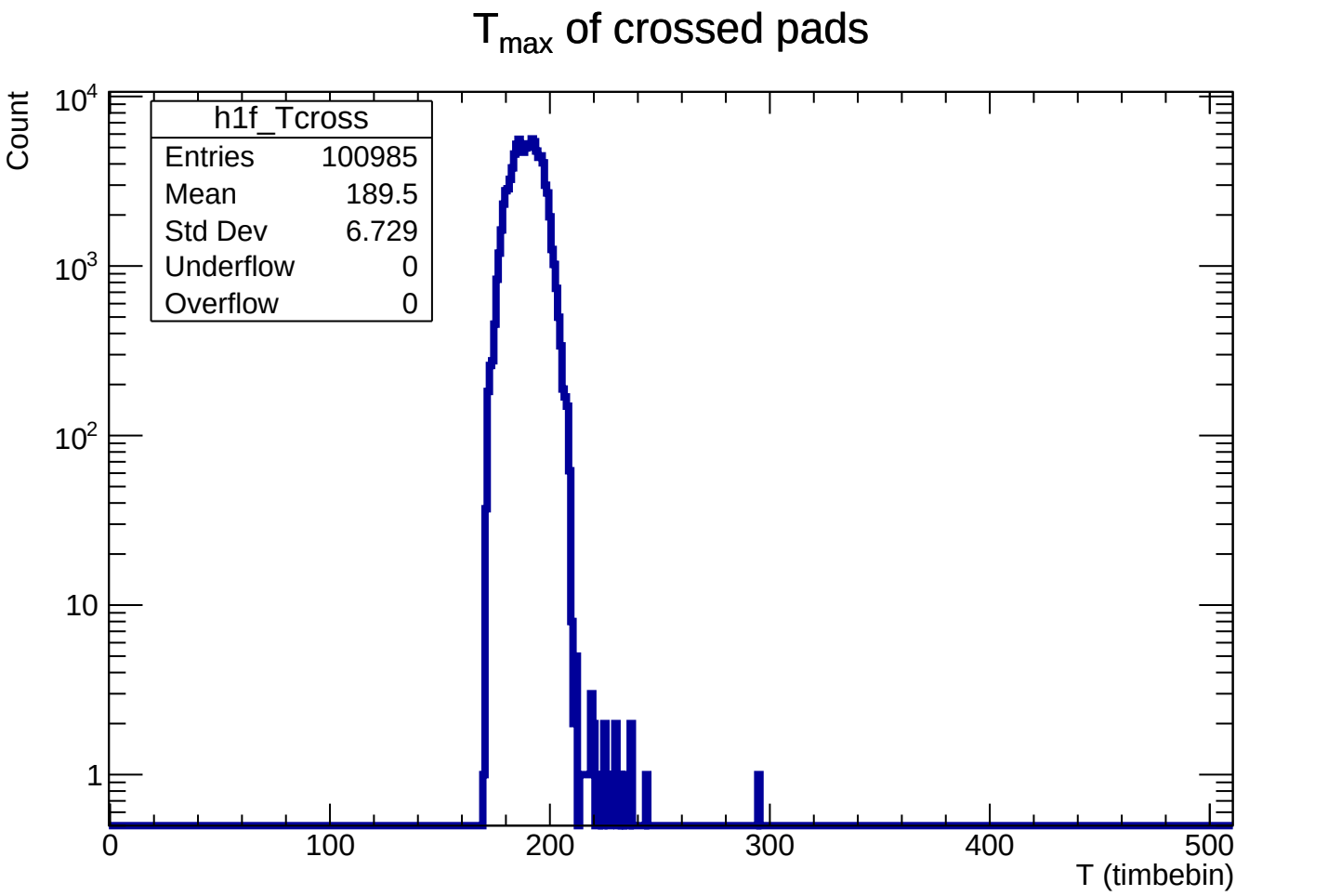
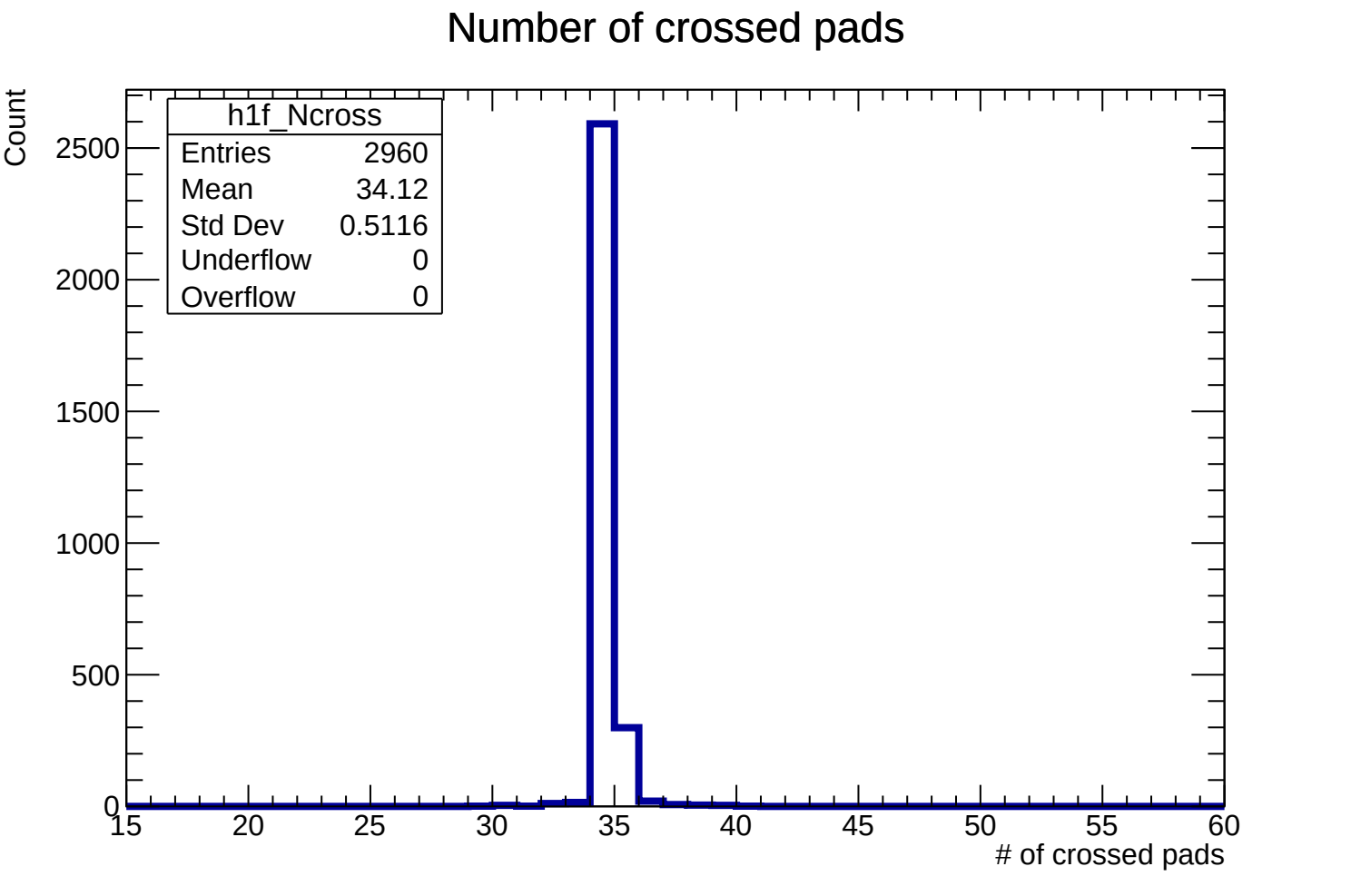
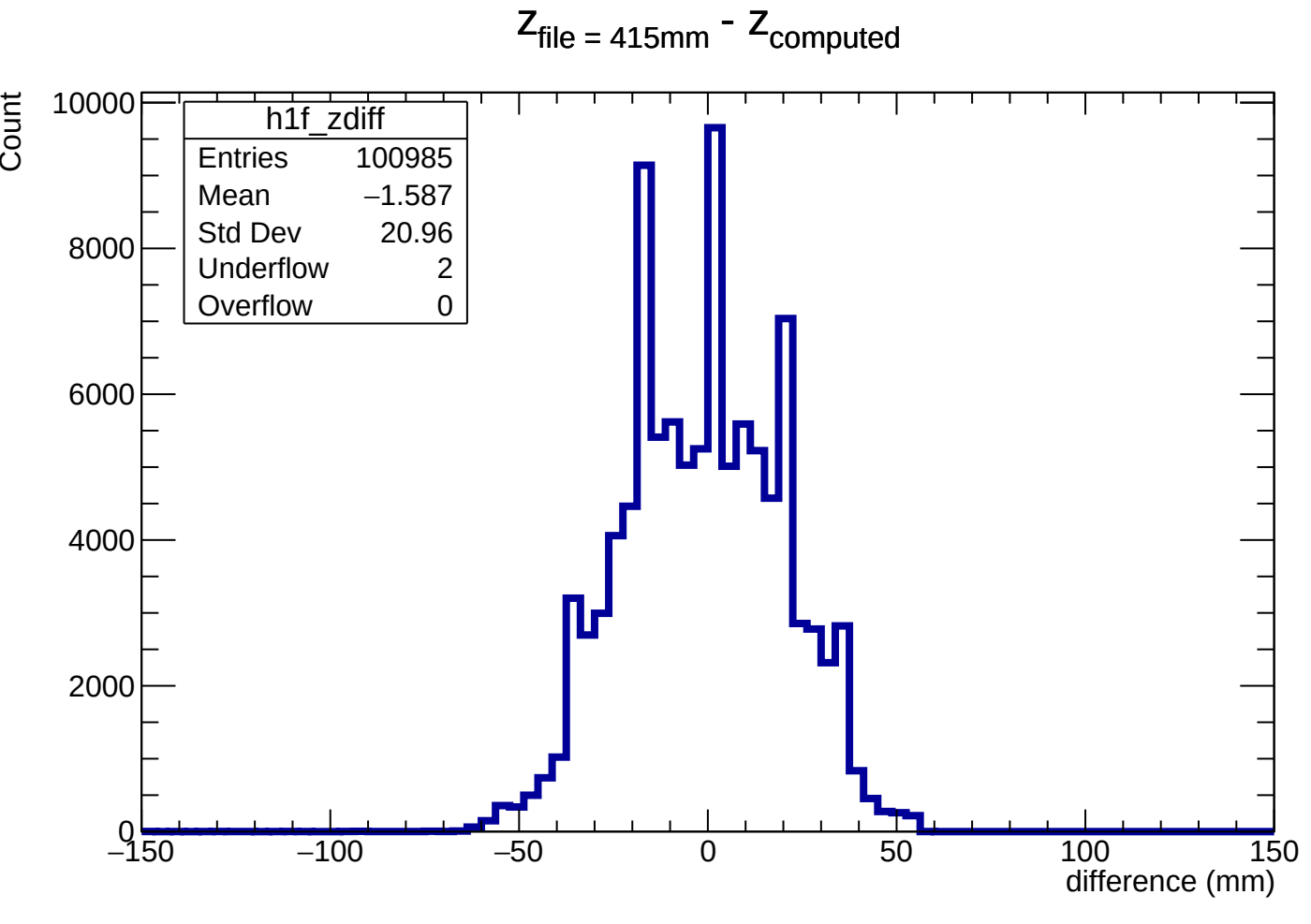
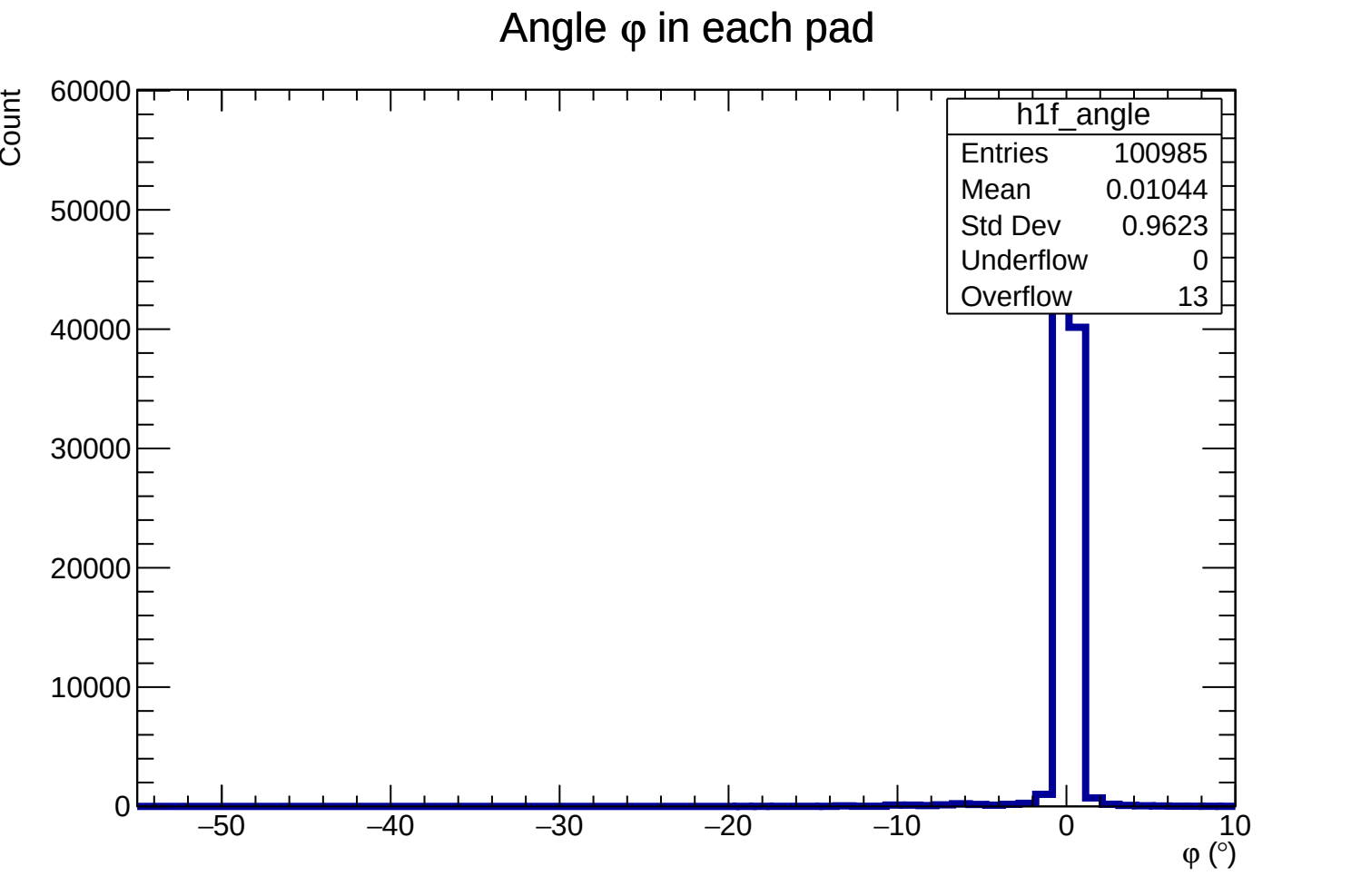
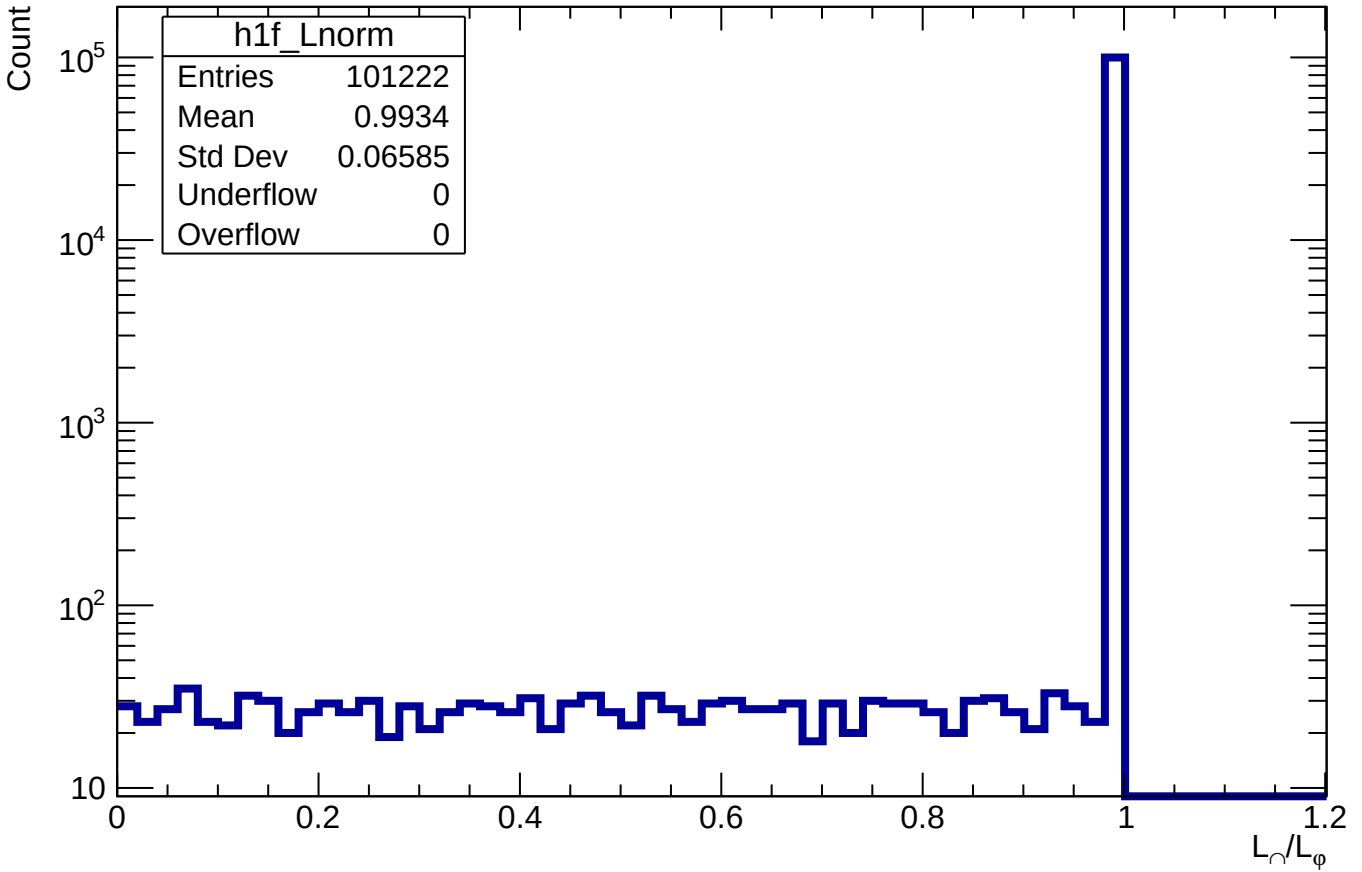
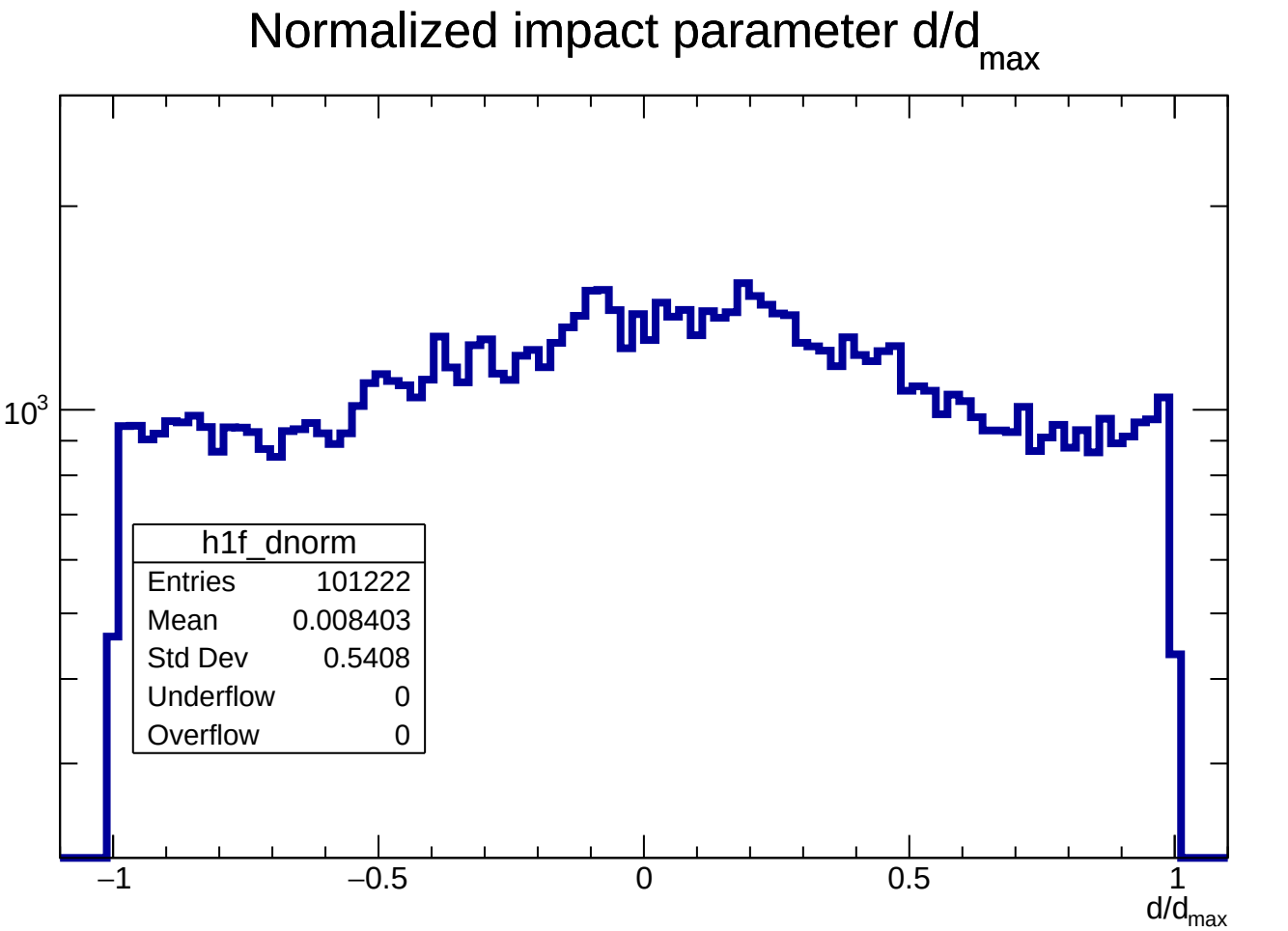

T_{max} of crossed pads
h1f_Tcross
Entries 100985
Mean 189.5
Std Dev 6.729
Underflow 0
Overflow 0
Count
10^4
10^3
10^2
10
1
0
100
200
300
400
500
T (timbebin)

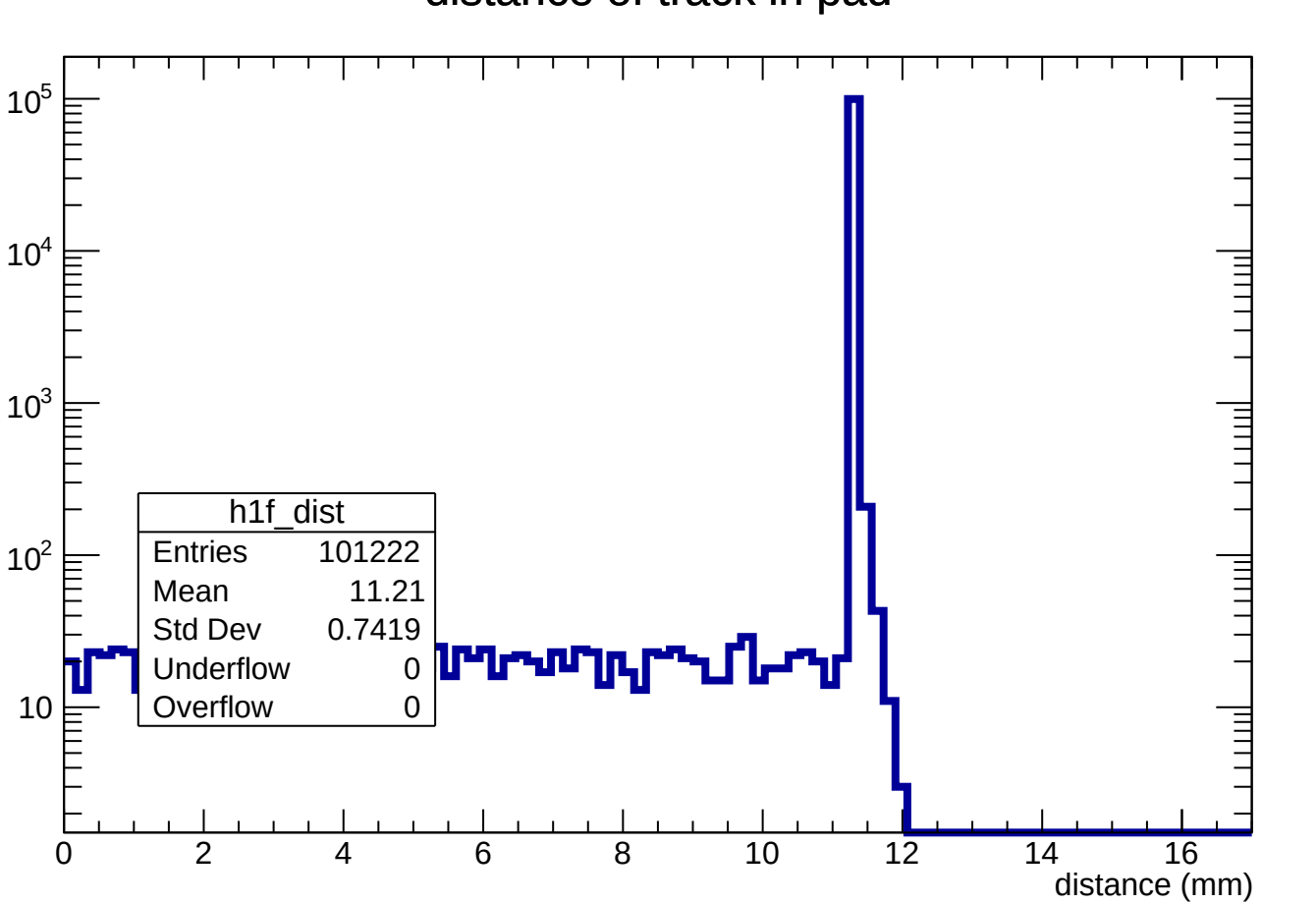

Number of crossed pads
h1f_Ncross
Entries 2960
Mean 34.12
Std Dev 0.5116
Underflow 0
Overflow 0
Count
2500
2000
1500
1000
500
0
15
20
25
30
35
40
45
50
55
60
# of crossed pads

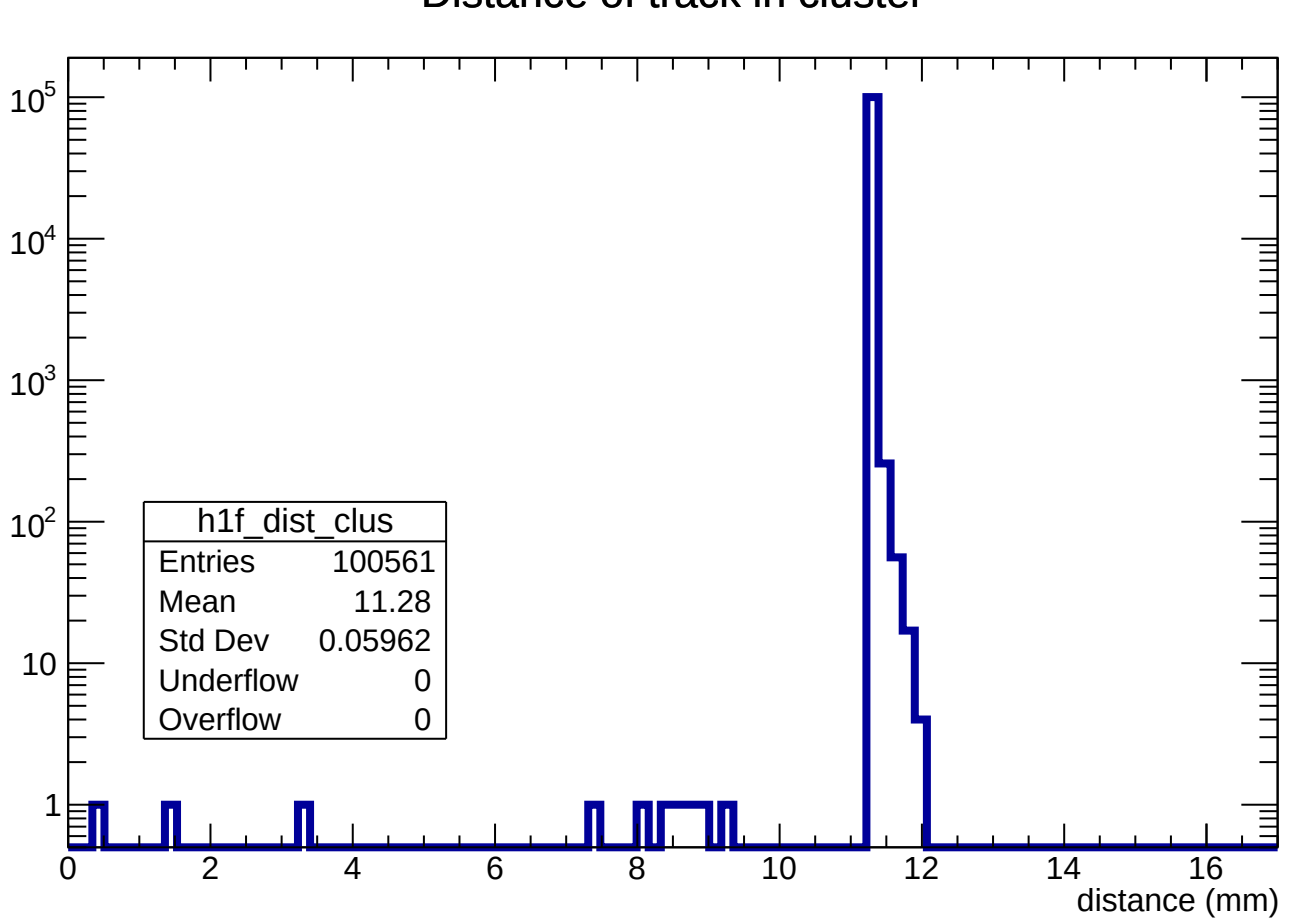

$Z_{file = 415mm} - Z_{computed}$
h1f_zdiff
Entries 100985
Mean −1.587
Std Dev 20.96
Underflow 2
Overflow 0
Count
10000
8000
6000
4000
2000
0
−150
−100
−50
0
50
100
150
difference (mm)

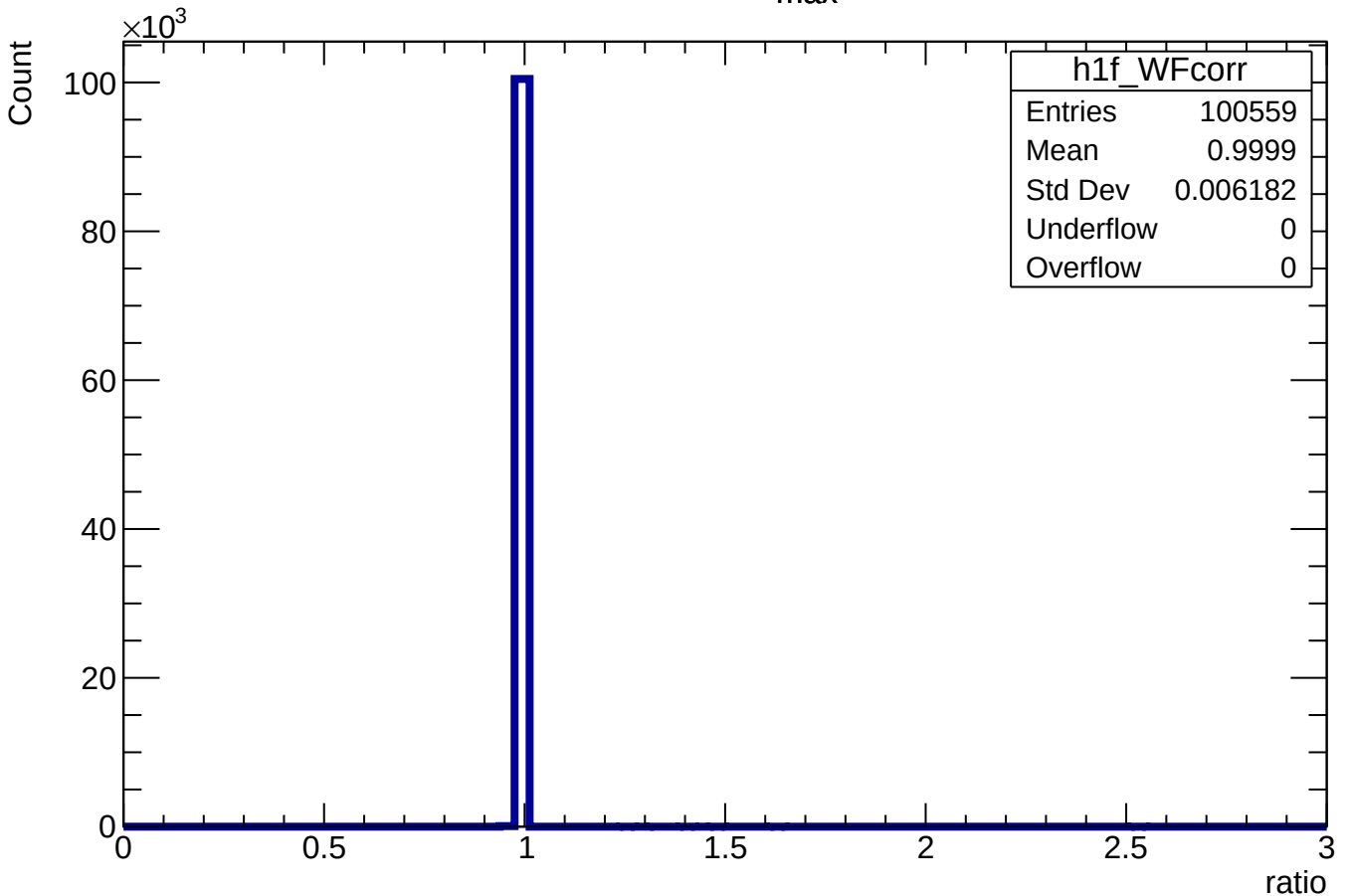

Angle φ in each pad
Count
60000
50000
40000
30000
20000
10000
0
–50
–40
–30
–20
–10
0
10
φ (°)
h1f_angle
Entries 100985
Mean 0.01044
Std Dev 0.9623
Underflow 0
Overflow 13

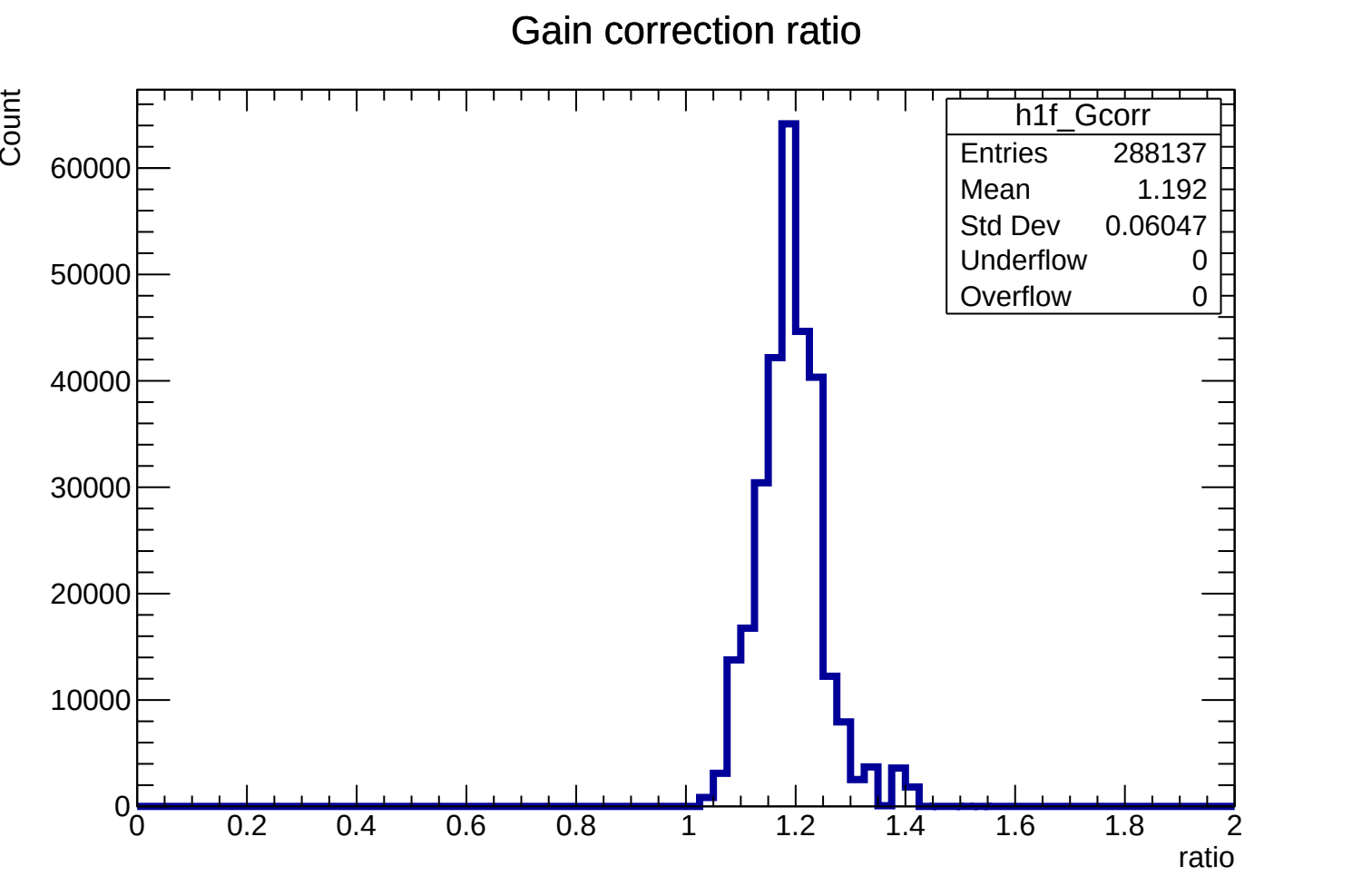

Length in pad normalized to maximum length in pad for a given φ
h1f_Lnorm
Entries 101222
Mean 0.9934
Std Dev 0.06585
Underflow 0
Overflow 0
Count
10^5
10^4
10^3
10^2
10
0
0.2
0.4
0.6
0.8
1
1.2
L_∩/L_φ

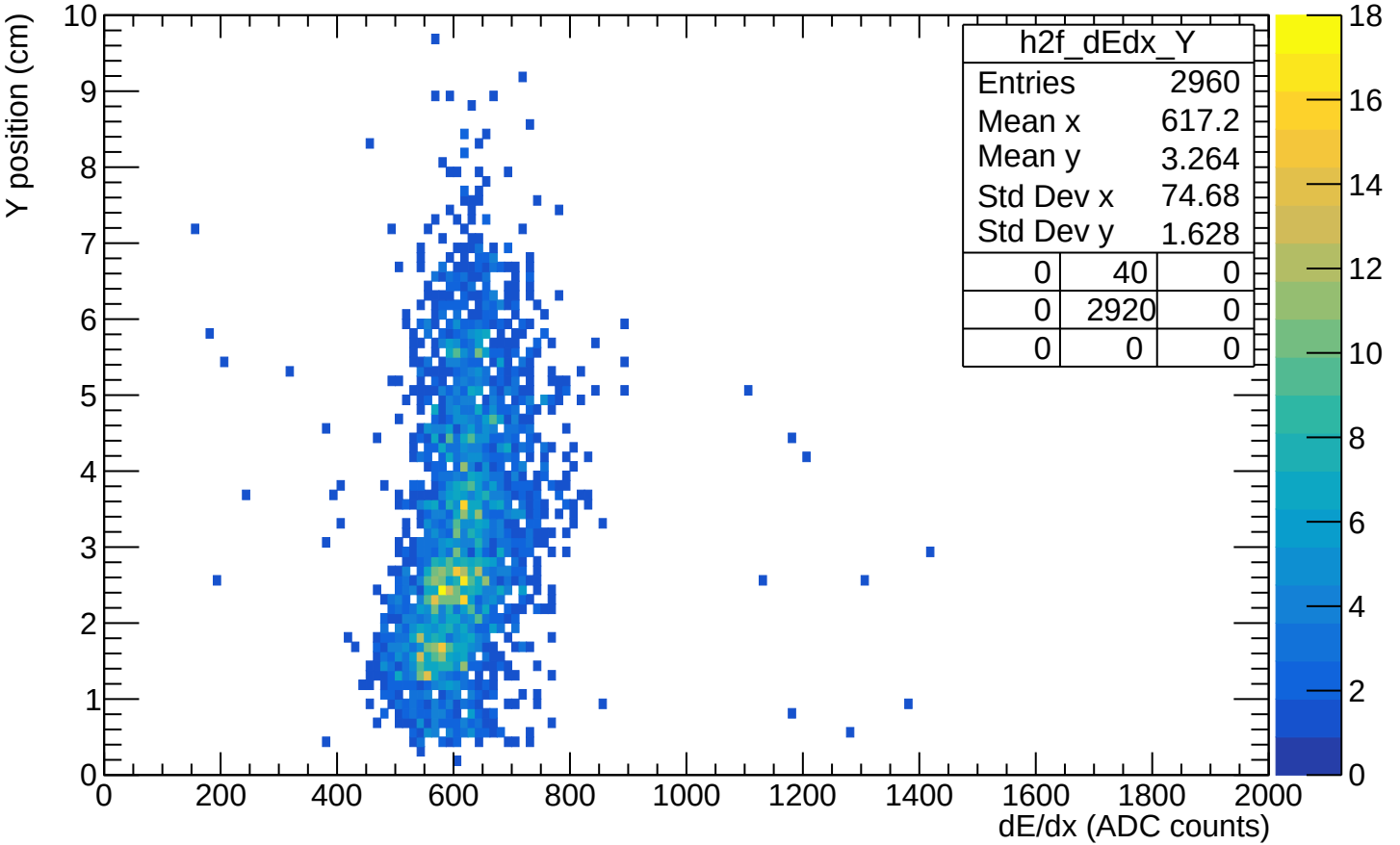

Normalized impact parameter d/d max
10 3
h1f_dnorm
Entries 101222
Mean 0.008403
Std Dev 0.5408
Underflow 0
Overflow 0
−1
−0.5
0
0.5
1
d/d max

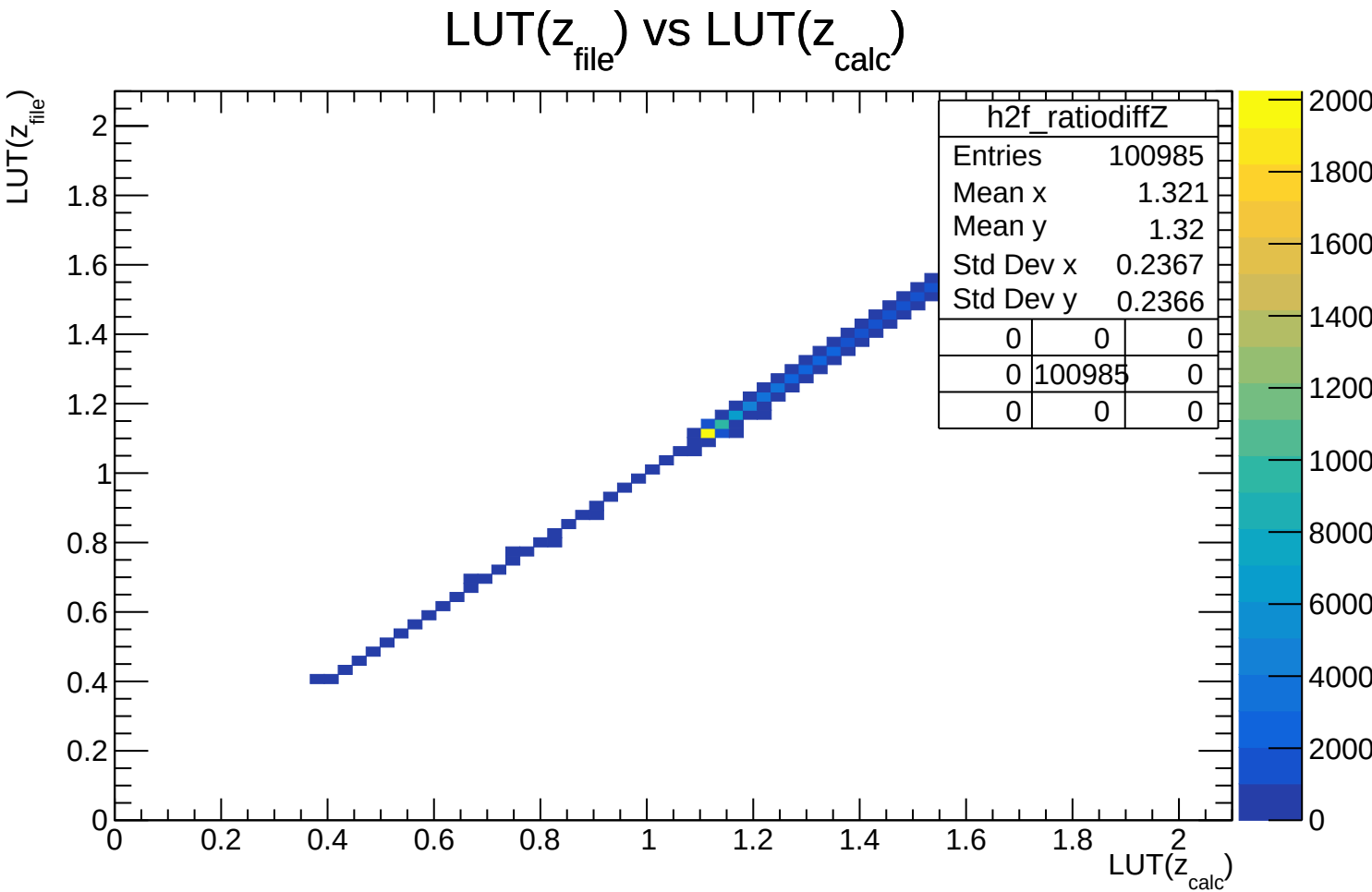

distance of track in pad
h1f_dist
Entries 101222
Mean 11.21
Std Dev 0.7419
Underflow 0
Overflow 0
distance (mm)

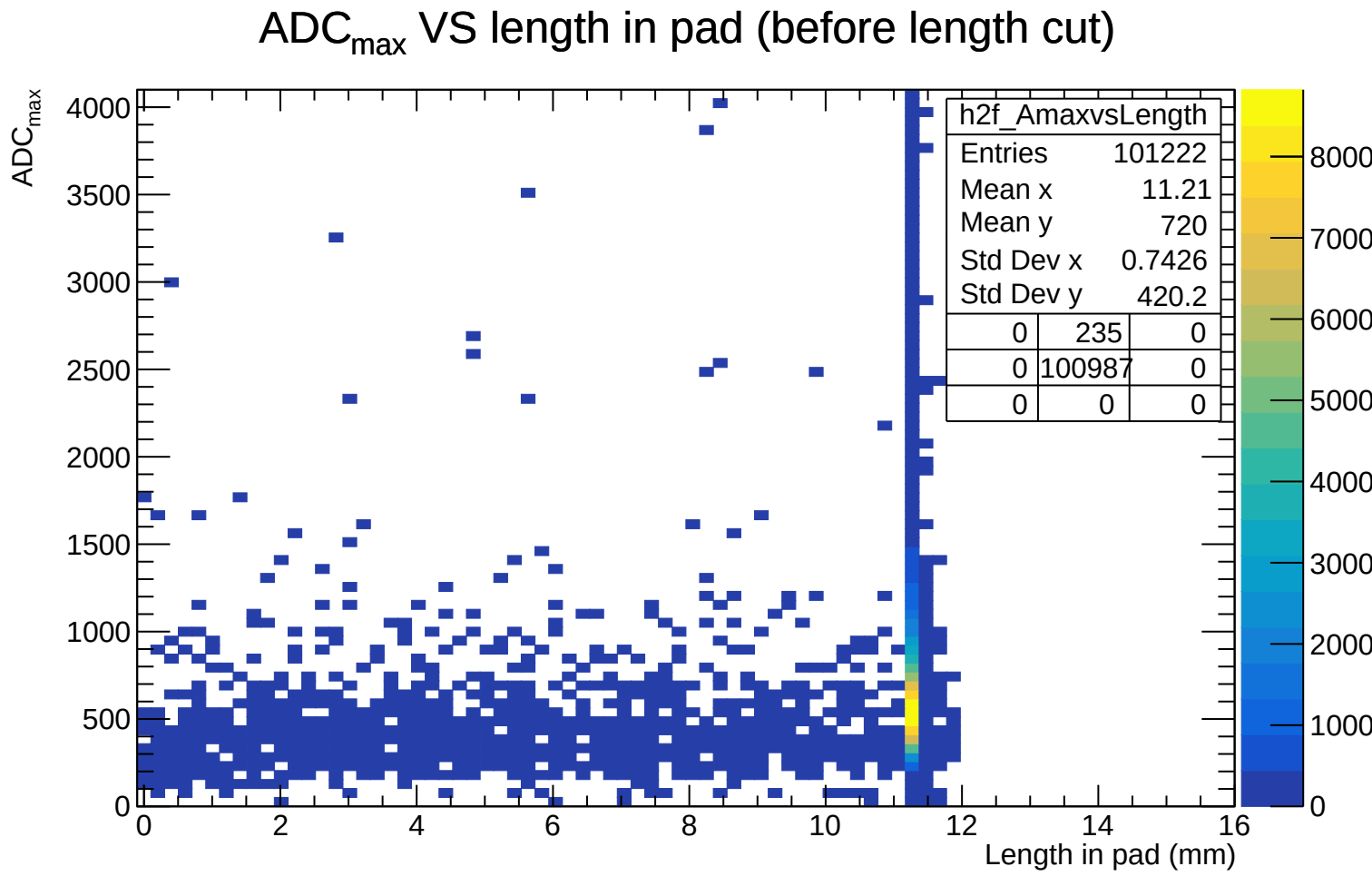

Distance of track in cluster
h1f_dist_clus
Entries 100561
Mean 11.28
Std Dev 0.05962
Underflow 0
Overflow 0
distance (mm)

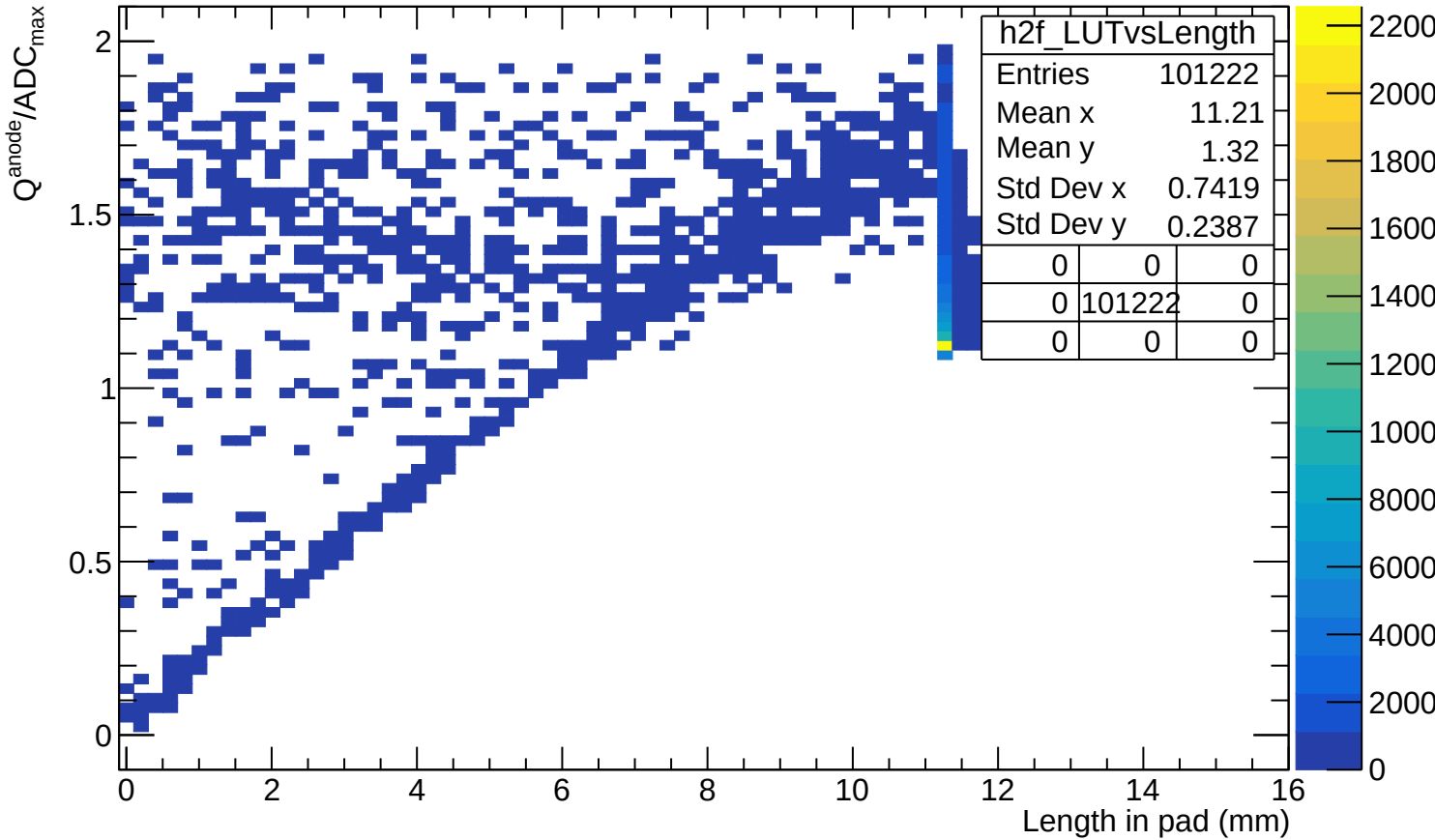

Correction A_{max} ratio
$\times 10^3$
Count
100
80
60
40
20
0
0
0.5
1
1.5
2
2.5
3
ratio
h1f_WFcorr
Entries 100559
Mean 0.9999
Std Dev 0.006182
Underflow 0
Overflow 0

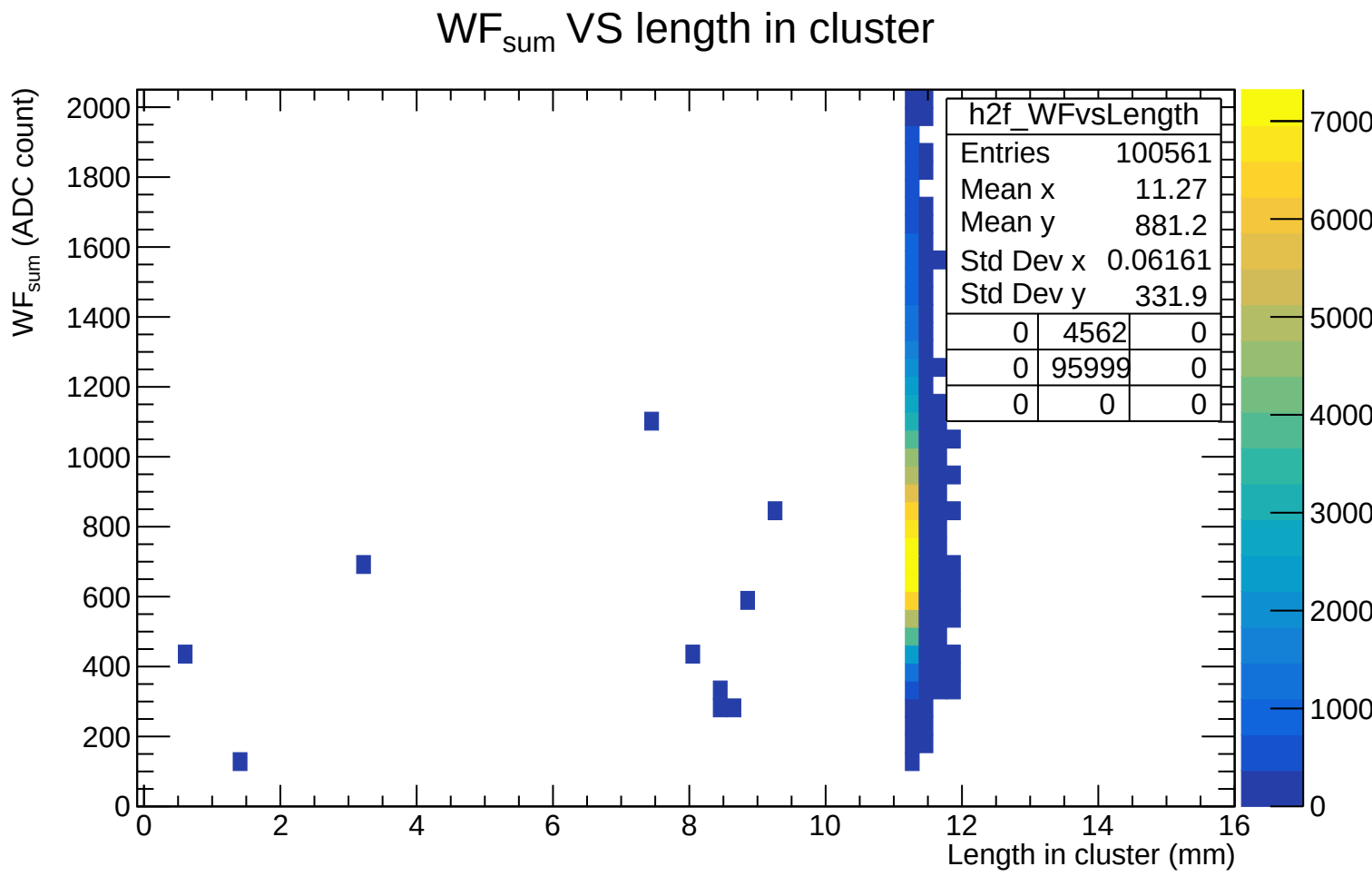

Gain correction ratio
Count
ratio
h1f_Gcorr
Entries 288137
Mean 1.192
Std Dev 0.06047
Underflow 0
Overflow 0
0
10000
20000
30000
40000
50000
60000
0
0.2
0.4
0.6
0.8
1
1.2
1.4
1.6
1.8
2

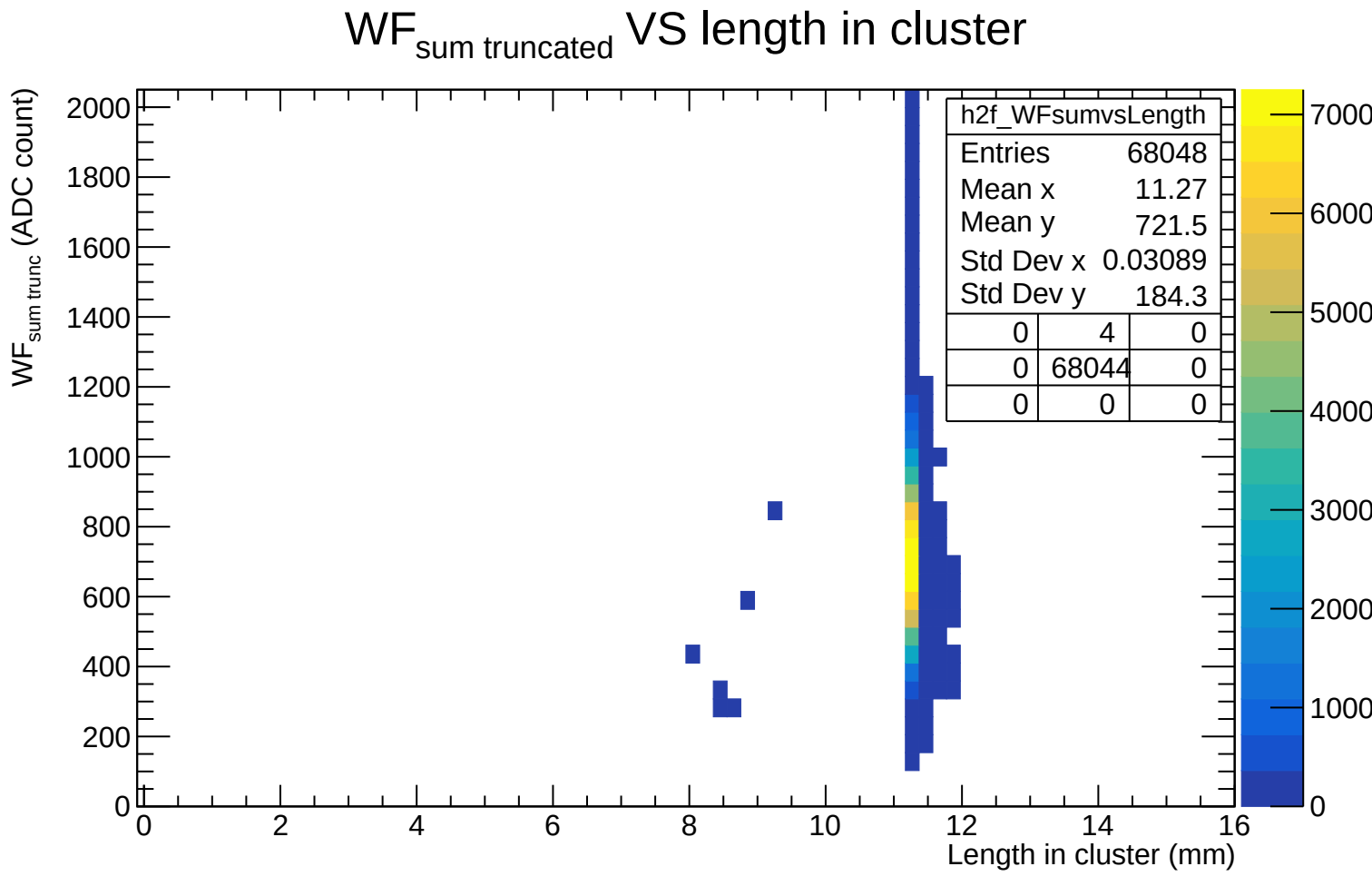

Y position VS dE/dx
Y position (cm)
dE/dx (ADC counts)
h2f_dEdx_Y
Entries 2960
Mean x 617.2
Mean y 3.264
Std Dev x 74.68
Std Dev y 1.628
0 40 0
0 2920 0
0 0 0
0 200 400 600 800 1000 1200 1400 1600 1800 2000
0 1 2 3 4 5 6 7 8 9 10
0 2 4 6 8 10 12 14 16 18

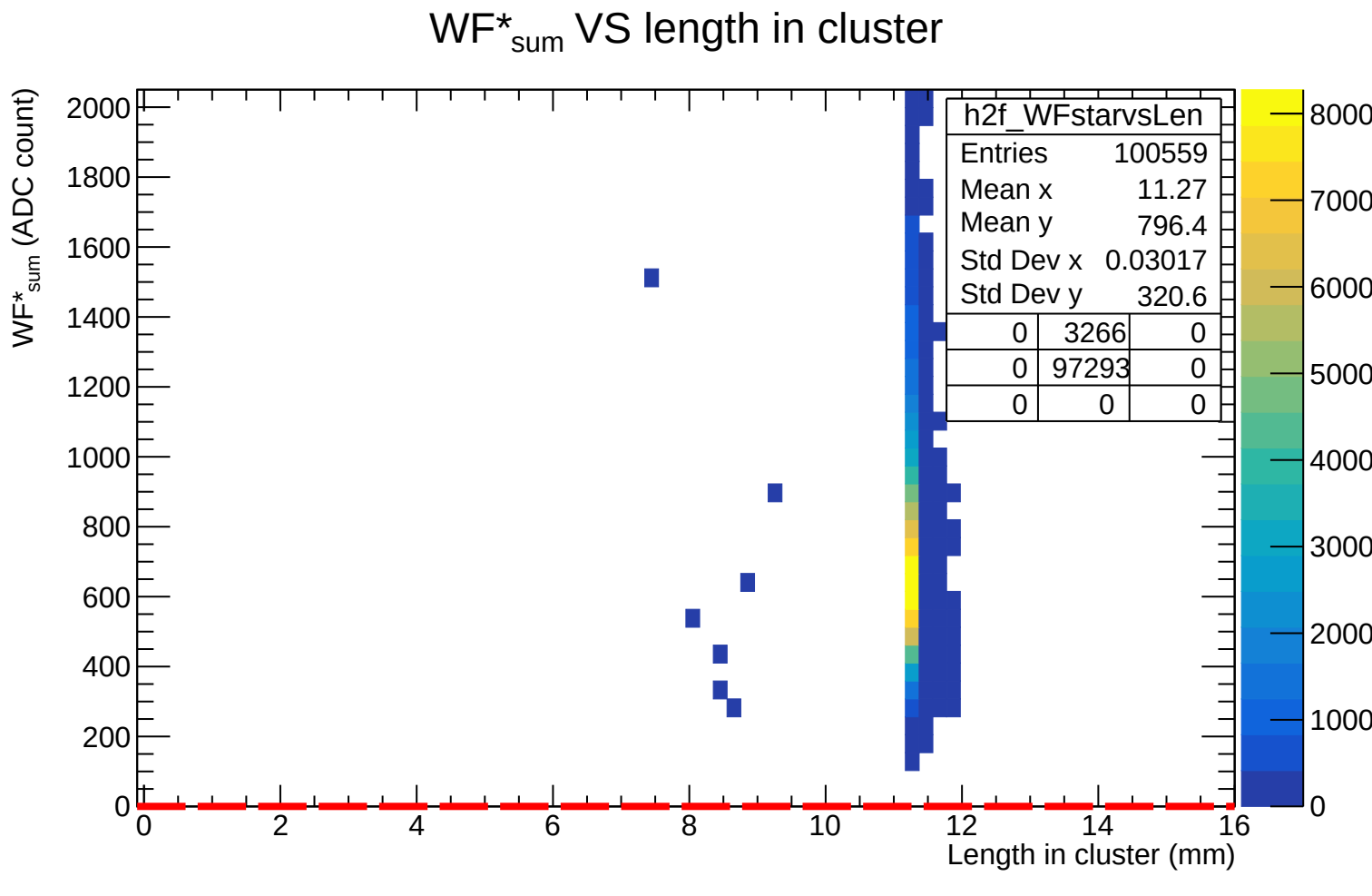

LUT(z_file) vs LUT(z_calc)
h2f_ratiodiffZ
Entries 100985
Mean x 1.321
Mean y 1.32
Std Dev x 0.2367
Std Dev y 0.2366
0 0 0
0 100985 0
0 0 0
LUT(z_file)
LUT(z_calc)
0 0.2 0.4 0.6 0.8 1 1.2 1.4 1.6 1.8 2
0 2000 4000 6000 8000 1000 1200 1400 1600 1800 2000

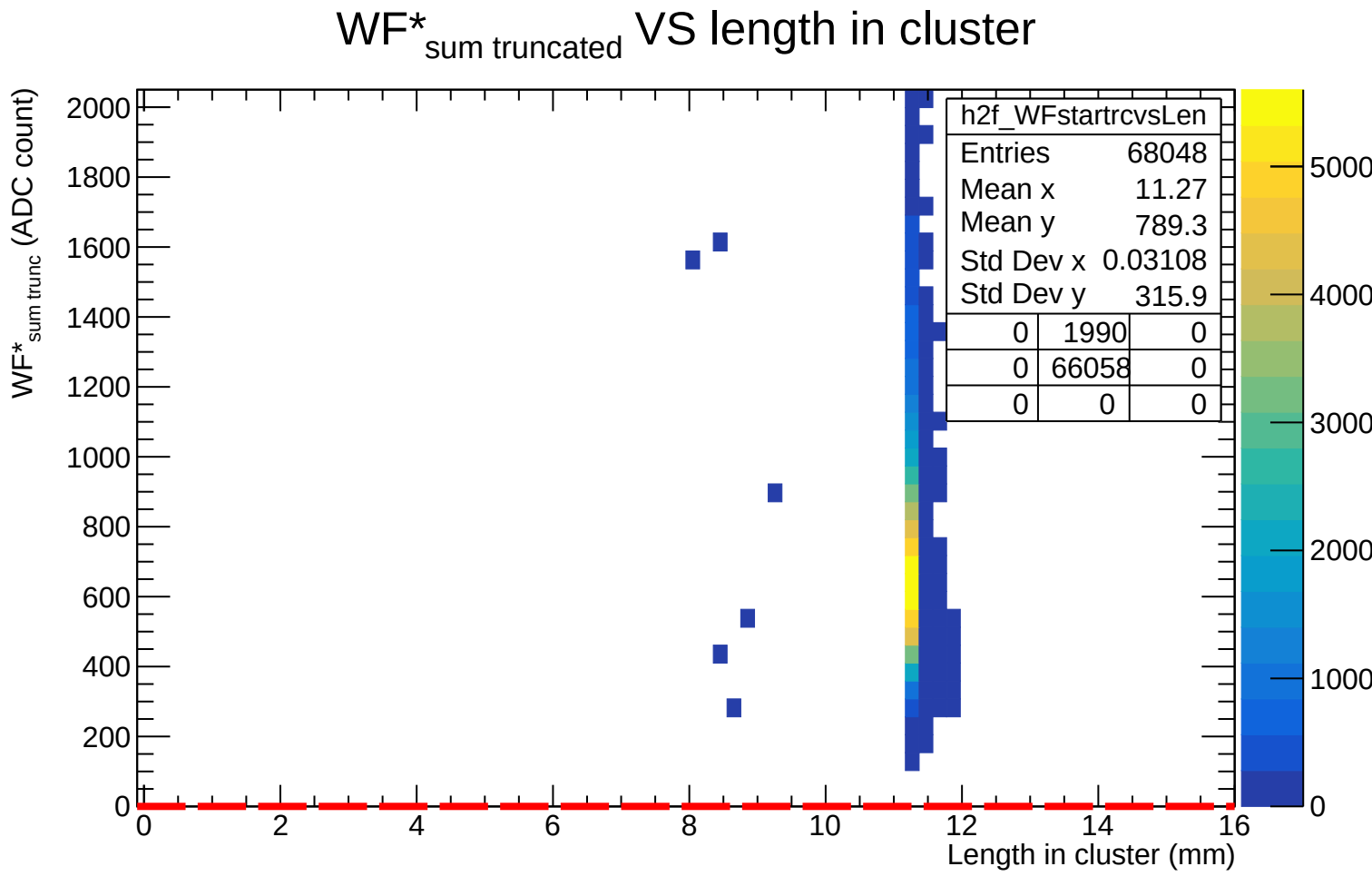

ADC_max VS length in pad (before length cut)
ADC_max
Length in pad (mm)
h2f_AmaxvsLength
Entries 101222
Mean x 11.21
Mean y 720
Std Dev x 0.7426
Std Dev y 420.2
0 235 0
0 100987 0
0 0 0
0 500 1000 1500 2000 2500 3000 3500 4000
0 2 4 6 8 10 12 14 16
0 1000 2000 3000 4000 5000 6000 7000 8000

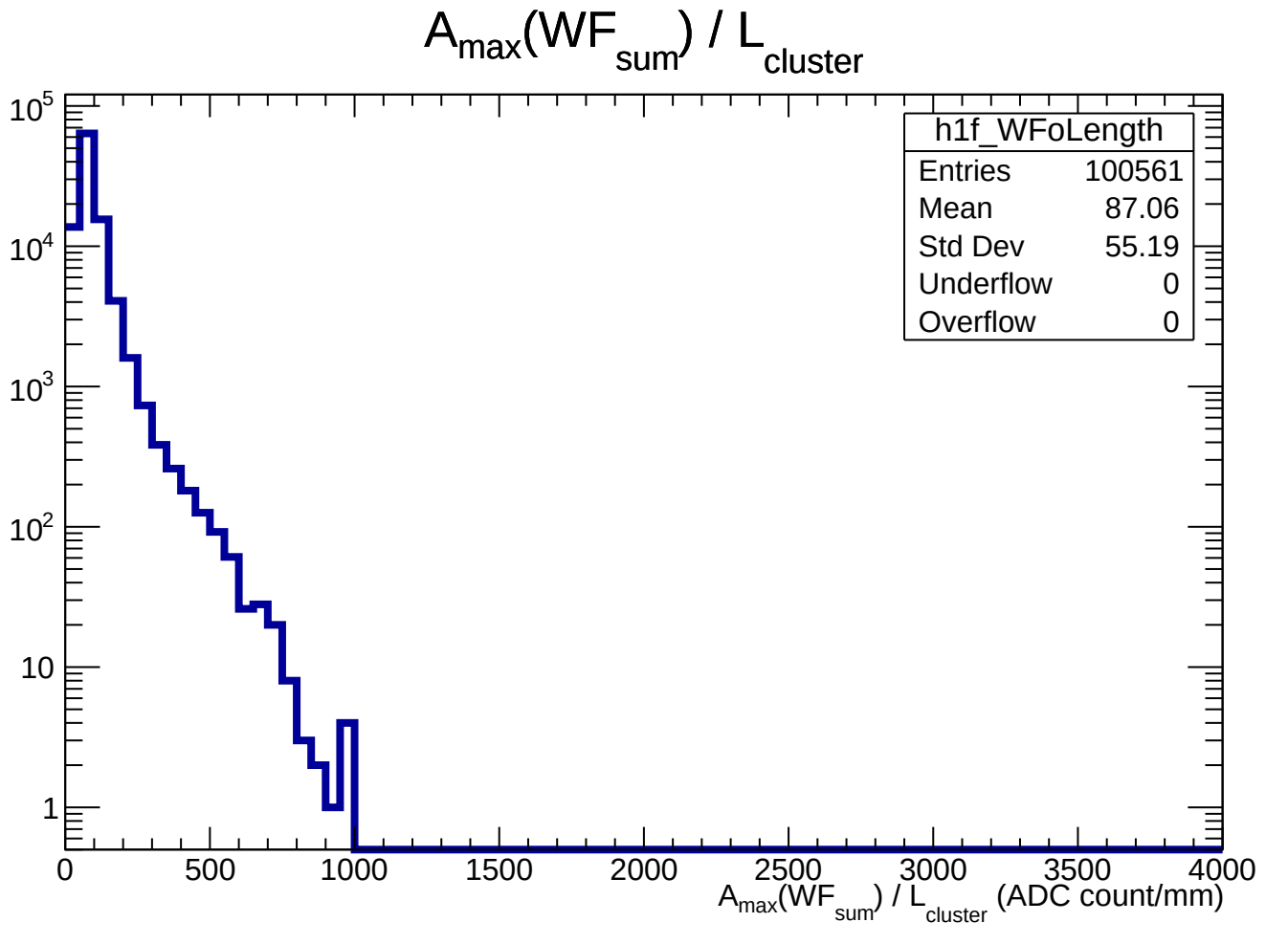

Q^anode/ADC_max VS length in pad (before length cut)
Q^anode/ADC_max
Length in pad (mm)
h2f_LUTvsLength
Entries 101222
Mean x 11.21
Mean y 1.32
Std Dev x 0.7419
Std Dev y 0.2387
0 0 0
0 101222 0
0 0 0
0
0.5
1
1.5
2
0
2
4
6
8
10
12
14
16
0
2000
4000
6000
8000
1000
1200
1400
1600
1800
2000
2200

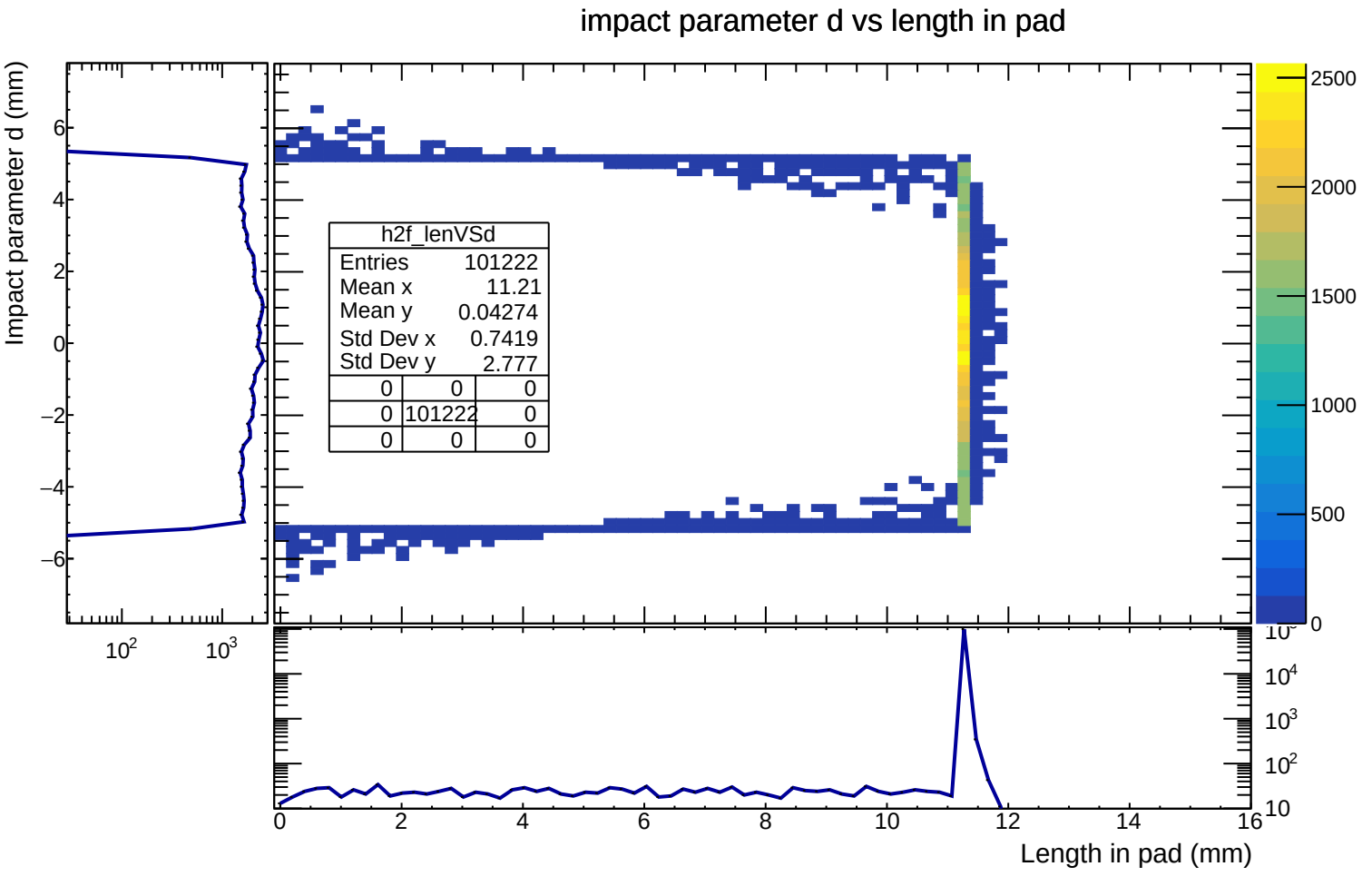

WF_sum VS length in cluster
WF_sum (ADC count)
Length in cluster (mm)
h2f_WFvsLength
Entries 100561
Mean x 11.27
Mean y 881.2
Std Dev x 0.06161
Std Dev y 331.9
0 4562 0
0 95999 0
0 0 0
0 200 400 600 800 1000 1200 1400 1600 1800 2000
0 2 4 6 8 10 12 14 16
0 1000 2000 3000 4000 5000 6000 7000


WF sum truncated VS length in cluster
WF sum trunc (ADC count)
Length in cluster (mm)
h2f_WFsumvsLength
Entries 68048
Mean x 11.27
Mean y 721.5
Std Dev x 0.03089
Std Dev y 184.3
0 4 0
0 68044 0
0 0 0
0 200 400 600 800 1000 1200 1400 1600 1800 2000
0 2 4 6 8 10 12 14 16
0 1000 2000 3000 4000 5000 6000 7000


WF*sum VS length in cluster
WF*sum (ADC count)
Length in cluster (mm)
h2f_WFstarvsLen
Entries 100559
Mean x 11.27
Mean y 796.4
Std Dev x 0.03017
Std Dev y 320.6
0 3266 0
0 97293 0
0 0 0
0 200 400 600 800 1000 1200 1400 1600 1800 2000
0 2 4 6 8 10 12 14 16
0 1000 2000 3000 4000 5000 6000 7000 8000


WF*sum truncated VS length in cluster
WF*sum trunc (ADC count)
Length in cluster (mm)
h2f_WFstartrcvsLen
Entries 68048
Mean x 11.27
Mean y 789.3
Std Dev x 0.03108
Std Dev y 315.9
0 1990 0
0 66058 0
0 0 0


$A_{max}(WF_{sum}) / L_{cluster}$
h1f_WFoLength
Entries 100561
Mean 87.06
Std Dev 55.19
Underflow 0
Overflow 0
10^5
10^4
10^3
10^2
10
1
0
500
1000
1500
2000
2500
3000
3500
4000
$A_{max}(WF_{sum}) / L_{cluster}$ (ADC count/mm)


impact parameter d vs length in pad
Impact parameter d (mm)
Length in pad (mm)
h2f_lenVSd
Entries 101222
Mean x 11.21
Mean y 0.04274
Std Dev x 0.7419
Std Dev y 2.777
0 0 0
0 101222 0
0 0 0