

27 April 2007 08:30 in 2889-R-009

Present: AB/CO: M. Koratzinos, R. Schmidt, M. Zerlauth
AB/PO: H. Thiesen, Y. Thurel, F. Bordry
AB/OP: M. Gruwe, G-H. Hemelsoet
AT/MEL: D. Bozzini, V. Chareyre, K.H. Mess , S. Feher,
P. Denis, A. Ballarino, K. Dahlerup-Petersen,
B. Flora
AT/MTM: A. Siemko
AT/ACR: S. Claudet
TS/HDO: R. Saban, A. Vergara, M. Pojer, MP. Casas Lino

Sector 78

- S. Claudet: lost the 1.8K pumping group at 23:30 last night due to a 24V relay that failed. This type of relays has been known to be faulty; 90% of them had already been replaced. The result was a slight warming in the arc, but DFBMs and DFBA's still have liquid He.
- Powering progress can be seen in the usual address <https://twiki.cern.ch/twiki/bin/view/HCC/BlogEntryPoint8x2007x04x26x21x42?point=8>. The sequencer for PNO3 was ready and some circuits passed PNO3. There is a new request for the sequencer which will be implemented this afternoon.
- EIQA on some 120A circuits was performed and results looked good.
- Infra red camera analysis of the DFBs: A report has been prepared "IR Analysis Report: SECTOR 7-8 DFBMA AND 120A CURRENT LEADS" (https://edms.cern.ch/file/819355/1.1/Sector78-IR_Report_2007-04-26_DFBMA.pdf) The authors draw attention to the fact that emissivity varies with the materials photographed, so measurements are not very accurate.
- Y. Thurel reported on the transfer function measurements which he carried out on four 120A correctors. Results were satisfactory. Very little spread was observed on the measured inductance and the precision of the control during powering was a few ppm. See https://edms.cern.ch/file/839886/1/Sector7-8_2007-04-26 for more details.
- The non-conformity cable (circuit RCBV22.L8B1) that was changed yesterday has been accepted and the non-conformity closed.
- There was a lot of condensation present in nearly all current leads, including the 60A corrector leads in the arc. Circuits

cannot pass EIQA under these conditions and no powering tests can take place until dry conditions are restored. The change of weather from sunny to rainy during the same period when heavy condensation showed up might not be a coincidence. KH. Mess asked if humidity levels in the tunnel can be (or already are) recorded. R. Saban noted that CV has an air drying facility which however was not switched on.

- R. Rabehl: one boil-off test done, one more to be done as soon as conditions allow.
- Outlook for today: no powering tests, investigations on condensation and DFBs continue.
- On Wednesday 2 May the cryo team will switch cryo plants for sector 78. The current plant (that has its origins during LEP) will be replaced by the brand new plant envisaged for sector 81. The latter has a more comfortable operational envelope.
- Next meeting Monday 30 April at 8:30 in 2889-R-009

M. Koratzinos

Open Hardware Commissioning Issues in SECTOR 78

REGION	ISSUE
SECTOR 78	
	QPS voltage tap problem in quadrupole 33R7 - Another tap will be used instead. Attention because the damaged tap might be floating on the conductor.
	Non-conformity of the crates of cryo instrumentation (inrush current) (A.Suraci)
	Securing of the ventilation units
	Four circuits in Q5 suffer a breakdown at around 450V due to a weak insulation. The four circuits are RCBCVS5.L8B1, RCBCHS5.L8B2, RCBCHS5.L8B1 and RCBCVS5.L8B2. Insulation towards ground and other circuits is OK.
	EI_QA performed on C16L8. ICC test showed reversed sequence of V-taps on circuit RCBV16.L8B1 (D.Bozzini) check
	BPM connection in Q2 (R.Jones) ? waiting for Inner Triplet to be repaired
	MB1055 magnet to be changed before powering above 2kA RB.A78
	Inner Triplet in Point 8 to be repaired
	Water leak on the tunnel concrete wall to be fixed (C33L8).

Closed hardware commissioning issues in sector 78 can be found at <http://hcc.web.cern.ch/hcc/activities/activities.php?region=S78>.