

# Higgs plus jets with the POWHEG BOX

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New generator for H+0/1J: remains NLO accurate for 1jet inclusive quantities (arXiv:1212.4504, An extension-refinement of MiNLO)

Cross section table (picobarns):

	Inclusive	2 jets, $p_T > 25,  y  < 5$	+ $\eta_{jj} < 2.8, m_{jj} > 400$ GeV
H	13.2	1.61	0.177
HJ	16.2	2.04	0.202
HJ-N	13.3	2.10	0.209
HJJ	17.8	2.41	0.239

- HJ and HJ-N agree on total (arXiv:1212.4504).
- HJ and HJ-N agree after cuts. It seems that cuts are already stringent enough so that HJ (MiNLO!) already works well.
- $\sim 15\%$  increase in HJJ to be attributed to genuine HJJ NLO.

# Comparison H HJ-N























