

Observable	χ^2 between data and prediction (dof = 5)			
	POWHEG v2	MG5_aMC@NLO	NLO calculation	No SC/pol
$\cos \theta_1^k$	1.1	1.0	1.1	1.1
$\cos \theta_2^k$	5.2	5.0	5.2	5.2
$\cos \theta_1^r$	4.3	4.4	4.2	3.9
$\cos \theta_2^r$	0.7	0.5	0.6	0.5
$\cos \theta_1^n$	1.9	1.8	1.8	1.9
$\cos \theta_2^n$	3.2	3.1	2.1	3.1
$\cos \theta_1^{k*}$	1.3	1.3	1.4	1.3
$\cos \theta_2^{k*}$	1.8	1.6	1.7	1.8
$\cos \theta_1^{r*}$	1.5	1.5	1.6	1.6
$\cos \theta_2^{r*}$	0.5	0.6	0.6	0.6
$\cos \theta_1^k \cos \theta_2^k$	3.1	3.2	3.5	66.7
$\cos \theta_1^r \cos \theta_2^r$	2.0	1.7	1.1	7.4
$\cos \theta_1^n \cos \theta_2^n$	0.6	0.3	0.3	267.0
$\cos \theta_1^r \cos \theta_2^k + \cos \theta_1^k \cos \theta_2^r$	1.5	1.6	1.7	12.3
$\cos \theta_1^r \cos \theta_2^k - \cos \theta_1^k \cos \theta_2^r$	3.6	3.1	3.6	3.6
$\cos \theta_1^n \cos \theta_2^r + \cos \theta_1^r \cos \theta_2^n$	1.7	1.7	1.8	1.8
$\cos \theta_1^n \cos \theta_2^r - \cos \theta_1^r \cos \theta_2^n$	1.8	1.9	1.9	1.9
$\cos \theta_1^n \cos \theta_2^k + \cos \theta_1^k \cos \theta_2^n$	3.8	4.0	4.0	3.9
$\cos \theta_1^n \cos \theta_2^k - \cos \theta_1^k \cos \theta_2^n$	2.3	2.4	2.2	2.2
$\cos \varphi$	1.5	0.7	1.4	496.2
$\cos \varphi_{\text{lab}}$	3.9	7.6	7.0	66.5
$ \Delta\phi_{\ell\ell} $	10.8	4.0	9.2	190.4
All (dof = 110)	88.4	89.7	88.6	2119.8