

V&V Reference Report

L2 ASCDS Version : 10

Observation 15116 - L2 Version 2
Chandra X-Ray Center

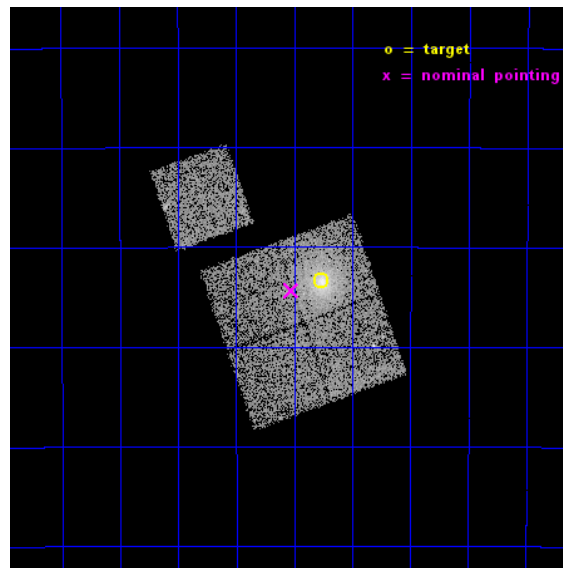
L2 Processing Date : Dec 6 2014

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1 Front

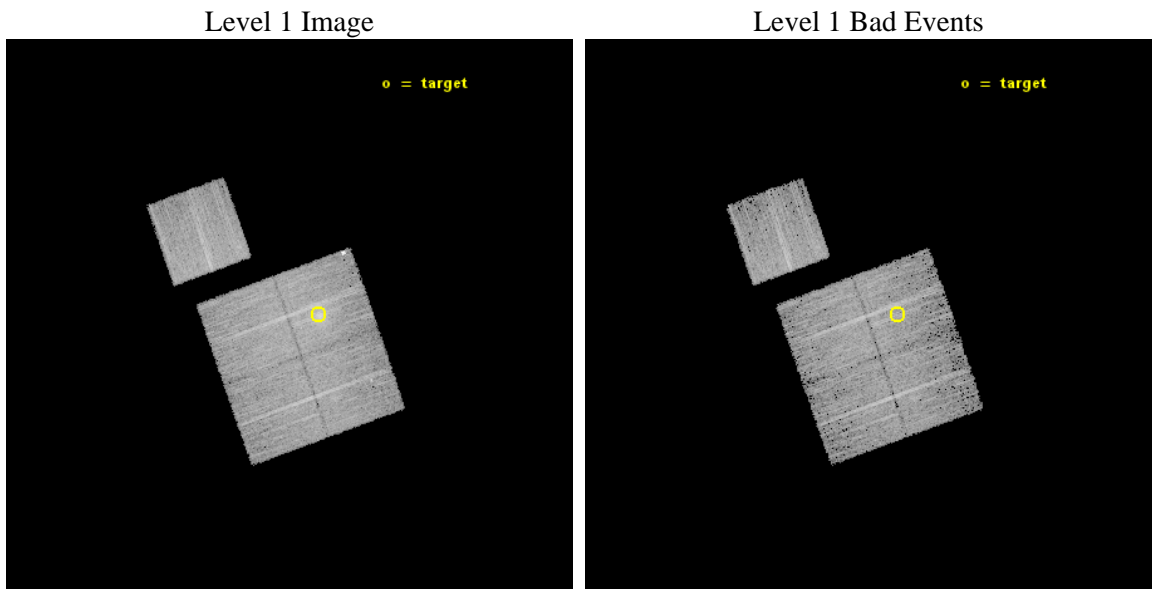
seq_num	801245	Sequence number
obs_id	15116	Observation id
title	A Chandra-Planck Legacy Program for Massive Clusters of Galaxies	P
observer	Dr. Christine Jones	Principal investigator
object	G008.44-56.35	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	334.442083	Observer's specified target RA [deg]
dec_targ	-35.722833	Observer's specified target Dec [deg]
ra_nom	334.50610461811	Nominal RA [deg]
dec_nom	-35.739027094794	Nominal Dec [deg]
roll_nom	340.36677587431	Nominal Roll [deg]
revision	2	Processing version of data
ontime	12083.635710537	Sum of GTIs [s]
livetime	11925.754114136	Livetime [s]
ontime0	12083.512590528	Sum of GTIs [s]
ontime1	12083.553630531	Sum of GTIs [s]
ontime2	12083.594670534	Sum of GTIs [s]
ontime3	12083.635710537	Sum of GTIs [s]
ontime6	12083.471550524	Sum of GTIs [s]
l2events	36605	Number of level 2 events



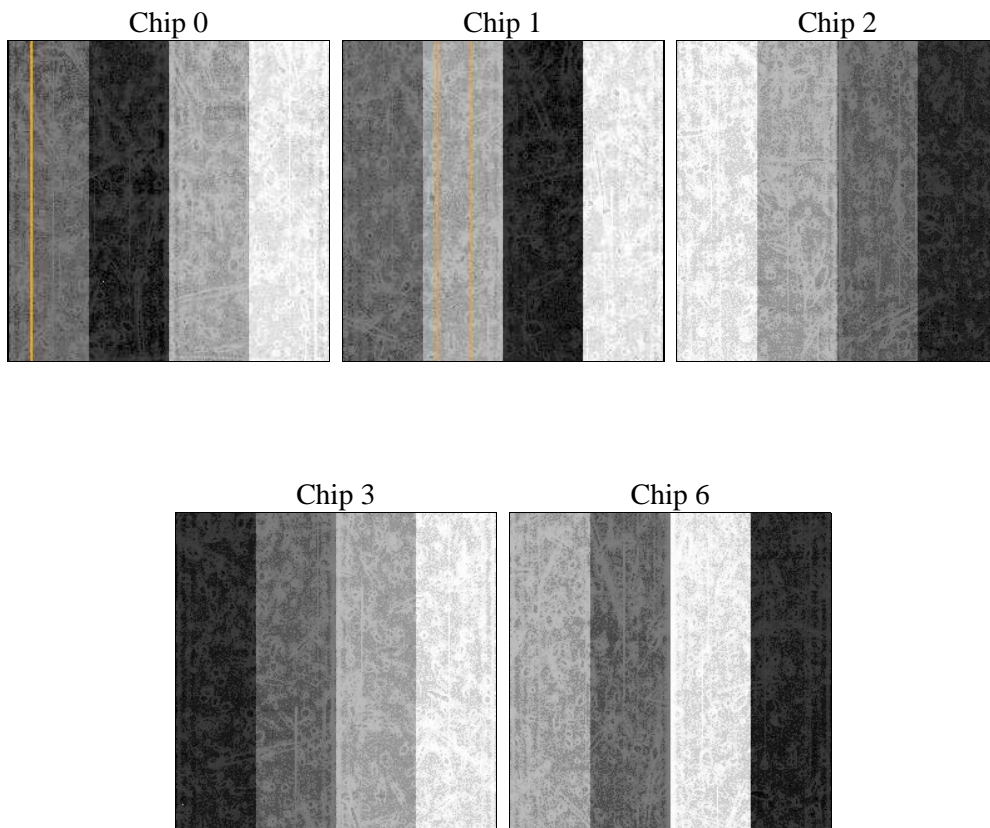
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	1	Obi number	sched_exp_time	12000.000000	[s] Scheduled observation exposure time
ascdsver	10.3.1	Processing system revision	ontime	12083.635710537	Sum of GTIs [s]
caldsver	4.6.4	 	ontime0	12083.512590528	Sum of GTIs [s]
date	2014-12-06T09:59:57	Date and time of file creation	ontime1	12083.553630531	Sum of GTIs [s]
revision	2	Processing version of data	ontime2	12083.594670534	Sum of GTIs [s]
			ontime3	12083.635710537	Sum of GTIs [s]
			ontime6	12083.471550524	Sum of GTIs [s]
			l1events	276420	Number of level 1 events

2.1.4 Events

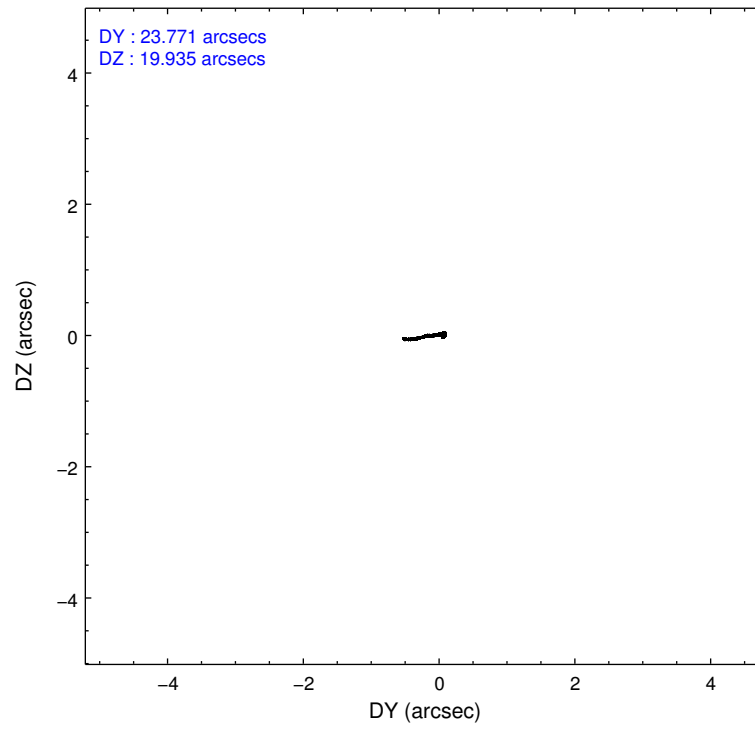
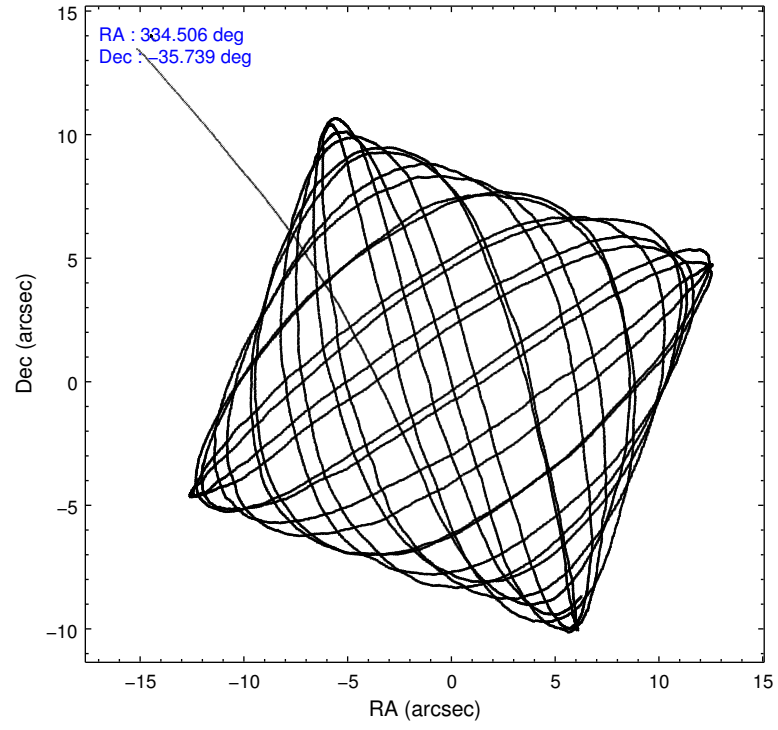
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6
level 1 events	50672	49110	57289	62766	56583
rejected events	43985	41495	50553	47280	49697
rejected %	86%	84%	88%	75%	87%

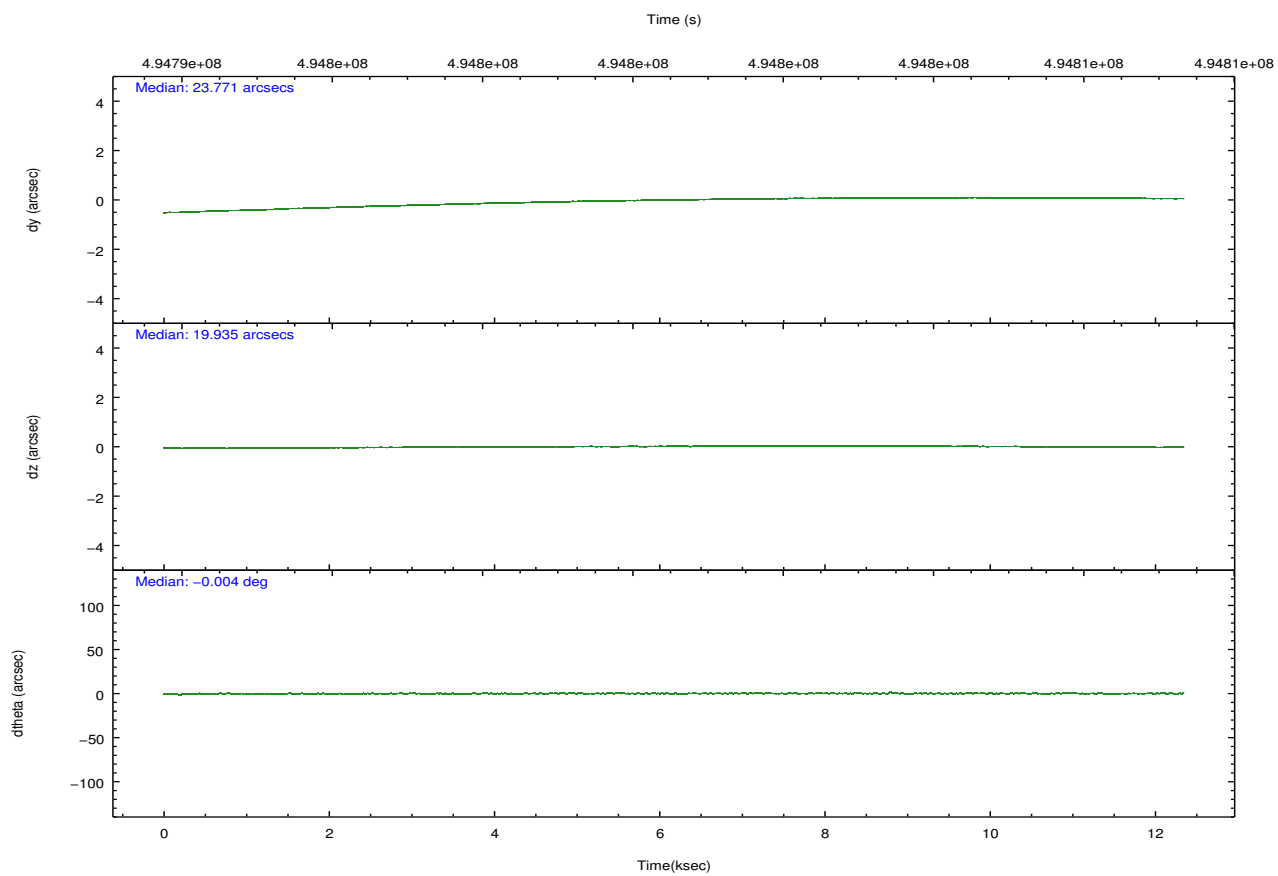
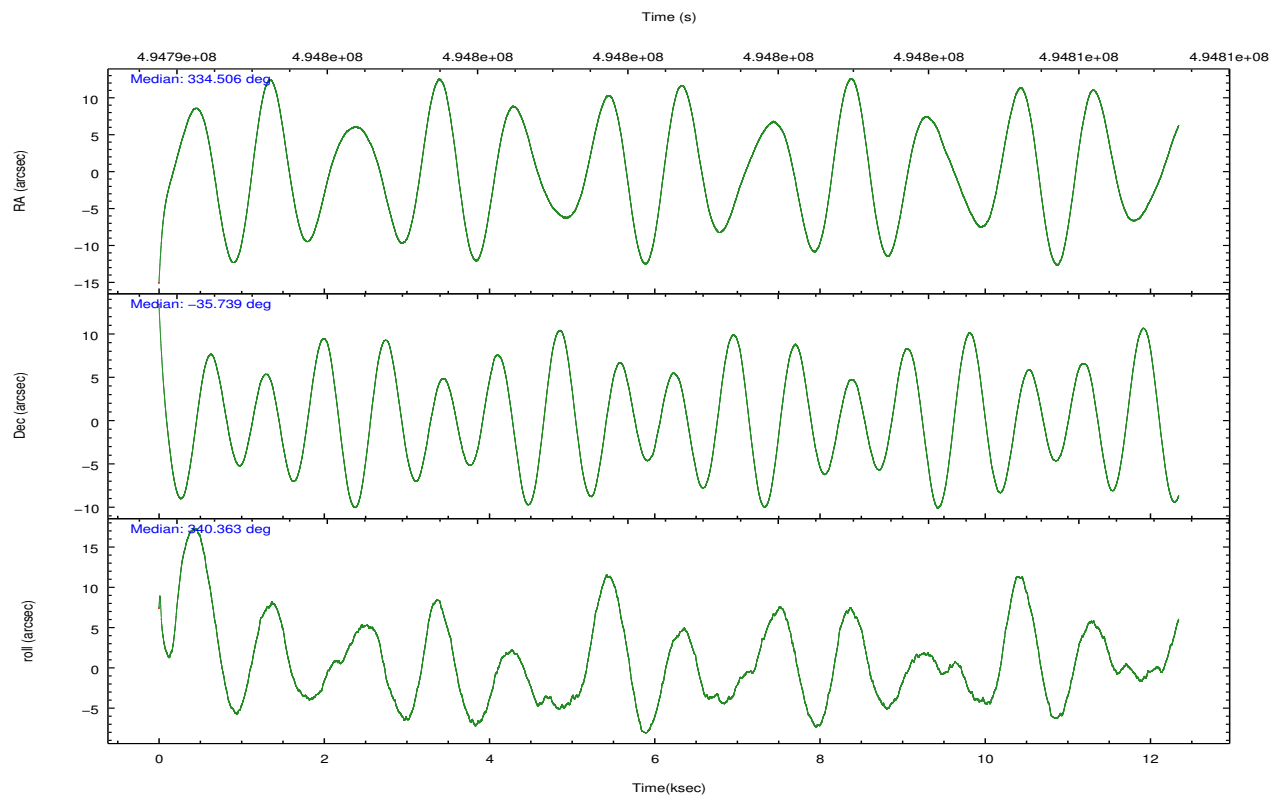
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6
grade 0 events	2293	2962	2596	9963	2365
	4%	6%	4%	15%	4%
grade 1 events	32	36	37	57	34
	0%	0%	0%	0%	0%
grade 2 events	1590	1691	1613	2236	1518
	3%	3%	2%	3%	2%
grade 3 events	735	710	665	902	688
	1%	1%	1%	1%	1%
grade 4 events	674	713	653	876	706
	1%	1%	1%	1%	1%
grade 5 events	2695	2822	2525	3130	2898
	5%	5%	4%	4%	5%
grade 6 events	1400	1543	1209	1516	1613
	2%	3%	2%	2%	2%
grade 7 events	41253	38633	47991	44086	46761
	81%	78%	83%	70%	82%

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	CCD I0 on	Y	Y
Observation mode	POINTING	POINTING	CCD I1 on	Y	Y
[deg] Pointing RA	334.472801	334.5061046181097	CCD I2 on	Y	Y
[deg] Pointing Dec	-35.744072	-35.7390270947936	CCD I3 on	Y	Y
[deg] Pointing Roll	340.138614	340.366775874308	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	-225.842463	-225.8433433320239	CCD S3 on	N	N
[mm] SIM translation stage offset	-7.75	-7.749109670905796	CCD S4 on	N	N
[s] Observation start time (MET)	494794710.184000	494793693.22692	CCD S5 on	N	N
Observation start date	2013-09-05T18:57:23	2013-09-05T18:41:33	Number of optional ACIS chips dropped	0	0
[s] Observation end time (MET)	494806710.184000	494807406.19017	On-chip summing requested	N	N
Observation end date	2013-09-05T22:17:23	2013-09-05T22:30:06	Subarray requested	NONE	NONE
Read mode	TIMED	TIMED	Alternating exposures requested	N	N
			[s] Primary exposure time	0.000000	3.1

2.3 Aspect



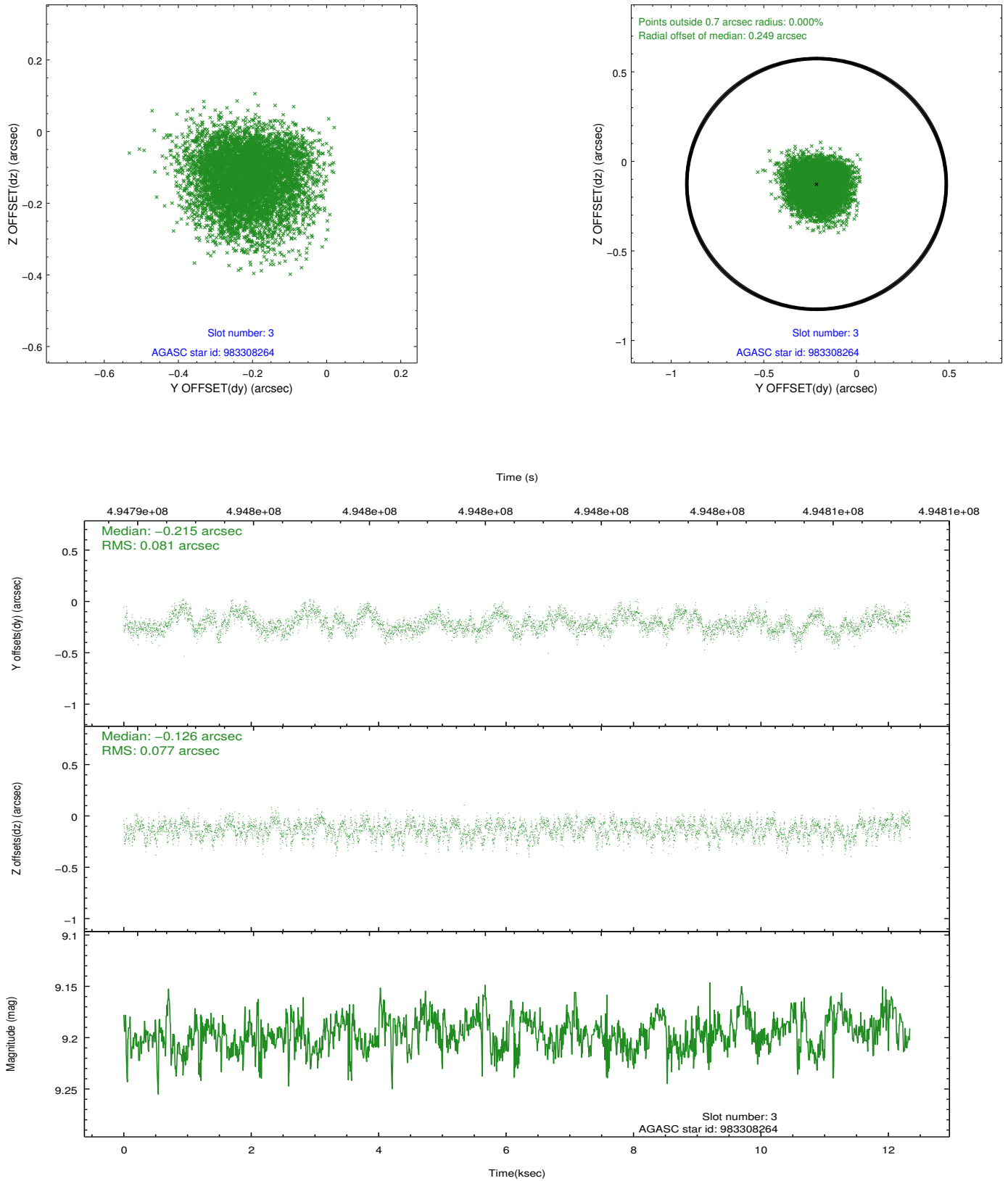


Slot Statistics

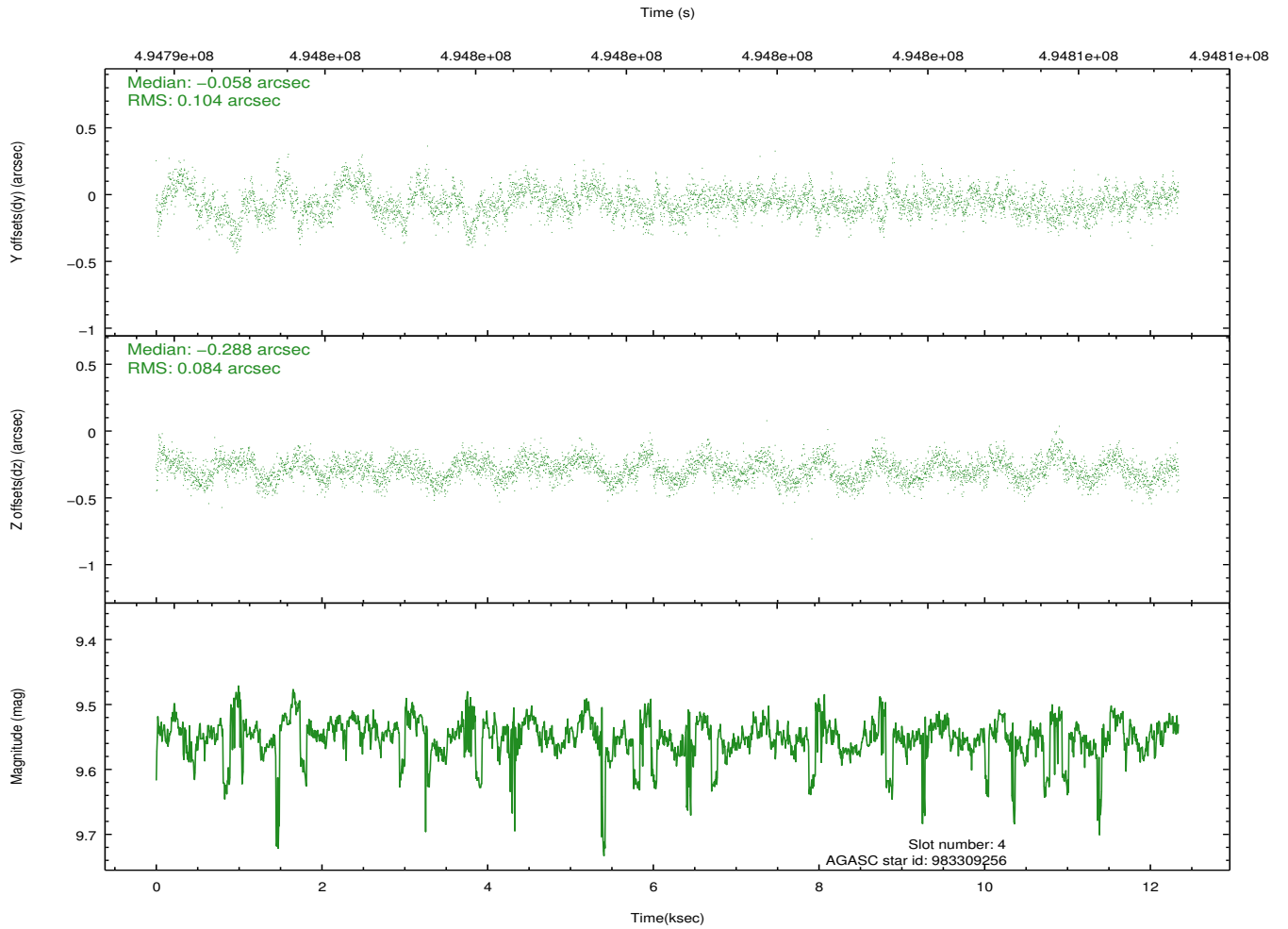
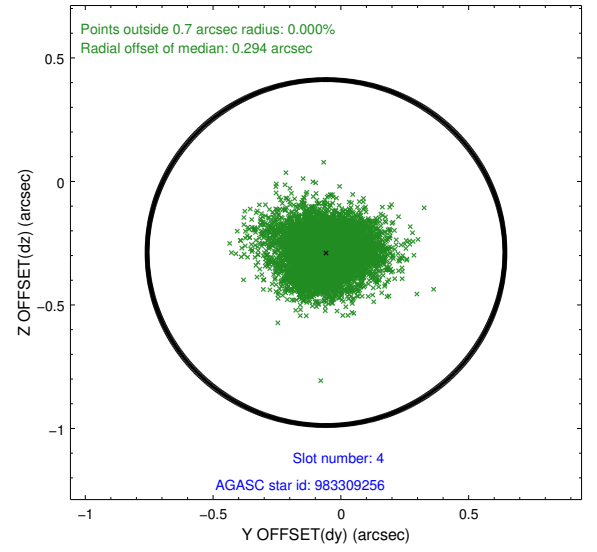
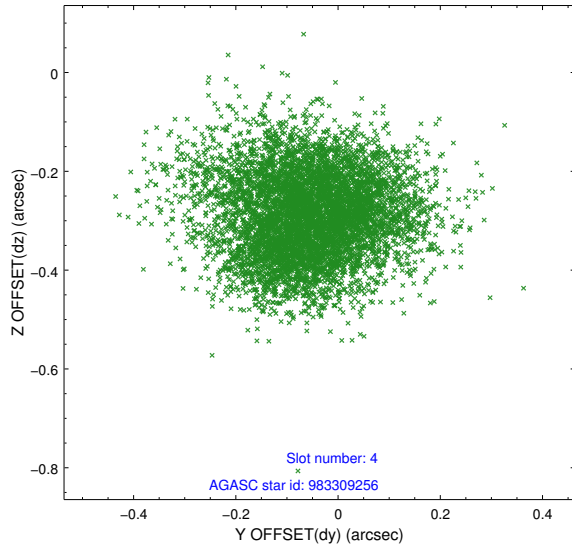
slot	status	used	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID		ACIS-I-1	7.10	3010	0.136	-0.117	0.007	0.012	0.000000	0.000000	915.55	-1002.82
1	FID		ACIS-I-5	7.09	3011	-0.396	0.076	0.008	0.015	0.000000	0.000000	-1832.93	894.52
2	FID		ACIS-I-6	7.10	3010	0.168	0.112	0.008	0.013	0.000000	0.000000	380.61	1539.58
3	GUIDE	used	983308264	9.20	6017	-0.215	-0.126	0.120	0.190	334.126370	-35.186872	-1639.10	1538.40
4	GUIDE	used	983309256	9.55	5991	-0.058	-0.288	0.140	0.233	335.202193	-35.904653	2199.50	171.74
5	GUIDE	used	983309856	8.88	6020	0.029	0.012	0.092	0.153	334.553948	-36.261002	854.71	-1670.04
6	GUIDE	used	983311272	9.17	5996	0.058	0.062	0.109	0.177	334.507174	-36.215546	671.93	-1562.36
7	GUIDE	used	983311352	9.09	6018	0.182	0.346	0.104	0.167	333.716121	-36.186229	-1522.69	-2251.10

2.4 Star Slots

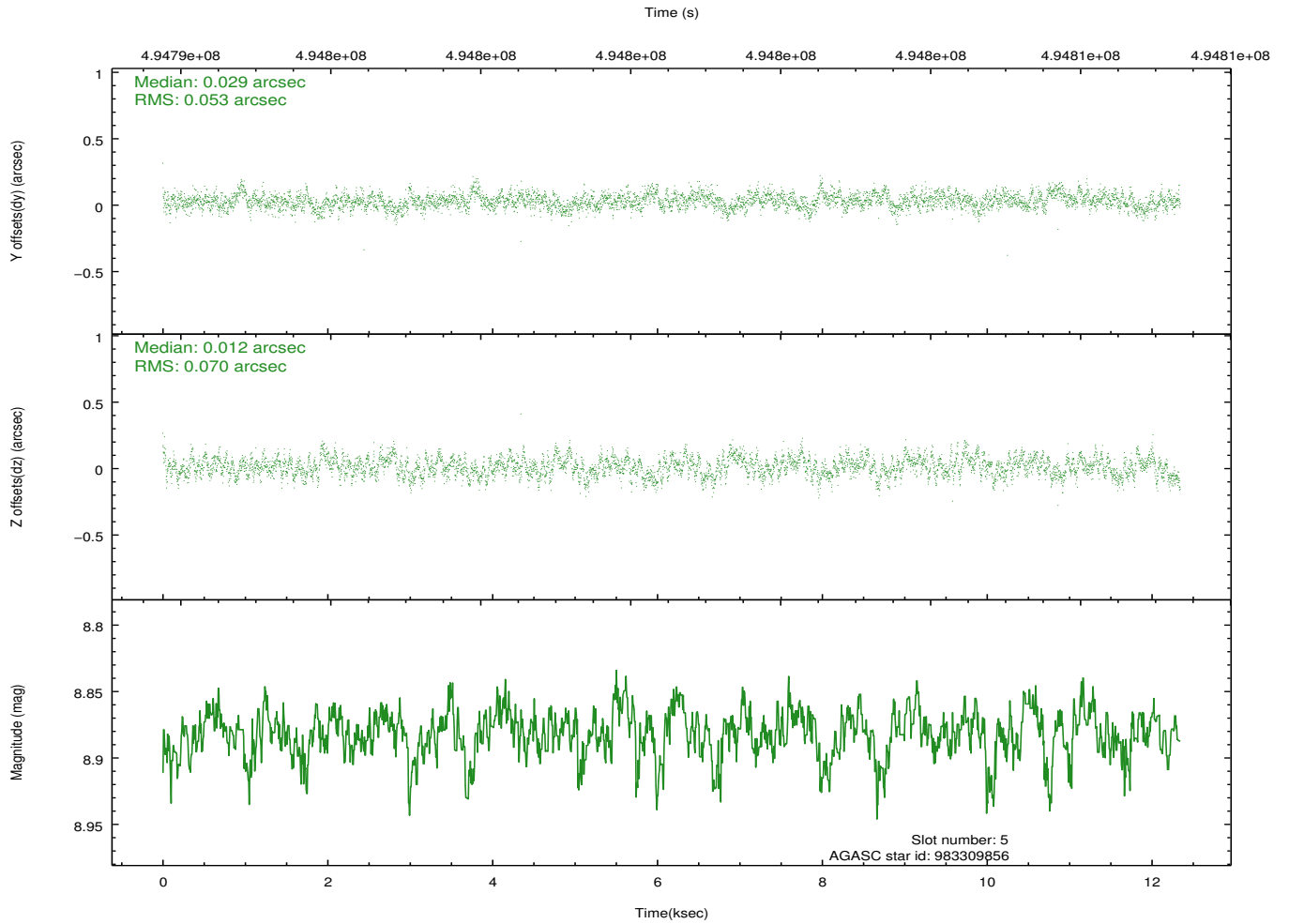
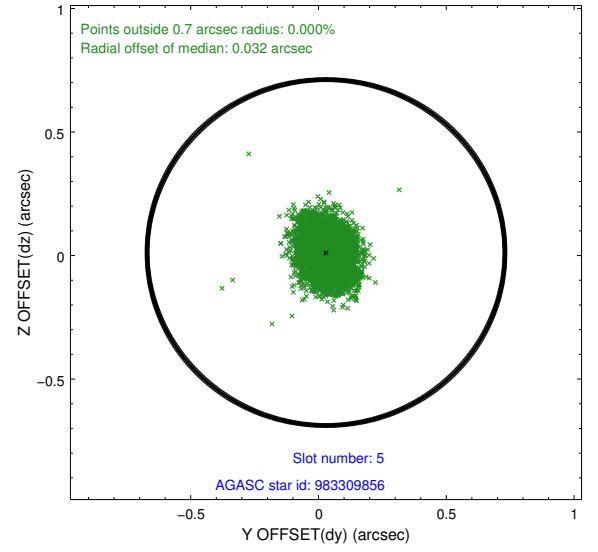
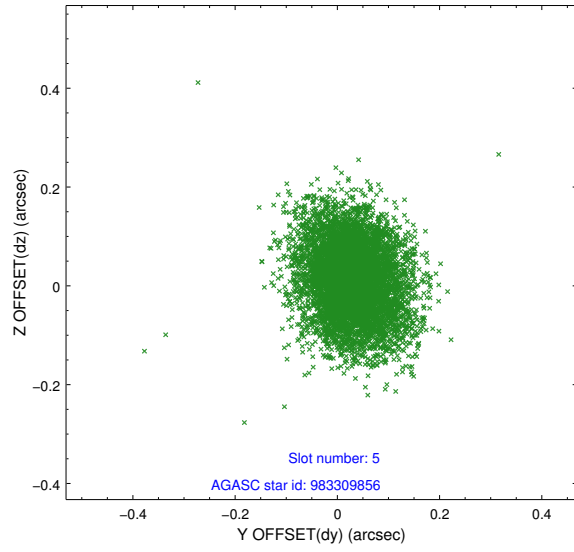
2.4.1 Slot 3



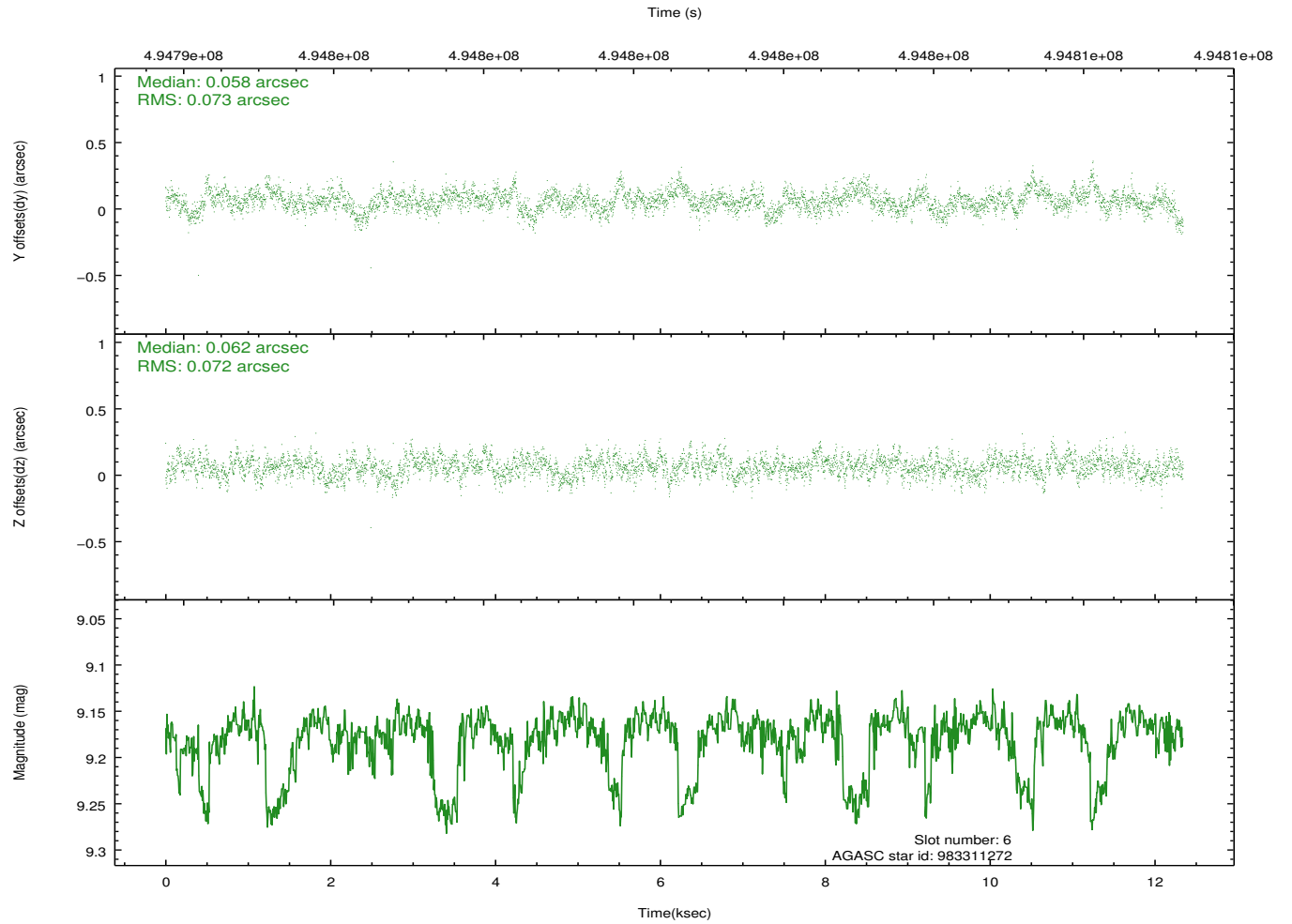
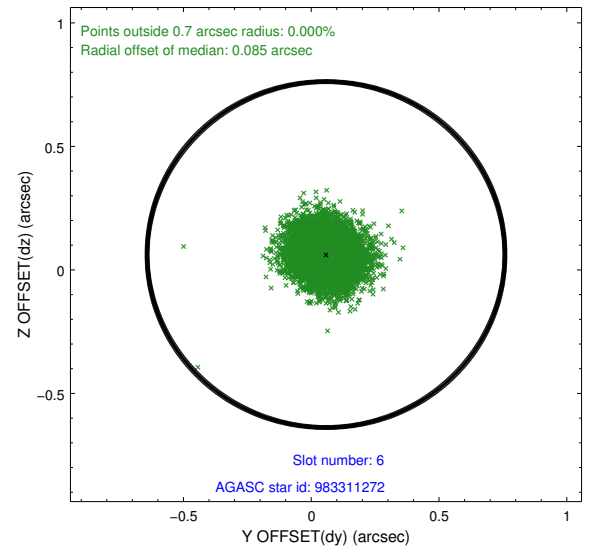
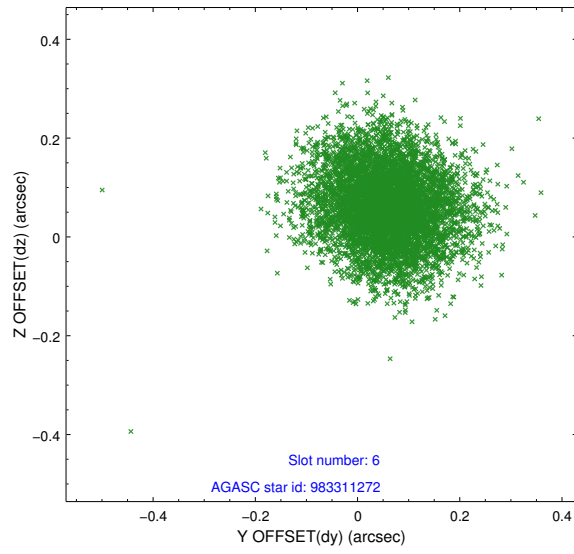
2.4.2 Slot 4



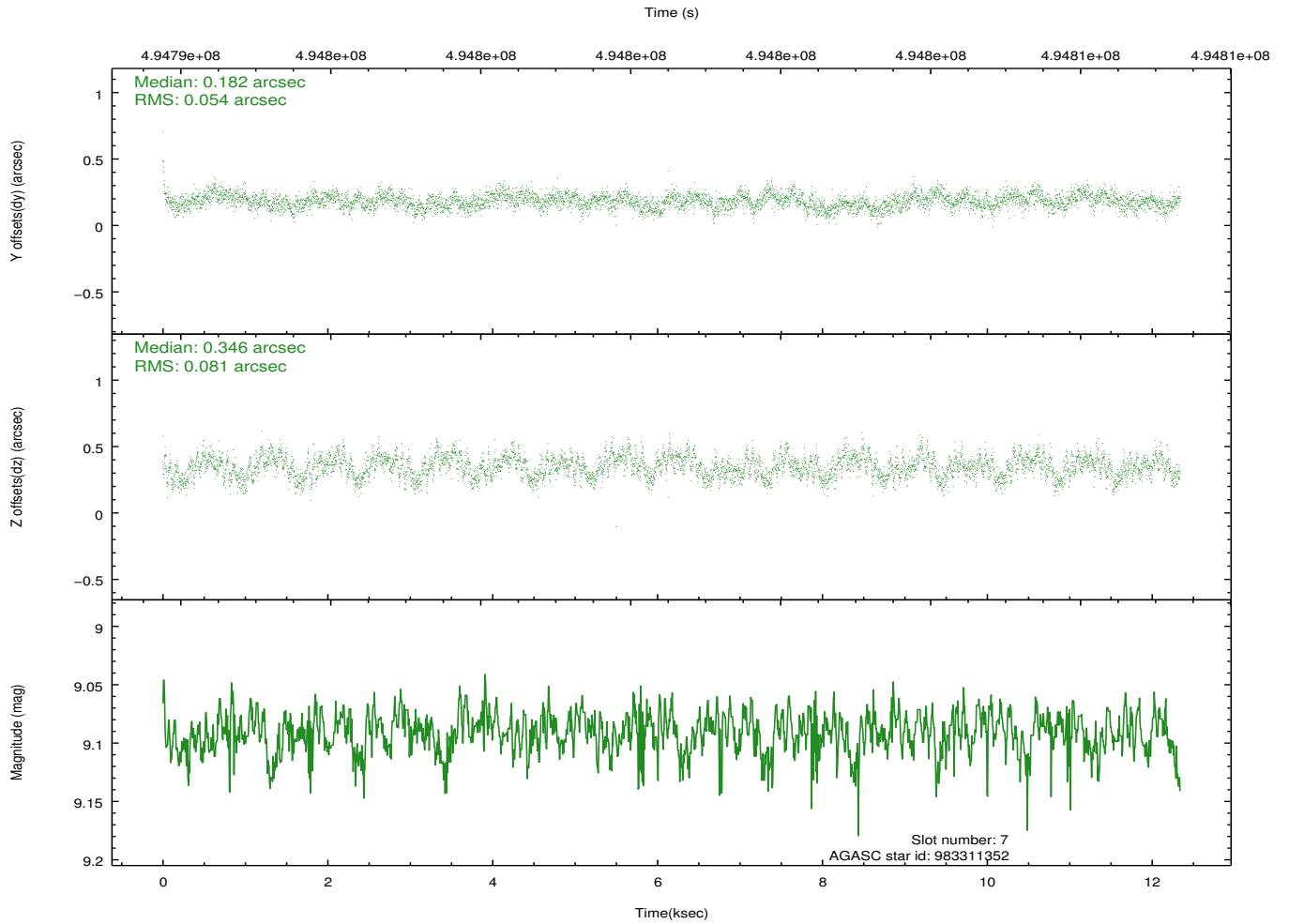
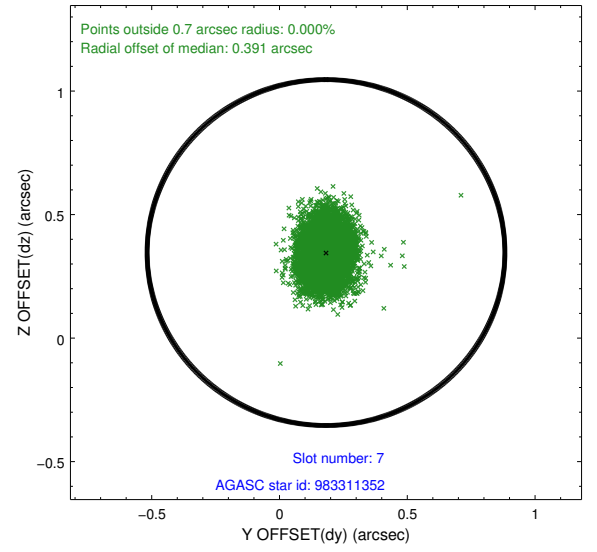
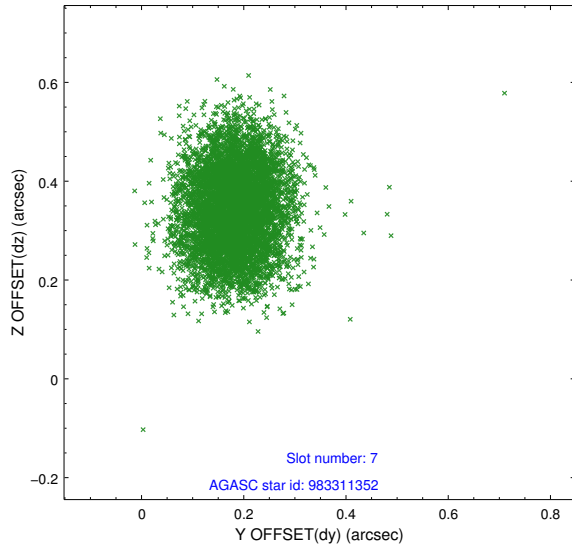
2.4.3 Slot 5



2.4.4 Slot 6

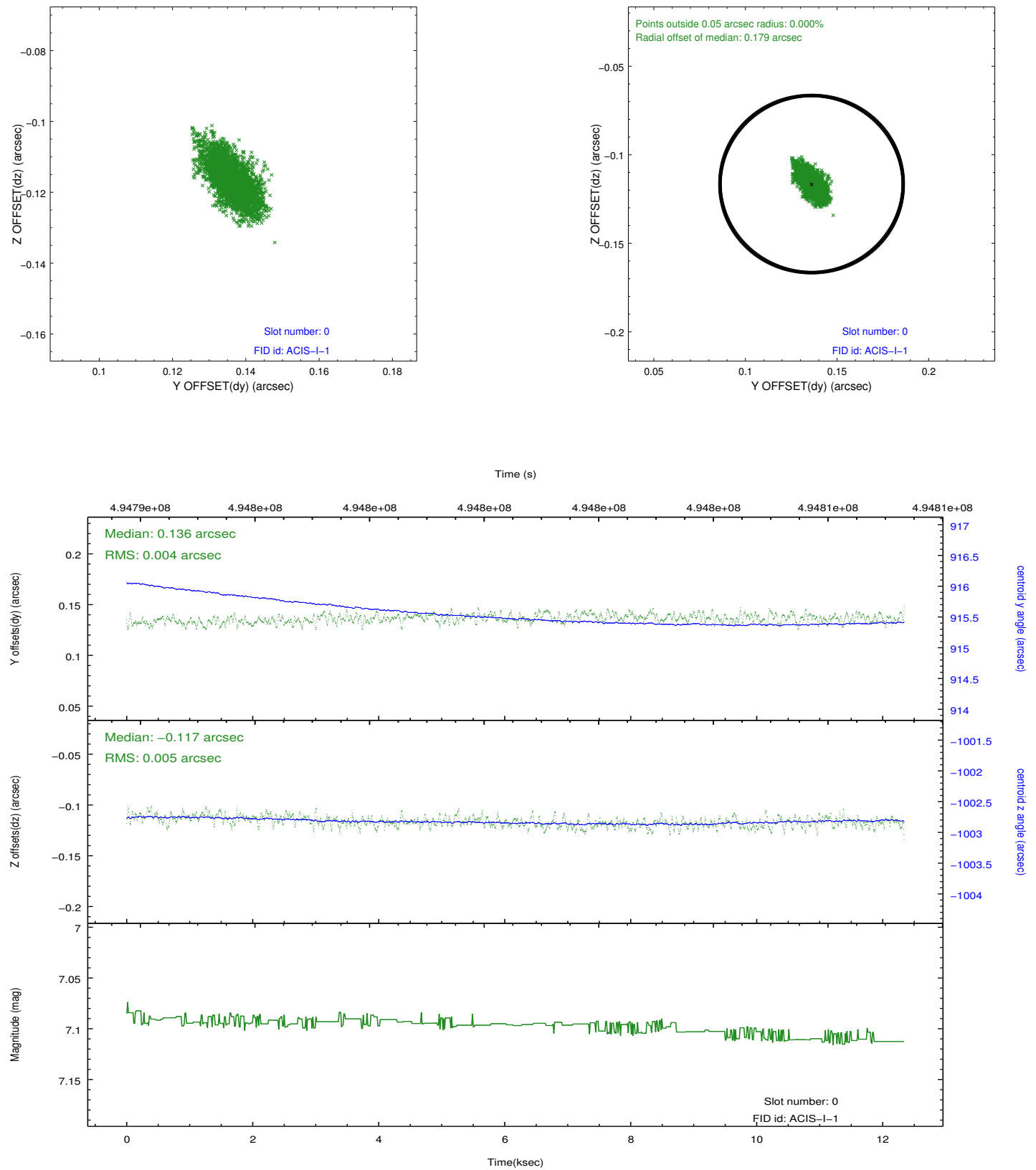


2.4.5 Slot 7

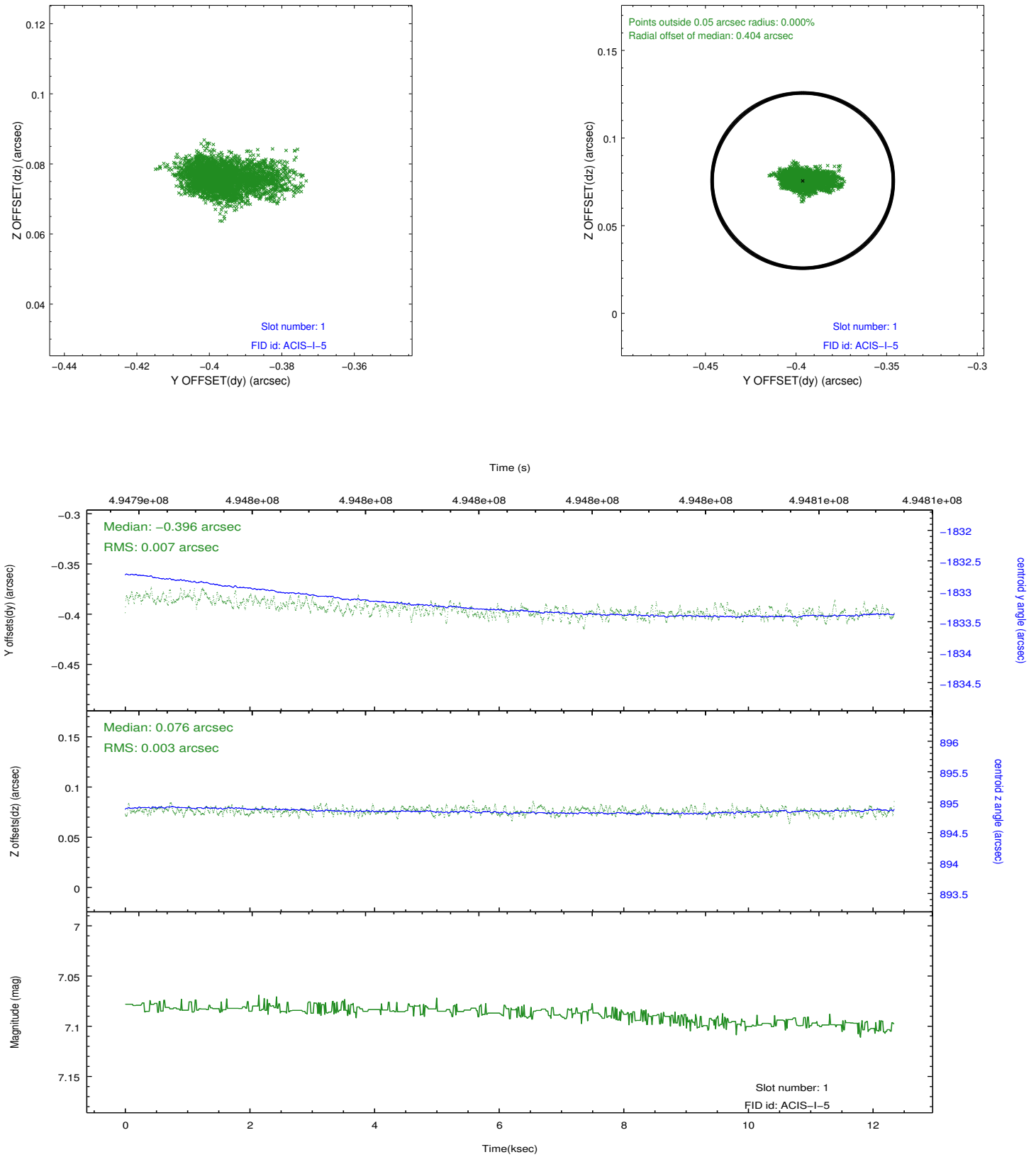


2.5 FID Slots

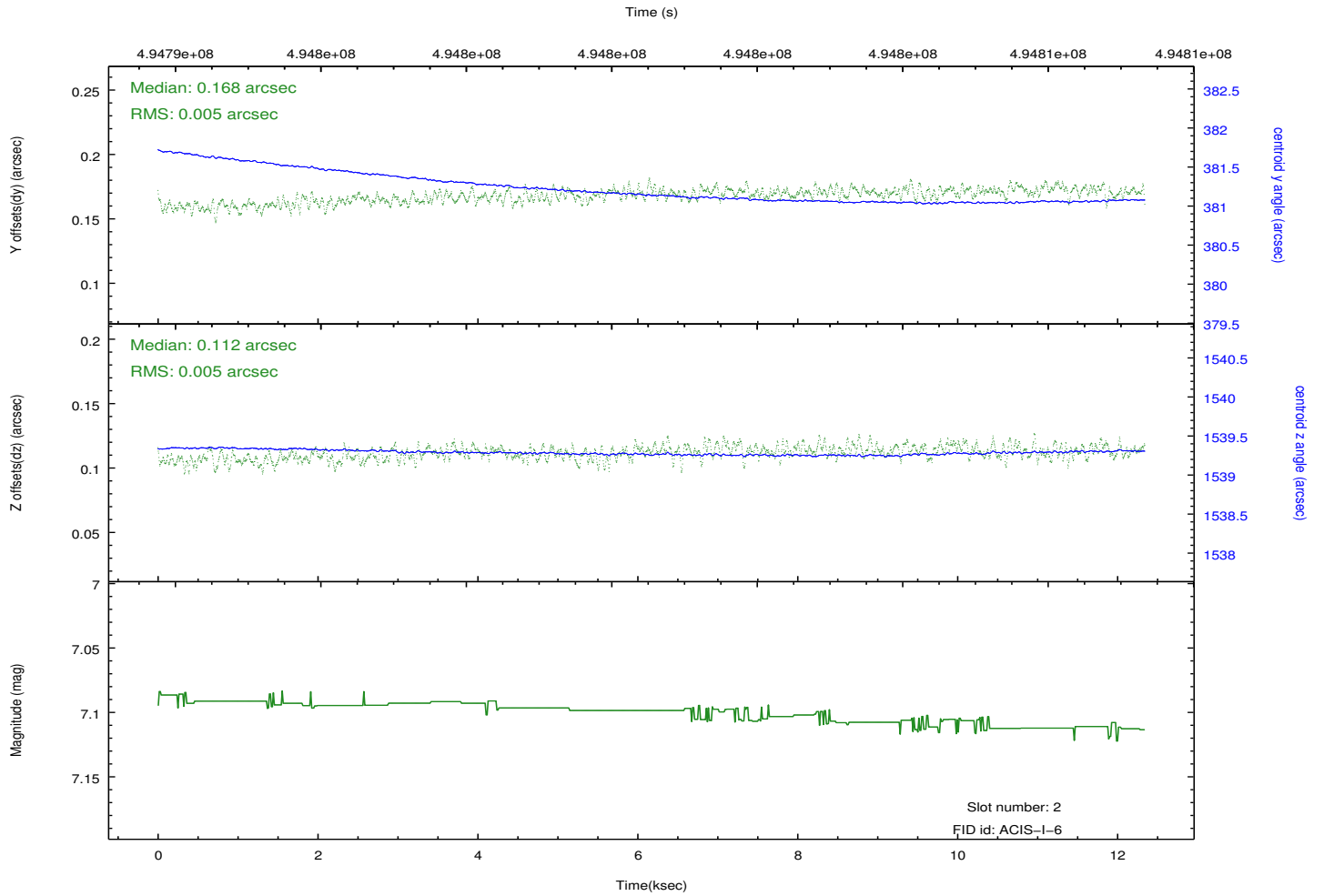
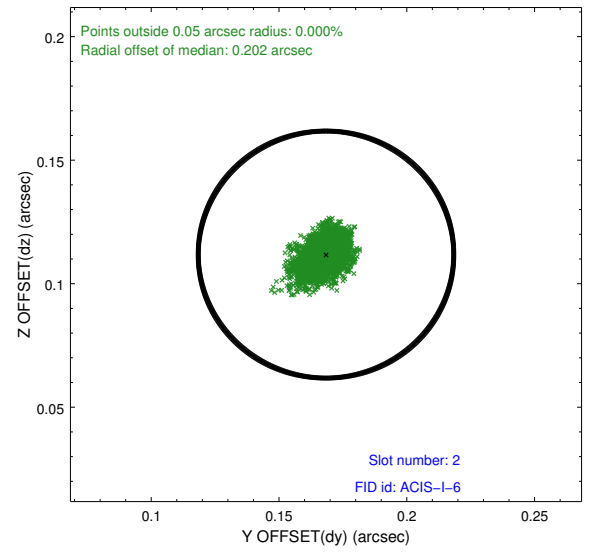
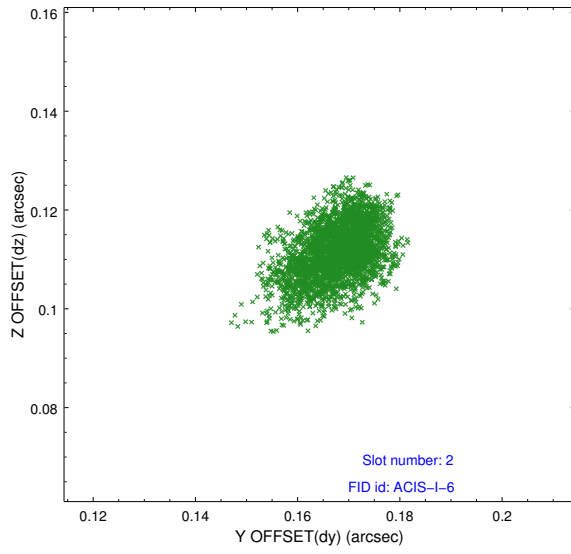
2.5.1 Slot 0



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)	2014.12.12
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	12.083635710537

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.