## **Hall C EPICS HV CSS Testing**

Date: February 15, 2019 Time: 10:00AM – 11:00AM

Attendees: Pablo Campero, Amanda Hoebel, Tyler Lemon, Steve Wood

- 1. Discussed DSG-developed CSS screens for HV controls.
  - 1.1. HV CSS screens located on cdaql2 at /home/cdsg/CSS-Workspace/HV-test/CSS.
  - 1.2. Shell script hv-css-test in /home/cdsg opens CS-Studio in workspace containing screens.
  - 1.3. DSG is working on startup script to open CSS screens in run-time environment from command line.
- 2. Tested first version of HV CSS screens
  - 2.1. Channel On/Off control did not work.
    - 2.1.1. DSG will debug today (February 15, 2019) since all HMS HV is off for HMS Q2 power supply repair.
    - 2.1.2. Debugging of controls will only be done on HMS Hodoscope 1 X channel h1x01+
    - 2.1.3. All debugging should be concluded by 4:00PM.
      - 2.1.3.1. Steve Wood will notify DSG if deadline moves to earlier time.
  - 2.2. Controls did not work as they were using PVs for readback.
    - 2.2.1. Channels have separate control and readback PVs.
    - 2.2.2. Screens were incorrectly programed to use readback PVs../hv
    - 2.2.3. Manually changed h1x01+ set voltage control to correct PV and verified correct operation.
    - 2.2.4. DSG will modify program used to generate CSS screens to use correct PVs.
- 3. Discussed features from TCL/TK HV screens yet to be added to CSS HV screens.
  - 3.1. Crate-level voltage on/off controls will be added.
  - 3.2. Crate-level controls for current trip level and ramp up/down rates will be added. 3.2.1. Confirmation message will be displayed if control is used.
  - 3.3. Trip reset control will be implemented.
- 4. Hall C would like to use HV CSS screens in summer experimental run.
  - 4.1. Development and thorough testing of operational versions of HV CSS screens should be complete by the end of April 2019.
- 5. Discussed Hall C alarm handler.
  - 5.1. Steve Wood showed DSG Hall C's current alarm handler running in EPICS ALH.
  - 5.2. All systems (HMS HV, SHMS HV, and PLCs) are included in overall alarm handler.
  - 5.3. For alarms, copies of existing PVs are being used to allow Hall C to change alarm limits without affecting original PVs' settings.
- 6. Discussed new CAEN mainframe and HV cards on loan to DSG.
  - 6.1. DSG has powered CAEN mainframe and connected it to a PC using a crossover cable to view its web interface.
  - 6.2. Steve Wood explained GECO, CAEN's crate control GUI.