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The First Pair of Antineutrino Detectors for the Daya Bay Experiment BRYCE LITTLEJOHN, University of Wisconsin - Madison, DAYA BAY COLLABORATION — The Daya Bay Reactor Neutrino Experiment is being built to precisely measure the value of θ_{13}, the final mixing angle in the PMNS neutrino mixing matrix. The Daya Bay experiment is the most sensitive reactor θ_{13} experiment, measuring the parameter to a sensitivity of 0.01 for $sin^2(2\theta_{13})$ by comparing the relative flux of antineutrinos from the Daya Bay reactor cores with antineutrino detectors at near and far distances. In an effort to ensure detector systematics are well-understood to better than 0.38%, the experiment's antineutrino detectors are constructed in pairs to be as identical as possible. This talk describes the design, fabrication, assembly, and characterization of the Daya Bay experiment's first two antineutrino detectors.

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