THE ANALYTIC HIERARCHY PROCESS AS A MEANS OF OPTIMIZATION OF RECREATIONAL FOREST RESOURCES USAGE

M. M. Kutia, V. A. Svynchuk, V. M. Kutia

Specialists of Kyiv forest-park enterprises have to make economic decisions which are usually based on a large number of criteria and to define measures for optimal organization and improvement of recreational forests. The effectiveness of decisions depends on many factors (legal, economic, etc.) and the competence of managers, engineers and technicians of forest-park enterprises.

The aim – to use AHP in order to select plants on the territory of the forest park landscapes that are most often used in recreational terms.

Materials and methods research. In order to study the features of usage the analytic hierarchy process for the improving management of recreational resources were chosen five typical forest areas that are situated on the green zone of the Kyiv city.

This method was developed by the American mathematician Thomas L. Saaty. To achieve this goal applies AHP algorithm, which includes 6 steps: the definition of main goal; structuring the main goal and the construction of the hierarchy from the top to the lowest level; formation a pairwise comparison of all elements in the hierarchy; formation of sets of local priorities vectors; definition of the vector of global priorities; selection of the best alternative.

Using the above algorithm, were made comparisons respecting to the goal criteria, comparing alternatives for each criterion, and were made appropriate calculations that found which forest landscape among five selected forest stands in experts' opinion is often used for recreation. As a result, this forest landscape requires caring and beautification first of all. These actions will provide sustainable recreational use of this area and its resistance to human impacts.

The specified method can be used in the practice of forestry and forest management as a means of rational decision-making and improving recreational forest resources usage.