

V&V Reference Report

L2 ASCDS Version : 8.4.3

Observation 12930 - L2 Version 2
Chandra X-Ray Center

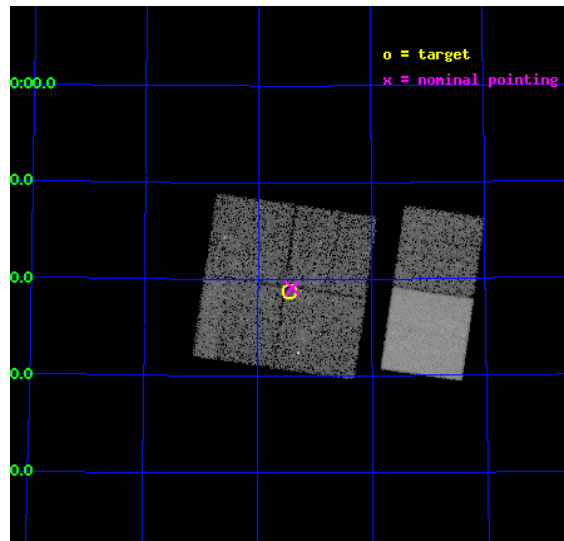
L2 Processing Date : Feb 7 2012

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1 Front

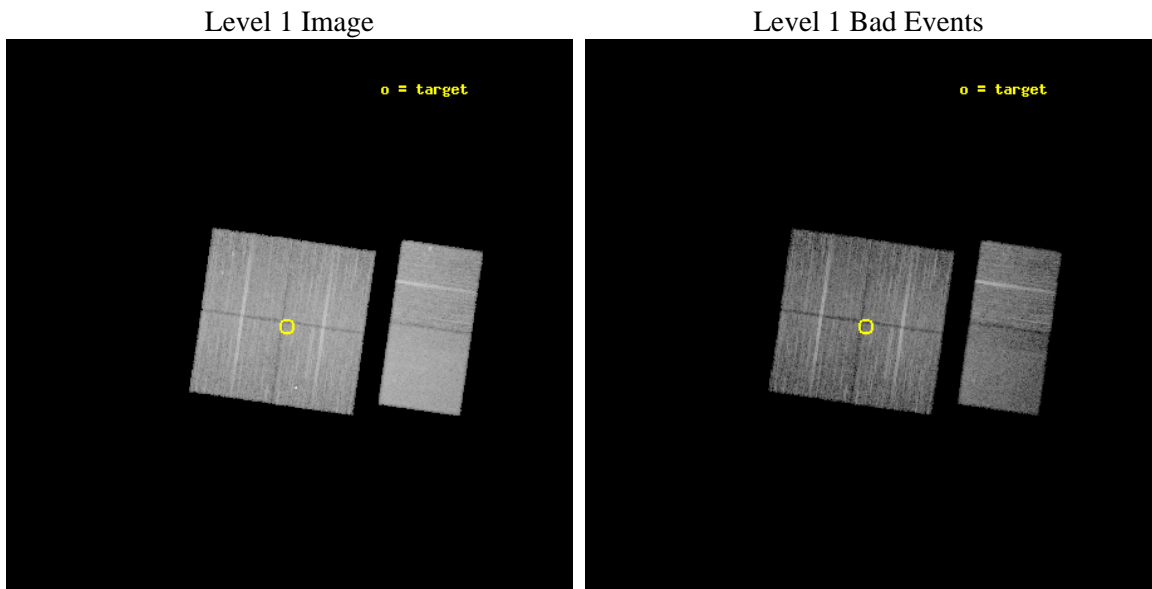
seq_num	900962	Sequence number
obs_id	12930	Observation id
title	Filling the 15 micron Gap: Search for Compton-thick Accretion with Chandra and AKARI in the NEP Deep Field	Proposal title
observer	Dr. Mirko Krumpe	Principal investigator
object	AKARI-NEP-Deep Field	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	268.86	Observer's specified target RA [deg]
dec_targ	66.645	Observer's specified target Dec [deg]
ra_nom	268.85125714442	Nominal RA [deg]
dec_nom	66.652303590613	Nominal Dec [deg]
roll_nom	98.216708611341	Nominal Roll [deg]
revision	2	Processing version of data
ontime	14755.185733855	Sum of GTIs [s]
livetime	14568.346687587	Livetime [s]
ontime0	14755.062613845	Sum of GTIs [s]
ontime1	14755.103653848	Sum of GTIs [s]
ontime2	14748.662802935	Sum of GTIs [s]
ontime3	14755.185733855	Sum of GTIs [s]
ontime6	14755.199945092	Sum of GTIs [s]
ontime7	14755.199945092	Sum of GTIs [s]
l2events	100094	Number of level 2 events



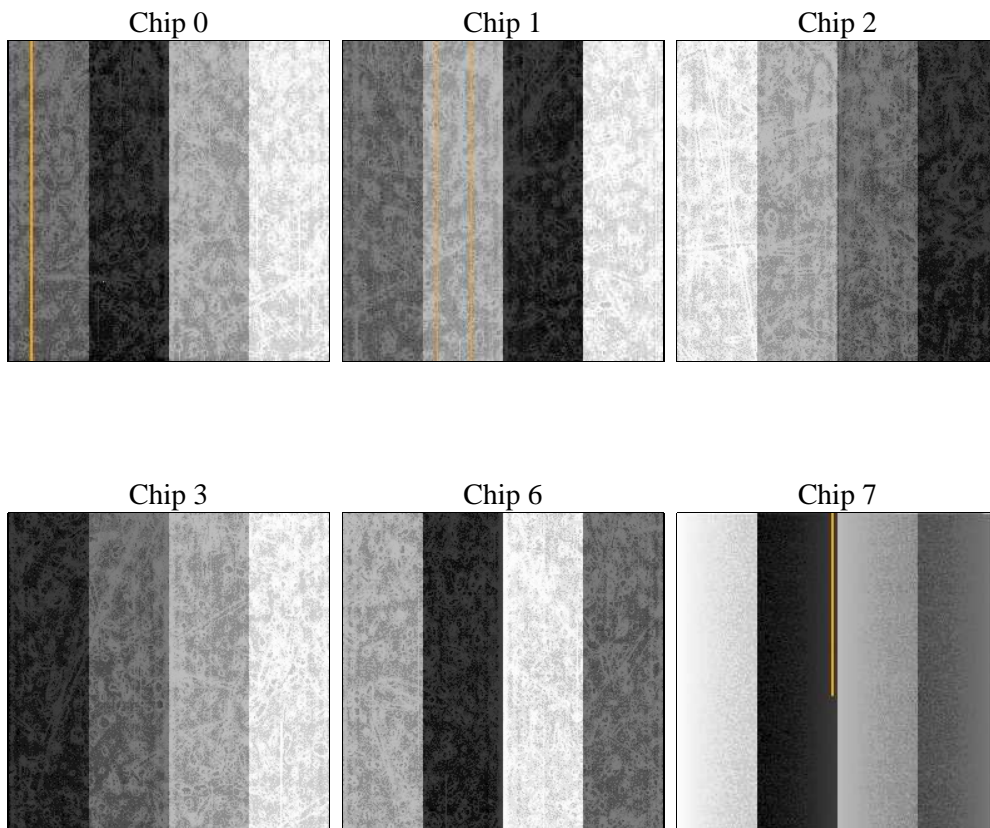
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	1	Obi number	sched_exp_time	15000.000000	[s] Scheduled observation exposure time
ascdsver	8.4.3	Processing system revision	ontime	14755.185733855	Sum of GTIs [s]
caldbver	4.4.7	 	ontime0	14755.062613845	Sum of GTIs [s]
date	2012-02-07T13:46:39	Date and time of file creation	ontime1	14755.103653848	Sum of GTIs [s]
revision	2	Processing version of data	ontime2	14748.662802935	Sum of GTIs [s]
			ontime3	14755.185733855	Sum of GTIs [s]
			ontime6	14755.199945092	Sum of GTIs [s]
			ontime7	14755.199945092	Sum of GTIs [s]
			l1events	588060	Number of level 1 events

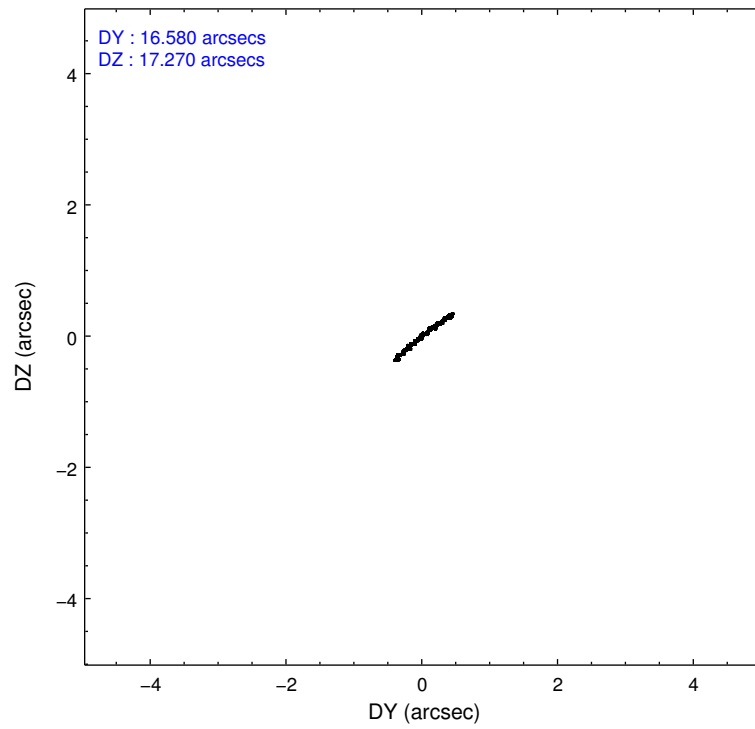
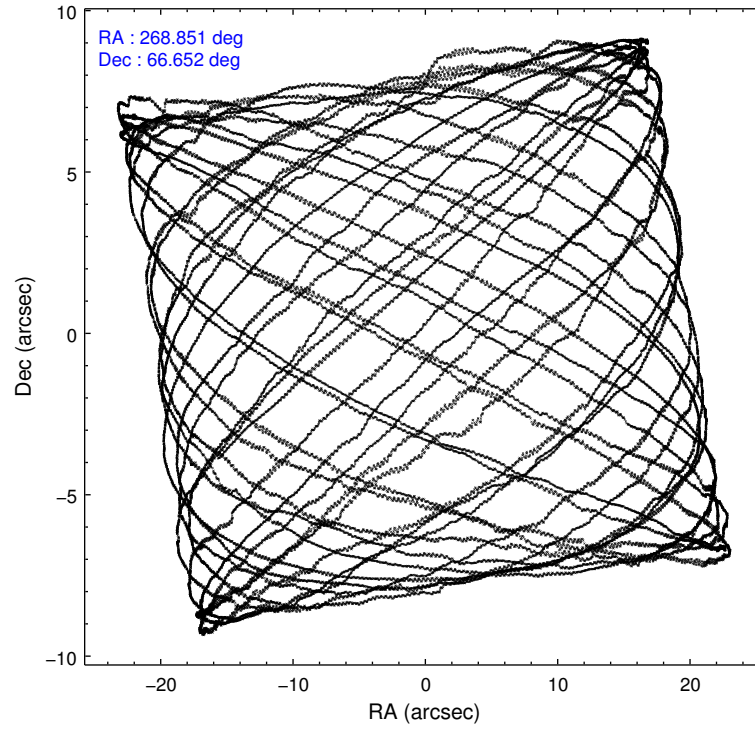
2.1.4 Events

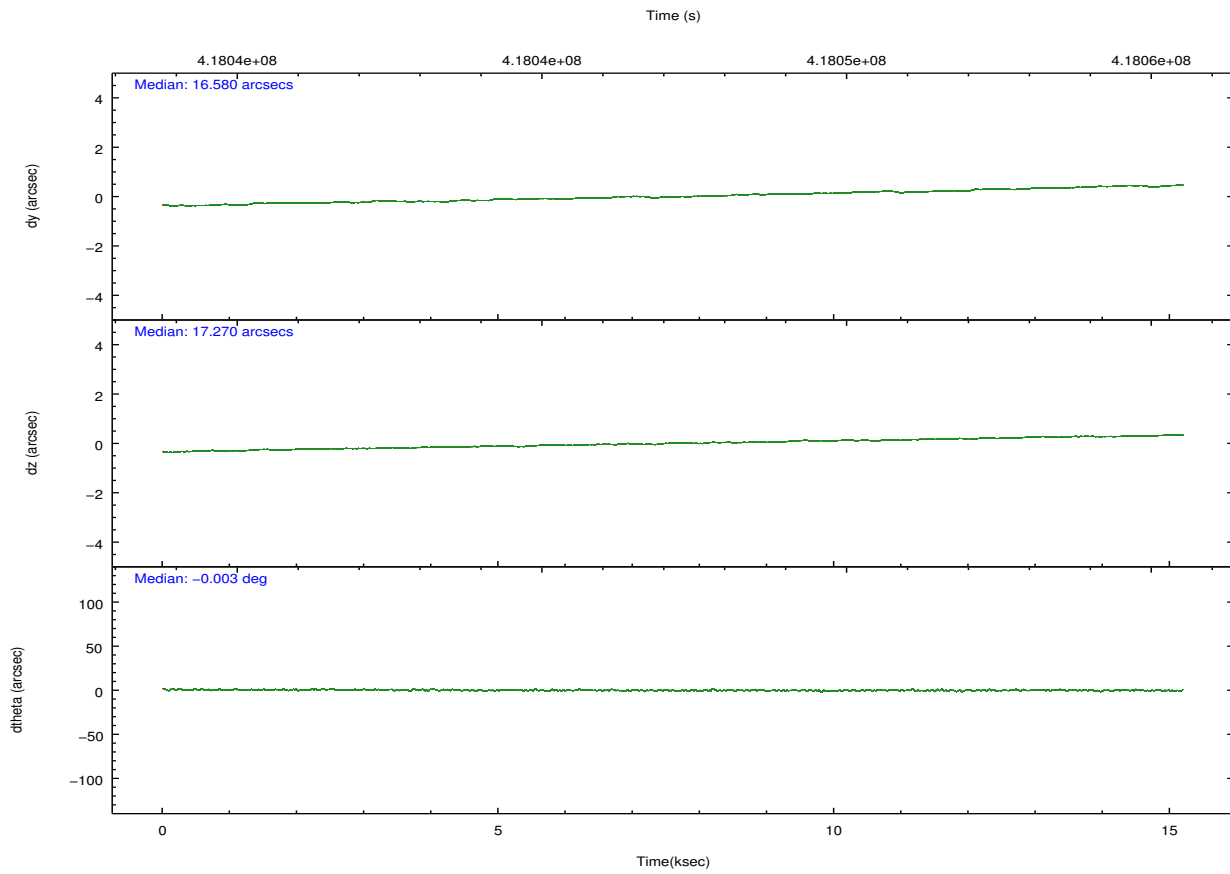
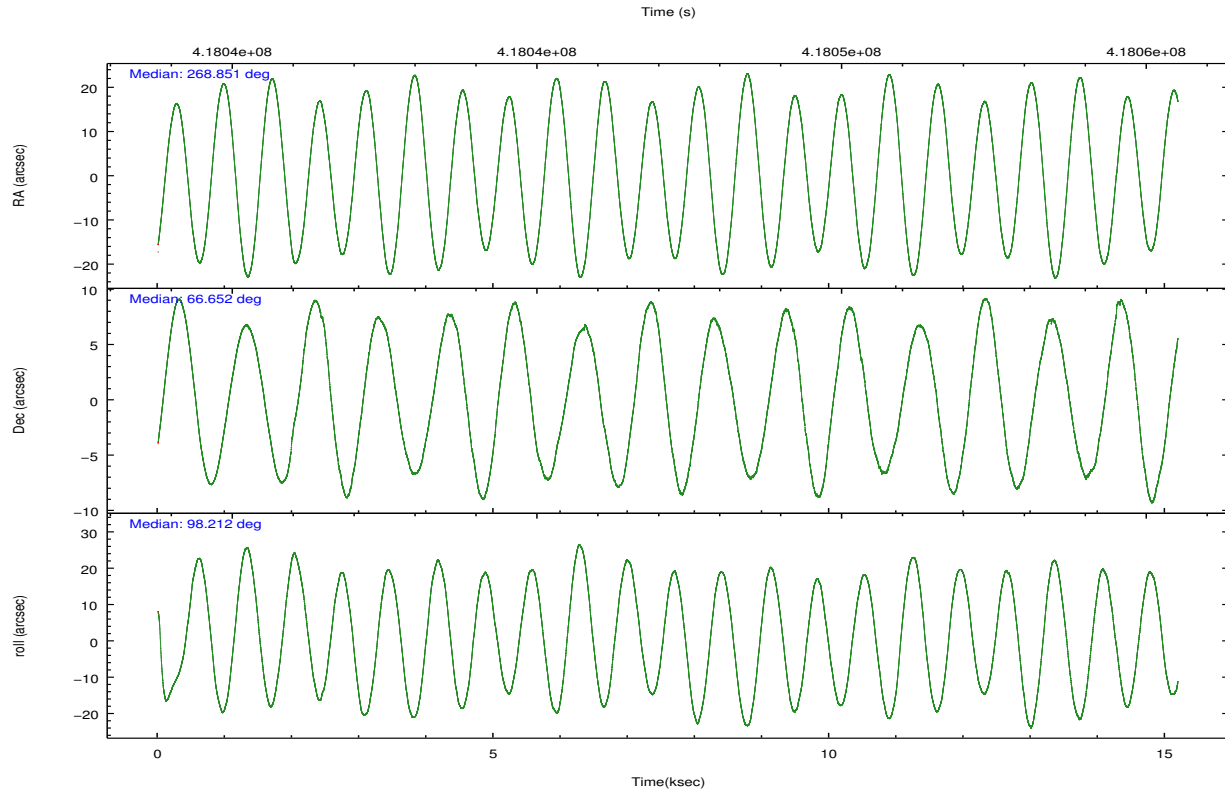
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6	ccd 7		ccd 0	ccd 1	ccd 2	ccd 3	ccd 6	ccd 7
level 1 events	88138	87679	97197	94553	98625	121868	grade 0 events	4028	4198	3739	4669	4172	4905
rejected events	77073	75778	86844	83024	86917	67570		4%	4%	3%	4%	4%	4%
rejected %	87%	86%	89%	87%	88%	55%	grade 1 events	56	51	50	74	61	156
								0%	0%	0%	0%	0%	0%
							grade 2 events	2719	2913	2509	2496	2589	11166
								3%	3%	2%	2%	2%	9%
							grade 3 events	1147	1242	1054	1126	1195	4789
								1%	1%	1%	1%	1%	3%
							grade 4 events	1068	1189	1098	1096	1176	4750
								1%	1%	1%	1%	1%	3%
							grade 5 events	3997	4323	3880	4629	4603	12644
								4%	4%	3%	4%	4%	10%
							grade 6 events	2106	2364	1957	2143	2580	28706
								2%	2%	2%	2%	2%	23%
							grade 7 events	73017	71399	82910	78320	82249	54752
								82%	81%	85%	82%	83%	44%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-012367	ACIS-012367	Obspar file type	PREDICTED	ACTUAL
Grating	NONE	NONE	Obspar update status	NONE	UPDATED
Data mode	VFAINT	VFAINT	CCD I0 on	Y	Y
Observation mode	POINTING	POINTING	CCD I1 on	Y	Y
[deg] Pointing RA	268.894323	268.8512571444184	CCD I2 on	Y	Y
[deg] Pointing Dec	66.630734	66.65230359061319	CCD I3 on	Y	Y
[deg] Pointing Roll	97.968491	98.21670861134058	CCD S0 on	N	N
[mm] SIM focus pos	-0.782348	-0.7809083437167272	CCD S1 on	N	N
[mm] SIM defocus	0	0.001439871863259334	CCD S2 on	O2	Y
[mm] SIM translation stage pos	-233.592463	-233.5874344608287	CCD S3 on	O1	Y
[mm] SIM translation stage offset	0	-0.005018542100998502	CCD S4 on	N	N
[s] Observation start time (MET)	418039755.184000	418039378.86437	CCD S5 on	N	N
Observation start date	2011-04-01T10:08:09	2011-04-01T10:02:58	Number of optional ACIS chips dropped	0	0
[s] Observation end time (MET)	418054755.184000	418055463.1652	On-chip summing requested	N	N
Observation end date	2011-04-01T14:18:09	2011-04-01T14:31:03	Subarray requested	NONE	NONE
Read mode	TIMED	TIMED	Alternating exposures requested	N	N
			[s] Primary exposure time	0.000000	3.2

2.3 Aspect



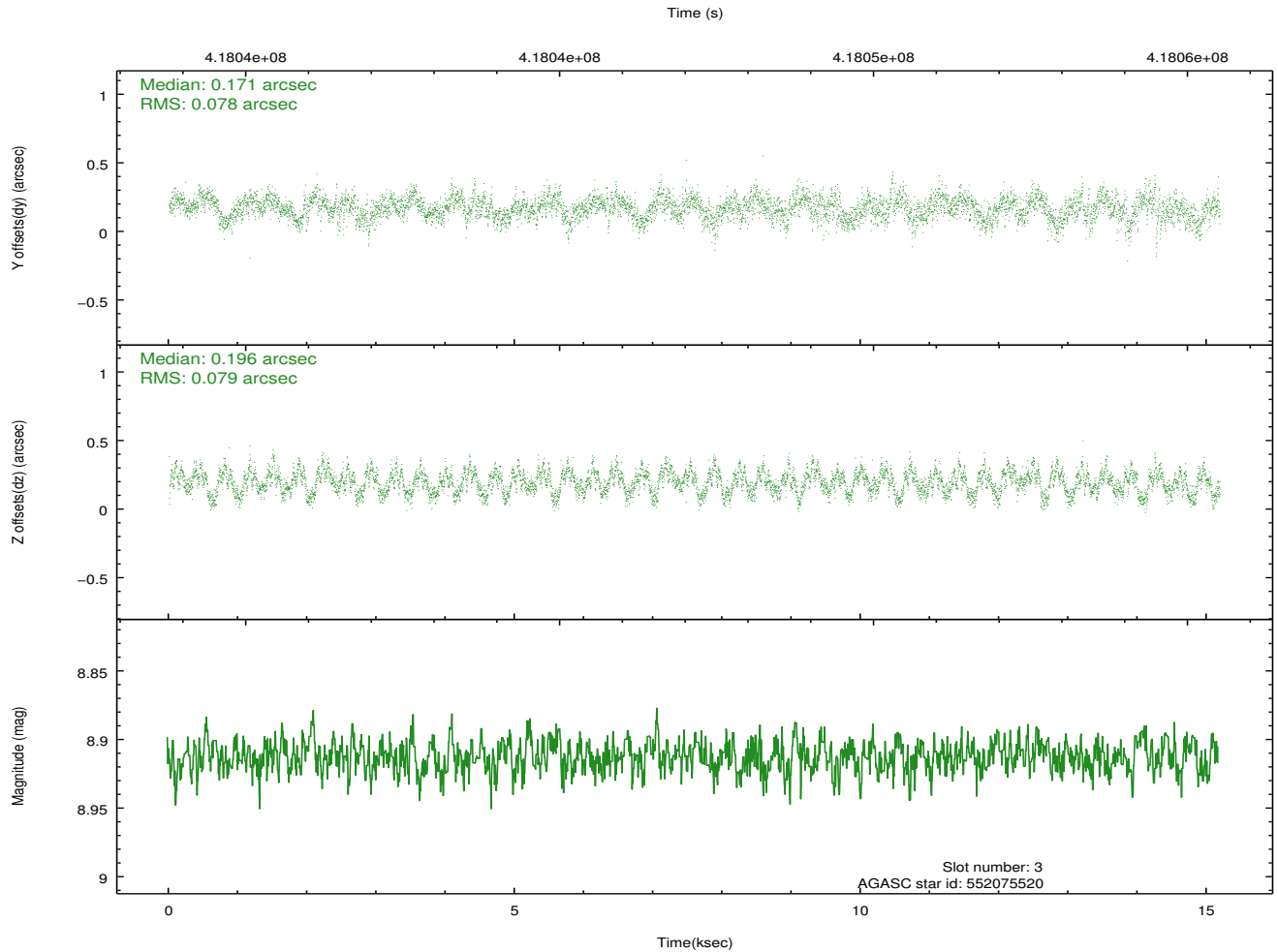
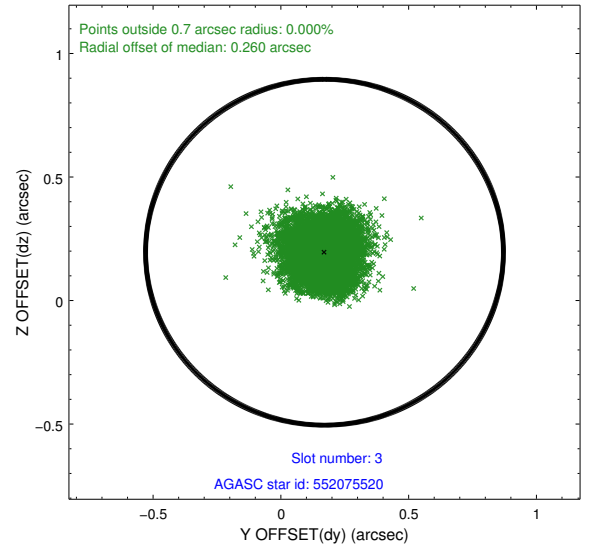
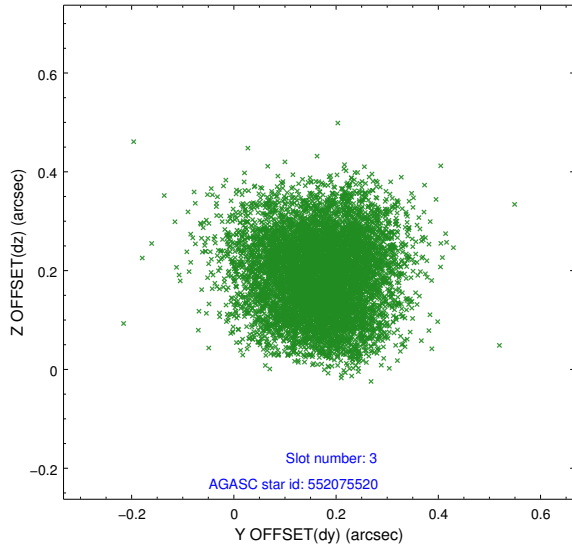


Slot Statistics

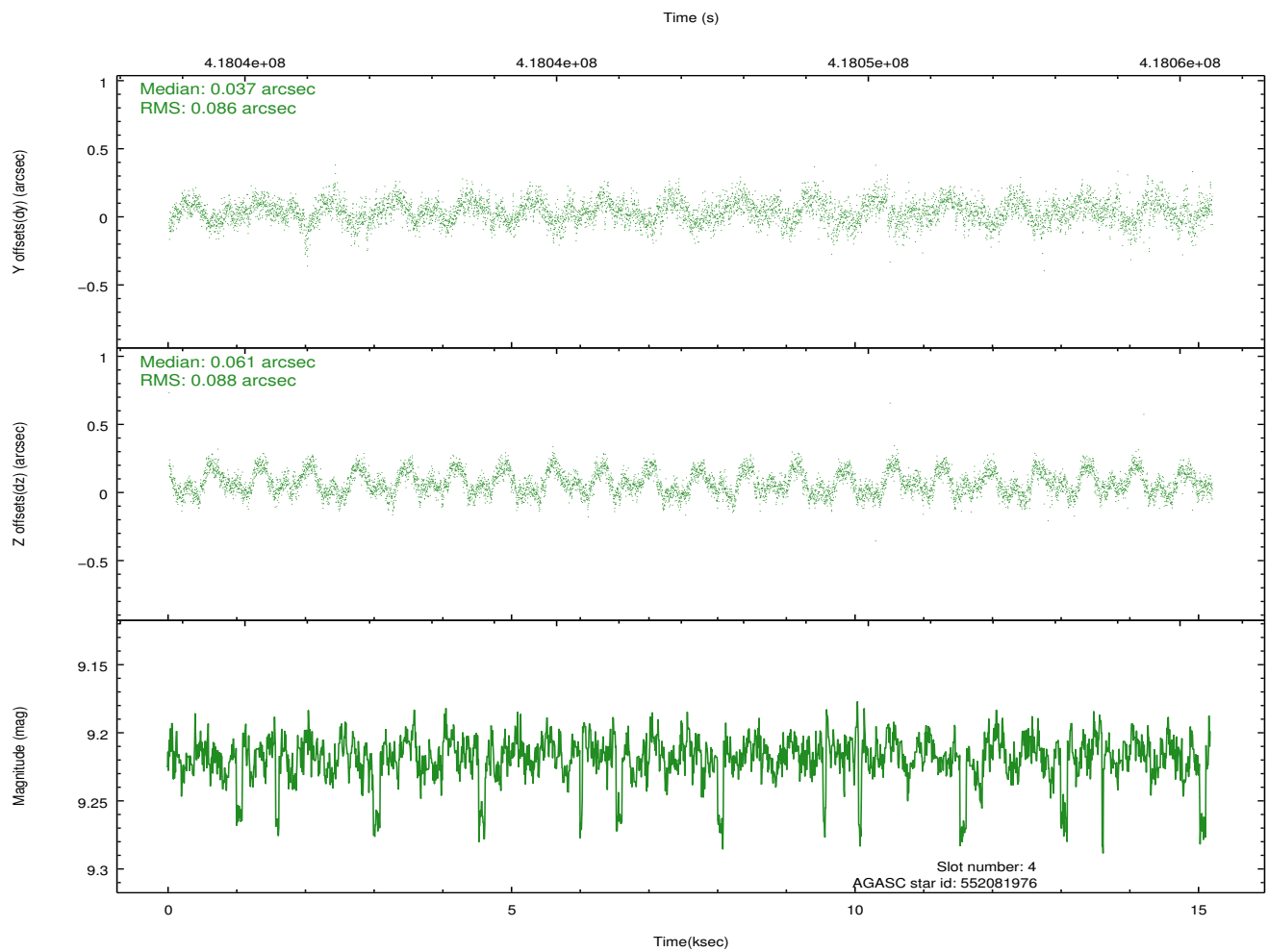
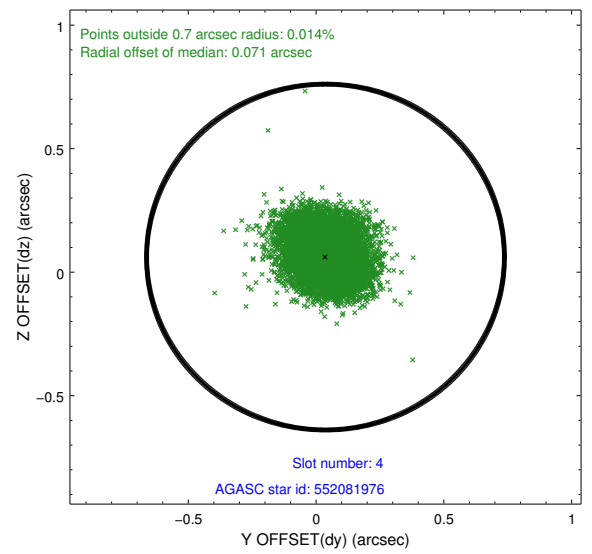
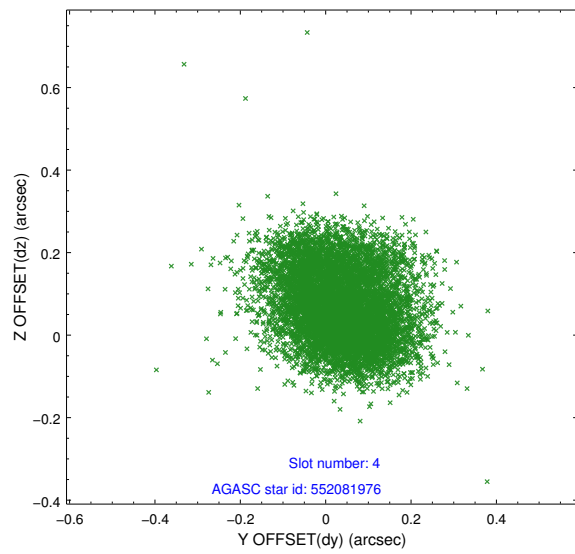
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-I-1	7.06	3705	-0.028	-0.082	0.011	0.018	0.000000	0.000000	922.80	-840.99
1	FID	ACIS-I-4	6.99	3705	0.160	0.094	0.022	0.037	0.000000	0.000000	2143.17	1058.87
2	FID	ACIS-I-5	7.06	3705	-0.231	0.059	0.015	0.028	0.000000	0.000000	-1825.06	1056.94
3	GUIDE	552075520	8.91	7400	0.171	0.196	0.120	0.186	269.430358	66.310622	-1245.22	-608.34
4	GUIDE	552081976	9.22	7361	0.037	0.061	0.132	0.207	269.000724	66.928627	1041.42	-297.10
5	GUIDE	552082392	9.69	7396	-0.211	-0.199	0.151	0.246	267.761612	66.950878	1377.05	1419.32
6	GUIDE	552084280	7.64	7409	0.049	-0.117	0.086	0.139	268.233478	66.419076	-617.39	1047.66
7	GUIDE	552216648	9.77	7369	-0.040	0.057	0.143	0.232	270.130141	67.075369	1361.94	-1939.70

2.4 Star Slots

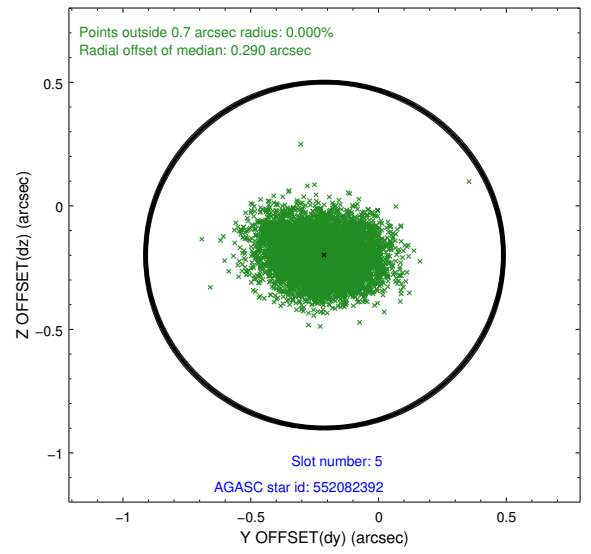
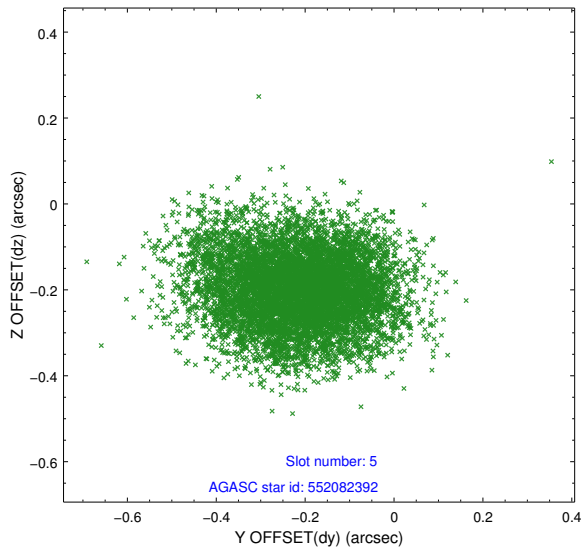
2.4.1 Slot 3



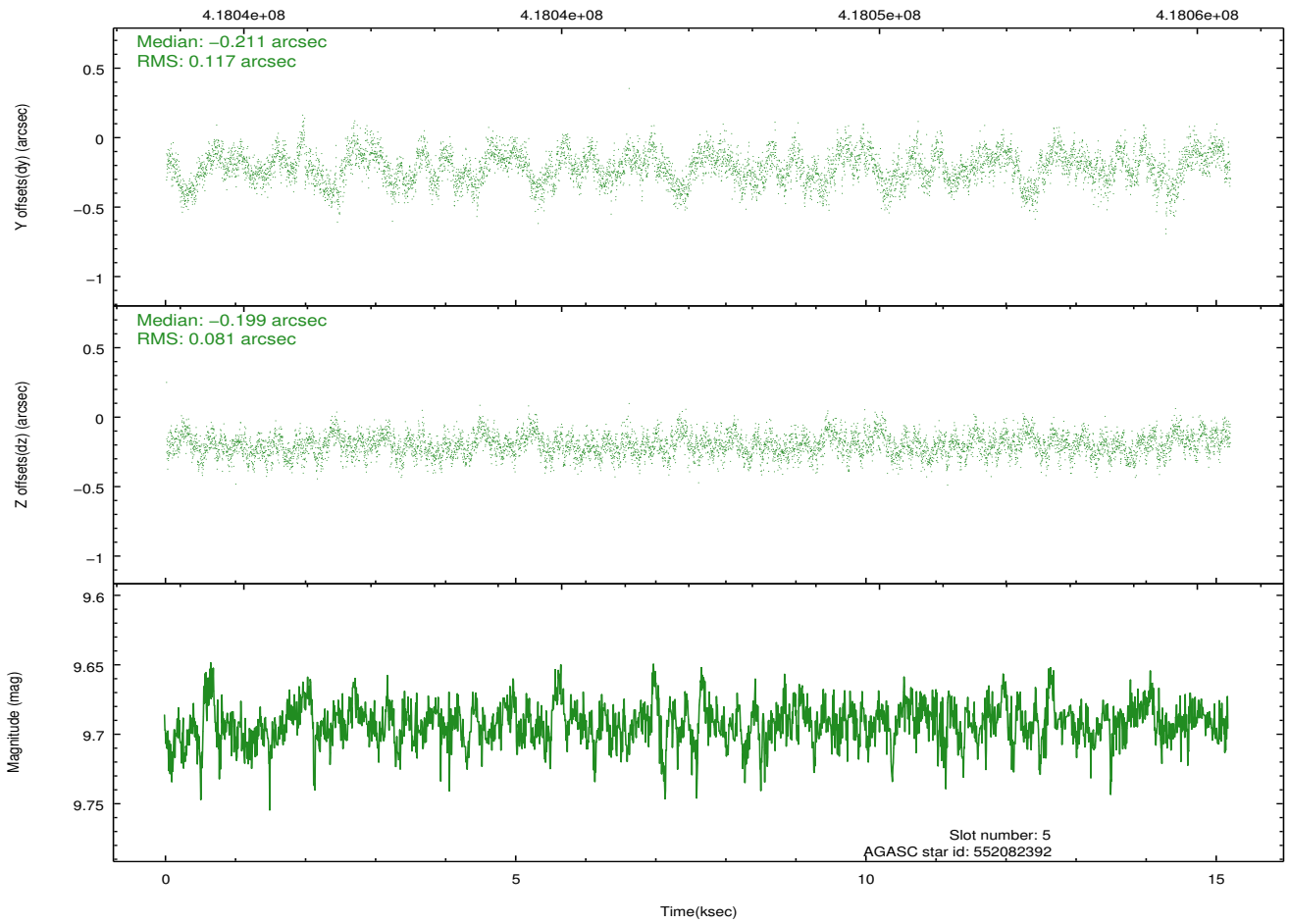
2.4.2 Slot 4



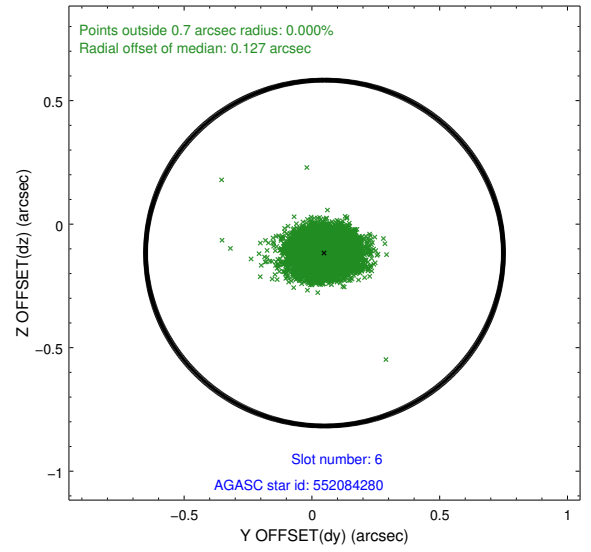
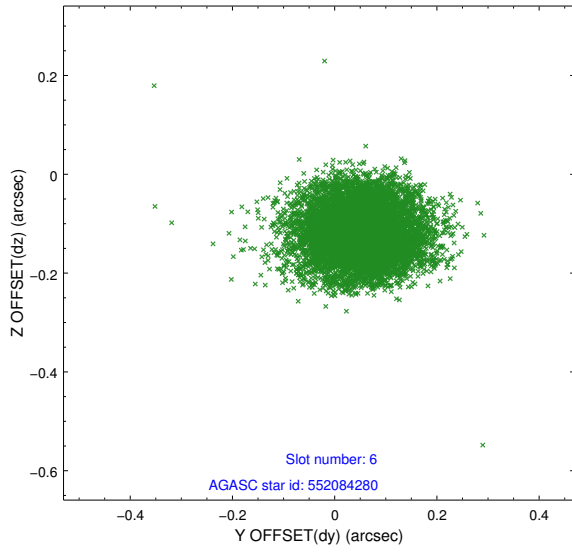
2.4.3 Slot 5



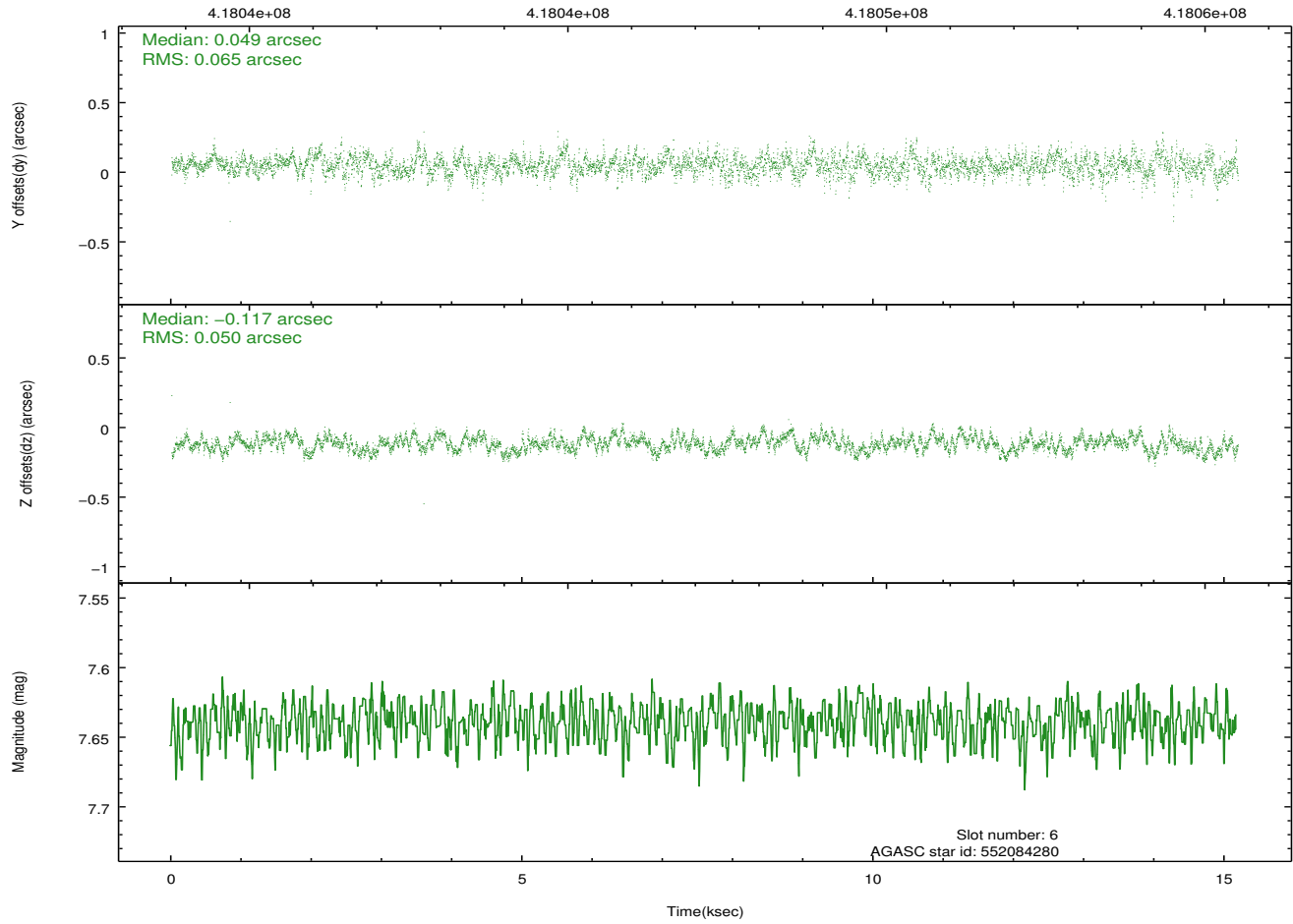
Time (s)



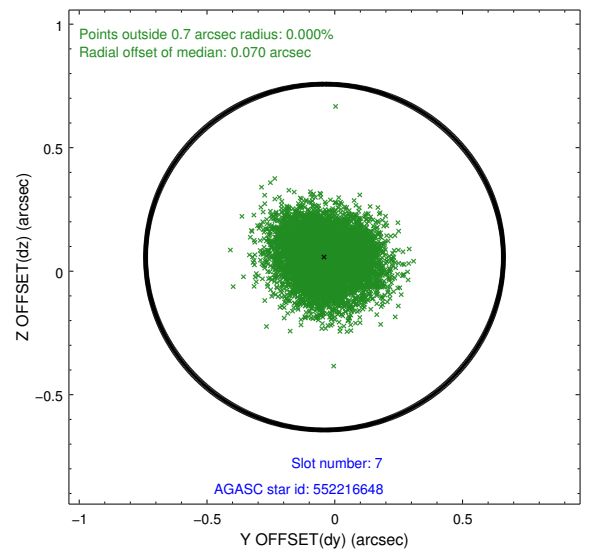
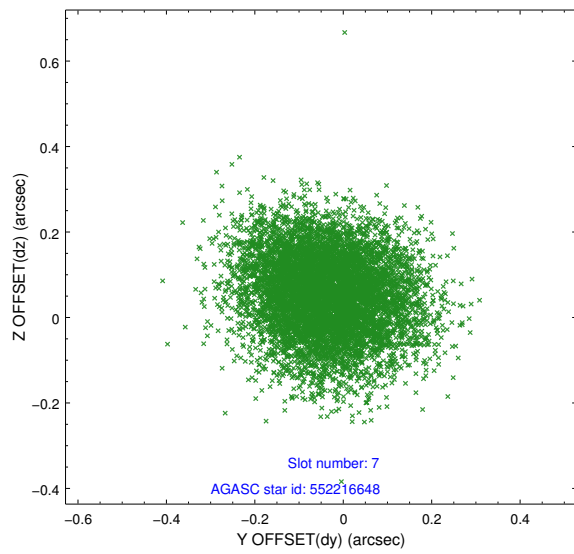
2.4.4 Slot 6



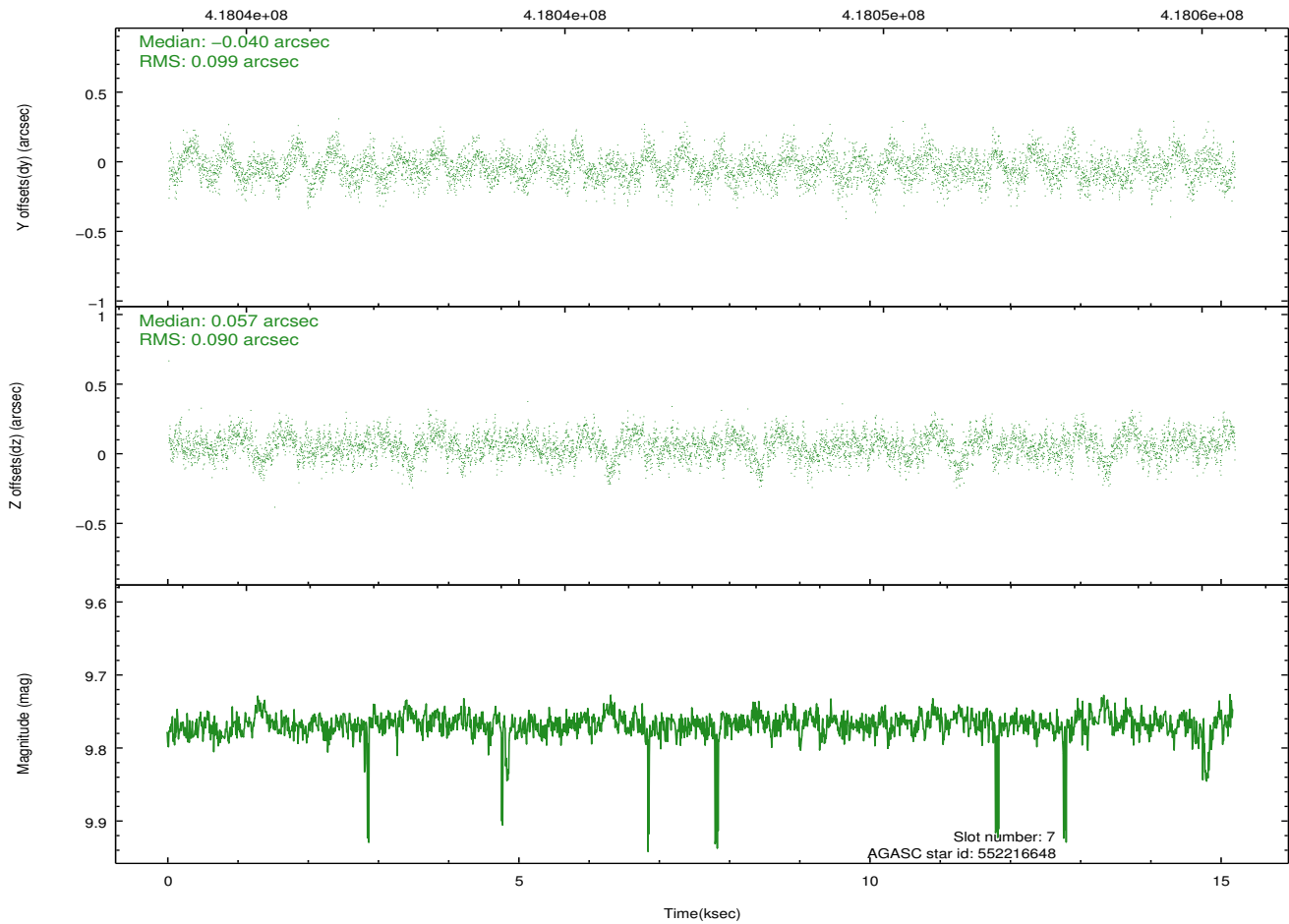
Time (s)



2.4.5 Slot 7

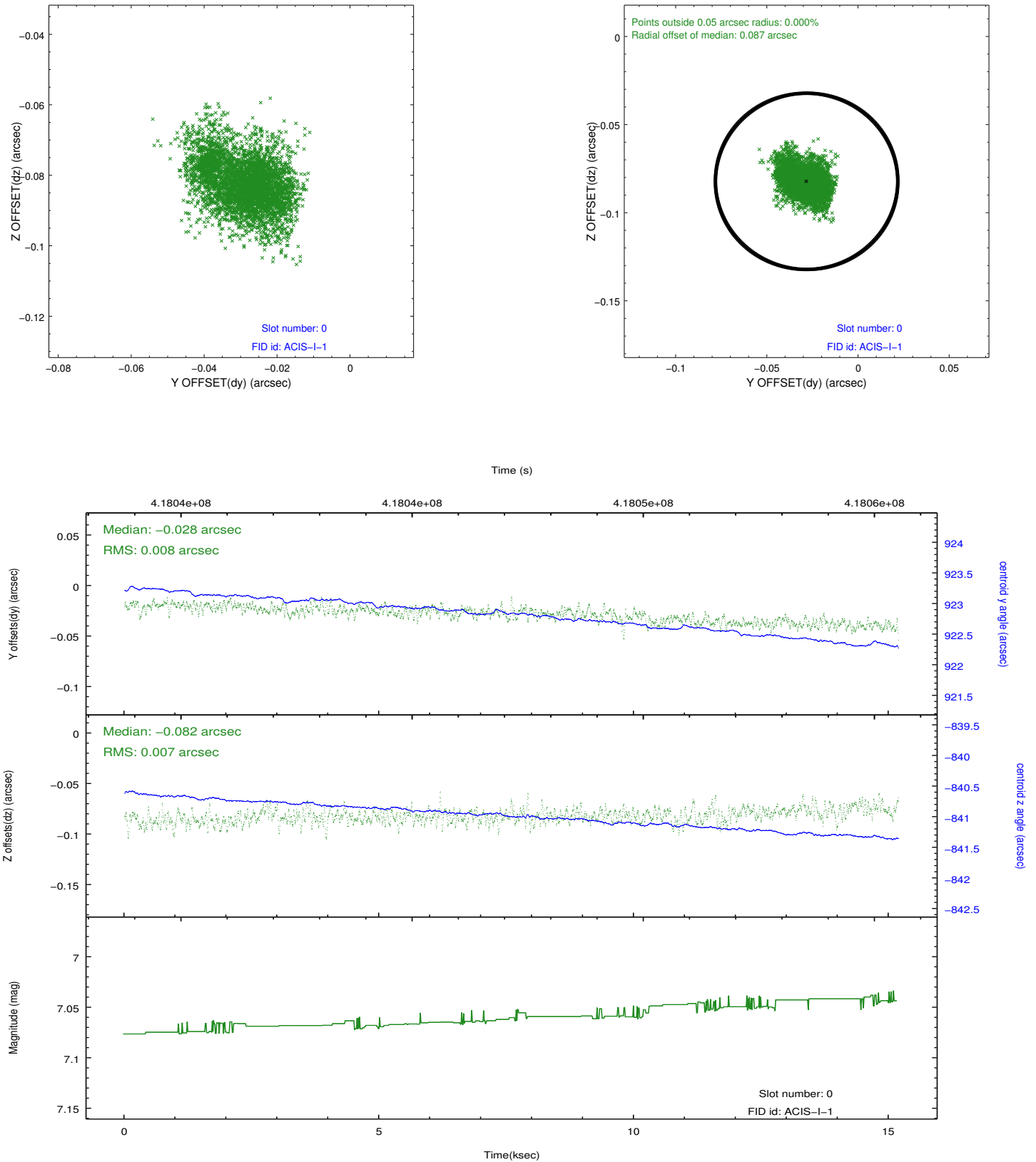


Time (s)

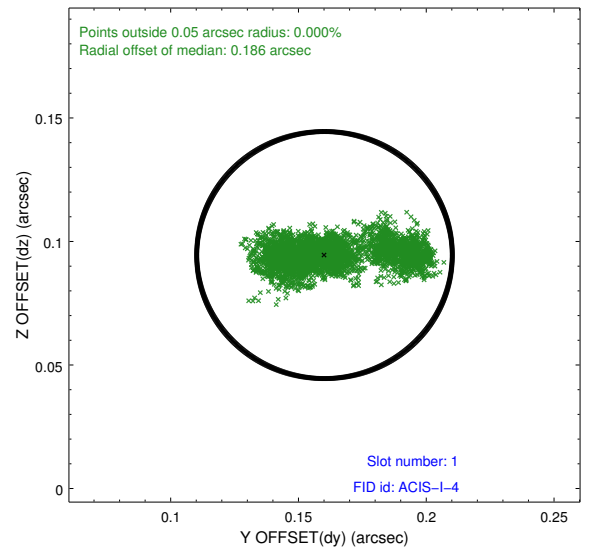
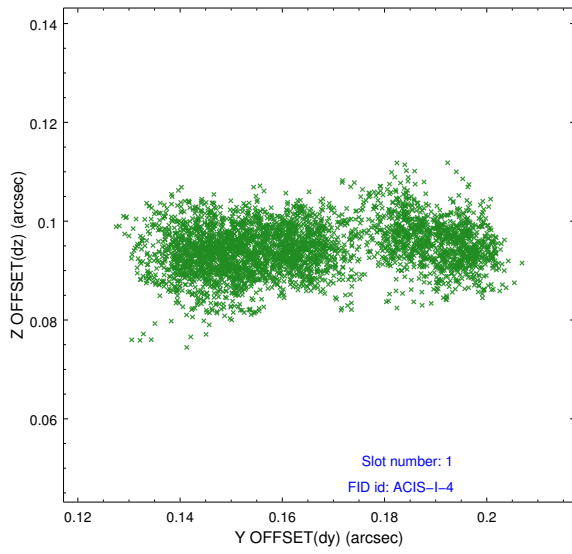


2.5 FID Slots

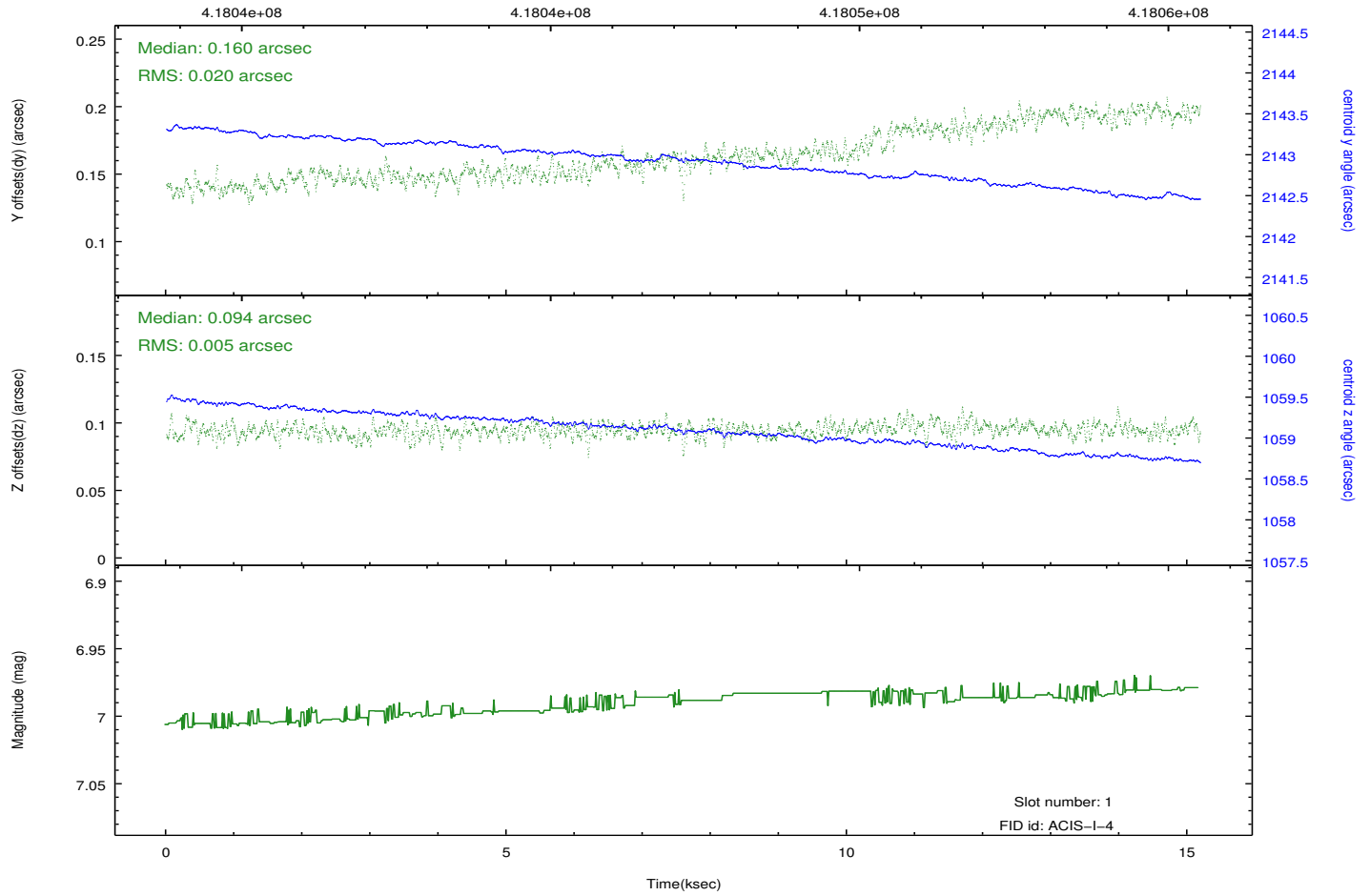
2.5.1 Slot 0



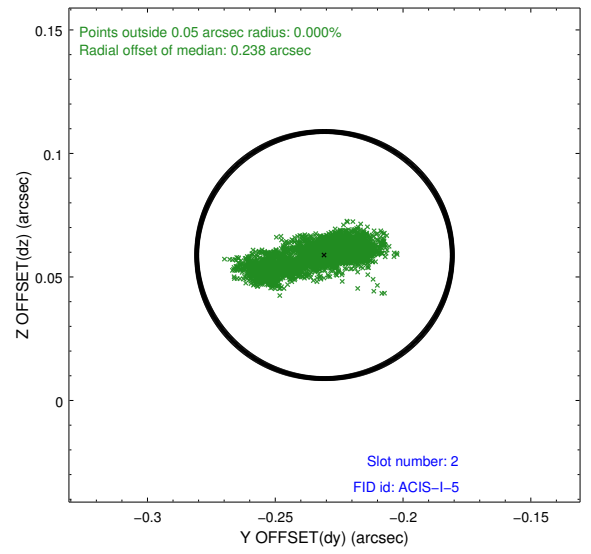
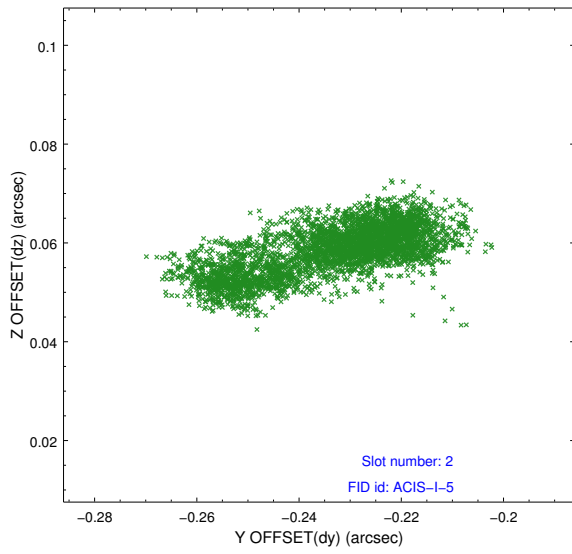
2.5.2 Slot 1



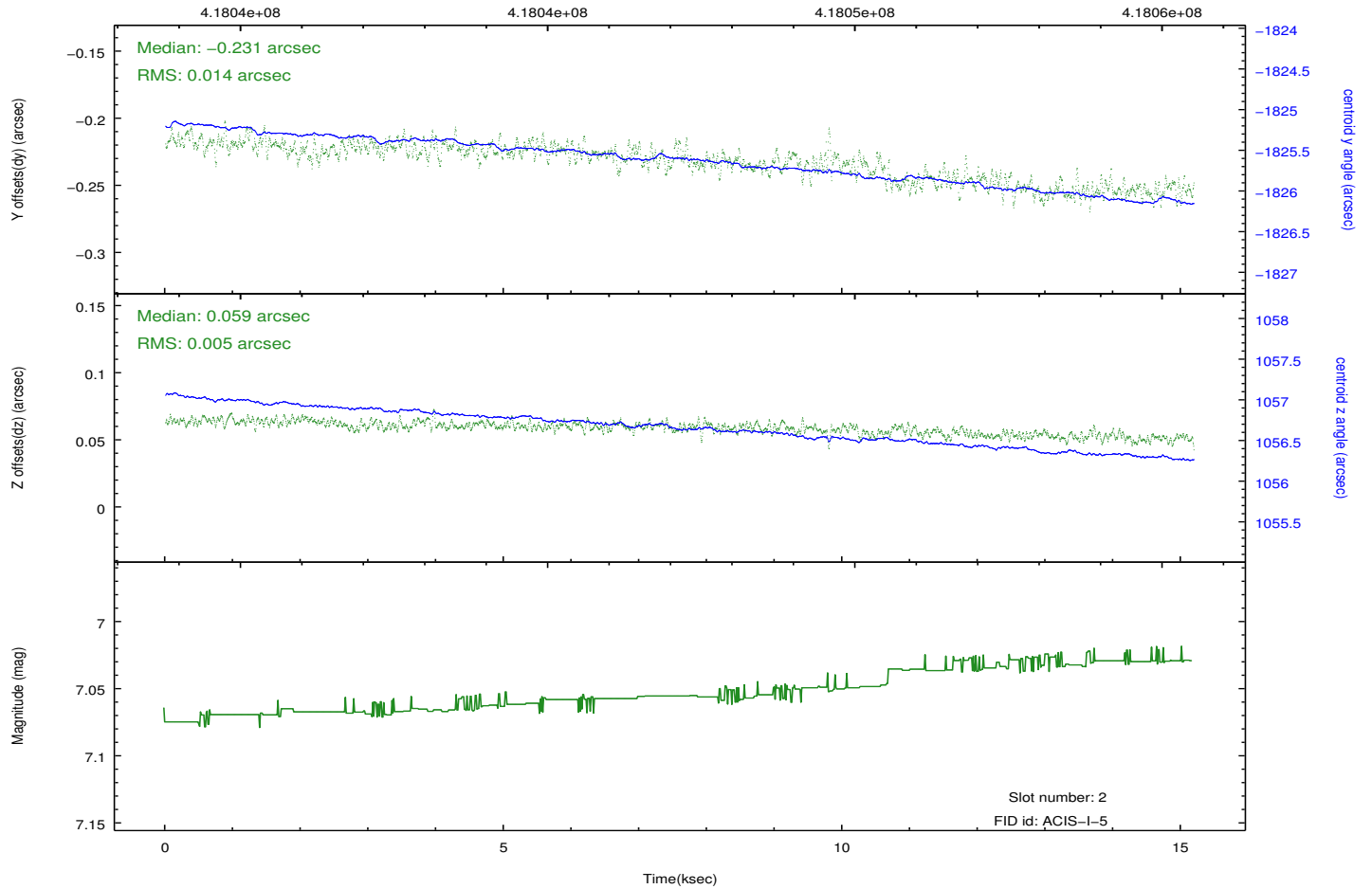
Time (s)



2.5.3 Slot 2



Time (s)



A Summary

A.1 Status

V&V Scientist	Jen Lauer
V&V Date (YYYY-MM-DD)	2012.02.09
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	14.755185733855

A.2 Comments

The data for this observation have been processed using the 'EDSER' sub-pixel event-repositioning algorithm of Li et al. (2004, ApJ, 610, 1204). Small-scale features should become sharper for sources near the aim point. The improvement will be less noticeable for off-axis sources where the size of the point-spread function is comparable to or larger than the size of an ACIS pixel. To take full advantage of the improvement, images should be binned on spatial scales smaller than the size of an ACIS pixel. Note that, at present, the point-spread function has not been calibrated for data to which the EDSEr algorithm has been applied. If dither was disabled for the observation, then the algorithm can introduce artificial aliasing effects on spatial scales smaller than a pixel. If you would prefer to use no sub-pixel adjustment or to apply a coordinate randomization, then use `acis_process_events` to reprocess the data with the parameter `pix_adj=NONE` or `RANDOMIZE`, respectively.

=====

Roll preference met.