

Matrix element generator	Simulated diagrams	PDF set	Tune
PYTHIA 8.219 [9]	$2 \rightarrow 2$ (LO)	NNPDF2.3LO [14, 15]	CUETP8M1 [13]
HERWIG++ 2.7.1 [10]	$2 \rightarrow 2$ (LO)	CTEQ6L1 [16]	CUETHppS1 [13]
MADGRAPH5_aMC@NLO 2.3.3 [17, 18] + PYTHIA 8.219 [9]	$2 \rightarrow 2, 2 \rightarrow 3, 2 \rightarrow 4$ (LO)	NNPDF2.3LO [14, 15]	CUETP8M1 [13]
POWHEG V2.Sep2016 [20–22] + PYTHIA 8.219 [9]	$2 \rightarrow 2$ (NLO), $2 \rightarrow 3$ (LO)	NNPDF3.0NLO [28]	CUETP8M1 [13]
POWHEG V2.Sep2016 [20–22] + PYTHIA 8.219 [9]	$2 \rightarrow 3$ (NLO), $2 \rightarrow 4$ (LO)	NNPDF3.0NLO [28]	CUETP8M1 [13]
POWHEG V2.Sep2016 [20–22] + HERWIG++ 2.7.1 [10]	$2 \rightarrow 2$ (NLO), $2 \rightarrow 3$ (LO)	NNPDF3.0NLO [28]	CUETHppS1 [13]
HERWIG 7.0.4 [23]	$2 \rightarrow 2$ (NLO), $2 \rightarrow 3$ (LO)	MMHT2014 [29]	H7-UE-MMHT [23]