RESEARCH OF IMPORTANT GROUNDWATER SOURCES OF CZECH-SAXONY TRANSBORDER REGION

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An interesting and useful topic that can be addressed within the European Union is the issue of transboundary aquifers. Groundwater is often used as an important water resource on both sides of a common state border and can therefore be affected by cross-border waters. The international project ResiBil, ongoing in 2016–2020, was focused on the joint protection of significant aquifers in the Czech-Saxon border area. The project focused on areas of Cretaceous sediments of Děčínský Sněžník, Czech-Saxon Switzerland and the Lužické Mts. The aim of the ResiBil project was to determine the balance, evaluate the possibility of long-term use of groundwater resources and sustainable management of them, depending on the expected impacts of climate change. The performed studies and models showed, that the reason for changes in the water regime and water balance in the landscape are, to varying degrees, both climatic and anthropogenic influences. However, the use of groundwater has significant reserves in the project area.