

# General Update

- SPR
  - Network changes
    - IPMI, domain setup
  - SNAPS
    - Debugged RPI version of power spectra gateware
    - Code development of voltage gateware capture mode.
- ATA signal chain verification
  - Power drop investigation ISM 902-928MHz
  - Called PG&E nothing new yet!
  - Further work in localization
  - Transmitter frequency sweep at +10dBm 920 – 200MHz
- Feed Firmware
  - Shutdown feed for reaching 70 deg C Cryocooler temp
- Observation
  - Developing capture code for voltage stream design (dada / hashpipe)

# Antonio Feed update

- 3C – replacement of pyramid with new tip-link and modified, preconditioned coaxial wiring.
  - Inner feed assembly, LNA module (Minex)
  - Installation into feed base
  - Firmware 5.4
  - Initial testing / installation on antenna/ TSYS
- 4J – replacement of base plate and pyramid with new tip-link and modified, preconditioned coaxial wiring.
  - Inner feed assembly, LNA module (Minex)
  - Replace base plate
  - Firmware 5.4
  - Tuning Cryocooler
  - Installation into feed base
  - Initial testing / installation on antenna/ TSYS
- 1K – replacement of base plate and pyramid with new tip-link. Installation revised wiring harness.
  - Inner feed assembly, Link-Tip (Minex)
  - Replace base plate
  - Tuning Cryocooler
  - New wiring harness (3x)

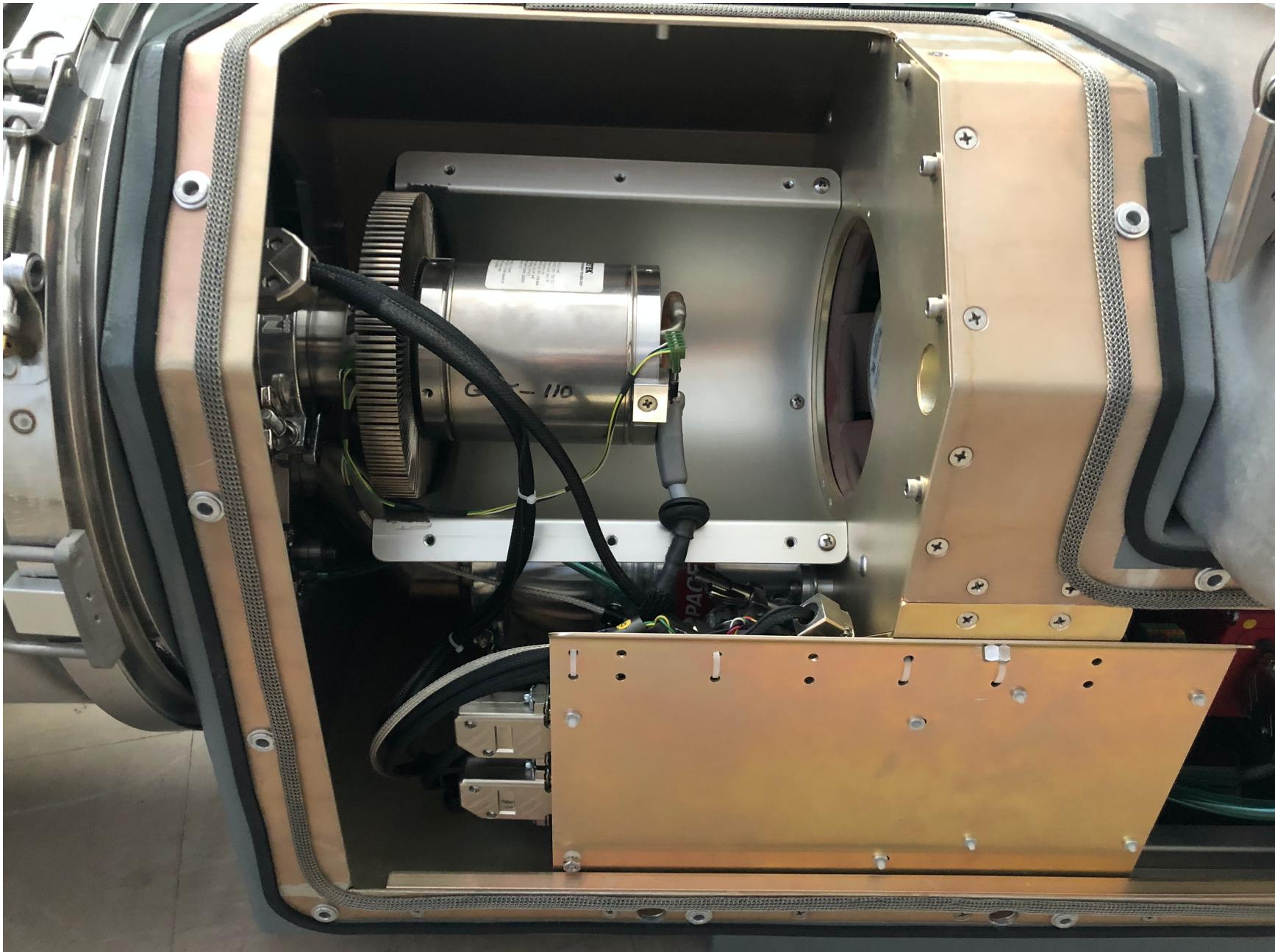
# HCRO Feed Lab

- Work bench arrived on Monday
- Setup complete
- Currently 4 feeds at feed lab for refurbishment



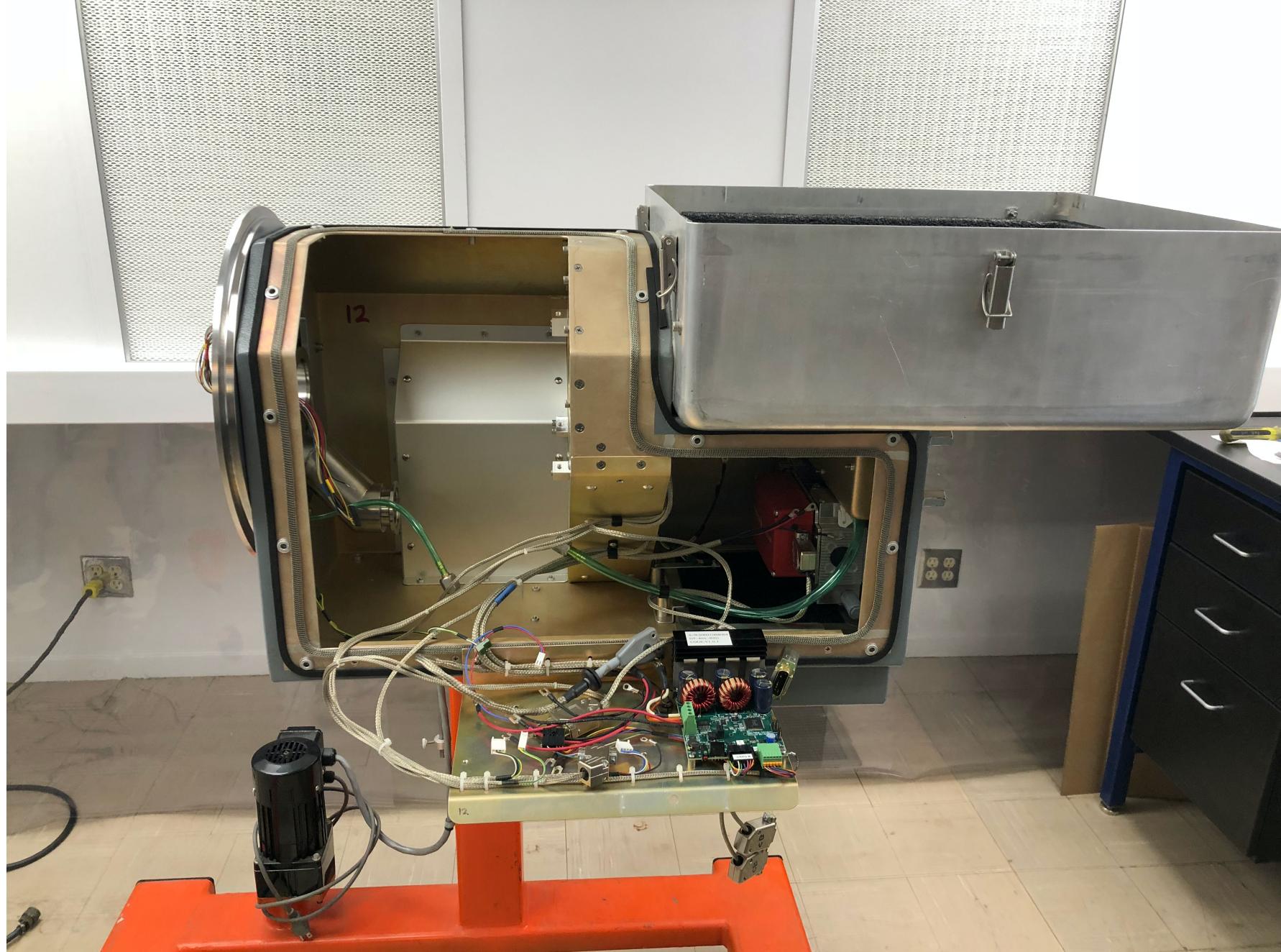
# 4J Refurbishment

- Feed base plate replaced
- Log periodic feed in transport container
- Vacuum tested OK



# 1K Refurbishment

- Feed base plate replaced
- Log periodic feed in transport container
- Discovered broken O-ring
- Wire harness update



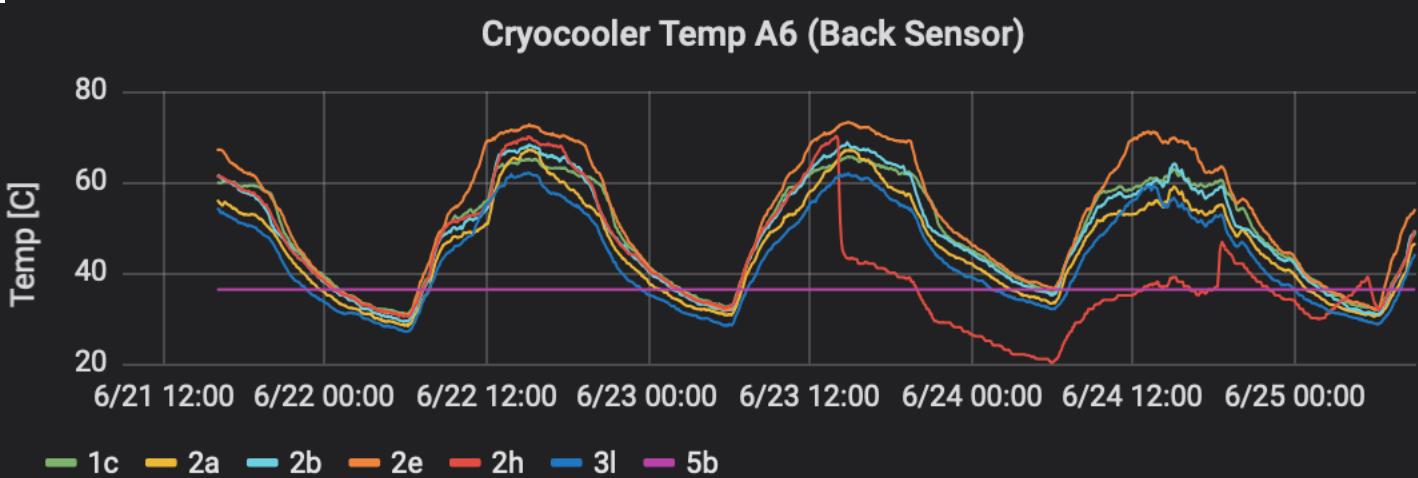
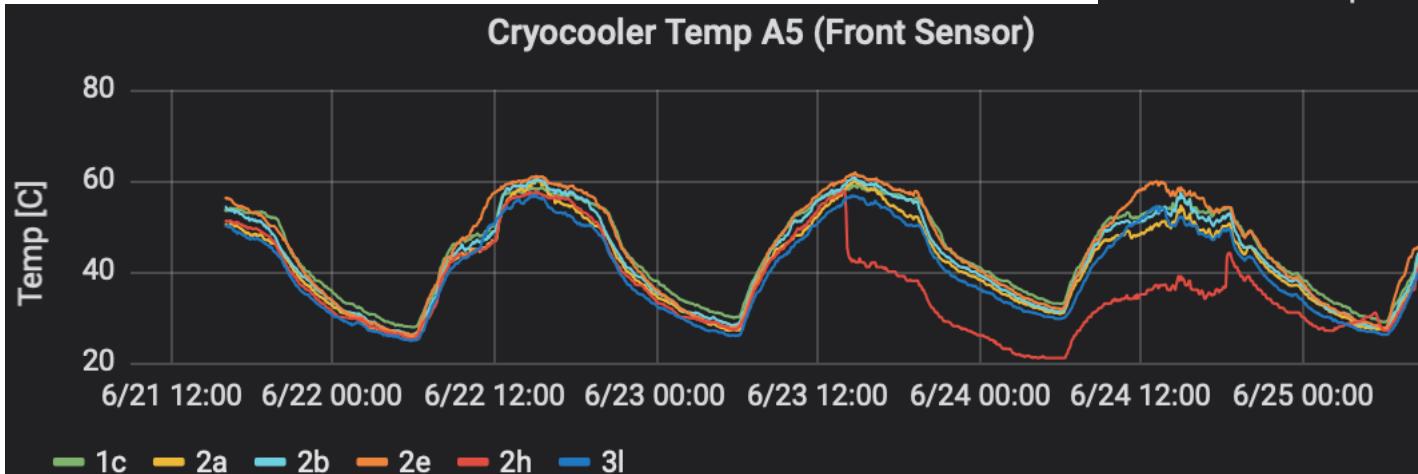
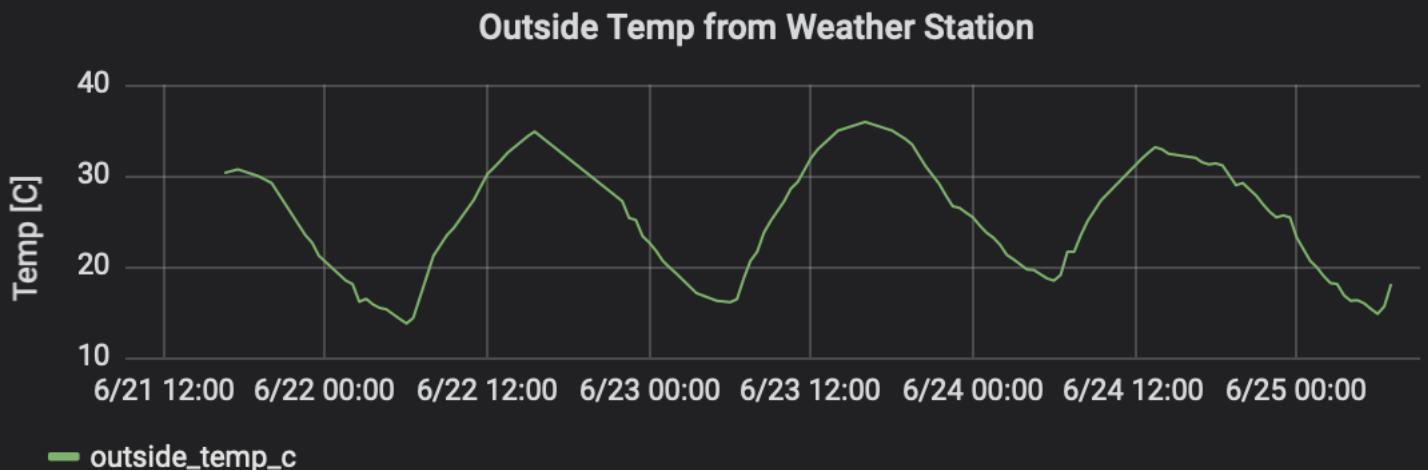
# Parts Ready for transport to Minex

- Log-Periodic feeds 4J and 1K
- Two old base plates



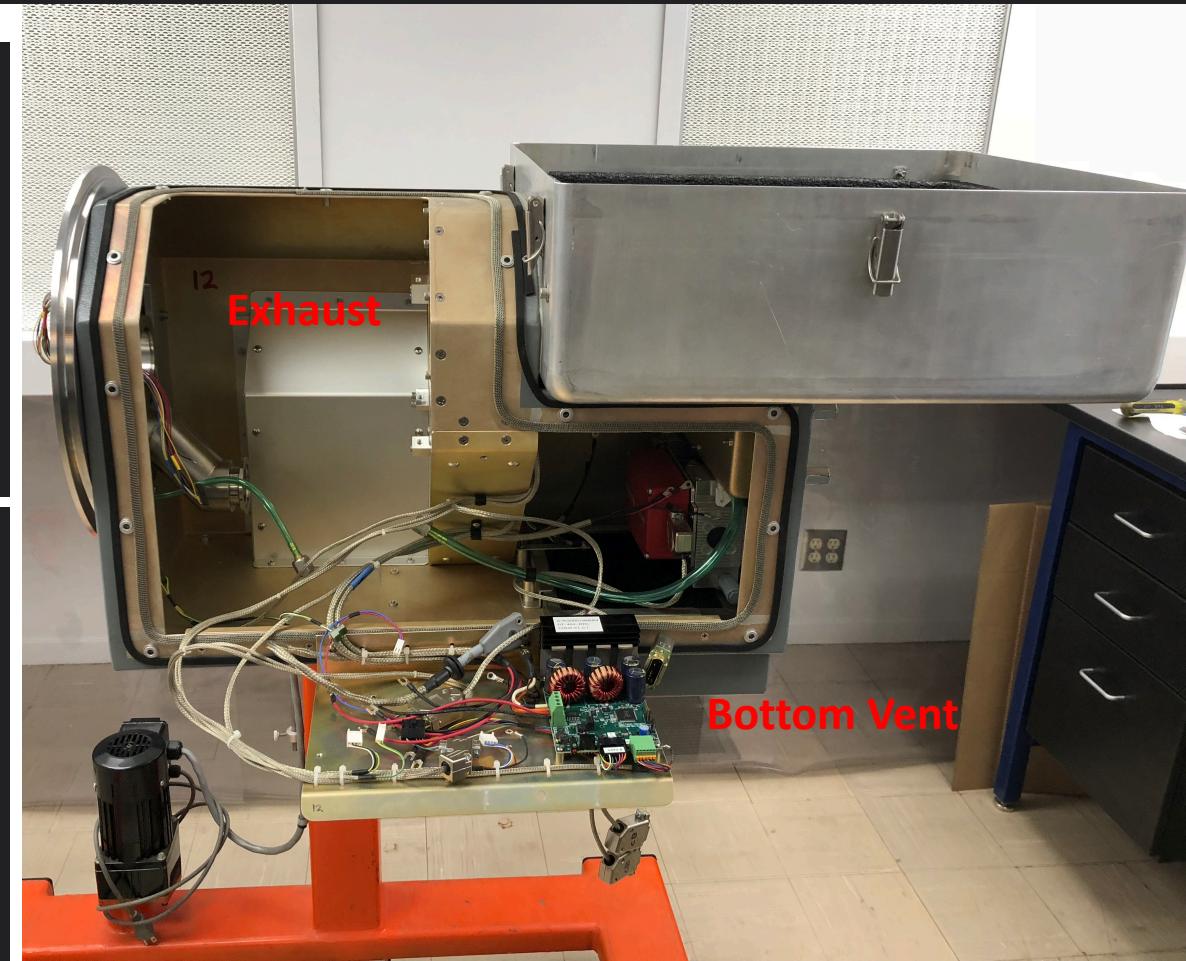
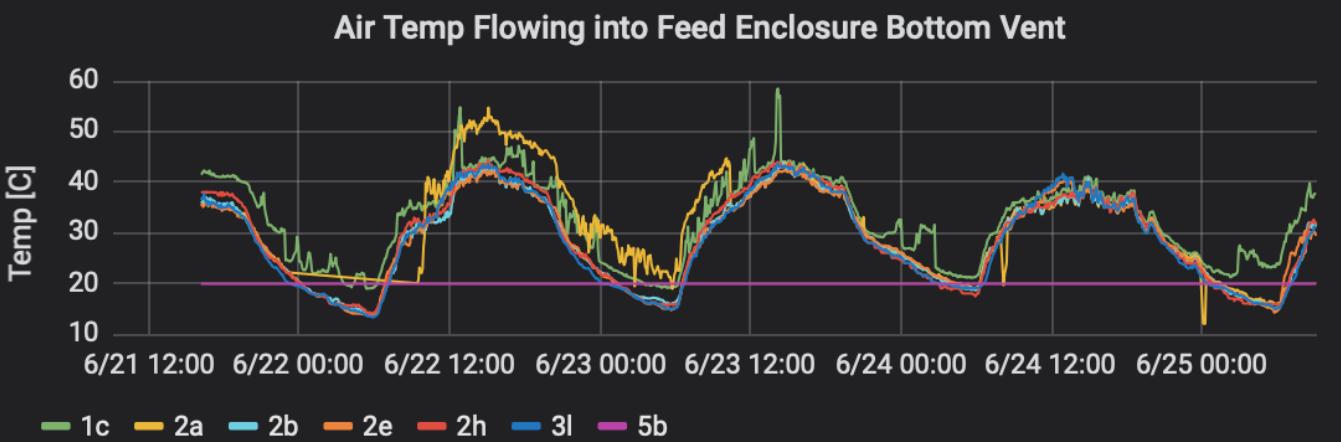
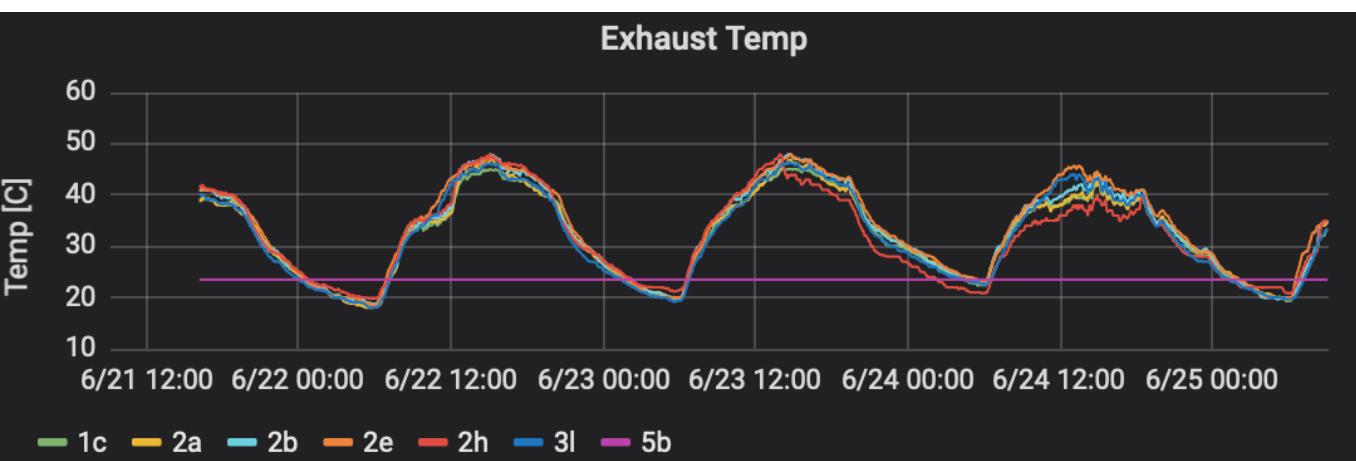
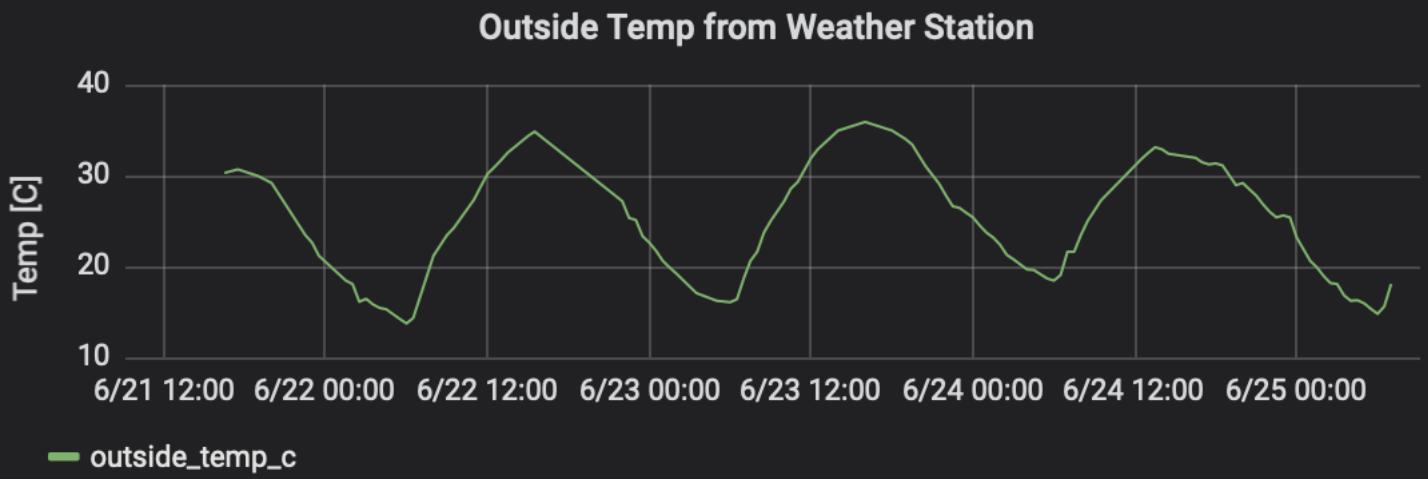
# 2H Shutdown

- Cryo-cooler reached 70 deg C



# 2H Shutdown

- Cryo-cooler reached 70 deg C



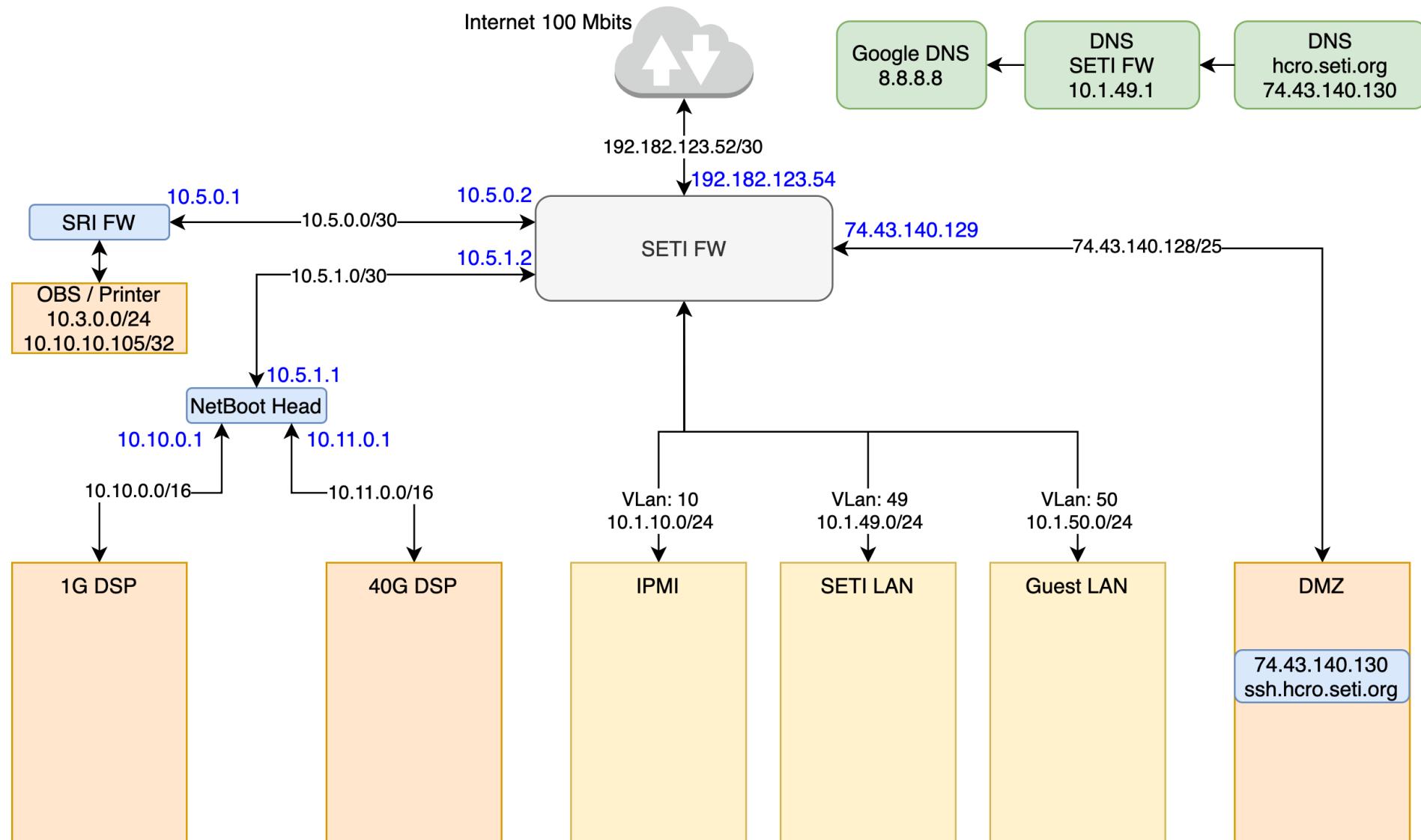
# Update

Network changes:

- DNS implemented
- Network range changed
- Integrated 40G NIC into 100 TB storage

ToDo:

- Setup compute node to analyze data
- Implementing of VLans and updating of switch configuration



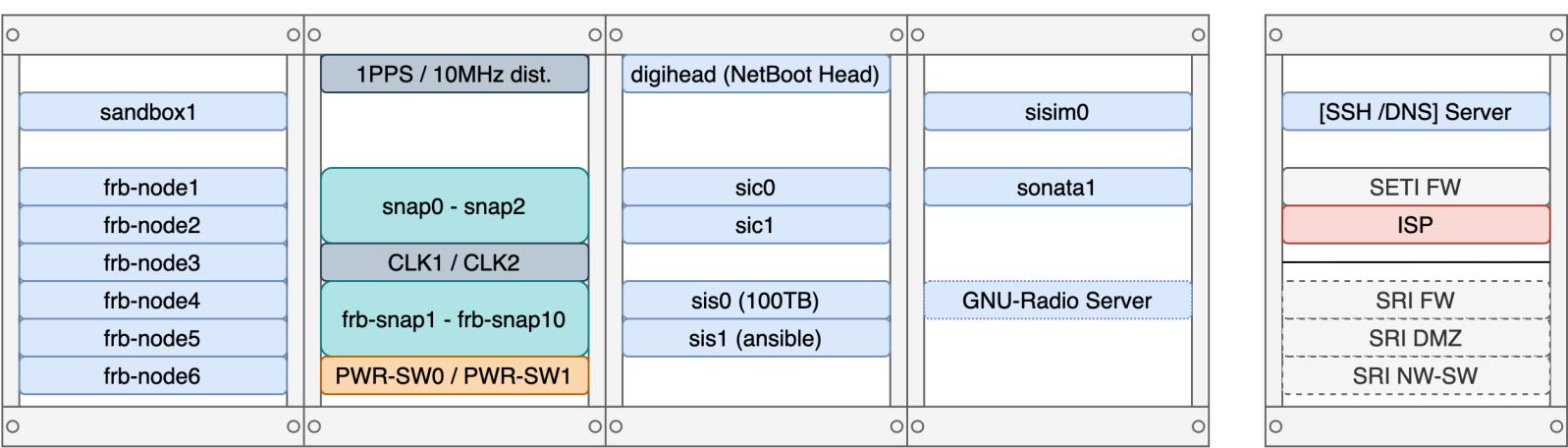
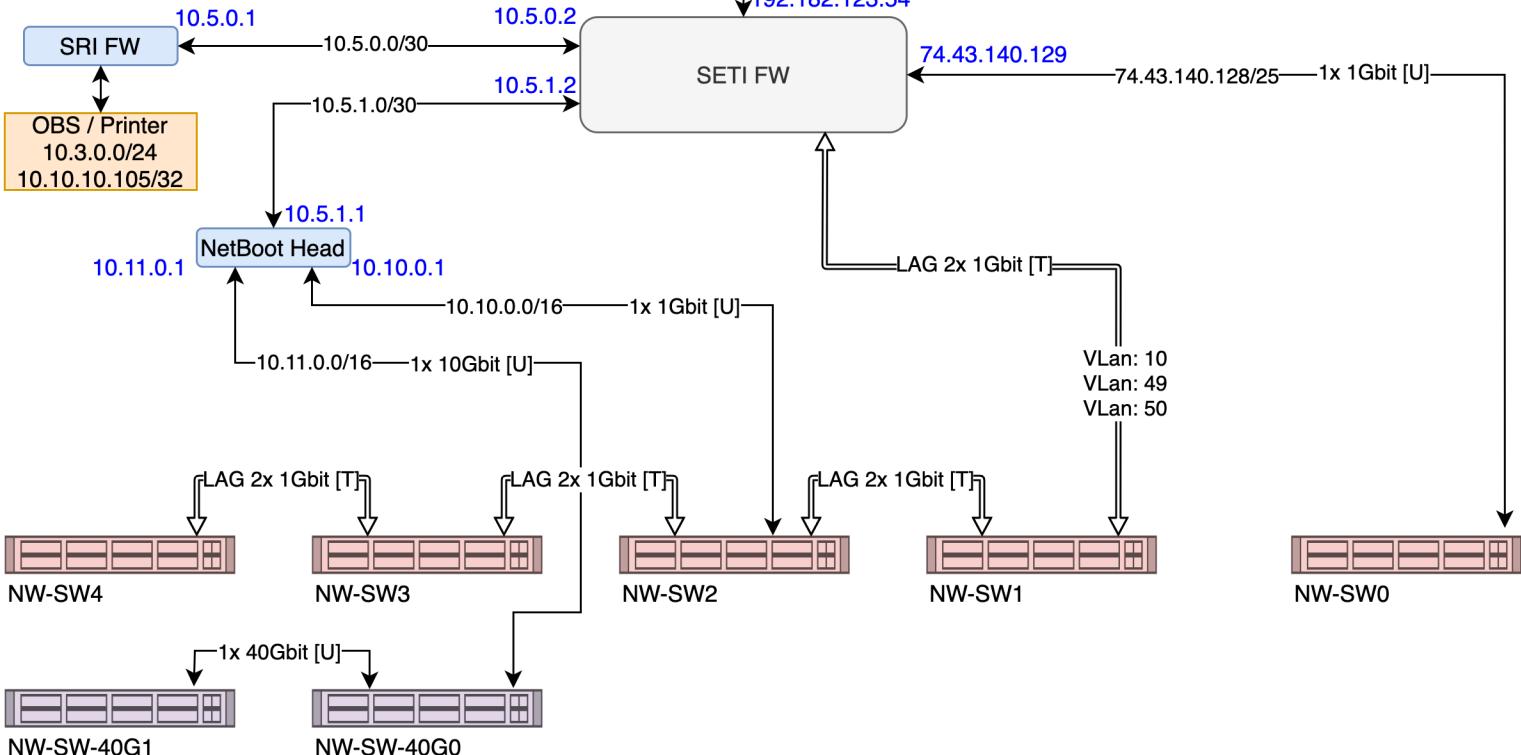
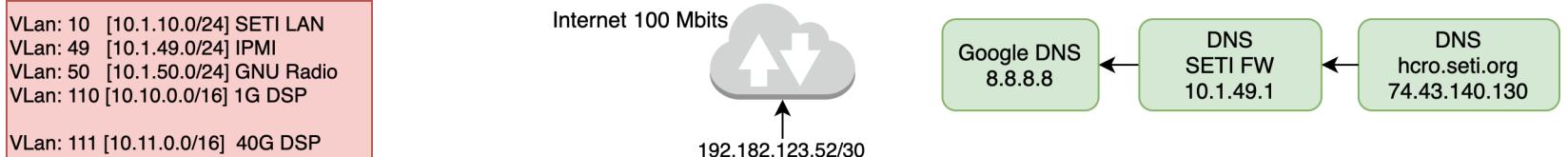
# Update

Network changes:

- DNS implemented
- Network range changed
- **LAG 2x 1Gbit implemented**
- **VLANs implemented**
- **Setup SIC1 to analyze data**

To Do:

- Setup IPMI
- Setup DNS domain  
(`hcro.seti.org`)



## Student Projects and Internships:

Name	Type	Duration (dd/mm/yyyy)	Description	Status
Olivia Durrett	Internship	15/06/2020 to TBC	Astronomical observations and data analysis of pulsars and FRBs	
Sarah Schoultz	Internship	01/07/2020 to 15/10/2020	Outreach, update of posters at ATA, local RFI monitoring	
Daniel Allspach	REU SETI	07/06/2020 to 15/08/2020	Astronomical observations and data analysis of pulsars and FRBs	
Ellie White	REU Berkeley	08/06/2020 to 14/08/2020	GNU Radio Enabled Capabilities for RFI Monitoring and Beamforming	
Hellen Peng	URAP Berkeley	24/02/2020 to 01/05/2020	Software development to control digital step attenuator for IF power leveling	Finished