

Tile plan for YETS 2024-2025 (FE electronics)

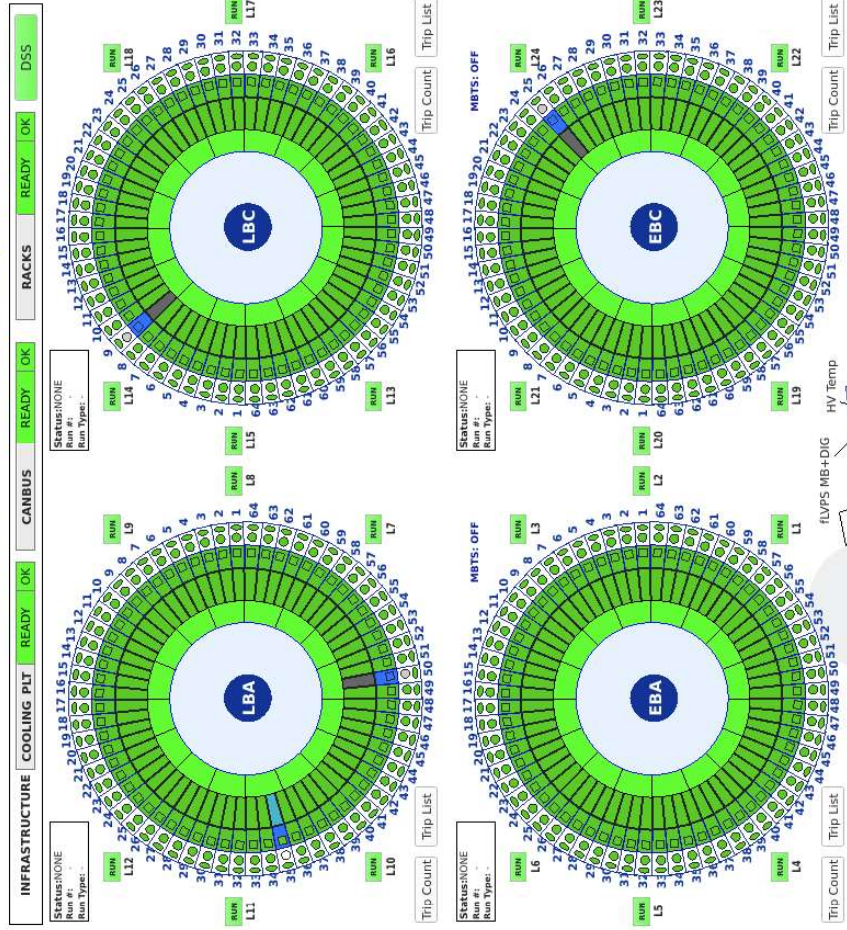
On behalf of TileCal

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TSU (Tbilisi, Georgia)

TileCal current status 02/10/2024

Tilecal Detector Control System

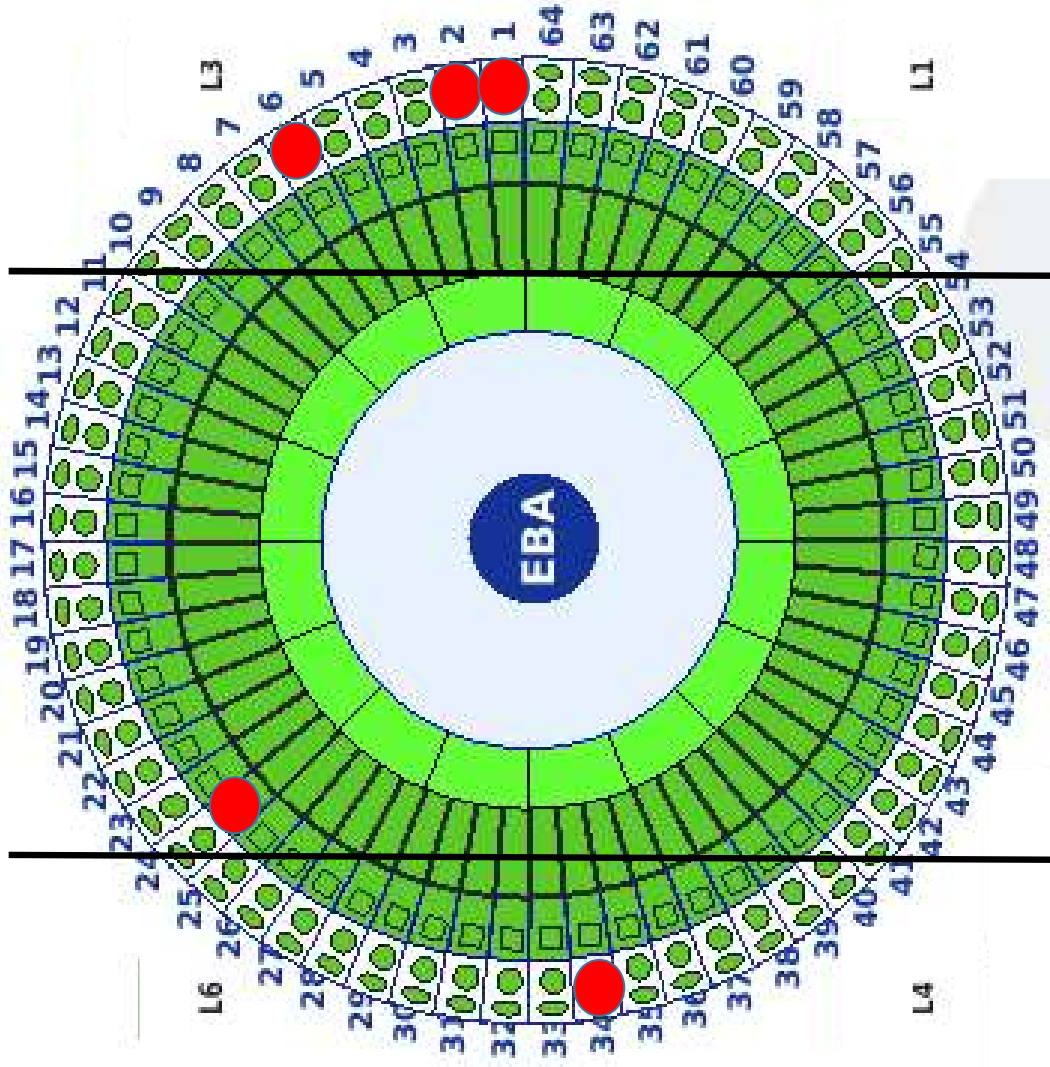


High priority problems

1. LBA50 OFF - due to cooling problem
2. LBC09 OFF - due to cooling problem
3. EBC25 OFF - due to cooling problem
4. LBA35 In emergency mode (no control and regulation of HV)
5. EBC02 no data PMT1-24
6. LBA14 Demonstrator

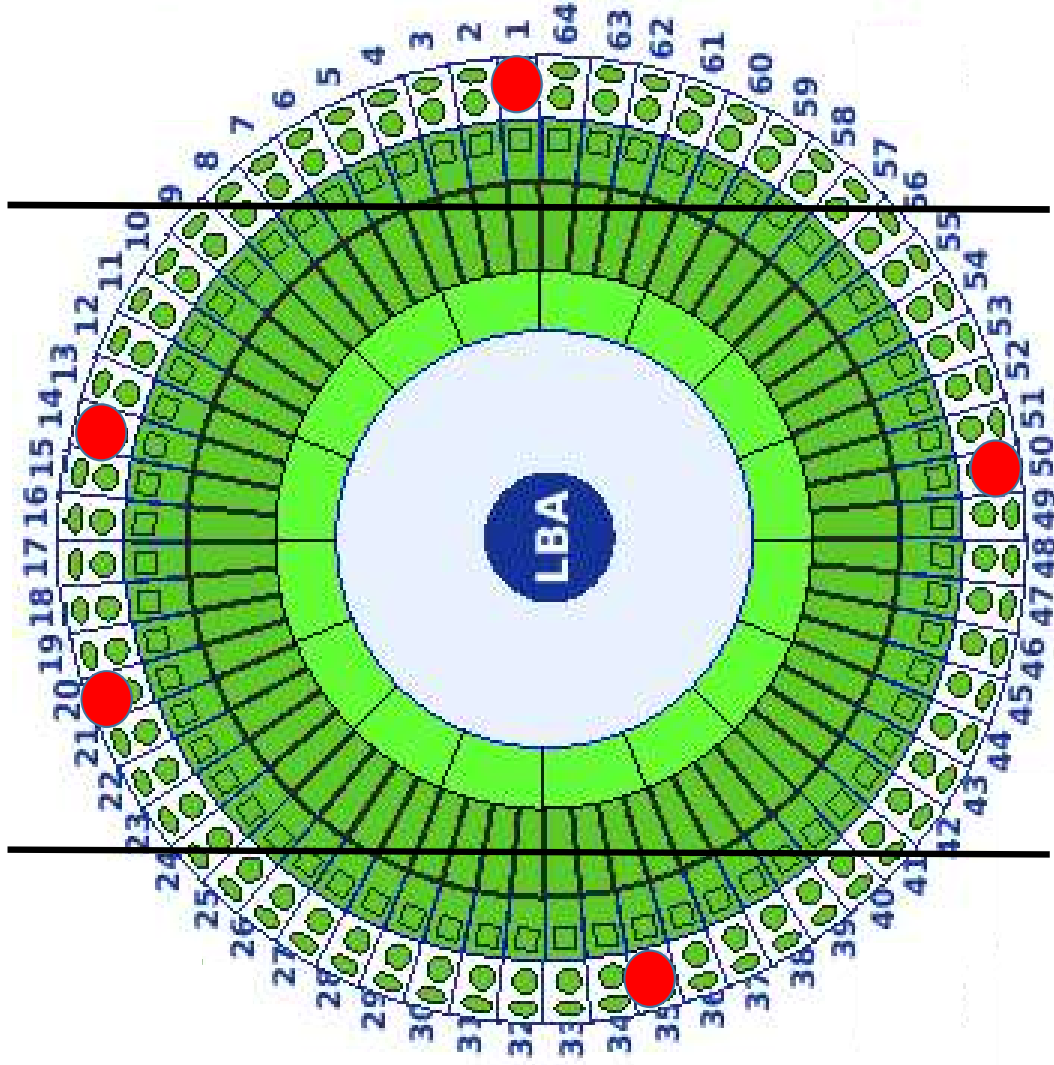
Medium priority problems

- LBA20 cell A09 dead
- LBC58 cell A07 dead
- LBC50 no CIS PMT1-12
- EBA02, EBA24, EBC16, EBC62, LBA01 (Cs - integrator)
- EBC62 (L1Calo)
- EBA06, EBA34, EBC29 (TMDB)



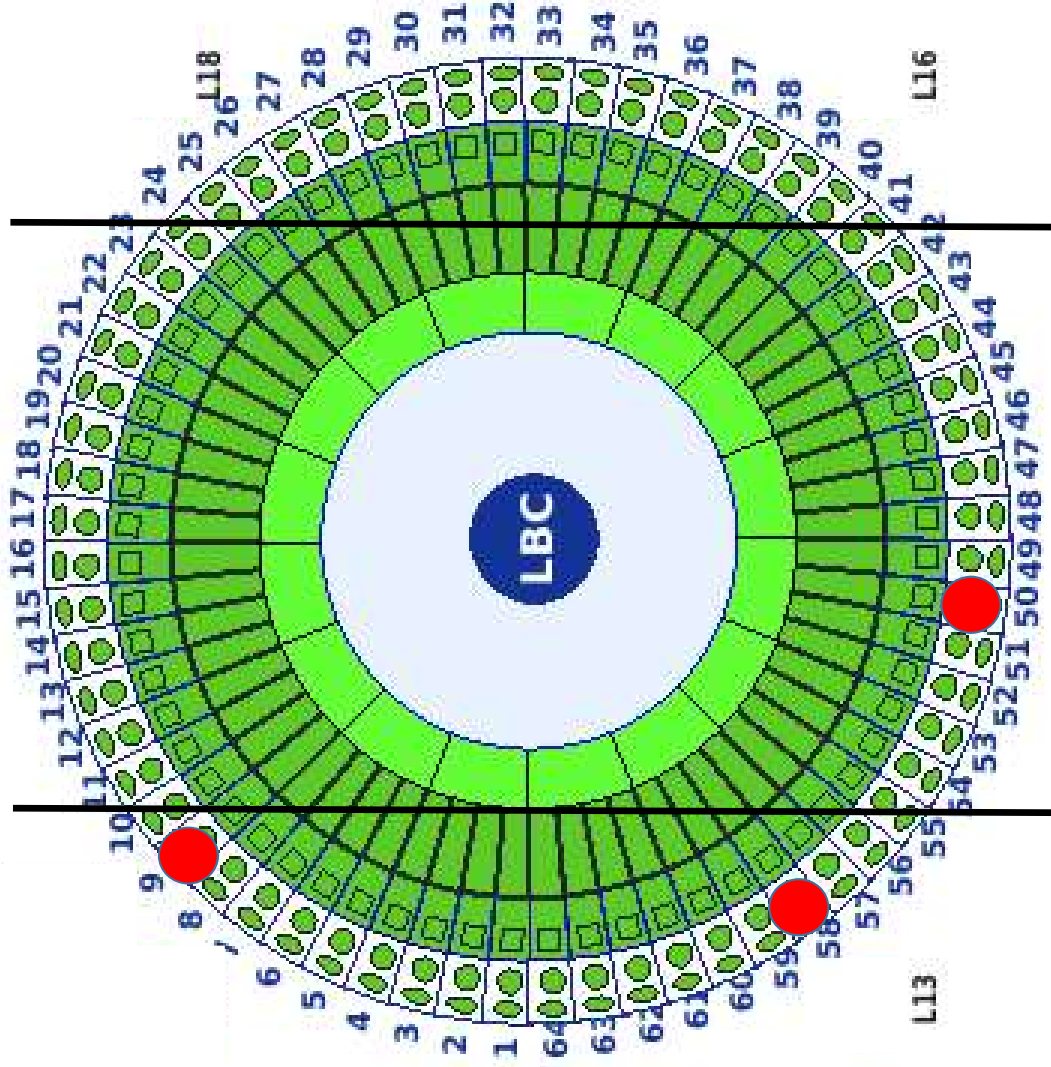
1. EBA01 – PMT46 Integrator
2. EBA02 – PMT03 Integrator
3. EBA24– PMT016 15 Integrator
4. EBA06 – PMT38 TMDB
5. EBA34 – PMT18 TMDB

All modules needs finger and back (rare) side access!!!



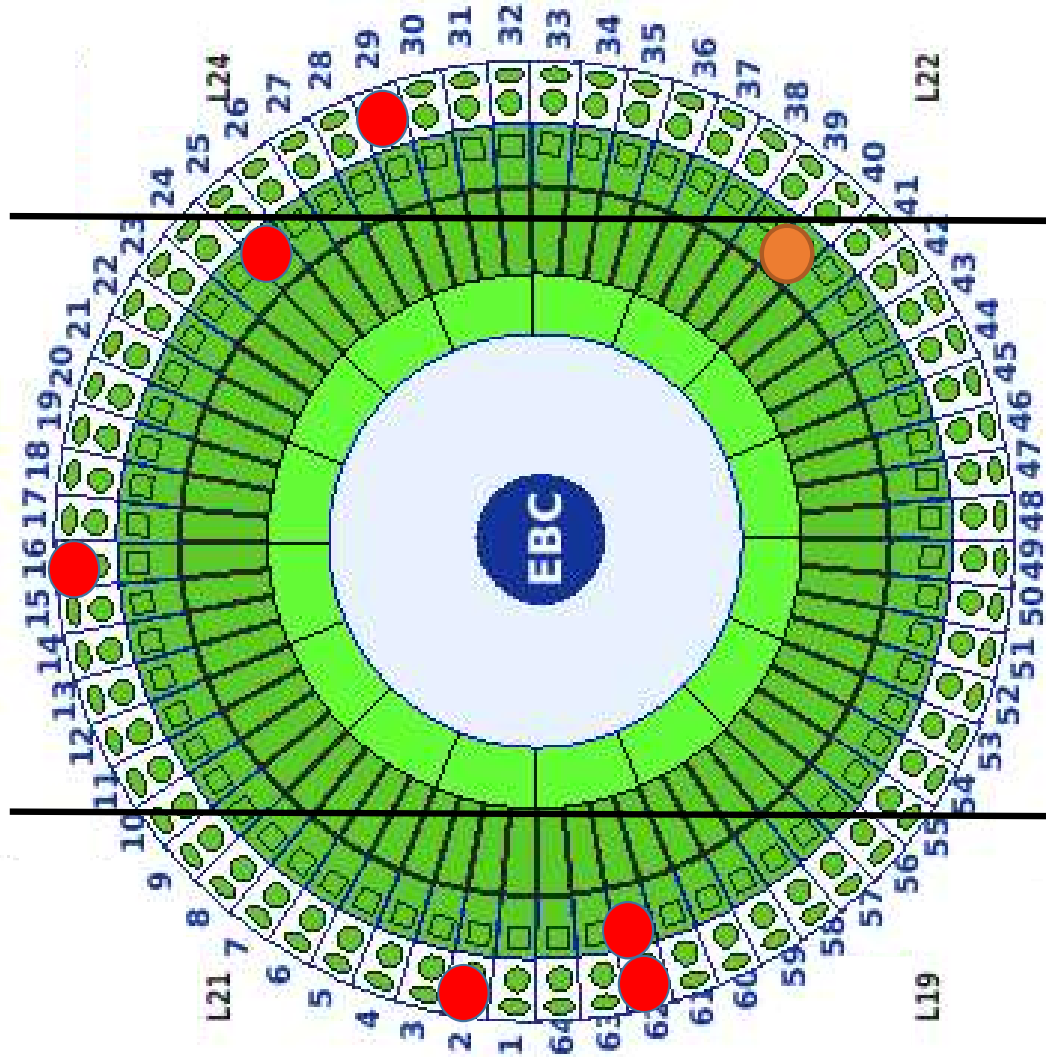
1. LBA50 – OFF cooling
2. LBA35 – Emergency no HV regulation
3. LBA01 – PMT46 Integrator
4. LBA20 – cell E09 dead
5. LBA14 - demonstrator

Standard opening good enough



1. LBC09 – OFF cooling
2. LBC58 – cell E07 dead
3. LBC50 – no CIS PMT1-12

Standard opening



EBC25 – OFF –cooling	Standard opening
EBC02 – no CIS PMT1-24	access from back side
EBC40 digital errors	
EBC16 – PMT46 Integrator	Standard opening
EBC62 – PMT03 Integrator	access from back side
EBC29 – PMT17 TMDB	access from back side
EBC62 – T1 L1Calo	access from back side

Additional work

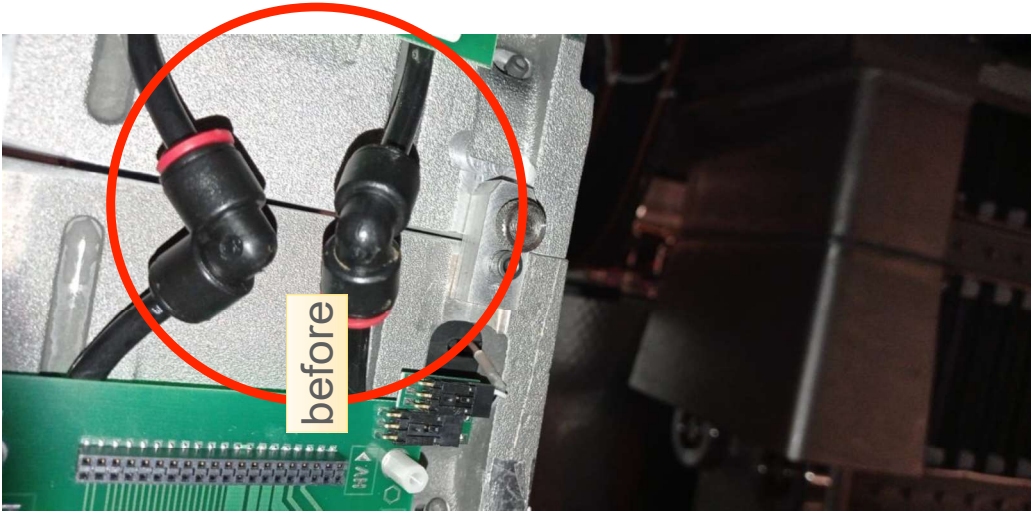
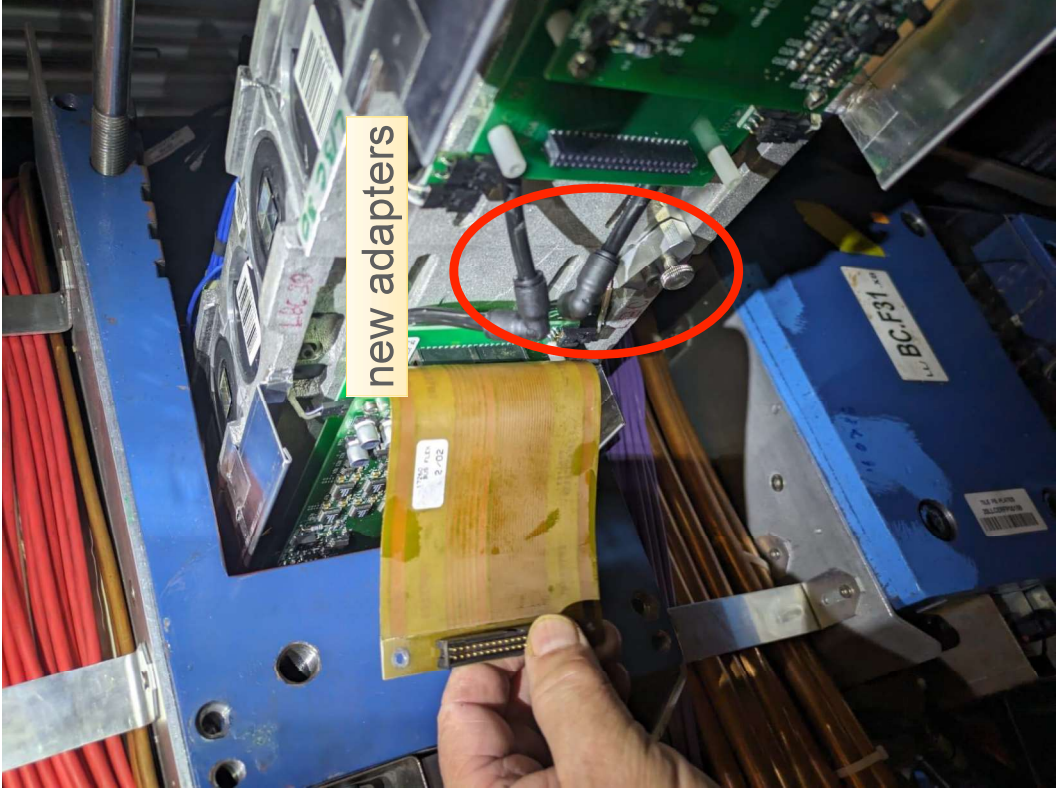
To prevent the future cooling problems the cooling connectors for as much possible long barrels to be replaced.

4 modules per day can be maintained by one team (2 persons)

2 Teams will be organised.

8 modules / day ☺ 40modules/week

All LB modules can be equipped with new connectors in 4 weeks
(expected time of maintenance YETS 2024???)



Replacement of cooling connectors foreseen on long barrels
1 team per side
4 modules per day

Minimum access time required is ≈ 4 weeks (standard barrel scaffolding with minor changes on request)

SPECIFIC ACTIVITIES

1. **SX1 OVERHEAD CRANES UPGRADES**
2. **CO2 MAIN TRANSFER LINES BRACKETS**
3. **BW-A TGC CHAMBERS REPLACEMENT**
4. **EIL4 TGC UPGRADE PILOT TEST**
5. **TILECAL COOLING CONNECTORS**

OPENING / CLOSING SCHEDULE

Key events summary

	Date
BW C	04.12
BW C	17.03
ECT C	11.12
ECT C	07.03
nSW C	12.12
nSW C	05.03
nSW C	[08.01 ; 27.02]
nSW C	[10.01 ; 24.02]
EBC	20.12
EBC	04.03
EBC	[08.01 ; 27.02]
Barrel C	[09.01; 25.02]

	Date
BW A	03.12
BW A	12.12
BW A	17.12
BW A	17.12
BW A	08.01
BW A	19.03
ECT A	14.01
ECT A	10.03
nSW A	15.01
nSW A	06.03
nSW A	[20.01 ; 28.02]
nSW A	[22.01 ; 24.02]
EBA	16.01
EBA	05.03
EBA	[20.01 ; 28.02]
Barrel A	[21.01 ; 26.02]

26.08.2024 OPM weekly – Opening Closing Schedule

Access to the toroid area for TileCal (with scaffolding)

C side:

EBC 08.01-27.02

LBC 09.01-25.02

A side:

EBA 20.01-28.02

LBA 21.01-26.02

Expected Manpower

1. Minashvili Irakli + 1 Chicago Student
2. Nugzar Mosulishvili+Dato Pheradze (UG)
3. Abbas Abdallah + 1 Chicago Student
4. Solovyanov Oleg
5. Stanislav Nemecek
6. Sanya Solodkov
7. Fernando Carrio Argos
8. Henric Wilkens
9. Jalal Abdallah
10. Filip Martins
11. Gao + CI-F student + Valencia?

Plus: TDAQ&DCS experts, Calibration RUNs analyzers

Modules with problems

<https://codimd.web.cern.ch/OfibZb4DSfiqFIYpHa9vOg?view>