

# **INFN Ptolemy**

**Wednesday, 20 November 2024 - Friday, 22 November 2024**

**Genova Villa Giustiniani-Cambiaso**

## **Scientific Programme**

**International Workshop of the PTOLEMY Collaboration****General Meeting**

Genova, November 20th -22nd - 2024

## AGENDA

**Wednesday 20th**

Colloquium at Physics Department of the University of Genova

Aula Magna h 4 e 30 p.m

(Via Dodecaneso 33, 16146, Genova)

Speaker Prof. Christopher G. Tully, from Princeton University

"How to unravel the youngest Universe: introduction to the PTOLEMY project."

**Thursday 21st**

Villa Giustiniani Cambiaso, Salone Nobile

(Via Montallegro 1,16145, Genova)

## Morning

09:15 Welcome and logistics - Local organizers E. Celasco and F. Gatti

09:30 Overview of theory - A. Esposito

09:45 In Silico optimization of tritiated graphene properties for Ptolemy - V. Tozzini

10:00 Simulation of graphene F. Pofi

10:15 Quantum Hall effect measurements we did for hydrogenated graphene - Inge

10:30 Report on H-graphene stability in air and in vacuum - A. Apponi

10:45 – Coffee break –

11:15 Future TES activities - B. Corcione

11:45 Studies on backscattered and emitted electrons from TES -A. Ruocco

12:15 Detection of electrons at 300 eV - M. Borghesi

12:45 – Lunch break –

## Afternoon

14:15 Report on the Nikhef activities in RF antenna and electronics - J. Mead

14:45 Results on RF detection at LNGS - F. Virzi

15:15 Measuring ExB drifting electrons with RF pin antennas, Y. Iwasaki and A. Tan

15:45 HV stability system - N. Rossi

16:15 – Coffee break –

16:45 Electron ExB Slow Drift Demonstration -M. Farino

17:00 Full filter simulation - W. Chung

17:30 Report on hydrogenated CNT O. Castellano

17:45 Review on PTOLEMY sensitivity - N. Rossi

Participation of representative of each group

18:00 Institutional Board

18:30 – end of the session –

20:00 Social Dinner

## **Friday 22st**

Morning

09:00 Construction of the Demonstrator vacuum chamber - M. Messina

09:20 “Updates on the design and manufacturing of the SC magnets for the Ptolemy experiment” J. Bastarrarena (Suprasys) and M. Tropeano ASG superconductors

09:40 Electron gun facility @ LNGS - F. Pofi

10:00 Steps towards building the PTOLEMY Demonstrator

10:30 – Coffee break –

11:00 Facility budgeting and preparation - M. Messina

11:30 Tritium facility in UK - GL Cavoto

12:00 Concluding remarks

12:20 – End of the meeting

12:30 – Lunch break –

13:50-16:00 Guided tour at <https://www.asgsuperconductors.com/>

## **Agenda**