

V&V Reference Report

L2 ASCDS Version : 8.4.3

Observation 12430 - L2 Version 2
Chandra X-Ray Center

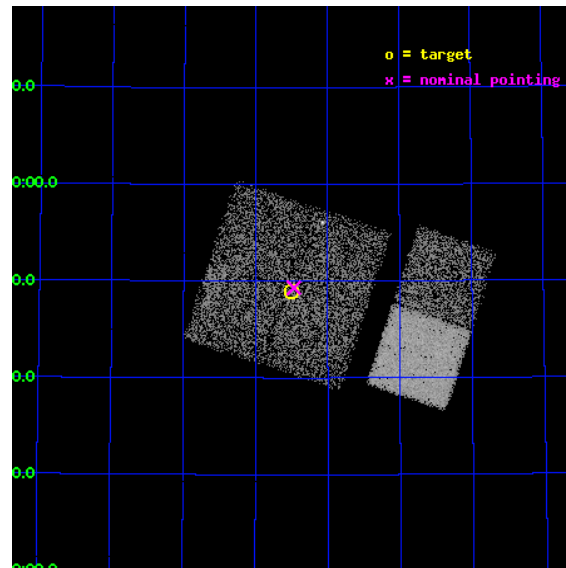
L2 Processing Date : Feb 10 2012

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1 Front

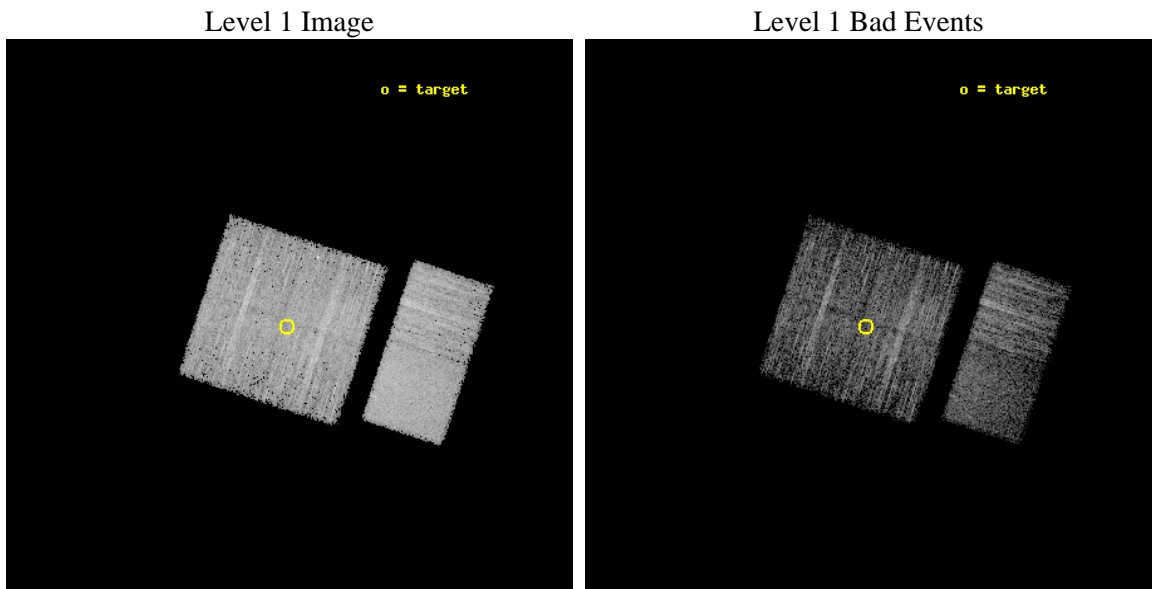
seq_num	401171	Sequence number
obs_id	12430	Observation id
title	The Nature of INTEGRAL Sources in the Galactic Plane	Proposal titl
observer	Dr. John Tomsick	Principal investigator
object	IGR J21565+5948	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	329.125833	Observer's specified target RA [deg]
dec_targ	59.815	Observer's specified target Dec [deg]
ra_nom	329.11702122373	Nominal RA [deg]
dec_nom	59.82191962297	Nominal Dec [deg]
roll_nom	108.26342668608	Nominal Roll [deg]
revision	2	Processing version of data
ontime	5055.9999812245	Sum of GTIs [s]
livetime	4991.9778651046	Livetime [s]
ontime0	5055.9999812245	Sum of GTIs [s]
ontime1	5055.9999812245	Sum of GTIs [s]
ontime2	5055.9999812245	Sum of GTIs [s]
ontime3	5055.9999812245	Sum of GTIs [s]
ontime6	5055.9999812245	Sum of GTIs [s]
ontime7	5055.9999812245	Sum of GTIs [s]
l2events	33157	Number of level 2 events



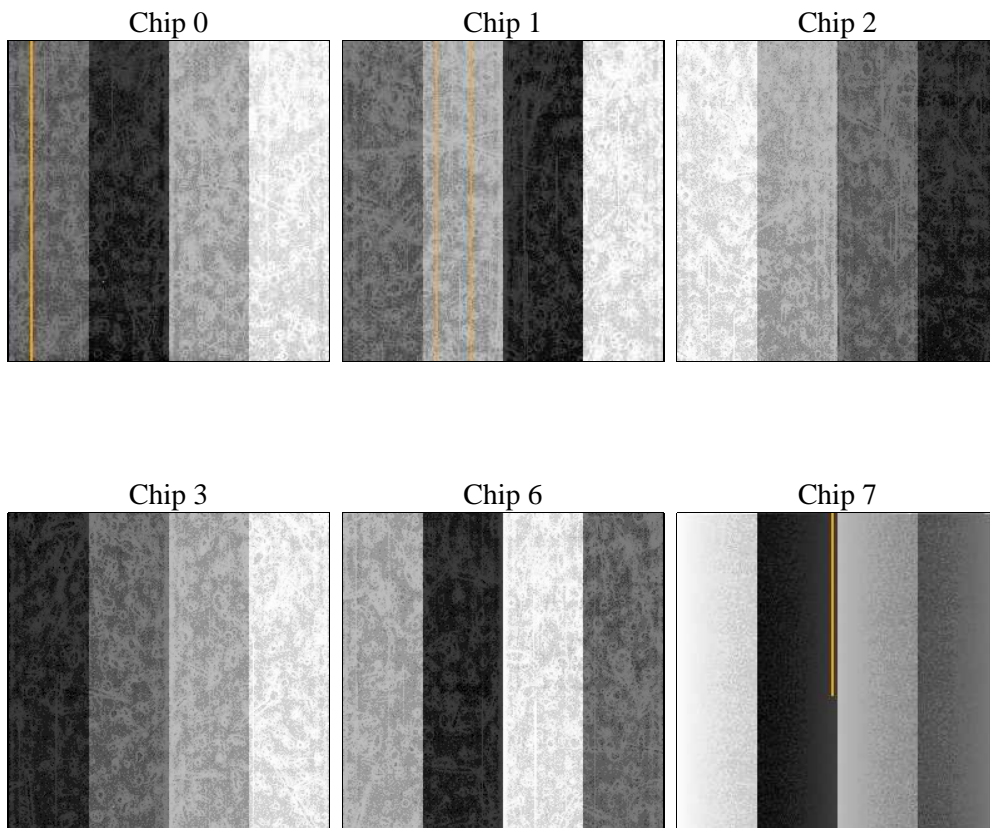
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	5000.000000	[s] Scheduled observation exposure time
ascdsver	8.4.3	Processing system revision	ontime	5055.9999812245	Sum of GTIs [s]
caldsver	4.4.7	 	ontime0	5055.9999812245	Sum of GTIs [s]
date	2012-02-11T02:43:46	Date and time of file creation	ontime1	5055.9999812245	Sum of GTIs [s]
revision	2	Processing version of data	ontime2	5055.9999812245	Sum of GTIs [s]
			ontime3	5055.9999812245	Sum of GTIs [s]
			ontime6	5055.9999812245	Sum of GTIs [s]
			ontime7	5055.9999812245	Sum of GTIs [s]
			l1events	198237	Number of level 1 events

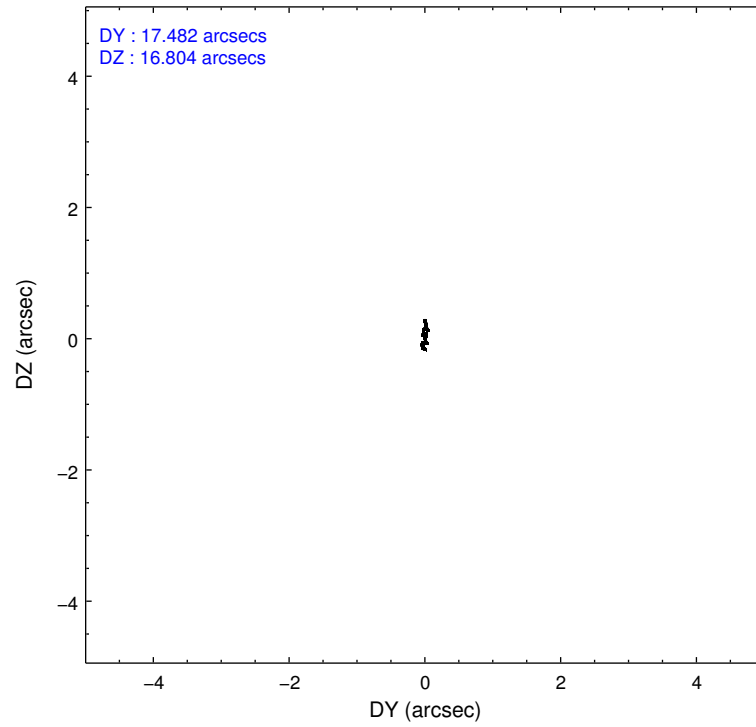
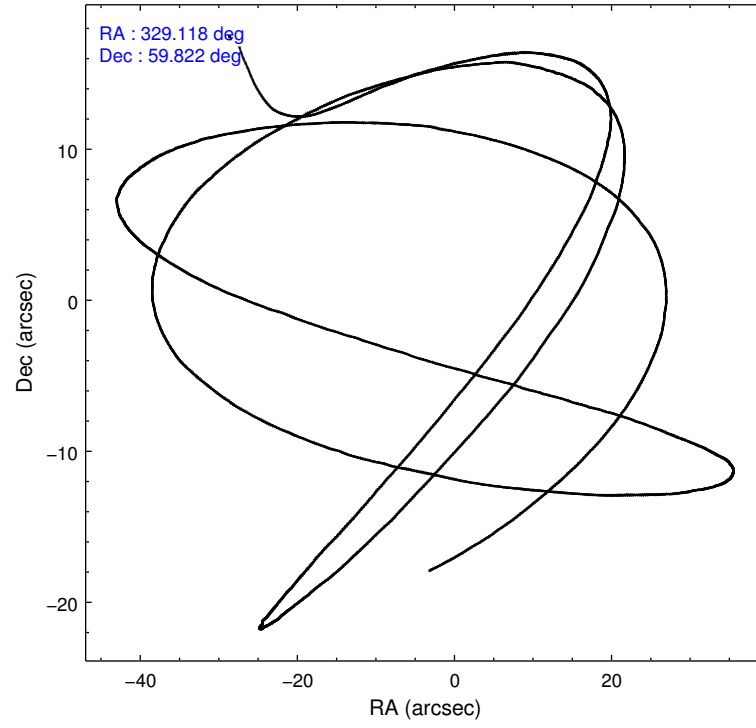
2.1.4 Events

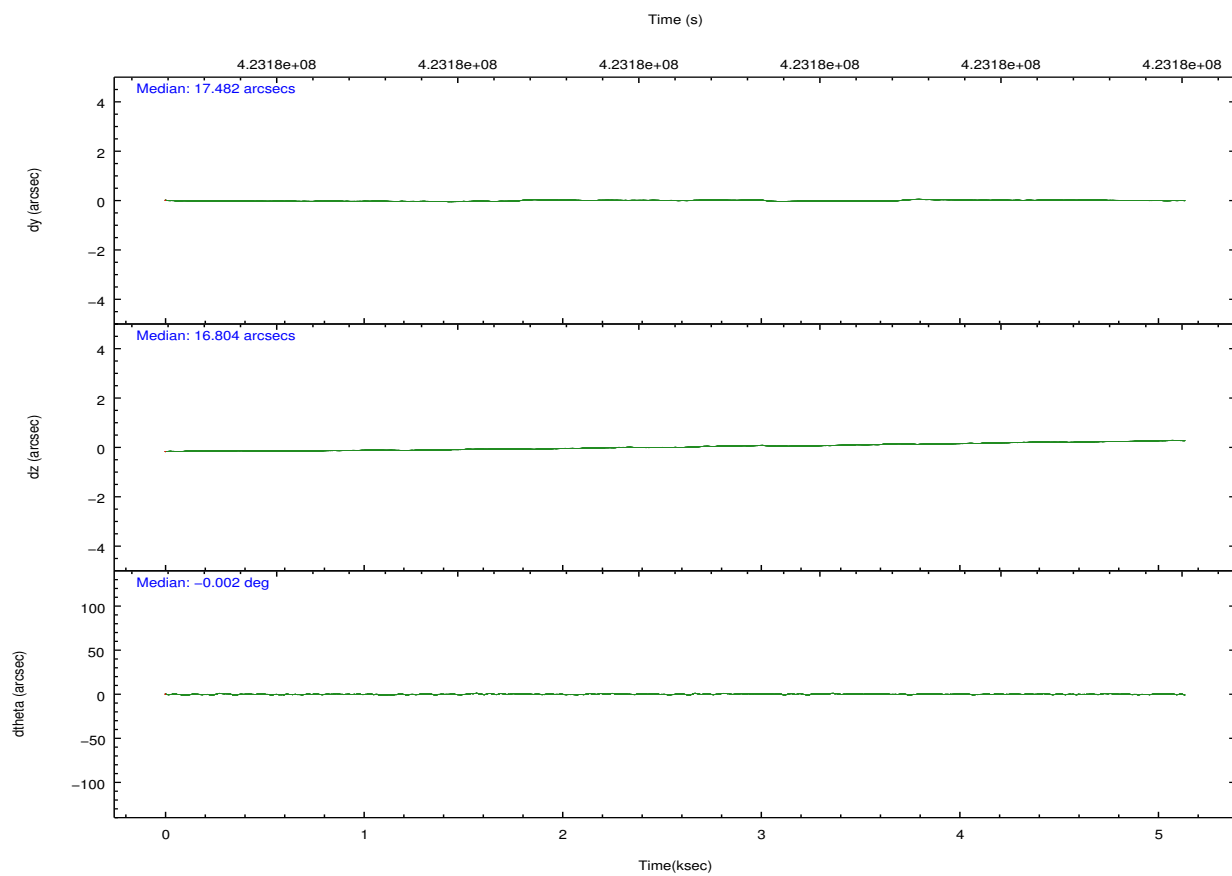
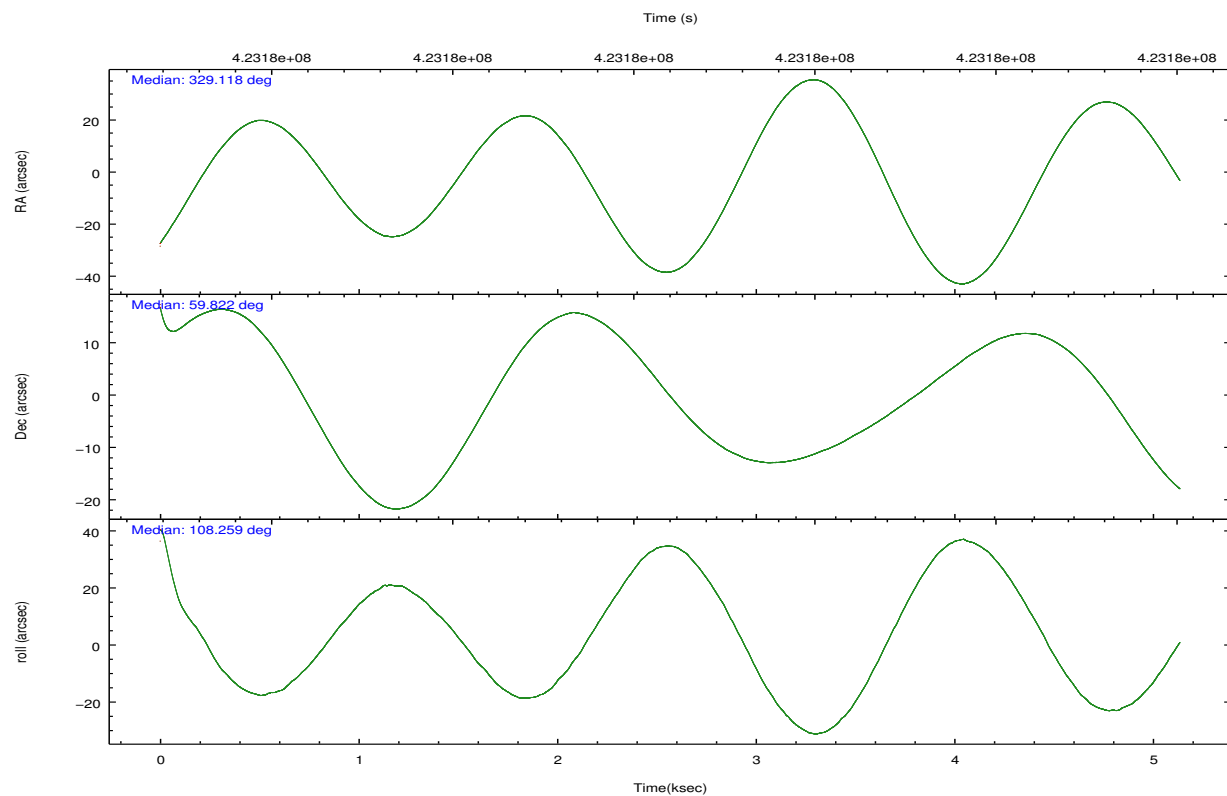
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6	ccd 7		ccd 0	ccd 1	ccd 2	ccd 3	ccd 6	ccd 7
level 1 events	29002	30087	33529	30562	34567	40490	grade 0 events	1232	1541	1526	1191	1332	1601
rejected events	25527	26006	29633	27191	30806	22395		4%	5%	4%	3%	3%	3%
rejected %	88%	86%	88%	88%	89%	55%	grade 1 events	10	19	28	16	14	45
								0%	0%	0%	0%	0%	0%
							grade 2 events	817	989	946	769	866	3634
								2%	3%	2%	2%	2%	8%
							grade 3 events	359	378	365	359	382	1645
								1%	1%	1%	1%	1%	4%
							grade 4 events	342	387	373	362	393	1585
								1%	1%	1%	1%	1%	3%
							grade 5 events	1328	1488	1304	1436	1564	4400
								4%	4%	3%	4%	4%	10%
							grade 6 events	726	789	693	693	796	9658
								2%	2%	2%	2%	2%	23%
							grade 7 events	24188	24496	28294	25736	29220	17922
								83%	81%	84%	84%	84%	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	FAINT	FAINT	CCD I0 on	Y	Y
Observation mode	POINTING	POINTING	CCD I1 on	Y	Y
[deg] Pointing RA	329.157430	329.1170212237251	CCD I2 on	Y	Y
[deg] Pointing Dec	59.803345	59.82191962297032	CCD I3 on	Y	Y
[deg] Pointing Roll	108.019770	108.2634266860797	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	O1	Y
[mm] SIM translation stage pos	-233.592463	-233.5874344608287	CCD S3 on	O2	Y
[mm] SIM translation stage offset	0	-0.005018542100998502	CCD S4 on	N	N
[s] Observation start time (MET)	423176773.184000	423175631.06851	CCD S5 on	N	N
Observation start date	2011-05-30T21:05:07	2011-05-30T20:47:11	Number of optional ACIS chips dropped	0	0
[s] Observation end time (MET)	423181773.184000	423182493.95637	On-chip summing requested	N	N
Observation end date	2011-05-30T22:28:27	2011-05-30T22:41:33	Subarray requested	NONE	NONE
Read mode	TIMED	TIMED	Alternating exposures requested	N	N
			[s] Primary exposure time	0.000000	3.2

2.3 Aspect



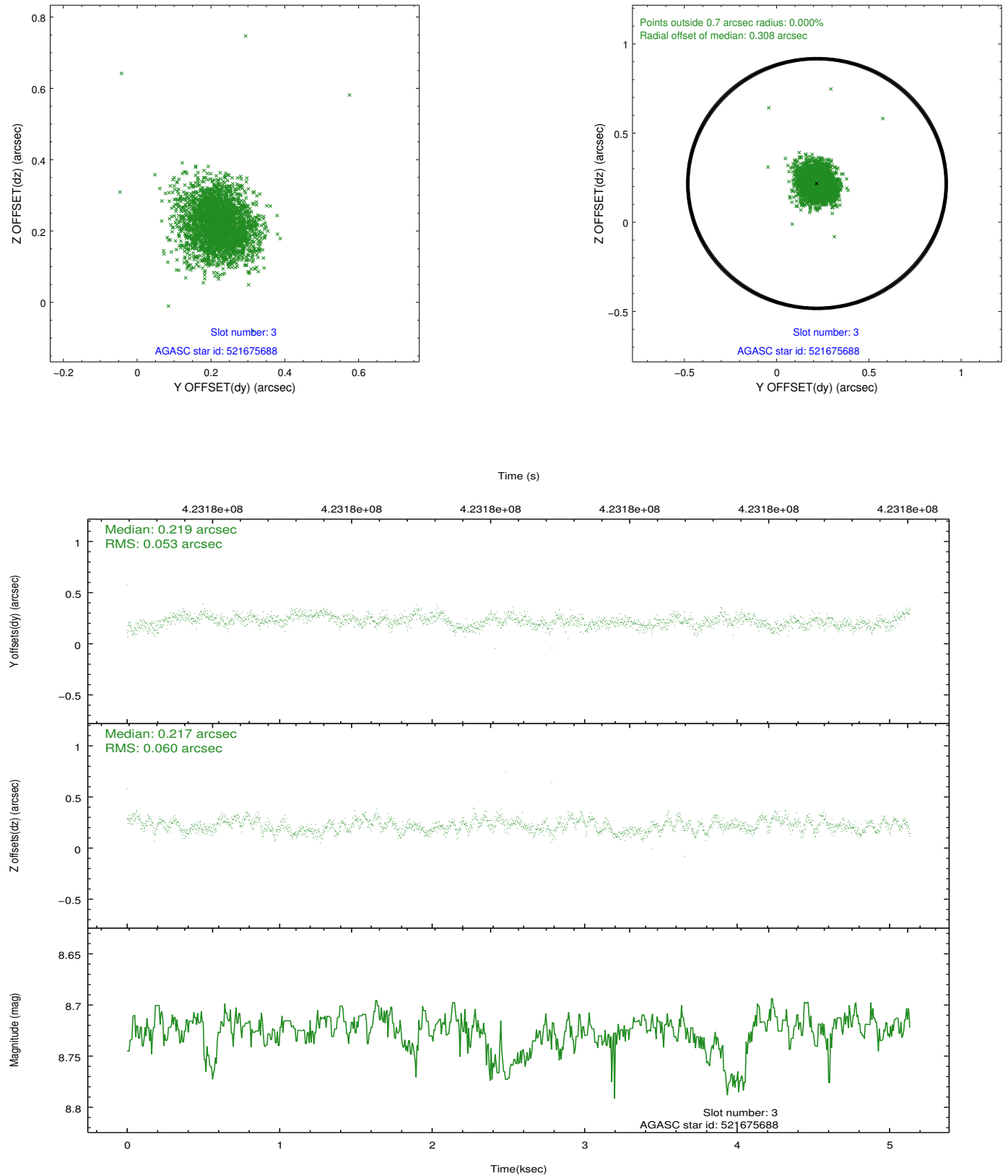


Slot Statistics

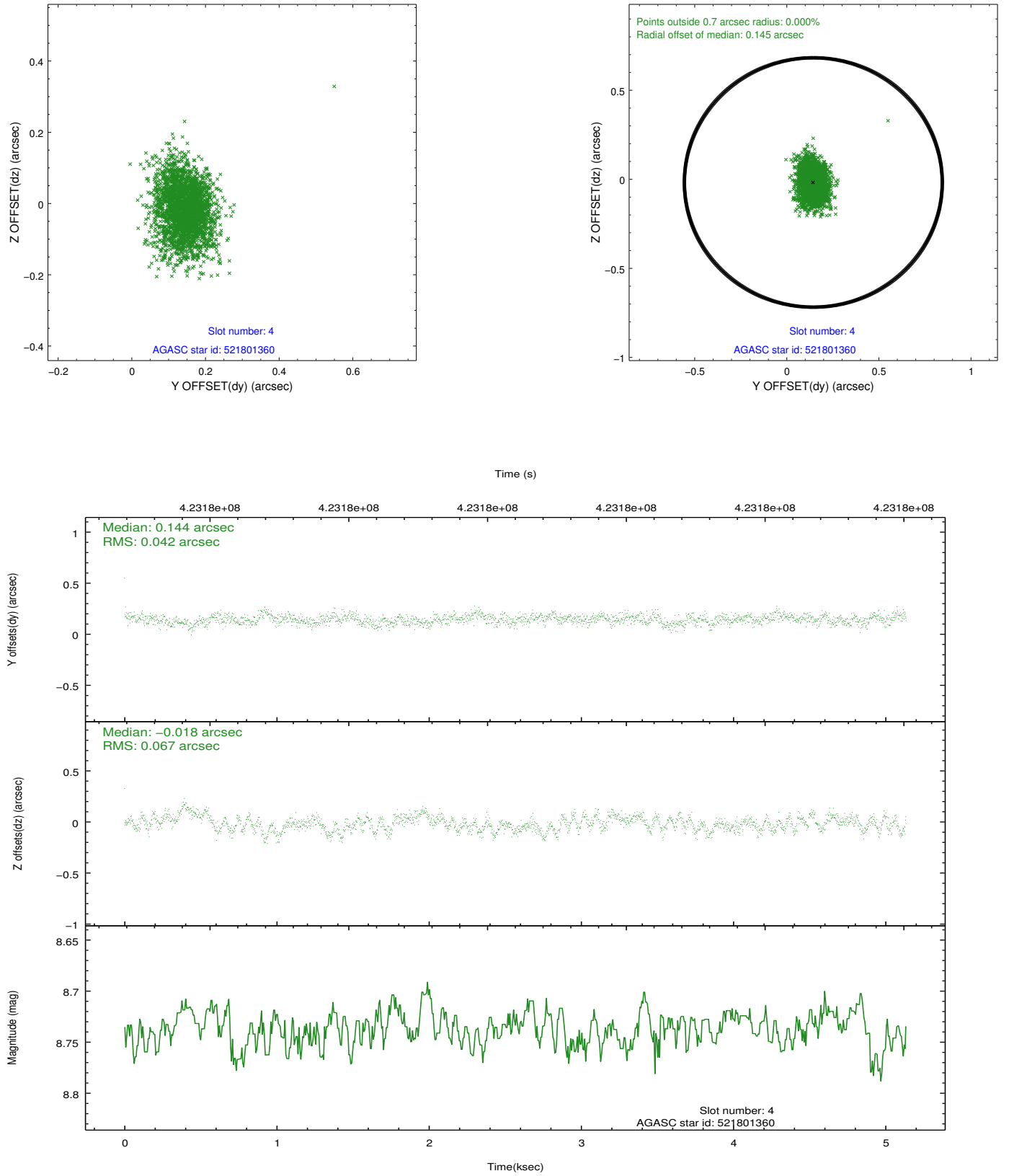
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-I-1	7.00	1253	0.062	-0.032	0.007	0.012	0.000000	0.000000	921.97	-840.51
1	FID	ACIS-I-5	6.98	1253	-0.228	0.059	0.006	0.010	0.000000	0.000000	-1825.77	1056.49
2	FID	ACIS-I-6	7.01	1253	0.075	0.043	0.008	0.014	0.000000	0.000000	386.25	1702.30
3	GUIDE	521675688	8.72	2503	0.219	0.217	0.084	0.134	329.885937	59.377443	-1864.73	-796.80
4	GUIDE	521801360	8.74	2504	0.144	-0.018	0.082	0.139	330.471554	59.545273	-1603.82	-1999.07
5	GUIDE	558635592	7.86	2505	-0.010	0.101	0.071	0.114	329.831949	60.297665	1324.73	-1695.75
6	GUIDE	558636992	8.14	2504	-0.067	-0.152	0.079	0.127	327.538801	60.180015	2219.24	2325.68
7	GUIDE	558637984	7.37	2505	-0.289	-0.147	0.065	0.106	328.103882	60.329891	2398.53	1196.52

2.4 Star Slots

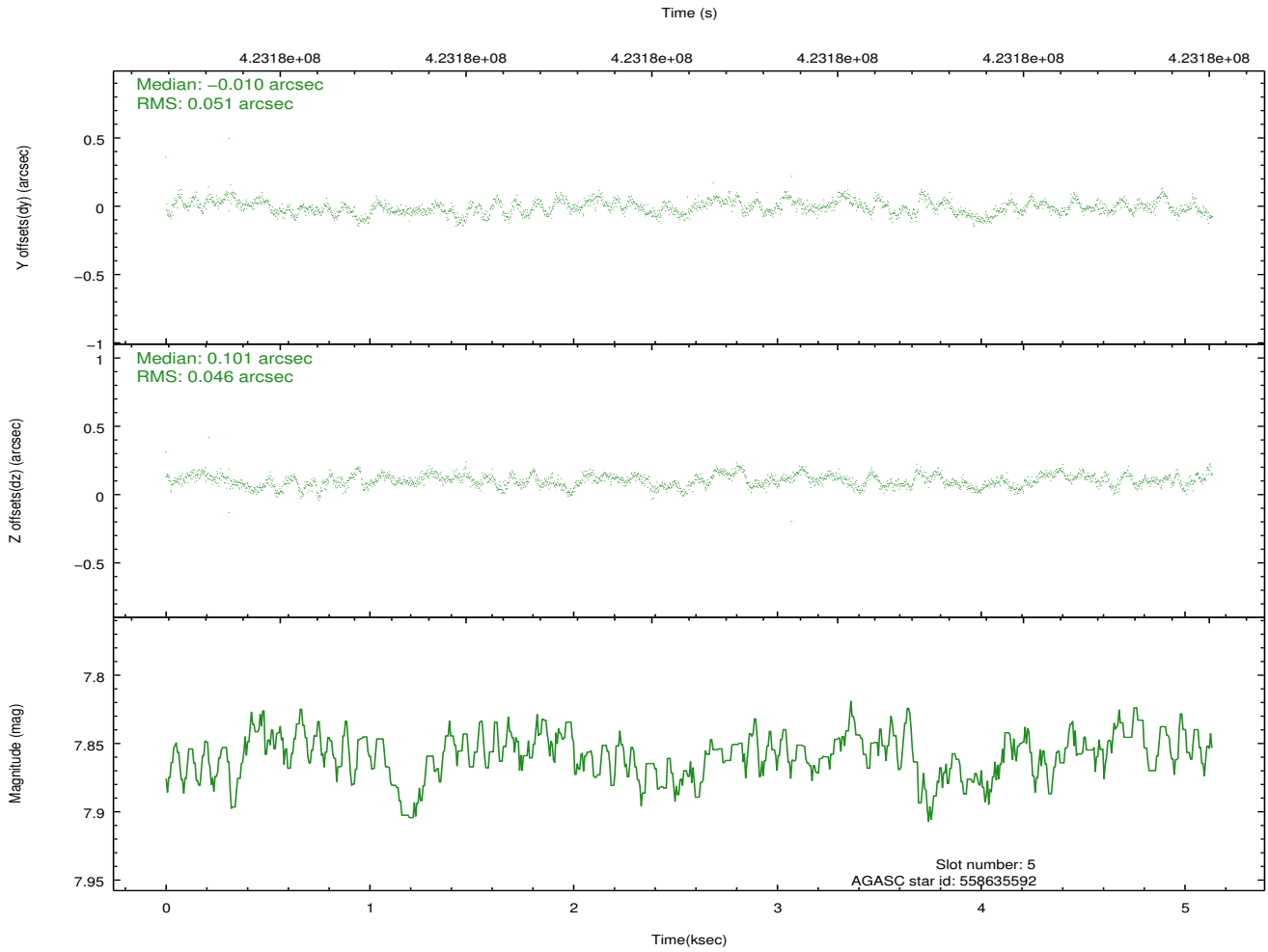
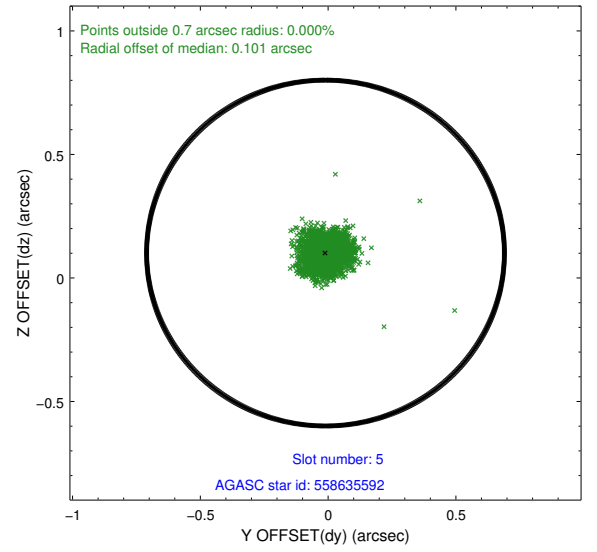
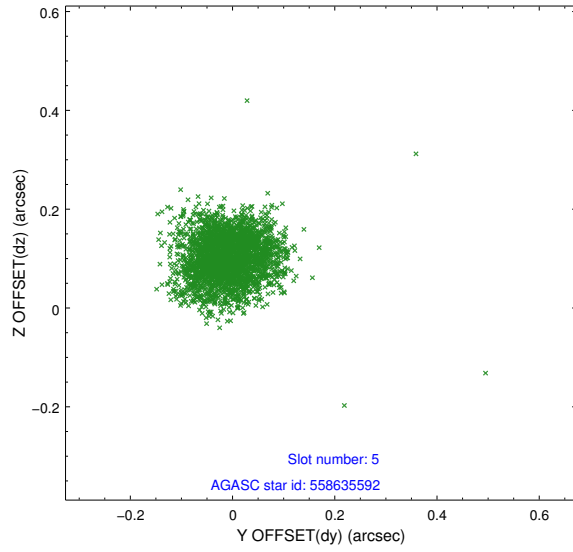
2.4.1 Slot 3



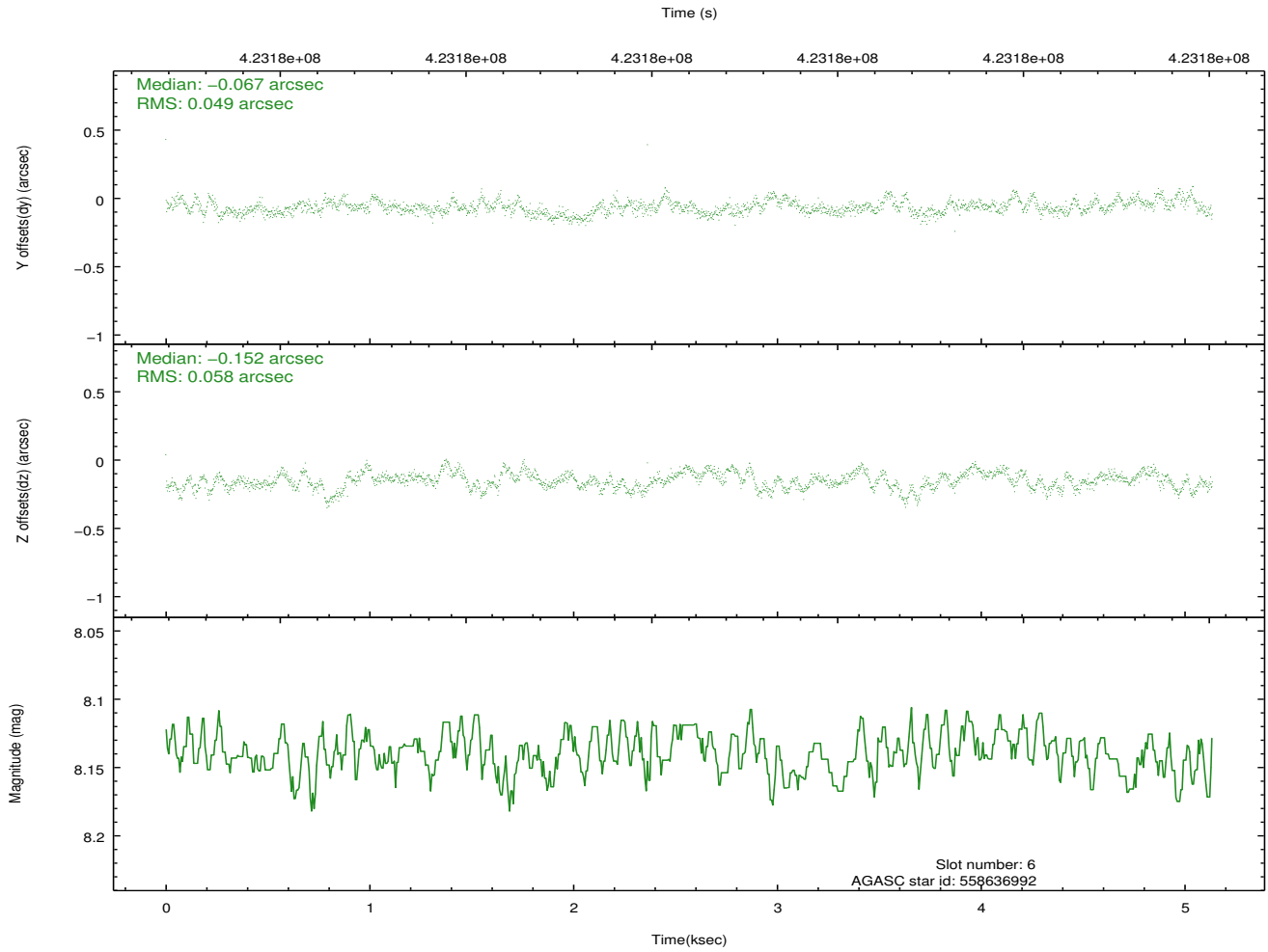
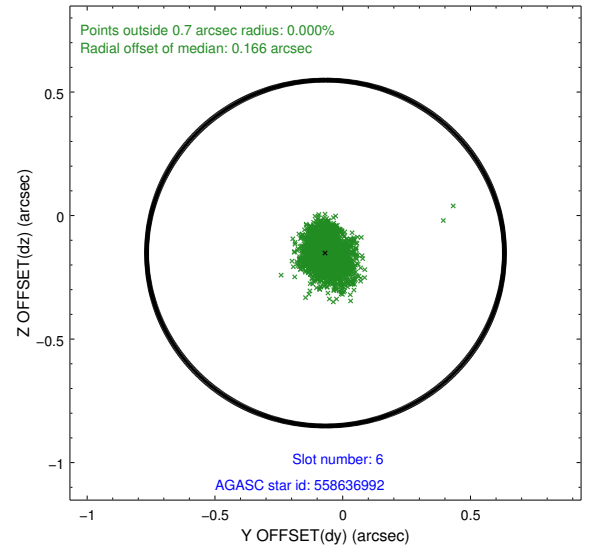
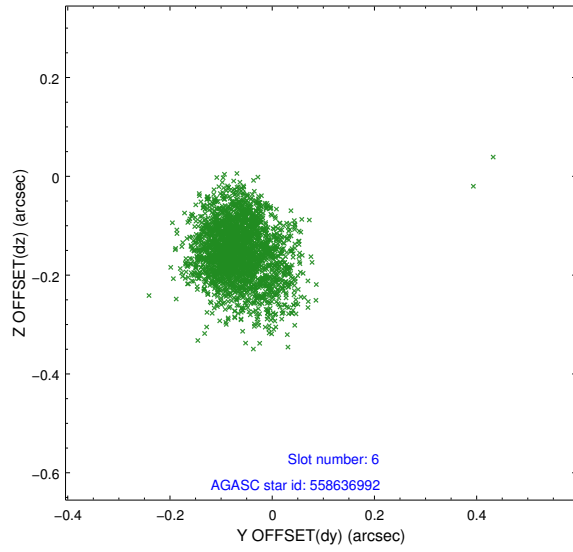
2.4.2 Slot 4



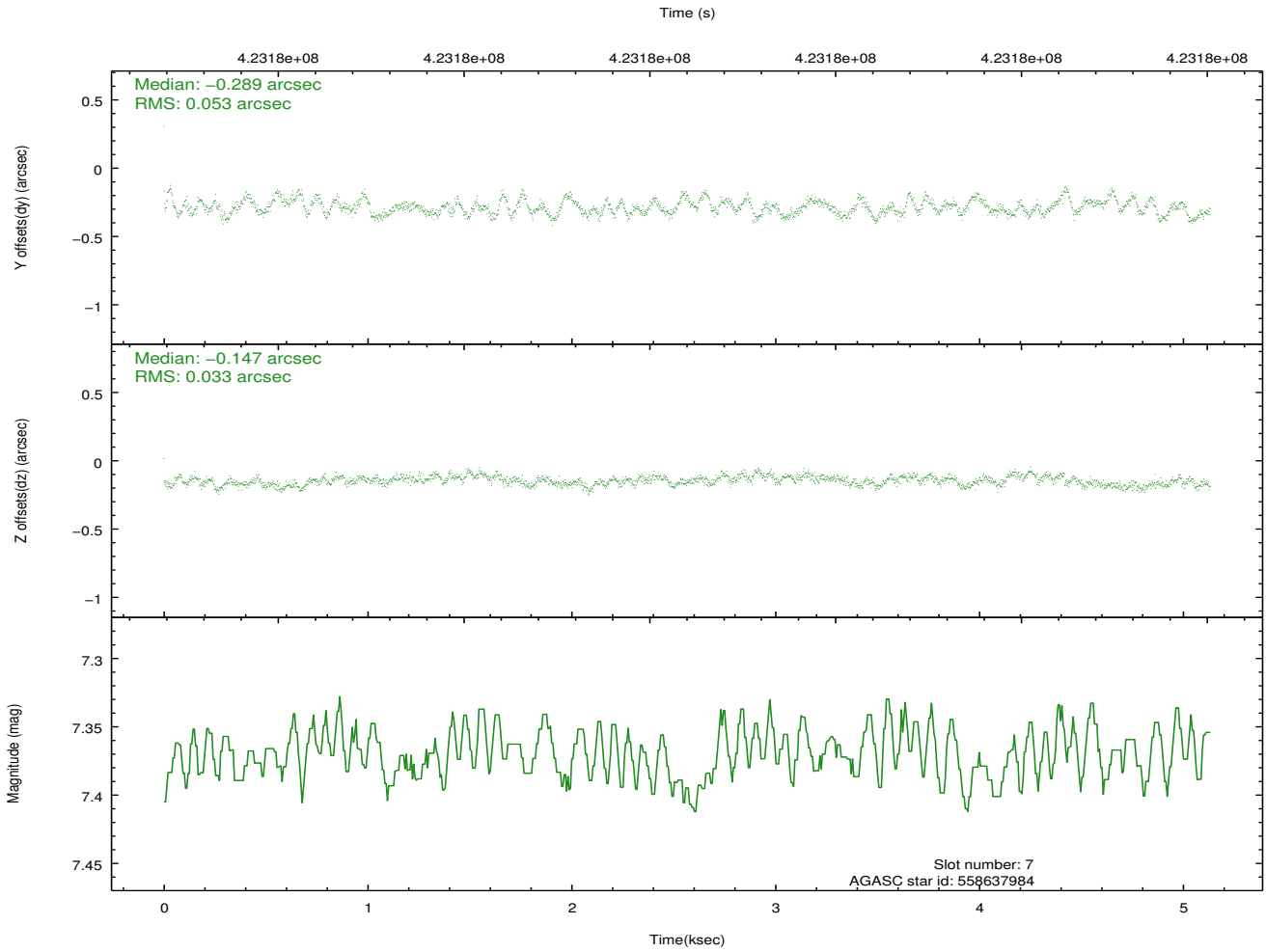
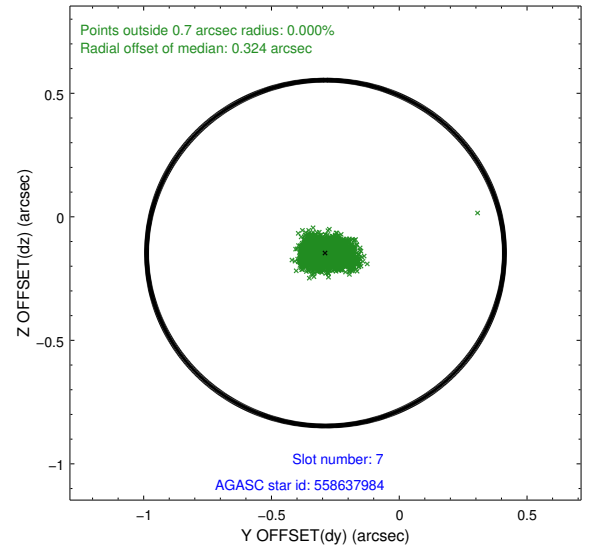
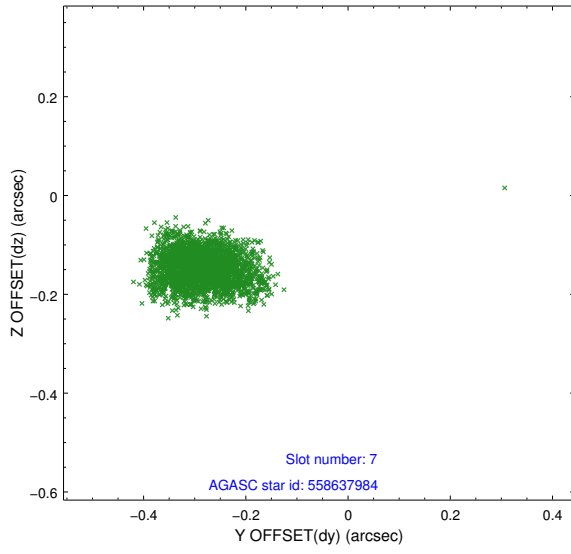
2.4.3 Slot 5



2.4.4 Slot 6

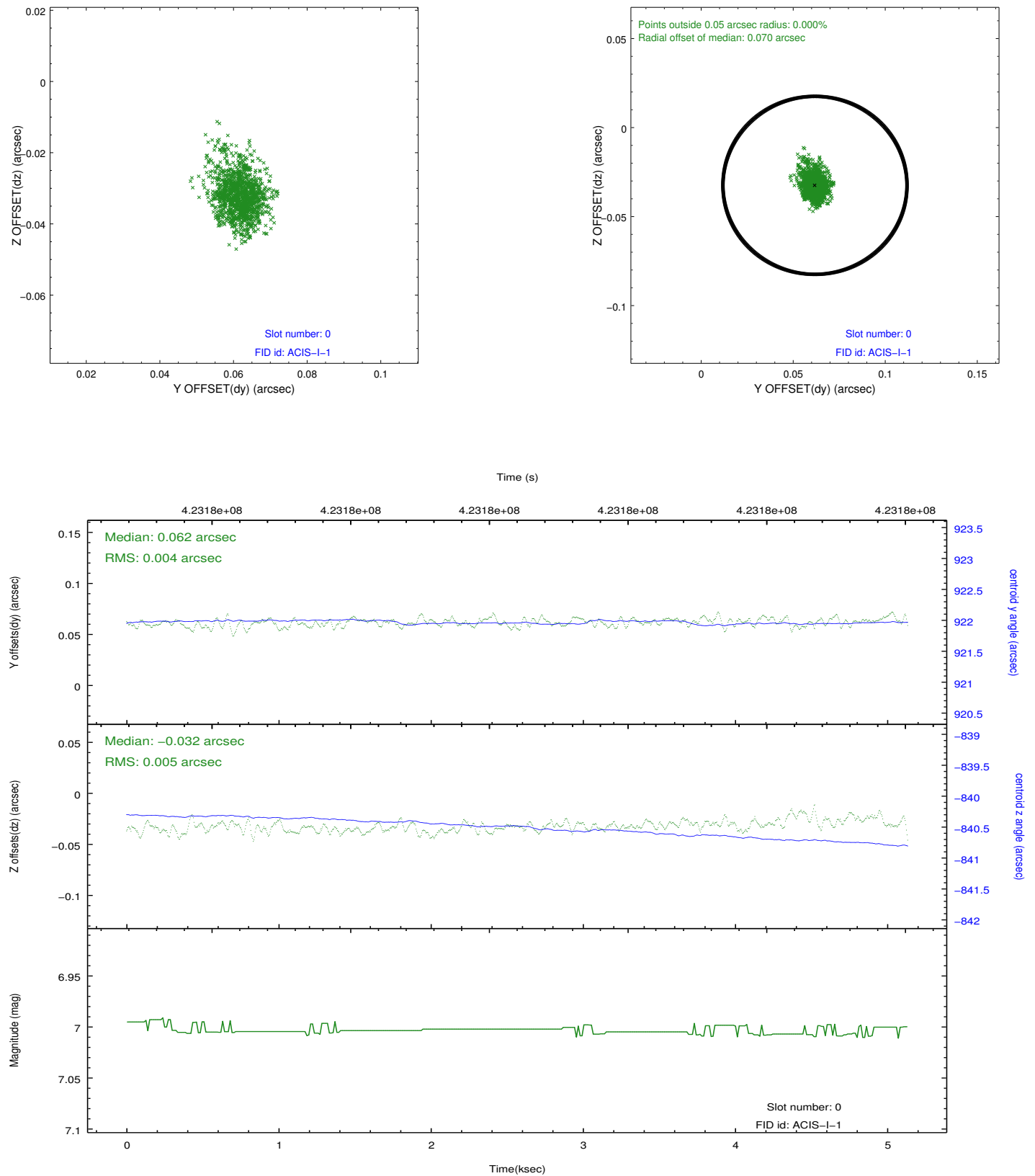


2.4.5 Slot 7

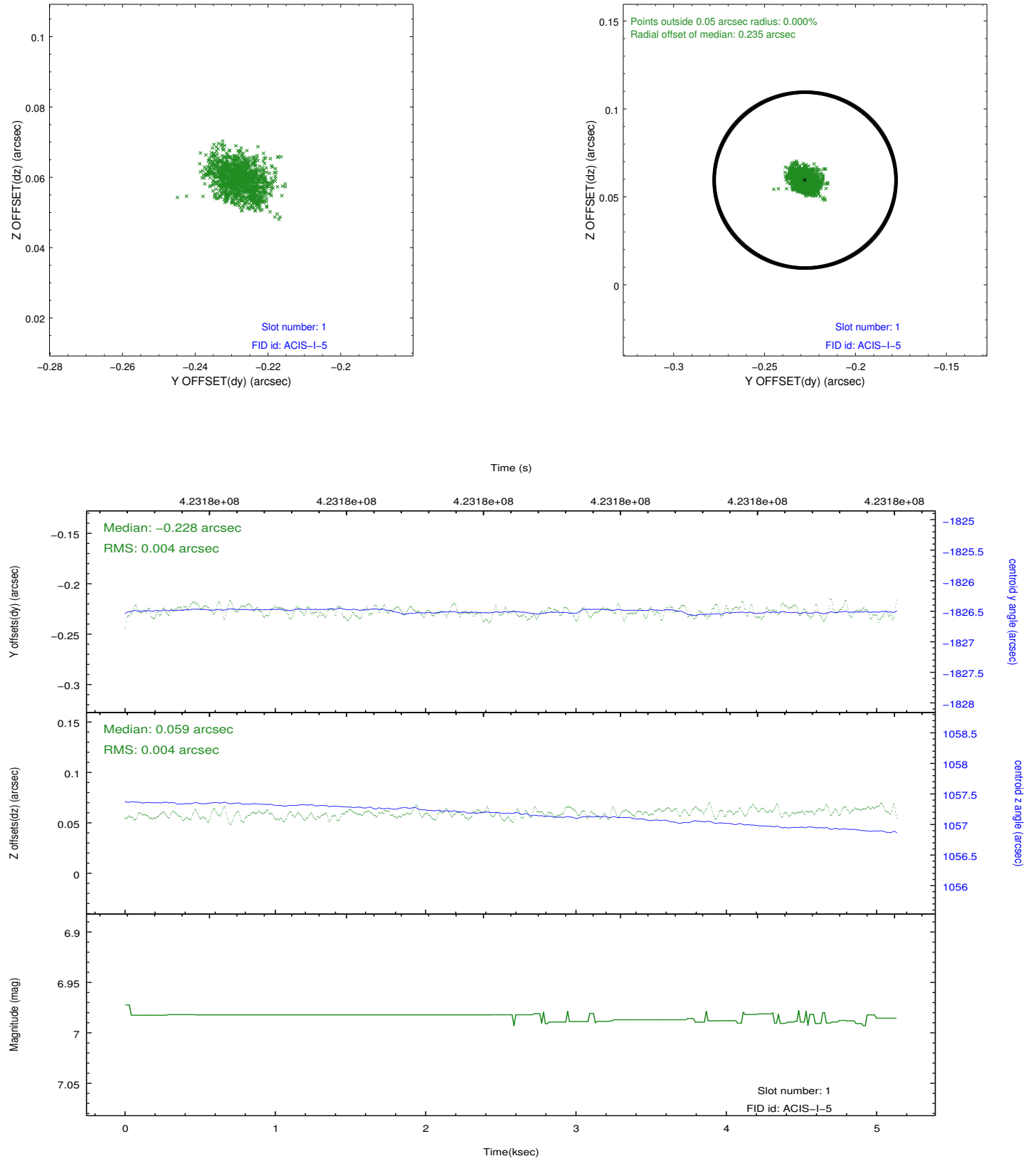


2.5 FID Slots

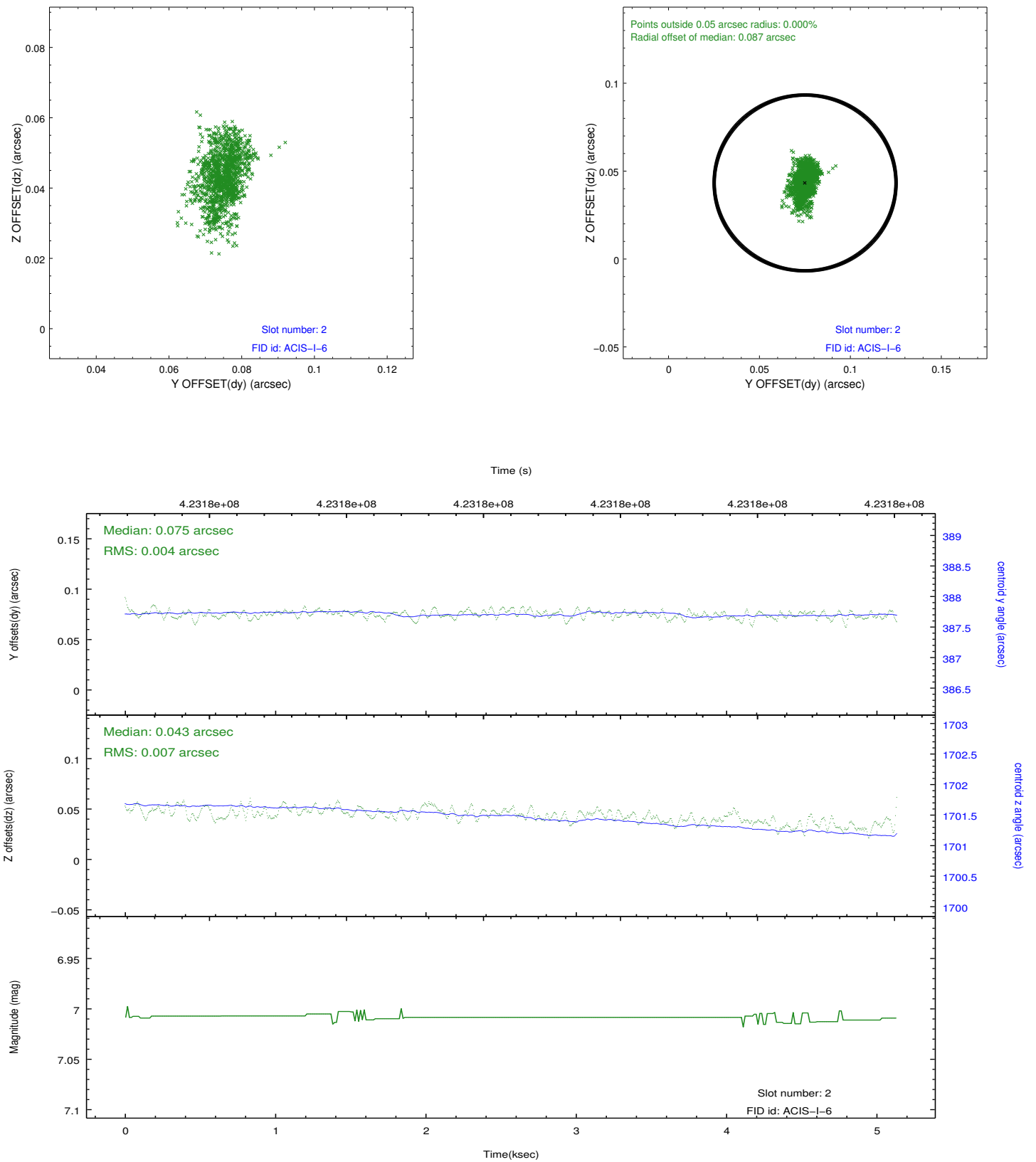
2.5.1 Slot 0



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)	2012.02.13
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	5.0559999812245

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.