

Session Program

Aug 2 - 6, 2021

**A Virtual Tribute to Quark Confinement and
the Hadron Spectrum 2021**

Parallels Track H

online

Mon, August 2

5:00 PM

Parallels Track H: Parallel I

Session | Location: online

5:00 - 5:30 PM

Review of statistical practices in CMS

Speaker

Andrea Carlo Marini

5:30 - 6:00 PM

Statistical methods at LHCb

Speaker

Matthew Kenzie

6:00 PM

Tue, August 3

9:00 AM

Parallels Track H: Parallel II

Session | Location: online

9:00 - 9:20 AM

Tensor Renormalization Group for interacting quantum fields

Speaker

Esperanza Lopez

9:20 - 9:40 AM

High-energy physics at ultracold temperatures

Speaker

Daniel González Cuadra

9:40 - 10:00 AM

Collective Monte Carlo updates through tensor network renormalization

Speaker

Dr Sofyan Iblisdir

10:00 AM

Wed, August 4

5:00 PM

Parallels Track H: Parallel III

Session | Location: online

5:00 – 5:20 PM

Machine learning regression and error quantification for lattice QCD Monte Carlo observables

Speaker

Boram Yoon

5:20 – 5:40 PM

Progress towards dynamical fermions in flow-based MCMC for lattice ensemble generation

Speaker

Gurtej Kanwar

5:40 – 6:00 PM

Finding the deconfinement temperature in lattice Yang-Mills theories from outside the scaling window with machine learning

Speaker

Mr Nikolai Gerasimenuik

6:00 PM

Thu, August 5

9:00 AM

Parallels Track H: Parallel IV

Session | Location: online

9:00 - 9:20 AM

RanBox: Anomaly Detection in the Copula Space

Speaker

Tommaso Dorigo

9:20 - 9:40 AM

Unfolding by Folding: a Bayesian resampling approach to the problem of matrix inversion without actually inverting any matrix

Speaker

Pietro Vischia

9:40 - 10:00 AM

Deep Reinforcement Learning based numerical analytic continuation of one-loop diagrams

Speaker

Andreas Windisch

10:00 AM

10:10 AM

Parallels Track H: Parallel V

Session | Location: online

10:10 - 10:30 AM

Mitigation of systematic errors induced biases in ML-based selection

Speaker

Francisco Matorras

10:30 - 10:50 AM

Effect of Systematic Uncertainty Estimation on the Muon $g-2$ Anomaly

Speaker

Glen Cowan

10:50 - 11:10 AM

Evaluating extremely low p-values with importance sampling techniques in discovery-oriented HEP analyses.

Speaker

Francisco Matorras

11:10 AM

Fri, August 6

2:30 PM

Parallels Track H: Parallel VI

Session | Location: online

2:50 - 3:10 PM

Preserving gauge invariance in neural networks

Speaker

David Müller

3:10 - 3:30 PM

Equivariance and generalization in neural networks

Speaker

Matteo Favoni

3:30 PM

3:40 PM

Parallels Track H: Parallel VII

Session | Location: online

3:40 - 4:00 PM

Highlights of gradient methods for simulation-based inference

Speaker

Andrey Ustyuzhanin

4:00 - 4:20 PM

Detector Reconstruction and Fast Simulation in High-Energy Physics using Graph Generative Models

Speaker

Mrs Darya Dyachkova

4:20 - 4:40 PM

Machine learning for Lattice QCD

Speaker

Dr Tomiya Akio

4:40 PM