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INVESTIGATION OF NOISE DISTRIBUTION ON THE BASIS OF CONDITIONAL SYMBOLS AND ITS DESCRIPTION.

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Abstract: This article describes the procedure for performing geodetic and cartographic mapping of urban noisemmaps. Modern geodetic (shumometric) devices used to measure noise frequencies, and the coordinates of the limit of noise impact on urban buildings and structures using GPS technology and processing of measured data using modern geodetic software (Panorama).

With the help of the panorama program, noise maps of the noisy streets of Samarkand were created based on the legend.

Keywords: Shumometer, gps, optimal, panorama, geomodelirovanie, frequency and speed, landscape design, monitoring, cartographic signs, innovative, architectural, ecological, acoustic landscape design.

Introduction

A comprehensive study of man, his relationship with the world around him, has led him to understand that health is not only the absence of disease, but also the physical, mental and social well-being of man. Man has always lived in a world of sounds and noises. Every day we are exposed to different frequency sound waves as a result of general traffic, evening TV or listening to music.

Problem statement. Measuring the propagation of a noise wave, its impact on the environment, and geomodeling are becoming one of the current tasks of modern geoinformatics.

This is due to a number of factors, the main of which are:

- Intensive urbanization of areas with an increase in the number of noise sources;

-increase in the number of vehicles and the need to control their noise;

- Densification of territories with increasing demands for the welfare of the population;

- increase in the number of sources of noise at work and in human life

In our study, we aimed to develop a set of measures to protect against the effects of traffic.

In our research, we identify and create a map of traffic noise in traffic jams on the streets of A.Rudaki, M.Ulugbek, Samarkand Registan, A.R.Beruni. A geodetic base was created using a GPS instrument, and observations were made on each foundation with a Sumerian instrument to determine the extent of the noise impact. Determining the plan and elevation bases of these foundations, measurements were made at each point from 9:00 a.m. to 10:00 a.m. and from 5:00 p.m. to 6:00 p.m.

The Panorama program was used based on a 1: 10,000 scale city noise map. In describing the noise propagation, the Panorama program's conditional sign panel developed conditional signs from 30 dB to 100 dB, starting in decibels that affect human health, and these signs were represented by various geometric shapes (Figure 4). We will mark the created symbols 30-40 db, 40-50 db, 50-60 db, 60-70 db, 70-80 db, 80-90 db, 90-100 decibels on the bases on our map. On this topographic map you can see that 10 db is denoted by 10 db divided by 10 and we can determine the decibel of this point (Figure 1).



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For example, an asterisk is marked at 90-100 dB on the icon and is painted up to 2 in red on a 10-poin



Figure 1. Creation and application of symbols

We can see that our set point on this symbol is 92 db. If the noise has changed decisively over the years, we have the ability to change it by clicking with the mouse on the embedded symbol.



Figure 2. Created conditional characters



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The noise is set to 92 dB. If, over time, the noise increases decibels, for example, if it is 95 dB, selecting (spot) to change (Auto movement) will bring a symbol to 95-100, and if you select, it will be 95 db.



Figure 3. Demonstration of change as a result of noise rise

To change the decibel of the noise, select (spot) and select Auto movement, the symbol will be 95-100, and if you select it with the mouse, it will be 95 db (up to 5 db will automatically turn red). In this developed method, such analyzes as regional analysis, comparative analysis, analytical, statistical analysis of streets were carried out. A conditional sign indicating the noise level in the current state of the noise decibel measured across the streets has been created. Noise data collected along city streets should be widely used in the design of the city, in determining the route of parking lots, in construction sites, in health epidemiology, in determining whether

the city is safe for tourists, in the creation of cartographic works in updating noise maps. Because noise maps allow you to scientifically assess the current situation, determine the situation, be aware of the outcome of the prediction. It is necessary to constantly monitor the characteristics of the periodic change of noise as a result of increased traffic in the city. It is necessary to improve the status of changes in the noise detection score on the map and to carry out monitoring work on the basis of space methods in the development of measures and the development of noise maps based on their results.



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Figure 4. Construction of the noise map of Samarkand

Conclusion: Thus, the acoustic beautification of urban areas, the creation of an optimal acoustic environment is an important task of modern spatial planning. To solve this problem, it is necessary to start with the organization of continuous monitoring of noise levels in the city.

Noise maps The main sources of urban noise are preliminary information about their acoustic parameters, the level of noise pollution in the city and the appropriate selection of means to reduce urban noise and create a project of its placement.

According to the results of geoinformation, there is an opportunity to develop a set of special measures for planning and noise protection, optimal and rapid distribution of traffic flows. Based on the strategic noise map of the city, the master plan will include soundproof houses in the quiet part of the city, other means and measures to reduce noise (for example, removing noisy businesses from residential areas or establishing optimal operating modes and routes of the most noisy transport).

Thus, noise maps are the basis for assessing the current and estimated noise regime in the city.

Important tasks to be solved in solving these problems:

is to create a system of continuous monitoring of noise in cities.



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