SITUATED LEARNING IN A THEORY COURSE ON URBANISATION: LESSONS FROM BANJA LUKA

ABSTRACT

Many theoretical and methodological efforts have been made to extend the disciplinary field of architecture and urbanism from the urban in the traditional sense to the larger territorial scales of contemporary urbanisation. This paper discusses the ways of studying the dispersed and polymorphic urban form that still needs to be understood. The discourse is developed around the situated learning model adequate for understanding the planetary urbanisation theory and the dispersed city. The learning model is applied inside the Urbanisation in the Western Balkan Countries course at the master’s studies in Architecture and Urbanism (University of Banja Luka). The situated learning model engages students in the research of real-life context, culture and situation, and therefore, connects the theories of large-scale urbanisation with the inquiry about familiar space. Furthermore, the learning approach advocates an inquiry-based strategy to learning about urbanisation and a dispersed urban form in theoretical courses. The course employs the techniques typically taught in design studios, such as mapping, collage imagery and three-dimensional modelling. The paper could contribute to the considerations on the education of architects as professionals that will deal with the growing scales of contemporary urbanisation, specifically in the Western Balkan countries.

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INTRODUCTION: LEARNING ABOUT CONTEMPORARY URBANISATION

Contemporary urbanisation worldwide is characterised through the expansion and reshaping of rural and natural areas and, at the same time, transforming historic city cores. In a fast changed urban landscape, the boundaries between the cities and their surroundings are not easily definable. A city can hardly be seen as a spatial and functional whole, while its large-scale perimeter is characterised by highly dynamic forms and sizes. In short, compared to the traditional city, the new city is vast, dispersed, without strict functional distinctions, with elusive boundaries and with many centralities. Thinkers in the field of urban studies put forward the urgent need for the new theory of the urban, confronted with the discrepancy between the urban theory, design practices and the real social and environmental change on a planetary scale.\(^1\) The question for architectural education and pedagogy is how to learn about contemporary urbanisation in the context of its undeveloped comprehension and theoretical premises?

The most elaborated theoretical reactions to contemporary urbanisation come from the advanced urbanism research hubs, such as Urban Theory Lab (Harvard Graduate School of Design), Future Cities Laboratory (ETH Zurich), Contemporary City Institute (ETH Studio Basel), and TU Delft. They offer emerging approaches to the study of the new urban fabric and socio-spatial configurations on different scales. Also, they reach for an understanding of the urban transformation, comprising both built and unbuilt environments and landscapes. These research practices put forward the benefits that design disciplines bring to dispersed city consideration: synthetic ways of thinking, rooted in urban history knowledge and sensitivity to cultural differences.\(^2\) Some of the research approaches are put in further testing in Master’s programmes and courses, such as the Architecture of Territory – the platform that groups several theory and studio design courses at ETH Zurich, or the Master’s programme in Urban and Territorial design at Habitat Research Center and École Polytechnique fédérale de Lausanne. Although these study programmes have a different problem focus, they all adopted inquiry-based strategies to learning about urbanisation and a dispersed urban form.\(^3\)

The Urbanisation in the Western Balkan Countries course at the Architecture and Urbanism Master’s studies at the University of Banja Luka follows the same learning perspective.\(^4\) The course provides an understanding of the historical and contemporary growth of cities and theories about their transformation. The course takes on an inquiry-based approach inside the theoretical curriculum and further argues for the situated learning model.\(^5\) Situated learning means
inquiry about real and lived space, and it engages students in historical and theoretical research in their socio-spatial milieu. Situated learning translates the urbanisation and dispersed form from abstract theoretical descriptions into the actual place of everyday experiences. Furthermore, it leads to an in-depth understanding of the theory using it as an analytical device. This article, firstly, presents the theoretical and methodological framework of the course. More precisely, it demonstrates how the theory of planetary urbanisation and the metropolitan form concept was integrated into the research strategy of a specific urban territory. Secondly, it presents the research results obtained in the period of four years of the Urbanisation in the Western Balkan Countries course implementation. The subjects of the course inquiry were urbanisation and the urban form of Banja Luka, the city in Bosnia and Herzegovina. The discussion aims to contribute to the pedagogy and education of architects in the context of growing scales of contemporary urbanisation.

1. URBANISATION IN THE WESTERN BALKAN COUNTRIES – A THEORY COURSE

Urbanisation in the Western Balkan Countries is an obligatory theory course that enrolled the fifth generation of students in the fall of 2021. The number of students over five years varied between five and twenty per year. The course links the historical development and contemporary urban condition of cities in the Western Balkans to the main theoretical body on urbanisation. The course content is structured according to three learning outcomes. Students are expected to acquire the knowledge about the key theoretical interpretations of contemporary urbanisation and urban form. Since it is a part of architectural education, the course focuses on the spatial dimension of urbanisation. Furthermore, students are expected to acquire the knowledge of the historical process of urbanisation in the Western Balkans context through its specific morphological patterns on different spatial scales. It is developing awareness of the urban heritage in the Western Balkans and its restraints and potentials in the context of contemporary urbanisation. Finally, by the end of the course students are expected to have developed skills for critical thinking and argumentative and logical description of learning results, contextualised in architectural and design culture.
1.1. Theoretical Framework Of Learning: Planetary Urbanisation And Metropolitan Form

Many theoretical and methodological efforts have been made to extend the disciplinary field of architecture and urbanism from the urban in the traditional sense to the larger territorial scales of contemporary urbanisation.\(^6\) Discipline adjustment and a larger view are necessary against the classical architectural understanding of the city. The new urban condition was first recognised by urban theorists at the beginning of the twentieth century. The sociologist Georg Simmel called it a *metropolis*.\(^7\) The concept of a metropolis was not a simple synonym for a new form of a city, ‘but, on the contrary… the manifestation of a distinctively modern spatial-productive logic which opposes and unsettles it.’\(^8\) Then the overwhelming transformation of a traditional configuration and the experience of the city as a dense, walkable, and core-dominated unit was evident in the fifties. The image of a metropolis came forward through post-war decentralising urban politics, such as the construction of large-scale infrastructural systems, demolition of old city centre neighbourhoods, and spreading of low-density peripheral fabric. Today, these environmental transformations are even more extreme and extend to villages, farming fields, forests, deserts, wetlands, etc., producing new social and spatial relations. The concept of *planetary urbanisation* comprehensively describes the contemporary urban condition. But, radical in the seventies, the hypothesis of the planetary scale of urbanisation as Henry Lefebvre called it in *The Urban Revolution*, hardly can be considered a hypothesis today.\(^9\)

Urbanisation changed the cities from centric formations to the new polymorphic fabric deeply extended in the once rural and natural environment. But the growth of urban fabric is not a banal extension of the concentrated city. It is a simultaneous process of ‘implosion’ and ‘explosion’\(^10\) with three mutually constitutive ‘moments’: concentrated, extended, and differentiated urbanisation.\(^11\) Urbanisation is still the concentration of population, and means of production and investment, as commonly seen, but also it involves the operationalisation of distant places, territories, and landscapes. They support the economic and social way of life of urban agglomerations. At the same time, the previously emerged and inherited socio-spatial configurations are constantly being changed and ‘creatively destroyed’ to make room for new, therefore differentiated ones.\(^12\)

There are three ‘dimensions’ through which the ‘imploded’ and ‘exploded’ fabric could be comprehended as well. Referring to Lefebvre’s theory of space
dimensions are defined as spatial practices, territorial regulation, and everyday life. The dimensions explicate the urbanisation not only as the intensive production of the built environment that embed the urban functions but also as the production of various kinds of rules concerning land, labour, and resources, formal procedures of planning, and management of territorial development. At the same time, urbanisation is materialised through everyday routines and practices of people who use and appropriate the urban fabric.

The thesis on urbanisation as a process explicitly put forward by Henry Lefebvre has been developed through the work of critical urban thinkers such as David Harvey and, more recently, Neil Brenner. Urbanisation is a dynamic and historically evolving process that materialises itself across different socio-spatial configurations and various scales. Important for the research on the spatial dimension of urbanisation is the focus on spatial scales. In this alternative approach, urban space was delineated not through a horizontal contrast of cities to other (suburban or rural) settlement zones, but instead through a vertical positioning of urban scales within dynamically evolving, multilayered organisational-geographical configurations. Therefore, urbanisation can no longer be comprehended as a universal form, settlement type, or bounded spatial unit. An important part of the inquiry on urbanisation is the multiscale perspective. The question of scale is important here not just as the theoretical premise of planetary urbanisation, but as methodological as well.

Another theoretical study important for learning about urbanisation and today’s urban form is the metropolitan landscape theory. This approach to the urban brings together the various scales of dispersed urban fabric and brings the concept of landscape in focus. According to the theory, the concept of landscape is the main methodological device that enables the composition of basic metropolitan forms that ‘addresses fragmentation and disorientation’. But it does so without relapsing in the hierarchy-based organisation of the traditional city that has proven inadequate for the metropolitan condition. The theory proposes the identification of fundamental patterns of metropolitan form (‘basic forms’ or ‘archetypes’) and the possibilities of their composing into new formations – the design of metropolis.

The metropolitan landscape theory recognises the three basic patterns of the metropolitan form: flowscapes, plantation and landscape theatre. Reduced to their formal and spatial properties they exist on different scales and constitute a metropolitan landscape. The flowscapes are linear structures in which the road is the main spatial, functional and visual backbone. Infrastructural ‘lines’
became the cultural phenomenon of our time and the mediums of human-environment experience through movement. Plantations are the urban surfaces under the programme with diverse morphological properties. They can be large, and as such, developed through time with the urban programme as the main ordering principle (dwelling, work, leisure, etc.). In addition, they can be spatially autonomous urban islands. The landscape, in this case, gains architectural expression through the interaction of the new programme grid and existing natural and cultural framework usually seen as a substrate for design. The landscape theatre refers to urban voids, unbuilt space in the inner city locations and those distant from the city centre, where natural processes are inherent, visible and exposed to human experience.

The analytical apparatus of the metropolitan landscape theory was supplemented with the fourth pattern based on previous research by authors of this text. This spatial pattern the authors propose as a distinctive fourth archetype of a dispersed urban form is called the carpet. It consists of the collage of green bits and pieces, separately covered with trees, crop plants or grass, and tailored according to heterogeneous geomorphology. It also contains sparsely arranged built structures of different sizes, sometimes in small groups and commonly near the local roads. This pattern is characteristic for the Bosnia and Herzegovina context.

1.2. Methodological Framework Of Learning

The Urbanisation in the Western Balkan Countries course integrates conventional and specific learning forms. Conventional learning forms integrated into the course are lectures with discussions and a colloquium as a student’s critical reflection on selected literature in series of short presentations. The specificity of the theory course stems from the teacher’s decision to dedicate a part of the course to research. Therefore, the overall learning methodology applied in the Urbanisation in the Western Balkan Countries course is inquiry-based. Research is understood as the producer of knowledge in the context of the course content.

Research is conducted individually, in small groups and at the generation level with a smaller scope, and with continuous consultations with teachers. It is important to note that each generation of students has a defined programme of comprehensive research, but those four years of research within the course should be viewed as a whole. Although the research is not conceived in
advance as a four-year project, the integrity stems from a reflective view of the experience and results of the previous generation that significantly influences the goals of the next. Since it was the inquiry of the specific territory and the results were not known in advance (therefore it is not an exercise), students and teachers reflected on the chosen methodology and revised the path if necessary during every year. Of course, students of one generation did not experience different topics and research methods discussed during the four years. However, each subsequent generation of students was familiar with the inquiry results of the previous ones. The learning methodology is, therefore, student-focused with students as participants in knowledge creation. Since the students are writing essays or seminar papers and have a consequent discussion with teachers, the link between the research and learning is also research-tutored. The direction of knowledge production is two-way because the students’ investigations helped the teachers to further their research.

The specific model of inquiry-based learning applied in the course is the situated learning model. The model stresses the relation between the cultural and social context and learning. Knowledge is linked to a specific task within a particular context in a given social environment, and therefore learning is situated. The students were learning about urbanisation and urban form through inquiry about the urban form of Banja Luka. They were linking the contemporary theories of urbanisation and the analysis of a familiar territory. After reading the course materials on urban history and theory, students were challenged to read the city itself in their seminar assignments.

The urbanisation and urban form of Banja Luka were researched through historical transformation and contemporary conditions. Following the theoretical framework, the research relates the urban form to three dimensions of urbanisation: spatial practice, spatial regulation and everyday life. The contemporary urban condition inquiry was separated into two parts. One generation of students was studying urban form related to spatial regulation, while the other to spatial practices and patterns of everyday life. The research of each student involved three steps in which space is observed through different scales. They are named as describing the large, finding and describing the small, and relating the large and the small. Dialectics of scales are bringing forward the awareness of a large-scale urban territory, not only as a morphological, infrastructural and planning issue, but also as a place and human habitat. This kind of approach calls for the phenomenological and qualitative dimensions of research, with a mixture of research tactics. They included the data collection and document analysis, map studies, and in the last year, the field research.
as well. Besides maps, diverse techniques of architectural description and representation were used, such as a photo essay, diagrams, collages, sketches and axonometric drawings.

2. INQUIRY BASED LEARNING: LESSONS FROM BANJA LUKA

2.1. Urbanisation In Historical Perspective

The historical research of urbanisation of Banja Luka from the end of the nineteenth century through to the present was divided into five periods as distinct research projects. The periodisation stems from the city’s urban history, usually described by five different narratives in socio-political, cultural and spatial terms. They all left recognisable traces on contemporary urban culture. Every period is observed through several spatial scales. The research was repeated for two years. The results from the first year were partially used in the second year to reduce the time for data collection and document analysis and to get stronger conclusions on each research aspect.

2.1.1. Describing The Large

In this step students were reconstructing the urban form concerning the wider territory, topography, planning regulation and socio-political context. They were producing several maps of the urban territory on the same scale, according to the analysis of relevant literature, periodical journals, planning documents and historical photography. Among the conventional territorial maps, students also produced more site-specific maps, indicating distinct cultural and social elements of urban territory (Figure 1).

2.1.2. Finding And Understanding The Small

In the next step, the smaller scale patterns were recognised and described, each rooted in the historical period through which the city is produced and lived. The pattern features were described morphologically and functionally, but also in the context of regulation and everyday life. The scale of inquiry was not prescribed but discovered, with various techniques of description and representation. The results were diverse and included diagrams, collages, sketches and axonometric drawings, sometimes positioning everyday life scenes from historical photographs juxtaposed with maps of geopolitical-political narrative into a dialectical position (Figure 2).
**UP: Fig. 1.** Mapping the large (students: Maja Radmanović and Dajana Papaz)

**DOWN: Fig. 2.** Axonometric view on the small (students: Isidora Gaćić and Vanja Đurđević)
2.1.3. Relating The Large And The Small

In conclusion, students produced a synthesis map for each historical period, showing the distribution and composition of spatial patterns along the centralities, borders, and networks (Figure 3). Besides the maps, the seminar works depicted relevant documents and photographs as a part of the historical narrative.

The essential character of urbanisation and urban form was recognised in each period. Consequently, Banja Luka was co-named based on discovered socio-cultural and morphological characteristics, such as ‘city along the railway’, ‘modern city’, and ‘city of fragments’. The new concepts were accompanied by a rich original material presenting urban history and urbanisation features. The general conclusions illuminated a longitudinal expansion of the urban fabric following the main road as an axis until the second half of the twentieth century, when the city began to expand in a transverse direction, more concentrically. At the same time, the smaller portions of the urban fabric were formed in more distant places and separated from the central to merge over time. The maps depicted that the city centre was re-established along the main road axis through several historical periods, moving from south to north. The urban form was generated through the permeation and almost equal representation of built and open space in all the historical periods. Banja Luka has never taken the form of a densely built European city but a very porous urban form. The disintegration of sharp boundaries of urban form started in the second part of the twentieth century.

Fig. 3. Understanding the large by mapping the small (students: Srđana Borković, Jelena Kretić, and Tamara Paštar)
Students also identified and described specific spatial patterns for different historical periods. For example, small ensembles of family houses with green courtyards organised around the mosque on the slopes along the river (mahala) are recognised as a characteristic socio-cultural and spatial framework for everyday life and units by which the city grew during the rule of the Ottoman Empire. One of the urban patterns in the period of Austro-Hungarian rule was a green boulevard. It was surrounded by residential villas and usually completed as a cul-de-sac with an administrative building on the end of the axis. Besides the residential neighbourhoods built in the second part of the twentieth century (stambena zajednica and mikrojeon), the factories were dominant working places, but also the confluencies of social and cultural life. Both patterns were the basic spatial units of city planning at the time. In Banja Luka’s urban form today, historical patterns are overlapping, touching, superimposing, and creating a colourful collage in the city map and everyday life experience.

2.2. Contemporary Gaze On Urbanisation

2.2.1. How Is The City Growing Today?
The correlational research ‘How is the city growing today?’ was done in 2019 by a small team of six students. By investigating the administrative territory of Banja Luka (1238 km²), the research aimed to understand the contemporary urban form concerning the urban planning regulation. How does the spatial dimension of urbanisation, in reality, correspond to the urban form visions in planning documents? Which elements of the form are subject to regulation and to what spatial scale? What are the regulation paradigm and mechanisms applied? The urban form was investigated with regard to three planning regulation themes: territorial scope of planning documents, mobility network, and landscape protection. Each theme is analysed in three steps concerning the scale.

2.2.1.1. Describing the large
The first step was mapping the contemporary state of urban form. The mapping was done by using the most recent planning documents and orthographic photography for an update. It was supported by analysis of several planning documents and relevant laws and rulebooks. The first map showed the contemporary urban form with a description of a built structure, open spaces and green structure. The second set of thematic maps was done on the same scale, representing the coverage of the territory with planning documents and the administrative division of territory, mobility network, and categories of
protected land. The comprehensive map study with conventional techniques of map representation was followed by an in-depth description of contemporary urban form and its features in the planning documents (Figure 4).

2.2.1.2. Finding and understanding the small
Based on data from the previous step, students identified spatial regulation mechanisms on a smaller scale and the spatial elements regulated concerning the three themes. The basic concepts within the plans were recognised and described, such as the system of centres, green belts, cultural landscape, etc. A brief history of the concepts was reconstructed from the previous plans. The scale was not prescribed but discovered, and the technique of description and representation was of free choice.

2.2.1.3. Relating the large and the small
The last phase in the research was the comparison of the large-scale maps from the first step. The students were putting in correlation the existing condition of the urban form and the thematic layer of the urban form as it is envisioned in the planning documents. Furthermore, smaller-scale spatial patterns, resulting from regulatory mechanisms and planning considerations, were observed in the context of large-scale territory. Their role in the formation of the urban fabric was discussed.

Students learned that a large part of the city’s administrative territory, which is changing intensively, is covered only by the City Spatial Plan without adequate regulatory mechanisms on a smaller scale. That could be called the blind spot.
of urbanisation when it comes to planning mechanisms. At the same time, the regulatory plans covering a smaller part of the city urban core are often changed, sometimes only because of one smaller plot. From the perspective of the regional and city policies, the envisioned network of urban concentrations is planned to grow and expand by defining the close construction perimeter around the existing built areas. The network of urban centres and other settlements are supposed to welcome new urban services and functions as a part of Banja Luka ‘metropolisation’ vision. The control of this urban condensation and densification strategy is supported by a selection of territories that will be covered by planning documents.

Banja Luka on site is not following this plan of the urban condensation network. The majority of the city territory, that is not planned for construction or protection, is extensively under transformation. The question of that ‘other’ land remains open. On the other hand, the growth of the urban form is directly related to the planned road network and it directly affects the spatial dimension of urbanisation. In general, the urbanisation narrative of Banja Luka in policies is fundamentally functional. The space is understood as an exploitative resource (‘productive’ and ‘nonproductive land’) for urban development and growth and it is controlled sporadically with restrictions. The open spaces are overlooked as compositional elements of urban form, and as a means of urbanisation control. The architectural view on qualitative properties and values of spatial morphology is almost entirely neglected.

2.2.2. Qualities Of Urban Form

The qualitative research entitled Qualities of Urban Form: Lessons from Banja Luka was conducted in 2020. It covered the administrative territory of the city. The research focused on the description of today’s urban form. The intention was to recognise and describe form qualities in the social and ecological context on different scales. The research is based on the metropolitan landscape theory application. The theory defining morphological properties based on scale dialectics and place experiences was considered appropriate for the inquiry about urban form related to spatial practices and everyday life. The seminar papers were based on the description and representation of the metropolitan landscape of Banja Luka through four distinct spatial patterns (flowscape, plantation, landscape theatre, carpet), their characteristics, distribution and composition within the city territory.
2.2.2.1. Describing the large
To understand the metropolitan landscape theory, the students drew a diagram of each of the four patterns by following their theoretical description. They showed the basic spatial elements of the patterns, their relation as well as the general human perspective through which the pattern is predominantly experienced (moving by car, staying in a small open space, etc.). In the next step of the research, patterns were mapped individually inside the city territory and then assembled with a clear perspective on their relationships in the composition (Figure 5). The map study was followed by discussions about each pattern presence, morphological characteristics, and territory composition.

2.2.2.2. Finding and understanding the small
The research was continued on the territorial samples 1km x 1km or 1km x 2km size distinguished from territories previously categorised as one of the four patterns. Map study of the small-scale areas represented the relations between the figure/ground ratio, green structure, mobility network and urban functions (Figure 6). Axonometric views of specific parts of the sample territory depicted the most pronounced characteristics of the pattern, along with the photo essay named poetics of the everyday. Identifying and describing the urban functions, abundance of green structures, temporal layers of space and the use of open space was a significant part of small-scale research.

2.2.2.3. Relating the large and the small
The sample analysis (four for each pattern) intended to bring forward the general characteristics of four patterns concerning their social and ecological qualities, coming from their smaller-scale structure. Moreover, the analysis of the spatial

Fig. 6. Understanding the small (student Jovana Janjić)
relationship of one pattern to other types of patterns, such as the overlapping or linking, was aimed at understanding its morphological and functional origin. Finally, the role of each pattern in the characteristics of urban form on the scale of the entire urban territory was analysed and discussed, taking into account its social and ecological qualities.

Students recognised three layers of the metropolitan landscape composition of Banja Luka: the city core, belt area and wider area. The city core and its surrounding belt have much denser built fabric than the rest of the city territory. It is possible to identify it with the plantation pattern on a larger scale view. The thick core fabric has an irregular and porous edge, penetrated with finger-like unbuilt areas along the perimeter. Many unbuilt spaces (voids) of different shapes and sizes are embedded in the form of the city core area, equivalent to the theatre patterns (Figure 7). From the relatively dense core, the built tissue expands linearly in several directions, and from there it expands linearly again in several directions in a smaller size, forming the fractal-like formation. Therefore, the flowscape pattern is also present in many sizes. These elongated structures are following the road capillary organisation. Where it is not dominantly linear, the edge of the built core dispersedly expands towards the open landscape.

Generally, the city core is one large plantation and the belt area is a dynamic collage of plantations, flowscapes and theaters of different sizes and shapes. The belt area contains the most diverse building and open space morphology, the amalgam of megastructures, small houses and a vast palette of infrastructural elements. The rest of the city territory is characterised by a different pattern of small-grained built fabric, evenly and finely distributed all over the green

Fig. 7. Understanding the large by mapping the voids (student Ilić Stefan)
landscape of ‘non-urban’ area. It could be seen as a distribution of small-size plantations. However, its genealogy is different and it is identified as the carpet. This pattern is created beyond the overall plan or programme, house by house, road by road, and plot by plot over a long period. The small pieces of built space, forests, agricultural land and grasslands intertwine in a distinctive urban landscape. It is ingrained in diverse geomorphology, from valleys and hills of mild contours and tame appearance to the slopes of mountain ranges. The carpet pattern also represents a kind of transformation of rural fabric and culture into the urban. The change occurs not through the expansion of the existing urban but the differentiation of the remote rural fabric.

3. DISCUSSION

Observing the course at the one year level, students have acquired the knowledge about the theory on urbanisation process, urban form, and the historical transformation of cities in the Western Balkan countries. Focus was given to the theory on planetary urbanisation and concept of a dispersed city. Furthermore, students gained the practical knowledge of recognising the spatial patterns of urbanisation on different scales. They learned to read the spatial patterns as the compositional and functional constituents of urban form on a large scale. Also, they learned to read the contextual connection of spatial patterns with the dominant spatial ideology and culture of everyday life. Uncommon for a theory course, students improved research skills through team and individual work and by combining different techniques of theoretical and historical research with the techniques of spatial analysis and fieldwork.

Besides the improvement of knowledge of local urban history, the historical inquiry offered students the platform for understanding urbanisation as a socio-spatial process over a long period. Through this inquiry in the first two years of the course, students learned to identify the key characteristics of urban form transformation on different scales and understand its embeddedness in the social and cultural context. Therefore, the research provided knowledge about the emergence of the contemporary urban condition through the twentieth century and a better understanding of its contemporary characteristics. It offered the comparison of urban landscapes and everyday life through historical periods and thinking about the concepts of development, transformation, memory and erasure. In other words, the students linked the insights from the historical inquiry about specific territory with the theoretical premises about urbanisation. The inquiry about urban form and planning regulation in the third year of
the course offered students an understanding of the relationship between urbanisation and planning instruments in a specific context and planning model. By acknowledging inconsistency between the planning vision of urban space as compact and dense and existing urban form as porous and dispersed, students became aware of how the planning efforts to direct urbanisation are not always productive. The plan, as the main outcome of the planning practice and the crucial regulatory mechanism of urbanisation, failed in coping with real-life processes. More generally, it enabled them to understand that the rational planning tradition still applied and based on the hierarchical spatial order and linear scenario is hard to relate to the complex contemporary urbanisation processes. Nevertheless, students gained knowledge of the local urban planning system, learned how to read the city from planning and other regulating documents and learned how to critically observe them.

The territorial inquiry within the administrative boundaries of the city was timely recognised as a weak point of the research. Nevertheless, it was conditioned by the lack of spatial data. Observing the urban form as a much larger territory would enable students to identify the actual directions of the urban explosion and implosion and their relation to the administrative boundaries of cities and municipalities. Furthermore, due to the domination of large-scale investigation and graphic representation, more diverse spatial scales could be incorporated into future research on urban form regulation. At the same time, an in-depth reading and analysis of large scale maps resulted in an interpretation of the relationship between built structures and underlying landscape and valuable preliminary identification of local patterns of dispersed urban form. It was concluded that the open spaces were overlooked as compositional elements of urban form and as a means of urbanisation control in planning documents.

The research on the metropolitan landscape in the fourth year enabled students to understand the contemporary urban form as a large-scale territory and dispersed and polymorphous fabric. It also enabled them to acknowledge the existence of specific urban landscapes compared to the concept of a dispersed city that is learned from literature and lectures. Through this inquiry, the urban form was related to spatial composition and the use of space at the level of a larger territory, and everyday life experience. In other words, inquiry enabled students to see the urban form in the function of the urbanisation process by following the dimensions of spatial practices and everyday life as well as to identify qualities of dispersed urban form in that context. Open spaces of different sizes and morphology are recognised as equally important structuring elements of a dispersed urban form, just as built spaces. Their social and ecological properties are of the highest value for the future of a dispersed city.
All student seminar assignments were structured methodologically through the dialectics of scales, presented here as describing the large, finding the small, and relating the large and small. This method enabled students to understand the concept of a dispersed city through practical experience of inquiring different spatial scales and discovering their relations, in which horizontal separation of categories of the urban, rural and natural is no longer applicable. In this context, the urban was conceptualised less as a bounded territorial unit than as a socio-spatial relation embedded within a broader, dynamically evolving whole.\textsuperscript{24} The study of the large territory of a dispersed city on a smaller scale enabled a qualitative and phenomenological observation of the urban inherent to architectural profession. Scale dialectics can play an important role in the potential bridging the planning and design disciplines and bringing together social, cultural and spatial issues in the transformation of urban landscapes.

CONCLUSION

The presented case study of the theory course on urbanisation aims to contribute to the discussion on architectural education. More precisely, it aims to enrich a discussion on pedagogical approach and learning models in the specific context of elusive comprehension and undeveloped theory of contemporary urbanisation. The new urban condition could be called, in Donald Schön term, a ‘messy, indeterminate situation’ for architectural practice, but education as well.\textsuperscript{25} ‘Because the unique case falls outside the categories of existing theory and technique, the practitioner cannot treat it as an instrumental problem to be solved by applying one of the rules in her store of professional knowledge.’\textsuperscript{26} The contemporary urbanisation is ‘not in the book’ of technical rationality and calls for a new approach to learning.

The Urbanisation in Western Balkan Countries course chose an inquiry-based learning within the theory curriculum and the situated learning model as adequate for studying contemporary urbanisation and urban form. Inquiry-based learning produced several benefits. As a pedagogical manoeuvre, certain theories of urbanisation were translated into a research strategy and analytical tool and as such used by students in their inquiry. Thus, learning about urbanisation and urban form went through strategic concepts and perspectives that contemporary theory finds relevant. Such an approach enables students to clearly understand the specific theory and acknowledge the relevance of theoretical knowledge in research-based activities. As a learning model, research led students to capture the complexities of the urban phenomenon through personal research experience and case study method.
While research can be done in many ways, the course employed the situated learning model that brought forward the inquiry of real and lived space. For a better understanding of the course content, the situated learning model offered an effective way of translating the concept of a dispersed city into the actual place of everyday experiences and students’ socio-spatial milieu. The model engaged analytical activities that connected theories of urbanisation with the analysis of familiar space. Therefore, students contextualised, or more precisely situated, their theoretical insights and further connected them to problem-solving skills to analyse the past and the present urban condition. Such knowledge could provide an inspiration and data for their future work.

The overall approach equipped students with new methodological and intellectual skills for inquiry of contemporary urbanisation and urban form. The research methods applied do not belong under a rigorous scientific domain but are more open, creative and contributive to the design way of thinking. The application of analytical methods common to design courses resulted in creative and authorial contributions by students and brought the theory course closer to the design environment.

Although urban theorists and researchers are putting forward the need for a refreshed epistemological framework, new theory and concepts about the urban condition, that is not a substitute for the specific research on the local urban condition. On the contrary, the planetary urbanisation discussion emphasises that urbanisation is always rendered by historical and geographical circumstances, with endless possibilities of morphological results and temporal dynamics of socio-spatial transformation. However, the local urban condition is also generated through its relations to a larger scale. The local urban condition is a part of the planetary urban fabric, which is 'at once the framework and the basis for the many forms of socio-spatial differentiation.' Therefore, apart from general theories of urbanisation as a planetary process, architecture and urbanism need methodological platforms and conceptual tools for the research of the local urban condition. The presented research on the urban form of Banja Luka (conducted in the education environment) aims to contribute to that domain of site-specific investigations by testing the analytical theories and bringing forward the Western Balkans urban condition peculiarities.
NOTES


4 The second cycle study programme Architecture and Urbanism at the University of Banja Luka and Faculty of Architecture, Civil Engineering and Geodesy was developed within the European Commission Erasmus+ capacity building project in the field of higher education, entitled Creating the Network of Knowledge Labs for Sustainable and Resilient Environments (KLABS). For more information on the study programme see https://aggf.unibl.org/en/studies/master-studies/architecture-and-urbanism.


11 Brenner and Schmid, “Towards a new epistemology of the urban?”, 166.
Ibid, 169.


Ibid, 169.


René Van Der Velde and Saskia de Wit, “The Landscape Form of the Metropolis”, *FOOTPRINT* 5 (June 2009): 55-80, https://doi.org/10.7480/footprint.3.2.709

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PLANIRANJE PROMENA: METODOLOŠKI OKVIR ZA INTEGRACIJU CIRKULARNOSTI U NASTAVNE PLANOVE I PROGRAME ARHITEKTONSKOG FAKULTETA I GRAĐENE SREDINE, TU DELFT
Olga Ioannou, Bob Geldermans, Tillmann Klein, Alexander Wandl

Ovaj rad postavlja metodološki okvir za integraciju cirkularnosti u arhitektonske nastavne planove i programe, predstavljajući blokove koji su doveli do njegove konceptualizacije. Prvi blok (Deo A) ispituje kako je složenost uticala na učenje i, posebno, na arhitektonsko obrazovanje. U radu se polazi od ideje da znanje proizvodi dalju nesigurnost u uslovima kritične složenosti. Štaviše, najviši nivoi složenosti zahtevaju najmanje naučnih pristupa. Zatim, ispituje glavne izazove koji proizlaze iz ove promene: jedan je da se učenje identifikuje sa sposobnošću pojedinaca da donose utemeljene odluke i konceptualizuje kao znanje koje se može primeniti. Drugo, obrazovanje treba da se opredeli za pedagogiju koja može da podrži učenje kroz donošenje odluka. Arhitektonsko obrazovanje bi, posebno, trebalo da bude u stanju da neguje novu vrstu profesionalizma, gde pojedinci preuzimaju odgovornost za svoje projektantske odluke koje se protežu izvan estetskog područja. Ali šta može da podstakne nastavne planove i programe da postanu osetljiviji na trenutnu ekološku, društvenu i političku realnost? Drugi blok (deo B) istražuje cirkularnost. On ispituje njegovu relevantnost za arhitektonsko obrazovanje zbog mogućnosti da funkcioniše i kao operativna šema i kao sistem vrednosti. Štaviše, budući da je koncept u nastajanju, cirukularnost može imati koristi od akademskog istraživanja, ali takođe može podržati pedagogiju koja se fokusira na pomaganje učenicima da nauče kako da uče. Predloženi metodološki okvir (Deo C) se zasniva na ova dva bloka i na fakultetskom istraživanju o cirkularnosti kako bi se razvila šema koja ukazuje na relevantne sadržaje za nastavu cirkularnosti, kako se mogu formulisati ciljevi za njegovo integrisanje u nastavne planove i programe i koja vrsta pedagogije je pogodna za podršku integraciji.

ključne reči: arhitektonsko obrazovanje; cirkularna građena sredina; složenost; transformativna pedagogija

SITUIRANO UČENJE U TEORIJSKOM KURSU URBANIZACIJE: LEKCIJE IZ BANJA LUKE
Nevena Novaković, Anita Milaković, Dijana Simonović

Učinjeni su mnogi teorijski i metodološki napori da se disciplinsko polje arhitekture i urbanizma proširi sa urbanog u tradicionalnom smislu na veće teritorijalne razmere savremene urbanizacije. U ovom članku se govori o načinima proučavanja disperzivne i polimorfne urbane forme koju tek treba sagledati. Diskurs se razvija oko modela situiranog učenja kao adekvatnog za razumevanje teorije planetarne urbanizacije i disperzovanog grada. Model učenja se primenjuje u okviru predmeta Urbanizacija u zemljama Zapadnog Balkana na master studijama Arhitektura i urbanizam (Univerzitet u Banjoj Luci). Model situiranog učenja uključuje studente u istraživanje realnog životnog konteksta, kulture i situacije, te stoga povezuje teorije urbanizacije velikih razmera sa ispitivanjem poznatog prostora. Štaviše, pristup učenju zagovara strategiju učenja o urbanizaciji i disperzovanu urbanu formu u teorijskim kursevima. Kurs koristi tehnike koje se obično uče u dizajnerskim studijima, kao što su mapiranje, kolaž slike i trodimenzionalno modeliranje. Članak bi mogao da doprinese razmatranju obrazovanja arhitekata kao profesionalaca koji će se baviti rastućim razmerama savremene urbanizacije, posebno u zemljama Zapadnog Balkana.

ključne reči: planetarna urbanizacija, urbana forma, disperzovani grad, učenje zasnovano na upitima, situirano učenje, metropolitanska forma, Banja Luka