



Contribution ID: 130

Type: **Talk**

Measurements of Higgs boson production and decay rates with the ATLAS experiment

Friday 30 August 2024 11:00 (20 minutes)

The event rates and kinematics of Higgs boson production and decay processes at the LHC are sensitive probes of possible new phenomena beyond the Standard Model (BSM). This talk presents precise measurements of Higgs boson production and decay rates, obtained using the full Run 2 and partial Run 3 pp collision dataset collected by the ATLAS experiment at 13 TeV and 13.6 TeV. These include total and fiducial cross-sections for the main Higgs boson processes as well as branching ratios into final states with bosons and fermions. Differential cross-sections in a variety of observables are also reported, as well as a fine-grained description of the Higgs boson production kinematics within the Simplified Template Cross-section (STXS) framework.

Internet talk

No

Is this an abstract from experimental collaboration?

Yes

Name of experiment and experimental site

ATLAS

Is the speaker for that presentation defined?

No

Details

N/A

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Session Classification: High Energy Particle Physics

Track Classification: Main topics: High Energy Particle Physics