



**PHYSICS
SEMINAR**



**Wednesday
November 20
14:00 - 15:00
Room 1.4.14**

**Dr. Catarina
Quintans
LIP**

Hadron Structure: the AMBER experiment at CERN

AMBER is a new fixed-target experiment at CERN that focuses on understanding hadrons, the building blocks of all visible matter. As far as we presently know, the hadrons constituent quarks and gluons interact according to the Quantum Chromodynamics theory. But how exactly the observed properties of hadrons emerge as we see them at the various probing scales, is a matter of intense study and debate. The hadrons structure and spectroscopy is the subject of the AMBER extensive experimental program, started in 2023. From nucleons to mesons, the experiment addresses their momentum and space distributions, mass, spin and radius.