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# URBAN PLAN OF UŽICE FROM 1863. BY EMANUEL ŠEFEL From Oriental to European Urban Planning

UDC 711.4(497.11 Užice) "1863"

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Abstract. The City of Užice had 2490 inhabitants in mid 1862. Following the order of the state administration that every city must have an urban plan, firstly a Geodetic plan of the current state of the city center was made and based on it, in May 1863 the first urban plan proposal (author Emanuel Šefel) appeared. The Ministry of Internal Affairs, because of a large number of complaints of the population and of a short period time available to make changes to the plan sent the engineers Joseph Vesely and Joseph Klinar to Užice so that they could assist. The second urban plan proposal was completed towards the end of 1863. The first urban plan of Užice transformed the town, previously fully regulated by oriental principles, into a city organized according to European urban principles. The plan was effective from 1871 to 1891.

**Key words**: 19<sup>th</sup> century urban planning in Serbia, Serbian cities reconstruction, urban reconstruction, urban planning, geology and urban planning.

#### 1. Introduction

The first urban plan of Užice was developed in 1863. After the fire of 1862, which destroyed most of the town, people migrated out the town and the number of Užice denizens was reduced from 5700 to 2490. Local Serbian administration, acting upon orders from Belgrade, by the end of 19<sup>th</sup> century laid town planning foundations for the city of Užice modeled after European cities and eliminated almost all traces of oriental urban planning An urban reconstruction was done, in the period from 1863 to 1871 in several stages: firstly a Geodetic town plan was made, then based on it the First urban plan proposal, next, the Proposal was put up for a public debate and all citizen complaints were collected which lead to making of the Second urban plan proposal and, eventually, the city Assembly adopted the ultimate proposal of the town urban plan. The adopted plan was effective since 1871 to 1891.

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#### 2. THE FIRST URBAN PLAN OF UZICE

The Ministry authorized the Engineering Council to develop the plan. A geodetic plan of the burned down town district was firstly made. The first urban plan proposal was done on its basis. After the fire in 1862, a lot of building ruins remained in the town center so the local administration, according to the permission from Belgrade sold the remnant structural material in order to clear the land plots for future construction. After the public review of the First proposal of the Urban plan (author Emanuel Šefel)<sup>2</sup> both Joseph Klinar came from Čačak, and Joseph Vesely<sup>3</sup> from Loznica, to assist in plan corrections according to the citizen's remarks.

The district engineer Dragoljub Ugričić held the plan proposal inapplicable and produced a list objections containing 9 items regarding improper streets layout and alignment (because of the gradients and sharp bends), military barracks location, city markets locations, river training etc.<sup>4</sup> The citizens who did not take part in the government distinguished themselves in the reconstruction of the town. They founded a town planning Commission and through their own work, collected funds for constructing public baths, the park and a green belt around the town in order to protect it from torrential floods.<sup>5</sup>

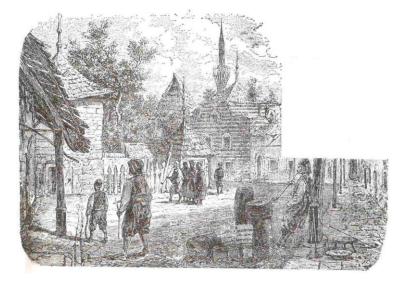


Fig. 1 Užice, "in front of Mudir's residence", (F. Kanic) 1860.

<sup>&</sup>lt;sup>1</sup> AS-NOU-1868.g. No 1026 29.5.1868.g., from: Živković, N., (1981) *Užice 1862.g.*, Užice.

<sup>&</sup>lt;sup>2</sup> Emanuel Sefel was born in Joachimstal in 1825 and finished his education in Prague. He came to Serbia in 1850. He worked in Majdanpek from 1851 to 1856. He worked in the Ministry of Interior from 1856 to 1858. He worked in the Krajinski distict from 1859 to 1862. He was appointed a district engineer on 12<sup>th</sup> February 1863 and he worked until 1865. His first task was the regulation plan of the burned down part of the town of Uzice. IN the Ministry of Construction, he was a 2<sup>nd</sup> class engineer from 1865 t o1876.

<sup>&</sup>lt;sup>3</sup> Josif Veseli district engineer from 1856. to 1868.g. From 1856. to 1866.g. engineer 6-th class, Ministry of Construction in Belgrade.

Živković, N., (1990) *Užički okrug 1865-1880.*, Užice, pp. 49-51.
Živković, N., (1981) *Užice 1862g*, Užice, pp. 29.

#### 2.1. Geodetic plan of the current state (March 1863.)

The geodetic plan of the current state was made in March 1863. It covered only the central town part destroyed by the fire. It provides valuable information on the town in the Turkish occupation period: the town was divided into the Muslim and Christian parts, urbanistically divided in *mahalas* (neighborhoods) organized around the mosque or *masjid*, the riverbed was untrained, the public facilities of the occupying authorities were located in the western town part (near the fort), madrasa and *Muselim's* (Provincial governor) residence were located on the west side, and large cemetery was in the town center splitting the town into two parts, and above the cemetery was the Post office. The east part of the town contained mahalas with the Christian population, the church, Serbian administration and the green market.

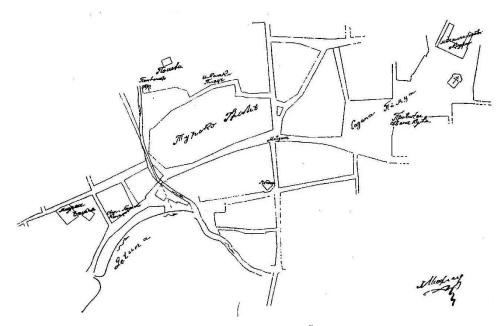


Fig. 2 Užice, Geodetic plan (E. Šefel) 1863.

#### 2.2. First urban plan proposal (May 1863)

The first urban plan proposal was made by engineer Emanuel Sefel and then delivered for consideration in May 1863. The proposal was made based on the geodetic plan of the current state.

The plan included solely the part of the town burned in fire. There was neither time nor need for inclusion of a wider area. Extending the intervention plan would increase the time required for preparation of the plan and the number of potential problems that would be solved. If we assume that the population density was about 150 inhabitants/hectare, and number of registered residents 2490, the town covered the surface area of about 17 hectares.

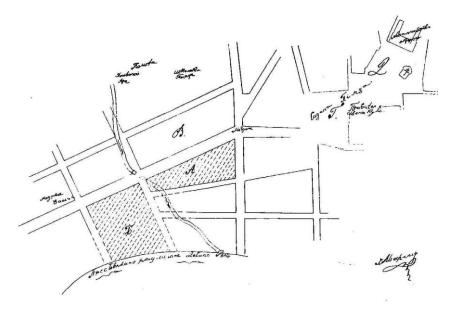


Fig. 3 Užice, Urban plan, First proposal (E. Šefel) May 1863.

The plan objectives were: to remove the cemetery in town center, to correct the improper transportation network, to correct street axes, to equalize street width, to correct city blocks geometry, to form market-squares, to provide space for public facilities on market-squares, to train the Djetinja riverbed, to introduce the obligation that every structure must be built on the alignment line, to adopt the rules of building construction, to use the central block part only for ancillary facilities, etc..

Traffic design was characterized by the restriction: the existing roads mostly had to keep their layouts, but they were straightened and had no broken axes between intersections. Streets were ranked by relevance in the city and acquired certain widths based on the rank. The widest street was the main street and it extended from the Market on the east side (along the route previously occupied by bazaar) towards west to the location of madrasa. All other streets in the city have smaller widths. The western half of the city was designed in a precise rectangular street pattern. Terrain around the main street and the river allows streets to stretch perpendicular to contour lines. In the area above the main street the terrain has higher gradient, so the streets, if they are perpendicular to contour lines, are too steep and impractical for motor traffic. After training the riverbed the space was freed for a new city block. The stream flowing into the Djetinja river was trained in the stretch from the main street to its confluence, so the space for a new city block was created. The market area near the church kept its irregular boundaries. In the eastern part of three city all streets kept their alignments as well as in the southern part of the city but their alignments were corrected.

Geometry of the city blocks is rectangular. The proportions of the block sides vary from 1:1 to 1:3. Public areas in the town were formed by reducing the area of the blocks. The blocks located in the south of the city have proper square and rectangular forms and at places where two of geometrical patterns met, several trapezoidal blocks were formed. In

comparison to the existing state, the new block draft represented reconciliation between the original situation and the new European town planning principles. The comparison of the existing situation and of the first urban plan proposal is provided in the illustration.

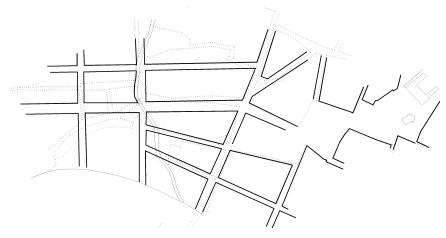


Fig. 4 Užice, Geodesic and First proposal relation, May 1863.

### 2.3. Second urban plan proposal (end of 1863)

Second urban plan proposal was developed by the engineers E. Scheafer, J. Vesely and J. Klinar at the end of 1863. This draft was adopted by the City Assembly 1871 and remained effective until 1891.

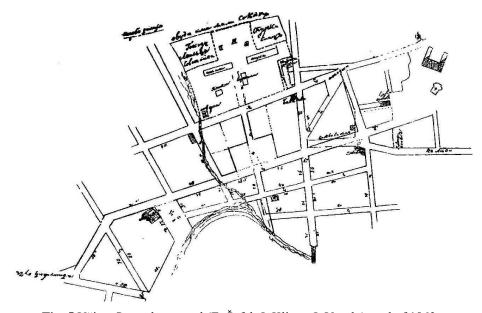


Fig. 5 Užice, Second proposal (E. Šefel, J. Klinar, J. Vesely), end of 1863.

The plan coverage is extended to north and west: the barracks with the surrounding city area and the flat ground extending to the foot of the slope towards the fort were included. There were numerous improvements in the plan: the barracks area covering the largest city area (about four residential blocks) was included, as well as the space around County district office on the east side; the main street from west to east no longer ended on the square near the District administration but continued further east, a new block was formed between the market and the main street etc.

Markets. Three irregularly shaped markets along the main street were formed: next to the District administration office, near Knez Miloš and next to the church. The market near the church had the same geometry as in the First plan proposal. The Knez Miloš market had an rectangular shape but it was intersected along the cut in the middle by the new street leading to the barracks. The Sveti Sava market had three streets as three tangent lines around it. A triangular space was created at the intersection point of the main street and Koštica stream, resembling the rural crossroads, and it will later evolve into a new market place.

Blocks geometry. A street was formed south from the Knez Miloš market space leading straight to the river Djetinja. On west end two additional blocks were included. Market space was formed in front of the elementary school. The main street was shifted to the north parallel to the former line. The blocks were rectangular having side ratio 1:1, 1:2 to 1:3. The blocks shapes were trapezoidal, triangular, and complex. The blocks dimensions were 21 to 80 ml. The existing state and the Second plan proposal relation are presented in the illustration.

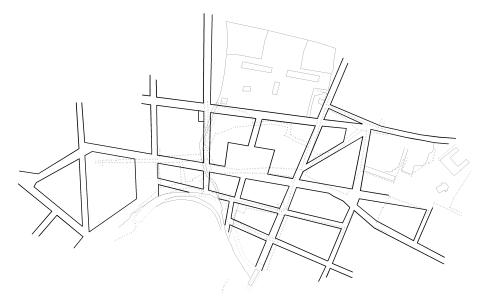


Fig. 6 Užice, Geodetic and Second proposal relation, end of 1863.

#### 2.4. Morpho-geological characteristics of the field of urban plan

The area of the urban plan from 1863 year. located on the left side of the Đetinja. In geomorphological terms, the plan covers the alluvial plateau and the largest part of the first river terrace that slopes gently toward the river course. The soil that makes these two geomorphological forms composed of fluvial sediments as well as piedmont deposit and river drift decomposed materials generated from the surrounding Carboniferous sandstones and schist.

The whole base soil of the urban plan is composed of sandstone and Carboniferous schist which extend in several tens of kilometers from Uzice to both sides along the NW-SE direction bordering the Triassic limestone and spread to the SI. The River Djetinja in its flow from Uzice to Požega generally follows the boundary between these two geological units. On the right side of the Djetinja there is a small alluvial fan, which quickly turns into a zone of partially built lithified colluvial materials as well as decomposed lower-Triassic clastic sediments.

Moving away from the river course, the steep slopes of massive and stratified limestone which constitute mountain range of Zabučje are rising. Due to the geomorphological characteristics the right side of the Djetinja is not so suitable for the development of the city as the left side, what probably lead to the first city plan development of the space located on the left side of the river. The town itself had a perspective for development due to affordable building materials: clay, stone and wood, and because of the quality of available drinking water, and the river valley for communication.

#### 3. CONCLUSION

The first urban plan of Užice was made in 1863. As the basis for the plan, the current geodetic situation plan of the city center was made. This geodetic survey represents the first urban plan of the town. It features winding streets of unequal width, irregular blocks, untrained rivers and streams, and a large cemetery in the town center. According to the current situation Geodetic plan, the First proposal of urban plan was made in May 1863. (Emanuel Šefel). The first plan proposal terminated the cemetery in the town center, outlined the training of the riverbed of Djetinja and Uremovac stream, formed two new blocks on the space freed by river training, straightened street alignments, corrected the geometry of blocks, around the church and District administration office, formed a town market, connected main street with the market near the church etc. The dissatisfaction of citizens during the public evaluation of this proposal was caused by the small number of markets and the main street design. The engineers Joseph Klinar (from Čačak) and Joseph Vesely (from Loznica) came to the city in order to assist with the making of the Second urban plan proposal with E. Šefel. In the plan they expanded the extent of the plan to north and west, formed two blocks and a market on the former cemetery area, reduced the block in which elementary school was located and created space for another market. The main street partially changed its direction and was extended to east, couples of parallel roads spread through the town from east to west, and north to south, riverbeds of Djetinja river and Uremovac stream were trained, and the area for the barracks was formed. The graphic presentation of the plan was updated and in the drawing all blocks had their side lengths marked and certain streets had their width marked. This urban plan was adopted in 1871 and remained in force until 1891.

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Archive of Serbia: AS-NOU-1865, AS-NOU-1868, AS-SOU-1869. Archive of City Užice. Archive by author.

#### Origin of Illustration

Fig. 1: Kanic, F., (1985) Srbija, zemlja i stanovništvo, Beograd.

Fig. 2, 3, 5: Živković, N., (1981) *Užice 1862*, Užice.

Fig. 4, 6: Author.

# URBANISTIČKI PLAN UŽICA EMANUELA ŠEFELA IZ 1863. GODINE

## Od orijentalnog ka evropskom urbanizmu

Grad Užice polovinom 1862.g. je imao 2490 stanovnika. Postupajući po naredbi državne uprave, da svaki grad mora imati urbanistički plan, najpre je urađen Geodetski plan postojećeg stanja centra grada i na osnovu njega, maja 1863. Prvi predlog urbanističkog plana (Emanuel Šefel). Ministarstvo unutrašnjih dela usled velikog broja primedbi stanovništva i kratkog roka u kome je potrebno da se naprave izmene plana poslalo je u Užice kao pomoć inženjere Josifa Veselog i Josifa Klinara. Drugi predlog urbanističkog plana je završen krajem 1863. Prvi urbanistički plan Užica je varoš, koja je u potpunosti uređena po orijentalnim principima, preobrazio u grad prema evropskim urbanističkim načelima. Plan je bio na snazi od 1871.g. do 1891.

Ključne reči: Urbanizam 19.v. u Srbiji, rekonstrukcija gradova u Srbiji, urbana rekonstrukcija, urbanizam, geologija i planiranje.