The Hitchhiker's Guide to Condensed Matter and Statistical Physics: Topological Phenomena in Condensed Matter

6, 13, 20 May, 3 June 2021 An ICTP Virtual School, 2nd edition Trieste, Italy

The aim of this online school is to sketch a roadmap of current exciting research directions in condensed matter and statistical physics. It will lead the students from basic notions to the open problems in each topic. The lectures will be held once a week, 4 weeks in a row in May and June 2021, each week a new subject.

Given the success of the first Hitchhiker's School in January 2021 (smr3589), we continue with the same format. The first series of lectures was dedicated to machine learning and had covered several different aspects of the application of machine learning in condensed matter physics.

In this second series, we focus on topological phenomena in condensed matter. What is topology? Does it explain the properties of some unconventional materials? Why is it important for future technologies?

The format of the lectures will be the following:

- 1h of basic notions relevant for the subject, including Questions and Answers session.
- 15 min break

Further information: http://indico.ictp.it/event/9627/ smr3625@ictp.it

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Local Organiser:

R. FAZIO, ICTP, Italy

Lecturers:

B.A. BERNEVIG, Princeton University, USA
C. CASTELNOVO, Cambridge University, UK
C. CHAMON, Boston University, USA
Y. GEFEN, Weizmann Institute of Science, Israel

- 1h of colloquia style lecture, that will start with the basics and bring the student to the set of open problems in the topic.

How to apply:

Online application: http://indico.ictp.it/event/9627/

Female scientists are encouraged to apply.

Registration:

There is no registration fee.

Deadline: 30 April 2021







The Abdus Salam International Centre for Theoretical Physics



www.ictp.it Trieste, Italy