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Recent three-flavor neutrino oscillation results from the NOvA experiment

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NOvA is a long-baseline experiment studying primarily neutrino oscillations in the NuMI beam from Fermi National Laboratory (FNAL), USA. It consists of two functionally identical, finely granulated detectors which are separated by 810 km and situated 14.6 mrad off the NuMI beam axis from FNAL. By measuring the transition probabilities $P(\nu_{\mu} \rightarrow \nu_{e})$ and $P(\nu_{\mu} \rightarrow \nu_{\mu})$, NOvA is able to probe the following parameters: Δm_{32}^2 , the mixing angle θ_{23} , the CP violating phase δ_{CP} and the neutrino mass hierarchy.

This talk will present the latest NOvA measurements of the neutrino oscillation parameters using neutrino and antineutrino disappearance and appearance.

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