

## Session Program

23-25 Sept 2024



## Fourth MODE Workshop on Differentiable Programming for Experiment Design

***Muography***

Valencia (Spain)

# Tuesday 24 September

09:00

## Muography

**Session** | **Location:** Valencia (Spain) | **Convener:** Pablo Martinez Ruiz Del Arbol

09:00–09:20

### Optimisation of muon tomography scanners for border controls using TomOpt

**Speaker**

Zahraa Zaher

09:20–09:40

### Generative Adversarial Neural Networks for muography simulation: image prediction

**Speaker**

Pablo Martinez Ruiz Del Arbol

09:40–10:00

### Segmentation and anomaly detection on Muon Tomography applied to the inspection of containers

**Speaker**

Carlos Diez

10:00

# Wednesday 25 September

09:00

## Muography

**Session** | **Location:** Valencia (Spain) | **Convener:** Pablo Martinez Ruiz Del Arbol

09:00–09:20

### Muon momentum estimation in scattering tomography

**Speaker**

Mr Florian Bury

09:20–09:40

### Improving Material Identification in Muon Scattering Tomography with Machine Learning.

**Speaker**

Angel Bueno Rodriguez

09:40–10:00

### Muographic Image Up-Sampling with Machine Learning for Built Infrastructure Applications

**Speaker**

Mr William O'Donnell

10:00