

STEREO MOC Status Report
Time Period: 2021:018 - 2021:024

STEREO Ahead (STA) Status:

1. The following Ground System anomalies/events occurred during this reporting period:

- On day 018, during the DSS-35 support, the transmitter was declared red, due to a hardware problem. This anomaly resulted in the loss of 1.9 hours of real-time commanding and 2-way tracking data. See DR #C115422 for more information.
- On day 023, during the DSS-14 support, turbo decoder lock was lost briefly at 0208z. This anomaly resulted in the loss of one frame of SSR data.
- On day 023, DSS-43 successfully conducted a Return-To-Service (RTS) engineering demo track. The purpose was to validate X-band tracking performance after the installation of a new X-band 80kW transmitter. The MOC successfully received real-time telemetry and sent four commands.

2. The following spacecraft/instrument events occurred during this week. The Ahead observatory operated nominally during this week.

- On day 019, the 134th momentum dump was executed successfully at 1630z, which imparted an estimated delta V of 0.070 m/sec. This was the 53rd momentum dump conducted without gyro use. After thruster operations completed, there was a 0.3 degree of roll angle error. Fine pointing stabilized 2.5 minutes after completion of the momentum dump.
- As of day 024, all PLASTIC systems are behaving well, except there is a high background count rate, which the team is continuing to monitor.
- The average daily science data return for Ahead was 5.8 Gbits during this week.