

VENICE

AESOP ANNUAL CONGRESS

9-13
JULY
2019



PLANNING FOR TRANSITION

Book of Papers

I
-
-
U
-
-
A
-
-
V

Università Iuav
di Venezia





AESOP 2019 Conference - Book of Papers
ISBN 978-88-99243-93-7

Planning for Transition

Contemporary cities and territories face significant challenges – natural disasters due to climate change impacts, ecological crises, growing socio-economic unrest, global migration, political rifts including a rise of right wing factions, ambitious public works and mega-projects – all of which require new capacities in dealing with such individual and multiple groupings of such challenging and profound changes.

It is a matter of fact that at international level a discourse if not a condition of transition is pervading sectors and societies. This discourse points to alternative patterns and solutions to many of the challenges faced. A quickly changing scenario requires forms of planning, both locally and globally, which bear the capacity to support and manage mutable urban and environmental conditions. In fact, although cities do incessantly change, policy-makers and institutions are never fully prepared to respond to complex and risky situations, as well as relying on planning and policy tools which are often outdated; in addition, also existing theoretical frameworks, concepts, cognitive abilities and approaches become ineffective or outmoded.

Each unintended or unanticipated change comes as a break to existing social, political, and administrative routines and yet it may be anticipated that mechanisms of collective reflection and action will be generated. The congress invites scholars and practitioners to present and discuss case-studies of cities and projects that have engaged in meeting challenging situations – supporting transitions in urban contexts.

Specifically, it is aimed at offering an understanding of the forms of knowledge, concepts, tools, and skills needed to plan and address transition. Furthermore, it seeks to explore whether (and how) managing such changes has brought any overall reconsideration of the city design model and towards more general institutional reconfigurations.

The book collects all the papers presented at the Aesop Venice 2019 conference. It is articulated in chapters that correspond to the tracks (16) and special sessions proposed (23).

Tracks

1. Transforming built heritage and landscapes
2. Urban design for multilevel planning
3. Teaching planning for the transition
4. Institutional change and regional transition
5. Methods and technologies for transformative planning
6. Community-based planning and social innovation
7. Theorizing urban change: complexity and ethics
8. Transition paths and urban futures
9. Climate proof cities and resilient societies
10. Urban metabolism and circular economy
11. Housing, gentrification and socio-spatial dynamics
12. Food, planning and healthy cities
13. Planning for accessibility and sustainable mobility
14. Planning, Law and Property Right: facing urban transitions
15. Tourism, spaces and urban cultures
16. Urban and Regional economics for transition

Special Session

1. Transition Histories
2. Urban Tourism, Neighborhood Change and Social Conflicts
3. Innovative Agriculture for Healthy Cities
4. Towards Post-Growth Planning Theory and Practice
5. Planning and Designing Green Infrastructures
6. Land Development and Management in Post-Socialist Countries
7. Home Sharing. Short-Term Rentals Affecting Local Housing Markets
8. Dynamic Change, Uncertainty and Planning for Adaptivity
9. Space, Citizenship and Identity: The Eu-Mena Region
10. The Role of The Local in Improving Cohesion and Spatial Justice
11. Friendly Spaces and Mobility for Ageing
12. Emerging Spatialities and Eu Policy Instruments: Cases and Perspectives
13. Facing Migrants Exclusionary Urban Policies
14. Learning Loops in The Public Realm. Enabling Social Learning in Communities to Tackle the Challenges of Cities in Transition
15. Planning and Biodiversity
16. Acsp-Aesop Special Session: Morsels of Hope: Migration and Urban Planning
17. Spatial Tensions: Urban Microgeographies for Changing Cities
18. Affordable Housing in Developing Countries: a Comparative Perspective
19. Acsp-Aesop Special Session: Learning from Arnstein's Ladder: from Citizen Participation to Public Engagement
20. Smart Cities and Regions Informing the Energy Transition
21. Maritime Spatial Planning (MSP) In Europe: Challenges in Transition
22. Shrinking Cities and Sustainability
23. Regional Design: Impacts on Territorial Governance and Planning Practice



PA 02 Transforming built heritage and landscapes

| | |
|---|------------|
| INFLUENCE OF CREATIVE ACTIVITIES ON THE RESIDENTS AND CONSERVATION OF CULTURE, HISTORY, AND LANDSCAPE IN SETOUCHI ISLANDS, JAPAN Asai Yuka, Miyake Saki, Abe Hirokazu, Otsuka Noriko | 2 |
| INVISIBLE PROJECTS: IMAGINED NEARNESS AS A TOOL TO EXPLORE LONG-TERM TRANSITIONS OF LANDSCAPE/HERITAGE. THE CASE OF THE RIVER TIBER IN ROME Avellini Elisa | 12 |
| ASSESSING THE TRANSITION FROM TRADITIONAL TO PARTICIPATORY HERITAGE MANAGEMENT IN TURKEY Aydin Gizem, Bleil de Souza Clarice, Cerutti Federico | 21 |
| TRANSITIONS TOWARDS LANDSCAPE-AND HERITAGE-CENTRED LOCAL DEVELOPMENT: A MULTI-LEVEL PERSPECTIVE Barbanente Angela, Grassini Laura | 35 |
| THE SLOW LINE AS AN OPPORTUNITY TO REGENERATE HERITAGE IN THE FRAGILE AREAS: THE CASE OF THE VENTO PROJECT Dezio Catherine, Giamb Bruno Maria Cristina, Oppio Alessandra, Pileri Paolo | 49 |
| RESEARCH ON THE RENEWAL STRATEGY OF NEW AND OLD INTERSECTION COMMUNITIES IN METROPOLIS BASED ON THE CONCEPT OF LANDSCAPE URBANISM - TAKING A PRACTICE IN SHANGHAI TIANLIN COMMUNITY AS AN EXAMPLE Hu Shufen | 62 |
| TOWARDS A HISTORICAL URBAN LANDSCAPE: PRINCIPLES AND APPROACHES IN RECENT BUILT HERITAGE AND LANDSCAPE REGENERATION PROJECTS IN THE YORKSHIRE REGION OF ENGLAND Huang Yong, Ren Xiang | 75 |
| UMBRELLAS, INCUBATORS, MOTHERS AND KILLERS: FOUR TYPOLOGIES OF RELATIONSHIP BETWEEN CULTURAL MEGA-EVENTS AND SMALL AND MICRO EVENTS IN HERITAGE-RICH EUROPEAN CITIES Jones Zachary, Ponzini Davide | 85 |
| REFLECTIONS ON INDIVIDUAL MEMORY IN THE TRANSFORMATION OF CULTURAL HERITAGE COGNITIVE CONTEXT Li Cong, Li Jiaying | 95 |
| EMERGING NEW MODEL OF URBAN RESIDENTIAL HISTORICAL BUILT-UP AREA RENEWAL IN CHINA: FIVE PRACTICE OF URBAN RENEWAL IN SHENZHEN, GUANGZHOU AND SHANGHAI Long Jiayu, Gang Liu | 119 |
| PARADOXES OF THE ITALIAN HISTORIC CENTRES BETWEEN UNDERUTILISATION AND PLANNING POLICIES FOR SUSTAINABILITY Pellegrini Paola, Micelli Ezio | 132 |
| ALPINE INDUSTRIAL LANDSCAPES IN TRANSITION. TOWARDS A TRANSFERABLE STRATEGY FOR BROWNFIELD TRANSFORMATION IN MOUNTAIN REGIONS. Modica Marcello, Weilacher Udo | 147 |
| BUILT HERITAGE AND LANDSCAPE ROLE IN THE ROME METROPOLITAN PLAN Nucci Lucia | 166 |
| THE PRODUCTION OF HERITAGE Pace Michela, Chandler Alan | 172 |
| DEVELOPING TRANSFORMATION STRATEGIES FOR ALPINE INDUSTRIAL LANDSCAPES SHOWN BY THE STYRIAN IRON ROUTE IN AUSTRIA Pechhacker Julia, Forster Julia | 182 |
| LET'S TALK ABOUT CHANGE - EXPERIENCES FROM A VIDEO EXHIBITION CONFRONTING THE PUBLIC WITH URBAN AND LANDSCAPE TRANSITION BY REVISITING THE ORIGINAL SITES OF RELOCATED HISTORICAL MUSEUMS BUILDINGS TO VIEW THESE SITES IN THEIR CURRENT STATE Schretzenmayr Martina, Casaulta-Meyer Simona | 196 |



Table of Contents

| | |
|---|------------|
| THE INFLUENCES AND IMPLICATIONS OF THE EUROPEAN CAPITAL OF CULTURE ON INTANGIBLE HERITAGE: NOVI SAD 2021 | 209 |
| Stupar Aleksandra, Camprag Nebojša, Polić Darko | |
| URBAN DESIGN METHODS OF SHANGHAI TILANQIAO HISTORIC DISTRICT UNDER THE BACKGROUND OF URBAN RENEWAL | 223 |
| Sun Xinyu | |
| IN SUPPORT OF GLOBAL INTEGRATED LANDSCAPE INITIATIVES: EXPERIENCES FROM THE GREEN HEART IN THE NETHERLANDS | 236 |
| Tisma Alexandra, Meijer Johan | |
| BUILT HERITAGE AND AGENDA 2030. EMBEDDING HERITAGE VALUES IN THE SPATIAL PLANNING LOCAL AGENDA | 248 |
| Trillo Claudia | |
| WHO IS AFRAID OF TRANSITION? MONITORING THE IMPACT OF TRANSFORMATION ON HISTORICAL RURAL LANDSCAPES AS INDICATOR OF COMMUNITIES' CHANGING NEEDS | 261 |
| Vigotti Francesca | |
| RECONSTRUCTING PUBLIC HISTORY THROUGH EUROPEAN SETTLER AND INDIGENOUS HERITAGE AND LANDSCAPE | 272 |
| Walker Ryan | |
| SUSTAINABLE PROTECTION OF CHINESE HUMAN-HABITAT HISTORICAL ENVIRONMENT FROM THE PERSPECTIVE OF TRANSITION:CASES STUDY OF TRADITIONAL VILLAGES AND ANCIENT CITY OF PINGYAO IN SHANXI PROVINCE | 290 |
| Xu Xiwei, Yin Xi, Li Yang | |
| TRANSFORMATION OF ROADS' FEATURE PROTECTION: STATUS AND FUTURE THINKINGS OF SHANGHAI'S FEATURE-PROTECTED ROADS:BASED ON THE CASE OF YUYUAN ROAD IN SHANGHAI | 301 |
| Zhou Yeyuan, Xueyan Wang | |

PA 03 Urban design for multilevel planning

| | |
|---|------------|
| WHAT ROLE DO URBAN POLICIES PLAY IN ENHANCING THE SATISFACTION FROM NEIGHBOURHOOD OPEN SPACES IN MIXED-USE CITY CENTRES: LESSON FROM AUCKLAND | 315 |
| Amirshekari Razno Salma, Beattie Lee, Silva Cristian Alejandro | |
| OPPORTUNITIES, INNOVATION, AND LEGITIMACY IN PUBLIC-PRIVATE COLLABORATION. LESSONS FROM FRENCH PRACTICES | 327 |
| Ariani Camilla, Donvito Giacinto | |
| ROME CAPITAL REGION: REASONS AND SCOPE OF A DIFFERENT PROSPECTIVE | 352 |
| Caudo Giovanni , Baioni Mauro, de Strobel de Haustadt E Schwanenfeld Lorenzo | |
| EXPLORING IBA BASEL – ASSESSING THE IMPACT OF TRINATIONAL COOPERATION AND THE RESULTING PERSPECTIVES FOR THE POST IBA PERIOD | 360 |
| Förster Agnes , Frieling Katharina, Thissen Fee Natalie | |
| THE ROLE OF PARTICIPATORY PLANNING METHODS IN THE DEVELOPMENT OF PUBLIC SPACES: A SYSTEMATIC CASE STUDIES REVIEW ON SUSTAINABLE URBAN GOVERNANCE | 375 |
| Geddes Ilaria, Charalambous Nadia, Papallas Andreas | |
| LIVING APARTMENT BUILDINGS IN ANKARA AND THEIR RELATION WITH THE CITY | 389 |
| Gedikli Bahar | |
| RESEARCH ON RENEWAL OF LEFTOVER SPACES BASED ON MULTI-ACTOR PLANNING | 410 |
| Guo YUCHEN, Baykurt Burçin, Dai Shuyuan | |
| CITY AS A TRANSFORMATIONAL TOOL. THE INFINITY CITIES OF IVAN LEONIDOV | 433 |
| Lanini Luca | |
| PARTICIPATION AND COMMUNICATION: CHANGSHA CHILDREN FRIENDLY CITY PLANNING, DESIGN AND ACTIONS ON MULTIPLE LEVELS | 444 |
| Li Ziyue, Ze Zhang | |



Table of Contents

| | |
|--|------------|
| A MULTILEVEL URBAN LANDSCAPE MEASUREMENT FOR ZONING CONTROL – A CASE STUDY OF GUSHAN KAOHSIUNG IN TAIWAN Li Jouhui, Han-Liang Lin | 460 |
| THE ROLE OF CLIMATHON® IN THE CHALLENGE OF MULTILEVEL ECOLOGICAL PLANNING Lorenzo Viviana, Massari Martina | 479 |
| INTERDISCIPLINARY METHODOLOGY FOR RETHINKING THE URBAN LAYOUT VIA MULTI CRITERIA ANALYSIS AND INDICATOR APPLICATION Luciani Francesca Romana, Caccamo Alessio, Herzog Lavinia, Nigro Silvia, Tommasoli Lavinia | 488 |
| COLLABORATIVE PROCESSES AND SPATIAL PLANNING: THE NATIONAL SPATIAL PLANNING POLICY IN PORTUGAL Maia Catarina, Sá Marques Teresa | 499 |
| FROM TRADITIONAL NEIGHBORHOODS TO URBAN ENCLAVES: AN INVESTIGATION ON THE RESIDENTS' PERCEPTIONS OF THEIR RESIDENTIAL TERRITORIES Memlük Çobanoğlu Nihan Oya, Akkar Ercan Müge | 514 |
| THE CHARACTERISTICS OF THE WORKING PLACE OF THE CREATIVE CLASS: THE CASE OF FASHION DESIGNERS IN ISTANBUL NISANTASI Olçay Gülsen Pelin, Mengin Hande | 528 |
| AN INCLUSIVE, MULTILEVEL PLANNING EXPERIENCE TO REGENERATE MILAN METROPOLITAN PERIPHERIES Pezzoni Nausicaa | 545 |
| CHARACTERISTIC OF FLEXIBLE SPACE OF TRADITIONAL URBAN STREET UNDER THE CONCEPT OF HEALTHY CITY: CASE STUDY OF MUSLIM SETTLEMENTS IN XI'AN Ren Yunying, Bai Shuaishuai, Wang Ruoyu | 555 |
| ASSESSING TERRITORIAL VULNERABILITIES AND SPATIAL INEQUALITIES: THE CASE OF PORTUGAL Marques Teresa, Saraiva Miguel, Matos Fátima, Maia Catarina, Ribeiro Diogo, Ferreira Márcio, Amante Ana | 566 |
| GRENOBLE-ALPES AND THE ECOLOGICAL TRANSITION: TERRITORIAL PLANNING IN MOTION Seigneuret Natacha | 577 |
| THE SPATIAL DIMENSION OF THE FLEMISH COVENANT OF MAYORS: A COMPARATIVE SPATIAL ANALYSIS ON THE TRANSITION TOWARDS ENERGY NEUTRAL MUNICIPALITIES Van Noordt Anneloes | 591 |
| SENSING OLDER PEOPLE'S LIVED EXPERIENCES THROUGH VISUAL IMAGES IN SINGAPORE Yuen Belinda | 602 |
| PRIVATIZATION, MARGINALIZATION AND REUSE OF WATERFRONT SPACE IN NEW TOWN - TAKING ZHANGJIANG SCIENCE CITY ZHONGSHI UNIT AS AN EXAMPLE Zhang Shuhan, Zhang Hanghua | 613 |
| STUDY ON THE CONSTRUCTION STRATEGY OF GREEN SPACE IN URBAN SHALLOW MOUNTAIN AREA—TAKING XISHAN MILITARY INDUSTRY COMMUNITY IN WULITUN AREA OF BEIJING AS AN EXAMPLE Zhao Xiyao, Zhuang Hang, Lin Qing | 633 |

PA04 Teaching planning for the transition

| | |
|---|------------|
| THE ROLE OF THE UNIVERSITY IN THE PROMOTION OF SOCIO-SPATIAL JUSTICE Álvarez de Andrés Eva, Falleiros Frare Ulises | 645 |
| RESEARCHING SCHOOLS VS RESEARCHING WITH SCHOOLS. AN URBAN RESEARCH LABORATORY EXPERIENCE IN AN ITALIAN HIGH SCHOOL Aliberti Francesco, Avellini Elisa | 654 |
| RECONFIGURING TEACHING/LEARNING/ACTION/RESEARCH: APPARATUS FOR SOCIO-SPATIAL TRANSFORMATION WITH/IN DISADVANTAGED RURAL REGIONS Baxter Jamie | 661 |



Table of Contents

| | |
|--|-----|
| INTEGRATED DEVELOPMENT PLANNING - POLISH PRATICE AND DIDACTIC CHALLENGES Churski Pawel | 679 |
| TEACHING URBAN PLANNING THROUGH INTERNATIONAL COOPERATION PROJECT WITH AFRICAN CITIES IN VERY FAST TRANSITION TIMES De Leo Daniela, Coralli Monica | 694 |
| A COLLABORATIVE LEARNING APPROACH TO PROMOTE POSITIVE INTERDEPENDENCE IN A “PLANNING SUSTAINABLE CITIES” COURSE Martinez Javier | 699 |
| TRAINING YOUNG PLANNERS AS EXPERTS IN PARTICIPATORY PROCESSES: THOUGHTS AND EXPERIENCES FROM PALERMO, ITALY Picone Marco, Schilleci Filippo | 714 |
| CREATING SHARED CONSCIOUSNESS THROUGH COLLABORATIVE EDUCATION: THE CASE OF MUNICIPAL AMALGAMATION IN UKRAINE Vlasenko Iegor, Thomann Urs | 721 |
| INCLUSIVE EXPERIENTIAL LEARNING AT GRADUATE LEVEL PLANNING STUDIO: A COLLABORATIVE GOVERNANCE CASE Waite Imge Akcakaya, Alkay Elif, Becerik Sinem | 739 |
| “COLLABORATIVE INTERNATIONAL WORKSHOPS – A JOINT BRAZILIAN-GERMAN TEACHING EXPERIENCE FOR PLANNING IN VULNERABLE AREAS COLLECTIVE LEARNING ON PLANNING FOR INTEGRATION AND TRANSITION” Wolff Almut, Leitão Gerônimo | 762 |
| PA05 Institutional change and regional transition | |
| THE ROLE AND THE FUTURE OF SMALL TOWNS IN THE CENTRAL ITALY EARTHQUAKE CRATER 2016 AND “THE RECONSTRUCTION OF THE POSSIBLE”, PARTICIPATORY WORKSHOP FOR A POST-EARTHQUAKE DEVELOPMENT PLAN IN BOLOGNOLA Baiocco Ruben, Catalanotti Cristina, Ernesti Giulio, Barbiero Massimiliano | 773 |
| BETWEEN EAST AND WEST. EU AND CHINA'S COMPETING SPATIAL INTEGRATION LOGICS FOR THE WESTERN BALKAN REGION Berisha Erblin, Cotella Giancarlo | 779 |
| BUILDING RESILIENCE THROUGH COLLECTIVE LEARNING IN PROJECT-ORIENTED ORGANIZATIONS IN INFRASTRUCTURE PLANNING De Groot Bert, Leendertse Wim, Arts Jos | 795 |
| IN-BETWEEN DYNAMICS. TOWARDS A RECONCEPTUALIZATION OF SOFT SPACES IN REGIONAL PLANNING De Jong Martine, Hajer Maarten, Hoffman Jesse | 810 |
| METROPOLITAN GOVERNANCE IN MEXICO: THE INSTITUTIONS Demerutis-Arenas Juan Ángel | 832 |
| “THERE IS NO WAY OF SPEAKING LOGICALLY ABOUT THIS MESS”: THE IMPACT OF ACTOR-RELATIONAL DYNAMICS ON INTEGRATED PLANNING PRACTICE Eräranta Susa, Mladenovic Miloš N. | 846 |
| REGIONAL INNOVATION AND THE NEW TERRITORIAL GOVERNANCE. FRENCH AND SPANISH CASES García-Nicolás Cristina | 858 |
| REGIONAL TRANSITION, TERRITORIAL DIFFERENTIATION, COMPOSITION FOR SUSTAINABLE TRAJECTORY Verpraet Gilles | 872 |
| SETTING UP THE NEW PLANNING SYSTEM IN KOSOVO - EVOLUTION AND INFLUENCES IN THE DEVELOPMENT Gjinolli Ilir | 891 |
| RESPONSIBILISATION IN FISH HABITAT REHABILITATION AND STEWARDSHIP Gregory Kieran, Grant-Smith Deanna | 912 |



Table of Contents

| | |
|---|-------------|
| SPATIAL EVOLUTION CHARACTERISTICS AND THE PLANNING COORDINATION MECHANISM OF CROSS-BORDER REGIONS IN RESCALING Huang Yinbo | 925 |
| RESEARCH ON REGION GOVERNANCE CHARACTER AND MECHANISM OF SUBURBAN COUNTIES SURROUNDING METROPOLITANS IN CENTRAL CHINA Huang Yong, Sun Xuyang | 937 |
| SPATIAL GOVERNANCE AND PLANNING SYSTEMS AND THE CAPACITY FOR PUBLIC CONTROL OF SPATIAL DEVELOPMENT: A EUROPEAN TYPOLOGY Berisha Erblin, Cotella Giancarlo, Janin Rivolin Umberto, Solly Alys | 951 |
| ASPERN EXPLAINED: HOW THE DISCURSIVE INSTITUTIONALIZATION OF INFRASTRUCTURE PLANNING SHAPED NORTH-EASTERN VIENNA'S URBAN TRANSFORMATION Krisch Astrid, Suitner Johannes | 965 |
| "OBSERVING GOVERNANCE FROM THE 'STREET LEVEL' AN INVESTIGATION ON FIRST ACCESS SERVICES IN BOLOGNA, EMILIA ROMAGNA, ITALY" Marani Benedetta | 985 |
| INSTITUTIONAL PATTERNS FOR METROPOLITAN GOVERNANCE IN LAC COUNTRIES. THE DIFFERENTIATED EVIDENCE FROM BOLIVIA AND BRAZIL Pioletti Maurizio, Royer Luciana de Oliveira, Urquieta Crespo Patricia | 1005 |
| TERRITORIAL PLANNING AND URBAN TRANSFORMATIVE CAPACITIES. PRELIMINARY REFLECTIONS ON THE CASE OF VALENCIA IN SPAIN Segura-Calero Sergio, Peris Jordi | 1026 |
| URBAN RENEWAL MECHANISM IN MINORITY NATIONALITY AREAS OF CHINA IN THE NEW ERA Shen Cheng, Zhang Xinyi | 1040 |
| GRAND PARIS OR ÎLE-DE-FRANCE? COMPARING TWO INSTITUTIONAL MODELS FOR TRANSITIONING TO SUSTAINABLE TRANSPORT IN THE ÎLE-DE-FRANCE REGION Singerman Ray Rosalie, Maaoui Magda | 1051 |
| GOVERNANCE AND POWER IN THE METROPOLITAN REGIONS OF THE RANDSTAD Spaans Marjolein, Zonneveld Wil, Stead Dominic | 1058 |
| ADVISABILITY OF REINTRODUCING THE BUILDING CODE DOCUMENT TO CANTON SARAJEVO SPATIAL AND URBAN PLANNING LEGISLATION Tabori Nataša | 1081 |
| THE NEW DYNAMICS BETWEEN REGIONAL AND URBAN GOVERNANCE: RURAL AREAS AS CONNECTION ELEMENT Torrìsi Luca | 1100 |

PA06 Methods and technologies for transformative planning

| | |
|---|-------------|
| TERRITORY AS MEDIA AND SOCIAL MEDIA AS TERRITORY Aliberti Francesco | 1116 |
| TECHNOLOGY READINESS FOR CITIES: THE NEAR-FUTURE CASE OF AUTONOMOUS PASSENGER DRONES Donnet Timothy | 1126 |
| THE SYSTEM OF SOCIO-SPATIAL DIVERSITY MONITORING IN THE CITY OF GDANSK, POLAND Gralewska Anna | 1133 |
| URBAN PLANNING AND NATURE: PARAMETRIC MODELLING AS A TOOL FOR RESPONSIVE GREENING OF CITIES Lemes de Oliveira Fabiano , Hamdan Dana | 1143 |
| MAPPING THE LANDSCAPE OF BEHAVIOURAL THEORIES: SYSTEMATIC LITERATURE REVIEW (SHORT REVIEW OF) Kwon Heeseo Rain, Silva Elisabete A. | 1156 |



Table of Contents

| | |
|--|-------------|
| A TRANSDISCIPLINARY PERSPECTIVE ON CITY TECHNOLOGIES: TOUCHPOINTS BETWEEN INFORMATICS AND URBAN DISCIPLINES Lupi Lucia | 1161 |
| TOWARDS A BETTER UNDERSTANDING OF UPCOMING CHALLENGES RELATED TO TECHNOLOGY AND DATA USABILITY WITHIN DESIGN PRACTICE. KEY REFLECTIONS FROM A COLLABORATIVE PROCESS IN AMSTERDAM CITY Luque-Martín Irene | 1178 |
| LANDSUPPORT, A DECISION SUPPORT SYSTEM FOR TERRITORIAL GOVERNMENT Coppola Emanuele, Moccia Francesco Domenico | 1192 |
| A KNOWLEDGE-DRIVEN APPROACH TO URBAN TRANSFORMATIONS: DENSIFICATION STRATEGY OF THE CENTRAL PARTS OF BERGEN, NORWAY Roald Hans Jacob, Elric de Koning Remco | 1203 |
| SÃO PAULO CITY GIS PLATFORM: GEOSAMPA Seo He Nem Kim, Aguilar Carolina Bracco Delgado de | 1217 |
| EXPLORING THE RELATIONSHIP BETWEEN URBAN VITALITY AND THE DISTRIBUTION OF AMENITY TYPOLOGIES Sulis Patrizia, Manley Ed | 1226 |
| THE MAPPING OF HISTORICAL STREETS ON SOCIAL MEDIA: A CASE STUDY BASED ON IMAGE RECOGNITION AND SEMANTIC RECOGNITION Tang Haoming, Wang Weiqiang | 1235 |
| COMMUNITY-BASED DATA FOR A NEW TAXONOMY OF ABANDONED PLACES Garda Emanuele, Saloriani Stefano, Villa Daniele | 1247 |
| PA07 Community-based planning and social innovation | |
| THE SELF-BUILD HOUSING IN MADRID (SPAIN): 40 YEARS OF STRUGGLE Álvarez de Andrés Eva | 1257 |
| NEW ROLES FOR ADMINISTRATIONS, PLANNERS AND CITIZENS IN THE SELF-ORGANIZATION VIEW Belingardi Chiara | 1263 |
| TERRITORIAL CONFLICTS IN METROPOLITAN AREAS. A REGENERATION PROJECT FOR THE RESURGENCE OF A COMMUNITY Caruso Elisa, Lingua Valeria | 1272 |
| CITIES AND SELF-ORGANIZATION. A DISCUSSION STARTING FROM ROME Cellamare Carlo | 1280 |
| THE SERIOUS GAME: A LEARNING TOOL TO ENHANCE THE COMMUNITIES IN THE CONTEXT OF SUSTAINABLE CITIES Cravero Sara, Lami Isabella, Abastante Francesca | 1290 |
| RESEARCH ON URBAN COMMUNITY MICRO-REGENERATION FROM PERSPECTIVE OF MULTI-ACTOR PARTICIPATION: THE CASE OF YANGPU DISTRICT IN SHANGHAI Fang Jialin, Yang Guiqing | 1302 |
| SENSE OF OWNERSHIP: APPLICATION OF PARTICIPATORY ACTION RESEARCH APPROACH IN CULTURAL ECOSYSTEM VALUATION PROCESSES IN CONTROVERSIAL URBAN DEVELOPMENT PROJECTS Fatourehchi Shabestari Akram, Ruth van Roon Marjorie | 1323 |
| LIVING SPACE RESEARCH IN TYPICAL RESIDENTIAL AREAS OF SHANGHAI Fu Yingzi, Wang De | 1337 |
| TRANSITION REQUIRES COLLABORATIVE WORK. DISCOVERING AND DEFINING ACTIONS THAT SUPPORT SUPERMIXED CITIES Huybrechts Liesbeth, Penninx Inge, Zaman Jan, De Mulder Sophie, Giaretta Federico, Tack Bram | 1349 |
| PUBLIC PARTICIPATION IN THE COMMUNITY PLANNING IN CHINA Jia Shuqian, Cao Kang | 1363 |



Table of Contents

| | |
|---|-------------|
| ENTREPRENEURIAL NEIGHBORHOOD PLANNING BASED ON MULTI-STAKEHOLDERS CO-CREATION Jiang Chenhan, Li Chen | 1365 |
| EXPLORATIONS ON THE ACTIVATION ROUTE OF GATED COMMUNITY BOUNDARY SPACE BASED ON COMMUNITY MICRO-RENOVATION—A CASE STUDY OF SHANGHAI Kai Xin, Yang Guiqing | 1377 |
| “STOP THE CHILD MURDER”: HOW A GRASSROOTS MOVEMENT FOR CHILDREN’S SAFETY FORMED A NEW PARADIGM IN URBAN DESIGN Katsavounidou Garyfallia | 1397 |
| URBAN MICRO-RENOVATION BASED ON ACTION RESEARCH METHODOLOGY: A CASE STUDY OF YIFENGLI, HONGKOU DISTRICT, SHANGHAI Li Qing, Lin Ni | 1407 |
| “THE ROLE OF ACTIVIST RESEARCHERS IN URBAN AND REGIONAL PLANNING. ANALYSING AND COMPARING INTERNATIONAL CASE STUDIES OF SOCIAL CHANGE” Scaffidi Federica, Franco Monica Lopez, Mottee Lara, Sharkey Megan | 1416 |
| NETWORKING COLLECTIVE KNOWLEDGE TO FOSTER CHANGE. THE CASE OF SANSHEROES NETWORK (SAN SIRO, MILAN) Maranghi Elena | 1434 |
| LET’S MEET AT THE URBAN COURTYARD! THE ROLE OF THE COMMUNITY PARTICIPATION IN MICRO-SCALE URBAN REGENERATION IN KRAKOW Miskowiec Magdalena | 1443 |
| LOST OR FOUND IN TRANSLATION? TRANSLATING INNOVATIVE FORMS OF PARTICIPATION INTO FORMAL DECISION MAKING Ringholm Toril | 1456 |
| TRANSFORMATION OF GROWN CITY CENTRES Schaumann Elisabeth, Simon-Philipp Christina | 1474 |
| CO-CREATING COLLECTIVE IMAGINATION. HOW TO PRODUCE THOUGHT-IMAGES FOR URBAN REFRAMING? Schreurs Jan E.a. | 1485 |
| STREET-LEVEL DEMOCRACY? URBAN PROFESSIONALS AS PARTICIPATORY INNOVATORS IN NEIGHBOURHOOD PLANNING PROCESSES Van Aanholt Jelle, Spanjar Gideon, De Nijs Karin, Suurenbroek Frank, Majoor Stan | 1497 |
| PLANNING FOR TRANSITION AND THE MULTIPLE PERSPECTIVES ON DEMOCRATIC LEGITIMACY Wolff Almut | 1514 |
| CULTURAL STAKING: TRANSITION OF THE CORE PUBLIC SPACE OF RURAL SETTLEMENTS Yang Guiqing, Xiao Yinghe | 1524 |

PA08 Theorizing urban change: complexity and ethics

| | |
|--|-------------|
| REBUILDING THE PLANNING SYSTEM: THE TRANSITION TOWARDS PROFESSIONAL ANTAGONISM IN THE UPHILL BATTLE OF MADRID NUEVO NORTE Aparicio Angel, Arias Félix | 1537 |
| SEX (ROLES) AND THE CITY Belingardi Chiara | 1548 |
| MANAGING RELIGIOUS MEGA-EVENT IN A MUNDANE URBAN COMMUNITY: THE CASE OF MUSLIM EID AL-FITR IN HUXI MOSQUE, SHANGHAI Cai Tong, Zhang Ze | 1554 |
| THE RIGHT TO HOUSING: FROM OCCUPATION TO TRANSITORY COLLECTIVE HOUSING IN TURIN. THE CASE OF VIA LA SALETTE Cottino Valeria, Gai Veronica, Masetto Annalisa, Sacco Paola | 1559 |
| URBAN AGRICULTURE AND THE SOCIAL ROLE OF URBANISM: PLANNING AND ETHICS FOR COMMUNITIES AND TERRITORIES Marat-Mendes Teresa, Cunha Borges João | 1569 |



Table of Contents

| | |
|---|------|
| TOWARDS POST-HUMAN URBANISM Lapintie Kimmo | 1584 |
| COMMUNICATION THROUGH VISUALIZATION: THE PURPOSE, ROLE AND STYLE OF VISUALIZATIONS IN URBAN PLANNING Mikulcik Burcu | 1595 |
| DESIGN IN THE ANTHROPOCENE: AN OPENING TO THE OTHER Rispoli Micol | 1603 |

PA09 Transition paths and urban futures

| | |
|--|------|
| LANDING. THE NEED FOR A RENEWED URBAN VOCABULARY FOR HOSPITALITY (AND THE CITY) Bovo Martina | 1615 |
| UNDERSTANDING THE URBANITE-ORIENTED PERFORMANCE OF ECOSYSTEM SERVICE I N PERI-URBAN AREAS: AN ANALYTICAL FRAMEWORK Liu Shuang , Li Zhipeng, Yan Kai, Chen Chen | 1625 |
| SUSPENDED TERRITORIES AND WINDOWS OF OPPORTUNITY AFTER THE 2016 EARTHQUAKE IN CENTRAL ITALY Francucci Marco Emanuel | 1637 |
| LITHUANIA AT THE CROSSROADS: EXPERIENCE FROM THE ‘MAKING’ OF A NATIONAL SPATIAL PLAN Gauce Kristina, Ratkute-Skackauskiene Giedre, Jakutyte-Walangitang Daiva, Neubert Nikolas | 1645 |
| BREX CITY: CURRENT AND FUTURE URBANITIES OF THE UNITED KINGDOM/REPUBLIC OF IRELAND BORDER Jefferies Tom | 1660 |
| BUILDING URBAN FUTURES THROUGH AN EXPLORATORY PROJECT: HOW CAN INNOVATIVE DESIGN APPROACHES BE USED TO REGENERATE URBAN PLANNING ROUTINES? Lavoie Nicolas, Abrassart Christophe, Scherrer Franck | 1670 |
| ADAPTATION. A METAPHOR FOR THE AGE OF CLIMATE CHANGE Magnabosco Giacomo, Bertin Mattia, Fabian Lorenzo | 1686 |
| QUESTIONS OF JUSTICE IN HYDROLOGICAL EXTREMES: ADVANCED REVIEW Savelli Elisa, Rusca Maria, Di Baldassarre Giuliano | 1698 |
| THE STRATEGIC DILEMMA OF AN OPEN AND CLOSED APPROACH OF TRANSITIONAL CHANGE. COMPARING THREE TRANSITION PATHS TO SUSTAINABILITY IN THE NETHERLANDS. Van der Wouden Ries | 1710 |

PA10 Climate proof cities and resilient societies

| | |
|---|------|
| URBAN RESILIENCE TO DISASTERS: A POLICY CASE FROM TURKEY Adikutlu Selin, Şenol Balaban Meltem | 1726 |
| CLIMATE CHANGE IMPACTS IN THREE REGIONS OF GREECE: INTERCONNECTIONS WITH REGIONAL PUBLIC PERCEPTIONS AND PLANNING POLICIES Angra Dimitra, Sapountzaki Kalliopi | 1734 |
| URBAN GREEN SPACES IN TRANSITION: URBAN SOCIAL-ECOLOGICAL RESILIENCE IN THE REGION FRANKFURT RHINE-MAIN—A REVIEW Bilgic Pinar | 1754 |
| A STUDY ON ESTABLISHMENT OF THE FLOOD PROTECTION STANDARD - A CASE STUDY OF DALI RIVER BASIN IN TAIWAN Chang Hsueh-Sheng, Katayama Takahiro | 1770 |
| CLIMATE JUSTICE AND INTEGRATED FLOODING RISK ASSESSMENT AND MANAGEMENT: A FRAMEWORK AND CASE STUDIES IN USA AND TAIWAN Cheng Chingwen, Chiang Li-Chun, Yao George C., Chou Wen-Jyun | 1780 |



Table of Contents

| | |
|---|-------------|
| LAND POLICY TOOLS IN FLOOD RISK GOVERNANCE: THE DIFFERENTIATED EXPERIENCES ARISING FROM THE BASINS OF THE RIVERS EVROS (GREECE) AND SCHELDT (BELGIUM) | 1788 |
| Delladetsimas Pavlos Marinos, Katsigianni Xenia, Van den Broeck Pieter , Hiergens Ide | |
| STUDY ON COUNTERMEASURES AND SPATIAL POTENTIAL OF CHINA'S COASTAL CITIES IN RESPONSE TO HEATWAVE AND FLOOD HAZARDS | 1800 |
| Feng Ning, Li Yang | |
| ERRATIC CLIMATE CHANGE PLANNING: THE GOLD COAST'S ALTERNATING TRANSITION | 1821 |
| Howes Michael, Dedekorkut-Howes Aysin | |
| ENHANCING CITIES' RESILIENCE IN THE FACE OF MULTIPLE CHALLENGES: ON-GOING EXPERIENCES IN ITALIAN AND GREEK CITIES | 1833 |
| Limongi Giada, Salata Konstantina-Dimitra, Galderisi Adriana | |
| FROM THE VIEWPOINT OF ECOSYSTEM SERVICE : A STUDY OF FUNCTIONAL REGIONALIZATION IN CHIAYI CITY, TAIWAN | 1854 |
| Lin Chia-Ming, Chang Hsueh-Sheng | |
| RESEARCH ON THE CONSTRUCTION OF "SPONGE CAMPUS" FROM THE PERSPECTIVE OF LOW IMPACT DEVELOPMENT - A CASE STUDY OF JIANGPU CAMPUS OF NANJING TECH UNIVERSITY | 1863 |
| Ling Lin, Dai Shenzhi | |
| CONVENING REGIONAL CLIMATE COLLABORATIVES: A CROSS-COMPARISON OF US CASES | 1879 |
| Margerum Richard D, Adams Steve, Bruce Josh | |
| SENSING THE CITY: CLIMATE CHANGES AND ADVANCED TECHNOLOGIES | 1889 |
| Fusero Paolo, Massimiano Lorenzo | |
| COOPERATIVE BRIDGES: THE ROLE OF RISK PERCEPTION IN CONSTRUCTION OF RESILIENT COMMUNITIES | 1895 |
| Monno Valeria, Frisullo Daniela | |
| BEYOND BARRIERS: EXPLORING THE FUTURES OF CLIMATE INFRASTRUCTURE ON THE VENETIAN LAGOON | 1907 |
| Toro Barragan Vanessa, Chan Collyn, Haney Elizabeth, Mohyuddin Azka, Ocampo Mary Anne, Ofsevit Ari, Purdy Bella, Smith Mary Hannah, Wong Angela | |
| PLANNING AND ARCHITECTURE FOR CLIMATE ADAPTATION: THE EXPERIENCES OF THE "STRUCTURE-TERRITORIES" IN LOW AND HIGH DENSITY CITY | 1924 |
| Serrelì Silvia, Sanna Gianfranco, Biddau Giovanni Maria, Spanedda Pier Paolo, Chemli Nesrine | |
| FLOOD: CAN MIAMI LEARN FROM VENEZIA (OR THE OPPOSITE) | 1941 |
| WASHER CHRISTOPHE | |
| A COMPARATIVE ANALYSIS OF LOCAL CLIMATE CHANGE ADAPTATION PLANS FOR NATURAL DISASTER RISK REDUCTION IN SOUTH KOREA | 1952 |
| Yoon Dong Keun, Cho Seong Yun, Choi Yeon Woo, Jang Jung Woo | |
| RESILIENT PLANNING OF CHINESE DELTA CITIES UNDER CLIMATE CHANGE | 1968 |
| Zhang Xinyi, Shen Cheng | |

PA11 Urban metabolism and circular economy

| | |
|--|-------------|
| CIRCULAR ECONOMY IN URBAN PROJECTS: A CASE STUDIES ANALYSIS OF CURRENT PRACTICES AND TOOLS | 1981 |
| Appendino Federica, Roux Charlotte, Saadé Myriam, Peupartier Bruno | |
| URBAN METABOLISM AND THE CIRCULAR ECONOMY , THE CAPITAL APPROACH | 1996 |
| Hunt Peter | |
| LOCAL MANUFACTURING SYSTEMS IN THE PIEDMONT AREA. NEW SCENARIOS FOR AN INLAND METABOLISM | 2009 |
| Leonardi Maria | |
| RESEARCH ON THE THEORETICAL FRAMEWORK OF INTEGRATED URBAN WATER SYSTEM PLANNING BASED ON WATER CYCLE THEORY | 2025 |
| Liu Feiping, Dai Shenzhi | |



Table of Contents

| | |
|---|------|
| THE GOVERNANCE OF THE CIRCULAR ECONOMY: INSIGHTS FROM THE VENETO REGION Church Jon Marco , Lucertini Giulia, Bellinato Giacomo, Guolo Erika, Pizzo Giovanna, Bonomin Giulia | 2043 |
| BRINGING WASTE TO THE FOREGROUND OF CITIES. TOWARDS SUSTAINABLE TRANSITION MANAGEMENT IN THE URBAN REGION OF NAPLES (ITALY) Berruti Gilda, Palestino Maria Federica | 2064 |
| DATA CENTER AND THE CITY: A POTENTIAL FOR URBAN SYNERGIES Ramos Cáceres Cristina, Sandberg Marcus, Sotoca Adolfo | 2072 |
| RETHINKING ORGANIC WASTE STREAMS AS METABOLIC DRIVERS FOR IMPROVING URBAN SUSTAINABILITY AND AGROECOLOGICAL PRACTICES Stempfle Sarah, Tornaghi Chiara, Reho Matelda | 2081 |
| | |
| PA12 Housing, gentrification and socio-spatial dynamics | |
| HOUSING POLICIES BEYOND NUMBERS: A COMPARATIVE STUDY IN PORTUGAL AND ITALY Di Giovanni Caterina Francesca, Antunes Gonçalo | 2088 |
| HIGH-DENSITY LIVING IN HONG KONG FROM THE PERSPECTIVE OF TEENAGERS Hao Pu | 2107 |
| REACH HOMES - A CRITICAL EXTENSION OF DWELLING Holden Samuel | 2117 |
| IDENTIFYING THE IMPACTS OF UNION STATIONS ON HOUSING PRICE IN KAOHSIUNG CITY, TAIWAN HSU Cheng-Kai, Chen Yen-Jong | 2128 |
| THE POSSIBILITIES AND LIMITATIONS OF THE STATE AND LOCAL AUTHORITIES' ACTIVITIES IN RESISTING FINANCIALISATION OF THE HOUSING SECTORS IN CENTRAL AND EASTERN EUROPEAN COUNTRIES Lis Piotr | 2136 |
| SUBURBS AND SUBSIDIZED HOUSING IN THE UNITED STATES: WHAT MAKES SOME SUBURBS MORE RECEPTIVE TO LOW-INCOME HOUSING TAX CREDIT HOUSING THAN OTHERS? McClure Kirk, Schwartz Alex | 2144 |
| GENTRIFICATION AND COMMUNITY-LED DESIGN: RENEGOTIATION AND LIMITATION OF THE RENT GAP IN THE UK Morton Tom | 2168 |
| ICD-AN ALTERNATIVE AFFORDABLE HOUSING INITIATIVE Nautiyal Nidhi | 2180 |
| HOUSES BEYOND-THE-THRESHOLD. A NEW PARADIGM OF HOUSING FOR THE THIRD MILLENNIUM Pezzoni Nausicaa | 2196 |
| HOUSING DEFICIT AND HOUSING OPPORTUNITIES: IMPLEMENTING COLLECTIVE OWNERSHIP IN THE CENTRE OF SÃO PAULO, BRAZIL. THE CASE OF FICA FUND Pioletti Maurizio, Cymbalista Renato | 2209 |
| CHICANA NEIGHBORHOOD ACTIVISM: GENDER, RACE, AND URBAN PLANNING Sandoval Gerardo, Sosa-Riddell Citlali, Sosa-Riddell Ada | 2219 |
| MASS HOUSING, RELOCATION, AND MOTHERS' AND CHILDREN'S RESIDENTIAL SATISFACTION: EVIDENCE FROM ANKARA Severcan Yucel Can | 2236 |
| "RETHINKING PARTNERSHIPS FOR AFFORDABLE HOUSING: PLANNING POLICY DESIGN NEXUS" Tsenkova Sasha | 2253 |
| DISPOSSESSION OF THE POOR THROUGH AN URBAN RENEWAL PROJECT IN NARLIDERE IZMIR, TURKEY Uysal Ayça, Arslan Avar Adile | 2264 |



Table of Contents

| | |
|---|------|
| THE POTENTIAL OF ALTERNATIVE HOUSING INITIATIVES TO ‘TRANSFORM’ THE HOUSING SECTOR: EXAMPLES FROM NEW YORK CITY AND BERLIN Yonder Ayse Nilufer, Brunzema Meta | 2280 |
| THE SPATIAL CHARACTERISTICS AND SUPPLY OF URBAN AFFORDABLE HOUSING - AN INTERNATIONAL COMPARATIVE STUDY Zhang Xiuning, Yang Fan | 2288 |
| PA13 Healthy City Planning: Food, Physical Activity and Social Justice | |
| EMERGING PLACES OF SOCIAL INNOVATION (POSI). THE CO-PRODUCTION OF SPACE BETWEEN MULTILEVEL STAKEHOLDERS: THE CASE OF PRODUCTIVE URBAN GREEN INFRASTRUCTURE Ardill Nicholas, Lemes de Oliveira Fabiano | 2303 |
| HEALTHY NEIGHBORHOODS ALONG AN URBAN TO RURAL GRADIENT Carver Rial | 2320 |
| THE IMPORTANCE OF BUILT ENVIRONMENT: CHARACTERISTICS OF THE BUILT ENVIRONMENT AND SPATIAL PATTERNING OF TYPE 2 DIABETES IN PUDONG DISTRICT, SHANGHAI Chen Sijia, Yu Yifan | 2334 |
| DOES THE CONNECTIVITY OF URBAN PUBLIC GREEN SPACE PROMOTE USE? AN EMPIRICAL STUDY OF WUHAN INNER CITY Dong Yuping, Liu Helin, Zheng Tianming | 2346 |
| STUDY OF THE INTERRELATIONSHIP BETWEEN URBAN MICRO PUBLIC SPACE MORPHOLOGY AND MICROCLIMATE Han Shanshan, Song Dexuan | 2361 |
| A RESEARCH FRAMEWORK OF URBAN SPATIAL PLANNING REGULATION BASED ON CARDIOVASCULAR HEALTH IN THE CONTEXT OF SEVERE COLD CLIMATE Li Shuyuan, Leng Hong | 2373 |
| THE CONSTRUCTION OF PEDESTRIAN NETWORK IN URBAN BLOCKS: A CASE STUDY Li Wenzhu, Sun Tongyu | 2383 |
| “THE REPOSITIONING AND URBANISATION OF HEALTH: NEW HEALTHY PLACES ALONG HOSPITAL-CITY-CONTINUUM AND ITS IMPLICATIONS FOR HEALTHY CITY PLANNING” Maierhofer Magdalena | 2395 |
| PHYSICAL ACTIVITY IN FAMILIES DAILY-LIFE OF SUBURBAN AREAS – THE CASE OF RIO DE MOURO, LISBON METROPOLITAN AREA Marques da Costa Eduarda, Franco Pedro, Marques da Costa Nuno | 2406 |
| HEALTHY CITY OF TOMORROW Nucci Lucia | 2416 |
| SHAPING CITIES FOR HEALTH TO CONTRAST THE EFFECTS OF CLIMATE CHANGE: THE CCHURE PROPOSAL D’Onofrio Rosalba, Odoguardi Ilaria, Trusiani Elio | 2423 |
| SUPPLY-DEMAND ANALYSIS OF PARK SERVICES FOR DIFFERENT AGE GROUPS IN COMMUNITY LIFE CIRCLE: A CENTRAL DISTRICT IN SHANGHAI AS A CASE Qiu Ming, Wang Min | 2434 |
| WELL-BEING, SOCIAL INTERACTION AND PHYSICAL ACTIVITY: ENCOURAGING HEALTHY BEHAVIOURS THROUGH QUALITY URBAN DESIGN Sepe Marichela | 2443 |
| URBAN FARMING IN A RAPID URBAN TRANSFORMATION: COMMUNITY INITIATIVES AND POLICY CHALLENGES IN BANDUNG AND YOGYAKARTA Setiawan Bakti, Tuntung Pandangwati Sri | 2451 |
| USING SPATIAL AGGREGATION METHOD OUTCOME TO EXPLAIN THE INFLUENCES OF BUILT ENVIRONMENT ON HEALTH PROFILE Shen Yuanyi, Zhong Mengqi, Zhang Qinglai, Bu Jiatian, Yu Yifan | 2466 |



Table of Contents

| | |
|--|-------------|
| THE SPACE-TIME RELATIONS BETWEEN PEDESTRIANS AND STREET VENDORS: A CASE STUDY IN SUIHUA, CHINA Sun Ziwen | 2473 |
| WALKABILITY IN FLANDERS (BELGIUM): DEVELOPING A TOOL TO SUPPORT HEALTHY SPATIAL PLANNING. Vervoort Peter, D'Haese Sara, Verdeyen An, Van Acker Ragnar | 2486 |
| RESEARCH OF AN INDICATORS SYSTEM FOR THE COMPACT URBAN FORM BASED ON THE HEALTHY CITY CRITERIA Wang Yimin, Fu Bin, Zhang Haoyan, Yang Shaoliang, Hu Ying, Lin Zhongjie | 2497 |
| WALKING IN SHANGHAI: STREET PLANNING AND DESIGN BASED ON WALKABILITY Xu Xinxin, Zhao Xiyao | 2505 |
| THE INFLUENCE OF COGNIZED NEIGHBORHOOD ENVIRONMENT ON CHILDREN'S HEALTH AND OUTDOOR ACTIVITIES: A CASE STUDY OF SHANGHAI Zhai Baoxin, Zhu Wei | 2513 |
| THE SIGNIFICANCE OF URBAN HISTORICAL PARKS TO PHYSICAL ACTIVITY AND PUBLIC HEALTH: A CASE STUDY IN BEIJING, CHINA Zhang Sihan, Liu Xiaoming | 2522 |
| EXPLORING ASSOCIATIONS BETWEEN STREET NETWORKS AND CYCLING FROM THE PERSPECTIVE OF SPACE SYNTAX: AN EMPIRICAL RESEARCH OF YANGPU DISTRICT OF SHANGHAI Wang Lan, Zhou Kaichen | 2535 |
| URBAN RIVER REGENERATION AS A TOOL FOR HEALTHY CITY PLANNING: THE CASE OF SHENZHEN FUTIAN RIVER Zordan Mirna, Villani Caterina, Zou Junyu, Talamini Gianni | 2546 |
| TEMPORARILY PEDESTRIANISED STREET IN HONG KONG: GOVERNMENTAL STRATEGY OF IMPLEMENTATION AND TACTICS OF APPROPRIATION Villani Caterina, Cheng Yu Hin, Zordan Mirna, Talamini Gianni | 2559 |
| PA14 Planning for accessibility and sustainable mobilities | |
| COMPARING IMPLEMENTATION APPROACHES IN MOBILITY INNOVATIONS: THE ECCENTRIC PROJECT IN MADRID Aparicio Angel | 2573 |
| SUSTAINABLE AND CONNECTED INFRASTRUCTURE NETWORKS AND URBAN REGIONS – TRANSITION TOWARDS INTEGRATED PLANNING OF URBAN NODES ON TEN-T CORRIDORS Arts Jos, Van der Linden Kevin, Van der Werf Sjaak | 2584 |
| CARGO HITCHING AS A TOOL TO TRASFORM THE URBAN MOBILITY SYSTEM. INTEGRATING PASSENGERS AND GOODS TRANSPORTATION TOWARDS A MORE SUSTAINABLE, DESIDERABLE AND EFFICIENT MOBILITY Bruzzzone Francesco | 2599 |
| AN ON DEMAND TRANSPORT IN A LOW DENSITY AREA OF PORTUGAL - ALENTEJO Carvalho Carmen | 2613 |
| CYCLING TO SCHOOL: EXPLORING KEY FACTORS INFLUENCING SCHOOL-GOING CHILDREN'S MOBILITY CHOICE TO CYCLE IN TALLINN, ESTONIA Kask Õne, Tan Wendy | 2621 |
| HOME PARKING AND COMMUTING: EXPLORING NEW WAYS OF ESTIMATING THE IMPACT OF PARKING ON MOBILITY CHOICES Khazaeian Omid, De Roiste Mairead, Daghlish Toby, Saglam Yigit | 2636 |
| ALTERNATIVE DISCOURSE AND NARRATIVES FOR INSTITUTIONAL CHANGE IN TRANSPORT PLANNING Muhammad Imran | 2647 |
| CLASSIFYING GOVERNANCE INITIATIVES FOR AN EFFECTIVE INTEGRATION OF CAR SHARING WITH URBAN PLANNING AND TRANSPORT SYSTEMS Paganelli Luisiana | 2661 |



Table of Contents

| | |
|---|------|
| THE RELOCATION OF A CIRCUS SCHOOL FROM THE PERSPECTIVE OF MOBILITY OF ITS PARTICIPANTS Penninx Inge, De Mulder Sophie | 2671 |
| USING SNAMUTS TO PLAN FOR CHANGE: THE PLACE FOR ACCESSIBILITY MODELLING IN STRATEGIC PLANNING FOR URBAN TRANSITIONS Perkovic Jana, Stone John | 2687 |
| NEIGHBOURHOOD WALKING AS TRANSPORT, OUTDOOR RECREATION AND PUBLIC HEALTH Skjeggedal Terje, Vistad Odd Inge, Thorén Kine Halvorsen | 2707 |
| STEERING DISRUPTION: A BACKCASTING APPROACH TO GOVERN THE SPATIAL IMPACTS OF THE DIFFUSION OF AUTOMATED VEHICLES IN TURIN Staricco Luca, Rappazzo Valentina, Scudellari Jacopo, Vitale Brovarone Elisabetta | 2722 |
| BEYOND THE PLAN: METHODS OF TRIGGERING LONG-TERM CHANGE IN URBAN AND REGIONAL MOBILITY Förster Agnes , Strobel Eva | 2732 |
| ANALYSING THE RELATION BETWEEN TERRITORIAL FRAGILITIES AND ACCESSIBILITY: A FOCUS ON INDIVIDUAL DIMENSION AND NEEDS Vendemmia Bruna | 2748 |
| ENHANCING URBAN-RURAL CONNECTIVITY IN NON-METROPOLITAN REGIONS: A METHODOLOGY IN SUPPORT TO DECISION-MAKING Vitale Brovarone Elisabetta, Cotella Giancarlo, Staricco Luca | 2756 |
| ‘STICKY FLOWS’ AND ‘PRODUCTIVE FRICTIONS’: UNTANGLING THE MECHANISMS OF STREET URBANISM Webb Jamme Hue-Tam | 2769 |
| PARKING PATTERN AND INFLUENCING FACTORS OF DOCKLESS PUBLIC BICYCLE: CASE STUDY FROM NANSHAN SHENZHEN Xie Zhaoyang, Liu Kun, Zhou Qingfeng | 2796 |
| “IMAGINING THE FUTURE OF MY NEIGHBORHOOD”: RESIDENTS’ PERCEPTIONS OF SUSTAINABLE MOBILITY AND REGENERATION AROUND METRO STATIONS IN THE CITY OF THESSALONIKI Papagiannakis Apostolos, Yiannakou Athena, Zachariadou Panagiota | 2811 |
| HOW COULD THE INTEGRATION OF LAND USE AND TRANSPORT IN PLANNING PRACTICE CONTRIBUTE ACHIEVING SUSTAINABLE URBAN FORM? – BY A CASE STUDY ANALYSIS OF KINGS’ CROSS AND OLYMPIC LEGACY IN LONDON Yue Yufeng, Shi Haochen | 2822 |
| BICYCLE–METRO INTEGRATION FOR THE ‘LAST MILE’ IN SHANGHAI Zhang Ze, Cai Tong | 2846 |

PA15 Planning, Law and Property Right: in the face of transitions

| | |
|---|------|
| RIGHT TO THE CITY, HUMAN RIGHTS, AND CANADIAN CITIES Agrawal Sandeep | 2853 |
| “TRANSPPOSITION OF ADVOCACY EXPERIENCE AS TRIPLE-LOOP SOCIAL LEARNING IN ALBANIA: FIGHTING HPPTS IN PROTECTED AREAS FROM THE VJOSA RIVER BASIN TO THE CANYONS OF OSUMI” Bekteshi Arba, Misho Erinda | 2857 |
| MONITORING AND ENFORCEMENT OF SHORT-TERM RENTALS RULES. MISSION IMPOSSIBLE? Calor Inês, Magarotto Mateus | 2868 |
| COMMON VALUE: TRANSFERRING DEVELOPMENT RIGHTS IN THE FACE OF CLIMATE CHANGE CHALLENGES Dyca Besmira | 2878 |
| URBAN-LEGAL PARADIGMS SUPPORTING POST-MILLENNIAL EVICTION: THE ROLE OF THE COURTS IN DISPLACEMENT PRACTICES Jahn Verri Fernanda | 2895 |



Table of Contents

| | |
|--|-------------|
| RESEARCH ON THE IMPLEMENTATION MECHANISM OF PRIVATELY OWNED PUBLIC SPACE - PLANNING IMPLEMENTATION OF THE PUBLICLY TRANSFERRED LAND IN FUZHOU CITY 2008-2017 Jiang Hong | 2909 |
| LEGITIMACY CRISIS OF THE VILLAGE PLANNING IN CHINA AND ITS RESOLUTION Li Yanqun, Geng Hong | 2916 |
| LAND USE PLANNING, TOURISM INTENSIFICATION AND REGULATION OF SHORT TERM COMMERCIAL VISITOR ACCOMMODATION: THE CASE OF EDINBURGH McCarthy John | 2932 |
| EVALUATION OF THE LAND VALUE CAPTURE (LVC) EXPERIENCE IN THE CITY OF SÃO PAULO, BRAZIL Nobre Eduardo | 2940 |
| UNINTENDED OUTCOMES OF THE MARKETIZED HOUSING AGENDA IN SWEDEN: THE TROLLS THAT NEVER WERE INVITED WHO WE NOW HAVE TO DEAL WITH Norén Bretzer Ylva | 2948 |
| NEOLIBERAL GOVERNANCE AND ACCUMULATION BY DISPOSSESSION IN KARABURUN PENINSULA, IZMIR, TURKEY Özcan Cive Yagmur, Arslan Avar Adile | 2964 |
| MASTERS IN TRANSITION? Rezac VIT | 2977 |
| IMPLEMENTATION PROBLEMS OF SOCIAL AND TECHNICAL INFRASTRUCTURE IN TURKISH SETTLEMENTS Subasi Gulden, Sence Turk Sevkiye | 2985 |
| PA16 Tourism, public spaces and urban cultures | |
| INTERRELATION BETWEEN INCLUSIVITY OF PUBLIC SPACES AND SOCIAL COHESION: METAMORPHOSIS OF A HISTORICAL PARK IN ANKARA, TURKEY Akkar Ercan Müge, Oya Memlük Nihan | 2998 |
| WHERE THE STREETS HAVE NAMES Barbieri Lorenzo | 3005 |
| TRANSITIONAL APPROACH FOR ENHANCING PLACE-BASED AND COLLABORATIVE POLICIES, TOWARDS AN EVOLUTIONARY DIMENSION OF COHESION POLICY Bevilacqua Carmelina, Cappellano Francesco, Ou Yapeng | 3016 |
| SPATIAL DISTRIBUTION CHARACTERISTICS OF CULTURAL TOURISM IN HISTORICAL REGIONS: A CASE OF SHAOXING ANCIENT CITY BASED ON POI DATA Cai Tong | 3029 |
| “WHAT ELSE?”: COMMUNITY PERSPECTIVES ON TOURISM-LED URBANIZATION IN SPITI, INDIA Chakravarty Surajit | 3038 |
| HOW WELL CAN PRIVATELY OWNED PUBLIC SPACES (POPS) FACILITATE SOCIAL INTERACTIONS IN TAIPEI CITY? A CASE STUDY OF THE COMMUNITY RESIDENTS’ DAILY LIFE Cheng Wen-Chi, Chao Tzu-Yuan | 3061 |
| ANALYSIS AND RESEARCH OF URBAN STREET FUNCTIONS BASED ON GIS: A CASE STUDY OF XUHUI DISTRICT, SHANGHAI, CHINA Dai Luning | 3075 |
| BY NO PLACE TO PUBLIC SPACE: A NEW RESOURCE FOR CAPUA De Biase Claudia, D’Agostino Irene | 3084 |
| THE IMPACTS OF SHARING PLATFORMS FOR TOURISM ON SPACES AND COMMUNITIES: THE POSSIBLE ROLE OF PLACEBASED REGENERATION PROCESSES Daldanise Gaia, Esposito De Vita Gabriella | 3103 |
| READING THE CITY THROUGH THE LENS OF URBAN STANDARDS. THE CASE OF PONTICELLI, EAST NAPLES Franzese Alessia | 3120 |



Table of Contents

| | |
|---|-------------|
| ANTIFRAGILE PRACTICES TO DESIGN SOCIAL DIALOGUE IN CONTEMPORARY EUROPEAN PUBLIC SPACES Galimberti Beatrice | 3131 |
| RESEARCH ON MULTI-LEVEL PUBLIC SPACE SYSTEM PLANNING STRATEGY IN HISTORICAL AND CULTURAL BLOCK BASED ON THE CONCEPT OF “COLLAGE CITY” - TAKING BEIJING MOSHIKOU HISTORICAL AND CULTURAL BLOCK AS AN EXAMPLE Gao Yu, Wang Ziyao, Zhang Yunlu | 3146 |
| URBAN PUBLIC SPACE DESIGN FROM THE PERSPECTIVE OF ENVIRONMENTAL BEHAVIOR - A CASE STUDY OF THE ROUND-CITY-PARK IN XI'AN Gu Taiwei | 3157 |
| THE ROLE OF THE LOCAL IN IMPROVING COHESION AND SPATIAL JUSTICE Su Yuqian, Guo Yuchen, Wan Lu | 3164 |
| MUSEUM OF LONDON - A CITY MUSEUM IN TRANSITION Hebbert Michael | 3174 |
| SUITABLE RENEWAL AND SPACE ORGANIZATION METHODS OF HISTORIC TOWN IN THE TRANSITION PERIOD: A CASE STUDY IN CHINA Hou Wenjun, Ge Tianyang, Yang Jianqiang | 3192 |
| THE STUDY ON SPATIAL INTERVENTIONS FOR AGING COMMUNITIES IN TOURISM-ORIENTED HISTORIC DISTRICTS FROM THE PERSPECTIVE OF SPATIAL TERRITORIALITY Hu Ying, Lin Zhongjie | 3201 |
| SUSTAINABLE TOURISM AND PUBLIC SPACE - A CASE STUDY OF SKEPPSHOLMSVIKEN 6 IN STOCKHOLM, SWEDEN Jonsson Anna-Paula, Haas Tigran | 3211 |
| SUPPRESSING URBAN CREATIVITY: DISPLACEMENT OF THE ART SPACES OUT OF THE MAINSTREAM CULTURAL SCENE OF ISTANBUL Kahya Guzin Yeliz | 3226 |
| ALTERNATIVE URBANISM IN THE HISTORIC CITY CENTRE: A TRANSNATIONAL PERSPECTIVE ON THEORY AND PRACTICE Akl Ameera, Kamvasinou Krystallia | 3237 |
| RESEARCH ON THE IMPROVEMENT OF URBAN PUBLIC SPACE VITALITY BASED ON THE CONCEPT OF SOCIAL RESOURCE SHARING--TAKING TIANLIN COMMUNITY IN SHANGHAI AS AN EXAMPLE Li Qianwen | 3249 |
| RECENT DEVELOPMENTS IN CULTURAL PLANNING AS AN APPROACH TO BUILD CREATIVE CITIES Kattimani Raghavendra | 3261 |
| RECORDING, EVALUATING AND MANAGEMENT OF TANGIBLE AND INTANGIBLE CULTURAL HERITAGE, THROUGH A DECISIONMAKING MULTI-CRITERIA ANALYSIS Linaki Eleni | 3268 |
| THE RESEARCH ON FORMATION MECHANISM OF THE RURAL RED CULTURE TOURISM INDUSTRY CLUSTER AND APPLICATION --- REFLECTIONS FROM THE COMPARATIVE ANALYSIS OF THE “REVOLUTIONARY RESORT” XIBAIPO TOWN AND “GREEN DOT” DASHI TOWN Liu Shiqi | 3274 |
| “A STUDY ON THE DEVELOPMENT TREND AND TRANSFORMATION OF SHANGHAI AS A CREATIVE CITY IN THE 21ST CENTURY” Ma Xiaojiao , Wang Weiqiang | 3287 |
| UN HABITAT'S PARTICIPATORY INITIATIVE TO PUBLIC SPACE DESIGN INVOLVING RESIDENTS, REFUGEES AND LOCAL AUTHORITIES: THE CASE OF NABAA', BOURJ HAMMOUD, LEBANON Mady Christine | 3299 |
| ALONG THE RIVER CORMOR, RE-LINKING LANDSCAPES AND PUBLIC FACILITIES IN THE REGION FRIULI VENEZIA GIULIA Cigalotto Paola, Marchigiani Elena | 3312 |
| WHO LIVES HERITAGE: INVESTIGATION ON THE IMPACT OF TOURISM FLOWS AND HERITAGE PROTECTION IN THE USE OF PUBLIC SPACE Amato Chiara, Mondelli Francesca Paola | 3335 |



Table of Contents

| | |
|---|------|
| PUBLIC SPACE AS PROTEST SPACE: BETWEEN VISIBILITY AND INSECURITY Neumann Ute | 3346 |
| URBAN REGENERATION AND (OVER) TOURISM IN CHINA: EXPLORING ALTERNATIVE TRACKS IN SUZHOU'S HISTORIC CENTRE Nolf Christian, Wang Yiwen, Liu Mengchuan | 3362 |
| UNBALANCED DEVELOPMENT AND PERIPHERALISATION PROCESSES: A TESTING PHASE TO MAP STUDIES Oppido Stefania, Ragozino Stefania | 3381 |
| THE BUILT ENVIRONMENT AND ACTIVE LIFE-STYLES IN OLDER ADULTS: AN ANALYSIS OF THE LOCATION OF CARE SERVICES IN PORTUGAL Santinha Gonçalo, Wolf Jan, Costa Catarina | 3394 |
| NEGOTIATED PUBLIC: INVESTIGATING THE STREETScape OF BEIJING'S OLD CITY Sun Wenwen | 3400 |
| STUDY ON THE CHARACTERISTICS AND CHANGES OF STREET CULTURAL ATTRIBUTES IN MINGCHENG DISTRICT OF XI'AN Tian Bowen, Lei Yumen | 3408 |
| EXPLORING PORT-CITY RELATIONSHIPS THROUGH EVENT-LED URBAN REGENERATION Tommaschi Enrico | 3423 |
| SPACES FOR TOURISM, VENICE PLANNING TOPOGRAPHIES Velo Luca | 3435 |
| THE IMPACT OF CULTURAL CREATIVE INDUSTRIES AND TOURISM DEVELOPMENT ON THE AUTHENTICITY OF HISTORIC DISTRICT FROM THE PERSPECTIVE OF SPATIAL PRODUCTION: A CASE STUDY OF TIANZIFANG, SHANGHAI Xu Hui | 3444 |
| CHARACTERISTICS IN THE SPACE RESHAPING OF CREATIVE CLUSTER DURING GENTRIFICATION: THE CASE OF TIANZIFANG IN SHANGHAI Yang Yi | 3452 |
| PRIVATIZATION, MARGINALIZATION AND REUSE OF WATERFRONT SPACE IN NEW TOWN - TAKING ZHANGJIANG SCIENCE CITY ZHONGSHI UNIT AS AN EXAMPLE Zhang Shuhan, Zhang Hanghua | 3461 |
| "PRELIMINARY STUDY ON THE RENEWAL STRATEGY OF THE NEW ESTATE FOR WORKERS:FROM THE PERSPECTIVE OF PLACE-MAKING" Zhang Yuwei | 3481 |

PA 17 Urban and Regional economics of transition

| | |
|--|------|
| WOMAN LABOR IN TRANSITION PROCESS FROM AGRICULTURE TO INDUSTRY SECTOR Çetin Reyçan | 3496 |
| IS THERE A HOUSING SHORTAGE? A POST-KEYNESIAN ECONOMICS APPROACH TO THE FINANCIALISATION OF HOUSING IN ENGLAND Grace Richard | 3507 |
| THE ROLE OF TAIWAN'S INDUSTRIAL DIVERSITY IN REGIONAL EMPLOYMENT GROWTH - A COMPARATIVE STUDY ON DIGITAL ECONOMY INDUSTRY AND CULTURAL INNOVATION INDUSTRY Huang Chung-Chun, Lin Cheng-Yi | 3523 |
| FINANCIAL OR SOCIETAL RETURNS? EXPLORING THE AMBIGUOUS ROLE OF INTERMUNICIPAL ENERGY COMPANY FLUVIUS IN THE ENERGY TRANSITION IN FLANDERS Juwet Griet, Deruytter Laura | 3536 |
| EXAMINING THE REGIONAL SPATIAL SPILLOVER EFFECT OF HOUSING PRICE IN TAIWAN - AN APPLICATION OF HOUSING PANEL DATA Chen Yen-Jong, Tuan Pi-Wen, Liang Yung-Han | 3553 |
| USING VALUE-ADDED HIERARCHY METHOD TO ANALYZE INDUSTRIAL SPATIAL PATTERN IN THE BACKGROUND OF ECONOMIC TRANSITION -- A CASE OF GUANZHONG PLAIN URBAN CLUSTER IN CHINA Wang Xueyan, Zhou Yeyuan | 3565 |



Table of Contents

SP 18 Transition histories

| | |
|---|------|
| PROGRESS IN THE NINETEENTH-CENTURY: PLANNING, BUILDING AND MANAGING THE MODERN URBAN INFRASTRUCTURES IN COIMBRA Calmeiro Margarida | 3580 |
| BACK TO THE PAST? TRAM CITY, MOTOPIA AND LIGHT RAIL COMMERCIALISM IN CANBERRA Fischer Karl Friedhelm, Weirick James | 3590 |
| ALBERTO SARTORIS: TRANSITIONS TO A POSSIBLE URBAN UTOPIA (1922-1989) Gavello Cinzia | 3602 |
| TWENTIETH CENTURY TECHNOCRACY - A TRANSITION ABORTED Hebbert Michael | 3613 |
| RE-POSITIONING AFTER THE FALL OF THE GERMAN WALL: WORLD TRADE CENTERS DEVELOPMENT IN CITIES OF THE FORMER GERMAN DEMOCRATIC REPUBLIC: ROSTOCK, DRESDEN AND FRANKFURT (ODER) Leconte Uta | 3627 |
| THE TRANSITION URBAN PLANNING HISTORY OF LISBON METROPOLITAN AREA Marat-Mendes Teresa, Cunha Borges João | 3635 |
| NAPLES IN TRANSITION: A MULTIDIMENSIONAL DECISIONMAKING PROCESS FOR THE NAPLES PORT AREA SUSTAINABLE DEVELOPMENT Cerreta Maria, Regalbutto Stefania | 3656 |
| WHITE REVOLUTION: PLANNING SOFT TRANSITION TO STATE SOCIALISM Zaferani Azadeh | 3669 |

SP 19 Urban tourism, neighbourhood change and social conflicts

| | |
|---|------|
| PLACING SLUMS IN THE GLOBALIZED TOURIST CITY: A PERFORMATIVITY AND ACTOR-NETWORK APPROACH Altamirano Eugenia | 3683 |
| WHOSE HERITAGE? CHALLENGES COMING FROM TURNING CITIES AS TOURIST PLACES Calmeiro Margarida, Gonçalves Adelino | 3698 |

SP 22 Planning and designing green infrastructures

| | |
|--|------|
| GREEN INFRASTRUCTURE: FROM BENEFITS TO PLANNING Alberico Simonetta, Vayr Paola | 3707 |
| THE ANIENE RIVER: A GREEN INFRASTRUCTURE TO SET UP A METROPOLITAN STRATEGY D'Ascanio Romina, Palazzo Anna Laura | 3720 |
| MILTON KEYNES: THE "FOREST CITY" Forget Malaury | 3728 |
| WHEN CONSTRAINTS BECOME ASSETS IN THE DESIGN OF BLUEGREEN INFRASTRUCTURES: AN INSIGHT FROM TWO CASES IN THE WESTERN PART OF FRANCE (LOIRE RIVER BASIN) Fournier Marie, Bonnefond Mathieu | 3741 |
| FARMING IN A CITY WITHOUT FARMLANDS. CADASTRAL MAPPING OF AGRICULTURE IN TURIN AND EARLY ASSESSMENT OF MULTIFUNCTIONALITY VIABILITY Greco Mirko | 3749 |
| LANDSCAPE AND ECOLOGICAL NETWORKS IN URBAN PLANNING: TECHNICAL STANDARDS FOR IMPLEMENTATION La Riccia Luigi | 3771 |



Table of Contents

| | |
|--|-------------|
| NATURE-BASED SOLUTIONS: NEW CHALLENGES FOR URBAN PLANNING Longato Davide, Geneletti Davide | 3785 |
|--|-------------|

| | |
|--|-------------|
| ECOSYSTEM SERVICE EVALUATION FOR LANDSCAPE DESIGN: THE PROJECT OF A RURAL PERI-URBAN PARK AS A NODE OF THE LOCAL GREEN INFRASTRUCTURE Allocco Marco, Murgese Davide, Quaglio Giorgio, Salizzoni Emma | 3793 |
|--|-------------|

SP 23 Land development and management in post-socialist countries

| | |
|--|-------------|
| ÚZEMNÍ PLÁNOVÁNÍ VS. GENERALBEBAUUNGSPLANUNG: A COMPARISON OF PLANNING CONCEPTS AND PRACTICES BETWEEN THE FORMER CZECHOSLOVAKIA AND THE GERMAN DEMOCRATIC REPUBLIC Arzmi Azmah | 3802 |
|--|-------------|

| | |
|--|-------------|
| TOWARDS COMPREHENSIVE AND INTEGRATED LAND MANAGEMENT PRACTICES IN ALBANIA. HOW CAN THE NEW PARADIGMATIC SHIFT IN LAND USE PLANNING AND GROWTH MANAGEMENT FOSTER A POSITIVE IMPACT ON LOCAL FINANCES AND THE TAX BASE? THE CASE OF MUNICIPALITY OF TIRANA. Dhrami Kejt, Imami Fiona | 3818 |
|--|-------------|

| | |
|---|-------------|
| APPLICATION AND VERIFICATION OF MUNICIPAL ADMINISTRATIVE AREAS SPATIAL ZONING MODEL IN NEW TOWN LOCATION SELECTION Zhao Yujing, Leng Hong, Yuan Qing, Sun Pingjun | 3839 |
|---|-------------|

SP 24 Home sharing. short-term rentals affecting local housing markets

| | |
|---|-------------|
| BUILT COMMONS: RECLAIMING THE SHARING ECONOMY Petkova Ioana | 3854 |
|---|-------------|

SP 25 Dynamic change, uncertainty and planning for adaptivity

| | |
|---|-------------|
| SPONTANEOUS LIVING SPACES – DWELLINGS AND SETTLEMENTS IN PEMBA (MOZAMBIQUE) A TYPO-MORPHOLOGICAL ANALYSIS IN CHANGING URBAN ENVIRONMENTS Del Bianco Corinna | 3865 |
|---|-------------|

SP 26 Space, citizenship and identity: the eu-mena region

| | |
|--|-------------|
| THE JERICHO GATE PROJECT: PLANNING CHALLENGES AND POLITICAL STRUGGLES AROUND A MEGAPROJECT IN THE OLDEST CITY IN THE WORLD Isayed Mohammed | 3883 |
|--|-------------|

SP 27 The role of the local in improving cohesion and spatial justice

| | |
|---|-------------|
| THE PLA DE BARRIS: A REMARKABLE CASE OF PLACE-SENSITIVE TERRITORIAL POLICY Peverini Marco | 3898 |
|---|-------------|

| | |
|---|-------------|
| THEMATIC VILLAGES AS THE EXAMPLE OF NEO-ENDOGENOUS LOCAL DEVELOPMENT IN RURAL AREAS Tobiasz-Lis Paulina | 3908 |
|---|-------------|

SP 28 Friendly spaces and mobility for ageing

| | |
|---|-------------|
| ELDERLY PEDESTRIANS, AGED >65 YEARS, DURING WINTERTIME - ATTITUDES TOWARDS WALKING OUTDOORS, SAFETY EQUIPMENT AND EXPERIENCES OF FALLS. A COMPARISON WITH HEALTHY ADULTS. Berggård Glenn | 3921 |
|---|-------------|



Table of Contents

| | |
|---|-------------|
| OLD AGE-RELATED STEREOTYPES, INCLUSION AND THE DEVELOPMENT OF ‘AGE APPROPRIATE’ NEIGHBOURHOODS Fabian Carlo | 3925 |
| FRIENDLY AND ACCESSIBLE PUBLIC SPACES: THE VENETIAN CASE Revellini Rosaria, Tatano Valeria, Condotta Massimiliano | 3934 |
| MOBI-AGE: PROMOTING URBAN MOBILITY IN AGEING POPULATIONS Ribeiro Anabela, Bastos Ana, Brandão Alves Fernando, Cruz Sara, Cunha Inês, Martins João Pedro | 3946 |
| IS ACTIVE AGEING A REALITY FOR LOCAL POLICIES? A DISCUSSION BASED ON THE PORTUGUESE CONTEXT Fernandes Alexandre, Santinha Gonçalo, Diogo Sara, Forte Teresa | 3955 |

SP 29 Emerging spatialities and eu policy instruments: cases and perspectives

| | |
|---|-------------|
| EU URBAN STRATEGIES 2014-2020: EXPLORING THE FUNCTIONAL AREA APPROACH Fioretti Carlotta, Pertoldi Martina | 3966 |
| HOW TO CONNECT FREIGHT LOGISTICS, PERSONS MOBILITY, AND SPATIAL PLANNING IN AND BETWEEN URBAN REGIONS? PERSPECTIVES FROM DIFFERENT EUROPEAN URBAN NODES ON TEN-T CORRIDORS Linszen Raymond, De Bruijn Martijn, Poppeliers Ricardo, Arts Jos | 3980 |
| THE PLA DE BARRIS: A REMARKABLE CASE OF PLACE-SENSITIVE TERRITORIAL POLICY Pezerini Marco | 3992 |

SP 30 Facing migrants exclusionary urban policies

| | |
|--|-------------|
| LANDING: HOW PRACTICES OF TEMPORARY HOSPITALITY CHALLENGE URBAN SPACES AND POLICIES Bovo Martina | 4003 |
| URBAN INCLUSION OF REFUGEES AND VULNERABLE MIGRANTS IN PORTUGAL Leiria Viegas Sílvia | 4014 |

SP 31 Learning loops in the public realm. Enabling social learning in communities to tackle the challenges of cities in transition

| | |
|---|-------------|
| TRANSPPOSITION OF ADVOCACY EXPERIENCE AS TRIPLE-LOOP SOCIAL LEARNING IN ALBANIA: FIGHTING HPPS IN PROTECTED AREAS FROM THE VJOSA RIVER BASIN TO THE CANYONS OF OSUMI Bekteshi Arba, Misho Erinda | 4024 |
| A PARTICIPATORY APPROACH TO SOCIETAL COST BENEFIT ANALYSIS (SCBA) AS A WAY TO START THE DEBATE ON TRANSFORMING RESIDENTIAL SUBDIVISIONS Custers Lieve, Devisch Oswald, Huybrechts Liesbeth | 4035 |
| EVIDENCE-BASED URBAN DEVELOPMENTAL: BEYOND THE URBAN ANECDOTES. THE NEED OF GOING BEYOND ANECDOTAL KNOWLEDGE IN URBAN PLANNING Forsemalm Joakim, Johansson Magnus | 4044 |
| CO-CREATION A WAY OF SUPPORTING DEVELOPMENT OF NEIGHBOURHOODLEVEL TRANSPORT INNOVATIONS Haufe Nadine, Großmann Astrid | 4058 |
| LEARNING THROUGH CO-CREATION: HOW TO SOLVE URBAN PROBLEMS WITH CITIZENS Keseru Imre, Pappers Jesse, Evans James, Astbury Janice, Condotta Massimiliano, Ravetz Joe, Scanagatta Chiara, Macharis Cathy | 4068 |
| PARTICIPATORY SENSING WITHIN CO-CREATION: IMPROVING THE TRANSFORMATION OF THE URBAN ENVIRONMENT. THE VERONA CASE INSIDE THE LOOPER PROJECT Condotta Massimiliano, Scanagatta Chiara, Borga Giovanni, Ruggeri Paolo, De Maria Michela, Peron Fabio | 4083 |



SP 32 Planning and biodiversity

| | |
|--|-------------|
| SOIL ECOSYSTEM SERVICES ASSESSMENT TO SUPPORT LAND USE PLANNING - APPLICATIONS IN ITALY AND A REFLECTION FOR THE FUTURE | 4102 |
| Assennato Francesca, Strollo Andrea, D'Antona Marco, De Fioravante Paolo, Cavalli Alice, Munafò Michele | |

| | |
|--|-------------|
| SPATIAL PLANNING IN VIEW OF NEW CHALLENGES: LAND TAKE AND SOME EVIDENCE FROM GREECE | 4115 |
| Thoidou Elisavet, Foutakis Dimitris | |

SP 34 Spatial tensions: urban microgeographies for changing cities

| | |
|---|-------------|
| MOTIONLESS MOVEMENT - THE BRAZILIAN URBAN CRISIS FROM THE CREATION OF THE MINISTRY OF CITIES TO THE GREAT PROTESTS OF 2013 | 4127 |
| Andrés Roberto | |

| | |
|--|-------------|
| FEAR AND SEGREGATION: ANXIETY BEYOND THE GATED COMMUNITIES. THE COSTA RICAN CASE. | 4139 |
| Barrantes Chaves Karla | |

| | |
|--|-------------|
| LOFTS DISTRICTS IN MILAN. OVERLAPPING TENSIONS BETWEEN USES AND REGULATIONS. INSTRUMENTS FOR URBAN AND ARCHITECTURAL DESIGN | 4147 |
| D'Armento Stefano | |

| | |
|--|-------------|
| DESIGN EXPERIMENTATION IN A CONTEXT OF CULTURAL DIVISION: THE CASE OF AHMEDABAD | 4159 |
| Gualdrini Giovanni | |

| | |
|--|-------------|
| RESISTING GENTRIFICATION. SOCIO-SPATIAL DYNAMICS OF THREE WORK PLACES IN BRUSSELS | 4172 |
| Lenna Verena, Martin Sanchez Luis Antonio | |

| | |
|--|-------------|
| URBAN CRISIS STORYTELLING: IDIOMS AND FORMS OF CITY'S EQUILIBRIUM INTEGRATING THE UNCERTAINTY | 4185 |
| Pietropaoli Martina | |

SP 36 Acsp-aesop special session: learning from Arnstein's ladder: from citizen participation to public engagement

| | |
|--|-------------|
| ENGAGING NON-CITIZENS IN AN AGE OF UNCERTAINTY: LESSONS FROM IMMIGRANT-SERVING NONPROFITS IN LOS ANGELES COUNTY | 4196 |
| Lee C. Aujean | |

| | |
|--|-------------|
| CITIZEN PARTICIPATION IN TRANSITIONAL SOCIETY: AN EVOLUTION OF PARTICIPATORY PLANNING IN SERBIA | 4218 |
| Peric Ana | |

SP 37 Smart cities and regions informing the energy transition

| | |
|--|-------------|
| THE NOTION OF SOCIOTECHNICAL SYSTEM IN THE PLANNING PROCESS OF A SMART REGION | 4234 |
| Balest Jessica, Garegnani Giulia, Pisani Elena, Secco Laura, Vettorato Daniele | |

| | |
|--|-------------|
| SPATIAL-BASED SCENARIO ANALYSIS FOR THE SMART ENERGY TRANSITION | 4242 |
| D'Alonzo Valentina, Vettorato Daniele, Zambelli Pietro | |

| | |
|--|-------------|
| THE ENERGY JUSTICE TOOL SUITE: AN INTERDISCIPLINARY AND COMPREHENSIVE METHOD FOR ENERGY TRANSITION TERRITORIALIZATION | 4250 |
| Henriot Carine, Artis Amélie, Molines Nathalie, Seigneuret Natacha, Antaluca Eduard, Lamarque Fabien, Martin Ewa | |



Table of Contents

| | |
|---|-------------|
| SMART ENERGY TRANSITION: EVALUATION OF CITIES IN SOUTH KOREA | 4261 |
| Lim Yirang, Edelenbos Jurian, Gianoli Alberto | |
| REVIEW OF DISTRICT HEATING SYSTEMS IN ITALY FOR FUTURE ENHANCEMENT | 4278 |
| Teso Lorenzo, Dalla Mora Tiziano, Romagnoni Piercarlo, Gasparella Andrea | |

SP 38 Maritime spatial planning (msp) in europe: challenges in transition

| | |
|--|-------------|
| CONCEPTUAL APPROACHES OF MARITIME SPATIAL PLANNING. PRINCIPLES AND PLANNING PARAMETERS | 4295 |
| Rampavila Mary, Avgerinou – Kolonias Sophia | |
| MANAGEMENT PLANS OF NATURA 2000 SITES AND COASTAL LAND USE PLANS: A STUDY CONCERNING AN INTEGRATED APPROACH TO MANAGEMENT OF COASTAL ZONES IN THE SULCIS AREA (SARDINIA, ITALY) | 4305 |
| Leone Federica, Zoppi Corrado | |

SP 39 Shrinking cities and sustainability

| | |
|---|-------------|
| DIALECTICAL UNDERSTANDING ON URBAN SHRINKAGE AND GROWTH IN CHINA: TAKING THE OLD INDUSTRIAL BASE CITIES IN NORTHEASTERN CHINA AS AN EXAMPLE | 4316 |
| Hu Qimin, Yang Fan | |
| A STUDY ON CHINA'S COUNTY SPORTS CENTER PLANNING STRATEGY FROM SMART SHRINKAGE PERSPECTIVE | 4329 |
| liang Bin, Wang Yang | |
| DEINDUSTRIALIZATION AND URBAN SHRINKAGE. ACHIEVING URBAN SUSTAINABILITY IN FORMER INDUSTRIAL CITIES IN FRANCE: THE CASE STUDIES OF NANTES AND SAINT-OUEN | 4338 |
| Toura Varvara | |
| DISCUSSION ON THE FACTORS OF SUSTAINABLE URBAN GROWTH IN SHRINKING REGION: CASE STUDY OF EUCALYPTUS HILLS IN THE CITY OF SAKURA DEVELOPED BY THE PRIVATE DEVELOPER YAMAMAN | 4357 |
| Uemura Tetsuji | |
| TIME SERIES OF URBAN SHRINKAGE ELEMENTS IN COALEXHAUSTED CITIES: A CASE STUDY OF TWO TYPICAL CITIES IN NORTHEAST CHINA | 4380 |
| Zhang Jie, Zhao Zhiqing, Li Peilun | |

SP 40 Regional design: impacts on territorial governance and planning practice

| | |
|---|-------------|
| FUELLING ENERGY-TRANSITION WITH REGIONAL DESIGN-ATELIERS | 4393 |
| Kempenaar Annet, Pleijte Marcel, Van Buuren Michael | |
| LAND TAKE AND REGIONAL PLANNING: PROMOTING SUSTAINABLE SETTLEMENT DEVELOPMENT IN URBAN REGIONS | 4400 |
| Wahrhusen Nina | |
| REGIONAL STRATEGY DESIGN – ADDRESSING TRANSFORMATIONS IN MULTIPLE WAYS | 4410 |
| Wirth Timo Matti | |

SP 41 The darker sides of smart city development

| | |
|---|-------------|
| DIGITAL PARTICIPATORY PLANNING TOOLS HELPFUL SIDE AND SIDE EFFECTS | 4430 |
| Shahin Anas | |



PA13

Healthy City Planning: Food, Physical Activity and Social Justice

Shaping cities for health to contrast the effects of climate change: the CCHURE proposal

Rosalba D'Onofrio¹, Ilaria Odoguardi², Elio Trusiani³

¹University of Camerino, rosalba.donofrio@unicam.it

²University of Camerino, ilaria.odoguardi@unicam.it

³University of Camerino, elio.trusiani@unicam.it

Abstract: Regenerating the existing city and placing health at the center of policies, plans, and projects represents an effect response to contrast the effects of climate change that impact cities and the health of inhabitants. Convinced of this need/opportunity are the World Health Organization (WHO), eminent international researchers, and public administration representatives in many European cities. However, a consolidated "silo approach", which is common to the sectors of scientific research and public administration, does not allow common objectives to be defined, especially in small-medium cities, or integrated design proposals to be formulated. The CCUHRE Research (Climate change and urban health resilience) aims to define a transdisciplinary methodology to evaluate the effects that climate change produces on urban health, to direct policies for adaptation/mitigation through the contribution of many scientific disciplines, interaction with municipalities and local health agencies, and the involvement of local communities. This will be done with the support of new IoT (Internet of Things) technologies and mobile crowdsensing techniques in order to expand knowledge to measure/assess the effects of climate change on health, to involve communities in designing shared plans for development, to empower them when dealing with urban health and wellbeing, and to support public administrations in making decisions.

Keywords: Urban regeneration; urban health and climate change; community participation; IoT and crowdsensing;

1. Introduction

Climate change is often addressed in terms of risk for infrastructures, energy reliability, and ecological concern. Growing evidence shows that the impacts on people's health/well-being are also urgent. The report "Healthy as the Pulse of the New Urban Agenda" (World Organizations Health, WHO 2016) introduced the idea of urban health resilience as the need to promote resilient urban policies to reduce the risk of climate change with respect to human health. The Fifth and Sixth Ministerial Conferences on Environment and Health from 2010 and 2017 declared their commitment to protect health and well-being, natural resources, and ecosystems; and to promote health equity, health security and healthy environments in a changing climate. The commitments made at these two conferences were the result of research activities in recent years (Patz *et al.* 2000; McMichael, 2002; Confalonieri *et al.* 2007; Barata *et al.*, 2011; Smith KR *et al.*, 2014; Watts *et al.*, 2015) and calls by international bodies (IPCC, 2013; WHO, 2015; etc.). All of these studies agree that cities are exposed to the greatest risks, both due to the effects of climate change (Ispra, 2014) and for the social imbalances that these effects can generate (UN-HABITAT,2010; Hughes BB, Kuhn R, Peterson CM, *et al.*2011).

The European "Health 2020" strategy recognizes the important leadership role of cities in developing health urban policies. Reorganizing the existing city by placing health at the center of policies for

urban regeneration represents an answer to contrast the effects of climate change as it impacts cities and the health of inhabitants. Many researchers from different disciplines are convinced of this, although they are accustomed to a silo approach that does not permit common objectives to be defined (e.g., the 2013 “Helsinki Statement” on “Health in all policies”).

Medical science alone is insufficient to address the theme of social and environmental determinants of health, which are explicitly present in the WHO's vision of health (WHO, 1948). Other disciplines must be involved, those dealing with the places where most people live: the cities (Urban Age Hong Kongdel 2011/London School of Economics and Political Science). First among these disciplines is urban planning and design, which is called to respond to the needs of health in cities, in delivering health improvements through reshaping the urban fabric of cities, in the creation of new healthy urban environments, in the sustainable organization of mobility, land use, and green areas. These principles were reiterated by the WHO through the UCL–Lancet Commission of 2012 and the Healthy City Europe Movement (VI Phase 2014- 2018: theme: “creating resilient communities and supportive environments”), in close relation with one of the priorities in the European Health 2020 Strategy. Some research has begun in this field in Europe (UK/ Barton, Tsourou), America (Corburn at UC Berkeley, Columbia University, Mailman School of Public Health), Canada (Canadian Urban Environmental Health Research Consortium-Canue, McGill School of Urban Planning), and Australia (RMIT University, Melbourne with NHMRC Centre of Research Excellence in Healthy Liveable Communities directed by Giles-Corti). In current research, there is a strong focus on the neighborhood scale, which is the most appropriate for involving communities in designing/creating environments favorable to health (D’Onofrio, Trusiani, 2018). London, Rotterdam, Copenhagen, Bratislava, and Almada are being activated with climate-change adaptation plans, beginning to make use of the new information technologies of sensors and mobile apps to monitor phenomena such as the urban heat island (Rotterdam), traffic, atmospheric pollution and respiratory illnesses (Barcelona), the effects of atmospheric precipitation, etc.

What emerges is the need to break down disciplinary fences in research and among the different sectors of public administration; expand knowledge to measure/assess the effects of climate change on health; and involve communities, empowering them with respect to health. Sustainable, low-cost tools to monitor health equity on the local scale are essential to make decisions, allocate resources, and guide interventions for transformations/adaptation (Vlahov D, *et al.* 2011). One aid may come from the Urban Internet of Things (IoT), low-cost technologies capable of real-time collection of information to understand the complex interactions among the urban ecosystem, climate change, the health of inhabitants, and social conditions (Yick, Mukherjee and Ghosal 2008, Kontokosta *et al.* 2016).

2. Materials and Methods

The CCHURE (Climate change and urban health resilience) Research¹ intends to take up the

¹ CCHURE is a research funded in 2018 by the University of Camerino. The members of the group are researchers from different subject areas of the University and some Italian and international researchers. Research UNIT 1: Rosalba D’Onofrio School of Architecture and Design - UNICAM (Italy); Michele Talia School of Architecture and Design - UNICAM (Italy); Chiara Camaioni School of Architecture and Design - UNICAM (Italy); Ilaria Odoguardi PhD Student School of Advanced Studies - UNICAM (Italy);

challenges mentioned above in a transdisciplinary approach, with greater knowledge of the impacts through new technologies, involving local populations in identifying the needs of health and co-designing their neighborhoods.

The research, in particular, aims to define a methodology to evaluate the effects that climate change produces on urban health, to direct policies for adaptation/mitigation through the contribution of many scientific disciplines (urban planning, architecture, medical science, computer science, social science, legal science), the interaction with municipalities and local health agencies, and the involvement of local communities with the support of the new IoT (Internet of Things) technologies and mobile crowdsensing techniques.

A small-medium size city of 50,000 inhabitants, Ascoli Piceno, was chosen for the research as being representative of small and medium European cities with greater criticalities due to the lack of qualitative and quantitative data on the risks for health and the lack of sufficient economic resources. The field of comparison is the neighborhood, where the local community is most present and participatory, specifically the Monticelli Quarter (Figure 1). In addition to involving researchers from different disciplines, CCUHRE also involves local entities, neighborhood associations, local health agencies, and experts. It aims to identify a working method that can be exported to other cities in which traditional means of gathering information on health, the environment, and their interrelationships are combined with collection via IoT devices and mobile crowdsensing techniques. Citizens are called to intervene in the process of gathering data, identifying/resolving problems, and building design hypotheses.

Research UNIT 2: Iolanda Grappasonni School of Pharmacy and Health Products - UNICAM (Italy); Costa Giuseppe University of Turin (Italy); Piera Di Martino School of Pharmacy and Health Products - UNICAM (Italy); Tatiana Guarnieri School of Law - UNICAM (Italy); Barbara Fenni School of Law - UNICAM (Italy);

Research UNIT 3: Diletta Romana Cacciagrano Researcher School of Science and Technology - UNICAM (Italy); Leonardo Mostarda School of Science and Technology - UNICAM (Italy); Fabio Pagnotta PhD Student School of Advanced Studies - UNICAM (Italy); GianMarco Mazzante PhD student School of Advanced Studies - UNICAM (Italy); Graziano Enzo Marchesani PhD student School of Advanced Studies - UNICAM (Italy); Franco Raimondi Full Prof Middlesex University London (UK) Professor of Computer Science; Marta Magagnini School of Architecture and Design - UNICAM (Italy);

Research UNIT 4: Roberto Ruggiero School of Architecture and Design - UNICAM (Italy); Roberta Cocci Grifoni School of Architecture and Design - UNICAM (Italy); Francesca Giofrè La Sapienza - Rome (Italy); Zoran Djukanovic Associate Professor University of Belgrade (Serbia) Professor in "Participatory Urban Design"; Luca Bradini School of Architecture and Design - UNICAM (Italy); Maria Federica Ottone School of Architecture and Design - UNICAM (Italy); Mariano Pierantozzi School of Architecture and Design - UNICAM (Italy); Ingrid Gomes Braga Researcher State University of Maranhão - UEMA (Brazil) Professor in Sustainable Architecture Component;

Research UNIT 5: Elio Trusiani School of Architecture and Design - UNICAM (Italy); Enrica Petrucci School of Architecture and Design - UNICAM (Italy); Gerardo Doti School of Architecture and Design - UNICAM (Italy); George Zillante University of Adelaide - Australia Head of the School of Architecture; Katharine Bartsch University of Adelaide; Maurizio Piccioni Director of the territorial structure sector City of Ascoli Piceno (Italy); Remo Appignanese UOC Director, Clinical governance and risk management ASUR Marche - Area Vasta 5 Ascoli Piceno-San Benedetto del Tronto (Italy); Benedetta Raffaella Ruggeri Medical director ASUR MARCHE - Area Vasta 5; Lina Maria Calandra Associate University of L'Aquila (Italy); Andrew Rundle Associate Professor Columbia University - New York (USA) Co-director of the Built environment and Health Research Group Epidemiology;





Figure 1. View of the Monticelli neighborhood; Source: Raniero Carloni

3.1 Features of the Monticelli district

The Monticelli quarter is one of the most populous in the city of Ascoli Piceno, with about 10,000 inhabitants. It is located only a few kilometers from the historical center, but “... you can’t get to Monticelli on foot”, as the local news reported a few years ago. Until the beginning of the 1970s, the land where the quarter is located was practically open country. In 1972, the city was endowed with its first local plan. This called for linear development along the east-west expanse of the city and defined a broad area to the east of the city (Monticelli) where the greatest residential volumes, built new, would be concentrated, in order to house 21,600 inhabitants (compared to the roughly 75,000 inhabitants expected in the entire municipal territory for the year 1975). It was quickly realized that the forecast for an increase in population from 50,000 to about 75,000 inhabitants was entirely unlikely, and that the nucleus of expansion in Monticelli was oversized in relation to the effective demographic trends. Despite this, the city administration proceeded to partially realize the housing and main roads as established by the plan. This was done in consideration of the fact that the earthquake of 1972 had caused serious damage to the building heritage in the historical center, with the consequent abandonment of uninhabitable buildings and the fact that the zones for social housing in Monticelli could take advantage of significant economic subsidies. Today, the quarter contains the hospital, a supermarket, offices, various types of shops, two churches, and, until a short time ago, a fast-food restaurant. Today, for most of Ascoli Piceno’s residents, Monticelli is simply a dormitory, a quarter situated between a road axis and the Tronto River, a small town in and of itself with respect to the rest of the city of Ascoli Piceno (Figure 2). The quarter lacks infrastructure and equipped green areas, it lacks meeting points and places that identify the quarter, and some residential buildings are degraded. The city news reports stories of drug addiction, aggression, and accidents due to dangerous cross traffic — both on the central axis and the internal streets — smog, and noise. Despite this, there are signs of liveliness and action by the local population in the presence of sports associations, social gardens, and a very busy senior center. Attention for the quarter has re-emerged in recent years

following urban regeneration projects financed with national public funds and local interest holders, such as the Neighborhood Contract 2 – Extraordinary Program for Peripheries (Contratto di Quartiere 2- il Programma Straordinario per le Periferie-PRASI), which establishes a budget of €86 million, of which €18 million is financed by the State with some interventions on the roads, green areas, and degraded buildings.



Figure 2. View of the Monticelli neighbourhood; Source: Raniero Carloni

3.2 Objectives and products expected

CCUHRE, in particular, proposes to:

1) Build a methodology to investigate the relationships between the impacts of climate change and the health/well-being of inhabitants on the urban scale of the neighborhood, which contributes to selecting actions and combinations of actions for mitigation and adaptation with citizens' active role.

Outputs:

a) Climate and Health Profile (CHP): to construct the neighborhood CHP, reference will be made to qualitative/quantitative indicators that assess the effects of climate change on the health and well-being of the population. These indicators will be selected based on existing public health data, as products of international research, and with the contribution of inhabitants by administering questionnaires and activating focus groups.

b) Climate and Health Actions (CHA): the selection of actions and combinations of actions for adaptation and mitigation, already present in international best practices, with reference to the "fundamental themes" of urban design — land use, mobility, housing, open spaces, and meeting spaces, the natural environment — and some themes of technological design — temporariness and flexibility, etc.

2) Proposing a methodology for public administration to select scenarios for adaptation to/mitigation of the effects of climate change, through the use of real-time analytics and data feedback mechanisms and non-instrumental interaction with local communities. Outputs:

a) Climate Health Lab (CHL): construction of a platform of sensors and automation technologies (Urban Internet of Things, IoT), which will provide real-time information/measurement of the physical/environmental conditions of the neighborhood and its inhabitants. This platform will be implemented with citizen contribution through the use of mobile crowdsensing techniques, which will allow smart-phone users to interact with IoT devices.

With the CHL, it will be possible to:

- analyze and assess the difference between subjective and objective measurements of quality-of-life indicators to understand how the perception of different environmental conditions varies across the neighborhood;
- verify and compare, with the help of researchers, technicians, and citizens, the "health" performance of the scenarios identified and their evolution in time, thereby assisting public administrations in the decision-making process.

The research objectives will be measurable: 1) in the number of citizens involved in the experimentation in the field and in the focus groups; 2) in the number of planning proposals for adaptation/mitigation that will be designed with the support of IoT technologies and citizens and from which the administration can choose based on the quarter's needs.

3.3 The current phase and the next steps of research

The research started at the beginning of 2019 with the presentation of the theme and objectives to the local community. Up to date, the research group is involved in construction of the methodology to investigate the relationships between the impacts of climate change and the health/well-being of inhabitants on the urban scale of the neighborhood, which will help to select actions and combinations of actions for mitigation and adaptation with citizens' active role. At the base of this methodology there is an approach that foresees the fundamental involvement of the community and the preparation of preliminary data with particular reference to: a) The construction of the Community Health Profile and b) the identification of Climate-Health Actions.

In order to construct a meaningful Community Health Profile and the consequent Climate-Health Actions, some indicators were highlighted to assess the families' quality of life in the Monticelli district. The indicators have been grouped together in a questionnaire; It has been distributed to families, intercepting an average age range between 30 and 55 years, with the help of primary school in the neighbourhood. The questionnaire is organized in 9 sections: demographic data, area where the family lives, security, accessibility to services, social cohesion in the neighbourhood, daily travel, characteristics of the dwelling, quality of life in the dwelling, outdoors.

Simultaneously and in close collaboration with ASUR (Regional Healthcare Company), for a complete and significant construction of the Health Profile is begun the administration of the PASSI questionnaires (Progress of Health Services for Health in Italy). Promoted and financed since 2006 by the Italian Ministry of Health, this questionnaire aims to carry out a full-scale monitoring of the population's health status. The administration of the questionnaire is in progress; it was being

administered on a sample of 250 people in the neighborhood and it gathers information on lifestyle and behavioural risk factors of the Italian adult population (18-69 years) related to the occurrence of non-communicable chronic diseases. Among the many topics investigated by PASSI are: smoking; physical activity; obesity; excessive weight, cardiovascular risk, state of physical and psychological well-being, and other aspects related to quality of life related to health.

From the results that will emerge from the administration of these two questionnaires, the Community Health Profile will be drawn up, which will allow to the research group to select indicators that will assess the possible impacts of climate change on the inhabitants' health and well-being of the neighborhood. Moreover, these additional indicators, selected by international literature and with the citizens' contribution, will be administered within focus groups and through the contribution of new information technologies. Simultaneously, it will be conducted a survey of best practices, that many European and world cities have and are promoting, which link urban plans and projects with the objective of combating climate change and health impacts. The fields of investigation to carry out this survey will cover: *Housing and buildings; Neighbourhoods; Social environments; Connectivity, density and land use mix; Accessibility, amenities and decision-making processes; Greenspace, etc.*

To simplify this activity, a reconnaissance of the district was carried out through the analysis of the planning tools in use, and then specifically considering: demographic data, urban standards, organized for green areas (type of green areas surveyed, type of green areas of public utility, etc.) (Figure 3); services (primary services, parking areas, commercial activity, etc.) (Figure 4); mobility structure (pedestrian path's survey, bicycle lane's path, bus routes, etc.) (Figure 5). Starting from the end of 2019, the next steps will concern the activities described in the previous paragraph.

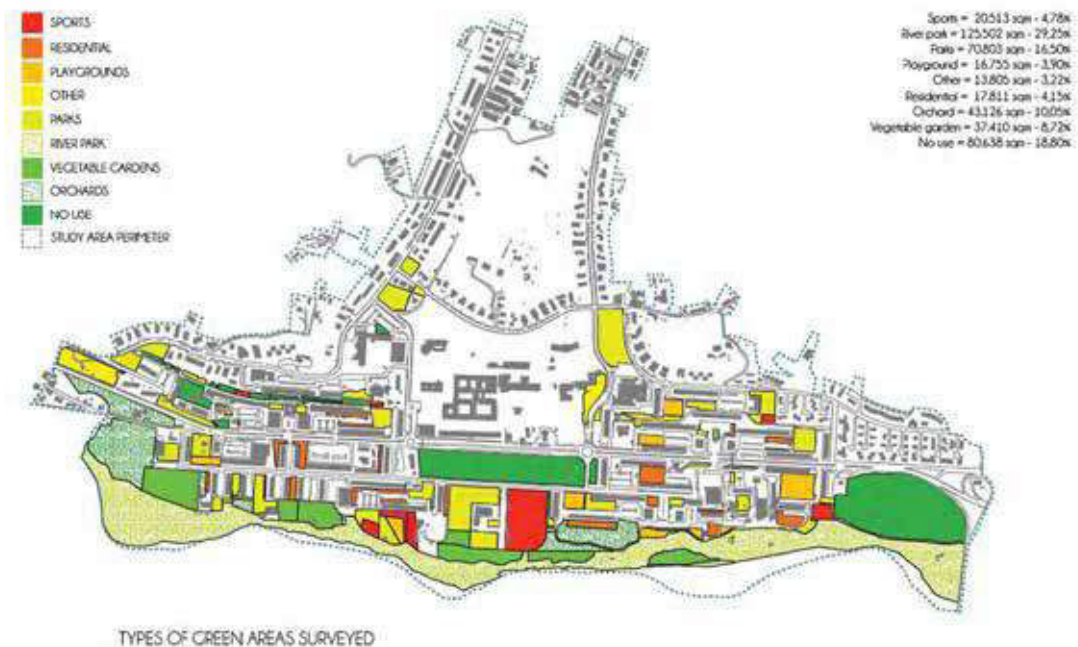


Figure 3. Types of green areas surveyed in Monticelli neighbourhood. Source: Search results

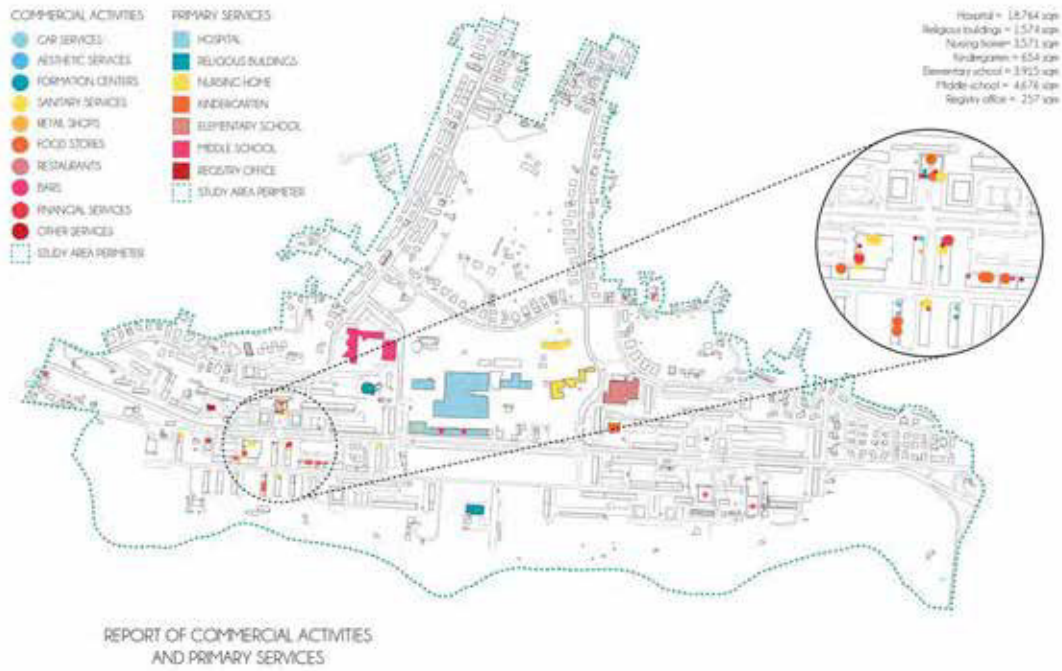


Figure 4. Report of commercial activities and primary services in Monticelli neighbourhood. Source: Search results

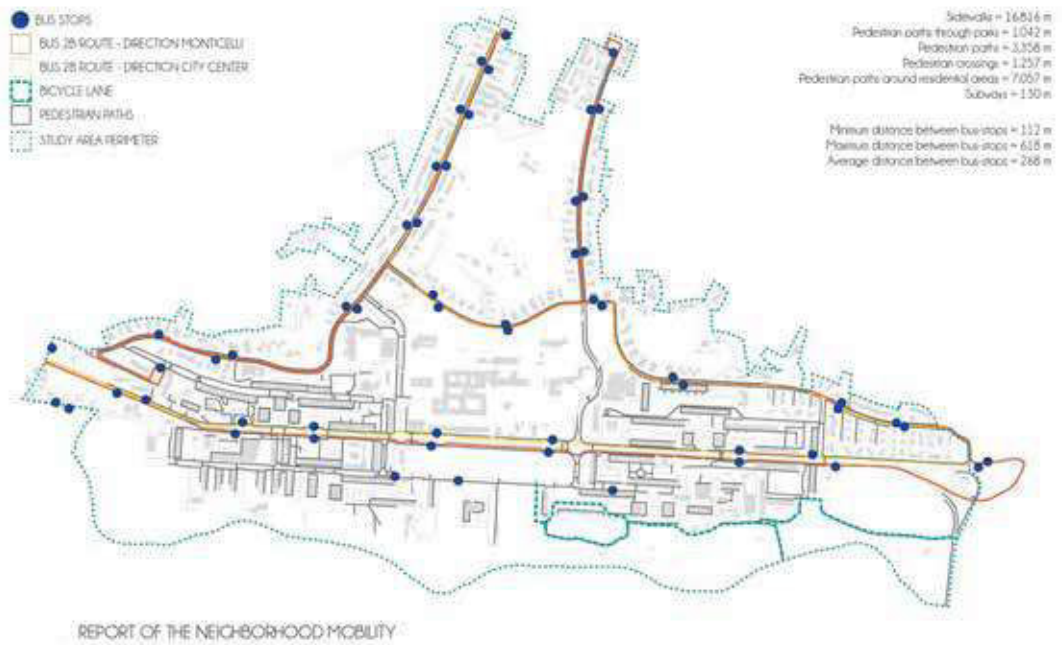


Figure 5. Report of the Monticelli neighbourhood mobility. Source: Search results

4. Conclusions

The innovation of CCUHRE regards the possibility of beginning a system of knowledge shared between the public administration, scientific community, and local community to assess projects and plans for mitigation of and adaptation to climate change and to choose the most advantageous in terms of their effects on health. This will occur through the use of IoT technologies and low-cost mobile crowdsensing. The results of CCUHRE will impact the research in the field of urban health in two ways: 1) the front-line participation of interested populations confers validity and concreteness on the research and the assessment of policies and the plans for adaptation to and mitigation of climate change, maximizing the impact of the solutions identified; 2) going beyond the concept of "urban design" guided by a top-down approach, which is strongly debated today, towards "human centred design" focusing on the knowledge of individual behavior, collaboration with the community, which makes use of contributions from various disciplines and the use of modern IoT technologies.

Citizens become providers and assessors of data regarding health and well-being, simulators and evaluators of scenarios for mitigation and adaptation, joining in the design of their living environments at risk due to climate change. This will favour:

- dialogue among the public administration, citizens, and researchers;
- citizens' participation and awareness regarding city governance/decision-making;
- an understanding of the need/opportunity to adopt an integrated, transdisciplinary approach, the only one capable of responding to the complexity of the effects of climate on health in urban areas;
- the fundamental role of the "urban project" in ensuring "equitable" access to health.

In imagining recourse to a methodology centred on people's knowledge of their living environment and the contribution that they can make in evaluating the quality of the mitigation and adaptation projects it is essential to earn their trust. It is therefore necessary to dialogue and establish collaborative relationships between citizens and the public administration by sharing information and ensuring:

- a) quality control of the data collected (which should be made known to the interested parties (ref. website of reference) and made available on an appropriate level of aggregation);
- b) assessments of mitigation and adaptation scenarios should occur through direct interaction between experts, technicians in the public administration, and citizens.

References

Barata, M., E. Ligeti, G. De Simone, T. Dickinson, D. Jack, J. Penney, M. Rahman, R. Zimmerman (2011), "Climate change and human health in cities". In C. Rosenzweig, W. D. Solecki, S. A. Hammer, S. Mehrotra, Eds., *Climate Change and Cities: First Assessment Report of the Urban Climate Change Research Network*, Cambridge University Press, Cambridge, UK.

Confalonieri, U., *et al.* (2007), "Human Health". In: Parry, M.L., Canziani, O.F., Palutikof, J.P., van der Linden, P.J. and Hanson, C.E., Eds., *Climate Change 2007: Impacts, Adaptation and*

Vulnerability, Contribution of Working Group II to the Fourth Assessment Report of the Intergovernmental Panel on Climate Change, Cambridge, 391-431.

D'Onofrio R., Trusiani E. (2018), *Urban Planning for Healthy European Cities*, Springer, Switzerland.

Hughes BB, Kuhn R, Peterson CM, Rothman DS, Solórzano JR, Mathers CD, Dickson JR.(2011) “Projections of global health outcomes from 2005 to 2060 using the International Futures integrated forecasting model”. *Bull World Health Organ.* 2011 Jul 1;89(7):478-86. doi: 10.2471/BLT.10.083766.

IPCC (2013), *Climate Change 2013: The Physical Science Basis. Contribution of Working Group I to the Fifth Assessment Report of the Intergovernmental Panel on Climate Change*, ed. by Stocker, T.F., D. Qin, G.-K. *et al.*, Cambridge University Press. New York.

Ispra (2014), *Gli indicatori del clima in Italia*
http://www.isprambiente.gov.it/files/pubblicazioni/statoambiente/SA_57_15_Indicatori_clima_2014.pdf

Yick, J., Mukherjee, B. and Ghosal, D. (2008), “Wireless Sensor Network Survey”. In: *Computer Networks*, 52, 2292-2330. <http://dx.doi.org/10.1016/j.comnet.2008.04.002>

McMichael AJ (2002), “Population, environment, disease, and survival: past patterns, uncertain futures”. *Lancet*, 2002 Mar 30;359(9312):1145-8. DOI:10.1016/S0140-6736(02)08164-3.

Patz JA, Graczyk TK, Geller N, Vittor AY. (2000), “Effects of environmental change on emerging parasitic diseases”, *Int J Parasitol* 30:1395–1405.

Smith, K.R., A. Woodward, D. Campbell-Lendrum, D.D. Chadee, Y. Honda, Q. Liu, J.M. Olwoch, B. Revich, and R. Sauerborn (2014), “Human health: impacts, adaptation, and co-benefits”. In: *Climate Change 2014: Impacts, Adaptation, and Vulnerability. Part A: Global and Sectoral Aspects. Contribution of Working Group II to the Fifth Assessment Report of the Intergovernmental Panel on Climate Change*. https://www.ipcc.ch/site/assets/uploads/2018/02/WGIIAR5-Chap11_FINAL.pdf

UN-HABITAT (2011), *UN-HABITAT annual report 2010*, <https://unhabitat.org/un-habitat-annual-report-2010/>

Vlahov D, *et al.* (2011), “Roundtable on Urban Living Environment Research (RULER)” *Journal of Urban Health*. 2011;88(5):793–857. doi: 10.1007/s11524-011-9613-2.

World Health Organization (WHO) (1948), *Constitution of the World Health Organization: Basic Document*, Geneva.

World Health Organization (WHO) (2015), *Climate and health country profiles - 2015a global overview*.
https://www.who.int/globalchange/resources/country-profiles/climatechange_global_overview.pdf

World Health Organization (WHO) (2016), *Health as the pulse of the new urban agenda: United Nations conference on housing and sustainable urban development, Quito*. In <https://www.who.int/phe/publications/urban-health/en/>

Watts N., Adger W.N., Agnolucci P., Blackstock J., Byass P., Cai W., Cox P.M. (2015), “Health and climate change: policy responses to protect public health”, *Lancet*, 386 (10006) (2015), pp. 1861-1914

Kontokosta C. (2016), “The Quantified Community and Neighborhood Labs: A Framework for Computational Urban Science and Civic Technology Innovation”, *Journal of Urban Technology*. Volume 23, 2016 - Issue 4.





aesop2019.eu