

PSS/MPS Support for CEBAF/LERF

Organization: Safety Systems Group Name: H. Robertson Date: July 16, 2015

This presentation does not include tasks required for support of or upgrades to CMTF, VTA, HDice, UITF, LCLS2, 12GeV Hall C, ODH - Halls A, B, & C

Effort Year to Date

Completed Support/Projects:

- PSS certification- CEBAF, LERF
- Door Control logic change- LERF
- PSS BCM power supply upgrade- BSY, E. Arc, INJ
- ODH Monitor change out- LERF

Major Milestones Reached on Continuing Projects:

- Completed PSS installation on SHMS for 12GeV Hall C

Near Term Tasks - Next month

CEBAF Support

Aug 2015

- ODH Sensor change out
- PSS Certification*
 - Changes include:
 - Access door logic
 - C100 interface timing
 - Allowed modes for OR08 dump movement
 - BTM trip set points to EPICS
- W2 RF Separator FSD conversion
- Convert BLM/FSD from CAMAC to VME (partial) - W1, W2, W4

*Possible change of date

Mid Term Tasks (2–6 months)

CEBAF Projects

Sep-Oct 2015

- PLC upgrade - Hall C (complete system)
- PLC network upgrade - Counting House (partial)
- PA System upgrade (partial)

Nov 2015-Jan 2016

- Gun HVPS/Laser interface upgrade
- Hall C Dump - ion chambers/PCB

LERF Support

Nov 2015

- PSS Certification

Long Term Projects

CEBAF Projects

2016

- PLC upgrade (complete system) - Hall A
- ODH System upgrade (partial 1/2) - N. Linac, S. Linac
- Install lights/horns in the N. Linac / S. Linac tunnels
- Examine Hall D transition issues with other halls
- Redesign Ion Chamber controls - Hall A
- Convert BLM/FSD from CAMAC to VME (partial) - Hall A, B, C
- Repair damaged BLM HVPS, FSD F. O. cables
- Explore individual Hall FSD shutdown
- Finish MPS HVPS upgrade to CAEN
- Replace Ion Chambers (partial)
- Install new Door Interlock Switches (partial)
- Remove door lock monitor switches from the PSS

Long Term Projects

2017

- PLC upgrade (complete system) - Hall B
- ODH System upgrade (partial 1/2) - N. Linac, S. Linac
- PA System upgrade (partial)
- PSS HMI update
- Kicker redesign
- BLM head redesign
- BLM signal cable system redesign
- Redesign Ion Chamber controls - Hall C
- Replace Ion Chambers (partial)
- Install new Door Interlock Switches (partial)
- Upgrade Access Room status visual indicators

Long Term Projects

2018 - 2019

- PLC upgrade (comprehensive) - N. Linac, S. Linac
- PLC upgrade (partial) - BSY, Injector
- PA System upgrade (partial)
- Replace PSS magenta beacons/strobes with LEDs

LERF Projects

2017

- ODH System upgrade (partial) - LERF
- PLC upgrade (partial) - LERF

2018

- ODH System upgrade (partial) - LERF

Long Term Support

Systems supported after 2015:

- All systems and cards that provide the core PSS and MPS functions

Systems not supported after 2015:

- Legacy custom data acquisition systems or cards for outside customers
 - Replacement VME cards may be installed, but will not be supported by the Safety Systems Group
- No new custom data acquisition systems or cards will be developed or installed by the Safety system Group for outside customers

Significant Problems Pending (technical issues, resource issues, scheduling)

- Staffing

Current Staffing Outlook:

- Ongoing training of new staff
- Replacement hires are frozen