

V&V Reference Report

L2 ASCDS Version : 8.5.1.1

Observation 6215 - L2 Version 4
Chandra X-Ray Center

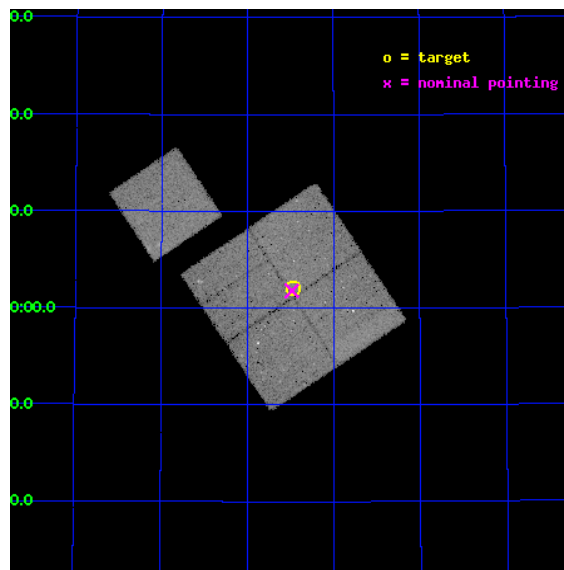
L2 Processing Date : Mar 7 2013

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1 Front

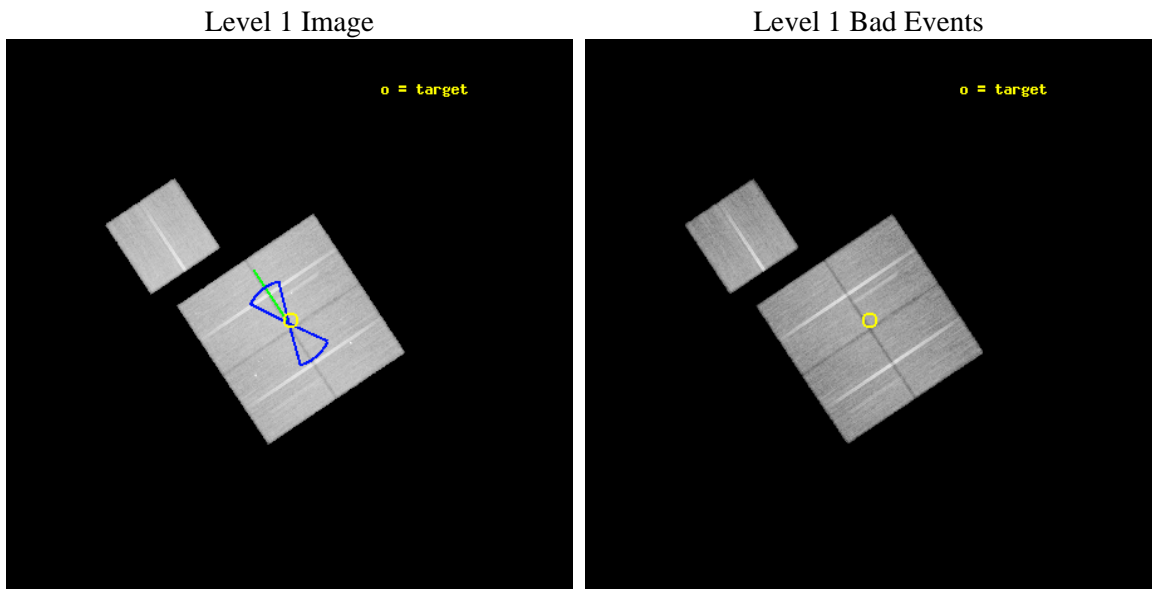
seq_num	900350	Sequence number
obs_id	6215	Observation id
title	Deep Chandra Imaging of the Extended Groth Strip: The Co-evolution of Black Holes and Galaxies	Proposal title
observer	Prof Kirpal Nandra	Principal investigator
object	EGS-3	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	215.116653	Observer's specified target RA [deg]
dec_targ	53.033695	Observer's specified target Dec [deg]
ra_nom	215.12092285587	Nominal RA [deg]
dec_nom	53.029803610132	Nominal Dec [deg]
roll_nom	326.32853680382	Nominal Roll [deg]
revision	4	Processing version of data
ontime	49271.358934999	Sum of GTIs [s]
livetime	48627.592357466	Livetime [s]
ontime0	49274.499905229	Sum of GTIs [s]
ontime1	49268.217974722	Sum of GTIs [s]
ontime2	49265.077014446	Sum of GTIs [s]
ontime3	49271.358934999	Sum of GTIs [s]
ontime6	49274.499905229	Sum of GTIs [s]
l2events	131411	Number of level 2 events



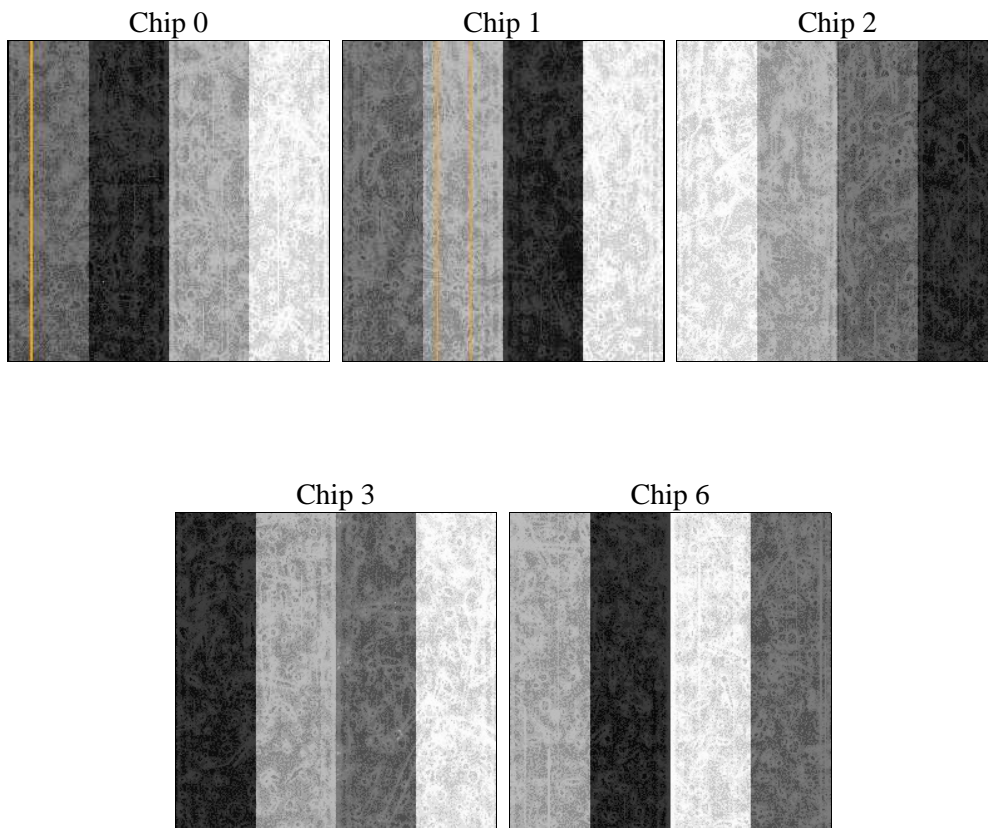
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	49140.713000	[s] Scheduled observation exposure time
ascdsver	8.5.1.1	Processing system revision	ontime	49271.358934999	Sum of GTIs [s]
caldbver	4.5.6	 	ontime0	49274.499905229	Sum of GTIs [s]
date	2013-03-07T21:10:00	Date and time of file creation	ontime1	49268.217974722	Sum of GTIs [s]
revision	4	Processing version of data	ontime2	49265.077014446	Sum of GTIs [s]
			ontime3	49271.358934999	Sum of GTIs [s]
			ontime6	49274.499905229	Sum of GTIs [s]
			l1events	1531684	Number of level 1 events

2.1.4 Events

	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6
level 1 events	295657	291441	326697	308456	309433
rejected events	264300	256059	296967	278864	277599
rejected %	89%	87%	90%	90%	89%

	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6
grade 0 events	11861	13810	11082	11126	11567
	4%	4%	3%	3%	3%
grade 1 events	162	173	153	161	140
	0%	0%	0%	0%	0%
grade 2 events	7597	7862	7357	6670	7199
	2%	2%	2%	2%	2%
grade 3 events	3506	3850	3296	3432	3601
	1%	1%	1%	1%	1%
grade 4 events	3296	3765	3331	3416	3515
	1%	1%	1%	1%	1%
grade 5 events	10902	12406	10270	12774	12665
	3%	4%	3%	4%	4%
grade 6 events	6080	7238	5738	5941	6998
	2%	2%	1%	1%	2%
grade 7 events	252253	242337	285470	264936	263748
	85%	83%	87%	85%	85%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-01236	ACIS-01236	Obspar file type	PREDICTED	ACTUAL
Grating	NONE	NONE	Obspar update status	NONE	UPDATED
Data mode	VFAINT	VFAINT	Number of optional ACIS chips dropped	0	0
Observation mode	POINTING	POINTING	On-chip summing requested	N	N
[deg] Pointing RA	215.075434	215.1209228558735	Subarray requested	NONE	NONE
[deg] Pointing Dec	53.031451	53.02980361013218	Alternating exposures requested	N	N
[deg] Pointing Roll	326.156185	326.3285368038201	[s] Primary exposure time	0.000000	3.1
[deg] Roll angle	50.756000	50.756000			
[deg] Roll tolerance	25.000000	25.000000			
Roll constraint allows 180D rotation	Y	Y			
[mm] SIM focus pos	-0.782348	-0.7809083437167272			
[mm] SIM defocus	0	0.001439871863259334			
[mm] SIM translation stage pos	-233.592463	-233.5874344608287			
[mm] SIM translation stage offset	0	-0.005018542100998502			
[s] Observation start time (MET)	244398520.184000	244396689.24368			
Observation start date	2005-09-29T16:27:36	2005-09-29T15:58:09			
[s] Observation end time (MET)	244447661.184000	244447901.32104			
Observation end date	2005-09-30T06:06:37	2005-09-30T06:11:41			
Read mode	TIMED	TIMED			

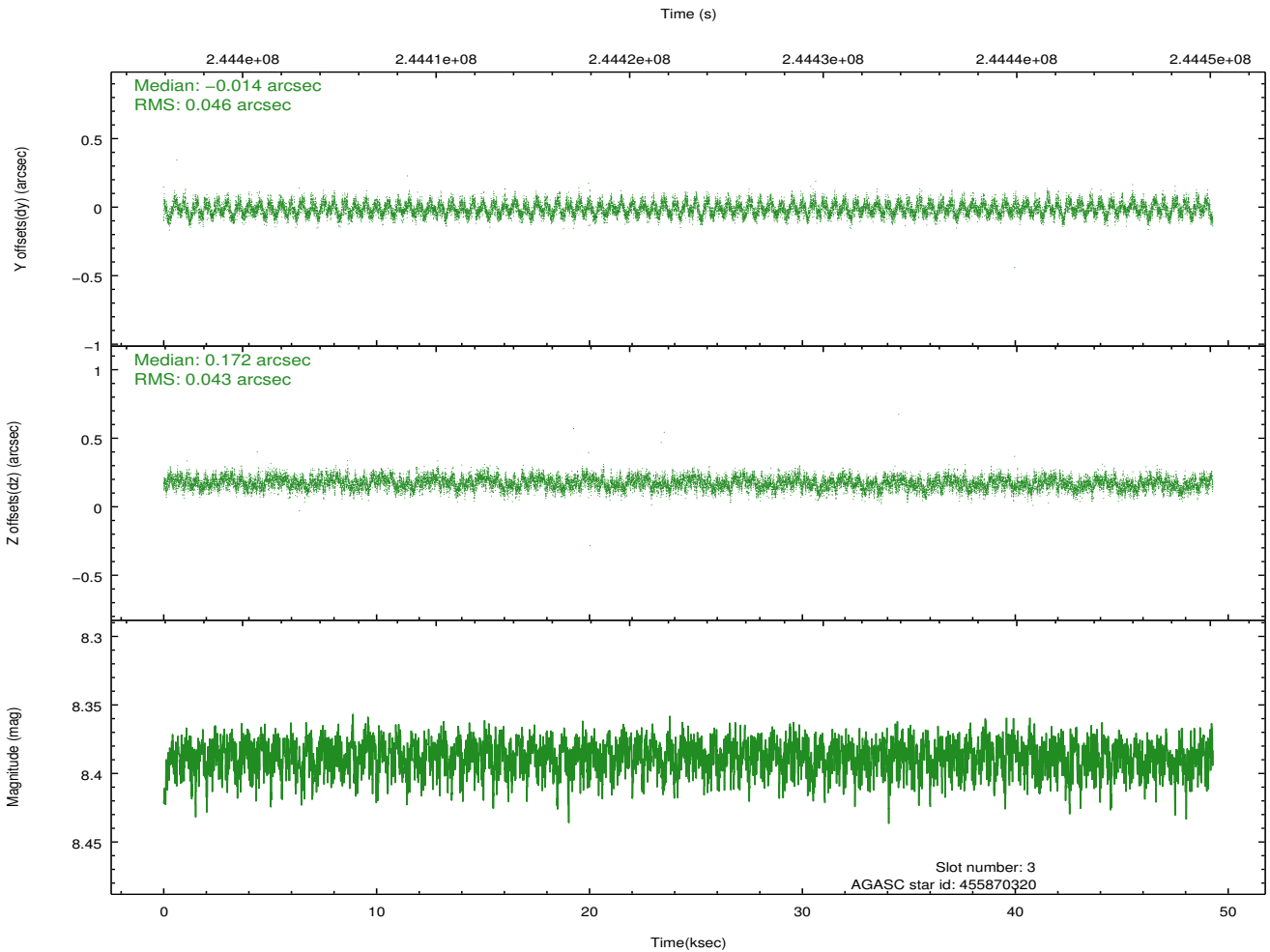
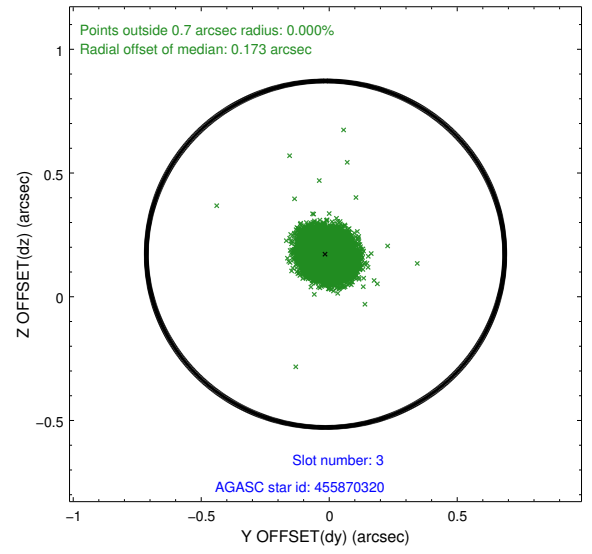
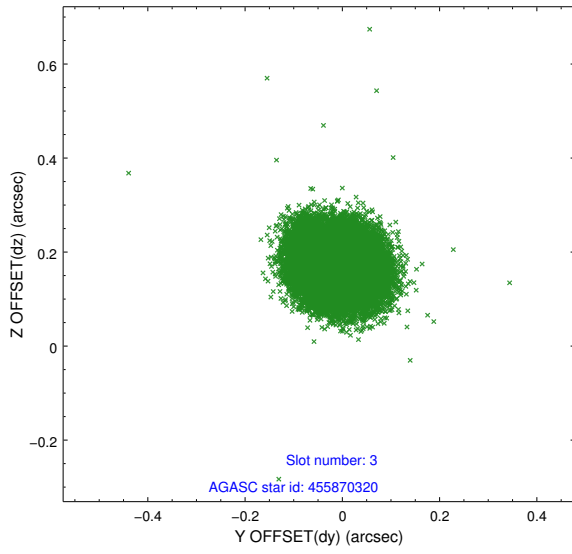
2.3 Aspect

Slot Statistics

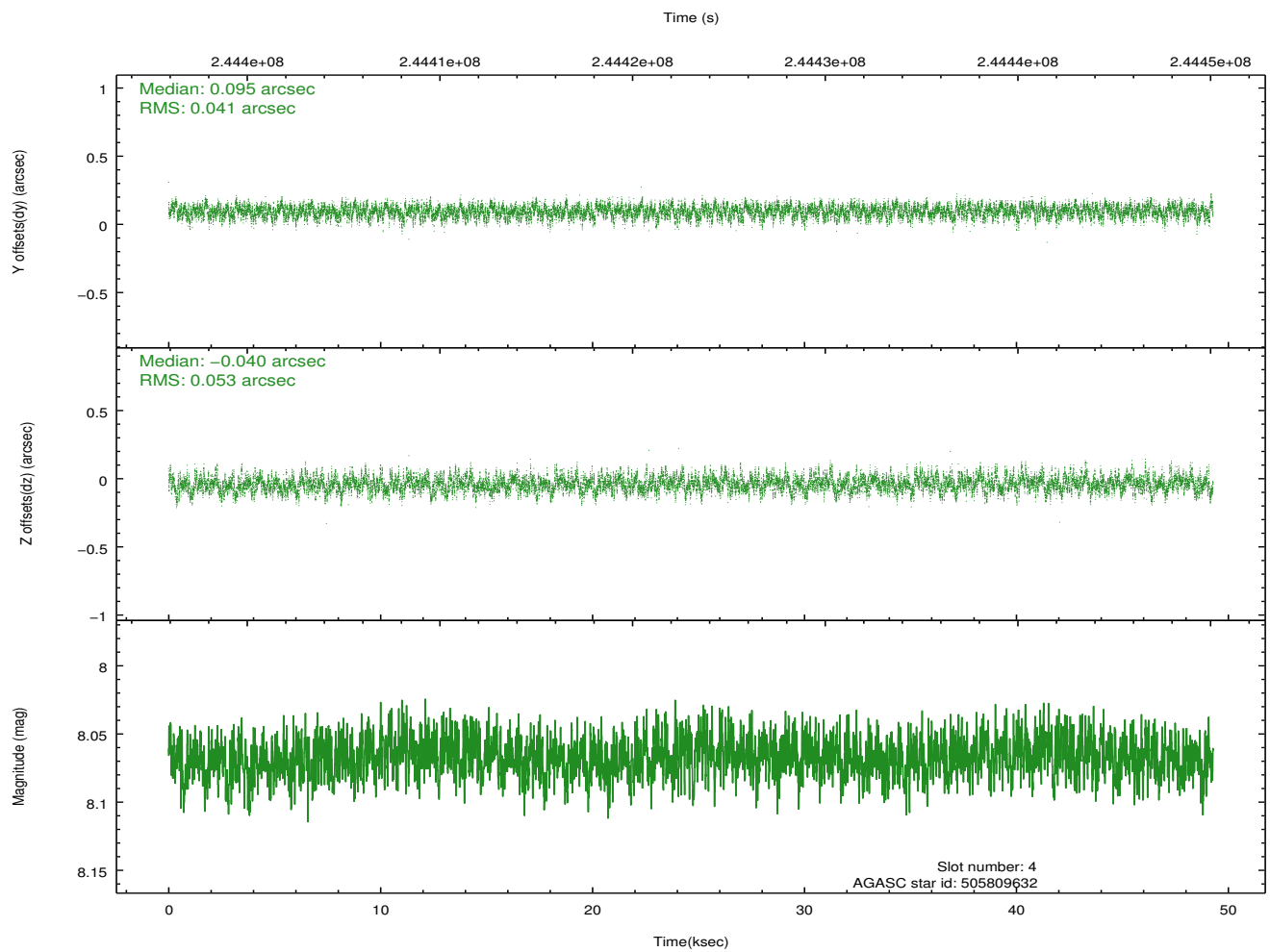
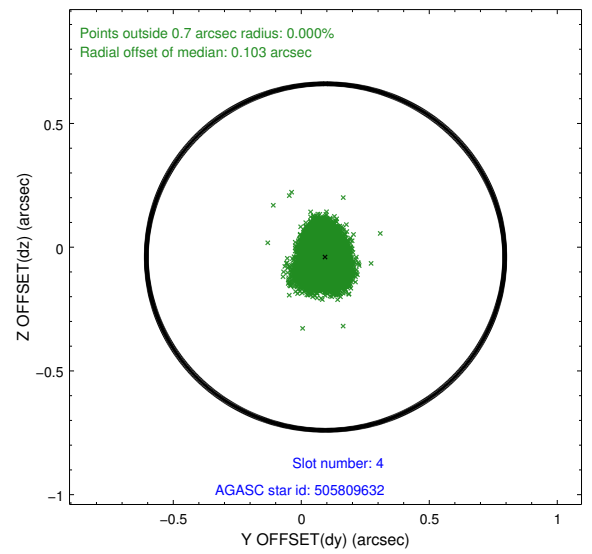
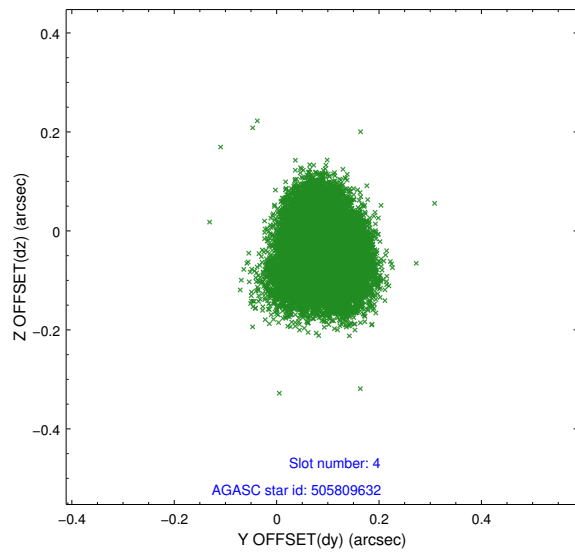
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-I-2	7.14	12020	-0.073	-0.109	0.019	0.045	0.000000	0.000000	-760.92	-841.34
1	FID	ACIS-I-4	7.18	12021	0.106	0.076	0.011	0.020	0.000000	0.000000	2153.32	1065.02
2	FID	ACIS-I-5	7.22	12021	-0.134	0.103	0.014	0.029	0.000000	0.000000	-1814.83	1062.88
3	GUIDE	455870320	8.39	24033	-0.014	0.172	0.067	0.105	214.874440	52.401638	896.22	-2128.10
4	GUIDE	505809632	8.07	24035	0.095	-0.040	0.071	0.117	215.499426	53.521185	-229.62	1971.98
5	GUIDE	505812088	8.15	24039	0.048	-0.009	0.056	0.088	214.186617	53.263562	-2061.30	-361.97
6	GUIDE	505812376	7.72	24040	-0.104	-0.099	0.055	0.089	214.039537	52.937930	-1688.08	-1517.97
7	GUIDE	505815928	8.33	24031	-0.023	-0.020	0.056	0.089	216.234742	53.074559	1984.61	1542.46

2.4 Star Slots

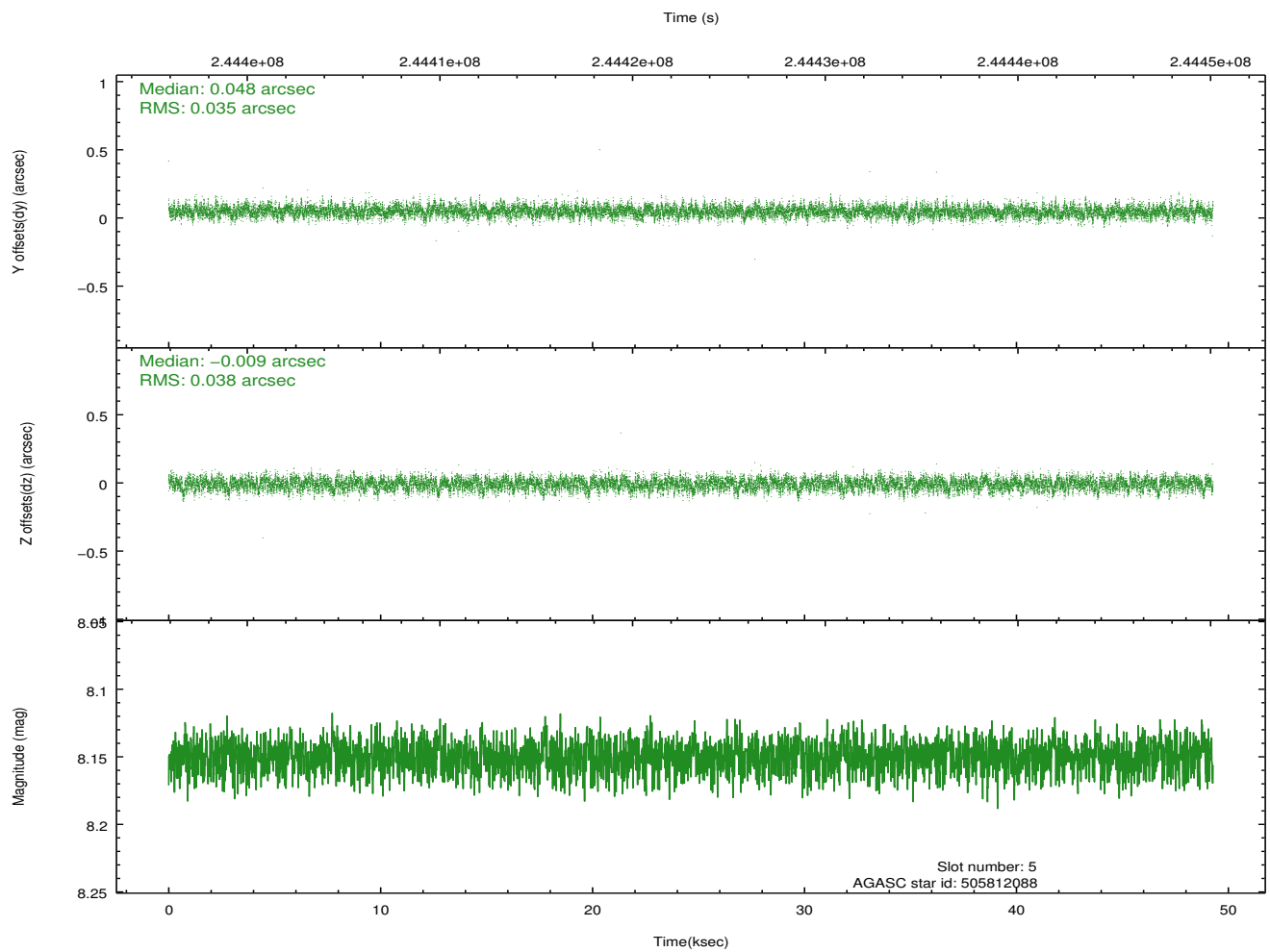
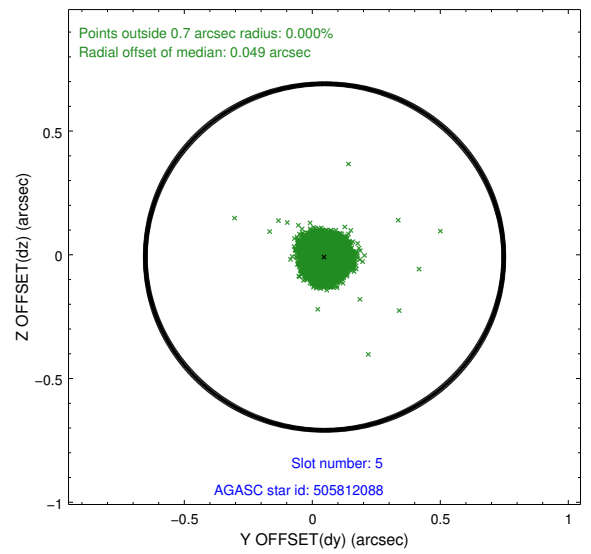
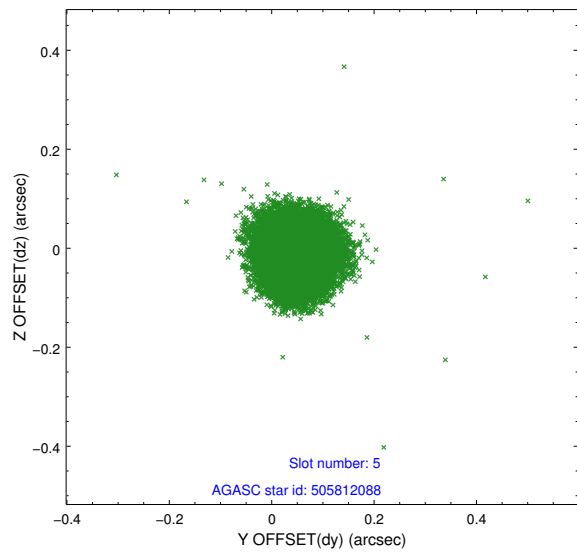
2.4.1 Slot 3



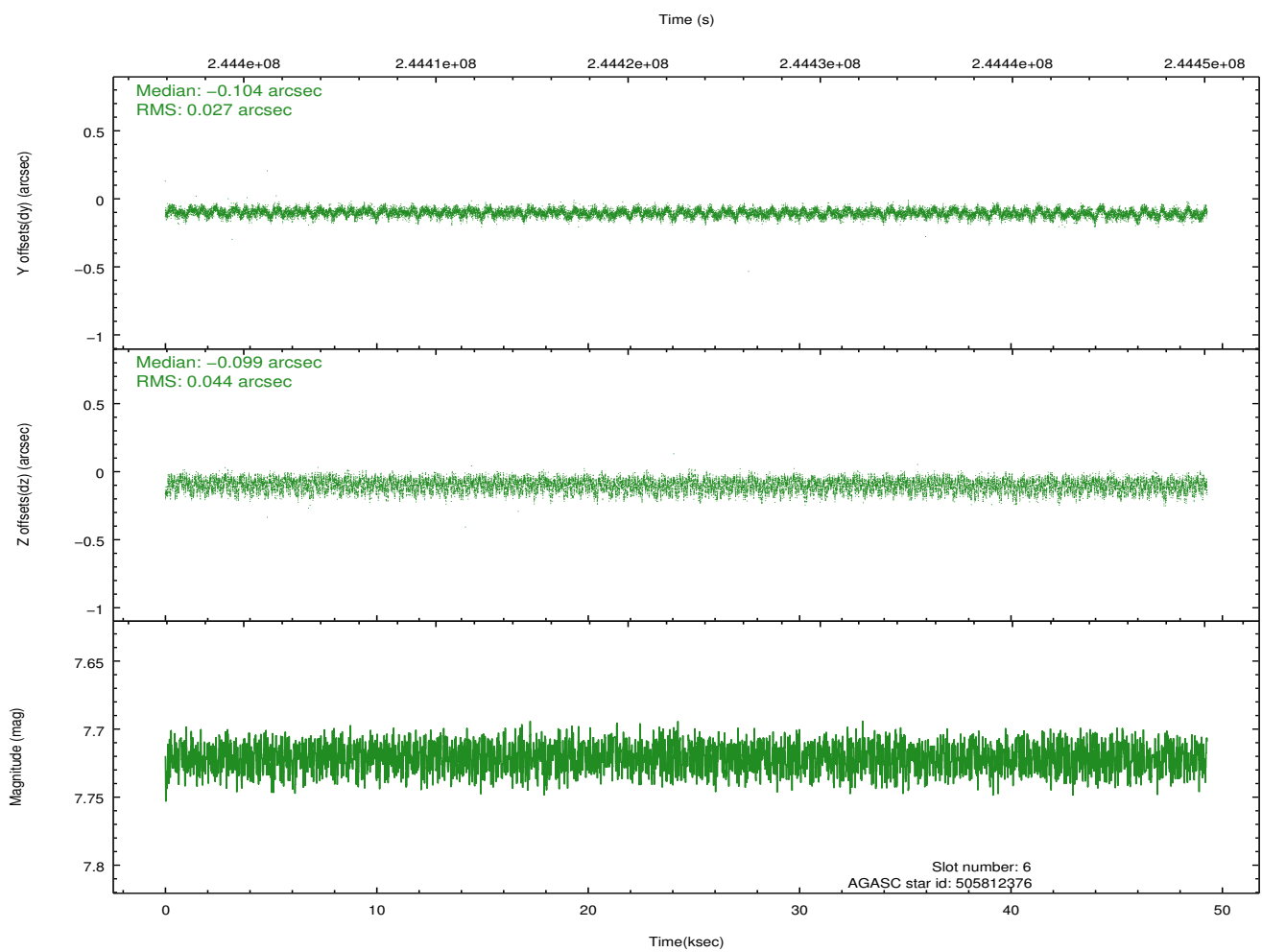
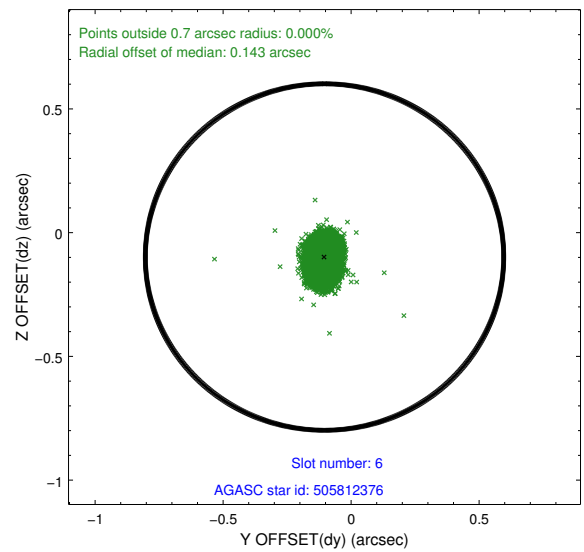
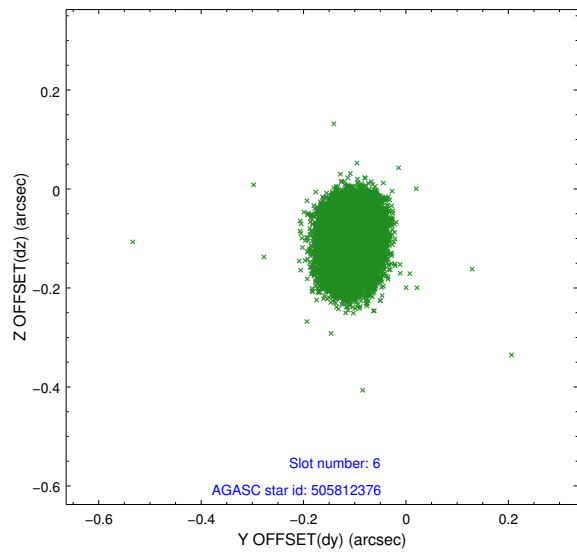
2.4.2 Slot 4



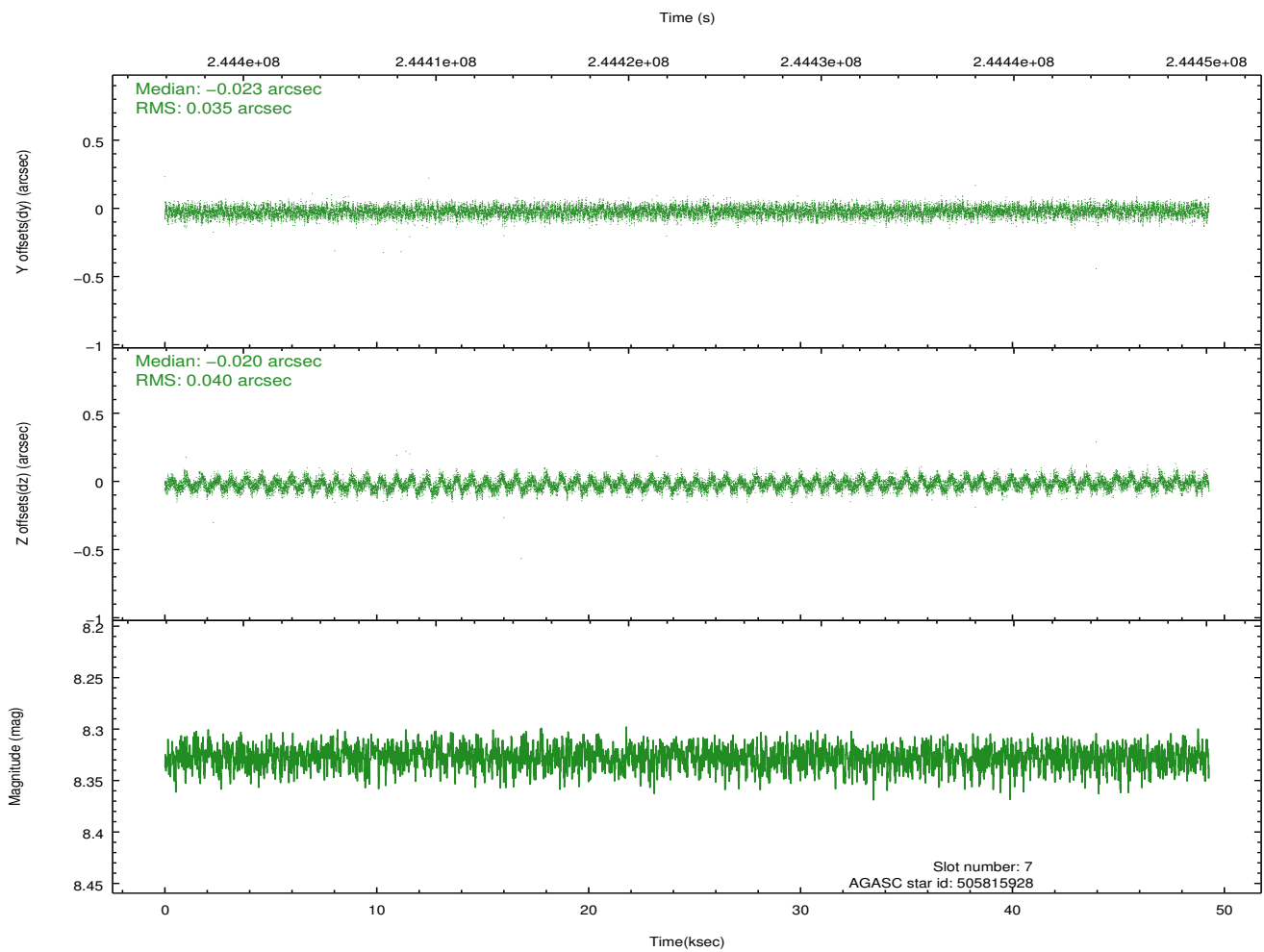
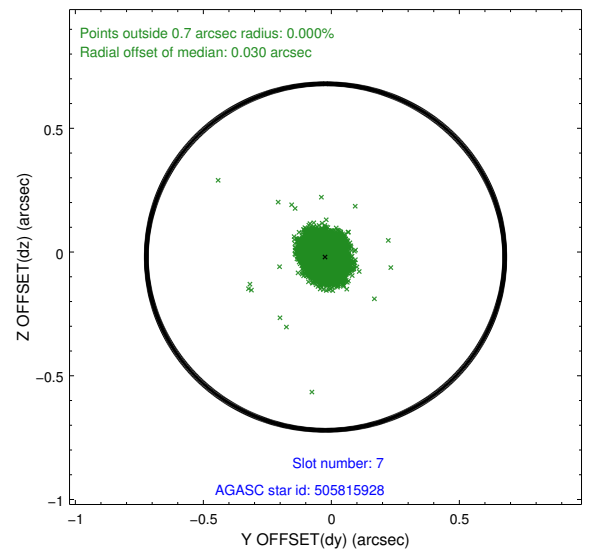
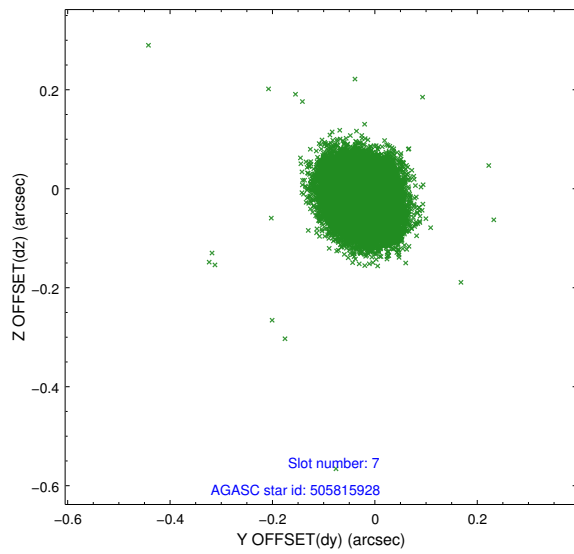
2.4.3 Slot 5



2.4.4 Slot 6

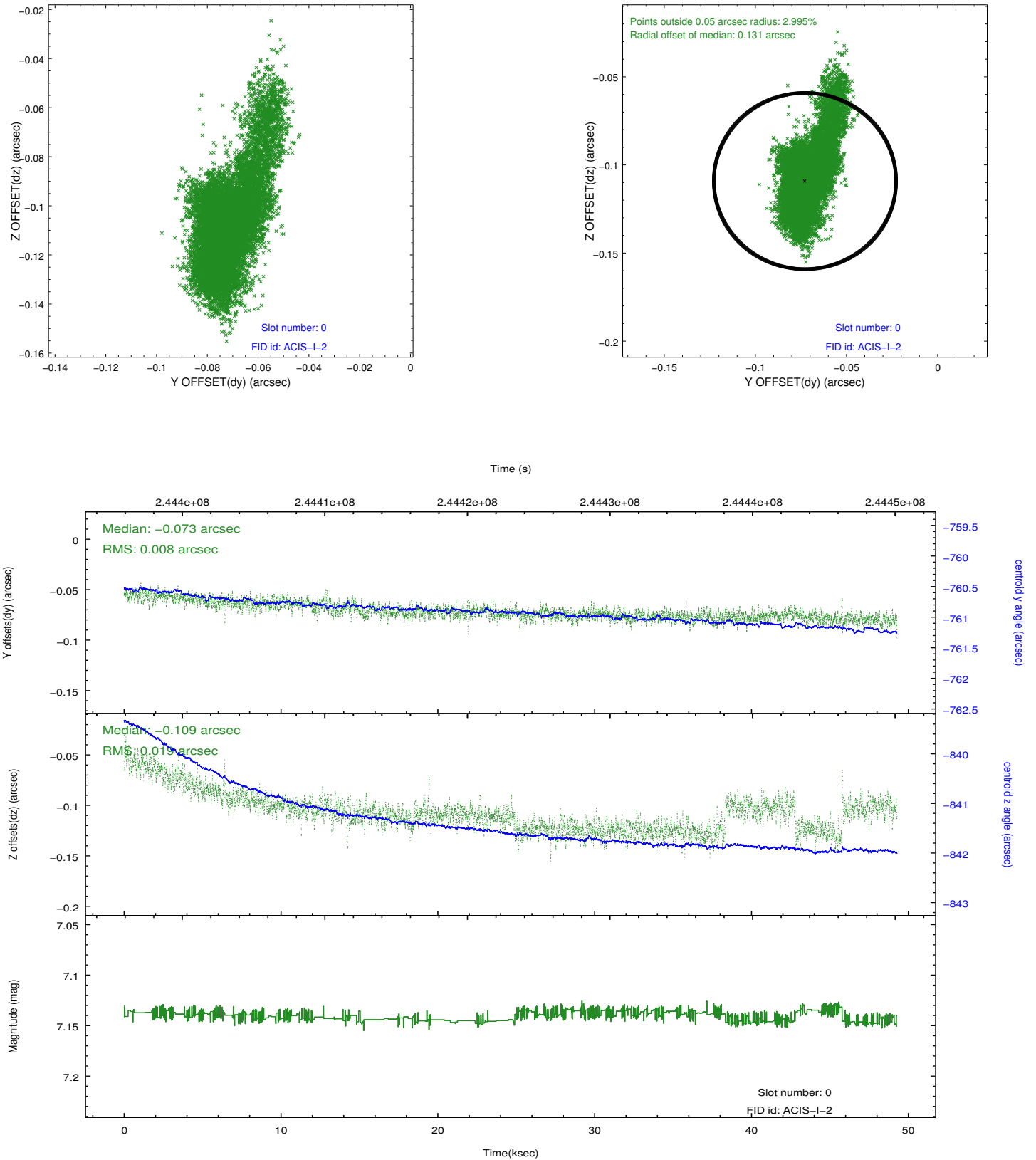


2.4.5 Slot 7

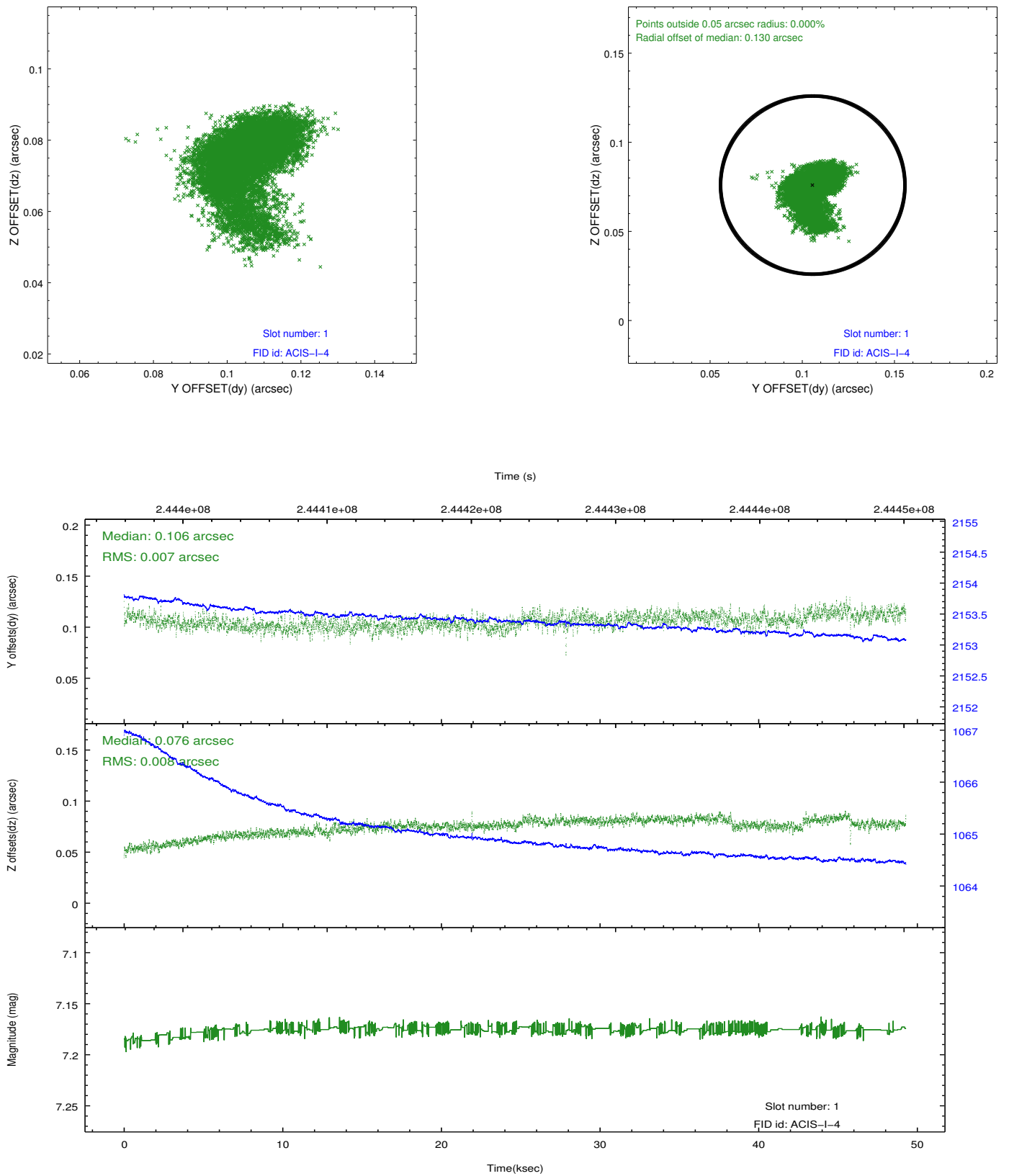


2.5 FID Slots

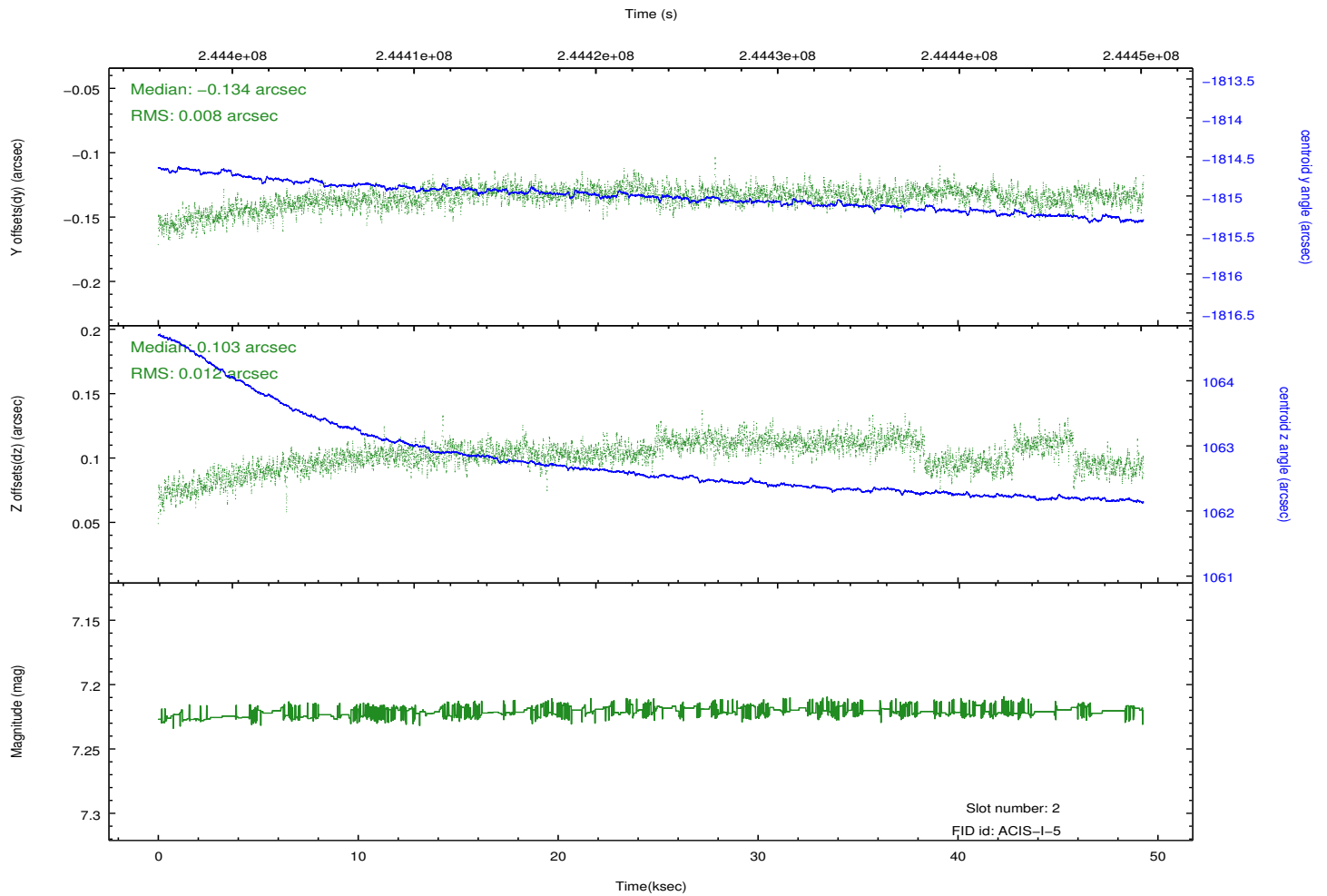
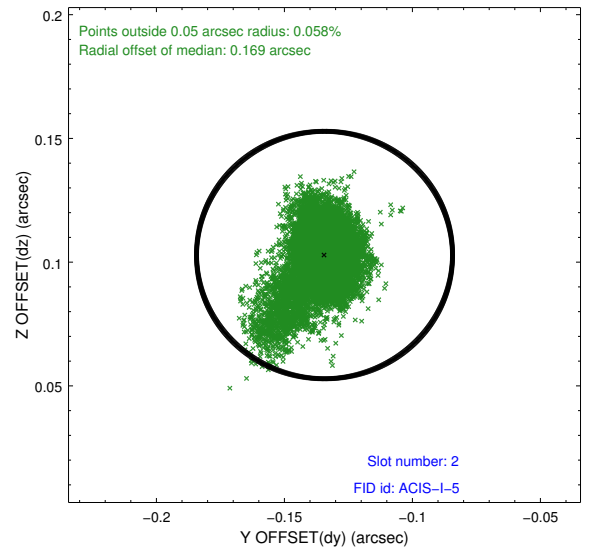
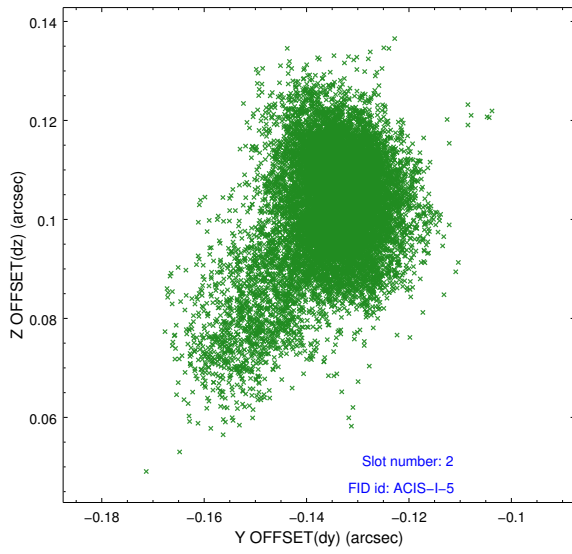
2.5.1 Slot 0



2.5.2 Slot 1



2.5.3 Slot 2



A Summary

A.1 Status

V&V Scientist	Jen Lauer
V&V Date (YYYY-MM-DD)	2013.03.08
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	49.27135

A.2 Comments

As a consequence of the DEA-A shutdown anomaly on Sep 15th (DOY258), the reported value of the ACIS FP temperature was ~1.3 degrees warmer than the actual temperature. The value for FP temperature reported in the headers of the Level 2 event file and the Mission Timeline files are incorrect by this amount for this processing. However, the temperature is corrected in the processing in order to obtain the correct temperature for the CTI correction. So the calibrated data are correct. If using the FP temp values in the headers of data files (some CIAO tools require this information), investigators should subtract 1.3 degrees from the reported temperature to determine the true temperature.

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Roll constraint satisfied.