

V&V Reference Report

L2 ASCDS Version : 10.4.1

Observation 17692 - L2 Version 1
Chandra X-Ray Center

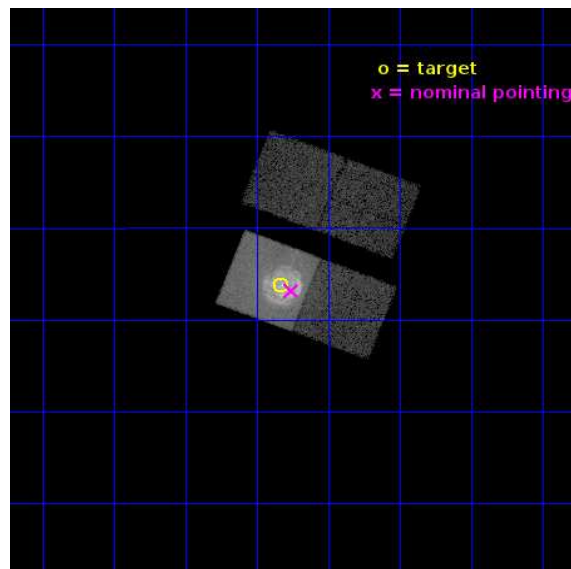
L2 Processing Date : Jul 9 2015

Contents

1	Front	2
2	OBI	3
2.1	OBI	3
2.1.1	Images	3
2.1.2	Bias	3
2.1.3	Parameters	4
2.1.4	Events	4
2.2	Compared Parameters	5
2.3	Aspect	6
2.4	Star Slots	9
2.4.1	Slot 3	9
2.4.2	Slot 4	10
2.4.3	Slot 5	11
2.4.4	Slot 6	12
2.4.5	Slot 7	13
2.5	FID Slots	14
2.5.1	Slot 0	14
2.5.2	Slot 1	15
2.5.3	Slot 2	16
A	Summary	17
A.1	Status	17
A.2	Comments	17

1 Front

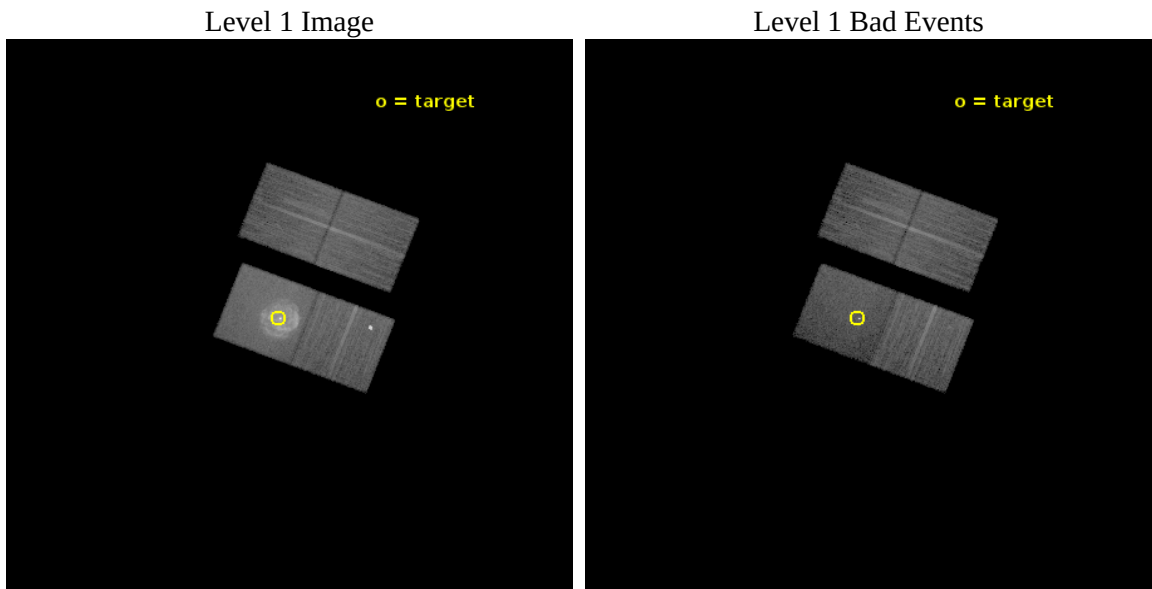
seq_num	502466	Sequence number
obs_id	17692	Observation id
title	Expansion of Kes 73, a shell supernova remnant containing a magnetar	
observer	Dr. Kazimierz Borkowski	Principal investigator
object	Kes 73	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	280.333333	Observer's specified target RA [deg]
dec_targ	-4.936389	Observer's specified target Dec [deg]
ra_nom	280.31500270864	Nominal RA [deg]
dec_nom	-4.9470794606871	Nominal Dec [deg]
roll_nom	201.15504647334	Nominal Roll [deg]
revision	1	Processing version of data
ontime	23566.200181365	Sum of GTIs [s]
livetime	23258.290426811	Livetime [s]
ontime2	23566.200181365	Sum of GTIs [s]
ontime3	23566.200181365	Sum of GTIs [s]
ontime6	23566.200181365	Sum of GTIs [s]
ontime7	23566.200181365	Sum of GTIs [s]
l2events	202979	Number of level 2 events



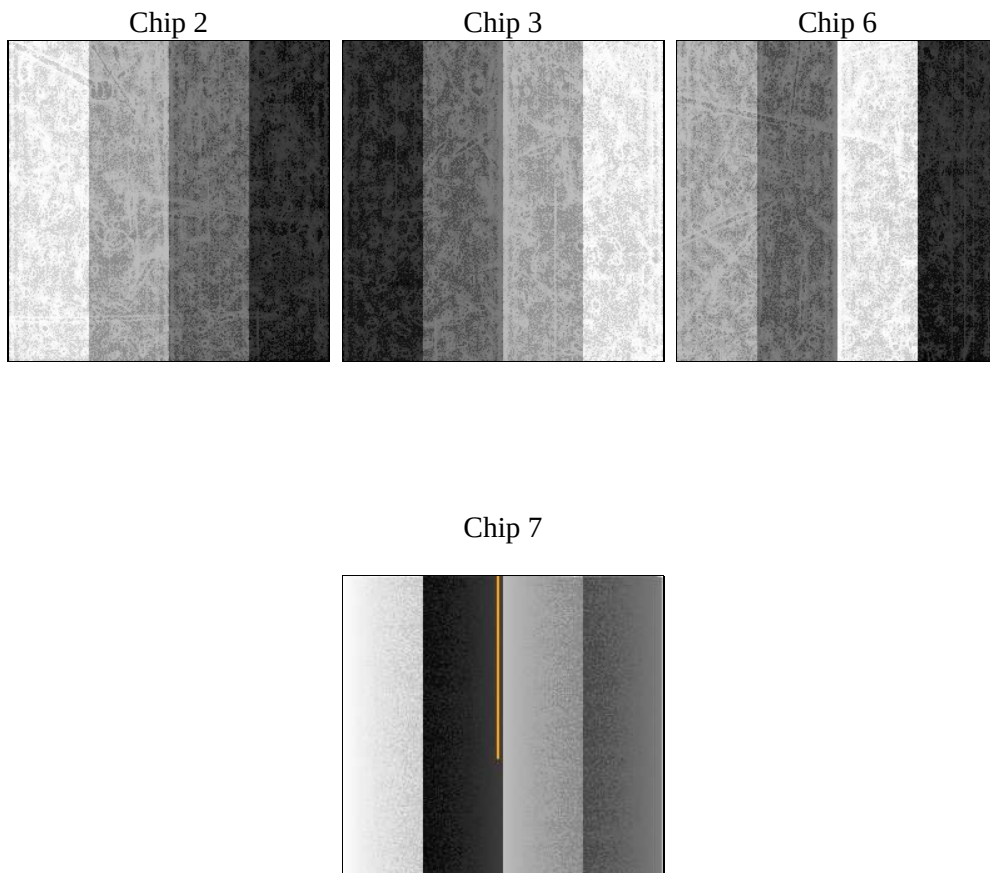
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	1	Obi number	sched_exp_time	23500.000000	[s] Scheduled observation exposure time
ascdsver	10.4.1	Processing system revision	ontime	23566.200181365	Sum of GTIs [s]
caldsver	4.6.8	 	ontime2	23566.200181365	Sum of GTIs [s]
date	2015-07-09T14:26:30	Date and time of file creation	ontime3	23566.200181365	Sum of GTIs [s]
revision	1	Processing version of data	ontime6	23566.200181365	Sum of GTIs [s]
			ontime7	23566.200181365	Sum of GTIs [s]
			l1events	597232	Number of level 1 events

2.1.4 Events

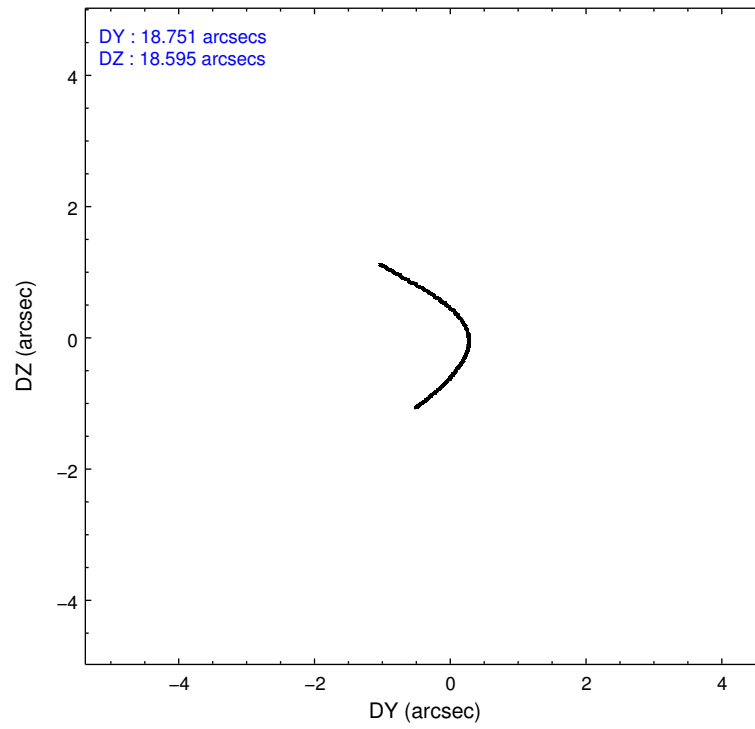
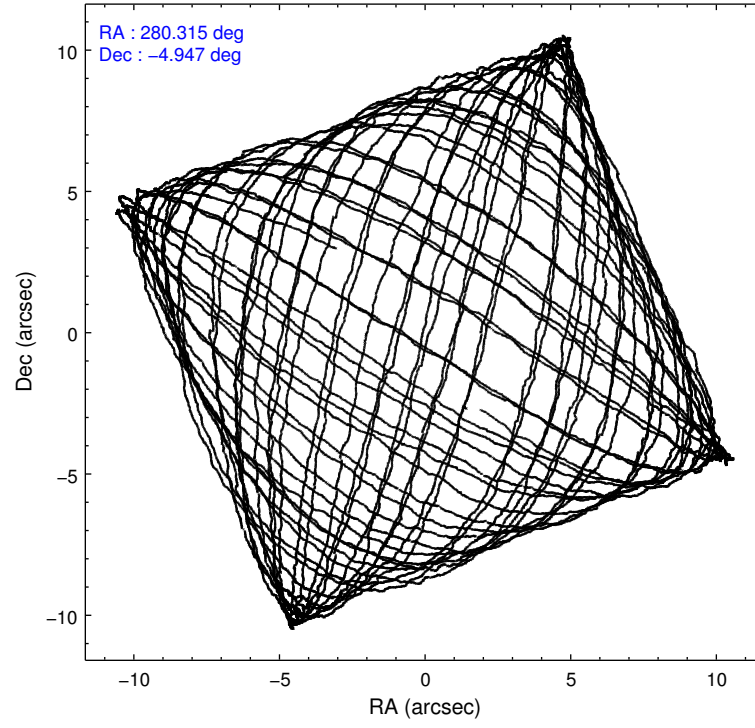
	ccd 2	ccd 3	ccd 6	ccd 7
level 1 events	117073	107200	131831	241128
rejected events	103138	93832	101289	74991
rejected %	88%	87%	76%	31%

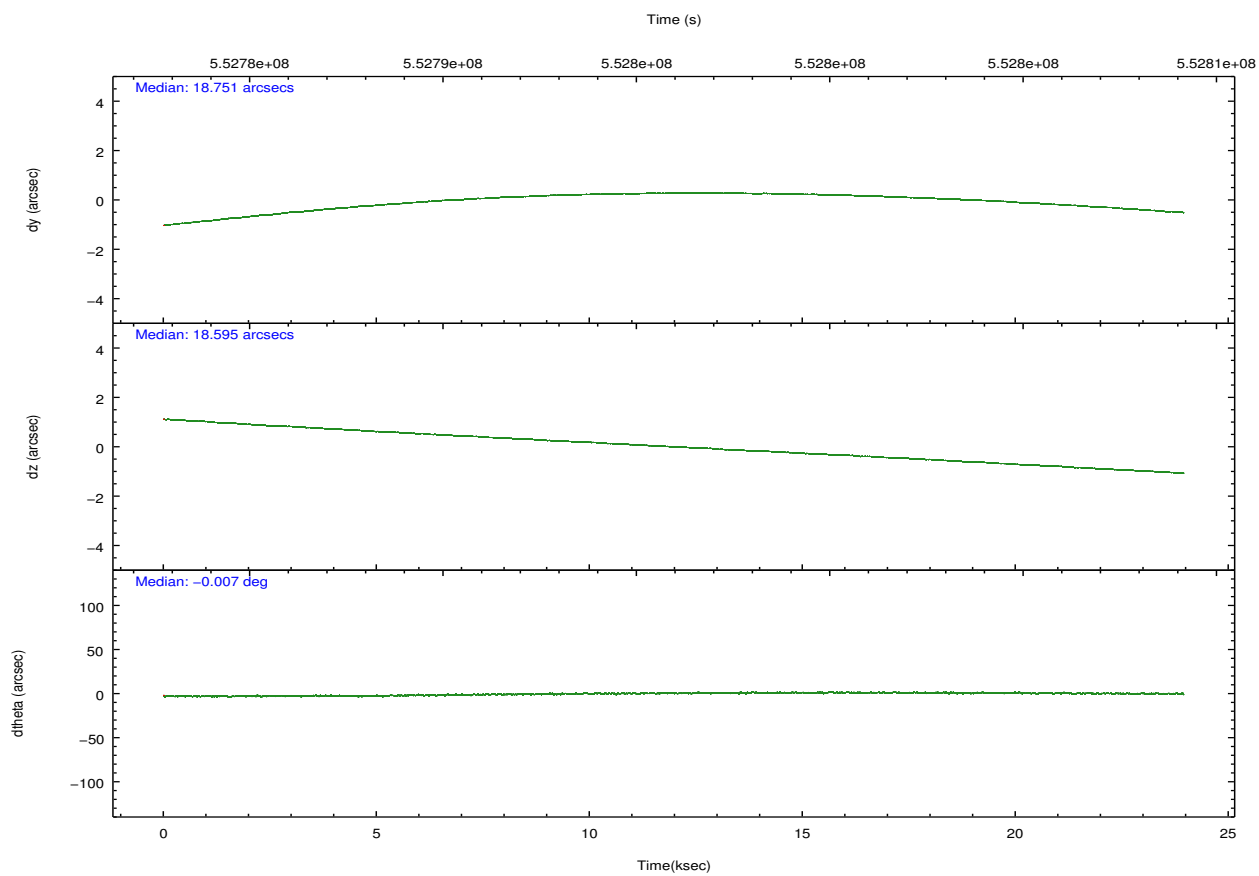
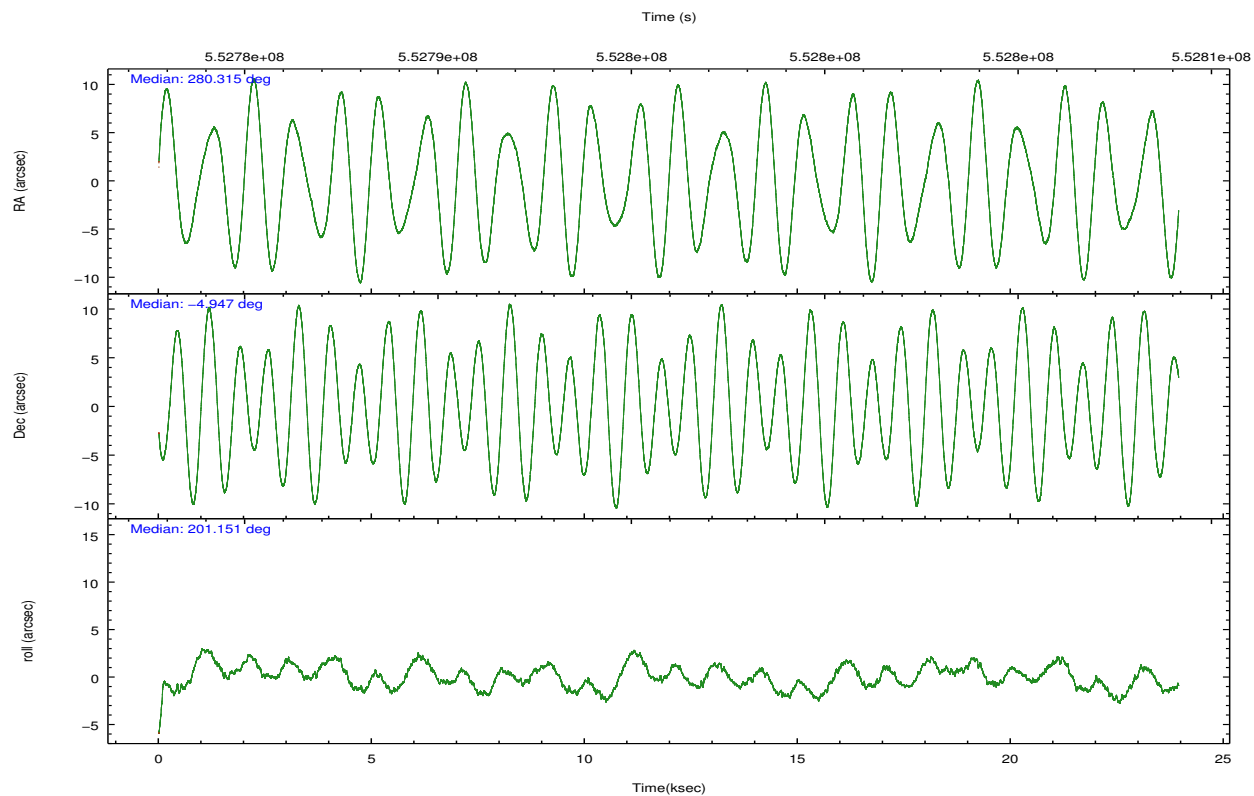
	ccd 2	ccd 3	ccd 6	ccd 7
grade 0 events	5743	5347	8198	30056
	4%	4%	6%	12%
grade 1 events	63	72	66	384
	0%	0%	0%	0%
grade 2 events	3336	2893	16414	41341
	2%	2%	12%	17%
grade 3 events	1294	1339	1466	17439
	1%	1%	1%	7%
grade 4 events	1221	1333	1460	17208
	1%	1%	1%	7%
grade 5 events	4125	5074	5262	15603
	3%	4%	3%	6%
grade 6 events	2342	2457	3008	60114
	2%	2%	2%	24%
grade 7 events	98949	88685	95957	58983
	84%	82%	72%	24%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-2367	ACIS-2367	Obspar file type	PREDICTED	ACTUAL
Grating	NONE	NONE	Obspar update status	NONE	UPDATED
Data mode	VFAINT	VFAINT	CCD I0 on	N	N
Observation mode	POINTING	POINTING	CCD I1 on	N	N
[deg] Pointing RA	280.331995	280.3150027086426	CCD I2 on	O1	Y
[deg] Pointing Dec	-4.925473	-4.947079460687135	CCD I3 on	O2	Y
[deg] Pointing Roll	200.999877	201.1550464733376	CCD S0 on	N	N
[mm] SIM focus pos	-0.684267	-0.6828225247311905	CCD S1 on	N	N
[mm] SIM defocus	0	0.001444936568705701	CCD S2 on	Y	Y
[mm] SIM translation stage pos	-190.132523	-190.1425803651734	CCD S3 on	Y	Y
[mm] SIM translation stage offset	0	0.01005778216563158	CCD S4 on	N	N
[s] Observation start time (MET)	552784457.184000	552783449.66633	CCD S5 on	N	N
Observation start date	2015-07-08T23:13:09	2015-07-08T22:57:29	Number of optional ACIS chips dropped	0	0
[s] Observation end time (MET)	552807957.184000	552808464.79273	On-chip summing requested	N	N
Observation end date	2015-07-09T05:44:49	2015-07-09T05:54:24	Subarray requested	NONE	NONE
Read mode	TIMED	TIMED	Alternating exposures requested	N	N
			[s] Primary exposure time	0.000000	3.1

2.3 Aspect



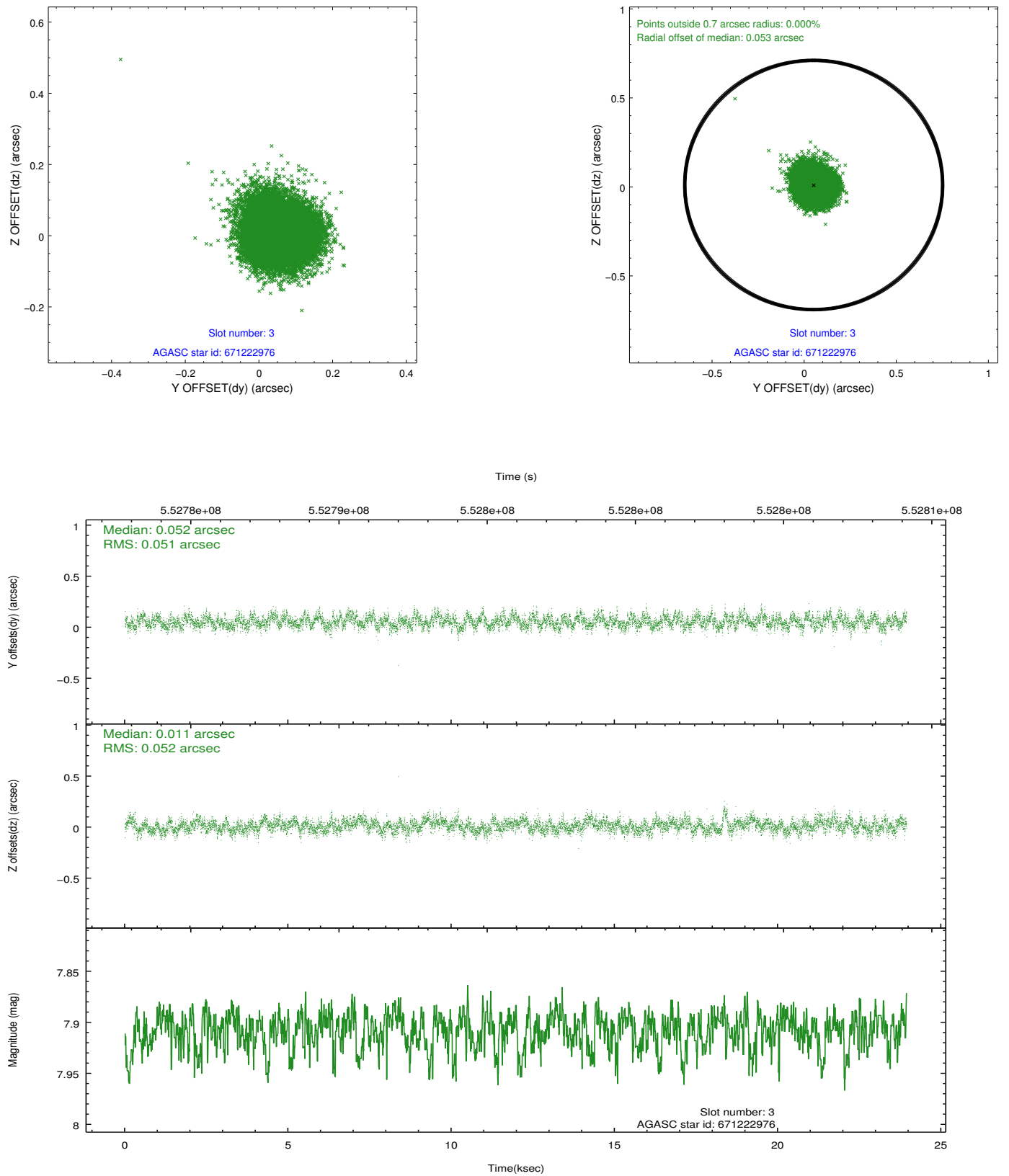


Slot Statistics

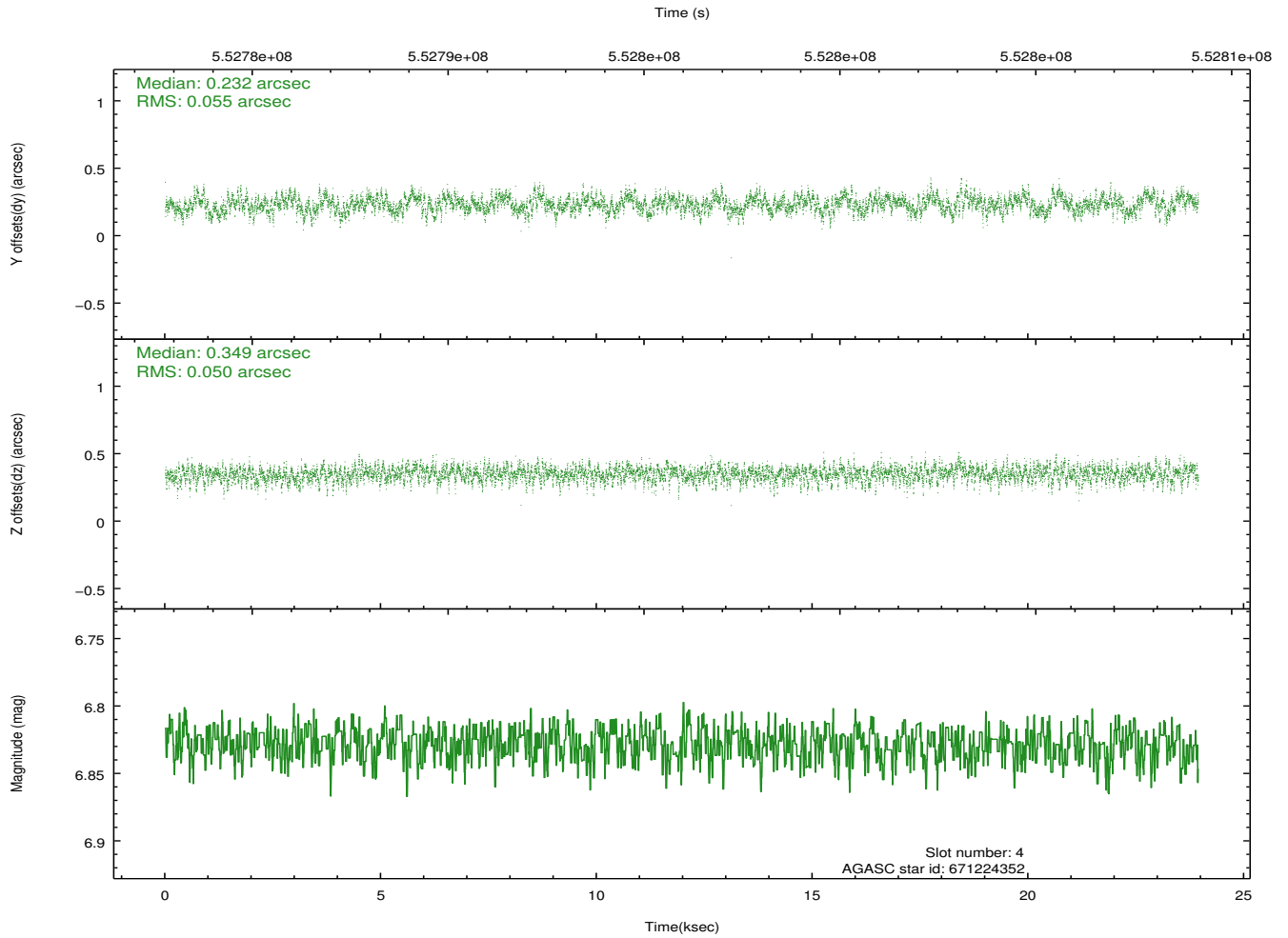
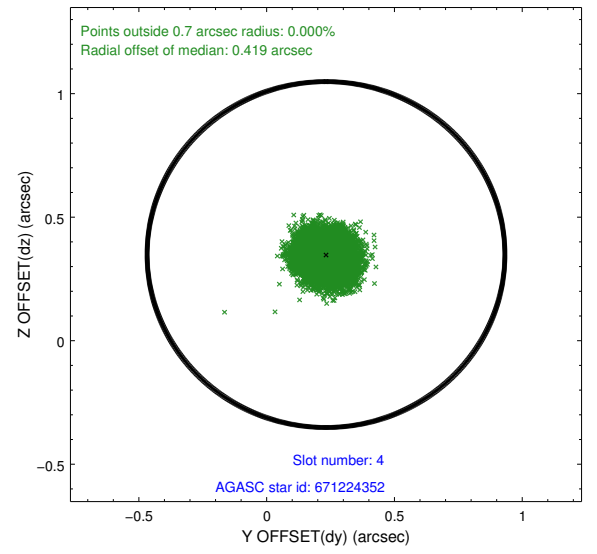
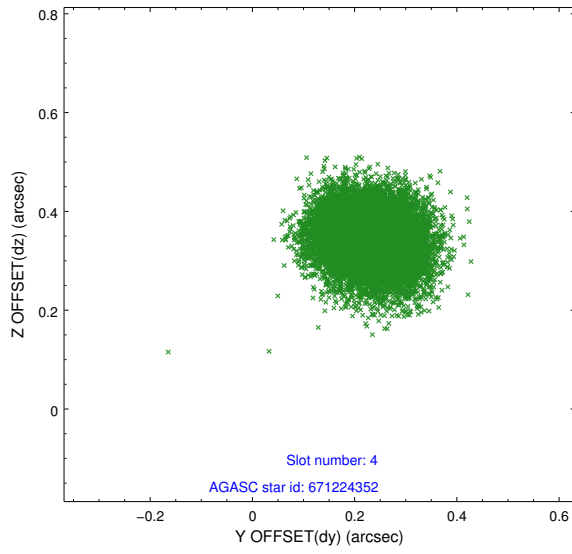
slot	status	used	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID		ACIS-S-1	7.05	5839	0.126	-0.034	0.019	0.035	0.000000	0.000000	924.47	-1735.67
1	FID		ACIS-S-5	7.08	5839	-0.258	0.075	0.014	0.020	0.000000	0.000000	-1824.87	161.80
2	FID		ACIS-S-6	7.20	5839	0.109	-0.032	0.014	0.028	0.000000	0.000000	389.81	805.85
3	GUIDE	used	671222976	7.91	11676	0.052	0.011	0.078	0.123	281.033634	-5.005625	-2245.14	1172.40
4	GUIDE	used	671224352	6.83	11679	0.232	0.349	0.080	0.128	280.197595	-4.496426	-102.85	-1614.20
5	GUIDE	used	671224408	8.92	11603	0.185	0.392	0.097	0.157	280.545473	-4.404085	-1387.00	-1477.07
6	GUIDE	used	671761568	8.38	11675	-0.245	-0.361	0.103	0.163	280.250283	-5.657644	1217.57	2355.64
7	GUIDE	used	671763744	7.51	11674	-0.222	-0.384	0.116	0.175	280.132895	-5.707615	1674.90	2373.36

2.4 Star Slots

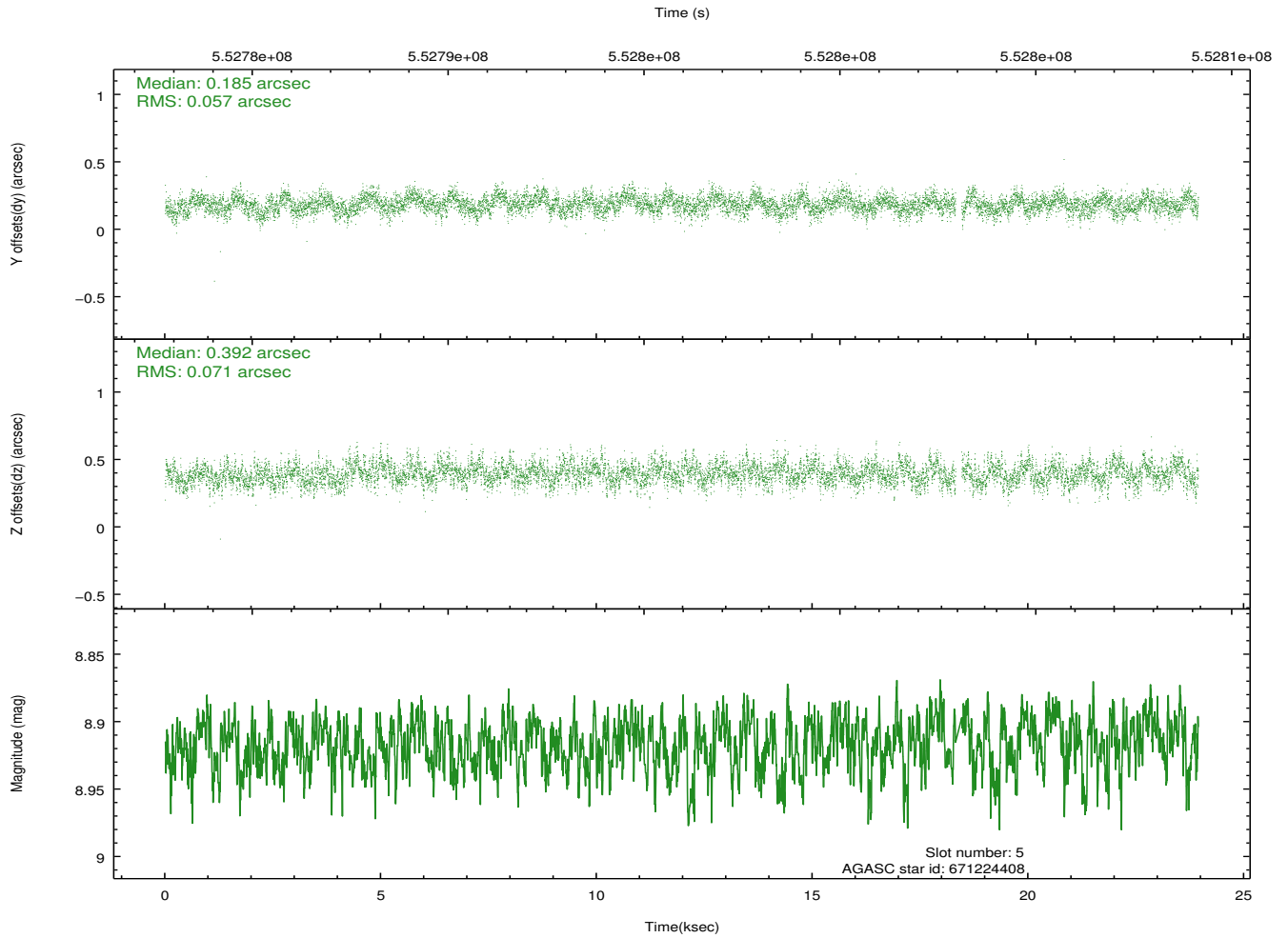
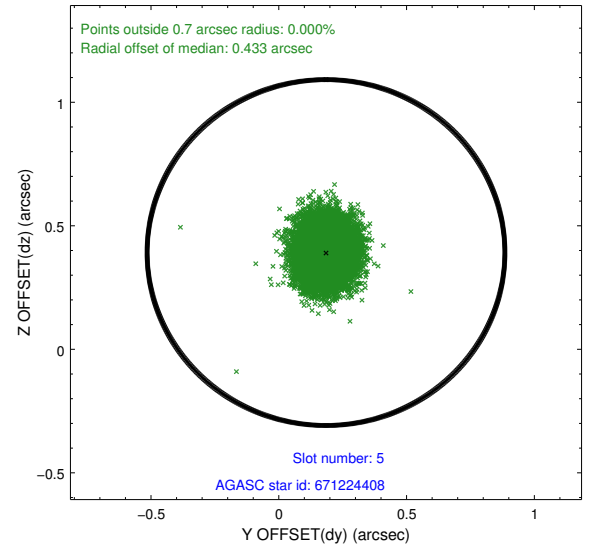
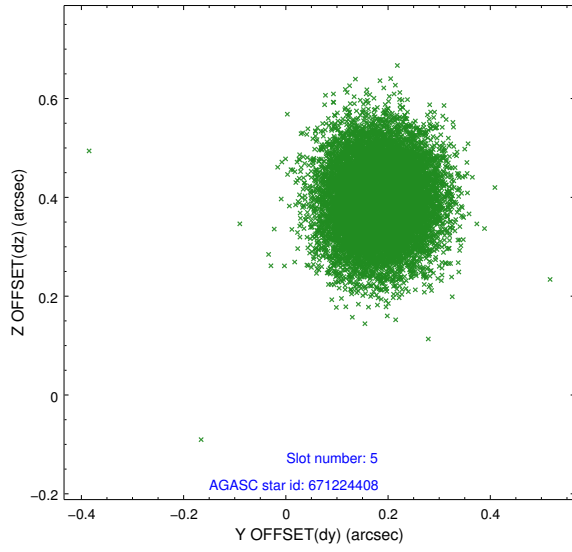
2.4.1 Slot 3



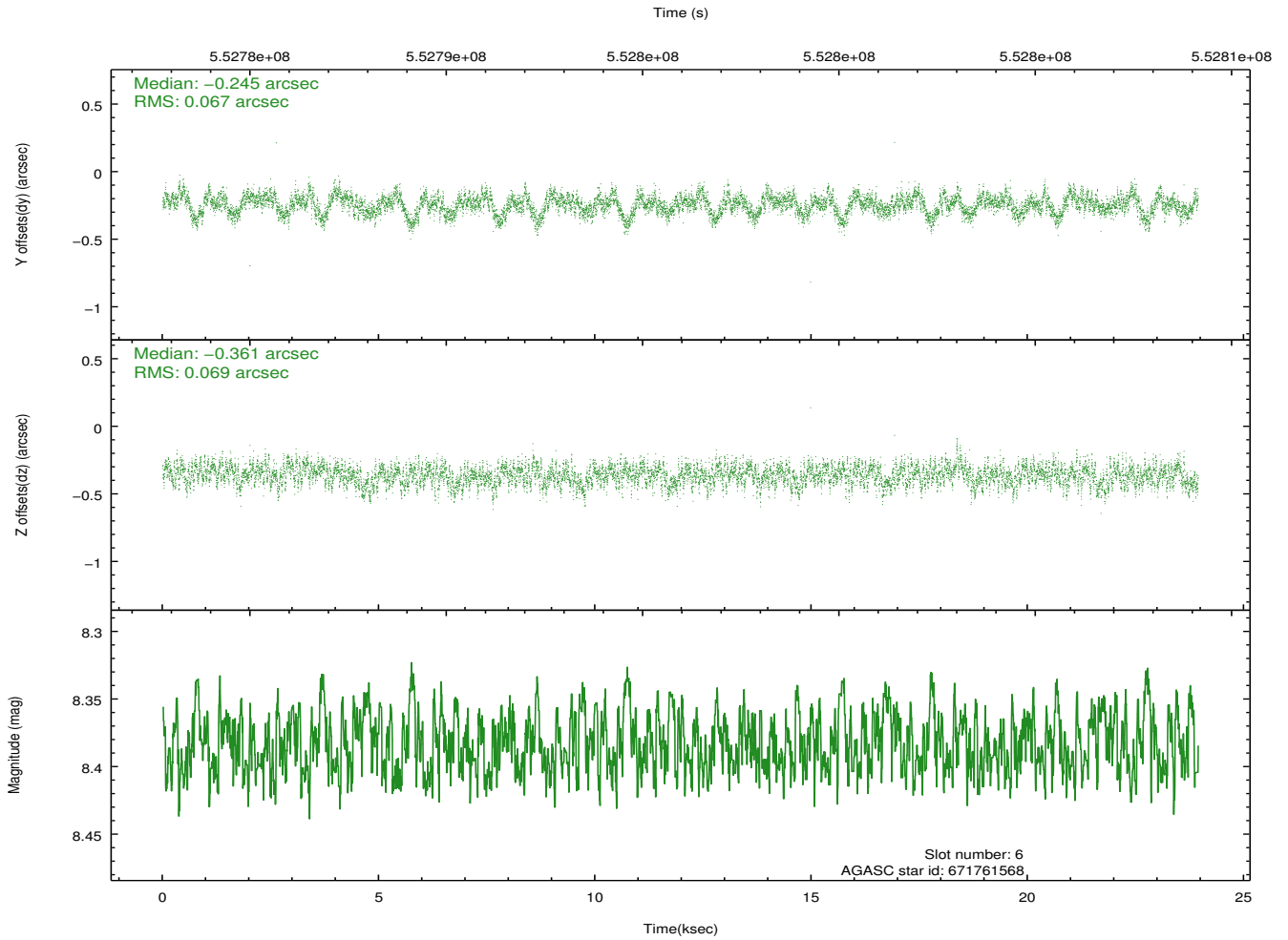
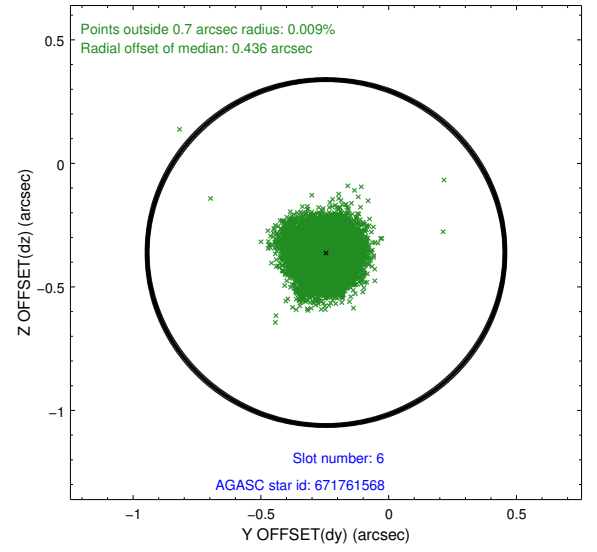
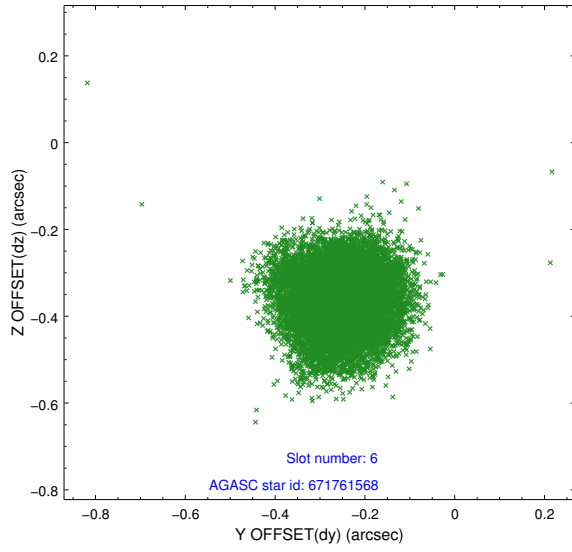
2.4.2 Slot 4



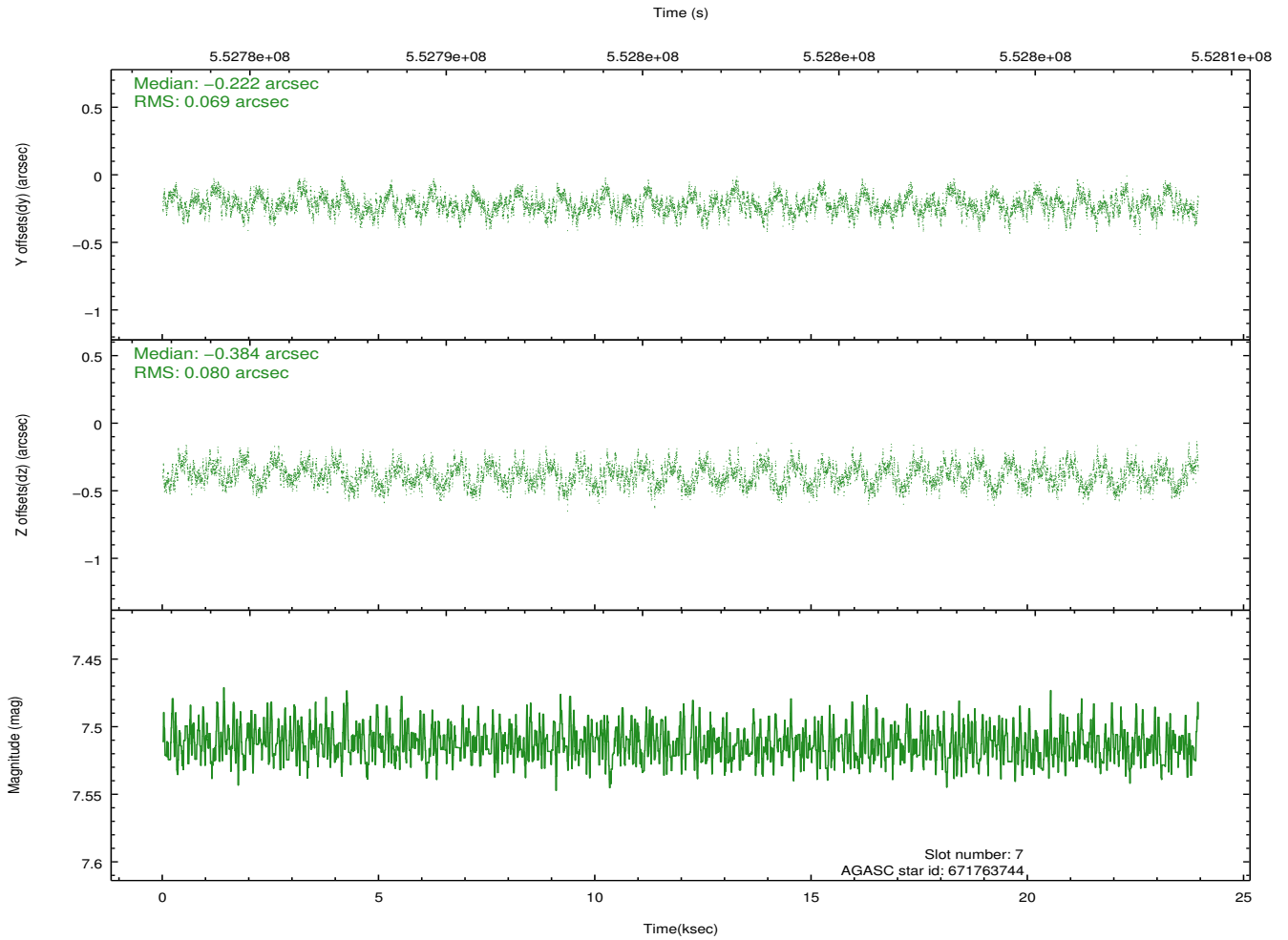
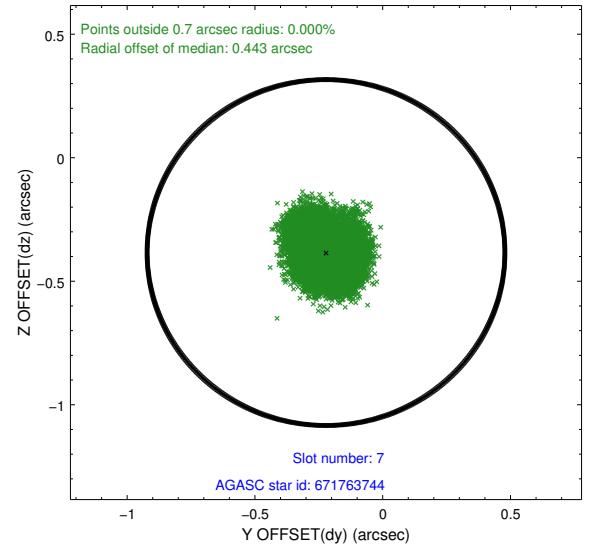
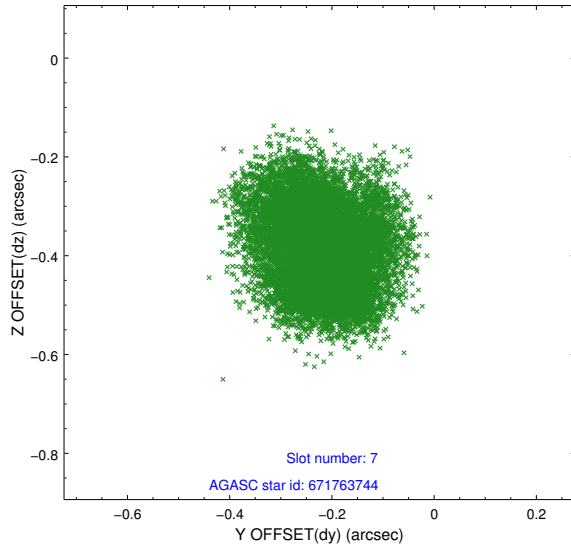
2.4.3 Slot 5



2.4.4 Slot 6

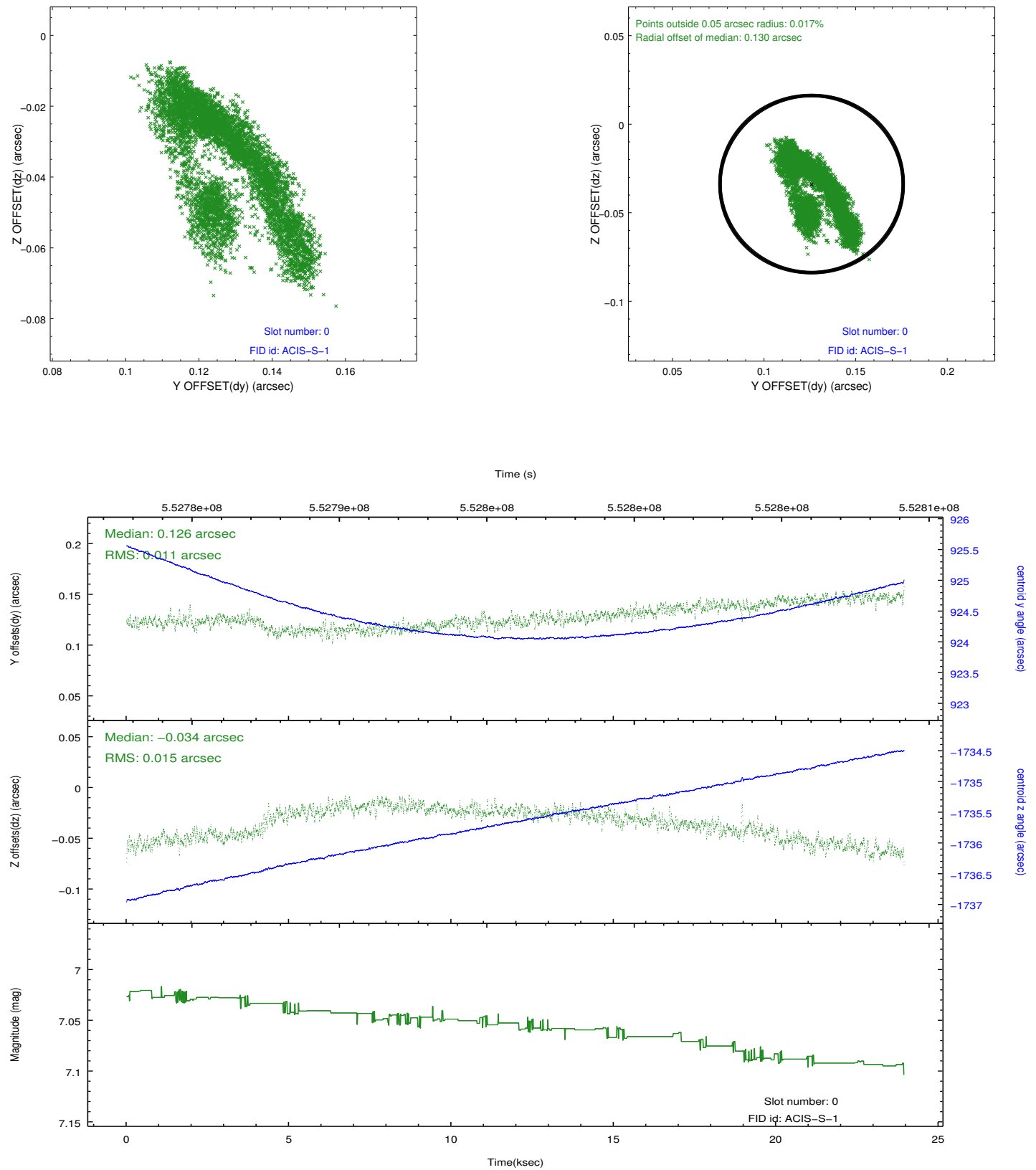


2.4.5 Slot 7

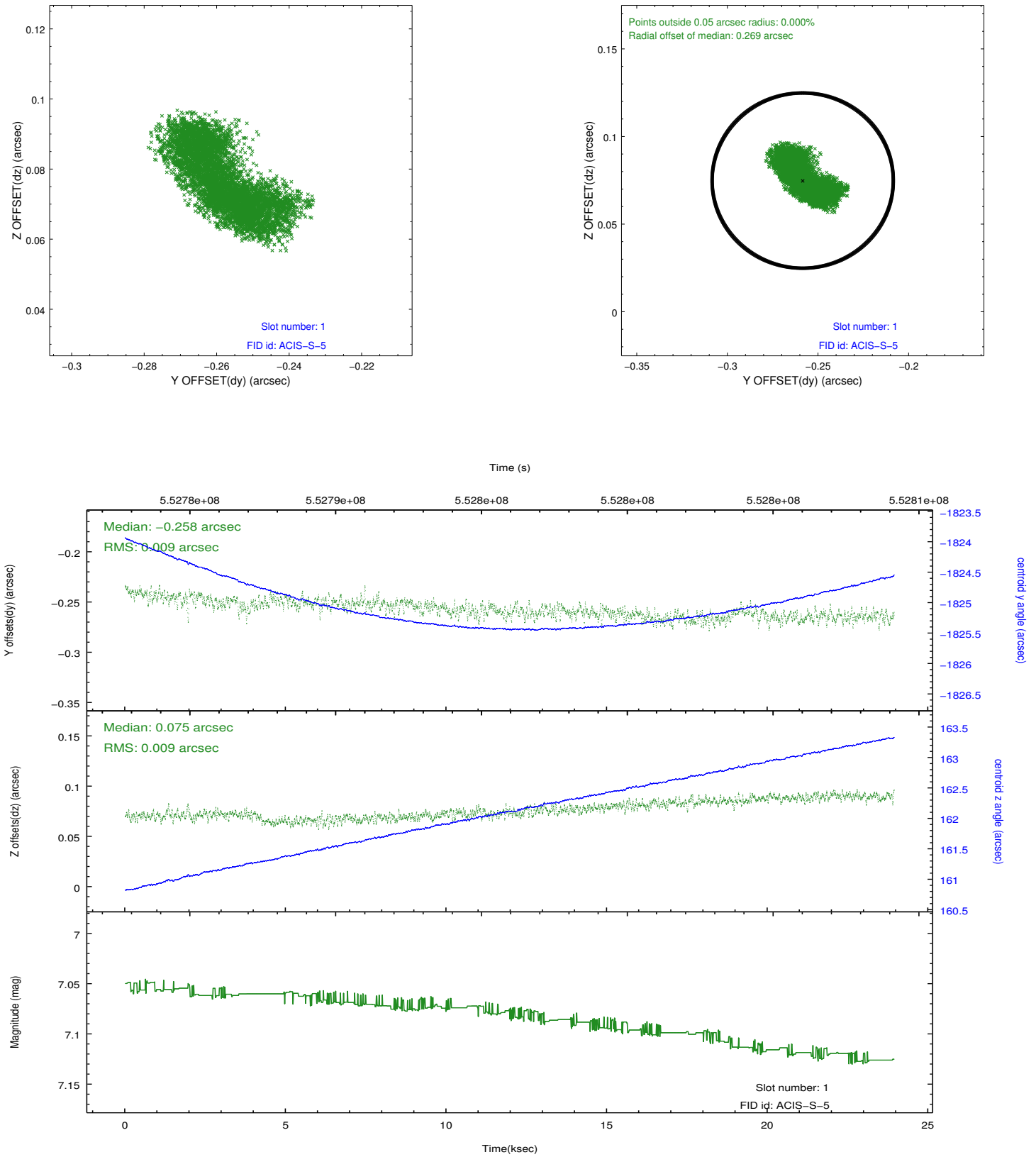


2.5 FID Slots

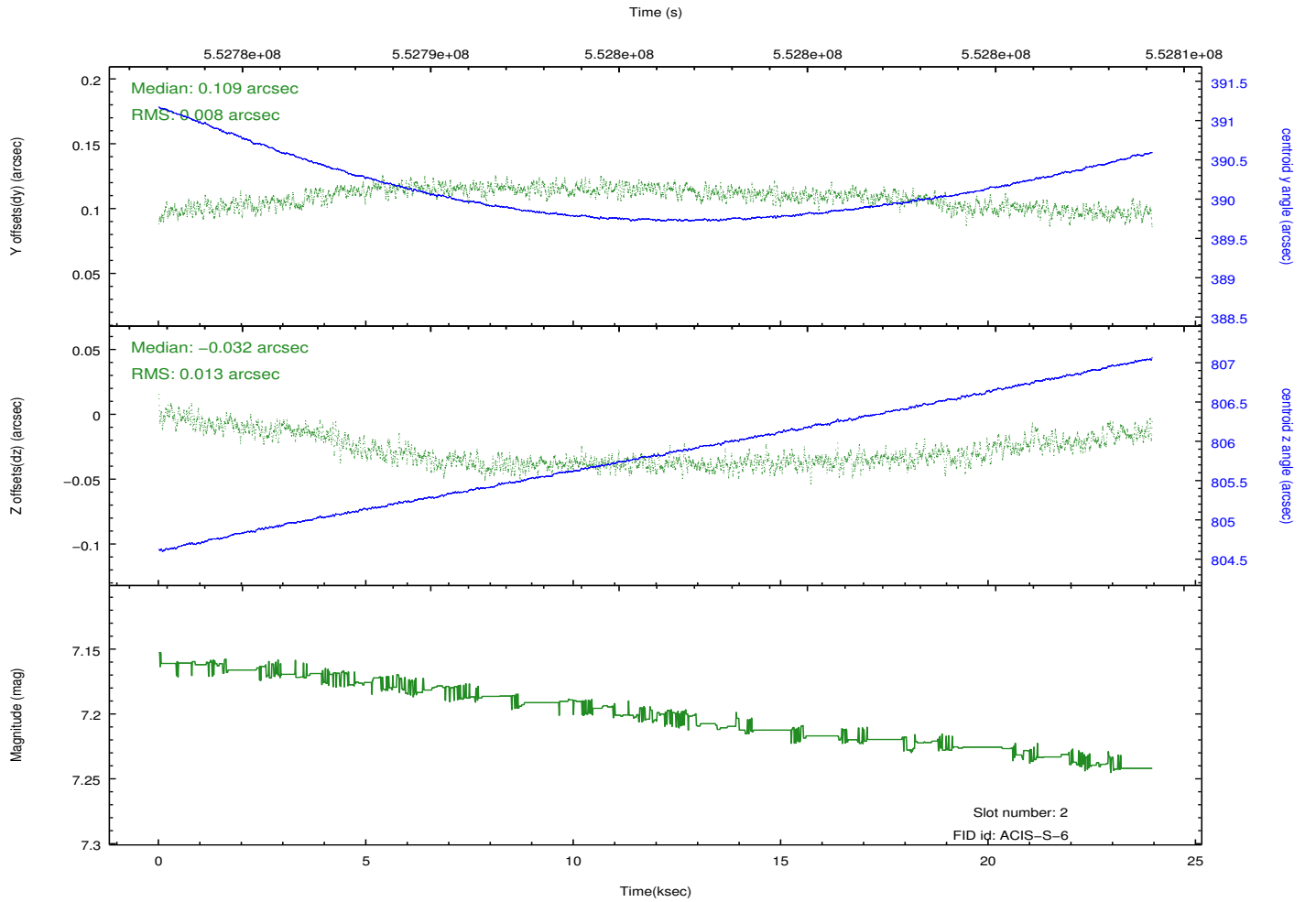
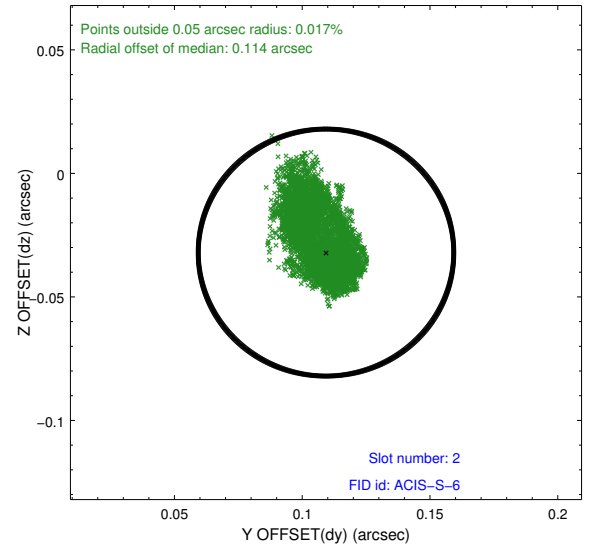
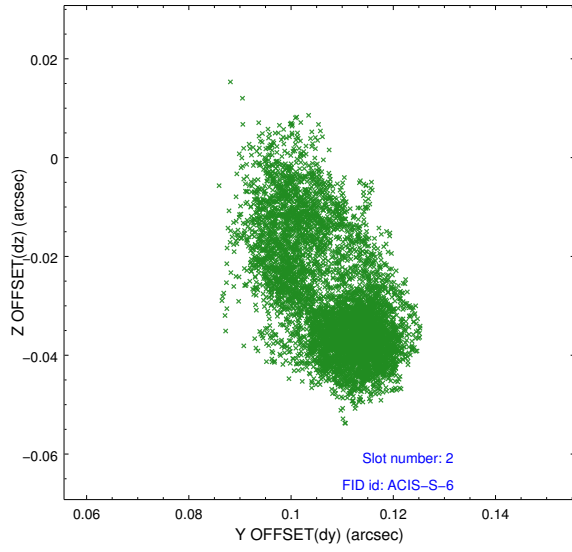
2.5.1 Slot 0



2.5.2 Slot 1



2.5.3 Slot 2



A Summary

A.1 Status

V&V Scientist	Beth Sundheim
V&V Date (YYYY-MM-DD)	2015.07.09
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	23.566200181365

A.2 Comments