

SeaQuest Status

Sep 8 - Sep 21

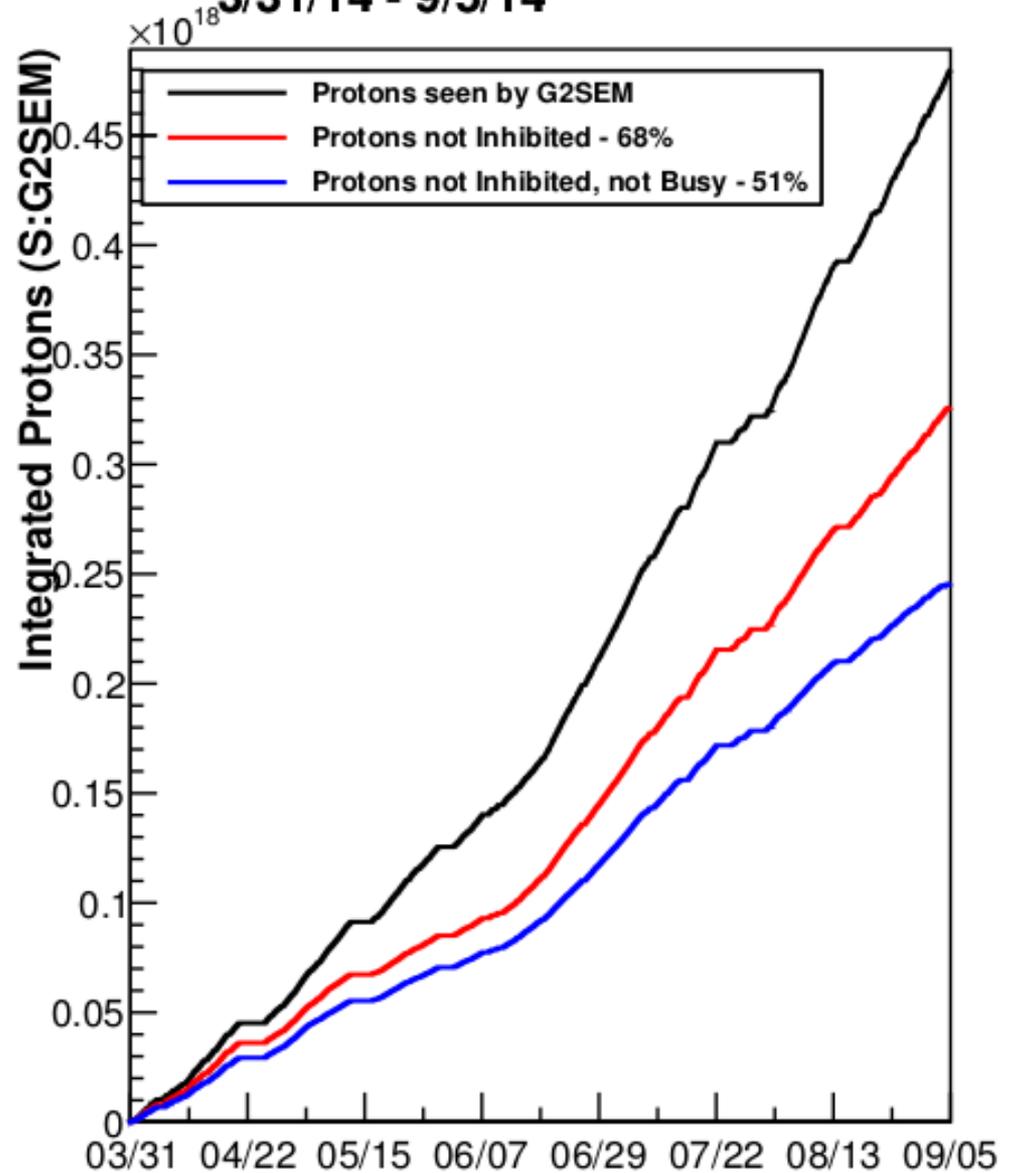
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Sep 22, 2014

Run II – up to shutdown

SeaQuest Integrated Protons

3/31/14 - 9/5/14



Target Maintenance

- Routine coldhead maintenance to be performed by SeaQuestrians
- Examining all wiring and connections
 - We suspect noise in electrical system causing some apparent sensor malfunction
 - Creates experts
- Need mechanical vacuum pumps serviced (4 in use+ 3 spares)
- Upgrade FGD on pump cart with VESDA to avoid electronics in high rad area
 - Similar to replacement done on a separate FGD in recent months

Station 1 Wire Chamber

- Uncovered additional broken wires in need of repair – Now totals 99
 - Repairs underway, not expected to delay installation

(gets its own slide because this is a lot of work)

Trigger + DAQ

- Need to understand a 2ns timing shift in trigger TDCs
 - Time shifts 2ns relative to beam several times
 - Changes the trigger purity
- Possible cause is jitter in rf signal
 - rf for trigger system comes from meson <- probable switch to MI beam sync
 - Trigger clocks not synced with rf <- will be remedied

- Have new VMEs (were low on spares), but they use Linux instead of vxworks
 - Difference not a problem for DAQ, but requires effort to learn how to use the new OS

Other

- Adding shielding to NM4 to avoid damage to electronics on east side
 - Requires rerouting some duct work
- Investigating move of Station 1 (most upstream) hodoscopes to reduce background rate
- Data processing continues
 - Getting ready to leave for DNP in 2 weeks
 - Senior graduate students beginning to salivate
 - Already planning improvements to speed up next processing

