

Session Program

17-23 Aug 2025

ML4Jets2025

Theory

California Institute of Technology, CHEN100
1200 E. California Blvd., Pasadena, California

Thursday 21 August

11:20

Theory

Session | **Location:** Broad 100, Chen Neuroscience Research Building | **Convener:** Rikab Gambhir

11:20-11:40

Autonomous Model Building with Reinforcement Learning: An Application with Lepton Flavor Symmetries

Speaker

Jake Rudolph

11:40-12:00

Observable Optimization for Precision Theory: Machine Learning Energy Correlators

Speaker

Katherine Fraser

12:00-12:20

Giving machine learning a boost towards respecting (approximate) symmetries

Speaker

Inbar Savoray

12:20-12:40

An Energy Correlation Function tagger for gluon-gluon resonances

Speaker

Connor Moore

12:40

Friday 22 August

09:00

Theory

Session | **Location:** Broad 100, Chen Neuroscience Research Building | **Convener:** Prasanth Shyamsundar

09:00–09:20

Explicit versus implicit physics priors for separating nearly identical classes

Speaker

Tanvi Wamorkar

09:20–09:40

Machine Learning Neutrino-Nucleus Cross Sections [remote]

Speaker

Dr Karla Tame-Narvaez

09:40–10:00

A novel loss function to optimise signal significance in particle physics [remote]

Speaker

Jai Bardhan

10:00–10:20

Machine Learning Symmetries in Physics from First Principles

Speaker

Konstantin Matchev

10:20