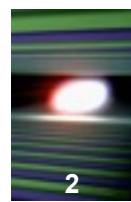


# Introduction

Tobias Haas  
Technical Meeting

2 Sep 2016

# Topics



- S. Cunis: Vibration Situation XHEXP1
- M. Arresté: Cabling Dates
- General Status

# Tunnels Civil Construction

- Interlock doors are being installed in XTL and XS1
- The dump shafts XSDU1/2 get an additional seal and will then be filled with sand and closed.
- Cylinders from heavy concrete are being cast to close unused holes in the radiation protection walls

## TGA in Southern tunnels

- Installations for water and electricity are still ongoing
- Connection of magnet power cables was interrupted to finish XTL
- The cooling infrastructure for the dump in XS1 is almost done. Work then continues on XSDU2/1

# Machine Installations XS1

- All supports for magnets and beam pipes are installed in XS1
- The safety magnets are installed. Mechanics still needs to be connected
- Labyrinths in XS1 to XTD1/2 are installed
- Supports for the shutters of the T1/T2 beam lines are in place
- Intense work on the hanging beam lines in XTD2 and at the end of XTL
- Work on the interlocks should finish by 16 Sep
- Start of cool down now on 17 Oct.

## Machine Installations XTD2

- Work can start on the T4 beam line
- Laser and camera for the SLRS system are being commissioned
- Cooling hoses need to be exchanged on the QA magnets in the undulator section due to insufficient resistance. Will be done so that it does not affect the schedule.

# Machine Installations in other tunnels

- XS3:
  - Last holes being drilled
- XTD4
  - Alignment of the 2 BV magnets end of September
  - Panel wall in undulator section is installed
- XTD10:
  - Floor coating is done
  - Racks have been connected to power
  - Component installation continues
- XTD1
  - Holders for undulator vacuum chamber installed

# Machine Installation in other tunnels cont'd

- XTD5
  - Marking for concrete stones is ongoing
- XSDU1
  - Rails for dump exchange vehicle are installed
- General
  - A lot of cabling is still to be done
  - Rack delivery for SASE2 delayed to Jan 17

# Issues in the tunnels

- Control System Commissioning
- Rack delivery for SASE1

# Status SASE1

- AC
  - Temperature regulation is working
  - Runs continuously in central laser room
  - Condensate goes to a container
  - Sewage pump could be temporarily put into operation
- Electricity
  - Done
- Media
  - Quality problems with the MKK air
  - Gases can be operated when requested
- Fire safety system is being commissioned

# SASE1 Cabling

- Phase1
  - Cables have been pulled
  - Vater working on the patch boxes
  - Racks arrive next week
- Phase2
  - Meeting with Actemium this week
    - ➔ Long lead items are ordered
    - ➔ Delivery starts in week 42
    - ➔ Detailed plans by Monica

# SASE1 Top Open Issues

- XHEXP1 Sewage pump
  - Now runs temporarily
- MKK compressed air
  - No change here
- “Brandschottung” of cutouts in the rack rooms
  - Solution found
  - Will be done by company SVT as part of a larger contract in the tunnels
- Laser Interlocks
  - DESY will do the SASE1 interlocks but they will be delayed until end 2016

# Power Consumption SASE1



# SASE1: Fire protection “Aufdopplung”



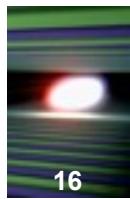
# SASE1: Floor in Bio lab SPB/SFX



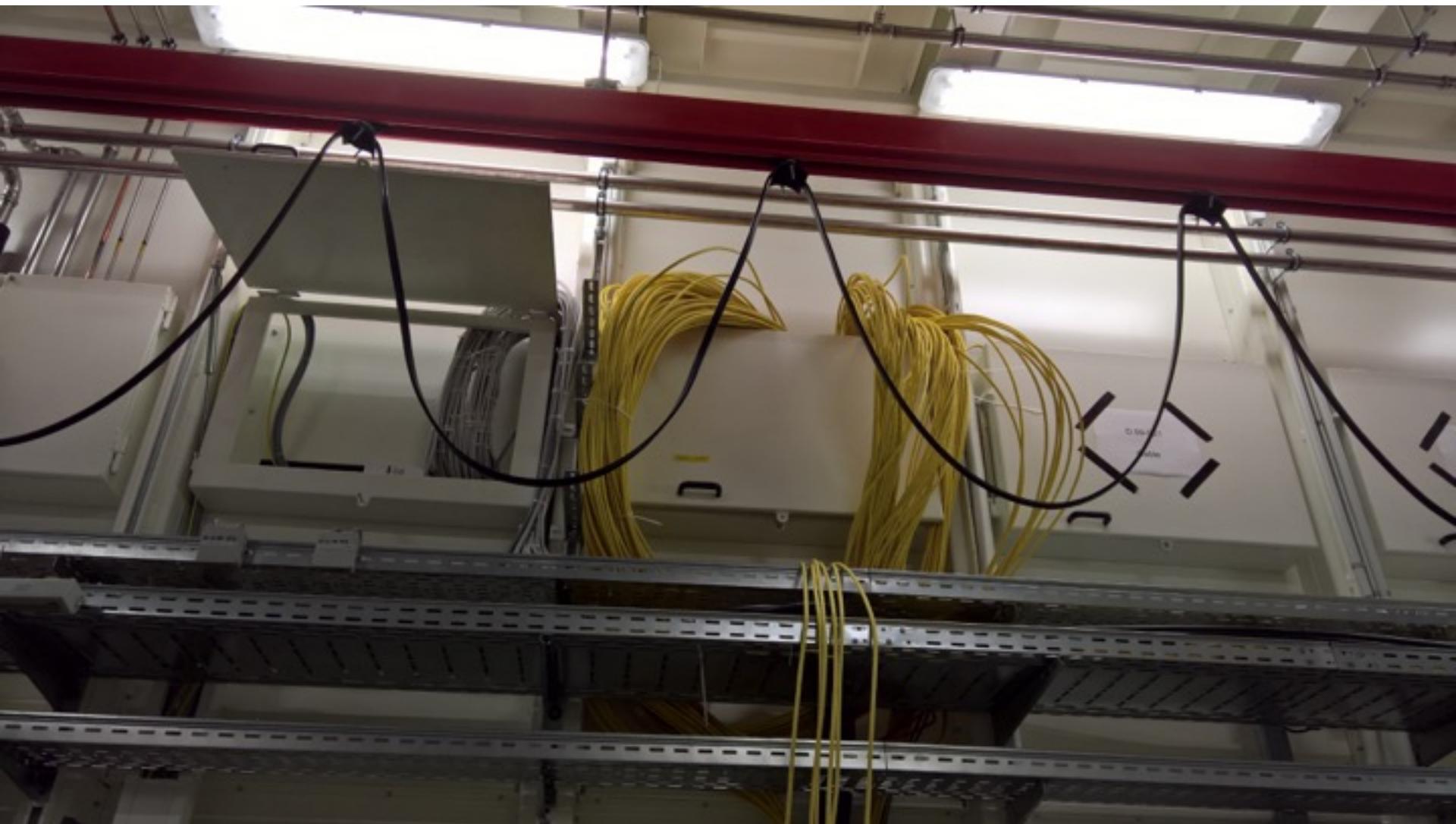
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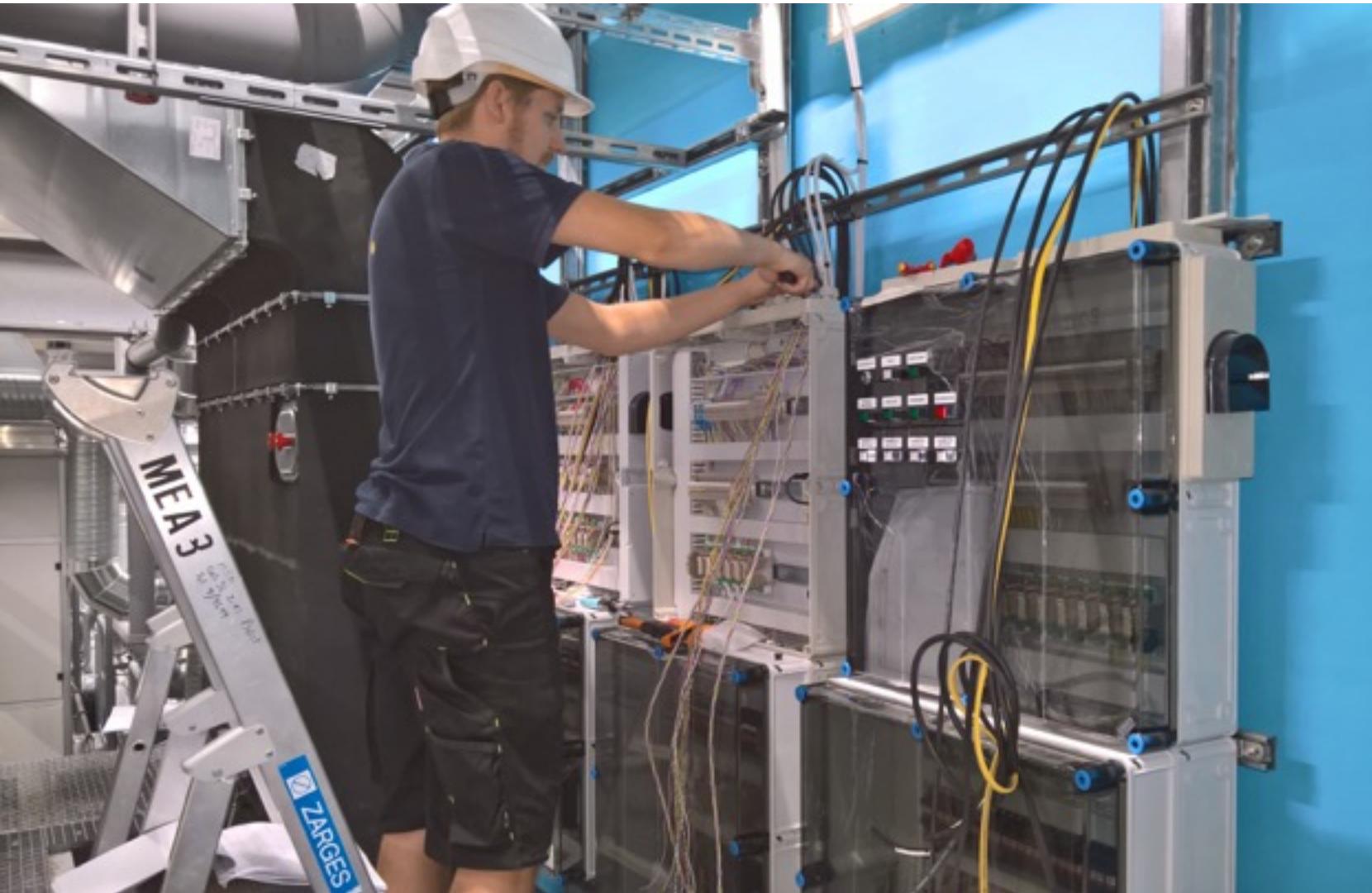
# SASE1: Coax Cables



# SASE1: Cable Capacity problems



# SASE1: MEA3 working on the Laser Interlock



# Pump crunching on sewage...



## SASE3 Status

- Civil construction
  - LIEN started to install chicane doors
    - ➔ difficult to open and do not fit very well
  - Double floors in rack room done
- AC
  - Waiting for updated schedule from Caverion
    - ➔ PI will then update the TGA schedule
- Electrical
  - Detailed discussion placement of outlets and switches last week
  - No installation activity this week

# SASE3 Status

- Media
  - Dräger starts again next week
- No activities on Sanitary and Fire Safety yet

# SASE3 Status

- Electronics and Cabling
  - Phase1 Tender published this week
  - Phase 2
    - ➔ Eplanners started to work on cable planning SASE3

# SASE3 Top Open Issues

- Caverion Time Schedule
- Phase1 Cabling is not tendered yet
  - Went out this week
- Eplanning both for modules as well as for cable routing has not started
  - Cable planning started
- Laser Interlocks
  - SRP identified an external company
    - ➔ PR and MB proposal in preparation

# SASE3: Missing doors



# SASE3: Chicanes with doors



# SASE3: Double Floor in SQS Rack Room



# SASE3: SCS Pump Room



# SASE2 Status

- Civil Construction
  - Pontax installed chicanes
  - LIEN continued with TGA Support structure
    - ➔ Big AC platform
  - Painting contract awarded
- TGA
  - ➔ Kickoff meetings yesterday

# SASE2 Top Open Issues

- Phase1 Cabling draft planning waiting for comments from our side for two months
  - Comments promised for 15 Sep
- Laser Interlocks
  - Will wait for developments in SASE3

# SASE2: Chicanes in MID Hutch



# SASE2: HED Rack Room with Support



## Infrastructure E0

- Meetings with user groups are ongoing

## Next Meetings

- Next Photon Tunnel Coordination Meeting
  - Today after TechMeet in XTOB
    - ➔ Vacuum Controls Task Force
    - ➔ Situation with SASE1 Racks
    - ➔ Finishing XTD2/10
- Next XHEXP1 hall coordination meeting
  - Friday, 9 Sep 8:30 XHQ/E1.173