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THE EFFECTS OF MAINTENANCE WORK ON THE GROWTH OF SPRUCLE SEEDLINGS IN THE NURSERY

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Lately, the regeneration and expansion of forests has been carried out using artificial interventions, the most suitable method being plantations, using high-quality forest seedlings. In order to achieve this, maintenance work on nursery crops plays an important role.

Spruce was one of the first species to start breeding in Europe. This species is one of the most important ones, covering an area of approximately 30 million hectares at European level, and in Romania it covers an area of approximately 1.37 million hectares.

The present work aims to study the effects of maintenance works on the growth of spruce seedlings in nurseries. For this study, experiments were carried out in the Ursu Nursery of the Groșii Țibleșului Forestry Park.

In order to determine the effects of certain maintenance works on the development of spruce seedlings, a number of 6 test squares were made, where their diameter and height were analyzed. Two measurements were carried out, the first one at the beginning of the study, in 2022, and the second one in 2023, at the end of the study.

The maintenance works were: watering, weeding and soil mobilization. The best results on seedling development were obtained in the seedlings where the following works were applied: watering + folding + soil mobilization, where at the end of year 2022 the seedlings had a height of (25.33 cm), and in year 2023 having an extra 10 cm. It was also noted that weeding and soil mobilization between the rows of saplings had relatively equal effects on sapling height in both 2022 and 2023.

For the production of forest seedlings, it is recommended to apply maintenance work in all nursery crops, regardless of their type, as it has a beneficial role and gives a significant increase in seedling growth.

Keywords: development, Nursery, saplings, spruce, works.