

Source/process	Signal	DY	$W \rightarrow \tau\nu$	QCD	Top	Dibosons	Charge flips
Normalization uncertainty for $W \rightarrow \ell\nu$ ($\ell = \mu, e$)							
Integrated luminosity	2.5%	2.5%	2.5%	—	2.5%	2.5%	—
DY cross section	—	3.8%	—	—	—	—	—
$t\bar{t}$, single-t cross section	—	—	—	—	6%	—	—
Diboson cross section	—	—	—	—	—	16%	—
Normalization uncertainty for $W \rightarrow \mu\nu$							
QCD normalization vs. η^ℓ	—	—	—	5%	—	—	—
QCD charge asymmetry vs. η^ℓ	—	—	—	2%	—	—	—
QCD normalization vs. p_T^ℓ	—	—	—	15–30%	—	—	—
Lepton veto	—	2%	—	—	—	—	—
Normalization uncertainty for $W \rightarrow e\nu$							
QCD normalization vs. η^ℓ	—	—	—	1–6%	—	—	—
QCD normalization vs. p_T^ℓ	—	—	—	10–30%	—	—	—
Charge-flip normalization	—	—	—	—	—	—	30%
Lepton veto	—	3%	—	—	—	—	—
Shape uncertainty for $W \rightarrow \ell\nu$ ($\ell = \mu, e$)							
Lepton efficiency (syst)	yes	yes	yes	—	—	—	—
Lepton efficiency (stat)	yes	yes	yes	—	—	—	—
L1 trigger pre-firing	yes	yes	yes	—	—	—	—
60 PDF variations	yes	yes	yes	—	—	—	—
α_S	yes	yes	yes	—	—	—	—
μ_F (binned in p_T^W)	yes	—	yes	—	—	—	—
μ_R (binned in p_T^W)	yes	—	yes	—	—	—	—
μ_{F+R} (binned in p_T^W)	yes	—	yes	—	—	—	—
Wboson mass	yes	—	—	—	—	—	—
μ_F	—	yes	—	—	—	—	—
μ_R	—	yes	—	—	—	—	—
μ_{F+R}	—	yes	—	—	—	—	—
μ momentum scale (syst)	yes	yes	yes	—	—	—	—
μ momentum scale (stat)	yes	yes	yes	—	—	—	—
e momentum scale (syst)	yes	yes	yes	—	—	—	—
e momentum scale (stat)	yes	yes	yes	—	—	—	—
Lepton misidentification vs. p_T^ℓ	—	—	—	yes	—	—	—
QED radiation	yes	—	—	—	—	—	—
Simulated sample size	yes	yes	yes	—	yes	yes	yes