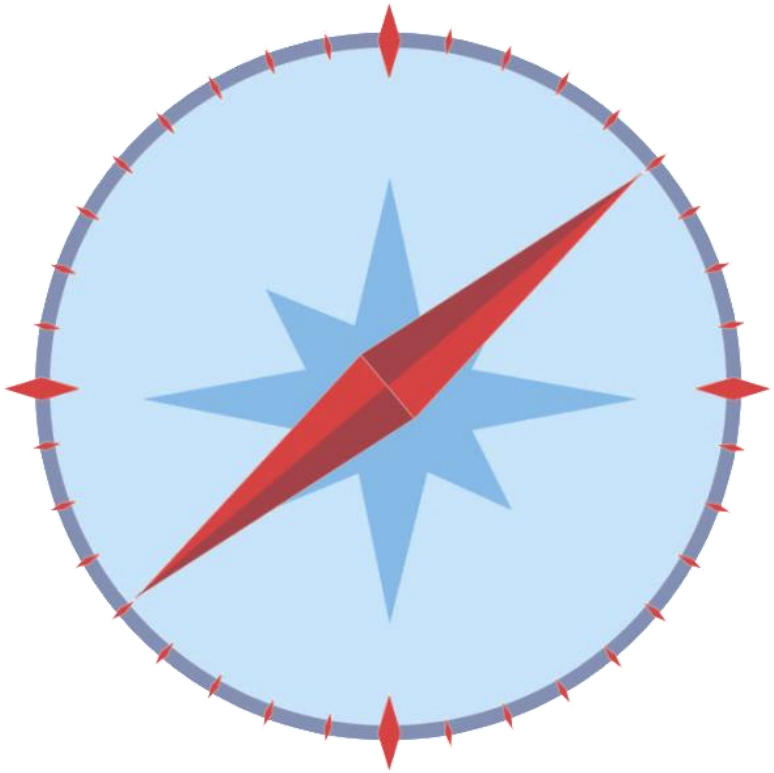
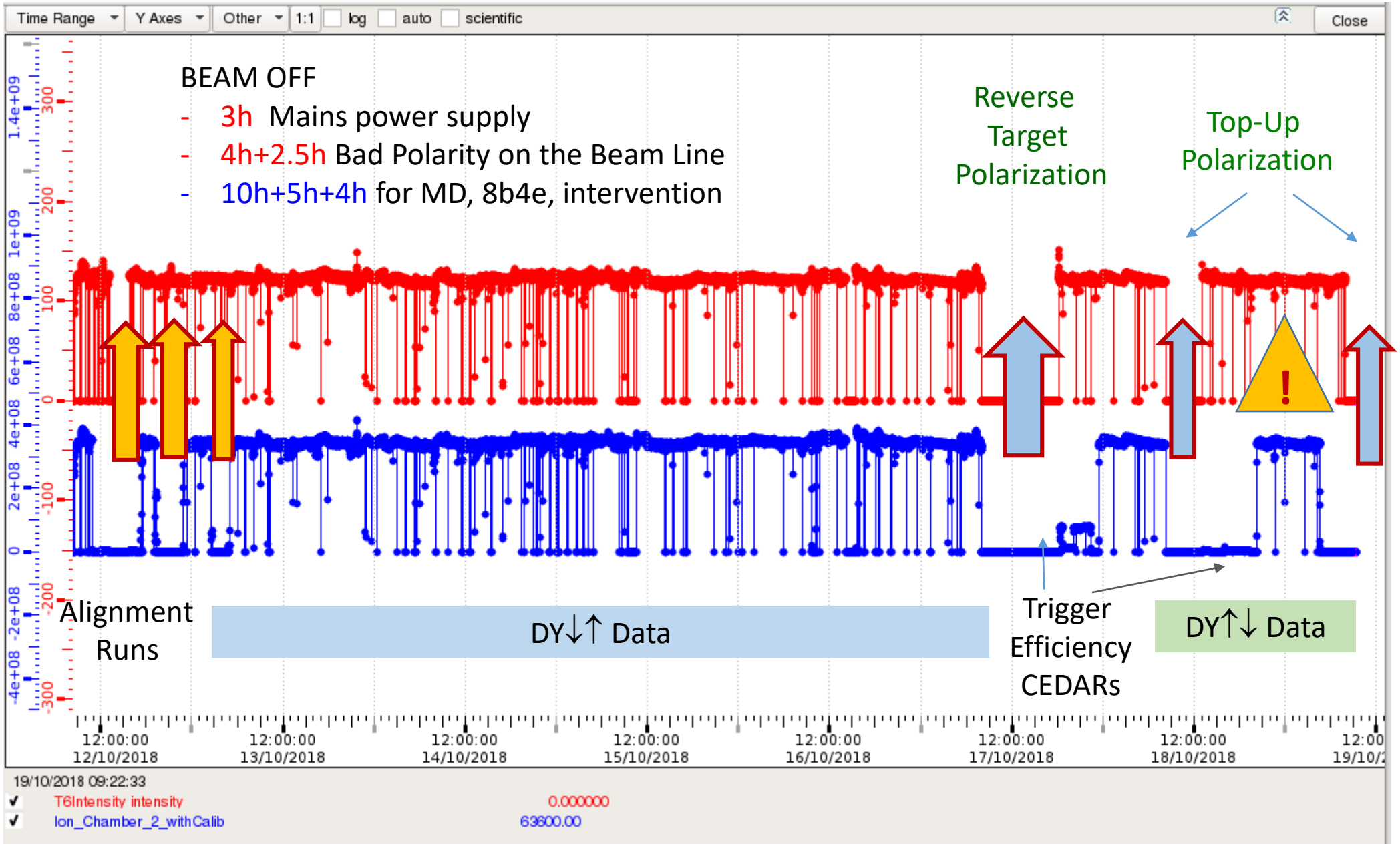
COMPASS Weekly Coordination
DY run
W42: Fr 12 October – Fr 19 October 2018



Nicole d'Hose, CEA, Université Paris-Saclay

SUMMARY OF THE WEEK



Last news from yesterday 16:00

Target polarization with data at low intensity for Trigger efficiency
20:00 DY started (PA03V pb)

1:45 CO2 GAS ALARM → GEM, MWPC, STRAW, W45, MW1, RW HV OFF

At 1:45 we observed CO2 flow drop on GEMs and MWPCs. Soon after we had to switch off the HVs. We called Vincent, who tried to check the PLC, but didn't find a solution. Then he exchanged many calls with TCR and various piquets trying to find who is responsible for our gas supply. At 3:15 the problems appeared also on STRAW gas system and at 3:40 on W45 (they are recycling the gas, as well as MW1, where we see no problems so far).

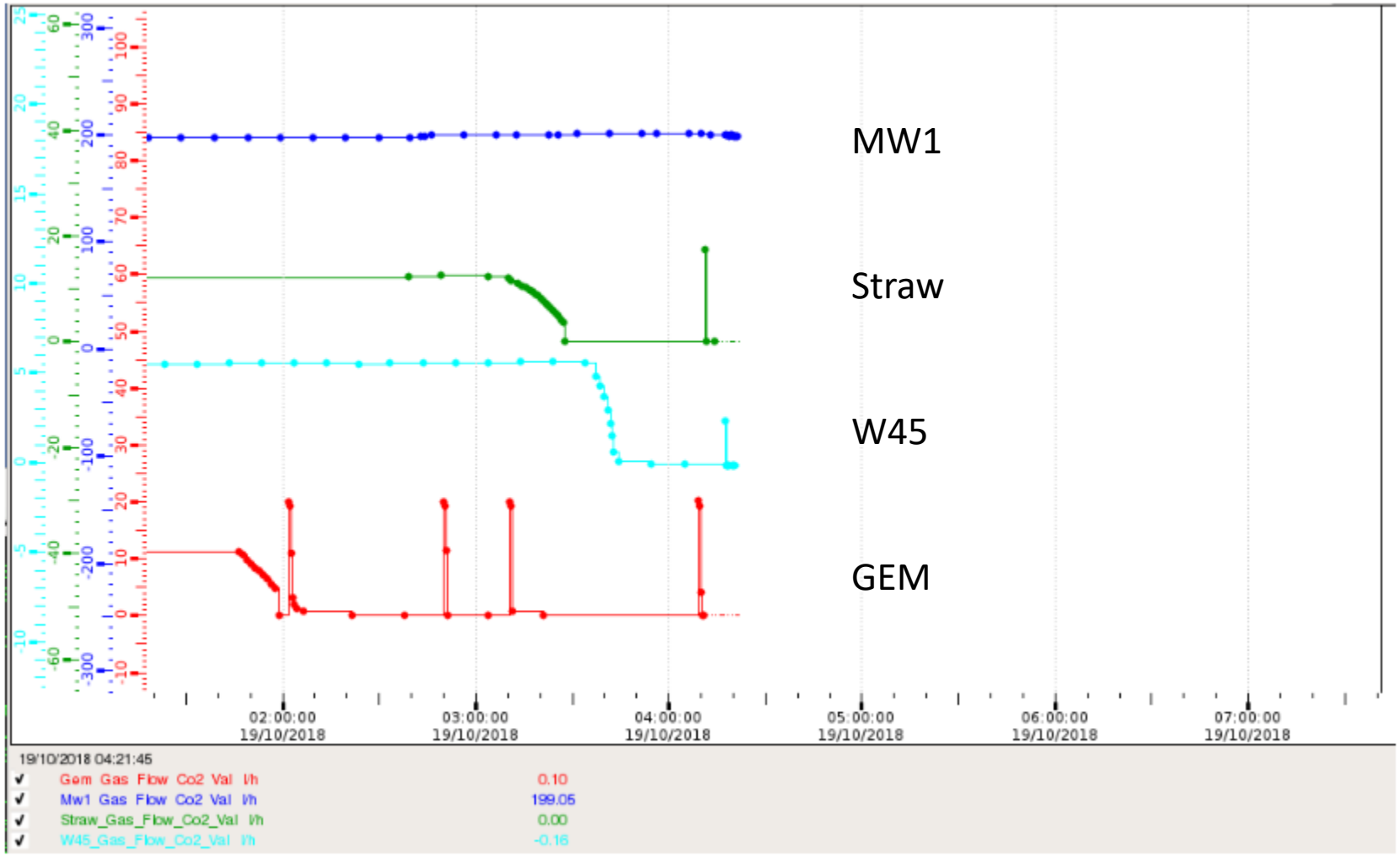
4:00 Vincent and Bogdan readjusted the PLCs to restore Ar flow in GEM, MWPC, STRAW and W45. The Ar flow stopped because the supply of CO_2 from CERN had stopped. After ~1 h without flushing, we started to see a humidity alarm on STRAW, which disappeared after the Ar flow was restored. However, we still have no CO_2.

8:00 Beam Stop for Main power converters intervention until 12:00

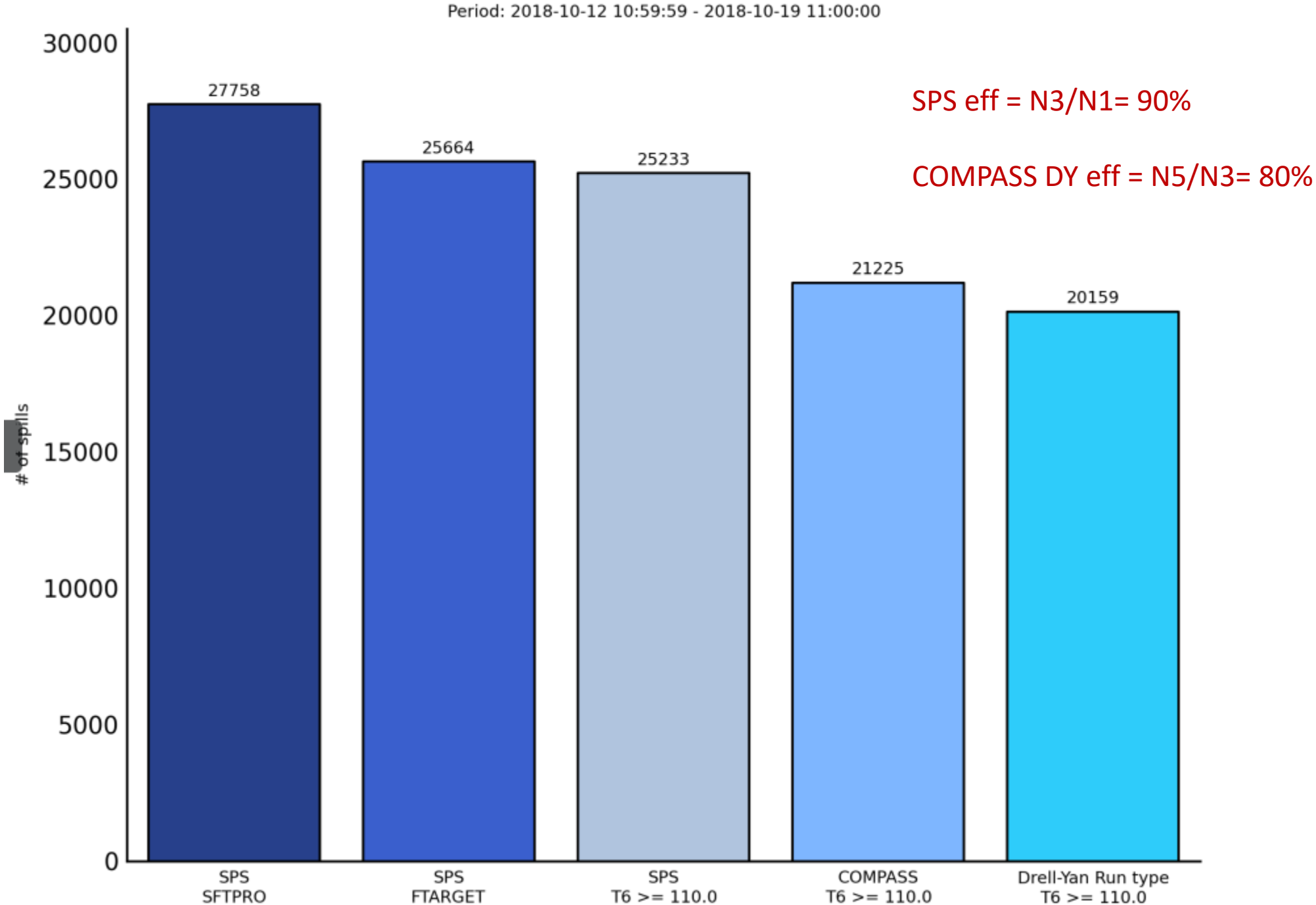
8:42 First the technical service (72201) and then the responsible for NA, David Jaillet (167151) told us that the intervention on CO2 supply is finished.
The problem is the same as in the past, namely a not properly working switch from an empty bottle to a new one.

→ 12:00 Hoping Beam back with operational detectors

GAS FLOW CO2

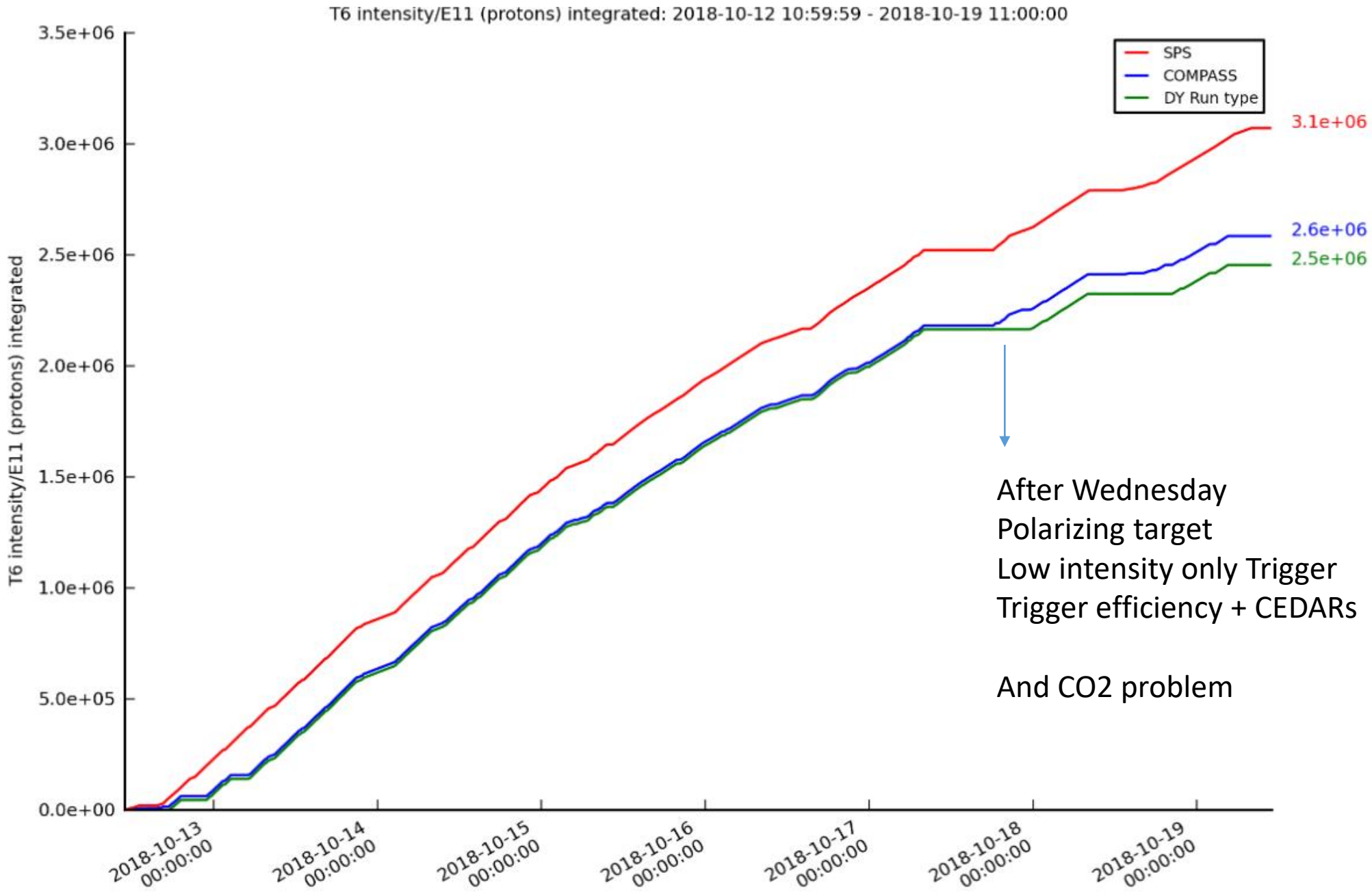


The situation resembles the incident from 12. 6. 2017, ~7:00, when the CO2 supply to COMPASS was stopped due to an abnormally high consumption elsewhere in North area (leak). The corresponding comment is referenced.



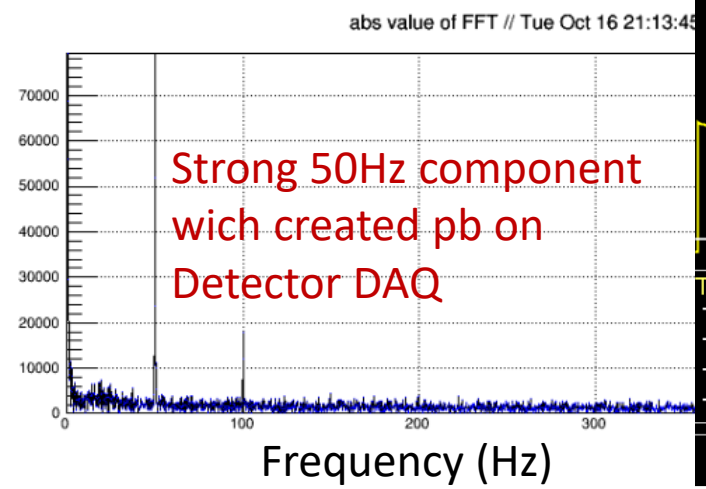
SPS eff = N3/N1= 90%

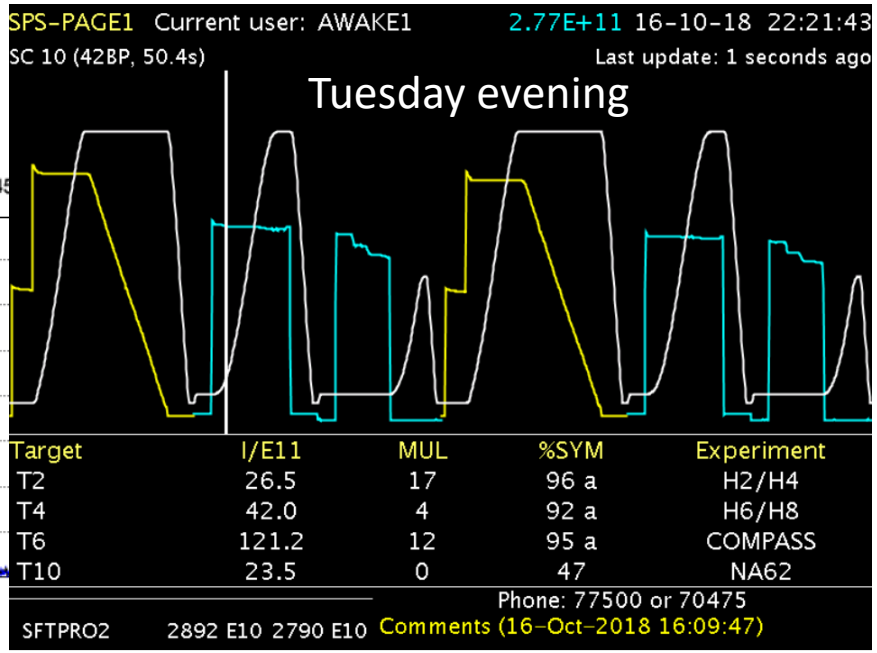
COMPASS DY eff = N5/N3= 80%

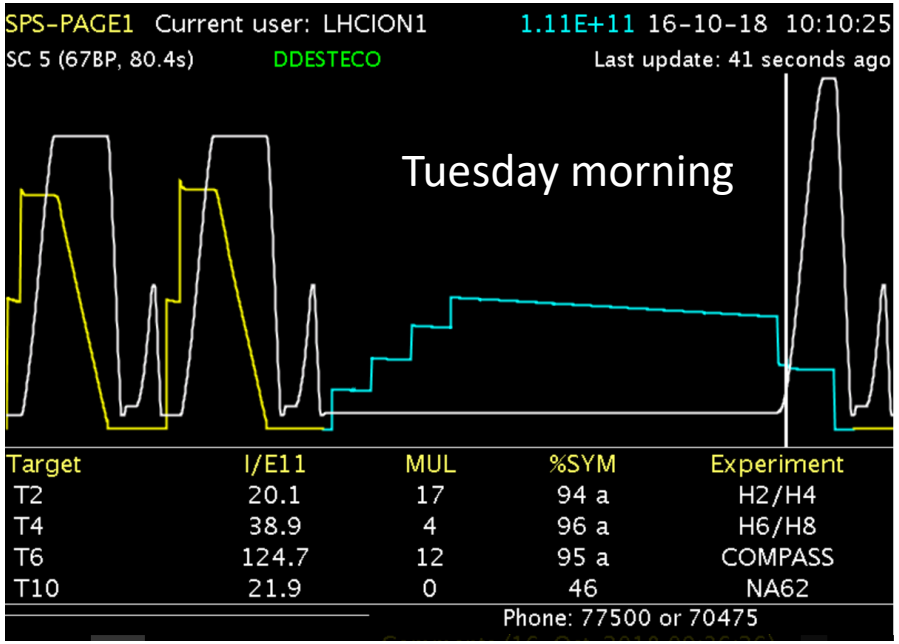

T6 intensity/E11 (protons) integrated: 2018-10-12 10:59:59 - 2018-10-19 11:00:00
T6 intensity/E11 (protons) integrated
3.5e+06
3.0e+06
2.5e+06
2.0e+06
1.5e+06
1.0e+06
5.0e+05
0.0e+00
2018-10-13 00:00:00
2018-10-14 00:00:00
2018-10-15 00:00:00
2018-10-16 00:00:00
2018-10-17 00:00:00
2018-10-18 00:00:00
2018-10-19 00:00:00
SPS
COMPASS
DY Run type
3.1e+06
2.6e+06
2.5e+06
After Wednesday
Polarizing target
Low intensity only Trigger
Trigger efficiency + CEDARs
And CO2 problem

The Beam

Mainly 2 spills in the favorite SC of 28.8 s
but sometimes
2 spills in 32.4s, 36s, 43.2s, 44.4s,
46.8s, 48.6s, 50.4s… 80.4s

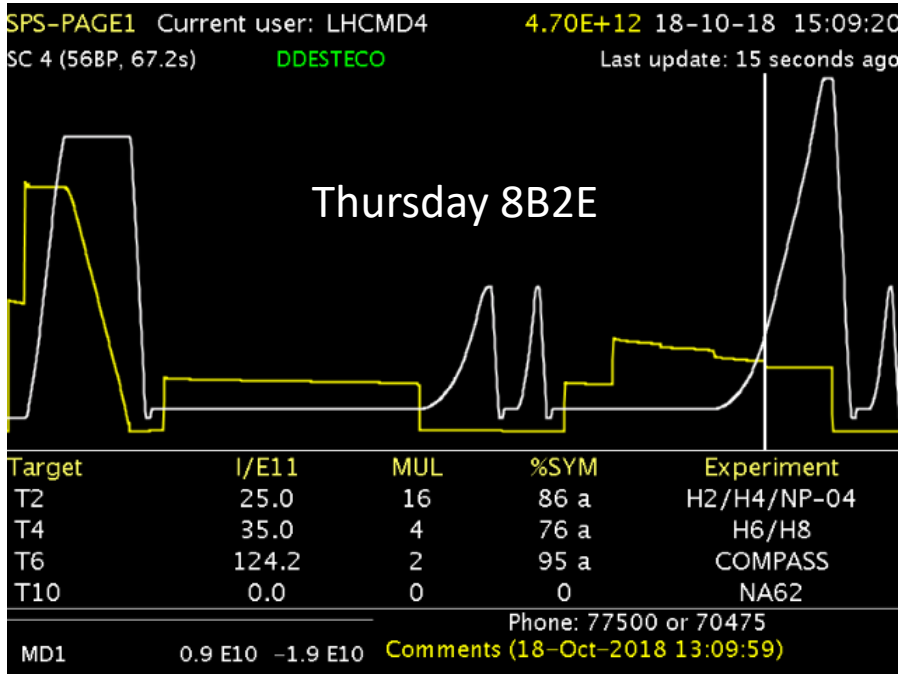


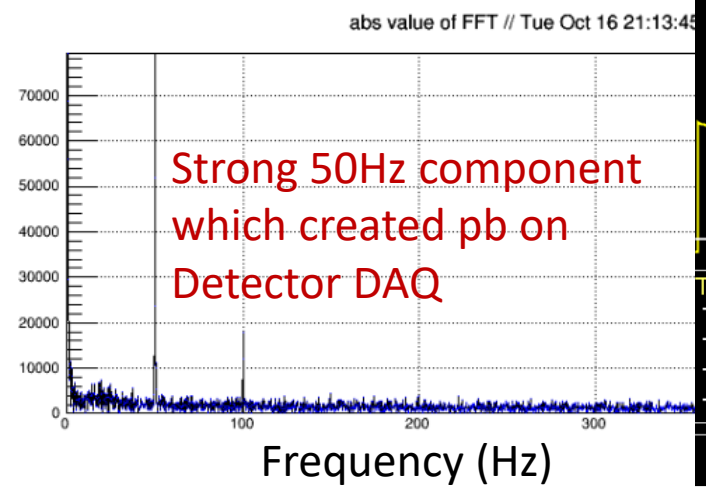


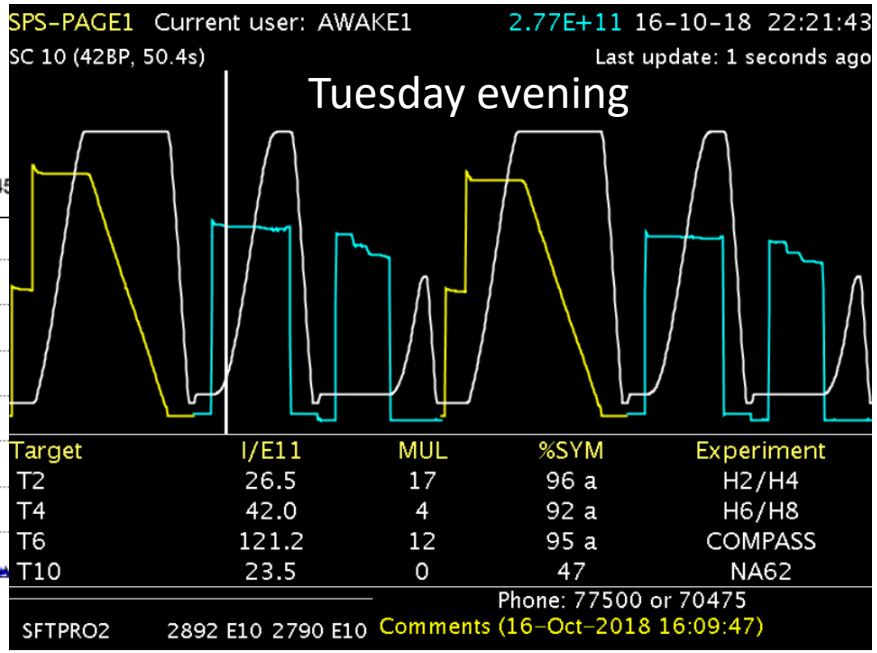


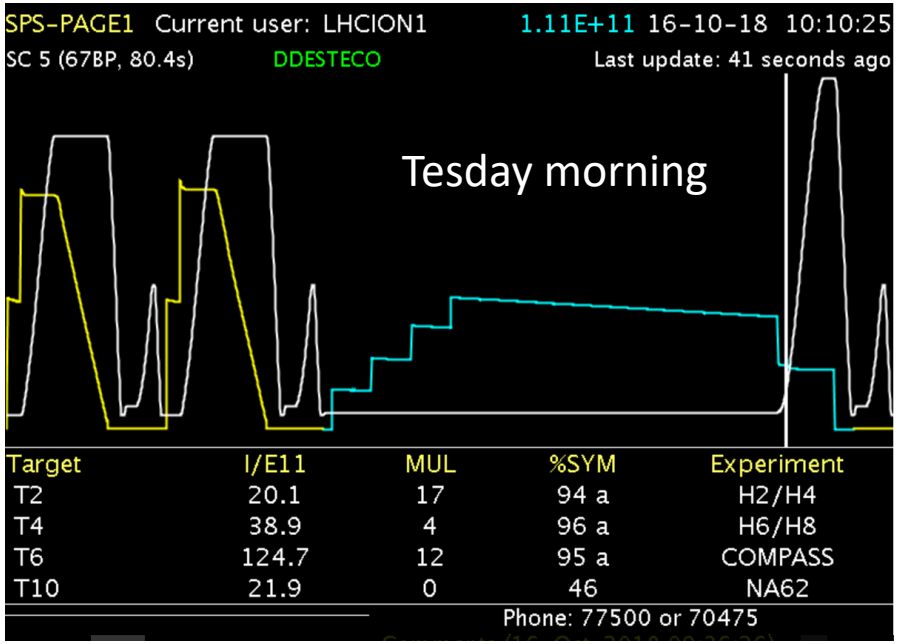
The Beam

Mainly 2 spills in the favorite SC of 28.8 s
but sometimes
2 spills in 32.4s, 36s, 43.2s, 44.4s,
46.8s, 48.6s, 50.4s… 80.4s
or 1 spill in 37.2s during LHC filling
or in 67.2s

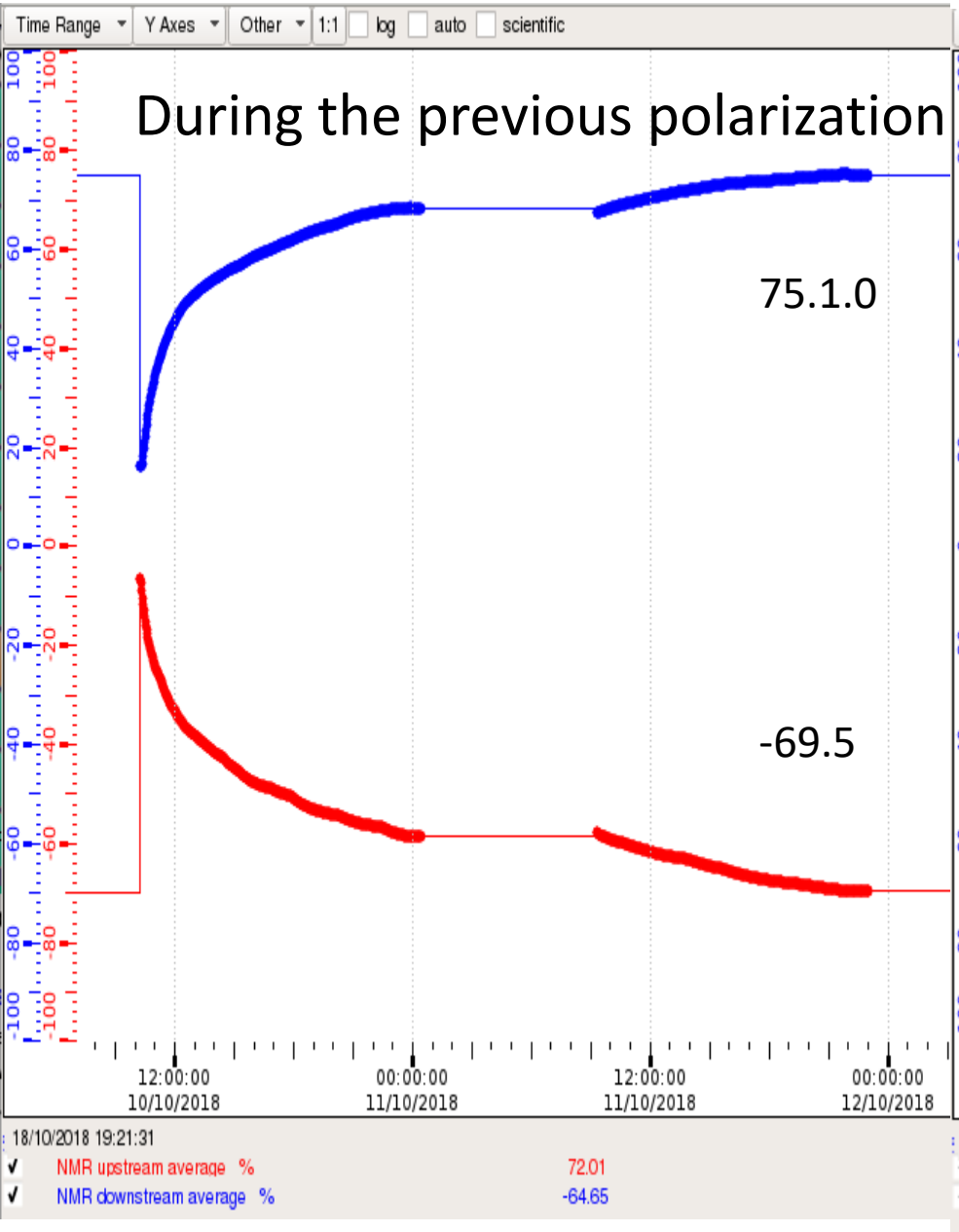


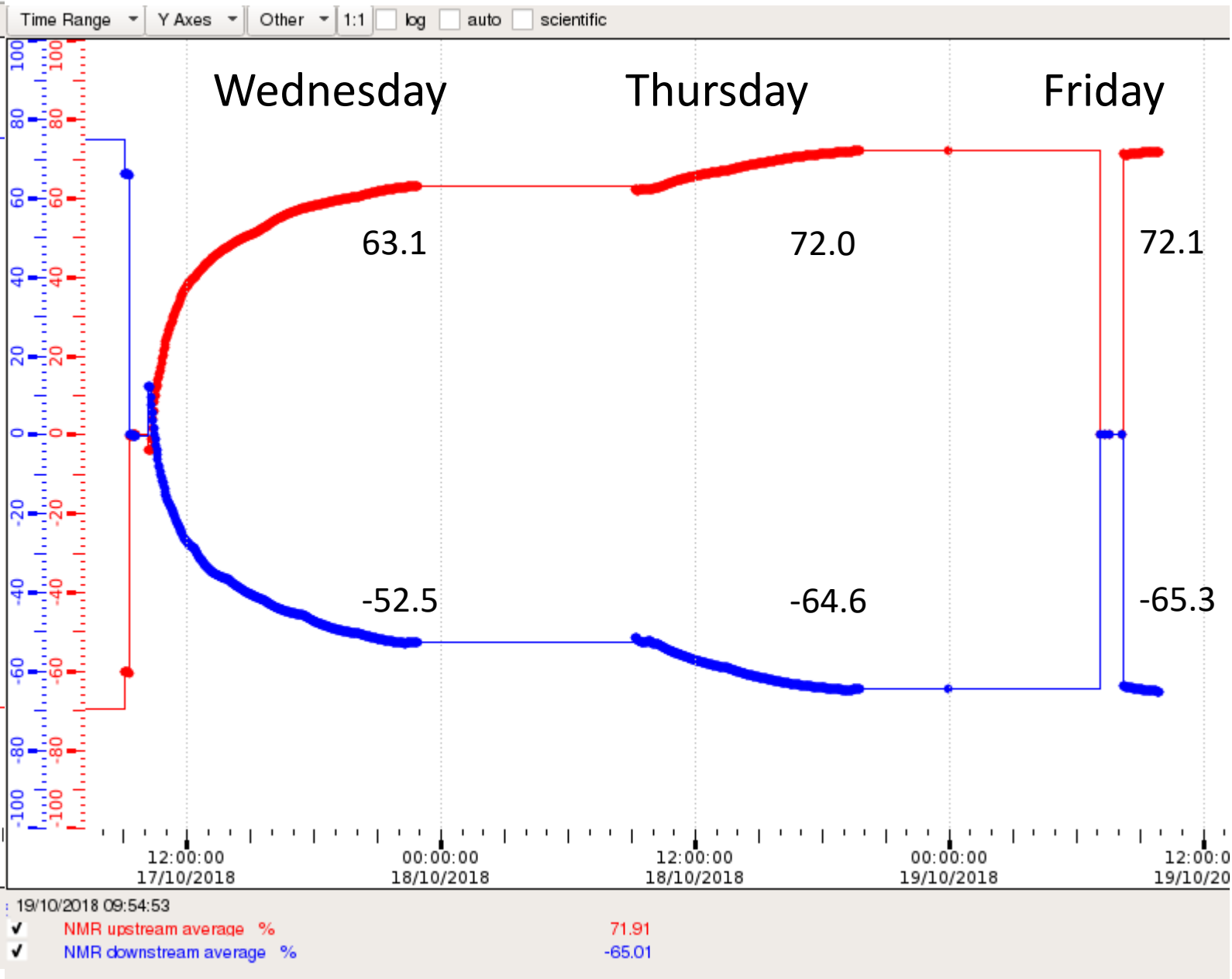






Target Polarization

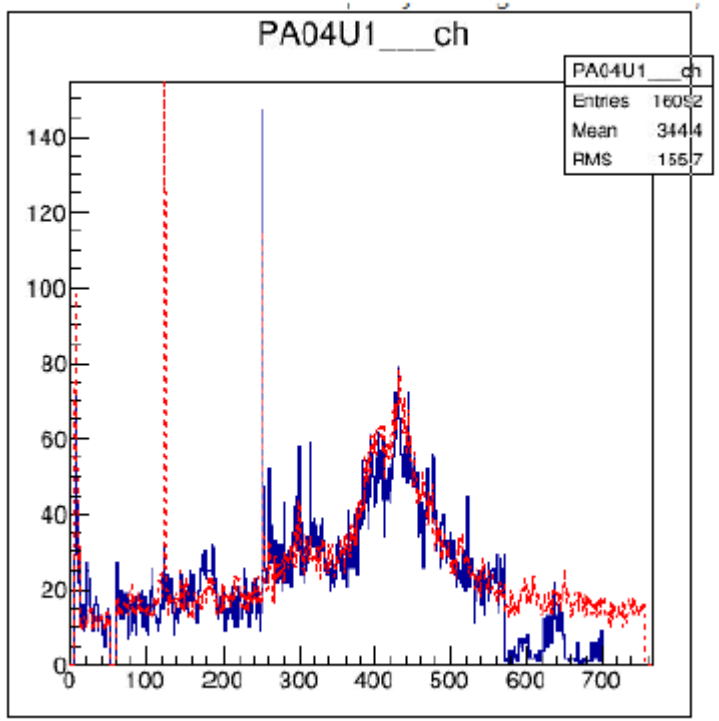


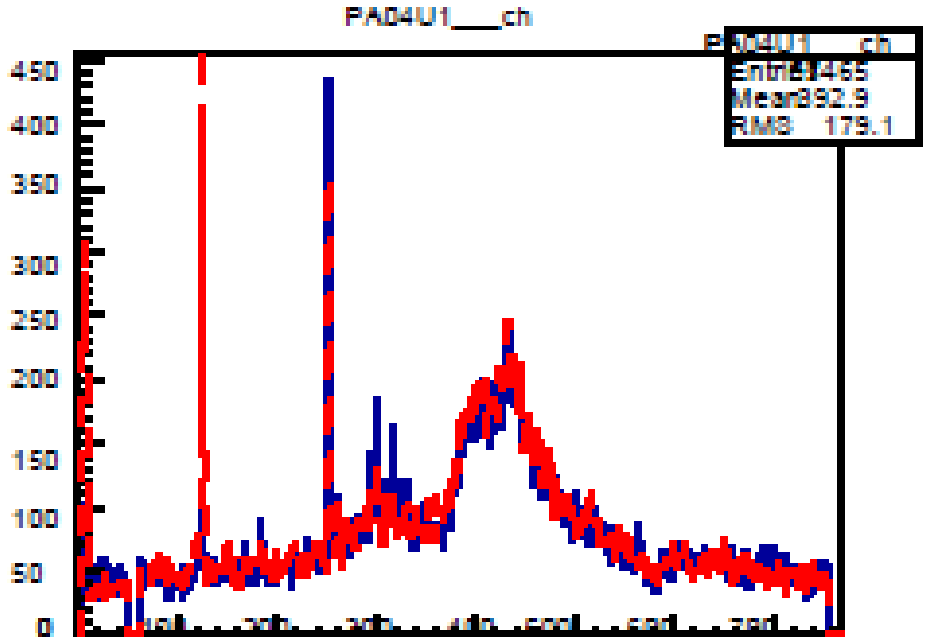


A few detector pbs

MWPC PA04 ID453

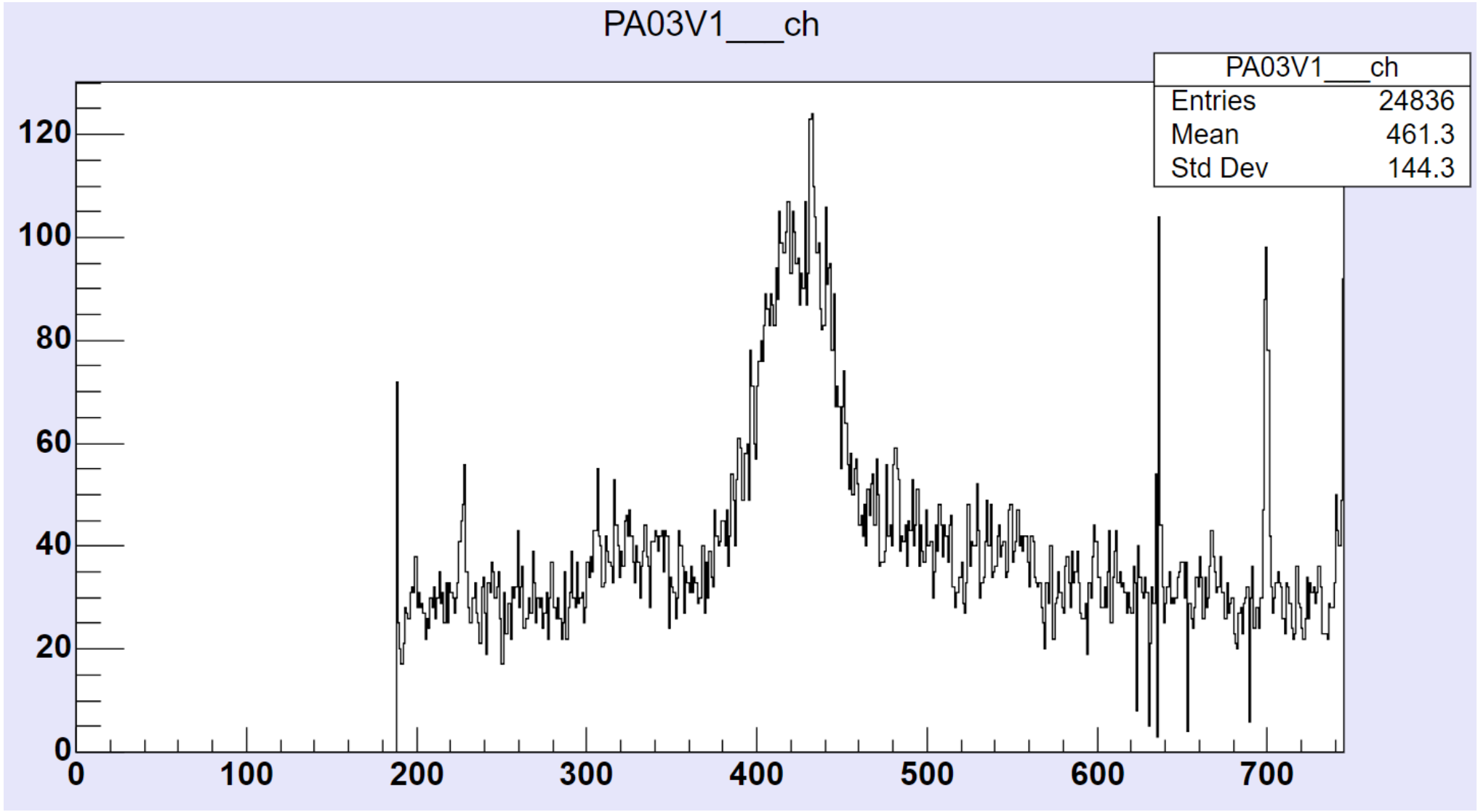
Has been Repaired on Wednesday 17 Oct before 16:00





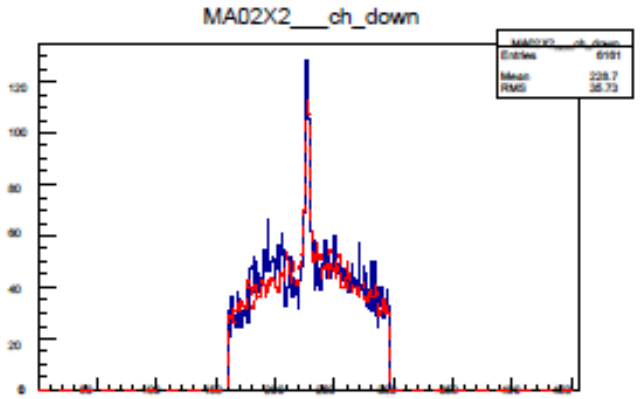
MWPC PA03 ID453

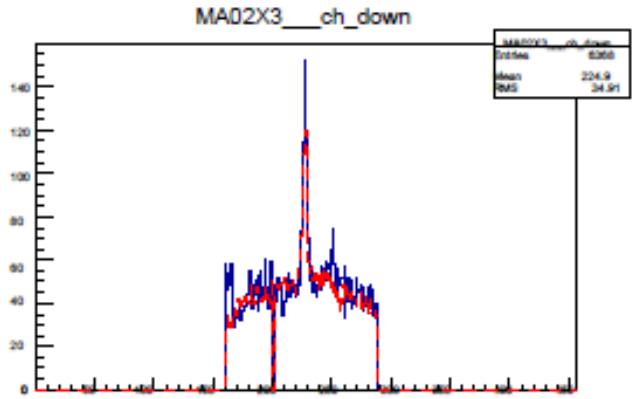
Thursday 22:00 Alexander port 0 excluded
Friday 6:00 Bogdan port 0 back in FE database



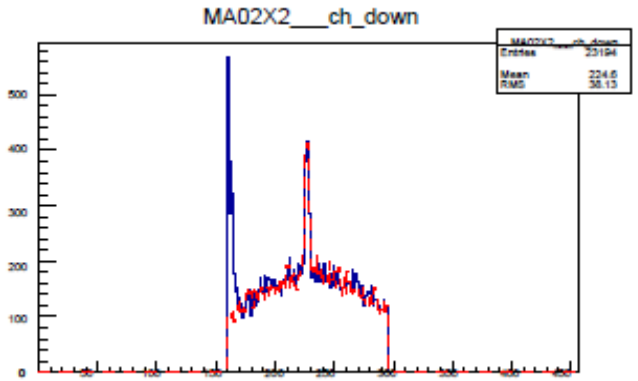
MW1 noisy channels (disappear and reappear)

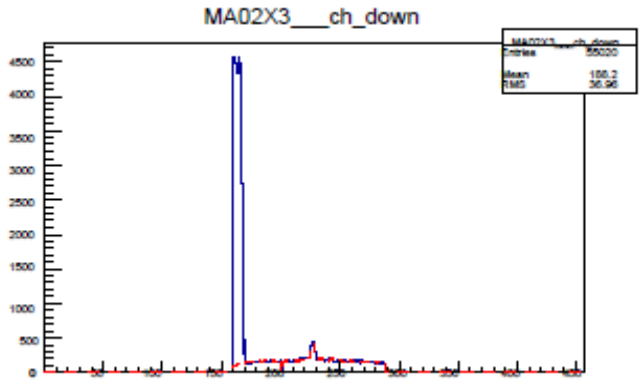
Run 286810





Run 286948

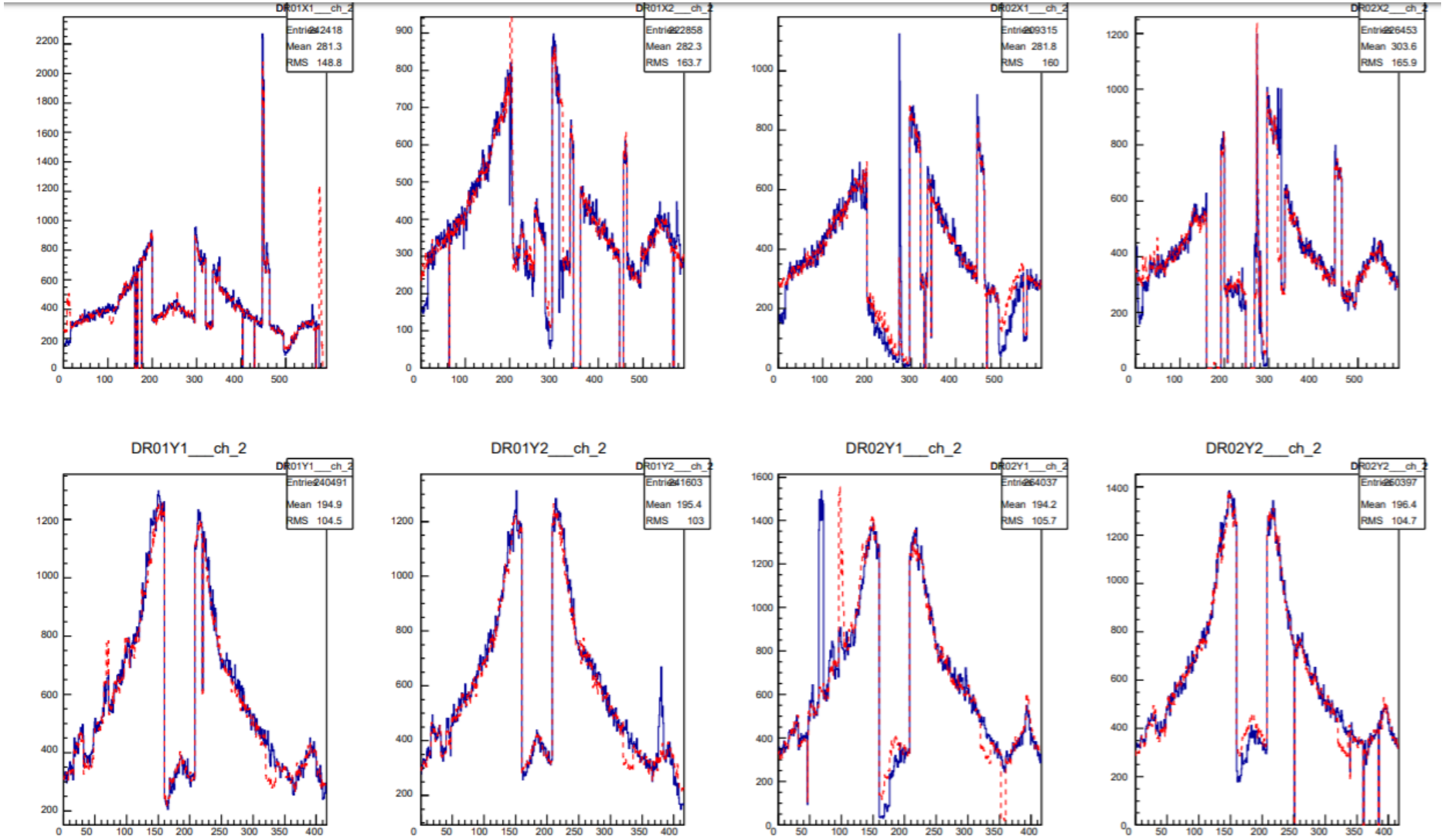




Rich Wall ID 432

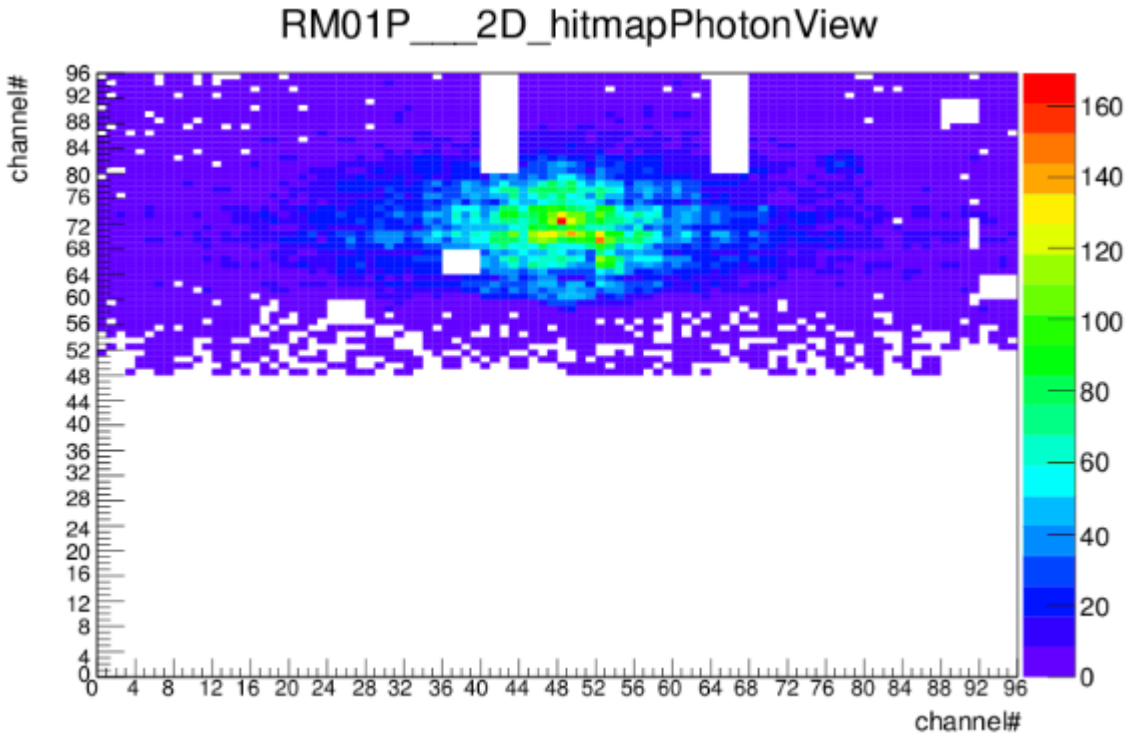
Thursday 11:33 100% errors on ID432 port 0 GeoID 6
Thursday 18:17 100% errors on ID432 port 5 GeoID 0

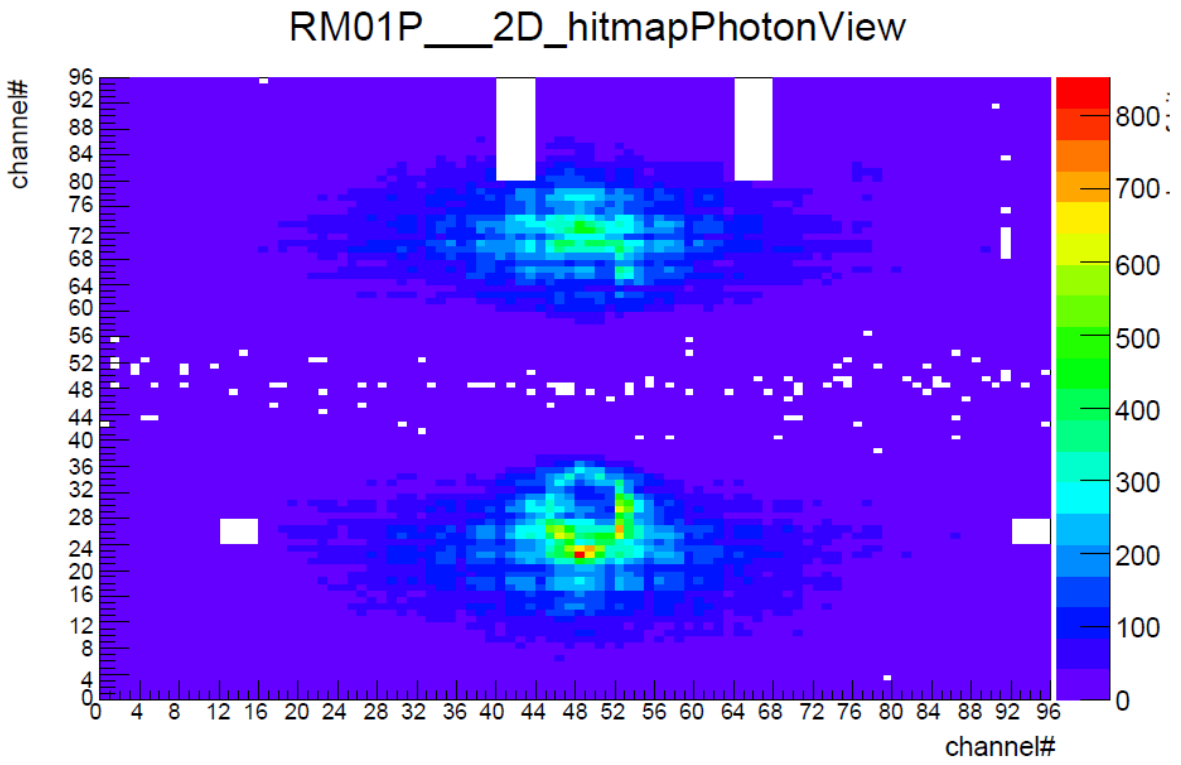
(LOAD –A 2000 help)



RICH Crate has been exchanged

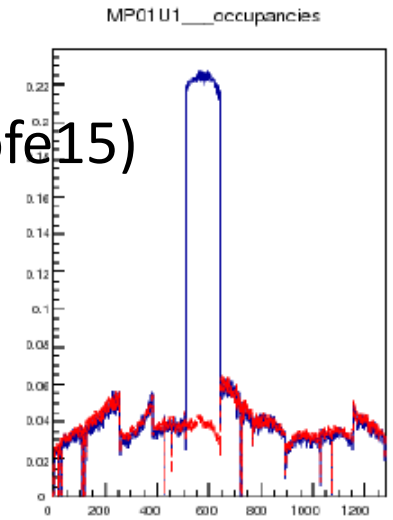
RUN 286962 Thursday 18 Oct, 23:21

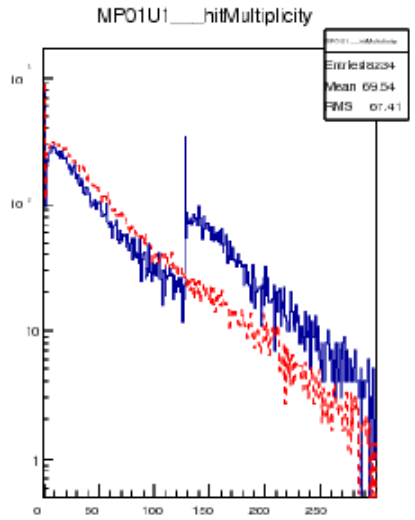


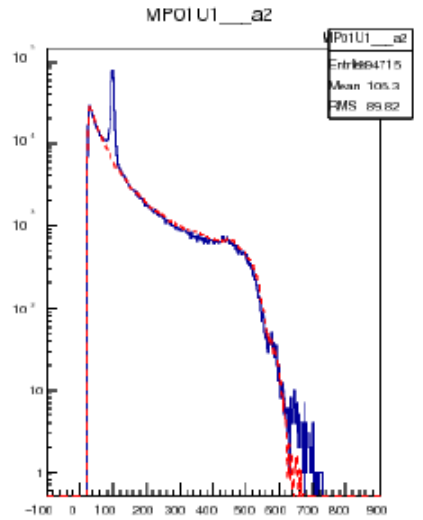


MM – Remarks For shift Crew

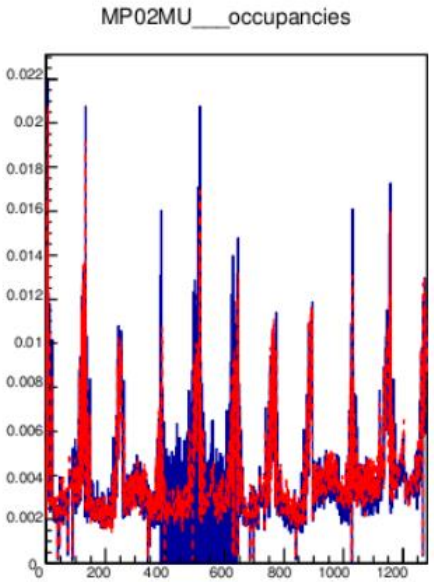
Noisy channels:
LOAD –A 380
(if I2C errors → LV power cycle;
if Config Server missing reboot pccofe15)

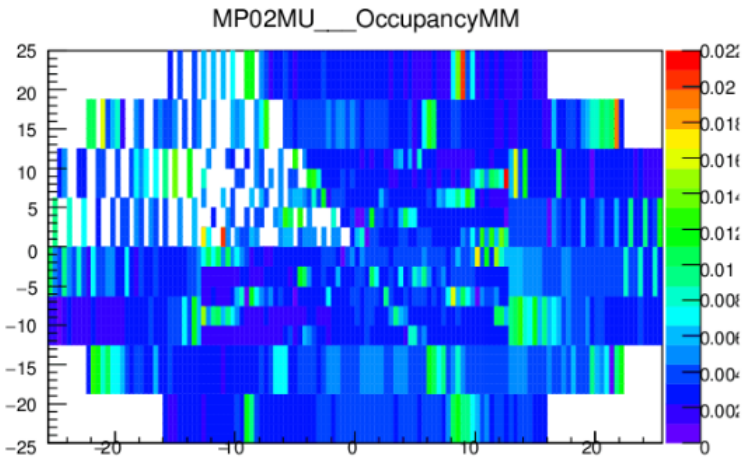




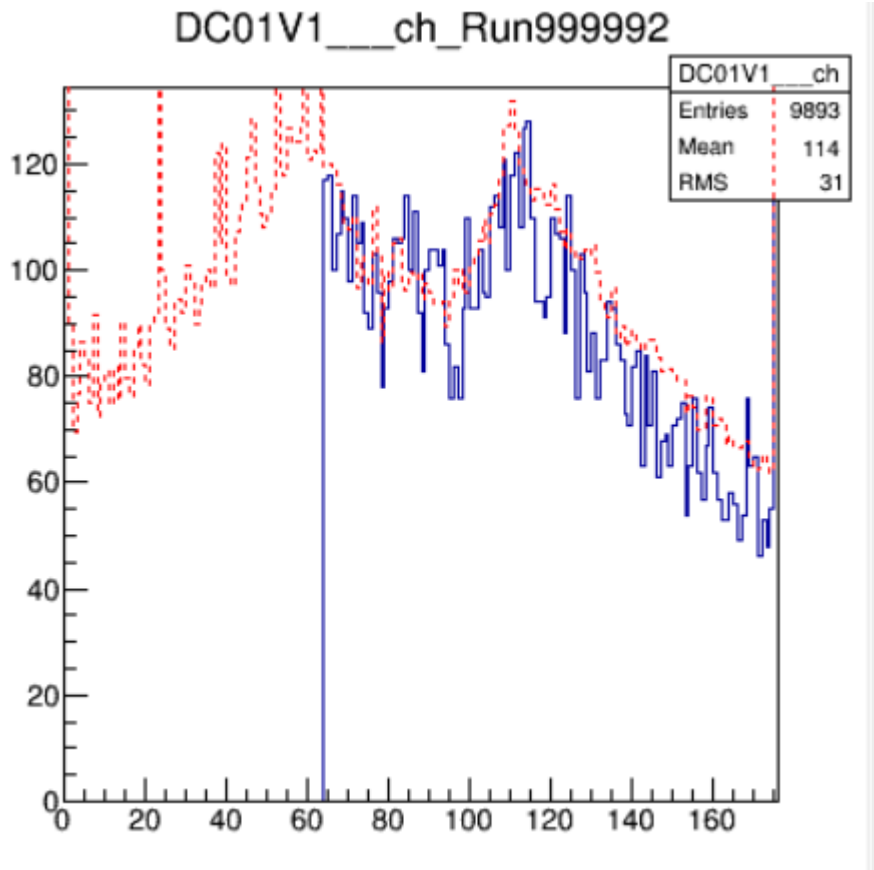


Missing Channels: LOAD –ra 381





DC00 and DC01 – Remarks For shift Crew



LOAD –A 257

(if I2C errors → LV power cycle
on BOTH ASD8 and F1 ;

if Config Server missing reboot pccofe08)

2 stations of 2 perpendicular wires added to the proton radius measurement setup

→ see Christian's Talk

The situation day by day
is presented in the spare slides

Thanks to the shift crews
and to the detector and target experts

A great thank to Vincent, Michael, Christophe,
Annika, Moritz, Johannes...

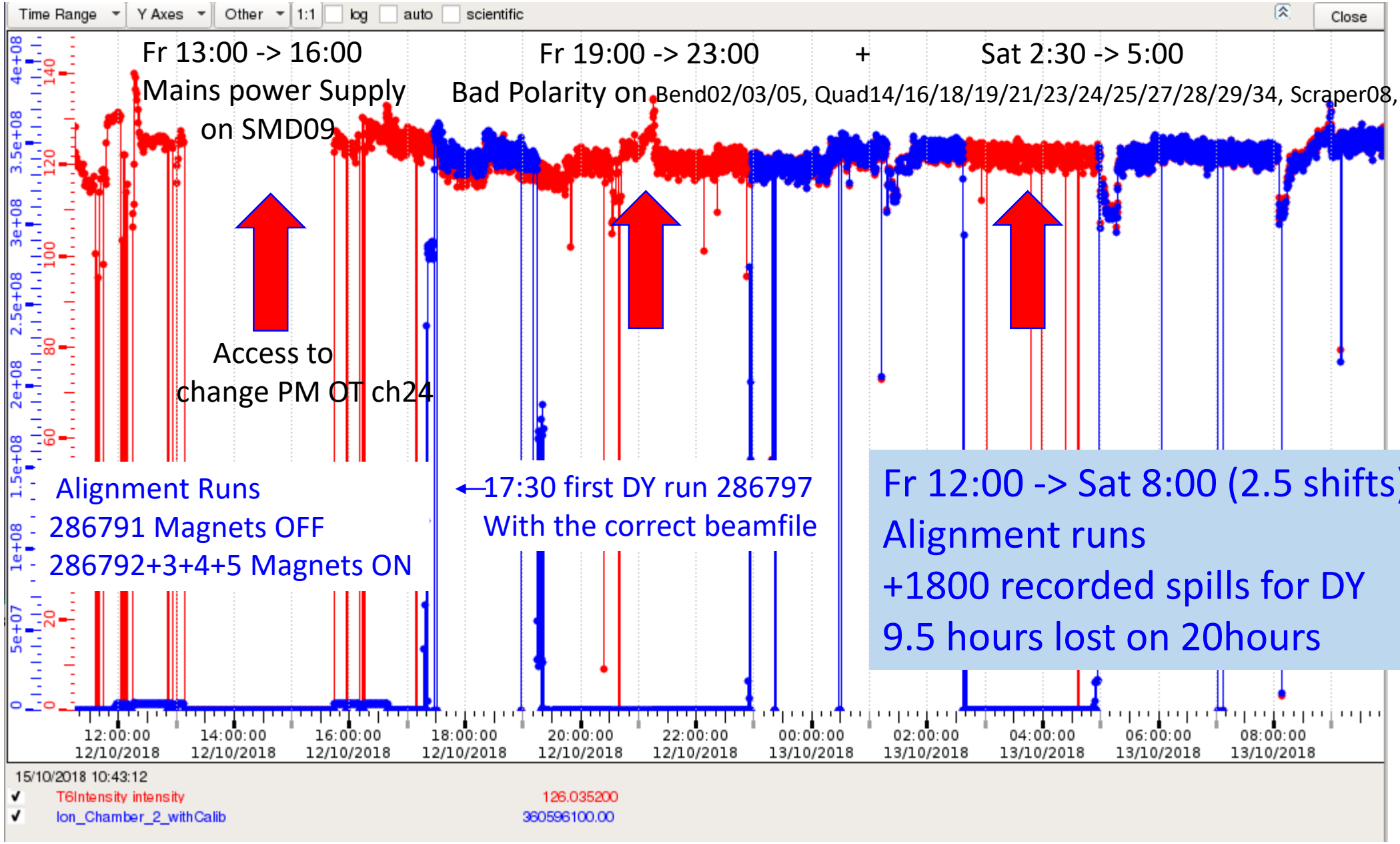
Good Luck to Robert!
(Take care of the manip but also of your health)

A short sumary from Friday 12 October 12:00

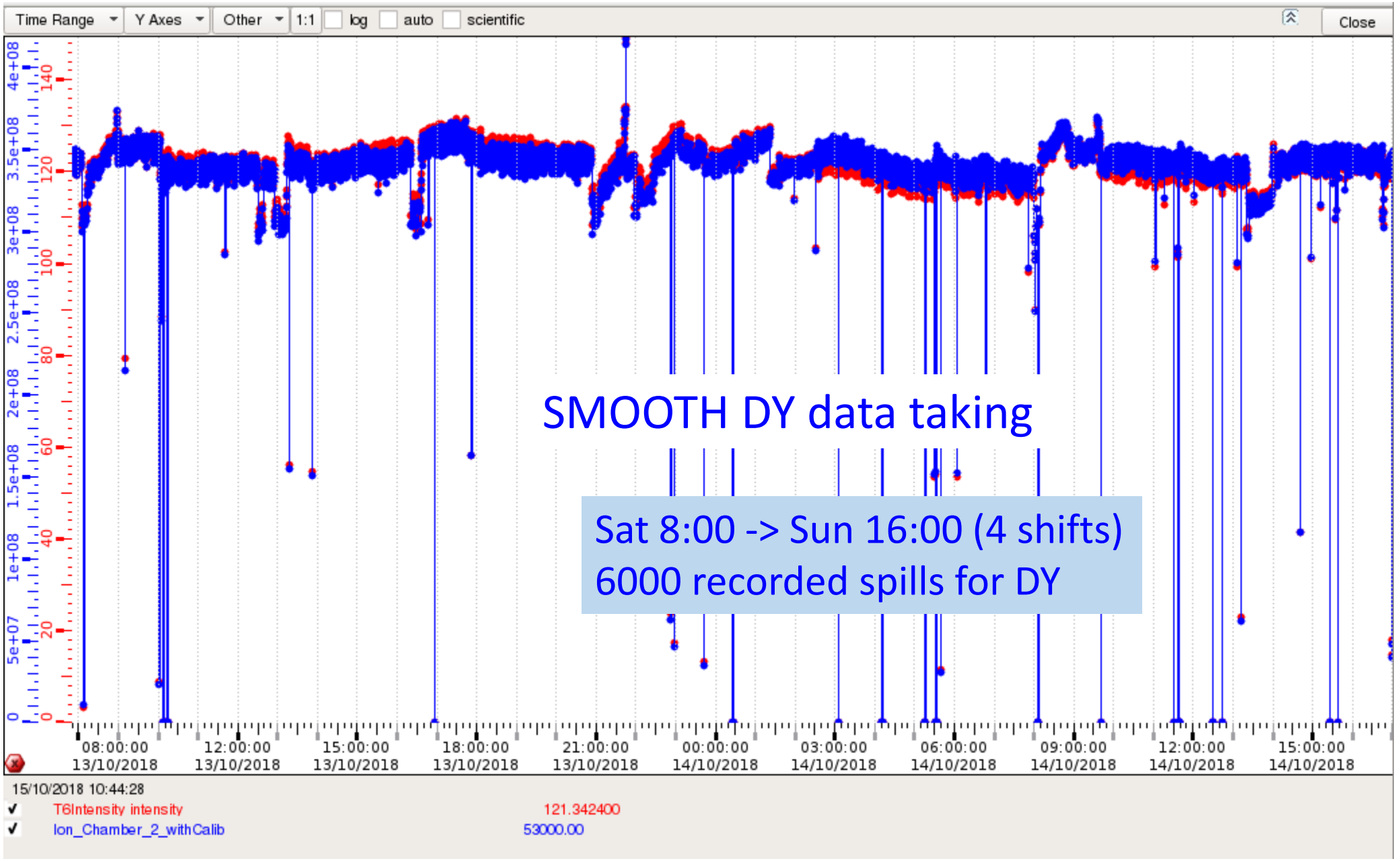
- ✓ From Friday 12:00 to Saturday 8:00 - pb on the beam 9.5 hours lost on 20hours
- ✓ From Saturday 8:00 until Sunday 16:00 – good beam and good data taking
- ✓ From Saturday 16:00 until Monday 16:00 – one pb on the beam (1h) and a few detector pb

As usual mainly 2 spills in the favorite SC of 28.8 s
but sometimes 2 spills in 32.4s, 36s, 43.2s, 44.4s, 46.8s, 48.6s, 50.4s… 80.4s
and 1 spill in 37.2s during LHC filling

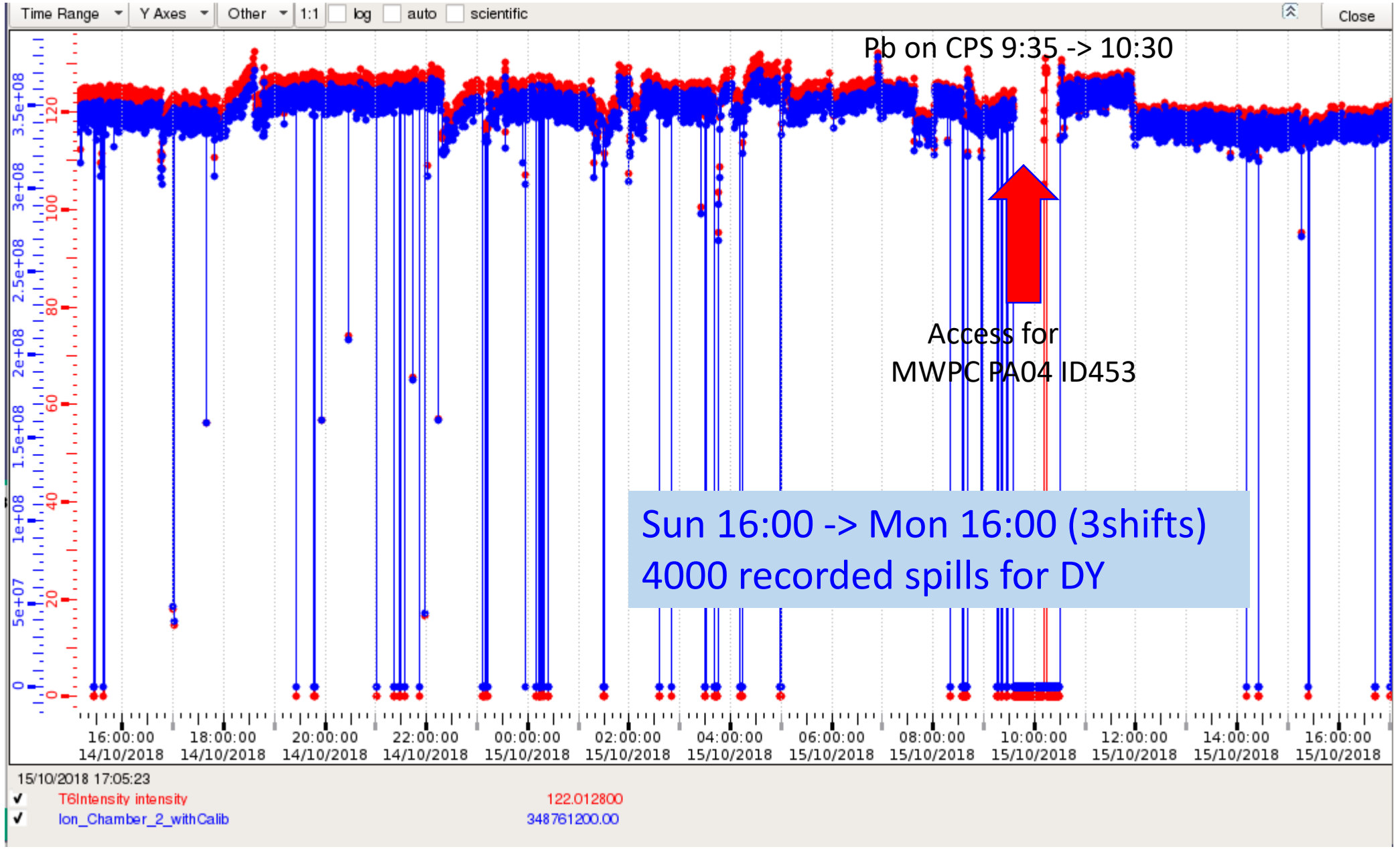
From Friday 12 Oct 12:00 to Saturday 13 Oct 8:00



From Saturday 13 Oct 8:00 to Sunday 14 Oct 16:00



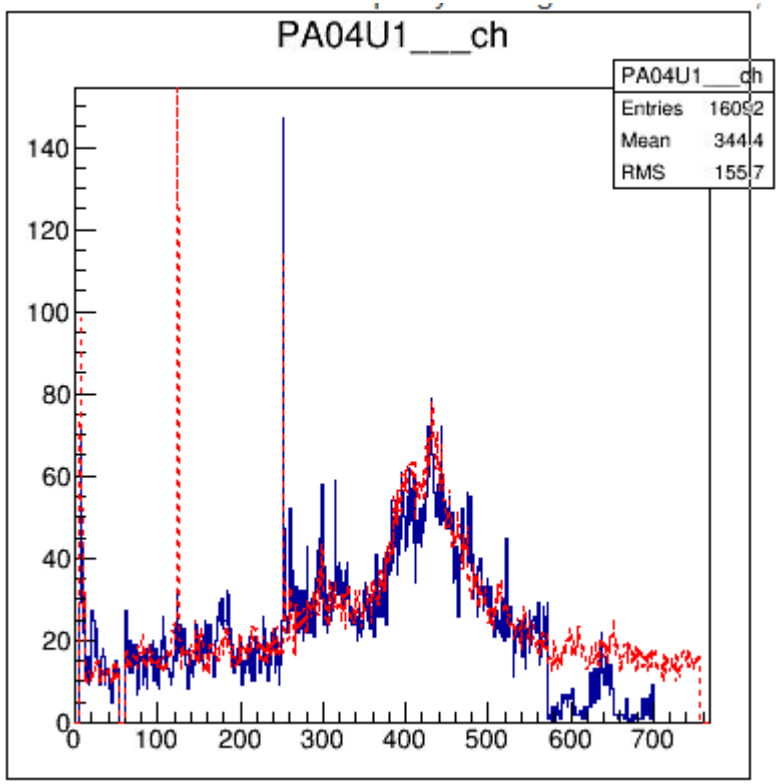
From Sunday 14 Oct 16:00 to Monday 15 Oct 16:00



A few detector problems

MWPC PA04 ID453

On Monday night and morning MWPC PA04 ID 453 persisting errors



This was fixed by Bogdan Vasilishin during an access this morning
One card lost LV connection)

And several reloads

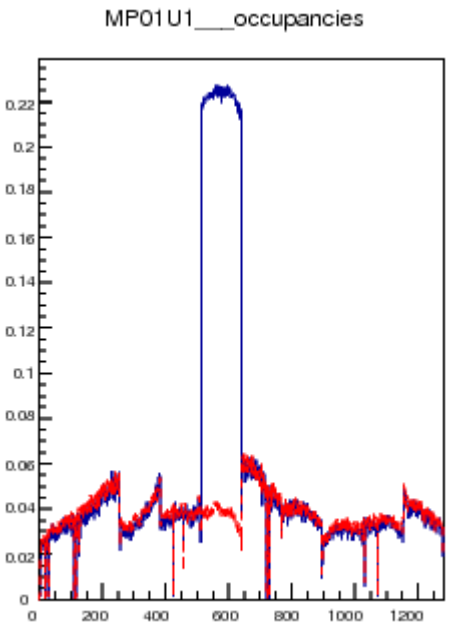
And after 13:00 again the pb

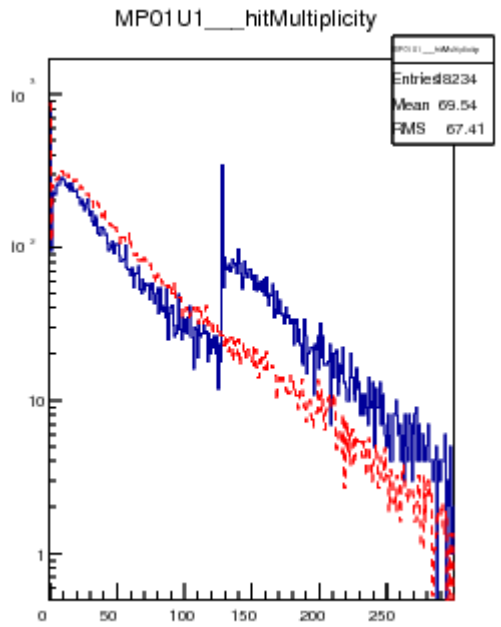
MM01 ID 380

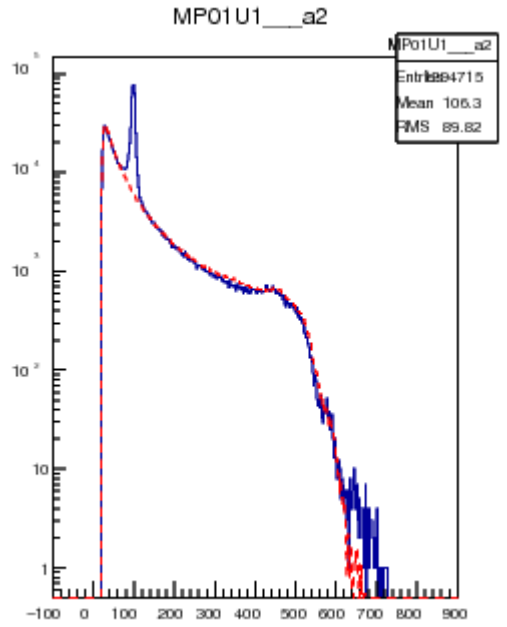
Rainer's comment: noisy MM01 380 but no errors in MurphyTV

Rainer's recipe: As reloading (LOAD -ra 380) did not fix the problem,
we power-cycled the LV.
After that LOAD -ra 380 (stated on the whiteboard) did not solve the problem,
however, LOAD -zRCpdrat 380 (given in the instruction folder) did.

Damien's recipe: LOAD –A 380 and (LV power cycle in case)







MW2 ID 416

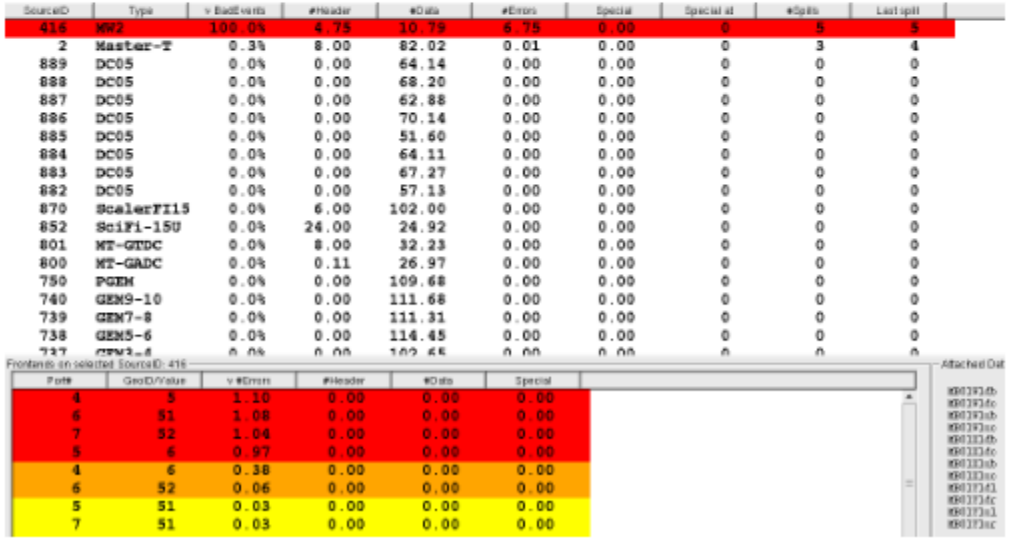
62297	R. Joosten	Mon 15 October 2018, 05:13	MW2	MW2 ok again

Problem in the end solved by reloading very often

Refers to #62296

62296	R. Joosten	Mon 15 October 2018, 04:51	MW2	100% errors on SrcId 416

So far reload did not help.



SourceID	Type	v BadEvents	#Header	#Data	#Errors	Special	Special id	#Splits	Last split
416	MW2	100.0%	4.75	10.79	6.75	0.00	0	5	5
2	Master-T	0.3%	8.00	82.02	0.01	0.00	0	3	4
889	DC05	0.0%	0.00	64.14	0.00	0.00	0	0	0
888	DC05	0.0%	0.00	68.20	0.00	0.00	0	0	0
887	DC05	0.0%	0.00	62.88	0.00	0.00	0	0	0
886	DC05	0.0%	0.00	70.14	0.00	0.00	0	0	0
885	DC05	0.0%	0.00	51.60	0.00	0.00	0	0	0
884	DC05	0.0%	0.00	64.11	0.00	0.00	0	0	0
883	DC05	0.0%	0.00	67.27	0.00	0.00	0	0	0
882	DC05	0.0%	0.00	57.13	0.00	0.00	0	0	0
870	ScalerFI15	0.0%	6.00	102.00	0.00	0.00	0	0	0
852	SciFi-15U	0.0%	24.00	24.92	0.00	0.00	0	0	0
801	MT-GEDC	0.0%	8.00	32.23	0.00	0.00	0	0	0
800	MT-GADC	0.0%	0.11	26.97	0.00	0.00	0	0	0
750	PGEM	0.0%	0.00	109.68	0.00	0.00	0	0	0
740	GEM9-10	0.0%	0.00	111.68	0.00	0.00	0	0	0
739	GEM7-8	0.0%	0.00	111.31	0.00	0.00	0	0	0
738	GEM5-6	0.0%	0.00	114.45	0.00	0.00	0	0	0
737	GEM3-4	0.0%	0.00	102.65	0.00	0.00	0	0	0

Frontends on selected SourceID: 416

Port#	GeoID/Value	v #Errors	#Header	#Data	Special
4	5	1.10	0.00	0.00	0.00
6	51	1.08	0.00	0.00	0.00
7	52	1.04	0.00	0.00	0.00
5	6	0.97	0.00	0.00	0.00
4	6	0.38	0.00	0.00	0.00
6	52	0.06	0.00	0.00	0.00
5	51	0.03	0.00	0.00	0.00
7	51	0.03	0.00	0.00	0.00

Attached Dat

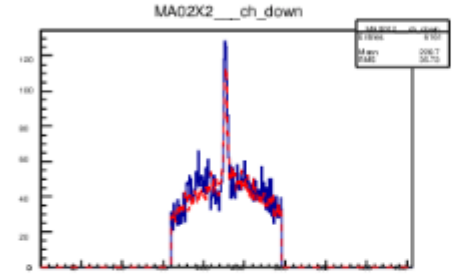
Referred by #62297

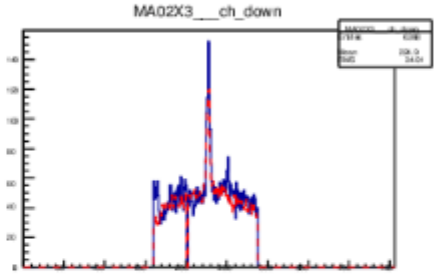
MW1 noisy channels

62290	R.Kurjata	Sat 13 October 2018, 16:34	MW1	MA02X{2,3} noisy (again)

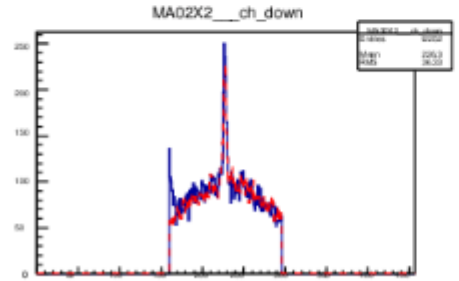
Was fine on run 286810, now noisy again on run 286819

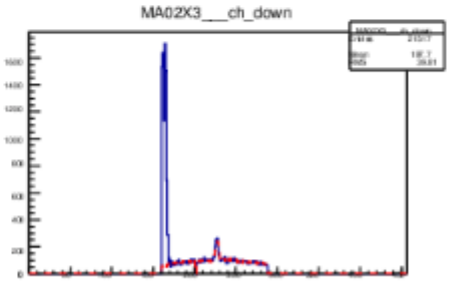
run: 286810





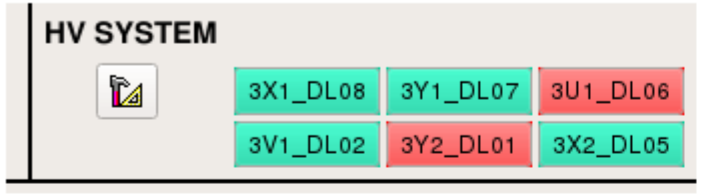
286819





Straw HV trips

62301	R. Joosten	Mon 15 October 2018, 07:02	STRAW	Trip in #U1_DL06 and 3Y2_DL01



Straw 03U1 DoubleLayer 06:

Group operation: On Off Settings Pop Window Action

Channel Name	v0(V)	vMon(V)	iMon(µA)	VMax(V)	I0(µA)	isOn	HwAlarms
St_Hv_DO8_03U1_6mm_0_PH	1640.000	1640.000	0.010	1640.000	20.000	TRUE	OK
St_Hv_DO8_03U1_6mm_1_Saleve	1640.000	1640.000	0.020	1640.000	20.000	TRUE	OK
St_Hv_DO8_03U1_6mm_2	1640.000	1640.000	5.360	1640.000	20.000	TRUE	OK
St_Hv_DO8_03U1_6mm_3	1640.000	1640.000	5.520	1640.000	20.000	TRUE	OK
St_Hv_DO8_03U1_6mm_4_Ph	1640.000	1640.000	2.700	1640.000	20.000	TRUE	OK
St_Hv_DO8_03U1_6mm_5	1640.000	1640.000	6.260	1640.000	20.000	TRUE	OK
St_Hv_DO8_03U1_6mm_6	1640.000	1640.000	5.640	1640.000	20.000	TRUE	OK
St_Hv_DO8_03U1_6mm_7_Jura	1640.000	1640.000	4.700	1640.000	20.000	TRUE	OK
St_Hv_DO8_03U1_10mm_Saleve	1780.000	8.000	0.000	1780.000	20.000	FALSE	OK

Straw 03Y2 DoubleLayer 01:

Group operation: On Off Settings Pop Window Action

Channel Name	v0(V)	vMon(V)	iMon(µA)	VMax(V)	I0(µA)	isOn	HwAlarms
St_Hv_DO1_03Y2_6mm_0_PH	1640.000	1640.000	3.480	1640.000	20.000	TRUE	OK
St_Hv_DO1_03Y2_6mm_1_BOTTOM	1640.000	1640.000	3.220	1640.000	20.000	TRUE	OK
St_Hv_DO1_03Y2_6mm_2	1640.000	1640.000	5.030	1640.000	20.000	TRUE	OK
St_Hv_DO1_03Y2_6mm_3_PH	1640.000	1640.000	6.160	1640.000	20.000	TRUE	OK
St_Hv_DO1_03Y2_6mm_4_PH	1640.000	1640.000	5.780	1640.000	20.000	TRUE	OK
St_Hv_DO1_03Y2_6mm_5	1640.000	1640.000	4.780	1640.000	20.000	TRUE	OK
St_Hv_DO1_03Y2_6mm_6_TOP	1640.000	1640.000	4.230	1640.000	20.000	TRUE	OK
Notused1	1640.000	1640.000	0.030	1780.000	20.000	TRUE	OK
Notused2	1640.000	1640.000	0.060	1780.000	20.000	TRUE	OK
St_Hv_DO1_03Y2_10mm_BOTTOM	1780.000	1780.000	0.140	1780.000	20.000	TRUE	OK
St_Hv_DO1_03Y2_10mm_1	1780.000	1780.000	0.020	1780.000	20.000	TRUE	OK
St_Hv_DO1_03Y2_10mm_2	1780.000	3.900	0.000	1780.000	20.000	FALSE	OK

switched HV back on and full HV is reached again

62295	R. Joosten	Mon 15 October 2018, 02:22	STRAW

X1 DoubleLayer 08:

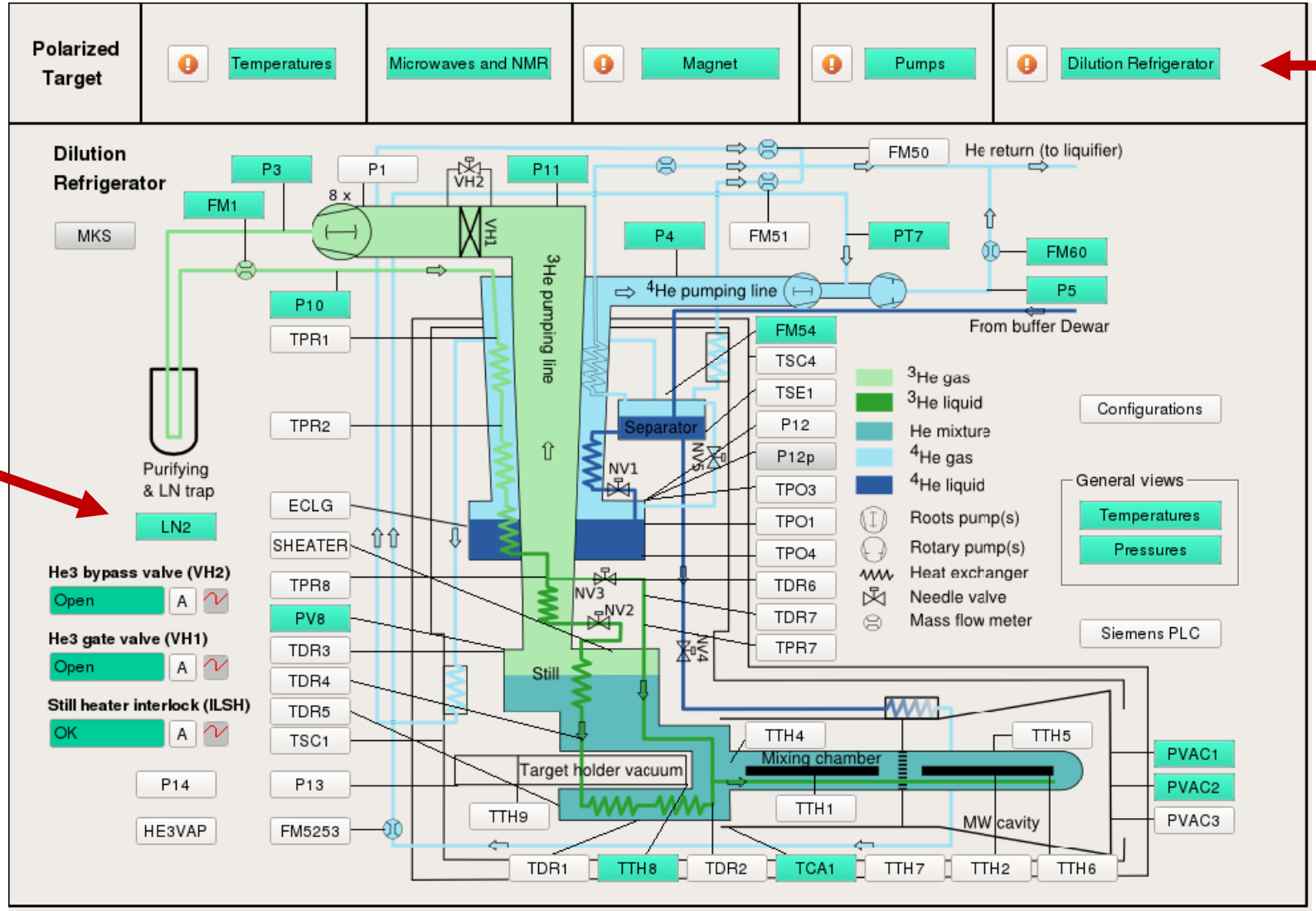
eration: Off ngs ndow on

Channel Name	v0(V)	vMon(V)	iMon(µA)	VMax(V)	I0(µA)	isOn	HwAlarms
St_Hv_DO8_03X1_6mm_0_PH	1640.000	1640.100	0.010	1640.000	20.000	TRUE	OK
St_Hv_DO8_03X1_6mm_1_Saleve	1640.000	1640.000	0.080	1640.000	20.000	TRUE	OK
St_Hv_DO8_03X1_6mm_2	1640.000	1640.000	0.020	1640.000	20.000	TRUE	OK
St_Hv_DO8_03X1_6mm_3	1640.000	1640.100	0.020	1640.000	20.000	TRUE	OK
St_Hv_DO8_03X1_6mm_4_Ph	1640.000	1640.000	0.010	1640.000	20.000	TRUE	OK
St_Hv_DO8_03X1_6mm_5	1640.000	1640.000	0.020	1640.000	20.000	TRUE	OK
St_Hv_DO8_03X1_6mm_6	1640.000	1640.100	0.030	1640.000	20.000	TRUE	OK
St_Hv_DO8_03X1_6mm_7_Jura	1640.000	1640.000	0.020	1640.000	20.000	TRUE	OK
St_Hv_DO8_03X1_10mm_Saleve	1780.000	1780.000	0.010	1780.000	20.000	TRUE	OK
St_Hv_DO8_03X1_10mm_1	1780.000	1780.000	7.120	1780.000	20.000	TRUE	OK
St_Hv_DO8_03X1_10mm_2	1780.000	1780.000	7.840	1780.000	20.000	TRUE	OK
St_Hv_DO8_03X1_10mm_3	1780.000	1780.100	9.940	1780.000	20.000	TRUE	OK
St_Hv_DO8_03X1_10mm_4	1780.000	4.600	0.000	1780.000	20.000	FALSE	OK

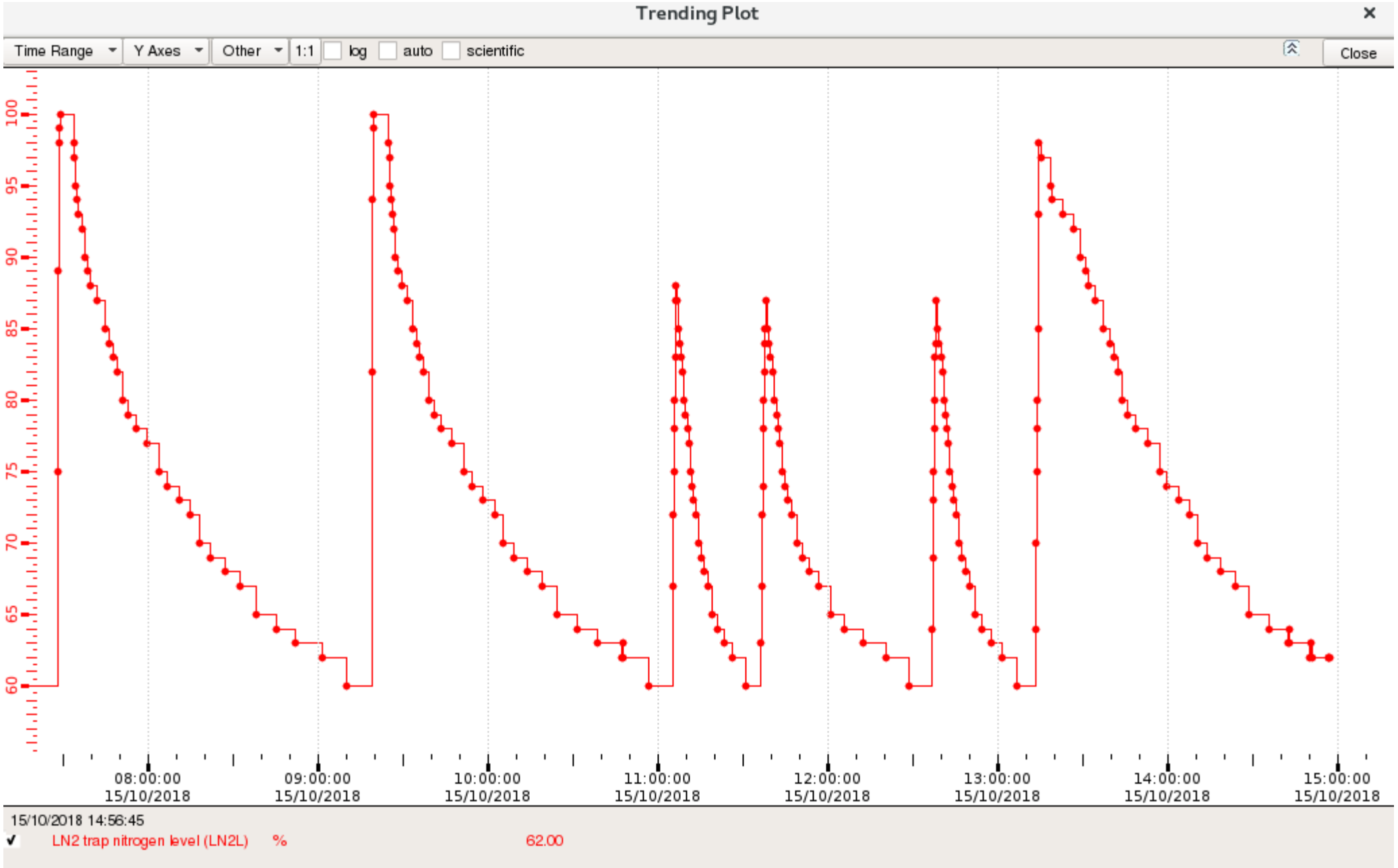
switched on again; it reaches full HV without tripping

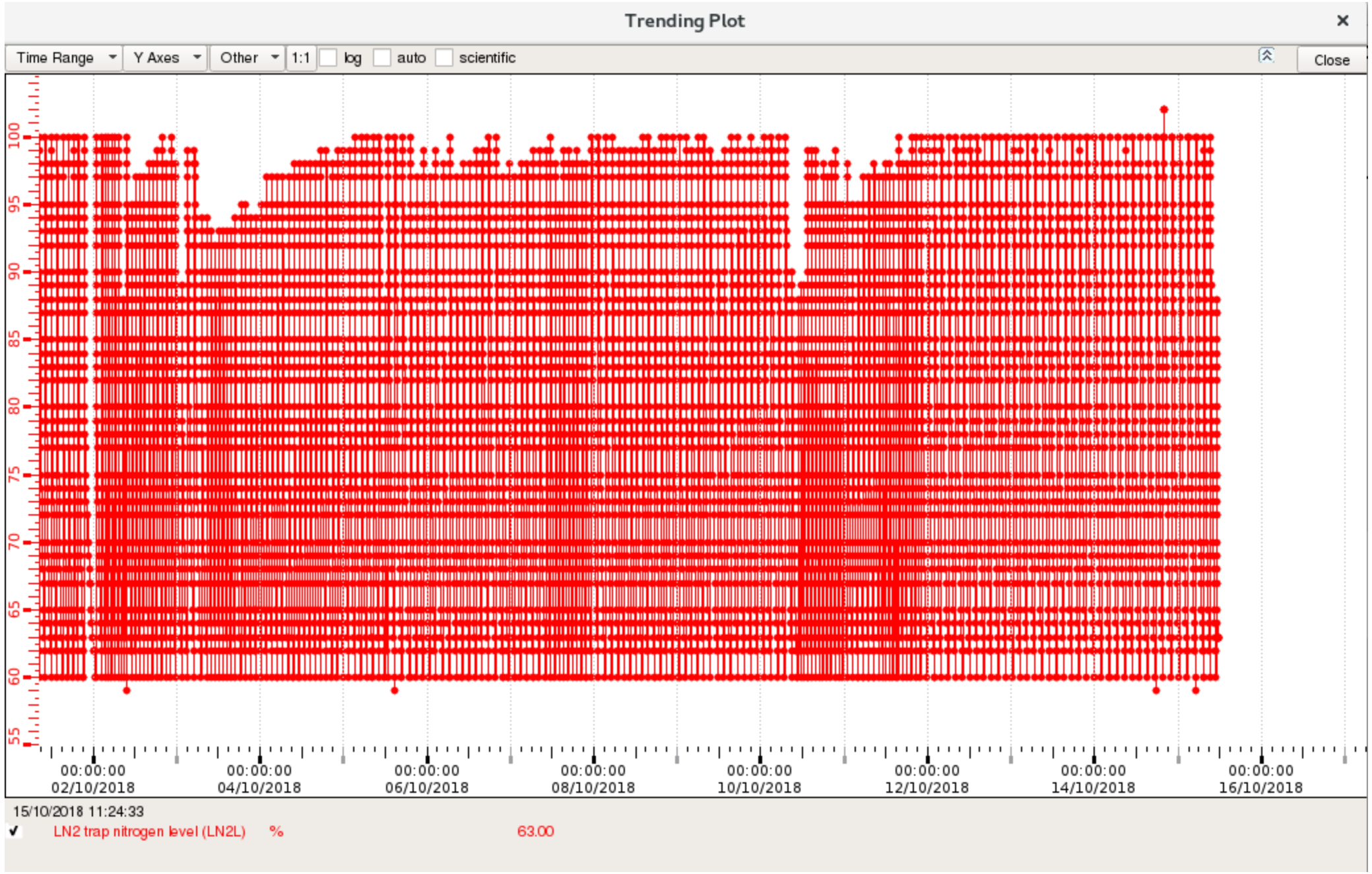
DCS: Polarized target

Trap
Nitrogen level

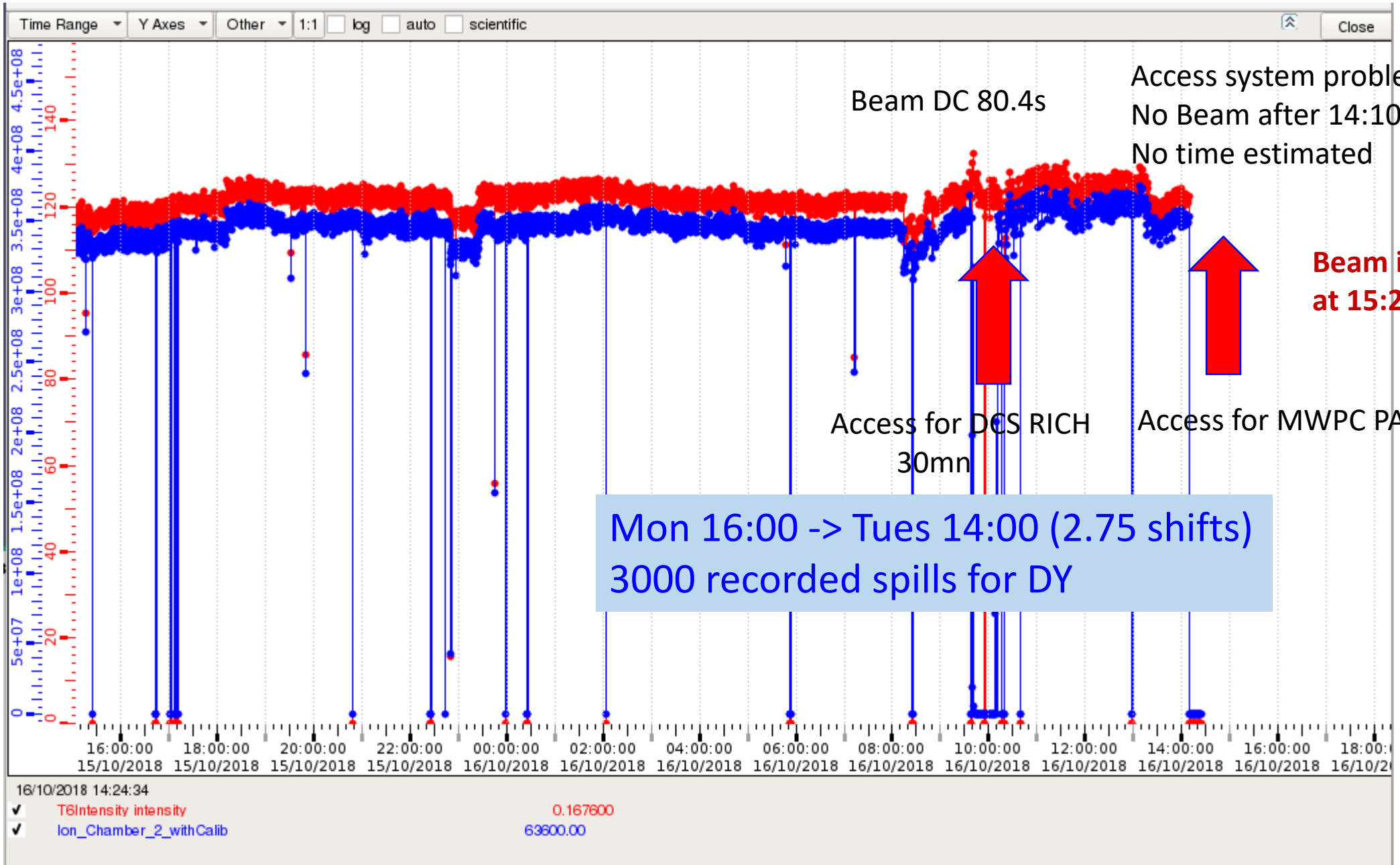


Trap Nitrogen level



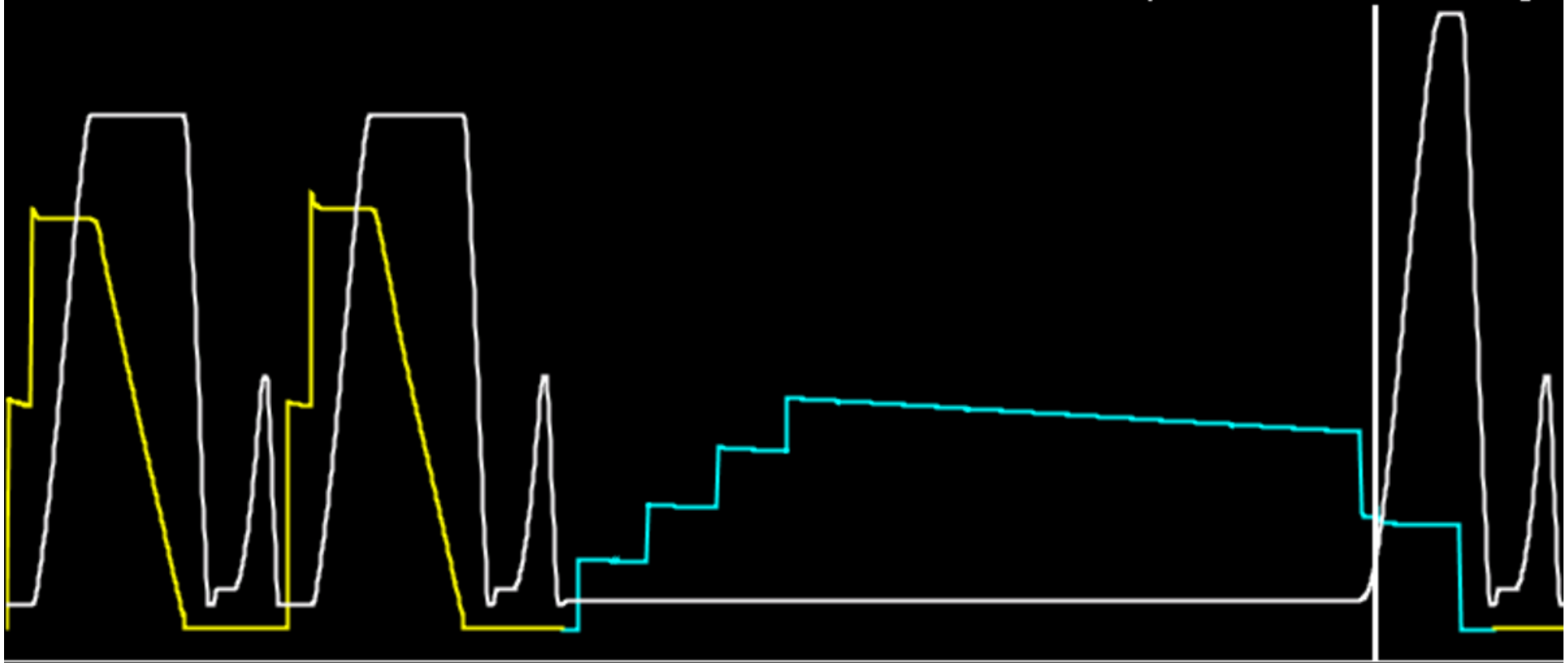

Trending Plot
Time Range
Y Axes
Other
1:1
log
auto
scientific
Close
100
95
90
85
80
75
70
65
60
55
00:00:00 02/10/2018
00:00:00 04/10/2018
00:00:00 06/10/2018
00:00:00 08/10/2018
00:00:00 10/10/2018
00:00:00 12/10/2018
00:00:00 14/10/2018
00:00:00 16/10/2018
15/10/2018 11:24:33
LN2 trap nitrogen level (LN2L) % 63.00

From Monday 15 Oct 16:00 to Tuesday 16 Oct 16:00



SPS-PAGE1 Current user: LHCION1 1.11E+11 16-10-18 10:10:25

SC 5 (67BP, 80.4s) DDESTECO Last update: 41 seconds ago



Target	I/E11	MUL	%SYM	Experiment
T2	20.1	17	94 a	H2/H4
T4	38.9	4	96 a	H6/H8
T6	124.7	12	95 a	COMPASS
T10	21.9	0	46	NA62

Phone: 77500 or 70475

Last problem just now from 15:17 to 15:37 Gas problem

(Ar line switched to another line on battery-

we will be back on the normal line on Friday – impurity O2, H2O…too large fracton of C2H6 or not?

Drop of Ar flow for a couple of minutes during the rerouting of the Ar flow.

PLC was reset for DCs as it was in alarm.

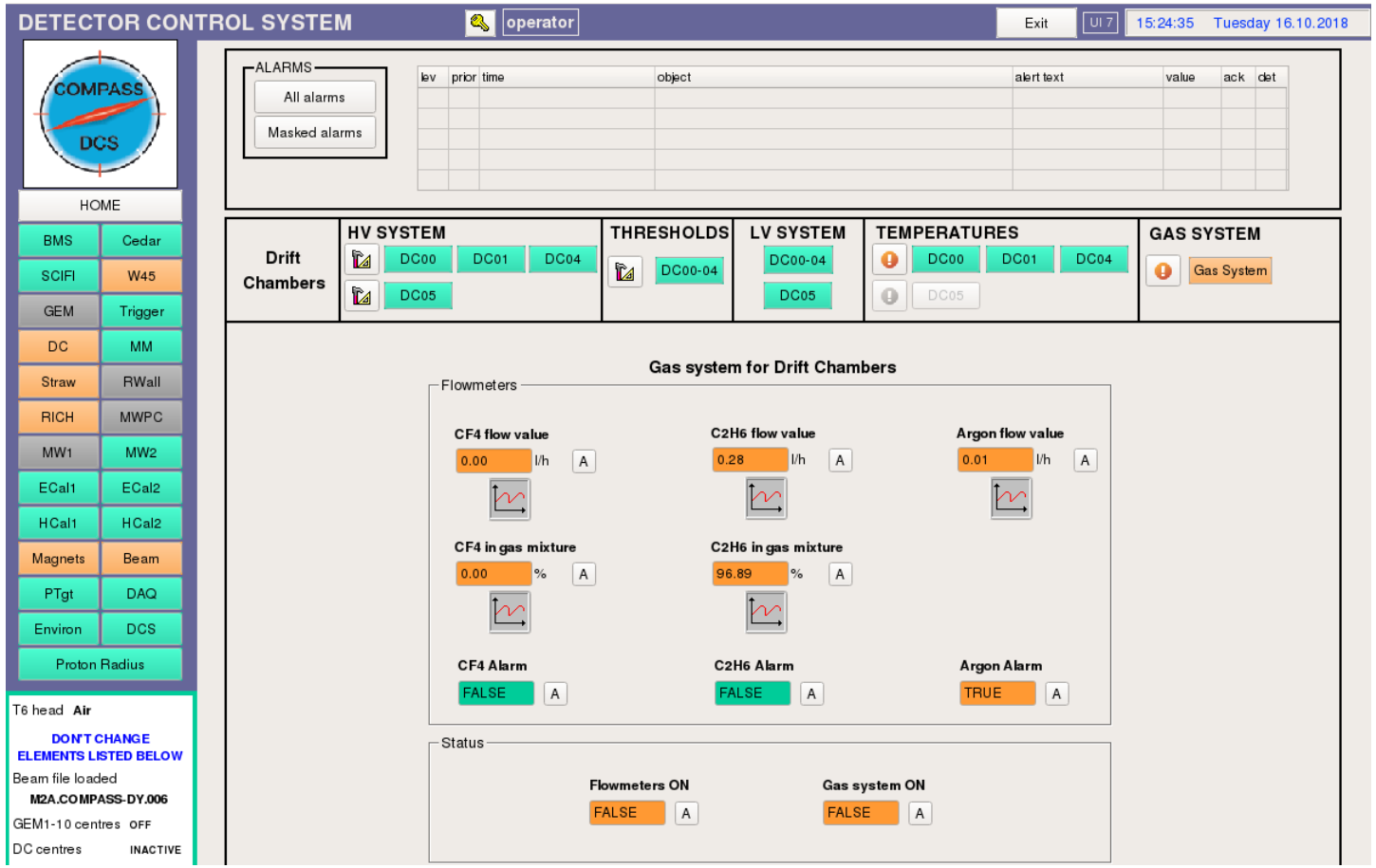
+ SM2 tripped

+ Bend4-5-6

Quad34 MIB03

Tripped (Water cooling pb in the NA)

+ T6?



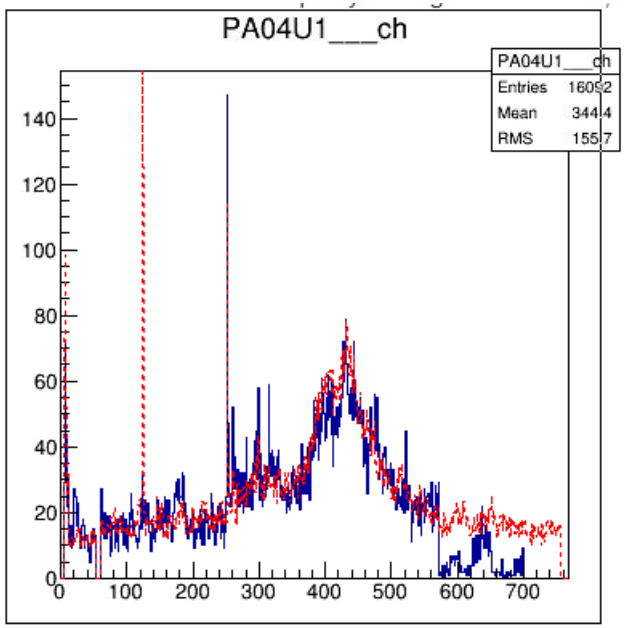
A few problems

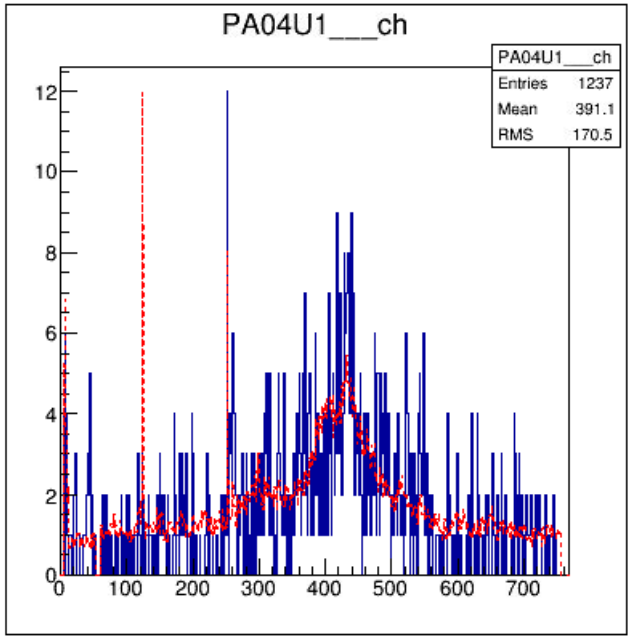
- ✓ DAQ: IP-BUS network switch hang - Power cycle of the switch solved the problem (Vladimir F.)

- ✓ DC05 100% errors - Reload IDs 882 883 884 885 886 887 888 889
- ✓ DC01 - ID 257 port 5 - 100% errors - Reload

- ✓ MWPC PA04 ID 453 – one time the missing channels were back after an ultilate reload attempt…. But only for 30mn
- ✓ MWPC PA05 ID 452 – reload successful

- ✓ RW ID 432 errors – a reload is only necessary at the end of the run



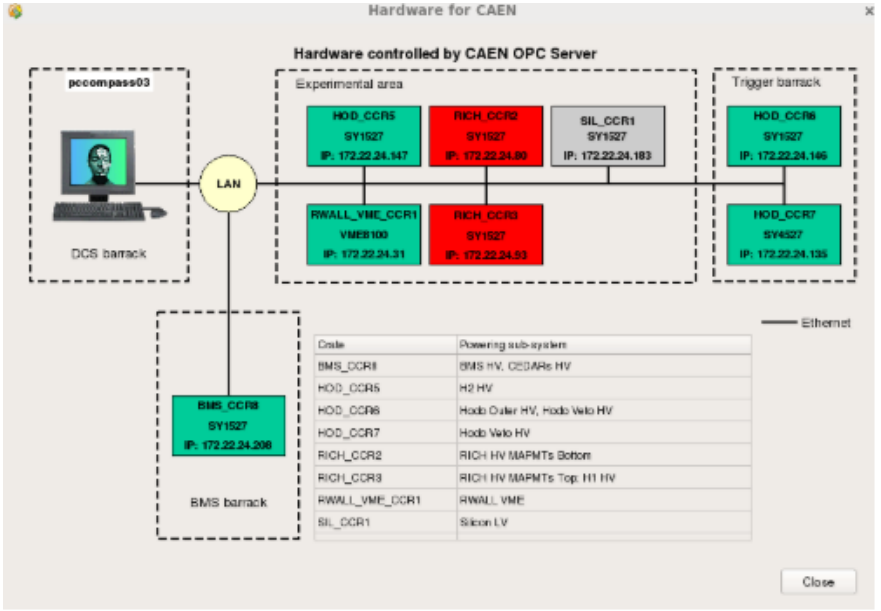


A few problems

✓ DCS CAEN manager

OPC Managers

Name	State	Heart beat	Action
ISEG HW	A	2018.10.16 02:36:45.638	Start Stop
CAEN 1 HW	A	2018.10.16 02:25:55.110	Start Stop
CAEN 2 HW	A	2018.10.16 02:37:10.848	Start Stop
SCHNEIDER HW	A	2018.10.16 02:36:37.380	Start Stop
CANOPEN HW	A	2018.10.16 02:37:01.285	Start Stop
WIENER1 HW	A	2018.10.16 02:36:49.101	Start Stop
WIENER2 HW	A	2018.10.16 02:36:47.349	Start Stop
WIENER3 HW	A	2018.10.16 02:36:44.502	Start Stop



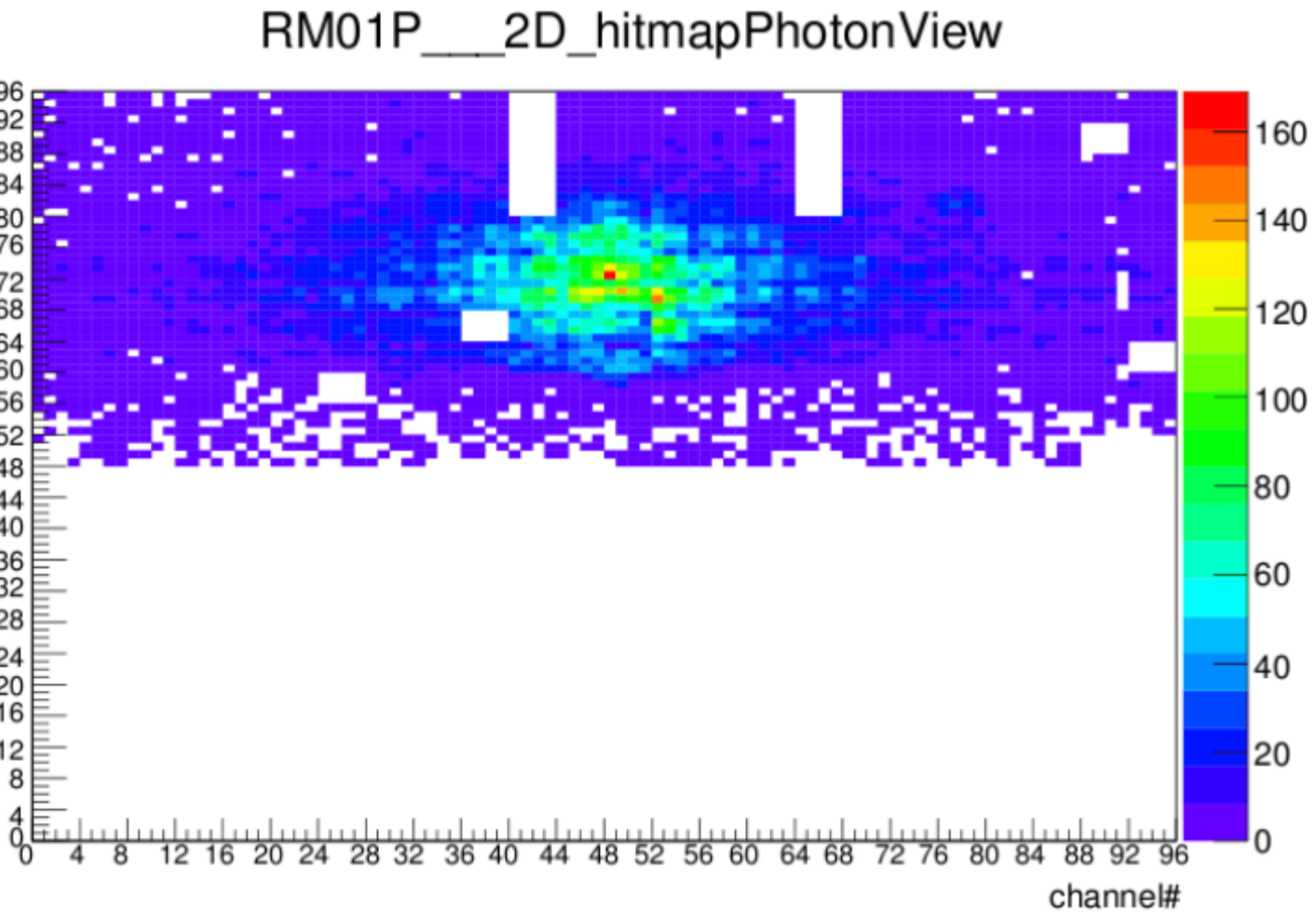
1- During the night lost of communication with RICH_CCR2 and _CCR3 (RICH HV MAPMTs + H1)
Stop/Start sloved the problem

2- This morning only lost of communication with RICH_CCR2 (RICH HV MAPMTs Bottom) .
An access for Christophe to see that the HV crate was not running. Powercycle did not help.

➔ The alarm is masked and the CAEN crate will be repaired when we have no beam (on Wednesday or Thursday)

✓ DCS ECAL1 position timestamp stopped. Restart of pccoef23 by Sergei D. during the access this morning.

21	J. Matousek	Tue 16 October 2018, 17:09	RICH	Bottom half of RICH is missing, because of the unresponsive cr



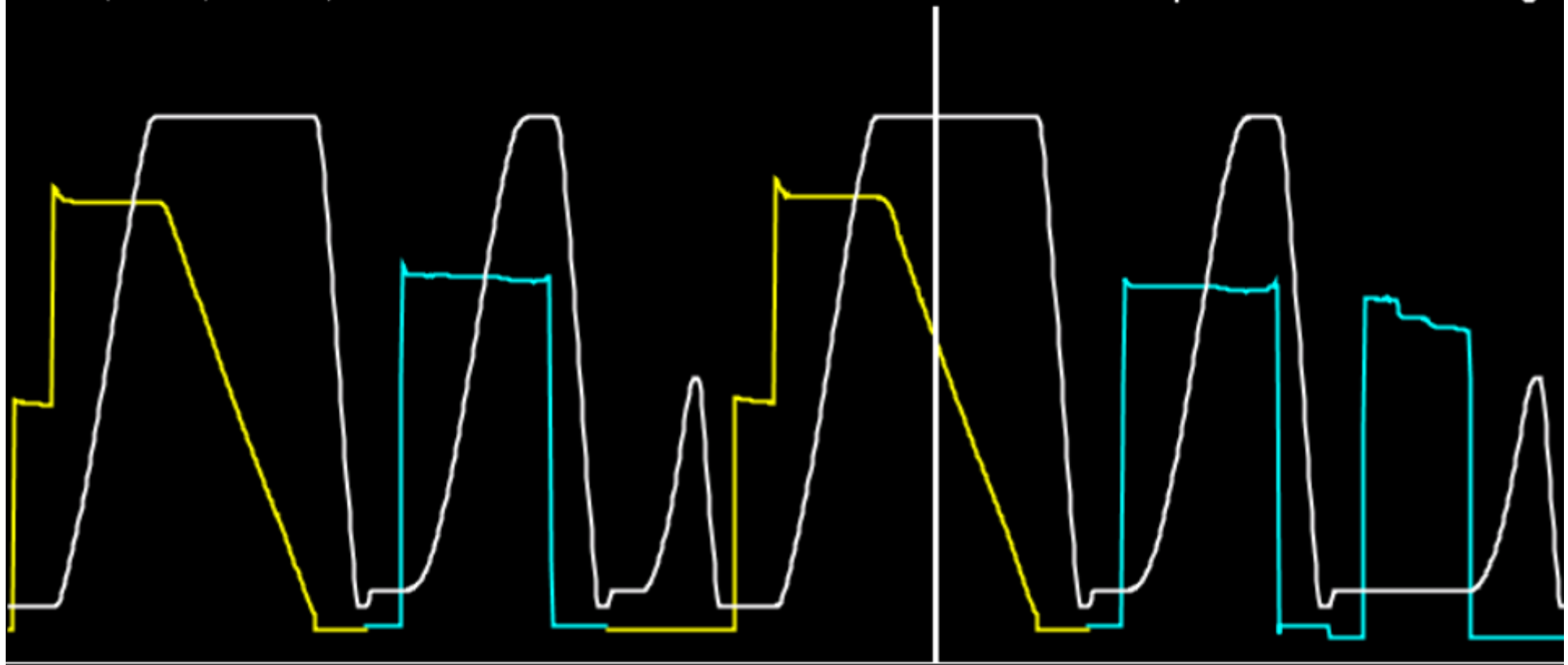
TO DO LIST FOR MD
on Wednesday 17 October from 8:00 to 18:00

- ✓ GEM OFF and SM1+SM2 OFF
- ✓ Target Polarization
- ✓ Na58pi006 not responding after power cycling?
- ✓ MWPC PA04 ID 453 (just at the moment maybe the pb is cured?!)
- ✓ Installation of SciFis for Proton Radius (Munich Team)
- ✓ RICH HV CAEN crate for MAPMT Bottom part
- ✓ Visit of the COMPASS hall by a few Czech VIP with Michael
- ✓ CEDARS activity when the beam is back at 18:00

From Tuesday 16 Oct 16:00 to Wednesday 17 Oct 16:00

SPS-PAGE1 Current user: SFTPRO2 1.90E+13 16-10-18 21:39:55

SC 1 (39BP, 46.8s) Last update: 5 seconds ago



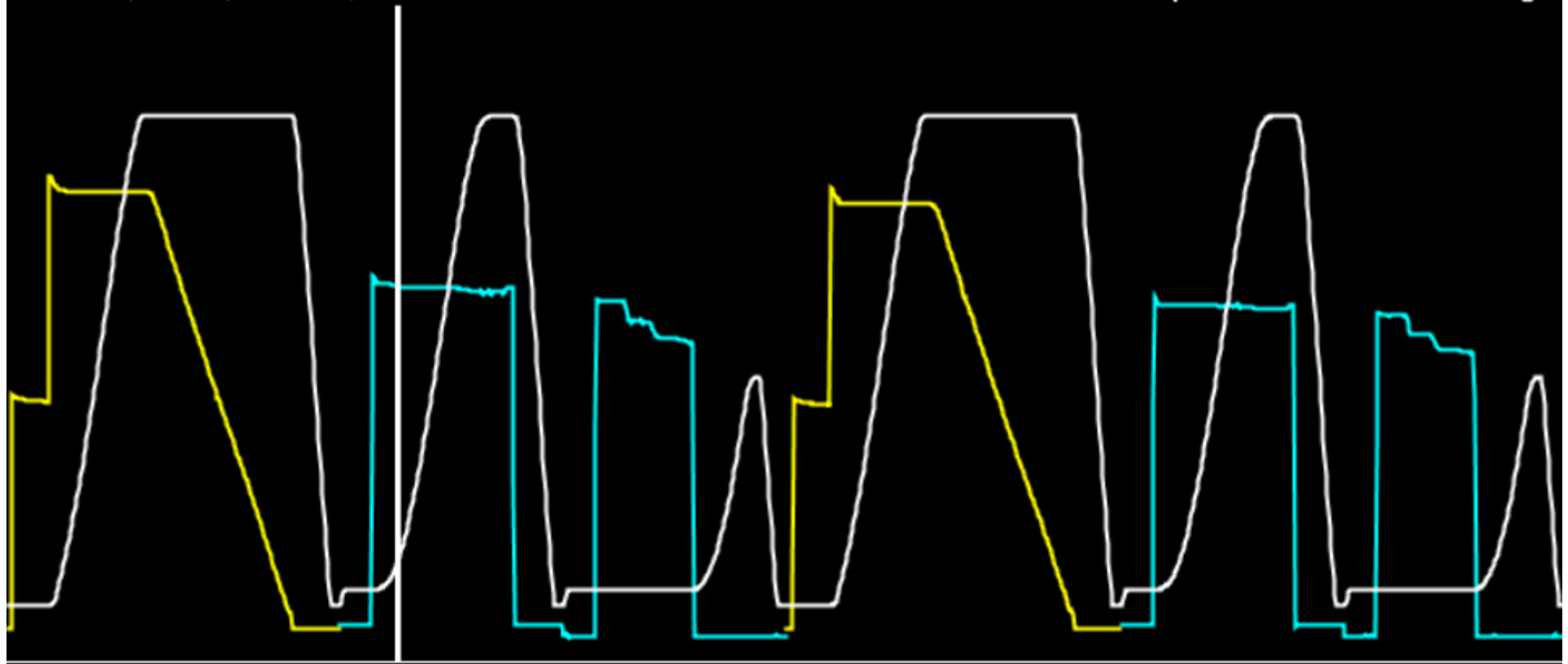
Target	I/E11	MUL	%SYM	Experiment
T2	26.0	17	92 a	H2/H4
T4	40.6	4	91 a	H6/H8
T6	118.5	12	94 a	COMPASS
T10	22.7	0	47	NA62

Phone: 77500 or 70475

MD1 0.0 E10 -0.9 E10 Comments (16-Oct-2018 16:09:47)

SPS-PAGE1 Current user: AWAKE1 2.77E+11 16-10-18 22:21:43

SC 10 (42BP, 50.4s) Last update: 1 seconds ago



Target	I/E11	MUL	%SYM	Experiment
T2	26.5	17	96 a	H2/H4
T4	42.0	4	92 a	H6/H8
T6	121.2	12	95 a	COMPASS
T10	23.5	0	47	NA62

Phone: 77500 or 70475

SFTPRO2 2892 E10 2790 E10 Comments (16-Oct-2018 16:09:47)

many pbs on detectors during Beam with a strong 50Hz component

Run number: 286917 21:37

SourceID 453: (PA03V1__ PA04U1__ PA04V1__ PA04X1__)

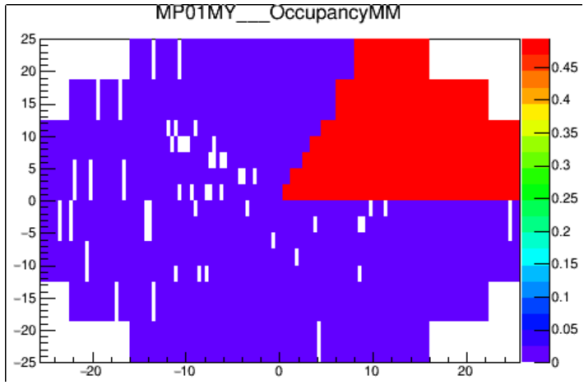
1047 (100% bad events) Sum of errors on this SourceID
1047 (100% bad events) DAQ ERROR: missing sourceID(s)

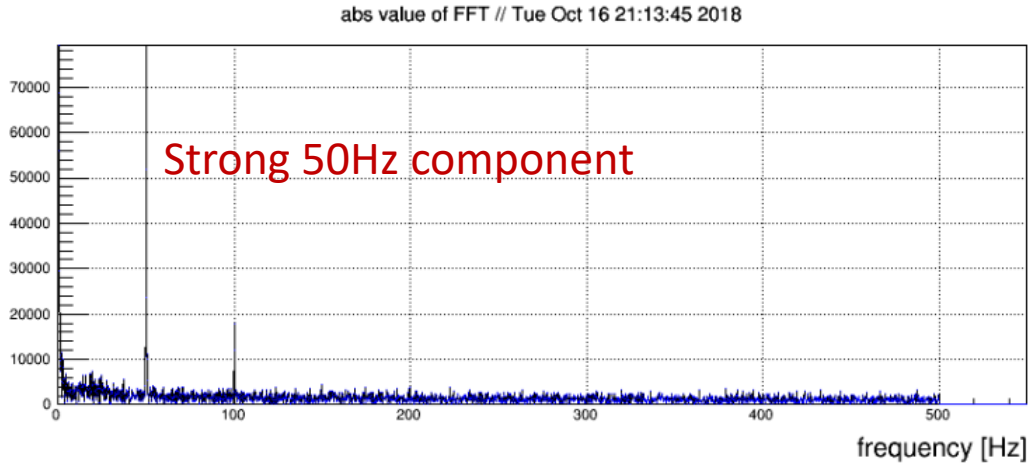
SourceID 380: (MP01MU__ MP01MV__ MP01MX__ MP01MY__ MP01U1__ MP01V1__ MP01X1__ MP01Y1__)
---
535 (51.1% bad events) Sum of errors on this SourceID
535 (51.1% bad events) DAQ ERROR: missing sourceID(s)

SourceID 454: (PA05U1__ PA05V1__ PA05X1__)
---
465 (44.4% bad events) Sum of errors on this SourceID
465 (44.4% bad events) DAQ ERROR: missing sourceID(s)

SourceID 452: (PA02U1__ PA02V1__ PA03U1__ PA03X1__)
---
465 (44.4% bad events) Sum of errors on this SourceID
465 (44.4% bad events) DAQ ERROR: missing sourceID(s)

SourceID 451: (PA01U1__ PA01V1__ PA01X1__ PA02X1__)
---
465 (44.4% bad events) Sum of errors on this SourceID
465 (44.4% bad events) DAQ ERROR: missing sourceID(s)





62324	B. Vasilishin	Tue 16 October 2018, 22:17	MWPC	PA04X1 (SrcID 453, port5, port7)

Error from port 5 propageted to SrcID 452, 451, 454 so I excluded it from DB. At this moment two ports are missing in PA04X1. Tomorrow during MD I will try to fix them.

Difficult data taking on yesterday evening

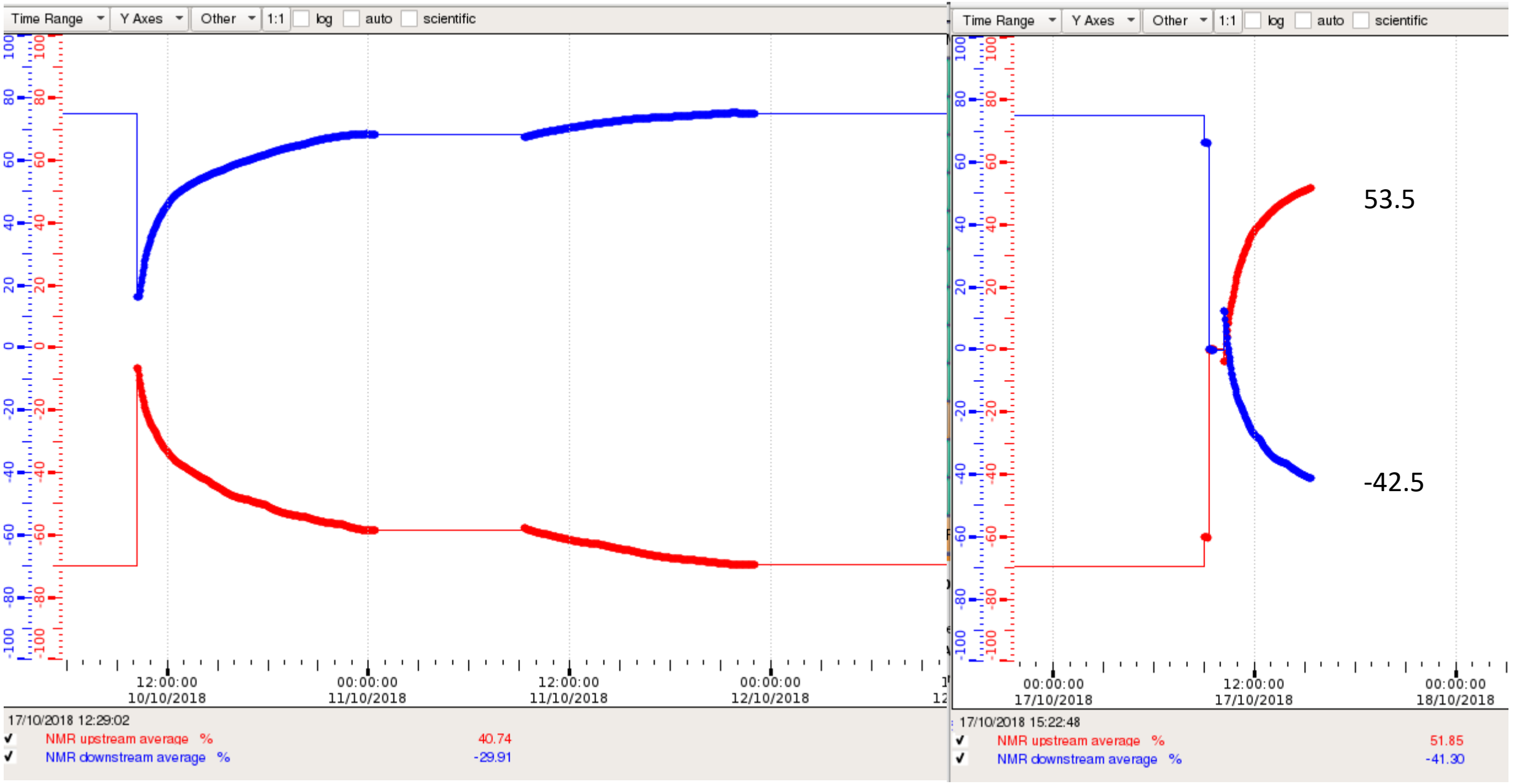
286922	2018-W19	Tue 16 October 2018, 23:58	01:10	200	drell-yan	Good	Prob.	MLAST, OLAST, CT, LASLAST, TRand	DY - 100% errors on MWPC(453) and RW(432)
286921	2018-W19	Tue 16 October 2018, 23:35	23:38	6	drell-yan	Good	Good	MLAST, OLAST, CT, LASLAST, TRand	DY
286920	2018-W19	Tue 16 October 2018, 23:31	23:33	4	drell-yan	Good	Good	MLAST, OLAST, CT, LASLAST, TRand	DY
286919	2018-W19	Tue 16 October 2018, 22:08	23:31	200	drell-yan	Good	Good	MLAST, OLAST, CT, LASLAST, TRand	DY
286918	2018-W19	Tue 16 October 2018, 21:41	21:41	1	drell-yan	Prob.	Prob.		DY, PA04 missing
286917	2018-W19	Tue 16 October 2018, 21:36	21:38	5	drell-yan	Prob.	Prob.	MLAST, OLAST, CT, LASLAST, TRand	DY, PA04 missing, MP01MY problem
286916	2018-W19	Tue 16 October 2018, 21:17	21:18	4	drell-yan	Good	Good	MLAST, OLAST, CT, LASLAST, TRand	DY, strong 50 Hz in the beam
286915	2018-W19	Tue 16 October 2018, 21:08	21:12	11	drell-yan	Good	Good	MLAST, OLAST, CT, LASLAST, TRand	DY, strong 50 Hz in the beam

During MD on Wednesday 17 October from 8:00 to 18:00

- ✓ GEM OFF and SM1+SM2 OFF
- ✓ Beam line ON as tests for communication bus problem
- ✓ Visit of the COMPASS hall by a few Czech VIP with Michael
- ✓ Target Polarization started at 8:30
- ✓ Status of Na58pi006?
- ✓ Installation of SciFis for Proton Radius (Munich Team)
- ✓ MWPC PA04 ID 453 + RW ID 432
- ✓ RICH HV CAEN crate for MAPMT Bottom part
- ✓ ECAL2 LV
- ✓ DAQ new multiplexer installed (First 4 ports of MUX01 connected to xSwitch)
- ✓ Close the doors 211 & 231
- ✓ CEDARS activity when the beam is back at 18:00
- ✓ Safety visit for the scintillator target for the proton radius measurement
- ✓ Japoneese VIP visit with Nori

During the previous polarization

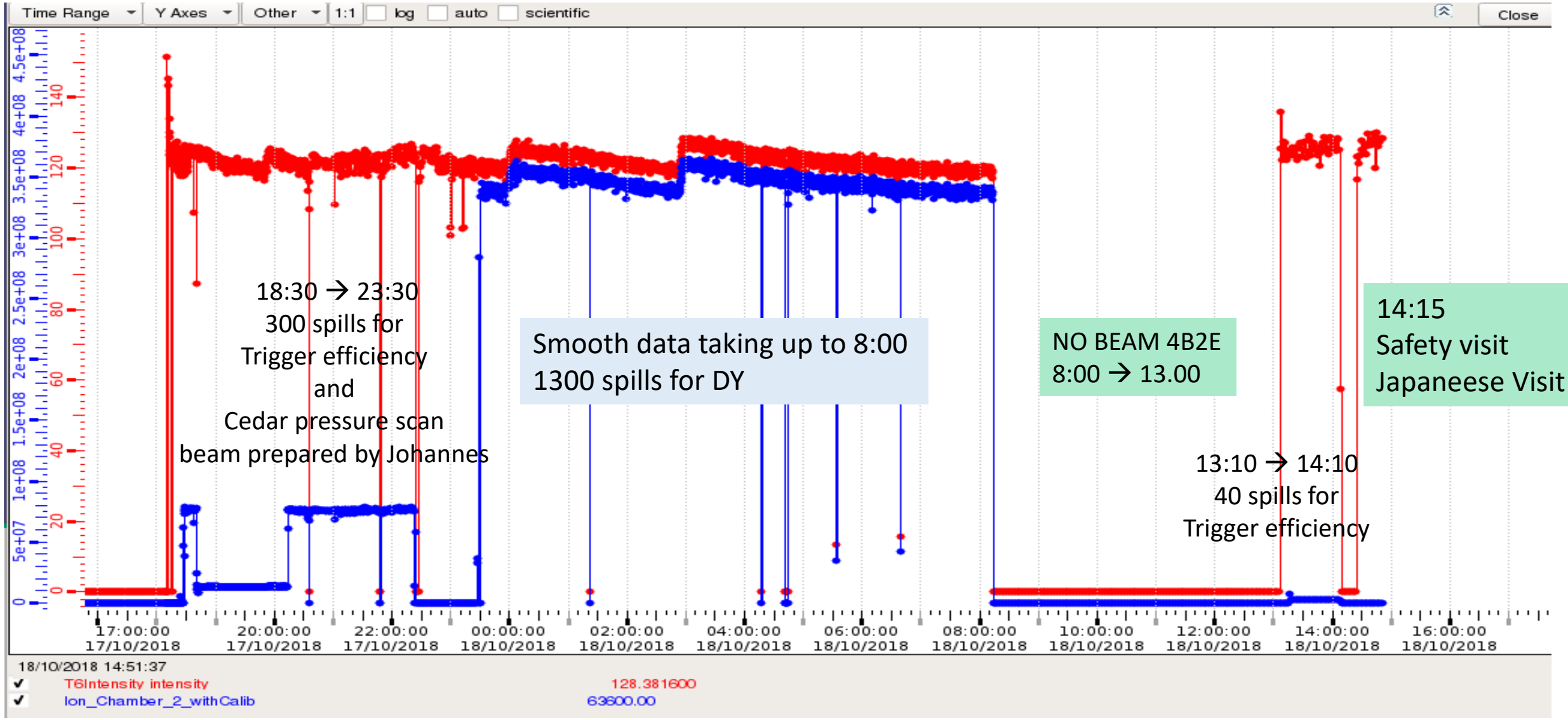
Today

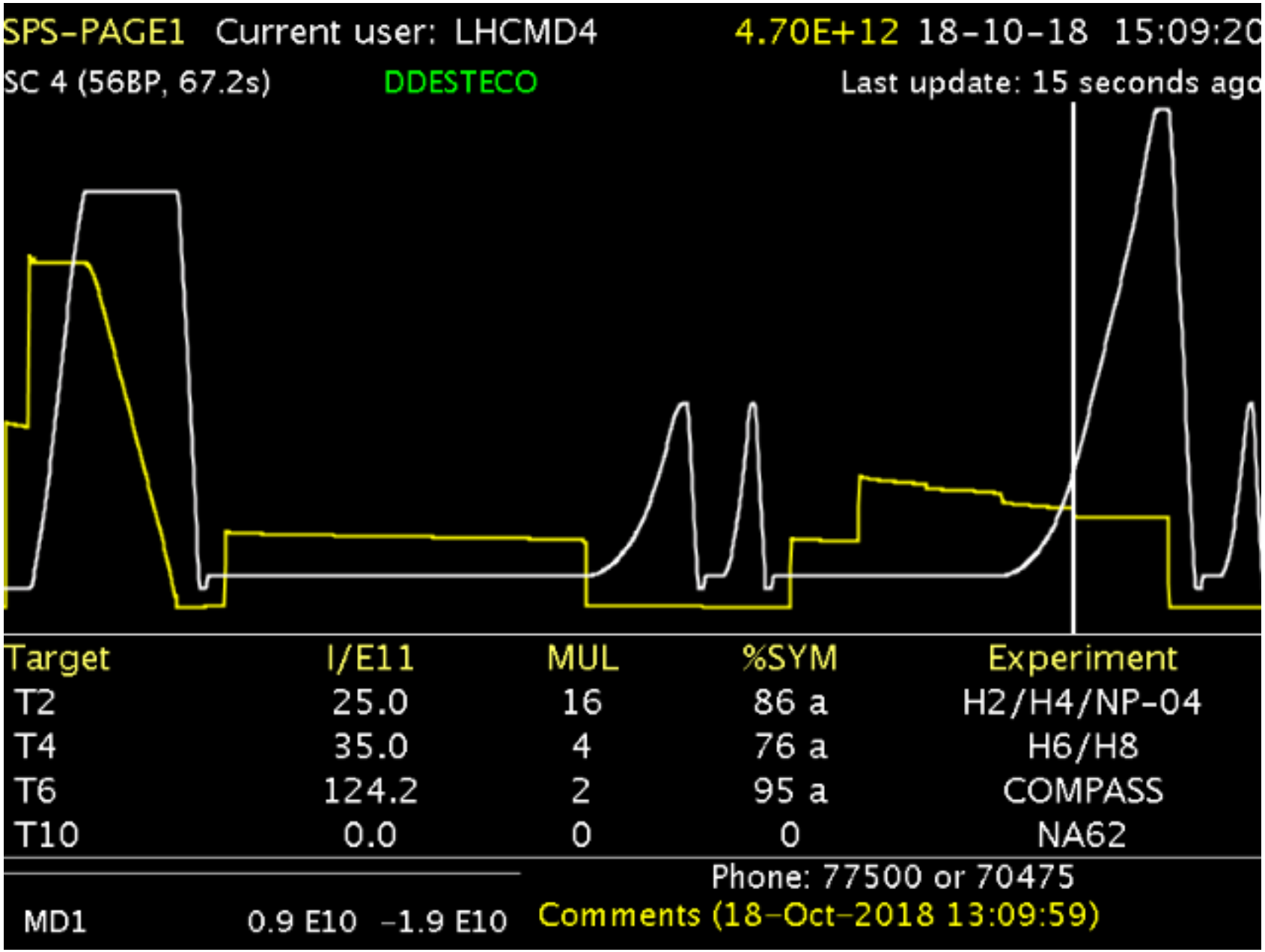



Preparation of the trigger


Box with the 2 stations
with 2 perpendicular wires
Survey was done

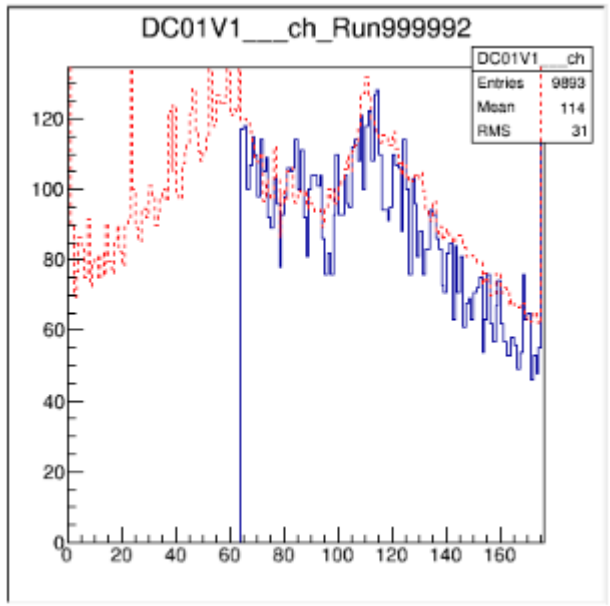
From Wednesday 17 Oct 16:00 to Thursday 17 Oct 16:00




SPS-PAGE1 Current user: LHCMD4 4.70E+12 18-10-18 15:09:20
SC 4 (56BP, 67.2s) DDESTECO
Last update: 15 seconds ago
Target I/E11 MUL %SYM Experiment
T2 25.0 16 86 a H2/H4/NP-04
T4 35.0 4 76 a H6/H8
T6 124.2 2 95 a COMPASS
T10 0.0 0 0 NA62
Phone: 77500 or 70475
MD1 0.9 E10 -1.9 E10
Comments (18-Oct-2018 13:09:59)

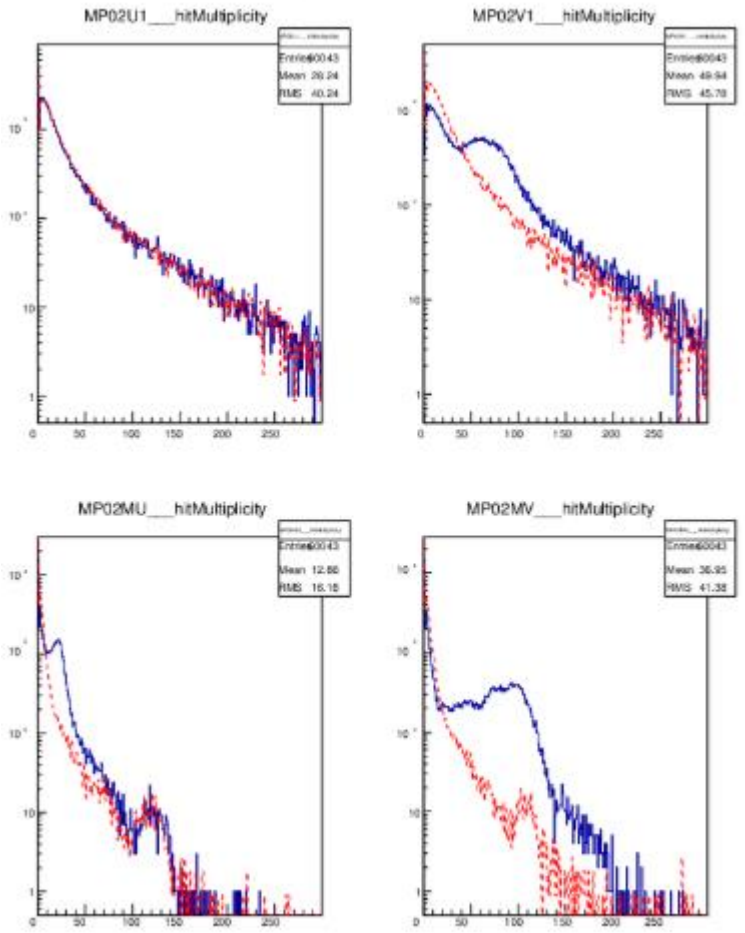
Only very few problems on detectors during the night

At 1:50



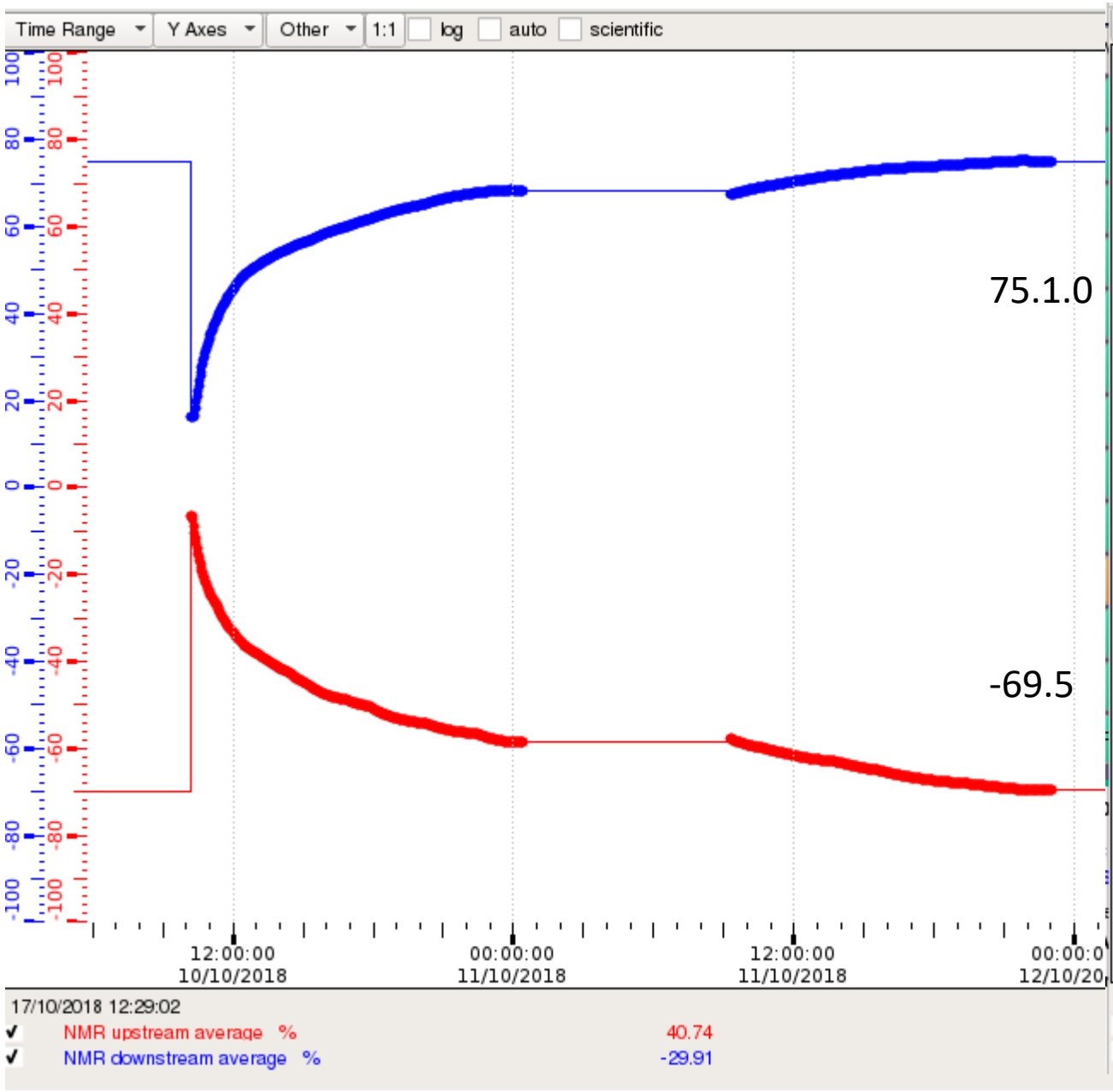
LV powercycle both on ASD8 and F1

At 8:00

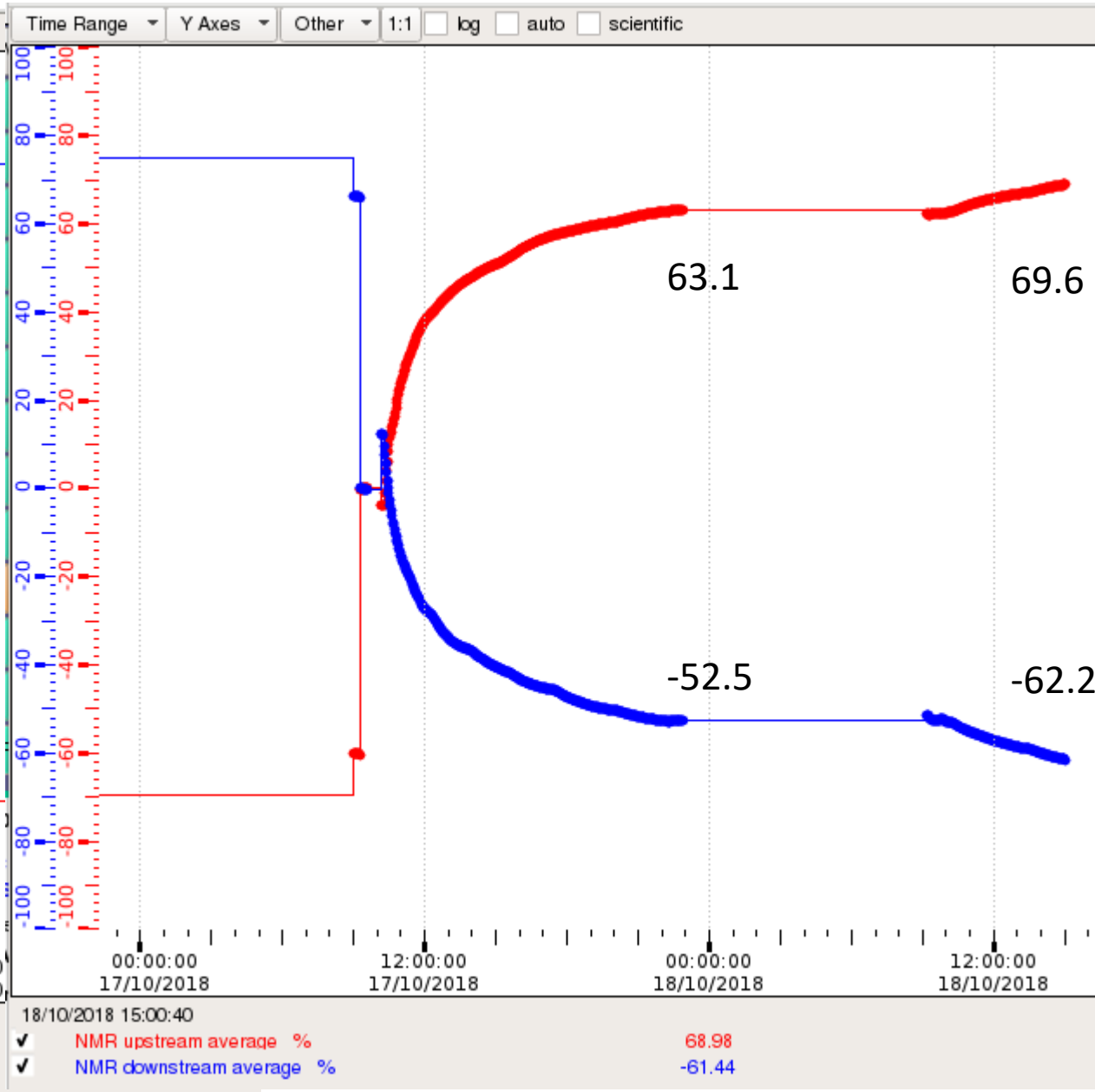


and
RichWall errors ID432
Reappeared

During the previous polarization



Yesterday and Today



Today, Thursday 18 October, NO BEAM from 8:00 to 16:00

- ✓ GEM OFF and SM1+SM2 OFF
- ✓ Beam line ON as tests for communication bus problem

- ✓ Target Polarization started at 8:30
- ✓ Reparation of Na58pi006?

- ✓ Improvement of the setup with of SciFis for Proton Radius (Munich Team)

- ✓ RW ID 432
- ✓ RICH HV CAEN crate for MAPMT Bottom part

At 14:15

- ✓ Safety Visit for the scintillator target for the proton radius measurement
- ✓ Visit of the COMPASS hall by a few Japoneese VIP with Nori

- ✓ Data taking with low intensity (Trigger efficiencies, CEDARs test, …) until the polarization reaches its maximum

```
[dcs@pccompass07 W42]$ more summary_2018-10-12_10\:59\:59_2018-10-19_11\:00\:00.txt
Summary

start time: 2018-10-12 10:59:59
end time: 2018-10-19 11:00:00

#1 SFTPRO attempts: 27758
#2 Number of spills marked as FTARGET: 25664
#3 Number of spills marked as FTARGET and T6 >= 110.0: 25233
#4 Number of COMPASS spills and T6 >= 110.0: 21225
#5 Number of DY Run type spills and T6 >= 110.0: 20159

Ratios:
#2 / #1 = 0.92
#3 / #2 = 0.98
#4 / #3 = 0.84
#5 / #3 = 0.80

Mean values:
SPS T6 >= 110.0 mean value: 121.72
SPS ion2 (raw) mean value for FTARGET T6 >= 110.0: 55633.72
SPS ion2 (calibrated) mean value for FTARGET T6 >= 110.0: 2.9e+08
COMPASS T6 >= 110.0 mean value: 121.78
COMPASS ion2 (raw) mean value for FTARGET T6 >= 110.0: 62015.82
COMPASS ion2 (calibrated) mean value for FTARGET T6 >= 110.0: 3.3e+08
COMPASS DAQ dead time mean value: 13.43
COMPASS Veto dead time (Random) mean value: 12.53
COMPASS Veto dead time (MT) mean value: 20.36
COMPASS Veto dead time (OT) mean value: 18.03
DY Run type T6 >= 110.0 mean value: 121.75
DY Run type ion2 (raw) mean value for FTARGET T6 >= 110.0: 64991.53
DY Run type ion2 (calibrated) mean value for FTARGET T6 >= 110.0: 3.4e+08
```