

# V&V Reference Report

## L2 ASCDS Version : 8.5.1.1

Observation 15294 - L2 Version 3  
Chandra X-Ray Center

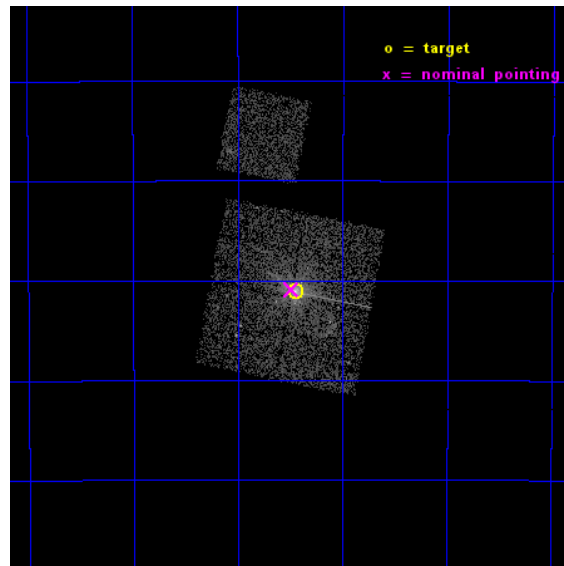
L2 Processing Date : Dec 2 2014

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# 1 Front

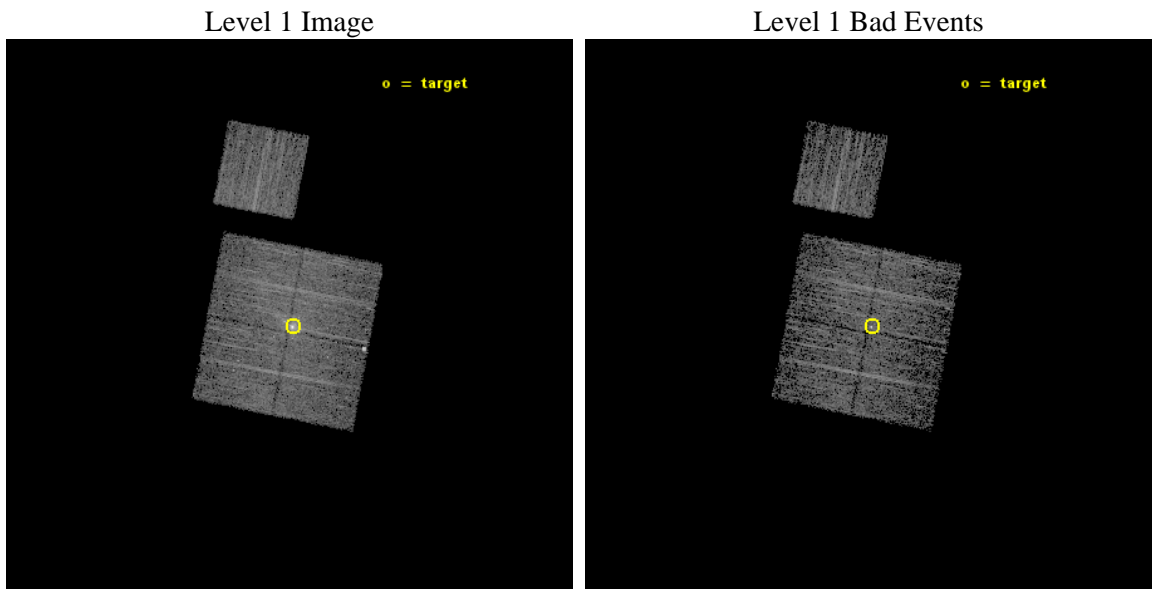
seq_num	702890	Sequence number
obs_id	15294	Observation id
title	Longterm Monitoring of the Jet in Centaurus A	Proposal title
observer	Dr Stephen Murray	Principal investigator
object	Centaurus A	Source name
dtcycle	0	&#160
cycle	P	events from which exps? Prim/Second/Both
ra_targ	201.3625	Observer's specified target RA [deg]
dec_targ	-43.018889	Observer's specified target Dec [deg]
ra_nom	201.37215747454	Nominal RA [deg]
dec_nom	-43.015123006618	Nominal Dec [deg]
roll_nom	10.947914157863	Nominal Roll [deg]
revision	3	Processing version of data
ontime	5084.0000391006	Sum of GTIs [s]
livetime	5017.5738358034	Livetime [s]
ontime0	5084.0000391006	Sum of GTIs [s]
ontime1	5084.0000391006	Sum of GTIs [s]
ontime2	5084.0000391006	Sum of GTIs [s]
ontime3	5084.0000391006	Sum of GTIs [s]
ontime6	5084.0000391006	Sum of GTIs [s]
l2events	25082	Number of level 2 events



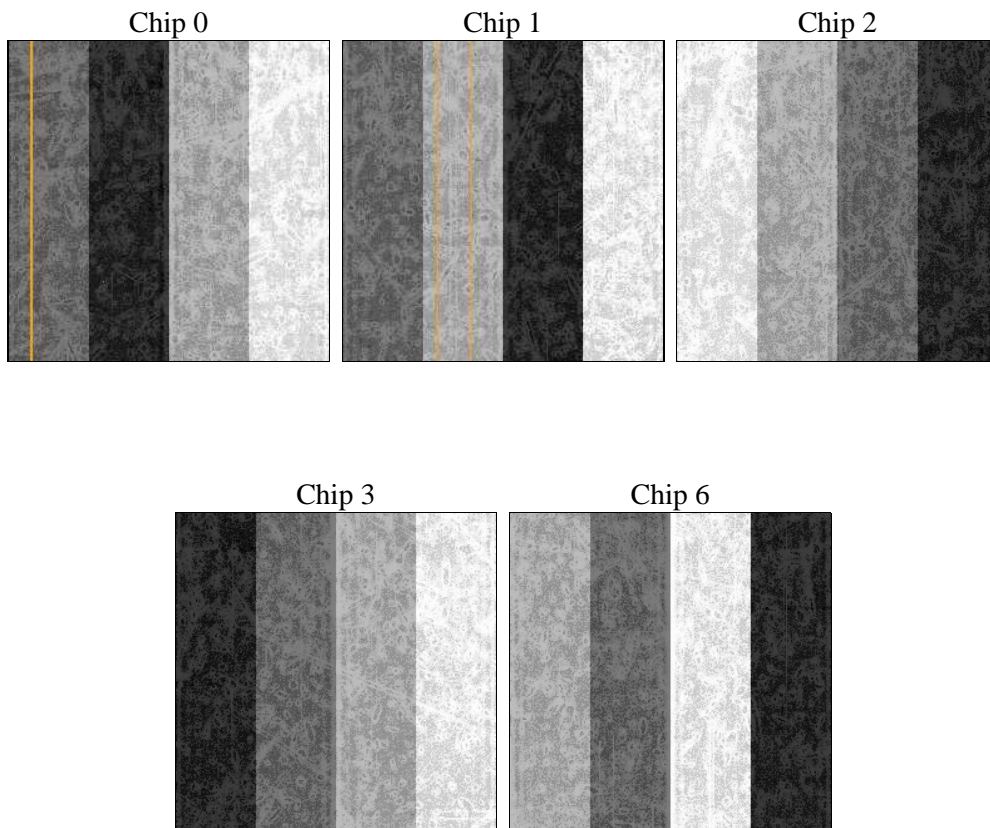
## 2 OBI

### 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	10.3	Processing system revision	ontime	5084.0000391006	Sum of GTIs [s]
caldsver	4.6.4	&#160	ontime0	5084.0000391006	Sum of GTIs [s]
date	2014-12-02T16:24:02	Date and time of file creation	ontime1	5084.0000391006	Sum of GTIs [s]
revision	3	Processing version of data	ontime2	5084.0000391006	Sum of GTIs [s]
			ontime3	5084.0000391006	Sum of GTIs [s]
			ontime6	5084.0000391006	Sum of GTIs [s]
			l1events	152033	Number of level 1 events

### 2.1.4 Events

	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6
level 1 events	27991	27744	31239	35432	29627
rejected events	23709	20926	25809	25812	26129
rejected %	84%	75%	82%	72%	88%

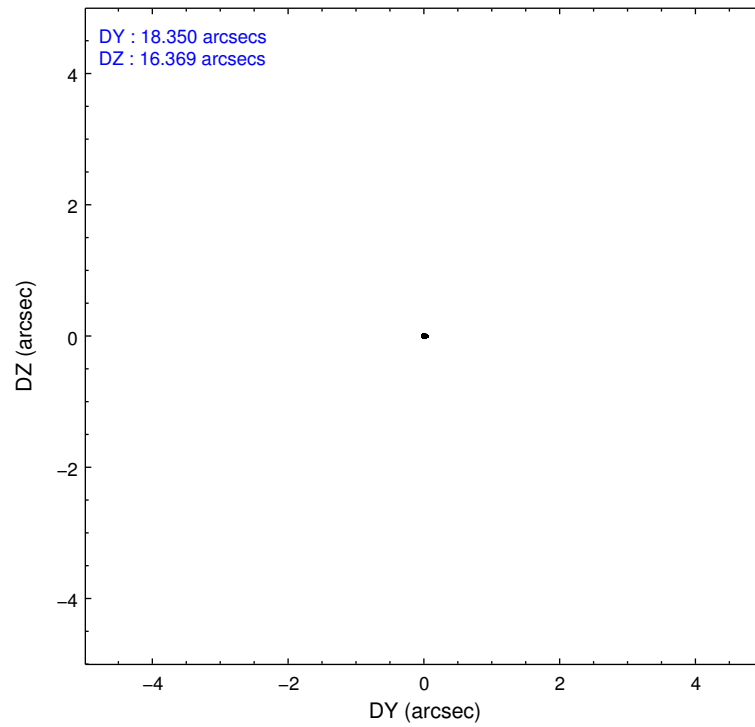
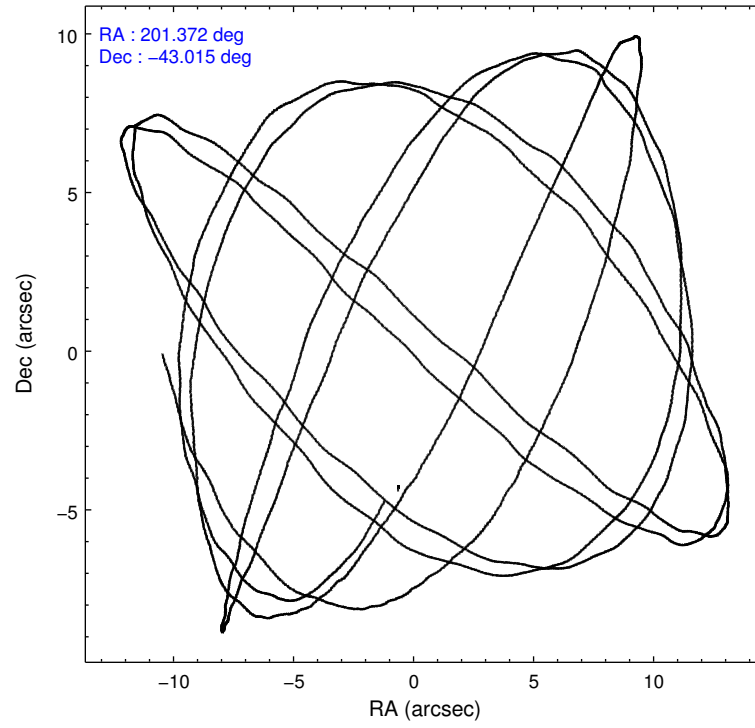
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6
grade 0 events	1899	2492	2879	5422	1245
	6%	8%	9%	15%	4%
grade 1 events	19	21	31	159	11
	0%	0%	0%	0%	0%
grade 2 events	947	2588	992	1558	788
	3%	9%	3%	4%	2%
grade 3 events	389	417	401	633	359
	1%	1%	1%	1%	1%
grade 4 events	323	408	421	610	340
	1%	1%	1%	1%	1%
grade 5 events	1220	1293	1255	1624	1397
	4%	4%	4%	4%	4%
grade 6 events	726	920	742	1400	768
	2%	3%	2%	3%	2%
grade 7 events	22468	19605	24518	24026	24719
	80%	70%	78%	67%	83%

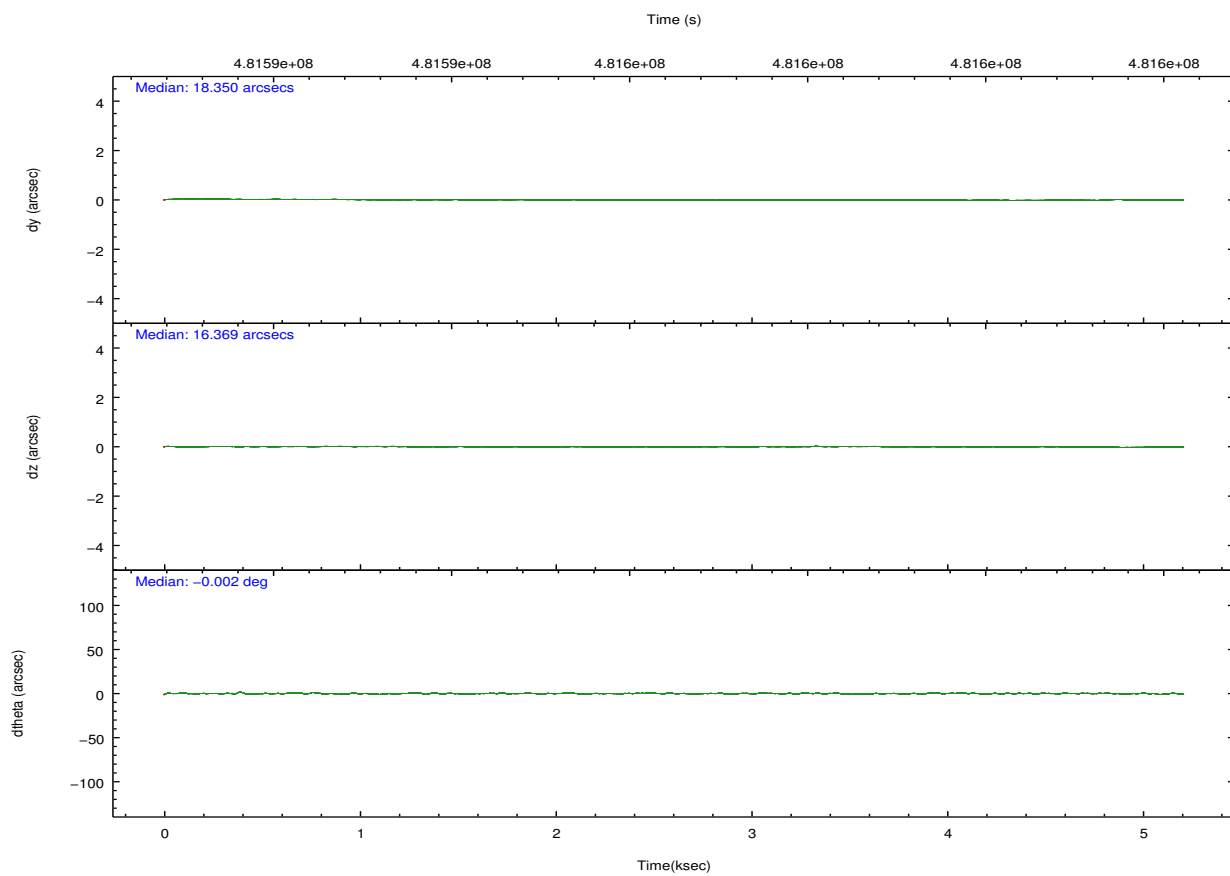
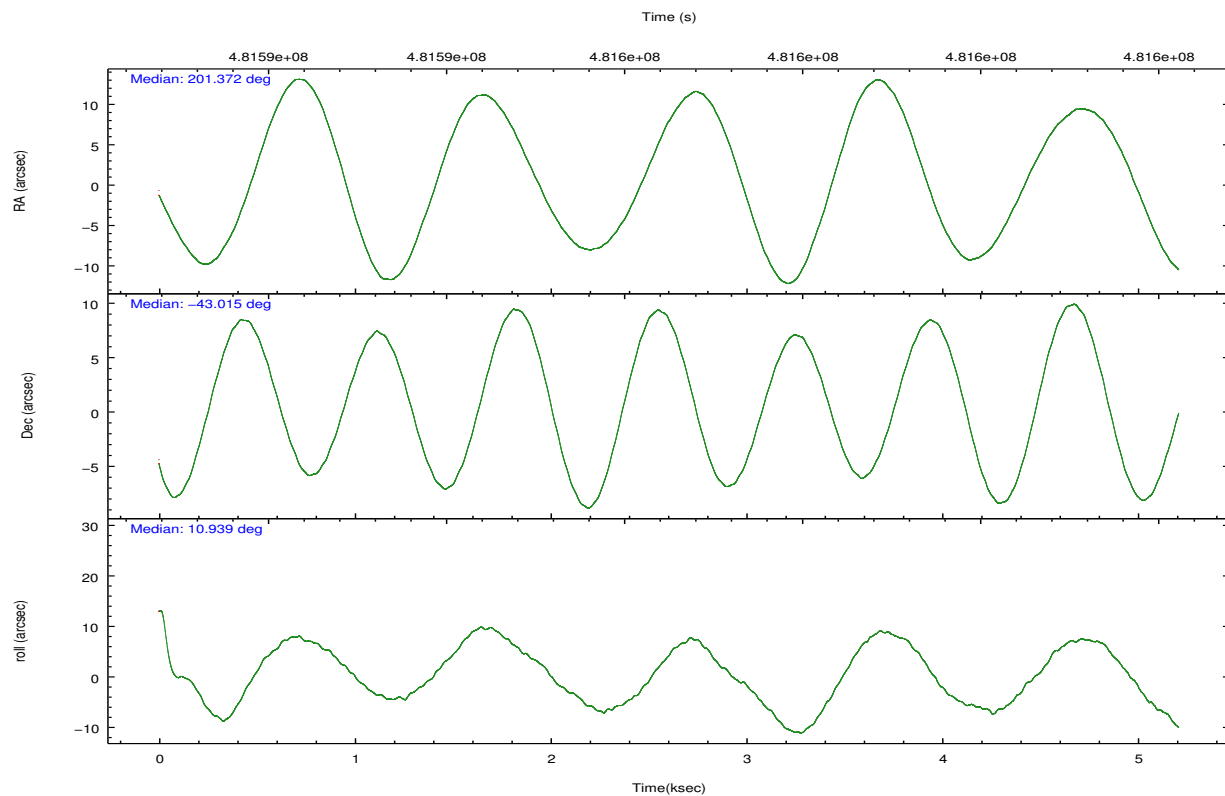
## 2.2 Compared Parameters

Parameter	Planned	Actual
Instrument	ACIS	ACIS
Detector	ACIS-01236	ACIS-01236
Grating	NONE	NONE
Data mode	FAINT	FAINT
Observation mode	POINTING	POINTING
[deg] Pointing RA	201.343915	201.3721574745362
[deg] Pointing Dec	-43.033171	-43.01512300661818
[deg] Pointing Roll	10.719944	10.94791415786314
[mm] SIM focus pos	-0.782348	-0.7809083437167272
[mm] SIM defocus	0	0.001439871863259334
[mm] SIM translation stage pos	-233.592463	-233.5874344608287
[mm] SIM translation stage offset	0	-0.005018542100998502
[s] Observation start time (MET)	481592846.184000	481591896.4846
Observation start date	2013-04-05T23:46:19	2013-04-05T23:31:36
[s] Observation end time (MET)	481597846.184000	481598607.67246
Observation end date	2013-04-06T01:09:39	2013-04-06T01:23:27
Read mode	TIMED	TIMED

Parameter	Planned	Actual
Obspar format version number	7	7
Obspar file type	PREDICTED	ACTUAL
Obspar update status	NONE	UPDATED
Number of optional ACIS chips dropped	0	0
On-chip summing requested	N	N
Subarray requested	NONE	NONE
Alternating exposures requested	N	N
[s] Primary exposure time	0.000000	3.1

## 2.3 Aspect



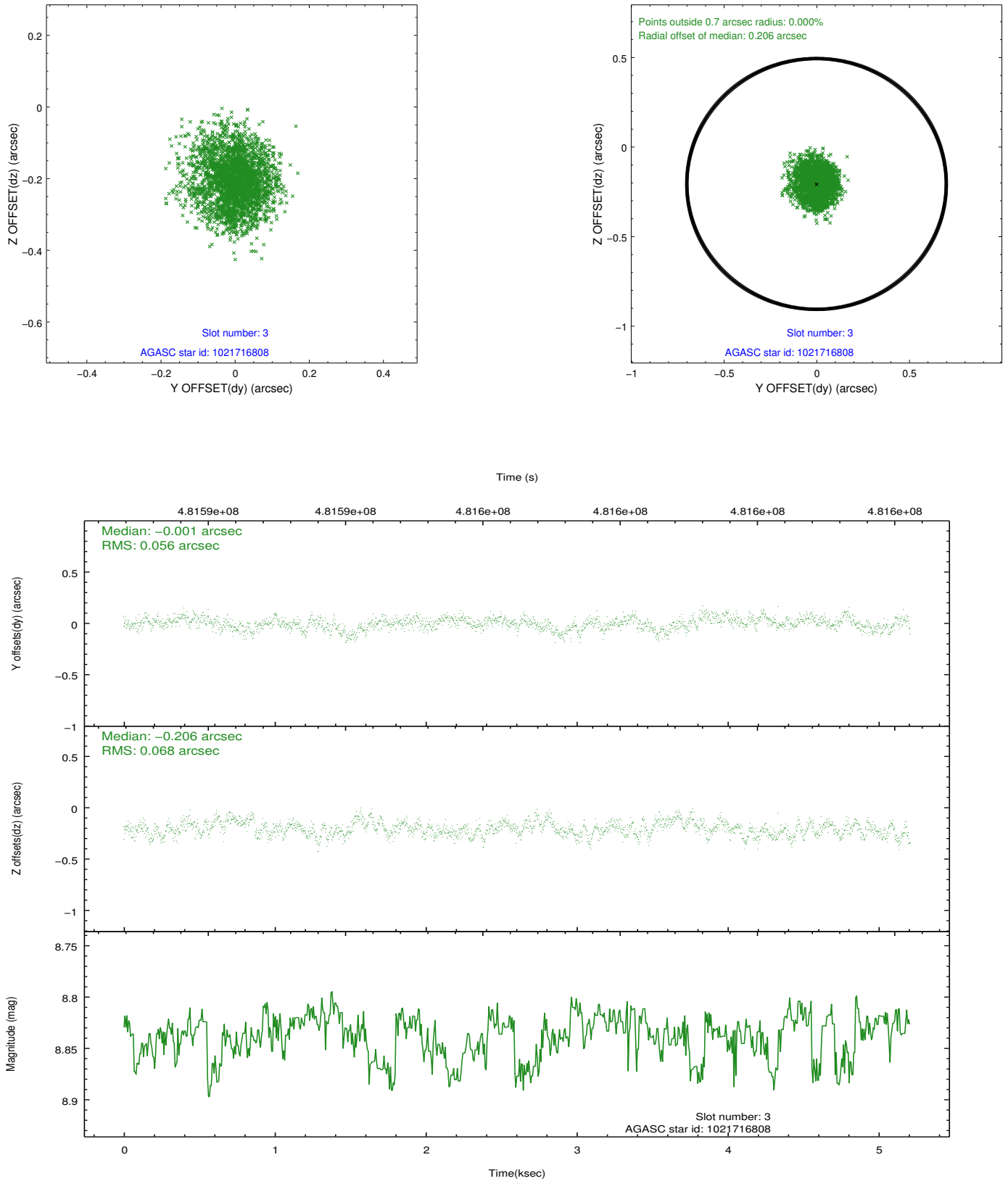


### Slot Statistics

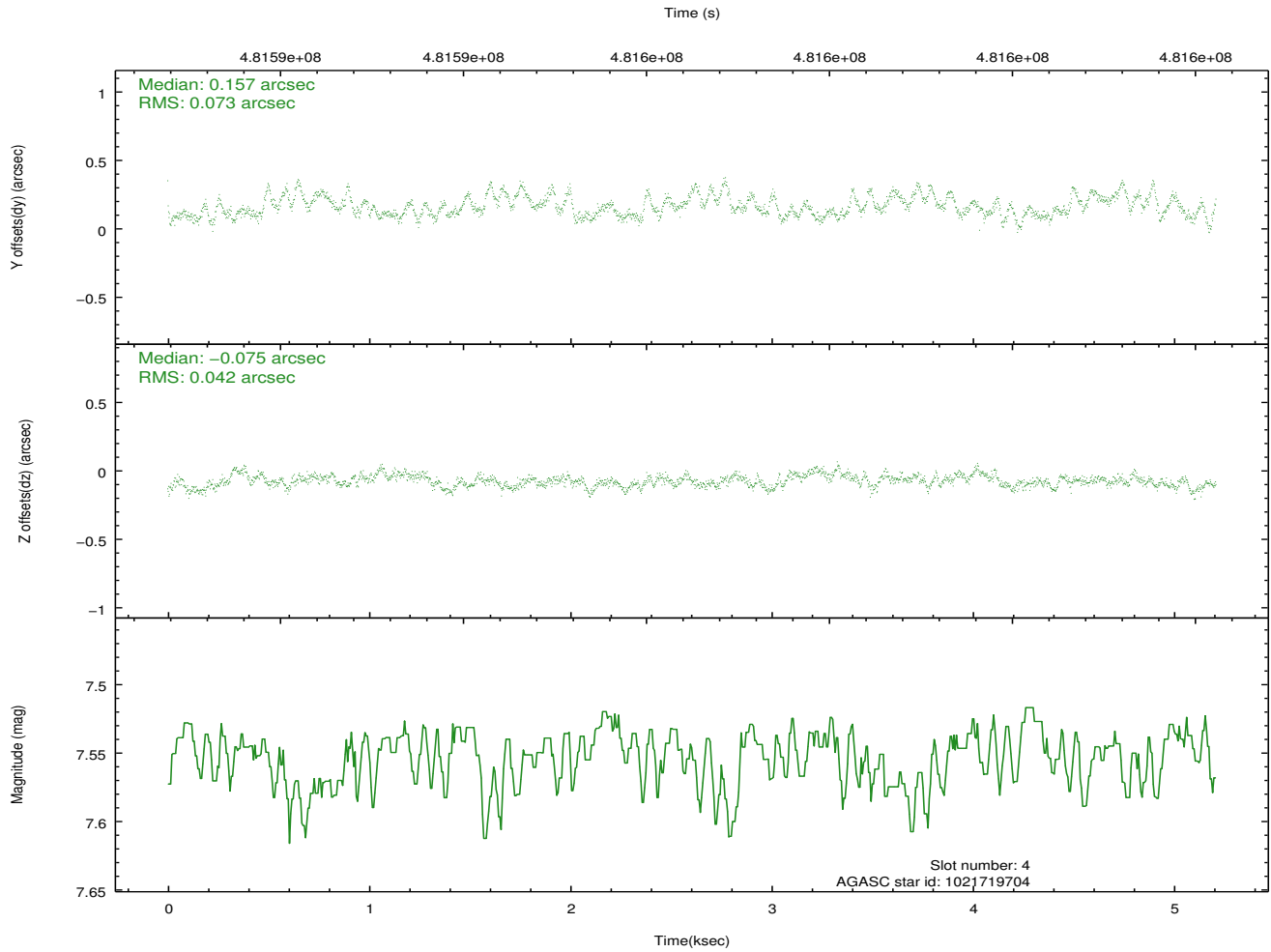
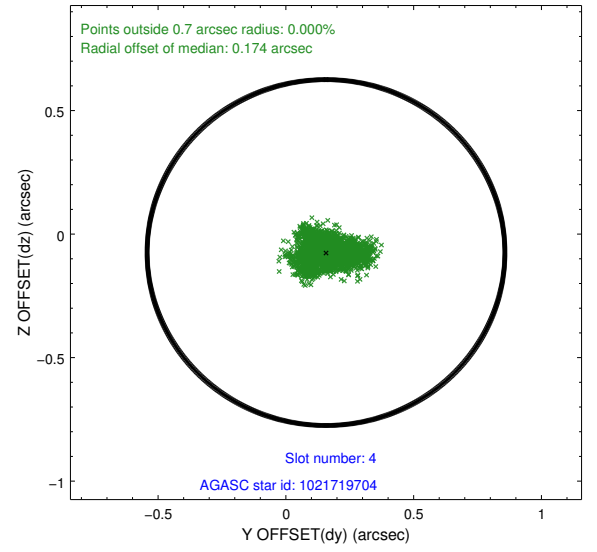
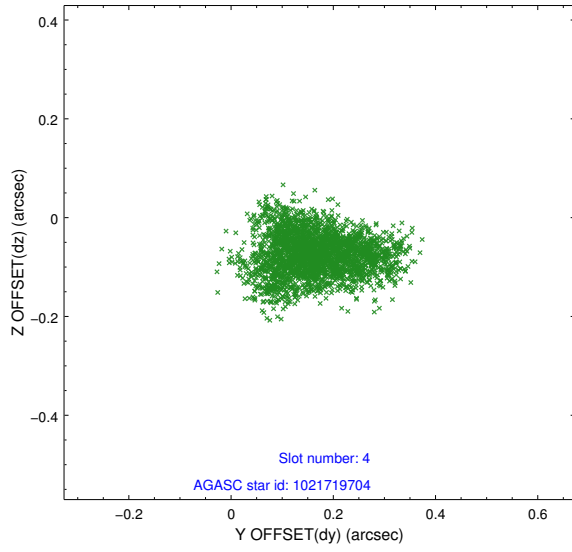
slot	status	used	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID		ACIS-I-1	7.15	1271	0.078	-0.048	0.006	0.010	0.000000	0.000000	921.09	-840.05
1	FID		ACIS-I-5	7.14	1271	-0.276	0.060	0.006	0.010	0.000000	0.000000	-1826.73	1056.97
2	FID		ACIS-I-6	7.16	1271	0.107	0.059	0.007	0.011	0.000000	0.000000	385.40	1702.78
3	GUIDE	used	1021716808	8.84	2542	-0.001	-0.206	0.096	0.150	200.901189	-42.531395	-818.72	1990.22
4	GUIDE	used	1021719704	7.55	2542	0.157	-0.075	0.089	0.148	200.511976	-43.050426	-2163.53	336.00
5	GUIDE	used	1021721672	9.53	2525	0.051	0.246	0.185	0.284	201.740358	-43.079729	992.15	-360.19
6	GUIDE	used	1022235840	9.40	2536	-0.124	-0.245	0.141	0.236	201.679306	-43.544276	518.39	-1972.31
7	GUIDE	used	1021717656	8.32	2541	-0.073	0.293	0.090	0.138	201.139642	-43.082878	-560.54	-76.76

## 2.4 Star Slots

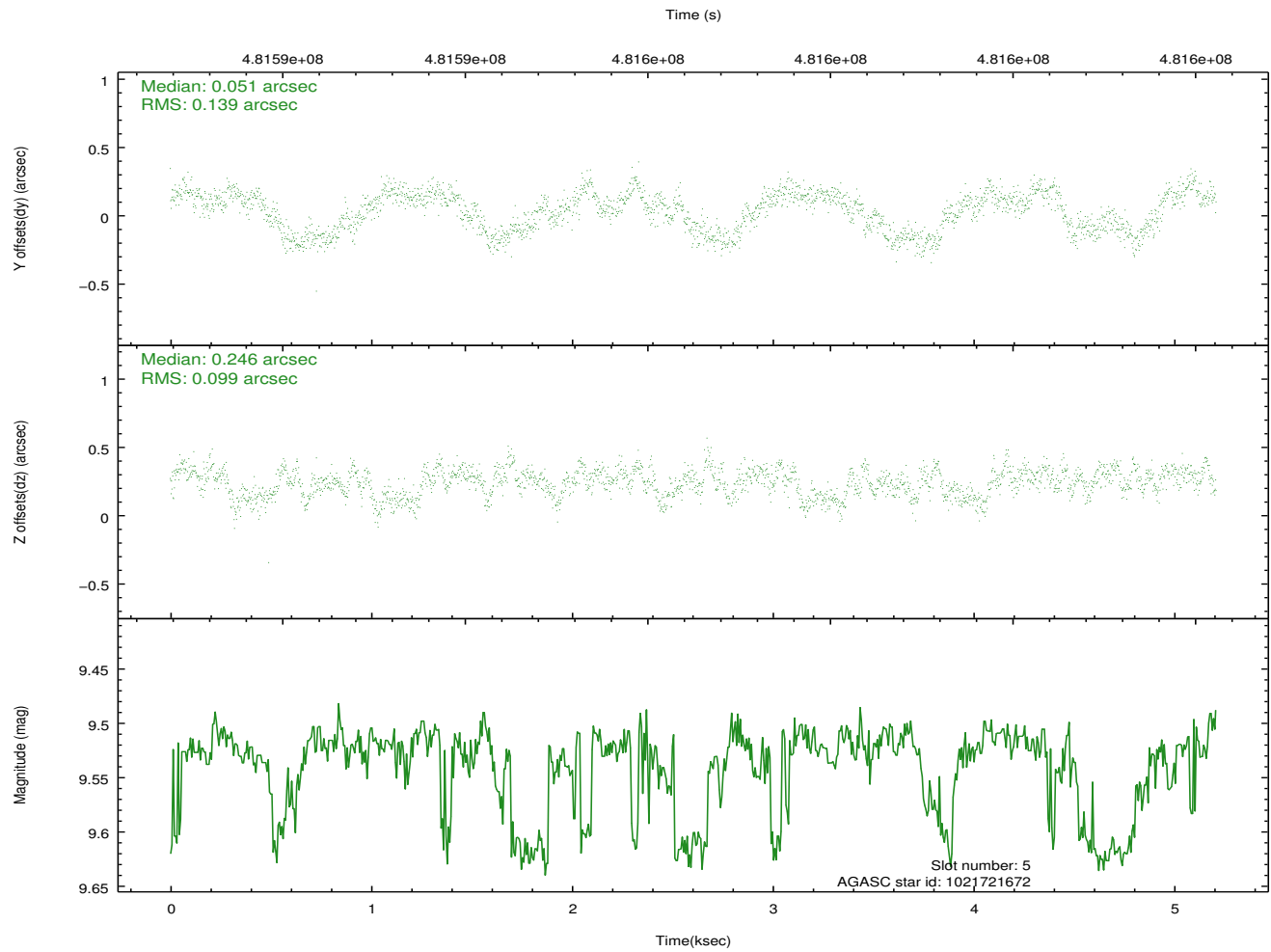
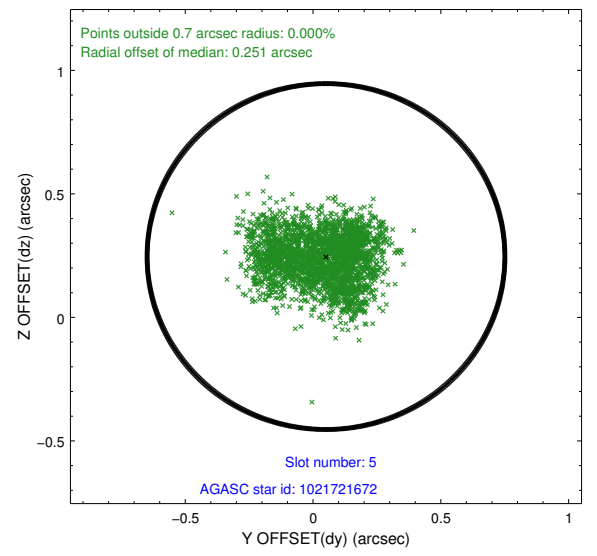
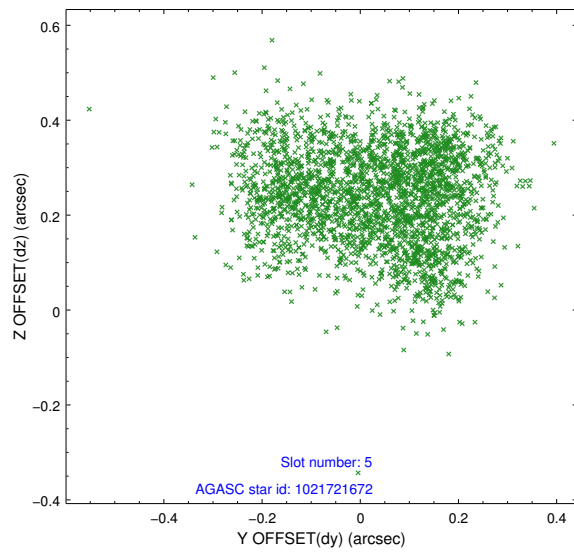
### 2.4.1 Slot 3



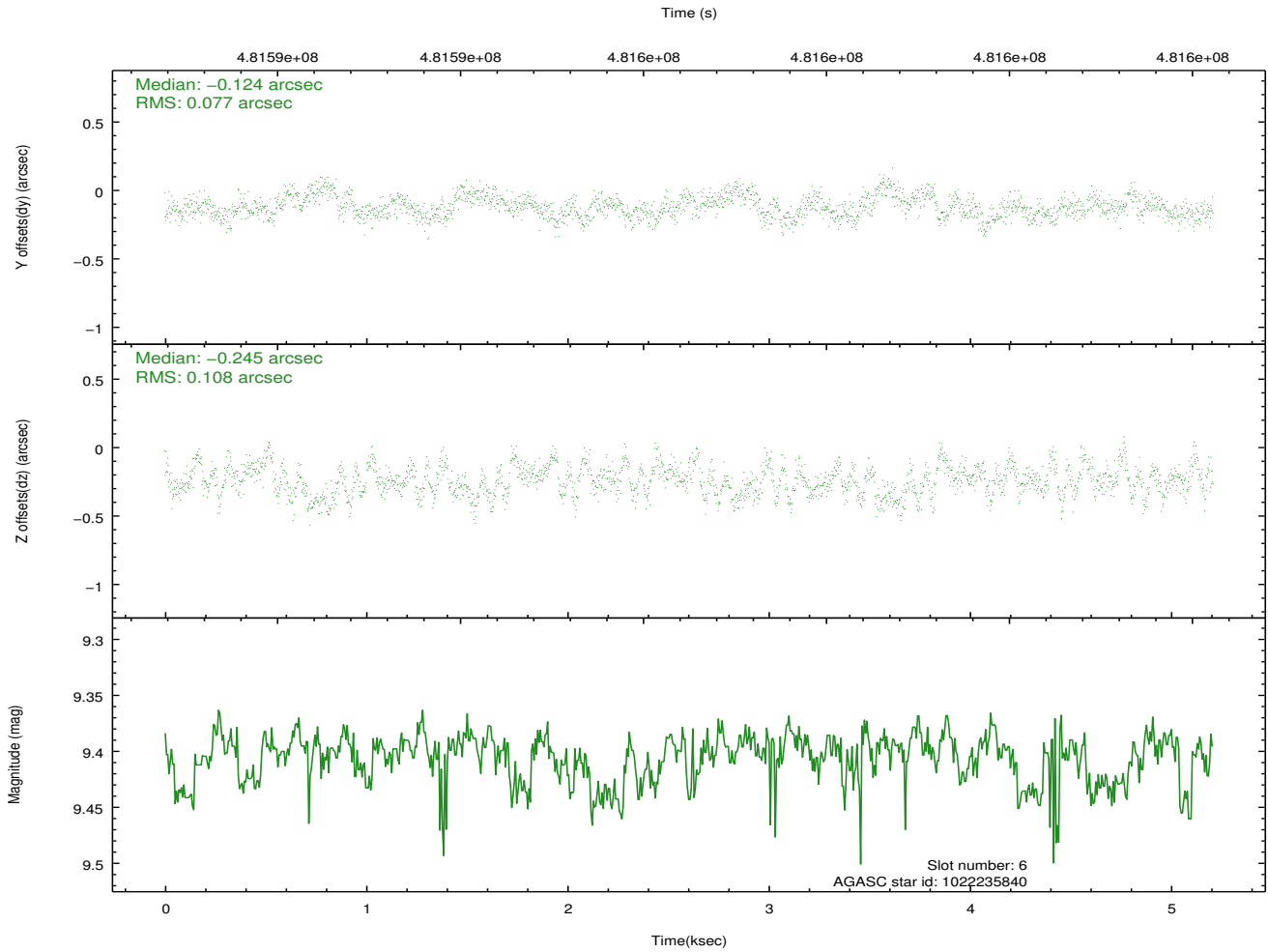
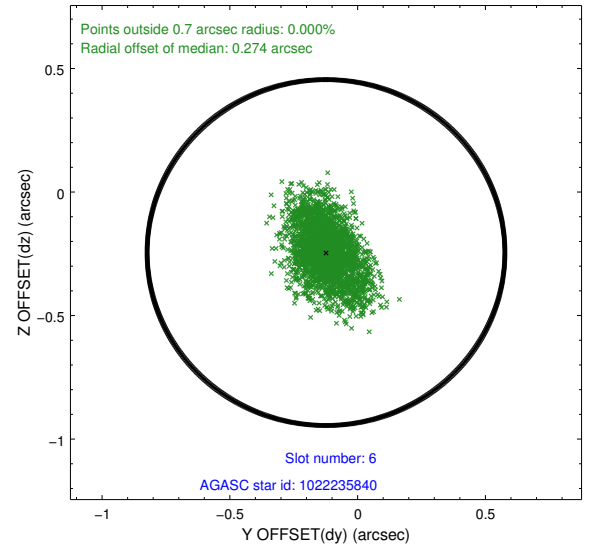
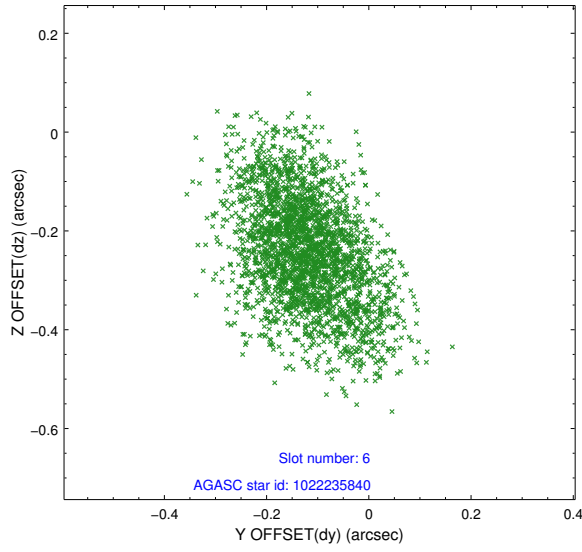
## 2.4.2 Slot 4



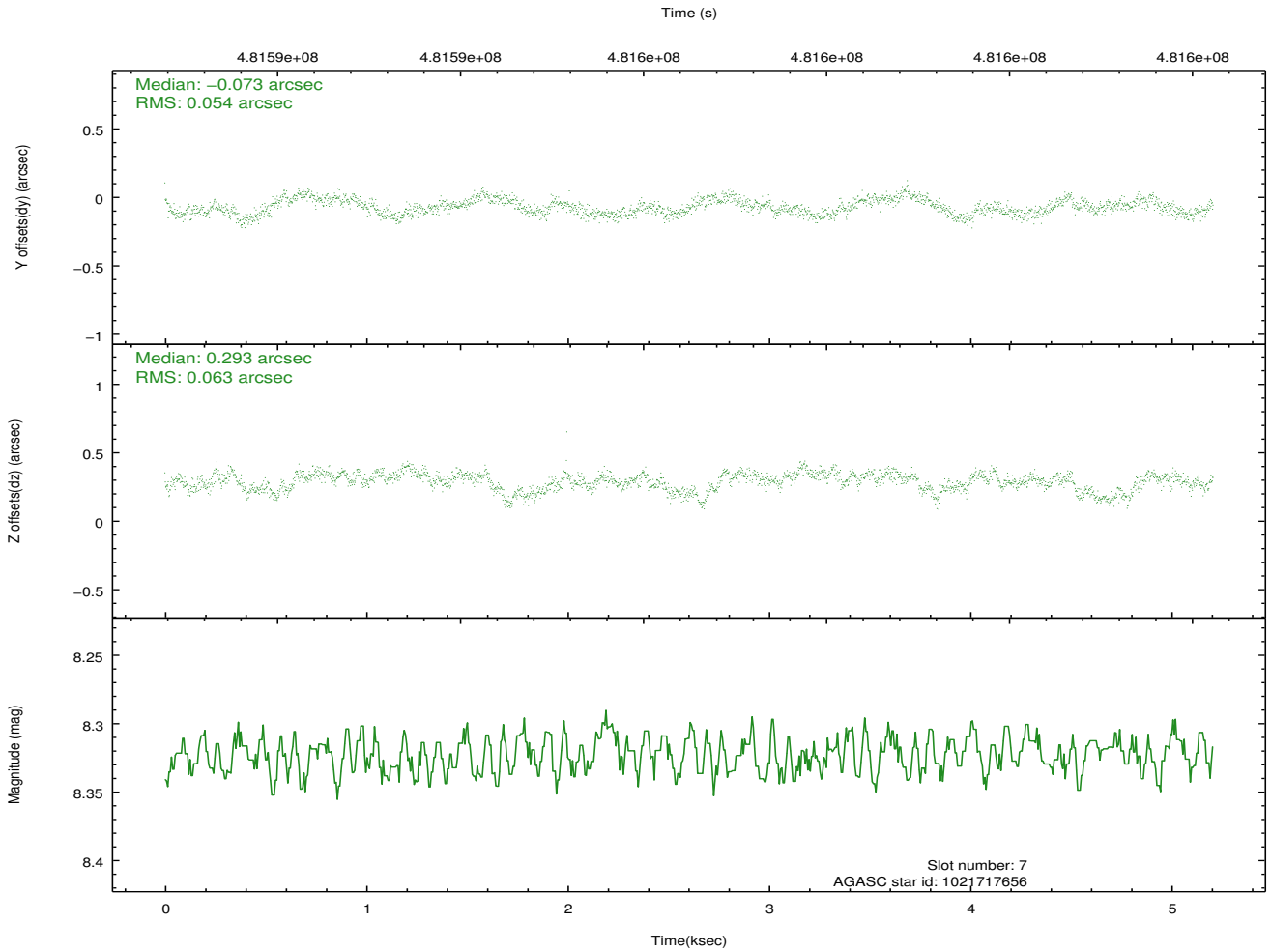
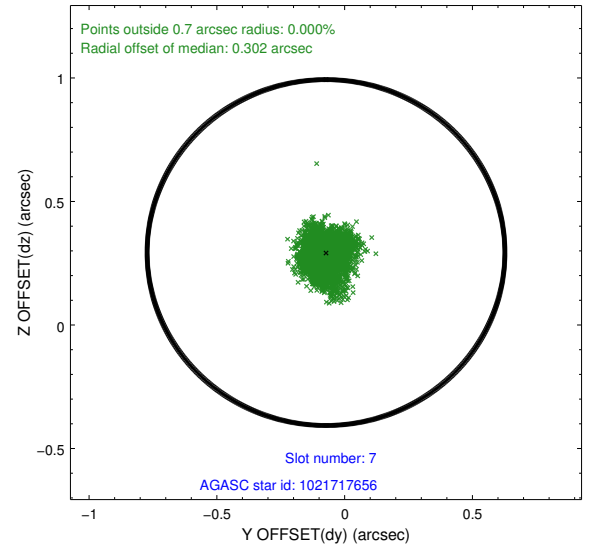
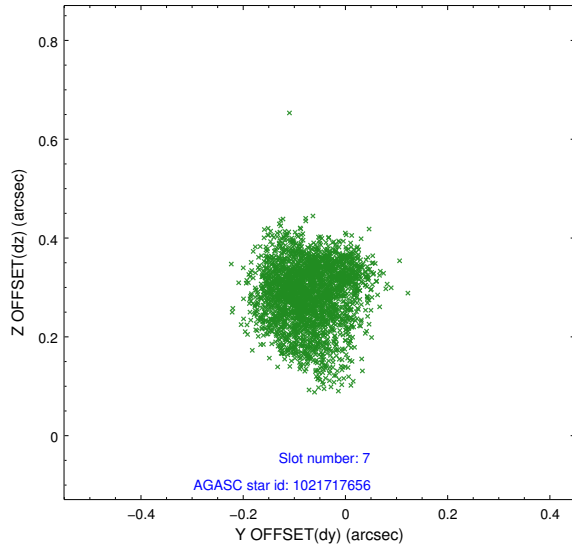
### 2.4.3 Slot 5



## 2.4.4 Slot 6

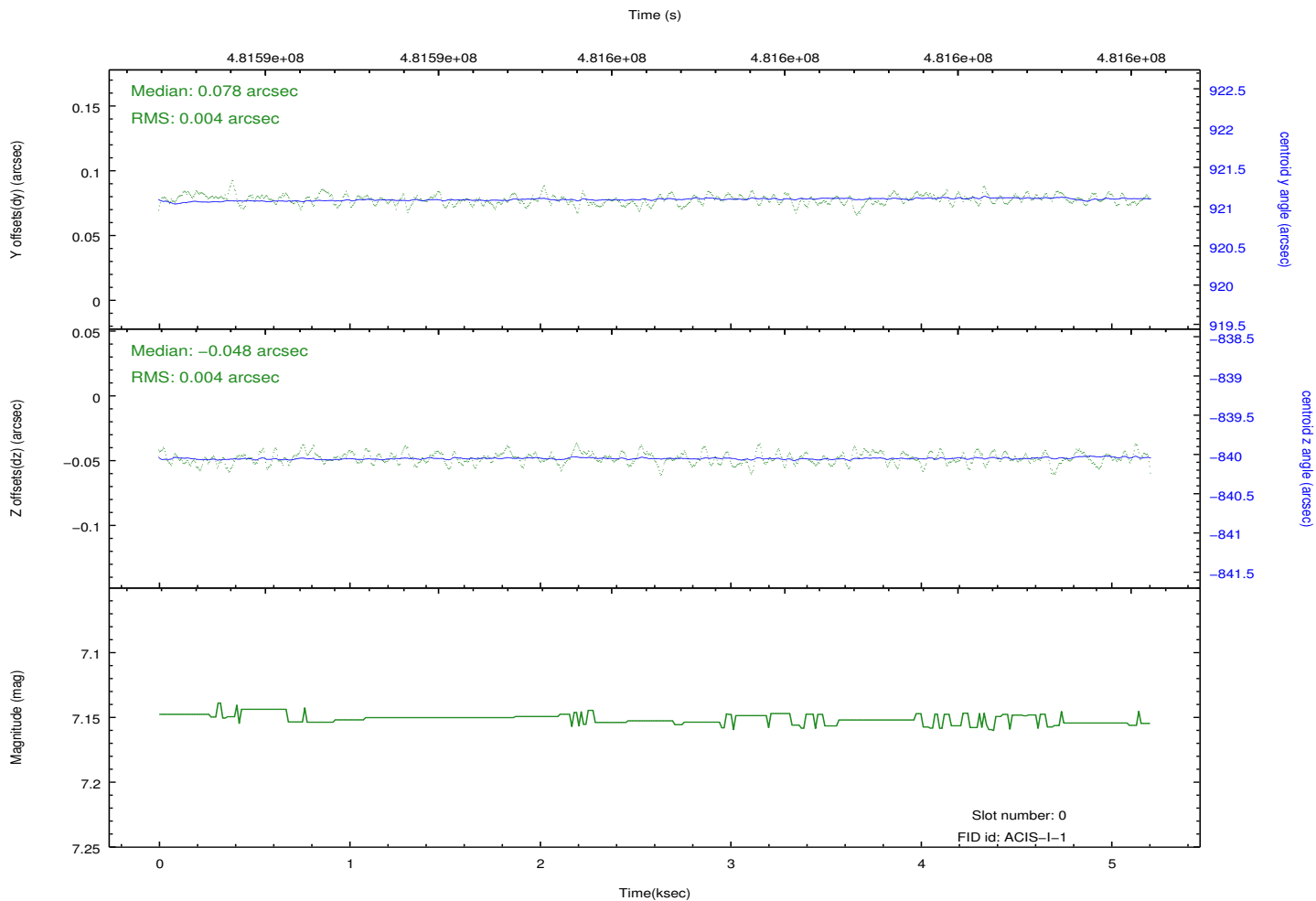
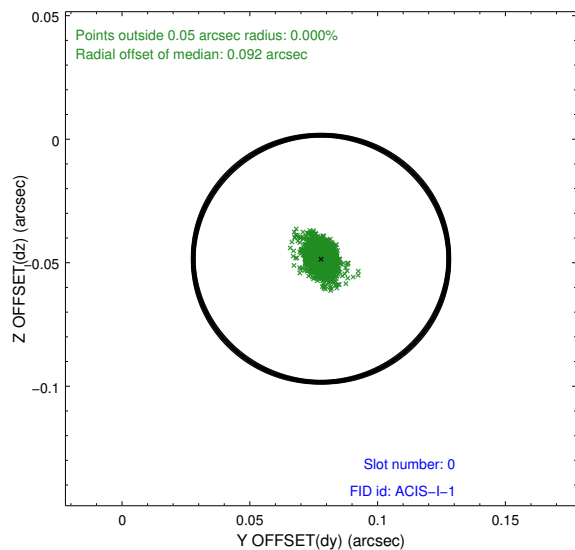
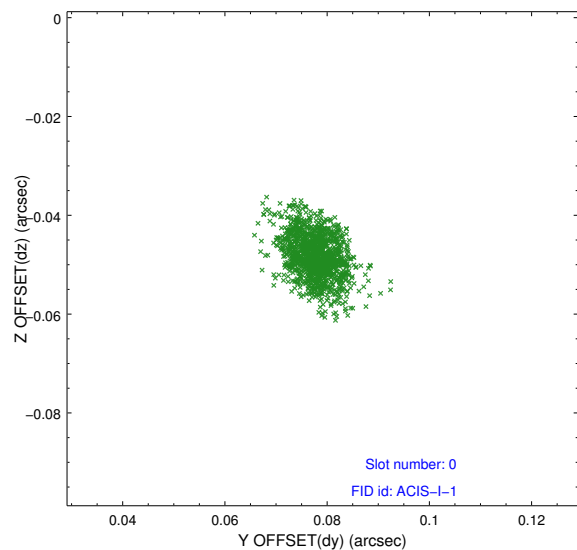


## 2.4.5 Slot 7

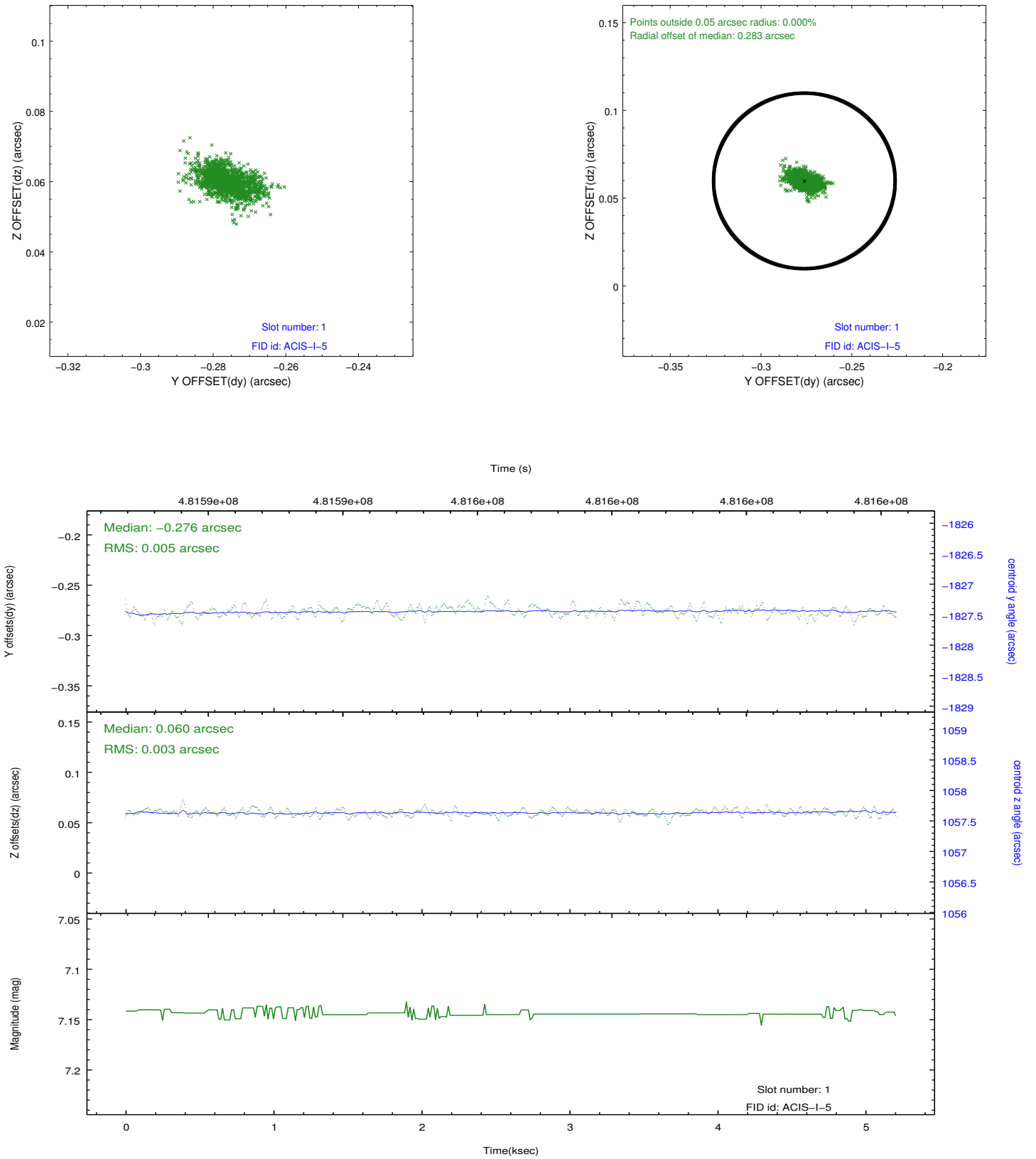


## 2.5 FID Slots

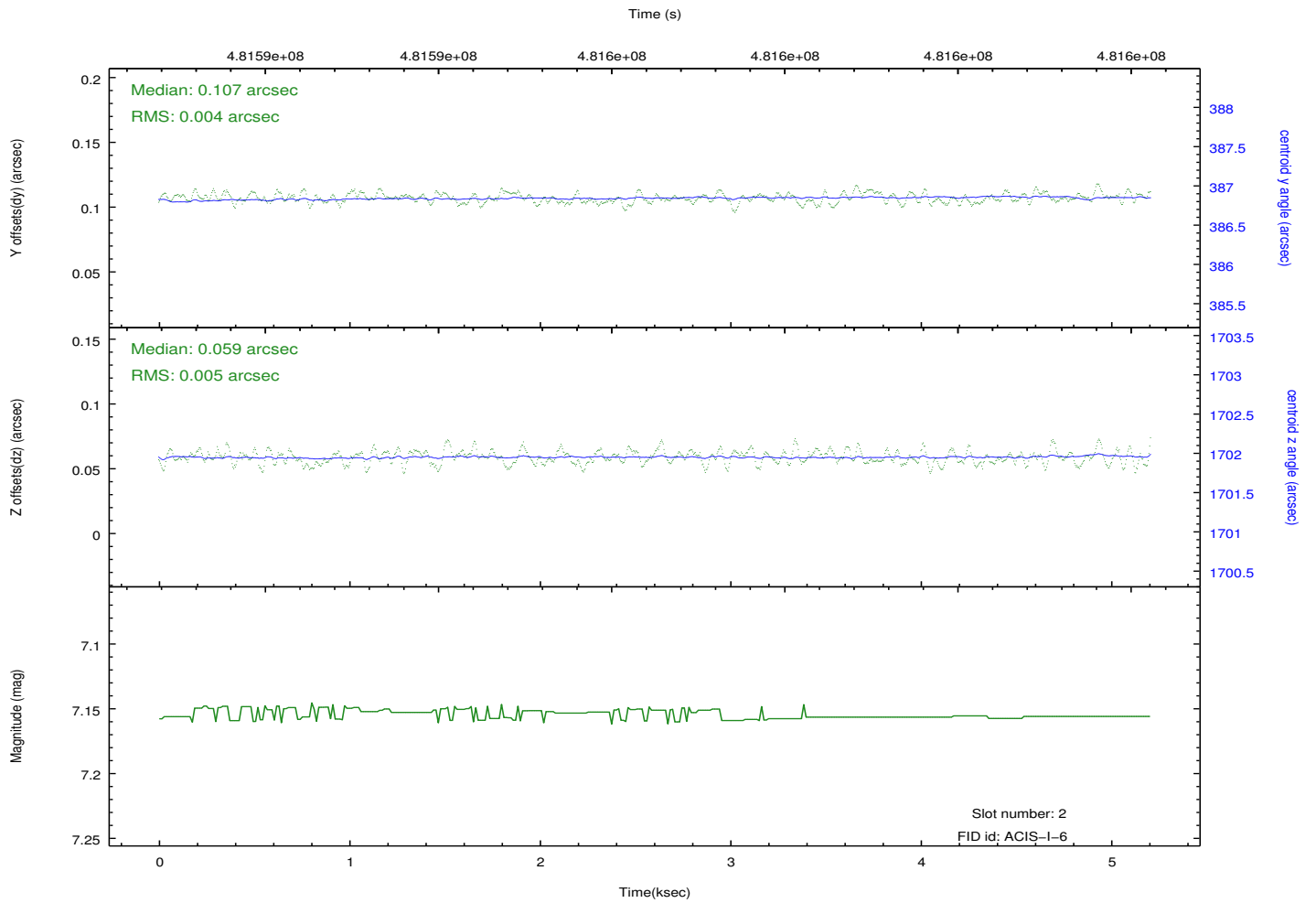
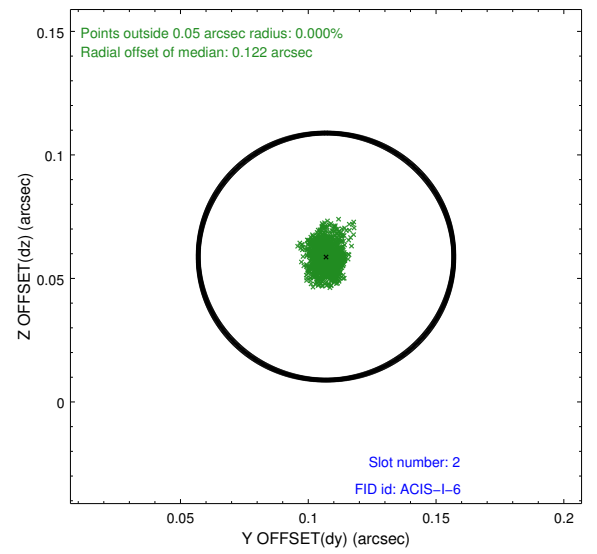
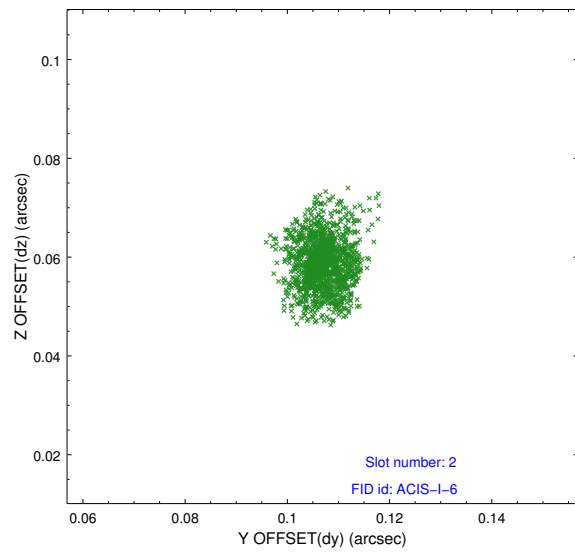
### 2.5.1 Slot 0



## 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)	2014.12.10
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	5.0840000391006

## 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.