WHERE CITY AND TERRITORY MEET...

16.th-17.th September 2021

SYMPOSIUM PROCEEDINGS

Content

Where city and territory meet...

Crises have influenced the formation of urbanism as a discipline, just as much as they have had effects on the development of different urbanistic movements. The current situation once again has confronted us with the fragility of our built environments - and thereby has evoked calls for a rethinking of the goals and means of urbanism.
In face of immense social and ecological challenges, one can already observe a much-needed change in approach. Ever more projects become increasingly rooted in their wider environment; taking into account ecological systems of resources as well as attempting to tackle issues of equity and social responsibility without being confined to an ecological answer.
Such projects are not limited to a single place defined by the confinements of the property but situate the project site within a wider area connected to socio-ecological systems and their metabolism. Project sites can be transformed in such way, as to participate in larger systems or even strengthen them. Such projects go beyond goals of economic progress, modernity, and technology to put emphasis on well-being, ecology, and social inclusion. This notion of urban design proposes prosperity as a goal, a concept that allows much less use of resources and offers more social equity. In short: A project which integrates ecological and social issues without seeing any contradiction between them becomes what we call a territorial project. It signifies a reconceptualization of urbanism's goals and means.
Rethinking the discipline in such way, however, is not necessarily how contemporary urban planning and design are playing out.

How, then, does the territorial project manifest in the actual design of our built environment? Taking current and historic urban and rural projects as a base to move beyond a reconsideration of the profession's fundamental goals and means, this online symposium invites theoretical, practical, methodological and empirical contributions that look at how the ongoing societal discourse manifests in space. We understand projects both as the medium and outcome of an amalgam of influences, be they of ecological, economic, cultural, social or political nature.

... AT THE FRINGE

THE GARDENS OF PUURS,

A VILLAGE URBANISM FOR FLANDERS

Author(s): Ward VERBAKEL*, masterplan by plusoffice architects - DELVA landscape and urbanism

Contact e-mail address: ward.verbakel@kuleuven.be

Institution: KU Leuven, dept. Architecture and Urbanism, Kasteelpark Arenberg 1, 3001 Leuven, Belgium, ward.verbakel@kuleuven.be

Keywords: #village #transitional #urbanism #

PROJECT details:

Masterplan Gardens of Puurs

Designed by plusoffice architects (BE) and DELVA Landscape and Urbanism (NL)

Location: Puurs, Belgium

Dates: invited competition 2014, masterplan 2014-2015, phase 1 construction: 2016-2018, phase 2 construction: 2019-2021, phase 3 construction planned for 2022.

THE GARDENS OF PUURS, A VILLAGE URBANISM FOR FLANDERS

Since the beginning of the century, the ratio apartments/single family homes in non-urban areas is growing faster than the evolution in urban areas of Flanders. This leads to an acceleration in building activity in villages and settlement fragments throughout the country side of Flanders. This dynamic presents us with both potential and challenge, as to the urban context it produces, especially in the light of other spatial challenges such as mobility transition, climate change and flood control and the creation of lively neighborhoods.

For one of those urbanizing village, through an Open Call competition in 2014, the municipality of Puurs -St-Amands formulated the ambition to transform its village center into a qualitative and attractive place to live. The winning masterplan concept 'The gardens of Puurs' by Plusoffice architects and Delva landscape architects answers with a concept that merges public space structure and gardens as the backbone for an alternative development attitude.

The small village does not benefit from a conception of public space taken from urban renewal or classic urbanism. One cannot solve the whole village with interventions that focus on singular exceptional spaces such as the redesign of main street, paved plaza's, commercial centers and event squares. Even though projects of this nature implemented during the early 2000s have been instrumental in strengthening the core of Puurs, the recipe falls short when continuing to look at adjacent neighborhoods and infill projects that don't present the same intensity or program mix. In order to accommodate the every-day, the village also needs a relaxed, possibly less mineral tactic which feels familiar and 'village-like' to many of the residents. Urban development tailored to the needs of the small village does not avoid densification and development as such, but in our view requires another public space concept and perhaps another sort of collectivity. The realm of gardens operates in the masterplans as the guiding image - an important tool for guiding the aspirations of a community in transition processes (Chombart 1964) - and offers us a collective space model that is not focused on intensity but thrives on occasional use, seasonal cycles and informal encounters.

Figure 1. Masterplan overview of the future Puurs' garden network and associated development

Business as usual in the development of Flanders villages would mean further petrifaction of the existing horizontal logic, through a densification of individual lots and the transformation of small paths and roads in to ever more urban streets and plaza's. That city in the making, negates the hybrid dispersed characteristics of the existing village in which landscape fragments, gardens and agricultural parcellation coexist with the typical mobility axis's and centers. With the sustainable objectives of the Flanders Spatial Policy Plan in mind, the demand for a less horizontal development tailored to the village scale is at the centre of our approach. The masterplan concept 'Gardens of Puurs' addressed this through a spatial language of gardens instead of streets and squares. It grafts green and intimate, sometimes even informal spaces with a cultural and social dimension onto the network of alleys and paths, often going back to the agricultural settlement patterns. The densification process should follow a development logic in which the garden is the first step of a project: each new development should add a specific garden to the village. The new village square thus becomes a publicly accessible green space, multifamily housing includes a collective garden, a small park emerges behind some existing houses, an inner block parking lot becomes a collective village garden, a social infill project adds a neighborhood garden, public services reintroduce a lost monastery garden as the public heart of the center, and so on. The gardens differ in scale, type and accessibility, but together they form a fabric: a green garden passage through the village. That is why the gardens - just like streets and squares - are named, so that they become part of the collective memory.

Dating back to medieval times, the urbanism of Flanders due to its fertile lands consists of a closely-knit network of towns and villages. It is why the villages in Flanders for most parts are never far from the amenities and economies of larger cities. De Meulder summarizes this hybrid urban- rural context as follows: 'The country of Belgium as a whole came to function as a phantom metropolis. It has all the features of a metropolis, both functionally and quantitative, an accumulation of innumerable differences – apart from the density and congestion that typify a real metropolis' (De Meulder 1999). Many of these rural fragments and villages continue to urbanize, some more drastic than others, but predominantly growing. The masterplan for Puurs originated precisely from this point, trying to formulate what such village densification can look like and how individual projects can help to strengthen larger spatial structure. The struggle between keeping the qualities that constitutes the village as such, while allowing for transformation and new development to insert itself, can be used to reinforce and even create new qualities in the somewhat loose urbanism of the village and its rural underlying settlement patterns. Following the discourse of the horizontal metropole as developed by Viganò, this masterplan concept embraces the horizontal and dispersed nature of the territory as a potential asset, not only as a problem (Viganò 2018).

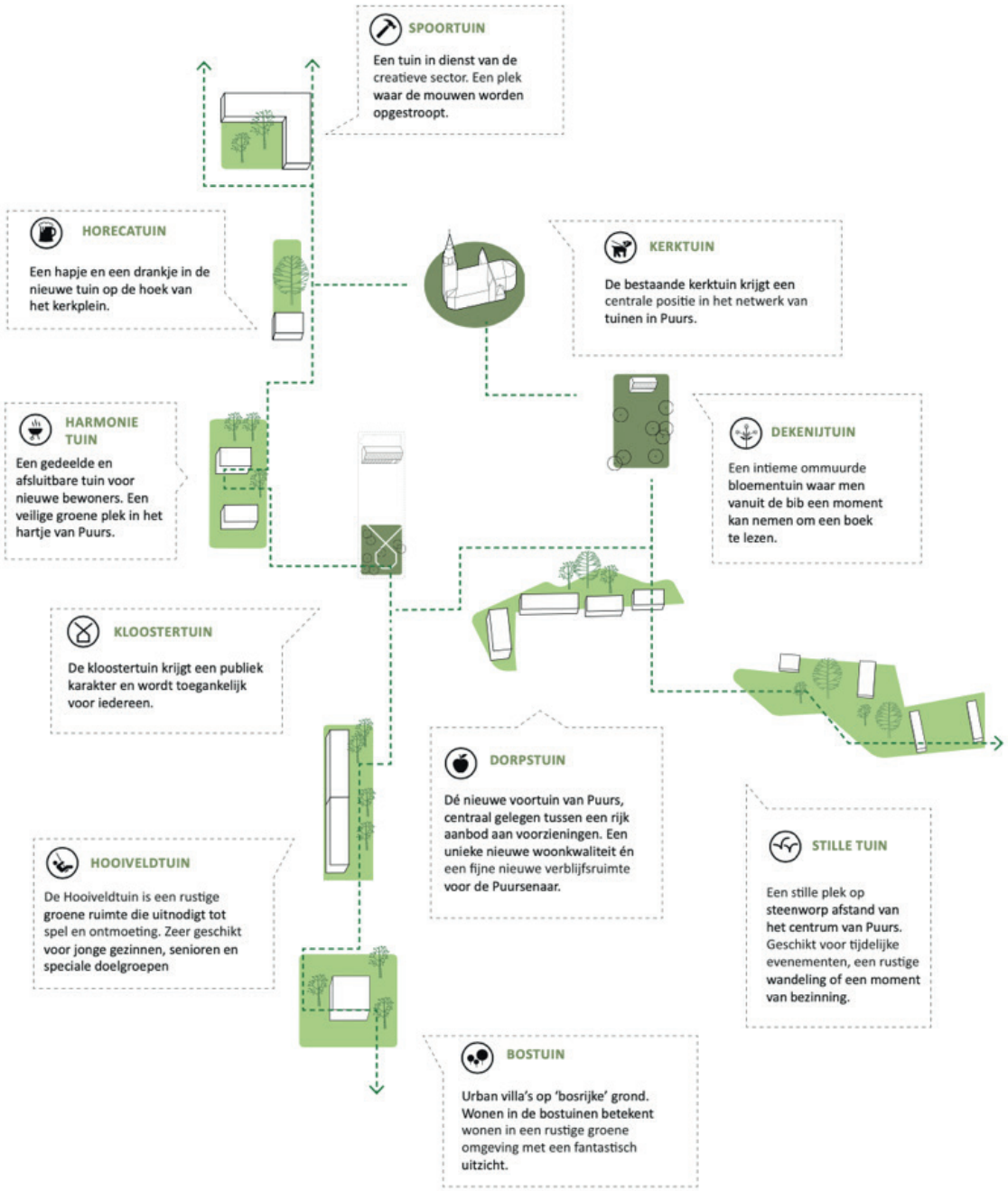


Figure 2. Gardens of Puurs public space network

This is no exclusive Flemish evolution. Throughout Europe rural areas are being urbanized and the associated challenges become part of the professional debate as most recently demonstrated at the Polish Pavilion with the contribution 'Trouble in Paradise' during the 17th international architectural biennale Venice (2021). Understanding that rural urbanizing areas produce most of their wealth outside the agricultural sector, Kajdanek argues for a new paradigm to understand the ongoing transformation as a multifunctional development of rural areas (Kajdanek 2020).

Figure 3. Future view of the Hondsmarkt / Figure 4. Future view of the Kloostertuin and SJABI school extension

By choosing the gardens as a structuring design principle, on the one hand, but also by considering the collective gardens as social space, the masterplan formulates a new type of garden suburb. The qualities of the village, such as its proximity to the open landscape, the individual gardens, and the fine grain of the architectural articulation were translated in this masterplan in order to allow the village to absorb the densification and urbanization processes as it is taking place without losing its aspiration to remain village-like. This striving for village like qualities is often approach from the lens of architectural form. In the practice of Plusoffice architects, several instruments have been developed to help guide the discussion on what constitutes village architecture. Beyond the traditional versus modern juxtaposition, these instruments focus on specific qualities and the strategies used to respond both to the surrounding and the challenges that need to be addressed (collective dimension, mobility transition, climate adaptation…). While important to acknowledge as a major part of qualitative village development, architecture as such is not at the heart of this specific masterplan. This presentation focusses on the urban strategies of what a village urbanism can be.

According to the urban designers and authors of the masterplan, the potential for another urbanism grafted on the village and its gardens holds great potential for addressing the challenges that lie ahead. Concerns such as permaculture, self-sufficiency and agroecology, as Marot points lead to the productive garden and its technology as a substructure of new-settlements. (Marot 2020). And this goes for other concerns such as water scarcity (rain gardens), urban heath island mitigation (shade and permeable soils) and social inclusion (commons). In that light the garden-village concept as explored and tested in The Gardens of Puurs offers new paths to another more resilient urbanism.

Figure 5. restored Kloostertuin garden shared by SJABI school and renovated cultural center.

Figure 6. New passage Harmoniepad with garden and renovated cultural center

References:

Chombart de Lauwe, P-H 1964, 'Aspirations, images guides et transformations sociales', Revue française de sociologie, vol. 5, no. 2, pp. 180-192.

De Meulder, B 1999, 'Patching up the Belgian Urban Landscape', Oase, no.52, pp. 78-113.

Kajdanek, K 2020, 'From the Milky Way's Point of View, We All Seem to Be from a Village (Loesje)' in Mazan, W 2020, Trouble in Paradise, Zacheta – national Gallery of Art, Warsaw, pp. 52-67.

Marot, S 2020, Taking the Country's Side: Agriculture and Architecture, Lisbon Architecture Trienale, Polígrafa & Monade, Lisbon.

Viganò, P, et alt.2018, The Horizontal Metropolis between Urbanism and Urbanization, Springer, Cham.

RE-THINKING URBAN EDGE AND GROWTH OF THE CITY: SKOPJE'S NORTH-EAST PERIURBAN FRINGE

Author(s): Slobodan VELEVSKI, Marija MANO VELEVSKA, Elena ANDONOVA*, Irena MILOJESKA

Contact e-mail address: elenaandonova9@gmail.com

Institution: University Ss. Cyril & Methodius, Faculty of Architecture, Boulevard Partizanski Odredi 24, 1000 Skopje, North Macedonia, dekanat@arh.ukim.edu.mk

Keywords: edge, periurban, growth, landscape, social

Rapid urbanization, processes of globalization, and neoliberal reality contribute to omnipresent socio-spatial disturbances and inequities. Our research-by-design project takes this dimension as a key element of urbanity which includes concentration, proximity, and overlapping of different subjects and realities of the urban environment. This is most evident at the very edges of the city where intra-urban differences occur, and furthermore confront the fragile and yet resourceful constraints of the natural environment. Therefore, the development of the city fringe in this research is observed as a test-bed for contemporary cityness. It is no longer a question of *if*, but a question of *how* can we equip the edge in order to handle the overflow, as reasonably and consciously as not to transform these zones in mere containers, but to instigate authentic models of urbanity capable of forming socioeconomic and cultural connections within the narrative of the ecological urbanism.

The current state of the periurban zones of the city of Skopje is a fragmented patchwork of isolated developments inserted into existing peripheral settlements and agricultural land, furthermore strained on account of the urban sprawl. The last thirty years of Skopje's development are marked by a seemingly never-ending transition, a process in which the city begrudgingly had to adjust to new complexities and scenarios due to political and economic shifts. The transition from a socialist to a post-socialist system has made the urban planning field unbalanced in terms of distribution of participatory powers, integration and interdisciplinary approaches. The societal shift led to privatization of land property that encouraged market pressure to evolve in frivolous urban planning processes that could not be controlled by weak municipal administration especially characteristic for the peripheral edges of the city. The current state led to a deterioration of the quality of life and the built environment marked by (over)densification of the city and continuous sprawl of its immediate surroundings, creating disparity between urban and rural areas, as well as between cities' inner parts and their edges.

This discrepancy calls for urban strategies for healing Skopje's territory based on the combination of creative economy, participatory approach, and specific architectural interventions turning urban conflicts, social potential, and spatial capacities into opportunities. Responding to the transformative specifics of urbanity in conditions of continuous quantitative change, our research project is testing growth through the potential of the collective realm of urbanity as a dialectical amalgam capable to bridge public and private interests within metropolitan territory, thus making the city a political act of the urban collective.

The methodological approach addressing these problems is divided into three categories: First, the category of *scale* that overlaps the urban and architectural realm, combining architectural gestures and spatial cut-outs with various possibilities of contemporary urban experience; second, the

theoretical references that extend the limits of possibilities and perceptions, exploring temporality as a contemporary condition embedded in metropolitan program and speciality (like urban concepts of Japanese Metabolism perceiving the city as a living organism which expands and retracts, heals and regrows, etc.); and *third*, the architectural ideas that introduce spatial and programmatic scenarios of concentrated urban development, used primarily as a communication tool that aims to establish a relationship between built and unbuilt, centre and periphery, city and countryside.

Figure 1. Neometabolism masterprogramme, north-east edge of Skopje

As an outcome of this research, two complementary proposals for management of periurban zones emerge. Both proposals focus on the social infrastructures and the productive landscape as main program and design objectives.

The first proposal defines urbanity as a modus vivendi in three perspectives:
- a physical structure, as technological and ecological order;
- a social system of institutions that enhance patterns of social behaviours;
- a collection of ideas engaged in typical forms of collectiveness.

This proposal employs the three conventional spheres of everyday life (home, work, leisure) and combines them in an alternative model that explores the qualities of quotidian life. It takes off from the very notion of urban living and the urban performance, accentuating its polyvalence and the

overlapping of these spheres into a unique model as opposed to conventional typologies and homogenous zoning. The turbulences undermining the conventional housing, the hegemony of the nuclear family, and the private ownerships are a call for a radical overturn on the question of habitation. Additionally, the rise of new modes of employment has weakened the traditional workspace, blurring the borders between home and work. Therefore, co-living and co-working can be more than a temporary ''easyfix'' and can offer solutions based on togetherness and solidarity.

The second proposal introduces new forms of settlements that exist between the 'alternative rurality' and 'alternative urbanity'. In this new context, dealing with the natural and artificial state in a non-dualistic and symmetrical manner, a creation of new communities is achievable: natural, material, and socio-political constructions of general interest. The proposal sets a system where the landscape serves as an infrastructure that can withstand the occurring urban and environmental challenges, such as:

- the prevention of uncontrolled urban and rural extensions by natural barriers;
- reviving productivity of the landscape and biodiversity and maintaining the same condition in the future;
- clear interpolation of border as liminal condition that separates city and countryside by establishing dichotomy between both.

This system integrates the unplanned urban expansion and a bio-corridor connecting several ecosystems, and creates a landscape apparatus that catalyses processes of urban regeneration. Ecosystems are activated and reactivated forming a new social, technological, and agrarian fabric with extensive periurban patterns. It adjusts various energy inputs, preserves and produces new ecological and cultural specificity of the periurban territories, and improves relationship between the built and natural environment.

Taking into account current migration trends of urban dwellers and urban sprawl tendencies, the periurban territory is one of the major assets of future urban planning. By abandoning classical zoning, conventional typologies of living, working and commuting, the strive towards the collective rather than the individual and using the natural as a driver of the community, these proposals are apparatuses that bring the urban experience at the city's edge.

... ALONG THE CORRIDOR

THE SPACE BETWEEN CITY AND SUBURBIA

SUBURBAN CONNECTIVITY AND ITS LOCAL CONSEQUENCES

Author(s): Dipl.-Ing. Catherine Papst

Contact e-mail address: papstcatherine@gmail.com

Institution: Oslo School of Architecture and Design, Maridalsveien 29, 0175 Oslo

Keywords: New B70, infrastructure, expropriation, suburbia

This contribution for the symposium follows the dispute of construction of the new B70 road. It analyses the influence of infrastructure on local community and its future.

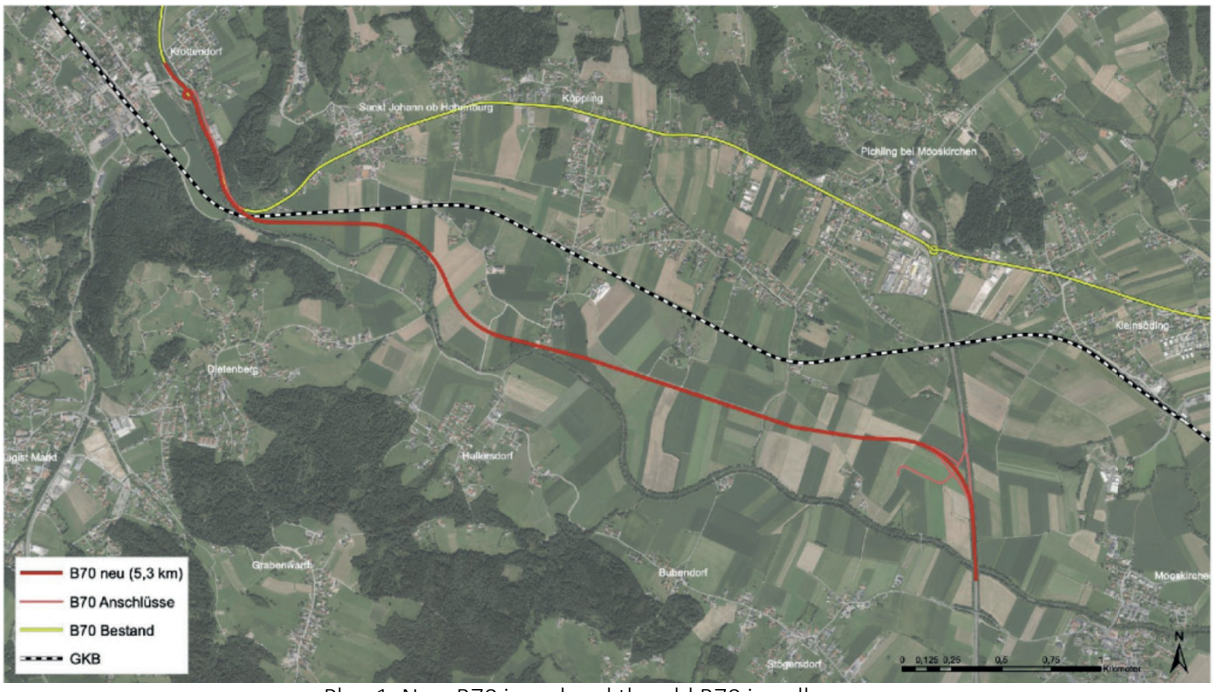
Summery:
Since 40 years the bypass road to the A2 from Köflach to Mooskirchen is in the planning and making. Now just the part in-between Krottendorf and Mooskirchen is needed to complete the project, with the goal to offer a direct and fast connection from Köflach to Graz.

The new road should relieve the existing B70 from the commuter traffic and the trucks that frequent the current road. About 18,000 cars travel daily on the road. The 60 families that have their houses alongside the road in St. Johann and Köppling are facing heavy traffic, air and noise pollution. With the new road traffic is said to reduce to 7,000 cars a day, which might help the families to safely live with the road.

Furthermore, the project should be a possibility for a fast connection to Voitsberg and attract businesses, commuters and investors into the city, which is currently declining in population. More and more young people choose to live in the close periphery of Graz.

A lot of hopes are placed on the construction of the last 5,3 km of asphalt, that complete the new bypass road. Construction should start in the year 2023, with the allocated budget of approximately 55 Million Euro.

(The Land Steiermark has made a visualisation of the new B70 road. That illustrate the project in closer detail: https://viiww.youtube.comiwatch?v=CidnA2PCak9E)



Plan 1. New B70 in red and the old B70 in yellow

The project currently faces many critics and difficulties

A signature list against the project has just been submitted with 1200 signatures. The issue is clear, the road will cut through the existing farmland which is used by 20 farmers who depend on their land to make a living. During the construction about 40 ha of farmland will be turned over and the farmers will face difficulties in accessing their land during construction and after completion.

Furthermore one family has to make way for the road and relocate its home.

The road will pass alongside the river Kainach which is currently a local recreation area with various vegetation and animal life which would have to be rehabilitated during the building process.

The farmers also worry about the water level of the Kainach and that the new road would increase the risk of flooding their land.


Picture 2. Locals protest against the new road

Picture 3. protest with tractors

The contra-movement criticizing that the project is not up to date and that the money for the project should be relocated into developing the existing public transport.

What is the space between city and suburbia?

The project raises many questions that need to be addressed in an urban context:

1. What is the space between the city and suburbia?
2. Is their space for farmland in suburban agglomeration?
3. Can the expropriation of people for new infrastructure be justified?

"The land in not a given commodity; it results from various processes".[1]
André Corboz

The territory is constantly changing by its own definition. It is the sum of its spacial qualities, it's history, implemented structures, as well as its social identities.
Infrastructure like the new B70 expands territories and changes its definition. He discussion focus on what these spaces aspire to be.

1. What is the space between the city and suburbia?

Communities around Graz like Söding-St.Johann experience population growth, but just a fraction of the people living in these communities also work there. They are growing together with bigger agglomerations and integrate themselves into a bigger urban system and identity.

2. Is their space for farmland in suburban agglomeration?

Answering the question is walking a fine line. Agricultural farmland need conditions to be profitable for the farmers. In the case of the new B70 the access to the land and its quality is compromised even though the footprint of the road on the individual parcels is small.

The dispute, of the B70, asks for validation of two identities. Farms with their fields and building typology have a rooted history in the area. But through the dispute, they are placed in a position, in which the farmers need to justify their land claim. The quality of farming is being evaluated, whether it is ecological farming or monoculture. Exercises like that try to objective asses the worth of the land. But the complexity is rooted in the history of land, which has been handed down through generations.

There is a need to define a frame work in which farmland can exist. This requires a planing for future urban projects decades ahead and to work with possible future scenarios for local centres like Voitsberg with integration of farmland. Which will be further explained in the Symposium.

For the symposium visual material in the form of maps will illustrating the current situation of land use along the B70.

3. Can the expropriation of people for new infrastructure be justified?

When does financial compensation turn to expropriation? Due to the noise and air pollution one farmer can not live at his home anymore and the planed crossing over the new B70 leads through his courtyard. This leads back to the question of identity.

The discussion needs to be elevated into a bigger picture. Cities like Voitsberg are facing a constant decline in their population and they see faster roads to Graz as a future for the cities to survive. The symposium is a platform to generate a collective discussion about urban infrastructure and its impact on local communities.

Personal position and involvement

I am myself from the region and see how the traffic is a constant discussion and divides the community. As urban planners we can see developments in a context and shine light on points that elevates the discussion from personal perspectives.

On the example of the B70 we see how infrastructure of an expanding city is intersecting with the lives of local individuals. It is not a discussion about two streets but the value of urban connectivity in comprehension to local quality of live.

Presentation

For the Symposium will be a presentation with a summary of the problematic and history of the project. The current state of the project and its consequences. Comparison to other suburban developments will be made and their developments.

Presentation:

https://www.verkehr.steiermark.at/cms/ziel/162761645/DE/
https://www.verwaltung.steiermark.at/cms/list/5166747/DE/?c=101-&limit=J&hits=10&sort=0&typ=7%2C8%2C9%2C10%2C11%2C20&topstyle=N&qu=b70#result
https://www.meinbezirk.at/voitsberg/c-locals/die-kainachnahe-terasse-ist-schon-tot a4599815#gallery=null

1 Corboz Andre, (1983). The Land/Territory as Palimpsest. Translated from the French by R. Scott Walker to English

images

1. Land Steiermark, Übersichtsplan. Available at:
https://www.verkehr.steiermark.at/cms/ziel/161872717/DE/

2. & 3. Alma, H. (2021). Available at:
https://www.meinbezirk.at/voitsberg/c-locals/die-kainachnahe-terasse-ist-schon-tot a4599815#gallery=null

BOULEVARD PERIPHERIQUE: FROM CITY FRONTIER TO METROPOLITAIN LINK

Author: DI Johannes Bernsteiner

Contact e-mail address: johannes@bernsteiner.com

Institution: TU Graz Institut für Städtebau
Rechbauerstraße 12/II, 8010 Graz, Austria

Keywords: City Limit, Banlieue, Right to the City, Urban Regeneration, New Imaginaries

Evers since its creation, the Paris ring road, or *Boulevard Périphérique*, has been an object of debate. Built in the 1970s, it marks the summit of modernism and the symbol of a car-oriented society. Today, the *Périph* is associated with traffic jams and its neighbors and drivers suffer from its disruptive factors. With a length of 35km, it is a rare example of a ring road in the urban center of a world metropolis. Due to its accessibility and high capacity, it attracts heavy traffic: With 1.1 million vehicles per day it is the busiest highway in Europe. As a result, it generates air and noise pollution which constitutes a major public health and environmental problem.

Besides, the Boulevard Périphérique overlaps with the administrative boundary of the city of Paris and thus represents a special case. The history of this highway is that of a border that still echoes the historical city walls of Paris. If the city can be understood as a palimpsest in which the structures of power are inscribed, what is the significance of this city boundary? The ring road represents a clear separation between an inside (*intramuros*) and an outside (*extramuros*), with a highly charged representation of a social hierarchy. This relationship of domination clearly shows the organization and spatialization of capitalism at the metropolitan level.

The hypothesis of this research is that the Parisian ring road constitutes the contemporary equivalent of the former city fortifications. While the ancient city walls of Paris have been absorbed and integrated with the continuous extension of the Parisian territory, this is not the case for the last city wall that was eventually replaced with the construction of the Boulevard Périphérique. This circular highway materializes the current administrative limit of the city of Paris and embodies the centralized image of the French capital in an already centralized country. Its constant flow of cars creates a continuous physical barrier that in turn creates an urban fracture.

If we compare the density of the crossing points of the ring road with that of the penultimate city wall *Fermiers-Généraux* located around 1km closer to the center, we can clearly see that the degree of permeability of the current Parisian city limit is significantly lower. The former frontier function of the *Fermiers-Généraux* has disappeared, its urban footprint has been replaced by a new transport infrastructure (above-ground metro line), while the former city gates have become important urban squares. On the contrary, crossing the Boulevard Périphérique is extremely difficult for pedestrians and cyclists, let alone for people with reduced mobility, and the former gates are today characterized by neglected squares, road interchanges and wastelands.

This research shows that, besides being an administrative and physical barrier, the Boulevard Périphérique also constitutes a strong social barrier, especially between Paris and the poor municipalities in the North. The almost continuous viaduct in the northern part of the ring evokes the medieval image of the formerly erased city wall. Also, there is a clear disparity in terms of property prices. The average price for an apartment is up to 47% higher in a district located on the Parisian side of the Boulevard Périphérique compared to its neighbouring district located just on the other side of the ring road. Thus, the ring road manifests a social border as much as a physical one.

Figure 1. Le Boulevard Périphérique © Johannes Bernsteiner

This socio-economic inequality can also be observed on the level of the city gates, or *portes*, that grant access to the city. Along the wealthy districts of Paris, the Boulevard Périphérique is either completely underground or sunken into the ground with wide bridges that allow for easy if not unconscious crossing. On the contrary, the Boulevard Périphérique runs aboveground in the northern part along the traditional working-class districts, resulting in dark and smelly underpasses that are the most unpleasing option of crossing the highway. Despite the fact that most people do not cross the border on foot anyway, this unequal access to the French capital can be considered as opposed to the "Right to the City" formulated by Lefebvre in 1968.

How can we tear down this symbolic and physical barrier? This work argues that the abolition of the current city limit is the logical step in the historical continuity of the expansion of Paris. Furthermore, it claims that the ring road should not be seen as a solitary urban fragment, but rather as an integral part of a more complex urban system that is inscribed in the city belt of Paris. A close reading of that system reveals that we can imagine the border not as a constraint, but as the place of possibilities. Thus, the ring road becomes an excellent experimental laboratory for a new metropolitan vision of the future. By investigating historical implications as well as current developments, this research makes an important contribution in the debate over the transformation and urban integration of the Boulevard Périphérique in the future metropolis of Grand Paris.

References:

APUR. 2019-2021. "Ateliers du Boulevard Périphérique" Paris: Atelier parisien d'urbanisme.

Bernsteiner, Johannes. 2019. "Boulevard Olympique. Paris 2024." Diploma Thesis. Graz: Institut für Städtebau.

Beyret, Nicolas, et al. 2021. "Le Boulevard Périphérique : Quel Avenir ?" Paris: archicity.

Cohen, Jean-Louis, and André Lortie. 2021. "Des fortifs au périf : Paris, les seuils de la ville." Paris: Pavillon de l'Arsenal.

Vaughan, Laura. 2018. "Mapping Society. The Spatial Dimensions of Social Cartography." London: UCL Press.

RECONNECTING FRAGMENTED DISTRICTS IN PERIPHERAL AUTOMOTIVE INFRASTRUCTURE LANDSCAPES: THE CASE CITÉ VERSAILLES

Author(s): Raf ILSBROEKX*, Maarten VAN ACKER

Contact e-mail address: raf.ilsbroekx@uantwerpen.be

Institution: University of Antwerp, Faculty of Design Sciences, Mutsaardstraat 31, 2000 Antwerp, Belgium

Keywords: automotive, infrastructure, peripheral, landscape, photography

The 20th century automotive city planning discourse has transformed and rescaled our cities drastically, resulting in, on the one hand, urban infrastructure landscapes composed by an ambiguous heritage of monofunctional automotive infrastructure spaces and, on the other hand, car-scaled networks and isolated districts in the peripheral fringe of the city. Although since the beginning of the 21th century, urban planners and policy makers have largely emphasised the reintegration of inner-city districts (e.g. pedestrianisation and greening of city centres), the peripheral districts and their specific problems remained significantly under-represented on the agenda. However, today an increased awareness and sense of urgency for interventions in the peripheral districts is noticeable. Moreover, today the emphasis is turning from merely tackling specific spatial challenges (e.g. infrastructure barriers) and social problems (e.g. warn-out high rise housing units, high [youth] unemployment rates) in the fringe, towards creating genuine connections by combining social and ecological perspectives on these sites since a large number of scholars have appointed the specific qualities of these peripheral fringes (e.g. high biodiversity, open space opportunities). Hence, the focus of this paper is specifically on the reintegration of isolated districts in historically planned peripheral automotive landscapes, thereby explicitly pursuing social and ecological benefits. The social housing district of *Cité Versailles* in Brussels serves as a case study.

Cité Versailles, a 1960s planned peripheral automotive district, is characterised by high-rise social housing units in a green environment and situated in the fringe of the Brussels Capital Region, where urban meets rural, in a 'rurban' (Vanempten, 2009, pp. 201-212) condition. However, *Cité Versailles* is generally perceived as an isolated 'island', pinned within the urban and institutional context of the city of Brussels, dealing with several urban problems, though located at the borders of the rural landscape of the Flanders Region, and in addition neighbouring, and morphologically contrasting with, the village identity of Neder-over-Heembeek. Although recently the fringe of Brussels has been the specific subject of intense spatial research (Mabilde et al, 2016; De Block et al, 2018, pp. 81-94), a more interdisciplinary approach encompassing its mobility (or lack of) and its automotive infrastructure landscape, its genesis and its contemporary social and ecological potential remains lacking today. Consequently, the research questions in this paper are formulated as follows: (i) What lessons can be learned by a historical and contemporary visual reading of *Cité Versailles' automotive infrastructure landscape,* relevant for future interventions in this specific site and in general for comparable peripheral 'rurban' districts? (ii) (In what ways) can corridor-based interventions and adaptive reuse of infrastructure contribute to a reintegration of this isolated 'rurban' district? The applied methodology combines two research traditions: firstly, the historic and contemporary context of the site are scrutinised by literature overview and visual analysis, mainly through photographic approaches (Pauwels, 2015). Thereafter, redesign scenarios are explored through research by design, supervised by the authors of this paper and

elaborated by Master students in Architecture at the authors' university during two semesters. The European Union's funded research project 'URBiNAT' served as a conceptual, analytical and methodological framework for this second part of the research.

The visual analysis of the genesis of *Cité Versailles* firstly uncovered that this 1960s planned project was foreseen to cover a significantly larger area (i.e. *Quartier Versailles*) than merely the currently known and actually built *Cité Versailles*. *Figure 1* shows two views on the model of *Quartier Versailles*, as exposed at the *41st International Exposition of Brussels* in 1968, under the (then) futuristic title: '*Brussel 1985'*. Today, 53 years after its public exposition, the project's initial intentions seem not readable in the built urban tissue of Neder-over-Heembeek. Moreover, this vast project *Quartier Versailles* followed the logics of a 'step-by-step plan', of which eventually only *Cité Versailles* and the *Versailleslaan* where built, resulting in an incomplete, dysfunctional and unintegrated project.

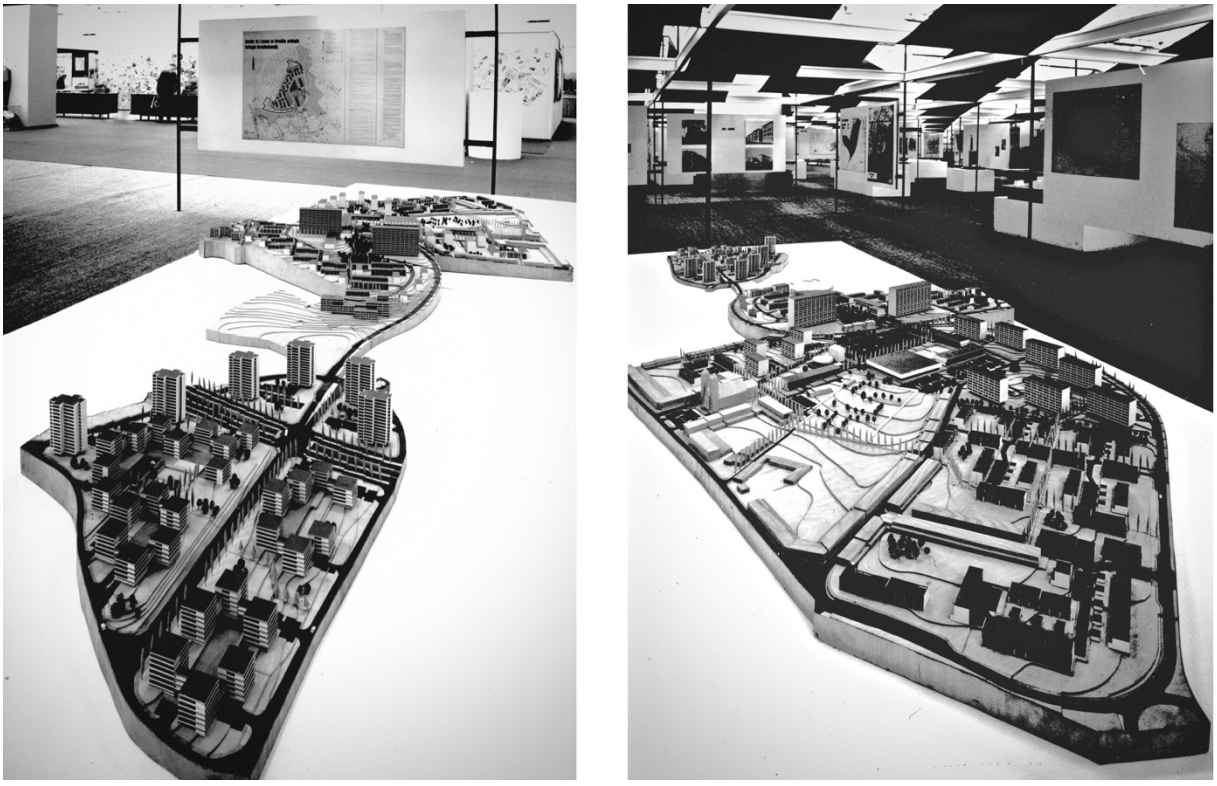


Figure 1. Juxtaposition of two viewpoints of the exposition hall of the *41st International Exposition of Brussels*, held between 20 April - 1 May 1968, displaying the *Quartier Versailles* model as planned by *Architectes et Urbanistes Associés* (A.U.A.); photos © Archives of the city of Brussels

Furthermore, *Figure 1* also shows that *Cité Versailles* was planned to be structured around a cross-sectional urban highway, which was eventually decided not to be built in 1976, and which also (partly) declares the specific location of the highest towers of the plan. However, today the residual space of this non-built highway is explicitly readable in the undefined vast green space in the middle of the *Cité Versailles* 'island'. Today, its vacant footprint is partly appropriated by *Cité Versailles*' inhabitants as a semi-public space, though not inviting for genuine public use or passage. In addition, the model uncovered a fine-meshed network of active mobility corridors, structured as pathways of cypresses-alike lanes, which were never built. Moreover, the mismatch between spatial and institutional boundaries has contributed to an ambiguous collection of dead-end streets and informal pathways, thereby creating a neighbourhood lacking genuine public passage, resulting in a perception of unsafety. The second part of the research, research by design, challenged and confronted the architecture students with their familiar notions of space and time and with the specific difficulties of (re)designing in this fragmented fringe context, where typical landscape design concepts such as topography and horizons (Corajoud, 2000, pp. 37-50) become more articulated, and can turn into leading design instruments. However, the 'rurban' canvas as well as the automotive residues (e.g. desolated

underground car parks) proved their particular potentials during this exploration. Furthermore, this design exploration has shown that outstepping the institutional boundaries of the Brussels Capital Region, by creating and re-establishing interregional corridors (e.g. for agricultural and recreational uses, active mobility paths, nature-based solutions), could enlarge the potential for this fringe area significantly. Moreover, both regions could benefit by interregional projects, thereby creating synergies between various scales and contexts, not in the least since the never-built urban highway has left an historic anomalous mark, still explicitly readable on both regions' territories, approximately half a century after its abolishment decision

Acknowledgements

The authors of this extended abstract are members of the URBiNAT project which received funding from the European Union's Horizon H2020 research and innovation programme under grant agreement N° 776783. The concepts and conclusions presented in this contribution reflect the authors' views only.

References

Vanempten, E. (2009) 'Challenging Urbanism. The rurban reality of the Brussels metropolitan area.' In De Meulder, B., Ryckewaert, M. and Shannon, K. (eds.), *5th International PhD Seminar – Urbanism & Urbanization – Leuven 1-3 October 2009. Transcending the discipline – Urbanism & Urbanization as receptors of multiple practices, discourses and realities, Conference Proceedings*. Leuven: KULeuven, pp. 201-212.

Mabilde, J., Vanempten, E., Devoldere, S. and Oosterlynck, C. (eds.) (2016) *Metropolitan Landscapes.* Brussel: Devoldere Stefan [wnd. Vlaams Bouwmeester].

De Block, G., Lehrer, N., Danneels, K. and Notteboom, B. (2018) 'Metropolitan Landscapes? Grappling with the Urban in Landscape Design.', *SPOOL*, 5(1), pp. 81-94.

Pauwels, L. (2015) *Reframing Visual Social Science: Towards a More Visual Sociology and Anthropology.* Cambridge: Cambridge University Press.

Corajoud, M. (2000) 'Le projet de paysage, lettre aux étudiants.' in Brisson, J-L. (ed.) *Le Jardinier, l'Artiste, l'Ingénieur.* Besançon: Les Éditions de l'imprimeur, pp. 37-50.

... IN EXCHANGE WITH ACTORS

LANDVESTORS
Looking for "Pluridisciplinary and pluridimensional implementation processes"

Author(s): Lea SORET

Contact e-mail address: lea.soret@deltametropool.nl

Institution: Vereniging Deltametropool, Museumpark 25, postbus 600, 3000AP Rotterdam, The Netherlands, secretariaat@deltametropool.nl

Keywords: Landscape financing, private stakeholders, crowdfunding, donation, business model

Landvestors

Nowadays, in the Netherlands and elsewhere, governments have difficulty to finance their landscape development ambitions while private initiatives are mushrooming all around. This explains why the search for cooperation with citizens and market parties to help financing and organizing landscape development and maintenance is increasing.

The project "Landvestors" explores various ways of investing in the landscape a company or citizen can undertake, for example through donations, crowdfunding campaigns and certain business models.
A "landvestor" is defined as any private individual, company or entrepreneur with the will and ambition to act for the environment through either time, effort, workforce, philanthropic actions, the sharing of information or cash investment. Landvestors either act individually, or through a structure. For example, we analyzed a crowdfunding campaign for the realisation of a "Food-Park" which involved the refurbishment of cultural buildings and land for local production (https://smaakparkede.nl/), with benefits for nature as well as physical and financial rewards for the crowdfunders. This example is one of the twelve Dutch and international practical cases that were collected, analysed and compared in 2020. An expert meeting was organised to enter into dialogue with a number of stakeholders and the results were published in *Landvestors (*Vereniging Deltametropool, *2020).* Valuable lessons have been learned, such as that the ideal model seems to be a mixed business model involving donation and/or crowdfunding, long and flexible timelines, possibilities in action's scalability, direct involvement of the investors, different financial tools and public subsidies.

In 2021, the follow-up project “Landvestors, The Region” aims to test and investigate what these results can mean in practise into two different pilot regions: Brainport Eindhoven in The Netherlands and the Rheinisches Revier in Nordrhein Westphalia (see figure 1.), and to see how private parties can respectively contribute to the development of the landscape.

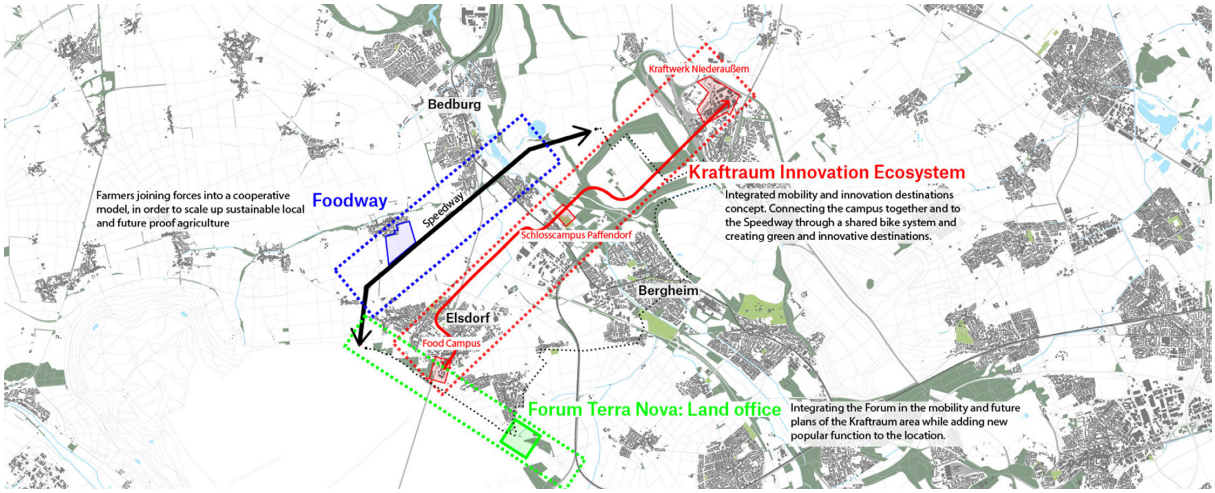


Figure 1. Stakeholder and concept map of the German region, Landvestors, The Region

The reflection will be translated into a regional landscape transition strategy, with different areas of interest. For each areas we reflect on spatial and financial steps and tools to take, which shows the power of Landvestors and its scalability through time and investments. These different options can be invested in separately or in parallel (see figure 2.).

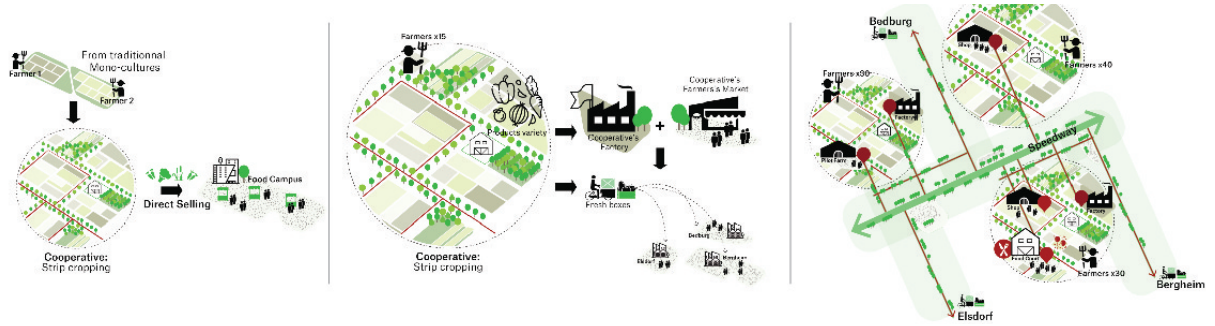


Figure 2. The “Foodway” concept (DE), scalability through investments and time

For this process, the Deltametropolis Association works together with a financial expert (Joost Hagens, Bureau Buiten), a landscape architect (Jonas Papenborg, FLUX), a German mediator (Cecilia Braun, BRAUN URBAN) and relevant stakeholders from both regions. An important moment in the sharing of knowledge and experience is the “living lab” Hightech Highgreen of the Dutch Landscape Triennial in April 2021. The project will be finalized in October 2021 and bundled up into a publication. Next to that, an open discussion will be organized, where the two landscape transition strategies will be presented to both Dutch and German stakeholders. The Deltametropolis Association aims to trigger and inspire both regions but also to target designers, provoke the financial world and decision making layers to offer new tools and ideas directed towards individuals, companies and policy makers who are willing to step into the world of Landvestors.

The Landvestors project emerged from the growing attention for landscape in the Dutch politics and spatial planning. Landscape quality has become a central concept in the National Spatial Vision (Nationale Omgevingvisie 2020). Investing in the landscape is also high on the agenda due to climate change, the Corona crisis, the preservation of cultural history, health care prevention and the economic business climate.

The Deltametropolis Association has a strong engagement and track record in this debate, in particular through the program "Landscape as Location Factor", including publications (such as "Blind Spot", see figure 3.), a lively Community of Practice (CoP), with over 500 active participants, a publication series, a website and linkedIn group, and co-organization of events such as the Landscape Triennial. The CoP is a pluridisciplinary group, including a constantly changing mix of policy makers, designers, researchers, students, private sector and politicians.

Figure 3. Blind Spot and Spot On publications (Deltametropolis Association)

In the two Landvestors pilot regions, we connect with a pluridisciplinary and pluridimensional audience (from the CoP participants, to government authorities, NGOs, local entrepreneurs, private individuals, semi-government structures). These actors are present and integrated within the project process through communication, participation and co-creation during meetings and events planned along different project stages – which are essential components of our process. We look for the potential of Landvestors by testing these different proposals, which combine spatial landscape development and a mixed financing model. During the discussion with the audience we assess what the potentials are, what are the opportunities and pitfalls. The aim is to learn how Landvestors can be a serious factor in landscape financing, and how they can radically change the way landscapes are developed. Also, it enables a better understanding of what is possible in both pilot areas, while at the same time, making everyone aware of what the keystones are for desirable transformations.
Anchoring our proposals within two "real" pilot regions, with concrete challenges, while bringing along their stakeholders with their different background and powers is how we chose to approach design and implementation process. We hope to give our project more chances to be executed, to have an influence on decision making layers while empowering designers, citizens, companies and governments through knowledge and information regarding landvestment tools and powers.

References:

Popup City, (2016) *Merstedenbouw.*

Tyora van de Meulen, (2019) *Presentatie Financiering van Landschap en Natuur.*

Wageningen UR, (2018) *Groei versus groen. Drie casestudy's over de waarde van het stadsgroen in Amsterdam.*

Vereniging Deltametropool,*(2020) Landvestors*

Merten Nefs, (February 2021) *Metropolitan Landscape, Definition, mapping and governance*

THE STADSATELIER OOSTENDE AS A PRO-ACTIVE TOOL FOR QUALITY IN URBAN DEVELOPMENT

Author(s): Stefan Devoldere*

Contact e-mail address: stefan.devoldere@uhasselt.be

Institution: Hasselt University, Martelarenlaan 42, 3500 Hasselt (BE), architectuur@uhasselt.be

Keywords: urban development, quality instrument, design for policy

In 2015 the city council of Ostend (BE) established the Stadsatelier Oostende (SAO) or "Ostend Urban Workshop": an expert group that was asked to work on a strategic development plan for the city, to provide the framework for a number of innovative housing projects, and to supervise various strategic development projects for the city. For this purpose, the SAO set up a double, complementary operation drawing up a strategic development vision for the long term, and starting up and monitoring concrete building projects. The SAO works at different speeds, but ensures that there is constant feedback between these speeds in the core of its operation. This operation is outlined and documented in the Global Strategic Development Plan (Globaal Strategisch Ontwikkelingsplan or GSO). The long-term vision of the GSO was fed by atelier sessions with stakeholders, and research by design that was done by external offices or by the members of the SAO themselves. At the same time, exemplary projects were initiated that translate the vision into a specific context and put it into practice. The Stadsatelier Oostende focuses on methodical innovation, in search of a flexible set of instruments for urban development. The goal of my presentation is to explain and illustrate this quest, as synthesized in the GSO, on the different levels and scales on which the SAO operates, moving from city-scaled studies to an exemplary housing project in the Stene district (Zilverlaan), that combines private, social and assisted housing programs, producing a shared publicly accessible park.

A triple mission

The SAO was chaired by myself from its creation in 2015 till the end of 2020. The SAO consists of both independent experts and members of the administration, resulting in a mix of practicing, academic and administrative profiles. The members meet every two weeks for internal workshop sessions or project discussions with external parties. Al Strategic Projects are to be discussed with the SAO, a label that can be given to a project by either the city council or the SAO itself. The method of guidance consists of workshops, rather than unidirectional presentations, taking the necessary time to establish a joint working process. In addition, the SAO also launched specific studies to develop the GSO. Within the framework of these studies, regular workshop sessions were organized to which the city services were invited for a broader reflection. Next to these, internal workshops within the SAO were set up to study specific districts. They are an efficient and effective way of using the knowledge potential of the SAO for specific research by design, laying the foundation for the reflection and steering framework of the SAO. The operation of the SAO is based on three pillars: it functions as a workshop where we study and make the city together with a diverse selection of stakeholders, it is a place for discussions which provide the basis for quality in urban design, and it is a platform for synergy between the city services, policy-makers and external actors. The GSO provides a light and manageable framework which presents and clarifies choices, and will continue to grow in the years to come, as a reference document for the administration and for the city council. The design of projects and processes is used as an instrument for preparing policy and as a test case in the field.

Ribbons, Trajectories and City Projects

The Stadsatelier Oostende is not a classic quality chamber. We want to weigh on the development process as early as possible in order to create the conditions for a high-quality end result. As a "urban workshop" we help to think about and design the city. We do this in both the short and long term. We give advice on current projects, but we also create a framework for future developments. We do this both technically and in terms of content. We supervise procedures to realize innovative housing projects on private and public land, and we carry out design research into the future of Ostend. Through the building projects we steer, we try to set in motion a gradual transformation of the residential fabric of the city districts, addressing mobility issues, social isolation, lack of programmatic diversity, etc. In the GSO we outline the vision that underpins this transformation. It is a reference document that inspires policy and sets the tone for reflection on the city. As a synthesis of the first five years' work of the SAO, the GSO describes a model for a future Ostend, composed of three main structural elements: Ribbons, Trajectories and City Projects.

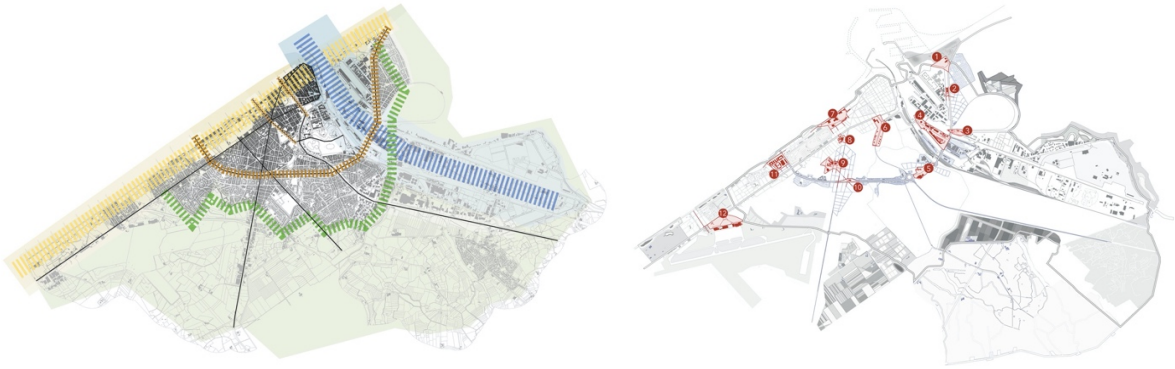


Figure 1. The four Ribbons (left) and the twelve City Projects (right) of the GSO

The **Ribbons** take their name from the Green Ribbon (Groen Lint) that was developed as a recreational bicycle line at the outskirts of the city even before the creation of the SAO. This park of interlinked landscapes has the potential to become an important structural carrier for the development of Ostend. Strengthened with urban programs, it can define a new profile of the city in relation to the landscape that surrounds it. It has the potential to become a structuring line that creates connections inward and outward, fundamentally changing the organization of the city. In addition to the Green Ribbon, we identified three other Ribbons as frontlines for the urban development in Ostend: the Coastal Ribbon (Kustlint) between the beach and the city, the Royal Ribbon (Koninklijk Lint) between the core city and the periphery, the Quay Ribbon (Kadelint) between the city and the port. The four Ribbons form the basis of the spatial model of the GSO. Their potential was explored through research by design (commissioned by the SAO, executed by external offices), literally and figuratively setting out the lines for the development of the city.

As a framework for the housing projects it supervises, the SAO itself conducts research by design on the residential fabrics in which those projects are located. This combination of research and project direction results in the so-called **Trajectories** that draw out a vision for the urban tissue that lies in between the four Ribbons. Each Trajectory studies a specific area within the city, analyzing the existing fabric, developing a vision on its further development, and steering specific projects that will (help) realize the vision in the short term. Three districts (Stene, Raversijde and Westerkwartier) were studied, all of them areas that are dominated by monofunctional housing, lacking diversity and good connections to the city center. In Stene we provided an operational framework for several collective housing projects, tinkering with the traditional allotment model and the accompanying real-estate logic. The collective housing project in Zilverlaan, for example, was accompanied from start to finish (the plot was sold at a fixed price, developers had to apply with an innovative design, the adjacent plot of a social housing company was included in the design…) and deliberately plays with the boundaries

between plot and landscape, between public and private space, between individual and communal housing wishes, between a traditional investment model and the return on collective added value.

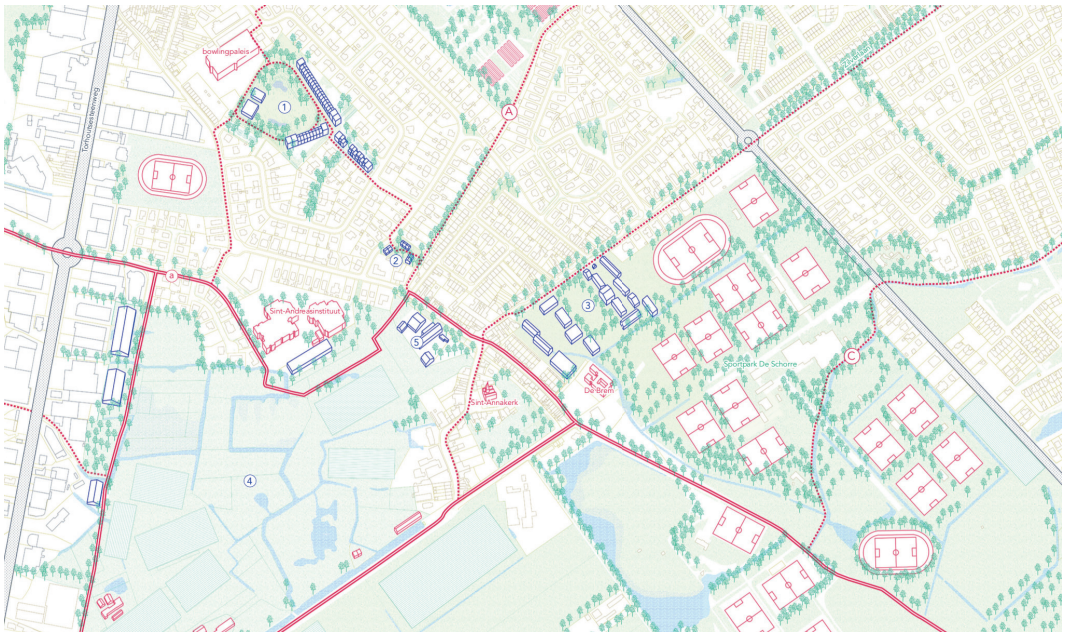


Figure 2. partial map of the Trajectory for the Stene district with housing projects in blue (project 3 is Zilverlaan)

Finally, as a synthesis of the Ribbons and Trajectories, twelve crucial sites in the city were defined where important levers are to be found for the realization of the GSO's vision and ambitions. These strategic urban sites were called the **City Projects**. They determine the agenda of the SAO for the coming years. At the end of 2019 the city council selected six of them to be further studied with priority.

Learning from Ostend

The Stadsatelier Oostende developed a methodology – between city architect and quality chamber – that is tailor-made for the medium-sized (Flemish) city. Academic and professional knowledge is used to strengthen a local administration that is faced with major challenges and limited capacity. City departments are given a sounding board for their operations and a platform where projects and intentions can be coordinated. An external view and expertise are combined with local know-how and knowledge of the field. In addition, the Stadsatelier helps to get a grip on a development dynamic that has its own logic and speed. Such processes sometimes overwhelm the city: private developments are fast-paced and there is no time to go through a classic planning process. By combining various processes, the Stadsatelier keeps the overview and helps to respond quickly, always with the long-term vision in mind. Thus, a vision for the future is being constructed while the urgent projects that require immediate input are being managed at the same time. The Stadsatelier is an instrument that combines long-term reflection with short-term strategies. It uses design as a pro-active tool for spatial policy and as a means of realizing innovative projects. It combines different disciplines and perspectives at the core of its operation. The lessons I learned from these first five years of the Stadsatelier Oostende (2016-2020) helped me to develop an adapted proposal for a Stadsatelier for the city of Hasselt, which started operating in April 2021. It will hopefully signify a second phase in the testing and development of the "Stadsatelier" or "Urban Workshop" as a flexible and innovative instrument for urban policy and development.

HOW DO GARDENERS INFLUENCE BIODIVERSITY? A TROPICAL CASE STUDY

Author: Sébastien CLEMENT*[1], Karine DUPRE[2]

Contact e-mail address: sebastien.clement1@etu.u-bordeaux-montaigne.fr

Institution: [1]Université Bordeaux Montaigne, UMR Passages, Maison des Suds, 12 Espl. des Antilles, 33600 Pessac (France); [2]Griffith University (Australia)

Keywords: gardening knowledge-sharing, Creole garden, gardening practices, landscape, biodiversity.

Introduction

The garden is potentially the place of cultural integration and practices (Clement, 2000), which can be (re)discovered, rethought, shared, grasped in their diversity and culturally integrated, respectful of living things (Watin, 1991). There is a great variety of gardens, yet each one singularly addresses biodiversity, while participating in its protection and enrichment. In the Tropics, "Creole garden" embeds the great diversity of garden forms (Fauvre-Vaccaro & Roux, 2006).

This research work focuses on gardening practices and knowledge in tropical environments, on the evaluation of their contribution to biodiversity, their transmission, evolution and renewal. This approach constitutes an original way of investigating the topic of biodiversity from both a scientific and cultural angle. The project is located on Reunion Island (France), which is one of the global biodiversity landmarks (French Ministry for Ecological and Solidarity Transition, 2018). Recognized for the exceptional diversity of its landscapes, the Reunion National Park was inscribed in 2010 on the Unesco World Heritage List for its exceptional landscape and biodiversity. It is also known for the richness of its environments and ecosystems, characterized by a high degree of endemism.

Based on the hypothesis that there is today a loss of traditional knowledge and know-how relating to gardening, consubstantial with a change in the ways of living in the island, this research investigates whether the gardeners of La Reunion contribute to the preservation of garden biodiversity, through knowledge-sharing and the development of their practices.

Methodology

This research uses a mixed-method approach and includes three main streams. The first stream concerns the collection of qualitative data through a series of interviews to collect the stories of the gardeners all over the island.

This approach provides a better understanding of the relationship they maintain with biodiversity and how their practices may have evolved over time. The sample of twenty three people across the island allows us to study their representations and the transmission of knowledge.

The second stream involves the creation of an experimental garden, to document not only the process itself but also the outcomes in terms of biodiversity. The main objective is to evaluate the capacity or not of a community of gardeners from all walks of life to build and manage a garden over time. At the same time, a comparative study is conducted, since the original plot has been divided into two sections: one for the experimental garden, the other left as it is to measure the changes throughout time. Both quantitative data (e.g. measuring the evolution of biodiversity) and qualitative data (e.g. knowledge-sharing process) are collected and analysed.

Experimental garden 2021 © SC

Finally, the third stream is based on the experience of the School of the Planetary Garden that researcher Clement has managed since its creation in 2013. The aim is to study, through a survey of 16,000 participants, the potential behavioral and practical changes in gardening.

This presentation will concern the results of the different streams.

In the experimental garden, the process included 4 main steps as follows: open call for participant's recruitment to commit weekly to the experiment in small groups, inventory of the existing insect biodiversity on the plot before new planting, experimental garden collective design, keeping of a logbook throughout the project to document processes and knowledge-sharing.

Results/Discussion

Although the research has not yet been fully completed, there are mostly 3 results regarding the experimental garden research stream. The first one concerns the level of engagement of the gardeners within the island. Although there was an initial expectation to get a minimum of 15 participants, the project gathered a steady and increasing interest since its inception in August 2020. Starting with 20 participants, there are now 65 gardeners involved, and around 5-6 of them (not always the same ones) come gardening every Friday morning. So overall, this result shows the relevance of the project. Although some said they came out of curiosity, the majority really wanted to share and discuss, supporting our hypothesis that knowledge-sharing is needed.

Garden of Christelle Visce © SC

The second finding regards the biodiversity. The initial inventory of the garden resulted in 36 different plants and more than 4000 insect species.

Two trends were then observed: firstly, both populations decreased in number during the creation of the experimental garden; then, the insect population not only recovered after the planting of endemic species but new species appeared.
Concerning the plants, 56 new species were cultivated by the gardeners, while the uncultivated area showed twelve new species. Despite the relatively short time frame, gardening seems to enrich biodiversity, both in quantity and diversity, therefore demonstrating its positive role. Uncultivated areas also benefited passively from the proximity of gardening, enhancing the former result.

The third result concerns the processes of knowledge-sharing, which is mainly done orally, by showing the actions to be carried out, while reproduced by others. Discussion topics are very broad, from food to health and well-being. Therefore, not only gardening practices were transmitted but also an art of living. Furthermore, the small scale of the project (200 m2), similar to the average size of private gardens on the island, demonstrates what could be achieved if this was duplicated by garden owners.

In conclusion, this research shows that emphasis on gardening could be an efficient means to preserving and enriching biodiversity. Yet, it still raises the question on how to garden *together* to preserve endemic biodiversity. Future research could investigate a model to be developed to accelerate the ecological transition, which is so far struggling to materialize. Can gardeners become key players in leading an ecological transition that has become essential? How to garden this world tomorrow? are but a few questions that need answers.

References :

- Gilles Clément. 2000. *Le jardin planétaire.* Tours : Albin Michel.

- Michel Watin. 1991. « *Habiter : approche anthropologique de l'espace domestique à La Réunion* ». Thèse en ethnologie.

... IN PARAMETRIC ISSUES

DISASTERS AND THE SMART CITY: COPING WITH A TROPICAL CYCLONE IN THE SLUMS OF BHUBANESWAR, INDIA

Author(s): Sramana Mukherjee *
Dr. S. P. Ray

Contact e-mail address: sramana.m@rediffmail.com

Institution:
Dept. of Humanities and Social Sciences National Institute of Technology Rourkela,
Rourkela Odisha – 769008, India

Keywords: Slums, Urban inequalities, Tropical cyclone, Smart City, Bhubaneswar

In India, about 31% of population (around 377 million) lives in urban areas (Census 2011). Though percentage-wise the proportion of Indian urban population compares unfavourably with global figures, in absolute terms it represents a herculean challenge for urban development planning. As a result, slum growth is one unintended outcome of this process of unbridled, unplanned and informal urbanism. No wonder then that 22% of Indian urban population lives in slums (ibid).

Slum, as a physical and spatial manifestation of urban poverty and intra-city inequality, existed since the 16th century Victorian England. Some of the earliest references of slums came from people like Engels who studied the squalid living conditions of industrial workers in his book, *The Conditions of the Working Class in England* (1844). In 1890, Jacob Riis's work *How the Other Half Lives*: *Studies among the Tenements of New York,* corroborated Engles' insights in the USA. Pioneering work of more recent times on slums and urban poverty generated concepts like the culture of poverty and marginality, which portrayed slums as problematic dens of violence and prostitution; with the only solution of demolishing and relocating them to public housing projects (Lewis 1959).

During the late 1980s and early 1990s, the neo-liberal policies of multilateral agencies like the World Bank, led to the creation of legislative, institutional and financial frameworks to facilitate entry and operation of private entrepreneurs (market) and NGOs in urban and slum development. Approaches of "cities without slums" were pioneered by countries like India with slum up-gradation programmes and state-sponsored subsidized slum housing schemes like PMAY-HFA (Urban). Contemporary global policy approaches – the New Urban Agenda from Habitat III, the UN's

Sustainable Development Goals (SDGs), IPCC 1.5 C Special Report, the U-20 development agenda – have all recognized the potential pitfalls of urban inequalities leading to slum growth.

Technology-driven Smart Cities are expected to meet the challenges of sustainability and further design disaster-resilient cities. It is believed that Smart Cities can transform slums into vibrant neighbourhoods and smart communities, which are fully integrated into the rationally and technically designed urban systems. The Smart City Mission of Govt. of India launched during 2015 seeks to realize these goals. Smart City (SC), it is argued, provides a flexible and responsive means of addressing the challenges of urban growth and renewal that responds to disasters and climate change (European Commission 2012). Market-driven and technology-enabled SC is projected to be a game changer in managing disasters and protecting the vulnerable in urban areas (Shah et al. 2019).

However, the operationalization of the promises of a disaster-resilient SC needs to be empirically tested on ground. The occurrence of the severe tropical cyclone Fani in Odisha in the summer of 2019 provided such an opportunity. By 2019, when Fani struck Bhubaneswar, the city had already entered its fourth year as a Smart City. Consequently, it helped to bring into sharp focus the interface between SC (Luque, McFarlane and Marvin 2014) and natural disasters (Smit and Wandel 2006) thereby putting to test the promises of Bhubaneswar as a designed Smart city.

The present study primarily grapples with the question of efficacy of the SC strategy to secure the lives and livelihoods of the disaster-affected urban poor. More specifically, it is built around the following objectives:

i) To examine the coping strategies adopted by slum residents to deal with cyclone Fani.
ii) To assess the impact of the disaster on the socio-economic lives of slum residents.
iii) To evaluate the response of the SC to meet the needs of the disaster-affected urban poor.

The BTCD (Smart District Area) encompasses 24 slum habitations across five wards, out of which ward 41 had the largest concentration of 11 slums and hence, was selected. Out of the 11 slums, two slums – Shanti Nagar FCI Colony and Jagannath Basti – making up about 37% of the total slum households of ward 41 were selected[1]. A total of 52 households from both the slums were selected to explore their perceptions, experiences, and coping strategies. Detailed individual interviews, Focus Group Discussions, visual documentation were main methods used. Discussions were held with officials from BSCL, BMC and BDA. Interactions were also held with NGO personnel.

As the study findings revealed, even with the devastation caused by Cyclone Fani, the state remained conspicuous by its absence from relief and rehabilitation work in the slums. Thus, while the state focused on bringing its cyclone-hit capital city back to form; the problems of the slum population remained conveniently forgotten. The idea of a just urban design adapted through SC fell short in the face of real challenges such as disasters, thereby unleashing the ugly reality of deep embedded socio-ecological inequalities. The slum residents were denied their collective right to the city resources when they needed it the most. By systematically denying them both ownership (right to land, housing and other services) and membership (participation in decision-making process), BSCL aggravated the impoverishment risks of the slum residents. The slum dwellers were forced to

[1] Data derived from BSCL Slum Data List provided by the Office of Bhubaneswar Smart City Limited (BSCL).

rely on their social capital base (Putnam 1993) for survival. This also brought out human agency and capability of the urban poor to cope with vulnerability rather than surrendering to it.

Figure 1. Destroyed home of an elderly couple from Jagannath Basti in Cyclone Fani, 2019

References

European Commission. (2012) 'European initiative on smart cities'. Available at: http://setis.ec.europa.eu/about-setis/technology-roadmap/european-initiative-on-smart-cities.

Harvey, D. (2008) 'The Right to the City', *New Left Review,* 53, p 23-40.

Lefebvre, H. (1968) 'Le Droit à la ville'. Paris: Economica/Anthropos.

(1996) 'Writings on Cities', Kofman, E. and Lebas, E. (trans). Cambridge, MA: Blackwell.

Lewis, O. (1959) 'Five Families: Mexican Case Studies in the Culture of Poverty'. New York: Basic Books.

Luque, A., McFarlane, C. and Marvin, S. (2014) 'Smart urbanism', in Hodson, M. and Marvin, S. (Ed.). *After Sustainable Cities?* (p. 74-89). London: Routledge.

Putnam, R. D. (1993) 'Making democracy work: civic traditions in Modern Italy'. Princeton, NJ: Princeton University Press.

Shah, S. A., Seker, D. Z., Rathore, M. M., Hameed, S., Yahia, S. B. and Draheim, D. (2019) 'Towards Disaster Resilient Smart Cities: Can Internet of Things and Big Data Analytics Be the Game Changers?' *Special Section on Urban Computing and Intelligence, IEEE Access,* 7, p 91885-91902.

Smit, B. and Wandel, J. (2006) 'Adaptation, Adaptive Capacity and Vulnerability', *Global Environmental Change,* 16, p 282-292.

CAN QUANTITATIVE GUIDELINES SUPPORT SUSTAINABLE AND QUALITATIVE URBAN DESIGN?

Author(s): Nina DE JONGHE*, Tom COPPENS

Contact e-mail address: nina.dejonghe@uantwerpen.be

Institution: University of Antwerp (Research group for Urban Development), Prinsstraat 13, 2000 Antwerp, Belgium, Stadsontwikkeling@uantwerpen.be

Topic area: Looking for…quality in urban design

Keywords: urban design parameters – spatial sustainability – target values – quantitative guidelines – qualitative practices

Extended Abstract - Research

The space we occupy to live, work, shop, recreate and move around is rapidly increasing while unsustainable land use patterns will further cause nature to shrink and fragment. Future spatial transition of cities, municipalities and regions worldwide is directed towards a more sustainable land use aiming to recover the balance between the built and unbuilt environment and to create a qualitative habitat for all. The assessment of current and future developments of certain areas happens often through quantitative indicators which serve as a 'barometer' for how an urban system is performing. The use of quantitative guidelines has moreover a long tradition in the field of urban design and regained attention with contemporary debates on compact cities or smart growth which connect certain parameters with desirable outcomes in terms of environmental sustainability, social dynamics, public health or economic vitality. Due to a broad and multidisciplinary understanding of its concept, the literature on sustainability indicators is extensive. In addition to spatial metrics describing the built environment, aspects such as travel behaviour and energy consumption are often included as indicators in urban or municipal databases. This paper explores the spatial dimension of sustainability by reviewing the recent literature on urban design indicators and existing research into the effects of these physical parameters on other aspects of the broader environment and society (the non-spatial dimensions of sustainability). The focus lies thus on the physical-spatial characteristics whereas aspects referring to the socio-spatial use of territories are discussed in relation to them or as a possible consequence thereof. We furthermore investigate whether target or threshold values may be derived from certain desirable effects or certain desirable 'example projects' and reflect on their relevance for practice.

The paper presents an inventory of the various parameters and corresponding values or norms along five key dimensions: *density, form, network, functional mix*, and *open & green space.* These research angles were defined after a first scan of the scientific literature and in consultation with a group of planning experts. For each dimension we enumerated various parameters, target values and norms and described their possible impact on travel behaviour, social cohesion, public and private costs, physical and mental health, biodiversity, (micro)climate, and so on. Although the five dimensions intertwine, the indicators and their effects were listed separately to provide structure in both research approach and outcome. This first step in our analysis departs from an objective and quantitative focus on the measurable aspects of the (un)built environment in relation to studied sustainability performance, while a second step takes a more qualitative framework into account starting from sites or projects numerously shared among urban designers and planners as 'best practices'. Based on

available data in publications, websites and additional measurements in Google Earth, the values of several parameters are determined for a selection of practices.

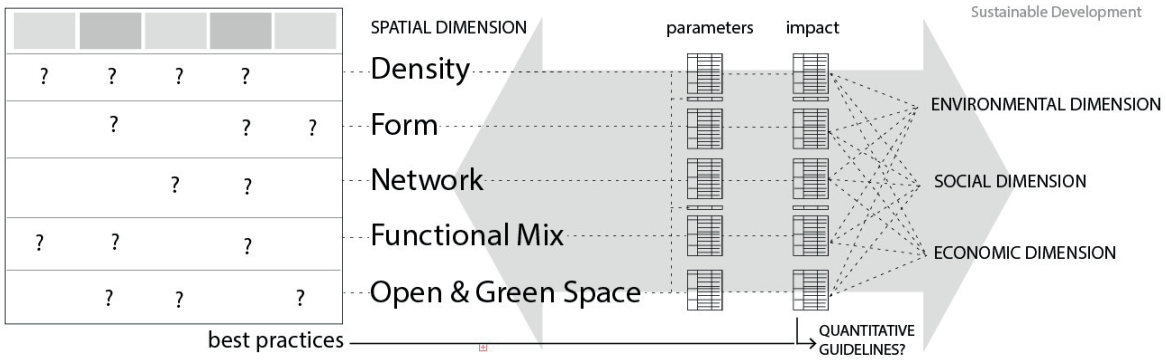


Figure 1. Structure of the research

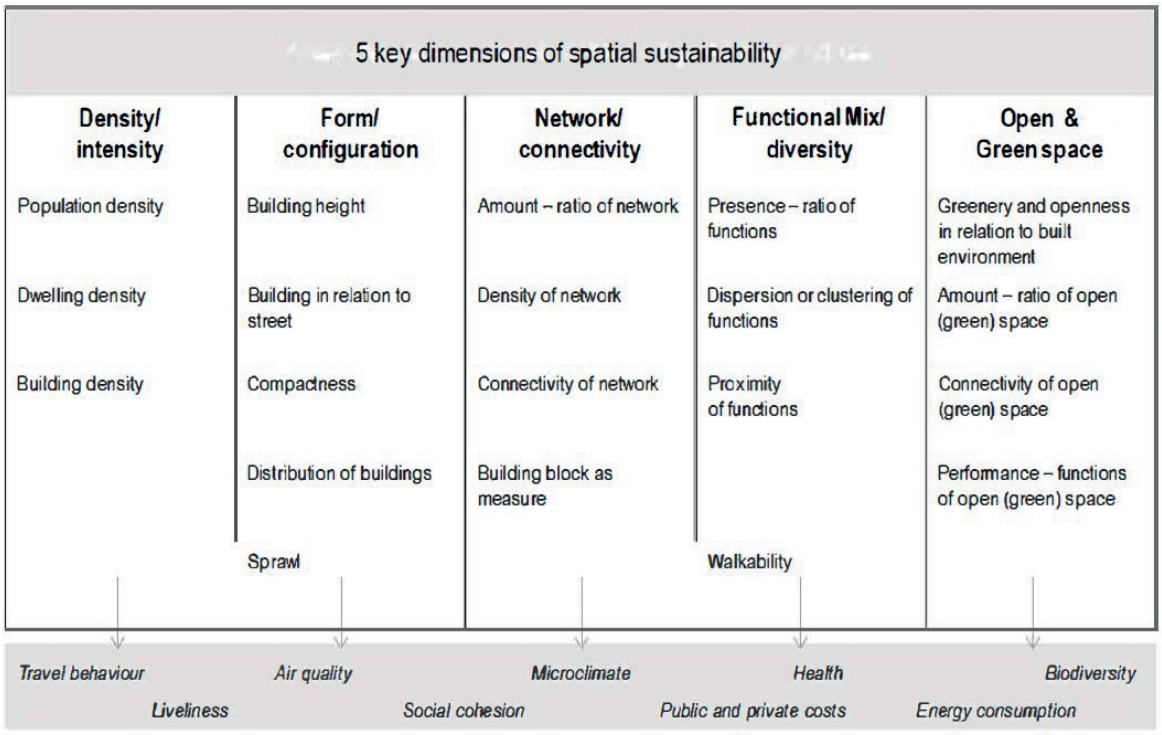


Figure 2. Overview of the inventory: dimensions, indicator categories and the main domains they impact

The inventory presents a multiplicity of spatial indicators and ways to express them in which the geographic reference area often influences its associated value. This is why the evaluation of certain values as well as comparisons between different locations is complex. Multiple interpretations of apparent straightforward indicators (e.g. dwellings per hectare) result moreover in ambiguity with regards to their application and questions the usefulness of the indicator and associated desired values. The use of a combination of a set of parameters is usually recommended to define a specific context's spatial attributes more adequately. Research on the impact of spatial indicators on various aspects of society and environment is extensive but not always univocal. Spatial conditions of high density and compact living environments with high street connectivity and a functional mix are for example largely studied as contributing to active travel behaviour of residents and in this way being beneficial for their health and a neighbourhood's liveliness and attractiveness. Yet, not all relations are as certain in the case of health since both positive and negative effects can be observed in high density neighbourhoods depending on which health factor is investigated (stress level versus physical activity for instance). The positive effect of the presence and accessibility of green space on health is

also claimed, although the actual use thereof, its specific vegetation and perceived quality play crucial roles. The same duality is present in research on social effects where certain spatial conditions may potentially boost community cohesion while it may also threaten an area's peacefulness or people's feelings of privacy. Findings are moreover strongly affected by cultural and socio-economic factors which obscure direct causality between spatial and social effects. Additionally, benefits in a certain place may simultaneously generate negative effects somewhere else just as the impact may diverge depending on the scale it is assessed. The figures highlighted in the literature arise from the analysis of specific areas of a particular scale in a unique location and rely on the policy context in which they unfold. Consequently, distinct values could be of guidance depending on the effect one intends to pursue. When striving for a change in travel behaviour for instance through an increase in dwelling density to a particular number, social well-being of residents might be impacted less beneficial by those means.

Although many claim a certain spatial quality is realized through a 'right' balance between built and non-built space, it seems as if this balance is to find in a relational measure rather than in concrete figures. Quality of urban design lies in the way how the physical characteristics and configurations of the (un)built environment interact positively with each other and with non-spatial dimensions. The values observed in international best practices illustrate that a combination of different outcomes for certain indicators allow for a qualitative living environment. The selected examples mostly take a higher density and socio-ecological living environments as point of departure in which the five spatial dimensions play a combined role. It is moreover relevant to bear in mind that certain urban design or planning concepts may attract specific types of residents (some projects for example focus on car-less households) who influence on their turn the positive effects observed which are thus not solely results of design characteristics. Some common factors which are considered carefully in the example projects or sites are the relationship to greenery, accessible and nearby (sustainable) mobility options, a comfortable microclimate (attention to local wind circulation) and the collective use of (indoor and outdoor) space. These aspects should be studied in relation to the specific context and scale of an area of intervention and could be seen as preconditions for realizing a higher residential density in a qualitative way, while one could focus on a broader margin of possible numeric values rather than a strict target or limit.

As much as this paper displays a comprehensive overview of ways to measure the (un)built environment and discusses a wide range of effects spatial characteristics bring along, it seems overly ambitious and moreover irrelevant to translate the observed values in both research and practice into generic guidelines. Measuring an urban system through several indicators implies often an oversimplification of reality while a city is a dynamic entity continuously under change according to local circumstances or priorities. Both the scale and context-sensitivity of indicators, their corresponding values and effects problematize their generic use as benchmark or guideline. Some researchers therefore look into the development of local context-specific indicator sets or multi-scalar approaches. The availability of some reference values and their distribution within a specific area could be relevant for designers or planners as long as methods for measurement are clarified and the relation between the different dimensions and parameters at play is taken into consideration. Because of the inconclusive and contradictory nature of the evidence base, the informative value of these parameters and figures may in some cases even add complexity instead of clarity to debates on urban sustainability and quality. It is important however to keep in mind that indicators and their possible target values on their own do not solve the challenges evolving around sustainability or quality in urban design but form rather starting points for discussion and further exploration.

References

Berghauser Pont, M., & Haupt, P. (2009). *Space, Density and Urban Form.*

Bourdic, L., Salat, S., & Nowacki, C. (2012). Assessing cities: A new system of cross-scale spatial indicators. *Building Research & Information*, *40*(5), 592–605. https://doi.org/10.1080/09613218.2012.703488

Carmona, M., Heath, T., Oc, T., & Tiesdell, S. (2010). *Public Places Urban Spaces: The Dimensions of Urban Design*. Routlegde.

Pafka, E. (2013). Nothing Gained by only Counting Dwellings per Hectare: A hundred years of confusing urban densities. *State of Austrialian Cities Conference*. Sydney.

Salat, S., Vialan, D., & Nowacki, C. (2010). A common metrics and set of indicators for assessing buildings and urban fabric sustainability performance. *Central Europe towards Sustainable Building. Quality of Internal and External Environment.* Prague.

.

... IN SPACES OF TRANSITION

TERROIR TO NON-PLACE: DEFINING FUTURE FOOD TERRITORIES

Author(s): Ian GILLIS, MArch, BsED, BFA*

Contact e-mail address: ian.gillis@uibk.ac.at

Institution: Universität Innsbruck, Fakultät für ArchitekturInstitute of Urban Design, Dept. of Territorial Strategy, Technikerstraße 15, A-6020 Innsbruck
ioud@uibk.ac.at

Keywords: Agricultural Territories, Sociocultural Value, Environment, Place, Urban-Rural Connection

This investigation aims to break down the complexities of our global food system making them relatable and accessible to the end user, thereby adding value to food spaces that link user and system. This is accomplished through examination of the concepts: Terroir – in practice, cultural understanding, and theoretical implication; and Non-Place – as seen in the anonymous spaces of the global food system. The theory, technologies, and territories of these concepts are scrutinized revealing the relationship between city and supporting land. Terroir is established within the context of contemporary agricultural territories and technologies as a new tool for landscape design.

Agricultural territories are the middle point between global and local urban context, and are potential connectors between human participant and the global food system. Additionally, they are the basis for our conceptual understanding of landscape. Traditionally situated at the urban edge, they mark the transition point on the urban-rural divide. Terroir is defined as the influence of all environmental factors, and cultural practices on the development of specialized food products. As a modern concept that harkens back to a traditional relationship between human and environment, Terroir is a practice that aims for maximum manipulation of environment while retaining maximum consideration for natural systems. Non-Place, a term coined by Marc Augé, describes the anonymous and disconnected agricultural territories of the global food system – the vast, repetitive fields, or increasingly automated and robotized production and distribution facilities.

The insertion of Terroir into Non-Places of the global food system elevates contemporary agricultural territories, their spatial quality, and defining characteristics; definition of place, culture, craft, the use of technology and data to form uniqueness, and the connection to ecologies and environments, are all cultivated. This investigation poses the questions: Do agricultural territories have something to teach us about our relationship to the landscape and environment, about spatial organization, or about the potential connectedness between urban and rural environments? And, can Non-Places of the global food system be redefined as potential settings for the development of Terroir?

Various typologies of agricultural territories and technologies are examined as comparison samplings, allowing for the determination of the degree to which a landscape is defined as Terroir (place), or Non-Place. The role of typologies is re-evaluated, and the relationship between human participant, territory, and environment is reassessed.

Current standard agricultural territories and technologies exemplify Non-Place, while many traditional agricultural territories and technologies display aspects of Terroir. However, new technologies and hi-tech production facilities have blurred the line between Non-Place and Terroir. These territories, through use of new technologies, create production spaces of wholly manufactured environments, which nonetheless are capable of generating specialized products within a local context.

The findings of this investigation are to be presented as a breakdown of the major themes of focus, which build a comprehensive impression of the research. Beginning with the basic definition of Terroir and developing into an expanded analysis, the presentation will reveal the territorial implications of this concept. It will show how Terroir can be developed as a design tool that allows for user interaction throughout all environmental and spatial scales. Additionally, the role of technology is affirmed as a cross-scale intermediary and a key element of the data collection process and sensory experience. It is here that the technology, infrastructure, and systems of Non-Place allow for the insertion of Terroir. Technology and Terroir join to yield new perspectives that enhance both character of place and cultural value previously absent from Non-Places.

Through the use of Terroir as a comprehensive concept, new perspectives on food spaces are achieved. Terroir becomes a tool utilized within both contemporary food production, and landscape design. This implementation leads to a shift in the territorial outcome of agricultural land use prompting the reconsideration of accepted values – valuation of socio-cultural impact of agricultural territories. The relationship between human participant and environment is re-established.

References:

Augé, M. (1995) *Non-Places, introduction to an anthropology of supermodernity*. London: Verso.

Maréchal, G., Linstead, S. and Munro, I. (2013) 'The territorial organization: History, divergence and possibilities', *Culture and Organization*, 19(3), pp. 185–208.

Koolhaas, R. *et al.* (2020) *Countryside: a report.*

Tomasik, T. J. (2001) 'Certeau a la Carte: Translating Discursive Terroir in The Practice of Everyday Life: Living and Cooking', *South Atlantic Quarterly*, 100(2), pp. 519–542.

Waldheim, C. and Berger, A. (2008) 'Logistics Landscape', *Landscape Journal*, 27(2–8), pp. 219–246.

WEAK STRUCTURES FOR THE TRANSITION:

HORIZONTALITY IN GREATER GENEVA CITY-TERRITORY

Author(s): Tommaso PIETROPOLLI *

Contact e-mail address: tommaso.pietropolli@epfl.ch

Institution: Laboratory of Urbanism - EPFL, bâtiment BP, Station 16, 1015 Lausanne, Switzerland

Keywords: city-territory; horizontality; spatial justice; ecosystem services; territorial design

This contribution roots in the Vision for the Greater Geneva, a project situated between research and design collectively developed by a multidisciplinary group headed by the Habitat Research Center at EPFL which I contributed to coordinate. The project proposes a vision for the development of Greater Geneva in light of its context of eco-socio-economic transition. In the occasion of this symposium, my contribution will first briefly present the proposal and then further deepen some theoretical elements key for the vision construction.

The presentation is structured in three parts. The first part contextualizes our proposal in its historical and geographical context, summarizing the research protocol applied and the main elements of the vision. A second part will focus on the "weak structure", a territorial prototypical space, at the core of the project, dedicated to ecosystem services development and climate change adaptation and a spatial organiser of the metropolitan area. By doing that, I will, in a third part, clarify some possible interactions between this project, its spatial organization and the figure of horizontality. Among others figures of speech structuring spatial thinking (Secchi, 2000; Rella, 2004), horizontality is in fact used in the contribution as a figure of thought, questioning the hierarchical relations of urban/territorial space at different levels: relations of power, between species, between actors and institutions of territorial development. If a vertical system is in fact hierarchically organized, a horizontal one is based on weak hierarchical relations, in which the supremacy of some elements over some others is not fundamental for the stability of the system itself. In the presentation, the vision for Greater Geneva metropolitan area allows for an investigation of the ways in which alternative power relations could take shape in the contemporary European urbanized territories supported by non-hierarchical spatial structures.

The research on the Greater Geneva comes at a time when the population's confidence in the transnational institution is particularly low; more a problem than a solution, many see Greater Geneva as a device to accentuate national or local differences and particularities. At the same time, the urgency of climate change adaptation is widely publicly debated in the region, and the capacity of this territory to face the upcoming challenges is considered a crucial issue. The vision investigates spatial structures able to articulate a radical territorial transformation, supporting and enhancing socio-ecological innovation. Moreover, the research explores how the transition could enable an original reflection on the theme of coexistence between different parts of the territory, its inhabitants, human and non-human.

Two hypotheses theoretically structure our work. The first puts soil and labour at the centre of the reflection; already at the beginning of the 20th century, soil and labour were witnesses of the formation of a new urban condition, capable of highlighting the economic and social issues that affect the future of the territory (Rowntree, 1910). Today, in this cross-border territory, marked by increasingly imbalances and struggling to address the challenges of a transition that is not only ecological but also social and economic, soil and labour are fundamental elements in the construction of a vision for the city-territory. A second hypothesis – the transition as an opportunity to organise a new biopolitical project - proposes to profit of this occasion both to rethink the modern biopolitical project and to disclose the lack of attention to collective and individual emancipation of the contemporary one. In the frame of this symposium, this second hypothesis will be more largely investigated.

The project, aiming at altering the spatial imbalances between the different parts of Greater Geneva, but avoiding the rigidity of a "planning" and regulatory approach, focuses on the structures and practices of transition. The explicit objectives concern the exploration of an urban project of continuity and network, the strengthening of (spatial and social) self-determination principles and the implementation of incremental adaptation processes. Two types of structures support the prototypes elaborated by the vision: weak and strong structures. They represent the ways in which horizontality is translated into the design of space and therefore into structures that organize it (Viganò, Pietropolli, 2021). If the strong structure radically rethinks the current model of mobility and TOD development in favour of an accessibility extended to the entire metropolitan territory, the weak structure is a laboratory for testing ecological, social and economic transition. An explicit ecosystemic nature determines its configuration: public space at territorial scale, it is made up of waterways, public, social and cultural spaces, areas at risk, forests and ecological corridors as well as heritage sites (fig. 1).

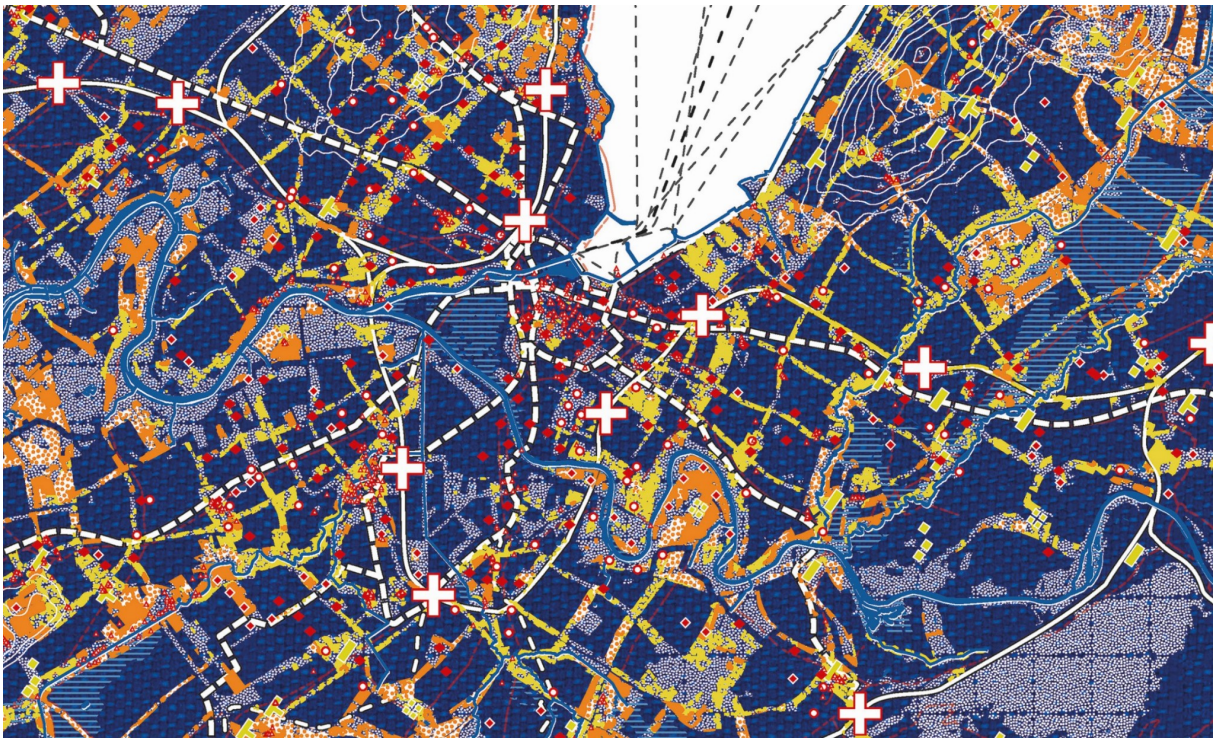


Figure 1. Weak and Strong structures, detail. ©HRC-EPFL 2020

Crossing equally existing urban centres and new spaces of growth, it behaves like a horizontality device manipulating the complexity of a heterogeneous construction at the limit of the paratactic. By rethinking continuity, no longer as the regulatory and definitive space with a defined perimeter of the Modern, this structure is therefore inspired by the uncertain action of a patchwork. Thus, while not resolving the matter, it attempts to tackle the paradox of equality, leaving room for the construction of original ways of living together, a complex ecosystem to traverse the transition.

This presentation, through the discussion of the vision, therefore not only explore how a contemporary territorial project could integrate ecology and society as actors of change, claiming the role of space and its design in the construction of original and improved conditions of territorial habitability; it also seeks to clarify the ways in which such a project could benefit from a non-hierarchical – thus horizontal and acentric (Petitot, 1977) – interpretation of spatial order, accepting to reconsider the very paradigms of its construction. Thereby, this re-territorialization project becomes a horizontal one, overcoming centralizing and polarizing logics to explore new forms of balance.

References:

Petitot, Jean (1977). Centrato / Acentrato. In Enciclopedia, Einaudi: Torino, vol. ii, pp. 894-954

Rella, Franco (2004). Pensare per figure, Roma: Fazi Editore

Rowntree, B. S. (1910). Land & Labour. Lessons From Belgium, London: MacMillan.

Secchi, Bernardo (2000). Prima lezione di urbanistica, Bari: Laterza

Viganò, P., Pietropolli, P. (forthcoming). Designing Horizontality. disP - The Planning Review (A Flat Ontology in Spatial Planning, forthcoming)

MADRID, NEW PROXIMITIES IN THE PRODUCTIVE POST-INDUSTRIAL CITY

Author(s): Julio de la Fuente*, Natalia Gutiérrez

Contact e-mail address: julio@gutierrez-delafuente.com

Institution: Gutiérrez-delaFuente Arquitectos (GdlF)

calle Madre de Dios 6, Madrid 28016, Spain. info@gutierrez-delafuente.com

Keywords: new proximities, infrastructures, production, inclusion, landscape

"Ideas cross corridors and streets more easily than continents and oceans" Edward Glaeser

The context

Madrid, new proximities in the productive post-industrial city is a research for the Seoul Biennale of Architecture and Urbanism 2019 "Cities Exhibition", carried out by Gutiérrez-delaFuente Arquitectos, with the collaboration of Urban Reports. The research has received the support and essential collaboration of the Ministry of Development of Spain, and the Government Area for Sustainable Urban Development of the City of Madrid.

This research of Madrid was co-curated in an unique pavilion together with Brussels Capital Region, (Kristiaan Borret), and with the City of Vienna (Bernd Vlay).

The city of Madrid properly serves as a case study, specifically the southeast of Madrid, which contains at the same time the most vulnerable and potential areas. The southeast area is the unique available land for the future growth of Madrid. It is a degraded landscape with former soil extractive activities, informal settlements, dumps and new neighbourhoods in different status (under construction or planned). In between the city and this rediscovered terrain exists an universe of obsolete industrial areas and infrastructures that are the main corpus of the research, trying to recode the strategic potentials of this unknown land.

The crisis arising from the success of cities, in the midst of the Urbanocene Era, produces phenomena of gentrification and social and economic inequality, among others. The challenge for the coming decades will be to find a functional urban economy where the employees of the services, industry, care, and workers of which until now we knew as middle class, can live at reasonable distances from the city, without performing endless commuting. Living and working.

The research focus on the following question: what territorial synergies can be triggered so that a new economy (the next economy) could prosper, based on a social agenda and criteria of equity and inclusion?

Research methodology

The matrix: the research is organized around a matrix of topics and questions to produce references, exchanges and explorations of the territory. The exploration of the Spanish Urban Agenda, in

collaboration with the Ministry of Development of Spain, is attached to this matrix which is organized around these fundamental issues:

1_ Why now? The political scale. 2_ Which synergies? A split reality. 3_ Which frameworks? Urban armatures. 4_ Which hybrids? Making place. 5_Which imaginaries? The collective realm.

The collaborators: the research is supported by interviews and experiences of collection of international and transdisciplinary experts, from the practice, academia and urban-regional management, such as Kristiaan Borret, Luis Fernández Galiano, Kaye Geipel, or Bernd Vlay, and ten expert who participated in the redaction of the Spanish Urban Agenda.

The geography (economy, soil, social…) and the space: the exploration of the territory was supported by the City of Madrid exchanging all the data and indicators, to build a new reality (social, incomes, education, commuting, nature, innovation….). A collection of research plans are part of the research.

The southeast territorial DATAR: finally, the exploration ends by addressing the uncertainty of the imaginary of the collective, which is formally answered as a photography documentary made by Urban Reports along the more than 30 km of the M-45 highway. The photographic campaign, a Madrid DATAR, puts on the table of the urban debate a series of realities in transformation, as well as productive, obsolete and invisible landscapes. This collection of realities seen with a new sensibility about its environmental condition are immediately transformed into the imaginary of the collective. How can these new imaginaries in between city and territory be introduced in the city?

Conclusions

Infrastructures and urban armatures appear as agencies capable of articulating the frictions between masterplans and action plans, between production and consumption, between city and territory, always from the large scale. Thinking again that “The Big can also be Beautiful” (subversion of Small Is Beautiful), is necessary to manage the metabolism of the different natural, social and economic ecosystems, always embedded in superior systems. What spatial frameworks can be generated through infrastructures, and what is their potential to negotiate the interests of different urban agents: public and private? Very different examples, such as the Brussels Canal or the Vienna metro network, serve as spatial frameworks for the new productive city: new urban mobility associated with industry 4.0.

In the case of Madrid, it is committed to the M-45 highway as the next study model for an infrastructure, able through a new spatial understanding, to avoid a dispersed growth that generates more inequalities and greater distances.

Now, it is an opportunity to explore the spatial synergies between the residential and the productive, as an interface between the city of Madrid and the southeast territory.

The *oceans* found in the research try to reduce inequalities, distances and segregation from the political scale, the technocratic agencies, the 2030 Agenda, the Spanish Urban Agenda, the urban development, the European context, and the world geopolitics, the Urbanocene. In the scale of the oceans we can also find the power of the infrastructures. The global.

The other types of research findings are *the corridors*. Here we place the hybrid models, the ambiguous morphologies, the innovative typologies, the emancipatory agencies, the tactical urbanism, the power of self-management, the communities, the blurred boundaries between forgotten territories, and the imaginary of the collective. The local.

Only by finding the missing connections between the oceans and the corridors will it be possible to develop inclusive city models capable of ensuring prosperity for all, without leaving anyone behind.

Research and research by design, a process of transformation. What is the next?

After this research, GdlF was commissioned by the City of Madrid for a research book about a New Madrid Mix, an Atlas of Innovation to develop a new economy in Madrid with a new productive model, especially to relaunch the southeast area in between the city and the territory, in this blurred reality. This book is included in the current strategic plan of the city. This could be also part of the symposium as a narrative of how to trigger the change in a City as Madrid through research.

Also recently, GdlF together with the Belgian office BUUR has been awarded with the second prize for the Bosque Metropolitano an ambitious transformation of a greenbelt of Madrid, 75km, with a proposal for the southeast area of the research.

The different researchs and practices are together an example of research by design as a process on the time.

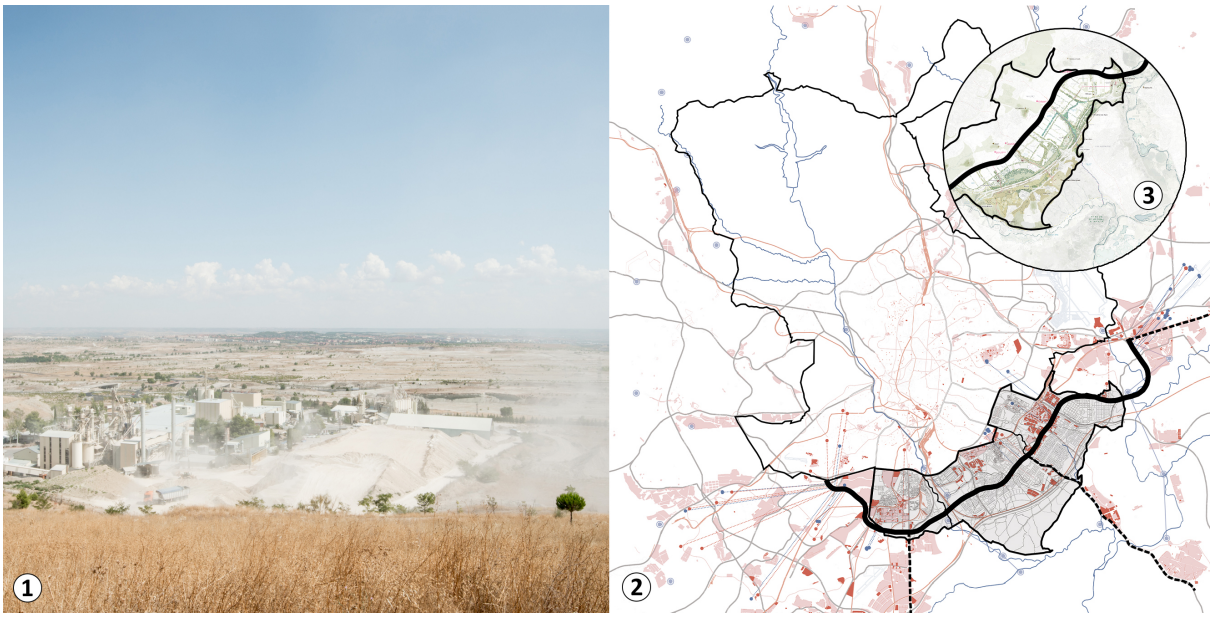


Figure 1. 01. Tolsa industrial area, a new interface between city and territory. ©Davide Curatola. 02. Research plan of the southeast Madrid and the role of M45 highway. ©GdlF and City of Madrid. 03. Bosque Metropolitano. ©GdlF and BUUR

Figure 01: industrial area of Vicálvaro, where Tolsa company transforms local raw materials (one of the largest deposits of sepiolite in Europe) into products for the construction sector. For years, the transformation plant was outside the city, literally hidden behind the Cerro Almodóvar. Nowadays, the new developments in the southeast exceed this urban limit, and the Tolsa industrial complex is perceived as the new skyline of Madrid. The starting conditions have changed, but the city still needs to be “fed”, also with construction materials. ©Davide Curatola. Urban Reports.

Figure 02: research plan of the Madrid southeast and the spatial role of M45 highway as an interface between the city and territory. ©Gutiérrez-delaFuente and the City of Madrid.

Figure 03: Bosque Metropolitano landscape design and territorial strategy for the southeast area of Madrid. Recently this proposal has been awrded with the 2nd Prize in an international competition. Proposal by Gutiérrez-delaFuente and the Belgian landscape office BUUR. ©Gutiérrez-delaFuente and BUUR.

... IN SPHERES OF UNCERTAINTY

ANTIFRAGILE STRATEGIES FOR IMPLEMENTING DESIGN PROCESSES IN UNCERTAIN TIMES

Author: Beatrice GALIMBERTI*

Contact e-mail address: beatrice.galimberti@polimi.it

Institution: Department of Architecture and Urban Studies (DAStU), Politecnico di Milano, via Bonardi 9, 20133, Milano, Italy

Keywords: Urban design; uncertainty; antifragility; public space; design process

We live in a time featured by a growing number of interconnected environmental, economic, social, and health crises. These crises are so frequent that Latour invites even to quit using the term 'crisis' as it may suggest reversibility. Indeed, he avers that "we are not in a crisis. We can no longer say 'this, too, will pass.' We're going to have to get used to it. It's *definitive*" (2017, p.13). By becoming permanent, crises fuel a diffused sense of uncertainty, so much that this contribution relies on the idea that 'uncertainty' is now one of the keywords of our time.

How does urbanism cope with uncertainty? The tradition of studies between urban planning and uncertainty has at least six decades of evolution. In contrast, the scholarship on urban design and uncertainty is much more fragmented. However, urban design practice is increasingly dealing with uncertainty. In particular, many recent design processes of public spaces have established a dialogue with uncertainty: but *how*? Among the possible ways of staying with uncertainty, there is one that is interesting but quite unexplored by urbanism. It is the ability to benefit from uncertainty, which, according to Taleb's definition (2012), can be called *antifragility*.

Taleb, a statistician expert of randomness, probability, and uncertainty, introduced this term to describe the functional opposite of *fragility*. He observed that *robustness* is commonly mistaken for the opposite of fragility. However, if a fragile system gets damaged by uncertainty –as well as crises, shocks, disorder, volatility, errors, ...–, then a robust system could not be considered the opposite because it remains just unaltered by uncertainty. Instead, Taleb argues that the opposite of a fragile system is one that improves and benefits from uncertainty. Since there is no word to describe this condition, he proposes to use the term 'antifragile.'

Investigating the relationship between fragility, antifragility, and robustness allow us to focus on a wide range of practical implications that affect the decisions we make. Indeed, if robustness is a safe condition, but it is not affected by context, antifragility is context-sensitive, adaptive, and able to deal with criticalities. An antifragile system is ready to change and take advantage of stress, disorder, imperfection, error, chaos, and chance –an excellent advantage in our time of uncertainty (Figure 1).

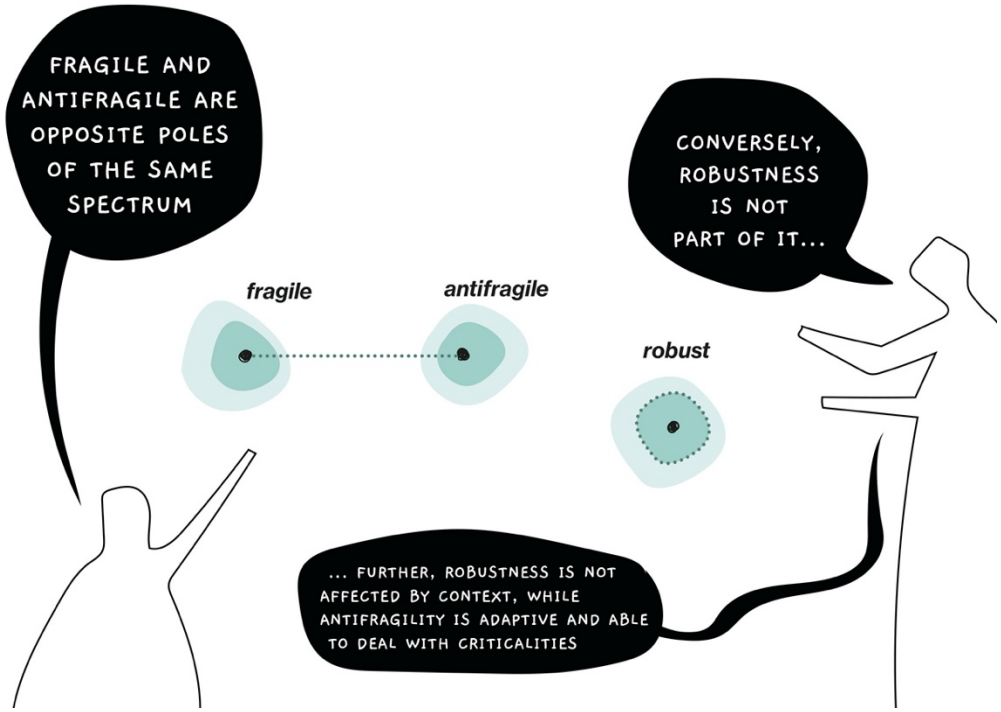


Figure 1. The relationships between fragility, robustness, and antifragility. Elaboration by the author.

Thus, this contribution defines and explores three antifragile strategies with which some public space design processes benefit from uncertainty. On the one hand, the aim is to seize the know-how –*metis*– (Bendiks and Degros, 2019) characterising the practice of design processes facing uncertainty; and, on the other hand, to interpret it in the light of the concept of antifragility.

The first of these antifragile strategies concerns the ability *to turn a crisis into an opportunity*. This is the case with the urbanism department of the municipality of Milan, which, in 2020, during the first lockdown, managed to trace in a few weeks about 35 km of temporary cycle paths. The intervention was so fast because it started from plans drawn up earlier, but on which no agreement had never been reached between the many stakeholders. In this respect, the pandemic was an opportunity to raise awareness of the urgency of alternative means of transport to the car and public transport.

The second strategy is about *learning from –design– errors*. For example, in Paris' Place de la République redesign (2009-13), the designers TVK not only learned from past errors by redressing the spatial configuration of the square –which progressively turned into a large roundabout during the 20th century– but also continue learning from present configurations, uses, and small mistakes –the daily variability–, with an open online blog that is a permanent observatory on the square.

The third strategy introduces *a margin of spatial uncertainty*. This is the case of many shared spaces, as they aim to design human-sized streets by removing separations and traffic signs among sidewalks, cycle paths, and roadways. The case of Sonnenfelsplatz in Graz by Kleboth und Dollnig, Komobile, and Sammer (2009-10) is particularly interesting for two reasons. First, this intervention results from a participatory process conducted together with the municipality, which allowed to overcome the initial diffidence of some inhabitants and city users and involve them in the co-design of the space. Second, the square was subjected to a rigorous traffic survey that showed how introducing a bit of uncertainty in the space configuration has raised awareness in those who cross it, significantly decreasing road accidents.

Antifragility is a promising lens to interpret and open strands for today's design processes –as for designers and all the other figures involved. However, it is not alone. In conclusion, the contribution expands to a broader dimension, observing that in recent years, several designer and researchers are working and reflecting on approaches that explore different ways to dialogue with the uncertainty of our time. Among these, in addition to antifragility, there are: *minor urbanism* (Sandström, 2019), which uses the cracks in the major practices of urban design to transform them from within; *open design*, which does not plan the result in advance and opens up to the emergent, the latent, and the unexpected (Porqueddu, 2018); there are also many forms of *temporary and meantime urbanism*, which test spatial configurations and alliances between stakeholders in the short term, before any permanent transformations. If looked at as a –plural– whole, these approaches suggest a new mindset for designers of *territorial projects* to stop unsuccessfully trying to avoid the uncertainty of our time and start embracing it.

Interviews with 'reflective' practitioners, literature review, direct observation, and desk analysis are the basis for the different parts of this work. All the topics covered are part of the ongoing PhD research *Design with(in) uncertainty. Exploring antifragile strategies from design processes of public space in today's Europe* that the author is carrying out under the tutorship of Prof. Bonfantini (DAStU, Politecnico di Milano).

References

Bendiks, S., and Degros, A. (2019) *Traffic space = Public space. Ein Handbuch zur transformation. A handbook for transformation*. Zurich: Park Books.

Latour, B. (2017, ed.or. 2015) *Facing Gaia. Eight lectures on the new climatic regime*. Cambridge: Polity Press.

Porqueddu, E. (2018) 'Toward the open city: design and research for emergent urban systems,' *Urban Design International*, 23, p236-248.

Taleb, N.N. (2012) *Antifragile. Things that gain from disorder*. New York: Random House.

Sandström, I. (2019) *Towards a minor urbanism. Thinking community without unity in recent makings of public space*. PhD thesis, Lund University.

THE USE OF INDIVIDUAL VISIONS FOR A COMMON GOAL

Author(s): LILLI LIČKA*, HANNES GRÖBLACHER

Contact e-mail address: lilli.licka@boku.ac.at

Institution: University of Natural Resources and Life Sciences, BOKU, Vienna, Institute of Landscape Architecture, Peter Jordan-Straße 65, 1180 Vienna

Keywords: park, vision, self empowerment, landscape architecture, urban development

At present planning authorities tend to be more progressive in conceptualising than in realising ideas. European city development programs are full of ambitious intentions when it comes to social equity, to climate change mitigation strategies, to mobility transformation, and to participation (c. f. Furchtlehner et al. 2021). In cities like Madrid, Barcelona and Paris many of those ideas are implemented on an experimental track, starting with Superblocks and ending with pop-up cycle paths. Other cities, like Copenhagen and Oslo are keen to fulfil climate goals through enhancing active or e-mobility and banning parking from city centres. The city development plan 2025 of Vienna is one of those documents describing ambitious goals and comprehensive measures subtly merging bottom-up and top-down strategies (Lička et al. 2020). The term 'tactical urbanism' has even made its way into politicians' speeches. Nevertheless, the outcome on site, i.e. in public space, is repetitive, superficial, and defensive rather than courageous. As a reaction the call for visionary practice is easy at hand, yet it is hard to realise.

This paper aims at thoroughly reflecting a real-life experiment which strategically develops a utopian idea in order to challenge prevalent regular planning processes: the vision of a linear park in the densely built up Gründerzeit area in Vienna: Westbahnpark. In the 15th district of the city of Vienna we find a number of superlatives: it is the most densely populated, and the poorest district, the youngest, and the least green and it houses the largest number of inhabitants of migrant background. Furthermore, it is cut in two by a railway track – the former Empress Elisabeth Railway – leading to today's Westbahnhof. This railway triggers the vision of a park because it has produced an exceptional urban landscape with obvious spatial qualities offering a straight view out of the built-up city into the Vienna Woods, a protected landscape of woody hills in the west, as well as a view into the baroque park of Schönbrunn castle. In this dense district a view is an exciting experience along with a narrow and straight stroke of land of more than 1kilometre length.
The planning system in Vienna constantly shifts between restriction and paternalism. It is proven to produce a liveable city but leaves extraordinary moves aside. The experiment Westbahnpark started out on this observation intending to trigger people's own fantastic ideas of a possible utopia. "BLA.-office of droll concerns" , a performative group of a landscape architect, an artist, and an architect projected a future for this area which was intriguing, inventive, and fun. This sounds a first step of a usual landscape design, projecting a possible future onto a sight (or rather a piece of paper) (Kretz 2020). In this case the invention was not on the side of the designers, who purposefully refrained from exposing designs, realistic renderings or other professional imagery. On a number of journeys into the future interested people were guided through the terrain and explained through earphones how it had been changed into the park, how planning policy has developed and which inventions were applied. The visitors' imagination was stimulated by actors in swimming suits in front of the depot buildings, readers in the steep meadow, passers-by blowing bubbles.

Figure 1. Action Instead of Renderings to Trigger Imagination, 2019, Foto: Jo Hloch.
(foto taken during a tour on site guided by BLA., www.bla.zone)

Westbahnpark is an ongoing process, drawing from international examples such as Park fiction in Hamburg, Dalston Eastern Curve Garden in Hackney, London, or Park am Gleisdreieck in Berlin. In the paper we will explore, if and how this way of pushing the envelope is apt to get a vision on the ground. We will explore media reaction, public perception, and citizen's activation and describe the reaction by the landowner, the planning department and local politicians. We will conclude by projecting scenarios of possible outcomes.

Impressum

Herausgeber: Univ. Prof. Aglaée Degros, Dr. Eva Schwab, DI Sabine Bauer, Institut für Städtebau, URBA Graz
Projektteam: Univ. Prof. Aglaée Degros, Dr. Eva Schwab, DI Sabine Bauer, Marie-Theres Schwaighofer

Kontakt: Institut für Städtebau
Fakultät für Architektur
Technische Universität Graz
Rechbauerstraße 12/II, 8010 Graz
Tel: +43/316 873-6286
Fax: +43/316 873-6280
E-Mail: m.haselbacher-berner@tugraz.at
Web: www.stdb.tugraz.at
Facebook: www.facebook.com/stdb.tugraz.at

Fotos: Martin Grabner