

## **Session Program**

**27 May 2025 to 2 August 2025**

# **USCMS Undergraduate Summer Internship 2025**

## ***Afternoon***

WH11NW, Pileup

# Tuesday 27 May

13:00

17:00

## Afternoon

Session | Location: WH11NW, Pileup

13:00–14:00 CMS Physics Overview

Speaker  
Tulika Bose

14:00–15:00 CMS Detector - a discovery tool

Speaker  
Steve Nahn

15:00–17:00 Entering Research

Speaker  
Chris Palmer

## Wednesday 28 May

13:00

### Afternoon: Afternoon Session

**Session** | **Location:** WH11NW, Pileup

13:00–14:30

#### Cohort building

**Speakers**

Matthew Bellis, Sudhir Malik

**Location**

Pileup

14:30–17:00

#### The UNIX Shell: A guide through the basics of the file systems and the shell

**Speaker**

Iliomar Rodriguez Ramos

**Location**

WH11NW, Pileup

17:30

# Thursday 29 May

13:00

## Afternoon: Afternoon Session

Session | Location: WH11NW, Pileup

13:00-14:00

**How to do Particle Physics in a Climate Emergency? (Curia II-WH2SW) - WH11NW - Pileup**

**Speaker**

Kenneth Bloom

14:00-17:00

**Git II - In this lesson we use Git from the Unix Shell**

**Speaker**

Marco Mambelli

**Location**

WH11NW, Pileup

17:00

## Friday 30 May

13:00

### Afternoon: Afternoon Session

**Session** | **Location:** WH11NW, Pileup

13:00–14:00

#### CMS Computing

**Speaker**

Andrew Malone Melo

14:00–17:00

#### Python II: Building Programs with Python

**Speaker**

Bruno Moreira Coimbra

17:00

# Monday 2 June

13:00

## Afternoon

Session | Location: WH11NW, Pileup

13:00-14:00 Visit to Quantum Garage (IARC)

Location  
Sidet

14:15-17:15 Python for HEP

Speaker  
Roy Cruz Candelaria

Location  
WH11NW, Pileup

17:30

## Tuesday 3 June

12:50

### Afternoon

**Session** | **Location:** WH11NW, Pileup

13:00–13:45

#### ROC Tour (WH Atrium)

**Location**

WH11NW, Pileup

13:45–14:45

#### What is a jet? (Remote talk from CERN)

**Speaker**

Garvita Agarwal

**Location**

Fermilab, Pileup

14:45–17:00

#### PyROOT and RDataFrame

**Speaker**

Xiaohe Shen

**Location**

WH11NW, Pileup

17:15

## Wednesday 4 June

13:00

### Afternoon

**Session** | **Location:** WH11NW, Pileup

13:00–14:00

#### Calorimeters current and future

**Speaker**

Grace Cummings

14:00–17:00

#### Machine Learning Exercises

**Speaker**

Arghya Chattopadhyay

17:00



## Thursday 5 June

13:00

### Afternoon

**Session** | **Location:** WH11NW, Pileup

13:00–14:00

#### Particle Physics Career Mentoring

**Speakers**

Robert Harris, Robert Harris

**Location**

Fermilab, Pileup

14:00–17:00

#### Containers and Apptainer

**Speaker**

Marco Mambelli

**Location**

WH11NW, Pileup

17:00

## Friday 6 June

13:00

### Afternoon

**Session** | **Location:** WH11NW, Pileup**13:00–14:00** **Future Collider (Muon Collider)****Speaker**

Sergo Jindariani

**14:00–14:30** **Talke to Fermilab Engineer (Sergey Los)****Speaker**

Sergey Los

**14:30–15:30** **CMS 101****Speakers**

Roy Cruz Candelaria, Sudhir Malik

**15:30–16:30** **Classes Q&A and Assignments****Speakers**

Ameya Thete, Arghya Chattopadhyay, Bruno Moreira Coimbra, Iliomar Rodriguez Ramos, Marco Mambelli, Roy Cruz Candelaria, Xiaohe Shen

**16:30–17:00** **Coordination with mentors and sendoff**

19:00

## Thursday 31 July

13:35

### Afternoon: Interns' Final Presentations (20 min talk + 10 min Q&A) - Reviewers: TBD

Session | Location: WH11NW, Pileup

13:35-14:05 **Talk 7**

14:05-14:35 **Talk 8**

14:35-15:05 **Talk 9**

15:05-15:35 **Talk 10**

15:35-16:05 **Talk 11**

16:05-16:35 **Talk 12**

16:35

Friday 1 August

13:35

15:05

Afternoon: Interns Final Presentations (20 min talk + 10 min Q&A) - Reviewers: TBD

Session | Location: WH11NW, Pileup

13:35-14:05 Talk 19

14:05-14:35 Talk 20

14:35-15:05 Interns fill 10-week feedback form