

V&V Reference Report

L2 ASCDS Version : 10.1.1

Observation 14948 - L2 Version 3
Chandra X-Ray Center

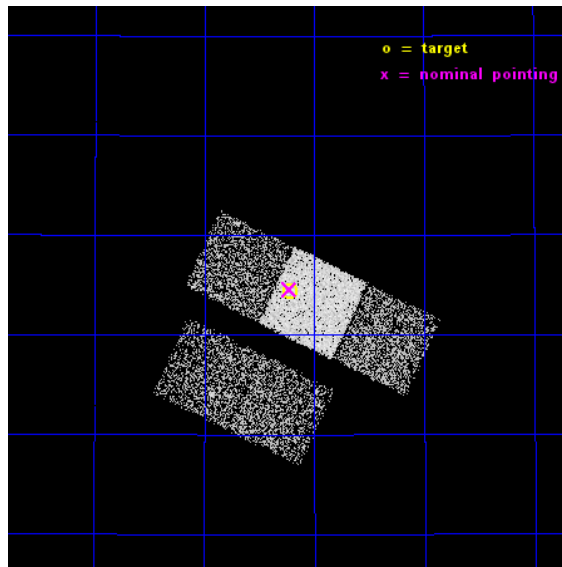
L2 Processing Date : Dec 8 2014

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1 Front

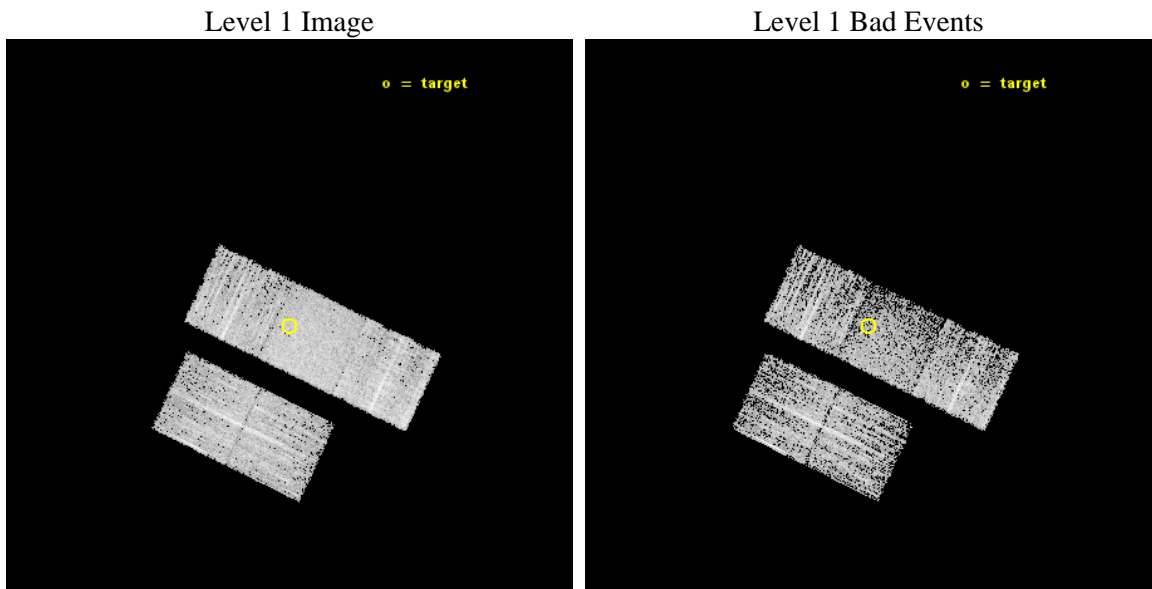
seq_num	702757	Sequence number
obs_id	14948	Observation id
title	Understanding the Nature of PHL 1811 Analogs	Proposal title
observer	Prof. William Brandt	Principal investigator
object	SDSS J1539+3954	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	234.80625	Observer's specified target RA [deg]
dec_targ	39.9065	Observer's specified target Dec [deg]
ra_nom	234.80673768591	Nominal RA [deg]
dec_nom	39.909580418329	Nominal Dec [deg]
roll_nom	25.484045328217	Nominal Roll [deg]
revision	3	Processing version of data
ontime	5369.1590436101	Sum of GTIs [s]
livetime	5299.0070279879	Livetime [s]
ontime2	5368.9948835969	Sum of GTIs [s]
ontime3	5369.0769636035	Sum of GTIs [s]
ontime6	5369.1180036068	Sum of GTIs [s]
ontime7	5369.1590436101	Sum of GTIs [s]
ontime8	5369.0359236002	Sum of GTIs [s]
l2events	22437	Number of level 2 events



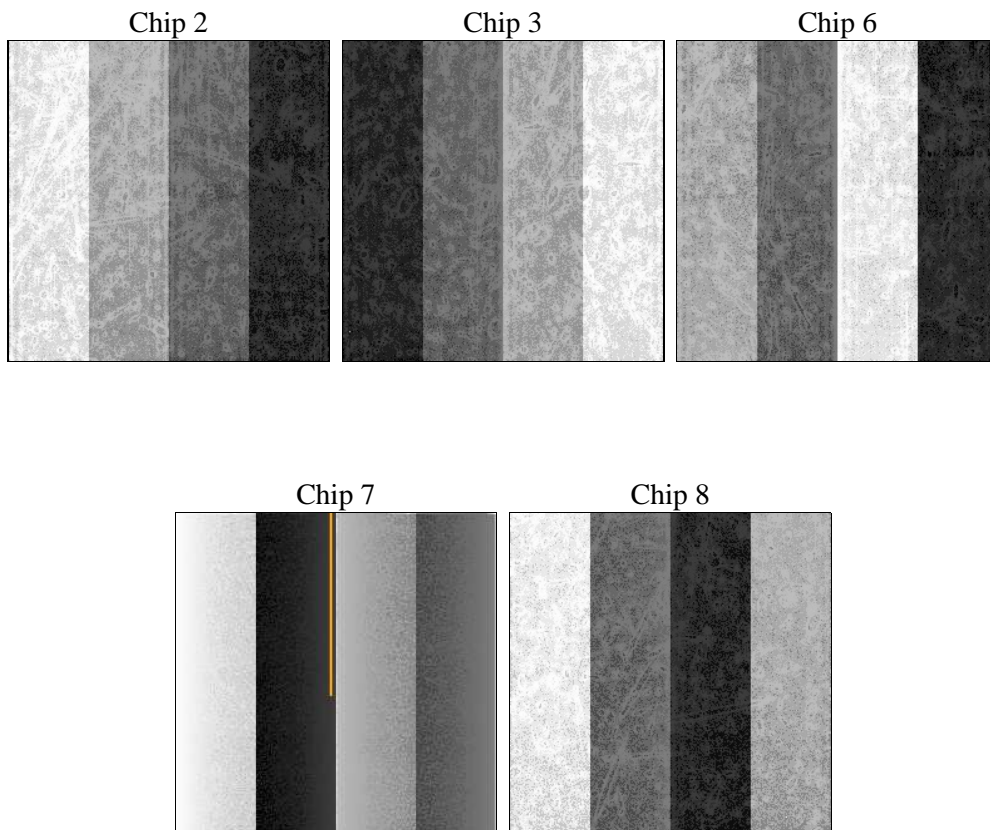
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	5300.000000	[s] Scheduled observation exposure time
ascdsver	10.3.1	Processing system revision	ontime	5369.1590436101	Sum of GTIs [s]
caldbver	4.6.4	 	ontime2	5368.9948835969	Sum of GTIs [s]
date	2014-12-08T07:33:16	Date and time of file creation	ontime3	5369.0769636035	Sum of GTIs [s]
revision	3	Processing version of data	ontime6	5369.1180036068	Sum of GTIs [s]
			ontime7	5369.1590436101	Sum of GTIs [s]
			ontime8	5369.0359236002	Sum of GTIs [s]
			l1events	129362	Number of level 1 events

2.1.4 Events

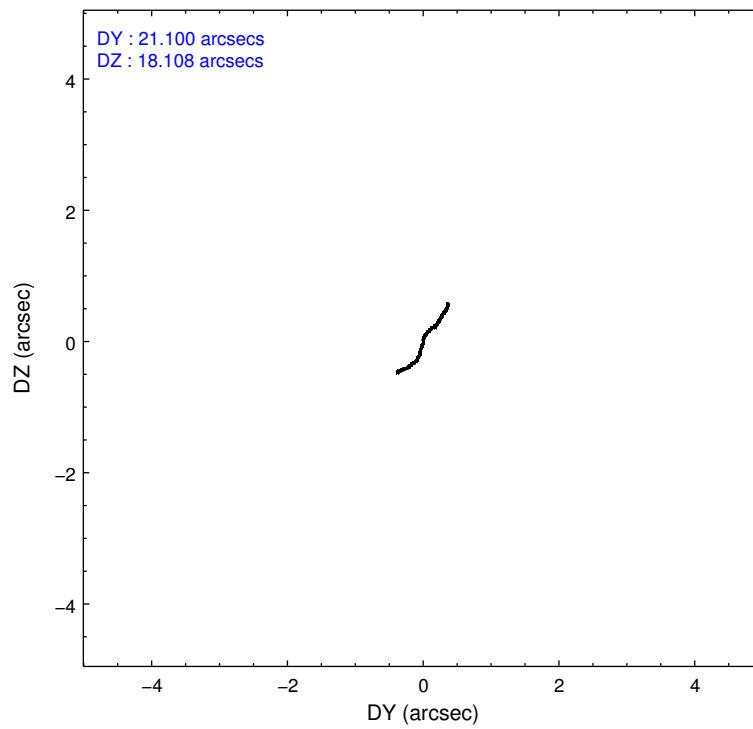
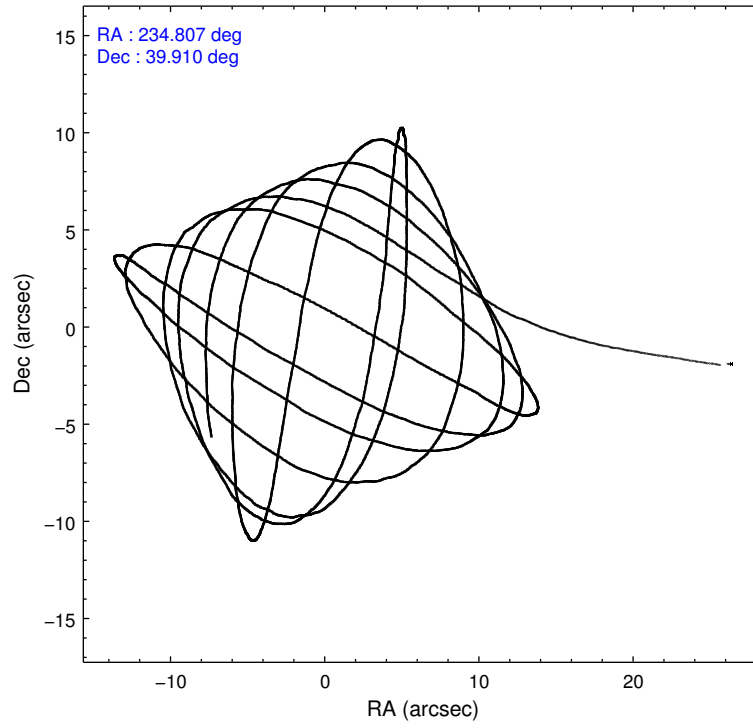
	ccd 2	ccd 3	ccd 6	ccd 7	ccd 8
level 1 events	23586	23074	23720	28342	30640
rejected events	20922	20511	20853	15340	22076
rejected %	88%	88%	87%	54%	72%

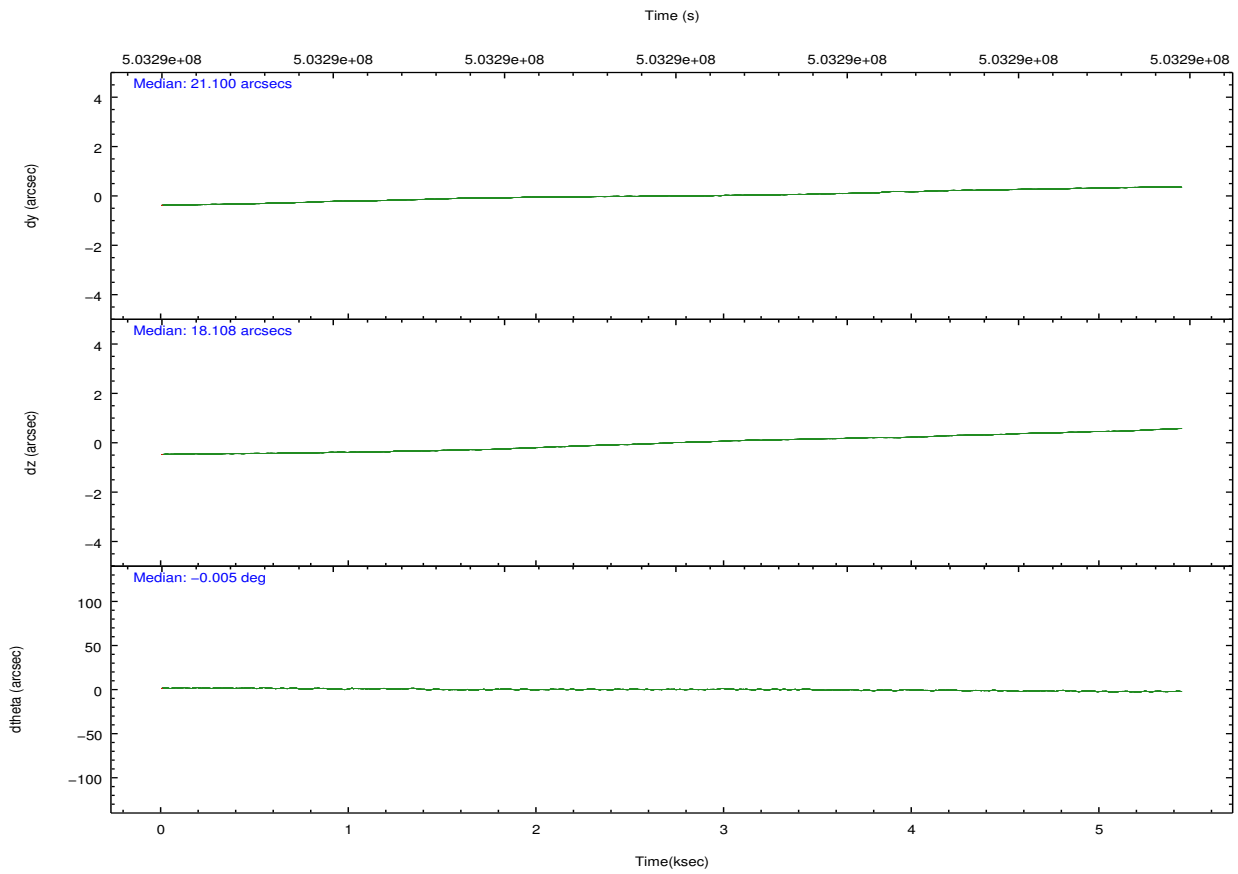
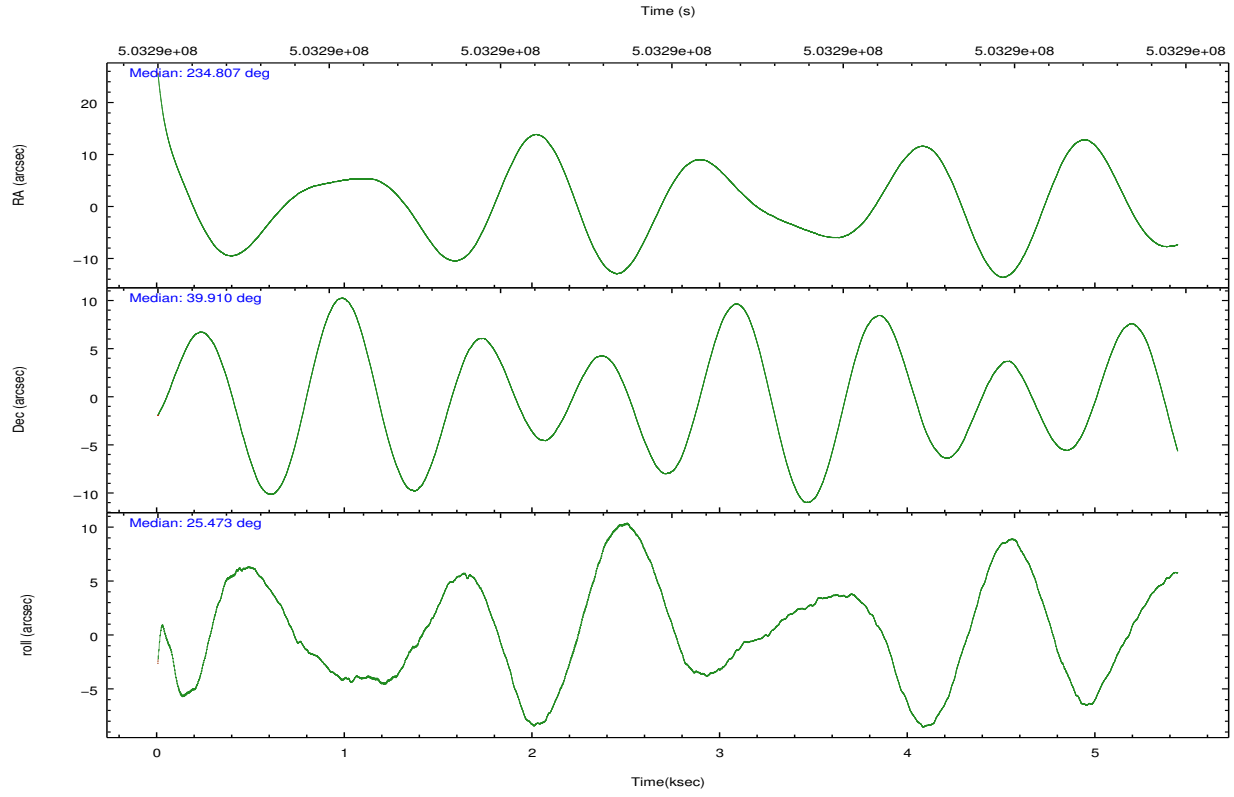
	ccd 2	ccd 3	ccd 6	ccd 7	ccd 8
grade 0 events	1008	960	1017	1264	2408
	4%	4%	4%	4%	7%
grade 1 events	16	10	7	47	20
	0%	0%	0%	0%	0%
grade 2 events	614	546	657	2829	2032
	2%	2%	2%	9%	6%
grade 3 events	291	278	310	1182	972
	1%	1%	1%	4%	3%
grade 4 events	280	266	263	1133	888
	1%	1%	1%	3%	2%
grade 5 events	887	1123	1083	2934	1633
	3%	4%	4%	10%	5%
grade 6 events	478	517	621	6608	2283
	2%	2%	2%	23%	7%
grade 7 events	20012	19374	19762	12345	20404
	84%	83%	83%	43%	66%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-23678	ACIS-23678	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	234.786943	234.8067376859063	CCD I2 on	O1	Y
[deg] Pointing Dec	39.886764	39.90958041832933	CCD I3 on	O2	Y
[deg] Pointing Roll	25.340092	25.48404532821657	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	Y	Y
[s] Observation start time (MET)	503288398.184000	503287247.5418	CCD S5 on	N	N
Observation start date	2013-12-13T02:18:51	2013-12-13T02:00:47	Number of optional ACIS chips dropped	0	0
[s] Observation end time (MET)	503293698.184000	503294447.65469	On-chip summing requested	N	N
Observation end date	2013-12-13T03:47:11	2013-12-13T04:00:47	Subarray requested	NONE	NONE
Read mode	TIMED	TIMED	Alternating exposures requested	N	N
			[s] Primary exposure time	0.000000	3.1

2.3 Aspect





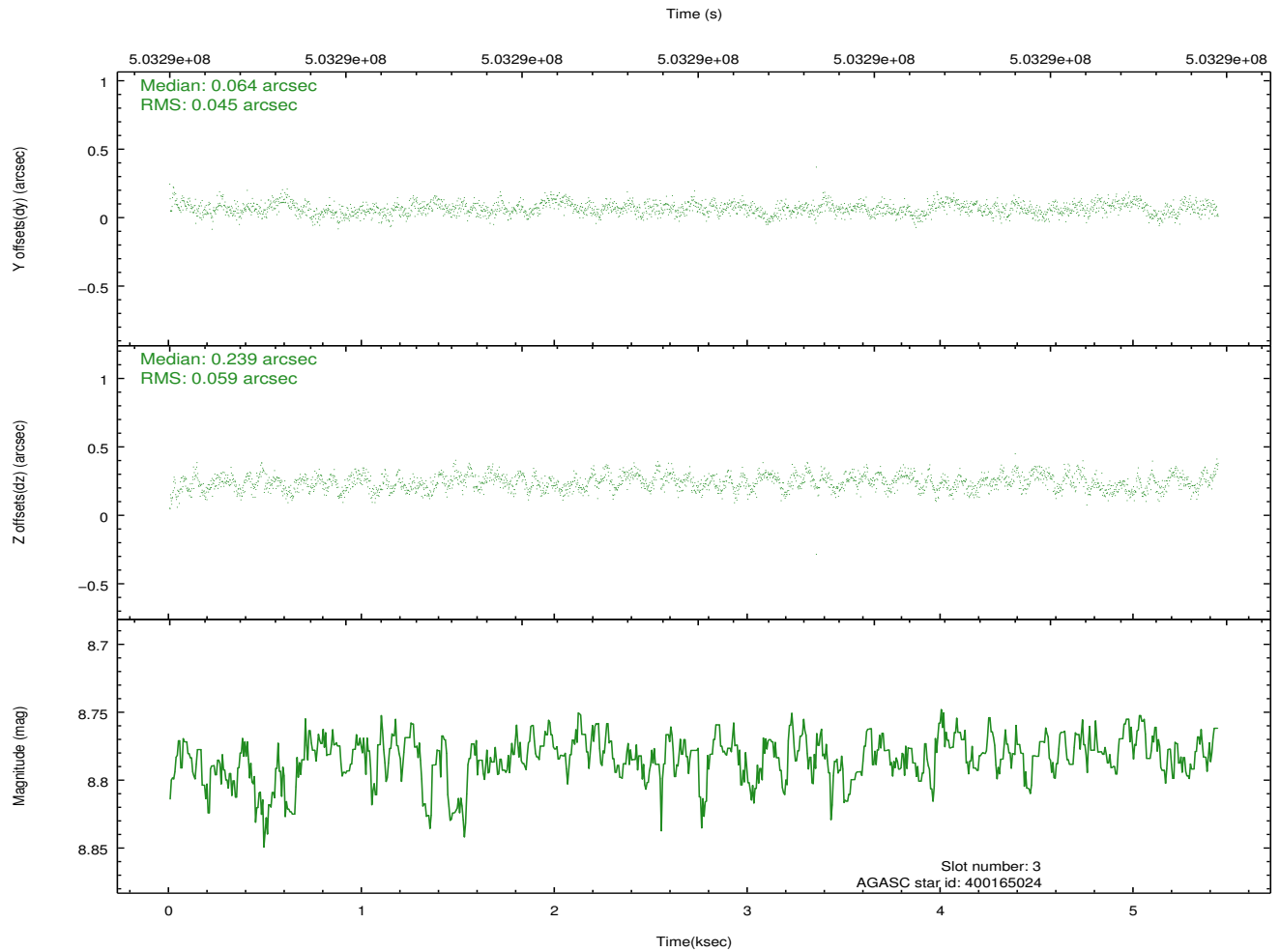
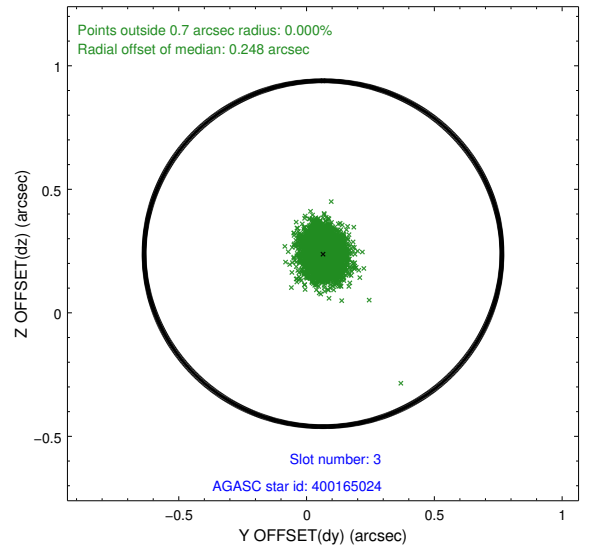
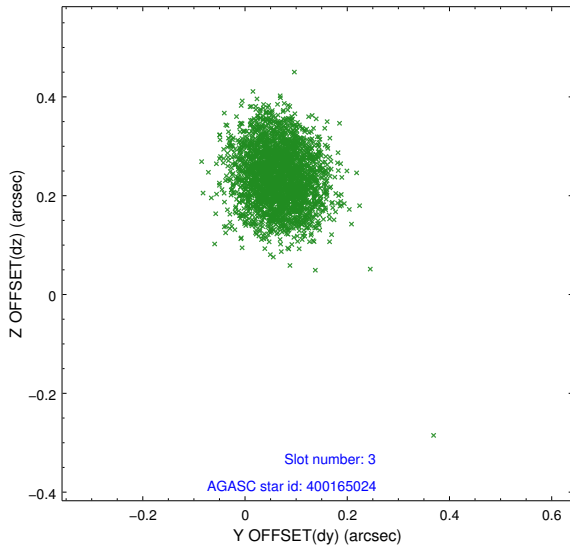
Slot Statistics

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	1326	0.044	-0.015	0.015	0.026	0.000000	0.000000	921.82	-1735.16
1	FID		ACIS-S-4	7.06	1326	0.181	-0.006	0.012	0.018	0.000000	0.000000	2139.98	167.86
2	FID		ACIS-S-5	7.08	1326	-0.252	0.034	0.008	0.013	0.000000	0.000000	-1825.93	162.77
3	GUIDE	used	400165024	8.78	2652	0.064	0.239	0.079	0.124	234.852278	39.422876	-549.65	-1587.27
4	GUIDE	used	400170088	8.69	2650	0.095	0.403	0.092	0.145	234.624444	39.216656	-1441.36	-1986.43
5	GUIDE	used	400568536	8.57	2652	0.012	-0.235	0.089	0.138	234.227036	40.311987	-732.45	2044.59
6	GUIDE	used	400569512	9.29	2651	-0.203	-0.317	0.140	0.216	234.747797	40.360328	633.16	1586.81
7	GUIDE	used	400162832	7.55	2651	0.028	-0.084	0.081	0.141	233.985694	39.831118	-2088.26	779.46

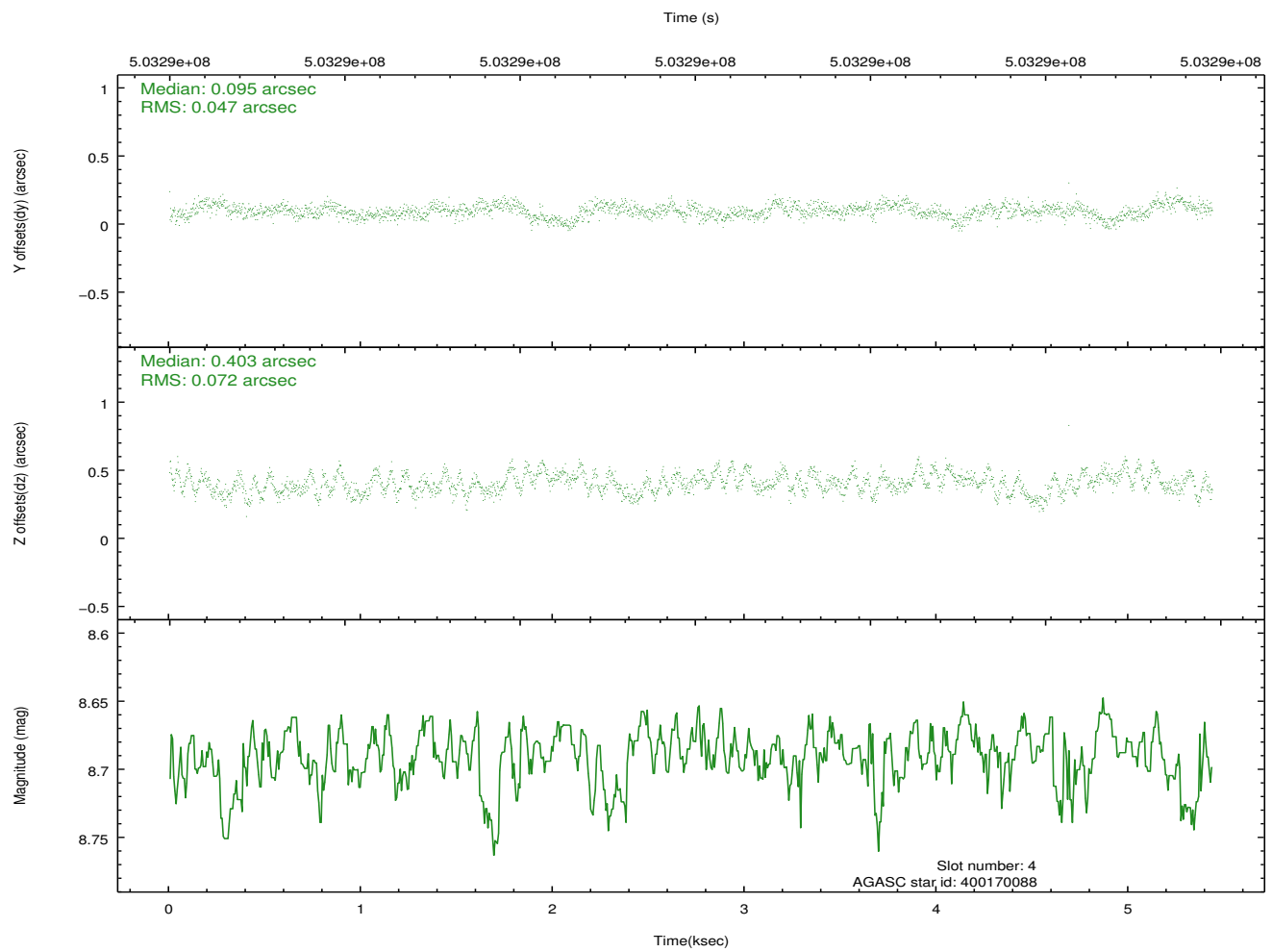
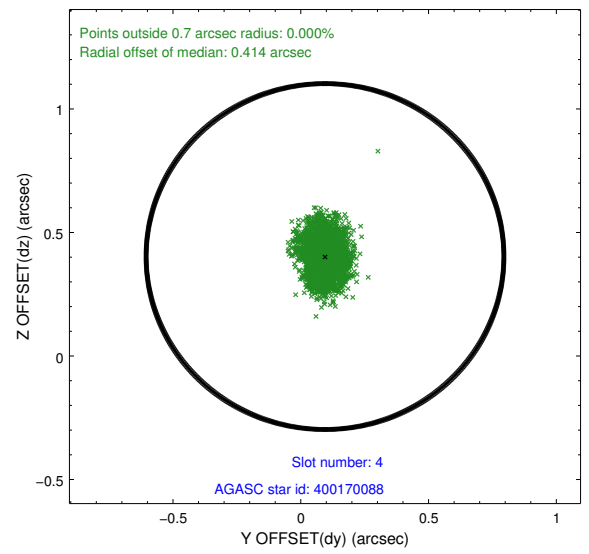
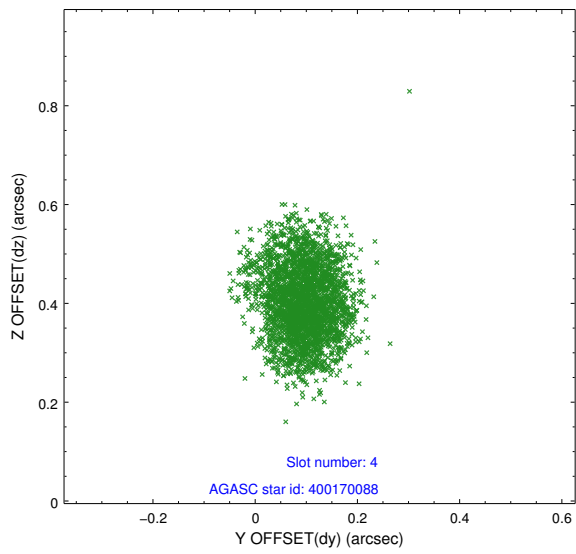
∞

2.4 Star Slots

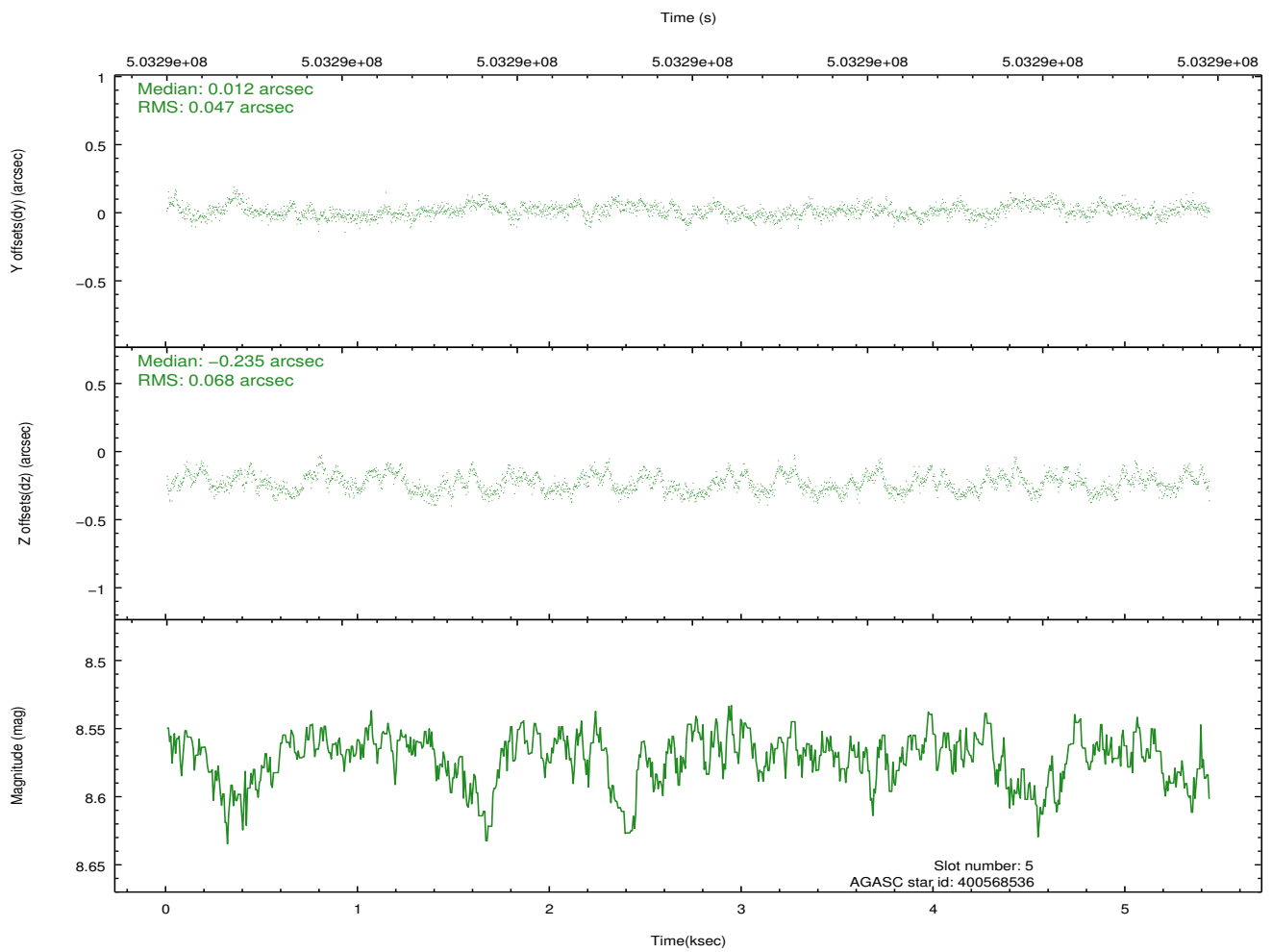
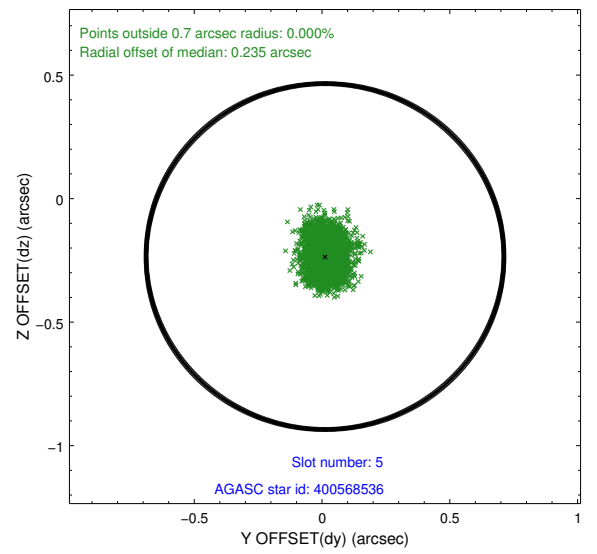
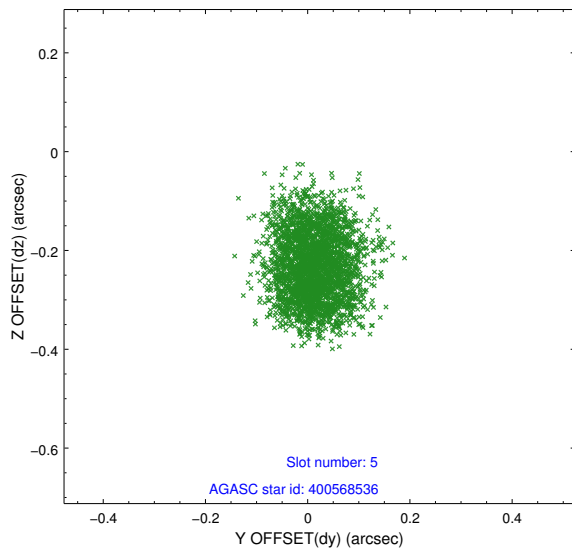
2.4.1 Slot 3



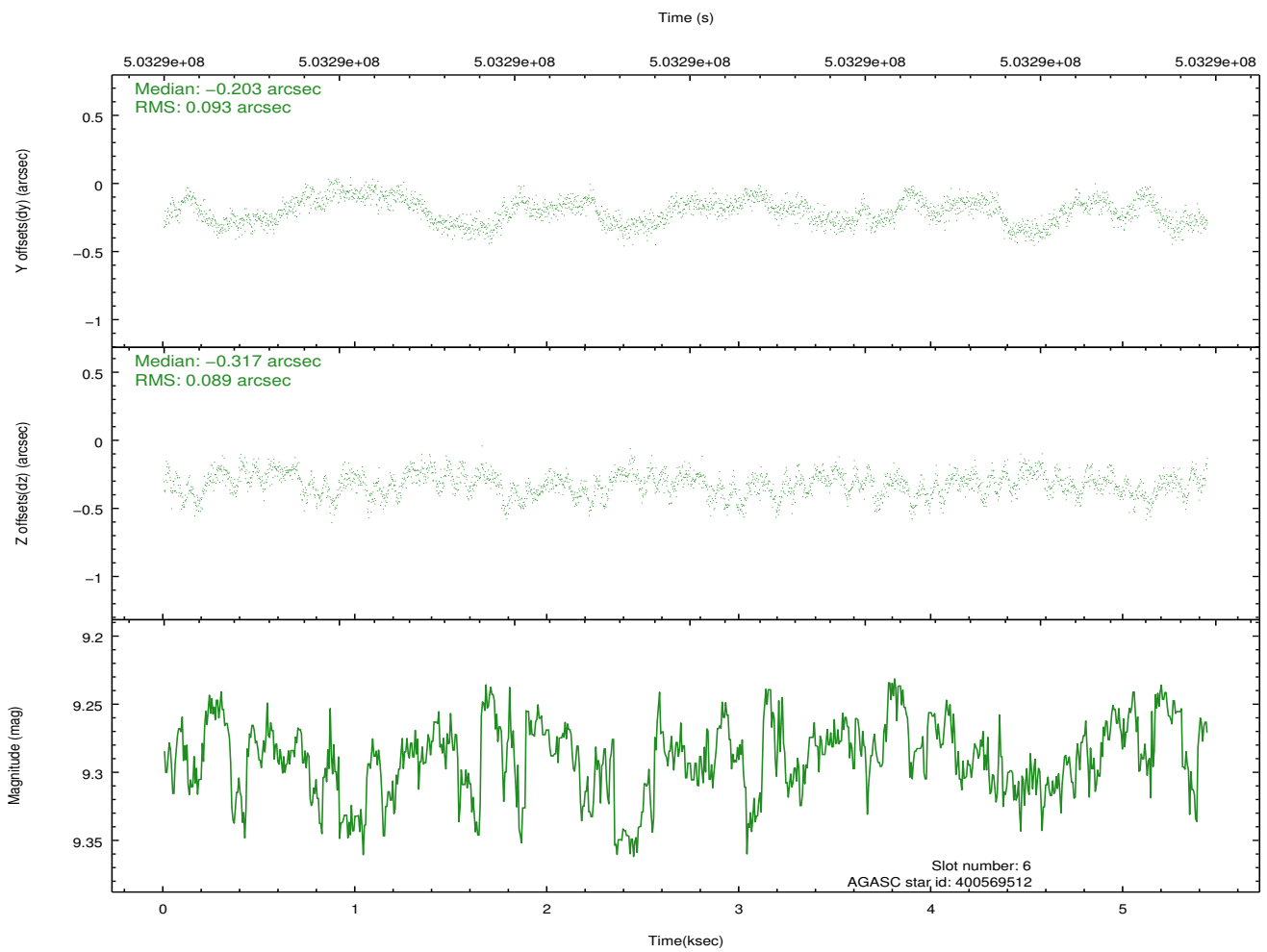
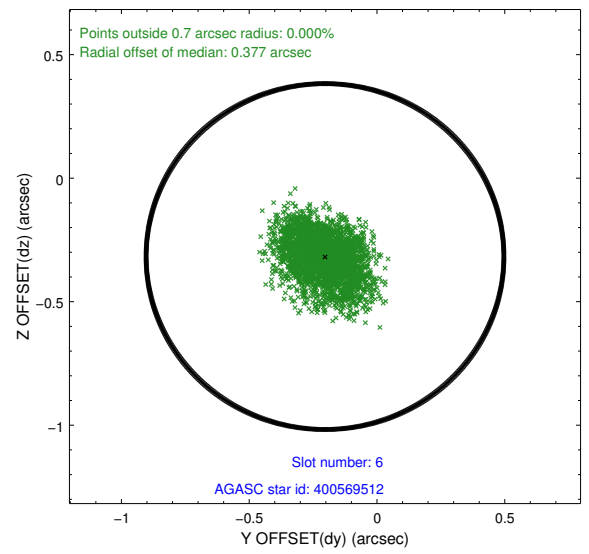
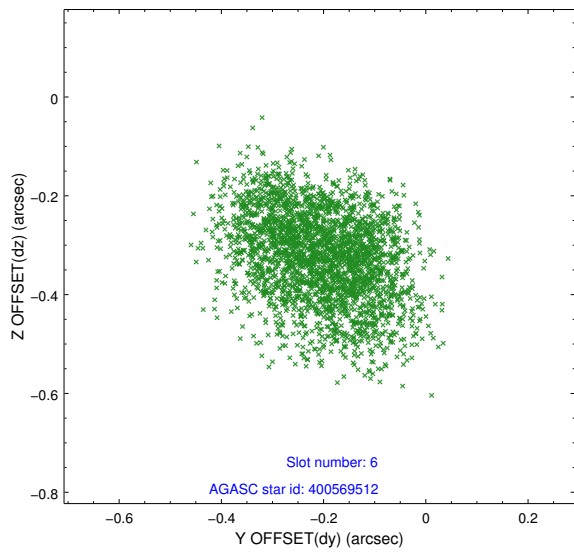
2.4.2 Slot 4



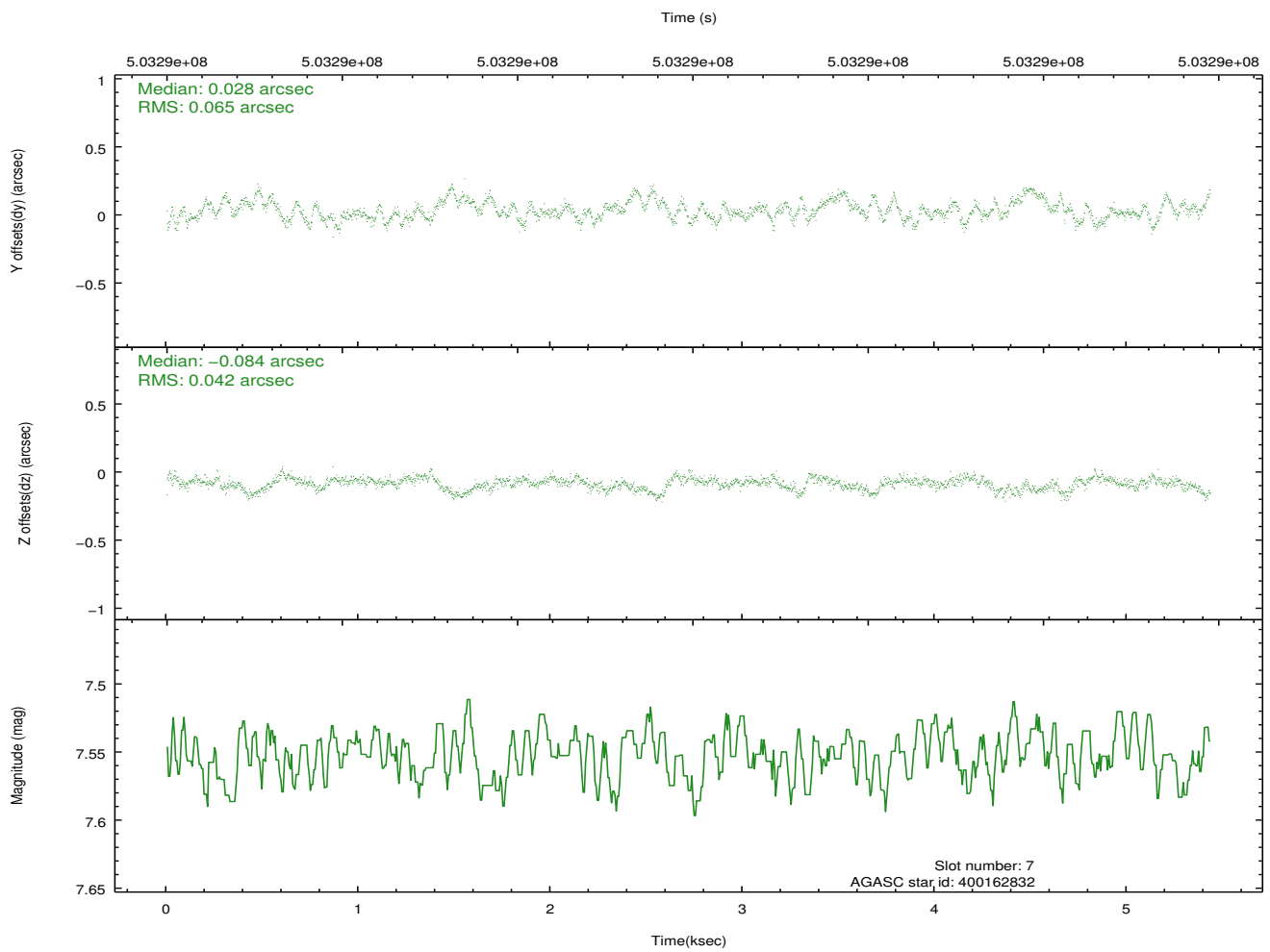
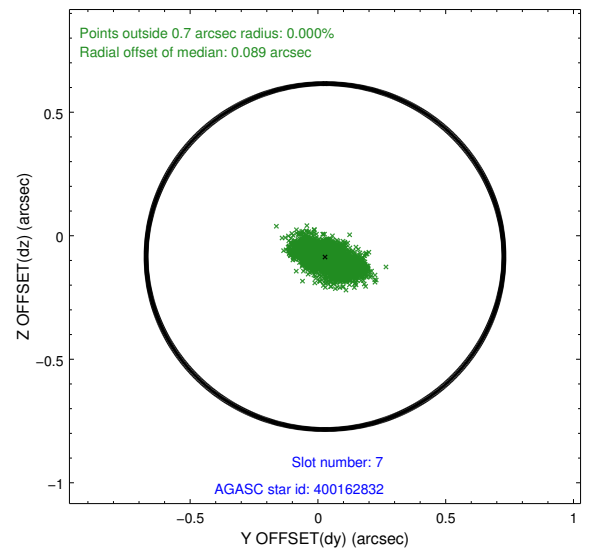
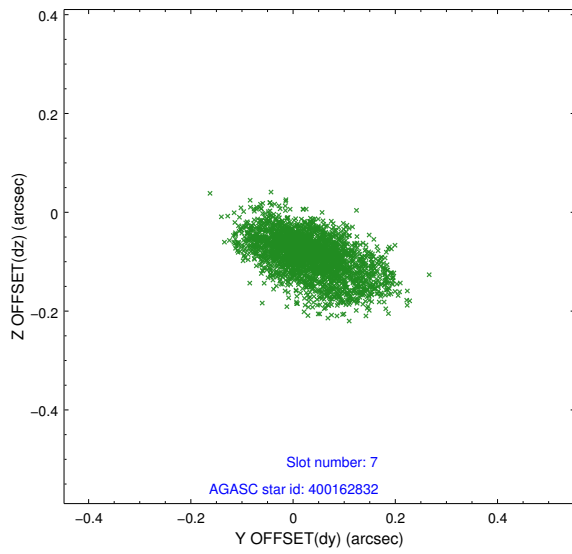
2.4.3 Slot 5



2.4.4 Slot 6

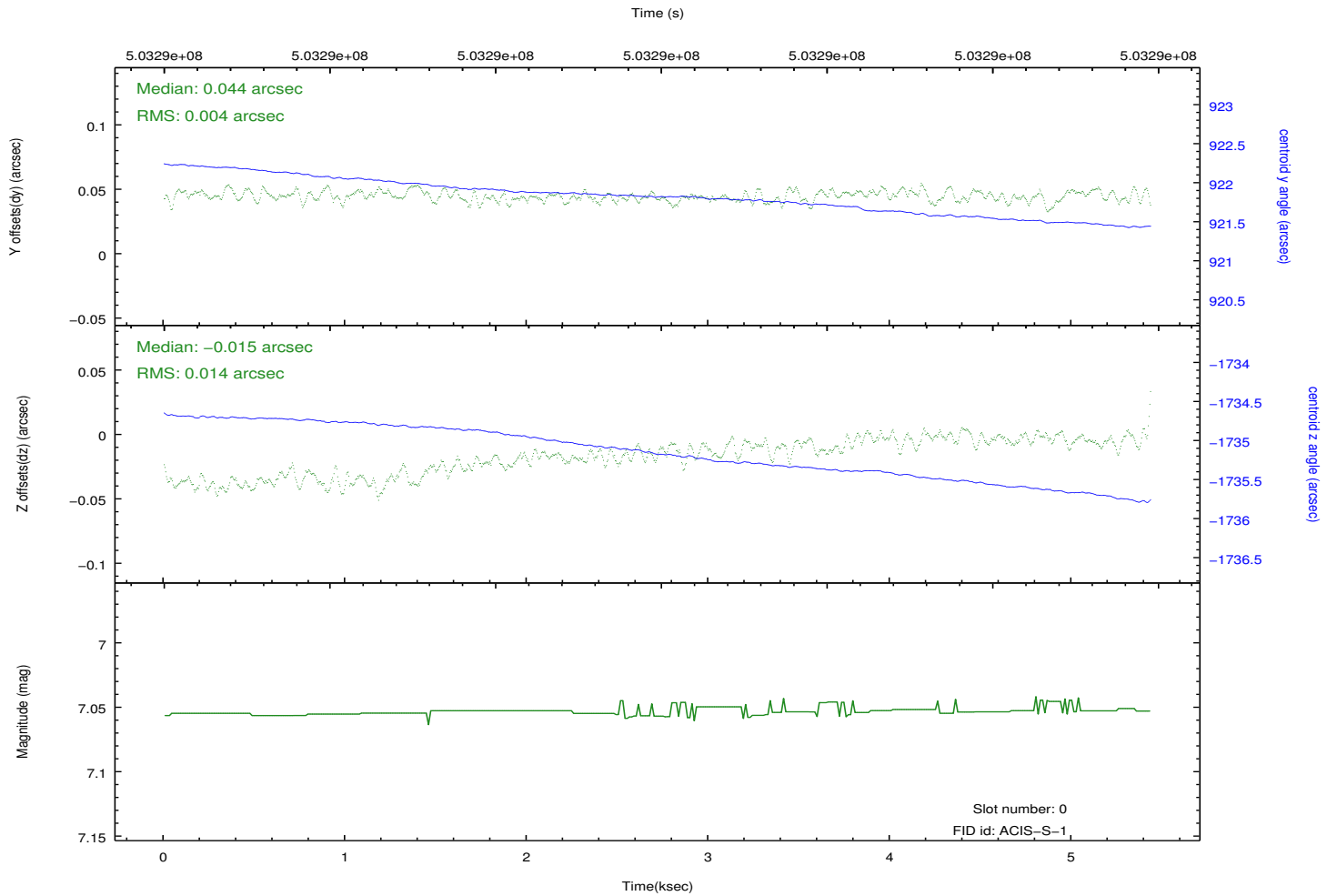
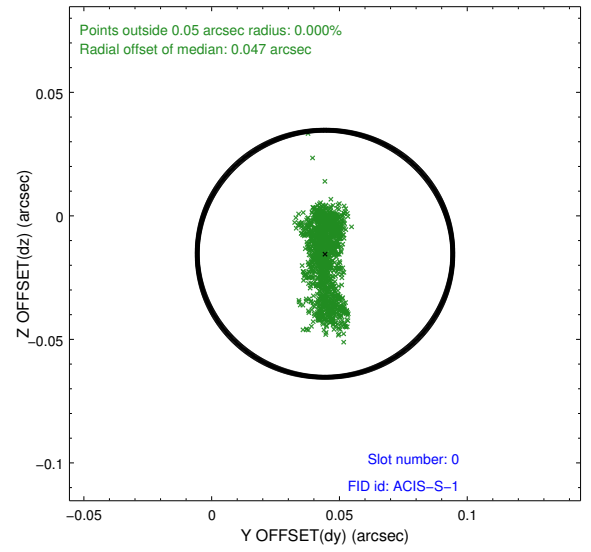
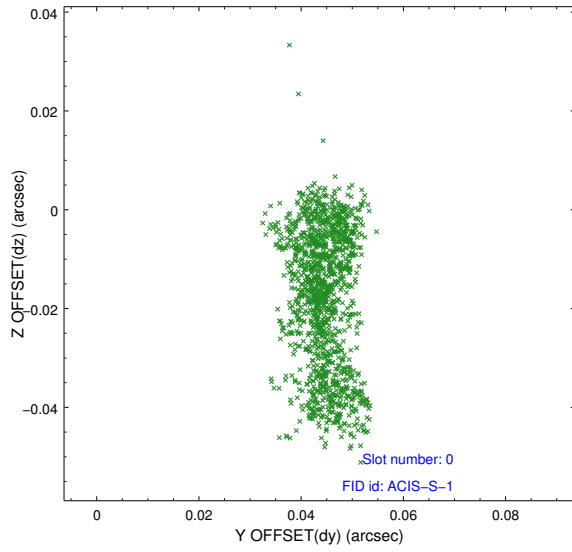


2.4.5 Slot 7

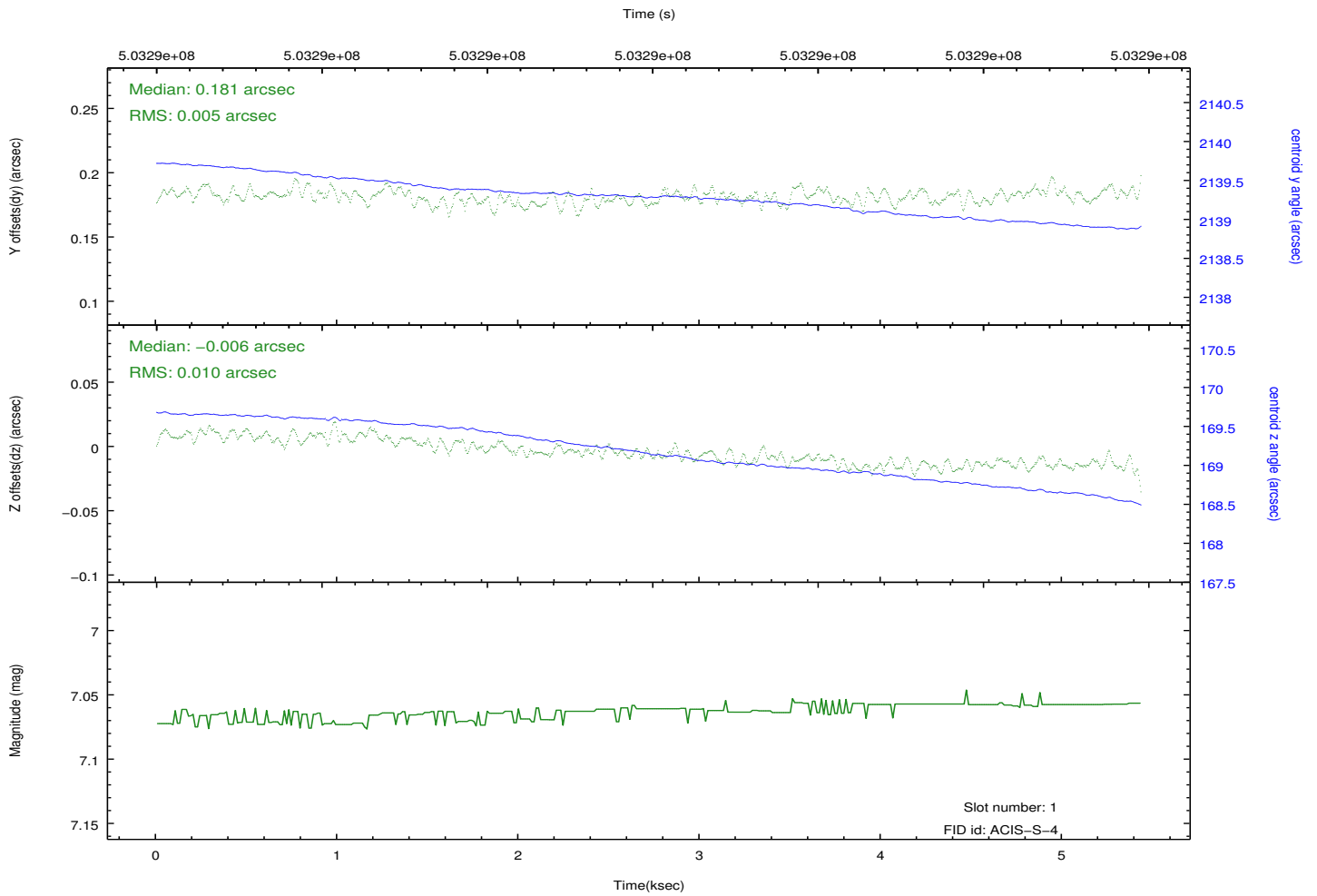
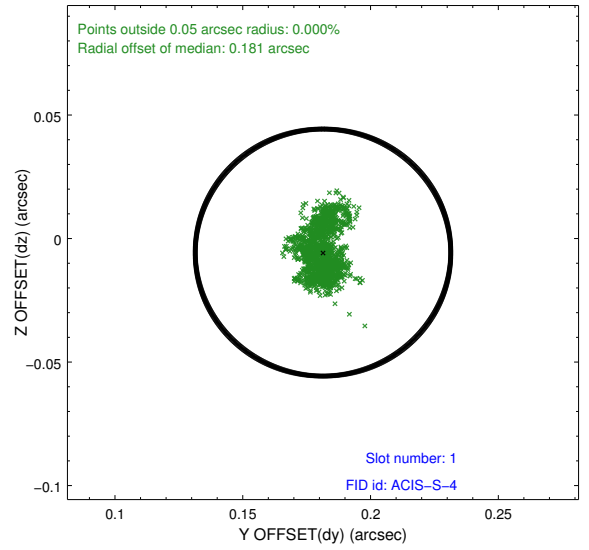
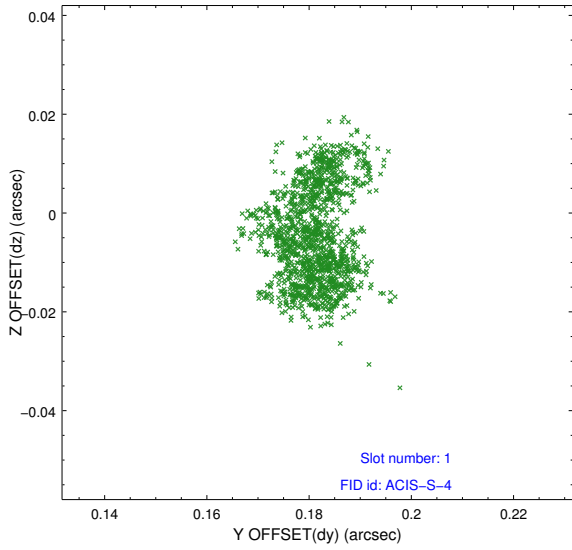


2.5 FID Slots

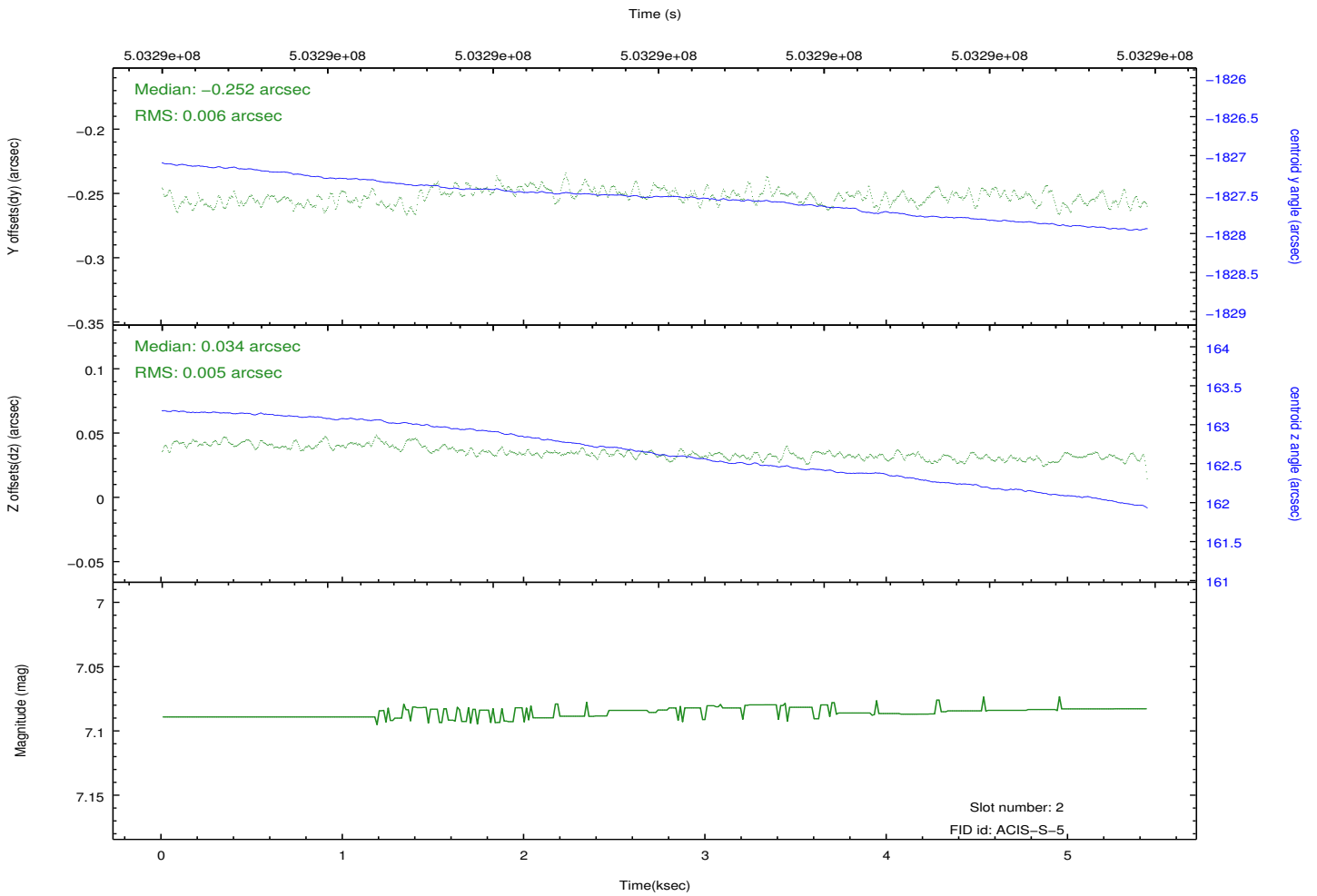
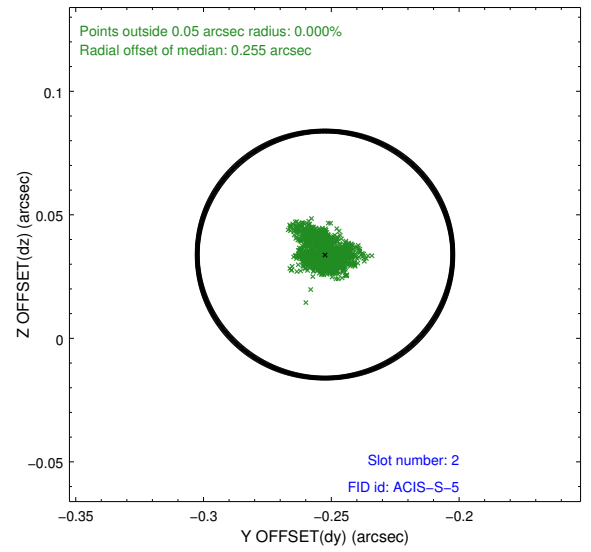
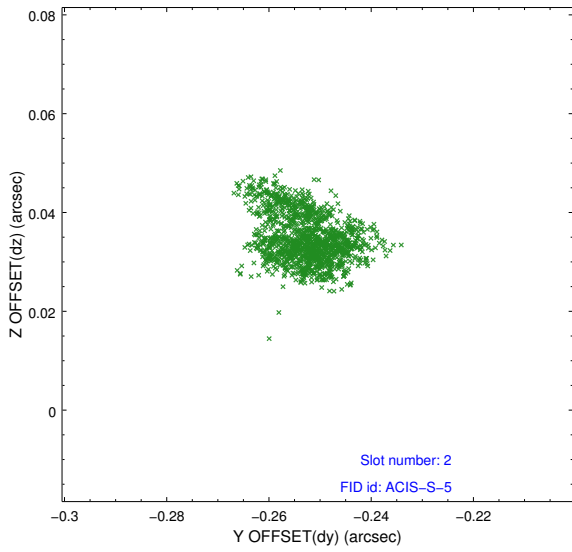
2.5.1 Slot 0



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)	2014.12.15
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	5.3691590436101

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.