

Session Program

23-27 Jul 2018



26th International Conference on Supersymmetry and Unification of Fundamental Interactions (SUSY2018)

Dark Matter, Astroparticle Physics

Barcelona, Hotel Catalonia Plaza
Hotel Catalonia Plaza, Plaça Espanya, 6-8

Monday 23 July

15:00

Dark Matter, Astroparticle Physics: Session 1

Session | Location: Room C | Convener: Jason Kumar

15:00-15:20

Dark matter searches with ground based Cherenkov gamma-ray telescopes

Speaker

Dr Javier Rico

15:20-15:40

Results from the ANTARES neutrino Telescope and perspectives for KM3NeT

Speaker

Dr Sergio Navas Concha

15:40-16:00

Particle Physics with KM3NeT

Speaker

Juan de Dios Zornoza Gomez

16:00-16:20

Attacking QCD uncertainties in Monte Carlo event generators for gamma-ray dark matter searches

Speaker

Simone Amoroso

16:20-16:40

Hidden local $U(1)$ symmetry realizing a neutrinophilic two-Higgs-doublet model with dark matter

Speaker

Takaaki Nomura

17:00

17:30

Dark Matter, Astroparticle Physics: Session 2

Session | Location: Room C | Convener: Jason Kumar

17:30-17:50

Core formation from self-heating dark matter

Speaker

Xiaoyong Chu

17:50-18:10

Dark Matter Accretion in Neutron Stars

Speaker

Dr Raghuvveer Garani

18:10-18:30

Probing Inelastic Dark Matter with Neutron Stars

Speaker

Dr Sandra Robles

18:30

Tuesday 24 July

14:30

Dark Matter, Astroparticle Physics: Session 3

Session | Location: Room C | Convener: Malcolm Fairbairn

14:30-14:50 **Results of the WIMP search with the XENON1T experiment**

Speaker

Ms Federica Agostini

14:50-15:10

Darkside latest results and the future liquid argon dark matter program

Speaker

Roberto Santorelli

15:10-15:30

ANAIS-112: A test of DAMA/LIBRA dark matter signal at the Canfranc Underground Laboratory

Speaker

Maria Martinez

15:30-15:50

Dark Sector searches with Belle II

Speaker

Enrico Graziani

15:50-16:10

Sub-MeV Dark Matter Interactions with Electrons: Cosmological Constraints and Detection Prospects

Speaker

Benjamin Lehmann

16:10-16:30

TeV Astroparticle Physics: Recent Highlights from VERITAS

Speaker

Prof. Reshmi Mukherjee

16:30

17:00

Dark Matter, Astroparticle Physics: Session 4

Session | Location: Room C | Convener: Kazuki Sakurai

17:00-17:20 **Indirect detection of (Late-decoupling) Semi-Annihilating Dark Matter**

Speaker

Andrew Spray

17:20-17:40

J-factors for Velocity-Dependent Dark Matter Annihilation

Speaker

Prof. Jason Kumar

17:40-18:00

Sudakov log resummation for indirect detection of heavy WIMP dark matter

Speaker
Martin Vollmann

18:00-18:20

Two scalar singlet Higgs Portal and the Anomaly-cancellation on a leptophobic Z' -mediator with axially coupled DM

Speaker
Javier Quilis

18:20-18:40

Stop annihilation into heavy quarks in DM@NLO

Speaker
Saskia Schmiemann

18:40

Wednesday 25 July

14:30

Dark Matter, Astroparticle Physics: Session 5

Session | Location: Room C | Conveners: Daniele Teresi, Daniele Teresi

14:30–14:50 **Axions from Strings**

Speaker

Marco Gorghetto

14:50–15:10 **Light axino dark matter and freeze-in production**

Speaker

Dr Kyu Jung Bae

15:10–15:30 **Spontaneous Leptogenesis in Continuum-Clockwork Axion Models**

Speaker

Dr Jeff Kost

15:30–15:50 **Singlet-Triplet Higgs Portal Dark Matter**

Speaker

Anastasiia Filimonova

15:50–16:11

Self-interacting dark matter and muon $g-2$ in a gauged $U(1)_{L_{\mu}} - L_{\tau}$ model

Speaker

Keisuke Yanagi

16:30

17:00

Dark Matter, Astroparticle Physics: Session 6

Session | Location: Room C | Convener: Malcolm Fairbairn

17:00–17:20

Revisiting the Dark Matter Relic Abundance Calculation: The Case of Early Kinetic Decoupling

Speaker

Dr Michael Gustafsson

17:20–17:40

Resonance enhancement of dark matter interactions: the case for early kinetic decoupling and velocity dependent resonance width

Speaker

Bohdan Grzadkowski

17:40–18:00 **Duration of classicality of a degenerate quantum scalar field**

Speaker

Dr Seishi Enomoto

18:00–18:20

Unassociated Gamma-ray Sources as Targets for Indirect DM Detection with Fermi-LAT

Speaker

Mr Javier Coronado-Blázquez

18:20-18:40

Effects of quantum statistics on relic density of Dark Radiation

Speaker

Marek Olechowski

18:40

Thursday 26 July

14:30

Dark Matter, Astroparticle Physics: Session 7

Session | Location: Room C | Convener: Felix Bruemmer

14:30–14:50 Dark Matter searches with the ATLAS Detector

Speaker

Michaela Queitsch-Maitland

14:50–15:10 Searches for dark matter in non-hadronic final states at CMS

Speaker

Shamik Ghosh

15:10–15:30 Searches for Dark Matter mediators with the ATLAS Detector

Speaker

Sabine Crepe-Renaudin

15:30–15:50 Collider search for minimal dark matter

Speaker

Hajime Fukuda

15:50–16:10 Global perspectives on dark matter simplified models

Speaker

Emanuele Angelo Bagnaschi

16:10–16:30 Primordial Black Holes from Axions

Speaker

Dr Fabrizio Rompineve

16:30

17:00

Dark Matter, Astroparticle Physics: Session 8

Session | Location: Room C | Convener: Oleg Lebedev

17:00–17:20 Next-to-minimal dark matter at colliders

Speaker

Felix Bruemmer

17:20–17:40 Probing ~ 100 GeV wino-like dark matter at the LHC

Speaker

Dr Shoaib Munir

17:40–18:00 Higgs binoculars for dark matter searches

Speaker

Simon Kast

18:00–18:20 Prospects for SUSY dark matter in light of LHC Run 2 results

Speaker

Emanuele Angelo Bagnaschi

18:20-18:40

Perspectives of monojet searches at the LHC on supersymmetric Dark Matter

Speaker

Conny Renate Beskidt

18:40