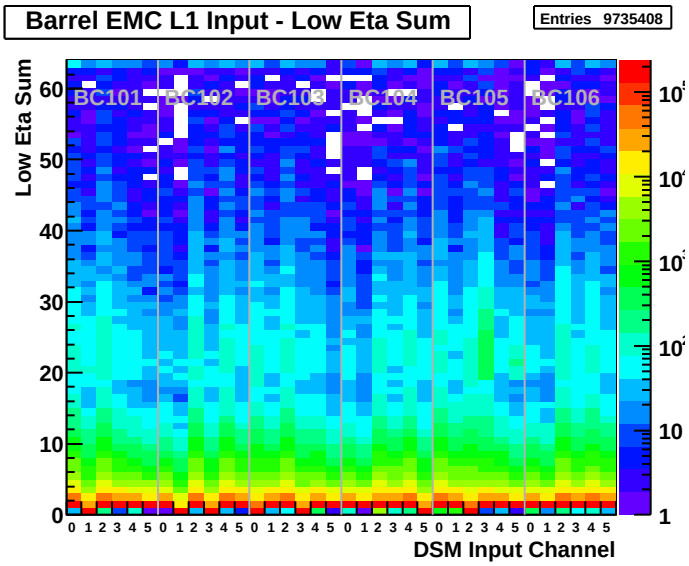
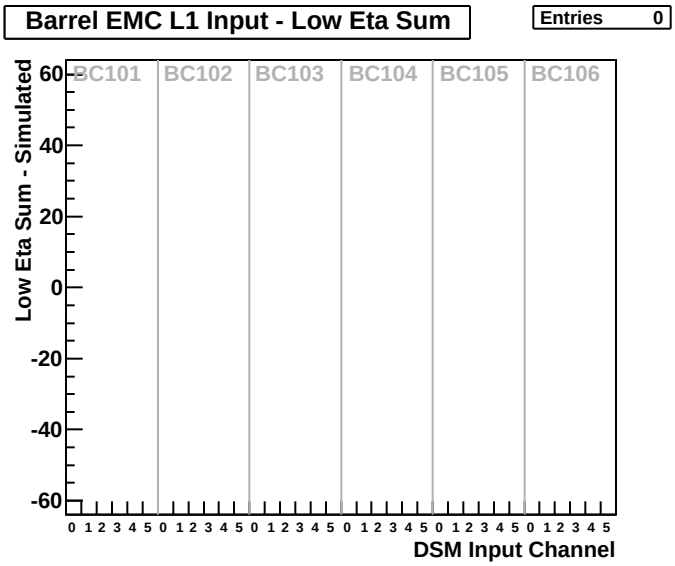
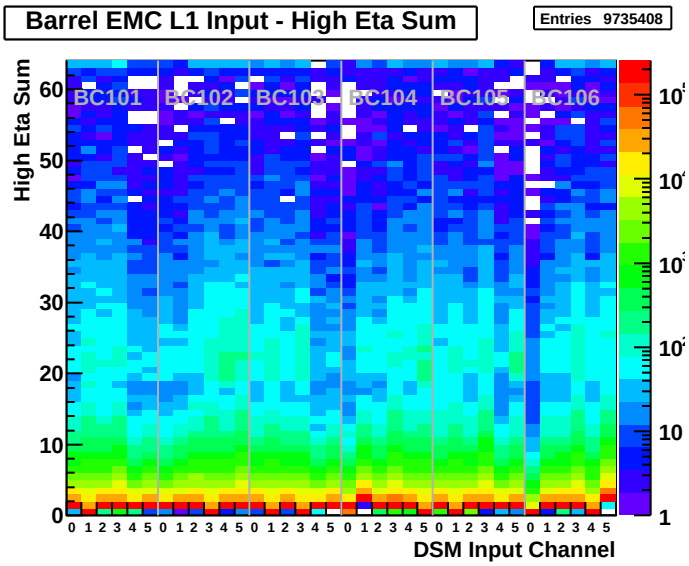
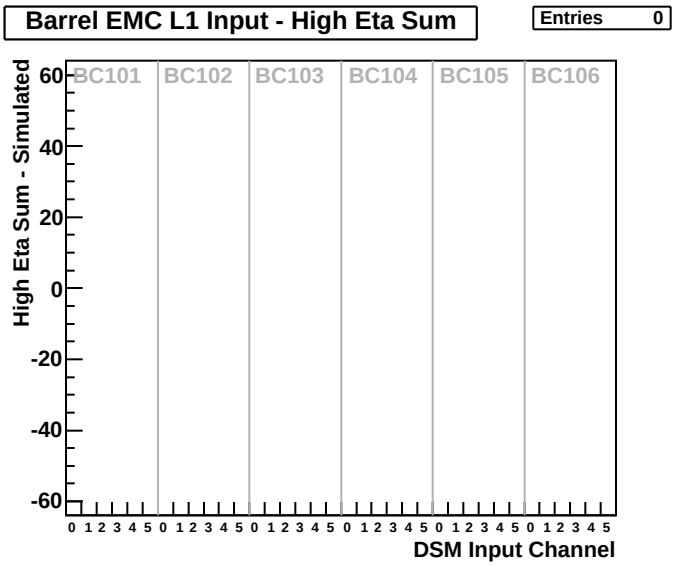
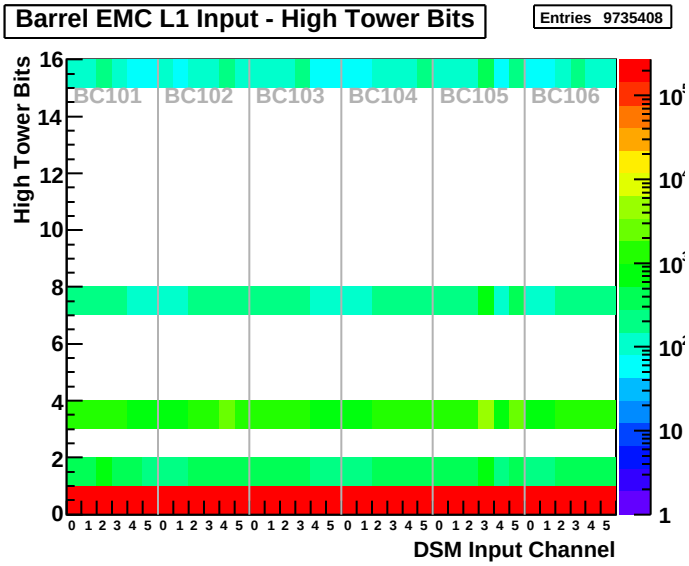
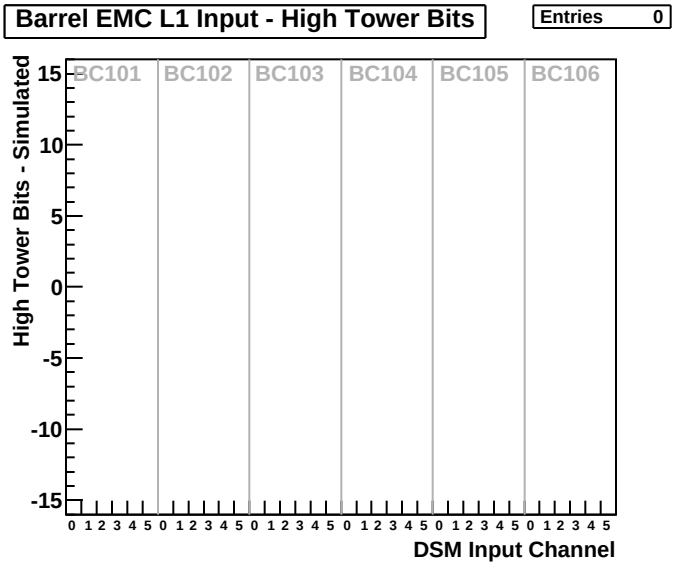

Barrel EMC L1 Input - Low Eta Sum
Entries 9735408
Low Eta Sum
BC101 BC102 BC103 BC104 BC105 BC106
DSM Input Channel

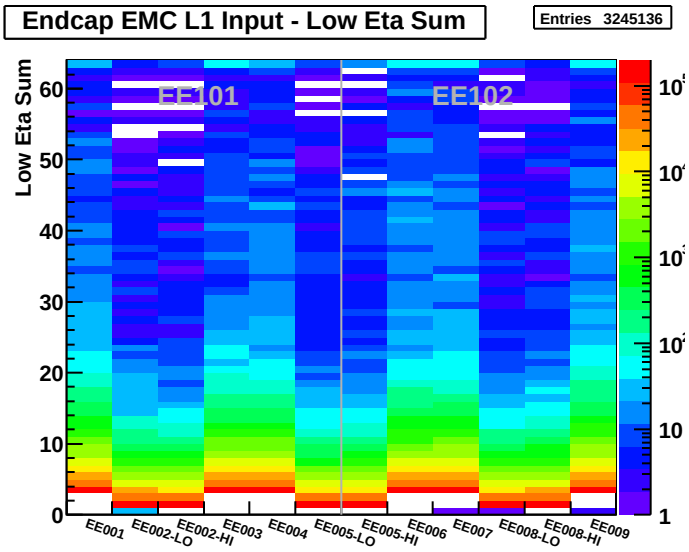

Barrel EMC L1 Input - Low Eta Sum
Entries 0
Low Eta Sum - Simulated
BC101 BC102 BC103 BC104 BC105 BC106
DSM Input Channel

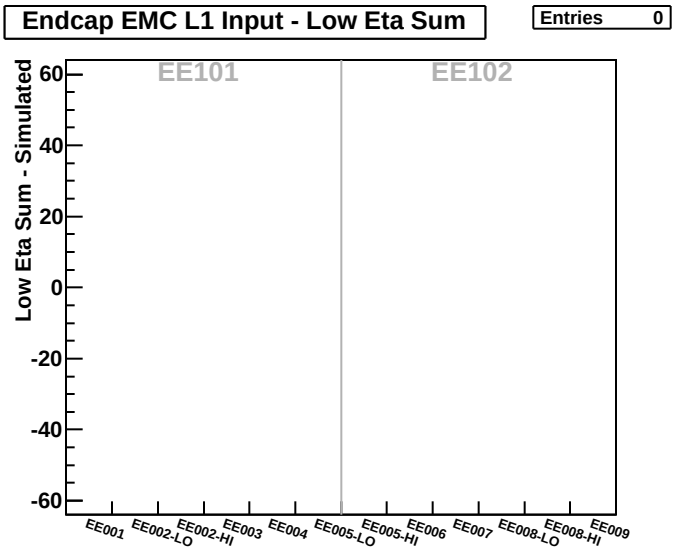

Barrel EMC L1 Input - High Eta Sum
Entries 9735408
High Eta Sum
BC101 BC102 BC103 BC104 BC105 BC106
DSM Input Channel

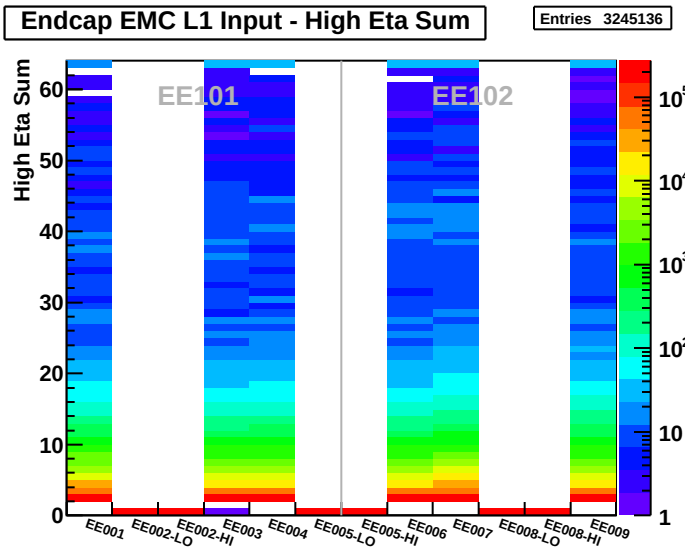

Barrel EMC L1 Input - High Eta Sum
Entries 0
High Eta Sum - Simulated
BC101 BC102 BC103 BC104 BC105 BC106
DSM Input Channel

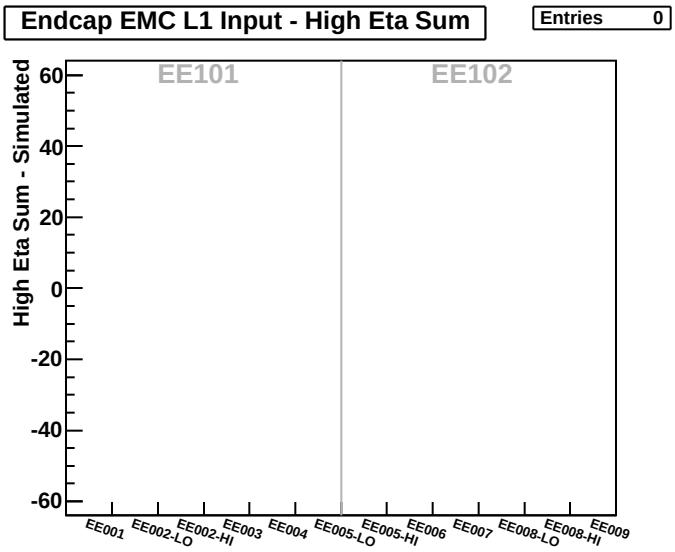

Barrel EMC L1 Input - High Tower Bits
Entries 9735408
High Tower Bits
BC101 BC102 BC103 BC104 BC105 BC106
DSM Input Channel

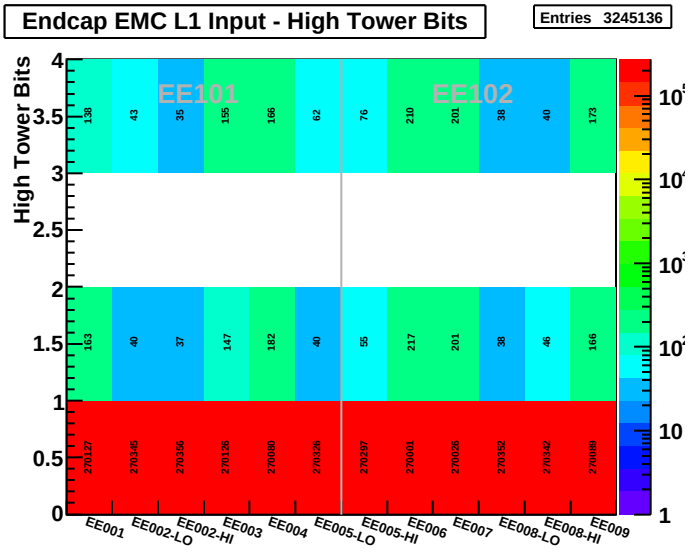

Barrel EMC L1 Input - High Tower Bits
Entries 0
High Tower Bits - Simulated
BC101 BC102 BC103 BC104 BC105 BC106
DSM Input Channel

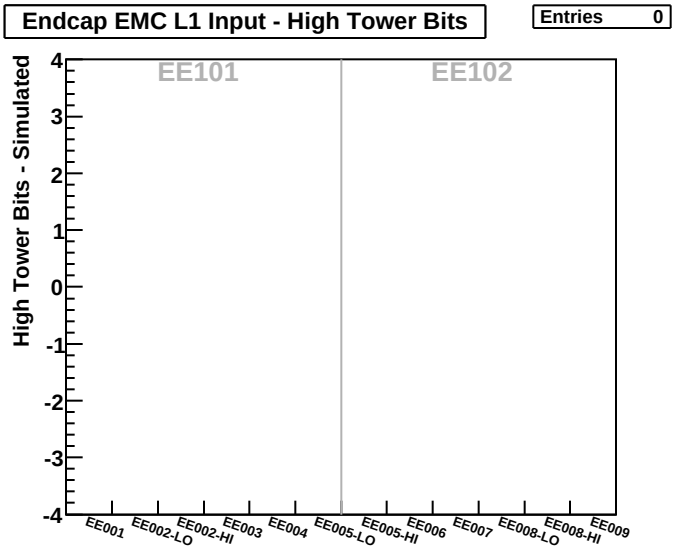

Endcap EMC L1 Input - Low Eta Sum
Entries 3245136
Low Eta Sum
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

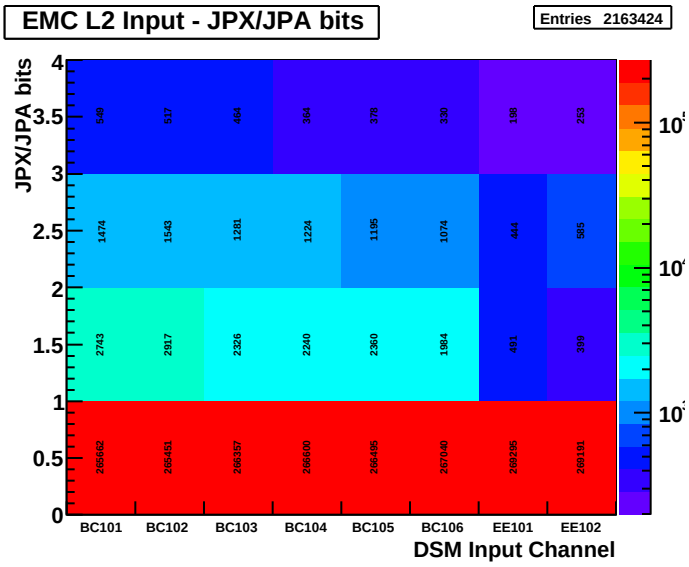

Endcap EMC L1 Input - Low Eta Sum
Entries 0
Low Eta Sum - Simulated
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

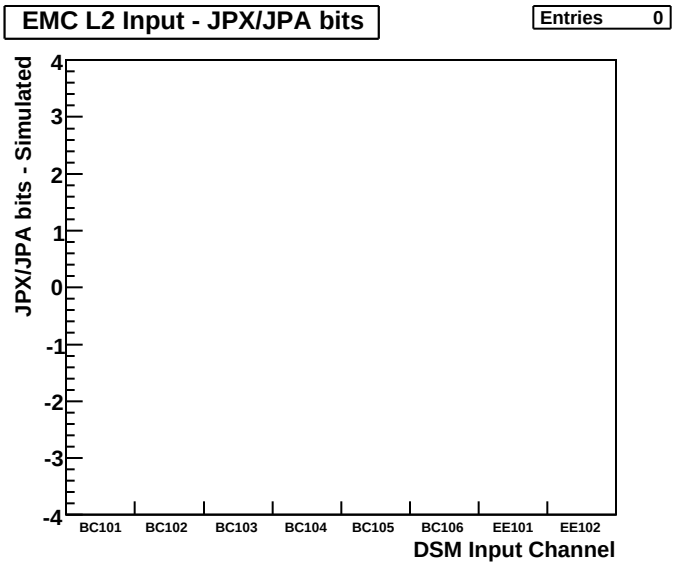

Endcap EMC L1 Input - High Eta Sum
Entries 3245136
High Eta Sum
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

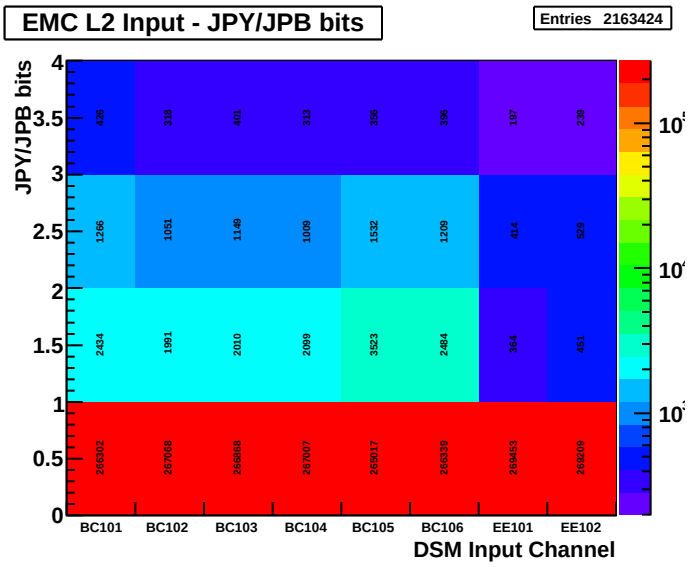

Endcap EMC L1 Input - High Eta Sum
Entries 0
High Eta Sum - Simulated
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

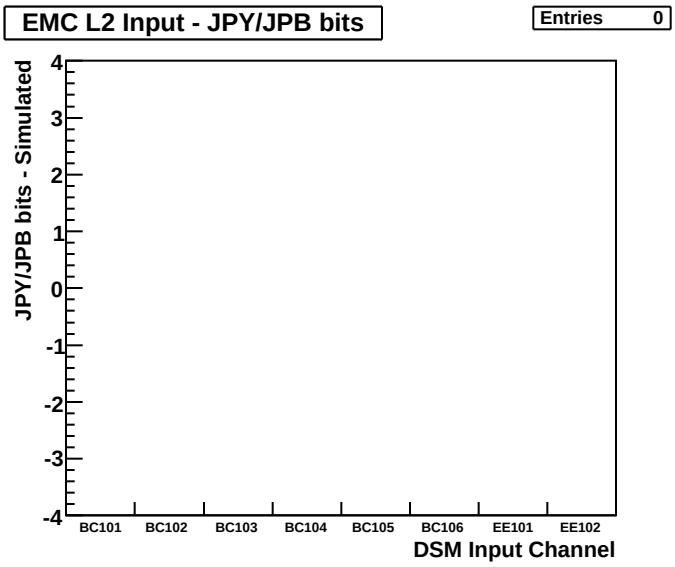

Endcap EMC L1 Input - High Tower Bits
Entries 3245136
High Tower Bits
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

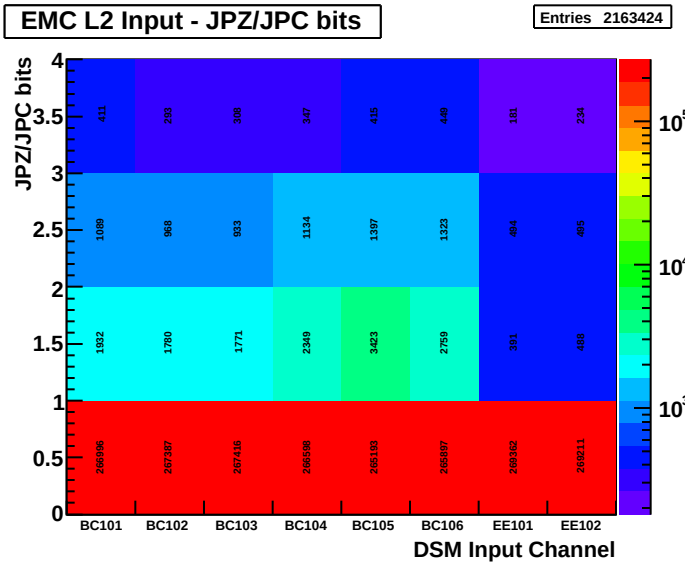

Endcap EMC L1 Input - High Tower Bits
Entries 0
High Tower Bits - Simulated
EE101
EE102
EE001 EE002-LO EE002-HI EE003 EE004 EE005-LO EE005-HI EE006 EE007 EE008-LO EE008-HI EE009

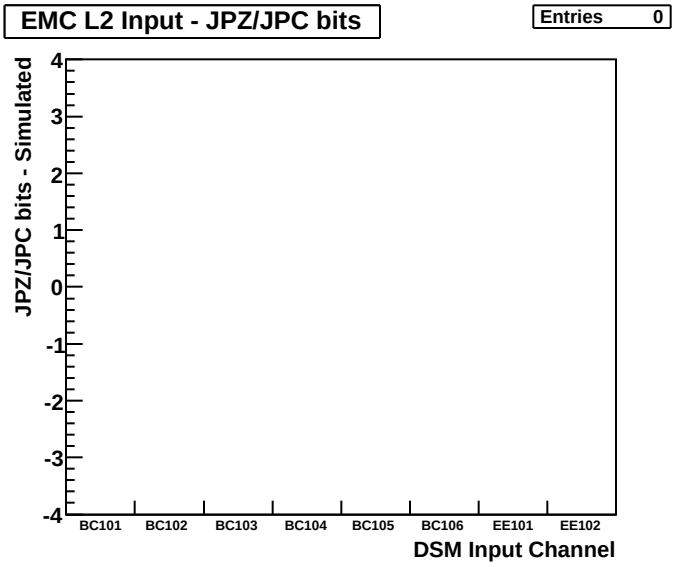

EMC L2 Input - JPX/JPA bits
Entries 2163424
JPX/JPA bits
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102
549 537 464 364 378 330 198 253
1474 1543 1281 1224 1195 1074 444 585
2743 2917 2326 2240 2360 1984 491 399
265662 265451 266357 266600 266495 267040 269295 269101

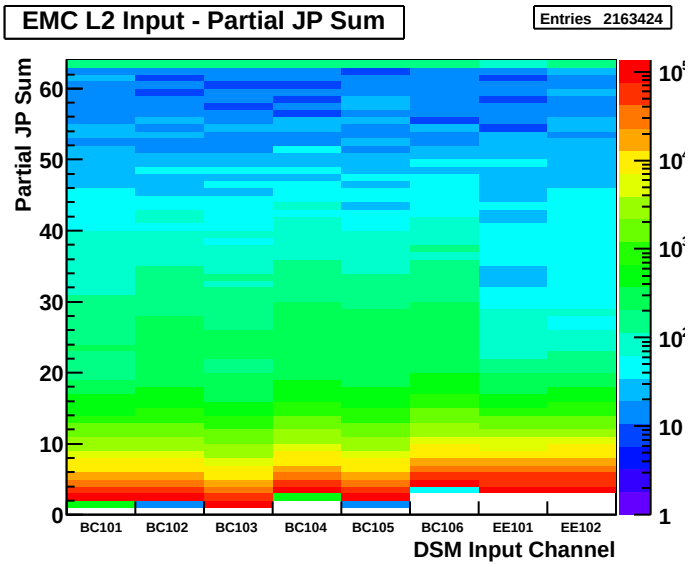

EMC L2 Input - JPX/JPA bits
Entries 0
JPX/JPA bits - Simulated
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

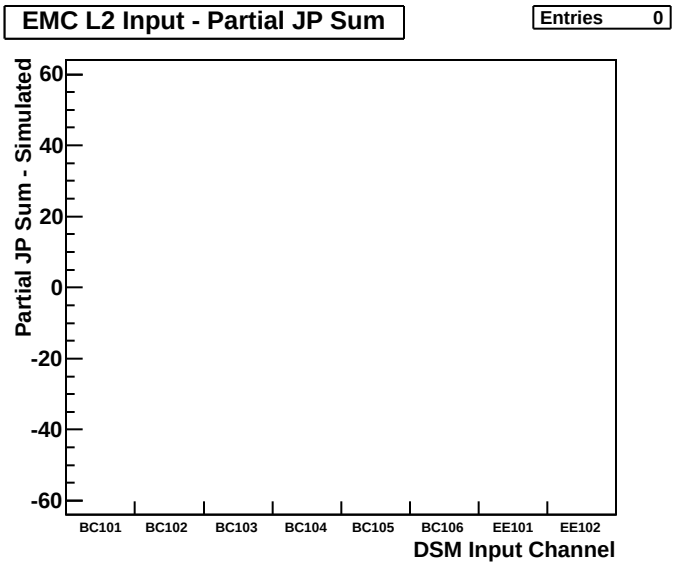

EMC L2 Input - JPY/JPB bits
Entries 2163424
JPY/JPB bits
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102
426 318 401 313 356 396 197 239
1266 1051 1149 1009 1532 1209 414 529
2434 1991 2010 2099 3523 2484 364 451
266302 267068 266868 267007 265017 266339 269453 269209

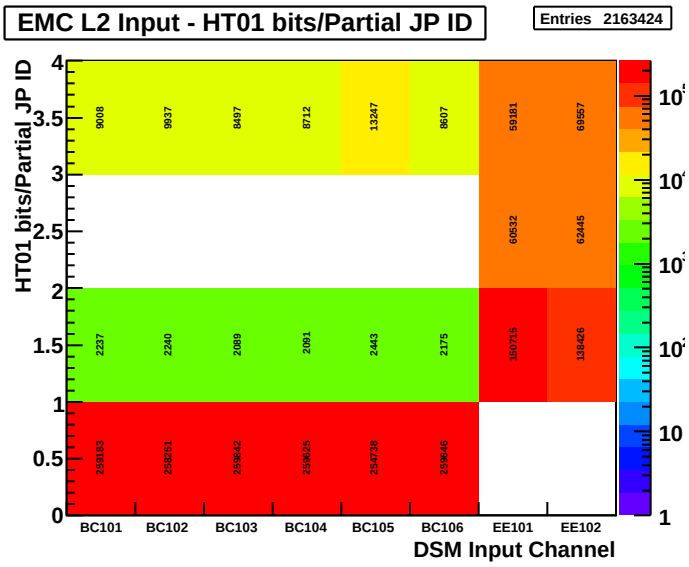

EMC L2 Input - JPY/JPB bits
Entries 0
JPY/JPB bits - Simulated
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

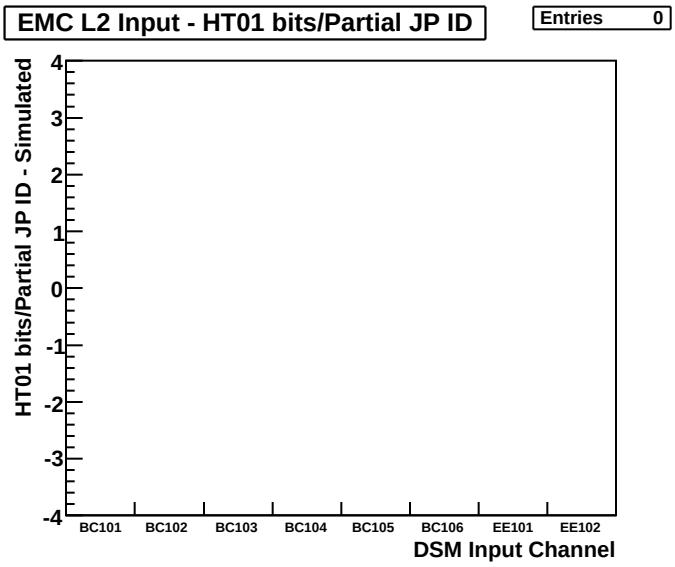

EMC L2 Input - JPZ/JPC bits
Entries 2163424
JPZ/JPC bits
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102
411 293 308 347 415 449 181 234
1089 968 933 1134 1397 1323 494 495
1932 1780 1771 2349 3423 2759 391 438
266996 267307 267416 266598 265193 265897 269362 269211

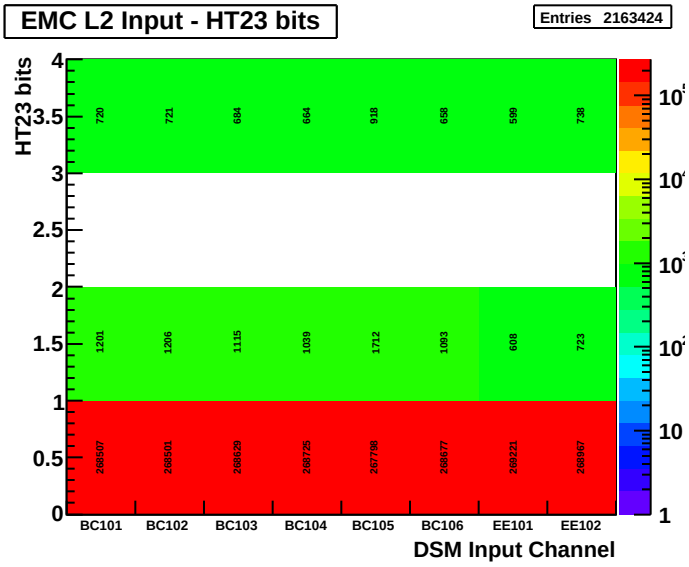

EMC L2 Input - JPZ/JPC bits
Entries 0
JPZ/JPC bits - Simulated
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

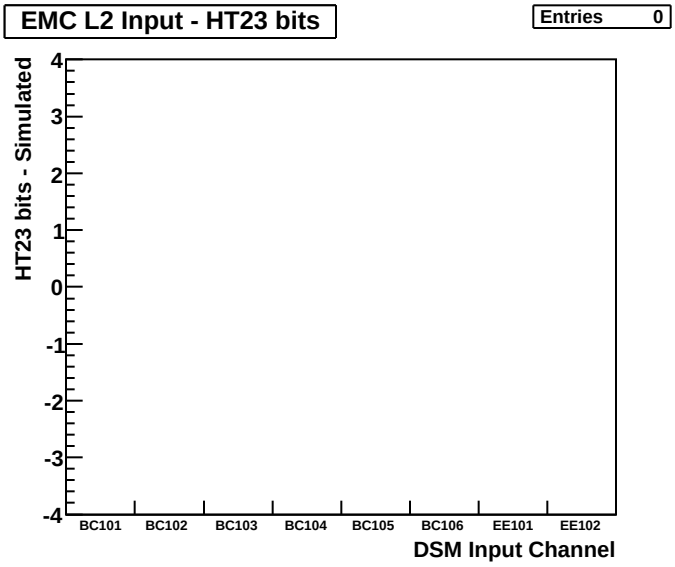

EMC L2 Input - Partial JP Sum
Entries 2163424
Partial JP Sum
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

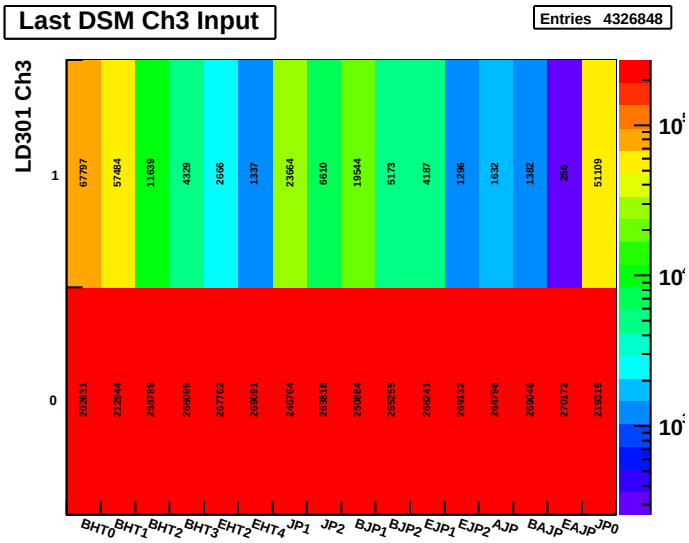

EMC L2 Input - Partial JP Sum
Entries 0
Partial JP Sum - Simulated
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

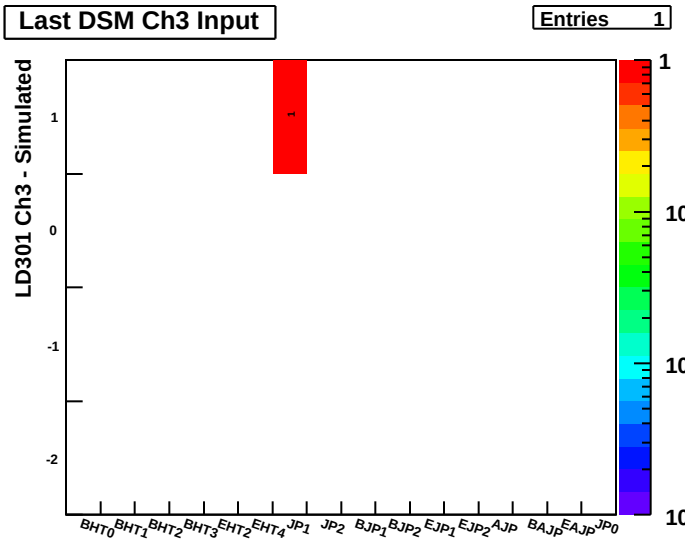

EMC L2 Input - HT01 bits/Partial JP ID
Entries 2163424
HT01 bits/Partial JP ID
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

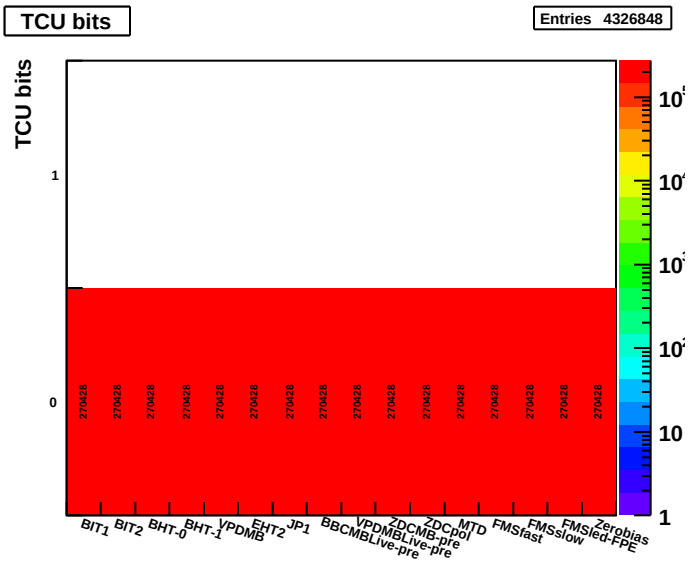

EMC L2 Input - HT01 bits/Partial JP ID
Entries 0
HT01 bits/Partial JP ID - Simulated
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

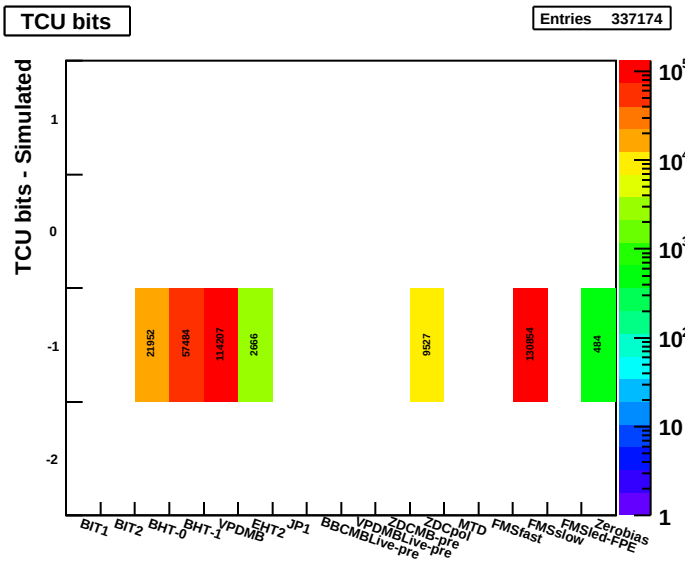

EMC L2 Input - HT23 bits
Entries 2163424
HT23 bits
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

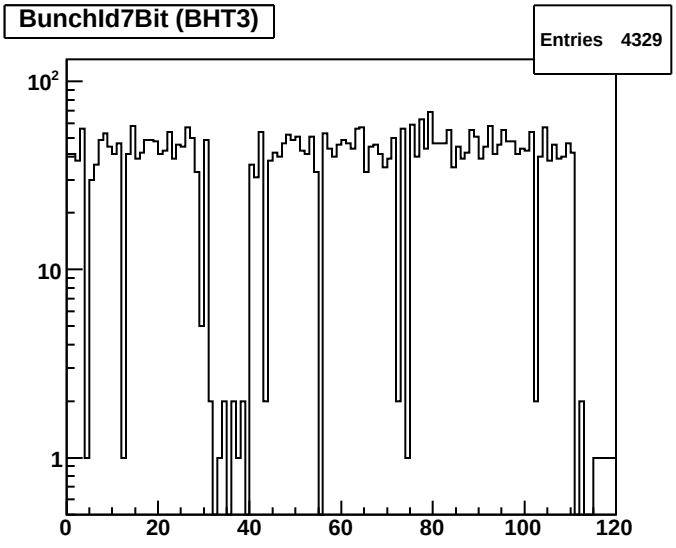

EMC L2 Input - HT23 bits
Entries 0
HT23 bits - Simulated
DSM Input Channel
BC101 BC102 BC103 BC104 BC105 BC106 EE101 EE102

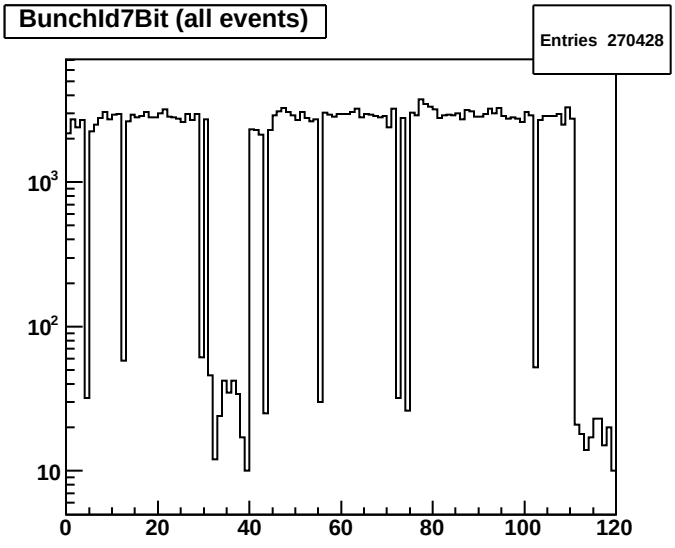

Last DSM Ch3 Input
Entries 4326848
LD301 Ch3
67797 57484 11639 4329 2666 1337 23664 6610 19544 5173 4187 1296 1632 1382 256 51109
202631 212944 258789 266099 267762 269091 246764 263818 250884 265265 266241 269132 268796 269046 270172 219319
BHT0 BHT1 BHT2 BHT3 EHT2 EHT4 JP1 JP2 BJP1 BJP2 EJP1 EJP2 AJP BAJP EAJP JP0

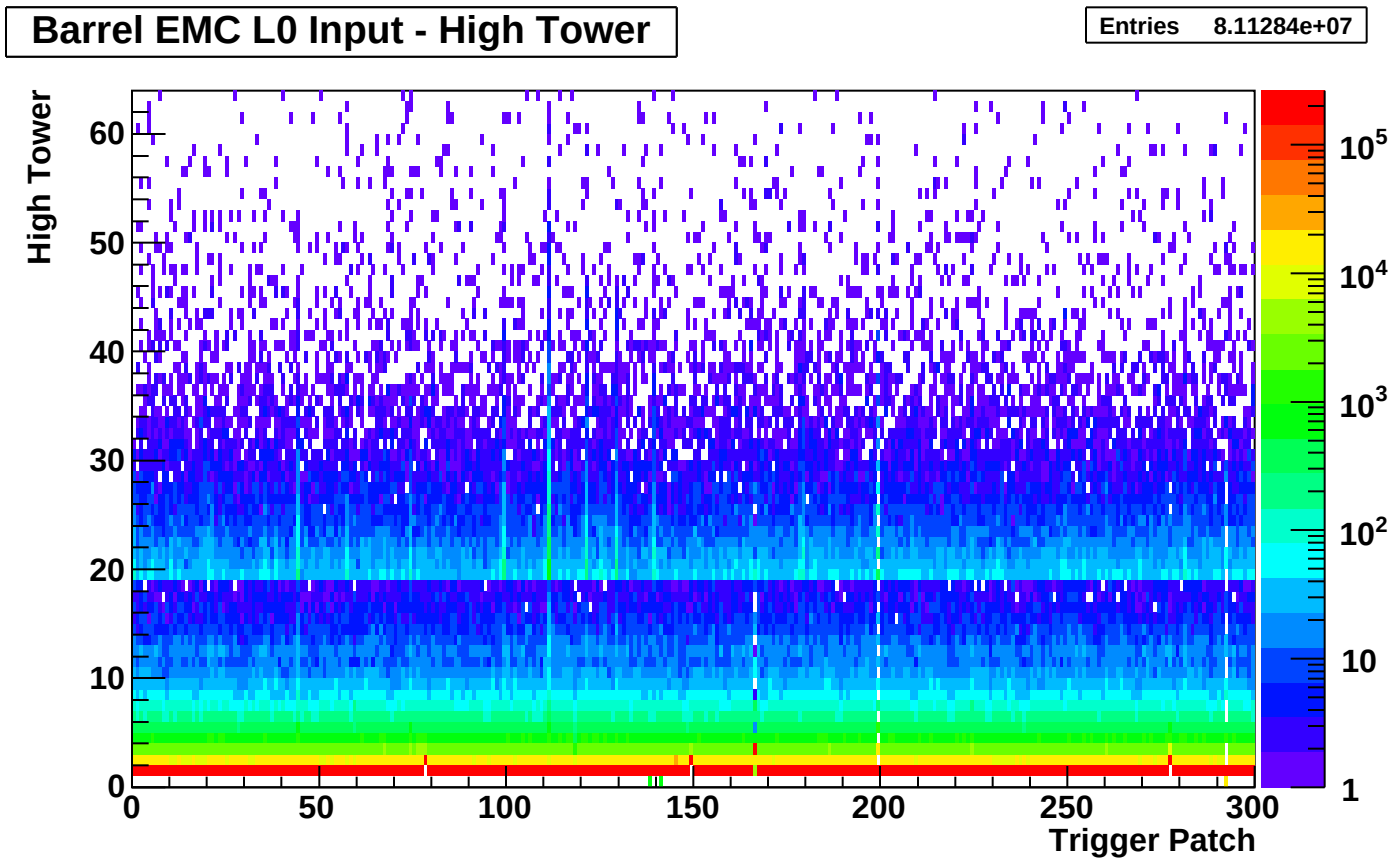

Last DSM Ch3 Input
Entries 1
LD301 Ch3 - Simulated
1
BHT0 BHT1 BHT2 BHT3 EHT2 EHT4 JP1 JP2 BJP1 BJP2 EJP1 EJP2 AJP BAJP EAJP JP0

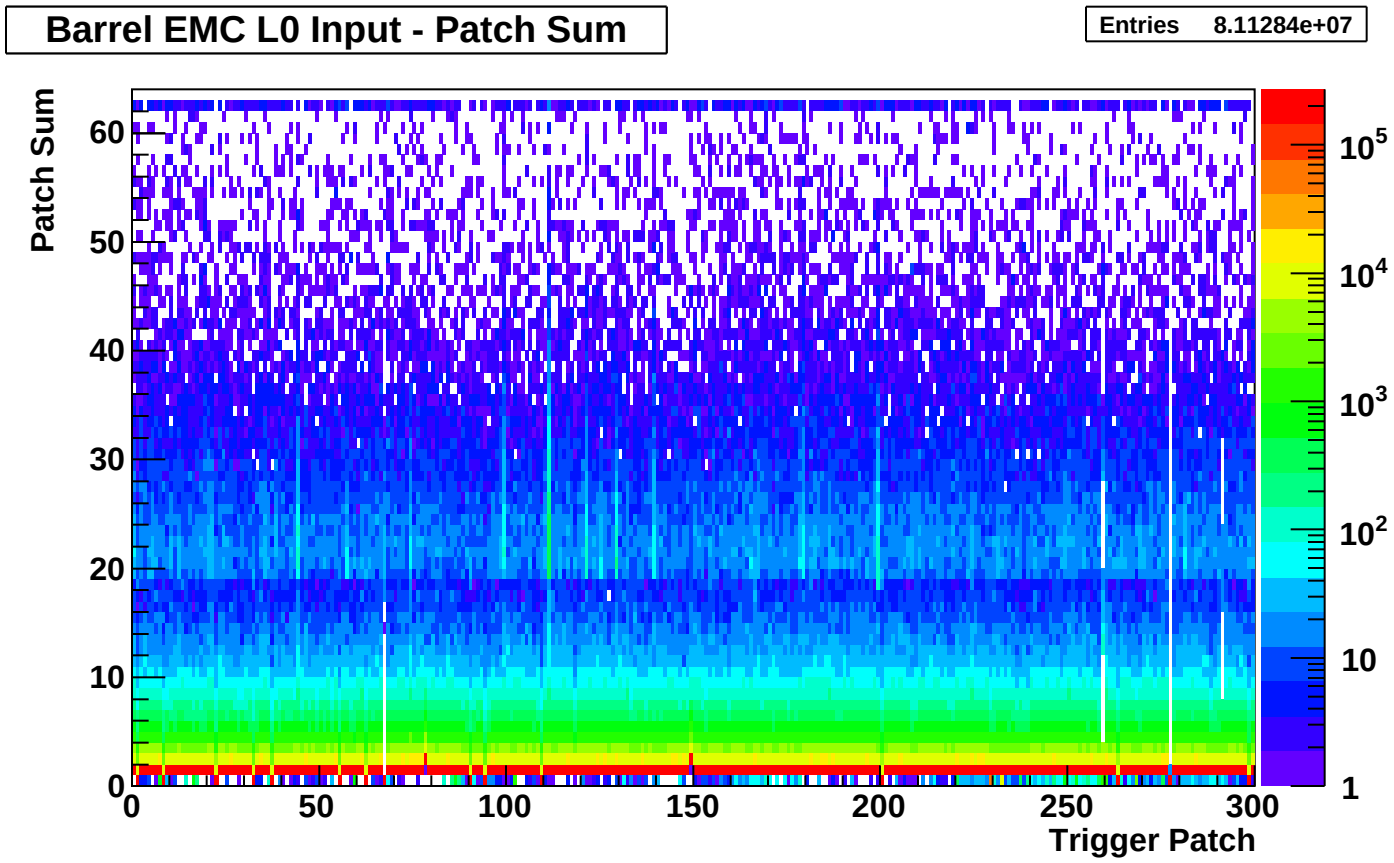

TCU bits
Entries 4326848
TCU bits
270428 270428 270428 270428 270428 270428 270428 270428 270428 270428 270428 270428 270428 270428 270428 270428
BIT1 BIT2 BHT-0 BHT-1 VPDMB EHT2 JP1 BBCMBLive-pre VPDMBLive-pre ZDCMB-pre ZDCpol MTD FMSfast FMSslow FMSled-FPE Zerobias

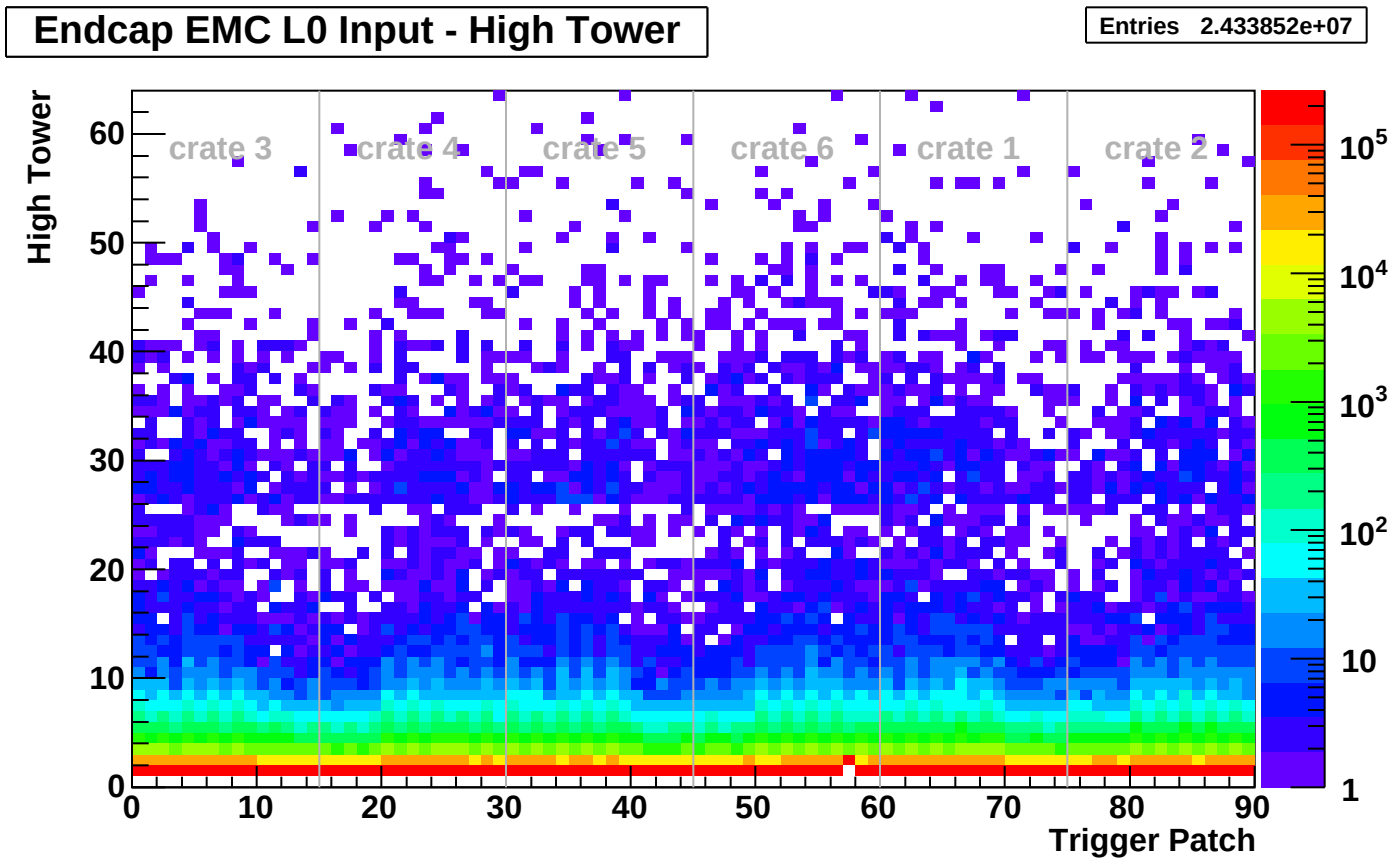

TCU bits
Entries 337174
TCU bits - Simulated
21952 57484 114207 2666 9527 130854 484
BIT1 BIT2 BHT-0 BHT-1 VPDMB EHT2 JP1 BBCMBLive-pre VPDMBLive-pre ZDCMB-pre ZDCpol MTD FMSfast FMSslow FMSled-FPE Zerobias

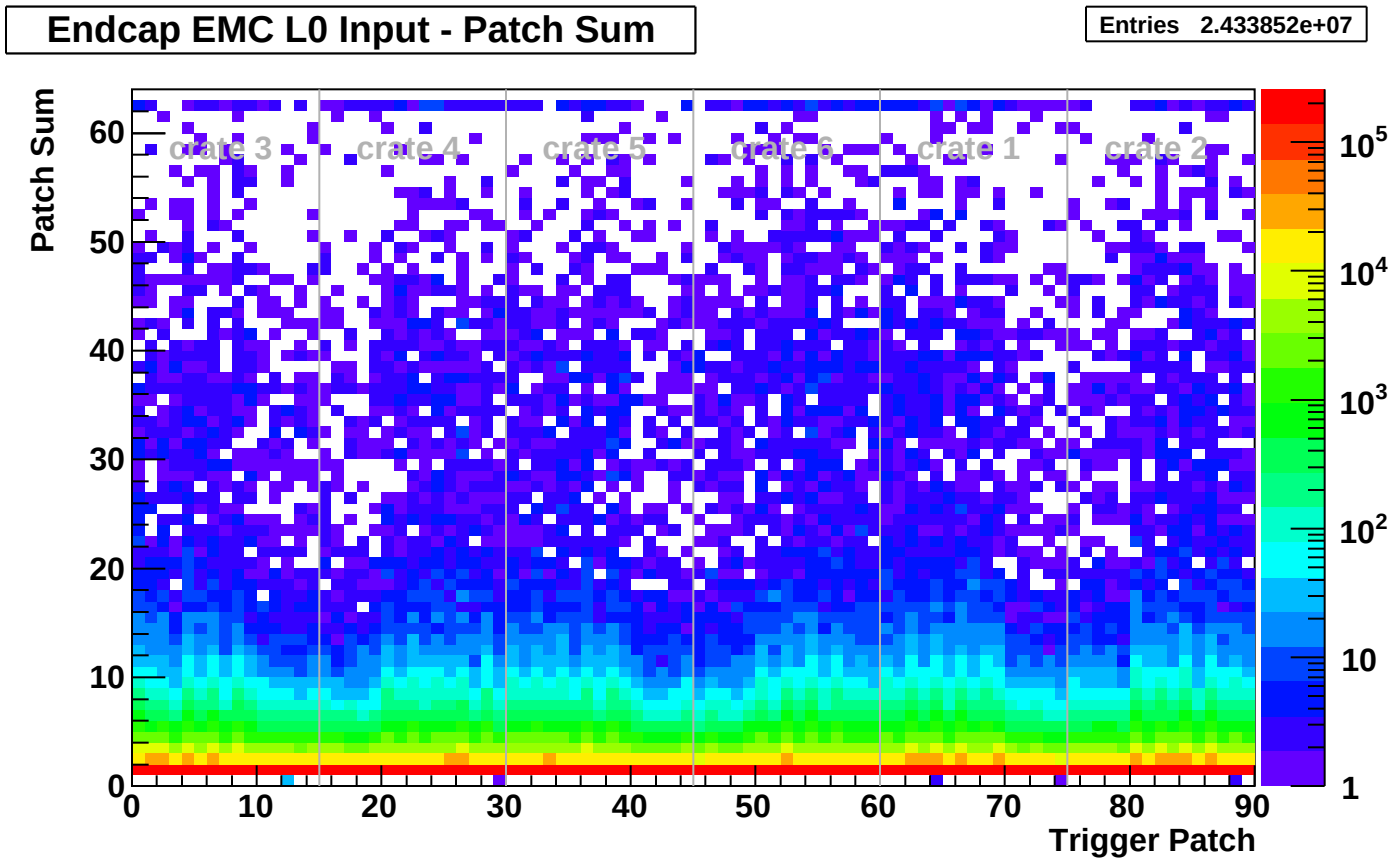

BunchId7Bit (BHT3)
Entries 4329

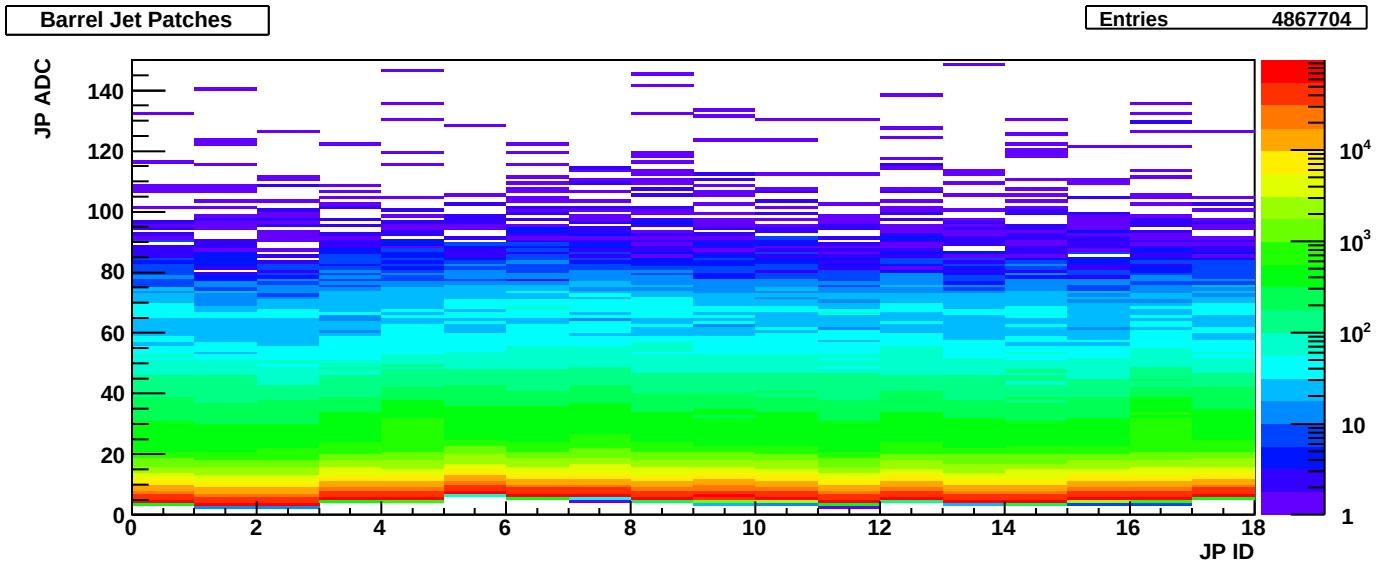

BunchId7Bit (all events)
Entries 270428

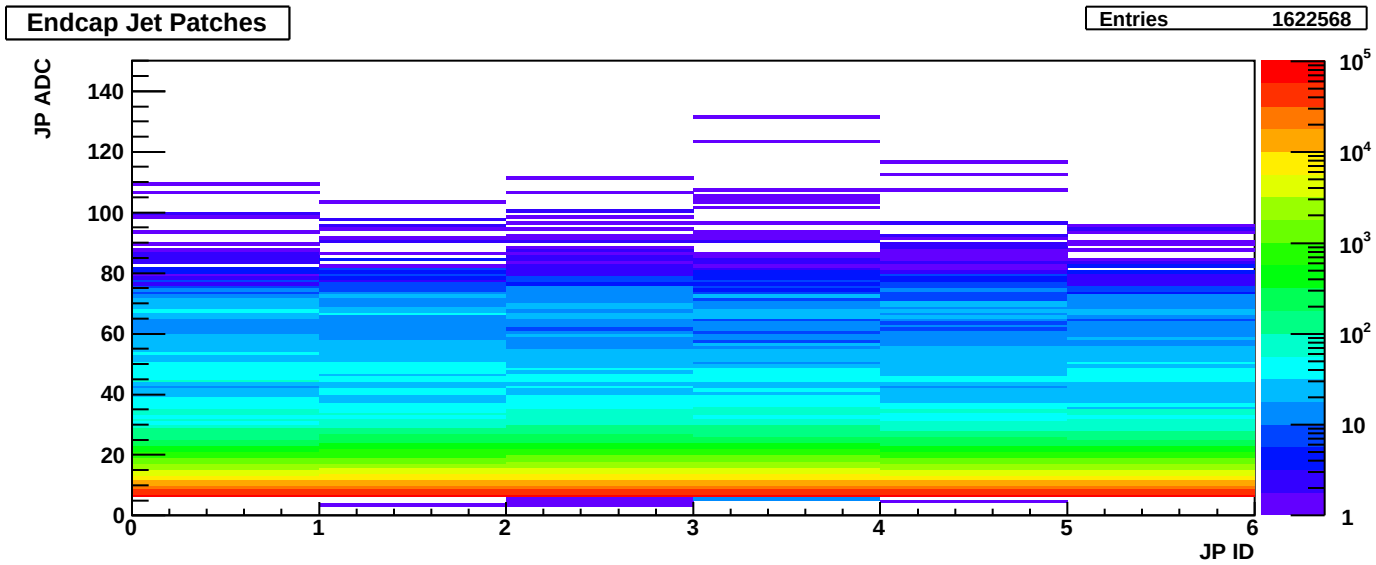

Barrel EMC L0 Input - High Tower
Entries 8.11284e+07
High Tower
Trigger Patch
0
10
20
30
40
50
60
0
50
100
150
200
250
300
1
10
10^2
10^3
10^4
10^5

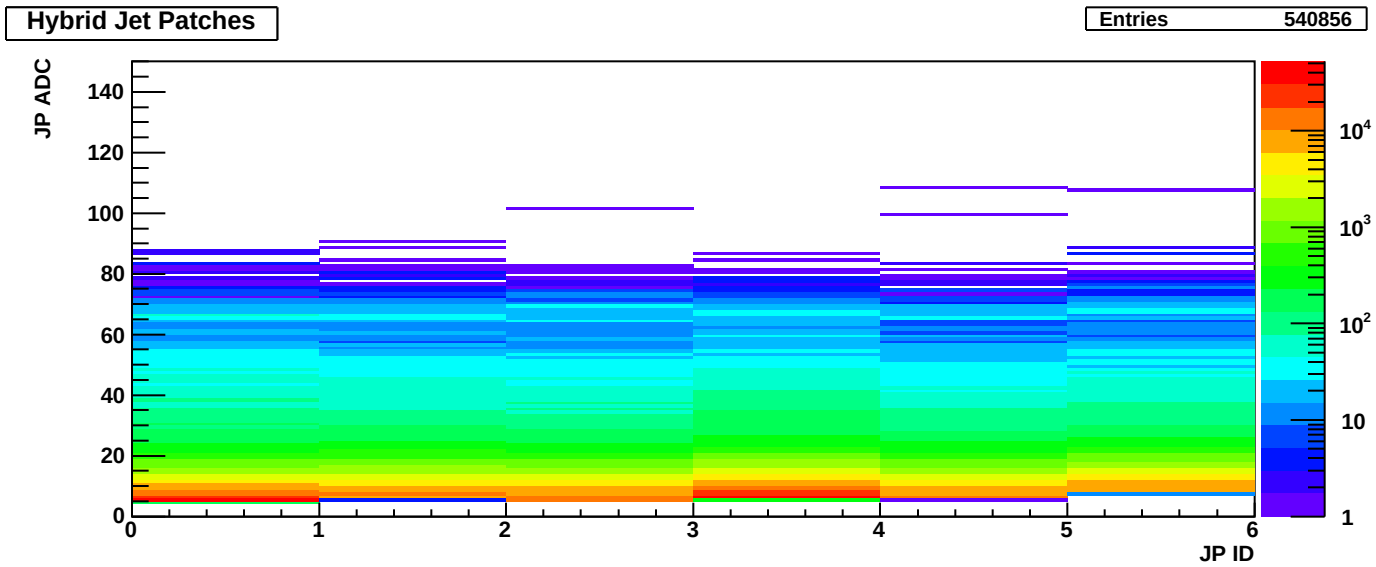

Barrel EMC L0 Input - Patch Sum
Entries 8.11284e+07
Patch Sum
Trigger Patch
0
10
20
30
40
50
60
0
50
100
150
200
250
300
1
10
10^2
10^3
10^4
10^5

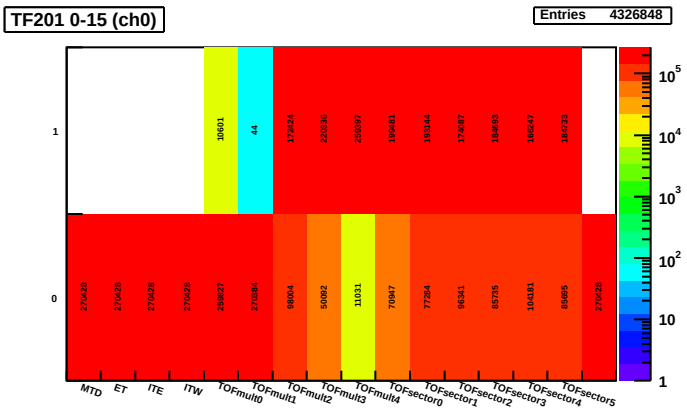

Endcap EMC L0 Input - High Tower
Entries 2.433852e+07
High Tower
crate 3
crate 4
crate 5
crate 6
crate 1
crate 2
Trigger Patch

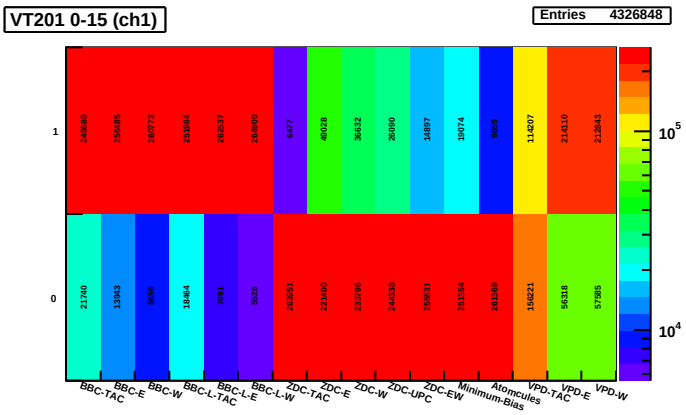

Endcap EMC L0 Input - Patch Sum
Entries 2.433852e+07
Patch Sum
crate 3
crate 4
crate 5
crate 6
crate 1
crate 2
Trigger Patch

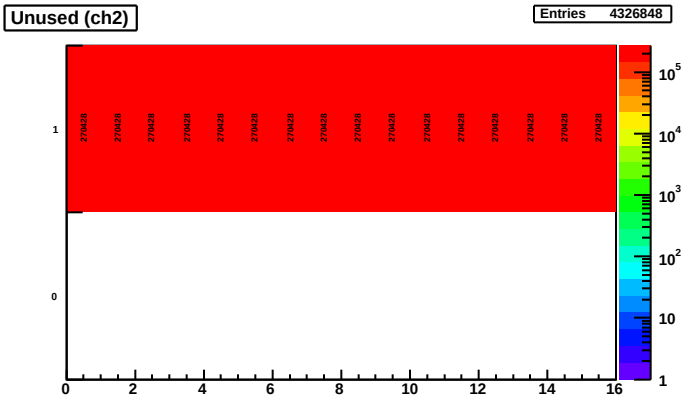

Barrel Jet Patches
Entries 4867704
JP ADC
JP ID

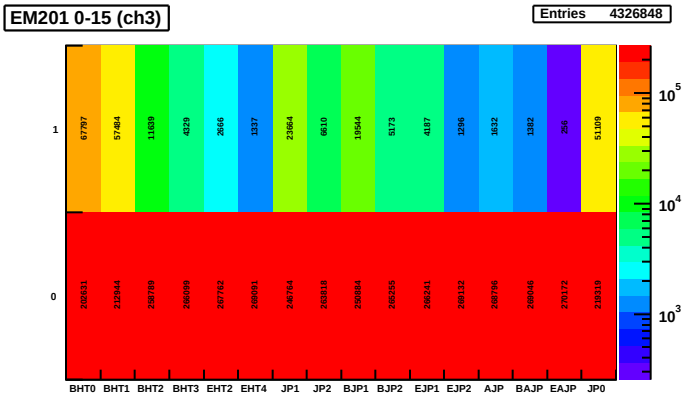

Endcap Jet Patches
Entries 1622568
JP ADC
JP ID

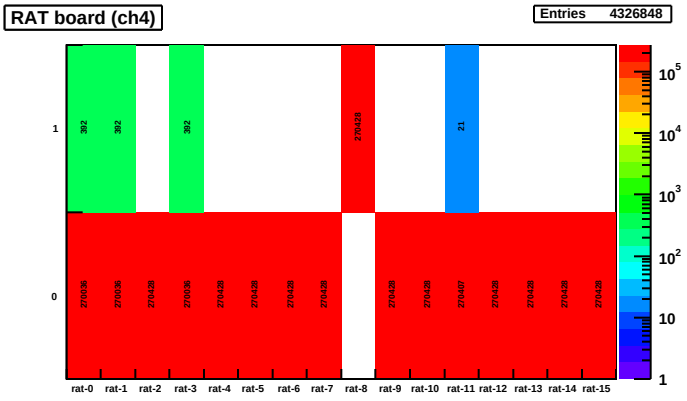

Hybrid Jet Patches
Entries 540856
JP ADC
JP ID

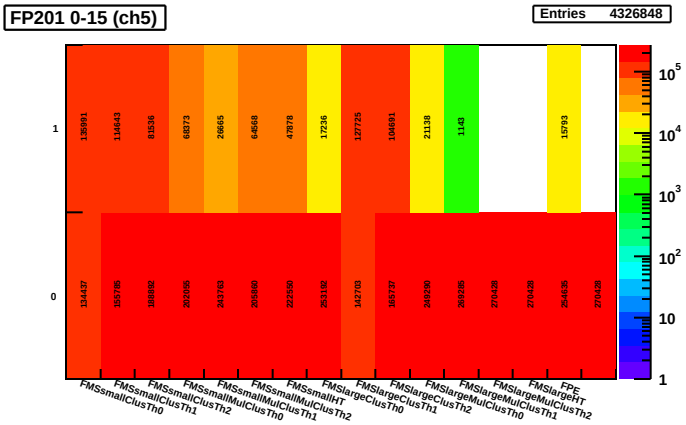

TF201 0-15 (ch0)
Entries 4326848
MTD ET ITE ITW TOFmult0 TOFmult1 TOFmult2 TOFmult3 TOFmult4 TOFsector0 TOFsector1 TOFsector2 TOFsector3 TOFsector4 TOFsector5

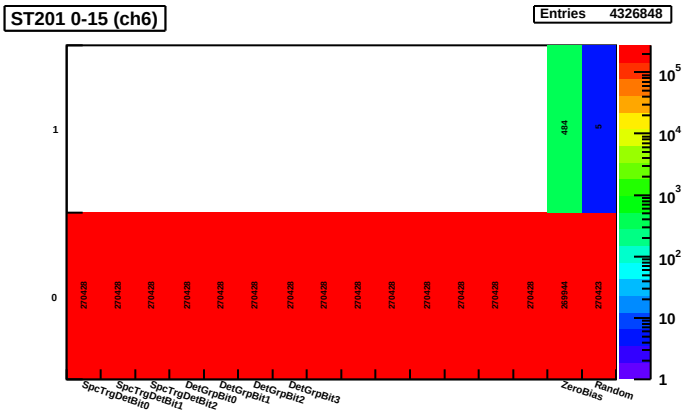

VT201 0-15 (ch1)
Entries 4326848
BBC-TAC BBC-E BBC-W BBC-L-TAC BBC-L-E BBC-L-W ZDC-TAC ZDC-E ZDC-W ZDC-UPC ZDC-EW Atomcules Minimum-Bias VPD-TAC VPD-E VPD-W

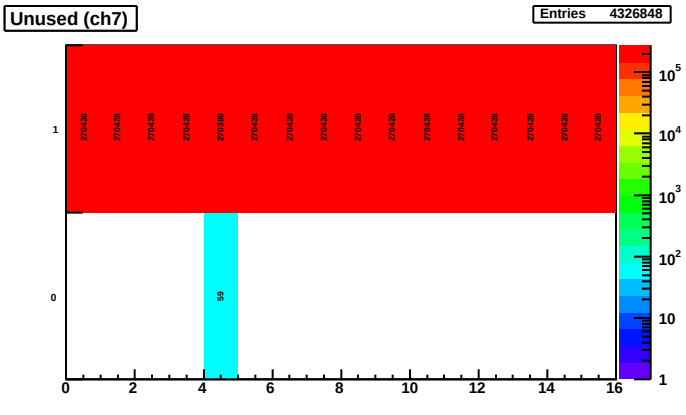

Unused (ch2)
Entries 4326848

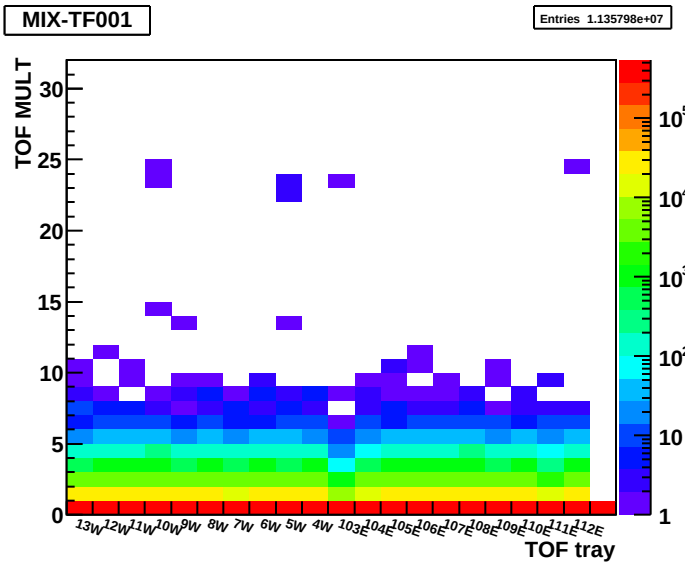

EM201 0-15 (ch3)
Entries 4326848
BHT0 BHT1 BHT2 BHT3 EHT2 EHT4 JP1 JP2 BJP1 BJP2 EJP1 EJP2 AJP BAJP EAJP JP0

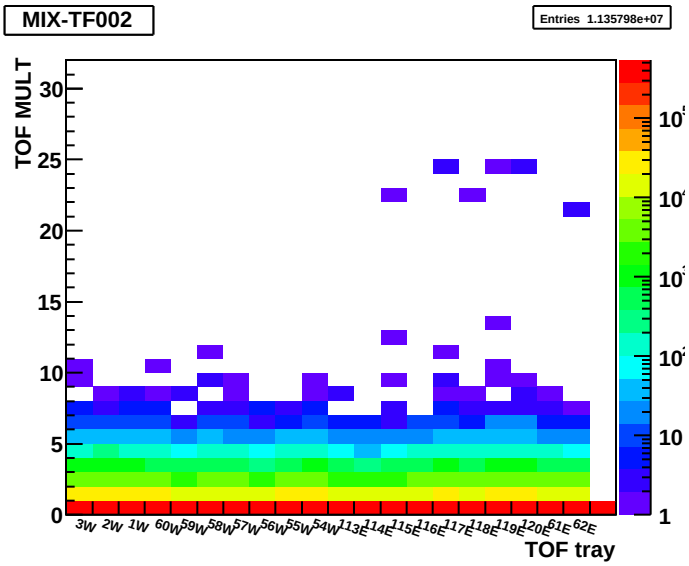

RAT board (ch4)
Entries 4326848
rat-0 rat-1 rat-2 rat-3 rat-4 rat-5 rat-6 rat-7 rat-8 rat-9 rat-10 rat-11 rat-12 rat-13 rat-14 rat-15

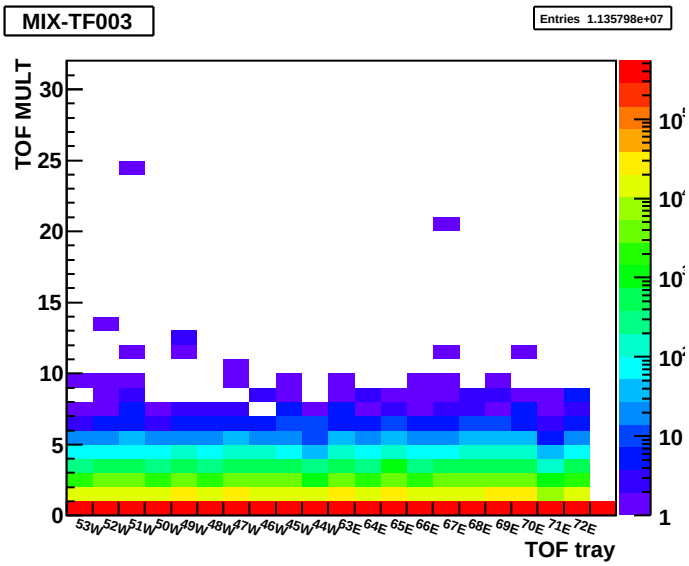

FP201 0-15 (ch5)
Entries 4326848
FMSsmallClusTh0 FMSsmallClusTh1 FMSsmallClusTh2 FMSsmallMulClusTh0 FMSsmallMulClusTh1 FMSsmallMulClusTh2 FMSsmallHT FMSlargeClusTh0 FMSlargeClusTh1 FMSlargeClusTh2 FMSlargeMulClusTh0 FMSlargeMulClusTh1 FMSlargeMulClusTh2 FMSlargeHT FPE

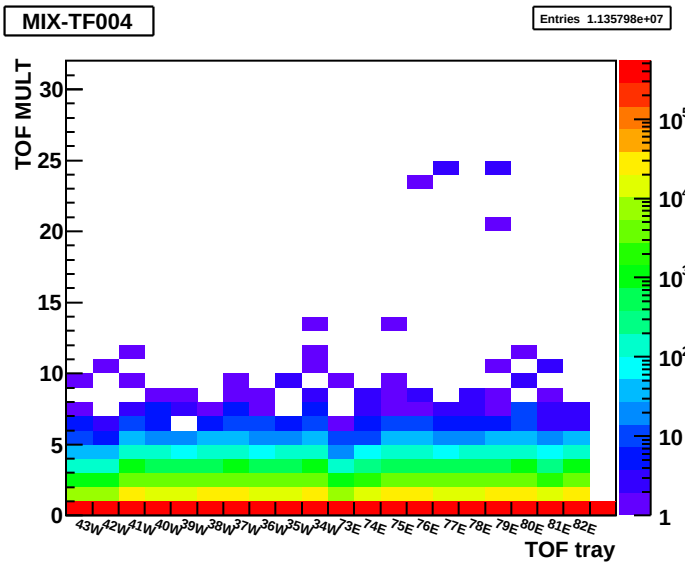

ST201 0-15 (ch6)
Entries 4326848
SpcTrgDetBit0 SpcTrgDetBit1 SpcTrgDetBit2 DetGrpBit0 DetGrpBit1 DetGrpBit2 DetGrpBit3 ZeroBias Random

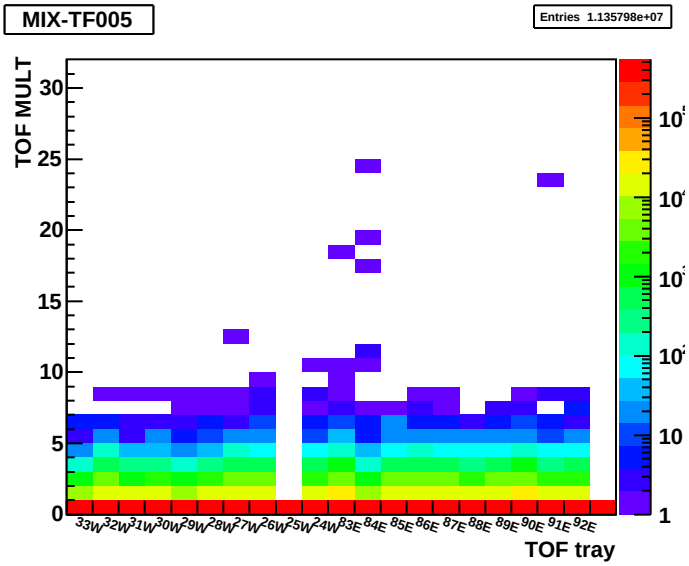

Unused (ch7)
Entries 4326848

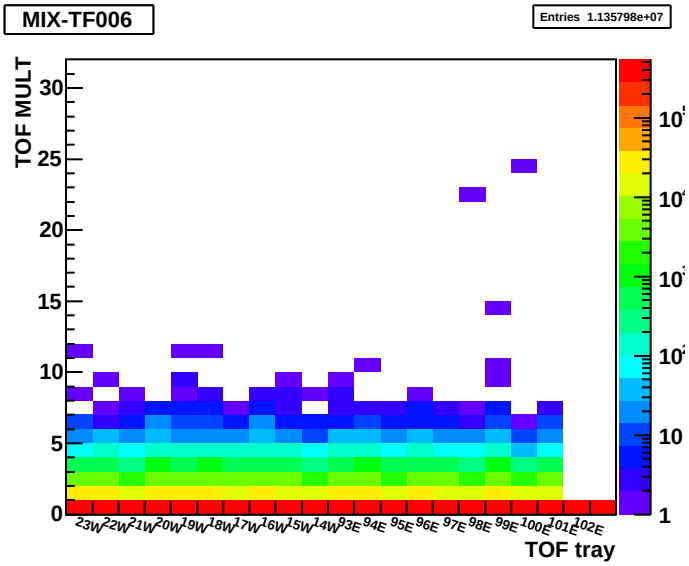

MIX-TF001
Entries 1.135798e+07
TOF MULT
TOF tray

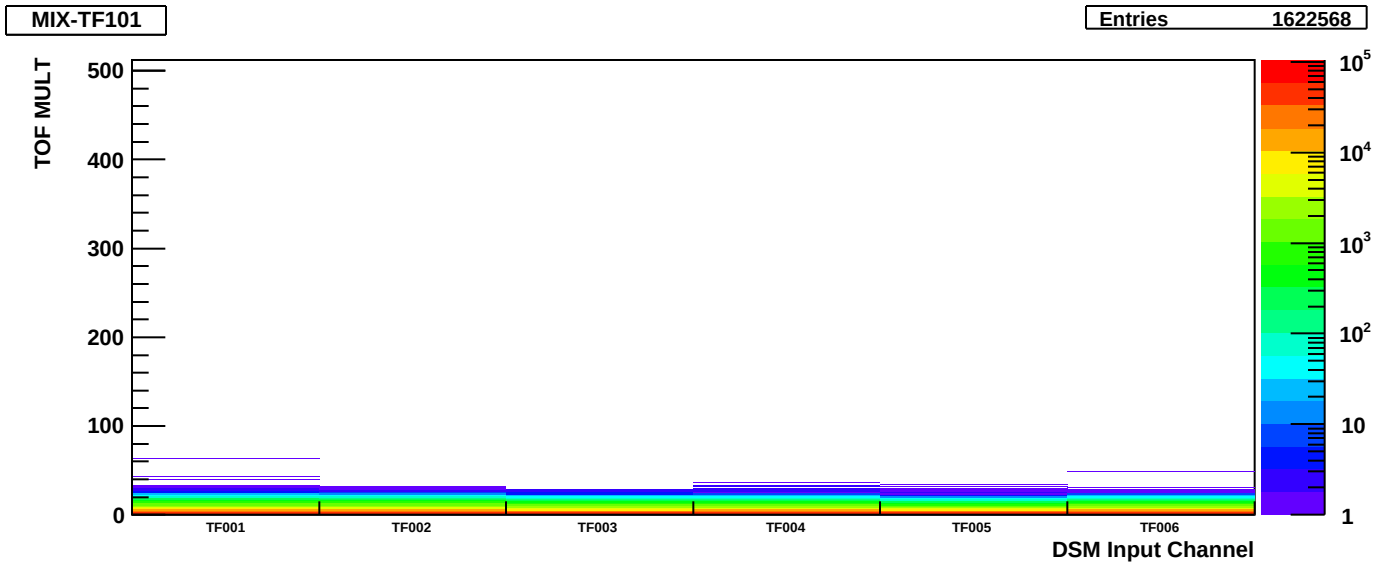

MIX-TF002
Entries 1.135798e+07
TOF MULT
TOF tray

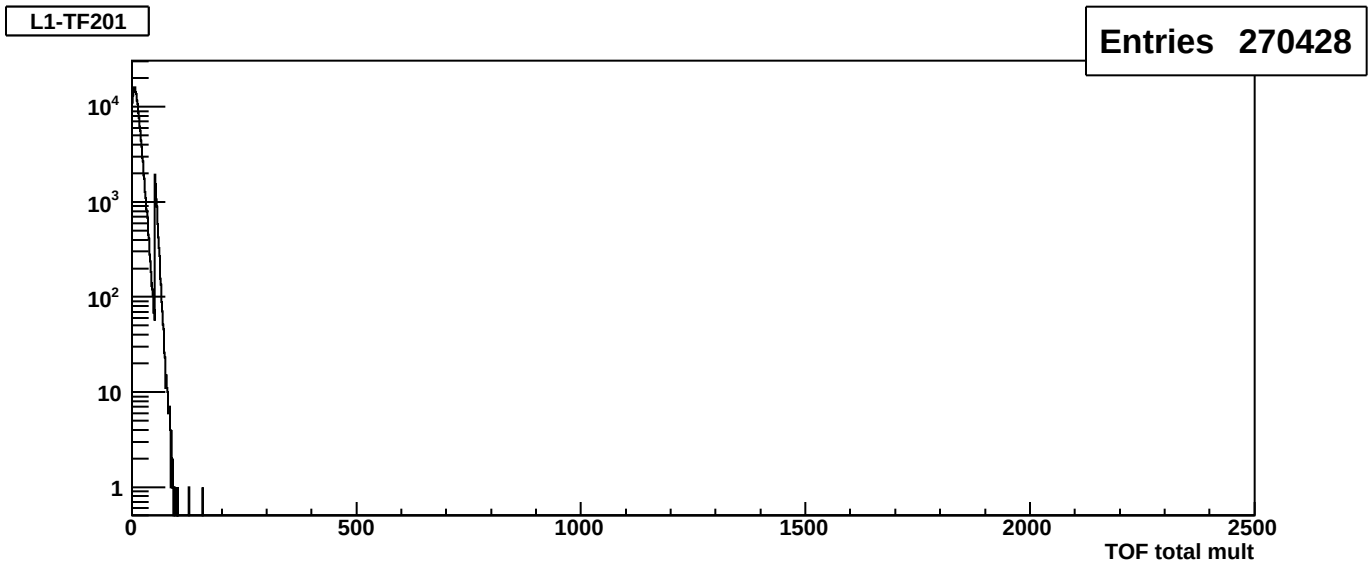

MIX-TF003
Entries 1.135798e+07
TOF MULT
TOF tray

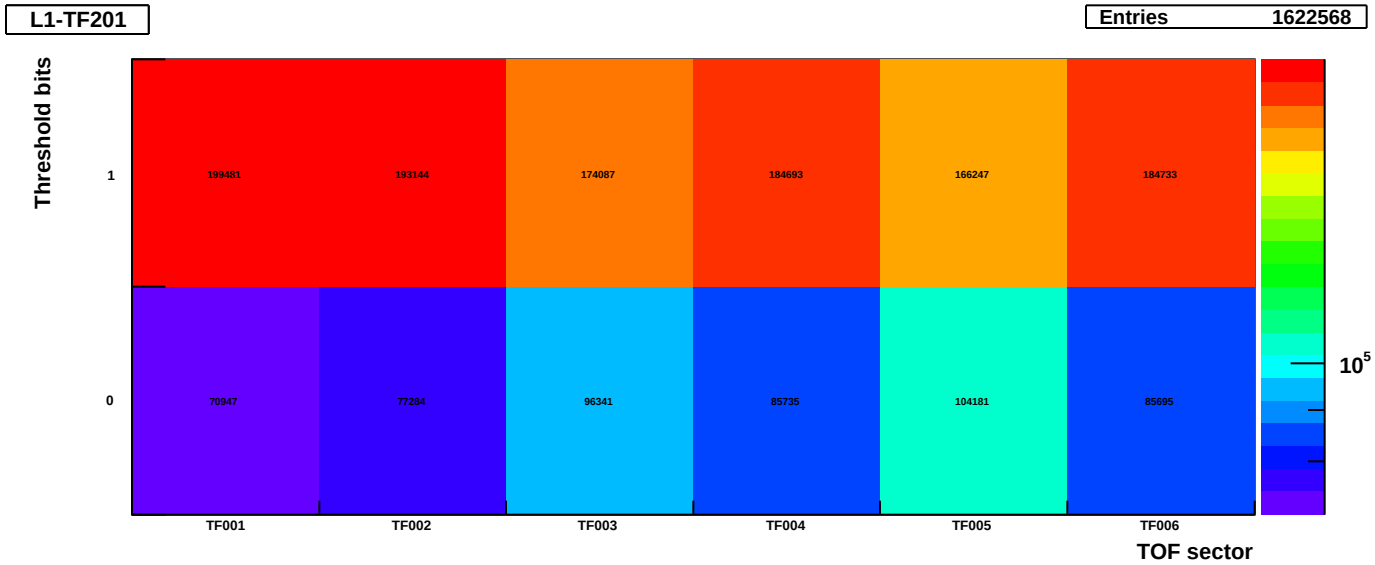

MIX-TF004
Entries 1.135798e+07
TOF MULT
TOF tray

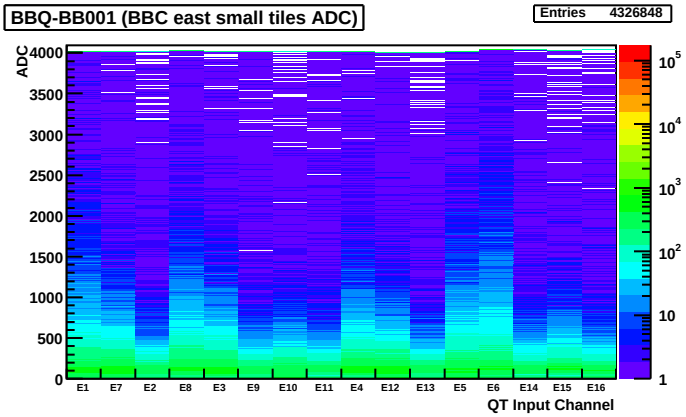

MIX-TF005
Entries 1.135798e+07
TOF MULT
TOF tray

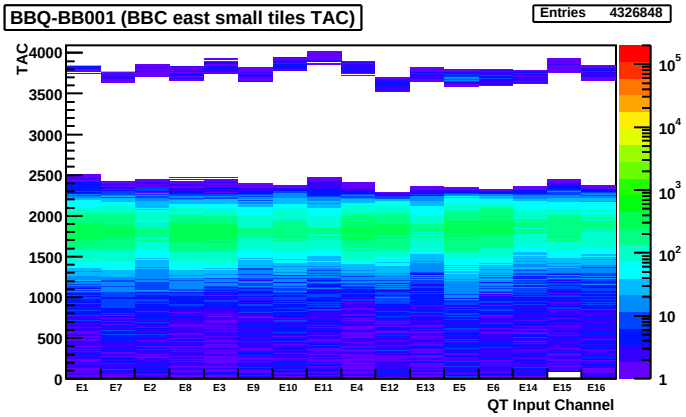

MIX-TF006
Entries 1.135798e+07
TOF MULT
TOF tray

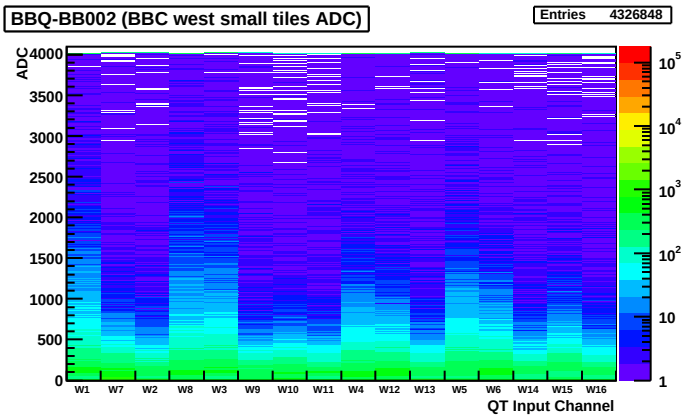

MIX-TF101
Entries 1622568
TOF MULT
500
400
300
200
100
0
TF001
TF002
TF003
TF004
TF005
TF006
DSM Input Channel
10^5
10^4
10^3
10^2
10
1

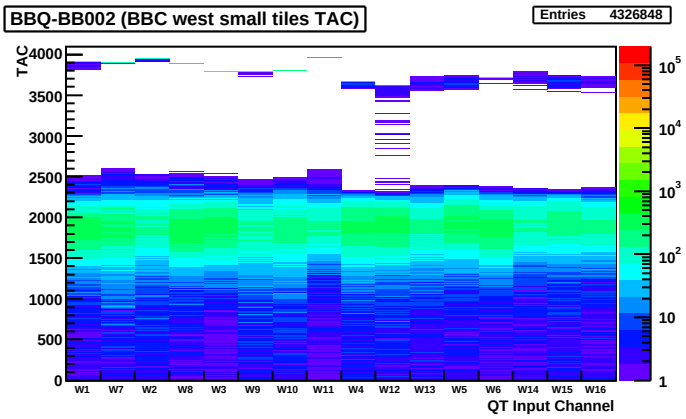

L1-TF201
Entries 270428
10^4
10^3
10^2
10
1
0
500
1000
1500
2000
2500
TOF total mult

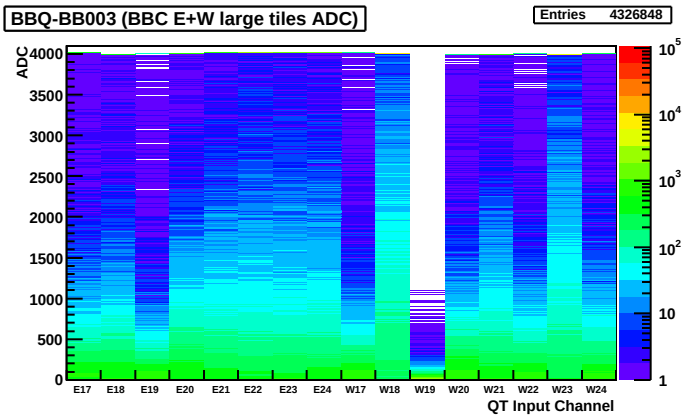

L1-TF201
Entries 1622568
Threshold bits
1
0
199481
193144
174087
184693
166247
184733
70947
77284
96341
85735
104181
85695
TF001
TF002
TF003
TF004
TF005
TF006
TOF sector
10^5

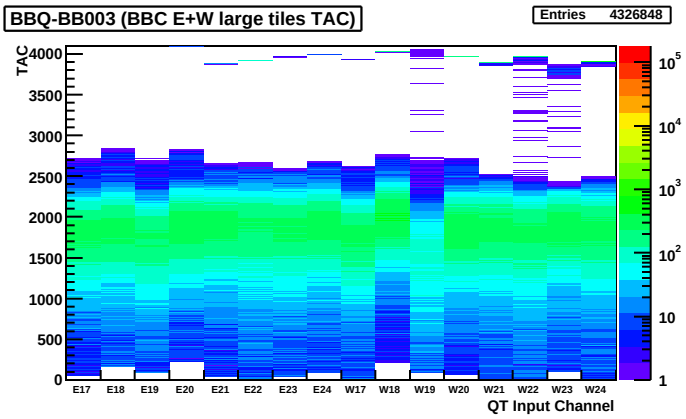

BBQ-BB001 (BBC east small tiles ADC)
Entries 4326848
ADC
QT Input Channel

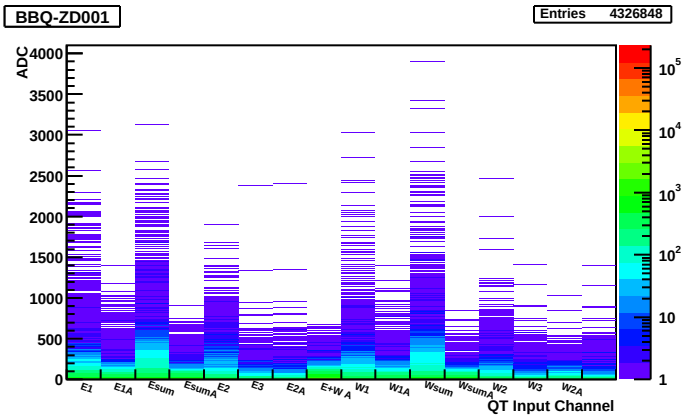

BBQ-BB001 (BBC east small tiles TAC)
Entries 4326848
TAC
QT Input Channel

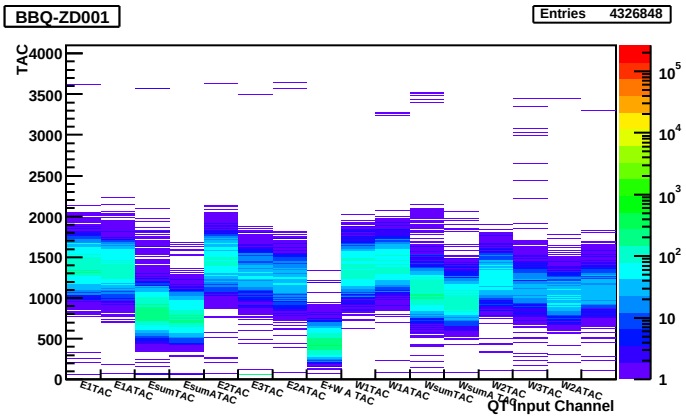

BBQ-BB002 (BBC west small tiles ADC)
Entries 4326848
ADC
QT Input Channel

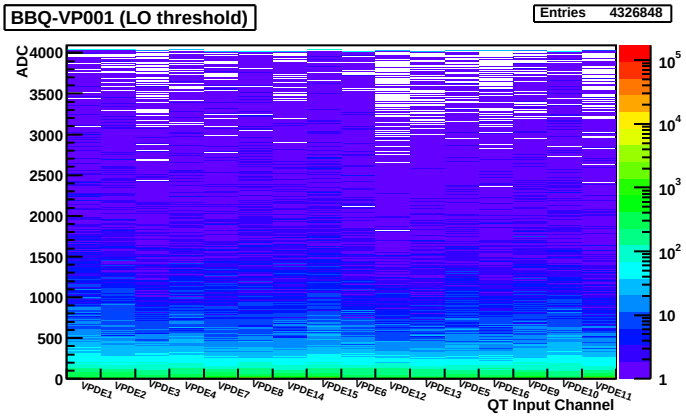

BBQ-BB002 (BBC west small tiles TAC)
Entries 4326848
TAC
QT Input Channel

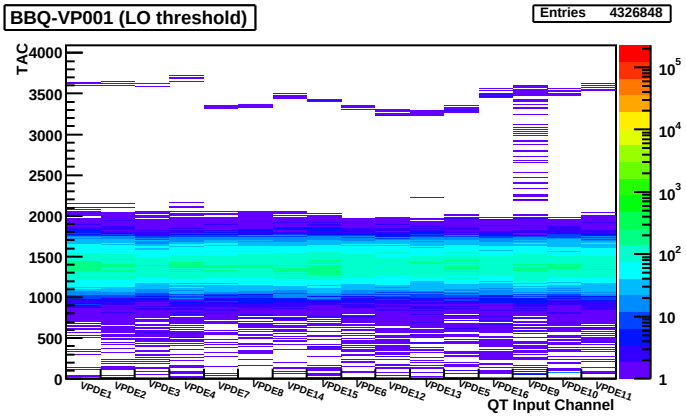

BBQ-BB003 (BBC E+W large tiles ADC)
Entries 4326848
ADC
QT Input Channel

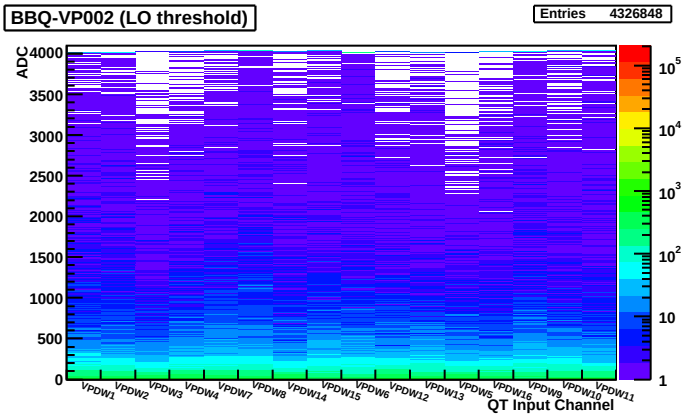

BBQ-BB003 (BBC E+W large tiles TAC)
Entries 4326848
TAC
QT Input Channel

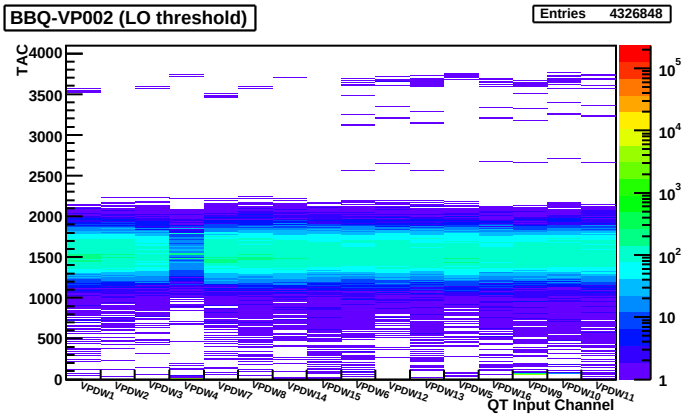

BBQ-ZD001
Entries 4326848
ADC
QT Input Channel

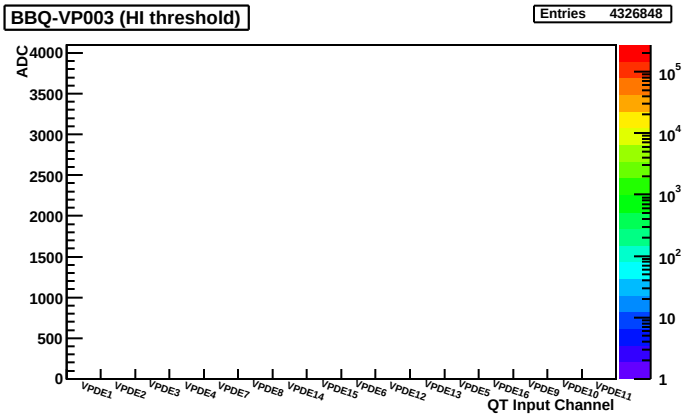

BBQ-ZD001
Entries 4326848
TAC
QT Input Channel

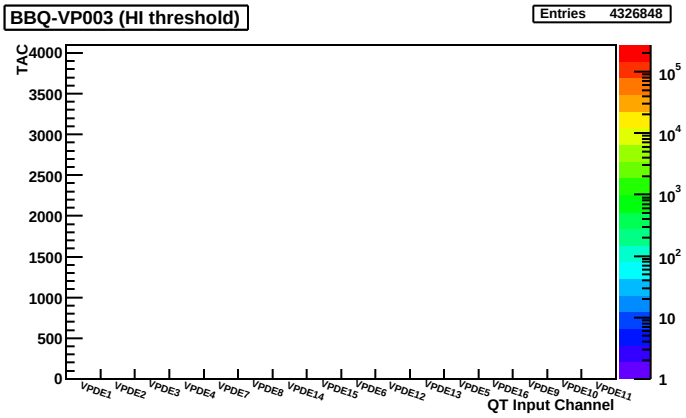

BBQ-VP001 (LO threshold)
Entries 4326848
ADC
QT Input Channel

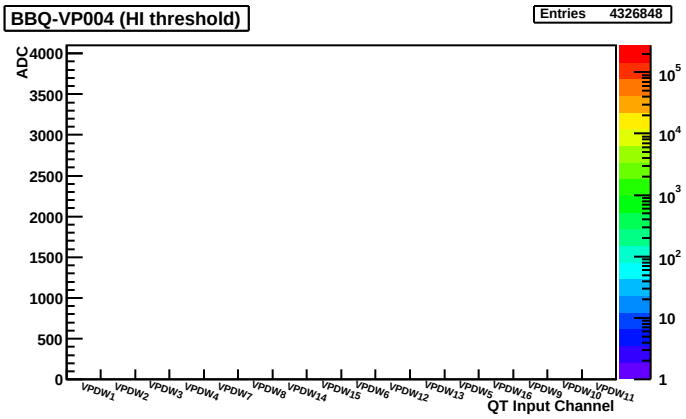

BBQ-VP001 (LO threshold)
Entries 4326848
TAC
QT Input Channel

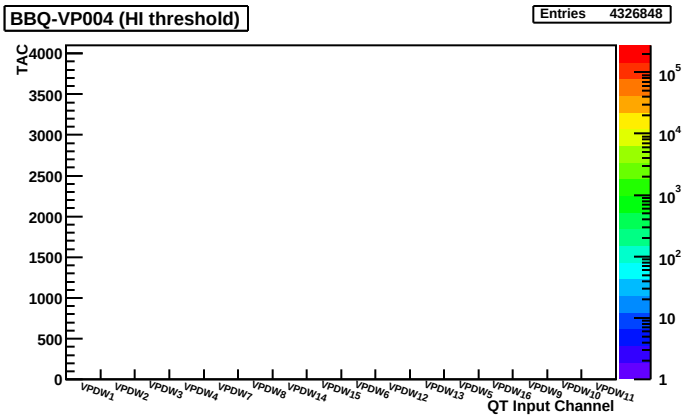

BBQ-VP002 (LO threshold)
Entries 4326848
ADC
QT Input Channel

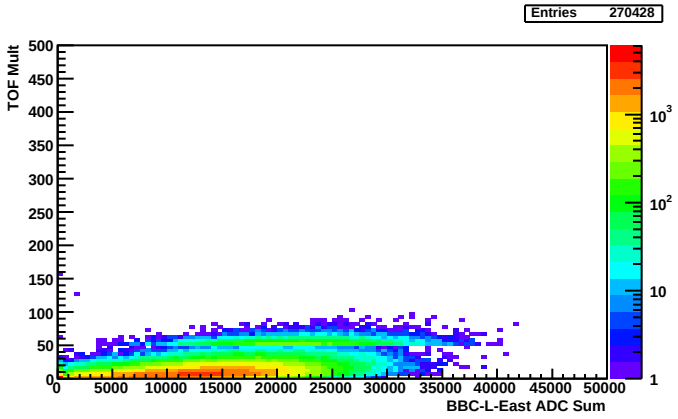

BBQ-VP002 (LO threshold)
Entries 4326848
TAC
QT Input Channel

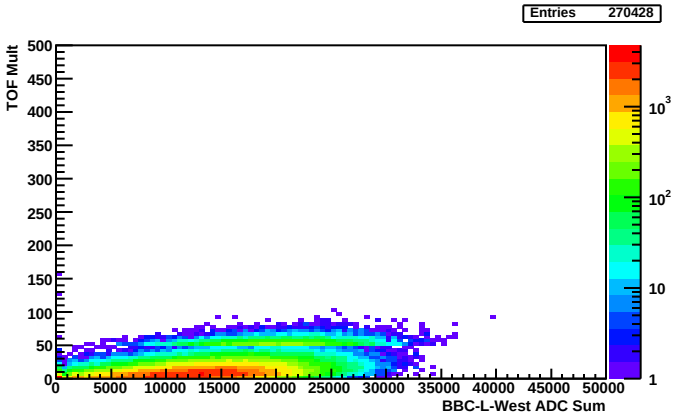

BBQ-VP003 (HI threshold)
Entries 4326848
ADC
QT Input Channel

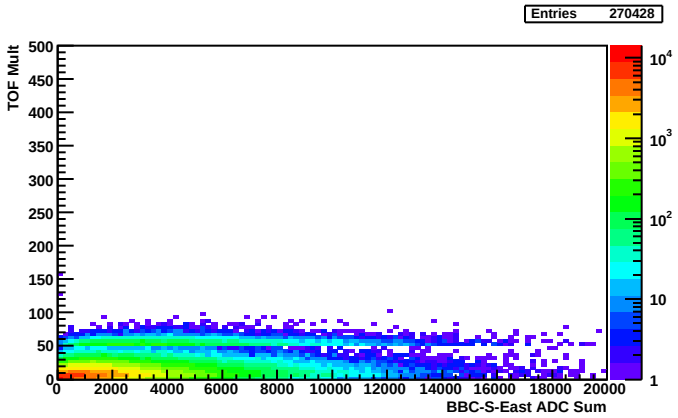

BBQ-VP003 (HI threshold)
Entries 4326848
TAC
QT Input Channel

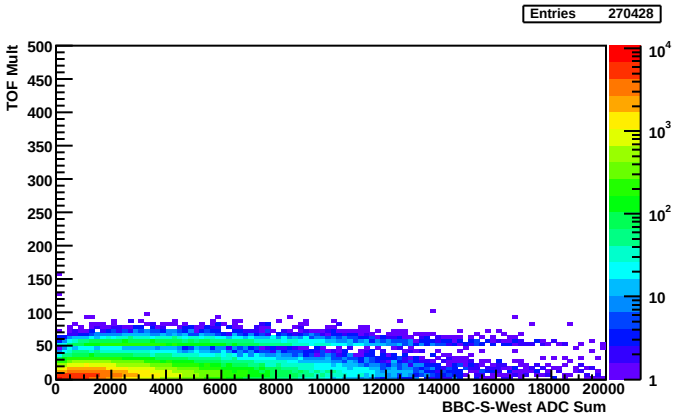

BBQ-VP004 (HI threshold)
Entries 4326848
ADC
QT Input Channel

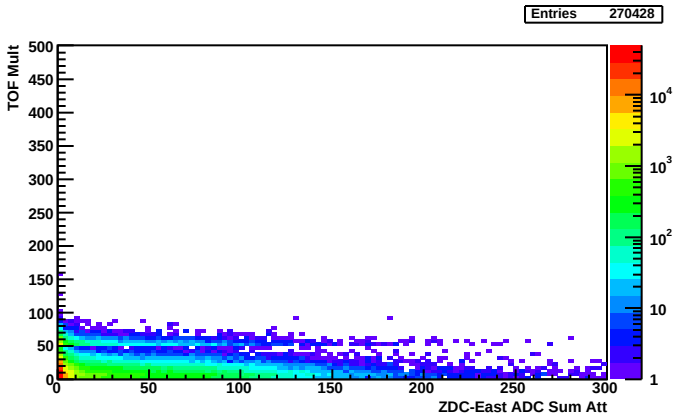

BBQ-VP004 (HI threshold)
Entries 4326848
TAC
QT Input Channel

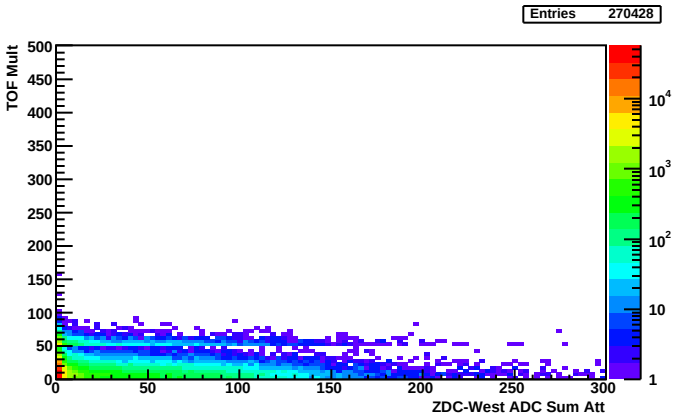

Entries 270428
TOF Mult
BBC-L-East ADC Sum

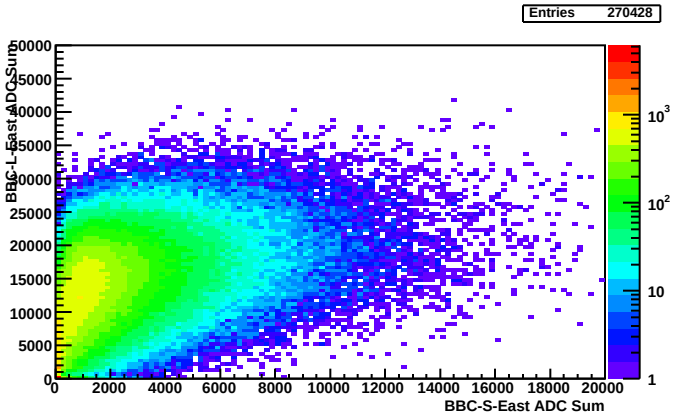

Entries 270428
TOF Mult
BBC-L-West ADC Sum

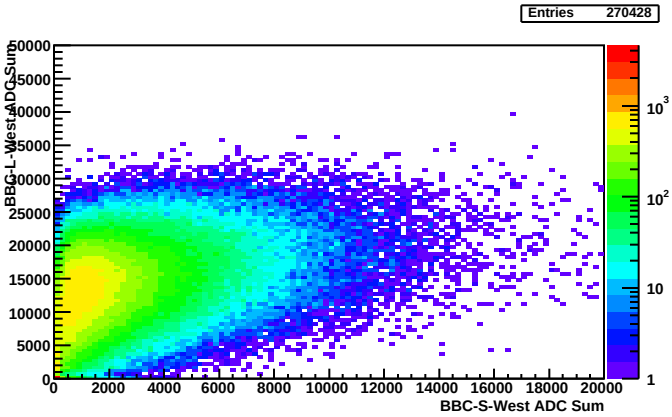

Entries 270428
TOF Mult
BBC-S-East ADC Sum

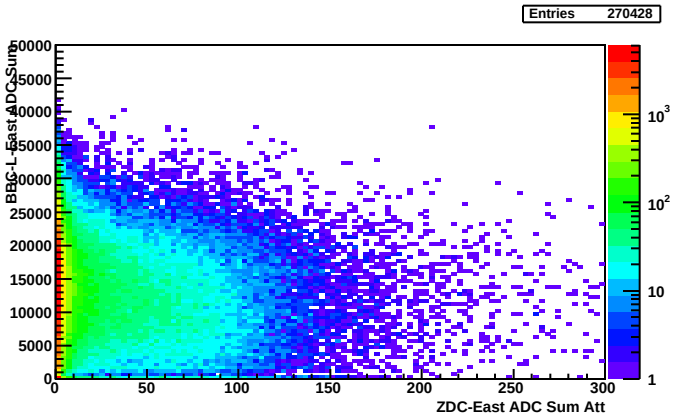

Entries 270428
TOF Mult
BBC-S-West ADC Sum

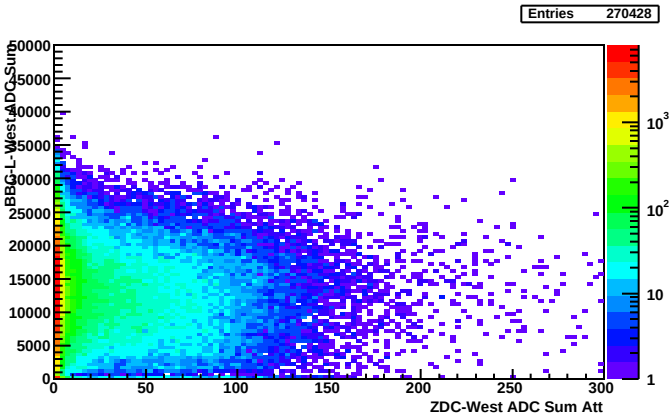

Entries 270428
TOF Mult
ZDC-East ADC Sum Att

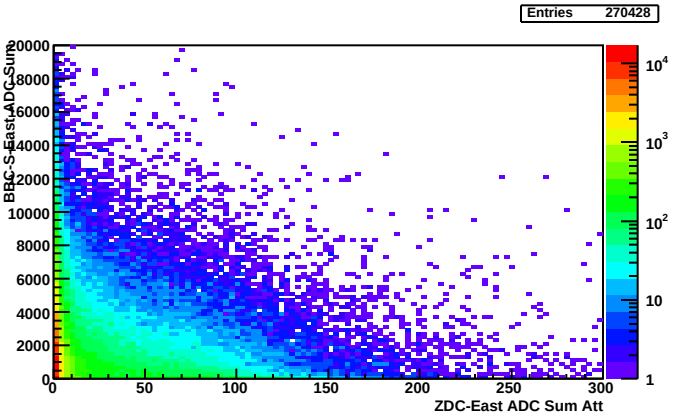

Entries 270428
TOF Mult
ZDC-West ADC Sum Att

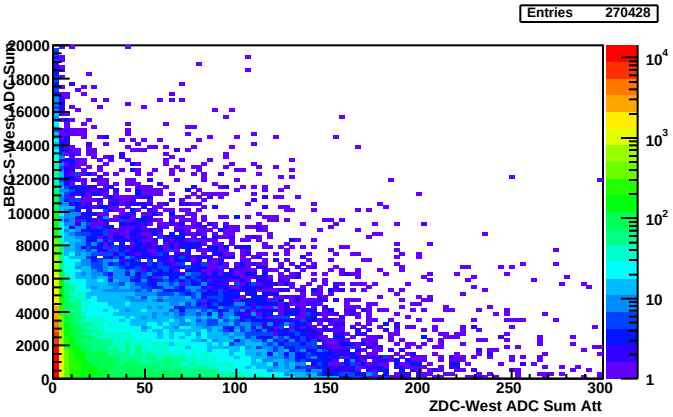

Entries 270428
BBC-L-East ADC Sum
BBC-S-East ADC Sum

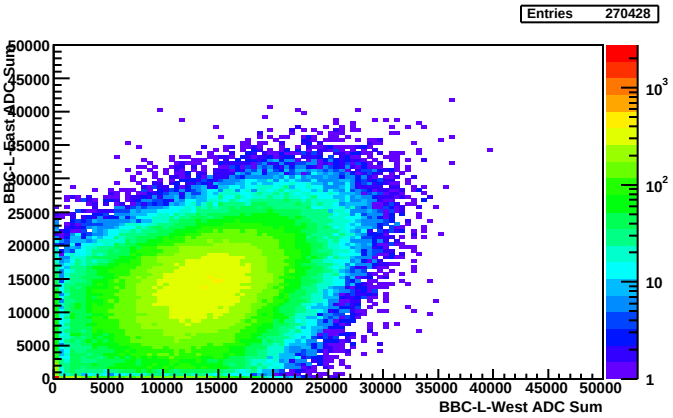

Entries 270428
BBC-L-West ADC Sum
BBC-S-West ADC Sum

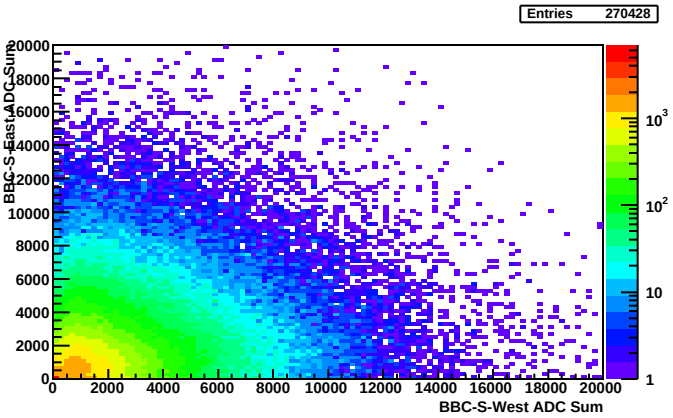

Entries 270428
BBC-L-East ADC Sum
ZDC-East ADC Sum Att

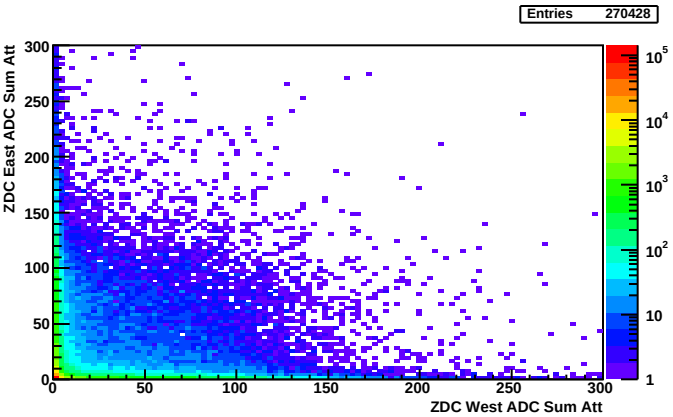

Entries 270428
BBC-L-West ADC Sum
ZDC-West ADC Sum Att

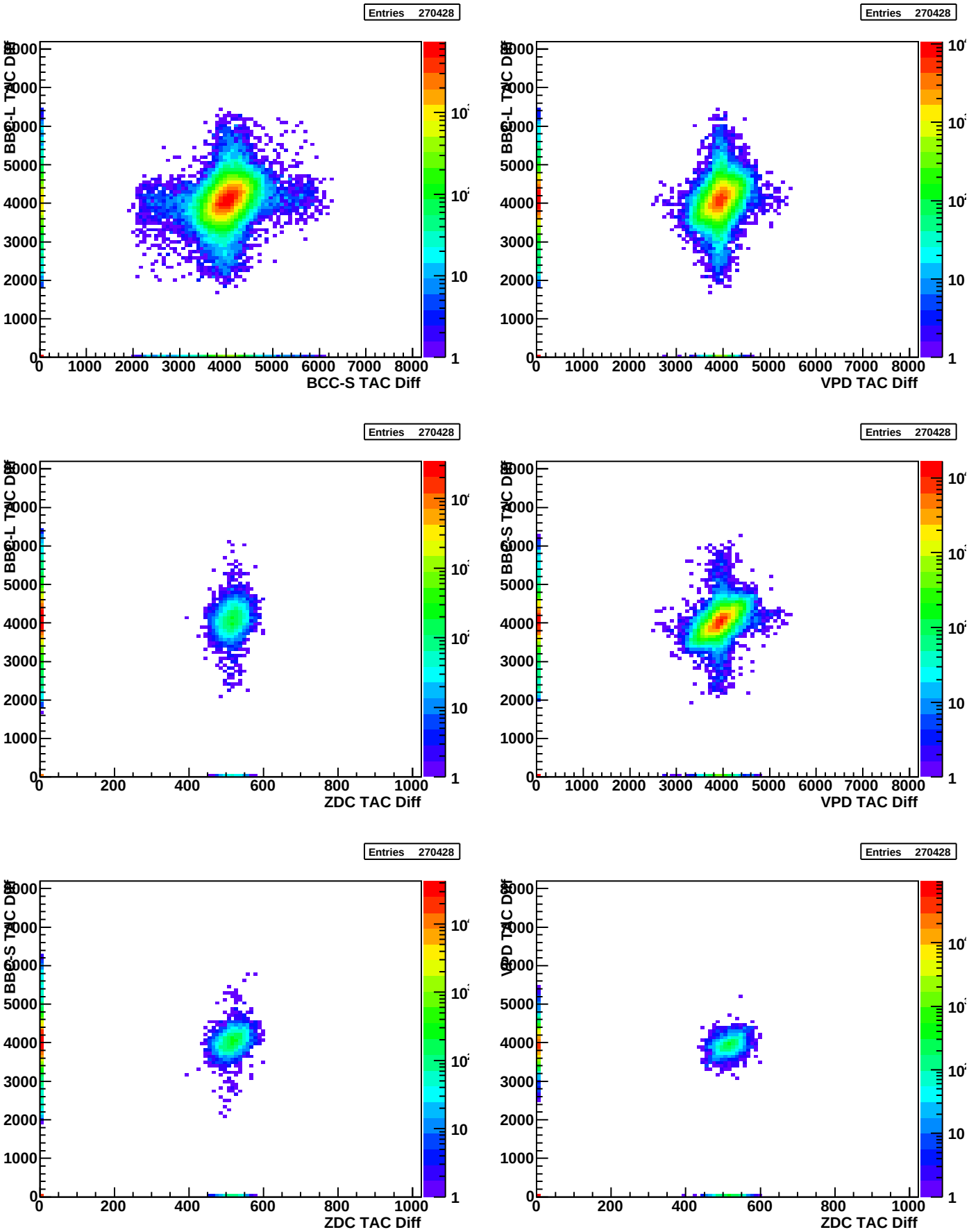

Entries 270428
BBC-S-East ADC Sum
ZDC-East ADC Sum Att

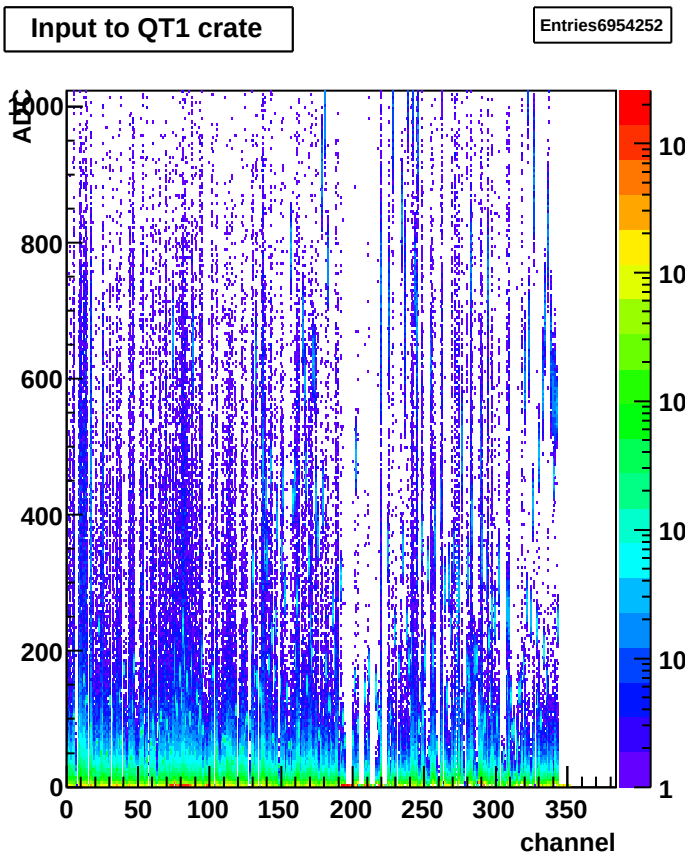

Entries 270428
BBC-S-West ADC Sum
ZDC-West ADC Sum Att

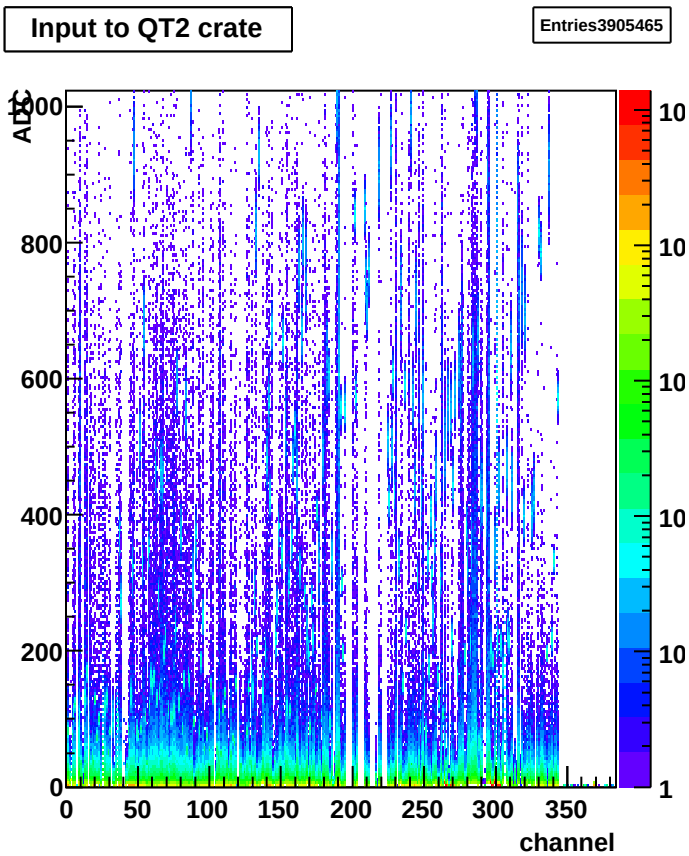

Entries 270428
BBC-L-East ADC Sum
BBC-L-West ADC Sum

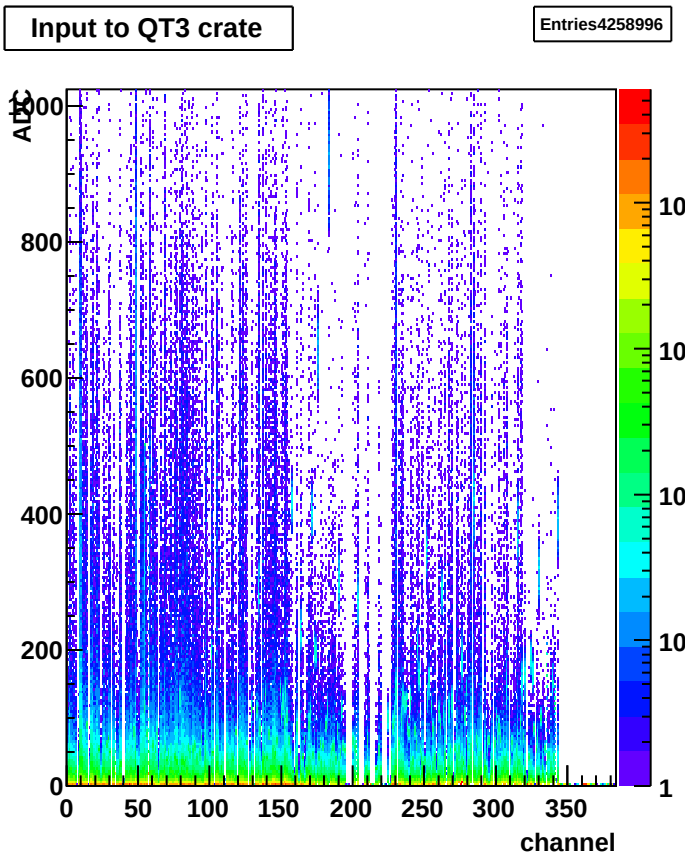

Entries 270428
BBC-S-East ADC Sum
BBC-S-West ADC Sum

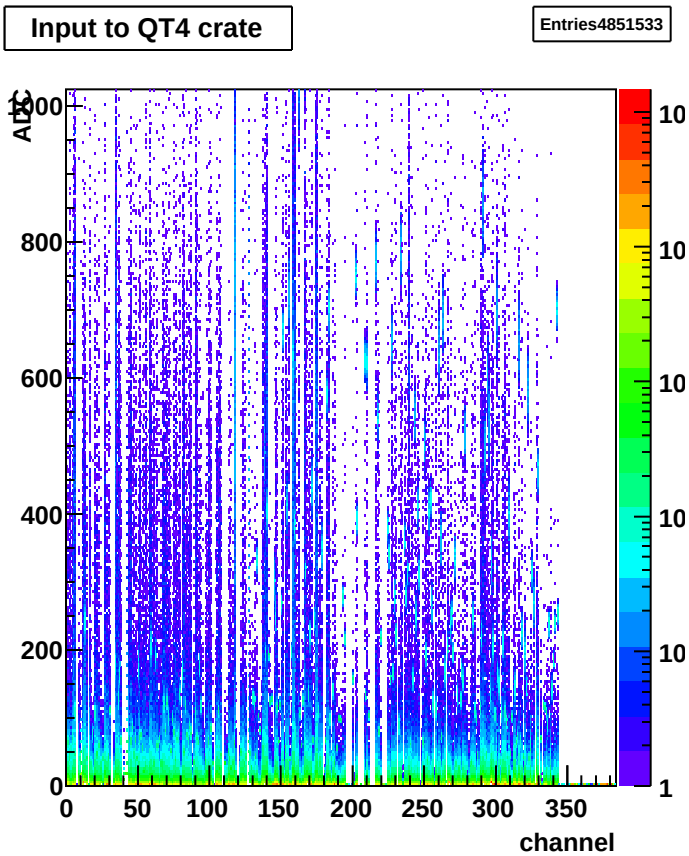

Entries 270428
ZDC East ADC Sum Att
ZDC West ADC Sum Att

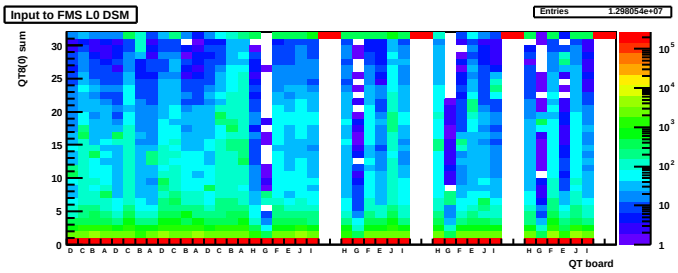

Entries 270428
BBC-L TAC Diff
BCC-S TAC Diff
Entries 270428
BBC-L TAC Diff
VPD TAC Diff
Entries 270428
BBC-L TAC Diff
ZDC TAC Diff
Entries 270428
BBC-S TAC Diff
VPD TAC Diff
Entries 270428
BBC-S TAC Diff
ZDC TAC Diff
Entries 270428
VPD TAC Diff
ZDC TAC Diff

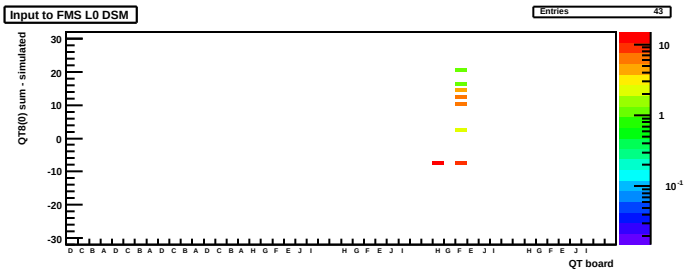

Input to QT1 crate
Entries6954252
ADC
channel

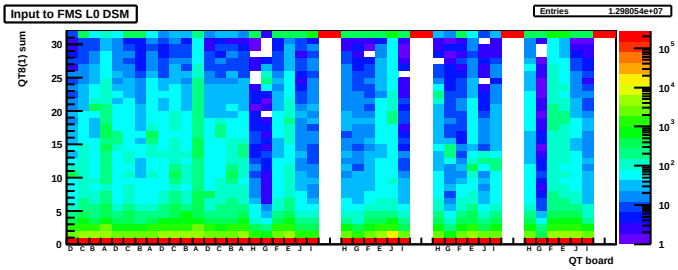

Input to QT2 crate
Entries3905465
ADC
channel

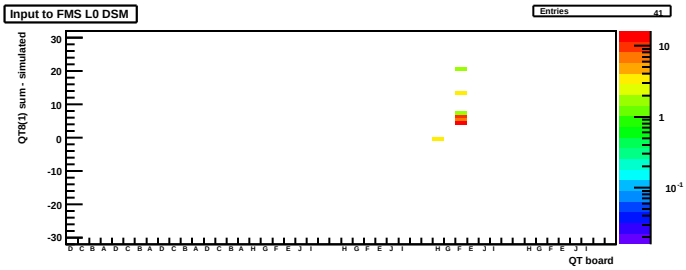

Input to QT3 crate
Entries4258996
ADC
channel

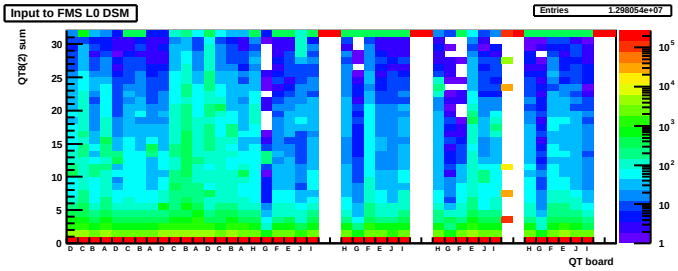

Input to QT4 crate
Entries4851533
ADC
channel

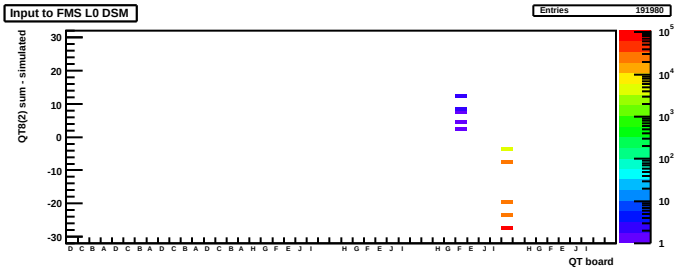

Input to FMS L0 DSM
Entries 1.298054e+07
QT8(0) sum
QT board

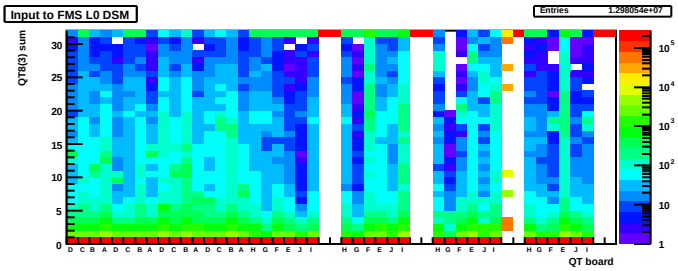

Input to FMS L0 DSM
Entries 43
QT8(0) sum - simulated
QT board

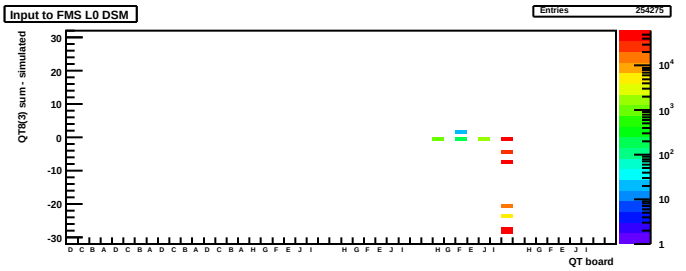

Input to FMS L0 DSM
Entries 1.298054e+07
QT8(1) sum
QT board

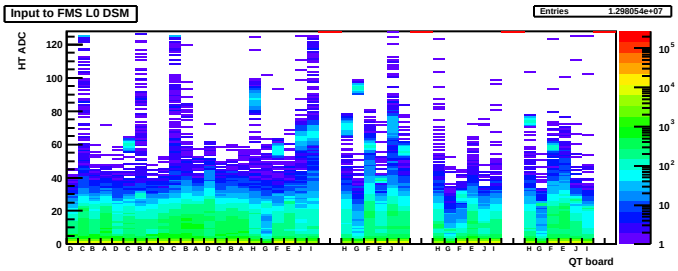

Input to FMS L0 DSM
Entries 41
QT8(1) sum - simulated
QT board

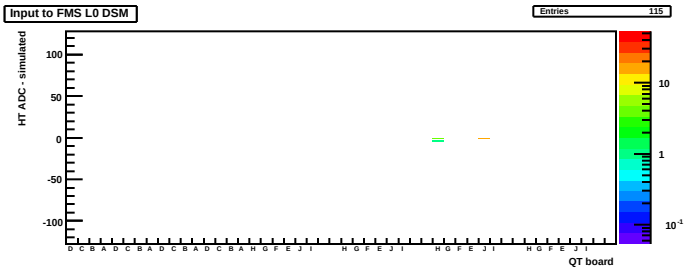

Input to FMS L0 DSM
Entries 1.298054e+07
QT8(2) sum
QT board

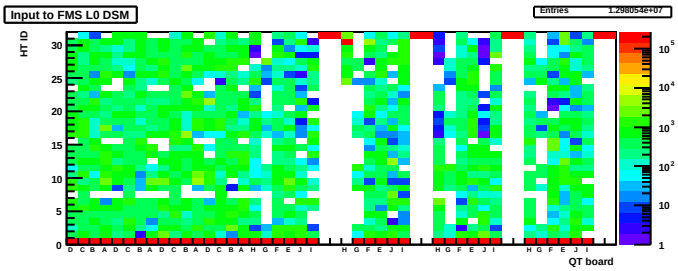

Input to FMS L0 DSM
Entries 191980
QT8(2) sum - simulated
QT board

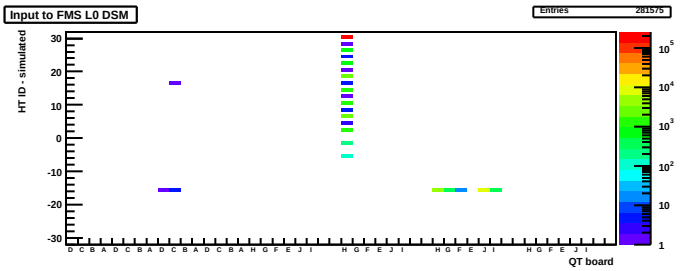

Input to FMS L0 DSM
Entries 1.298054e+07
QT8(3) sum
QT board

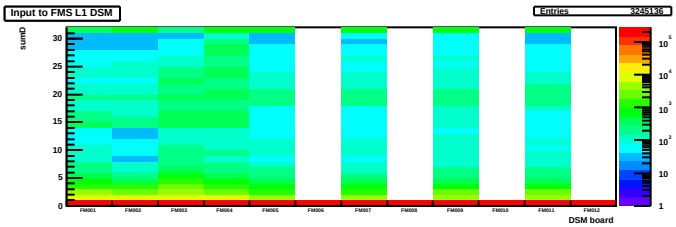

Input to FMS L0 DSM
Entries 254275
QT8(3) sum - simulated
QT board

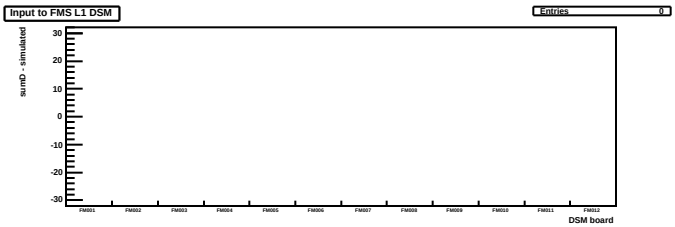

Input to FMS L0 DSM
Entries 1.298054e+07
HT ADC
QT board

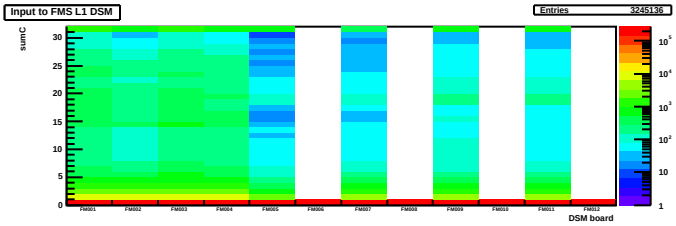

Input to FMS L0 DSM
Entries 115
HT ADC - simulated
QT board

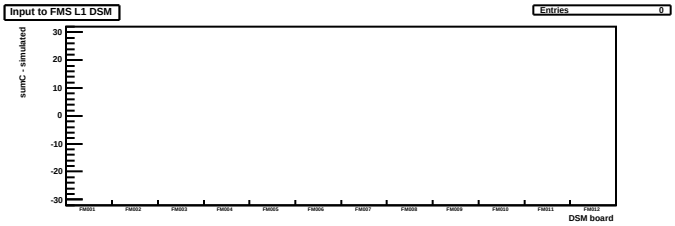

Input to FMS L0 DSM
Entries 1.298054e+07
HT ID
QT board

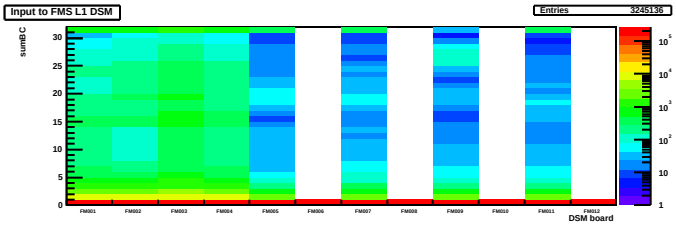

Input to FMS L0 DSM
Entries 281575
HT ID - simulated
QT board

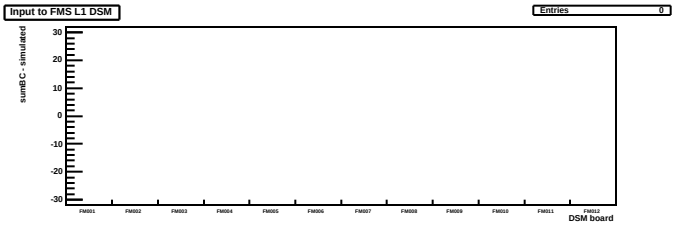

Input to FMS L1 DSM
Entries 3245136
sumD
DSM board

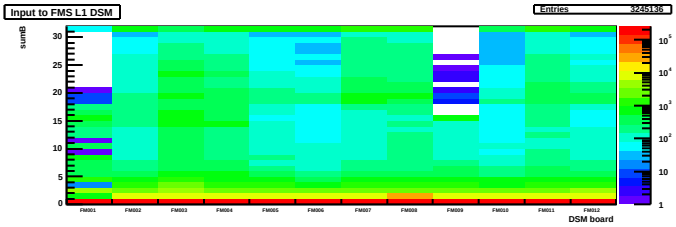

Input to FMS L1 DSM
Entries 0
sumD - simulated
DSM board

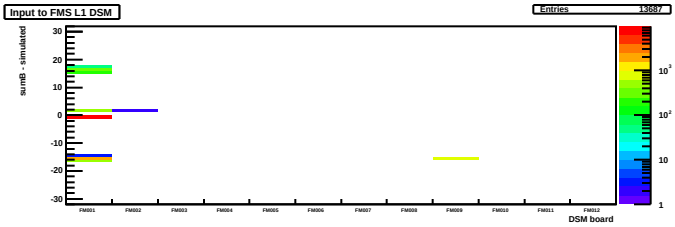

Input to FMS L1 DSM
Entries 3245136
sumC
DSM board

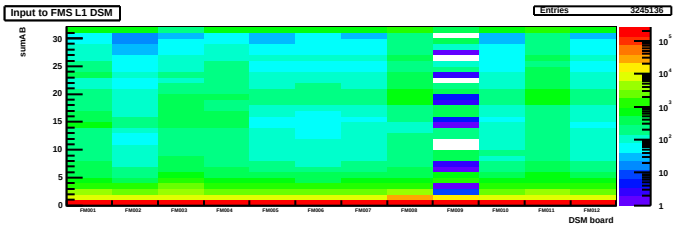

Input to FMS L1 DSM
Entries 0
sumC - simulated
DSM board

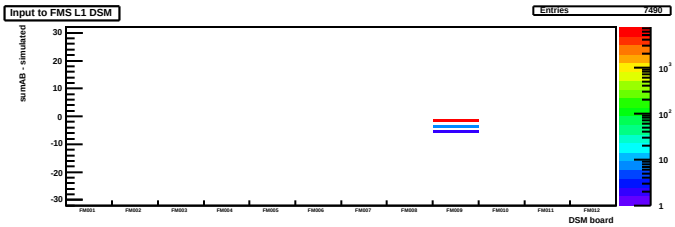

Input to FMS L1 DSM
Entries 3245136
sumBC
DSM board

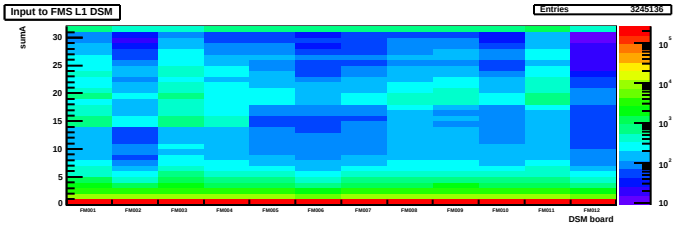

Input to FMS L1 DSM
Entries 0
sumBC - simulated
DSM board

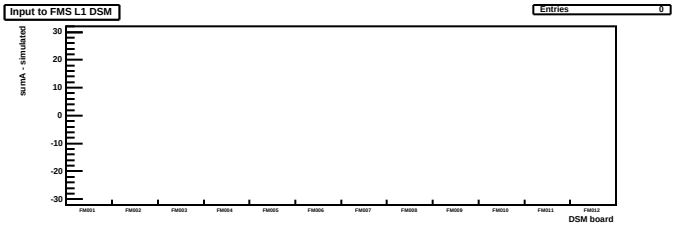

Input to FMS L1 DSM
Entries 3245136
sumB
DSM board

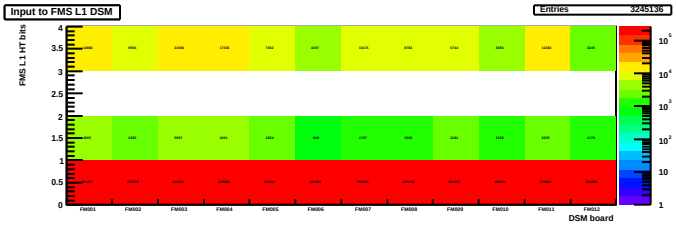

Input to FMS L1 DSM
Entries 13687
sumB - simulated
DSM board

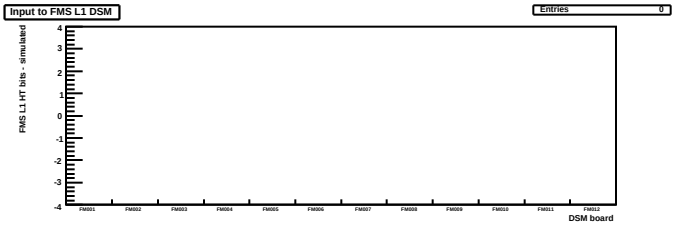

Input to FMS L1 DSM
Entries 3245136
sumAB
DSM board

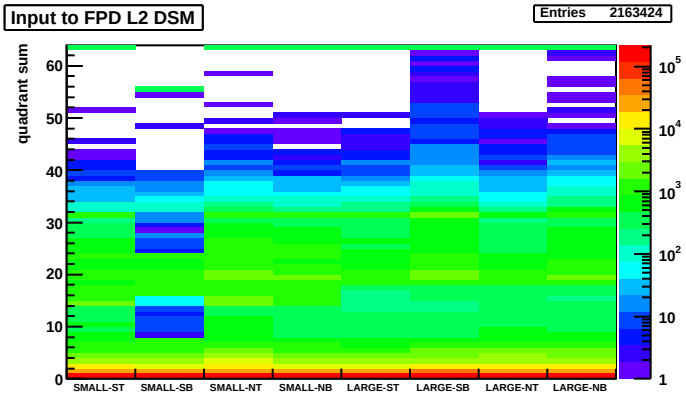

Input to FMS L1 DSM
Entries 7490
sumAB - simulated
DSM board

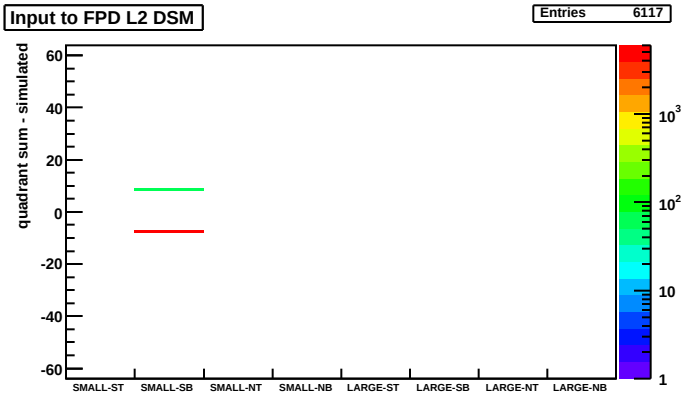

Input to FMS L1 DSM
Entries 3245136
sumA
DSM board

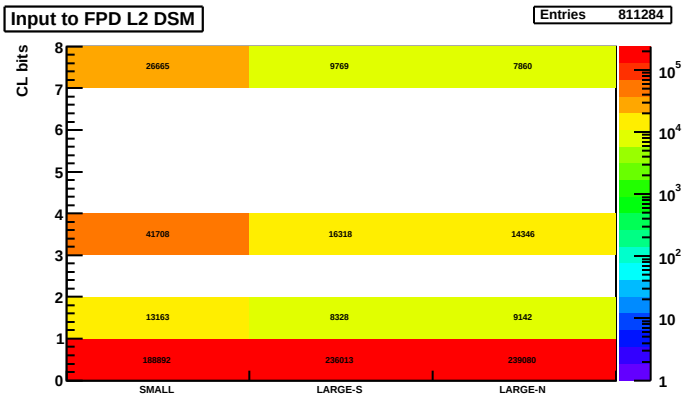

Input to FMS L1 DSM
Entries 0
sumA - simulated
DSM board

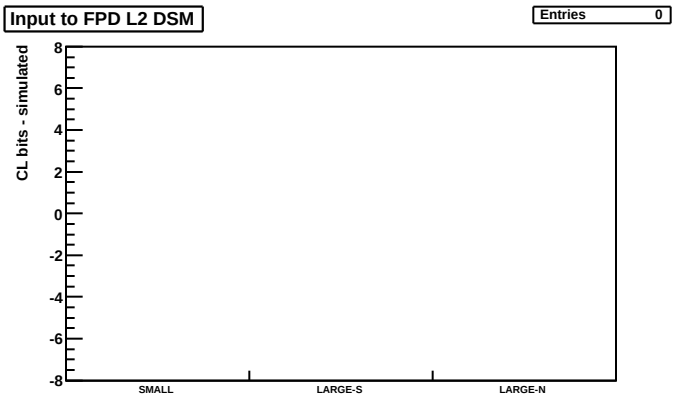

Input to FMS L1 DSM
Entries 3245136
FMS L1 HT bits
DSM board

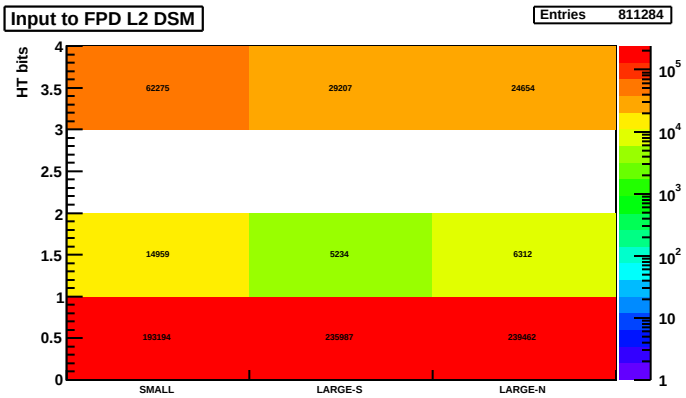

Input to FMS L1 DSM
Entries 0
FMS L1 HT bits - simulated
DSM board

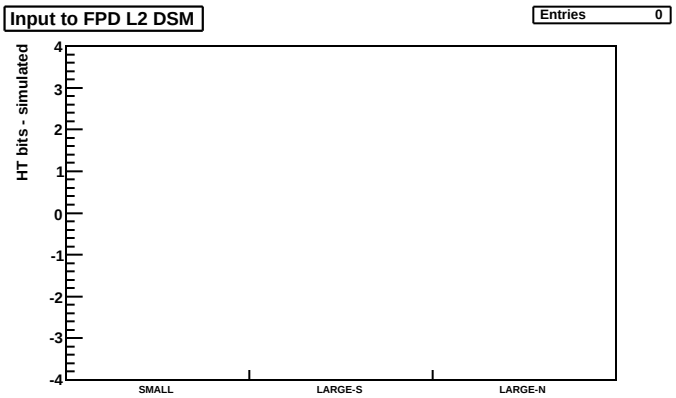

Input to FPD L2 DSM
Entries 2163424
quadrant sum
SMALL-ST
SMALL-SB
SMALL-NT
SMALL-NB
LARGE-ST
LARGE-SB
LARGE-NT
LARGE-NB

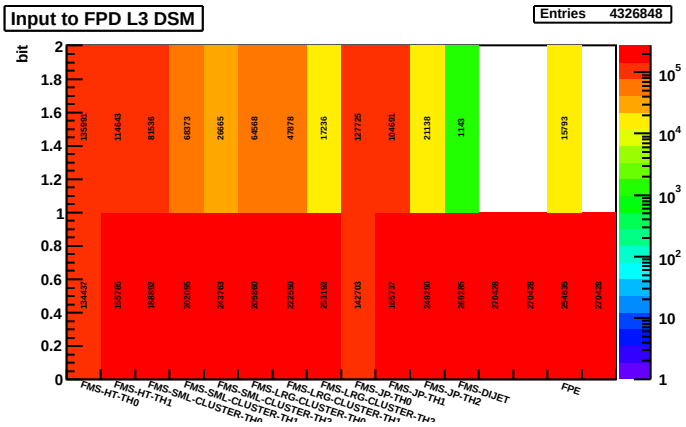

Input to FPD L2 DSM
Entries 6117
quadrant sum - simulated
SMALL-ST
SMALL-SB
SMALL-NT
SMALL-NB
LARGE-ST
LARGE-SB
LARGE-NT
LARGE-NB

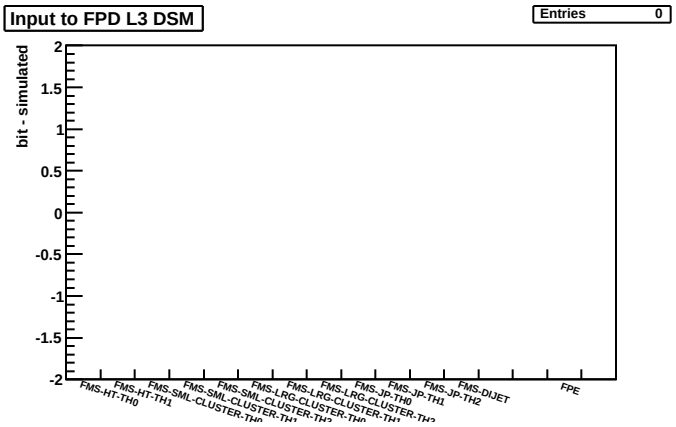

Input to FPD L2 DSM
Entries 811284
CL bits
26665
9769
7860
41708
16318
14346
13163
8328
9142
188892
236013
239080
SMALL
LARGE-S
LARGE-N

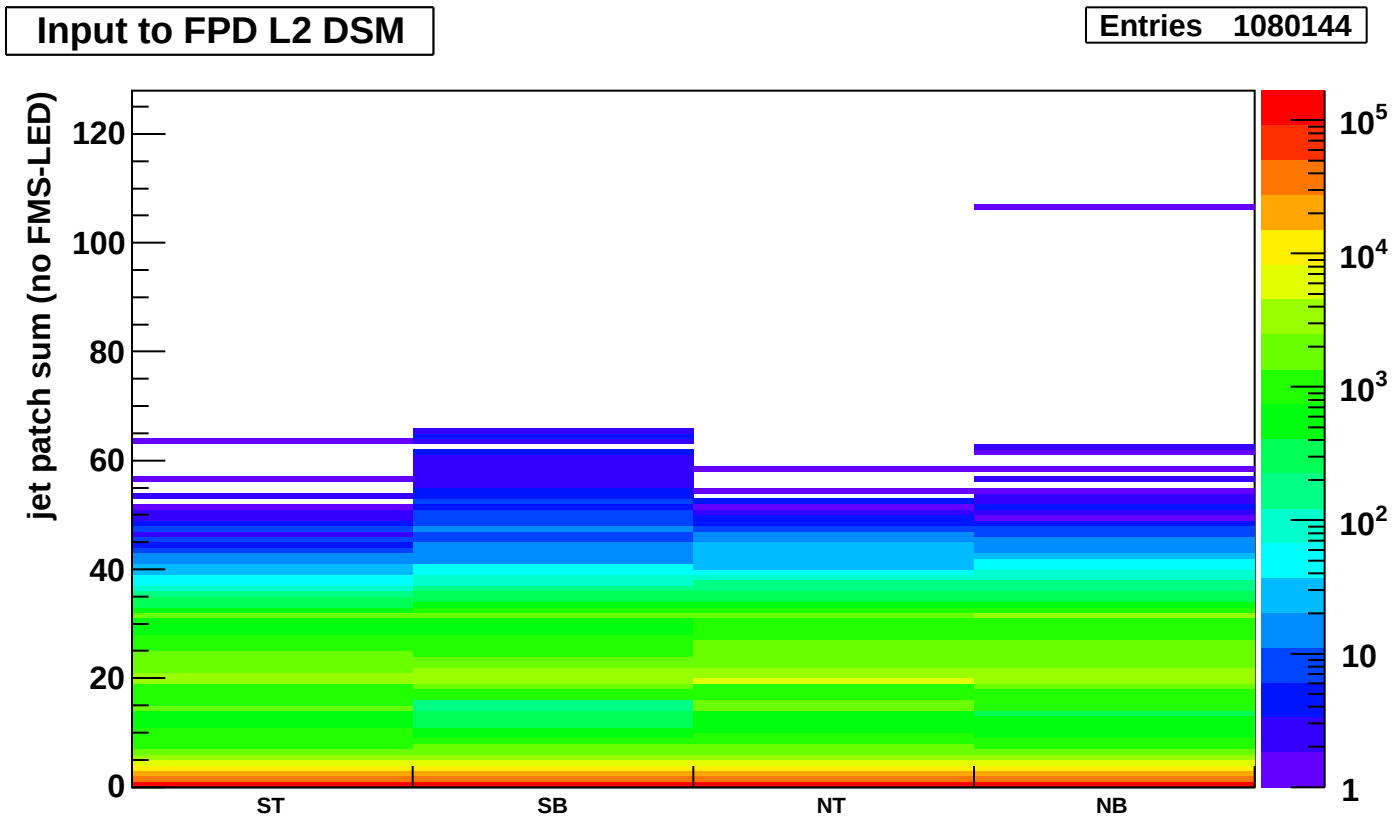

Input to FPD L2 DSM
Entries 0
CL bits - simulated
SMALL
LARGE-S
LARGE-N

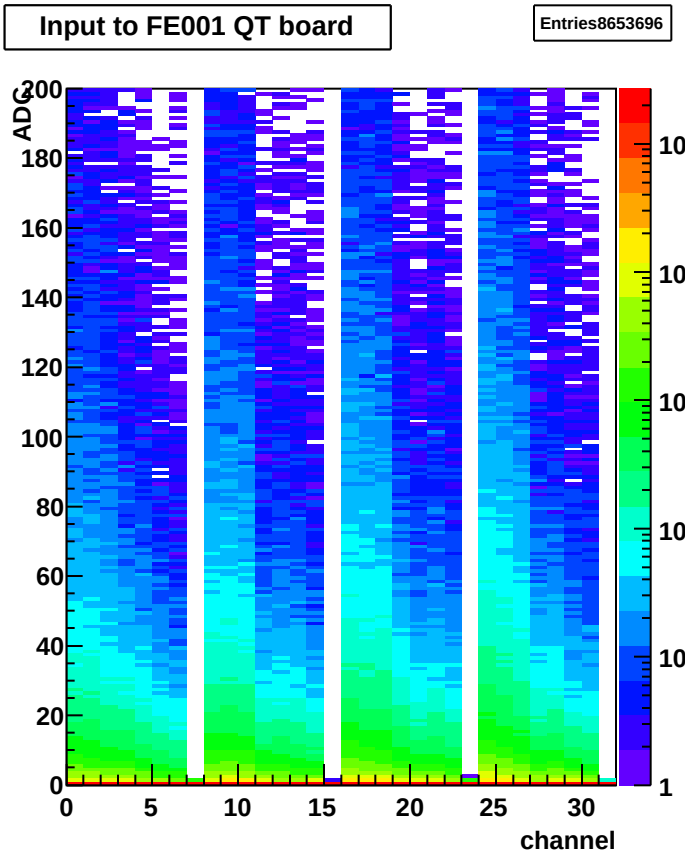

Input to FPD L2 DSM
Entries 811284
HT bits
62275
29207
24654
14959
5234
6312
193194
235987
239462
SMALL
LARGE-S
LARGE-N

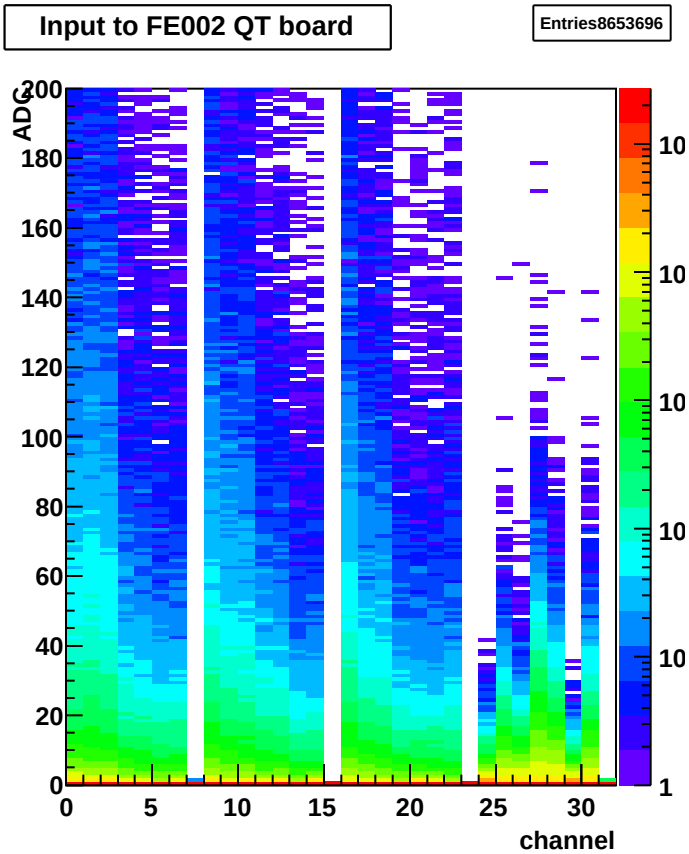

Input to FPD L2 DSM
Entries 0
HT bits - simulated
SMALL
LARGE-S
LARGE-N

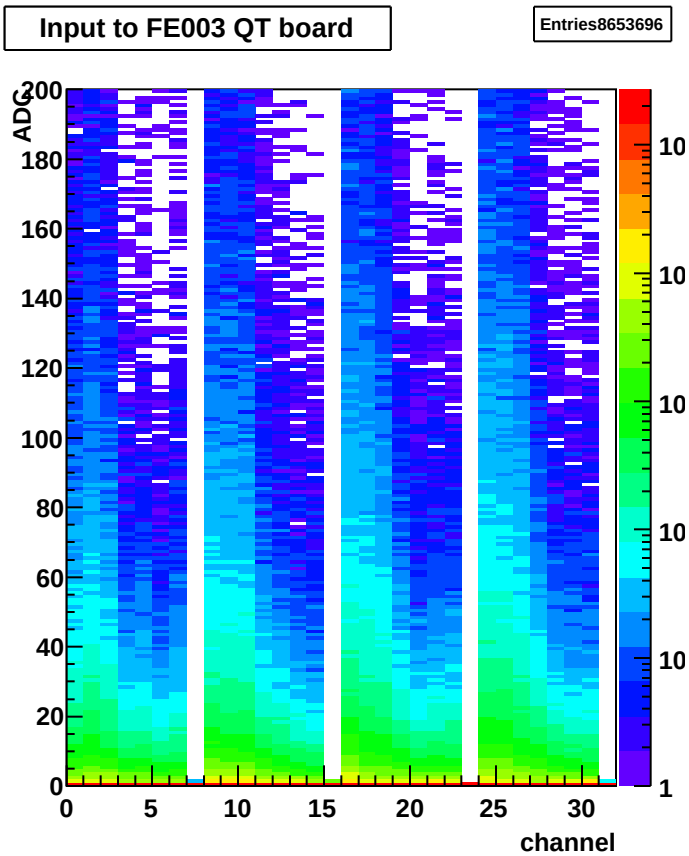

Input to FPD L3 DSM
Entries 4326848
bit
FMS-HT-TH0
FMS-HT-TH1
FMS-SML-CLUSTER-TH0
FMS-SML-CLUSTER-TH1
FMS-SML-CLUSTER-TH2
FMS-LRG-CLUSTER-TH0
FMS-LRG-CLUSTER-TH1
FMS-LRG-CLUSTER-TH2
FMS-JP-TH0
FMS-JP-TH1
FMS-JP-TH2
FMS-DIJET
FPE

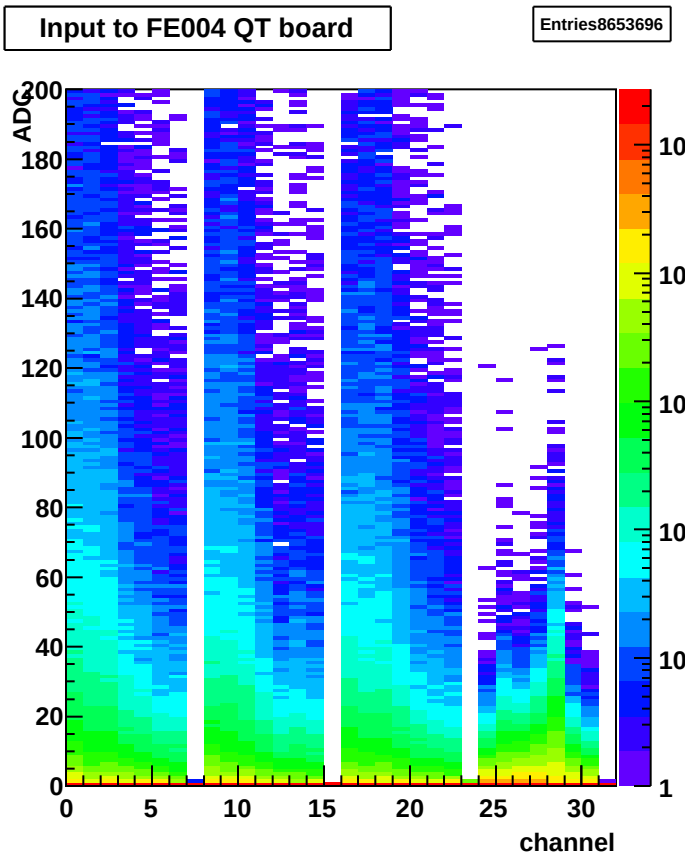

Input to FPD L3 DSM
Entries 0
bit - simulated
FMS-HT-TH0
FMS-HT-TH1
FMS-SML-CLUSTER-TH0
FMS-SML-CLUSTER-TH1
FMS-SML-CLUSTER-TH2
FMS-LRG-CLUSTER-TH0
FMS-LRG-CLUSTER-TH1
FMS-LRG-CLUSTER-TH2
FMS-JP-TH0
FMS-JP-TH1
FMS-JP-TH2
FMS-DIJET
FPE

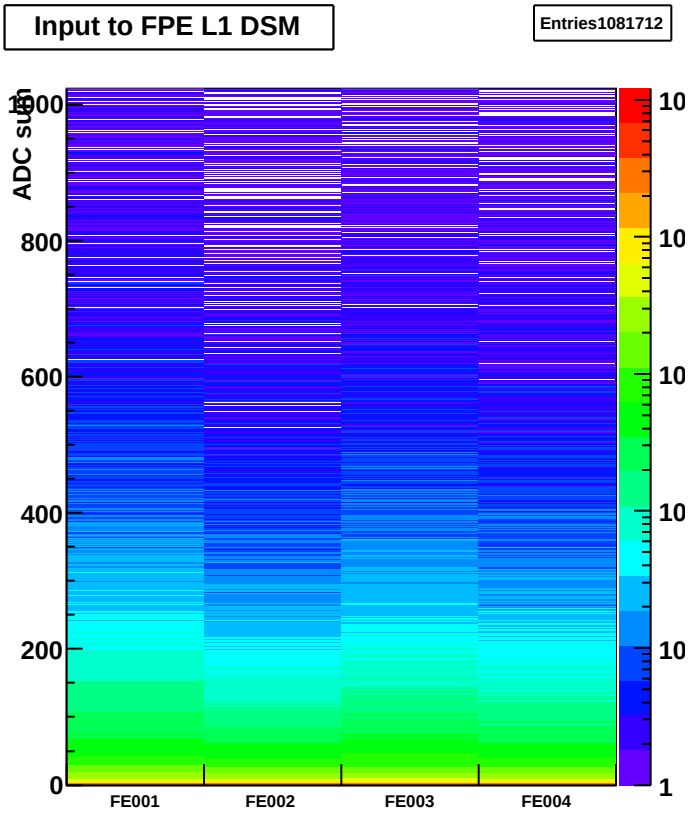

Input to FPD L2 DSM
Entries 1080144
jet patch sum (no FMS-LED)
0
20
40
60
80
100
120
ST
SB
NT
NB
1
10
10^2
10^3
10^4
10^5

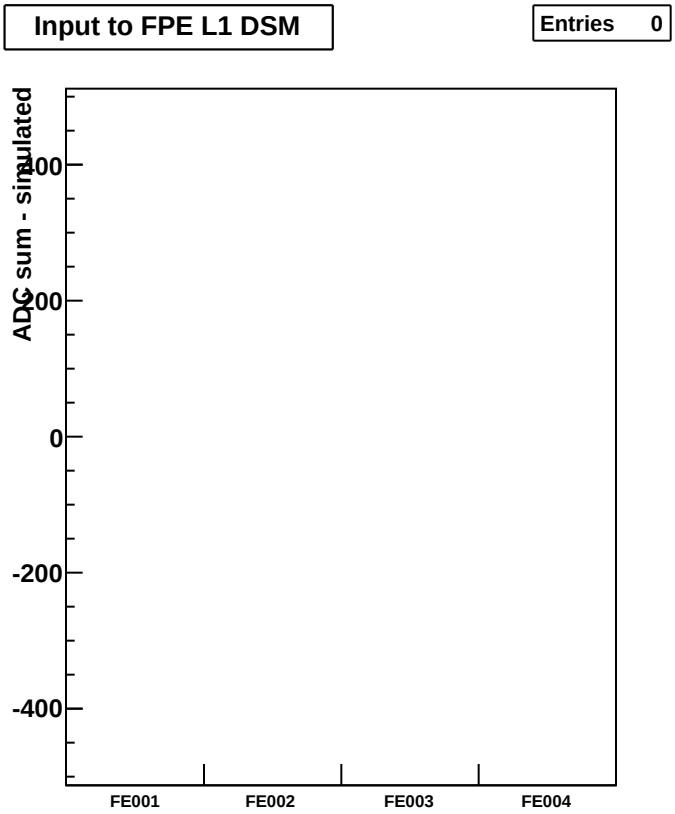

Input to FE001 QT board
Entries8653696
ADC
channel

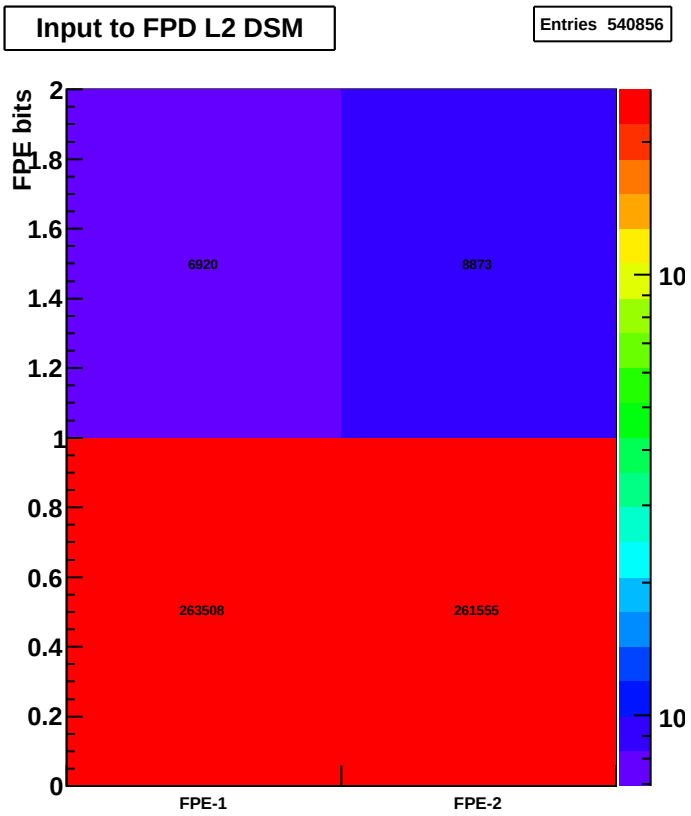

Input to FE002 QT board
Entries8653696
ADC
channel

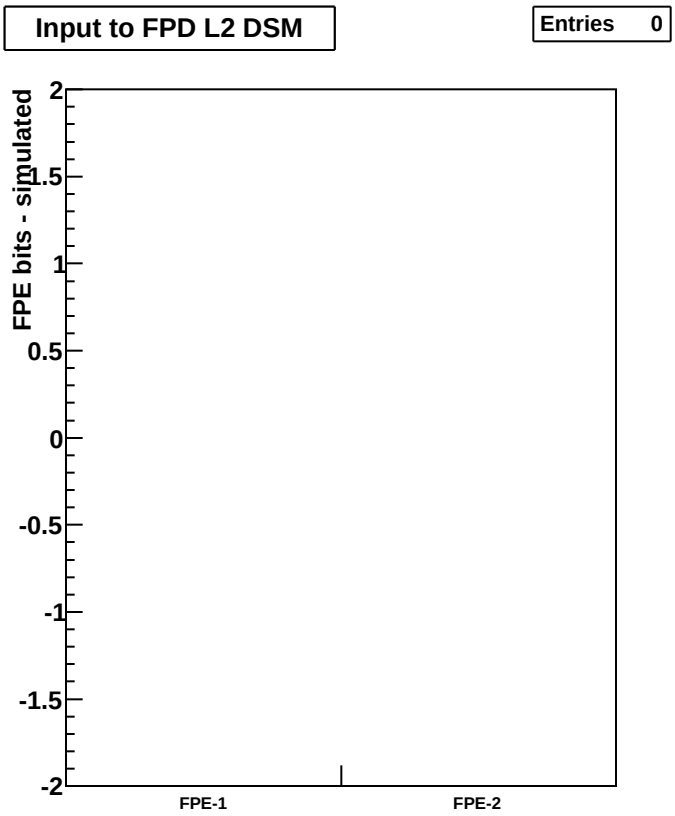

Input to FE003 QT board
Entries8653696
ADC
channel


Input to FE004 QT board
Entries8653696
ADC
channel


Input to FPE L1 DSM
Entries1081712
ADC sum
1000
800
600
400
200
0
FE001
FE002
FE003
FE004
10
10
10
10
10
1


Input to FPE L1 DSM
Entries 0
ADC sum - simulated
400
200
0
-200
-400
FE001
FE002
FE003
FE004


Input to FPD L2 DSM
Entries 540856
FPE bits
2
1.8
1.6
1.4
1.2
1
0.8
0.6
0.4
0.2
0
6920
8873
263508
261555
FPE-1
FPE-2
10
10


Input to FPD L2 DSM
Entries 0
FPE bits - simulated
2
1.5
1
0.5
0
-0.5
-1
-1.5
-2
FPE-1
FPE-2