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Naturalization of Alien Woody Plants in Northwest Russia under Climate Change

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Abstract. *The introduction of woody plants in St. Petersburg began in the first years of the city's existence, in the early XVIII century. However, attention was paid to the spread of self-seeding only in the second half of the 20th century. At the beginning of the XXI century, against the backdrop of climate warming, the number of alien species of trees and shrubs that had reached a generative state increased noticeably. For a number of species, seed offspring were obtained for the first time in a long period of introduction. This makes it possible to grow a larger number of woody plants from locally reproduced seeds, and, ultimately, contributes to their acclimatization and introduction into urban landscaping. At the same time, self-seeding of a number of introduced species has been and continues to be detected, where it has not been observed before. As of autumn 2024, seed regeneration has been noted in 308 species and hybrids from 89 genera and 39 families. 21 alien species can be classified as invasive and potentially invasive plants. The formation and maintenance of self-seeding depends on the placement of plantings, it is affected by the age of the plants, the degree of soil sodding and its moisture, the illumination of the site, the absence or presence of care. Constant monitoring of all alien species that form self-seeding is necessary as potentially invasive.*

Key words: *alien woody plants, arboriculture, self-sowing, changes of climate, Saint-Petersburg.*

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