

ELENA Project

E. Harrouch

Installation follow-up & Planning update

Follow-up

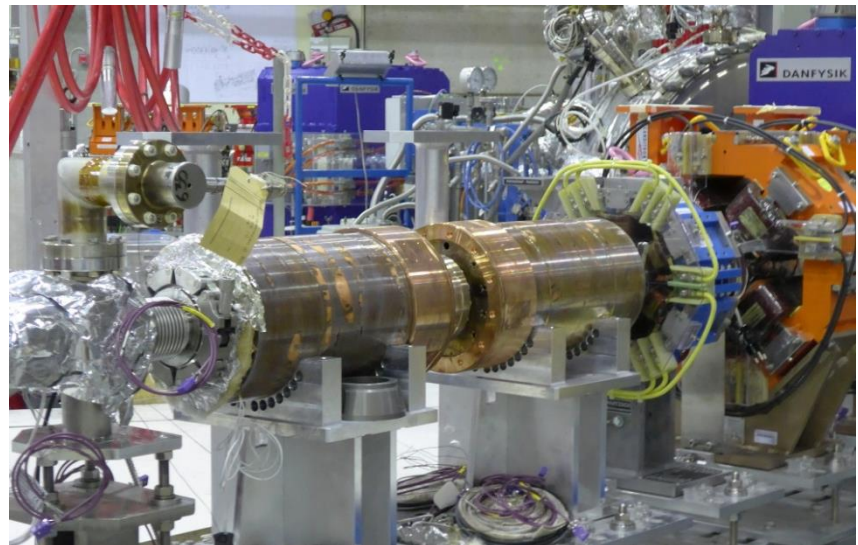
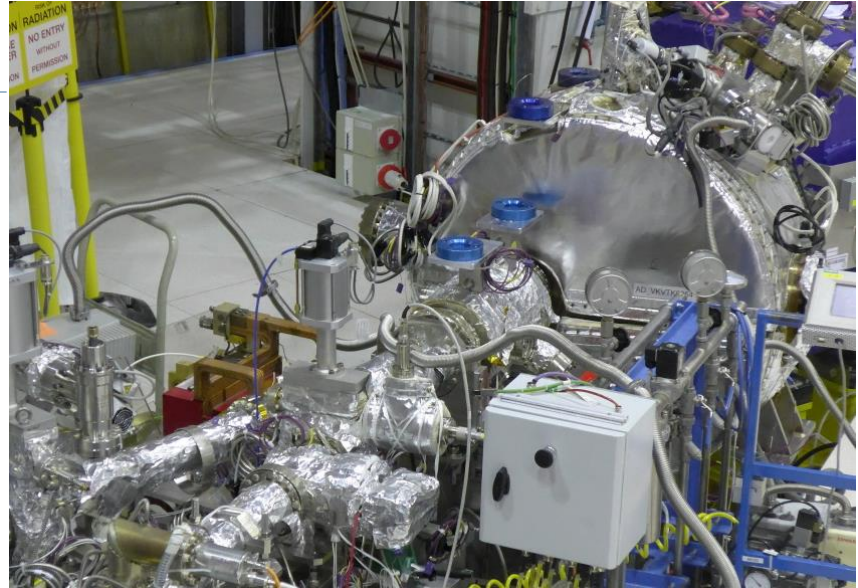
- ▶ **Btrain installation :**
 - ▶ Completion of the Btrain system to be performed



Follow up

▶ Other equipment installation

- ▶ Tune measurement : Installed and aligned
- ▶ Scrapers : Installed and tested.
- ▶ Long PU : Installed
- ▶ BTV : Installed and tested
- ▶ BPMs : Installed
- ▶ Injection Kicker : Installed
- ▶ SEMs : First SEM : Installed on LNS. 3 / 4 SEM at CERN.



ELENA Magnets status w39

▶ 12 MCCAY H/V correctors status:

- ▶ MCCAY03: Installed in position LNR.MCCAY.0130.;
- ▶ MCCAY04: Installed in position ;
- ▶ **MCCAY02: Certification is not OK, Investigating ongoing by contractor ;**
- ▶ MCCAY05: Certification is OK, Magnetic measurements are ongoing, Installation should be possible on 04/10/2016;
- ▶ MCCAY06: Certification is ongoing, Installation foreseen on 10/10/2016;
- ▶ MCCAY07: Certification is ongoing, Installation foreseen on 10/10/2016;
- ▶ MCCAY08 and MCCAY09, Shipment is ongoing. Delivery foreseen on 03/10/2016, Installation foreseen on 14/10/2016;
- ▶ *MCCAY10 and MCCAY11, delivery foreseen on 14/10/2016, Installation foreseen on 24/10/2016;*
- ▶ *MCCAY12 and MCCAY13, delivery foreseen on 20/10/2016, Installation foreseen on 01/11/2016.*

TE/MS-C-MNC

Alignment

▶ Statut de l'alignement : 100%

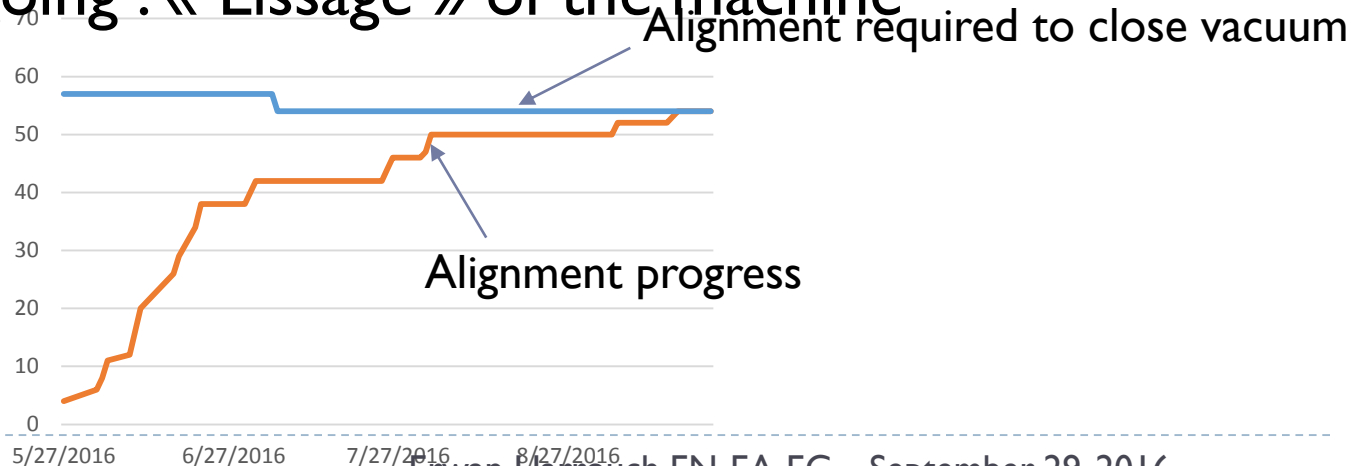
▶ Magnets :

▶ All the magnets are aligned

▶ Correctors magnets are not aligned, the survey only measures their position after installation : Difference of 5mm in the radial direction (Toward the inside of the machine)

▶ All the other beamlines components are aligned

▶ Last step on-going : « Lissage » of the machine

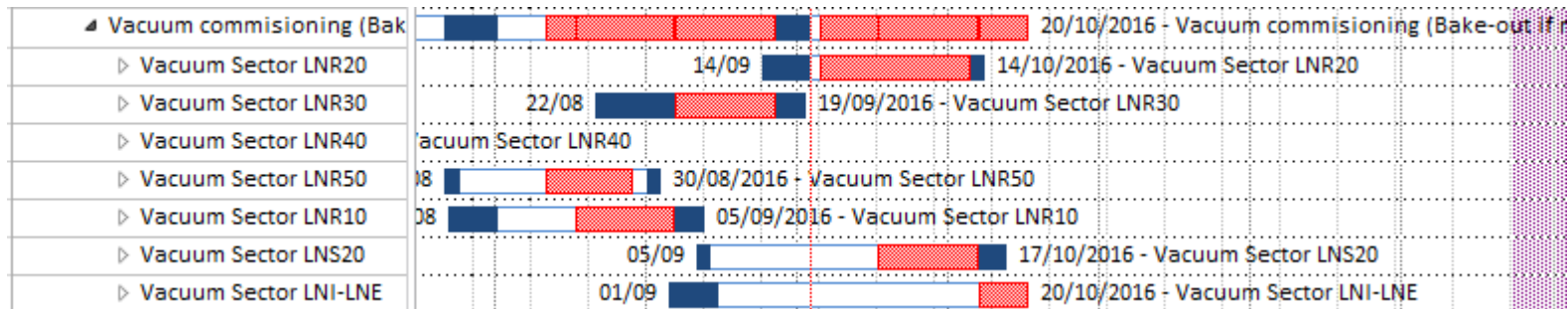


Vacuum advancement

Vacuum sector	Desc.	Bake-out	Pressure reached
LNI-LNE	Inject, from AD + Eject. To exp.	Starting date to be defined	-
LNS20	Source	Start expected by the end of the week	-
LNR10	Eject. to exp.	Done	1×10^{-12} mbars
LNR20	Inject. To ELENA	On-going	-
LNR30	Eject. to GBar	Done	<u>2×10^{-12} mbars</u>
LNR40	E-Cooler Sect	Done	<u>1×10^{-10} mbars</u>
LNR50	Scrapers + RF	Done	<u>5×10^{-12} mbars</u>

Bake-out planning

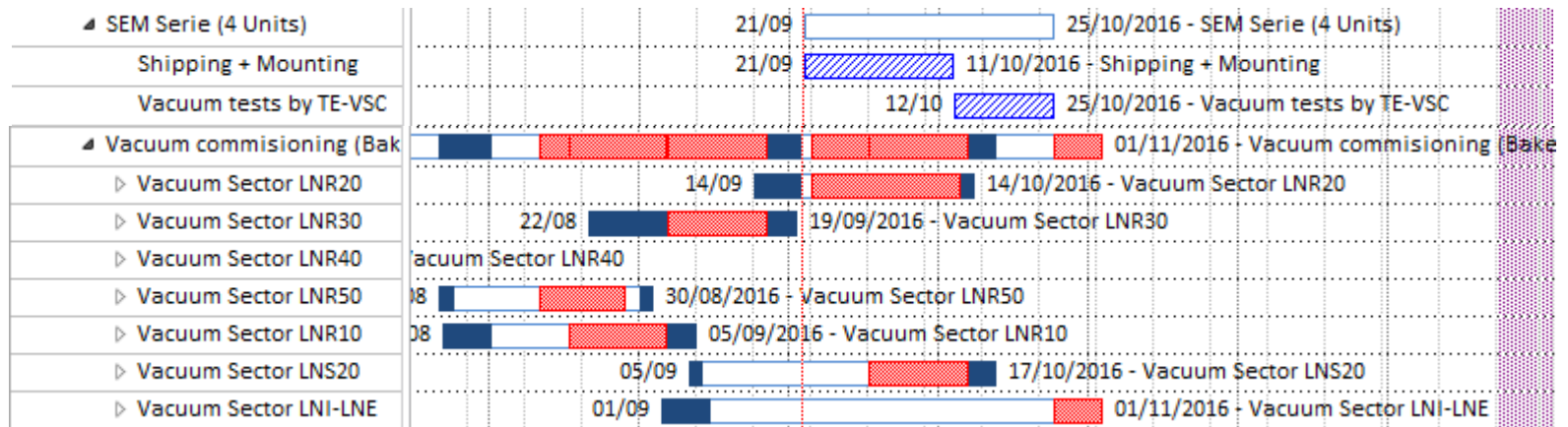
Bake-out planning if we do not wait for the SEM



- LNR 10,30,40,50 bake-out completed
- LNR20 Bake-out on-going
- LNS20 Bake-out start expected by the end of the week
- LNI-LNE bake-out cannot be done in parallel of LNS20/LNR20 bake-out (Not enough power socket and space available)

Bake-out planning

Bake-out planning if we wait for the SEM



- 3 weeks from now before the SEM are sent for vacuum tests
- 2 weeks of vacuum test
- Bake-out completed by the 1/11 with this scenario

Summary of next week

- ▶ Bake-out LNR20 (TE-VSC)
- ▶ Bake-out LNS (TE-VSC)
- ▶ “Lissage” of the machine (EN-ACE)
- ▶ Installation of one corrector magnets (TE-MS)

REMINDER

Hardware tests

- ▶ Any tests performed on the machine should follow the same procedure :
 - ▶ Notify Francois Butin and Jose Gascon by email with a description of the tests that you foresee.
 - ▶ Francois will then trigger a Visite d'Inspection Commune (VIC) if required
- ▶ **Please notify to me all the tests/work that will be performed after the end of the bake-out so they will be integrated to the planning.**

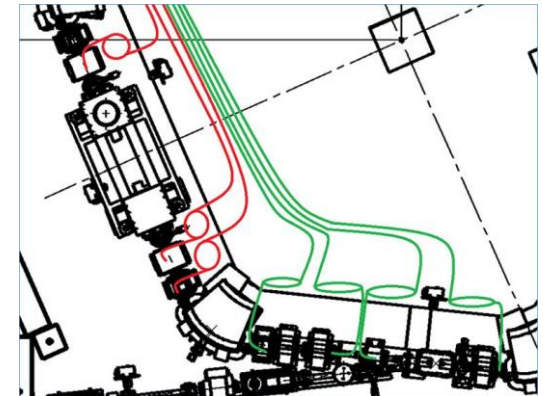
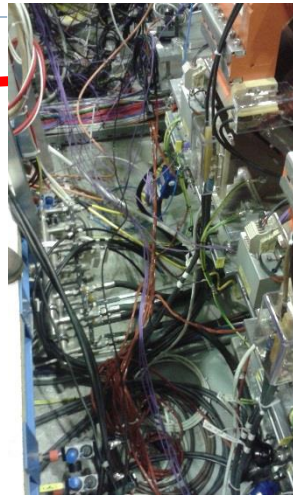
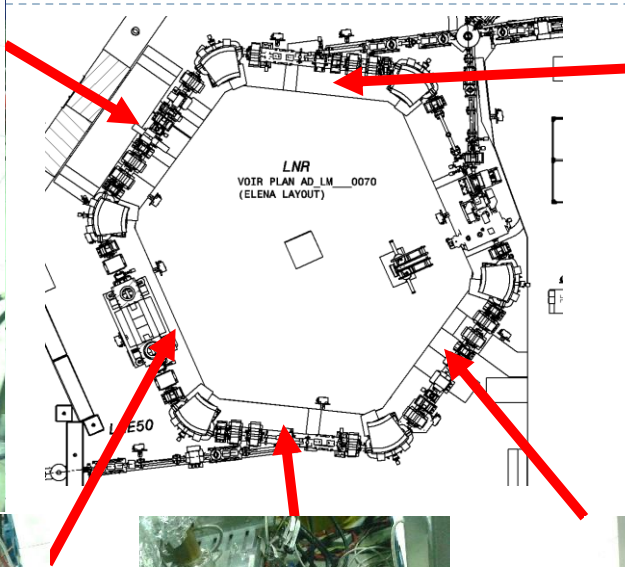
Spare slides

Lock-outs

REMINDER

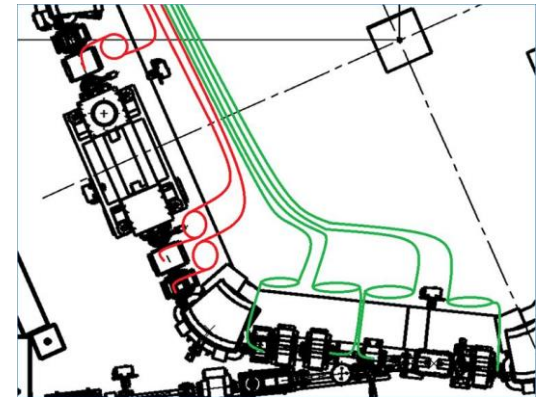
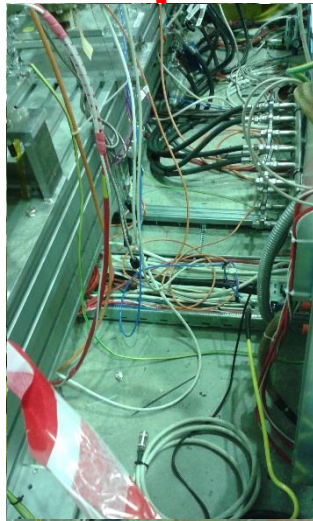
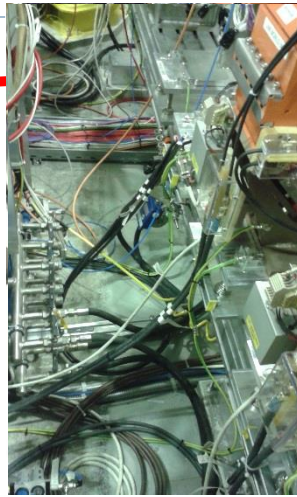
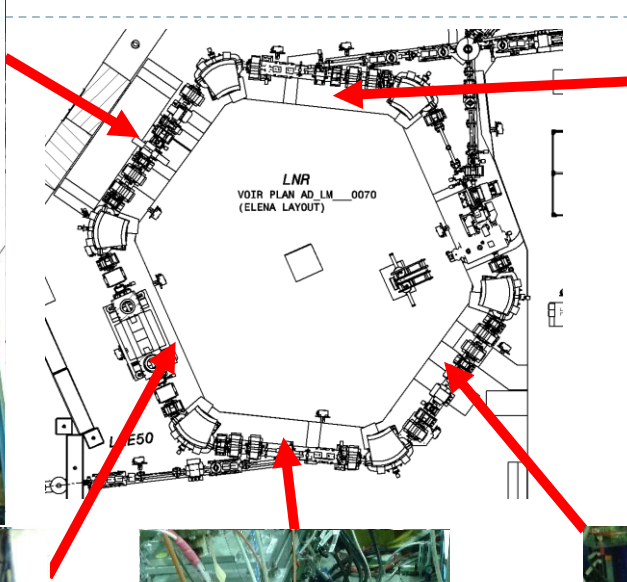
- ▶ Racks sous la responsabilité de TE-EPC :
- ▶ Liste des Racks Convertisseurs se trouvant sur la plateforme :
 - ▶ RYE01 à RYE03 Powering Ring (Responsable équipement : [Kuczerowski, Nicolas](#))
 - ▶ RYE08 Ion Switch (Responsable équipement : [Machado Christophe](#))
 - ▶ RYE10 à RYE13 Transfert Line HV (Responsable équipement : [Machado Christophe](#))
 - ▶ RYE18 à RYE21 Electron Cooler Low Converters (Responsable équipement : [Yves Thurel, Ludovic Charnay](#))
- ▶ Liste des Racks Convertisseurs se trouvant en salle de puissance :
 - ▶ RA-K302 à RA-K307 ELENA Electron Cooler (Responsable équipement : [Ludovic Charnay](#))
 - ▶ RB300 et RB301 Convertisseurs APOLO + Spare (Responsable équipement : [Christophe Mutin](#))
- ▶ LNI bendings: Locked-out (C.Carli) + ground straps on magnets
- ▶ **La demande de consignation peut se faire via le service first line EPC 163668 ainsi qu'à Michal DUDEK ou un responsable d'équipement.**

On the 07/09



Please put your cables in the green configuration

On the 21/09



Please put your cables in the green configuration