Abstract

Evolution of contamination in the Plouļnice River Basin (Bohemia) due to uranium mining in the period 1992-2009

A study was set up to follow the effects of uranium ore mining in the Czech Republic and its environmental aspekt. This study assesses evolution of radioactivite pollution in the Plouļnice River Basin, which was impacted by waste water from uranium mining and processing from Stráġ pod Ralskem location. Period includes the beginning of the geological survey in the 60´s after the end of mining extraction and clean-up launch of acid leaching solutions in the 90´s.

Consequently to discharges of mining water, bottom sediments, and biomas of aquatic organism in the Plouļnice River were contaminated by radioactiv substance. Samples of water, bottom sediments and biomas were used for laboratory testing. The observation programme included also in-situ monitoring of soil contamination in flood plain areas along the Plouļnice River. In-situ metod and laboratory charakterizations of contaminated sites continued up to date.