





# Powering Tests Coordination meeting #105

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# General info

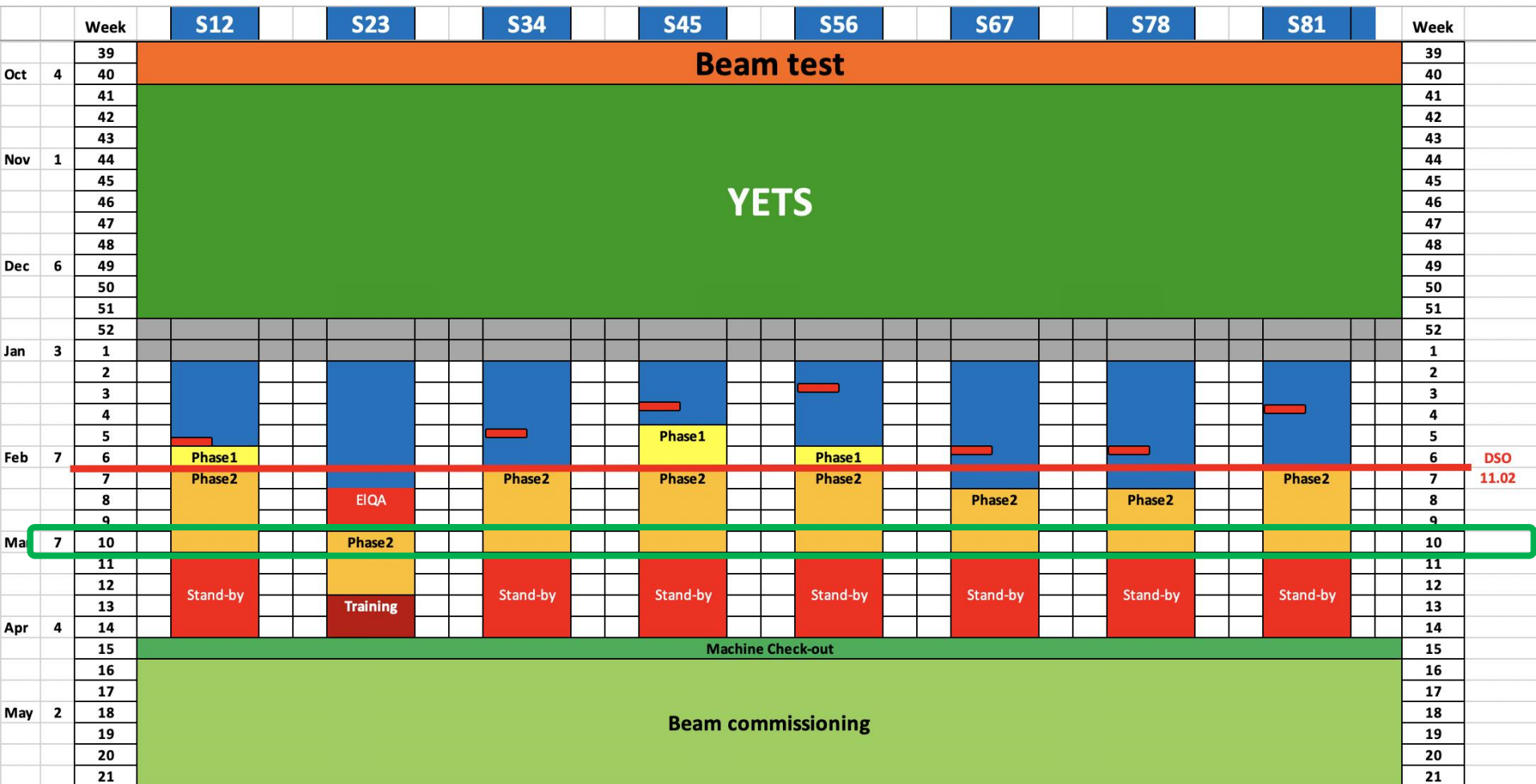
[Link to access constraints](#)

- **NEXT WEEK:** Access possible everyday between 9am and 5pm, **except Thursday**
- **Monday:** IP8 cryo compressor filter regeneration – loss of cryo conditions for about 24h



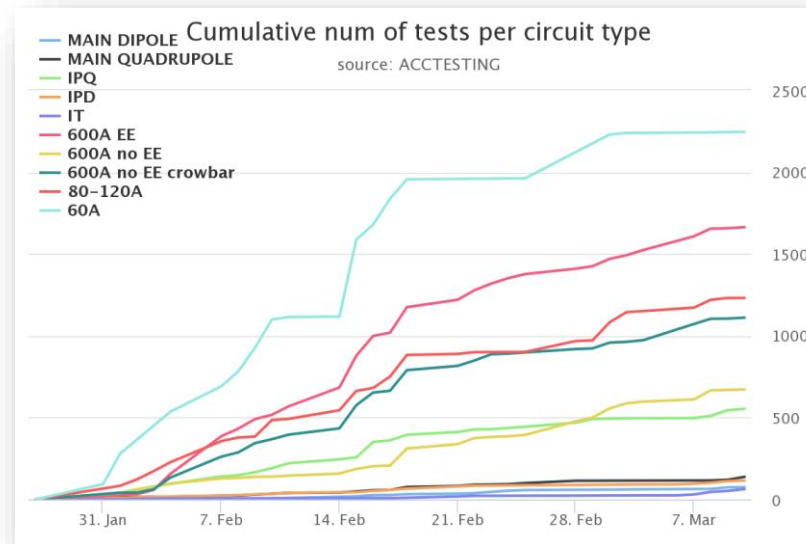
# Powering tests planning

 EIQA



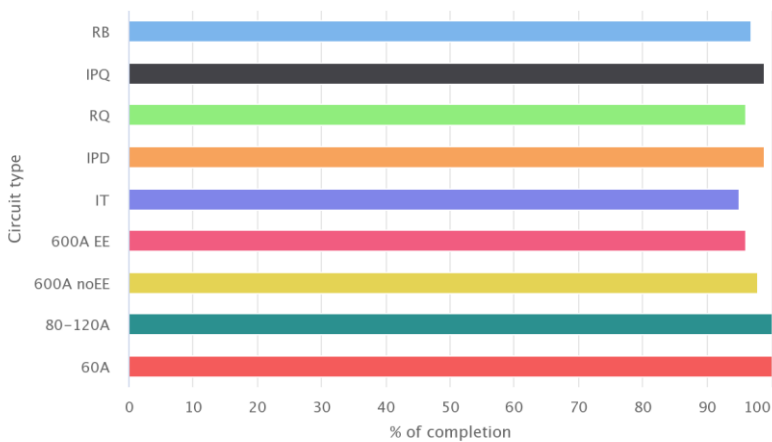
DSO  
11.02

# Powering tests advancement



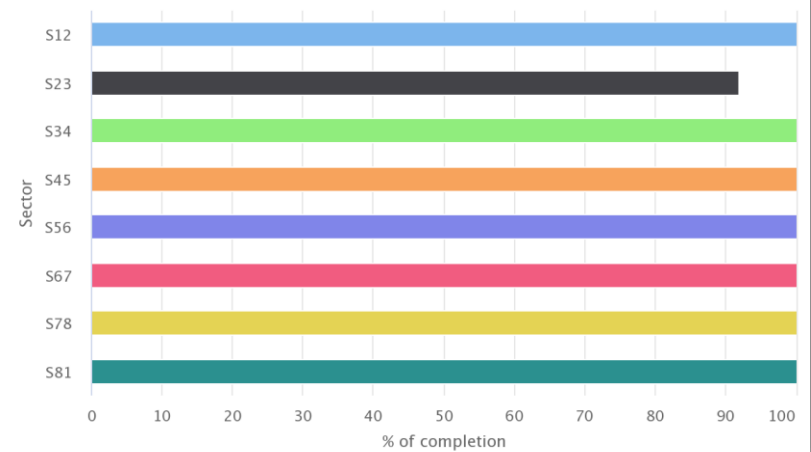
## # Executed tests per circuit type

Source: ACCTESTING



## # Executed tests per sector

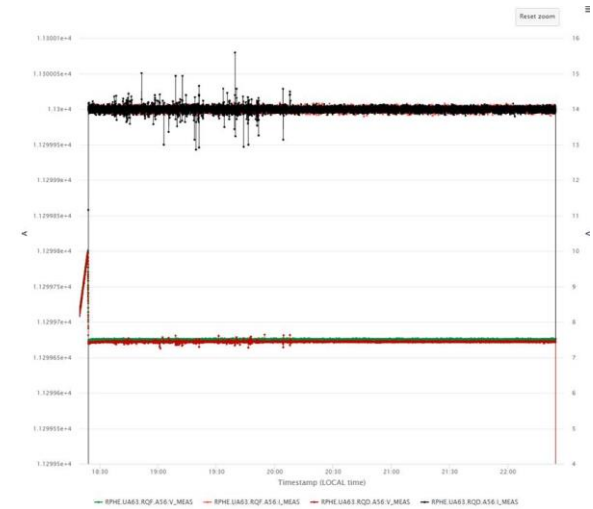
Source: ACCTESTING



# All sectors BUT S23

## All circuits commissioned, but:

- **RCBV24.L4B1** – high resistance - EIQA investigation revealed no problem in the cold part of the circuit. **EPC intervention this afternoon**
- **RQX.L1** – completed
- **RQX.R1** – completed
- **RQD/F.A56** – **completed**, noise on RQD I\_MEAS
- **ROF.A45B2** – I\_Earth fault detected by PC, PNO.a3 repeated successfully
- **RQ6.R7B1** – OK after PC replacement



**IP8 cryo compressor  
filter regeneration on  
Monday 14<sup>th</sup> March  
Loss of cryo  
conditions for about  
24h**

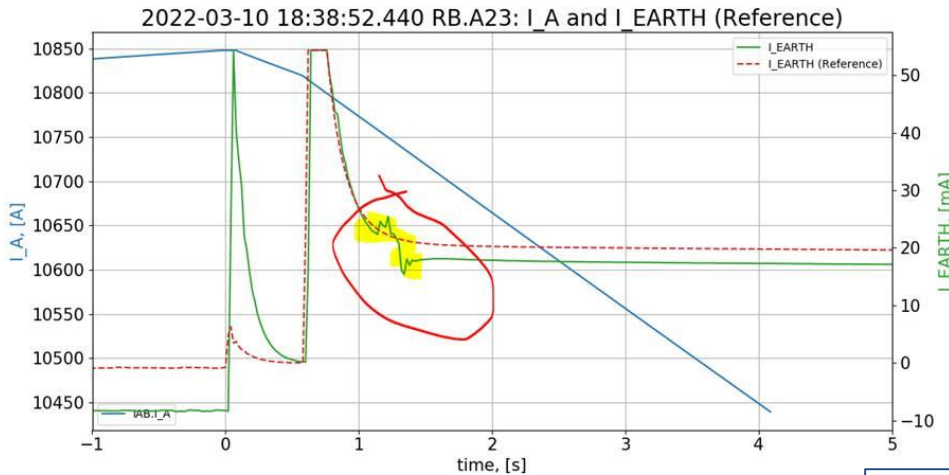
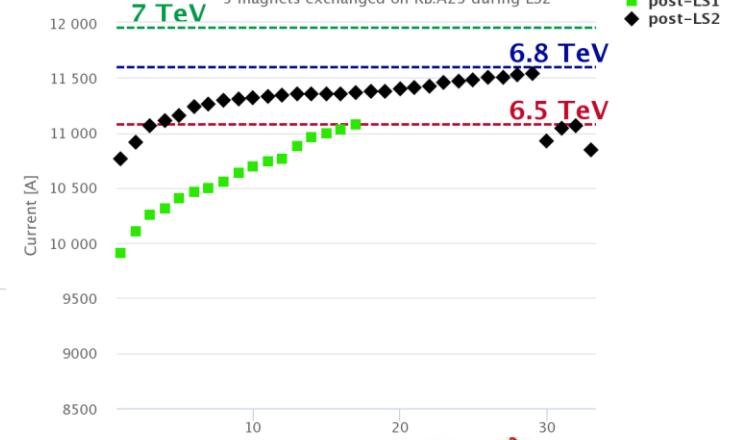
**RB.A56, RB.A81 had 1 quench on flatop**

# Sector 23

Circuit	Circuit quenches	Last quench current	Equivalent E
RB.A23	1 (29+3)	10848	6.4

RB.A23 all training campaigns

5 magnets exchanged on RB.A23 during LS2



796 A14R8	667	6	257780 B14R8	243 GHe propagation	EXT
767 B21R2	10848	1	-11 B20R2	2 Training	INT
767 B19R2	10801	2	740 B18R2	686 EM disturbance	EXT
767 A19R2	10794	3	797 B19R2	755 EM disturbance	EXT
767 B18R2	10762	4	1097 B19R2	755 EM disturbance	EXT
767 C19R2	10753	5	1178 B19R2	755 EM disturbance	EXT
767 A18R2	10742	6	1287 B18R2	686 EM disturbance	INT
767 C18R2	10742	7	1287 B18R2	686 EM disturbance	INT
767 C21R2	7519	8	35217 B21R2	4200 GHe propagation	INT
767 A21R2	6302	9	51264 B21R2	4200 GHe propagation	INT
767 A22R2	3947	10	92295 B22R2	4393 GHe propagation	INT
767 B22R2	204	11	323196 B23R2	4295 GHe propagation	EXT
767 B20R2	204	12	323196 B21R2	4295 GHe propagation	EXT

- **RQD/F**: ready for nominal current
- **IPQ/D**: a few tests at I\_PNO missing
- **600A**: very well advanced
- **80/120A**: almost completed

So many EM disturbances after the 1st quench cannot be normal. And what one can see on the FGC earth current decay is not normal as well. It is correlated in time with a batch of EM-disturbance trips.

**Ad-hoc MP3 meeting @10am**

**Cryo intervention needed following the quench (electrical lock-out of DFB??)**

# Intervention on R2E-LHC600A-10V

- **Problem with the ventilation** of the R2E 600A converters identified
- It can be solved by **adjusting a potentiometer** that controls the fans (1 day per RR)
- **PCC tests to be repeated** after the intervention
  - RR13: Fri 11.03
  - RR17: Wed 9.03
  - RR53: Mon 14.03
  - RR57: Tue 15.03
  - RR73: Wed 16.03
  - RR77: Thu 17.03
  - + Fri 18.01 as additional day for IP7



# EE maintenance validation

RB.A67+RQD/F.A67 - EE in IP6 maintenance only took place in the YEST

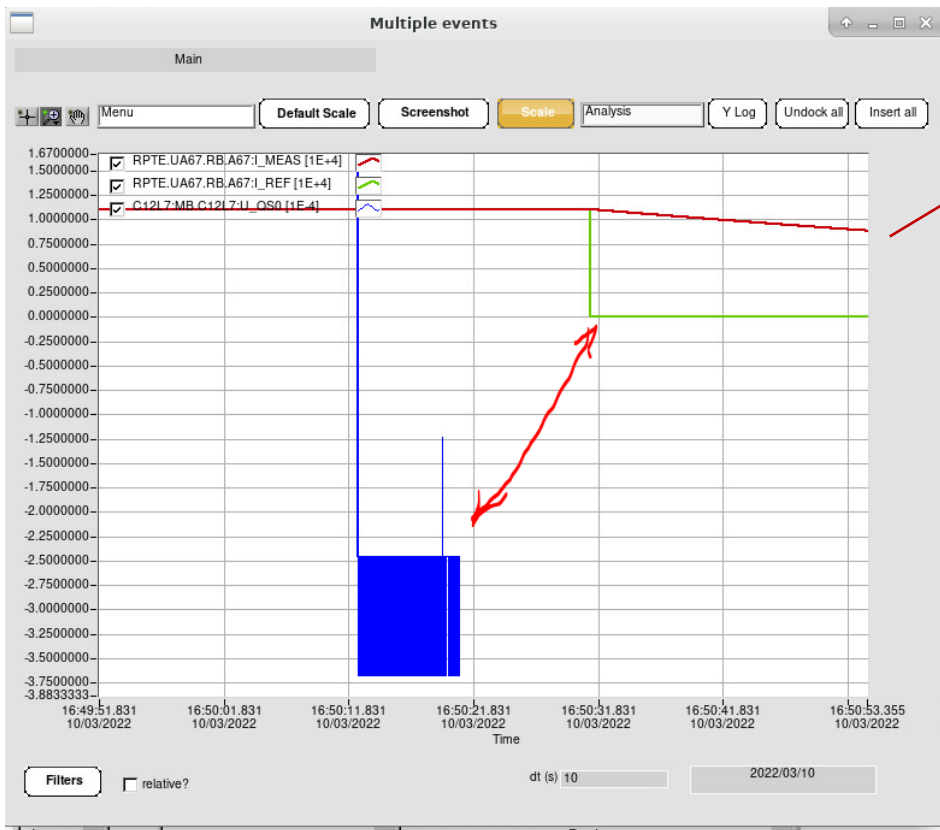
+

RB.A23 and RB.A34 to be repeated, due to maintenance in IP3

				PLI1.b3	PLI2.b3
			RQD.A12	27.09	27.09
			RQF.A12	27.09	27.09
			RQD.A23	28.09	28.09
			RQF.A23	28.09	29.09
			RQD.A34	16.09	16.09
			RQF.A34	16.09	16.09
	<b>PLI1.b2</b>	<b>PLI2.b2</b>			
RB.A12	27.09	27.09	RQD.A45	13.09	13.09
RB.A23	09.03.2022 (28.09)	09.03.2022 (29.09)	RQF.A45	13.09	13.09
RB.A34	22.02.2022 (16.09)	24.02.2022 (16.09)			
RB.A45	13.09	13.09	RQD.A56	13.09	13.09
RB.A56	13.09	13.09	RQF.A56	13.09	13.09
RB.A67	22.02.2022	24.02.2022			
RB.A78	6.10	7.10	RQD.A67	22.02.2022	24.02.2022
RB.A81	23.09	27.09	RQF.A67	22.02.2022	25.02.2022
			RQD.A78	6.10	6.10
			RQF.A78	6.10	6.10
			RQD.A81	22.09	27.09
			RQF.A81	22.09	27.09

# RB.A67 & RB.A78 special tests

	2 kA		5 kA		8 kA		11 kA	
	FT	10 A/s	FT	10 A/s	FT	10 A/s	FT	10 A/s
RB.A67	10.03.2022 @10:40			10.03.2022 @11:25	10.03.2022 @12:05	10.03.2022 @14:40	10.03.2022 @16:50	
RB.A78	10.03.2022 @10:40		10.03.2022 @11:25	10.03.2022 @12:50	10.03.2022 @14:40	10.03.2022 @16:50		



Maybe to be repeated??  
Pay attention at the timing between  
iQPS snapshot activation and FPA