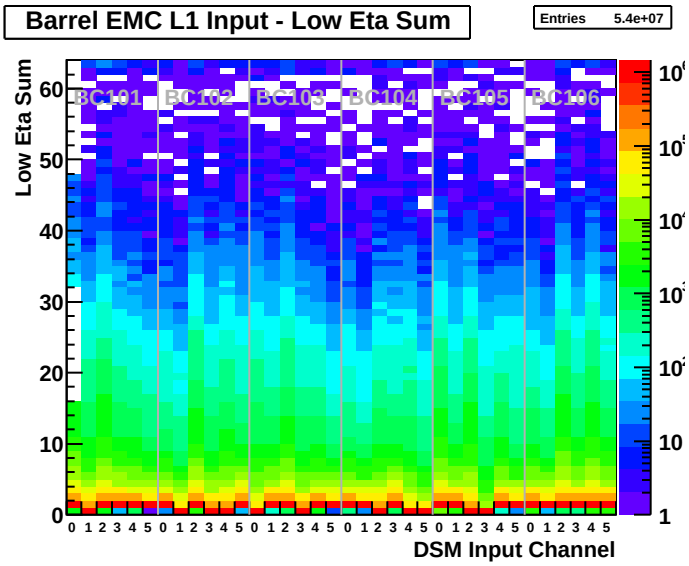
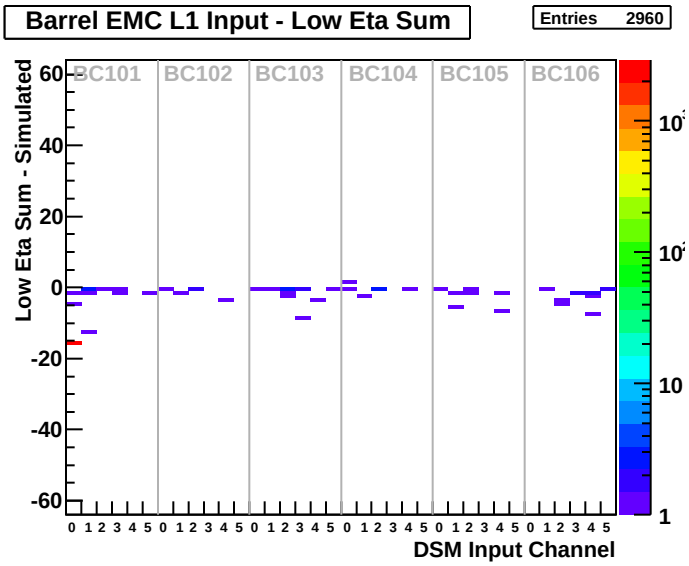
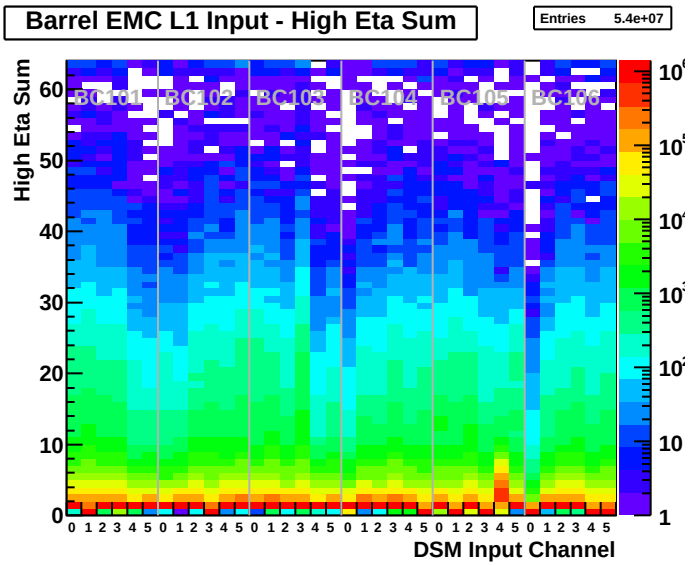
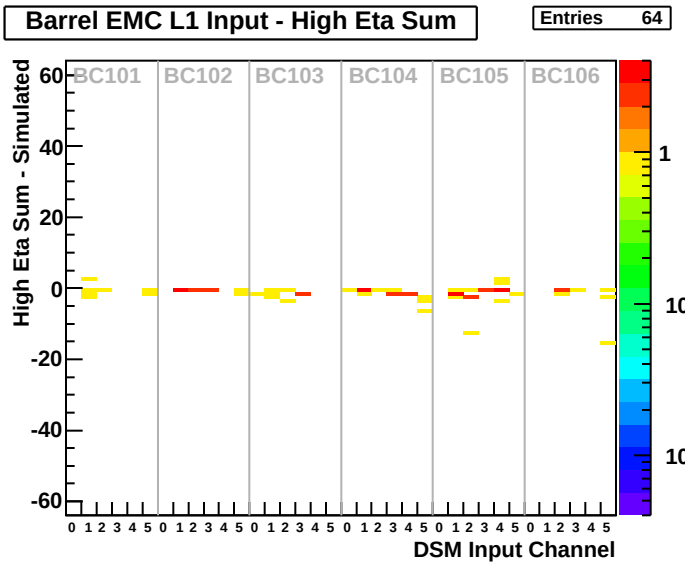
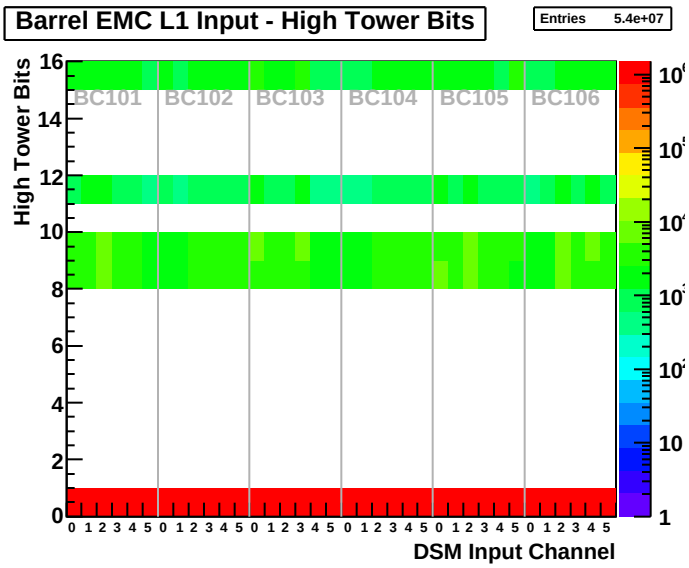
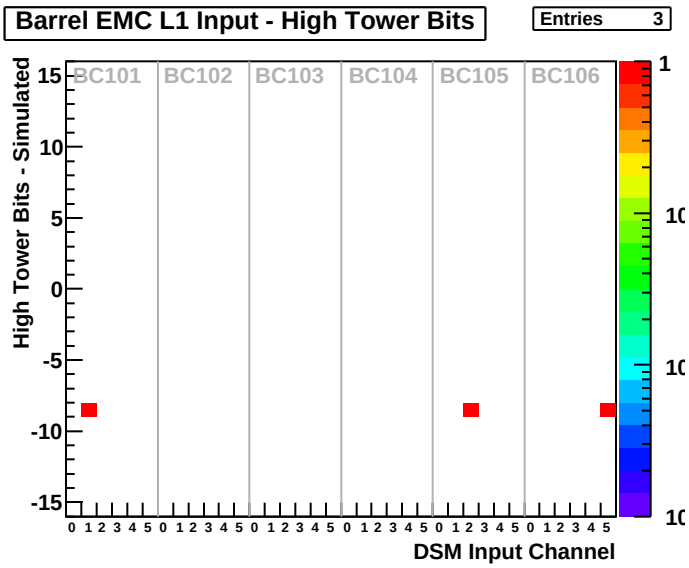

Barrel EMC L1 Input - Low Eta Sum
Entries 5.4e+07
Low Eta Sum
BC101 BC102 BC103 BC104 BC105 BC106
DSM Input Channel

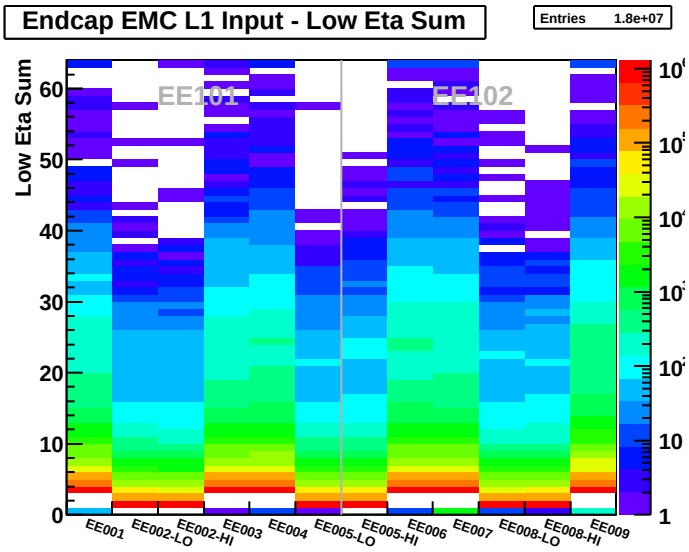

Barrel EMC L1 Input - Low Eta Sum
Entries 2960
Low Eta Sum - Simulated
BC101 BC102 BC103 BC104 BC105 BC106
DSM Input Channel

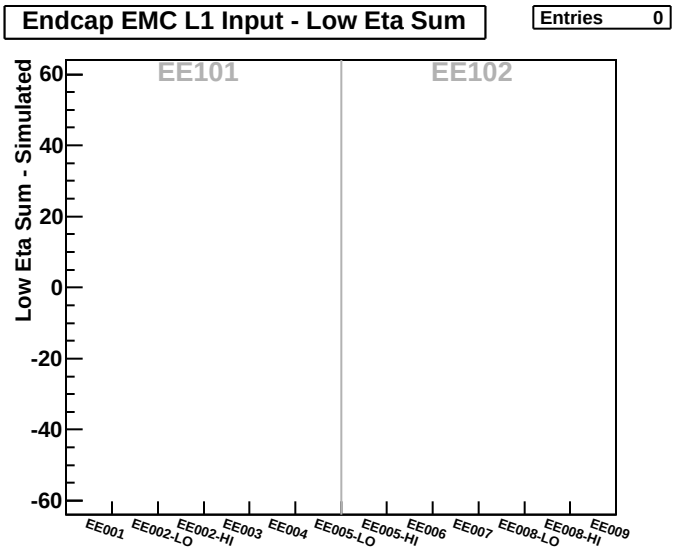

Barrel EMC L1 Input - High Eta Sum
Entries 5.4e+07
High Eta Sum
BC101 BC102 BC103 BC104 BC105 BC106
DSM Input Channel

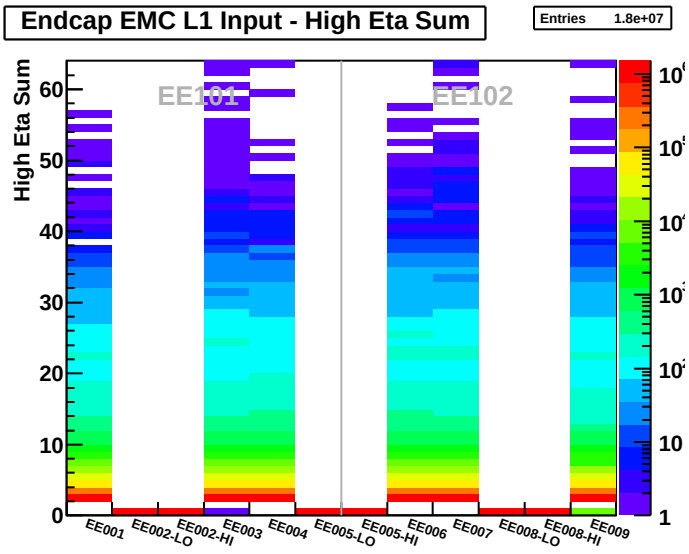

Barrel EMC L1 Input - High Eta Sum
Entries 64
High Eta Sum - Simulated
BC101 BC102 BC103 BC104 BC105 BC106
DSM Input Channel

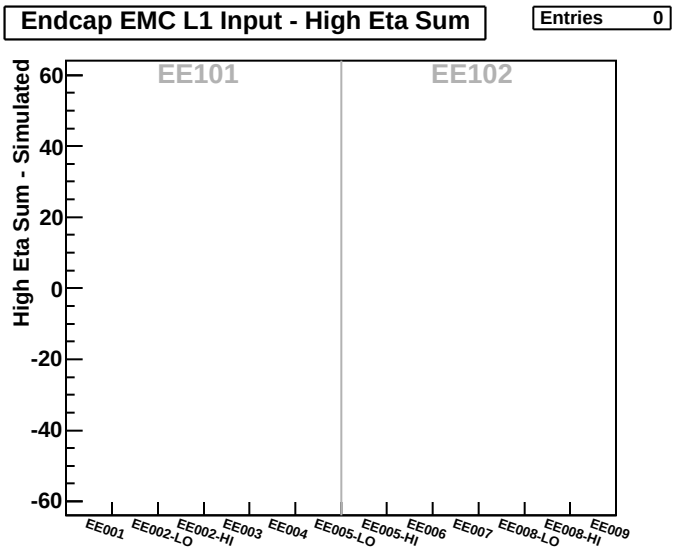

Barrel EMC L1 Input - High Tower Bits
Entries 5.4e+07
High Tower Bits
BC101 BC102 BC103 BC104 BC105 BC106
DSM Input Channel

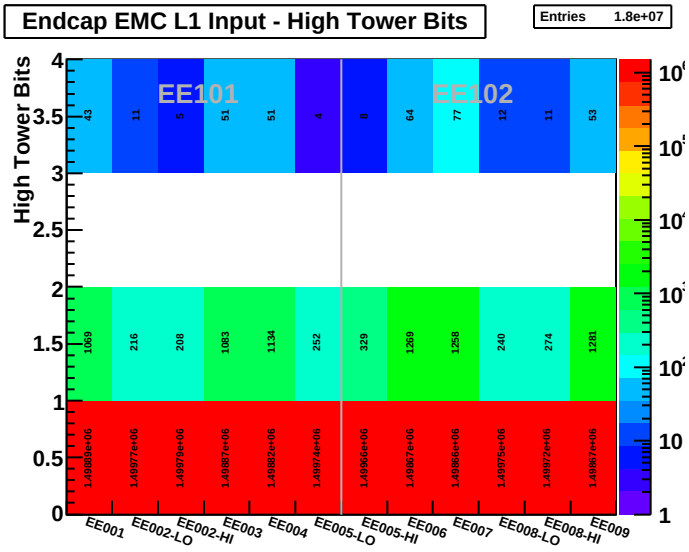

Barrel EMC L1 Input - High Tower Bits
Entries 3
High Tower Bits - Simulated
BC101 BC102 BC103 BC104 BC105 BC106
DSM Input Channel

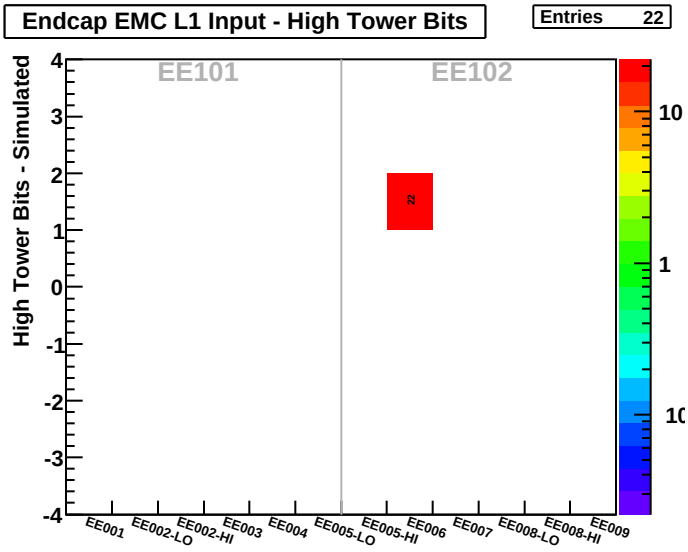

Endcap EMC L1 Input - Low Eta Sum
Entries 1.8e+07
Low Eta Sum
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

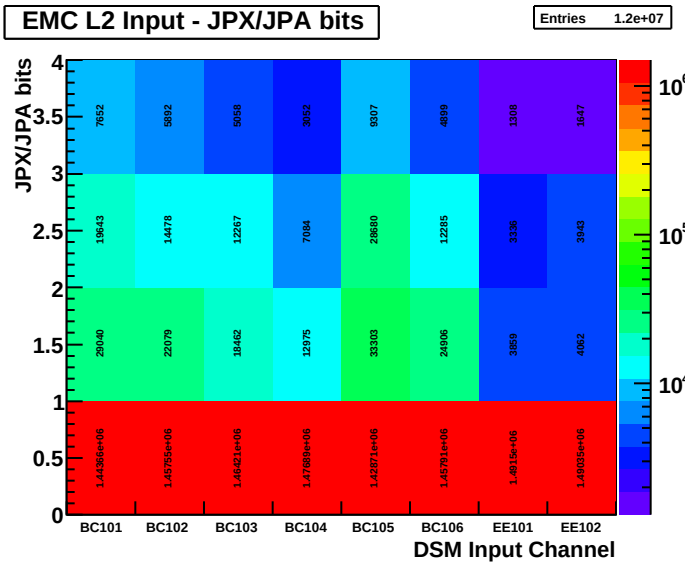

Endcap EMC L1 Input - Low Eta Sum
Entries 0
Low Eta Sum - Simulated
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

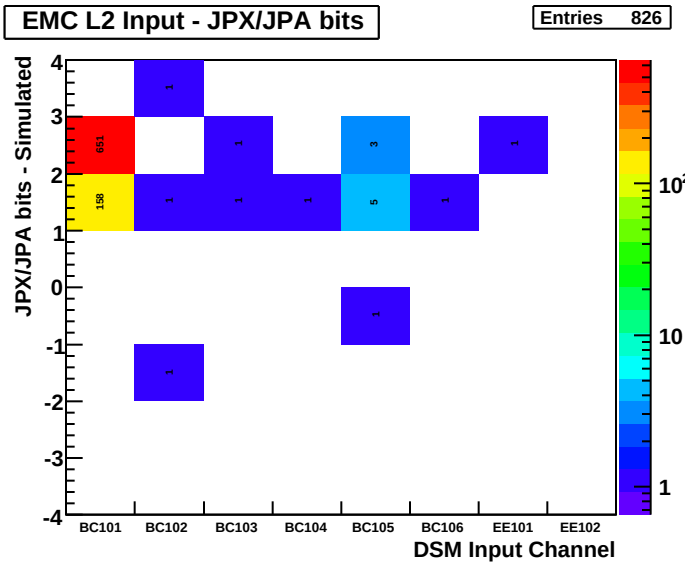

Endcap EMC L1 Input - High Eta Sum
Entries 1.8e+07
High Eta Sum
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

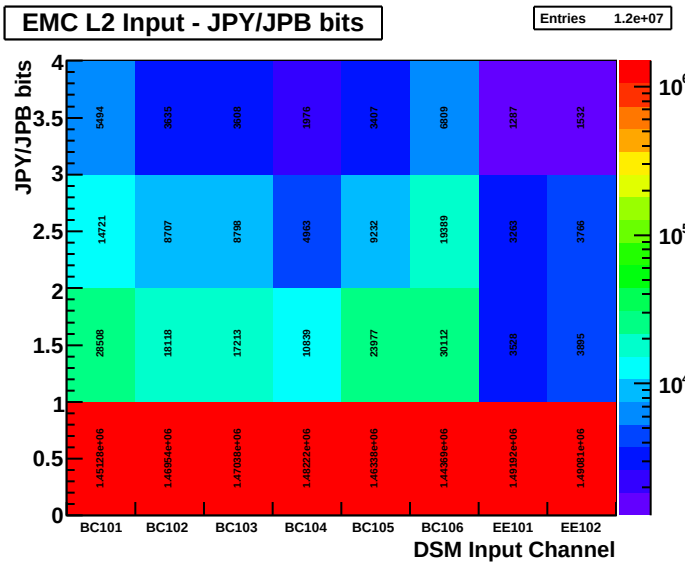

Endcap EMC L1 Input - High Eta Sum
Entries 0
High Eta Sum - Simulated
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

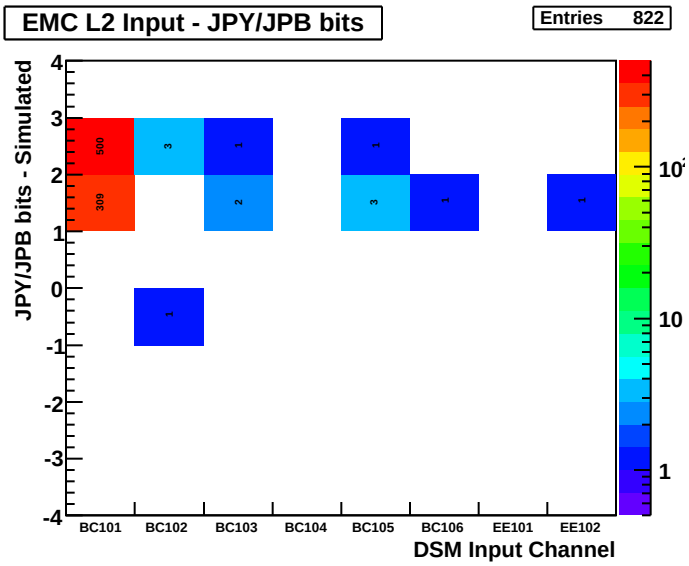

Endcap EMC L1 Input - High Tower Bits
Entries 1.8e+07
High Tower Bits
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

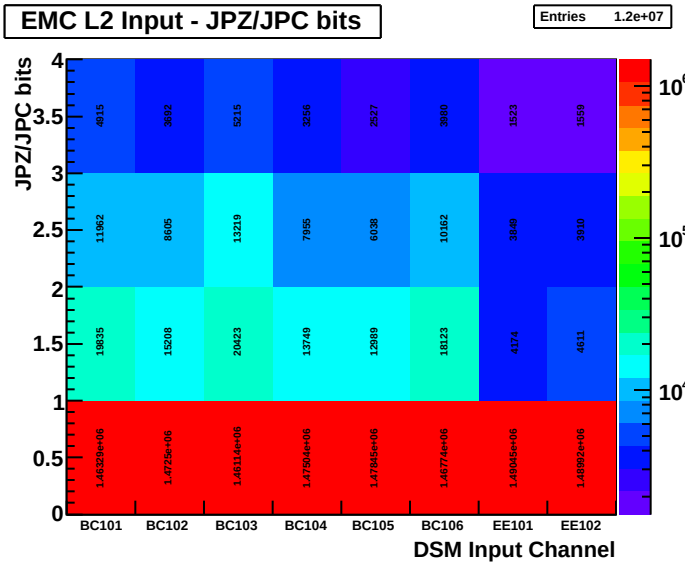

Endcap EMC L1 Input - High Tower Bits
Entries 22
High Tower Bits - Simulated
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

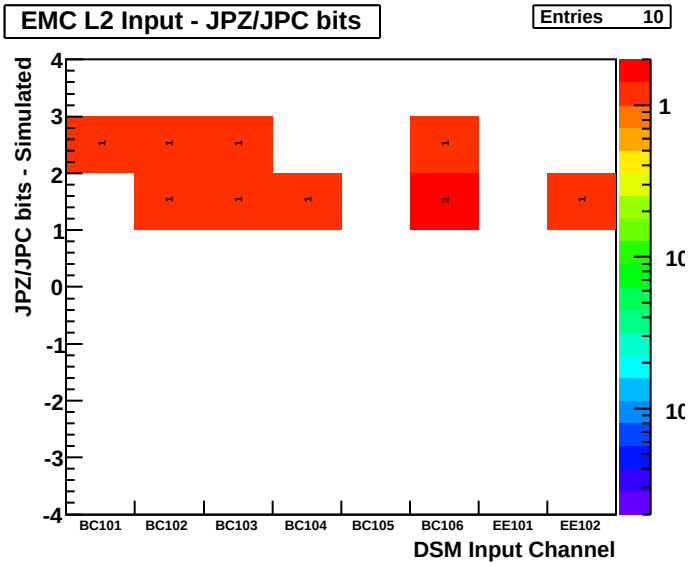

EMC L2 Input - JPX/JPA bits
Entries 1.2e+07
JPX/JPA bits
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102
7652 5892 5058 3052 9307 4899 1308 1647
19643 14478 12267 7084 28680 12285 3336 3943
29040 22079 18462 12975 33303 24906 3859 4062
1.44366e+06 1.45755e+06 1.46421e+06 1.47689e+06 1.42871e+06 1.45791e+06 1.4915e+06 1.49035e+06

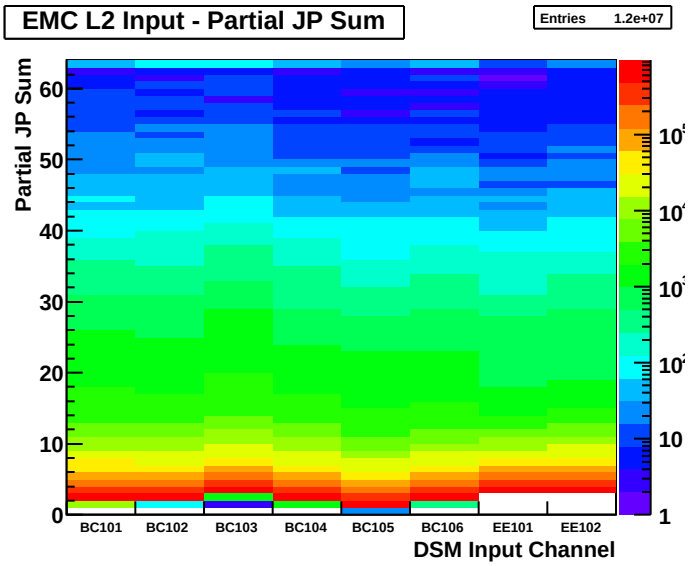

EMC L2 Input - JPX/JPA bits
Entries 826
JPX/JPA bits - Simulated
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102
651
158
1 1 1 1 3 1 1
1 1 1 5 1
1
1

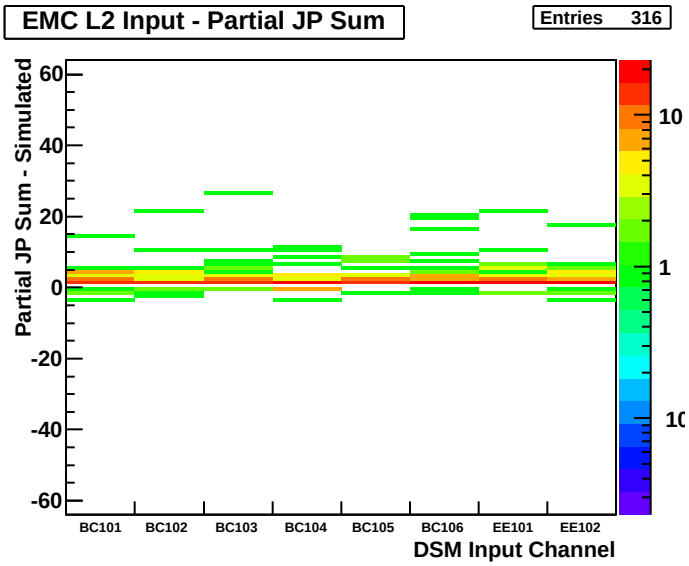

EMC L2 Input - JPY/JPB bits
Entries 1.2e+07
JPY/JPB bits
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102
5494 3635 3608 1976 3407 6809 1287 1532
14721 8707 8798 4963 9232 19389 3263 3766
28508 18118 17213 10839 23977 30112 3528 3895
1.45128e+06 1.46854e+06 1.47038e+06 1.48222e+06 1.46338e+06 1.44389e+06 1.49192e+06 1.49081e+06

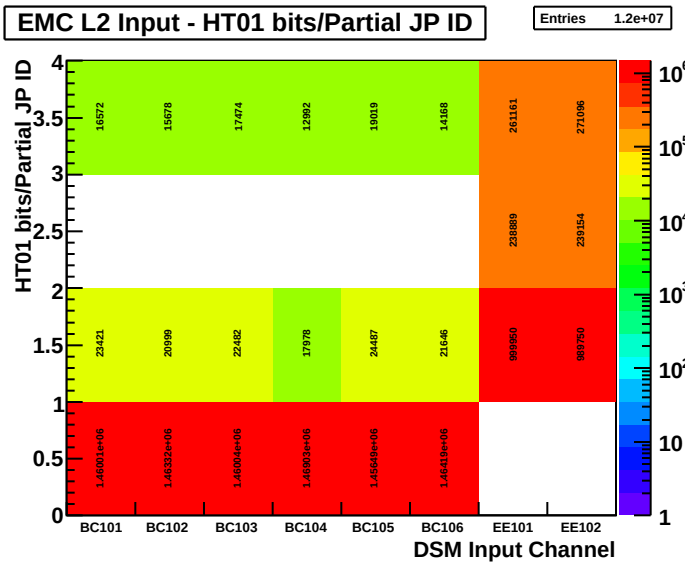

EMC L2 Input - JPY/JPB bits
Entries 822
JPY/JPB bits - Simulated
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102
500
309
3 1 1
2 3 1 1
1
1

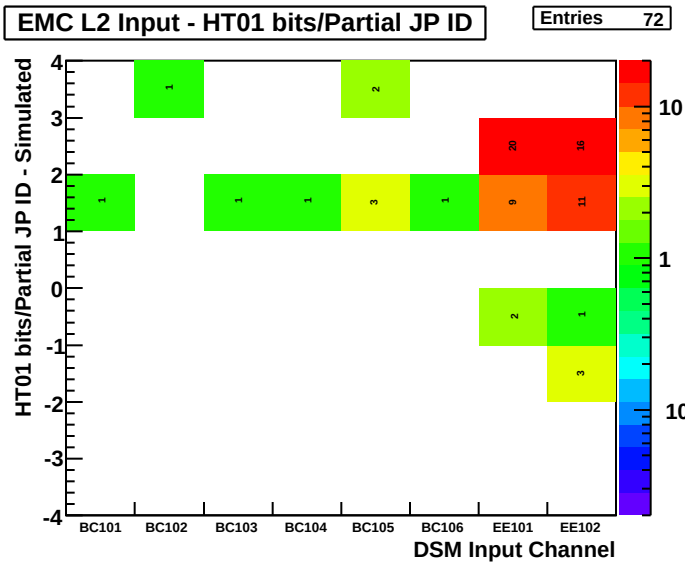

EMC L2 Input - JPZ/JPC bits
Entries 1.2e+07
JPZ/JPC bits
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102
4915 3092 5215 3256 2527 3880 1523 1559
11962 8605 13219 7955 6038 10162 3849 3910
19835 15208 20423 13749 12889 18123 4174 4611
1.46329e+06 1.4726e+06 1.46114e+06 1.47504e+06 1.47845e+06 1.46774e+06 1.49045e+06 1.48992e+06

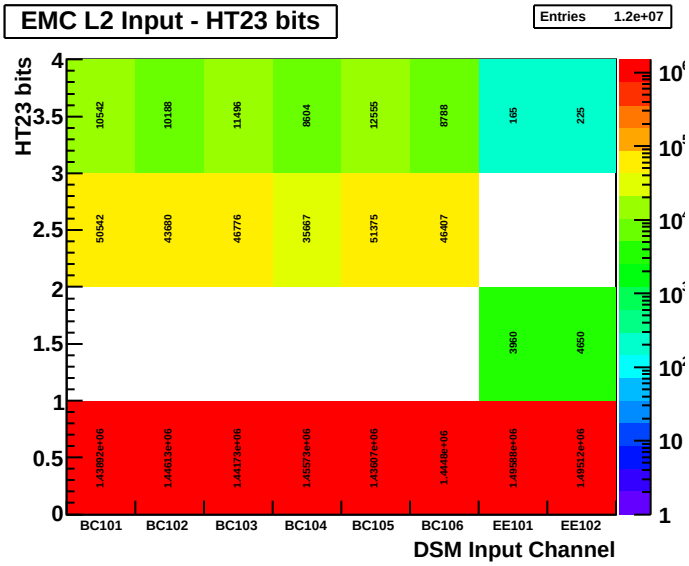

EMC L2 Input - JPZ/JPC bits
Entries 10
JPZ/JPC bits - Simulated
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102
1 1 1 1
1 1 1 2 1

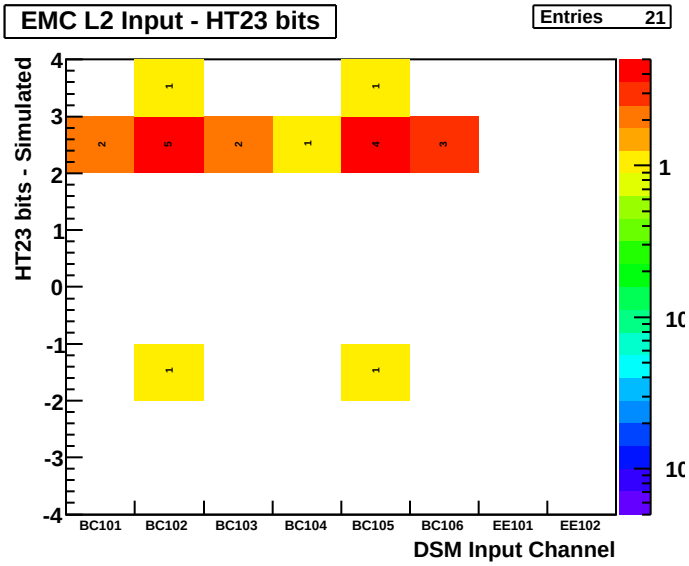

EMC L2 Input - Partial JP Sum
Entries 1.2e+07
Partial JP Sum
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

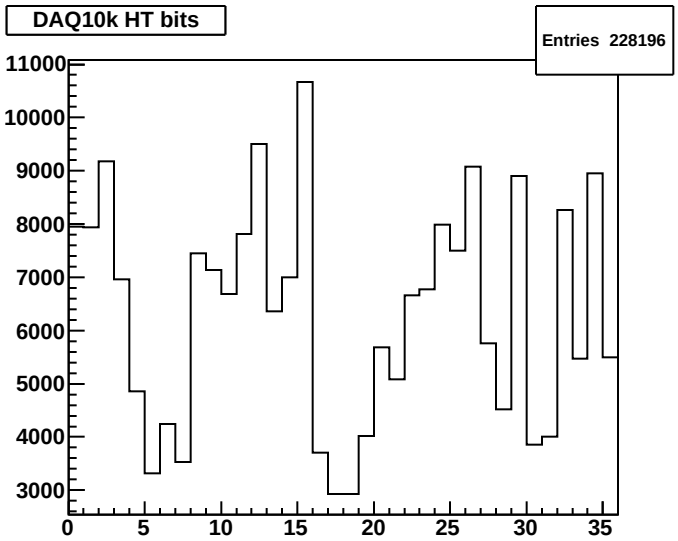

EMC L2 Input - Partial JP Sum
Entries 316
Partial JP Sum - Simulated
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

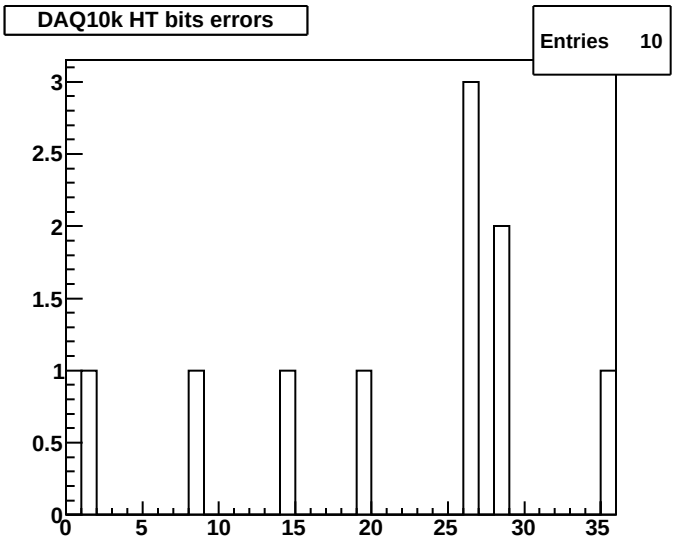

EMC L2 Input - HT01 bits/Partial JP ID
Entries 1.2e+07
HT01 bits/Partial JP ID
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

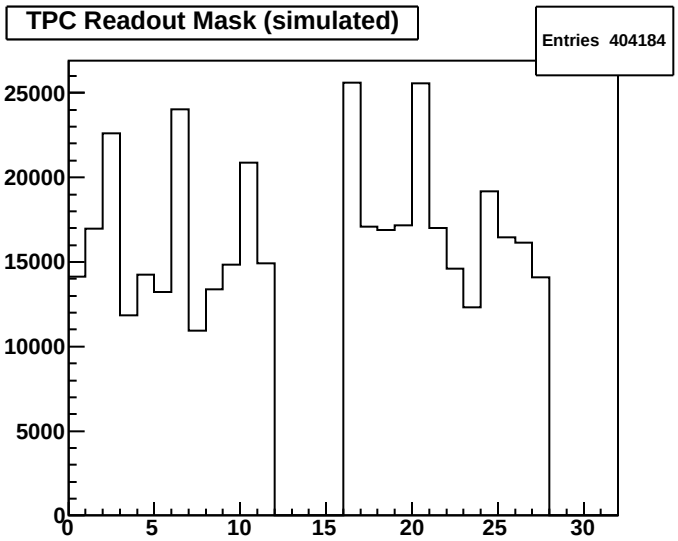

EMC L2 Input - HT01 bits/Partial JP ID
Entries 72
HT01 bits/Partial JP ID - Simulated
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

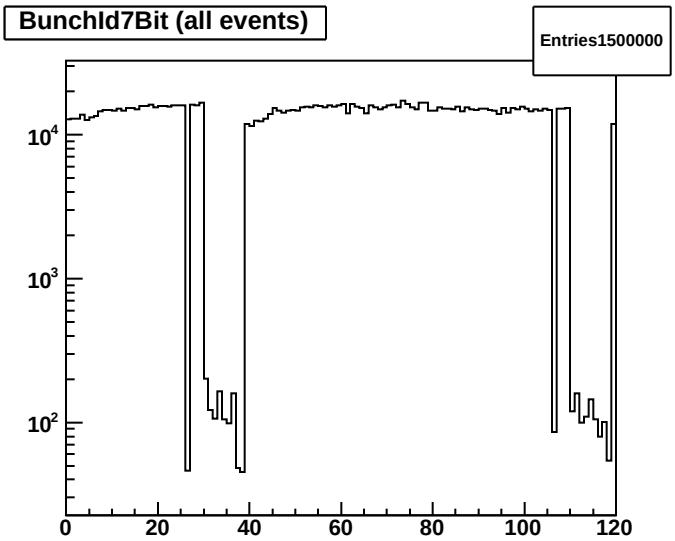

EMC L2 Input - HT23 bits
Entries 1.2e+07
HT23 bits
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

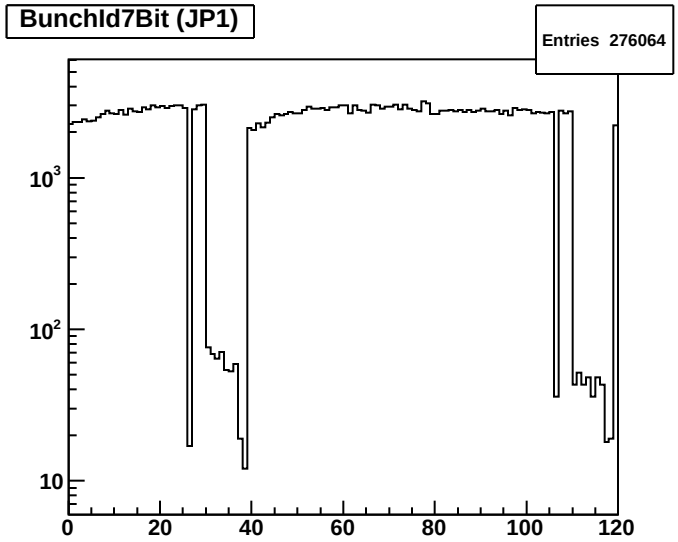

EMC L2 Input - HT23 bits
Entries 21
HT23 bits - Simulated
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

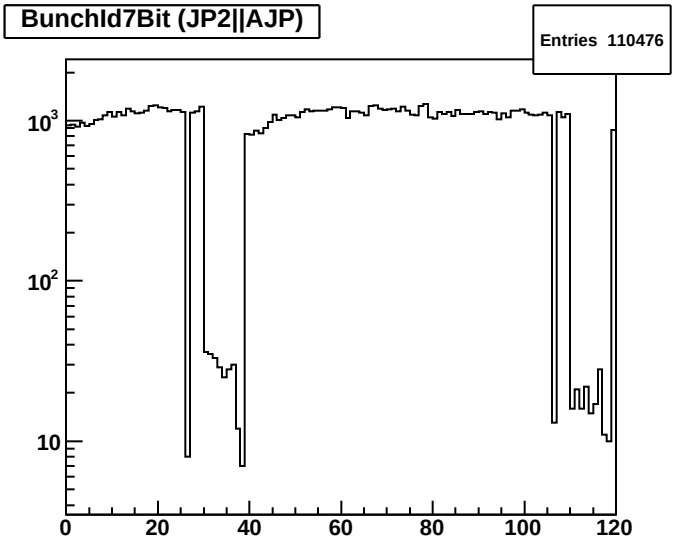

DAQ10k HT bits
Entries 228196

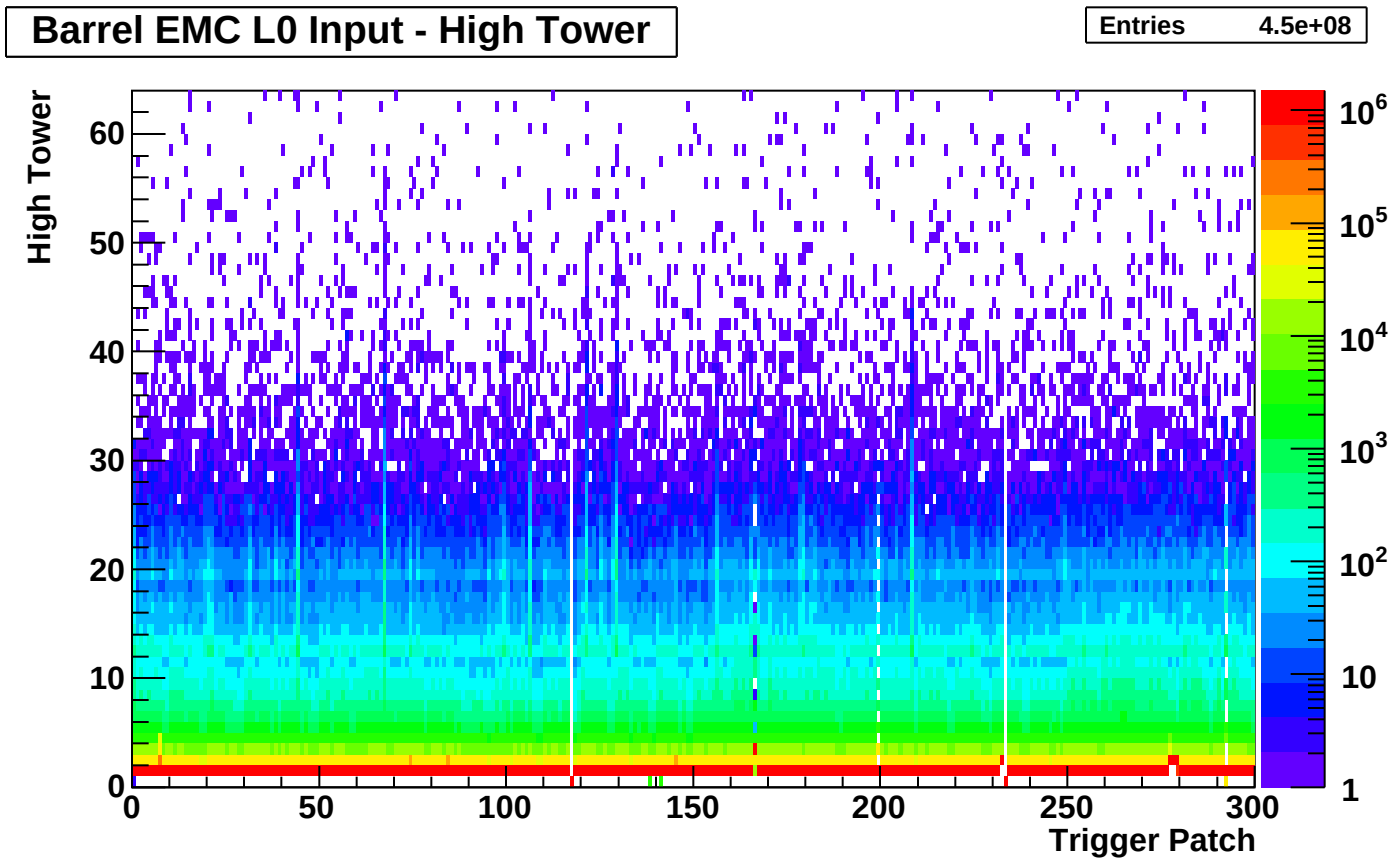

DAQ10k HT bits errors
Entries 10

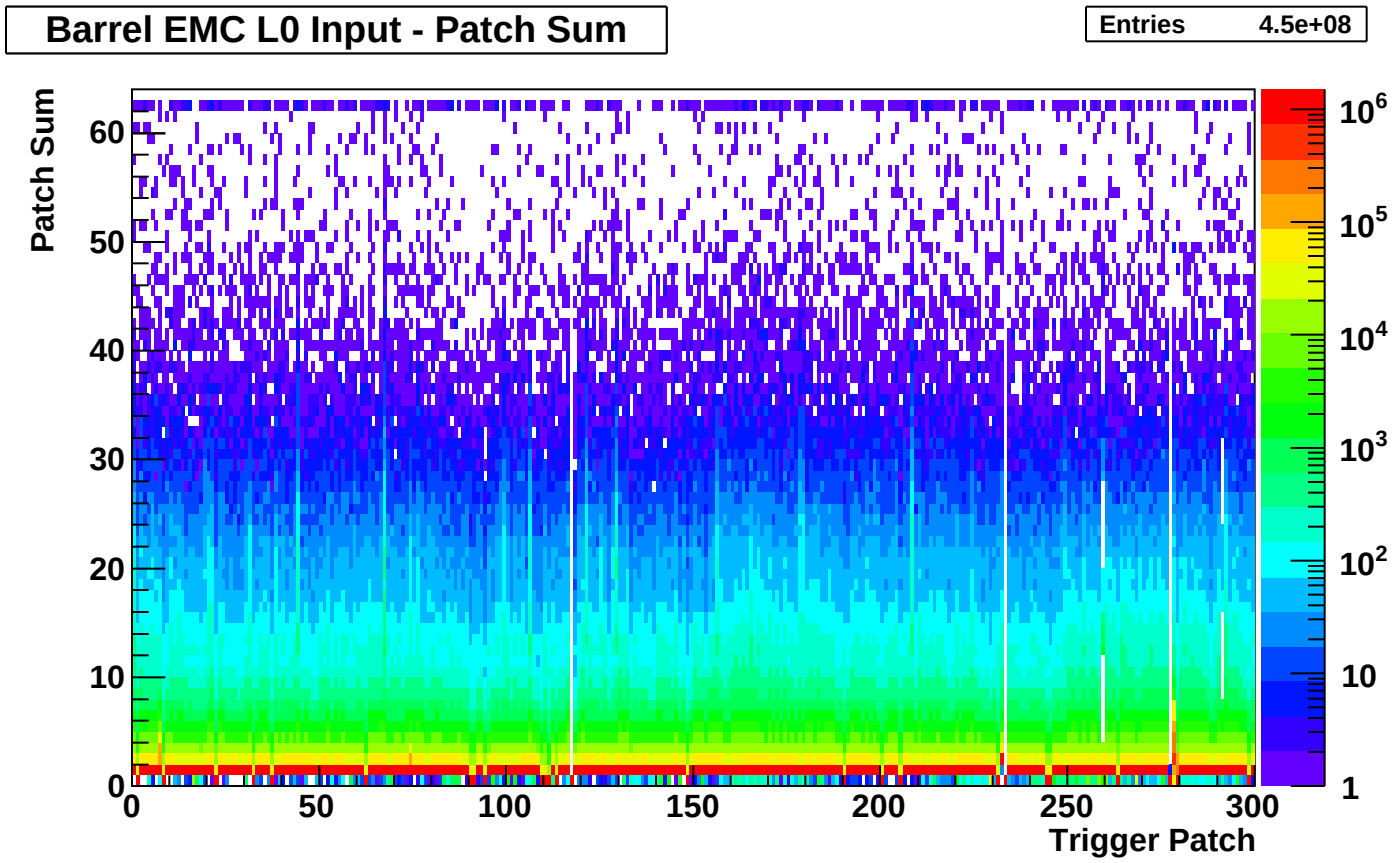

TPC Readout Mask (simulated)
Entries 404184

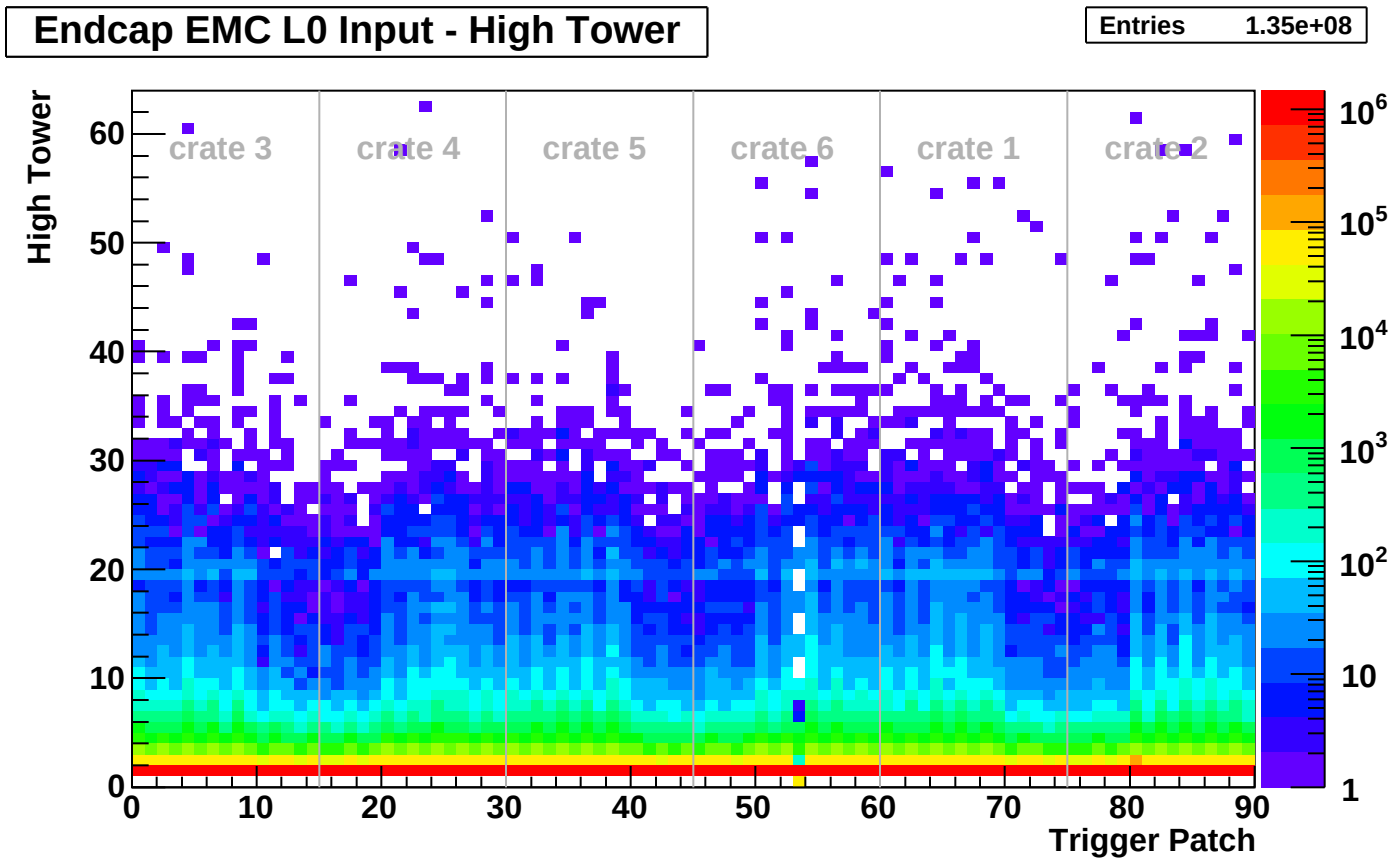

BunchId7Bit (all events)
Entries1500000

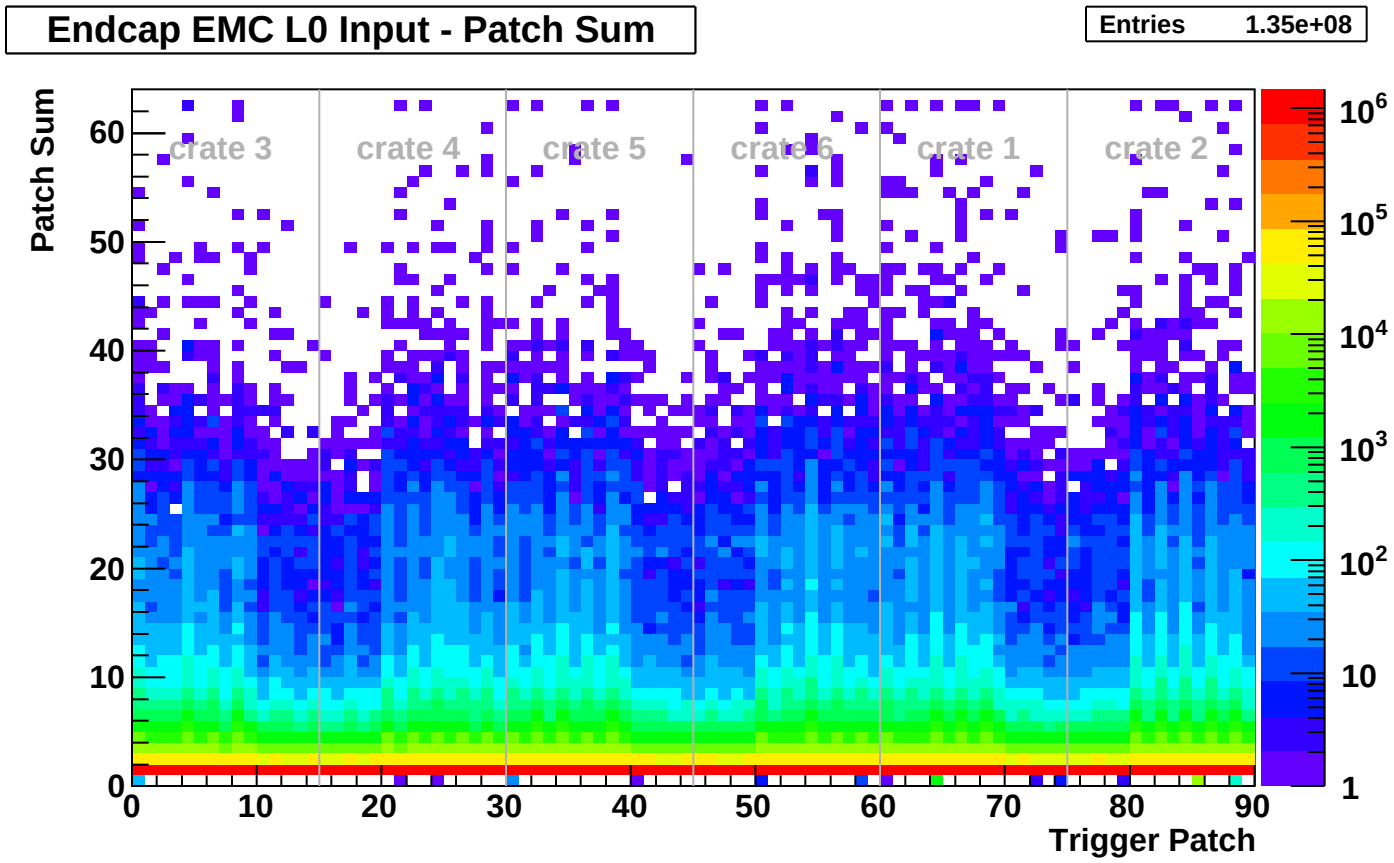

BunchId7Bit (JP1)
Entries 276064

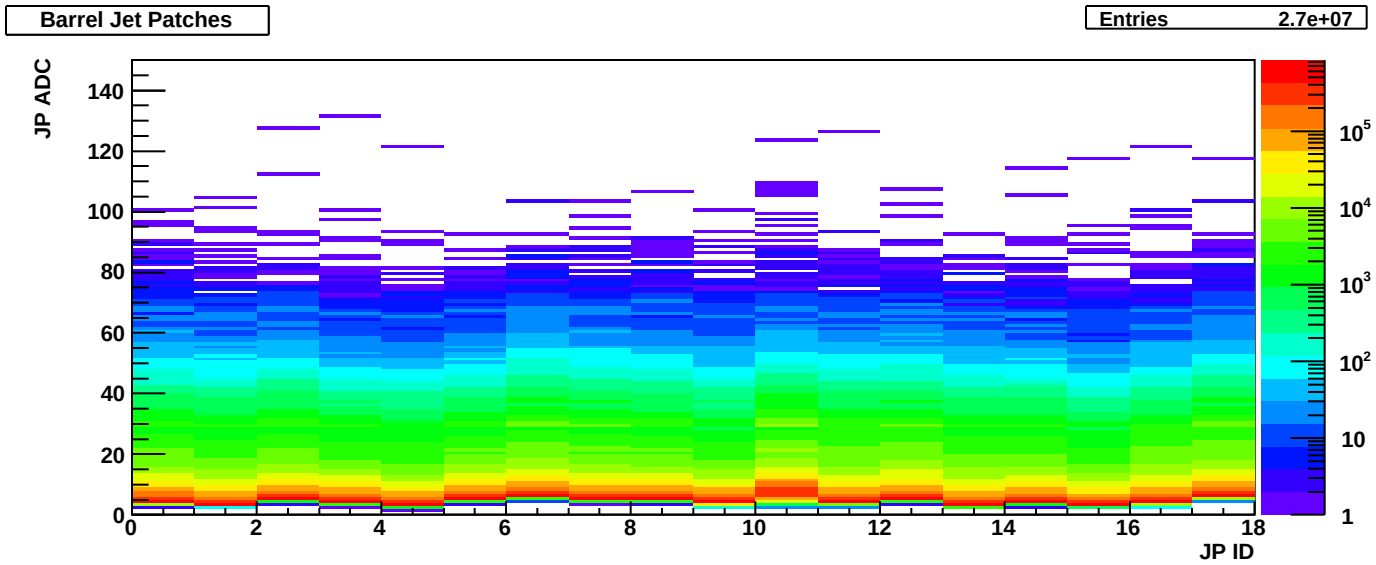

BunchId7Bit (JP2||AJP)
Entries 110476

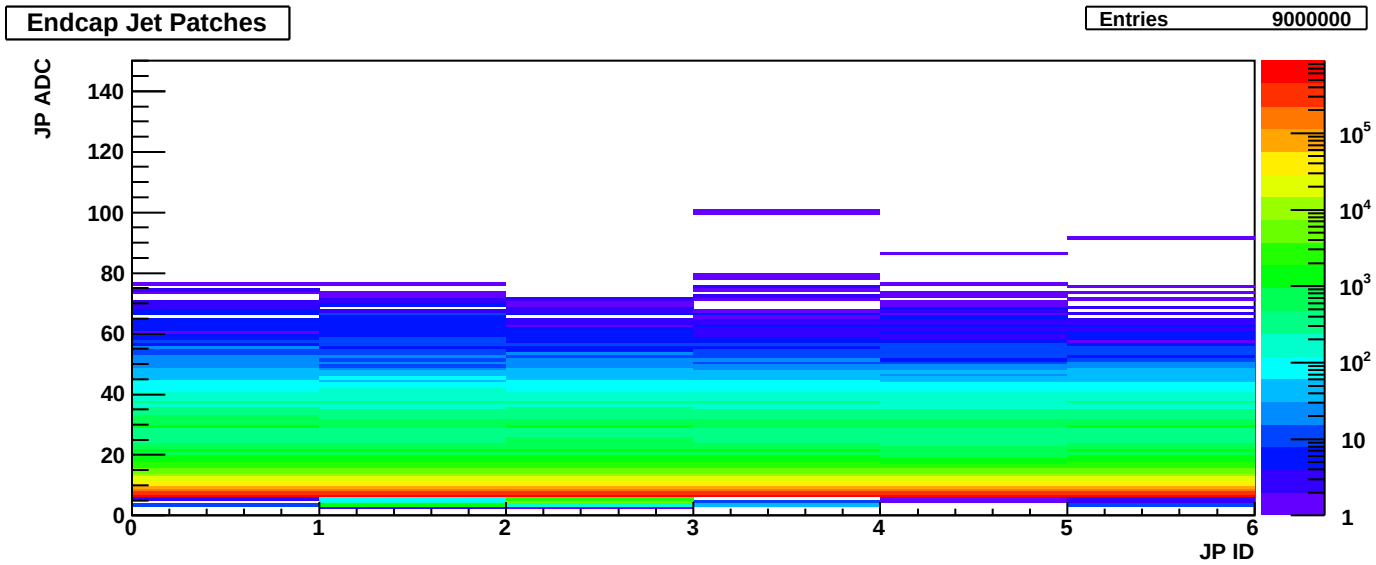

Barrel EMC L0 Input - High Tower
Entries 4.5e+08
High Tower
Trigger Patch
0
10
20
30
40
50
60
0
50
100
150
200
250
300
1
10
10^2
10^3
10^4
10^5
10^6

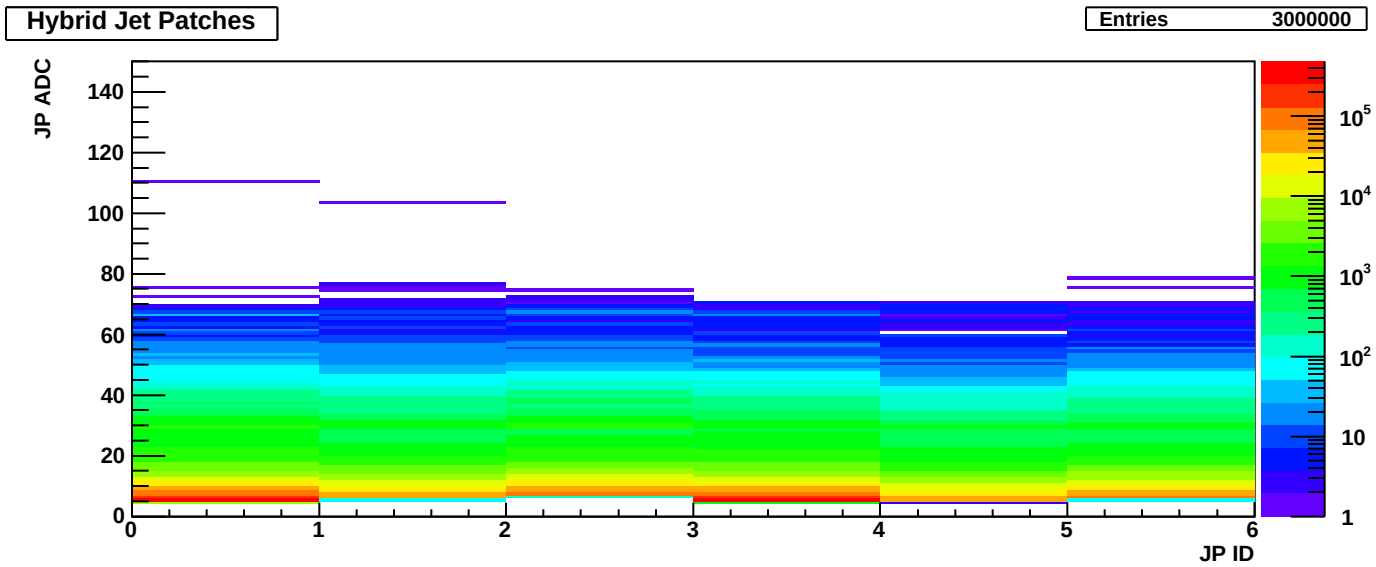

Barrel EMC L0 Input - Patch Sum
Entries 4.5e+08
Patch Sum
Trigger Patch
0
10
20
30
40
50
60
0
50
100
150
200
250
300
1
10
10^2
10^3
10^4
10^5
10^6

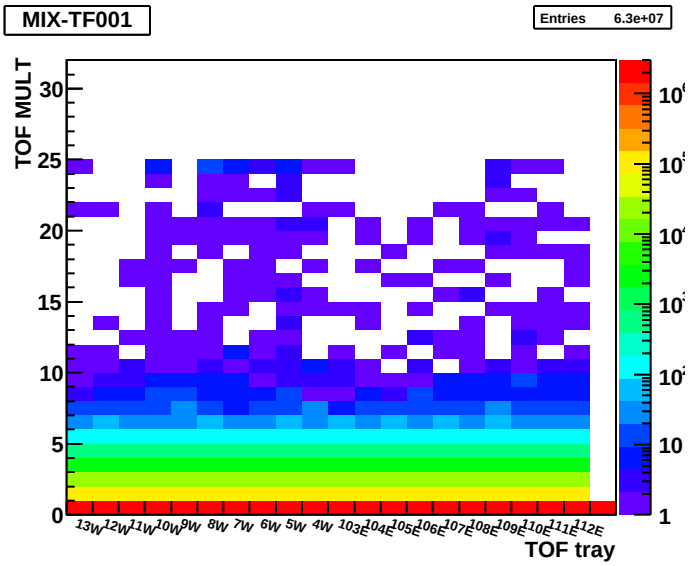

Endcap EMC L0 Input - High Tower
Entries 1.35e+08
High Tower
crate 3
crate 4
crate 5
crate 6
crate 1
crate 2
Trigger Patch

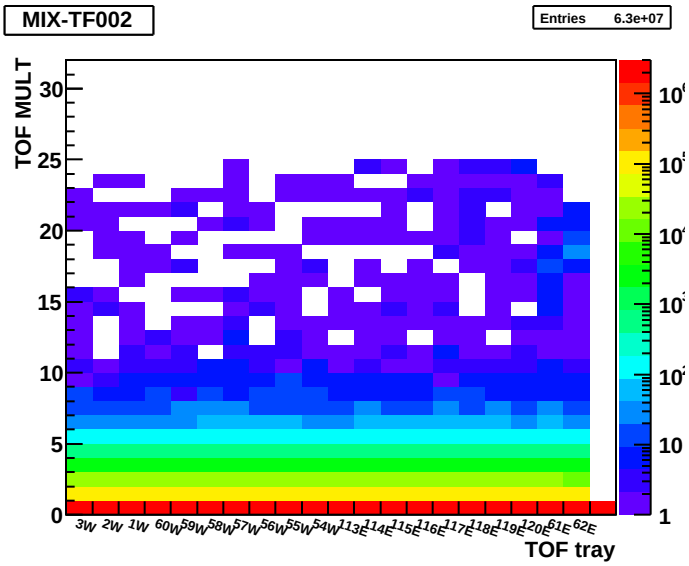

Endcap EMC L0 Input - Patch Sum
Entries 1.35e+08
Patch Sum
crate 3
crate 4
crate 5
crate 6
crate 1
crate 2
Trigger Patch

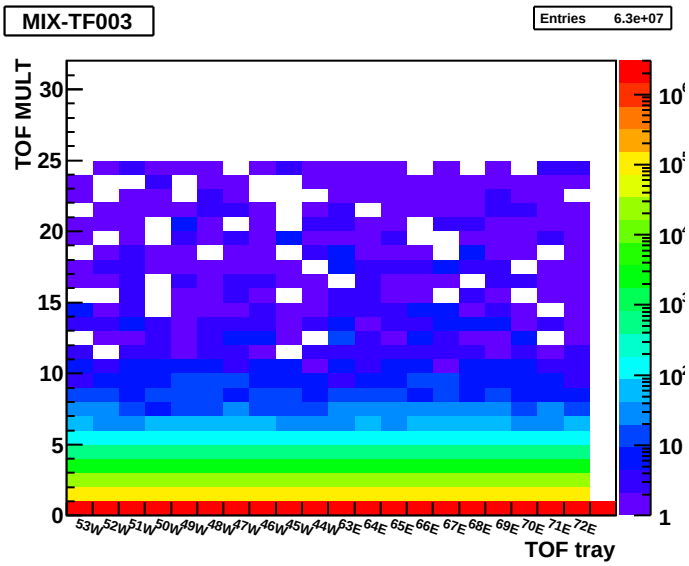

Barrel Jet Patches
Entries 2.7e+07
JP ADC
JP ID

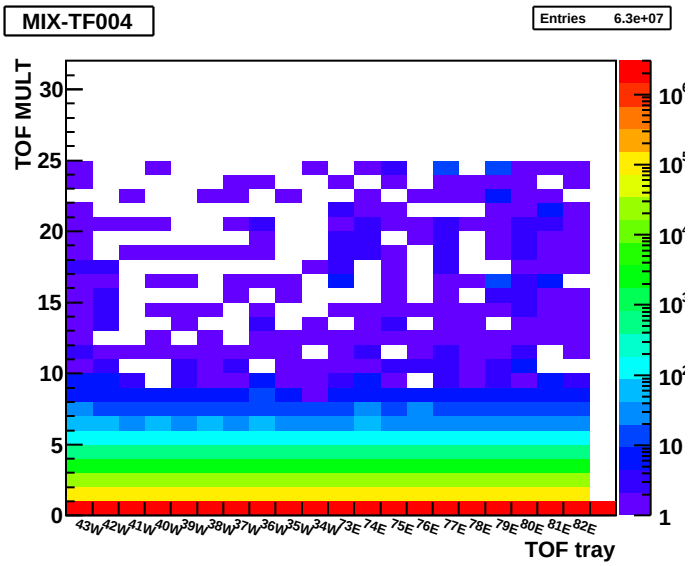

Endcap Jet Patches
Entries 9000000
JP ADC
JP ID

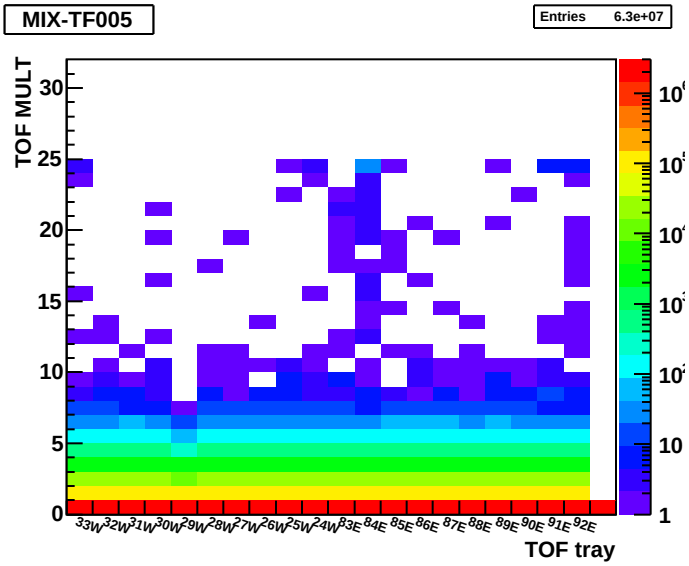

Hybrid Jet Patches
Entries 3000000
JP ADC
JP ID

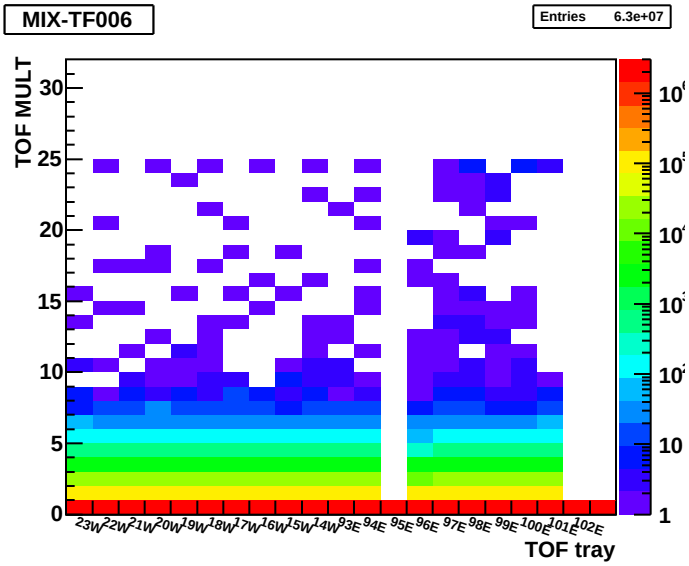

MIX-TF001
Entries 6.3e+07
TOF MULT
TOF tray

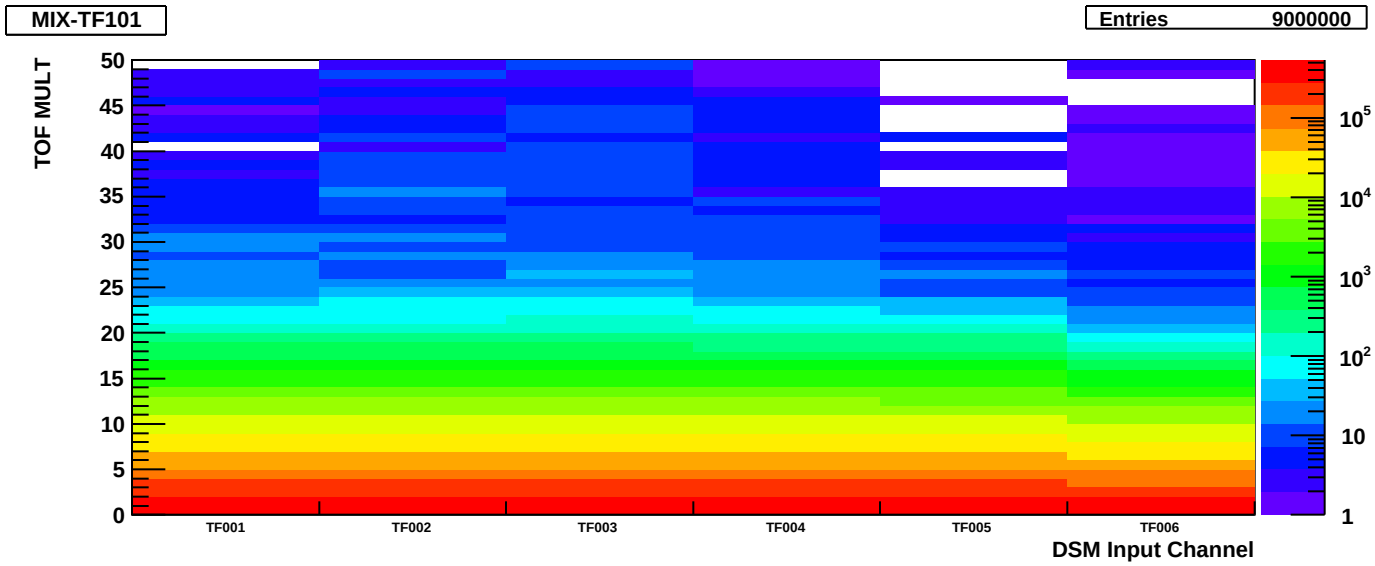

MIX-TF002
Entries 6.3e+07
TOF MULT
TOF tray

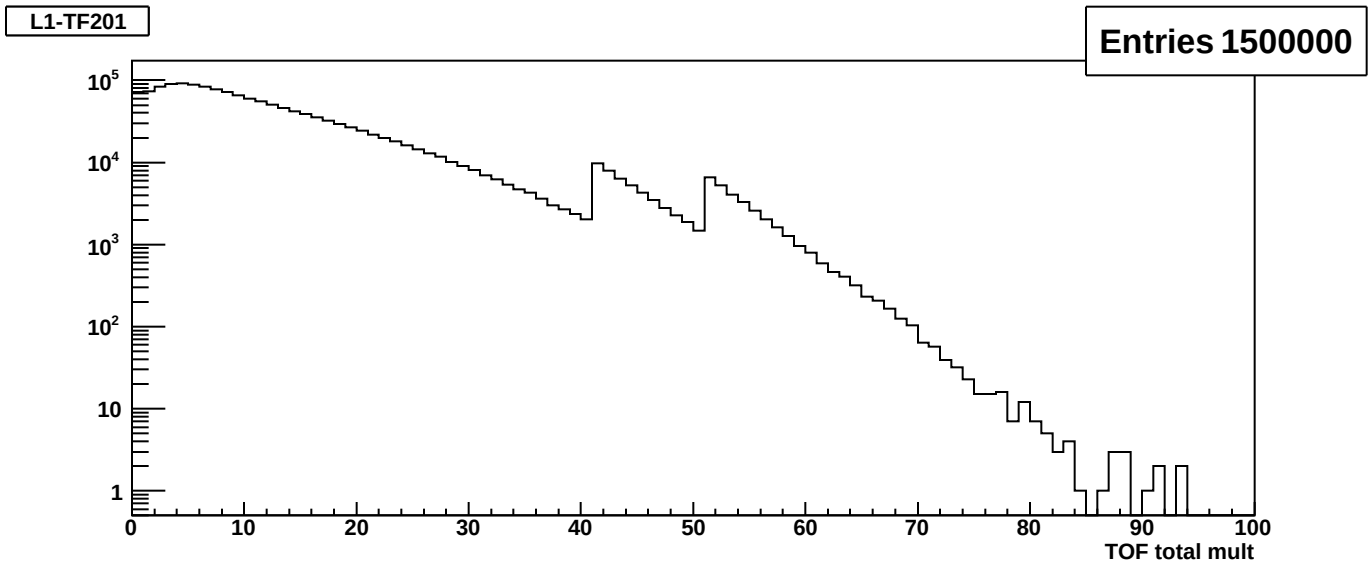

MIX-TF003
Entries 6.3e+07
TOF MULT
TOF tray

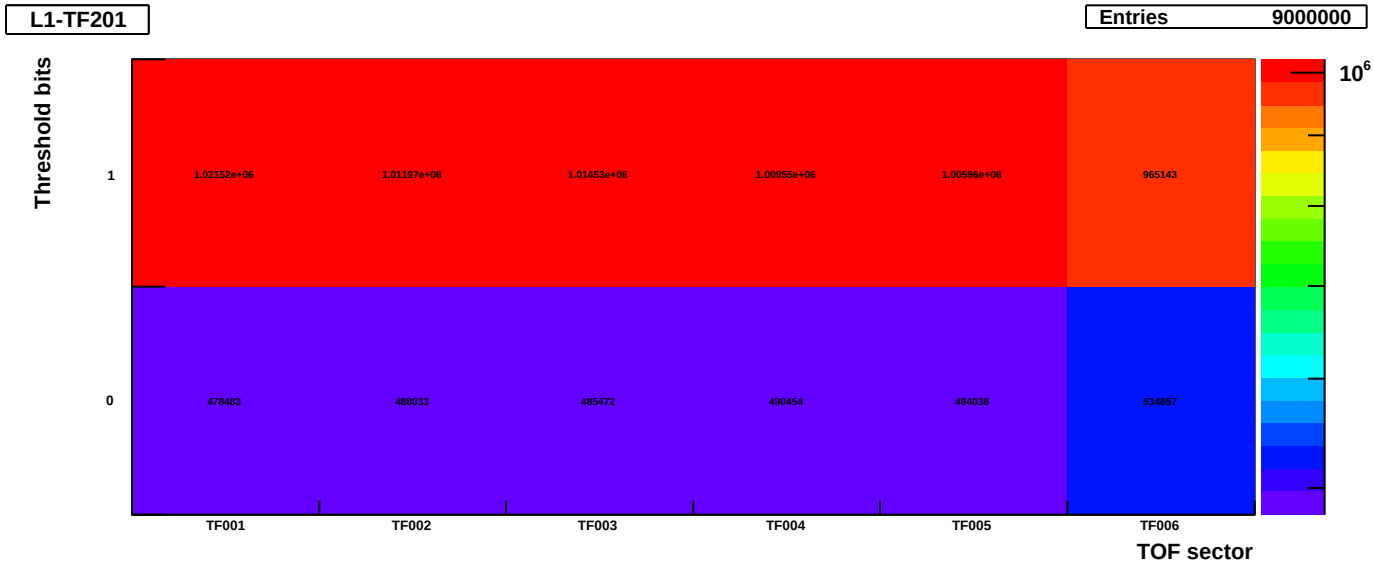

MIX-TF004
Entries 6.3e+07
TOF MULT
TOF tray

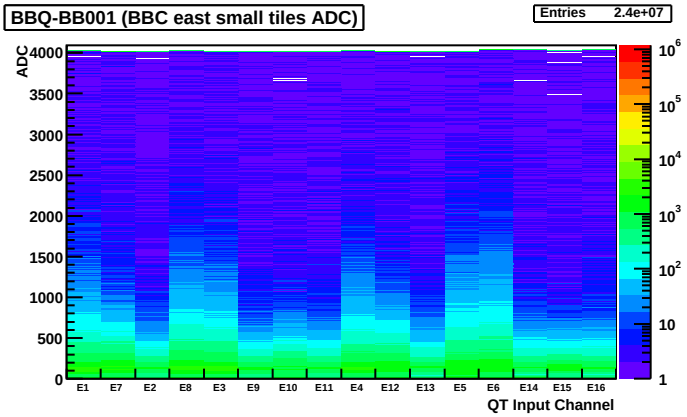

MIX-TF005
Entries 6.3e+07
TOF MULT
TOF tray

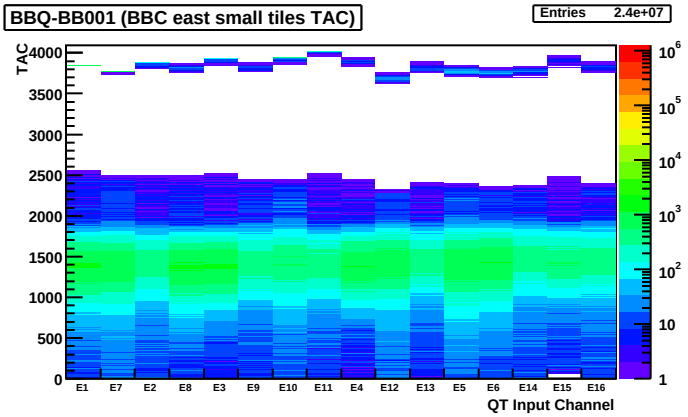

MIX-TF006
Entries 6.3e+07
TOF MULT
TOF tray

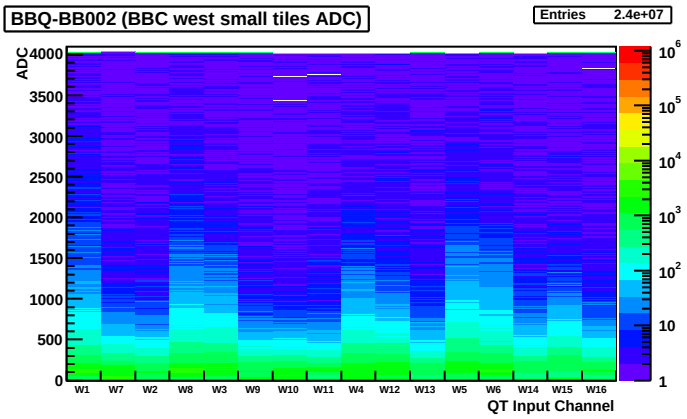

MIX-TF101
Entries 9000000
TOF MULT
50
45
40
35
30
25
20
15
10
5
0
TF001
TF002
TF003
TF004
TF005
TF006
DSM Input Channel
10^5
10^4
10^3
10^2
10
1

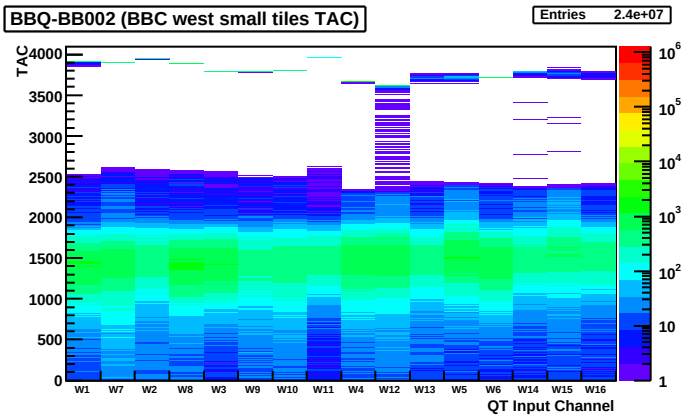

L1-TF201
Entries 1500000
10^5
10^4
10^3
10^2
10
1
0
10
20
30
40
50
60
70
80
90
100
TOF total mult

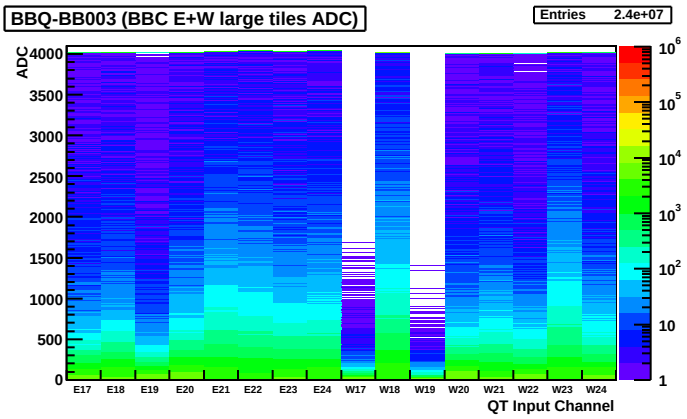

L1-TF201
Entries 9000000
Threshold bits
1
0
1.02152e+06
1.01197e+06
1.01453e+06
1.00955e+06
1.00596e+06
965143
478483
488033
485472
490454
494038
534857
TF001
TF002
TF003
TF004
TF005
TF006
TOF sector
10^6

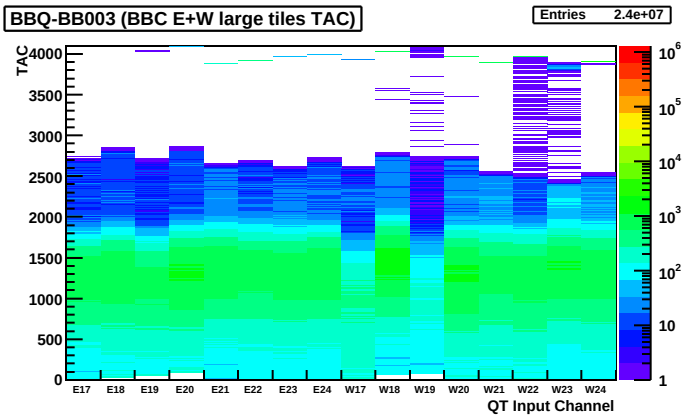

BBQ-BB001 (BBC east small tiles ADC)
Entries 2.4e+07
ADC
QT Input Channel

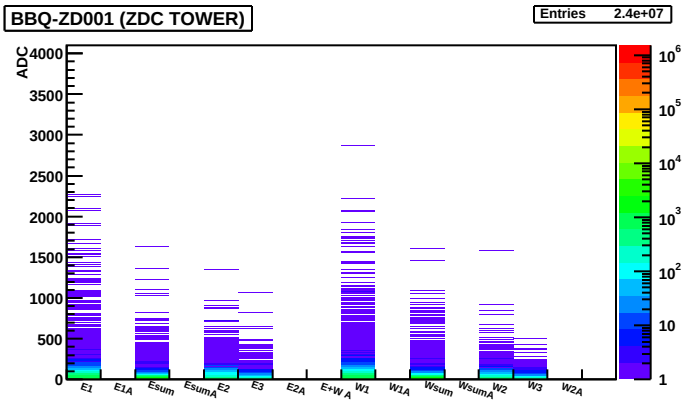

BBQ-BB001 (BBC east small tiles TAC)
Entries 2.4e+07
TAC
QT Input Channel

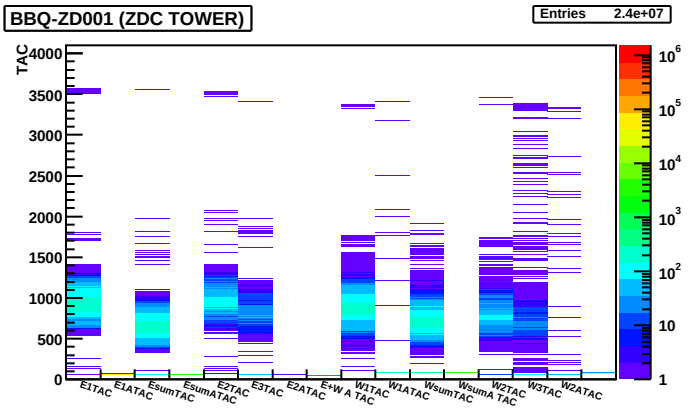

BBQ-BB002 (BBC west small tiles ADC)
Entries 2.4e+07
ADC
QT Input Channel

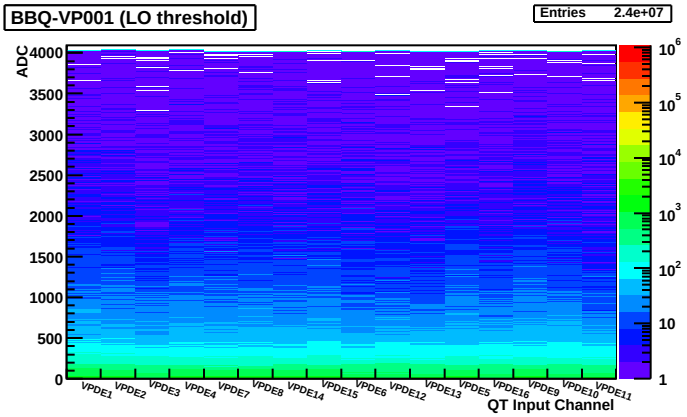

BBQ-BB002 (BBC west small tiles TAC)
Entries 2.4e+07
TAC
QT Input Channel

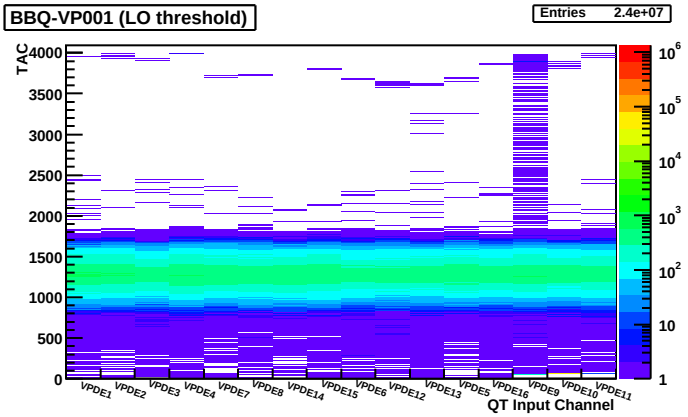

BBQ-BB003 (BBC E+W large tiles ADC)
Entries 2.4e+07
ADC
QT Input Channel

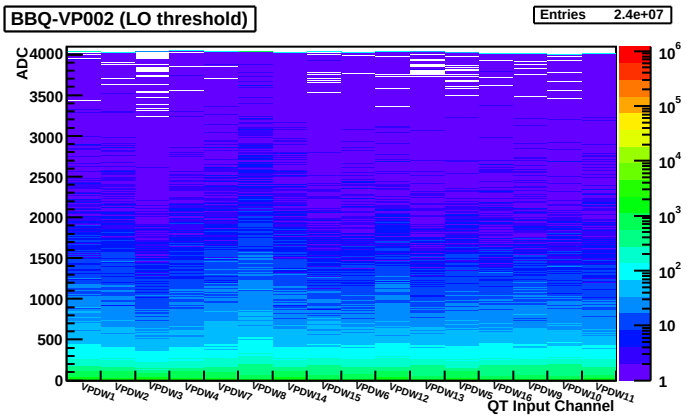

BBQ-BB003 (BBC E+W large tiles TAC)
Entries 2.4e+07
TAC
QT Input Channel

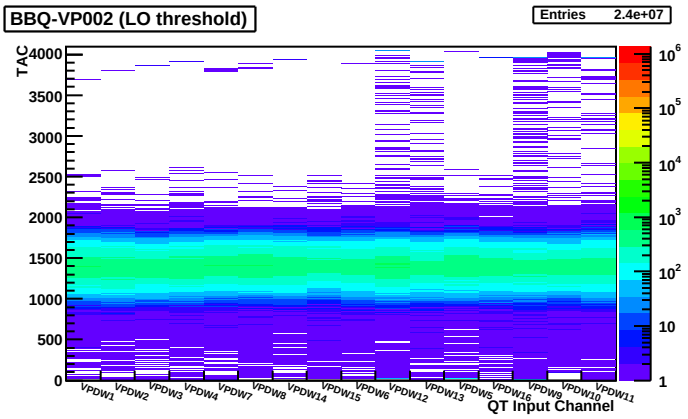

BBQ-ZD001 (ZDC TOWER)
Entries 2.4e+07
ADC

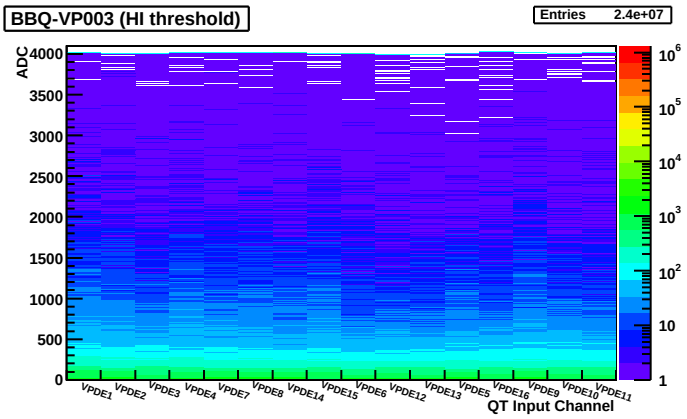

BBQ-ZD001 (ZDC TOWER)
Entries 2.4e+07
TAC

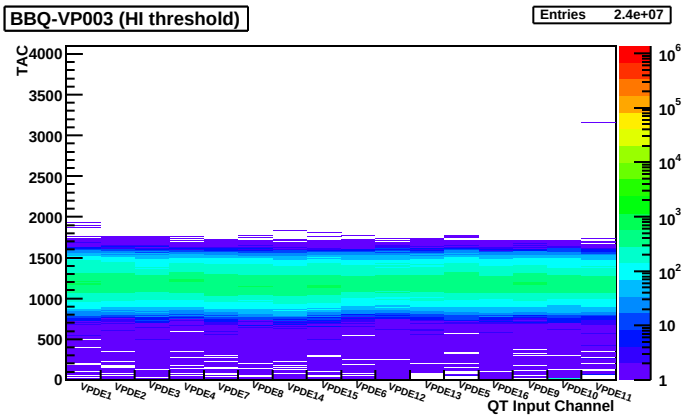

BBQ-VP001 (LO threshold)
Entries 2.4e+07
ADC
QT Input Channel

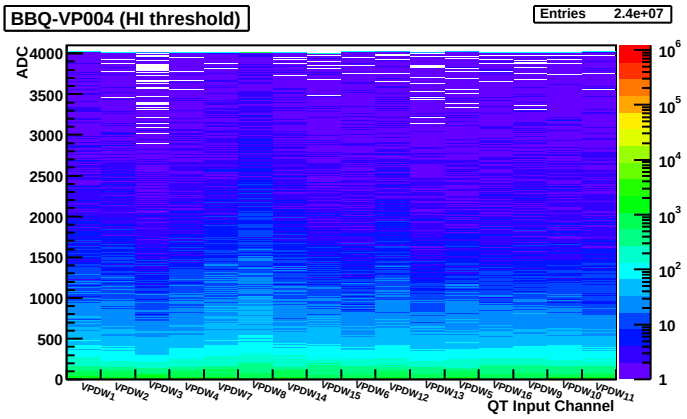

BBQ-VP001 (LO threshold)
Entries 2.4e+07
TAC
QT Input Channel

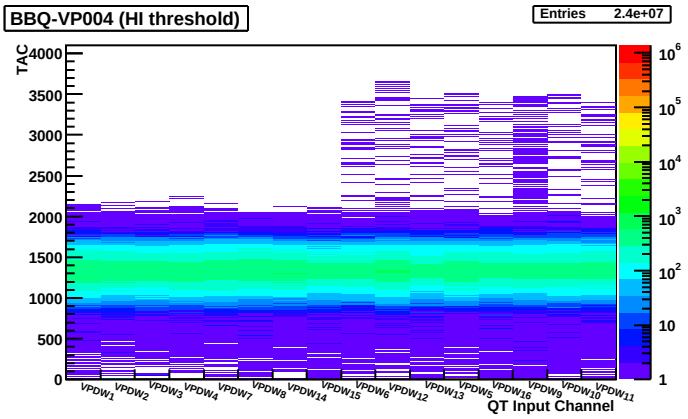

BBQ-VP002 (LO threshold)
Entries 2.4e+07
ADC
QT Input Channel

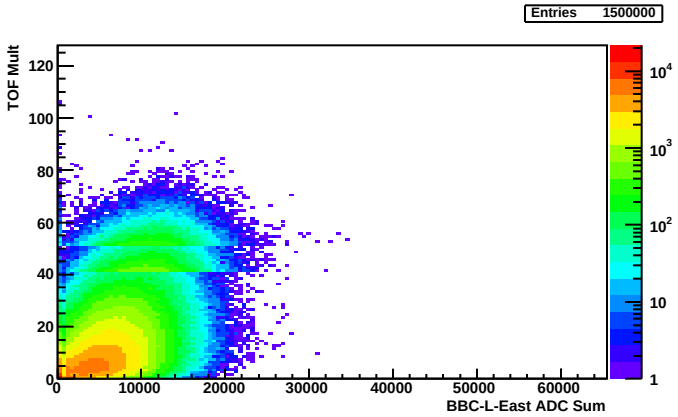

BBQ-VP002 (LO threshold)
Entries 2.4e+07
TAC
QT Input Channel

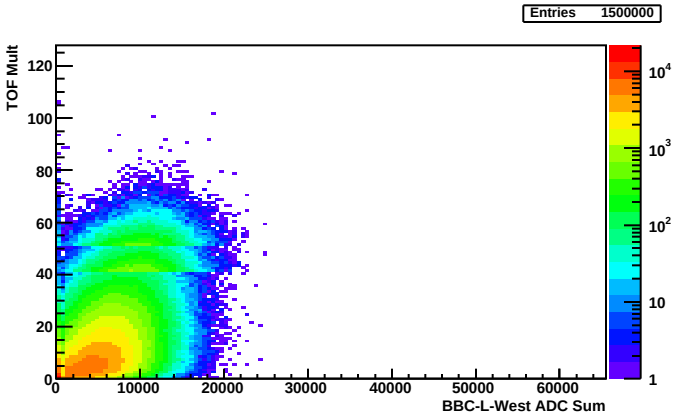

BBQ-VP003 (HI threshold)
Entries 2.4e+07
ADC
QT Input Channel

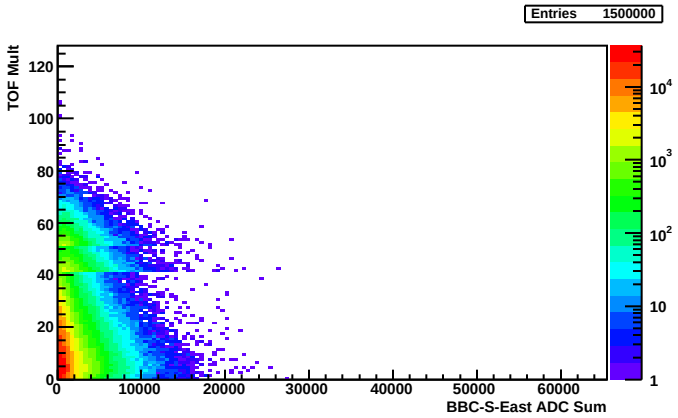

BBQ-VP003 (HI threshold)
Entries 2.4e+07
TAC
QT Input Channel

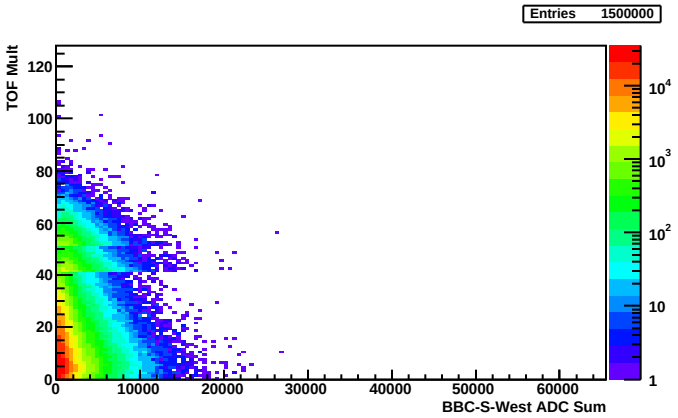

BBQ-VP004 (HI threshold)
Entries 2.4e+07
ADC
QT Input Channel

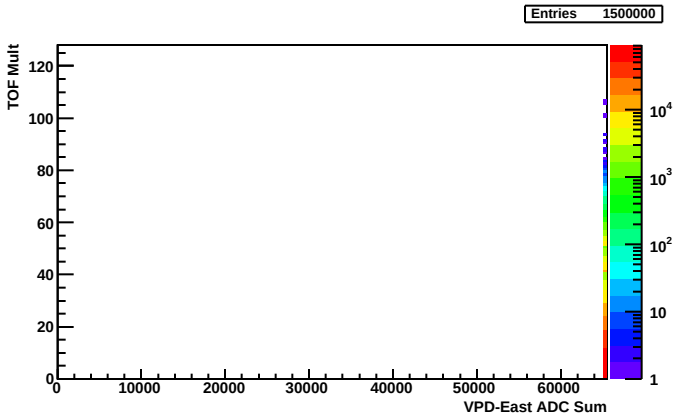

BBQ-VP004 (HI threshold)
Entries 2.4e+07
TAC
QT Input Channel

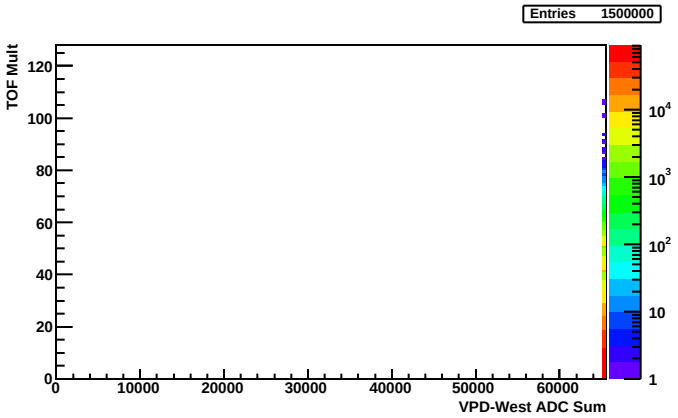

Entries 1500000
TOF Mult
BBC-L-East ADC Sum

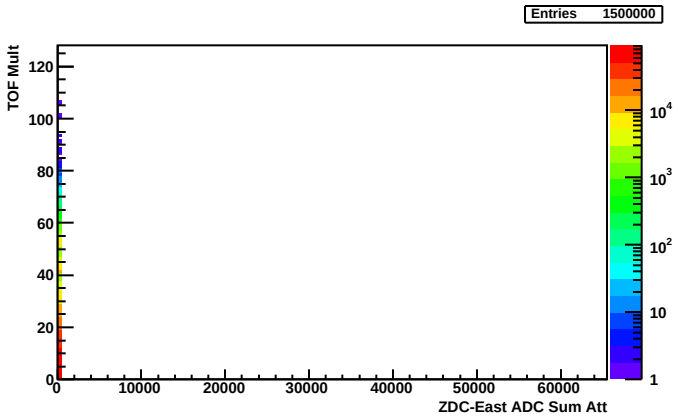

Entries 1500000
TOF Mult
BBC-L-West ADC Sum

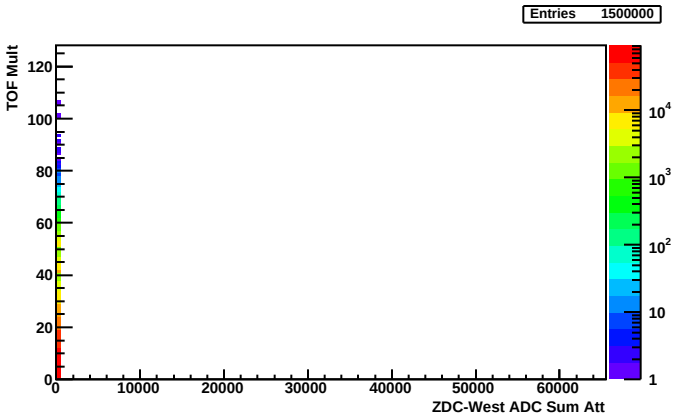

Entries 1500000
TOF Mult
BBC-S-East ADC Sum

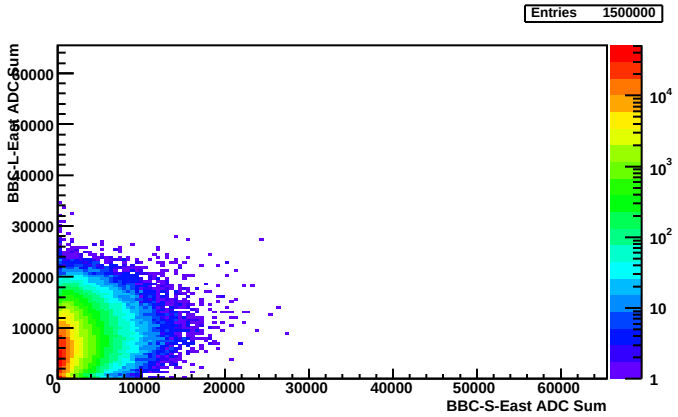

Entries 1500000
TOF Mult
BBC-S-West ADC Sum

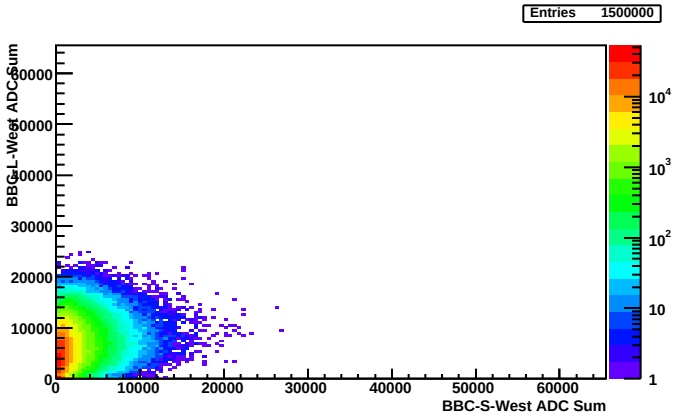

Entries 1500000
TOF Mult
VPD-East ADC Sum

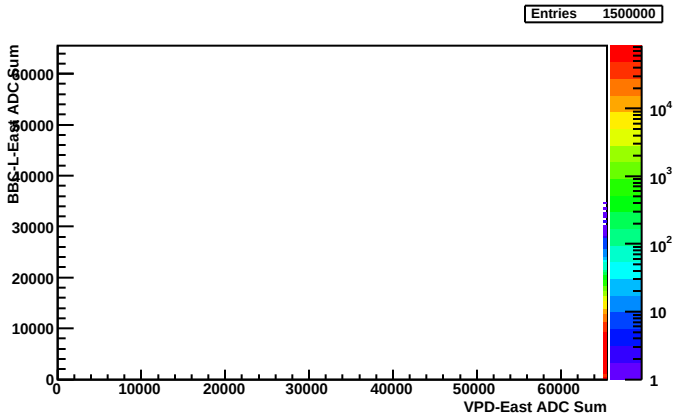

Entries 1500000
TOF Mult
VPD-West ADC Sum

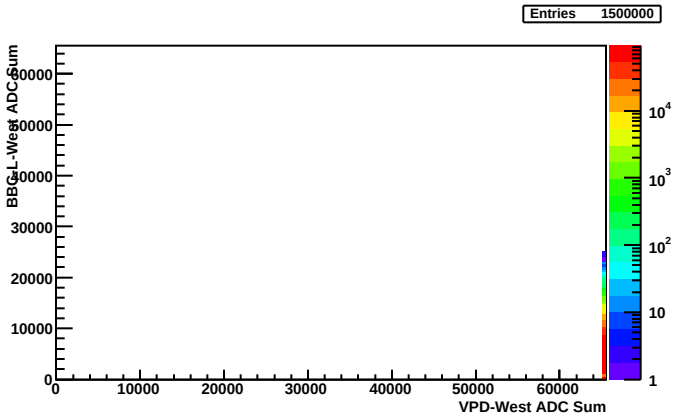

Entries 1500000
TOF Mult
ZDC-East ADC Sum Att

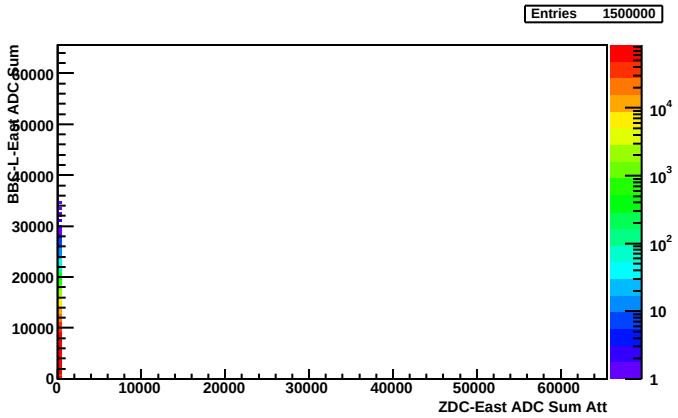

Entries 1500000
TOF Mult
ZDC-West ADC Sum Att

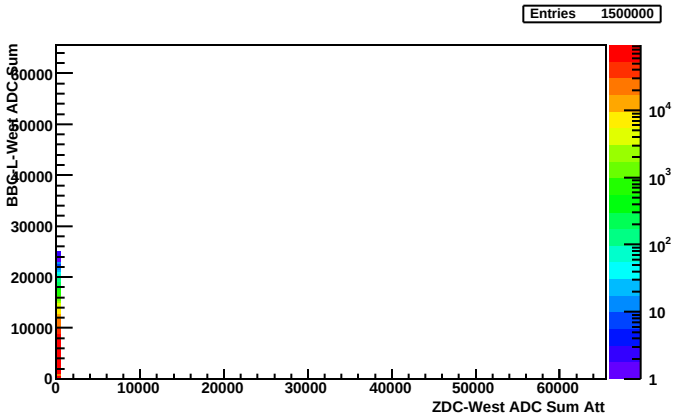

Entries 1500000
BBC-L-East ADC Sum
BBC-S-East ADC Sum

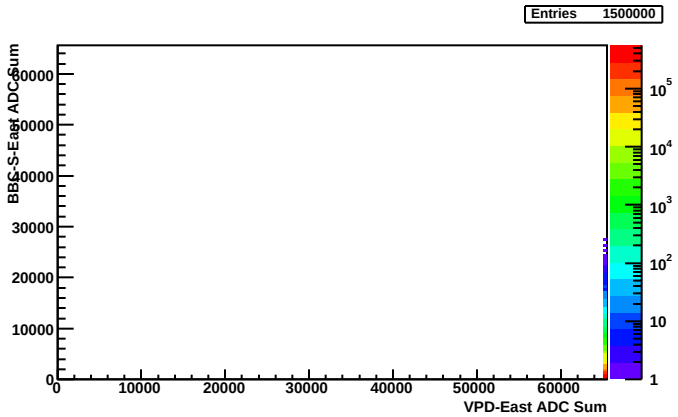

Entries 1500000
BBC-L-West ADC Sum
BBC-S-West ADC Sum

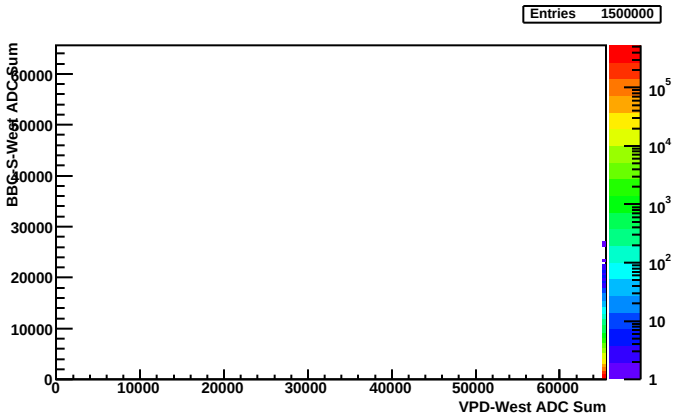

Entries 1500000
BBC-L-East ADC Sum
VPD-East ADC Sum

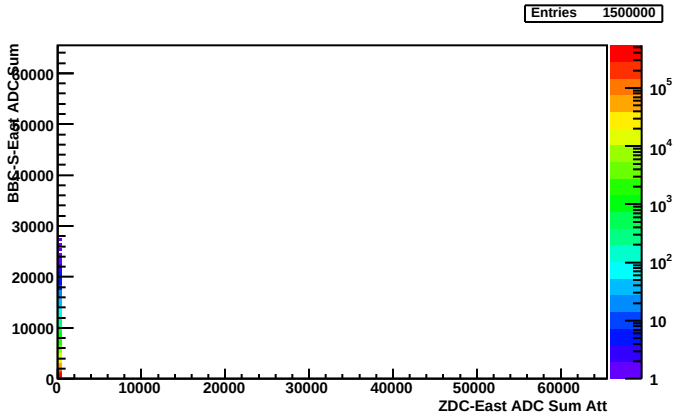

Entries 1500000
BBC-L-West ADC Sum
VPD-West ADC Sum

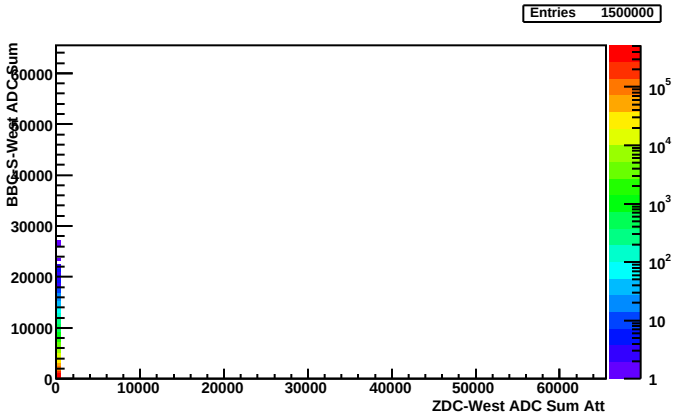

Entries 1500000
BBC-L-East ADC Sum
ZDC-East ADC Sum Att

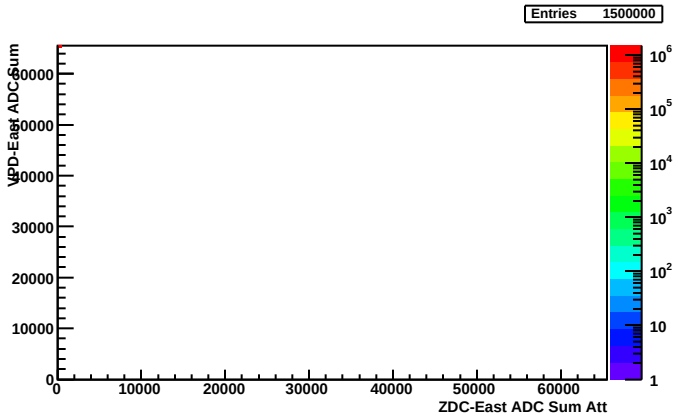

Entries 1500000
BBC-L-West ADC Sum
ZDC-West ADC Sum Att

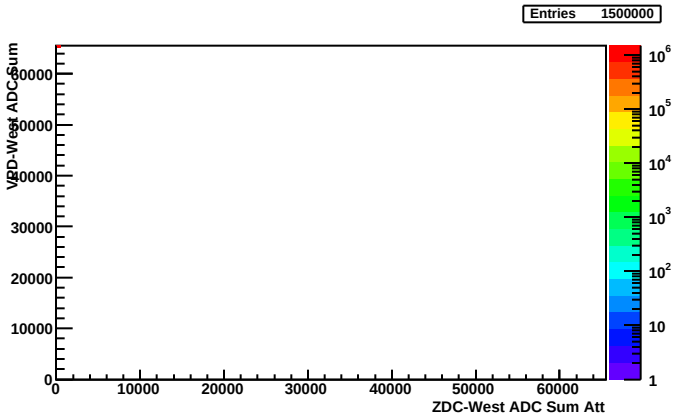

Entries 1500000
BBC-S-East ADC Sum
VPD-East ADC Sum

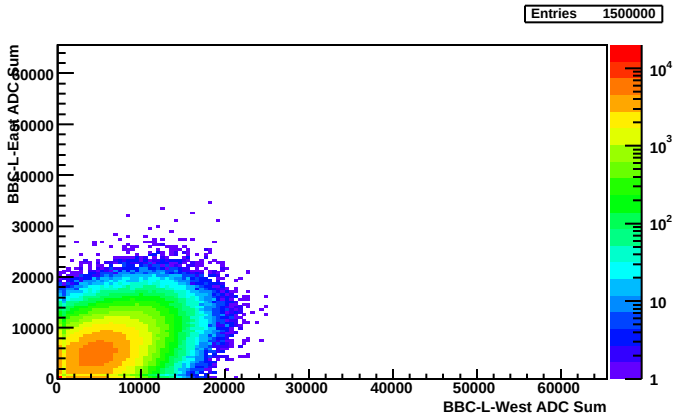

Entries 1500000
BBC-S-West ADC Sum
VPD-West ADC Sum

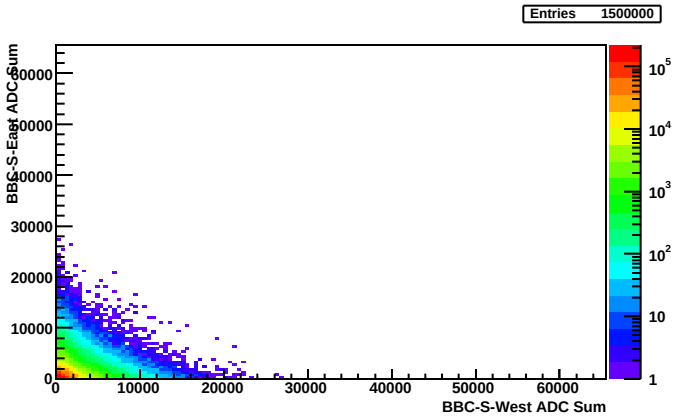

Entries 1500000
BBC-S-East ADC Sum
ZDC-East ADC Sum Att

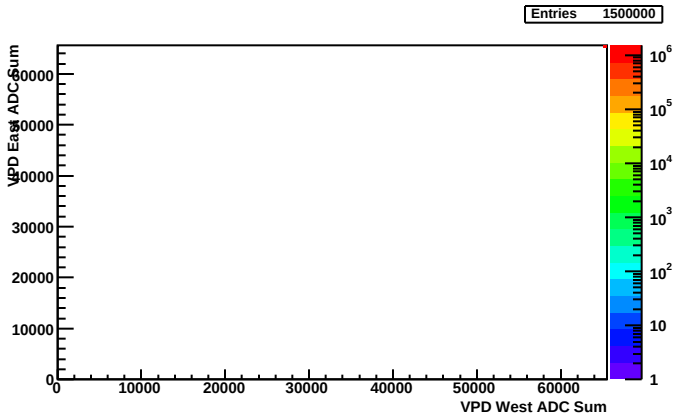

Entries 1500000
BBC-S-West ADC Sum
ZDC-West ADC Sum Att

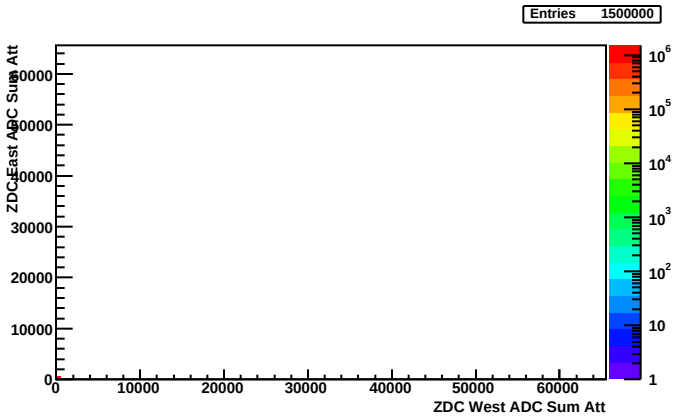

Entries 1500000
VPD-East ADC Sum
ZDC-East ADC Sum Att

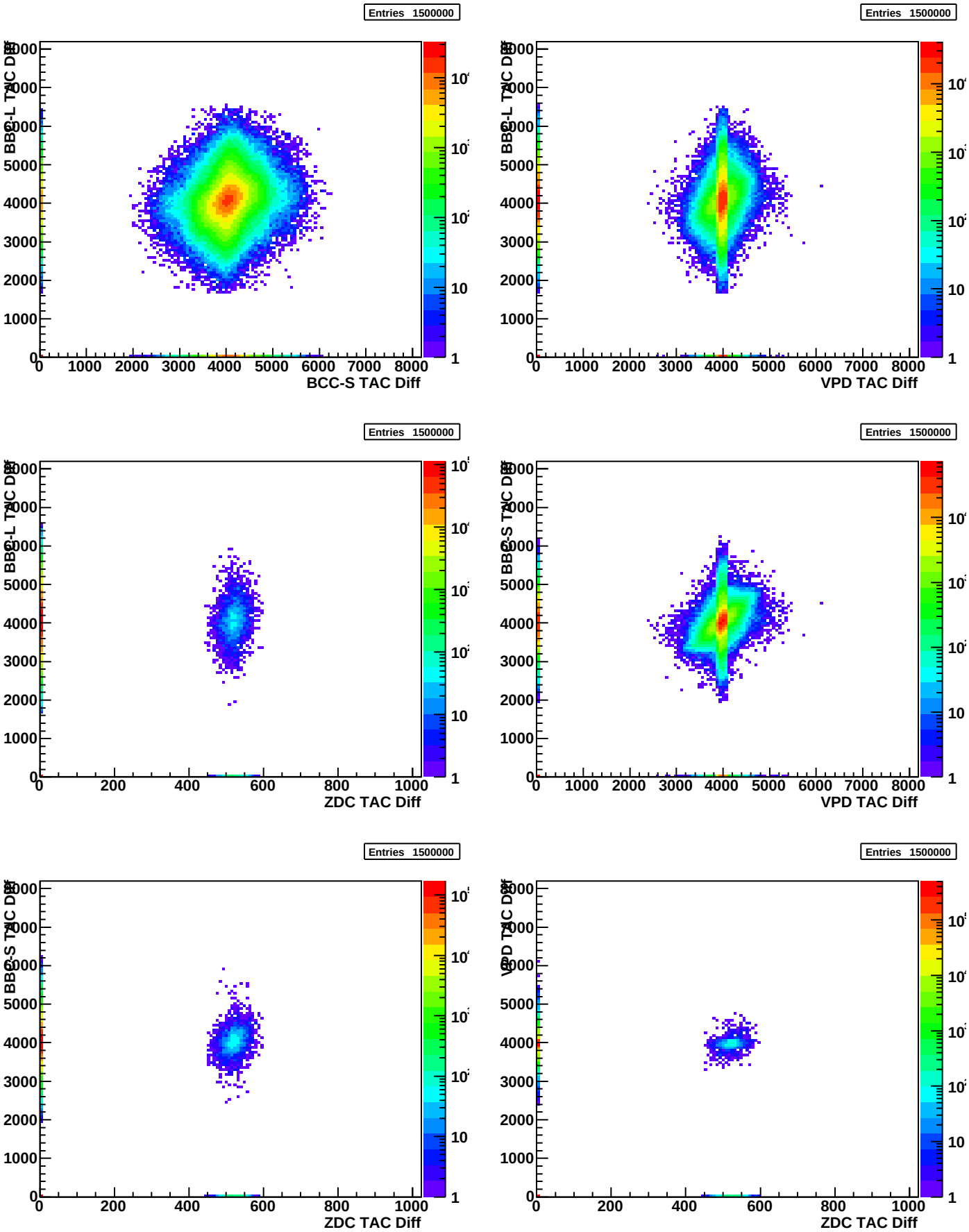

Entries 1500000
VPD-West ADC Sum
ZDC-West ADC Sum Att

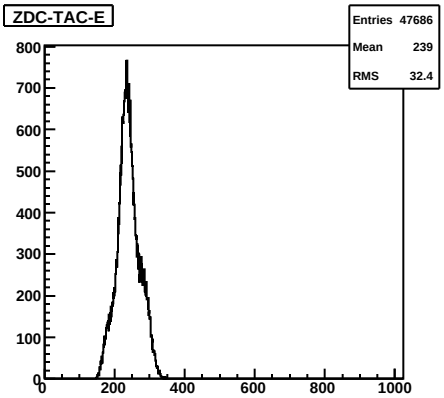

Entries 1500000
BBC-L-East ADC Sum
BBC-L-West ADC Sum

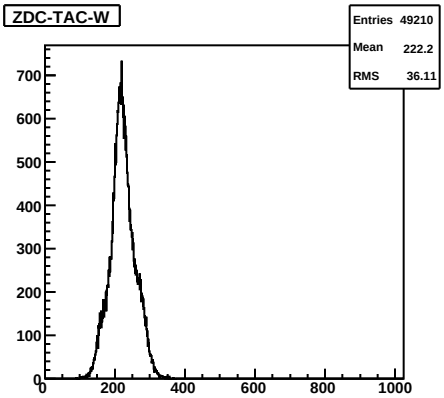

Entries 1500000
BBC-S-East ADC Sum
BBC-S-West ADC Sum

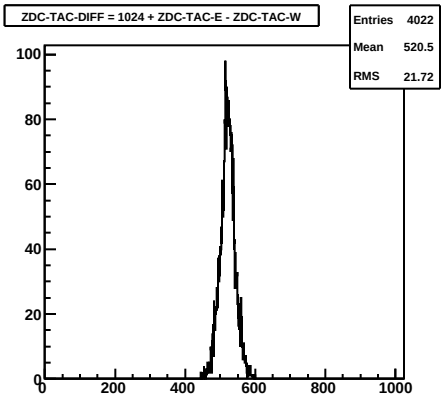

Entries 1500000
VPD East ADC Sum
VPD West ADC Sum

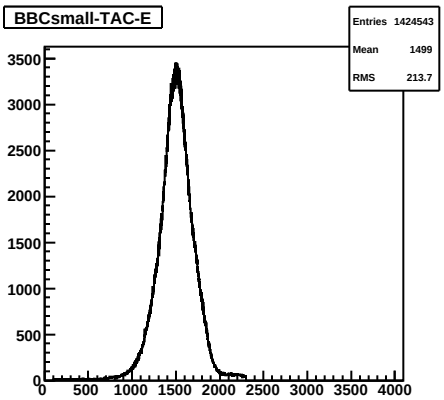

Entries 1500000
ZDC East ADC Sum Att
ZDC West ADC Sum Att

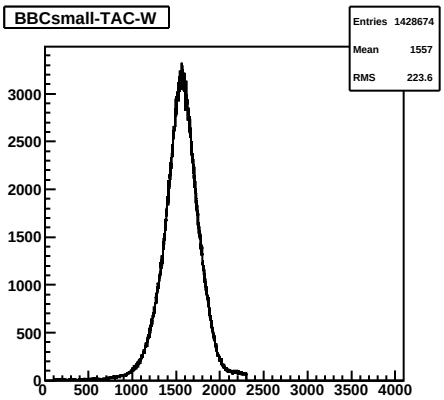

Entries 1500000
BBC-L TAC Diff
BCC-S TAC Diff
Entries 1500000
BBC-L TAC Diff
VPD TAC Diff
Entries 1500000
BBC-L TAC Diff
ZDC TAC Diff
Entries 1500000
BBC-S TAC Diff
VPD TAC Diff
Entries 1500000
BBC-S TAC Diff
ZDC TAC Diff
Entries 1500000
VPD TAC Diff
ZDC TAC Diff

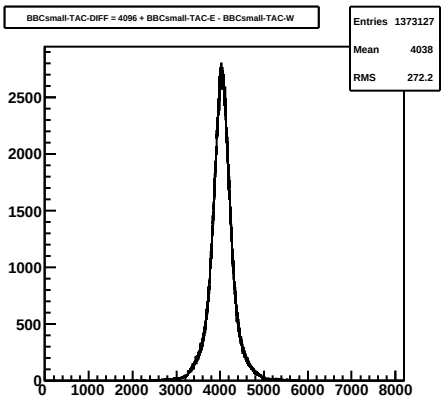

ZDC-TAC-E
Entries 47686
Mean 239
RMS 32.4

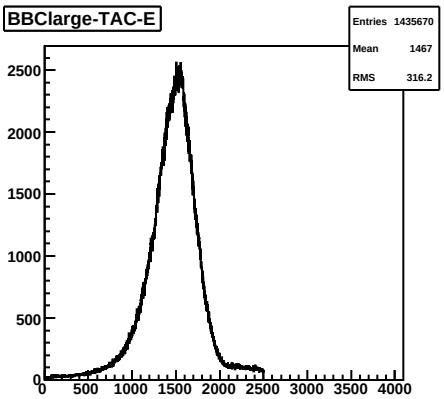

ZDC-TAC-W
Entries 49210
Mean 222.2
RMS 36.11

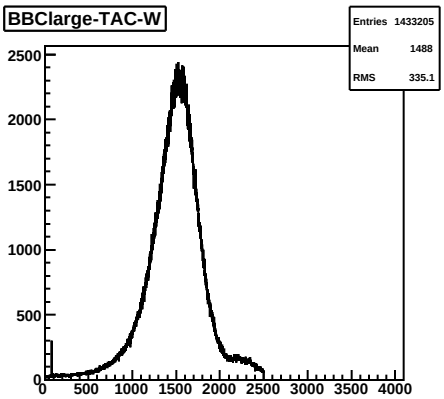

ZDC-TAC-DIFF = 1024 + ZDC-TAC-E - ZDC-TAC-W
Entries 4022
Mean 520.5
RMS 21.72

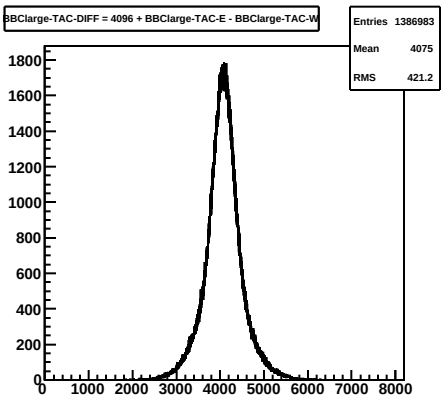

BBCsmall-TAC-E
Entries 1424543
Mean 1499
RMS 213.7

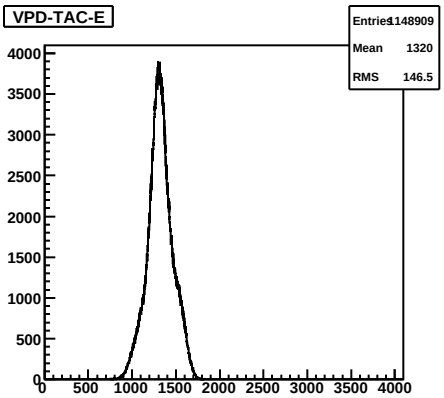

BBCsmall-TAC-W
Entries 1428674
Mean 1557
RMS 223.6

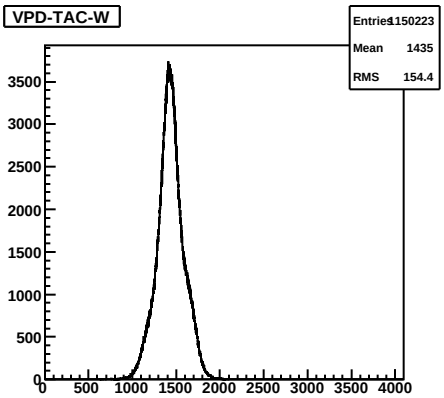

BBCsmall-TAC-DIFF = 4096 + BBCsmall-TAC-E - BBCsmall-TAC-W
Entries 1373127
Mean 4038
RMS 272.2

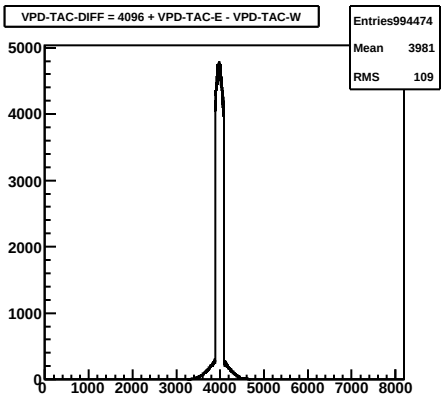

BBClarge-TAC-E
Entries 1435670
Mean 1467
RMS 316.2

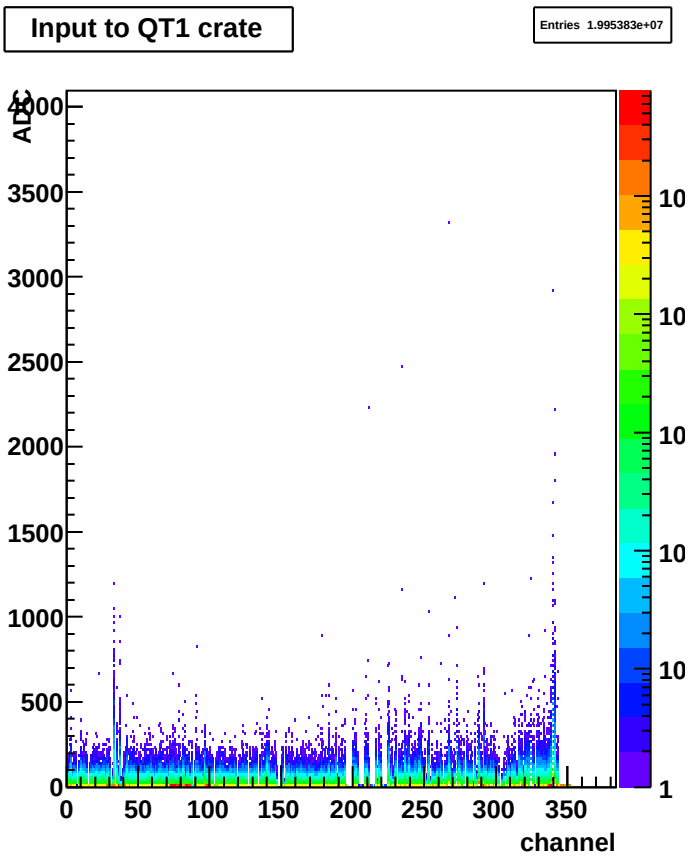

BBClarge-TAC-W
Entries 1433205
Mean 1488
RMS 335.1

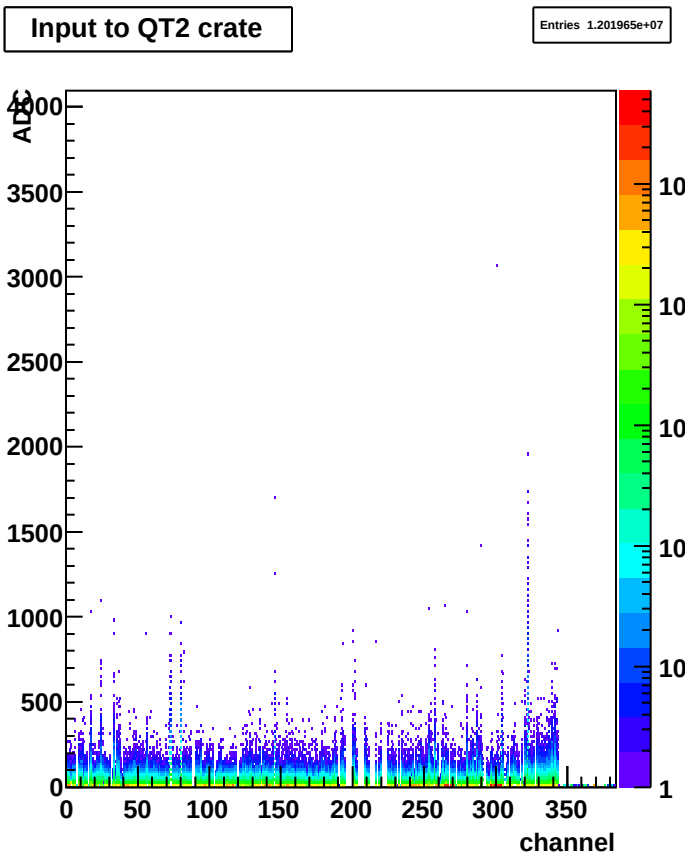

BBClarge-TAC-DIFF = 4096 + BBClarge-TAC-E - BBClarge-TAC-W
Entries 1386983
Mean 4075
RMS 421.2

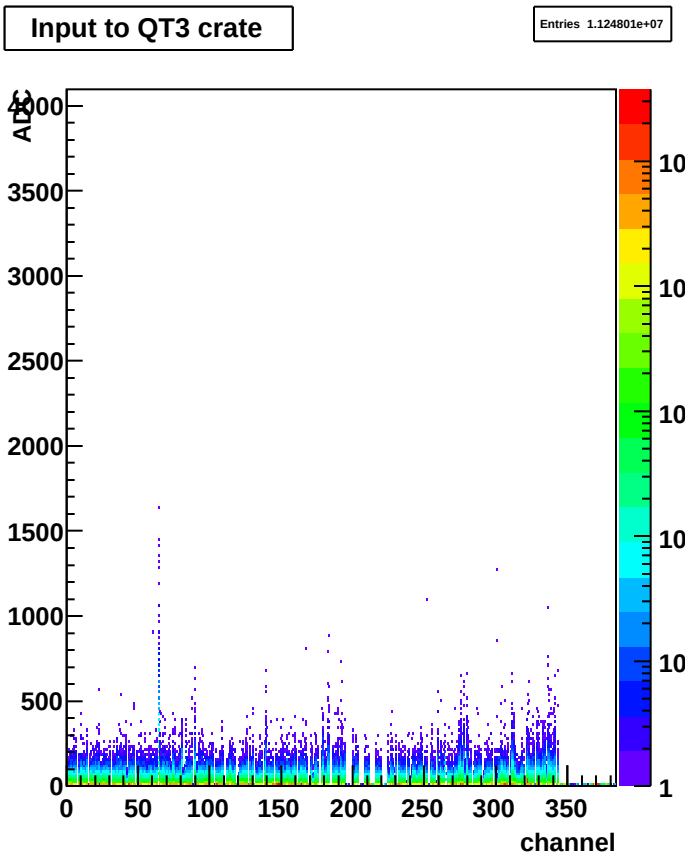

VPD-TAC-E
Entries 1148909
Mean 1320
RMS 146.5

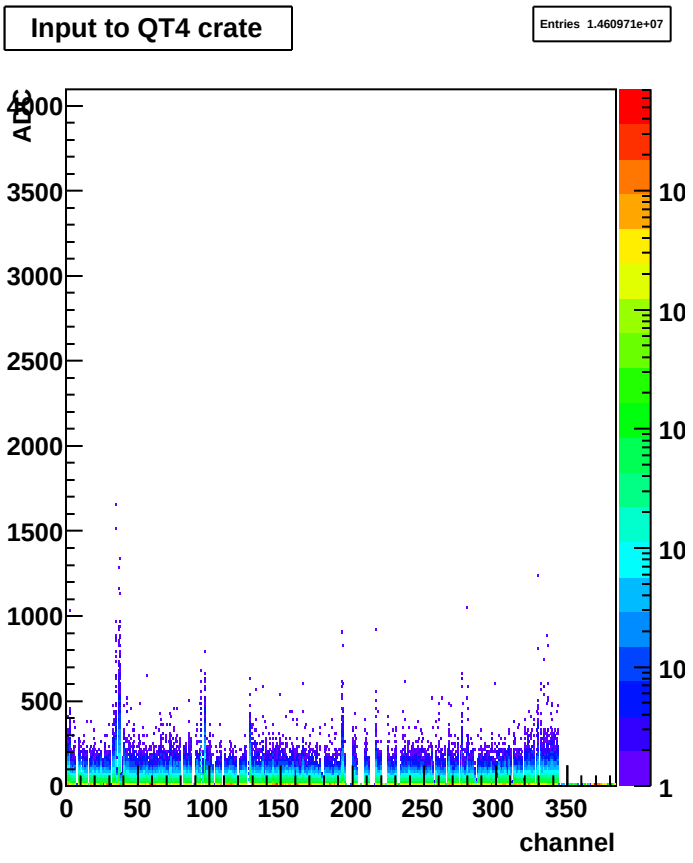

VPD-TAC-W
Entries 1150223
Mean 1435
RMS 154.4

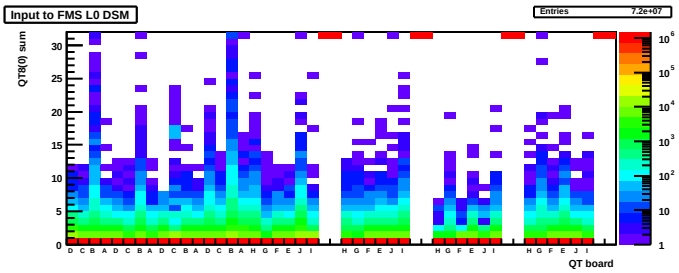

VPD-TAC-DIFF = 4096 + VPD-TAC-E - VPD-TAC-W
Entries 994474
Mean 3981
RMS 109

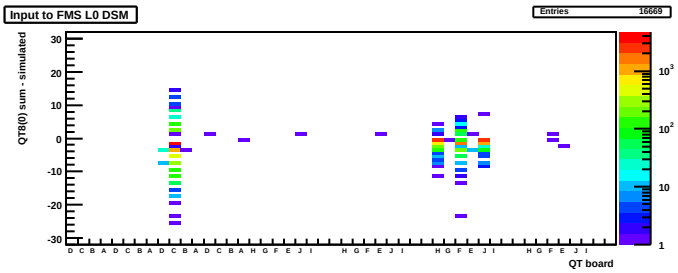

Input to QT1 crate
Entries 1.995383e+07
ADC
channel

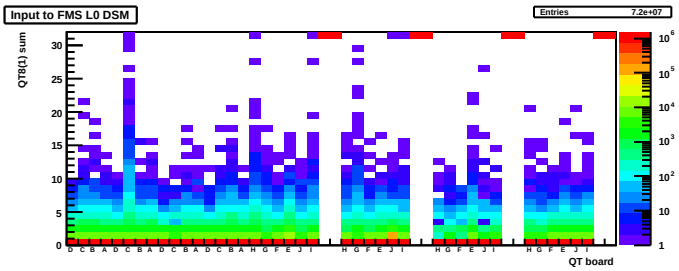

Input to QT2 crate
Entries 1.201965e+07
ADC
channel

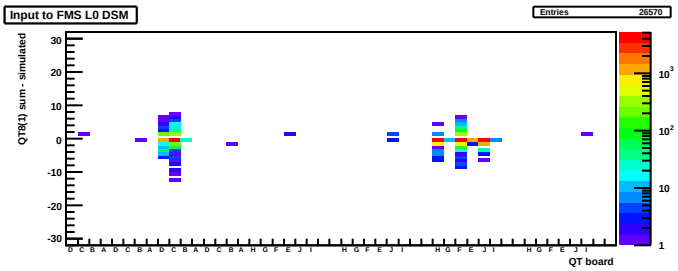

Input to QT3 crate
Entries 1.124801e+07
ADC
channel

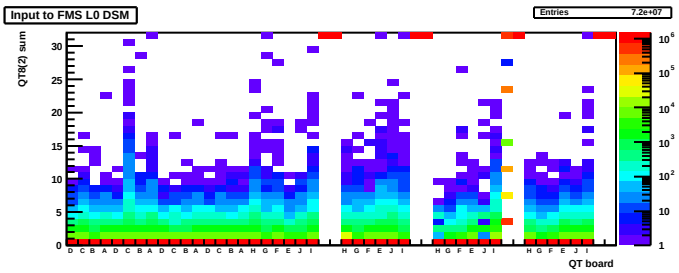

Input to QT4 crate
Entries 1.460971e+07
ADC
channel

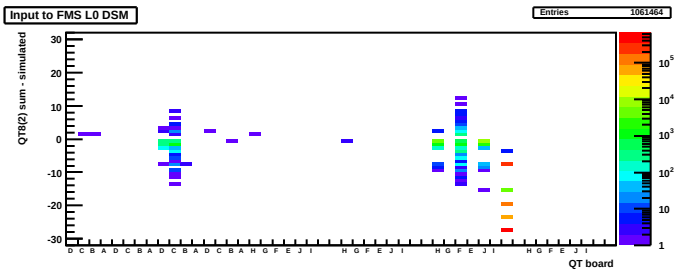

Input to FMS L0 DSM
Entries 7.2e+07
QT8(0) sum
QT board

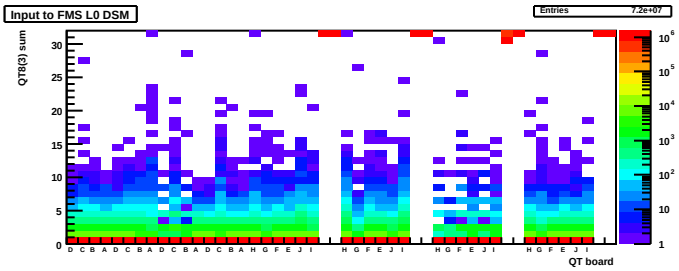

Input to FMS L0 DSM
Entries 16669
QT8(0) sum - simulated
QT board

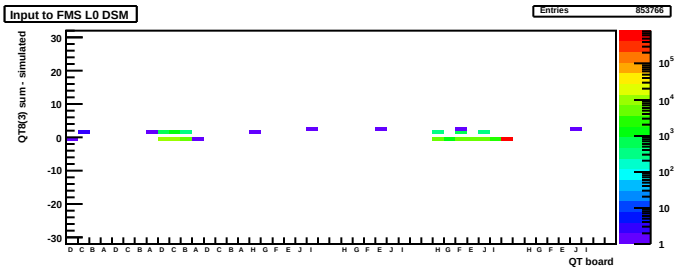

Input to FMS L0 DSM
Entries 7.2e+07
QT8(1) sum
QT board

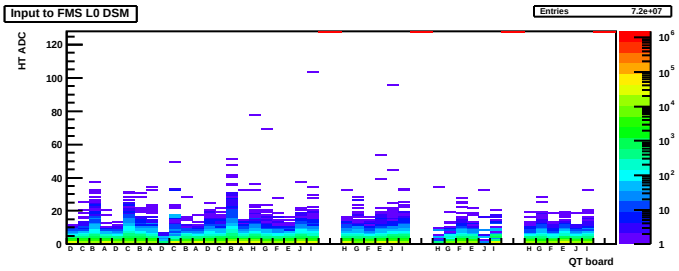

Input to FMS L0 DSM
Entries 26570
QT8(1) sum - simulated
QT board

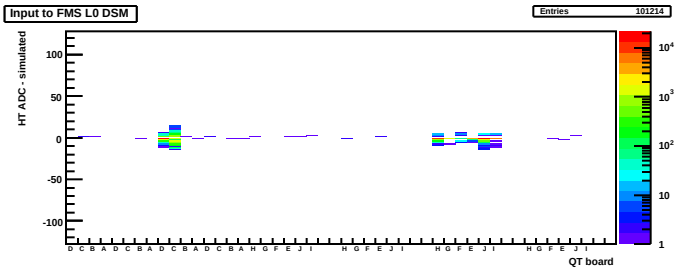

Input to FMS L0 DSM
Entries 7.2e+07
QT8(2) sum
QT board

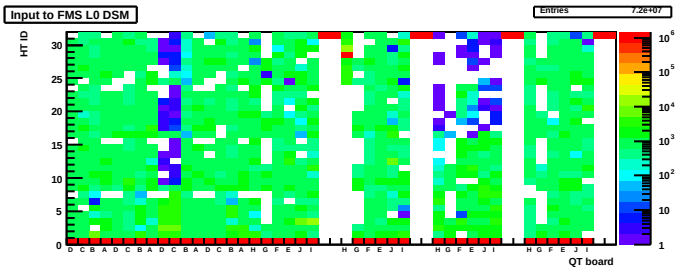

Input to FMS L0 DSM
Entries 1061464
QT8(2) sum - simulated
QT board

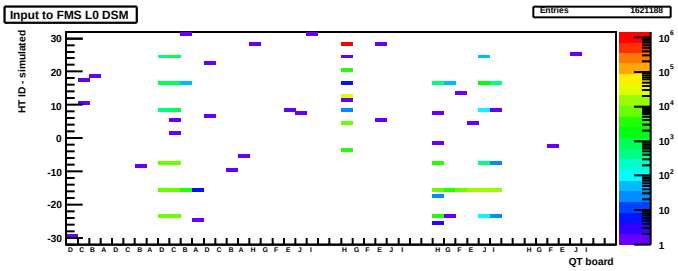

Input to FMS L0 DSM
Entries 7.2e+07
QT8(3) sum
QT board

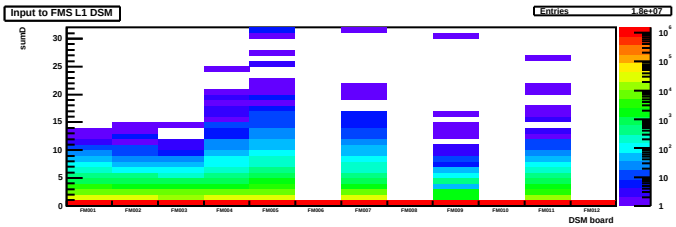

Input to FMS L0 DSM
Entries 853766
QT8(3) sum - simulated
QT board

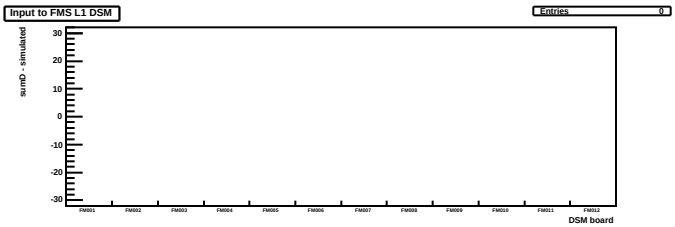

Input to FMS L0 DSM
Entries 7.2e+07
HT ADC
QT board

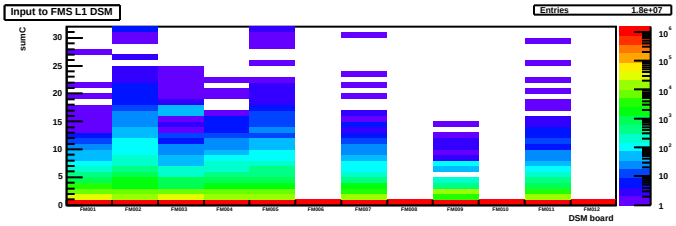

Input to FMS L0 DSM
Entries 101214
HT ADC - simulated
QT board

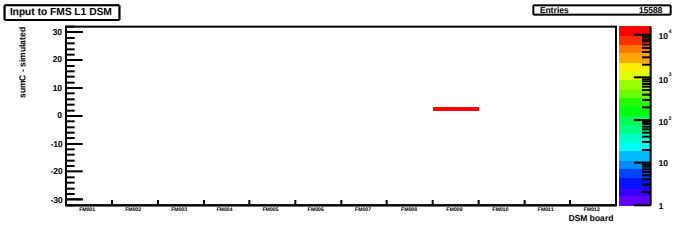

Input to FMS L0 DSM
Entries 7.2e+07
HT ID
QT board

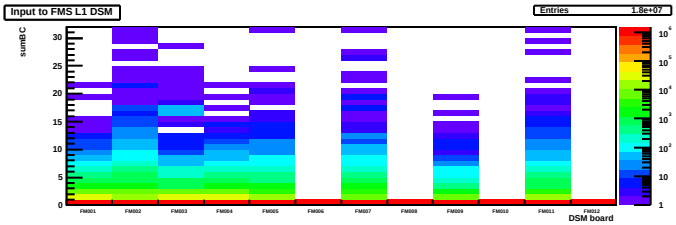

Input to FMS L0 DSM
Entries 1621188
HT ID - simulated
QT board

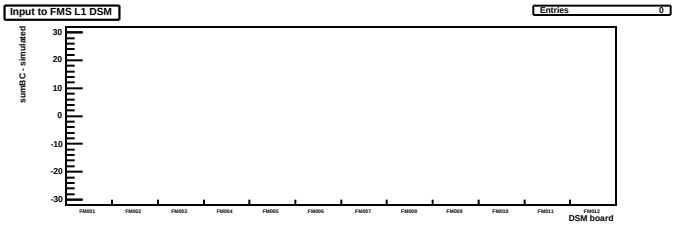

Input to FMS L1 DSM
Entries 1.8e+07
sumD
DSM board

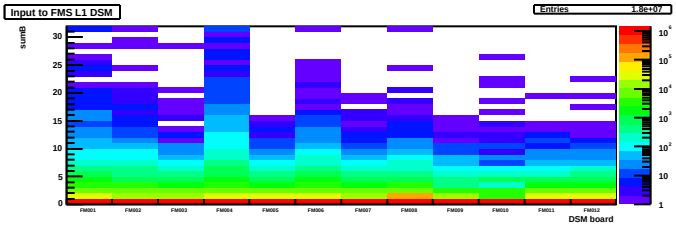

Input to FMS L1 DSM
Entries 0
sumD - simulated
DSM board

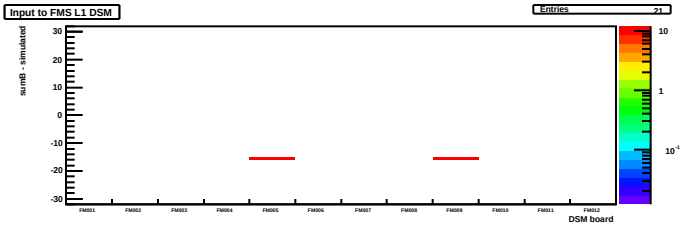

Input to FMS L1 DSM
Entries 1.8e+07
sumC
DSM board

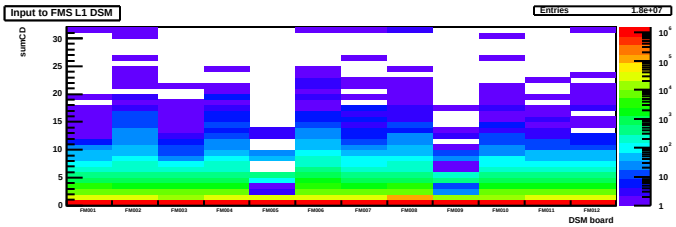

Input to FMS L1 DSM
Entries 15588
sumC - simulated
DSM board

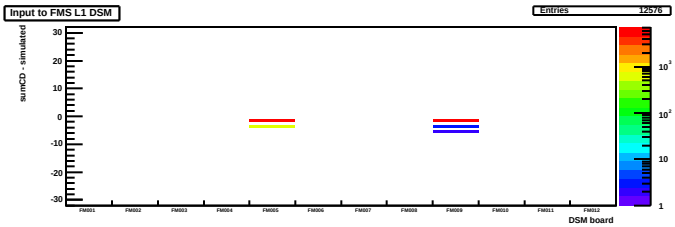

Input to FMS L1 DSM
Entries 1.8e+07
sumBC
DSM board

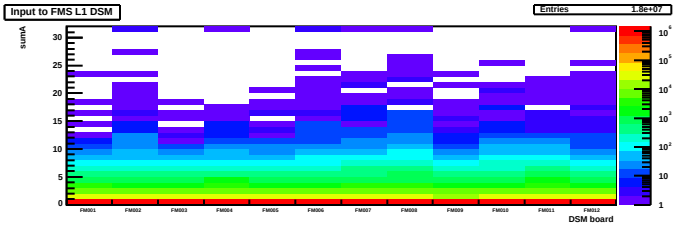

Input to FMS L1 DSM
Entries 0
sumBC - simulated
DSM board

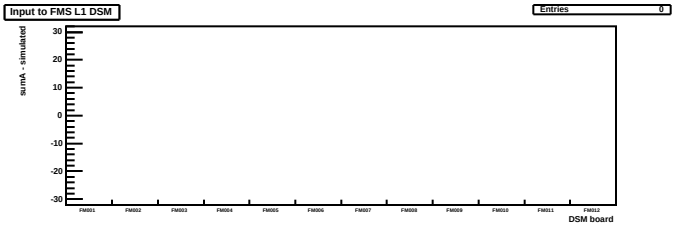

Input to FMS L1 DSM
Entries 1.8e+07
sumB
DSM board

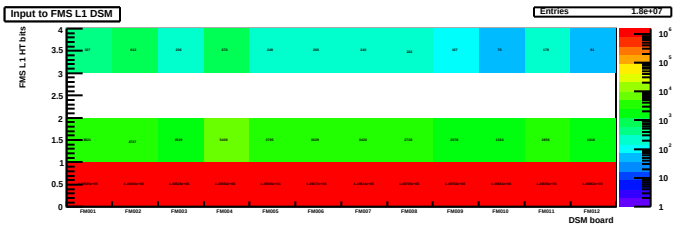

Input to FMS L1 DSM
Entries 21
sumB - simulated
DSM board

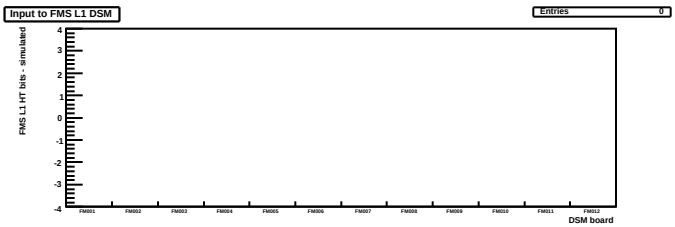

Input to FMS L1 DSM
Entries 1.8e+07
sumCD
DSM board

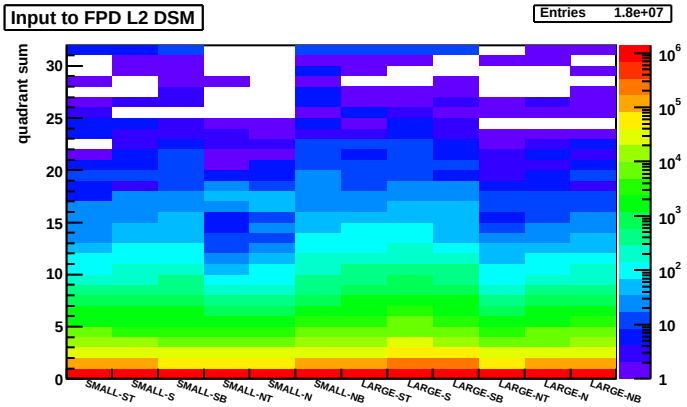

Input to FMS L1 DSM
Entries 12576
sumCD - simulated
DSM board

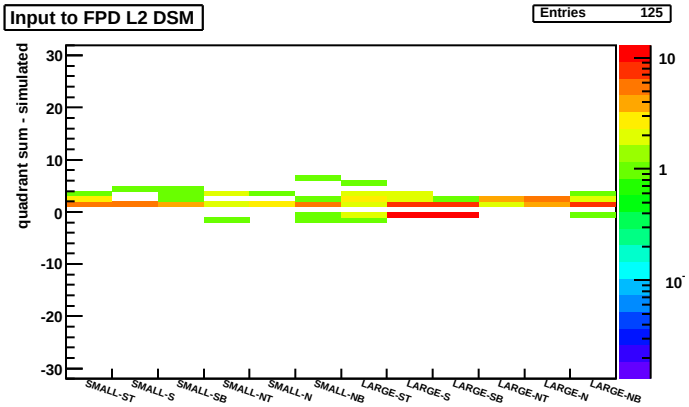

Input to FMS L1 DSM
Entries 1.8e+07
sumA
DSM board

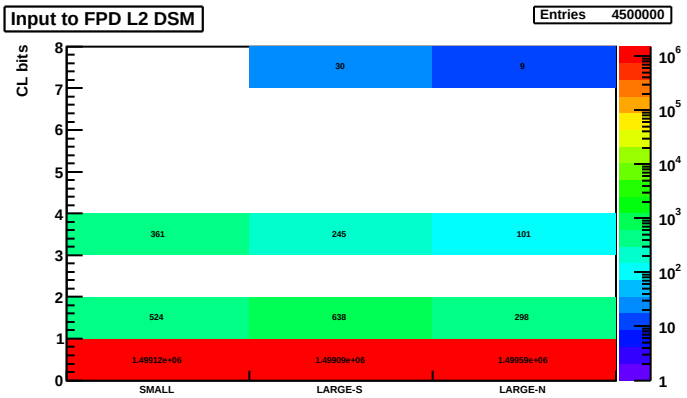

Input to FMS L1 DSM
Entries 0
sumA - simulated
DSM board

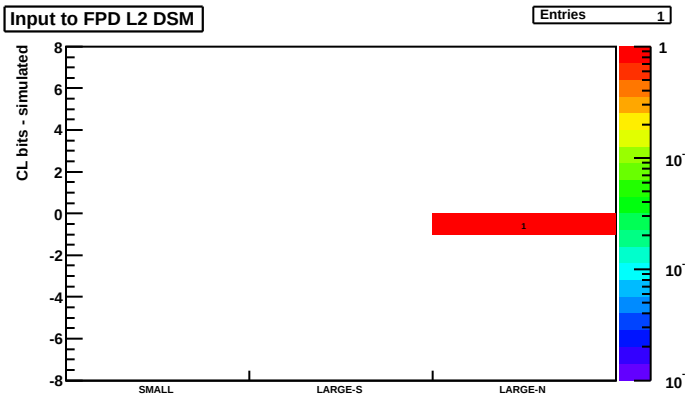

Input to FMS L1 DSM
Entries 1.8e+07
FMS L1 HT bits
DSM board

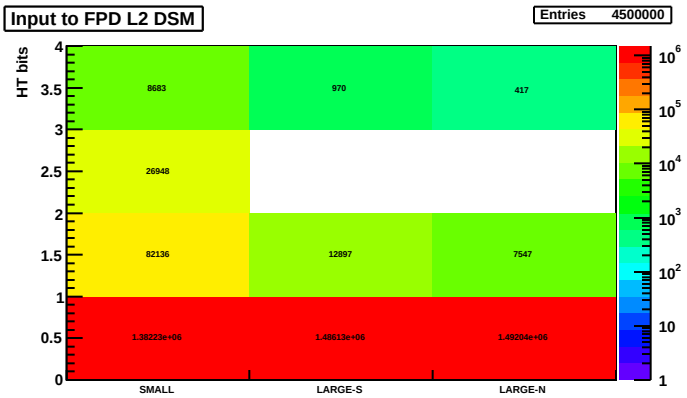

Input to FMS L1 DSM
Entries 0
FMS L1 HT bits - simulated
DSM board

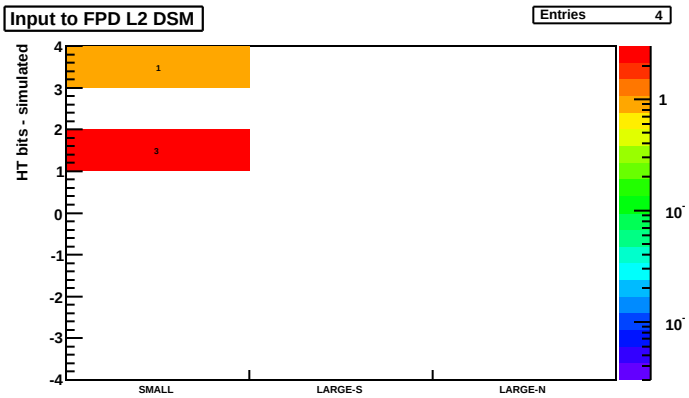

Input to FPD L2 DSM
Entries 1.8e+07
quadrant sum
SMALL-ST
SMALL-S
SMALL-SB
SMALL-NT
SMALL-N
SMALL-NB
LARGE-ST
LARGE-S
LARGE-SB
LARGE-NT
LARGE-N
LARGE-NB

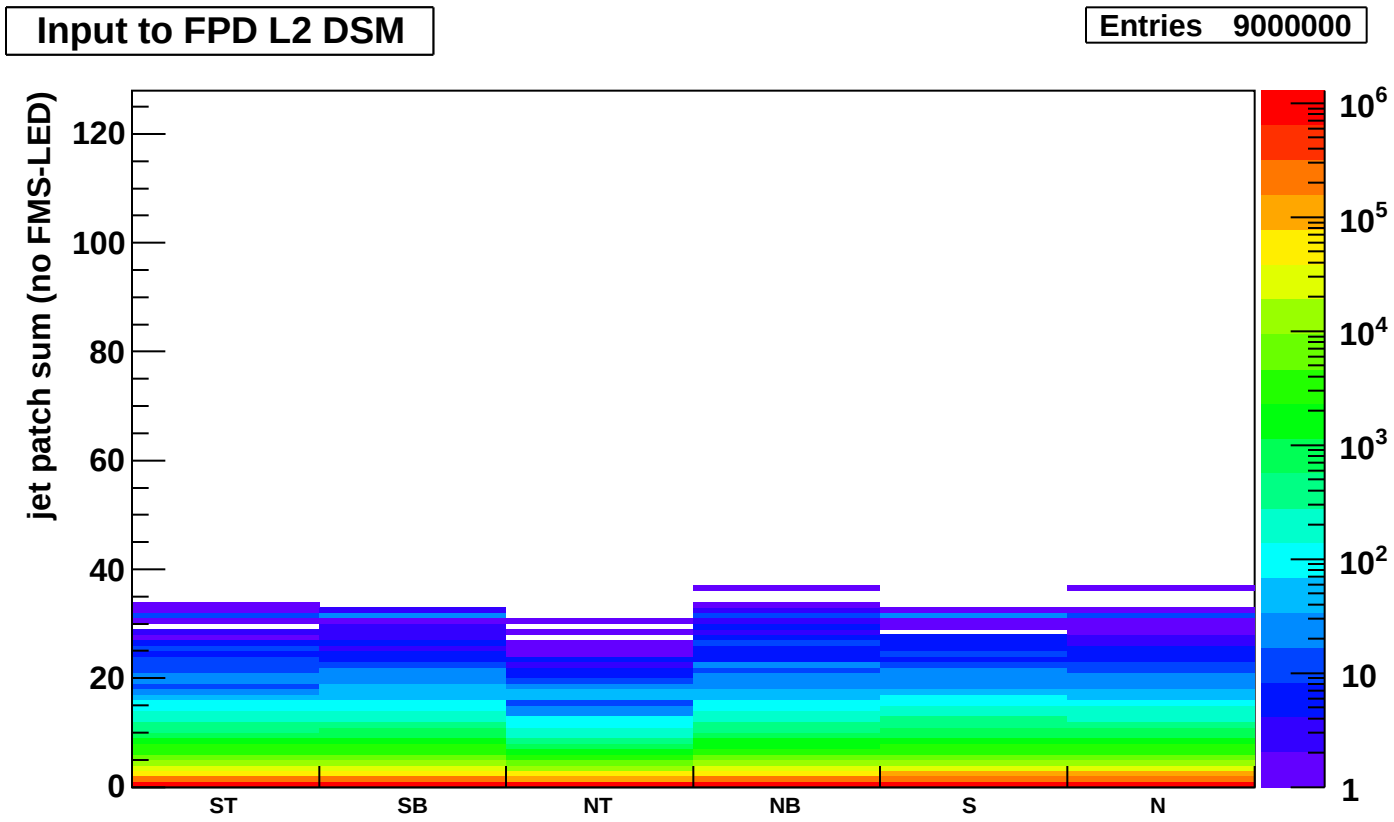

Input to FPD L2 DSM
Entries 125
quadrant sum - simulated
SMALL-ST
SMALL-S
SMALL-SB
SMALL-NT
SMALL-N
SMALL-NB
LARGE-ST
LARGE-S
LARGE-SB
LARGE-NT
LARGE-N
LARGE-NB

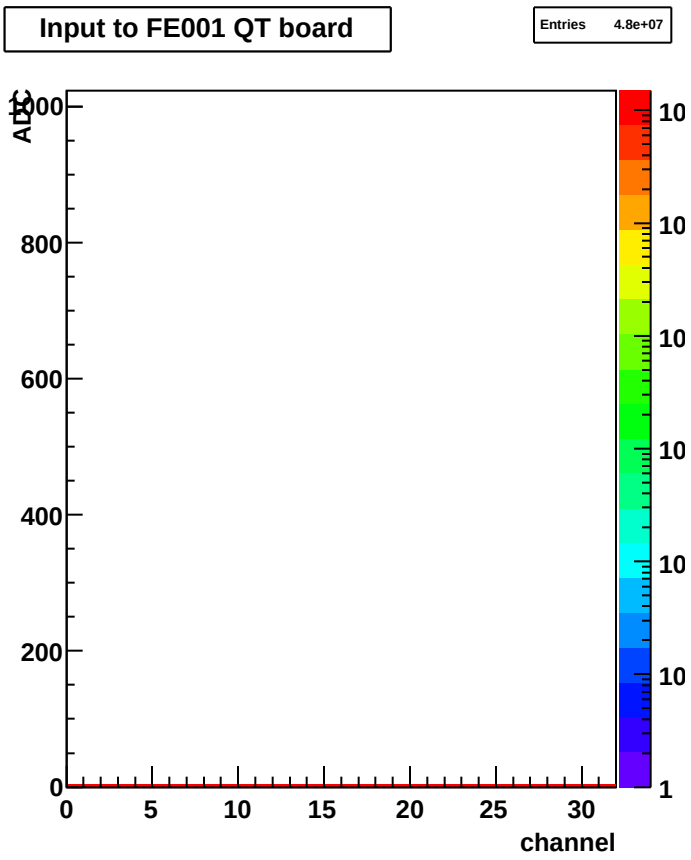

Input to FPD L2 DSM
Entries 4500000
CL bits
30
9
361
245
101
524
638
298
1.49912e+06
1.49909e+06
1.49959e+06
SMALL
LARGE-S
LARGE-N

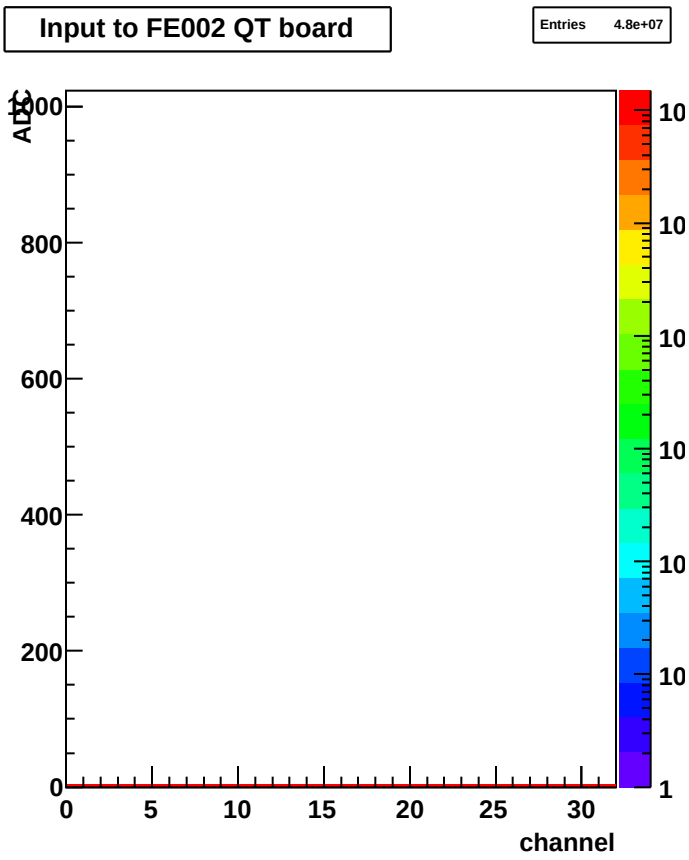

Input to FPD L2 DSM
Entries 1
CL bits - simulated
1
SMALL
LARGE-S
LARGE-N

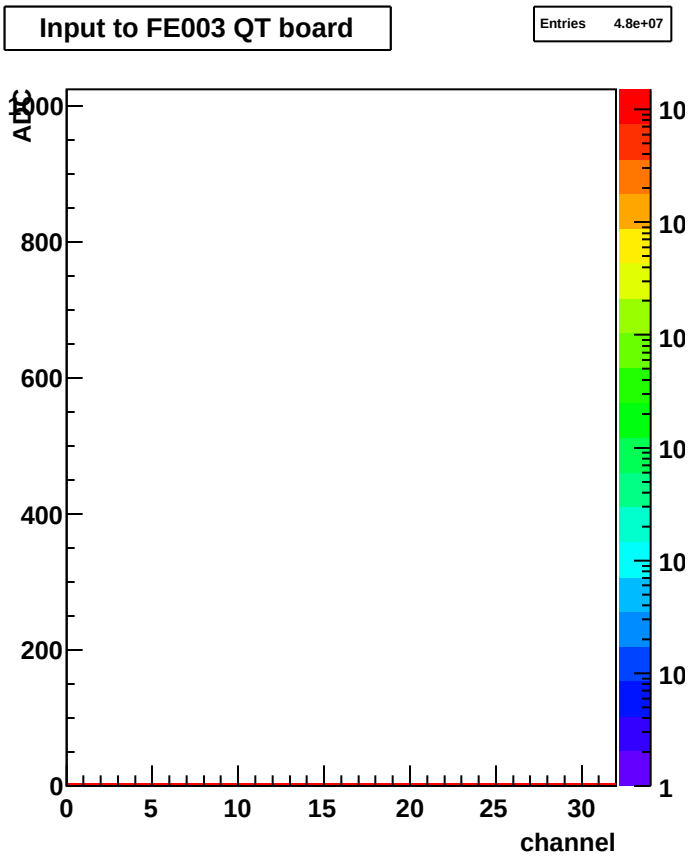

Input to FPD L2 DSM
Entries 4500000
HT bits
8683
970
417
26948
82136
12897
7547
1.38223e+06
1.48613e+06
1.49204e+06
SMALL
LARGE-S
LARGE-N

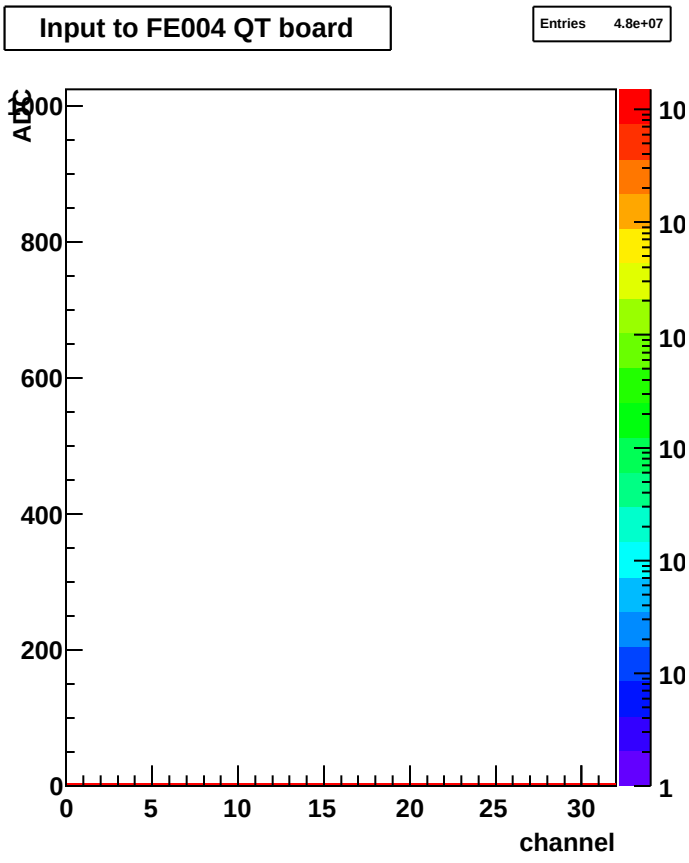

Input to FPD L2 DSM
Entries 4
HT bits - simulated
1
3
SMALL
LARGE-S
LARGE-N

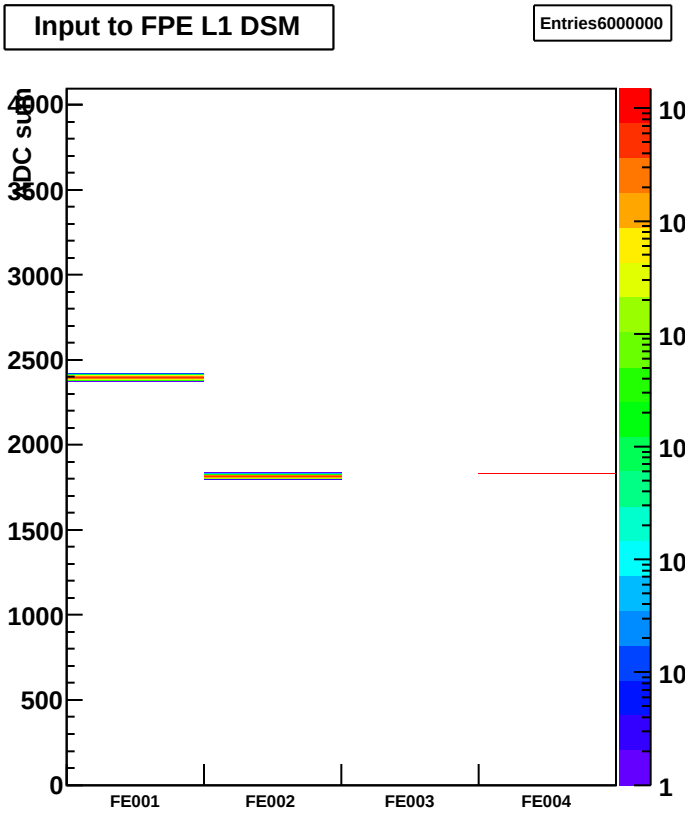

Input to FPD L2 DSM
Entries 9000000
jet patch sum (no FMS-LED)
0
20
40
60
80
100
120
ST
SB
NT
NB
S
N
1
10
10^2
10^3
10^4
10^5
10^6

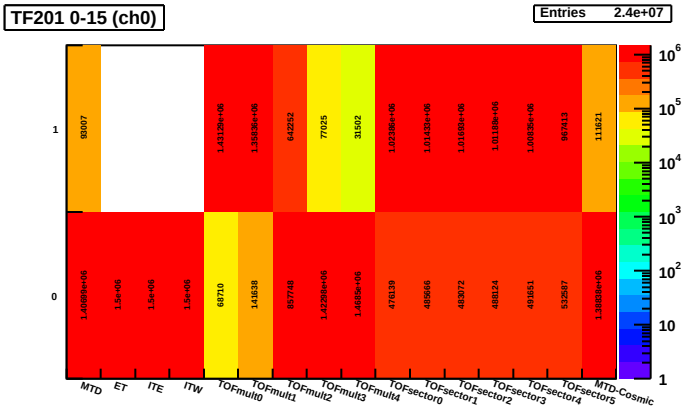

Input to FE001 QT board
Entries 4.8e+07
ADC
channel

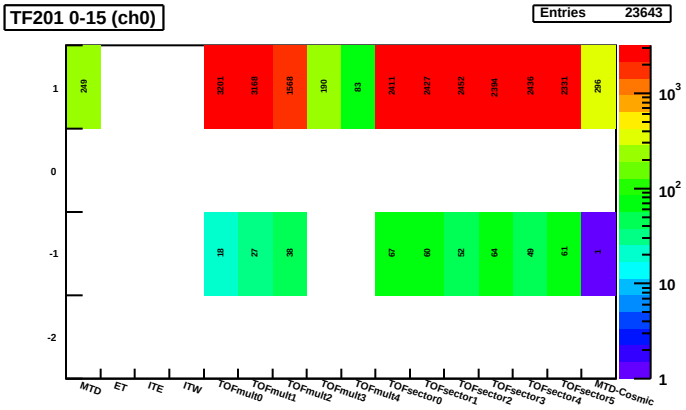

Input to FE002 QT board
Entries 4.8e+07
ADC
channel

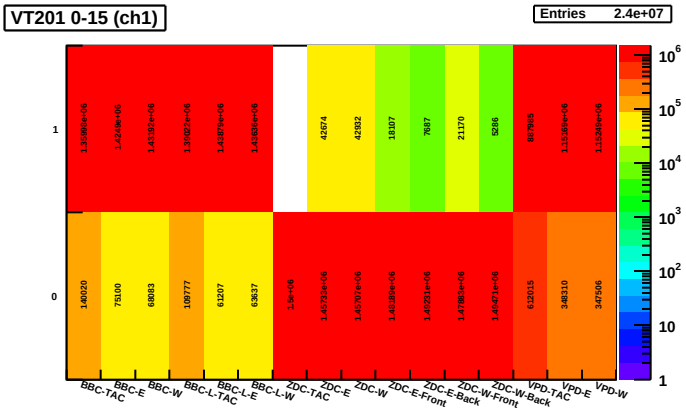

Input to FE003 QT board
Entries 4.8e+07
ADC
channel

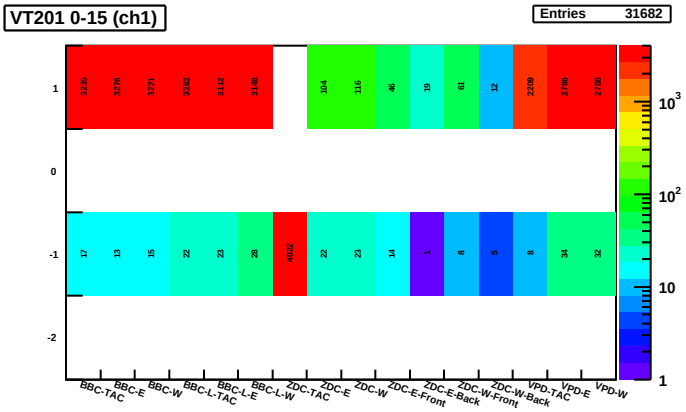

Input to FE004 QT board
Entries 4.8e+07
ADC
channel


Input to FPE L1 DSM
Entries6000000
ADC sum
4000
3500
3000
2500
2000
1500
1000
500
0
FE001
FE002
FE003
FE004
10
10
10
10
10
10
1


TF201 0-15 (ch0)
Entries 2.4e+07
MTD ET ITE ITW TOFmult0 TOFmult1 TOFmult2 TOFmult3 TOFmult4 TOFsector0 TOFsector1 TOFsector2 TOFsector3 TOFsector4 TOFsector5 MTD-Cosmic


TF201 0-15 (ch0)
Entries 23643
MTD ET ITE ITW TOFmult0 TOFmult1 TOFmult2 TOFmult3 TOFmult4 TOFsector0 TOFsector1 TOFsector2 TOFsector3 TOFsector4 TOFsector5 MTD-Cosmic


VT201 0-15 (ch1)
Entries 2.4e+07
BBC-TAC BBC-E BBC-W BBC-L-TAC BBC-L-E BBC-L-W ZDC-TAC ZDC-E ZDC-W ZDC-E-Front ZDC-E-Back ZDC-W-Front ZDC-W-Back VPD-TAC VPD-E VPD-W


VT201 0-15 (ch1)
Entries 31682
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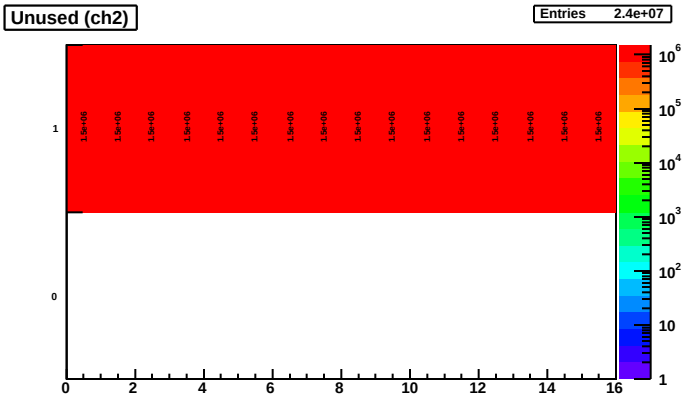
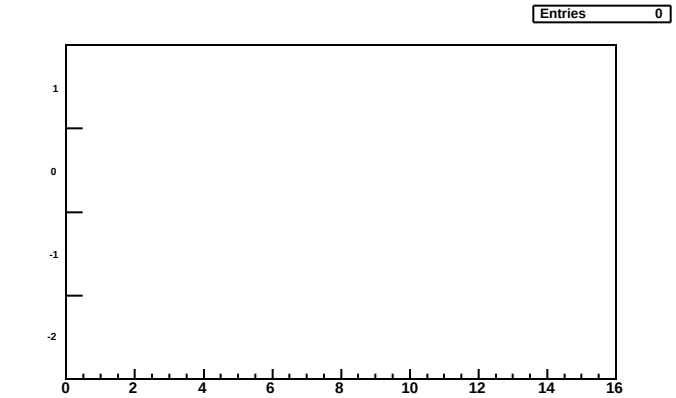
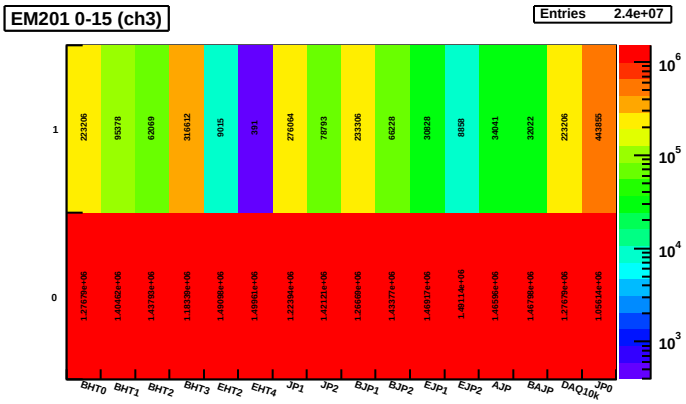
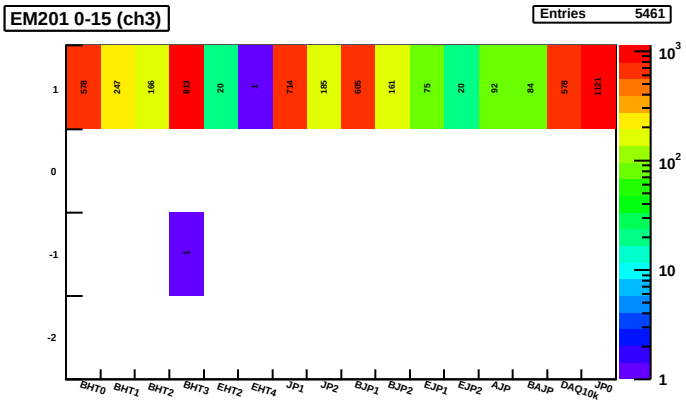

Unused (ch2)
Entries 2.4e+07


Entries 0


EM201 0-15 (ch3)
Entries 2.4e+07
BHT0 BHT1 BHT2 BHT3 EHT2 EHT4 JP1 JP2 BJP1 BJP2 EJP1 EJP2 AJP BAJP DAQ10k JP0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Entries 5461
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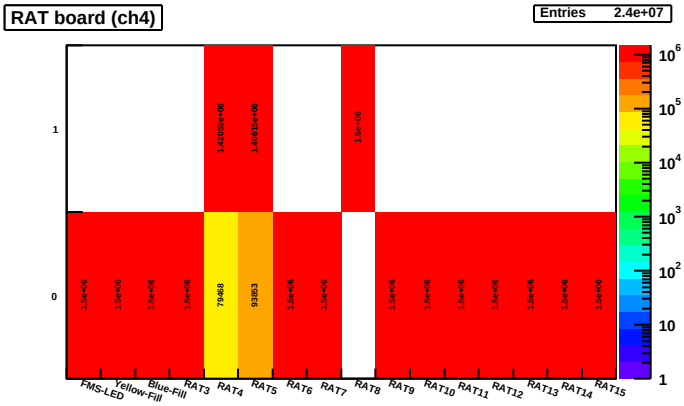
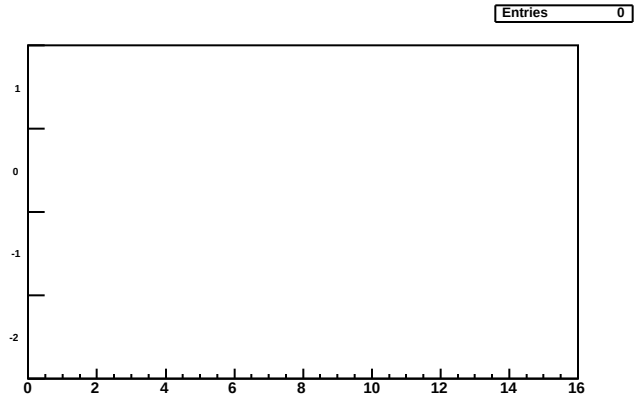
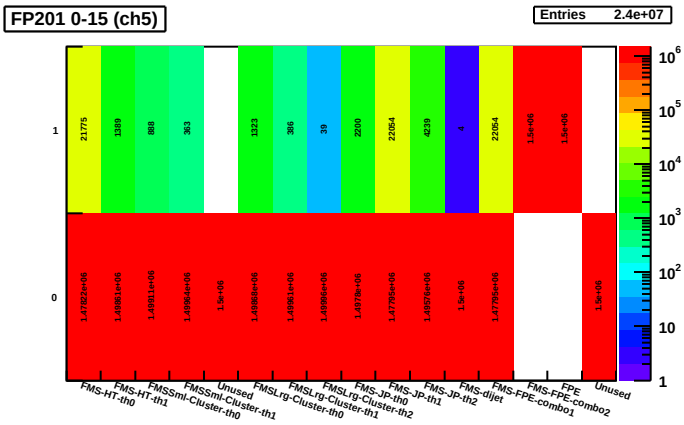
RAT board (ch4)

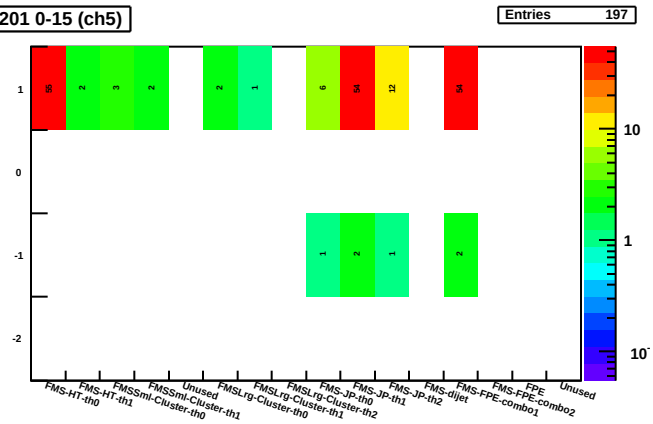




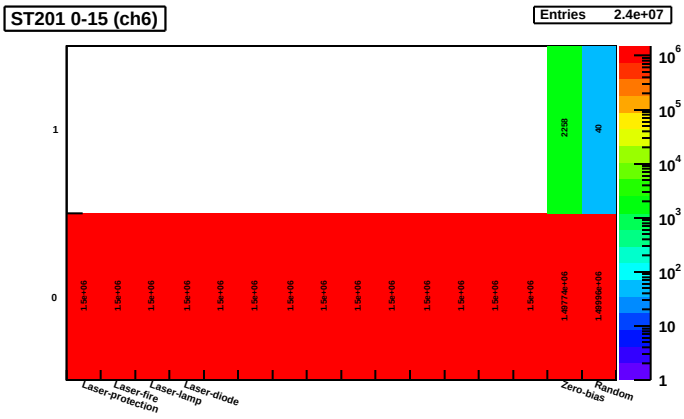
FP201 0-15 (ch5)

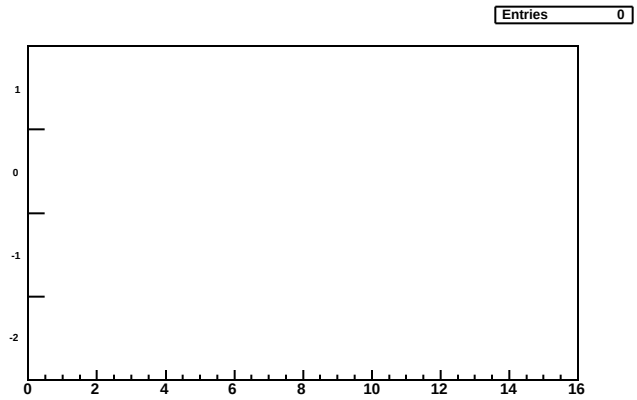
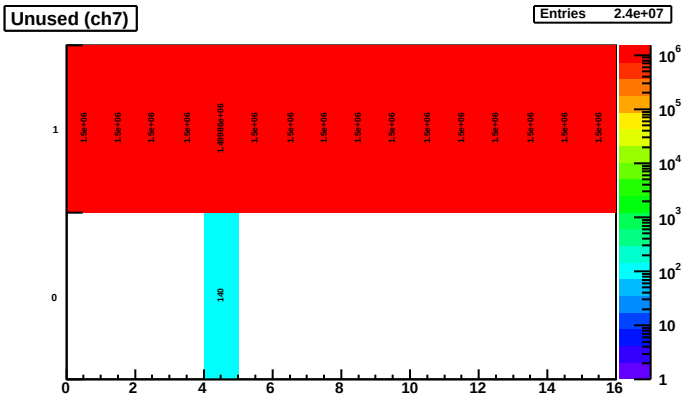
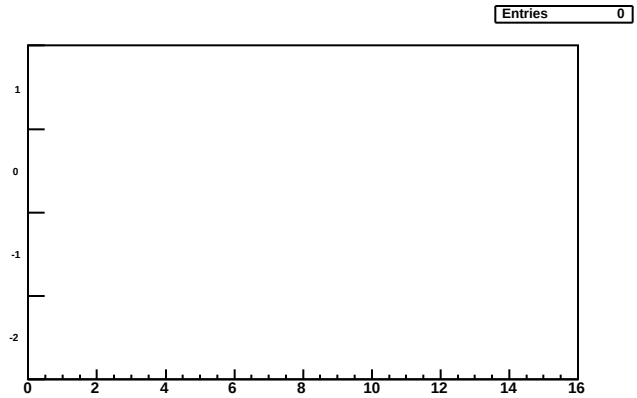


FP201 0-15 (ch5)



ST201 0-15 (ch6)





Unused (ch7)