

FLUIDIC DYNAMICAL MODEL OF KOLSKAYA SUPERDEEP WELL LOCATION REGION IN THE CONTEXT OF MINERAL DEPOSITS FORECAST PROBLEM

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Kolskaya superdeep well stripped the ancient Earth crust to the depth of 12,262 m. Numerous discoveries in the field of Earth sciences have been made as a result of stripped section research. The major is the discovery of the crystal wave-guide and permeable zones at considerable depths. Authors have carried out a revision of the existing conceptions concerning state of the matter at the abyssal parts of the Earth crust. As a result there was drawn a conclusion that the inner Earth crust water volume is commensurable with such in the World Ocean. We have worked out a model of fluid flow across the crust wave-guides in geological time scale. The fluid flow mechanism idea lies in the natural oscillation implementation due to the matter compaction and dilatation in the Earth crust. The wave-guide existence and dynamic balance condition are accomplished as a result. The proposed model has been employed to advantage in the specific case of Kolskaya superdeep region. This region corresponds to endogenic copper-nickel deposit field. On the North the Atlantic Ocean shelf flanks it. The shelf's sedimentary rocks are rich in hydrocarbons. The fluid flow mechanism understanding is the clue to the search for mineral deposits in this region.