

Search for Neutrino Events Associated with Gravitational Wave at Daya Bay

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Several gravitational-wave (GW) events have been observed by the Advanced LIGO and Virgo detectors. Providing a connection between neutrino emission and GW bursts is obviously important for understanding the underlying physical processes associated with GW creation. The Daya Bay Reactor Neutrino Experiment is designed for measuring the neutrino mixing angle θ_{13} using reactor antineutrinos at the Daya Bay Power Plant in South China. It has 8 antineutrino detectors with identical design positioned at multiple baselines that help in suppressing incoherent cosmogenic backgrounds and detector-related noises. During the years since the discovery of the first GW signal, Daya Bay has been running continuously and smoothly. In this poster, we will present the latest results of a search for electron anti-neutrino signals in coincidence with the detected GW events.

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