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Research article

Social and Utopian Ideas in Russian Paper Architecture of the Post-Revolutionary Decade

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Abstract

During the post-revolutionary years in Russia so called "paper architecture" not only revealed different stylistic and formal inventions, but also conveyed philosophical and social ideas for creating a new world for a new human. Architects understood their task to create principally new forms, related to the future, but at the same time, to fulfill urgent problems of current social life. First discussions and competitions started at the very end of the civil war. Projects like the huge Palaces of Labor, dwellings for workers, and city planning demonstrated the fantasy and inventiveness of the architects Nikolai Ladovsky, Ilya Golosov, the Vesnins brothers, Konstantin Melnikov, or Moisei Ginsburg. The architectural fantasies by Jakob Chernikhov created an unpopulated world of inventive constructions, inspired by the dream of technological future. Avant-garde in art strongly influenced architectural experimentation with form, while the political ideology of "the cultural revolution" stressed its social functions. In the theory of "constructivism" architecture was considered to be an important instrument of "life-building." Features of utopian thinking, found in nearly every trend of art of that period, manifested themselves differently and on several levels: philosophical, ideological, social, artistic. Paper architecture within this special period served to convey the ideas of a new way of life and social order. The rich and exquisite architectural language of the time expressed itself in the nearest future, when the construction sites appeared, and throughout the century provided architects a source of inspiration and method of teaching.

Keywords: Paper architecture; Social utopian Ideas; Graphics of avant-garde; Constructivism; Language of architecture

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Научная статья

Социальные и утопические идеи в бумажной архитектуре России первого послереволюционного десятилетия

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Аннотация
В течение первого послереволюционного десятилетия так называемая “бумажная архитектура” не только отражала разнообразные стилевые и формальные поиски, но и передавала философские и социальные идеи творения нового мира для нового человека. Перед архитекторами стояла задача создания принципиально новых форм, направленных в будущее, но, в то же время, нацеленных на решение насущных задач социальной жизни. Первые дискуссии и конкурсы проводились еще в конце гражданской войны. Проекты Дворцов труда, домов для рабочих, планы городов создавались фантазией и изобретательностью Н.Ладовского, И.Голосова, братьев Весниных, К.Мельникова, М.Гинзбурга. Архитектурные фантазии Я.Чернихова представляли безлюдный мир конструкций, навеянный мечтой о технологическом будущем. Авангард в искусстве существенно повлиял на эксперименты с архитектурной формой, в то время как политическая идеология “культурной революции” подчеркивала ее социальные функции. Согласно теоретическим основам конструктивизма, архитектура была одним из важных средств “жизнестроения”. Черты утопического мышления, обнаруживаемые практически в любом направлении искусства того времени, проявлялись на разных уровнях: философском, идеологическом, социальном и художественном. Бумажная архитектура служила проводником идей нового образа жизни и нового социального строя. Богатый изобретательный язык архитектуры этого периода только отчасти нашел применение, когда возобновилась строительная практика, но служил источником вдохновения для архитекторов и методом архитектурного и дизайнерского образования.

Ключевые слова: Бумажная архитектура; Социально-утопические идеи; Графика авангарда; Конструктивизм; Язык архитектуры

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INTRODUCTION

Architecture takes a leading role among the fine arts' development of forms, as witnessed by a great number of unrealized projects, drafts, and preparatory materials, existing only on paper. The fatal impossibility of implementing every artistic idea is "a tragic feature" of architecture. Moreover, the number of unrealized designs is constantly growing together with the development of civilization (Vipper, 1985, p. 216). In the European tradition the term "paper architecture" is associated with the epoch of the Art Academies, where students and tutors produced an abundance of architectural drawings, and their artistic performance used to be the starting and final point of studying. Professionals also produced a number of additional drawings and sketches during the creation process. Still there are many other historical and cultural reasons for the rise of paper architecture since the implementation of projects strongly depends on the social, economic, and political situation, as well as on the state of the engineering and technological systems.

There is a special period in the history of Russian architecture, the post-revolutionary decade, marked by a great diversity of creative ideas and forward-looking projects, unrealized because of the devastation, poverty, and underdevelopment of building industry. Many of these architectural ideas were fantastic and utopian, but they testify to the unique role of architecture as a method of bringing the future closer. The paper architecture of the 1920s not only revealed different stylistic and formal inventions, but also actively participated in the formation and dissemination of philosophical and social ideas, especially as they concern the creation of a new world for a new human. Avant-garde art strongly influenced architectural experimentation with form, while the political ideology of "the cultural revolution" stressed its social functions. Architecture was thought to provide the best example of purposeful basic structure: "any product of spiritual creation – scientific theory, piece of poetry, the system of legal and moral norms – has got an architecture of its own, a disjointed unity of parts, fulfilling various functions, mutually complementing each other" (Bogdanov, 1980, p. 78).

The utopian ideas of the 1920s and their embodiment in art were willfully excluded from the social and artistic context in the 1930s. Architecture was probably the last sphere where avant-garde forms faded away and yielded to the neoclassicism of the 1930s. Social utopias of collective life, of productive art, and of salvation through creativity was no longer welcome against the background of industrialization with its command-and-control methods. The label "utopian," now used for criticizing opponents, became dangerous.

THE PROGRAM

Social utopia in architectural investigations in the period from 1917 to the mid-1920s was rooted in the revolutionary tradition and in modernism in art. The inevitable destruction of old social forms coincided with a modernist pathos of creating new forms in art. Revolutionary romanticism and the anticipation of the victory of communism all over the world - though lacking obvious evidence, these strong beliefs produced utopian forms of thought and practice. Architecture and other forms of art had to demonstrate

visual proof of the new times to come, introducing the new way of life of a new human, and creating a "framework" for new social relationships. Architecture as an artistic activity of high social responsibility played a great role in building the new society, but without materials and other means of the construction industry, it demonstrated its importance mostly in designs, theoretical writings, competitions, plans that developed alongside with the theory and praxis of "cultural revolution" and "life-building." Thus, the new architectural ideas became an integral part of social technologies irrespective of their realization. Designs of the Russian architects of the 1920-ies proclaimed new social ideas and clearly presented them in visual form. The visual presentation of utopian thought had to produce a close encounter with the future. Most of the architectural designs of that time existed as paper architecture which continued performing its original function as part of the pedagogical project of the Russian avant-garde and illustrated origins and development of architectural concepts. Unrealized projects were creating a new vocabulary of form, construction, and methods of material use, and they prepared the transition to a new architectural language.

Not aiming to cover the diversity of designs and inventions, we would like to explore the sources of this paper architecture, then to identify groups and directions of ideas, brought into life under the influence of different "levels" of utopian thinking. We focus in this text on the process that took place in Russia, leaving aside the international aspect of the subject. The constant dialogue and contacts of Russian architects and their colleagues abroad deserve a separate story.

Essays, manifestos, theoretical notes by the architects of the Russian avant-garde art and art-critics serve as the material for this study. Special emphasis was placed on the materials from the first revolutionary years, including competition programs, published designs, and drawings. The architectural activities of the first post-revolutionary decade were reflected especially in the materials of the magazine "*Sovremennaya arkhitectura* [Contemporary Architecture]", that devoted its pages to the comments, considerations, and opinions of the architects, especially when the realization of the projects had already started.

FOUR DIMENSIONS

Paper architecture and glorification

There are several forms of manifestation of what we take to be the paper architecture: graphics, painting, architectural collages and photomontages, modelling. Architectural drawings (or drawings with architectural subjects) became a notable part of the cultural heritage. They were in great number created in the course of experimental laboratory work of artistic societies and educational establishments. We find detailed classifications of architectural graphics (architectural ideas, sketches, drafts, fantasies, designs) in a book by Jacob Chernikhov. He shared in it his rich experience in teaching technical and geometric drawing. Chernikhov created nearly 4500 drawings with architectural fantasies and believed the language of graphics to be a universal means of expression, something that everyone has to learn like an alphabet (Chernikhov, 1933; fig. 1).

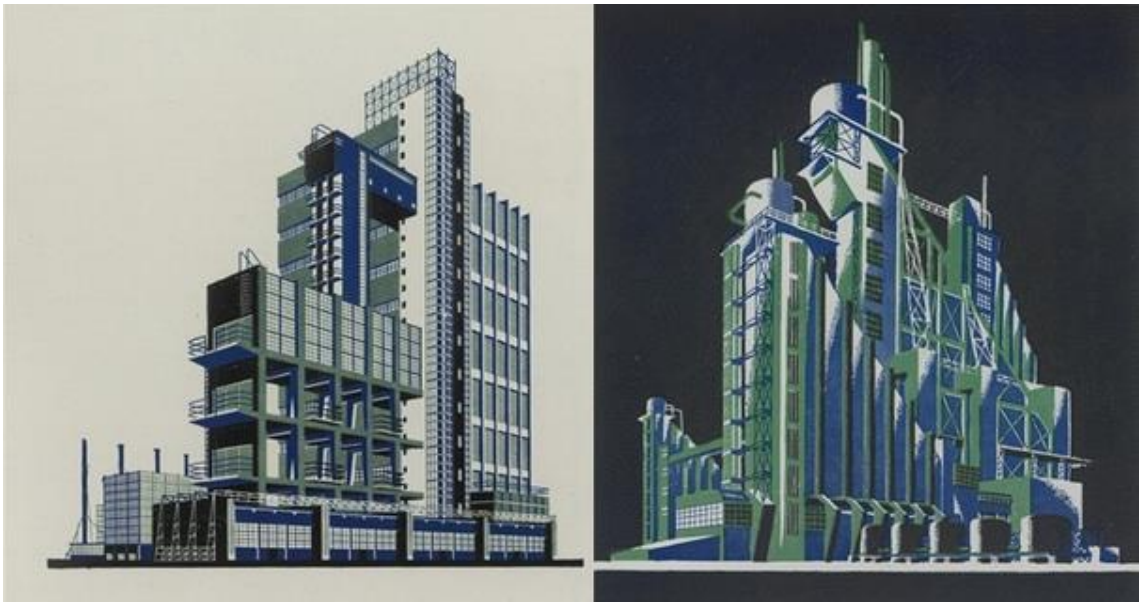

Figure 1. Jakob Chernichov. Architectural fantasies (Chernikhov, 1933, compositions 1, 4)

The role of architecture in the post-revolutionary years was so significant, that discussions within the creative professional community and first competitions already started before the end of the civil war. One's understanding of the social role of architecture was inherited from former times, but the social content had to be different now. One of the first tasks put forward before the architects was to replace a temple as the place of gathering and worship (and an architecturally dominating structure as well) by some new kind of building. In 1919 at the meetings of Zhivsculptarch (Synthesis of Painting, Sculpture, and Architecture Commission in Moscow) the project "Temple of the Communication Between People" was discussed. The main demands included huge size, a place for mass gatherings, excellent light inside, dynamism of the architectural imagery through forms and constructions, central position in the surroundings. General architectural ideas were suggested for the composition of the pure volumes – sphere, cube, pyramid, cylinder (Khan-Magomedov, 2001).

These requirements predetermined the fantastic character of the experimental designs by Nikolai Ladovsky, Boris Korolev, Vladimir Krinsky, and others – the bright examples of architectural utopia. Early experimental designs were aimed at the glorification of the victorious revolutionary masses. However, the idea of a Temple (more or less reminiscent of a religious cult) existed for a short period and was replaced by one of a Palace. Representatives of the victorious proletarians had to enter large magnificent interiors, not inferior to the grandeur of the Tsars' palaces, but created in contemporary forms. The first official competition for designing the Moscow Palace of Labor – which had to serve as an example for other cities – was announced in 1922. Its program demanded to plan a big inner assembly hall, adjoining rooms for meetings, a canteen for 1500 persons, offices for the Moscow City Soviet and Communist party committee, and a "museum of social knowledge." None of the 47 submitted designs was realized, but the

competition demonstrated various directions for further architectural development (figs. 2, 6). Work by Alexander and Leonid Vesnin proved to be one of the first constructivist designs, Ilya Golosov presented a design with industrial symbols where the roofing of a main hall was shaped like a huge turbine. In Petrograd, Ivan Fomin envisioned a Palace of Labor for the workers of the Putilovsky plant. It featured the late neoclassical style of "red doric" or "proletarian classics." The Palace was intended for all kinds of recreation, including sports, arts, science. It was inspired by revolutionary romanticism, having been developed in 1919 during the advance of General Yudenich's troops on Petrograd. Apart from these institutional efforts to initiate the architectural history of a new age, there were, of course, individual initiatives, like Vasily Kandinsky's idea of erecting the International Art Building, the Temple of the "Great Utopia" ("I believe to be not the only one to feel happy if this temple gets the name of the Great Utopia," Kandinsky, 1920, p. 3). Kandinsky's program was for the synthesis of arts and the cooperation of the creative forces of the world.

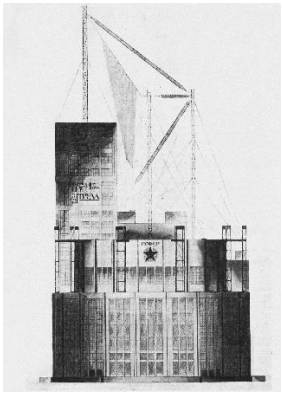

Figure 2. Alexander, Leonid, and Viktor Vesniny. Palace of Labor. 1923

Paper architecture and the garden city

Within a rather short period the experimental Zhivsculptarch Commission kept on by planning new cities and even bigger areas. The first projects for the city's structure regulation had been preparing for Moscow since 1918. The process of nationalization and development of the new form of property produced the utopian idea of a possibly "self-organizing" urban organism. That is why, according to the first recommendations for Moscow, the original historical structure had to be preserved and developed while considering its organic growth. Engineer Boris Sakulin suggested to spread the radial concentric system to an area of several thousand kilometers around Moscow. The first architectural scheme of the capital's re-planning was worked out with participation of Ivan Zholtovsky and was aimed at turning it into "the Garden City" by inserting rings and wedges of gardens and boulevards into existing system of streets and roads. The plan was completed by Shchusev in 1924 ("New Moscow") and it was supposed to avoid tall buildings and to preserve historical monuments as dominant markers among the green masses of gardens, which looked like a kind of "retrospective utopia" (Ikonnikov, 2004, p. 298-300). All those plans were presented as recommendations and continued

stockpiling. Two main aspects of the utopian context are highlighted by art historians – one inspired by futurism and modernism, and another one influenced by romanticism of the Silver age, leading backward and strongly reminiscent of fantasy in the spirit of Piranesi (Ikonnikov, 2004, p. 300).

The years of 1920-1921 (on the eve of the "new economic policy" period) were marked by wartime destruction, hunger, and social unrest. Hunger made some part of citizens move to the suburbs or rural places in order to have kitchen gardens. That is why the first designs of the workers quarters were planned as suburban settlements, built up using traditional materials. Those villages immersed in greenery had to be opposed to the dark slums of the big city, and it was easier to realize these projects as well. The idea of "the garden city" was based upon a strong belief in possible depopulation and ruralisation, that was reflected in utopian novel by Alexander Chajanov "Travel of brother Alexey to the country of the Peasants' Utopia" (1920). We find there a fantastic depiction of Moscow as a huge garden, where people do not live, but visit it for leisure and educational excursions. The same principle of "the garden city" was used to design workers' villages which originated at the construction sites of the first hydro-power electric stations. See, for example, the project submitted by Leonid and Aleksander Vesnin for Shaturskaya station. In it, the timber houses for workers had some decorative and constructional features not typical for traditional peasant houses. The project was realized alongside industrial, residential, and public buildings, each designed in different materials and in a different manner (Khan-Magomedov, 2001). The idea of a "garden city" developed as part of a social utopian outlook. The image of a "paradise" garden where people could find rest and comfort in harmony with nature was a prototype of contemporary trends of landscape design of the urban zones (for example, the park "Zarjadje" in the very center of Moscow).

At the same time, architects of the Zhivsculptarch commission undertook the discussion on residential houses for workers inside Moscow and other big cities where there was not so much place for new construction.

Paper architecture and collectivism

The idea of the commune (communal living with the socialization of many everyday functions) had existed before its architectural implementation. Since October 1917 several old buildings in Moscow, Petrograd and other cities were turned into collective dwellings (Smolny, Astoria hotel, "House of Arts" in Petrograd, "Nationale" hotel in Moscow, etc.) that were intended mostly for Soviet officials who lived close to their working places and had meals and heating for free. Though there were some prototypes, including communes from "*Chto Delat* [What is to be done]" by Chernyshevsky, in 1917-1918 this way of living was really a forced measure of "military communism." The first "working houses" or communes of workers appeared in 1918. The next step towards collective forms of everyday life was taken in 1920-1921 by the Communist youth organization (*comsomol*), insisting on forming communes of the young people, to cultivate comradeship and free them from the "petty-bourgeois" influence of their families and hardships of routine life. First communes were organized in former student dormitories and campuses under the slogan of "socialization of everyday life"

(Izmozik & Lebina, 2016, p. 143-147). Communes were thought to be the centers of new social life, self-governing and self-servicing, freeing women from routine housework for the sake of their social activity. Living in a commune was organized according to certain rules, their fulfillment predetermined by the construction. These rules seemed to coincide with laws of efficiency, functionality, and economy – helping to accumulate the energy of the working "units."

Figure 3. Nikolai Ladovsky. Idea of a communal house. 1920.

Collectivism was regarded one of the principal ideas concerning the new human. It was developed by leaders of Proletcult not only for living, but for processes of production (e.g., the "factory of writers" suggested by Sergei Tretiakov). The task was to grow a new human who is able to conquer the forces of nature, learn science, use technology in the course of harmoniously organized labor, and thus to become a natural collectivist – an organic part of the collective. The most radical followers of the leftists's ideas of "human machinery" thought dwellings to be places for the concentration, grouping and channeling of the productive forces, like accumulating and transmitting energy by electric chains. In 1919 Ladovsky made drawings for the first commune-house – high spiral construction, formed from individual residential units (fig. 3). Some years later his students from VHUTEMAS (The High Art and Technical Workshops) and were designing buildings and complexes with different amounts of socialized functionality: residential flats for families (in order to meet demand for traditional settings) and rooms for singles (1923). Realized in 1928-1929, the first building-communes were called "dwellings of a transitional type," for they had different parts with flats and rooms for families and solitary persons. Ladovsky continued to experiment with unit-cells, forming various combinations. The special premises were designed for public activities (clubs, reading rooms, "red corners") and for self-servicing collective use (laundries, kitchens, canteens) (House of Narkomfin in Moscow, Moisei Ginsburg, 1928-1929). In the pages of "*Sovremennaya arkhitectura* [Contemporary architecture]" there was lots of criticism addressed to architects for their pursuit supposedly of destroying traditional families and replace them by collectives (Okhitovich, 1929, p. 134; Taut, 1930, p. 63).

Paper architecture and the origins of constructivism

Vladimir Tatlin's tower at the Third International is the most famous example of paper architecture and embodiment of social utopian ideas in the work of art. Tatlin shared an understanding of constructivism as a method of life-building, creating a new environment for a new human. Nicholas Punin in his essay on Tatlin's Tower of the Third International suggests that the tower is the first example of implementing organizational principles in art, a single entity of idea, structure, function, and material. This article contains a theoretical look at the first steps of new art in terms of organizational theory: "utility of form is nothing other than the organization of its content. Forms devoid of practical significance […] are simply forms which are not organized" (Harrison and Woods, 1992, p. 312). Tatlin's idea took the shape of drawings and a model, still it has never been realized (though his idea of unsynchronized moving parts was used in contemporary architecture, see Ermolenko, 2020). The tower was a metaphor of the World revolution and was intended as the seat of a Global government of the future. It was commissioned by the Department of Fine Arts of the Narkompros (Ministry of Education) as a monument to the victory of the revolution. The first model exhibited in the building of the former Academy of Fine Arts in November 1920 was made from the same materials that he used for his counter-reliefs and corner-reliefs: ropes, plywood, tin, metal conjunctions. Simple and vulnerable materials contrasted with the greatness of the virtual image, but there was another aspect of it – spanning a bridge to the future, materializing the way of its implementation, visual presentation of a social idea of very high rank. As a work of art it definitely demonstrated the symbiosis of architecture, sculpture, and graphic art. The first architectural design that subsequently marked the formation of constructivism was the design of the Palace of Labor by Vesniny brothers – a combination of huge pure volumes to be built from metal, concrete, and glass, and equipped by modern means of communication (1923) (fig. 2).

The social meaning of constructivism was its future-orientation rooted in the idea of the new human who would be able to embrace scientific, technical, social experience in harmonious unity with the help of a new organization of labor, based upon natural organic skill as an integrated part of a whole. Alexander Bogdanov believed that this process of collective creativity develops naturally with the right purposes and justice in economic relationships. Constructivism based upon laboratory experimental methods helps to develop an empirical perception of the material, to learn different qualities and textures, their physical features (Ershova et al., 2019, p. 886).

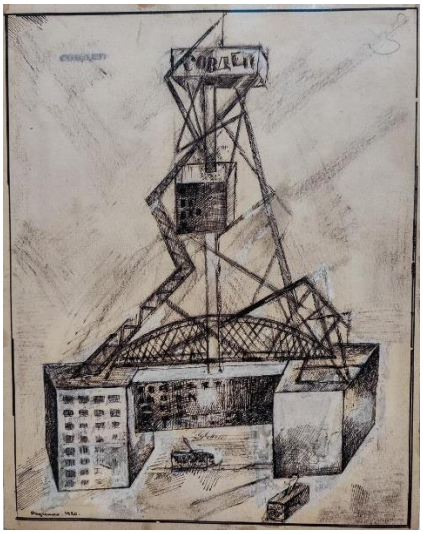

Figure 4. Alexander Rodchenko. House of Sovdep. From the series “City with the upper façade” (1920). From theExhibition “1922. Contructivism. The Beginning” at the Zotov center, January to March 2023

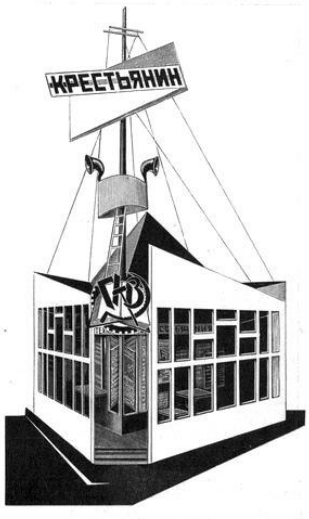

Figure 5. Alexei Gun. Village kioskn. 1926. (Lavrentiev, 2023, p. 157)

Experimental paper architecture as a result of professional activity, regulated by state commission practice, with competitions, meetings, and an education system, was strongly influenced by theoretical and artistic ideas of avant-garde. In 1920 Alexander Rodchenko made a series of architectural sketches of “Houses with the upper façade,” exploring the idea of high-rise constructions on top of the buildings in big cities (fig. 4). He also started to make numerous variations of “kiosks” that could in a short time be realized as real constructions, that was continued by other designers (fig. 5). It was Rodchenko who became head of INHUK (Institute for Artistic Culture) after Kandinsky left it in 1921. The year was marked by discussions on “Composition or construction”

and the founding of the First working group of constructivists. In the discussion, Nikolai Ladovsky suggested an accurate and laconic definition of construction: "Construction is a purposeful organization of the material elements" (2004, p. 325). Constructivism was not considered to be a trend or style, it was understood as a principle of life-building. Similarly, an understanding of architecture as fine art was marked by the influence of organizational theory: "within the period of constructivism we understand architecture as organization, invention, life-building" (Ginsburg, 1927/2021, p. 160). Alexey Gun, artist and author of the first manifesto "Constructivism," speculates about constructivism as a form of state cultural politics "based upon Marxist theory, proletarian struggle and modern technology." One of his main slogans called for a transition from abstract designs to the fulfillment of real tasks of the new culture (fig. 5). His appeal was to abandon old art that failed to fulfil its social role, and to replace sculpture by things in space, theatre by mass actions, architecture by constructivism (Gun, 1922, pp. 61-62). This understanding of constructivism as life-building and social project, if not social design, attached even greater importance to architecture. However, having taken a new step forward in social technology, constructivists were not able to free themselves from utopian thought which penetrated their appeals, texts, designs. The new technological reality in Russia at that time had mostly ideological and aesthetic meaning, was utopian itself, and brought to life techno-utopias in literature (see Geller & Nike, 2003). Moreover, constructivism seemed to mitigate the tragic effects of the situation by developing "laboratory methods" as a transitional stage from projection to production. In the art of constructivism, paper architecture achieved its full membership in the process of production, where all stages – idea, concept, drawing, model and thing – constituted a content of art (later these ideas would be revived in conceptual art). Architects creating utopian designs challenge engineers to estimate their ideas and tell them whether they are realizable or not. To make this collaboration easier, Anton Lavinsky made a series of schemes for principally important subjects: plan of the city, plan of the neighborhood, scheme of the radio mast. These schemes resulted from numerous drawings created within a long process of projection, embodying the ideal of maximal purposefulness (Mayakovsky, 1923, p. 64).

Naum Gabo understood constructivism as a universal method of creation irrespective of social life-building and class interests (Harrison and Wood, 1992, p. 297). He proclaimed the idea of a "thing" free from its temporal and accidental features, existing as a result of inner forces defining its position in space and time. Gabo's dynamic objects represented "life of the construction" in real time. Moisei Ginsburg in "Style and Epoch" laid the theoretical architectural foundation of constructivism, analyzing the role of constructive forces and dynamics in building. However, it was not until 1925-1927 when the first residential houses and "houses of culture" were really built.

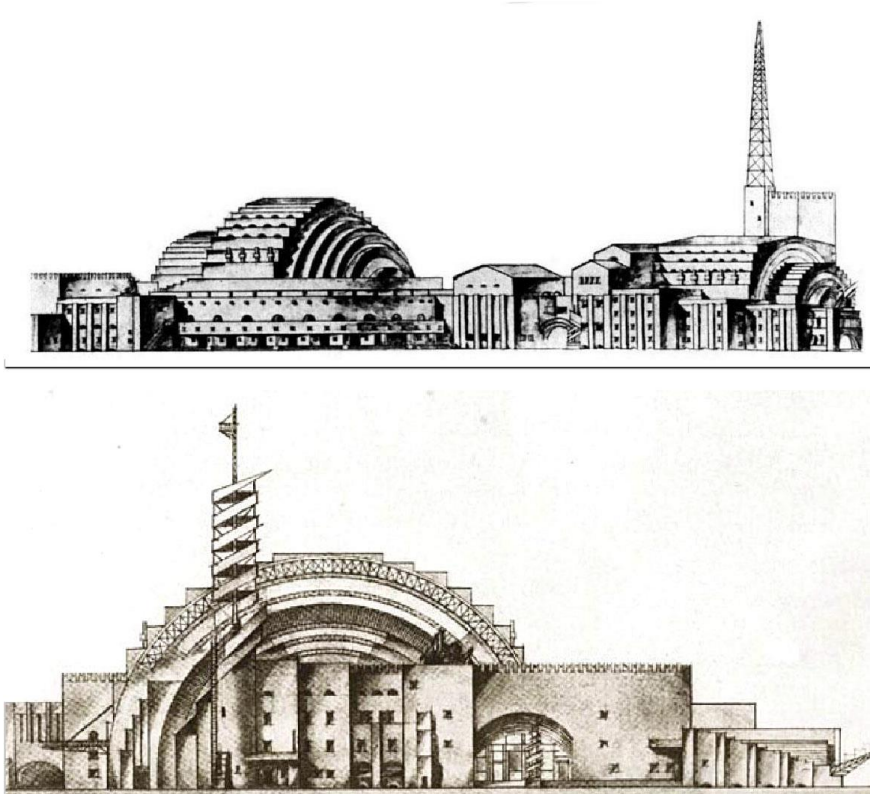

Figure 6. Ilya Golosov. Competition project for the Palace of Labor. 1922-1923. (Khan-Magomedov, 1988, p. 96)

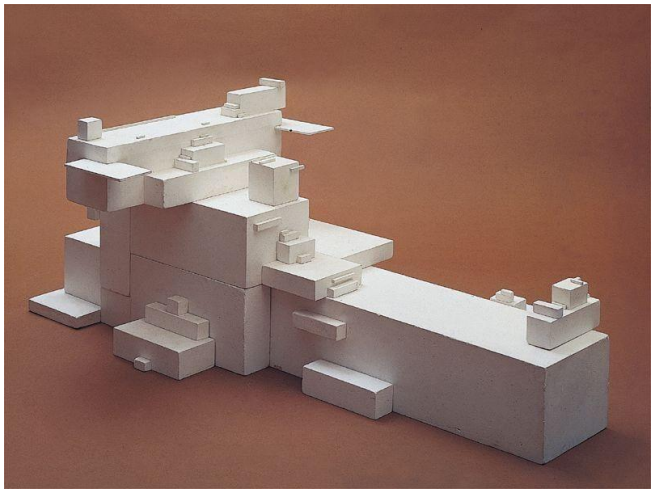

Figure 7. Kazimir Malevich. Architecton Alfa. 1920.

Kazimir Malevich was against the association of suprematism with constructivism, thinking about architecture as an "activity outside all utilitarianism, a non-objective art[…] free from all economical, practical and religious ideologies." He noted with bitter irony that practical routine life used to plead and beg an architect to accommodate it and

make room for it among architectural forms "so has to move in her sofas and beds" (Malevich, 2004, p. 281-290). He headed the UNOVIS (workshop in Vitebsk, applying principles of suprematism to the decoration of the town. For him it was the experiment of introducing suprematism in the environment. As opposed to the revolutionary designs, e.g. of Golosov (fig. 6), his spatial constructions ("architectons", created in 1920-1923) were artistic objects rather than architectural models, pure forms that we hardly imagine to be dwellings (fig. 7). While Malevich started active theoretical work in Petrograd in 1922, some of his students were involved in projecting and planning architectural constructions. Inspired by Malevich's "planites" they developed ideas of constructions torn from the ground level, overcoming gravity. El Lissitzky designed the series of 8 Horizontal skyscrapers (1923-1925) for the Moscow boulevard ring (presented in different kinds of graphics, technical drawings, and also in photomontage). Lazar Khidekel developed an idea of a raised up city on high supports, hanging over built up territories or parts of untouched nature. Architectural constructions were to connect all natural levels – underground, water and air. His ideas of raised up tiered architecture are used now, but in the 1920s his ecological designs belonged to the realm of utopia (fig. 8). Still he came closer to the implementation of suprematic ideas than anyone of Malevich's disciples. The influence of Malevich's "planites" and "architectons" – he himself attached only spiritual and aesthetical meaning to them – was much wider than the circle of his followers and students. His experiments with pure volumes and suprematic coloring influenced young architects in the Leningrad Institute of Civil Engineering, especially Alexander Nikolsky, who was working out a completely new system of teaching and training, based upon making compositions of abstract forms, drawing "archscemes" (typical designs from pure volumes). By this time, architectural (constructive) drawings and designs had been already widely used in the education process in Moscow schools of art and crafts like VHUTEMAS and in various experimental laboratories and workshops.

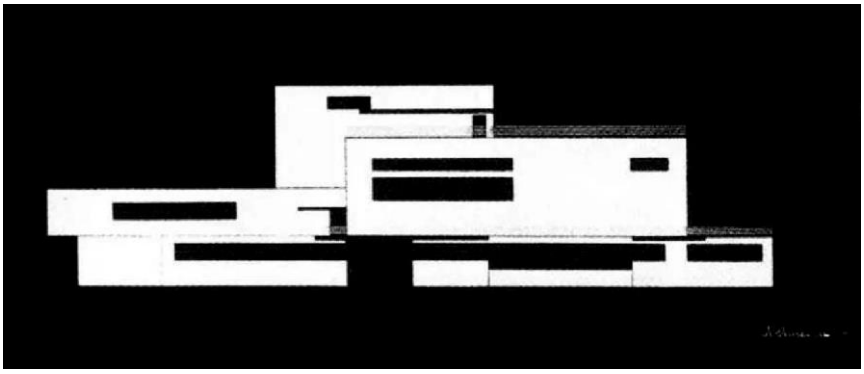

Figure 8. Lazar Khidekel. Design of the Workers' club. 1926 (V kruge Malevicha, 2000, p. 208)

Designs, fantasies and sketches of paper architecture created a new language of forms and a grammar of their correlation. This new language was freed from traditional content and restrictions, probably, like the words in futurists' poetry. Modern technology, though practically out of use, was a source of creative ideas (Bylieva & Nordmann, 2023, p. 71). This new language allowed for the creation of an endless number of individual

designs in the future. It could not comply with regulations of socialist realism, so it was forced out of architectural practice. Still it outlived the social utopias of the 1920s and survived in educational systems. At the same time, the language of neoclassicism and neoromanticism (that was also seriously influenced by a utopian outlook) was appropriated in the further development of architecture. It proved to be more survivable, adaptable under changing political conditions.

CONCLUSION

The period of 1917-1925 was marked by a creative upsurge of architectural thought and projections separated from practice. Fantastical and often principally unrealized designs of paper architecture took shape in artistically performed graphics. It started in Moscow experimental institutions, where architects discussed the utmost social and ideological problems of the time – greatness of the proletariat, its everyday life in collectives, and the bright future in new garden cities. Architectural drawing with its special individual manner and various techniques became a widely spread artistic genre, reflecting utopian ideas not only for their social origin, but also for their aesthetic and philosophical origin. This genre crystallized in architectural fantasies by Chernikhov, from which he compiled "handbooks" for learning architectural language before it would be used for some specific goal.

Constructivists tried to connect theory, projection, modelling, and practice, but in architecture it was still not possible, so they concentrated on "laboratory work," which resulted in the mass production of new forms and their combinations. Constructivism in realized architectural projects appeared several years later, in the second half of the 1920s. The language of paper architecture was affected by futurism and a new social and technological reality. Utopianism in Russian thought and social consciousness was deeply rooted in culture, however, in post-revolutionary years it was intensified by the expectation of a great future as well as the great difficulties in the ways of approaching it. It was avant-garde in art, spanning a bridge to the future by creating visual images and a formal language of non-existent worlds ("the great utopia"), thus designing new instruments to achieve global changes. However, having started with those tools they still saw their final goal "in the dim of social myth" (Grois, 1993, p. 14). And so, speaking about "paper architecture," we are facing at least four dimensions of utopianism – political, social, artistic, and philosophical, connected to life-building and organizational theory, as well as ideas of cosmism.

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