

**BOOK of ABSTRACTS**  
of the  
**INTERNATIONAL CONFERENCE**  
on  
**CHANGING CITIES V**  
*Spatial, Design, Landscape, Heritage & Socio-economic Dimensions*



Changing Cities V, Corfu, 20-25 June 2022

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**Organised by**

Department of Planning and Regional Development, University of Thessaly  
Laboratory of Urban Morphology and Design

**in collaboration with**

Department of History, Ionian University, Greece

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## FORWARD

The series of international conferences on *CHANGING CITIES* aspires to bring together urban planners and designers, architects, landscape designers, urban geographers and historians, urban economists, urban sociologists, and urban policy makers, and investigate new challenges concerning cities and their future. The conference aims at becoming an international forum of transaction of ideas on cities' transitions. We have so far organized five conferences, with peer-reviewed Proceedings, taken place always in June, in venues with unique urban and natural landscape.

- *CHANGING CITIES I: Spatial, Morphological, formal and socioeconomic dimensions, 18-21 June 2013, Skiathos Island, Greece.*
- *CHANGING CITIES II: Spatial, Design, Landscape and socioeconomic dimensions, 22-26 June 2015, Porto Heli, Peloponnese, Greece.*
- *CHANGING CITIES III: Spatial, Design, Landscape and socioeconomic dimensions, 26-30 June 2017, Syros Island, Greece.*
- *CHANGING CITIES IV: Spatial, Design, Landscape and socioeconomic dimensions, 23-28 June 2019, Chania, Crete Island, Greece.*
- *CHANGING CITIES V: Spatial, Design, Landscape, Heritage and socioeconomic dimensions, 20-25 June 2022, Corfu Island, Greece.*

All Changing Cities conferences have been welcomed by the academic community worldwide, usually attracting over 300 presenters from more than 50 countries - Greece and Europe, USA and Canada, Latin America, Middle East and North Africa, Asia, Far East, and Oceania.

On this basis, we believe that despite the difficult conditions of the pandemic crisis, the energy crisis, and the war in Ukraine, the 5th Changing Cities conference will also be a successful academic event. This year, 400 abstracts from Greece and other 32 countries around the world have been submitted, while 13 special sessions have been pre-organised by distinguished academics. Besides, the relatively high percentage (about 40%) of contributions by scholars from abroad indicates the international character of the conference. The 5<sup>th</sup> Changing Cities conference puts an emphasis on transformations of cities caused by COVID '19 pandemic; the main theme is *'Making our cities resilient in times of pandemics'*. It also highlights issues of *heritage management in cities* validating the co-organisation of the conference with History Department, Ionian University. The strong interest in the 5<sup>th</sup> CC conference by academic communities, yet under difficult global conditions, allows us to have thoughts about organising the 6th Changing Cities conference on another Greek island in two years' time.

I would like first to thank the Organising Committee, the keynote speakers, and the members of the international scientific board who supported enthusiastically the academic organization of this conference. I would especially like to thank those colleagues of the Scientific Committee who have also pre-organized special sessions in this conference. I would like to thank all the academic and state organisations which supported this conference in many ways: University of Thessaly; The Ionian University in which the conference has been hosted; The Greek Ministry of Environment and Energy - The Green Fund; The Greek Ministry of Maritime Affairs and Insular Policy for offering their aegis and financial support.

**Aspa Gospodini, PhD**

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Department of Planning & Regional Development

Chair of the Organising Committee & the international scientific board  
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## OPENING CEREMONY

# CHANGING CITIES



Changing Cities V, Corfu, 20-25 June 2022

## **Welcome ADRESSES**

- 1. Prof. Aspa Gospodini**, Chair of the Organizing Committee, University of Thessaly
- 2. Prof. Efthimios Bakogiannis**, Secretary General of Spatial Planning and Urban Environment, The Greek Ministry of Environment and Energy
- 3. Manolis St. Koutoulakis**, Secretary General of the Aegean and Island Policy, The Greek Ministry of Maritime Affairs and Insulae Policy
- 4. Prof. Maros Finka**, President of AESOP and SPECTRA CE EU at STU in Bratislava. Cities in the "New Normal"
- 5. Prof. Athanasios Efstathiou**, Dean of Faculty of Humanities, Ionian University
- 6. Porf. Sofia Laiou**, Hed of the Department of History, Ionian University
- 7. Christos Voskopoulos**, Architect, Mayor of the Municipality of Kaisariani, Athens – Greece

## KEYNOTES SPEECHES

# CHANGING CITIES



Changing Cities V, Corfu, 20-25 June 2022





## The landscape design for the resilient city

**Prof. Em. Achille Maria Ippolito**

A.S.B. - Cultural Association "architect Simonetta Bastelli"

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### Abstract

I have always believed, even before the European Convention, that “everything is landscape”, using the words of Lucien Kroll. This personal belief has found a direct correspondence in the projects analyzed over the years, regardless of quality and outcomes. However, I found a substantial difference between profession and training.

Whoever designs for the landscape, or rather, in the landscape, must be defined as landscape architect. But is it by training? It is appropriate to reflect on the relationship between landscape and landscape architect, taking nothing for granted.

It should be noted that among the most important landscape architects we have, in recent decades, graduates in landscape architecture, but on the international scene we have agronomists, botanists, ecologists, gardeners and many architects. It is useful and important to analyze and compare projects on the basis of training, but also on the basis of the initial approach.

I said that I have often found an antinomy between profession and training: especially in the training of those who design. The relationship between profession and education is a crucial point of analysis. It is essential to investigate the role of landscape architects in the contemporary world, a basic element for analyzing the question.

Having noted the different training of designers, the study must shift to teaching. At the international level, there are many differences, especially between the Italian traditions and those of many European countries, with the Anglo-Saxon world. Aided by the thinking of academics and by the programs of many universities, it is necessary to take stock, highlighting the main concepts and purposes, but also highlighting the contradictions. One thing, however, is certain: the landscape project requires multiple disciplinary contributions and a strongly transdisciplinary attitude.

The landscape architect, also understood as the fulcrum and reference point of a large multidisciplinary group, has a fundamental role in the reorganization and enhancement of urban centers to make cities resilient, with lasting and not extemporary projects, overcoming their own enclosures, but maintaining the bases of the single specific training.

The project for the resilient city is a true landscape project, capable of withstanding emergencies, events and natural disasters, fragility and climate change.

Open public spaces, in their different types, are and must, even more, be at the center of redevelopment.

The epidemic emergency, with their social repercussions, have demonstrated this in an evident and sometimes worrying way, while giving stimulus and contributions.

The pandemic theme does not need specific and particular interventions, but it helps to reinforce the need for suitable planning, with a rebalancing relationship between architecture and nature, re-evaluating identities.

The idea of place is at the base as it is in close correlation with its identity and with the population that lives it, also through the cultural landscape with all its values.

The landscape project must recover and enhance identities, but also equip suitable spaces for community living and for services.

*Keywords: designer, landscape, resilient city*

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## The footprint of the pandemic on Mediterranean cities: states of exception vs permanent urban transformation

**Prof. Em. Lila Leontidou**

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### Abstract

The short 21st century is already full of bad surprises: space-time has been lined with crises and austerity, pandemics, and even war. We have been living in a constant “state of exception” of “memoranda”, “lockdowns”, border controls, bombardments, refugee waves, unprecedented restrictions in mobility and privacy. We will examine the pandemic, as it creeps into the global community in the 2020s. Our hypothesis is that, what we thought was a state of exception, has several permanent outcomes as it settles down on cities and regions. We will focus on certain geographical aspects of these changes in the EU periphery with special reference to Greek cities, seeking the set of forces which is put to motion to topple regional and global balances and create polarizations and other permanent rather than temporary transformations. We will stress that the pandemic tends to undermine our urban age, which has been taken for granted for so long, and open a discussion for the crystallization of a “new normal”.

It will be argued that the footprint of the pandemic in spatial polarization, land use, urban-rural imbalance, digital surveillance, social restructuring and other changes, is actually not ephemeral. The state of exception is creating permanent transformations on at least 12 geographical levels, which we will analyze, one by one. Cities are already changing radically, and their resilience requires strengthening through policy for social welfare, health and infrastructure rather than decorative interventions such as those disfiguring Athens in the 2020s. A ray of optimism might be discerned, as we hear, with climate change receding and sustainability advancing with stoppages of much of the economic activity. But is this really the appropriate way of saving the planet?

*Keywords: Covid-19, Athens, State of exception, the new normal, digitalization of quotidian, biopolitics of social distancing, land use change, privatization, deconstruction of ‘commons’, counterurbanization, littoralization, social polarization.*



## Is de-growth good for cities? Socially and politically controversial reflections on cities and urban planning in de-growth economics

**Prof. Izabela Mironowicz**

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### Abstract

Both research and empirical data demonstrate that there is very little probability of decoupling economic growth and its negative environmental impacts. It is probably impossible at all.

In 2018, Federico Demaria, an environmental economist at the Universitat Autònoma de Barcelona, addressing the representatives of the European Commission, said that “*the uncomfortable truth to be faced by policymakers is the following: economic growth is ecologically unsustainable*” and therefore “*the total consumption of materials and energy needs to be reduced, starting with developed countries.*”<sup>1</sup> This is in line with the demands raised in the paper recently published in *BioScience* (Ripple et al., 2020). More than 11,000 scientists who are signatories to this paper, agree with this position.

Thus, economic models for which growth is not a precondition are conceptualised and debated. Some of these do not address the issue of growth at all, such as Kate Raworth's concept of “doughnut economics”, while others explicitly argue for de-growth as a prerequisite for ensuring the survival of humanity on the planet (e.g., Meadows et al. 1972, Jackson 2009, Kallis 2011, Hickel 2020).

So far, however, little attention has been paid to the spatial aspects of de-growth, in particular the question of urban planning in an economy without growth (e.g. JinXue 2021, Lehtinen 2018). How are cities supposed to look and function in a system which is different from the one in which they have operated so far? This is not an entirely new situation for cities, as some of them existed under systems other than a liberal capitalist economy, such as feudalism. Yet, the transitions from one social (and therefore economic) system to another certainly constitute a serious challenge. How are the problems of de-growth and climate adaptation reflected and interconnected in cities, how will they shape their structure? And the lives of its residents?

In my presentation I will try to point out the most important challenges for cities in the transition to a de-growth economy and highlight some solutions that are already emerging. I will try to point out how in an urban structure climate and de-growth solutions can be mutually reinforcing. However, I will leave many more questions than answers.

### References:

- Hickel, J. (2020) *Less is More*. London: Penguin Random House.
- Jackson, T. (2009) *Prosperity Without Growth: Economics for a Finite Planet*. Oxon: Routledge.
- JinXue (2021) *Urban planning and degrowth: a missing dialogue* Local Environment, DOI: 10.1080/13549839.2020.1867840
- Kallis, G. (2011) *In Defence of Degrowth*. *Ecological Economics* 70 (5): 837–880.
- Lehtinen, A. A. (2018) *Degrowth in City Planning*. *Fennia* 196 (1): 43–45.
- Meadows, D.H., Meadows, D.I., Randers, J., Behrens III, W.W. (1972) *The Limits to Growth: A Report to The Club of Rome*. Potomac Associates – Universe Books.
- Ripple, W.J., Wolf, Ch., Newsome, T.M., Barnard, P., Moomaw, W.R. (2020) *World Scientists' Warning of a Climate Emergency*. *BioScience*, Volume 70, Issue 1, pp. 8–12, DOI: 10.1093/biosci/biz088.

<sup>1</sup>Quoted from: <https://degrowth.org/2018/04/02/why-economic-growth-is-not-compatible-with-environmental-sustainability/>, accessed 02.04.2022.

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## Changing Places during Covid-19 pandemic: new approaches for mapping and design

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### **Abstract**

The Covid-19 pandemic, although in different manner and measure, has changed habits and use of places and cities at global level. In many countries public spaces became completely empty for months and new urban landscapes have substituted the previous ones, transforming the private in public. Children and young interrupted the school in presence to start that by internet; adults experienced the smart working; elderly met their sons through the computer. Houses and balconies were used for work and study, allowing people to go inside the private life of everyone. The reopening of the public spaces required rules for social distancing indicated with signals, urban furniture and different kind of indications often with no attention to the identity of places and sustainability.

Accordingly, the keynote speech deals with the new methods to design public spaces which take mainly in account urban health and liveability issues, including the 15-Minutes, Flexible, Soft, Smart and Healthy Pl@ce Design ones.

While the 15-minutes city is a city able to offer all its inhabitants everything they need to live, work and have fun to be reached on foot in no more than 15 minutes, the flexible one is based on tools for architectural and urban planning and design, which are able to allow changes in the course of implementation of those projects. The Soft City is based on the idea that from the union of density and diversity a more liveable and healthier city can be obtained, as proximity of an environment can be translated into time. In the smart city the whole range of technologies are at the service of the place both to improve its liveability and healthy and ensure its sustainability. Finally, with the original Healthy Pl@ce Design method is possible to analyse people, their activities, elements, and factors useful to identify sustainable project interventions for liveable and healthy places.

Together with these approaches, new indexes were created to support the calculation of sustainability. The illustration of those which focuses on health and resilience issues including the HLHPl@ce index will complete the presentation.



## Transitional Visions for “Heritage Open Space in Transformation” in the Post-Covid City

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### Abstract

The heritage open space before the pandemic was full flow and the idea on its transformation was mainly based on the creating attractive places by adding activities for socialisation and urban quality. Yet in recent years historic open spaces were considering predominate places to characterise historic towns and cities and add urban values. Heritage assets were considered to acquire more value and importance of place-making.

In defining the 'Heritage Open Space in Transformation', (HOST)<sup>2</sup> as a “historic open space of great challenge that is strictly connected within innovative urban change”, one should consider a HOST as a space of special architectural and historic interest, the character of which can be sensitively preserved or transformed. But the recent consequences of the pandemic emergency, visions on the 'Heritage Open Space in Transformation' are clearly changed, bringing a huge challenge to most city centres and cities. However, social distancing, more environmental awareness and greening, technological and smart solutions on place-making have brought on changing the heritage space-status.

Rethinking the heritage open space is now clear for everyone and new ideas on how to bring life back in such spaces is the new reflection for the post-covid City:

- New strategies should be adopted by local authorities to manage this shifting emergence.
- New uses should be considered for more change
- A new role of heritage assets should be considered by professional and local people.
- Urban resilience should play an important role in historic city centres
- Temporary infrastructures should be introduced for more flexibility on heritage places activities.

Cities need to take active measures either to prevent or, however be able to respond to exceptional events. At the current, the world scenario has highlighted how critical is urban situation of cities; how difficult is to live in social distancing with the urban environment. Consequently, this conflict felt totally on people's health, physical and mental well-being.

Finally, pandemic crisis should be seen as a great opportunity to re-thing cities and re-design urban spaces. It is important to consider the need for a more resilient city, more adaptable to future challenges and sustainable to focus on people needs. Experiencing sustainability and urban resilience that is based on preparation, prevention and responsibility should lead to increased knowledge for future actions.

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<sup>2</sup>The notion of *Heritage Open Space in Transformation HOST* has been introduced and formulated by Dimitra Babalis in the framework of the IV INTEGRO UAD Annual Meeting, held in Florence in March 2018. For a discussion of this see: Babalis D., (Edited by) (2018) *Heritage Open Space in Transformation. Changing Attitudes*, Altralinea Edizioni, Florence, Italy.



## Planning towards creativity and circular economy for urban revitalization and sustainable development of historic cities

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### Abstract

Development of cities is closely linked to creative productive activities. It is often observed they are located in city centers benefiting of the advantages offered by the location, such as the low cost of transportation of raw materials and products, as affordable rents, and as the possibility of finding a skilled workforce. In this favorable spatial context, the cooperation and networking are developed between related Cultural Creative Industries (CCIs) and other relevant Small Medium Enterprises (SMEs) and clusters are created. The resulting social and economic interconnections strengthen further this particular ecosystem, and they create a particularly characteristic Historical Urban Landscape.

Today, the Cultural and Creative Industries can boost urban economies by promoting new activities. They also strengthen other related economic sectors. Crafts, publishing, fashion and a variety of other applied arts are the contemporary expression of traditional activities that flourished in cities, adding value to local economies and shaping the symbolic aspects of urban centers. It is considered that the CCIs can play an important role in achieving the goal of sustainable urbanization.

In the context of Agenda 2030, the highest priority is given to the issues of protection of the natural and man-made environment and reducing climate change. To this end sustainable economic growth with lower emissions, the reduction of global waste and the shift of the model of production and consumption to a circular economy are needed. Therefore, cities must create a resilient ecosystem that can create new networks of cooperation between SMEs and other actors that can contribute to the circularity of the urban environment. So, we are looking for innovative business models that recycle waste as part of the value chain. Cultural and Creative Industries can help shift local urban economies to a circular production and consumption, including the optimal use of material resources and the enhancement of innovation in SMEs. Historic cities can develop their own waste recycling strategies in collaboration with the creative industries and circular economy action plans for the benefit of revitalization of their historic centres towards their sustainable future.

*Keywords: Historical Cities, Historic Urban Landscape, Cultural Creative Industries, Circular Economy, Sustainable Urbanization, Urban Revitalization.*



## Resilience and sustainable development of historical towns. The case of Corfu

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### Abstract

The presentation will highlight the relationship between "sustainable development" and the "resilience" of cities and their common goals. These are concepts and policies that have been gradually formed due to the pressures and threats arising from the rapid changes in the built and natural environment. The connection of their principles and goals with the principles of "integrated protection" of historic cities will also be presented. The goal is to highlight the need to combine the above policies and integrate them into emerging development policies.

"Sustainability" is one of the five pillars of the European Framework for Action on Cultural Heritage, as its objectives include strengthening social capital and economic development, by revitalizing cities and regions through their cultural heritage, by reusing historic buildings in the context of the circular economy and by promoting cultural tourism. The concepts of sustainable development and resilience and their policies are complementary, as both refer to the environment, the society, and the economy and in addition, resilience refers to the ability of the above to deal with risks and changes, without compromising their evolution and development. As both policies deal with conservation of natural and man-made resources they are related to the principles of "Integrated Protection" of historic cities, whose aim is the preservation of the natural and man-made historic environment.

The old town of Corfu - a world heritage town - faces many challenges as it evolves over time, threatening its balanced relationship between social needs, economic activities and cultural identity. They arise from natural phenomena but also from human activities. These challenges and the policies, strategies and actions required to achieve the city's resilience and sustainable development will be discussed.



## Urban agony and political uncertainty: from Mary Shelley's fictional narratives to real Covid19 pandemics cities

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### Abstract

Six years ago, during the 2<sup>nd</sup> Changing Cities Conference, held in Porto-Heli Peloponnese in 2015, I have mentioned, in low voice, during a round-table discussion that the present and future of the Western metropolises could not be solely described as an optimistic present and future. Small clouds of social and political disturbances seemed to be gradually accumulating and a slighter or stronger 'rain' of problems could probably appear. Gradually, I began to realize that my recent urban disappointment, my own 'spleen de Paris', the melancholy of the big cities, was not a recent historic feeling solely. I could comment that the previous poetical expression initially applied by Charles Baudelaire in a collection of shortprose poems, was used in order to describe his cultural and, I may say, his political despair. I prefer however to be even more provocative and remark that the promises of the Western Enlightenment have been postponed many times, during the last two centuries. Joker was laughing again and again, in his schizophrenic criminal attitude, but before him Doctor Jekyll was constantly transformed into monstrous Mr. Hyde in the Western metropolises. Bram Stockers Dracula violated European cities in the past, bringing with him epidemics. Did Baron Haussmann's urban rehabilitation prevent the Parisian Commune; did modernist optimistic visions prevent Guernica or Hiroshima?

I have written the previous part of my abstract before February 28<sup>th</sup>, before the beginning of the Russian-Ukrainian war. Military invasions and city bombardments, seemed to be till now in safe distance from European countries; Ukraine, Poland, Swede, Finland. My principal European agony had to do with epidemics, or probably with immigrants and refugees arriving in Western cities from their own impoverished and destroyed homelands. However now the case is different... Was Shelley's frightening narration in her *The Last Man* novel, a horrible oracle? Pandemic is it again, as in her novel, associated to military confrontation and the collapse of our political certainty?

*Keywords: political uncertainty; urban agony; cultural didactics and urban heritage; political didactics and urban heritage; economic 'enlargement'; cultural and political 'development'; pandemics; 'dark' fictional narratives; Mary Shelley's Last Man*

# A ‘Trans-Urban’ structure: is it a building, is it an open-air public space, is it a landscape project?

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## Abstract

### A multi-value structure that may be used as an incubator of public urban life

Our presentation refers to an urban structure, we do not use the term ‘building’, characterized by trans-formal identity. It oscillates among a building formation, an open-air public space and a landscape project. It is in this context that we shall use the term ‘urban’, ‘Trans-Urban’ in a more elucidating description. Its principal identity has to do with its urban apprehension and, moreover, with its multi-value appearance, with its multiform functionality and publicity.

In other presentations of this Changing Cities 5<sup>th</sup> International Conference, we shall express our agony about the tormented future of our world, of our bombarded and destroyed cities, about the promises of Enlightenment and Western democracy that have never been realized in their full, complete cultural and political value. We may refer, in those other presentations of ours, to our changing cities that have never been formed in complete accordance to our democratic dreams. However, in this key-note speech, we shall continue to promote our visionary proposals about urban public space, presenting an urban structure hovering among three different identities: is it a building, is it an open-air public space, or is it a landscape project? It is ‘Trans-Urban’, continuously moving from one urban identity to another...

The project to be presented was awarded with the first prize in a pan-Hellenic architectural competition, concerning a public building for the services of the General Secretariat of Infrastructure of the Greek Ministry of Infrastructure and Transport. We believe that it was thus awarded, because it refers not solely to an enclosed building structure, but to a more ‘extended’ space formation; an open-air public space and a landscape formation as well. After the previous pan-Hellenic first award, the proposal presented was also honoured with the first award for the category Public Building (Concept), of the international architectural competition ‘Rethinking the Future 2022’. It is in this context that ‘Arsis Architects Architectural Team’ presents this paradigmatic project to you, being for sure extremely proud for the two previous distinctions. Functional efficiency, spatial flexibility, aesthetical projection to the public space, structural innovation, bioclimatic sustainable design and energy intelligence are the targets of the design of the ‘Trans-Urban’ structure. Its innovative character and its contribution to the immediate city tissue may constitute a significant landmark to further strengthen the identity and economic growth of the surrounding Athenian territory.

*Keywords: ARSIS ARCHITECTS, ‘Trans-Urban’, public building, open-air public urban space, urban landscape formation, structural innovation, bioclimatic sustainable design, energy intelligence*



## Positioning Maritime Spatial Planning (MSP) in the core of spatial planning debate.

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### **Abstract**

Maritime Spatial Planning (MSP) was initially defined as ‘the public process of analysing and allocating the spatial and temporal distribution of human activities in marine (and terrestrial) areas, to achieve ecological, economic and social objectives that are usually specified through a political process.’ (Ehler & Douvère, 2009). This is essentially aligned with the process of terrestrial planning and the two present similarities and face parallel challenges. MSP in practice presents a high degree of diversity induced by national and sea-basin related contexts, dominant planning traditions and policy priorities. In broad terms, it is possible to recognize two distinct interpretations of the role of MSP. The principal task of MSP may be understood in terms of sea use regulation that may be achieved through zoning and rigorous use designation. Regulation of sea use can provide a degree of certainty for maritime industries and other economic interests and contribute to ensure stability, coherence, and compatibility among sectoral plans. This kind of plans is often legally binding while allowing for some decision-making options on specific proposals. There are many examples of such a “negative coordination” since the idea is to bound activities, create frontiers and avoid interference between them. Beyond this kind of rigid coordination there can also be a soft and positive coordination that will promote mutual understanding and trust between stakeholders, more ambitious aspirations and the capacity to build on novel solutions together. This kind of MSP is the one performing a strategic visioning role, establishing a cohesive policy framework for future decision-making, based on a future-oriented policy vision. Strategic MSP may lead to potential synergies and points of intersection across policy sectors. Hence, MSP should be understood as a strategic and evolutionary process, genuinely embedded in and regularly revealing fundamental societal and cultural values. MSP should evolve towards a tool both encouraging and controlling market forces simultaneously. Key challenge for MSP is to achieve a balance between market and non-market considerations and outcomes. In this context the recent draft of the “National (Hellenic) Spatial Strategy for the marine space” will be briefly presented and criticized.



## Individual Actions for the Implementation of the 17 Global Goals of Sustainable Development in Cities

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### **Abstract**

Aiming at Sustainable Development, the United Nations Special Meeting on Environment and Development has set the 17 Sustainable Development Goals. These Goals are the commitment made by the leaders of the Member States to work collectively and to be able to deal with the global problems facing the planet in all areas by the year 2030.

As we approach the year 2030, the individual effort of each citizen is important! The participation of all of us is essential! The sum of the individual actions will lead to the final success of the 17 Global Sustainable Development Goals.

This paper highlights specific proposals for individual actions that each of us can follow for the success of each of the 17 Goals of Sustainable Development. Since everything in the environment, society and the economy are interconnected and interdependent, then one of our actions can have a positive effect on more than one goal. Therefore, we choose to repeat some suggestions for each goal separately.



## **The Covid 19 pandemic and Tourism: old stories, new challenges, lessons learned;**

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### **Abstract**

The paper will deal with the impacts of COVID 19 on Tourism and the major policy and developmental issues which resulted for the post pandemic era. In the first section of my paper, I will argue that some of the most severe impacts are related to a number of issues which are not new and have concerned the development and policy of Tourism for decades. In the second section I will analyze the new challenges which have occurred in relation to COVID 19 and the need to address them in the context of the context of a four partite approach: local governance of Tourism Destinations, internationalization of Tourism Development, climate change and Tourism and sustainable goals and Tourism. In the third section I will present the policies and strategies needed in order to implement successfully the needed changes in the day after the COVID pandemic so that lessons learned will not be forgotten.



## The reuse of industrial buildings as lever to upgrade the urban environment of cities

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### Abstract

The exploitation and reuse of the architectural heritage, starts from the depths of the centuries and has contributed to the preservation of important monuments of world's culture. The reuse of historic buildings is considered as one of the most environmental- friendly development of cities.

The remains of the historical industrial heritage is a special category of buildings and their reuse has given particularly encouraging results for the transformation of the degraded areas of cities. Most of them are large in area, built on centrifugal plots and due to their architectural and technical characteristics attract solutions for a wide range of new uses. Museums, cultural centers, educational buildings but also hotels, administrative spaces, offices and residential complexes are some of many uses they can serve, giving way to the increasing needs of cities.

The history of the restorations and functional reuses of industrial buildings or complexes and ensembles as well as entire industrial areas proved to be a good opportunity for traffic and urban interventions that necessary to all cities. The idea of total demolition of buildings, machinery and equipment, with no other level of evaluation, has been already abandoned internationally and the exploration of possibilities for the preservation and integration of new uses is recommended in abandoned industrial shells. The cities dynamically accept the changes and transformations between past, present and future. The preservation of the industrial heritage is now a conscious choice and a new strategy for the city that accepts its past and redefines its attitude with it.

In this presentation, we make an attempt to highlight the benefits of rescuing, recording and utilizing abandoned industrial complexes through successful cases implemented mainly from Europe and Istanbul and to mention the effects in the urban environment on underdeveloped areas of the cities. An attempt is also made to present the financial management models, and the strategies that have been implemented to motivate and make the project a success.



## Aristotle's Mosaic: The pandemic's hybrid landscape and the intangible presence of the past

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### Abstract

Designing spaces that encourage “living together” in “times of pandemics” requires the understanding of historical, geographical, and cultural landscape. The meticulous exploitation of past experiences can help develop a pragmatic plan for the future.

A typical example of a radical redesign of a multicultural city is the reconstruction of modern Thessaloniki a century ago. At the core of this presentation is the Aristotle Axis in Thessaloniki, originally conceived as the “Boulevard de la Société de Nations”. A related double exhibition in the frame of the Greek participation in the 17<sup>th</sup> Biennale of Architecture was presented simultaneously at the Greek Pavilion in Venice and in situ at the Bey Hammam in the area of the Aristotle Axis.

The urban axis bears the name of the methodical ancient philosopher and polymath, Aristotle, according to whom:

- Human beings are by nature “political animals” and as creatures of reason take part in the life of the polis, not only for physical survival but also for the sense it gives of an organized community. Aristotle’s oft-cited formulation allows for multiple investigations into the substance of human nature and the public space of the polis.
- Citizenship is distinguished from other forms of community, such as kinship or companionship, as it is rooted in the potential equality that emerges from dialog and the laws governing relations between individuals.

The “Boulevard de la Société des Nations”, the epicenter of Ernest Hébrard’s plan for the reconstruction of Thessaloniki (1918-21), followed an idealized Grand Manner dominated by a notion of centrality. The Aristotle axis can be seen as an extensive series of sweeping perspective highlights, integrated into the city’s sloping topography.

- At the root of the interventions, foreseen in the urban plan, lay the vision of strong political authority embraced by Venizelos and Papanastasiou.
- The pursuit of an eclectic regionalism was underscored by introduction of “neo-Byzantine” details. These decorative motifs formed part of a façade architecture that featured classicist proportions and the alternation of volumes and voids.
- Economic conditions prevented Hébrard, Zachos and Kitsikis’s ambitious visions from fully being realized. Their dramatic mis-en-scène remained unfinished.
- In the post-war years, it took yet another powerful political intervention by Prime Minister Konstantinos Karamanlis, to complete reconstruction albeit at greater density and with a simplified iconography.

The Grand Manner in the plan sought to achieve monumentality, order, and rationality, as opposed to the “chaotic” organic structure of the traditional city. Such “authoritarian” approaches were a common feature of not only neoclassical but also many modern solutions that adopted a central hierarchized management of urban space.

Despite the partial implementation of the original plan, the central monumental promenade of Thessaloniki remains today a pleasant surprise in typology and form, a unique public space with a heightened sense of urbanity. The realized section is marked by a sober monumentality, contributing to the unique identity of the axis, and ingraining itself in collective memory.

### **Book of Abstracts**

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During the COVID-19 pandemic, the Aristotle Square and its axis, nearly deserted, brought to mind the paintings of Giorgio di Chirico. The sacramental melancholy of this urban still life, formed in rows of uniform neo-Byzantine façades, seemed to be dominated by startling intangible sculptural presences.

The palimpsest of Roman, Byzantine, and Ottoman elements that accentuate this urban still life echoes the coherent architectural composition that surrounds them. With the arrival of the pandemic, the day-to-day bustle in the square and its axis abated, allowing revelatory metaphysical references to emerge in its place. Strange perspectives came into view that brought to the fore distant traces of a lived space.

What sources of inspiration did the designers of Thessaloniki's monumental axis draw upon?

- Paris's royal squares and façades, which Ernest Hébrard had known first-hand?
- The Roman ruins and archeological reconstructions in Split, Diocletian's palace-city?
- Andersen and Hébrard's utopian vision of a global city, which sought to employ art as catalyst to create a World Center of Communication?
- The surrealistic image of the ruined basilica of Saint Demetrius that Alberto Savinio, de Chirico's brother, painted during his stay in Thessaloniki in 1917?
- The basilica of Saint Demetrius, rebuilt by Aristotle Zachos, who sought to revive an imaginary neo-Byzantine grandeur through an archaeological surrealist utopia?
- The prospect, which became feasible with political leaders such as Eleftherios Venizelos and Alexandros Papanastasiou, of applying modern-day ideas to rebuild Thessaloniki as a Balkan metropolis in which memories of Byzantium could be revived at the same time?

The politicians and architects who created this metropolis, with its multi-story buildings, modern-day infrastructure and city planning, favored hybrid urban landscapes that accommodated an idealized projection of the past. Arcades and uniform façades, enriched with classical and Byzantine motifs, sought to give shape to the never-ending cycle of "motionless" time.

We may have had occasion these days, to view these cityscapes as a wilderness created by the COVID-19 pandemic. An image akin to the perspective drawings originally made for the monumental Aristotle axis, in which sculptures and gardens are surrounded by volumetrically articulated, ornamental façades, without human presence.

The palimpsest of the deserted center of Thessaloniki resembled a vast urban museum that was closed to the public. The few masked pedestrians to be seen recalled the faceless figures of de Chirico and the Surrealists. Paradoxically, it was in the gloom of lockdown that we came to truly appreciate the value of public space—that precious, incomparable space where we can truly "live together", surrounded by the emblematic setting that classical city planning has bequeathed us.

*Keywords: Aristotle Axis; grand manner; pandemic; Thessaloniki; urban landscape*



## Post-pandemic reforms of the post-Generic City

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### **Abstract**

Cities are a dualistic representation of ‘perpetrator-victim’ regarding most of the challenges that humanity currently faces. For example, they are major source of greenhouse gas emissions, yet potential victims of natural disasters caused by global warming.

The Covid-19 pandemic has further enhanced cities as a cradle for future solutions. It activated several world cities to rethink and calibrate urban strategies and policies so as to pursue resiliency by becoming smarter, greener, and more inclusive: remote work through smart technology transportation patterns, the adoption of AI accelerated, temporary and permanent cycleways were created to provide greater access, ultra-low emission zones were introduced, and time-related City Models such as the 15-Minute City and the 1-Minute City were embraced.

The presentation will discuss the pandemic crisis as a reform agent for the Post-Generic City. Picking up the thread from Rem Koolhaas’ concept of the Generic City, it will focus on shifts and fallacies that the pandemic crisis highlighted in relation to, among others, identity, density, urbanity, centrality, consumption and diversity and the need to reinvent our notion of urbanism by rethinking the way we design, build and use space.

Within the concept of the generic city under globalization, we elaborate on symbiotic post-generic strategies for the post-pandemic city towards resilience.

# The municipality of Kaisariani, a small city with a great history: 100 years of cultural and political output

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## Extended abstract

The city of Kaisariani is a characteristic phenomenon of the 20th century. The era's history is literally carved down on the body of the city. Kaisariani was born from the ashes of the Greek-Turkish war, while Europe was still struggling to define its internal and external borders. Kaisariani's first landmark year was **1923**, when it was founded by refugees from Asia Minor, during one of the largest population exchanges in history. The refugees carried a rich urban culture that transformed both the Greek landscape and the Greek society. Their perception of common space and participation in public affairs, their cosmopolitan approach in sports, arts, crafts, commerce and gastronomy revitalized the Greek urban life and economy.

The second historical landmark for Kaisariani was the **Second World War**. Our grandparents massively joined the Greek Resistance. 49 battles took place in Kaisariani between the Nazi forces and the Greek Partisans. The city was never fully conquered. They never surrendered. Kaisariani still bears the marks of its struggle to remain free. The most iconic place is of course the Skopeftirio Shooting Range, where the Occupation Forces executed almost 700 partisans. Skopeftirio deserves to take its rightful place in the European historical map of WW II. Our initiative to create the "Network of Cities Against Fascism" is heading towards that direction.

Contemporary affairs and events such as the **climate crisis** and the **pandemic** have introduced a third historical landmark for Kaisariani: its environmental importance and role in the vicinity of Athens. Located on the foot of mount Hymettus, the Kaisariani Forest, with its cultural, religious and environmental landmarks, presents itself not only as a prominent touristic destination, but first and foremost as a "green window" to the Athenian cemented landscape. Along with the Union for the Protection and Development of Hymettus, we are designing the "Kaisariani Trail", the first of 12 paths of Hymettus to receive European certification, thus 'pinning' Kaisariani in the European map of thematic tourism.

Nowadays, we are redefining our heritage in contemporary terms. A rather characteristic sample of our effort is the redesigning of the heart of our city, its main square. On this vital project we were lucky to collaborate with Professor Kostas Moraitis and his team of Arsis Architects, who approached it with the uttermost respect and admiration for our city's history and cultural heritage and even managed to incorporate all of it in the design, making it part of the future landscape, of everyday life for the city's inhabitants and visitors, for the old generations to remember and the young ones to learn. Please enjoy the video:

*Keywords: Municipality of Kaisariani; 1923 Minor Asia Greek refugees; Greek Resistance against Nazis, Network of Cities Against Fascism; Kaisariani Trail; climate change; urban heritage*



**PRE-ORGANIZED SPECIAL SESSIONS**

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Changing Cities V, Corfu, 20-25 June 2022

## **THE ROLE OF THE DESIGNER FOR THE RESILIENT CITY**

**CHANGING  
CITIES**



**Changing Cities V, Corfu, 20-25 June 2022**

**Organized and chaired by Prof. Em. Achille Maria Ippolito**

**Prof. Em. Achille Maria Ippolito, Simonetta Bastelli Cultural Association**



## The landscape design for the resilient city

**Prof. A.M. Ippolito**

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### Extended abstract

I have always believed, even before the European Convention, that “everything is landscape”, using the words of Lucien Kroll. This personal belief has found a direct correspondence in the projects analyzed over the years, regardless of quality and outcomes. However, I found a substantial difference between profession and training.

Whoever designs for the landscape, or rather, in the landscape, must be defined as landscape architect. But is it by training? It is appropriate to reflect on the relationship between landscape and landscape architect, taking nothing for granted.

It should be noted that among the most important landscape architects we have, in recent decades, graduates in landscape architecture, but on the international scene we have agronomists, botanists, ecologists, gardeners and many architects. It is useful and important to analyze and compare projects on the basis of training, but also on the basis of the initial approach.

I said that I have often found an antinomy between profession and training: especially in the training of those who design. The relationship between profession and education is a crucial point of analysis. It is essential to investigate the role of landscape architects in the contemporary world, a basic element for analyzing the question.

Having noted the different training of designers, the study must shift to teaching. At the international level, there are many differences, especially between the Italian traditions and those of many European countries, with the Anglo-Saxon world. Aided by the thinking of academics and by the programs of many universities, it is necessary to take stock, highlighting the main concepts and purposes, but also highlighting the contradictions. One thing, however, is certain: the landscape project requires multiple disciplinary contributions and a strongly transdisciplinary attitude.

The landscape architect, also understood as the fulcrum and reference point of a large multidisciplinary group, has a fundamental role in the reorganization and enhancement of urban centers to make cities resilient, with lasting and not extemporary projects, overcoming their own enclosures, but maintaining the bases of the single specific training.

The project for the resilient city is a true landscape project, capable of withstanding emergencies, events and natural disasters, fragility and climate change.

Open public spaces, in their different types, are and must, even more, be at the center of redevelopment.

The epidemic emergency, with their social repercussions, have demonstrated this in an evident and sometimes worrying way, while giving stimulus and contributions.

The pandemic theme does not need specific and particular interventions, but it helps to reinforce the need for suitable planning, with a rebalancing relationship between architecture and nature, re-evaluating identities.

The idea of place is at the base as it is in close correlation with its identity and with the population that lives it, also through the cultural landscape with all its values.

The landscape project must recover and enhance identities, but also equip suitable spaces for community living and for services.

*Keywords: designer, landscape, resilient city*

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## Beauty and happiness in the resilient cities of the future

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### Extended abstract

It is believed that much-desired happiness can be created or even induced: for example, it may be useful to prepare yourself with a positive attitude, work to achieve some goals, promote healthy and fulfilling social relationships. Any activity of this type must necessarily take place in a space, be it surrounded by walls or by the sea, the sky, buildings or nature.

Emotions depend on the physical characteristics of the places in which we experience our existence, so that, by changing a place, the resulting emotion can be changed. By creating a beautiful place you can get a beautiful emotion. It may seem too easy, however, thinking about a moment of happiness you have to place it in a space; it is really impossible to remember a happy moment in a smelly or dangerous wrecked place.

So good architecture, or even beautiful architecture (a room or a city or a landscape) can make us feel good or even make us happy. Probably they gave us the fairytale castle we could only rejoice, just as lying down in a lush garden could give us serenity and something more. The nest of our little house like the scent of a single flower could make us happy, but not just any flower or any house: only welcoming, well-designed and possibly beautiful spaces have this power. Designers (creators of apartments, cities, gardens or landscapes) must be able to create beauty, because it is precisely this promise of happiness as it tears us away from the problems of life to project us towards our best fantasies. But what is beauty? And what is beauty for each of us?

When it comes to a "beautiful" city, everyone can imagine it without smog and without noise, safe, clean, with lots of greenery and possibly scented. I do not intend to argue that it can be created "at the table", but there are some rules that - if applied - can induce and lead to a state of happiness.

A green city with many parks and tree-lined avenues, is not an unattainable dream and there are numerous urban reforestation campaigns in the world and the absence of cars in the centers is beginning to be experienced and theories against soil consumption are being applied. And trees are living beings' best allies. The ecosystemic services they perform are numerous: they protect us from excessive heat, retain fine dust and many pollutants, transform carbon dioxide into oxygen, muffle noise, increase the real estate value of nearby buildings and ... and they are beautiful! Let's think about how much this beauty can regenerate us psychologically; it is therapeutic, invigorates, connects our microcosm with the limitless and timeless macrocosm. And we designers must re-create the benefits that nature possesses and transmits to us, bringing nature into cities.

When we are happy we say we feel in heaven, so let's try to create our small individual or citizen paradises by seeking harmonious coexistence with all living beings on the Planet.

*Keywords: happiness; city; urban regeneration; green; ecosystem; resilient; architecture*

## Cultural heritage's management in contemporary cities

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### Extended abstract

*To hurry or not in design. That is the question* Today, the approach to the question of sustainability often provokes a frenzy of activity, in restlessly search for rapid and effective solutions. Most of the time, speed is a bad XL scale ways adviser. It would be more beneficial to talk about hierarchies of problems which, in their turn, need various speeds of evolving solutions that interact with each other and gradually move towards a common horizon as an objective. Many stakeholders have a role in the process from the political, economic, social and design spectrums.

The role of design is not free of this frenzy and necessitates too a variety of different speeds approaches: Industrial Design, Architectural Design and Planning Design to which must be added the "cultural" variable, as, properly, the cornerstone of training, not of the simple change.

Differences of approach are the solution to these problems, because they facilitate and trigger, in the short term, but especially in the long term, resilient societies and communities, both as biodiversity, both as design-diversity. The small size can become part of the public domain of the city, as a place or object which is liveable through experience. It suffers the congestion, but unmasking its presumed irreversibility. Its content is a sheltering action which, without self-hidding behind an external "skin", reveals itself by the internal truth.

There is a story, that a client came to Norman Foster for a new factory, and he redesigned their manufacturing process so they could stay in their old one. So, the designer had to examine very thoroughly the client's existing processes and organisation. And in this case, he saw that improvements could be made which would remove the need for a new building: the renounce to abstraction is the basis for achieving, with little, a radical update.

The significant appearance of an object derives from his basic possibility of sustaining the essentiality of human gestures, in a daily revelation of a world open to future happiness. So, the loving observation on small artifacts creates an object that *unites* a community. Crisis accompanies us in the present time and makes us so close to poverty - even if we do not want it or try to abolish the thought of it - and, perhaps, may lead us to discover a different fundamental: understanding what is simple and light is not, in itself, insufficient or missing, but could represent a refinement of the constructive ability to aim and signify by adequate means and techniques.

*Keywords: design approach; urban integration; processes; small objects; community; adequate means*

## Improving the life in today's Cities

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### Extended abstract

We know that to grow physically and psychologically children and young people need to live a healthy life and play outdoors. Today, however, many cities do not allow this type of life, both because of high pollution, both because traffic represents a constant danger, and because in many neighborhoods, but also in medium and small centers, there are no spaces to play and meet. It follows that many children lead a sedentary life and lack the sociability they need.

Yet, it has been more than a decade that a new sensibility has begun to spread in Europe pushing urban planners, administrators, and ordinary citizens to rethink the city by recovering what was good in the communities of the past (squares, gardens, orchards, roofs and green terraces, etc.) and designing new spaces that can be used on foot and by bicycle. Many people now believe that the city road network should be rethought according to the needs of pedestrians, not just vehicles; that in renovating old neighborhoods we must de-cement by restoring green areas and meeting spaces; that in designing new neighborhoods we must create significant, non-dangerous and polluted "places", as an alternative to anonymous and squalid "non places" to be crossed quickly for fear of aggressions.

Among the criteria to be taken into account to improve the living conditions of citizens and the functioning of urban areas are: the liberation of historic centers from traffic, efficient waste and energy management, an effective water policy (which also includes bringing underground streams to surface), reduction of air and noise pollution, as well as a fair distribution of the surface of green spaces per inhabitant, completed by a criterion of distance of a green space less than 300 meters from an urban population nucleus.

The improvement interventions vary from city to city according to the characteristics of the territory. Thus, in the face of cities such as Oslo, where the forest has been incorporated into the urban space, Zurich, on the other hand, which already has a vast area of its hinterland occupied by forests, has been pursuing for years a policy of "recovery" of creeks and streams (freeing them from concrete and underground deviations) to make them flow through the city flanking them with vegetation.

In Paris as in New York, in Philadelphia as in Rotterdam, many elevated structures, mostly disused railways, instead of being demolished have been converted into parks that wind at various heights within the neighborhood. With the well-being of citizens and the reduction of exhaust gases in mind, there are many cities, even in our country, that have created cycle paths and are planning to extend them. Needless to say, the tracks must meet maximum safety criteria (traffic lights reserved for bikes, priority over cars). This also applies to scooters whizzing on the street and on the sidewalks, causing numerous accidents.

Finally, some cities have developed a real philosophy towards greenery, such as Montpellier, whose "urban tree map" reads: *In Montpellier the tree is present and respected. For centuries now, the tree has not been treated as a simple urban furniture.*

*Keywords: Play; greencities; parks; living places*

# Ecosystem Services and Urban Green Design: the Case Study of Barge (Italy)

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## Extended abstract

There is widespread and growing concern worldwide about the serious pressure on our natural capital: the planet's heritage of biodiversity and ecosystems is being depleted as a direct or indirect consequence of human activities. This is why it is necessary to set up projects based on concrete actions aimed at keeping healthy and resilient the natural systems from which we derive the resources that guarantee us a high quality of life. It is precisely in contexts where human pressure is greatest that those actions can bring the greatest benefits. Enhancing natural capital can increase the direct or indirect, material or immaterial benefits that humans derive from the proper functioning of an ecosystem, including an urban one. These benefits are defined as ecosystem services (ES), which are often fundamental to the development of sustainable goals and to supporting environmental policy objectives at all levels of urban governance. There are many ways of assessing ES, ranging from the application of spatially explicit biophysical indicators to analyse the spatial distribution of ES, to web-based modelling suites or platforms, or to the biophysical characteristics of vegetation. As the vegetation component has become in recent years fundamental to address a number of urban and peri-urban challenges in the development of a more sustainable and resilient city model, the paper focuses on this issue, analysing methods of vegetation selection in the design phase, aimed at the provision of ES. In this regard, a project of a green space under construction in Barge (Piedmont, Italy) is proposed as a case study. The project has been financed by a private foundation, with the aim of increasing the natural capital of urban and peri-urban centres in Piedmont, focusing on the theme of ES. Two different methods were used in the design phase to identify the potential species to be planted: the use of national and regional documents and guidelines; the application of a species-specific air quality index. The final choice of plant species was based on the characteristics of the site and the needs that emerged from the discussion with the municipal administration. The proposed methodology is replicable in different national and international contexts, becoming a model to be adopted for the accurate choice of vegetation in public green space projects. Collaboration between different realities, including municipalities and academia, is essential to design public green spaces in an innovative way, able to face the current challenges related to climate change and to reconcile them with management needs.

*Keywords: natural capital; plant species; public space; biodiversity; urban green infrastructure*

## Future cities, between technology and environment

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### Extended abstract

The 21st century has turned the spotlight on climate change, which has altered the balance of the environment, placing the emphasis on the actions to be taken to safeguard the world to be handed down to future generations. One example of this is the Fridays for Future movement led by the young Greta Thunberg.

Cities have had to cope with rapid climate change, which has increasingly affected coastal areas and helped to isolate marginal areas considered at risk. There have been many urban regeneration projects related to sustainability, especially large projects in Northern Europe, aimed at creating the right proportion between architecture and nature.

Yet cities have been unable to cope with and counteract, both economically and socially, the effects that the global pandemic has generated in the last two years.

The enormous concentration of the population in the city, the so-called metropolitan areas, has meant that the negative effects on physical and mental health are spreading fast.

The indoor and outdoor spaces of the contemporary city have not been sufficient and adequate in guaranteeing public health both from a health and psychological point of view.

City services have been interrupted. Places of sociability and open spaces have been banned.

Homes, formerly familiar and intimate places, have become offices, working spaces that are inadequately equipped and comfortable. From a place of the heart to a place of stress, where everything happens.

Architectural spaces, especially those related to work, have not allowed social distancing, in the contemporary city everything is concentrated in order to guarantee the citizen services and infrastructures within a few kilometers.

And yet, until now, spaces have been planned with the idea of combining services, infrastructure and well-being for the citizen. The pandemic has highlighted the great problem of long-term planning, with objectives primarily for public health as well as the environmental and socio-economic well-being of the city.

The role of the designer becomes central, the cities of the future will have to be designed according to constant variables.

The concept of multidisciplinary is therefore the keystone for long-term planning and landscape design, the professional figures appointed will have to interconnect themes such as sociology, environment, health, economy and technology.

*Keywords: Landscape; city; urban design; regeneration; health; sociability; environment*

## Resilient habitat and long times in contemporary project

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### Extended abstract

The recent pandemic events - and mostly the growing awareness of an increasingly likely 'endemic' coexistence with global viruses - require really deep reflections on the new paradigms of space transformation and about which role the architect and landscape designer should play in such processes. The paper, through some cases and research experiences, tries to highlight two possible lines in the redefinition of this role:

*The revision of the very idea of the city:* the designer will no longer be called, even in the smallest of interventions, just to solving the specific problem in its well-defined space but to place his action within a system of "reciprocal resonances" that see the urban organism behave as a 'living being' in which 'everything is interstice'. The concepts of ecological step, of preservation of empty spaces, of residual, of biological mixité, will take on a paradigmatic value in the perspective of a new city idea that must regain its vital connections with the territory and with the landscape. The designer has deeply to know this kind of connections and they must be at the basis of his actions even before the economic and functional limits; in this sense, the concept of 'traditional city', as well as of 'urban project' will no longer exist. The city must be one of the many habitats which is possible to find in the landscape, it must be able to be crossed by natural processes, it must be in the service of agriculture and ecological regeneration. The single urban project will have to be born within a general framework - and, at the same time, from a perspective - that are radically different from the past.

*The conceptual shift of the anthropocentric attitudes of the project:* the designer will have to extend his field of action - and not to compress it, as it might seem - by intervening not only in the human sphere but by favoring correct interactions and, increasingly, amplifying the biological 'reserve' of other living beings. It does not mean the renunciation of the project, quite the opposite: the designer must redefine his education, both specialist and general, to study how non-anthropocentric habitats could correctly work according to natural dynamics and in an 'expanded' way in regeneration areas. The landscape architecture project could fit in favoring the animal access to water, in amplification of the ecotone areas of rivers eroded by urbanization, in creating specialized corridors for the connection of protected species, in regenerating woods in the fire-devastated areas etc ... All of that requires a new type of design and the adoption of a new approach that might also contemplate the occasional and 'remote' monitoring of the same architecture - if not the abandonment - by man, so that can be the most effective support for the development of natural habitats.

A final consideration, more general, concerns the very approach to the project that designer should increasingly assume as invariant: the 'long time' perspective. That not to trace the idea and the errors of the past in considering architecture and human landscapes as "eternal", but to reach a sensitivity - and disciplinary attention - for the 'long-lasting effects' of the landscape architecture with regard to the life of living beings. João Nunes has recently stated: "especially after the pandemic, we should no longer pay attention to the 'temporary', to the 'reversibility' and to the 'transience' of our actions on the landscape but, on the contrary, to develop a certain ability to see beyond the anthropic horizon, probably beyond the very cycle of humanity; the time of the landscape is a long time, it is a very different form of permanence in comparison to the architectural one, the effects of our actions are no longer measured with regard to fast and sudden drawings - that change places with the same

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speed and drama - but with regard to progressive modifications that we have to measure with the long time of topography, water, vegetation".

This perspective states new limits but, above all, new opportunities for the architect of the "resilient landscape".

*Keywords: changing landscape; city; long time; resilience; living beings*

# **Sustainable Tourism and Landscape Design: their interrelated relationship as a tool for reactivating the Caiafa Lake area and its impact on the resilience and the Urban development of local regional area**

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## **Extended abstract**

Wetlands have always been areas of particular importance both for the enrichment and impact on the local natural environment of an area and responsible for the well-being of the human environment. Caiafa's Lake is a protected wetland whose location is defined in the Peloponnese and more specifically in a coastal area in the southern part of the Prefecture of Ilia. Historical findings show a location with relevance to the historicity of Ancient Olympia and Greece in general as it used to be a holiday destination for the Olympian Gods. One of the main features of the lake is the historical presence of its thermal baths which make their appearance from antiquity with the presence of two springs, the Anigris Nymphs and the Atlantis Nymphs. The area presents an exceptional geomorphological beauty as it is located on the coast front of the Municipality of Zacharo City and is surrounded by mountains and caves which are historically located since antiquity, a historically strategic location due to the thermal springs, the existence of successive forest areas and the coastal natural environment. In 2013 it was included in the National Natura2000 list for the natural biodiversity of its flora and fauna. The natural landscape of the area is the main protagonist creating a unique aquatic ecosystem with an area of about 200 hectares and a union of the sea area, the lake and the forest with the help of natural corridors. The local annual climatic conditions have proven to be an ideal environment for the survival of endangered flora such as reed belts, Tamarix forests and the aquatic species *cladiumtamariscus*. Dunes in sequential arrangement with a unique variety of shape, size and vegetation harmonize with the forest of Strofilia composing the existence of a separate ecosystem that is a place of rejuvenation and protection of migratory birds, reptiles and aquatic organisms. In addition to the intense natural landscape that is enclosed in the Caiaphas zone, it presents a unique medical background which is due to the beneficial properties of the thermal baths such as those related to human muscles, skin diseases and lung problems through the high levels of iodine produced by water vapor inside the caves of the area. With the arrival of the 21st century, the landscape of Caiaphas Lake and the coastal front are experiencing a slow decline and fragmentation due primarily to climate change, severe weather and the dramatic fires of 2007 which led to its rapid fragmentation; secondly to the economic crisis which does not allow financial resources to be secured for the development of infrastructures. The role of a landscape architect in this phase can provide the opportunity for the synthesis of a strategic planning and a forecasting model so that through a) the collection of historical and socio-cultural data, b) the climate data of the area and c) the designing skills, the landscape acquires a sustainable resilience combining a dynamic interconnection with the city of Zacharo. These are scientific tools to develop a model of ecotourism interest which will strengthen the local economy but will awaken the consciousness and continuous participation of the inhabitants.

*Keywords: sustainable tourism; landscape design; ecotourism; regional planning; climate change*

## Analysis of the mitigation measures against hydrogeological instability in the Italian regional capitals according to the ReNDiS database

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### Extended abstract

Plans and programs of mitigation measures against hydrogeological instability are a topic of particular relevance in Italy, due to the impacts they have on population, on the economic-productive context and especially on the environment. The Department for the Geological Survey of Italy, based in ISPRA (the Italian Institute for Environmental Protection and Research), among all its duties, is involved in collecting and organising information and data of hydrogeological risk mitigation measures in the Italian territory also producing periodic reports relating to the geosphere (soil and subsoil).

In this context, the project for a "National Inventory of hydrogeological risk mitigation measures in the Italian territory (ReNDiS)" was born in 2005, starting from the activity that ISPRA carries out on behalf of the Ministry of Ecological Transition (MiTE) based on the implementation and monitoring of plans, programs and measures for the mitigation of hydrogeological risk funded by the Ministry itself. The main objective of the ReNDiS project is the formation of a unitary framework, systematically updated, of the measures and resources involved in the field of hydrogeological risk mitigation at national level. The database contains all data relating to the measures financed by MiTE from 1999 to today, considering all different kind of instabilities as flood, landslides, coastal, fire and avalanche events. In particular, the ReNDiS project refers both to the ordinary planning measures resulting from the indications provided by the government planning tools and funding laws, but it also considers all measures funded by emergency plans connected to extraordinary hazards.

The ReNDiS proposes itself as a cognitive tool potentially capable of the creation of resilience strategies both nationally and locally and it allows the sharing of knowledge among the various bodies involved in the management of hydrogeological risk mitigation. This cognitive framework can be useful as a support to decision-making processes in hydrogeological risk mitigation policies in urban areas.

This work contains an analysis of the main data relating to the measures in the national ReNDiS database located in 21 relevant municipalities (19 regional capitals and 2 autonomous-province capitals). For each municipality, it will be illustrated the number of measures versus financed amounts, taking into account the design typology. In addition, more detailed considerations will be made on the design of the measures according to the type of instability on which action has been taken.

In addition, the RaStEM (Standardized Representation of Mitigation Effects) is presented, an application created by ISPRA, which aims to represent cartographically, in a standardized, clear and homogeneous way at national scale, the significant elements of a project relating to a measure aimed at mitigating the hydrogeological risk. The objective is to ensure that the significant elements of the design that contribute to defining the purposes and the associated risk scenarios are clearly documented in the project, also in their geographical component, in order to allow an analysis of the mitigation effects risk based on objectively identified elements.

*Keywords: Ispra; ReNDiS; RaStEM; hydrogeological risk; Design*

## The role of the geologist in the design of a resilient city: some case studies in Rome

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### Extended abstract

The planning and the design of works in a complex urban system, like the one of Rome, must take into account a series of interrelated factors, such as the natural environment where the intervention takes place, the geological and hydro-geomorphological conditions, the seismicity, the urban fabric and the historical - architectural – archaeological heritage. In this context, the professional role of the geologist is extremely important, as it is able to identify critical issues and evaluate the geological hazards inherent in the anthropized urban system. With a view to a “resilient city”, an effective control and safeguard of the geological aspects of the territory becomes necessary. This allows to plan and design in a respectful and balanced way, considering the relationship between urban development, environmental sustainability and socio-economic context. The role of the geologist in a project design team is therefore fundamental to promote the environmental sustainability of an intervention and to guarantee the long-term safety conditions against hydrogeological instability, landslides and seismic risk. A resilient design cannot ignore the effects of climate change, in particular with respect to variations in the rainfall regime. In fact, the latter might lead to scenarios of potential danger and risk, with reference to landslides and floods by the hydrographic network of the Tiber River and its tributary system. These phenomena intersect with problems related to the infrastructure network of the underground utilities, often old and deteriorated. In particular, the deterioration of water networks and sewage collectors facilitates the activation of generalized instabilities and damage to the urban structure; the widespread losses of the water pipelines lead to subsoil breakouts and trigger the subsidence of structures’ foundations (buildings, roads, retaining walls). An important geological aspect to consider in order to design in a resilient way concerns the mitigation of seismic risk. The municipal territory of Rome, that with its 1287.36 km<sup>2</sup> represents the largest municipality in Italy and in Europe, is characterized by variable conditions of basic seismic hazard. In order to achieve a resilient city, continuous interactions between the geologists and the other professional figures in the planning and design chain are fundamental. The relevance of the geologists is clear in view of their ability to make correct models of the geological subsoil, to identify critical issues and to give an assessment on the possible scenarios and impacts on the urban fabric and its inhabitants. It is therefore crucial to conduct an in-depth geological analysis to ensure that a project is carried out considering both the vulnerabilities intrinsic in complex urban areas and the changes of the territory, and with a view to environmental, social and economic sustainability.

In the design practice, these concepts translate into an adequate preparatory phase to conduct a geological study of the area where the intervention is located, accompanied by specific geognostic, geotechnical, hydrogeological and seismic analysis. In the present work, some relevant case studies are proposed, addressing the geological aspects needed for the correct and resilient design of interventions in the urban context of Rome.

*Keywords: Rome; seismic risk; hydrogeological risk; design; resilient*

## Taking Over The Streets. Re\_imaging Badia's urban landscape identity

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### Extended abstract

By redesigning mobility infrastructures, disrupted continuities between people and its urban and natural landscapes can be restored. Is landscape design—by rethinking mobility, rescaling infrastructure, inserting ecology and urban life—able to take over the streets and support communities towards more resilient future habitats? What are the landscape tools needed to fulfill urbanistic aspirations for a livable and sustainable 21st century metropolis?

This paper presents the reflection and the outcomes of a teaching experience where students participated with their urban and landscape design strategies in the making of a real project in the Barcelona metropolitan area. The studio project in Badia del Vallès is currently under study in AMB-Area Metropolitana de Barcelona as part of URBACT, a European program that promotes the integral and sustainable development of cities with FEDER funds.

The landscape design studio's main goals were: reconnecting Badia del Vallès with Riu Sec, Universitat Autònoma de Barcelona and Cerdanyola by transforming the neighborhood's indeterminate and scattered public space, into a cohesive one that enhances collective identity and improves the everyday city's vitality at the ground level and at a human scale. *TAKING OVER THE STREETS. Re\_imagine Badia's urban landscape identity* proposes to rethink and rescale Burgos Avenue as a connecting backbone for the neighborhood, as a green infrastructure and as a lively public space at an eye-level. Projects scale down from the territory and the neighborhood's network of open spaces analysis, to that of the redesign of Badia's main axis with dead ends. By reimagining Burgos Avenue as an active, pedestrian-friendly and green urban avenue, the studio aimed to rethink this isolated but vivid neighborhood from the territory and the cityscape to the scale of the construction detail. The teaching methodology was based on the research of the site's atmosphere and characteristics, through personal mapping and representation. The projects started asking the neighbors and elaborating overall strategies and systems to continue and conclude in specific areas' zooms and details. The student's experiments and creative processes enriched the studio's approach and gave interesting academic results. The proposals intended to reveal hidden qualities and enhance the latent natural elements of the place. By investigating Badia's agricultural past, reconnecting with the adjacent river or reestablishing lost urban connections, student's interventions intended to transform the rigid and fragmented neighborhood into a biophilic and lively urban environment.

*Keywords: landscape; infrastructure; public space; resiliency; biophilic city; pedestrian friendly*

## The landscape architect mission: dreaming a greener world

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### Extended abstract

The question is: what is the role of the landscape designer at the beginning of the 21st century?

We are no longer at the courts of the great sovereigns in which the landscape architect had the precise task of demonstrating and legitimizing the power of the monarch by designing amazing green architectures with scenographic perspectives. We are no longer even in the romantic period, in which the architect was required to accurately recreate semi-natural environments, dedicated to the contemplation of nature and landscape.

The role of the landscape designer in recent years has consisted of reconverting degraded or abandoned urban areas, healing the wounds of these spaces.

A landscape architect now should pursue the goal of designing quality green spaces, both public and private, through which people may recognize the value of their outdoor life, denied during the first year of pandemic. Furthermore, raising awareness and involving people in order to trigger "green change" has to be regarded as a priority. This mission must be substantiated in a change of trend, necessary to cope with climate change and high levels of pollution.

The landscaper today should become a "spokesman of change", involving new generations to feel an active part of an ecological and sustainable turnabout. Small spaces, such as terraces or pocket gardens, essential for ecological networks, need to be affected by such a change: it can be effective only if capillary. Meanwhile, it is crucial to keep an eye on global, which implies evolving the majority of open spaces. Thus, it would be necessary for everyone to be directly involved.

What can be the practical steps of his mission? Taking part in conferences and seminars involving citizenship, organizing small events throughout the abandoned areas of the city, to show the value of open spaces, with a view also to explaining the social impact of such interventions: fun-educational activities in parks and gardens, in order to bring children to play more outdoors, to have direct contact with peers and nature, so that as adults they will share and defend those places together.

The landscape architect must take up the challenge of making people want greener places to live, highlighting the collective responsibility to choose a quality of life that holds a sense of Future.

It would be nice to think that green spaces could become the trait d'union between citizens, bringing them closer, in safety, even in times of pandemic. In this perspective, the outskirts of the urban areas would no longer be perceived only as places of transit but as quality spaces for rest and socialization.

I like to conclude by quoting a motto, heard during a conference by a fellow architect, that I made my own: "Let's keep dreaming in a green(er) world!"

*Keywords: mission; change; landscape; urban spaces; revaluation*

## The role of the design disciplines in times of pandemic. Relationship between legislative planning and urban form

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### Extended abstract

2020 was the year in which the world community discovered itself vulnerable, it was the year in which all of us became aware that the lifestyle and development perpetrated up to now could no longer be considered sustainable. However, there were some moments in which we thought that the words “lockdown”, “social distancing”, “pandemic”, were only passing. In this sense, 2021 was the year of awareness, the moment in which we became conscious that our way of inhabiting the earth was radically and structurally changing. Somehow, we have experienced the concept of “resilience” on ourselves, we have adapted it to every aspect of our life.

The persistence of the health emergency is exacerbating the structural deficiencies of the contemporary city with negative impacts on urban communities, widening the gap between rich and poor.

Having acknowledged that the pandemic has affected everyone without distinction, regardless of economic conditions, the lockdown has highlighted how the discriminating factor between those who have more possibilities and those who have less was the “space”, both private and public.

So, the field of investigation on which the contribution focuses is the public space of the cities, underlining the role it played during the lockdown, highlighting how it changed its function, up to the role it will have in the near future and consequently the role of the design disciplines in the resilient changing of the contemporary city.

It is now clear that such systemic complexity cannot find any answer in sectoral approaches. In fact, the political decision-maker and the designer are understanding with increasing awareness the need for an interdisciplinary, inter-scalar, iterative and integrated approach to urban complexity which presupposes as a preliminary act an overall systemization and subsequent implementation, within the design disciplines, of the EU directives and national matters on public health.

Thus, the quality of life is closely connected with the quality of the urban environment, which is why urban regeneration strategies are assuming an ever-greater social value.

*Keywords: urban welfare; urban landscape; urban design and planning; Covid-19; public spaces*

# Post-pandemic agriculture and tourism: the case study of the United Arab Emirates

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## Extended abstract

The crisis caused by the pandemic of COVID-19 threw off the commitment to the UN 2030 vision, where desertification impacts one-sixth of the global population, seventy percent of all drylands, and one-quarter of the world's total geographical area. It leads to widespread poverty and the destruction of billions of hectares of farmland and rangeland. COVID-19's appearance has highlighted the fact that destroying biodiversity destroys the system that supports human life. Its loss makes it easy for a single virus to spread quickly or dominate. According to a United Nations report, a dramatic reduction in biodiversity affected every part of the planet, jeopardizing inhabitants' capacity to find adequate food and clean water in many countries. While climate change and population expansion are a significant threat, land-use change is an immediate hazard for most ecosystems. The Covid-19 outbreak has heightened local worries, bringing a huge impact on economy based on global supply lines for imports and international tourism. In fact, aside from the environmental aspects the pandemic also brought a global crisis on international tourism, one of the fundamental sources of many countries.

The pandemic has also affected rich and stable countries as in the case of the UAE. Although initiative related to self sufficient production of agriculture and internal tourism were already in place, the necessary response to the pandemic has for sure speeded up the development of both sectors.

In the UAE His Excellency the Minister of Climate Change and Environment is driven to act and raise environmental awareness. The issue has also reignited the UAE to develop strategies that enhance local agriculture, encourage farming innovation, and formulate a new vision for internal tourism.

To achieve better biodiversity maintaining habitats, restoring degraded ecosystems, enhancing local agriculture, and promoting sustainable internal tourism is a must. The research explores traditional and modern agricultural practices in the UAE and how they affect and characterize the landscape of the country. Moreover, it investigates the present rapid rise of new sustainable agriculture practices and technology, or 'AgTech,' in the country, and explores new possibilities for future development of sustainable internal agritourism, analyzing how architecture, humans, agriculture, and tourism may coexist to improve ecosystem services.

*Keywords: pandemic; biodiversity; agricultural land scape; agritourism; UAE*

# Flash Forward for the resilient city. Preparing the “memory of the future” through the organisation of museums and business archives

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## Extended abstract

In spite of the crisis and recession we are currently facing, the aim of this paper is to highlight the essential role that people and businesses play in this particular historical context, in which our country needs resources and new energy to renew itself and find new lifeblood.

Museums and business archives are not only the custodians of past memory; since it is thanks to the 'future of memory' that we can merge human knowledge with technological advancement, a necessary tool for business development. Memory also entails pride and a common sense of belonging, constituting both the true foundations of resilience, and the trigger for growth and restart. A business museum is first and foremost a corporate identity; a place that generates a story which unfolds, articulates and transforms, adapting to changes through time. It is the authentically natural path capable of transmitting and handing down the know-how and knowledge of each trade in the present day, thus inspiring a future vision that generates new production and dissemination processes.

This contribution aims to address the role of the discipline of design in relation to its potential role in the enhancement of corporate archives and business museums through the analysis of some project practices and case studies. Particular attention is paid to southern Italy, where the proponents of this contribution have been concentrating at length their academic and professional research.

The valorisation of documentary deposits and the preservation of material and immaterial cultures represent an enormous value for the realities of Southern Italy and, more generally, of the European continent.

In this scenario, the role of the discipline of design is crucial, by virtue of its ability to weld connections between knowledge pertaining to different fields of knowledge, both humanistic and technical-scientific. All the more so in light of its shift from a physical-objective design activity to a dimension linked to immaterial goods such as services or sociality.

The design of services represented, in the 80s and 90s of the last century, the most evident representation of the new form design was assuming in the relationship between product and user. But it is at the beginning of our century that the design of the immaterial has imposed to the attention of the general public, demonstrating a pervasive capacity through service design. In its evolution, service design has had the ability to expand its area of interest, embracing design instances of different matrixes, flanking the activity of product design, the management of distribution and the development of service communication. From the dialectical intersection between service design and marketing, innovative methods and project areas have emerged, including the project for territorial marketing, which is increasingly imposed as a form of development and rewarding support for local economies.

In fact, this action of territorial marketing has proved to be a useful tool for the local, regional and national administrator to operate in a perspective of territorial policy, for the management of local resources and their enhancement.

Such considerations refer strongly to Art. 9 of the Italian Constitution, in which the landscape is assimilated to the historical and artistic heritage as an element for the cultural and scientific

development of the country and the inclusion of the Intangible Cultural Heritage by UNESCO in the World Heritage List.

The design aspect linked to communication has changed the approach to the territory, whose understanding as a physical place determined exclusively by its material, monumental, geomorphological, climatic or artisanal aspects is now obsolete. This conception has decisively shifted to the intangible dimension as the "fundamental physical and metaphysical interface within the processes of local development" and has favored an even more marketing-oriented approach to its valorization.

*Keywords: design, cultural heritage; landscape; marketing; service design*

## Artificial intelligence at the service of urban natural landscapes

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### Extended abstract

More and more, in recent years, urban public spaces need new attention due to the changed conditions of use, and the renewed needs of citizens.

AI (Artificial Intelligence) applications can play an important role in enabling and supporting resilient and empowered citizens in the city. Citizen Energy Communities (CEC) are introduced in the Clean Energy Package (CEP) and play an important role in the Green Deal as a new market party to engage and empower citizens and amplify the local enthusiasm and resources towards local, sustainable and reliable energy systems. However, as the energy system is getting more complex and technically challenging due to decentralisation and diversification, there is a role for open data and AI, as they may enable CECs to adequately deploy and operate local energy systems independently or in collaboration with new market parties such as aggregators. From a citizen-science perspective, local initiatives take a more bottom up approach (thus control) over energy systems. However, they often face the challenge of upscaling and professionalisation. The role of digitisation and AI in such processes could be multiple.

In addition to a reliable and sustainable energy supply, a resilient society benefits from local, sustainable and reliable food supply. To this end, urban communities are engaged in activities such as urban farming, often in combination with vertical farming. Like the local energy system, these local farming and agriculture systems are immensely complex and may be time and labour intensive in tight spaces and connected sub-spaces. To sustainably maximise the yield from urban farming, e.g. by being energy and water efficient, and to minimise the hassle for citizens, AI can play a major role. AI application relates to automation in crop monitoring and care, based on imagery and other environmental sensors. As leading examples, California based start-up Plenty developed an AI and robotics run vertical farm in the city, resulting in a 99% reduction in land-use and 95% in water use, while in Amsterdam vertical farming company GROWx, together with Wageningen University, Signify and Be-bots build a robotic and AI driven vertical farm which automates the cultivation of crops. The contribution intends to investigate the best experiences underway in the various countries.

*Keywords: smart cities, environmental urban planning, machine learning, urban landscapes, landscape planning & design*

# The Technological-Environmental Metadesigner as Enabler of Different Degrees of Resilience

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## Extended abstract

This proposal intends to submit theoretical, methodological, and teaching-designing research outcomes focused on urban in-between spaces and reinterpreted after the recent pandemic emergency. The design experience was assumed as a plural process in which the designer’s roles, areas and skills can be redefined, starting from four recurring dimensions (CSIRO, 2007; Rockefeller Found. & ARUP, 2015) that influence the resilience of urban spaces: the environmental dimension, the organizational dimension, the economic-social dimension, and the health dimension. In fact, main studies on urban environment have pointed out the polycentric and multiscale nature of resilience (Folke *et al.*, 2010), identifying the city as a complex bio-psycho-socio-techno/logical system. The goal of resilience can only be achieved by considering aspects such as reactivity, adaptability, and transformability (Walker *et al.*, 2004). In this direction, the fields of action of technological-environmental design were explored to redefine the in-between urban space as adaptive habitat/landscape in which can co-exist co-evolutionary (Carmona, 2015) interrelationships between natural, human, social and technological entities.

A methodological framework has been defined showing the possibility to explore different fields of intervention in a metadesigning modality, in which the technological-environmental designer can break away from the traditional authorial role. The reinterpretation of the creative-constructive process in metadesigning terms allows to define a lot of new roles for the technological-environmental planner/designer. He will be able to operate as an “enabler” on several levels of resilience such as: co-director for the development of pre-feasibility scenarios and visions; facilitator of participatory and co-planning processes; coordinator of different feasibility and sustainability degrees; co-manager of designing, construction and management informational systems; harmonizer of the decision-making processes of possible alternative solutions; co-designer of performative, cultural, organizational and technological value contents. Three main innovation domains are highlighted. The first concerns the transition from closed planning based on the static space resistances, to an open, reversible, and adaptive project that enables a co-evolutive dynamic robustness. The second is related to the continuous designers’ proactive interactions as experts who enable different ways of cooperative maintenance of urban resilience skills. The third regards the dialogue between expert and diffuse design (Ratti, 2014; Manzini, 2015; Ward, 2016) toward antifragile relationships between nature, society, and technological innovations.

Even in view of the next probable different emergencies, the possibility of following multiple metadesign technological-environmental explorations (transversal and not necessarily sequential) can validly contribute not only to reducing the fragility of urban in-between spaces. It is possible to define dynamic configurations of the urban space, which itself becomes a regulating-enabling interface of adaptive landscapes, based on the continuous planning of robustness, resilience, and anti-fragility.

*Keywords: reactivity; adaptability; transformability; metadesign; regulative-enabling interface.*

# **The tower houses of Mytilene as symbols of cultural and historical development for the preservation of the local architectural heritage in North Aegean**

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## **Extended abstract**

The tower houses of Mytilene constitute an important part of the traditional housing types on the island of Lesbos and an element of cultural identity and heritage, due to their special architectural idiom, as well as the set of economic, social, historical and cultural models and ideals that consist their genotype.

This type of building is a complex form of housing whose development began as a fortified tower - observatory during the Gatlouzi period due to the defense needs and ended in the 19<sup>th</sup> century with its final use as a housing unit of the wealthy landowners of the island, mainly the Greek but also the Turkish community. That was the period during which the ownership of the land regained significant momentum in the Greek community and the economic activity developed thanks to the expansion of maritime trade and commerce. Thus, the tower houses were gathered on the outskirts of the city of Mytilene which was the dominant urban center of the island.

The complexity of their operation and the evolution of their architectural form make this traditional residence a typology of special socio-cultural importance in the North Aegean and the wider Greek area. Their form differs comparing to other tower-like dwellings in the rest of the Greek islands, whose influence is strongly influenced by times of Frankish and Venetian rule. However, they have similarities with the mansions in areas of Thessaly and Thrace due to the common origin of the craftsmen of the time who applied similar traditional construction techniques. As for the use, the tower houses served a dual purpose; the summer vacation of the owners and the supervision of the production, as the tower houses were the centers of the farms. In this way this traditional house acquired an additional function of commercial importance and agricultural production.

It turns out that the analysis of the social, economic and cultural conditions of the period, compose a more complete and complex picture in understanding this particular architectural type, which is not fully conceived when examining them solely through the need for defense.

In the 21st century, designated as the protected monuments by the Ministry of Culture, the few existing tower houses remain impressive with their elongated forms in the city center and the countryside. As examples now, of the traditional architecture of the island, they are the material implementation of an entire worldview that embodies the values, needs and culture of the Lesbian people. Thus, at the end of this publication, a strategic plan for the creation of a network of places to visit is proposed, which will operate as a dynamic map of illustration, historical information and cultural sustainability of the tower houses of the traditional architecture of Mytilene, which will be accessible to both visitors and inhabitants.

*Keywords: cultural heritage; traditional architecture; tower houses; management; Mytilene; Lesbos island*

## In between the sea & the city: approaching the topography of waterfront interface in the city of Alexandroupolis

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### Extended abstract

This study attempts to analyse the spatial interface between urban waterfront and urban landscape. The dynamics of this relationship has undoubtedly great significance, as it greatly affects the urban and social physiognomy of a city. Despite its importance, it is very difficult, perhaps for some cases impractical, to manage a balance in the sea - city relationship especially if there are no organized and integrated spatial interventions. In brief, it becomes clear that in order to create a new “equal” relationship between the urban waterfront and urban landscape, the role of the landscape architect is decisive. Although design has the potential to create the proper conditions to upgrade interrelations between these two species of urban landscape.

As typical such a case, the city of Alexandroupolis, Greece, is examined. Alexandroupolis, is the costal capital city of Evros region; it holds a key position on the map of Greece, located close to the borders with Turkey and is one of the few coastal cities in Greece organized with such a clean and strict urbanplanning (1878 - Hippodamian system). Although the city was developed in such a geometrical shape in relation to the waterfront, unfortunatelyit has not yet managedto creatively interrelate and interfacewith it.

The weak relationship of the city with the waterfront landscape and the poor interface between them is caused by a combination of factors such as the following: the city’s Master Plan had not initially include the waterfront area, the spatial core of the city has been gradually shaped for years - in the geographical centre of the city; the transport infrastructure is very close to the coastal front; high urbandensities and high building constructions on the waterfront of the city; and the last but not least, is the high altitude difference between the city and the sea level. This is the point that we think it is interesting to focus, as we think it is the starting point for any planning interventions.

This apparent disadvantage that lies in ground and sea imbalance can be transformed into a great benefit for the city of Alexandroupolis; This benefot will emerge by means of a specific design of its urban landscape. Landscape architects are capable to use the landscape as a means of interpretation and design of modern urban environment and moreover to activate and redefine the relationship between the city resident and the sea. The successful examples of similar cases of urban landscape design, show that Alexandroupolis deserves to be better analysed and designed by innovative planning strategies.

*Keywords: urban landscape, urban design, urban waterfront, urban sustainability, Alexandroupolis*

## History has its runs and reruns. Landscape design in the post-pandemic era

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### Extended abstract

Epochal changes have always resulted from technological innovations. They have changed our way of life, our habits, our homes, our urban landscapes.

"Just as the advent of the industrial metropolis questioned all the elements of the pre-industrial universe, so the advent of the electric city calls into question the elements of the mechanical city ..." (Iengo, 1992) and so on up to the "Cyberculture" (Levy, 1997) then to virtual reality.

The pandemic forced us to take note of changes that had already been in place for some decades: the internet.

Was it the "virtual-as-place that allowed us to remain functional and coordinated ... was it the illusion of a place ... or was it a real new place ...?", An interesting question to which we are probably not able to answer, but we are at the point where we ask ourselves "How were we supposed to respond to this new place? How should architecture respond to him? How should our future cities have responded to him?" (Novak, 2021).

The pandemic has set foot on the accelerator of the transformations that were already slowly taking place and even if after two years we try to return to "normality" nothing will be the same, but not in a pessimistic and catastrophic vision, we simply entered more in contact with the virtual world. The way we work, shop, consume food, explore, socialize, live, perceive reality has changed; changes that had already taken place, we have now acquired and metabolized them. The role of the landscape architect must become the interpreter of a new language.

The real space must confront itself with the virtual space, without entering into conflict "So I wonder what is the right Architecture for an illusion, what is the attitude to be able to create and perceive it", what could be the new role of the designer? But "the real turning point lies precisely in this:« [...] everything that happens in the space of numbers coexists with what happens outside it. No dramatic end of our memory, of our habits, of the space that hosts our living [...] of Architecture "(Calabrese, 2021).

*Keywords: Smart Cities; Environmental Urban Planning; Landscape architecture; city of the future; Landscape Planning & Design*

# Complex urban systems. Design and new professions. Cultural heritage's management in contemporary cities

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## Extended abstract

The progressive expansion of the role of the professional, to whom today's society asks to be an active and proactive part of the future, not only by carrying out their work with diligence and competence, but above all by understanding that the cultural weight of the intellectual professions is crucial for development of our society, for individual citizens, for the entire entrepreneurial and productive fabric and for local development.

It leads us to reflect on the new professional skills linked to the complex processes of the growth of the contemporary city that the policies, aimed at building the capacity for regeneration and resilience of the urban space, are called upon to question and interact.

In a scenario in which the rapid turmoil of the time that sees the birth of liquid professionals that cannot be classified according to traditional classifications in reference to the labor market in the E.U.

The profound and rapid transformations in the world of work have given rise to a continuous process of adapting the definitions and classifications relating to qualifications, competences and professional skills.

Evolutions that make taxonomies flexible and dynamic, but require that they be more clearly defined, consolidated and internationally comparable.

It is necessary to take good note of how in reality the sectors have collapsed, the divisions between the disciplines have crumbled and triggered the hybridization and the mixing of knowledge.

The new professions that are victims of an increasingly ruthless model, which are not given the opportunity to demonstrate their level and ability to impact on the existing, need to be legitimized by changing methodology and approach.

Concentrate on slow forms and methods of accreditation, structured and interconnected with the areas with which those same professions interact.

Designing the regenerated and resilient city means facing the complexity of the landscape project as defined by the European Landscape Convention: the landscape of everyday life.

Defined as the continuous transformation of the living space that relates to the continuous search for the quality of human life, where the interdisciplinarity and flexibility of the design approach requires old and new professions, capable of interpreting the complexity of urban phenomena and to be a reference for change.

The possibility of affecting the existing is closely linked to the recognition of the status of those new professions born from the new and urgent needs to build new links between the subjects who must govern the changes aimed at the regenerated and resilient city.

*Keywords: design, professions, urban systems, complexity, resilient, city, regeneration, landscape*



**RESILIENT CITIES AND HISTORICAL CENTERS  
MANAGEMENT. THE CASE OF CORFU**



Changing Cities V, Corfu, 20-25 June 2022

**Organized and chaired by Prof. Em. Eleni Maistrou**

**Prof. Em. Eleni Maistrou**, School of Architecture, National Technical University of Athens



# **Resilient Cities and Historical Centers Management. The case of Corfu**

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## **Extended abstract**

The aim of my contribution is the recognition and critical presentation of the parameters that make a historical city resilient against threats to its physical and intangible characteristics and the way in which its resilience and sustainable development can be built.

Threats that are currently urgent include those provoked by climate change and the pandemic. Understanding the multiple dimensions of risks that can disrupt social, economic, and environmental systems must be understood and analyzed, to ensure resilience. More specifically important is to recognize any threat to the city's historical and architectural attributes, its function, and social context. These threatening factors may be owed to human activity or natural disasters.

Strengthening the resilience of societies requires constant conservation but at the same time, resilience aids conservation. And both resilience and conservation of natural and man-made resources are fundamental to implement the goal of sustainable development. Involving all relevant stakeholders in the process of understanding and dealing with risks is necessary.

Having as case study the historic center of Corfu, the content of a management plan that aims to ensure the above will be discussed.

*Keywords: Historical city, Resilience, Sustainable development, Management plan, Corfu*

## **IRC-Hermes: A digital tool that can contribute to urban resilience**

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### **Extended abstract**

For historical cities, preservation of their authentic urban fabric and building stock is important for achieving resilience. Documentation is an indispensable tool for achieving this preservation. Current technology allows for documentation to be interactive, real-time and its data easily processed. However, heritage conservation has, so far, been shy of adopting digital technology.

The IRC-HERMeS is an award-winning digital application used for the management of cultural heritage sites, created on the idea and initiative of Dr Pavlos Hadjigrogoriou. It was recently expanded to include four locations inscribed on the UNESCO World Heritage List: Corfu and Samos (Greece), Gjirokastra (Albania) and Ohrid (North Macedonia). The “Elliniki Etairia - Society for the Environment and Cultural Heritage” was a partner to the programme, as an expert in cultural heritage documentation and protection.

In its first pilot phase, a digital data base platform was created and part of the building stock, including the most prominent historic buildings and monuments in the city, were digitally registered and a condition assessment was completed on-site and uploaded. Documentation had to be carried out by specialized heritage experts, such as conservation architects and engineers. After this process had been completed, a decision making tool (algorithm) was created in order to prioritize interventions and create common reports for the participating authorities.

Except for a monitoring tool for local authorities, the objectives of the system include providing information and support, transferring knowledge and raising awareness among citizens. Citizen participation in decision making and their free access to information, concerning their city, are very important for the city’s resilience.

Moving from the pilot phase of the IRC-HERMeS platform to a real adoption by the competent authorities could greatly benefit the management of the Old City of Corfu. Such a digital tool can document individual buildings in an inexpensive and fast way, so that eventually, the entirety of the Old City building stock could be registered, condition assessed and monitored. Real time monitoring is important, as seismic threat, extreme weather and rising sea level pose serious threats that need constant observation. This digital tool could also allow for regulations application to be monitored, protecting the Old City from unauthorized interventions that alter the cityscape. Enhancing the digital platform to include other parameters, such as monitoring land use and building use, property rentals for residents or tourists could provide a tool for steering the city through the challenges of overtourism.

*Keywords: digital; urban resilience; building stock; monitoring; Corfu; historic buildings, UNESCO*

## **Assessing the Impacts of Climate Change at a historic settlement: The case of the Old Town of Corfu**

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### **Extended abstract**

Climate change has been widely acknowledged as the most critical challenge humanity faces nowadays. According to the latest reports, greenhouse gas concentrations in the atmosphere continue at record levels, committing the planet to dangerous future warming and extreme weather events (United in Science, 2021). Considering that most of the world population already lives in urban areas, developing and implementing a resilient and sustainable future for the urban systems and the built environment is crucial.

This paper presents climate change's impact on the Old Town of Corfu –a World Heritage Site. It is based on a research programme and is part of the broader action ELLINIKI ETAIRIA – Society for the Environment and Cultural Heritage (ELLETT) leads in the Life IP “AdaptInGR-Boosting the implementation of adaptation policy across Greece” programme. One of the program's priorities is developing an integrated climate change adaptation monitoring and evaluation framework for the sector of Cultural Heritage, which will be proposed to be included in the Greek National Adaptation Strategy (NAS).

The Old Town of Corfu case study constitutes an architectural example of outstanding universal value, both in terms of its authenticity and integrity. It is a modern living city and, at the same time, a World Heritage Site, which makes it vulnerable to a wider range of pressures, including the effects of climate change. The requirements and needs of the modern lifestyle, rapid tourism development, mobility issues, sensitivities and particularities of the cultural value itself are some of the challenges that need to be addressed individually and in combination with the expected extreme weather events.

The analysis performed is based initially on examining the climate data provided by the National Observatory of Athens, a partner of the Life-IP Adapt In GR programme and the assessment of the expected climate changes for the site area. Then, all those characteristics that compose the identity of the Old Town of Corfu are identified, as well as the existing problems and challenges that it faces today. Some of these characteristics are related to the area's geomorphology, land-uses, road network and mobility within the city, materials of the monuments, electromechanical infrastructure. Through this process, an attempt is performed to assess the vulnerability of the site to climate change following the approach (risk analysis), which is defined by the Intergovernmental Panel on Climate Change (IPCC) after the publication of the Third Assessment Report (TAR). Finally, an integrated policy approach is proposed, with guidelines and actions that aim to ensure both the goals of resilience, sustainability and the protection of the outstanding cultural value.

*Keywords: cultural heritage; Old Town; climate change; World Heritage Sites; Corfu; sustainability; resilience; pressures.*

# **The contribution of modern geodetic methods in the creation of geometric diagrams/plans for the management of historic centers. The Old & New Fortress of Corfu**

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## **Extended abstract**

In recent years, the development of technology and the need for more accurate and detailed diagrams and plans, has led to the use of combined methods originating from different engineering specialties. In order to provide full geometric description of the land and the surroundings of the earth's surface, a measurements' system that utilizes both terrestrial and aircraft modules, is nowadays necessary. The rapid development of unmanned aerial vehicles (UAV or remotely piloted systems), but also the evolution of geodetic instruments can in one hand offer a combination of geometric and qualitative characteristics, and in the other hand guarantee the complete description of the research area with the best possible geometric and illustration results.

The key factor, to the creation of a correct geometric diagram/plan is the combination of these methods, especially when it comes to areas of great historical importance. Such areas are often studied in order to highlight their historical significance and to strengthen their modern evolutionary course. So, apart from the geometric factors, old and new characteristics referring to the building conditions, purposes and facts of these centers should be implemented to the study and ought to be properly integrated into the final deliverables.

In this paper, after describing, in detail, the terrestrial and aerial measuring methods, the ideal conditions for their combination for a correct geometric result will be presented. Their implementation took place in the Old and New Fortress of Corfu, Greece, in order to create initial backgrounds for the management of the historic center, which was created and developed between them. In addition, a comparative evaluation of new combined methods with older ones, which had been applied in the area, is carried out, in order to identify possible significant differences throughout the years.

Finally, conclusions and suggestions emerge regarding the evolution of precision and detail (geometric and qualitative) offered by the new combination technologies, thus opening new avenues for the future.

*Keywords: historical center; terrestrial methods; aerial methods; Fortress of Corfu*

# **The importance of registration and historic research in the administration of cultural heritage. The example of Old and New Fortress in Corfu**

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## **Extended abstract**

The architectural involvement with monuments over the years, has taught me the main importance of the “study” and recognition of the values and the history of cultural heritage before of any other action. In the case of protection of the historic environment, the architect does not design on a blank sheet of paper but is called upon all to understand in depth the monument which has to protect, to restore where appropriate, but above all, to integrate it into the contemporary environment. This very challenging and crucial process cannot bring out safe or even innovative project results unless the architect have a humble approach as a recognition of the importance of the earlier creator. To transform the humbling into protection and architectural creation and ultimately into a cultural revival of the monument is necessary to go through detailed understanding, studying researching and documentation.

In the case of the two fortresses of Corfu, the registration and historic research was carried out both in parallel as well as successively, while the enrichment of the elements, lead us to go back and frond, again and again, interpreting and understanding fully, elements of the previous observation and recording until its final completion. The completion of the recording and documentation aimed at the continuous monitoring and ensuring the resilience of the monuments, on the one hand, and at the strategy of the proposals for action through criteria such as necessity, importance, priority, in order to set the specifications for the actions – projects in the monumental complex and individual monuments, on the other hand.

Specifically in the two fortresses of Corfu, the management of all the selected material was particularly demanding mostly because of the large area and the numerous monuments. For this reason, from the beginning we chose the production of registration to be cards for each monument separately in which we wrote down all the data we collected. Recording data, observations and findings concerning the Old and New fortresses were illustrated on maps also. This very large produced material which emerged, formed the basis for the activation of phase 2 of the management plan, through which it was now possible to protect, to manage, to suggest, and above all to monitoring and control with safety the maintenance and revival of the complex.

During this presentation we show you the methodology we followed in the research and in the administration of all information we managed to collect.

*Keywords: registration, documentation, monitoring, cultural heritage, fortresses of Corfu*

## **Corfu: Multicultural identity, issues of Promotion**

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### **Extended abstract**

Corfu, since ancient Greek times, was an important stronghold for Greek territory. In the years that followed, the island, mainly due to its geopolitical position, became a lure for many conquerors, both in the West and in the East. As a result, the island was involved with a variety of cultural influences, nowadays recognized in the tangible and intangible indications of the place. It is though interesting how the various cultural influences are assimilated over time while maintaining their central Greek reference. In addition, Greek waves of migration, mainly from Crete and Epirus, redefined the physiognomy and identity of the place.

The multicultural identity of Corfu is captured, expressed, and projected mainly through its architectural elements. The Venetian architectural achievements, the Byzantine castles, the English neoclassical buildings in the Old City. Archaeological sites and monuments, museums, palaces, galleries, educational institutions, places of religious interest, libraries. Its historic center, the "Old Town", as a UNESCO World Heritage Site, today presented with a dual role: as an "open" museum with a large number of cultural heritage elements, as well as as a living organization in need of protection, development, and revitalization.

However, architecture is not the only imprint of the island's cultural diversity. Many customs, religion, music tradition, gastronomic customs, and even language dialects are closely related to the different cultures that passed through the island over time.

This presentation aims to record and reveal the multicultural identity of Corfu and redefine the strategies for the development approach of the island, based on this particular identity. The multicultural records and the natural peculiarities of the island can be used as tools, to identify and reconstruct the multicultural identity of Corfu and the conditions for its potential promotion.

The "strong" elements of the place, tangible and intangible, should be used for its promotion. The special, diverse identity of the island should be highlighted and used, not only as a tourist product but as a field of study, research, knowledge, and history, by the people of Corfu and for the people of Corfu. Aiming to improve the image of the place, sustainable development, but also the quality of life of the inhabitants. Also, greater visibility of the monumental ensemble and awareness of the public, the local community, and visitors.

*Keywords: heritage; multiculturalism; Identity; Promotion; Corfu*

## **Effects of climate change on the historical building materials in the town of Corfu, Greece**

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### **Extended abstract**

The performance of the historical building materials under the action of environmental factors is greatly correlated to the type of material, the period of the building construction and mainly the causes of decay. Stones, mortars and renders of historical structures have been deteriorated due to physical, biological, chemical and mechanical parameters and their synergy. Physical factors causing decay comprise the climatic conditions, namely temperature, relative humidity, sunshine and precipitations. During the last decades, the climate change accelerates the decay phenomena due to the intensity, as well as the rapid change of the weather conditions of each region.

The case study of this research is the historical town of Corfu, declared as a UNESCO World Heritage Site in 2007. The town, enclosed between 2 main fortresses in a special urban network, was formed by the remnants of the different historical periods of the island (Venetian, English occupations, Independency, Greek state) from 17<sup>th</sup> to 20<sup>th</sup> century. The architectural styles exhibited baroque and neoclassical influences on the residences, important public buildings and temples representing a creative mixture of artistic and cultural elements ranging from the Eastern to Western Mediterranean.

The masonries, on the ground floor, are built by lime-based mortars and calcareous stones of different origin depending on the historical period, whereas the upper floors were mostly structured by bricks. The trusses of the roofs are wooden and covered with ceramic tiles. Biological crusts, detachments, erosion, salt crystallization along with humidity fronts from water capillary rise are the most common decays observed on the architectural surfaces. The extent of the decay patterns ranges from low to risky and is mainly due to the impact of the environment and other mechanical stress, such as earthquakes. The climatic data evaluated to further explain the mechanism of decay were: (a) significant high temperature change on the same day in 4 months at least annually, (b) high relative humidity, (c) intense winds, (d) high precipitation, as well as the combination and progress of the above-mentioned parameters.

Those environmental effects along with the need for new uses and rehabilitation of masonry have led to interventions, mainly conducted with incompatible materials, like cement and concrete, which have induced an accelerated decay remarkably indicated by the plethora of the decay patterns observed. Important physico-chemical parameters, such as porosity, permeability, water absorption and mechanical behavior are significantly differentiated between original porous materials and cement-based interventions; the latter, caused indisputable alteration of the value and authenticity of the architecture, further detachments and damages to the buildings. The diligent study of the environmental conditions, the historical materials, the appropriate restoration techniques constitute a crucial point for the long-last maintenance of cultural heritage buildings, especially in conditions of climate change, where intense weathering phenomena negatively affect the architectural surfaces.

*Keywords: materials decay; climate change; Corfu old Town; architecture style; compatible interventions*



**SOCIO-SPATIAL TRANSFORMATIONS OF EVERYDAY  
PRACTICES IN PUBLIC SPACES DURING THE PANDEMIC**



Changing Cities V, Corfu, 20-25 June 2022

**Organized and chaired by Prof. Athina Vitopoulou**

**Prof. Athina Vitopoulou**, Department of Architecture, Aristotle University of Thessaloniki



## **Between temporary and permanent. Exploring users' experience of open-air market before and during the pandemic**

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### **Extended abstract**

Open-air market has historically been an essential part of urban public space commercial and social life, as for centuries it has been a place of gathering, entertainment, exchange of ideas, buying and selling. However, as it primarily serves basic needs in food and other products, it is rarely recognized nowadays as an element that contributes to the social, psychological, and perceptual experience of public space. Its contribution to the social dimension of public space derives mainly from its temporary nature, although due to its periodic repetition, it could be considered, according to Madanipour (2017), as an in-between temporary and permanent use.

Focusing on this very periodic nature, the paper explores open-air market to highlight its role as an event in the social space, as a characteristic point of the temporality of the city, as an occasion and field of experiencing urban space, as a point of interaction and management of diversity, as a means of reshaping the culture and memory of the place. The paper also attempts to contribute to the discussion on the way public space everyday practices have been transformed during the pandemic. The research is based on bibliographical review as well as on a questionnaire survey on the way people experience open-air market, which was answered by 274 people. The survey was held during the first quarter of 2021, i.e., during these lockdown period in Greece, when restrictions were imposed on open public spaces (such as banning gatherings and enforcing social distancing), and open-air markets operated with 50% of the sellers and a distance of 5m between the benches. Thus, the questionnaire was distributed via internet, using mainly social media, resulting in the compulsory recall of the experience from memory and hence the possibility to explore how the perception of the respondent's experience had been recorded in his/her memory. The questionnaire is divided into three sections, which concern the space of the market in terms of its permanent and temporary characteristics and the way they are perceived, the people/users and the interaction between them and finally the time perception within it. Questions about the transformations generated by the anti-Covid measures were also included, to draw conclusions as to whether this situation affected users' perceptions on the above issues.

The research confirmed that the perception of the space of the open-air market is clearly highly subjective, though some elements are to a large extent perceived in a common way and contribute to the formation of collective perceptions, images, memories. The market proves to be an important place of socialization and familiarization with the "other", while its importance in the time cycles and rhythms of the neighborhood, as well as in the various subjective temporalities of human perception, also emerged. During the pandemic, the users' experience was evidently transformed, while it was felt that certain restrictions on the coexistence and socialization with the others can decisively alter their perception and psychology and especially their sociability.

*Keywords: open-air market; public space temporary uses; experience of open public space; users' perception; Covid-19 pandemic*

## **Cultural expression in the public space: a pandemic encounter**

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### **Extended abstract**

The COVID-19 crisis has had a devastating impact on every aspect of our lives causing extreme changes worldwide in a very short period of time. A strategy, which still has worldwide application, formed during the initial COVID-19 response, whereby in order to reduce the spread of the virus, for the safety of citizens, restrictions were imposed on free access to open public spaces, a range of permissible behaviors were outlined, while the closure of museums, galleries, theaters and cinemas, cancellation of performances, concerts and festivals, had a sizeable impact on individual and social well-being. To counterbalance this lack of space, contact, action and entertainment and to enhance the urban experience, impromptu relief mechanisms were invented creating ephemeral heterotopic events, co-shaping the boundaries and the functional values of designed spaces - balconies, pilotis, rooftops, parks etc. Culture, and more precisely cultural, artistic and creative activities and events (such as music and art festivals, street musicians and performers, concerts, storytelling walks, etc.) play a fundamental role in individual's well-being. As the EU recognized, culture has the capacity to foster citizens' participation in public life, contribute to the sense of "belonging" and facilitate social inclusion. Furthermore, urban public spaces provide the needed space for recreation, entertainment, contact and cultural expression and participation, constituting the receptors of local culture and forming the cultural identity of a place.

The paper forms part of the first author's doctoral research/dissertation which is conducted at the School of Architecture, A.U.Th. It investigates the alternative ways that citizens developed, in order to access culture and the ways/media that culture and (open urban public) space responded to these new conditions. The study is carried out by reviewing examples from different cities around the world through literature and web information. A particular case study of Thessaloniki's cultural expression in its public space forms the main focus of the PhD; this paper presents an initial cataloging, mapping and assessment of this cultural landscape before and during the pandemic. The study is based on qualitative and quantitative data derived from web information and interviews with people that create actions in the city and also with the municipalities/stakeholders involved.

The analysis reveals the spatial diaspora of culture in the urban fabric before and during COVID-19 crisis, the interaction and influence between culture, space and citizens and the impact of the pandemic on open urban spaces and on cultural expression and creation in Thessaloniki. The estimated results will allow the comparison of data concerning the scale of the events, their social impact, their attraction, appeal, accessibility, inclusivity, cultural justice, and their impact on existing cultural, spatial and social structures. The results will also highlight the relationship between the city and cultural events before and during the pandemic and identify initial indicators for the resilience of cultural expression in the public domain, the potential of cultural urban policy tools for a more inclusive and cultural just city.

*Keywords: cultural events, public space, cultural justice, cultural participation, COVID-19 pandemic*

# Urban space and quality of life in Greek cities before and during COVID-19: Seeking pandemic resilient city planning

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## Extended abstract

The transition to pandemic resilient cities has emerged as a response to the coronavirus disease (COVID-19) pandemic. Quality of life in cities was seriously challenged by this extreme health crisis. One of the main aims of pandemic resilient city planning is to mitigate the negative impacts of pandemics on urban quality of life. Based on quasi-longitudinal survey data, geographic information systems (GIS) data, and qualitative data from Greek cities, we first examine changes in self-reported quality of life during COVID-19 (first wave) compared to pre-COVID-19 times, and then explore how urban space, land uses, and housing attributes are linked to quality of life before and during COVID-19.

Findings indicate that quality of life, as expected, declined due to COVID-19. Life satisfaction, happiness, general health, satisfaction with social relationships, satisfaction with leisure activities, satisfaction with income, and satisfaction with vacations all declined during COVID-19. Conversely, anxiety increased during COVID-19. Important changes, however, were also observed in the relationship between certain city characteristics and quality of life. Lower neighborhood density was related to higher satisfaction with life, leisure, and social relationships during COVID-19, but not before COVID-19. Larger dwellings were associated with lower anxiety and better health during COVID-19, but not before COVID-19.

Regarding public spaces, participants reported that green spaces (e.g., parks and public gardens) and other public open spaces (e.g., public squares, pedestrian areas, seafront) were very important to them both before and during the pandemic. At the same time, findings from qualitative analysis highlight residents' concerns that these urban spaces are lacking both in quantity and quality in major Greek cities. This is likely to have negative implications for quality of life, and even more so during pandemic restrictions, when mobility and access to other spaces are limited. Lack of green spaces and small dwellings, typically found in some high-density areas, may contribute to the negative relationship between neighborhood density and well-being during COVID-19.

The COVID-19 pandemic has provided important lessons for city planning, and especially for compact urban forms and urban sustainability. To mitigate the negative impacts of such global health crises on quality of life in cities, it is crucial to provide all residents with dwellings of sufficient size and quality and easy access to adequate, high-quality urban green space as well as other types of public open space and communal outdoor space. Indeed, these lessons are not meaningful only under pandemic situations, but they highlight the enduring and critical role of city planning in addressing socio-spatial inequities, supporting vulnerable groups, and improving social sustainability.

*Keywords: coronavirus disease (COVID-19); public space; urban planning; compact city; neighborhood; health and well-being*

## **Public space transformations in the covid era: implications for Mediterranean cities urban planning**

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### **Extended abstract**

Pandemics are anti-urban. They undermine the idea of community and urban life. Covid-19 restrictions have been particularly painful for Mediterranean societies, where outdoor life is important and public urban space is more widely used. Perceptions of public space have been changed along with the ways that it has been used and produced. Public (open) space is lost and reclaimed through creative, informal or formal, urban practices.

In the compact, high-density, Mediterranean cities, parks and squares had been depopulated and transformed from meeting places to transit points. At the same time, streets and pavements have become an alternative space for social life as mobility habits changed and the use of soft transport means -walking and biking- increased. Due to the mobility restrictions, the urban radius has been shrunk and users and activities have been redistributed. Local services and amenities have become focal to the social and economic life, resulting in the rediscovery of the neighborhood. Locality gained popularity Apartment block open communal spaces had been reinvented for outdoor leisure activities forming semi-public open spaces. The urban balcony, distinctive architectural element of Mediterranean city, became temporarily a new pseudo-place of public life offering a sense of urbanity through the pattern of 'vertical street'.

The outburst of Covid-19 has added more challenges to public space urban design and planning. Temporary urban low-cost interventions, such as expansion of pedestrians routes and bike lanes on to the road, have been applied in order to remodel traffic and produce more open public spaces.

The pandemic has increased concerns for public space replanning and redesigning as a parameter of public health and social cohesion and has brought to the scene the quest of more livable cities. Firstly, the paper aims to trace the socio-spatial transformations and different identities and perceptions of public spaces, even if ephemeral, in the Mediterranean cities. Secondly, it aims to assess the impact of urban practices on reclaiming public space and establishing new development pathways and planning process. The paper concludes providing implications for Mediterranean cities redesign and replanning within the context of resilient cities.

*Keywords: public space; Covid era; urban planning; Mediterranean city*

## **From plazas to balconies: counterbalancing the lack of space, contact, action, entertainment**

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### **Extended abstract**

Urban landscapes are constantly evolving through interactions of people, time and space. Global environmental and social changes, climate change and demographic shifts have great impact to cities development. Such changes usually happen gradually over lengthy periods of time; however, the COVID-19 pandemic caused extreme changes worldwide in a very short period of time.

To reduce the spread of the virus for the safety of the citizens, restrictions of free access with temporal and geographical constraints (within each municipality) and a range of permissible behaviors, distances and relationships between individuals further narrowed the accessibility of public spaces. Hence, pandemic restrictions created a deserted urban landscape worldwide, constituting the canvas for new urban interpretations.

People acknowledge the new condition and enact a set of interactional familiar and unfamiliar practices in the transformation of the international urban landscape. The production of neighborhood and city space through the actions of the users co-shaped the boundaries and the functional values of the designed spaces. Seeking to counterbalance the lack of space, contact, action, entertainment, performative/artistic/cultural events and to enhance the urban experience, impromptu relief mechanisms were invented creating ephemeral heterotopic events (musicians performing on balconies, street performers, etc). The global health crisis showed that cultural participation, creative activity and access to open, vibrant and social public spaces is a crucial factor for safeguarding citizens' physical, mental, and emotional stability and social well-being.

The paper investigates the temporary transformations that urban landscapes worldwide have undergone during COVID-19 crisis and particularly in the period March - September 2020 where two crucial phases were identified: i) strict restrictions and ii) less intense restrictions. Through a critical literature review, informed by authorial observations, the paper aims to provide insight into how these user-generated adaptations and temporary transformations impact on the functional values of urban spaces, while supporting connections, stimulating contact and social exchanges, affecting social well-being and blurring the limits of public/private, permanent/temporal, legal/illegal, just/unjust. The research is developed on the background of 3 pre-Covid axioms: the sustainability, the globalization and the culture and focuses on spaces where shifts of public life were occurred: the urban public space, the urban balcony, the urban rooftop and the cyberspace. The paper also highlights the significance of spontaneous "tactical pandemic urbanism" as a bottom-up action that can lead to top-down policies that acknowledge the existence of the flexible dynamics that can allow the renegotiation of existing urban spaces in the context of future crises.

*Keywords: duality, spatial boundaries, participatory appropriation, performative appropriation, COVID-19 restrictions*

## **Rethinking urban planning in the time of COVID-19: From “urban voids” to “urban commons”**

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### **Extended Abstract**

Today's cities face multiple forms of crisis - environmental, economic, social, political, technological, pandemic - which are constantly testing and changing the demands and challenges of urban planning. The whole planet has been facing such a crisis for a little over two years. A period of global pandemic (Covid-19), which has now shaped the way cities are designed. Currently there is a dramatic change in our relationship with the city, neighborhoods, streets and in general the public space where we move and live. The pandemic turned people into a state of confinement and introversion, revising distances in the city and urban spaces. The once forgotten public space regained its meaning and the dialogue for its recovery was rekindled. The need for public open spaces in which social distance can be maintained has increased. The neighborhood came to the fore again and acquired an unprecedented dimension. A typical example is the pocket parks which were an emerging trend of effective utilization of the open public space.

During the first international lockdown of cities, the spatial disadvantages of cities in dealing with the crisis were revealed. It has been unequivocally shown that the sidewalks and public green and recreational areas (squares, parks, etc.) in many Greek cities are insufficient in number and size, unevenly distributed in the urban fabric, while most are not attractive due to image and/or functionality. A paradox was observed in the cities, where on the one hand there is a lack of public open spaces and on the other a plethora of unused, abandoned, empty spaces. These empty spaces, which are described in the literature as 'urban voids', are a tool for re-examining urban space, which can be used to reshape the image and structure of the modern city, especially if they can be transformed from “urban voids” to “urban commons”. Due to the current need, for more public open spaces, the existing urban voids that are scattered in the urban fabric gain special meaning and can be the receptors for new activities and experiences.

A pandemic on such a global scale may be an opportunity to think about designing more "sustainable" and "resilient" cities. It is necessary to be able to find ways in which "urban voids" could be changed or reused in urban public spaces, highlighting them as key spaces for the sustainable development and resilience of modern Greek cities. This article through bibliographic review and bibliostatistics methods utilizes the existing literature focused on urban voids and proceeds to highlight a time horizon of the decade of challenges and the role that the urban public open space is now called to take, with emphasis on participatory processes and forms of tactical urbanism like pocket parks.

*Keywords: covid-19; urban void; bibliostatistics; tactical urbanism; pocket parks*



**SENSORY PLACEMAKING: REIMAGINE THE FUTURE  
RESILIENT CITY AND PUBLIC SPACES THROUGH SENSES  
AND MEMORIES**



Changing Cities V, Corfu, 20-25 June 2022

**Organized and chaired by Ass. Prof. Maro Sinou**

**Ass. Prof. Maro Sinou**, Department of Interior Architecture, University of West Attica



## Small urban space network: the perspective of a green network including small and very small urban spaces as an answer to the scarcity of available public space in city centers

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### Extended abstract

A green network accessible to all is significant in order people to socialize and create permeable and rigid environments that promote health and wellbeing. Green spaces in cities can also provide cooling through shading and enhanced evapotranspiration, thus reducing the heat island effect that occurs in many cities. This approach includes the connection between different types of open spaces as squares, parks of all sizes and green corridors.

The paper focuses on the design of small and very small urban spaces as parts of green networks in city centres. The overall objective is that in densely built cities with small percentage of green areas, such a network could offer a more sustainable and viable environment. The work focuses into three main objectives:

1. How a dense network of small and very small urban spaces can affect the microclimate of the city.
2. How to reinforce social interaction in public space. Urban open spaces are not only climate regulators, but they also act as means to urban cohesion.
3. The aesthetic upgrade of urban landscape through such interventions, in order to create locally strong, long lasting community identities.

In this research four types of small urban open spaces are investigated. The first type is 'internal urban courtyards' within urban blocks. In Greece these open spaces are rarely being used due to their poor or no design at all while they are abandoned. The second type is 'pocket parks', which are usually small open spaces smaller than 500 square meters. These spaces have the potential to provide a sense of relief in the urban fabric, contribute to a sense of place, provide comfort, promote well-being and contribute positively to the urban microclimate. 'Parklets', which is the third type investigated, are extensions of the sidewalk, small parks –public spaces that can be installed in the place of a parking space of one or two cars. Some of the aims of the implementation of parklets are the encouragement of the pedestrian activities, of the non-vehicular transportation, the interaction between the community members, the support of local businesses and finally the potential of a new concept for street design. Finally, the fourth type is 'semi-enclosed urban spaces', which are very significant since they act as climate moderators, being cooler than the outside temperature during summer and warmer during winter.

A case study Athens' city centre is investigated and in particular, Kipseli a densely built area. The aim is handling the problems and propose solutions based on the principles of sustainable urban design approach. Inspired by the mechanisms of nature, an effort is made to reintegrate green spaces into the urban environment.

*Keywords: green network, sustainable urban planning, biomimicry, urban courtyards, pocket parks parklets, small urban spaces*

# **The architecture of the senses and the understanding of space through technology and smart systems for people with reduced perception**

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## **Extended abstract**

Man's contact with architecture is daily and necessary. The experience of space is a complex process where the environment is decoded by our sensory system and is perceived through the combination of cognitive functions. It makes the translation from the brain and is recorded in memory as an experience. In this process, the role of architecture has a key role, as it is the means by which space and time are analyzed, thus giving a human measure.

The built-up environment should be barrier-free and adapted to fulfill the needs of all people equally. A thorough understanding of human behavior is needed for architecture design to achieve its intended use. Also, the human senses are related to architectural design. In recent decades, a multisensory approach is proposed as there is a shift of interest from architects and designers from eye/sight to the other senses, namely sound, touch, smell, and on rare occasions, even taste in their work.

“Person with disabilities and person with reduced mobility” means any person who has a permanent or temporary physical, mental, intellectual, or sensory impairment which, in interaction with various barriers, may hinder their full and effective use of transport on an equal basis with other passengers or whose mobility when using transport is reduced due to age” (EU Regulation No. 1300/2014).

Persons with disabilities are a significant part of the population (an estimated 15% of the world population). A large number of those people have a reduced perception of the space. Planning for the majority implies planning for people with varying abilities and disabilities.

These people require particular assistance to achieve high accessibility for the areas of transport, living, security, and services. The role of assistive technologies and smart systems to serve these people's needs is indisputable.

The main objective of the study is to examine the relationship between architecture dimensions, people with reduced perception, and assistive new technologies, in the Greek context.

In-depth interviews, secondary data, and focus groups were used to collect the required information. Open questions and purposeful sampling were used. The study's participants (n=14) had a rich knowledge of the examined subject. The subsequent communication with them was accomplished personally, via the internet (mainly through email), and by telephone.

The main finding of the study shows that the appropriate architecture design with the assistance of advanced technologies facilitates people with reduced perception to enjoy high-quality services. In addition, the continuous monitoring of people with reduced perception needs is required to offer them the appropriate services. Those services should include a multisensory approach in order to become more attractive to a wide range of people with reduced perception.

All the involved parts in the examined issue, such as politicians, new technology providers, academicians, architects, and planners can benefit from the current study, acquiring useful insights

*Keywords: architecture; senses; technology; people with reduced perception, people with disabilities*

## **The relationship between disability, technology, and sustainable development: the Greek reality**

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### **Extended abstract**

Today an increasing number of the population face health problems due to aging and the rapid dissemination of various diseases. At least 1 billion people in the world are affected by some form of disability, which corresponds to about 15% of the entire population (World Health Organization, 2020). The term ‘Disability’ refers to both permanent and temporary functional limitations experienced by people of any age within any circumstance.

Technologies of all kinds, assistive technologies, technological solutions, smart wireless devices, ‘intelligent systems’, can improve the independence, quality, and health of people with disabilities. The intelligent tools which can be integrated into networks, adopt the Internet of Things (IoT), and allow greater accessibility to services and physical barriers. These ‘smart technologies’ integrate information technology with assistive technologies which opened a gateway to the development of increasingly powerful, personalized tools to help persons with disabilities (PWDs) meet their needs. Supporting the independence of PWDs (at all ages) will not only benefit the individual, but also will benefit society by reducing health care and formal long-term care expenditures, dependence on family members, and other informal supports, and harnessing the productive activities of those who are underemployed.

Sustainability consists of a big challenge and target in the last years. Sustainability, however, is not a consolidated idea, but an evolutionary process of improving natural and human systems through the best understanding and knowledge. Sustainability is related to ‘smart cities and those who adopt advanced technologies assist PWDs to facilitate their accessibility of them in all aspects of their life significantly contributing to sustainable development. Accessibility is one of the most important considerations in architecture, ensuring that the built environment caters to people of all abilities. Accessibility is not only the right thing to do but often also brings benefits to all users.

Among architectural designers, it is common to visualize accessibility as adding ramps, wide corridors, and elevators. However, technology can play a huge role to give the solution for problems that appeared.

The above-mentioned three items for accessibility are examined in the current study. Open questions were used to collect the required information. Also, purposeful sampling (n=30) was used. In particular, PWDs, their escorts, and academicians with high knowledge of the subject have participated in the study. An initial analysis of the answers is presented.

The outcome of the analysis shows a strong relationship between the three dimensions of disability, accessibility, and sustainability. Respondents pointed out that particular emphasis should be placed on accessibility in public organizations, supermarkets, and museums. Specific technologies (RFID, NFC systems which communicate through mobile phones) were proposed by participants.

Policymakers, people with disabilities, and academics can benefit from the current study, acquiring useful knowledge.

*Keywords: disability; technology; sustainability*

# **International Experience on Sustainable Public Spaces: Exploring Athens beyond the Dichotomy of Periphery and Center through the Athens Riviera**

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## **Extended abstract**

This research examines two pillars of resilient placemaking: green policies for the built environment and sustainable mobility, through the lens of public green roofs and bike paths in the Athens Riviera. After the economic crisis of 2008, the “Athens Riviera concept” was linked to tourist utilization, privatization of land and public land seizure (Markou, 2015 and Hadjimichalis, 2015). In this context, strategic enclaves of the Saronic coastal area, from Piraeus to Sounio, are gradually being renewed, following contemporary principles of city branding. Taking into account these relatively recent urban planning advances, this paper explores international best practices for application in the Athenian Riviera to promote sustainable urban development.

With the objective of highlighting good practices and strategies, we examine the Cool Neighborhoods NYC program and the EU Cool Roofs policy to inform potential methodology for creating a public green roof program in the Athens Riviera. Together, these programs provide examples of specific materials and building strategies that provide cooler outdoor spaces for residents and help mitigate the urban heat island effect. Additionally, we draw from the Javits Center roof as a case study in New York City to provide an example of public-private collaboration and community benefit from public green space. The Javits Center, an 840,000 square foot convention center bordering the Hudson River in Manhattan, is home to a 7-acre green roof that has reduced the facility’s energy consumption, offered green space to visitors and animals, and created its own power generation through solar panels. Drawing from this international experience, we propose a program to create publicly accessible rooftop spaces on administrative and commercial buildings in the Athens Riviera.

We use the case of the Great Allegheny Passage (GAP) trail in the Appalachian region of the United States to inform our analysis of strengths, weaknesses, opportunities, and challenges, of cycling infrastructure around the Athens Riviera and coastal Greece. The GAP consists of 150+ miles of railroad tracks that have been converted into a cycling trail connecting Pittsburgh, Pennsylvania to Cumberland, Maryland. The annual economic impact of the GAP is estimated to be \$800,000 per mile, or over \$121 million for the total trail (Great Allegheny Passage Economic Impact Report, 2021). By applying GAP’s successful planning, development, and financing strategies to large scale bike paths in the Athens Riviera, we see opportunity to add a new dimension to Greece’s domestic and international tourism industry and enrich Athens’ offerings.

Using green-blue infrastructure, we reimagine the future of Athens through a wider lens that incorporates the Athens Riviera and peripheral neighborhoods. These potential projects offer residents and tourists new public spaces which can help reduce stress and environmental impact on the city’s center (Acropolis, Syntagma, Monastiraki). By creating public outdoor space in less frequented parts of Attica, these projects may help draw people away from the densest parts of the city and spur economic activity in new communities. Additionally, by utilizing outdoor space, both proposals offer sustainable strategies for maintaining resiliency during potential future pandemics.

*Keywords: sustainability, urban planning, Athens, tourism, green infrastructure*

## **Urban screen based narratives as social experiences**

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### **Extended Abstract**

The urban environment is currently a combination of digital and haptic space. City surfaces become information screens, while smartphones create an endless augmented reality stage. Strolling in the city thus becomes a cinematic experience, in which distinct individual narratives are created in a non-linear and fragmented manner. This paper will explore the evolution of the viewer-screen relationship from passive to active/participatory based on the expanded cinema design principles. This is a group of experimental cinema works of the 60s that explored the formal qualities of the projection system (projection mechanism, light beam, projection surface) in order to alter the viewer's relationship with the screen. Different spatial arrangements lead to different kinds of experiences. The spatial design of urban media artworks will be explored as an opportunity to form a locus of shared encounters, thus creating common social experiences. The selected works deploy data visualization applications which transcend information sharing and create a visually enhancing and participatory experience. This study will focus on digital media strategies that create an architecturally designed screen-based narrative leading to a meaningful experience and a better quality of urban life.

*Keywords: media architecture; expanded cinema; digitally expanded cinema; projection mapping; urban media.*

## **Smart Sensory City as the new public place: investigate resilience and sustainability of urban public spaces to promote healthier environments and community participation**

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### **Extended abstract**

All public open spaces are key elements of urban fabric because they create patterns that promote social interaction. They also create a sense of security because people can have a clear picture of the place that they belong to. According to current guidelines, urban areas are essential to satisfy the need for social interaction, create a sense of place, to increase the awareness of the urban fabric and contribute to the improvement of the urban microclimate. In recent years and particularly during the recent Covid-19 pandemic, particular attention to the quality of public spaces and built environment has grown among architects, designers and urban planners.

However, current studies are suggesting that the mismanagement and abandonment of such sites has turned them into useless spaces within the built environments. This prompts us to explore further the idea of reusing and redefining such spaces and investigate further the potential to create new vibrant urban sustainable environments. In addition to the above, the concern about the inadequacy of high-quality public spaces in city centers, the exploitation of available public space from other land uses and the natural degradation of them, prompt us to look at the reasons why they have failed and what the users sense of them.

Local sense and sensory mapping can play an important role in improving the quality of the urban landscape and contribute to finding the necessary components to improve the comfort and experience of users. Recent research relates to the influence of the structured environment on memories, behaviours and senses and demonstrates the importance of the environment, the spatial messages that the user receives and how they can perceive and experience the space.

Based on the above data, the research methodology aims to explore the concept of the sensory city that provides opportunities for healthier places and promote social inclusion through participatory design techniques. It consists of literature review on the subject of the perception of the sense of place through the experiences of users. The perception of space based on these findings will be an important element to decode and explore the characteristics of the resilience of the urban landscape and to provide solutions to problems of design quality, social inclusion, sustainability and spatial comfort.

The paper argues that sensory mapping and active community participation can contribute to new recruits in the future composition of urban public space and to criteria for the implementation of sustainable development strategies.

*Keywords: placemaking; sensory mapping; urban public spaces; collaborative design; resilience*

## **Participatory activities in Piraeus Municipality through proGReg – H2020 project**

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### **Extended abstract**

Within the framework of the Horizon 2020 project: ProGReg the Municipality of Piraeus, together with the NGO KEAN – Cell of Alternative Youth Activities, is currently undergoing participatory activities in Piraeus city.

The use of Nature-Based Solutions (NBS) as a tool to promote urban regeneration processes in deindustrialized on densely urbanized areas by using participatory activities is an important issue.

In order to integrate the regeneration process in the local context and make it more efficient and successful within the local community, the project is based on a new participatory strategy model, developed during the first two years of the ProGReg project with the collaboration of all the cities participating in the re-research, and especially the Front Runner Cities that act as examples for the project implementation.

As a Follower City, Piraeus Municipality's aim is to apply and follow all the Roadmap steps, identified for the participatory and co-design process, at the local level and verify the feasibility and adaptability of such model in the urban context of the Greek city of Piraeus and in the chosen districts.

The participatory process defined in the Roadmap is composed of three main con-sequent phases to be achieved: 1) Preparatory Work, 2) Planning the Urban Regeneration Area Transformation; 3) From Co-design to Co-implementation. The process in Piraeus began in the first months of 2021, and since then the Municipality of Piraeus, together with KEAN, managed to achieve the first block of the first phase (Preparatory Work) of the Roadmap: this process involved the engagement of a first group of stakeholders from the public and private sectors, with a particular focus on the education field, by involving school teachers and man-agers, in order to plan future activities.

The difficulties related to the pandemic crisis required an effort to adapt to the new situation and to find a new set of digital tools and approaches, in order to engage with the stakeholders and start the participatory process from a distance: a series of online meeting and seminars was held, and new strategies are going to be applied and tested in the next steps of the process. Due to the challenges related to covid restrictions, the project team decided to focus on the school stakeholders, to carry on the project activities: further communication between the project team and the school stakeholders, involved during the kick off, enabled the organization of new workshops and activities, also in collaboration with new schools involved later on during the process.

Furthermore, in site hands on actions happened contributing to co-production activities in two schools of Piraeus where students and teachers have participated with great enthusiastic to the project. Research also took place with interviews and questionnaires to the participants while significant results.

*Keywords: co-design, participatory activities, natural based solutions, green infrastructures, pandemic crisis*

## **Memories created, memories recalled; interpretations of sensory spatial design in exploring cultural identity and heritage**

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### **Extended abstract**

Nowadays there is an everincreasing tendency in the field of spatial design towards experience centred design, associated with senses, cognition and emotion. Sense of place and sensory spatial design introduce designers into the sciences of behavior, psychology, physiology, advanced technologies and environmental studies. According to Pallasmaa “architecture is the art of reconciliation between our-selves and the world and this mediation takes place through the senses”. A combination of senses and experiences makes places understandable and memorable. The definition of “place” in the specific context includes parameters such as history, heritage, architecture and environment, as well as, social and cultural structures, rather than just the location. It is suggested also that seven experiential factors – hedonism, novelty, knowledge, involvement, meaningfulness, local culture, and re-freshment – lead to strong memorability. Through a process of analysis, scenario setting, story-telling and material implementation, designers are requested to interpret intangible and tangible values into sensory spatial designs in order to facilitate to the enjoyment, recognition, understanding and remembering of experiences, cultures and identities. The aim of this study is to discuss, mainly through case studies of student project work and workshop material, the visualization of the above theoretical background. Design students through a number of sensory spatial design case studies attempt to communicate cultural identities, to explore heritage and to provide memorable experiences responding to the continuous changes with adaptability and flexibility, to the increased needs of the society with inventiveness and openness of mind and to the fragility of the environment with respect and thoughtfulness.

*Keywords: sense of place; cultural identity; spatial memory; sensory spatial design*

# **Multisensory urban design as a complement to sustainable regeneration projects, in Euro-Mediterranean metropolises: the case of Athens**

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## **Extended abstract**

Multisensory urban design creates urban environments promoting positive spatial experiences for all human senses. Such an urban environment is perceived through a unique identity, emerging from locus' natural and human-created elements, while such projects can also highlight elements of local culture and collective memory. As multisensory urban design extends analysis and conception beyond visual aspects of urban space, it also contains a strong inclusivity aspect, mainly, but not only, for visually impaired people. Obviously, successful multisensory design, can improve the quality of environment and of life in urban areas, towards the direction of sustainable city and increase its attractiveness for dwellers, visitors, professionals and investors. In a sustainability context, multisensory elements of an urban area results to enhance and deepen its sustainable character. Sustainable urban areas (a)are compact and densely constructed, (b)are multifunctional, although mainly residential areas with diverse populationanddisposevivid shopping pathways, (c)dispose sufficient green spaces, appropriate social equipment and facilitate people to move by mild, non-polluting means, (d)promote safety in public spaces and accessibility to disabled. Multisensory urban projects need sufficient vital space, as they should include a diversity of elements stimulating human senses (planting, water elements, urban furniture, equipment and floor materials, fauna protection equipment etc.) while overall quality of built environment is also important. Thus, multisensory urban design can be conceived and applied, in urban areas where there is availability and quality in public space; it appears then, that it could be directed mainly towards favoured urban areas, where there are optimal conditions for its application. Nevertheless, multisensory urban design should be by priority directed towards dense and declining inner-city areas e.g. of several Euro-Mediterranean metropolises, having many common characteristics, as *intensive housing, few green areas, lack of infrastructures and services, exploitation of soil to its limits and uninhabitable conditions of some areas*. Typical examples of this way of urban development, are several inner-city areas of Athens, that in recent decades have been transformed into quasi-slums, as they are abandoned by dynamic strata, that are fleeing to the suburbs, provoking acceleration of urban decline that undergo lower strata, remaining or replacing the population losses. As in other Euro-Mediterranean metropolises, lack of free public spaces -as their vast majority is occupied by motorised traffic and parking lots- prevents inner cities from fulfilling their needs. About this question, the strategy adopted by EU in recent decades, is to give greater priority to more sustainable forms of transport. Thus, in the case of several Athens' inner-city areas, where public space is scarce, multisensory urban design has to be promoted as an enhancement of broader sustainable urban regeneration projects, which should be lanced by priority towards an urban renaissance of these areas. To face these problems, there are several major ideas about sustainable urban design (e.g. "Car free cities", "15-Minute City", "Superblocks" and in the longer term "smart city" and "autonomous vehicles" technologies) that could be combined with the idea of multisensory urban design, in purpose to form adequate integrated projects, for inner cities of euro-Mediterranean metropolises. In this context, for every area in need, further study should be required, to define the appropriate combination of sustainable and multisensory elements, in purpose to form the optimum integrated project.

*Keywords: multisensory urban design; sustainable regeneration; Mediterranean metropolis; Athens inner city*

## **New Emerging Urbanities. Vacillations, transformations and challenges in the post-Covid urban condition**

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### **Extended abstract**

*“At the ankles of the day  
the signature of evil is now clear  
time-bound captives, slaves of the night  
tied to the railings of the bed  
a prison, a threat out there...”  
[George Veis, “Gloriless,” unpublished]*

*“Leaving in a ghost town...”  
[Rolling stones]*

From the city of iconocentric perception, floodlit glamor and suffocating accumulation of services and functions, to the city of isolation and confinement, emptiness, and the darkness of abandonment. From crowded streets to solitary wanderings and obsessive-compulsive physical exercise. From excessive and uncalled for public exposure of the subject to its forced retreat to privacy, safe distancing, and fear of physical contact. Cities—spaces of action and experience—arouse human perception through various stimuli perceived by the senses. Cities move along the ebb and flow of their historical perspective, bearing particular meanings that are embedded in their predominantly material layer. Meanings that are related to the processes of origination, mythical status, historical development. Experiences that are interwoven with the collective and cultural memory of an urban fabric under constant transformation. Modern - day people do not simply inhabit urban areas, but also act as a “mirror” of their city, reflecting people, objects and stories of everyday life. Urban space turns into a locus when it becomes a field of action, when it is inhabited, in the broader sense of the word, and its spatial formations capture both the trace and the mold of human relations and activities.

The city of the pandemic is an extreme, fluid, dystopic condition, which forms part of a completely new narrative framework. Under the present circumstances, Benjamin’s iconic languorous flâneur is unwittingly transposed from safe living, consumerist euphoria, throngs of crowds, burgeoning travel, relaxed communication and a laid-back dip into the pool of collective memory and cultural memory, to confinement, oversight and hermetic isolation, to online communication and remote work, to the fear of infection and death. Currently, the body of citizens is slowly and painfully learning to adapt, to acquire newfangled habits, to balance on the cusp of environmental shifts. The dialogical relationship between people and the urban space is changing. The divergent narratives of people and the city are emerging in an oscillation between withdrawal into the private sphere and bodiless digital communication, and dynamic assertion of public space under new terms, creating the need to search for and devise new narrative models of urbanity.

*Keywords: cities; bodies; urban narratives; heritage; collective memory; cultural memory*

# **Transformative Designs of Hospitality Spaces in During the Period of a Pandemic**

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## **Extended abstract**

Nowadays that everyday life seems to regain “normalcy” the concept and the practice of accommodation -mainly in hospitality- seems to be enriched with the introversion and stability in the Covid era. While habitation and urban spaces regained “obvious” qualities of protection and precaution, the architectural qualities of movement, visibility, accessibility, privacy and also sun lighting, air ventilation etc. came back as key demands of spatial everyday life. By focusing on the hospitality spaces, this paper will seek to draw out the contemporary context in which various practices of accommodation “re-configure” spaces and change spatial modalities in the post Covid era.

How can distance and isolation be spatialized in a touristic architectural space that at first guarantees proximity and mixing? Which architectural practices tend to maintain the mobility of residence while the restrictions impose on mobility? How can we redesign a tourist building shell when the use of it involves moving, meeting and mixing uses in a sterile environment of health protocols?

In the context of this research, we will present redesigned examples of an emblematic - historic hotel in Greece during the Covid era. By restoring architectural practices and spatial tactics, the students of the Department of Internal Architecture of the University of West Attica bring into correlation the material building shell with the use of hospitality spaces. This proposal aim to highlight contemporary tools of architecture that transform the design of hospitality spaces now, in the era of Post-Covid living. The study of redesigned examples seeks to contribute to this endeavour in the field of both practice and theory on contemporary architectural design of hospitality.

*Keywords: spaces of hospitality, accommodation, redesign, Post-Covid living, architectural practices*

## **Environmental improvement of neighborhood thermal conditions: the case of Akadimia Platonos using ENVI-met software**

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### **Extended abstract**

This paper explores ways to improve the urban microclimate in city centers. The term *urban microclimate* consists of local variations in wind, humidity, solar radiation and temperature as a result of urban morphology parameters (build infrastructures, vegetation, surface materials). Given the complexity of the urban environment and the severe urban problems, the need for adaptation and change of that situation becomes increasingly important. The connection between the ecosystem and the cities should subsist as a sustainable way of development. The aim of the research is that subtle improvements in the urban scale, with regard to materials and vegetation are enough to improve the thermal conditions of an area, hence creating more comfortable conditions in densely built city centers.

The issue is investigated through modelling of the urban microclimate on the scale of a neighborhood, based on the complexity of the three-dimensional space. The case study area is Academia Platonos in Athens a historic area of rich cultural and social identity. The area is analyzed in terms of urban geometry and other urban characteristics and on-site observations are taken. Furthermore, the ENVI-met v4.4.5 Summer20 Lite software for microclimate analysis is used for the thermal modelling in order to analyze the ways of improving the conditions of urban microclimate through design techniques and different parametric scenarios. The study investigates that the application of passive cooling technologies (such as reflective materials) and urban green (such as vegetation of high density) can reduce the urban environment's temperature and improve the conditions of thermal comfort, even in densely populated areas with small urban voids.

The results of this study focus first on the analysis of air and average radiation temperature, as well as their impact on thermal comfort conditions and second on different design parameters that can contribute in the improvement of the thermal environmental convenience of densely populated city centers with scarce availability of green areas.

*Keywords: urban microclimate, thermal comfort, neighborhood, thermal modelling*

## **“The Intangible Victory”, Interactive Audiovisual Installation**

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### **Extended abstract**

“Intangible Victory” is an audiovisual installation in the form of the intangible being of the “Victory of Samothrace” that uses interactive digital media. Specifically, through this installation, we redefine the visual symbolism of the ancient sculpture, paying attention to time as a wear factor (entropy) and the special importance of the void as an absence of the sculptural form. Emptiness completes the intangible essence of the sculpture in the field of symbolism as well as in that of artistic significance for the interpretation of the work today. The function of the void and the interaction of the viewer with the work, causes the emergence of a new experience-dialogue between space and time. The use of digital media and technology reveals the absence of the sculptural form as it is visualized in the “Victory of Samothrace”. The sculptural form is reconstructed from fibers in space in a cylindrical arrangement. The form is rendered with colored strings - conductive sensors, that allow the visitor to interact with the work, creating a sound environment through movement. The sound completely replaces the volume, as the void of the sculptural form together with the viewer in unison present an audiovisual symbolism of the “Victory of Samothrace”.

*Keywords: The Winged Victory of Samothrace; Interactive Audio-Visual Installations; Symbols; Ruins*

## **Experience the city: designing an info kiosk for the promotion of the Sparta's city brand**

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### **Extended abstract**

The continuous and rapid development is the main characteristic of our days. The competition between places is getting more and more intense. In order to attract more visitors, companies and funds, each region takes care of the shaping of a distinguished brand with unique characteristics, goals and philosophy. This process is enhanced on the one hand by the design, via composing a visual identity and on the other hand, via its communication through media, such as advertising techniques, printed and digital communication material as well as the events' planning. The place branding strategy is intensified even more when, art installations and micro architecture constructions are embedded in the public urban space. The brand characteristics are now considered as part of a distinct experience, creating new industries in the fields of architecture and marketing related to user-centered experiences. Facilities such as tourist information centers, when they are designed systematically following basic design principles, can make a significant contribution creating a great experience and ultimately a positive city brand perception.

This paper examines the info-kiosks as ephemeral, transformable, architectural forms, which are able to act as experiential spaces that highlight and promote a city brand. The research and study of the Municipality of Sparta's city brand, leads to the design of an info kiosk that represents the city brand by promoting its unique identity. Also, by making it part of the visitors' experience and by serving the different needs of the Municipality. The methodological approach is based on the bibliographic review and the study of articles from different scientific fields, such as marketing, architecture and psychology, as well as user experience. Within this frame, we can strategically define the axis for managing similar design problems and promote the adoption of modern, flexible and efficient processes. In addition, by applying a qualitative research we investigate the target audience needs. Furthermore, we proceed to evaluate the project proposal.

Thus, prototyping in the design process is guided by the design principles of information centers, the design criteria based on the brand vision, as well as the requirements of the target group. It is a flexible, versatile construction that incorporates elements of the brand identity. Also, it's able to serve the different needs of the Municipality enabling new interactions, and transformations. By visiting the installation, the user is given the potential to get informed, to learn, to socialize, to feel, and eventually to experience the city completely. As a result, his experience may affect positively the city image and he will encourage more people to visit the region [word of mouth]. The design is determined by factors such as small architectural scale, periodic use, micro-medium operation and user flow intensity. The construction's modularity allows its transfer to different locations, enables different uses, layouts, and moreover, the integration of different experiences, thus giving flexibility and adaptability.

The project was designed and evaluated in the framework of a Diploma Thesis at the Department of Interior Architecture of the University of West Attica.

*Keywords: city branding; experiential marketing; temporary/portable info kiosk; modular construction; user experience*

## **Digital Art as a Form of Public Art**

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### **Extended abstract**

In our contemporary cultural environments, art holds a central role in creating and articulating values, moreover, in structuring and shaping everyday practices. Further to that, it can provide a conceptual framework to address contemporary concepts. The knowledge of the aesthetics and the experimentation upon over-elaborated aesthetic principles can be challenged in the stimulating practice of working on the field of public spaces and the everydayness. If the common basis for experiencing any public space is defined by our necessity to communicate with thoughtful, comprehensive societies of people, then we could think of the possible ways in which the physical and the digital public space could be designed as if to broaden the conceptual presence of one another.

Creating a digital project for a public space asks for a thought in situ; that which is installed within it, it must somehow (conceptually, literally, functionally and sociologically) get evolved with it. Since a work of art can reveal how complex relationships between individuals and public spaces causes, if not births, behaviors and whispers stories, it asks for us to think about the coexistence of the space and the artwork as a vector for creating meanings. Ideas for the relationship between the physical, emotional and intellectual perception of space, the understanding of public spaces, the expression of an aesthetic and at the same time a critical reason, the desire or intention for interaction -which arises from the affinity of bodies and spaces- they all can be seen in the light of a new perspective. This can be defined by the fact that the thought which generates digital artworks is revolutionary, because it always creates new ideas, or even, some different ways of thinking about our environments, our mode of inhabitant and behavioral selves.

According to the above, if the creation of a Digital Artwork means that someone is engaged to the creation of the new, then we have a provocatively interesting perspective for the future, for "the world that comes". Digital Artworks in public spaces look like a kind of a map leading us to understand what this world is not but yet, what it could be about. However, materializing a Digital work of Art for a certain public space is not just a project to predict what-will-happen, or a project to understand the reality as-it-is-now, it also composes the means of crossing a multitude other dynamics, such as the political, the economic, the social, the cultural and the institutional ones. For the time being, the text will retain the fact that a Digital Artwork, transitory among the places we inhabit, the time we spend, is not only a reminder of our pattern of perceiving, our motif of living our lives but it is also an opportunity to realize the culture we create.

*Keywords: city; public space; digital art-work; installation art; urban*

## From the platonic *chora* to the *flesh* of the world. A phenomenological approach to public space

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### Extended abstract

Plato, in his work *Timaeus* which deals with the creation of the world, describes a problematic in logical terms situation which comes out as a result of his attempt to activate *mimesis* and consequently approach the process through which *aestheta* (sensible things) take birth from the *ideas*. The presupposition that the world *per se* and the world as conceived by human mind coincide, underlies his thinking. Nevertheless, only through an inauthentic, bastard thought (λογισμότηνίνόθη), a third kind of being, *chora* (space) can be conceived as a kind of womb which gives birth to everything sensible on the basis of the *ideas*. The process of production of works of art and architecture resembles that of the works of nature.

The search for unity between art and life and its implications within public domain constitutes a principal issue for modernity, having its roots in a radical shift in the relation between man and nature during the Enlightenment. In the seventeenth century, the search for the ultimate principles of the natural world in the quantitative characteristics of nature generated the need for exceeding direct sensory experience and led to the conceptualization of supra-empirical, mathematical laws, which do not exist either outside the empirical world, neither as such inside it. The claim of the supra-empirical, mathematical relations of physical science to truth, expanded to all fields of scientific knowledge. In this respect, Descartes divided the world into *res cogitans* and *res extensa*. He allowed though nature to inhibit consciousness only in the form of mathematical physics extended in space through the cartesian coordinates.

A century later, Immanuel Kant looked for the principles of the judgement of taste separated from truth, in accord however to the new ontological situation of nature. In his *Third Moment* of the “Analytic of the Beautiful”, aiming to achieve a universally valid judgement, Kant excluded aesthetic judgements based on materiality (*empirical*) from judgements which concern the abstract form alone (*pure*). This is the reason why in all the formative arts as well as in architecture and landscape architecture, Kant claims, the *design* is essential. Hence it becomes clear that abstract form alone can be related to the beautiful, in a universally valid judgement. Moreover, for Kant space and time become properties of human consciousness.

Within the context of Maurice Merleau-Ponty’s philosophy, the aesthetic consideration of public space is far removed from any experience of alienation and detachment implied by the Kantian concept of *aesthetic disinterestedness*. Maurice Merleau-Ponty attempts, through a total reversal of the Kantian aesthetics, not only to reconnect aesthetics to knowledge and truth, but also to found this unity on sensation and materiality. His focus on the materiality of things is totally opposed to the Cartesian mind-body separation and the privileged position of the mind. The notion of the *lived body* and, ultimately, the reversibility of the *flesh* (*chiasm*), indicate the direct engagement of our senses with light and shadow, shapes, textures, surfaces, materials. The term *intentionality* indicates a latent “openness” of consciousness to things, where the roles of subject and object are reversible. Memory, imagination and dream can be activated in an interplay of art and architecture with life, within open, constantly changing systems of dialogue and communication.

This paper will examine how public space can accommodate the relation of contemporary man with history, nature and other cultures, within the spectrum of Maurice Merleau-Ponty’s philosophy. It is the common task of art and architecture to face this challenge.

*Keywords: public space; chora; lived body; flesh; materiality; art; architecture*

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## **Performance art: A tool to redefine public space**

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### **Extended abstract**

We live in a world determined by the needs of a consumer society and the consequences of this condition are reflected in everyday life and in our surroundings. Commercial tactics, social control and discrimination are used to direct and control the masses. Public spaces which ideally should reflect the principles of freedom, creativity, free social interaction and the development of fruitful political discourse, are instead directed towards suppression of actions that go against consumerism. Thus public spaces lose their true identity as public and turn into homogeneous spaces with predetermined functions. In this barren landscape, people end up becoming helpless and docile consumers.

Since in modern everyday life people have no opportunity to develop their creativity, spontaneity and play. It is then urgent the need to redefine public spaces and public life so that they achieve their optimal form. Art, being a part of life has faithfully replicated and become a part of consumerism. After the First World War, however, artistic movements such as those of the situationists, dadaists and surrealists, began to appear in the western world as a reaction to the social and artistic establishment. Art escapes the sterile and commercial context of galleries and museums, seeking a new form, being actual aspects of everyday life and no longer just a representation of it. In this way it becomes anti-art, moving away from the production of objects and turning to artistic practices in the city's open public spaces; where the act of wandering becomes a form of spatial intervention.

These movements are a precursor to the evolution of artistic practices after the middle of the twentieth century, where their most radical form appears, the performance art. The action here is a direct, physical practice in real time and space, focusing on participation, breaking down boundaries between spectators and artists, and connecting directly with everyday life. In the vast urban landscape the performance becomes the tool for shaping micro-spaces of freedom, where citizens can re-appropriate public space, become playful, express themselves, develop dialogue in order to communicate their ideas and concerns. Performance is a form of art that bears no resemblance to the conventional notion of art but is a radical movement that aims to shape active subjects that challenge the imposed constructed normality of life which ultimately aims to redefine life.

*Keywords: art, performance, public space, radical movements*



**THE MEMORY OF PLACES: BUILT ENVIRONMENT,  
CULTURAL LANDSCAPE AND HISTORICO-POLITICAL  
IDENTITY**



**Changing Cities V, Corfu, 20-25 June 2022**

**Organized and chaired by Ass. Prof. Elena Konstantinidou & Prof. Em. Konstantinos Moraitis**

**Ass. Prof. Elena Konstantinidou**, National Technical University Athens, School of Architecture, Greece

**Prof. Em. Konstantinos Moraitis**, National Technical University Athens, School of Architecture, Greece



## **Virtual promotion of historical memory: digital guidance narratives 'inscribed' in public urban space or correlated to cultural landscape visiting itineraries**

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### **Extended abstract**

Frances Yates in her classic study on the *Art of Memory*, intensively described the importance of place references for the formation of the mnemonic structures and their association to individual or collective imagery. Investigating the opposite direction of these reciprocal influences, we may assert that place identity cannot exist outside the semantic formations, outside the denotational and connotational meaning. Reality and mate-reality cannot flourish outside the intangible formations and, in this context, virtual digitally presented narratives appear to be suitable for the promotion of the previous intangible attribution in its full possible value, in its full imaginary and mnemonic extension.

The lecture to be presented, intends to describe three architectural projects of urban landscape design, plus a fourth project concerning the strategy for place identity promotion of a geographical insular territory. All four case-studies refer to proposed interventions in Greece: in the city of Trikala in Thessaly, in the city of Larissa again in Thessaly, in the municipality of Kaisariani at the periphery of Athens and, the fourth one, in the geographical territory of the Isle of Lesbos, in the north-eastern part of the Aegean Sea. They attempt to correlate, all four of them, material place formations with guidance narratives offered to the visitors as well as to the inhabitants of the cities or the isle in question; guidance narratives provided through virtual information procedures.

It seems rather needless to insist on the informative value of virtual digital guidance in sites of specific, important historic and archaeological value; in Acropolis hill or Kerameikos ancient cemetery in Athens, in Forum Romanum, Pompei, or Jerusalem.

However, what we should further insist on is, that urban space, in every possible city of the world, constitutes an important cultural and political environment 'par excellence', an extended representational and expressive active ecosystem, being correlated to the mnemonic past references of its population, as well as to their historic future to come. We may comment in addition that the same holds truth for historic territories outside cities, for 'cultural landscape' in general, as in the case of the cultural geographic territory of the Isle of Lesbos, presenting not only a natural landscape existence but, moreover, an extended influence on the neoteric Western imagery and art references. Didactic narratives, concerning the presentation and promotion of the cultural landscape identity in urban or peri-urban territories, are thus crucial, exceeding goals such as the touristic development or for consummative proposals. They are moreover valuable as testimonies for the existence and development of the cultural and political conscience of the local societies; for the acknowledgment and the coherence of their collective historical identity, which has to be preserved, commemorated, promoted and transferred to present and future generations.

*Keywords: digital virtual narratives; place identity; urban public space; cultural landscape; Trikala Thessaly; Larissa Thessaly; municipality of Kaisariani in Athens; Isle of Lesbos.*

## **The memory of places–The places of memory**

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### **Extended abstract**

The concept of collective memory, as a key element for the formation of social identity, is associated with society, social conscience, and places of reference. Therefore landscape, the natural as well as the built environment, may be described as the "field" for the projection of memory, acquiring its 'validity' in cultural or political terms, thanks to the intangible elements that constitute its identity. Therefore landscape, the natural as well as the built environment, may be described as the "field" for the projection of memory, acquiring its 'validity' in cultural or political terms, thanks to the intangible elements that constitute its identity. Memory 'needs' the place; it is important to be projected on it. At the same time, places acquire identity not through their material substance solely, but also through intangible processes and collective memories. Historical sites, as par excellence mnemonic places, are an ever-changing visual record of historical memory.

This paper will discuss ideas on the relationship of collective memory with the place, as a determining factor in its formation, but also as a tool for planning its protection and promotion. That is, the way that collective memory is recorded in space, in general but also in particular in the built environment. Also, the way memory is correlated with the identity of a place, defining, redefining, highlighting, or even effacing parts of previous mnemonic approaches. Ultimately how memory affects place as well as time and its spatial/spatiotemporal imprint.

In particular, emphasis is given on the correlation of the terms memory and history, with the spatial background of one of the most important places of historical memory in Greece, Souli, on the occasion of a research program on "HISTORICAL REGION OF SOULI: PROMOTION, PROTECTION, AND DEVELOPMENT OF ITS CULTURAL LANDSCAPE" (developed in collaboration with the Ministry of Culture and Sports of the Hellenic Republic, Region of Epirus, School of Architecture NTUA).

Souli is one of the most important historical places in Greece, related to the struggles for liberation and the recent history of the country. Furthermore, the place is symbolically identified with the highest expression of people with a free spirit and the demand for independence, associated with the overall political background of modern Europe and the Western world. The area has a very strong historical, cultural, and political identity forming a complex landscape, unique in the world. Is a "historical place" and "cultural landscape" as it has settlements that maintain distinct historical traces and historical fortifications.

On the occasion of the case of Souli, the paper attempts to highlight contemporary methodological approaches, as well as directions and strategies, related to the design of protection, reveal, and promotion of the identity of cultural - memory landscapes.

*Keywords: memory of places, places of memory, identity, collective memory, historical memory, historical place, Souli*

## **Accessibility as a strategy to investigate historical strata**

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### **Extended abstract**

Historical strata, ancient remnants and present or vanished traces from the past construct the historical urban stratigraphy of our built environment. One of the challenges is to interpret the intricate relationship between strata and to implement strategies that are able to bring to light this complexity, in order to make it readable and tangible. In this paper, the issue of accessibility will be investigated as a strategy to explore the identity of a place and then to make it visible and comprehensible to the public. To do so, the case-study of Piazza Mazzini in Albano Laziale and of the famous Villa d'Este in Tivoli, both cities close to Rome, will be presented. These two examples challenge the issue of historical identity at the city scale as a complex relation of networked spaces that have been built over time.

The first case-study is Piazza Mazzini, the main square of the city Albano Laziale that is mainly used as a parking space. The square is located along the famous via Appia, a consular road that was connecting Rome to the port of Brindisi, just right after the old Main Gate of the city and adjacent to Villa Doria, a large park on the slope of the hill. The square has assumed this shape only after the Second World War, when a *Palazzo* was bombed and then demolished, altering definitely the morphology of the square. The investigation of these historical events, together with the morphological analysis of the surrounding places, brought to the definition of a strategy that aims to give a new identity to a place with no quality.

The second case-study is Villa d'Este in Tivoli, famous for its wonderful building and the astonished garden that make this place one of the most important and visited monuments of Italy. But the area outside the Villa presents today a vast and complex stratification that includes a portion of cultivated land with vineyards and the complex system of the recently excavated Santuario di Ercole Vincitore. Between the two areas, a public space, until today used as a parking area, assumes a crucial role to re-connect the areas and to integrate antiquities to the city network. The complex chronology of the area and the juxtaposition of multiple morphologies reclaim for a strategy able to integrate the many places and to reveal this multi-faced identity.

The two case-studies will demonstrate how cities are defined today by the co-existence of diverse materials, periods and forms that have been juxtaposed and overlapped during the passing of time. Such complexity, that makes a place unique and unrepeatable, should not remain silent but it is of a common interest to make it visible. Therefore, a prerequisite to understating places is to make them accessible in order to strengthen both their identity as perceived by citizens and by tourists. Finally, the two proposals will be investigated and questioned by comparing them with other similar good practices.

*Keywords: archaeology; palimpsest; city; urban regeneration; accessibility, public spaces*

## **New Metabolism: ‘Placeless’ solutions strategies for unplanned scenarios**

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### **Extended abstract**

Architectural design is a process wherein a problem regarding physical space is analysed to a set of variables, then re-synthesised towards new solutions. Additionally, design’s increasing complexity and challenges with regards to sustainability, ecology, infrastructure, political issues, and public resources often require novel responses. It follows that design deals with change as a quality inherent to a project’s main purpose. Architecture, as much as it envisions new ways of living, inevitably causes a shift of socio-cultural memory due to a place’s transforming. This observation is mostly relevant in cases where unexpected phenomena take precedence over other imperatives being more predictable and controlled; in that sense, design may purposefully disengage from prior references by which place would have been identified.

This paper delves into this challenge by introducing the ‘unexpected’ into architecture’s body of work. Open-ended strategies are compared as alternative ones set in response to unforeseen scenarios. Historical paradigms are drawn, namely Metabolism and Late-modernist avant-garde in Japan and Europe, reflecting widely applicable bottom-up and cross-disciplinary approaches. As this Post-War legacy is met with the use of advanced computing, it prompts to raise complexity, prediction, and overall expectations even further. However, to engage with a wider range of unspecified factors, it is necessary to move away from prior references that would render a scheme less flexible. In effect, ‘placeless’ styles are preferred, as ones that are more adjustable, speculative and responsive. Case studies with unpredictable character are also examined along with computing, which sets design a cross-parametric task impacting regional planning, infrastructure, architectural modules, and smaller elements altogether, with reference to acclaimed examples on similar themes. Specifically, this paper touches upon ‘placeless’ scenarios with regards to a need for high unpredictability due to flooding, earthquakes, warzone escaping and forced fleeing as recurring disasters of natural or human-related causes. Because of their disturbing character, reaction time or the possibility to employ sophisticated systems, figures and long-term policies is limited, whereas to respond to a wider spectrum of cases, provision needs to stay away from a place’s memory and identity as major constraints. Dynamic, fuzzy variables may better suit design’s agendas, methods, and modes of implementation. The employed techniques build upon cross-parametric also cross-scalar linking to increase adaptability and resilience of ‘placeless’ strategies, however impacting regional planning, infrastructure, architectural modules and smaller functional elements, and longer-term priorities. A revisiting of Post-War precedents in Japan and across Europe through the contemporary context sheds new light in the analysis of design methods and the conceptualization of dynamic features about placeless approaches, as ones that do not attempt to connect with place’s identity, history, or memory. A series of unpublished outputs being presented meet past references of interdisciplinary design thinking with computing and the broader humanistic discourse.

*Keywords: metabolism; place-lessness; sustainability; interdisciplinary design; Post-War architecture*

# **Place branding and the ancient Greek imaginary: The case of Lesbos island as an example for the creation of Greek national network of associative cultural landscapes**

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## **Extended abstract**

This paper deals with a regional development method that focuses on finding and promoting place identity. In particular, an attempt is made for the development of a network of cultural landscapes in Lesbos to promote the intangible cultural heritage of the island. In addition, the ancient Greek imaginary is explored as a useable resource that can contribute to national growth and place branding.

Landscape, based on the European Landscape Convention of Florence, is defined as the outcome of nature and human interaction, thus recognizing its inherently cultural status. As, therefore, cultural heritage is distinguished in tangible and intangible, so the cultural landscape is analyzed in real and associative. Place identity is conceived as the resultant of the landscapes that construct the place. Place-branding is considered to be an important tool for spatial development. It requires the finding of place identity through the landscape analysis of the region, as well as place identity promotion through the implementation of architectural and landscape design projects.

Based on this theoretical background, Lesbos is taken as a case study. The tracking of Lesbos' place-identity is structured on the basis of its real and associative landscape. The latter concerns the subjective perceptions of the place, where the lyric eroticism emerged as a predominant element projected on Lesbos, thanks to the plethora of remarkable litterateurs associated with the island. Its natural scenery is governed by diversity and contrasts, while its anthropogenic landscape is a palimpsest of Western and Eastern culture.

In order to highlight Lesbos' intangible cultural heritage, it is proposed to create a network of associative cultural landscapes. This is structured by individual small-scale interventions based on a specific architectural example, the infrastructure designed by Peter Zumthor in Norway's Allmannajuvet cultural route. In the central point of the network, it is proposed to create a cultural park that will act as a network management center and will promote Lesbos' heritage.

Then, an attempt is made to extend the proposed model from regional to national level, utilizing the mythological and historical narratives of the ancient Greek imaginary. The adoption of the structure of the successful Norwegian Network of National Scenic Tourist Routes is urged. Additionally, the main mythical landscapes of ancient Greece are analyzed, while a proposal is made for the implementation of a tourist model that creates cultural corridors both within the country and transnationally on the basis of the dominant categorization of Greek mythology.

In conclusion, the associative cultural landscape emerges as a valuable cultural resource that can contribute to the development of a place at both regional and national level. Specifically, in the case of Greece, there is a unique scope of opportunities in the exploitation of the ancient Greek mythical landscape, which is of constitutional importance for Western culture. Finally, through the proposals that have been analyzed, it became clear that architectural and landscape design can successfully act as spatial storytelling tools of place narratives.

*Keywords: place identity; cultural routes; landscape; intangible cultural heritage; narratives-storytelling*

## Breaking the Fourth Wall: On Tools to Explore the *Terra Incognita*

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### Extended abstract

While densification in Israel nowadays has become a national challenge due to population growth and a shortage of free land, there are areas in the country considered ex-territories, preventing any possible architectural intervention. Those out-of-site, out-of-mind territories are the *terra incognita* potentially to become *terra firma*, once evaluating the obstacles justified them to their rediscovery and development.

I have focused on Lynch Bay, by the Dead Sea, as the site of this research, on account of the major ecological and climatic transformations which are taking place there in the past decades, while revealing new grounds, such as dry salty-water soils, swallow-holes and sweet water streams. Although expeditions to the Dead Sea were documented as early as 1772, the 1848 comprehensive survey led by Lynch set out to map the area. The accurate mapping indicated that the seabed was flat. The edges of the northern basin were steep on its eastern side and its bottom was deep, contrasting that of the southern basin, which was shallow—only five meters on average. Following the conducted mapping, a steep drainage system was discovered, identified at the bottom slopes of the southern basin, formed by the dismantling processes of underground streams. The researchers regarded this as evidence that the southern Dead Sea basin had alternately dried up and flooded several times throughout history. Nowadays, Lynch's assumption has proven accurate, with the southern Dead Sea drying up, revealing 'new' land, expected to expand through time. It was not only the revealed territory that posed questions concerning preservation of a becoming one-of-a-kind landscape, residing along the Great Rift Valley and of its climatic conditions, but also determining the exact location of the lost contemporary Israeli-Jordanian border that was no longer positioned in the midst of the sea water. According to Irit Rogoff, geography "has become a language in crisis, unable to represent the immense changes that have taken place"; however, in the case of the new discovered territories, they could even become a key resolution to contested spaces, transforming opportunities for environmental planning conceptions onto a novel, productive neighbouring life.

I argue that it is not only possible to conduct an examination of the extended territory fraught with international conflict *recto verso*; such examination bears the potential to envision a site informed by multiple design gazes, motivated by principles of belonging, identity and ecological measures that would redefine the Dead Sea as one of the wonders of the world.

*Keywords: terra incognita; Dead Sea; Lynch Bay; Great Rift Valley; geography in crisis*

# **Memory in Transit. Integrating archaeological heritage into the daily commute**

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## **Extended abstract**

Cultural heritage as a source of memory and inspiration has a significant impact on the sphere of urban representation, where monumentality, narration, and identity of a place have social and cultural expansions of the utmost importance to the community. Therefore, the role of cultural heritage in the regeneration and sustainable development of cities and regions is increasingly being studied, where the challenge is its consideration as part of the larger field of socio-cultural processes of the contemporary urban context. In this framework, archaeological heritage, due to the morphological nature of ruins encloses a high level of complexity when it comes to fruitful integration with the contemporary urban spatial reality and the mobile nature of contemporary societies.

Indeed, as urbanity is constantly evolving and people fluxes increasing, mobility nodes and multimodal infrastructures are transforming to the more central and vital nucleus in the city's stratum, claiming the importance of the exterior public space, leading to the deterioration of the physical connections of the city, and the marginalization of the archaeological areas. Mobility infrastructures become new centralities and attract a variety of uses and services. They celebrate advanced technological achievements and materialize the concept of sustainability when it comes to mass mobility and connectivity but fail to incorporate cultural qualities, encapsulate the notion of identity, and establish conceptual and contextual connections with the locus. For this reason, it is necessary to reflect on the role that archaeological remains can play in the formation of the contemporary urban spaces, considering excavation as a creative process, and find synergies to achieve an integrated approach between the need to preserve archaeological assets and the need to modernize urban infrastructures.

Recently, many attempts have been made towards this direction for the design and realization of mobility infrastructures, in European cities, where the in-situ conservation and display of archaeological remains became the tool for the design of the architectural project. A critical analysis of the practical application aims to reveal the high potential that this integration is enclosing and identify successful design methodologies implemented for achieving meaningful interactions. Narration as the main design tool enables the conservation of the archaeological asset and the architectural intervention to be accomplished synergistically, creating new meaningful relationships between the past and the present, establishing the historical continuity, and enriching the identity of the place. The architectural project has the potential to become the interconnective mechanism that enables the traces of the past to serve as symbolic elements into the contemporary urban cultural imagination and invent ways to incorporate aspects of memory and identity into the public spaces and structures of daily use.

*Keywords: archaeology; ruin; memory; identity; urbanity; mobility, infrastructure; architectural design*

## **Digging in time: the loss of memory of Citânia de Santa Luzia**

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### **Extended abstract**

Starting from Henri Bergson's reflections on the development of memory, it is proposed to analyze the case of Citania de Santa Luzia and how new design methods can lead to the recovery of a lost memory. The study proposed here tries to combine the collective memory, which seems to have been preserved by construction techniques, with the memory of the individual: the latter needs direct spatial experience to develop a sense of identity, rather than handed-down knowledge. In the analysis of places, the study of building techniques is combined with historical research, aiming at deciphering the forms of living and building solutions in chronological order; all based on the belief that the characteristics of a settlement describe the culture of its inhabitants.

The pre-Roman settlement sits on top of the mountain overlooking the present-day town of Viana do Castelo, now dominated by the early 20th century church and the hotel built in 1955.

Although the sources do not refer to it as early as the 18th century, it is an important case for the 'castrense' culture, as well as for understanding how settlement principles have changed over the centuries in relation to natural factors. The territory is characterized by an almost totally rocky soil, marked by numerous watercourses. Ancient construction seems to take its origin precisely from these characteristics, making the rocky shore as building material itself; shaping or conforming the ridge as needed.

Most of the archaeological sites enhanced in the last 50 years have been based on principles of heritage conservation that did not value the importance of site in its original conformation, passing by the design dimension. The use of an archaeological space should therefore be able to narrate the spaces of the ancient time, and the best way to narrate a space is to experience it directly. The first experience of space is in the dimension of our senses, through experiences of our body.

The valorization project proposed assumes a total understanding of the archaeological site, also developing reconstructive hypotheses, which are accepted as temporary and always variable changeable according to further archaeological data. Strongly convinced that the understanding of any phenomenon is through direct experience, the project promotes "acts of conscious freedom" in the visitor. Like a theatre, the site changes over time, it will always have new events, new staging reflecting the state of research, becoming a representation not only of the past, but also of the present. As M. Heidegger wrote: "construction is always an outcome of history". But how can a built element become an open work (referring to U. Eco definition)? Architecture for archaeology cannot be a closure but should produce an invitation towards knowledge of the past, leaving room for new developments. This idea goes beyond the principle of reversibility that the latest restoration charters have proclaimed. Architecture becomes an open work of art:*in-situ* with the visitor, and in time with possible changes in the layout, thus following the most modern principles of museography.

*Keywords: memory; castro culture; landscape; ancient architecture; pre-roman settlements.*

## **The Memory of Place in the World of Augmented Reality**

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### **Extended abstract**

InterArch is a research project that aims at the design of a site-based digital application for archaeological visits and guided tours, supporting Virtual and Augmented Reality (VR, AR) technology. The research case study is the city of Ancient Messene in Peloponnese, one of the most important archaeological sites in Greece. The program is co-financed by the European Union and Greek national funds, through the Operational Program Competitiveness, Entrepreneurship and Innovation, under the call RESEARCH – CREATE – INNOVATE (project code: T2EAK-01659). It involves mutual collaboration between academic and cultural institutions, and the contribution of an IT applications development company. The research proposal combines the physical space of the archaeological site with the digital space of archeological and cultural data. Archeological sites constitute, in general, important ‘cultural landscapes’ that reveal a historical, social and political environment consisting not solely of material indices, but also of immaterial, intangible mnemonic references. Mingling of the real-world environment with its digital and cultural components, by using augmented reality techniques, could potentially transform the visit on site, into an immersive multimodal sensory experience. To this purpose, on-site research is carried out, using GPS locators, which monitor and track visitors' itineraries throughout the archaeological visit. Spatial analysis on the visitors' flows will provide our project with useful insight, about the ways visitors engage and interact with their surroundings, according to the duration of stay on each location. This process will enable us to associate tangible and intangible features of the landscape, such as the range of viewing angle and display of multiple perspective ‘views’ of the site, with specific points of interest. Our main goal is to relate these time-space varying maps to the extensive historical records, along with the detailed evaluation of the existing digital and non-digital archives. This fusion of the real-world environment with its digital components enables to incorporate a multidimensional approach to the narrative, elaborated through the processes of story-telling. Although up to date digital technology makes possible in-situ presentation of multidimensional narration that extends the limits of factual knowledge, the formation of identity and collective memory narratives, is not a recent strategy. The city of Ancient Messene was founded by Theban General Epaminondas for military and political purposes and the well-considered choice of the fertile natural landscape at the foothills of Mount Ihtomi, was supported by the awakening of collective awareness, based on the surviving rituals and myths of the place, and the emblematic new constructions of public buildings. The visual ‘image’ of the new-founded city is related directly to the formation of a new ethnic identity for the Messenian people. This paradigm, of the ‘image’ of the city placed side by side with the different perspective ‘views’ of narration, emphasizes the extensible character of interpretation of historical evidence and its intertemporal correlation to present reality.

*Keywords: archaeological, digital, memory, identity, augmented reality, visitor's flows*

## **The boundary between urban and natural landscape**

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### **Extended abstract**

The images of empty cities in the pandemic era surprised us, every economic activity, every type of transport has stopped making urban centers like ghost areas.

The frame that shocked the world is certainly the one captured by Copernicus, a space satellite of the European Space Agency (ESA). He showed us a planet earth that returns to breathe, for the first time in decades the smog clouds have no longer enveloped the earth's surface.

Despite the negative aspects related to health and sociality, there were many positive aspects that allowed us to think about how important the environment is about a naturalistic-environmental point of view as well as for psychological well-being.

Many minor historic centers and naturalistic areas have welcomed smart-working workers, favoring a repopulation of ancient uninhabited villages or countryside areas disconnected by large urban centers.

These are decentralized places that are marked by a boundary between urban and natural landscape, a boundary that in recent decades has proved increasingly weak and susceptible.

The human evolution has shown us that migrations occurred to find food and comfortable places, hence the formation of the first villages to create places for the exchange of goods and knowledge, understood as cultural exchange.

From the primordial human evolution up to contemporary history, needs have changed and cities have changed because of these.

The pandemic has reminded us, however, how important are the places that contain memories.

That border, so vulnerable, is the sustainable development goal for the future, human beings must invest to protect.

It's time to ward the memory, the cultural identity and the natural capital of these places.

Re-inhabiting, re-evaluating and rehabilitating these places could be the way to achieve a sustainable future.

In the waste era increasing by pollution and frenetic city life, many people are trying to reconcile themselves with nature rhythm, with an ancient well-being of self-production daily food.

The communities that live these places need to be included into a political-social process, they must be the subjects of planning.

The past can be the way to approach the future.

*Keywords: Natural landscape; urban landscape; identity; cultures; memory*

## **Mapping the historical memory of places**

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### **Extended abstract**

Historical memory connects a place to the people. Concerns not only the inhabitants but is part of the wider collective consciousness of an entire community. It expresses the relationship with the past, through the elements that constitute the identity of a place. Tangible and intangible elements, perceived with all the means of perception, the senses, the intellect, the emotion. Data that in order to be able to evaluate, one must first find a way to record.

Mapping is a tool for recording the elements that constitute the place. It concerns the visualization of the elements that have geography as the organizing principle and the objective depiction of geometric concepts. Also, explores the way of human perception through the senses and the understanding of the place. Regarding historical memory, mapping can record physical, social, spatial, or sensory elements - elements that can be perceived not only on a practical level but also ideological and psychological.

This presentation refers to the ways that historical memory can become a field of evaluation of the material and intangible elements that make it up, through specific cartographic approaches. Particular emphasis will be given to the elements concerning the recording of intangible data, in relation to historical memory, on the occasion of the research on the historical place of Souli ("RESEARCH OF THE HISTORIC REGION OF SOULI: PROMOTION, PROTECTION, AND DEVELOPMENT OF ITS CULTURAL LANDSCAPE", developed in collaboration of the Ministry of Culture and Sports of the Hellenic Republic, Region of Epirus, School of Architecture NTUA, 2020-2021).

Maps that created "functioned" as a communication system, captured all diverse and multifaceted data. In the same way, an image or a morphological element "satisfies" the user, using his vision, to the level that one perceives this data. without having direct experience at that particular time. The ultimate purpose of this process is to record the "messages" that a place gives, the place acquaintance and interpretation. Also, the "shaping" of the image of the dominant perception and consciousness of the society acted and acts in that place, for its historical course and heritage.

The study of the intangible and material elements that constitute the identity of a place, reflects the relationships that man develops with the place through a system of ideas and beliefs, through memories of social and cultural structures. Memories that, not only concern the past but constitute its heritage, a living reality that changes, evolves, transforms, enriches, adapts, and is passed on to the next generations.

*Keywords: historical memory, mapping, intangible data, historical place, Souli*

## **The mnemonic formation of the public space: The example of the main avenue of the city of Ioannina, Epirus, Greece**

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### **Extended abstract**

The mapping of the central avenue of the city of Ioannina, Epirus with the multitude of its sculptures (statues and monuments), starting from Heroon Polytechniou Square and ending at Mavili Square by the lake, a 2.5 km long route, highlights several ideological landmarks of the space that co-determine the mnemonic nature of the city, as it is represented in its central avenue. The 'sculptural performance' of memory articulates an extremely rich in mnemonic definitions identity, which is formed by the effect of a multitude of public landmarks that memorize selected historical moments of the past (Greek Revolution, 1st Balkan War, Contemporary History). It is a landscape of shaping the social space, which constructs a dominant collective memory and where conflicting cultural and ideological origins can coexist within the dominant hegemonic narratives of memory. Although the public monuments comprise a series of diverse episodes in terms of the flow of their deployment, they nevertheless derive their theme from national historical time, without being defined by a prescribed and premeditated plan in terms of their overall order and realization. Of course, the manifestation of history as it emerges through the social imprint of sculptural constructions is of particular interest. However, each monumental landmark, which functions as the condensation and manifestation of a specific memory or identity, when connected with others on our delimited route, constitutes a thematic core, with all public landmarks articulating the diversity of an ideological signifier which turns the discontinuous space into a memorial place.

The main artery of the city thus becomes a field of production of meanings that make evident a historicity of the urban landscape, as defined by the decoration of its monuments and hero shrines (Heroon). What we quickly perceive from this sculptural landscape is the grounded national consciousness on the horizon of the local, as the subject matter is eminently confined to the authoritarian manipulations of the national historical capital that converses at the same time with the local history. This activates familiar experiences derived from the repository of a basically homogenized national identity. Given that our monumental repository draws from local, but also national, historiography, we can realize the elements of expediency in its construction and understand the ideological realities that make up the public space.

In any case, the whole public sculptural state of memory composes a complex field of mnemonic reference since the human subject can integrate in its urban environment ethnocentric but also exogenous cultural and aesthetic narratives. At the same time, the sculptural creations themselves in turn mark a point in space, activate the mnemonic formations of the social through the manipulation of memory that they orchestrate in a complex political and social process of historicizing the identity of the urban landscape.

*Keywords: Ioannina city; public space; mnemonic identity; monumental landmarks; national historical capital; local historiography*

## **In the intimacy of the Mediterranean Sea: an eternal story of Palimpsest**

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### **Extended abstract**

The Mediterranean Sea witnessed the birth of most civilizations. Mare Nostrum "Our Sea" was the term used by the Ancient Romans. In the "Mappa Mundi" of 1280, it was represented as the Center of the World. Many cities have developed around it under different invasions and civilizations and took part in making the place. These cities had different lives throughout all these eras and carried physical traces of this accumulated past. Some kept their important positioning, some disappeared into bigger cities and others became open-air ruins with an attached tourism. But all are living witnesses in their stratum of this undeniable memory of greatness, violence and prosperity. This abstract wants to tackle the similitudes and differences of the below cities through their palimpsest.

**Beirut:** "Bayrut", "Beyrut", and "Biruta" is the capital and largest city of Lebanon with a population of 2.2 million (2014). The third-largest city in the Levant region, situated on Lebanon's Mediterranean coast. It has been inhabited for more than 5,000 years, and was one of Phoenicia's most prominent city states, making it one of the oldest cities in the world.

**Marseilles** is the second-largest city in France with a metropolitan population of 3,100,329 (2019). Founded by Greek settlers from Phocaea, Marseille is the oldest city of France, and one of Europe's oldest continuously inhabited settlements. It has been a trading port since ancient times and had a considerable commercial boom during the colonial period and the 19th century. In the 1990s, the Euroméditerranée project for economic development and urban renewal was launched bringing it to the 21<sup>st</sup> century.

**Alexandria** is the third-largest city in Egypt and the largest city on the Mediterranean. It was founded by Alexander the Great and rapidly became a major centre of Hellenic civilisation, it retained this status for almost a millennium, through the period of Roman and Byzantine rule until the Muslim conquest of Egypt. One time the largest city in the ancient world before being overtaken by Rome. During the Arab conquest of Egypt, the city was plundered and lost its significance before re-emerging in the late 18th century as a major centre of the international trading and shipping industry.

**Syracuse** is a historic city of 2,700-year-old city in Sicily. It was founded by Ancient Greek Corinthians and Teneans and became a very powerful city-state. During the Magna Graecia, it was the most important city equaling Athens in size during the fifth century BC. It became part of the Roman Republic and served as the capital of the Byzantine Empire. The city is listed by UNESCO as a World Heritage Site with a population of around 125,000 people.

**Tunis /Carthage** was the capital city of the ancient Carthaginian civilization, on what is now Tunisia. It was destroyed by the Roman Republic and then re-developed as Roman Carthage, major city in the province of Africa. The city was sacked and destroyed by Umayyad forces and used as a fort by the Muslims until the Hafsid period when it was taken by the Crusaders. In the early 20th century, it developed into a coastal suburb of Tunis. The archaeological site is a UNESCO World Heritage Site.

These cities were very important poles around the Mediterranean. It is important to look at this shared history analyzing their past, present and future.

*Keywords: Palimpsest, civilizations, wars, Rome, Greece, memory, places, contemporary world*

## **Community-Archive Project: to tell the story of Israeli periphery from the bottom up**

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### **Extended abstract**

Israel is home to several unique types of communities, including the many moshavim, kibbutzim, Bedouin towns and development towns strategically planted across the country to disperse the population, absorb new immigrants, and fuel the economy.

The Bedouin towns and development towns these days are well established and home to thousands of Israelis, and their role in the historical development of the state of Israel is recognized. Yet, their story is not told, mainly due to the absence of accessible documentation.

The objective of the Community-Archive Project is to create community archives in these towns “from the bottom up”. This will be accomplished by locating, scanning, and digitizing existing materials that document the growth of the communities, integrating them into the database of the Online Ben-Gurion Archives. As part of the Archive, the material will be made available online to the community, scholars, and the public.

Until now, public discourse and scholarly research have painted these communities, in a similarly passive light. Their natural growth and development, propelled by internal dynamics as organic communities with “bottom up” growth, has, until now, received little attention from researchers. The Community-Archive Project aims to address this gap and provide an opportunity to enrich the historical record by including the archival collections of the development towns themselves. These collections will give voice to the experience on the ground and reveal the rich history of these communities, “from the bottom up”.

Following Carlo Ginzburg’s words, we are aware that all phases through which research unfolds are constructed and not given. In this manner, constructed archive is the ground phase for any research. Hence, the fundamental challenge for this project is the authenticity of the archive.

In the past two years, due to the covid-19 pandemic, we faced a new challenge: to guide a team whom we never met in person, and to assist in archival processing through remote access. In this presentation, therefore, I will introduce this pioneering project, discuss the impact of its core challenge, the solutions we formulated especially in days of social distancing, and the significant impact this project may have on community identity and social resilience.

*Keywords: community archives; digital heritage; intangible heritage; community resilience*

## **The urban stratigraphy of the subsoil of Eleonas area as a monument of the 'Anthropocene' period in the Athenian landscape**

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### **Extended abstract**

The assessment of the urban subsoil stratigraphy, and especially of the man-made strata in the area of Eleonas, are a previously uncharted but important field for the documentation and reflection of the epistemic landscape of the city of Athens. More specifically the imprint of the 'Anthropocene' period in the evolution of the Athenian landscape can be recognized, mapped and documented in a wide area at the core of Eleonas plateau, where extensive underground construction took place in order to build the Athens Metro Line 3 train depot. The palimpsest of the recent urban deposits of Athenian strata, thoroughly documented through boreholes, slope mappings and environmental soil and water pollution records, reflect clearly and to a great spatial extent both the geomorphological as well as the socio-political conditions that generated the formation and landscaping of this region of Athens.

This detailed study of the unearthed geologic materials of the recent and older deposits at the core of Eleonas field, was examined in parallel to historical and city planning records and documents, under a neo-archaeological perspective, allowed for the recognition and classification of distinctive eras in the evolution of the city of Athens across Eleonas plateau in geological, historical and modern times.

Eleonas spatial field evolution, from a natural river plateau evolving upwards to a modern times industrial camp of nowadays, follows a gradual sequential layered path that consists of the following strata: natural sediments of Kifissos river alluvium in the valley of Eleonas at the base of the column, fertile red hard clay as the main substratum of agricultural era land - the homonymous Eleonas (olive grove) of Attica-, then passing on to a first *unconformity/rupture* between agricultural and urban use of Eleonas land, followed by subsequent man-made deposits formed by the dumping, stratification and gradual lithification of concrete and cement corresponding to the rebuilding of Athens City, and then a heavy industrial era stratum of its urban stratigraphy bearing the first traces of water and soil contamination by contemporary waste or uncontrolled landfill operations, ending to nowadays polluted city surface conditions and the notion of modern 'discarded' populations.

The subsoil of Eleonas is considered as a thorough archive that tells the full story of the composition of its landscape. The porous web, the horizontal as well as the vertical anarchy, the intertwining and interaction of the natural with the anthropogenic materials, at first naturalistic, then productive and sometimes 'guilty', the absence of legislative and state frameworks to protect a land that has always been so generous, are elements that are found registered in the underground profile of Eleonas as much as in the surface landscape.

*Keywords: Anthropocene; Athens city; Eleonas depot; soil records; palimpsest; recent history; uncontrolled development; contamination; buried memory*

# Infrastructural/Spatiotemporal Nodes and Memory, within the Long Walls Zone: oblivion VS inclusiveness towards historic landscapes

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## Extended abstract

The Long Walls zone can be approached as a palimpsest of infrastructural axes, the presence of which is rather indirectly testified in the urban fabric today, between Athens and Piraeus port. Inaugurated during classical antiquity, the zone between the Northern and Southern Long Walls was identified as the fortified corridor bonding Athens to Piraeus. Mostly parallel, along their length of 40 stadia, the Long Walls diverged before articulating with the fortifications of Athens and Piraeus. During the 19<sup>th</sup> century, the establishment of the connection between Athens -the modern Hellenic capital- and Piraeus port, was based on the Long Walls zone again: as the major transport connecting axes were founded along most of the parallel course of the Long Walls. Beyond its obvious and diachronic linking property, an investigation of the spatial characteristics of the Long Walls zone in antiquity, during recent history, and at our present day is attempted. This investigation aims to illustrate locations where the Long Wall zone's historic dimension is -or could be- revealed in a spatially expressive manner, as part of the memory of today's Athens-Piraeus metropolitan area.

The investigation methodology has been based on an experiential mapping procedure and the combination of in situ visits with archival and bibliographic inquiry. The data regarding the landscape characteristics of the Long Walls zone during classical antiquity are scarce, consisting mainly of findings documented by recent archaeological inquiries, and some philological sources. Neoteric history during the 19<sup>th</sup> and 20<sup>th</sup> century brought about significant changes as a predominantly rural area was transformed into a rapidly evolving industrial zone, the first important industrial zone of the Greek capital. Via historic aerial photographs and by in situ visits, it has been documented that the urban fabric within the larger part of the Long Walls zone, is respectful of the elongated corridor's geometry. Thus, a built characteristic of the historic urban fabric up to our present day, embeds the memory of the Long Walls position.

Older maps often depict the Long Walls' traces, and thus are safekeeping their memory. The aerial photos showcase in relative accuracy their trail, occupied by linear infrastructure which literally demarcates the urban tissue: in situ experienced as segmenting infrastructural landscapes, whilst in the aerial views they function as memory keepers. Oblivion is challenged at places where the transport infrastructure axes lead the view to features of the archaeological landscape [i.e. the Acropolis, Filopappou monument]. Among other findings, the nodes and articulations between the Long Walls zone and the surrounding rural/urban landscape reveal the relationship between built environment and the memorial character of the Long Walls zone. When inclusive, enabling one to see through the superimposed layers of the Long Walls zone's palimpsest, these articulations could be identified as '*spatiotemporal nodes*', or '*mnemonic nodes*'.

*Keywords: Long Walls zone, archaeological traces, infrastructural palimpsest, infrastructural segmentation, spatiotemporal nodes*

## **Khans in the Cypriot built environment**

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### **Extended abstract**

In today's urban environments, historical and traditional buildings – whether preserved individually or in groups – are living expressions of the cultural evolution of a place over time. They communicate the conditions of each era and society, and consequently they constitute an integral part of the cultural heritage, and memory of a place. In the Cypriot landscape, a particular type of these heritage buildings are the remaining khans (inns), which are located throughout the island, both in urban centres, and in rural areas. This specific building typology is influenced by the eastern caravanserais, and reflects the social, economic, and commercial conditions of the place during the Ottoman rule.

The choice to study this group of buildings is related to the special social and economic role they played, as well as their strategic position in the urban, and rural areas of the island. Specifically, the khans are located on the main commercial routes, and functioned as stations for commercial transactions, cultural interaction, and exchange of information. In other words, the khans incorporated various functions, since the main reason for their development was to serve the needs of traders, travellers and suppliers. They set up temporary living quarters for both humans and animals, as the latter were the main means of transportation of the time.

This research was carried out in the context of the final research graduate thesis of a postgraduate programme on Conservation from the University of Cyprus. The aim is to highlight this typology in the current built landscape, which bears the memories and habits of a 'lost world'. The study also aims at a holistic understanding of the character of the khans, and their recording mainly in the urban historical centres of the island. At the same time, their development over time and their integration into the new data of the historical centres are investigated. Special emphasis is given to the khans within the walled city of the capital (Nicosia), a city with the largest number of such buildings on the island, with rich stratigraphy and historical layers. At the same time, the research aims to identify the typological, morphological, and construction peculiarities of khans, in an effort to recognise common patterns of architectural design and spatial hierarchies. Through this study, the intangible, and tangible values of these buildings are identified. At the same time an understanding of how they are integrated over time in the changing urban fabric of the cities, while simultaneously preserving the memories of the past is achieved.

*Keywords: khans; travellers; urban fabric; intangible and tangible values, memory*

## **Riverbank Mélange to Fusion Stream: City Junkyards as Junctures**

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### **Extended Abstract**

The Pointe de la Jonction in Geneva, a city-edge condition, is explored here as an ultimate case study for agendas of urban regeneration in loci of, assumingly, ‘poor’ memory, of heritage strong and defining, yet harsh and repelling; of memory at once nonnegligible and yet insufficient to bestow urban stature. This remarkable territory, standing closely to the city center, emerges as a re-iteration of ‘mild’ brownfields; of degraded, underused zones with industrial remains, depots, and warehouses. The ‘Junction’ name precisely signifies the convergence of two rivers – one muddy, the other clear – their waters eventually fused. With respect to its unique ‘topology’, the locus can be interpreted on a symbolic level either as the city’s end, or its beginning, triggering a series of crucial questions: what does ‘planning’ for an urban conclusion, or reversely, for instigation mean? Should one conceptualize for notional deadlocks, or rather for noumenal gateways? Do we encounter here an urban backyard, or possibly a front lawn? Should such a context be expressed architecturally through outward signifiers or landmarks? and then, what may the term place-marker possibly connote here? Is it adequate to rely on iconography, or instead, could place-making, reserved or discreet – yet significant in terms of collective experience and public identity – reiterate an ‘eye-catcher’ alternative, less physical yet equally powerful? Would that announce a thesis for anti-monumentality? This reveals however not the sole series of dualities here. More than solely a “junction point” of differing yet confluent rivers, the site conjoins distinct spatial and notional entities in clear boundaries: the urban – as artificial realm and manmade environment – versus an open landscape – as direct natural expression; given that the riverbanks across remain entirely unpaved and green. And yet disjunction emerges in terms of use and function; any spatial links to the historic center showcase ruptures; the dense urban grid disappears while approaching the site, is then overtaken by looser organizational modes, maintaining poor alignments. Discontinuities are also scalar: while density is radically reduced, the urban blocks are sharply enlarged, apparently due to industrial-uses, intermodal protocols and imposed logistics, while building heights become significantly lower than neighboring residential blocks. To counter all that, strategies for the reversal of existing scalar hierarchies are employed, emphasizing the transplanting of programmatic and formal types at the macro- and micro-scale at once.

*Keywords: ‘poor’ memory; anti-monumentality; disjunction; urban juncture; scalar rupture re-fusion*

## **Memorials of Industry and Monuments of Ruination: the case of abandoned quarries**

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### **Extended abstract**

The proposed topic is an approach to the tangible and intangible architectural and aesthetic values, of an unrecorded and non-architectural segment of the Greek industrial heritage. This segment includes abandoned stone quarries and adjacent processing facilities that functioned in the beginning and middle of the last century. These facilities perish over time throughout Greece and one first goal of the research that has taken place, is to spot and record them with sketches, plans, photographs and maps, as a means of rescue. Having recorded 46 abandoned quarries in the mainland -and mostly in the regions of Peloponnese, Epirus, Thessaly and Central Greece- a map that will guide us through places of forgotten industrial heritage is created. Although the quarry spaces constitute a solid part of the industry, since they are not found inside the urban area, they are not cherished by collective consciousness nor by competent authorities. Hence, they are considered and treated as dumps, refugee and homeless shelters or -at the best case- they are simply ignored. They linger on as worthless matter, out of place and time and we find them caught up somewhere between disposal and history. One main aim is to prove that these facilities work today as concrete sacs of memory, that are directly connected with our architectural industrial heritage, human labor and the growth of the national infrastructures, as part of the country's general reconstruction plan after World War II and the Civil War. We argue that they are the modern material proof of man's timeless relationship with earth and his fundamental tool to create cultural civilization through the ages. Hence, we recognize that these facilities are associated with a very powerful notion: the conversion of the natural, of the unformed (the simple stone) to something that is socially and culturally editable and useful (a road, a railway, a building). Moreover, their ruination, offer us the opportunity to examine them as places of a rare aspect of architectural experience. Since no restoration and no new building program has taken place, we consider them as authentic ruins that stimulate an ongoing game between memory and imagination, and we become in-situ witnesses of the procedure of a construction's natural return to earth. We will examine the above through the cases of stone quarries that were used for the construction of the first railway network and the basic national road network.

*Keywords: quarry; ruin; memory; industrial*

## **A cultural mnemonic experiment: memories of Art History and of an important neoteric Didactic Approach, depicted on a contemporary school building**

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### **Extended abstract**

Our presentation is correlated to a school building, in the periphery of Athens; a school building, which unfortunately lacks identity terms of material substance. Since the teaching staff and the students could not intervene in the core of its architectural formation, they decided to project on it, elements of the memory of the world's finest painting creations. Emblematic works of art, whose value echoes eternity, were painted on a large scale on the wall of the school yard by students from first to sixth grade. Is such a project an activity of pleasant pastime? Is it, moreover an activity correlated to mnemonic references or, even more, a process of real immersion into the artistic creation of the past? When children paint Picasso's "Guernica" or Van Gogh's "Sunflowers", besides acquiring artistic skills, they may gain an immediate cultural experience, a really advanced for their age understanding of art history in an extremely direct and profound way. Narration of art history is thus transformed from external knowledge to a meditative participatory association, to a participatory deepening in the field of cultural historical evolution. If Art is associated with cultural depth, then contact with art history in our case study, may offer to the students involved, the contact with memories of cultural history in general. It may offer to them the immediate perception of the beliefs and ideological premises of social groups or societies of the past. It would be important furthermore to mention that this immediate conduct is not offered, in the project presented, to students of Greek origin solely. It is addressed as well, to youngsters from different cultural backgrounds, to refugee students from Syria and immigrants from India. Artistic activity creates the possibility for them to be correlated to the cultural environment of Western art, a field completely unknown to them. It offers to them the possibility of cultural participation to an historical past previously not existing for their own perception; it offers to them the conditions for social cohesion in a multicultural environment.

Concluding our abstract we ought to refer to the association of the project in question, with another mnemonic trace important for the history of neoteric Western education system in general. Through the previously presented process, the teachers of the school aimed to reintroduce to their didactics the memory of Friedrich Froebel, founder of the world's first Kindergarten. In the context of Froebel's didactic approach, correlation to abstract forms of depiction could introduce children to organized abstract schematized, conceptual formations. They could thus enable mental organization, abstraction and schematization on the one hand, while indicating at the same time the conditions of contact with Art as an aesthetic experience; not just a decorative process, but a process of composing sensory data and giving value to them.

*Keywords: Memories of the cultural past; art history; didactic approach; Friedrich Froebel; kindergarten.*

## **Urban Synergies in the design process; Place Identity as a catalyst for the formation of space**

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### **Extended abstract**

The paper will discuss ideas of Synergies between the Building and its Context, and their potential role in the design process. The author will examine the operative potential of context, social, physical and cultural, in revealing a place identity that can influence the design decision.

The aim of the paper is to highlight the importance of the integration of memory and locality of an urban landscape, to the design process of a building, in the micro scale. It will discuss how by applying methodologies of Mapping, complex and invisible layers of information that exist in a macro scale are exposed, allowing the architect to understand and experience the unique characteristics of that specific place and thus inform the design decisions in a micro scale.

Place will be examined as a Lived space, where social, physical and cultural Context coexist without an imposing hierarchy. Mapping of Context offers an operative potential, that can influence the design decision. Mapping is understood, not as a process of representing geographies or ideas, but as an active tool that identify, decode and create the potential of possibilities of place.

Approaching design as a process of orchestrating synergies between what already exist on site together with new intents, the authors will discuss the importance of understanding of Place both as an objective environment and a subjective interpretation in the design process.

The paper will build up the argument by discussing and comparing two competition entries design proposals where the author had the opportunity to test these research ideas.

“The Creation of The Cultural Village of Lempa”, an awarded entry, a Multi-Use Center for Art Education in Cyprus, the author will examine on how Social Mapping, Stratification of Cultural identity found in the landscape, and Cultural Topography were the main components that drove the design process.

*Keywords: place identity; mapping; design process; urban synergies; cultural topographies*

## Genius loci et temporis. Time capsules for recording memories

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### Extended abstract

The trace of humans, on the places we were occupying, has always been a violent sign. It is about the alteration of a pre-existing balance. We can say that these repairs took place in search of Beauty. Not always, indeed rarely. Of course, many and different ideas of Bello have gone through Time. But also, Places. The last century, a tiny time segment in the history of mankind, has upset the precious evidence of *differences*. The very long and slow work of time (Time spirit, *genius temporis*) is upset. Contexts and places did lead to the wealth of identities, a treasure of diversities. Urban settlements and architectural forms use to fix the material culture of places. The idea of living, and the relationship with one's own stories, plastically represented the spirit of the inhabitants, their way of relating to the forces present in the places (Place spirit, *genius loci*). Like for the Time, the constant influence of the Place is messed up too. Globalization has enormously enriched knowledge and speeded up sharing information. At the same time, globalization has eradicated the memory of different histories, with violent immediacy. Memories fixed in urban environments, in territories tamed by human presence. The prevalence of spatial models and the reduction of languages are producing new configurations at various scales. *Non-places*, which did enter the collective imagination as *Passepartout* environments, have pervasively occupied every inhabited place. The identity of the places is fading out. It is vanishing as material presence, fixed by buildings and urban environments. But above all, the identity of the places is fading away of collective memories. The challenge awaiting the next generations has many, perhaps too many, questions. What should be taken care of? Why should be looked after? How to preserve it? Among the various theses in progress, let's point out the two extreme poles within which the dialectic takes place. These are Protection and Time capsule strategies. On the one hand, there is the protection aimed at a dominant ethics, that pushed to the fetishistic preservation of the past. On the other hand, there is the choice of "samples" to be encapsulated and entrusted to transmission over time, for recording memories. The cynicism of the choice of fragments to be saved versus the hypocrisy of an impracticable conservative ethic. Probably there is no third way, unless as temporary choice and practices of compromise.

*Keywords: heritage; memories; micro-histories; preservation; time-capsule; geniusloci; geniustemporis*

## **Placing collective memory in Displaced Architecture**

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### **Extended abstract**

This paper investigates ‘places of refuge’, understanding the cultural and political need for the careful interpretation of the important role that memory plays in finding solutions for displaced populations.

‘Refugee habitats’ are becoming a norm and will be the future negotiators of urban boundaries and notions of what is just and shareable public space. A feeling of community should be established when inhabitants move from being transitory to being an ‘owner’ and a welcome ‘occupier’ of a specific piece of the city (or place). They transition from lone, to a community member and through this creation of a new urban form, they offer the greater public an opportunity to begin to forge new connections and experiences in connection to a social oriented planning process. Randall Teal argues that in order to discover the richness of ‘*place*’ through architecture, the designer must engage with the specificities of culture, location, and experience that make up everyday existence (Teal, 2008). This is furthered by Doreen Massey who sees “*space not as a site but as an event*” (Massey, 1994).

The research presented in this paper seeks to find the relation between memory, space and future proposed design for integration. The paper seeks to answer how refugees, when relocating, can possibly (re)find themselves in either a natural landscape or human build environment that they can identify themselves within, to evoke memories of where they came from and simultaneously begin to adapt into this new environment using memory as a tool for successful integration.

If we, as a society, begin to embrace collective memory as a celebration of our differences, both found in the ‘incoming’ group as well as within the ‘welcoming’ population, then we can all flourish and find solutions.

The paper will strive to propose ways in which architecture can work as the mediator to transition displaced persons into an urban environment and help develop long-term sustainable inclusion, while maintaining the cultural identity of both the existing and incoming community. Through this new design dynamic, the different actors and roles involved in the creation of this new community begin a future forward dialogue, both in architectural/urban design and social terms.

*Keywords: collective memory; long-term sustainable inclusion; places of refuge; refugee habitats*



## **INNOVATIVE URBAN PLANNING APPROACHES**



**Changing Cities V, Corfu, 20-25 June 2022**

**Organized and chaired by Prof. Konstantinos Serraios**

**Prof. Konstantinos Serraios, School of Architecture, National Technical University Athens**



## **Sparta | Greece. A historic city in transition. Planning attempts from the 19th to the 21st century**

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### **Extended Abstract**

Subject of this presentation is “Sparta”, a historical outstanding, though medium-sized, Greek city. It concerns the city’s course from the planning attempts of the neoclassical period at the end of the 19th century, to the new modern urban planning challenges.

Sparta is located on the bank of the river Evrotas, in a plain defined by Mount Taygetos, and the mountain range of Parnon. Recently it celebrated the anniversary of 2500 years (= 480 BC + 2020) from the battle of Thermopylae, as well as from the naval battle of Salamis, in which the fleet admiral of all Greek naval forces was Evryviadis from Sparta.

In the historical and political context of the reorganization of the modern Greek state after the Revolution of 1821, the first Urban Plan for the city was prepared by the Bavarian Geometer Friedrich Stauffert, including an area equal to about 6 ha. Neoclassicism, the implementation of the Hippodameian System, and the relation with antiquity, were the three main influences and urban design principles.

The historical past of Sparta, the proximity to important archeological sites as well as its diverse and challenging natural environment, make the today’s city an attractive urban pole, which has emerged as a major administrative, commercial, economic, and social center for its Region.

On its way to the 21st century, Sparta needs a vision for a world-class, modern, intelligent, productive, environmentally sound, resilient, and vibrant city. This vision, in terms of urban planning, should propose an integrated strategy, for central Sparta and its wider hinterland, that would emphasize, balanced spatial development, sustainable mobility, environmental resilience, and urban regeneration.

*Keywords: historic city; natural environment; urban vision; spatial strategy*

# Colouring Athens - A Crowdsourcing Platform for the Collection of Data on Athens' Building Stock

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## Extended abstract

This paper reports on the development of Colouring Athens, a crowdsourcing platform designed to collect, display and make accessible data for each building in Athens. Colouring Athens allows public to input, validate and download information about the buildings of the city based on specific attributes designed upon research, such as the age of the building, its morphology, use, construction system, height, heritage status, the condition of the public realm that surrounds it, its popularity and others. Both the data and the code of Colouring Athens will be open and available under an Open Data Commons Open Database License (ODbL) and a GNU General Public License.

The building stock is a city's largest physical asset and one of its most significant socioeconomic resources. The availability of comprehensive information on the composition, operation and dynamic behavior of building stocks is fundamental in order to address critical issues such as the improvement of their quality, sustainability and resilience and the effective design and programming of cities. However, few systematised digital data are available for the building stock of the city of Athens and other Greek cities. In this context, Colouring Athens aims to contribute substantially in addressing a number of issues that concern Greek cities, such as the maintenance and reuse of buildings, their environmental and structural upgrade, the protection of cultural heritage and the identification of areas for regeneration. The platform is designed as a pilot that could be easily applied to other Greek cities.

The paper presents the initial phases of the Colouring Athens project, that include the design and beta testing that will lead to the full launch of the platform. The platform is developed by the Urban Planning Research Lab of the School of Architecture of the National Technical University of Athens and the Geochoros Geospatial Analysis and GIS Research Group of the School of Rural, Surveying and Geoinformatics Engineering of the National Technical University of Athens. It is funded by the Athens Development and Destination Agency. Colouring Athens code is developed based on the open Colouring Cities code that was initially developed for the city of London. Colouring Athens is part of the international Colouring Cities Research Programme set up at The Alan Turing Institute, the United Kingdom's national institute for data science and artificial intelligence, in order to support international research institutions wishing to reproduce and co-work on Colouring Cities code at city or country level.

*Keywords: crowdsourcing; participatory mapping; open data; building attributes; Athens*

# Development of a multicriteria decision making system for the evaluation of the cultural assets of a place

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## Extended abstract

Culture is an ongoing process that leaves significant traces without affecting the progress of communities and their futures. Cultural heritage is the inherited culture that communities tend to preserve in order to transfer knowledge to future generations. The most understandable separation of culture is the tangible and intangible cultural assets. Tangible assets are all dimensional, as intangible forms are non-dimensional. Tangible cultural assets concern material assets, such as buildings, monuments etc., as intangible cultural heritage refers to: “*practices, representations, expressions, knowledge and techniques*”. The proposed article attempts to broaden the current knowledge about decision-making multicriteria systems and especially multicriteria systems in cultural heritage, as it sheds new light on multicriteria decision-making systems, through the proposal of a new open access multicriteria evaluation based on a decision-making method. As the literature shows, previous studies failed to address a holistic approach in multicriteria evaluation of cultural assets of a place. In this point of view the aim is the development of an innovative decision-making method which evaluates the cultural significance of the cultural assets of a place. In this framework, other criteria—such as social or even environmental criteria—are excluded. The main body of the research project is organized into two sections: recording and evaluation. This describes a new approach towards the development of an innovative solution to the recording and evaluation of the cultural assets of a place by setting the appropriate evaluation criteria related to cultural significance. After an extended literature review, the paper proceeds to the construction of the multicriteria decision-making system and provides the framework for a new way to classify and rank the cultural assets of a place by their cultural significance. In the end, it creates a new open-source software, which can be constantly fed back with new intangible and tangible cultural assets.

*Keywords: heritage, tangible and intangible cultural assets, multicriteria system, MAUT*

## A proposal for a spatial strategy methodology. The Vamvakou case

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### Extended abstract

This proposal is based on the Research Project entitled: '*Urban/spatial support of the Vamvakou revitalization program. The formulation of a spatial strategy*', conducted by the Urban Planning Research Laboratory of the School of Architecture NTUA on behalf of the Social Cooperative for Collective/Productive Purposes (SCCP) 'VamvakouRevival'. The scope refers both to the reactivation of the settlement, attractive to permanent residents and ensuring modern living conditions, and to the development of a spatial strategy according to the specific vision of self-sufficiency, extroversion and active participation based on a socialcooperative economy.

Vamvakou is a mountain settlement, located at an altitude of over 800 meters on the west side of Mount Paronass, northwest of the municipality of Sparta in Laconia. It was built around the 15<sup>th</sup> century in connection with the river Oinountas and has 88 inhabitants according to the 2011 census. The article analyzes the *three phases of the spatial strategy methodology*. The proposal of a spatial strategy is the optimal combination – that is, the best and most acceptable in terms of urban planning, socially useful and environmentally sustainable- of compatible proposals from the different sectors.

*First of all*, a set of specific thematic axes was defined, on the one hand, general in nature and for which proposals should be made, and on the other hand specialized and focused on the particular characteristics of each sector. This resulted in the ten thematic axes for which mild and interventional measures were proposed.

*In the second phase*, alternative proposals were formulated for each of the above areas. By *alternatives* was meant a set of proposals covering as broad a spectrum as possible, from the most conservative to the most radical. The alternative proposals ranged from general to very specific, depending on the sector.

*The third phase*, explored possible '*communication channels*' between the different alternative proposals formulated above for the different sectors forming '*alternative scenarios*' for future development. These alternative spatial scenarios had three main axes; production, human resources and innovation – technology, and combined the actions analyzed in the first two phases, with a time horizon of five years.

Finally, these scenarios were presented during a consultation process involving the SCCP, researchers, local government representatives, residents and businesses. The viewpoints and positions presented during the consultation process covered a wide range of topics, including agriculture, food, tourism, culture, manufacturing, educational programs, connectivity, infrastructure, building renovation, etc. These categories, along with the more specific actions they encompass, form an overall spatial strategy with great impact for the Vamvakou.

*Keywords: spatial strategy; methodology; revival; alternative proposals; Vamvakou*

## **Control of off-plan development through access roads: from “roadless mountains” to “roadless areas”**

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### **Extended abstract**

For the past 50 years or so, an issue of great concern for town planners – as well as politicians - is off-plan management. Given that, the coverage of urbanized space in Greece, is very low (even lower than 20% which is considered to be the area covered by first level urban planning), it has become clear that until the whole country is covered by land use plans, the ban of off-plan construction is a utopian scenario.

The most feasible alternative, it is argued, is a proper off-plan management in order to rationalize and reduce building development in areas without land use plans. The case law, developed over the past 10 years by the Council of State, has contributed much to this direction. Unfortunately, the State, has not yet been able to exploit the opportunities given by case law to protect the suburban environment and the countryside until the completion of planning.

The present work discusses the above given opportunity to control off-plan development, through the network of access roads instead of the sizes and characteristics of the plots, applied by the State to date. The recent initiative taken by the Ministry of the Environment, to enact six "roadless mountains", should be expanded in wider areas, it is suggested, to protect forest as well as agricultural land from the scattered construction without rules. The legal framework exists, and the Council of State supports this direction. Otherwise, until the completion of the urban planning of the country, huge areas will continue to environmentally degrade, aesthetically damaged and sustainably destroyed.

Although several special studies are planned, to be completed relatively quickly with funding by the Recovery and Resilience Fund, to identify legally existing roads providing the ability to build off-plan, this approach does not seem sufficient to address the issue. Some case studies are presented to show the size and depth of the problem, from which a question clearly arises: should we go directly from the “roadless mountains” to the “roadless areas”?

*Keywords: off plan management; spatial planning; planning legislation; access roads; roadless areas*

# The role of metropolitan spatial planning in adopting SDGs in Greece

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## Extended abstract

The concept of sustainability broadened the "traditional" economic perspective of development, complementing it with environmental, social and intergenerational aspects. The UN 2030 Agenda for Sustainable Development (2015) identifies 17 Sustainable Development Goals (SDGs) that aim to address, in a dynamic and operational manner, contemporary economic, social and environmental challenges. It constitutes a global and far-reaching action plan for the transition towards a more sustainable and resilient development model. The goals are structured in five main pillars and it is proposed that they be adopted by both developed and developing countries.

The Voluntary National Review (VNR) for Greece, issued in July 2018, includes the eight (8) National Priorities which specialize the SDGs and reflect the needs of the country, as well as the analysis of the necessary institutional changes and the mapping of existing policies and instruments available to implement the SDGs. Spatial planning, having adopted sustainable development as its main objective in recent decades, is emerging as a tool that promotes governance and policy coherence.

This paper attempts to determine the role of strategic spatial planning in the adoption of SDGs by Greece and the possible conditions for their operationally effective integration. It focuses on the recording and evaluation of relevant policies that are formed at the metropolitan level, considering also the connection with the strategies promoted on the local level through integrated tools for urban interventions. More specifically, the paper examines the new Athens Master Plan (AMP, 2014), known as the Regulatory (or Strategic) Plan of Athens, the country's leading center in terms of population and economy, and the Plan of Integrated Urban Interventions (PIUI, 2015), covering the centre of the Athens municipality. The PIUI constitutes a tool for urban interventions promoting integrated urban planning strategies in cities that present critical and complex issues of development lag, social and economic cohesion, environmental degradation and quality of life. PIUI is a spatial development strategy guided by an action plan, within the framework of national and regional spatial planning.

The research aims at identifying the policies included in metropolitan planning and cover SDGs goals. The methodology consists of a two-step approach recording: (a) the SDGs goals and targets that are directly or indirectly related to strategic spatial planning at the metropolitan level (AMP) and (b) the potential of integrating certain goals / targets in local strategies (PIUI). The conclusions aspire to contribute to the discussion regarding the new innovative framework that is moved forward by the SDGs and to give visibility to the potential role of the Greek spatial planning in making cities resilient and sustainable.

*Keywords: sustainable development goals; spatial planning; integrated urban interventions; metropolitan areas; Athens*

# Investigating the Role of Spatial Resilience in the Light of Climate Change: An Innovative Approach for Coastal Cities

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## Extended Abstract

Climate change is widely acknowledged as one of humanity's most critical challenges. To enhance the adaptation of its Members-States to climate change in 2013, the EU adopted a strategy on adaptation to climate change that was revised in February 2021. This new strategy sets out how the EU can adapt to the expected impacts of climate change and become climate resilient by 2050. The European Parliament has declared a climate emergency while the European Council characterised climate change as "an existential threat".

The Greek National Adaptation Strategy (NAS) was adopted in mid-2016 (L. 4414/2016). It has a 10-year time horizon and outlines broad policy directions and adaptation actions in vulnerable sectors. The main objectives of the NAS are to estimate the immediate and long-term expected impacts of climate change on the Greek territory based on vulnerability assessment analysis; identify the priority areas that need climate change adaptation measures to be taken; outline the measures requiring legislation to ensure the adaptation to climate change is effective. These objectives are thoroughly analysed through the Regional Adaptation Action Plans (RAAPs).

Spatial resilience is the ability of a territorial system to bounce back to desired functions aftershocks and disturbances to improve its adaptive capacity intending to evolve all its material and immaterial components toward a new territorial system's organisation. Spatial resilience acquires a different content for each city as each urban system has complex and often unique characteristics. A resilient city holistically addresses challenges, pursues flexible and adaptive policies, enables participation in decision-making in all social actors and has resources to address pressures.

Close to 50% of the world's population lives within 200 km of a coastline, with projections suggesting this figure will rise to 70% by 2025. Because of the high value of natural and socio-economic assets threatened or lost in coastal cities, it is crucial to identify the types and magnitude of problems related to climate change. Knowledge of the vulnerability of coastal cities against the impacts of climate change enables scientists and policymakers to anticipate impacts that could emerge from rising sea levels, floods, erosion, and other hazards related to climate change. This helps with prioritising measures to minimise risks and mitigate their impacts.

This paper proposes a four-staged framework to enhance the resilience of medium-sized coastal Greek cities against the effects of climate change.

The main pillars of the proposed framework are (i) the development of a policy framework that will be characterised by flexibility and adaptability; (ii) the examination of international best practices to identify the best practices and smart spatial planning tools that can contribute to enhancing the resilience of Greek coastal cities; (iii) the formulation of policies that will effectively enhance the resilience of medium-sized Greek coastal cities, in the context of a participatory and evidenced-based process; (iv) the development of actions for vulnerable areas or areas with unique characteristics (cultural heritage, rare biodiversity) that needs to be protected at all costs.

*Keywords: climate change; adaptation; urban resilience; spatial planning.*

## A methodological approach for developing institutionalized integrated sustainable energy and climate action plans: The 2ISECAP project

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### Extended abstract

Planning for energy transition is an interdisciplinary and urgent issue, requiring the integration of the energy theme into the everyday work of public administration (spatial planning, transport policies, waste management, human health etc.) and respect to local physical and socioeconomic landscape characteristics and needs. Doing so requires not only an integrated approach, but also a participatory and multilevel governing process. Effective and efficient planning for the energy transition, thus, can greatly benefit from allowing an open and creative process of confronting formal decision-making with the places, stakeholders and communities they aim to affect or activate. The creation of an institutional environment (i.e. a governance structure) that can combine the democratic legitimacy and legal power of formal plans and policies with the creativity, energy and social capacity of (bottom-up) initiatives, entrepreneurship and community involvement will definitely add great value to the energy transition and ensure its success.

The objective of this paper is to present a methodological approach for developing institutionalized integrated sustainable energy and climate action plans that has been developed within the framework of the 2ISECAP project, funded by HORIZON2020 (duration: 09/2021-08/2024). The project aims to bridge the gap between local sustainable energy planning and implementation by supporting the capacity building of public authorities and by developing interface capacities within public authorities to engage with civil society towards energy transition. 2ISECAP utilizes the Living Lab (LL) concept to activate participants to co-create knowledge, energy plans and future policies. LLs can be considered as innovation intermediaries to facilitate the institutional capacity building and collaboration between stakeholders and the co-creation of solutions. The project will provide experiential learning to 6 European Municipalities, by applying the 2ISECAP approach to revise/develop their Sustainable Energy Climate Action Plans (SECAPs) within a LL environment, with the explicit intention to progressively develop a more formalized governance tool. Additionally, it will support them to assess their capacity to be involved in the 100 Climate-Neutral Cities by 2030 initiative and to co-create and apply for a Climate City Contract.

The proposed Integrated SECAPs planning approach seeks to add value, on the one hand, to the decision-making process by supporting the development of sustainable relationships between actors through engagement and trust creation, and on the other, to the plan itself by increasing its feasibility.

*Keywords: institutionalized integrated energy planning; SECAPs; living labs; participatory governance; urban policies*

# Methodological challenges in designing policies for human protection from natural hazards in urban historic monuments: The case of the Acropolis of Athens

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## Extended Abstract

When a natural hazard strikes, human protection is always a challenge; even more so in unique places of high population concentration such as world heritage sites within urban centers. In 1987, Acropolis of Athens was designated as a “World Heritage Site” by UNESCO due to its cultural value, reminding us of being the most significant archeological site of Greece and one of the most significant worldwide.

The whole complex is situated on a steep hill in the center of the city of Athens and covers an area of 0.03 km<sup>2</sup>. The site has been exposed to various meteorological (2013 flood; 2007, 2012, 2021 heat wave; 2021 snowfall) and geodynamic (1981, 1999 earthquake) hazards. From the perspective of climate change, the regional climate models suggest that the city of Athens (among others) will experience greater pressure than the rural areas due to substantial changes in most climate indicators (e.g. frequency of heatwaves, average temperature) in the upcoming decades (Kartalis et al., 2021). Furthermore, visitation (number of visitors/2hours) of the archeological site has steadily been increasing since 2000. As an indication, the total number of visitors amounted to 3.6 million people in 2019 (125% increase since 2010) while the maximum visitation reached 5,500 visitors/2h in the summer months in the same period.

In this context, protection of visitors becomes a demanding multi-facet issue. How to increase visitors and staff's capacity to respond to an emergency of natural or anthropogenic origin? Are standard emergency plans appropriate for this unique and dynamic environment? How to enforce required procedures and constraints without compromising visitors' satisfaction and visitation? What new infrastructure is vital for security and protection and how to minimize its intrusion to the monument? How to best tackle risk governance involving a range of diverse stakeholders? Given the hazard, how to best alter exposure, vulnerability and capacity towards disaster risk reduction while maintaining the values and goals associated with the character of this unique site?

The objective of this article is to shed light on methodological challenges identified in the course of (re)development of an emergency plan of the Acropolis archeological site, including an evacuation plan. Emergency planning was examined in relation to both disaster risk reduction and routine incidents and accidents taking place regardless of the occurrence of a natural hazard. In this regard, it focuses on the most dynamic parameters of disaster risk assessment (human exposure, place vulnerability). Finally, we propose policies for human protection related to exposure and vulnerability reduction (e.g. regulation of visitation and ticket policies, infrastructure for safety), emergency management measures (preparedness guidelines including training of the staff and other stakeholders, early warning), and governance.

*Keywords: Athens Acropolis; archeological site; emergency plan; human exposure; vulnerability; evacuation, urban center*

## Memory and cultural heritage as drivers for spatial design

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### Extended abstract

Nineteen-century urbanization in Greece, the devastating upsets - such as world wars and heavy migration flows - of the twentieth century as well as climate change more recently, brought forth as strongly as never before the collective urge for preserving memory, cultural heritage and an emerging sense of identity. Loss as a result of history, social development or natural disaster, accentuates the meaning of memory and cultural heritage; such loss establishes a significant cultural and collective subtext within the framework of spatial design and planning.

This paper discusses place as container and incubator of collective memory and cultural heritage. It focuses on research projects conducted within the NTUA Laboratory of Urban Research during the past two years, presenting the role of memory and cultural heritage as drivers for spatial design: the revival study for the village Vamvakou in the Peloponnese the Special Spatial Plan for Mati, Attica Considering the spatial dimensions of civil protection in urban planning and the study for the historic city of Sparta investigating the plan for contemporary Sparta.

In the case of Sparta, the transition of its historic urbanity from the 19th to the 21st century assumes a formal and normative role. The nineteen-century town is being built according to the plan of German surveyor Friedrich Stauffert introducing the tenets and the prestigious status of neoclassicism to the Greek city. Neoclassicism by definition fixes its gaze to the classical past, in Sparta's case to its glorious antiquity. The proposal for modern Sparta draws from these two layers of the past in order to establish the drivers for urban qualities and analogies which convey the city's rich history.

Vamvakou, a once lively rural community which has been home to numerous families of great Greek patriots such as Stavros Niarchos, today is endangered by desertion. A proposal for a spatial strategy that revives the spirit of place while it allows new technologies to redefine the existing network of uses is being presented.

Mati, a municipality along the coastline south of Athens, was the subject of a Special Spatial Plan after the area had been devastated by deadly wildfires in 2018 claiming the life of 103 people. Ever since the community is seeking to heal. A plan is proposed for the desolate remainders and public spaces in Mati which provides that a memorial site dedicated to the fire is created in order to facilitate collective memory and open the path to recovery.

*Keywords: heritage; collective memory; city*

## **Working with communities. Promoting SDGs in design and planning workshops**

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### **Extended abstract**

During the last decade, the Urbanism group at the Department of Architecture at Frederick University (in association with our research centre - UPDU) organised seven (7) independent workshops with students from European and Mediterranean universities dealing with challenging design and planning issues associated with Cities and Communities in Cyprus. The main aim of all the workshops was to promote and explore the nature of sustainable planning and design in the specific environmental and logistical context of the Eastern Mediterranean. There was no initial intention to associate or structure under an umbrella all of these events, except to align them with the general aim of our Department to inform and promote the local debate around environmental, sustainable design and planning issues. A parallel underlined objective was to highlight the importance of the 'client involvement' (varied from local communities to generic purposely 'designed' user profiles) in an attempt to explore the role of the 'stakeholder' in the shaping, quality and upgraded role of sustainability in the formulation of spatial strategies. This inevitably implied the engagement of students/tutors' teams with the 'local' (people and place) in a direct, meaningful and informed way, which was an integrated part of the workshop formulation. One other inevitable output were extensive and very interesting discussions between the international group of colleagues involved, on pedagogical tools associated with the exploration of open-ended design processes, (outside the relatively linear and often restrictive academic curriculum of architectural studies) and in a context where 'framing the question' is central to a creative response. A direct output of all workshops and follow up research undertaken by our unit during the last two years, was inevitably the intention to inform revisions of our design and planning curricula within the context of UN SDG goals.

The aim of the paper is to discuss and evaluate the aims and the results of the seven workshops in terms of the structured tools and knowledge explored at the time and their relevance to exploring communication mechanisms and the teaching of sustainable design.

*Keywords: design workshops, stakeholder, UN SDG Goals, studio pedagogical tools*

# Built-up area, population density and carrying capacity estimation: A new methodological approach

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## Extended abstract

The modern economic development leads to constant urban expansion at a very fast pace, having as a main characteristic the diffuse sprawl of urban activities in the urban areas. From the point of view of the sustainable development, the phenomenon of urban sprawl is frowned upon, considering it causes major problems, in various ways, on both the natural environment and the natural resources (A. Giannakou, 2004). In the city and general urban environment, a series of uses and activities are developed in organized areas which are interconnected through functional transport networks/infrastructures, that reflect more or less negatively on the environment and the quality of life of the population. Both the national legislation and the policy guidelines at European level, after taking into account the fast-spreading phenomena of recent years due to the climate crisis, encourage the re-planning of cities in order for them to evolve into smart and resilient cities that can rightly respond to the demands of the sustainability goals (EUROPEAN COMMISSION, 2017, UN 17 SDGs).

For the re-planning of cities so that they can become more resilient and ‘smarter’ in order to achieve sustainable development, a critical factor is thought to be the accurate – as sound as possible – definition of the major components that affect the planning, such as actual data concerning the population, the structuring, the infrastructure networks etc. (P. Voulellis, 2020). For this exploration, it is a fact that a quantity of data is available, through the existing information technologies which, amongst others, include information for both the urban environment and the technical infrastructures (A. Lurev, 2020). The selection of the most trustworthy data and the means of calculating the critical parameters for the re-planning, on a spatial level of Municipality/city, is a very hard process for the sole reason that even today deficiencies exist up-to-date and official data/elements and the spatial planning, mainly where it concerns the critical factors of population and structuring, ends up being applied through estimations of data that age back to five or ten years, therefore limiting the reliability and accuracy in the approximation of the re-planning goals and the sustainable development.

In the current study, a new methodological approach for determining populace quantities and the structuring in a spatial system is presented, which was explored in extent within the framework of the finished study ‘Tourism Carrying Capacity of the Municipality of Santorini Island’. This approach could be utilized for the preparation of Local or Special Urban Plans, for the best and most accurate specification not only of the “planning” population and population in the high season but also of the existing structuring/capacity, as well as the existing, allowed and remaining structuring/capacity, according to the applicable requirements and regulations of each area.

*Keywords: urban planning, population peak/planning, structuring/capacity, Sustainable Development.*

# Environmental planning directions in peri-urban residential areas and scattered settlements vulnerable to forest fires

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## Extended abstract

Wildfires in the wildland-urban interface are a new problem that has gradually emerged from the 1980s as a specific problem of great importance, in almost all fire-affected areas of the developed world. In our country, the socio-economic and the gradual degradation and rarity of space in large urban areas, direct the residential pressures mainly to the peri-urban and coastal forests as well as the tourist areas, gradually transforming extended areas into a continuously changing mosaic. Holiday settlements, often illegally built-in or in contact with forests, are distinguished by low to medium quality housing construction with several flammable materials and many weaknesses in relatively small space. The wild vegetation is often in contact with the houses and the road network which is usually inadequate. In addition, residents, who in many cases have become permanent in these areas, have little awareness of the risk of fire and lack of knowledge on the prevention and response. A similar problem of settlement security against forest fires is faced by other areas where there are scattered settlements in forests, mainly in the coastal, hilly and / or low mountainous zone. The vegetation in these areas belongs to the thermo-Mediterranean formations of the Eastern Mediterranean which are very flammable. These forests are usually characterized by fragmented management, and this results in the accumulation of forest fuel in combination with insufficient fire prevention infrastructure. In both cases, the conditions greatly increase the risk of a fire mainly from anthropogenic activities which are very difficult to deal with by the fire brigades and can cause losses of life, but also can lead to destruction, not only to forests but in property and infrastructure. Typical examples are the fires of 2007, when many residents of settlements were burned, mainly in the Peloponnese and Evia, the fire in 2018 in Mati (in Attica) in which 102 people lost their lives and the big fire of 2021 in North Evia that highlighted the problem of the safety of settlements from forest fires.

In order to plan interventions mainly for the fire protection of these areas, the planning in the light of a complex of forest-settlements as a whole should be reconsidered and the measures that will be designed should aim at the protection of this complex. Also, the reduction of the fire risk is achieved by creating zones where the forest fuel has been cleaned and by strengthening the way of preventing and addressing with the fire. Finally, it is important that the settlements located in forest areas are treated different in relation to the plain forest area. Consequently, this method of handling will be more effective in fire suppression in such areas.

*Keywords: wildfires; wildland-urban interface; forest fire prevention; settlement prevention planning urban resilience*

## Acting as a Healthy City

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### Extended abstract

Could any city be “healthy” by just only its acting? To answer this question we have to define what type of city is originally “healthy”. According to the Copenhagen Consensus of Mayors, Healthy Cities foster health and well-being through governance, empowerment and participation, creating urban places for equity and community prosperity, and investing in people for a peaceful planet. A Healthy City commits to leading with the social, physical, cultural environments aligned to create a place that is actively inclusive and non-exploitative and facilitates the pursuit of health and well-being for all <sup>(1)</sup>.

The Healthy Cities (HC) URBACT III network<sup>(2)</sup> aims to lead its members on how to be healthier. But which are the policies that the project applies?

Firstly, the network has a representative composition regarding partner cities: located across Europe, with different geographical, population and cultural features. It includes small cities along with big ones, Mediterranean cities along with Northern ones.

Secondly, the Strategic Planning: The Integrated Action Plan (IAP) includes the URBACT state-of-the-art methodology, which is common for the partner cities, but it has the flexibility to fit with each city needs, because it is produced by the cities, with the critical contribution of the URBACT Local Groups (ULGs).

The HC network didn't stop there. It has introduced and leveraged with IAP two critical methods.

- The Health Impact Assessment (HIA), a research method - scientific study, regarding the impact of the Urban Planning to the public health. There are different scales of an HIA scoping and planning depth. Each city is free to choose. The main sectors in which our HC network focuses are sustainable mobility, greening, obesity combat and mental health, but they are not exclusive.

- The HIA needs a methodological tool for applying, which has to be not only scientific evidence based, but also adaptable and easy-to-use, in order to be useful for the urban planners and the policy makers.

For this purpose, our network needed to find or create the most suitable one. As a result, it achieved to create the “Healthy Cities Generator” (HCG), an innovative tool which complies all the above mentioned features and advantages.

HCG offers a qualitative analysis with numerical indexes, for inclusion to the HIA, the main component of which is a matrix of Urban Determinants crossed with Health Indicators.

This study has an “input – output” relation with the IAP. For this reason, the two studies are developing in parallel. The more accurate HIA, the more effective IAP. Additionally, the ULG's contribution increase the feasibility of the planning.

Small scale actions of the partner cities, which are included in this methodology, play the role of the demonstrative mini-projects, applied in the framework of a “test-bed” or a “living lab”. Last but not least, the HC network has a specific logo, in variants according the name of each city (e.g. “Healthy Farkadona”), which is an excellent opportunity for city branding. The notion of being healthy, could increase attractiveness both for the places and their products.

*Keywords: healthy; city; urban; impact; assessment; indicators; determinants; generator; integrated; plan*

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## **Blockchain and urban planning law**

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### **Extended abstract**

Blockchain technology has made a dynamic impact in areas such as the energy market, investment, supply chain management, reliable and unalterable record keeping in the public sector e. g. land registry, data management in education and health. The reason for that is that the blockchain is immutable, transparent, decentralised and provides equality to all participants. The question that arises is how blockchain will find its way into the consultation and voting processes in the preparation of local urban planning and the corresponding strategic environmental impact assessment.

*Keywords: blockchain; participatory planning; environmental law*

# **Redefining 21st century's planning through soil and culture: The case-study of the historic Greek city of Sparta**

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## **Extended abstract**

Nowadays, urban planning at municipal level follows a typical and complicated procedure formed by specific rules, standards and specifications. According to this procedure, planning is to be harmonized with general and special directives, and planners are to collect and study a plethora of data in order to form and propose such a plan. Although the above-mentioned procedure ensures the implementation of specific principals, including the protection of natural habitat and cultural heritage, however, ideas concerning the relationship between people and nature/soil, as well as the relationship between city and landscape/culture may remain undiscovered. It is crucial for the planning to examine such factors and finally redefine the typical planning methods through challenges and vision, a method which could be characterised as “innovative”, taking into account the definition of this term in common dictionaries.

The case study of the proposed paper/presentation refers to the historic Greek city of Sparta and the proposed strategic plan according to the aforementioned goals. The city of Sparta is surrounded by natural and rural landscape of significant value, as it is located next to the bank of river Evrotas between mountains Taygetos and Parnonas. The first urban plan was drawn up by Friedrich Stauffert in 1834 and was characterized by two wide vertical axes. The first axis (Lykourgoustr.) was orientated in order to offer perspective to both mountains, while the second one (Paleologou str.) was meant to connect the new palace with ancient Acropolis, namely the current authority to the glorious ancient past of Sparta. The team of Urban Planning Research Lab (NTUA), during their collaboration with Region of Peloponnese and Municipality of Sparta, researched the historic, cultural and natural features which contributed to the creation of the city or were part of the initial plan and, today, may remain “hidden potential” of the city. The pluralistic research led to the proposal of an integrated spatial strategy, which puts emphasis on the highlighting of historical and environmental elements. The purpose of the proposed presentation is to present not only the final strategic proposal, but also the procedure and methodology which were followed.

Finally, the aforementioned approach aims to contribute to the dialogue over the roots of planning and re-examine 21st century's planning through soil, culture and other challenges that are observed in local, regional, national and global level.

*Keywords; Sparta, strategic planning, innovative urban planning approach*

# Cycling in Athens in light of the institutionalized standards for cycling infrastructure planning

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## Extended abstract

Modern cities are on the spotlight of the increased motorized traffic usage. Indeed, cities face various challenges with communicating urgent sustainability problems to transportation infrastructure and services. Thus, it is of paramount importance to promote integrated and more sustainable planning strategies that consider the social aspects of mobility within the formal planning process. ‘Sustainable Urban Mobility’ plays an essential role for: a) the encouragement of active mobility, b) the reduction of travel speeds, c) the enhancement of road environment in qualitative-aesthetic terms and d) the provision of suitable mobility conditions for vulnerable road users (pedestrians, cyclists, disabled etc.).

This research paper focuses on cycling infrastructure across Greek cities. The reason why this topic is crucial is related to the fact that although bicycle is treated as an equal option to the auto-mobile, with the same or even more freedoms for its movement in European cities, in Greece it was only lately added to the public urban discourse as a decent alternative to cars and a fair supplement to walking and public transportation. The Ministry of Transportation, back in 2016, has issued the first specifications for configuring bicycle infrastructure in Greek streets so that the people to be safe when they make use of cycling infrastructure. Six years later, the discussion continues to focus on how these design standards will manage to ‘fit’ the bicycle within the saturated Greek streets.

This paper aims to critically explore the issued standards and correlate them to the current situation of street environment in Greek cities. To gain this goal, various cities for which a Sustainable Urban Mobility Plan (SUMP) has been implemented were selected as case studies. Problems and main issues derived during the design process are commented. Moreover, critique is applied by giving attention to the goals of the specifications as well as to the results of the implementation of such an infrastructure. Finally, difficulties of introducing cycling in Greek car-centric communities and how ‘strict’ and not adaptable and dynamic regulations could additionally cease its development are explained.

*Keywords: cycling infrastructure; design standards; assessment; case studies; SUMP.*

## Reconsidering sustainable mobility patterns in urban business clusters' planning: Kifisias Avenue, Athens

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### Extended abstract

Nowadays it is rather common for urban planning policies to be based on clustering practice. Indeed, local authorities as well as private bodies support the formation of various-types of clusters by reconstructing or even reforming neighborhoods in order for a symbolic landscape, status and capital to be created. At the same time, there are places developed on an organic way that function as clusters. Such urban areas can be found in Athens, Greece; they are mainly located along main street-axes. A typical example is the one of the 'informal' business cluster located along Kifisias Avenue.

Taking into account that sustainable urban mobility measures are also applied in many cities worldwide, a question is raised: how can sustainable mobility patterns enhance business clustering practice? By focusing on Kifisias Avenue as a linear business cluster, the goal of this paper is to elaborate on smart and sustainable mobility measures for strengthening its entrepreneurial identity and increasing its attractiveness. To accomplish this goal, critical problems confining citizens' mobility and access to various enterprises are identified and are properly dealt with stressing the importance of sustainable mobility in relevant business planning endeavors. By studying a series of variables (land uses, traffic loads, design qualities and environmental affordances), an assessment of the current state of the route is made in order for a sustainable mobility proposal to be provided.

It should be noticed that our proposal is selected by a pool of three hierarchical scenarios whose formulation was based on applying mild, cheap and easy applicable solutions as well as 'smart interventions'. To deal with this objective, some typical examples were selected to be studied as case studies. All scenarios were evaluated through the use of multicriteria analysis. In particular, the regime method was implemented using Definite software, in order to identify which scenario best promotes the goal of this research which is the good function of the business cluster.

*Keywords: business clusters; Athens; sustainable mobility; smart mobility; multicriteria analysis.*

# Self-regulated planning standards: theory and application

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## Extended abstract

The Greek planning system is one with a long tradition in the use of planning standards. Even before their inclusion in the planning legislation in the early 1980s, a great deal of research was already published on the subject matter by the Athens Center of Ekistics in 1964, by Markopoulou and Partners in 1973, and by the Technical University of Athens in 1977. The latter comprised the basis for the estimation of the planning standards that were used in all urban plans prepared between 1983 and 2004. In 2004, these planning standards were slightly revised and institutionalized. Since then, no revisions have taken place, even though in the meantime, the planning agenda was enriched, the national planning system was reformed, and two major economic crises along with a pandemic have hit the country. These developments have altered greatly the status and the prospects of the national economy, the demographic characteristics of the population, and the living standards and habits of the Greek people.

Within this context, this presentation aims to draw attention on the need to revise the 2004 legislation on planning standards, as well as to provide the pertinent theoretical and methodological tools that are necessary for their revision. Thematically, the presentation is structured in two parts.

The first part presents parts of the theory of planning standards, in order to build a shared vocabulary and to enhance the further discussion on the subject matter. Special attention is also given to the clarification of existing terms and concepts, especially since new ones are proposed in the second part of the presentation. In addition, the presentation elaborates on the methodological pitfalls of the 2004 legislation, some of which are associated with the insufficient level of elaboration of the existing terminology.

The second part particularly examines the *self-regulated planning standard*. This is a new type of planning standard, which departs from the established notion of a standard as a, more or less, static value with universal applicability that is used by planners to estimate the necessary size of an urban use. Self-regulated standards comprise instead a *process*, with certain qualities and internal procedures, which assist the planner to estimate, on a case-by-case basis, the specific needs of urban space. Last but not least, the presentation includes an example of the application of this new type of standards in a real-case scenario.

*Keywords: planning standard; self-regulation; urban planning; Greece; planning legislation*

# **Innovative approaches of planning and design in the coastal landscape**

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## **Extended abstract**

The paper discusses the interrelationship between planning and design in place making in the context of a strategic coastal landscape requalification project. The integration of planning and design epistemological perspectives represents a key factor in determining the success of strategic spatial interventions as demonstrated in the long history of urban design shaping of the contemporary city from the 19<sup>th</sup> century up today. This starts from the setting of development objectives, preparation of a clear strategy and goes on to ensuring funds, setting up the organizational structure for carrying out the project, adjustment of land use and regulations in harmony with the area's new destination and preparing a project design that fits and delivers the expected outcome. Last but not least the success of the project depends on its acceptance by local stakeholders particularly when rearrangement of property structure is involved, which is the case in most of the cases of integrated urban regeneration. Given these complexities, the integration between planning goals and actual reshaping of the territory through design is not so easily achieved as the different actors involved and disconnected processes create gaps in understanding and communication.

The paper looks how these difficulties and challenges were handled in the context of a strategic project in Albania that serves an ambitious development vision. The creation of the Albanian Riviera represents a strategic development objective which has guided the planning of the coastline over the last two decades promoted with the contribution of international, national and local actors. The underlying idea builds on the imagery of the Mediterranean Riviera tradition, which was initiated in the South of France in the 19<sup>th</sup> century and has been influencing the transformation of specific Mediterranean coastal landscapes oriented to tourism development and recreation in Italy, Spain and elsewhere. It refers to the so-called Ionian coast of Albania, which spans over a distance of more than 120km from Vlore to Saranda. The area has been the focus of numerous planning initiatives and studies assigned by the World Bank and the Albanian government at national and local level and supported by multiple financial and institutional means. The paper focuses on the coastline of Vlore, where important public investment has taken place over the last decade with ambitious projects underway. It will examine the evolution of a coastal requalification project which expands southwards from the city along the bay of Vlore over a distance of 11km examining how consistently the declared goals were carried over from the stage of conceptual planning to detailed project design.

*Keywords: innovative planning and design approaches, coastal landscape, Albanian riviera*

# Planning and designing across a living trace: the case of the Pelion railway

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## Extended abstract

Nowadays, abandoned rail routes are a common phenomenon in Greece, with multiple examples located especially in Peloponnese and Thessaly. However, recently there has been a revival of a number of railways – either by retrieving their role as a form of transportation or by acquiring the new use of heritage railway and functioning as a tourist attraction. One example of the latter category is the Little Train of Pelion.

Railway tourism is an ever-increasing form of special purpose tourism, creating opportunities not only for economic and tourist development, but also for designing the spaces adjacent to the operating railway in order to enhance the visitor's experience and reclaim its cultural heritage. The revitalization of formerly abandoned sites associated with the railway also facilitates its reconnection with the local communities.

The Little Train of Pelion during 1903-1971 connected the important port city of Volos with the hardly accessible traditional villages of West Pelion. It provided them with a unique outlet for their products, benefited immensely their economy and directly contributed to their evolvement in important settlements. The railway was not just a means of transport, but a living character participating in Pelion's social life, and is considered also a vital part of Greece's industrial heritage, being one of the narrowest railways in the world (only 60cm) and possessing technical elements of important cultural value.

In 1971, the train's use was terminated, a decision that was met with resistance. A "Friends of the Railway" union was founded immediately, demanding its reuse as a heritage railway. This goal was achieved more than 20 years later, but only in half. Since 1996, the train is operating as a tourist railway during the summer period, from the village of AnoLechonia to the mountain village of Mileai, attracting a number of rail enthusiasts and general visitors.

Nevertheless, the most vital part of the route that connects Volos with AnoLechonia still remains without use. The rail tracks cross Volos' neighboring town, Agria, leaving a trace full of memory across its most central road. The abandoned rail station is standing in solitude inside a vast area that has been stripped of all life, creating an open wound inside Agria's core. The tracks then continue, shamefully covered in asphalt with the exception of two areas, one next to Vrychonas' concrete bridge, and one in an olive grove near the village of AnoLechonia.

A reuse of the Little Train of Pelion almost in its entirety is proposed, combined with topical interventions across the route, which underline its most significant spots. A special interest is located in the area between Agria and AnoLechonia, where a more detailed plan of a spatial development strategy is conducted. The three sites of importance – the Agria station, Vrychonas bridge, and the olive grove – are highlighted, each one assigned its own character and use. Finally, the area of the Agria rail station is meticulously designed as an urban park, with the implementation of a much-needed center of culture and entrepreneurship.

*Keywords: abandoned rail routes; heritage railway; Little Train of Pelion; Volos; Agria*

## **Reclaiming disused railway infrastructure through innovative urban planning practices. The case study of “Kozani’s OSE City Park”**

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### **Extended abstract**

Railways as well as road axes, due to structure and operation, interrupt the continuity of urban tissue and become perceived as barriers and “border vacuums” especially when they become obsolete and remain inactive. The already disused railway infrastructure is being transformed into vacant waiting areas, vague and fluctuating but also potential and dynamic fields of new alternatives, spatial and planning ones. They become a significant reserve of land that the inhabitants of the ever-changing city can utilize, appropriate and plan according to their needs and welfare.

The Kozani Railway Station, located in the south of the old city, is such an urban void, a product of a former rail function. This vast flat area remains “inactive” since summer of 2010 when OSE interrupted the operation of Regional Unit of Kozani’s railway network, due to great shrinkage of passengers. The area of Kozani railway station has always been inextricably linked to the history of the city and to urban memory as an emotional and favourite place for its inhabitants, also charged with the notion of boundary and barrier inside the city. The current “sleeping” state of the area creates a special dynamic and is a unique opportunity for urban revitalization, for enhancing the green infrastructure and its network as well for the significant improvement of both the city microclimate and the sustainable urban mobility.

Under this framework, within the area of the Kozani’s OSE Station (approx. 14,5ha), a Special Urban Planning Survey was developed and approved by Presidential Decree (GOG 292D/2021) in accordance with the provisions of Article 6A of Law 3891/2010 (A’188), in order to define land uses, building standard regulations and restrictions in line with their respective land uses, transport infrastructure and other services in immediate proximity and in the greater city area. This special planning is part of the overall City’s Sustainable Urban Mobility Plan and directs the necessary interventions for the creation of low-impact mobility routes, suitable for attractive and safe walking and cycling as well as regeneration interventions for functional integration of southern neighbourhoods with the city core.

In particular, “Kozani’s OSE City Park” is part of the regeneration projects for upgrading urban environment of Kozani’s historic centre. A network of extensive sidewalks and key public spaces will be created along the axis “City Center-Lassani Square-Railway Station”, through Aristotelous Street, that will reach the inactive space of OSE in order to transform an “urban void” into a functional Park of greenery, leisure and entrepreneurship. This regeneration proposal includes the maintenance of the passenger railway station of the city, the location of a covered municipal farmers’ market, parking lots and the upgrading of existing green spaces.

Parallel to the above urban interventions, new ideas and proposals came up -through an Architecture Ideas Competition- that promote bioclimatic design, sustainable water use (recycling, rainwater collection for irrigation), wastewater management and waste collection along with energy saving (lighting, district heating, etc.).

*Keywords: disused railways; void; reuse; sustainability; mobility; integration; city park; Kozani; OSE*

# **Urban scale digital twins and socio-technical perspectives: Big Data in urban planning decision-making**

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## **Extended abstract**

The paper examines the impact of the virtual public sphere on how urban spaces are experienced and conceived in our data-driven society. It places particular emphasis on urban scale digital twins, which are virtual replicas of cities that are used to simulate environments and develop scenarios in response to policy problems. The paper also investigates the shift from technical to the socio-technical perspectives within the field of smart cities. Despite the aspirations of urban scale digital twins to enhance the participation of citizens in the decision-making processes relayed to urban planning strategies, the fact that they are based on a limited set of variables and processes makes them problematic. The paper aims to shed light on the tension between the real and the ideal at stake during this process of abstracting sets of variables and processes in the case of urban scale digital twins. The paper examines the critiques of ‘digital universalism’, reflecting upon the role of urban scale digital twins in data-driven decision-making concerning urban policies and urban planning. It also explores how Manuel Castells’s theory could help us better understand the relationship between big data and urban planning in our data-driven society. The point of departure of this paper is the necessity to shape methodological tools offering the possibility to develop new forms of social advocacy around big data. Its main objective is to explore how the intensification of the use of urban scale digital twins for decision-making in urban planning makes indispensable to investigate the risks that digital universalism and the use of big data entail. In order to render explicit its arguments, the paper examines urban scale digital twins such as the digital twin of the Docklands area in Dublin, the digital twin of the city of Zurich, Virtual Singapore, the digital twin of Hervanta in Tampere and Kalasatama district in Helsinki, and the project ‘Digital Urban European Twins’.

At the center of this article is the idea that when working with big data thinking locally means thinking critically. This goes hand in hand with the recognition of the significance of shaping approaches that aim to enable us to reveal the specificities and implications of the local contexts in which data are created. When we study how data are collected and instrumentalized, it would be useful to bear in mind Christine L. Borgman’s remark that ‘entities become data only when someone uses them as evidence of a phenomenon, and the same entities can be evidence of multiple phenomena’. The paper aims to render explicit that the potentials of the urban scale digital twins for data-driven decision-making in urban planning lie, therefore, in our capacities to tackle these two different temporal scales conjointly and to elaborate conceptual and methodological tools that manage to do so. This tension between the two different temporal scales could be better understood through the notion of ‘timeless time’ in Castells’s work. In order to shape approaches that promote the use of big data for urban analytics without neglecting the social aspects involved in the strategies of formation of urban policies, it is important to bear in mind the weaknesses of ‘digital universalism’ and the assumptions on which the creation of urban scale digital twins.

*Keywords: data-driven society, data-driven decision-making, urban scale digital twins, big data, digital universalism*

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# Considering spatial dimensions of civil protection in urban planning: The case of Special Spatial Plan of Mati, Attica, Greece

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## Extended abstract

The starting point of this paper is that spatial planning can be used both as one of the principal means for the reduction of the impact of hazards and disasters and as a means for the creation of the spatial conditions for better emergency management and building back after a disaster. Spatial planning can prevent new and reduce existing disaster risk by regulating the type and intensity of use of space, therefore reducing exposure to hazards of tangible and intangible elements exposed to risk among them people, infrastructure, activities, goods of economic, cultural and environmental significance. In addition, it can reduce urban vulnerability, especially the systemic one, by holistically considering compounding risks and interconnections of various elements of the urban system. Besides contributing to disaster risk reduction efforts, spatial planning can also support management of residual disaster risk by creating the spatial conditions suitable for better dealing with emergencies arising from the occurrence of hazards as well as for better rehabilitation and rebuilding of the affected areas. This is primarily the subject of civil protection and mostly involves contingency and emergency plans, preparedness actions, information and communication efforts and the use of early warning systems.

Experience from disasters in Greece has repeatedly demonstrated significant links between spatial parameters and the severity of impacts due to natural and man-made hazards. To mention only few examples, fire risk has been proven higher in the interaction zone between wild land and settlements (WUI), technological accidents have threatened settlements and critical infrastructure located close to dangerous industrial facilities, flash floods have destroyed urban areas constructed on past water flow paths and heat islands were identified in densely built urban areas. Likewise, response to emergencies is hindered by conditions of insufficient open and green spaces, labyrinthine urban fabric and tangled traffic network, large residential and population densities, high concentration of vulnerable groups, inadequate location of critical or vital infrastructure and facilities.

The wildfire disaster in Eastern Attica in 2018 and its fatal impact on Mati settlement brought up among others the necessity to address the spatial challenges disaster risk reduction and emergency management face and led to the uncommon for Greece decision to employ spatial planning for improved reconstruction of Mati. To this end, elaboration of guidelines and specifications for considering disaster risk reduction and civil protection in spatial planning was necessitated.

Considering the Greek context, the paper first discusses the potential of spatial planning to address disaster risk reduction and civil protection challenges and provides examples from recent disasters. Second, it touches upon the relationships between urban planning and civil protection in Greece and the segregation of respective fields of expertise and practice. Finally, it puts forward guidelines and specifications for the introduction of civil protection and disaster risk reduction considerations into spatial planning and discusses their application in Special Spatial Plan of Mati which is in the process of implementation.

*Keywords: civil protection; spatial planning; Greece; reconstruction; wildfire; disaster risk reduction*

## Phoenix | regeneration of Mati settlement in Attica

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### Extended abstract

This diploma project deals with the holistic redesign of Mati, a settlement on the Northeast coast of Attica, which was devastated by a wildfire in 2018. The aim of this project is to investigate ways in which design can contribute to cases of catastrophic physical disasters. The ultimate goal is to rejuvenate the area, to enhance its resilience to other potential natural disasters, while creating a contemporary suburban settlement.

The design process was guided by principles concerning the safety of the area and the preservation of its natural environment, along with some qualitative characteristics, which were maintained as a memorial for its previous state. The new road system is based on the existing one, with several additions of perpendicular movement. It combines mixed use roads, pedestrian streets, and some main roads connecting the settlement with the neighboring areas. The new plot distribution is generated by using geometries from a selection of existing building blocks, which were found to be of appropriate proportions. The model-blocks were refined and spread out throughout the area, creating a new urban “mosaic”. The new roads and plot-grid are connected with the introduction of pedestrian passages that cut through each building block, blurring the boundaries of private and public space. The fences of each plot are interrupted while in contact with the internal pedestrian street to enhance the sense of community that existed before. The general plan (scale 1:2000) is completed by determining the boundaries of the large public spaces: the waterfront, the three parks, which are designated by the existing streams, as well as a “green defense zone” parallel to Marathonos avenue. The design also incorporates certain public spaces, both singular and along the pedestrian passages. They, together with the central square, aim at rejuvenating urban space on the whole of the urban tissue, spreading-out in the area. As possible “gathering points”, they are also meant to ensure the safe evacuation of the settlement in case of emergency. A public building is also proposed to be placed at the meeting-point of the central park and the waterfront. The building is meant to operate as a public center, capable of hosting local events, various volunteering activities, as well as the local sailing club.

Designated areas for built space are defined using a categorization for the plots according to their sides' ratio. The built environment emerges from a combination of rules regarding the height of the buildings -which is kept low, and the placement of the built area on the plot (1:666). The design process also involves the configuration of planting, to safely reinstate plant life in the area. Finally, the details of the urban spaces are determined by zooming in further in scale. A section of the central park, one of the waterfront and certain urban blocks are designed in detail (1:333), defining their materials, pavements and urban equipment. Public spaces are approached in a cohesive manner, mixing the orthogonal axes of the plots' design with smooth, curved lines enhancing the corresponding point of interest.

*Keywords: urban regeneration; urban planning; urban design; design for natural disasters; Mati*



**SUSTAINABLE REGENERATION AND HEALTHY AND LIVABLE  
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**Changing Cities V, Corfu, 20-25 June 2022**

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**Prof. Marichela Sepe**, ISMed - Institute for Studies on the Mediterranean, CNR - National Research Council



## Cultural sites and livable spaces: a case of intangible resources sustainable enhancement

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### Extended Abstract

The cultural heritage in Italy is characterized by many differences concerning landscapes and cultures and, for this reason, its safeguarding and enhancing need *ad hoc* methods and database capable to identify both tangible and intangible aspects of involved places. Many sites, for their outstanding beauty, have been declared UNESCO World Heritage Sites, requiring a more accurate enhancement, capable to meet both current visitor's demands and sustainable preservation. Indeed, nowadays the visitor's demand is increasingly changing – also due the pandemic period and different kinds of risks - requiring an adaptation of the offer at different level: namely local, regional and national. Furthermore, many Unesco sites present more than one specialization such as Pompeii with both archaeological and religious tourism, or the Dolomites, with ecological, sport and food tourism. Other opportunities for visits are constituted by the great events, such as the Universal Exhibitions and the Olympic Games, which offer a reason to visit for a certain period of time and open up to the visitor further possibilities to enjoy the cultural attractions that the place owns. Finally, tourist guides organize personalized itineraries, increasing the possibilities of visits and the occasions to get to know the places in their many keys of interpretation. In Italy, there is the largest number of UNESCO WHS in the world: in 2021 the list include 58 properties of which 53 are cultural and 5 are natural. Since October 17, 2003, the UNESCO General Conference has expanded this list by creating the list of oral and intangible heritage, with "the aim of safeguarding these masterpieces to prevent their disappearance, preserving the extraordinary set of languages, rituals, social customs, and practices concerning the knowledge related to craftsmanship that over the millennia have been handed down from generation to generation representing the differences inherent in the evolution of humanity". This list include: Dieta Mediterranea, transnational, added in 2013; Saper fare liutario di Cremona, 2012; Le Macchine dei Santi, di Nola, Palmi, Sassari, and Viterbo, 2013; Pratica agricola della vite ad alberello di Pantelleria, 2014; La Falconeria: un patrimonio umano vivente, transnational added in 2016; L'Opera dei Pupi - Sicilia -, 2008; Il Canto a Tenore - Sardegna -, 2008; L'arte dei pizzaiuoli napoletani, 2017; and L'Arte dei muretti a secco – transnational added in 2018). Starting from these premises, the paper aims to illustrate the results of a study focused on UNESCO heritage in Italy, with the author's responsibility, namely identifying both positive factors and problems in the enhancement of these sites, with particular attention to the public spaces and the role of UNESCO recognition, also in relation to multiple kinds of crisis depending on new risks. The study was carried out in the framework of: the ISMed-CNR research entitled "Analysis and design of the contemporary territory: identity, health and liveability for resilient and sustainable places"; the Bilateral Cach Italy-China Program "Cultural itineraries: enhancement and management of great historical sites"; and PRIN research project (Bando Prin 2020). By way of example, the emblematic case study of the Machine of Santa Rosa in Viterbo, in the framework of the oral and intangible Unesco heritage list.

*Keywords: Cultural heritage, livability, public space, sustainable enhancement, intangible resources*

## **Art and public space: a case of cultural regeneration**

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### **Extended Abstract**

In recent decades cities had to deal with increasingly complex problems, including the reduction of population and the reuse of brownfield sites, and innovative planning tools, together with greater participation in regeneration processes and attention to the quality of life, were required. From this viewpoint, culture and art were more and more put in connection with urban transformation policies so that works of art went out of the museums, creating a tighter contact between the artists and the public. In this perspective art can be seen no longer as a mean of human expression or, more prosaically, a new urban economic engine, but also a tool for local development, to stimulate co-design initiatives for the transformation of 'neighborhood' spaces, to achieve regenerative objectives with effects not only on the economic life but also on the well-being of the community. Therefore, we are seeing the increasing involvement of artists in the transformation of the city, entering into urban regeneration processes with a sustainable approach that focuses on the process rather than on art objects and which also takes into account social intentions. All this stimulates an interaction among professionals with different skills to "make cities", creating relationships and opportunities for effective dialogue. Traditionally, city art was connected to sculpture only, but still its function was always linked to political and social values. Since the 1960s installations, performances, as well as the space in which they are positioned, have gained increased importance in artistic expression. The work of art opens up to everyday objects, to linguistic expression, and the political and social context. Since the meaning of public art is not univocal, in this paper it is used to indicate activities and installations not only realized outside of exhibition spaces, such as museums and galleries, but rather interacting with public space. The influence of the economic globalization on art has been reflected in the emergence of international artists, "nomadic" curators and global contemporary art collectors. Installation works, even on a large scale, built for a specific site as part of art exhibitions, often highlight a social commitment, the experiential participation of viewers, almost making the public space of the exhibition private. In this scenario we investigate Manifesta, the European Biennial of Contemporary Art, the first important nomadic event, born in contexts in which profound cultural and political changes have occurred as consequences of the 1996 fall of the Berlin Wall. Manifesta was launched with the aim of contributing to the redesign of Europe after the Cold War, engaging critically with the new suburbs. Every two years Manifesta is hosted by, and interacts in, a different European city with the aim of inducing an "alternative aesthetic vision to the local", but also of offering "heterotopic sites of emerging cultural production". This was particularly evident in Palermo, where the recovery and reuse of prestigious buildings and gardens within the event provided a backdrop for citizens and artists, but especially for visitors, to rethink the city. Starting from these premises, the study - which is part of a wider CNR research project concerning best practices in urban and social regeneration based on art events - illustrates: the relationships between public art and art exhibitions; Manifesta Palermo and the process of urban regeneration; and the conclusion.

*Keywords: cultural regeneration, public space, urban regeneration, Manifesta biennial, Palermo*

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# **Healing places, healing people: Insights on spontaneous critical placemaking from the Bellhaven Harm Reduction Centre, Durban, South Africa**

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## **Extended Abstract**

Despite the renewed interest in place in urban planning since the 1990s, the empirical focus has predominantly been on cities along the Atlantic Rim with limited scholarly attention on African, Asian and Latin American cities. A more worrying trend discernible from an examination of contemporary discourse and practices of urban place-making is that concerns for, and interventions in, the interests of social equity are becoming less relevant with almost no focus on placemaking efforts for the most vulnerable groups in cities. More specifically, whilst much has been written about urban placemaking and about responses to homelessness, not enough empirical attention has been focused on the intersection of the two. In attempting to fill in this gap in the placemaking literature, the paper draws on the authors' experiences of spontaneous and frugal institutional placemaking at the Bellhaven Harm Reduction Centre, a space dedicated to providing opioid substitution therapy to Durban's drug-using populations since the COVID-19 lockdown. The paper suggests what placemaking for the marginalized could and should look like, emphasising the importance of creating public spaces of dignity, whilst engaging meaningfully with a group of diverse stakeholders and neighbours. The importance of having a place that resembles 'home' for homeless people with an opioid use disorder, and their re-humanisation as a result, is core to what the Bellhaven Harm Reduction Centre is. But equally important is how this public space has transformed narratives within the broader urban community about homelessness and drug use, making it an excellent model of critical placemaking. This is revealed through interviews with beneficiaries, and observational research that focuses on how the space is used. In telling the story of the Bellhaven Harm Reduction Centre we invite a rethinking of traditional notions of place-making and a re-grounding of common understandings of what it means to make vibrant and truly accessible urban places. In so doing we also call for south-north learnings about using common space to enhance public safety and public health, and concurrently demonstrating the interconnectivity of urban dwellers across social divides.

*Keywords: Harm reduction; spontaneous place-making; homelessness*

## The city that resists

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### Extended abstract

In the clash between Covid and City, the City arms itself to protect its inhabitants. The paper aims to make some programmatic and operational suggestions to prepare the protective barriers of the city and its inhabitants, concentrated in medium and large cities or scattered in fragile inland areas. Proposals are suggested to sharpen the city's weapons, in defense from the rapidity of pandemic mutations, sudden changes in strategy, indeterminacy, global risk, chaos. The city is called to prepare new protection strategies: from concentration to diffusion, from socialization to isolation, from predetermining the future to "on sight" navigation, from rigidity to flexibility of use, from permanently delimited space to space with variable boundaries, from permanence to transformation, from a reasonable certainty to the uncertainty of the future, from bureaucratic and political slowness to the rapidity of defense strategies.

The methodology follows an unusual procedure by expanding the practices of protection against seismic risks and disasters, to adapt them to the need for resistance to pandemic risk.

The results in progress are design solutions for a paradigm shift and for the modification of urban and territorial tools, in the context of a digital, environmental, ecological, administrative transition, and of the European Union Recovery Plan.

The advanced design suggestions concern the introduction of flexibility in the methods and times of use of urban spaces and in their variable delimitation, the elimination of bureaucratic procedures, the construction of cities more green, digital and interconnected, the territorial distribution of equipped centers provision of mass health services or quarantine facilities, and procedures for mitigating the imbalances between center, periphery, scattered settlements.

The conclusions highlight the knots to be solved in order to fill the gaps of apolitical-administrative and disciplinary path, which has neglected the need for solidarity and coordination between peoples to oppose global challenges and has favored isolation by leaving plunder human and natural resources and perpetrate the plunder of land, air, water and the city.

*Keywords: the city that resists; flexibility in methods, times of use and in the delimitation of urban spaces; sustainability as a defense against pandemic risks; inclusiveness as mitigation of inequalities and imbalances; resilience as city self-regeneration*

## **Regeneration or speculation? A socio-spatial analysis on liveability within Valletta**

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### **Extended abstract**

There is little doubt that the true success of urban regeneration lies in achieving long term liveability – ensuring a diverse and resilient local economy, neighbourhood robustness, affordable housing, sustainable mobility and appropriate place-making. Cities must be liveable in order to achieve a socio-economic balance, which often tends to shift in favour of short-term economic gains. Interventions, branded as being regeneration projects, become largely speculative. The introduction of regeneration-focused infrastructure results in socio-spatial impacts that need to be understood and addressed. Such impacts are more significant when stakeholder objectives, and resultant policies, are centred on the creation of urban magnets to attract individuals to particular land uses. The measure of success for these projects tends to prioritise, somewhat narrow-mindedly, urban vitality. This is the case with the proliferation of catering outlets within cities; not as ancillary to more important land uses but as ends in their own right. While one may argue that this creates vibrant public spaces that are ‘alive’ it often does little to the local communities. Indeed, the impact of such projects could be detrimental to citizens’ quality of lives and hamper long term liveability within certain neighbourhoods, particularly as important community spaces become appropriated by private ventures. A land-use focus to regeneration is furthermore fragile because it skews housing market conditions, exploited by speculators who ride on the wave of cultural infrastructure and newfound ‘urban buzz’. In turn, this generates affordability issues and subsequent gentrification-related phenomena such as displacement.

This paper investigates the above themes in relation to Valletta, Malta’s capital city and administrative, cultural and touristic centre and recent European Capital of Culture (ECoC). Valletta’s urban structure has been modified throughout the centuries through adaptive reuse – more recently through the introduction of cultural infrastructure and diverse land uses, particularly catering and entertainment establishments. The ECoC title is believed to have substantially accelerated private investment and the city’s commercialisation. An increase in tourists and new affluent city users was reflected in a demand for short-term rentals, land use changes, and soaring property prices; exposing the city’s affordability and liveability to speculation, facilitated by planning policies. This has led numerous authors to label Valletta as a gentrified city. These themes are especially imperative in a reality where cities must confront the dynamics of a pandemic, wherein a heavy reliance on specific commercial land uses may be volatile.

The paper contextualises liveability within broader urban regeneration objectives and introduces Valletta as a case study, highlighting its changing socio-economic nature. It then discusses the above phenomena, singling out issues in relation to socialisation and inclusion. By taking some pertinent examples, the authors question the forces at play and whether one could claim that Valletta has become gentrified. The city’s metamorphosis highlights the crucial role of governance and policymaking in prioritising liveability as opposed to simply reacting to fluctuating short term market demands. In this spirit, the paper concludes with some key observations directed at future policymaking for urban regeneration.

*Keywords: liveability, affordability, gentrification, socio-spatial impacts, Valletta*

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## Diversity, community and participation: how Covid-19 has boosted the main issues of public space design

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### Extended abstract

In recent years, cities have made significant transformations that reshape buildings, spaces and infrastructures - due to major urban regeneration projects. These processes have also determined many social and cultural changes. In addition, in 2020 the outbreak of the Coronavirus completely reshaped urban lives because of the need to limit the spread of the disease and ensure essential services to the most vulnerable city users.

Considering those events and collaborating with the municipality of the city of Mantua (Italy), we conducted research on how Covid-19 has boosted the main issues related on designing of public space. In our earlier research on urban regeneration process and the specific role that public spaces play in intervention strategies, we focus on three key-concepts that urban design can be based on. These concepts are diversity, community and participation. They represent our interpretation of multiple dynamics that occur in public space design. *Diversity*: it is the most determining feature that describes an urban context because it embraces the complexity of urban spaces; it refers to both the physical and functional characteristics of place and it incorporates several aspects of diversity, such as form, activity, culture etc. *Community*: it is the actor that plays a fundamental role in public space; it refers to a group of people with a common background who shares urban places, ethic values and projects. In acting together, those people create many heterogeneous groups with a common identity. *Participation*: it is a process that opens up the discussion on new perspectives and strategies about urban projects, but it is also the experience that promotes the sense of belonging among dwellers.

Based on systematic observations we made within the case study of Mantua, we propose a reinterpretation of those urban issues in the light of some forced shifts due to Coronavirus spread. We believe that the Covid-19 pandemic takes a role as an accelerator in the development of urban projects, therefore, we look at Covid-19 pandemic not only as a crisis, but also as an opportunity. Then, we think that the sense of diversity, community and participation in urban design expands with new shades of meaning that highlight the way going ahead in pandemic times.

In conclusion, our research focuses on the reinterpretation of the key issues that generate a new set of keywords such as: care as reciprocal responsibility; interplay as interactions of different factors; adaptability as the ability to take action in evolving scenarios; integration as the way to manage urban complexity; proximity, considering both the social and urban field; and finally, planning time as the necessity to plan both short term and long term actions.

*Keywords: pandemic impacts; care as responsibility; proximity in public space; implementations of design strategies; regeneration scenarios*

# Transformations and the resilient city. Lessons from the *Reinventing Cities* competitions in Milan

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## Extended abstract

After the peak of the housing and socio-economic crisis in the last decade, a profound shift in urban policies occurred. The change has definitively overtaken the previous seasons, which were characterised by processes of urban transformation limited to the mere reuse and redevelopment of portions of brownfields and greyfields. The current urban regeneration policies orient medium and long term scenarios and are featured by projects involving conspicuous portions of the existing city to be reclaimed and re-infrastructured. The trend pays remarkable attention to environmental sustainability and the fight against climate change, also in response to the post-pandemic severe conditions, with the aim of enhancing the centrality of public and collective open space in the construction of the contemporary city.

The sustainability challenges in spatial planning open up different research fields, particularly regarding the most relevant transformations in the city tissue, where design, financial and organisational resources interact. To this end, urban regeneration processes are increasingly intertwined with mechanisms, tools, and objectives capable of enhancing biodiversity, improving the urban microclimate, reconstructing a correct relationship between permeability and the water cycle, encouraging energy transition, redesigning the urban landscape, and making cities more resilient. These challenges require multifunctional and multi-scalar solutions and a transdisciplinary approach to tackle the multiplicity of territorial, environmental, social, and economic dimensions.

The critical analysis of the proposals resulting from the two editions of the *Reinventing Cities* competitions in Milan ([www.c40reinventingcities.org](http://www.c40reinventingcities.org)) allows multiple considerations. The debate raised by the competitions provides the opportunity of reflecting on primary needs, challenges and problems of the city, its residents and local activities. On the one hand, it is necessary to study the coherence among strategies, attentions, tools, and practices that strengthen the international positioning of cities. On the other side, it is important to investigate the capability of public policies to design a qualified open space at different scales, leveraging private investments. As a matter of fact, the density of transformations (uses, activities, relationships, constructions) is associated with the production, design and management of public spaces and facilities.

The paper intends to critically explore the actors, processes, intentions, and outcomes of these competitions, investigating the ability of the submitted and awarded proposals to combine the adoption of appropriate ecological and environmental value measures with the effectiveness in meeting social expectations of the surrounding populations and sustainability issues. This should happen without ignoring the effectiveness of public policies in monitoring and leading the different moments of the process and the adaptive capacity in addressing social needs and urban health.

The physical transformations and functional renovations resulting from competitions are of significant size and impact and subject to challenging investment by public and private actors. The hypothesis to be tested concerns the possibility of combining them with the demand for an increase in urban and environmental quality and the enhancement of city resilience.

*Keywords:* Urban regeneration; Climate change; Milan; Reinventing Cities competitions; Public policy

# Urban green spaces and environmental justice: a debate on “healthy cities”

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## Extended abstract

The Covid-19 pandemic calls for new ways of inhabiting the city and investments in urban green spaces to make cities more resilient and resistant to future challenges. In these two years of emergency and restrictions on individual freedoms, urban green spaces have been the test case for the resilience of urban populations globally. However, recent studies have shown that there have been many inequalities in terms of access to this resource by a large proportion of the population in vulnerable conditions or because they live in marginal and peripheral areas of the city.

In the face of this complex framework, urban policies in Europe are focusing on increasing and rehabilitating green areas in order to enhance urban quality - in ecological and social terms - and simultaneously act on the development of local economies. However, there is still limited knowledge about the spatial justice effects of such urban green interventions. Analyzing these interventions on public green spaces thus becomes an opportunity to assess whether indeed the ecological dimension of the new urban agenda is moving towards a more equitable distribution of green spaces in the city or, on the contrary, the risk is the creation of new areas of exclusion for the most vulnerable populations.

Within this theoretical framework, the particular link between environmental justice, social vulnerabilities and urban planning could be observed in the relation between the coastal metropolitan city of Palermo, in Sicily, and the Oreto River. Along its 22 km, Oreto is the backbone of a series of critical issues not only not addressed over the decades, but supported by policies that have reduced the river to an open sewer, in particular, through the waterproofing of the embankments and the conveyance in the riverbed of numerous sewage systems. Unlike other realities that have had the privilege of being in more prosperous districts of the city, the Oreto is a mirror which shows the abandonment of a territory – the entire drainage basin – and, in its final stretch, the removal of the idea of the river from the city, and so from the community. In this perspective, the article observes an ongoing project on the river financed by the Italian Recovery Plan, the regeneration and renaturalization of the mouth of the Oreto River, considering these complexities with the issues of maintenance funds available in the long term and short times imposed by the European institutions.

Starting from these premises, the paper aims to contribute to the current debate on "healthy cities" by giving greater prominence to issues of environmental injustice than to the rhetoric of "green" regeneration practices present in the post-covid urban agenda.

*Keywords: environmental justice, urban green spaces, urban regeneration, healthy cities*

# **Strategic scenarios for urban and environmental regeneration. A master plan for ancient Kroton**

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## **Extended abstract**

Since the end of the seventies, the problem of the management of brownfield sites has emerged in major industrialized countries, producing significant risks for the health of both communities and environment. Following that, the path for urban and environmental regeneration of the Ancient Kroton is operated, as part of this case study. The interest in the redevelopment of the former industrial site (ENI reclamation), focuses in particular on the tools that can be used to mobilize and involve the properties of the soils, for the consultation of the interested parties and the sharing of purposes in the urban regeneration project sustainable. This research aims to investigate the policies and processes aimed at the development and urban and environmental regeneration of the former ENI area, and parts of the city connected to it. It is the enhancement project of Ancient Kroton and the environmental, tourist and cultural system of Croton and Capocolonna. The general objective arises above all in relation to a need, which is that of a new search for a cultural and collective identity, which in this project must be configured as a future public space, based on the exploration of visible and invisible places. Finally, this research examines the existing European regulatory and political context on the subject, in order to develop, through the analysis of best practices, a management model for the complex remediation and redevelopment procedures of brownfield sites. The city of Croton has launched and developed a policy of interventions related to the conversion, regeneration and enhancement of its cultural, environmental and landscape heritage, in order to launch a cultural revolution, on which to base social and economic development processes. The case study will be structured through a careful comparative evaluation, supported by a more in-depth analysis of good practices, both in Italy and in the EU.

*Keywords: reconversion, integration, participation*

## New square in Meolo, Venice. Projects for the regeneration of a degraded historical site

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### Extended abstract

Meolo is a small town in the Metropolitan City of Venice, crossed by the river of the same name. Its flat territory is located between the courses of the Piave and Sile rivers. The work we propose concerns the redevelopment of the central part of this town.

The analysis carried out led to the finding that the space in front of the Town Hall was, and still is, inadequate in relation to the need for a centrality felt by the community. This space is insufficient to host the main recreational and meeting public functions. The purpose of this study is the formulation of hypotheses for a new definition of the central space close to the historic building that now houses the Town Hall.

The historic square of Meolo was once the churchyard of St John the Baptist, a consecrated place that also housed burial sites far from the location of the current Town Hall. Throughout the Middle Ages and beyond, it has been a place of collective events and activities, including those of a non-sacred nature. Over the centuries, the churchyard has been built and the memory of this central space has been lost.

Afterwards, the place of reference of the community was the area in front of the villa Ca' Cappello, an open space not well defined at the foot of the Ponte dei Carri. Arranged as Piazza Martiridella Libertà during the reconstruction phase following World War I, it remained a secondary square. The area was overlooked by the main historic buildings, seats of administrative and commercial activities, including Villa Folco (also known as Villa Dreina).

In 1953, the Ponte dei Carri was demolished, and a section of the river buried.

The area in front of the Town Hall, being originally part of a private villa, is not a real square in the perception of its inhabitants. It, however, constitutes today a valuable opportunity to redesign the lost unity of this historic town.

The paper includes the results of students' workshops developed in the framework of the courses on "Architectural and Urban Composition 2" taught on the master's degree in Architectural Engineering at the Department of Civil, Environmental and Architectural Engineering of the University of Padua, academic years 2015-16. The working method is based on the belief that the study of urban morphology and the history of the city are basic to face a design theme. The history is considered as an indispensable tool to know the deep reasons of the urban structure which is the memory and the image of the community. The methodology contemplates the urban form as a result of its spatial structure. Progressing from the study of how the area has evolved through time, students defined new proposals for the area that involved testing new building types.

*Keywords: heritage; urban public space; identity; memory; urban regeneration*

# **Cultural institutions as agents of urban and community regeneration in the (post-)pandemic city. The case of the «Laboratorio Zen Insieme» in Palermo**

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## **Extended abstract**

Although all cities in the world have been affected by the COVID-19 pandemic, its impacts on the territories, yet to be understood, are unevenly distributed, revealing extremely varied imbalances depending on the places. However, it is clear that the virus and its variants have aggravated pre-existing socio-spatial inequalities, creating new ones and bringing attention back to those implications between space, planning, public health and citizenship that are at the origins of contemporary urbanism. In a reference framework in which the crisis is globalized but unequal and in the absence of a welfare system capable of responding to the urgencies of the most marginalized social contexts and groups, a response to the new social and individual needs has been offered by cultural institutions that play a role of territorial agency, often independently or in the absence of political institutions.

Far from the idea of entertainment and divertimento, it is in fact increasingly clear how the practices of cultural innovation, experimenting with various forms of action and participation, can in some cases play a fundamental role in the processes of social cohesion and community building, representing an antidote to the worsening of the phenomena of marginalization and socio-spatial inequalities within cities and territories (Colantonio and Dixon, 2011; Olsen, 2018; Sacco and Blessi, 2009).

In the current (post-) pandemic context and through the lens of a southern European perspective, the purpose of this article is to critically reflect about the role of culture as possible vehicle of urban and community regeneration. In particular, we will focus on the activities of the no profit organization «Laboratorio Zen Insieme» in ZEN2, one of the last large popular and peripheral neighborhoods built in Palermo at the end of 80s, in order to explore and understand how cultural practices work as agent of urban and social transformation capable of addressing emerging issues, especially in the pandemic scenario we are experiencing.

The case study has been conducted through analysis of documents, participative observations (Honer and Hitzler, 2015), and qualitative in-depth interviews with key actors involved in the conception, organization and management of the activities carried out by Laboratorio Zen Insieme, with representatives of local institutions and non-formal conversations with participants of the workshops held in the neighborhood.

The experience we narrate finds that cultural practices have re-conceptualized their design and functions as strategies of urban and community regeneration and at the same time have contributed to answer to emergent issues in developing proximity and local based strategies, facing up to problems inherent civil rights, educational poverty, socio-spatial justice and have changed the image and identity of urban places they inhabit. In this sense, the research provides a framework for development of strategies and legitimization for cultural practices and a point of discussion about their role in urban development.

*Keywords: urban regeneration, cultural practices, community engagement, social inclusion, cultural urban planning*

## Porto Alegre & Rio Guaíba: Revive or Die!

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### Extended abstract

As far as changing cities in contemporary times are concerned the case today seems quite simple: cities either tend to Revive or to Die. This seemingly uncontrollable contradiction is a consequence of the dominance of the coronavirus pestilence, which has already imposed an aggressive threatening upon the furtherance of urbanisation, seemingly of no likely return over humankind. Fortunately, there is not only bad news on this side of the equation. Paradoxically, the disgraceful pandemics may also involve innovative trends that may advance new hopes to cope with the problems.

In my last participation in this series of conferences (Changing Cities IV, Chania, Crete Island, Greece, June 2019) I presented the paper “Relentless Resilience”, in which I have approached the phenomenon of city resilience as a strategy for contemporary placemaking.

In the present paper I argue that a reasonable resolution for the future of urbanisation could lie therein, because eventually there could be at least two beneficial attitudes people could derive from the crisis: (i) people are growing desperate to intensify their socialisation practices; (ii) people are growing increasingly conscious of the need to live in a healthier environment. In this reasoning, resilience of certain structural city components seems to offer a reasonable alternative for the adverse growth of present-day urbanisation.

So, now, I intend to focus on the urbanistic project “Guaíba Shores”, being implemented in my own city, Porto Alegre, south Brazil. The project is now becoming implemented, originally designed by Brazilian architect Jaime Lerner, author of the book “Urban Acupuncture”. I am interested in this implementation because it involves new regards in the theory of urbanism, which looks at changes in cities, as usually involving two kinds of experiences, mainly by addressing two simple actions: inventing and reinventing places.

Recent literature in urbanism is prodigal in presenting practical examples of the two circumstances, investigating them as ‘placemaking’, in the first case (inventing places), and ‘resilience’ of disused spaces (reinventing places). The innovative bibliographical directions are advanced in titles as the ones signed by: Karen Franck and Quentin Stevens (Loose Space. Possibility and diversity in urban life); Mike Lydon and Anthony Garcia (Tactical Urbanism); Charles Wolfe, (Urbanism Without Effort), and Jaime Lerner (Urban Acupuncture, Celebrating Pinpricks of Change that Enrich City Life).

Now, this deserve further investigation, because it involves sustainability and resilience, two of the factors encouraged to be examined in the papers for this conference.

*Keywords: resilience; place; urbanity.*

# **Aban(donment), the solution in the problem. The collective patrimony subject to civic uses as a gift-resource for local development in the municipalities of the southern regions, case studies**

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## **Extended Abstract**

The choice of the title "abandonment", highlighting the term "gift", is not accidental. It derives, in fact, from the desire to underline the intent of this contribution. That is, to reason on the areas subject to civic uses to verify and therefore demonstrate how these areas, which are publicly owned but which in most cases are abandoned or assigned to private subjects, without any return in economic terms, can be framed as a gift-resource. This last aspect becomes even more important if we consider that, in fact, these are areas which, in the Middle Ages, were granted as a benefit (gift) to the community to satisfy essential needs. Now, if in the past they had the function of sustenance, today, the recovery of these precious resources could represent a lever of local development. Moreover, even if these areas are usually outside the built-up area, they are still ontologically connected with the city and therefore with the community that inhabits it and realises this connection. In this sense, they are also a resource for urban regeneration as they could contribute to tackling global warming as well as generating jobs, for example.

Now, understanding what these areas look like today means analysing their management over time. Thus, by reviewing the 8 design principles proposed by Elinor Ostrom, Nobel Prize winner for economics, it is possible to understand why the 'gift' has become a resource or, rather, has been abandoned.

Moreover, in order to understand the state of the art in these areas, one cannot avoid considering the time variable, especially linked to the complex history of collective property.

Considering management and time means taking into account the anthropic action of man, over time, in these areas and therefore in the landscape. Thus, referring to the definition of landscape as given by the "European Landscape Convention", that is « "Landscape" designates a specific part of the territory, as perceived by the populations, the character of which derives from the action of natural and/or human factors and their interrelationships», the correlation between collective heritage subject to civic uses and landscape is inevitable and, moreover, one is contained in the other.

With regard to this last aspect, that of the landscape, it is through geo-referencing and comparison with land use in the five regions of southern Italy - Sicily, Calabria, Basilicata, Apulia and Campania - that the state of the art can be better understood.

Therefore, considering that the key words of this contribution are management, time and landscape, taking note of the state of the art and using the case of the state forests of Troina, the common lands in Emilia-Romagna, as an example of good practice, the question arises: could the collective heritage subject to civic uses actually represent a resource for promoting local development?

*Keywords: Civic uses; Gift; Resource; Management; Heritage; Time; Anthropogenic Action*

# Changing Cities for Resilience against Climate Changes: Architectural, Engineering and Human Health Implications – The H2020 Project HARMONIA

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## Extended abstract

Climate changes are inducing big variations in the “actions” that are normally considered in design of buildings and more in general in Risk Analysis for Urban environments. Extreme Winds, Heat Islands, Instant Floodings are natural phenomena that become more and more frequent, causing large economical damages as well as human lives losses.

The Architects & Engineering Community response, in order to try to improve the Cities’ resilience toward such “Extreme Actions” is inducing a global “re-thinking” of Urban Environments, introducing a number of more or less innovative solutions to increase the inhabitants’ well-being.

One of these strategies is the introduction of Green Vertical Walls as façades of buildings, a technology that, most probably, will in the next future at least partially replace the technology of the curtain-wall façades made of steel and glass.

However, a massive introduction of this very promising technology is, at present, partially prevented by a number of uncertainties related to some problems of different nature: Technological (e.g. interaction of the green wall with the building façade), Structural (e.g. how to consider the drag forces due to the wind, as a function of the greeneries used in the wall), Health&Safety (e.g. increment of PMs during the blooming season).

This paper (based on experimental results of some pilot study carried out at Politecnico di Milano) tries to summarize the main advantages and disadvantages of this technology, while introducing the H2020 European Research Project HARMONIA, which is dealing with Climate Changes and, in accordance with the approach of Vulnerability Assessment and Risk Management, aims at providing hazard indicators that can help policy makers and also increase citizens

*Keywords: urban health; risk assessment; COVID-19 pandemic; built environment; urban adaptation*

# Earthquake and pandemic in Central Italy: urban regeneration of historical cities and the role of new public spaces in reshaping urban identity

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## Extended abstract

The core of Central Italy is a mountainous and hilly region featuring a multitude of medium-to-small cities and towns, mostly of historical origin, each of which surrounded by a galaxy of peri-urban areas, rural villages and scattered dwellings of various type. With the exception of some of the most recent settlements, the urban environments are placed harmoniously in the landscape, following the constraints of a rough geomorphology that has driven the urban and road evolution of the region. Notwithstanding the richness and value of the cultural and architectural heritage, the area has progressively underwent a number of issues, for several decades now, such as socio-economic and political marginalization, population decrease and aging, abandonment of places and activities, shrinking phenomena, etc.

In 2016, a series of catastrophic earthquakes has dramatically impacted on 138 municipalities, with many of the historical centres turned into ghost towns in urgent need of regeneration. In some cases, the implementation of urban redevelopment plans has started after not too long, in a clear and convincing manner; in some others, it is just looming pale on the horizon; in others still it is missing, and sometimes it seems even far yet to come. Whatever the case, public spaces are about to be deeply reshaped by the new urban designs, not only for security reasons due to the post-seismic rearrangement of the urban fabric in view of future possible events (i.e. for making room for instance to escaping routes, gathering areas, etc.), but also due to the need of open spaces for outdoor activities and social distancing urged by the pandemic.

As different typologies of urban areas present different types of public spaces, the understanding of this historical and functional relationship is key to plan any sensible rearrangement of the urban environments, as well as to monitor and evaluate the already ongoing transformations. In this sense, emblematic is the example of Camerino, a historical town in the inland of Marche Region, where the fate of some public open spaces of utmost importance for the Old Town is still pending, also because of the recent stop to the *Extraordinary Programme of Reconstruction (PSR – Programma Straordinario di Ricostruzione)*, forced by the government crisis of the City Hall. This programme is a tool created by the Office of the Extraordinary Commissioner for the Reconstruction of Central Italy, made available to local Authorities to orient and integrate at best the physical and socio-economic regeneration of the cities affected by the seismic, and now pandemic, events.

The University of Camerino is producing scientific research on all that, participating to the debate about the future of public spaces in historical towns, and closely following the practice of urban administrations and professionals who are in charge of making changes real. Research projects particularly significant for this purpose are RE-LAND (RESilientLANDscapes) and PRE-PLAN (PREventivePLANning for disaster-resilient territories), besides the ongoing collaboration between the Research Consortium REDI (REDucing risks of natural DISasters) and the Governmental Dept. Casa Italia, Presidency of the Council of Ministers.

*Keywords: post-disaster regeneration, historical town, urban environment, outdoor activities, Central Italy*

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## Privileged places in the city: urban quality, livability, sustainability

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### Extended abstract

The pandemic emergency we have been experiencing since March 2020 has greatly changed the way we inhabit cities and our homes. We found ourselves confined for months, each in their own homes, avoiding public contacts and moments of conviviality. In an almost surreal scenario, with deserted, depopulated and silent inhabited centers, the "limits" of urbanization have been further emphasized. More than in the past, in fact, there has been a greater urban social discomfort, a greater gap between rich and poor, a greater gap between urban centers and peripheral areas due to the lack of services and equipment of primary importance, essential to guarantee and satisfy the well-being of the community and the quality of living. In this context, particular attention should be paid to the role of public spaces - indoors or outdoors, such as: squares, open spaces, streets, public gardens, areas of relevance, sports and leisure facilities, car parks, public transport stops, shopping centers, service areas, etc. - emptied and unreachable during lockdowns for the Covid-19 emergency, the lack of which certainly could not be filled by remote connections and virtual meetings. Hence the need to rethink the places of sociality, where you can interact directly and disintermediately, through new financial and urban planning strategies. Public spaces that reflect and identify the state of health of the city, of the work of the administrators, which reflect the "goodness" of business ideas and the ability to implement them. Public spaces are *privileged places in the city* where the interpersonal skills and creativity of citizens are recorded. Unfortunately, conurbation phenomena have taken over, leaving local places and identities to disintegrate, marking a clear break between community and settlement, undermining the common good and the use of public spaces. To improve well-being and quality of life, public spaces must be attractive and safe, which is why they must be designed according to principles that meet the needs and expectations of all citizens, with particular attention to the weakest, as indicated in the *Public Space Charter* in 2013, in line with the *European Landscape Convention* and the United Nations Program for Human Settlements (UN-Habitat). Seniors and children must be able to use public space unconditionally, allowing them to create or maintain a solid network of social contacts. Whether you are in an old town, a village core, a suburban residential area, a disused building, an industrial area, a commercial area or on the banks of a river, public space design always requires a complete vision of the urban, architectural and social aspects. This study investigates the quality of public spaces in some urban realities - national and international - which have become examples of sustainable urban regeneration, places of sociality and hospitality.

*Keywords: public spaces, livability, creativity, sociality*

# Art as Catalyst for Community and Economic Development

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## Extended Abstract

Inclusionary place-based art has the potential to catalyze community and economic development. Traditionally, visual or plastic art is created by the solitary artist and then presented to the viewer for consumption. The viewing occurs in commercial or public museums. The artist dialogues with the medium. Then the viewer dialogues with the product in separate spaces and at separate times. The ultimate dialogue occurs between the critic and the work. In a market economy, a secondary critique occurs between the work and the consumer (buyer). Public art repeats the same process. The artist creates the monument, places it in a monumental space and then the viewer looks at it and forms an opinion. It is focused on a stimulus-response mental process.

### ARTIST ↔ ART OBJECT ↔ AUDIENCE

As artists, we have concluded that the paradigm of how art is created and how it is experienced might be modified. Art involving “community engagement” suggests that a more inclusive paradigm engages the viewer in the process of creating and experiencing. Our art suggests that there is a larger audience for art as well. Rather than art occurring in a linear process it can occur in a way that engages the viewer more intently in the process:

ARTIST



COMMUNITY ↔ OBJECT

Art is created in community, with community members as participant and as recipients. The theory of creating art inclusive of civic participation has been tested in multiple venues with verifiable results such as: 1) Popotla, Baja California (B.C.), México: Sculptural installation generated community pride, increased business and modified environmental policies in a fishing village. 2) San Isidro neighborhood in Old Havana. Cuba: Useable public art installation via the “7<sup>th</sup> Havana Biennale, 2000” increased public infrastructure investment, economic development, and catalyzed the formation of the San Isidro Arts District. 3) Colonia Lomas Verdes, Tijuana, B.C., México: Sculptural installation resulted in a public park and increased infrastructure investment in the Colonia. 4) San Ysidro, California, USA: Art installation catalyzed stylized affordable housing, new cultural venues and community cohesion. 5) City Heights, San Diego, California, USA: Pop-up sculptural installation catalyzed informal economy stimulus, public improvements. Similar efforts are currently being pursued in La Rumurosa, B.C., México, involving the Kumiai/Kumeyay transnational Nations.

Inclusionary approach to art can facilitate/provoke economic and community development in a greater way than the linear process. Art in community has micro- and macro-economic impacts. Specific projects can impact specific environments while multiple projects, repeated throughout a City have the potential to redefine the urban experience wholesale. On a large scale, it builds community and creates identity that can translate into macroeconomic benefit.

*Keywords: community engagement/ownership, inclusive paradigm, cultural tourism, public art installation*

## NO D.A.D: the classroom in open space

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### Extended abstract

Facing to the problem of Covid-19 in 2020 and 2021, the continuous lockdown and closure of school made the parents getting mad: the young kids were taking DAD (*Didattica A Distanza*: distance education), and the parents were obliged to stay at home to make smart work meanwhile to take care with their kids.

The co-founders of RECS Architects, Arch.Pier Maria Giordani and Arch.Chen Zhen, also as two desperate “Dad” (father) exhausted with this situation - kids need parents to accompany with during DAD, decided to make the project NO DAD: Create open classroom to against DAD; non need “Dad” (father) for DAD.

We believe the project NO DAD can kill four birds with one stone.

FIRST: Of course, the open space is safer during the epidemic period and the mask could be also not mandatory. The fear of the virus will be tempered by nature and the tranquility will return to the mind of children. The criticism of this approach is always the same: the climate. We should notice that the temperature cannot be a problem: from Naples downwards, the mild temperature allows you to be outdoors all year round. From Bologna to Naples, it is possible from March to November. Throughout the pre-Alpine belt (Turin - Milan - Brescia - Verona - Treviso) people can stay outdoors in April, May, and June and again in September and October.

SECOND: The outdoor teaching would be realized, which encouraged and pushed by Italian government for about ten years, to let little children to embrace the open area, and discover the seasons and the evolution of the natural environment, without fear of atmospheric conditions.

THIRD: This push towards the outside could finally put the school, understood as a cultural, sport and social institution, in a position to open to the city by sharing its spaces with it, finally demolish the boundary walls between the world of students and citizens. The space is flexible for both educational and social uses. At the same time, when the school will not be able to count on its own open spaces, the city will lend them, in fact many schools are adjacent to gardens and parks which would thus fulfill the needs of outdoor spaces.

FOURTH: In this way a lot of forgotten spaces around the school and park can be requalified and adapted to the useful function, and the intervention cost is much lower than the normal construction or renovation of the school building.

We projected five open classroom prototypes to some Italian municipality governments, and this idea was appreciated by some wise political leaders. Thanks to them all the five prototypes (exactly eight open classrooms) have been constructed until now and were proved very useful to the school and the city.

*Keywords: open classroom; Covid-19 and public spaces; NO DAD*

# **Spatial memory, a stability factor in post-traumatic recovery at risk**

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## **Extended abstract**

The built space as a value of reporting resource (cultural, identity, functional, perceptual connectivity and affectivity) has an essential role in shaping the human personality and community belonging as its social dimension. Spatial memory is a field of semantic sedimentation or episodic flashes, an unfolding, an overlapping of perceptions amalgamated in a coded montage. The direct relation to the spatial landmarks gives us existential stability, their disappearance confuses us. Studying the relationship of citizens with the city, through the way of reporting understanding of urban information, it was found that multisensory perception but first and foremost the visual one develops "the ability to retain and evoke images" ("imageability"). (Lynch, K., 1960). In order to determine the reason why certain characteristics are selected, in the elaboration of "image map" of each individual, extensive sociological analyses were made identifying 5 markers (engram) (path, node, landmark, edge, district) which through an imprinting process – „engrafie” forms in memory "mental map". (Lynch, K., 1960), Harrison JP Howard WA – 1973 illustration of a "retrieving" recovery. All these markers identified as elements of "urban symbolism" characterize the correspondence between the production of space - (distinct natural space), the perception of space and its representation" (Lefbvre H. 1974). Quantifying the frequency of these spatial markers forms the values of resource, of perceptual connectivity. The relationship between the city and the inhabitants within the urban ecosystem is defined not only by urban entities but especially by urban life. Thus, the space coded as the anatomy of existence through "Sein" (to be) is revealed by living it, through "Da Sein" (to be there) as the meaning of existence (Heidegger M - 2012). The living in space of the being is a fragile balance between the multiple constraints received at birth (ethnicity, sex, religion, customs) and those gained through experience, direct experience (Liiceanu G. 2012). Individual or collective spatial existence, an accumulation of events of autobiographical flashes is hoarded in the episodic emotional memory of the person, group or community forming the value of resource, individualized identity, personified (ethnic, religious, historical, memorial, symbolic, mythical). Each built space has an initial aspiration, transmits a history of edification and existence, becoming for us a permanent testimony and revelation of our own identity (Gociman C.O. & all 2019). The physical disappearance of the spatial heritage by aggression by a hazard will affect the reporting values of the being activating the memory as a zone of post-traumatic stability. Reconstruction will call for the reading of these sedimented values using both semantic and episodic memory to restore existential balance. The case study analyses the effects of the extensive urban restructuring on Arsenal Hill on the traumatized and displaced population, by the demolitions ordered by the communist regime after the earthquake of 04.03.1977. The monuments saved by relocation (the churches of the monasteries Mihai Vodă and the Hermitage of the Nunneries) (Spețeanu VG 2011) were altered as perception, as a valuable resource of reporting by losing the premises and moving from the original sites losing certain spatial qualities and requiring value restoration reporting. Activating community memory can provide us with post-traumatic recovery solutions.

*Keywords: spatial memory, perceptual connectivity, post-traumatic recovery*

## **Book of Abstracts**

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# Exploring formal and informal means of improving spatial quality in cities across Europe: the role of financial tools

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## Extended abstract

Urban Maestro is a major research initiative funded under Horizon 2020 that ran from December 2018 to February 2021 by a partnership between United Nations Human Settlements Programme (UN-Habitat), Bouwmeester Maître Architecte Brussels (BMA) and the Bartlett School of Planning at University College London (UCL).

The research looked at the ways European cities are being designed and financed, focusing on innovative ways of generating and implementing urban spatial quality: the **“soft power” modalities of urban design governance**. Soft power modalities refer to those approaches where public authorities act in an informal capacity as enablers or brokers rather than through formal regulatory or direct investment powers. Examples include multi-stakeholder design platforms, bouwmeesters, city-architects, quality negotiation mechanisms and the like. The action focused on these processes and how they are being used to shape cities through means short of regulation, direct design or development.

To explore these issues the work programme mapped out the design governance landscape in jurisdictions across Europe (hard and soft / formal and informal); burrowed down into their workings via a series of pan-European workshops; contrasted experiences in Europe to international practices elsewhere; used the initiative to build a long-term network for sharing best practice; and supported policy uptake focussed on the drive to urban quality across the continent, and globally.

In this presentation, Tommaso Gabrieli (Co-Investigator at UCL) will present final findings on how different countries and cities across Europe have been intervening to shape the design and quality of the built environment, through which sorts of tools and how their choices relate to the political, economic and democratic systems and priorities of these countries. In particular, the emphasis will be on innovative policies and practices in urban design governance that relate to financial instruments.

*Keywords: Urban Finance; Spatial Quality in Europe*



**THE EXCEPTION AS THE RULE: THE DARK SIDE OF  
PLANNING**



**Changing Cities V, Corfu, 20-25 June 2022**

**Organized and chaired by Prof. Francesco Lo Piccolo & Prof. Vincenzo Todaro**

**Prof. Francesco Lo Piccolo**, Department of Architecture, University of Palermo, Italy

**Prof. Vincenzo Todaro**, Department of Architecture, University of Palermo, Italy



## **Space as an Actor: the Hidden Rules of the City**

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### **Extended Abstract**

The paper takes stock from the field-works developed for two years by an international class of students of the Master in Architecture or Planning at Politecnico di Milano. Specifically, our course in Urban Ethnography aims at helping students in developing an ethnographical path that could be helpful for designers (Cranz, 2016), giving a particular attention to the intertwining between people, spaces and practices in the everyday (de Certeau, 1984). Based on an exploration (through direct observation and photography), students have to develop an individual essay on the role that rules have in the way places are used, organised and designed. The city as a complex environment is densely framed by norms and rules that dictate the way in which objects, buildings, private and public spaces are conceived and used for human action (Lieto, 2017). Rules and norms are often not explicitly visible, but they act as a hidden code and have a strong impact on the way in which life in the city is experienced. They are a social and cultural construct leading also to spatial effects. While globalisation and standardisation have a relevant impact in shaping the urban environment across the world, in each different context rules and norms may be different and give evidence to the diverse use that people with different backgrounds (as students of our class are) make of the same place.

*Keywords: hidden rules, city, ethnography for designers, spatial practices, everyday life*

## Escorting death: exclusion as the impossibility of inhabitation

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### Extended abstract

Drawing on current research on the infrastructures of protection and life as a register to interrogate the again central tensions of life-and-death and its biopolitics, the paper reflects on the "dark side planning" looking at how different regime of separation(s) based on racial and ethnic discrimination and driven by consumer logic, privatisation, and deregulation, intensify and deepen inequalities in urban settings are going beyond exclusions as we know it. While there is no doubt that planning is facilitating political control through socio-spatial division, I would argue that possibly one of the salient features of current exclusionary practices is not only to seclude and impoverish, to divide and extract value, to coerce and police, to control and datafy bodies and movements, but to make impossible inhabitation. Reflection on the inhabitable will hopefully shed new lights on the role of architecture and planning in imagine equitable futures.

That life and death are co-implicated is a tautology since Foucault, but the continuous global practices of the capitalist machinery (Lazzarato) of abandonment, isolation and slow death make their spatial implication and their biopolitical dimension imperative in any analytic. If, on the one hand, biopolitics has become an inescapable term used to analyze a wide range of processes, procedures, power relations of institutions linked to the politicization of life, on the other hand, its various declinations of "affirmative", "negative" or "necropolitical" have made more evident the complicity of architecture, planning and space in general, in the construction of political technologies and infrastructures that mark, distribute, constitute, and expose life beyond the original binary opposition of "let live/let die" as originally expressed by Foucault. This paper will trace a reflection on the mechanisms of additions, securitisations, containments, protections, taken from critical border studies, critical migration studies and camp studies, complementing them with reflections on bans, subtractions, violent inactions such as those imposed in the government of migrants at the European borders with the complicity of the humanitarian system, wtoproblematise the notion of inhabitation and the ambivalence of lifelines. Biopolitics thus is understood as debilitation erosion, precarisation and hypermobilisation. Not only production of infrastructure, but subtraction of the same literally "taking the ground" (Tazzioli) from life. Such expansion to the notion of exclusion as ontological impossibility of permanence will bring - in the second part of the paper - to a reflection on *lifelines*, a concept-in-progress, that emerged as a register to interrogate the again central tensions of life-and-death and their variegated regime of separation(s) complemented with the state of exception (Agamben), introducing the notion of inhabitation. As life is always and inhabitant life (in time, in space, in relations) and therefore always political, lifelines might help us to interrogate how we can inhabit when the "house is burning" where everything and everyone human and non-human is about to disappear.

*Keywords: heritage; exclusion; inhabitation; death; futures; Agamben*

# Affects, Bodies and Antipluralist “Activism”: The Dark Sides of Public Space Protests

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## Extended abstract

Public space protests and urban resistance have been often coined as emancipatory forms of constituting ‘the political’ vis-a-vis ‘politics’ in the city. Very often, activist ideas, actions and methods have been romanticized as the glue that renews democratic practices through interventions and other forms of resistance in urban public space. However, what we currently see throughout the pandemic pressures on urban societies is an affective and embodied protest of violent political nature, undermining basic ideas of freedom of speech, the press and the guaranteeing of respect and dignity for everyone. Scholars in planning theory and urban studies are slowly grasping that a more sober analysis of activism in public space is needed. In our conference contribution we draw, among others, on Giorgio Agamben’s concept of the state of exception which he has first developed in his work *Homo Sacer: Sovereign Power and Bare Life* (1995) and further expanded in *State of Exception* (2005). We explore to what extent his theoretical endeavor can be fruitful for analyzing current urban protests and resistance emerging as a result of pandemic measures. More precisely, we aim to discuss how Agamben’s thought can help to distinguish pluralistic quests for equity and democracy from anti-pluralistic protest against ‘the elites’ and for ‘the people’. Our empirical focus lies on the capital of Austria, Vienna, where – like in many other European cities and beyond – people regularly take to the streets, using their bodies and voices to collectively demonstrate against different state measures to the COVID-19 pandemic. In our presentation we seek to link first thoughts on empirical evidence of ‘politically violent ‘activism’ under pandemic circumstances with an ambivalent take on Agamben’s work. We particularly draw on further conceptual developments of his work that argue for an increasingly diffusion of the ‘normalization’ of the state of exception in the everyday life, and approach contemporary forms of COVID protest in terms of Agamben’s theory in two ways: On the one hand, we want to examine how the current COVID protests legitimize their violent forms of urban resistance as a response to an impending state of exception by the government. On the other hand, we aim to explore the question of whether these demonstrations actually advocate policies of exception themselves. Agamben’s theoretical work could then serve as an analytical lens for differentiating anti-pluralist forms of resistance from progressive demands for equity and democracy. In our contribution we discuss potentials and pitfalls of such theoretical endeavors in order to decipher manifest and socially divisive transitions in urban everyday life.

*Keywords: public space; urban resistance; anti-pluralism; state of exception; COVID-19 protests*

# **Graying the Dark Side of Planning through Planning Education: an Autobiographical Account**

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## **Extended abstract**

Since first conceptualizations of the dark side of planning (Flyvbjerg, 1996; Yiftachel, 1998), critical theories of planning have been focusing on exploring how planning practices are used instrumentally as mechanisms of social control and oppression. By producing critical scholarship reflecting on the dark side, scholars worldwide have increasingly eclipsed the normative mandate of the planning discipline and developed an enthusiasm over academic practices aiming at empathetically supporting existing social movements to make the world a better place. In this paper, we suggest that a mutual transformative relation between researchers and socially oppressed and disenfranchised groups should be at the core of the academic planning enterprise to build movements toward change. The paper draws from the personal involvement of the two authors in action research projects in Italy and the US (Saija, 2017). By using post-modern epistemologies combining forms of libertarian pedagogy and social mobilization, the authors' experiences show how to use planning research to construct intentional and collective actions for empowerment to counter the dark side of planning.

*Keywords: Action Research, Empowerment Planning, dark side, Italy, USA.*

# Spatial consequences of the COVID-19 state of exception: before and after scenarios through citizens' digital traces

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## Extended abstract

The Covid-19 emergency has brought radical changes to the multiple dimensions that comprise the physical, social, functional, and economic structure of cities. The special conditions in which international politics have been immersed due to the crisis have led to exceptional governmental measures and recommendations in the use of city spaces in order to guarantee social distancing and thus preventing the spiking of cases. Fast-paced reactions adopted such as city-owned sidewalks and roadways becoming the spatial extension of establishments have impacted the natural pre-pandemic social and economic activity patterns. This research examines the spatial consequences of the COVID-19 state of exception by carrying out neighborhood-scale diagnoses of before-and-after pandemic scenarios through the citizens' digital traces left on social media platforms. These tools have proven to be very useful for obtaining an updated view on collective behaviors and perceptions in the face of crisis situations. This fact together with the continuing increase and availability of information as a clear consequence of the COVID-19 pandemic has attracted scientific interest for measuring the impact and consequences that the outbreak has left the social, spatial, and urban realities. Specifically, this research uses the geolocated data shared in the social networks Foursquare, Twitter and Google Places to identify transformations in three different aspects: (i) identifiable shifts in the social use and collective demand of establishments and urban spaces through the analysis of pre and post COVID-19 datasets retrieved from Foursquare; (ii) differences in the amount and distribution of users sharing messages on Twitter; and, (iii) changes in the number and types of urban economic activity registered in Google Places before and after the pandemic crisis. Two neighborhoods with contrasted socioeconomic profiles have been selected in three case study cities whose countries have adopted rather different non-medical pandemic measures: Valencia in Spain, where strict containment measures have been taken; Mexico City, where confinement and suspension of non-essential activity have not been a mandatory requirement in most cases and where a traffic-light contagion levels system has been used to measure the epidemic risk; and, lastly, Gothenburg in Sweden, the Nordic country with most relaxed measures. The comparison of pre and post COVID-19 pandemic datasets offers insights that evidence neighborhood-scale spatial transformations that have occurred as a consequence of the state of exception. All in all, the contribution of this study is twofold, first, to the existing knowledge on monitoring changes and transformations through geolocated social media data, and second, to the identification of future lines of action for reducing the vulnerability of urban areas in the face of future crises.

*Keywords: urban activity, economic activity, social media data, neighborhood, urban dynamics, COVID-19*

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# Nation, Nationalism, and the Politics of Space - Exploring the Tensions and Relations between Nationalism Studies and Urban Scholarship

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## Extended abstract

Considering the current rise of far-right political influence, the spatial sciences have contributed to an understanding of how urban space is made a central arena of anti- and ethnopluralist, xenophobic and nationalist movements and exposed the dark sides of political appropriations of space. Less contributions have examined how nationalism is inscribed into everyday praxis, life and relations in cities, and how urban development is relevant in nation-building and cultural unification. Connecting urban studies with nationalism studies, this paper aims to draw out the relations and tensions between nationalism and the production of urban spaces.

In the first part, this paper traces the semantic transformation of nationalism in both the academic and public discourse as historically contingent and object to change through political, cultural, and social change. While earlier nationalism studies focused on the emancipatory struggles and material conditions of nation-states, later, more critical analyses of nationalism from the 1980s onwards offered an understanding of nations as social products. Following the different definitions of national belonging and their transformation with the case of Second Republic of Austria, these insights from nationalism studies are brought in touch with the level of the city: How is nationalism (re-)produced or manifested in urban spaces and every life? Recent, more critical analyses understand nationalism as “real fiction”, since while a common national identity might be socially constructed, nation-states have material effects on people’s lives. The concept of *Banal Nationalism* includes the ideological habits through which stable nation-states reproduce themselves as powerful order of economic, social and conscient relations. Both these concepts offer a valuable perspective on both material and everyday reproductions of nationalism through the production of urban spaces, which are presumed to be at the foundation of more extreme, discriminatory, or violent forms of nationalism and thus can inform the growing relevance of urban spaces for far-right mobilisations.

*Keywords: semantic transformation of nationalism, anti-ethnopluralist, xenophobic and nationalist movements, production of urban spaces*



**CULTURE, COHESION AND PLANNING IN DIVERSE  
TERRESTRIAL AND MARINE ENVIRONMENTS**



Changing Cities V, Corfu, 20-25 June 2022

**Organized and chaired by Prof. Stella Sofia Kyvelou**

**Prof. Stella Sofia Kyvelou**, Department of Economic and Regional development, Panteion University of  
Social and Political Sciences



# Near-shore Multi-use of marine space: potential and prospects on the Greek coasts

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## Extended abstract

Whilst the Sustainable Development Goal (SDG) 14 promotes the conservation and sustainable use of the oceans, seas and marine resources for sustainable development, the concept, practice and emerging management responsibility of maritime spatial planning (MSP) is gaining ground worldwide, mainly as a “trade-off” procedure. MSP is directly related to the marine critical natural capital degradation, the current demands for the ever-increasing exploitation of marine resources and the emergence of conflicts between traditional and new uses of marine space.

Competing claims for marine allocation are, potentially, home for conflicts. Still, they may alternatively lead to joint benefits if intelligent and creative planning concepts that involve co-location and assemblages of uses are sought, taking into account that not all uses are compatible with each other and that complexity results from the potential co-existence of traditional activities (fisheries, maritime traffic or even military uses) with the new blue growth industries (marine aquaculture, wind farms, sea bed mining etc.).

Decisions in MSP follow annoying and costly trade-offs and this is a condition that may negatively impact its acceptance. The alternative is “win-win” decisions that rarely occur in current MSP procedures. To address conflicts and cumulative impacts, and as much as possible, favor win-win options, it is necessary to develop integrated and coherent planning approaches and new management, monitoring and evaluation tools, taking into account that not all uses are compatible with each other (Michler-Cieluch et al. 2009, Kyriazi et al. 2016) raises considerable complexity.

Therefore, in order to address conflicts and cumulative effects and to favor such alternatives as much as possible, it is necessary to promote integrated and coherent design approaches and new governance and management tools as well as tools for monitoring and continuous project evaluation.

Furthermore, it should not be overlooked that the distribution of maritime space is not only a matter of growing maritime claims from both traditional and new marine uses associated with Blue Growth, but is also subject to political and geopolitical conflicts.

In this context, the following will be attempted:

1. a critical analysis of the multi-use of the marine space through the study of some good practices, in order to conclude whether and how rational management of natural and energy marine resources and spatial efficiency can be achieved.
2. Examination of Multi-use in different countries and European sea-basins (North sea, Balic sea etc.), both institutionally and in practice, but also a critical approach to the applicability of Multi-use in Greece. It should be noted that the recently published "National Spatial Strategy for the Marine space" still under consultation process, merely mentions the possibility of co-existence of certain maritime uses such as aquaculture and offshore wind farms.
3. Further analysis of the potential of multi-use in the case of coexistence of aquaculture with other compatible uses (e.g tourism), based both on a literature review and on a specially designed survey.

*Keywords: coastal zone, land-sea interaction, multi-use, aquaculture, tourism, Greece*

## **Balancing the management of the cultural and natural commons and market choices through Multi-use settings: towards evolutionary aspects of Maritime Spatial Planning (MSP)**

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### **Extended abstract**

The current presentation will discuss the potential of soft MUs involving Maritime/Underwater Cultural Heritage (MUCH), tourism and nature conservation. To identify usual claims from and conflicts between maritime uses, it chooses as case-study Greece and as focus area the National Park of Alonissos in the Aegean initially established for the conservation of the Mediterranean monk seal *Monachusmonachus*. MUCH-driven MUs are being increasingly practiced in the country without a special framework other than sectoral laws ( issued by the Ministries of Culture and Tourism accordingly) and licensing procedure and the “National Spatial Strategy for the Marine Space” (2022) makes a few mentions on them, mainly because of the willingness to develop a well-delimited and low environmental impact diving tourism in combination with Underwater Cultural heritage (UCH) as a niche tourism in the Greek waters.

The research is aiming at investigating the opportunity for development of the Multi-use combination involving Maritime/Underwater Cultural Heritage, diving tourism, &nature conservation (within or close to MPAs) in Greece. Based on desk research and active stakeholder engagement, the study identifies the main Drivers and Barriers of multi-use, the expected Added values (benefits) of its implementation, and its potential negative Impacts. Moreover, recommendations are proposed to overcome the identified barriers and impacts with the support of MSP and to further exploit multi-use potential at the local, regional, national and cross-border levels.

The article concludes that despite market preferences of exclusivity on the marine space, especially in the coastal zone and to the detriment of conservation areas, there is a huge potential for soft MUs development especially when natural and cultural capital may be essentially reconnected and blue economy prospects may prospects of blue economy through tourism can be served.

The authors suggest UCH-driven MU as a tool for sustainable use of sea space, supporting social and cultural aspects of blue economy and promoting the ecosystem-based approach to Maritime Spatial Planning (MSP), enhancing, in parallel, its enforceability. The final conclusion is that MSP evolves towards a mechanism both encouraging and controlling market forces simultaneously. Key challenge for MSP is to achieve a balance between market and non-market considerations and outcomes.

*Keywords: Co-existence, Conflicts, Synergies, Multi-Use concept, underwater cultural heritage, heritage tourism, MPAs, Greece*

## The minor ports management: between opportunities and cooperation

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### Extended abstract

Among the various critical issues affecting ports, the governance modality is particularly relevant in the small Italian ports. Unlike the main ports, there is a lesser capacity for the integrated management and a lack of coordination. Moreover, these issues reflect the territorial planning dimension, especially in the urban regulatory plans and policies ranging between different administrative levels. The thesis that this article outlines, and begins to explore, is about a need to bridge this gap with a supra-local level of coordination. A strategic plan on a regional scale, such as the ICZM (Integrated Coastal Zone Management), can guarantee greater coordination - both between and within different ports - and more effective management between the activities that interact with the local maritime space and coastal interfaces. The rare implementation, to date, of this tool by Italian coastal regions has fomented this relational and cooperation discrepancy between both major and minor ports and the minor ports themselves.

The regulation and spatial and strategic planning of the main ports is the responsibility of the Port Authorities, which are in charge of the Maritime State Property, the drafting of port plans, and the implementation of over-port coordination strategies. On the other hand, minor ports have a very different characterization. The mixture of public and private management often coexists in adjacent spaces, generating a set of conflicts and criticalities for which management responsibility is not clear.

It is, right here, possible to recognize a disciplinary gap in planning. If for the major ports there is a coordination and subsidiarity of governance processes from the community scale up to the negotiation carried out by the Port Authorities with the municipal administrations, the management of the smaller realities is delegated to the overlapping - often causal - of local planning instruments. The definition of a strategic coordination framework can also positively interact with local governance issues, typical of many small ports. The land where the major ports are is public property and entrusted by public actors' management (or consortia with the public), the smaller realities, while also being public property, is entrusted (or rather granted) by private actors. The substantial difference of these management models is that the first aims at an interest of growth and collective economic stability, instead the second is based on the principle of entrepreneurship and business and therefore oriented to the maximum profit achievement at the expense - often - of the collective interest. The thesis sustains that in the lack of structural coordination of the minor ports there is an untapped opportunity for more effective management of coastal interfaces. If, on the one hand, the economic activities volume of the different port typologies is not comparable because they are radically different, on the other hand, the territorial extension and the local complexities associated with these realities are similar and equally critical.

*Keywords: integrated planning; coastal management; governance; port's coordination; management plan*

# Towards a circular urban and spatial planning in Greece, under the light of the European Green Deal

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## Extended Abstract

The idea of circular economy proposes the need to revise the conventional life cycle in order to replace usage charges with restoration, elimination of waste and toxic chemicals and transition to the exploitation of renewable energy (Geng et al., 2013; Goldberg, 2017; Hobson, 2016). More precisely, the transition to a circular economy essentially starts in cities, where the economic, social and spatial impact is greater. Given that "sustainable neighborhoods" as well as "sustainable cities" are manifestations of local strategic spatial planning where "spatial marketing" plays a significant role (Kyvelou, 2010), it can be argued **that the circular economy may be a unifying element and at the same time a point of reorganization of urban/territorial policies, specifically in the framework of the European Green Deal.** In this wider analytical environment, three critical issues-research questions are addressed in this paper:

- a) To what extent is it possible to implement the circular actions at the macro level and specifically at the city-country level?
- b) What are the actions that enable the maintenance, evolution and renewal of material flows between the ecosystem and the socio-economic system? and
- c) Focusing on the case of Greece and the Greek cities, to what extent is it possible to implement the circular actions and what initiatives have already been developed or may be developed in this direction?

With this in mind, a "circular urban and spatial planning" proposal for Greece is to provide parameters of circularity in the Local Urban Plans and the Athens Master Plan, to apply green infrastructure principles that are governed by circularity by their nature, while general design should be wrapped around ecosystemic "circular thinking" in terms of resilience thinking.

*Keywords: circular economy, strategic spatial planning, resilient cities, historic buildings*

# Maritime and Underwater Cultural heritage in insular areas; Best practices and perspectives in Greece

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## Extended abstract

Considering the maritime and underwater cultural heritage (MUCH) in the context of Maritime Spatial Planning is gaining importance, over the last decade and attracts the growing interest of the scientific community. It is partly linked with cultural ecosystem services (CES) that is the cultural benefits and values associated with ecosystems. Adopting a system based on ecosystem and cultural services provided by ecosystems is becoming increasingly important in management and decision-making in maritime spatial planning.

This presentation highlights the "cultural ecosystem services" and the consequent "cultural values" envisaged in the MSP process. To this end, it will consider **a case study the Aegean archipelago's cultural values and diversity and the "Aegean cultural potential"** focusing on its importance for the future Maritime Spatial Plans and an island policy taking into account social and cultural aspects. Nowadays, Greece, endowed with vast and invaluable MUCH (Maritime and Underwater Cultural heritage) is working on the recently published National Spatial Strategy for the Marine Space and on the definition of Maritime Areas, among which the South Aegean Maritime Area.

Life on the islands is evolving through and because of the sea and vice versa, and this has a strong social and cultural dimension (Kyvelou & Ierapetritis, 2019). Cultural landscape diversity resulting from land-sea interaction is a real asset for the Region, similarly with the plethora of underwater antiquities and underwater cultural heritage, including wrecks of ancient ships and settlements or ancient harbour installations that lie in the seas, all governed by the Ephorate of Underwater Archaeology of the Hellenic Ministry of Culture, under a strict protection system.

The presentation will be structured around two main axes:

**A.** a discussion about how cultural capital and values are defined in the South Aegean Region, and how sites of cultural significance may be identified and relatively assessed.

**B.** a presentation of relevant insights from the "ANDIKAT" project funded within the framework of the Interreg VA Greece-Cyprus 2014-2020 Cooperation Programme, and specifically from the pilot action that is being implemented by the South Aegean Region. The project seeks to develop a diving tourism network between Greece and Cyprus and envisages the diving routes as a tool to protect the marine environment and preserve and promote the natural and cultural heritage. Furthermore, similar case studies from EU funded projects concerning co-existence of MUCH with diving tourism will be presented.

The conclusions will highlight the "Aegean cultural potential", also under the concept of Payment for Environmental Services (PES).

*Keywords: Maritime Spatial Planning, Socio-cultural values, Cultural Ecosystem Services, Maritime/Underwater Cultural Heritage, South Aegean sea.*

## French bids for the title of European Capital of Culture 2028

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### Extended abstract

Amiens, Bastia, Bourges, Clermont-Ferrand, Lens-Lievin, Nice, Reims, Roubaix, Rouen and Saint-Denis have already announced their candidacy to the title of European capital of culture in 2028, often in connection with their region, after Paris in 1989, Avignon in 2000, Lille in 2004 and Marseille Provence in 2013. Eight cities had applied for 2013: Amiens, Bordeaux, Lyon, Marseille, Nice, Saint-Étienne, Strasbourg and Toulouse. The growing appeal of the title of European Capital of Culture, especially after the success of Lille and Marseille, has led to numerous bids despite the high cost of preparing and implementing the bid.

Lille and Marseille were chosen because they needed to catch up on their cultural and territorial development. This aspect is increasingly important in support of medium-sized and even small towns. Grouped bids, such as Lille (Euro metropole) in 2004 and Marseille Provence in 2013, make it possible to spread the costs somewhat among the municipalities and to obtain support more easily from the public authorities concerned (inter-municipalities, departments, regions, State) in addition to that of the European Union (Melina Mercouri Prize of €1.5 million and often more important structural funds). But the return on investment is largely commensurate with the effort made.

Lille 2004 and Marseille 2013 attracted between 10 and 13 million visitors and changed the image of the city. Lille has even continued the process with Lille 3000, which offers themed seasons every three years or so. The application for the title of European Capital of Culture creates a dynamic that makes it possible to support or obtain investments for facilities or monuments, to develop or create major events in the city, without forgetting the outlying districts and territories, and to enhance the value of a territory. Strong economic, social and media spin-offs are expected, as well as the transformation of the cultural offer for the residents.

Cities have until 1 December 2022 to submit their application. After analysis by independent experts in the cultural field, a shortlist of candidate cities selected for the final selection will be drawn up by the Minister for Culture in the first half of 2023 in accordance with the report of the independent European panel. The designated French city will be officially announced by the European Union at the end of 2023. It will then have four years to prepare for the event and then implement the selected program in 2028, together and if possible in collaboration with the Czech and North Macedonian ones (two cities per year, in the West and the East, and every three years a city from a candidate country to the EU).

We will analyze the cultural and territorial development projects of these cities and territories according to the selection criteria of the applications through their information (contribution to long-term strategy; European dimension; cultural and artistic content; capacity to deliver; scope and management) and to the analysis of the long-term sustainable impact of previous capitals.

*Keywords: cities, European capitals of culture, France, regions, territorial development.*

## How is noise affecting the marine environment? Do we need to define “marine quiet areas” in Maritime Spatial Plans?

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### Extended Abstract

Noise pollution is affecting the marine environment in numerous ways. Several ecological and cultural stakes derive from human activities and noise stands amongst the major but less studied stressors. An additional threat towards the marine environment is the impairment of Underwater Cultural Heritage (UCH) from noise pollution. Several forms of UCH like shipwrecks present an interconnection of both, natural and cultural assets of the marine environment and noise pollution can harm the integrity of both. The human impact on the marine environment can be described using the Driving force–Pressure–State–Impact–Response (DPSIR) framework. Here, we propose such a framework to analyse the effects of noise on the marine environment and determine the driving factors that produce it. Amongst the available reactions towards noise pollution, the establishment of “marine quiet areas” especially as far as Marine Protected Areas (MPAs) are concerned is added. Due to the scientific uncertainty of this issue, a precautionary tactic is proposed mainly through a legislative approach that includes the introduction of “marine quiet areas” at least among the designated as protected areas of the sea and the oceans.

*Keywords: underwater noise; DPSIR; marine quiet areas; Underwater Cultural Heritage (UCH)*

# Understanding land-sea interaction traditions and transitions through the theory of evolutionary governance: lessons from the city of Piraeus

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## Extended abstract

Different coastal cities in Greece such as Piraeus or Heraklion have endorsed the Blue growth strategy as an alternative growth strategy for recovering from the economic crisis. However, recently at the EU level, the importance of the blue economy in delivering the “*European Green Deal*” is emerging, thus urging the transition of blue growth principles to blue sustainable economy ones. The attempt to encourage the sustainability of blue growth comes with the formulation of new policies, alongside the ones already in force (see the Integrated Maritime Policy (IMP), the Marine Strategy Framework Directive (MSFD), and the Maritime Spatial Planning Directive (MSPD), the 2021 Communications on the blue economy, etc.).

At the same time, the importance of “maritime governance” or “ocean governance” is being constantly addressed (Van Tatenhove, 2011; Van Tatenhove, J.: 2013; Raakjaer, J.: 2014; Papageorgiou & Kyvelou, 2018). Lately, “land-sea governance” is also stressed as sustainable coastal development is essential for achieving the SDGs either related to the sea or the land (Singh, 2020; Singh et al., 2021). Hence, more than ever, there is a need for adaptive governing relations and a need for more reflexive governance structures and co-management schemes. The coexistence and cooperation of many actors, at many levels both horizontally and vertically for addressing effectively ecological, social, or developmental challenges are evident in coastal areas (Van Tatenhove, J: 2011; Van Tatenhove, J: 2013; Raakjaer, J: 2014). At the land-sea interface, multi-actors, such as government, NGOs, private firms, and citizens, among others are interacting, confronting, drafting strategies, and acting, but a new system of synergies should develop for handling the road to sustainability. At the EU level, the importance of a holistic approach in land-sea governance and planning was acknowledged (Pittman, J: 2016) and supported by the MSP Directive.

This article aims to assess, in selected city land-sea interfaces in Greece, i.e those of Piraeus city area, how the land-sea governance interface and systems have been evolved during the last decade. Through a literature review, the study of relevant policy documents, and mainly through interviewed stakeholders’ views, the aforementioned governance systems, and their evolution are being described and evaluated. The research to be presented was carried out in a sample of institutional stakeholders (both horizontally and vertically acting). It concludes that new types of coalitions in strategic planning are being progressively established, and this may catalyze more effective planning responses for sustainable land-sea governance practices, in line with the renewed blue economy objectives.

*Keywords: Land and-sea interface, land-sea governance, evolutionary governance, social innovation, blue sustainable blue economy perspective, strategic planning*

## Developing an Observation Network for Maritime Cultural Heritage (MCH/UCH) in Greece : the HER-SEA project

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### Extended abstract

The potential of Blue Economy was identified in 2012 by the European Commission and reaffirmed in May 2021 with the adoption of a new approach for a sustainable blue economy in the EU. This potential and the related policies, strategies, and resources brought into play for its promotion, mark the fact that the marine space is gradually shifting away from something simply to be safeguarded toward a place of opportunity and investment, both in traditional as well as emerging economic sectors. In this context, the HER-SEA project attempts to fill the gap concerning the non-inclusion of social and cultural elements in shaping maritime space. Immaterial benefits derived from the sea (cultural identity, aesthetic appreciation, personal and community perceptions) might prompt people to protect those values for the present and the future generations. Despite the increasing recognition of their importance, the tangible/intangible cultural values/heritage associated with the sea continue to be neglected in Maritime Spatial Planning (MSP) due to inherent difficulties in defining and highlighting cultural values but also in connecting them to specific places to allow a place-based approach to planning. The project focuses to Greece, endowed with huge and invaluable MCH and working towards its final National Spatial Strategy for the Marine Space (L.4546/2018 and L.4759/2020) and the elaboration of Maritime Spatial Plans according to the EU MSP Directive. The country is marked by a long tradition of ties with the sea, high coastality and insularity strong land-sea interactions, whilst life on the islands is evolving through and because of the sea and the constantly evolving marine ecosystem. The project includes: A. an in-depth analysis to define cultural capital and values, identifying and assessing sites of cultural significance and MCH B. determining the importance of MCH for the development of tourism-driven multi-use in the marine space, assessing its blue growth potential C. Working on two focus areas to implement the research approach, in both the Aegean archipelago (Dodecanese) and the coastal area of the Region of Thessaly. In these areas participative processes will take place to determine the relative importance of sites of cultural significance D. Key step will be the organisation of data and maps in a WebGIS platform to be the founding tool of a HER-SEA Observation Network to monitor and promote the incorporation of socio-cultural elements in MSP processes, in an inclusive way.

*Keywords: Maritime/Underwater cultural heritage (MUCH), maritime spatial planning, cultural values, cultural ecosystem services, Multi-use*



**CITIES AND GEOGRAPHICAL TERRITORIES OF CONFLICT:  
THE PAST PRESENT AND FUTURE OF POLITICAL  
INSTABILITY**



Changing Cities V, Corfu, 20-25 June 2022

**Organized and chaired by Prof. Em. Konstantinos Moraitis**

**Prof. Em. Konstantinos Moraitis**, School of Architecture, National Technical University Athens



## **Destruction of cities, genocides and ‘the orders from the dead’: a requiem for the destruction of Hellenic part of Smyrna in 1922**

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### **Extended abstract**

Architects, urban planners, landscape architects, we all usually refer to our visionary projects in a optimistic way. However, everyday agony and terror never stopped to escort, in the closer to us neoteric historic period, the promises of our positive political expectations and our positive design proposals. French Revolution did not succeed to offer, in their full anticipated value, social fraternity, benevolence and justice as described by the 18th century Enlightenment intellectuals. Soon after 1789 the feeling of terror was established. Next to the promises of the triumphing democratic revolutionary change, everyday executions reached the number of many thousands. Later on industrial development continued to be closely accompanied by the creation of urban slums, as presented in Charles Booth's poverty maps or Gustav Doré's etchings in his ‘Pilgrimage to London’, both of them depicting the somber neighborhoods of the British capital city. Baron Haussmann's embellishment was closely followed by Paris Commune, and the Frederick Law Olmsted's urban park fervor did not make the impoverished parts of the American cities to disappear - not to mention the mass destruction of the urban structures, the bombardments, the successive ‘Guernicas’ and ‘Hiroshimas’, the hecatombs of innocents during many minor and two extended World Wars.

It would be impossible nevertheless to enumerate the whole sequence of the urban disasters of the ‘dark’ periods of history, even if we only focus on the recent years closer to us; it would be impossible to lament all of them. That being so, we chose to insist on one exemplary historic incident that had decisively influenced Hellenic history, the political, cultural and urban history of modern Greece. Evidently it would be more important to refer to a historic incident that has immediately influenced the life of our own ancestors and finally our own cultural and political feeling as well, our own cultural and political existence; a historic incident that radically transformed the 20<sup>th</sup> century Greek cities being infused by an extended number of Minor Asia refugees' quarters; finally a historic incident that radically influenced both the centralized urban civilization and the neoteric folk-culture. We shall refer to the destruction of the Hellenic part of the Minor Asia city of Smyrna in 1922, and our attempt to commemorate it in the re-design proposal of an urban square in the municipality of Kaisariani, at the metropolitan territory of Athens. Our proposal must not be associated, nevertheless, to a nationalistic approach, or an effort to revitalize nationalistic confrontations of the past; we should definitely like to abstain from an analogous vulgar confrontation. What we really desire, is to offer a requiem dedicated not to the inhabitants of the pre-destroyed Smyrna solely, or the actual victims of that extermination, but to the continuous massacres and urban destructions that did not stop to exist, till now, in a large part of our ‘civilized’ world. We should like to dedicate this requiem to all analogous events; to dedicate it to the ‘orders from the dead’, denouncing the loss of their precious life and happiness.

*Keywords: destruction of cities; genocides; refugees; Minor Asia Smyrna; municipality of Kaisariani*

## **Weird-Fiction and the Architecture of Xenophobia**

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### **Extended Abstract**

In May of 1924, following decades of public debate on the consequences of unrestricted immigration, the United States government passes the Asian Exclusion and National Origins Acts, preventing immigration from Asia, setting quotas for all countries outside the Western Hemisphere, and establishing the Border Patrol as a federal agency. In March of the same year, weird-fiction writer and New England native H. P. Lovecraft moves from Providence, Rhode Island, to New York City to experience the metropolitan condition for the first time. For the next twenty-five months, he witnesses the proliferation of cultural ghettos and ‘roaring slums’, the planned demolition of historic districts, and the advent of emerging building technologies which give rise to the modern skyscraper. Gradually overwhelmed by Manhattan’s cultural-historical divergence from the provincial Anglo-Colonial narrative, he commits his fear and despair to creativity and employs the weird-fiction method to re-architect the city.

This paper will explore the architectural elements of H. P. Lovecraft’s gothic reinterpretation of the modern metropolis. It will introduce the weird-fiction method as both a creative world-view and medium of supernatural horror, and briefly discuss its incompatibility with the dynamics of the neoteric city. The method, which is published as a treatise in 1927, is designed ‘to satisfy aesthetically the sincere and burning curiosity which a sensitive minority of mankind feel toward the provocative abysses which press in upon the known world from unknown infinities.’ It is a design tool for consciously liberating the emotional imagination.

The paper will then assess the spatial narrative of the short story *He* (1925), which Lovecraft wrote while living in New York. The story itself is a condensed account of his ‘grand disillusionment’ with Manhattan and the revelation of a ‘fearful truth which no one had ever dared to breathe before – the unwhisperable secret of secrets – the fact that this city of stone and stridor is not a sentient population of Old New York as London is of Old London and Paris of Old Paris, but that it is in fact quite dead, its sprawling body imperfectly embalmed and infested with queer animate things which have nothing to do with it as it was in life.’ It will present historic urban landmarks in the area of Greenwich Village (following the narrative arc of the story), discuss the extent of their weird-fictionalization, and assess their role in Lovecraft’s emotional exploration of xenophobia and cultural identity.

The work proposed above will provide valuable insights into the psychology of urban heritage and the conflicts inherent to intercultural dialogue, addressing issues of immigration and social change which remain as relevant to today’s Western discourse as they were nearly a century ago. These fundamental questions, about how we should or should not qualify our cultural identities and position them with respect to one another, provide both a basis for critical understanding and an opportunity for positive self-reflection.

*Keywords: metropolis; xenophobia; weird-fiction; H. P. Lovecraft; Manhattan*

# Phobic narrational motifs of a constantly impending disaster and fear of the masses; tragic and grotesque as an analytical prism for comics of the fantasy genre

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## Extended abstract

In the 19<sup>th</sup> century, criticism on the bourgeois society, which drew from romanticism, produced certain narrative motifs that would define the philosophy and the artistic movements of the 20<sup>th</sup> century. Indicatively, creators such as Poe and Goya depicted the uncanny nature of city life and the urban-rural antithesis, using representations of eerie, pre-modern worlds. By following the thread that goes through 19<sup>th</sup> and 20<sup>th</sup> century art –and focusing on the latter– we seek to highlight the significance of the aesthetic category of the *grotesque* and the concept of the *tragic*, as concepts that reflect and express the *fear of the masses* and, thus, the very existence of our society.

At the beginning of the 20<sup>th</sup> century, the reconstruction of the public sphere brought about radical changes in the social function of art; in its forms, contents, ways of perception and its everyday life usage. Comics, as a product of these changes, emerged within everyday press, assimilating pre-existing forms of folk art such as vaudeville, political caricature and pamphlet literature. As far as their structure is concerned, it reflects the condition of metropolitan life; the coexistence of heterogeneous masses, the formalisation of private and public life and the fragmented sense of time. During the interwar period, the "*aestheticization of politics*" was made possible by using grotesque representations in order to formulate the categories of *enemy and friend*. At the same time, revolutionary modern art didn't achieve to point towards a positive transcendence of the social contrasts it revealed; it failed to express to its end a tragic conflict from which a new and more fairer social constitution could emerge.

In the 1970's, artists overcame the limitations set by the Cold War and expressed their critique through forms of mass culture, rather than those of highbrow art. Comics, which drew their inspiration from the genre of "fantasy", revealed the ideological motifs of the hegemonic ideologies, as well as the caged psyche of modern man, using an understandable and easily adaptable aesthetic vocabulary. Grotesque and tragic motifs were used in order to highlight the psychic foundation of Western man who, caught up in the ideological imperatives of the Cold War and "*bureaucratic society of controlled consumption*", was disorganised and alienated to the point of turning against himself and his environment.

This historical trail, whose pacing traces the evolution of the use of the grotesque and the tragic, is neither intended to clarify the two terms, nor to formulate a distinguished field within the history of art. Our concern is to trace the evolution of Western man's self-image, through his evolving perception of historical time and, through that, his relationship with the world's course. For grotesque reflects not only the type and form of threat or the psychosynthesis of the threatened, but also the concept of history as a prerequisite condition for the existence of society. The same applies for the tragic; as conflicting, positive moral values problematize society's existence itself on a cosmogonic level.

*Keywords: tragic, grotesque, romanticism, fantasy, metropolis, alienation, mass culture, comics, aestheticization of politics*

## **The memory of the place after a natural disaster. The case of Mikro Chorio Evrytanias**

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### **Extended abstract**

Common references to memory and space can relate to identified monuments, monumental buildings, entire architectural ensembles, and even settlements of historical significance and / or considerable local and environmental importance created or emphasized, through a natural disaster. Many parts of Evrytania, from the period of the Revolution of 1821 and the creation of the Greek State until today, have been connected to the collective memory through historical events and some of them through significant natural disasters. A typical case of the above is the example of MikroChorio (current settlements Palio and Neo Mikro Chorio).

In addition to the historical events that characterized the area, especially during the Civil War, a major landslide occurred in January 1963 and destroyed half the village, while taking human lives. It is an event that has been inscribed in the collective memory of its inhabitants and not only, in two ways: environmentally, with the destruction of the settlement and the simultaneous destruction and alteration of the landscape, but also socially with the re-settlement of its inhabitants to a new, safe nearby place, called afterwards NeoMikroChorio.

In the present work we will investigate the hypothesis that the natural disaster of MikroChorio, was a loss of place, landscape and identity but also a trigger for the creation and shaping of a new social and local identity, through the process of social and environmental sensitization. Also, that the landscape is a monument of collective memory, and we will document and explain through which process and under what conditions, this was done in this case.

*Keywords: collective memory; natural disaster; landslide; landscape identity; Mikro Chorio; Evrytania*

## **HomeLand A monument for those who need to remember**

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### **Extended abstract**

The following proposal consists in re-approaching art through the factor of aimless, as this can be found in modern technological and scientific design. Essentially, every scientific experiment is a series of setbacks, before it finally reaches the correct result, which may well be reversed at any time with new discoveries or experiments. However, this process also functions as the primary method of every artistic act, an argumentative, playful questioning of the world, open to possibility and the unexpected. In this way, a series of works is born based on the gradual transformation of materials and their circular reorganization. The true poetic and philosophical dimension of bricolage has been used as a basis of projects mainly focusing on specific features of the landscape as well as the social environment (local and international artistic community).

The works that will be presented serve as structures around an artificial, contrived “accuracy” and at the same time constitute highly poetic images of a practically metaphysical character that invites the viewer to reflect upon the contemporary lack of context (both literal and figurative) as well as natural attrition and ecological thinking in the midst of the current technocratic ideology as well as on the ‘failures’ and weaknesses of sociability.

The “homeland” project is an invitation to return to the idea of Arcadia, a place of peace and tranquility, and a return to the primordial. This invitation aims to engage with the geographical and geological history (affective geography), via the establishment of a universally open-ended sampling that captures the symbolic memory of the place (human geography). The work, as multilevel crossroad of real and spiritual meetings, constitutes a geo-sociopolitical encounter and aims towards distilling the cosmogonic meaning of soil, and transfusing it from the ideological foundation of the theory of the masses to everyday human practices. Transforming an urban wall into a topographic map serves as a vehicle between the meta-physics of “dedication” and physical “mortal” substance, between the spiritual and the material. The archival activity does not aim to create only an outdoors installation offered to public view, but a multilevel aesthetic experience. It is also a toolbox for (social, ethnological, anthropological, geological) research that activates a universal network related to the identity, origin and lineage of the offering/donation. The wall ceases to be a blind boundary and becomes a portal, a door to the world. The 4600 samples gathered from the participants in conjunction with the additional digital material and the workshop experience form an original material meta-object, which can constitute an open field for future research in various areas of humanities and sciences.

*Keywords: aimless, bricolage, rammed earth, spatial archives, geological maps, places of origin.*

## **Violence and the City: Urban Conflicts in Exarcheia**

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### **Extended abstract**

The paper examines the philosophical concept of political violence, and the ways that it becomes apparent in the urban scene, through a particular case study: Exarcheia a neighbourhood of the city center of Athens, Greece.

Violence is an extreme use of force that is accompanied with aggression. According to many political philosophers, there should be a 'monopoly of violence,' that is, a violence applied only by the state which should enforce the legitimate governmental authority to suppress the liberties of different individuals in order to preserve social peace.

In Exarcheia, though, there is a constant challenge of the monopoly of violence by the state that appears through explicit and implicit forms in the streets of the city. There prevails an ambience that the state itself is a social problem, shaping, not only the structure of governance, but also citizenship and the quality of life of individuals and communities. Exarcheia has always been infamous for, social misbehavior, drugs and political riots, that often escalate in armed clashes with the police. No other place in Athens, has more graffiti, and political posters on the walls. Common knowledge of the area stands on two major pillars of 'immoral' behavior: the one has a political dimension (anarchism) and the other has a social one (gangs, drugs, debauchery etc). Although these two pillars are essentially different, they appear to coincide in an imaginative topological space that is known as the verge or the marginal, that is both dark and violent.

In order to trace the genealogy of violence in the neighbourhood, the paper will present some key moments in the urban development of Exarcheia in relation to the development of the city of Athens. There we will see that Modern Athens, despite its famous ancient historical roots, is a new city that was designed according to the predominant neoclassical views that had prevailed in the early nineteenth century. Exarcheia or Neapolis, as it was initially called, was developed illegally outside the neoclassical city from 1840 until around 1900, at the verge of the city –the city beyond the city. Although since the beginning of the 20<sup>th</sup> century it has been on the central downtown neighborhoods, its marginal character never ceased to exist. Indicative of this marginality is that some of its inhabitants like to assimilate the neighborhood with the small Gaelic village of Asterix the Gaul, that has been independent from the Roman rule, because of the often clashes with the police around its streets.

*Keywords: violence; monopoly; urban development; urban conflict; police clashes*

## **Environmental refugees: a global and local conflict field and a cultural challenge**

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### **Extended abstract**

In recent years we have witnessed explosive technological progress, tectonic geopolitical changes and a constantly changing social environment. In this context, we need to address three additional issues: the covid-19 pandemic, the energy /economic crisis and the effects of climate change. The issue that I will develop in this text concerns an invisible aspect of forced displacement, that of environmental refugees, the cause of which is directly intertwined with all the above three issues. Refugee/migration flows to "developed" countries will not only continue but will increase by people who will be forced to move from environments where one cannot survive. The purpose of this presentation is to comment on the analytical category of environmental refugees, as a field of conflict at global and local level. The argument is that the factor of climate change is not only a justified cause of population migration, is not a co-factor, but, according to forecasts, will be the predominant factor of displacement in the coming decades. Next, it is important to inquire the relationship between climate change and the capitalist mode of production found mainly in the developed cities of the West, while at the same time the nature of capitalist production is related to climate catastrophe and more specifically to the challenge of environmental refugees.

In a critical view, therefore, the issue of environmental refugees is addressed, concluding that the vast majority of "environmental refugees" come from less developing countries and their displacement, as a result of the immediate environmental disaster, verifies the dipole of the two worlds "West"- "East", "North-South", privileged-non-privileged, where there is a relationship of exploitation of the latter from the former.

It is noteworthy that "non-western" countries are more vulnerable to immediately experiencing the effects of climate change. A catastrophe that concerns both the direct imprints of industry and the capitalist mode of production (river rubble, deforestation, arson, water pollution, overfishing, etc.), as well as the indirect and longer-term (floods due to global warming and consequent melting of ice, drought, extinction of species, unsustainable habitation in cities, destruction of crops, disruption of biodiversity, etc.). The maintenance of the "border" identity of the subjects satisfies many interests, the most important of which is not forcing the state bodies and the international organizations to take their responsibility. In the case of "environmental refugees", the concept of "illegality" relates to the unofficial recognition of refugee status by the internationally, with the result that persons displaced by environmental disasters are in a borderline situation concerning their identity of an immigrant who does not allow them to apply for asylum.

In conclusion, the power generated by the possession of wealth, both individually and collectively, determines the ability of legal movement. Finally, cases of affected areas are already reported and the severity and immediate nature of the problem that will be addressed by those who make decisions on living, integration and planning of urban areas in the host countries is pointed out.

*Keywords: environmental refugees, social injustice, cultural aspects, conflict, economical factors, global & local*

## **Housing for the poor in Addis Ababa: Territories of instability and commoning practices**

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### **Extended abstract**

The paper presents the reasons for which the question of providing housing to low-income citizens has been a real challenge in the case of Addis Ababa during the recent years and will continue to be, given the galloping growth of its population. It examines the tensions between the universal aspirations and the local realities in the case of ‘Addis Ababa Grand Housing Program’ (AAGHP) launched in 2004 and integrated in the ‘Integrated Housing Development Program’ (IHDP) in 2006. The paper draws upon the idea that there is a mutual correspondence between social and spatial structures. It aims to render explicit that, in order to shape strategies that take into account the social and cultural aspects of the quotidian life of the poor people in Addis Ababa, it is pivotal to invite them to participate to the decision-making processes regarding their resettlement. Departing from the fact that a large percentage of the housing supply in Addis Ababa consists of informal unplanned housing, the paper compares the commoning practices in kebele houses and condominium units. The former refers to the legal informal housing units owned by the government and rented to their dwellers, whereas the latter concerns the housing blocks built in the framework of the IHDP for the resettlement of the kebele dwellers. The paper analyzes these processes of resettlement, shedding light on the fact that kebele houses were located at the inner city, whereas the condominiums are located in the suburbs. It examines commoning practices in architecture and urban planning, and how the implementation of participation-oriented solutions can respond to the difficulties of providing housing. It argues that urban planning and architecture in Addis Ababa should be based on the principles of negotiated planning approach, which implies a close analysis of the interconnections between planning, infrastructure, and land. Despite the efforts of the UN-Habitat to support a narrative claiming that the condominium houses offer the possibility for social mobility, in reality, this is not always the case. In many cases, the condominiums are, in the end, inhabited by middle-income citizens instead of low-income ones. Even if the IHDP was originally conceived as a pro-poverty housing program, very often, the low-income owners of the condominium units are forced to rent their apartments to middle-income residents. This shows that the social classes of the condominiums are in a state of becoming. In certain cases, the resettlement in the condominium units offers, to a certain extent, social emancipation due to its break with the previous mechanisms of inhabitancy and dependency. However, a close examination of what really happens can reveal that often this is not the case. A tension that is useful for better grasping the notion of commons is the interrogation regarding the understanding of commons as community or as public space. Understanding the commons as community implies that community is conceived as a homogeneous group of people, whereas comprehending the commons as public space is based on the intention to take into consideration the relation between heterogeneous communities. A question that emerges is whether, in the case of Addis Ababa and the social capital of its poor citizens, it would be more compatible to understand the commons as public space or as community.

*Keywords: kebele houses; condominiums; Addis Ababa; commoning practices; social and spatial conflicts; negotiated planning; participation*

## Transient spaces

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### Extended abstract

Mass migration is one of the most important issues confronting cities in the 21st century. Increased border tensions and internal conflicts, compounded by environmental degradation and economic precariousness have created impromptu urban enclaves whose very character and economies are defined by migration. Continuous flows of people leaving and arriving challenge architects, planners, governments and policy makers to create infrastructural systems and spatial fabric of unparalleled elasticity.

*Transient Spaces* is a curated collection of essays and projects about the impact of mass migration on cities around the world. The book examines transience as a force of opportunity and resilience in the design of cities and includes contributions from notable writers, designers and thinkers, including Michael Sorkin, Saskia Sassen and Konstantinos Moraitis.

How do global cities of today cope with populations in flux? What can cities do to leverage the human capital, intellectual potential, and entrepreneurial capacity of migrants in order to revitalize local economies and repair their civic, cultural, and physical infrastructures? The essays and proposals in this volume explore unconventional opportunities for cities to enable conditions of impermanence in order to catalyze change, meet the needs of migrant populations, and foster sustainable urban development policies that benefit both host and guest communities more effectively. The ideas presented here confirm the potential of transience as a force of resilience and integration in the design and operation of cities. But the book also points to the need for a major transformation in how we view the phenomenon of mass migration and how our governments, civic structures, and citizens are prepared to react to them.

As forced migrations increase in scale, frequency, and duration, how can we seize the opportunities inherent in movement to create synergy between newcomer and host? Can some sustainable fabric of participatory civic institutions be restored in an impromptu enclave? How can design disrupt power structures in relief response? Can we create methods that adapt to the ever-increasing need for sheltering amid ongoing crises? These are some of the pressing questions this book seeks to address.

A variety of alternative, bottom-up initiatives by a growing global network of activists and host communities have been more proactive and progressive than they are given credit for. These strategies and actions are a retort to the fear and resentment that pervade political discourse on migration today.

*Transient Spaces* is a provocation to explore cross-disciplinary borders and wider fields of knowledge. It is an exhortation to all nations, political leaders, planners and citizens of the world to open our minds and borders to the potential growth that comes from the interaction, integration, and innovation made possible the exchange of resources and ideas beyond borders.

*Keywords: migration; refugees; urban planning; urban policy; sustainable development; cities; communities*

## **In times of Pandemic**

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### **Extended abstract**

During the 18th and 19<sup>th</sup> century, many European cities suffered several disease outbreaks and epidemics that resulted to radical transformation of their historical urban landscape. In the wake of these outbreaks, new scientific knowledge is gained, emphasizing the importance of hygiene and sanitation conditions for public safety and social care. The new design principles developed by architects and urban planners, regarding the city's most densely populated areas, involve the construction of modern sewage systems and public infrastructure, the establishment of open green spaces, the integration of new building materials and building techniques, securing adequate lighting and ventilation for dwellers, the re-evaluation of the waterfront management, land distribution and functional zoning.

Recent pandemic has proven to be a major historical event of similar impact, affecting contemporary cities on a global scale. Amid advanced technology in mobility and transportation, the Covid -19 virus spread across the planet, within the time span of several weeks. The lack of sufficient empirical data about the virus and its implications, during the first months of the pandemic, presented a state of scientific uncertainty. Although, in science, uncertainty is used as measurement, connoting the levels of true knowledge on a certain subject, displaying the range of possible values within which the true value of the measurement lies, however, in western politics and culture, scientific uncertainty almost corresponds to absence of knowledge, that often leads to public and political disbelief, and ideological dogmatism.

Major historical events such as the recent pandemic evoke changes followed by other significant changes, in an associative or random manner, that indicate a state of transition. The notion of change identified both by philosophy and science, presents different aspects and views. Change is seen as either a continuous process, that occurs at different rates, or a consistent process of inconsistent representations, that sets things in motion, or alters their identity by transforming their intrinsic properties through time. There is no doubt, nonetheless that radical change transforms our perception of the world we live in and puts into question the traditional knowledge systems.

Moreover, our understanding -in the Kantian sense- of the causal relations of events associated with change, remains unclear, during such periods of political and social instability, eliminating our ability to foresee calamity and arrest its impact. However, coming to this realization, that our world is not always a mere product of deterministic causal relations, that enable the necessary conjunctions one needs to make in order to unify his own perceptions of the world in accordance with a universal lawful form of the latter, but just a number of arbitrary events randomly linked together, may also transform the ways we respond to change, forecast its implications, and react upon it.

*Keywords: change, knowledge, causal, form, pandemic*

## **War refugees and unavoidable economic immigration: camps and cities of refugees in the historic past and the geopolitical present**

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### **Extended abstract**

The urban ground of western cities reveals itself through complexity and diversity. The city's web is characterized by social differences, which are imprinted in the urban worlds. The neighborhoods are outlined by physical and symbolic borders, which cause society to experience constant disparity and instability. And these borders are not created by a natural force principally but are reproduced through the way they are culturally imposed. Thus, we are not focusing on differences that develop by a personal choice or freedom, but on differences of hierarchical character. Whether we are referring to class inequalities, gender, race oriented discriminations, cities may appear as conflict territories. As social scientists, we need to place these cultural dynamics on the center of our analysis. Thus, we are responsible of searching how and why cities are formed unequally; we are asked to take a political and epistemological thesis into the society we study.

Focusing on the urban area of Athens, this paper aims at unraveling the experiences of war refugees and economic immigrants, who arrived through Middle East. Due to its geographical position, Greece is considered as a crossroad for people who hope to arrive in Europe or for those who are forced to do so. These experiences however are not approached by a geographical interest, but analyzed as social phenomena. In other words, we choose to reveal immigration as a social and political move, which undertakes discriminating extensions. Refugee camps, "green cards" of residency permissions, black labor and every day threats are only a part of the immigration management. As a result, border crossing is not just a spatial movement, but is in fact a default of human lives by national policies.

We, thus, dare to ask how do we stand by these constant instabilities, how do we cope with the invisible suppressed parts of the western national glory. A hundred years after the arrival of Minor Asian refugees, immigration is still a crucial part of urban configuration and inequality, making us wonder about the past, the present and the future. A hundred years after 1922, we are forced to talk about the value of life, through the terrifying images of our urban "development".

*Keywords: urban conflict territories; class inequalities; race discrimination; refugees; Minor Asia 1922*



**SMART AND GREEN CITIES: PARTICIPATORY PROCESSES  
AND INCLUSION IN URBAN PLANNING**



Changing Cities V, Corfu, 20-25 June 2022

**Organized and chaired by Ass. Prof. Valina Geropanta**

**Ass. Prof. Valina Geropanta**, School of Architecture, Technical University of Crete



# Participative process for cultural tourism development. The case of TExTOUR project

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## Extended abstract

The EU funded project TExTOUR is aiming at supporting eight pilots around Europe to develop their Participatory cultural tourism development strategies and action plans.

The pilots are selected among different contexts, urban, rural, and remote areas, and scales, from urban scale to interregional. Pilots will address a set of challenges spanning from inclusion of minority cultures and regions, unfavourable economic transitions, cross-border dimensions, to Europeanisation within their Cultural Tourism (CT) Labs, an innovative ecosystem working group, made by local stakeholders and communities. To address local challenges and issues, pilots will follow a co-creation process, initiating a larger discussion between stakeholders and local communities, where they will be equally intended as creator and users of cultural tourism actions and services in their areas. In this paper we will present the goals and the methodological approach behind the design of the participatory co-creation process that will lead the pilots to 1) co-map with their local communities and stakeholders the local heritage resources and to advance a shared vision for the area, 2) create a set of tourism actions based on such resources and their integration with relevant ICT services, 3) implement such actions through the creation of a business model canvas and finally 4) test the actions against a set of Early Warning Indicators to define preventive and corrective measures that will help the success of such actions. The process is designed to support the Pilots in the development of their 4 workshops (titled: Workshop#1 Objectives & Co-Mapping, Workshop #2 Actions, Workshop#3 Implementation, Workshop #4 Preventive and Corrective Measures) between February and July 2022, through a seamless exchange of knowledge and operational experience, both from the Consortium Partners to the Pilots Representative and directly among the Pilot Partners, through a series of Pilot Forums, Help Desks, and bilateral meetings. Besides the general set of guidelines, it seems particularly important to help the Pilots mould and adjust the activities of the workshops to the specific needs of the different Cultural Tourism Labs of the Pilots, including the possibility of having the workshops face-to face or online according to the COVID-19 restrictions in the different regions. From each workshop, the CT Labs will extract a report that will progressively build towards their CT strategies in a systematic manner, focusing on specific steps and building on the knowledge produced in the earlier workshops. Those reports will become the basis of the strategies they will eventually contain: the overall strategic approach to the CT in the pilot area with a summary of the main challenges, aims, vision, and goals; a strategic vision of ICT services to develop both within TExTOUR project than with possible future integration; a detailed action plan including timeline, roles, and responsibilities, and foreseen budget of each action; and a monitoring plan in accordance to Key Performance Indicator defined in the TExTOUR. The paper will examine the methodological framework supporting the co-designing creation process at the core of the Strategic Cultural Tourism Development for TExTOUR pilots and its design for the definition of TExTOUR recommendation and guidelines for CT Development in Europe.

*Keywords: participation, co-creation, cultural tourism, ICT integration*

# Urban planning and policy making under the light of emerging global trends in digitalization and sustainability

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## Extended abstract

In an age of rapid changes in businesses, technology and lifestyles, local and regional authorities are challenged to design policies with a forward-looking perspective. To assist them in this respect, prominent public and private organisations from all over around the world regularly publish reports that aim to predict future developments. Demographic shifts, urbanisation, migration, technological innovation, the changing working and educational patterns, economic uncertainty, and climate change are only a few examples of developments that are predicted to shape the world in the next decade.

This paper presents results from the Horizon2020 RRI2SCALE project (Grant Agreement n. 872526). RRI2SCALE researches how to balance sustainable territorial development and breakthrough research and innovation in urban and regional policy making. It places a specific focus on the domains of intelligent cities, intelligent transport, and intelligent energy, which are the sectors that are presumed to have the most striking and visible impact on the daily lives of urban citizens over the next 10 years from today.

Under this light, the paper describes the results of the extended analysis that we conducted in order to identify megatrends, trends and drivers that are anticipated to alter the socioeconomic and environmental landscape in the years to come, with a focus on the fields of intelligent cities, transport and energy. Some of the most important factors identified to possibly accelerate the digital transition, we noted: (i) growing urban challenges (e.g., the increasing housing prices, traffic congestion, poor air quality, and urban flooding); (ii) territorial phenomena that jeopardise environmental, social, and economic sustainability (e.g., urban sprawl, overurbanisation and uncontrolled urban development); (iii) technological advancements that improve the efficiency of smart city projects but that come with certain trade-offs; (iv) the limitations of European and national policies and funding schemes; and (v) the increasing energy demand. Moreover, we identified emerging trends such as: (i) increasing investment and participation of private sector to intelligent city projects; (ii) the rising digitalisation of public services; (iii) more and more citizens demanding new market solutions that minimise social and environmental concerns and implications; (iv) the rising need for European and national frameworks to regulate privacy, security, safety, and ethical issues associated with digital and technological solutions used for public purposes; (v) the surging demand for better and safer public transport services; and (vi) the increase of energy needs.

We close the paper with interesting recommendations for future urban policy making and urban planning, under the light of emerging innovations and digital transition.

*Keywords: urban planning; urban policy; smart cities and communities; digital transition; global trends*

## Participatory greening in urban planning and policymaking with the help of new technologies: The case of Union Youth in Chania

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### Extended abstract

The current climate challenges have compelled actors, cities, and citizens to employ smart technology, digital platforms, and data-driven intelligence to spearhead creative greening solutions in their urban ecosystems. As a result of this phenomenon, there is a growing need for citizen participation and inclusion in the co-design of green infrastructures, as well as alternate approaches to dealing with a lack of or misuse of public space. This paper presents results from the project "Union Youth in Chania", created in the framework of the course Planning of Smart and Virtual Cities at the Technical University of Crete, and was chosen to receive funding by the region of Crete, in the framework of the initiative Fytwrioidewn. Union Youth researches how to develop an environmental awareness strategy for Generation Z through capacity-building and participatory processes related to climate change and environmental protection. The project entails in parallel, the development of a digital platform and a mobile app that includes a number of engagement tools that allow interaction between the online community of youngsters, local decision makers, and city greening players. In light of the above, the first section of the paper describes the results of an extended analysis of a literature review from the last decade that discusses the importance in promoting today's participatory procedures in the city for climate change mitigation. The paper's second section looks at a case study, Union Youth in Chania, a digital collaborative platform that supports greening the city through district-based, activity-based, and network-based redesign solutions. The paper's final section contains insightful comments on the relationship between the analogue and digital worlds, as well as how bottom-up methods might be a useful tool in city planning. The ultimate goal of the case study analysis is to provide insights into the architectural world in order to build more connections with citizens and communities and contribute to their understanding of greening.

*Keywords: Climate Change, Green Infrastructure, Smart Technologies and Digital Platforms, Participatory Design, Smart City*

## Leasing Urbanism: digital nomad as the new Ulises

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### Extended abstract

The current Covid19 pandemic has brought dramatic economic and socio-political changes on a global scale which continue to evolve. This transitional period from pandemic to post pandemic era has sped up the need for digital and smarter technologies which can ensure faster and spatially safer environments. Lockdowns, mobility restrictions and working from home governmental directives has changed the spatial dynamics of cities and urban infrastructure synergies. For the past three years of the pandemic a significant amount of the population chose to migrate from large urban centres to smaller cities and rural areas for a safer quality of life, a phenomenon quite opposite of the post WW2 where everyone headed towards large urban centres. This decentralisation, has transformed the previously bohemian social group of digital nomads into a significant force which, once researched and organised, could contribute to evolving smaller urban and rural areas of the mediterranean into resilient and smarter zones. Digital nomads as a group consist generally of younger, active, educated members which when mixing with the locals can generate reciprocal economic, cultural and social benefits in decentralised areas which traditionally benefit unilaterally from seasonal tourism. Can a common ground basis be established for a spatial cohesion and competitiveness in decentralised areas? This paper aims to analyse the characteristics of digital nomad group and translate them into spatial qualities that can form planning directives towards what the author call, leasing urbanism, a dimensional space with vague flexible borders which forms the centre of something or the periphery of the another, an intersection between permanence and impermanence. Leasing urbanism, a multi-layered hybrid spatial entity which can be correlated with the meaning of a voyage, that one of a constant fight towards a final destination, a common ground which through its ephemerality can re-shape inclusive environments. As a case study, the first European pilot programme for digital nomads village established in January 2022 in Ponta do sol of the Portuguese island of Madeira will be researched.

*Keywords: leasing urbanism; digital nomads; Mediterranean; urban planning; cohesion*

# Smart greening: ecosystem services and planting strategies for vertical gardening

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## Extended abstract

Crossing the threshold of the third year of Covid-19 crisis and amid the persistent occurrence of emerging flare-ups, climate change constitutes the peak of the existing daunting challenges. Nevertheless, amidst the unprecedented events and imbalances since the onset of the Pandemic, the opportunity was given to witness and reflect on the consequences of the Covid-19 anthropause; numerous initiatives intensified their efforts for multiscale restoration actions – founded on Nature-based solutions (NBS) – like the One Trillion Tree initiative or various Urban Forest projects. Consequently, the imperativeness of studying the numerous interactions between plants and the urban environment rises. Within this frame and based on a bibliographic review, the study aims to outline the key steps of a greening strategy towards building urban resilience, while making provisions for the future challenges.

The endeavor firstly attempts to conduct an overview of the fundamental ecosystem services supplied by plants in contextual urban habitats, as well as, highlight negative consequences related to inadequately managed, unintegrated (or unsuitable) vegetation. This initial outline of the ecological roles and useful services of plants constitutes the foundation of the strategy and aims to highlight the numerous synergies among the plants, urban environment and people.

Secondly, following current developments in international scientific literature, an overview of novel approaches in urban tree sourcing and planting strategies as well as reflections on tree diversity in cities, will be conducted. Taking into account that the capacity of plants to deliver ecosystem services is species/ contextually-dependent and considering the additional stresses of future conditions, numerous sources purportedly encourage a refocus on the quality and not just the quantity, pointing out – among others – the necessity for vegetal diversity. The second part of the study aims to track these relevancies.

The third part of the study in accordance with the previous i.e., ecosystem services and planting strategies, attempts a projection into an artificial ecological system, namely a vertical garden. The versatility of utilizing vertical gardening along with the broad implementation prospects, extending in various climatic zones and spatial urban schemes designate the technique as a major restorative tool. These planning qualities enable the envisage and miniaturization of urban textures, into a vertical garden. Taking these into account, the cornerstone of the study is the attempt to acquire insights from an analysis of a major European project of Patrick Blanc. The acquired case study analysis, along with plants selection criteria, plants species and their sequencing conclude the research, thus providing unique insights into a strategic greening analysis.

*Keywords: nature-based solutions; urban resilience; ecosystem services; planting strategies; vertical gardening*

## A holistic Digital Twin to support an island's resilience in the fight against climate change

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### Extended abstract

A Digital Twin is a virtual representation that serves as the real-time digital counterpart of a physical object or process. Emphasis is given on the fact that exchange of information is applied a) in real time and b) in both ways between the physical and the digital. A Digital Twin can be conceived as the next step after the Building Information Modeling (BIM) in the Architecture, Engineering and Construction (AEC) industry and the smart cities sector. An extended reality (XR) Digital Twin in Construction offers the potential for a ground-breaking data management and visualization in different modes, such as visual, temporal, abstract, user empowered, policy related, etc. which can be perceived as different layers of reality.

Climate change has accelerated and intensified natural disasters like wildfires and floods, making proper preparation but also disaster recovery increasingly complicated tasks, challenging the resilience of cities or even larger communities who seem more and more vulnerable. Tasks like acquiring the right data sets, offering different data visualizations for each task and stakeholder or running the proper simulation models, are crucial in the effort to achieve real time collaboration between all stakeholders for a successful outcome.

Evia island in the region of Central Greece, the second largest Greek island, has suffered severely from wildfires in the summer of 2021, followed by the threat of extreme snowfalls and floods in the months after the disaster. We propose the creation of a holistic Digital Twin for Evia's ecosystem, in order to support the island's resilience in the fight against climate change. This Digital Twin will incorporate the island's urban, financial, rural, commercial, environmental, touristic, cultural, etc. networks along with human activities, in order to create more intelligent decision-making mechanisms and thus assist in preparation before, protection during and relief after a hazard hits. Furthermore, it is intended to enhance citizen awareness and participation, but also better facilitate and steer donations and volunteerism.

*Keywords: digital twin; resilience; climate change; extended reality; visualization; awareness*

# Integrating BIM into architectural education: the case of the urban scale

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## Extended abstract

The objective of this paper is to explore the integration of BIM into architectural education, focusing on the courses relevant to urban design and urban planning. The adoption of BIM, replacing CAD by professionals in AEC has created several challenges and opportunities in educational programs (Becerik - Gerber et al., 2011). The paper forms part of an ongoing study that intends to collect, process, and analyze existing information on how BIM is integrated in the educational framework of Schools of Architecture in Greece and Europe.

The proposed methodological framework involves three layers: the in-depth analysis of BIM research and teaching in relation to the academic courses taught in Schools of Architecture in Greece; literature review and analysis related to how BIM is used in academic or professional environment at the urban scale globally; and the analysis of the results of BIM integration at this scale from an educational point of view.

Through the analysis of the implemented case studies, the advantages of BIM integration are highlighted: collaborative environment, interdisciplinary design, big data integration, and even new ways to revisit the design process. It is concluded that integrating BIM in the urban academic courses is fundamental to the representation and modeling of the urban built environment, while it can also unlock new potentialities for the design, planning and construction process at the urban level.

*Keywords: BIM; smart; data-driven; architectural education; city; urban planning; urban design; Europe*

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**CHILDREN’S WELLBEING AND URBAN SUSTAINABILITY:  
DESIGN, PLANNING AND POLICIES FOR CHILDREN-  
FRIENDLY CITIES**



**Changing Cities V, Corfu, 20-25 June 2022**

**Organized and chaired by Prof. Fyllio Katsavounidou**

**Prof. Fyllio Katsavounidou**, Department of Spatial Planning and Development, Aristotle University of Thessaloniki



## Children's wellbeing and urban sustainability: Towards a child-centered agenda for the post-pandemic city

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### Extended abstract

Children's wellbeing and sustainability of cities are intrinsically connected. Children are like "canaries in a goldmine" (Bunge 2011): a city that is friendly for children is friendly to all, a sure sign of urban quality. The urban environment intersects decisively with children's everyday lives; from affordances of play areas to safe routes to school, urban design and planning define crucial aspects of children's wellbeing. On the other hand, children are a major asset in shaping a sustainable urban policy. Strategic municipal plans that promote urban children's wellbeing, urban planning interventions that ensure children can enjoy independent active mobility, and design practices that provide activities and opportunities for children and teens in public spaces not only make cities more friendly to children, but also contribute to urban sustainability and resilience. Such strategies can be implemented, for example, to lure families to move back from the suburbs to dense core districts, thus contributing to the revitalization and economic development of urban centers, while at the same time controlling urban sprawl, reducing daily commuting etc.

The discussion about children as users of the city is even more urgent at this moment, since the experience of the lockdown during the COVID-19 pandemic has shown very vividly how important public urban spaces are all citizens, and particularly for children. The closing down of play-spaces brought about the realization that urban space needs to be reshaped giving children equal share. Indeed, the pandemic has made visible the importance of designing urban neighborhoods, in their entirety, with children in mind, and not only spaces specifically designed *for children*, "unwanted patches set aside to contain children and their activities" (Ward 1977).

At this threshold it is important to rethink how children are included in public space and in the public realm. The quest for a truly "childhood city" (Karsten 2002) is still quite elusive, but of extreme urgency, if our societies are to escape the present-day domestication of play and of social interaction, children's growing addiction to screens, and the resulting impact on children's physical and mental health as well as the alarming disconnection of children from nature.

If we want a truly fair-shared city, we need a holistic approach, from the macroscale, policy level to the organization of districts and neighborhoods and the physical design of streets, school areas, and open spaces. To do so, a paradigm shift in urban design and planning is required. I call this new paradigm *Spielraum*. This child-centered agenda can be condensed into four main rubrics: *design practice as civic praxis; openness and self-management; inclusion and interconnection; doing more with less*. In this paper, I trace these characteristics in historical and contemporary examples of child-centered practices. I put emphasis on recent cases and particularly on pandemic responses in cities around the world that have given priority to children as users of open spaces, as well as municipal policies that put forth children and their needs as a vehicle towards sustainability.

*Keywords: children; urban sustainability; child-friendly cities; post-pandemic city; Spielraum*

## **Children's social networks, practices and experiences as agents in shaping urban policies and planning.**

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### **Extended abstract**

The concept of urban sustainability has been linked to networks, practices and exchanging experiences between urban centers. These conceptual tools shape the urban agenda for children-friendly cities. However, approaches for children's wellbeing in cities are bound to be superficial and restricted to general outlines, insofar as they fail to take into account children's doings in the urban space. This paper wishes to contribute to this discussion, considering children's networks, practices and experiences as vehicles that provide urban planning with tools to enhance the quality of children's urban life.

Drawing on the data of an ethnographic study with children 7-12 years old, this paper takes as a starting point the fact that children's lives are articulated in common places. Common places are considered as intersections of daily routes and are approached through socio-spatial practices. These are the places that children meet others, act together and develop their social networks. To this end, this study focuses on the public school and square, as they have a leading role in their everyday lives. Both school and square are local hubs, where children shape their identities, negotiate their relationships with peers and "others" and cultivate their sense of belonging. Encounters at school and square enable social bonds and raise the issues of coexistence and difference. These are the places that formal and informal networks, scheduled and fleeting encounters, dominant and invisible aspects of social life get interrelated. In addition, children's practices in common places highlight their active role in preserving the memory of the place.

Children's doings provide tools in urban policies and planning that can strengthen their place in urban cities. A grid of public and social functions is revealed that activates complementary and mutually supportive social networks. Spatial proximity, diversity and density of social networks are critical factors that determine their everyday practices. Children's wellbeing in urban cities is intertwined with their chances to develop their own practices, whilst visibly living among others. Studying their networks, practices and experiences of space and time, children urge us to rethink all scales of urban design, taking account that place is a product of social interrelations.

*Keywords: social networks, everyday practices, encounters, common places, children's geographies*

## **Participation on wheels: A ludic tool for citizens' engagement in urban participatory processes**

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### **Extended abstract**

The new European agenda on urban planning strategies has focused, inter alia, on processes of citizen engagement towards a more inclusive urban space. In this context, research over the last decades has recognised the value of collective actions and their impact on public space. Citizens' empowerment and participation on issues related to urban life is the starting point towards an inclusive planning strategy. This engagement is even more crucial in the post-pandemic era, as the experience of the pandemic has taught us the significance of our unrestricted interaction with public space. This project explores ways in which active citizen participation in urban planning can be achieved, through the incorporation of an interactive tool in the participatory process. The tool's name, 'Participation on Wheels', is inspired by its morphological characteristics combined with the social purpose for which it was created.

'Participation on Wheels' is a transformable multifaceted construction, designed to enhance the process of a participatory action in public space. It consists of a modular unit that includes frames to which different surfaces fit. This modular unit is repeated six times to form a dynamic structure that can be transformed to serve the multiple stages of a collective action. The frames are connected to each other by joints that allow them to move freely in one direction. The movement of the frames is stabilized with the help of nodes that secure the connections of the modules at specific degrees. Thus, with the appropriate rotation and by adding surfaces, the construction is transformed into a cart that transports the equipment used in each workshop, a ladder that exposes the tools of the workshops and provides information on the type of action being carried out, or a workbench for planning, mapping and filling in research forms. The workbench is adapted to more than one height, facilitating the participation of younger people or adults in the workshops.

The idea of this construction is to function as a core of participation and as a tool that facilitates the transition of the urban planner from the workplace to the research field. In this way, the planner develops a direct relationship with the community and values local knowledge. The initial intention is to explore the dynamics of urban space, to challenge existing planning and to find more inclusive ways of engaging citizens in urban planning issues. Its aim is to encourage curiosity, openness to new creative approaches to participatory planning of public space and to highlight the need for multiple ways of communicating and interacting with citizens. It is placed in frequented places to inform as many passers-by as possible, to gather around concerned citizens and to enhance the interaction with potential participants.

The inspiration of this project comes from interdisciplinary teams of professionals based in Barcelona who study and experiment with ways of actively engaging citizens in urban planning. They introduce interactive tools, such as the cart, in order to encourage people to get familiar with the everyday neighborhood spaces and to participate in transformative processes in public space.

*keywords: participatory workshops, citizens' engagement, collective urbanism, participation*

# **Involving children in urban planning: collaborative approaches and methods of participation**

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## **Extended abstract**

Alongside the urbanization phenomena, the number of children growing up in urban environments has steadily increased through the years. Children living in urban areas are subject to risks that may affect their mental and physical healthy development, namely, noise and air pollution, traffic danger, crime, social isolation and, disconnection from nature. This paper starts with a literature review addressing the current state of the art of participatory approaches and methodologies aimed at the inclusion of children in urban planning activities. In addition, we present the context, methods, and specific characteristics of the procedures implemented in several studies with an analysis of the key findings to identify the best practices and their outcomes for kids and communities.

Even though scholars have examined the influences of the urban environment on children's well-being and health, the inclusion of children in the decision-making process of the city planning field is relatively recent. The current urban planning participatory approaches do not accommodate adequately the youth well, especially those of a younger age. Children need age-adjusted strategies that acknowledge their differing abilities to communicate their needs and ideas; as well as, methods that engage with their disposition to play, move, create, and explore. Schools offer a variety of opportunities to engage with children and, for this reason, school-aged children are satisfactorily depicted in studies. In contrast, children aged 1 to 5 years old are the least represented group. Depending on the scope of the study, and the age of participants, strategies may vary significantly. Traditional methods include interviews and observations and, expressive methods may require the kids to create drawings or take pictures. Practitioners and researchers also organize workshops, field trips, and discussions as means to educate, inform, and include children in the procedures.

Communication is a sensitive topic that often requires a multidisciplinary approach as a means to ensure that the participation process is relevant and meaningful for the children. Researchers may be subject to misinterpretation when evaluating children through traditional methods. Children may lack words to express themselves and, this leads to the usage of art, play, and other practices as tools of inclusion. A successful and sustainable planning and design process, with the inclusion of children, requires a highly diverse group and a significant focus on communication - both in sending and receiving information.

This paper intends to critically analyze the numerous approaches applied with children, by pointing out limitations and recommendations in outlining future collaborative processes, namely considering multidisciplinary approaches, with the involvement of multiple actors and sharing of responsibility.

*Keywords: children, child-friendly cities, urban planning, urban design, collaborative approaches and methods*

## **What if we "read" the city through children's maps?**

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### **Extended abstract**

Young children's cartographic illustrations and narratives highlight urban planning and living issues that receive social and political ramifications. Their ideas, observations and the way they perceive and describe space converge at various points with the approach of critical theory in cartography. Their maps reveal that space is reinterpreted in every attempt to depict and interact with it. Therefore their cartographic practices work as an exploratory act that does not attempt to reproduce facts but instead produces new knowledge. So it becomes clear that through this process they aim to discover rather than to represent the world. The sense of continuous evolution is evident in their spatial narratives, in contrast to the static and consolidated maps that we are accustomed to encounter in our daily lives. It is observed that through children's eyes, the city becomes more open to interpretations, inviting adults to recognize and study urban space in these terms. Although the map may -for most adults- be a tool for reading and navigating the space, it is also considered the ultimate means of studying and designing the space. Thus, mapping practice becomes essential and necessary for understanding, interpreting and processing urban space. This aspect offers a social character to the map, as it enables each person to form and express their own point of view. In other words, it becomes, even informally, a tool that enhances participation and inclusion in urban planning and highlights the fluidity of the city. Children's mappings contribute to these social practices as their intentions to record their personal views are devoid of the fear of a possible inaccurate approach, or of the lack of objectivity. Their mappings address critical issues such as sustainability, security, inclusion and accessibility in the urban center. These issues concern all citizens, especially in the post-pandemic era, after having experienced strict restrictive measures regarding our flawless movement in the city. Children's illustrations remind us that the urban space is primarily a field of social interactions, through which it is constantly being reshaped. Their ability to capture their thoughts and perceptions of space give an enlightening example on how we can research and analyze the complexities of urban space, and consequently to envision new formations of living in cities.

We study the above concerns through the maps of children aged 6 to 7 years old, which are depicting their neighborhoods in areas of the center of Athens. Their mappings reveal their tendency to focus on their personal spatial experiences, and through them, to highlight their desires, needs and concerns for the urban space.

*Keywords: children mapping; child and city; social mapping practices; inclusive urban planning*

## **Designing public space with children: Toolkits for participation**

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### **Extended abstract**

This paper is part of a PhD research in the Doctoral Architecture of Contemporary Metropolitan Territories - Cities and Territories, at ISCTE-IUL, with the title "UAIG (Urban Areas of Illegal Genesis) - (re) living to (re) integrate – Micro practices for (re) qualification of the public space", from which a strategy for (re) qualification of UAIG (Urban Areas of Illegal Genesis) can be developed through the introduction of an intervention methodology based on collaborative participatory processes with children, with the object of study municipality of Cascais, investigates the integrated transformation urban design of clandestine neighbourhoods, based on the assumption that designing a city that respects children's space and needs is the basis for solving the current challenges of cities and guiding them towards a future, where children's rights are given priority in public policy and decision making about city life.

In Portugal, in the decade 60's of 20th century, housing alternative was developed, transversal to the entire Portuguese territory, on the margins of the formal market, a consequence of the migratory movements that were developing in the outskirts of cities. The phenomenon has reached a great extent, especially in the Metropolitan Area of Lisbon, with the creation of multiple clandestine neighbourhoods, today, designated by UAIG.

The objective of this paper is to present several types of participatory tools, called toolkits, demonstrating a set of possibilities of participatory tools that can be used by children and applied in the design of (re) qualification of the public space.

A series of toolkits was created for different phases of a methodology- "Participate: Your idea. Your place", some of which were tested in two clandestine neighborhoods in the municipality of Cascais, giving priority to children's rights in public policies and programs, looking to the future of these neighborhoods through the eyes of the children.

*Keywords: public space; participatory design: toolkits; children*

## **Empowering children through co-creation: writing a book with and for children about their first steps towards urban independence**

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### **Extended abstract**

Children are largely absent from Polish social discourse, a fact which is mirrored in urban planning processes. Their absence creates a vicious circle – unfriendly urban space discourages children from going outside on their own, meaning adults do not see a need to make spaces more friendly for a group not present. The pandemic and lockdown, with their closed schools and temporary ban on unaccompanied minors on the streets, have only reinforced this.

The project – co-writing with children a book concerning their first steps into urban independence - aims at empowering children, enabling them to find their voice when it comes to urban space. The foundation for the book was data collected during research and workshops with children from Warsaw primary schools, aged 7-10 - the age they begin independent travel in the city.

The project was carried out with the participation and involvement of children at each creative step. Children were (1) models: the narrator is an 7-year-old boy, getting ready for urban independence. He shares his experience as well as the experience of his school friends and his 10-year-old sister, who already travels on her own. Children were (2) teachers: the book is based on authentic children's stories and experience, along with the author's findings from research undertaken with children. The material was extended by observations and conclusions made during the pandemic. Children were (3) reviewers: a series of draft chapters from the book underwent review by children during workshops performed in a school.

The process demonstrated that all children experience similar pleasures and worries when it comes to interaction with urban space. Furthermore, they also have similar needs that need satisfying. In my article I will discuss; (1) the advantages of creating together with children; (2) my conclusions on how to work with children in participatory processes; (3) research results: perceptions of urban space by children age 7-10, when they begin their independent travel in the city; the barriers to and pleasures derived from independent urban travel; the influence of the pandemic on children's feelings and their behaviour in urban spaces.

*Keywords: children; urban space; co-creation; participation*

## **Playing as a tool towards a sustainable urban reality**

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### **Extended abstract**

In this project, playing -and playful practices- are studied as a means of participation in urban issues and the procedures concerning urban design. At the same time, the predication that civil participation and urban development are interrelated and co-dependent is investigated, considering the fact that civil participation itself is considered as a key pillar of urban sustainability. The importance of play for the modern human as part of the community and the city, may interrelate and connect with their urge to express their ideas for the city and involve themselves in the urban decision making scene. More specifically, this project is based on the assumption that public space can only exist in its entirety when it reflects the needs of the people who experience it. Therefore, when the challenge of reviewing and planning public space emerges, the citizens and their needs must be taken into account as key points of the process. Generally, civic engagement on urban issues and collective action- in order to address those issues and find solutions- is the way towards a more sustainable reality. More specifically, we cannot debate the crucial subject of urban sustainability without first considering how we can build our cities, neighborhoods and communities in a more circular manner, through empowerment, inclusivity and participation. In raising the issue of participation in the processes of the city, the need for these processes to be improved arises, so that they are more open and attractive for the average citizen to get involved in. Through my research, I have found that games and play in the city / for the city have the power to embellish the decision-making and planning processes for the city and thus, transform them from procedural processes into more enjoyable, palatable and inclusive activities. The act of playing or even collectively designing a game could be a critical urban tool as it appears to have the power to redefine the relationship between the citizens and the urban issues that concern them, and function as a force of mobilization for the people and the public space of the city. All of these are applications that play or games can have in the urban environment; whether it means the literal act of playing in the public space, or the integration of playful practices in the decision-making and urban planning processes, or simply the design of an urban game with or for the people of the city. In summary, games related to the city have a very wide field of application and their use in urban areas can promote changes in the way citizens exist and participate in their cities on a practical, social and intellectual level. To conclude, on the way to a more sustainable urban reality, it is important to consider citizen mobilization and participation as necessary steps in the process and therefore recognize and take advantage of all available means towards this goal.

*Keywords: play; urban tool; public space; civil participation; urban sustainability*

## **The school threshold as a place for interaction. Research projects with the participation of elementary-school children**

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### **Extended abstract**

School entrance is one of the most important spaces related to children's everyday lives. Through gradations of porous or rigid boundaries, it performs as the intersection between school and the public realm of the city. It can be inviting or repelling, a threshold or a boundary. It is also a spatial condition that activates the dialogue between school and the city and draws content from the two. By experiencing this in-between space, we obtain simultaneous oversight of both realms.

When a school's threshold possesses prominent usage and meaning, being a place open to the community as well as to possibilities and physical interaction, it reinforces the role of the school as an important node in the city and a bridge between children's different everyday life dynamics.

In this piece of research, we examine the role of the "realm of the in-between" city and school space through architecture workshops for children. We implement those workshops as an interdisciplinary group called Athens Superscript. We also invent tools and methods through which children can reflect upon social action towards their community, neighbourhood and thus the city as a whole. I am specifically using the example of the back gate of the 35th elementary school of Athens -that has been transformed into a library and vegetation space, in which books and plants are supposed to invite children from both sides to explore it- as well as the architecture workshops implemented in Hill Memorial School. We explore children's perception, wishes and ideas about their familiar everyday place of transition from school to the city and vice versa. Using architectural tools of representation, we shift our attention from the school building and the urban environment to what lies in-between. We use multiple languages and notational systems [maps, photographs, cognitive maps, collage, questionnaires, texts, drawings, structures, body movements and postures] encouraging their co-relation. This interaction is being cultivated through a systematic focus in symbolic representation. Children critically observe their school's boundaries and express on 3 or 4 dimensions their ideas about ways of moving forward in educational and design terms.

The presentation also refers to the writings of Herman Hertzberger, Lamberto Borghi, Aldo Van Eyck, Barbara Comber, Jaap Bakema and other researchers that have explored the way school's threshold serves as a meeting place and opportunity for exchange, an excellence place of coexistence and conciliation.

*Keywords: boundary, threshold, in-between space, elementary school, representation*



## **THE X-MINUTE CITY: MODELS OF URBAN PROXIMITY**



**Changing Cities V, Corfu, 20-25 June 2022**

**Organized and chaired by Ass. Prof. Alcestis Rodi**

**Ass. Prof. Alcestis Rodi**, Department of Architecture, University of Patras



# Aristotle's Mosaic: The pandemic's hybrid landscape and the intangible presence of the past

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## Extended abstract

Designing spaces that encourage “living together” in “times of pandemics” requires the understanding of historical, geographical, and cultural landscape. The meticulous exploitation of past experiences can help develop a pragmatic plan for the future.

A typical example of a radical redesign of a multicultural city is the reconstruction of modern Thessaloniki a century ago. At the core of this presentation is the Aristotle Axis in Thessaloniki, originally conceived as the “Boulevard de la Société de Nations”. A related double exhibition in the frame of the Greek participation in the 17<sup>th</sup> Biennale of Architecture was presented simultaneously at the Greek Pavilion in Venice and in situ at the Bey Hammam in the area of the Aristotle Axis.

The urban axis bears the name of the methodical ancient philosopher and polymath, Aristotle, according to whom:

Human beings are by nature “political animals” and as creatures of reason take part in the life of the polis, not only for physical survival but also for the sense it gives of an organized community. Aristotle's oft-cited formulation allows for multiple investigations into the substance of human nature and the public space of the polis.

Citizenship is distinguished from other forms of community, such as kinship or companionship, as it is rooted in the potential equality that emerges from dialog and the laws governing relations between individuals.

The “Boulevard de la Société des Nations”, the epicenter of Ernest Hébrard's plan for the reconstruction of Thessaloniki (1918-21), followed an idealized Grand Manner dominated by a notion of centrality. The Aristotle axis can be seen as an extensive series of sweeping perspective highlights, integrated into the city's sloping topography.

At the root of the interventions, foreseen in the urban plan, lay the vision of strong political authority embraced by Venizelos and Papanastasiou.

The pursuit of an eclectic regionalism was underscored by introduction of “neo-Byzantine” details. These decorative motifs formed part of a façade architecture that featured classicist proportions and the alternation of volumes and voids.

Economic conditions prevented Hébrard, Zachos and Kitsikis's ambitious visions from fully being realized. Their dramatic mis-en-scène remained unfinished.

In the post-war years, it took yet another powerful political intervention by Prime Minister Konstantinos Karamanlis, to complete reconstruction albeit at greater density and with a simplified iconography.

The Grand Manner in the plan sought to achieve monumentality, order, and rationality, as opposed to the “chaotic” organic structure of the traditional city. Such “authoritarian” approaches were a common feature of not only neoclassical but also many modern solutions that adopted a central hierarchized management of urban space.

Despite the partial implementation of the original plan, the central monumental promenade of Thessaloniki remains today a pleasant surprise in typology and form, a unique public space with a heightened sense of urbanity. The realized section is marked by a sober monumentality, contributing to the unique identity of the axis, and ingraining itself in collective memory.

During the COVID-19 pandemic, the Aristotle Square and its axis, nearly deserted, brought to mind the paintings of Giorgio di Chirico. The sacramental melancholy of this urban still life, formed in rows of uniform neo-Byzantine façades, seemed to be dominated by startling intangible sculptural presences.

The palimpsest of Roman, Byzantine, and Ottoman elements that accentuate this urban still life echoes the coherent architectural composition that surrounds them. With the arrival of the pandemic, the day-to-day bustle in the square and its axis abated, allowing revelatory metaphysical references to emerge in its place. Strange perspectives came into view that brought to the fore distant traces of a lived space.

What sources of inspiration did the designers of Thessaloniki's monumental axis draw upon?

Paris's royal squares and façades, which Ernest Hébrard had known first-hand?

The Roman ruins and archeological reconstructions in Split, Diocletian's palace-city?

Andersen and Hébrard's utopian vision of a global city, which sought to employ art as catalyst to create a World Center of Communication?

The surrealistic image of the ruined basilica of Saint Demetrius that Alberto Savinio, de Chirico's brother, painted during his stay in Thessaloniki in 1917?

The basilica of Saint Demetrius, rebuilt by Aristotle Zachos, who sought to revive an imaginary neo-Byzantine grandeur through an archaeological surrealist utopia?

The prospect, which became feasible with political leaders such as Eleftherios Venizelos and Alexandros Papanastasiou, of applying modern-day ideas to rebuild Thessaloniki as a Balkan metropolis in which memories of Byzantium could be revived at the same time?

The politicians and architects who created this metropolis, with its multi-story buildings, modern-day infrastructure and city planning, favored hybrid urban landscapes that accommodated an idealized projection of the past. Arcades and uniform façades, enriched with classical and Byzantine motifs, sought to give shape to the never-ending cycle of "motionless" time.

We may have had occasion these days, to view these cityscapes as a wilderness created by the COVID-19 pandemic. An image akin to the perspective drawings originally made for the monumental Aristotle axis, in which sculptures and gardens are surrounded by volumetrically articulated, ornamental façades, without human presence.

The palimpsest of the deserted center of Thessaloniki resembled a vast urban museum that was closed to the public. The few masked pedestrians to be seen recalled the faceless figures of de Chirico and the Surrealists. Paradoxically, it was in the gloom of lockdown that we came to truly appreciate the value of public space—that precious, incomparable space where we can truly "live together", surrounded by the emblematic setting that classical city planning has bequeathed us.

*Keywords: Aristotle Axis; grand manner; pandemic; Thessaloniki; urban landscape*

# The post-growth/post-mobility city of the Ecological transition. Paris-Geneva-Luxembourg

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## Extended Abstract

The performative task of time-space optimisation is a persistent characteristic of modern urban models. Space is optimized with new material and spatial arrangements; time is optimized through speed and simultaneity; their combination is optimized through the development of hybrid space-time configurations. From the MVRDV's Five-minute-city to Carlos Moreno's 15-minute city, the pursuit of human ubiquity (being always at the right point at the right time) as a means to gain a comparative advantage over... (over whom actually ?) is haunting the construction of the contemporary metropolis.

Hybrid derives etymologically from hubris, a term used in Antiquity to designate the intentional use of violence, for purposes of humiliation, or degradation. The word's connotation changed over time, and hubris came to be defined as overweening presumption that leads a person to disregard the divinely fixed limits on human action in an ordered cosmos.

The post-covid world order tends again to be overtly mobile, erratic and chaotic. Humans and goods are expected to move again fast-faster-fastest, to consume or to be consumed, or both. In this sense, the X-minute city designates the best shortcut towards the ecological precipice. The ecological transition towards a non-fossil-fuel era and a zero-carbon environment is the only acceptable target for our societies, if they ever manage to escape the entanglement of warfare and horror... Therefore, time-related planning in cities will have to consider slowness, locality, and sobriety. Dense urban realms such as Paris, and less dense ones like Geneva or Luxembourg have been thought over again in the recent fifteen years under this prism. They became the cradles of visions and projects for a less mobile, more resilient future, and could be considered as the precursors of a post-growth transitional model of urban development.

# Is the 15-Minute-City (FMC) model applicable in the Greek context? Evidence from regulations, practice and reality

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## Extended abstract

This paper examines whether the 15-Minute-City (FMC) model for urban policy making and planning concept is applicable in the Greek context.

Although conceived in 2016, the FMC model gained global popularity after the onset of the COVID-19 crisis. It represents a relatively new way of thinking about urban planning and policy – one that is centered on the human scale and experience of the city. Its core premise is that cities should be designed in such a way that within a walking or bicycling distance of 15 minutes, citizens should be able to meet all their needs, i.e. access work, home, food, health, education, culture, sports and leisure. To this end, it gives prominence to the ‘neighborhood’ as the basic element of spatial and functional organization, and it argues that the city should be organized in neighborhoods, within which any need should be met within a 15-minute walk or bike ride. Besides proximity, other important planning principles of the FMC include an enhanced land use mix, the optimization of the use of land by means of allowing for multiple functions in the same place, the variety and affordability of housing options, etc.

To understand whether the FMC is applicable in the Greek context, we first shift our focus to the elements of the Greek urban planning system that are relevant in a FMC framework. Our research indicates that the Greek urban planning system is already compliant with many of the premises that can be found in the model, as it provisions:

the organization of urban space in organic Neighborhood Units (NU)

the adoption of compliant urban planning ‘standards’ in the design of the above organic NU

a conducive land use regulation regime

The research continues by means of collecting observations from the planned and built reality of Greek cities. We find that: (a) In terms of realized plans, two recent local land use plans concerning the Municipalities of Thessaloniki and Kalamaria resonate (or could resonate with small modifications) with the ideal plan of the FMC (b) In terms of built reality, Greek cities, even after a period of 35 years of official urban planning, are still, to a large extent, the result of spontaneous developments, characterized by the co-presence of various uses in mixed use buildings.

The above, of course, are not to argue that Greek urban planning and policy making system are ideal in a FMC context. On the contrary, there are several recommendations that should be considered in Greek regulations for urban planning, as well as in planning practice. Also, many Greek Municipalities, especially the peri-urban and less urbanized ones, have local land use plans that are far from meeting the requirements of the FMC. We close the paper by meticulously describing our recommendations.

*Keywords: 15-Minute-City; urban planning; urban policy; Greek cities; chrono urbanism*

# Application of the 15-min city model in the Mediterranean context: a methodological approach for the city of Thessaloniki

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## Extended abstract

The fifteen-minutes city (FMC) model is a contemporary trend in urban planning that aspires to substantially change the quality of life in urban areas. The basic underlying concept is that all citizens are able to meet most or all of their needs within a short walk or bike ride from home. It is intended to function as a model of reconnecting people to their neighbourhoods and localize city life. In terms of physical planning, FMCs are heavily based on attributes that have been used as design flagships in the past, namely accessibility, walkability, density, land use mix and design diversity. Perhaps the main difference in relation to other neighbourhood-centered approaches is that FMCs intend to bring activities to the neighbourhoods and not people to the activities, restoring an older urban planning concept this of proximity. Proximity is one of several principal ways for people to access spatially distributed opportunities in the urban environment and is rather different from accessibility. In the FMC concept, the proximity principle assumes immediate and short distance access to a wide range of amenities that are important for quality of life such as healthcare facilities, preschools and schools, social services, commercial services, leisure, cultural and entertainment amenities, parks and natural areas, this list being indicative rather than exhaustive. Nevertheless, this rather simple and obvious principle of FMC presupposes a great deal of compartmentation of services and facilities at the neighbourhood scale, in order to equilibrate differences between districts citywide. In addition, application of this model requires to elaborate on the hierarchical order of public services based on facilities' market range and threshold populations. This paper presents a real-world application of the FMC model in the Mediterranean context. It focuses on the development of a methodology that takes into account the basic principles of FMC and applies them into two urban districts that present different features (i.e. urban and population density, land use mix, connectivity etc.). Since there is no formal document that delineates the basic principles of the FMC model, a review of several planning strategies that have adopted this new model of city vision is performed. The review includes cities from the Asian, European, Australian and American continent. Finally, the comparative application of the methodology in different urban contexts (Municipality of Thessaloniki and Thessaloniki) enables the deeper understanding and evaluation of the model while it suggests possible improvements for the implementation of the model in a Mediterranean context.

*Keywords: 15 min city, proximity, land use planning, chrono urbanism*

## Homo medicus & the post vaccine city

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### Extended abstract

The essay attempts to trace the influence of medical discourse on the formation of the concept of the ideal city through the investigation of the elements that are likely to shape the Post Vaccine City of the Future.

The pandemic has challenged and altered our everyday routines and rituals and subsequently the way that we experience and appropriate the city, thus raising the question of the suitability of the urban space in the Post Pandemic era. The emergence of concepts like amateur epidemiology, the sin of overcrowding, the digital self, the shame of the naked facedictate a new modus vivendi and ultimately shape the model of the new urbanite who is completely dependent on the new medical context. The issue of the Post Vaccine City affects the new formation of the subject (Homo Medicus) around a medicalised doctrine.

Through the archaeology of Medical Anthropology the essay studies the methods that have been used in to manage past pandemics (Leprosy-Plague-Smallpox) in relation to cultural and moral issues and the respective enforcement of policies that shape the concept of the Ideal City (The Rite of Exclusion - The Disciplined City - The Cultivation of the Self).

In conclusion, the formulation of 3 questions-directions attempts to answer possible scenarios of the city's evolution after the pandemic.

The reason of the experts brings to the fore the issue of faith in Technology. What is its relationship with the new phenomenon?

How are the make-shift practices of appropriation of the public space of the city shaped in the post-pandemic era?

The condition of confinement defines a new framework for the rise of the importance of the interior space. What is the relation between the new conception of the digital self and the spatial articulation of the interior?

The research attempts to summarize the experience of the pandemic in relation to the new perception of the urban space by outlining the new urban condition through the transformation of the concept of the ideal city and the emergence of Homo Medicus as its central protagonist.

*Keywords: Homo Medicus, Medical Anthropology, Pandemic, Post Vaccine City, Ideal City*

## C40 Reinventing Cities: A global students' competition on 'Reinventing Kypseli'

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### Extended Abstract

In the context of the 2021 C40 competition, participants were challenged to imagine a more sustainable and inclusive vision for cities across the globe, by rethinking how neighbourhoods are lived and imagined, planned and designed. The main goals of the competition were to deliver new approaches for low carbon urbanisation, to address the climate crisis and envision a future that has climate and social justice at its heart.

In response to the competition brief, the Coastal Domains Initiative at the Department of Architecture, University of Patras selected Athens' Kypseli site and set up a dynamic interdisciplinary collaboration with the University of Geneva and Harvard Graduate School of Design. The two competition entries -and eventually the competition winner- were developed by DoAUP architecture students working remotely yet closely -through joint working sessions, reviews and a lectures series- with UniGe social sciences students. Twentythree collaborators, through two integrated masterplans, *reinvented* Kypselineighbourhood as a residential, commercial, creative and common space to live, work, and enjoy urbanity.

Key concepts and actions considered in the strategies include *the 15 min city* through the provision of high quality accessible services and urban infrastructure available to all; *circular economy* providing the necessary infrastructure to scale up reuse and recycling of materials, waste and by products and promoting practices associated with sustainable businesses; *green design* through the adaptation of environmental principles and nature-based solutions that promote climate resilient private and public, built and open space; *upcycling of the polykatoiki* through the optimisation, repurposing or retrofitting of the existing building stock.

Kypseli's urban density proved adequate to support a greener and better quality of life through improved urban design, lower carbon footprint and more efficient infrastructures. The since the 1930's covered Levidi stream that continues to flow beneath Fokionos Negri boulevard giving life to its dense vegetation, had a strong role to play in achieving human interaction with natural ecosystems, designing meaningful and engaging public spaces, improving quality of life and most importantly enhancing climate resilience and social cohesion.

*Keywords: polykatoikiaupcycling; green design; 15 min city; climate change, circular economy; sustainable development; Kypseli; Athens*

## 15-minutes cities; the regeneration of Greek cities

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### Extended abstract

The '15-minute cities' is a recent approach, introduced by Professor Carlos Moreno, Sorbonne University, 2016. The concept of '15-minute cities' is defined as the regeneration of cities in such a way that each neighborhood has all necessary services for residents. This new city model seeks to minimize the daily movements of citizens saving time and providing it for various activities and personal pleasure. It also aims to eliminate the human footprint in the environment, encouraging limited car use. The Covid-19 pandemic has revealed various problems of cities, already existing, especially in Greek cities; These are lack of green and public open spaces within the urban fabric. This paper is based on doctoral research just started, and concerning Greek cities and urban regeneration in the framework '15-minute cities'. The research will attempt to explore the directions and ways of regenerating the urban fabric and public open spaces of Greek cities in order to increase the resilience and sustainability of the central and densely populated areas of Greek cities while improving the quality of life of residents.

*Keywords: 15-minutes cities, regeneration, Greek cities, sustainability*



## **EXPERIENCING SUSTAINABILITY FOR CORE URBAN AREAS IN POST-PANDEMIC CITIES**



**Changing Cities V, Corfu, 20-25 June 2022**

**Organized and chaired by Prof. Dimitra Diana Babalis**

**Prof. Dimitra Diana Babalis**, Department of Civil and Environmental Engineering, (DiCEA), University of Florence, Italy



## Changing Worker-scapes in core urban areas. A Masterplan for the former cement factory 'Marchino' in Tuscany

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### Extended abstract

The paper investigates on the sustainable regeneration of the Cement Factory 'Marchino' in Prato by looking on how former industrial buildings can be properly reused within transformation of the surrounding environment of great value. The Cement Factory was built between 1926 and 1927 and was properly designed and structured on a hill area due to limestone formations and the marl soil, essential for the production of cement but also to a well-connected infrastructure system with the main Railway 'Rome- Milan' and the 'Florence-Sea' Highway.

From 1928 to 1930 the plant's production was based on the four vertical Rysager furnaces, clearly identifiable by the quadrangular chimneys, still today, well visible and preserved. In the following years, the cement plant experienced a period of growth, so much that it became essential to expand the mining area and subsequently the production area with a new UNAX rotating kiln. More than a hundred of workers were employed, the most mainly arrived from the textile industry of Prato and the factory became of great importance and productivity.

In 1944 part of the buildings were destroyed by the German troops. In the post-World War II, the Factory went back into operation but never returned to levels production in the years before the war. In 1958, the Marchino & Co Cements Union asked for permission to stop mining, from that moment onwards the Factory was used only as a deposit.

In 1985 the Prato "City Regulation Plan", (PRG) had defined part of the area as a core site of great social interest and of significant architectural value. Regulations were proposed by local authority for landscape conservation and the reuse of old industrial buildings. Later other actions plans have been proposed but still now the industrial complex is under an evident abandon condition.

The paper aims to present a proposed Masterplanning methodology that takes into consideration a sustainable reuse of the former industrial buildings into a Museum, Exhibition Centre, Music School including other facilities. Further, an open space design is proposed that can create enjoyable sustainable core places. Finally, many aspects have been considered to drive change and re-create connections with the city core areas, accessibility and sharable places while upgrading the industrial landscape for the post pandemic City.

*Keywords: Worker-scapes, urban regeneration, sustainable masterplanning, cement factory, open space design, post-pandemic city.*

# Industrial Heritage Architecture and Sustainable Regeneration on Texas Urban Waterfronts

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## Extended abstract

This paper examines industrial heritage preservation in waterfront areas of Texas: San Antonio's Pearl Brewery and Sugar Land's Imperial Sugar district. These two postindustrial sites are prime examples in the rehabilitation of the industrial. The Pearl Brewery, which production ceased in 2001, is an architecture-oriented initiative for reusing former industrial heritage. After site inventory and two years of plan development, Pearl has become a "flavored, lively food-oriented urban district" on the banks of San Antonio River, with restaurants, shops, office spaces, a branch of the Culinary Institute of America, weekly farmers-market, and residences. With innovative sustainable design strategies, the project developed by Lake-Flato achieved LEED Gold certification, and has received several awards, including the 2009 AIA San Antonio Design Award, 2014 AIA National Honor Award, 2015 CNU Global Charter Award, and 2017 Urban Land Institute Global Award for Excellence. The Pearl has served as model for Sugar Land's rehabilitation plans of its old Imperial Sugar Company, Texas' first sugar refinery and the oldest business in the state. In the 1920s Sugar Land flourished as a company town. Under the impact of Houston's expansion in the 1950s, it changed status. In 2002, activities in the refinery ended, so that its original identity and history, connected to the sugar industry, has been weakened. The area has been on the verge of redevelopment and included in the National Register of Historic Places in 2017. The plan for Sugar Land's district forms an important case study of a defiant industrial structure on the bend of Oyster Creek, and subject to flooding, as well as of urban rehabilitation and "reUrbanism" strategies. A comparative study attempts to reveal common models and to distinguish specific characteristics of each location, looking at issues related to sustainable regeneration in post-pandemic times.

*Keywords: industrial heritage; architecture; adaptive reuse; sustainable regeneration, urban waterfronts*

# A Spatial Risk Assessment on Coastal Communities using Bayesian Networks

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## Extended abstract

With wide access to resources such as the FEMA National Flood Hazard Layer and the NOAA National Storm Surge Hazard Maps, several coastal communities have available their susceptibility to each potential natural hazard distributed over large areas. However, it is a recurring problem for local authorities to estimate the impacts of one, or a combination of these regional hazard maps, even with the support of fine population distribution (e.g., ORNL's LandScan) and local building and land-use details prepared by tax appraisal districts. Few studies tried to combine independent maps (i.e., spatial data) to create a robust assessment of risk that can be replicated not only locally but also at a regional scale. Typically, a grid (or mesh) is defined by a regular, abstract, repeating geometric shape. An elementary problem with this choice is the lack of a meaning for planning applications. This research proposes a methodology that can understand exposure to some natural hazards at the community level. Using a novel gridding process, based on city blocks that can be better acknowledged by residents and authorities, a Bayesian Network model is applied systematically to integrate different sources of information and estimate risk. A case study is developed in La Marque, TX, a coastal city in the Houston Metropolitan Area, frequently exposed to hurricane surge and inland flooding. Risk is quantified in terms of the number of residents and homes at-risk and structure values. The proposed approach can help researchers, emergency managers, and decision makers to better qualify and quantify risk in small areas and communities, as alternative to the subjective visually based analyze of individual exposure maps.

*Keywords: coastal communities; urban planning; risk assessment; spatial gridding; Bayesian Networks*

# Rethinking networks of small - scale public places for a Resilient Urban Design after Covid pandemic

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## Extended abstract

The pandemic could be a major agent of change for urban public place's transformation. COVID-19 has strongly affected the life of public places, both indoor and outdoor, also caused serious collateral damages in many socioeconomic aspects of urban daily life, as it was essentially connected to these places. As this pandemic situation has an extremely fast swept across the countries, it became everywhere the main cause for the disorganisation of public life in the outdoor places, also denying that we were out of place in the way we designed so far the city outdoors, to deal with such harsh conditions. However, this did not make much sense, if we consider that this pandemic is not the first, but the last of four fatal pandemics in the past century since 1918. So, the critical question continues to remain: what does an outdoor public place need to be prepared for a *pandemic*?

This paper examines the potential benefits that *small outdoor spaces* can give in a pandemic situation. In contrast to the large, central outdoor places of the city, where there is inevitably a huge concentration and density of people, both in the use of space and in their public transportation, to and from them, significantly smaller spaces, scattered at a *neighbourhood level*, have strong advantages. They also enhance a development of a collective responsibility of the community, on a small scale, where individuals, especially the younger and the older ones, are usually well acquainted with each other. On the other hand, we should not ignore the fact that a walkable city where citizens can get to a small public outdoor on foot is much more effective in reducing dispersion as we already know very well that in cases of pandemic the transmission of the virus is directly related to the kind and the conditions of *mobility*.

Under these conditions, for the renewal of small *outdoor networks*, we need to rethink certain key points, as it is important to introduce and upgrade new technologies throughout a smart mix of *virtual* and *physical* space, especially for younger ages and teenagers, enhancing a new *augmented reality (AR)*. Through these practices we could possibly emerge alternative forms and activities for art and culture, avoiding large gatherings and crowds.

All the above concerning on the city's small-scale outdoor networks may also significantly affect the future design of the large outdoor spaces, by enhancing them with many new features that will make them more *resilient* to pandemic situations.

*Keywords: public places; urban networks; city resilience; urban design after covid pandemic; augmented reality*

# Re-starting from cultural heritage to design the resilience of historical urban centres

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## Extended abstract

Cities resulted more vulnerable to major global challenges, such as climate change and the pandemic. Indeed, cities are the places where most of the global population is concentrated; the high level of anthropisation caused a total break with the rest of the biosphere and the concentration of air pollutants poses health issues and is also proven to be correlated with the severity of the COVID-19 pandemic. Historical districts are even more fragile due to the compactness of the urban structure. Considering the urgency of these issues, urban resilience strategies has been a key topic in research for several decades. However, these strategies are often based on standardised actions, easily applicable to peripheral or recent areas, but not suitable for historical centres. Indeed, large-scale renaturing processes are hardly implemented in historical districts where transformable public space is lacking, and similarly new spaces designed for social distancing barely match the compact urban fabric. Overcoming these limitations requires a change of perspective and the re-placing of cultural specificities at the very centre of resilience strategies. The international debate fully support this approach, as remarked in the The Hangzhou Declaration (2013), which recognized the active role of cultural heritage for enhancing “the resilience of communities to disasters and climate change”. To further explore the topic, the case study of Milan (Italy) was investigated. Milan is located in one of the most polluted areas in Europe. It has been experiencing the effects of climate change for years, especially in terms of rising temperatures, and was one of the cities most affected by the pandemic. Moreover, Milan is at the forefront of experimentation with innovative strategic planning. However, its historical centre is still marginally involved in urban adaptation processes. In this study, we analyse the specific urban and architectural features of the historical centre and we focus on the role of residential courtyards. In the past, these courtyards were places for socialising, integrating greeneries into the compact city and an extension of the public space of the street. Today they are underused and degraded spaces, dedicated to waste collection and car parking. The courtyards network represents a neglected potential for the re-naturalisation of the centre, which can have consistent benefits in terms of climate mitigation, psycho-physical benefits associated with the contact with nature and a more equitable distribution of green areas. The widespread distribution of these spaces makes them privileged places for recreating micro-scale social interactions. Lastly, due to their shape, courtyards have a better microclimate than the outside, and thus can represent shelters from summer heat waves, especially useful for the most vulnerable segments of the population. The results of the study are closely linked to the specificities of the context, but the methodology and general considerations can be extended to most European cities, linking resilience strategies with the idea that “heritage value and significance may be embodied in the uses, meanings, and associations of a place, in addition to the physical fabric” (Cassar, 2009). The contribution is part of YADESMSCA RISE Project.

Keywords: *urban cultural heritage, urban resilience, culture-based approach, historical centres, urban courtyards*

## Contesting or coinciding needs: The relationship between ensuring thriving urban cores and safeguarding historic qualities

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### Extended abstract

Regeneration of city centres are considered central for increasing the urban core's vitality. Such developments need to consider various demands, including the qualities of its surroundings. In this paper, we ask how the relationship between strengthening the city centre's attractiveness, safeguarding their historical cores, and ensuring healthy environments for their citizens is handled in a post-pandemic situation? Based on a comparative study of two middle-sized Norwegian towns, Lillehammer and Arendal, we examine closer activities carried out in two main streets. Both towns are well recognised on national, regional, and local levels as important heritage cities. City planners recognise their historic cores as assets in profiling the cities as attractive areas. They face the same challenges that other towns with a series of historic buildings meet. While they are working hard to attend to conservation regulations, other societal demands necessitate development, densification, and increased trade. In Lillehammer, we highlight the process of rebuilding a historic building in the lively, main shopping street, severely damaged by fire. We found that preservation of the historic building and increasing city centre vitality were essential goals, considered by the municipality as two ends of the same concept. By reconstructing the façade and allowing for a new internal layout, the main street's historical character is maintained, and more flexible premises for retail and services are ensured. In Arendal, we look closer at a quarter of historic buildings in the initial rehabilitation phase. Situated next to the main square and the pedestrianised street network in the city's historic core, future uses can contribute to a thriving urban core. However, an uncertain framework regarding acceptable changes to the historic buildings characterises the initial planning stage. Our aim is to identify how contesting or coinciding needs affect the historic city core and whether the planned projects have qualities enriching their city centres main streets and contributing to a thriving urban core.

*Keywords: Main-street development; Thriving urban cores; Cultural Heritage; Regeneration*

# Experiencing sustainability of historic cities through management plans

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## Extended Abstract

Sustainability is a challenging environmental, economic, and social process.

The Agenda 21 in Chapter 8 calls on countries to adopt national strategies for sustainable development (NSDS) improving planning and management systems. According to the same chapter “a first step towards the integration of sustainability into management plans is the establishment of better measurement of the crucial role of the environment as a source of natural capital. As sustainable development encompasses social, economic, and environmental dimensions, it is also important that national accounting procedures are not restricted to measuring the production of goods and services that are conventionally remunerated. ”Stakeholders’ collaboration and contribution to this process is necessary.

Furthermore, *Toledo Declaration on Urban Development* (2010) defined the multiple dimensions of sustainability as “economic, social, environmental, cultural and governance, based on the principles of openness, participation, accountability, effectiveness, coherence and subsidiarity in order to assure the successful implementation of public policies and to increase citizen’s direct participation, involvement, engagement and empowerment”.

This paper with reference to these international texts will propose basic principles regarding the historic cities’ management plans.

*Keywords: sustainability, management plans, historic cities*



## **CITIES' CULTURAL HERITAGE MANAGEMENT**

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# Historical Physiognomy of the City of Volos, Recognized by New Residents, First Years University Students

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## Extended abstract

A city can be considered to have a historical physiognomy when the collective perception of it is mainly characterized by historical elements. The main hypothesis of the survey presented in this paper is that 'The City of Volos maintains its historical physiognomy and the most characteristic elements of the city, through which it can be identified by new residents, are related to its historicity'.

To carry out the survey, a questionnaire was addressed a random sample of first years' students of the Department of Planning and Regional Development of the University of Thessaly, at Volos. At the same time, there surveyed the views of students on:

- The recognition of a historical physiognomy at the City of Volos and its possible impact on its choice as the city for their studies
- The intention to recommend the city to others for visiting-tourism, or as a place of residence for potential new residents.

The question, about the most characteristic elements of the City of Volos, through which it can be identified, was open-ended and allowed spontaneous responses from the interviewees, which were recorded in turn they reported them. There was followed the wording of Professor Joseph Stefanou and the main aim was to obtain the most characteristic elements of the city's identity -through the frequency with which they appeared in the respondents' answers- and as to the hierarchical order in which they chose to indicate the elements (or in which they were recalled in their memory), which of them would have more presence in the first position, which of them in the second position, which of them in the third position and so on.

Questions about the historicity of the city's physiognomy and its association with the decision to settle in the city for studies, and those concerning the intention to recommend the city to new residents and tourists/visitors, were divisive/dichotomous. Using the SPSS Statistics program, the results of all the combinations of answers and characteristics of the respondents were investigated and the statistically significant correlations  $\chi^2$  (with a confidence level  $\geq 95\%$ ) were revealed.

*Keywords: Historical Physiognomy; Identification Elements; Opinion Survey; City of Volos*

# Cognitive mapping of Volos: a figural and qualitative survey of regional planning students

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## Extended abstract

Cognitive mapping is a means to understand how people daily behave and function. It is a basic mental spatial basis upon which a person thinks, plans and acts. This function is thus so crucial for urban planning of any level as it reflects the way in which people interact with their urban environment. This paper aims to shed light to this mental mapping by undergoing a student survey of regional planning asking them to literally draw their city. As first years students with just few months of familiarity, in the medium-sized city of Volos, the results shall provide evidence of how new residents, of basic spatial understanding as students of regional planning, perform in their task of cognitive mapping.

The basic values that will be examined in terms of cognitive understanding and in this sense mapping are the following:

a. Urbanstructure

To identify a certain level of common structure between the different students maps. This finding may provide important information of what is the gluing factor of urban cognitive elements.

b. Urbanelements

What are today the major elements of an urban cognitive map, how different are they from the 60s Kevin Lynch's five major characteristics of: paths, edges, districts, nodes and landmarks? How does today's new technologies of digital mapping affect their understanding of urban space?

c. Localheritage

Is local heritage affecting qualitatively all the above, is there a possible level of attention that is evident to elements or other urban or social parameters?

Finally, this research aims to explain how cognitive city knowledge is influenced by a variety of factors such as age, gender, local familiarity, respondents' profile (visitors, students, local residents, etc.). The survey analysis is both a. qualitative, with a set of questions about the city of Volos and b. figural, with cognitive sketches of urban characteristics.

*Keywords: cognitive mapping; urban structure; urban elements; local heritage; city; Volos*

# Architectural history of the listed building of the Aristotle University of Thessaloniki Bequest “Thomas Papamichaelides”. Contribution to the protection of architectural heritage, urban regeneration and aesthetic upgrade of T. Papageorgiou Street in Thessaloniki

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## Extended abstract

The paper presents the architectural history of the listed building of the Aristotle University of Thessaloniki Bequest “Thomas Papamichaelides”. The four-storey interwar building, consisting of residential and commercial spaces, was built at 2, T. Papageorgiou Street in the suburb of Ancient Forum in the historic centre of Thessaloniki. In 2002, it was listed by the Ministry of Macedonia and Thrace due to its remarkable Art Deco decorative elements of its facade. The paper also presents the interesting but unknown history of the former owner and donor of the building, Thomas Papamichaelides, civil engineer, originating from Black Sea basin (Kars), to highlight his offer to the academic community and society of Thessaloniki. After having completed his studies at Tomsk Technological Institute in Siberia, Papamichaelides was forced to leave his homeland and settled permanently in Thessaloniki, where he lived and worked as a freelancer until his death in 1963. He bequeathed his property, as well as the above-mentioned privately owned building, by will to the University of Thessaloniki. Specifically, he determined that scholarships coming from the lease of the building, will be awarded to excellent students at the Faculties of Engineering, Physics and Mathematics. Today the building is empty, without use. However, its restoration and development are expected.

The Papamichaelides building is part of a remarkable architectural ensemble on Papageorgiou Street: at numbers 5, 6, 7, 9, 11 and 12, there are six more listed interwar residential buildings (out of the twelve buildings on the street). Half of the above listed buildings (at numbers 5, 9, 11) are inhabited and maintained, while the other half (at numbers 6, 7, 12) remain without use and maintenance. As a result, other objectives of the paper are: (i) the understanding of the values of public space, in which the listed buildings are located, (ii) the brief presentation of their architecture, (iii) the formulation of proposals for small-scale interventions that lead to public space's upgrade (e.g., maintenance of facades, installation of external lighting for illumination of facades, installation of information signs, reconstruction of Papageorgiou Street's sidewalks, etc.).

The paper contributes to the dissemination of the interwar architectural history of Thessaloniki, as well as to the awareness of public and private sector's bodies for initiating urban regeneration processes and upgrading of the historic centre. In conclusion, the paper could be considered as a pointing out to the ongoing degradation of the historic centre of Thessaloniki: the consideration of its data and the implementation of proposals may contribute to a notable upgrade of Papageorgiou Street. In addition, similar proposals could be implemented in other suburbs of the historic centre.

*Keywords: architectural heritage; listed interwar building; Papamichaelides Bequest; Aristotle University of Thessaloniki; historic centre.*

# Reuse of the listed building 'Papazoglios Textile School for Girls' in Ioannina, Greece, as a School of Architecture and Design

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## Extended abstract

The city as a whole is the spatial field of synthesis of the natural with artificial creation. It is expressed through its urban artifacts that establish it, characterize it or are characterized by it. It consists of a thick layer of historical continuities that incorporates and carries its values and memories and exists through its history, which is experienced in the present through cultural heritage. The city, seen as gigantic man-made object, reflects its historical continuity through architecture, which tries to bridge the dipole between the past and the future through the monuments that are the fixed points of its dynamics. Man, in order to connect himself with the past as a spiritual need for integration, is pushed to protect and preserve the cultural heritage. Over the centuries, the society of people, depending on the period in which he lived, gave different importance in terms of the preservation of cultural goods of the past with their main axis almost always being their utilitarian value. Over time, however, and the flourishing of the sciences, the concepts of restoration and reuse of historic buildings and groups were born that encourage societies to restore, preserve the cultural monuments and complexes of each place and give them useful uses for society that will correspond to the needs of modern life.

The present paper entitled "Reuse of the listed building 'Papazoglios Textile School for Girls' in Ioannina, Greece, as a School of Architecture and Design" of the Polytechnic School of the University of Ioannina concerns the inclusion of the new use in the listed, neoclassical style, building of the Papazoglios Textile School for Girls, located in Ioannina, Greece and dated around 1908. Key research issues of the work are the imprinting of the current situation, the assessment of the seismic adequacy against an earthquake and the proposal for the restoration of the shell through integrated protection for the purpose of adaptive reuse, taking into account the values of culture that a monument can bring in accordance with the Declaration of Amsterdam, having as a concern the formation of the architecture of tomorrow through a monument of the past. Initially, the protection of cultural heritage is mentioned and the historical and theoretical framework for the protection of monuments is examined. Subsequently, the historical and theoretical background of the restoration of historical monuments is analyzed and a series of interventions are proposed in the shell of the building in accordance with the principles and regulations governing the protection of monuments. Finally, the reuse of historical buildings as a historical and theoretical issue is explored, it is proposed that the new use for the monument under study be explored and the development of activities is analyzed in order to be a core of education and an incubator of ideas of youthful creativity within the urban fabric of the city which, in parallel with its operation, will become open and beneficial to society.

*Keywords: heritage; city; integrated conservation; adaptive reuse: Papazoglios; Ioannina*

# Management and enhancement of cultural heritage monuments after restoration works: The example of the Archaeological site of Ancient Pelinna and the Hellenistic Tomb of Petroporos in the Prefecture of Trikala

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## Extended abstract

Within the framework of the NSRF 2014-2020 in the Prefecture of Trikala, restoration works are in progress at the Archaeological site of Ancient Pelinna and the Hellenistic Tomb of Petroporos. The sites under consideration are located at a distance of about 20 km east of the city of Trikala, and on the axis of connection of important monuments such as the Ancient Theater of Larissa and Meteora. They are approximately 2.2 km apart and separated by the National Road Trikala-Larissa.

Ancient Pelinna was one of the cities of ancient Hestiaiotis and was located at a strategic point between ancient Trikki and Farkadona, controlling the passage from Larissa to Trikki. Testimonies and excavation data give information about the continuous habitation of the city since the 4<sup>th</sup> century B.C.E. until the late Byzantine years. At the beginning of the 20th century a looted vaulted Hellenistic tomb, the form of which refers to the well-known Macedonian tombs, was found in the area of the southern cemetery of Ancient Pelinna, where the village of Petroporos is currently located.

The restoration and the opening to the public of the forementioned monuments, followed by proper and sustainable management could transform the area into a pole of tourist interest and lead to a significant addition to the cultural route in Central Greece. The presence of a karst doline within the declared archeological site could also attract climbing and mountaineering associations that will contribute to the promotion of a monument of natural and cultural interest. Inclusion of the site in the green cultural routes and in tourist guides of monuments, archeological sites and settlements could lead to the promotion of outdoor activities that take place in the wider area of Trikala. In parallel, collaboration with institutions, such as universities, schools, cultural associations will attract the interest of the scientific community to an archaeological site that was known but not accessible and is likely to encourage future archaeological projects.

A Visitor Information Center, where informative material will be available in printed form (guides-brochures), as well as, the installation of an application for mobile phones at the archeological site, will provide the public the opportunity to experience a guided tour of the area, through the creation of three-dimensional models of the ancient city and highlight, that way, the great educational role of culture in tourism development.

Finally, the promotion and orderly operation of the sites will have significant indirect benefits, by increasing the positive effect on visitability by attracting investments that are either interested in antiquities in general, or belong to special interest groups dealing with alternative tourism (religious tourism due to Meteora, ecotourism, climbing, cyclists etc.).

*Keywords: heritage, management, Ancient Pelinna, Hellenistic Tomb of Petroporos, cultural routes.*

# The existing management of cultural reserve in Trikala and Karditsa, examples and proposals for the historical centers of the cities.

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## Extended abstract

This paper deals with the existing management of cultural reserve in Trikala and Karditsa and discusses examples and proposals that mostly concern the historical center of those cities, as a tool for strengthening each city's cultural identity and by extension the modern management of the wider residential environment.

Trikala, a city in Thessaly and one of the oldest cities in Greece, has a special feature: throughout its history, it has continuous presence and development since the ancient times, small in scope and perhaps not special, but it has never been extinguished from existence. As a result of this course, Trikala preserves a rich cultural reserve of remarkable monuments of cultural heritage (secular, religious, traditional settlements, archaeological sites). Karditsa, on the other hand, a newer city, founded less than 200 years ago in the middle of the plain, struggles to obtain and maintain a historic and cultural identity. Buildings of every historical and architectural period are scattered throughout the city and their preservation is threatened daily.

Over the past decade, an important work is in progress by local authorities and cultural associations in Trikala, to find a balance between the preservation of history and the evolution through technology, in an effort to highlight the city's cultural wealth. with intense and productive activity, in promoting the city through the enhancement and emergence of its monuments, in an effort to develop urban tourism. This effort focuses on the exploitation of individual monuments which have been restored through the funding of European Programs, and is implemented through thematic actions. This policy leads to a significant increase of tourism during the periods of the actions, but it does not lead to the desired economic growth that sustainable tourism offers which is designed to improve the quality of life in reception areas and to provide high quality services to visitors.

Karditsa has become the last decade a city of bicycles and an example of urban mobility, with many pedestrian routes in the city center and many open public spaces. However, the history and the architecture of the city remain unused and marginalized.

Necessary element to enhance the extroversion and competitiveness of both cities is the development of cultural tourism, through the creation of a network of monuments and especially the promotion of its cultural identity which is represented and shaped by the historic center and mostly by the traditional part of the city, "the Varoussi" district in the case of Trikala and by the plethora of open public spaces and of different architectural samples in the case of Karditsa.

The cultural reserve, and its sustainable management is a strategic choice for the 21st century worldwide. Culture and heritage are precious economic and social capitals and a growth potential, defining a holistic framework for investment with proven added value.

What is the Greek mentality for this thesis?

*Keywords: Trikala, Karditsa, cultural sustainable tourism, historic center, management of cultural reserve.*

# Architectural history of “E. Raftopoulos” School Building in Messovounia, Cephalonia. Contribution to the protection of modern Greek architectural heritage and preservation of historical memory

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## Extended abstract

“E. Raftopoulos” School Building in Messovounia, Cephalonia, Greece, is a two-storey educational building which was built in 1932-33 to house a primary school and a high school in the district of Erissos. It is one of approximately 3,000 school buildings, which were built in the context of an ambitious technical programme of the Ministry of Education and Religious Affairs, started by the governments of E. Venizelos (1928-32), under the ministers of Education K. Gondikas and G. Papandreou, with the aim of renewing educational buildings. The donation of a large plot and an extremely large amount of money for the construction of the school building was made by the Bequest of the benefactor Evangelos Raftopoulos (b. Messovounia, Cephalonia, 1858 – d. Karachi, Pakistan, 1925). Raftopoulos emigrated at a young age, lived, worked and died far from his homeland. He donated by will all his movable and immovable property for the realization of public benefit purposes in his hometown. The homonymous school building is important because it is historical: it was built with the efforts of the Greek state and the Community of Messovounia, and its architectural morphological features (“modern idiom”) reveal influences of Central European rationalist architecture. The building was used until 1998, when it was abandoned. Since then, the operating school units housed in it, have been relocated and the building has been left without main use. Recently, it was maintained basically.

The Raftopoulos school building is unknown in literature. There are no references in pre-war architectural journals or in recently published scientific papers, except for a reference in author’s paper entitled “School buildings of the interwar period in the Ionian Islands (Cephalonia): contribution to the protection of our modern architectural heritage” [Beriatos, H., Papageorgiou, M. (ed.), *Spatial Planning-Urban Planning-Environment in the 21st century. Greece-Mediterranean. Proceedings of the 10th Scientific Symposium of Cephalonia Cities and Regions in Greece and the Mediterranean in the 21st century. Spaces and places - environment and development* (Argostoli 2-4.7.2010), University Publications of Thessaly, Volos 2010, pp. 715-728]. Consequently, the aim of the paper is the study of the building’s architecture (typological, morphological, structural features) and the writing of its architectural history, with a view to the expected building’s restoration and reuse. In the context of archival research, data are collected from the archives of the Directorate of Technical Services of the Ministry of Education, the Community of Messovounia and from private archives. Data are also collected from the building itself and other school buildings on the island. The paper results in the presentation of the building’s unknown architectural history and the formulation of a concise proposal for its reuse, in accordance with the benefactor’s will and the local/educational community’s needs. In conclusion, the paper confirms and highlights the historical and aesthetic value of the building, contributing the efforts to preserve the modern Greek architectural heritage and the historical memory.

*Keywords: Raftopoulos School Building; Messovounia-Cephalonia; modern Greek architectural heritage; benefactors*

# A proposal for renovation and restoration of the old railway station "Myloi Athens"

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## Extended abstract

Humanity has evolved throughout history year by year, step by step, idea by idea. Mankind has to keep moving. Mankind is the train. Goes forth rapidly, leaving behind everything that has made us. So does history, and by extension so do buildings, since buildings are part of history. Old buildings are our heritage, and we should designate them. Otherwise, they will fall. And then history will be lost and forgotten. So that's what I tried to do with my thesis. Link the old to the new. Link the past to the future. Preserve history. And our country has nothing if only history. This project was inspired by the need to raise awareness of our cultural monuments in order to use them in the best possible way to bring them back to life and usability, to breathe life into the neighborhood where they are located and to be used by residents and visitors alike, to be open and beneficial to society.

Greece was recognized as a sovereign and independent state in 1832, and the birth of the newly established sovereign state coincided with the beginning of the railway era. The effort to cover Greece with a railway network began in mid-1857 and developed in an admirable manner and with remarkable speed by the standards of the time. The railway networks that were created in the newly established Greece - for the purpose of transporting goods and passengers - in the midst of turmoil, world wars and global upheavals, united cities and villages and played a major role in the development of new ideas and military successes.

Therefore, taking into account the importance of the station in the history of the railway and its potential contribution to the area, a proposal is presented in order to highlight its significance, to upgrade the station aesthetically and reopen it, but with a different, modern use. In this way, the environmental upgrading of the area will be achieved, as well as highlighting its historical significance. The aim of this paper is to study the railway station of Liosia, "Mili Athens", in Athens, its restoration and reuse, its promotion and enhancement, its integration into the surrounding area and its connection with the existing Railway Museum, which is an important part of the history of the railway. The reopening of the station and the redevelopment of the surrounding area, always with respect to the history and the original construction, but also protecting the environment and promoting the area in general as a center of activities, will contribute to improving the quality of life of the permanent residents and potential visitors. The aim is to demonstrate whether and how it is possible to create cultural spaces as centers of recreation and collective memory, always with respect to the history and the original construction.

*Keywords: heritage; adaptive reuse; Railway Station of Liosia; Mili of Athens; Athens*



## THE 'SoPHIA' PLATFORM FOR HOLISTIC HERITAGE IMPACT ASSESSMENT



Changing Cities V, Corfu, 20-25 June 2022

**Organized and chaired by Ass. Prof. Nicholas Anastasopoulos and Prof. Riva Lava**

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# Towards a Methodology for Assessing CH Interventions: Holism in the Case of the SoPHIA Research Program

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## Extended abstract

Recognising Cultural Heritage as a potential contributor and resource for sustainable development, the Horizon 2020 European Research Program SoPHIA, attempted to set a new state of the art Holistic Impact Assessment Model. Based on the experience, work and conclusions drawn by two years of research within the project, this paper aims to address the methodological issues related to holism that emerge when assessing cultural impact, both in its theoretical premises and the practical aspects of applied measuring through a set of quantitative and qualitative indexes. The paper explores the notion and central role of holism in the framework of an Impact Assessment Model, explains and further refines the used concepts with ultimate purpose to address new trends and opportunities and outlines the methodology of evaluating how cultural heritage projects affect people's lives and environments in ways that should be understood from a holistic perspective. After an introductory presentation of the project's methods and principles, the six basic themes that constitute the heart of the Model (Social Capital and Governance; Identity of Place; Quality of Life, Education; Creativity and Innovation; Work and Prosperity; Protection) are analysed. Emphasis is given on the conflicts and controversies that rose in the process of their further division in subthemes, quantitative and qualitative indexes. The role of the themes is then expanded to address new needs toward an inclusive, updated and holistic grid with focus on community and participation. The paper also expands on key concepts of the project such as the time factor (ex-ante, during, or ex-post), as well as the role of the selected case studies. For the former part it examines the ways in which the timeframe of the assessment differentiates the impact as well as what would the pertinent monitoring methodology entail. For the later part it explores the case studies' role in the creation and testing of the holistic character of the project. The conclusions shed light to methodological as well as practical issues that are proved pivotal towards guaranteeing the holistic nature of the impact assessment model. By encompassing existing discrepancies and addressing current needs, the holistic character of the heritage impact assessment model aims to create a widely applicable methodology for evaluating cultural impact, and for interpreting and sharing the values of heritage. By examining the methodology implicit or explicit in the SoPHIA model the paper also looks at its applicability and potential.

*Keywords: heritage; quantitative indexes; qualitative indexes; holism; impact assessment model; holistic; time factor; methodology*

# Temple Bar Cultural Quarter: Every ship needs a rudder. The impact & importance of governance on sustainable urban area regeneration

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## Extended abstract

This paper builds on the findings from the case study of Temple Bar Cultural Quarter (TBCQ) in the city of Dublin in Ireland. The case study is one of 12 cases researched as part of the Horizon 2020 funded SoPHIA Project (Social Platform for Holistic Heritage Impact Assessment)<sup>3</sup>, that tested the applicability of the SoPHIA Holistic Impact Assessment Model<sup>4</sup> in varying contexts. Temple Bar was chosen as an urban area regeneration project that instrumentally utilised culture and cultural heritage as a strategic element within the development. This paper discusses the relevance of the SoPHIA model in exploring the cross-cutting issues between two of the six themes of the holistic model: Social Capital and Governance, and Identity of Place.

In our study, governance emerged clearly as a key element in the sustainability of the strategic vision within urban area regeneration. TBCQ offers an interesting case because in 2012 - 2014 the governance of the urban quarter was handed over from a state backed private company (Temple Bar Cultural Trust) to a publicly funded local authority (Dublin City Council). This governance change has impacted on several sub-themes related to the SoPHIA theme of Identity of Place. This paper will explore how the visibility and reputation of Temple Bar as a cultural quarter, has been impacted by these changes in governance. We will also explore the visible signs of impact on the cultural landscape and aesthetics of the area. On the SoPHIA theme of Social Capital and Governance, we will look at the impact of governance on social cohesion, partnership and cooperation.

Now seven years after the dissolving of the Temple Bar Cultural Trust, including two years of Covid restrictions affecting the use of public space and restricting tourism, we are offered an opportunity to reflect on the implications of this handover in governance, on the stewardship of the area and the identity of place. This is vital to ensure the future of Temple Bar as an attractive cultural hub steeped in cultural heritage and living culture.

*Keywords: cultural heritage; urban regeneration; holistic impact assessment; governance; identity of place; sustainable urban development*

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<sup>3</sup>SoPHIA, (2021), D2.2 Case Studies Report. Accessible at <https://sophiaplatform.eu/uploads/sophiaplatform-eu/2021/07/15/88891512607e5cd5902aefc88902861b.pdf>

<sup>4</sup>SoPHIA, (2021), Heritage Impact Assessment Model. Accessible at <https://model.sophiaplatform.eu>

## Holistic impact assessment as a tool for giving evidence to a cultural-driven change: the SoPHIA model

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### Extended abstract

In recent years, transition studies have focused on the interplay between space, socio-ecological and socio-technical innovation systems. In this context, networking processes and communication tools play a specific role. Under this lens, holistic assessment models provide a useful tool to assess the possible impact that can arise in different, and intertwined, areas of change.

As for culture as a driver of change, the issue of measuring and communicating the value created by cultural organizations has given the rise to an interesting debate. So far, in Italy, "Sustainability Reporting" (hereafter SR) is the mainstream tool that many cultural organizations utilize to account for their created value. However, current SR models do not respond to fulfil the need of describing the broad spectrum of impacts in a perspective of communication and support for "changes in the lives of people and their societies."

To fill the above-mentioned gaps, a possible course has been proposed by the European Horizon 2020 project SoPHIA, which created a Social Platform for a Holistic Impact Assessment model to evaluate investments in cultural heritage (CH). The SoPHIA model adopts a multi-dimensional approach based on three axes (domain, people, and time) to:

- detect the main themes in which a CH initiative may create an impact on society and their interdependencies.
- advocate for all people engaged in the intervention to monitor its impact.
- present a longitudinal perspective to assess the intervention's legacy over time.

Building on these premises, the RQs of this paper are as follows: how does the SoPHIA model contribute to the SR of cultural organizations? And is it helpful for giving full evidence to all potential of change? To answer the RQs, the paper will focus on a paradigmatic Italian case, questioning its SR through a qualitative approach based on text analysis and unstructured interviews addressed to key actors.

The case study analysis will show if and how the main themes addressed by the SoPHIA model are already embedded in the narrative of the SR and how their systematization could be a useful tool for dialoguing with stakeholders, fostering the process of information exchange with communities and citizens, and boosting the creation of collective awareness on cultural-driven potential of change.

*Keywords: holistic impact assessment, cultural-driven change, social reporting, communication tools*



## ROUNDTABLE DISCUSSIONS

# CHANGING CITIES



Changing Cities V, Corfu, 20-25 June 2022

# HOW TO PREPARE OUR CITIES FOR THE UNEXPECTED, OR WHAT HAVE WE LEARNT ABOUT URBAN RESILIENCE FROM COVID'19?"

## CHANGING CITIES



Changing Cities V, Corfu, 20-25 June 2022

**Organised and coordinated by Prof. Aspa Gospodini**

**Prof. Aspa Gospodini**, Department of Planning and Regional Development,  
University of Thessaly, Greece

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- 2. Prof. Maros Finka**, President of AESOP and SPECTRA CE EU at STU in Bratislava, Slovakia.
- 3. Prof. George Panetsos**, Department of Architecture, University of Patras, Greece.
- 4. Prof. Em. Lila Leontidou**, School of Humanities, Hellenic Open University, Greece.
- 5. Prof. Irene Klabatsea**, School of Architecture, National Technical University of Greece.

# How to prepare our cities for the unexpected, or what have we learnt about urban resilience from covid'19?"

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## Extended abstract

The COVID-19 pandemic and the following specific temporary measures to mitigate outbreak have strongly impacted our societies, our cities, and our economies.

First, they produced drastic changes in people's everyday routine activities concerning work, home, leisure, services, education, etc. Lockdown of activities, or time and space restrictions of activities of individuals, and especially teleworking for adults and tele-education for children and teenagers from home, have also turned certain categories of buildings into abandoned space (schools, office buildings, commercial shops, entertainment spaces, et al.). On the contrary, lockdown and such restrictions increased activities at home, creating new spatial demands in middle-class apartments and houses – i.e., specific spaces for work and education.

Second, regarding the city as a whole, specific temporary measures to mitigate outbreak have altered functional and spatial aspects of cities: (a) Typical urban mobility concerning pedestrian movement and traffic of vehicles in the city centre and inner city areas changed. Urban motorways and big road axis remained underused while increased needs emerged for both pedestrian streets and cycling lanes – both often over-occupied. (b) Use patterns of public open spaces (squares, parks, and the like) were intensified and altered. Individuals often used public open spaces as gym; they were indeed gathering in the city's most attracting public open spaces (e.g. waterfront spaces, athletic parks, green parks, etc.) irrespective of the distance from their home. Therefore, certain public open spaces were underused while others were over-crowded,

Third, new demands for electronic access to social activities enhanced the power of 'smart city'. Information and communication technologies have acted as key-means for significant everyday social activities in cities (email communication, professional face-meetings at online platforms for tele-working and tele-education, internet shopping, new internet platforms for leisure (movies, music, etc.).

This roundtable discussion highlights all the above impacts of COVID'19 pandemic on cities, societies, and economies, while it attempts to answer questions concerning the preparation and resilience of cities in times of unexpected crisis:

1. Which are the necessary temporary adjustments on the city's master plan and the network of public open spaces (streets network, pedestrian network, cycling network, squares, parks, urban forests, etc.) to meet people's needs in times of pandemics or other unexpected situations like the current global energy crisis?
2. How should we replan and redesign peripheral residential areas in our cities to meet people's needs in times of crisis? Is the urban model of the '15-minutes-city' an appropriate model for making peripheral residential areas resilient in times of crisis?
3. What transformations should be made in the typology of common apartments and houses for middle classes to provide with 'buffer spaces' which may temporarily host specific activities like distant working or/and distant education, in times of crisis?
4. How can new informational and communicational technologies facilitate everyday life of individuals in cities in times of crisis? Can 'smart city' be a key-factor for resilience in times of crisis?

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## THE IMPORTANCE OF HABITABLE HISTORICAL CENTERS IN THE MANAGEMENT OF CULTURAL HERITAGE



Changing Cities V, Corfu, 20-25 June 2022

**Organised by Civil Society Network of Mediterranean Historical Cities and coordinated by  
Lina Roussou**

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4. **Nikos Triantos**, Electrical Engineer, Former President, Technical Chamber of Greece, Corfu Department, San Giacomo Association, Corfu

# The importance of habitable historical centers in the management of cultural heritage

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## Extended abstract

For the historical cities, the major objective lies on the transition to a model of sustainable development based on a social, economic and cultural balance.

Nowadays, It is largely understood that the social fabric and the culture of the everyday life in the older urban centers of the European continent reflect the most lively aspect of memory of the European cultural heritage. However, the last decades have been marked by rapid changes disturbing the traditional fabric of the historical centers in terms of economic life, of business activities and trade and, inevitably, of habitation. These changes are heterodetermined and lead to a shrinking population, to the degradation of the residents' quality of life and, eventually, to the alteration of their cultural identity.

This paper seeks to raise the crucial issue of habitation in the historical centers, especially those listed as UNESCO Cultural Heritage sites.

“Civil Society Network of Mediterranean Historical Cities” a civil society organization of historical cities, emphasizes the importance of the historical cities being inhabited and the need to protect their liveability, within a complex and unregulated changing environment.

On the basis of the perceived experience of this adverse reality and the officially recorded data as a starting point, the presentation examines the factors which affect habitation and the issues resulting from the inadequate coordination between the several organizations involved in the management of cultural heritage. Through the study of the current situation and taking account of best practices and the relevant literature, it searches the institutions of participation of the civic society and emphasizes the need to update the management plans in a way that will highlight the importance of protecting the habitation in the historical centers as an inherent element of cultural heritage.

Having seriously considered the fact that the plans already elaborated do not provide for the substantial participation of the residents in the management bodies, and that the residents are only briefly referred to, it is concluded that habitation has not been an issue of considerable concern even though it is a complicated issue affected by various factors – even by the residents themselves.

The paper searches the problems, highlights them and tries to detect possible solutions for the protection of liveability as a major factor for the management of historical cities.

Our paper could be an original work elaborated by the interested parties but it could also be the topic of a workshop on the protection of habitation.

*Keywords: habitation, historical cities, cultural heritage management, liveability*



## THEMATIC SESSIONS

# CHANGING CITIES



Changing Cities V, Corfu, 20-25 June 2022

**RESILIENT CITIES AND HISTORICAL CENTRES  
MANAGEMENT**



Changing Cities V, Corfu, 20-25 June 2022

## Evaluating urban resilience: The case of Athens

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### Extended abstract

In the recent years, intense urbanization, climate change, social inequalities, and new technologies, have a decisive role in the development of urban areas. As cities are complex systems that are constantly adjusting in the new environmental, economic, political, and social conditions they should be planned in a way that makes them flexible to adapt to changes and be developed in terms of environmental protection, social cohesion, and economic sustainability. Urban growth and its challenges in social, ecological, and economic sectors have made resilience a new term in the field of spatial planning. In this framework urban resilience, the capacity of urban systems to maintain their function, is an important tool for the constant development of the urban tissue.

In the recent years, policies for resilience are integrated in the urban functions and consequently in spatial planning. The role of urban planning can be decisive in the achievement of urban resilience, in fields as land use, urban infrastructures and services planning which are crucial for emergency response but also for the quick recovery of an urban area. Ecosystem management and land use planning are approaches for the effective management of urban disaster risks in areas that lack resources and capacity, while urban infrastructure and services planning should be based on the possibility of failure through redundant principles. Policies for urban resilience should be based on adaptivity, foresight and preparedness, absorption, and recovery.

The city of Athens has since 2014 engaged a participatory process to draft and implement a holistic, robust, and realistic strategy that supported and enhanced the resilience of the city for the upcoming decades. The economic crisis and its consequences have revealed the underlying vulnerabilities of the city which are the increase of poverty and homelessness, the decrease of population, the insufficient protection of the ageing infrastructure in climate change, the increase of energy poverty, the large influx of refugees and the fragmental spatial planning. The unemployment rate is increasing and the green areas have low quality and quantity.

The current paper will examine and evaluate urban resilience of the municipality of Athens. It will examine the actions that have already been developed for the improvement of environmental urban quality, the development of infrastructures for sudden and chronic shocks, the promotion of redevelopment projects in all urban scales and the achievement of social cohesion. It will proceed to results about the development of urban resilience so far and it will propose good practices that have already been applied in other cities for the achievement of urban resilience.

*Keywords: urban resilience; urban planning; adaptivity, foresight, preparedness, absorption, recovery*

# **Ionian Belfries - Perspective of development and sustainability of Historic Centers. The case of the historic center of Corfu**

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## **Extended abstract**

In Corfu, Paxos, Kefalonia, Zakynthos, Lefkada and the outlying Kythera, art, culture and religion converged. Through adversity, they merged into a new, unique form of architecture, painting, poetry, faith, customs and traditions. Of unparalleled beauty and interest, however, is certainly the harmony of spirit and matter in buildings of either cosmic or religious character, thus transforming them into monumental witnesses of the history and culture of these islands. There, Orthodox and Catholics built bell towers as defensive and religious buildings. They were designed and decorated according to classicism, renaissance and baroque. They remain an extensive source of information to this day as they link the past with the present. A form of public art that you will definitely encounter in your journey. Orthodoxy and Catholicism in one combination.

Their symbolic character and their semiotic function from yesterday to everyday life, urges us to treat them as an intercultural phenomenon that can reveal to us the relations that the people of that era had developed with their environment as well as the way they signified and transformed it by indicating religious, political and even economic-social situations through their construction. In contrast to the usual buildings of a residential urban landscape, temples predominated as part of a religious edifice, with their own peculiar status and legality. They have claimed and rightly won the right to be considered monuments. The bell towers are therefore multi-symbolic constructions that will surely enchant those who seek a differentiation in visiting a temple beyond its religious character.

On the island of Corfu, Greek-Latins, Byzantium - Middle Ages, East - West with their different philosophies of man and religion, through upheavals, oppression and creativity, have been combined and harmoniously blended with the folk art of Corfu. They created different traditions but also expressions of aesthetics and art, and composed part of the material culture of the island imprinted in the scattered bell towers of Eastern and Western Christianity, with emphasis on those of the historic center. With their elaborate architecture, their height and their artistic peculiarity, they constitute another important chapter in the legacy of civilizations, providing us with information that enriches and decodes the enchanting puzzle of cultural heritage, acting as historical "monuments".

In this paper we examine different ways in which these cultural assets can become part of an "outdoor museum". Through the design of special visitation routes, their cultural importance can be restored within the historical center. The development of such routes requires interdisciplinary management and cooperation, which is consistent with the sustainable management of this cultural heritage.

*Keywords: Ionian Islands, bell towers, sustainability, cultural heritage*

# Redefining the tourist destination by upgrading the role of guided tours in historic city centres: a novel conceptual approach and a proposal for Corfu old town

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## Extended Abstract

Urban and city break tourism are growing at an impressive rate. Increasingly more urban areas strive to make an entrance or to consolidate their position in this intensely competitive market. Even long-established, typical S&S holiday destinations develop an interest to expand in this market, as urban and city break tourism is limitedly affected by the weather and other factors, and therefore their seasonality can be mitigated. However, this kind of expansion usually presumes a fresh approach to a variety of aspects, from the destination's identity and image, to infrastructure and tourism product.

This paper offers a novel conceptual approach to the definition of the destination's identity and product by focusing on the destination's heritage and cultural assets and the overall tourist experience derived from them. Based on a critical literature review and the authors' extensive experience in presenting heritage assets and interpreting them in guided tours, it is proposed that the principles and techniques of heritage interpretation can be employed in DMO and other stakeholders' decision making, towards defining specific aspects of the destination identity and image in an optimum manner. Furthermore, it is proposed that the guided tours' role upgrading into an integral part of the destination's core product, can contribute to the consolidation and promotion of the destination's image by augmenting the tourist experience, generating publicity and social media material, and inducing word of mouth.

This approach can be particularly useful when established S&S destinations seek to divert and expand their market share in the urban and city break segments. In these cases, the existing destination identity and image are usually the products of the stakeholders' perspective and its projection to the visitors' perception. Therefore, the modulation of the destination's brand with the same approach would be rather challenging, and the proposed framework can offer a solid alternative strategy in redefining the brand, by focusing on the destination's core identity.

As an exploratory case study for the implementation of the proposed framework, an integrated plan for Corfu old town is presented. Corfu is quite a typical S&S destination, with extensive potential in expanding in the urban and cultural tourism segments. However, its distinctive heritage and cultural background (including its status as a UNESCO World Heritage Site) has been neglected or highly undervalued concerning its tourist destination identity and image. In face of the tourism market developments and the accumulating issues of seasonality and overtourism, local authorities and stakeholders currently explore possible strategies for entering the urban and city break tourism market, by capitalizing on cultural heritage. This paper responds to this pursuit by the deployment of a proposal which focuses on sustainability and preservation of the local heritage and which can have a generally positive impact in reducing seasonality, diverting tourists from overcrowded routes, accommodating small tourist groups in face of the pandemic, inspire the host community and induce infrastructure improvement.

*Keywords: cultural heritage, destination identity, sustainable tourism, heritage interpretation, guided tours*

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# Conservation and demolition of Brutalist built environment in England

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## Extended abstract

In a period of great changes in the management and development of the urban habitats, it is necessary to rethink the current models of planning and designing of cities, by processing in a contemporary way the examples of the past, which were born from similar conditions. This renewed approach must take into account the unprecedented social and environmental needs of communities, the urgency of which has also increased following the consequences of the recent Pandemic crisis.

Looking at the European context, in particular to England, much of the current urban quality, both in positive and negative ways, refers to the legacy of the second postwar city planning, in the period following the enormous devastation of the World conflict. This movement of rebirth from the rubble led to the reconstruction of whole parts of cities and to the foundation of new settlements (the so-called new towns), the built environment of which was often characterized by a radical and common architectural matrix, which recalls the current of *New Brutalism*.

Therefore, the process of understanding the weight that this architectural expression has had in the definition of the modern English city and establishing the role of its heritage in the contemporary constitutes a necessary phase to qualify the conservation or demolition actions of the enormous Brutalist heritage that has come down to present times.

Starting from these general premises, the paper offers a critical evaluation of the results in the management of the brutalist heritage of two important British cities, namely *Newcastle* (in the North-East region) and *Birmingham* (in the West Midlands). Both centres are distinguished by the legacy of a strong identity related to the modernist development of the 1950s and 1960s. The first one barely retains the signs of the ambitious vision of a multi-level and motorway-based city centre planned in the early 1960s by T. Dan Smith and Wilfred Burns. The second one attended in the last years a process of urban cleaning, through a global action of demolition of the so despised concrete jungle, as conceived by the planning of a *Motor City* by Sir Herbert Manzoni.

All the operations of protection and dismantling of the postwar heritage fall into the systematic listing programme carried out from the end of 1980s by the agency of English Heritage. The rating, and consequently the individual measures applied to the built environment, often acted with an unscrupulous policy, causing huge and often forced changes to the urban landscapes by favoring the conservation of isolated buildings that are iconic and authorial. Thus, the tendency has been to consider the architectures according to their reputation, rather than for the real historical and social values underlying more ordinary and low-profile examples.

Through the comparative study of the brutalist heritage in the two English cities mentioned above, the text retraces their ethical and social reasons. By highlighting the beneficial and unsuccessful implications in the governance of the built environment, it suggests common new perspectives for the strategic conservation and reactivation of brutalist urban centers in the contemporary.

*Keywords: heritage; Brutalism; built environment; Newcastle; Birmingham*

# Presenation of CORRELATE: An interaCtive framewORk foR sustainable worLd heritAge siTe managEmEnt

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## Extended abstract

This paper presents the goals and functional methodology of a new managerial framework named «CORRELATE: interaCtive framewORk foR sustainable worLd heritAge siTe managEmEnt». The design of the framework has been the main result of Sofia Maria's Poulimenou doctoral thesis entitled "Sustainable Management of UNESCO World Heritage Sites: Models, Proposals, Perspectives: The Case of the Old Town of Corfu" (2021).

As sustainable management of cultural heritage sites is highly connected with the preservation and promotion of world heritage values, a great need is being addressed, that to link heritage management with related governance policies, so that cultural heritage becomes a pillar of sustainable development and a positive example for the effective implementation of the World Heritage Convention. Since 2015, when the 17 UN Sustainable Development Goals (SDGs) were at first adopted by the United Nations, they are considered to contain elements related to culture and its protection.

The framework "CORRELATE" attempts to combine local management and world heritage management plans with the 17 UN SDG's a way that:

- A. combine the local strategic planning in collaboration with experts that analyze and address the actual conditions and needs of the monuments.
- B. align the proposals of the experts with the 17 SDGs, a process that ensures the completeness check of new proposed actions with the priorities currently set by the internationally accepted framework for ensuring world peace and prosperity.
- C. allow the development and revision of new proposed actions in cases of change of circumstances or emergencies.
- D. provide the participation of several stakeholders with a clearly defined role by creating a socio-centric management process in which the expression of opinion and analysis of needs is separated from political decisions.
- E. create a link between the decision-making process and the existing SDG evaluation indicators proposed by the UN and their adaptation to the specific needs of monuments.

In the proposed framework, the different users of the monument are included in the process of its implementation either as bodies involved with the management, or with the proposed consultation process of the reformed proposals in order to take into account all the different views and needs.

In this paper we explore several factors that influence the management systems of cultural world heritage monuments, such as tourism development, learning processes and technology, the paper also presents the implementation of a European co-funded project named "Interactive Guide for the Old Town of Corfu with the use of augmented reality and holograms", as a case study which utilizes and makes the best of the above mentioned factors for the sustainability of a monument.

*Keywords: cultural management; 17 UN SDGs; world heritage sites; sustainability*

# Environmental planning and urban resilience in medium-sized cities. The case of Xanthi

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## Extended abstract

Urban resilience strategies constitute a powerful tool of integrated spatial intervention which aims at the implementation of development actions in urban areas. These areas, either raise problems that need to be addressed comprehensively, or are distinguished by significant development potential, which can be exploited and maximized based on a comprehensive development plan. The implementation of a strategy can be interpreted as a system of interconnected actions that focuses on long-term improvement of the economic, environmental and social conditions of the intervention area.

The integrated nature of the strategy and action plan should be ensured by the complementarity and coherence of the proposed interventions, as well as by the governance system's representativeness.

The urban resilience strategy for Xanthi sets the Commercial and Administrative Center of the city as an intervention area. This choice is based simultaneously on spatial and functional characteristics, which can be used in the most effective way to create and disseminate development actions and network the most important resources of the wider region, in order to mitigate the negative economic and social impacts that have been created since the era of economic recession in the urban environment. The principal objective is to transform Xanthi into a more competitive environment to attract entrepreneurship, visitors, residents and financial resources. The priorities set in the strategy concern the connection between the tourist pole of Old Xanthi and the rest of the city, the emergence of the city center as an engine of development and diffusion of knowledge, innovation and employment, as well as the improvement of infrastructure efficiency.

The implementation of the cited above policies can contribute positively: a) to increase the number of visitors to the city center and Old Xanthi, b) to the promotion of local products and their connection with tourism and culture of the city, c) in the activation of the local potential networks d) reducing unemployment and increasing incomes, e) in saving resources and improving the quality of the environment, always by creating equal participation opportunities for vulnerable social groups.

*Keywords: environmental design, sustainable development, urban resilience, medium-sized city*

## Portraying Corfu in 1486: The view from the deck of Contarini's ship

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### Extended abstract

In the 15th century, the growing number of depictions of cities began to acquire a certain correspondence to reality. The representations were gradually taking on more and more realistic elements. Details of houses, mansions, walls and churches show a structured habitation that, together with the residents, testify to socio-cultural conditions of the time.

In this context, the depictions of cities in the *Peregrinatio in terramsanctam* of 1486, the first illustrated publication in the history of travel literature, hold a special place.

In the first incunabular Latin and German edition (*Reise ins Heilige Land*, 1486), the groundbreaking illustrations of seven East Mediterranean cities –Venice, Parenzo, Candia, Rhodes, Modon and Jerusalem–include Corfu. This is the first printed depiction of the city. It was designed by the Dutch painter and engraver Erhard Reuwich, who was engaged by Bernhard von Breydenbach (ca 1440-1497), Bishop of Mainz, to accompany him on his pilgrimage to the Holy Land in the years 1483-84.

Reuwich made sketches of the Old Fortress (*Fortezza Vecchia*) of Corfu, which at that time enclosed the island's Byzantine and medieval capital that had been transferred from Paleopolis and developed after the 6th century, with the two fortified peaks being its landmarks to this day. The onsite drawings were executed during the three days (12-15 June 1483) that their ship –Agostino Contarini's galley– dropped anchor at Corfu, one of the first ports of call on the voyage.

Reuwich's work responds to the medieval iconographic tradition of the idealized and conventional perception and rendering of the natural world, by introducing an elementary verisimilitude. Deviations from reality are present, but by studying the urban space and the surrounding countryside the painter overcame the limitations of perceptual experience and succeeded in giving a spatial representation with an elegant and condensed structure following a personal design perception. This perception characterizes all his images of cities, differentiating them from corresponding ones that cleave to the medieval iconography.

The paper discusses the engraved view (woodcut) of the city of Corfu, examining the cityscape as well as the topographical accuracy of Reuwich's rendering. The surface of the image is searched in an attempt to elicit the multiplicity and interaction of its meanings and functions. Modern technologies are used to explore the artist's technique –horizontal format, panoramic effect– and way of working. Analysed too is the historical and social context that emerges from the image as an example of the Renaissance worldview at the end of the 15th century.

*Keywords: Corfu, urban space, 15th c., Breydenbach, Reuwich*

# Ongoing adaptive reuse. Clues of heritage resilience in the Covid-19 pandemic

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## Extended abstract

In the last two years, several studies have shown that the Covid-19 pandemic has profoundly impacted on all fronts of the cultural heritage sector: from tourism to research, and from conservation and protection to education. After all, cultural heritage development and management rest in the (cultural) interest and (economic) presence of an “audience”. Although over the last century the “culture device” has gradually gained a pivotal role in urban, social and economic transformations, critical historical conjunctions – such as the Covid-19 pandemic crisis – tend to easily overshadow it. Despite the reckon potential of cultural tools in risk prevention and management, this tendency is mirrored in the marginality of the role assumed by culture and cultural heritage in the field of resilience.

The article aims to contribute in covering this gap by presenting some early results of Covid-19 impacts in six European heritage labs. It thus reinforces the ongoing debate by highlighting processes of resilience that stem from the encounter of urban practices and heritage assets. These experiences are part of OpenHeritage, a European research and innovation project funded by Horizon 2020 program, which focus on the development of inclusive governance models for adaptive practices of heritage re-use. The selected cases involve heritage communities, formally or informally defined, while the project is founded on principles of participation, self-organisation and self-management. These characteristics make them naturally oriented towards building resilient urban systems that are grounded on plural and complex territorial relationships. The hypothesis of this paper is that co-production of cultural values and places promoted by this kind of projects could significantly contribute in the construction of adaptive urban scenarios, primarily grounded on shared set of (non-monetary) values and strategies.

Methodologically, the paper draws on data collected between January and May 2021 through a survey conducted on the six Labs by involving scholars and practitioners engaged in the onsite work. The five resilience characteristics defined by Judith Rodin (awareness, diversification, integration, self-regulation and adaptability) are used to analyse the survey outcomes. These results, moreover, are presented within a theoretical framework that links adaptive heritage reuse, planning and resilience. Combining the survey results and the literature review, the contribution depicts some financial, methodological and managerial elements that contribute to Rodin’s resilience characteristics as recognized in the analysed living labs. Without expecting to be exhaustive, these elements would merit worthy attention in the design phase of resilience programs, policies or projects related to the cultural heritage world.

*Keywords: cultural heritage; adaptive reuse; resilience; community-led practices; Covid-19 pandemic*

# Composing the profile of urban resilience in mid-sized Greek cities. The case of Larisa

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## Extended abstract

Urban resilience is defined as the capacity of cities to endure, adjust, and further develop, when facing either long term/chronic pressures (social, environmental, economic) or sudden and unexpected crises, hazards, risks, and disasters (emergency situations). Spatial and economic shrinking, unemployment, flows of refugees due to wars, spreading of pandemic and health hazards, social exclusion, environmental degradation, as well as lack of cooperation between departments and levels of administration and inefficient governance are indicative examples of challenges of the above kinds. In this context, present planning and decision making about social and technical infrastructure may have significant effect on urban development of the future.

Greek experience in issues of urban resilience is limited to resilience planning of two cities, Athens, and Thessaloniki, which were included in the 100 Resilient Cities programme. Recently, another Greek city, Larisa, initiated a project about the resilient profile of the city, in collaboration with the University of Thessaly. The proposed presentation describes the structure, the progress, and the challenges of the on-going research.

Research on urban resilience in the city of Larisa is initially based on the ARUP approach. It aims in building a City Resilience Index, based in the four dimensions of Health and Well Being, Economy and Society, Infrastructure and Environment, and Leadership and Strategy. The goals of the above dimensions, as specified for the city of Larisa, were defined as follows:

- Sustainable Development of immobile private and/or public property currently being abandoned and /or in dangerous decay.
- Sustainable Development of Public/Green/Open Space.
- Economic and Social Development. Creative Economy.
- Roadmap for the Mitigation of Poverty in the Sector of Energy.
- Adaptation to Climate Change in Urban and Rural Environment.
- Sustainable Urban Development.
- Transparency, Accountability and Effective Governance.

Each goal consists of a phase of analysis leading to conclusions and to the proposal of indicators potentially providing a measurable assessment of the goal. Proposals are finally conducted concerning policies and implementations for the achievement of the goals synthesizing the resilient profile of the city of Larisa.

The research, as mentioned above, is under elaboration, and the proposed presentation aims to provide a meaningful description of the methodology being used, and the challenges and particularities which must be dealt with, in shaping up the profile of urban resilience of a middle-sized city in Greece.

*Keywords: resilience, Larisa, risk mitigation, disasters, social crises, environmental crises, economic crises, health hazards.*



**BUILT HERITAGE MANAGEMENT**

**CHANGING  
CITIES**



**Changing Cities V, Corfu, 20-25 June 2022**

# The value of pre-industrial masonry architecture for urban housing rehabilitation. Case studies in Southern Europe

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## Extended abstract

Urban vernacular housing architecture reflects the cultural heritage of each city and the social needs, habits and lifestyle of their inhabitants around times. Around the world, there are a lot of cities with a large ancient residential building stock belonging to the pre-industrial times, that even though it has a great cultural and ecological value, it often remains in ignorance by the population and therefore in a declining state of conservation, with several vulnerabilities and offering deprived comfort conditions.

In this research, a comparison is made between the pre-industrial residential buildings that were built around the 18th and 19th century in three European urban historic areas: Lisbon, Corfu and Valletta. In this period, the habitational needs in these cities have drastically increased, for several reasons. These urban areas were considered comparable, due to the similarities in geographical characteristics, climate conditions, architectural features and construction materials used during that era on current housing construction.

Indeed, some conservation and rehabilitation policies and practices are being applied lately to preserve their cultural value, in all three cities, but challenges persist, and further technical knowledge and strategic support is needed a broader housing rehabilitation, moreover when the time of pandemics forced people to stay within their homes.

This study aims to evaluate the cultural and environmental value of these buildings. The methodology used is based on bibliographic sources of the history of these places, existing policies, studying examples of similar case studies and on-site surveys of buildings, for its systemic categorization and evaluation.

The evaluation takes into consideration the urbanistic development, the urban morphology and architectural typology of the existing buildings, in terms of spatial organization and facades, and the constructive system and its ecoefficiency.

A comparison between similarities or differences among six samples of these buildings is presented, envisioning the identification of opportunities, risks, and challenges of rehabilitation for this building stock rehabilitation. Assuming the results, it is found that:

- i) Built under similar climate conditions and centuries, there is a common hierarchy in public and private spaces, but also similar problems in terms of hygienic standards, that should be taken into consideration in case of refurbishment;
- ii) Vernacular architecture contains heavy construction systems that last hundreds of years and can provide thermal comfort to the habitants if adaptive strategies are considered in the rehabilitation options;
- iii) The applied regulations or on-going rehabilitation projects referring to the pre-industrial building stock, seem to mostly focus on the maintenance or restoration of their facades and not on the whole building system.

*Keywords: urban heritage; pre-industrial buildings; Lisbon; Corfu; Valletta*

## A strategy for the rehabilitation of Lisbon pre-industrial housing (16th - early 19th c.)

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### Extended abstract

One of the most relevant Lisbon's cultural significance lies on the architectural and urban values of a substantial number of early modern residential buildings (pre-industrial housing - PIH) that build-up central and relevant consolidated areas. In the last decades, these buildings have been submitted to demolitions and uninformed refurbishment actions, partly driven by the real estate pressure related to the growth of urban tourism, and partly motivated by the lack of technical knowledge about the value and specific performance of these buildings. Main consequences can be observed at the cultural, social and environmental levels: the loss of cultural significance of these areas, the increase of seismic vulnerability, the raise of materials/energy consumption and CO2 emissions, the expulsion of residents to the suburbs, due to the increased unaffordability of housing, reducing social cohesion in several neighbourhoods of Lisbon.

These "preindustrial urban buildings" which expanded the city of Lisbon between the 16th and early 19th century, currently represent a significant housing pool with the potential to rehost the middle-class population, young people, and new family models. These buildings are also relevant because they still conserve its original traditional structural materials and technologies (stone or brick masonry walls and wood pavements, without concrete or steel), presenting a low fossil energy consumption, and a good environmental and energy performance, while offering low energy comfort. They represent a testimony of a paradigm of urbanization, construction, and resources management, that nowadays can help us respond to the challenges of a more sustainable architecture, with less embodied and operational carbon.

Following the assumption that a rehabilitation assuring high levels of material conservation can lead to cultural preservation, environmental efficiency (comfort and circular economy) and positive social impacts, a research methodology (Lis|PIH) was developed to support proposals for qualifying current interventions in PIH, considering not only their technical specificities and multiple values, but also assessing their physical and spatial vulnerabilities, taking a step forward to the recognition of the cultural, environmental and social value of this heritage and its contribution to a sustainable urban regeneration. Lis|PIH intends to catalyse urban and architectural intervention towards sustainability, raising awareness to this important "pre-industrial" urban/built heritage, expecting to contribute to scientific advances in Urban Sustainable Regeneration, PIH architecture studies and to Urban and Housing Policies, by envisioning an interdisciplinary approach operating within the fields of architecture and architectural heritage, structural engineering and construction, environmental sustainability, sociology and governance.

This paper presents the first stage of this research methodology which includes the following stages: 1) scope definition/systematisation; 2) diagnosis; 3) toolkit; 4) dissemination. This first stage intends to produce a digital inquiry which will collect and classify PIH information through typification and sampling concerning urban morphology, architectural typology, construction systems, seismic condition, resources (materials and energy), social and housing condition. It includes the following topics: geographic location and chronology of the early modern urban expansion areas, where groups of pre-industrial housing buildings remain, crossing over this information with the georeferenced historical cartography, archive data and field surveys.

*Keywords: Lisbon, preindustrial urban buildings, buildings rehabilitation, sustainable urban regeneration*

### Book of Abstracts

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## Accessibility and architectural heritage: building vernacular settlements' and cities' resilience and sustainability

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### Extended abstract

In the time of pandemics and of evolving socio-economic and environmental crises, cities and human settlements in general, including architectural heritage environments, face considerable changes and their relevant consequences. Small settlements in particular and among them vernacular ones have often to deal with the issue of isolation and economic decline. Enhancing these settlements' functionality, safety and inclusivity is expected to largely contribute to their -and further to the cities'- resilience and sustainability, by increasing the incentives to stay and live in vernacular settlements than to move in big urban centres, with significant social, economic and environmental benefits. Universal Design (UD), which integrates the understanding and addressing of the diverse humanity's needs, ensures the accessibility enabling at the same time the protection of heritage and thus the sustainability of settlements both as living places and as tourism destinations.

UD is deemed to improve the quality of inhabitants' life, to provide learning opportunities and to offer new prospects by attracting new groups of visitors, residents and entrepreneurs. A place branding strategy can be implemented in vernacular settlements and further in cities' architectural heritage environments, as in historic centres and heritage districts, with the aim to give meaning to a place and manage perceptions about it. The endeavour is to form a strong relationship between person and place, regarding the feeling of attachment to the place and the identification which leads to place satisfaction, driving both locals and new visitors to stay at or select a certain place.

The aforementioned constitute a critical component of the present research's theoretical framework. In specific, the aim of the present research is to structure a strategy regarding Greek vernacular settlements. The particular features of these settlements, their location and geomorphology and the relevant limits in accessibility issues in regard to legislation's implementation, reveal the need of a holistic approach that takes into account the vernacular settlements' idioms and the experience of heritage itself by inhabitants and visitors, including those with disabilities. Accessibility is explored as the means to perceive the architectural ensemble's identity via mainly the in situ experience. The objective is the development of a new "architectural narrative" based on physically, intellectually and digitally accessible routes. The presented methodology -settlements' classification of accessibility level, development of a typology, listing of access infrastructure in the traditional environment, investigation of the use of technology and of possible adjustments to the particular forms and structure of vernacular settlements, as well as case studies- and the expected results are discussed in terms of sustainability and long term impact both on vernacular settlements' and cities' level, place branding and quality of life.

*Keywords: vernacular settlements' sustainability; architectural heritage; accessibility; Universal Design; place branding*

## Different meanings of memory, a value for a complex landscape design

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### Extended abstract

Whenever the research attempts to provide its own interpretation about landscape, it must interface with unavoidable evidences. We are certainly talking about a complex, broad, but above all polysemic topic, whose investigation necessarily requires the consideration of a vast spectrum of disciplines.

The interdisciplinarity in the field of landscape is responsible for a double effect with a contradictory or synergistic character depending on the points of view: on the one hand, the univocal definition of landscape, as a complete and persuasive knowledge, becomes more and more distant, on the other hand, the effervescence deriving from the various contributions increases the proximity to an idea of landscape as a complex and indispensable field, a kind of mirror inside which the several human activities are reflected.

Our researches, with particular reference to the Mantuan design experience aimed at enhancing the “PratiStabili” of the Mincio Valley, return a series of interesting considerations related to the historical context. Among the various aspects, what emerges is the theme of dynamism applied to landscape, according to which it corresponds only to one of the possible configurations that the territory can assume over time, and the theme of landscape as a common good and a fundamental element for the consolidation of identity, as also underlined by the European Landscape Convention.

The historical layering largely determined by humans together with the idea of landscape as a stimulating place for the individual awareness, testify the mutual relation between man and context, opening a window on the role that memory can play in this interconnection.

Although the technical vision of architects enables us to understand more easily aspects of a materialistic nature rather than the intangibility of a theme such as that of memory, the current situation, which acts as an accelerator, underlines the urgency of facing the value of these goods in order to develop new forms of response, more comprehensive or at least in line with current needs. Developing an idea that interests the place and the multiple meanings of its memory essentially means designing, that is, creating an articulate project that can open up to new solicitations able to interact with the complexity of our present and future.

Faced with these awareness, the contribution would like to highlight, theoretically but also through concrete references, three issues related to the memory that the project must assume today in order to express its effectiveness in relation to historical contexts.

The first aspect concerns the relativity of the value of memory and its relevance to a highly subjective order, influenced in particular by the passage of time and by individual perception; the second concept concerns the proactive nature of memory which must feed on solicitations starting from the re-elaboration of the past and not from its crystallization, avoiding “nostalgia” just as a state of mind; finally, but not least, the third theme refers to the systemic peculiarity that memory assumes, intended as a complex entity inside which each element, including its safeguarding or transformation, assumes a key role.

*Keywords: polysemic topic; complexity; common good; memory; intangible values*

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# Coastal tourism destinations as spaces of local identity and culture. Depictions from Mediterranean projects

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## Extended abstract

Mediterranean coastal regions are considered unique spaces of culture and landscape. Their cultural resources and physical environment constitute attractive assets for tourism development which has often jeopardized their identity and put pressures on the coastal and maritime ecosystems. The additional threats of climate change along with the economic and health crises call for a differentiation of the tourism product, which should be more sustainable and responsible in order to facilitate the resilience of the tourism sector. In coastal tourism destinations, the stakeholders affected by and contributing to tourism development represent both the demand and the supply side, including tourists, businesses, destination authorities and residents. The need for their cooperation and the development of integrated actions has proved to be essential in order to address the challenges posed for the tourism sector in the Mediterranean.

In this context, a community of projects under the INTERREG MED Programme aims at enhancing sustainable and responsible development of coastal and maritime tourism in the Mediterranean area. The entities involved are usually regional and municipal authorities and councils, universities, development agencies, networks, NGOs, regional and national agencies, ministries and other local, regional, national and macroregional entities with an interest in tourism development. The Community has worked towards identifying the factors affecting local identity and culture in the Mediterranean region. It also produced a series of outputs and methods towards assisting coastal regions to preserve their cultural assets and, at the same time, enhance their competitive advantages through new approaches. In this paper, some examples of such initiatives are presented that aim at providing alternative methods for dealing with overtourism and tourism monoculture, developing management strategies for underwater cultural heritage sites, developing new and sustainable culinary experiences, preserving cultural and natural heritage of small towns and at introducing new business models based on fishing activities. These initiatives share a common target, to preserve local identity and promote new and innovative approaches towards sustainable and responsible tourism. Their main outcomes can be easily replicated in other territories while their proposed actions could act as important components for tourism recovery and destination risk management.

This paper summarizes the projects' methods and outputs, their implementation to the Mediterranean regions, the transferability conditions for their implementation to other territories, their contribution to specific policy targets and their contribution to tourism recovery. It concludes with a series of policy recommendations towards the promotion of sustainable and responsible tourism in Mediterranean coastal tourism destinations. The paper results contribute to the facilitation of an integrated approach of coastal tourism destinations, especially on an urban scale, taking into account their identity, local economy, culture and environmental assets.

*Keywords: local identity; cultural heritage; coastal destinations; responsible tourism*

# Socialist mass housing stock as urban built heritage in Sofia, Bulgaria: perspectives and challenges

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## Extended abstract

Built heritage describes our origins and informs our understandings of who we are today. It helps to define a sense of place, an identity for a community. Heritage can excite curiosity about our past and enrich our daily lives. Built heritage is not just about beautiful or significant historic buildings but also includes modest buildings that reflect the social and living conditions of the middle- and low-income strata of a certain period. It encompasses a wide range of familiar and historical landmarks that are important in creating and sustaining a strong sense of belonging and attachment to our society.

This paper explores the socialist ‘housing stock’ (the large panel residential buildings) in Central East European Countries from the urban built heritage dimension. It mainly focuses on the capital of Bulgaria, Sofia (district Mladost II). In Bulgaria, rows of panel blocks were constructed during the Communist period as a fast and cheap solution to the housing crisis, which resulted after the Second World War. During the 45-years Communist rule in Bulgaria, housing was a powerful ideological instrument. The construction of the mass housing started in the beginning of the 1960s with the first housing estates reflecting the socialist ideals. The growing needs for housing together with the shortage of public investment generated more problems, such as permanent housing crises, poor living standards, low quality of construction and lack of finance for maintenance and improvement. With the mass privatisation (97%) of the local authority housing stock in the 1980s, the government “retired” from all responsibilities for the housing maintenance and management. Since 1992, the political and socio-economic change in Bulgaria was directed towards replacing the former socialist society with greater liberalisation, development of the market economy and integration into the European Union.

As pointed by many authors, communist heritage is controversial and ideologically overburdened, linked to memories and past experience (both positive and negative) for older generations, and unknown for younger generations. Based mainly on primary field research and secondary bibliographical material, the paper attempts to discuss the complex socio-spatial, economic and management issues regarding the socialist mass housing as urban built heritage of a specific historical period in Bulgaria. The paper suggests that given the rapid deterioration and destruction of this stock, it urgently needs attention and conservation, and concludes with findings and recommendations on the relevant perspectives and challenges.

*Keywords: socialist mass housing stock; panel residential buildings; socialist urban built heritage; Sofia.*

# The Economics of Architecture: Mapping the Economic and Cultural values

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## Extended abstract

This paper attempts to investigate the value of architecture in the context of sustainability, mapping the cultural and economic value of its externalities. How architectural value is depicted in economic indicators and how do they shape policy and decision making in architecture? What is the importance of recognizing, apart from the economic, the social and cultural impact of architecture? Initially, this paper highlights the current economical evaluation methods and their suitability to assess architectural value given that architecture capital generates both economic value and cultural value. The first is defined using methods of economic analysis and can be expressed in monetary terms. The latter derives from the fact that architecture as public good produces externalities and “in the economics of heritage, has been represented as a multifaceted and shifting concept that has no single unit account” (Mazzanti 2003, Choi 2010). It is a fact that decision making in contemporary socioeconomic context is derived from hard data and while expenditure is quantitative and easy to calculate in monetary terms, the benefits are not only financial but also aesthetic, symbolic, social, historical, educational, environmental, scientific etc. and, therefore, hard to measure. Given that the economic resources are finite and their management is always an issue, it is important to evaluate the architectural assets as a whole and to demonstrate the relevance of both the economic and cultural value to sustainable development and well – being. Moreover, architecture cannot be perceived detached from other social and economic fields such as tourism, construction, research, education, healthcare etc. The systematic underestimation of the value of architecture diminishes its role in decision making and overall in society.

This paper aims to illustrate the cultural value in conjunction with economic value of architecture, contributing in understanding the overall impact of architecture and the importance in investing in architecture. Recognizing the worldwide urge for a transition towards greener and more sustainable cities, ratified by the 2030 Agenda for Sustainable Development, the key requirement of this work is shifting the focus from a strictly economic - centered towards a more people - centered evaluation in architecture management and policy making, bringing in aspects from architecture, economic and social sciences. After all, public or private expenditure on architecture can be seen as an investment project, and therefore is amenable to evaluation using methodologies such as cost-benefit analysis, which should ideally include an assessment of both market and nonmarket effects of the project. In conclusion, nonmarket effects or externalities have significant social and cultural impact that can even exceed the hard economic effect and therefore should be explored and taken into account during decision making.

*Keywords: architecture; cultural value; economic value; sustainability; cultural management*

# Cultural and architectural heritage of tobacco era in Kavala, Greece. Can decay be reversed?

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## Extended abstract

The proposed presentation aims at accentuating the role of tobacco as a significant element in cultural and architectural heritage of the city of Kavala, in Northeastern Greece, and at describing possible directions for its preservation and management by the use of new technologies, namely the blockchain technology. For doing so, an initial framework will be defined, based on the history of the urban formation of Kavala, and highlighting its unique characteristics which granted to the city its past significance in an international level, as a center of tobacco cultivation, elaboration and exportation. Succession from an Ottoman past with a multicultural flavor, to a national identity of a new Greek State; the various movements of the population of the broader area and the demographic changes of the city at the beginning of the 20<sup>th</sup> century, until the exchange of populations of 1923 and the arrival of the refugees; the social classes and the social movements of the 20<sup>th</sup> century; and all of them, soaked in a strong tobacco aroma and flavor, and wrapped in a characteristic urban tissue. The evolution of this tissue will be examined in relation to its specific elements (tobacco warehouses, the old neighbourhoods of the city etc.), and to the elaboration and implementation of the first urban plans of Kavala.

The transition from the past to the present will be approached through a comparative point of view, and the structural and essential changes of the urban character of Kavala will be pinpointed, with special focus on the elements of its architectural heritage, and the succession of their functions and roles in urban planning procedures.

Protection and management of cultural and architectural heritage for the city of Kavala encompasses the potential of a city to embrace its past as an essential element of its cultural reproduction and plan its future according to the principles of sustainability, and the possibilities offered by means of modern technologies.

Blockchain technology can provide providence for elements of architectural heritage (tobacco warehouses) to improve building maintenance, attract interest for investing on them, and provide a platform for participative management of the urban areas/neighbourhoods which they compose, aiming in integrating them in contemporary urban functions.

*Keywords: architectural heritage, cultural heritage, Kavala, tobacco era, tobacco warehouses, blockchain technology*



## **CULTURAL HERITAGE MANAGEMENT**

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**Changing Cities V, Corfu, 20-25 June 2022**

# City branding via Greek film festivals in the time of the COVID-19 pandemic

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## Extended abstract

Greece, despite its relatively small size as a country has always been involved in cinema by organizing important film festivals but also by giving birth to prominent artists.

Indeed, Greek cinema during the 21<sup>st</sup> century has truly experienced an artistic resurrection by producing movies which have transcended Greek borders. Consequently, these movies have also generated a generation of Greek artists involved in the different aspects of cinematic creation. These artists, by their identity as Greeks, have brought attention to our country, but also to our film festivals.

In this paper, we will concentrate our attention not on the artists but on the film festivals. More precisely, we will use as case studies, the Thessaloniki International Film Festival and the Drama International Short Film Festival. Both these festivals apart from their artistic potential and capacities have served through the years as ambassadors for the city of Thessaloniki and Drama, respectively. Firstly, both the film festivals include international competition sections. Consequently, by involving, a number of foreign artists these artists have the opportunity to travel to both the cities and get to know them. However, apart from these artists travelling, our most important point is that both these festivals involve the city in their whole organization. The city becomes a part of the festival and the festival becomes a part of the city. At the time of the film festival, this is the most important event of both the cities.

Throughout the years before the COVID pandemic both the film festivals organized events in different venues and places in the city. In these events a great number of people were present having the opportunity to know and experience the city. However, during the last years, both the film festivals have been obliged to transform their program due to the measures taken for dealing with the pandemic.

In this paper we will investigate these alterations in the programs of the film festivals. Our goal is to understand if they have also affected the way the city is experienced and portrayed through the festivals.

In order to realize this research, we will interview members of the organizing committee of both the festivals. We will interview members, from both the national and the international competition but also members of the PR management of the festivals. In this way we will both analyze the changes in the program, but also their impact in terms of the reception of the image of the city.

*Keywords: Thessaloniki International Film Festival, Drama International Short Film Festival, film festivals, city branding, COVID pandemic*

## Archaeological museum of Thebes: Innovation via past

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### Extended abstract

Cultural heritage was and still is a very strong incentive when people decide to visit a tourist destination, regardless of its significance, either primary or secondary. The advantages of such a choice are many; some of them are authenticity, experience, quality, investigation of a different civilization etc. Thus, the whole tourist experience does not become monotonous. This is completely understood by few countries, especially in the south Mediterranean (e.g. Italy and Spain) which nowadays focus on forming a complementary tourist policy on a national level. Since all the countries in the Mediterranean Sea, both European and African, offer the same tourist product concerning mass tourism, innovation seems to be an imperative so that every country can be competitive in the European context, at least.

One of those countries which can totally rely on this project is Greece but unfortunately, it is a common sense that there is not even the slightest organization regarding the coordinated promotion of every cultural asset. The problem is getting bigger because there are many archaeological monuments that, still in the present, have not been discovered yet. Nevertheless, there are also modern monuments which are related to the past and preserve to a great extent the local identity of many cities, prefectures and even regions; museums. Greece is characterized by a large number of museums throughout the country, proving the common component of cultural heritage in the whole Greek territory. Though the perspectives are great, the current management of most museums shows that the overall perception is static and not dynamic. However, the distribution of museums in the Greek territory is an optimistic note since the point is regional development and cultural heritage highlighting. This is of great importance because the phenomenon of urbanization in Greece is continuously growing and a turn in the opposite direction is needed.

The practices which a museum can adopt and implement in order to enhance its sustainability and image are various all over the world. This paper deals with the newly built archaeological museum of Thebes, a small city north of Athens, known for both its great mythological and historic past. The survey is based on the way that this museum distinguishes itself from any other in Greece and how it intends to change the current situation for the better in the future, regarding museum tourism as well as local development. In conclusion, the paper submits a unique and emotional proof of connecting past and present via scripture.

*Keywords: Thebes; archaeological museum; tourism; innovation; scripture*

## Archaeological tourism on Kos Island: Asclepius' sanctuary

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### Extended abstract

Culture as a term is quite broad and for this reason, cultural tourism is divided into many different categories. One of the main categories, if not the most basic of them, is that of archaeological tourism. Any journey to the past, either through reading or through authentic experience, will always fascinate a large number of visitors and tourists, in the context of a constructive tourist experience. Therefore, those who are interested in such activities form a substantiated opinion of other cultures through comparative analysis and complete themselves as personalities. This is nothing but a great advantage as it enhances the mitigation and understanding of cultural differences at the level of interculturalism.

Despite the fact that Greece faces many problems regarding cultural heritage displaying, the country is characterized as an attractive pole since it is the cradle of the western civilization. Visitors can enjoy the combination of the entire natural environment with archaeological sites and ruins and monuments. This is a unique opportunity for everyone to come in touch with the customs and the history of each place, thus acquiring both a cultural and an educational framework, correlating leisure with essential knowledge. Apart from the tourists, archaeological tourism attracts enterprises as well. As a result, the benefits are quite many for them and the society. Some of them are economic benefits from tickets, travel expenses, accommodation, gastronomy, purchases in local businesses etc.

Although the potential of archaeological tourism is largely taken for granted, most areas of southern Greece in particular, do not seem to desire to add this alternative form of tourism to the existing tourist model of "4S". Of course, there are some brilliant exceptions and one of them can be observed on the island of Kos. The island is very famous about its luxurious hotel infrastructure, the astonishing natural environment and if there is one thing for sure, this is that mass tourism does not show any sluggish row at all. In parallel with that, the island has something extraordinary – among others – to present to tourists and this is related to one of the most well known ancient sanctuaries of Asclepius. In turn, this sanctuary is also connected to the father of medicine, Hippocrates, Asclepius' descendant. This paper records the ideas and the proposals which were taken into account so that the island of Kos could be a very serious reason for a tourist visit. The results clearly demonstrate the scope of archaeological tourism and why it should not be neglected.

*Keywords: archaeological tourism; Kos Island; Asclepius; Hippocrates*

# Memories of the concentration camp of Ai-Stratis. Interpretation of a difficult heritage about the internal exile of political opponents in Greece

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## Extended abstract

In recent decades, there has been a growing worldwide interest in those events that marked the course of world history and create conflicts within a society. In Greece, the subject of compulsory displacements and political persecutions, such as repression measures against the political enemies, that took place in 20<sup>th</sup> century, still remains a marginal topic to discuss and analyze. At the same time, the methods of repression that the state implied on its political opponents (radical citizens, left-winged, communists), from the '30s to the political transition in 1974 (Military Junta), have been consigned to oblivion. The commonest way of prosecution was the displacement to distant locations (internal exile) and the internment to maximum-security prisons.

Regarding Greece, dozens of islands were turned into places of exile and “disciplinary camps”, whilst many prisons were created for the state “enemies”. In their majority, these sites of memory have been abandoned receiving no state support. One of the most obvious examples is the “Concentration Camp of Discipline Living” in Ai-Stratis, a small island in the Aegean. The Camp was opened in 1929 due to the “Idionymo” law, which aimed at suppressing trade unionism and communism. The exile phenomenon culminated during Metaxa’s dictatorship and hundreds “opponents” of the nation were exiled. After the Nazi invasion the security forces of Greece handed over the political prisoners and exiles, as hostages, to the German occupation army. After the liberation, in October 1944, the Camp closed and the last exiles were set free. In 1947, during the Civil War, the Camp of Ai-Stratis opened again. Overall, between 1947 and 1962, more than 9.000 exiles were displaced in the island. Finally, the Camp closed in 1962. After the military coup of 1967, the Camp reopened and operated as a place of exile for political detainees up to 1974, hosting a small number of people. This year the “Left” – communist party was officially recognized as a legitimate political organization and persecutions were paused.

Additionally, the Museum of Democracy is the first Greek public Museum which deals with a period of recent history of crucial political and social emotion. The location chosen was the island of Ai-Stratis. The museum is housed in a historical building, which was originally the first school on the island. In the periods of exile, the school was turned into a community infirmary staffed by the exiles. The building was damaged by the 1968 earthquake and had to be abandoned, until the restoration of 2005 held by the Ministry of Culture. Thus, in 2007 the Museum of Democracy opened its gates.

In this article, we will handle the term “difficult cultural heritage”, as well as the transformation of such sites of memory into museums and their promotion. The concentration camp of Ai-Stratis and the Museum of Democracy will be discussed as a case study due to its significance and historical importance.

*Keywords: Difficult cultural heritage, Political prisoners, Concentration Camp, Museum of Democracy, Ai-Stratis.*

# The cultural-historical heritage as a potential for the development of tourism in the municipality of Arandjelovac

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## Extended abstract

When it comes to tourism, cultural heritage keeps gaining attention and interest. A tourist's wish to learn more about the destination he is visiting is mirrored in his growing demand for cultural landmarks from different historical periods - to the most recent ones. Today, tourists do not decide solely on one content, it is usually enriched with a whole spectrum of new ones.

In the context of cultural heritage, new approaches have a special role in the development of tourism, so all of the aspects of its influence are being taken into consideration. The presentation and conservation of cultural heritage can contribute to the development and advancement of local and regional communities. In terms of tourism, each space is more interesting if cultural heritage has been integrated into spatial development (in the level of development). An important segment of development and advancement of cultural tourism is the sustainable use and management of cultural potentials. The paper explores the capability of including cultural heritage into cultural and tourism policy. The paper presents and describes the tourism potential of the historically and artistically important urban wholes of Arandjelovac, a city with preserved historical heritage. The municipality and town of Arandjelovac belong to the district of Sumadija in central Serbia. Arandjelovac occupies a territory of 375,89 km<sup>2</sup>, of which 15,75% of the total area of the Sumadija district (2.386,71 km<sup>2</sup>) belongs to the municipality of Arandjelovac. Arandjelovac is situated at the foot of the Bukulja Mountain (696 m), at about 250 m above sea level, where the river Kubrsnica has its springs. Apart from its natural beauties, this area is known for its historical importance and abundance of cultural monuments. This is why the aim of our paper is to introduce landmarks such as the Risovaca cave, Bukovickabanja, Maricevicajaruga, the Church of Saint Archangel Michael in Arandjelovac, the Church of Saint Archangel Gabriel with a memorial fountain and plaque in Bukovik (just to name a few) to the public and to point out the tourism potential of these places. Tourism is becoming one of the leading branches of economy in the world today, and its development can be based on natural and culturally-historical values of cities. Due to tourism, the conservation of natural, cultural and historical values (in municipalities like Arandjelovac) can be achieved in accordance with the economic potential it owns.

*Keywords: cultural-historical heritage; tourism; development, advancement, conservation*

# Revitalizing intangible cultural heritage through the design of virtual environments

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## Extended abstract

Intangible cultural heritage (ICH) consists of nonphysical intellectual wealth, such as songs, performing arts, social practices, rituals, festive events, knowledge and practices concerning nature, as well as knowledge and skills to produce traditional crafts. The safeguarding of ICH is an important factor in maintaining social coherence along with cultural diversity, but it is also a challenge in modern societies. Lately, advancements in extended reality interactive technologies and artificial intelligence have been breaking new ground in understanding and sensing intangible heritage. In this paper, we present the project CHROMATA, which aims to develop a platform that uses content from online sources and cultural institutions, for instance data as images, videos, texts, audio, and 3D models and assists the design of immersive environments with 3D reconstruction techniques. Project CHROMATA aims to boost the revival of the intangible cultural heritage via encouraging the creation of coherent, complete immersive experiences. The platform development is driven and validated by real use case scenarios in which designers, creators and historians are designing virtual experiences of selected customs of Greek culture. The project is elaborated through three pilot use cases (PUC). The PUCs address issues of Greek tradition and its intangible heritage, located mainly in the region of Macedonia (Greece) and Thrace. All PUCs include the elements of analysis of audio-visual material for the recognition of dances, digitization of stories or music lyrics, and their digital transcription / re-invention in a virtual environment which includes traditional spatial units, techniques and objects. Within academic activities at School of Architecture, Aristotle University of Thessaloniki, students try to experience attributes of the designed virtual space, using tools provided by the CHROMATA platform, and designing spaces and objects inspired by selected elements of intangible heritage. The result of this process is compilation of reports on the use cases, utilizing the content of all the data that they have explored and are related to the intangible heritage and at the same time visualizing the virtual spatial experience as an exhibition unit, addressed to others users. For each use case, places of interest, people's activities and related objects are selected for three-dimensional reconstruction purposes, the acquisition of corresponding spatial three dimensional models that will facilitate the scene creation of related immersive environments.

*Keywords: intangible cultural heritage; immersive experiences; customs; 3D reconstruction; interactive technologies*

## World heritage monuments and the city: some preliminary remarks on the management of the monuments of Thessaloniki Greece

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### Extended abstract

The World Heritage Monuments and sites constitute a special category of monuments. Being selected for inscription in the World Heritage List on the basis of certain criteria, they are considered of outstanding universal value. In the context of World Heritage Convention, effective measures should be taken to preserve their value and ensure its transmission to future generations. These measures include the legal protection of the monuments, conservation and restoration works and, the most important, the integration of protection into broader planning programmes.

Furthermore, World heritage monuments are expected, as they are highly recognizable, to attract many visitors, locals and tourists, and to contribute in the economic development of the region where they are situated. Also, they are linked to educational activities, as they bear strong material testimony of past eras and are embedded with cultural meanings of high importance. All these dimensions of World Heritage monuments form the various aspects of a highly demanding management plan, especially when the monuments and sites integrate into the urban fabric.

This the case of the Palaeochristian and Byzantine Monuments of Thessaloniki, a series of monuments constructed from the 4<sup>th</sup> to the 15<sup>th</sup> century, which includes secular, military (as the impressive byzantine walls) and mainly religious monuments, an important number of fine churches scattered throughout the historic center of the modern city. Among the aims of this brief presentation is to describe in broad terms the current situation concerning the management of these monuments, taking into account the dimensions referred above and identifying the main stakeholders involved. Some first remarks will be made, main problems or deficiencies, on the one hand, and best practice, on the other hand, in any of the protection fields will be highlighted. Secondly, an attempt will be made to examine to what extent the protection measures and presentation activities conform with the corresponding spatial, economic and educational policies at a local level. Consequently, some thoughts and suggestions for a more holistic and coherent management of the World heritage monuments of Thessaloniki will be made, if possible.

*Keywords: world heritage monuments, heritage management, religious byzantine monuments, cultural tourism, policies, Thessaloniki*

## “SPHINX”: changing the world

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### Extended abstract

The pandemic plague that has spread throughout the world has also affected our society in all levels, among which our correlation with the cultural-archaeological heritage. In context of the author's Doctoral Thesis, an attempt was made to create an innovative system called “SPHINX” for the management of intangible and natural cultural heritage implemented in the region of Boeotia in Greece. This system is a particularly valuable methodological project both for the field of research and for any other area where SPHINX will be applied. This research revealed a very important aspect of Boeotia, its global uniqueness, and in particular its cultural virtues, that are clearly incomparable with any other similar global features, i.e., the prominent Lavdakid circle, one of the two pillars of Greek Mythology and Drama.

The process of mapping was used for the development of the innovative SPHINX system. The system is mainly based on superimposing one –or more- maps on top of one another and constitutes a continuous search of landscapes that, as dynamic and timeless fields of cultural inscription and manifestation, seek their enhancement and interpretation within the sphere of meanings and symbols. The process of compiling maps can bring up, through the projected concept of palimpsest, the continuously vibrating images of the boeotic, in this case, landscape through the complexes of multilayered dynamic topological systems and networks inscribed on holographic surfaces.

More specifically, the most important points of the system are: 1) the highlighting of the uniqueness of SPHINX as a capacitor of the tangible and intangible elements of an area as the respective field of research claims its own uniqueness, 2) the drawing up of guidelines in order to highlight the cultural heritage, the natural landscape, the areas and landscapes of natural, historical, cultural interest and to promote cultural tourism in combination with the awareness of ecology, education, tourism, sustainable development, 3) the definition of a -holistic- management policy for the remodeling of the existing incomplete framework, in which the existing "reality" and the experience of the landscape are continuously registered by the users, 4) the strengthening of the universal use and cooperation of the competent Agencies, in order to achieve the wider impact of the research through the leading Humanistic Science of Architecture, which promotes and evolves Human, 5) the highlight of the continuous and timeless process of recording the anthropogenic imprint in the space-time continuum as the expression and the spirit of the place (Genius Loci) as well as 6) the promotion of the development planning to ensure the prosperity and sustainability of the landscapes -at national/ global level- for an auspicious future.

The possibility of creating an innovative digital database in order for the SPHINX system to be managed by the general public is noteworthy. This will facilitate on-site and remote monitoring of cultural heritage, broadening human prospects due to the fact that SPHINX is an innovative idea that combines the past with the present seeking a bright future with the ultimate goal of widening human horizons.

*Keywords: Sphinx; heritage; Boeotia; Palimpsest; Landscape*

# Cultural heritage management, Archaeology and Architecture: The experience of a time-space apocalypse

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## Extended Abstract

Concerning the dipole ancient-modern, the question whether the architecture that happened 2500 years ago can still constitute a source of inspiration and a design basis in modern times has aroused.

The paper aims to promote a project-oriented approach to perception, comprehension, interpretation, and place intervention in the archeological site of Delos Island.

Through a procedure of an analytical method, the current paper intends to provide some initial answers to the above question, by referring to the sacred island of Delos, the place where the universal light was born, according to the Greek mythology. A light, which can be interpreted as realistic, as a space design tool and as an intellectual repository.

Delos, it's a small island of the Aegean Sea, the entire island is designated as an archaeological, and a World Cultural Site since 1990 by UNESCO. In the ancient times, the myth of God Apollo, God of light, and goddess Artemis having been born there rendered the island sacred: no mortal would ever be allowed to be born on its land.

This proposal introduces an innovative scenario access, promenade, and intervention, in the archeological site, as well as a design approach, incorporating those critical elements focus on the understanding of the Delian Genius Loci, through the exposition of a multi-functional building complex.

The design idea is based on the perception of the place's spirit and the analysis and interpretation of the urban and architectural vocabulary and heritage management of the Delian ancient city.

The excavation is supposed to be the core design element, as an attempt to become totally integrated to the earth level and subsequently preserve the heavy meaning of the landscape and the balance between ancient-modern. A view threshold before visiting the open-air archeological site becomes a training tool for the visitor, through the presentation of proportions, scales, and style of the buildings, preparing him for the rest of his visit.

This kind of approach can also play a significant role in creating sensitive architectural interventions, suitable for their context, contemporary in their design, while responding to historical precedents.

It can establish a methodological tool, as a link between the fields of architecture and archaeology, which in more ways than one has a lot in common. In a time of increased awareness on issues of sustainability and heritage, the preservation of architectural landmarks of historical significance is of major importance.

*Keywords: heritage management; architecture; place integration; Delos Island; Genius Loci*



## URBAN DESIGN IN PLANNING

# CHANGING CITIES



Changing Cities V, Corfu, 20-25 June 2022

# Urban Gender and Scalar Hermaphrodites: Forging a Fjordscape

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## Extended Abstract

This text explores nascent scenarios of tentative ‘scalability’ spanning between the macroscale of an arctic landscape and a relative microscale of urban regeneration efforts. As study locus serves a brownfield seaside site in central Odda, a remote Norwegian town west of Oslo, thus prioritizing a confrontation with the Nordic landscape, a pristine primordial terrain. The fjord seems feminine, a deep indentation in the earth crust. Yet the addressed setting emerges as a potentially masculine protrusion, in section or plan, counter-action to an implied femininity of the glacier. This instinctive reaction to topological ‘physis’ triggers a scalar *hermaphrodite* [Hermes + Aphrodite] discourse. Simultaneously of masculine and feminine nature, the *hermaphrodite* acts upon or responds to a geological and perceptual setting thus subconsciously expressing the intrinsic topology of the fjord. The examined case study attempts to create an experiential plateau staging a contextualized confrontation with the arctic ‘sublime’, an exposure to the grand scale of a geological miracle. Tectonic forms evaporate into the fjord grandeur in an immateriality of Miesian descent. Super-imposition and fusion of scales generate an uncanny juxtaposition; a hybrid ensemble, an amalgam that embodies the deeper idiosyncrasies of topography and context. Pre-eminent formal role in the analyzed volumetric composition is offered to the natural landscape, re-establishing the primacy of *locus*. Solids negotiate the phenomena of glacier carving and scarring the Gaea skin, engendering the current *anaglyph*, a ‘brute’ act operating at an unperceivable grandiose scale. Individual traces of local urban history are reformed as *bowls* of historic conscience through formations of a ‘conical’ townscape. Carved and subtracted voids reflect diverse directives that range from a notion of ‘detachment’ established from the ‘volcano’ cone – finally reversed by notions of engagement established by amphitheatric arrangements. The subsequent re-urbanization phases triggered via the examined *HermaphrOdda\*ite* parti – redefine the site as a milieu of human occupancy overriding the former industrial wasteland. *Industry* does not simply become a retro-attraction but generates new species of urbanity, balancing a hectic heritage of raw logistics with the dynamic urban terrain of unprecedented typological hybrids, readdressing questions of public space. Re-branding the city of Odda as a sought tourist-destination and leisurely harbor, passenger circulation routes and related infrastructural constituents facilitate a novel – much anticipated – cruise-ship port-terminal. While provocative conceptual or architectonic objectives are served without compromise, the investigated scheme displays organizational modes that optimize operative agendas; services and programmatic outsets. Systematic responses are offered at the level of efficient construction, building processes and implementation strategies while landscape notions, urban design agendas, historical traces, city politics, marketing trends, public policies and communal directives are provocatively engaged.

*Keywords: scalability, arctic landscape, brownfield reclamation, place branding, waterfront regeneration, urban gender.*

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# Aesthetics of streetscapes characterized by buildings with different heights and front setbacks, and distinct levels of order and visual stimulus

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## Extended abstract

The objective of this paper is to evaluate the aesthetics of streetscapes characterized by buildings with different heights and front setbacks, and distinct levels of order and visual stimulus, by three groups of people with different levels and types of educational background. Although some studies have been made about the aesthetics of streetscapes with these or similar characteristics, there is a need to deepen the existing knowledge, mainly, regarding aesthetic evaluations of these streetscapes by such groups of people. There is also a need for greater dissemination to those involved in urban planning and design of the results of research that support people's aesthetic reactions to streets with these characteristics. In this sense, a disregard for the aesthetic effect of the buildings' height, location in relation to the front setback lines and levels of order and visual stimulus is reflected in many new buildings in different cities. Moreover, some controversy does exist about the existence or not of differences between the aesthetic evaluations of architects and laypeople, further justifying the relevance of this study.

Questionnaires available in the LimeSurvey software via the Internet were used for data collection, being answered by 250 people as follows: 62 architects, 169 non-architects college graduates and 19 non-college graduates. Nine streetscapes scenes in three sets were included in the questionnaire, as follows: set 1 - three streetscapes scenes characterized by buildings of different heights inside the blocks, with no direct relationship with the street; set 2 - three streetscapes scenes characterized by buildings of different heights on the block perimeter, with doors and windows facing the street; set 3 - three streetscapes characterized by order and low visual stimulus, by order and visual stimulus, and by disorder. Questions about the aesthetic evaluations of each of the nine scenes and about the order of preference for the appearance of the three scenes in each of the three sets and multiple choice questions about the justifications for the preferred and least preferred scene in each of the three sets were used. Non parametric statistical tests such as Kruskal-Wallis and Kendall W were used to analyze the data.

Results show that aesthetics of streetscapes is clearly affected by building's height and by distinct levels of order and visual stimulus, mainly by those with college education. For example, streetscapes scene with 5-story buildings inside the blocks with no direct relationship with the street is preferred and that with 18-story buildings is the worst evaluated and the least preferred by any of the three groups of respondents, mainly due to differences in sky visibility. Moreover, streetscape scene characterized by order and visual stimulus is clearly preferred, mainly due to similarity between buildings' heights, colours and forms, and presence of clear visual stimulus, and the scene characterized by disorder is visibly the least preferred, mainly due to differences between buildings' heights, colours and forms, and the absence of clear visual stimulus, by architects and by non-architects college graduates. Additionally, streetscape scene characterized by order and visual stimulus is positively evaluated, while the streetscape scene characterized by disorder has a very negative evaluation, by any of the three groups. Therefore, these research findings can contribute to deepen the understanding of streetscapes aesthetics.

*Keywords: aesthetics of streetscapes; buildings' heights; buildings' front setbacks; order and visual stimulus*

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## Making cities liveable: Barcelona caring city

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### Extended abstract

Nowadays it's necessary to reshape our cities for better and equitable living conditions. We have to respond to different challenges such as the climate crises, the shift to renewable energy, the right of housing for all, sustainable mobility, more naturalisation and, basically, the creation of conditions for equitable cities on the basis of people-centred policies and projects, and specifically caring needs and works. For all this many European cities are facing important transformations in the configuration of public space.

That's the case of Barcelona, the transformation of the public space has been pushed forward due to pandemic, reinforcing the current policies of city re-naturalisation and pedestrian friendly. The pandemic situation gives the opportunity to go faster on the transformation of public space for the people, that has been complemented by the utilization of soft, tactic or lean urbanism providing the chance to test and at the same time to change faster the priority in public spaces. We have chosen to study two programmes.

-The programme "We Protect Schools" ("*Protegim les escoles*" in Catalan), that aims to gain space for gathering and playing safely in front of schools. And, also, following the ideas of the international network "Educating cities", Barcelona has a strategic plan -based on transforming all the city, all the public spaces, into playing sites. These shifts towards a children-centred urban planning mean a total transformation of the bases and priorities for an urban plan, following the real needs and ways of living and improving the relations between people, and their health.

-The superblock programme (*Superilles* in Catalan), based on converting former car dominated areas into pedestrian, places to be and playground areas for daily life (and not only around emblematic buildings or tourist reasons). The programme is based on giving support to the necessities of everyday life, and the transformation is specially focused on the 19th century city (*Ildefons Cerdà's Eixample*) which means a great challenge, because it is transforming the machine city, car-centred, into liveable, quieter and greener public spaces.

All these proposals have been underlined by a gender and feminist perspective on urban design, that look for everyday life through spatial programmes and policies. Placing people, inhabitants, and their daily need at the centre of the city policies.

So, we propose focusing our study on the already done transformations of space and habits of inhabitants, specifically on the case of the *Superilla* in Poblenou and in Sant Antoni, and related to the programme "We Protect Schools", as real examples to compare with experiences and good practices in different countries, to make cities more liveable and more in accordance with our times and the necessary and urgent shifts. Making the city a caring place.

*Keywords: public space, playgrounds, feminist cities, right to city*

# Towards a Resilient City: urban morphology for design

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## Extended abstract

The paper focuses on the Portuguese urban culture as case study to address an operative way of analysis the urban form. The objective, under the topic of urban morphology for design, aims to discuss the relations between research, analysis and design and the practical role of urban form study towards the sustainable and resilient cities.

Methodologically, the reading is based in the analogue relations, i.e. a powerful operation that works as process to convert the memory of things into architecture. The proposed method of analysis uses the analogy as a form of dialectics attempting to bridge a conceptual relation between the interpretative exercise of reading of the urban fabrics of some selected historical cities, produced throughout the time and sedimented in the long time, and the conjectural design principles behind the shape of urban samples that represents the long traditions of the Portuguese way of building. Using drawing as an interpretation tool, together with delayering and elementarism as methodological procedures of decomposition, allowed for the exercise of progressive abstraction and consequent simplification of the complexity of the urban form. From the conjectural point of view, we reconstituted the code of design principles based on a theoretical frame which defines the architectural and urban typologies structural interference within the city built-fabric.

The result of the proposed approach advises an operative reading that should be understood as a process of conceptual transfer. Thus, it is possible to admit that the knowledge extracted from the analysis of built city may be used to define new concepts for design the urban fabric or can be converted into design principles, whereby it may inform an active position on the way of thinking and shaping tomorrow's cities.

*Keywords: historical city; urban morphology; design; urban layout, Portuguese city*

# Challenges of the Covid-19 pandemic and design responses in public space: Towards strategies for resilient post-Covid cities

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## Extended abstract

The Covid-19 pandemic triggered designers to revalue and redesign public spaces, creating temporary innovative solutions for urgent covid-related challenges. Within the project 'From Prevention to Resilience', we documented and researched these changes in both short-term, mapping the ad hoc design responses to the pandemic in public space, and in the long-term, investigating how public spaces can contain urban resilience anticipating future shocks. Within this two-year project, we ask *in what ways public space can be (re)designed or used in response to a pandemic?* To address this question, we are developing an open-source database, curating design challenges, design strategies, and design examples, thereby providing actionable knowledge for creative professionals in responding to the ongoing and anticipated future pandemics while building social and ecological resilience. The research project, funded by the Dutch organization for health research and care innovation, is a collaboration between the chairs of Spatial Urban Transformation and Civic Interaction Design (AUAS) and an international partner consortium.

In this paper, we share our preliminary findings and approach-in-the-making to identify the challenges caused by the Covid-19 pandemic and the design strategies that address them. We studied 65 design examples collected from design and architecture blogs, such as thatArchDaily and Dezeen among others, and a community of practice involved in our project. Analysing the examples consisted of two key steps. First, the examples were clustered into themes by asking *what Covid-related challenge they attempted to address*. Second, we articulated design strategies per theme based on *how the design examples tackle the challenges*. We found five main pandemic challenges: *Be able to keep distance; Uphold and access to important activities and services; Have the opportunity to be together; Safeguard emotional well-being; and Access to medical infrastructure*. For each challenge, we articulated three to six design strategies.

The results highlight the potential of public space in addressing a variety of Covid-related challenges. The strategies, in turn, elaborate how designers can tackle such challenges in multiple ways, providing concrete guidelines to operationalise design solutions. In conclusion, the paper reflects on the methods and the construction of multiple levels of knowledge that enabled the organisation and analysis of the collected design examples. Thereby, it introduces intermediate-level knowledge and enables professionals to access and apply it in their practice. The database will be shared with a diverse professional audience, including designers and local governments, and serve as a program of possibilities, inspiring decision-makers to build urban resilience beyond preventive measures.

*Keywords: Covid-19 pandemic; public space design; neighbourhood resilience; program of possibilities; database*

# The pandemic and the urban design: Reflections about Post COVID-19 urban planning of inner areas in Central Italy

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## Extended abstract

The pandemic COVID-19 triggered a deepening of studies linking the areas of health and urban planning in the academic world. Since 1843, it has been known that the number of diseases and deaths varies according to climate and soil, as *Jean Boudin* showed in his essays on medical geography. Current research in this area suggests that climate change may be responsible for the emergence of certain disease variants, as the climate is capable of causing the transformation and alteration of pathologies and influencing both the pathogenic microorganisms and the human organisms themselves. Variations in temperature and atmosphere determine deviations and adaptations of normal metabolism and likewise alter and regulate pathophysiological processes in which functional resistance to parasitic attack is expressed. Therefore, has been discussed the existence of meteorotropic diseases related to seasonal conditioning, such as colds and the exacerbation of respiratory, circulatory and cardiac diseases in winter; radiation-related diseases such as sunburn and migraine in summer; and, more recently, the relationship between air pollution and the spread of coronavirus. In addition to the stresses that climate change brings in the form of natural disasters such as heat islands, earthquakes, tidal waves, floods, etc; there is an extension of its effects to the health sector as well, which also have global and local impacts on the environmental, social, and economic spheres locally and globally. In this way, the disruptions triggered by the pandemic have had, and continue to have, a decisive impact on the urban tissue and its uses. In the first months, with the lockdown, there was a significant collapse of the real estate market, a substantial economic loss due to the vulnerability of supply chains, the closure of a significant portion of establishments and a gradual collapse of tourist activities, the non-use of public spaces, and much more. Numerous documents have been produced in an attempt to guide actions in the post COVID-19 phase such as the document "*COVID-19 and the goals for urban development*" from ONU, the "*Drawing light from the pandemic: a new strategy for health and sustainable development*" of the Pan-European Commission on Health and Sustainable Development, the "*Piano Nazionale di ripresa e resilienza*" of the Italian government, among others. But would all these proposals be adequate for the restart of the cities of the Italian inner area? This article proposes an analysis of the effects brought about by the COVID-19 pandemic on urban planning and a reflection on the national and international guidelines for the restart phase after the pandemic in a regional context, evaluating their adequacy to the reality of the cities in the region of the Crater of Centro Italia, an area affected by the earthquake that occurred in 2016. Consequently, the result of the research suggests that the strategies adopted at the national and international level should be re-evaluated at the regional level to ensure that other specificities of place are taken into account to ensure the resilience of cities in inland areas through urban planning and design.

*Keywords: urban planning; the post COVID-19 cities; urban design of inland areas*

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# Assessing the density of the traditional morphological patterns in Tuti Island in Khartoum

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## Extended abstract

Urban densification is a critical indicator of urban morphology. It is one of the most employed strategies to regenerate and develop urban areas in post-colonial Africa. In Sudan, most of the previous planning attempts in the capital region (Khartoum) have adopted this technique in some way- mainly in the form of vertical densification. Yet, recent evidence from Khartoum City demonstrates the efficiency of “horizontal” densification employed in many traditional Sudanese settlements, as in Old Omdurman and Tuti Island. Nonetheless, horizontal densification in traditional Sudanese neighborhoods has never been thoroughly investigated and studied, especially when referencing urban forms and morphology.

This research aims to examine urban form through the mapping of morphological indices. This was achieved by identifying the factors that shaped prevailing urban patterns and morphology in Tuti Island (the oldest traditional settlement in Khartoum); thus, assessing densification means adopted in each. This research utilized the explorative approach, which focuses on the built form and the mechanism that invented the dominant urban forms and densification patterns. Data was collected through direct observation and fieldwork supported by Questionnaires and interviews. Several secondary data were also utilized – mostly related to current and historical maps, land uses, and urban forms.

The conclusions drawn by this research indicate four different morphological patterns that respond to time, culture, place, and space. Those patterns adopt various densification techniques of which the traditional center of Tuti is the most densified. The researchers also observed that urban density in Tuti island decreases as the level of adoption of the colonially inherited planning regulations increases.

*Keywords: Urban density; Urban Morphology; Tuti Island; Khartoum*



## **SUSTAINABLE URBAN PLANNING & DEVELOPMENT**

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**Changing Cities V, Corfu, 20-25 June 2022**

# Evaluating the accessibility of green spaces in Romanian small urban environments

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## Extended Abstract

Over the past two decades, the concern for the creation and development of green spaces in urban areas has increased considerably. This concept has gained major importance in view of the benefits that green spaces provide directly to society. In Romania, small cities represent the bridge between urban and rural areas, having the lowest level of urban system. They are a mix of the urban and rural features and characteristics of a territory. The purpose of this study is to identify the main categories of green space in small towns (less than 20.000 inhabitants) and the way in which they are perceived by the population. In general, the distribution of green urban areas depends directly on the different characteristics of cities, their typology and the complementary elements of urban environments. Green spaces allow adequate and detailed identification of certain aspects relevant to their planning, construction and maintenance.

Out of the total of 220 small cities across Romania, we have chosen a sample of 25 representative cities for all the country's development regions, where green spaces have been mapped. The methods used in the mapping process were the digitization of satellite images using the ArcGis Pro software and the application of a survey regarding the population perception of the existence of green spaces. Following the mapping of the above-mentioned cities, we have obtained a database of quantitative information, such as the area served by existing green spaces, the street network, and the areas where various typologies of green infrastructure have been identified (parks, squares, sports grounds, etc.). In order to create a complex analysis, the results obtained from the mapping of green areas were compared with the answers obtained from the questionnaire applied to the population of small towns. Thus, as a result of the digitization of satellite images, a maximum of 5 categories of green spaces emerged, as opposed to the questionnaire, where respondents identified 6 categories.

Comparing the categories of green spaces obtained from the satellite images with the answers obtained from the questionnaire, it appears that there are no very large differences in the composition of the green infrastructure in the small cities analyzed. 78,1% of respondents mentioned private gardens as the main category of green space. In the mapping process, it was not possible to identify private gardens, due to poor resolution of satellite images, but as cities where individual residents predominate, private gardens are real green areas.

This study highlights the necessity regarding the development of green spaces in these small towns, given that there are currently no quantifiable data on how these green areas are used or whether there is equity in terms of access to quality green spaces. Small towns face a lack of information on green spaces and lack of data on their connectivity and multifunctionality.

*Keywords: green spaces, small towns, distribution, population perception, satellite images*

# Getting to the bottom of bottom-up planning strategies: The reformation of the Hellenic Defense Factory SA in Hymettus

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## Extended abstract

The Hellenic Defense Factory SA operates in an enclosed lot of 1.550 acres in the Municipality of Dafni - Hymettus, 4km South of the center of Athens. It was recently announced that in the governments' immediate agenda is the future relocation of the factory facilities, in order to redesign and reuse the remaining area. The future use focuses mainly on the creation a governmental center nearby downtown Athens, aiming to relocate several ministries' services from scattered buildings in Athens, to an organized Administrative Park. The Hellenic Defense Factory SA has been operating in these facilities since 1874. At that time the area was barely inhabited and was considered a suburb of the city of Athens. During the first half of the 20<sup>th</sup> century the city expanded towards its adjacent areas and the factory came to be surrounded by a dense urban fabric. The fenced lot is now located in Hymettus municipal district, which after 2011 is a part of the Dafni – Hymettus Municipality. The fear of a deadly accident due to the flammable materials being processed in the middle of a residential area, in addition to the lack of free public spaces in the city, have created a strong public demand of tearing down the walls of the factory and replacing it with a public park, for several decades now. The total Municipal area is 2.350 acres, 1.000 of which is the former Hymettus Municipality. The Hellenic Defense Factory SA covers the 15% of Hymettus municipal district. Given the fact that the two municipal units differ vividly from one another, due to building morphology differences as well as the barrier set between them by the main road network, it is safe to say that the impact of the existence of the factory currently effects mainly Hymettus district. However, on a second level, the future uses of the area may influence a much wider area.

After the governmental statements for the exploitation of the area towards a newly introduced direction, far from prior local demands, serious questions are raised: How detailed was the information published and to what level did it reach the interested parties? Was the public consultation requested? If yes, was it integrated into the reformation strategy? If so, how and to what level? To answer these questions, one must reach out to the actual users of the city and share their individual experience on the subject. The aim of this paper is to document and evaluate the amount of information that reached the residents of the Municipality, as well as their demands and expectations for the area, after the factory removal. The results will then be compared to the actual strategic plan according to the government statements and relevant legislative provisions. The information was collected via questionnaires, retrieval of municipal assembly proceedings, citizen movements' requests and interviews with both local organizations and administrative representatives.

The results identify serious weaknesses in the communication process between authorities and users: There seems to be absence of thorough documentation and prioritization of community needs and demands. In addition, the majority of the nearby residents do not feel included in the decision-making process nor are aware of a detailed plan for the area. Finally, the users appear discouraged or not willing to contribute to the planning process as they feel that they cannot impact the outcome. Such communication difficulties are a threat to the planning strategy and integration and jeopardize future city resilience.

*Keywords: participatory planning; urban integration; Hellenistic Defense Factory SA; bottom-up strategies, public consultation*

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# The difficult journey between governance and governance in the urban ecosystem. The Movement for the Caracol da Penha Garden as a case study

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## Extended abstract

The rapid generalization of a community based on sharing, collaboration, co-decision making, and co-operation has given greater visibility to a range of activities in a paradigmatic transition toward what is known as the fourth sector.

Active citizenship and the forms it has adopted fall into this new category. The renewed dynamism of civil society, led through properly organized citizen groups, but also inorganic and conjunctural social movements, can be interpreted in several ways, but perhaps that which fits best is the increasing de-legitimization of formal power or, at least, the need to deepen the democratic system in an urban context.

All these urban transformation mechanisms become condensed in the transfer from a context of government, i.e., a formal system of articulation of actors in the public sphere, to a context of governance, i.e., an informal system, with variable geometry both in terms of scale and the nature of the actors involved. This is oftentimes a troubled process because it means an effective redistribution of power, something that is almost never peaceful or easy.

The discussion of the emergence of these new values is reflected in the narrative for the formation of, and the activity carried out by, the “Caracol da Penha” movement. The related challenge was based around a demand that a green space be built instead of a car park, that is equipped to serve the locals but also the entire city of Lisbon, Portugal.

Popular mobilization, the reversal of the decision by Lisbon City Council, the use of Participatory Budget mechanisms, the ability to produce and organize information and communicate it, makes this case emblematic for many other participatory processes, and appears to have been a learning ground for all actors involved.

It is important to underline that this movement is organic, spontaneous and acts outside any political party context. The initial idea was to break away with the achievement of its main goal - the construction of the Caracol da Penha Garden - but then it ended up also taking on the challenge of organizing the collaborative process to define a programme for the Garden. Finally, the temptation to extend the experience gained was so strong that the non-governmental organization Caracol POP Associação was formed, which gives support to other initiatives aimed at urban issues of the same nature.

This process of reversing a unilateral decision already taken by a local power, thanks to the structured and dynamic mobilization of the local community, makes it possible to see in practice how the change of values in the power system is tending towards a more collaborative democracy in an urban context.

*Keywords: Active citizenship; public participation; public spaces; urban policies; urban governance*

# Urban sustainability and resilience: a social research in Thessaloniki

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## Extended abstract

This paper presents the results of a social survey conducted in the metropolitan Thessaloniki area, in order to investigate the views of the residents on issues related to the urban environment, climate change, energy crisis and extreme phenomena at three levels: at their home, at their Neighborhood and at their City in general.

At the UN General Assembly in 2015, all member states agreed on seventeen Sustainable Development Goals, eleven of which refer to the pursuit of Sustainable Cities.

If cities are responsible for 70% of energy consumption and 75% of greenhouse gas emissions, but at the same time there are problems with adequate, safe and affordable housing as well as services and necessary facilities, it becomes necessary and imperative to make cities Sustainable and resilient, both for the present and for the challenges of the future.

Although the recent COP26 pointed out the problems of disagreement on common goals by all the countries, the messages that were heard very loudly, made it clear that there is not much wiggle room left - from the high government policy makers all the way down to us, the plain citizens.

The conjecture of the effects of climate change, the energy crisis (which results in a direct economic crisis for the people) and the consequences of the Covid-19 pandemic, create a special reference point from which to explore the views of residents in relation to the present and the future of the urban environment.

It is therefore important to explore and present the views of plain people on these issues, both to determine their level of information and interest, as well as to present their opinions and needs on them.

The research was conducted from October 2021 to January 2022, and one thousand seventy-two (1072) questionnaires were collected, which covered the entire area of metropolitan Thessaloniki.

(Important note: The research was conducted during the period of measures against the Covid-19 pandemic as well as during increased energy costs and some extreme phenomena).

*Keywords: sustainability, urban environment, climate change, energy crisis, Thessaloniki*

## Bhopal, is it a water shaped historic city?

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### Extended Abstract

Time in history has proven the fact that water bodies do play an important role in human civilizations. Hence, we stem from cave habitations near rivers, river valley civilizations and continue our existence around water. It is predicted the next biggest survival crisis shall revolve around water. The approach this paper takes is by acknowledging all water resources big or small to be a part of the heritage. The paper shall make observations related to Bhopal, the city that adapted itself around these water bodies both in its spatial forms and built human environments.

Urbanization reflects how humans have altered the hydrological system. The existence of a source of water near any city is an important aspect around which the city reverberates. Water bodies can be natural or manmade. Many times, it becomes difficult to differentiate between them as through generations they become a part of our culture. Through the example of Bhopal, we explore these aspects.

The history of Bhopal travels through the time, from the 11th century and still is a thriving city. Through the study of water bodies, we trace the evolution of the city by tracing the development through time. The time periods shall tell us the tale of water being respected, transformed, abused, and lost in the process. The story of land adaptation and water goes hand in hand. Now is the opportunity where we need to understand the process of adaptation translating itself to the traditions and the local culture of the place.

The methodology uses periodic maps and satellite imagery to trace the evolution. The references from the related text are used to validate the understanding acquired, necessary for developing the political and social changes observed in the cityscape. There are many other small water bodies like the lakes and ponds, which were made and erased in the city. This paper advocates the study of the water shaping the city. This paper addresses the question of how water and its use shaped the spatial development of the city that has happened in the last century.

*Keywords: water; urban evolution; heritage; Bhopal; sustainable development*

# Strategic planning as a resilient urban tool in the Balkans

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## Extended abstract

The aim of the proposed research is the registration and evaluation of contemporary urban policies in the Balkans, through specific examples, within European perspectives of strategic planning in the area of SE Europe.

Urban space in the Balkans has undergone significant transformations throughout the last decades; the accumulation of different ethnic and national minorities and the lack of continuity between the historical past and the modern present affected the image and identity of urban centers. Furthermore, the transition process from a socialist to a market driven socioeconomic system with considerable consequences in urban planning. In that case, urban resilience could be perceived as the ongoing transitioning process of Balkan centers, in an attempt to define their urban identity, in local and regional level. Under that framework, the process of adopting the EU features should comply with the particular needs and priorities of the region.

Regarding the reference examples (Pristina, Sofia, Bucharest), the capitals are approached, analyzed and compared through an empirical research. Methodology comprises of bibliography review, as well as fieldwork, including mapping and tracking of areas of interest, policy identification and data registration through short questionnaires and interviews with relevant stakeholders that are involved in Urban Planning & Development in reference cities (academia, private and non-profit sector, international organizations, administrative departments, public institutions, policy sectors, citizens). The capital of Kosovo, a western Balkan center, is an example of a city in transition due to socio-political transformations and conflicts; it presents a contradicting urban image based on complex planning regulations. Likewise, Sofia and Bucharest, the capitals of Bulgaria and Romania, are contemporary Balkan centers that have undergone a series of changes, throughout socialist and post socialist era, evident in their urban pattern and image.

A common strategic goal is to achieve sustainable development through urban networks and regional cooperation in the context of strategic planning. It is obvious that urban resilience relies on urban networking and participatory planning through EU urban programs and (inter)regional synergies. Place marketing and city branding policies are among measures to be taken towards urban regeneration and sustainability. It remains to be seen whether there are perspectives towards a coherent strategic plan, while reinforcing local identity, in the Balkans.

*Keywords: urban policies, city image, urban resilience, strategic planning, Balkans*

# SDG localization: a bridge to livable and healthy public spaces?

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## **Extended abstract**

The global scale of UN Sustainable Development Goal (SDG) discussions and narrative consensus-building has involved primarily national-level actors. However, cities must contend with the ground-level impacts of sustainability crises in a variety of ways, from natural threats like flooding and sea level rise to social concerns like forced migration and economic precarity. Despite the relevance of the SDGs to urban policy and planning, cities have generally been slow to explicitly incorporate SDG language into plans and policies for public spaces. Those with the resources to pursue SDG ‘localization’ are accumulating experiences that will shape the terms of knowledge and ‘best practice’ dissemination for less-resourced cities following suit. This article contributes to a growing discourse about the political dynamics of SDG localization by examining the role of cities in the global sustainability agenda, the normative coercion of SDG ‘progress’ measurement, and challenges and opportunities for cities embracing the SDGs as a guiding vision for development.

Since the introduction of the SDGs in 2015, there has been enough action on implementation to offer preliminary reflections on best practices. One sphere is localization – the interpretation and implementation of SDGs by cities and other subnational jurisdictions. SDG localization presents opportunities for city governments to orient long-term urban plans around a comprehensive set of sustainability goals, targets, and indicators. Localization also calls on governments to deploy capacities that they may not possess and to engage an array of stakeholders in often unprecedented ways. Meeting these challenges and opportunities can help local governments achieve SDG targets but requires vision and commitment.

Cities are at the forefront of SDG implementation in facing the immediate challenges of climate change and other global crises. Advanced technologies and access to data have given cities sharper decisionmaking tools, but the wide array of SDG targets and limited governance capacities force cities to prioritize policy efforts for the development of public spaces and other urban issues. Constraints include limited political power in national contexts, insufficient institutional and fiscal capacity, and absence of cross-agency cooperation and integration. Cities also face difficult decisions about whether and how to participate in multi-stakeholder and international partnerships. Given these constraints, variability in SDG localization may be expected, with lagging performance from resource-constrained cities and those in states with repressive politics and centralized administrative systems.

Implementation strategies and aspirational guidance around SDG localization have been slow to emerge. In response, the UN Sustainable Development Solutions Network outlines implementation steps for cities including democratic participation structures and plans for resourcing, partnerships, and monitoring. Extending research by Hartley (2019a) on SDG localization, this article seeks to contribute further to this conversation by proposing recommendations for cities to build smart capacity, broaden the concept of sustainability knowledge, and foster the development of a global community through strategic collaborations and networking.

*Keywords: SDGs; SDG localization; sustainability; global policy; public policy; urban planning*

# The ex ante evaluation methodology: the Corradini case study in the industrial area of east Naples

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## Extended abstract

The research aims to outline a verifiable and repeatable methodological approach applicable in regeneration projects of the brownfields, through design experimentations concerning new possible uses of the demolition waste.

The research aims to define a protocol for brownfield sites that holds together the potential value of new freed soils (empty spaces that can be returned to the city) and the request for new specific uses to allocate the future life cycles of the brownfields.

The paper will describe the results of the research work and an investigation on the scientific background of the research concerning the urban regeneration topic, starting from the analysis of the convergences of three thematic fields, interpreted as paradigms of the contemporary urban project: the care of the drosscape, the circular economy and the concept of urban mining.

The research aims to produce a protocol that can pre-determine (ex ante evaluation methodology) the material flows resulting from demolition. Through a management based on BIM tools, the protocol standardizes the production process of C&D waste flows to control and plan their disposal and/or recycling on site. The protocol is updated for the Italian legislation and harmonized with the guidelines of the European legislation. The information obtained from the application of the methodology feeds a knowledge system necessary to structure the labeling of C&D products in view of their possible reuse or recycling. Analyzing a case study, the brownfield named Corradini, a disused factory located in the eastern area of Naples. The research experimentally developed the methodology applied to the protocol, finalizing the study to the quantization and management of waste streams, to their pre-characterization, assigning a CER code, and to the planning of material flows towards the reuse, recycling or landfill supply chains. The research results are simulative and require further analytical and experimental validation on the case study.

The ex ante evaluation methodology is designed for great-scale urban regeneration projects, where there are many volumes to be demolished and the environmental and economic costs of demolition are high and justify the activation of alternative procedures for the recovery and recycling of C&D waste on site.

The research is focused on the urban regeneration project as a privileged field of experimentation because it includes a heterogeneous set of activities that allows you to test the compatibility of the protocol on different building typology and to hypothesize a direct re-entry into the building cycle of disused materials in the same construction site. Above all, the study on the selective recovery of great volumes allows to test the advantages of an analytical knowledge process structured ex ante. The ex ante evaluation methodology is aimed at creating an on-site supply chain useful for developing a wide range of activities: construction works aimed at recovery projects, ex-novo projects, reconfigurations of open spaces such as soil modeling projects, creations of green spaces and new traffic infrastructures.

*Keywords: Ex-ante evaluation; urban regeneration project; BIM-Based protocol; C&D waste; brownfields*

# **The implementation of sustainable urban development strategies in the 2014-2020 programming period in Greece. Problems and prospects for the 2021-2027 programming period**

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## **Extended abstract**

For more than a decade the Place Based Approach has been adopted as a main policy option for the implementation of the European Cohesion Policy Programs. The main idea is to focus on a specific place and try to implement a holistic development strategy that will simultaneously provide resources for different kinds of investments and projects which are considered critical for the development of the place. The most common type of place using this development logic, for many reasons, is the city and the most common type of strategy is the Sustainable Urban Development Strategy. To give more concentration on the Place Based Approach, the European Cohesion Policy's Regulations for the 2014-2020 Programming Period required that 6% of the ERDF Funds in each country should be provided for Sustainable Urban Development Strategies. For the new Programming Period 2021-2027 the funds for Sustainable Urban Development Strategies should be 8% of the total ERDF funds in each country.

Having these in mind the paper analyzes the implementation progress of Sustainable Urban Development Strategies in Greece, in the 2014-2020 programming period. The paper tries to highlight problems that have occurred during the implementation of relevant strategies and the thematic orientation of the projects involved. The paper also points to good practices that could be further utilized in the new programming period.

One problem is the lack of stakeholders involvement in the preparation and the implementation of the strategies. In many cases Municipal Authorities believe that they are the only competent body to plan an Urban Development Strategy, but this way of thinking is narrow and ends up in Strategies that are not Integrated or Holistic at all.

Another problem is that most cities do not have an actual Urban Development Strategy and prepare one just for the absorption of the specific funds, that are a small proportion of the total funds that in the end are directed to urban areas through other programs. This results to fragmented interventions and not to an integrated outcome.

Of course, in some cases the implemented Sustainable Urban Development Strategies provide sufficient funding for the solution of urban problems and the regeneration of cities, or at least the part of a city that the selected projects are focused on.

The main outcome of the paper is that Sustainable Urban Development Strategies, in the new Programming Period 2021-2027, must be prepared by Municipal Authorities with the involvement of all stakeholders in a "quadruple helix" way of thinking. Also, in the implementation phase stakeholders involvement is crucial, but each one must have an active role in some kind of projects. Else they will not be interested in participating in the strategy.

*Keywords: Sustainable Urban Development Projects, Place – Based Approach, Cohesion Policy, Greece*

# Urban Sprawl and Its Evolution in the Capital City of Jammu, India (1974 to 2020)

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## Extended Abstract

The purpose of this study is to examine the urban sprawl and its evolution in the capital city of Jammu. The satellite images of panchromatic Corona (2 November 1974), ASTER (26 September 2002) and Sentinel (7 May 2020) have been used to analyse land use and land cover (LULC) and urban change detection. There is attempted to quantify percentage and hectares of land use and land cover (LULC) between the period 1974 and 2020. The rapid increases in built-up area expansion led to dramatic changes in land use and land cover (LULC). The built-up area has been more than quintupled from (6.3%) 1,925 hectares in 1974 to (34.3%) 10,546 hectares in 2020. There is expected that large area of non-built features is going to be converted into built-up area in the upcoming future. The uncontrolled development has already been encroached immediate surroundings of municipal boundary. The urban demography, urban growth and expansion, class size towns, and urban agglomeration (UA) have also been discussed to understand the spatio-temporal dynamics of urban sprawl. Jammu city is the second largest urban centre and have urban agglomeration with a population of 657,314 in the union territory of Jammu and Kashmir (J&K). This city is one the fastest growing urban centres of India. It is experiencing large number of urban migrations, natural increasing of population and urbanization. It was urbanised 10.7 % in 1921, which increased significantly to 50 % in 2011. It is also expected that it will be urbanised 64.5 % until 2031. There have been seen overwhelming changes in the urban growth and spatial expansion of Jammu city. The analysis depicts that urban sprawl is mainly caused due to rapid increasing of urban population, urban migration, industrialisation, commercialisation and being an administrative centre. Moreover, Housing and Urban Development Department (HUDD), Jammu Municipal Corporation (JMC) and Jammu Development Authority (DDA) have failed to identify and address the urban problems. There is not seen any corporation and coordination in executing developmental works and plans. There is supposed to be a strong institutional framework for urban planning, urban infrastructure and land management. In order to have sustainable development, there is needed a holistic policy pertaining to urbanisation and urban sprawl in this city.

*Keywords: Urban Sprawl; Urban Population; Land Use and Land Cover (LULC); Urban Agglomeration (UA); Urban Planning; Jammu City*

# Sustainable urban tourism indicators. The Town of the Corfu Island in Greece

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## Extended Abstract

In recent decades, the development of tourism worldwide has been rapid. Particularly regions offering summer holidays have developed to a large extent, but also many cities became popular tourist destinations, showing phenomena of overtourism on seasonal basis. Typical cases in Europe are Venice, Barcelona, Dubrovnik, Amsterdam, and many other cities. The problem becomes more critical when these cities combine many tourist attractions for travelers, such as holidays, cultural tourism, business travelers and cruise ships stop. Consequently, the cities receive extremely great number of tourists in relation to the local population and the size of the cities. Due to the increasing demand for tourism, tourist infrastructure has developed to a very large extent, such as hotel accommodation, restaurants, bars, nightclubs, while at the same time the basic infrastructure of cities has not been developed to a similar extent. This problem is becoming more intense in island regions, where very large number of tourists are concentrated in a very small space, without the possibility of spreading the demand to neighboring areas. Such a case in Greece is the island of Corfu (41,9 Km<sup>2</sup>) and especially the urban areas of Corfu, which has many of the characteristics of overtourism. Overtourism has not only an impact on the unpleasant experience for residents and visitors, but also on the burden on the infrastructure of the city and the environment in general. The World Tourism Organization has developed a list of sustainability indicators in tourism to measure the effects of tourism development, but their implementation at the city level is small. In cities, on the contrary, many studies focus on the impact of tourist flows on monuments and cultural sites, examining, among other things, the issue of sustainability.

The present paper presents the main indicators concerning the impact of tourism in various areas. In particular are measured: (1) Socio-cultural Tourism Indicators, which measure the number of tourists and overnight stays in relation to the local population and the area of the Island. (2) Economic tourism Indicators, which measure the impact on tourism receipts, employment, entrepreneurship and the importance of tourism for the city in general. (3) Environmental indicators, where the consumption of water, energy, waste generation is recorded. (4) Pressure on Monuments and historical sites by measuring the arrivals of visitors per day and by square meter. (5) Pressure on transportation infrastructure and services by calculating the tourist arrivals by plane, ships, yachts, and cruise ships. The results of the measurements showed that in the last decades up to 2019, before the COVID-19 era, all indicators showed significant negative growth. The decrease in tourist traffic, due to COVID-19, in the years 2020 and 2021, will not prevent the further negative increase of the indicators in the next years.

*Keywords: City tourism; Overtourism; Sustainable Tourism indicators; Corfu; Greece*

# Resilient Cities and Sustainable development - The 100RC Network

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## Extended abstract

Cities are complex and adaptive systems, hubs of resource consumption, and places of innovation. They are the core of economic and social growth. It is estimated that 55 percent of the world's population lives in them, a rate that is expected to rise to 68 percent by 2050. Intense urbanization, urban complexity, the number and the severity of natural and man-made disasters, force cities to face their vulnerabilities head-on and increase the well-being and security of their inhabitants and infrastructure. Resilience has become an important goal for cities as it helps them to be able to respond to disruptions, improve their skills, perform basic functions, and provide services both daily and in times of crisis. Many scholars believe that resilience is a way of thinking and acting, whereas others believe that as resiliency increases, urban systems become sustainable. Resilience is the preferred way of thinking to achieve sustainability and in some cases, resilience is seen as a precondition for sustainable urban development. Furthermore, resilience is a process that allows each city to develop a strategic plan for response, adaptation, and development in unprecedented conditions and ongoing ecosystem transformations. In terms of sustainability, researchers argue that a resilient system in a "desirable" state has a greater ability to continue to provide goods and services that support quality of life while suffering from a variety of disorders.

In the context of urban development, the Rockefeller Foundation launched the Network of 100 Resilient Cities, which is consisted of cities of different size, history, culture, needs, and levels of development from all over the world, and provides its member-cities with knowledge and best practices to enhance robustness, flexibility, and develop resilience.

An extensive study was conducted in this direction by using a combined methodological approach. First of all, it used the Network of 100 Resilient Cities as a case study, as it is one of the first global urban initiatives to use a consistent set of tools, advocates, and resources in so many different cities. It is also the first of its kind to have the explicit mission of building resilience at the city level. Secondly, a content analysis was applied. This phase used: a) the City's Resilience Framework and b) each city's Strategic Resilience Plans. Finally, a comparative analysis of the characteristics of each case was applied, with the analysis and synthesis of the similarities, the differences between cases of cities that share a common goal or vision. A comparison of the Strategic Plans of the 100 RC demonstrated that the implementation of the City's strategies contributes to the planning of infrastructure to improve the natural and structured environment, enhances resilience, creates conditions for economic development, improves resources and systems for greater efficiency, accountability, and transparency in the community.

*Keywords: cities; resilience; urban sustainable development; Sustainability; 100 Resilient Cities*

# The social impact of the Ellinikon renovation project: the Athenians citizen's perception

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## Extended abstract

The concept of sustainable development-in economic, environmental, and social terms- is obtaining increasingly popularity in construction industry. Although many studies have focused on economic and environmental performance of the construction projects, little attention was given to their social performance. Social performance has been perceived as critical aspect for sustainable development and project success. In Greece, the social dimension of the urban development projects is systematically and over time underestimated from the urban planning process relative to economic and environmental one.

This paper aims to estimate the Athenian citizen's perception of the social impact of the Ellinikon-urban development project. Social Impact Assessment (SIA) is significant. It helps planners, project promoters, the impacted population, and decision-makers to evaluate and foresee the likely social effects on the human population and communities of proposed project development. Due to the complex nature of the social impact concept, the scope of the inquiry was based on different municipalities of Athens periphery case study areas to enable a more compelling and robust interpretation of the information collected. A questionnaire containing 49 items-investigated the social aspects of safety and health, social impacts, social conflicts, and others was administered to approximately 1200 citizens in these areas. This questionnaire was based on SIA and EIA (Environmental Impact assessment) studies and the new listing of indicative social impacts created from Frank Vanclay, considering the specific national and local research context.

Overall, our results reveal the significance of the citizen's perception of the social performance-positive or negative- of construction projects which affects the approval and their successful completion so far. More seriously, results emerge the grave concern of the participants about the social performance of the Ellinikon-urban development project. This concern was diversified under the influence of variables such as the proximity with the construction project mentioned earlier, the educational level, the gender, and others. Although, the respondents were optimistic regarding the upcoming positive economic impact of the project - not only for the neighbouring municipalities but also for the whole of Athens and its periphery- at the same time they seemed very scepticism about the impact equity and expressed their awareness about the fairness in the distribution of impacts-positive or harmful- between various groups in the community or differentiation in level of access to specific resources. Further, the respondents emphasized the lack of participatory community involvement in the planning processes of the Ellinikon urban project.

The importance of equally accessible open urban spaces was revealed widely after Covid 19 pandemic. The lack of open urban spaces - equally accessible to all urban citizens - was one of the most critical factors that are influenced the vulnerability of cities to covid 19. Therefore, the social impacts estimation of the big urban renovation projects seems very important as it relates to the sustainable management of the open urban spaces and their equal accessibility from the urban citizens.

*Keywords: urban renovation projects; social sustainability; social impacts; impact assessment; Ellinikon urban project; Athens*

## Welfare: Towards happy and safe cities

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### Extended abstract

A triptych of Justice, Welfare and Healing might constitute a tripod, on which a happy city could be designed upon. A happy city should provide citizens with a sense of autonomy, independence, self-acceptance, positivity towards others and the idea of meaning and purpose. Montgomery professes that "trust is the cornerstone on which cities are developing and prospering. Indeed, he argues, cities are planning our lives, and if we can save our city, we will save ourselves. The modernists' visions of dividing the urban space into zones or the scattered and centrifugal city that favors life in the suburbs, he argues, are not the solution to a happy and therefore spiritually healthy life.

At the end of the day, the aforementioned is not a mere triptych, but a triple connection under the umbrella of the general idea of welfare, constituting a balance between feeling secure, having opportunities and being-becoming well.

In the heart of welfare, is safety, the first priority of Plato's *Ideal Society*. Achieving a welfare state is ultimately an ongoing design process that continuously evaluates the current situations, and envisions progress putting priorities in everyday life.

However, no matter how well-designed a city is, an epidemic will test infrastructure and welfare, pushing urban day-to-day balances to their limits. When the health of society as a whole is at stake, cities as places of commons, socialization and interaction are no longer safe. Plans are revoked. In the face of the urgency of not getting sick and staying alive, all priorities become secondary. Epidemics of all kinds prove that the state of health in human societies is an unpredictable factor. The vulnerability and unpredictability of health and therefore of human life, makes us turn our attention to the essence of life, which is sought away from the stressful daily life, which is dedicated to the speed and "strangulation" of free time.

Sustainability is put on the table and reexamined. Inspired by ancient Greeks, we retrieve that the city as a place of commons was actually the key to *eudaimonia*, difficult to achieve in today's neurotic urban structures. After analyzing and taking position around the priority issue of security and well-being in urban design, we will present some architectural examples that accompany this reasoning and set the ground for a happy and safe city.

*Keywords: welfare; safety; progress; happy city; sustainability*

# Design thinking, nudges and green economy: towards an integrated strategy for sustainable urban development

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## Extended abstract

Cities are spatial concentrations of socioeconomic activity and human interaction. Nowadays, one of the biggest challenges of cities is to develop policy guidelines around an integrated strategy for sustainable urban development. Thirty years after the Rio'92 UN Conference on the Environment and Development (UNCED), the debate on sustainability continues to rise in the international arena (UN Urban Agenda, SDG 11 ‘Sustainable Cities and Communities’) in the most diverse scientific branches, especially those related to socioeconomic issues, policy and territorial systems, both inseparable from the dimensions of urban life: human behavior, social relations, economic development and land management.

Starting from this premise, the present paper was designed to explore the challenges of sustainability in urban dimensions and aim to discuss future perspectives of an integrated strategy for urban policy design through a transdisciplinary literature review about design thinking, nudges (behavioral economics) and green economy. Design thinking provides a set of practices and processes that has been present in business studies for a significant amount of time; it is a method valuing creativity and using transversality to find innovative solutions (new approach to problem solving). Behavioral economics, through a nudging approach, offers us a new policy perspective with the potential for low-cost and broad application to significantly alter people's behavior and improve the effectiveness of sustainable urban planning without the need of restrictive regulation. Green economy provides for policies and measures in support of ecological and climate transition of the society ensuring at the same time sound local economic growth and social inclusion. The discussion also led us to consider the concept of ‘green nudges’, which are a subset of behavioral economics that aims to encourage sustainable behaviors by citizens and consumers.

The association of concepts and methods from these fields of knowledge reinforces synergies between the core elements of design thinking and nudging theory pushed by the instruments of green economy, which support sustainable, livable and healthy urban planning. The combination of these different approaches to analytical processes and data collection allow to identify urban challenges and opportunities unknown to traditional urban planning and provide instruments such as soft and non-dominant policies being able to integrate urban planning tools.

Thus, the research results suggests a framework for an integrated strategy based on design thinking, nudges and green economy, and include the elaboration of a summary diagram that illustrates ways to deal with these concepts and methodologies simultaneously, starting from goal-setting the urban challenges to ending at the implementation, testing and monitoring of possible solutions. To conclude, we present an approach to operate in the adaptation or mitigation of urban wicked problems such as sustainability, equality and quality of life.

*Keywords: design thinking; nudge theory; green economy; sustainable urban development*

## Redeveloping military brownfields: a complex process

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### Extended abstract

Redeveloping former military sites and disposing them for civilian use is a quite complex and multidisciplinary process. It is a planning challenge, differing from ordinary changes of use because of the unusually wide range of interested stakeholders and their expectations. Military brownfields are made up of large and small sites, urban or remote, and can include an extraordinary range of functional specialist buildings that can be recognized as heritage as they are a specific feature of wars, conflicts, and their aftermaths. As urban sites are a particular part of the city, that for a long time has been excluded from the active life of the city, it is considered necessary to adopt new strategies for their re-appropriation. Although the relevant existing literature is not considered to be very extensive, there are some particularly enlightening reports.

The European Union launched projects and programs related to the enhancement, reuse, and regeneration of former military sites. One of this was the “2015–2018 MAPS-Military Assets as Public Spaces” initiative that has involved mostly former military barracks across nine European cities to provide feasible solutions aimed at the preservation and enhancement of tangible and intangible values. This program appears to be a remarkable reference that extracted key drivers for innovative reuses integrating collaborative practices such as: the involvement of local and state stakeholders, both public and private, to identify feasible reuse solutions of buildings and open spaces; the temporary reuse to experiment unexpected short-term and cheap functions and activities to enable the reuse in the medium and long term and the identification of former military barracks’ tangible and intangible values.

Although several authors have suggested that collaborative planning processes are crucial for the success of military real estate conversion, there are others arguing that collaboration was not able to solve the demanding urban challenges related to the conversion of these areas and that these processes had only a symbolic importance and not a significant contribution. The reason they cite is that collaborative approaches have generally been paying limited attention to the physical, morphological, and typological dimensions of urban issues, concentrating more on governance and symbolic and discursive aspects. Suggestions are made for taking national policy and local variables and solutions into further consideration (e.g. the quality and design of the physical environment, the policy tools available in the potentially conflictual institutional setting of military base conversion) rather than considering the collaboration with the local community alone.

On the occasion of the endeavor that has begun for the redevelopment of former military sites in the Metropolitan area of Thessaloniki, the relevant reports so far are taken into account in order to create a model for comparing and evaluating this regeneration effort

*Keywords: military brownfields; military heritage; urban redevelopment; collaborative planning; Thessaloniki*

# Applying social sustainability to urban planning practice using the Place Standard Tool: Measurement, findings, and guidance

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## Extended abstract

Integrating social sustainability into urban planning can contribute to shaping more equitable, inclusive, and livable places. We present insights from exploring how urban social sustainability can be applied to support urban governance and urban planning processes. Academic researchers, municipal coordinators, and municipal planners have collaborated for the purposes of the project SOSLOKAL “Social sustainability as a new driving force in local community development”. We tested the Place Standard Tool for measuring social sustainability in two districts in Kristiansand and Stavanger in Norway. We used the Place Standard Tool as a basis for surveys as well as focus groups with residents. Knowledge produced will contribute to plans for new urban development and upgrading in the districts. Based on this application, we offer theoretical and methodological guidance for future assessment of urban social sustainability with the Place Standard Tool.

The Place Standard Tool is a straightforward, useful tool for assessing urban social sustainability. The physical and social factors evaluated with the tool correspond to a series of elements of urban social sustainability: social infrastructure, physical infrastructure and transport, public spaces, local environmental quality, political participation, social interaction, security and safety, and identity and belonging. Residents’ evaluations of these factors shed light on equitable access and opportunity and social cohesion, which are basic dimensions of urban social sustainability, and on whether an area enables residents to cover their needs, which is a key goal of urban sustainability in general. The tool can be used to obtain both quantitative and qualitative input. A comparative use of the tool – between different districts, cities as well as population groups – makes this input more meaningful. Using the tool for conducting surveys provides an overall general assessment of physical and social factors and highlights possible strengths and weaknesses. Using the tool for workshops (e.g. focus groups) provides in-depth, nuanced understanding of each factor and how each factor is embedded into the local context. Moreover, workshops can mobilize residents to participate in decisions for future development and offer concrete suggestions on how to improve physical and social factors to better meet the needs of specific groups.

Naturally, every tool has limitations, and the Place Standard Tool cannot on its own offer a complete assessment of urban social sustainability. It is recommended that evaluations with the Place Standard Tool are supplemented by objectively measured indicators (e.g. neighborhood deprivation indices, access to green spaces and facilities, crime rates) and other subjective indicators (e.g. neighborhood satisfaction, subjective well-being). Another critical point that needs particular attention is how the results of the Place Standard Tool are interpreted, especially considering links to social sustainability at a city or global scale as well as links to environmental considerations of sustainability.

*Keywords: social sustainability; urban planning; Place Standard Tool; neighborhood; cities*

# Regional Policy Reforms: The Road to Integrated Urban Development Plans and the Future of European Cities

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## Extended abstract

Europe is considered one of the most urbanized continents, with 75% of Europeans living in or around urban areas, with estimates of this percentage rising in the upcoming years. In recent decades, integrated urban development and consequently issues related to the economic and social sustainable development of European cities are high in the European agenda. European strategies focus on green and environmental friendly development of European cities and the progressive transformation of the local economy and society. Since the Lisbon Strategy, the local level has emerged as a level of action, shifting the level of decision-making even closer to the citizens and involving more stakeholders from different levels of government in the decision-making process, a critical application of the EU subsidiary principle. The question is about the ability of the cities to promote their development, whether this development is explained by endogenous or exogenous factors or concerns the concentration of characteristic functions of the "center". The concept of sustainable urban development is a matrix that should be de-coded in order to determine the ability of cities to design, implement and fund integrated development plans and to achieve their development through this design process. The choice to conduct a qualitative research addressed to first and second degree of local government executives, executives of Ministries and experts tries to explore the opinion and view of the target group on the notion of integrated planning, the potentials of Greek cities to implement integrated sustainable development plans taking into account the current situation and their future perspectives based on the European guidelines.

*Keywords: sustainable urban development; EU strategies; cities; integrated urban development plans*

## The changing meaning of urban open spaces through the pandemic process: workshop experiences

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### Extended abstract

Covid 19 epidemic has been effective since the beginning of 2020 and is one of the most widespread pandemics with its global spread rate and area. In the historical process, pandemics have had a substantial impact on the city and urbanization, and in this context, urban transformations have been associated with pandemics. The emergence and spread of pandemics are directly related to urban conditions under the headings of collective life, architecture and urban planning, infrastructure services, settlement, and population density.

The rapidly implemented measures for controlling the pandemic affected different parts of the society in psychological, social, physical, and economic terms at different levels, and the power-society relationship is questioned. The use of public spaces has been restricted, cultural and social life has decreased considerably due to the risk of transmission of the virus. While the pandemic has affected our lives at different layers, it has changed our perception of space, architecture, urban space, and landscape. Living in the residences located in the densely populated area in the city center and those living in the residences located on the periphery and having their common areas or gardens have experienced the quarantine process differently. The location, typology, size, open and semi-open spaces of the house have differentiated the experience.

As part of the "The Use of Indoor and Outdoor Space during the lockdown in Pandemic" research project, the concepts related to the changing use of outdoor space during the pandemic have been discussed at workshops. In the research, our aim is to determine the density of using open areas regarding various activities of people during the pandemic process and to understand the alterations made and their reasons in using the space. The use and transformation of open spaces and surroundings were examined in multiple layers through users' perceptions and relationships. In addition, we created an online workshop and survey series with undergraduate and graduate students from various design disciplines to demonstrate the transformation of space. The suggestions on open space and its surroundings' experiences and needs were discussed through the workshops. The importance of having a residential garden and balcony was emphasized during the pandemic process, and also have open areas such as parks, urban forests, open sports fields, walking track, sea/lakeside, children's gardens, children's playgrounds within walking distance was emphasized. The analysis highlighted the importance and necessity of open spaces. Additionally, workshops have looked beyond physical boundaries and reconsidered our living environments. However, we do not yet know whether Covid 19 will cause a systemic transformation in our city life.

*Keywords: urban open space; design workshop; pandemics*

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# Multidimensional space-time patterns of crime and insecurity in Porto, Portugal: contributions to preventive planning

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## Extended abstract

Cities were originally built to provide safety, but with the passing centuries they have become the hotspots of insecurity feelings and crime rates. Major planning, sustainable and quality of life agendas of today give great emphasis to urban (and human) security, and more so in recent years. Despite declining overall crime rates, certain types of hate or violence crimes have increased and can be related to several cycles of crises, including an economic recession, social and migrant upheavals and, more recently, the COVID-19 pandemic. This has brought to the fore, particularly in urban areas, question related to socio-economic exclusion and vulnerabilities, the legitimate use of space, social control, and divergences between the citizen and the state.

Although it has always been recognized that crime patterns were not random; i.e. they varied in space (but also in time), research on the Geography of Crime and Environmental Criminology only really propagated in the 1970s, with theories as CPTED, Routine Activities and Crime Pattern. Then, it became more systematized, and more focused on the micro-scale, in the new millennia, when technological developments associated to geographical information systems allowed better assessments in terms of crime georeferencing, crime pattern analysis, crime modelling and forecasting. Consequently, research has moved toward place-based approaches, where the understanding of each context is crucial, as the multidimensional characteristics of places – including socio-economic, morphological or urban design dimensions – have proven to be important predictors of the spatial distribution of crime and insecurity.

However, only a few models conceptualize “the place” as a cumulative aggregation of micro-geographical patterns and territorial specificities, when correlating with the space-time variation of crime occurrences. This research contributes precisely to this growing research, by developing a local-level multidimensional decision-support model. Devised for the city of Porto, in Portugal, whose downtown is a world heritage site, this model uses official crime registries for the last ten years, georeferenced at street segment, and crosses them with block level information concerning morphological, functional, socio-economic and perceptual variables. Using statistical and data mining tools, five different profiles, one for each dimension, is conceived, which then are crossed using Multiple Correspondence Analysis, in order to understand the spatial determinants which may contribute to explain the registered crime pattern. Theoretical postulates are proven – crime concentrates spatially and these locations have particular characteristics – and this fuels discussions not only on the importance of micro-scale studies in prevention and the promotion of quality of life, but also for ensuring resilience. Overtly spatial diagnosis are relevant, but to be translated into effective and sustainable plans of action and targeted policies, they need to co-exist with sociality, as well as multi-layer and cross-disciplinary assessments based on the smart aggregation of data.

*Keywords: geography of crime; crime mapping and modelling; insecurity; multiple correspondence analysis; preventive planning; spatial analysis; Porto*

# The “meanwhile” city: Temporary land uses and flexible planning strategies for urban crisis recovery

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## Extended abstract

As the world and city life are in a state of flux, spatial planning is struggling to adjust to emerging challenges. COVID-19 pandemic is a striking example of a contemporary challenge that changed human interactions which was reflected in cities' functionality. This health crisis that became an urban crisis brought to the forefront the dysfunctionality of our cities as well as the obsolescence of current planning practices, stressing the need for new planning tools that would enable immediate application and results.

To adapt to the “new normal” cities around the world employed a wide range of spatial planning practices that could be described as flexible, among these the temporary land uses. Temporary land uses helped cities to adjust to abrupt changes by forming ephemeral cities, based mainly on participatory and planning-by-doing practices. The sources, however, that systematically report these changes in the urban areas are few, while there are scarcely any records of the changes in the daily habits of the city inhabitants manifested as temporary land uses.

The present paper attempts to explore the notion of the temporary land uses that emerged during the pandemic and examine whether and how they can be operationalized through their known practices to enhance the city's ability to adapt to urban crises. For this purpose, a survey has been conducted to record the changes in basic aspects of city life that concerns the use of public space, mobility and urban amenities during the 2021 pandemic. The survey concerns the city of Thessaloniki the second largest city in Greece and was conducted just after the end of the 2021 lockdown imposed by the Greek government. The analysis of the results identifies the critical elements of the “meanwhile uses” and the prospect of reshaping spatial planning practices that would enhance the transformative nature of cities.

*Keywords: meanwhile city, temporary uses, land use planning, COVID19*

# Urban Strategies for a Resilient City in Africa - Beira

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## Extended abstract

Climate change is responsible for several events, including extreme temperatures. The African continent, and Mozambique in particular, despite its low contribution to greenhouse gas emissions and global warming, is one of the regions of the world that suffer most with climate change, through the increase of the number of extreme events, an increase in climate variability and consequent increase in losses from natural disasters, thus increasing socio-economic vulnerability.

Most African cities are characterized by relatively high and sometimes uncontrolled building densities, which can exacerbate hazard risk when they are in disaster-prone areas and do not incorporate sufficient hazard mitigation techniques to reduce its impact, as is the case in the city of Beira.

Beira is an important coastal city in Mozambique, which is exposed to rising sea levels and frequent cyclone events, where the mangroves that protected it from coastal erosion were cut down. Due to the significant exodus from the countryside to the city, the populations have been building in a disorderly way (informal) in vulnerable areas and without adequate infrastructure. This creates conditions for the outbreak of cholera, mosquitoes, and malaria, and the proliferation of informal subsistence commerce. This also shows the need for an urban rehabilitation strategy that promotes resilient neighborhoods that can withstand natural hazard events without suffering devastating losses and without requiring significant assistance from outside entities.

This work has as its primary objective to define strategies, clearly identifying the improvements that adopting new systems will produce and their impact, such as sustainably increasing municipal planning capacity, promoting resilient construction policies, reducing the vulnerability of buildings, protecting coastal erosion with natural and structural elements, designing and implementing flood control actions, improving the retention capacity of rainwater in heavy rainfall events, and promoting efficient drainage.

The natural climate solutions represent promising options to protect our urban spaces, like protecting and revegetating mangroves contributing to the goals of the United Nations Development Agenda for 2030, which refers to sustainable principles and the promotion of a circular economy to improve, renew, and protect the built environment. With promoting urbanism and local government strategies engaging in more proactive land-use planning and taking more responsibility to ensure that risk mitigation techniques are integrated into new urbanist design projects. Thus, we can see that strategic urban redevelopment with attention to climate change presents exciting opportunities to reduce losses related to natural hazards.

*Keywords: climate change; cities; heritage; urban integration; Beira; Mozambique*

## Achieving urban sustainability and resilience to times of crisis

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### Extended abstract

Sustainable development has appeared since 1987 with Brundtland Report "Our Common Future" and has taken shape with Agenda 21, after Rio Conference (1992), together with new needs and challenges appeared for our cities, to achieve sustainable urban development through Local Agenda 21 implementation. Afterwards, urgent physical disasters, climate change crisis and also covid-19 pandemic are occurred and all efforts converge to a progressive transformation towards low-energy, low-carbon, highly resilient and ultimately climate neutral cities, adopting decarbonisation strategies for energy, transport, buildings and even industry and agriculture until 2030 achieving circular economy taking into account options and criteria for recycling, production of biofuels and incineration, low-carbon mobility, use of renewable energy, energy-efficient technologies, intelligent electric grid systems for city facilities, urban form and green spaces using techniques to reduce and prevent sprawl, while preserving and expanding green and open spaces, mitigating the urban heat island effect, etc.. Addressing cities climate neutrality it is necessary to promote a proactive urban approach based on climate-smart policies, clear vision and strategy, cooperation, stakeholders participation, population involvement in decision-making processes, consultation with advocacy groups and organisations representing business and finally identifying sustainable funding sources for climate and energy projects, such as the recovery and resilience fund and market regulation. In the same time the pandemic period new changes have occurred with the loss of cities social public space and collective urban life, so cities need each other and also need to hear citizens voice, prioritizing prevention, to reduce inequalities, and take urgent climate change adaptation measures. Sustainable spatial planning finds itself at the heart of urban adaptation and mitigation measures, as also urban resilience for city's social, economic and natural systems with regard to climate and energy. Cities can take again a real active role as climate-smart cities in shaping their future, based on a wise city governments, supporting local production, prioritizing education and culture, planning and renovating disable regions in a green way, implementing green and blue infrastructure, taking actions that could make cities resilient and sustainable, but always on the base of public participation in the decision making process, harnessing the benefits of digital transformation and also traditional knowledge, methods and practices.

*Keywords: sustainable circular city; smart technologies, urban regeneration, climate neutral cities*

# The criteria for developing site-based tourism products based on the exploitation of existing Industrial Heritage. A Comparative analysis of certain Greek examples

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## Extended abstract

The development of new tourism products is a multidimensional process that presupposes the existence of tourism resources, but at the same time it needs to meet certain criteria. The development of new tourism products has always been and often adopted as a significant policy for growth and development.

The development of tourism products means bringing new and innovative products, experiences, and services to the market for tourists to spend money on. Nowadays the tourism ecosystem is highly diverse and complex, covering globalized and interconnected value chains. Tourism ecosystems have also been severely affected by COVID-19 crisis, since they are very sensitive to the waves of the pandemic and related measures.

This research aims to examine most significant criteria related to the development of new innovative product, and particularly products involving industrial heritage sites while taking into consideration all vulnerabilities raised for tourism during recent years. In order to specify those criteria, research attempts a thorough understanding of tourism activity, current market trends, motivations, traveler types and many more factors.

Taking into consideration statistics from the years of the pandemic, the research creates a tool based on qualitative criteria for developing new tourism products in our era.

More specifically, the criteria will be tested against several cases in Greece, and especially cases concerning site-based tourism products based on the exploitation of existing Industrial Heritage.

The research attempts to answer main questions concerning the reason for developing a tourism product, the stages of its development, the role of specific strategies and policies, the ability to seize opportunities that arise, the recognition of tourism resources, tourists' behavior to the tourism ecosystem, as it has been reconciled lately.

The comparative analysis of cases and the tool itself are not the main concern of the research, but they constitute a process for theory-testing and verification, and methodology; and as presented and in the next stage of the research, they may contribute to strategic planning for development and exploitation of industrial heritage in our days.

*Keywords: tourism, new tourism products, tourism ecosystem, industrial heritage, tourism development, tourism context, COVID-19 pandemic*

## How did Covid-19 influence Urban Planning?

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### Extended abstract

It's been about two years since the emergence of Covid-19 and the severely outcomes of it in our daily lives. Although the virus seems to affect only the health sector, it also has a significant impact on other sectors, such as urban planning. Urban Design is concerned with the physical form of urban space at the scales of an urban area or city.

The pandemic caused problems in the structure of the city. To avoid traffic jams, road shaping is required. Narrow streets will be widened, junctions will be removed, and cycle paths will replace busy urban streets. In addition, cities with a high population density require more facilities. One project aims to further improve urban green spaces that have an impact on human health. A survey was carried out, which showed that in a period of climate and public health crises, a healthy and green urban environment plays an important role for the sustainability of urban ecosystems (Life Grin,2019).

The pandemic has led to a significant drop in global tourism by early 2020. Tourism has fallen dramatically with millions of jobs at risk, disrupting the economy. The crisis is creating economic diversity in cities and regions. There is an opportunity for cities to work collectively to expand their offer in a way that can withstand repeated periods of instability as well as make a meaningful, long-term contribution to local communities. More space in the urban sphere will also create opportunities for safe street retailing and those cities that adopt innovative strategies to revive vibrant urban life will prove more attractive. COVID-19 will undoubtedly transform our local neighborhoods, most of which currently offer little or nothing to those who visit them.

In conclusion, the pandemic undoubtedly influenced the development of the urban space and new innovative ideas were introduced, with the main objective of the coexistence of the virus with urban life. More specifically in the transport sector, the form of the roads will be changed and parts of it will be converted into cycle paths to avoid overcrowding. Also, due to overpopulation, it is necessary to build more buildings (e. g. hospitals) without, of course, violating the basic building rules. Also, urban parks should be increased and upgraded because they contribute to the mental and physical health of the individual. Cities should cooperate and create innovative industries that will be able to cope with similar conditions in the future, and not rely financially on monothematic revenues (e. g. tourism).

*Keywords: Covid-19; urban planning; urban structure; urban environment; tourism*

# Residential preferences, housing affordability and building construction challenges during COVID-19 pandemics: Case study of Belgrade, Serbia

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## Extended abstract

This paper analyses the impact of COVID-19 pandemic on residential preferences, housing affordability and building construction issues that have been experienced through housing sector in Serbia, especially in the case of its capital city Belgrade. The starting research question is whether COVID-19 pandemic further potentiated the already present socio-spatial issues emerging since the beginning of post-socialist urban transition. The methods used in this study include comparative analyses of statistical data and research findings on housing in the period 1990-2020 and available relevant data and knowledge in this field from the first quarter of 2020 until today. Regarding residential preferences, some recent research showed that the situation of pandemic exacerbated already encapsulated lifestyles and fear from economic recession, as well as it prompted changes of living patterns towards longer duration of staying at home. The pandemic has further disrupted affordability of housing for all social groups, and mostly for the disadvantaged ones. Prior to 2020, the affordability of buying and renting an apartment in Serbia was already reduced to only 10% of the population, while the most expensive housing market was recorded in Belgrade. Despite the COVID-19-induced economic uncertainty, there has been a significant increase in housing estates prices, which is explained by the global decline of interest rates for housing loans, imbalance between housing supply and demand in new as well as in old housing stock, increase of the construction material prices, deficit of construction workers and delay in finishing already started projects. Moreover, the accumulation of capital through housing and especially the most exclusive residential developments is intensifying which affects the growth of unused housing stock and thus disguising the real housing needs. On the other hand, the world pandemic that nobody could predict the end of, has opened up some new opportunities in the construction sector, such as an intensified use of digital technology. The introduction of the new safety measures has caused considerable reduction of the labour employed on building sites and lack of the regular quality control, which has drastically decreased the speed of building construction. Since the building industry needed to respond quickly, the investors and the entire building teams were forced to introduce new methods in order to achieve a dynamic that could ensure the financial justification of the building works to be continued. One response to the new demand for a quicker process of the building applications was an introduction of the electronic building approvals. Introducing the e-administration allowed for “buying time” in case any other unexpected events occur, which often happens in the building industry, regardless of the pandemic.

*Keywords:* COVID-19; residential preferences; affordable housing; building construction; digital technology; Belgrade

# A new era for the location of productive activities in Greece

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## Extended abstract

Greece's fiscal adjustment programs have placed particular emphasis on spatial planning issues in relation to the location issues of productive activities. The revision of the urban planning law (Law 2508/1997) that was initially carried out in 2014 (Law 4269/2014) and was completed -in the first phase- in 2016 with the enactment of law 4447/2016 “Spatial planning, Sustainable Development and other provisions”, demonstrate the great effort made in previous years. Particularly, the reform of the spatial planning system, which was enriched with new spatial tools, such as the Special Urban Plans, gave a clear solution to complex issues faced by business activities during their location decision-making processes.

Reforms in spatial planning policy continue to this day, with equally emblematic interventions such as Law 4635/2019 “Invest in Greece” and Law 4269/2020 for the “Modernization of Spatial and Urban Planning Legislation”. There is also an increasing correlation between spatial planning policies and development planning legislation, through the introduction of Law 4864/2021 for the New Strategic Investments and Law 4872/2021 for the Just Transition Development Plan.

These reforms, gradually create a new era for the location of manufacturing and business activities in Greece. The focus is now on the promotion of organized receptors, and the concentration of manufacturing activities into Business Parks. In order to change the spatial model -which was until recently characterized by unplanned spatial development- structural changes and incentives are required in other institutional sub-systems (such as licensing, installation, operation procedures).

The purpose of this paper is to present the latest institutional developments that now have a decisive impact on the location of productive activities in Greece, but also to explore the changes needed for a more integrated spatial planning system. The analysis includes the recent modernization of the concept and content of the Special Urban Plans and Special Spatial Planning Frameworks and how they affect business location procedures, the introduction of the concept of the Industrial Park for Individual Large Units (EPMMA) and the investment licencing reform, with the abolition of the nuisance classification system and the re-classification of economic activities based on environmental and spatial criteria.

Finally, this paper presents the key challenges currently emerging for the concept of organized receptors for industrial sector activities, in the context of the currently ongoing reforms and initiatives for the new Local Spatial Plans. Green transition, climate change and disaster management seem to play an important role in the new design approaches, as they are incorporated as key elements in planning processes.

*Keywords: Organized Receptors, Business Parks, Spatial Planning Reform in Greece, Industrial Development, Sustainable Spatial Development.*

# Resilient urban planning in European cities during and after the Covid-19 pandemic

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## Extended abstract

The Covid-19 pandemic has undoubtedly an important spatial dimension, both in terms of the spread of the virus and in the health system. In this paper we examine the pandemic from the perspective of both urban analysis and urban planning. Here urban analysis focuses on issues that have priority for urban planning.

The pandemic in cities is a health problem, but it is undoubtedly linked to the other dimensions of the city: the economic, the social and the environmental. That's why we start by presenting the key characteristics of the health dimension of the pandemic in relation with its socio-economic and environmental ones. Then, we discuss the obviously important interaction of the European cities with their regional, national and European / international context. All these enable us to look at the resilience of these cities in the pandemic times. In a second stage, we examine the urban policy response to the pandemic as well as the urban interventions required for the implementation of this policy. We focus on the case of European Union and its cities with reference to the case of Greek cities. Specifically, we proceed to a summary, but comprehensive review of the different innovative solutions implemented by European cities with reference to Greek ones. The review is carried out by specific sectors of intervention (people, nature, transport, citizens participation etc.) as well as by spatial patterns that need to be strengthened and reorganize. Some examples of relevant urban actions are presented and evaluated in more depth; they have been selected from documents and other sources referred to EU Initiatives supporting innovative urban actions. These responses should be included in a broader policy approach dealing with possible future pandemics different from the current one. Also, they should consider the EU's recovery strategy after the coronavirus pandemic - which is linked (in terms of intentions / declarations) to the EU's goals for achieving a "Green" and "Digital" development. The EU temporary recovery instrument called "NextGenerationEU" (2021) stated that "post-COVID-19 Europe will be greener, more digital and more resilient". The paper discusses the conditions under which the "real results" of these programs will meet the respective ambitious goals and will not lead to less than more territorial cohesion and urban sustainability.

The main finding of the research work on which the paper is based is that the above urban actions have undoubtedly produced very positive results in the cities that implemented them first and effectively. However, the corresponding "good practices" have been adopted by a relatively small number of other cities. Moreover, in several cities which attempted such a "transfer of good practices", the results have had very limited positive effects. This is usually because innovative actions were not sufficiently linked to the "needs" of cities and to the existing urban planning priorities. Based on these findings we make proposals to improve the objectives and implementation of the urban policies and actions in European cities during and after the Covid-19 pandemic to really achieve a resilient urban planning.

*Keywords: Covid-19 pandemic; urban planning; resilient cities; European cities; Greek cities*

## Walkers on water: a methodology of trans local cooperation towards urban development driven by citizens' active participation

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### Extended abstract

While there is a constant reference of “participation” in the public discourse, city residents and Civil Society Organizations (CSOs) in Greece seem to be detached from decision-making on urban development. At the same time, even in cases that participatory processes are included, the way in which spatial development policies are drawn up and implemented is fragmented, following the spatial and managing restrictions of the local governance system. The culture of participation and inter-municipal cooperation between decision-makers could be described as weak. There seems to be a need for interdisciplinary approaches to participatory planning, where not only citizens interact with decision-makers, but also where this interaction goes beyond the local administrative boundaries. Within this context, the Walkers on Water project conducts an experiment: It invites citizens, CSOs and decision-makers to participate in the implementation of an original, inter-municipal methodological approach to urban development. The methodology is tested at an underground, Roman monument, of inter-municipal spatiality and of supra-local significance: the Athens' Hadrian Aqueduct. The aqueduct was built in 140 A.D. and is the only Roman aqueduct – of this type and size - in Europe that still carries water. It runs under eight municipalities of Attica Region with various characteristics: starting from Acharnes and the Olympic Village –an area neglected, with very low connection to the city center-, passing under several suburbs and ending up to Kolonaki (one of the most rich and central Athenian neighborhoods), the Hadrian Aqueduct inspires the vision for a network amongst different worlds. Thus, a challenging, yet fertile, condition for collaboration and interaction amongst actors with different backgrounds and everyday lives is emerging; and a promising field on bringing out issues that have to do with environment and culture in our everyday lives. Using the aqueduct as a case study, the project seeks to bring together diverse urban actors, raising awareness on the importance of active participation and collaboration for sustainable urban development, through commonly making good use of such a valuable urban resource. Our approach employs artistic, creative and non-formal processes and activities. The project is supported by EEA Grants (Active Citizens Fund).

The goals of “Walkers on Water” are to develop i) a community of active actors around the aqueduct, and the development of structured dialogue, and joint decision-making and management of the urban resource, ii) a toolkit of innovative methods (performative, educational, embodied) to attract and strengthen the stand of this community in the public debate and iii) political culture that favors and integrates bottom-up decision-making processes in urban development.

The project's broader goal is to provide "tools" in the hands of citizens, the CSOs and policy & decision makers with a vision of equal cooperation, as well as a sustainable and inclusive city.

*Keywords: civil society participation; trans local cooperation; common urban resources; Athens' Hadrian Aqueduct*

# Knowledge, Attitude and Behavior of Greek students towards SDGs. Initial findings

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## Extended abstract

The 17 Sustainability Development Goals (SDGs), which are part of the United Nations' Agenda 2030, have set the widely accepted framework for the implementation of the economic, environmental and social dimensions of sustainable development. The Many Universities worldwide have high on their agenda the implementation of the SDGs.

This paper presents the initial findings of an ongoing research about the sustainable development of the Greek Universities. Since 2011, Greek universities have signed the Sustainability Charter and are committed to implementing the principles of sustainable development in research and teaching, in governance, in the university's relations with society, as well as applying methods and practices within the university facilities.

This research explores the potential contribution of students to achieving sustainable development. This is important, because the cooperation of students is considered very important for the successful implementation of a sustainability strategy.

The authors have designed a questionnaire in order to measure the knowledge of students regarding the SDGs and also their attitude and behavior towards the SDGs. After the validation process, the questionnaire has been disseminated online to students of different academic backgrounds, who have participated anonymously. In particular, they are asked if they are aware of the 17 UN Sustainable Development Goals (SDGs). They are also asked about their behavior and attitudes towards environmental, social and economic issues related to sustainable development. Quantitative analysis provides interesting results regarding the factors that affect the responses and the correlation between the variables.

This is the first research of this kind in Greece and it can bring added value to current research worldwide.

The findings can be very useful to the Universities which are currently preparing their Sustainability Strategy, as the interpretation of the findings might show ways to encourage the active participation of students and also avoid mistakes that can cost them time and money.

*Keywords: sustainability, Sustainable Development Goals, Students, Universities*

# The city of Pylos and its dynamics in terms of sustainable tourism development

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## Extended abstract

According to the United Nations World Tourism Organization (UNWTO), the promotion of responsible, sustainable and globally accessible tourism with a view to achieving the Agenda 2030 for Sustainable Development and the applicable - on a global scale - Sustainable Development Goals (SDGs), aims to achieve a balance between the three pillars of sustainable development (economy, society, environment) in the production and implementation process of tourism activities.

The present research presents the initial findings of an ongoing field research in a mediterranean coastal area of high tourist interest that gathers the characteristics of a complex of places and landscapes with particular natural beauty and vivid historical and cultural interest. Specifically, Pylos and its wider region are being studied, with the aim of reading in depth of the current situation in order to analyze and plan the possibilities of developing tourism in harmony with the Sustainable Development Goals (SDGs) of the Agenda 2030.

This research explores, among other things, the potential contribution of local (and other) economic, social, cultural and political actors (Local Authorities, chambers, civil society, etc.) to the achievement of a Participatory Bottom-up Process to promote the principles of sustainable development. This is important, because the Participatory Multi-level and Cross-sectoral Territorial Cooperation of the stakeholders is considered an essential prerequisite for the successful Design of a Sustainability Strategy.

Also in this context, the authors have compiled a dynamic swot analysis. The extraction and synthesis of appropriate information on the advantages and disadvantages, on the threats and opportunities that characterize the wider region, through dialogue with local stakeholders, aims at the elaboration of a Sustainable Tourism Plan in accordance with the principles of the Agenda 2030. The alignment of this research with the Sustainable Development Goals (SDGs) of the Agenda 2030 gives it added value at the Mediterranean level, but also globally. The findings can be very useful for states, local authorities and public and private sector bodies that are in the process of being prepared or that are about to develop a Sustainability Strategy. Highlighting and synthesizing research findings can encourage the active participation of territorial actors and/or also help to avoid mistakes that may cost them time and money.

*Keywords: sustainable tourism development; Pylos; tourism; dynamics*

## Quality of life of residents of the suburban area of Warsaw

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### Extended Abstract

Together with its suburban zone, Warsaw has been among the fastest developing areas in Poland for many years. After 1989, it began to undergo rapid changes that often strengthened or generated spatial conflicts. The most serious problems include the chaotic urbanisation of suburban areas, extensive development, functional dispersion, services leaving the centre, lack of direct contact points (poor condition of public spaces), intensity of individual transport, smog, households using coal-fired furnaces, concretisation of space – parking lots, etc. Therefore, in Poland, “a sustainable city is often a utopia that fights against the particularity of private and corporate interests, whose only motive for action is profit” (Paszkowski Z., 2011). The 30 years of political transformation has brought excessive suburbanisation of Warsaw itself as well as the surrounding cities, an increase in the number of their residents, and reduction of green areas in favour of housing development. The dynamic growth of urbanised areas results in worsening of the quality of life of residents, because commune authorities cannot keep up with building new public services in the scope of education or health. Moreover, the Covid 19 pandemic triggered a change in housing needs among residents of large and medium-sized cities. The demand for suburban building plots increased. It resulted in an increase in prices of land in suburban and rural zones, and expansion of housing development onto environmentally valuable or arable land.

Research was conducted in reference to indicators of the quality of life of residents, among others the distance and time of commute, built-up area, public green areas, and public services per resident. The article will point to the determined increases in new urbanised areas, and their location in relation to road and railway transportation routes. Places with the highest increase in the number of residents will be identified along with the verification, whether it has been accompanied by the worsening of the quality of life of the indigenous residents or not. If so, it will be determined what public services and green areas should be designed to improve the quality of life of residents. The research aims at diagnosing functional-spatial changes in the suburban zone in the context of sustainable development, and defining indicators of quality of life of residents of the study area. The research was conducted in the scope of grant: An innovative approach to determining the city life quality indicators using geospatial technologies (INnovaCITY) implemented at WUT.

*Keywords: suburban area, Warsaw, quality of life, urban indicators, INnovaCity*

## **Sustainable regeneration of a listed building: The case of the low energy ‘Constantin Xenakis’ Art Gallery**

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### **Extended abstract**

Listed buildings have various restrictions for their refurbishment as their architectural identity must be reserved. The current EU policies for a decarbonization of buildings by the year 2050 demands actions to be taken in new and deeply refurbished buildings in order to drastically reduce their energy dependence on conventional energy sources.

Museums and Art Gallery buildings, in several cases are hosted in cultural heritage buildings. They also accommodate treasure objects of valuable cultural, historical, art and scientific value, requiring special conditions in respect to indoor air temperature, relative humidity and other environmental parameters. These buildings are also visited by a considerable number of people and thus, comfort conditions (thermal, optical, acoustic) have to be ensured.

The ‘Constantin Xenakis’ Art Gallery, located at Serres city (Greece), is accommodated at a listed, old barrack building that has been energy upgraded in order to become a ‘Nearly Zero Energy Building (NZEB)’. The Museum hosts the art works of the internationally famous Greek artist, Constantin Xenakis. The energy demand of the building for space heating and cooling was reduced with energy efficiency measures and, in respect to the restrictions imposed by a listed buildings, the use of renewable energy sources for space heating and cooling was exploited in order to transform it into a NZEBuilding. The energy upgrade of the buildings was funded by the “CULTURAL DIPOLE” project, funded partially by the “INTERREG V-A COOPERATION PROGRAMME GREECE-BULGARIA 2014-2020” and national funds.

The building was simulated with a detailed energy model (Design Builder) in order to investigate its energy performance.

The Art Gallery refurbishment and the results of its energy performance will be discussed in this paper.

*Keywords: listed building, low energy building, Art Gallery, energy renovation*



**URBAN REDEVELOPMENT, REGENERATION AND  
RESILIENCE**



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# Urban Resilience Strategies and the deficiency of metropolitan governance in Greece: the case studies of Athens and Thessaloniki

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## Extended abstract

Contemporary urban agglomerations have to address numerous vulnerability risks due to poor governance, environmental degradation, unplanned expansion, rapid urbanization, inefficient land use planning and the over stretching of the resources. The 100 Resilient Cities (100RC) initiative, pioneered by the Rockefeller Foundation in 2013 was dedicated in helping cities around the world to become more resilient to the physical, social, and economic challenges that are a growing part of the 21st century. 100RC supported the adoption and incorporation of a view of resilience that includes not just the shocks but also the stresses that weaken the fabric of a city on a day to day or cyclical basis. Cities in the 100RC network were provided with the resources necessary to develop a roadmap to resilience. These resources included expert support, access to solutions, service providers, and partners from the private, public and NGO sectors as well as a membership to a global network of member cities who can learn from and help each other.

In the mid-2010s the two major cities in Greece (Athens and Thessaloniki), that can be identified also as metropolitan areas, participated in the international urban network of 100 Resilient Cities. They developed in collaboration with a wide range of stakeholders and the guidance of the 100RC network their Urban Resilience Strategies. In order to identify the urban risks for each municipality an urban resilient assessment was held. The assessment pointed out several ascending risks and shocks, such as threats of earthquakes, violence and civil unrest, population decline in addition to the large influx of refugees, aging infrastructure and fragmented government structure with overlapping jurisdictions. However, the major shortcoming identified for both cities was the lack of metropolitan governance. In fact, metropolitan governance was pointed out as the most critical factor for the successful implementation of the strategies in policy sectors that concern urban areas, due to the fact that large urban centres often consist by more than one municipality, undermining the application of the plans.

This paper examines the action plans of the respective Resilient Strategies with the scope to identify the critical components for the formation of a metropolitan governance model that will be able to facilitate the above-mentioned plans or any other plans of metropolitan scale for that matter. To this end it systematically identifies and records all the actions that are planned to address the diverse challenges posed in metropolitan areas, concerning issues of spatial planning, transport and mobility, environment, economic development, social cohesion etc. The paper concludes that in order to achieve applicability of the resilient strategies or any other strategies of metropolitan scale we need to rethink more flexible or even tailored made metropolitan governance schemes.

*Keywords: resilience strategies, urban risk assessment and management, land use planning, metropolitan governance, strategic municipal planning*

# Towards flexible spatial planning in Greece? analysis through the regeneration plan for the coastal zone of Thessaloniki's metropolitan area

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## Extended abstract

In the recent past, spatial planning in Greece has been “blamed” for progressing at a slow pace (in terms of preparation and implementation of plans), and for generating several planning discontinuities, in terms of coordination and feedback between the different planning tools and scales. As a result, since 2014, the Greek planning system underwent a triple reform, in the name of providing flexibility and speeding-up of the planning process. All these reforms, aimed at cutting-down the number of Plans per spatial level, introducing at the same time a new type of plan: the Special Urban Plan (SUP) that meant to transgress administrative boundaries and by-pass existing land use and Master Plans.

The paper uses the case of Thessaloniki (the second largest city in Greece), where several S.U.Plans are currently in progress, covering different parts of the metropolitan area. Among those, the paper places emphasis on the S.U.Plan concerning the regeneration of the 40km coastal zone of Thessaloniki, that has not been approved yet, though is expected to have the most countable impact on the metropolitan area. The paper argues that in the case of the coastal zone, the S.U.Plan (that is currently under consultation) is deviating in many aspects from the existing Master and land use Plans related to the area in question. In specific, the proposed S.U.Plan seems to be project-based and promote an investment-oriented spatial organization in a prime real-estate zone. As such it deprives any environmental and social pursuits, despite the recognized environmental challenges as well as the growing concerns about the climate crisis effects, that call for innovative planning approaches, goals and measures.

Through the case of Thessaloniki, and the examination of the proposed S.U.Plan for the coastal zone of its metropolitan area, the key concerns/questions that are raised are: is this new type of plan used more of a bypass tool to the existing planning framework and procedures and less of a tool that will accelerate planning interventions in certain highly important and urgent cases? In other words, is this new type of plan, appropriate to bridge existing spatial planning discontinuities, or will it serve as a tool that will work outside and in parallel to existing planning framework, promoting mostly private investment-oriented planning?

*Keywords: metropolitan planning; flexible planning, coastal zone planning; Thessaloniki; Greece*

# Urban regeneration policy in Greece: The unbearable lightness of being

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## Extended abstract

Currently in Greece, there is no urban regeneration policy, as there was never in the past. This means that there was never such a Government initiative comprising specific and measurable goals, explicit strategy, measures and actions. Urban projects implemented are limited so far and concern the improvement of the image of public space, but urban interventions in depth are missing, despite the ever-expanding social, economic and functional problems of urban areas, the urgent need to address cities' energy efficiency, smart equipment, etc. Academic debate on the need of urban regeneration programs in Greece also remain rather limited. Their necessity is underlined within the academic milieus, although it is usually limited to urban design or to some social issues. Policy, management, economic and financial issues haven't sufficiently attracted neither researchers' interest, nor public bodies' attention. Financing of applied research is totally missing. However, the elaboration of a coherent National Urban Regeneration Policy is absolutely necessary, through the collaboration of all co-competent authorities - beyond the Ministry of Environment and Energy – the research community and all stakeholders. More specifically - in our opinion - any public initiative must rely on the following main pillars:

- a) A system of national organization that will ensure the elaboration, monitoring and implementation of an urban regeneration policy. It is necessary to establish a national authority with professional management and hopefully independent to government and political parties. This authority will shape and monitor both national policy and sustainable local urban regeneration programs. This entity should have the institutional power to solve any issues arising and will ensure the adequate and efficient use of EU and national funds and will maximize synergies with other policies (migration, energy, public infrastructure, etc.); will facilitate financial leverage; will oversee public procurement and public-private partnership procedures; will produce know-how - that does not currently exists - and will provide framework and guidelines for the implementation and management of local urban regeneration programs.
- b) Administration and governance issues of urban regeneration programs at the local - or regional - level. Both studies and the implementation of public, private and PPP projects consisting an urban regeneration program should be a coordinated and monitored by a local mixt economy body in order to ensure the social consensus at the local level and public interest, as well as the time sequence and assembly of the urban projects.
- c) The current institutional framework on urban regeneration is inefficient and has never been activated, mainly due to its complexity as well as its weak and outdated connection with economic issues. It is impossible for an urban regeneration institutional framework to anticipate and regulate all the issues that may arise in any particular real case. It should address the main issues, ensure the implementation of the national policy and provide efficient and low risk planning procedures that will attract and encourage efficient private sector investments in sustainable urban regeneration projects. Furthermore, there is a need to set planning tools actually missing, such as - for example - a procedure for the multi-ownership buildings' renewal, land assembly, an efficient Transfer of Development Rights system within urban regeneration areas, etc.

Without the development and the necessary synergies between the above three pillars of action, which are currently inexistent, it is probably impossible to expect that important integrated urban regeneration projects will be implemented in Greece, while most of the existing funds and efforts may continue to be spend in low-medium impact individual projects.

*Keywords: Urban regeneration policy; governance; institutional framework; Greece*

## Distributed urban manufacturing in Thessaloniki, Greece: prospects for enhancing urban regeneration and circularity

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### Extended abstract

During recent years, collaborative production and the maker movement have been gaining significant traction. The prosumer trend, the rapid expansion of open workshops (makerspaces), the increase of availability and affordability of digital fabrication tools such as 3D printers and laser cutters, as well as the advancement in certain collaborative technologies, have led to the creation of a rapidly increasing number of maker communities, with the most well-known examples of the fabrication laboratories (fablabs), the precious plastic project and the *Do-It-Yourself* paradigm. This paper presents results from the Horizon2020 Pop-Machina project (Grant Agreement n. 821479) with a specific focus on the pilot city of Thessaloniki, Greece. Pop-Machina grasps this opportunity in order to create and support bottom-up maker communities to stimulate innovation, business opportunities, and job creation in both established and newly created sectors.

Among others, the project uses urban analysis as a tool to map and inform collaborative production (using urban/spatial, architecture and design analytics). It targets areas at socio-spatial risk, with the broader purpose to help their adaptation to emerging economic, social, and environmental challenges, while identifying ways of sustainably reusing and (mixed-use) reprogramming of existing buildings, open spaces and (infra)structures. To this end, the project's collaborative production pilot cities, among which is the city of Thessaloniki, applied an innovative methodology to identify the actors, places and spaces of its urban maker ecosystem and proposed how they can be organized in the context of the city's socio-spatial structure and infrastructure networks, in order to upscale the city's urban regeneration dynamic. The specific exercise includes the identification of the characteristics and assets of the urban environment that may be leveraged as sources of strength for urban manufacturing for regenerative and circular city development. Such sources of strength include already existing conducive urban functions and land uses, as well as underutilized urban assets. The results of this spatially based investigation of the cultural, socio-economic, regulatory, and technological characteristics of the maker community ecosystem of Thessaloniki, were used in order to assess its regeneration potential and propose different avenues for optimizing it. The main question to be answered is how Thessaloniki - a city which presents a trend of social rather than production-focused craftwork, has a strong but homebased and starting-up culture of repair, hosts a good variety of fabrication spaces, has a decentralized waste distribution, can transition into a circular and regenerative development, utilizing the upcoming force of the maker movement.

We close the paper with interesting conclusions that emerged from this collaborative exercise and point to future directions for extending this research in Thessaloniki and other Greek cities.

*Keywords: urban planning; urban regeneration; circular economy; collaborative technologies; co-creation; Greek cities*

# Cultural, environmental and social assessment of buildings rehabilitation for urban regeneration strategies

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## Extended abstract

In recent years in Portugal, as in Europe, existing urban residential buildings are being submitted to frequent and deep rehabilitation works, envisioning new uses, functional and comfort requirements, or market trends. These interventions over the inherited urban building stock have become a key-factor of a *nonstrategic* urban regeneration, transforming urban housing and its cultural, environmental, and social value in uncontrolled ways in areas where urban tourism plays an important role, and shortages of housing are strong.

In Portugal, a framework regime for urban rehabilitation defined in 2004 conditions to the development of strategic urban regeneration, however since then it was very scarcely implemented. Later, in 2019, a new mandatory legal regime established specific principles and requirements for buildings rehabilitation projects and construction. These fundamental principles of protection and valuation of the existing buildings, environmental sustainability, and progressive and proportional improvement, represent the good practice of buildings rehabilitation.

To assure the quality and adequacy of future rehabilitation works, according to these principles, a tool of technical support was created. This tool, consisting of a multicriteria method to support decision-making in urban housing rehabilitation, is being implemented at the framework of sustainable and integrated urban regeneration goals. REHURB\_IMPACTS method evaluates buildings and projects with stabilized criteria and a structured assessment and scoring procedure, targeting the preservation of the built heritage with cultural value, the optimization of the consumption of materials and energy, and an offer of adequate and affordable housing.

Hence, REHURB\_IMPACTS evaluates and classifies the impacts of buildings' rehabilitation on three assessment dimensions: technical-cultural; energy-environmental; and social-residential, aiming to contribute to integrated urban regeneration practices. It comprises a group of 55 elements to be assessed through a system of simple questions and pairs of qualifiers, resulting on a scoring system to provide simple information about foreseen impacts. It is structured by nine domains: urban morphology, architectural typology; construction system; materials, components, facilities, uses, habitat, and real estate development; and 25 assessment criteria: urban tissue; heights; street front; spatiality; communications; aesthetics; primary elements; secondary elements; existent materials; additional materials; solar gains; natural lighting; natural ventilation; hygrothermal balance; insulation; air conditioning; hot water; renewable energy; networks; use; community; building; dwellings; cost; benefits. It uses seven qualifiers to evaluate the elements contained in each criterion: representativeness; adequacy; conservation; embodied energy; comfort and operational energy; adaptability and equity.

This paper describes REHURB\_IMPACTS multicriteria method, showing pilot applications in different Portuguese cities and specific residential buildings. This experimental practice pursues the improvement of rehabilitation works quality and the consideration of the principles of the new regulatory framework, as well supporting urban rehabilitation and regeneration strategies, benefitting from the legal support established in the country.

*Keywords:* Urban Heritage, Buildings Rehabilitation, Cultural Value, Environmental efficiency, Adequate housing

# Port cities and ecological transition. Urban regeneration strategies for new resilient public spaces

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## Extended abstract

Historically, port cities have been strategic places where the economic, political, and social power of cities is concentrated, and at the same time they are a constant and continuous engine of local innovation for the growth and development of the contemporary city. They are places of social conflict, exacerbated today by the emergency pandemic phase, especially because of issues related to the difficulty of logistical, relational and morphological relations between port infrastructures and the urban structure of the city that hosts them, and they are, at the same time, places of opportunity in the complex scenario of global challenges linked to the prospect of ecological transition for the revitalisation of contemporary cities and territories (PNRR, Green Deal, Agenda 2030). This ambivalence is rooted in multiple issues, linked to different planning methods, different administrative competences, and conflicting uses (Pavia, di Venosa, 2012). Moreover, the negative effects of the pandemic on commercial port traffic has been significant worldwide (Pavia, 2021).

A possible condition for success could be the innovation of governance models in use in the regeneration of city-port interface areas. (Smith, Soledad Garcia Ferrari 2012). This condition opens up an interesting field of research that investigates the relationships between the overall quality of the city-port-territory interface and the decision-making dimension referred to the actors, urban planning tools and processes that come into play in the planning of the contact spaces between the city, the port and the territory (De Martino 2020, Russo 2016, Hein 2015).

The open questions of coexistence between city and port, linked, on the one hand, to the lack of space for carrying out activities related to port logistics and the presence of functions that are not compatible with urban ones, and on the other, to a sometimes paralysing complexity of the governance system between port and urban areas, call for the need to identify theoretical, methodological and operational references for experimentation and innovation in local and port planning with a view to enhancing the dual nature of the port city and the identity that characterises it.

In this context, the contribution proposes, starting from the examination of two case studies identified as best practices (Civitavecchia in Italy and the port of Setè in France, in Europe), a reflection on possible models of virtuous governance, with particular reference to the morphological, functional and relational models between the two territorial systems (port and urban), in order to identify possible guidelines for the sustainable development of port cities in the era of ecological transition and economic recovery following the emergency phase.

*Keywords: urban planning; port -city; contemporary city; governance.*

# Urban regeneration and transformation of the industrial landscape

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## Extended abstract

Today we live in an era where the terrestrial environment is strongly influenced by the effects of human action, with deep signals of unbalance, which need to be urgently addressed by acting in a mindful, incisive and transversal way. In this sense, this realization is outlining new directions to orient the urban field as well, especially in Europe. Among the main ones, there is the need to reduce land consumption and, in parallel, to increase the requalification of the existing building heritage. The European Urban Agenda, issued with the Pact of Amsterdam, also dedicates one of the partnerships activated to the reduction of land consumption. Through the Action Plan drawn up by the partnership, some specific actions are identified aimed precisely at reducing soil consumption, which is indispensable in the process of ecological transition underway aimed, first of all, at reducing the risks associated with climatic combinations.

In this context a key role is played by the transformation of former industrial areas. These fragile contexts, often in a state of abandonment and with a long degree of safety and livability, demanded not only a urban project capable of triggering new uses and potential, but also a strategy aware of the material and immaterial values that these spaces still contain.

The phenomena of deindustrialization and decommissioning, influenced by economic, productive, and social dynamic, substantially modified these places into empty containers, inaccessible open spaces, which induced radical changes even in the urban context, determining remains and fragments of unfinished landscapes.

The landscape of the different industrial areas represents a pretext to weave a more articulated and interdisciplinary network that tries to keep under the same roof the different knowledges involved. The interaction between the various figure involved (economist, sociologist, urban planner, architect) and the regulatory and decision-making aspects assumes a central role in rewriting the substantial bases that support regeneration strategies.

In this general framework, the research, of which the paper is only a brief summary, aims to reflect on the role that the urban planning discipline can play in building a relationship between the project and the assimilation of skills and techniques in urban transformation processes.

*Keywords: urban regeneration, urban planning, industrial archeology, reduction of land consumption, ecological transition*

## Regeneration of Katrana area in Farsala

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### Extended abstract

This paper focuses on an architectural project, which explores the potential of enhancing the identity of the city of Farsala, Greece, by means of coherent management of its public open spaces and the design of a new cultural infrastructure on the outskirts of the city, in the Katrana area. The project was designed by the architectural firm *aether: arch*. The project concerns urban renewal of public open space and it is based on an existing study of the area, entitled as "Utilization of Cultural Area of Katrana Area", by the municipality of Farsala in 2009, and following archaeologists' findings of fragments of the ancient wall. Creative use of the Homeric texts that refer to the figure of Achilles and the construction of his shield is enlisted as a conceptual narrative to enhance the city's identity. The design strategy is based on the need to adapt and reuse existing public open spaces and the old infrastructure which has gradually deteriorated both functionally and aesthetically (desolated quarry, old cement water reservoir tanks), taking into account current data and requirements. The design scheme is also based on the urgent necessity to connect public open spaces with historical landmarks and new archaeological findings of the city, by re-thinking the surrounding landscape and creating a site for cultural events of regional importance. Hence, the study exhibits an interest on the design of spaces for hosting cultural events adding to the existing open air theater, a gallery, an observatory and a recreational area.

The design scheme for the Katrana area is characterized by two concerns. The first relates to the need to the enhancement of the ancient ruins and the second relates to the development of a cultural and leisure site - absent from the city. The aim is to develop a design that would justify both aspects. Starting point of the research was the exploration of the connection of these two aspects by means of the city's identity and meeting the requirements of the citizens of Farsala. At the same time, public space is conceived as a new form of identity which reinforces the development prospects of the city by creating points of interest, and connecting the city to the pre-historical personality of King Achilles.

*Keywords: myth; city's historical identity; urban renewal; urban landscape*

# Burj al Babas project and discussion of an “as if architecture” in the context of contemporary Turkish Architecture

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## Extended Abstract

Burj al Babas is a residential construction located in a natural environment near Mudurnu, a historical Turkish town that takes place in the tentative list of UNESCO World Heritage Sites. The Project having an Arabic name translatable as “Babas Towers” is a complex of 732 identical villas resembling miniature palaces or French castles with a blend of diverse architectural styles. The construction of the densely situated villas came to a halt due to the bankruptcy of the construction company. Today the landscape of this abandoned and uninhabited ghost town is the subject of attention from both national and international media, photographers, and music video makers.

This place in-between a Disney or post-apocalyptic stage setting atmosphere deserves discussion not only for its visual and uncanny aesthetic qualities but also for pointing to a complicated state in the discipline of architecture as understood and practiced in the Turkish context. This state as I will conceptualize it as “as if architecture” refers to a prevailing architectural approach in Turkey whose examples are increasing day by day all over the country. “As if architecture” briefly points to a state in which the content of architecture is discharged from its ethical values, culture, knowledge, skills, and responsibilities; and loaded with superficial meanings found in attached images. This approach with its capacity of affecting fundamental constituents of the discipline and boldly represented in the Burj al Babas example needs to be discussed and understood in the academic environment as well.

Discussion of “as if” formulated in the context of architecture is adapted from two sources which reveal different modes of “as if architecture.”

The first reference is from psychology, that is ‘as if personality,’ a type of personality style initially described by psychoanalyst Helene Deutsch. In 1942, Deutsch depicted a person who behaves as if mentally and emotionally stable but is doing only what is expected without genuineness. The ‘as if’ person has no connection to her/his true self and lacks inner motivations. Without the possibility of developing self-identity, the adaptation of imitation takes over.

The second reference is DoğanCüceloğlu’s discussion of “acting as if,” a social phenomenon that he recognizes in the Turkish context. In his book “MışGibiYaşamlar” (translatable as “Pretend Lives”), Cüceloğlu, a Turkish communication psychologist, presents “as if” culture as a phenomenon that is observed in the assumption of responsibilities happening in every scale ranging from personal relations to the implementation of the legal system in Turkey. “Acting as if” is a condition of exploitation of four factors: intention, knowledge, skill, and responsibility.

These two concepts of “as if personality” and “acting as if” will constitute the framework for discussing “as if architecture” in the Turkish context. The study reveals the existence of these two modes with examples from the Turkish architectural context that are happening simultaneously in the context of Burj al Babas.

*Keywords: Burj al Babas, as if, pretend, architecture, Mudurnu, Turkish Architecture*

## Developing peri-urban Cultural Epicentres: The regeneration of Tatoi estate in Attica.

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### Extended abstract

The former royal palaces of Tatoi on mountain Parnitha in Attica has been for many consecutive years a key issue of resolution and promotion for the Ministries of Environment and Energy and Culture and Sports respectively. This postgraduate dissertation explores the historical evolution of the Tatoi estate in terms of its spatial structure and studies the ideal examples in Europe regarding the regeneration of royal palaces and gardens. Additionally, the building complex of the estate is analysed with a wide range of information, as the reason for choosing the location and the assignment to the Greek State. With a guideline for the protection status of mountain Parnitha, the legal frameworks relating to Tatoi and the examples of the royal palaces of Europe, alternative proposals are being drawn up for the regeneration and development of the former royal estate into a peri-urban Cultural Epicentres. The final conclusions describe the results of the research.

*Keywords: Tatoi estate, royal palaces, gardens, regeneration, peri-urban Cultural Epicentres, Greece, MCS.*

# Spaces of absence in the city: an examination of urban voids

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## Extended Abstract

Walking in the city, there are rarely visible spaces, which are usually overlooked by the human eye; places with no functions and uses, and vague meanings interrupting the urban fabric; places without identity and a clear role. Architects and planners are referring to those spaces as “urban voids”. These are the spaces that create a state of fear, manifest themselves as spaces of chaos and entropy, but at the same time as spaces of imagination and creativity, ready to take action and become key spaces for the sustainable development and resilience of modern cities.

As “urban voids” considered spaces with the presence or even absence of construction that cannot be perceived as integrated entities and as elements of the urban structure. Analysing the concept of “urban void”, we realize that it contains the meaning of “urban” stating that something belongs to the city and the meaning of “void” stating the lack of physical and mental content.

These empty spaces arose by unpredictable transformations of the city due to historical events, political decisions, economic changes, and natural changes. They are places where design follows spontaneity and becomes the subject of study and many discussions of their recovery and integration into the urban fabric. According to the existing literature, the term “urban void” is used as an umbrella to describe a variety of spaces that include a set of abandonment features. Usually the phrase “urban void” refers to unused, underused, misused, and abandoned spaces. Such areas can be unstructured plots invaded by greenery, abandoned camps and industrial complexes, abandoned airports, railway lines and ports, uncovered construction sites, roads that have been removed, etc.

The concept of “urban voids” is widely presented, which often creates misinterpretations and makes it difficult to investigate. To date, no formal definition has been defined to describe the concept of “urban voids”, allowing multiple terminologies at different times and places, making it difficult to interpret and manage. In the literature there are a plethora of similar terms used to state voids, such as “vacant land”, “terrain vague”, “brownfields” and “lost spaces”.

This paper explores and interprets the “urban void” in order to understand and define the concept in an effort to propose the best practices on urban regeneration, highlighting them as key areas for the sustainable development and resilience of modern Greek cities. It attempts to describe its scattered definitions and typologies, as well as to examine the design approaches to “urban void” that have been formed over the last 50 years, creating the conceptual framework of the term.

*Keywords: urban voids; urban regeneration; terminologies; typologies; conceptual framework*



## URBAN LANDSCAPES, LANDSCAPE PLANNING & DESIGN

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# The Historic Urban Landscape context in urban planning: The case study of Elefsina, European Cultural Capital 2023

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## Extended Abstract

In 2011, UNESCO adopted the Recommendation on the Historic Urban Landscape, (hereafter the HUL approach) aiming to facilitate the integration of heritage management and urban development. This practice promotes a landscape-based approach, in which the existence of an inventory of resources and the identification of values and vulnerabilities are essential factors where drawing up urban development policies (Veldpaus, 2015). The HUL approach is holistic and interdisciplinary. It addresses the inclusive management of heritage resources in dynamic and constantly changing environments, aimed at guiding change in historic cities. It is based on the recognition and identification of a layering and interconnection of natural and cultural, tangible and intangible, international and local values present in any city. According to the HUL approach, these values should be taken as a point of departure in the overall management and development of the city. The core to the HUL approach is a new understanding and perspective of the historic environment. The Historic Urban Landscape is the urban area understood as the result of a historic layering of cultural and natural values and attributes, extending beyond the notion of “historic centre” or “ensemble” to include the broader urban context and its geographical setting. This wider context includes notably the site’s topography, geomorphology, hydrology and natural features, its built environment, both historic and contemporary, its infrastructures above and below ground, its open spaces and gardens, its land use patterns and spatial organization, perception, and visual relationships, as well as all other elements of the urban structure.

The city chosen in the current research to be seen and studied under the prism of the HUL approach, is the city of Elefsina, in the area of Attiki, Greece, which is chosen as European Cultural Capital 2023. The European Capital of Culture event is one of the most interesting and successful EU cultural programs, combining the fields of cultural heritage and urban design, while attracting an increasing interest from policy makers, academics, and media. Elefsina, differs from the stereotypical image that any tourist or visitor may have (from Greece) since it is a purely industrial city, which in the mid 60s and 70s suffered major degradation due to pollution caused by the industrial infrastructure. The project “Transition to Euphoria” (the official bid of the city as a candidate for the ECOC), aims, among others, to strengthen the rich cultural profile of the city and clarify its cultural identity, (thus) changing its stereotypical image of an industrial city. The plan involves many strategies that are already taking place, including financial, but also physical planning, in order to bring benefits in the fields of transportation, accommodation, tourism competitiveness etc. As the archaeological identity and image of the city seems very strong, in this research the case study is approached through the Historic Urban Landscape concept, which was launched by UNESCO in 2011 and inserted a new perspective to protect and highlight historic heritage areas. In that context, the research questions raised concern mostly on how the historic urban landscape approach is applied in the case of Eleusina, the strategies used to protect the historic/heritage site of Eleusina along with its notion as European Capital of Culture while in the meantime keeping it economically/socially active and how stakeholders are involved and participate in the management and application of the vision presented.

*Keywords: urban landscape, historic urban landscape, cultural landscape, historic centre, cultural heritage*

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# Notating Performative Interventions and Urban Transformations

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## Extended abstract

This paper is concerned with forming a critique of the temporary uses of public space by socio-cultural activists in Athens, Greece, through the development of notational drawing. The aim is to propose a method to sustain and construct conditions for temporary transformations in selected locations within the urban context of Athens by exploring the symbiosis of corporeal movement and physical space. The paper suggests that a conceptual and speculative practice could become a critical tool to intervene in public space and constitute a hybrid approach that responds to its increasing demands. An improvised notation system is formulated to assist as a representational form of “language” that can describe selected events and act as a tool by which ephemeral actions, engraved through performance into public space, can be captured. The purpose is to indicate both the relationship between layers of the notational mapping of space with temporary movement dynamics, and the extent to which this hybrid tool can generate new urban scenarios. The speculative experimentation therefore tests how the interpretation of the ephemeral as an embodied experience can determine and impose elements of design to consolidate a new potential tool for architecture, urban design and urban activism.

During the course of this research, the performativity of citizens in public space was observed, spanning two significant types of crisis. The first was the Greek financial crisis and harsh austerity since 2009, which accentuated public space as a place of solidarity, but also of decay where the effects of economic bankruptcy were largely manifested both spatially and socially. The second was the global crisis of the COVID-19 pandemic, which limited sociability and deprived people of a vast range of social activities; from education, health and culture to all forms of economic activity. But it also opened the dialogue for new possibilities in the design of public spaces. Following these reflections, the paper primarily highlights the complexity and instability of public space, while the speculative experiments and notational tool proposed reflect on contemporary social actions, looking beyond the obvious and what is there. The drawing and notational process aims to become a hybrid tool that has the capacity to shape socio-spatial programmes and disrupt the formality of space by freeing it from constraints, showing what cannot be otherwise seen. Ultimately, through this process, traditional architectural drawings are addressed in terms of their ability to adapt and to reflect the aforementioned complex social transformations in spatial terms.

*Keywords: notation; performance; public space; Athens; urban activism; architectural drawing*

# Greeks tend to shift towards the public space during difficult periods. Can public space be a catalyst for (Greek) urban resilience?

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## **Extended abstract**

Public space was an important part of Greek people's lives in the different chronological periods of the country's history. Starting from antiquity, the ancient agora and the Greek polis were considered as prototypes of democratic public spaces. In more modern years, Greece was under the domination of different conquerors and during those periods public space constituted a bond between Greek people and input their need to reinforce their communal life. Although Greeks were connected with public space in different periods, after the final liberation of the country (1821), different factors contributed to the debilitation of the noteworthy role of the Greek public space. So, the relationship between Greek people and public space started gradually to get lost.

In March 2020 the outbreak of coronavirus and the whole crisis that followed made many people around the world to move towards public space. Even though all the media presented an image of cities, to which we are not used to, (abandoned streets, mass transportation without masses, closed stores, people at home, silence) based on observations, the reality was a little bit different. We were bombarded with images of metropolitan areas, big famous cities, popular touristic destinations. But what about medium-sized cities in Greece? During the first lockdowns it seemed that many Greeks in small and medium-sized cities or in the scale of neighborhood in the big cities turned to every form of public space. Probably, that crisis was an opportunity for Greeks to reconsider the meaning and the importance of public space.

It can be said that the economic depression that Greece has experienced since 2008, made Greece to build community resilience in unexpected and difficult circumstances. Greece has been in an almost non-stop crisis mode, so society was better prepared to enter a state of alert, like this of the pandemic. So, now apart from community resilience, Greece should achieve also urban resilience. However, like in every kind of crisis the responsible authorities react to the "disaster" rather than respond in a deliberate way. Most of the time, a city's emergency response system is focused mainly on the rescue work and not really concentrating on the post-disaster recovery, deconstruction and precognition. "...a better definition of urban resilience starts from a deep understanding of a city's systems and operation. It's an approach to resilience that can lead to proactive adjustment." Public space can be considered as a significant part or even the core of a city's system and operation.

So, this COVID-19 crisis is an opportunity to rethink the way we plan, design, develop and manage our cities having as starting point the reconquest of public space. The proper design and maintenance of public space can lead to the eight city functions that are critical to resilience, based on the research for the City Resilience Index, Understanding and measuring City Resilience. Can public space after all be a catalyst for urban resilience?

*Keywords: Greek public space; community resilience; urban resilience; design of public space; city functions towards resilience; COVID-19*

## Eco-Time Machine: using new representational technologies to take a 4D tour in landscape history

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### Extended abstract

Landscape emerges as a critical perspective in the environmental and geographical studies, planning and management, as it combines natural with social dimensions, objective processes with cultural and subjective perceptions. However, because of its romantic character, landscape is often perceived as a non-historical unity. Thus, it is important to note that rural, urban or suburban landscapes are changing entities, with a specific history, determined by complex and interacting social and environmental processes. New representational technologies, including virtual and augmented reality, may offer adequate tools which can highlight such a historical dimension; while they have been widely used to depict monuments or buildings, new representational technologies have rarely been used in the landscape context.

In the research project “Ecotime Machine”, we studied the landscape history of a rural, mountainous area of North Greece (South-East Gramos, Perf. Kastoria), combining different approaches coming from environmental and social studies, including air photo interpretation, photogrammetry, vegetable sampling, fauna monitoring, palynology, interviews and anthropological research. Additionally, we used a succession model (Landis) and we developed more techniques in order to simulate vegetation’s history, as well as projections for the future and alternative scenarios for the past. Finally, we developed two applications that can represent the landscape history, for research, educational and promotional purposes.

The first application is based on an augmented 3D rendering and visualization software – as developed in particular for the project. It represents the main elements of the landscape (vegetation including cultivated plants, road network, riverbeds and the settlements) in a mixed, wide-scale 3D image, offering the possibility of observing the changes that the area underwent in space and time. The software was developed in the Unity3D environment. It utilizes georeferencing technologies and localization, position and orientation of the user on Android mobile devices, in order to depict in superposition with the nowadays landscape the three-dimensional representation of its history.

The second application, a Progressive Web Application based on Microsoft’s Azure cloud services, provides a 2D representation of various spatial layers of the landscape. Besides the spatial dimension, the web app introduces a temporal dimension so that the user can navigate in different historical moments, as well as in the future. The 2D application can host and represent a large volume of spatial data due to a non-SQL database (CosmosDB). Moreover, administrators of the application need only to use their preferred GIS software to produce the required spatial layers.

In our project, a rural area was selected as case study, in order to highlight that natural landscapes have a rich and contradictory history. Nevertheless, the methods and the technologies developed can be also used for urban and suburban landscapes.

*Keywords: landscape history; representational technologies; augmented reality; web application; 3D representation*

## The “Resilience” of History

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### Extended abstract

The subject of this presentation is the research of the effect of history on urban design. “For every image of the past that is not recognized by the present as one of its own concerns threatens to disappear irretrievably” Walter Benjamin contemplates on *Theses on the Philosophy of History*. He presents the relationship of past and present, as a **critical constellation**, in which precisely this fragment of the past finds himself with precisely this present. Accepting this aspect I will comment on a series of urban design projects of our office, as far as their entanglement with history concerns. Against the dominant model of modernism, the cut from history and tradition, and the self referring spaces, we propose connections with the surroundings, the context, and correlations with the past, mythical and historical. **We retrieve** aspects of the past intertwine on the fabric of the present. **We recognize** the complexity of reality, as an interweaving of different components. Edgar Morin urges us to learn to weave, to unite. **We propose** spaces of an **authentic experience**, when they are founded on the memory of a cultural and historical tradition and not only on the direct experience. **We pursue** the introduction of poetry on the rationalized space of the city.

In light of history, which is a field of contemplation and a tank of inspiration, our urban design projects can be grouped into the following categories:

*\_Emphasis\_* Places that are distinguished by their former industrial use. We emphasize their aura, we highlight and intensify this aspect of their character, avoiding being picturesque.

*\_Intertwining (Interweaving)\_* Places that contain older traces, ancient or more recent. We reveal those traces and intertwine (interweave) our proposal with them, by connecting literary the past with the present. The woof of the past fed into the warp of the present.

*\_Constellation\_* Historical places where we attempted the constellation of the past with the present. We suggest with a symbolic way, the mention to and relating to history.

The notions of emphasis, intertwining and constellation will be used as tools of understanding and interpretation of our proposals, attempting to support the “resilience” of history. Since according to Walter Benjamin “the manner in which human sense perception is organized, the medium in which it is accomplished, is determined not only by nature but by historical circumstances as well.”

*Keywords: urban design, history, constellation, aura, traces*

# Breaking boundaries: from the school as ‘micro-city’ to the city as a sustainable ‘macro-school’

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## Extended abstract

This contribution intends to approach and intertwine the fields of educational space, landscape and urban design, as well as sustainable development. In the 21st century society marked by globalisation and the domination of the digital, the nature of education is being rethought. Learning can be achieved in different places with the utilisation of mobile technologies, a condition that has recently intensified by the implications of the pandemic. Nevertheless, it is a consensus that physical educational spaces play a crucial role in guaranteeing equal access to education, in acquiring social competences and in sharing cultural values, but also as vital resources for local communities. Hence, in order to compensate for the 'attractiveness of the screen', the school environment needs to be re-promoted as primarily a vital social space, with the provision of a multiplicity of locations and spatial types.

In the last six decades there has been an emergence of tendencies in school design that intend to break the spatial boundaries of the classroom. One of the most characteristic ones is Herman Herzberger's structuralist compositional approach which is based on the concept of 'spatial articulation' and implies the provision of an unchanging multifunctional spatial framework easily adaptable to different conditions. According to Herzberger, an appropriate balance between the spatial qualities of 'visibility' and 'coverage' refers to the complexity of urban morphology and, combined with a spatial interpretation of the urban organisation of streets and squares, transforms the school building into a 'micro-city'. The application of the aforementioned spatial means in Herzberger's schools, in the form of transitional zones, nooks and galleries, supports informal learning and contributes to the social cohesion among the members of the school community.

Other boundaries that have been progressively approached in the recent decades are the ones of the building and the fence, with the goals to exceed the school as the exclusive locus of education. We refer to the spatial configuration of the schoolyard and public urban space for informal learning and spatial literacy, through the lens of environmental and social sustainability. Thus, we explore open-air learning space as a tool of environmental education, as well as of social justice, through the concepts of participatory design and gender perspective. After critically approaching the exclusion of the young individual in the contemporary city, we comment on counterexamples of individual sites and networks of spaces that reconfigure urban space into sustainable 'macro-schools'.

Lastly, we dive into two case studies which constitute large scale public parks surrounding privately developed cultural institutions. These are the Calouste Gulbenkian Foundation in Lisbon and the National Opera and Library complex in Athens. We explore the parks in the light of the aforementioned concepts, and conduct surveys in order to evaluate their use as agents of informal social learning. Within these surveys we document the public opinion on the spatial re-configuration needed for the increase in their 'learning potential', on the incorporation of ICT, and on the challenges or opportunities arising within the crisis of Covid-19.

*Keywords: educational space; urban space; sustainability; participatory design; gender equality*

## Digital Ecologies and Robotic Landscapes

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### Extended abstract

Nowadays, the computational design tools may help redefine the landscape design as an interaction between technologies that sense the environment, model and simulations. and the way that they affect the physical world without constant human input and monitoring. All the designing protocols refer to how natural systems behave, and they are used by the designers to tune the designing algorithms and eventually the land itself. Landscape design is a process that has been so far dominated by a top-down approach. That means that designers usually impose rules from above not always taking into consideration the real potential in the landscape. When the designers are not working with place-specific landscape in the process, design is led to generic urban forms, ecological degradation, and cities that lack resilience and adaptability. The growing use of more complex visualization techniques and digital tools in landscape architectural practice and research poses a set of challenges for landscape architects. Furthermore, computational analysis of different parameters of a certain place gives the opportunity to landscape designers to an in-depth understanding of landscape. design and construction processes can be better adapted to real-time topological and sensory data. This analytical approach will, in due time, revolutionize how designers think, act and introduce robotic construction methods on contemporary landscapes, and reimagine their intrinsic relationship to infrastructure. At its core, it's a call for new levels of observational rigor: first, to observe all the factors that make an ecosystem function, and then to understand how those factors work together to create a landscape. For the computational design tool to take better advantage of these novel robotic construction methods, a matrix of parameters is defined in order to help distinguish between fixed parameters and performative parameters. The computational design tool allows for changing site conditions to operate and therefore affect a changing topology of the resulting path and allow for the application of artificial intelligence-driven robotics solutions that are trained using the aforementioned matrix of parameters. These fixed and performative parameters are categorized in domains as architectural intentions and performance, fabrication constraints, materiality. Computer scientists have been particularly interested in an algorithmic description of nature for ends ranging from improving graphical representation, to generating believable artificial worlds, to improving artificial intelligence.

*Keywords: Design ecologies; computational design; Robotic Landscapes; digital tools; design protocols*

# Characterizing Landscape Patterns and Spatio-temporal transformation in Urban-Rural Interfaces. The case of the Metropolitan District of Quito

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## Extended abstract

Latin America is the developing region that has registered the fastest urbanization in the world. However, little is known about urban expansion patterns in many of its main cities. This is the case of the Metropolitan District of Quito (MDQ), currently the most populous city in Ecuador. Despite its highly complex geography, located between 2.300 and 4.200 meters above sea level, over the Andes Mountain range, this city is experiencing an accelerated process of dispersed expansion. The MDQ is a territory with very particular features, it is composed by 32 urban parishes and 33 rural parishes. The urban parishes encompass the city of Quito and are surrounded by the rural parishes. Due to topographic factors, the rural parishes located at the north and west of the MDQ are paramount rural, some of them even covered by large areas of forests and it is where the Pichincha volcano is located. While the rural parishes located at the east of the DMQ, are areas that are facing the urban expansion of the city of Quito. These parishes are very heterogenous, having micro-urban areas, periurban zones, agricultural areas, forests, among other land uses. Due to new urbanization patterns, where cities' edges are becoming increasingly difficult to delimit, a better understanding of urban-rural gradients has become a key issue for urban planning. As in the DMQ case, these interstitial territories are characterized for being highly heterogeneous, with hybrid and complex dynamics and -due to their landscape ambiguity and rapid transformation- frequently lack of clear regulations. Using the software Fragstat, a set of landscape metrics were calculated and evaluated. High resolution satellite images of two years were used with the aim of understanding spatiotemporal transformations. Additionally, the Markov chains modelling technique was applied, exploring landscape change probabilities in the following years. The goal of this research was testing a novel and accurate method to identify urbanization processes and tendencies and its possible main drivers. Results suggest that the MDQ presents patterns of urban diffusion and coalescence. The diffusion starts at the urban core and expand to rural parishes where some emerging traditional settlements merge, constituting a complex pattern of urbanization. Also, significant levels of fragmentation were identified for the vegetation cover in periurban areas, threatening the territory environmental sustainability. Finally, a multivariate cluster analysis was developed, evidencing five main tendencies of urbanization patterns. This knowledge can be particularly useful for urban planning in terms of reducing randomness in urban development processes. This paper proposes and tests an analytical approach which could be applied to other Latin-American cities, where urban expansion patterns remain unknown.

*Keywords: Urban-rural gradient; Landscape patterns; Landscape metrics; Urban expansion*

## Urban landscape quality evaluation criteria

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### Extended Abstract

For a city dweller, the urban landscape is a constant presence in the urban environment, and the quality of life of the city's inhabitants depends on its quality.

Therefore it is imperative to allow Municipalities to have a tool to assess the quality of their urban landscapes.

The identification of the evaluation criteria, validated by an expert panel, is a contribution to the elaboration of policy making, to evaluate the urban landscapes. The Delphi method was applied, on a four-round assessment, to select the five criteria that are the most essential to integrate an evaluation model.

This work, attending the multidimensionality of urban landscape, based on the concept of "landscape" defined by the European Landscape Convention (2000), propose the identification of the criteria for assessing the quality of the urban landscape - Human Dimension, Functional Diversity, Natural Elements, Identity and Maintenance - using the Delphi method and attending to a panel of 24 experts, and present a multicriteria evaluation model, using the SMART method (Single Multi Attribute Rating Technique).

As far as is known, the determination of the weighting coefficients of the criteria, by applying the Swing Weighting method to a set of decision makers, in which the premise that there would be no consensus among the experts of the decision conference, was an innovation, and it has proven to be an effective method, leading to mathematically valid results. The social distance, imposed by the pandemic, implied a conference decision "online" for obtaining the quantification of the weighting coefficients of the five evaluation criteria to be obtained using the Swing Weighting method (adapted), applied to a panel of 10 experts.

With the proposed model Municipalities can have a tool for evaluating urban landscapes to ensure a quality urban landscape for their residents and visitors.

*Keywords: Urban landscape; European Landscape Convention; Delphi method; Swing weight method (conference decision adapted "online"); multi-criteria evaluation model*

# The effect that the residential space has on the educational process into which the school unit belongs

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## Extended abstract

According to the Educational Sciences and the Spatial Sciences, the school is an open system that does not operate in a social, economic and cultural vacuum, but is in a relationship of interaction with its wider external environment. The educational act is directly related to the Places, Landscapes and Territories that surround the school. The external environment affects the operation of the school and the operation of the school affects the outdoor space, to the point that this interaction can even lead to a transformation of the very characteristics of the Space.

Also, the school environment, by itself, does not favor or prevent Knowledge and Learning, but interacts with a variety of other factors -such as the surrounding Places and the various Territories- to favor or ultimately hinder the Learning process. Knowledge, therefore, emerges through the active interaction of the human body (mind, body and soul) with the school environment, as well as with the wider natural and man-made Places and Spaces (urban space, residential space, rural space, etc.), where he lives and grows. The present work refers to the scientific findings of an ongoing field research on the spatial interaction between school environment and residential space, in schools located in urban areas of Greece (Messinia and Attica), as well as France (Paris, Amiens and Lyon). The research examines the potential contribution of Modern Democratic, Participatory and Collaborative Educational Instruments that contribute to the development of a framework of Spatial Cohesion and Spatial Justice within the school. This is achieved through Democratic, Participatory and Collaborative Methods in which all students and teachers, without exception, participate daily, while parents and guardians become aware of the collaborative process at regular intervals. This is extremely important, because -as it turns out- the promotion of Collaborative Classes and Schools contributes beneficially to the balancing of social inequalities arising from inherent weaknesses and threats of the residential environment. The authors have prepared questionnaires and have scheduled regular meetings in schools in Greece and France. They record the views of students, teachers, as well as parents, on the impact that residential space has on the school and vice versa. By conducting the research, an attempt is made to validate, extend or even undo the elements that compose the existing theoretical background.

This research, which is already being promoted in France, is the first research of its kind in Greece and can bring added value to current research across Europe. The findings can be very useful for the design of educational policy and the school environment, at all levels (from kindergartens to universities), while the application of Democratic Collaborative Methods as well as the interpretation of the findings can encourage active Involvement of the educational public in the formation of a new Educational Space, avoiding possible mistakes that can cost time and money.

*Keywords: residential space; spatial interaction; collaborative and participatory planning spatial; cohesion and spatial justice; educational policy planning*

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## Post- COVID-19 pandemic and vulnerable communities dwelling in emergency. What's the role of landscape architecture?

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### Extended Abstract

On 30th January 2020, the WHO declared the Chinese outbreak of COVID—19 to be a Public Health Emergency of International Concern, posing a high risk to countries with vulnerable health systems. The emergency committee has stated that the spread of COVID—19 may be interrupted by early detection, isolation, prompt treatment, and the implementation of a robust system to trace contacts (World Health Organization, 2020). Sadly, social inequalities in informal settings around the world could diminish the capacities of communities to cope with and actively respond to the spread of a pandemic. The pandemic is not democratic. It has and will hit vulnerable and marginalized communities the hardest and will likely end up reinforcing existing hierarchies. Vulnerable communities, forcibly displaced, migrants, refugees and people on the move are at heightened risk. The disease could be controlled only if there is an inclusive approach. Therefore, recognizing and addressing the stark reality of the socio-spatial inequality of deprived and endangered communities is essential for addressing the epidemic and planning for the post-pandemic.

Two years have passed since the COVID-19 outbreak, but the pandemic is still ongoing, and there is no clarity and certainty on the future and end of the health emergency. Nevertheless, we have learned how to cope with it, and we have almost forgotten the striking images of the empty cities, lines of coffins, tired faces of nurses and doctors, and the queer silence of our deserted neighbours. Since the beginning of the COVID, we have wondered about the post-pandemic nurturing /imagining a possible shift to a 'new normal'. Questions arise: will this normal be more equitable and just for everyone? will it address vulnerable communities that the pandemic has heavily impacted?

We all hope new investments will increase the quality and quantity of open and green spaces in our cities. Besides, who will assure us that the landscape professional will be able to minimize the negative impacts and the green gentrification effect on socially vulnerable communities while selling the ideas of a new urban brand of the green and environmentally resilient 21st-century city to investors, real estate developers, and new sustainability-class residents (Gould, et al. 2018; Checker, 2011)?

This paper is a call for action for landscape architecture as a profession among the design and planning discipline in defining its role to address emergency and disaster management, especially in the contest of vulnerable communities.

*Keywords: vulnerable communities; landscape architecture; green gentrification; post-pandemic; social inequalities*



## **ENVIROMENTAL URBAN PLANNING**

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**Changing Cities V, Corfu, 20-25 June 2022**

# Harmonia Project: Shaping vertical and horizontal engagements to get real impact through locally rooted projects

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## Extended abstract

Cities consume 78% of the world's energy and produce more than 60% of overall greenhouse gas (GhG) emissions while occupying less than 2% of the surface of the Earth (UN Habitat, 2016). And they continue to grow, creating future challenges for cities and policy makers to sustainably manage an additional urbanized population of 720 million people (World bank) in the next 10 years. The influence of cities on anthropogenic Climate Change (CC) and related consequences on human beings cannot be underestimated. Therefore, effective and sustainable decision-making in urban planning related matters need to have a strong participatory planning foundation, being inclusive and taking into account both the changing behaviours and the urban metabolic processes, adapting them to fit the Paris Accord goals and recent COP26 agreements. The Harmonia project (H2020 EU, financed project nr.101003517) can help to face these open challenges as it aims at uniting the stakeholders around the common CC issues, through a co-design and co-participation process. The Harmonia Project allows the stakeholders not only to understand the impacts on their local environment but also to concretely visualise those issues through a Support System for improved resilience and sustainable urban areas.

The Harmonia project enhances cities' preparedness to respond to specific predictions, such as floods or dust storms, and protect their residents and assets, what is it makes cities more resilient towards climate change-induced risks.

To achieve these goals, Harmonia is going to engage a wide-ranging of stakeholders at the local level, from professional experts to citizens. Urbasofia designed the Harmonia Stakeholder Engagement Plan (SEP), it links project's scope, target users (and collaborators) with the process leading to the expected results.

The stakeholders' engagement supports Harmonia Project to achieve sustainable collaboration with all those territorial actors affected and interested by the envisaged outputs, but also to develop the Integrated Resilience Assessment Platform (IRAP) on real-life needs to provide high serviceability and usefulness.

The focus of the engagement process is on forming synergic relationships and developing a community around the co-conception of the IRAP Platform in order to raise their level of understanding, awareness and inclusiveness in and for the project.

Finally, the Harmonia Project aims to reach, to attract and to engage all key urban governance actors, especially in the topics where they can make a difference for inclusive development processes at urban scale.

*Keywords: Climate Change, Pluralism in Urban Planning, Resilient Cities, Co-designed Planning Process, Sustainable Development*

## Planning and designing small urban green areas using PPGIS

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### Extended abstract

Planning urban green areas is still a challenge regarding the needs of the society and political approaches to a sustainable living world. Mostly, green areas were used as recreational areas with a very high impact in aesthetics, but green represents more than that. Green areas offer ecosystem services such as support for biodiversity, improvement in air quality, carbon sequestration and can provide food. All these services can be used in the benefit of the community and in order to mitigate urban challenges. In Romania we have a specific law for green areas that describes almost all green categories, the rules to follow and the consequences, but the practitioners and residents all over the country are not familiar with the law. Even if the law mentions some categories of green, except green walls, green roofs, rain gardens or other new concepts, municipalities do not know exactly all the green spaces they have in the cities. Furthermore, the restrictions and sanctions are not applied properly or at all. Because urban planning is a very important step in creating and obtaining the services the society needs and in a sustainable manner, we started with the society perception of the problems regarding small green areas. Those areas are more accessible to population even if they are not accessing them consciously, so they are aware of the problems green areas are dealing with. Our study's aim is to identify which are the problems of small green areas using society perception and how can we plan and design those areas for a better living. We used public participatory geographic informatic system (PPGIS) for collecting data regarding the problems residents of Bucharest (Romania) are perceiving, but also some other related aspects that can help to solve them. For collecting data, we used a webapp created using Esri platform which was disseminated on social media. We focused on small green areas that are represented by: road alignment, residential gardens, pocket parks, squares, playgrounds (outside urban parks). The results indicate that most of the small green areas from Bucharest are dealing with waste pollution or inappropriate use of green, such as using small green areas for parking cars. Also, there are some issues regarding the quality of the green areas. Using PPGIS we point up which are the small green areas people noticed nearby, if people are ready to participate in actions such as planning green areas and to express their needs. All the collected data should be considered for a better planning of green areas, especially for small green ones because of their dispersal in Bucharest.

*Keywords: urban planning, small urban green, PPGIS, green design*

# Urban Green Spaces and Accessibility: the case of Thessaloniki, Greece

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## Extended abstract

The social, economic, environmental and aesthetic benefits of Urban Green Spaces (UGS) for the urban inhabitants are well accepted and recognized in several studies, research work and policy papers. Moreover, the opportunities for equal access by all social groups and the balanced development in the context of environmental justice, gain more ground during urban and environmental planning. Despite the acknowledged importance of UGS, the current planning policies and practices show that the increased population density is likely to lead to degradation or even to shrinkage of UGS.

This paper analyses the current situation of UGS in the city of Thessaloniki (in terms of availability and quality), the main preferences regarding the use of UGS and how a large infrastructure project, such as the Metro of Thessaloniki, can influence their development and use. The study focuses on the accessibility of green spaces as well as on how their accessibility can differentiate and support the visiting preferences/decisions of the residents. As the Metro of Thessaloniki is not yet operational, the analysis is based on the existing preferences survey for the city of Thessaloniki and on the review of the relevant literature.

Some facts regarding the UGS in the city of Thessaloniki is that the share of green area per person is only 2.6m<sup>2</sup>. Moreover, the size of UGS is usually quite small, as only 30% of them are larger than 500m<sup>2</sup>. This shortage and fragmentation of green spaces poses significant environmental and health impacts (e.g., impact on air quality) and lower resilience on climate change (e.g., urban heat island effect). Based on a recent study, the citizens of Thessaloniki used to travel about 1.8km (measured in Euclidean distance), while only 20% of the sample is visiting a green space at a distance equal to, or less than, 400m, which is a commonly used distance indicating accessibility (i.e., walking distance) for all age groups. As a consequence, one in four residents never walks to an UGS as it is forced to use some means of transport (car, bus, bicycle, etc.).

Considering also the Transit Oriented Development approach for the metro stations, the paper evaluates how the existing and planned UGS can be influenced by the operation of the metro via easier, safer and more convenient access as well as by the use of improved transportation means, like bicycle and walking routes. This article therefore intends to contribute to a reconsideration of the current urban planning strategies and to the development of new green spaces in the urban environment of Thessaloniki.

*Keywords: urban green spaces; accessibility; sustainability; urban planning; Metro of Thessaloniki*

# Sensory and sensitive aspects and approaches in ecological urban production

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## Extended abstract

The proposal presented here starts from the hypothesis that two mechanisms are at work today in a concomitant manner in the processes of production of space, potentially having a strong impact on the sensory and sensitive dimension relating to these processes. These two mechanisms are: the aestheticization of urban worlds and the consideration of contemporary environmental issues accompanied by an increased awareness of environmental issues and their necessary integration into the processes of making spaces. We consider that the impact of these two concomitant processes would potentially lie both: (1) in the consideration of the sensitive in the design process of projects with environmental issues (and therefore a priori in a large number of projects currently in progress in French territories), and (2) in the perceptible effects produced and experienced in the spaces in question, by their inhabitants and users.

In this context, the research "PROSECO - Sensitive urban PROduction. From design to experience: environmental and political issues of Sensitive approaches in COntemporary projects" (funded by the French National Research Agency) aims to provide elements of understanding the place of the sensitive aspects and approaches in the urban production processes that include environmental objectives (as éco-districts, green and blue infrastructures, parcs, climatized urban places etc.) – understanding that is to consider from the formulation of a development project (urbainstrategie, planification, programming and command) to the sensitive experience of this space, its uses and appropriations.

Thus, one of the four objectives that structure the project is to understand the place of the sensitive aspects and approaches in the ecological design process - for the stakeholders (cities and other local governments and stakeholders) but also for the designers (architects, landscapers, urban designers...). In order to respond to this objective, the methodological approach is a qualitative survey with professionals (approximately 5 to 8 interviews and walking interviews for each field; and one seminary field) in 11 fields (contemporary urban projects that have environmental goals).

As the survey is actually ongoing, to present communication proposes to present the PROSECO research and to discuss the first results of this survey in order to: (1) shed light on consideration of sensitive aspects in urban French ecological production; (2) on the relations made (or not) between sensory and sensitive aspects and approaches and ecological issues; (3) on developments and evolutions of space production professions by the contact with environmental issues.

*Keywords: sensory, sensitive, ecology, urban production, design, professionals, qualitative survey*

# Analysis of stakeholders' participatory perceptions of Thessaloniki's coastal revitalization plan

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## Extended abstract

A key goal of the Paris Agreement and the European Commission's (EC) Master Plan is to reduce greenhouse gas emissions which has an important global mission of environmental protection. Municipalities across Greece are in the process of adopting green infrastructure practices to revitalize environmentally-friendly communities, reduce the carbon footprint, mitigate pollution-related impacts and conserve natural resources. These practices include environmental revitalization, flood mitigation, brownfield remediation and other green practices. Research has shown that stakeholder engagement is a pivotal element of positive outcomes in the implementation of environmental mitigation which include land and infrastructure regeneration, environmental resilience, brownfield remediation and other environmental impacts. This research examines stakeholders' perceptions and awareness of the ongoing Thessaloniki Coastal Revitalization Plan. It also offers strategies to promote inclusive and equitable stakeholder engagement in environmental policy.

As part of the European Commission's spatial planning goals, the Regional Authority of Central Macedonia conceived and adopted a strategic plan for the coastal zone of the metropolitan area of Thessaloniki, namely the Special Urban Plan (SUP) Thessaloniki's Coastal Zone. This redevelopment project involves 10 municipalities which covers a 40-kilometer (≈25 miles) area along Thessaloniki's coastal zone. However, no actual stakeholder input or participation occurred as the SUP was imposed upon the stakeholders. In response to this issue, a comprehensive review of the literature served as the foundation for best practices in stakeholder participatory processes and equity in environmental decision making. Note, this research categorized stakeholders into three key groups: citizens, public agency officials, and private investors and developers.

Further, limited literature exists on how to best incorporate and evaluate participatory activities in environmental systems and redevelopments. This research adds to the literature, filling this gap by utilizing Arnstein's ladder as an evaluative framework to measure stakeholders' perceptions of participation in developing Thessaloniki's Coastal SUP and environmental restoration in practice. It is important to understand how the extent of participation in project decision-making may promote or hinder redevelopments.

Stakeholders' participatory perceptions of Thessaloniki's SUP are accessed using semi-structured interviews and surveys. Arnstein's ladder of participation was utilized as an evaluative framework of stakeholders' perspectives of participation and empowerment in the coastal redevelopment project. Primary data are analyzed from semi-structured interviews and surveys collected from stakeholders. Secondary data sources included review of literature, historical records, the internet, journals and newspaper articles.

Overall, this work offers participatory strategies and contributes to the limited research devoted to stakeholder engagement in environmental systems and green infrastructure decision making, policy, and planning. The study's guidance for environmental policy development could also serve as a foundation for equitable and inclusive environmental stewardship.

*Keywords: stakeholder participatory processes; urban revitalization; stakeholder engagement; urban planning; environmental policy*

## Book of Abstracts

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# Bioclimatic Urban Planning in Dense Building Conditions. Application in an area of Athens

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## Extended abstract

Depending on the scale of the urban environment studied, bioclimatic design is distinguished in architectural and urban planning. The architectural bioclimatic design is widespread and focuses on the scale of the building. On the contrary, in the bioclimatic urban planning, the study expands throughout the city with a minimum scale of the building block. In addition, the bioclimatic urban planning perspective is what significantly determines the impact on the building since –regardless if it is designed to utilize the ideal environmental benefits– it will not be able to meet the targets set if the neighboring buildings do not allow access to insolation and ventilation.

This current research has as its object of study the urban planning and specifically its bioclimatic perspective. The ultimate goal is the creation of urban models that will ideally combine the implementation of bioclimatic criteria and the preservation of the character of a compact city. The research and study framework focuses on the Greek area and cities. During the implementation of the research, a bibliography study was conducted first, whilst after its completion a practical application was carried out in a selected study area. According to the methodological approach followed, the scientific work is developed in three sections.

The first section is introductory and it is divided into three chapters. The first chapter refers to the microclimate of Greek cities, the factors that shape it and the concept of bioclimatic planning is introduced. In order to shape a tangible example on which the study will be carried out and solutions will be proposed, the second chapter presents data on the residential development of Greek cities, their morphology and the environmental problems identified in them. This chapter concludes with a description of the historical development of the institutional frameworks regarding urban characteristics as well as the existing regulations that govern the urban regenerations of environmental interest.

The second section is the basis of the bibliographic study and is also divided into three chapters. In the first two, data that highlight the importance of utilizing the sun and air in urban planning are extensively analyzed. In addition, concepts relevant to the work related to natural insolation and ventilation are clarified. In the last chapter, historical and modern examples of bioclimatic urban applications in Greece and abroad are presented, as well as descriptions of institutional frameworks that exist in other countries and finally a small commentary is made in comparison with the Greek reality.

In the third and last section, the findings of the bibliographic study are applied, in a specific block of the Municipality of Athens. In a first level of planning, an evaluation of the current condition of the plots is made, through experimentation in certain urban planning parameters. At the second level, complete redesigned urban models of the building block are proposed and the most ideal ones are selected. The work is completed with the presentation of the conclusions, possible concerns and that of the broader vision behind the original idea.

*Keywords: bioclimatic urban planning, compact city, insolation, solar exposure, ventilation*

# Water Sensitive Urban Design strategies and tools for sustainable water management in Mediterranean historical centres. Application in the Old Town of Corfu, Greece

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## Extended abstract

In the light of climate change and the occurring extreme weather events, water-related environmental problems, such as water scarcity, drought and floods, are proliferating. To evaluate their effects and address them, both their intensity and spatial distribution must be taken into account, as they present important similarities but also many local peculiarities. Urban planning and design in the past did not give the adequate importance to water management issues in the urban environment, as they were mostly addressed in a purely technocratic way. Since the 1980s, in the context of sustainable water management and minimization of the urban development negative impact on the water cycle, various holistic approaches to urban planning and design have been developed, proposing resource-saving and climate change crisis-response water management strategies, tools and techniques, one of them being Water Sensitive Urban Design (WSUD).

The aim of the paper is to assess the specificities of the water-related environmental problems in the Mediterranean – and especially Greek – historical centres and explore the adequacy and applicability of WSUD strategies and tools to address them, through the case study of the Old Town of Corfu, Greece. The research is based on bibliographic material and extensive field research in the study area to evaluate the current situation and identify the local water-related environmental and management problems through observation, cartographic and photographic material, and collection of data and archival material from involved stakeholders.

Mediterranean historical centers are densely populated, with small-sized open spaces, old building stock, and extensive but mainly degraded water supply and sewerage infrastructure. However, they present various traditional sustainable water management techniques, especially concerning the rainwater collection and reuse. The paper concludes that despite the particularities of the historic urban environments, most of the WSUD strategies and tools could be applied – with few exceptions due to the size of the available open space and the typomorphological characteristics of the building stock – mainly focusing on underground constructions, fragmented interventions on the ground level, as well as the residents' and visitors' education and awareness. In general, an integrated sustainable water management plan for historical urban environments should require: a) reforming of the so far water management system through the cooperation between different bodies and stakeholders and the participation of the users; b) overall consideration of the urban space - both historical and modern - by adopting strategies and tools at different scales; c) both constructive and non-constructive strategies and tools adapted to and inspired of the local climatic, geographical and socio-spatial characteristics; and d) enhancement of traditional techniques and reuse and reintegration of ancient infrastructures into the contemporary life of the historical centres.

*Keywords:* Water Sensitive Urban Design; sustainable water management; environmental urban design; climate change; Mediterranean historical centres; Corfu



## **URBAN CULTURES & PUBLIC OPEN SPACES**

**CHANGING  
CITIES**



**Changing Cities V, Corfu, 20-25 June 2022**

# Urban space and carnival: centre and neighbourhoods, old and new city of Athens 1834-1940

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## **Extended Abstract**

In this paper I'm going to explore the spatial dimensions of Athens' carnival and their change in the course of a century. My analysis will be based on two polarities. Firstly, that of old city and new city, which was the basic contrast in the structure of Athens up to 1870 and was related to the contrast between traditional and modern culture in the celebration of carnival. Both old city and traditional culture were increasingly undervalued and denounced until the interwar years, when a nostalgia was developed for old places and practices and "the carnival of Old Athens" was organized in Plaka neighbourhood by the municipality, the Tourism Organization and a residents' committee.

The second major contrast is that between the centre of Athens and its periphery. There was a strong tendency towards concentration of carnival events and crowds in the centre of Athens until the 1900s - particularly after the establishment of a central parade from 1887 onwards, organized by an upper bourgeoisie committee. This development of concentration is correlated with the reinforcement of the middle class and its cultural hegemony. A new cultural autonomy of the neighbourhoods of the popular classes occurred in the interwar period; however, this did not result to the revival of popular carnival culture.

*Keywords: Athens; centre; modernity; hegemony; middle class*

# The social, economic and environmental impacts of Stavros Niarchos Foundation Cultural Centre (SNFCC) on Athens urban redevelopment

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## Extended Abstract

The main purpose of this article is to investigate and present the local and national social, economic, and environmental impacts of the construction and operation of the Stavros Niarchos Foundation Cultural Centre (SNFCC) on Athens urban redevelopment. The recent major economic upheavals have set the stage for the implementation of alternatives to urban sustainable developments. The creation of cultural clusters in abandoned urban areas works as a growth lever for both the application area and the city as a whole. Culture has played a critical role in the development and implementation of urban regeneration programs for more than two decades. The cultural clusterbus constitute the central pillars for a city's development and long-term viability. The wide range of activities available contributes to the city's image and competitiveness.

Moreover, there is an increasing need to conserve resources and energy in the operation of these cultural clusters. The use of models and principles of environmental sustainability is critical for their development. The combination of cultural clusters with green open places improves the inhabitants' quality of life as well as the visitor experience. The SNFCC's building construction and the development of the park, which covers 85 percent of the area, have both contributed to the improvement of urban space and residents' lives. Such a large project also contributes greatly to the region's economic development and attraction of investment.

The paper includes a thorough analysis of the SNFCC's policies and their immense influence on visitors and inhabitants. It will also provide an insight into the vital role of the SNFCC policies, measures, and regulations in the way of dealing with the new conditions the pandemic emerged. Adopting an integrated methodological framework, an analysis of the literature, reports from the SNFCC, and an in-person survey has all been part of the research approach.

The article aims to promote the SNFCC as a global model of environmental, economic, and social sustainability. The paper's conclusions indicate that the SNFCC project has been widely regarded as a modern international cultural destination and a prominent global landmark benefiting visitors, art, science, and the environment.

*Keywords: cultural clusters; cultural destination; economic impact; social impact; environmental sustainability; spatial redevelopment*

# Street Walkability: Students' Daily Walk to School - Um Al Sharayet Neighborhood-Palestine

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## Extended abstract

Street walkability is an indication of the suitability of the built environment to walking. There is currently much talk about creating walkable environments and improving walkability. Such views are meant to solve diverse problems including traffic congestion, environmental injustice, and social isolation. Focusing on the school students' pedestrianism in Palestine, it is noticeable that the daily walk to school is not any more desirable for parents and students. The paper will explore the pedestrian experience of school students' in Um Al Sharayetneighbourhood in Al-Bireh city, through investigating their perception of their daily walk to school. The aim of this study is to define the school students' assessment for the neighbourhood's walkability, based on studying the following dimensions: the availability and adequacy of sidewalks and pedestrian crossings, attractive street fronts, safety, calm traffic, and cleanness. It also aims to define the school students' needs and preferences of their daily walk to school.

The study area is Um Al Sharayetneighbourhood which is located in the south-western part of Al-Bireh in the middle of the West Bank. It is under the administration of Al-Bireh Municipality, with a population of 12,000 (Al-Bireh Municipality, 2016). It is dominated by a large number of apartment buildings with inadequate services and infrastructure. This neighbourhood was selected due to the fact that students are walking to their schools, besides its distinctive condition as an example of rapid and uncontrolled urbanization.

The study is based on exploring the students' mental images and memory of their daily walk to school based on Lynch's imageability. This theoretical approach will provide deeper understanding of the students' experience of their daily walk to school, and their sense of place. Lynch theory of imageability will be useful for investigating the students' image of their neighbourhood streets and their perception and evaluation of the neighbourhood walkability in order to assess the school students' pedestrianism dimensions including safety, cleanness, comfortability, attractiveness and livability. The research methodology includes observations of the school students' daily journey to school, in addition to a workshop with school students to investigate their daily journey to/from school and their neighborhood. Finally this paper will draw a conclusion on how school students perceive their daily walk to school and their neighborhood walkability, and provide recommendations to enhance the students' experience of daily walk to school.

*Keywords: walkability; school students; mental image, Um al Sharayet, Palestine*

## Cross-boundary merger of public and private dichotomy

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### Extended Abstract

Public, open space is the realm of public life, the space of spontaneous encounter and social activity. It provides an occasion for people of different backgrounds to come together on a daily basis. As such, it constitutes a viable arena for being in and belonging to the world. On the level of neighborhood, it designates the space that can potentially foster social integration and strengthen community bonds. Whilst much research focuses on the design of public open space, less attention is paid to the equally important aspect of boundaries that mark out public and private, open space. They are important not only because their characteristics determine how residents respond to them but also because they provide useful insights on people's perception and attraction to public open space across the divide. The research aims to investigate boundaries separating public and private, open space and their transformation in time. The objectives are to establish their spatial characteristics, study them in relation to human perception and cognition and record their multi-faceted transformation in time through human interaction.

Drawing upon analytical research conducted in a governmental housing settlement for the displaced in Nicosia, Cyprus, morphological characteristics of boundary line types are established and their multi-faceted transformation through time elaborated. In the present study, spatial boundaries are interpreted in the light of human perception of space and their intrinsic definition of here and there. The necessity to move between spaces distinguished by boundaries renders them permeable to varying degrees. These are observed by residents as edges that can act as barriers as well as seams and open up affordances that provide possibilities for action. Multiple reinforced, dented, perforated or bridged boundaries display human inhabitation. Dwellers' needs and desires are expressed through assemblages and spatial appropriations on or along those boundaries. Former straight boundary lines are breaking up and partly shifting towards public, open space. This has not only made activities in both, public and private open spaces, more visible to either side. It has also enhanced the physical connectivity across the separation and even transferred former activities in private space to public ground.

Boundaries are, hence, subject to humans' interactions with space and potentially nurture human interpersonal relations in space. The study concludes with an outlook on a continued strengthening of community bonds based on a novel re-interpretation of the spatial configuration of boundaries, reading them rather as seams that are joining the spatial divide beyond legal and normative concepts of separation.

*Keywords: boundaries; public open space; private open space; human interaction; public life*

# Underground Space and Street Art towards resilient and sustainable infrastructure

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## Extended abstract

Cities are shaped and re-shaped dynamically, through spatial and social interactions that occur and develop among places and people, and the way they inhabit them. Graffiti and street art are urban phenomena that illustrate and reveal these socio-spatial interactions. While they are formed by other cultural, historical, and aesthetic components of a place they become part of that place over time.

At the same time, they can be used as a tool to disseminate ideas, challenges, and memories in cities, whilst being an expression of urban space and its governance. They constitute visual signs of the city and thus challenge the existing urban aesthetics while producing new social narratives and counter-narratives in place. As a practice, they have been primarily associated with the public expression of the marginalized other, one that disrupts the visual landscape of the city. Nowadays, graffiti and street art have become popular and are recognized as expressions of contemporary art, finding their ways in galleries, art fairs and public spaces as acclaimed commissioned artworks, balancing between the mainstream and the marginal (Paraskevopoulou A., 2020).

Often graffiti can also be found in pedestrian passageways and tunnels. Underground space is part of the built environment and often as infrastructure (constructed through mining and tunnelling), specifically in urban settings, where a major application is transportation infrastructure. However, there is a growing number of other underground applications such as utilities, geothermal energy, groundwater resource, storage, parking, and even public recreational facilities (such as swimming halls and sports centers) and underground farming. The processes of urbanization ask of a comprehensive understanding, re-thinking and reshaping of the underground spaces that become even more vital and crucial in the urban transformation of our cities, considering overpopulation and extended density figures that urban settings suffer from. The ‘right to the city’ defined from Lefebvre (1996) as the “right to change ourselves by changing the city” in order to achieve urban and social transformation, transcends from the over ground spatiality of our cities to their adjacent underground spaces. There is consequently the need of changing the public perception of the underground space of that being a welcoming and friendly environment, that fosters social interaction and inclusion (Paraskevopoulou et al., 2019).

This paper examines how street art and underground space can work together and add social value to existing urban environments by contributing to resiliency and sustainable smart cities (by means of specific examples that are further analysed). Conclusions on ways of creatively re-thinking the urban (underground) space and making it more human-friendly by changing the existing public perception are drawn.

*Keywords: urban city; public space; street-art; urban sustainability; resilience; infrastructure; underground space*

## Community placemaking: A critical perspective

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### Extended abstract

Placemaking is a rapidly evolving practice for initiating urban change and adapting public spaces to the needs and characteristics of local dwellers, businesses and visitors. This practice had risen since the mid-1990s as an alternative to comprehensive long-term planning. However, its seeds go back to the 1960s, when the awareness of good urbanism's characteristics started to rise. The rejection of top-down, strictly designed modern planning processes has led placemaking to the opposite end. Thus, there is no agreed definition for the process and scope of planning and creating placemaking projects. Various methodologies and local influences are operated and the active members are free to adapt the pace and process characteristics to the specific case. This freedom is part of the leading philosophy in the absence of a definite work process.

In the last decade, placemaking turned into a widespread practice in Israel. The relatively easy and immediate nature of placemaking makes this practice attractive to various stakeholders. This research investigates the application of placemaking in non-metropolitan areas, where local actions with a relatively moderate budget seem to appeal to various stakeholder types. We examined a variety of placemaking projects conducted by local governments, NGOs and local activists. Our qualitative research methodology included in-depth interviews with placemakers and planners, project observations and document analysis.

The study found four models of placemaking, influenced by two main axes: the goal axis, which ranges from a broad community goal to a narrow, focused or predetermined aim, and the motivation axis, which goes from internal motivation to external motivation. The combination of these axes delivered four types of community placemaking. Besides the original, mainstream community placemaking, formed by a broad community goal and internal motivation of the lacemakers, we found governmental, artistic-economic and segregative placemaking. Governmental placemaking is motivated by the desire to change a place in a specific direction and manifest governmental presence. Artistic-economic placemaking is driven by the placemakers' wish to express themselves, often as a tool for self-publicity and self-marketing. Finally, segregative placemaking is conducted by a specific group aiming to strengthen the attachment of its members to the place. Unlike the classical model, this type involves the (sometimes unintended) exclusion of others, living at the place and using it.

Despite dealing with community placemaking, the various models presented here differ regarding the placemakers' identity and attitudes and how this technique is applied. Acknowledging these models has far-reaching practical implications for the planned space and the ability to realize the community goal, defined as the primary goal.

*Keywords: Community placemaking; Neighborhood change; Critical perspective*

# The role of digital media in funerary rituals in contemporary urban spaces and its connection to the post-mortem photography of the 19th century

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## Extended abstract

The access to specific geographical locations and human activities had been hugely restricted during the covid-19 pandemic. Hence, the concepts of distance and proximity have changed. At the same time, the use of photography and digital media has been increased enormously in almost all levels of people's social and personal lives. Image is, amongst others, a reflection of reality, thus it has the ability to simulate places and minimize distances, while being a powerful tool that helps people perceive facts more effectively. In this light, the present study focuses on the use of digital media in contemporary funerary rituals and its connection to the 19th century post-mortem photography.

Restricted access to funerary rituals has been a major issue in the last two years. In addition to being an event of social and personal significance, a funeral is also a spatial phenomenon, since the place it is held is strictly defined. While most social events were postponed during the pandemic, funeral and burial ceremonies were the only rituals that could not be cancelled or postponed. They were held with many restrictions, the most common being the number of people allowed to attend. This led to innovative solutions in terms of virtual attendance at funerals and burials. The new trend that emerged was the video live streaming of the funerals. This practice was often offered free of charge by several funeral homes and allowed the extended family and friends to watch the ceremony, giving them the opportunity to pay their last respect. The recorded audio-visual material could also be used in the future to help mourners come to terms with the loss of their loved ones and cope with their grief.

This potential result is being studied as a later version of post-mortem photography, a practice that began in the mid 19<sup>th</sup> century, as soon as the photographic technique was invented. Photographing the dead soon became widespread. It was a unique opportunity to capture the facial characteristics of the deceased and preserve their memory. In addition, post-mortem photography was used to verify death to distant relatives, as if it were a death certificate. Photographs of the dead helped those left behind to cope with grief and loss at a time where people had a completely different perception of spatial and distance than they do today and the use of image had significantly less involvement in people's lives, than it has today.

*Keywords: spatial distance, image as heirloom, post-mortem photography, visual culture*

## Children as marginalized residents of the city

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### Extended abstract

The society as a form, a priori tends to marginalize and confine the activities of those who are considered weak, we live in the city of the privileged which is not interested in create a place where differences coexist. The only social team that can survive in a world characterized by privatization and trade, are the consumers. The rest are social groups that are considered undesirable or potentially dangerous. The women, the homeless, immigrants, sexual minorities, children and young people are some of the social groups excluded from the public realm.

Particularly, children are identified as uncompleted individuals and do not belong to the public sphere. They are then treated as naive, innocent and unable to move safely due to a number of road traffic hazards and the physical or sexual violence they may encounter. Thus, they are not equally considered as citizens, but rather as citizens-in-the-making. Constantly being protected and supervised, they have adults carry out certain decisions on their behalf. In the so called 'western societies', the state defines the children's daily program, the kind of knowledge they should get and the time that is left for them to play. Thus, the children aspire to adulthood, when they are supposed to get their rights, their freedom of expression and limited surveillance over their acts.

This problematic norm, can be easily reflected in many factors of the social mechanism, such as the city planning. Cities are designed for adults and are completely occupied by them and very little concern is given to infrastructure that is relevant to young users. Places that meet their needs and scale, but also the ones that activate their stimulus energy and the imagination without limits. Instead, not only the absence of playscapes is noticeable, but also, the few playgrounds that are finally designed lack openness. They end up and working as cages, with fences and oversight. With play being a very important process in the development of children as complete, socialized personalities, this is definitely concerning. In a microscale, even the houses and apartments are designed for the needs of adults. As a result, every space that children live in, becomes inaccessible to them.

Instead of an attempt to create conditions in the city that will make it more friendly and welcoming to young people and children, we suffice eventually to their exclusion. But how can a society function effectively when the future citizens are not considered equal members and must live in environments where their needs and desires are not fully taken into consideration?

*Keywords: exclusion, children, playscapes, minorities, play, city planning*

## Streets and pavements as the territory of everyday public life: Reflections from three European Cities

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### Extended abstract

Since the early 1970s, the study of urbanity and territoriality has shifted from the level of urban form, to the level of the street and how life unfolds between buildings. Numerous studies have demonstrated the multifaced concept of territory. Territory manifests in the act of inhabiting, to dwell in a place, and particularly in the act of occupying (being in a place) relating to possession and control, or possibly dispute and tension. In this context, streets are considered the territory where public life unfolds and takes form, while pavements are the intersection; the superimposition of the public and private domains. All these are defined by density, building typologies, street patterns, and are determined by local urban, cultural, social, and political characteristics.

Our contribution will present these theoretical concepts and explore them in three European cities: Barcelona, Cardiff and Athens, through intersecting morphological and phenomenological methods. We argue that the three cities represent three different cases on how social, political, and cultural arrangements are portrayed in the image and quality of public space in terms of pattern, design, and materiality. In Barcelona, public space is fundamental to the social and cultural life of the city reflecting a sense of civic pride, and the aim of social inclusion that dates from the period of the transition to democracy. In Cardiff, social policies have little presence on the streets and until recently, public space has been a secondary priority whilst the public life at the intersection of domains reflects the cultural life defined by a pragmatic approach to materiality and management. In the case of Athens, the street patterns and design are a result of the uncontrolled expansion of the private sphere into the public space, and this is portrayed by the lack of quality of sidewalks-pavements and the narrow street patterns that are typical of the city. Our analysis will be based on the link between cultural and social arrangements, the historical characteristics of the cities, streets and public life, city design, and materiality.

Understanding streetscape design, and the commonalities as well as differences between different urban environments, is important in order to address current and future challenges of the cities. Climate change adaptation and resilience approaches require severe changes in the way we live and dwell in the public space. Linking these broader discourses around the urban development trajectories of the three cities, we will inquire how this debate has evolved during the last years and through the Covid pandemic.

*Keywords: streets; pavements; urban strategies; public space and life; European cities; territory;*

## Urban Space into the Age of the *Liquid*

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### Extended abstract

The question of urban spatial dynamics is, once again, gaining relevance. On one side, there is the growing complexity of contemporary urbanisms, and on the other, a rapid augmentation in informational and communicative overlays with significant agency over urban life. The contemporary city, today, cannot be addressed as a single enclosed entity. It is rather a system of reciprocal ecologies which constitute geographical, cyber and temporal strata. This renders spatial interventions in the urban milieu significantly stringent. TheRE raises the urge for novel understandings of urban space, its constituents and dynamics. The renders the necessity of unraveling operative spatial layers of contemporary urban space and their reflexive dynamics timely and momentous.

As an inquiry into spatial layers and dynamics, the present study, examines what it conceptualizes as “urban fractals.” An urban fractal, referring to Bauman’s conception of “Liquid Modernity”, is defined, hereby, so as to refer to significant illustrative instantiations of urbanism, as well as to representational spatial interstices within and through which multiple layers of space transect each other. The work, visiting a series of urban fractals, opens contemporary means, mediums and domains of production of urban space to debate. In that, it departs from the now-classical Lefebvrian tripartite breakdown of space: conceived space, perceived space, and lived space. From there, it moves and expands towards Zygmunt Bauman’s fluid definition. Therein, it propounds a conceptual mapping of solid-liquid, stable-non-stable, animate-inanimate, real-cyber spatial dynamics. This derives from a comparative and critical inquiry over the depicted fractals.

The study reflects on three specific urban fractals from Istanbul: The Gezi Park (protests), Tarlabasi Neighborhood (transformation), and Hagia Sophia (conversion). All three involve significant spatial, social and representational histories which also became grounds for socio-spatial debates and conflicts. These are visited both as instantiations and interstices that portray rich stratifications of spatial practices. From a spatio-temporal perspective that addresses various resolutions, the work elaborates on the trajectories of their spatial exploitations. In that, the study highlights the change in the essential elements of thinking about these places in relevance to shifts towards fluid modes of urbanity. These elements are further discussed in reference to layers and reciprocities – permanent, provisional and probationary – that constitute contemporary urban space. This discussion is conducted through a series of binary concepts: reality-perception, endurance-stamina, autonomy-agency, and permanence-transience. The work, at the end, intends to open up room for discussions on the changing and emergent dynamics of space production in the age of Liquid Modernity.

*Keywords: Liquid Modernity; Production of Space; Urban Space*

# Spatial qualities for urban open spaces: Transport corridor of Ankara, Turkey

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## Extended abstract

Cities and urban open spaces are places where the individual and the community coexist and which are meeting points for people from every walk of life who have dissimilar characteristics and interact socially. The individual maintains his/her socio-cultural life in these open spaces within the urban-physical construct and with the activities he/she experiences in these places. The relation of the city dwellers with the physical environment, their perception and interpretation of the space, and their behaviour in this physical environment play a vital role in shaping urban spaces. Physical environments which create various activity opportunities for the community and the individual, which are shaped by the expectations and needs of the community and which provide urban open space experience accessible to everyone matter in terms of the sustainability of urban design and overcoming urban problems.

In line with this significance, the aim of this study is to determine environmental problems in urban open spaces laying emphasis on the relation between structure and urban space. In this context, the space of transport corridor, selected as the study area, which has shown significant development in the city of Ankara, Turkey is a problematic area of the city in terms of planning principles and the setting formed by communal and environmental data. In cities that develop fast, as in Ankara, the unplanned development of the cities and the fact that urban open spaces lose their significance in parallel with the unplanned development of the present structures have resulted in the dissolution of sustainability in urban spaces. Accordingly, re-evaluating the new urban space formations in the city, the location, formation, sustainability of these urban spaces and the fact that they are a means to the realization of social interaction within the city constitute the fundamental discussion part of the study. For the success of spatial qualities, the relation of urban space activities and the sustainability of the urban area of urban open spaces, concepts related to the subject matter were scanned within the scope of the study, and these concepts were supported with quality measuring criteria. Quality measurement criteria have been created based on the studies conducted by researchers in the literature. As a result of the acquired data and analysis in the study area, the qualities of the urban spaces were found to be directly proportional to the activities taking places in that area, socio-economic input and the provision of the sustainability of that area.

*Keywords: Urban open space; spatial quality; urban space activity; urban design sustainability*

# Reclaiming public space: observing open spaces through COVID times in the city of Volos

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## Extended abstract

In urban planning, public and private spaces are defined and distinct, but the boundaries between them are often ambiguous. Public space reflects the society that shapes it, therefore the permeation of private functions in it reveals a tendency to privatize everyday life. But what happens when private functions cease to exist as a pandemic emerges? In this context, aim of the present paper is the research of the boundaries between public space and food and beverage outlets and the way in which these were affected during the pandemic by the behavior of people towards public space. During lockdown due to COVID-19, with the F&B outlets closed, people adapted to the new status quo in an attempt to maintain their social activity. As a result, public spaces inevitably overflowed. In order to determine the impact of the pandemic on the public-private relationship, three characteristic points were studied in the city of Volos: “Pezoulia”, the intersection of Koumoundourou and Kodaratou streets and the district of Palaia.

Primarily, Pezoulia, a linear public space that develops along the coastal front and acts as a resting and gathering place, is examined. During the pandemic, its function as a space for socializing was amplified as it received heavier flows of users, which resulted in the intensification of the pre-pandemic situation. Secondly, the intersection of Koumoundourou and Kodaratou streets, where multiple cafes and restaurants use the sidewalk to place tables and chairs, is studied. Amid the pandemic, with F&B outlets exclusively functioning as take-away, multiple customers after buying their drinks, gathered at the intersection, turning the designed walking area into a meeting point. In this case, a placebo effect of the former condition is observed, with users attempting to recreate the previous situation set by cafes and restaurants. Finally, Palaia, the historical district of the city, where many restaurants and bars are located, is examined. In Palaia, a phenomenon of diffusion of the boundaries between private and public space is detected, as restaurants place their tables along the pedestrian street. During the pandemic, people attempted to restore social space, with spontaneous assemblies taking place along the sidewalk. The choice of the aforementioned places is based on the fact that all three are distinct and characteristic districts of the city which became points of interest during the pandemic.

The research results in the observation of a momentous and spontaneous reclamation of public space, which lays the foundation of redefining the way we think of and design the spaces that host everyday life in order to work towards socially resilient cities. Considering the functional, anthropological, social and aesthetic effects of COVID-19 on public space, the pandemic era is examined as an occasion to challenge sovereignty over public space, triggering a critical reconsideration of the topic of the city's open space.

*Keywords: boundaries; public – private space; reclaiming public space; COVID-19*

# On Togetherness & threshold spaces: the shared courtyards of Nikea

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## Extended abstract

Europe has never been homogeneous and is increasingly becoming more culturally, ethnically, and religiously diverse. In 2018, 2.4 million people migrated to Europe from outside of the continent, while 1.4 million migrated internally. The diversification of European cities can be an opportunity for increased tolerance and bilateral exchange, or it might lead to conflict and fear. Creating a better understanding of how public spaces in urban neighborhoods can facilitate tolerance is thus an interdisciplinary critical research field, drawing knowledge from geography, decolonial urbanism, transition design, and social sciences, and has the potential to inform local policy. However, the interrelationships between people and place are highly contextual and situated. In this article, I explore contested notions of togetherness, otherness, and social cohesion, and how they manifest in threshold spaces – between private and public – by bringing together situated knowledges about public space in the municipality of Nikea, in Greece.

After the Minor Asia catastrophe, the compulsory exchange of populations between Turkey and Greece – specified by the Lausanne Convention in 1923 – led to a massive population influx in the Greek state, leading to a housing crisis. One of the areas developed to accommodate the refugees was Nikea, in the west of Attica. As most Asia Minor refugee settlements, Nikea developed quickly through different mechanisms, creating a plethora of minimal housing typologies. A key part of the building blocks' typology were the shared internal courtyards. In the past, the courtyards often facilitated shared laundries, wells, and informal gardens. They became an extension of the houses, allowed for sharing and created threshold conditions between public and private.

Over the last century, Nikea has transformed significantly and evolved to a diverse urban landscape with socio-economic disparities within its population. The neighborhood's popular narrative and identity is highly tied to the history of the Asia Minor catastrophe, as it was the reason of the neighborhood's original settlement, with lasting implications in the area even 100 years later. Nevertheless, Nikea's changing demographics showcase a rising population not of Asia Minor decent, many of whom do not have Greek ethnicity and who seem to remain outside of the constantly reproduced narrative of the city. Spatially, the area is also undergoing significant urban changes, including a new subway station and the regeneration of several courtyards.

Within this context key questions arise about the shared courtyards in the ways they have transformed over time, how they have been used and appropriated by residents throughout time, and how different demographics interact within them today. This article will present some initial insights regarding these key questions, as they arise from an in-depth investigation on the field. For this investigation, I place myself as a resident and researcher within Nikea's transient context, after not living there for ten years. I aim to combine different research methods including mapping, observation, semi-structured interviews, and a self-reflection diary, as a way to overlay different situated knowledges about the social life of the courtyards.

*Keywords: threshold spaces; public spaces; social cohesion; togetherness; otherness*

## Urban markets and food at public open spaces

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### Extended abstract

On a walk through the city everyone can easily locate food courts. As an urban planner, my interest is focused on the study of selling food at the urban space of cities, analyzing the characteristics of the points and where this activity is located and concentrated. To better understand the study of spaces, a categorization of the types of outdoor trade is done first. Thus, we are talking about open-air markets and street markets, farmers market, organic market, marketplaces, or street vendors who either stand in a certain place, either move at intervals, or are constantly on the move. Urban markets are found in different places throughout the cities. Thus, different characteristics are found at central hubs and in city centers and others in neighborhoods and suburbs. At the same time there are differences depending on the variety of products (whether they are fresh or cooked), seasonality, weather conditions and the length of the day.

Urban markets are a regularity for cities, the feeling prevails that these places operate "always" and are a daily and simple operation of the city. Their survival can therefore be considered paradoxical, especially during the 21st century, when the predominance of large supermarket chains and large monopolies has greatly reduced small and medium-sized enterprises. Urban markets prove that they can adapt and evolve according to the needs and requirements of current events. Urban markets have once again proved how resilient are after surviving economic crisis and pandemics. The existence of open-air food trade in cities can offer many benefits to both the economy, the environment, and the inhabitants themselves.

Street food is a relative social innovation that has begun to develop new outlines that reveal the re-reading of the long tradition of food in many parts of the world. In the past, street food meant consuming cheap food that was quickly served as a thought in many daily activities. Today, eating out can also be a social event where people gather for food, having a conversation and socialization. Therefore, the phenomenon of social innovation is not understood as something that is deliberately designed, but as a result of daily social interactions and reshaping. They are also a major source of food for households and are often an economical, healthy, and safe solution. At the same time, they can have an important character in promoting the identity of a place. Gastronomic tourism and food festivals have become popular in many cities around the world, influencing the experience of travelers and residents.

Urban markets and open-air food trade are activities that you rarely study and need special planning with provision for accompanying infrastructure and multifunctional interventions. Finally, they are another solution to improve the quality of public spaces.

*Keywords: food; urban markets; street vendors; public spaces*

# Human activities in the city center during the Pandemic. The case of Aiolou Street.

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## Extended abstract

Public space is the material footprint of society and the pre-eminent field of development of social interfaces. The outbreak of the coronavirus and its rapid spread made it necessary to take drastic measures to protect citizens and restrict its transmission. The nationwide quarantine, the travel ban, the suspension of retail, but mainly the traffic ban and the restriction of citizens to move within a radius of just a few kilometers around their homes were decisive factors in reducing the individual and collective human activity. As a result, public space and especially city centers were deserted.

The purpose of this paper is to investigate the impact of the Covid pandemic on human encounters and activities in public space. More specifically, it captures and analyzes the way in which restrictive measures, during the pandemic, influenced the formation of new spatial conditions in the city center and focuses in particular, on how the change in the boundary between public and private space has had a decisive effect on the number and quality of human encounters and activities.

The case study for this research was Aiolou Street, as well as the urban voids around it. Being one of the most historic, commercial and busy streets of Athens, in which a number of business activities take place (trade, leisure, tourism services, etc.) its image through the pandemic becomes indicative of the entire city center.

The study was carried out with field research, through systematic mapping, using methods of correct observation of public space and human behavior in it, as well as systematic mapping of spatial boundaries and uses.

The research was carried out during the period of different restricting measures and was divided into 4 parts, depending on the current conditions and restrictions: the condition of lockdown, click away, open stores and open restaurants. For the best reading of the space and due to the different characteristics that are located along Aiolou, the mapping unfolds in three distinct spatial units: Unit 1 (Stadiou to Euripidou), Unit 2 (Euripidou to Ermou), Unit 3 (Ermou - Roman Agora).

The movement of pedestrians in all three sections of Aiolou Street, seems to have been significantly determined by the mutation of spatial boundaries through the pandemic, while the short or prolonged stasis of the people followed the pattern of movements.

Throughout the restrictions, the permeable boundaries of the space facilitated the inside - outside connection, creating the right conditions for the public space to function as a place where people meet and interact. The "unification" of private space with the public and the abolition of the boundary between them, created hybrid intermediate zones of intimacy within an impersonal urban landscape

*Keywords: City centers; coronavirus pandemic; restrictions; urban space observations; human encounters; public – private boundaries*

# Urban cultures and public open space: the interpretation of their values during Coronavirus period

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## Extended abstract

Nowadays, the pandemic period is a characteristic facet of the recent past era and in the meantime it is an ongoing condition with vulnerable balance of the relationships of any kind, mainly personal, social and with the place.

Basically, the technological progress combined with the demanding rhythm of daily routine creates the urban cultures. They are characterized by a fundamental need of connecting with the public open space, even merely with the orientation and the view perspectives. As the meaning of the place refers to the feeling of belonging to somewhere, to a space with discrete character, individuals and social groups have an unstoppable need to correlate with their environment developing interaction. Especially for urban cultures, public open spaces offer a kind of freedom, as well as a reminder of a healthy social life. The latter is a vital human need which emerges even under the daily pressure. Therefore, the restrictions of circulation and social interactions through the times of lock-down reinforce the assessment of the open space, where society can enjoy the social and spatial qualities, both natural or human-made and designed.

During the pandemic, the axles of socialisation, physical exercise, the feeling of belonging and mental health seem to be prone to unbalance because of the entirely new character of the universal phenomenon. As health is of primary significance, society faced unprecedented insecurity regarding the future and the means of getting through the challenge of the health system and of an unknown threat. At the really first months of the obligatory quarantine, even the open space would seem dangerous, as people preferred and selected the safe decision of resting at home. But, the need of social interaction, the physical need of the body to move and assess the qualities of the urban culture of which it is constitutional part, encourage people, individuals and groups, to evaluate the importance and uniqueness of public open spaces. People begun to discover and explore the city web with the squares, the parks, the walks and the options of exercise and even meditate outside the built walls. Respecting health security, public open spaces have established their character of outstanding value, offering the chance to interpret the living place of society, with the conception of space qualities designed in the urban fabric.

In order to assess the value of open spaces and their interactions with everyday social life which impact the urban wellbeing and the urban mindset during the pandemic period, quantitative research with questionnaires took place so as to collect the experience and the opinions of society respecting the public open space. Finally, the unknown condition of pandemic provoked reflection of the urban cultures for the indispensable value of the public open space.

*Keywords: urban cultures; open space; urban identity; urban fabric; pandemic; urban happiness*



## TRANSPORTATION PLANNING AND POLICY IN CITIES

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# Autonomous vehicles as a means of green transition in the EU policy framework and research activity.

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## Extended abstract

Climate change constitutes an increasingly urgent concern for modern societies. Countries and international entities, like the EU, are intensifying their efforts to alleviate its impacts and foster transition to a more environmentally friendly everyday practice. Mobility is a core component of production and societal processes of modern communities. However, it is one of the most polluting activities, with the transport sector being responsible for almost 30% of global CO<sub>2</sub> emissions. This has made governments and responsible authorities trying to find solutions on how it could take place in a more sustainable way. These include, among others, the wider use of alternative energy sources, the development of more energy-efficient vehicles and the optimization of the mobility system through better management and digital innovations. In the case of the EU, efforts to make mobility greener have been embedded in the “Sustainable and smart mobility strategy – putting European transport on track for the future” and the “Green Deal” Communications, as well as on other documents regarding transportation, energy transition and environmental sustainability. Research and innovation, brought by the extensive engagement of the scientific community, play a defining role in achieving the previously mentioned targets. First, there should be wide discourse on how these solutions could be implemented and which ways they will benefit society the most. Second, the examined solutions have to be tested in real conditions in order to define their actual benefits and the challenges in their realization.

Autonomous Vehicles (AV) constitute one of the leading innovations in making the transportation system more efficient and inclusive. At the same time, due to their complex nature and the vast number of challenges in their implementation, extensive research and testing is required for their successful introduction in everyday mobility. This paper constitutes a research about the integration of AVs in recent EU policy documents that promote sustainable development, energy transition and action against global warming, and its effect on boosting further research in this field. Initially, it is reviewed when, how extensively and in which policy documents over the period from 2015 (Launch of the Sustainable Development Goals and the Paris Agreement) until today AVs are included. By implementing a timeline with milestones that represent the publication of these EU policy documents, the evolution of scientific activity is assessed, in terms of the volume of publications and research projects conducted in the EU, by country and funding programme. Towards this purpose, the research is based on thorough literature review using text mining and targeted searches in various sources, including the TRIMIS database. Based on the above analyses, the assessment of the policy impact on research activity will take place in order to extract useful conclusions for policy makers with focus on AVs contribution to the green transition.

*Keywords: Autonomous vehicles; Sustainable mobility; Research and innovation; Green transition*

# Recommendations for promoting active mobility of young families in rural municipalities

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## Extended abstract

Climate change and environmental pollution are the biggest problems of our time. Emissions in the transport sector in particular are still increasing in a way that runs counter to all political objectives. The transport system should therefore be made more sustainable and efficient. At the same time, 33 percent of the Austrian population is physically inactive to an extent that negative health effects are to be expected (WHO 2018). To curb this development and protect the climate at the same time, it is necessary to promote physical activity in everyday life through more active mobility, such as walking and cycling.

How can a municipality simultaneously improve the quality of life and mobility of young families and do something for climate protection? This is the challenge addressed by the research project ANFANG (promoting active mobility of young families in rural municipalities). While in the urban environment various measures to promote active mobility are increasingly coming into the focus of research and planning, municipalities in rural areas still seem to be relatively untouched by this development. Young families (and expectant parents) are defined as a target group since a major biographical change is often followed by a shift in everyday mobility behavior toward the car. Therefore, this life stage is ideal for interventions. Findings by Thøgersen and Møller (2008) show that a not insignificant part of mobility behavior is based on past habits and thus parents influence their children's attitudes toward certain modes of transport (Ausserer et al. 2012). However, for sustainable, uncomplicated and safe mobility of parents, framework conditions in the municipality are necessary.

To gain deeper insight into behavior and needs, mobility data of households with children were analyzed and personal interviews were conducted. Based on this, guidelines were developed on how to promote active family mobility in rural municipalities with the participation of decision makers and concerned residents. A checklist is provided to analyze the current infrastructure with regard to family-friendly active mobility. Based on this, strategies and suitable measures must be developed in a participatory process with young families, accompanied by targeted public relation work. For this reason, the guidelines include a comprehensive list of possible measures. Guidance is given on the evaluation of possible effects of measures, which serve as a basis for reflection or adaptation of the objectives and corresponding strategies for further development in the municipality.

*Keywords: active mobility, sustainable transport planning, families, participation process*

# Measuring the transit-oriented development readiness of metro station areas in Thessaloniki, Greece

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## Extended abstract

The concept of Transit-Oriented Development (TOD) is an integrated urban and transport planning approach that aims to mitigate the use of private vehicles, enhance public transport and promote sustainable urban mobility. High accessibility, soft mobility measures, mixed land uses and medium to high densities constitute the success of the TOD model implementation within the public transport nodes' catchment areas. The transit node typologies, which group the catchment areas of stations and stops that share similar characteristics in function of spatial and transport criteria, is considered an effective tool for optimal TOD planning. The development of a typology is based on the calculation of a TOD readiness index, which assesses the station's area opportunities and dynamics for implementing the TOD model.

In this context, the paper investigates the degree to which the urban and transport characteristics of six (6) areas surrounding future stations of the Thessaloniki Metro line are suitable to support TOD plans. The six (6) stations are considered representative study areas due to their differentiation regarding the urban environment in which they are located (i.e. metropolitan, urban, neighborhood, peri-urban, special activity areas). The catchment area radius of metro stations was set at 400 meters, that is an average 5-minute walking distance. To measure the TOD readiness level, an aggregate weighted index was developed as a function of sixteen (16) key indicators, categorized into seven (7) criteria that assess land use diversity, population density, sustainable mobility, public transport level of service, neighborhood attractiveness, local economic development and urban development opportunities. The weight of each respective criterion and indicator was determined through a questionnaire survey addressed to fifteen (15) experts in the field of transport and urban planning, who ranked the indicators regarding their significance and relevance for TOD.

The results of the aggregated TOD index showcase the stations that meet the basic TOD requirements, but also the spatial features in which each catchment area is amenable to improvement or has great development potential. The multiple challenges that the city of Thessaloniki faces concerning the integration of the Metro into the urban environment and the promotion of sustainable mobility, require the effective use of the TOD model either for upgrading the public space, encouraging walkability, and enhancing the stations' neighborhood livability, or for leveraging significant investments in the peri-urban area aiming to implement new residential development. The TOD readiness index is a rational tool for creating node typologies and establishing urban development priorities according to the distinct spatial identity of each station.

*Keywords: Transit Oriented Development (TOD); TOD readiness; TOD typology; Integrated spatial planning; Thessaloniki Metro*

# Measuring Spatial Disparities of Neighborhood Accessibility to Public Health Services for Older Adults in Rural Communities of Thailand

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## Extended Abstract

Based on future projections of the older adult population in SamutSakorn province during the year 2015 – 2030, it was found that SamutSakorn province, Thailand, has a great inclination towards aging society in 2025. Due to such changes in the structure of population, effective communities are required to provide an urban milieu which is safe and inclusive, with public health infrastructures of high-standers. Such an urban milieu can help the elderly to have better quality of life and health conditions. This study focuses on accessibility of public health infrastructures by elderly people in Ban Phaeo, SamutSakorn, province Thailand, adopting Space Syntax methodology for measuring the attribute of ‘connectivity’ of the road network and thus, accessibility of health services by older people. Accessibility to public health infrastructures can support the aged group of the community to enhance coverage and easy utilization of services. In Ban Phaeo district, the most common patterns of urban traveling involve private car or motorcycle and motorcycle taxi. In such an area with water transport means, elderly people residing in areas along the main canal and sub-canals still use boats for everyday traveling and reaching health facilities. Space syntax analysis shows the accessibility potential in terms of the standard radius of services in city planning regulations. The results show that different urban districts are characterised by diverse values of accessibility to health care systems. The different degree of accessibility to health services in each district are significant to the differentiation of older adults’ health behaviours. This result is regarded in relation with three health factors: 1) congenital disease (physical health), 2) ability daily life (ADL), and 3) mental health. All of these variables can be helpful for further research on the relationship between the different levels of accessibility to public health services in urban areas and health behaviour of elder people. Results of statistical analysis revealed a significant such relationship. In the case-study, urban areas with low accessibility to public health services correspond to poor health behaviors of elderly people. This result leads to the recommendation of developing health infrastructures in spaces with high connectivity, and in particular, along the natural canal as well as several major roads. Therefore, planning the neighbourhood for an aging society should focus on ‘comprehensive connectivity plan’ and promote both travelling choices - by private car or motorcycle or/and by public transports, as suitable and safe choices for the elderly.

*Keywords: Accessibility, Older Adults, Public Facilities, Public Health, Space Syntax*

## Looking into the urban road of the future. Identification of transforming concepts.

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### Extended Abstract

Urban roads are constantly transforming, especially in the era of complexity that dictates contemporary towns and cities. In the rather complex urban environments, several and diverse driving forces are encountered, tending to modify the structure and identity of urban road realm. Taking that into account, this study examines the form of the urban road of the future through a broad perspective, aiming to pave the way towards sustainability and liveability of urban environments. Through a critical investigation of all the potential approaches attempting to ‘configure’ the urban road and redistribute urban road space; this study aspires to open a wide discussion about the issue of how urban roads should function. For this reason, a systematic literature review is employed, focusing on scientific articles published after 2010 due to the dynamic nature of the topic. A Systematic Literature Review (SLR) is a robust technique in social science research, which is about systematically assembling, evaluating and synthesizing all available information to a topic. The main steps followed were three, namely; 1) planning stage, where the review protocol is defined, 2) the review process based on certain criteria and 3) the identification of concepts through an objective-centric synthesis of results. According to the scope of the research, a great variety of keywords was assembled. All used keywords were accompanied from the term “urban road” for the sake of research integrity. By implementing a thorough analysis of these 43 publications that were found in SCOPUS database, this study reveals 28 transforming concepts which are then organized into five categories, namely: efficiency, safety, liveability, accessibility, and smart technology. Among them, one can encounter concepts such as Shared Space, Dynamic Road Space Allocation, Traffic Calming, Superblocks and Home Zones, Walking and Cycling Infrastructure, Roadside Vegetation, Vitality and Diversity, Electric Mobility, Photovoltaic Roads, Shared Autonomous Vehicles and Vehicle 2 Infrastructure (V2I) technologies, etc. These are described in detail in this study referring to noticeable paradigms and interesting cases from cities around the world. All these concepts may play a pivotal role in transforming urban roads and have multiplying effects in environmental conditions (e.g., air quality, noise pollution), social interaction and economic growth. At the same, noticeable contradictions among are revealed from this process. They bring up critical dilemmas that should be answered in the next decades, namely: a) share the space or segregate it? b) design systems or roads? and c) prioritization of modes: human first or not?

*Keywords: systematic literature review; road space allocation; future mobility; urban road; transforming concepts.*

# Understanding commuting patterns of suburban university population and potential sustainable transportation systems: the case of Najran University, Saudi Arabia

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## Extended abstract

Reducing automobile dependence is an essential public policy among members who commute to suburban universities. Commuting patterns of travelers to urban universities differ greatly from those of commuters to suburban universities since suburban universities campuses are located far away from services and housing, so those universities generate more daily trips and increase travel times, especially given that most university populations commute by automobile. Thus, dependency on automobiles has a number of consequences such as longer trips, increased energy consumption, higher traffic congestions and accidents, and higher air pollution.

Therefore, this study examines current commuting patterns, transportation mode choices, and their determinants of Najran University, a suburban university located in Saudi Arabia. An online survey was designed and distributed to all university members (i.e., faculty members, staff, and students). A total of 1149 responses were recorded. The results of the descriptive analysis and multinomial logit models revealed that the average daily commuting distance between campus and residences is 41 kilometers, and the average trip duration is 46 minutes. Most university members drive alone, although some carpool, vanpool, or use buses, especially females. Male students and married university members show more of a tendency to use alternative transportation modes rather than driving alone, but male faculty members and employees increase the utility for driving alone to/from campus. The longer the trip, the higher the likelihood of carpooling for males. On the contrary, female staff and faculty members increase the propensity of carpooling with friends or commuting alone with a chauffeur. Female members who spend around 50 minutes commuting to campus reduce the propensity toward alternative transportation modes.

Understanding current commuting mode choice and important determinants of travel mode choices allow university planners and policymakers to determine several proper sustainable transportation strategies at suburban universities. Therefore, the study concludes by setting some recommendations and a framework for implementing, administrating, and enhancing sustainable transportation modes. One of the keys to encourage sustainable transportation modes is shortening the distance between members' residents and the university campus. Applying this strategy results in less trip distance and thereby increases the utility of walking, biking, and riding bus to campus. Another strategy is to encourage university members to rideshare (carpool and vanpool), especially because many of them concentrate on specific districts.

The author believes that applying those strategies can significantly reduce dependency on automobiles, improve alternative transportation modes among the university population, and make a zero-carbon transportation network within reach.

*Keywords: suburban university; transportation mode choice, travel behavior, sustainable transportation; Najran University*



**PLACE MARKETING & CITY BRANDING**

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## Place Marketing & City Branding, city of Vranje, South Serbia

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### **Extended Abstract**

South of Serbia has always been the crossroad of Balkans. It has gone through very tumultuous history to reach modern times, exhausted and lagging behind the rest of the country in terms of social, economic and cultural development. The reason for this occurrence is the migration of the young generation in bigger and more developed cities nearby, mostly to the capital of the country, Belgrade, in search of job opportunities, education and better quality of life in general.

But what if this trend continues? Will such remarkable smaller Balkan cities stop to exist all together? Will the history be forgotten in search of new technology and new perspectives? Such a sad future is inevitable unless some measures are taken into account in order to represent better the historical heritage, urban and social values of the past that are still visible, and unless there is a development plan for better promotion, marketing and city branding.

This small town is not the only one under the threat of disappearing, it is just one more case study for all the culturally rich small towns of Balkans that are facing similar problems of migration, neglect of development potential and general urban distortion. Examples of such places can be found all around Greece, Bulgaria, North Macedonia, Romania etc.

What is the model the municipality of Vranje could follow in order to create more job positions, intercept migration, attract possible investors, and protect the cultural and historical heritage it possesses?

Urbanism and architectural planning play a very important role in city-branding. Since the traces of important historic monuments and buildings are nearly completely lost in fires and wars, the first step towards the improvement concerns the research of local historical documents in the Institute for Protection of Monuments of the city of Nis (the center of the area). Then, research of the localities, urban planning aiming at improving city core, and finally city branding model, set up a proposal using the tourism and hospitality - as Vranje is famous for its culinary tradition and oriental vibes from the past. It also uses the language dialect as one of the important assets, using general knowledge of inhabitants and the image outside of the social circle of the city itself. It remains to be seen if this research can lead to serious changes and improvement in the urban life of this Balkan city...

*Keywords: urban heritage; city; urban integration; Balkan cities; Serbia; cultural image*

# Rural creativity: Community-led placemaking through art

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## Extended abstract

Arts and the creative sector can be considered invaluable assets in strengthening and constructing a sense of place. People feel connected to places through experiences and meaningful exchanges within that very specific place. In an urban context, the notion of art and creative sectors as a means for placemaking and to establish economic profitability is well-established. However, in rural areas the very same notion has been less explored and just in the very last years the debate around culture and arts as drivers of rural regeneration has opened. In the Vision of Rural areas for 2030 by the European Commission, it is acknowledged that possibilities for active participation in artistic and cultural activities are likely to influence the attractiveness of rural areas. The local rural territories within H2020 RURITAGE project are validating this notion while building on art for increased community-building and placemaking. RURITAGE - *Rural regeneration through systemic heritage-led strategies* is a four-year EU-funded research project, initiated in June 2018, which strives to enable rural regeneration through cultural and natural heritage using community-led processes. Within the project, six *Replicator* areas around Europe are showing how heritage, including through art, function as a driver to re-establish a sense of community.

The RURITAGE Replicators have shown various examples of how art can be used as a communal glue by providing opportunities for people of all ages to explore, participate and work within the arts while they enable sustainable social and economic development. A few of them will be looked at in this paper. One example of this is the UNESCO Global Geopark Geo-NaturparkBergstrasse-Odenwald, Germany, that aim to reach vulnerable groups through their land art initiatives. By using natural materials straight from the surrounding landscape, they are showing how art can be used as a means for integration and establishing a bond between newly arrived immigrants and the territory. At the same time, another Replicator in Izmir, Turkey, is working on mapping their traditional music scene through an interactive collection of recordings. These recordings connect the local music heritage with specific sites, creating a sensory experience of the territory.

The RURITAGE Replicators show how art and creativity provide a certain value that goes beyond economic impact; it can also function as catalyst for placemaking. Supporting communities from within may lead to a regeneration of the local art scene and provide a catalyst for creative grassroots projects where the outcome might be a social meeting place for locals. We have found that the community-led regeneration practices have provided a rich context for exploring an expanding sense of community where the arts-based activities bring multiple understandings of community and turn art into a meaningful dialogue through re-connecting with their territory and sharing creativity. The RURITAGE communities themselves have activated a placemaking process from within: capitalizing on local community's assets, unique identities, senses, and memories that derive from their experiences, and creating resilient rural communities.

*Keywords: rural arts; rural regeneration; placemaking; Replicators; community-led regeneration*

# Cultural tourism and sustainable development – the case of Naxos island in Greece

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## Extended Abstract

The term "Cultural Tourism" refers to the type of tourism that enables the visitor to experience the culture of a place. The main goal is to highlight and promote the cultural characteristics of the place, where the visitor has the opportunity to experience places of architectural, historical and cultural interest, while also coming in contact with other types of intangible forms of culture such as customs, traditions and perceptions of the residents.

Cultural Routes are emerging today as an important management and utility tool to highlight cultural resources and further promote the cultural tourism of a place. Through a pre-determined route, the visitor has the opportunity to experience the history and culture of the place and to know its special physiognomy.

This paper refers to the capital of the Greek island of Naxos and Small Cyclades and concludes specific suggestions for the cultural route, which is mapped with the help of google maps. The approach to the main cultural points of the city is based on the proximity and importance of monuments, buildings, and landscapes of natural aesthetics.

Through the analysis of the area and the description of the cultural route, some general conclusions are drawn, which can highlight and improve the cultural services of the island and contribute to its sustainable development.

*Keywords: Cultural routes on small islands, the culture of Naxos*

## Place branding in traditional settlements. The Old Town of Xanthi as a pole of attraction for visitors.

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### Extended abstract

Traditional settlements consist a key part of the cultural heritage and are indissolubly linked to tourism. Greece has a significant stock of traditional settlements, the preservation and sustainability of which is necessary for the country's tourist identity.

In the northern part of Xanthi is located the Old Town, which consists the historical core. The settlement would not have been saved until today if a series of interventions had not been carried out to declare it protected. The area has significant historic value and is one of the best preserved architectural ensembles in Northern Greece.

The Old City of Xanthi flourished in the middle of the 19th century, a period during which most of its population was involved in the tobacco trade. Built on a hillside, keeping its traditional form, it allures both the visitors and its inhabitants. It is one of the largest traditional settlements in Greece, which has been unaffected by the deterioration of time and preserves its nobility and majesty.

The emergence of this traditional building settlement is based on the treatment and the successful confrontation of certain critical issues concerning: a) the protection of the settlement from interventions that do not conform to its physiognomy, b) the restoration of the rich building stock and c) the restriction of the use of cars within the settlements' limits.

The Old City of Xanthi is one of the most popular tourist destinations in Thrace. The visitor, while walking on the cobblestone streets, has the opportunity to admire great masterpieces, as well as small squares reminiscent of all-time seasons, since they actually function as narrators of the city's history. Trekking in the Old Town requires enough time from the visitor to enjoy the splendor and the austere beauty of the area. Moreover, every year a number of events are organized in the traditional settlement, in the aim of further attracting visitors from all over Greece and abroad.

*Keywords: traditional settlement, old town, place branding, tourism development*

## Neon signs and the visual identity of the city

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### Extended abstract

The identity of a city, in the post-electricity era is strongly defined by the image of the city during the night. Except for the urban lighting which is necessary for safety or for highlighting the built environment, there are also bright details that enhance the urban nightscape creating a special atmosphere. Illuminated commercial signs, and especially the use of neon tubes has strongly contributed to the visual identity of cities in the 20<sup>th</sup> century.

Since their early adoption, neon signs have always symbolized future and evolution, however their handcrafted uniqueness attributes more symbolisms. After the invasion of LED lighting and contemporary technologies, the use of neon lights declined and such signs remained only non-gentrified neighborhoods therefore often associating their image to social decay rather than future and economic growth.

The present study aims to examine the contribution of neon signs to the shaping of a city's identity. Within this realm, it is necessary to investigate their course in time and space. For this reason, three cities that have been identified over time for the broad use of neon light tubes are selected, spanning to different parts of the world, designating also different eras of neon culture.

In Hong Kong, neon signs appeared as a natural evolution of calligraphy on business signs and have become an integral part of the city's visual culture and an attraction point for visitors. However, over the last twenty years, the government has imposed regulations that have resulted in the removal of a large percentage of them. The effort to preserve, record and save many neon signs is the aim of several cultural organizations and the M+ museum, that is dedicated to the visual culture of the city and the broader area.

New York City, and in particular the Times Square area, in an attempt to overcome the moral depression and crime of the beginning of the previous century, the city has been modernized and upgraded since the mid-1990s. The neon signs that once defined the identity of Times Square and symbolized the underworld and immorality, but also artistic freedom, are almost entirely replaced by bright giant screens and huge advertisements, shaping a new cityscape.

The third city examined in this study is Las Vegas, where neon represents concepts of consumerism, entertainment, and gambling. As opposed to the previous cases, neon has maintained its original character, although in newer constructions LED lighting prevails. The light tubes are still present in the older city center and, together with the Neon Museum, that pays tribute to the neon culture, form an integral part of the city's history and identity.

Based on the above spatial and temporal analysis, the factors that determine the identity of the three cities the study will be enriched with data drawn from social media platforms, where visitors share their experience in real time and have specific expectations of the image and identity of the city

*Keywords: urban lighting; neon signs; visual identity; popular culture; social media; Hong Kong; New York; Las Vegas*

# Contemporary applications of sharing economy in the tourism sector: Digital platforms as catalysts for the exploitation of creative and cultural resources.

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## Extended abstract

The Purpose of this presentation is to broaden the scientific debate on the exploitation of redundant and untapped creative and cultural capital in urban tourist destinations, through digital concentrations of cultural and creative resources. The explosion that was triggered almost at the whole spectrum of economic affairs worldwide, mainly due to new social technologies, has led, among others, to the creation of a new consumptive model, capable to absorb the cultural and creative surplus of places and societies. This model of sharing economy, which includes also cooperative economy, is based on offering goods, services, knowledge or experience, with or without financial consideration. In this modern economic landscape, it is observed rapid growth of new forms of companies that place particular emphasis on 'networks orchestration' such as 'Uber' or 'AirBnB', with significant revenue streams per year, by applying sharing economy models to the tourism industry, distributing economic benefits to consumers and providers. At the same time, digital collaborative platforms provide high-quality customer-centric services, using extensive capabilities and resources that do not actually belong to them and they also invest in creating a sense of community and collaboration.

'AirBnB' in addition to being a successful sharing economy company, and an online community that also aims to facilitate short-term rentals of a city or region of tourists, is also important online platform that promotes activities related to creativity and culture through tourism. In particular, the 'AirBnB Experiences' platform differs from the process of promoting or brokering short-term accommodation, as it relates to further experiences which the tourist can become a receiver.

In short, it could be concluded that 'AirBnB Experiences' functions as a platform for the cultural industry, mainly as a major promotional tool that brings together the elements of local culture, with a financial gain for the creators and enhancing the overall experience gained for tourists. At the same time, it is now increasingly clear that organizations and companies with a worldwide reputation perceive and treat tourism as an overall experience rather than solely as providing individual core tourism services, such as relocation or accommodation. Furthermore, digital platforms such as 'AirBnB Experiences' have the potential to act as leading sharing economy communities - in terms of the number of participants and the volume of services provided - because of their extensive networking, refer and reach out to the global tourism community. Finally, such communities are taking advantage of the surplus potential of tourist destinations, with benefits at both the individual level - the creators - as well as the collective, as the incomes of the local community increase further.

As cities and regions increasingly engage in a 'choking' competitive process both, to attract attention, interest and investment, and to develop distinctive products and experiences, alternative and creative forms of tourism are now a particularly popular choice for urban development and gentrification.

*Keywords: sharing economy; digital platforms; AirBnB Experience; creative and cultural resources exploitation.*

## Urban identity & city branding

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### Extended Abstract

The city marketing strategy (city branding) refers to the management of the image and the promotion of the identity of the cities in order to strengthen the sustainable development. Connects in an interdisciplinary way, goals and directions from spatial planning, tourism, geography, economy, management of network tools etc. The cultural heritage, material and intangible, and therefore its imprint in the public space, characterizes the identity of each city and as a comparative advantage appears its recognizable name (brand name).

On the other hand, urban cultural policy has been strengthened with an emphasis on tourism marketing and the logic of cultural investment. The city branding strategy is also used for the purposes of promoting the sites to their consumption as a tourist product. The demand for competitive identity appears to be leading in tourism and the commercialization of the public space experience.

This presentation aspires to illuminate the dynamic relationship between selected goals of the city branding strategy and the production of public space, from the point of view of urban design. It refers to the importance of promoting urban identity, when designing public space, taking as an example the award-winning proposal in the Panhellenic Architectural Idea Competition: Redesign of 23 March Street, in order to unify the Historical and Commercial Center of the city of Kalamata (1st Prize, 2016). From the point of view of architectural design, the term brand name becomes an occasion for the meaning of public space with emphasis on culture, so that residents and visitors connect the city with its cultural heritage.

The architectural proposal aims to staple the historic center with the wider urban fabric of the city, through the highlighting of the elements of the Natural and Historical Landscape, that is, those of the cultural elements of the Place, in order to underline a united urban identity. The synthesis implements a unified urban skin, that pedestrianizes the main street, integrates the central square with the sidewalk network and creates the appropriate interconnections for the bidirectional link of the space with the historic fabric.

The design is done through two conceptual and spatial tools: the *crack*, as a trace of the natural landscape and the *inscription*, as a narration of the historical memory. The connection of the distinct urban identity with the city branding is underlined, in order to achieve the narration and the inscription, in the urban space, of the identity or of the many identities of the city, through the correlation: the collective memory of the Place, the attractive characteristics of the urban space, the historical culture, the local special culture, the production products.

*Keywords: city branding; identity; landscape; urban design; memory*

# The power of place: rebranding a shopping arcade at Egnatia street in Thessaloniki historic center

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## Extended abstract

This paper will present the research and analysis methodology for creating a new identity for 45 Egnatias Street shopping arcade, one of the Thessaloniki's historic center main retail and leisure arcades. The Egnatia Corridor is a central artery that has crossed Thessaloniki in northern Greece for over two millennia. The start of the Metro construction on Egnatia in 2006 has led to increased traffic, decreased activity of commercial activities, and a negative image of the street by its citizens. The Egnatia Corridor has been negatively impacted by the combined effects of the Metro construction both with the economic crisis in Greece. Delays have resulted in longer periods of construction blocking off portions of road and sidewalk, making traversing the area difficult by vehicle and on foot.

The building at Egnatias 45 street hosts a historic shopping arcade, even though the building is a modern one, build in 1974. The new building replaced a previous one located in the same site, having the same ground floor plan typology, and including a shopping arcade, too. The shopping arcade used to host shops and craft laboratories such as silverware jewelry labs. Over the years, the arcade has been changed, but still hosts a silverware jewelry laboratory, both with other retail and new activities from creative economy sectors.

Aiming to create a new brand identity for the arcade, the authors have been developed a place re-branding methodology and process based on the history of the place, its collective memory, and the spatial expressions of memory.

On the other hand, the methodology is based on user's sense of the place. People make sense of places by constructing their own understandings of them in their minds. These encounters with places occur through first, perceptions and images obtained through the accumulated experiences of how they use specific places.

The sense of community is a very important factor for the arcade's new tenants. This process meets the concept of place making which is about forging an identity and creating a sense of place, purpose, and community.

Getting the development of place right through a fusion of placemaking and place branding concepts, the paper is exploring ways in which the development of places can be improved to provide sustainability offer for the occupiers, but also to create new narratives for the city itself.

*Keywords: place branding, place rebranding, place making, collective memory, creative economy*

# Investigation on opportunities of developing accessible tourism in Greece: the case study of Ionian Islands

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## Extended abstract

Participation in leisure, tourism and leisure activities is an individual's inalienable right. People with disabilities (PWDs), however, still face reduced accessibility and mainly difficulties during their travels, because of which they do not enjoy equal benefits and services in the place they choose to visit. In order for a destination to attract the specific market, it is crucial that it designs its tourism product in a way that everyone could enjoy. The purpose of this essay is to explore the possibilities of developing accessible tourism in the Ionian and to fill a gap in this field, by investigating the current situation as for the accessibility of these islands and potential barriers faced by tourists with disabilities during the organization and implementation of the trip.

Using qualitative research and conducting interviews with 22 people who hold a central position in associations for the disabled, tourism companies and local agencies, their views regarding the implementation of accessible tourism in the Ionian Sea are investigated and aligned with the research questions, as well as the satisfaction of disabled tourists and potential actions to improve accessibility to the islands, which are one of the most important tourist destinations in Greece, with approximately 2,805,157 international air arrivals per year. The results show that each island has a different degree of accessibility as it has different morphological and accessible characteristics. Despite the interventions to improve accessibility and the effective practices that have been adopted, there are significant shortcomings in terms of infrastructure and information provided, while the satisfaction of tourists is affected mainly by the natural beauty of the islands rather than the level of accessibility.

To promote accessible tourism in the Ionian Islands, several steps need to be taken to improve access to every sector of the tourism chain, which is associated to the fact that the needs of disabled tourists are multiple and varied, similarly to the dimensions of disability. The suggestions focus on informing and raising public awareness, on promoting the cooperation between the public and the private sector, on improving infrastructure and upgrading the public transport network, on providing accessible and valid information for PWDs and, above all, on adopting a holistic model from the principles of universal design. The development of accessible tourism, along with the natural beauty of the islands will be a strong competitive advantage for the Ionian, which will bring both economic and social benefits.

*Keywords: accessible tourism; accessibility; tourists with disabilities; barriers; universal design; place marketing; Ionian Islands*



**CLIMATE CHANGE, CIRCULAR ECONOMY AND  
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## Copernicus for Urban Resilience in Europe: the CURE project

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### Extended abstract

A major challenge for the urban community is the exploitation of Earth Observation (EO) in dealing with the multidimensional nature of urban sustainability towards enhancing urban resilience, particularly in the face of climate change. Here, we present how the H2020 funded project CURE (Copernicus for Urban Resilience in Europe) synergistically exploits Copernicus Core Services, to develop cross-cutting applications for urban resilience. CURE provides the urban planning community with spatially disaggregated environmental information at local scale, as well as a proof-of-concept that urban planning and management activities towards enhancing the resilience of cities can be supported by four Copernicus Core Services, namely, the Land Monitoring Service (CLMS), the Atmospheric Monitoring Service (CAMS), the Climate Change Service (C3S) and the Emergency Service (EMS).

CURE improved analysis methods for addressing specific dimensions of urban resilience, enabling its integration into operational services in the future, related to climate change adaptation and mitigation, healthy cities and social environments and energy and economy. CURE is built on Data and Information Access Services (DIAS), as a system integrating these cross-cutting applications, capable of supporting downstream services across Europe, addressing also its economic feasibility. CURE has resulted in information capacity presenting current state of cities against drivers (land use, green areas, energy use etc.) and pressures (pollution, emissions, floods, etc.) and help in assessing their overall impact (quality of life, health, economic damage, etc.) that will enable cities to prepare an evidence and knowledge based response (i.e., better plans, local actions and new policies).

The contribution of CURE mainly concerns: online platform for combining Core Services to support urban resilience planning; uniform data for large samples of urban areas both within region and across regions in Europe; consistent measurements across European cities, including synergies between Copernicus core products and third-party data; different approaches and models for better information on urban form and function at different spatial and temporal scales; and assimilation of users' knowledge with technical data and benchmarking; fostering of innovation.

More information on CURE evolution at: <http://cure-copernicus.eu>

*Keywords: Urban Resilience, Copernicus Services, Climate Change Adaptation and Mitigation, Healthy Cities and Social Environments, Energy and Economy*

## Emerging issues for the implementation of circular nature-based solutions for water management in Ljubljana, Slovenia

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### Extended abstract

Nature-Based Solutions (NBS) can support cities in shifting towards the circular management of their resources and enhance their water management capacity. NBS can function in a circular manner by enhancing the natural water cycle or by providing opportunities for water and nutrients reuse. However, research indicates that more capacity building is required among urban professionals for the mainstreaming of circular NBS in cities, as the notion of circular economy is usually associated with the reuse of products or materials, and not the reuse of resources such as water. This research examines how water professionals in Ljubljana, Slovenia, perceive the concept of NBS for circular water management.

In the context of a short-term scientific mission for the COST Action Circular City, we interviewed 14 urban planning and water management professionals. The interviewed experts were selected due to their involvement in related urban greening and urban water infrastructure research and advocacy projects, in key organizations and institutes of the city. The semi-structured interviews aimed at identifying the familiarity of the professionals with circular NBS for water management, exploring their perceptions regarding the mainstreaming of NBS in urban planning in Ljubljana, and recognizing the challenges behind NBS implementation.

The analysis of the collected data allowed the emergence of patterns and connections among the responses, as well as the triangulation of the findings. Through iterative analysis of the transcripts and the interview audio files, the input of the interviewees was annotated and transferred in the analytical framework, following the interview structure.

The findings indicate that while Ljubljana is a city with abundance of green and blue resources, recognized and awarded for its sustainability initiatives and innovative green approaches, there are several barriers to be overcome in order for new concepts such as NBS for circular water management to be established. The abundance of nature and water was interestingly one of the first barriers that were identified by the interviewees. In this paper, we outline the perceptions of the interviewed professionals as well as the issues that emerged in relation to the planning and implementation of circular NBS for water management in Ljubljana.

**Acknowledgment:** The research presented in this paper was conducted during the Short-Term Scientific Mission “The role of NBS in urban planning” of the COST Action CA17133 “Implementing nature-based solutions (NBS) for creating a resourceful Circular City”.

*Keywords:* nature-based solutions, water management, circular economy, urban planning, Ljubljana

# Brownfields and disused factories: analysis and digital cataloguing platforms

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## Extended abstract

Brownfields, abandoned land that may be contaminated, are result of industrial economic policies of the XX century and they may be a useful resource to reduce the environmental costs in our cities nowadays. First of all, we need to study how the brownfields could be part of a new sustainable urban ecosystem, where we can plan strategies to prevent land consumption, according to the principles of circular economy and based on an extended idea of urban mining. The brownfields and the disused factories, that no longer have their original productive function, can have a new meaning for the urban palimpsest: they can become “nutrients” used to produce secondary raw materials and recycled building components to be reintroduced into the living chain of the urban metabolism. Indeed, the waste resulting from the demolition of disused factories can be re-introduce into the market for construction products bringing the life cycle of buildings back to a truly circular dimension. This approach addresses the challenges of the New European Green Deal, it aimsto produce and consume secondary raw materials and to reduce the consumption of land and natural resources. However, in the construction Italian sector, the end-of-waste concerning the C&D waste is struggling to take off. To meet this circular point of view, we need to design practices and a technological tool able to transform the chain of recycled materials through a usable and comprehensible approach. For this reason, it is important to catalogue brownfields and disused factories in order to analyze and model them through algorithmic tools. We can design digital models useful to understand the consumption trends concerning the recycled components and the secondary raw materials in the construction market. Based on these considerations, we have developed a database useful to catalogue brownfields and disused factories.

The paper will describe criteria and digital tools that we have developed to map the brownfields and the disused factories located in the industrial East area of Naples, a very polluted site, where in the last century there was an intense industrial production that did not protect the environment, so that after the economic crisis, only rubble and contaminants remain.

We have catalogued 424 sites, analyzing their location, dimension, the production activity status, the remediation plan status, highlighting the specific soil and water pollutants detected.

We have uploaded all the information on the HEURIST platform, a data management system that allows you to design and publish richly structured databases that can also be exported as a website. HEURIST makes it possible to archive, analyze and publish a lot of information in the form of a digital register, it carries out hierarchical classifications, associates images, videos and spatial data by geolocating the industrial areas mapped. It was possible to extrapolate reports from the database using customizable filters that design interactive maps, timelines, cross tabulations, lists. We drew thematic maps using the dates analyzed that summarize the state of art concerning the contamination/pollution status, the reclamation and reconversion status of the East site of Naples.

*Keywords: end of waste; industrial area; database; secondary raw materials; digital tool*

# Geo-data on Adriatic linear city: from risk analysis to climate future adaptation. The San Benedetto del Tronto case study

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## Extended abstract

The paper presents the results of a theoretical and field-applied research that investigates a section of mid-Adriatic coastline linear city in the Marche region (Italy). The methodological approach is multidisciplinary and transcalar and aims to promote sustainable urban regeneration dealing with climate risk and adaptation. The research analyses the Ascoli Piceno territory with different interpretations techniques that allow varying knowledge levels. In this sense, the study proposes on the one hand a geo-informatics workflow to build a dataset profile to highlight macro scale climate and social vulnerability, on the other present the future climate adaptive vision for the Municipality of San Benedetto del Tronto, following a specific interest from the Public Administration. At this scale, the research performs several traditional and data-oriented analyses to support design hypotheses and propose short and medium-long action plans, also finding new economic resources. To those purposes, the paper proposes an integrated methodological process capable of renewing the cognitive processes of the discipline. Using different geo-placed tools (GIS, urban CFD) and parametric data (measured or simulated) were produced qualitative and quantitative relational databases which guide the strategies and the actions of public space redesign. The design interventions consider the daily needs for multi-functional, flexible and eco-sustainable spaces by implementing nature-based and water-sensitive solutions trying to not alter the citizens' site's perception. The study faces urban emergencies from a contemporary point of view: reducing land consumption, avoiding the loss of biodiversity, building a widespread and transcalar ecological network and introducing slow mobility systems to make the city healthy, inclusive and human-sized. In this sense, the micro scale focus was essential to understand the dynamics between the anthropised environment and climate-change impacts on a territory with a large number of sub-landscapes systems with different transformability values: from the historic settlement and the seafront/seaport activities, to the near agricultural-naturalistic areas and the infrastructural marks and limits. Those findings are represented in different ways, scales and levels of detail, including i) risk exposure maps, ii) multi-objective strategic address maps, iii) adaptive-evolutionary scenario maps, iv) ante/post operam monitoring maps. In conclusion, these site-specific cognitive tools and the related evolutive visions could guide governance choices favouring the mandatory ecological transition. Even though there are some limitations, the curried-out studies allow building a new "critical knowledge" that combines data-driven planning (geo-digital innovation) with local knowledge and traditional methods encouraging the renewing urban planning techniques. In line with the research framework presented, it is possible to think of multiple evolutive scenarios and update the planning parameters by quickly evaluating the results in order to improve the life-quality standards of our cities.

*Keywords: GIScience; CFD analysis; climate change; urban planning; nature based solutions*

# Metabolic Interdependencies: Thinking of the city as a biodiverse metropolis

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## Extended abstract

This paper focuses on the exploration of metabolic interdependencies through material and energy flows aiming at addressing climate change and the encroachments on nature, as well as tackling the mishandling of waste. These conditions lead to an increased risk of repeated pandemics; and therefore, addressing them means making our cities more resilient to both. It is estimated that urban populations will increase by 2.5-3 billion by 2050, which constitutes 66 percent of the estimated global population. As the built environment is responsible for about 40 percent of energy consumption and 30 percent of gas emissions, a rationale for mitigating the environmental impacts should emerge. Otherwise, significant hygiene and security problems will arise in urban Settlements.

The concept of urban metabolism is not new. It attempts to reunite and transcend the binary of object/process, form/energy, nature/culture, urban/rural, by providing a framework through which objects are analysed as hybridized ecological systems of multi-scale dimensions. In contrast to other metabolic flows, wood becomes the capacitor to link forest harvesting with the construction commodities in our cities. The overriding urban ambition should not be designing of buildings that are energy efficient or to create a “sustainable” city, although we must accomplish both. The broader and more comprehensive response should be reversing climate change by a reform of building culture and the integration of the city into the carbon cycle.

To this end, this paper explores ‘Biomilano’, a project by the Italian Architect Stefano Boeri, involving six case studies of different spatial scale and scope which outline the economic and territorial energies required to arrive at a new balance between the urban fabric, rural areas, and the natural environment. Biomilano develops a new identity for Milan by downscaling the vision of bioregionalism to the metropolitan scale while envisioning a city that attempts a balance between the tertiary activities characteristic of an advanced urban economy and a series of primary production landscapes that are ecologically, economically, and culturally active. The six case studies consist of the Global kitchen Gardens for Milan Expo 2015, Metrowood, Vertical Forest, Wood House, Farms, and Urban Ruralities.

The paper proposes several subversive actions towards the metabolic interdependencies in the face of climate change. Thinking of a city as a metabolism means we concede importance to the visibility of relationships and transformations. Understanding metabolism means detecting what is transformed into what. The idea of metabolism helps us to reflect not only that our bricks were once clay and may in the future become rubble for another construction, but also that they contain embodied energy, which contains greenhouse emissions. So instead of merely appreciating the material qualities of construction elements, we have to mentally imagine their trans-materiality as well. Their capacity to have been, and to become something else.

*Keywords: Climate Change; Circular Economy; Sustainable Development; Metabolics; Ecological; Territorial; Material; Energy; Urban*

# Nature-based solutions for circular water economy: An analysis of EU policy and international frameworks

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## Extended abstract

Water management practices can play a crucial role for water conservation and flood risk reduction, by providing solutions for water stress, water scarcity, and flooding as combined impacts of climate change and urban development. However, due to global trends such as urbanization and the subsequent demand for urban land, cities become increasingly impermeable, while urban nature is reduced to dispersed pockets of green space with negligible impact.

In the interface of water conservation and water management lie rainwater/stormwater harvesting, water/wastewater treatment, and water reuse -which are all parts of the circular economy in the water sector. In the context of water, a circular economy includes the valorization of non-conventional water sources, for example, the reclamation and reuse of polluted water streams (stormwater, greywater, and wastewater), seawater and brackish water, or direct rainfall. Nature-based solutions (NBS) can contribute to the circular water economy by allowing the natural water cycle to close through soil permeability and evapotranspiration, and by supporting advanced water harvesting and treatment processes offered by novel ecosystems. Apart from their contribution to water management and water conservation challenges, NBS offer a wide range of additional environmental, social, and economic co-benefits.

Sustainable urban development, circular economy, and water evolve around a wide spectrum of EU policies and international agreements. However, the interdisciplinary nature of NBS for circular water systems in urban areas increases the complexity of the relevant policy landscape. This study analyses the main urban, environmental, and climate EU policy initiatives and international frameworks through a review of policy documents and related literature. The aim is to map the extent to which the current policies cover the interface of NBS, water, and circular economy, and to identify the policy gaps and barriers that need to be addressed in order to achieve a nature-based, circular water economy in cities.

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*Keywords:* nature-based solutions, circular economy, circular cities, policy, water

# Coastal landscape as a concept – Changing conditions as a game changer

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## Extended abstract

The Belgian Coast must be seen as a zone instead as a line, not reduced to the beach, the dike and dunes. The Coastal landscape is seen as a concept in the research project '*Waterscapes in transformation*' linked to this abstract. Different layers in the landscape, layers of different ages are noticeable. Multiple systems provide the dynamics in the landscape (water system, coastal defence system, agriculture, flora&- fauna, ...).

Coastal landscapes of neighbouring countries (The Netherlands - la Côté d'Opale) are different from the unique character of the Belgian coastal landscape. The three different coastal landscapes ask for a different coastal defence specific strategy with the climate change in mind. This creates a different experience per coastal landscape. In the North of France, west from the Belgian border it is the large topographic differences that protects the innerland created by elements that are specific to the natural features of the site. In the Netherlands, the Flevopolder for example, they radically choose for the rational of a dike that protects a landscape under sea-level. It is a homogenous rational landscape in function of economy. The Belgian coastal landscape is unique: combining rational and site specific features. It is a layered landscape with an accumulation of small scale landscapes lead by a socio-economic rational, characterised by the interplay of different watersystems on an intermediate scale.

The PhD research '*Waterscapes in Transformation*' linked to this abstract proves that the Belgian Coastal zone is more than a line, it's an area where different watersystems have a complex interplay enclosed by an accumulation of small scale landscapes, each with their traces to the past. The shoreline and the innerland are kind of separated because of the human impact, because of the coastal defence principle 'protect'. Next to the coastal defence principle protect there are two other main principles: accommodate and retreat. The principles are determined by IPCC in '*chapter 5: Coastal Zone Management of the report of the working group in 1997*'.

This trilogy (Protect - Accommodate - Retreat) of strategies has expanded into broad approaches of retreat, defend, and attack (Peel, 2010). Protection aims at advancing or holding existing defence lines by means of different options such as land claim; beach and dune nourishment; the construction of artificial dunes and hard structures such as seawalls, sea dikes, and storm surge barriers; or removing invasive and restoring native species. Accommodation is achieved by increasing flexibility, flood proofing, flood-resistant agriculture, flood hazard mapping, the implementation of flood warning systems, or replacing armoured with living shorelines. Retreat options include allowing wetlands to migrate inland, shoreline setbacks, and managed realignment by, for example, breaching coastal defences allowing the creation of an intertidal habitat (IPCC, 2014).

What are the spatial effects of climate change in the Belgian coastal landscape already noticeable today and how is it possible to see those changing conditions as opportunities?

*Keywords: landscape; climate change; coastal landscape; changing spatial conditions; spatial effects of climate change; socio-economic values*

# The principles of the industrial heritage of Thessaloniki, as parameters for the design of the model of production units, for the future cities

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## Extended abstract

Thessaloniki was the pre-eminent field of installation and development of numerous and important industries, from the middle 19<sup>th</sup> to the beginning of the 20<sup>th</sup> century. The industrial heritage of Thessaloniki is rich and has very important former industrial shells, such as the Allatini Mills or the Athenian brewery FIX. The modern construction technology of the West gave these industrial buildings a special monumental character, which they retain today. Moreover, the siting of industrial units in the coastal zone of the city, for the supply of raw materials and the transportation of products from the sea, made these buildings landmarks for the city. Until the middle of 20<sup>th</sup> century, new industrial units were installed in the city, which along with the older ones made Thessaloniki an important industrial center. Viamyl was the largest factory known for starch and amylosacchar, glucose syrup and isoglucose production, while many of by-products used in the paper mill. It was founded in 1926 in Piraeus, while in 1953 it expands by opening the factory in Thessaloniki. In 2008, after a series of difficulties, the machines in the factory stop, Viamyl closed and immediately afterwards it is demolished. Since then, the plot of 53 acres has remained completely vacant.

At this abstract I will present the project of designing a new model industrial unit, in the trace of the old one, but also the way such an intention is installed within the urban fabric, as one of its basic design principles. This project has multiple objectives: creation of an innovative chocolate factory, exploitation of the land with the simultaneous creation of a green free open park for the residents, integration of the circular economy with the development of sustainable packaging, introduction of production units within the urban fabric without burdening the environment. The change of the model of the industrial building and the reintroduction of the production units within the city limits, led to verticalize the production process and their enrichment with other uses such as museum, education, energy production, or recreation. This new type of industrial building of small or large scale, based on the experience of the past, attempts to bring back production within the urban fabric, where residents will gain access and active participation in the products they consume. It will minimize the costs of transporting raw materials and products, it will take up the smallest possible space, it will minimize the production of pollutants and, above all, through the circular economy and renewable energy sources, it will protect the environment. In addition, the design motif that the unit is organized provides an automated operation during times of health crises, such as Covid-19. It is a cluster of active production, which at the same time aspires to be a pioneering innovative landmark, which will be at the same time a place of entertainment, recreation, education and awareness. A modern model of industrial building for both modern smart cities and the productive community.

The proposed abstract is based on my diploma design thesis at the Department of Architecture at the Aristotle University of Thessaloniki (2021).

*Keywords: Industrial building; Circular economy; Sustainability; Energy; Vertical production*

# Integration of the model of the circular economy in the construction sector, using the Construction Materials Database

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## Extended abstract

The purpose of this study is to highlight a tool with practical and wide application, with the aim of transitioning the construction industry to the model of the circular economy not only to reduce the environmental footprint, but also the redistribution of building materials in a systematic and beneficial way. Initially, in order to better understand and introduce the importance of the circular economy, the key concepts are identified and examples of central strategies of European countries that promote the circular economy are given. Then, the benefits from the integration of circularity are sought, but also the obstacles that inhibit its development and the main sources of origin of construction materials for recycling and/or reuse are identified, which will be an important stock of secondary materials. The second chapter follows a search of the international and national context and more specifically of the strategies and policies adopted in the direction of the circular economy and concerning the construction sector which it represents 50% of all mined materials and is responsible for more than 35% of total waste production in the EU. The next chapter identifies the categories of the involved groups and bodies in the construction sector, which with their participation and involvement can create a channel of communication, which will encourage the exchange of knowledge, information and know-how. In addition, they have been selected to highlight examples from healthy companies in the construction industry that integrate circularity in their philosophy and production process, helping to reduce the ecological footprint. Chapter four identifies and analyzes the means, i.e. the digital building materials platform, that will constitute a common space, ie a database, with detailed information and data on the building materials that it will collect and supply. In addition, good practices and tactics are suggested that will power the platform, enhancing its reliability. In addition, examples of applied digital platforms from abroad are presented and its functions and services are examined, as well as the model on which they are based. The fifth chapter follows where detailed proposals for the design of the digital platform are provided and its pilot representation is sought. The possible options and its other characteristics are identified, while for the practical support of the project it is proposed to create a network of partners that will consist of local start-ups collecting, disposing and supplying secondary materials and will supply the digital repository. Finally, it is important to apply the platform in mass renovations, being both a source of circular materials and a receiver. In conclusion, a brief reference is made to the initial objectives of the present postgraduate thesis, outlining the conclusions that emerge and the prospects for future research.

*Keywords: circular economy, ecological footprint, construction sector, secondary building materials, digital platform*



**URBAN ECONOMIES; SPATIAL IMPACTS, PLANNING LAWS  
AND REAL ESTATE**

**CHANGING  
CITIES**



**Changing Cities V, Corfu, 20-25 June 2022**

# The Economic, Socio-cultural and Spatial Effects of Tourism Development in Antalya on the Local Community's Well-being

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## Extended abstract

Tourism sector, which has been developing and expanding rapidly in the world economy since the 1950s, started to develop as the main sector in Antalya, Turkey while the Southern Antalya Development Project initiated in 1976. New employment positions created by tourism, offered occupation to the local community and additional labor force was met by internal migration. Following these developments, the population of Antalya increased by 257% between 1985-2015, and employment in tourism and related sectors increased by 524% (Işık&Zoğal, 2017). With the economic uplift, the socio-cultural life of the local community started to be affected by foreign tourists visiting the city, while the community's spatial experience has been reconfigured according to the sector needs as well.

In this framework, this paper focus on the local community as the heart of urban life while their quality of life has been examined in the economic, socio-cultural and spatial context. To explore the existing patterns and relations between tourism activities and the well-being of the Antalya's local community, a semi-structured literature review is conducted including the studies with qualitative and quantitative data. The purpose of this study is to advance knowledge for further theoretical development and conceptual models for tourism by identifying the gaps of repetitive approaches which overlook local people's quality of life in a tourist area.

In this research, the percentage of tourism employees in the labour market is evaluated within the economic framework while the competition and land prices are also discussed accordingly. From the socio-cultural perspective, the effects of the social interaction between the local community and foreign tourists are examined in relation to changing patterns in their urban experience. Lastly, from a spatial point of view, the study discusses environmental pollution in urban land, inaccessibility of open public spaces and lack of access to services caused by the tourism activities.

Results show that the focus of Antalya's tourism development is on real estate and brand development. The local community's access to urban services and their participation in social life have not been sufficiently addressed. It is necessary to emphasize that focusing on the local community's well-being in the city should be one of the most significant parameters for the economic, social and environmental sustainability of cities.

*Keywords: urban quality of life, well-being, local community, tourism development, Antalya*

## Innovative working environments in existing industrial buildings.

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### Extended abstract

Work can be defined on the basis of the ability to activate and manage productive collaboration, as workers are transformed into active actors, who coordinate various functions of the productive process and not just a single task. Constant activation of mechanisms of production and dissemination of knowledge are tools of major importance. Since 1960, cybernetics have affected working environments, by introducing new applications and methods. New technological means replace structural components of physical working environments, shaping new spaces. Nowadays, digital nomadism augments this situation, by differentiating workspace and workplace. Hence, a review of the working space and place -digital and physical- is necessary.

After researching the constant transformation of the identity of labor in conjunction with requirements that emerge in the post-covid era through standards and guidelines that have been released in the past two years, it is made clear that workspace and workplace are directly dependent on synergies between users, their physical and digital presence and flexible design of building programs -not just buildings- that respond to the new health, economic and social conditions, intangible work, digital nomadism and augmented environments. Furthermore, research focuses on the study of architectural examples of workplaces through a typological classification, in order to compile a manual for adaptive reuse of existing industrial buildings into flexible working environments. The focus is posed on a specific case study, JOIST, that deals with the transformation of an existing industrial building into a business innovation park in the city of Larissa in Greece, designed by architectural firm aether:arch. JOIST hosts a hybrid building program that aspires to meet growing demands of the post-labor era, being at the same time a digital center of innovation, having the ability to take place cultural, social and business events. Its functions combine facilities for education, research, learning, dissemination of knowledge, cultivation and development of new ideas and their applications in the real world.

Research and in situ investigation reveals the fluid state of new working relations, emphasizing the new role that small cities are called to take. New creative uses are the keys for the connection of the ongoing transformations of labor conditions and existing urban economies. Architecture can be implemented as a tool for social, economical and business regeneration, by adopting a new language on the reuse of existing buildings. At the same time, critical and innovative design can mediate in order to create flexible working programs with hybrid functions, breaking down existing models and practices that have prevailed all these years.

*Keywords: post-labour; digital nomadism; synergies; workspace vs workplace; business innovation park*

# Planning and City: The Decentralization of Labor and Leisure, during COVID -19 pandemics crisis, and its potential impact

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## Extended abstract

It is a common place that COVID – 19 pandemics crisis has led cities, economies and planning in major changes, problems and challenges. The significant number of cases and deaths, the long Covid' s symptoms and the resulted lock downs have pushed cities, urban economies and planning demands to their extremes. In general, there has been noticed a decrease in western countries' GDP, an increase in prices and unemployment and several obstacles in logistics. In specific, in urban space, there have been transformations in labor and leisure, based on social distancing and focused on remote work and alternative forms of sports or remote observation of cultural events.

In most cases, there were no emergency plans for the danger of pandemics of such mortality rates and of that scale. COVID – 19 pandemics resemble to an absolute Black Swan, an unpredictable event with tremendous effect, worldwide. Although public planning process was highly mature, a composition of rationalism and social participation, the pandemics overturned the objectives of governments and states. Since planning is, broadly, based on empirical base and had initiated after the last pandemics of Interwar period, there was a planning vacuum and, in certain cases, the pandemics ran out of control, before they get in line. Subsequently, the new forms of labor and leisure transformed the concept and the essence of central places in cities.

Economies of scale, both internal and external, are based on the territorial proximity of the factors of production or other inputs in the corporation, the departments or other facilities. Social distancing has impaired the front office functions in all financial sectors and back-office functions in several factors, while it crashed certain sectors as the aviation, the tourism or the horeca sector. Sectoral analysis and cost breakdown analysis per product may shed further light on the changes and the factors involved in planning and cities.

Critical Rationalism focuses on falsification, claiming that the resilient part of a theory may proceed in the next phase of the scientific dialogue. Hence, the pandemics may lead in new knowledge about planning, central places, economies of scale and cities, since there is a massive falsification of conjectures, during COVID -19 pandemics crisis. The conclusions could result in a more effective and resilient urban economy, incorporating the new forms of labor and leisure in cities.

*Keywords: planning; economies of scale; city; central places; COVID -19 pandemics crisis*

## Property taxation in reshaping urban landscape: The case of Athens

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### Extended abstract

Throughout the years, property taxation in Greece has been a crucial source of public revenue. Especially during the economic crisis of 2008, one of the main policies was to increase these taxes in order to achieve fiscal stability. A significant part of these fundamental reforms was to gradually lower transaction taxes – which had been the kernel of the so far taxation revenues – followed by a simultaneous increase of possession recurrent taxes, such as ENFIA (Uniform Tax on Real Estate Property). After all these measures, Greece abides by one of the highest taxes burden on property among OECD countries.

The radical reforms on property fiscal system had been selected as an appropriate mean of confronting the urgent fiscal needs of the period of greek recession but it has never been approached by a holistic manner. This choice, among others, resulted in a total disregard of the consequences of property taxes on spatial issues. In practice, property taxation is a principal element of land policy, which is placed in the core of spatial and urban policy. Imposing recurrent taxes on immovable property seems to have an impact on notable planning parameters such as urban density, land uses and real estate investments. This article will review how these taxes affected the urban space of the city center of Athens (specifically the surroundings of the Omonia Square). The survey, that was carried out analyses data collected during the period from 2008 to 2018, which approximately coincides with the period of greek recession.

More explicitly, inherent and administrative weaknesses of property taxation system, and how these correlate with old and new pathogenesis of this specific urban area, will be evaluated. The research also focuses on the influence of taxes on specific characteristics of the case study area and its emerging challenges (crime rates, immigration phenomena, reduction of private investments etc.). For instance, the publication will mention to the results of ENFIA (and previous taxation systems) on crucial urban issues such as legalized or arbitrary buildings/structures, the reuse of unfinished or vacant buildings, the maintenance or refurbishment of old buildings, the effect of tax burden upon the choice of land uses. The necessity of inquiring these topics derives from the role of the case study as one of outmost value for the sustainability of the wider area of urban Athens.

*Keywords: property taxation; planning; Athens; real estate; urban space*

# The development of the sharing economy in the Old Town of Corfu

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## Extended abstract

The Sharing Economy (S.E.) was given a boost by the technology developments (internet, platforms, etc), the world tourism growth and the trend for “authentic experience”. The foreseen growth rate for the coming years is at least six times greater than that of the traditional offer of similar services. In Greece, it currently makes up more than 10% of the tourist expenditure while Corfu is among the tourist destinations with above-average performance at a national level. As with all activities, it creates positive and negative impacts on the economy, the society, the environment and the space, especially on the urban “eco-systems”: new revenues and sharing of assets, but also rent increases and housing shortage, regeneration of neighbourhoods but also depopulation of others, opportunities and challenges for tourist destinations, etc.

This presentation, based on the students’ research<sup>2</sup>, focuses on the comparative development of the S.E. in the historic centre of the town of Corfu (Old Town), a site listed among the UNESCO World Heritage monuments, located within the demographic, administrative and economic centre of the island. Despite the large number of tourist accommodation on the island, only few of them are located in the centre of the town, so the number of overnight guests is equally low. The emergence of short-term accommodation lease tends to change this picture. The analysis is based on the Airbnb platform registrations during the period 2017-2021 and focuses on the examination of basic economic parameters of the sharing economy (offer of accommodation, occupancy, period of lease, total revenue for the local market, etc.) and on the search of its spatial development pattern.

The following conclusions result from the said analysis: a) despite the continued potential of offer, there are negative impacts noted since 2019 – the pandemic initially makes the situation worse, b) in the pre-pandemic period, the S.E. status in the Old Town was better than in the whole island of Corfu while during the pandemic the situation is reversed, c) the direct total economic result for the local market during the last three years (2019-2021), is affected in different ways: mainly based on a quantitative extension of the activity during the pre-pandemic period (2019) and on a combination of quantitative and mainly qualitative data (duration of stay, revenue per night, etc.), during the period of the pursued tourist recovery (2021), d) a divergence between the spatial patterns of accommodation offer and demand in the Old town, with indications of demand higher than expected against offer lower than expected.

For an overall evaluation of the contribution of the S.E. in the Old Town of Corfu and the broader area, the above data of the analysis must be taken into account along with the broader social and environmental-spatial effects.

*Keywords: sharing economy; economic impacts; spatial patterns; Corfu*

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## Urban Transformations: the shifting modalities

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### Extended abstract

The dramatic changes that took place in the Palestinian reality resulted in major challenges in urban and rural areas and the emergence of new forms of urban developments since the 1990's. Shifting economies, investments and new visions for Palestine have been defined within the frame of a state-building stage and neoliberal economy causing a boom in investments and the construction sector. This inclination towards neoliberalism amidst the prevailing regional attitude towards attracting businesses and investments, somewhat steered the state-building visions. A shift from the agrarian based economy to a service led economy imposed drastic changes and challenges on both urban and rural areas. This was highly projected on the social and communal needs and the emerging new lifestyles. The high demands on land for development have caused tremendous rise in value and the prices of land in cities and consequently on the peripheries and rural areas around, which gave way to investors and businesses to take over and steer the development in one direction.

This research explores the shifting modalities occurring in the Palestinian urban and rural areas. It mainly investigates the current urban conditions in the city of Ramallah and its impact on the peripheries and villages. It investigates the main indicators of the urban neoliberal transformations and restructuring that can be seen in the new urban islands and the rise of residential archipelagos, which mainly cater to the emerging lifestyles characterized by consumerism, and the attraction and establishment of regional and global commercial companies as well as planning, engineering and construction firms. These new forms of urban development have exerted high pressure on the values of land in cities and their peripheries and consequently the surrounding rural areas. Rural areas have adopted similar models of development replacing agricultural lands and the open landscapes with urban archipelagos and gated residential areas.

Ramallah acquired a new status upon the arrival of the Palestinian National Authority in 1994. It became the temporary capital of the 'newly established state'. There was an influx of capital into the city for the construction of governmental, commercial and residential sectors in order to meet the new needs. Another important incident, which aggravated the urban rapture of the city and the surrounding villages was the neoliberal era under the administration of Salam Fayyad. Much of the rapid development was based on speculation that the values of land will continuously rise not only in the city but also in the rural areas. The research is interested in studying the influence of Ramallah as a model of neoliberal development on the villages of Birzeit, Abu Qash and Surda which lie almost 10km to the north of Ramallah.

This paper highlights the urban structural and morphological dichotomy in Ramallah, Birzeit, Abu Qash and Surda by investigating changes in the land-use plan, architecture and urban landscape character and their associated socioeconomic challenges and transformations. This will be further explored by adopting an ethnographic approach, reviewing archival resources and studying the morphological transformations.

*Keywords: Urban planning, rural areas, commodification of land, occupation, planning policies, gated communities*

## Economic and spatial policies of FDI location in Europe and Greece

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### Extended abstract

This proposal refers to the crucial impact of economic and spatial policies on Foreign Direct Investment (FDI) location at the European level and as the main tool of economic growth and recovery in the case of Greece. The economic boom and the increase in productivity and entrepreneurship-intensified competition between the states, which of course has spatial impacts. Regions, cities and urban areas, seen as receptors for economic activity and investment, should adapt to the ever-increasing changes that are occurring. To mitigate such competition, the EU provides the Cohesion Policy with a clear spatial orientation. The methodology that was used for this purpose is case study research for empirical conclusions to be drawn concerning the contemporary formulated policies concerning the FDI location in Greece.

As a part of a wider PhD research, this article examines the concept of Special Economic Zone, which is the most common tool regarding the location of FDI. According to the OECD's definition, FDI is defined as a category of cross-border investments made by a resident of a country (origin), to acquire a lasting interest in a company, located in another country (destination).

Special Economic Zone (SEZ) derives from economic policy and is characterised as a geographical area delimited, within which there are certain tax and development incentives to strengthen industry and investment in general.

SEZ is widely used in most developing and developed economies, while their whole logic is based on theories of economic and spatial agglomeration, i.e. clustering of industries and businesses, either as companies in the same sector (localization economies) or as different businesses in the same location (urbanization economies). The SEZ is subject to differentiated economic regulations from other regions in the same host country, with the aim, of course, of attracting FDI.

As far as Greece is concerned, there is no institutionalised SEZ, although it has been discussed and proposed several times, mainly in the border areas. In contrast, the location of investments is sought through the tools of spatial planning, which have the development scope.

In conclusion, the study of the implementation of this economic policy tool raises some interesting issues. Initially, the exclusive economic planning of SEZ is not enough, if it is not part of a single policy of attracting investments, which takes into account spatial factors and the impact of these Zones on the space. Spatial planning and development outside the Zones are equally important, as they complement complementary functions and activities with those within them. Therefore, the integrated spatial planning of the wider area in which it is located is necessary. The experience of implementing this tool has proved that in the wider area outside the Zone, additional activities are attracted, with the result development within the Zone implies a development outside it. Thus, the benefits are diffused in the wider region, with multiple significant social consequences.

Finally, three pillars are recognized for the success of the Special Economic Zones development outcomes in a country: (i) the correlation between the SEZ strategic approach and development policy, (ii) strategic dynamism, regarding the risk of this project for both the investing entrepreneurs and the state and (iii) the implementation. Moreover, a fourth one could be added, concerning the integrated approach to spatial planning.

*Keywords: foreign direct investment; special economic zone; spatial policies; urban economies*

## Decisive factors in changing the urban scenery - Oslo as an example

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### Extended Abstract

Urban landscapes are in a continuous process of change. Rarely, it is caused by natural disasters. Most often they are initiated by power-struggles (including sometimes acts of terror and wars) and property-speculations. Both approaches are well wrapped in political or ideological terminology. And in this respect, the slogan “the freedom of the private car”, has absolutely been a frontrunner in the world since 1945.

Oslo has a several hundred years long history of battles between the state (today Norway) and the town/municipality for ownership and use of key city-locations. Today, hospitals, new government offices, motorways and railway lines are high on this agenda. In Norway, the government (state) can usually overrule the municipalities on the use of strategic city-land. Therefore, such conflicts are an important part of the struggles of the political parties in the city-parliament. Further, they are almost as a rule, very high on the agenda of local and national media.

Oslo has like many other European capitals seen a bonanza in property prices since the economic crisis of 2008. Prices have doubled. National as well as international companies, often located in overseas tax-havens, are involved. Only fragmented overviews of who are buying and selling, who the owners (shareholders) are and where they are located, are available.

95 % of all housing-unites in Oslo were until 1940 rented. The buildings were mostly owned by smaller or larger landlords. Only 5% of the housing units were owner-occupancy. Also, from 1945 until 1982 more than half of all housing in Oslo were price-regulated and controlled through government policies. But this changed and this year we can look back at 40 years with hardly any price-control or regulations.

Both left and right in the National Parliament have strongly pursued private home-ownership policies. In Oslo the result is that 37% of all homes are now private owner-occupancy, more than 33% are owner-occupancy through housing co-operations and 30 % is for renting. Also, many of these are privately owned.

The total number of housing-unites in Oslo are 347 000. 100 000 is for renting. Half of these are family-owned. Anyone in Norway can own five flats without having to pay wealth taxes. A total of 11 000 flats for renting are empty, probably mostly because the owners see them as investments.

However, even if owner-ship structure has changed formidable in the city the last decades, the class-division of Oslo - with the working class living in the east and middle class and the rich in the west, is still the same.

*Keywords; political struggles, property speculations, changing urban scenery*

# Post-socialist financialization through urban mega-projects: Flexibilization of norms and commons, or just an exceptional a fortiori game?

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## Extended abstract

The paper explores urban financialization through urban megaprojects (UMPs), as instruments of urban development, and specific types of urban exceptionalities on the example of the Belgrade Waterfront Project (BWP). The post-socialist institutional framework has provided the conditions for attracting foreign investments, especially those of interest to the leading real estate investment trusts and international capital in the services and urban real estate sectors. Real estate financialization is a general pattern of neoliberalized urban transformations, mostly through UMPs. Neoliberal principles of urban planning are widely accepted, while state structures at the top of the government broadly accept the concept of “exceptions” in urban financialization, i.e. the “exceptionality” of BWP as a “new trademark of our capital city and Europe”. The process of financialization through UMPs in the post-socialist urban development is fast-growing. This is made possible by using new financial instruments and products, and by extracting and monetizing the values of urban commons in the procedure of decision-making, planning and governance (DMPG). The various aspects of UMPs make them exceptional and extremely complex: huge size, sometimes unpredictable outcomes and diverse multi-scale impacts. Their exceptional character causes changes to the urban rules, conditions, planning regime, urban matrix, and introduces “exceptions” in the process of DMPG. These changes encompass the suspension and violation of urban norms; the acceptance of exceptional standards; flexibilization of norms, and finally, their normalization on multi-scales. We explore the exceptionality of the DMPG of BWP under state patronage and international investors. Starting from the premises of Agamben's theory and the game theory, we applied a comprehensive analysis of DMPG onto BWP.

The findings point to a strong appropriation and erosion of urban commons, to violations of various rights and norms (including the urban norms), as the consequences of a new assetization game driven by the predicted outcomes of urban financialization and the concept of the “state of exceptions”. Under the influence of the applied framework of the “state of exceptions” new “exceptional spaces” in urban environment are being created, such as closed smart ghettos of the rich, and ghettos of the poor. The paper indicates exceptional socio-spatial phenomena, such as: mainly state-led gentrification; the new urban ghettos; and the endangering of public interests, goods, properties, as well as public finance. It was concluded that it is necessary to rethink the acceptability of UMPs “exceptionality”, the violation and servility of current urban norms, but also the flexibilization and normalization in DMPG towards more inclusive and sustainable perspectives. Additionally, a shift from the existing practices in DMPG of UMPs is suggested, such as: the reconsideration of *lex specialis* (for BWP); avoidance of exclusive fast-lane and “top-top” approaches to UMPs; exclusion of a fortiori approach in DMPG; limitation of the discretionary powers of the central government; elimination of planning decisionism through by-laws (especially in urban land-use, alienation of public construction land without fees); extra-territorial urban planning of the UMPs; poor participation, etc. Some recommendations for improving the DMPG for UMPs and for controlling these “exceptions” in the post-socialist context will be given.

*Keywords:* Post-socialist financialization; urban mega-projects; exceptional property game; flexibilization of norms; *lex specialis*; a fortiori approach

## The use of public land to provide affordable housing: applications in Toronto Canada

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### **Extended abstract**

The need and provision of affordable housing for those households and groups who can't afford market housing is not only a problem in Canada but is worldwide. As an alternative to providing demand side subsidies or providing supply side subsidies for the construction of units, a viable alternative is to provide in kind subsidies in terms of government owned land. This contribution may be provided through several different policy tools. These tools include public land leasing, land readjustment or the use of public private partnerships. All of these tools are part of the domain of land value capture applications. In situations where related to government investments or market conditions that land values are increased, these tools can be used to capture land values that are in turn used to subsidize affordable housing.

The paper will examine and explain cases where these land value capture tools have been used in the Canadian and specific Toronto context to either rebuild aging social housing units or create new units that add to the existing supply. Finding ways to fund either the repair or replacement of social housing units has received a great deal of attention in Toronto as the Toronto Community Housing Corporation accumulate significant deferred maintenance for its social housing stock. The solution has been Public Private Partnerships where the Private Sector Partner receives government land to build market condos in exchange for rebuilding all of the social housing units and provide additional community benefits. Regent Park will be provided as the flagship project with the approach being replicated for seven other projects across Toronto.

Examples of using public land leases to lever affordable housing have been used for one off demonstration projects in the WestDonlands by the Provincial government, in the waterfront district by Waterfront Toronto (Tri-Government Agency); and by the City of Toronto Affordable Housing Office in its "Housing Now" program.

This success and concerns of the above programs/ approaches will be presented and evaluated. Recommendations will be made for the further use of the programs in Toronto and other jurisdictions.

*Keywords: affordable housing; land value capture; land leasing; Public Private Partnerships*

# The property assembly issue in urban regeneration projects in Greece

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## Extended abstract

Land and property may be important facilitators in urban regeneration projects. The availability of land is an important issue that may hinder property development, necessary for urban regeneration. This constraint emanates from the particularities of land as an asset, the characteristics of the property market, the behavioral characteristics of owners and the institutional context of real ownership, exchange and development. The implementation of urban regeneration projects depends on the very complex task of successful property assembly, including the acquisition of lesser ownership interests. Multiple ownership of land can act as a significant barrier to projects development, while a most prevalent form of constraint in properties' assembly is the division of ownership rights and more precisely, when it is the case of individual properties belonging to many co-owners.

The issue is more complex when there is a need for acquisition of multi-ownership properties in buildings for the purpose of its renewal, and eventually, its use change, within an urban regeneration project. The number of co-owners of the buildings may be exponentially increased over time; this intensifies the difficulties in the implementation of any urban regeneration initiative. Furthermore, the management and administration of condominium in Greece are assigned to all of its owners unless the by-laws dictate otherwise, according to the Greek Law on Ownership of Storeys; a unanimous resolution is required for all acts of administration. With regard to the accumulative application of the condominium provisions of the Civil Code in effect, it is inferred that in the case all co-owners cannot agree, or a majority laid down in the by-laws cannot be reached, no renewal is effective.

From the economic point of view, properties assembly for buildings renewal and urban regeneration purposes is a case of market inefficiency, imperfect information and dominant position of the owners, this leads to the called holdout problem. Barriers may be caused by owners willing to sell but whose expectations of price were unrealistic and by those entirely unwilling to sell. All the above may lead to projects' canceling.

It is particularly hard to resolve the co-ownership issue without the prospect or lucrative development of the property, or State intervention using statutory measures, such as expropriation. But the problem solving is more complicated according to the institutional context, as far as expropriated property may be transferred to a private developer; this questioning the public interest purpose of the expropriation act.

Based on an extended field research in the Athens city-center, this paper proposes a new process of properties acquisition, development and redevelopment within urban regeneration areas, with taking into account the existing institutional framework on expropriation in Greece, as well as the provisions of the Greek Constitution regarding property ownership protection.

*Keywords: Urban regeneration, Property assembly, multi-ownership properties.*



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# Cities Resilient in Times of Pandemics and Sustainable Cities

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## Extended abstract

The basic principle of sustainable architecture can be stated as the minimum use of existing energy resources, and the construction of structures that are compatible with nature and do not harm human health. In the field of architecture, some researchers have highlighted the differences between the definitions of sustainable architecture and green architecture. However, most researchers treat these two definitions as interchangeable terms. In fact, there are many definitions such as "Green, sustainable, ecological, climate and eco-friendly, high performance, smart, passive, carbon-zero building". The aim of this architectural movement is human's respect for nature. Today, there is a risk that future generations will not be able to sustain their lives. In this context, sustainability can be defined as "meeting today's needs without harming the resources that future generations will need" and "transferring today's resources to future generations".

Sustainable architecture includes sustainable building elements and systems, sustainable design, project and construction strategies. Sustainable building elements include materials and technical tools. In sustainable design project and construction strategies; site selection and development, transportation impacts, various layouts and orientations of the building, reuse, sustainable product and material selection, renewable energy use and energy savings, water resources saving and renewal, optimization of the potentials of the land and its surroundings (operation, maintenance and repair of the building) Sustainable approaches that are friendly to human health, such as clean air, human comfort, etc., are discussed.

Most of the time, structures that are claimed to be sustainable may not always be sustainable. However, when applying sustainable design elements and systems, some results may not have positive effects on society and the environment. Wooden structures designed with the thought that wood is a natural and sustainable building element can be considered sustainable. However, wood production needs to be regulated in such a way that it does not cause deforestation in our environment and its transport does not lead to higher energy consumption (Chansomsak and Vale, 2008).

While the words "green, ecological, climate and environment friendly, zero energy or carbon-zero building, high performance building" can be used interchangeably, the words "sustainable building" or "green building" are often used instead of these words. Today, there are many successful exemplary structures designed to support the protection of the natural environment. However, there are structures that are defined as sustainable or green buildings, even though they do not meet the criteria for protecting nature. The terms green and sustainable are also used for advertising purposes today.

When the definition of "sustainable city" is considered in terms of "livability", we can understand that an increase in the quality of urban life is defined. In this context, one of the most important architectural practices of the 21st century has been the phenomenon of "sustainable city" and "green architecture". With green architecture, the amount of energy consumed in the construction, use and operation of the building is reduced. The amount of pollution and waste arising from the building is reduced. At the same time, many stages such as sustainable energy use and construction with natural building materials reveal the green architectural feature of these buildings. Another purpose of green architecture is to bring people living in the city closer to nature. Houses, which are one of

the important building blocks of traditional and rural architecture, reflect many qualities of green architecture. These structures, in harmony with nature, carry the sustainable features that have been going on for centuries. Within the scope of the study, the definitions of “Resilient cities in the Pandemic Period”, “Sustainability” and “Green Architecture” will be discussed. In addition, the connections between traditional residential architecture from the past and green architectural structures will be investigated.

*Keywords: Sustainability, Resilient Cities, Green Architecture, Traditional Housing Design Criteria*

# Optimization of living conditions in the public space of the Greek city through architectural design

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## Extended abstract

Our urban environment is in constant flux caused by the often violent economic and social transformations as well as climate change. The issues of remediation, adaptation and resilience in terms of sustainable design are increasingly, nowadays, a prerequisite for most urban interventions on a small or large scale.

For the first two decades of 21<sup>st</sup> century, the municipal authorities in Greece have spent significant funds of their budget on the renovation of central points of the cities, attempting to renew the image of their municipalities. Most of the cases concern the functional redesign of areas, aiming at the creation of the new municipal image. The object of the natural planning of the renovations in a certain intervention area was mainly the reconstruction of sidewalks, in some cases the creation of bicycle paths, the creation of parking spaces, the management of rainwater drainage, horizontal and vertical marking, greenery and street lighting works.

In 2011 the CENTER FOR RENEWABLE SOURCES AND ENERGY SAVINGS (CRES) under the presidency of Mattheos Santamouris presented a program of Urban Bioclimatic Reconstruction within the European Operational Program "Environment and Sustainable Development 2007-2013". The Program called "BIOCLIMATIC UPGRADES OF PUBLIC OPEN SPACES" concerned the design and implementation of pilot / demonstration projects of urban upgrade within the network of cities of the Greek territory with specific bioclimatic characteristics and with the aim of halting urban climate change. The project was managed by CRES, which undertook the selection, monitoring and the scientific and financial evaluation of the projects.

The expected results of the renovations included the reduction of the thermal heat island effect within the urban fabric, the reduction of CO<sub>2</sub> emissions and the stimulation of pedestrian and alternative forms of movement such as the use of bicycles. Theoretically beneficiaries of the operation were both the permanent residents of the urban fabric of each municipality as well as the visitors and tourists of each city. In November 2011, proposals were submitted by 78 Municipalities and on December 18, 2012, 15 proposals were positively evaluated.

In the present paper, the qualitative characteristics of the program are analyzed and the results are commented. In addition, the evaluation of the 15 studies is attempted and especially the categorization of the design proposals based on the results in relation to the bioclimatic behavior of the Public Spaces.

*Keywords: Resilience; city centers; urban Regeneration; Sustainability ecology; Climate Change; Open Spaces; Architectural Design*

# Tech-based gamification strategies for Public Space regeneration

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## Extended abstract

Public spaces play a pivotal role in urban regeneration strategies, representing the main field of action to strengthen social interaction and build the sense of community, the physical framework for services and strategies that support citizens' needs, and the structural nodes of urban systems that move towards resiliency and sustainability models. The engagement of citizens in co-design and co-creation strategies is renowned as crucial to address their needs and desires, as well as to enable the implementation of regeneration projects, activating the citizen agency. However, it suffers limitations posed by difficulty to engage a large and representative sector of society, and by complexity and multidisciplinary of the design process.

This study aims to assess the potential of serious game approaches and gamification strategies, empowered by digital technologies, to engage citizens in co-design and co-creation of sustainable and livable public spaces. Presenting three case studies developed at IAAC-Institute for Advanced Architecture of Catalonia and implemented in Barcelona and Nantes, this research compares different methodologies and gamification tools for co-design: a video game, a physical game board, and a gamified interactive sensor/actuator installation. They are evaluated based on their capacity to engage individuals, stimulate interaction between citizens, generate valid design solutions for livable and healthier environments, and support co-creation and real implementation of solutions.

The first case study is the mobile-based *Superbarrio* video game platform. It empowers citizens to visualise and design the public space in 3D, receiving a score calculated on the impact of the design proposal on parameters of wellbeing, health, mobility, nature, participation, and economy. The second case study is the *PPS Urban Game Board*, a digitally fabricated game embedded with digital sensing devices, supporting the co-design process through game tokens that belongs to categories of health and safety, resilience, energy and carbon neutrality, food, circular economy, mobility. The third case study is *Lumina Foresta* installation, which citizens in a 360° interactive gamified environment with sensors and actuators. Connecting awareness-raising and activism, it focuses on sustainability and renaturalisation of the urban environment.

The assessment and comparison display the correlation between different game tools and mechanics and different levels of impact with regards to engagement, community building and implementation capacity. It includes: the potential of *videogames* to engage a larger audience, as the game can be accessed in different locations including the public space or the users' private houses; the high capacity of *physical games* to create interaction, interaction, community building and problem solving; the potential of *interactive installations* as communication tools to captivate citizens interest and foster awareness-raising, despite limited impact of the co-design outcome and process.

The study demonstrates the potential of digital-based serious games and gamification strategies to engage citizens in co-design and co-creation of livable public spaces and offers a critical evaluation of different tools to enable researchers and practitioners for future studies, developments and applications according to local contextual criteria and objectives.

*Keywords: Participatory Design; Public Space; Gamification; Serious Games; Livability*

# Contemporary challenges for residential Architecture: towards a more resilient and adaptable dwelling, building and city

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## Extended abstract

Dwelling is one of the central research topics in the architectural discipline, insofar as the question of dwelling will always be central to human life and society. Even though it has a permanent character, a transformation of housing spaces is continuously registered, since the experiential and social transformations of the human being, over time, correspond to an evolution and modification of the domestic space.

Today, dwelling must meet the profound social, labor and technological changes that occurred in recent decades, and brought different and evolving requirements to the house. This is reinforced by the fact that we can observe a clear dissociation between emerging ways of living and proposed housing models, mostly based on typologies that are still heirs of modern rationalist architecture.

The current Covid-19 Pandemic constitutes yet another challenge for the rethinking of residential architecture, both in the design of the apartment and in the design of the building: the dwelling spaces have been the subject of new and increasing demands, with the introduction of new uses in the home – working, studying, socializing, resting, playing, communicating, exercising, others – and the request for new spaces: inside spaces like home offices, study rooms, playrooms, physical exercise spaces among others; outside spaces like terraces, verandas, rooftops, patios, yards, gardens; and collective shared spaces like multipurpose common rooms, playgrounds, gardens, terraces, among others.

Addressing these questions, different principles, ideas and strategies, both for the apartment and for the residential building can be pointed out as a way to find more suitable residential environments for the accelerated transformation of contemporary ways of dwelling and also to give answer to the new challenges brought by the Pandemics.

Based on the reading of key authors on the subject and of relevant case studies of residential architecture (pre-modern, modern and contemporary), the article aims to contribute to the establishment of design principles and strategies developed to promote a more open-use and versatile interior domestic space, thus focusing on the ideas of *flexibility*, *adaptability*, *spatial ambiguity* and *de-hierarchization*; and to promote a more varied, diversified and inclusive residential building, proposing the ideas of *typological and morphological diversity*, *functional hybridity*, and promoting the principles of the *elastic apartment*, the *disperse apartment* and the rethinking of the *communal residential building*,

The final aim is to contribute to the design of a more resilient and adaptable residential architecture – considering the home, the building, the neighborhood and the city -, more prepared to face the challenges placed by the Covid-19 Pandemic, more adequate to contemporary needs and aspirations, and more adapted to change, present and future.

*Keywords: Dwelling; contemporary challenges; Covid-19; principles and strategies; adaptability and resilience.*

# Instant Cities: Redefining urban spaces through arts and technology

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## Extended abstract

Over the past years, research concerning emotional and cognitive wellbeing of individuals, the impact of functionality and design of indoors and outdoors spaces, is intensified. Recent advances in cognitive and sensing technologies in artistic and creative industries are deepening the understanding of how changing environments can affect people's wellbeing and behavior. Project 'MindSpaces' brings together artists, creatives, and technology experts to design solutions for creating emotionally and functionally adaptive designs of outdoors and indoors spaces.

MindSpaces is addressing design needs, present in a diverse set of environments, ranging from public, openly accessible urban spaces, to demanding professional indoor environments and finally to sensitive domestic environments with special needs of their inhabitants. This array of spaces, both outdoors and indoors, reflect an important part of today's city challenges, holding an important social character. For the realization of the project's vision, artists, technology experts and end users are closely collaborating under a novel working model scheme aiming at creating solutions that highlight the cultural significance of cities and sustainability issues they are facing, as well as paradigm-shifting designs of outdoors and indoors environments.

Aristotle university of Thessaloniki as project partner is mainly involved in design cases, related to outdoor urban environments. More specifically, the research team is focusing on the modern city of L'Hospitalet in the urban area of Barcelona, Spain. The research procedure incorporates new technologies in architecture and urban design, utilizing and adapting Kevin Lynch's theory, from his now classic book "The image of the city". Kevin Lynch is extensively discussing the concept of imageability, notion of pivotal importance in the project implementation. As defined by Lynch, the concept of imageability, with emphasis to the physical environment, is described as the physical qualities that relate to attributes of identity and structure in a mental image.

Project 'MindSpaces' design use cases aim at incorporating artistic and city inhabitants' input, with the deployment of innovative architecture and design authoring applications, as well as state-of-the-art (SoA) multi sensing technologies, such as wearable EEG, physiological sensing, visual and text sentiment analysis, amongst others. This diverse set of technologies and inputs aim at creating a platform that gives architects and designers the ability to articulate proposals centered on improving societal challenges and the imageability of urban spaces.

*Keywords: city; urban design; MindSpaces; technology; art; Barcelona, Kevin Lynch; imageability*

# Ecoplinthos, recycling construction waste: an innovative wall panel for buildings

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## Extended abstract

Excavation, construction and demolition waste (ECDW) constitutes one of the biggest streams of waste. ECDW is produced from activities such as construction or demolition works for buildings and infrastructure projects, renovation works for houses or apartments as well as road construction works. Excavation, construction and demolition waste is one of the heaviest and biggest in volume type of waste produced across the European Union (EU). It accounts for 25% - 30% of all EU waste, consisting of materials such as concrete, iron, bricks, plaster, wood, glass, metal, plastic, asbestos and earth – materials that can in fact be recycled. Uncontrolled disposal of ECDW - apart from polluting the soil, the air and the water resources – is a major factor in the aesthetic degradation of their disposal site. The recycling of building materials at appropriate management facilities providing us with new materials that we can use is a modern trend of environmental engineering in the field of the alternative management of waste. The benefits of recycling, or on a wider note of the alternative management of waste, are well known and fully documented. Recycling supports sustainable development from a financial, environmental and social aspect; it is the most integrated approach in waste management today as it combines financial benefits with providing a solution to environmental problems whilst also creating new jobs. Recycling is key in the achievement of EU's strategy for the transfer over to an economy that utilizes its natural resources more efficiently. ECDW has been recognized by the EU as a high-priority waste stream as regards their management. There is currently momentum in their recycling and reuse, given that some of these are high value materials. In particular, a market now exists for aggregates arising from ECDW for construction projects. Furthermore, the technology for separation and recovery of construction and demolition waste is firmly established, easily accessible and in general, low-cost. However, the recycling and reuse of waste across the EU varies to a significant degree from below 10% to more than 90%. In certain member countries, this category of waste is disposed of instead of recycled, taking up valuable space in sanitary landfill sites. Furthermore, if waste is not separated at source, it can contain quantities of dangerous waste, posing a significant risk to the environment.

A new innovative solution is proposed herein for the recycling of a large share of building waste, modeled mainly on the Greek construction system; this is the production of a new construction material from ECDW with the view of protecting the environment, aiming at saving raw materials and electrical energy, whilst at the same time reducing the volume of waste and creating new positions of employment. Following extensive research, certain ECDW materials were selected to be recycled and reused, giving rise to the idea of creating a new technology building material for filling and outer lining of buildings, wall panel, etc.; the ECOPLINTHOS PANEL. The presentation outlines ECOPLINTHOS, the materials it consists of, the procedure for its production, the tests made and the conclusions reached.

*Keywords; recycling construction waste, innovative wall panel, 'ecoplinthos'*

## **Inclusive design using cultural, ecological and business innovations in the context of building strong local communities.**

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### **Extended abstract**

The author's participatory projects on spatial solutions causing social conflicts show similarities at the stage of discussion on the proposed possible spatial changes. Currently in Poland, at the stage of urban and architectural design, multivariant expert analyses are required, and they result in selected proposals presented in visualisations and design documentation. Meanwhile, for public discussion, it is often necessary to provide quick impact analyses for proposals that are put forward by stakeholders. In conflicts, where stakeholders represent extremely different expectations and in cases where it is difficult to involve stakeholders in the dialogue, a process is needed to guide participants in the process through the analysis of different options and design directions. The available technology allows conceptual visualisations to be created and presented in traditional or virtual reality form. However, processes where organisers have been tempted to include stakeholders in this analytical process need to be recognised. The purpose of the study was to find literature that describes examples of the participation of stakeholders in creative work and data analysis and to analyze the potential costs that would compete with developing design proposals in VR simulations. The study also analyzed the proposals of participants in startup hackathons where participants used inclusive technologies to engage passersby in dialogue about urban and architectural solutions. The selected projects addressed public engagement for projects responding to the challenge of climate change adaptation and pointed to the need for multi-pronged dialogue. Among the findings, specific expectations of participants in participatory processes are evident. Expectations relate to a close relationship in the nature of co-design, in which individual observations can be visualised in real time, and decisions made in meetings. It is important to specify the characteristics of research techniques and tools that can meet the expectations of participants in participatory processes, including designers and process organizers. The characteristics include a financial and organisational analysis of the methods used to involve local communities in urban-architectural design.

*Keywords: urban-architectural design; city; participatory projects; inclusive design*

## **A new interdisciplinarity. The relevance of Ross Ashby's “embodied mind” in the scientification of present design thinking.**

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### **Extended abstract**

From the 1940s-1960s cybernetic electromechanical “perception” devices set in demystifying the human brain to the design methods movement in architecture and its mutations, the paper traces connections between traditionally disparate fields and reveals operations, tactics, and methods that situate the notions of performance and adaptation. The paper argues for a dialectical approach to the contemporary understandings of performance as it was manifested in psychologist and cybernetician Ross Ashby's “embodied mind” concept in the 1960s. Via the construction of parallel historical lineages, the paper reflects a willingness to transcend disciplinary boundaries that are characteristic of cybernetics' origins cutting across distinctions between design and science fields as well as those between objectivity and subjectivity, human and machine, and mind and body.

Such evolutionary cybernetic “perception” machines including Ashby's homeostat, Gray Walter's light-seeking tortoises, and later on Gordon Pask's musicolor—all works deeply influential to the design methods movement proclaimers—a meaningful synergy between psychology, philosophy, and scientific rigor is revealed and an understanding of performance as action—bodily, biologically and socially—is being promoted. These dialectical approaches, the paper argues, entailed softening the rational lenses of the first-generation design methods movement in its aspiration to systematize design and anticipate its social outcomes. Ross Ashby's work on the nature of embodied mind is key in framing the importance of the user and the body as a performative entity made of complex actions that define the space as much as the space defines the actions of the body.

In an attempt to make a parallelism between the transition from the first generation of cybernetics to the second order cybernetics and the evolution of the design methods movement to the later design thinking approaches, the paper argues that—in both the sciences and design realms—the reincorporation of the human and the coupling between reasoning, perception and embodiment enriched the original scope. In design's and cybernetics' parallel evolution and through their various mutations and entanglements, the synthesis between subjective interpretation and methodological rigor appeared as a very real possibility. As psychology, neuroscience, cognitive science and artificial intelligence evolve, new paths are engendered. The embodied mind entails a performative understanding of the brain, mind and self, transgressing the familiar dualism of mind and matter. In embracing the “unknowns” of perception and intuition, while including the body, the embodied mind concept offers a valuable resource for the future of the design discipline.

*Keywords: cybernetic sciences; performance; adaptation; embodied mind; design thinking movement.*

# Introducing High Tech Layer on Low tech Designs for smart city applications

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## Extended abstract

A smart city is a municipality that uses information and communication technologies (ICT) to increase operational efficiency, share information with the public and improve both the quality of government services and the well-being of citizens.

Consequently, the ability to integrate applications into the smart city system requires the introduction of state-of-the-art technology and therefore the use of high technology makes application prohibitive in countries with low industrial potential such as Greece.

This in turn means that the introduction of innovative technological solutions depends on the import of products, widening the country's gap from those with a high level of industry and ability to develop integrated solutions for smart city systems.

In this difficult equation the only possible way out is to use open technologies. Open technologies are a critical priority for Greece for sustainable development, better production and exploitation of research results, cooperation and the democratization of knowledge.

In the present work are presented three design applications that were developed in respective diploma theses of the School of Architecture of NTUA.

A common denominator in all cases is the introduction of technology as an additional level on the designed system as well as the use of technology without copyright.

Specifically, the following case studies are presented:

1. Diploma thesis presented in June 2020 on the design of a network of cultural routes in Mesa Mani. The Design dissertation incorporates directional and networking technologies based on open technologies.
2. Diploma thesis of October 2021 concerning interactive constructions that reflect aspects of public life. The design dissertation deals with the design of a system, which through variability and the formation of spatial tensions, reflects and redefines human life in public space.
3. Diploma thesis of February 2022 on the subject of interactive construction of rearrangement of acoustic parameters of spaces. The design dissertation focuses on design solutions that change the boundaries of spaces and is also based on open technologies

In all design work, the limitations set from the beginning were the use of simple materials and elements, which can be easily assembled by unskilled people as well as the use of open technologies. The use of open source hardware and software for incorporating automation into design makes construction scalable, enabling the whole community to expand the designed product and create most suitable variations.

*Keywords: Resilience; city centers; urban Regeneration; Sustainability ecology; Smart Cities; Open Spaces; Architectural Design and New Technologies; Mesa Mani, Open Source*

# Design and construction framework for freeform glass facade

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## Extended abstract

Nowadays design and construction of glass facades is a very complex sector in the construction industry, whose multidisciplinary character is reflected in the application of new technologies of glass and glass facade production, in solutions for multitude requirements of the envelope performances sometimes very complex geometry, as well as in wide range of various glass materials. The aim of the presented research is to create links and interactive relationship between the design process on the conceptual level, materialization and realization of geometrically complex form of glass envelope, which integrate different issues such as design, manufacture, performance and economy. Based on research on how architects, engineers and contractors deal with different aspects of the design and construction process of freeform glass structures, the investigation includes an overview of interviews findings as a basis for the development of support tool – process map, which could help efficient storage, access and transfer of project information.

The current paper presents creation and verification of a model of process mapping which will be supportive in further research of the application of glass in all types of geometrically complex glass facades. The process map is especially useful for defining deadlines, understanding the role of different actors, their responsibilities and the sequence of activities, as well as identifying different requirements during the design and construction process.

The first part of the research related to the mapping of design and construction process of geometrically complex glass envelopes (CGE) implies the design of the map. The map is created using the method of graphic presentation of specific processes in the business process model - BuildingSMART's adaptation of the Business Process Map Notation (BPMN), which improves the exchange of information between software applications used in the construction industry. The entire process is analyzed, defined and presented in the following six phases: preliminary CGE design proposal (including a sub-phase of outline cladding proposal); detailed CGE design proposal; final CGE design proposal; tender documentation and evaluate tender returns; coordinate design process with fabrication process; monitor construction work to completion. In addition, mapping of the process was carried out both on database and information about design and construction process of glass facades in Serbia and Europe, as well as according to British RIBA Work Plan. The final goal of the analyzed process is to give the comprehensive overview and underline the most important steps characteristically for the design and construction of geometrically complex forms of glass envelopes. The process itself, which, besides combining knowledge from different areas, has included with particular attention the CAD-CAM fabrication of the curved glass envelope, as well as a different approach to the curved glass shaping technique. As well, the most important steps in the process were distinguished through the analysis of relevant case studies. The second part of the research relating to the mapping of design and construction process was realized during interviews in which the map was verified and evaluated.

*Keywords: freeform building envelope; glass; facade design and construction; process map; survey*



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# Urban Diversity and Epidemic Resilience: The case of the COVID-19

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## Extended abstract

In recent months the world has experienced a severe pandemic caused by the novel coronavirus. It erupted in China in early 2020, quickly spread worldwide, and has claimed lives almost everywhere. According to the World Health Organization, as of August 14, 2020, more than 20.5 million people had been diagnosed with COVID-19, and 750,400 had died, in 216 countries. The morbidity and mortality rates vary from place to place, but it has hit harder in closed and homogeneous communities, especially the ultra-Orthodox Jewish communities in Israel, New York, and other places.

The spread of the coronavirus pandemic offers a unique opportunity to improve our understanding of the role of urban planning strategies in the resilience of urban communities confronting a pandemic. This study examines the relationship between urban diversity and epidemiological resilience by empirically assessing the relation between the level of neighborhood homogeneity and the probability of being infected by the coronavirus. We focus on the ultra-Orthodox Jewish community, a relatively closed community that was disproportionately and severely affected by the pandemic in both Israel and the United States, especially in its early stages.

In recent years, the Ultra-Orthodox community has undergone major changes in its degree of closure and isolation. Some members of the community continue to live in closed neighborhoods, while others have moved to more mixed neighborhoods. This enables us to examine a wide range of neighborhood homogeneity values, especially as we are able to utilize unique, detailed data spanning all neighborhoods in Israel.

The findings indicate a monotonic but nonlinear relationship between the level of ultra-Orthodox prevalence in a neighborhood and a resident's probability of contracting COVID-19. As the fraction of ultra-Orthodox individuals in the neighborhood decreases, the fraction of infected population decreases significantly and more strongly than can be explained without recourse to urban diversity considerations. This relationship is found to be significant and strong, even when other variables are accounted for that had hitherto been perceived as central to coronavirus distribution, such as housing density, socioeconomic level of the neighborhood, and number of people in the household. Although the findings focus on the UO community in Israel, they are important and relevant at various levels to many societies around the globe in which a variety of populations have a separatist lifestyle. On a practical level, the findings emphasize the central role of urban planning strategies in maintaining public health and their ability to affect the resilience of the public and reduce its likelihood of contracting epidemic diseases. Although the findings focus on the ultra-Orthodox community in Israel, they are important and relevant at various levels to many societies around the globe in which a variety of populations have a separatist lifestyle.

*Keywords: coronavirus, COVID-19, urban diversity, neighborhood homogeneity, ultra-Orthodox*

# Social Design: Connecting People and Spaces in a Human -centered Approach

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## Extended abstract

Cultural diversity is a dominant feature in postmodern societies, reinforced by the use of digital technologies and based on compulsory or voluntary movement of large groups of people. Though worldwide there is rapid development, as far as technology is concerned, many countries are obliged to address situations that belong to history. This process entails many challenges and creates new conditions of rapid growth of multicultural societies establishing circumstances of co-habitation with collective or ephemeral characteristics. This intercultural interaction and the relationships between different groups of people give new meanings to spaces, introducing new interpretations, redefining their forms or imposing places that may exclude large groups of people. This paper is focused on main questions that arise concerning architectural design education in Greece as “How can a designer contribute to a major social crisis?” and “Can design provide social transformation for people in vulnerable positions?” Thus, addressing complex problems in educational design practice could not be based on one-dimensional solutions, as it moves along many paths that may be cross-fertilized in multiple way increasing the spectrum of design practices. So, following the statement that design and its didactic are complex, multifarious, interdisciplinary and holistic research fields, “social design,” or “socially useful design,” could play a key role concerning the design process that is mindful of the designer’s role and responsibility in society in order to bring about social change.

A social design methodology, developed in a two-year master’s program titled “Interior Architecture: Sustainable and Social Design” at the Department of Interior Architecture in Greece since 2018, is introduced in the present paper, as well as certain students’ study cases are presented. The didactic methodology suggested was developed chronologically in two parts (during the first and third semesters of the master’s program) using interdisciplinary approaches connected to the “Human Centered Design” ideas. The aim and objectives were to create learning processes and tools with which students were required to actively participate, to analyse, to use multifactor methods of evaluation, and to apply a concept to uncertain situations, which could all be defined as a holistic design approach. Also, to explore and identify design issues and how they are connected to socioeconomic, political, and environmental causes, and to address them as parts of the holistic design process over time. The basis for further research developed, concerned creativity and vernacular values, traditional techniques and theories as open resources to form a new design praxis. This process could lie within the framework of social design theories focused on the interconnectedness and inter-dependency of social, economic, political, and natural systems, and project them onto design.

*Keywords: design; social design; human centered design; holistic design; design education; interdisciplinary design process*

## Ethnicities and sense of place – the walled city of Nicosia

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### Extended abstract

The walled city of Nicosia is a multicultural, urban patchwork with a distinctive place identity shaped by its evolution in time. The paper presents the historic timeline of ethnic imprints in space by global networks of migration. It examines their ethnic identities revealed in activities and the built environment within the walls. As multiple ethnic communities coincide in space and time and different group identities coexist, they shape multiple place identities that consolidate in a complex urban sense of place. Multiple cultures rooted in immigration continuously transformed and enriched the urban milieu and imprinted their cultural identity on the physical, urban space. This has resulted in a strong place identity nourished by a multitude of historic layers of architecture of various cultural backgrounds and ethnic origins and an overall ethnic, urban organisation with concentrations of ethnic groups in parishes.

Political upheaval, half a century ago, has led to political and consequent urban division, a severe impact on the city's fabric. In recent decades, the city became, under the influence of global networks of migration, a centre of migrant workers and economic and political refugees. In specific, two main groups with Catholic and Islamic, religious backgrounds are leaving unique traces and displaying an 'otherness' by occupying spaces and imprinting their culture. In the pursuit to satisfy their needs to live, shop and worship, they slowly take over parts of the urban landscape situated in proximity to their religious centres. Their choice of location is thereby guided by individual constraints and capabilities and compared to what the context offers. Migrant interventions rather emerge in less maintained, run down or abandoned urban spots that offer a minimum of local advantage, low cost availability and customer proximity. By concentrating in specific urban areas and shaping a culturally distinctive, urban space, they generate a group identity articulated in space that expresses distinctiveness, continuity and self-esteem and satisfies the need of belonging. The identity of a specific ethnic group manifests itself not only in the built environment but also in specific activities related to the very space. The experiences gathered in that place shape vice versa the migrants' feelings, values and personal identity.

In the case of the walled city of Nicosia, it becomes clear that multiple ethnicities and their culture reshape the urban environment by modifying space, changing the social milieu and intensifying social activity. The coexistence of diverse cultures in space and time creates a complex overlay of multiple group and place identities and an overall complex and lively sense of place.

*Keywords: ethnicity; cultural diversity; group identity; sense of place; Nicosia*

## Nomadic and refugee lives: How can innovative cities support this kind of population?

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### **Extended abstract**

In 2021, almost two years since the SARS-CoV-2 breakout, a global need has emerged to fulfill our everyday needs, under different protocols, even in EU countries. If our cities and countries became more innovative, even part of their resident population would be better supported. It would be most helpful, however, for the nomadic and refugee populations, who are in constant movement until they find their new home. Our first step in this direction would be to create a platform/application in order to collect and regularly update all the information necessary to facilitate their research for accommodation, occupation, education, healthcare, public services etc. Secondly, this information would become available in at least two languages, in the official language as well as in English, ultimately aiming in providing translation in other languages in the future. The third step would be to study and implement all of the above. This project's realization is expected to have positive results in several fields, and its social and financial impact will be immediate, while it will also result in several indirect and long-term psychological benefits for the general population, as its needs will be met easier and more directly. The project's objective and vision is to combine the efforts of several professional fields in the long run, including architects and engineers, programmers, educators, psychologists, and law experts, who can promote the realization of future projects. We shouldn't need to be in the shoes of the nomads and refugees in order to put in the effort for quality services. Our goal is to re-invent life in the Balkans, not only for the native population but for everyone.

*Keywords: Nomadic life, refugee life, innovative systems, innovation, support*

# Activism and Property rights: Newspapers coverage of planning in Tel Aviv-Jaffa

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## Extended abstract

Current planning debates are expanding beyond traditional participatory and regulatory frameworks (McAuliffe & Rogers, 2019), while officials, developers and activists growingly rely on mass media to promote their perspectives (Rogers, 2016). Yet scholars doubt whether for-profit media empowers activism, as they usually support officials and the existing market-led power relations (Herman & Chomsky, 2002).

This paper focuses on the intense coverage of plans and planning debates in Tel Aviv-Jaffa, by five leading Israeli media outlets along five recent years. I analyzed the full coverage and planning activity, identified the spaces journalists gave to certain plans, their highlights and silences and how they represented various areas, issues and people. I found that journalists focused more on plans that provoked residents' activism. However, this did not mean that media adapted an anti-market agenda. They covered mobilizations against entrepreneurial projects and also against the reduction of property and development rights in projects. I discuss this realm as part of the current urban culture in large and expensive cities, such as Tel Aviv, and question the roles of media, planners and activists in preserving the neoliberal narrative.

*Keywords: activism, property rights, media*

## Challenges of public value capture in shrinking cities: Is there any value to capture and who will pay?

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### Extended abstract

It is well known that public investment in urban infrastructure can bring about an enormous increase in property values, which is surely also valid in shrinking cities. In principle, the planning of and decision making on public investment aims to maximise the wellbeing of the resident population and benefit local businesses, whether already existing or likely to be attracted in the future. While some private land owners can profit a great deal from these spatial planning processes, others may not. Tools for public value capture pursue spatial justice objectives, optimizing the allocation of development costs and benefits and relieving, at the same time, strained public budgets. Shrinking cities, especially those where population loss is matched by economic decline, have less means to live up to their public commitments and, therefore, value capturing in a shrinkage context has to be carefully devised so as not to pawn future development. Even prosperous shrinking cities, in which activities such as tourism thrive but population dwindles, can take advantage of value capture mechanisms to regulate and balance prosperity and population change.

*Keywords: shrinking cities; public value capture; urban planning, urban shrinkage; prosperous degrowth; rightsizing*

# “Undivided” city in a divided post-conflict society of Kosovo: factors contributing to peaceful coexistence of Albanians and Serbs in Kamenica

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## Extended abstract

Unlike many other places in Kosovo, the town of Kamenica is unique for its seemingly good interethnic relations among Albanians and Serbs living there. Among frequent media reports on interethnic conflicts in Kosovo, Kamenica is almost never mentioned, whereas in some other towns the conflicts between Kosovo Albanians and Serbs are a part of everyday life – most prominent being the town of (Kosovska) Mitrovica, which is known in the literature as an example of a “divided city” (similar to Jerusalem, Beirut, Belfast etc.). The main goal of this paper is to investigate which factors affect the quality of interethnic relations in Kamenica. The following factors have been explored: geographical (proximity to the state border); geopolitical (strategic importance of the town); demographic (ethnic composition of the town); economic (economic opportunities for everyone or for one ethnic group only), socio-political (power-sharing among ethnic groups); historic (the history of violence/peace and the overall quality of inter-ethnic relations in the town) etc. We attempt to answer the following questions: are interethnic relations in Kamenica good because of general, “natural” aspiration of the locals to live in peace and harmony, or are there other factors that affect the peaceful coexistence of the locals? Are interethnic tensions, when and if they occur, resolved by certain economic measures such as new jobs? Are interethnic tensions being covered up so that the image of good interethnic relations and a peaceful place “attracts” economic investments? From a theoretical viewpoint, this paper aims to determine which factors affect the quality of interethnic relations in different towns of post-conflict societies and so contribute to the scholarship on peacebuilding and peace studies. The study builds on extensive field of work conducted in Kamenica in 2021 and 2022 (archive analysis; media reports; interviews).

*Keywords: Kamenica, Kosovo, post-conflict society, interethnic relations*

# The Italian suburbs during the pandemic Covid 19

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## Extended abstract

The suburbs of Italy's large cities, already afflicted by multiple problems and marked by a historical crisis of participation and citizenship, have suffered the effects of two years of pandemic in a particularly acute manner. Urban planners, aware of the gravity of the situation, speak of the need for 15-minutes cities, and point to the urgency of a complete rethink of the transport system. But the problem of the suburbs is not only the distance from the center. Recent research and reports on Rome, Genoa, Milan, and Naples point to a dramatic impoverishment in what were already extremely difficult situations.

It is as if the virus has made a mass, bringing to light all the pre-existing problems. On the outskirts of the city, there is an accumulation of disparities not only in income, but also in cultural education, job opportunities, proximity to services and the quality of those services, and ultimately a radical inequality of life chances. A few years ago, the Parliamentary Commission of Inquiry into the Suburbs already pointed this out with concern, albeit from a mainly security perspective. There are huge gaps between one neighborhood and another, and these gaps seem to be widening all the time. This social distance is being created between areas that are spatially contiguous and is fueled by accelerated dynamics that dramatically increase the polarization between high and low. The paper takes stock of this situation, while at the same time offering an assessment of the prospects for regeneration and rehabilitation in the part of the Italian Recovery Plan that provides for investments in the so-called "Periphery Plan".

*Keywords: Italian suburbs- Covid 19- socioeconomic polarization- inequalities- local welfare*

## Urbicide: The Case of Anata Town/ Palestine

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### Extended abstract

Landscapes in Palestine encompass an interactive relationship between build up areas, agricultural zones, cities and towns. Depicting the chronological evolution of the rural landscapes in Palestine, a huge transformation took place due to the Israeli occupation practices and control over the Palestinian areas, the administrative land division according to the Oslo accords, and the influence of the neoliberal policies adopted by the Palestinian National Authority. The Israeli Occupation has implemented tools of control over spaces, the most evident being the apartheid wall, the colonies, the checkpoints and the massive settlements infrastructure, in a way that has altered the sensitive character of the local landscapes and intercepted the access between Palestinian built-up areas and their rural context. This has resulted in the fragmentation of the landscape, of physical structures, confining Palestinian cities, towns and villages to defined limits and forcing them to exist in isolation of each other and/or of the surrounding landscape. The process eventually transformed the landscape into an archipelago, where every island is isolated in a way that directly impacted the landscape and the communities inhabiting it.

This research aims at studying the transformations of the rural landscapes in Palestine, under the influence of the Israeli occupation policies of control. It inquires the direct and indirect influences of these policies and practices on the Palestinian landscapes and the resulted transformations on the open spaces micro scale level statues. In order to achieve this goal, the research will shed the lights on Anata town, located in the north-east of Jerusalem city. Anata is a typical case of Palestinian towns that are located on Jerusalem city peripheries that are subject to radical spatial policies. Anata inhabitants depend mainly on agricultural as the main source of livelihood and income. The town has been radically isolated from its context through the superimposition of the segregation wall, colonies and Israeli settlements, military bases and the high voltage line that serves the Israeli settlements. This has altered the original rural character with a high dense hybrid urban fabric.

The research will adopt a chronological approach in understanding the changes that occur over time through making a morphological study of these changes. It will also analyze maps and photos in order to understand the phenomenon. As a final result, the research will decode the changes on spatial structures within Anata Town and its impact on the social life and cultural identity of the inhabitants.

The study will shed the light on the impact of Israeli planning policies on the isolation and exclusion of Jerusalem city from its peripheral towns, and Anata town will be adopted a case of study in this research.

*Keywords: Urbicide; urban exclusion; geopolitical context; spatial transformation; planning policies*

# Multiculturalism as a factor of economic growth and city branding: The case of Komotini

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## Extended abstract

The concept of multiculturalism is complex and is formed under different conditions, depending on the region, the era and the economic circumstances that prevail at the time (Arasaratnam, 2013). According to Tip et al (2012), it refers to the policy that is being developed under the values of acceptance towards minority group members. (Tip, et al., 2012).

Van de Vijver & et al. (2004), define multiculturalism through three distinct aspects. The aspects recognized in this sense are nominal multiculturalism, expressed through demographics, policy, and perception. By policy they refer to the concept as it is being used by the policymakers to form a specific political ideology addressing multiculturalism. Moreover the term "perception", refers to the acceptance and support of the cultural diversity that exists in a society (Van de Vijver, Breugelmans, & Scalk - Soakar, 2008)

At the same time, the Universal Declaration of UNESCO in 2001, recognized the importance of preserving the Cultural Diversity as a living. Furthermore, it underlines the importance of acknowledging not only of the plurality in a society but also the plurality of each own identity due to the adaptive process that occur living in a plural society. Furthermore, the Universal Declaration of UNESCO, places Cultural Diversity at the heart of all development policies, as a prerequisite for the success of any development initiative (Bokova, 2009).

The city of Komotini is a unique cultural entity in Greece (Ert Archive, 1998), a patchwork of different cultures, formed due to its key geographical location, with its inhabitants coexisting peacefully over the years. Its turbulent history endowed it with "multiple" identities, which are distinguished in its monuments and neighborhoods. Greeks, Ottomans, Jews and Armenians were the tiles of the mosaic that continues to this day to shape the living cultural diversity of the region. A point of convergence and cultural homogeneity that also functions as a link between them, the Greek citizenship and "the common sense of belonging" (Tsimbiridou, 2016).

The purpose of this research is: a) to explore the perceptions of opinion makers regarding the concept of multiculturalism and its contribution to shaping the identity of the city, b) to examine the relationship between multiculturalism, economic development, and the attractiveness of the Municipality of Komotini, c) the possibility of formulating a strategic branding of the city with cultural diversity as a central element.

The results of the qualitative research showed that multiculturalism is the dominant element of the identity of the city. Also, the opinion makers strongly believe that this element can contribute to the growth of the city and with the right branding it can increase its attractiveness. Therefore, the formulation of a strategic plan for the promotion of this element requires delicate manipulations and careful steps to avoid the complexities of nationalism and divisions. However, conducting a broader study that will include both its residents and visitors, would lead to a more holistic and anthropocentric approach to the phenomenon under study.

*Keywords: Multiculturalism, diversity, city branding, economic growth*

## Zipf's Law and the scale of cities given epidemics

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### Extended abstract

The topic of the distribution of population has been of interest to researchers, both on theoretical grounds but also due to the possible practical applications. In the early 20<sup>th</sup> century, Auerbach noticed that the distribution of city sizes within a country seems to follow a Pareto (power-law) distribution. This observation was formalized by Zipf, who also suggested a specific exponent of 1 for the distribution. While there have been found deviations from the specific characteristics of this model in empirical settings, especially regarding the exponent of the distribution, it is still a strong tool of approximation and yields insight into our understanding of population aggregation.

In its simple form, Zipf's law was of use to economists since it offered a paragon of modelling of cities and economic activities through the notion of scale. There have been efforts to justify this ad-hoc imposition of distribution by studying assumptions that give rise to such a distribution. One of the most common interpretations is the assumption that cities' growth rate is independent of size. Namely, each city's population growth (or decline) in a given time period is proportional to its population. The model of Gabaix (1999) seeks to analyze the implicit costs and benefits associated with a city that yield such a behavior of the population. In this framework, higher productivity in the cities imply larger wages, however the constriction in cities yields negative externalities such as a lowered utility from amenities.

We intend to use this framework in order to study the impact of disease in the equilibrium of the model. The prevalence of diseases may impose negative externalities to the inhabitants of a city, depending on the method of transmission. The scale of cities is impacting the level to which the externalities are felt since they are not going to be linear. Specifically, in our modeling we will use simple epidemiological models in order to inform our selection of variables that are impacted. While the specific impact of a disease will always depend on characteristics of disease or at least a combination of key parameters, we will be able to extract implicit differentiation results regarding various key parameters. We will also address assumptions regarding the way diseases impact productivity/wages given the existing literature. Finally, it should be kept in mind that diseases could come in waves or are transient. In those cases, there is a reversal to the previous equilibrium, but in general it can be shown that the forming of expectations is integral to whether it will be reached again. We discuss how this impacts our discussion as diseases might become more prevalent than a "once-in- a lifetime event" and how we might introduce lifetime utility and wages in order to generalize the model. We hope thus to provide a simplistic but efficient tool to understand the impact of diseases on internal migration due to large disease events.

*Keywords: city; Zipf's Law; Urbanproductivity; internal migration*

**JEL: R72**

## Athens: from imagined historical centre to a refugee city (1830s-1920s)

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### Extended abstract

This paper is concerned with the past and mainly the life of Athens during the interwar period. It will briefly examine the urban development of the city since the establishment of the Greek independent state and the start of a large-scale urban planning. The capital was viewed as a place that fostered Greek national identity at the times of the Great Idea (the vision of Greek nationalism). To this purpose, new buildings were constructed that gave Athens the glory of the imagined national centre. Demographically was also an ever-growing city as new migrants were settled in the urban setting. However, a dramatic change took place after the end of the war in Asia Minor in 1922 and the conclusion of the Lausanne Treaty in 1923, when almost 1.3 million Greek Orthodox refugees transferred from Turkey to Greece in the first obligatory exchange of populations in world history. The 1920s will be the main focus of this study. It will be an attempt to shed light on a very particular angle of Greek historical geography that is concerned with the development of the urban web of Athens after the settlement of almost 300.000 Asia Minor refugees. It will analyse how the Greek city was shaped, not only at the level of the policy-makers through their plans and decisions, but mainly at the local level through the actions, memories and experiences of the people who were settled there. The need for housing of the masses of refugees led to the collapse of the limited infrastructure and had a catalytic effect on town planning. The focus will also be on the interplay between state planners, who sought spaces for the settlement, and the experiences of the refugees, who transformed these spaces into places. This paper also explores how the refugee settlements defined different spatial configurations and reflected various forms of power relations. It will examine how the urban integration of those refugees created a town from 'below', in spite of all town planning from 'above' that visualised Athens as the bright historical and national centre of Greece. Archives from Greece as well as from the League of Nations in Geneva and the Public Record Office in London will be used in this study.

*Keywords: Athens; city; urbanintegration; migration; Asia Minorrefugees; townsfrom 'below'*



## SMART CITIES

**CHANGING  
CITIES**



Changing Cities V, Corfu, 20-25 June 2022

# Smart Tourism In Smart Cities: Trends and evidence

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## Extended abstract

Examining the phenomenon of the smart city in the tourist context is certainly vital, especially in terms of its influence on the travel experience and on the other hand the quality of life of the permanent residents. In this context, a smart tourist city is defined as an innovative tourist destination that guarantees sustainable development that facilitates and enhances the interaction of visitors with experiences at the destination and ultimately improves the quality of life of residents. Most importantly, a smart tourism city provides smart services to visitors in terms of transportation, gastronomy, accommodation, ancillary services, and attractions in three phases: the pre-trip phase (planning), the travel phase (on-site) and the post-trip phase (estimation). All these services are based on the main areas of the smart city infrastructure: services, land, and infrastructure.

The provision of smart tourism services based on ICT (Information and Communication Technologies) enhances the interaction with tourists, increases their active participation, and ultimately improves the co-creation of tourism experiences. Especially in the era of the global spread of the COVID-19 pandemic, with offline cultural activities and tourism being affected by quarantine, smart tourism has the potential to meet this challenge by creating smart tourism products that take advantage of Augmented Reality (AR) and virtual reality services (VR Virtual Reality). The active participation of both visitors and residents in the exchange of their on-site experiences is extremely important in the process of smart experience. The needs of tourists must be combined with the requirements for reducing over-tourism. This combination of interests is achieved by considering how tourists in busy and stressful environments manage to have a successful visit. The present work through bibliostatistical analysis and analysis of forms of smart tourism city infrastructure brings together the dominant indicators of measurement of the tourist capacity of an area and their evolution over time. Then, it proceeds to their comparison, evaluation and suggestions for additional parameters for their optimal operation.

*Keywords: smart tourism, smart cities, Augmented Reality, virtual reality services, bibliostatistics*

# The impact of digitalization on social innovation and the rural-urban divide during the Covid19 crisis

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## Extended abstract

The Covid-19 pandemic triggered an era of radical digital transformations for worldwide economies and societies, both in urban and rural areas. Digital platforms created opportunities for people to work jointly despite physical distance, and opened innovative ways for virtual collaboration, as well as creating new opportunities for network creation and developments. The rise of remote working, with an increasing number of people to move more or less permanently to the countryside could contribute to a revitalization of rural territories if the receiving areas are able to capitalize on this opportunity. However, this rapid digitalization process is also at risk of increasing the “urban-rural” divide, due to on the one hand the more limited infrastructure on rural areas, and on the other, the aging population in these areas who often lack the skills and knowledge to make the most of these technologies. In a context where the importance of rethinking the “urban-rural” relationships is being increasingly recognized as key for meeting sustainability challenges, the importance of a digital transformation that does not increase, but instead bridges, spatial inequalities is key. The importance of collaborative networks and social innovation (SI) initiatives in rural areas to meet unmet needs and tackle societal challenges is receiving increasing attention by scholars, policy makers and practitioners alike. Many authors propose that, by promoting neo-endogenous development processes such as SI initiatives, it is possible to develop resilient structures which are on the one hand, able to adapt to changing conditions and innovate, while on the other, can maintain the necessary stability to produce outcomes which will contribute to societal well-being. However, the extent to which digital technologies, and in particular the rapid digitalization processes triggered by the Covid-19 pandemic, are supporting these social innovations to deliver their on-the-ground objectives, remains unclear. And as consequence, the impacts on the well-being of the communities in which these initiatives operate.

With this research we aim at filling this gap, by developing and delivering a survey to European SI initiatives, which are largely operating in rural environments, in order to explore the uptake of digital tools during the Covid-19 pandemic and their impacts on the SI’ activities and outcomes. We build upon the database of the H2020 SIMRA project, which studied social innovation initiatives in rural Europe in order to distribute the survey and identify whether the digital transformation triggered by the Covid-19 pandemic is supporting or rather hindering the works of social innovators in reconfiguring and transforming local networks, attitudes, and governance arrangements to promote new ecological, social, or institutional practices in the areas where they operate. With these results, we seek to explore the linkages between local communities and digital technologies examining if the digital transformation has been beneficial or detrimental to grassroots movements and associations in tackling sustainability challenges, as well as how has it contributed to tackle or not the rural-urban divide.

*Keywords: social innovation; digitalization; rural, urban, covid-19*

# Co-working spaces: Potentials and challenges in Greece

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## Extended Abstract

Smart cities are strongly characterized by their ability, through a network of interconnected devices, to collect, analyze, monitor and renew data and make decisions regarding adapting to this data. For a city to be considered smart, it is important that its investments in human and social capital and the transport and communications sector enhance its sustainable financial development and inhabitants' quality of life through the participatory process. Smart cities, especially in the context of financial development, exploit their advantage in the fields of creativity and innovation. The network development of cities and their orientation towards a smarter and more sustainable state helps them create new business opportunities, mainly through extensive data collection. This data can be used in new and innovative ways, such as developing new business activities or transforming existing organizations by exploiting social entrepreneurship. Smart cities offer these favorable conditions for the development of entrepreneurship through purchasing related technology and IoT devices, or offices formulating policies to encourage entrepreneurship (as the T-Hub in Hyderabad, India). Correct governance policies and partnerships to ensure the integrity of those involved and public interests is a key consideration for smart cities. Co-working spaces and makerspaces are examples of developing these partnerships. This article attempts to present the principles of developing these spaces and examples of cities in which they operate successfully, such as in Greece, and make some predictions for their future.

*Keywords: smart cities, co-working spaces, makerspaces, Greece*

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# Funding opportunities for Smart Cities in Greece

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## Extended abstract

In times of intense competition and major urban challenges, cities are forced to adapt to modern conditions and exploit their particular peculiarities in order to survive and grow. Our era is also characterized by the continued development of new information and communication technologies (ICT). These technologies, combined with the infrastructure, services and products they make, could be a dynamic factor for the development of cities. The creation of "smart cities", therefore, may be the answer of urban planning to the modern challenges and problems faced by urban centers.

A city is considered to be "smart" when investing in human and social capital, traditional infrastructure (transport) and modern communication infrastructure, fostering sustainable economic growth and a high standard of living, with prudent management of resources through participatory governance. The concept of "smart cities" is also closely linked to the concepts of global competitiveness, sustainable development, quality of life, and is based on broadband networks and modern ICT.

Over the past two decades, Greece has suffered significant economic and social upheaval. After an economic depression and an ongoing refugee crisis, Greece fell into another recession due to the economic fallout in 2020 prompted by COVID-19. These challenges are forcing us to rethink the future of cities and "smart cities" could be a powerful tool to this direction. Given the strategic importance of "smart cities", it is highly important to deploy all possible financial tools to make this transition possible and affordable.

In these terms, the *National Recovery and Resilience Plan (NRRP) "Greece 2.0"* aims to eradicate long-term vulnerabilities in the country's economy, mainly in terms of digital infrastructure, public administration, and sustainability. In addition, the *Greek Partnership Agreement for 2021-2027* can support key EU priorities such as the green and digital transition and contribute to develop a competitive, innovative and export-oriented growth model for the country. Furthermore, *Horizon Europe* is the EU's key funding programme for research and innovation, aiming to climate – neutral and "smart cities". Additionally, the *LIFE* programme is the EU's funding instrument for the environment and climate action. The programme includes a Clean Energy Transition sub programme, which aims to increase capacity-building and market-uptake for renewables by working with local, regional and national government while protecting consumers and citizens. The *Cohesion Policy* also, focus on green and digital transition, building a more connected, inclusive and social Europe, and a Europe that is closer to its citizens. Specific climate targets are established, accompanied by a special adjustment mechanism that will help in monitoring and achieving them. Finally, the *INTERREG* programme aims to help regional and local governments across Europe to develop and deliver better policy by ensuring that government investment, innovation and implementation efforts all lead to integrated and sustainable impact for people and place.

*Keywords: cities; urban challenges; "smart cities"; ICT; financial tools*

# Planning and Decision Support Systems – concepts, challenges opportunities and proposals

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## Extended abstract

The development and implementation of Decision Support Systems (DSS) in the planning activity is not a new issue. Since the mid-1960s, the need to use structured information to support and improve decision making has been discussed. The unpredictability of social, economic, environmental and territorial factors and the way they interact have increasingly justified the development of methodologies that could respond to this complexity and can take advantage of the growing amount of information and computational capacity that characterises current times. DSS then assume an increased importance in the planning activity, by allowing the systematisation of useful and necessary information for a more informed, participated, transparent and consistent decision-making.

Independently of the type of application, it is recognized that a DSS must follow an interdisciplinary perspective and an integrated structure; and it has to take into account the information (available or not) that is necessary to understand the processes of urban transformation, which have been characterized by contradictory trends and great complexity. In this context, it is desirable to consider new (or renewed) planning approaches capable of dealing with cognitive and dispersed knowledge, integrating different interest groups, giving meaning to the expectations and preferences of the various types of agents involved in a decision-making process, seeking to make a connection between political decisions, individual choices and their impacts on the territory. Being clear that the domain of development and application of DSS are increasingly diversified and sophisticated, it is also true that there must be a constant effort to frame them and to understand how they can be effectively important and consequent. However, the recognition of their potential does not imply an unquestionable confidence in this type of instrument; they do not replace political decision-making and do not dispense a theoretical-conceptual framework that establishes the guidelines and methodological assumptions for their development.

In the spatial planning, satisfying different purposes, a DSS can be typified at three levels, depending on the type of information, methodologies and tools used: i) situational or diagnostic; ii) predictive or prognostic; and iii) socio-cognitive and prospective (Marques, Wolf, Borges, et al., 2020). Thus, this article: i) highlights the importance of decision support systems as useful tools for planning practice; ii) presents the characteristics and functions of a DSS and iii) discusses the application of decision support methodologies in planning. Recognising the organisational complexity of urban systems, this papers also presents methodological proposals for the implementation of an integrated DSS, in the context of housing, education, and health. The demographic and economic dynamics are in these DSS key aspects for assessing the determinants of the demand.

*Keywords: Decision Support Systems; planning; public policy; housing; education; health*

# Urban - Intelligent Interconnected Digital Landscape: Resilience in urban neighborhood square

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## Extended abstract

Urban landscape was and is a complex and dynamic field composed of multiple entities, which are evolving over time reflecting and enriching its identity, content, meaning and significance.

This paper examines a way of approaching synergies between urban-intelligent interconnected digital landscape in terms of resilience. Synergies that, although we feel their existence, we often seek a way to point them out, to incorporate them and to make sense of them. In this process, urban-intelligent interconnected digital landscape maintains both spatial (geographically-defined) and digital (technologically-defined) components, which coexist as a whole.

This approach focuses on the local scale of Greek neighborhood and specifically on neighborhood square in metropolitan Athens. Neighborhood square is seen as a distinctive entity of urban structure, to which special significance, content, meaning and role are attributed. Especially in today's time, when socio-economic, environmental and pandemic crises create new needs for resilient urban space and new needs in resilient urban space.

Methodologically, electronic questionnaires to Public Services, Stakeholders and activists, as well as in situ questionnaires are used for the experiential assessment of the actual users of the neighborhood square. In situ observations regarding socio-spatial practices, thermal comfort simulations via RayMan Pro and simulations of microclimatic conditions via ENVI-met, multi-criteria evaluation method (ELECTRE III) complete the approach.

Three alternative scenarios of evolutionary integration of technological intelligence in neighborhood square are introduced, excluding the baseline scenario (keeping the square as is). The 1<sup>st</sup> scenario is on the most likely trend of sustainable interventions and focuses on cold recyclable/biodegradable materials. The 2<sup>nd</sup> scenario focuses on the transition from passively intelligent properties and functions to the actively intelligent behaviors and is on sustainable interventions using technological intelligence of changing properties. The 3<sup>rd</sup> scenario focuses on sustainable interventions via interconnected technological intelligence of energy production. All scenarios are based on the strategy of "mild interventions" and are evaluated before and during the Covid-19 pandemic, via multi-criteria method based on criteria derived from the United Nations Sustainable Development Goals (SDGs). Based on the selected criteria, the generated hierarchy reveals the overall added value of technological intelligence to resilience-centered interventions.

This research pinpoints to synergies between urban-intelligent interconnected digital landscape in terms of resilience, where attractive, realistic and feasible alternatives emerge. Alternatives that indicate new possibilities and opportunities, and also can lead to socio-spatial, environmental, technological, energy and communication upgrade, both in conditions of normality and in conditions of crisis.

*Keywords: neighborhood square; resilience; technological intelligence; multi-criteria analysis; Sustainable Development Goals; Covid-19 pandemic.*

# Alexandroupolis: The Evolution of a border town into a smart city and its effects on the quality of life of its inhabitants and the change of its identity.

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## Extended abstract

The concept of the "smart city", a city that invests in its economy, environment, mobility, human resources, cooperative governance, culture and quality of life of its inhabitants, developed especially in the modern era when the competition of cities, urbanization, lack of resources, the difficulty of a sustainable strategic planning and in general the economic, social and environmental problems are constantly increasing. In this new emerging reality, the role that the public bodies of the State, and especially the Local Government, are called to play, is a catalyst if they want to make their societies sustainable and creative, attracting companies and capital, ensuring social cohesion, The main purpose of this research is to highlight the urban strategies and intelligent policies developed in the Municipality of Alexandroupolis, especially in recent years, which resulted in the acquisition in 2020 of five awards in the "Best City Awards 2020" with a top award in "Smart City of the Year". The other four awards are the gold award for the initiatives "Grid of actions to enhance stability", the gold award for the project "Water in the city", the silver award for the digital application "Safe Citizen of Alexandroupolis" and the bronze Award for the program "Sustainable Mobility in the Municipality of Alexandroupolis: THE BIKE CHALLENGE".

Target of research is to investigate whether the effort to transform it into a smart city has an impact on the quality of life of its inhabitants and on changing its identity as a city with a clear modernist orientation. Driven by the phrase of the Mayor that "Alexandroupolis is like a plane ready to take off", the research aims to find out whether the efforts that have been implemented and those that are planned to be made, aim at a more favorable future for the inhabitants of the city, fulfilling their dreams. and the aspirations of institutions and citizens.

Initially, reference is made to the geomorphological, political, demographic and historical elements of the city which define it on the map of the country as a border area. Then all the evolving actions of the city, urban regeneration, digital infrastructure & applications and smart interventions based on the six axes that characterize an intelligent city such as smart governance, smart economy, smart mobility, smart environment, smart people and smart lifestyle. Specifically, for each of these axes is presented their object and the planning strategy followed by the Municipality of Alexandroupolis and the local community, analyzing the benefits that it causes or is expected to cause in the future for its transformation into a smart and creative city.

The present work is completed by drawing conclusions and submitting proposals aimed at transforming Alexandroupolis into an even more "Smart City".

*Keywords: smart and creative city, transformation strategies, smart development, identity, Alexandroupolis.*

## Smart city - an interdisciplinary approach

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### Extended abstract

The pandemic has changed the perception of city planning, its development strategies, the social aspects of living in a city, and even the use of public spaces. In an interdisciplinary approach that responds to the needs of sustainable development, smart cities take into account many factors: social, economic, environmental, functional, spatial, communication and technical infrastructure. Pandemic resilient cities are those that use new solutions as well as practical smart city solutions at various stages: preparing for a pandemic, fighting it and returning to normal functioning. Holistic spatial planning is used, taking into account e.g. access to system green areas, walking distance to basic services. Properly arranged public spaces supporting social integration and equal access for all users, where the streets are friendly to pedestrians and cyclists. In smart cities, solutions are focused on energy self-sufficiency and the obtaining green energy through renewable sources. An important role in the development of smart city are played by intelligent and autonomous transport, intelligent information and communication technologies and the creation of new jobs based on knowledge, as well as cooperation with the academic community, research centre and innovation laboratory. The key aspect, however, is the change in social awareness. City residents express their understanding for the transformation, including decisions in urban policy related to the development towards a smart city, through social participation. All activities in this area must constructively and measurably improve the quality of life of the inhabitants. The research analysed smart solutions implemented in the world that are or may be used in the time of a pandemic. A comparative list of the analysed smart city practices was prepared, which could be applied in the capital of Poland - Warsaw. The basic functional, spatial, communication and environmental conditions of the area selected in the research procedure were analysed. Finally, schematic urban design guidelines for a selected metropolitan research area were also proposed. The pandemic is now a relatively new reality, a destructive element, in the fight against which interdisciplinary smart city solutions turn out to be the right direction. This poses a serious challenge for city authorities, health services, planners, economists, politicians and many other experts. Synergic interdisciplinary activities aimed at smart pandemic resilient city in many fields are becoming a complex solution to a much more complicated problem.

*Keywords: smart city, pandemic resilient city, COVID-19, sustainable development, public spaces*

# Local dimension of spatial mixed-use indicators for city quality of life assessment

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## Extended abstract

The quality of life in the city is a complex concept related to economic, social, and environmental conditions. In cities, the population's basic needs, i.e., access to food, health care, education, recreation, public transport, social care facilities, and administration, are essential elements of the quality of life. Many spatial and social problems occur in satellite cities of Polish agglomerations due to excessive urbanization. The current trends related to the design of cities implement ideas such as sustainable development, compact city, 15-minutes city, resilient city, and environmental justice. All these urban trends highlight the essence of mixed-use urban areas. In recent years, mixed-use has become an increasingly important topic. The times of the COVID-19 pandemic have highlighted the need for walks, green spaces, and active or passive recreational areas on the one hand, and access to basic services such as shopping on the other. Authors of numerous articles discuss mixed-use indicators at different levels of geographical scale. At the most general level, the scale of analysis covers the entire area of a city. It makes it possible to compare cities but not to determine the diversity of the values across a given city. At a more detailed level, researchers determine indicators locally based on the performed segmentation: tessellation and census tract or in the catchment area (CA) adopted around selected locations.

Our approach involved the application of the floating window method to determine the local values of mixed-use indicators. This method makes it possible to capture a continuous picture of changes in values across a city. Based on the available topographic data, points of interest (POIs) from Google places API, and satellite data, it is possible to determine both simple indicators, including the area of parks per capita, number of key services per capita, population density of built-up areas, land consumption per capita, build-up area per open area, as well as complex indicators, including entropy coefficient, or dissimilarity index. The comparison between locally calculated indicators and their expected values determined based on the global level and the simple method of visualization of results allows residents to assess their situation in their place of residence. Testing the developed methodology of GIS analysis involved a case study for the city of Piaseczno, located 18 km from Warsaw, the capital city of Poland. The developed methodologies can help simulate changes in the quality of life, generate various planning scenarios, and assess the impact of planned changes and investments on residents' quality of life.

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*Keywords:* city; local indicators; urban indicators, moving window analysis; GIS; mixed-use; INnovaCITY;



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