

V&V Reference Report

L2 ASCDS Version : 8.5.1.1

Observation 14649 - L2 Version 2
Chandra X-Ray Center

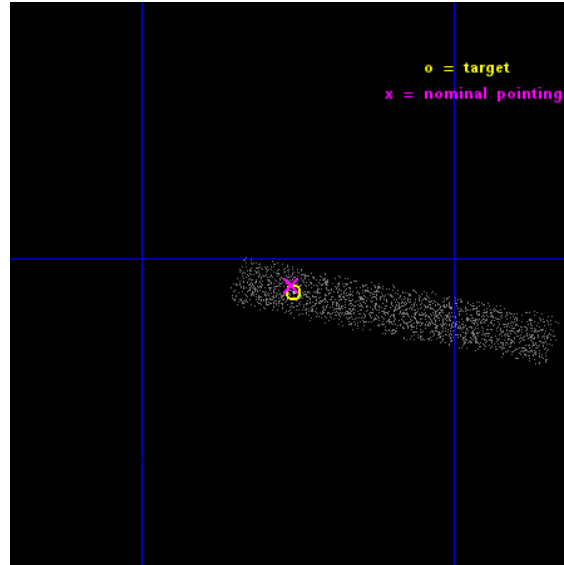
L2 Processing Date : Dec 1 2014

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1 Front

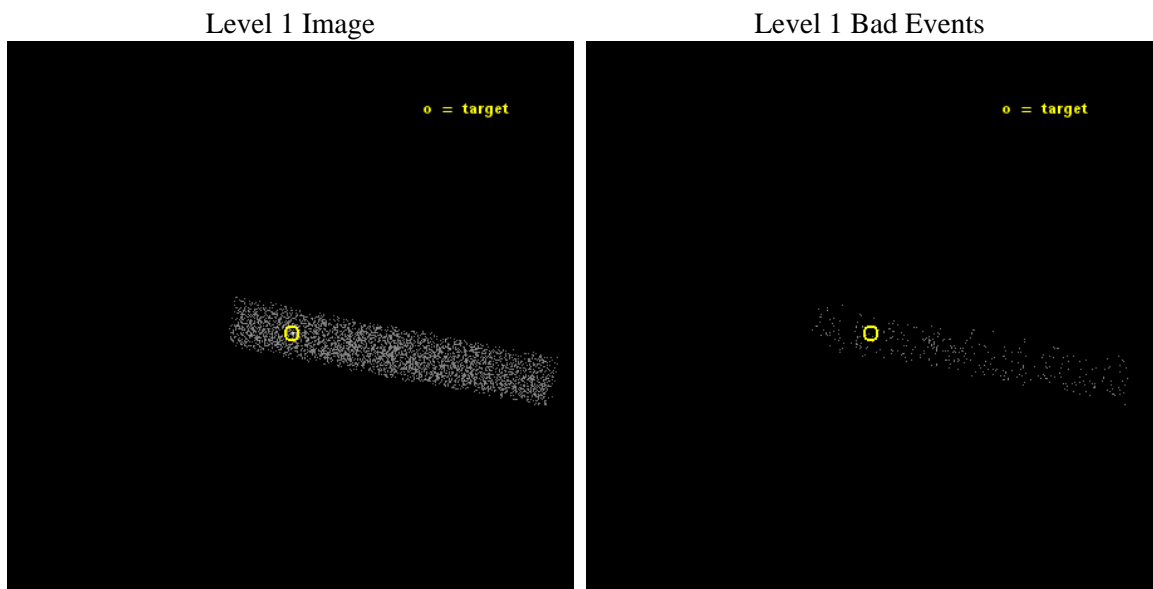
seq_num	401482	Sequence number
obs_id	14649	Observation id
title	A snap-shot survey of Galactic neutron-star Be/X-ray transients in quiescence	Proposal title
observer	Dr. Rudy Wijnands	Principal investigator
object	Cep X-4	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	324.877917	Observer's specified target RA [deg]
dec_targ	56.986111	Observer's specified target Dec [deg]
ra_nom	324.8799571427	Nominal RA [deg]
dec_nom	56.988907243635	Nominal Dec [deg]
roll_nom	10.215807098596	Nominal Roll [deg]
revision	2	Processing version of data
ontime	4853.1997107267	Sum of GTIs [s]
livetime	4401.595964744	Livetime [s]
ontime7	4853.1997107267	Sum of GTIs [s]
l2events	2502	Number of level 2 events



2 OBI

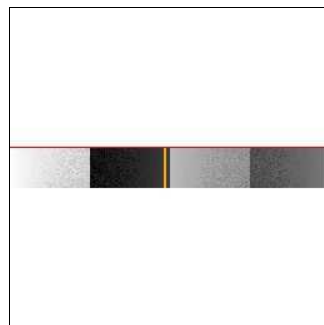
2.1 OBI

2.1.1 Images



2.1.2 Bias

Chip 7



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	5000.000000	[s] Scheduled observation exposure time
ascdsver	10.3	Processing system revision	ontime	4853.1997107267	Sum of GTIs [s]
caldsver	4.6.4	 	ontime7	4853.1997107267	Sum of GTIs [s]
date	2014-12-01T13:24:19	Date and time of file creation	l1events	5134	Number of level 1 events
revision	2	Processing version of data			

2.1.4 Events

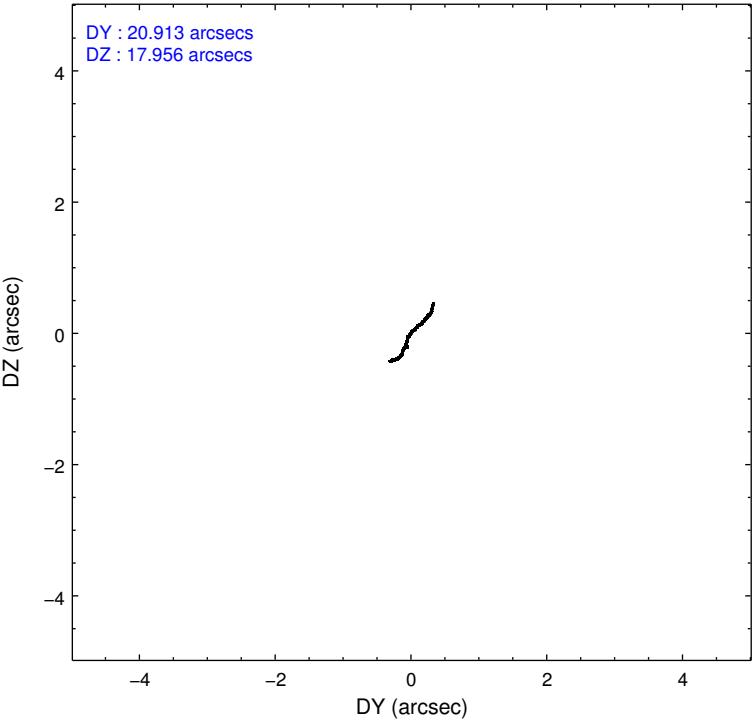
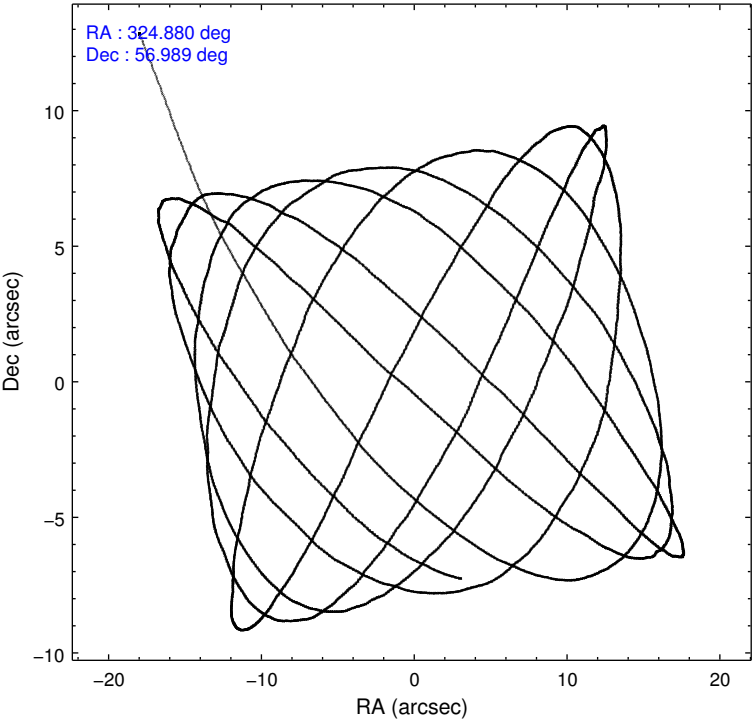
	ccd 7
level 1 events	5134
rejected events	2512
rejected %	48%

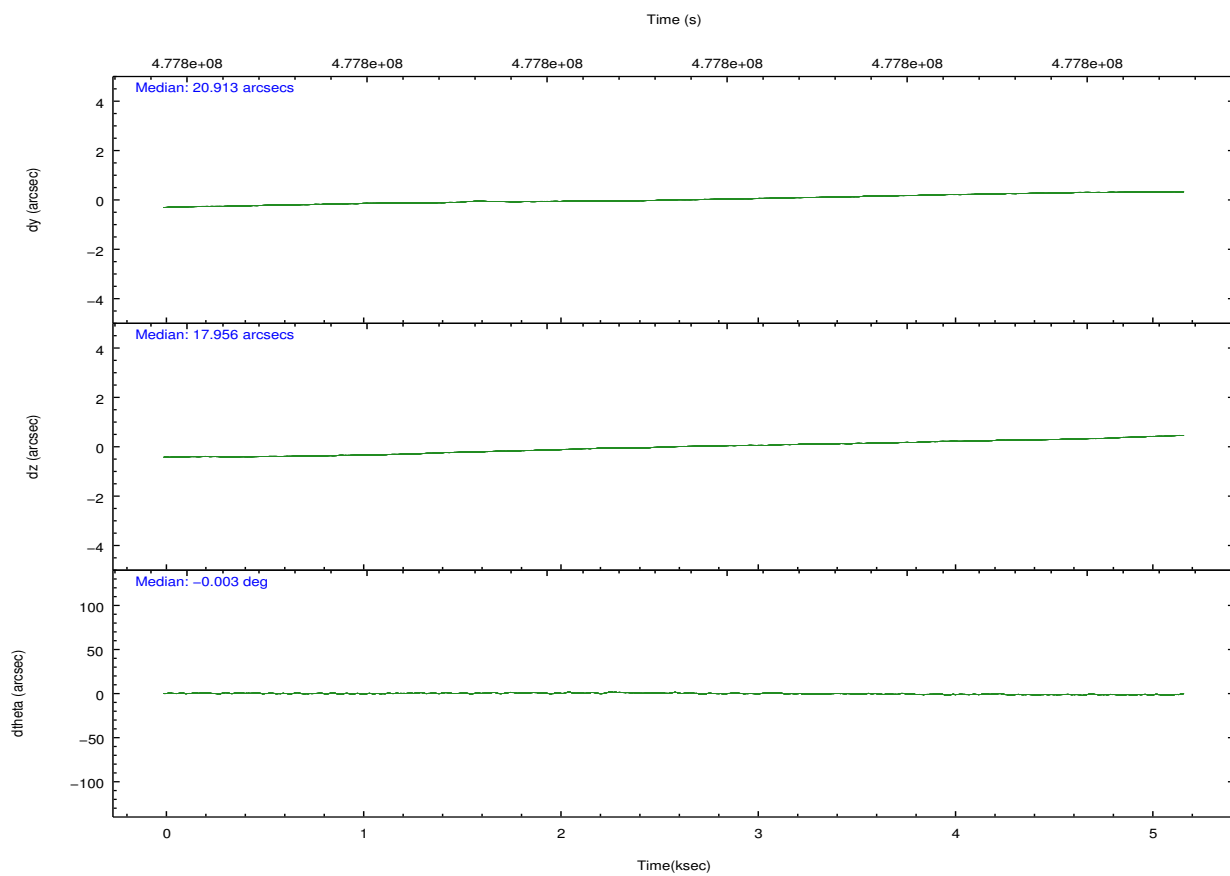
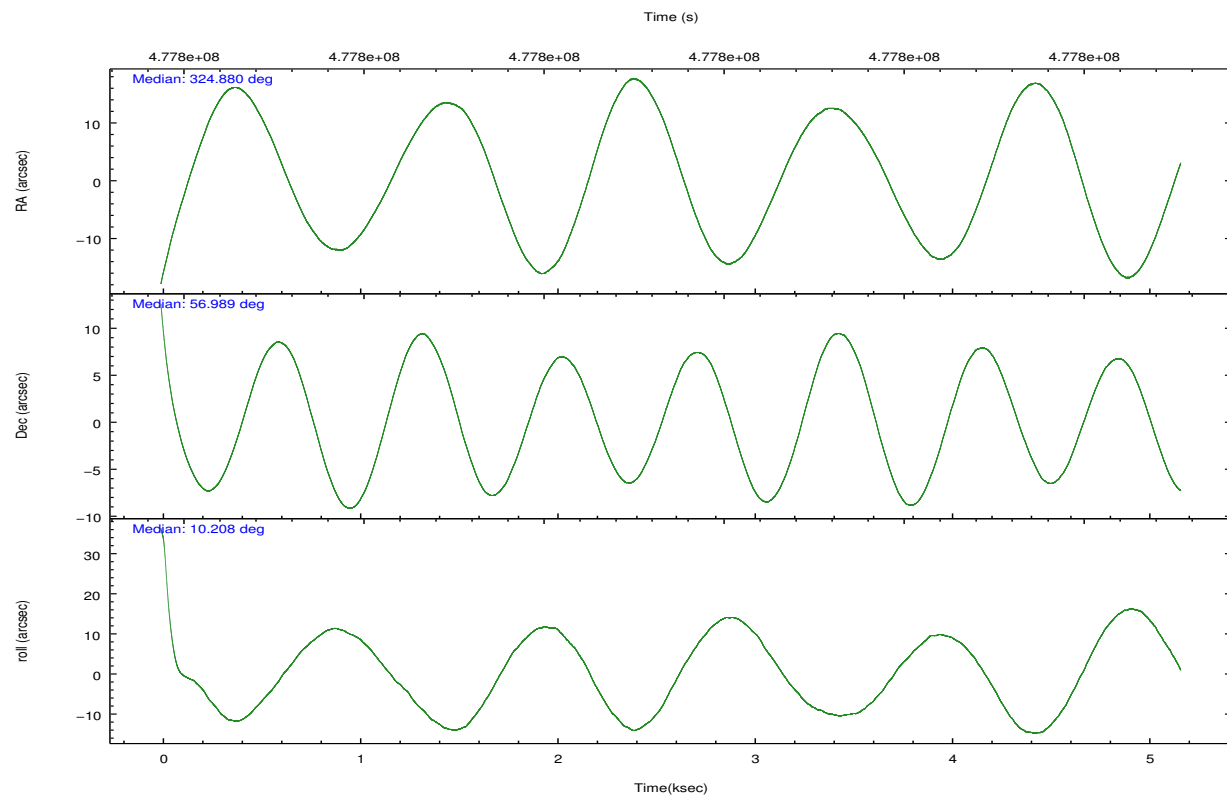
	ccd 7
grade 0 events	307
	5%
grade 1 events	10
	0%
grade 2 events	553
	10%
grade 3 events	320
	6%
grade 4 events	321
	6%
grade 5 events	557
	10%
grade 6 events	1121
	21%
grade 7 events	1945
	37%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-7	ACIS-7	Obspar file type	PREDICTED	ACTUAL
Grating	NONE	NONE	Obspar update status	NONE	UPDATED
Data mode	FAINT	FAINT	Number of optional ACIS chips dropped	0	0
Observation mode	POINTING	POINTING	On-chip summing requested	N	N
[deg] Pointing RA	324.842163	324.8799571426997	Subarray requested	CUSTOM	1/8
[deg] Pointing Dec	56.970972	56.98890724363524	Subarray start row	449	449
[deg] Pointing Roll	10.090818	10.21580709859636	Subarray row count	128	128
[mm] SIM focus pos	-0.684267	-0.6828225247311905	Alternating exposures requested	N	N
[mm] SIM defocus	0	0.001444936568705701	[s] Primary exposure time	0.000000	0.4
[mm] SIM translation stage pos	-190.132523	-190.1400660498719			
[mm] SIM translation stage offset	0	0.00754346686406393			
[s] Observation start time (MET)	477800285.184000	477798789.47942			
Observation start date	2013-02-21T02:16:58	2013-02-21T01:53:09			
[s] Observation end time (MET)	477805285.184000	477806210.99232			
Observation end date	2013-02-21T03:40:18	2013-02-21T03:56:50			
Read mode	TIMED	TIMED			

2.3 Aspect



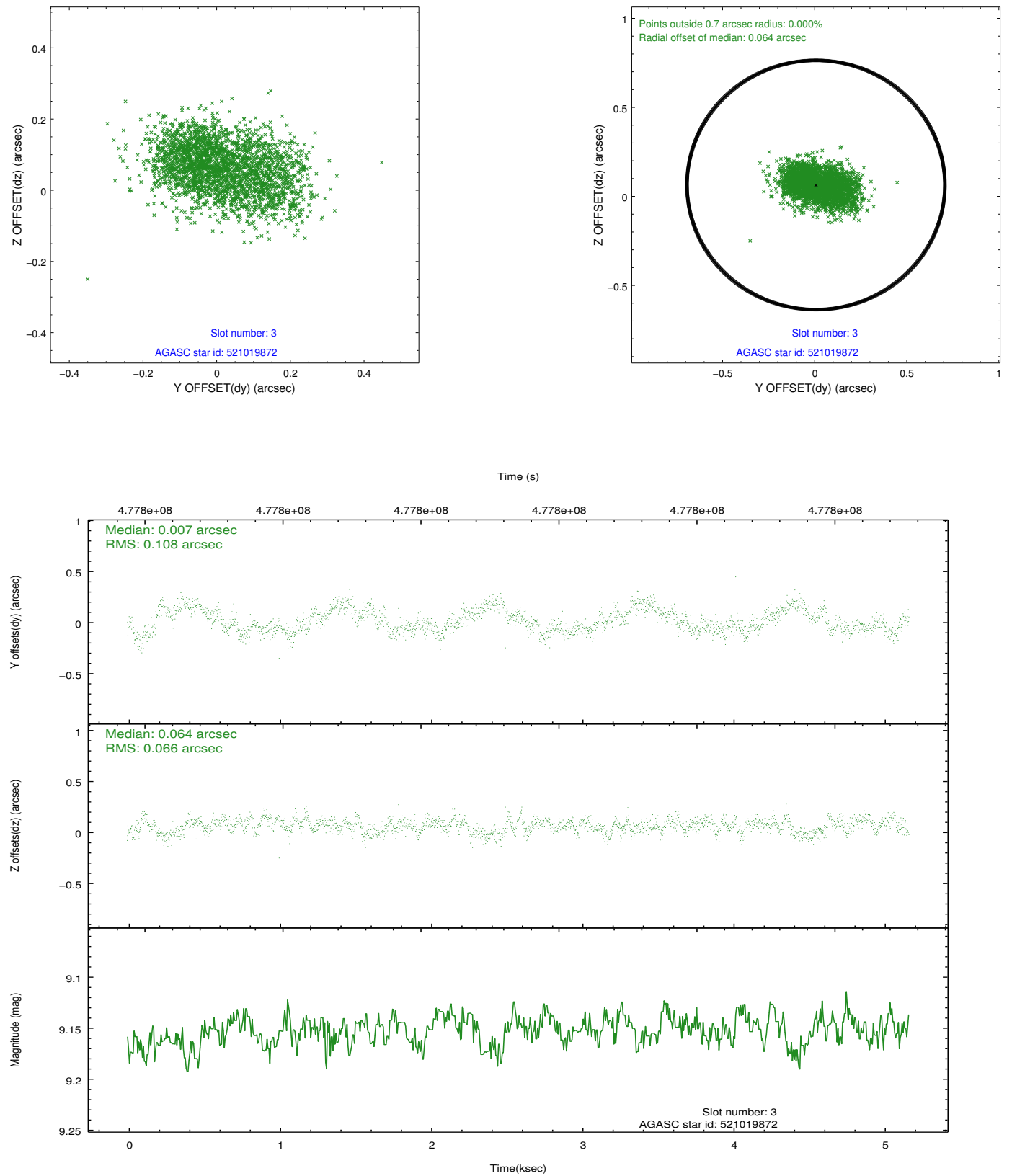


Slot Statistics

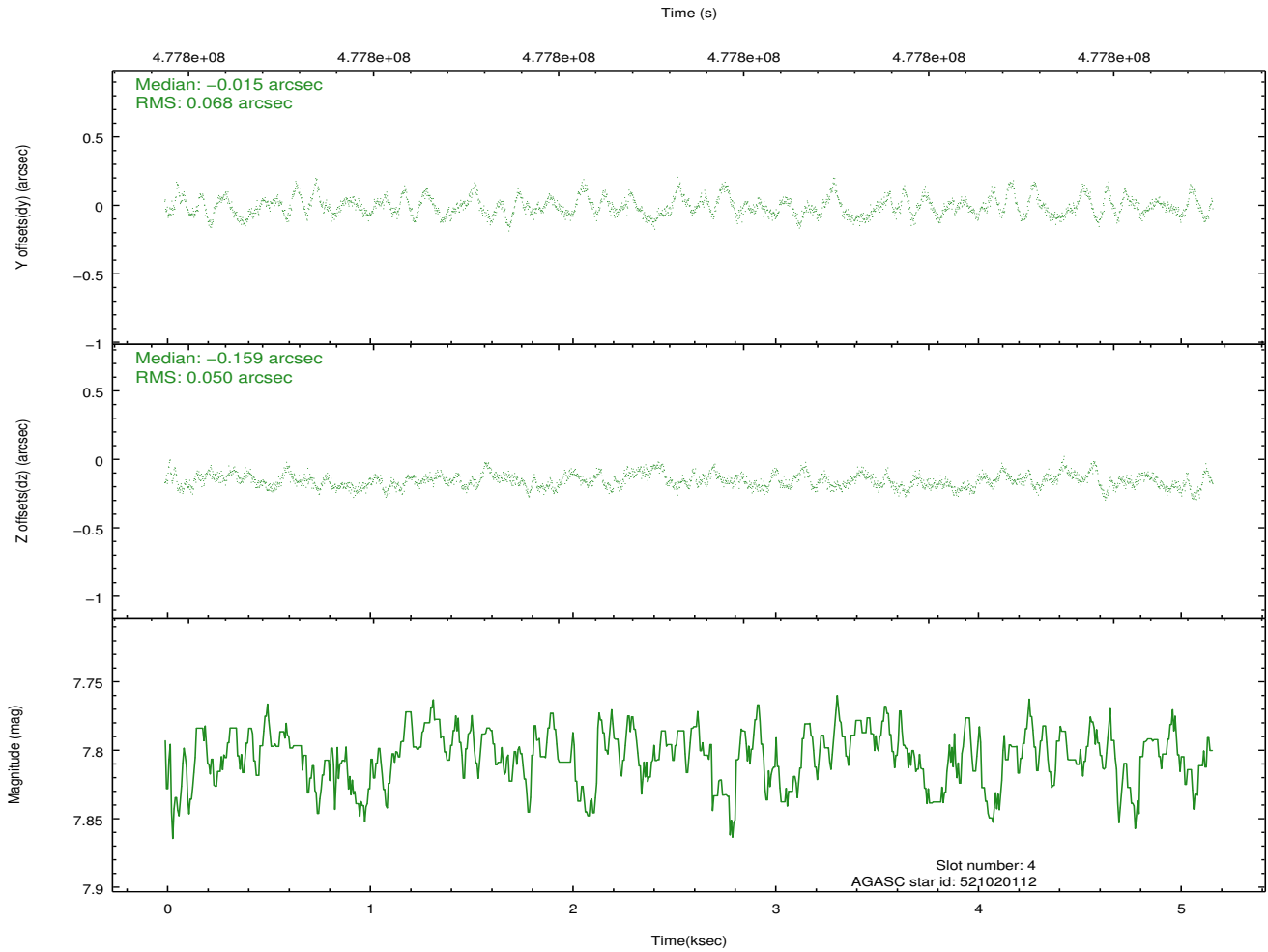
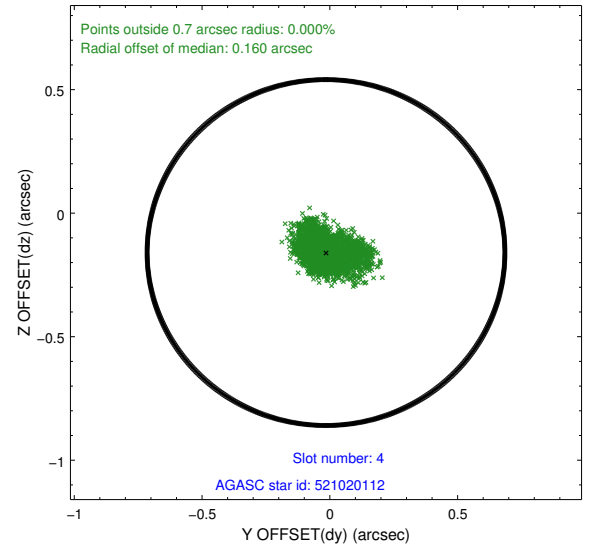
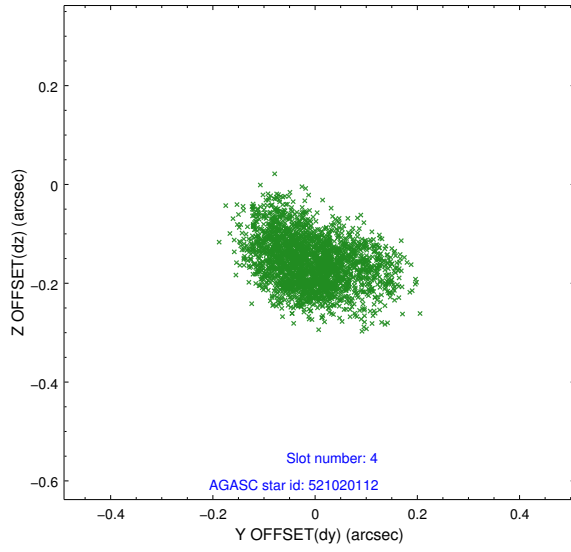
slot	status	used	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID		ACIS-S-2	6.94	1261	-0.105	-0.043	0.009	0.014	0.000000	0.000000	-774.20	-1739.42
1	FID		ACIS-S-4	7.04	1261	0.228	0.062	0.005	0.010	0.000000	0.000000	2138.89	167.91
2	FID		ACIS-S-5	7.07	1261	-0.154	-0.010	0.009	0.014	0.000000	0.000000	-1825.57	162.90
3	GUIDE	used	521019872	9.15	2523	0.007	0.064	0.135	0.222	325.851932	57.023145	1983.83	-146.93
4	GUIDE	used	521020112	7.80	2523	-0.015	-0.159	0.089	0.151	324.609515	56.973735	-446.39	90.36
5	GUIDE	used	521024480	8.81	2514	0.031	0.051	0.084	0.132	324.594440	57.241705	-304.07	1045.12
6	GUIDE	used	521024712	7.74	2523	-0.093	0.071	0.076	0.124	325.844978	56.481207	1656.80	-2070.03
7	GUIDE	used	521016400	8.59	2522	0.056	-0.029	0.088	0.143	323.932642	57.467640	-1417.46	2079.50

2.4 Star Slots

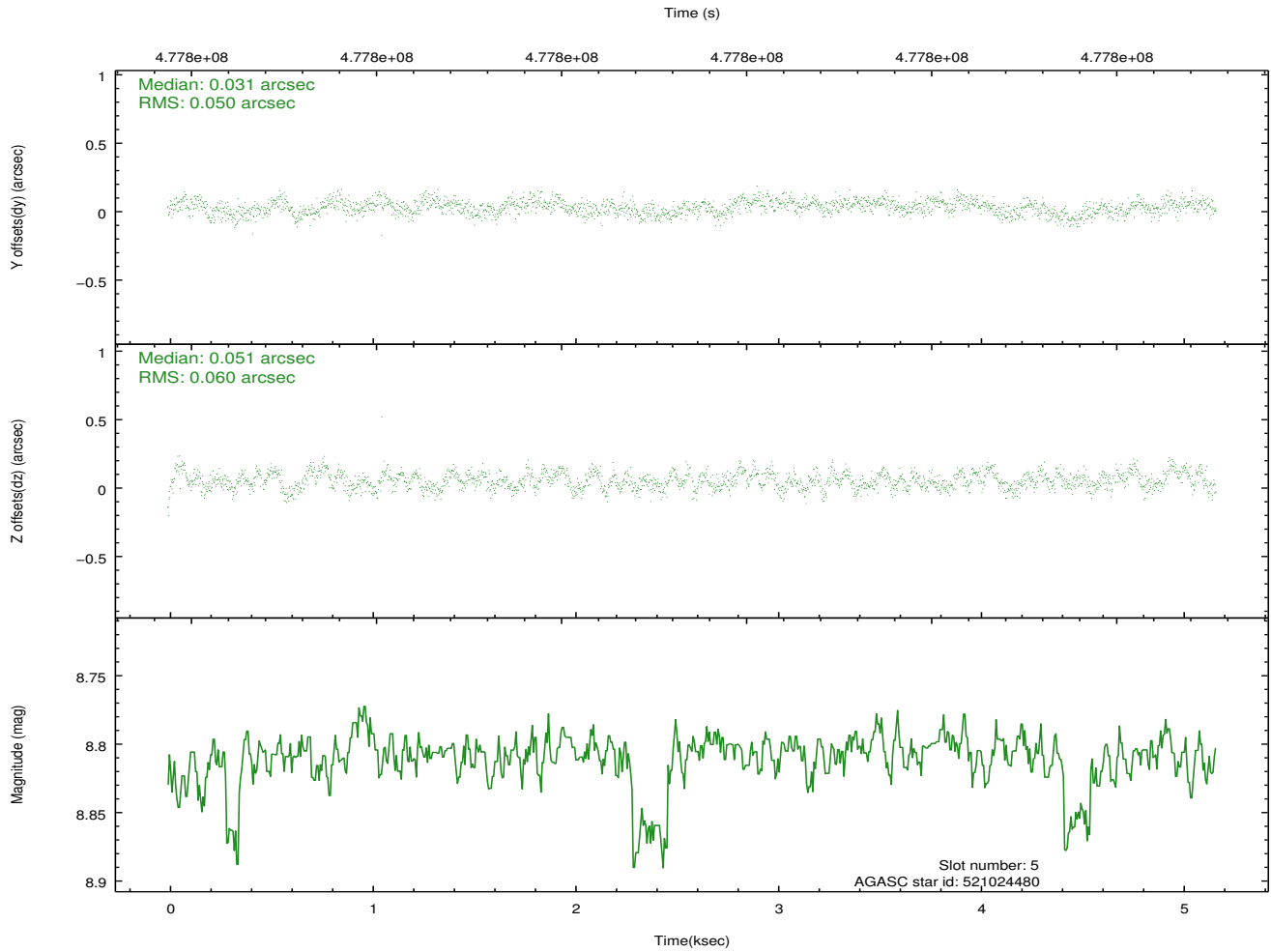
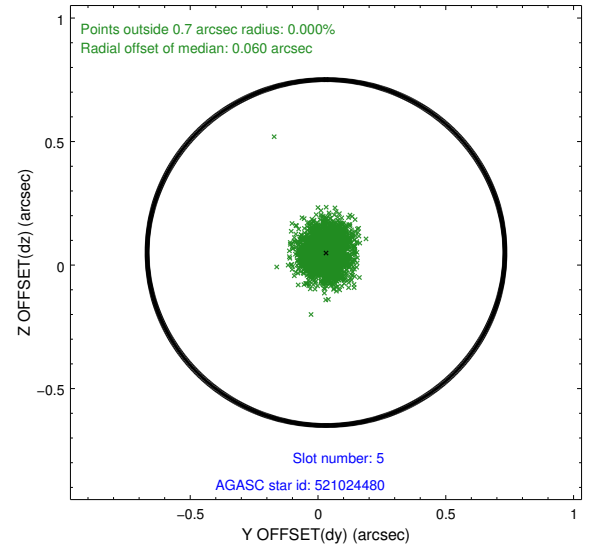
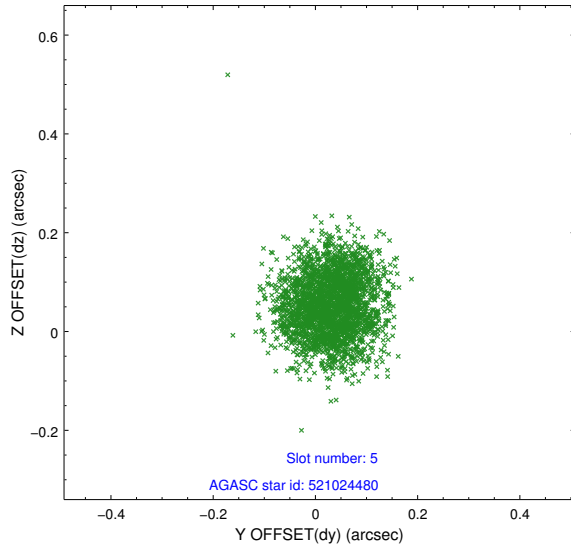
2.4.1 Slot 3



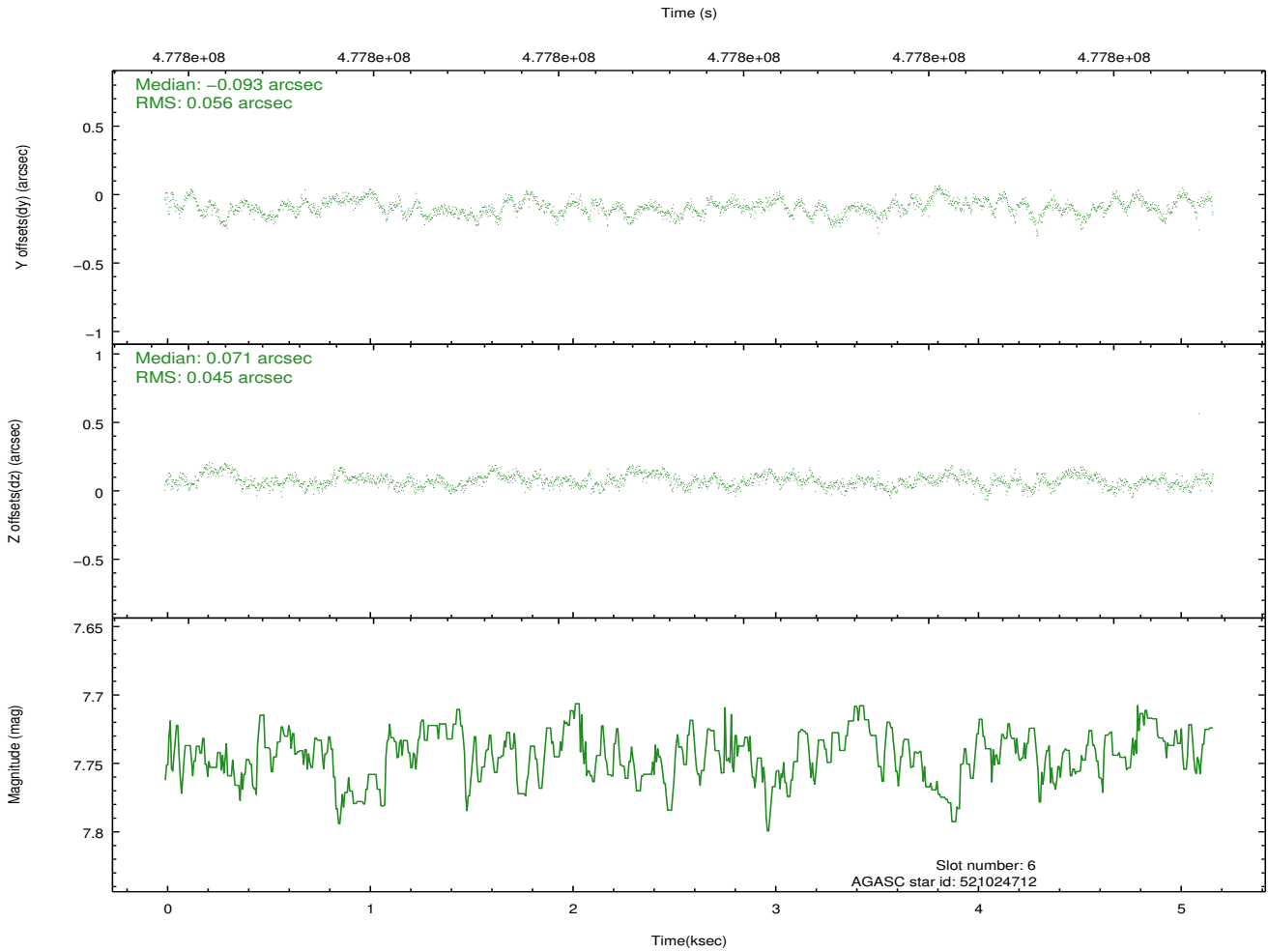
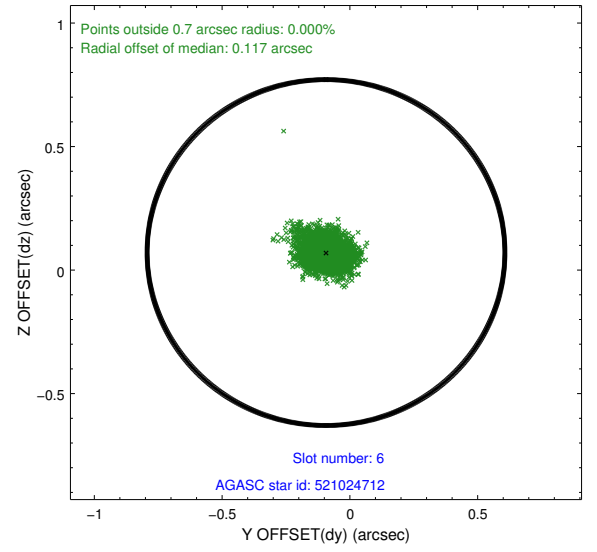
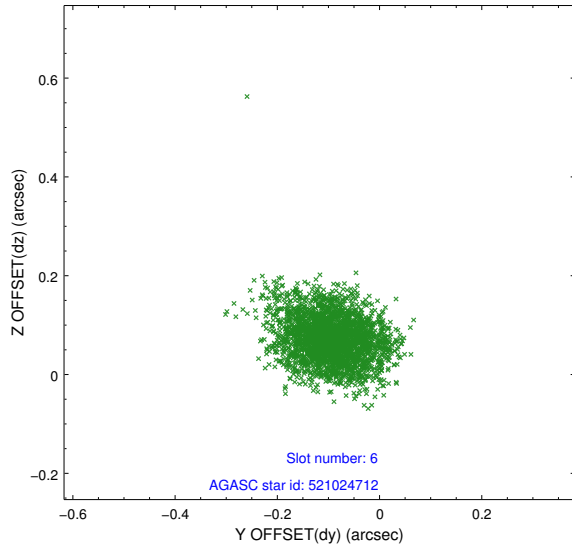
2.4.2 Slot 4



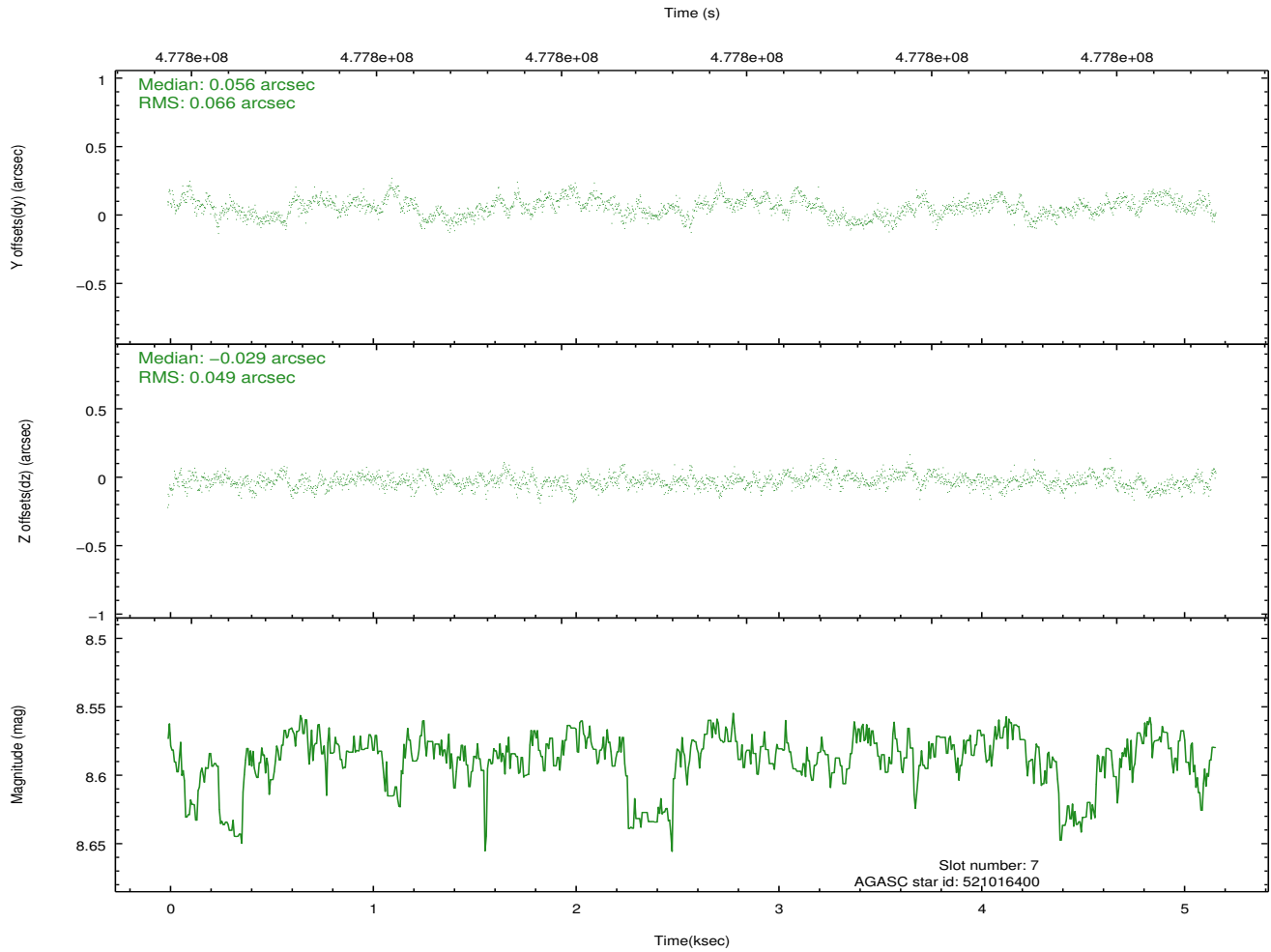
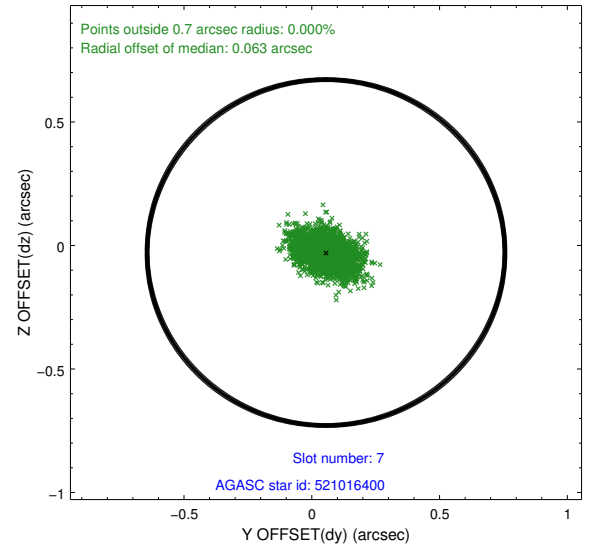
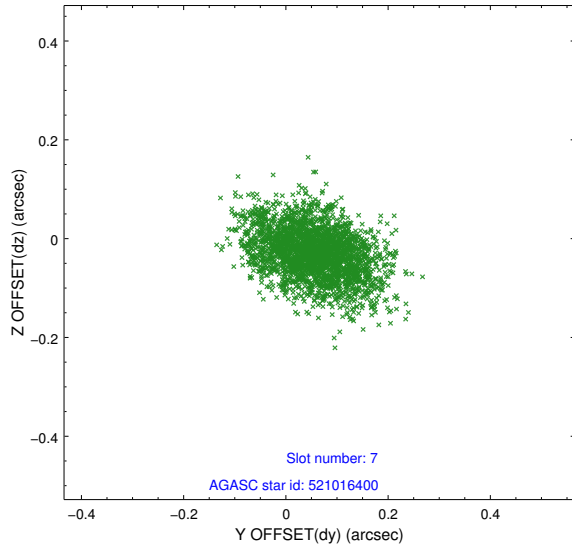
2.4.3 Slot 5



2.4.4 Slot 6

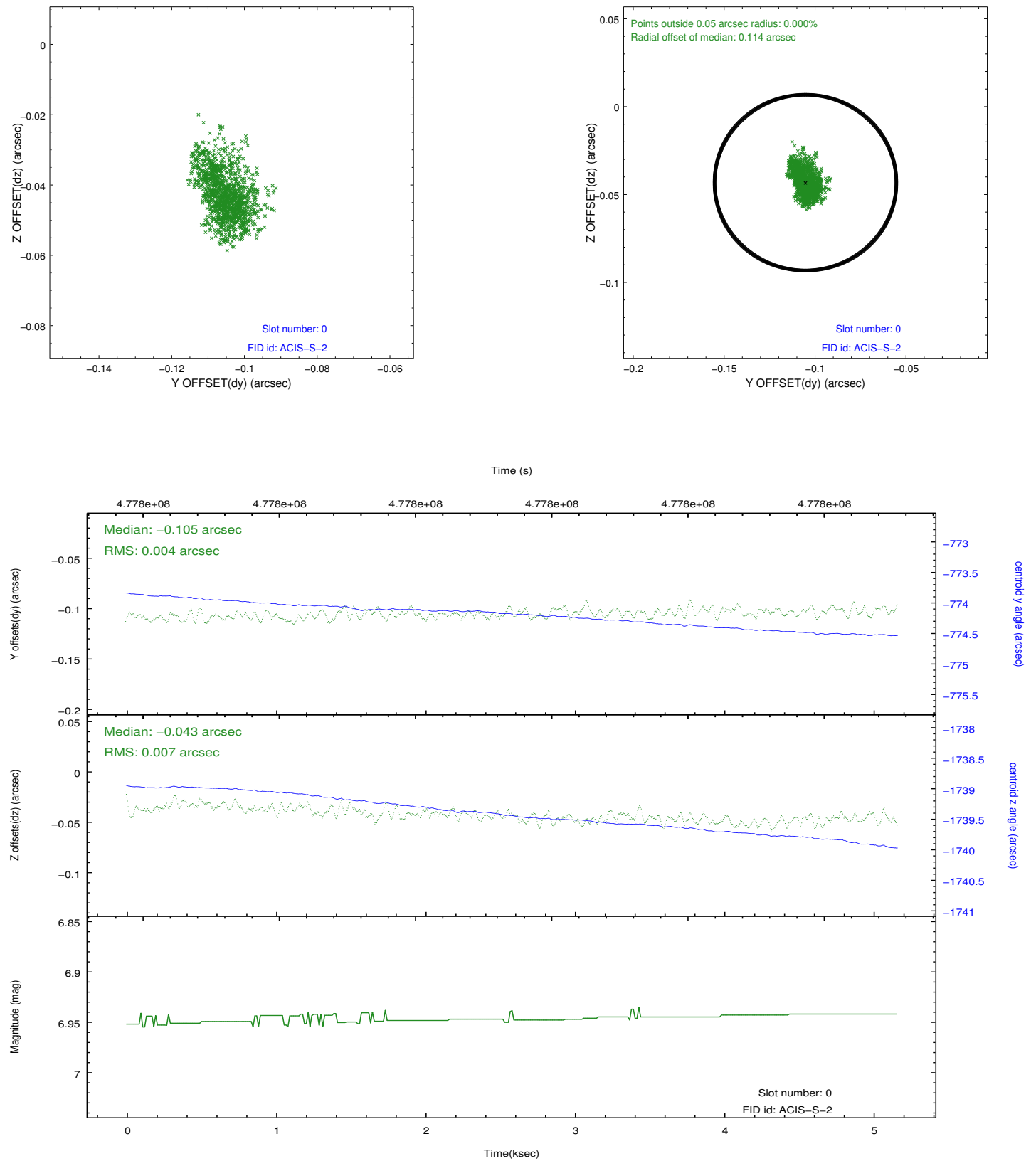


2.4.5 Slot 7

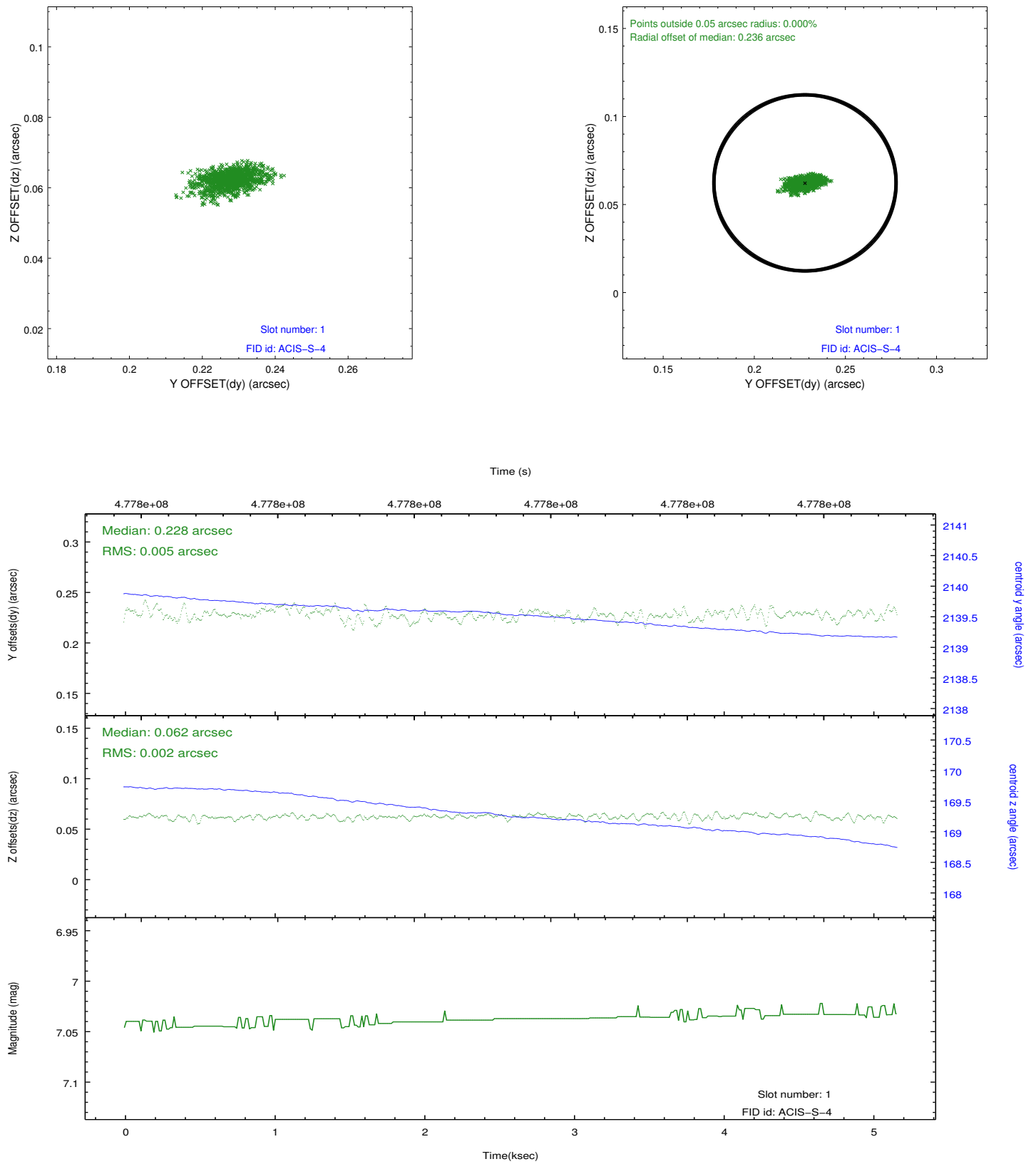


2.5 FID Slots

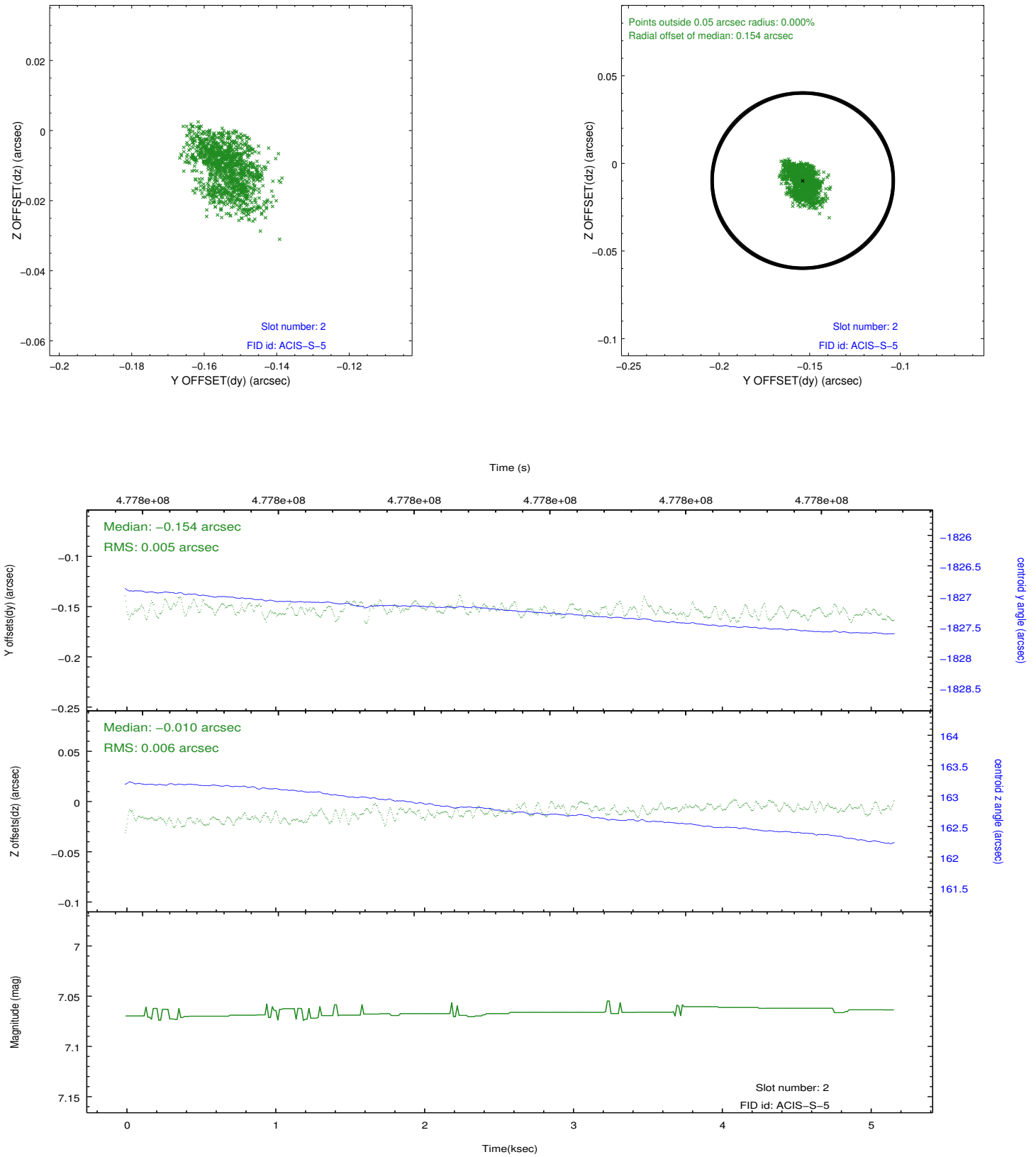
2.5.1 Slot 0



2.5.2 Slot 1



2.5.3 Slot 2



A Summary

A.1 Status

V&V Scientist	Beth Sundheim
V&V Date (YYYY-MM-DD)	2014.12.09
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	4.8531997107267

A.2 Comments

These data have been reprocessed with new aspect alignment calibration files that correct small mean offsets (up to 0.4 arcsecs) and improve overall astrometric accuracy. The new calibration was determined using data from the time period being reprocessed and was performed using cross-correlation of X-ray sources with radio and optical counterparts.