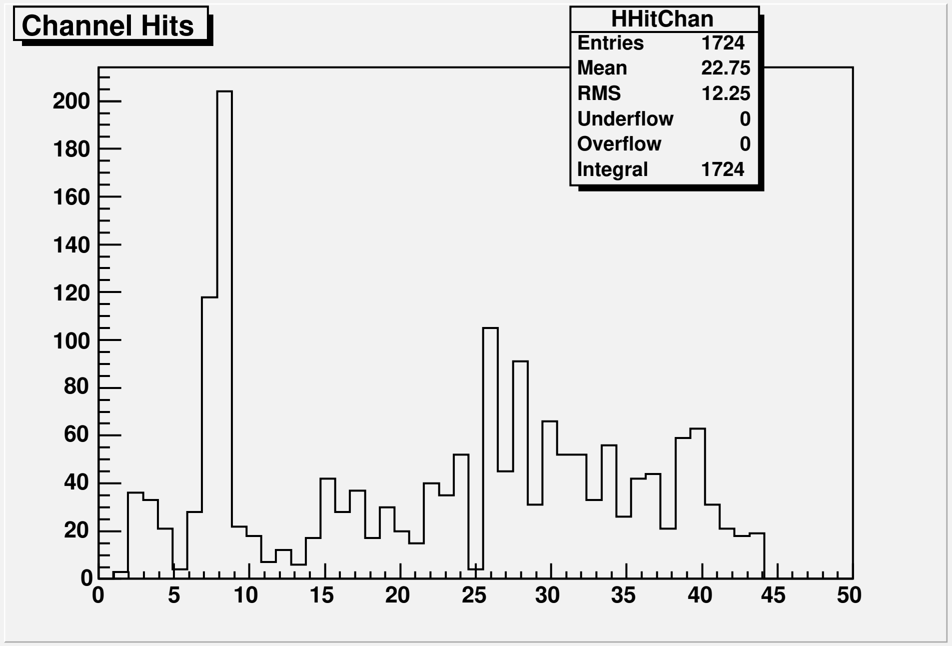
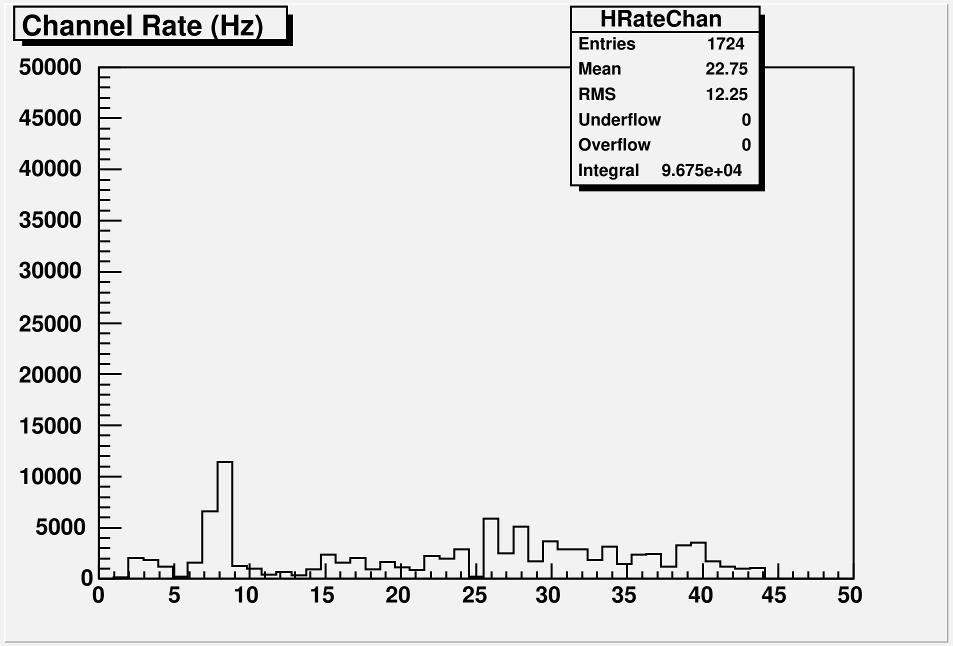
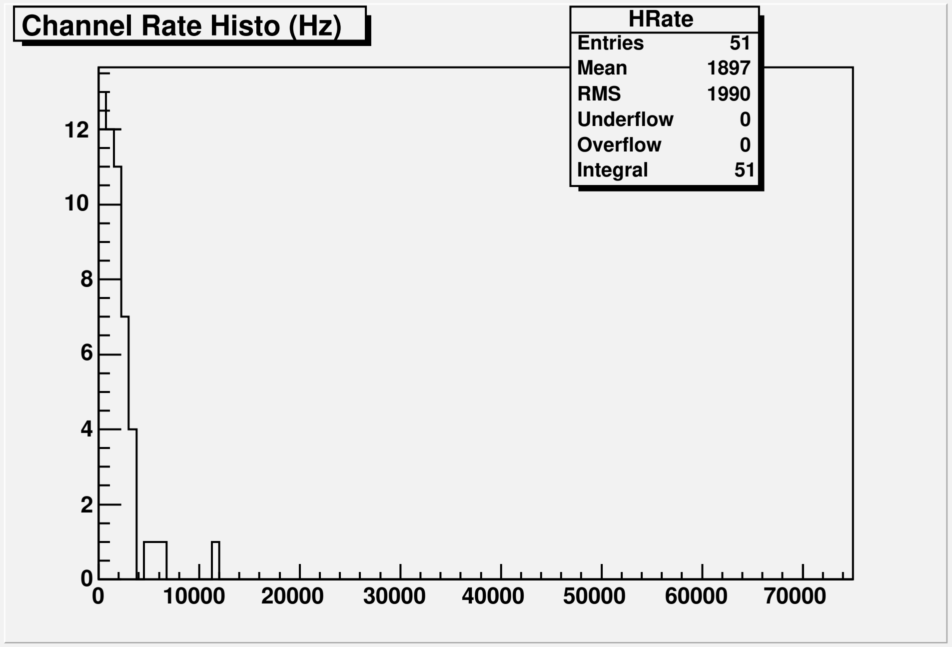
RUN: VlandUnCal Run11490 LEDTCut-QCut



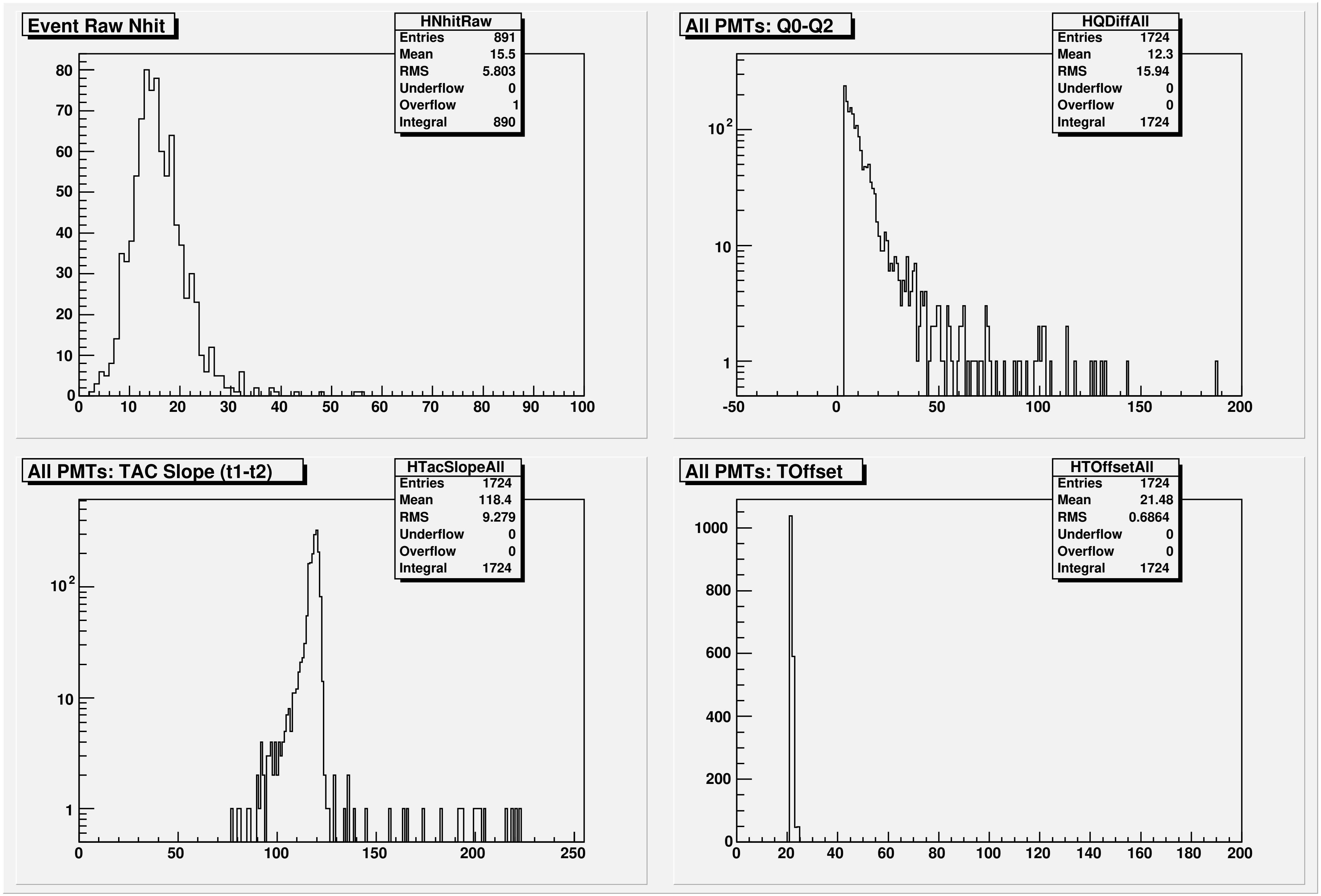
Channel Hits

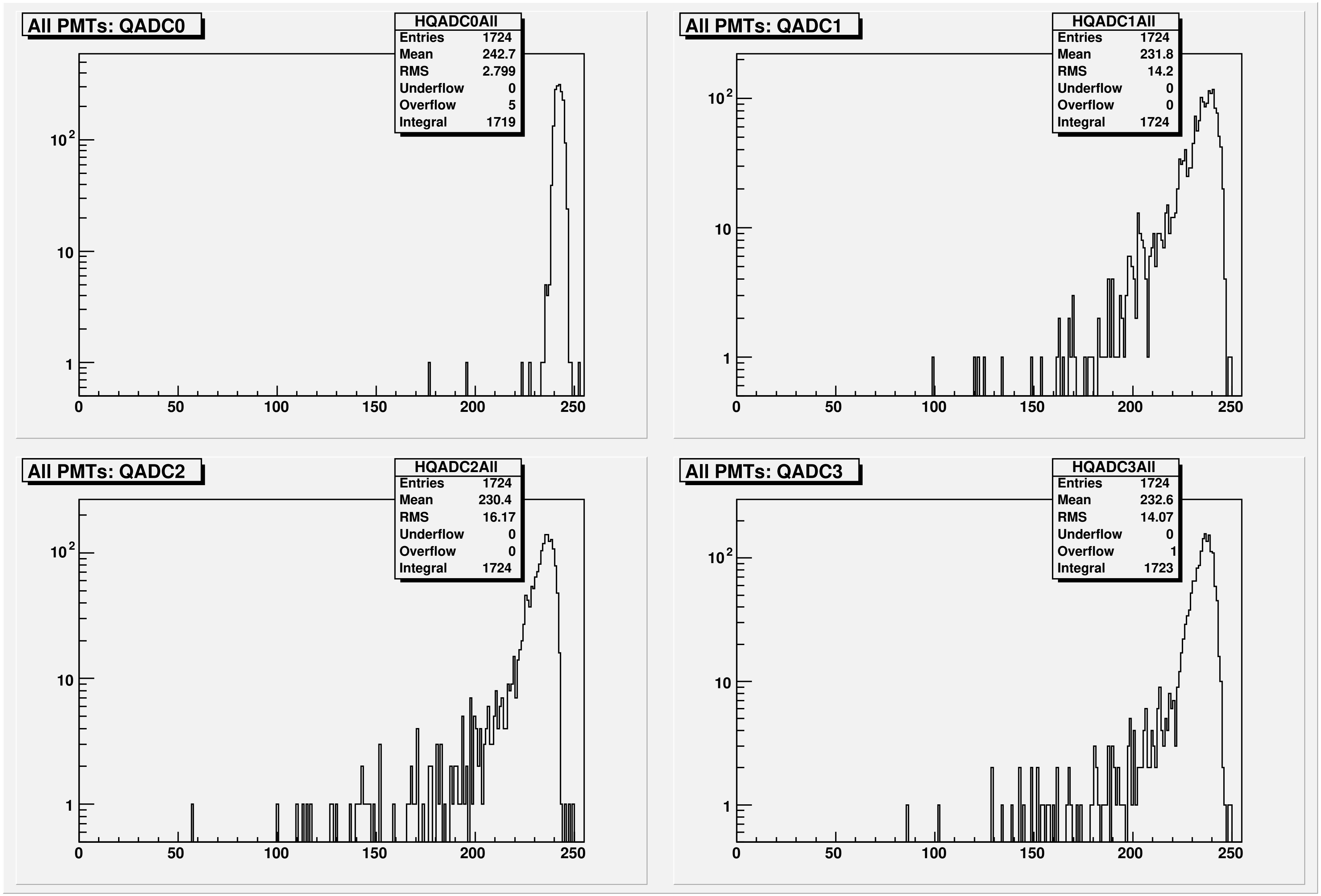


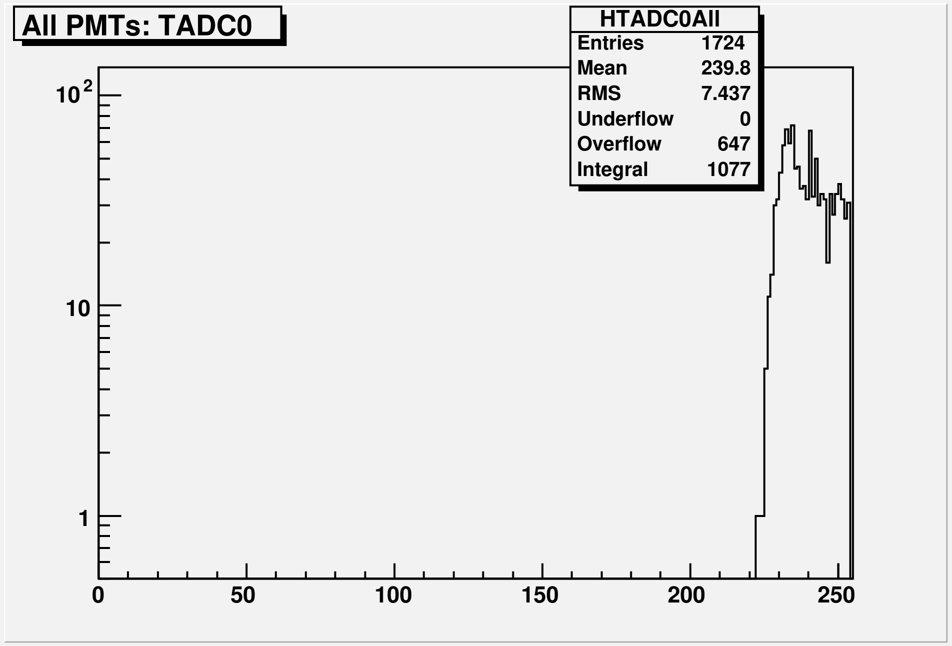
Channel Rate (Hz)

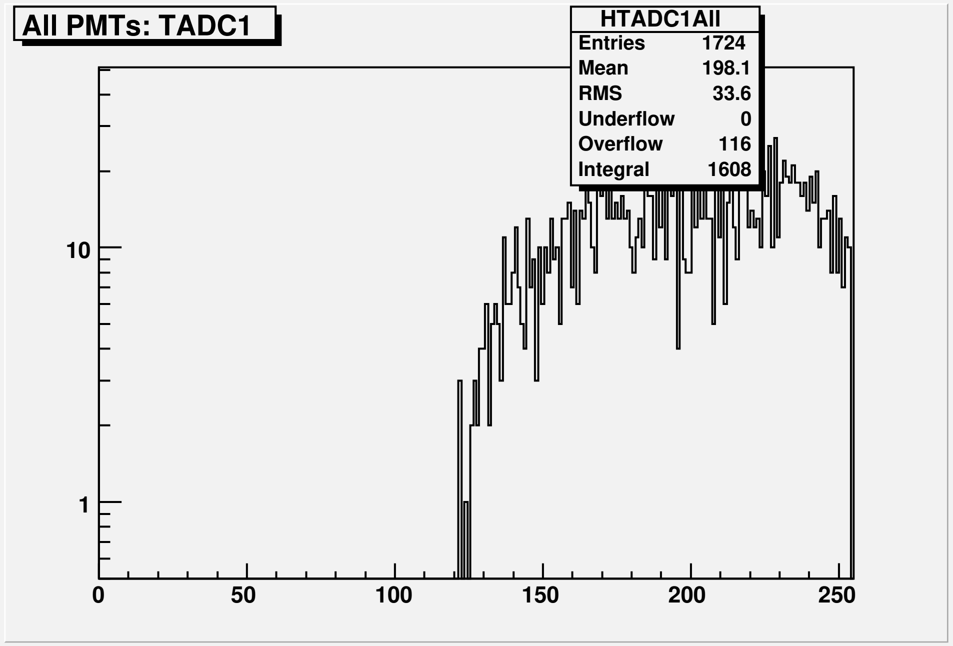


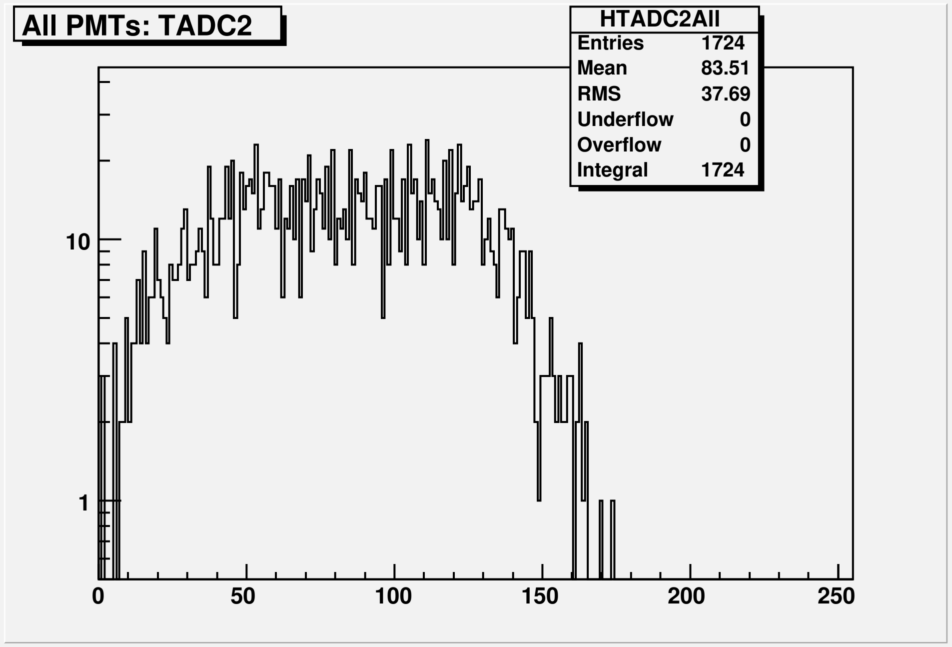
Channel Rate Histo (Hz)

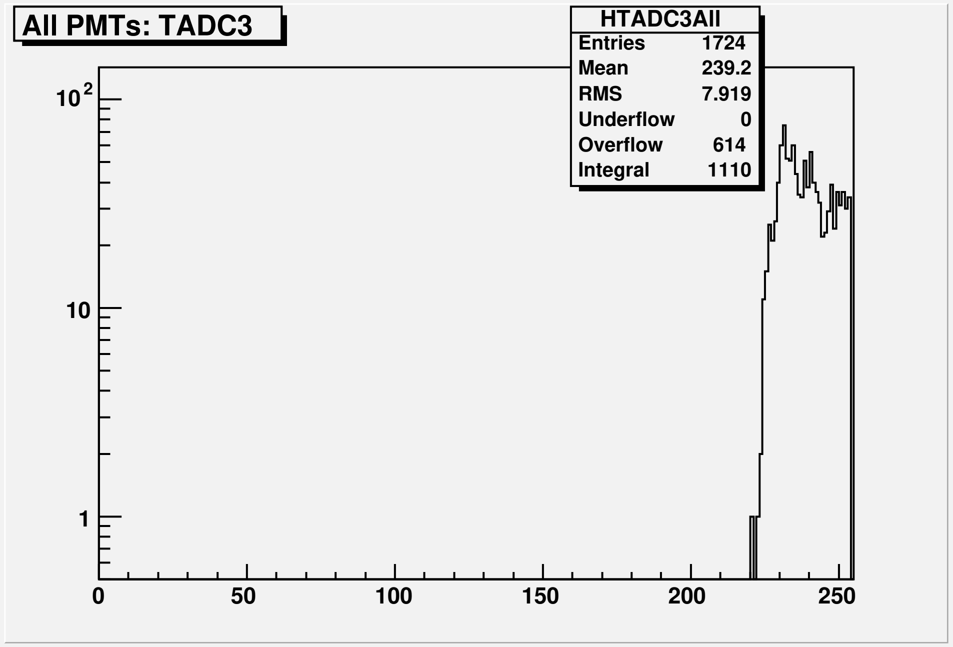

Event Raw Nhit
HNhitRaw
Entries 891
Mean 15.5
RMS 5.803
Underflow 0
Overflow 1
Integral 890
0 10 20 30 40 50 60 70 80
0 10 20 30 40 50 60 70 80 90 100
All PMTs: Q0-Q2
HQDiffAll
Entries 1724
Mean 12.3
RMS 15.94
Underflow 0
Overflow 0
Integral 1724
1 10 10^2
-50 0 50 100 150 200
All PMTs: TAC Slope (t1-t2)
HTacSlopeAll
Entries 1724
Mean 118.4
RMS 9.279
Underflow 0
Overflow 0
Integral 1724
1 10 10^2
0 50 100 150 200 250
All PMTs: TOffset
HTOffsetAll
Entries 1724
Mean 21.48
RMS 0.6864
Underflow 0
Overflow 0
Integral 1724
0 200 400 600 800 1000
0 20 40 60 80 100 120 140 160 180 200


All PMTs: QADC0
HQADC0All
Entries 1724
Mean 242.7
RMS 2.799
Underflow 0
Overflow 5
Integral 1719
All PMTs: QADC1
HQADC1All
Entries 1724
Mean 231.8
RMS 14.2
Underflow 0
Overflow 0
Integral 1724
All PMTs: QADC2
HQADC2All
Entries 1724
Mean 230.4
RMS 16.17
Underflow 0
Overflow 0
Integral 1724
All PMTs: QADC3
HQADC3All
Entries 1724
Mean 232.6
RMS 14.07
Underflow 0
Overflow 1
Integral 1723
10^2
10
1
0
50
100
150
200
250


All PMTs: TADC0
HTADC0All
Entries 1724
Mean 239.8
RMS 7.437
Underflow 0
Overflow 647
Integral 1077
10^2
10
1
0
50
100
150
200
250

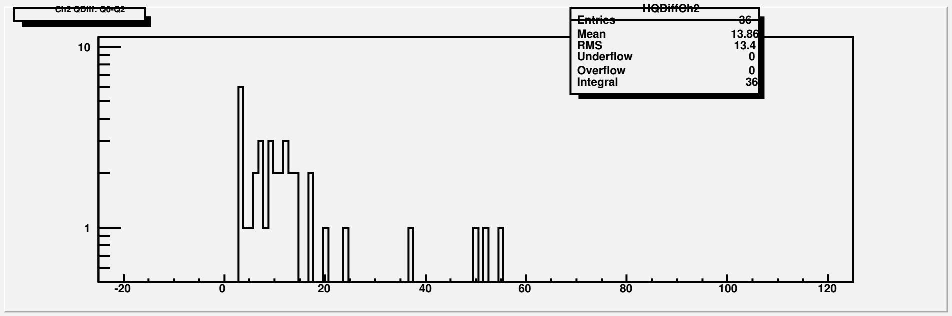

All PMTs: TADC1
HTADC1All
Entries 1724
Mean 198.1
RMS 33.6
Underflow 0
Overflow 116
Integral 1608
10
1
0
50
100
150
200
250

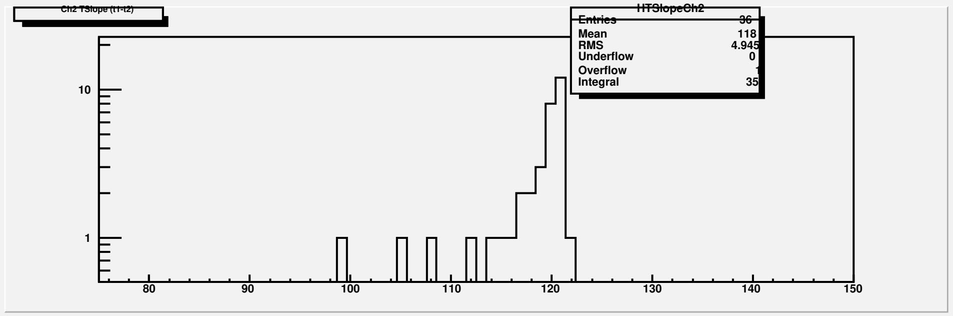

All PMTs: TADC2
HTADC2All
Entries 1724
Mean 83.51
RMS 37.69
Underflow 0
Overflow 0
Integral 1724
10
1
0
50
100
150
200
250

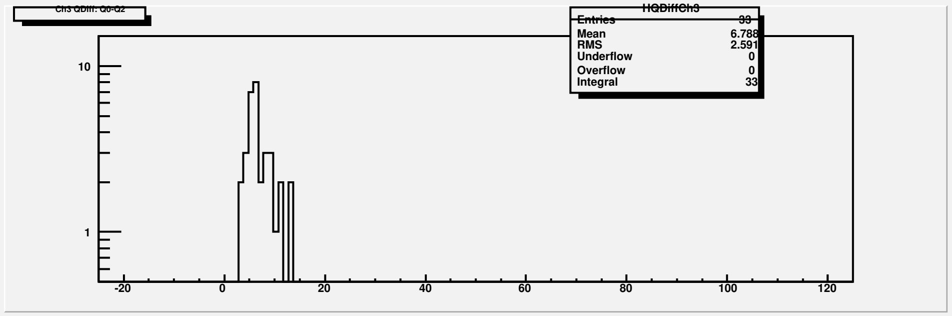

All PMTs: TADC3
HTADC3All
Entries 1724
Mean 239.2
RMS 7.919
Underflow 0
Overflow 614
Integral 1110
10^2
10
1
0
50
100
150
200
250

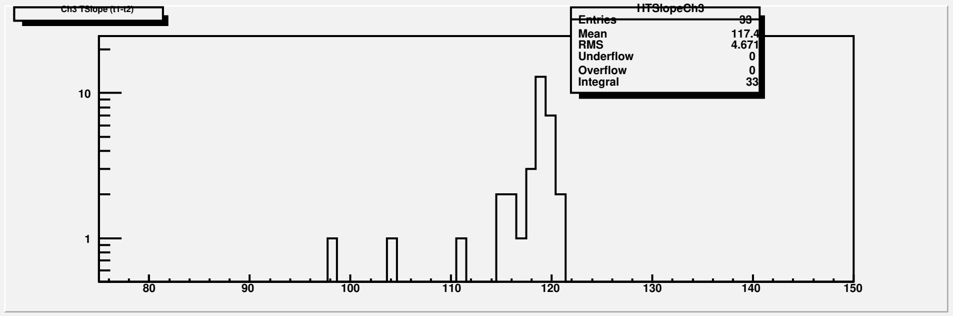

Ch1 QDiff: Q0-Q2
HQDiffCh1
Entries 3
Mean 5.667
RMS 1.886
Underflow 0
Overflow 0
Integral 3
1
-20
0
20
40
60
80
100
120


Ch1 TSlope (t1-t2)
HTSlopeCh1
Entries 3
Mean 121.7
RMS 0.4714
Underflow 0
Overflow 0
Integral 3
1
80
90
100
110
120
130
140
150

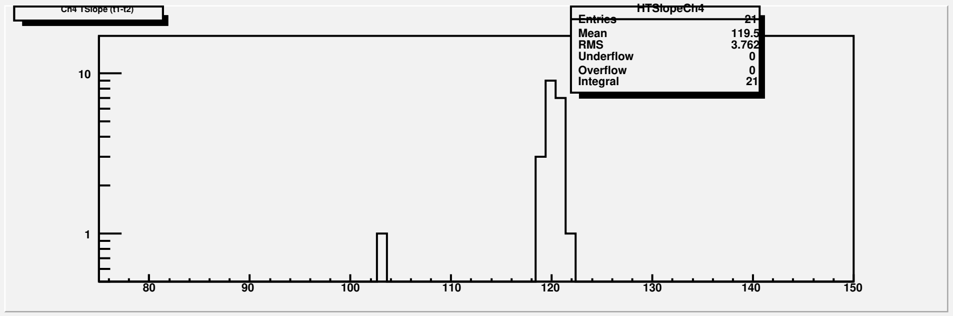

Ch2 QDiff: Q0-Q2
HQDiffCh2
Entries 36
Mean 13.86
RMS 13.4
Underflow 0
Overflow 0
Integral 36
10
1
-20
0
20
40
60
80
100
120


Ch2 TSlope (t1-t2)
HTSlopeCh2
Entries 36
Mean 118
RMS 4.945
Underflow 0
Overflow 1
Integral 35
10
1
80
90
100
110
120
130
140
150

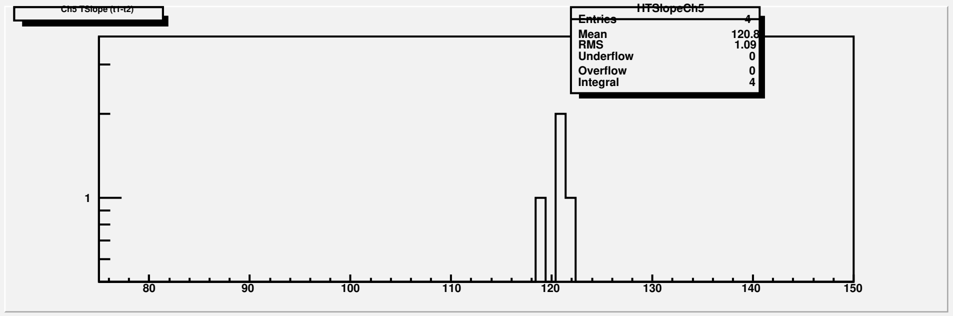

Ch3 QDiff: Q0-Q2
HQDiffCh3
Entries 33
Mean 6.788
RMS 2.591
Underflow 0
Overflow 0
Integral 33
10
1
-20
0
20
40
60
80
100
120

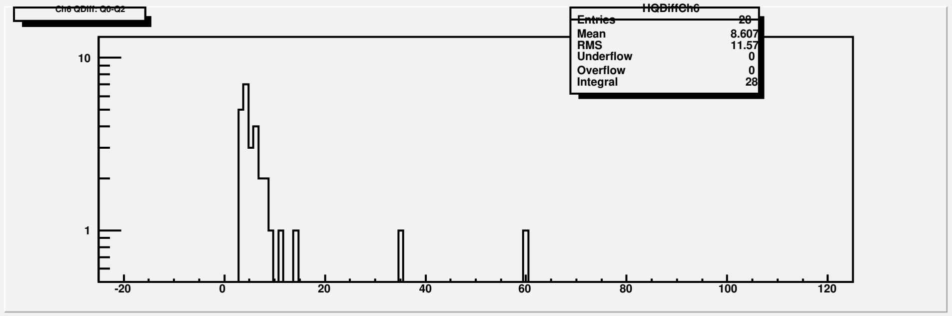

Ch3 TSlope (t1-t2)
HTSlopeCh3
Entries 33
Mean 117.4
RMS 4.671
Underflow 0
Overflow 0
Integral 33
10
1
80
90
100
110
120
130
140
150

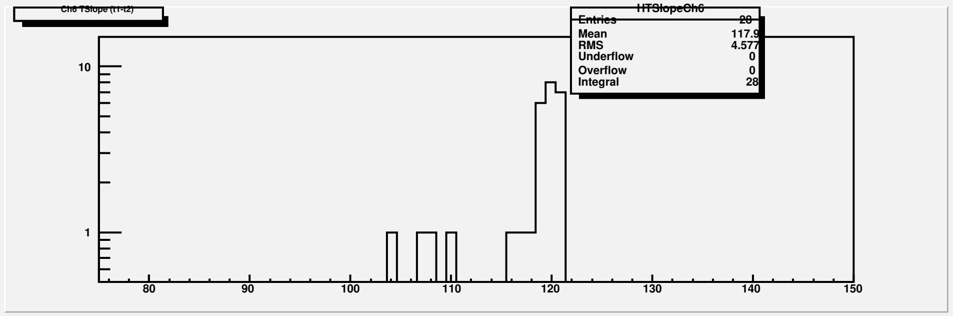

Ch4 QDiff: Q0-Q2
HQDiffCh4
Entries 21
Mean 6.286
RMS 2.393
Underflow 0
Overflow 0
Integral 21
1
-20
0
20
40
60
80
100
120

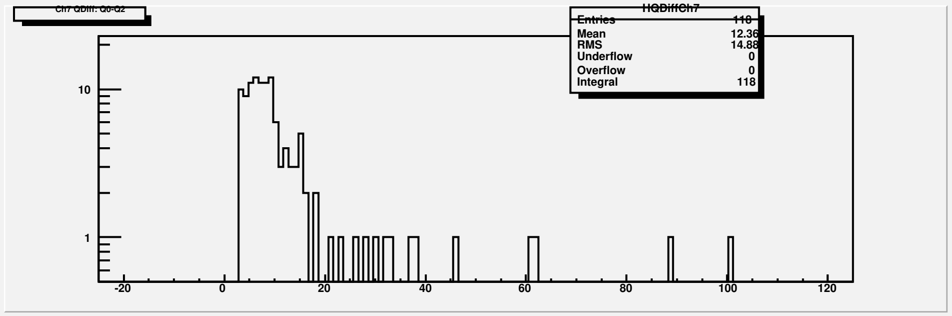

Ch4 TSlope (t1-t2)
HTSlopeCh4
Entries 21
Mean 119.5
RMS 3.762
Underflow 0
Overflow 0
Integral 21
10
1
80
90
100
110
120
130
140
150

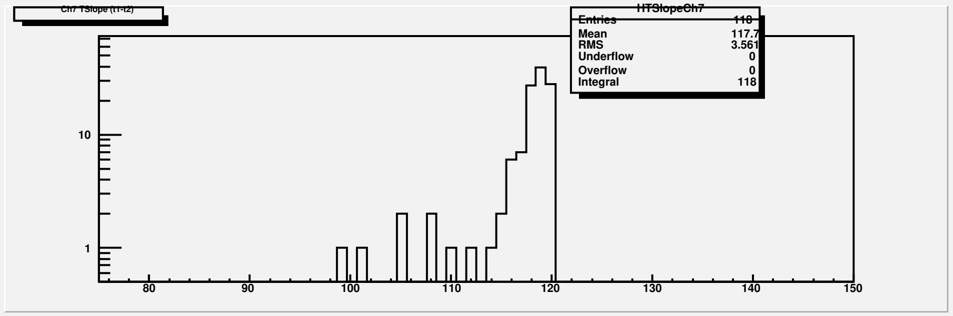

Ch5 QDiff: Q0-Q2
HQDiffCh5
Entries 4
Mean 4
RMS 1.732
Underflow 0
Overflow 0
Integral 4
1
-20
0
20
40
60
80
100
120

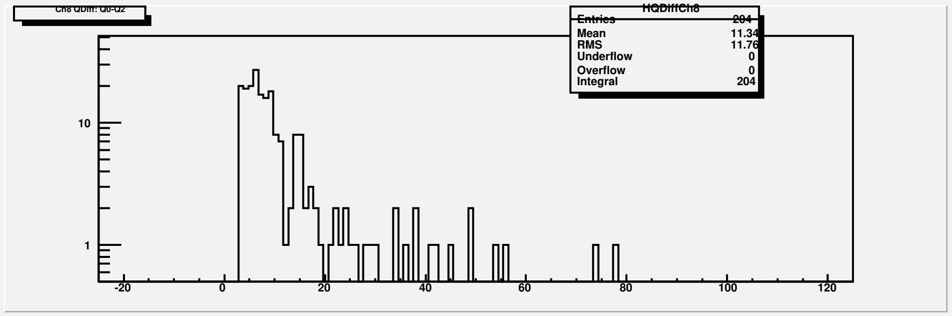

Ch5 TSlope (t1-t2)
HTSlopeCh5
Entries 4
Mean 120.8
RMS 1.09
Underflow 0
Overflow 0
Integral 4
1
80
90
100
110
120
130
140
150

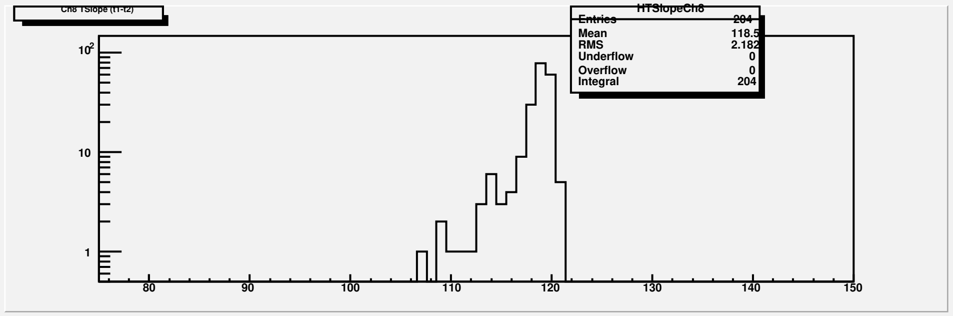

Ch6 QDiff: Q0-Q2
HQDiffCh6
Entries 28
Mean 8.607
RMS 11.57
Underflow 0
Overflow 0
Integral 28
10
1
-20
0
20
40
60
80
100
120

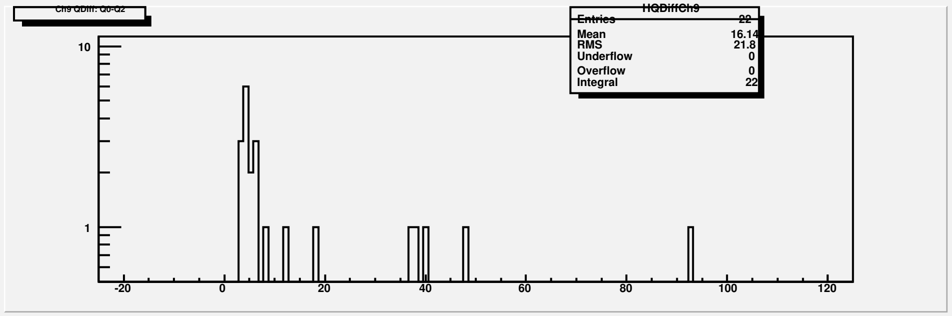

Ch6 TSlope (t1-t2)
HTSlopeCh6
Entries 28
Mean 117.9
RMS 4.577
Underflow 0
Overflow 0
Integral 28
10
1
80
90
100
110
120
130
140
150

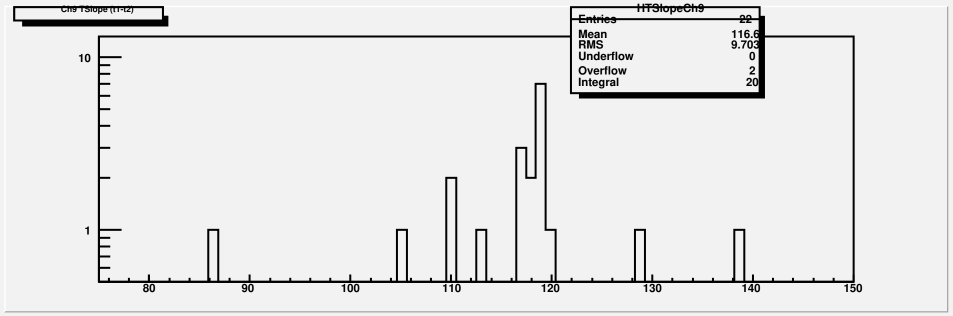

Ch7 QDiff: Q0-Q2
HQDiffCh7
Entries 118
Mean 12.36
RMS 14.88
Underflow 0
Overflow 0
Integral 118
10
1
-20
0
20
40
60
80
100
120

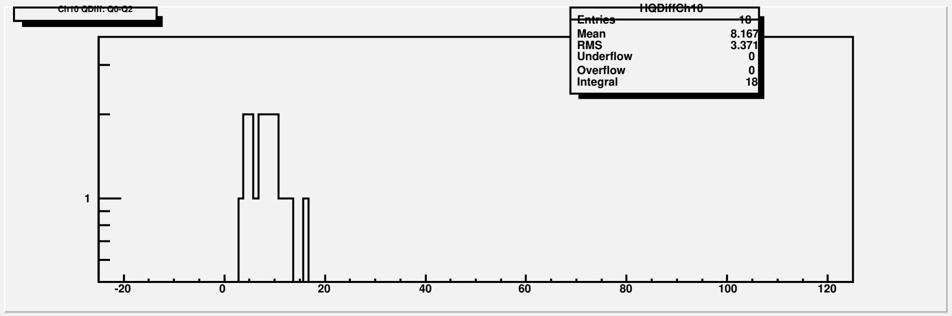

Ch7 TSlope (t1-t2)
HTSlopeCh7
Entries 118
Mean 117.7
RMS 3.561
Underflow 0
Overflow 0
Integral 118
10
1
80
90
100
110
120
130
140
150

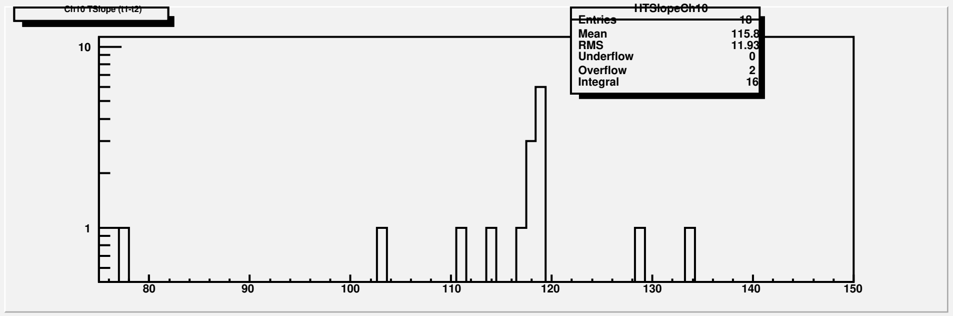

Ch8 QDiff: Q0-Q2
HQDiffCh8
Entries 204
Mean 11.34
RMS 11.76
Underflow 0
Overflow 0
Integral 204
10
1
-20
0
20
40
60
80
100
120

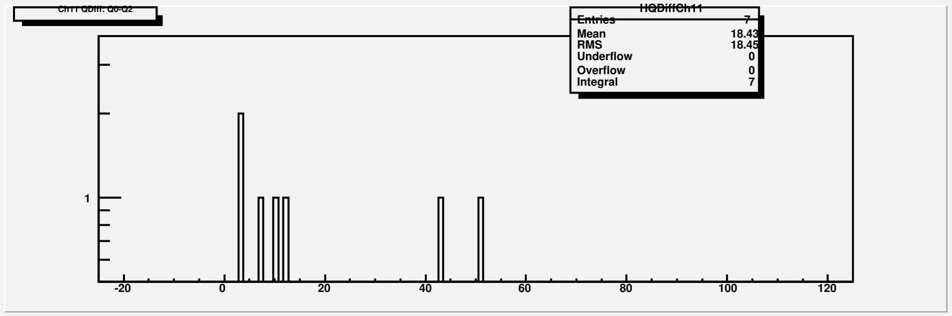

Ch8 TSlope (t1-t2)
HTSlopeCh8
Entries 204
Mean 118.5
RMS 2.182
Underflow 0
Overflow 0
Integral 204
10^{2}
10
1
80
90
100
110
120
130
140
150

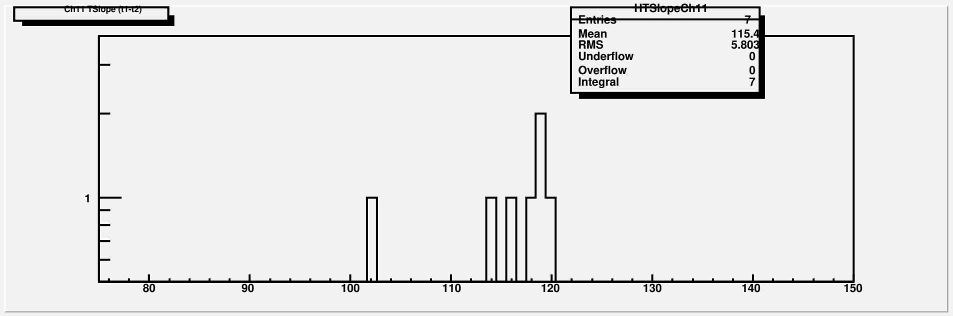

Ch9 QDiff: Q0-Q2
HQDiffCh9
Entries 22
Mean 16.14
RMS 21.8
Underflow 0
Overflow 0
Integral 22
10
1
-20
0
20
40
60
80
100
120


Ch9 TSlope (t1-t2)
HTSlopeCh9
Entries 22
Mean 116.6
RMS 9.703
Underflow 0
Overflow 2
Integral 20
10
1
80
90
100
110
120
130
140
150

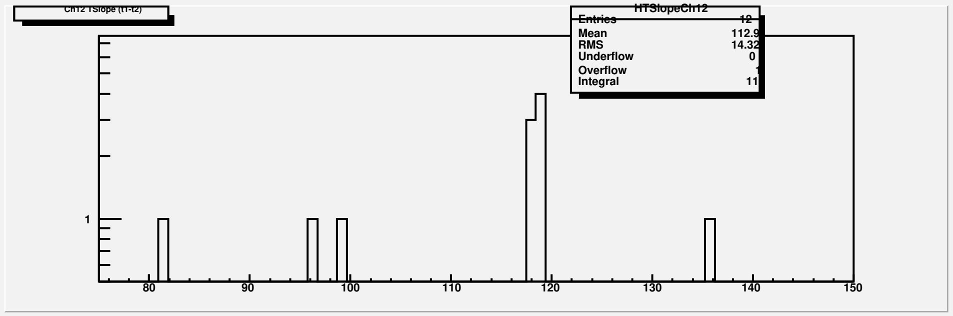

Ch10 QDiff: Q0-Q2
HQDiffCh10
Entries 18
Mean 8.167
RMS 3.371
Underflow 0
Overflow 0
Integral 18
1
-20
0
20
40
60
80
100
120

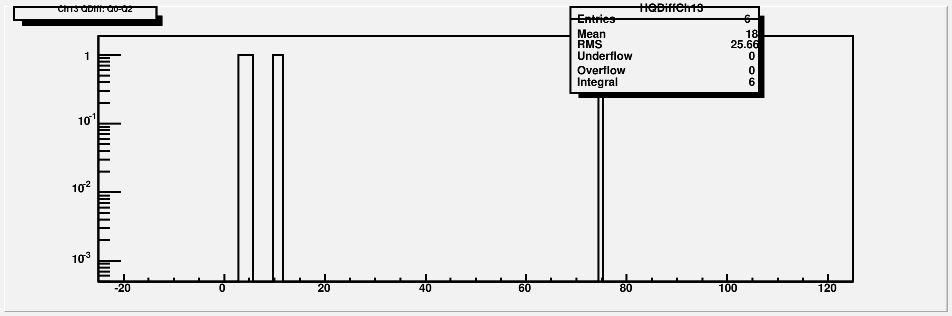

Ch10 TSlope (t1-t2)
HTSlopeCh10
Entries 18
Mean 115.8
RMS 11.93
Underflow 0
Overflow 2
Integral 16
10
1
80
90
100
110
120
130
140
150

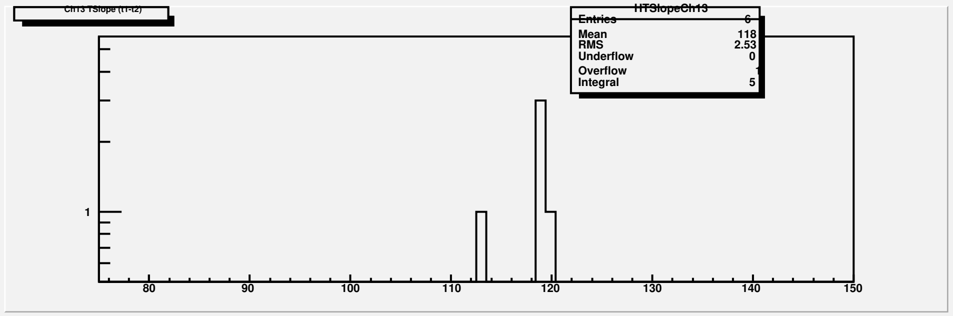

Ch11 QDiff: Q0-Q2
HQDiffCh11
Entries 7
Mean 18.43
RMS 18.45
Underflow 0
Overflow 0
Integral 7
1
-20
0
20
40
60
80
100
120

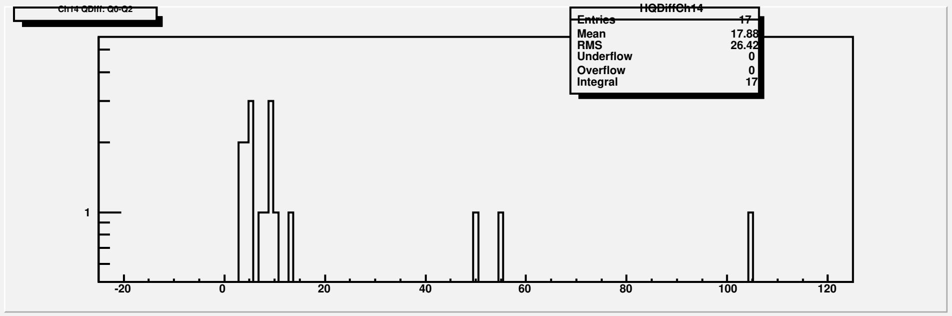

Ch11 TSlope (t1-t2)
HTSlopeCh11
Entries 7
Mean 115.4
RMS 5.803
Underflow 0
Overflow 0
Integral 7
1
80
90
100
110
120
130
140
150

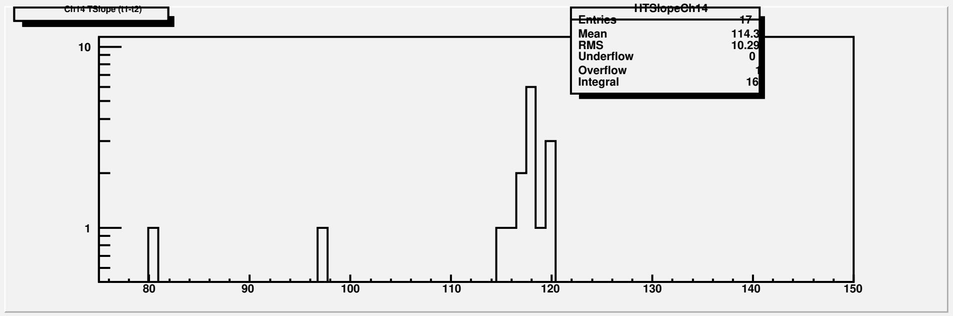

Ch12 QDiff: Q0-Q2
HQDiffCh12
Entries 12
Mean 6.667
RMS 3.682
Underflow 0
Overflow 0
Integral 12
1
-20
0
20
40
60
80
100
120

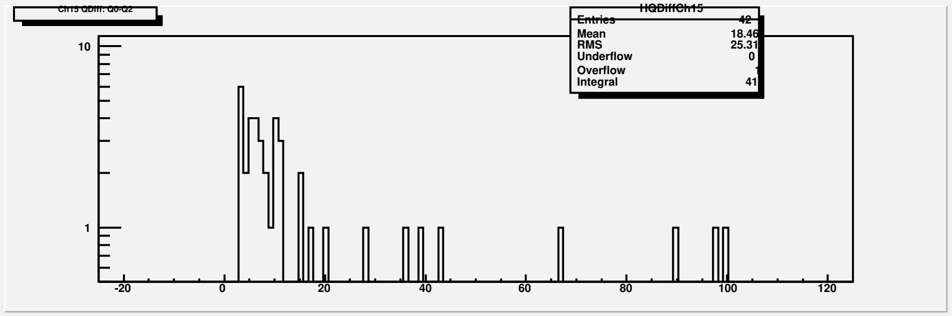

Ch12 TSlope (t1-t2)
HTSlopeCh12
Entries 12
Mean 112.9
RMS 14.32
Underflow 0
Overflow 1
Integral 11
1
80
90
100
110
120
130
140
150

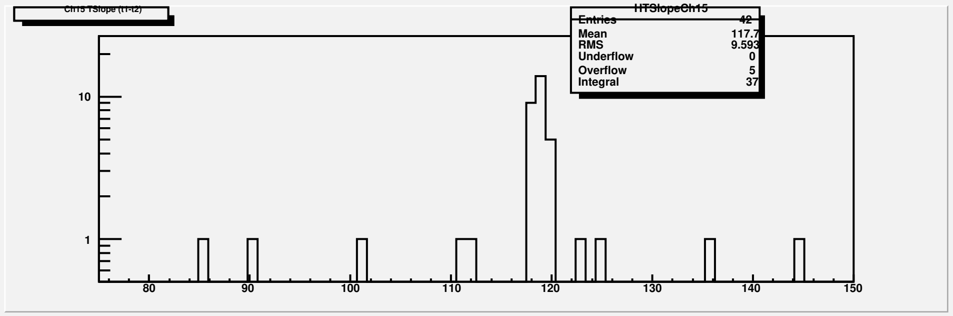

Ch13 QDiff: Q0-Q2
HQDiffCh13
Entries 6
Mean 18
RMS 25.66
Underflow 0
Overflow 0
Integral 6
1
10^-1
10^-2
10^-3
-20
0
20
40
60
80
100
120


Ch13 TSlope (t1-t2)
HTSlopeCh13
Entries 6
Mean 118
RMS 2.53
Underflow 0
Overflow 1
Integral 5
1
80
90
100
110
120
130
140
150

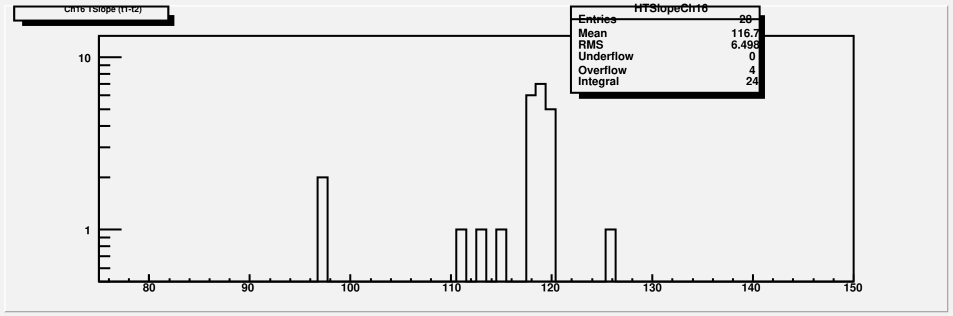

Ch14 QDiff: Q0-Q2
HQDiffCh14
Entries 17
Mean 17.88
RMS 26.42
Underflow 0
Overflow 0
Integral 17
1
-20
0
20
40
60
80
100
120


Ch14 TSlope (t1-t2)
HTSlopeCh14
Entries 17
Mean 114.3
RMS 10.29
Underflow 0
Overflow 1
Integral 16
10
1
80
90
100
110
120
130
140
150

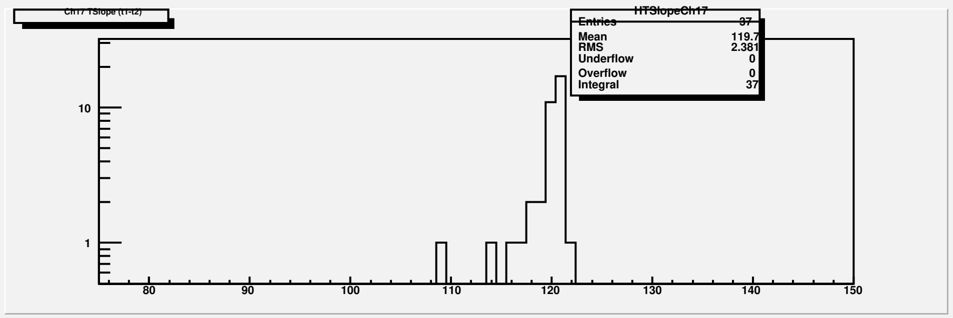

Ch15 QDiff: Q0-Q2
HQDiffCh15
Entries 42
Mean 18.46
RMS 25.31
Underflow 0
Overflow 1
Integral 41
10
1
-20
0
20
40
60
80
100
120

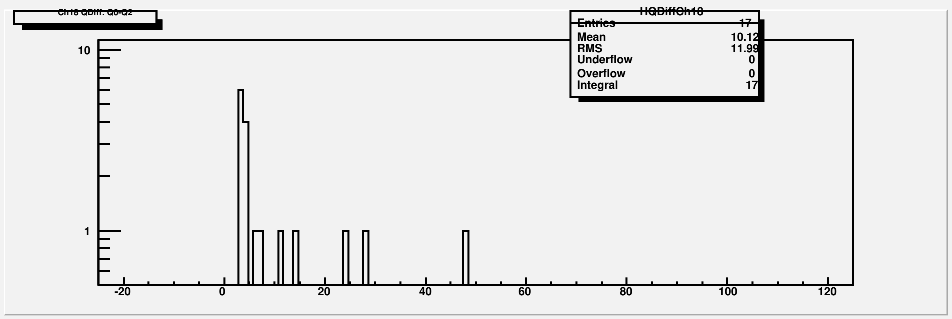

Ch15 TSlope (t1-t2)
HTSlopeCh15
Entries 42
Mean 117.7
RMS 9.593
Underflow 0
Overflow 5
Integral 37
10
1
80
90
100
110
120
130
140
150

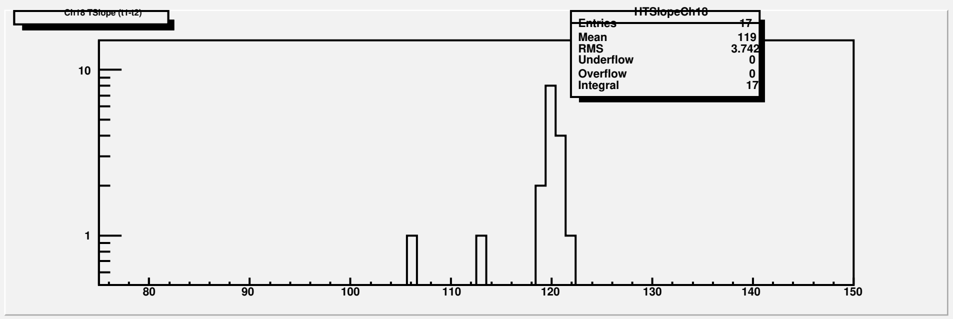

Ch16 QDiff: Q0-Q2
HQDiffCh16
Entries 28
Mean 8.464
RMS 7.253
Underflow 0
Overflow 0
Integral 28
1
-20
0
20
40
60
80
100
120

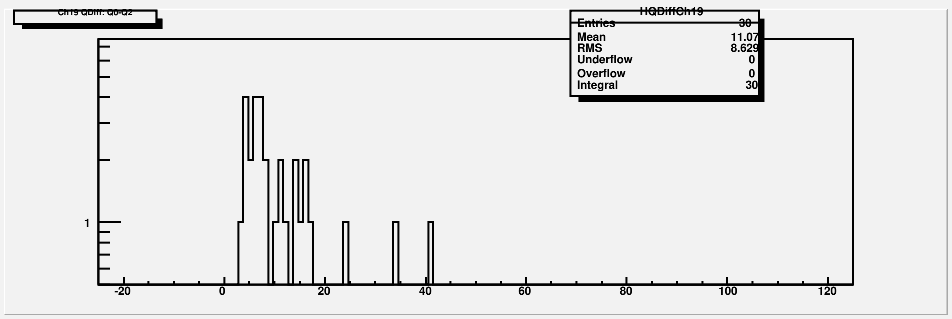

Ch16 TSlope (t1-t2)
HTSlopeCh16
Entries 28
Mean 116.7
RMS 6.498
Underflow 0
Overflow 4
Integral 24
10
1
80
90
100
110
120
130
140
150

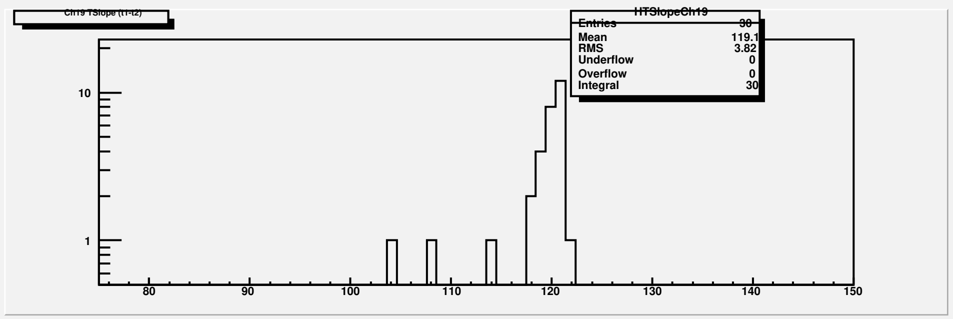

Ch17 QDiff: Q0-Q2
HQDiffCh17
Entries 37
Mean 9.514
RMS 8.949
Underflow 0
Overflow 0
Integral 37
10
1
-20
0
20
40
60
80
100
120

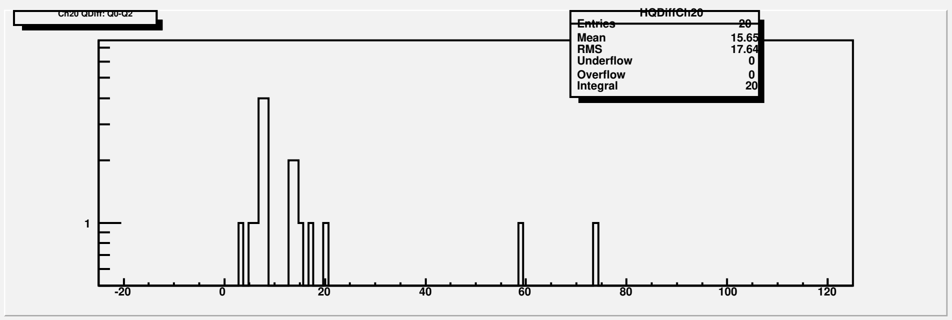

Ch17 TSlope (t1-t2)
HTSlopeCh17
Entries 37
Mean 119.7
RMS 2.381
Underflow 0
Overflow 0
Integral 37
10
1
80
90
100
110
120
130
140
150

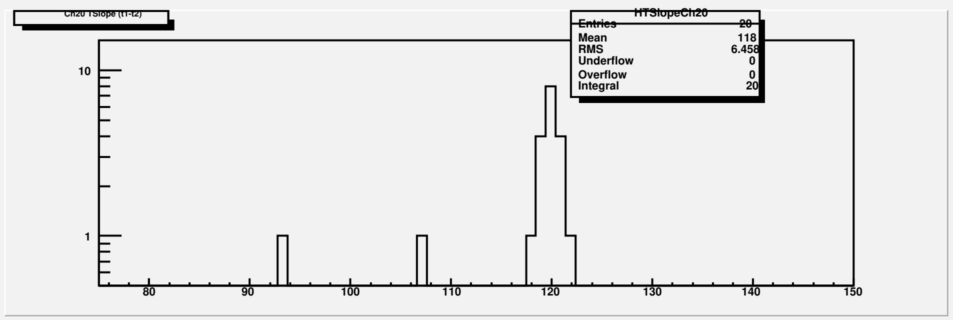

Ch18 QDiff: Q0-Q2
HQDiffCh18
Entries 17
Mean 10.12
RMS 11.99
Underflow 0
Overflow 0
Integral 17
10
1
-20
0
20
40
60
80
100
120

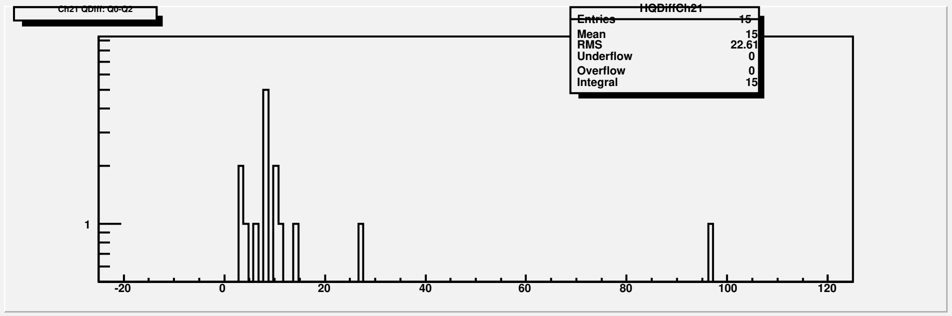

Ch18 TSlope (t1-t2)
HTSlopeCh18
Entries 17
Mean 119
RMS 3.742
Underflow 0
Overflow 0
Integral 17
10
1
80
90
100
110
120
130
140
150

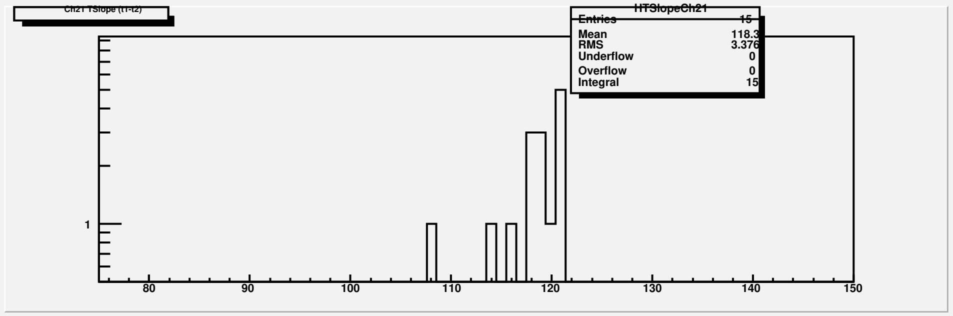

Ch19 QDiff: Q0-Q2
HQDiffCh19
Entries 30
Mean 11.07
RMS 8.629
Underflow 0
Overflow 0
Integral 30
1
-20
0
20
40
60
80
100
120

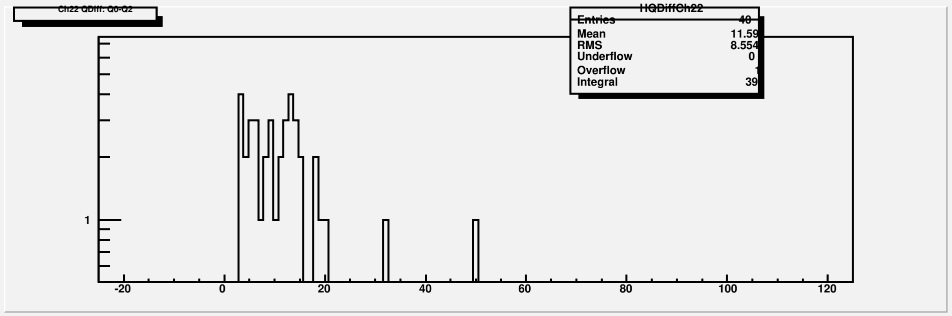

Ch19 TSlope (t1-t2)
HTSlopeCh19
Entries 30
Mean 119.1
RMS 3.82
Underflow 0
Overflow 0
Integral 30
10
1
80
90
100
110
120
130
140
150

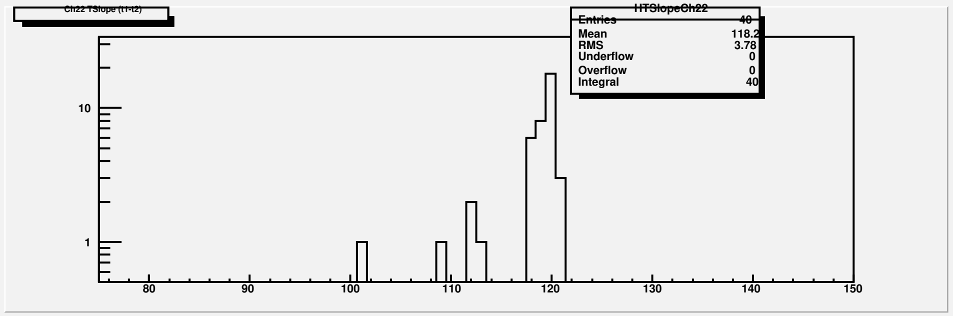

Ch20 QDiff: Q0-Q2
HQDiffCh20
Entries 20
Mean 15.65
RMS 17.64
Underflow 0
Overflow 0
Integral 20
1
-20
0
20
40
60
80
100
120

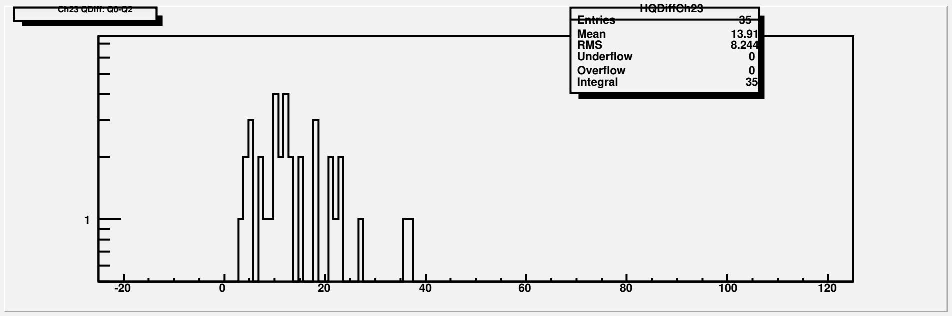

Ch20 TSlope (t1-t2)
HTSlopeCh20
Entries 20
Mean 118
RMS 6.458
Underflow 0
Overflow 0
Integral 20
10
1
80
90
100
110
120
130
140
150

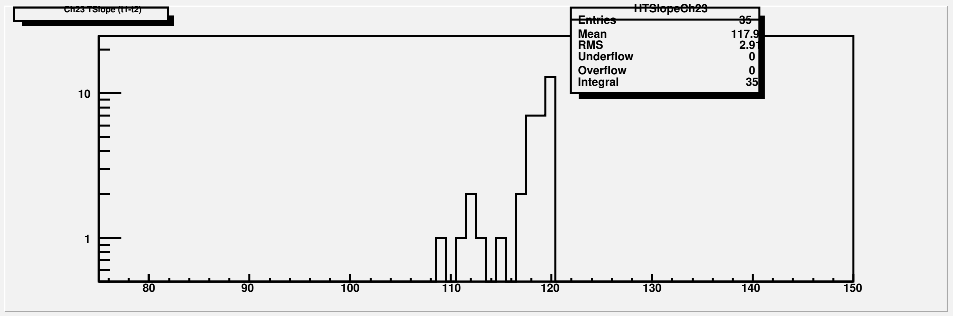

Ch21 QDiff: Q0-Q2
HQDiffCh21
Entries 15
Mean 15
RMS 22.61
Underflow 0
Overflow 0
Integral 15
1
-20
0
20
40
60
80
100
120

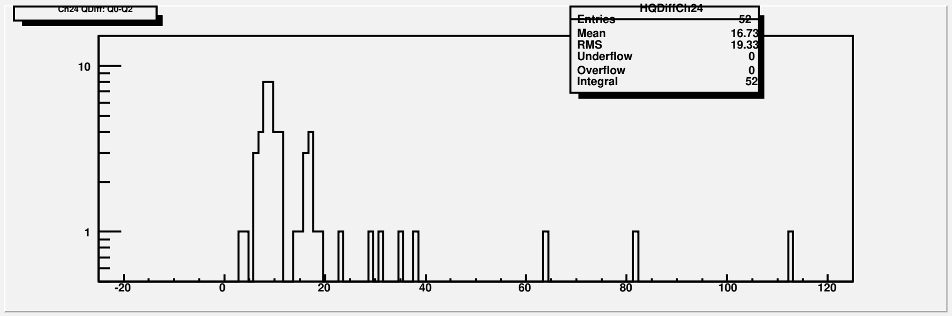

Ch21 TSlope (t1-t2)
HTSlopeCh21
Entries 15
Mean 118.3
RMS 3.376
Underflow 0
Overflow 0
Integral 15
1
80
90
100
110
120
130
140
150

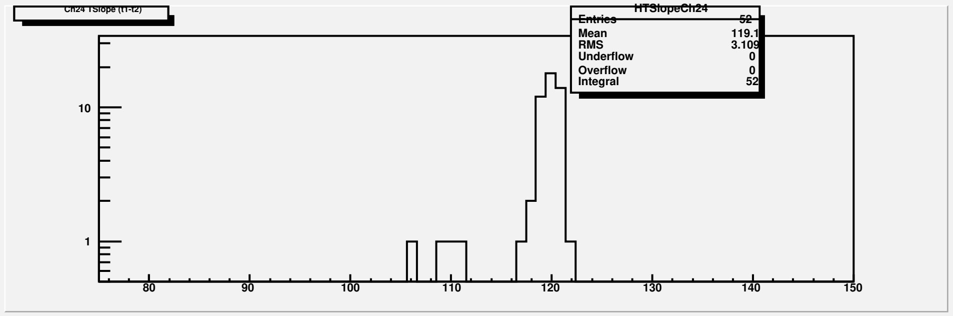

Ch22 QDiff: Q0-Q2
HQDiffCh22
Entries 40
Mean 11.59
RMS 8.554
Underflow 0
Overflow 1
Integral 39
1
-20
0
20
40
60
80
100
120


Ch22 TSlope (t1-t2)
HTSlopeCh22
Entries 40
Mean 118.2
RMS 3.78
Underflow 0
Overflow 0
Integral 40
10
1
80
90
100
110
120
130
140
150

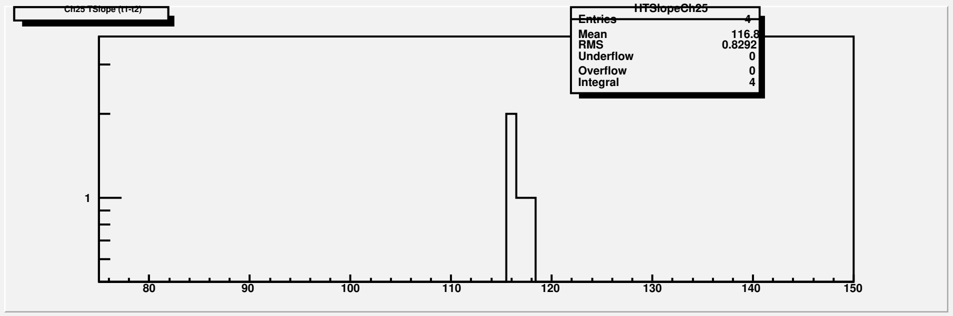

Ch23 QDiff: Q0-Q2
HQDiffCh23
Entries 35
Mean 13.91
RMS 8.244
Underflow 0
Overflow 0
Integral 35
1
-20
0
20
40
60
80
100
120

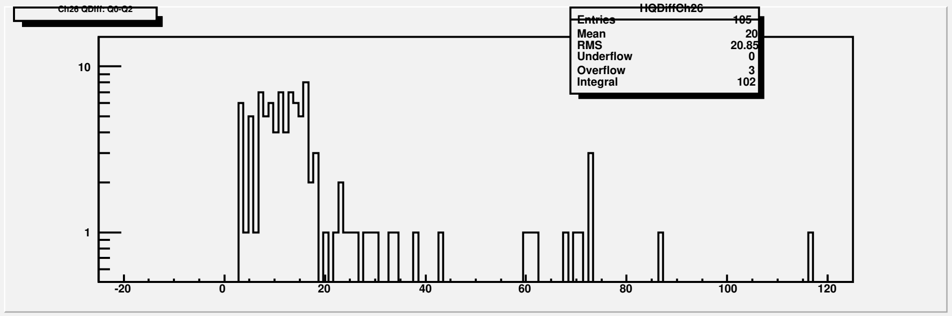

Ch23 TSlope (t1-t2)
HTSlopeCh23
Entries 35
Mean 117.9
RMS 2.91
Underflow 0
Overflow 0
Integral 35
10
1
80
90
100
110
120
130
140
150

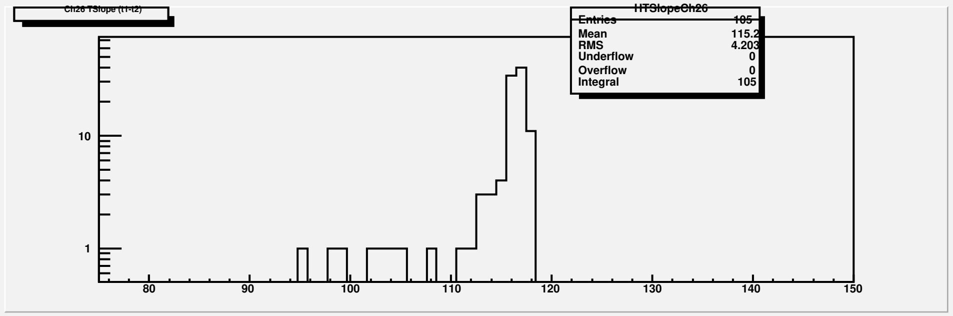

Ch24 QDiff: Q0-Q2
HQDiffCh24
Entries 52
Mean 16.73
RMS 19.33
Underflow 0
Overflow 0
Integral 52
10
1
-20
0
20
40
60
80
100
120


Ch24 TSlope (t1-t2)
HTSlopeCh24
Entries 52
Mean 119.1
RMS 3.109
Underflow 0
Overflow 0
Integral 52
10
1
80
90
100
110
120
130
140
150

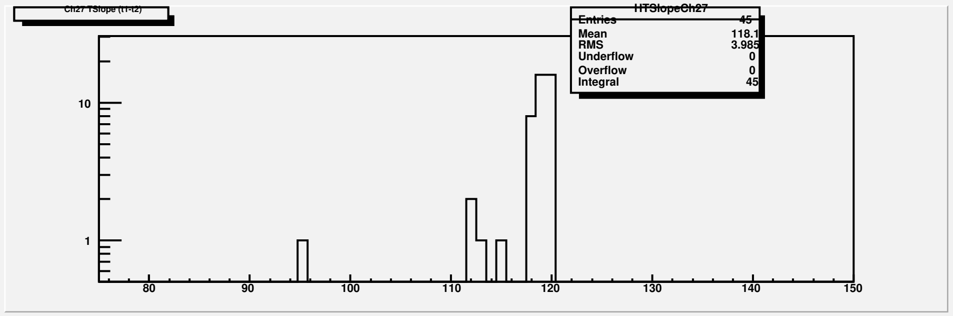

Ch25 QDiff: Q0-Q2
HQDiffCh25
Entries 4
Mean 3.5
RMS 0.866
Underflow 0
Overflow 0
Integral 4
1
-20
0
20
40
60
80
100
120

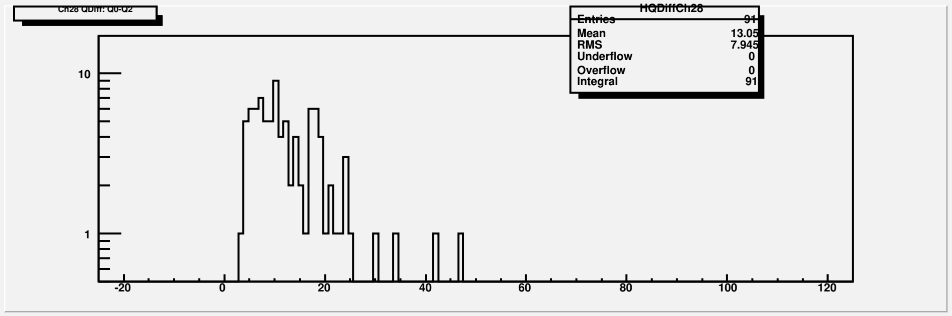

Ch25 TSlope (t1-t2)
HTSlopeCh25
Entries 4
Mean 116.8
RMS 0.8292
Underflow 0
Overflow 0
Integral 4
1
80
90
100
110
120
130
140
150

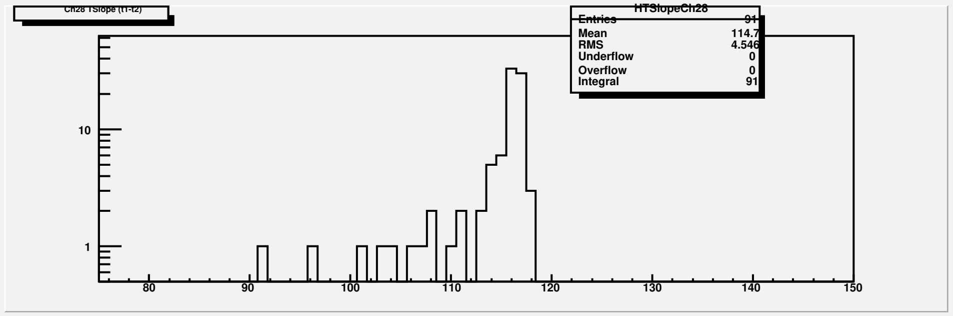

Ch26 QDiff: Q0-Q2
HQDiffCh26
Entries 105
Mean 20
RMS 20.85
Underflow 0
Overflow 3
Integral 102
10
1
-20
0
20
40
60
80
100
120


Ch26 TSlope (t1-t2)
HTSlopeCh26
Entries 105
Mean 115.2
RMS 4.203
Underflow 0
Overflow 0
Integral 105
10
1
80
90
100
110
120
130
140
150

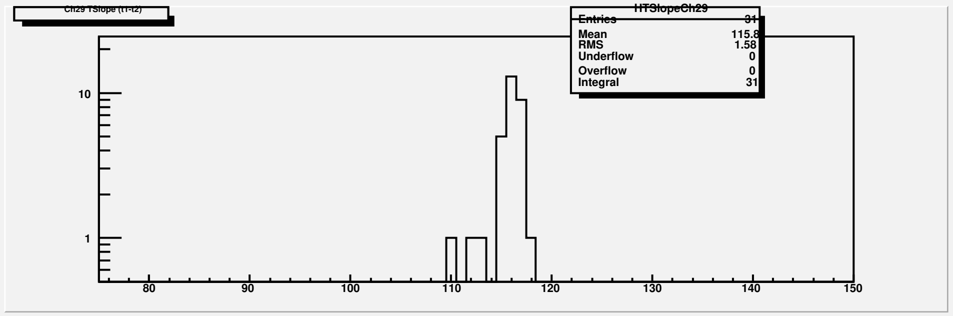

Ch27 QDiff: Q0-Q2
HQDiffCh27
Entries 45
Mean 6.911
RMS 4.857
Underflow 0
Overflow 0
Integral 45
10
1
-20
0
20
40
60
80
100
120

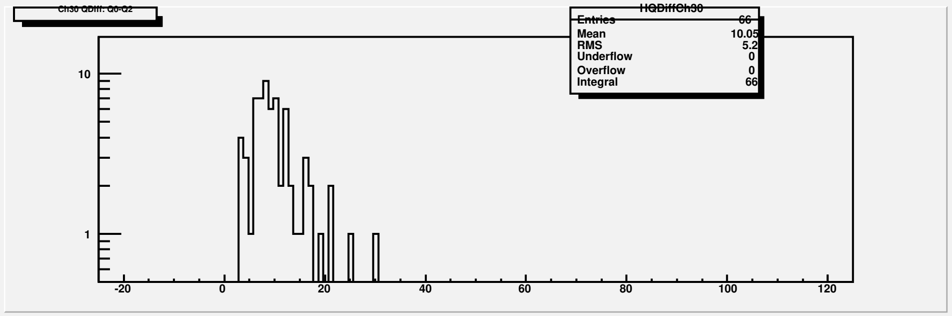

Ch27 TSlope (t1-t2)
HTSlopeCh27
Entries 45
Mean 118.1
RMS 3.985
Underflow 0
Overflow 0
Integral 45
10
1
80
90
100
110
120
130
140
150

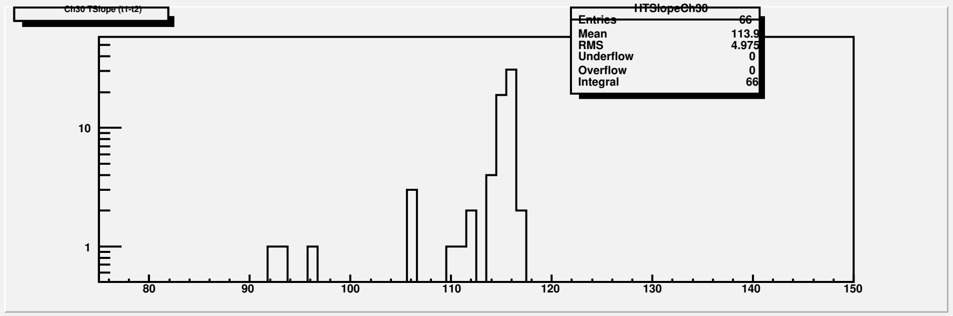

Ch28 QDiff: Q0-Q2
HQDiffCh28
Entries 91
Mean 13.05
RMS 7.945
Underflow 0
Overflow 0
Integral 91
10
1
-20
0
20
40
60
80
100
120


Ch28 TSlope (t1-t2)
HTSlopeCh28
Entries 91
Mean 114.7
RMS 4.546
Underflow 0
Overflow 0
Integral 91
10
1
80
90
100
110
120
130
140
150

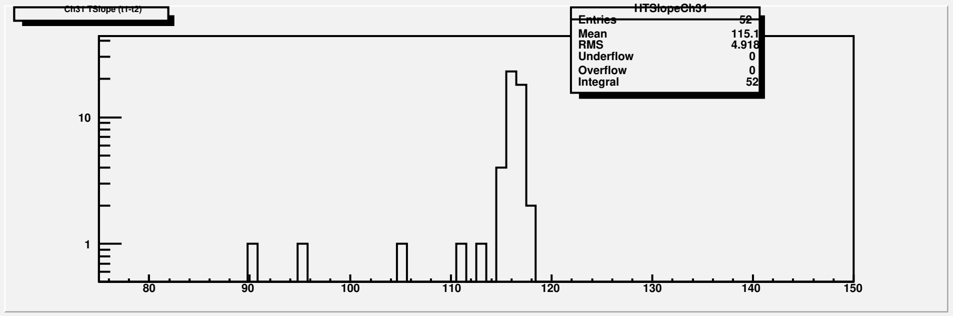

Ch29 QDiff: Q0-Q2
HQDiffCh29
Entries 31
Mean 8.871
RMS 10.78
Underflow 0
Overflow 0
Integral 31
10
1
-20
0
20
40
60
80
100
120

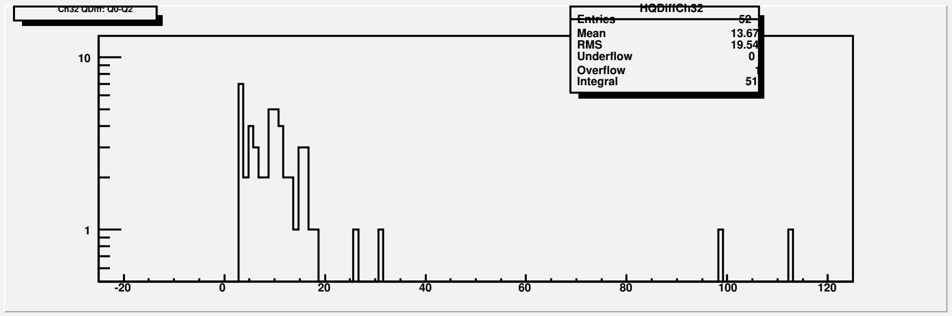

Ch29 TSlope (t1-t2)
HTSlopeCh29
Entries 31
Mean 115.8
RMS 1.58
Underflow 0
Overflow 0
Integral 31
10
1
80
90
100
110
120
130
140
150

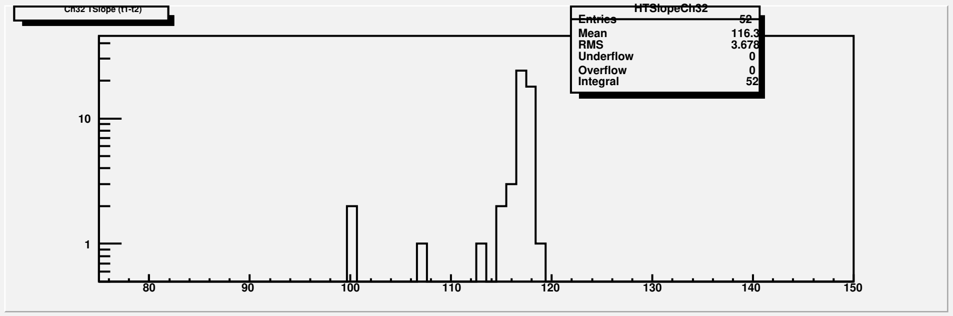

Ch30 QDiff: Q0-Q2
HQDiffCh30
Entries 66
Mean 10.05
RMS 5.2
Underflow 0
Overflow 0
Integral 66
10
1
-20
0
20
40
60
80
100
120


Ch30 TSlope (t1-t2)
HTSlopeCh30
Entries 66
Mean 113.9
RMS 4.975
Underflow 0
Overflow 0
Integral 66
10
1
80
90
100
110
120
130
140
150

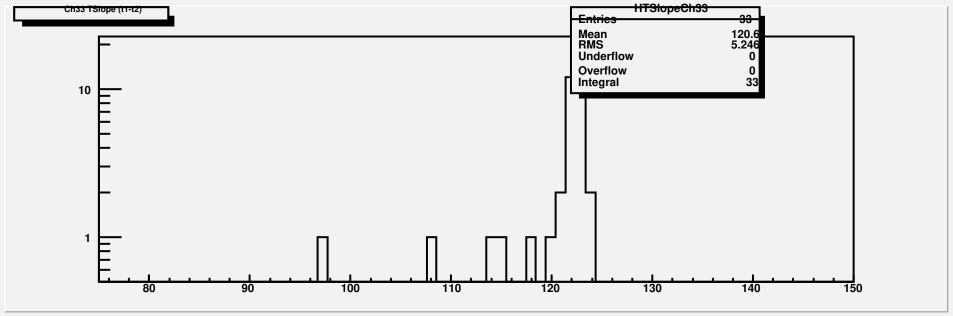

Ch31 QDiff: Q0-Q2
HQDiffCh31
Entries 52
Mean 10.6
RMS 15.37
Underflow 0
Overflow 0
Integral 52
10
1
-20
0
20
40
60
80
100
120

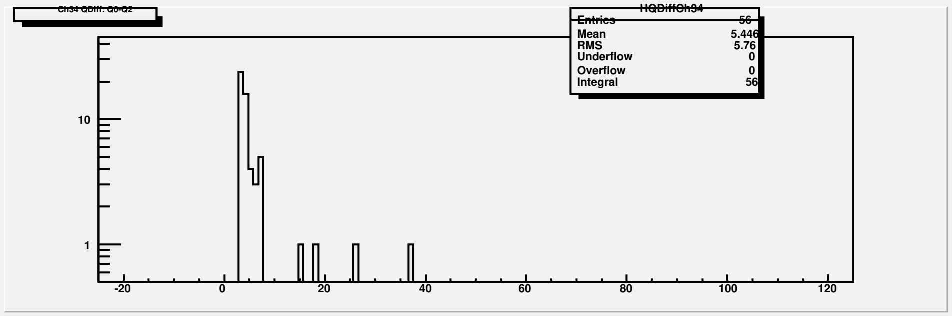

Ch31 TSlope (t1-t2)
HTSlopeCh31
Entries 52
Mean 115.1
RMS 4.918
Underflow 0
Overflow 0
Integral 52
10
1
80
90
100
110
120
130
140
150

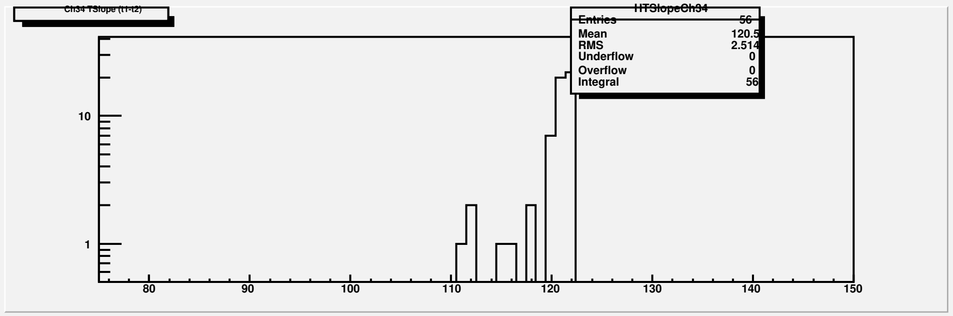

Ch32 QDiff: Q0-Q2
HQDiffCh32
Entries 52
Mean 13.67
RMS 19.54
Underflow 0
Overflow 1
Integral 51
10
1
-20
0
20
40
60
80
100
120


Ch32 TSlope (t1-t2)
HTSlopeCh32
Entries 52
Mean 116.3
RMS 3.678
Underflow 0
Overflow 0
Integral 52
10
1
80
90
100
110
120
130
140
150

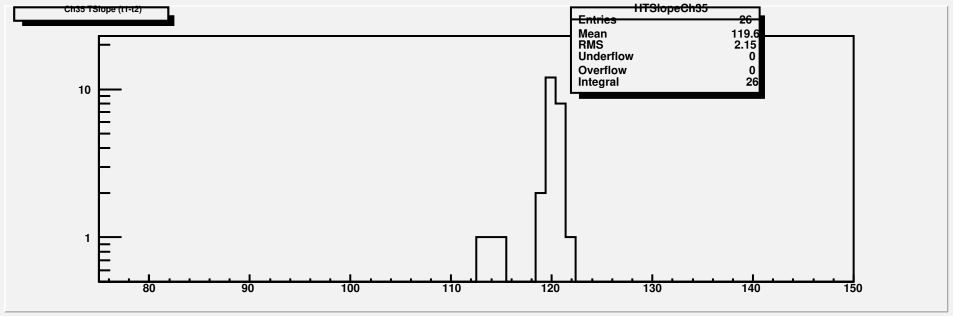

Ch33 QDiff: Q0-Q2
HQDiffCh33
Entries 33
Mean 6.515
RMS 6.416
Underflow 0
Overflow 0
Integral 33
10
1
-20
0
20
40
60
80
100
120


Ch33 TSlope (t1-t2)
HTSlopeCh33
Entries 33
Mean 120.6
RMS 5.246
Underflow 0
Overflow 0
Integral 33
10
1
80
90
100
110
120
130
140
150

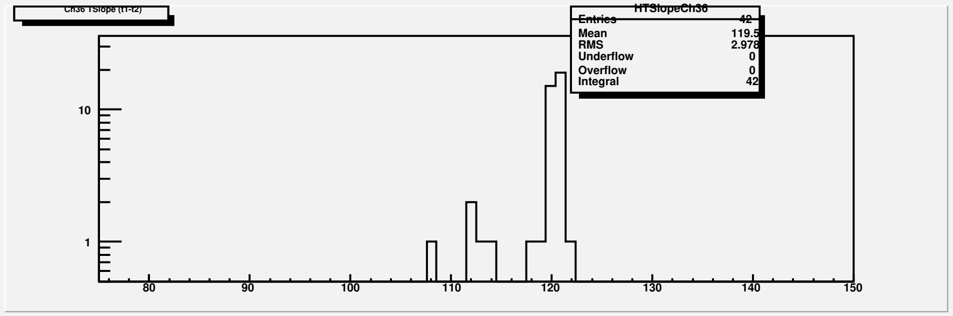

Ch34 QDiff: Q0-Q2
HQDiffCh34
Entries 56
Mean 5.446
RMS 5.76
Underflow 0
Overflow 0
Integral 56
10
1
-20
0
20
40
60
80
100
120

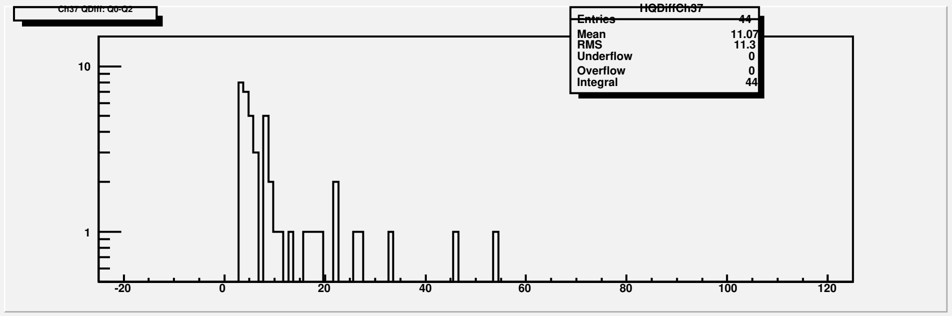

Ch34 TSlope (t1-t2)
HTSlopeCh34
Entries 56
Mean 120.5
RMS 2.514
Underflow 0
Overflow 0
Integral 56
10
1
80
90
100
110
120
130
140
150

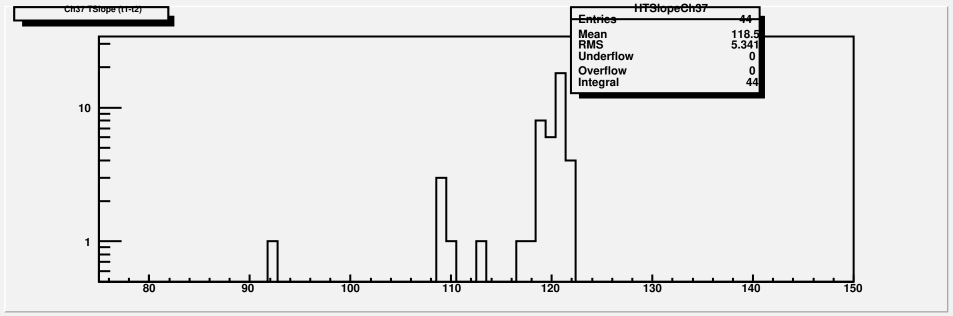

Ch35 QDiff: Q0-Q2
HQDiffCh35
Entries 26
Mean 4.731
RMS 3.276
Underflow 0
Overflow 0
Integral 26
10
1
-20
0
20
40
60
80
100
120

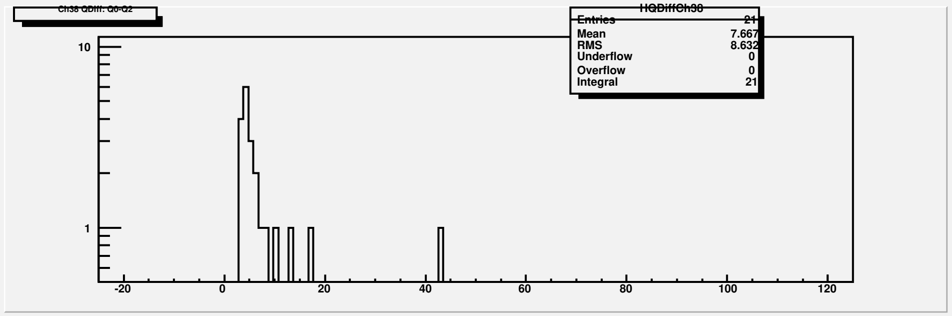

Ch35 TSlope (t1-t2)
HTSlopeCh35
Entries 26
Mean 119.6
RMS 2.15
Underflow 0
Overflow 0
Integral 26
10
1
80
90
100
110
120
130
140
150

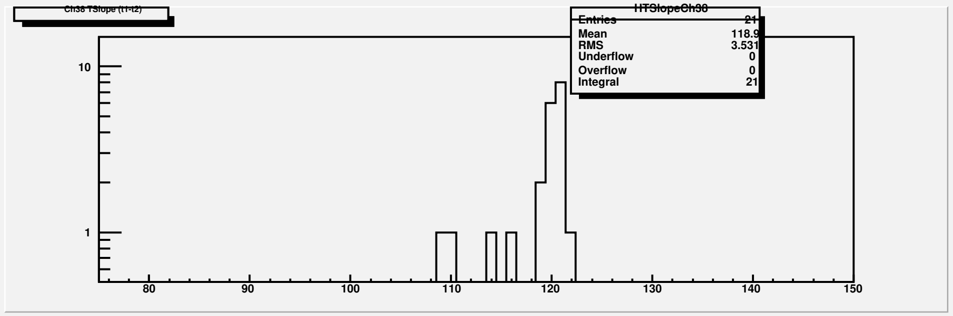

Ch36 QDiff: Q0-Q2
HQDiffCh36
Entries 42
Mean 7.548
RMS 6.363
Underflow 0
Overflow 0
Integral 42
10
1
-20
0
20
40
60
80
100
120

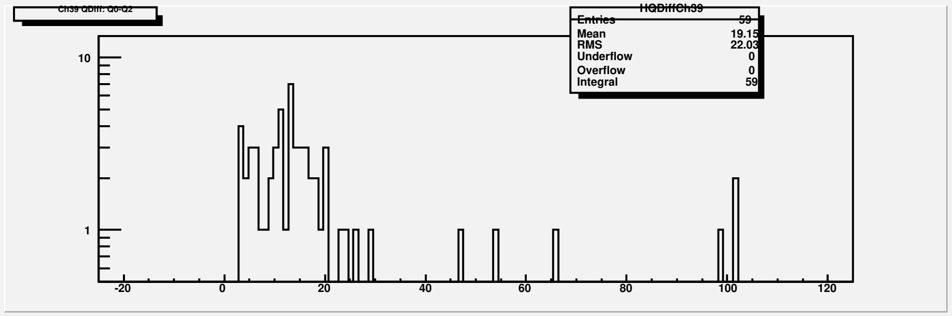

Ch36 TSlope (t1-t2)
HTSlopeCh36
Entries 42
Mean 119.5
RMS 2.978
Underflow 0
Overflow 0
Integral 42
10
1
80
90
100
110
120
130
140
150

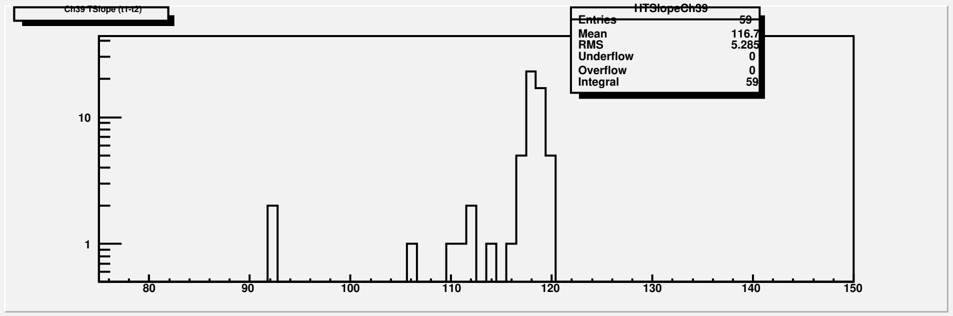

Ch37 QDiff: Q0-Q2
HQDiffCh37
Entries 44
Mean 11.07
RMS 11.3
Underflow 0
Overflow 0
Integral 44
10
1
-20
0
20
40
60
80
100
120

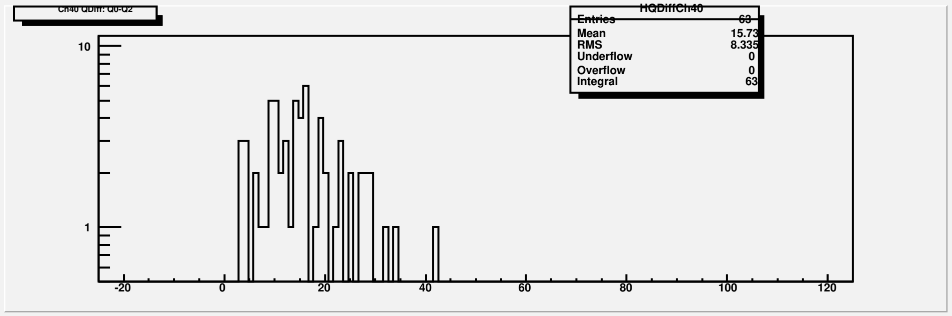

Ch37 TSlope (t1-t2)
HTSlopeCh37
Entries 44
Mean 118.5
RMS 5.341
Underflow 0
Overflow 0
Integral 44
10
1
80
90
100
110
120
130
140
150

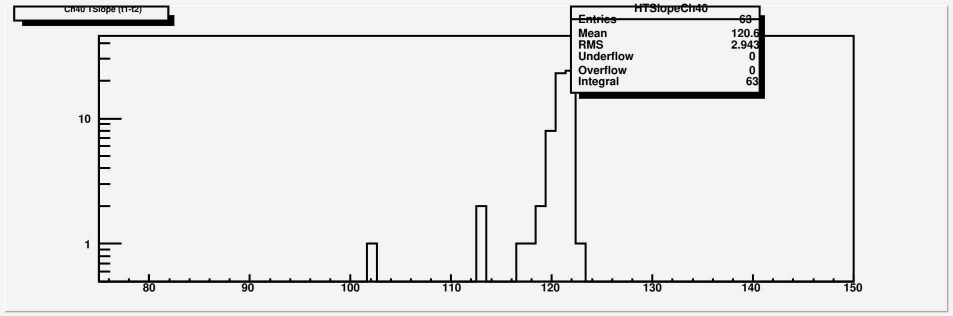

Ch38 QDiff: Q0-Q2
HQDiffCh38
Entries 21
Mean 7.667
RMS 8.632
Underflow 0
Overflow 0
Integral 21
10
1
-20
0
20
40
60
80
100
120

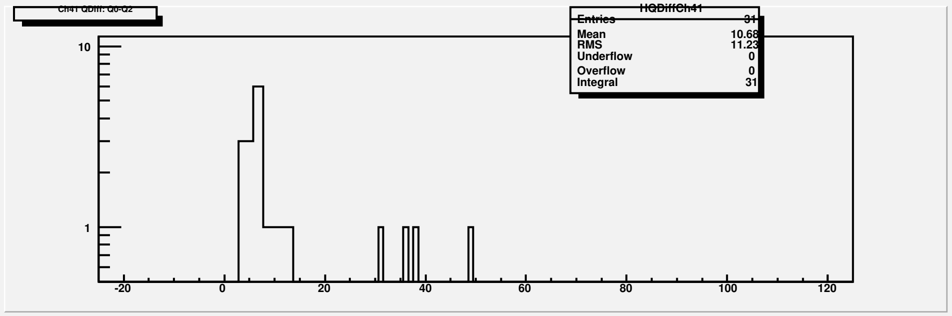

Ch38 TSlope (t1-t2)
HTSlopeCh38
Entries 21
Mean 118.9
RMS 3.531
Underflow 0
Overflow 0
Integral 21
10
1
80
90
100
110
120
130
140
150

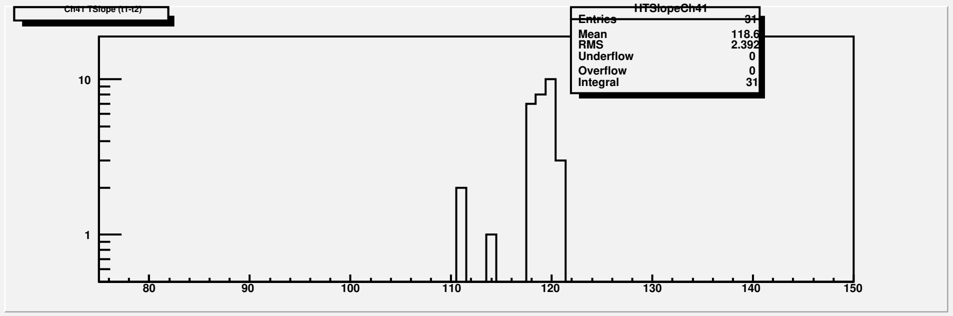

Ch39 QDiff: Q0-Q2
HQDiffCh39
Entries 59
Mean 19.15
RMS 22.03
Underflow 0
Overflow 0
Integral 59
10
1
-20
0
20
40
60
80
100
120

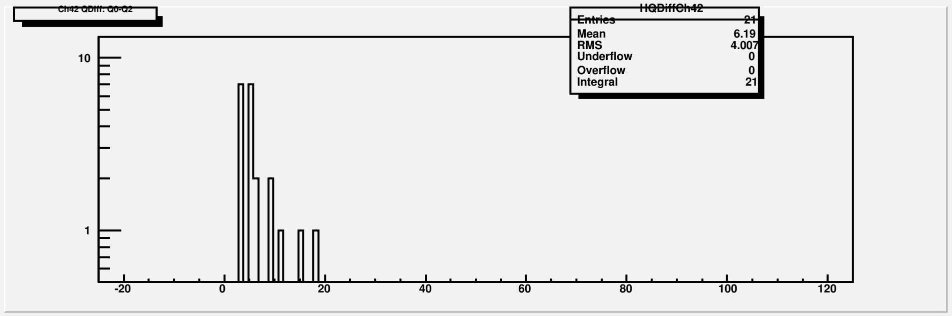

Ch39 TSlope (t1-t2)
HTSlopeCh39
Entries 59
Mean 116.7
RMS 5.285
Underflow 0
Overflow 0
Integral 59
10
1
80
90
100
110
120
130
140
150

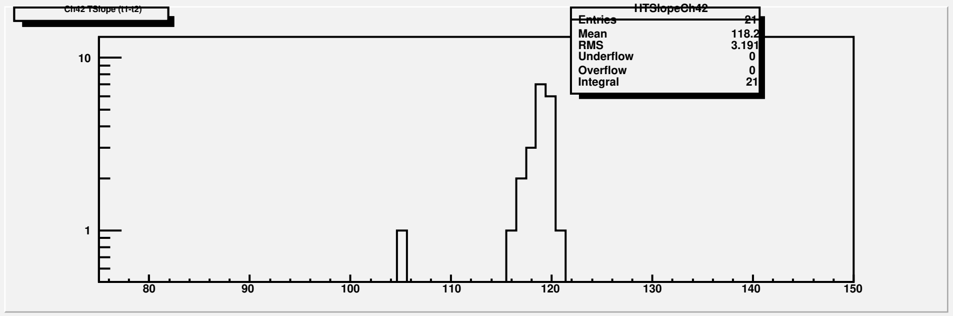

Ch40 QDiff: Q0-Q2
HQDiffCh40
Entries 63
Mean 15.73
RMS 8.335
Underflow 0
Overflow 0
Integral 63
10
1
-20
0
20
40
60
80
100
120

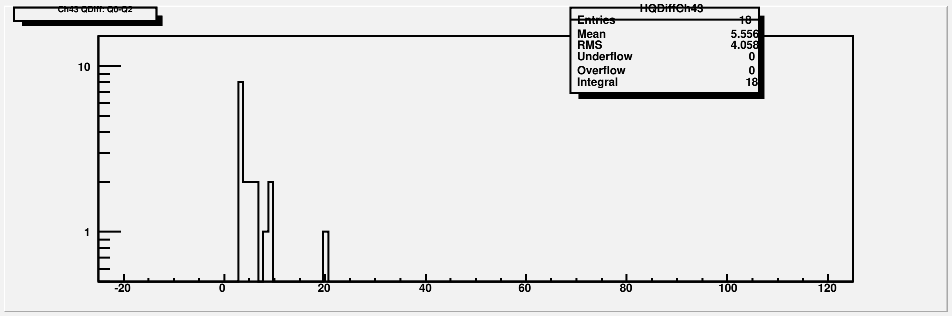

Ch40 TSlope (t1-t2)
HTSlopeCh40
Entries 63
Mean 120.6
RMS 2.943
Underflow 0
Overflow 0
Integral 63
10
1
80
90
100
110
120
130
140
150

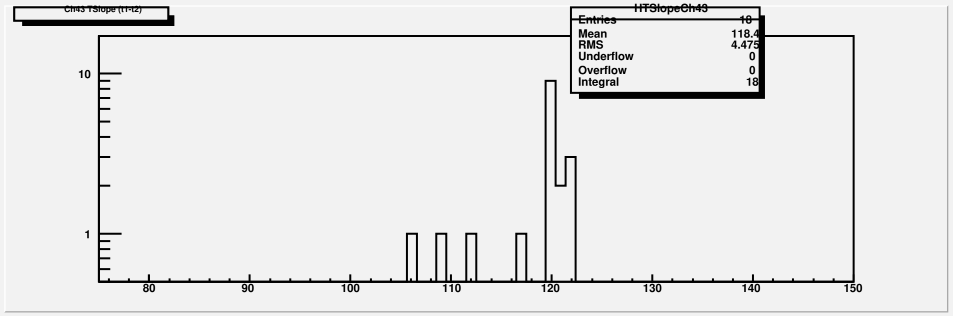

Ch41 QDiff: Q0-Q2
HQDiffCh41
Entries 31
Mean 10.68
RMS 11.23
Underflow 0
Overflow 0
Integral 31
10
1
-20
0
20
40
60
80
100
120


Ch41 TSlope (t1-t2)
HTSlopeCh41
Entries 31
Mean 118.6
RMS 2.392
Underflow 0
Overflow 0
Integral 31
10
1
80
90
100
110
120
130
140
150

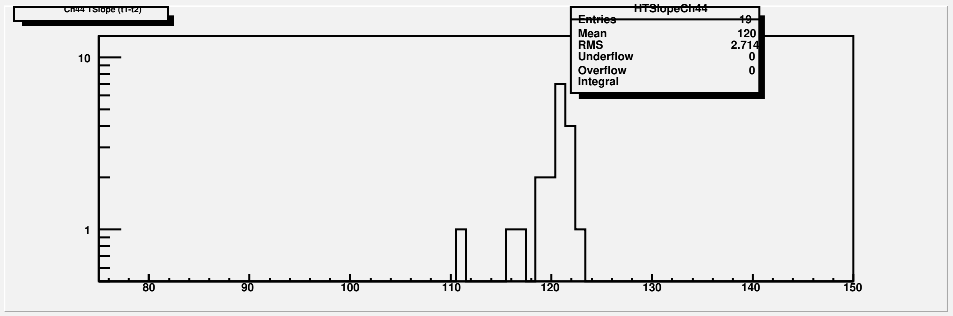

Ch42 QDiff: Q0-Q2
HQDiffCh42
Entries 21
Mean 6.19
RMS 4.007
Underflow 0
Overflow 0
Integral 21
10
1
-20
0
20
40
60
80
100
120


Ch42 TSlope (t1-t2)
HTSlopeCh42
Entries 21
Mean 118.2
RMS 3.191
Underflow 0
Overflow 0
Integral 21
10
1
80
90
100
110
120
130
140
150


Ch43 QDiff: Q0-Q2
HQDiffCh43
Entries 18
Mean 5.556
RMS 4.058
Underflow 0
Overflow 0
Integral 18
10
1
-20
0
20
40
60
80
100
120


Ch43 TSlope (t1-t2)
HTSlopeCh43
Entries 18
Mean 118.4
RMS 4.475
Underflow 0
Overflow 0
Integral 18
10
1
80
90
100
110
120
130
140
150


Ch44 QDiff: Q0-Q2
HQDiffCh44
Entries 19
Mean 5.737
RMS 4.47
Underflow 0
Overflow 0
Integral 19
10
1
-20
0
20
40
60
80
100
120


Ch44 TSlope (t1-t2)
HTSlopeCh44
Entries 19
Mean 120
RMS 2.714
Underflow 0
Overflow 0
Integral
10
1
80
90
100
110
120
130
140
150