

## SORCE Weekly Status Report – 8/27/2009 to 9/9/2009

### 1. Introduction

This status report addresses the performance of the SORCE spacecraft, instruments, and ground assets during the weeks of Thursday, August 27, through Wednesday, September 2, 2009, and Wednesday, September 3 through Thursday, September 9.

### 2.a. Spacecraft Summary (submitted by Deb McCabe, Sept. 3)

08/27	08/28	08/29	08/30	08/31	09/01	09/02
239	240	241	242	243	244	245

A STR-FSS calibration was performed on DOY 239.

There were four MU read zero event this week.

2009/240-11:15:57  
 2009/241-07:38:16  
 2009/241-20:46:26  
 2009/243-07:02:29

GCI lockups:

Instrument	Lockup Time	Response Time	Duration	Lat	Lon
solstice_a	2009/239-17:46:43	2009/239-18:41:15	54.53	-37.5	-77.5
solstice_a	2009/240-14:41:30	2009/240-15:44:08	62.63	-28.2	-63.4
solstice_a	2009/241-23:31:04	2009/242-00:07:20	36.27	-16.0	-84.8
solstice_a	2009/243-03:21:25	2009/243-03:39:19	17.90	30.3	-85.6
solstice_a	2009/245-11:02:55	2009/245-12:21:19	78.40	-19.1	-55.9
solstice_b	2009/239-19:37:10	2009/239-20:18:19	41.15	-33.3	-43.8
solstice_b	2009/240-13:02:54	2009/240-14:06:55	64.02	-25.1	-44.2
solstice_b	2009/240-18:12:32	2009/240-18:58:21	45.82	-37.1	-41.5
solstice_b	2009/242-15:20:38	2009/242-16:18:59	58.35	-39.0	-51.3
solstice_b	2009/244-16:00:27	2009/244-16:54:45	54.30	-36.5	-31.7
sim_a	2009/239-14:24:07	2009/239-14:58:53	34.77	-24.5	-59.4
sim_a	2009/240-11:19:46	2009/240-12:02:27	42.68	-11.8	-37.5
sim_a	2009/240-14:41:45	2009/240-15:16:52	35.12	-28.6	-62.9
sim_a	2009/240-21:40:33	2009/240-21:45:41	5.13	-11.7	-44.3
sim_a	2009/241-14:53:31	2009/241-15:34:59	41.47	-21.5	-84.8
sim_a	2009/241-16:48:38	2009/241-17:12:10	23.53	-38.9	-36.8
sim_a	2009/241-23:34:04	2009/241-23:41:01	6.95	-9.2	-76.6
sim_a	2009/242-11:52:34	2009/242-12:38:42	46.13	-16.4	-52.7
sim_a	2009/243-08:58:57	2009/243-09:42:25	43.47	-27.2	2.1
sim_a	2009/243-12:12:42	2009/243-12:56:49	44.12	-26.5	-48.5
sim_a	2009/243-15:37:53	2009/243-16:11:13	33.33	-39.7	-53.6
sim_a	2009/244-14:19:26	2009/244-14:52:02	32.60	-39.6	-25.0
sim_a	2009/244-16:04:32	2009/244-16:29:14	24.70	-30.9	-16.3
sim_a	2009/245-17:59:19	2009/245-18:24:15	24.93	-26.6	-43.1
sim_b	2009/240-16:25:30	2009/240-16:54:09	28.65	-37.9	-61.2
sim_b	2009/240-18:12:58	2009/240-18:31:21	18.38	-36.5	-39.5
sim_b	2009/241-13:20:55	2009/241-13:57:51	36.93	-29.9	-45.9
sim_b	2009/243-01:46:14	2009/243-02:00:39	14.42	33.3	-54.0
sim_b	2009/244-10:47:45	2009/244-11:37:45	50.00	-19.6	-44.8
sim_b	2009/245-12:43:16	2009/245-13:32:46	49.50	-25.9	-70.4
sim_b	2009/245-14:35:06	2009/245-15:09:57	34.85	-39.5	-34.2
sim_b	2009/245-16:16:27	2009/245-16:47:09	30.70	-35.8	-39.6
sim_b	2009/245-23:21:39	2009/245-23:40:18	18.65	37.4	-22.1
tim	2009/240-18:13:00	2009/240-18:28:41	15.68	-36.5	-39.5
tim	2009/240-19:52:53	2009/240-20:05:53	13.00	-32.8	-53.1
tim	2009/240-21:33:44	2009/240-21:43:06	9.37	-26.3	-64.4
tim	2009/240-23:17:16	2009/240-23:20:18	3.03	-12.5	-70.0
tim	2009/242-13:37:17	2009/242-14:13:20	36.05	-31.8	-52.3

tim	2009/243-12:15:32	2009/243-12:54:15	38.72	-31.5	-38.7
tim	2009/243-19:08:23	2009/243-19:23:03	14.67	-21.1	-38.3
tim	2009/244-10:50:22	2009/244-11:35:05	44.72	-25.1	-36.6
tim	2009/245-11:09:11	2009/245-11:52:55	43.73	-31.3	-35.2
tim	2009/245-12:49:10	2009/245-13:30:07	40.95	-35.6	-48.5
tim	2009/245-14:27:18	2009/245-15:07:17	39.98	-36.9	-68.5
tim	2009/245-17:55:31	2009/245-18:21:39	26.13	-33.2	-56.6
tim	2009/245-19:38:43	2009/245-19:58:51	20.13	-22.0	-60.5
XPS	2009/242-18:47:57			-30.9	-44.7
XPS	2009/242-20:33:48			-12.7	-41.7
XPS	2009/243-10:34:38			-24.5	-27.0
XPS	2009/243-20:43:13			-25.6	-69.8
XPS	2009/243-20:48:40			-13.9	-53.5
XPS	2009/245-16:25:11			-20.9	-9.4

	SIM A	SIM B	SOL A	SOL B	TIM	XPS*
Week	14	9	5	5	13	6
Total	2098	2664	1444	1721	2320	2164

**2.b. Spacecraft Summary** (submitted by Deb McCabe, Sept. 10)

09/03	09/04	09/05	09/06	09/07	09/08	09/09
246	247	248	249	250	251	252

There were four MU read zero event this week.

2009/247-19:51:50  
2009/250-03:21:09  
2009/251-15:27:53  
2009/251-16:18:13

**GCI lockups:**

Instrument	Lockup Time	Response Time	Duration	Lat	Lon
solstice_a	2009/246-16:38:45	2009/246-17:31:07	52.37	-24.7	-25.6
solstice_a	2009/247-15:03:03	2009/247-16:12:01	68.97	-39.9	-67.7
solstice_a	2009/249-17:24:59	2009/249-18:25:03	60.07	-24.4	-56.3
solstice_a	2009/250-10:36:19	2009/250-12:14:03	97.73	-4.1	-101.1
solstice_a	2009/252-08:05:58	2009/252-09:34:36	88.63	-31.6	-33.6
solstice_b	2009/246-14:44:01	2009/246-15:53:49	69.80	-38.1	-73.5
solstice_b	2009/246-16:38:26	2009/246-17:31:03	52.62	-25.4	-26.7
solstice_b	2009/247-15:12:59	2009/247-16:11:57	58.97	-32.0	-25.1
solstice_b	2009/247-16:50:42	2009/247-17:49:09	58.45	-30.9	-47.5
solstice_b	2009/249-15:48:07	2009/249-16:47:47	59.67	-24.0	-31.0
solstice_b	2009/250-14:22:43	2009/250-15:28:19	65.60	-31.1	-29.8
solstice_b	2009/251-14:42:16	2009/251-15:45:48	63.53	-23.5	-26.4
sim_a	2009/246-09:36:34	2009/246-10:35:59	59.42	-8.3	-54.7
sim_a	2009/248-15:31:10	2009/248-16:02:03	30.88	-27.1	-25.8
sim_a	2009/249-10:30:47	2009/249-11:27:39	56.87	-26.1	-62.3
sim_a	2009/249-15:41:18	2009/249-16:19:02	37.73	-35.5	-55.7
sim_a	2009/249-17:25:13	2009/249-17:56:10	30.95	-24.0	-55.8
sim_a	2009/249-19:03:41	2009/249-19:33:18	29.62	-21.0	-76.0
sim_a	2009/250-16:00:25	2009/250-16:35:55	35.50	-30.0	-52.2
sim_a	2009/251-11:08:58	2009/251-12:01:19	52.35	-37.3	-55.4
sim_a	2009/252-14:57:33	2009/252-15:32:14	34.68	-23.6	-37.0
sim_b	2009/247-08:18:38	2009/247-09:16:20	57.70	-17.1	-30.0
sim_b	2009/248-17:11:01	2009/248-17:39:16	28.25	-21.5	-41.6
sim_b	2009/249-08:54:30	2009/249-09:50:37	56.12	-27.5	-35.3
sim_b	2009/249-12:14:56	2009/249-13:04:52	49.93	-36.9	-60.9
sim_b	2009/250-07:26:51	2009/250-08:30:23	63.53	-14.8	-39.4
sim_b	2009/250-12:31:43	2009/250-13:21:45	50.03	-38.2	-65.2
sim_b	2009/251-13:02:17	2009/251-13:38:31	36.23	-28.9	-10.9
sim_b	2009/251-16:16:00	2009/251-16:52:45	36.75	-29.5	-61.6
sim_b	2009/252-16:35:43	2009/252-17:09:27	33.73	-21.2	-58.2

tim	2009/246-18:11:11	2009/246-18:39:15	28.07	-32.7	-66.0
tim	2009/248-17:08:52	2009/248-17:36:36	27.73	-25.9	-48.4
tim	2009/249-17:26:38	2009/249-17:53:35	26.95	-21.0	-51.2
tim	2009/250-14:15:03	2009/250-14:56:12	41.15	-39.5	-61.3
XPS	2009/246-09:36:04			-7.2	-56.0
XPS	2009/247-16:51:35			-29.5	-44.6
XPS	2009/247-16:52:58			-26.8	-39.5
XPS	2009/248-15:27:01			-34.0	-40.8
XPS	2009/249-15:45:31			-29.1	-39.8
XPS	2009/249-15:48:37			-23.3	-30.0
XPS	2009/249-17:23:20			-27.6	-61.8
XPS	2009/250-16:00:33			-29.7	-51.6
XPS	2009/250-17:41:00			-23.1	-64.8

	SIM A	SIM B	SOL A	SOL B	TIM	XPS*
Week	9	9	5	7	4	9
Total	2107	2673	1449	1728	2324	2173

**3.a. Ground Support / Contact Summary** (submitted by D. McCabe, Sept. 3)

Fourteen ground station contacts were performed over the past week.

	Captured VCDUS	Recorded VCDUS	%
SC housekeeping	317723	317724	100
IM housekeeping	42884	42885	100
Science	311375	311376	100

**3.b. Ground Support / Contact Summary** (submitted by D. McCabe, Sept. 10)

Fourteen ground station contacts were performed over the past week.

	Captured VCDUS	Recorded VCDUS	%
SC housekeeping	316571	316572	100
IM housekeeping	43021	43022	100
Science	309590	309591	100

**4. Instrument Status**

**4.1.a. TIM** (submitted by Greg Kopp, September 3)

TIM operations during previous week

- Normal Ops (TSI data w/ Cavity B)
- Cavity A&B, A&C comparisons
- Gain CD Calibration

Current work

- Normal operations
  - Version 9 data processing provides daily updated TSI values
- After some glitches in Data Processing, the TSI data are restored and normal daily processing has resumed

TIM anomalies during previous week

- Had an abnormally high number of 8-bit errors in telemetered data this week

**4.1.b. TIM** (submitted by Greg Kopp, September 9)

TIM operations during previous week

- Normal Ops (TSI data w/ Cavity B)
- Cavity A&B comparisons

Current work

- Normal operations
  - Version 9 data processing provides daily updated TSI values

TIM anomalies during previous week

- None

**4.2.a. SIM** (submitted by Jerry Harder, September 3)

For days 2009/239 (Aug. 27) to 2009/246 (Sept. 3):

• Calibration Activities:	<u>SIM A</u>	<u>SIM B</u>
-- Prism Calibration A_cal_B	0	0
-- Prism Calibration B_cal_A	0	0
-- CCDDump	2	2
-- Image Dark	1	0
-- Image Light	1	1
-- Servo Gain 20 sec half cycle	2	2
-- Servo Gain 50 sec half cycle	1	1
-- Cruciform Scans	2	2
-- FOV Maps	0	0
• Science Activities:	<u>SIM A</u>	<u>SIM B</u>
-- ESR Full Scan Segments	0	0
-- ESR Table Scan Segments	7	0
-- 24-minute Scans	14	0
-- 24-minute Scans w/ HRT	0	0
-- IR scans	7	0

**4.2.b. SIM** (submitted by Jerry Harder, September 10)

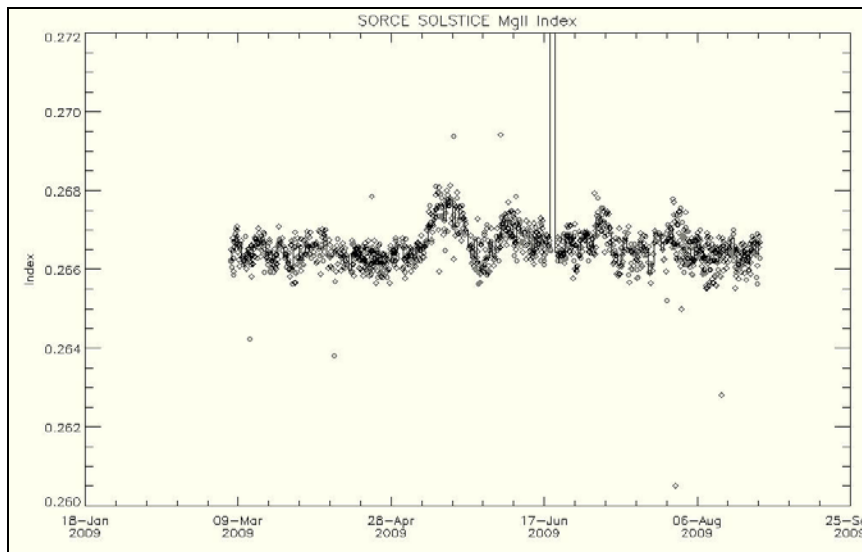
For days 2009/246 (Sept. 3) to 2009/253 (Sept. 10):

• Calibration Activities:	<u>SIM A</u>	<u>SIM B</u>
-- Prism Calibration A_cal_B	0	0
-- Prism Calibration B_cal_A	0	0
-- CCDDump	2	2
-- Image Dark	1	0
-- Image Light	1	1
-- Servo Gain 20 sec half cycle	2	2
-- Servo Gain 50 sec half cycle	1	1
-- Cruciform Scans	0	0
-- FOV Maps	0	0
• Science Activities:	<u>SIM A</u>	<u>SIM B</u>
-- ESR Full Scan Segments	0	0
-- ESR Table Scan Segments	7	0
-- 24-minute Scans	15	0
-- 24-minute Scans w/ HRT	0	0
-- IR scans	7	0

**4.3.a. SOLSTICE** (submitted by Marty Snow, Sept. 2)

For days 2009/239 (Aug 27) to 2009/246 (Sept. 3):

- SOLSTICE A grating drive errors:  
2009/239, 18:42:53  
2009/242, 00:08:58
- SOLSTICE B grating drive errors: None
- Data Gaps for SOLSTICE A (date, length in minutes):  
2009/239, 18:42:02 55 minutes  
2009/240, 15:44:55 63 minutes  
2009/242, 00:08:07 37 minutes  
2009/243, 03:40:06 19 minutes
- Data Gaps for SOLSTICE B (date, length in minutes):  
2009/239, 20:19:06 42 minutes  
2009/240, 14:07:42 65 minutes  
2009/240, 18:59:08 47 minutes  
2009/242, 16:19:47 59 minutes  
2009/244, 16:55:32 55 minutes



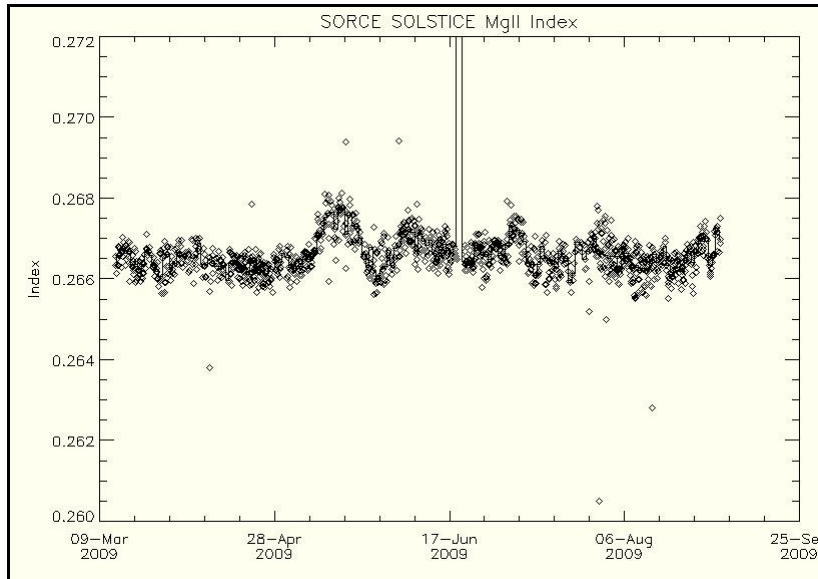
**4.3.b. SOLSTICE** (submitted by Marty Snow, Sept. 9)

For days 2009/246 (Sept. 3) to 2009/253 (Sept. 10):

- SOLSTICE A grating drive errors:  
2009/249, 18:26:41  
2009/250, 12:15:41
- SOLSTICE B grating drive errors: None
- Data Gaps for SOLSTICE A (date, length in minutes):  
2009/246, 17:32:00 53 minutes  
2009/247, 16:12:54 70 minutes  
2009/249, 18:25:50 61 minutes  
2009/250, 12:14:50 99 minutes  
2009/252, 09:35:23 89 minutes

- Data Gaps for SOLSTICE B (date, length in minutes):
 

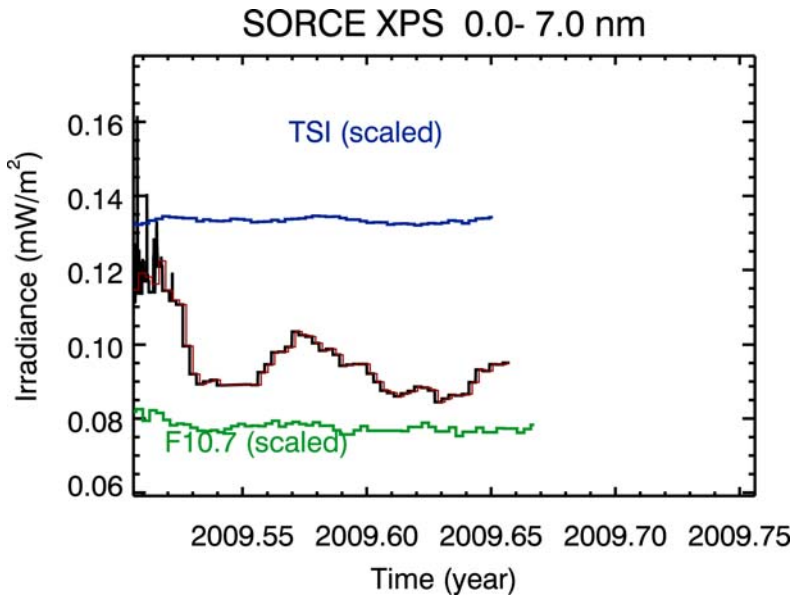
2009/246, 15:54:37	71 minutes
2009/246, 17:32:05	54 minutes
2009/247, 16:12:59	60 minutes
2009/247, 17:49:56	59 minutes
2009/249, 16:48:34	60 minutes
2009/250, 15:29:06	66 minutes
2009/251, 15:46:35	64 minutes



**4.4.a. XPS** (submitted by Tom Woods, 2 September)

For days 2009/233 (August 21) to 2009/244 (September 01):

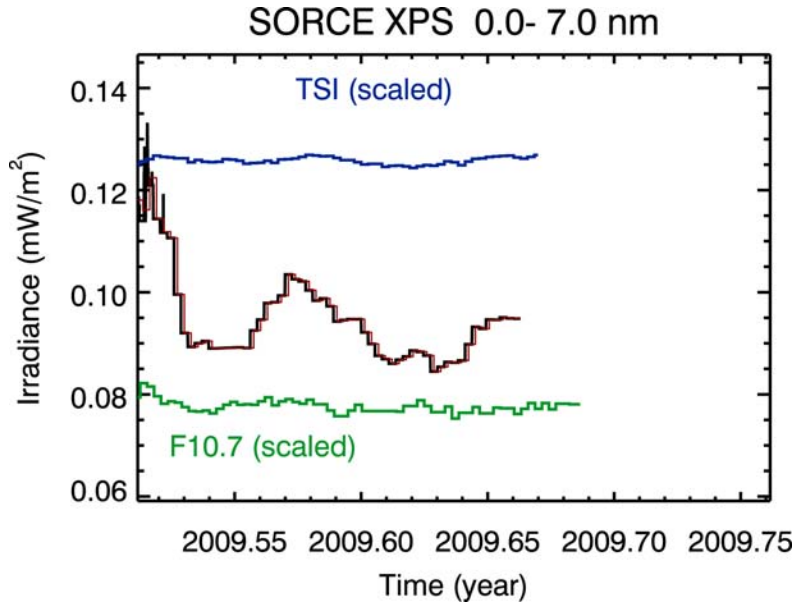
- Number of XPS GCI errors: 12
- SORCE XPS Data Gaps: None
- SORCE XPS Calibration Experiment Duration: None
- Flares: None above class M1.0



**4.4.b. XPS** (submitted by Tom Woods, 9 September)

For days 2009/240 (August 28) to 2009/251 (September 08):

- Number of XPS GCI errors: 15
- SORCE XPS Data Gaps: None
- SORCE XPS Calibration Experiment Duration: None
- Flares: None above class M1.0



**5.a. Planning** (automated report submitted by Jay Kominek, Sept. 3)

***Plans completed 27 August – 03 September:***

**SORCE Spacecraft**

Activity	Total	Total Time
Solar Rolls	386	13:56
Stellar Rolls	410	11:39
Ram Avoidance	0	0:00
Solar Alignment	4	1:23
Stellar Alignment	0	0:00
Field of View Maps	0	0:00
FSS Calibration	5	0:29
Station Contacts	14	2:28
GCI Checks	832	0:13
State Vector Upload	7	0:21
MU Checksum	1	0:12

**SIM A (Primary)**

Solar Activity	Total	Total Time
ESR Mode	7	5:38
ESR Mode with HRT	0	0:00
IR Scan	7	7:38
Quick Scan	14	5:39
Quick Scan HRT	0	0:00
<b>Calibration Activity</b>		

Fixed Wavelength	0	0:00
Servo Gain Calibration	2	1:20
Solar Alignment	2	1:27
Field of View Map	0	0:00
Prism Calibration	0	0:00
Image Light	1	0:06
Image Dark	1	0:05
ESR Full Scan	0	0:00
Dark	28	0:21
<b>Special Activity</b>		
Power Cycle Checks	209	13:56

### **SIM B (Secondary)**

<b>Solar Activity</b>	<b>Total</b>	<b>Total Time</b>
ESR Mode	0	0:00
ESR Mode with HRT	0	0:00
IR Scan	0	0:00
Quick Scan	0	0:00
Quick Scan HRT	0	0:00
<b>Calibration Activity</b>		
Fixed Wavelength	0	0:00
Servo Gain Calibration	2	1:20
Solar Alignment	2	1:27
Field of View Map	0	0:00
Prism Calibration	0	0:00
Image Light	1	0:06
Image Dark	1	0:05
ESR Full Scan	0	0:00
Dark	0	0:00
<b>Special Activity</b>		
Power Cycle Checks	209	13:38

### **SOLSTICE A (MUV)**

<b>Solar Activity</b>	<b>Total</b>	<b>Total Time</b>
Normal Scan	94	80:46
Quick Scan	41	11:35
Mini Quick Scan	34	9:49
<b>Stellar Activity</b>		
Fixed Wavelength	0	0:00
Companion	0	0:00
Stellar Scan	0	0:00
Zero Order Scan	0	0:00
Number Unique Targets	0	0:00
<b>Calibration Activity</b>		
Filter Calibration	1	1:06
Fixed Wavelength	0	0:00
AB Comparison	1	1:05
Mini 64 Scan	7	7:38
MUV Solar Alignment	0	0:00
FUV Solar Alignment	0	0:00
MUV Stellar Alignment	0	0:00
FUV Stellar Alignment	0	0:00
MUV Field of View Map	0	0:00
FUV Field of View Map	0	0:00
<b>Special Activity</b>		
Power Cycle Checks	104	4:28
Step Response Test	1	0:02

## **SOLSTICE B (FUV)**

	<b>Total</b>	<b>Total Time</b>
<b>Solar Activity</b>		
Normal Scan	96	88:55
Quick Scan	42	7:50
Mini Quick Scan	35	6:39
<b>Stellar Activity</b>		
Fixed Wavelength	310	14:13
Companion	42	2:27
Stellar Scan	28	5:24
Zero Order Scan	373	10:58
Number Unique Targets	38	34:04
<b>Calibration Activity</b>		
Fixed Wavelength	0	0:00
AB Comparison	1	1:05
Mini 64 Seam	7	7:38
MUV Solar Alignment	0	0:00
FUV Solar Alignment	0	0:00
MUV Stellar Alignment	0	0:00
FUV Stellar Alignment	0	0:00
MUV Field of View Map	0	0:00
FUV Field of View Map	0	0:00
<b>Special Activity</b>		
Power Cycle Checks	104	4:37
Step Response Test	1	0:02

## **TIM**

	<b>Total</b>	<b>Total Time</b>
<b>Solar Activity</b>		
Normal Solar	100	111:43
Normal Eclipse	104	46:28
<b>Calibration Activity</b>		
Degradation A	1	1:09
Degradation C	0	0:00
Aliveness D	0	0:00
Gain Calibration AB	0	0:00
Gain Calibration CD	1	6:00
Solar Alignment	2	1:27
Field of View Map	0	0:00
<b>Special Activity</b>		
Power Cycle Checks	201	8:39

## **XPS**

	<b>Total</b>	<b>Total Time</b>
<b>Calibration Activity</b>		
Calibration	0	0:00

Since December 2005, XPS is activated for a continuous 1-min integration at filter wheel position 6 (0.1-18 nm range) and only has a monthly calibration experiment.

### **5.b. Planning** (automated report submitted by Jay Kominek, Sept. 10)

#### ***Plans completed 03 September – 10 September:***

## **SORCE Spacecraft**

<b>Activity</b>	<b>Total</b>	<b>Total Time</b>
Solar Rolls	400	12:20
Stellar Rolls	487	14:06
Ram Avoidance	0	0:00
Solar Alignment	4	1:01

Stellar Alignment	0	0:00
Field of View Maps	0	0:00
FSS Calibration	0	0:00
Station Contacts	14	2:25
GCI Checks	827	0:13
State Vector Upload	7	0:21
MU Checksum	1	0:12

### **SIM A (Primary)**

<b>Solar Activity</b>	<b>Total</b>	<b>Total Time</b>
ESR Mode	7	5:40
ESR Mode with HRT	0	0:00
IR Scan	7	7:27
Quick Scan	14	5:39
Quick Scan HRT	0	0:00
<b>Calibration Activity</b>		
Fixed Wavelength	0	0:00
Servo Gain Calibration	2	1:20
Solar Alignment	0	0:00
Field of View Map	0	0:00
Prism Calibration	0	0:00
Image Light	1	0:06
Image Dark	1	0:05
ESR Full Scan	0	0:00
Dark	28	0:21
<b>Special Activity</b>		
Power Cycle Checks	207	13:48

### **SIM B (Secondary)**

<b>Solar Activity</b>	<b>Total</b>	<b>Total Time</b>
ESR Mode	0	0:00
ESR Mode with HRT	0	0:00
IR Scan	0	0:00
Quick Scan	0	0:00
Quick Scan HRT	0	0:00
<b>Calibration Activity</b>		
Fixed Wavelength	0	0:00
Servo Gain Calibration	2	1:20
Solar Alignment	0	0:00
Field of View Map	0	0:00
Prism Calibration	0	0:00
Image Light	1	0:06
Image Dark	1	0:05
ESR Full Scan	0	0:00
Dark	0	0:00
<b>Special Activity</b>		
Power Cycle Checks	207	13:30

### **SOLSTICE A (MUV)**

<b>Solar Activity</b>	<b>Total</b>	<b>Total Time</b>
Normal Scan	92	76:19
Quick Scan	42	11:59
Mini Quick Scan	37	10:22
<b>Stellar Activity</b>		
Fixed Wavelength	0	0:00
Companion	0	0:00
Stellar Scan	0	0:00
Zero Order Scan	0	0:00
Number Unique Targets	0	0:00

**Calibration Activity**

Filter Calibration	1	1:02
Fixed Wavelength	0	0:00
AB Comparison	1	1:03
Mini 64 Scan	7	7:26
MUV Solar Alignment	2	0:27
FUV Solar Alignment	2	0:34
MUV Stellar Alignment	0	0:00
FUV Stellar Alignment	0	0:00
MUV Field of View Map	0	0:00
FUV Field of View Map	0	0:00

**Special Activity**

Power Cycle Checks	103	4:26
Step Response Test	1	0:02

**SOLSTICE B (FUV)****Solar Activity**                      **Total**                      **Total Time**

Normal Scan	95	84:39
Quick Scan	43	8:11
Mini Quick Scan	36	6:55

**Stellar Activity**

Fixed Wavelength	245	11:36
Companion	42	2:27
Stellar Scan	55	10:47
Zero Order Scan	340	9:59
Number Unique Targets	33	35:32

**Calibration Activity**

Fixed Wavelength	0	0:00
AB Comparison	1	1:03
Mini 64 Seam	7	7:26
MUV Solar Alignment	2	0:27
FUV Solar Alignment	2	0:34
MUV Stellar Alignment	0	0:00
FUV Stellar Alignment	0	0:00
MUV Field of View Map	0	0:00
FUV Field of View Map	0	0:00

**Special Activity**

Power Cycle Checks	103	4:34
Step Response Test	1	0:02

**TIM****Solar Activity**                      **Total**                      **Total Time**

Normal Solar	101	109:08
Normal Eclipse	145	49:06

**Calibration Activity**

Degradation A	1	1:04
Degradation C	1	1:04
Aliveness D	1	1:03
Gain Calibration AB	0	0:00
Gain Calibration CD	0	0:00
Solar Alignment	2	1:04
Field of View Map	0	0:00

**Special Activity**

Power Cycle Checks	207	8:54
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**XPS****Calibration Activity**

Calibration	0	0:00
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Since December 2005, XPS is activated for a continuous 1-min integration at filter wheel position 6 (0.1-18 nm range) and only has a monthly calibration experiment.

## **6.a. Data Processing Summary**

**TIM** (submitted by Doug Lindholm, 20 August 2009)

- Status
  - Version 9 routine processing is ongoing.
  - Version 9 TSI data are available on LISIRD, the SORCE web site, and the GES DISC with the new LASP ASCII file format.
  - Dark irradiances have been processed and are being evaluated
- Work in progress
  - Preparing for version 10 reprocessing.
  - Code modifications (generalizations) to support Glory TIM data processing.
- Future Plans
  - Field of view analysis and pointing correction.

**SOLSTICE** (submitted by Doug Lindholm, 3 September 2009)

- Status
  - Version 10 reprocessing is complete and undergoing evaluation.
  - Routine data processing is producing version 9 level 3 FUV and MUV SOLSTICE data products. These are available on the SORCE web site and LISIRD.
  - MgII index is being produced routinely and is available on the SORCE web site.
- Work in Progress
  - Debugging shift in wavelength correction.
  - Evaluating tasks for version 11 reprocessing.
  - Filter experiment analysis to improve dead time correction and filter transmission.
- Future Plans
  - Analysis of instrument misalignment calibration.
  - Analysis of level 3 uncertainties.
  - Improved Jan 2006 slit anomaly correction.
  - Improvement of field of view maps.

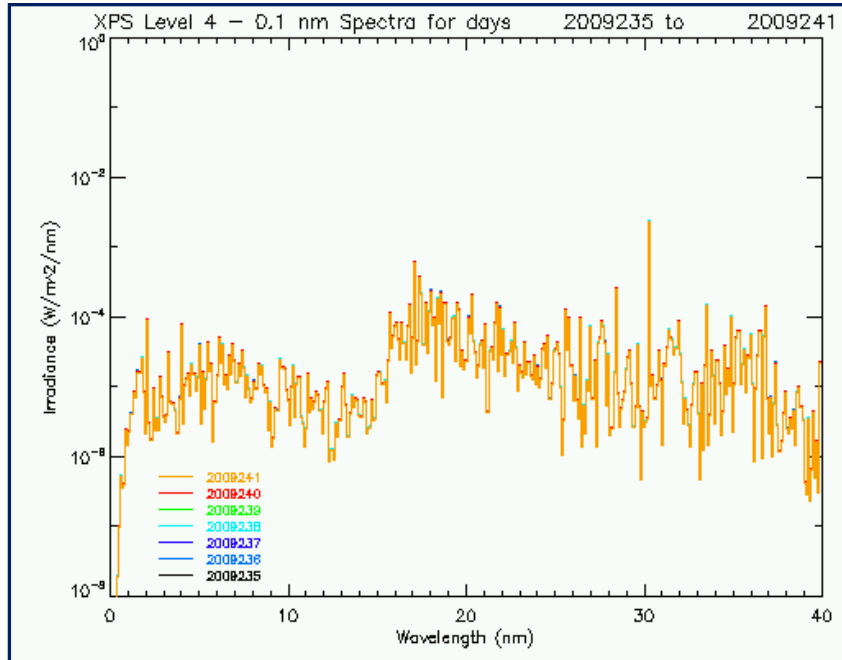
**SIM** (submitted by Doug Lindholm, 31 July 2009)

- Status
  - The routine processing of version 17 data is ongoing.
  - The level 3 data products are available on the SORCE web site and LISIRD.
- Work in Progress
  - Calibration to improve the quality of early mission data.
  - Testing of new SIM exposure time algorithm.
- Future Plans
  - Process SIM B.
  - Investigate UV degradation.
  - Consider field of view correction for data affected by the filter wheel anomaly.

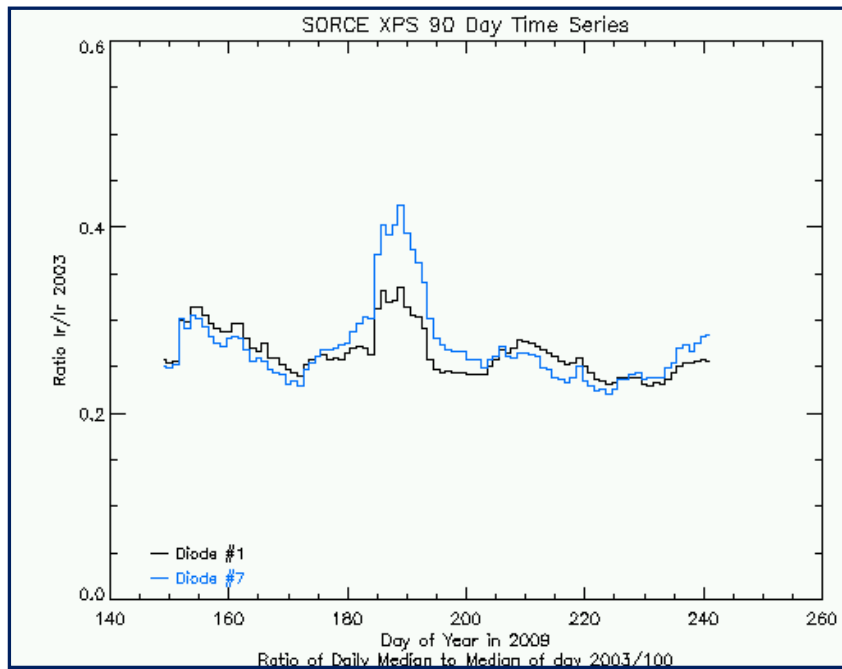
**XPS** (submitted by Brian Templeman, 3 September 2009)

- Version 9 XPS data are being routinely reprocessed and released.
- The safe-hold events in January did not appear to affect data quality.
- SORCE XPS Data Processing Statistics for 2009/235 to 2009/241

Total level 1b Observations Processed: 29742  
 Percent used in level 2 Processing: 49.6772  
 Total level 3 Observations Processed: 14775



Weekly Image



Diode Time Series

## 6.b. Data Processing Summary

**TIM** (submitted by Doug Lindholm, 20 Aug 2009)

- Status
  - Version 9 routine processing is ongoing.

- Version 9 TSI data are available on LISIRD, the SORCE web site, and the GES DISC with the new LASP ASCII file format.
- Dark irradiances have been processed and are being evaluated
- Work in progress
  - Preparing for version 10 reprocessing.
  - Code modifications (generalizations) to support Glory TIM data processing.
- Future Plans
  - Field of view analysis and pointing correction.

**SOLSTICE** (submitted by Doug Lindholm, 10 September 2009)

- Status
  - Version 10 Solstice data has been release!
  - Routine data processing is producing version 10 level 3 FUV and MUV SOLSTICE data products. These are available on the SORCE web site and LISIRD.
  - MgII index is being produced routinely and is available on the SORCE web site.
- Work in Progress
  - Debugging shift in wavelength correction.
  - Evaluating tasks for version 11 reprocessing.
  - Filter experiment analysis to Improve dead time correction and filter transmission.
- Future Plans
  - Analysis of instrument misalignment calibration.
  - Analysis of level 3 uncertainties.
  - Improved Jan 2006 slit anomaly correction.
  - Improvement of field of view maps.

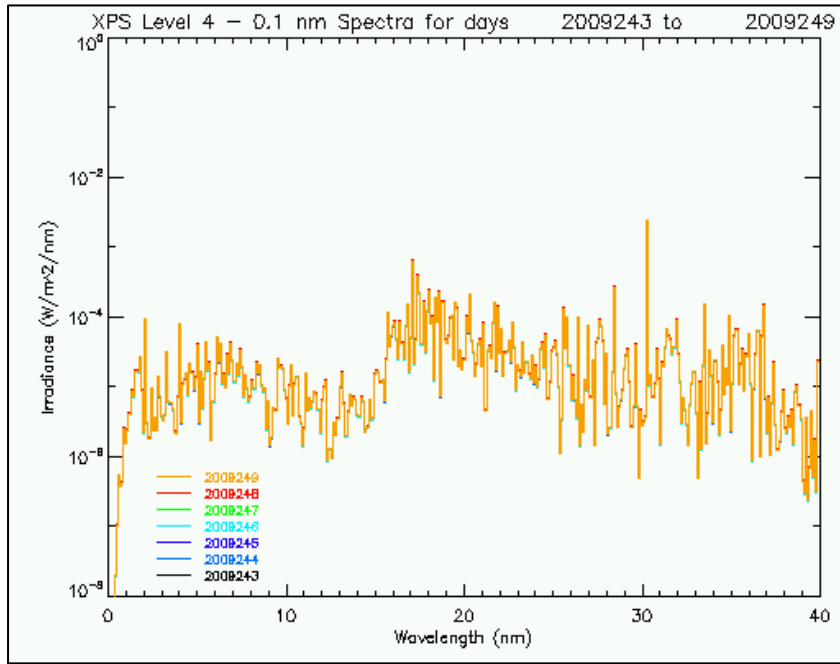
**SIM** (submitted by Doug Lindholm, 10 September 2009)

- Status
  - The routine processing of version 17 data is ongoing.
  - The level 3 data products are available on the SORCE web site and LISIRD.
- Work in Progress
  - Calibration to improve the quality of early mission data.
  - Testing of new SIM exposure time algorithm.
- Future Plans
  - Process SIM B.
  - Investigate UV degradation.
  - Consider field of view correction for data affected by the filter wheel anomaly.

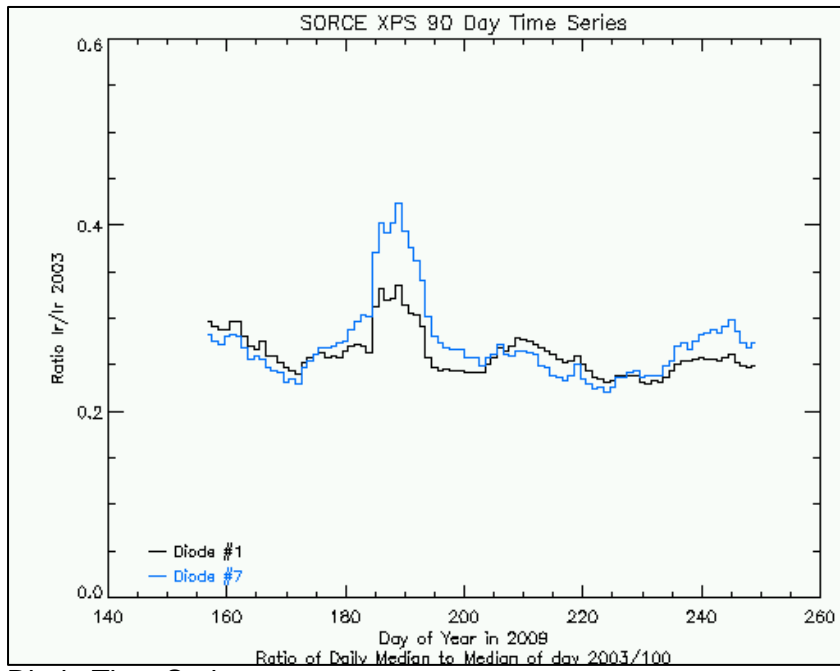
**XPS** (submitted by Brian Templeman, 10 September 2009)

- Version 9 XPS data are being routinely reprocessed and released.
- The safe-hold events in January did not appear to affect data quality.
- SORCE XPS Data Processing Statistics for 2009/243 to 2009/249
 

Total level 1b Observations Processed:	27031
Percent used in level 2 Processing:	54.3598
Total level 3 Observations Processed:	14694



Weekly Image



Diode Time Series