

Seismological observations in Antarctica

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Abstract The history of seismological observations development in Antarctica is shown. Maps of the existing seismic stations and earthquake epicenters location on the mainland territory for the instrumental monitoring period (1956–2018) are presented according to data from International centers. Russian seismic stations monitor major earthquakes around the globe, earthquakes in the seismic zone around Antarctica, and local seismic phenomena in Antarctica, including local earthquakes and ice sheet ruptures. Since 1999, the Novolazarevskaya seismic station has been equipped with digital equipment. An analysis of the sixth continent seismicity was made; the records of the Antarctic strongest earthquakes (2007, 2008, and 2012) by the GS RAS stations Mirny and Novolazarevskaya were shown.

Keywords Antarctica, seismic station, seismological observations, digital records, summary processing, earthquake.

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