

# Anomalous couplings in Higgs plus jet production

*Wednesday 6 November 2024 13:50 (20 minutes)*

We present NLO QCD results for Higgs boson production in association with one jet, including anomalous Higgs-top and Higgs-gluon couplings and with full top quark mass dependence. We will compare the full theory with varied anomalous couplings to the Standard Model, based on our implementation into POWHEG-BOX-V2. Of special interest will be the  $p_{T,H}$  distribution, since the high-pT tail is sensitive to heavy new physics.

## Primary track

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

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

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**Session Classification:** Common session: precision & BSM 1 - sal IX

**Track Classification:** Precision Higgs measurements and calculations