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The off-shell Higgs production and measurement of its decay width with the ATLAS experiment

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The measurement of the off-shell Higgs production and its decay width is performed in the Higgs decay channels of $ZZ \rightarrow 4\ell$ and $ZZ \rightarrow 2\ell 2\nu$. The measurement uses Monte Carlo samples at a centre-of-mass energy of 13 TeV, produced according to the ATLAS detector configurations with an integrated luminosity of 139 fb⁻¹. The results are presented as an expected upper limit on the off-shell Higgs signal strength at 95% confidence levels (CLs). In addition, the ZZ off-shell and on-shell combined results are shown.

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