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Neutrino-induced neutral-current elastic (NCE) scattering in the P0D in the T2K experiment DANIEL RUTERBORIES, Colorado State University, T2K COLLABORATION — The T2K experiment is a second generation long baseline neutrino oscillation experiment designed to search for the appearance of an electron type neutron oscillating from a muon type neutrino. The PiZero sub-detector (P0D) of the T2K off-axis near detector ND280 is used to characterize the neutrino beam and to measure neutrino cross-sections. The T2K neutrino narrow band beam peaks at ∼700MeV, where experimental knowledge of these cross-sections is limited. The NCE measurement provides a probe into the fundamental structure of the target nucleons, an understanding of final state interactions in the target nucleus, as well as a way to compare models to data in comparisons between NCE and the dominant charge-current analog to this process. I will give an overview of the NCE interaction in this energy region and present the current status of the ongoing data analysis.

Daniel Ruterbories
Colorado State University

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