

No excavations have taken place in Rasa, Croatia for 10 years, but the mines remain environmentally hazardous

The underground of Istrian coal mines in Rasa can have a negative impact on local food production even though the mines were closed more than a decade ago, warns a group of scientists in the international Journal of Coal Geology.

The most important result of the study is the unquestionable confirmation that groundwater flushes coal and contaminates the local environment with a number of potentially toxic trace elements, according to an article recently published in the International Journal of Coal Geology.

Among these elements, the most prominent are selenium, barium, vanadium, uranium and strontium, the article states, and emphasizes the need for further hydrogeochemical examination of the environment.

Istrian coal mines comprise a technological landscape that extends over 200 square kilometers, with more than 14 kilometers of underground mining channels.

These canals were filled with water after the cessation of the mines for almost four centuries, and comprehensive geochemical, petrological and mineralogical analyzes of coal samples from Raša exposed to the mining water were needed, according to an article signed by nine authors. one of which is from Croatia.

Also, it is noted that local coal is known for its unusually high content of organic sulfur. From 9.92 percent of the total sulfur, the experts calculated the percentage of 9.87 percent of organic sulfur based on ash analysis. That proportion of sulfur coal in chemical research gives it an extreme position, the study warns.

Coal layers reach a thickness of up to 400 meters, and are tectonically extremely fractured, which is why some parts of the mine are located 400 meters below sea level, as in the Labin area, and even 500 meters below the sea, as in Plomin.

About 40 million tonnes of coal from Rasa have been excavated in almost four centuries, of which almost half from 1945 to 1984, and at most in 1942 - 1.16 million tonnes. The last coal cart was pulled out on May 28, 1999 at 11.30 am.

There are an estimated 4.4 million tonnes of coal left in the underground.

Residual deposits, exposed to groundwater, release potential toxic trace elements into the surrounding streams, posing a danger to locals, experts warn.

Source: hr.n1info.com