

**CURRENT CONDITION OF STREET ORDINARY PLANTATIONS OF  
KHERSON**  
**СУЧАСНИЙ СТАН ВУЛИЧНИХ РЯДОВИХ НАСАДЖЕНЬ МІСТА  
ХЕРСОН**

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**Abstract.** *The article considers the current state of street ordinary plantations of the city of Kherson. 59 species of woody plants were identified in the studied plantations. The results of the field survey found that investigated quantitatively dominate the green street plantings and green bands *Platanus orientalis* L., *Acer platanoides* L., *A. pseudoplatanus* L., *Morus nigra* L., *Robinia pseudoacacia* L., *Gleditsia triacanthos* L., *Populus alba* L., *P. italica* (Du Roi) Moench, *Fraxinus excelsior* L., *Biota orientalis* (L.) Franco. Most of the trees in the street plantings have already reached the coming age and need regular molding and sanitary pruning. The average longevity class of woody plants in street plantations is 2,6. This indicates a high average age of tree species. Among the woody plants of street plantations, a high percentage of specimens affected by diseases and pests. Accordingly, the tree plantations will need complete reconstruction in the near future.*

**Key words:** *woody plants, longevity class, age of plantings, landscaping*

**Анотація.** *В статті розглядається сучасний стан вуличних рядових насаджень міста Херсон. У досліджених насадженнях ідентифіковано 59 видів деревних рослин. Переважають у досліджених зелених вуличних насадженнях та зелених роздільних смугах *Platanus orientalis* L., *Acer platanoides* L., *A. pseudoplatanus* L., *Morus nigra* L., *Robinia pseudoacacia* L., *Gleditsia triacanthos* L., *Populus alba* L., *P. italica* (Du Roi) Moench, *Fraxinus excelsior* L., *Biota orientalis* (L.) Franco. Більшість дерев вуличних насаджень вже досягли пристигаючого віку та потребують регулярної формувальної та санітарної обрізки. Середній клас довговічності деревних рослин у вуличних насадженнях – 2,6. Це свідчить про високий середній вік деревних порід. Серед деревних рослин вуличних насаджень високий відсоток екземплярів, уражених хворобами та шкідниками. Відповідно деревні насадження в найближчому майбутньому будуть потребувати повної реконструкції.*

**Ключові слова:** *деревні рослини, клас довговічності, вік насаджень, озеленення*

### **Introduction.**

Street plantings of cities are created as a single architectural and construction complex with buildings and taking into account sanitary and hygienic, ecological, transport and other requirements. Street planting every year becomes more and more

necessary in view of the ever increasing traffic transport gassed i increase dust in the air, increasing noise pollution [1,2].

### **The main text.**

The most typical elements of street landscaping are ordinary plantings of trees on sidewalks, ordinary plantings of trees in strips of lawns or flower beds and green stripes in front of houses (between the sidewalk and the stage) [4]. The most common way of landscaping streets in Kherson is to create ordinary plantings of trees along the streets. This is the planting of trees of the same species, which are created at regular intervals in the holes along the edge of the sidewalks. They are used to delimit the territories of open quarters and microdistricts. They play an important noise-protective and dust-absorbing role. They are arranged in the form of hedges and curbs, partitions (pergolas, trellises and fences) of twisted plants, ordinary plantings of trees and shrubs, as well as tree and shrub groups [4].

The results of the field survey found that investigated quantitatively dominate the green street plantings and green bands *Platanus orientalis* L., *Acer platanoides* L., *A. pseudoplatanus* L., *Morus nigra* L., *Robinia pseudoacacia* L., *Gleditsia triacanthos* L., *Populus alba* L., *P. italica* (Du Roi) Moench, *Fraxinus excelsior* L., *Biota orientalis* (L.) Franco and other. In total, 59 species of woody plants were identified in the studied plantations.

Species with a very high share of participation in street plantings (5 class) include species: *Populus italica* (11,0%) *Platanus orientalis* L. (10,5%). High participation rate – *Acer platanoides* (8,0%), *Robinia pseudoacacia* (7,5%), *Acer pseudoplatanus* L. (7,0%), *Fraxinus excelsior* L. (6,0%) та *Catalpa speciosa* (Warder ex Barney) Warder ex Engelm. (5,0%). The average share belongs to the species *Acer saccharinum* L. (1,0%), *A. negundo* L. (2,0%), *Aesculus hippocastanum* L. (3,0%), *Morus alba* L. (2,0%), *M. nigra* L. (3,0%), *Populus alba* (4,0%), *Platanus occidentalis* L. (2,0%), *Syringa vulgaris* L. (2,0%). Other species belong to 1 and 2 class, that occasionally occur at street stands and are isolated instances.

Most of the plantations along the highways represented by *Platanus orientalis*, *Acer negundo*, *Catalpa speciosa*, *Sophora japonica* L. have already reached the

coming age and have wide-spreading crowns. This often hinders traffic, which is contrary to the State of build rules Ukraine [3]. Accordingly, most of them require regular molding and sanitary pruning [5].

More than 80% of trees belong to the 2nd class of durability, to the species that retain decorative qualities at the age of 30 to 50 years. A number of species belong to the third class, that is groups of short-lived species that retain decorative qualities at the age of 25 to 30 years. Analysis of the class of average durability shows a high average age of tree species. Accordingly, the tree plantations will need complete reconstruction in the near future [4]. This is also evidenced by the high percentage of specimens affected by diseases and pests, and the general phytosanitary condition of the city's street plantings.

### **Conclusions**

Optimization of the system of street green plantations should be based on knowledge and practical experience of plant resistance to adverse environmental conditions, taking into account resistance to pollutants in the air, as well as the ability of plants to combat the harmful effects of vehicles and noise pollution. However, the renewal of plantations should be carried out with durable highly ornamental species that will create a favorable microclimate in anthropogenically contaminated areas.

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Article sent: 23.08.2020

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