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Organizing the runways in the area of the Russian Antarctic stations in East Antarctica sector during the seasons of the 59 - 64rd RAE (2013/19)

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For logistic operations of the Russian Antarctic Expedition (RAE), maintaining the existing runways near the Russian wintering stations and field camps, as well as the creation of new ones, is of great importance. The presence of airfields ensures a mobility of personnel and a movement of goods, which greatly simplifies implementation of field work and provision of stations. One of the most significant is the airfield of Novolazarevskaya station, which is organized in a zone of "blue ice". Its distinctive feature is an ability to take airplanes on a wheeled landing gear, in particular, IL-76TD. Most airfields are organized on a snowy surface and are designed to receive airplanes on a ski landing gear, since the blue ice zones are few in number. In this regard, their identification, especially near infrastructure, is an important application. Zones of "blue ice" of sizes acceptable for organization of aerodromes are presumably located in the area of the Russian Progress and Mirny stations. The work aimed at their search and study was carried out in the period 2016-19 by conducting GPR and glaciological works.

In addition, until recently Mirny station was the only Russian station that does not have air traffic. In this regard, during the field work of 2013-2016 complex GPR, glaciological, geodesic and drilling investigations were conducted aimed at revealing the place and organizing the snow-runway. The work was complicated by the presence of numerous zones of crevasses located in the station area. However, the place was chosen, and on February 10, 2016, the medium-range DC-3T (BT-67) Turbobasler from ALCI was taken to the landing pad.