

V&V Reference Report

L2 ASCDS Version : 8.5.1

Observation 15376 - L2 Version 2
Chandra X-Ray Center

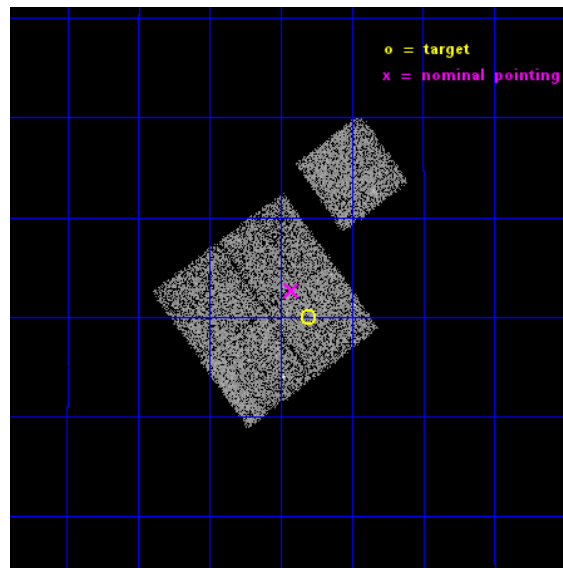
L2 Processing Date : Nov 30 2014

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1 Front

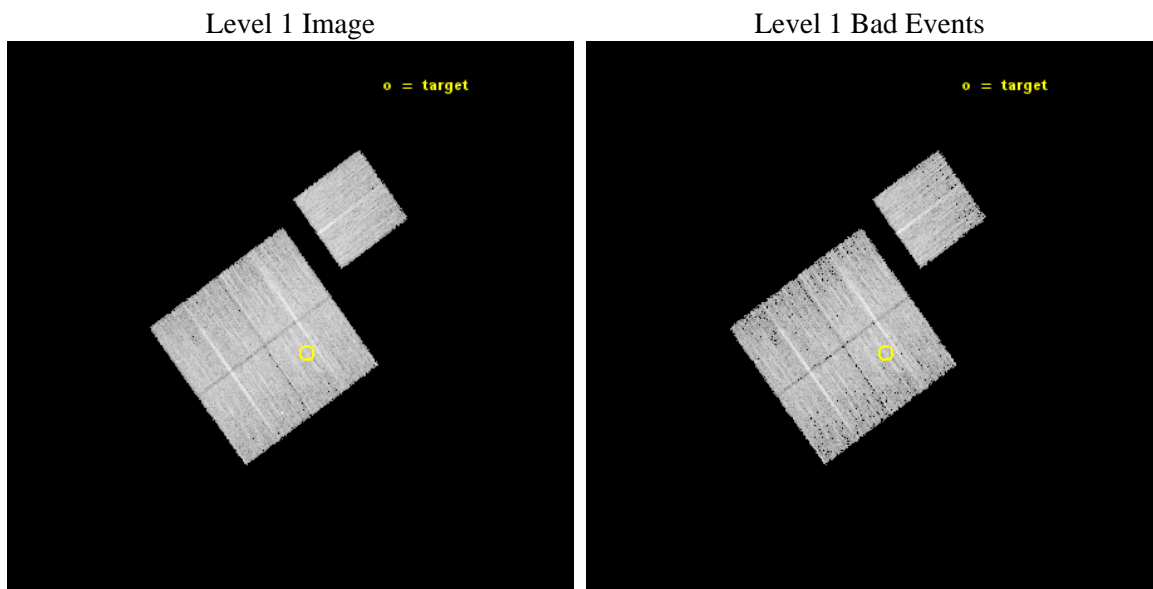
seq_num	801366	Sequence number
obs_id	15376	Observation id
title	A Search for Cool Cores in a Sample of $z = 0.4$ Galaxy Clusters	Pro
observer	Professor Gordon Garmire	Principal investigator
object	GMBCG J219.69392+06.50142	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	219.700833	Observer's specified target RA [deg]
dec_targ	6.499444	Observer's specified target Dec [deg]
ra_nom	219.73120902037	Nominal RA [deg]
dec_nom	6.5446957053888	Nominal Dec [deg]
roll_nom	53.954574874912	Nominal Roll [deg]
revision	2	Processing version of data
ontime	9771.2000751495	Sum of GTIs [s]
livetime	9643.5321527149	Livetime [s]
ontime0	9771.2000751495	Sum of GTIs [s]
ontime1	9771.2000751495	Sum of GTIs [s]
ontime2	9771.2000751495	Sum of GTIs [s]
ontime3	9771.2000751495	Sum of GTIs [s]
ontime6	9771.2000751495	Sum of GTIs [s]
l2events	27745	Number of level 2 events



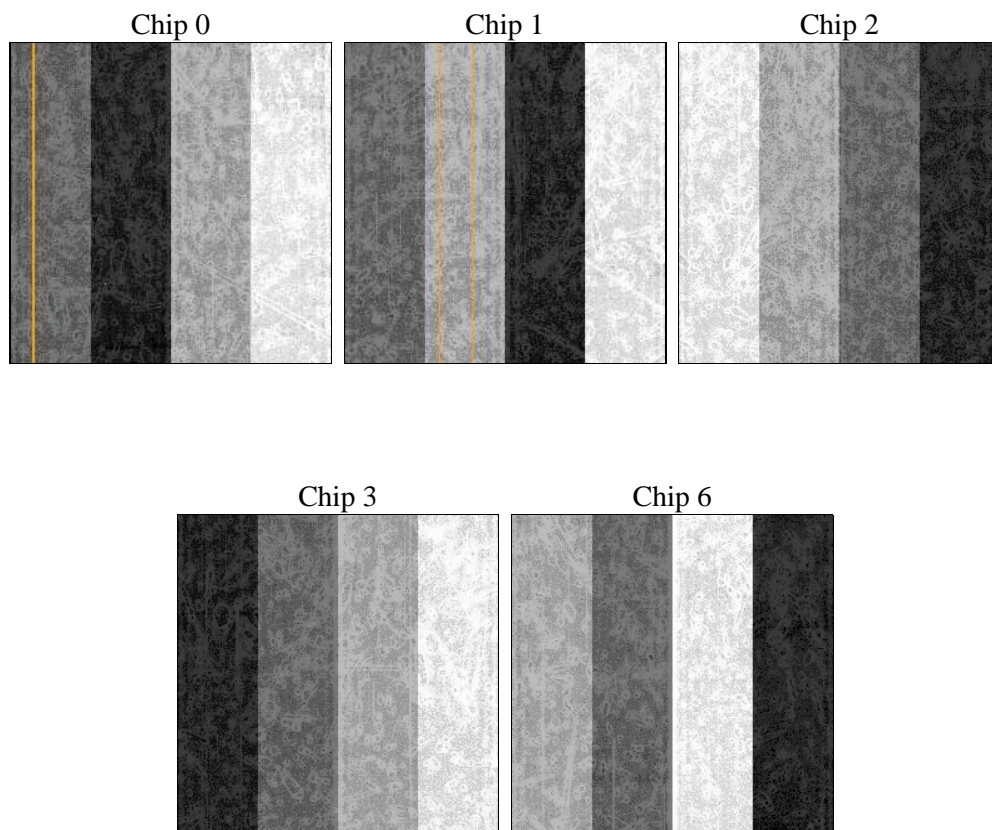
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	10000.000000	[s] Scheduled observation exposure time
ascdsver	10.3	Processing system revision	ontime	9771.2000751495	Sum of GTIs [s]
caldbver	4.6.4	 	ontime0	9771.2000751495	Sum of GTIs [s]
date	2014-11-30T12:32:38	Date and time of file creation	ontime1	9771.2000751495	Sum of GTIs [s]
revision	2	Processing version of data	ontime2	9771.2000751495	Sum of GTIs [s]
			ontime3	9771.2000751495	Sum of GTIs [s]
			ontime6	9771.2000751495	Sum of GTIs [s]
			l1events	261224	Number of level 1 events

2.1.4 Events

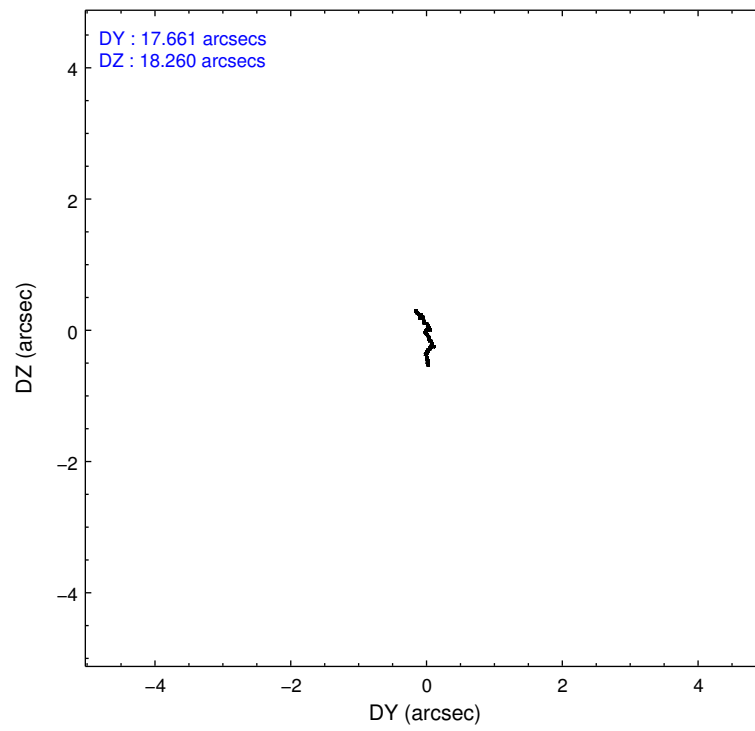
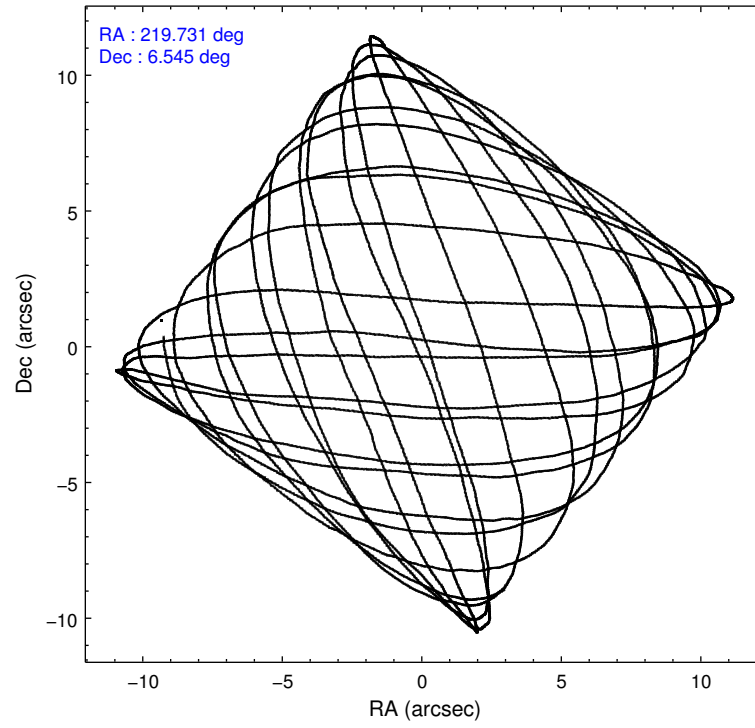
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6
level 1 events	47220	49347	56362	53646	54649
rejected events	40769	41916	49931	47391	47823
rejected %	86%	84%	88%	88%	87%

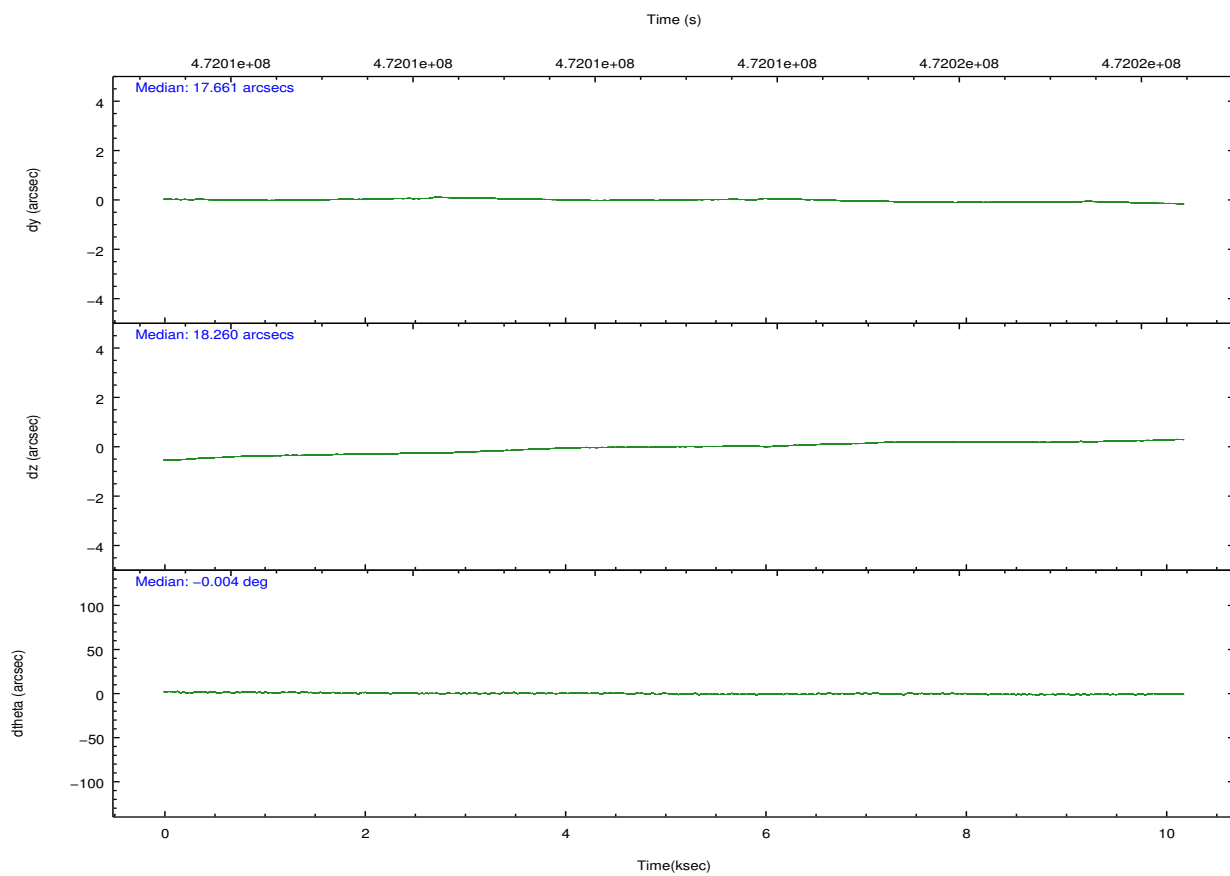
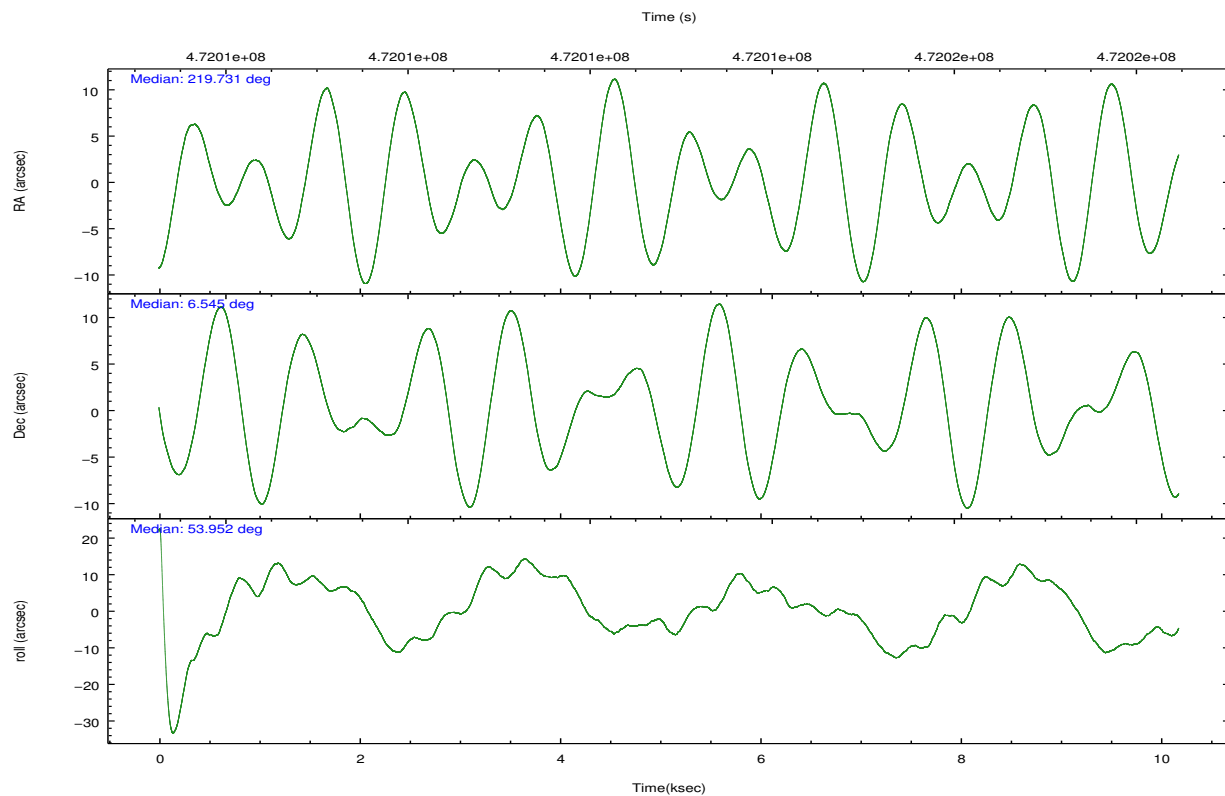
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6
grade 0 events	2345	2806	2479	2440	2547
	4%	5%	4%	4%	4%
grade 1 events	25	25	30	33	23
	0%	0%	0%	0%	0%
grade 2 events	1641	1741	1543	1380	1572
	3%	3%	2%	2%	2%
grade 3 events	649	679	579	597	604
	1%	1%	1%	1%	1%
grade 4 events	603	698	663	671	622
	1%	1%	1%	1%	1%
grade 5 events	2302	2589	2252	2741	2519
	4%	5%	3%	5%	4%
grade 6 events	1217	1512	1173	1170	1488
	2%	3%	2%	2%	2%
grade 7 events	38438	39297	47643	44614	45274
	81%	79%	84%	83%	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	219.728425	219.7312090203718	CCD I2 on	Y	Y
[deg] Pointing Dec	6.517371	6.544695705388787	CCD I3 on	Y	Y
[deg] Pointing Roll	53.746214	53.95457487491227	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	-225.8458576473255	CCD S3 on	N	N
[mm] SIM translation stage offset	-7.75	-7.746595355604228	CCD S4 on	N	N
[s] Observation start time (MET)	472007946.184000	472007455.11705	CCD S5 on	N	N
Observation start date	2012-12-16T01:17:59	2012-12-16T01:10:55	Number of optional ACIS chips dropped	0	0
[s] Observation end time (MET)	472017946.184000	472018276.55513	On-chip summing requested	N	N
Observation end date	2012-12-16T04:04:39	2012-12-16T04:11:16	Subarray requested	NONE	NONE
Read mode	TIMED	TIMED	Alternating exposures requested	N	N
			[s] Primary exposure time	0.000000	3.1

2.3 Aspect



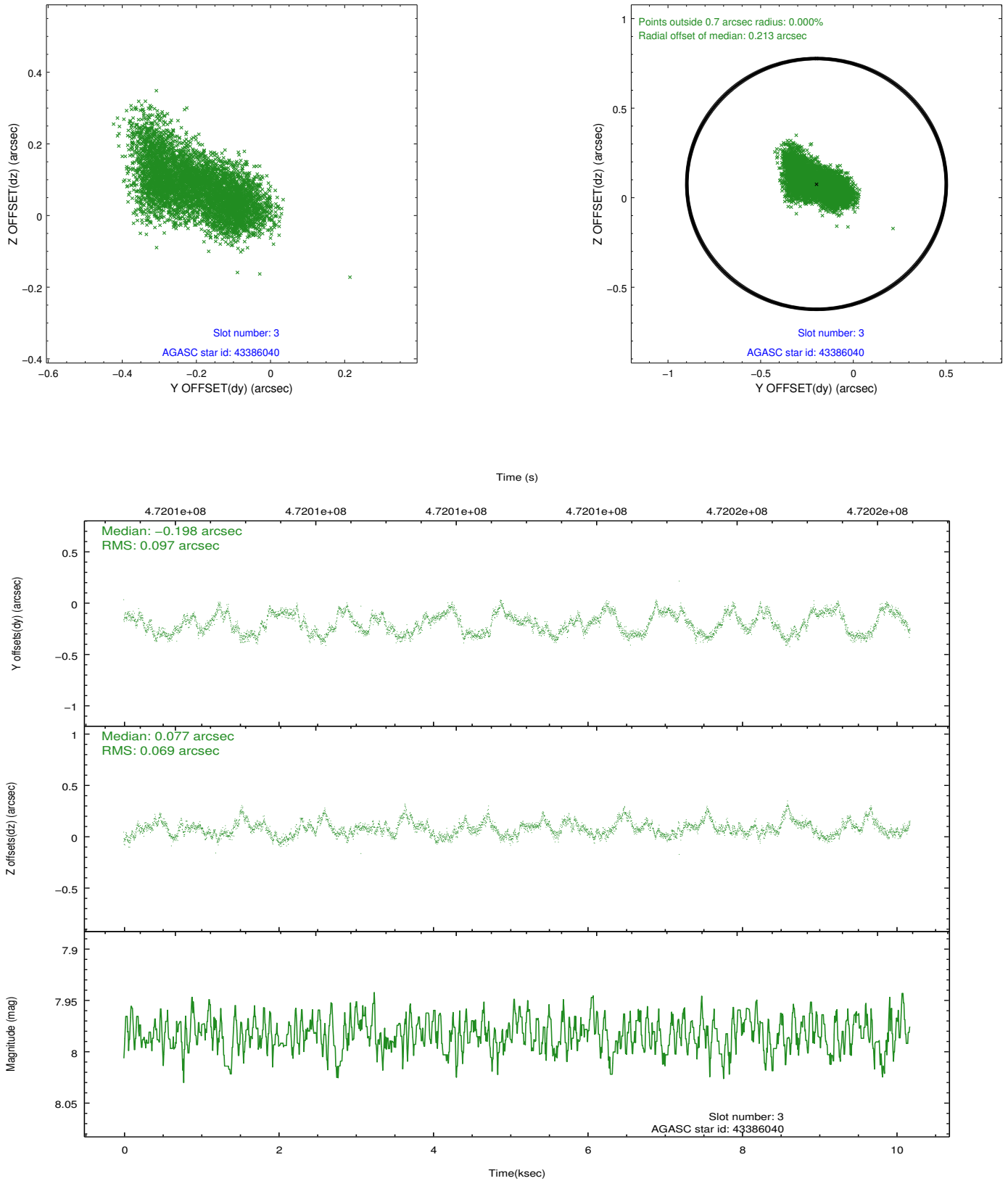


Slot Statistics

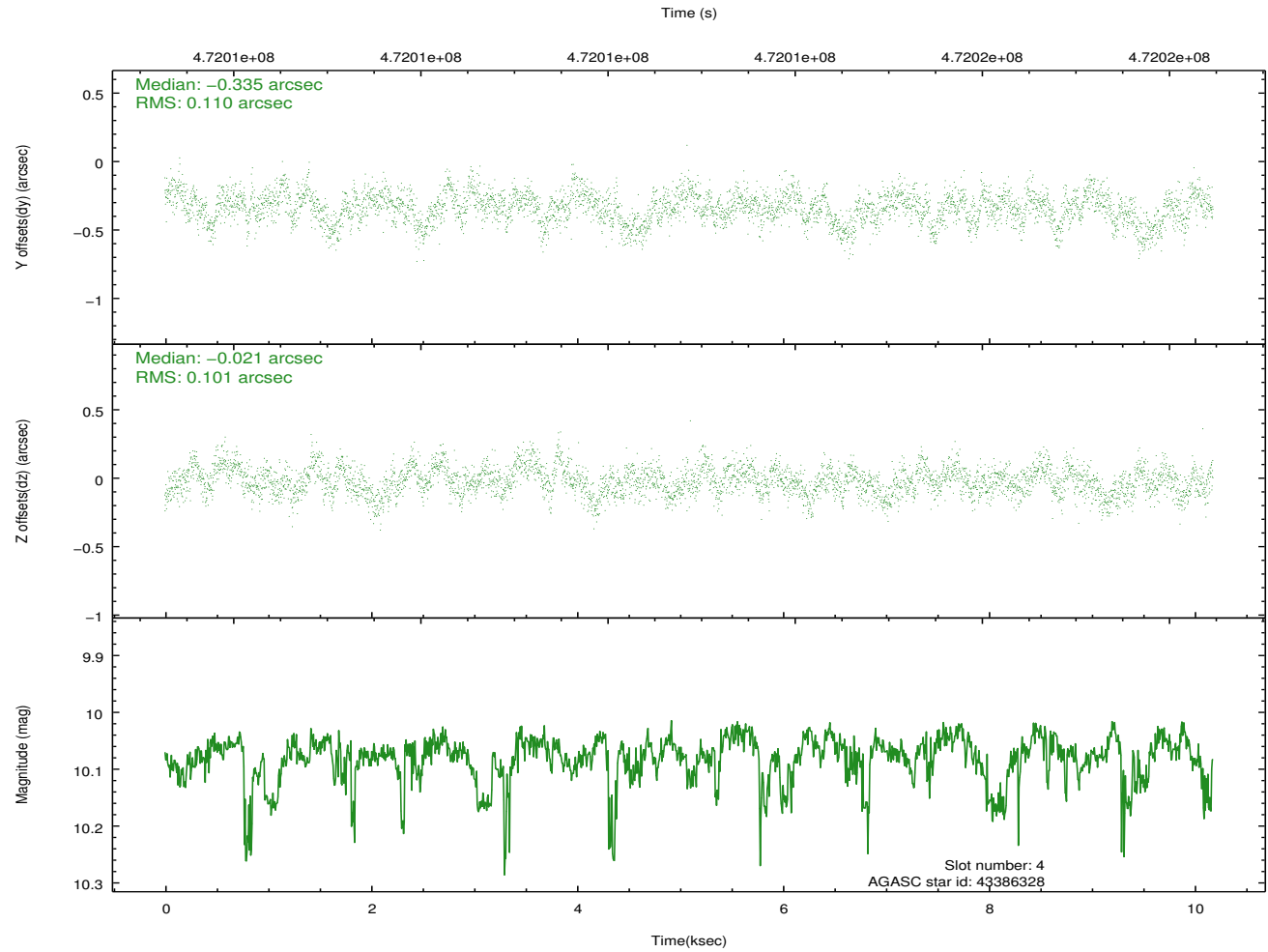
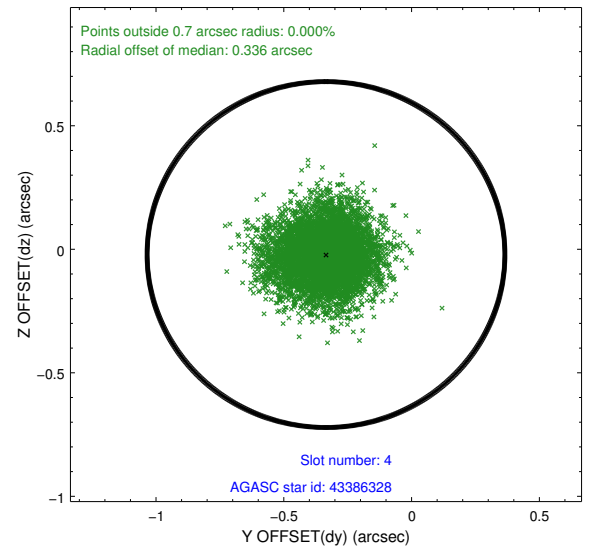
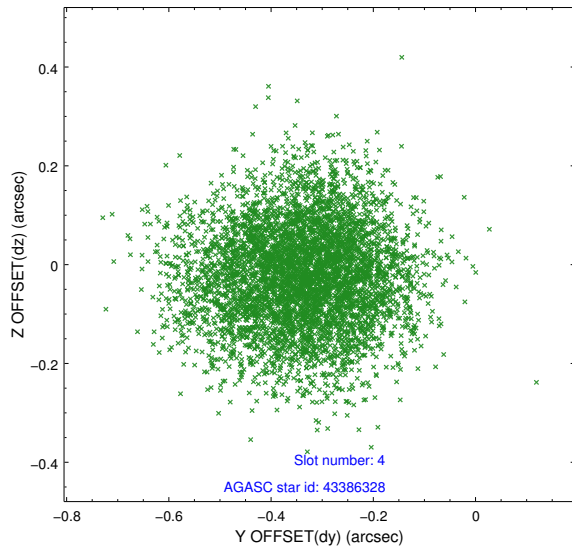
slot	status	used	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID		ACIS-I-1	7.06	2483	0.117	-0.064	0.012	0.020	0.000000	0.000000	921.75	-1000.96
1	FID		ACIS-I-5	7.05	2483	-0.273	0.101	0.011	0.017	0.000000	0.000000	-1826.53	896.27
2	FID		ACIS-I-6	7.06	2483	0.064	0.033	0.007	0.012	0.000000	0.000000	386.58	1541.38
3	GUIDE	used	43386040	7.98	4961	-0.198	0.077	0.130	0.199	219.680029	6.984547	1253.24	1134.19
4	GUIDE	used	43386328	10.07	4952	-0.335	-0.021	0.160	0.255	219.642022	7.268018	1996.90	1847.71
5	GUIDE	used	43387624	10.17	4948	-0.051	-0.076	0.222	0.341	219.733959	6.700490	543.06	374.26
6	GUIDE	used	43392008	9.81	4958	0.203	0.033	0.207	0.353	219.019368	6.355516	-1968.28	1702.46
7	GUIDE	used	43398080	10.51	4952	0.391	-0.041	0.402	0.605	219.133071	6.317504	-1838.92	1293.47

2.4 Star Slots

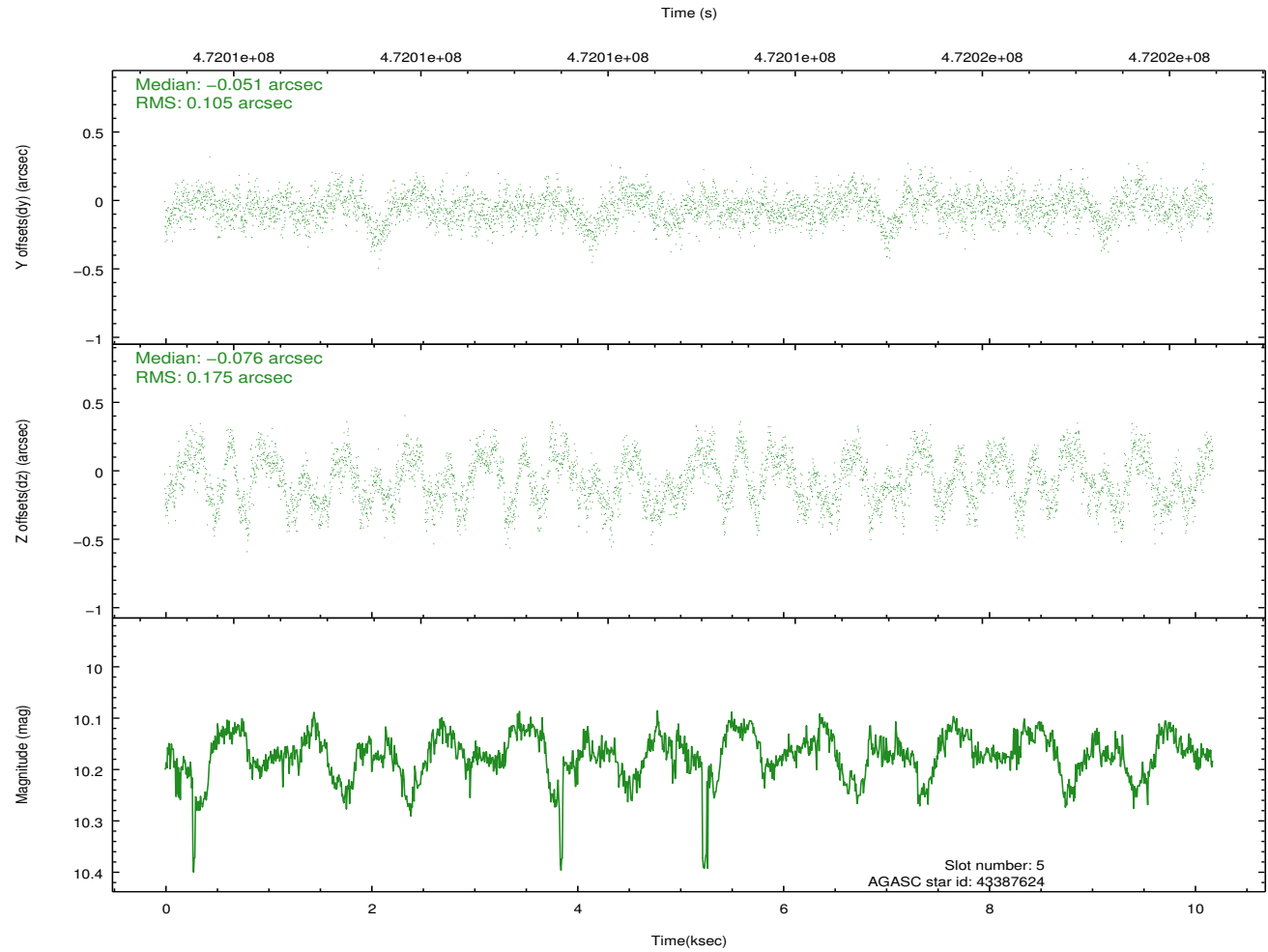
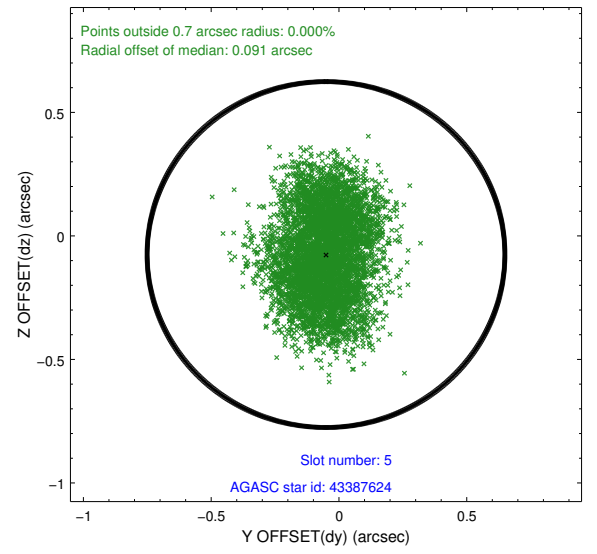
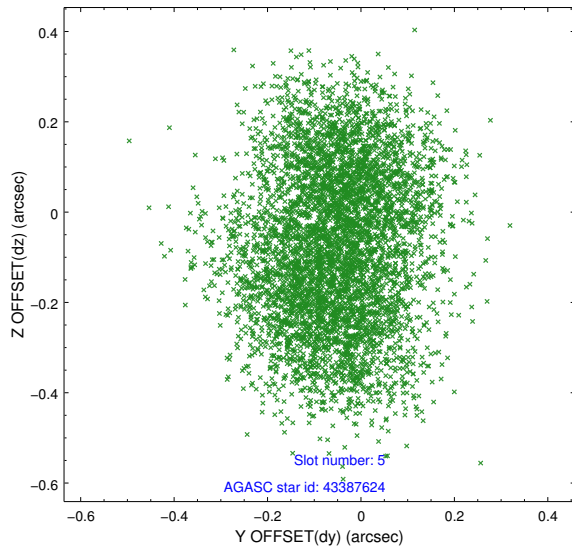
2.4.1 Slot 3



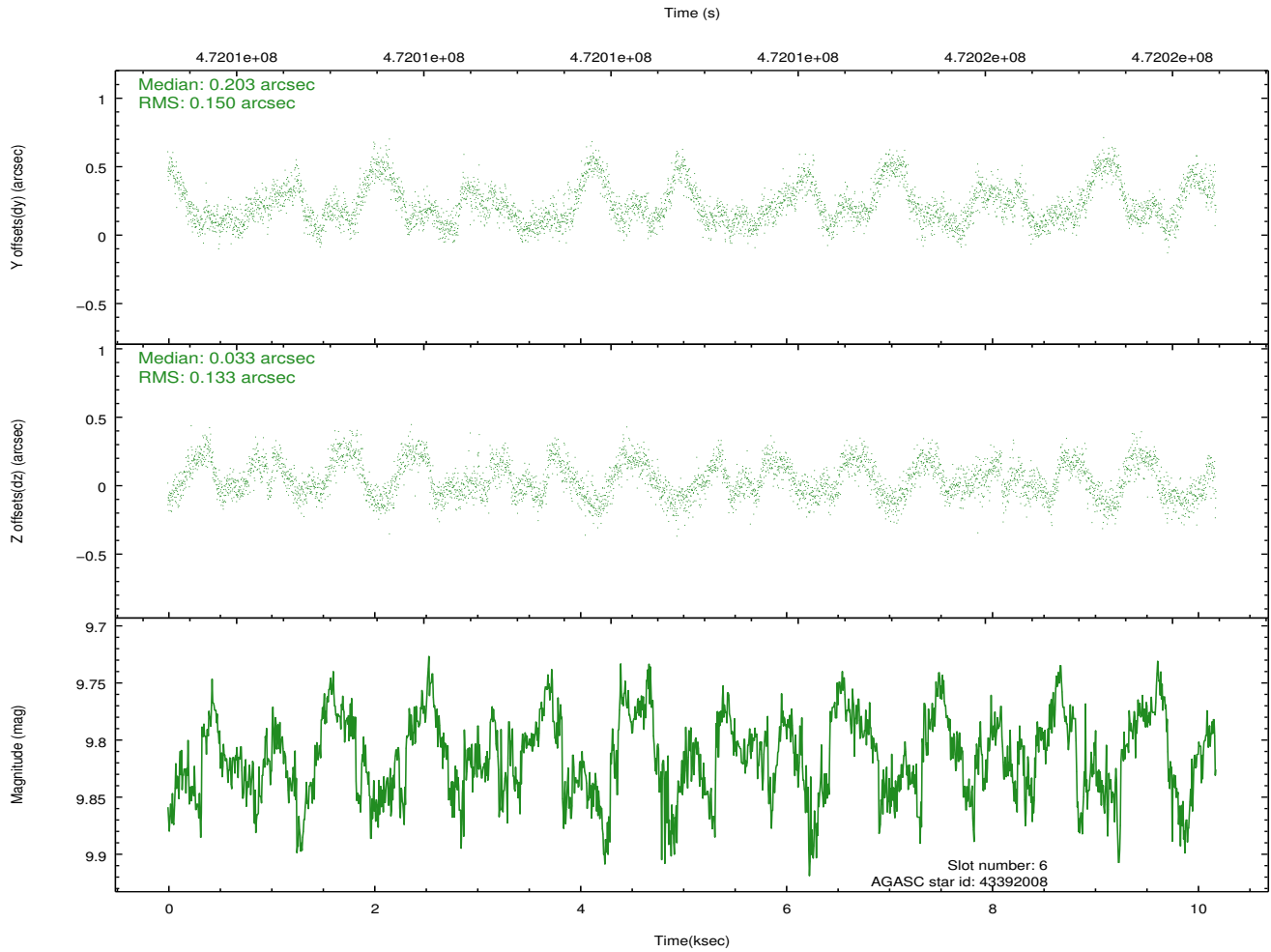
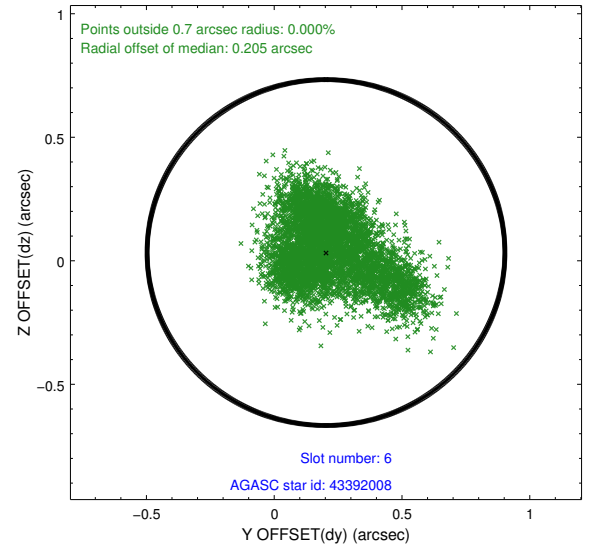
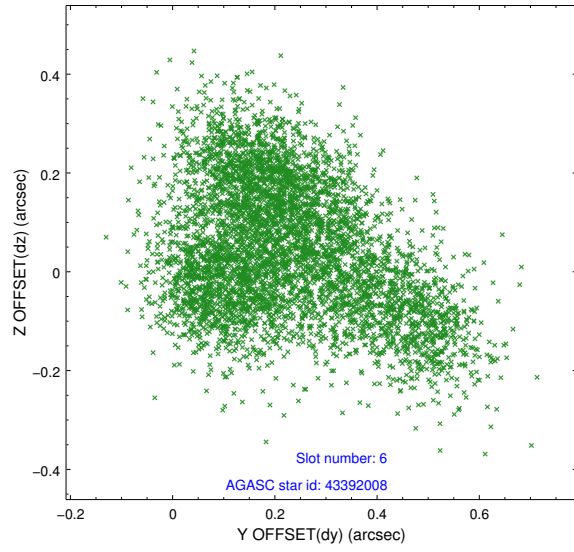
2.4.2 Slot 4



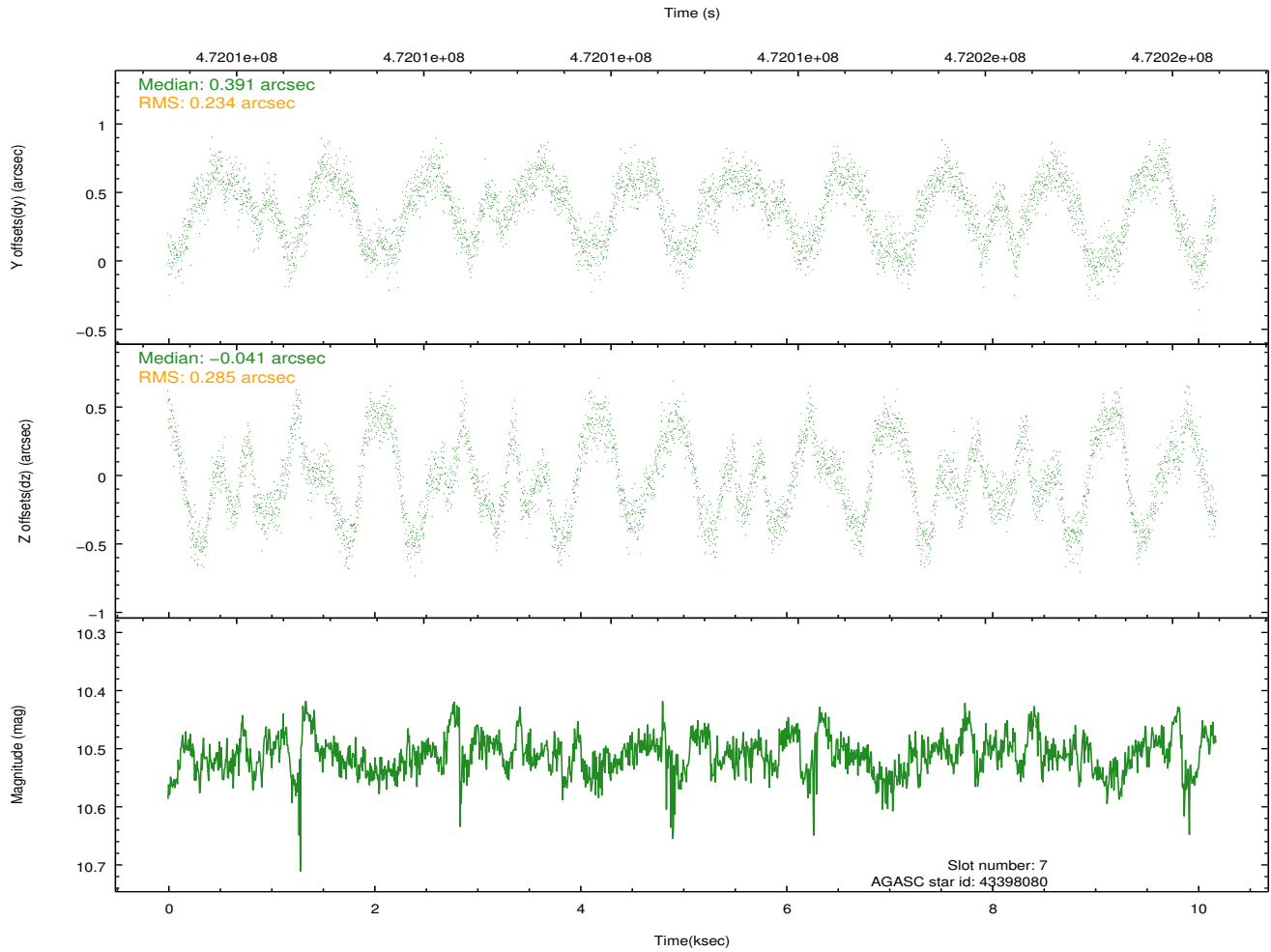
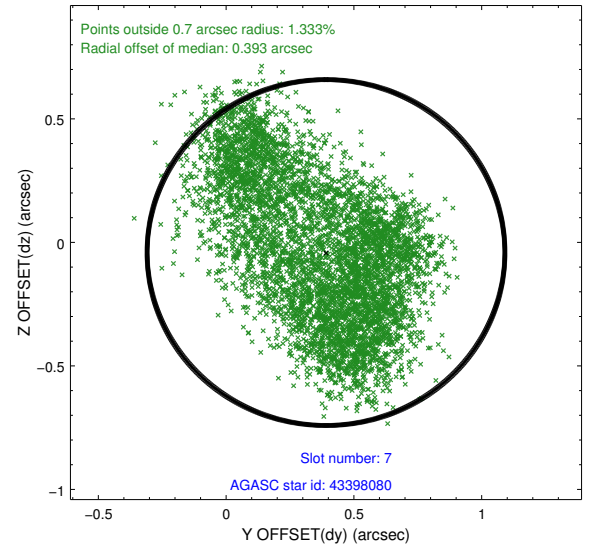
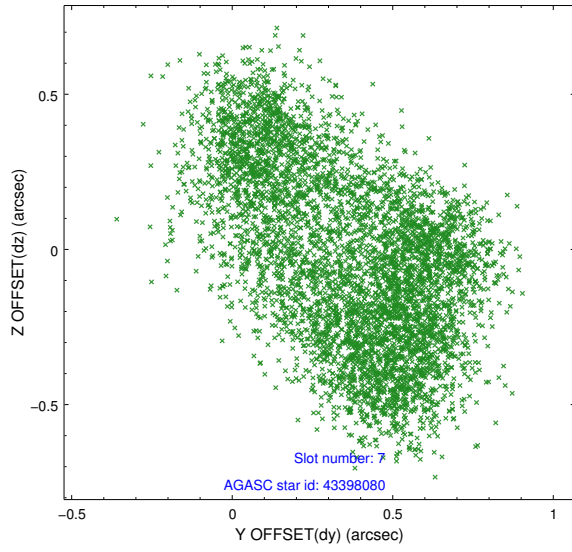
2.4.3 Slot 5



2.4.4 Slot 6

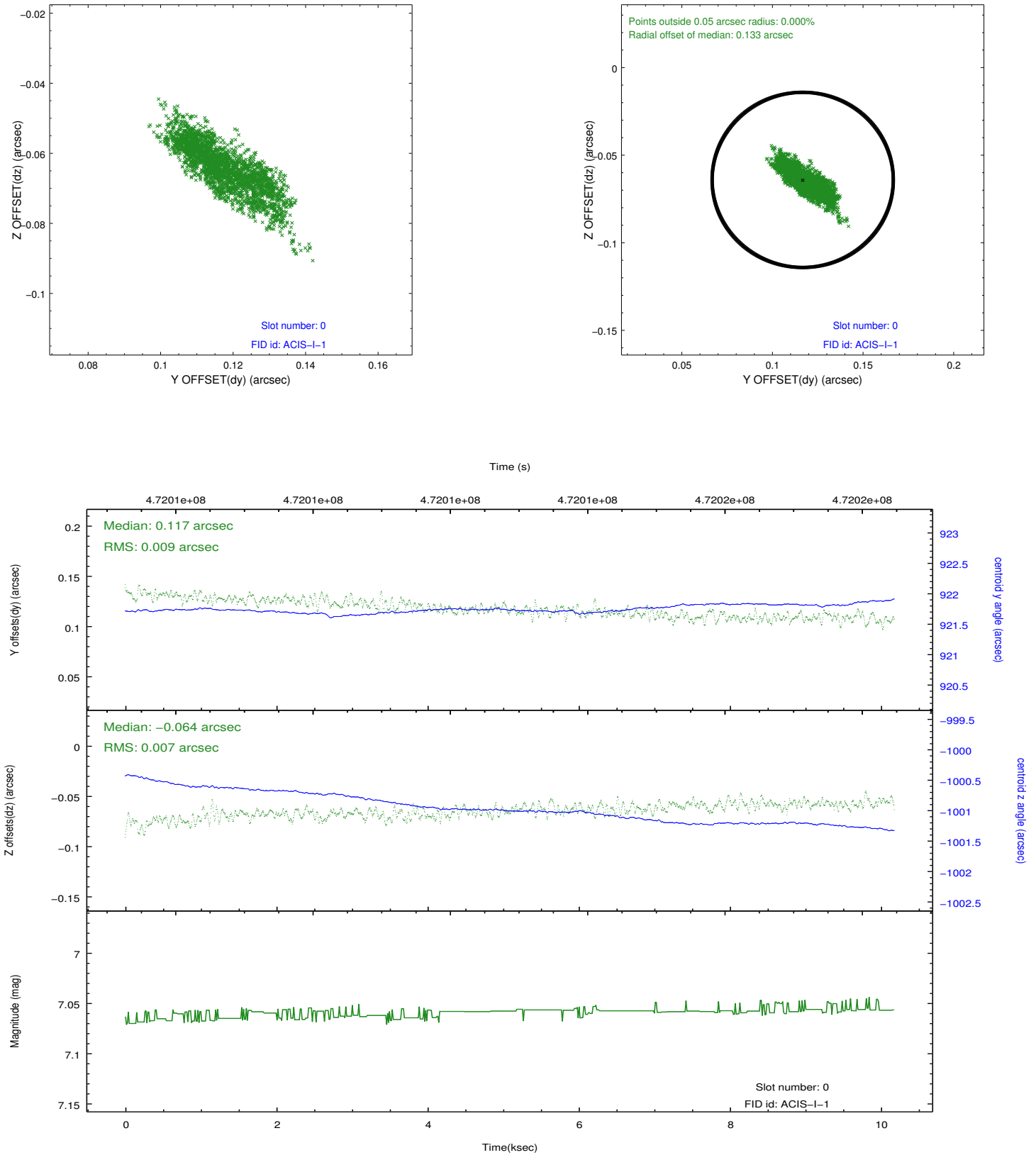


2.4.5 Slot 7

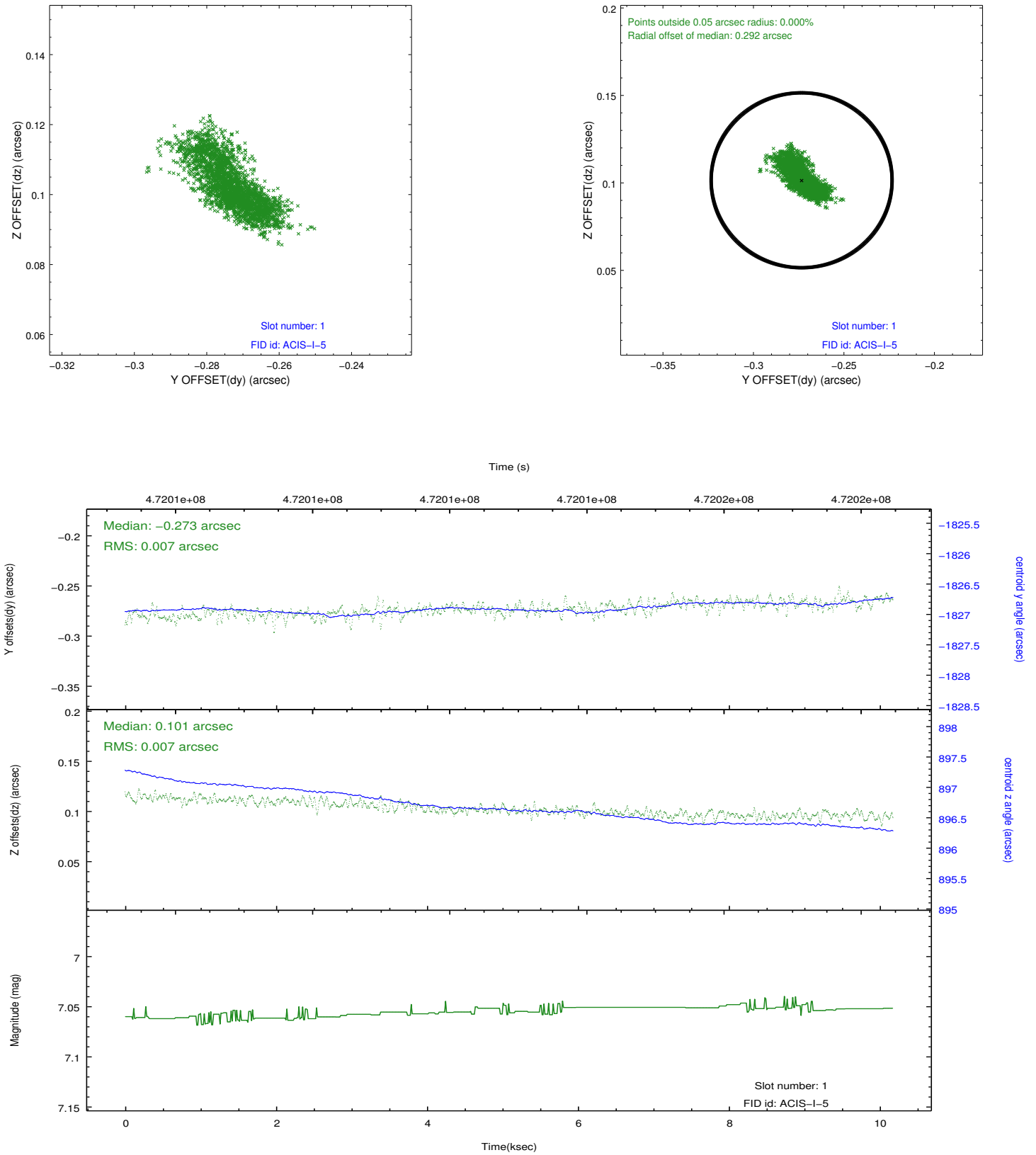


2.5 FID Slots

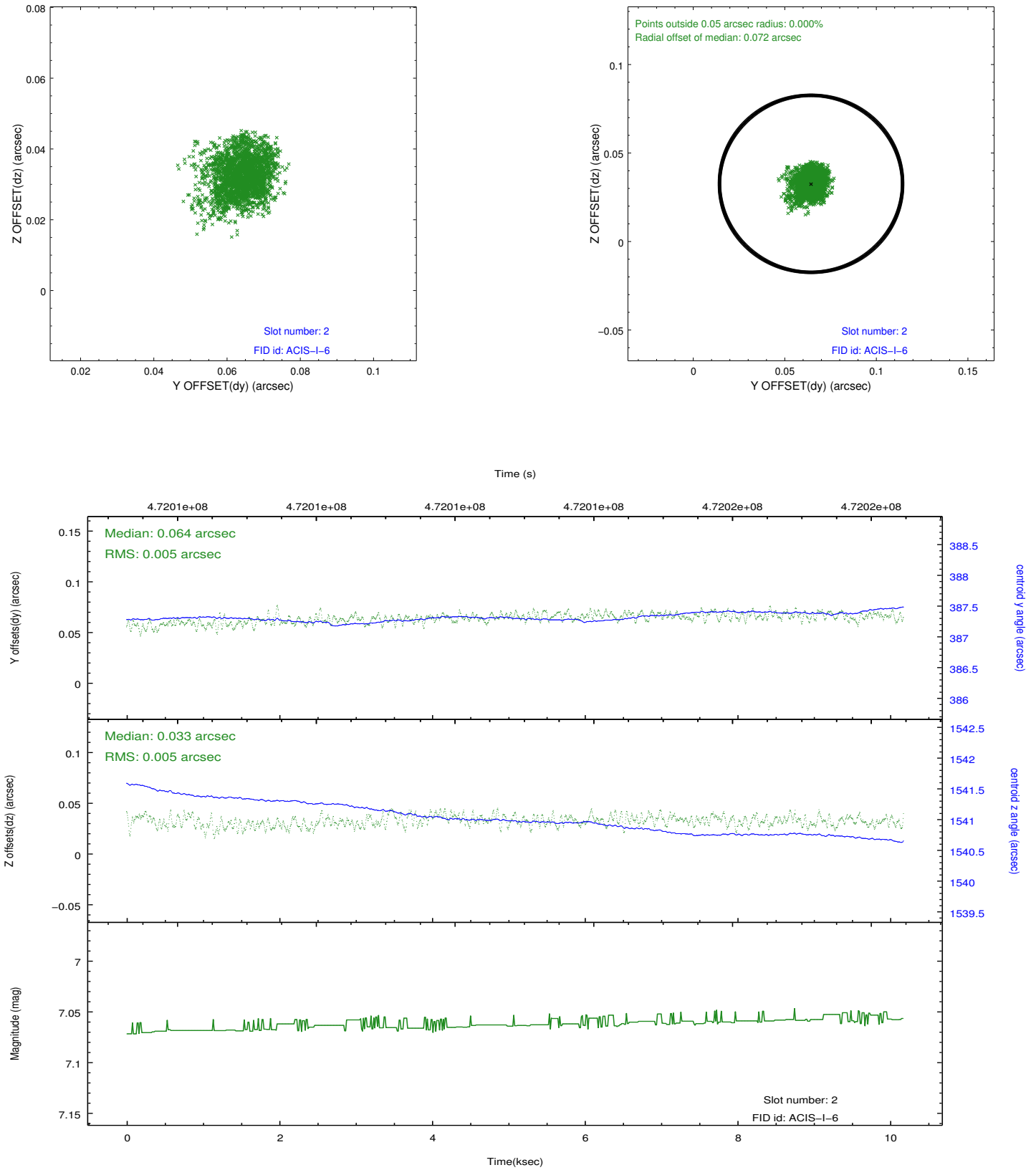
2.5.1 Slot 0



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)	2014.12.04
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	9.7712000751495

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.