

The results and prospects of the Baikal Gigaton Volume Detector

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We present the current status and plans of the Baikal-Gigaton Volume Detector (Baikal-GVD) experiment. Baikal-GVD is the project of a cubic-kilometer scale high-energy neutrino observatory. For the time being GVD consists of three clusters of optical modules, the first of which was deployed in 2015. At the moment detector reconstructs both muon tracks and showers produced by high-energy neutrino. We present the preliminary analysis of data acquired coincidentally with IceCube “blazar” IC170922A and LIGO neutron stars merger GW170817 events, and give the upper limits for neutrino fluxes for these event obtained at GVD. Finally, we discuss the development of Baikal-GVD alert system for multimessenger studies.

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