SUSTAINABLE MANAGEMENT OF FOREST RESIDUE AND WOOD WASTE IN SERBIA

Goran Stojićević[1], Suzana Knežević, Milena Milojević

Academy of Vocational Studies Šabac, Unit of Agricultural and Business Studies and Tourism, Vojvode Putnika 56, 15000 Šabac, Srbija
e-mail: csugoran@gmail.com

Abstract

The exploitation of forest funds in Serbia during 2021, according to data from the Republic Statistical Office, shows that 735,647 m^3 of wood has been cut down, of which 73,601 m^3 is waste. Cut wood is used as industrial and technical wood, but also for firewood. The remains in the cutting of the forest tree include: remnants of bark that has been removed from the enclothes, ends with crust when cutting hulls, thin branches with bark, and stumps with roots. As a result of wood processing, wood waste is created which by size can be classified into three groups - bark, large debris after cutting the enclothal and small remains (sawdust, scraping, wood dust). Forest debris (forest biomass) and wood waste are a significant resource that has not been used enough. In the face of the current global energy crisis and declining reserves of fossil fuels, forest waste and timber waste are becoming increasingly attractive products as demand for wood-based energy is steadily growing and razors, pellets and wood are increasingly being used for firewood. Managing forest waste and wood waste is based on one of the main goals of waste management, which is to reduce the negative impact of waste on human health and the environment in a sustainable way. Rising waste disposal costs and rising environmental awareness are also contributing to the growing importance of waste wood recycling. New methods are being developed for recycling wood waste – it is added in small quantities to the cement or mortar mixture, resulting in stronger and more waterproof material. There is also the use of wood waste in the form of wood flour for obtaining different wood-plastic composite materials. Sustainable management of forest remains and wood waste should be based on the principle of a circular economy whose concept implies that waste does not exist, i.e. it becomes a resource that can be exploited.

Keywords: forest waste, management, Serbia, wood waste