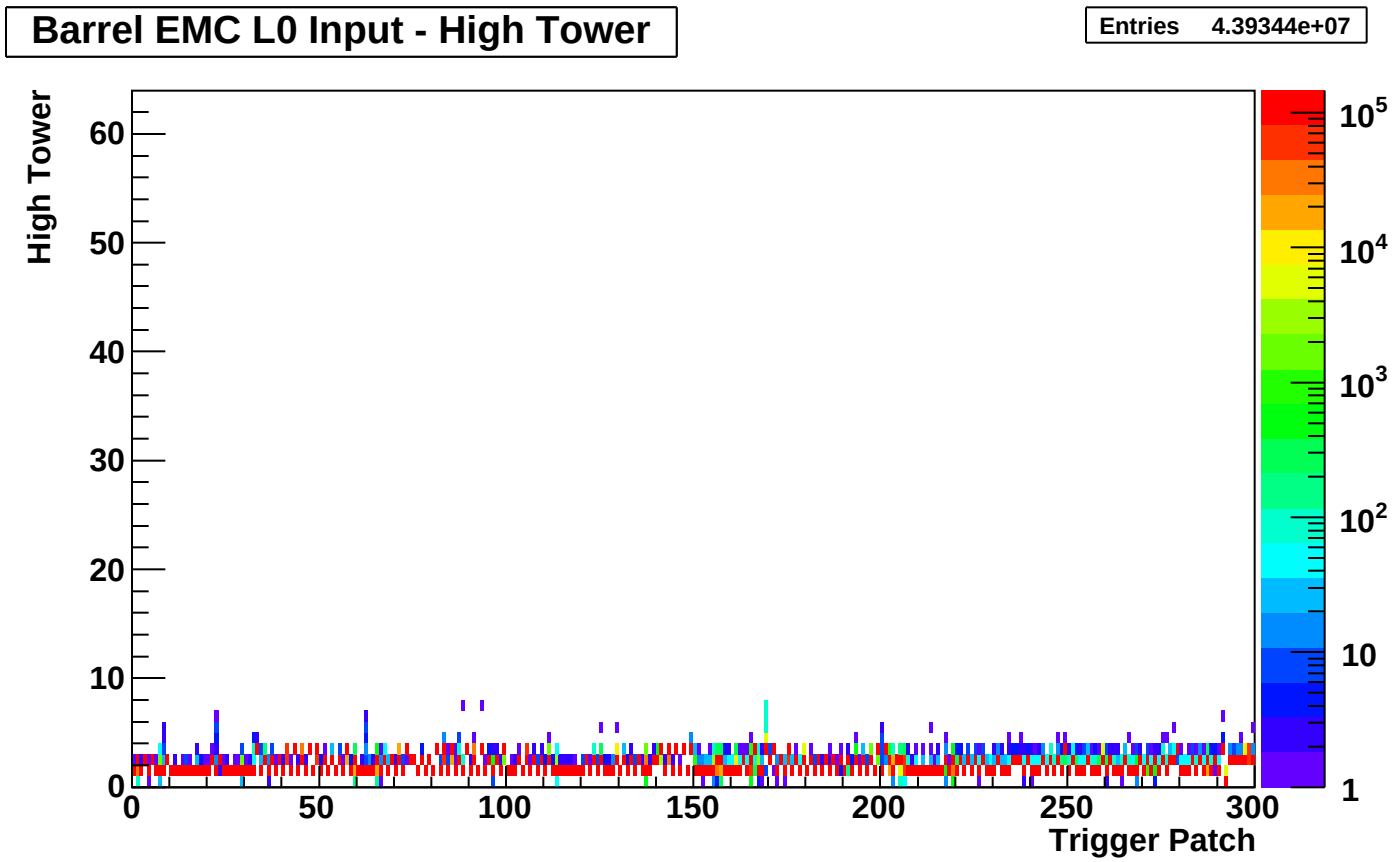
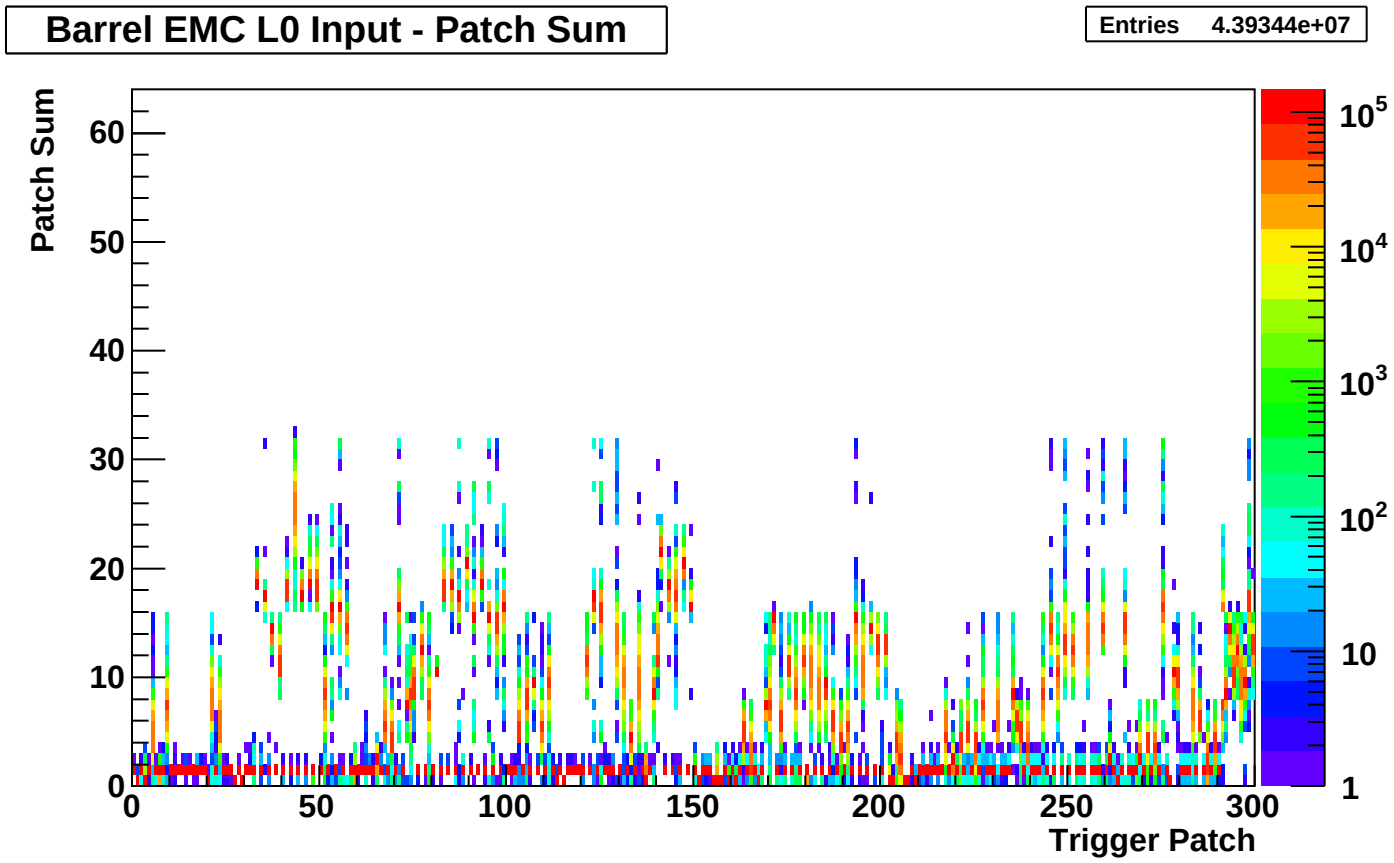
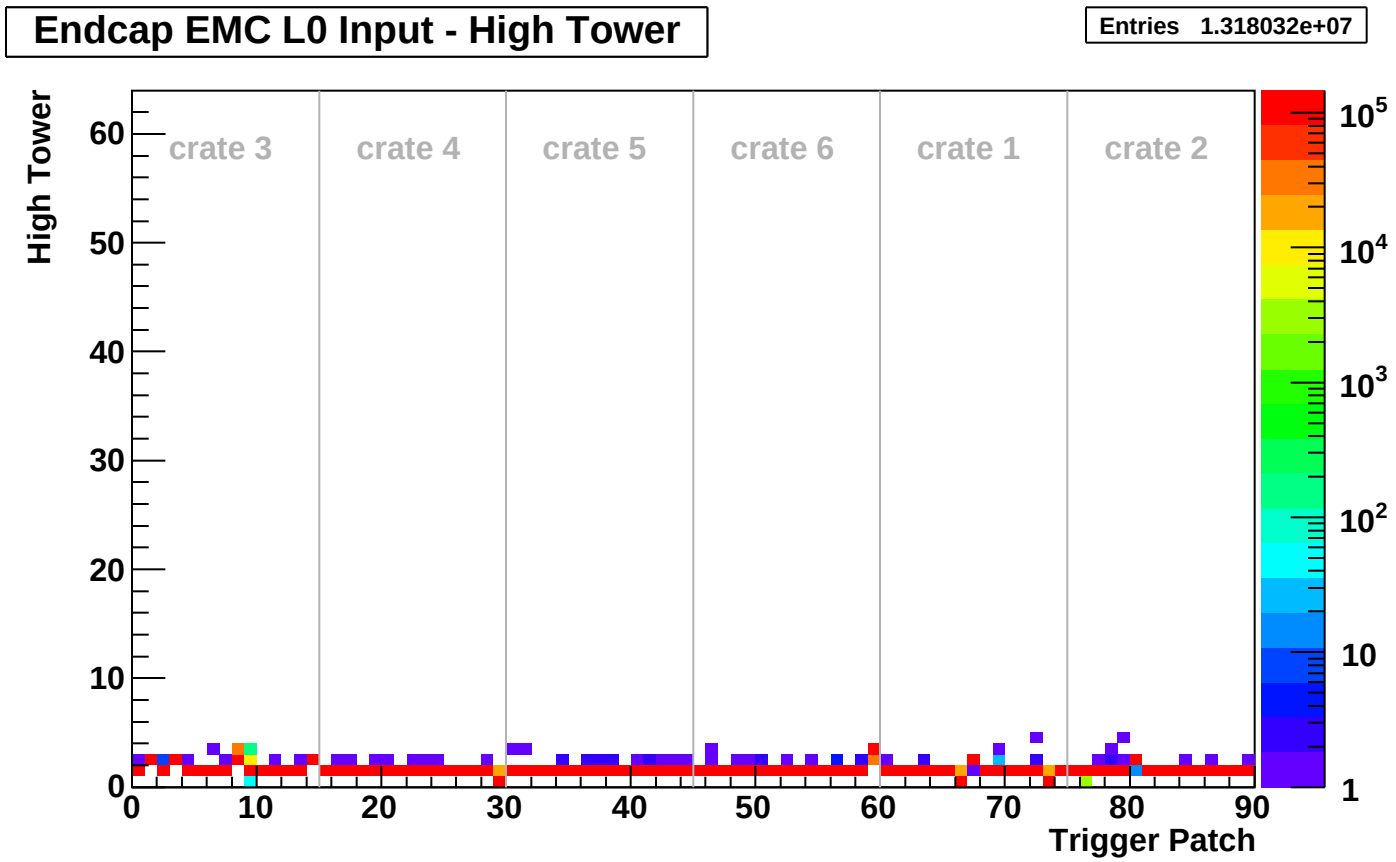
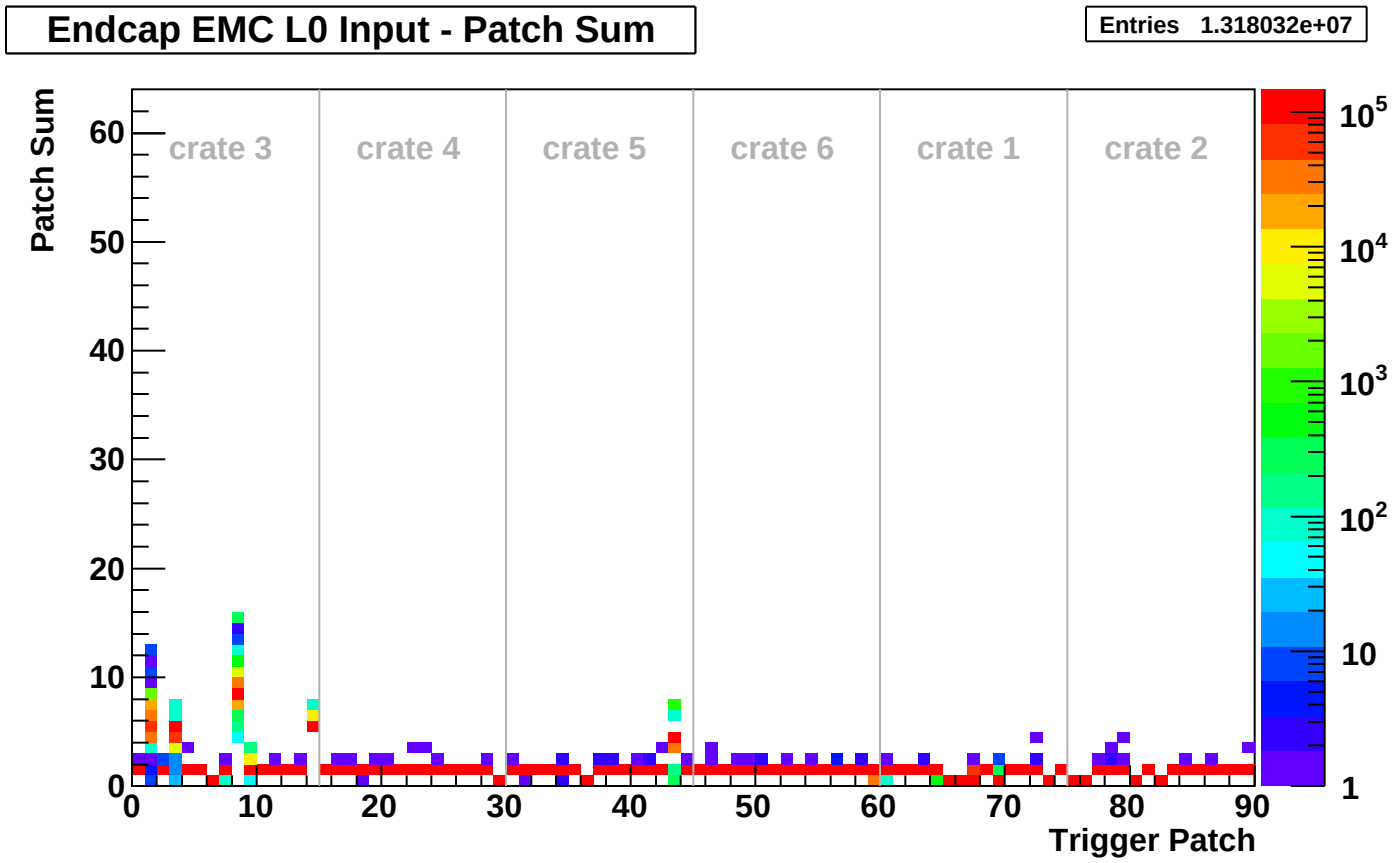
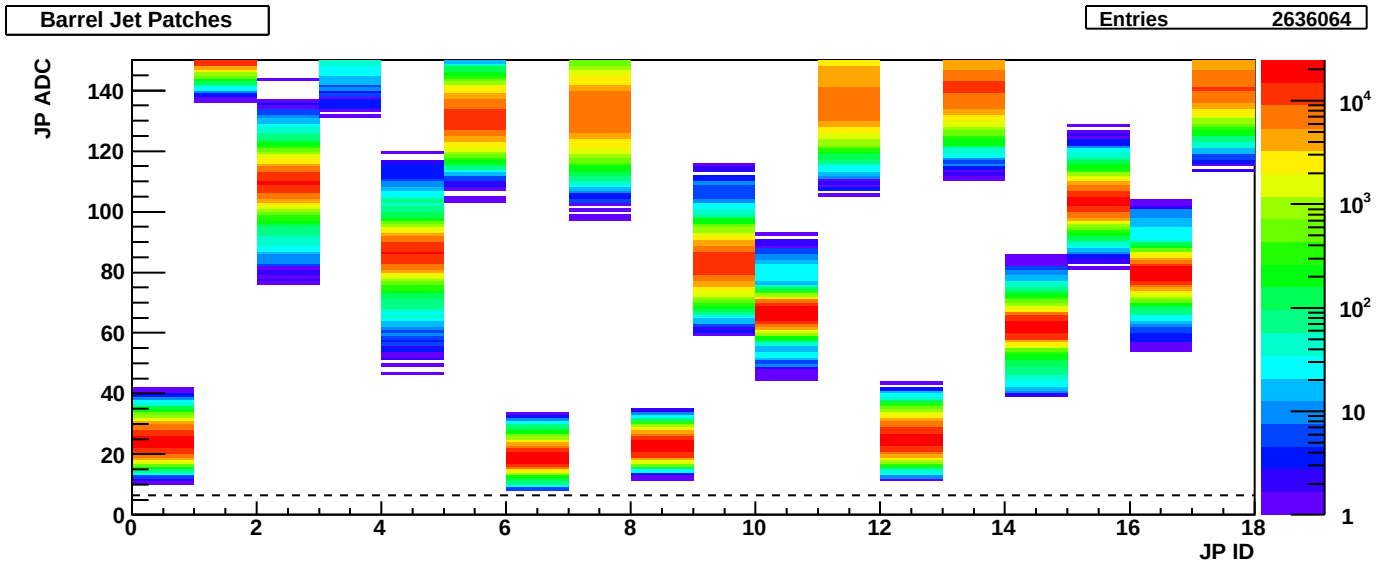
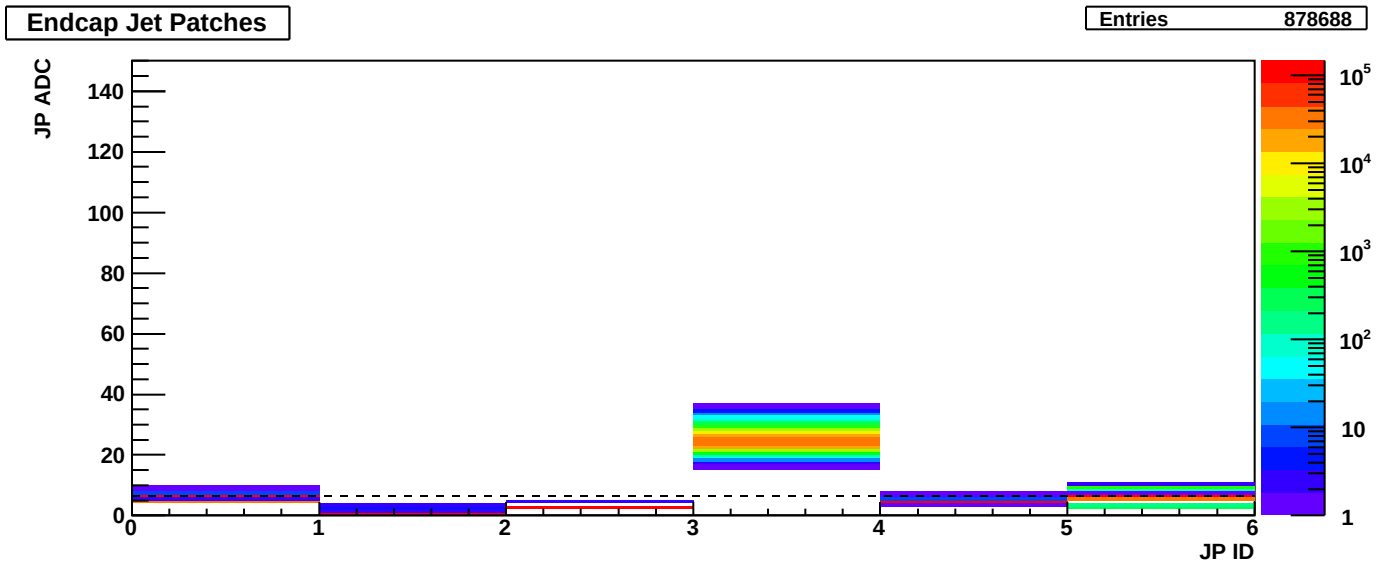

Barrel EMC L0 Input - High Tower
Entries 4.39344e+07
High Tower
Trigger Patch
0
10
20
30
40
50
60
0
50
100
150
200
250
300
1
10
10^2
10^3
10^4
10^5

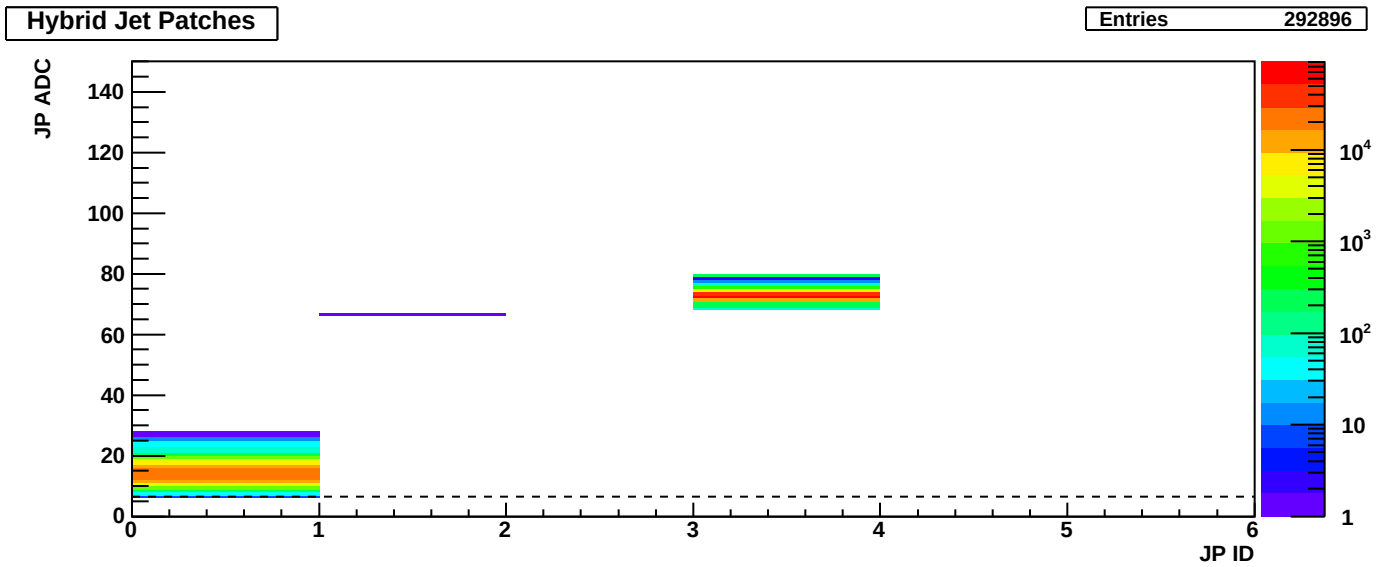

Barrel EMC L0 Input - Patch Sum
Entries 4.39344e+07
Patch Sum
Trigger Patch
0
10
20
30
40
50
60
0
50
100
150
200
250
300
1
10
10^2
10^3
10^4
10^5

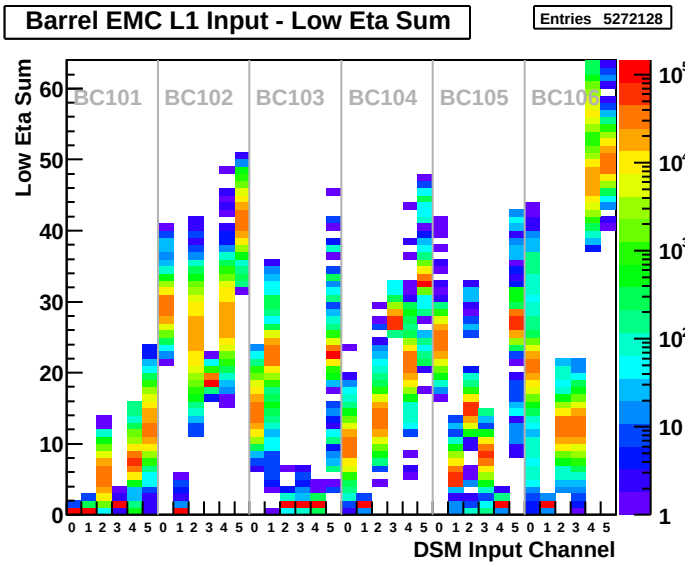

Endcap EMC L0 Input - High Tower
Entries 1.318032e+07
High Tower
crate 3
crate 4
crate 5
crate 6
crate 1
crate 2
Trigger Patch

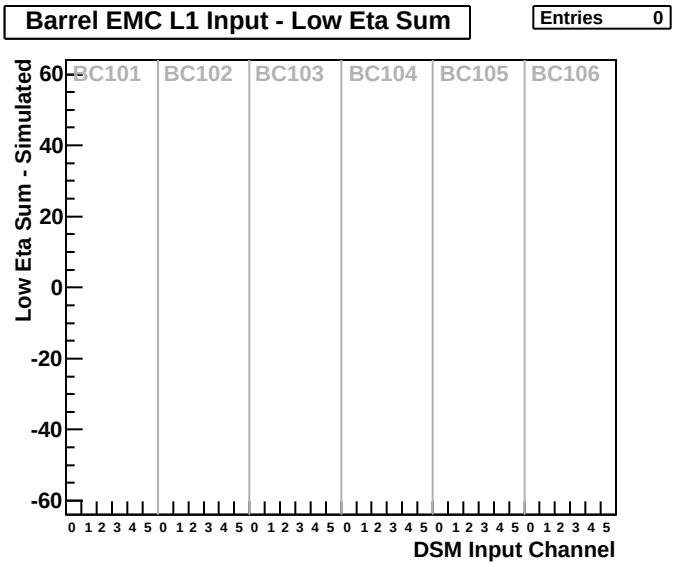

Endcap EMC L0 Input - Patch Sum
Entries 1.318032e+07
Patch Sum
crate 3
crate 4
crate 5
crate 6
crate 1
crate 2
Trigger Patch

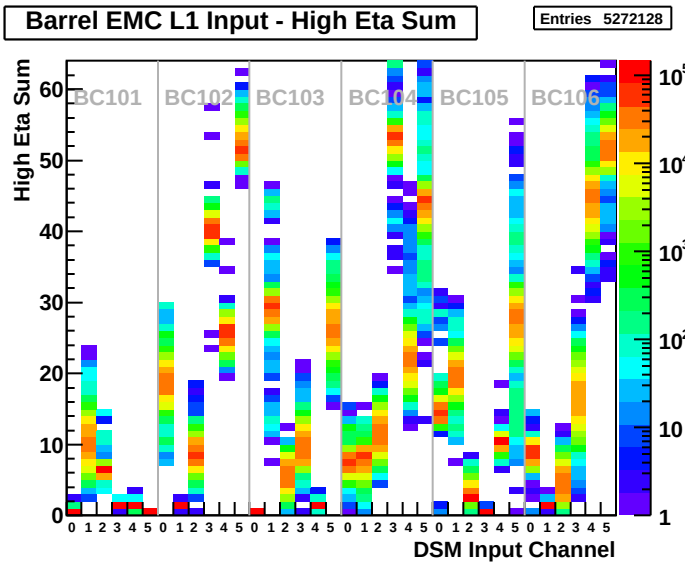

Barrel Jet Patches
Entries 2636064
JP ADC
JP ID

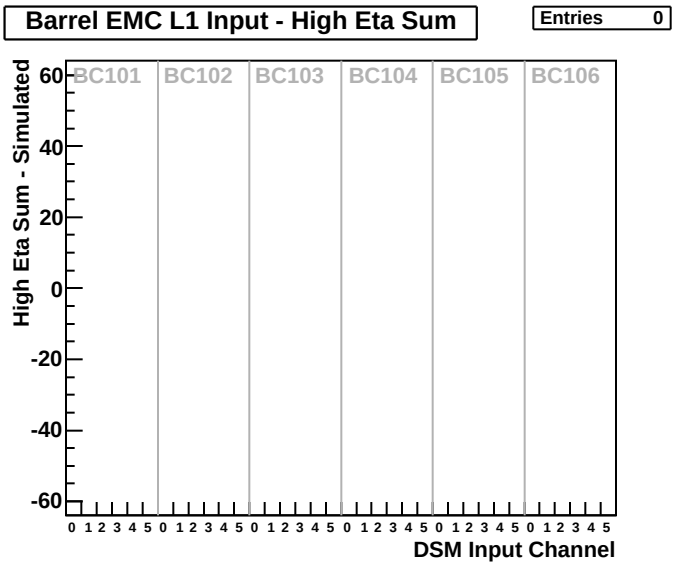

Endcap Jet Patches
Entries 878688
JP ADC
JP ID

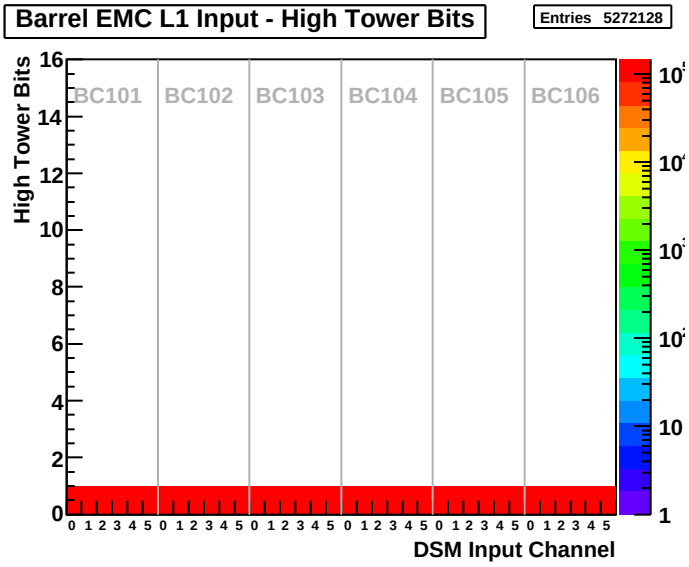

Hybrid Jet Patches
Entries 292896
JP ADC
JP ID

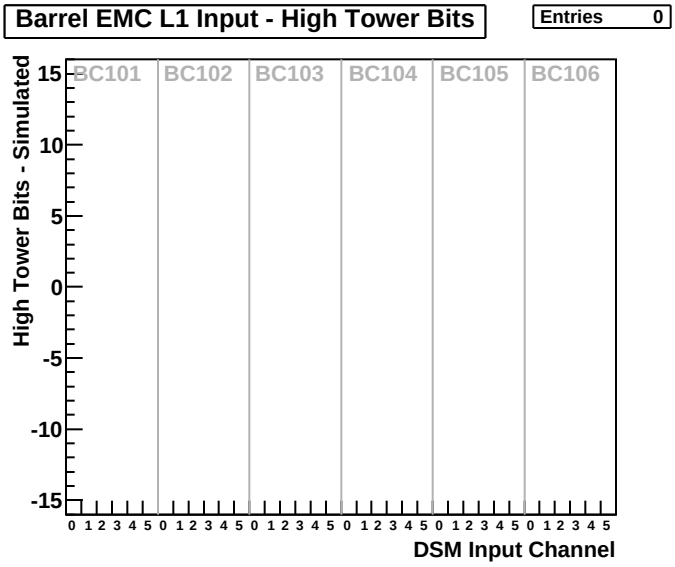

Barrel EMC L1 Input - Low Eta Sum
Entries 5272128
Low Eta Sum
BC101
BC102
BC103
BC104
BC105
BC106
DSM Input Channel

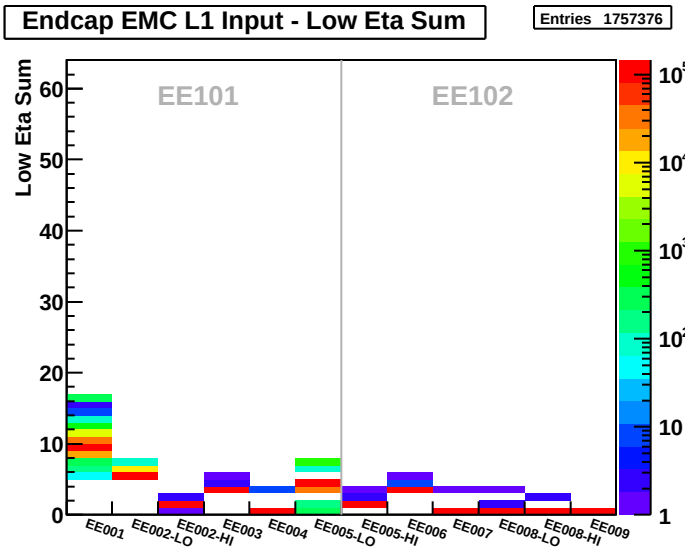

Barrel EMC L1 Input - Low Eta Sum
Entries 0
Low Eta Sum - Simulated
BC101
BC102
BC103
BC104
BC105
BC106
DSM Input Channel

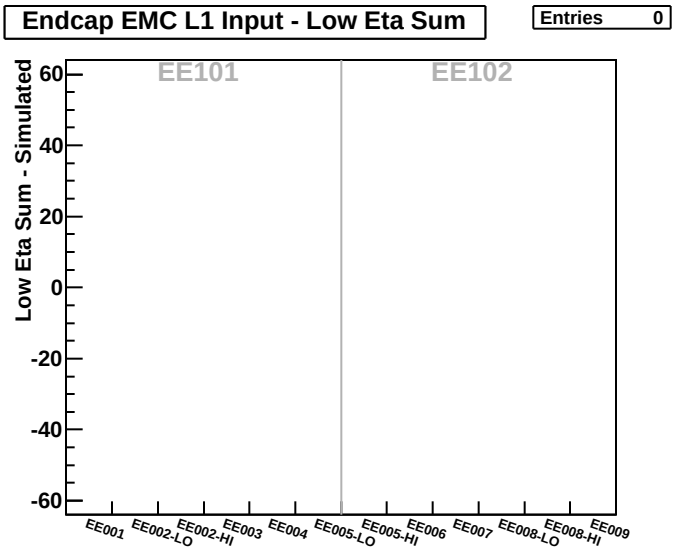

Barrel EMC L1 Input - High Eta Sum
Entries 5272128
High Eta Sum
BC101
BC102
BC103
BC104
BC105
BC106
DSM Input Channel

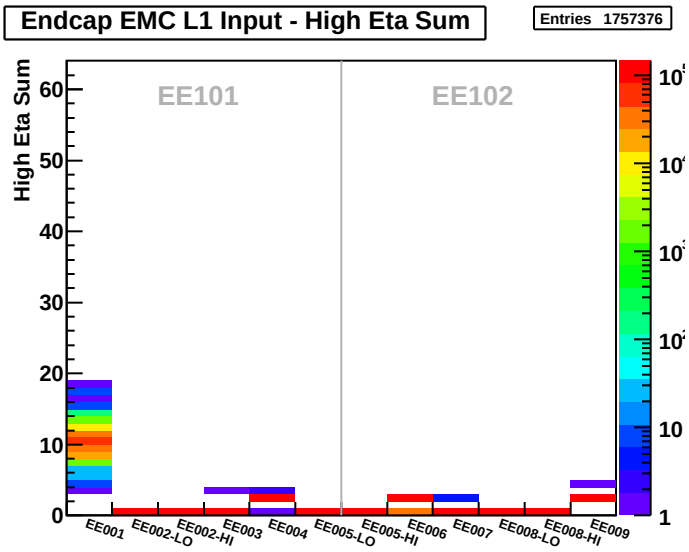

Barrel EMC L1 Input - High Eta Sum
Entries 0
High Eta Sum - Simulated
BC101
BC102
BC103
BC104
BC105
BC106
DSM Input Channel

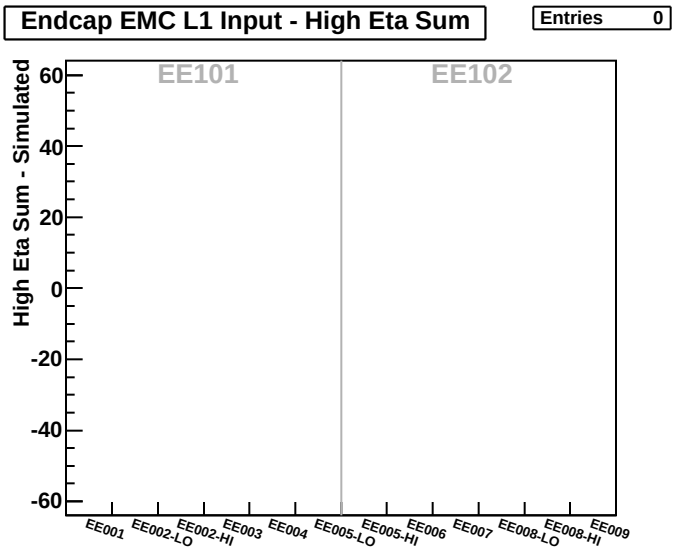

Barrel EMC L1 Input - High Tower Bits
Entries 5272128
High Tower Bits
BC101
BC102
BC103
BC104
BC105
BC106
DSM Input Channel

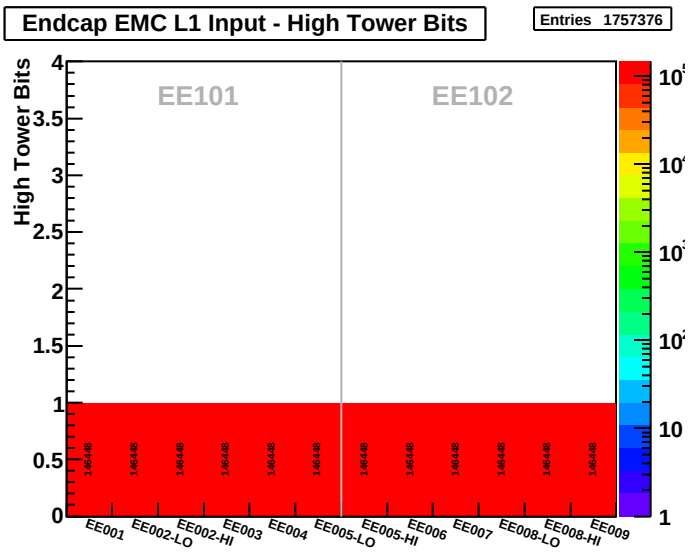

Barrel EMC L1 Input - High Tower Bits
Entries 0
High Tower Bits - Simulated
BC101
BC102
BC103
BC104
BC105
BC106
DSM Input Channel

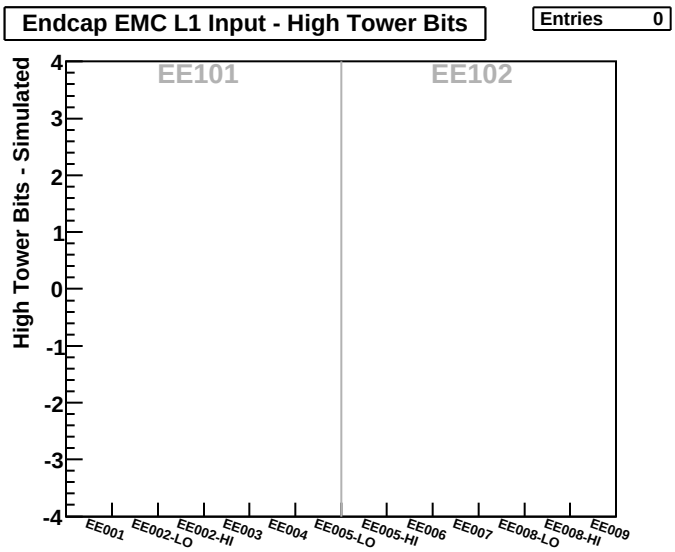

Endcap EMC L1 Input - Low Eta Sum
Entries 1757376
Low Eta Sum
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

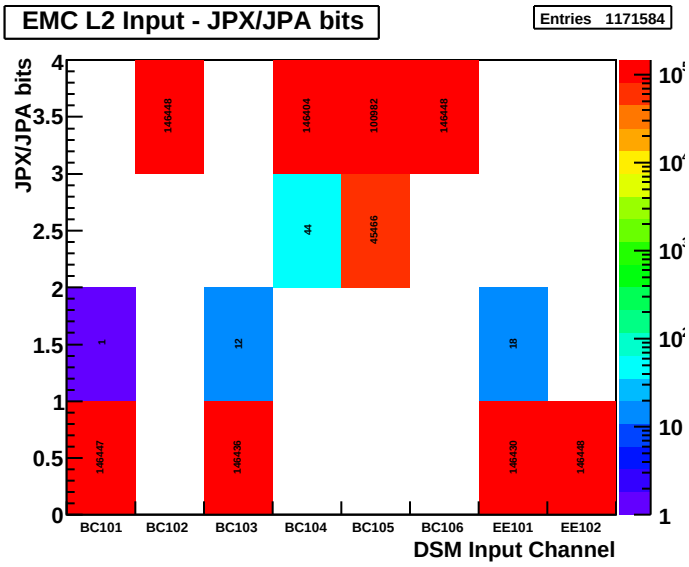

Endcap EMC L1 Input - Low Eta Sum
Entries 0
Low Eta Sum - Simulated
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

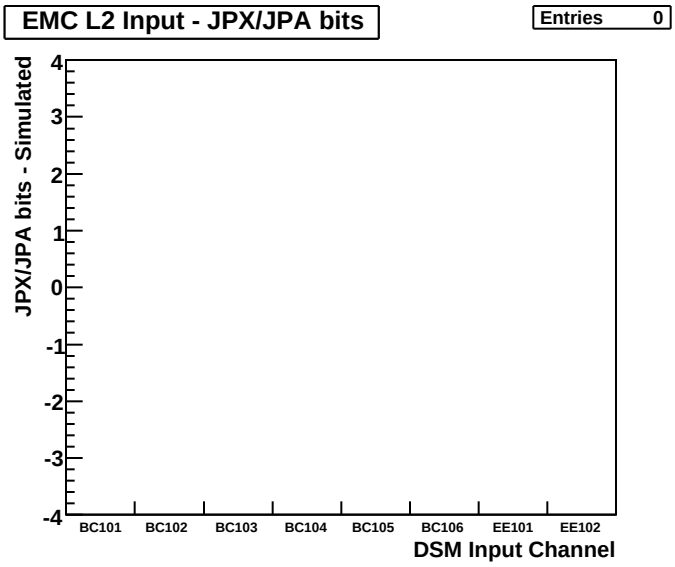

Endcap EMC L1 Input - High Eta Sum
Entries 1757376
High Eta Sum
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

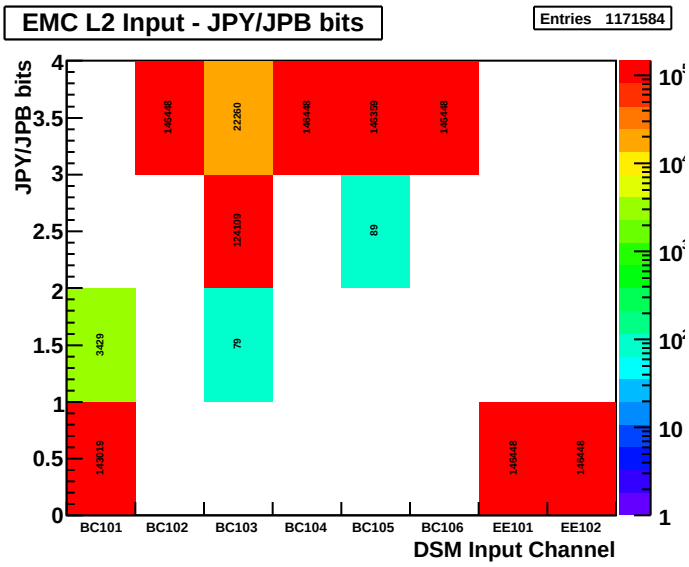

Endcap EMC L1 Input - High Eta Sum
Entries 0
High Eta Sum - Simulated
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

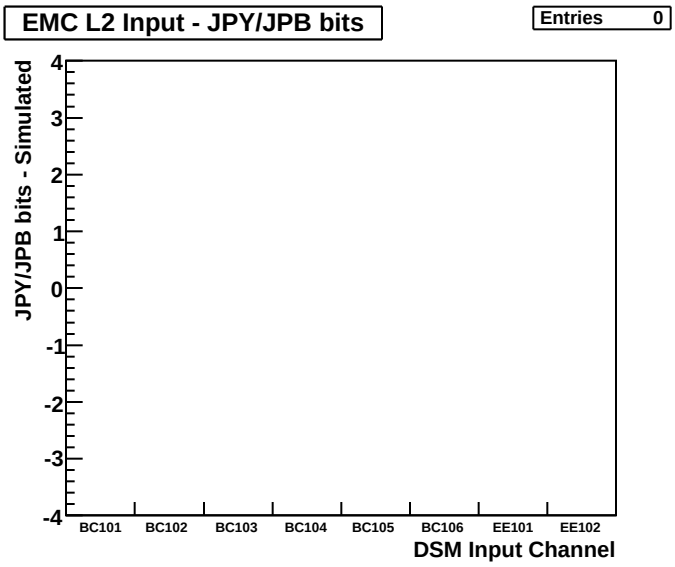

Endcap EMC L1 Input - High Tower Bits
Entries 1757376
High Tower Bits
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

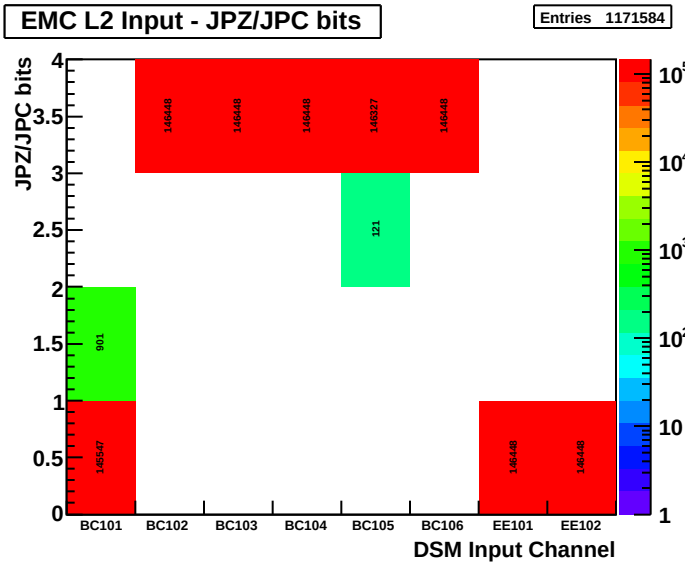

Endcap EMC L1 Input - High Tower Bits
Entries 0
High Tower Bits - Simulated
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

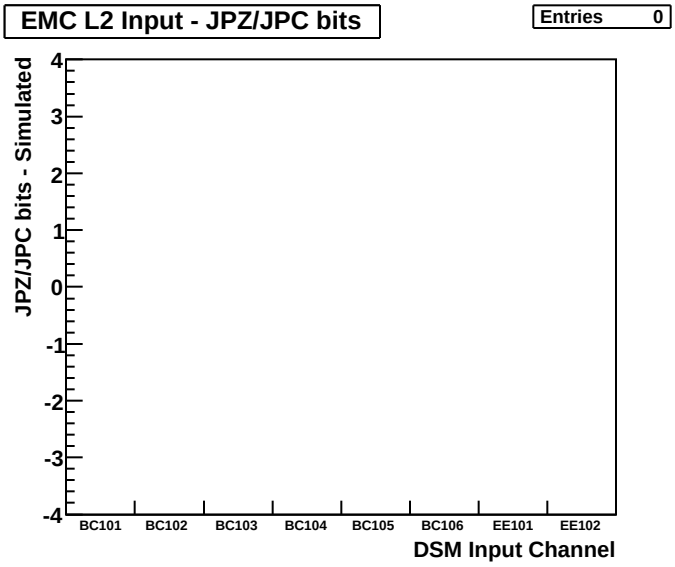

EMC L2 Input - JPX/JPA bits
Entries 1171584
JPX/JPA bits
DSM Input Channel
BC101
BC102
BC103
BC104
BC105
BC106
EE101
EE102
146448
146404
100982
146448
44
45466
1
12
18
146447
146436
146430
146448

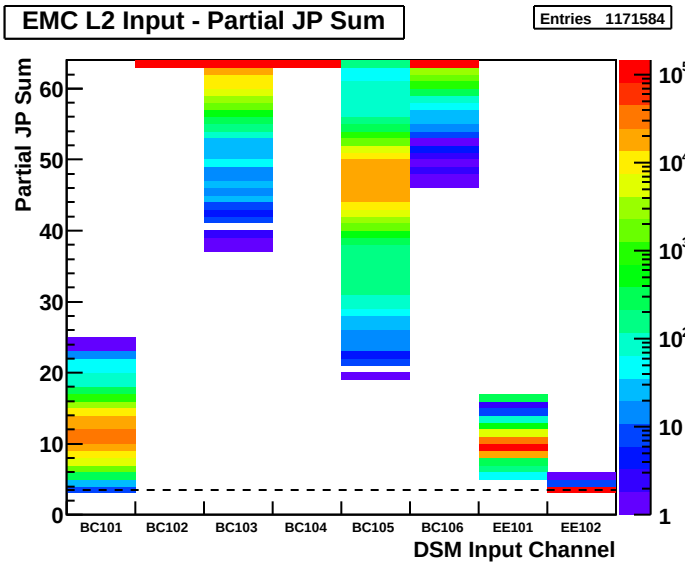

EMC L2 Input - JPX/JPA bits
Entries 0
JPX/JPA bits - Simulated
DSM Input Channel
BC101
BC102
BC103
BC104
BC105
BC106
EE101
EE102

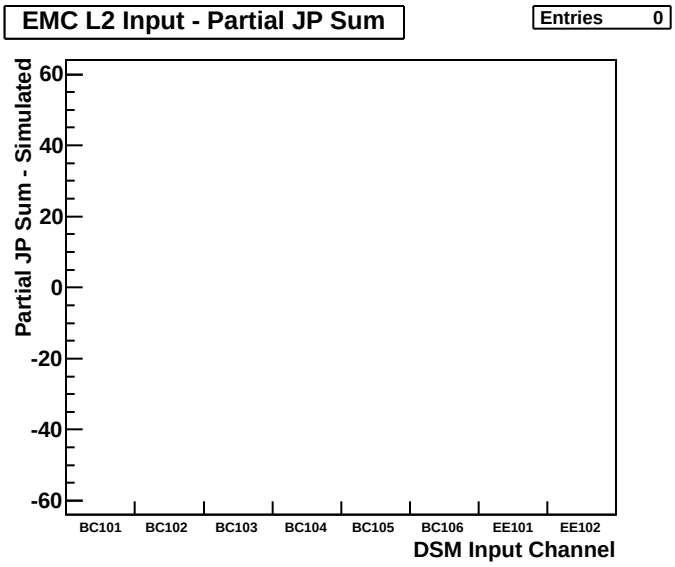

EMC L2 Input - JPY/JPB bits
Entries 1171584
JPY/JPB bits
DSM Input Channel
BC101
BC102
BC103
BC104
BC105
BC106
EE101
EE102
146448
22260
146448
146359
146448
124109
89
3429
79
143019
146448
146448

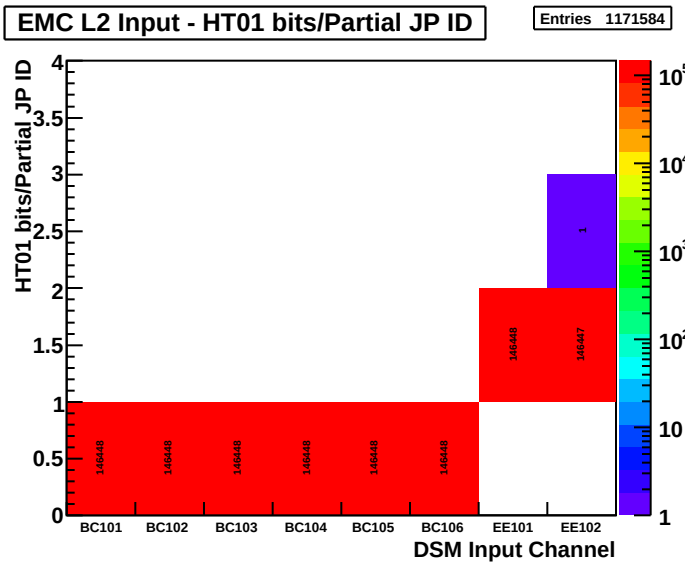

EMC L2 Input - JPY/JPB bits
Entries 0
JPY/JPB bits - Simulated
DSM Input Channel
BC101
BC102
BC103
BC104
BC105
BC106
EE101
EE102

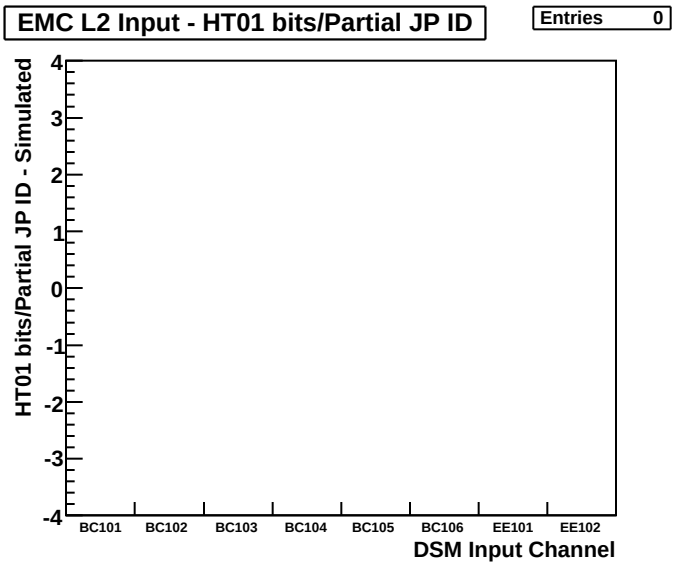

EMC L2 Input - JPZ/JPC bits
Entries 1171584
JPZ/JPC bits
DSM Input Channel
BC101
BC102
BC103
BC104
BC105
BC106
EE101
EE102
146448
146448
146448
146327
146448
121
901
145547
146448
146448

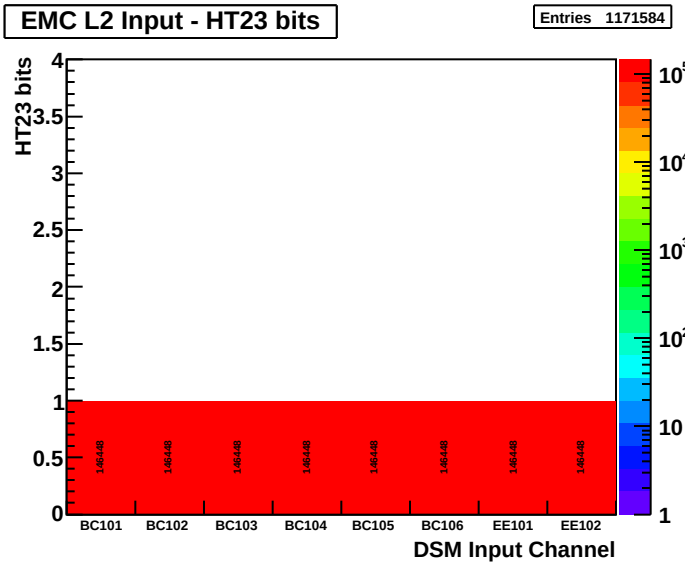

EMC L2 Input - JPZ/JPC bits
Entries 0
JPZ/JPC bits - Simulated
DSM Input Channel
BC101
BC102
BC103
BC104
BC105
BC106
EE101
EE102

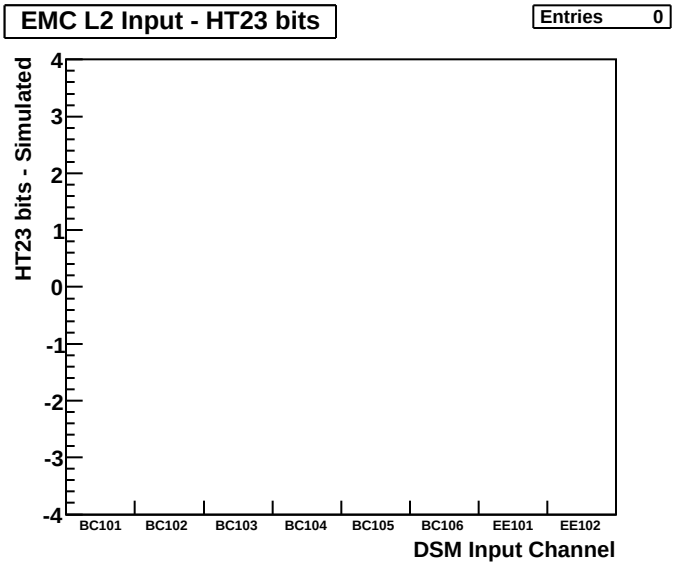

EMC L2 Input - Partial JP Sum
Entries 1171584
Partial JP Sum
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

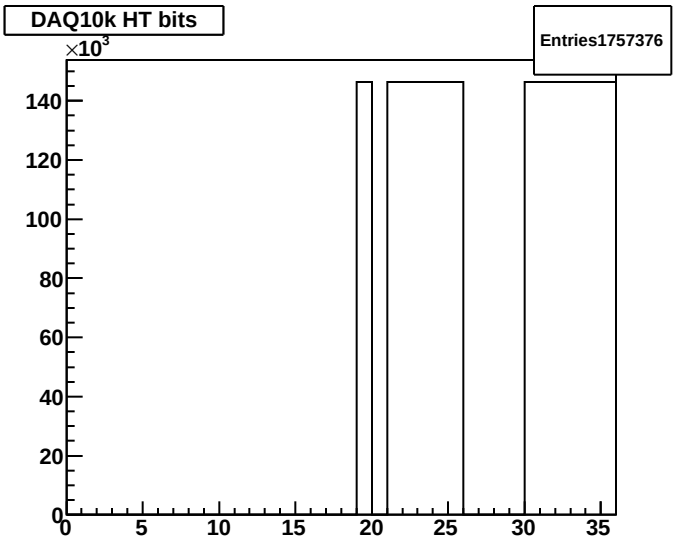

EMC L2 Input - Partial JP Sum
Entries 0
Partial JP Sum - Simulated
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

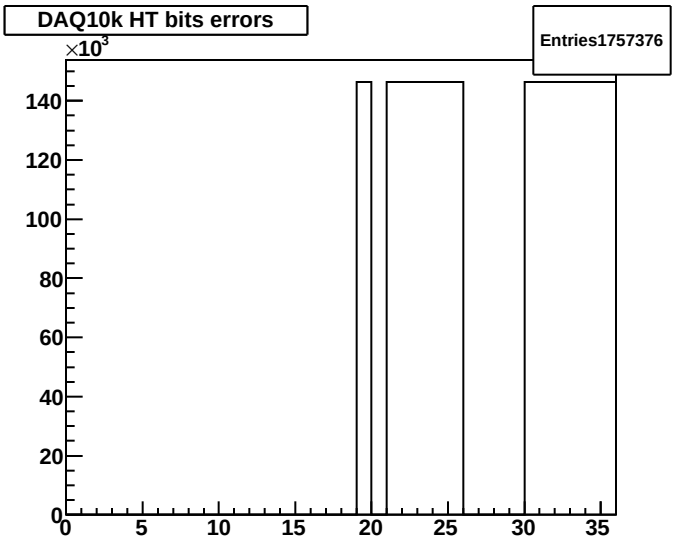

EMC L2 Input - HT01 bits/Partial JP ID
Entries 1171584
HT01 bits/Partial JP ID
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

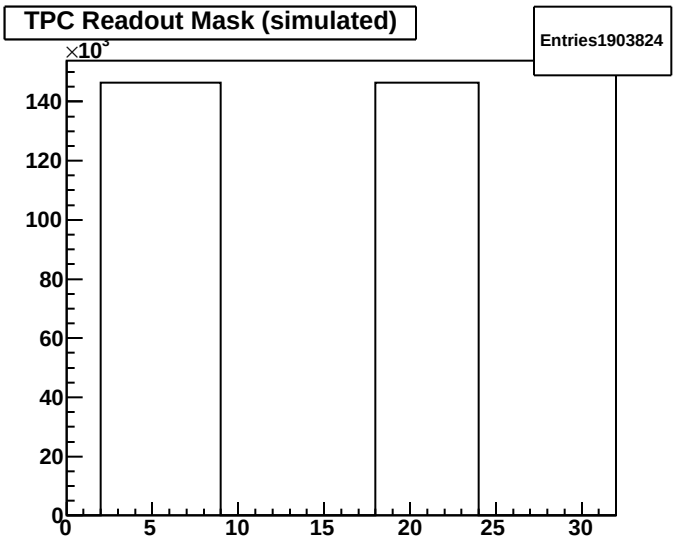

EMC L2 Input - HT01 bits/Partial JP ID
Entries 0
HT01 bits/Partial JP ID - Simulated
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

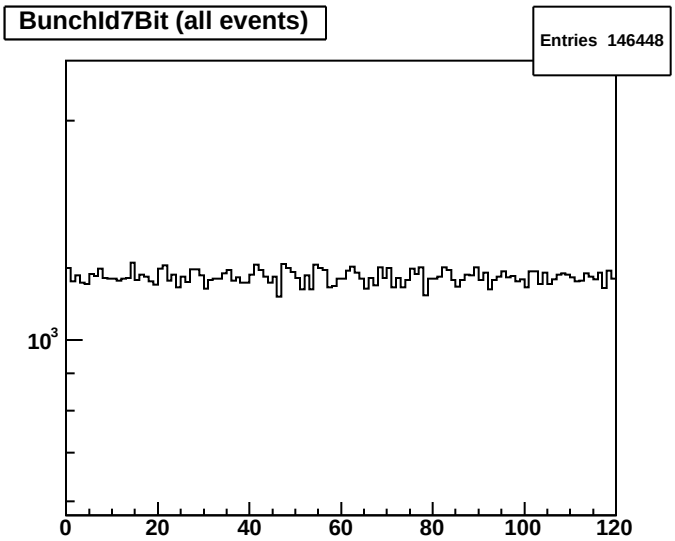

EMC L2 Input - HT23 bits
Entries 1171584
HT23 bits
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

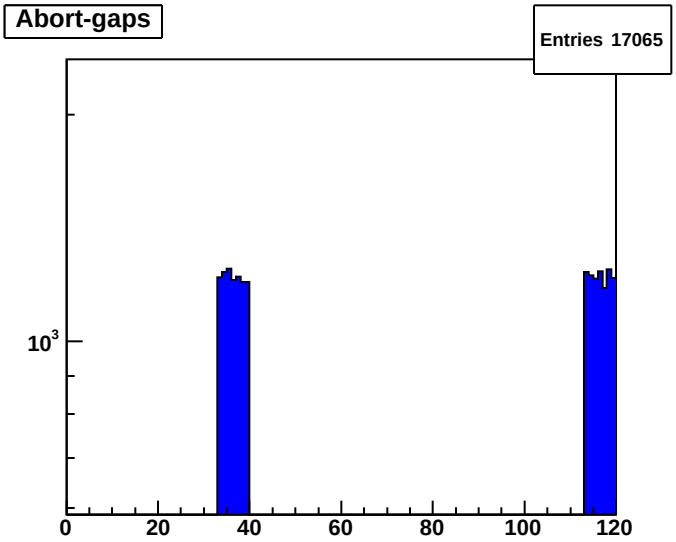

EMC L2 Input - HT23 bits
Entries 0
HT23 bits - Simulated
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

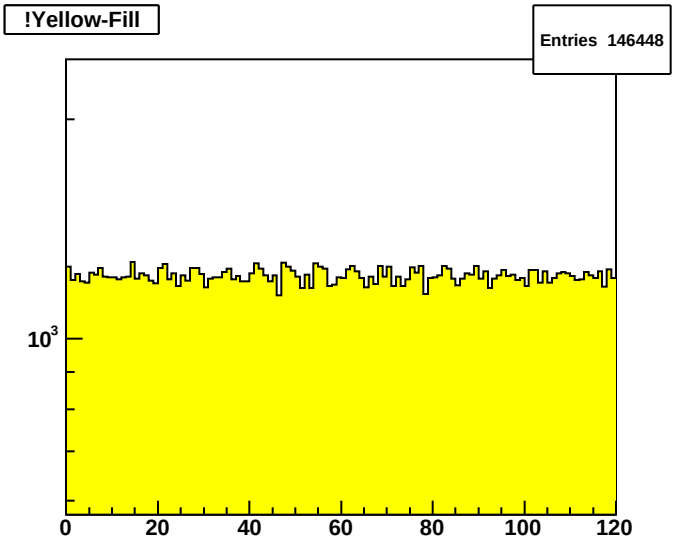

DAQ10k HT bits
Entries1757376
×10^3
140
120
100
80
60
40
20
0
0
5
10
15
20
25
30
35

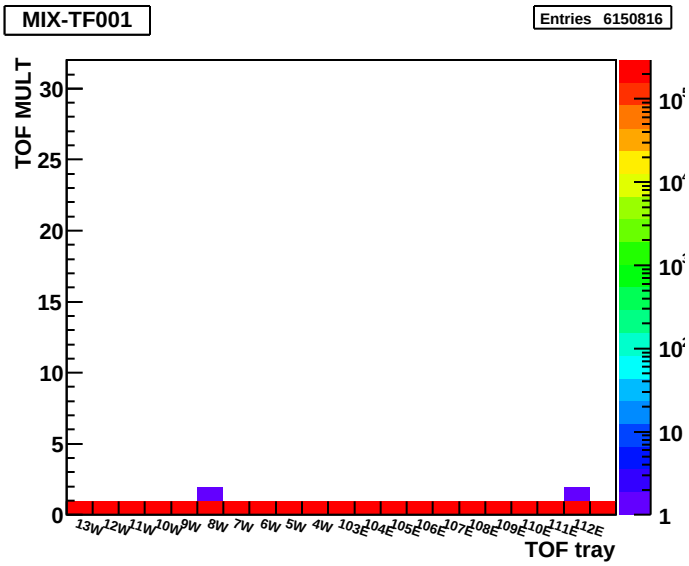

DAQ10k HT bits errors
Entries1757376
×10^3
140
120
100
80
60
40
20
0
0
5
10
15
20
25
30
35

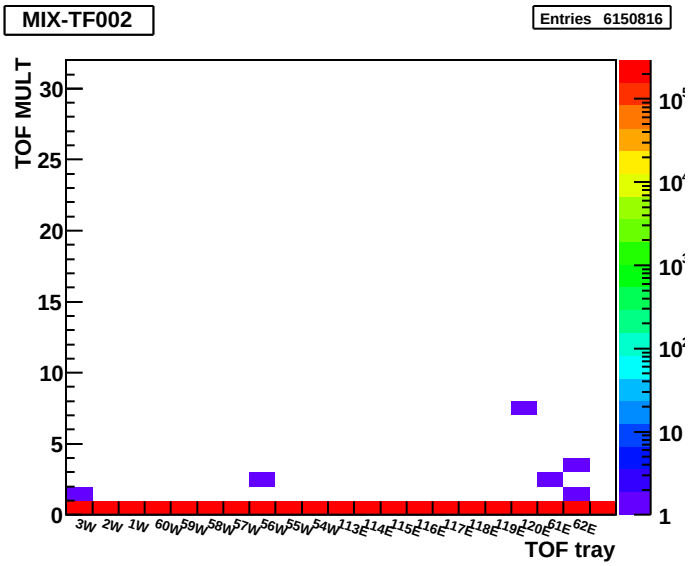

TPC Readout Mask (simulated)
Entries1903824
×10^3
140
120
100
80
60
40
20
0
0
5
10
15
20
25
30

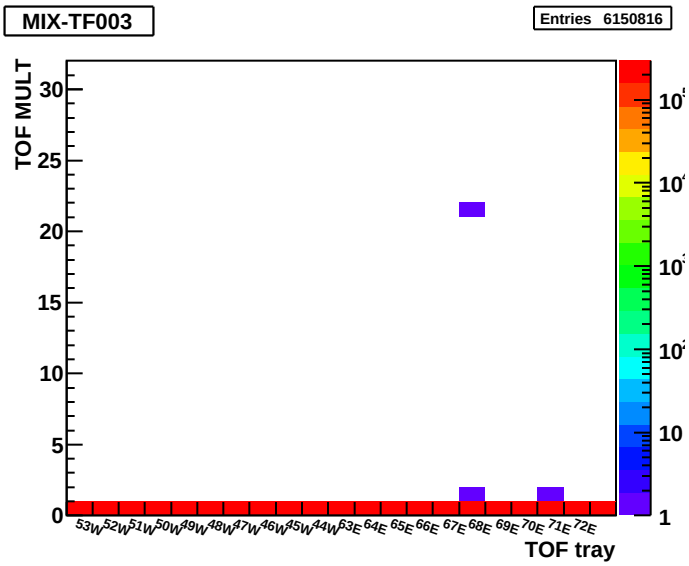

BunchId7Bit (all events)
Entries 146448
10^3
0
20
40
60
80
100
120

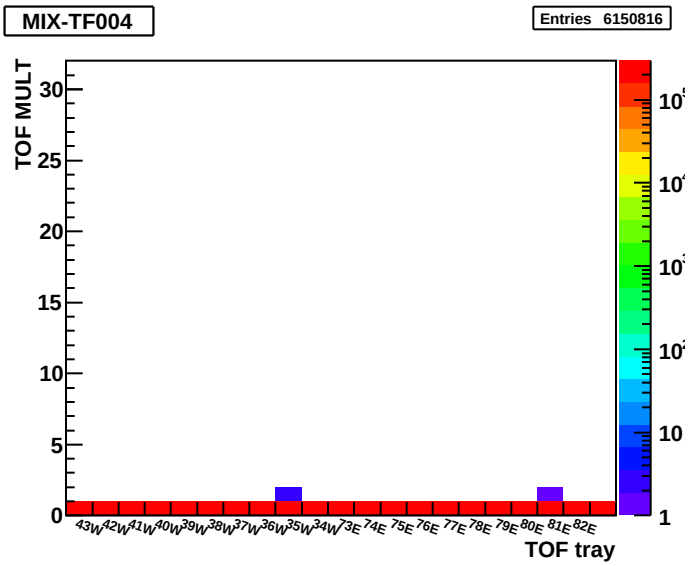

Abort-gaps
Entries 17065
10^3
0
20
40
60
80
100
120

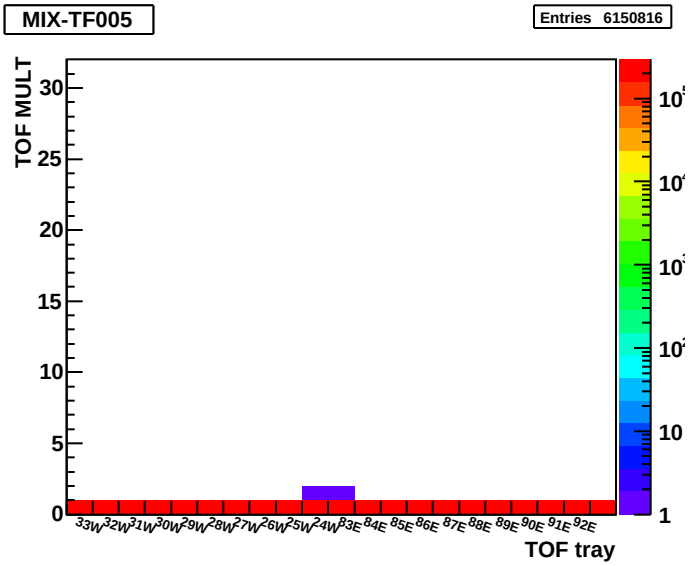

!Yellow-Fill
Entries 146448
10^3
0
20
40
60
80
100
120

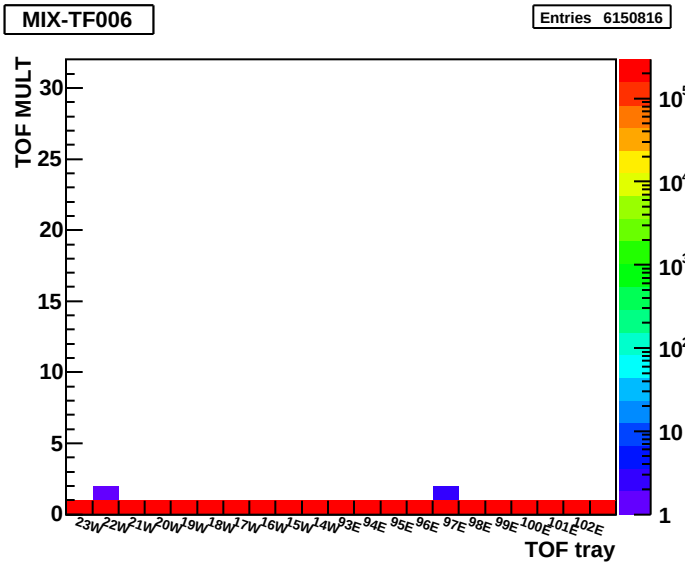

MIX-TF001
Entries 6150816
TOF MULT
TOF tray

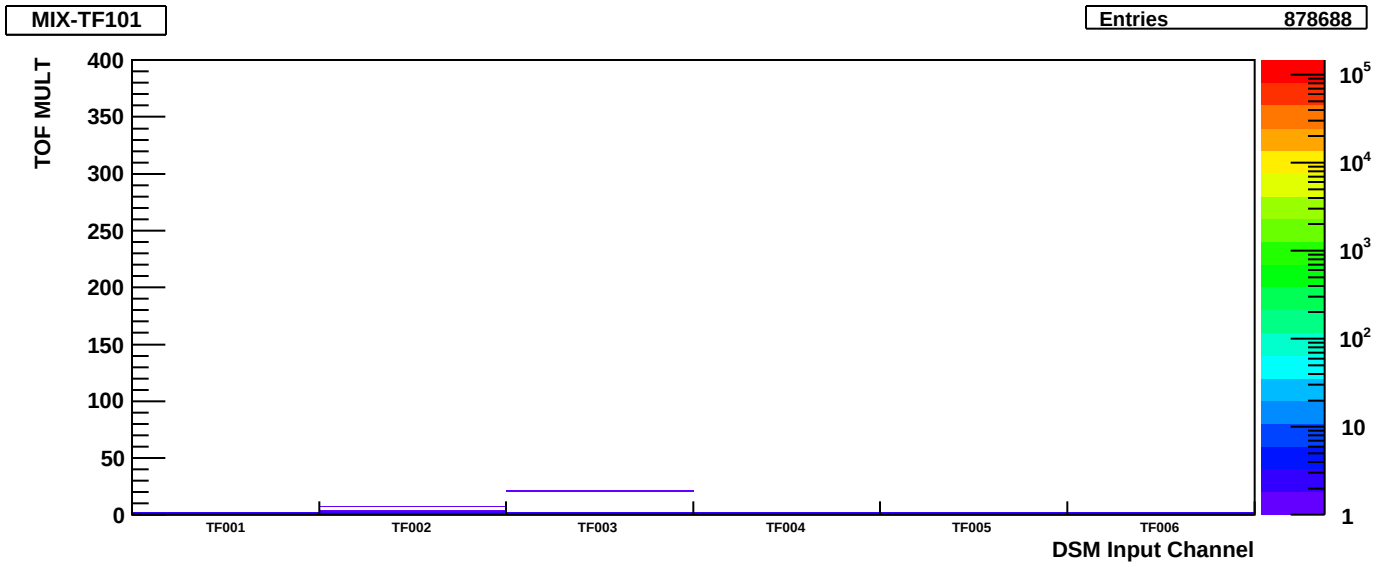

MIX-TF002
Entries 6150816
TOF MULT
TOF tray

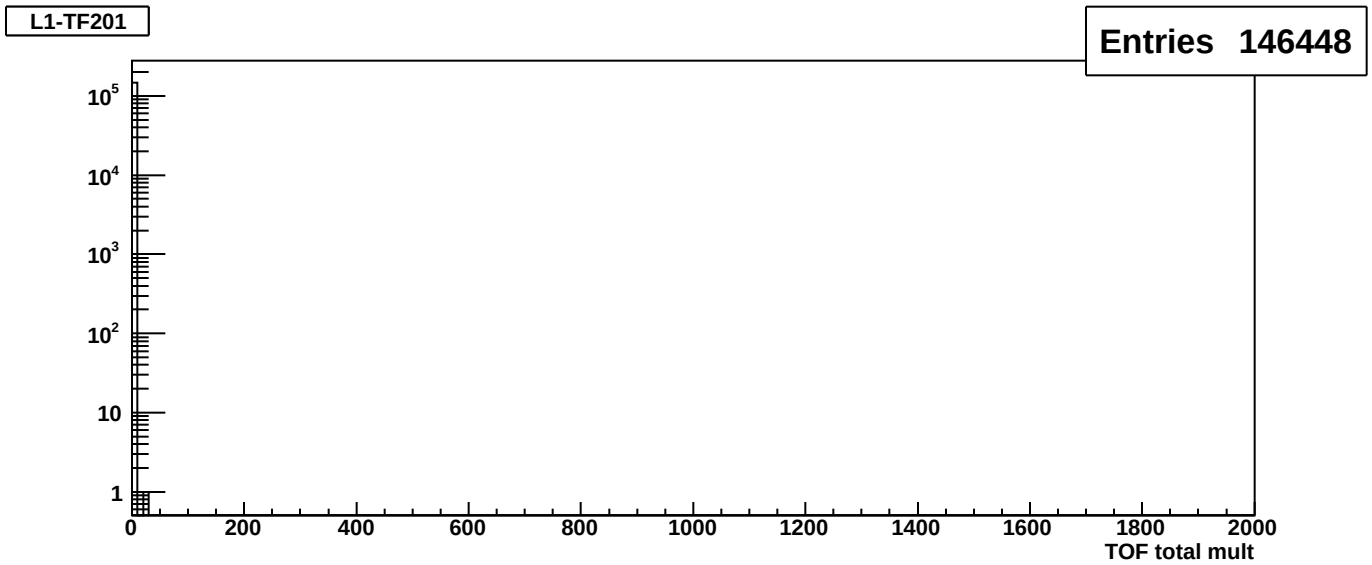

MIX-TF003
Entries 6150816
TOF MULT
TOF tray

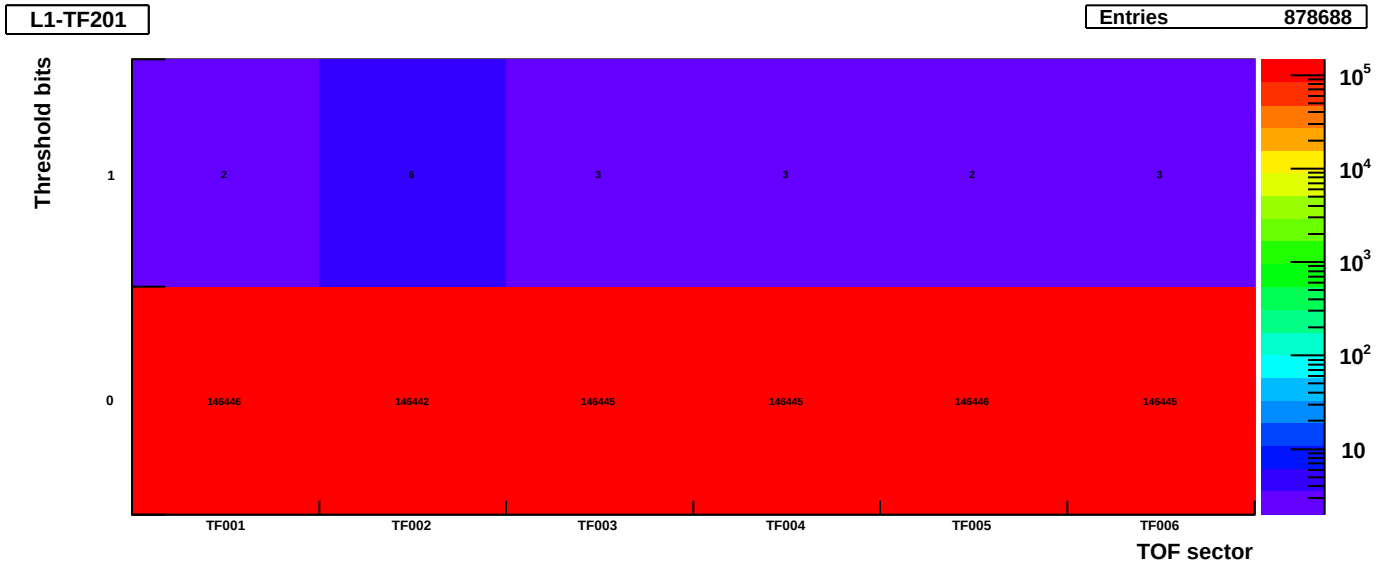

MIX-TF004
Entries 6150816
TOF MULT
TOF tray

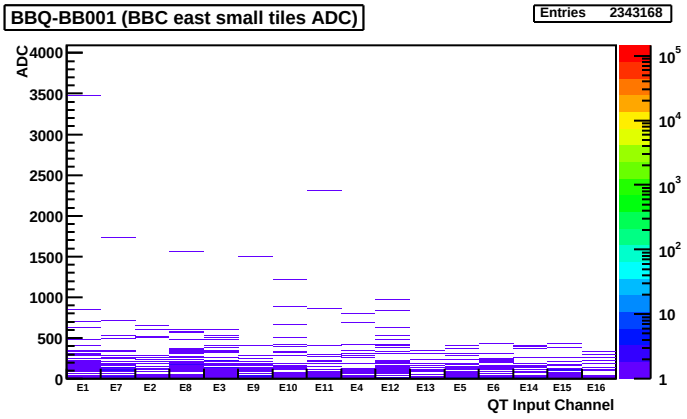

MIX-TF005
Entries 6150816
TOF MULT
TOF tray

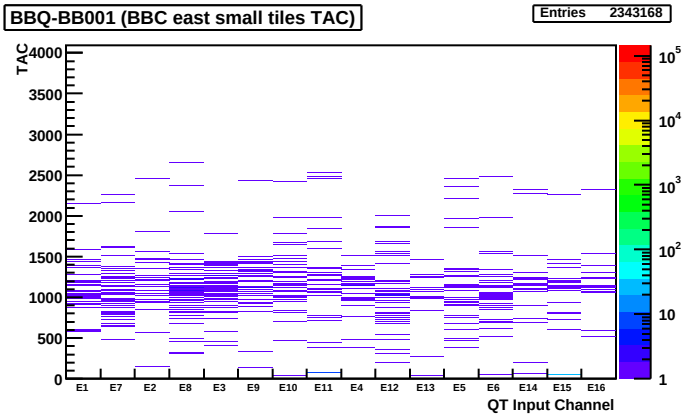

MIX-TF006
Entries 6150816
TOF MULT
TOF tray

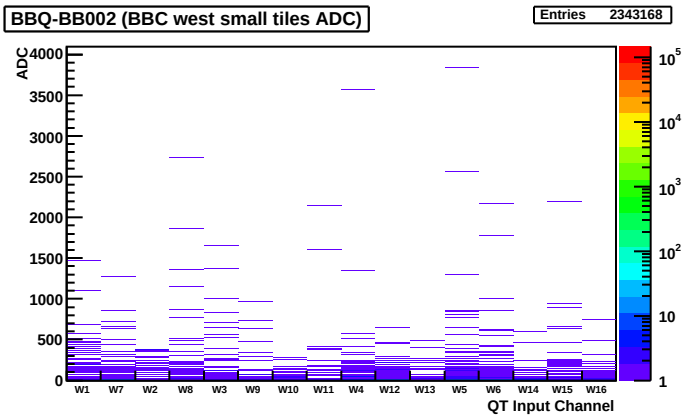

MIX-TF101
Entries 878688
TOF MULT
400
350
300
250
200
150
100
50
0
TF001
TF002
TF003
TF004
TF005
TF006
DSM Input Channel
10^5
10^4
10^3
10^2
10
1

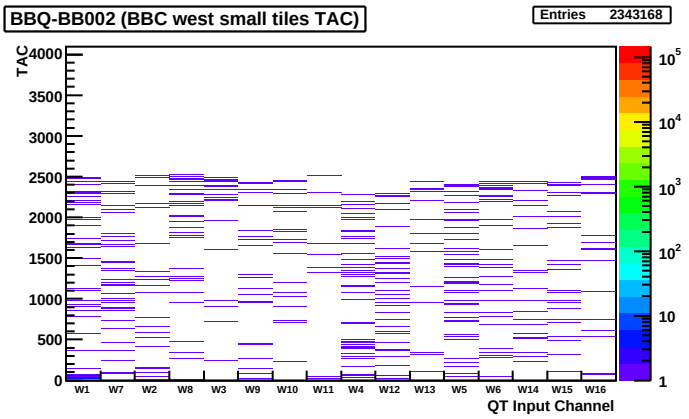

L1-TF201
Entries 146448
10^5
10^4
10^3
10^2
10
1
0
200
400
600
800
1000
1200
1400
1600
1800
2000
TOF total mult

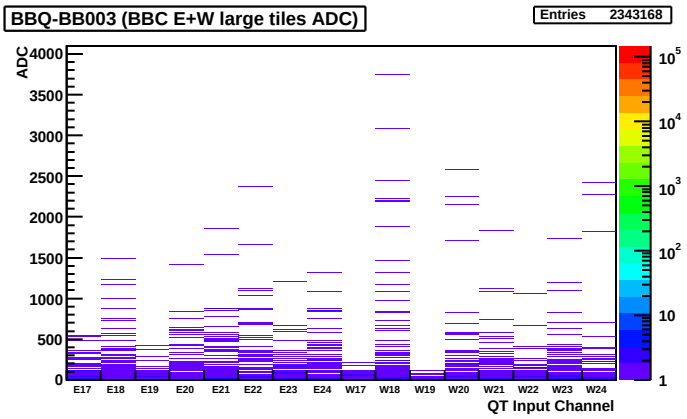

L1-TF201
Entries 878688
Threshold bits
1
0
2
6
3
3
2
3
146446
146442
146445
146445
146446
146445
TF001
TF002
TF003
TF004
TF005
TF006
TOF sector
10^5
10^4
10^3
10^2
10

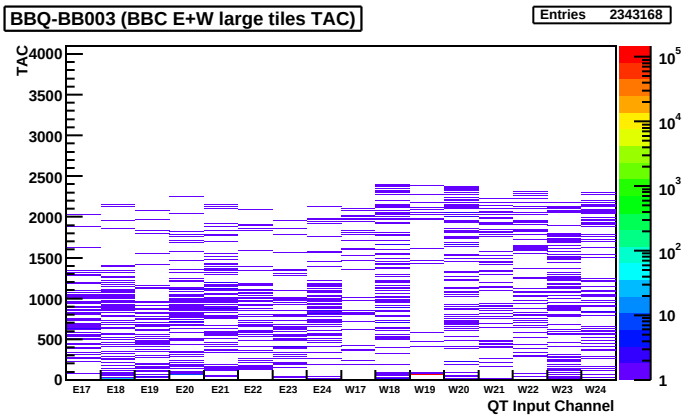

BBQ-BB001 (BBC east small tiles ADC)
Entries 2343168
ADC
QT Input Channel

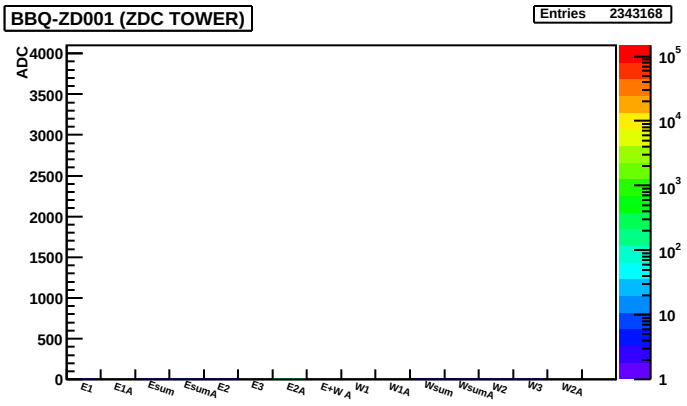

BBQ-BB001 (BBC east small tiles TAC)
Entries 2343168
TAC
QT Input Channel

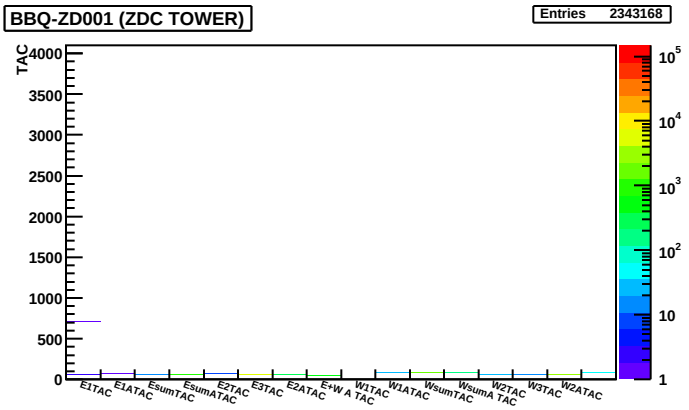

BBQ-BB002 (BBC west small tiles ADC)
Entries 2343168
ADC
QT Input Channel

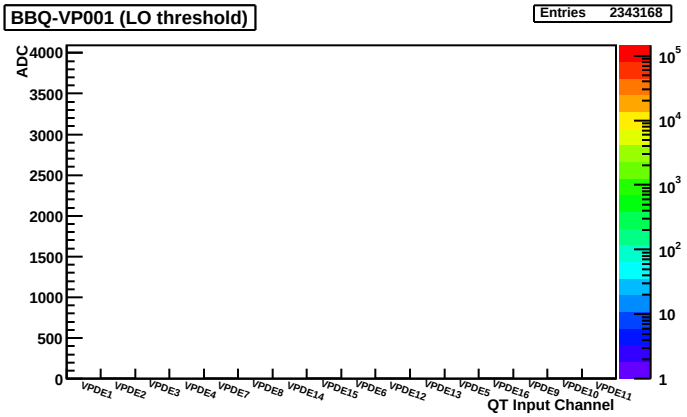

BBQ-BB002 (BBC west small tiles TAC)
Entries 2343168
TAC
QT Input Channel

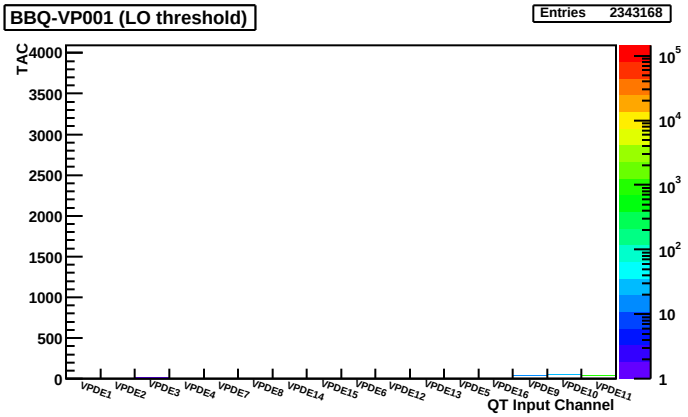

BBQ-BB003 (BBC E+W large tiles ADC)
Entries 2343168
ADC
QT Input Channel

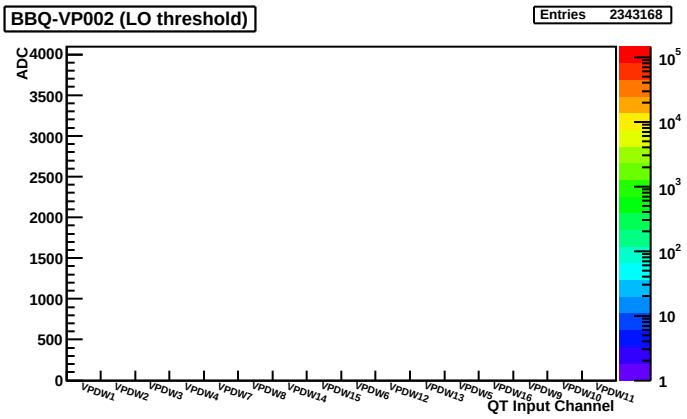

BBQ-BB003 (BBC E+W large tiles TAC)
Entries 2343168
TAC
QT Input Channel

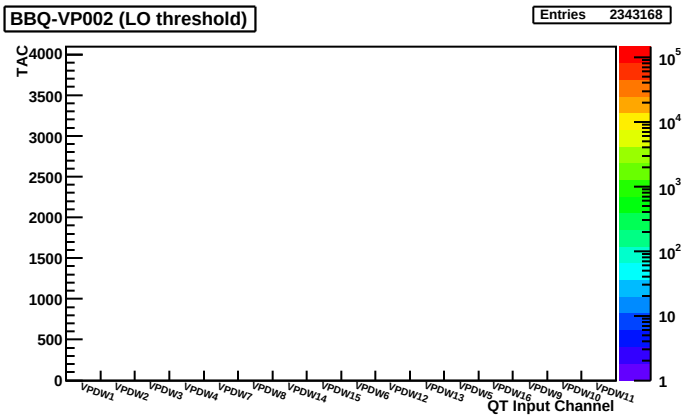

BBQ-ZD001 (ZDC TOWER)
Entries 2343168
ADC

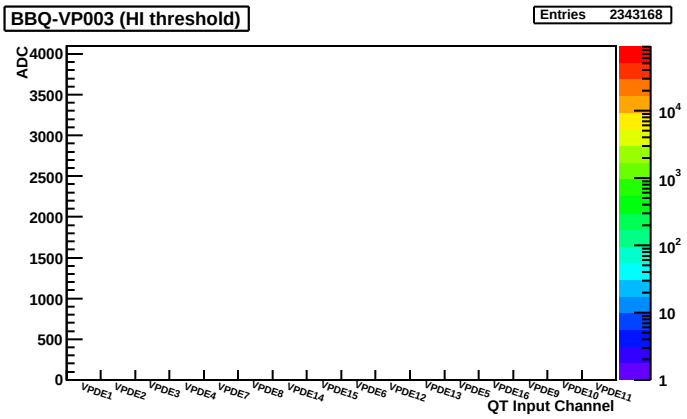

BBQ-ZD001 (ZDC TOWER)
Entries 2343168
TAC

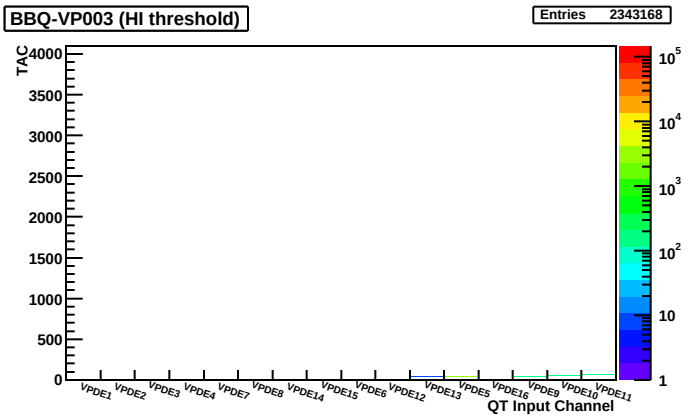

BBQ-VP001 (LO threshold)
Entries 2343168
ADC
QT Input Channel

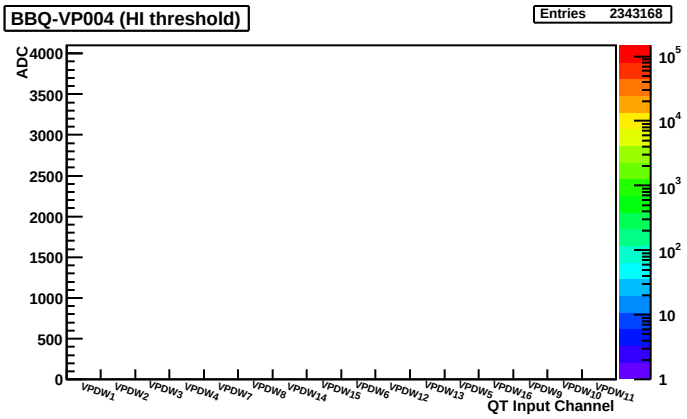

BBQ-VP001 (LO threshold)
Entries 2343168
TAC
QT Input Channel

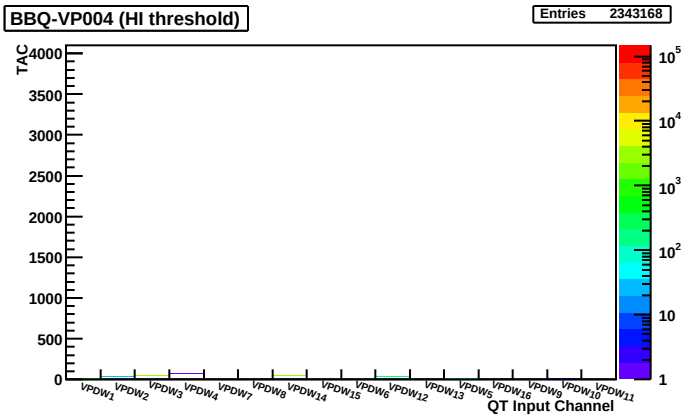

BBQ-VP002 (LO threshold)
Entries 2343168
ADC
QT Input Channel

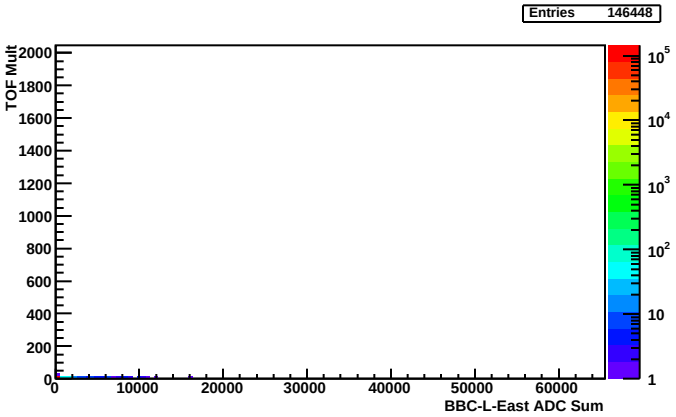

BBQ-VP002 (LO threshold)
Entries 2343168
TAC
QT Input Channel

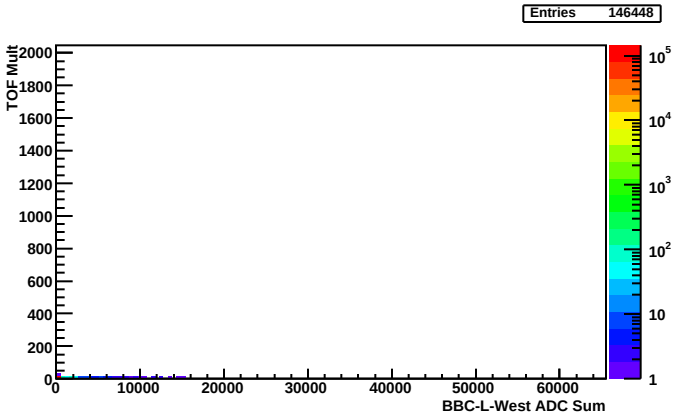

BBQ-VP003 (HI threshold)
Entries 2343168
ADC
QT Input Channel

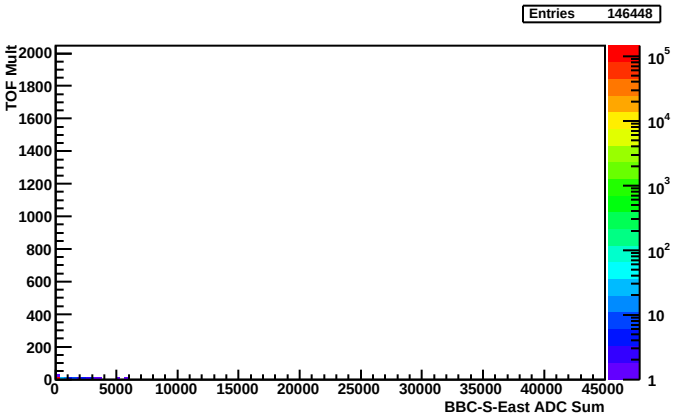

BBQ-VP003 (HI threshold)
Entries 2343168
TAC
QT Input Channel

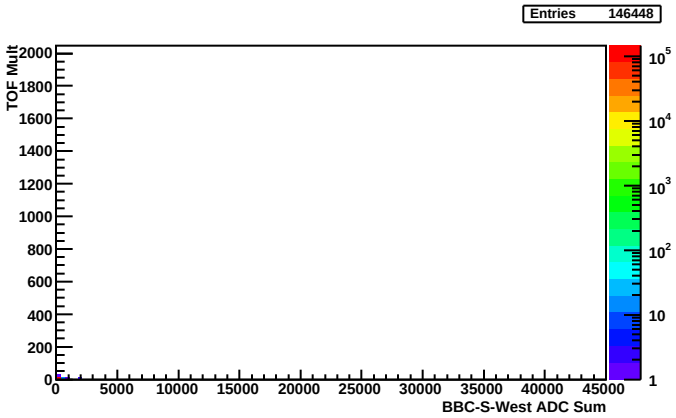

BBQ-VP004 (HI threshold)
Entries 2343168
ADC
QT Input Channel

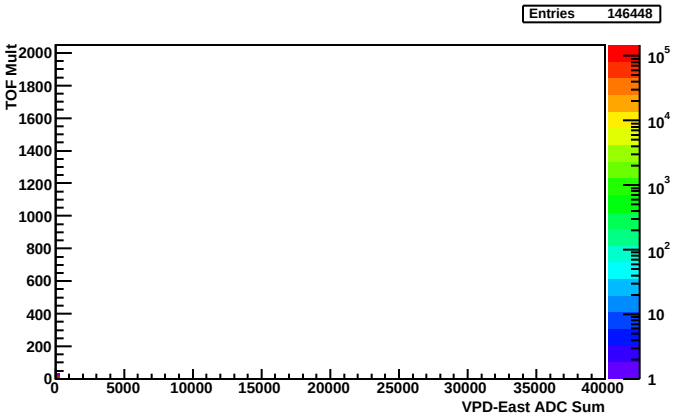

BBQ-VP004 (HI threshold)
Entries 2343168
TAC
QT Input Channel

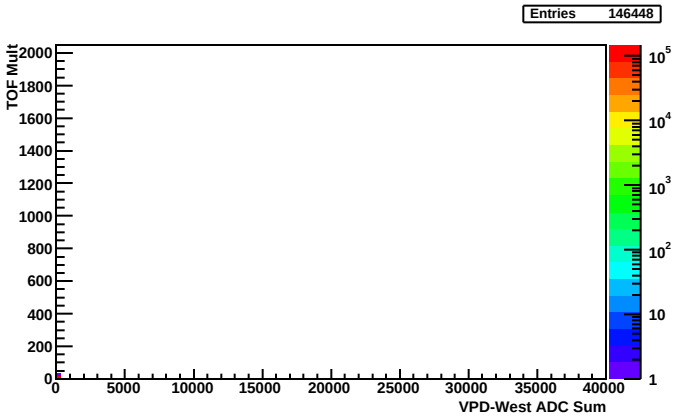

Entries 146448
TOF Mult
BBC-L-East ADC Sum

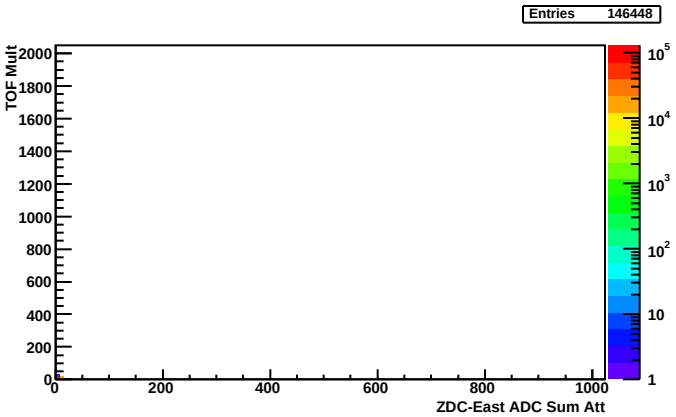

Entries 146448
TOF Mult
BBC-L-West ADC Sum

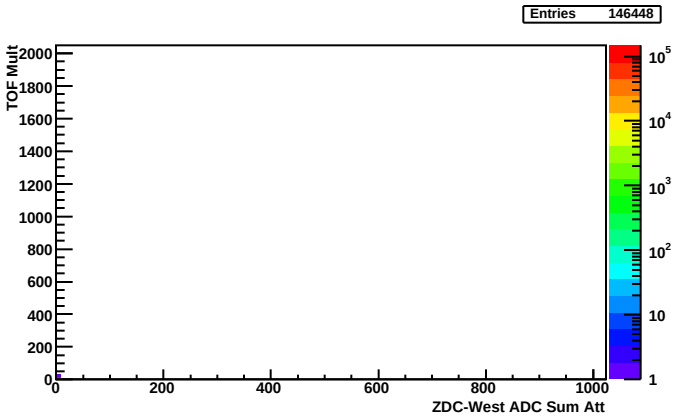

Entries 146448
TOF Mult
BBC-S-East ADC Sum

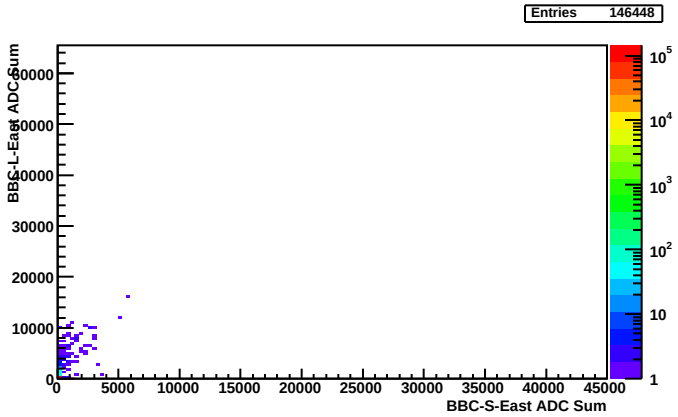

Entries 146448
TOF Mult
BBC-S-West ADC Sum

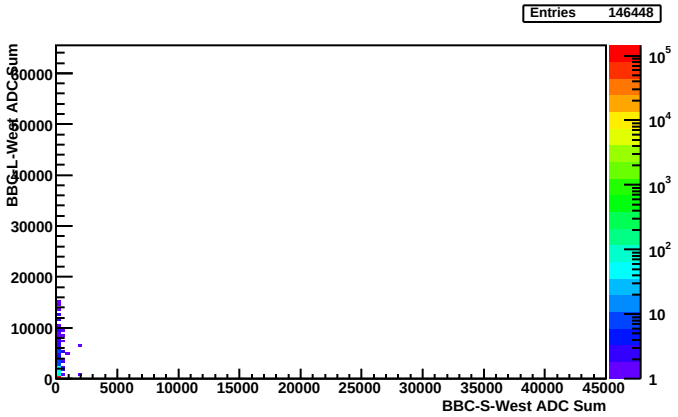

Entries 146448
TOF Mult
VPD-East ADC Sum

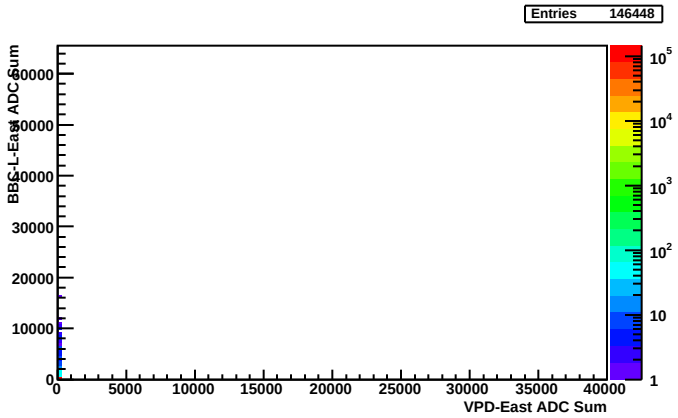

Entries 146448
TOF Mult
VPD-West ADC Sum

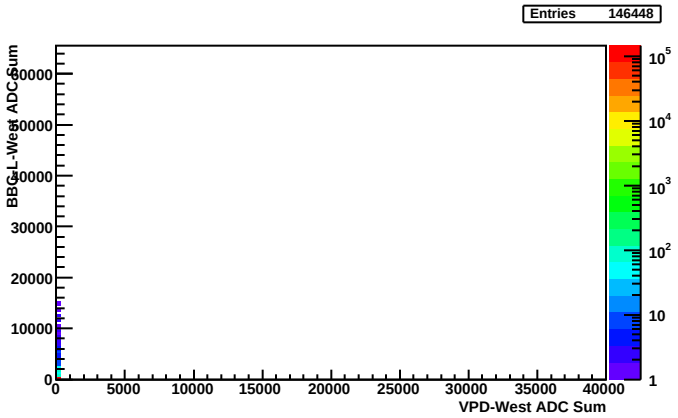

Entries 146448
TOF Mult
ZDC-East ADC Sum Att

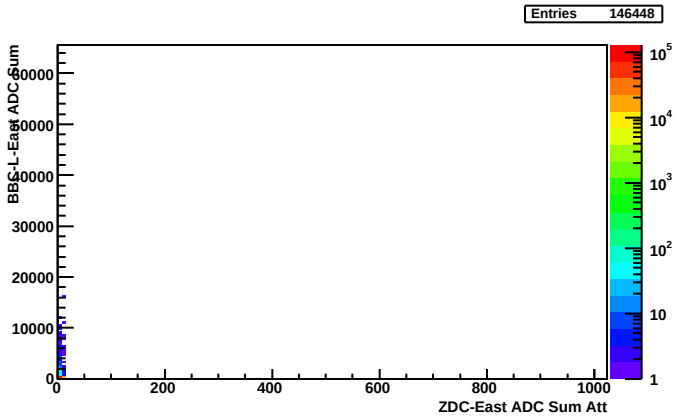

Entries 146448
TOF Mult
ZDC-West ADC Sum Att

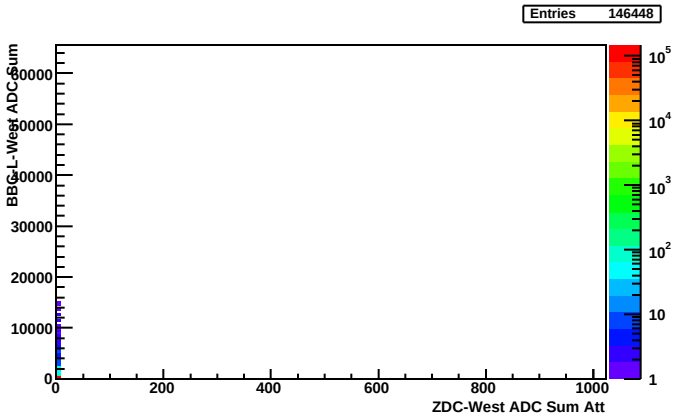

Entries 146448
BBC-L-East ADC Sum
BBC-S-East ADC Sum

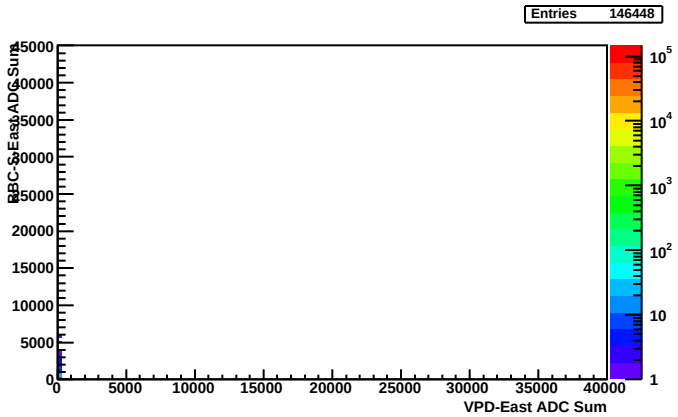

Entries 146448
BBC-L-West ADC Sum
BBC-S-West ADC Sum

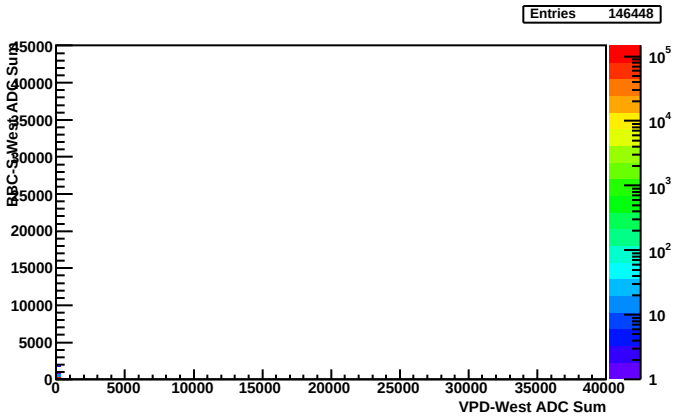

Entries 146448
BBC-L-East ADC Sum
VPD-East ADC Sum

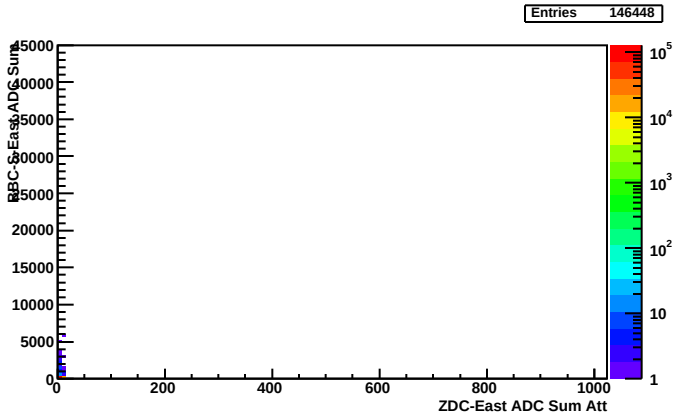

Entries 146448
BBC-L-West ADC Sum
VPD-West ADC Sum

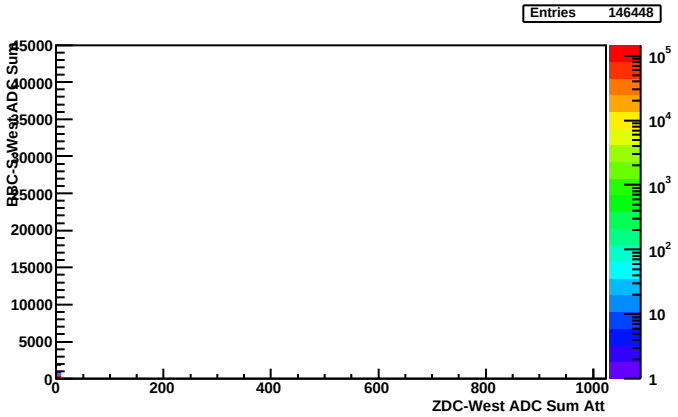

Entries 146448
BBC-L-East ADC Sum
ZDC-East ADC Sum Att

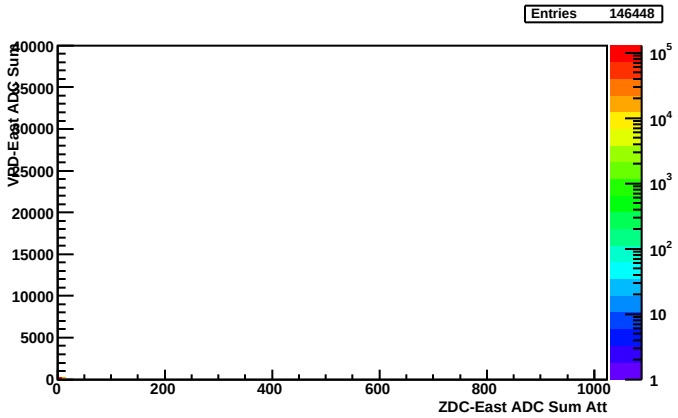

Entries 146448
BBC-L-West ADC Sum
ZDC-West ADC Sum Att

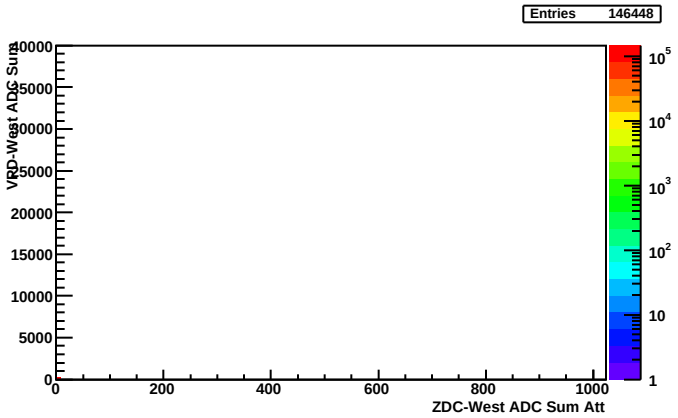

Entries 146448
BBC-S-East ADC Sum
VPD-East ADC Sum

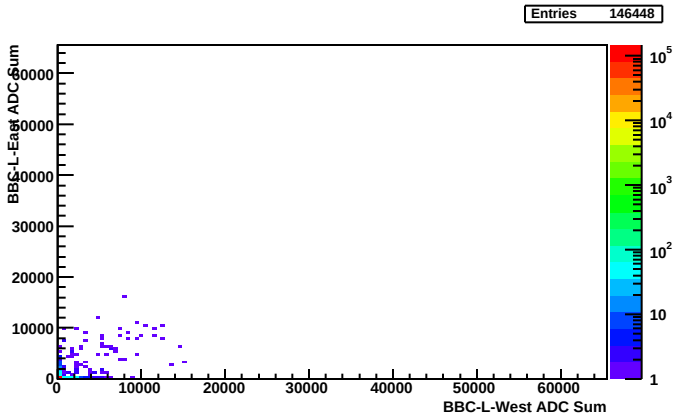

Entries 146448
BBC-S-West ADC Sum
VPD-West ADC Sum

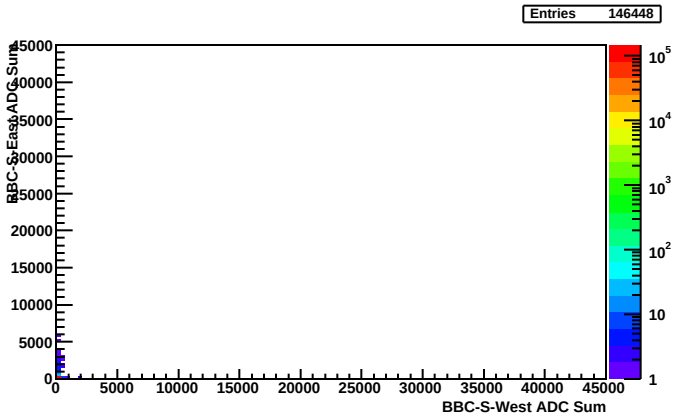

Entries 146448
BBC-S-East ADC Sum
ZDC-East ADC Sum Att

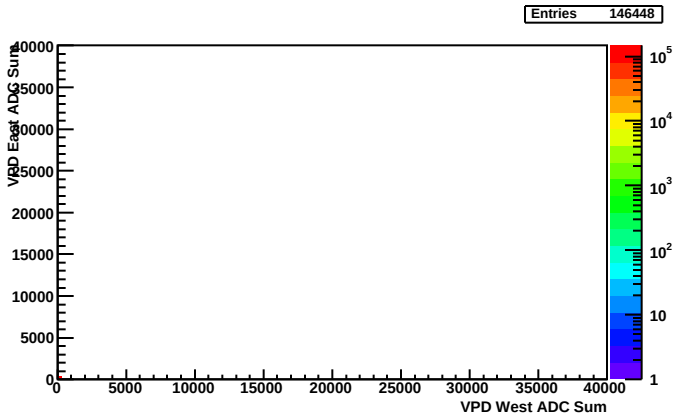

Entries 146448
BBC-S-West ADC Sum
ZDC-West ADC Sum Att

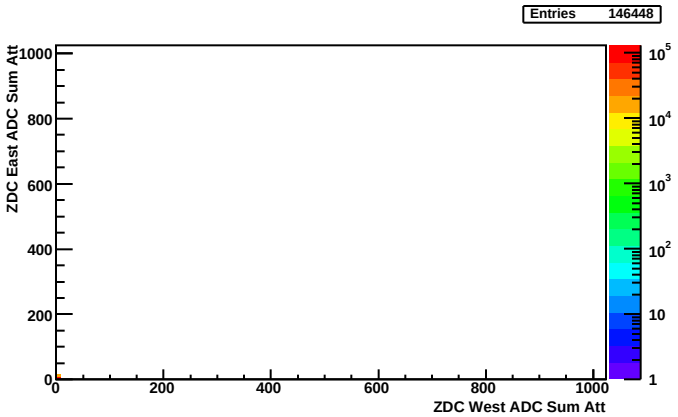

Entries 146448
VPD-East ADC Sum
ZDC-East ADC Sum Att

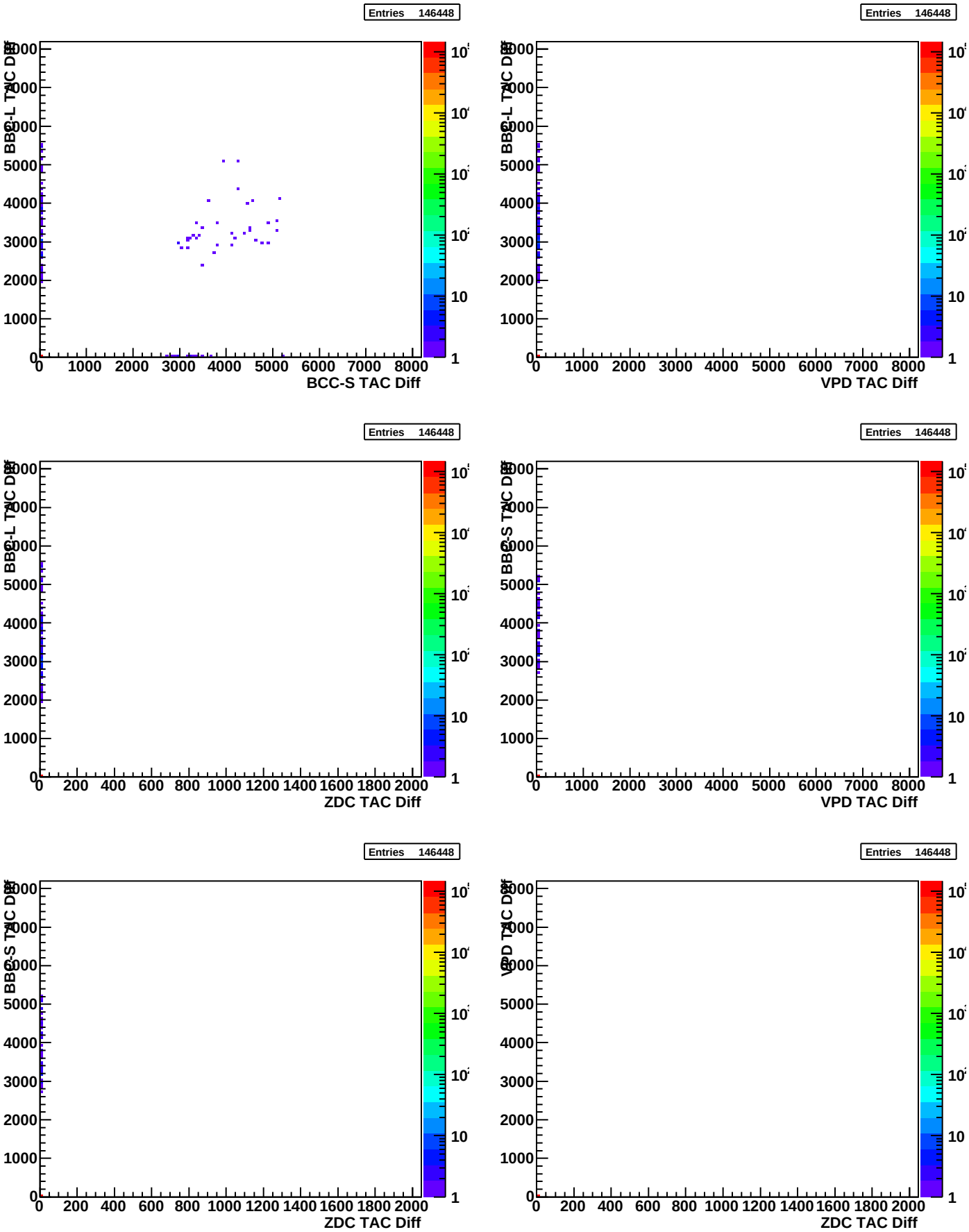

Entries 146448
VPD-West ADC Sum
ZDC-West ADC Sum Att

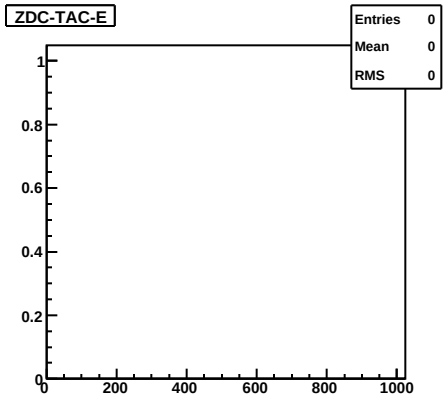

Entries 146448
BBC-L-East ADC Sum
BBC-L-West ADC Sum

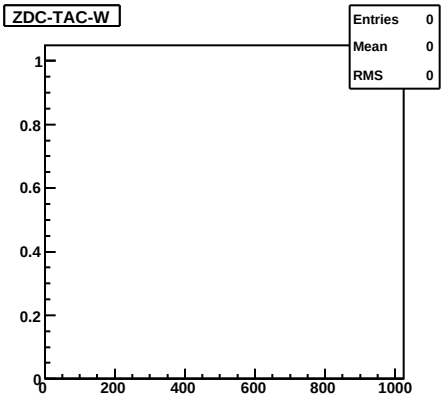

Entries 146448
BBC-S-East ADC Sum
BBC-S-West ADC Sum

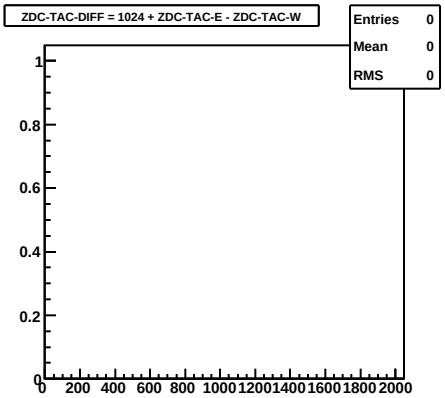

Entries 146448
VPD East ADC Sum
VPD West ADC Sum

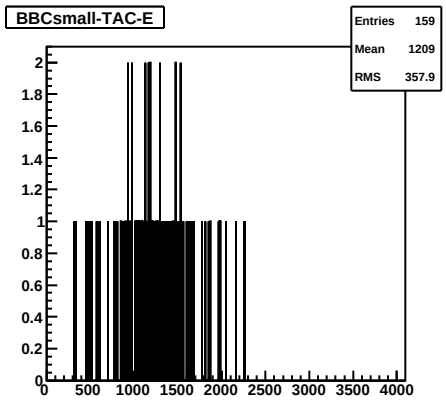

Entries 146448
ZDC East ADC Sum Att
ZDC West ADC Sum Att

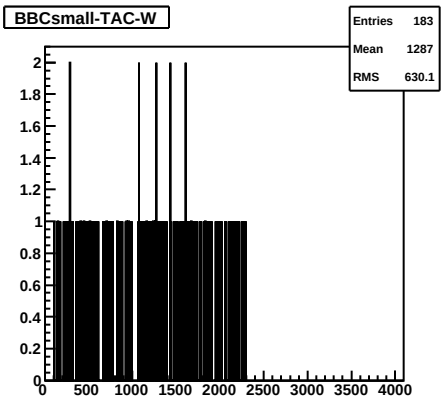

Entries 146448
BBC-L TAC Diff
BCC-S TAC Diff
Entries 146448
BBC-L TAC Diff
VPD TAC Diff
Entries 146448
BBC-L TAC Diff
ZDC TAC Diff
Entries 146448
BBC-S TAC Diff
VPD TAC Diff
Entries 146448
BBC-S TAC Diff
ZDC TAC Diff
Entries 146448
VPD TAC Diff
ZDC TAC Diff

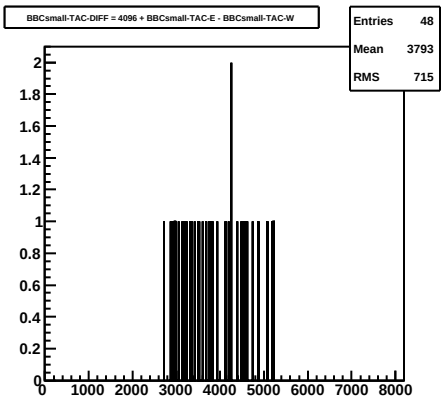

ZDC-TAC-E
Entries 0
Mean 0
RMS 0

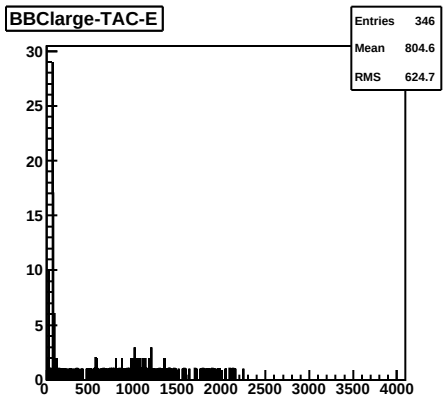

ZDC-TAC-W
Entries 0
Mean 0
RMS 0

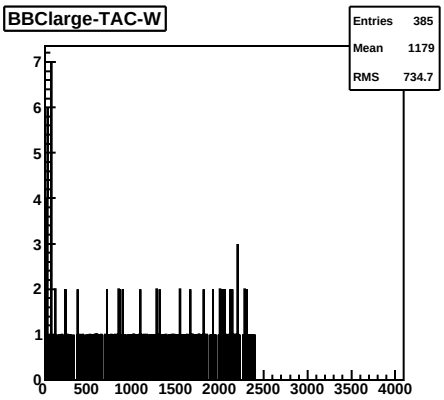

ZDC-TAC-DIFF = 1024 + ZDC-TAC-E - ZDC-TAC-W
Entries 0
Mean 0
RMS 0

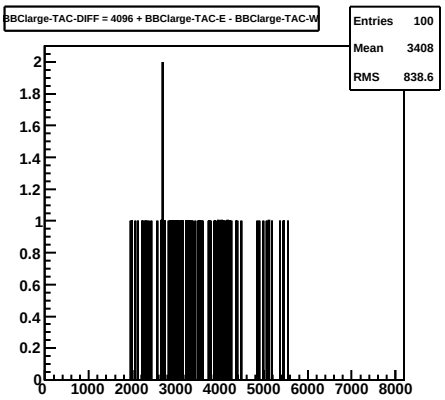

BBCsmall-TAC-E
Entries 159
Mean 1209
RMS 357.9

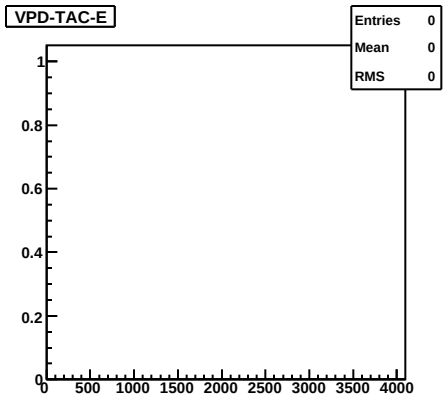

BBCsmall-TAC-W
Entries 183
Mean 1287
RMS 630.1

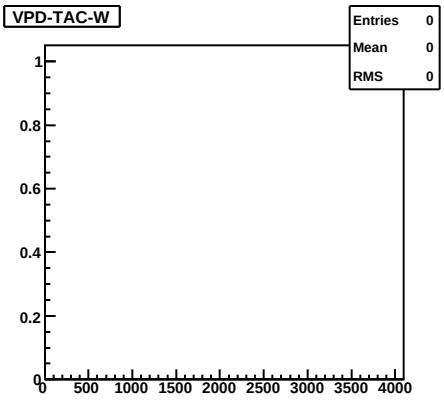

BBCsmall-TAC-DIFF = 4096 + BBCsmall-TAC-E - BBCsmall-TAC-W
Entries 48
Mean 3793
RMS 715

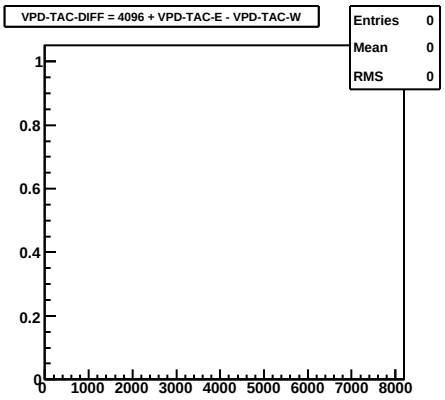

BBClarge-TAC-E
Entries 346
Mean 804.6
RMS 624.7

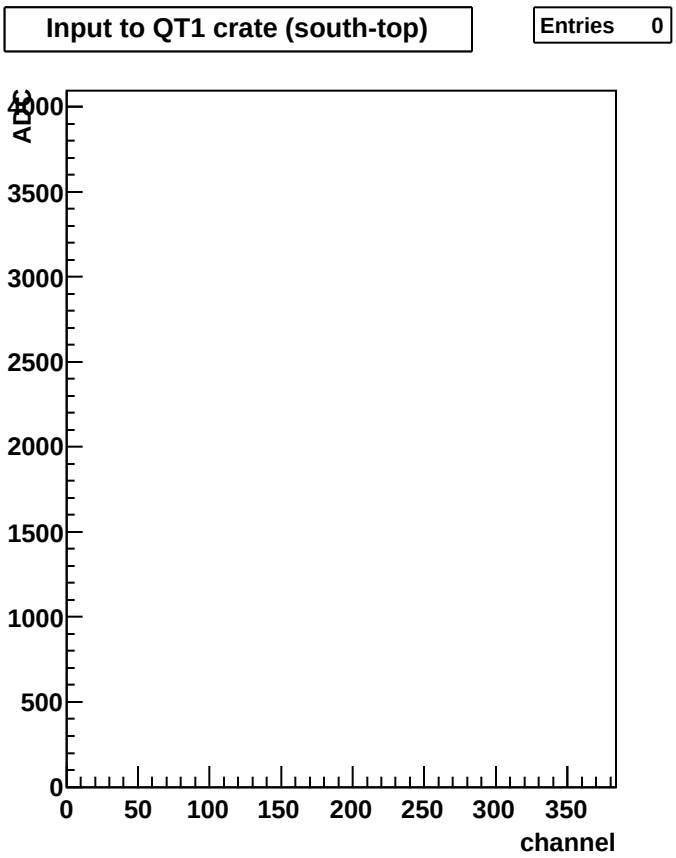

BBClarge-TAC-W
Entries 385
Mean 1179
RMS 734.7

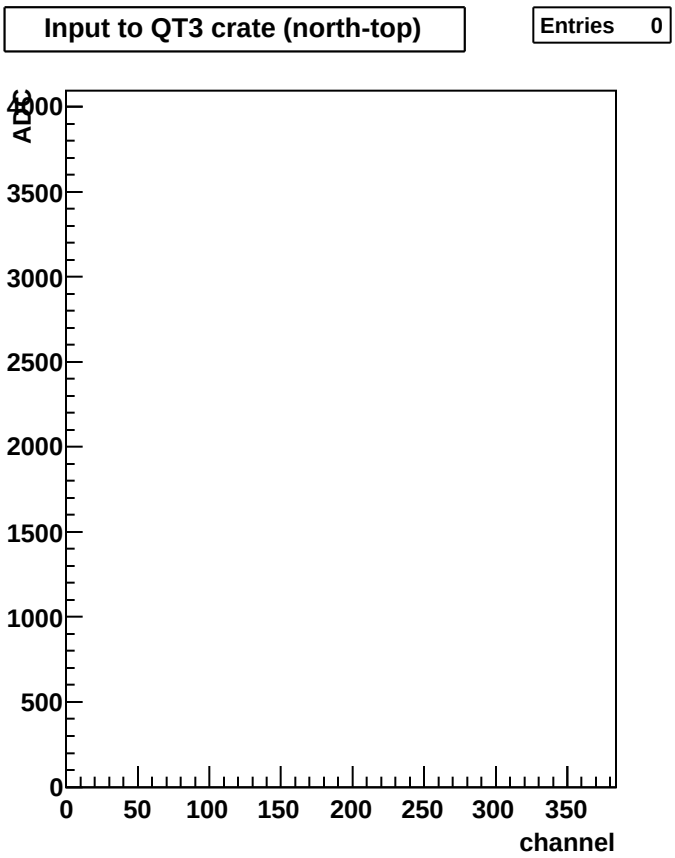

BBClarge-TAC-DIFF = 4096 + BBClarge-TAC-E - BBClarge-TAC-W
Entries 100
Mean 3408
RMS 838.6

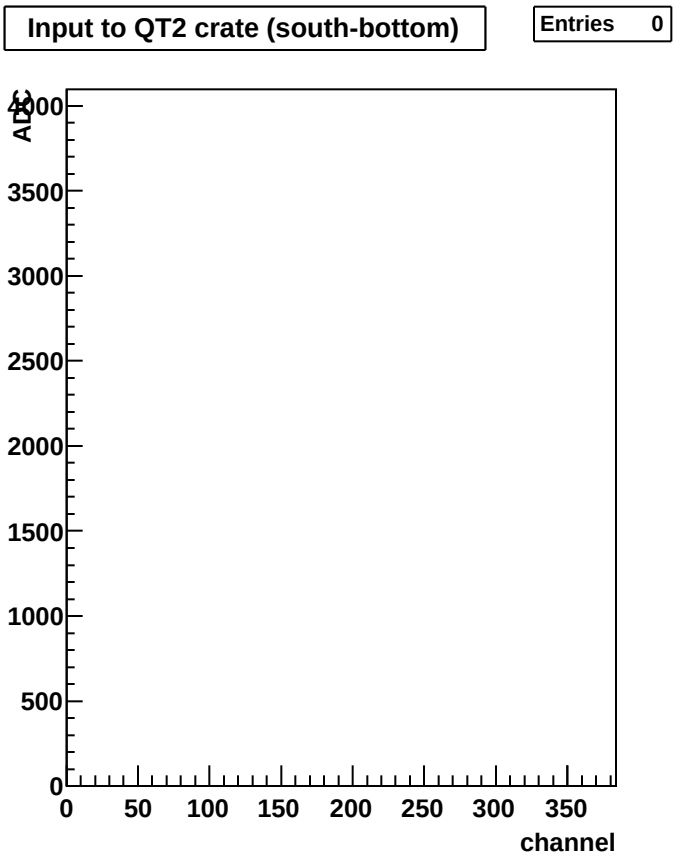

VPD-TAC-E
Entries 0
Mean 0
RMS 0

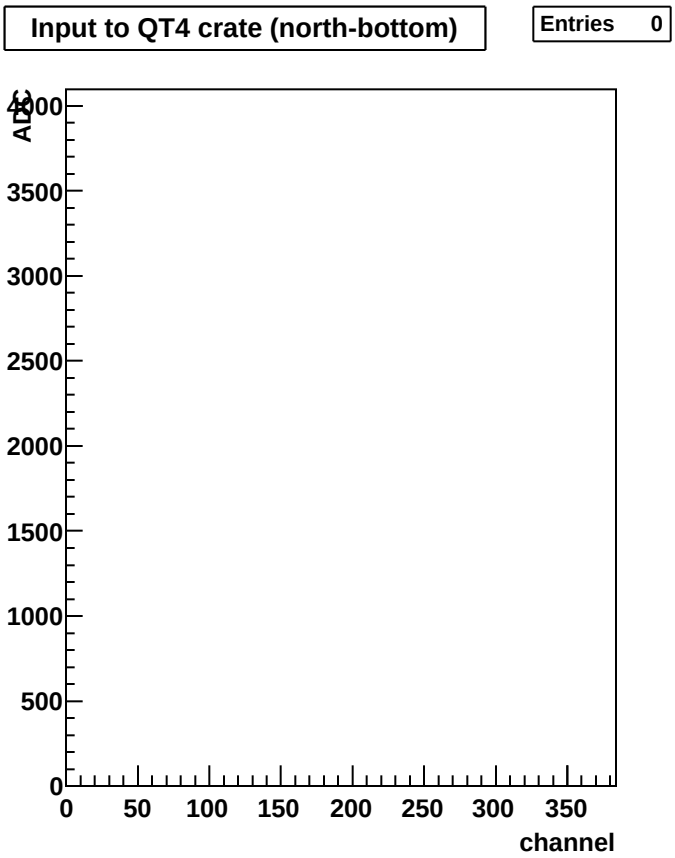

VPD-TAC-W
Entries 0
Mean 0
RMS 0

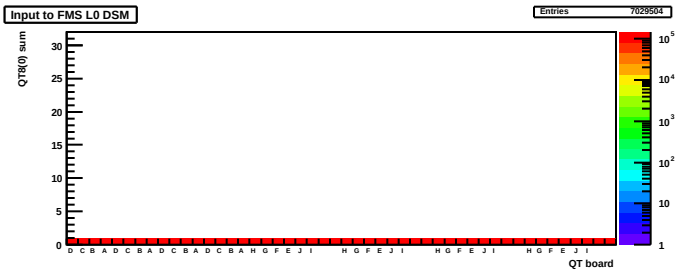

VPD-TAC-DIFF = 4096 + VPD-TAC-E - VPD-TAC-W
Entries 0
Mean 0
RMS 0

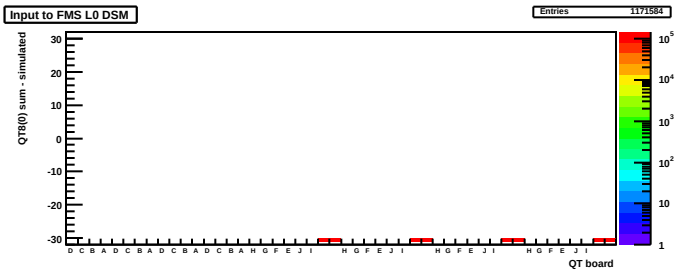

Input to QT1 crate (south-top)
Entries 0
ADC
4000
3500
3000
2500
2000
1500
1000
500
0
0 50 100 150 200 250 300 350
channel

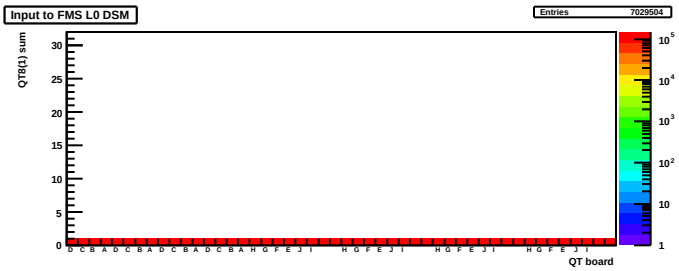

Input to QT3 crate (north-top)
Entries 0
ADC
4000
3500
3000
2500
2000
1500
1000
500
0
0 50 100 150 200 250 300 350
channel

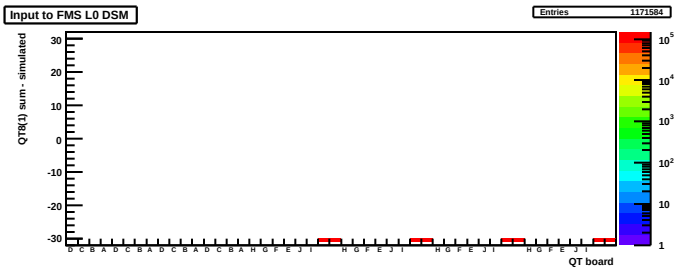

Input to QT2 crate (south-bottom)
Entries 0
ADC
4000
3500
3000
2500
2000
1500
1000
500
0
0 50 100 150 200 250 300 350
channel

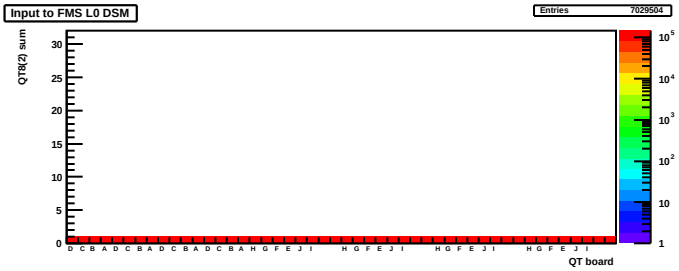

Input to QT4 crate (north-bottom)
Entries 0
ADC
4000
3500
3000
2500
2000
1500
1000
500
0
0 50 100 150 200 250 300 350
channel

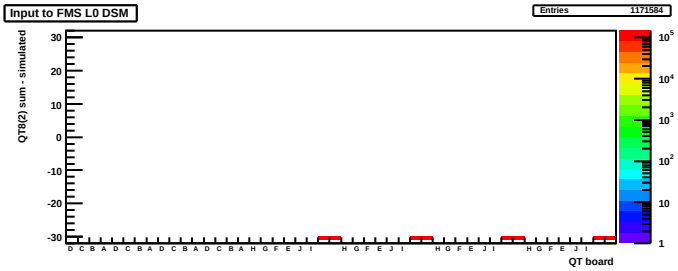

Input to FMS L0 DSM
Entries 7029504
QT8(0) sum
QT board

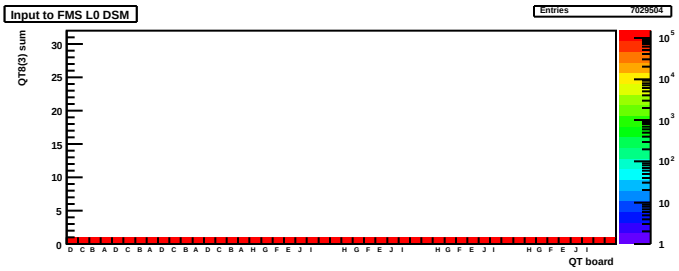

Input to FMS L0 DSM
Entries 1171584
QT8(0) sum - simulated
QT board

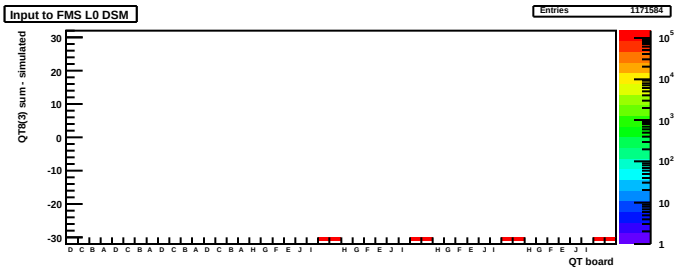

Input to FMS L0 DSM
Entries 7029504
QT8(1) sum
QT board

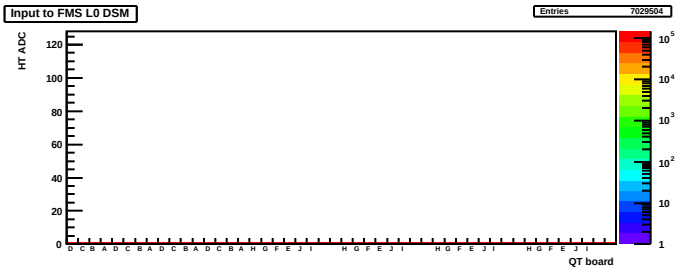

Input to FMS L0 DSM
Entries 1171584
QT8(1) sum - simulated
QT board

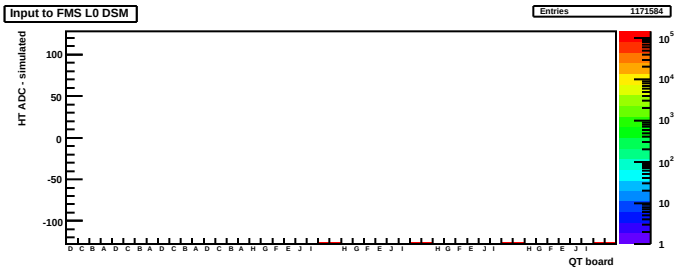

Input to FMS L0 DSM
Entries 7029504
QT8(2) sum
QT board

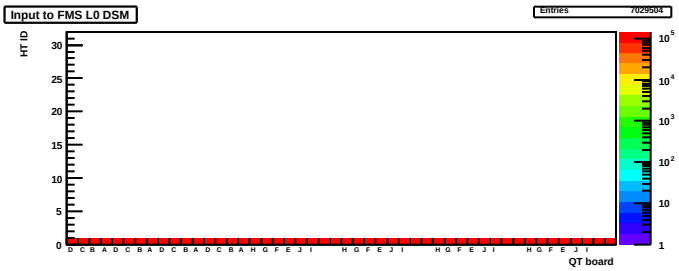

Input to FMS L0 DSM
Entries 1171584
QT8(2) sum - simulated
QT board

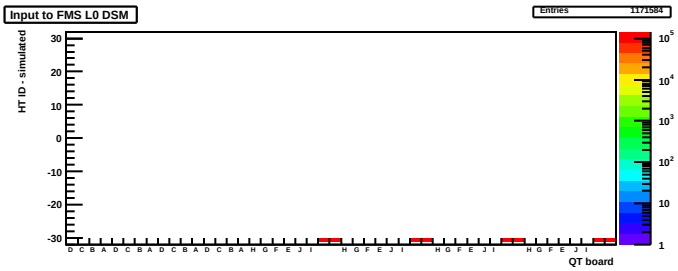

Input to FMS L0 DSM
Entries 7029504
QT8(3) sum
QT board

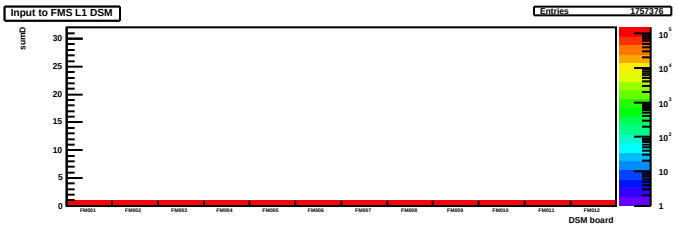

Input to FMS L0 DSM
Entries 1171584
QT8(3) sum - simulated
QT board

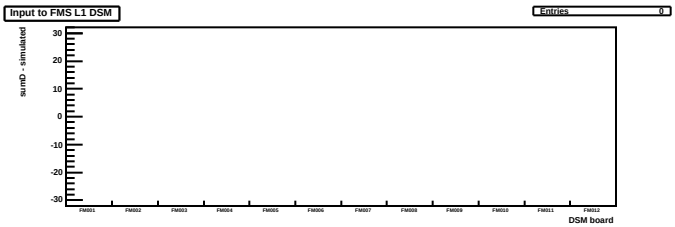

Input to FMS L0 DSM
Entries 7029504
HT ADC
QT board

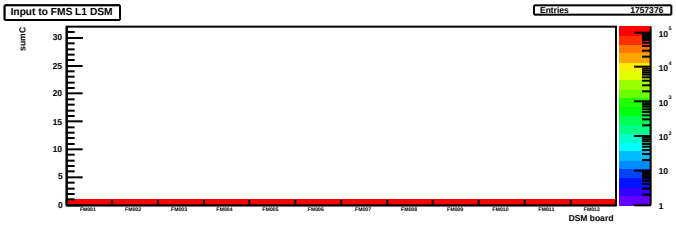

Input to FMS L0 DSM
Entries 1171584
HT ADC - simulated
QT board

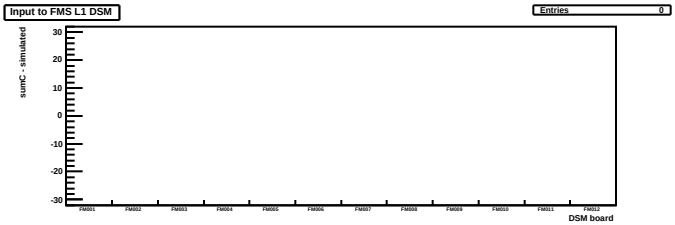

Input to FMS L0 DSM
Entries 7029504
HT ID
QT board

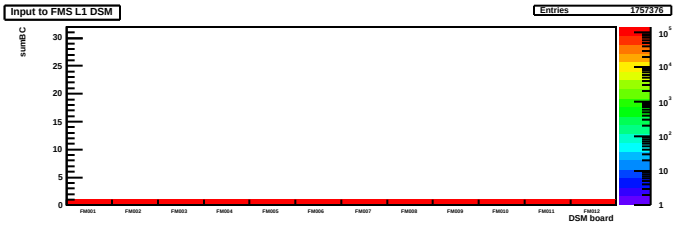

Input to FMS L0 DSM
Entries 1171584
HT ID - simulated
QT board

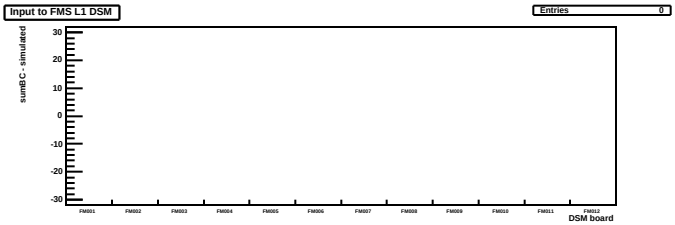

Input to FMS L1 DSM
Entries 1757376
sumD
DSM board

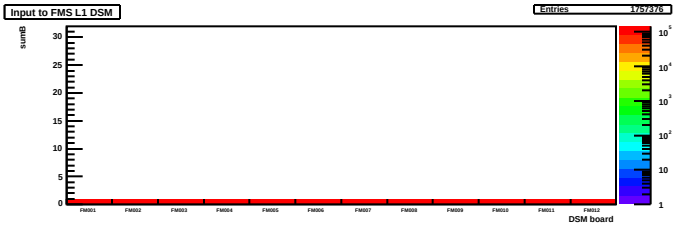

Input to FMS L1 DSM
Entries 0
sumD - simulated
DSM board

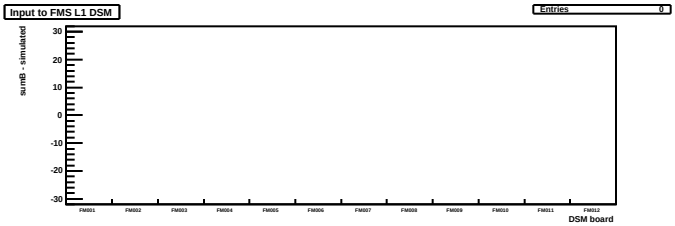

Input to FMS L1 DSM
Entries 1757376
sumC
DSM board

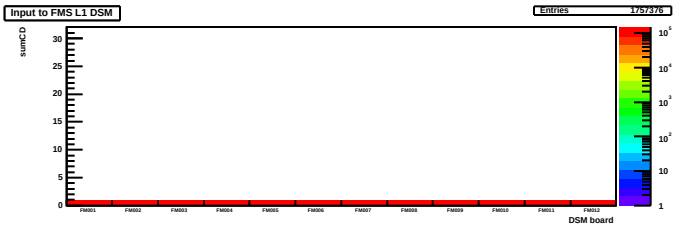

Input to FMS L1 DSM
Entries 0
sumC - simulated
DSM board

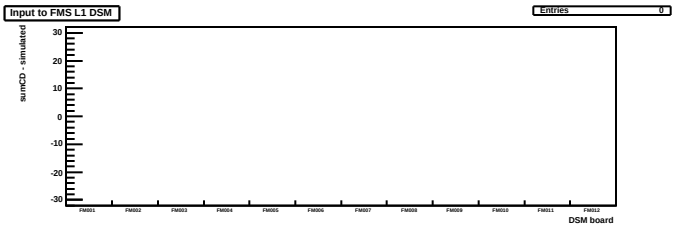

Input to FMS L1 DSM
Entries 1757376
sumBC
DSM board

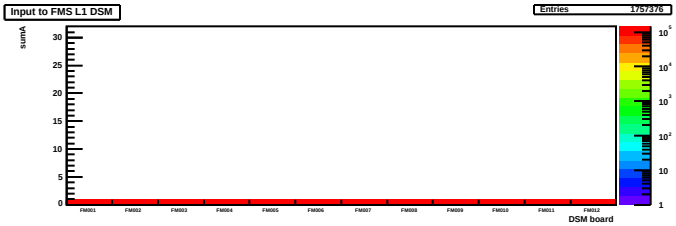

Input to FMS L1 DSM
Entries 0
sumBC - simulated
DSM board

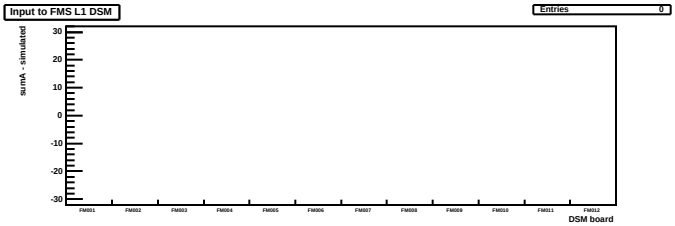

Input to FMS L1 DSM
Entries 1757376
sumB
DSM board

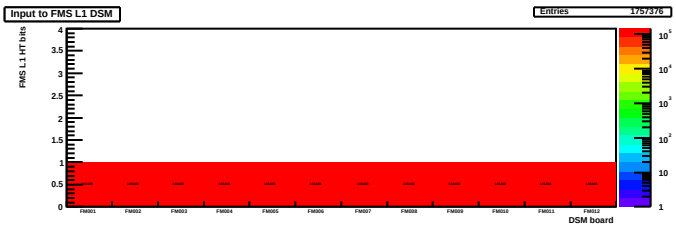

Input to FMS L1 DSM
Entries 0
sumB - simulated
DSM board

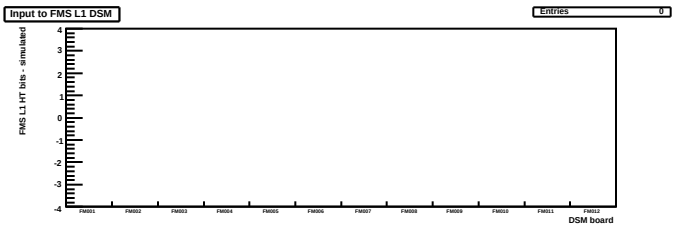

Input to FMS L1 DSM
Entries 1757376
sumCD
DSM board

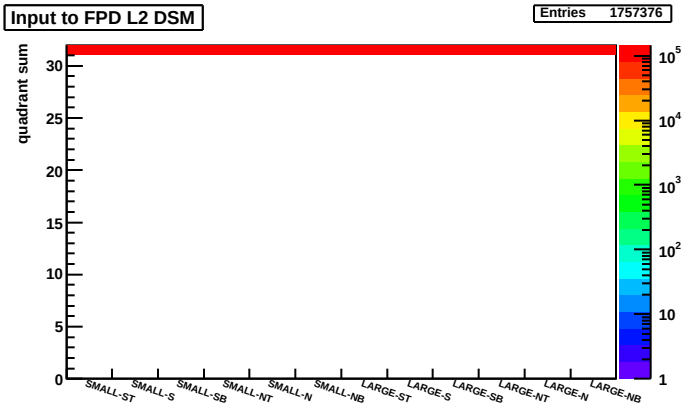

Input to FMS L1 DSM
Entries 0
sumCD - simulated
DSM board

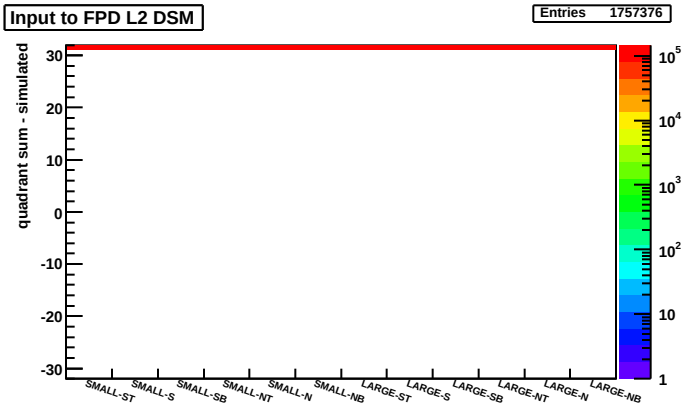

Input to FMS L1 DSM
Entries 1757376
sumA
DSM board

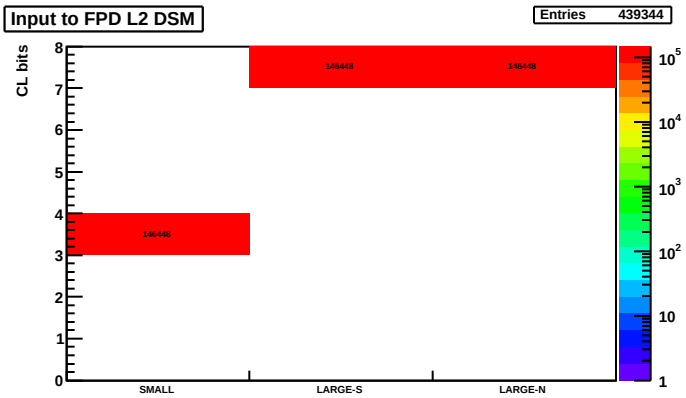

Input to FMS L1 DSM
Entries 0
sumA - simulated
DSM board

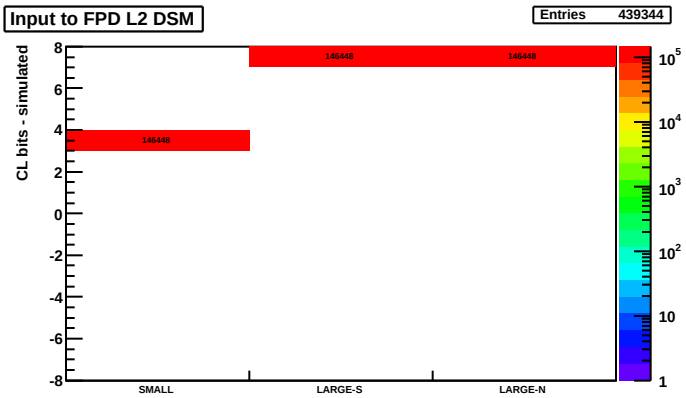

Input to FMS L1 DSM
Entries 1757376
FMS L1 HT bits
DSM board

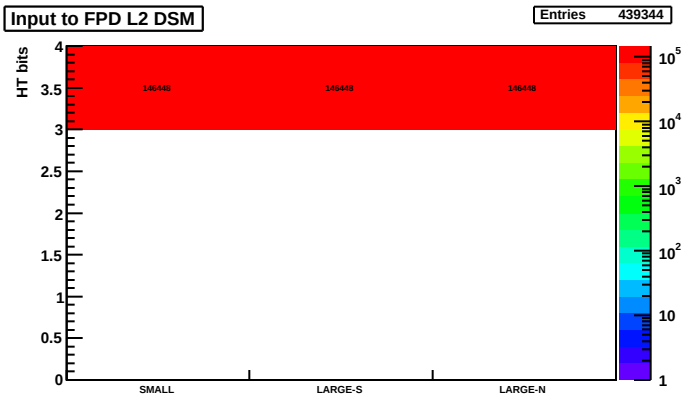

Input to FMS L1 DSM
Entries 0
FMS L1 HT bits - simulated
DSM board

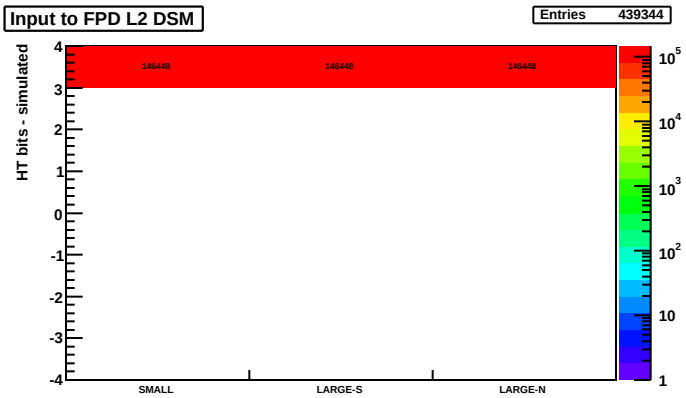

Input to FPD L2 DSM
Entries 1757376
quadrant sum
SMALL-ST
SMALL-S
SMALL-SB
SMALL-NT
SMALL-N
SMALL-NB
LARGE-ST
LARGE-S
LARGE-SB
LARGE-NT
LARGE-N
LARGE-NB

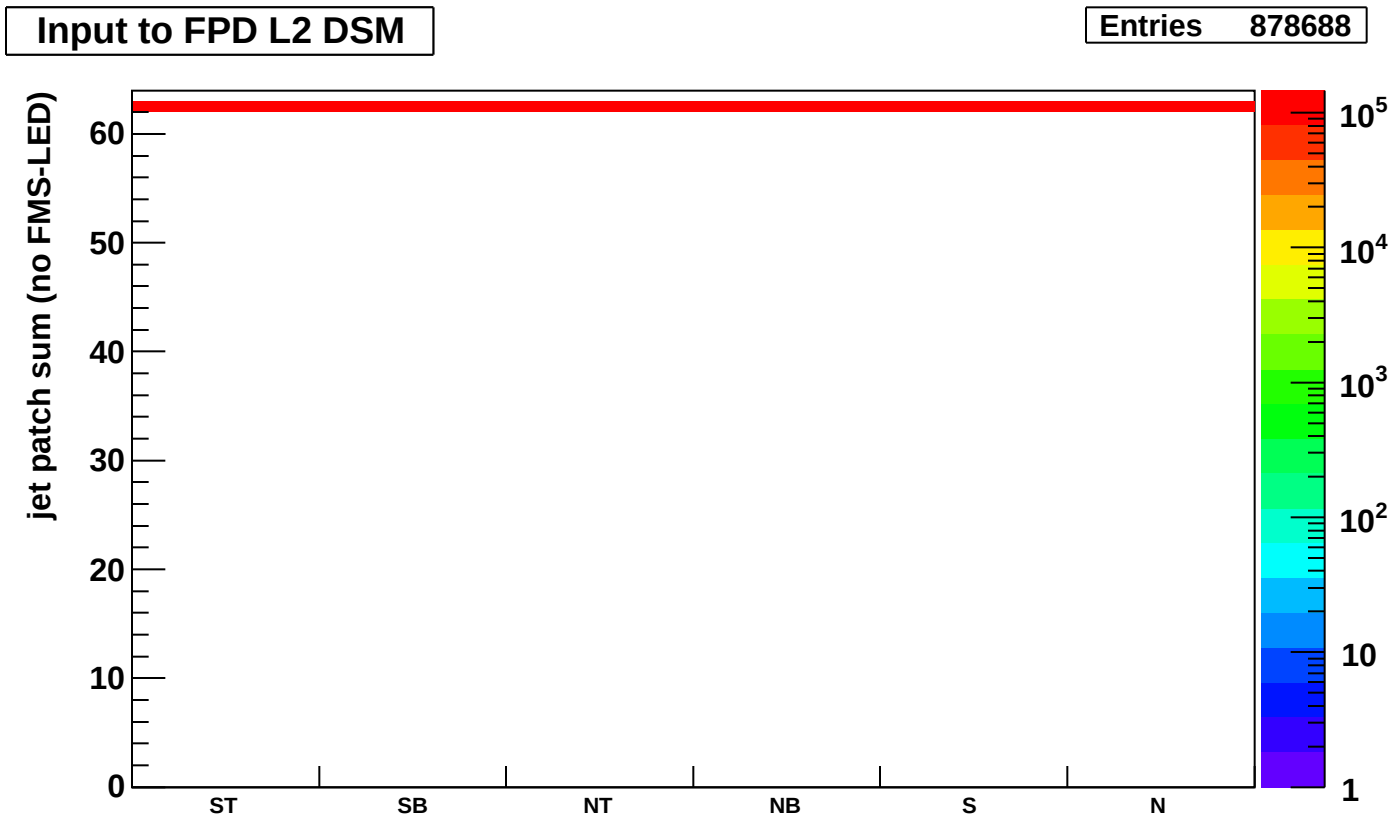

Input to FPD L2 DSM
Entries 1757376
quadrant sum - simulated
SMALL-ST
SMALL-S
SMALL-SB
SMALL-NT
SMALL-N
SMALL-NB
LARGE-ST
LARGE-S
LARGE-SB
LARGE-NT
LARGE-N
LARGE-NB

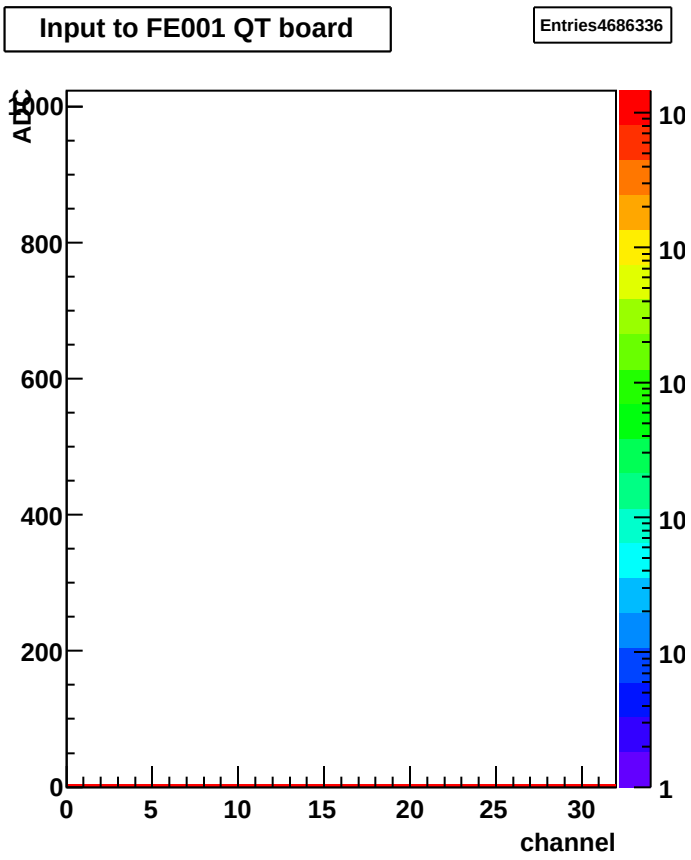

Input to FPD L2 DSM
Entries 439344
CL bits
146448
146448
146448
SMALL
LARGE-S
LARGE-N

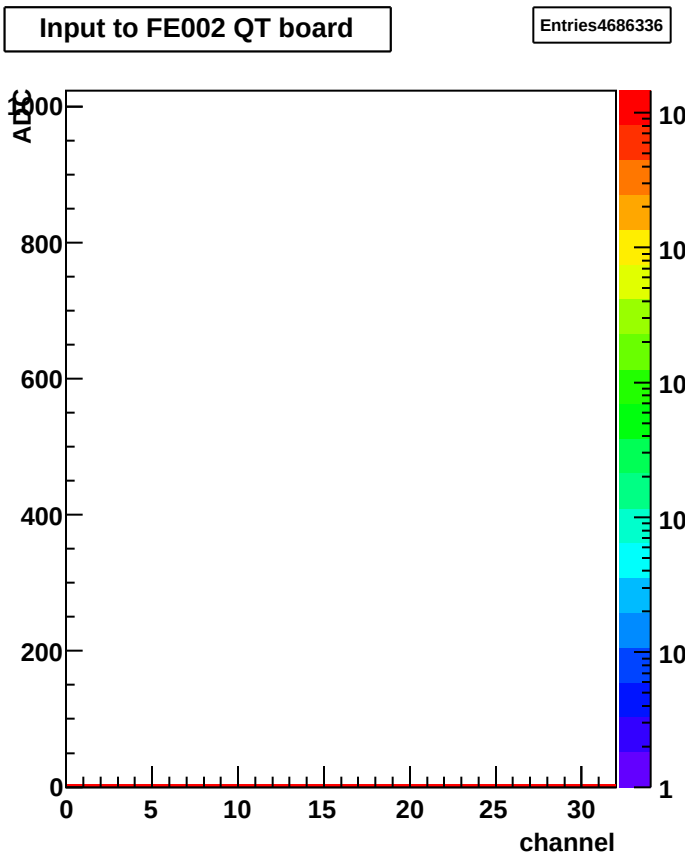

Input to FPD L2 DSM
Entries 439344
CL bits - simulated
146448
146448
146448
SMALL
LARGE-S
LARGE-N

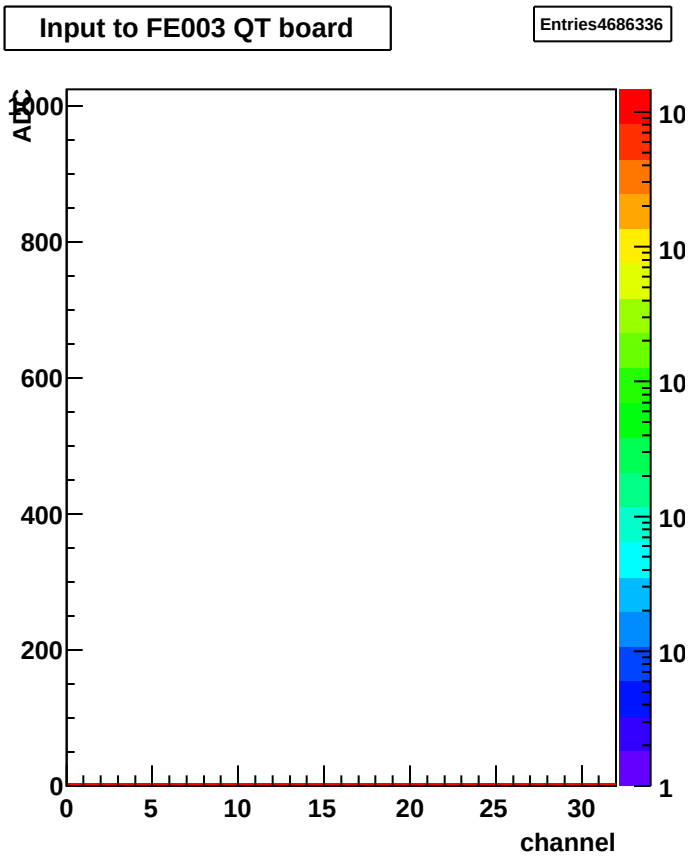

Input to FPD L2 DSM
Entries 439344
HT bits
146448
146448
146448
SMALL
LARGE-S
LARGE-N

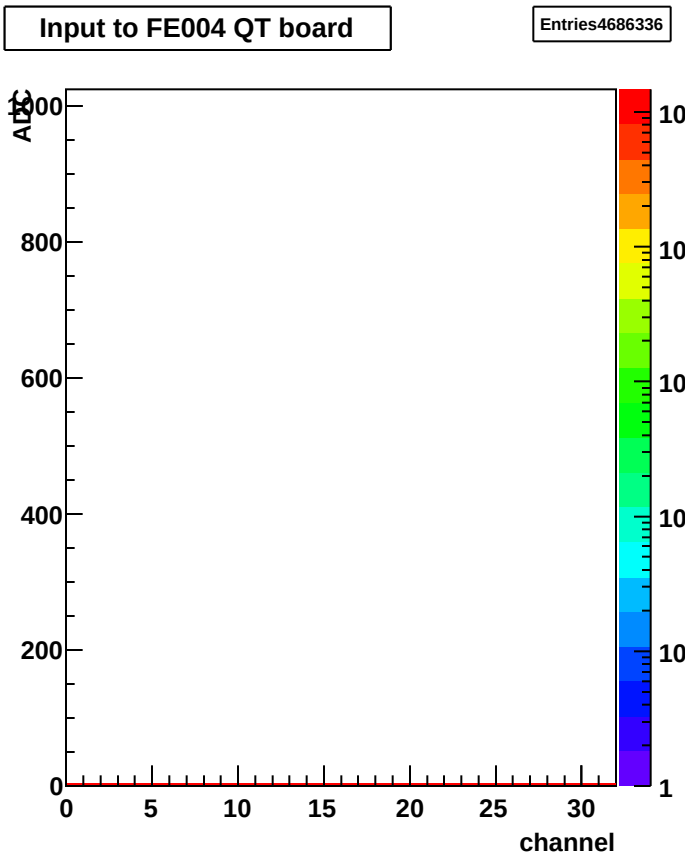

Input to FPD L2 DSM
Entries 439344
HT bits - simulated
146448
146448
146448
SMALL
LARGE-S
LARGE-N

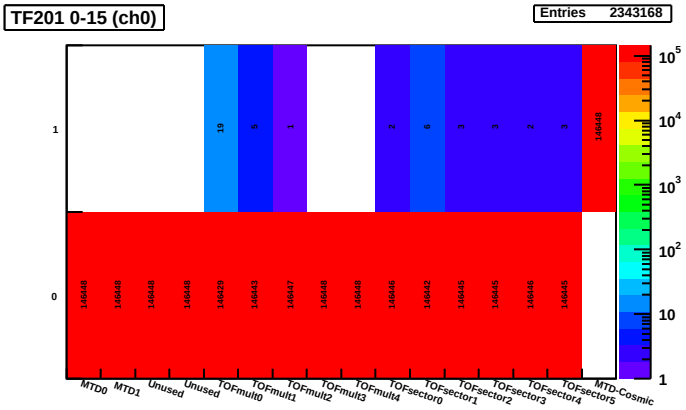

Input to FPD L2 DSM
Entries 878688
jet patch sum (no FMS-LED)
0
10
20
30
40
50
60
ST
SB
NT
NB
S
N
1
10
10^2
10^3
10^4
10^5

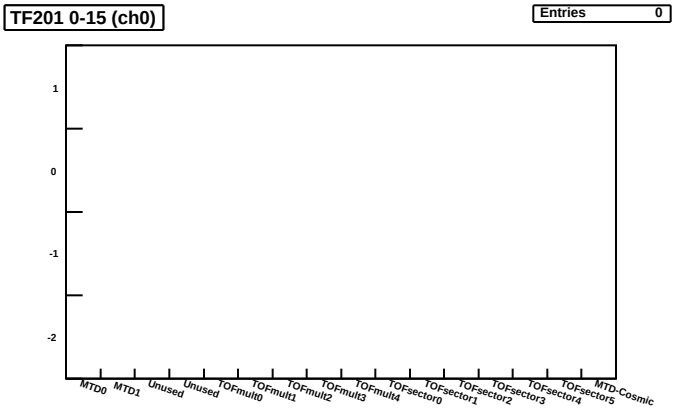

Input to FE001 QT board
Entries4686336
ADC
channel

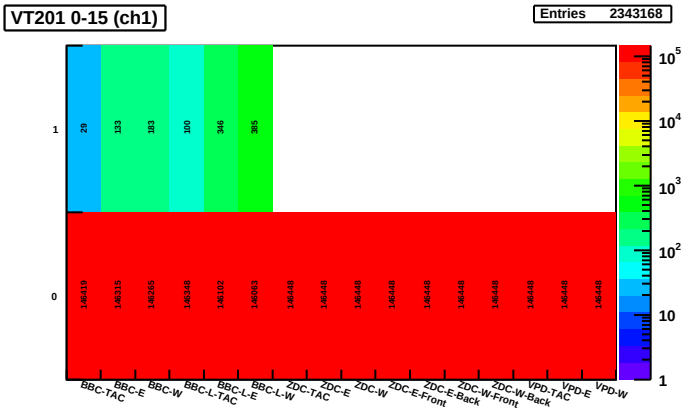

Input to FE002 QT board
Entries4686336
ADC
channel

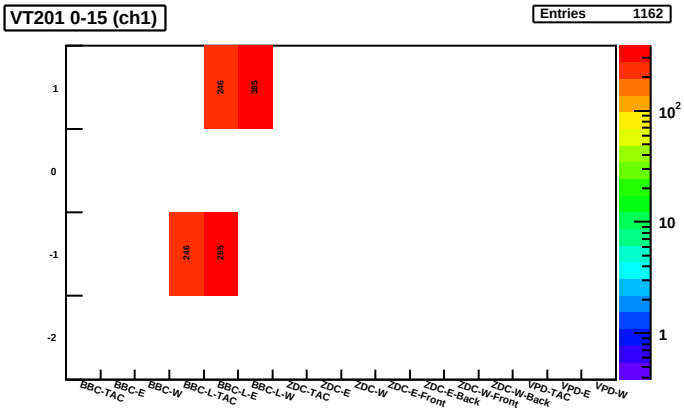

Input to FE003 QT board
Entries4686336
ADC
channel


Input to FE004 QT board
Entries4686336
ADC
channel


TF201 0-15 (ch0)
Entries 2343168
MTD0 MTD1 Unused Unused TOFmult0 TOFmult1 TOFmult2 TOFmult3 TOFmult4 TOFsector0 TOFsector1 TOFsector2 TOFsector3 TOFsector4 TOFsector5 MTD-Cosmic


TF201 0-15 (ch0)
Entries 0
MTD0 MTD1 Unused Unused TOFmult0 TOFmult1 TOFmult2 TOFmult3 TOFmult4 TOFsector0 TOFsector1 TOFsector2 TOFsector3 TOFsector4 TOFsector5 MTD-Cosmic


VT201 0-15 (ch1)
Entries 2343168
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 1162
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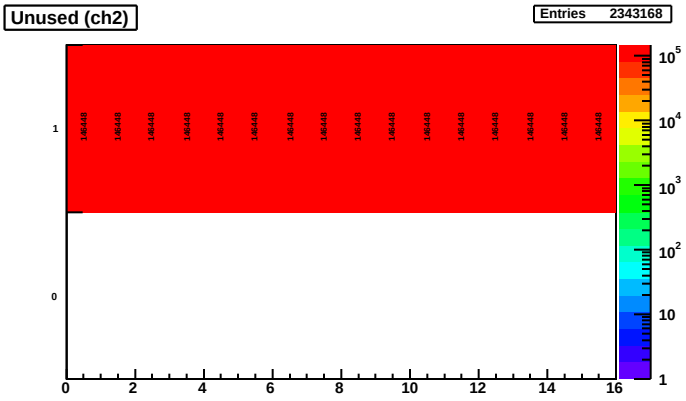
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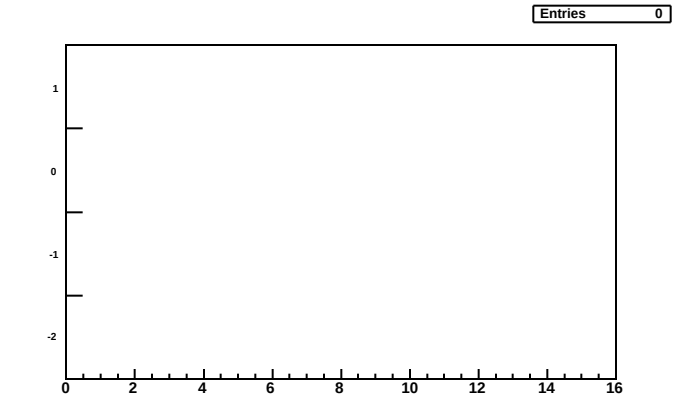
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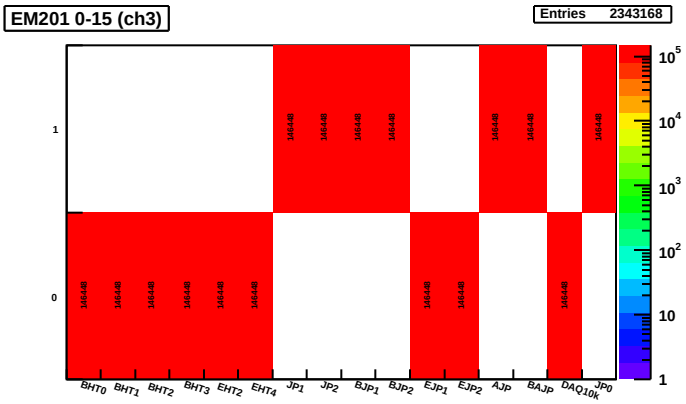
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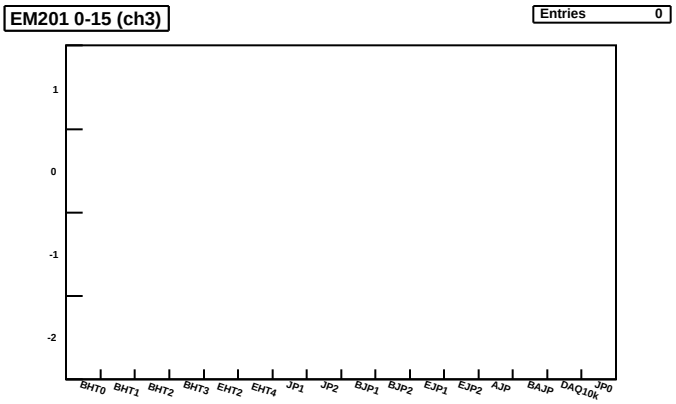
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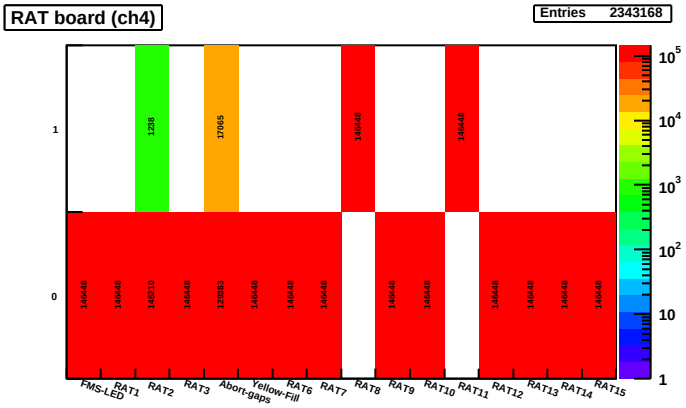
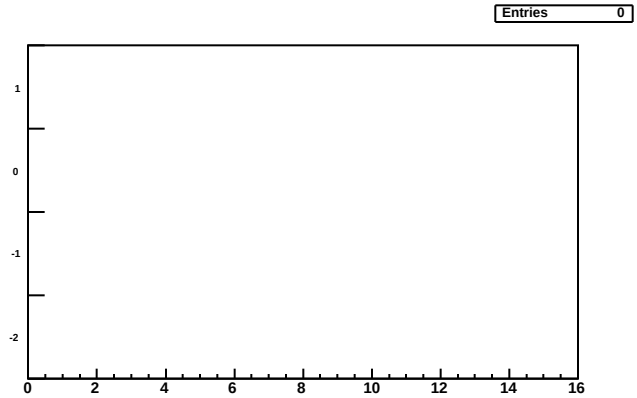
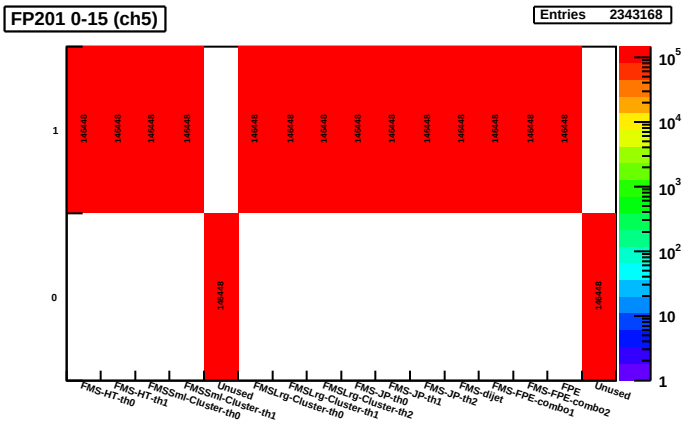
RAT board (ch4)

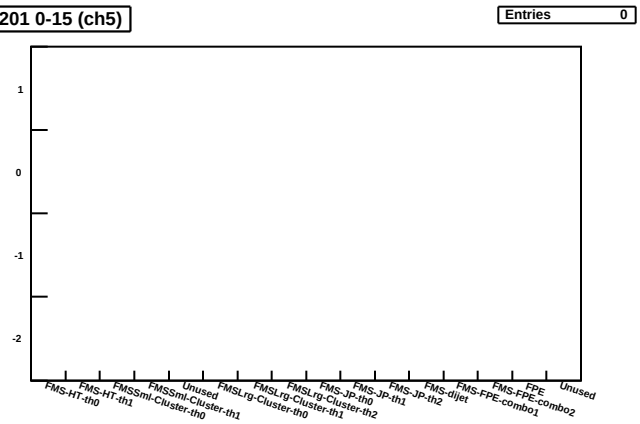




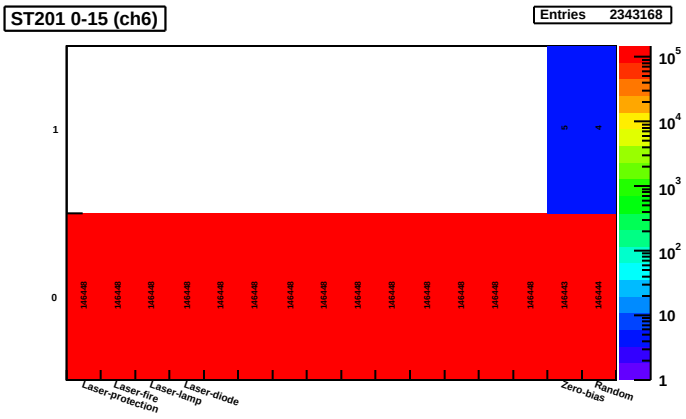
FP201 0-15 (ch5)

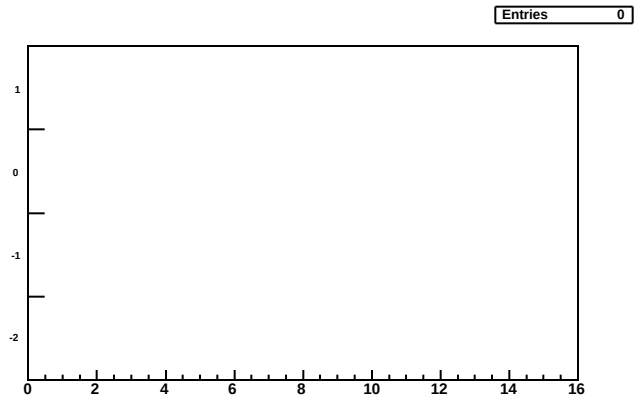
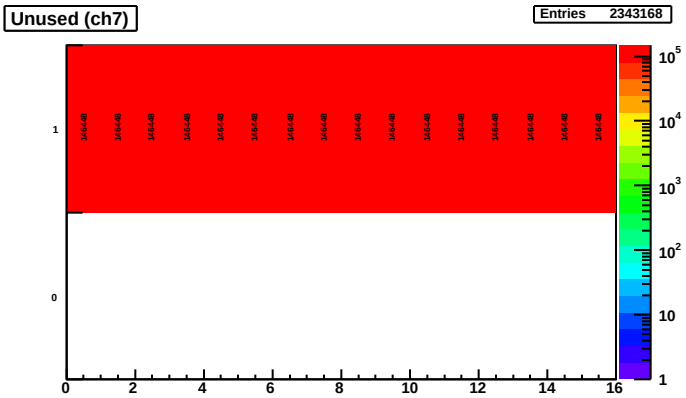
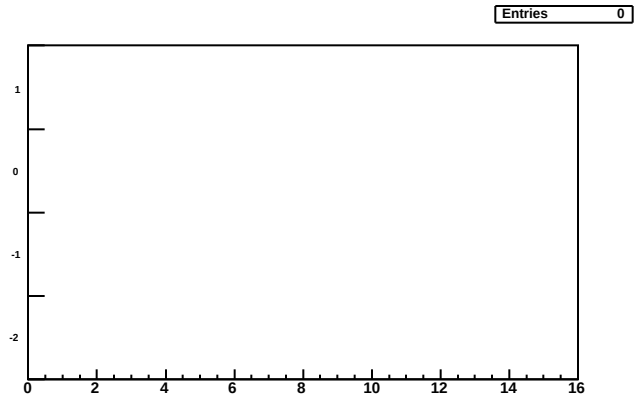


FP201 0-15 (ch5)



ST201 0-15 (ch6)





Unused (ch7)