

NOvA Experiment Report

Update on NOvA Operations

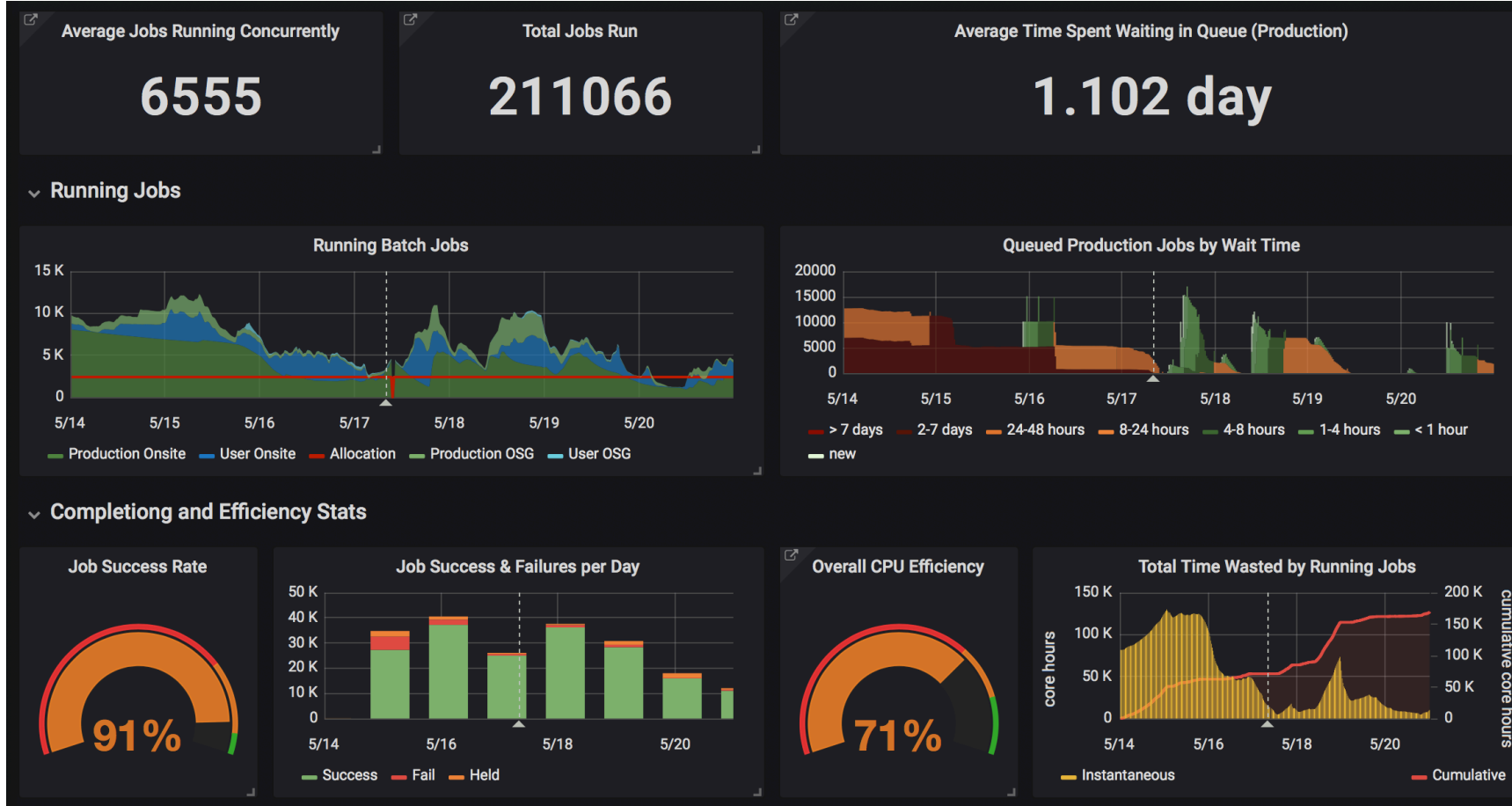


Michael Baird, University of Virginia

AEM Meeting

Monday, May 21st 2018

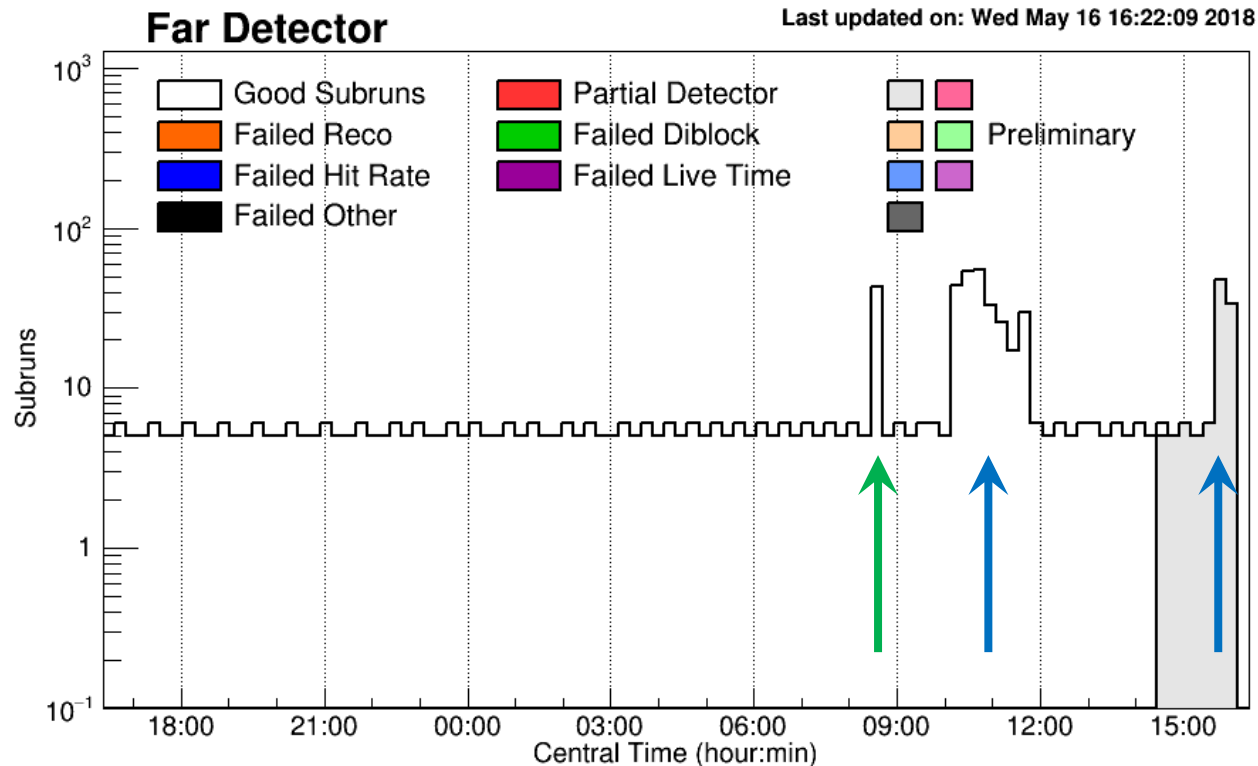
Computing Summary:



- Final sample for the summer conference production campaign has been finished this week.
- Worked through a large number of jobs submitted at the end of last week, these jobs dominated grid usage.

FD Supernova triggers:

- Our supernova trigger has been running reliably since the last shutdown.
- This week we saw several “bursts” of supernova triggers within a few days, triggered by noisy electronics.



- Left plot shows subruns passing data quality metrics (good subruns are white.)
- Spikes in this plot mean short subruns (i.e. many triggers.)
- daily 8:30 am SNEWS trigger
- burst of supernova triggers

- We masked off 2 suspicious FEBs on Friday and haven't seen any supernova triggers since then.

Downtimes this week:

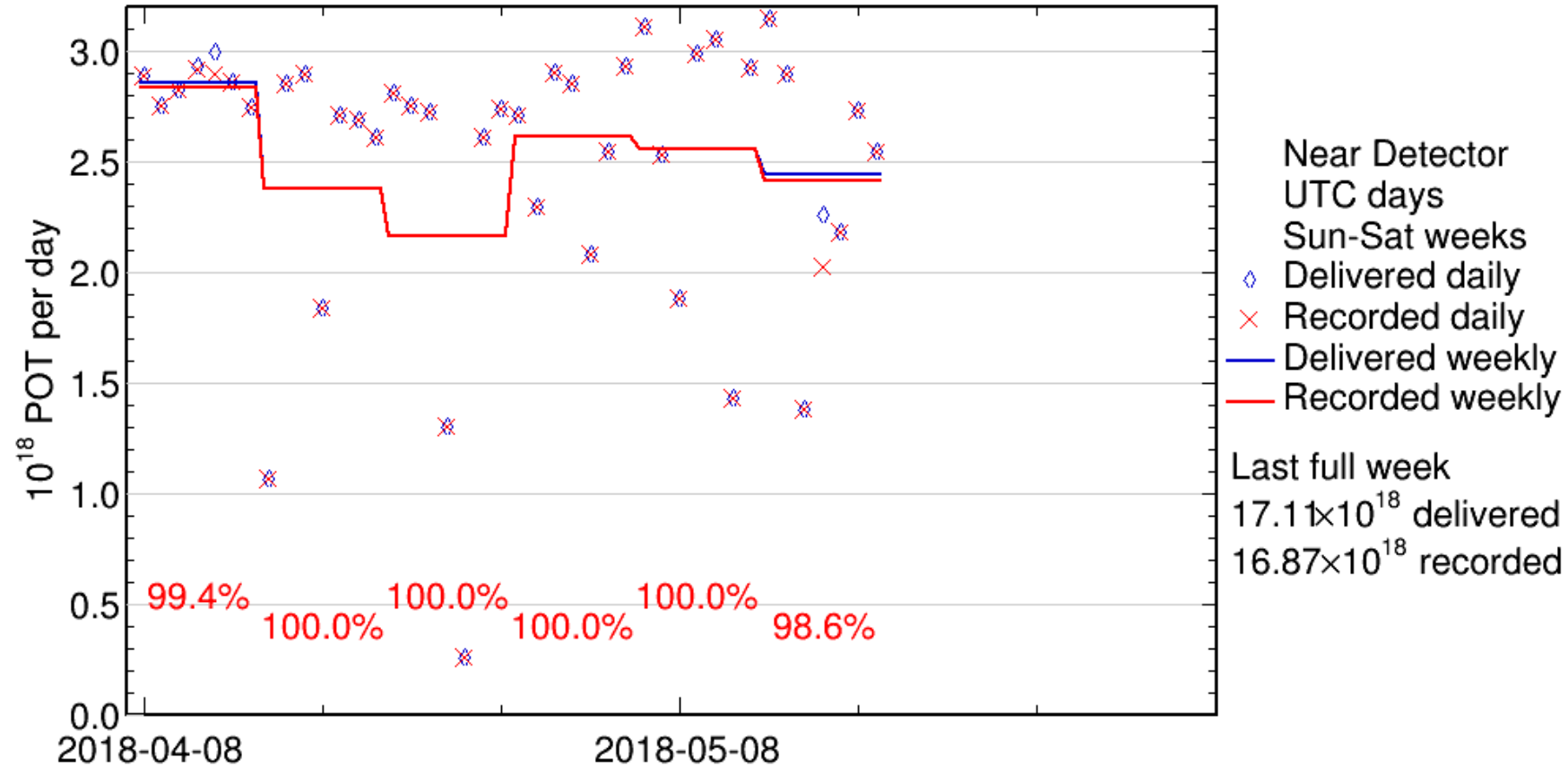
FD:

- Thursday – DAQ crash during an extended burst of supernova triggers (DT = 39 min)
- Friday – Stopped run to mask of suspicious FEBs (DT = 57 min)

ND:

- Wednesday – Received a warm water temperature alarm during maintenance on the MINOS chillers. To remove risk of detector tripping and a potentially long downtime, we stopped running until the alarm cleared. (DT = 2 hr 48 min)
- Thursday – “normal” DAQ hiccup (DT = 23 min)

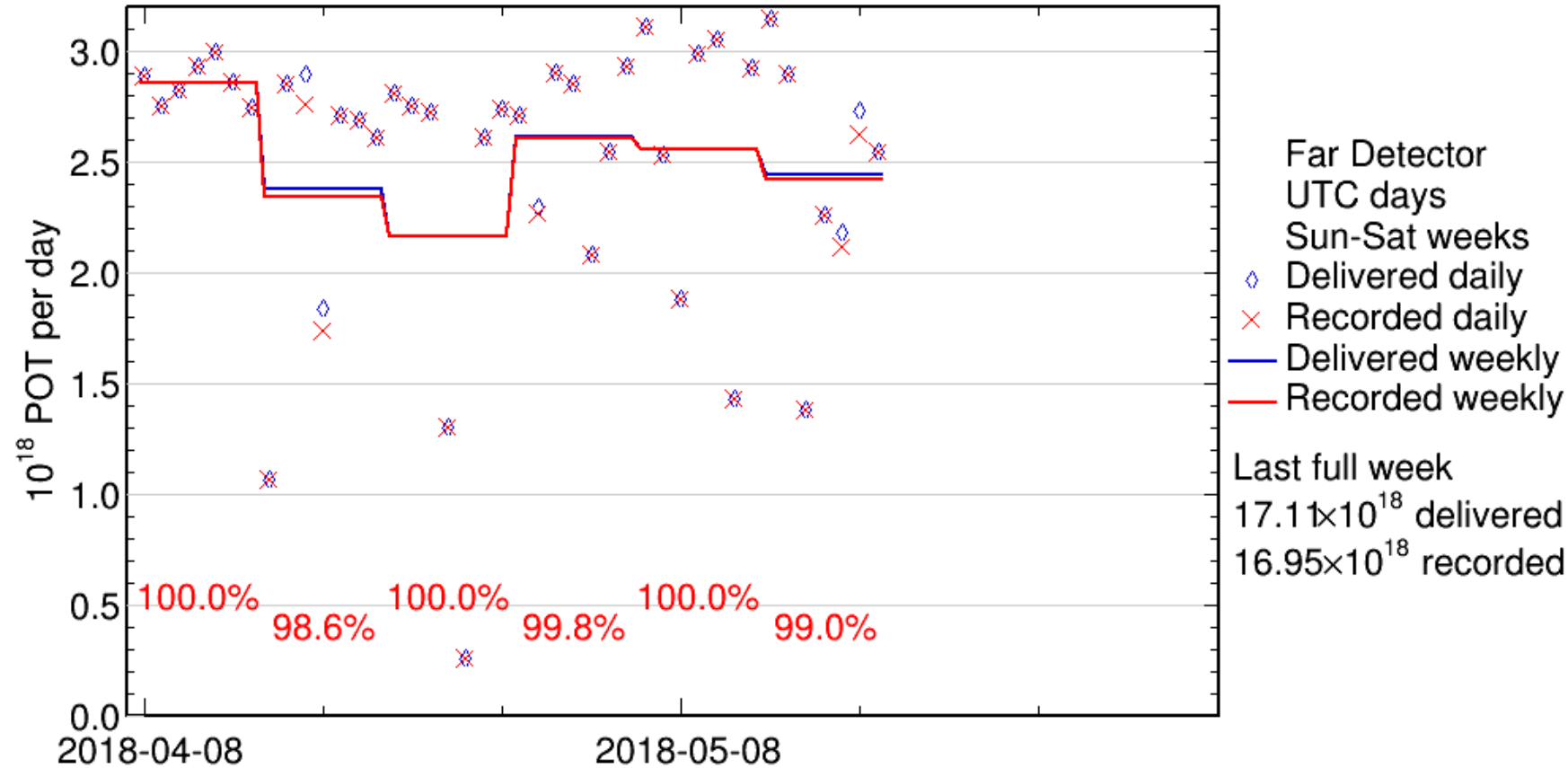
ND Summary:



4 week ave: **99.7%**

~3 hour down time on Wednesday during chiller maintenance.

FD Summary:



4 week ave: **99.7%**

Both down times on Thurs/Fri related to previously mentioned supernova trigger issues.

- FY 2018 POT: 4.41×10^{20} delivered, 4.35×10^{20} recorded
- Total nu mode POT recorded: 11.46×10^{20} (8.85×10^{20} 14 kT equivalent)
- Total anti-nu mode POT recorded: 8.14×10^{20}