

## MONITORING OF THE URBANIZED TERRITORY: METHODS, TECHNOLOGIES, RESULTS

### *Andrey N. Beshentsev*

Baikal Institute of Nature Management SB RAS, 6, Sakhyanova St., Ulan-Ude, 670031, Russia, D. Sc., Professor of RAS, Head of Laboratory, phone: (301)243-36-76, e-mail: abesh@mail.ru

### *Evgenia E. Kuklina*

Buryat State Agricultural Academy named after V. R. Filippov, Institute of Land Management, Cadastres and Melioration, 8, Pushkina St., Ulan-Ude, 670024, Russia, Ph. D., Head of Department, phone: (301)246-67-62, e-mail: kadastr@bgsha.ru

### *Kirill I. Kalashnikov*

Buryat State Agricultural Academy named after V. R. Filippov, Institute of Land Management, Cadastres and Melioration, 8, Pushkina St., Ulan-Ude, 670024, Russia, Ph. D., Deputy Director for Research, phone: (301)246-67-62, e-mail: izkim@bgsha.ru

### *Nimbu D. Baldanov*

Buryat State Agricultural Academy named after V. R. Filippov, Institute of Land Management, Cadastres and Melioration, 8, Pushkina St., 670024, Russia, Ulan-Ude, Ph. D., Head of Department, phone: (301)246-67-62, e-mail: mel\_izkim@bgsha.ru

The article provides information on the methods and technologies used in assessing the dynamics of an urbanized territory, gives a brief description of them, and outlines the advantages and disadvantages. The concept of geoinformation monitoring of an urbanized territory is formulated. To integrate heterogeneous and diverse data and assess the dynamics of residential nature management using the example of Ulan-Ude (The Republic of Buryatia), a problem-oriented GIS for monitoring an urbanized area has been developed. The functional structure of a GIS consisting of measuring, analytical, cartographic and publishing blocks is presented, a characteristic of each block is given. The dynamics of the urbanized territory of the city of Ulan-Ude has been estimated for six time slices. The physical and geographical features of the development of the urbanized territory are determined, a map of the dynamics of the urban territory for the entire period of residential development is compiled, a forecast for the further development of the urbanized territory by background and local development is presented.

**Key words:** urban area, residential nature management, dynamic, monitoring, geoinformation technology, GIS.

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