

## USING ROUND FORMS IN URBAN PLANNING

**Stesenko O. M.**

*National Aviation University, Kyiv*

*Scientific supervisor – Bzhezovska N. V., major teacher*

### I. INTRODUCTION

The round shape has a natural township and city, which was a lot built in the history of mankind. For the construction of defensive structures circle is the most economical form. In the territories where the landscape allowed, the cities sought to round outlines, even the presence of a hill of rivers or riverand were not for the form of a circle obstacle. Like the rings in trees, as well as in historical development round city increases the ring residential quarters, protective and social buildings.

Round form was associated with the minimum length of the city walls, which significantly saves the effort on their erection. A circulate shape is very simple to create on the terrain with one rather long rope. This form is readily achieved, which also speaks of its economic effectiveness.

### II. THE MAIN PART

Analysing the forms of plans of early cities, beginning in ancient Egypt and Mesopotamia, two forms of plans can be distinguished: square or rectangular, with a clear rectangular grid of streets and a circle with a radial-ring system and the central square.

The oldest city Dvyrichchia had a columnar shape. For example, a near-right round plan has a wall surrounding the temple in Tel-el-Obeyd. The outer walls of ancient Ura cheer approach the wrong oval shape. The rounded outlines has a sacred area in the Upi. A perfectly correct circular contour demonstrates the sirohetsk city of Samal. Already from this list it is evident that the round form of plans is typical for the first egyptian cities, and in the cities of the Asia is not only widespread, but also stable. Cities such as Samal in the X-VIII century BC received the strengthening of the Ring scheme when the urban planning of ancient Egypt used rectangular forms of plans.

In XVI-XVII centuries city planning obeyed the rules fortification its time. Cities were in terms of the shape of a circle, semicircle, square. On the perimeter of the located defensive ditches and ramparts with basoons. Street planning had a regular character. In the XVII century in the form of a circle was designed plan of the city-fortress Slutska.

Architect Richard Kaufman developed a construction concept based on the use of concentric circles, which include administrative and public buildings in their scheme. According to this concept, most of the Moshans were built before 1948. Nahalal in the Northern part of Israel, belongs to the regional Consulate of Israel and is the first city of workers. It was founded in 1921 and has a round plan shape. Small streams running

throughout the city contributed to the appearance of mosquitoes that cause malaria. Therefore, at first only the hilly parts of the territory were inhabited for life, and only later the inhabitants mastered the flat terrain.

In the process of historical development of cities, the round shape is often lost and dissolved in more complex plans. But the core manifests itself in the city's transport communications system. The planning structure in this case will be with several rings and a radial highway scheme.

The development and preservation of the circular shape of the plan in the process of city growth has its own characteristics. In the process of development, a radial-ring system is formed. At the same time, the Central part has the greatest changes in the transformation of the planning structure due to the loss of elements of historical planning, which are replaced by elements of a complex planning structure. You can preserve the original circular shape of the historical city by limiting its further growth. With the spatial growth of the city, the preservation of its round shape is possible only if the city is located on a relatively flat surface.

In planning circular cities, it is not necessary to adhere to the nature of circular planning structures within the circular shape of the city. In the history of urban planning, there are examples of a combination of round and square plan forms. The city of Kristianshaup (Danmark) was built in the XVII century in its scheme, a rectangular planning structure with two mutually perpendicular diagonals.

In the process of development, a city that initially has a rectangular shape may gradually turn into a round or semi-circular one. An example of this transformation is the plan of the city of split and the oldest known city of the Aryans — Arkaim

### **III. CONCLUSION**

Round cities have come to us since ancient times. This indicates that this form was most advantageous for the defense of settlements and their further growth. The scheme of the plan form determines the nature of the development of this city for a long period of time and it can not be arbitrary or random. Based on it, you can predict the future evolution of the city.

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