



Nordic Radio-Neutrino Meeting Chalmers, Gothenburg, April 19-20, 2023

— Workshop in the context of the Collaborative Research Center
SFB1491, www.sfb1491.rub.de/ —

Context

The detection of high-energy neutrinos from the Universe with IceCube more than a decade ago opened a new window to the Universe. First hints indicate that the neutrinos must come from gamma-ray absorbed environments, with the dense cores of galaxies being among the primary candidates. This workshop is meant to bring together researchers in neutrino and radio astronomy in the Northern Countries in order to exchange their view on the Universe and try to understand how the low- and high-energy emission from different objects in the Universe can be used to build up a coherent picture of the role of cosmic rays in galaxies.

Zoom Link

General:

<https://ruhr-uni-bochum.zoom.us/j/61705413354?pwd=Q3dxb2hPc1ErbVkyeVVOdlIjS3Y2dz09>

Colloquium:

<https://chalmers.zoom.us/j/66078347255?pwd=NlI0cXpZUFZ0bUthOWZ0QXQ2QklwZz09>

(Password: 654321)

Schedule

April 19, 2023

10:00-11:30 Arrival (please come to E-Huset, floor 3Ö), so I can open the door to the floor

11:30-12:45 Lunch

12:45 - 14:40 Session 1 (room EL42, E-huset)

12:45 - 12:55 Short Presentation of everybody

12:55 - 13:30 High-energy neutrino detection with IceCube, Julia Tjus [30+5min]

13:30 - 14:15 Neutrino emission in the context of the multimessenger picture, Markus Ahlers [40+5min]

14:15 - 14:40 IceCube Activities at Uppsala Universitet, Erin O'Sullivan [20+5min]

14:40-15:10 Coffee

15:15 - 16:15 Colloquium (room EDIT, E-huset)

15:15 - 16:15 The Wild Hunt: uncovering the sources of high-energy neutrinos, Yannis Liodakis (Univ. of Turku)

16:15 - 17:00 Coffee

19:00 Workshop Dinner, Sjöbaren, <https://haga-en.sjobaren.se/>

April 20, 2023

9:00 - 10:40 Session 2 (room EC, E-huset)

9:00-9:45 Compact Obscured Nuclei - an Overview, Susanne Aalto (40+5min);

9:45-10:20 Multimessenger emission from NGC1068, Björn Eichmann [30+5min]

10:20-10:40 Adding a jet to the NGC1068 model: status and outlook, Silvia Salvatore [15+5min]

10:40-11:15 Coffee

11:15-12:00 Session 3 (room EC, E-huset)

11:15-11:40 Cosmic Rays in Starforming Regions, Santiago Del Palacio (20+5min);

11:40-12:00 Outflows from galaxies (Ralf-Jürgen Dettmar **via zoom** (15+5min)

12:00-13:30 Lunch

13:30 - 15:00 Time for smaller-scale discussions

15:00 - ... departure

Directions

We will be at Campus Johanneberg in central Gothenburg. Here is an interactive map of the Campus:

<http://maps.chalmers.se/#a85a8be2-4ff6-4e39-9880-c2adb2a7626f>

We will be at the “Space, Earth and Environment Department”,

<https://www.chalmers.se/en/departments/see>

You can find it on the map under “Rymd-, geo- och miljövetenskap”, the building is called “E-huset”. We can meet some time in the morning of April 19 on floor 3Ö. Susanne will guide us to the different rooms from here :-)

For Fun

If you have time, you can visit the “Vetenskapsfestivalen”, which takes place this week in downtown Gothenburg with a huge, fun scientific program: www.vetenskapsfestivalen.se/en