

# Di-Higgs searches at CMS

*Tuesday, November 5, 2024 1:50 PM (20 minutes)*

The measurement of the production of Higgs boson pairs (HH) at the LHC allows the exploration of the Higgs boson interaction with itself and is thus a fundamental test of the Standard Model theory and has a key role in the determination of the Higgs boson nature. The most recent results from the CMS collaboration on measurements of non-resonant HH production using different final states and their combination using the data set collected by the CMS experiment at a centre of mass energy of 13 TeV will be presented

## Is the speaker a PhD student or post-doc?

Yes - My participation will be fully supported by my research group

## Primary track

**Presenter:** MOTTA, Jona (University of Zurich (CH))

**Session Classification:** Higgs boson pairs and Higgs potential 1 - sal IX

**Track Classification:** Higgs boson pairs and Higgs potential (including electroweak phase transitions and connections to cosmology)