



The Czech Elbe project - the Elbe River and its tributaries

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Within the Elbe project the research is oriented towards the problems connected with meeting the demands of national and European water legislation, particularly the Water Framework Directive (WFD). On the Elbe River itself we study the influence of industrial sources of pollution including pollution incidents, ecotoxicology, old industrial sites and their potential effect on groundwater, the dynamics of contaminated sediments in the channel and the floodplain, fish migration using telemetering, dangerous substances using chemical biomarkers and we carry out biomonitoring in 3-years time steps. Three large tributaries are studied from the point of view of evaluation of extreme hydrological events on the basis of continuous simulation using experimental data for constraining uncertainty, runoff generation and origins of nitrate using isotopes ^{15}N and ^{18}O , space-time changes of phytoplankton as depending on hydrological and meteorological conditions, physical habitat of fish and characteristics of fish communities. Description of development in the basin on the basis of environmental indicators is carried out on the whole Czech Elbe catchment. The Czech Elbe Project is harmonised with Elbe case study within the framework of the EU project NeWater. The Czech Elbe Project (1991-2006) is supported by the Ministry of Environment of the Czech Republic.