

Construction of new hybrid CC1 π + sample for the SK detector error estimation

Friday, July 6, 2018 8:15 PM (15 minutes)

In the energy region of T2K beam, which is peaked around 0.6 GeV, CC1 π + is a dominant channel besides CCQE. Consequently, T2K plans to include CC1 π + channel as a signal channel. An evaluation of the Super Kamiokande (SK) detector related systematic errors on CC1 π + needs to be done. A new hybrid sample is constructed, as it was successfully used for the evaluation of π 0 background in the SK detector in previous oscillation analyses. In this poster, we will describe how the atmospheric neutrino data in SK enabled the construction of a CC1 π + hybrid sample and the possibility to apply the results to the systematic error estimation.

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Session Classification: POSTER

Track Classification: Neutrino Physics