

NEW PECULIARITIES IN THE STRUCTURE OF NORTHERN MID-KURIL TROUGH (BASED ON SEISMIC CONTINUOUS DATA)

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New peculiarities of Northern Mid-Kuril trough structure are examined using data on SCP (seismic continuous profiling) and results of their repeated interpretation (Kuril island arc). They include unconformities in the Late Cenozoic cover and conditions of sedimentation; numerous gas seeps (windows and columns) as zones of break or visible weakening of reflectors intensity in the sedimentary cover and probable source of gas in situ; «field» type anomalies and gas hydrates; small, possibly volcanic, cones on the Northern Vityaz submarine ridge; peculiarities of valley network structure. Some geological challenges and history of formation of inter-arc trough and adjacent arc structures and Kuril deep-sea trench are also discussed with regard of reinterpretation results.

Keywords: trough, cover, unconformity, gas seep, gas hydrate, «field» type anomaly.