
Mauna Loa Solar Observatory Observer's Log

Tue Nov 26 16:58:21 GMT 1996

Year: 96 Doy: 331

Observer: koon

WEATHER COMMENT: Tue Nov 26 16:58:25 GMT 1996

Clear sky, wind=5 mph from the SE, temp=42 F.

Tue Nov 26 16:59:05 GMT 1996 CHIP Startup--Initializing new tape

Tue Nov 26 17:02:38 GMT 1996 dPMon Start Patrol

Tue Nov 26 17:02:51 GMT 1996 CHIP CHIP Start Patrol

Tue Nov 26 18:01:48 GMT 1996 CHIP Bias

Tue Nov 26 18:02:58 GMT 1996 dPMon Flat

Tue Nov 26 18:03:05 GMT 1996 CHIP End Bias

Tue Nov 26 18:03:15 GMT 1996 CHIP Water

Tue Nov 26 18:03:53 GMT 1996 dPMon End Flat

Tue Nov 26 18:03:54 GMT 1996 CHIP End Water

MKIII COMMENT: Tue Nov 26 18:06:41 GMT 1996

The images started out with lots of the radial noise spikes that we saw yesterday, then they got better although there were still faint radial brightness differences, then the signal went away completely in both channels and for some reason data stopped going to tape although everything else appears to be running.

Tue Nov 26 19:02:46 GMT 1996 CHIP Bias

Tue Nov 26 19:02:56 GMT 1996 dPMon Flat

Tue Nov 26 19:03:49 GMT 1996 dPMon End Flat

Tue Nov 26 19:03:55 GMT 1996 CHIP End Bias

Tue Nov 26 19:04:05 GMT 1996 CHIP Water

Tue Nov 26 19:04:43 GMT 1996 CHIP End Water

MKIII COMMENT: Tue Nov 26 19:15:30 GMT 1996

When I just came down from checking the encoder and the test points I noticed that the loaf of bread is back and the data are being recorded on tape again.

Doing a coronal scan shows almost no signal from channel #0 punctuated by occasional bursts of noise as the scan progresses, similar symptoms seen on channel #1. The data appears to go to tape only when the "loaf of bread" is visible, also Scan-log shows that data are occasionally recorded with normal looking cadence between scans, then the time for several scans stays the same, then no data recorded for 15 minutes or so.

MKIII COMMENT: Tue Nov 26 19:57:23 GMT 1996

While no "loaf of bread". getting 5vdc out of both Analog Corrector Power Supplies (for chan 0 and 1).

Tue Nov 26 20:02:46 GMT 1996 CHIP Gain

Tue Nov 26 20:02:58 GMT 1996 dPMon Flat

Tue Nov 26 20:03:53 GMT 1996 dPMon End Flat

Tue Nov 26 20:07:09 GMT 1996 CHIP End Gain

Tue Nov 26 20:07:19 GMT 1996 CHIP Bias

Tue Nov 26 20:08:01 GMT 1996 CHIP End Bias

Tue Nov 26 20:08:11 GMT 1996 CHIP Water

Tue Nov 26 20:08:39 GMT 1996 CHIP End Water

MKIII COMMENT: Tue Nov 26 20:32:46 GMT 1996

I can't find any start or rotational signals anywhere, upstairs or downstairs, although I see a square wave at the data test point for channel 0 upstairs. At the encoder cable connector that goes into the first box after the encoder there is a loose ended black wire that was apparently soldered to the braided shield of that cable, it looks like it broke off at the solder connection, it is very small gauge. I'll try to hookup a jumper cable between it and the shield to see if that helps anything.

CHIP COMMENT: Tue Nov 26 20:40:13 GMT 1996

Images still look too bright like they did yesterday.

Tue Nov 26 21:02:58 GMT 1996 dPMon Flat

Tue Nov 26 21:03:49 GMT 1996 dPMon End Flat

Tue Nov 26 21:03:46 GMT 1996 CHIP Bias

Tue Nov 26 21:05:00 GMT 1996 CHIP End Bias

Tue Nov 26 21:05:09 GMT 1996 CHIP Water

Tue Nov 26 21:05:48 GMT 1996 CHIP End Water

MKIII COMMENT: Tue Nov 26 21:23:23 GMT 1996

Jumping the black wire to the shield didn't make any difference. The only signals I see are: upstairs, ch 0 data signal, volts/div=1, time/div=5 microseconds; downstairs, ch 0 start signal, volts/div=1, time/div=5 microseconds. Note that I forgot to mention the downstairs signal earlier, but it was there. Could one of those testpoints be mislabeled so that I am actually seeing only one signal at both places?

CHIP COMMENT: Tue Nov 26 21:57:52 GMT 1996

Images are starting to look better (less bright).

Tue Nov 26 22:01:50 GMT 1996 CHIP Bias

Tue Nov 26 22:03:02 GMT 1996 dPMon Flat

Tue Nov 26 22:03:07 GMT 1996 CHIP End Bias

Tue Nov 26 22:03:17 GMT 1996 CHIP Water

Tue Nov 26 22:03:59 GMT 1996 dPMon End Flat

Tue Nov 26 22:03:56 GMT 1996 CHIP End Water

Tue Nov 26 22:56:54 GMT 1996 dPMon End Patrol

Tue Nov 26 22:58:34 GMT 1996 CHIP CHIP End Patrol

MKIII COMMENT: Tue Nov 26 22:57:29 GMT 1996

Since the solder joint on the outside of the encoder cable may have damaged some wires (near D-connector into first box) I turning off the Analog power and disconnected both ends of that cable and tested for continuity. All wires are good between connectors, and none of the wires are shorted to each other. The gold cylindrical connector (Microtech?) doesn't connect to the braided shield of the cable either through a pin or the metal body of the connector, maybe that is why the black wire at the D-connector on the other end of the cable isn't soldered to the shield, is this desirable? I checked for continuity between the unwired solder joint near the D-connector and the pins and body of the gold metal connector.

The last few times I tried a coronal scan there were only concentric rings for both channels, no random noise and no "loaf of bread". Maybe the HEI did get damaged by that short that Eric mentioned on 11/21/96.

Tue Nov 26 23:33:03 GMT 1996 CHIP ending tape
COMMENT: Tue Nov 26 23:30:57 GMT 1996
Activity report:
QP: 130; 233-245; 306; 314.
No coronal activity observed, but had problem with MKIII.

TAPES:

MKIII: H01441
DPMON: P00767
CHIP: C00184
LOWL: L00428 in drive #0

SCAN-LOG

SCAN-LOG 17:03:29. 11/26/96 DOY 331

17:12:24	17:15:36	17:18:49	17:22:02	17:25:19
17:28:32	17:31:48	17:35:03	17:38:20	17:41:35
17:44:53	17:48:09	17:51:34	17:54:50	17:58:07
17:58:07	17:58:07	17:58:07	18:13:01	18:13:01
18:13:01	18:13:01	18:27:53	18:31:11	18:34:30
18:37:48	18:41:07	18:44:59	18:44:59	18:44:59
18:44:59	18:44:59	18:44:59	19:07:37	19:10:55
19:14:11	19:17:29	19:20:46	19:24:05	19:27:23
19:30:42	19:30:42	19:30:42	19:41:46	19:41:46
19:41:46	19:41:46	19:41:46	19:41:46	19:41:46
19:41:46	19:41:46	19:41:46	19:41:46	19:41:46
19:41:46	19:41:46	19:41:46	19:41:46	19:41:46
19:41:46	19:41:46	19:41:46	19:41:46	19:41:46

0 ERRORS

OK