

Chemical Industrogenic Transformations of Soils on the Selected Area of Przedgórze Hżeckie – Anna Świercz

Summary

“Ożarów” Cement Plant manufactures cement with the application of dry method, thus supplying its products on more than 15% of the domestic market. The processes, especially troublesome for the environment, are as follows: raw material output, its transportation, grinding, burning, packaging and storage. The aim of this paper is to determine the influence of emission from “Ożarów” Cement Plant on the chemical properties of the soils being under its direct impact. There are seven soil profiles done in the forested complex at the South from the Cement Plant. In soils material content chemical properties were examined. On the basis of the profile structure the uncovered soils were defined as albic arenosol and haplic podzol soils. The following have been noticed: the change of pH value of soil from 8.3 in the organic horizons, the change of CaCO_3 at the depth of 30–40 cm, the considerable decrease in the hydrolytic acidity, aluminum and exchangeable hydrogen, the saturation of the sorption complex mainly by cations Ca^{2+} and Mg^{2+} , the considerable salinity of the organic horizons from 270 mg KCl/100 g, the considerable trophic, considerable content trace elements in organic horizons.