Contribution ID: **132** Type: **Parallel session talk**

Measurements of Higgs boson couplings and simplified template cross sections in bosonic final states (WW, ZZ, yy) at the ATLAS experiment

Monday 21 August 2023 17:50 (20 minutes)

Higgs boson decays to bosons provide very detailed measurements of its properties and interactions, and shine light on the mechanism of electroweak symmetry breaking. This talk presents the latest measurements of the Higgs boson coupling properties performed by the ATLAS experiment in various bosonic decay channels (WW, ZZ and yy) using the full Run 2 pp collision dataset collected at 13 TeV. Results on production mode cross sections, Simplified Template Cross Sections (STXS), and their interpretations are presented. Specific scenarios of physics beyond the Standard Model are tested, as well as generic extensions within the framework of the Standard Model Effective Field Theory.

Collaboration / Activity

ATLAS

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Session Classification: T09 Higgs Physics

Track Classification: Higgs Physics