

THE ARCHITECT MILAN LOJANICA'S *BELGRADE REALM* *AND VISIONS* – FROM A GRADUATION PROJECT TO JULINO BRDO AND GOŁAW, 1962–1972

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Attempting to highlight the specificity of the architect Milan Lojanica's design approach, clearly distinct in his first professional decennary 1962–1972, the focus of this paper is on his firstly designed and developed, and afterwards awarded architectural masterpiece, which he realized with his associates, architects Cagić and Jovanović – *i.e.* the urban suprastructure of Julino brdo/*Jula's hill* (1967–1970). As fifty years has passed from its first drawings, and the project documentation consists of exceptionally rare fragments only, one of the main goals of the research was the attempt to reconstruct the complete creative process – including its particular modality of construction/materialization.

Although in its results merely a brief recapitulation of Lojanica's innovative beginnings, the discourse still may provide a source-material for the genre of textbooks – from student to technical practice – regarding the rarest and almost forgotten discipline of experimental urban (mass)housing, with artistic/spiritual/serene touch of a refined prefabricated system.

Nonetheless, the opus of the eminent author, the respected creative endeavor of Milan Lojanica, future professor of architecture and the SASA academic, arises from its earliest stages and then permanently confirms itself as an entirety in its continuity. Therefore, the small-scale Julino brdo/*Jula's hill* settlement case study is reanalyzed/rethought within Lojanica's antecedent thematic preoccupations, and additionally within the most challenging subsequent one – the Goław project (1972), Poland (Polska), throughout its emerging, unrivaled, innovatively envisioned – town/city of *hundred-thousand-inhabitants*.

Key words: Milan Lojanica's architecture, Belgrade experimental (mass)housing, refined prefabrication, structural/visual articulation, ambience/environment/townscape.

INTRODUCTORY PREFERENCES – THEMATIC APPROACH

Influencing and interweaving three multifarious architectural domains – moderated modernity postulations, urban-social issues and practicing experimental contemporary design – these were Milan Lojanica's *calling-for-a-solution-frames* in his opening professional decade (1962–1972), as they shape a composite subject matter of the research presented in this article. Beginning with the graduation project (1962), poetically, yet modernist oriented, throughout his first leading assignment in 1965, the young architect faced the unfavorable reality of Belgrade's substandard housing fund, thus both these experiences complemented and permeated each other – bearing a fruit of Julino brdo settlement, the winning competition project (1966/1967). Nevertheless,

all these engagements ensured an introduction to the next, higher level of contribution, the ultimate city modernization with the design of a whole new structure area for the Polish capital.

The appropriate methodological approach for the research unfolded in the form of a multitactic qualitative-interpretive study, in addition with comparative analysis based on *reading* Milan Lojanica's projects and developments, and, furthermore, on their comparisons and interpolations with thoughts, ideas and concepts of other contemporary authors-architects and theoreticians chosen for their awareness of multifold aspects of human evolving through urban development. The pursuit was undertaken with the goal of acquiring more detailed and stratified knowledge in order to understand and depict generally ignored hidden aspects of architectural complexity.

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Assuming David Leatherbarrow's (2009:11) point that "both communication among people and dialogue between buildings rest upon the acknowledgement of the limitations of the individuals that enter into conversation", one could conclude that all architectural efforts actually rely on the hope that those limitations could be transcended. Consequently, it is of major interest to comprehend Lojanica's architectural process, for he had never restricted a design method by reducing it to ordinary patterns detached of meaning, nor to (al)ready-existing typologies, nor he ever reached for any easy/fast prefix, common for the auto-pilot-shortcut manner of thinking. Instead, Lojanica relentlessly acted against oversimplification in design. Thereby formulated hypothesis consists of several additional ones: a) for an earnest architect there are no limits between being a researcher and designer, b) previous research experience – the most important part of it – continues to reshape designer's project methods, which remain recognizable in his future realizations as a special distinction; c) furthermore, each subsequent project leaves a trace in the experience, and d) throughout it modifies the (angle of) inspection even to the point of becoming e) a major part of the forthcoming project assignments. Although unwritten, unspoken, and sometimes even unconscious f) – it flourishes as the internal leading reason.

BACKGROUND OF MILAN LOJANICA'S PERSONAL DESIGN APPROACH

Indeed, as Leatherbarrow portrays it (2009:11) "Always a matter of degree, the individuality of building, like that of a person, is measured by its participation in shared conditions." Moreover, the intriguing, thematically diversified, complex and polyphonically oriented architectural opus of Milan Lojanica has a renaissance meaning, comprehensiveness and vitality. Exceptional and sublime, Lojanica's creative endeavor arose over his student interest in CIAM causing his active participation in Young Architects Conferences (YAC) which published CIAM's statements, offprints and declarations in Serbian. Thereafter, launched with his graduation project in 1962 (discerned in Mokranjac's overall review of Lojanica's pedagogical engagement(s) (2015:212)) "Design of Jaz beach near Budva", his unique creativity lasts until nowadays – in a full-scale architectural accomplishments of over five decades. In the final outcome, his rich and varied multi-layered pedagogical activities, always overcoming initial institutional and media limitations, have progressed simultaneously within his architectural achievements.

The interweaving of three motivational lines is a common trait of every Milan Lojanica's architectural artifact. Passionate, scientific research method, unconditionally adopted at his earliest professional outsets, appears to be the initial methodological key. *Structural architectonics* constitutes the web/frame of contemplative/speculative, textual and visually influenced improvements – commencing with the sketch, up to the design and final spatial and design expression. *Architectural and urban ambientalization* – are targeted and achieved effects of spatial and culturological interactions; they likewise present a particular author's recognizability – the measure of a qualitative *domain/intervention/locus* enrichment.

Professional initiation of Milan Lojanica coincides with his scientific-research beginnings. He was heading a research team and was a secretary to the Commission for [examining] Functionality, Cff (Komisija za funkcionalitet) at the Institute of Architecture and Urban & Spatial Planning of Serbia (Institut za arhitekturu i urbanizam Srbije, IAUS) in 1964/1965 (Lojanica, 1965:73), as he also participated in the conferences on *social housing* and *construction industrialization* (two international conferences took place in Belgrade (1965, 1966)). Additionally, in the 1960s, Lojanica made study visits around Europe related to the industrialization and rationalization of the construction process, starting from France, Belgium and Denmark, to the Netherlands and Sweden. Although, besides certain indubitable technical innovations and augmented capacities of the construction industry, the only modern milieu/*mise-en-scène*/ambience he could behold there, Nathaniel Coleman (2005:175) describes as follows: "Unfortunately, what had begun in the late nineteenth century as a movement for radical architectural reform was, by the 1950s, resulting in an increasingly alien environment. Wonder and hope were overwhelmed by management agendas characterised by a near sacralisation of economy, efficiency and the quantification of human need and desire." Moreover, Aitchison (2012:630) observes, "The early years of post-war reconstruction witnessed the rise of scepticism regarding planning, a feeling that where the bombs had failed the planners might yet succeed."

Thenceforth, Milan Lojanica's research of social issues presented an introduction to defining the notion "apartment of minimum standard", aiming to examine and determine "objective – physical special phenomena [...] in the reality of [Belgrade]" while examining theoretical design principles and scientific findings (Lojanica, 1965:I-3, 1984:13). Belgrade *reality* of the time, its unfavorable housing fund and living conditions inside it, therefore, were (through the formation of the Cff) in the focus of scientific-research method of leading architects and professors of architecture in Serbia. For young architect-researcher Lojanica, that became an unforgettable encounter with organizational, morphological and typological, paraarchitectural/paraurban artifacts – latent and immanent to human *constructing gene*. At the neighborhood organization's level, and achieved ambient-values effects, this was a mere scream of human urge – not only to find a retreat/shelter – but a *dwelling poetics*; a considerably higher reach of human spirit, for most, hidden below the opaque layers of miserable drifts in existential suffering and hardship (Lojanica, 2016a, 2016b; Mokranjac, 2016). Consequently, Milan Lojanica always engineered thoughtfully, cautiously avoiding the pitfalls of modernism. Wherein lies his courage to be one of the few, who, as Powers formulated (2012:698) "While supporting Modern architecture, [...] came to deplore its self-referential tendency to become, 'a cause practiced by an élite for an élite in the cause of elitism [...].'"

Lojanica made a rather unusual choice for his graduation project (Figure 1), thus, the beach situated on the South-Adriatic coast as a topic counterpoints his vision, conceptual and design solutions – witnessing his early vivid interest in the superposition of public-private theme, for there

is no such intense overlapping of collective and private, as in human activity of visiting the beach. By further observing Lojanica's drawings, a strong visionary moment reveals itself – a burst of poetic and rational code fused together, suggesting a carefully arranged, almost futuristic ambiance. Light aspects, light apperception of architectural composition have equal form-relevant role in visual terms. *Light imprint* emphasizes the concept of *architecture-in-motion* – motion paths and assembling areas including central and service facilities... synchronously celebrating encounter between the land and the sea.

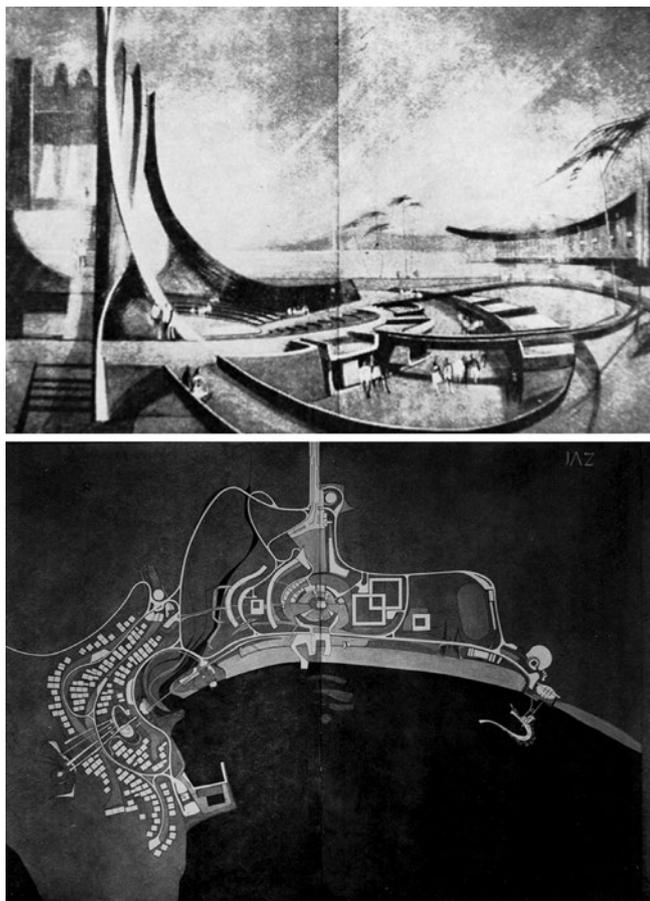


Figure 1: Milan Lojanica, Graduation project (1962), Beach Jaz, Budva (ex SFRY), Perspective and situational display (Source: courtesy of author, Milan Lojanica.)

JULINO BRDO/'JULA'S HILL' SETTLEMENT², 1967–1970

Introducing general remarks

Architectural design competition for Belgrade-based Julino brdo settlement was announced in 1966/1967. A three-member team of Belgrade architects, led by Milan Lojanica (Figure 2) including Predrag Cagić and Borivoje Jovanović, won the competition (Bjelikov, 1969:18; Aleksić, 1975:48). Subsequently, Milan Lojanica was heading the design team, during the development of the main architectural and

² Investor - HC Betonjerka, Belgrade. Contractor C.C. "IMP" [*Industrijsko montažno podjetje*], Ljubljana. C.C. "IMOS", Ljubljana is also stated as a Contractor (Bjelikov, 1969:18; Aleksić, 1975:48). *Structural system*-panels/vertical reinforced concrete (RC) structural walls constructed using sliding formwork; the same, shared formwork served for all floors of a building. Façade(s)—constructed/installed as prefabricated reinforced concrete (RC) panels.

structural design, as he was overseeing the construction site until the completion of works (1970). Eventually, Milan Lojanica and his collaborators were awarded the *Belgrade City's October Prize* in 1971, for an unprecedented innovative realization.

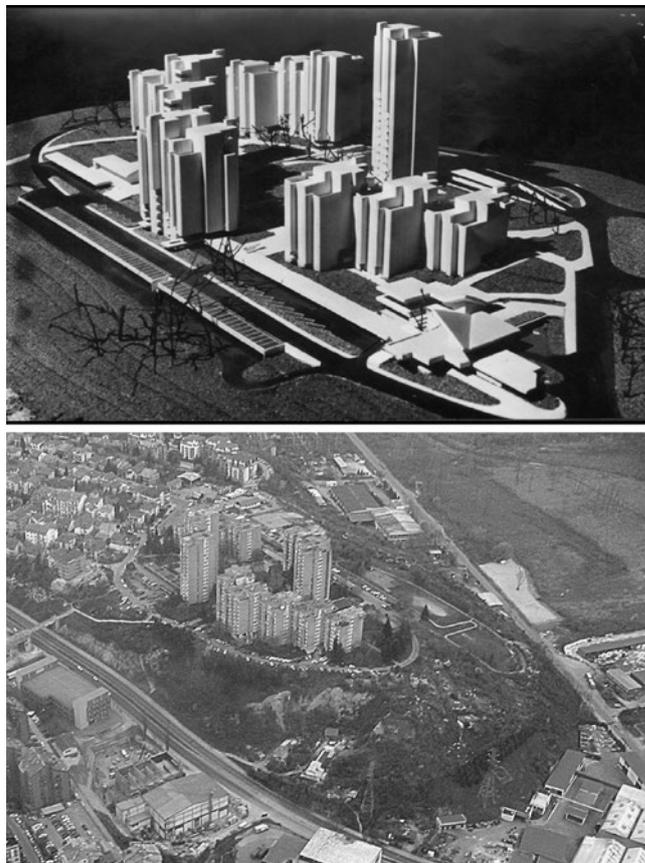


Figure 2: Milan Lojanica, Julino brdo settlement (1966/1967), Belgrade/Čukarica. Spatial model (Source: courtesy of author, Milan Lojanica) – juxtaposed to Actual aerial view https://upload.wikimedia.org/wikipedia/sr/thumb/b/b1/Julino_brdo_from_airplane.jpg/435px-Julino_brdo_from_airplane.jpg, accessed 12th May 2016

As the aftereffect of the innovativeness in the domain of mass-prefabricated/industrialized development and successful implementation, the Yugoslav Civil Engineering Centre (Belgrade) and Ljubljana-based Building and Civil Engineering Institute recommended explicitly Milan Lojanica to select the team of experts and lead them throughout the International Competition in the Polish capital Warsaw (Warszawa) (1972). The competition topic/purpose was modern town/city of one thousand citizens, envisaged on the undeveloped, inundated bank of the river Vistula (Wisła). Justifying expectations, Milan Lojanica and his chosen team – Predrag Cagić, Nedjeljko Neđa Borovnica, Miša David, Borivoje Jovanović and Sofija Vujanac-Borovnica – responded to numerous challenges by presenting architectural visions of their country, clearly defined in their major project, a study-vision of the new town Gočlaw, elaborated with organizational and technical assistance of the CEP (The Centre of Urban Planning Development, Belgrade). The *grand prix* won at this Competition was additionally the first significant post-war international affirmation of Serbian architects, and thereby – of the *Belgrade School of Architecture*.

Structural and form aspect

The form of Julino brdo/*Jula's hill* – that small town on its own (Figure 3), appears to us from afar as *the monolith analogue of a crown*, with only a few vertical panoramic gaps-intervals.

As virtually summarized in Vasiljević-Tomić's study (2007:109-111/185, 2009:19), "Monolith forms generally assume monochromy or polychromy of low-degree activity", which is here properly confirmed. Should we approach just slightly closer to *Jula's-town-on-its-own*, we shall notice, on a sunny day, that concrete of *its walls/ramparts*, in which we start discerning more articulated structures, embraces warm and golden reflections on which vertical stripes of whiteness remain, consisting of windows-parapets arrays. Indeed – "forms of medium articulation [...] [impose] more active polychromy", (*ibid.*), achieved here through light that harmonizes the constructed whole with the landscape from which it arises. (Figure 3)

Furthermore, in nearing *Jula's town*, we perceive advanced degrees of articulation – which are still in harmony with the natural environment. Also, it shows that "the most articulated forms, which [...] [almost] melt with space, entail [...] low-degree polychrome activity [...] close to monochromy." (*ibid.*). Finally, if we arrive close-up – within the walls/ramparts of *Jula's town*, which move apart before the visitors to allow them in – we will be welcomed by the dance of light and shadows (Figure 4), *the ode to geometrical purity*. Only a few will ask themselves: *And yet – how did it all originate?*

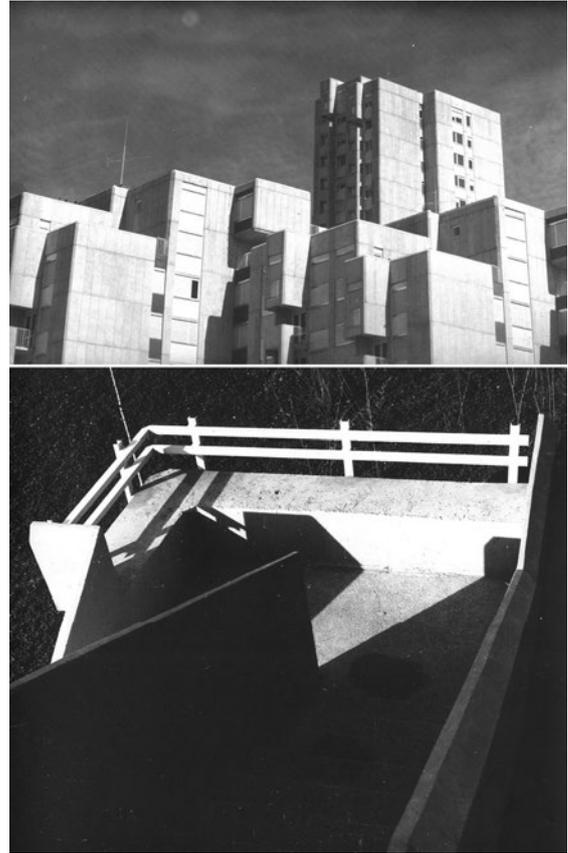


Figure 4: Milan Lojanica, Julino brdo settlement (1970).
Close-up photographs
(Source: courtesy of author, Milan Lojanica.)



Figure 3: Milan Lojanica, Julino brdo settlement (1967-1970). Situation and photographs.
(Source: courtesy of author, Milan Lojanica.)

Structural and technical aspect

Since fifty years has expired from the outset of the design for Julino brdo settlement (1966/1967) – its project documentation exists no longer, except for a few random fragments (in Lojanica's private archive) – to prevent the utter extinction/disappearance of the precious *knowledge-source*, this research focuses on disclosing its treasure of data, accentuating the constructive-technical information as particularly important for the architectural practice.

The construction of supporting (RC structural) walls-grinders was implemented by placing the metal framework (implying the static calculation, specification, details and formwork plans) into prefabricated flexible/adaptable industrial steel formwork (skeletal, filled with glued wood), thereafter grouted with concrete (type of concrete as per calculation). *Standrad plate floor* is a monolithic slab *cast-in-situ* and homogenized with floor construction. Precast-monolithic facades, made to fit the formwork plan(s), were delivered and marked *in situ*, directly from the plant-factory organized on the location... (Figure 5) Upon installation, thermal insulation on the inside was added – 8 cm Styrofoam, and, using the sliding formwork – the concrete grouting was done, thus the outer prefabricate remained as a *lost formwork*. Only after the completion of the facade on the entire floor, and with previously erected supporting walls, the next (upper) floor was cast. Facade thus became wedged between two floor constructions, hiding the plate floor by the outlet, "reveal" of the panel, behind which the anchors were connected to the metal framework of the lower floor construction. Before casting the next/upper floor slab, the sliding formworks of the grinders were erected/positioned onto that level. Typical facades are floor high, 60 cm wide, according to design modular grid of 60 x 60 cm. Special facades are floor high (except the fence-roof parapets), at 40 cm, 80 cm wide, and larger or smaller, likewise specific ones – final-angular (Lojanica, 2016c).

All concrete facade elements were prefabricated – shaped in the aforementioned plant-factory, by *pervibrating* on the steel vibrating tables, in specially constructed ribbed steel flumes. Concrete was homogenized by vibration. After solidification, the homogenized-smooth outer/visible layer of the *glaze* concrete remained along with its non-hygroscopic feature. The surface panel profile retained the flutings form, in finishing nuance/shade of nature-concrete.

Quoining of *angular prefabricated facade* elements was resolved by a special detail of *bevelled edge(s)*, thereby

the final appearance of the structure/settlement gained refinement and elegance.

Roof is flat. Insulation and protective layer were placed over cast/molded slab, with the waterproofing thereafter. Finishing layer is synthetic – epoxy-resins/polyurethane, reinforced plastic cloth/mesh with multi-coatings. Polyurethane was designed as a unique insulation basin, pulled over the parapet, instead of the tin drip. The passable areas (secured by 110 cm high parapet), have concrete moldings over the polyurethane – thus forming the ventilation layer – with final setting of pebble panels. On impassable parts (40 cm high parapet), the river ballast protects the polyurethane. Drainage is internal, with no visible gutters and/or downpipes on the facade. Gutters/downpipes *hiding* – characterizes all Milan Lojanica's projects and realizations, as a *purity-marking* of his architectural space(s). That specificity expressly implicates certain correlations with Louis Kahn's design process, as indicated in Banham's (1969/1984:249) quoting of Kahn's deepest conviction: "I do not like ducts, I do not like pipes. I hate them really thoroughly, but [...therefore], I feel that they have to be given their place." Skillfully hidden places, are equally Lojanica's choice.

Layout – dispositional and function-form aspect

The orientation of all apartments is two-sided; the angular apartments are closed by the adjacent walls (at right angle), and the rest by the opposing facade planes (Figure 6). According to Aleksić (1975:48) "Four apartments on the floor offer equality of conditions (orientation and organisation) to all apartments. Concurrently, the favorable effects (rationality) of the usable living space ratios/surfaces and the common horizontal and vertical communication areas in the building are [estimably] close. Structural system scheme [...] is simple and statically stiff (the possibility of frontal and diagonal centerlines). Standard residential floor of Julino brdo was built using the system of vertical grinders – [RC structural] walls in the sequence of orthogonally set 'comb-like' symmetrically upon diagonal. Sanitary facilities, groups of coupled bathrooms and kitchens occupy the zone(s) around [elevators and] staircases, thus forming [...] a buffer ring toward effective residential premises around it".

Although seemingly the facade cladding camouflages the construction of facilities/structures, concurrently, the very modular prefabricated fluted nature-concrete panels undoubtedly testify about the epoch of their creation – the industrialized era of construction and mass-

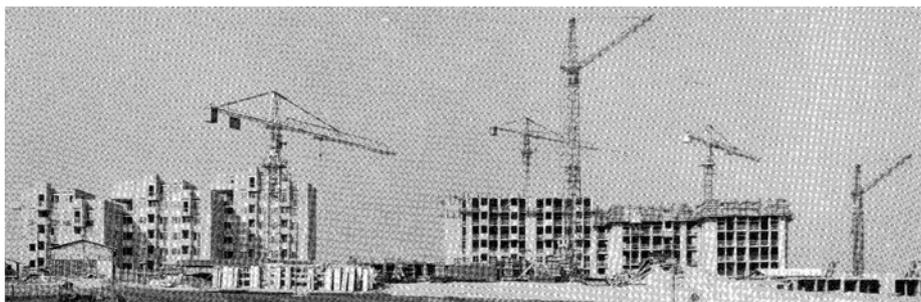


Figure 5: Milan Lojanica, Julino brdo settlement under construction (1969)
(Source: Bjelikov, 1969:18)

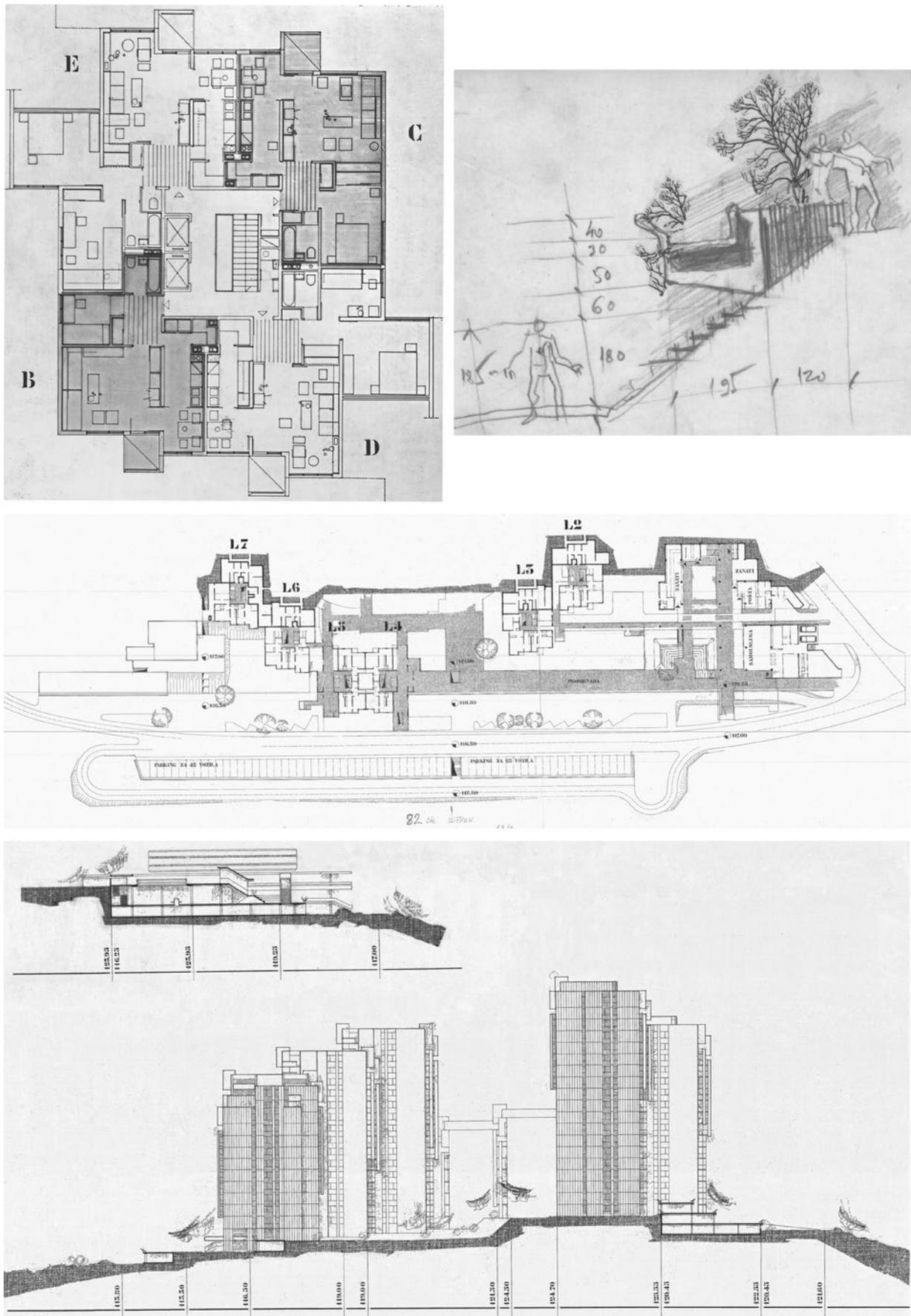


Figure 6: Milan Lojanica, Julino brdo settlement (1970). Original drawings: Typical floor plan (top-left); Walkway throughout the staircase and verdure – Sketch (top-right); Structures L2-L7 – landscape layout (middle); Settlement cross-section – walkway with a staircase (below)
 (Source: courtesy of author, Milan Lojanica; with the assistance of Kosana Rošulj, architect.)

residential production – and thereby directly about the reinforced-concrete structural system. The prerequisite for the rational industrialization, as *qualitative* and not just quantitative transition of construction from craftwork to industrial domain, is designing research of various typologies and possibilities of modular systems. Similarly evident is Lojanica's devotedness to the final product – *apartment diversity* realized on Julino brdo – understood/conceptualized and fulfilled as living space, with obtained multifunctionality both on the level of a stand-alone unit, and furthermore as a part of greater organizational group, the *urban unity-assembly* of collective residential buildings... up to the orchestrated complex of the entire settlement.

In principle and formwise – jagged floor base with loggias overhung outward is multiplied with gradual and discreet variation per floors, which in its final form provides the structure that, although composed of almost identical elements, achieves outstanding effect – *anti-monotonous* form. Through consistently multilayered vocabulary of permeating horizontal and vertical plan flows a complex narrative – from differing treatment of the terrestrial and floor level(s), betwixt *longitudinal* and *orthogonal* angular elements of vertical concrete surfaces, to witty separated loggias on the final floors... and final roof and parapet elements – in the visual semantics of the symbolically reduced cornice. Attentively designed *facade modularity* emphasizes a distinct, *discreetly articulated* and volumetrically intriguing geometry of the structures. The realization frankly outlines the initial developmental idea, supports logic and appropriateness of the creative act, uncovering the *technological-feature* and *style key*. Overall interweaving of designing motifs preconditioned by the rationalization – from functional and constructive, through form and visual, to productional – is not perceived as restricting. Contrariwise, its expertly created and applied compositional potential becomes completely integrated into expressive mode, into genuine designer's power of a final gesture.

Conceivable theoretical discourse and its contextualization

Observing Julino brdo, Aleksić's (*ibid.*) scope extends into a discernment that "by disassembling and recombining forms, with rhythm change of roof heights and interpolating other corrections, with visual and aesthetic contents eluding an easily perceived formula though which by distracting a fundamental order create free rhythms and optional, almost spontaneous form structures are simultaneously achieved". Aleksej Brkić (1982:257) noted that Julino brdo is "in superform-type the first accomplishment of pure definition [...] including wholeness [...] of functional formation and presupposing a free form [...] it is the first that highlighted itself as influential on the general platform of Belgrade Circle development. [...] Visual key was found in spontaneous relation to unconditional economy [...] [T]his complex, although [...] a century distant from the first garden city concept – made in [ex-SFRY] [...] a decisive influence [...] on redefining [both] the concept of supporting settlement [...] and phenomenology of mega-shapes".

Indeed, even on the purely typological level, Julino brdo is so unique, incomparable with the European modernist

housing estate production, from its emerging period – until nowadays. Let us just enumerate the settlements (Monclús an Medina, 2015) concurrent with Julino brdo, such as Bijlmermeer (Amsterdam, 1966-1972), Sarcelles (Paris, 1955-1970), Gropiusstadt (Berlin, 1962-1977), Quarto Cagnino (Milan, 1964-1973), etc. – which predominantly suffer from insatiable monotony and repetition of mono-defined, identical apartment blocks. Accordingly, in his sequel, Brkić (*ibid.*) is more explicit: "All elements of formal mega-structure acquired in this assemblage, primarily signs of space integration and linkage with vastness, the omission of the polygon schematism and free construction line with the emphasized rhythm of the pediment, along with the omission of the straight axis with the conventional street profile, [...] and even the presence of [...] [skyline] [...], a unique shaped procedure which did not lack aspiration towards pictorial, decorativeness [...], all that was later found in subsequent numerous [Lojanica's] creations [...] labeled by the author's personal attitude."

Yet, in Aleksić's (1975:48) further depiction that "terrain motion was hiding the opportunity to achieve [horizontal and vertical] vehicles isolation [...]. Vehicles remained [...] farther on the lower levels. Interspace gained features of complete, unrestrained pedestrian domination" – there is a lack of comprehension for Lojanica's design procedure, which is based on the determination to gain the traffic separation, in favor of pedestrian safety and comfort (theoretically-practically the CIAM and Team X tradition).

Considering a broader socio-historical context, Mecanov (2007:151,160) indicates: "Cessation of mass-residential construction due to abolition of social housing led to subsiding of industrial Modern(ism) [...]. Julino brdo [...] will represent the turning point in urban planning of residential areas." From a concept to its realization, Julino brdo is undoubtedly the turning point, indeed, apart from its numerous echoes, although – less effectual. *Nor block, nor slab, nor tower...* with structure heights, from four to six, and gradually to nineteen floors, within all the other complexities with a purpose to imitate *town genesis* – that type of undertaking is a confirmed practice for public buildings exclusively, from university campuses to hotel assemblages. Otherwise, as an *architectural statement*, it represents Lojanica's profound criticism of common practices which oversimplify the domain of collective housing issues.

Feedback and relations – ambientalization

Essential relation between researching fullest potentials of mass-construction and the composition of an architectural structure as elements-factors of the ensuing *urban ambient of decidedly higher order and quality* – was and persists to be the architect Milan Lojanica's major preoccupation, evident in all his contemplations, projects and realizations. Architecture as a modality of creating contemporary spatial ambient/environment, that cherishes reminiscences of the most successful architectural experiences, i.e. – *ambientalization* [coinage by A.M.] as the vital organizational principle is the crucial motif/impetus/aim to which Lojanica subjects everything else, defending this key stronghold by market competitiveness. Transforming the socio-historical conditionality and assigned production limits into powerful

contemporaries-allies, accepting the challenge of rational/cost-effective construction methods/procedures to its limits, Milan Lojanica finds himself in the center of invisible side of the equation that in return imposes much more complex requirements on design-engineer, sometimes hard to bypass, than the classical-craft approach.

Finally, for Milan Lojanica himself, Julino brdo/*Jula's hill* "represents the theme variation of the Serbian medieval towns origins", (Manević, 1971:11; Mokranjac, 2012:277-278). Despite centuries of destructions and devastations... there are still examples such as Maglič Fortress from the beginning of the 15th century, at the river Ibar Gorge. Similarly, Monastery Resava (Manasija), 1407–1418, founded by Despot Stefan Lazarević, Serbian ruler and Knight of the Dragon Order, educator and patron of art (*ibid.*), though less obvious choice – will re(de)fine the saga of *Jula's town*, with contours of its ramparts and towers (Figure 7).

Furthermore, the concept and realization of *Jula's town* will open numerous new questions about the position of modern man in the reality of possible directions of progress and improvement of urbanity of our region. For, architecture as art remains always – *the art of possible*, and consequently possible choices, amid the determinants of the given socio-historical and technical, productional and technological circumstances. Challenges and ethics of *Jula's town* will conclude into "research of the *System for design and construction of apartments and other facilities NS 71* [(Lojanica, 1971) design and study verification]", (Mokranjac, 2015:212), then into the new views/panoramas of the new town/city Gočlaw with the "project topic 'Town-Model' (1972) [withal] the first significant [post-war] international affirmation of the Serbian architects – by winning the first prize at the international open competition in Warsaw", (*ibid.*) as well into the reconstruction of the Valjevo town center 1971–1980 (Lojanica, 1981).

GOCLAW, A TOWN/CITY OF A HUNDRED THOUSAND INHABITANTS, 1972

Evidently, the Leatherbarrow's insight (2009:13) that "Shared passions give rise to community, just as they transform sovereign objectivity into true singularity – which is not self-sufficiency", particularly concerns the architects themselves... while engaged in team research-design project(s). The thirtieth page of the publication issued by the Centre for Spatial System Analysis (ISPU) – *Belgrade: International Contest-seminar Warsaw-Gočlaw 1972*, on the first prize winners, the architectural team – Lojanica, Cagić, Borovnica, David, Janković and Vujanac-Borovnica, reveals an indicative outline of Milan Lojanica (Figure 8). The analytic and ambient display/illustration of the neighborhood concept assembly is concise in it – designed around a new micro-model of public space which contains the reflex of a spontaneous encounter-flow of an alley into an indication/hint of a *piazzetta*/small square. The entire lessons/moral gained through the researches of spontaneously formed, self-grown Belgrade settlements (1963–1965), of their ambiental "treasures from nothing", has been improved and articulated into a new urban matrix. Public space has been visualized/outlined through a short pedestrian street-alley formed by new slabs/lamellae –



Figure 7: Monastery Resava (Manasija), 1407–1418, founded by Despot Stefan Lazarević,
(Source: <http://www.nacionalnarevija.com/images/images/Broj%2010/Galerija/manasija%20a%2001%2008%202008.jpg>, <http://www.sekcijatvrđjava.rs/?p=49>, http://resavskapecina.rs/images/IMG_For_WP/Manastir_Manasija/Images-for-Manasitr-Manasija-Portfolio-003-Utvrdjenje-Manasija.jpg (adapted by author), accessed 1st Jun 2016.

with interrupted physical continuity on one side, and with visual breakthrough further on the opposite side. Town *piazzetta* with a thoughtfully short street-alley flowing into it as designed by Milan Lojanica for the future of Gočlaw, is in slightly refracted direction to the street axis. The theme of morphological and typological variation of the motifs aiming to gain graded views and exponentiation of situation/layout forms – are consistently followed by vertical and other compositional plans. As Giedion ([1941]/1966/2012:868) ascertained once: "A unique complex [...] was carefully designed in order to allow all the much possible of personal freedom, as well as visual diversity."

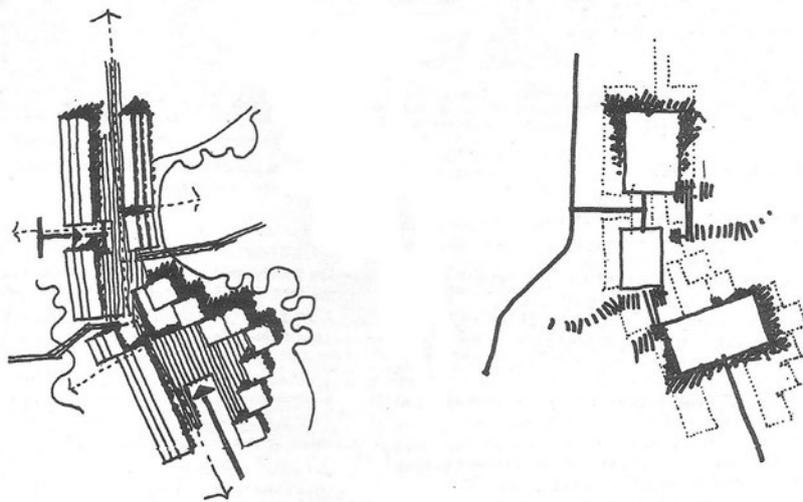


Figure 8: Milan Lojanica et al. ([1972]/1973:30).
 Warsaw-Goclaw – Typical motif.
 (Source: courtesy of author, Milan Lojanica.)

Trying to reveal such an importance of the short pedestrian street-alley, we may understand it for the simplest reason that – nothing can successfully rival a long-street-front emerging from the historical ‘over-layering’ of architectural creations/achievements; even the projects performed by differentiated teams, as a tiny sequence of (contemporary) Time, they still remain – a single-design-move-of-one-hand. Historical street’s façade-front is an image of time-flow itself, subliming varied nexuses of motives, circumstances and faiths... (Hebbert, 2005). Its modernist-block replica left a bitter taste even amongst the most eminent Modernists. Frampton (1980/2004:277) states: “In his numerous writings of that period [1970s] he [Aldo van Eyck] stresses

the role modern architecture has played in the destruction of both style and ambience.” Similarly, the Smithsons [Alison & Peter] and van Eyck, who, having challenged four crucial functional achievements of the Athens Charter (*living-work-recreation-transportation*), during CIAM IX (1953) on behalf of a new generation of architects, wrote: “One can easily identify himself with his own fireplace, but not that easy with the town/city he lives in. ‘Belonging’ is fundamental emotional need [...]. That ‘belonging’ – i.e. identity – develops into good-neighbourly relations. A short, narrow street/alley in the poor/slum suburb, often in that sense gives better results than spacious, renewed quarters.”, (*ibid.*:271).



Figure 9: Milan Lojanica et al. (1972). Warsaw-Goclaw – Composition plan.
 (Source: courtesy of author, Milan Lojanica.)

Complex issues and structures that Milan Lojanica masters, commencing with the wholeness of a new city – to the tiniest urban segment, lucid in the *Composition plan* (Figure 9) and carefully articulated in the display model (Figure 10), all that precious Gočlaw experience has been transposed into the following great competition challenge – New Belgrade's Block 19a.

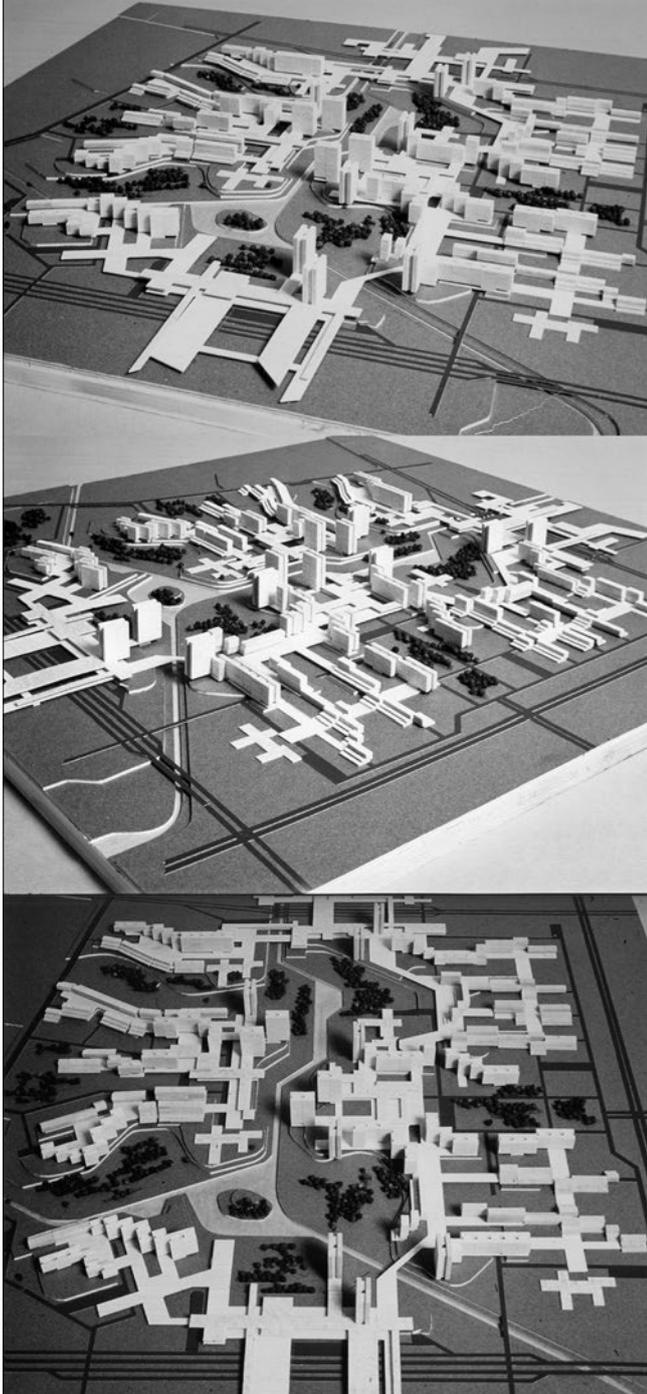


Figure 10: Milan Lojanica et al. (1972). *Warsaw-Gočlaw – Model*, photographs simulating aerial view. (Source: courtesy of author, Milan Lojanica.)

CONCLUSION – ON LONG-LASTING ECHOES OF MILAN LOJANICA'S FIRST CREATIVE DECENNARY

A distinguished Marguerite Yourcenar's quotation: "one foot in scholarship [meaning science], the other [...] in that

sympathetic magic which operates when one transports oneself, in thought, into another's body and soul", also invokes (inly) the essence of being architect. What else is an architect, if not a constant concern about future users, guessing their bodies and souls' needs, as their entire cognitive time-space presence? This also recalls Milutin Borisavljević's (Borissavliévitch, 1926:42) discernment: "Aesthetically, the architecture is – art of time; while geometrically or actually/objectively – it is spatial art."

The fact is that *ambientalization* of public spaces presents primary motivational and functionally-formative designing means of Milan Lojanica – as we were/are convinced by his own graduation project (1962). Commencing with Julino brdo settlement (1967–1970), and concluding with Gočlaw project (1972) – three defining principles of that process were crystallized. Briefly, those *tasks* are: 1. *intimately*, but not provincially, 2. *Modern-industrialized* – but – *not rigid*, and eventually – the most difficult one, 3. *Typified/standardized, but not – banal/obvious or monotonous/serial*.

All the Milan Lojanica's projects and realizations accentuate *the scales of spatial plans/visions* – reflection and developmental procedure are visible – running simultaneously into several reverse directions, through carefully constructed game along with superposition of large and distant plans. Design engineer Milan Lojanica always envisages the beneficiary – user, tenant, visitor, passer-by... – a person as *the most sensitive focus* of the complex public-private relation.

Rational poetics or *poetics of the rational*, presents the sophisticated creativity hallmark of modernism-oriented architect and contemporary pedagogue of architecture, the academic Milan Lojanica. Impressive mastering of architecture *subject matter*, as compositional and constructional principle, as functional and technological procedure, as artistically shaped medium, and as aspiring socially projected pulsation, and finally as a historical and layered mechanism of collective heritage is revealed by a somewhat more consistent analysis of the project and realization of Julino brdo settlement.

From *objects – to the settlement*, and vice versa, from *micro-urban – to macro-urban form*, in the achievements of Julino brdo and, a decade later, of Block 19a, with his more than evident erudition of Helmholtz, Vischer, Maertens and Sitte legacies (Moravánszky, 2012), and for all that to be interpreted as purely intuitive foreknowledge, Milan Lojanica examines traditional and modernist aspects/modalities and valuable urban ambiances. Because, "as eternal modulator of actuating structuring capabilities, *town/city* is the last privileged memory people would voluntarily agree to be deprived of." (Mokranjac, 2012:266).

Nevertheless, Ljiljana Blagojević's review of Stanek's book on Lefebvre (2012:811-812) invokes certain analogy, since Lojanica also, "[...] positions the project of architecture and urbanism beyond both heresy and utopia and, rather like Lefebvre himself, [...] rejects the contradiction between reform and revolution [...]" Notwithstanding, Lojanica supremely differentiates/discerns which traditional architectural values should be preserved, and which are to be renewed.

Even in the global context Milan Lojanica is one of the rare who managed to avoid temptations of repetitions and monotony, while accomplishing the optimum of all functional, structural and formatively visual demands of highest standards. Balancing the ethical and aesthetic architectural components and thereon in his achievements mainly expressing himself through strictly limited, parametrically precise, and the most demanding combinatorics of prefabricated structure vocabulary in design, Milan Lojanica is *supremely qualified* to transpose such *production architectonics* – which is a technological progress compared to craftsmanlike approaches – into the spheres of sustainable concepts, including prefabricated systems for obtaining energy efficiency of already built facilities, too. Otherwise, the long-term sustainability of housing domain will remain, on a worldwide scale – permanently reserved for the elite. The initiative for such projects should originate from urban development planning. It is where local architectural scene must return, as urban development planning presents the only meaningful method of the aimed sustainable progress, innovated in accordance with future challenges, from urban to rural environments – to terminate forever multi-decennial chaotic and random scourge of investor capriciousness cacophony on the Serbian soil. Let it be a unanimous answer of Serbian architects-urbanists-planners on Frampton's (1995:376) more than justified concern “how to maintain the tectonic trajectory in the face of a postindustrial civilisation that seeks nothing less than the reduction of the entire world to one vast commodity.” Moreover, let us overcome Giedion's *precise curse* ([1941]/1966/2012:857): “In history of architecture, urbanism of a particular time is always in delay.” Considering that, Serbian primary contemporary/modernist architectural-urban practice – and especially Milan Lojanica's heritage – obliges us to accomplish nothing less.

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