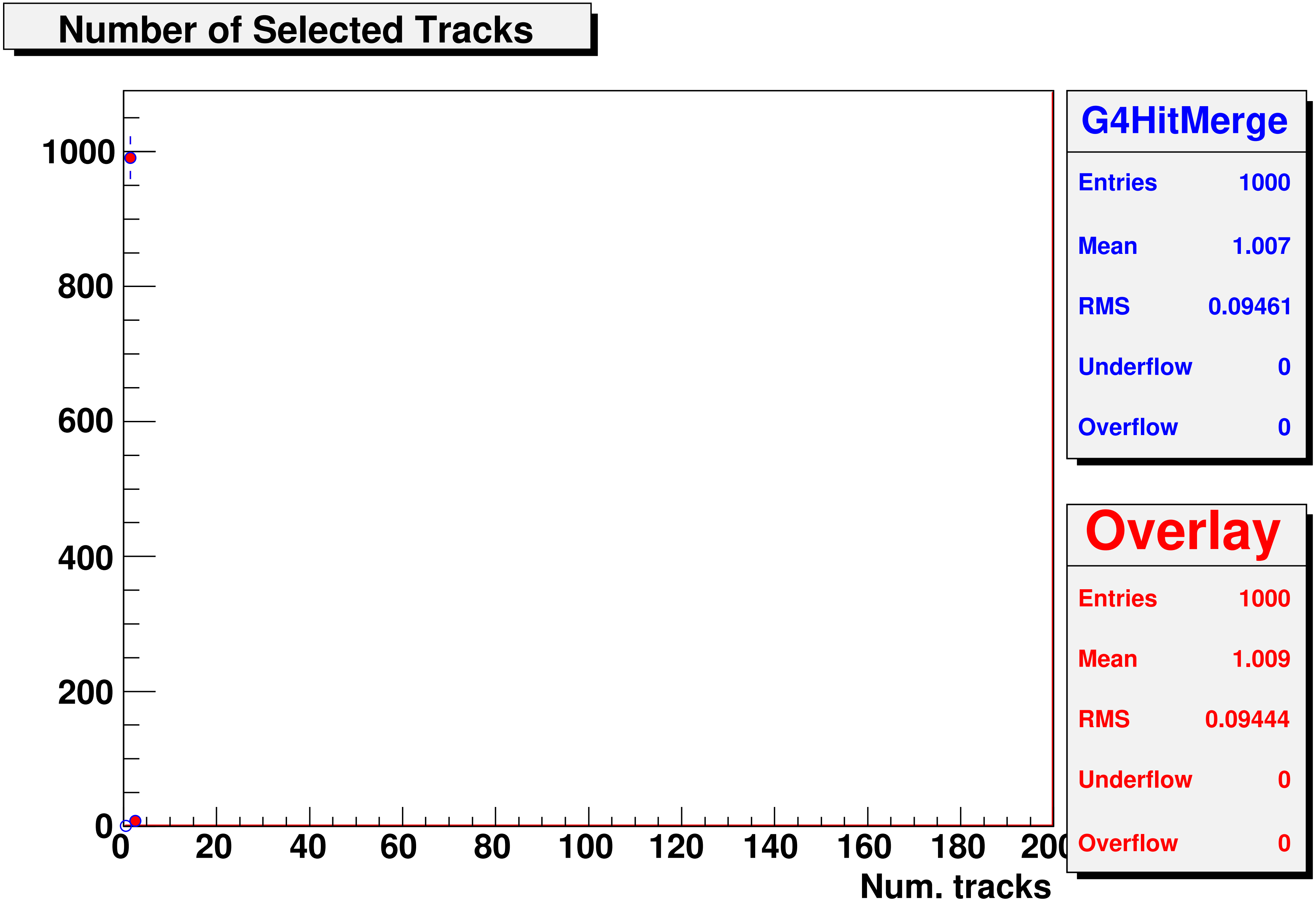
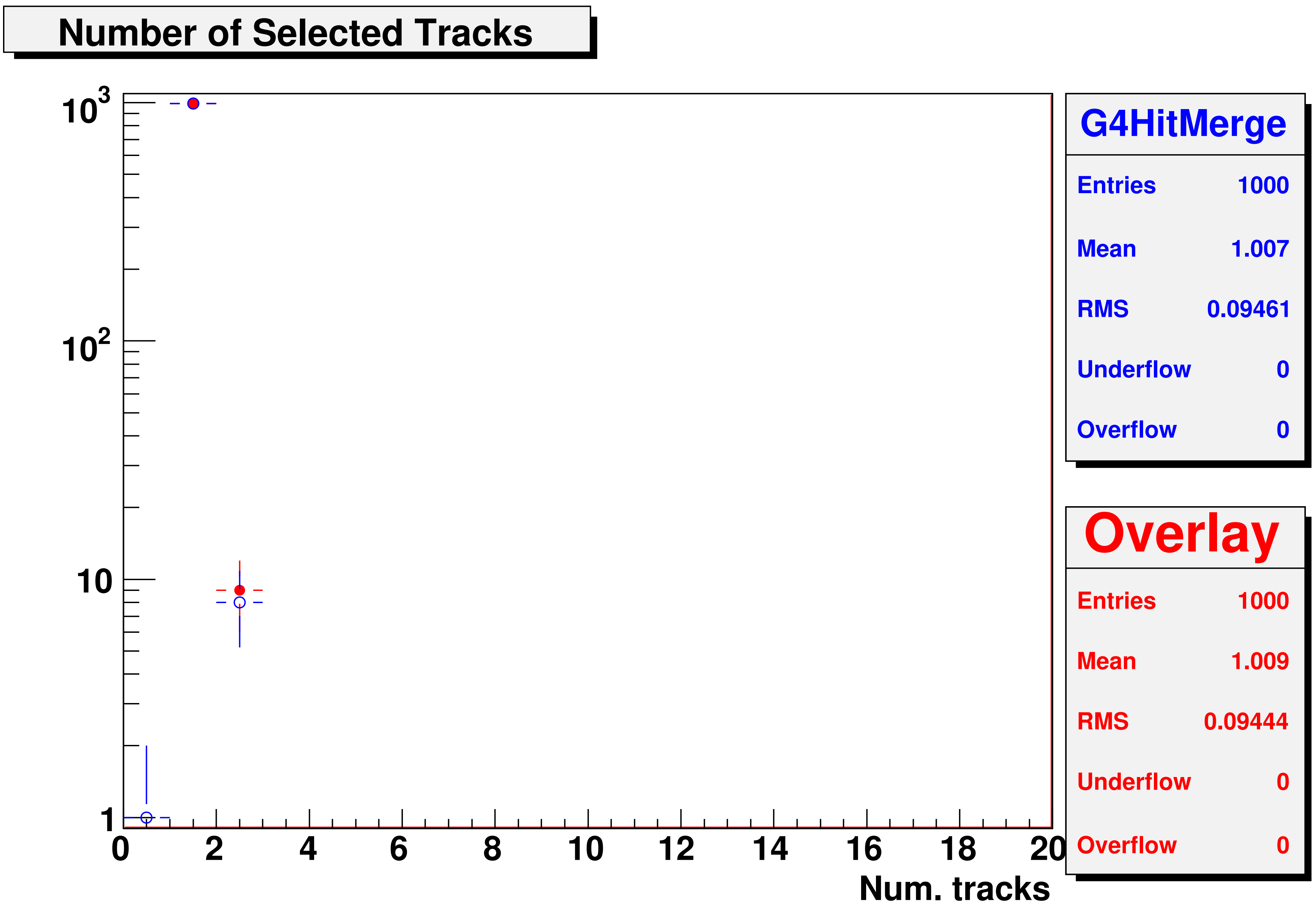
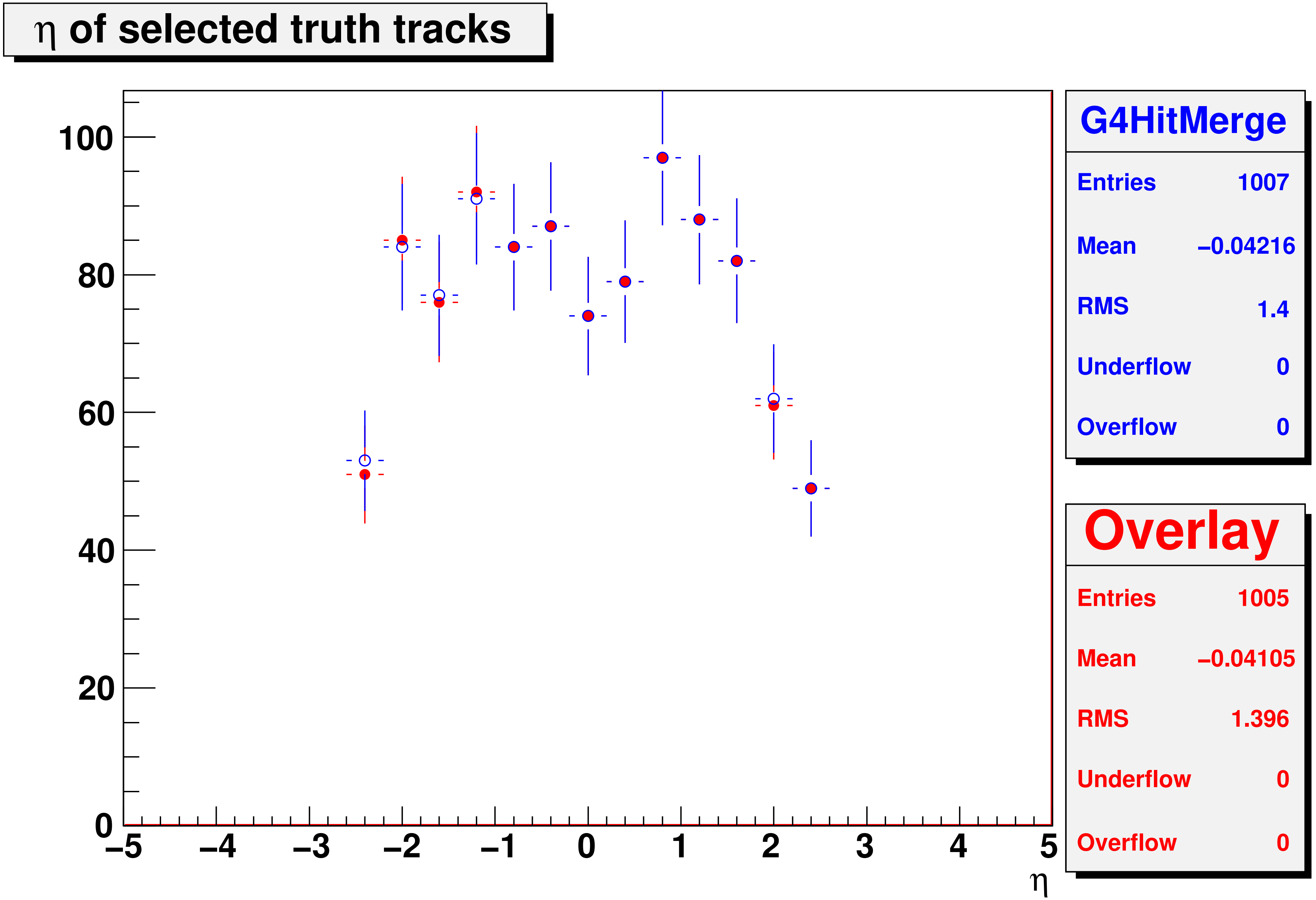
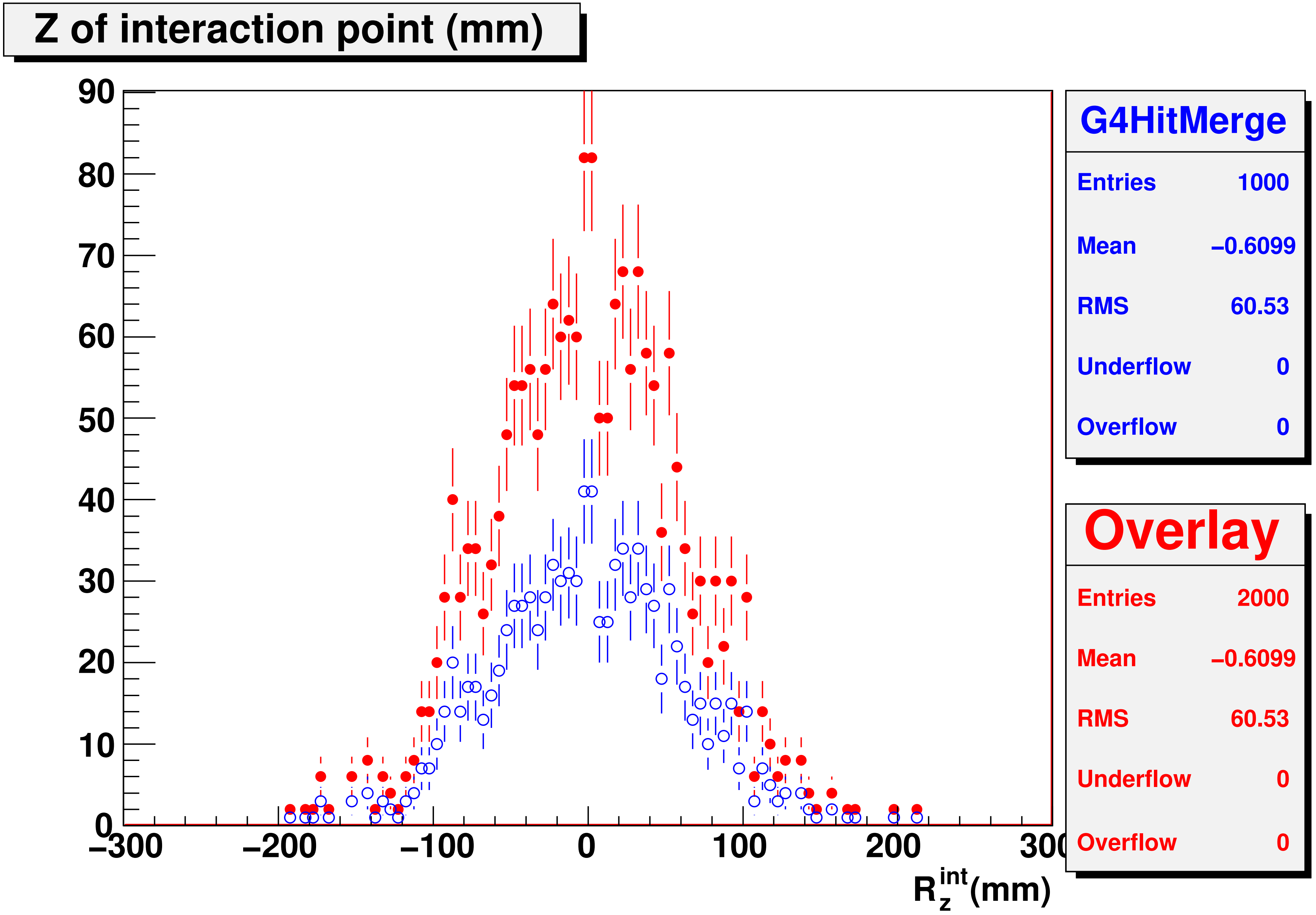

Number of Selected Tracks
1000
800
600
400
200
0
0
20
40
60
80
100
120
140
160
180
200
Num. tracks
G4HitMerge
Entries 1000
Mean 1.007
RMS 0.09461
Underflow 0
Overflow 0
Overlay
Entries 1000
Mean 1.009
RMS 0.09444
Underflow 0
Overflow 0



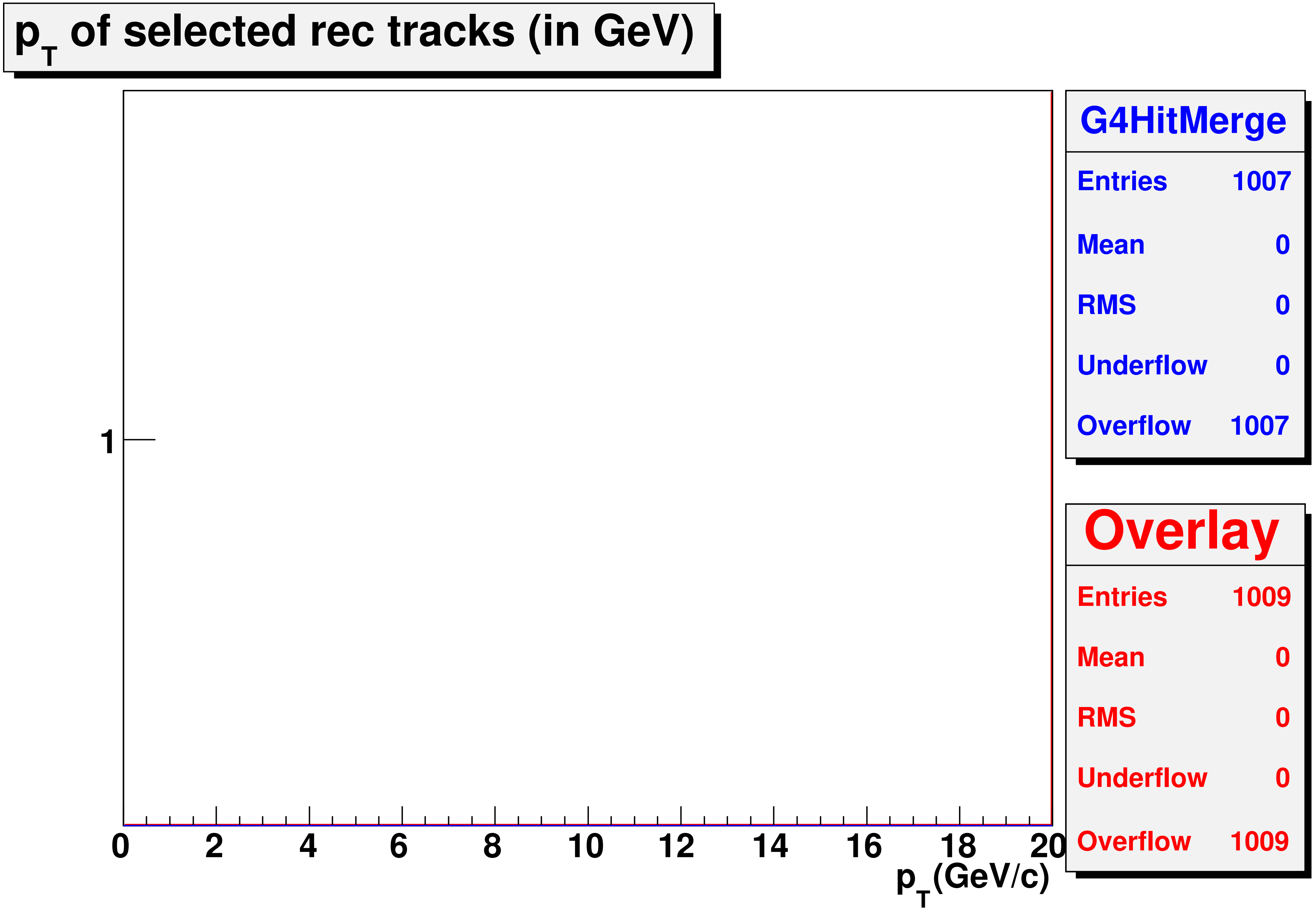
Number of Selected Tracks
10^3
10^2
10
1
0
2
4
6
8
10
12
14
16
18
20
Num. tracks
G4HitMerge
Entries 1000
Mean 1.007
RMS 0.09461
Underflow 0
Overflow 0
Overlay
Entries 1000
Mean 1.009
RMS 0.09444
Underflow 0
Overflow 0



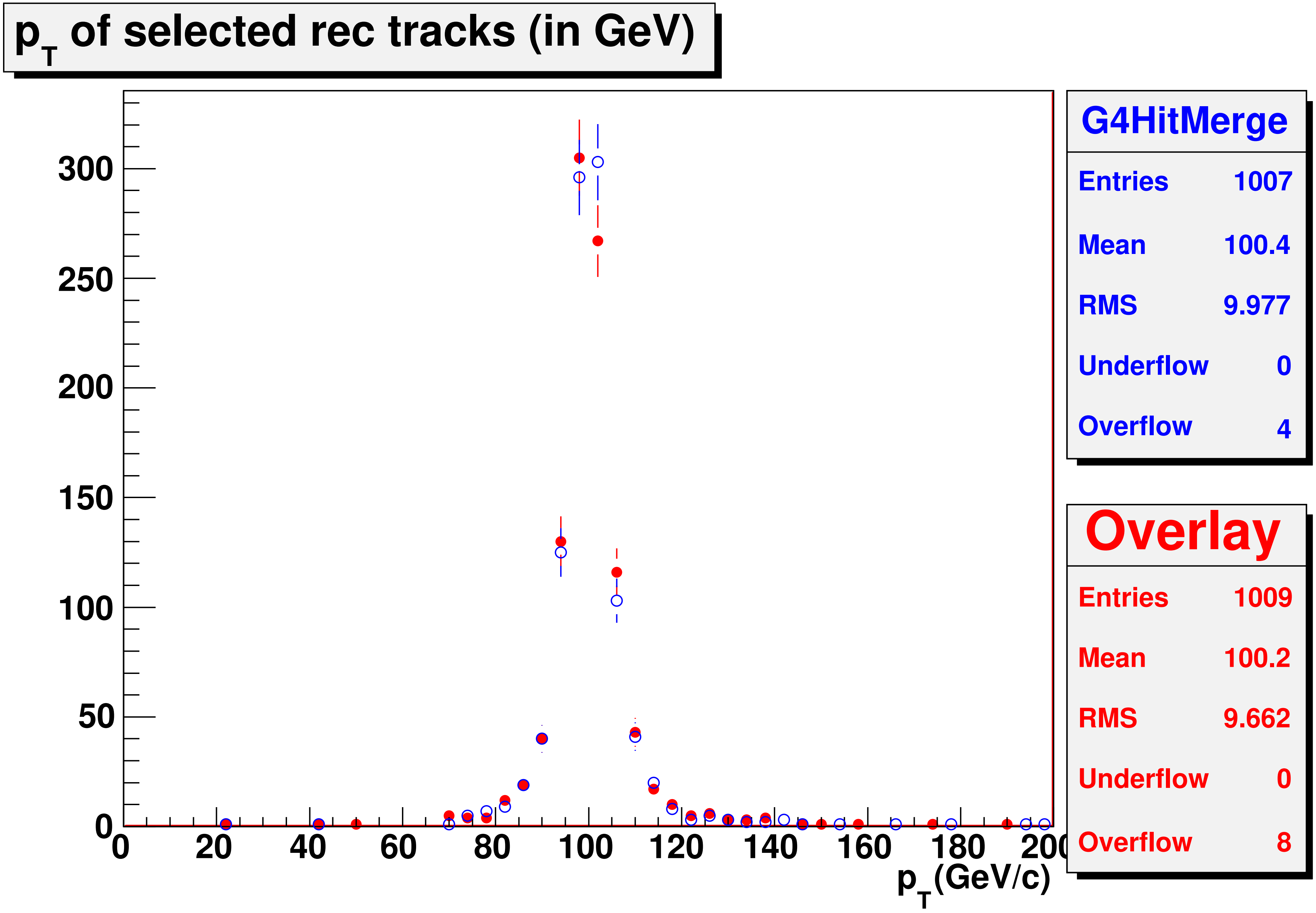
η of selected truth tracks
G4HitMerge
Entries 1007
Mean −0.04216
RMS 1.4
Underflow 0
Overflow 0
Overlay
Entries 1005
Mean −0.04105
RMS 1.396
Underflow 0
Overflow 0
0
20
40
60
80
100
−5
−4
−3
−2
−1
0
1
2
3
4
5
η



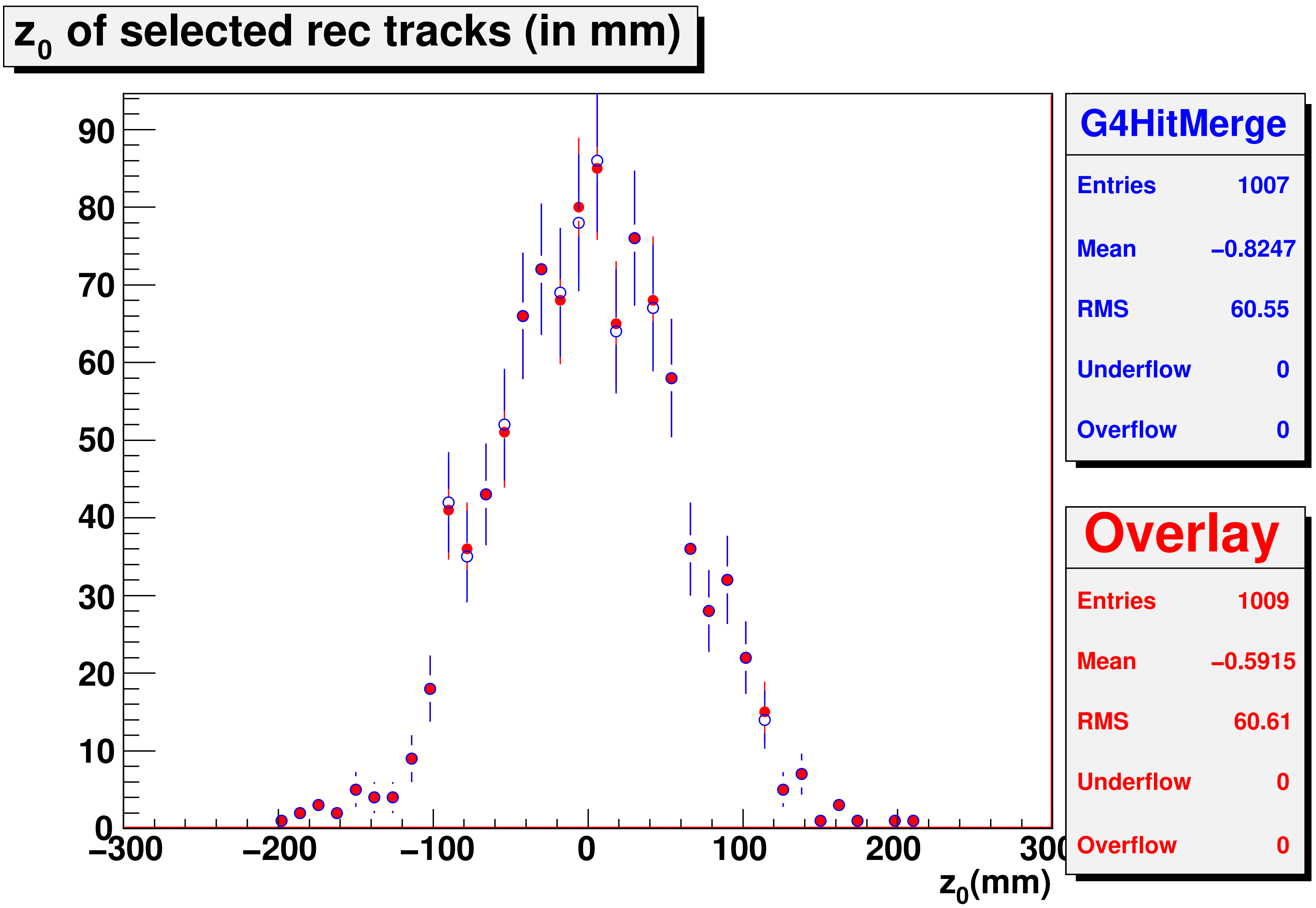
Z of interaction point (mm)
90
80
70
60
50
40
30
20
10
0
−300
−200
−100
0
100
200
300
R_z^{int}(mm)
G4HitMerge
Entries 1000
Mean −0.6099
RMS 60.53
Underflow 0
Overflow 0
Overlay
Entries 2000
Mean −0.6099
RMS 60.53
Underflow 0
Overflow 0



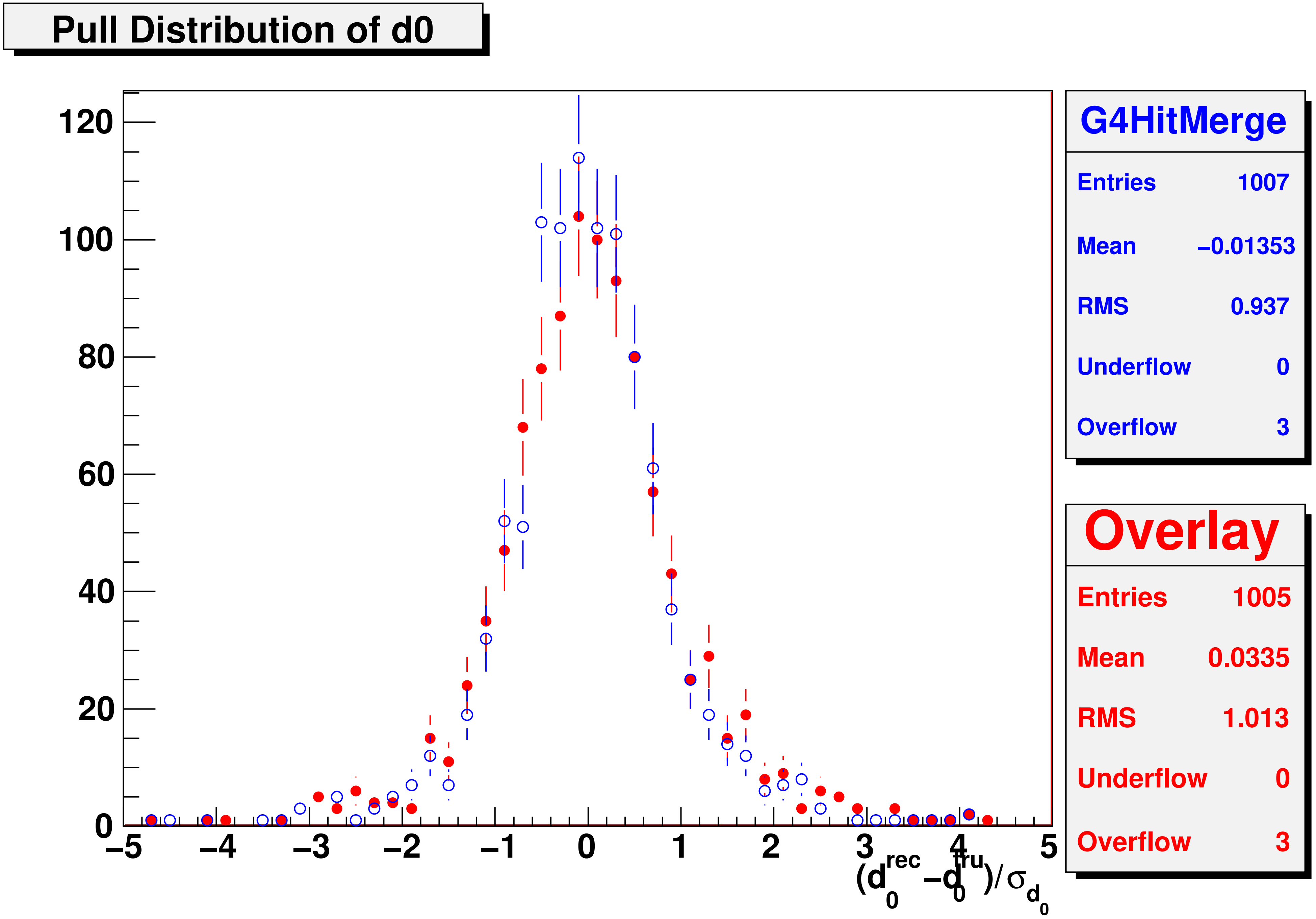
p_T of selected rec tracks (in GeV)
1
0
2
4
6
8
10
12
14
16
18
20
p_T(GeV/c)
G4HitMerge
Entries 1007
Mean 0
RMS 0
Underflow 0
Overflow 1007
Overlay
Entries 1009
Mean 0
RMS 0
Underflow 0
Overflow 1009



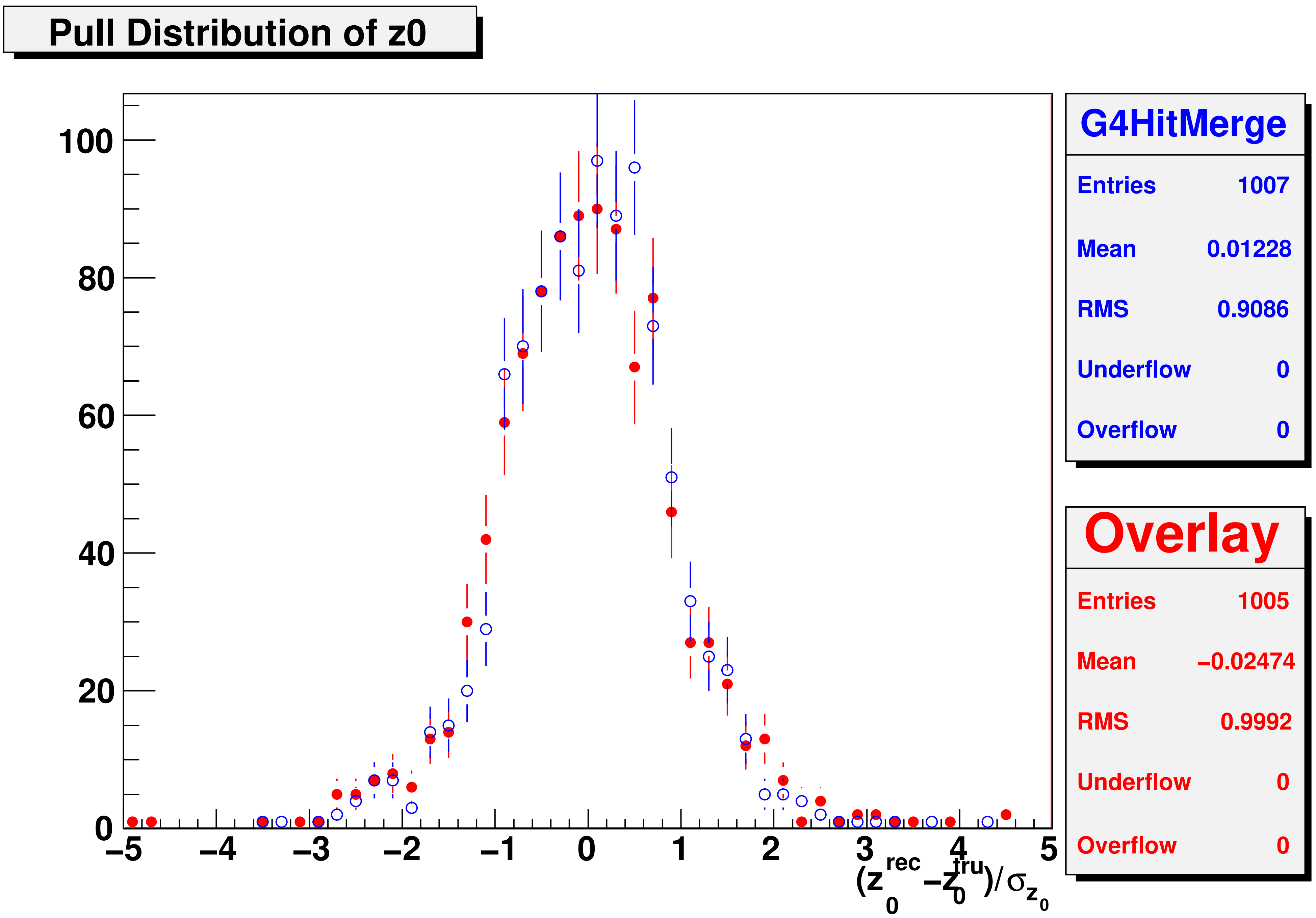
p_T of selected rec tracks (in GeV)
G4HitMerge
Entries 1007
Mean 100.4
RMS 9.977
Underflow 0
Overflow 4
Overlay
Entries 1009
Mean 100.2
RMS 9.662
Underflow 0
Overflow 8
0
50
100
150
200
250
300
0
20
40
60
80
100
120
140
160
180
200
p_T (GeV/c)



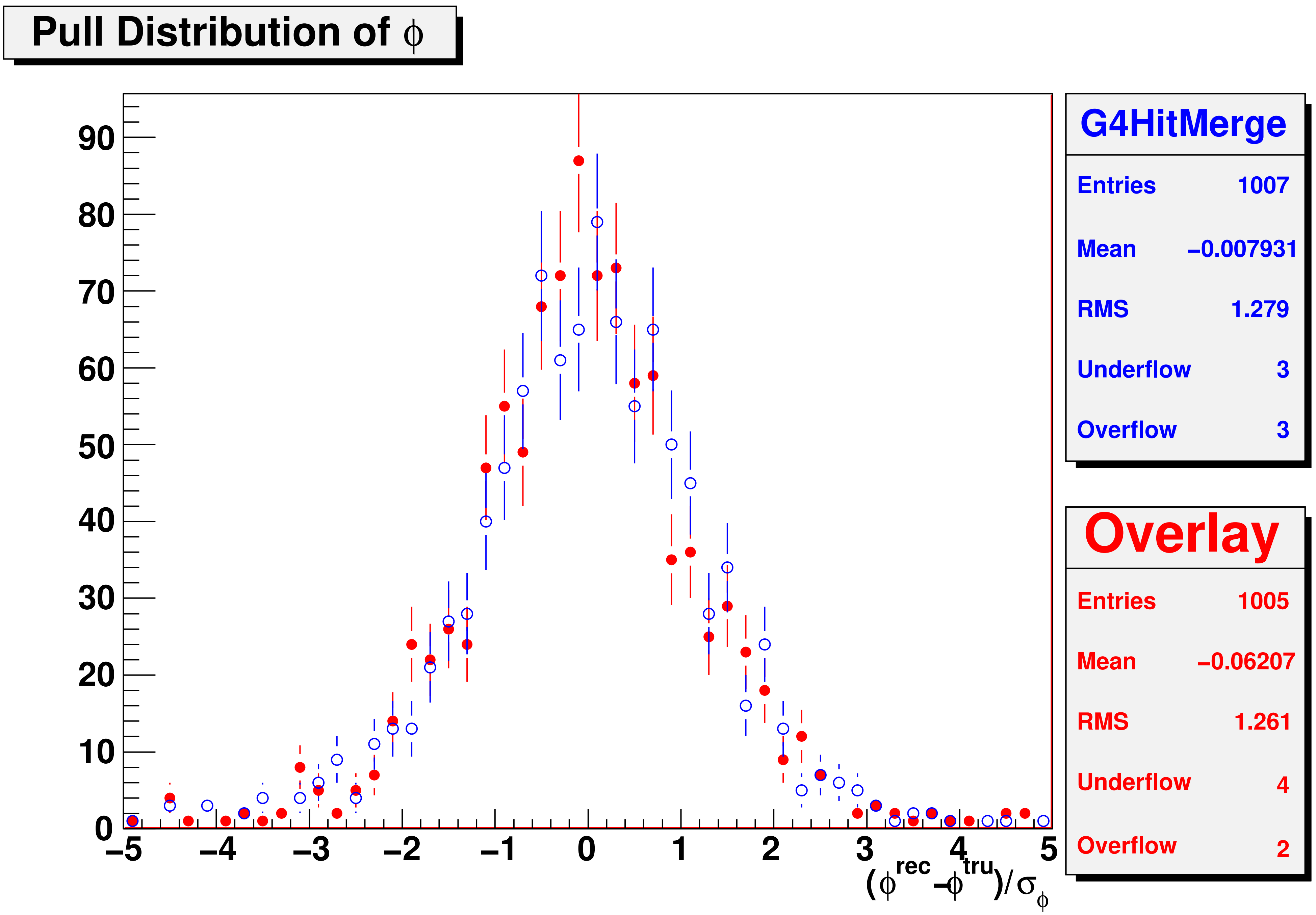
z_0 of selected rec tracks (in mm)
G4HitMerge
Entries 1007
Mean −0.8247
RMS 60.55
Underflow 0
Overflow 0
Overlay
Entries 1009
Mean −0.5915
RMS 60.61
Underflow 0
Overflow 0
z_0(mm)



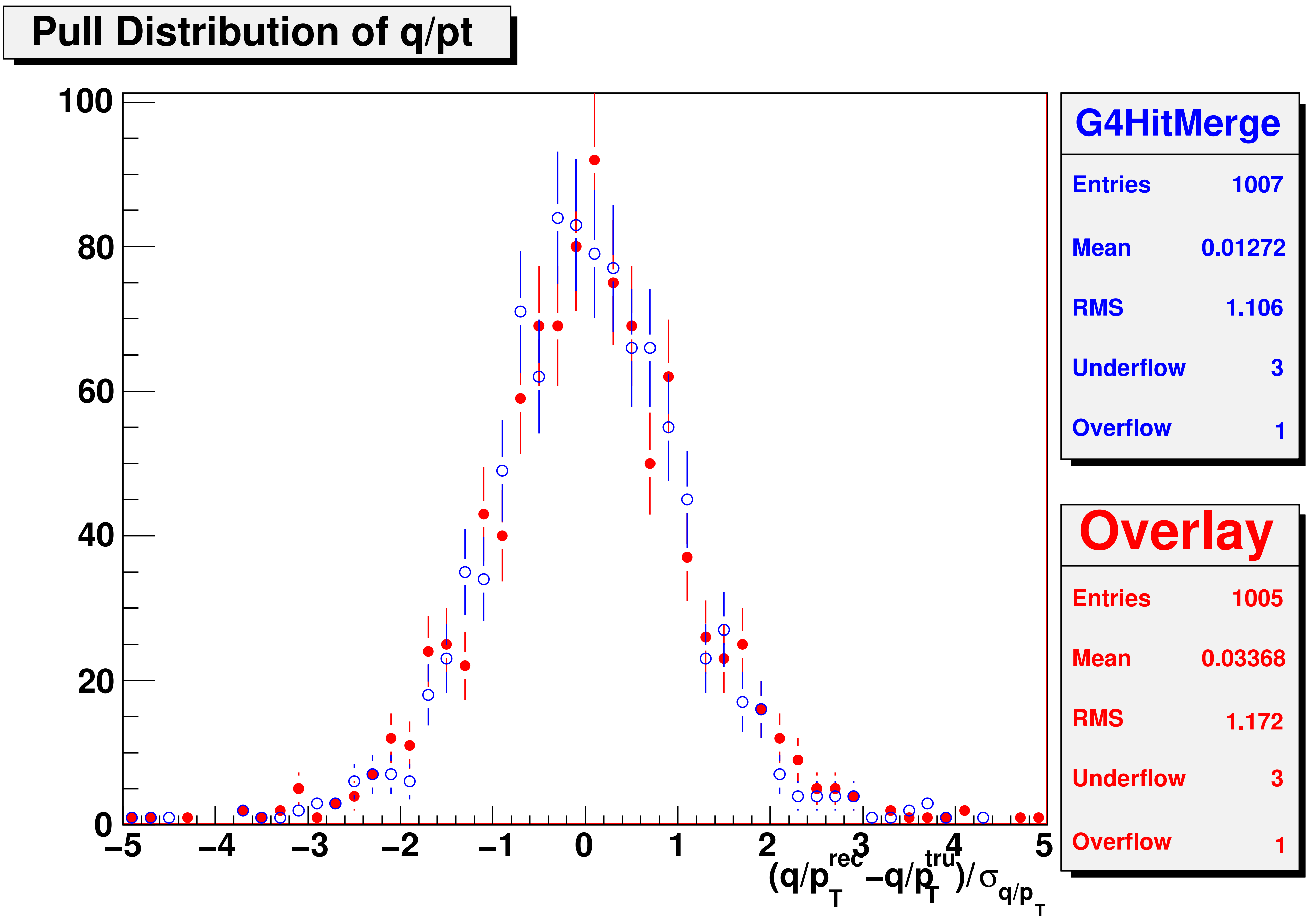
Pull Distribution of d0
G4HitMerge
Entries 1007
Mean −0.01353
RMS 0.937
Underflow 0
Overflow 3
Overlay
Entries 1005
Mean 0.0335
RMS 1.013
Underflow 0
Overflow 3
$(d_0^{rec} - d_0^{tru})/\sigma_{d_0}$



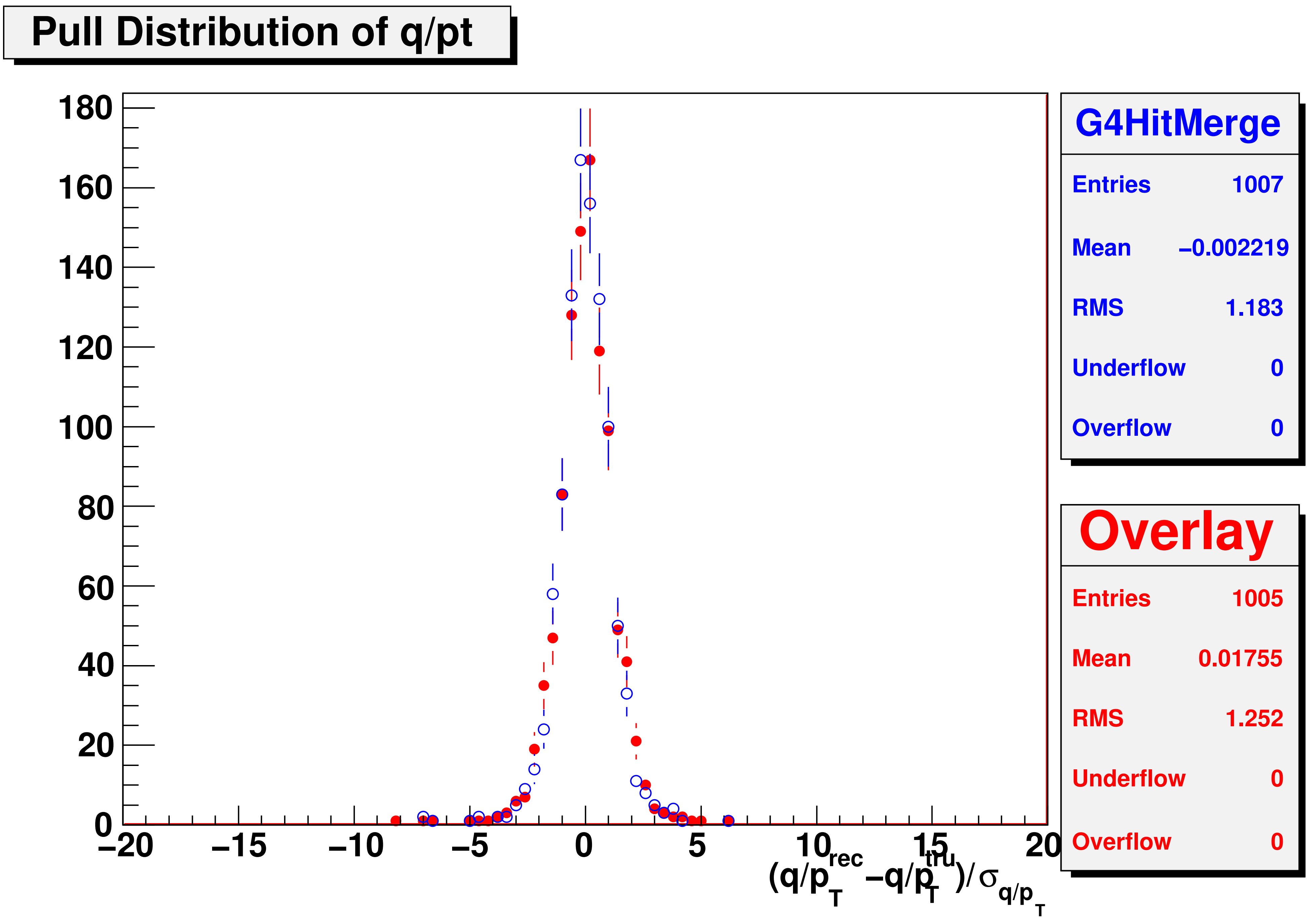
Pull Distribution of z0
G4HitMerge
Entries 1007
Mean 0.01228
RMS 0.9086
Underflow 0
Overflow 0
Overlay
Entries 1005
Mean –0.02474
RMS 0.9992
Underflow 0
Overflow 0
100
80
60
40
20
0
–5
–4
–3
–2
–1
0
1
2
3
4
5
$(z_0^{rec} - z_0^{tru})/\sigma_{z_0}$



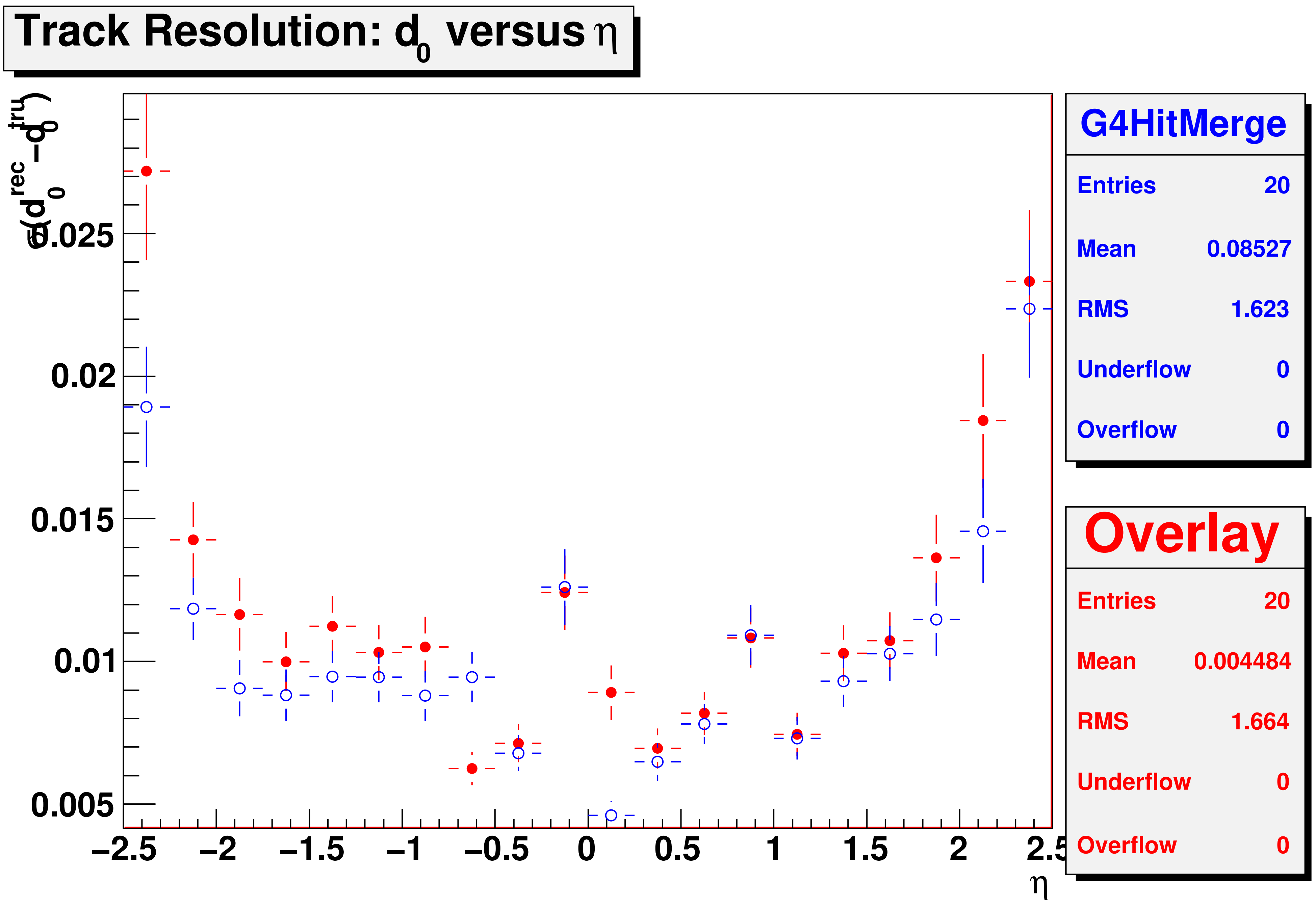
Pull Distribution of ϕ
$(\phi^{rec}-\phi^{tru})/\sigma_{\phi}$
G4HitMerge
Entries 1007
Mean −0.007931
RMS 1.279
Underflow 3
Overflow 3
Overlay
Entries 1005
Mean −0.06207
RMS 1.261
Underflow 4
Overflow 2



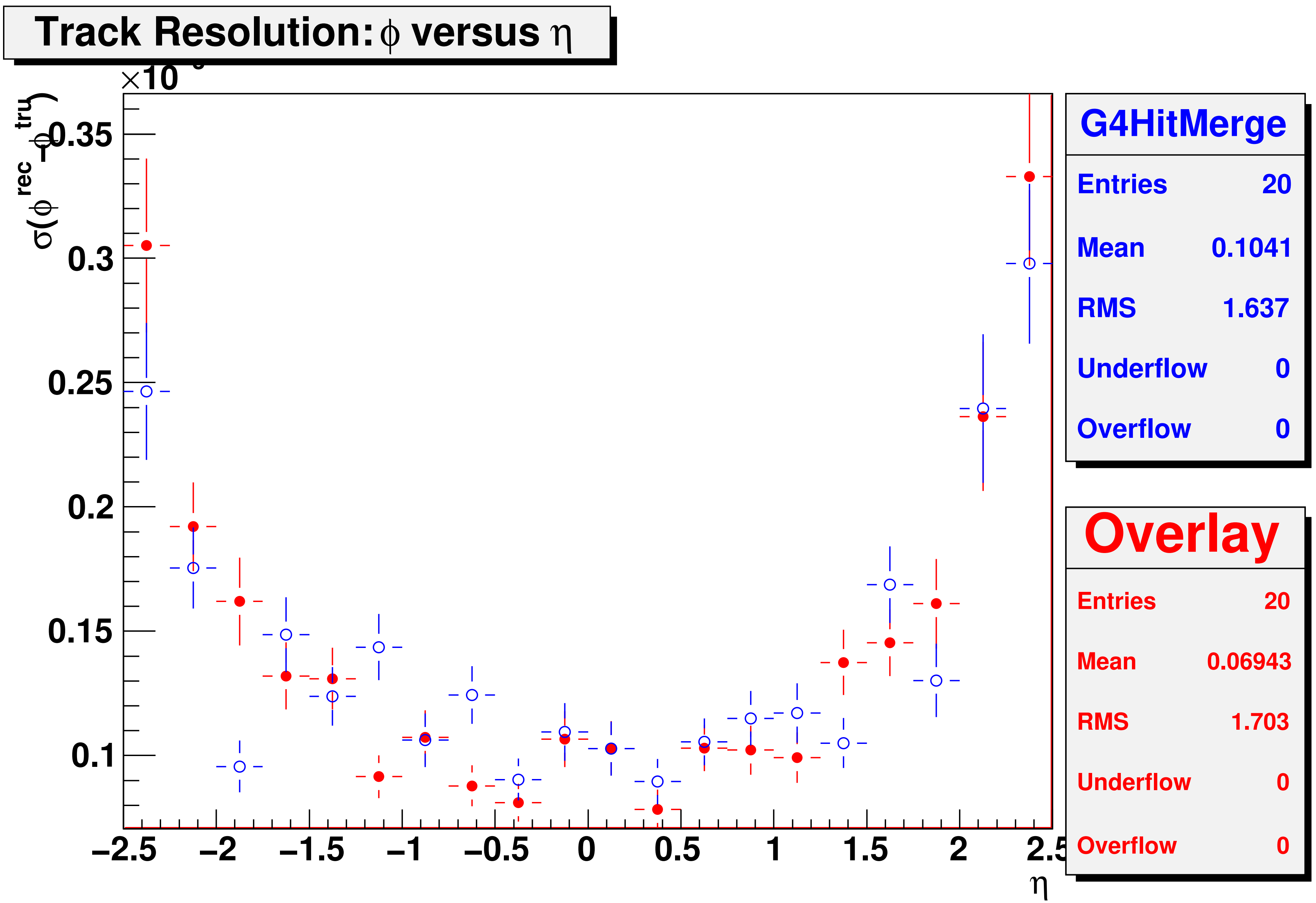
Pull Distribution of q/pt
G4HitMerge
Entries 1007
Mean 0.01272
RMS 1.106
Underflow 3
Overflow 1
Overlay
Entries 1005
Mean 0.03368
RMS 1.172
Underflow 3
Overflow 1
100
80
60
40
20
0
–5 –4 –3 –2 –1 0 1 2 3 4 5
$(q/p_T^{rec} - q/p_T^{tru})/\sigma_{q/p_T}$



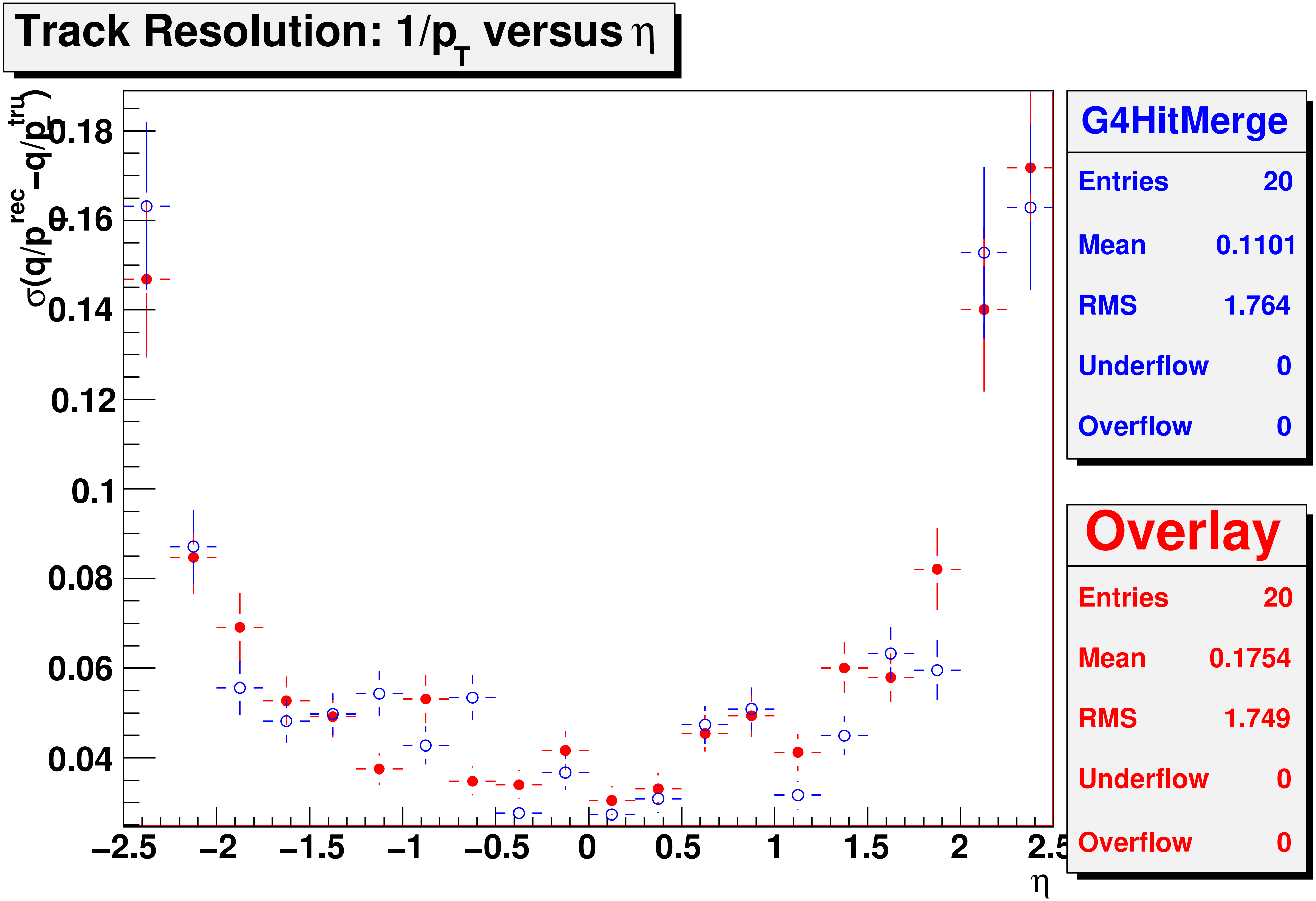
Pull Distribution of q/pt
180
160
140
120
100
80
60
40
20
0
−20
−15
−10
−5
0
5
10
15
20
$(q/p_T^{rec} - q/p_T^{tru})/\sigma_{q/p_T}$
G4HitMerge
Entries 1007
Mean −0.002219
RMS 1.183
Underflow 0
Overflow 0
Overlay
Entries 1005
Mean 0.01755
RMS 1.252
Underflow 0
Overflow 0



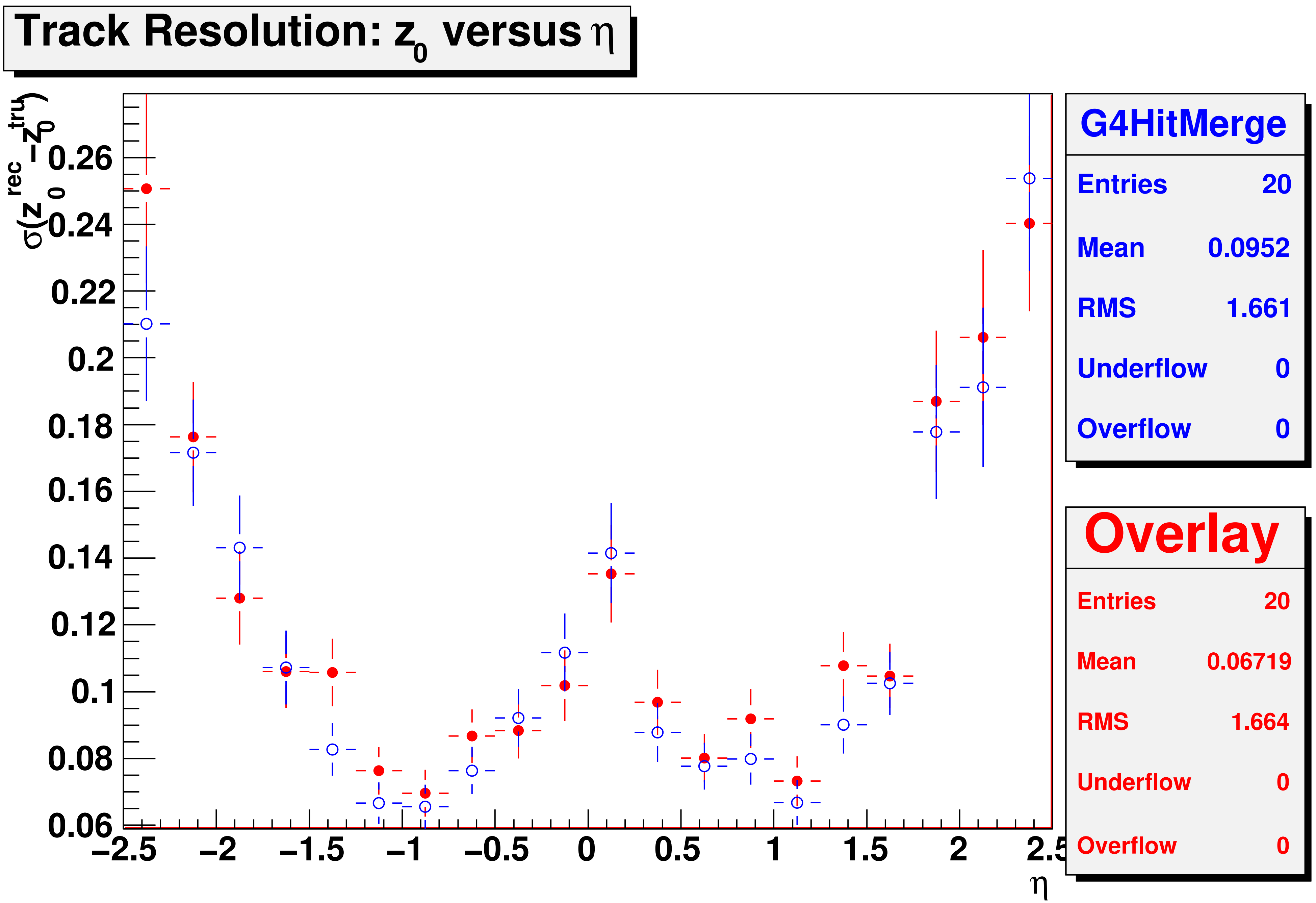
Track Resolution: d0 versus η
σ(d0rec −d0tru)
0.025
0.02
0.015
0.01
0.005
−2.5
−2
−1.5
−1
−0.5
0
0.5
1
1.5
2
2.5
η
G4HitMerge
Entries 20
Mean 0.08527
RMS 1.623
Underflow 0
Overflow 0
Overlay
Entries 20
Mean 0.004484
RMS 1.664
Underflow 0
Overflow 0



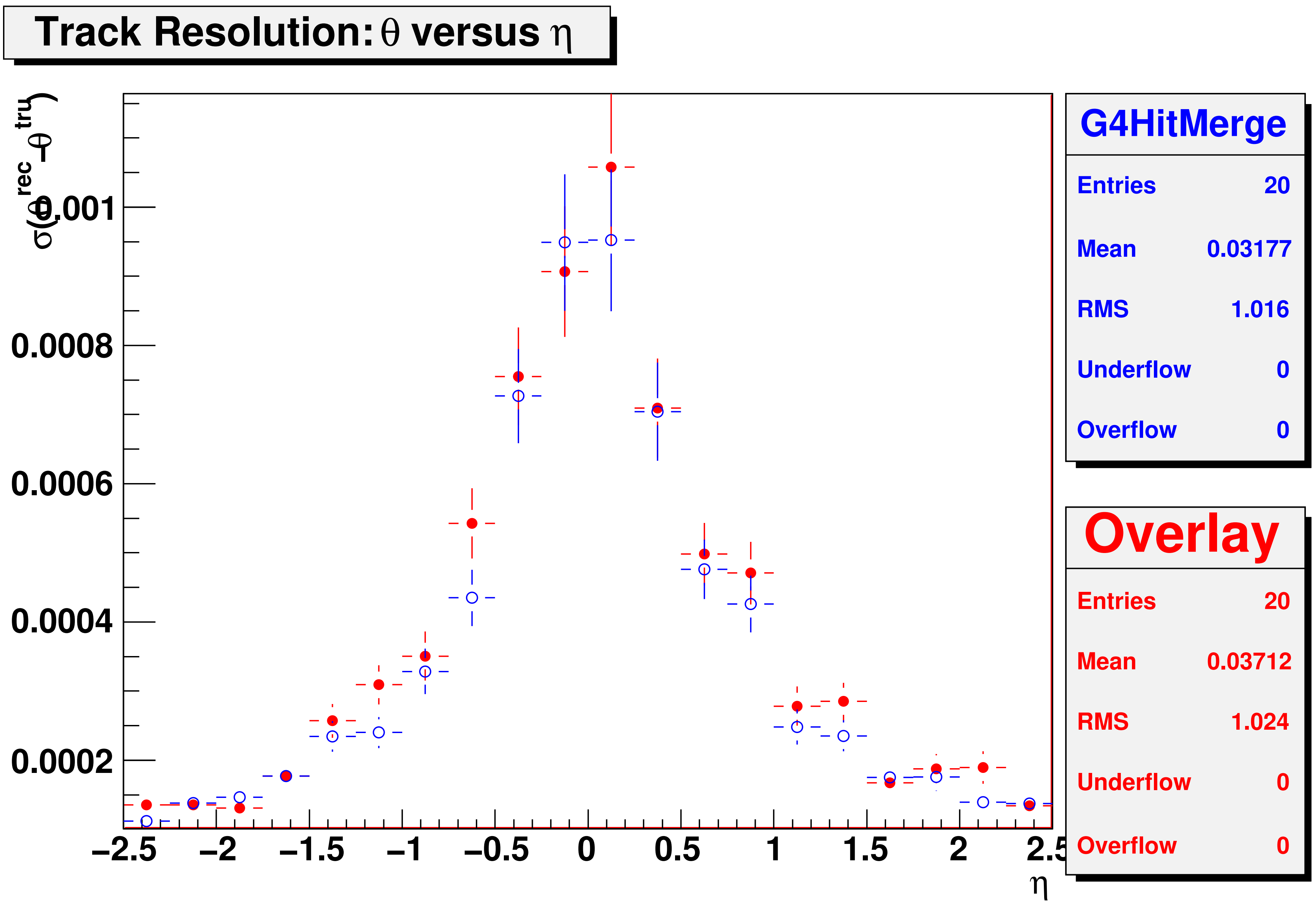
Track Resolution: ϕ versus η
×10^-3
σ(ϕ^rec − ϕ^tru)
0.35
0.3
0.25
0.2
0.15
0.1
−2.5
−2
−1.5
−1
−0.5
0
0.5
1
1.5
2
2.5
η
G4HitMerge
Entries 20
Mean 0.1041
RMS 1.637
Underflow 0
Overflow 0
Overlay
Entries 20
Mean 0.06943
RMS 1.703
Underflow 0
Overflow 0



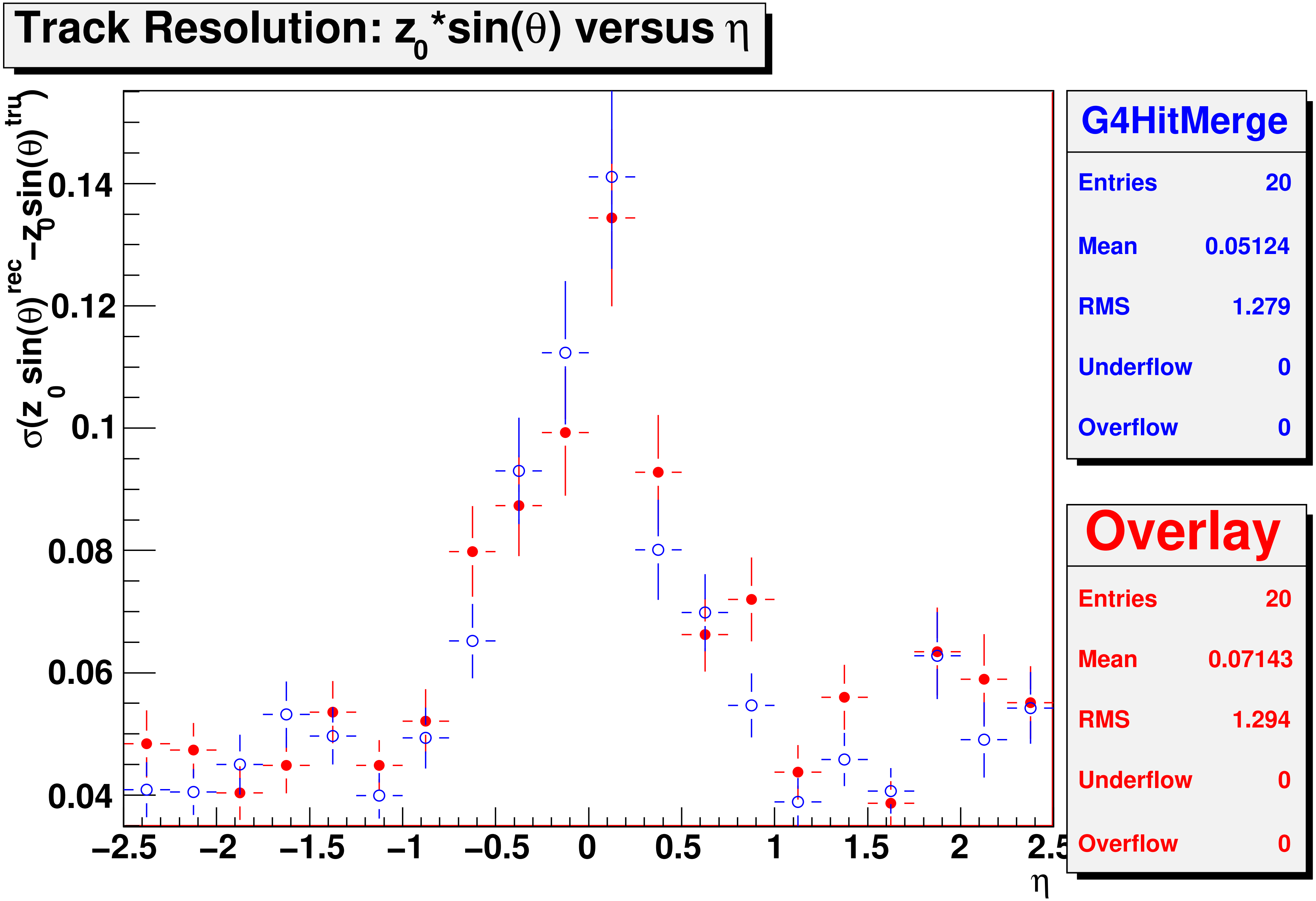
Track Resolution: 1/p_T versus η
σ(q/p^rec −q/p^tru)
0.18
0.16
0.14
0.12
0.1
0.08
0.06
0.04
−2.5
−2
−1.5
−1
−0.5
0
0.5
1
1.5
2
2.5
η
G4HitMerge
Entries 20
Mean 0.1101
RMS 1.764
Underflow 0
Overflow 0
Overlay
Entries 20
Mean 0.1754
RMS 1.749
Underflow 0
Overflow 0



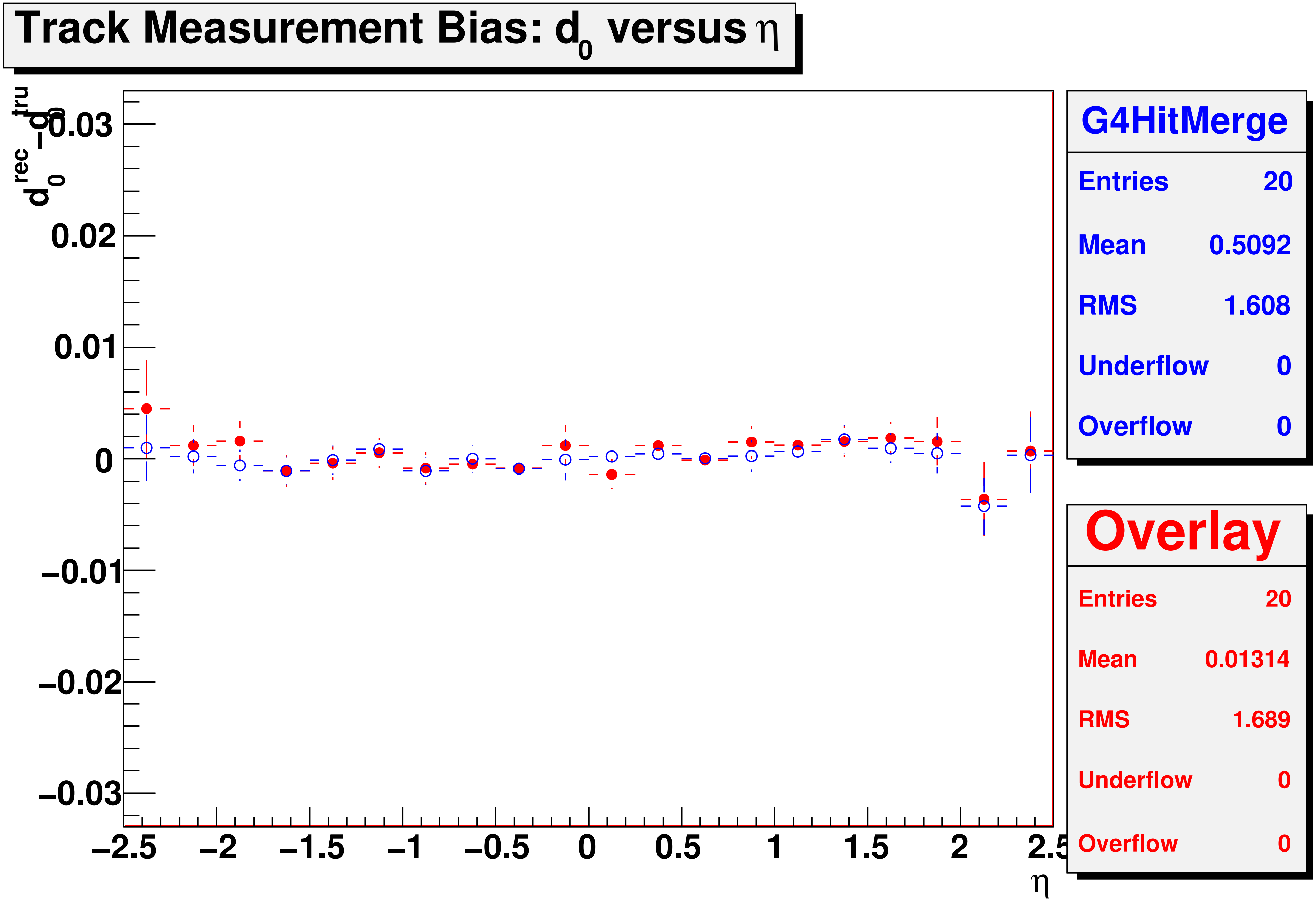
Track Resolution: z_0 versus η
$\sigma(z_0^{rec} - z_0^{tru})$
0.26
0.24
0.22
0.2
0.18
0.16
0.14
0.12
0.1
0.08
0.06
−2.5
−2
−1.5
−1
−0.5
0
0.5
1
1.5
2
2.5
η
G4HitMerge
Entries 20
Mean 0.0952
RMS 1.661
Underflow 0
Overflow 0
Overlay
Entries 20
Mean 0.06719
RMS 1.664
Underflow 0
Overflow 0



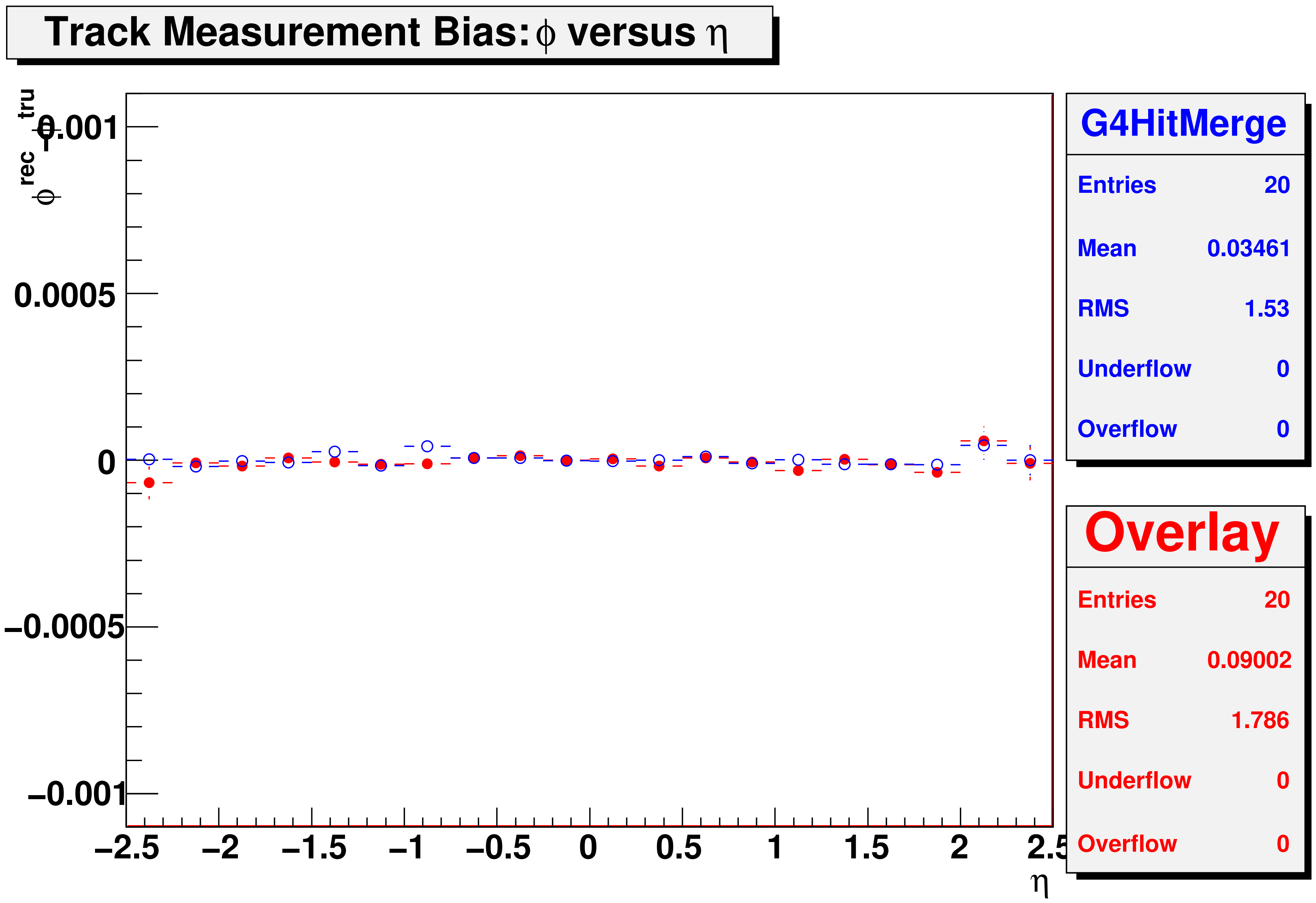
Track Resolution: θ versus η
σ(θ^rec − θ^tru)
0.001
0.0008
0.0006
0.0004
0.0002
−2.5
−2
−1.5
−1
−0.5
0
0.5
1
1.5
2
2.5
η
G4HitMerge
Entries 20
Mean 0.03177
RMS 1.016
Underflow 0
Overflow 0
Overlay
Entries 20
Mean 0.03712
RMS 1.024
Underflow 0
Overflow 0

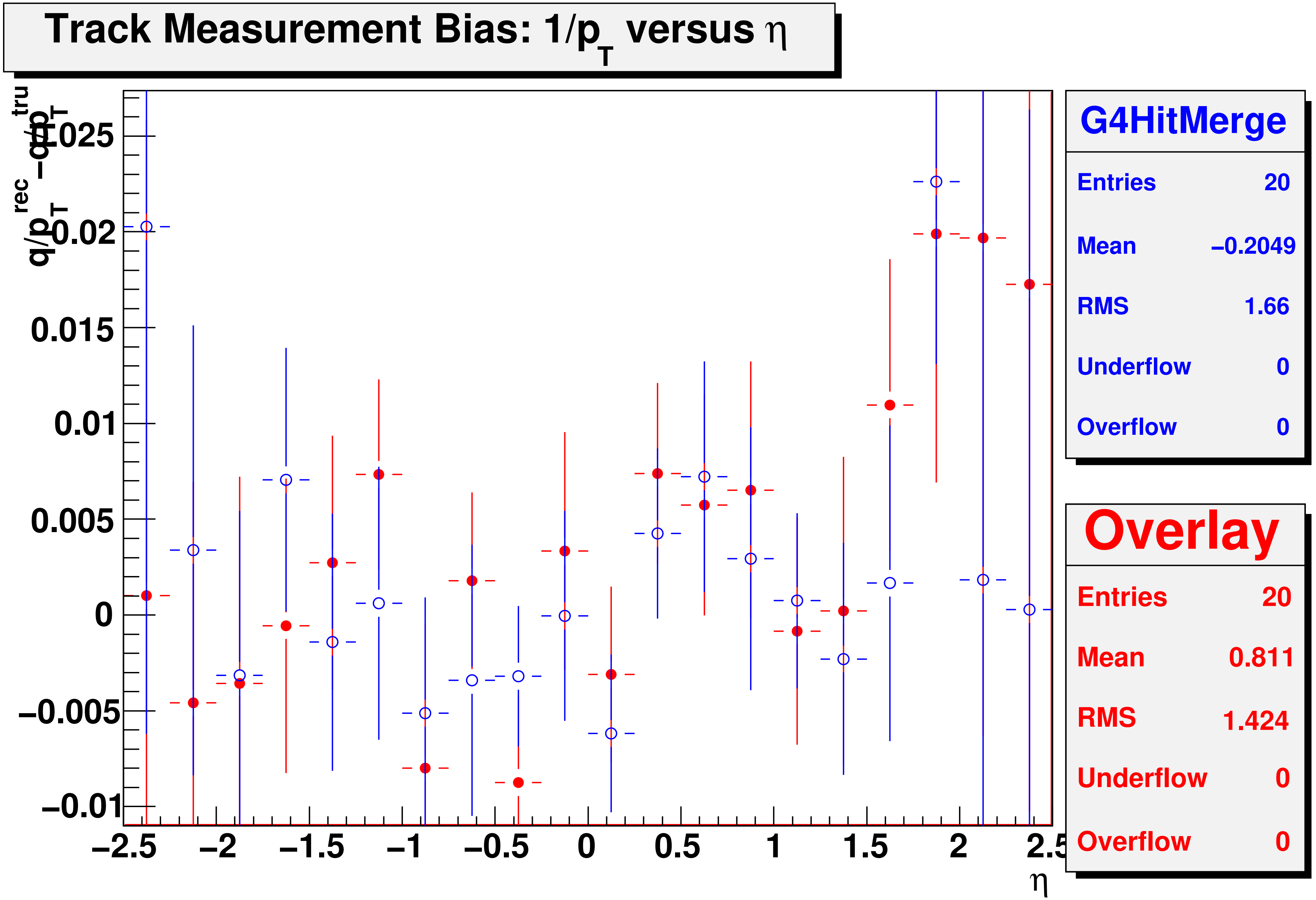


Track Resolution: z0*sin(θ) versus η
σ(z0sin(θ)rec−z0sin(θ)tru)
0.14
0.12
0.1
0.08
0.06
0.04
−2.5
−2
−1.5
−1
−0.5
0
0.5
1
1.5
2
2.5
η
G4HitMerge
Entries 20
Mean 0.05124
RMS 1.279
Underflow 0
Overflow 0
Overlay
Entries 20
Mean 0.07143
RMS 1.294
Underflow 0
Overflow 0

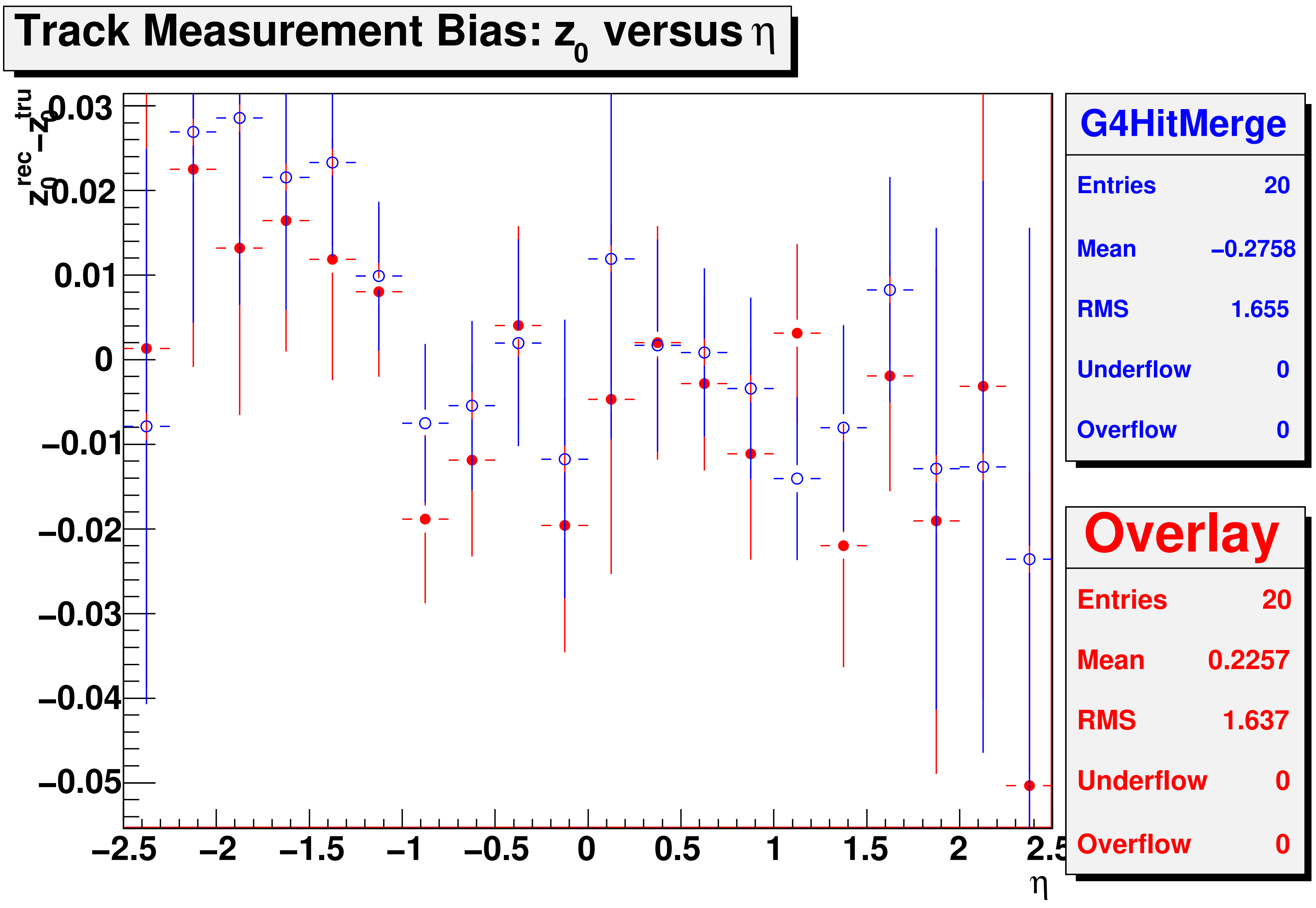


Track Measurement Bias: d_0 versus η
$d_0^{rec} - d_0^{tru}$
0.03
0.02
0.01
0
−0.01
−0.02
−0.03
−2.5
−2
−1.5
−1
−0.5
0
0.5
1
1.5
2
2.5
η
G4HitMerge
Entries 20
Mean 0.5092
RMS 1.608
Underflow 0
Overflow 0
Overlay
Entries 20
Mean 0.01314
RMS 1.689
Underflow 0
Overflow 0

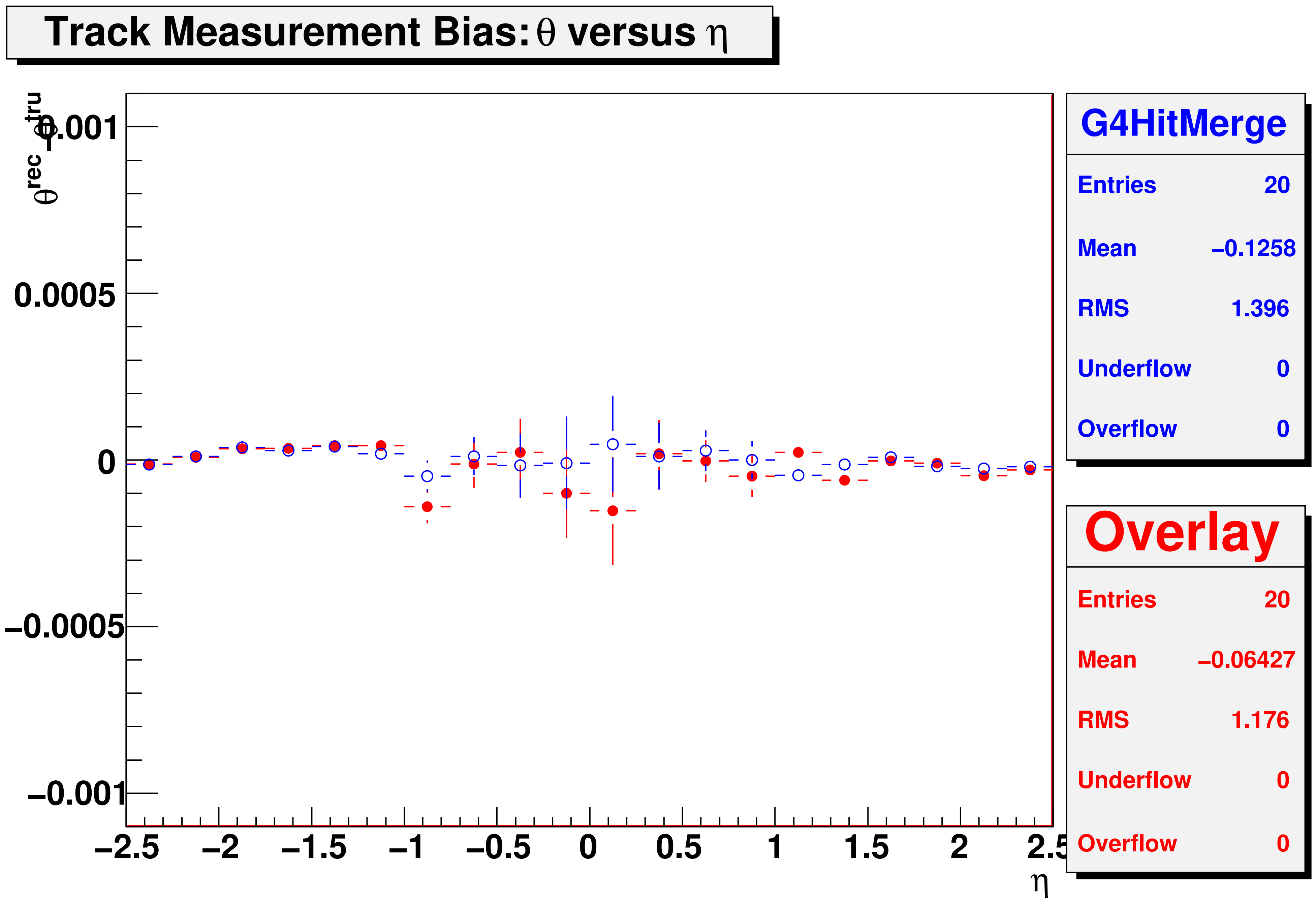

Track Measurement Bias: ϕ versus η
$\phi^{rec} - \phi^{tru}$
0.001
0.0005
0
-0.0005
-0.001
-2.5
-2
-1.5
-1
-0.5
0
0.5
1
1.5
2
2.5
η
G4HitMerge
Entries 20
Mean 0.03461
RMS 1.53
Underflow 0
Overflow 0
Overlay
Entries 20
Mean 0.09002
RMS 1.786
Underflow 0
Overflow 0



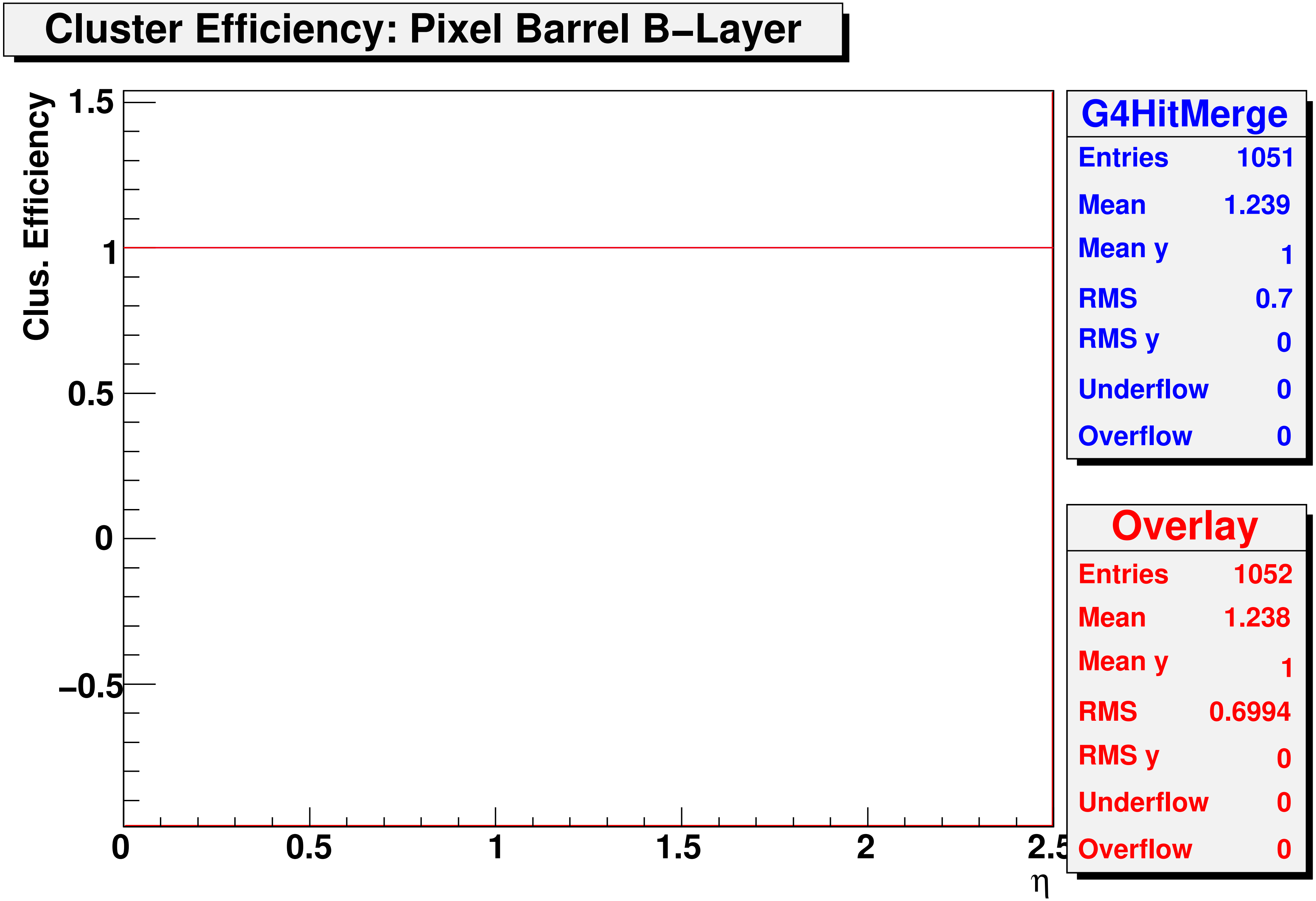
Track Measurement Bias: 1/p_T versus η
q/p_T^rec − q/p_T^tru
0.025
0.02
0.015
0.01
0.005
0
−0.005
−0.01
−2.5
−2
−1.5
−1
−0.5
0
0.5
1
1.5
2
2.5
η
G4HitMerge
Entries 20
Mean −0.2049
RMS 1.66
Underflow 0
Overflow 0
Overlay
Entries 20
Mean 0.811
RMS 1.424
Underflow 0
Overflow 0



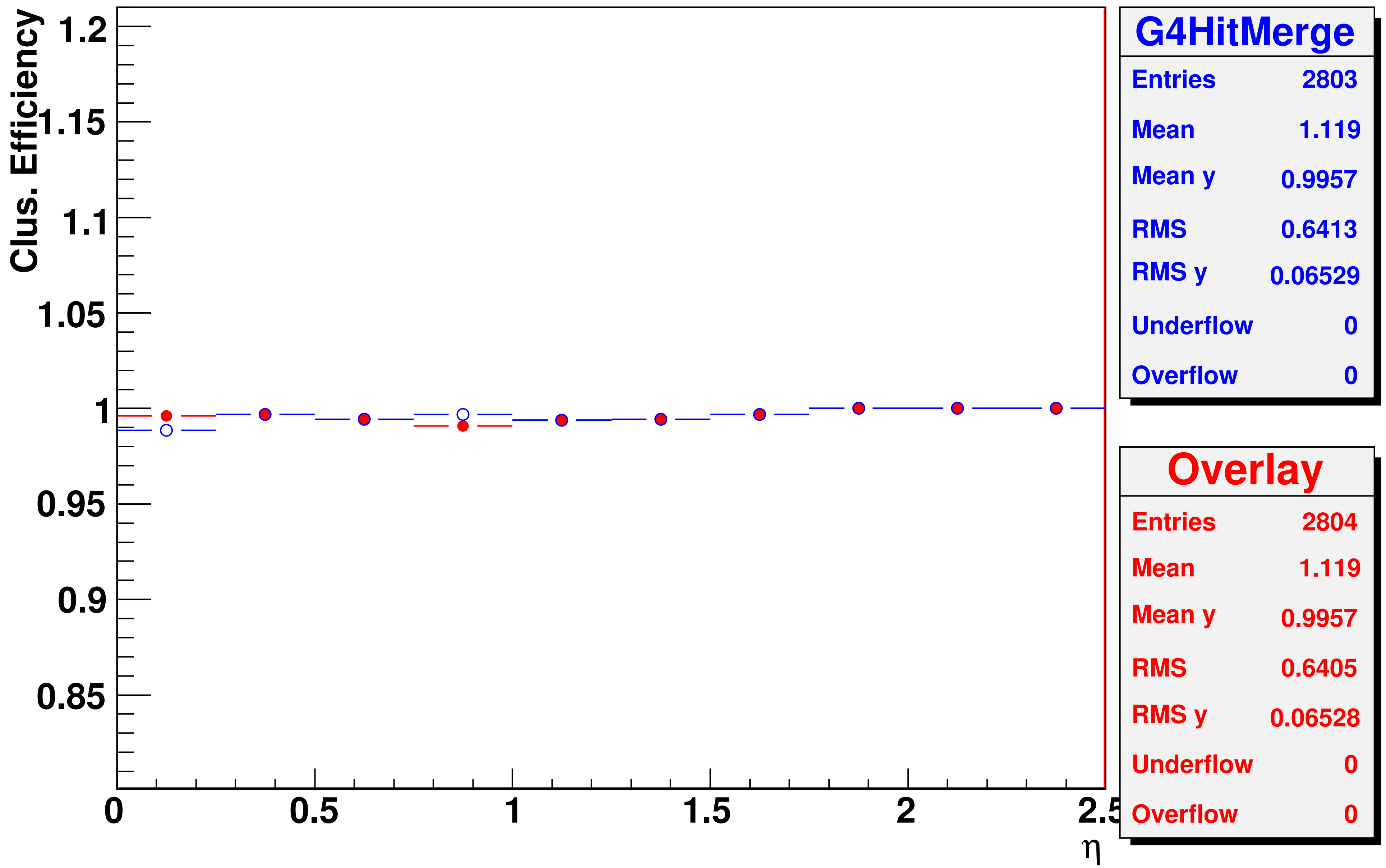
Track Measurement Bias: z0 versus η
z0rec − z0tru
0.03
0.02
0.01
0
−0.01
−0.02
−0.03
−0.04
−0.05
−2.5
−2
−1.5
−1
−0.5
0
0.5
1
1.5
2
2.5
η
G4HitMerge
Entries 20
Mean −0.2758
RMS 1.655
Underflow 0
Overflow 0
Overlay
Entries 20
Mean 0.2257
RMS 1.637
Underflow 0
Overflow 0

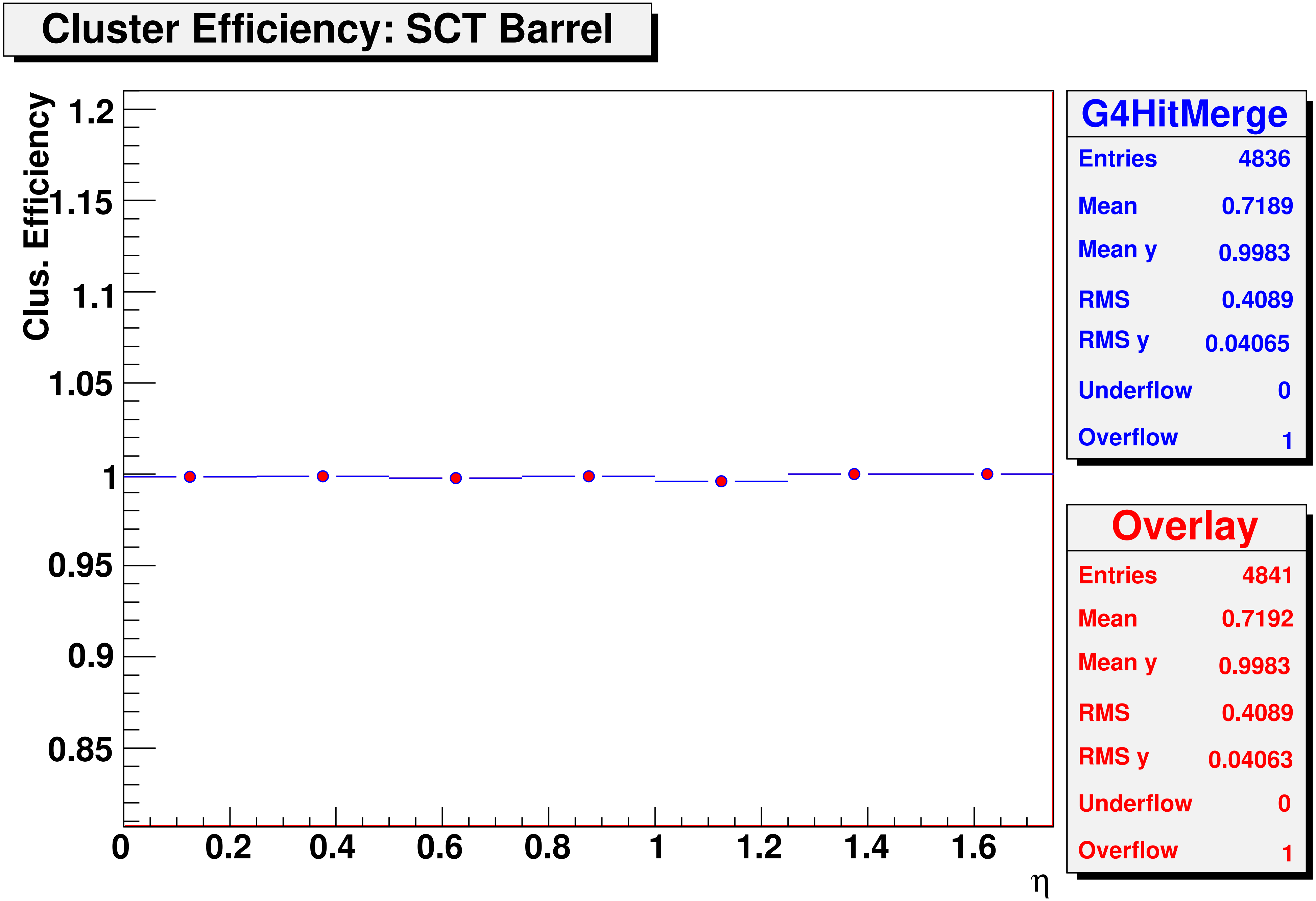


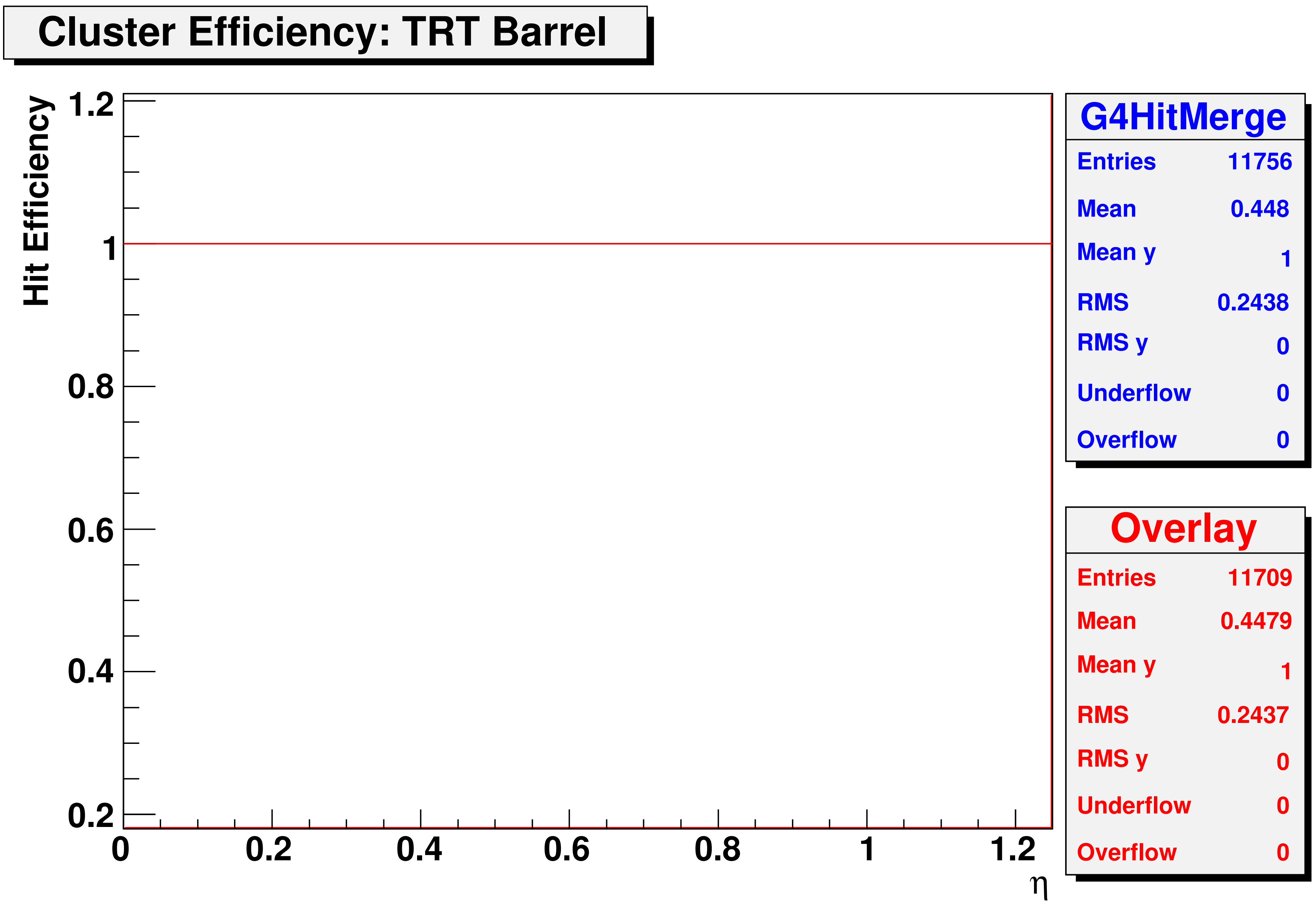
Track Measurement Bias: θ versus η
$\theta^{rec}-\theta^{tru}$
0.001
0.0005
0
−0.0005
−0.001
−2.5
−2
−1.5
−1
−0.5
0
0.5
1
1.5
2
2.5
η
G4HitMerge
Entries 20
Mean −0.1258
RMS 1.396
Underflow 0
Overflow 0
Overlay
Entries 20
Mean −0.06427
RMS 1.176
Underflow 0
Overflow 0


Cluster Efficiency: Pixel Barrel B-Layer
Clus. Efficiency
1.5
1
0.5
0
-0.5
0
0.5
1
1.5
2
2.5
η
G4HitMerge
Entries 1051
Mean 1.239
Mean y 1
RMS 0.7
RMS y 0
Underflow 0
Overflow 0
Overlay
Entries 1052
Mean 1.238
Mean y 1
RMS 0.6994
RMS y 0
Underflow 0
Overflow 0

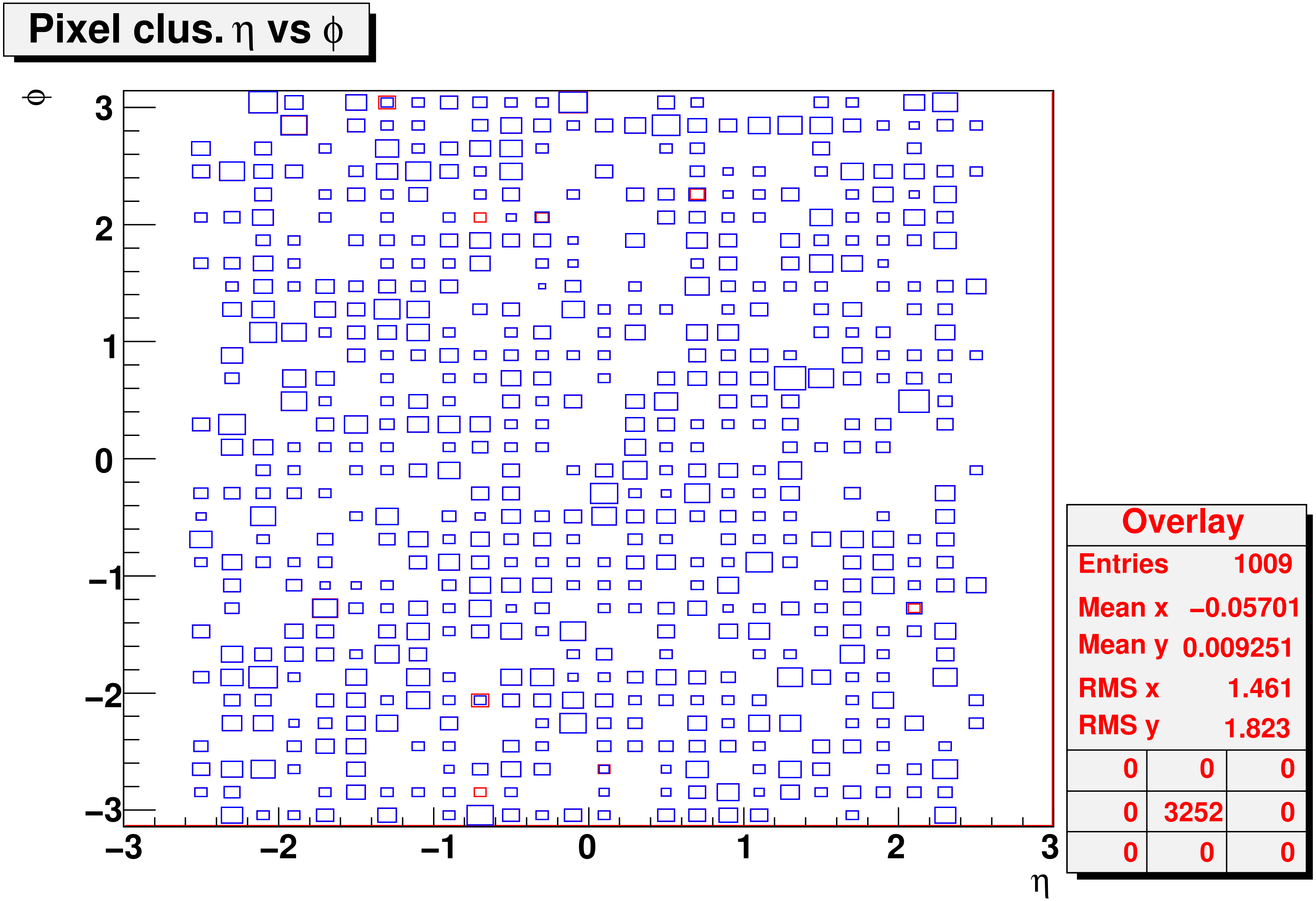
Cluster Efficiency: Pixel Barrel

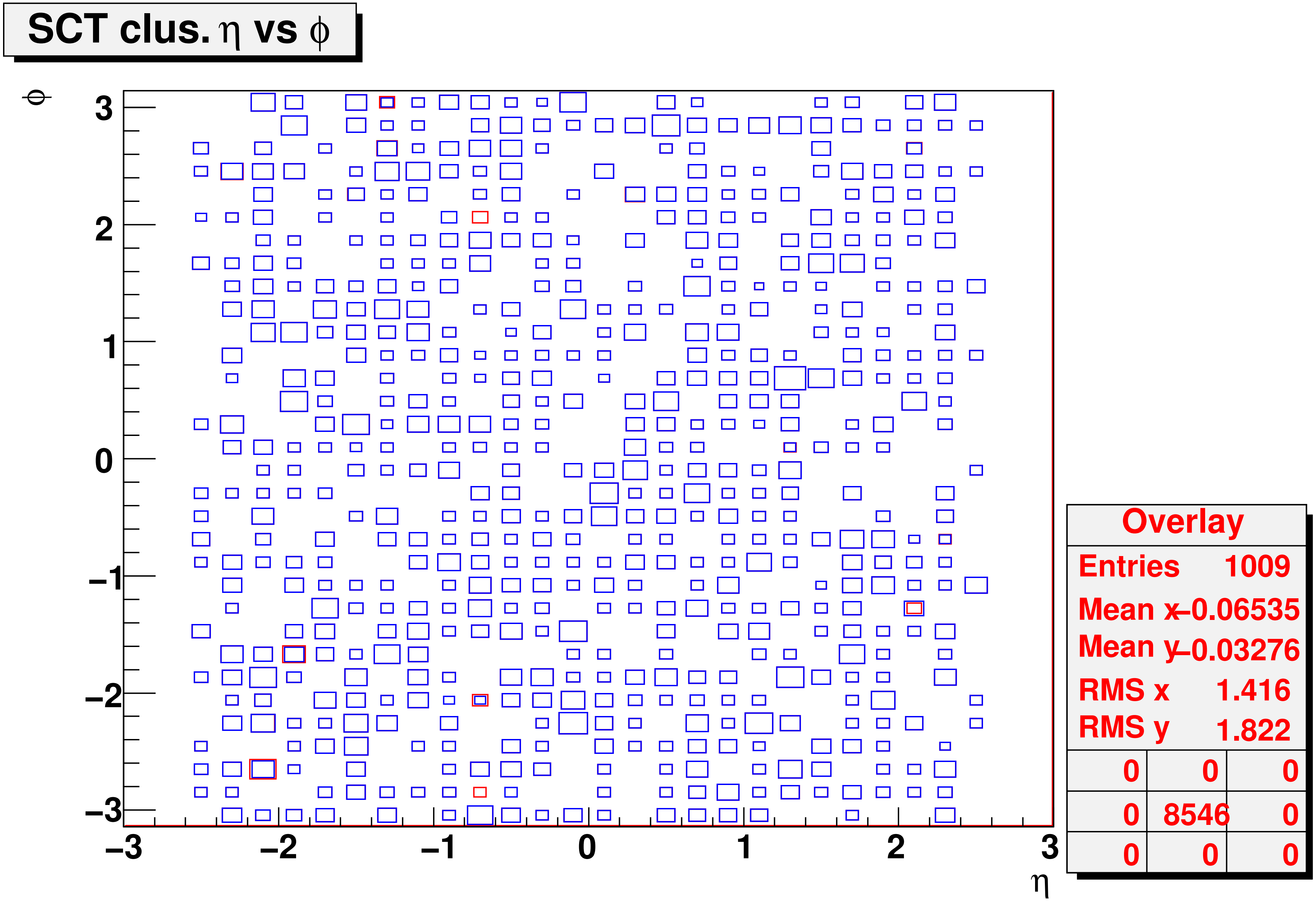


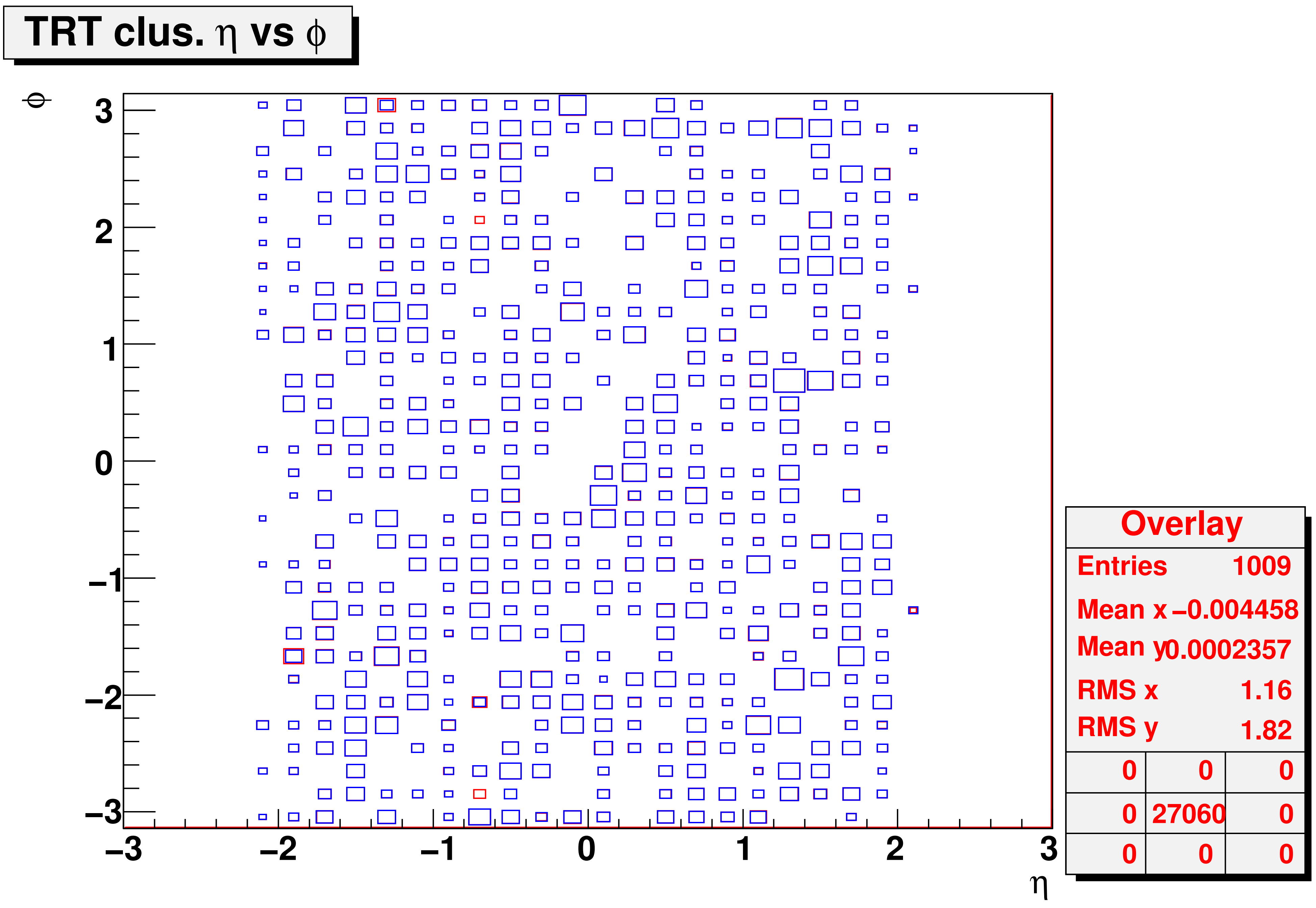

Cluster Efficiency: SCT Barrel
Clus. Efficiency
1.2
1.15
1.1
1.05
1
0.95
0.9
0.85
0
0.2
0.4
0.6
0.8
1
1.2
1.4
1.6
η
G4HitMerge
Entries 4836
Mean 0.7189
Mean y 0.9983
RMS 0.4089
RMS y 0.04065
Underflow 0
Overflow 1
Overlay
Entries 4841
Mean 0.7192
Mean y 0.9983
RMS 0.4089
RMS y 0.04063
Underflow 0
Overflow 1

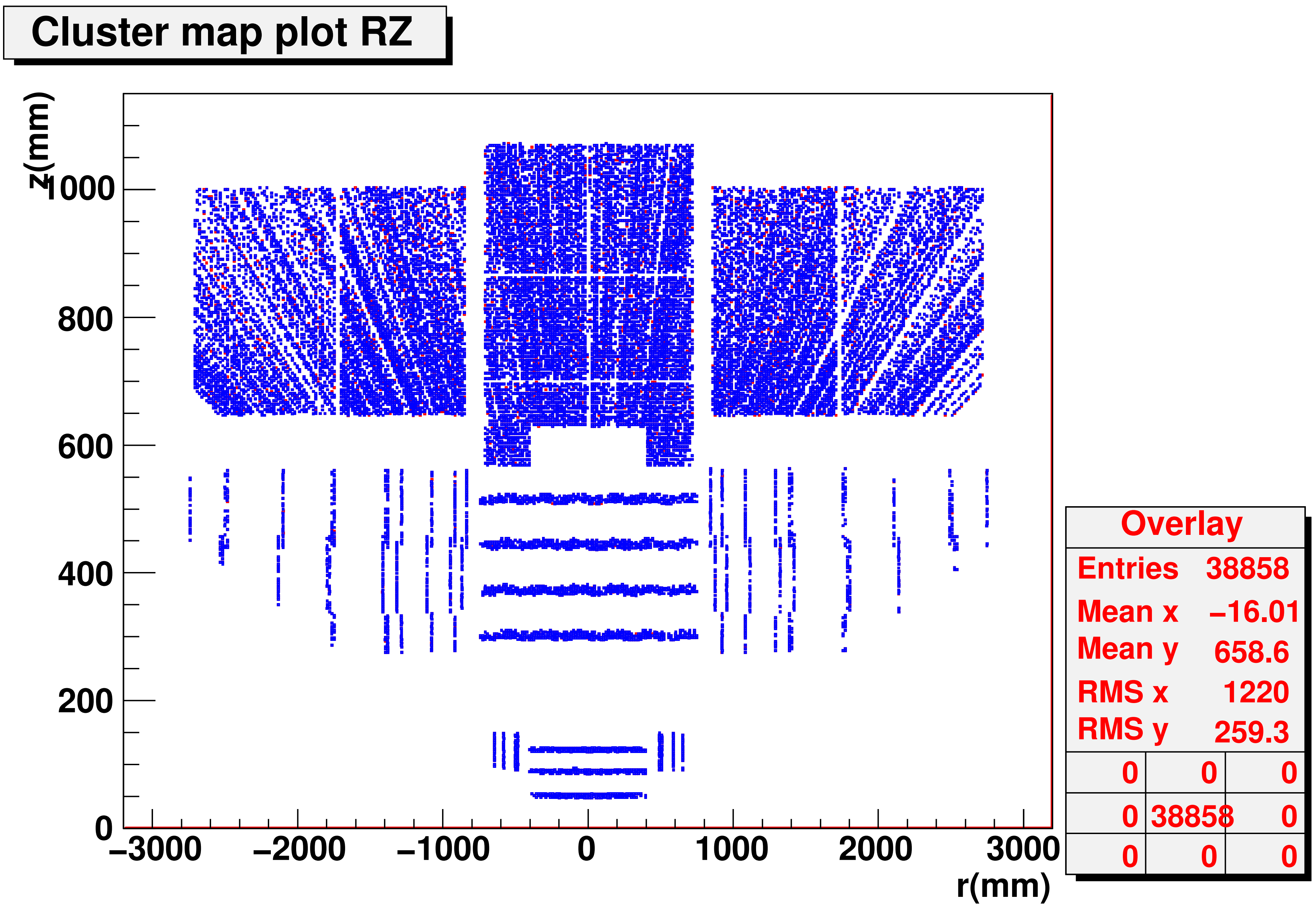


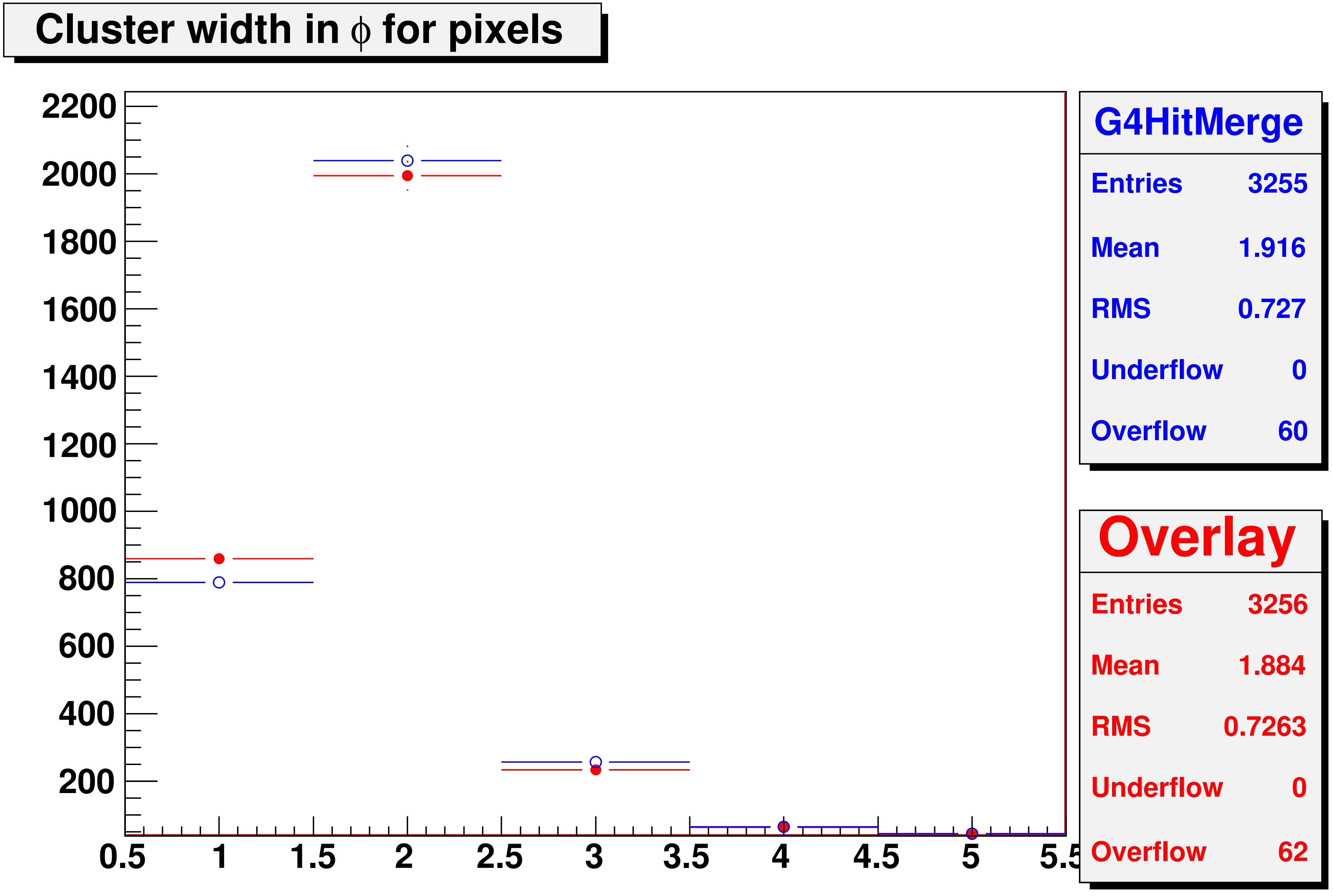
Cluster Efficiency: TRT Barrel
Hit Efficiency
1.2
1
0.8
0.6
0.4
0.2
0
0.2
0.4
0.6
0.8
1
1.2
η
G4HitMerge
Entries 11756
Mean 0.448
Mean y 1
RMS 0.2438
RMS y 0
Underflow 0
Overflow 0
Overlay
Entries 11709
Mean 0.4479
Mean y 1
RMS 0.2437
RMS y 0
Underflow 0
Overflow 0


Pixel clus. η vs φ
φ
3
2
1
0
−1
−2
−3
−3
−2
−1
0
1
2
3
η
Overlay
Entries 1009
Mean x −0.05701
Mean y 0.009251
RMS x 1.461
RMS y 1.823
0 0 0
0 3252 0
0 0 0

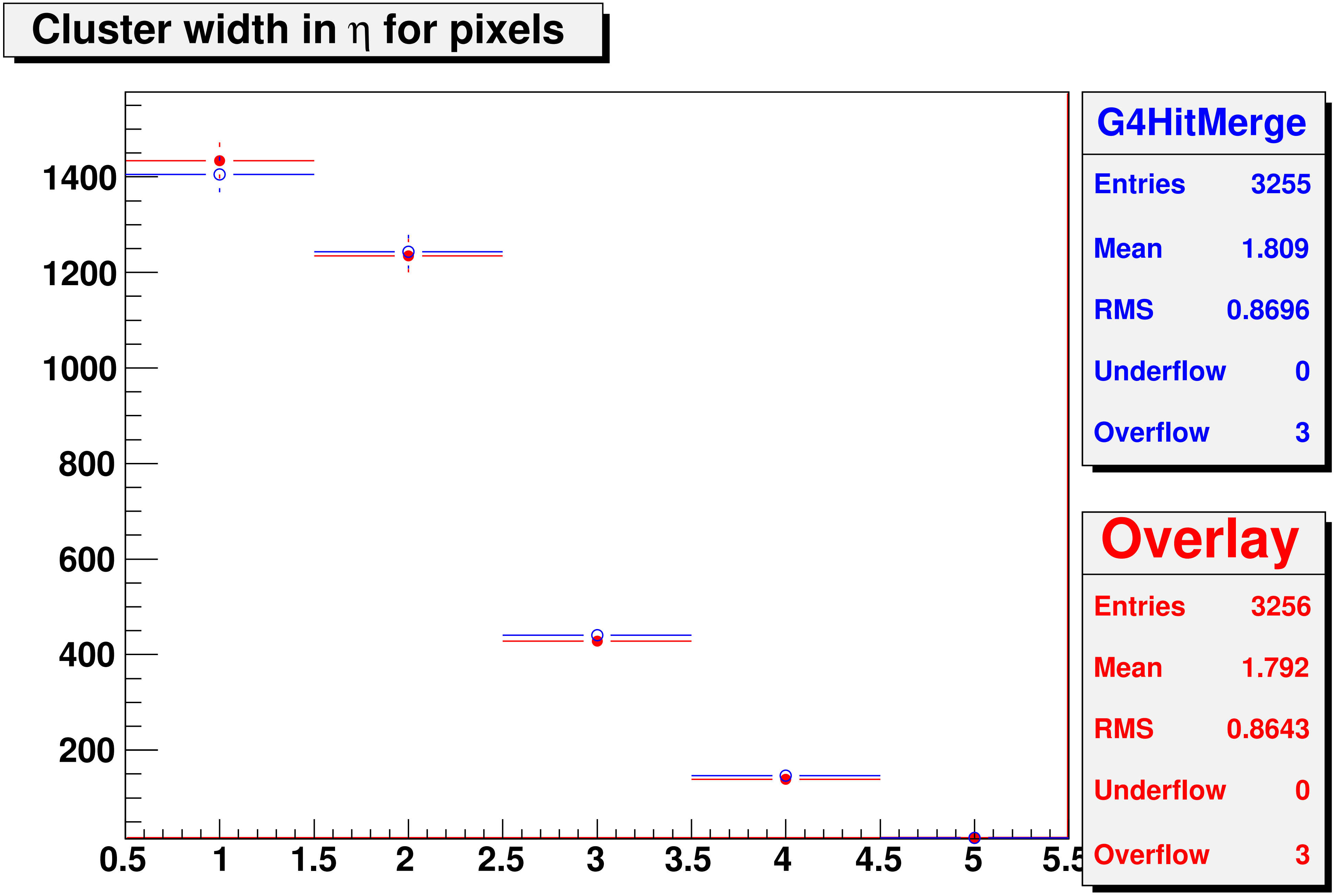

SCT clus. η vs φ
φ
3
2
1
0
−1
−2
−3
η
Overlay
Entries 1009
Mean x -0.06535
Mean y -0.03276
RMS x 1.416
RMS y 1.822
0 0 0
0 8546 0
0 0 0

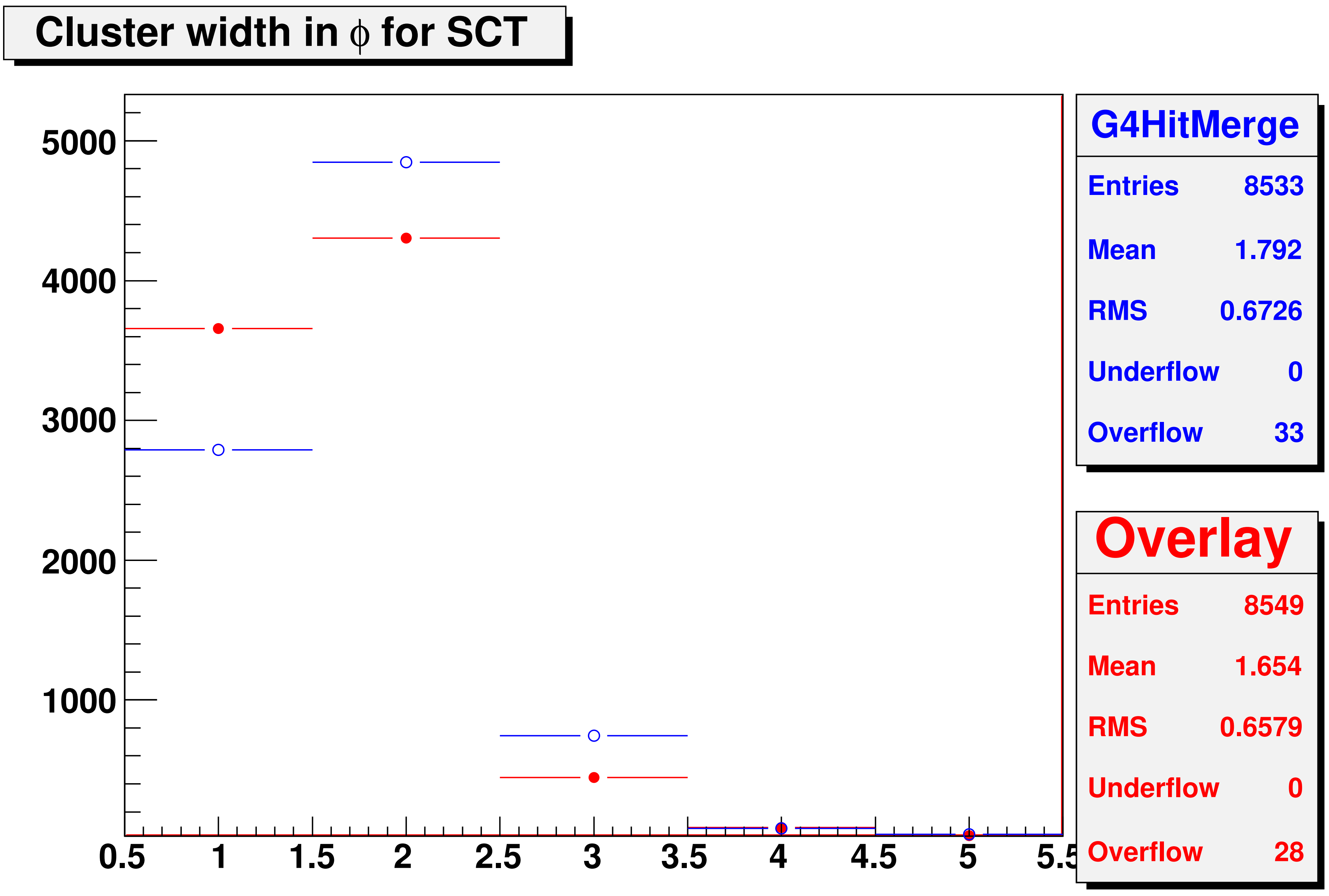

TRT clus. η vs ϕ
ϕ
3
2
1
0
−1
−2
−3
−3
−2
−1
0
1
2
3
η
Overlay
Entries 1009
Mean x −0.004458
Mean y 0.0002357
RMS x 1.16
RMS y 1.82
0 0 0
0 27060 0
0 0 0

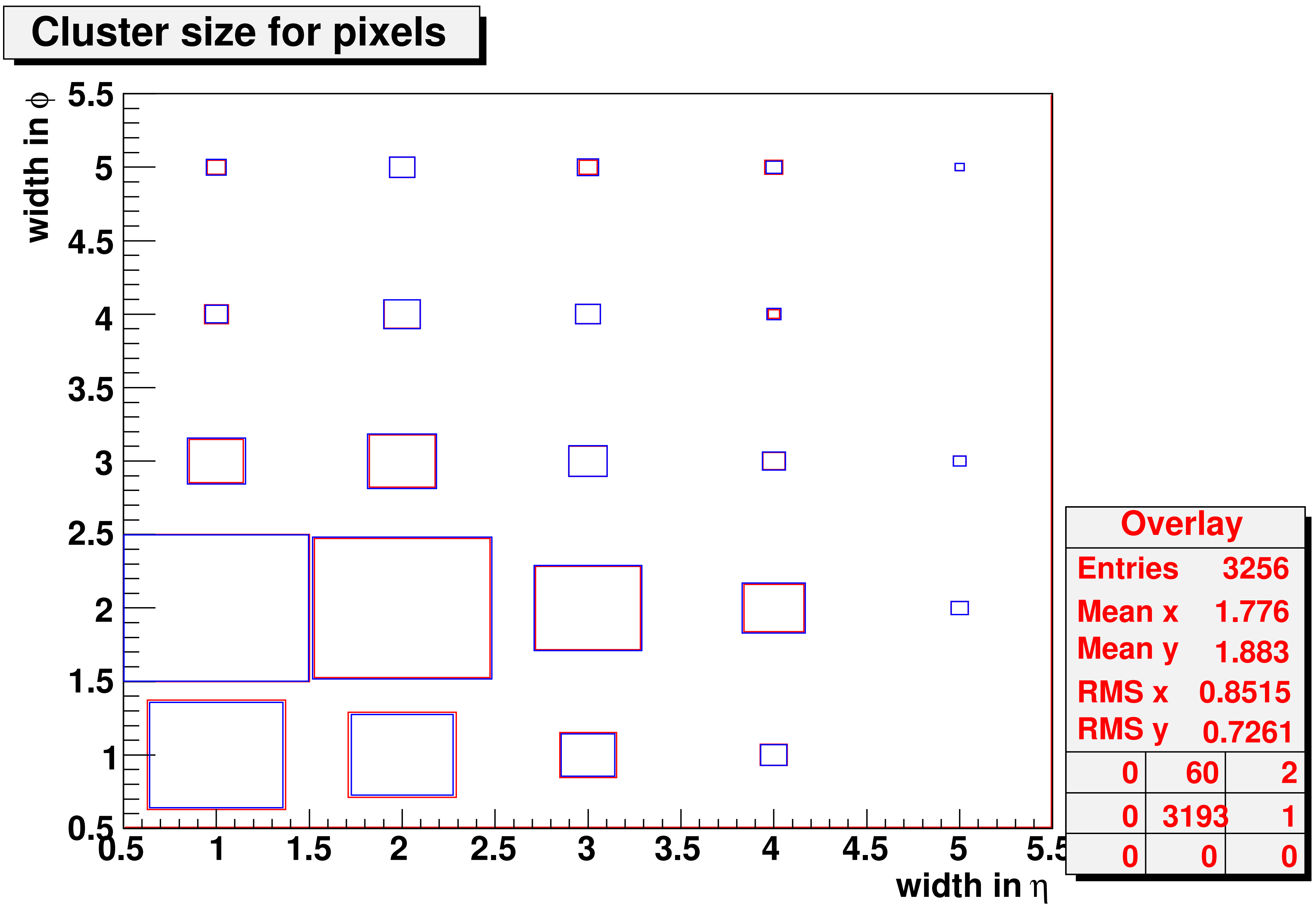

Cluster map plot RZ
z(mm)
1000
800
600
400
200
0
−3000
−2000
−1000
0
1000
2000
3000
r(mm)
Overlay
Entries 38858
Mean x −16.01
Mean y 658.6
RMS x 1220
RMS y 259.3
0 0 0
0 38858 0
0 0 0

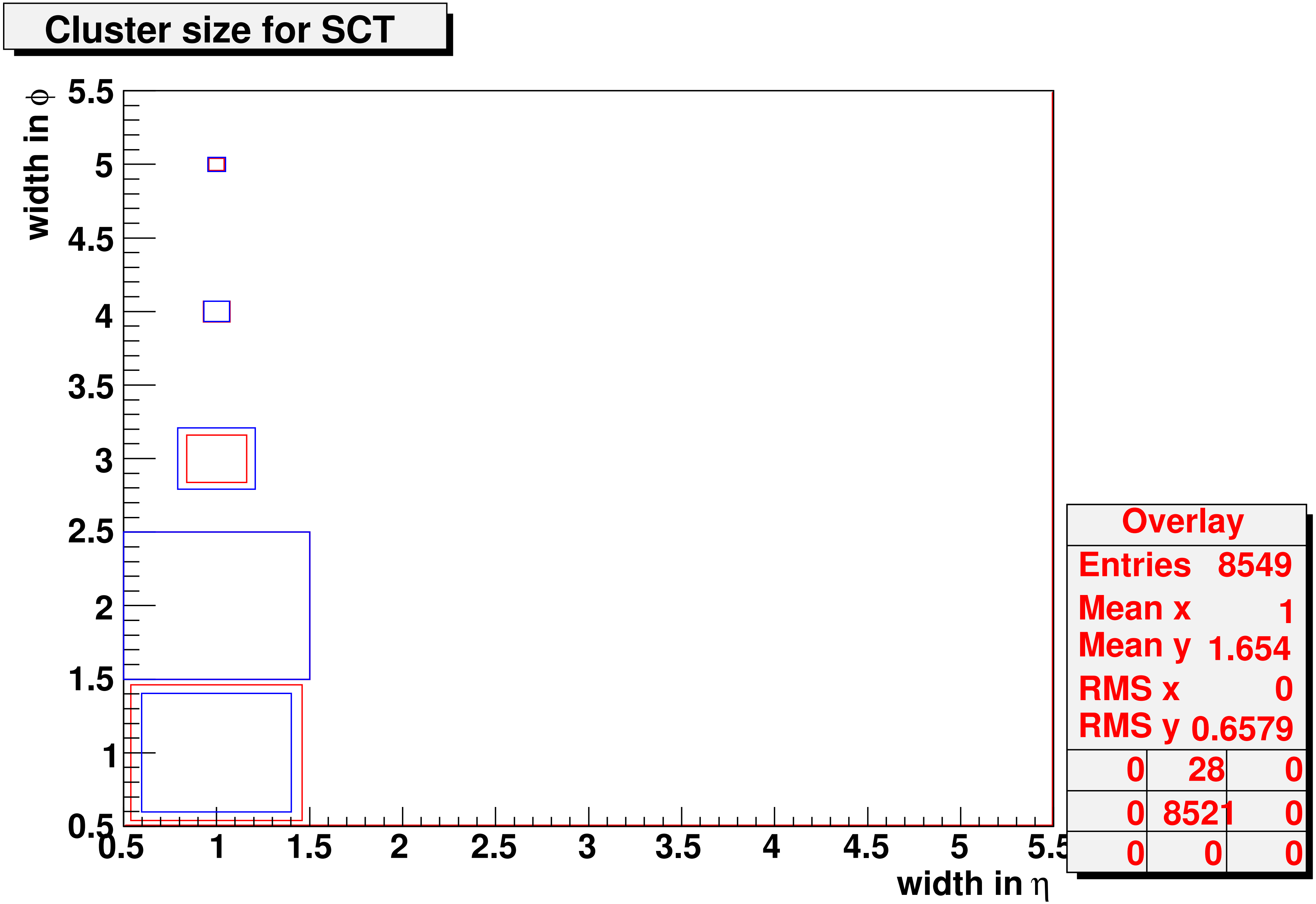


Cluster width in ϕ for pixels
2200
2000
1800
1600
1400
1200
1000
800
600
400
200
0.5
1
1.5
2
2.5
3
3.5
4
4.5
5
5.5
G4HitMerge
Entries 3255
Mean 1.916
RMS 0.727
Underflow 0
Overflow 60
Overlay
Entries 3256
Mean 1.884
RMS 0.7263
Underflow 0
Overflow 62

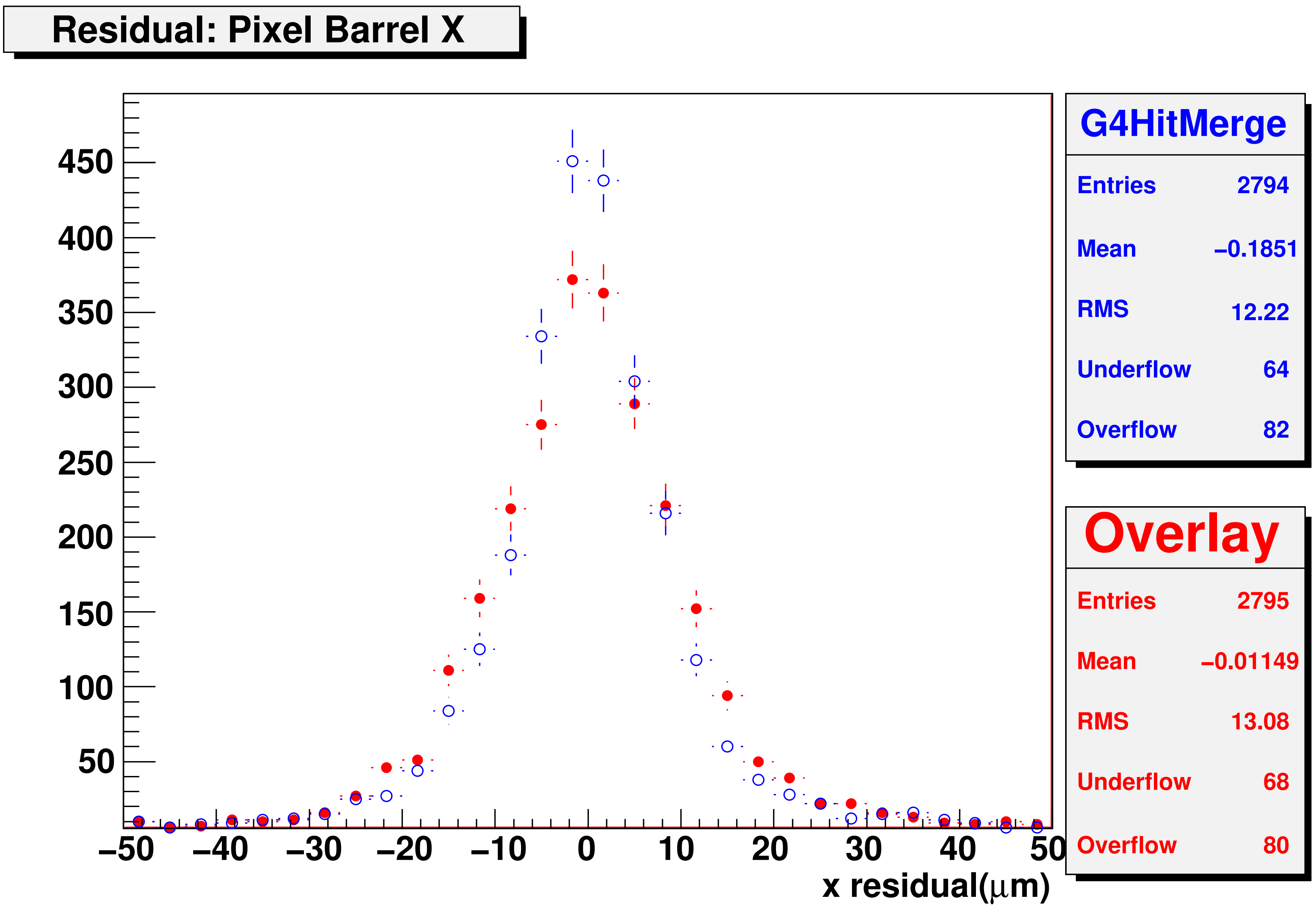

Cluster width in η for pixels
1400
1200
1000
800
600
400
200
0.5
1
1.5
2
2.5
3
3.5
4
4.5
5
5.5
G4HitMerge
Entries 3255
Mean 1.809
RMS 0.8696
Underflow 0
Overflow 3
Overlay
Entries 3256
Mean 1.792
RMS 0.8643
Underflow 0
Overflow 3


Cluster width in ϕ for SCT
5000
4000
3000
2000
1000
0.5
1
1.5
2
2.5
3
3.5
4
4.5
5
5.5
G4HitMerge
Entries 8533
Mean 1.792
RMS 0.6726
Underflow 0
Overflow 33
Overlay
Entries 8549
Mean 1.654
RMS 0.6579
Underflow 0
Overflow 28

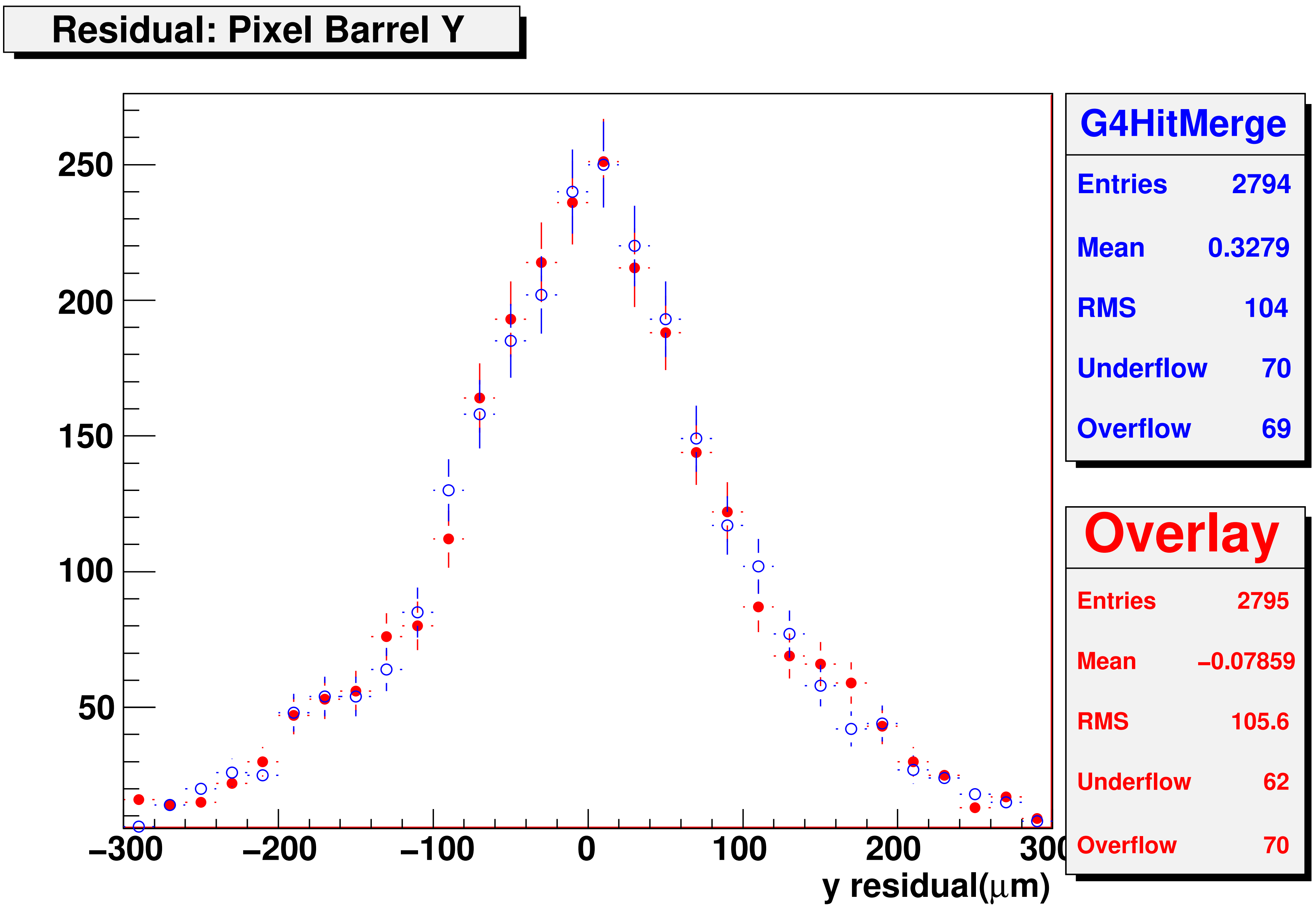

Cluster size for pixels
width in φ
width in η
0.5
1
1.5
2
2.5
3
3.5
4
4.5
5
5.5
Overlay
Entries 3256
Mean x 1.776
Mean y 1.883
RMS x 0.8515
RMS y 0.7261
0 60 2
0 3193 1
0 0 0



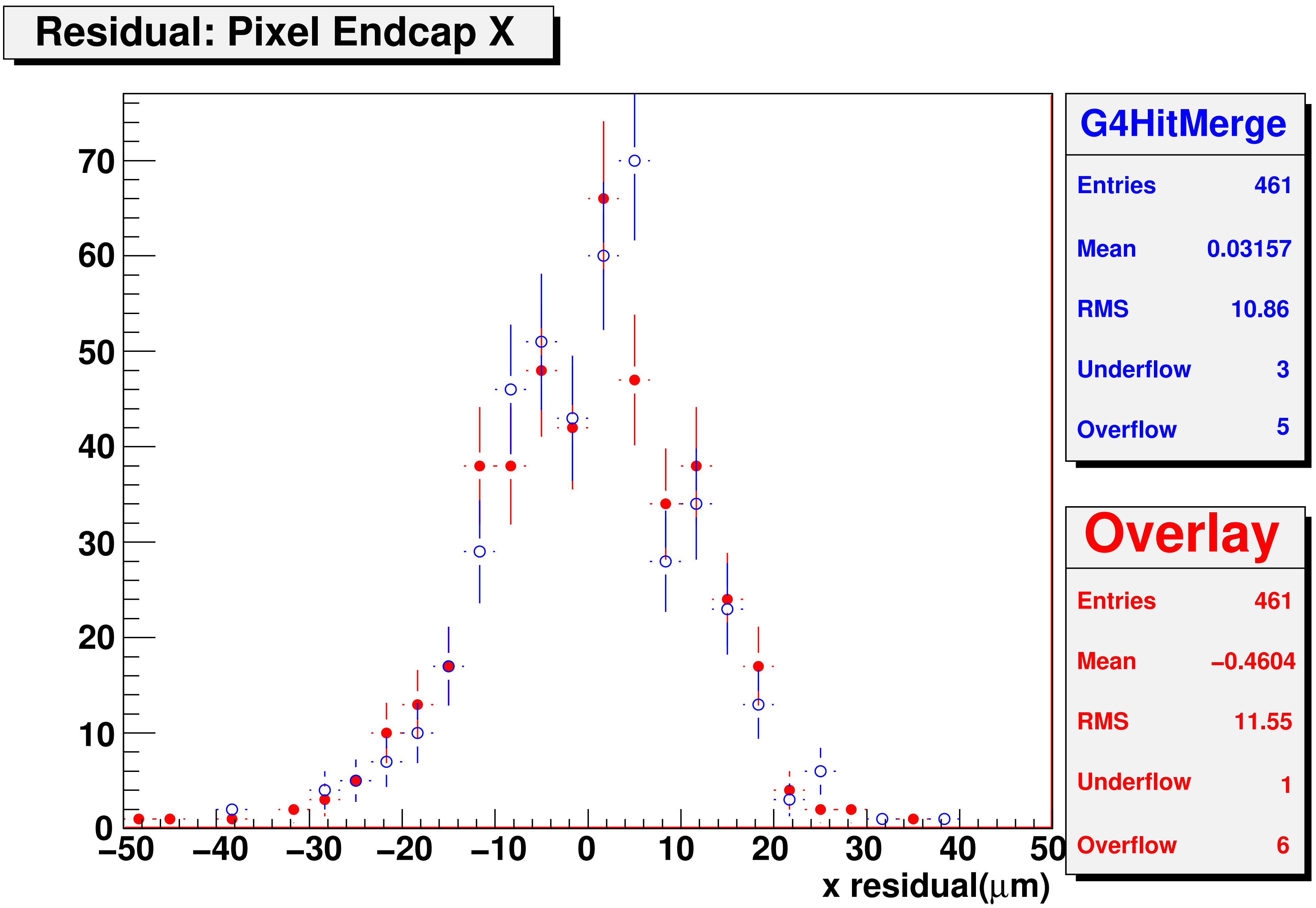
Cluster size for SCT
width in φ
width in η
Overlay
Entries 8549
Mean x 1
Mean y 1.654
RMS x 0
RMS y 0.6579
0 28 0
0 8521 0
0 0 0



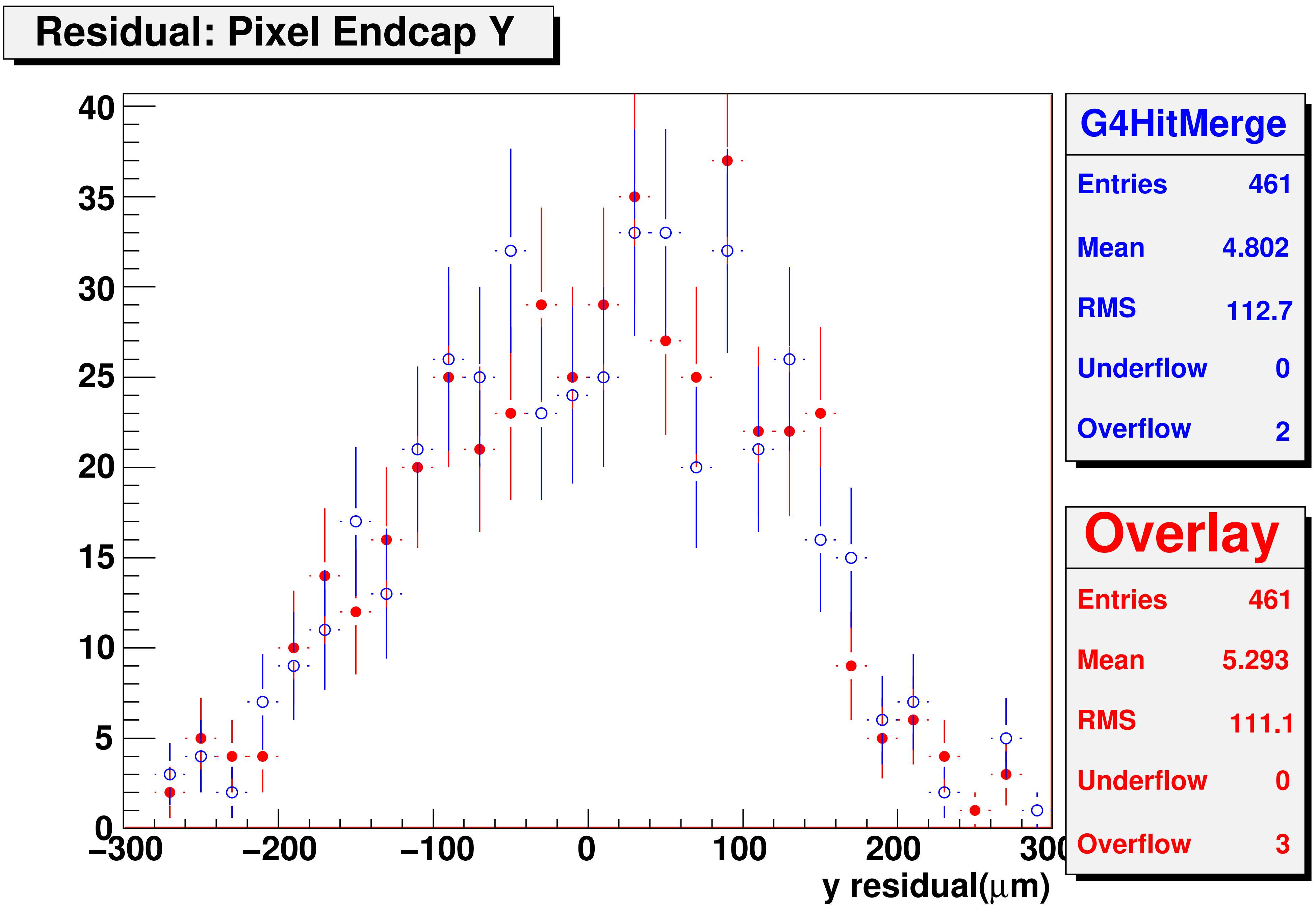
Residual: Pixel Barrel X
450
400
350
300
250
200
150
100
50
–50
–40
–30
–20
–10
0
10
20
30
40
50
x residual(μm)
G4HitMerge
Entries 2794
Mean –0.1851
RMS 12.22
Underflow 64
Overflow 82
Overlay
Entries 2795
Mean –0.01149
RMS 13.08
Underflow 68
Overflow 80



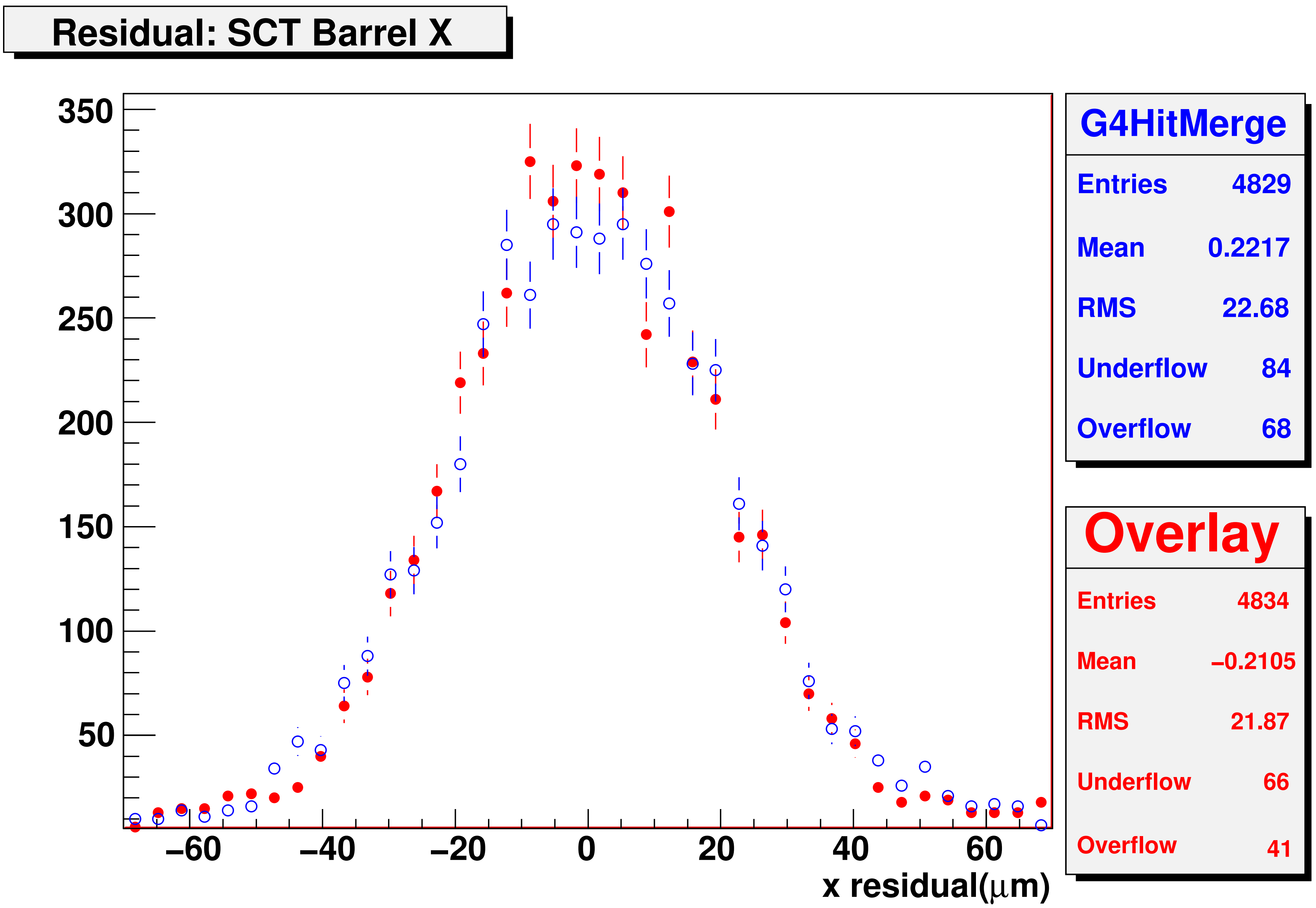
Residual: Pixel Barrel Y
250
200
150
100
50
–300
–200
–100
0
100
200
300
y residual(μm)
G4HitMerge
Entries 2794
Mean 0.3279
RMS 104
Underflow 70
Overflow 69
Overlay
Entries 2795
Mean –0.07859
RMS 105.6
Underflow 62
Overflow 70



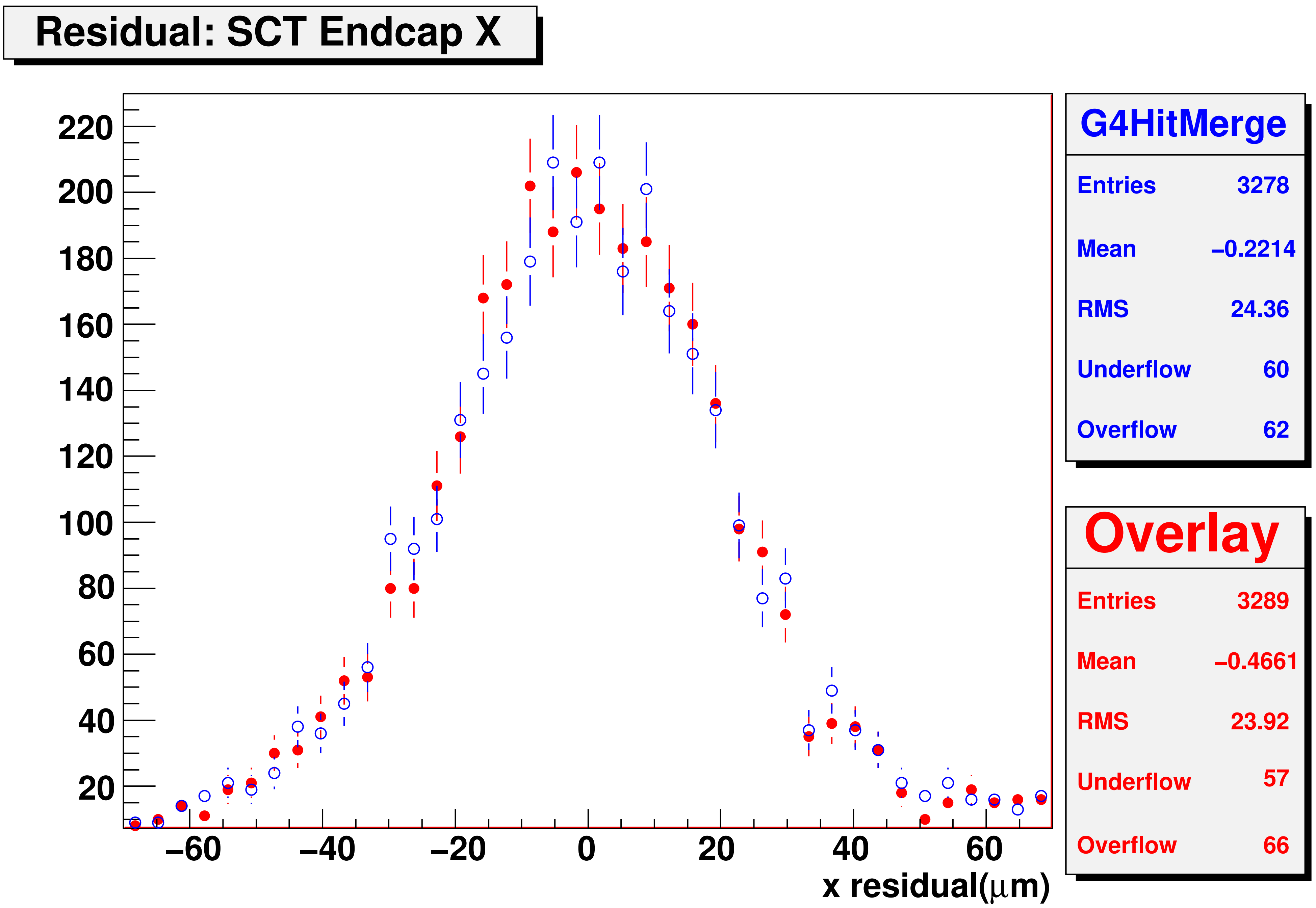
Residual: Pixel Endcap X
G4HitMerge
Entries 461
Mean 0.03157
RMS 10.86
Underflow 3
Overflow 5
Overlay
Entries 461
Mean –0.4604
RMS 11.55
Underflow 1
Overflow 6
x residual(μm)
0
10
20
30
40
50
60
70
–50
–40
–30
–20
–10
0
10
20
30
40
50



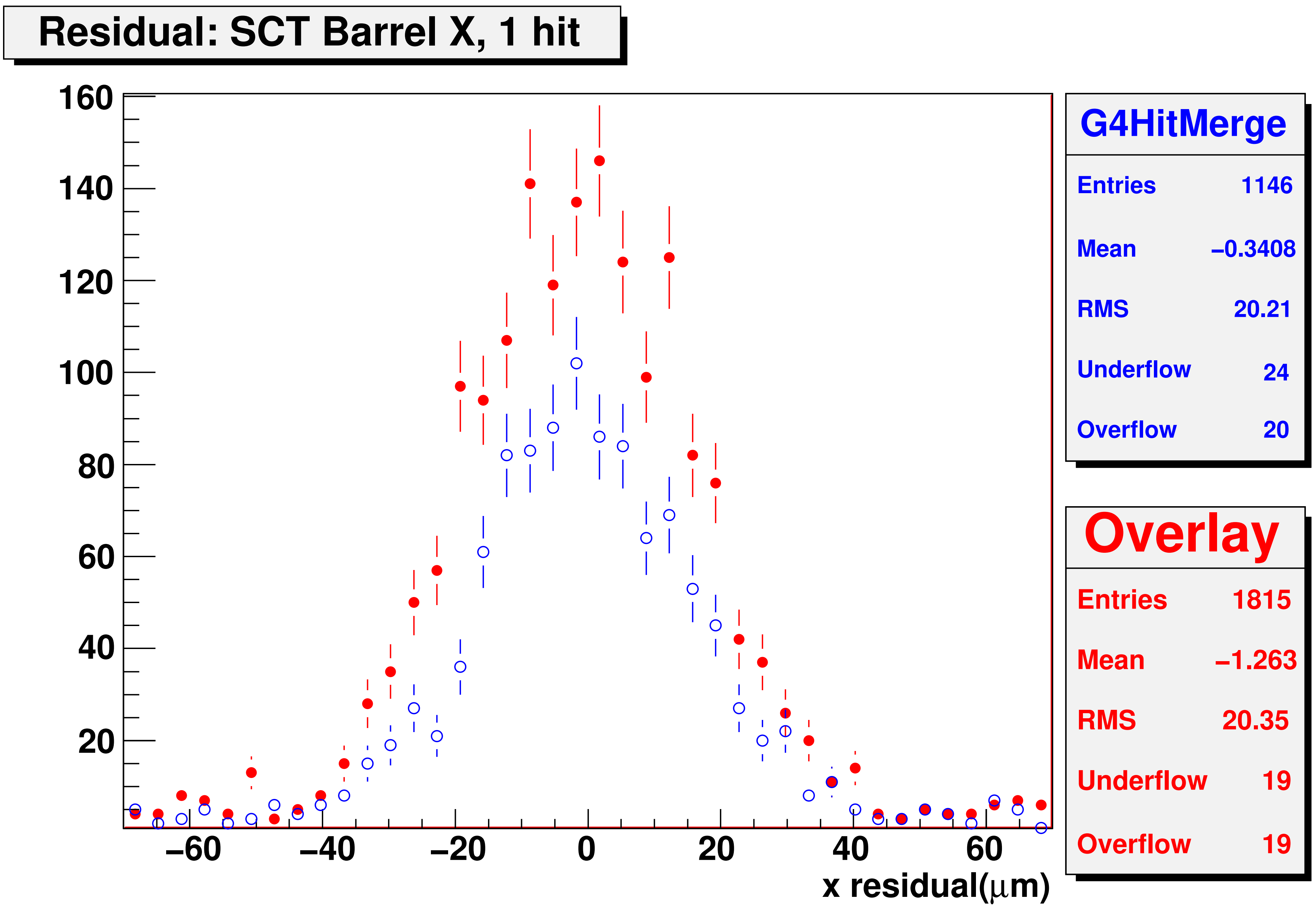
Residual: Pixel Endcap Y
40
35
30
25
20
15
10
5
0
−300
−200
−100
0
100
200
300
y residual(μm)
G4HitMerge
Entries 461
Mean 4.802
RMS 112.7
Underflow 0
Overflow 2
Overlay
Entries 461
Mean 5.293
RMS 111.1
Underflow 0
Overflow 3

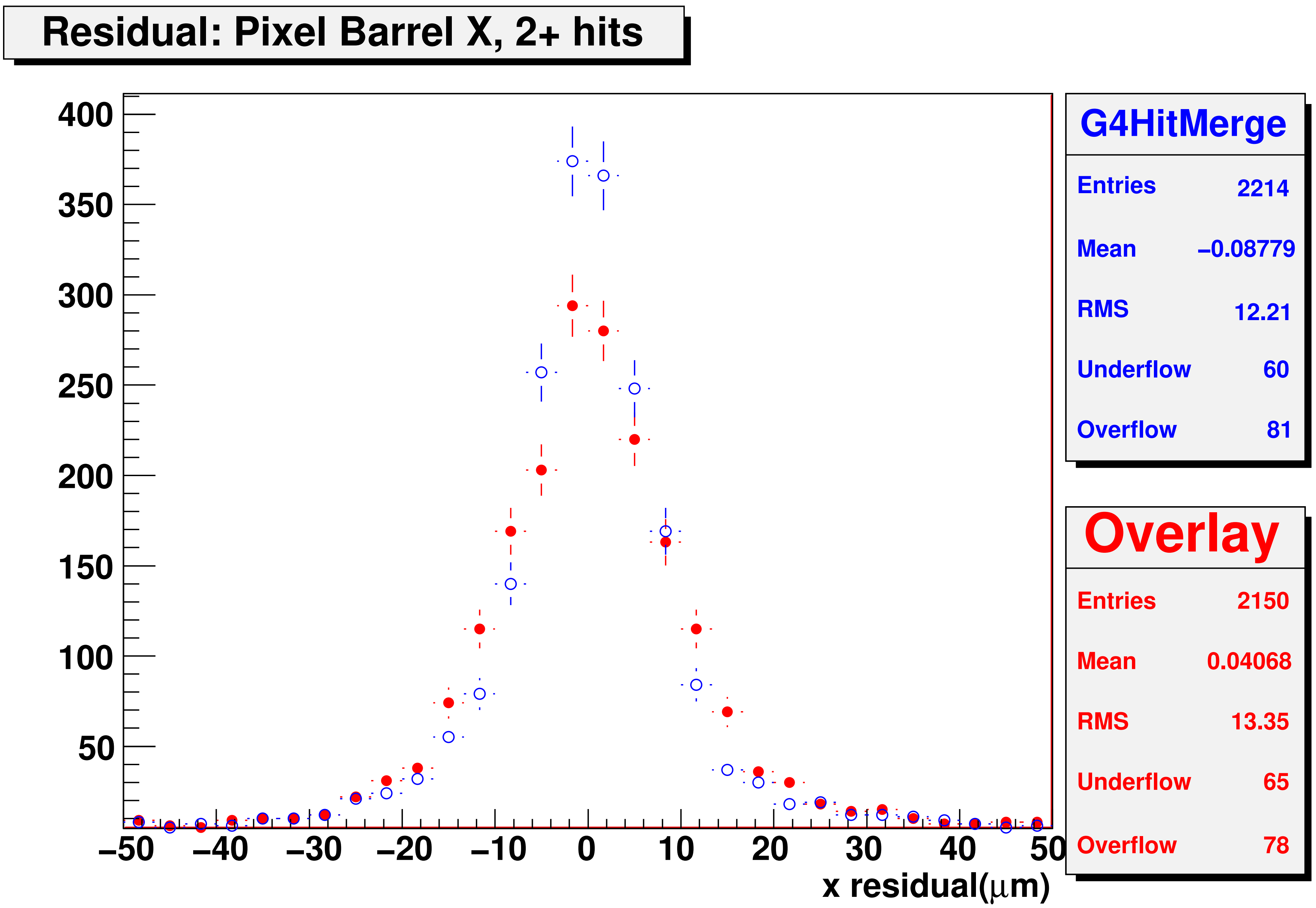


Residual: SCT Barrel X
G4HitMerge
Entries 4829
Mean 0.2217
RMS 22.68
Underflow 84
Overflow 68
Overlay
Entries 4834
Mean −0.2105
RMS 21.87
Underflow 66
Overflow 41
350
300
250
200
150
100
50
−60
−40
−20
0
20
40
60
x residual(μm)

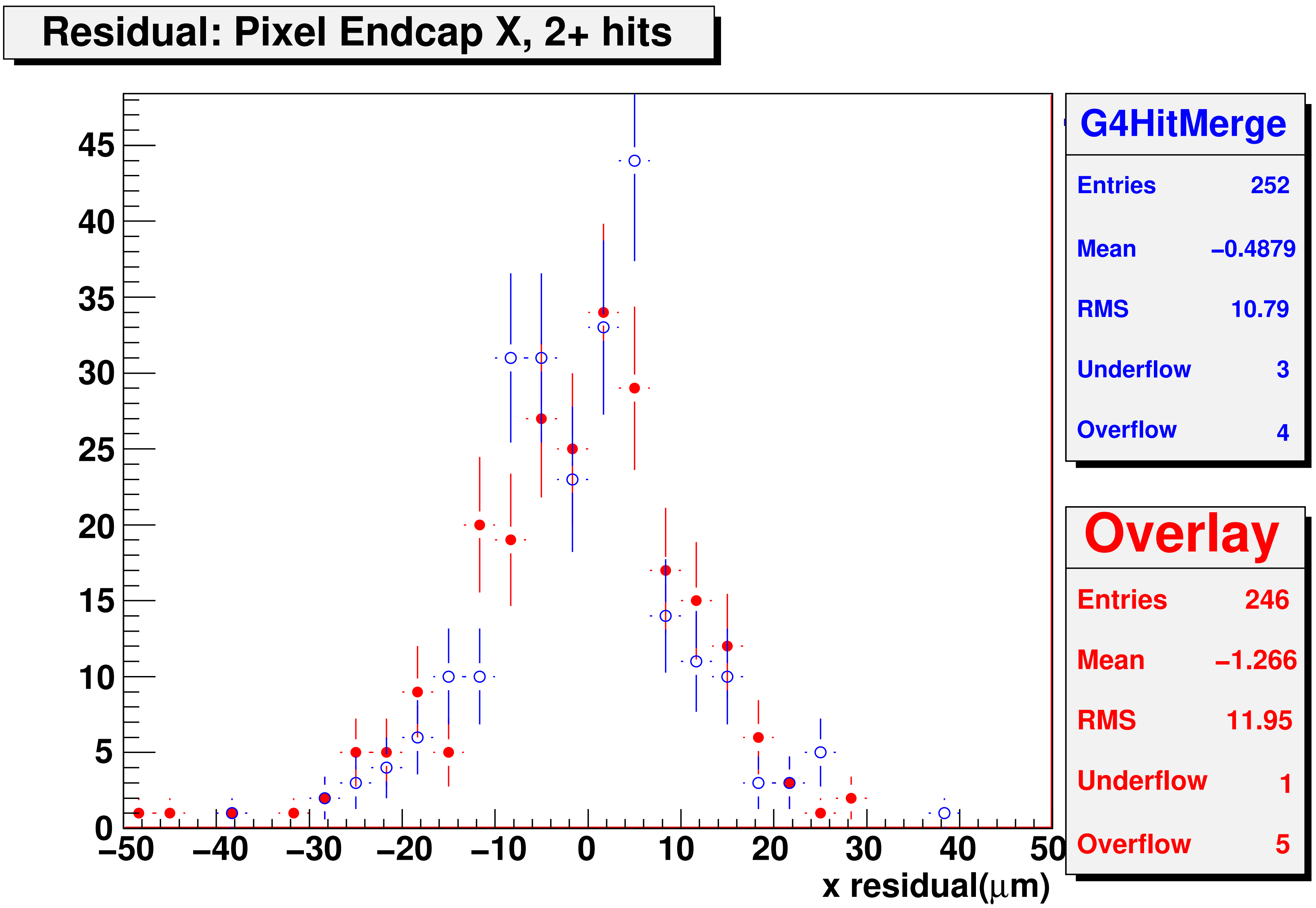


Residual: SCT Endcap X
220
200
180
160
140
120
100
80
60
40
20
−60
−40
−20
0
20
40
60
x residual(μm)
G4HitMerge
Entries 3278
Mean −0.2214
RMS 24.36
Underflow 60
Overflow 62
Overlay
Entries 3289
Mean −0.4661
RMS 23.92
Underflow 57
Overflow 66

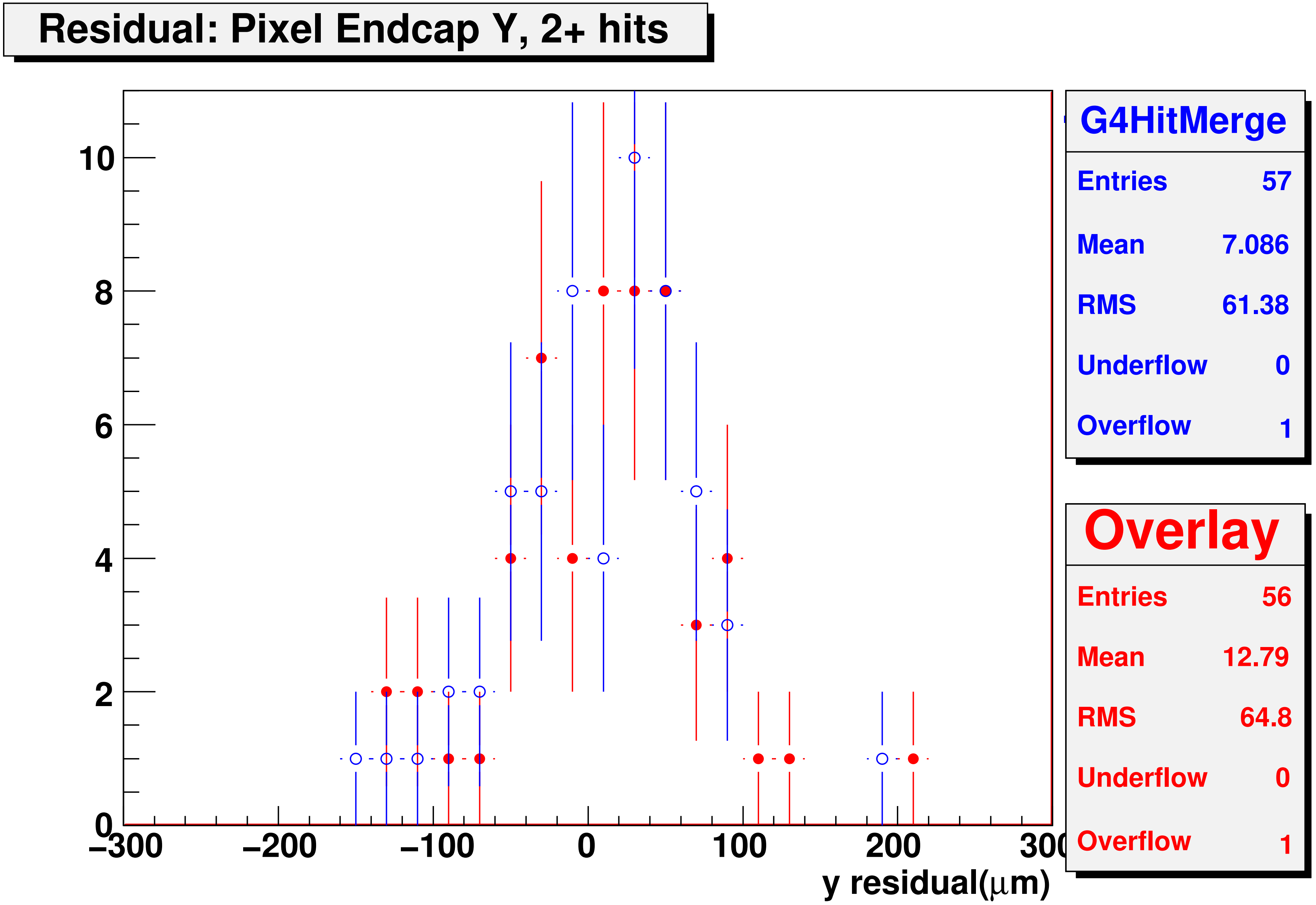

Residual: SCT Barrel X, 1 hit
160
140
120
100
80
60
40
20
−60
−40
−20
0
20
40
60
x residual(μm)
G4HitMerge
Entries 1146
Mean −0.3408
RMS 20.21
Underflow 24
Overflow 20
Overlay
Entries 1815
Mean −1.263
RMS 20.35
Underflow 19
Overflow 19



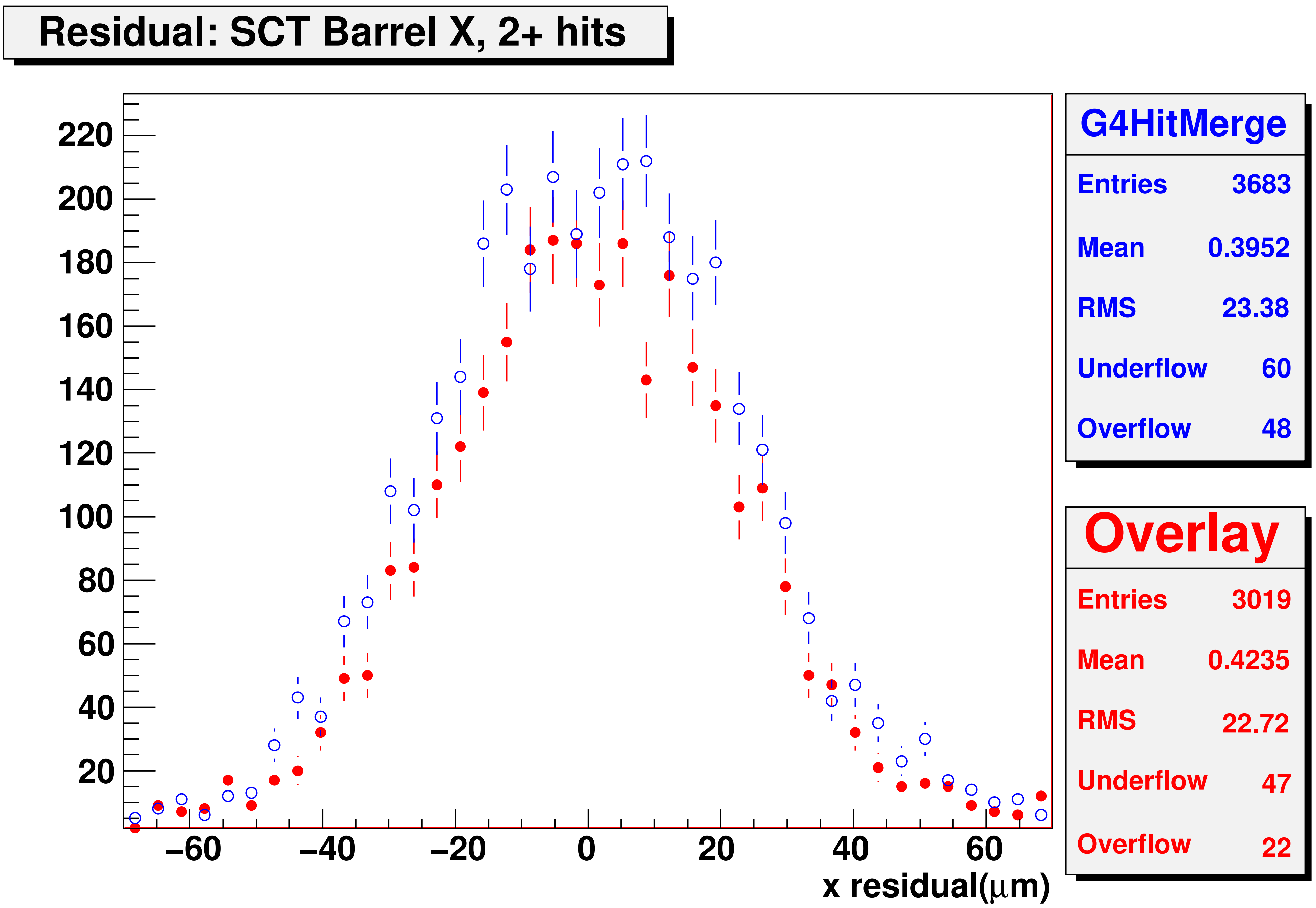
Residual: Pixel Barrel X, 2+ hits
400
350
300
250
200
150
100
50
–50
–40
–30
–20
–10
0
10
20
30
40
50
x residual(μm)
G4HitMerge
Entries 2214
Mean –0.08779
RMS 12.21
Underflow 60
Overflow 81
Overlay
Entries 2150
Mean 0.04068
RMS 13.35
Underflow 65
Overflow 78



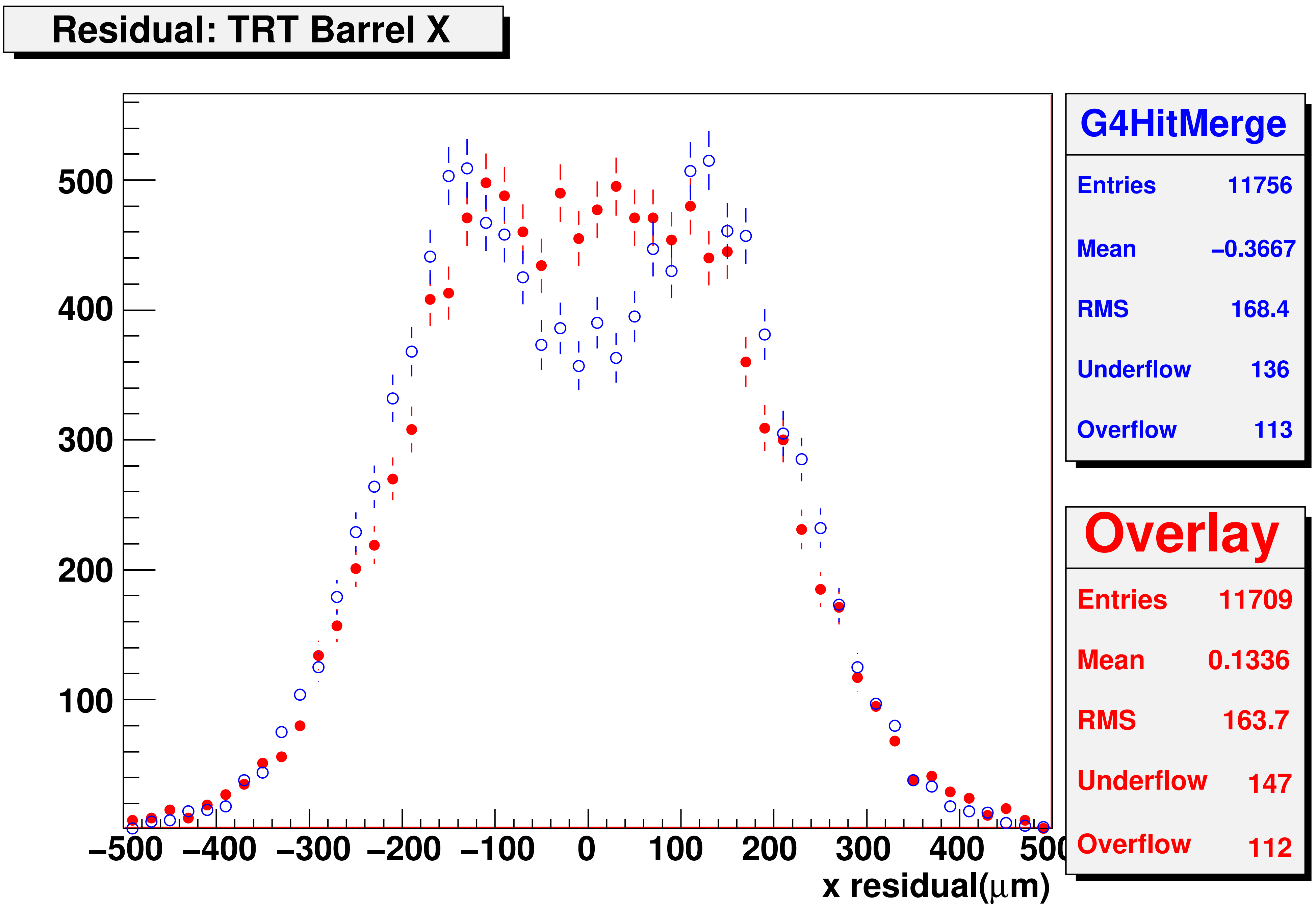
Residual: Pixel Endcap X, 2+ hits
G4HitMerge
Entries 252
Mean −0.4879
RMS 10.79
Underflow 3
Overflow 4
Overlay
Entries 246
Mean −1.266
RMS 11.95
Underflow 1
Overflow 5
0
5
10
15
20
25
30
35
40
45
−50
−40
−30
−20
−10
0
10
20
30
40
50
x residual(μm)

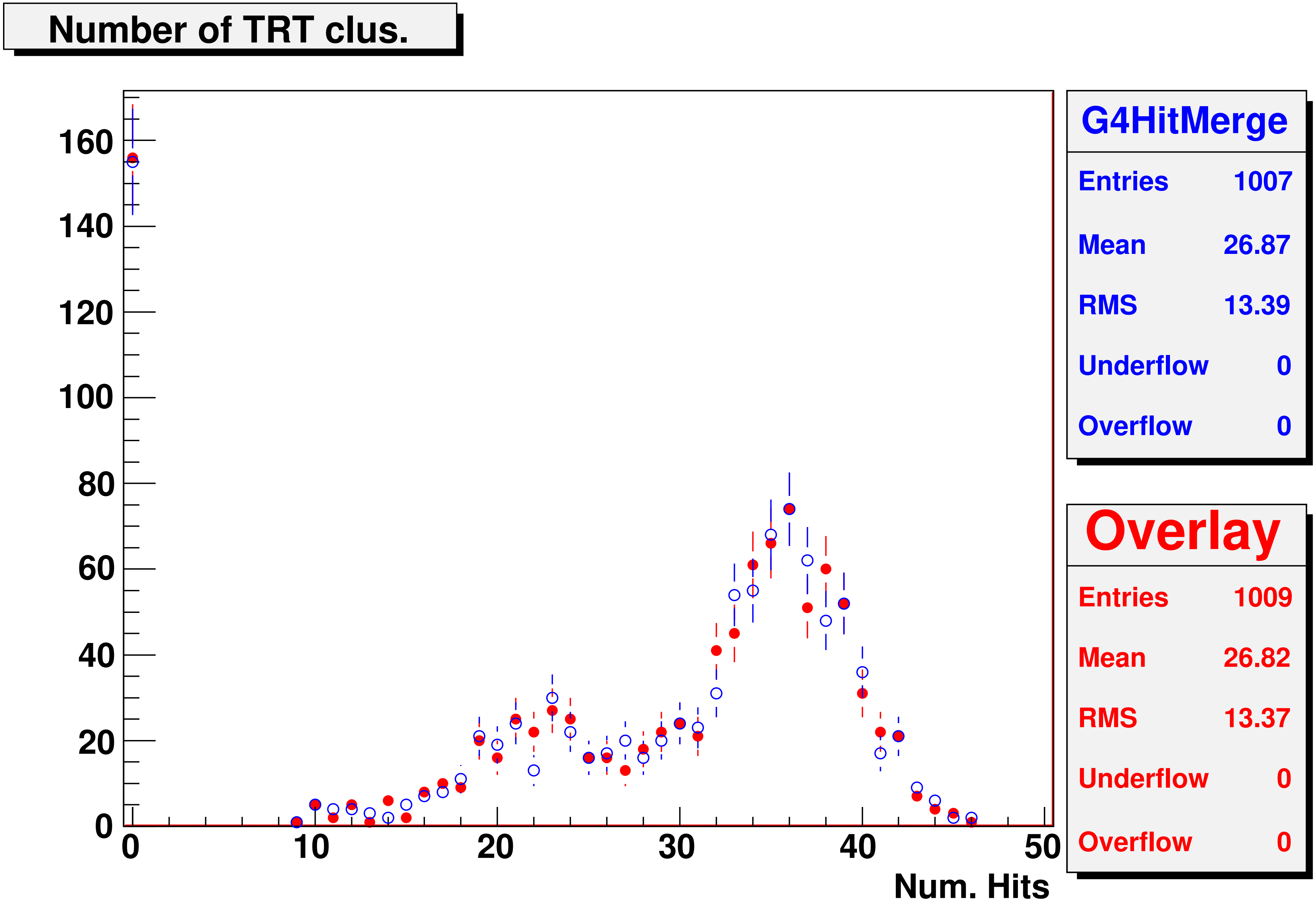


Residual: Pixel Endcap Y, 2+ hits
G4HitMerge
Entries 57
Mean 7.086
RMS 61.38
Underflow 0
Overflow 1
Overlay
Entries 56
Mean 12.79
RMS 64.8
Underflow 0
Overflow 1
0
2
4
6
8
10
−300
−200
−100
0
100
200
300
y residual(μm)

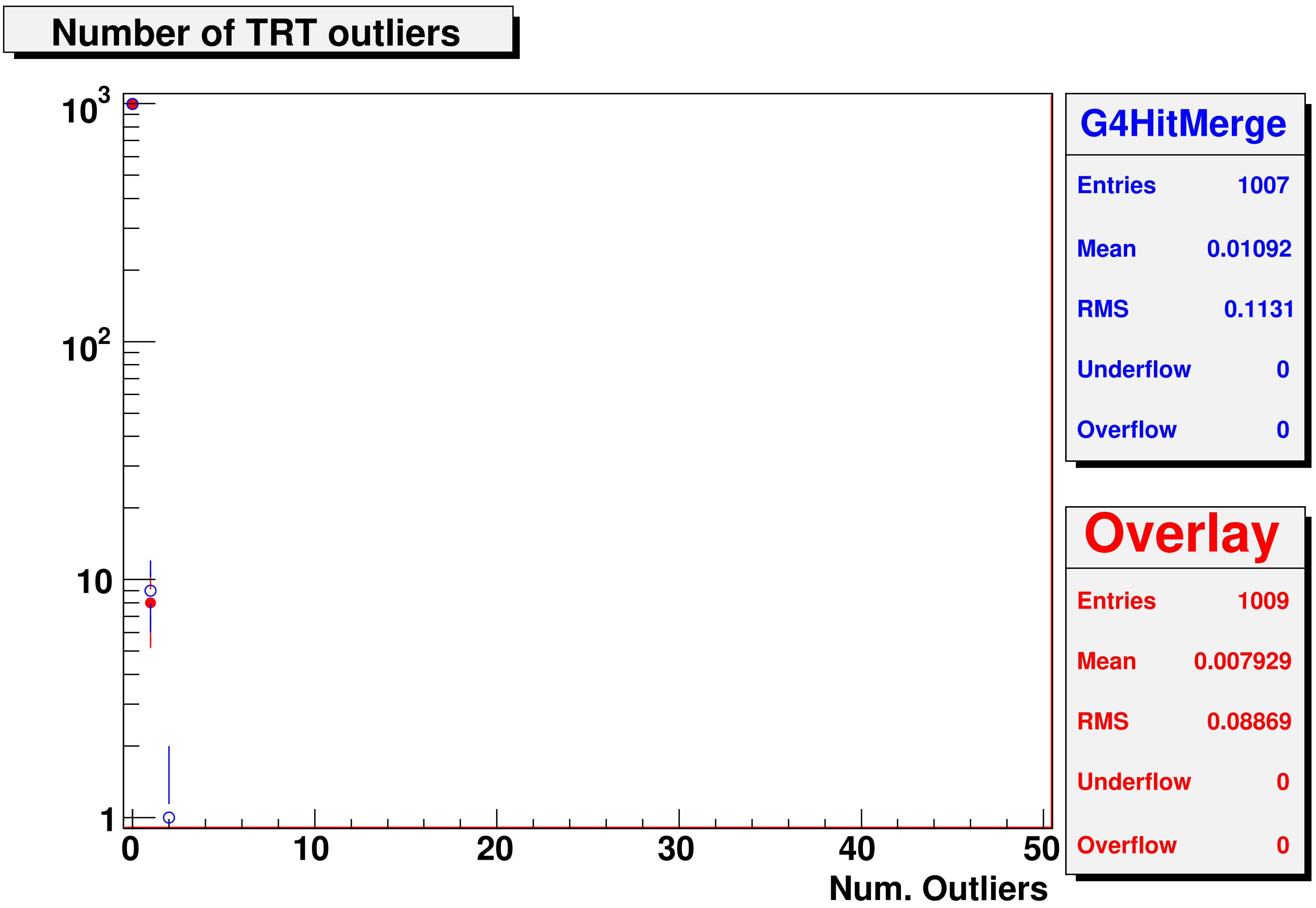


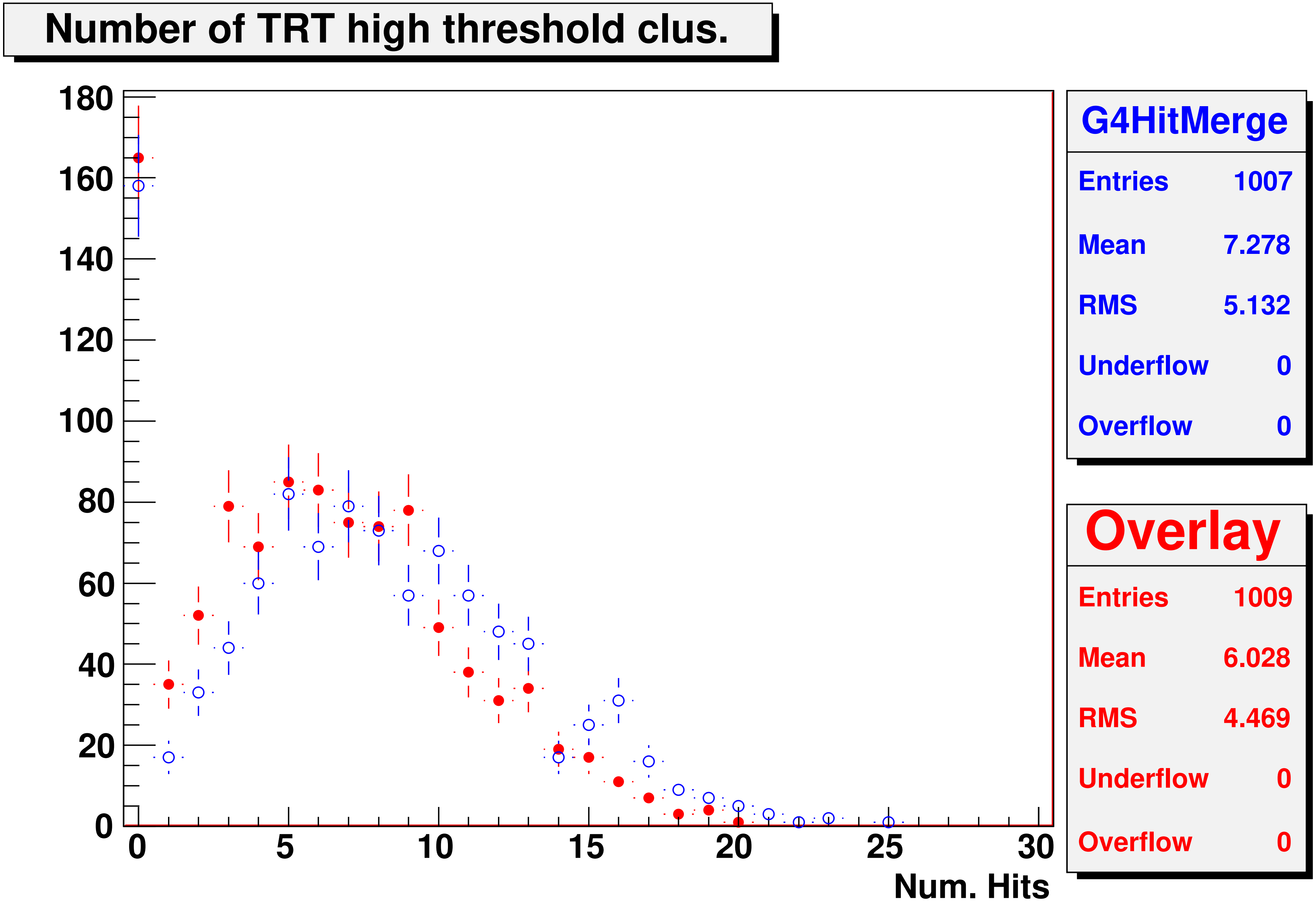
Residual: SCT Barrel X, 2+ hits
220
200
180
160
140
120
100
80
60
40
20
−60
−40
−20
0
20
40
60
x residual(μm)
G4HitMerge
Entries 3683
Mean 0.3952
RMS 23.38
Underflow 60
Overflow 48
Overlay
Entries 3019
Mean 0.4235
RMS 22.72
Underflow 47
Overflow 22


Residual: TRT Barrel X
G4HitMerge
Entries 11756
Mean −0.3667
RMS 168.4
Underflow 136
Overflow 113
Overlay
Entries 11709
Mean 0.1336
RMS 163.7
Underflow 147
Overflow 112
500
400
300
200
100
−500 −400 −300 −200 −100 0 100 200 300 400 500
x residual(μm)

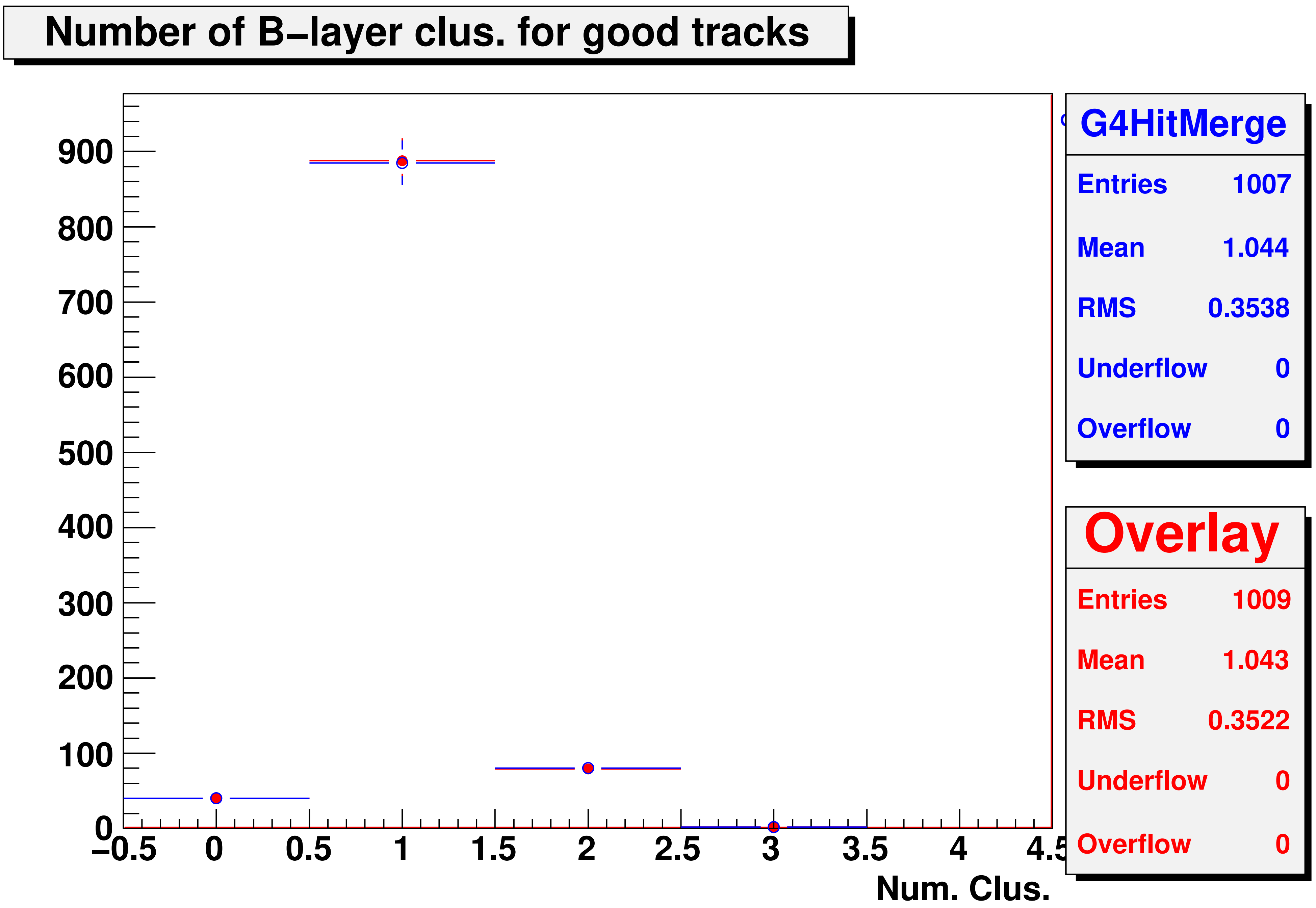


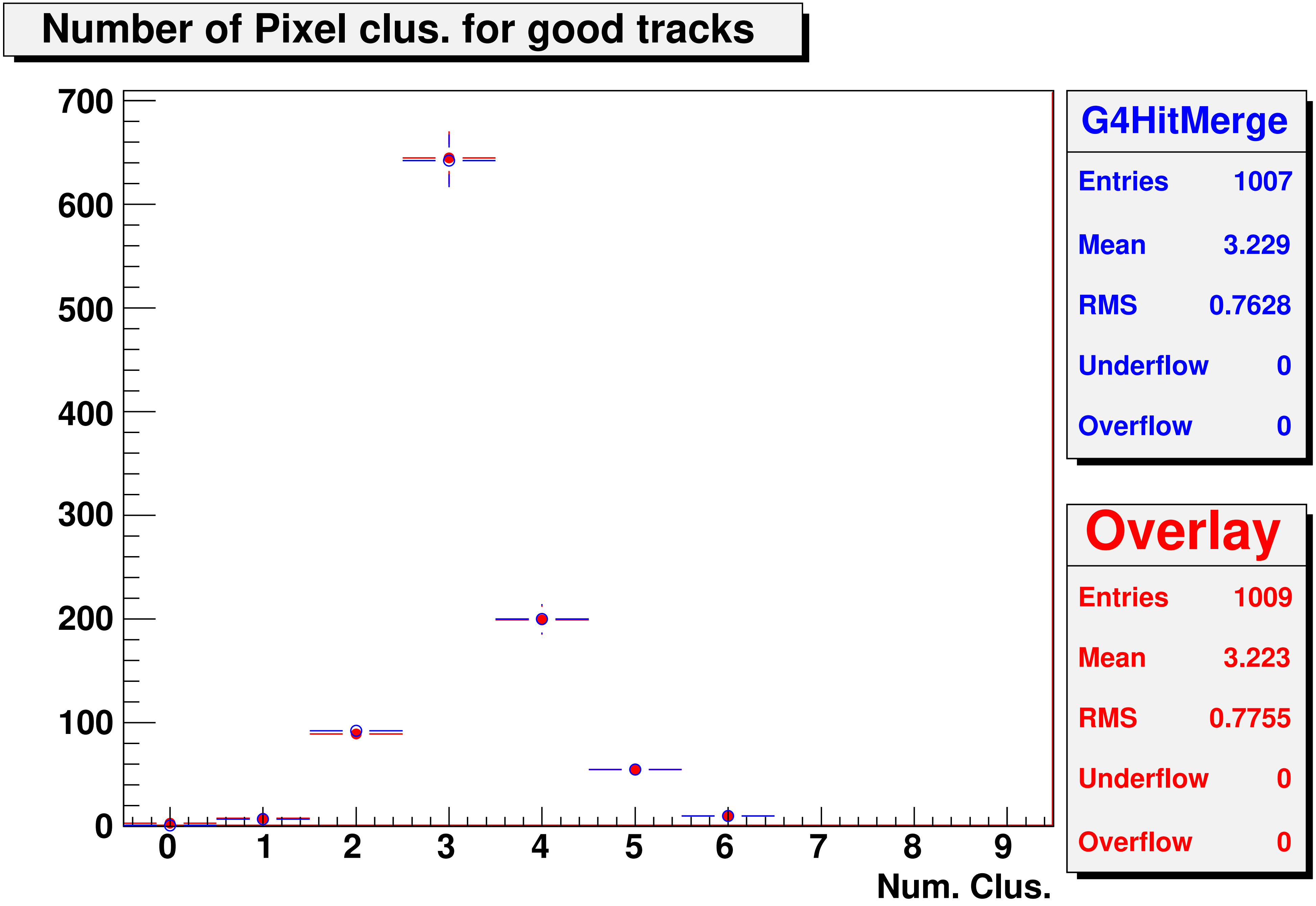
Number of TRT clus.
G4HitMerge
Entries 1007
Mean 26.87
RMS 13.39
Underflow 0
Overflow 0
Overlay
Entries 1009
Mean 26.82
RMS 13.37
Underflow 0
Overflow 0
Num. Hits
0
20
40
60
80
100
120
140
160
10
30
50

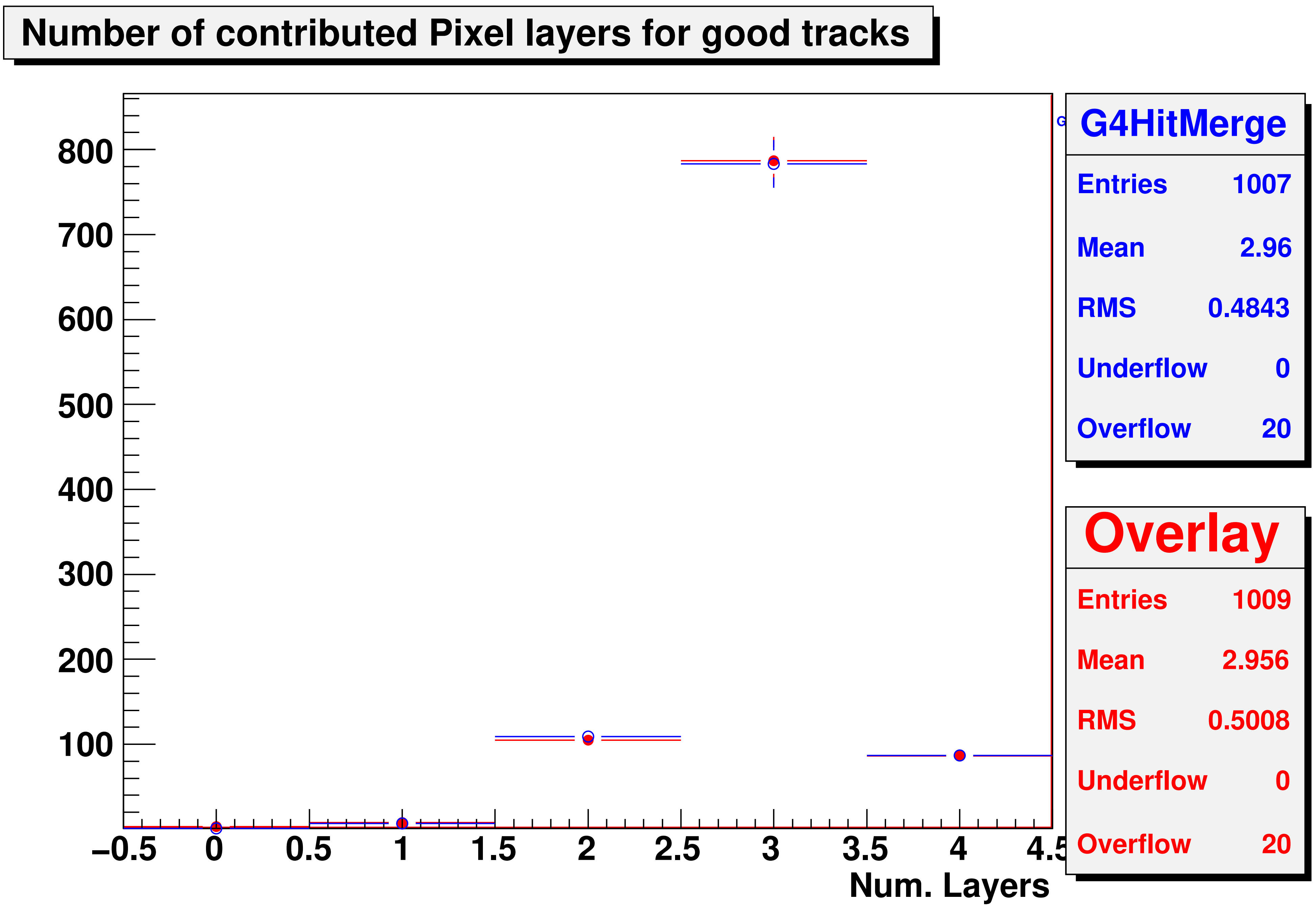

Number of TRT outliers
10^3
10^2
10
1
0
10
20
30
40
50
Num. Outliers
G4HitMerge
Entries 1007
Mean 0.01092
RMS 0.1131
Underflow 0
Overflow 0
Overlay
Entries 1009
Mean 0.007929
RMS 0.08869
Underflow 0
Overflow 0



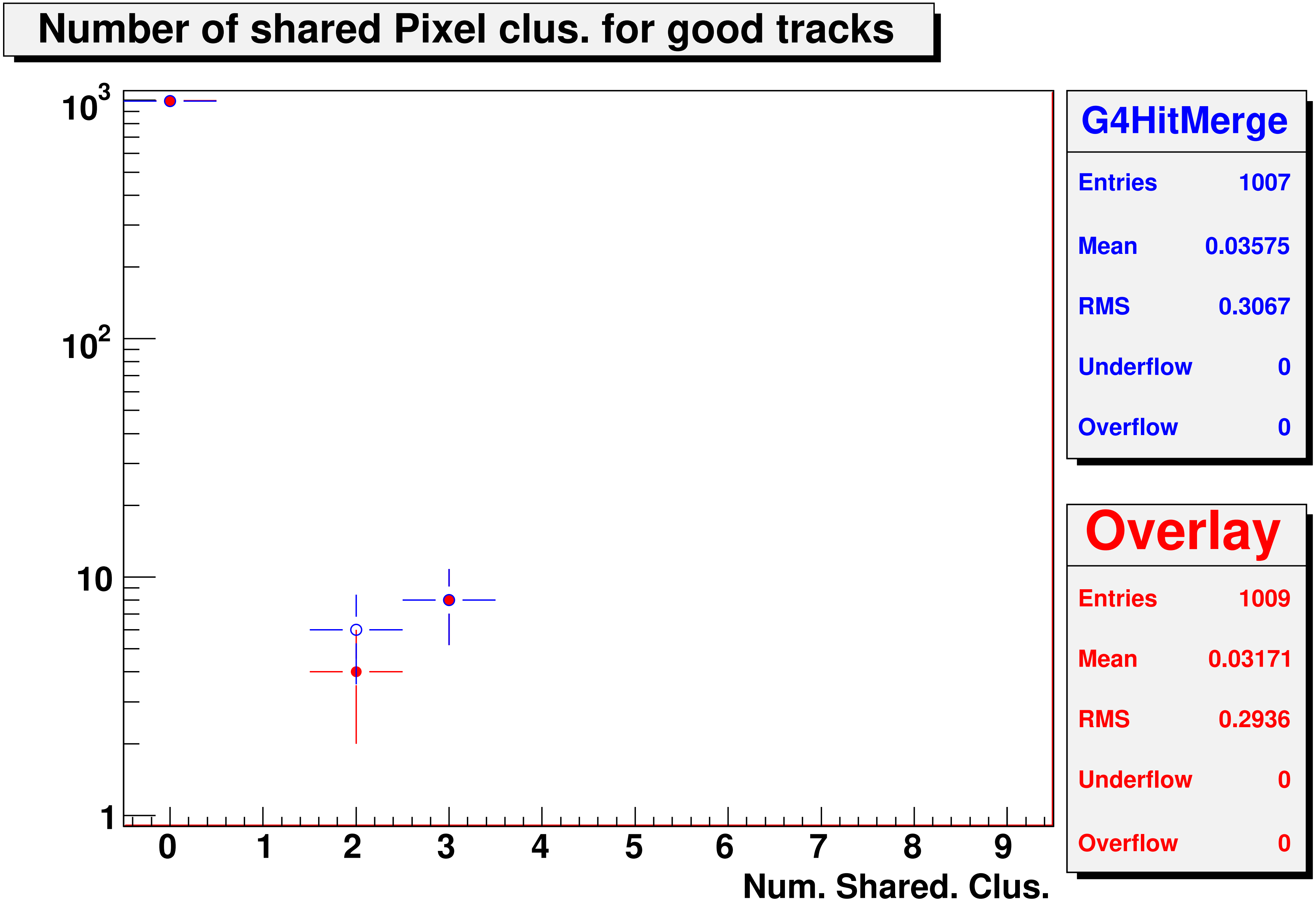
Number of TRT high threshold clus.
G4HitMerge
Entries 1007
Mean 7.278
RMS 5.132
Underflow 0
Overflow 0
Overlay
Entries 1009
Mean 6.028
RMS 4.469
Underflow 0
Overflow 0
Num. Hits
0
5
10
15
20
25
30
180
160
140
120
100
80
60
40
20
0


Number of B–layer clus. for good tracks
900
800
700
600
500
400
300
200
100
0
–0.5
0
0.5
1
1.5
2
2.5
3
3.5
4
4.5
Num. Clus.
G4HitMerge
Entries 1007
Mean 1.044
RMS 0.3538
Underflow 0
Overflow 0
Overlay
Entries 1009
Mean 1.043
RMS 0.3522
Underflow 0
Overflow 0

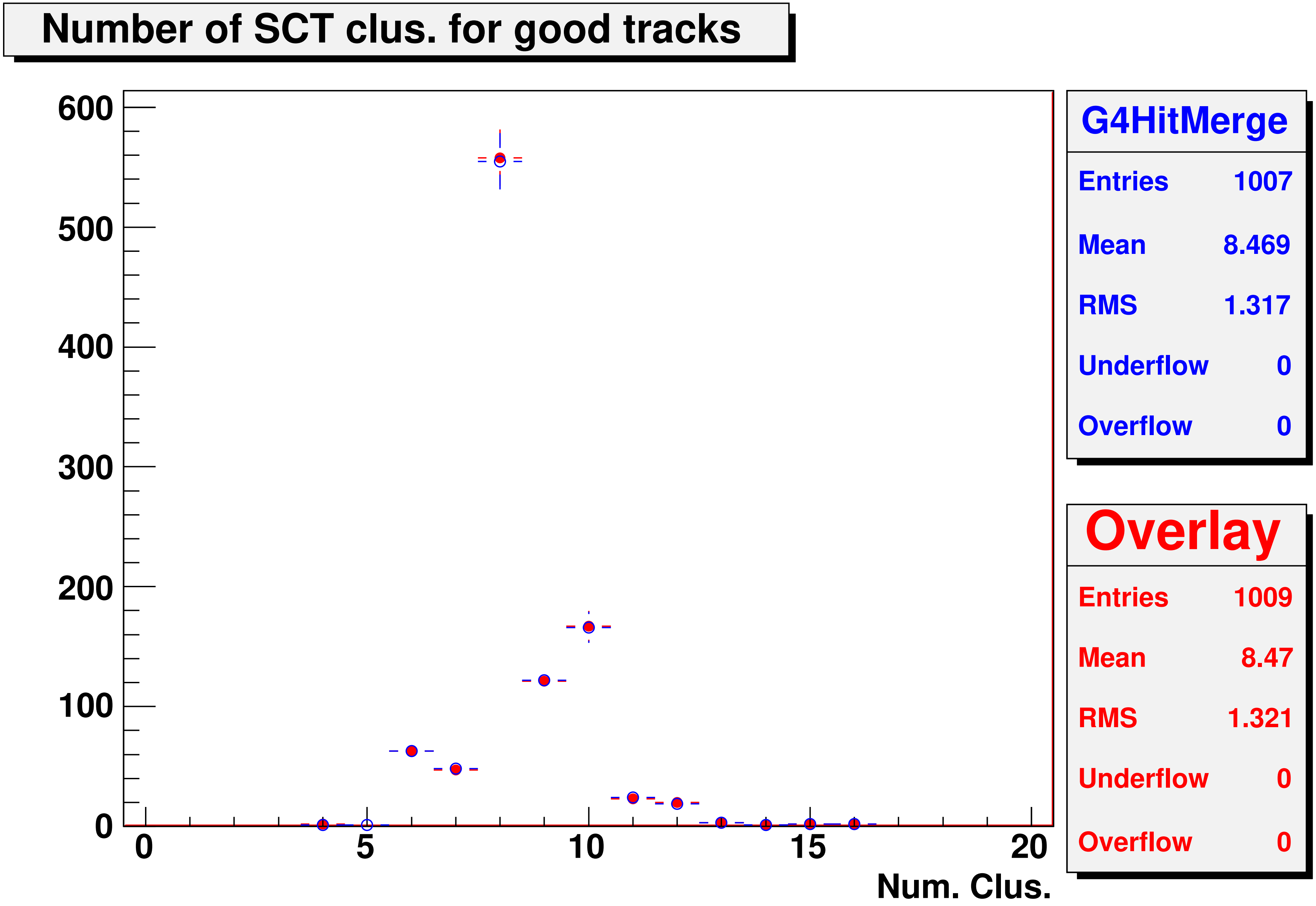

Number of Pixel clus. for good tracks
700
600
500
400
300
200
100
0
0
1
2
3
4
5
6
7
8
9
Num. Clus.
G4HitMerge
Entries 1007
Mean 3.229
RMS 0.7628
Underflow 0
Overflow 0
Overlay
Entries 1009
Mean 3.223
RMS 0.7755
Underflow 0
Overflow 0



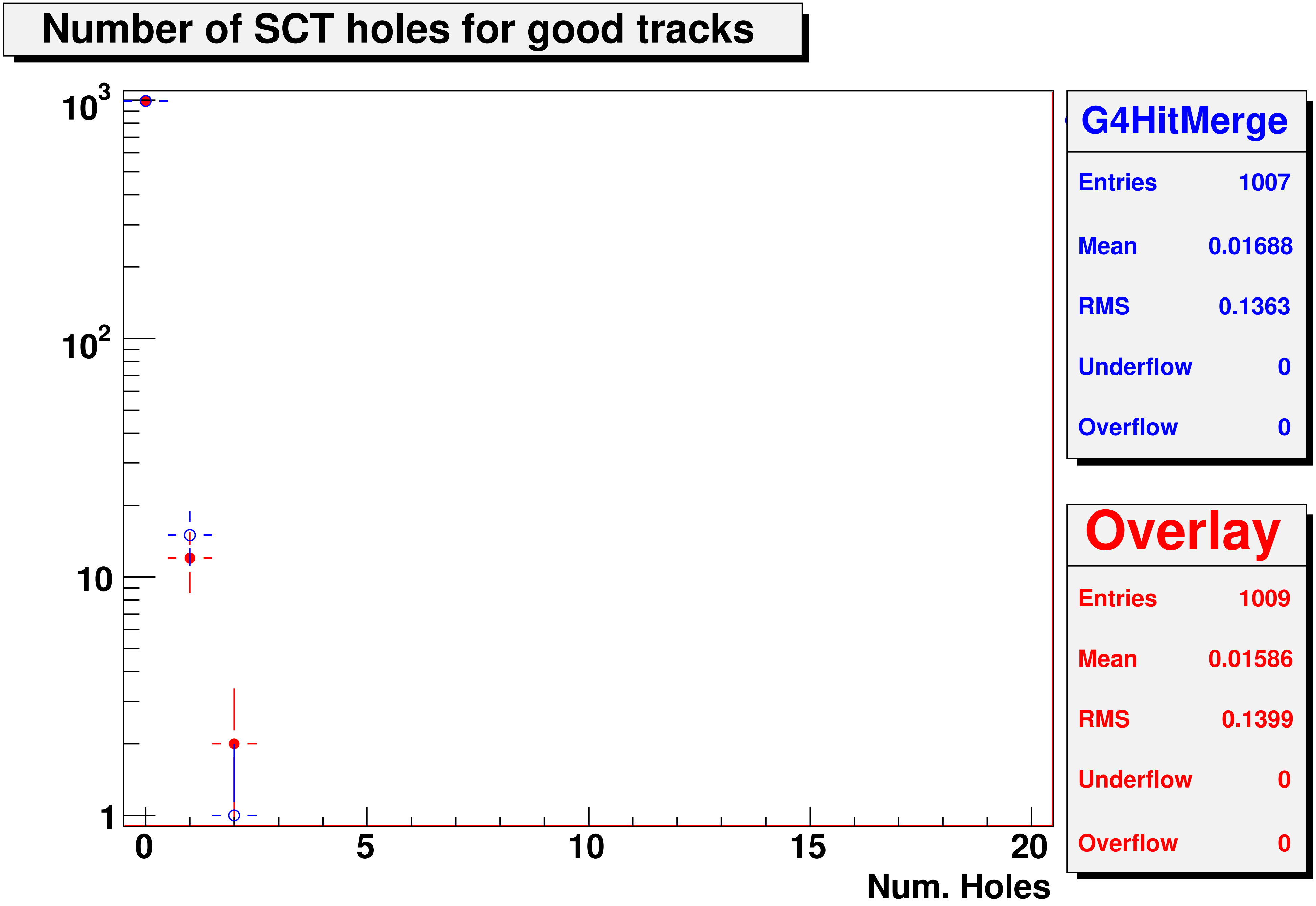
Number of contributed Pixel layers for good tracks
G4HitMerge
Entries 1007
Mean 2.96
RMS 0.4843
Underflow 0
Overflow 20
Overlay
Entries 1009
Mean 2.956
RMS 0.5008
Underflow 0
Overflow 20
Num. Layers



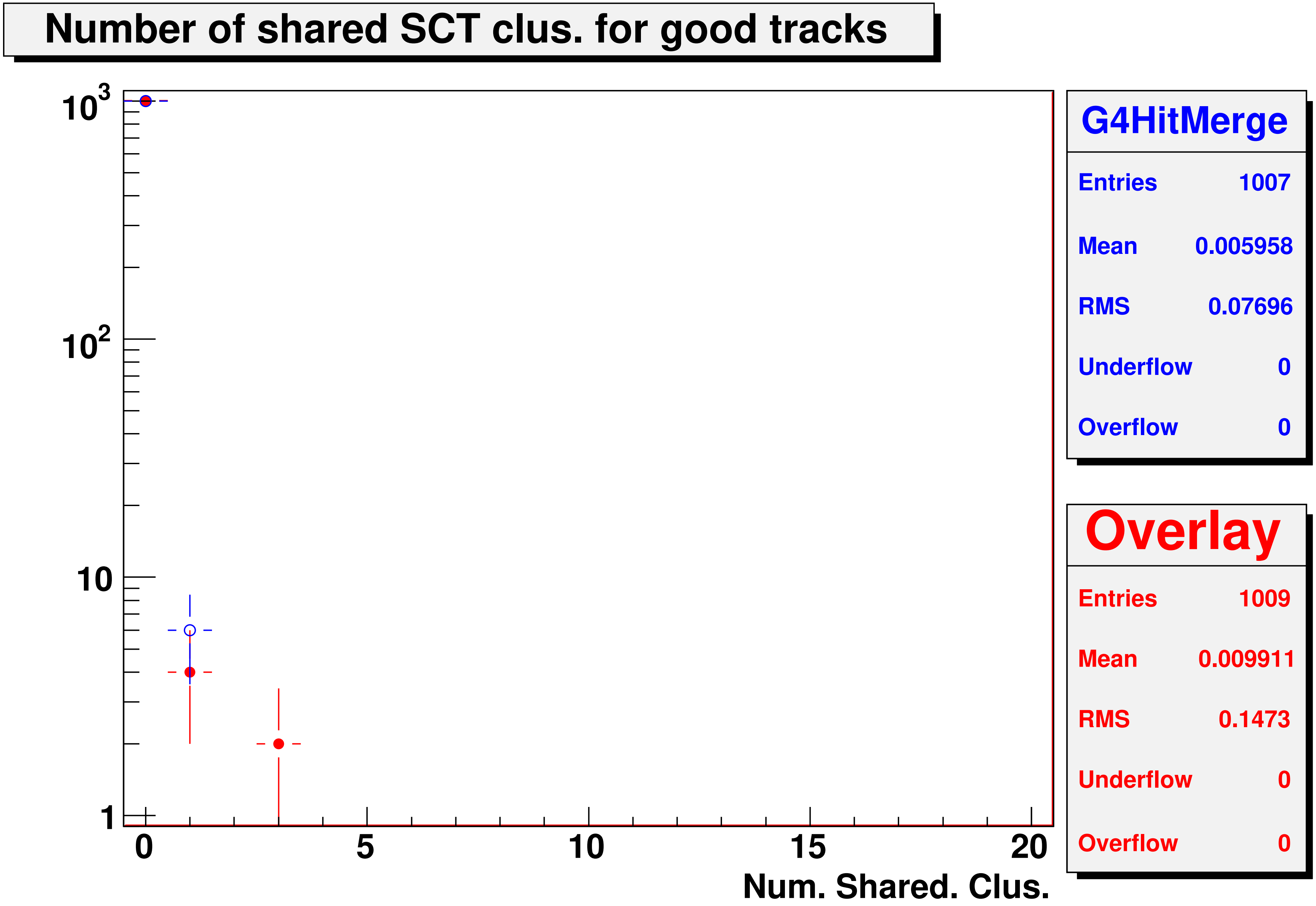
Number of shared Pixel clus. for good tracks
G4HitMerge
Entries 1007
Mean 0.03575
RMS 0.3067
Underflow 0
Overflow 0
Overlay
Entries 1009
Mean 0.03171
RMS 0.2936
Underflow 0
Overflow 0
Num. Shared. Clus.



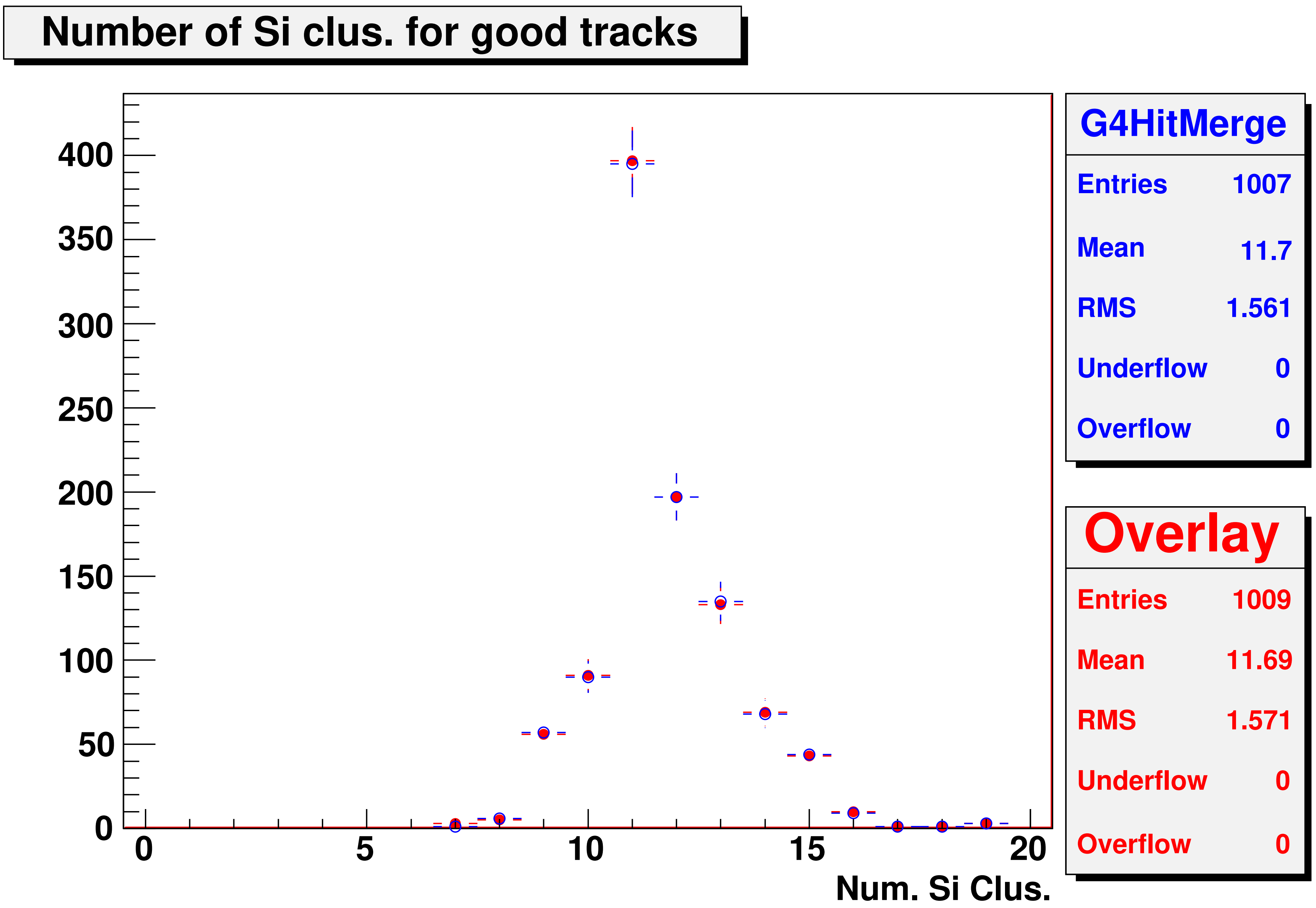
Number of SCT clus. for good tracks
600
500
400
300
200
100
0
0
5
10
15
20
Num. Clus.
G4HitMerge
Entries 1007
Mean 8.469
RMS 1.317
Underflow 0
Overflow 0
Overlay
Entries 1009
Mean 8.47
RMS 1.321
Underflow 0
Overflow 0



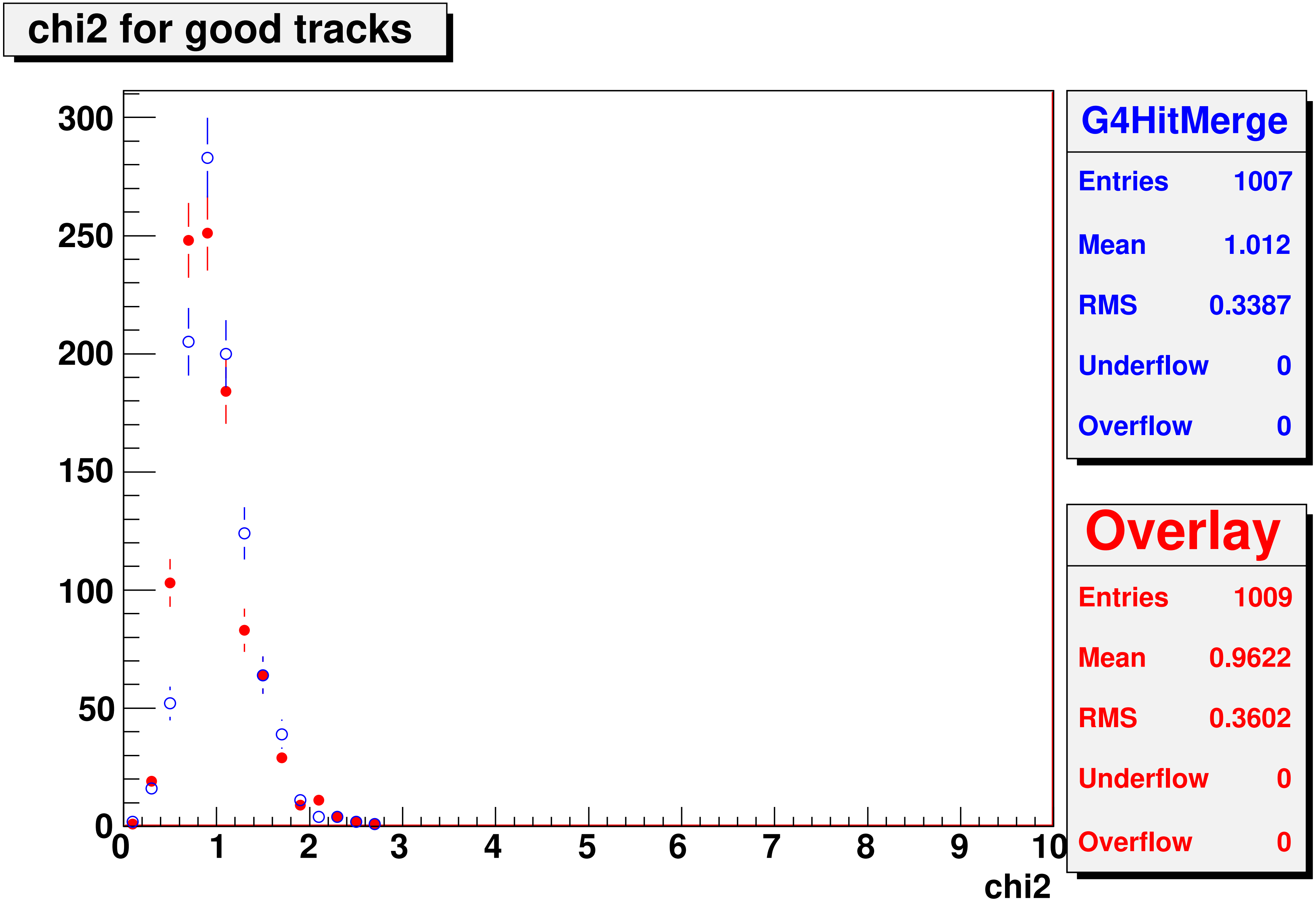
Number of SCT holes for good tracks
10^3
10^2
10
1
0
5
10
15
20
Num. Holes
G4HitMerge
Entries 1007
Mean 0.01688
RMS 0.1363
Underflow 0
Overflow 0
Overlay
Entries 1009
Mean 0.01586
RMS 0.1399
Underflow 0
Overflow 0

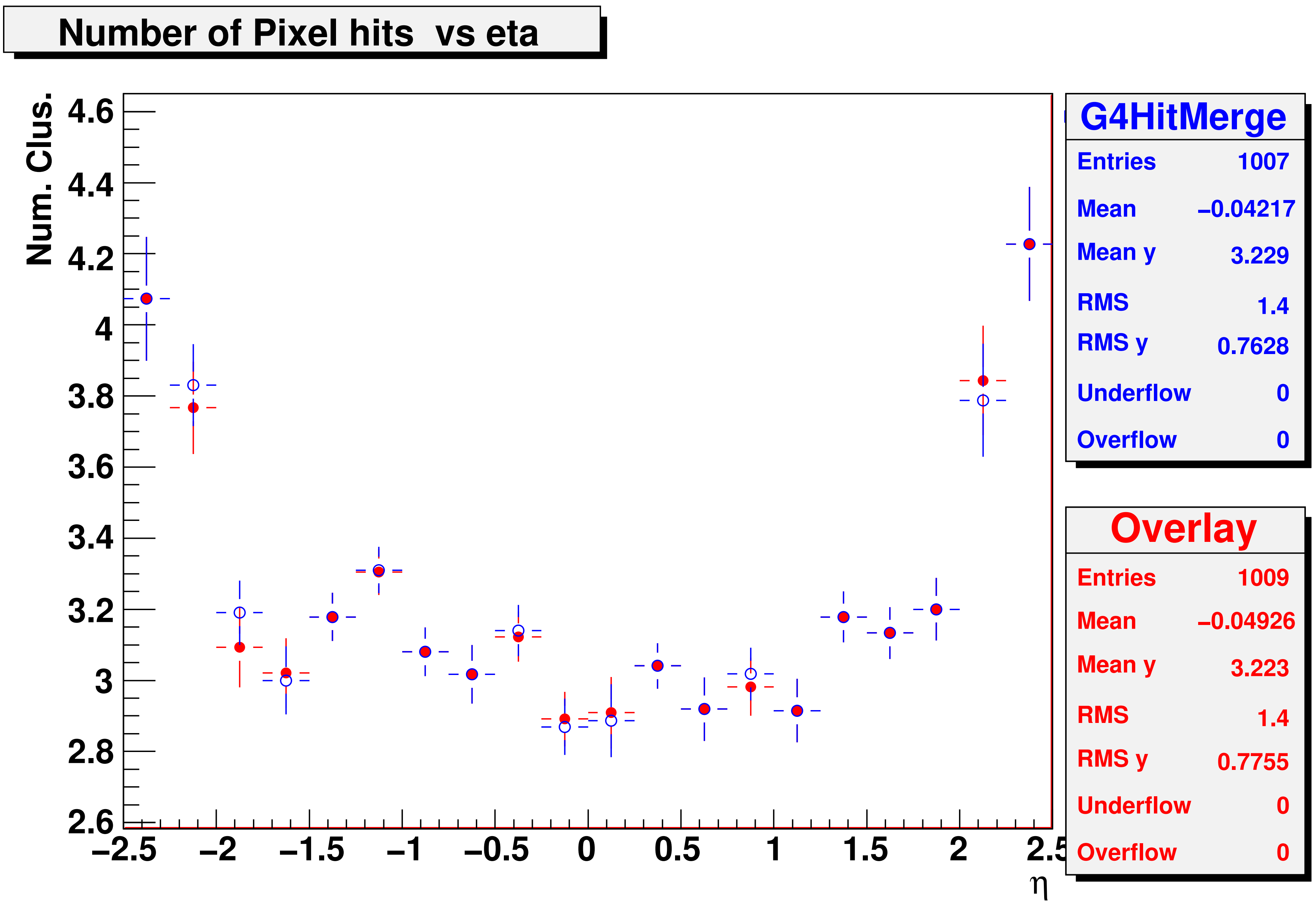


Number of shared SCT clus. for good tracks
10^3
10^2
10
1
0
5
10
15
20
Num. Shared. Clus.
G4HitMerge
Entries 1007
Mean 0.005958
RMS 0.07696
Underflow 0
Overflow 0
Overlay
Entries 1009
Mean 0.009911
RMS 0.1473
Underflow 0
Overflow 0

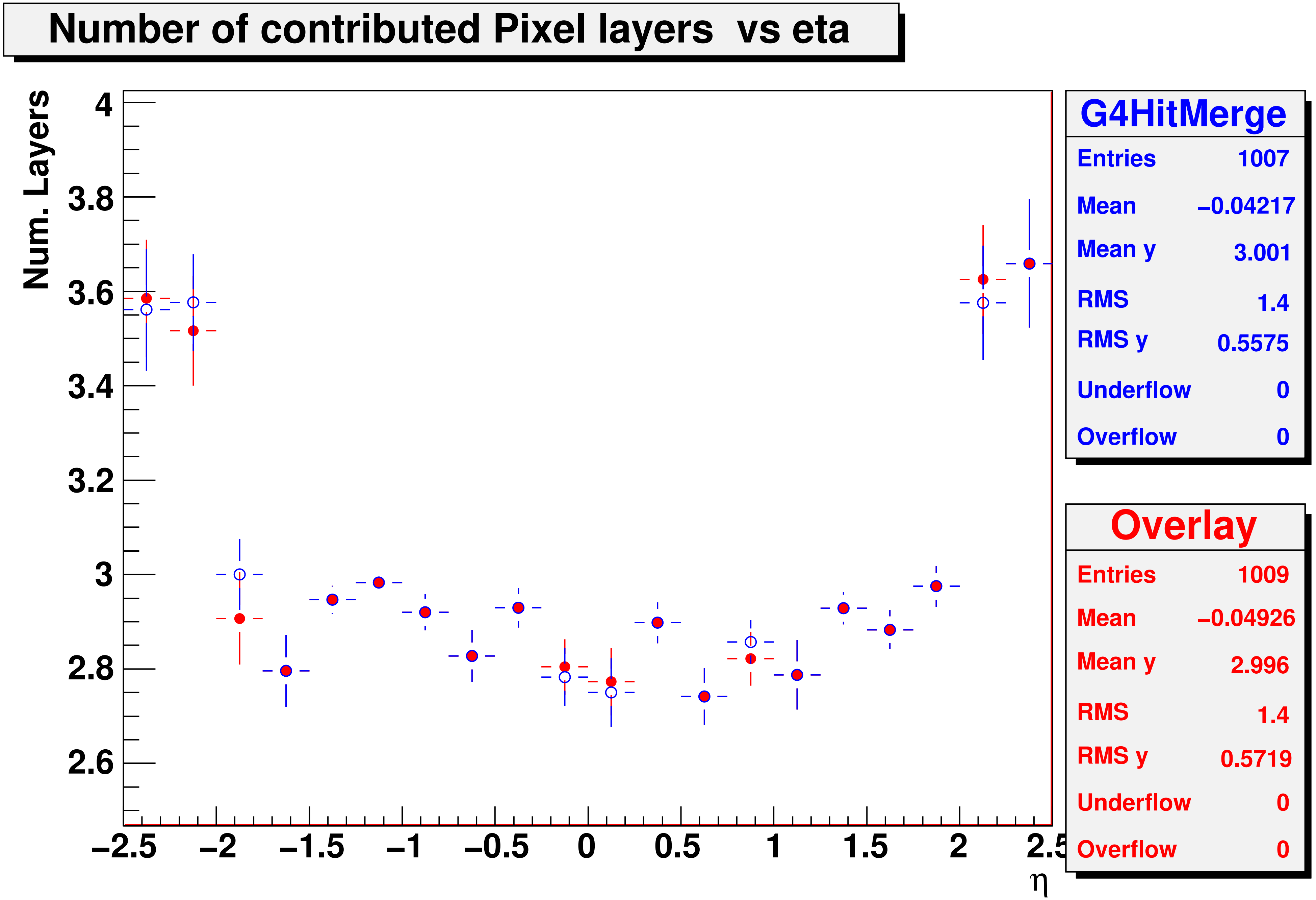


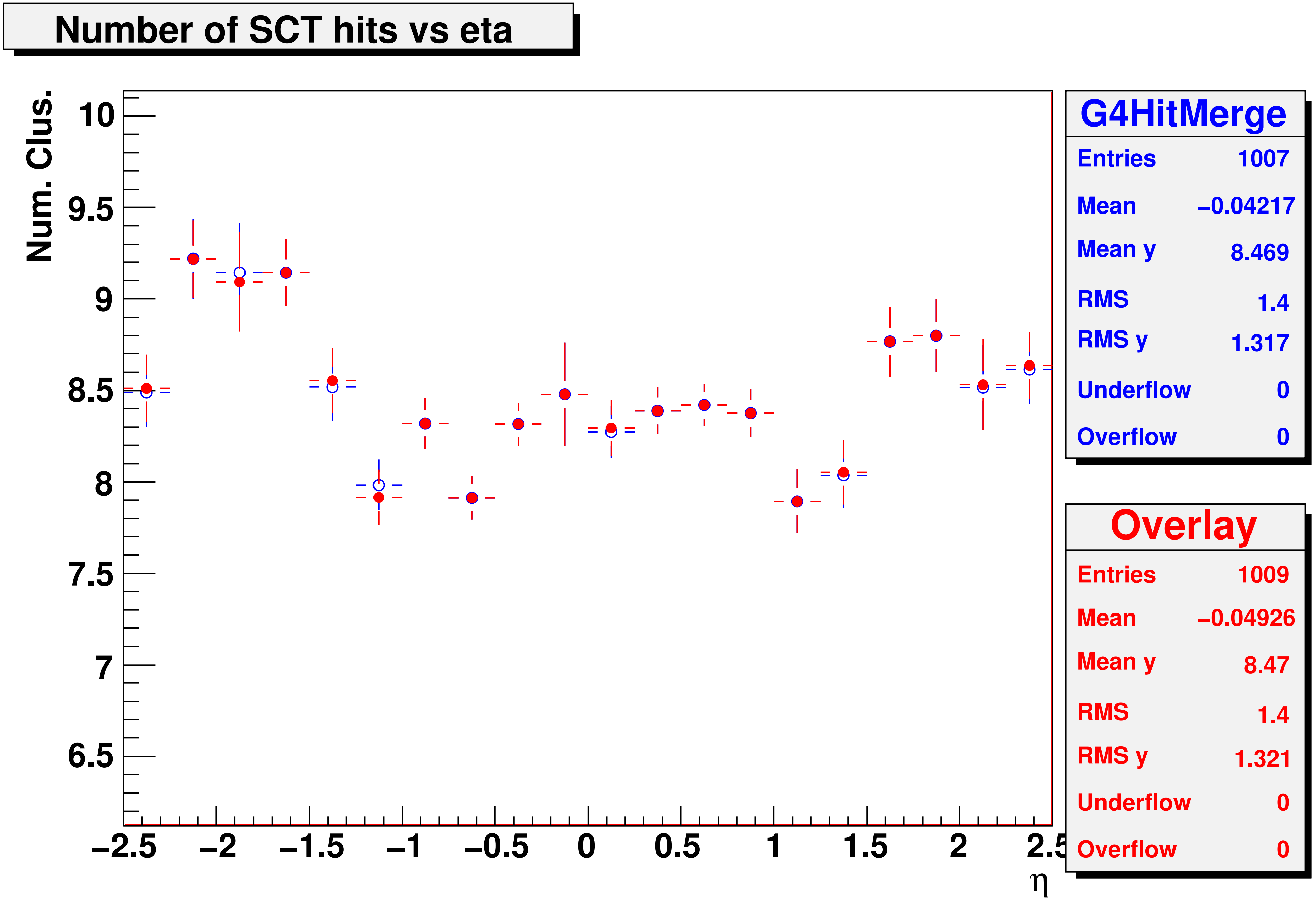
Number of Si clus. for good tracks
400
350
300
250
200
150
100
50
0
0
5
10
15
20
Num. Si Clus.
G4HitMerge
Entries 1007
Mean 11.7
RMS 1.561
Underflow 0
Overflow 0
Overlay
Entries 1009
Mean 11.69
RMS 1.571
Underflow 0
Overflow 0


chi2 for good tracks
300
250
200
150
100
50
0
0
1
2
3
4
5
6
7
8
9
10
chi2
G4HitMerge
Entries 1007
Mean 1.012
RMS 0.3387
Underflow 0
Overflow 0
Overlay
Entries 1009
Mean 0.9622
RMS 0.3602
Underflow 0
Overflow 0

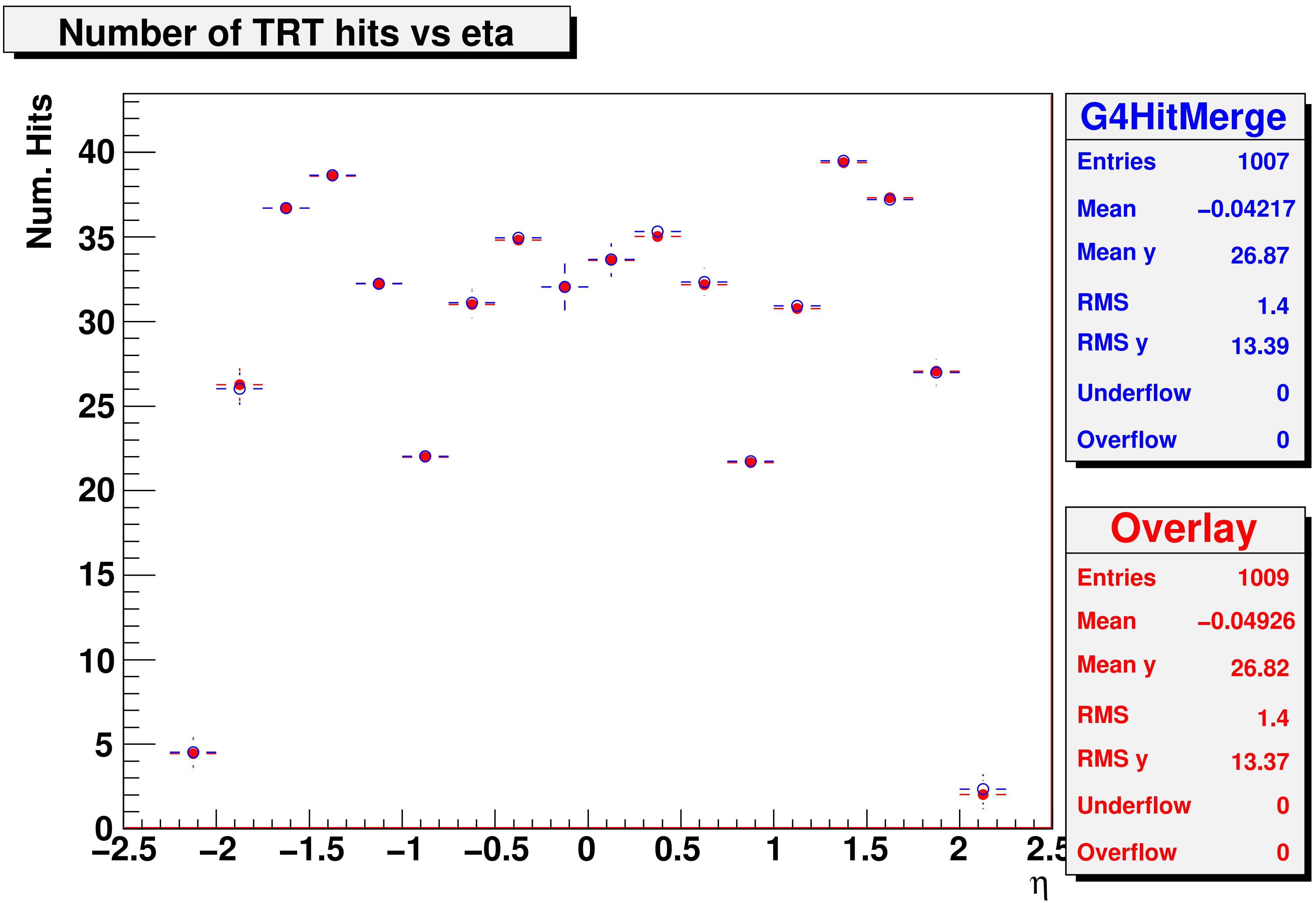


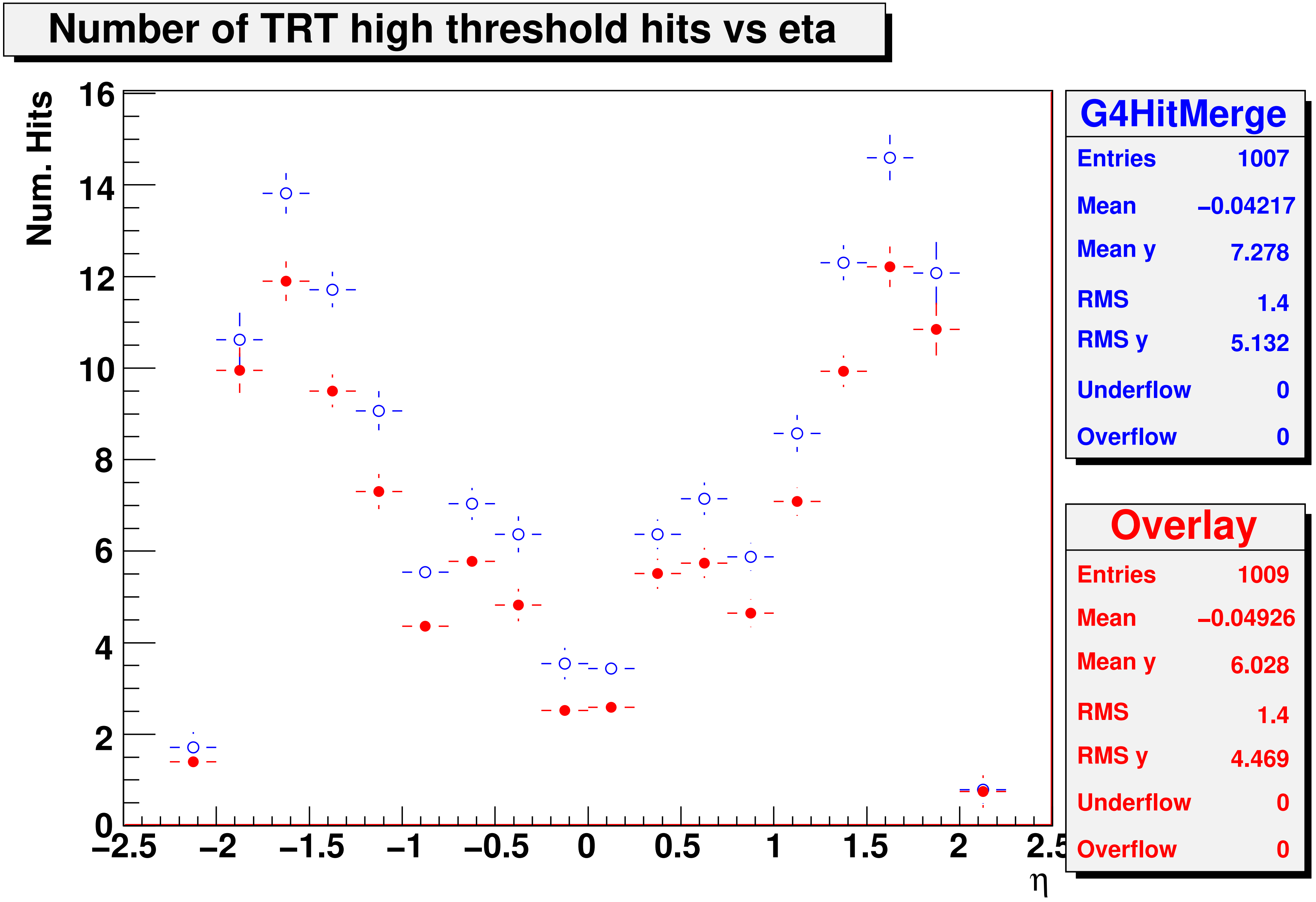
Number of Pixel hits vs eta
Num. Clus.
4.6
4.4
4.2
4
3.8
3.6
3.4
3.2
3
2.8
2.6
−2.5
−2
−1.5
−1
−0.5
0
0.5
1
1.5
2
2.5
η
G4HitMerge
Entries 1007
Mean −0.04217
Mean y 3.229
RMS 1.4
RMS y 0.7628
Underflow 0
Overflow 0
Overlay
Entries 1009
Mean −0.04926
Mean y 3.223
RMS 1.4
RMS y 0.7755
Underflow 0
Overflow 0


Number of contributed Pixel layers vs eta
Num. Layers
4
3.8
3.6
3.4
3.2
3
2.8
2.6
–2.5
–2
–1.5
–1
–0.5
0
0.5
1
1.5
2
2.5
η
G4HitMerge
Entries 1007
Mean –0.04217
Mean y 3.001
RMS 1.4
RMS y 0.5575
Underflow 0
Overflow 0
Overlay
Entries 1009
Mean –0.04926
Mean y 2.996
RMS 1.4
RMS y 0.5719
Underflow 0
Overflow 0



Number of SCT hits vs eta
Num. Clus.
10
9.5
9
8.5
8
7.5
7
6.5
−2.5
−2
−1.5
−1
−0.5
0
0.5
1
1.5
2
2.5
η
G4HitMerge
Entries 1007
Mean −0.04217
Mean y 8.469
RMS 1.4
RMS y 1.317
Underflow 0
Overflow 0
Overlay
Entries 1009
Mean −0.04926
Mean y 8.47
RMS 1.4
RMS y 1.321
Underflow 0
Overflow 0


Number of TRT hits vs eta
Num. Hits
40
35
30
25
20
15
10
5
0
−2.5
−2
−1.5
−1
−0.5
0
0.5
1
1.5
2
2.5
η
G4HitMerge
Entries 1007
Mean −0.04217
Mean y 26.87
RMS 1.4
RMS y 13.39
Underflow 0
Overflow 0
Overlay
Entries 1009
Mean −0.04926
Mean y 26.82
RMS 1.4
RMS y 13.37
Underflow 0
Overflow 0



Number of TRT high threshold hits vs eta
Num. Hits
0
2
4
6
8
10
12
14
16
−2.5
−2
−1.5
−1
−0.5
0
0.5
1
1.5
2
2.5
η
G4HitMerge
Entries 1007
Mean −0.04217
Mean y 7.278
RMS 1.4
RMS y 5.132
Underflow 0
Overflow 0
Overlay
Entries 1009
Mean −0.04926
Mean y 6.028
RMS 1.4
RMS y 4.469
Underflow 0
Overflow 0