

Session Program

12-15 Apr 2021

IoP 2021 - Joint APP/HEPP/NP Conference

Parallel Stream 3

Edinburgh, Remote

Monday 12 April

13:30

Parallel Stream 3: Large liquid detectors

Session | **Location:** Edinburgh, Remote | **Convener:** Alexander Deisting

13:30–13:45

Alpha - Neutron Background Characterisation Within the SNO+ Detector

Speaker

Matthew Cox

13:45–14:00

Cosmogenic Muon Induced Background Tagging in the SNO+ Scintillator Phase

Speaker

Lorna Nolan

14:00–14:15

Search for Heavy Neutral Leptons using the ArgoNeuT detector at Fermilab

Speaker

Patrick James Green

14:15–14:30

SNO+, Supernova neutrinos and Supernova Burst Trigger

Speaker

Mr Michal Rigan

14:30–14:45

Improved reconstruction of charged pions and other particles in the NOvA near detector

Speaker

Cathal Sweeney

14:45–15:00

Reducing sensitivity to systematic uncertainties of the deep neural networks employed in the NOvA experiment

Speaker

Kevin Mulder

15:00

Tuesday 13 April

14:45

Parallel Stream 3: Neutrinos: The long and the short of it

Session | **Location:** Edinburgh, Remote | **Convener:** Thomas Dealtry

14:45–15:00

Neutral current quasielastic neutron tagging analysis with Super-Kamiokande-Gd

Speaker

Pruthvi Mehta

15:00–15:15

Improving CP violation sensitivity with improved electron neutrino cross-section measurements at Hyper-Kamiokande

Speaker

Charlie Naseby

15:15–15:30

Near detector constraint on beam and interaction model parameters in the T2K long-baseline neutrino oscillation analysis

Speaker

Joseph Walsh

15:30–15:45

An Electron Neutrino Selection in the Short Baseline NearDetector (SBND)

Speaker

Edward Tyley

15:45–16:00

Using inclusive electron scattering data to improve the uncertainty on the nucleon removal energy systematic at T2K

Speaker

Jordan Michael McElwee

16:00–16:15

An improved muon neutrino charged-current single positive pion cross section on water using michel electron reconstruction in the T2K near detector

Speaker

Sam Jenkins

16:15

Thursday 15 April

11:30

Parallel Stream 3: Neutrino interactions

Session | **Location:** Edinburgh, Remote | **Convener:** Nicola Mcconkey

11:30–11:45

Selecting charged current ν_μ interactions with final state γ s in the T2K near detector

Speaker

Tristan Doyle

11:45–12:00

Measurement of the Electron-Neutrino Charged-Current Inclusive Cross-Section on Argon in MicroBooNE

Speaker

Krishan Mistry

12:00–12:15

Treatment of the $^{13}\text{C}(\alpha, n)^{16}\text{O}$ background in the SNO+ antineutrino analyses

Speaker

Charlie Mills

12:15–12:30

Systematic Uncertainties in the NOvA Muon Neutrino Disappearance Analysis

Speaker

Ms Yibing Zhang

12:30