

# V&V Reference Report

## L2 ASCDS Version : 8.4.5

Observation 15582 - L2 Version 2  
Chandra X-Ray Center

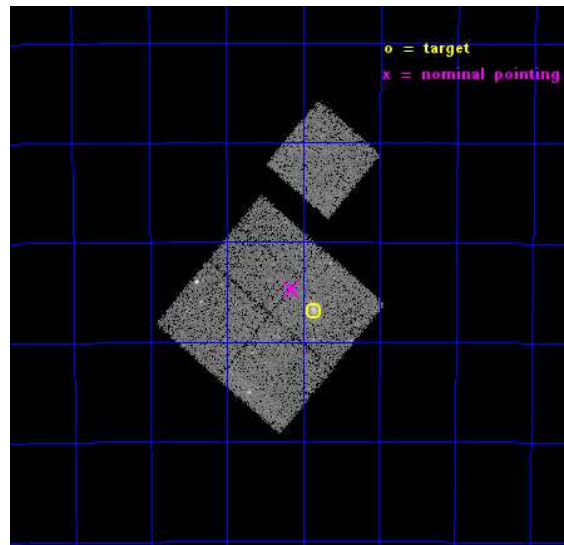
L2 Processing Date : Nov 29 2014

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# 1 Front

seq_num	801197	Sequence number
obs_id	15582	Observation id
title	A DETAILED CHANDRA/HST STUDY OF THE FIRST z approx 1 CLUSTER BLINDLY DISCOVERED IN THE PLANCK ALL SKY SURVEY	Proposal title
observer	Dr. Pasquale Mazzotta	Principal investigator
object	PLCKG266.6-27.3	Source name
dtcycle	0	&#160
cycle	P	events from which exps? Prim/Second/Both
ra_targ	93.966667	Observer's specified target RA [deg]
dec_targ	-57.781	Observer's specified target Dec [deg]
ra_nom	94.038219322316	Nominal RA [deg]
dec_nom	-57.745744748186	Nominal Dec [deg]
roll_nom	40.269198124671	Nominal Roll [deg]
revision	2	Processing version of data
ontime	18584.500142932	Sum of GTIs [s]
livetime	18341.679966855	Livetime [s]
ontime0	18584.500142932	Sum of GTIs [s]
ontime1	18584.500142932	Sum of GTIs [s]
ontime2	18584.500142932	Sum of GTIs [s]
ontime3	18584.500142932	Sum of GTIs [s]
ontime6	18584.500142932	Sum of GTIs [s]
l2events	53507	Number of level 2 events

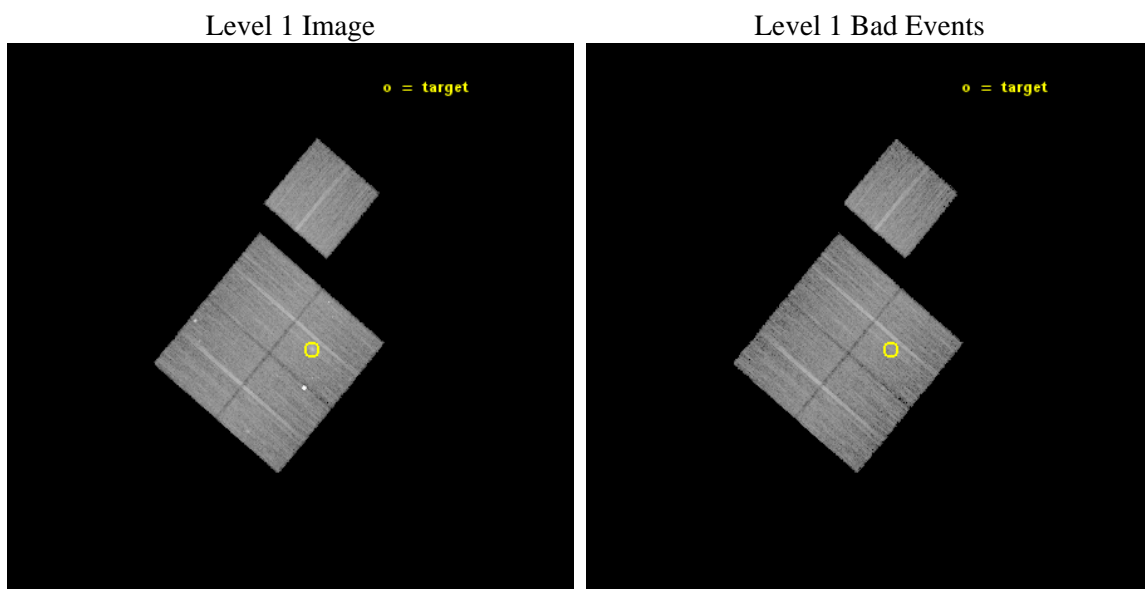




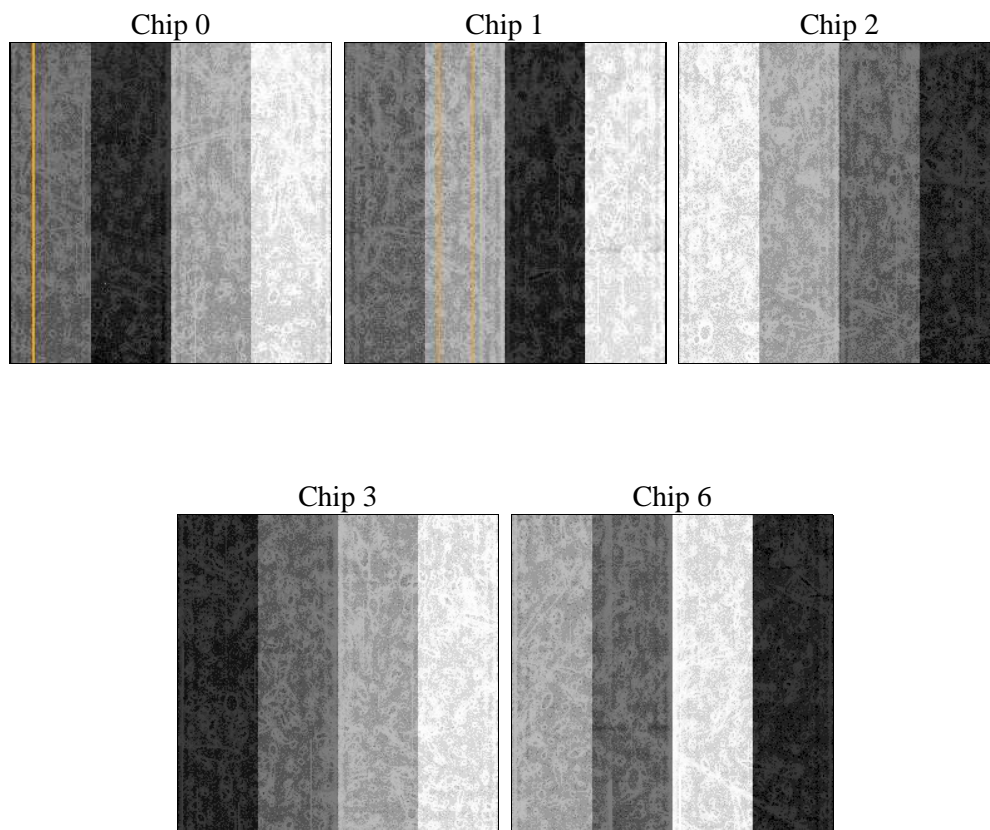
## 2 OBI

### 2.1 OBI

#### 2.1.1 Images



#### 2.1.2 Bias



### 2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	18500.000000	[s] Scheduled observation exposure time
ascdsver	10.3	Processing system revision	ontime	18584.500142932	Sum of GTIs [s]
caldbver	4.6.4	&#160	ontime0	18584.500142932	Sum of GTIs [s]
date	2014-11-29T15:24:35	Date and time of file creation	ontime1	18584.500142932	Sum of GTIs [s]
revision	2	Processing version of data	ontime2	18584.500142932	Sum of GTIs [s]
			ontime3	18584.500142932	Sum of GTIs [s]
			ontime6	18584.500142932	Sum of GTIs [s]
			l1events	486960	Number of level 1 events

### 2.1.4 Events

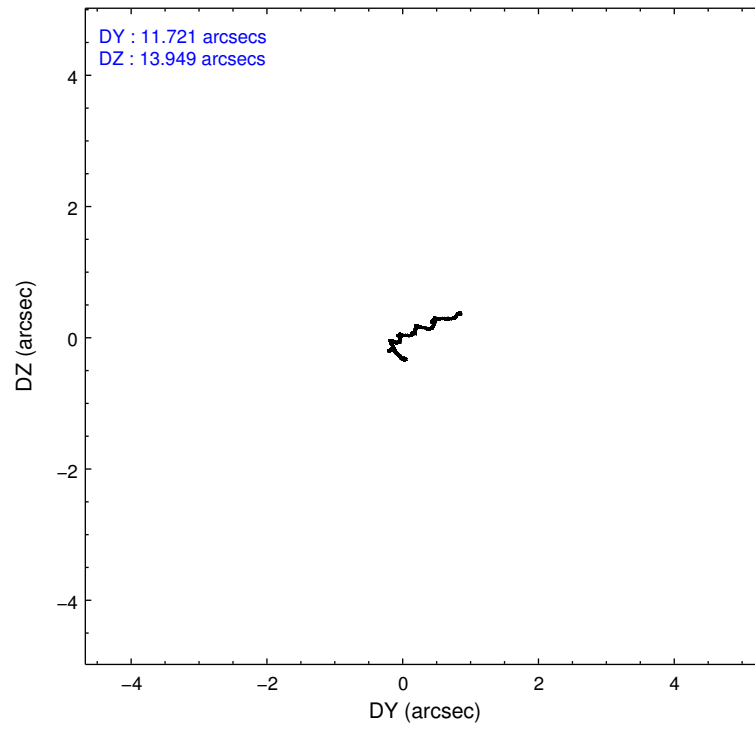
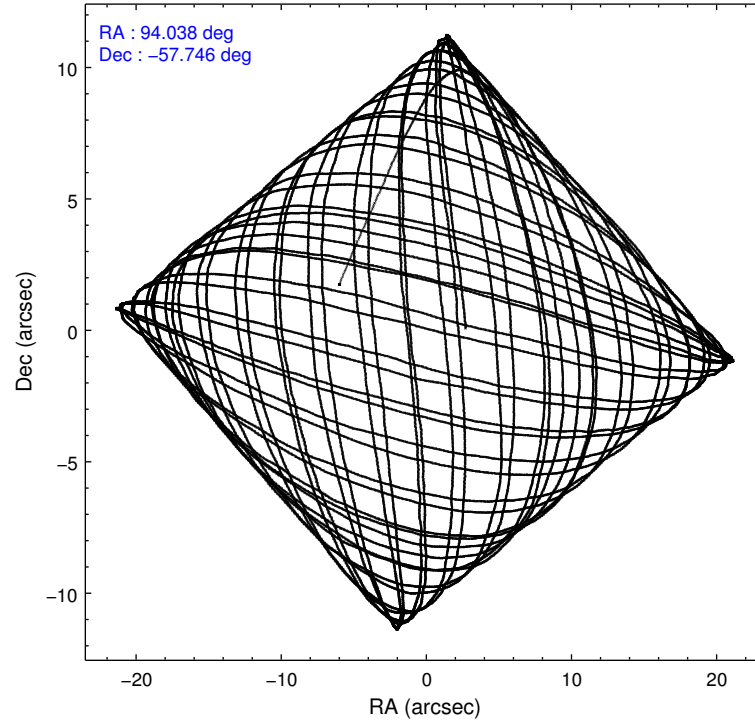
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6
level 1 events	92142	100264	98969	98155	97430
rejected events	79645	79126	87573	84351	85465
rejected %	86%	78%	88%	85%	87%

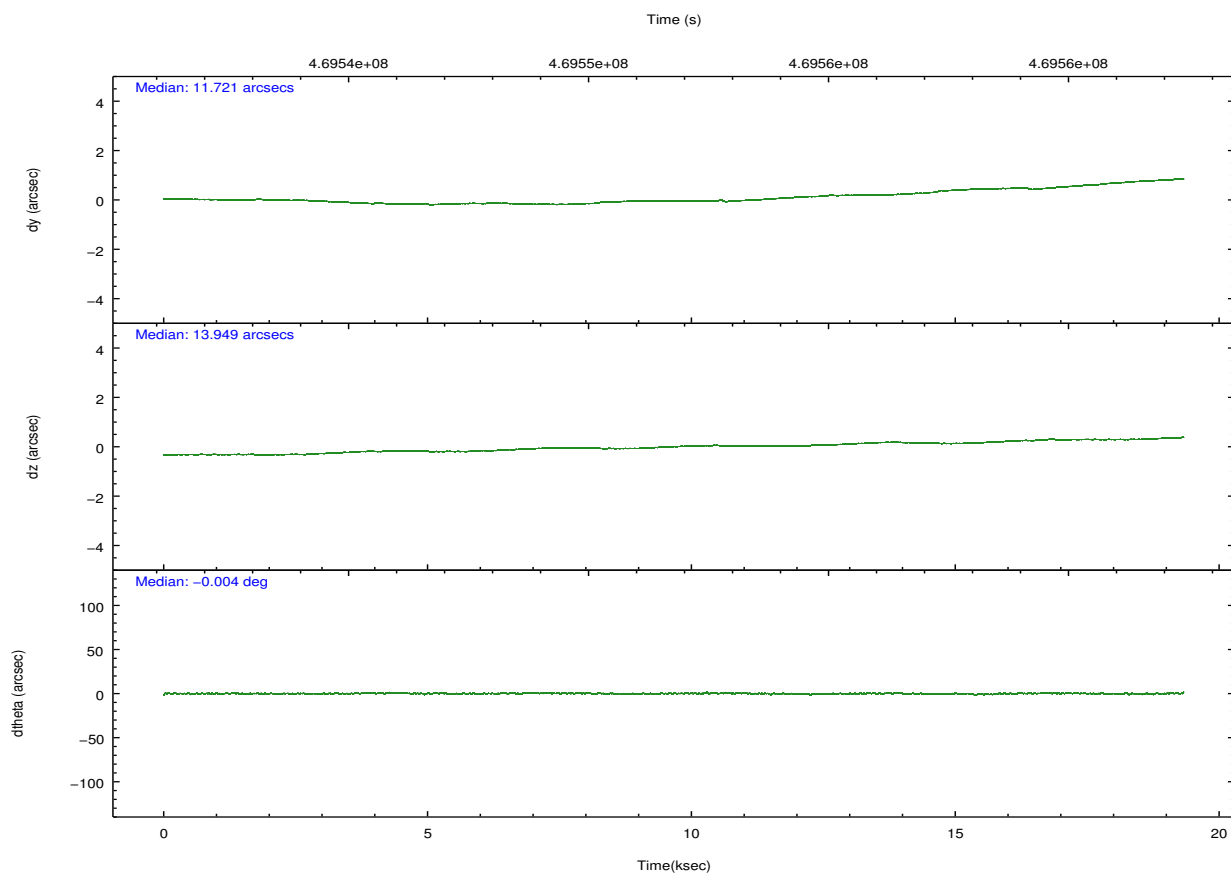
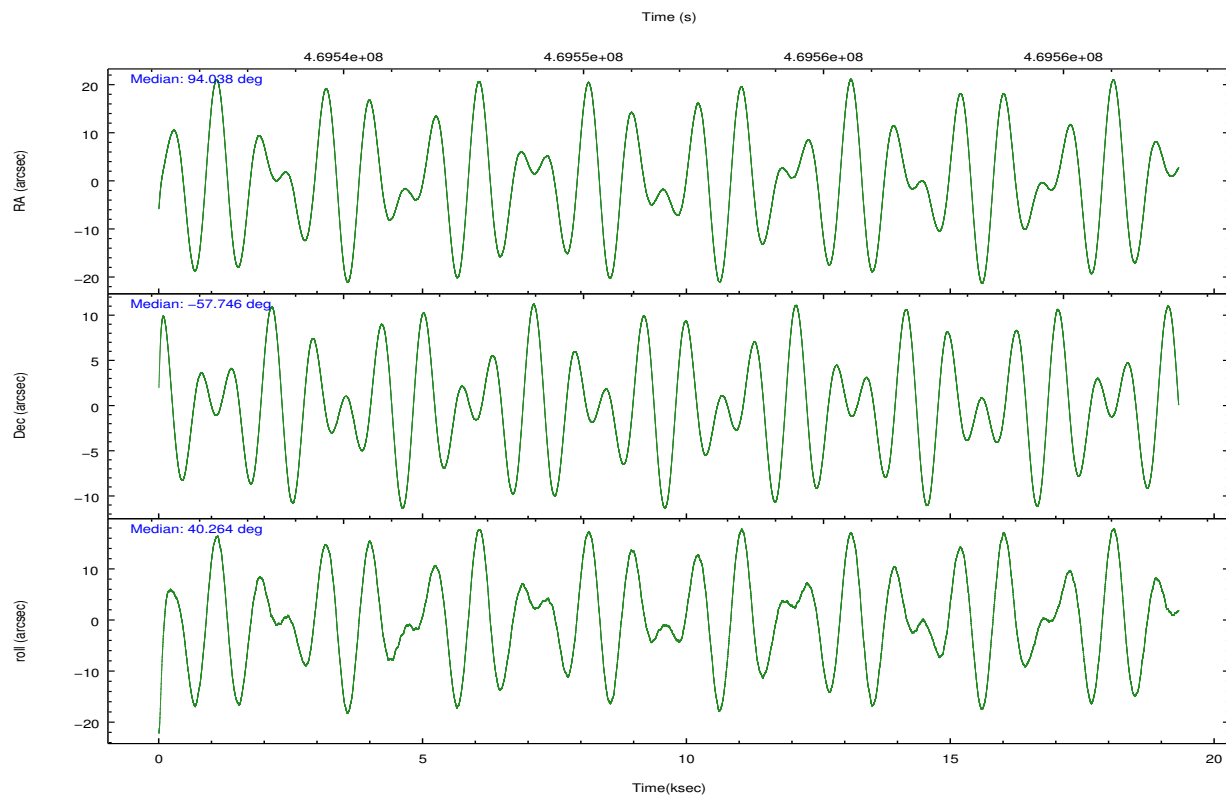
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6
grade 0 events	4604	4653	4097	6179	4236
	4%	4%	4%	6%	4%
grade 1 events	47	52	51	82	41
	0%	0%	0%	0%	0%
grade 2 events	3024	11169	2757	2789	2644
	3%	11%	2%	2%	2%
grade 3 events	1273	1299	1154	1223	1204
	1%	1%	1%	1%	1%
grade 4 events	1191	1259	1205	1278	1196
	1%	1%	1%	1%	1%
grade 5 events	4560	4854	4284	5159	4962
	4%	4%	4%	5%	5%
grade 6 events	2405	2765	2183	2338	2691
	2%	2%	2%	2%	2%
grade 7 events	75038	74213	83238	79107	80456
	81%	74%	84%	80%	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	94.020983	94.03821932231644	CCD I2 on	Y	Y
[deg] Pointing Dec	-57.771687	-57.74574474818618	CCD I3 on	Y	Y
[deg] Pointing Roll	40.045941	40.2691981246706	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)	469542940.184000	469541285.50933	CCD S5 on	N	N
Observation start date	2012-11-17T12:34:33	2012-11-17T12:08:05	Number of optional ACIS chips dropped	0	0
[s] Observation end time (MET)	469561440.184000	469562144.26046	On-chip summing requested	N	N
Observation end date	2012-11-17T17:42:53	2012-11-17T17:55:44	Subarray requested	NONE	NONE
Read mode	TIMED	TIMED	Alternating exposures requested	N	N
			[s] Primary exposure time	0.000000	3.1

## 2.3 Aspect



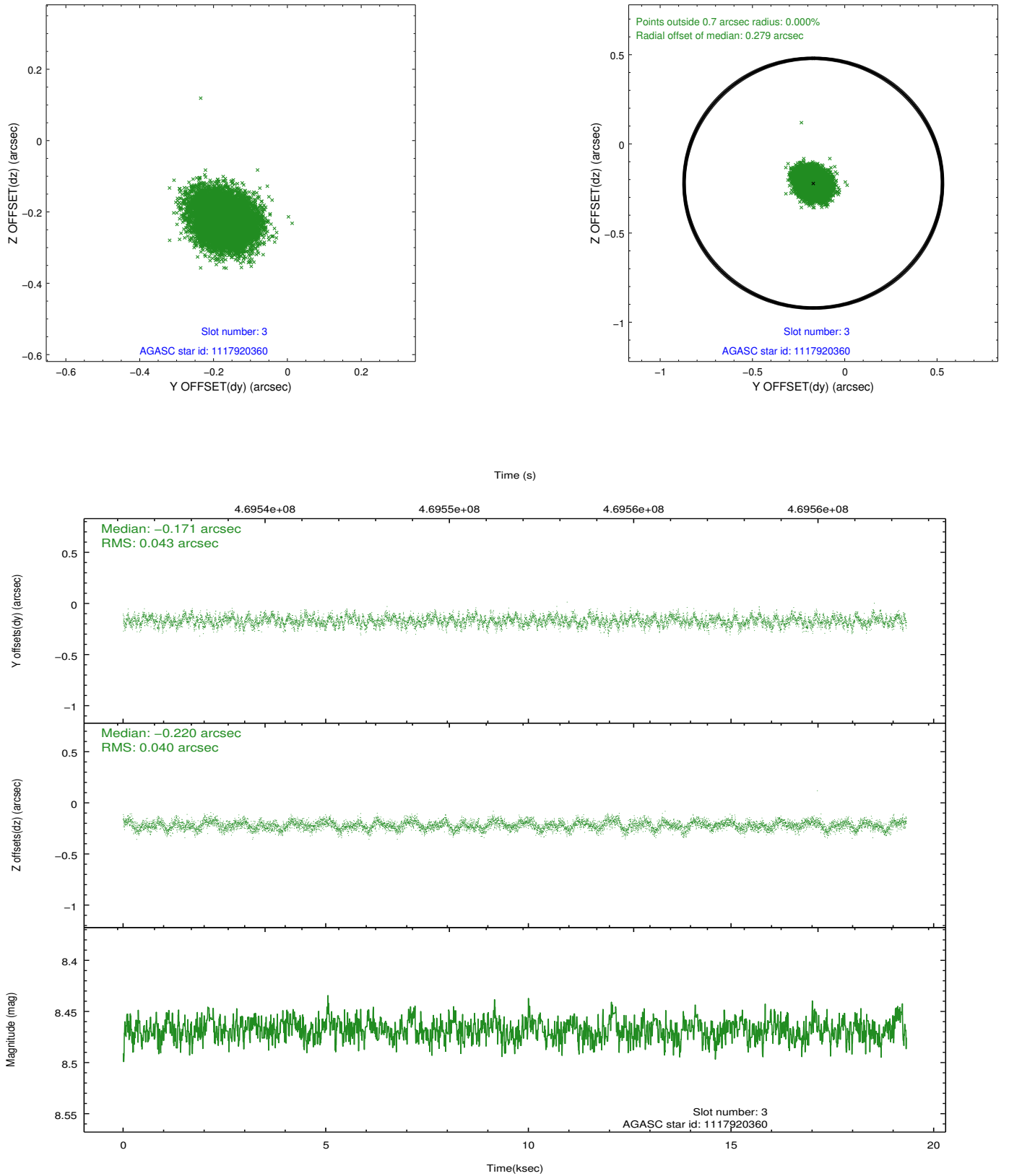


### Slot Statistics

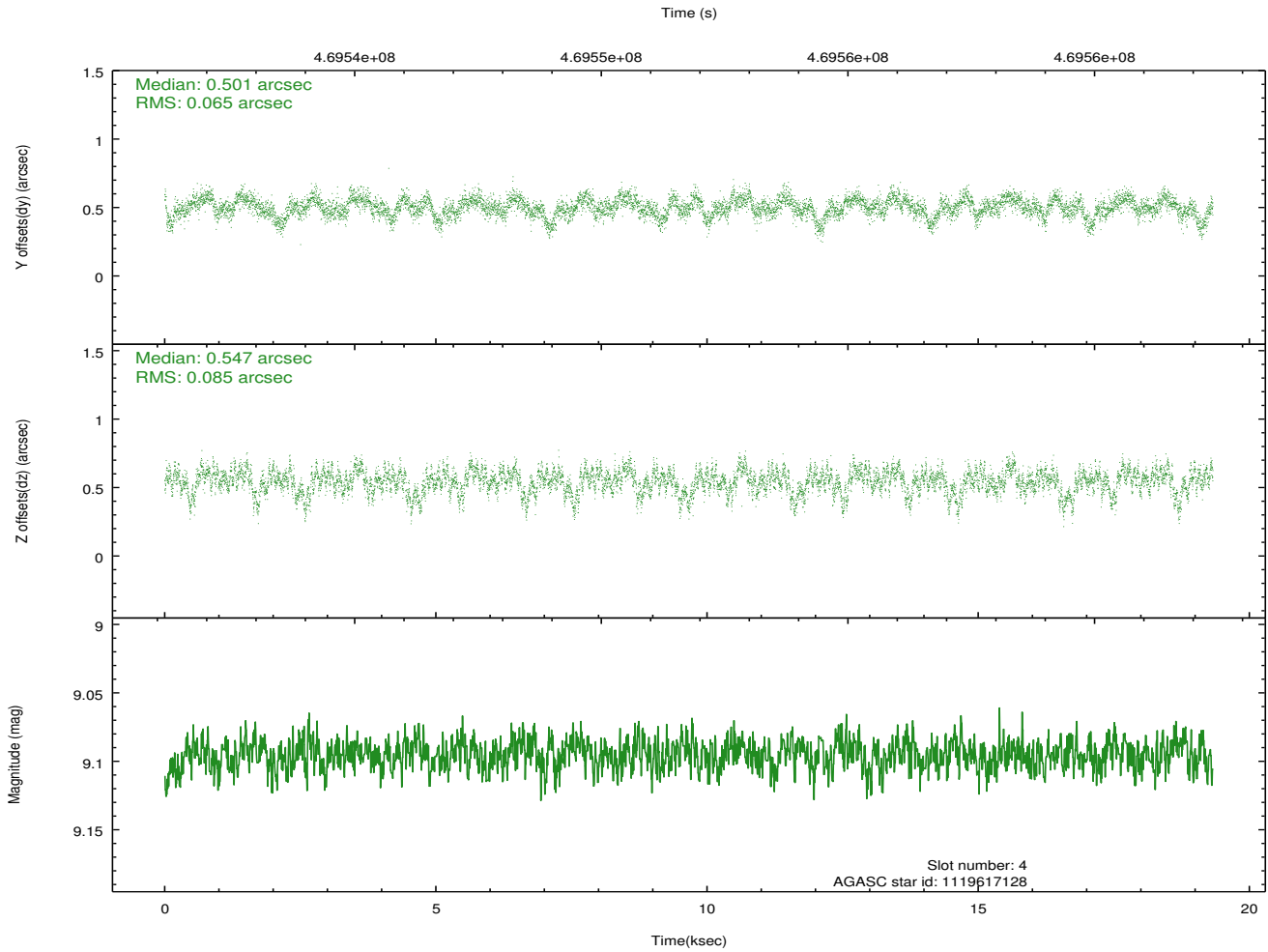
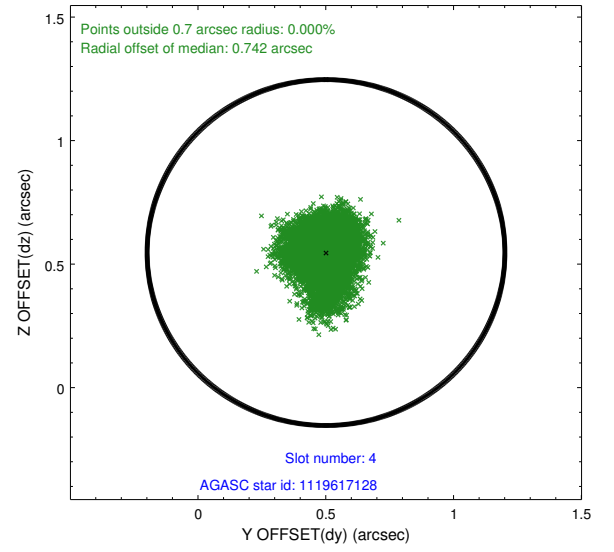
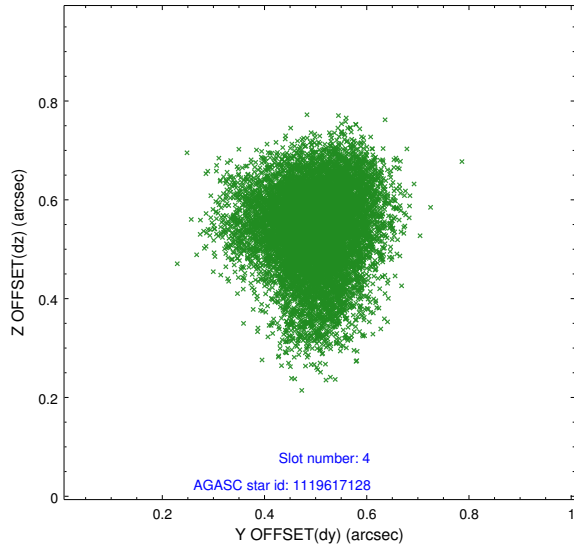
slot	status	used	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID		ACIS-I-1	7.08	4713	0.106	-0.075	0.007	0.013	0.000000	0.000000	927.70	-996.63
1	FID		ACIS-I-5	7.06	4714	-0.248	0.094	0.009	0.019	0.000000	0.000000	-1820.71	900.79
2	FID		ACIS-I-6	7.09	4714	0.050	0.052	0.011	0.022	0.000000	0.000000	392.89	1545.57
3	GUIDE	used	1117920360	8.47	9423	-0.171	-0.220	0.063	0.101	92.689586	-57.826981	-2097.95	1470.17
4	GUIDE	used	1119617128	9.10	9424	0.501	0.547	0.114	0.187	93.986624	-58.000911	-580.53	-588.75
5	GUIDE	used	1119617976	8.00	9428	-0.201	-0.199	0.068	0.107	94.543198	-57.336411	1782.52	544.18
6	GUIDE	used	1119620096	8.97	9419	-0.131	0.028	0.102	0.167	94.803811	-58.054312	482.35	-1744.26
7	GUIDE	used	1119622936	9.54	9361	0.009	-0.149	0.112	0.177	93.865538	-57.055249	1426.42	2169.98

## 2.4 Star Slots

### 2.4.1 Slot 3

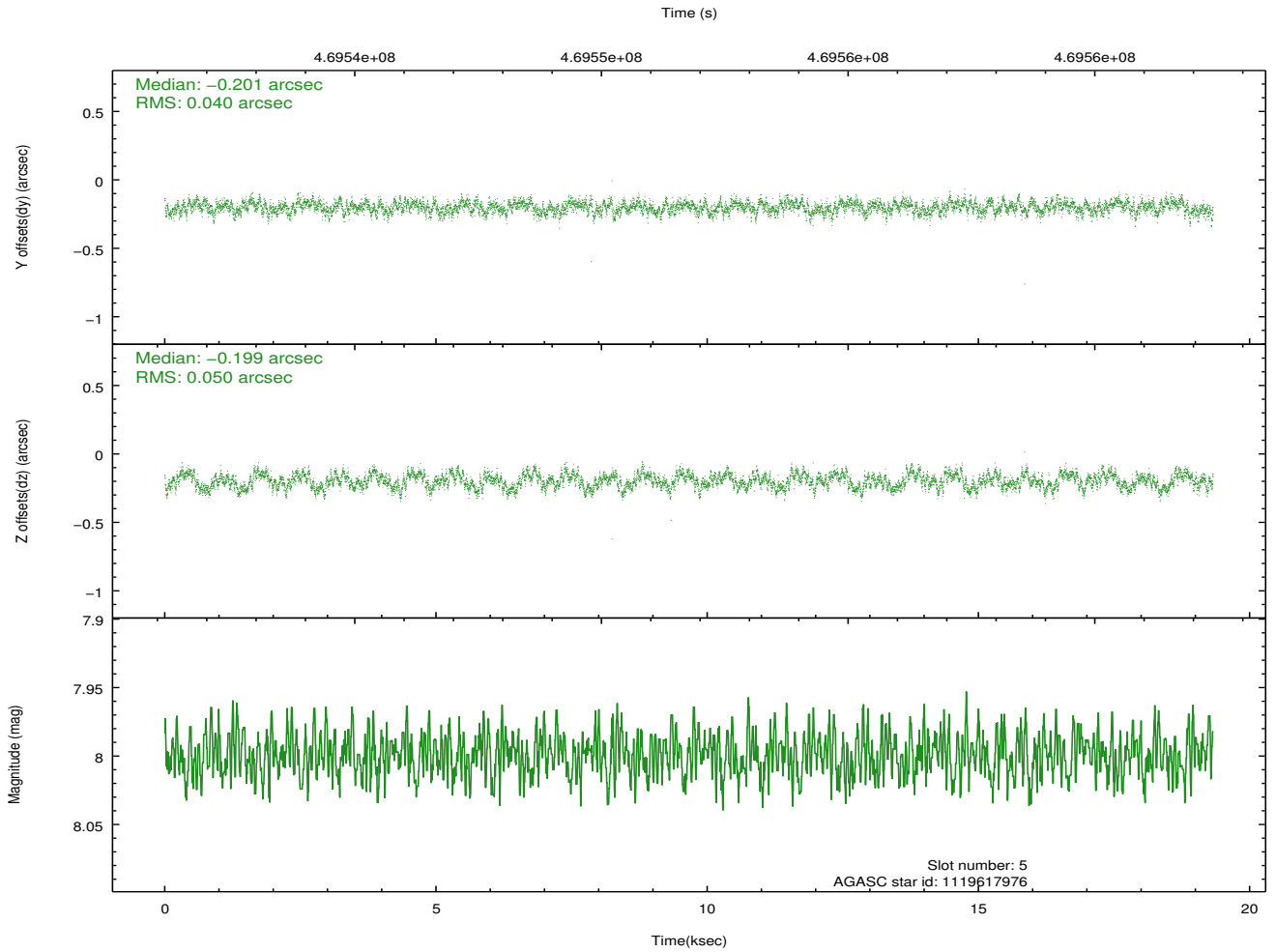
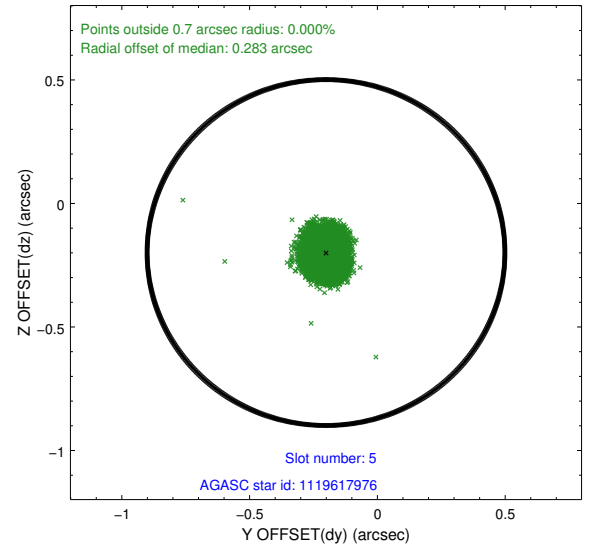
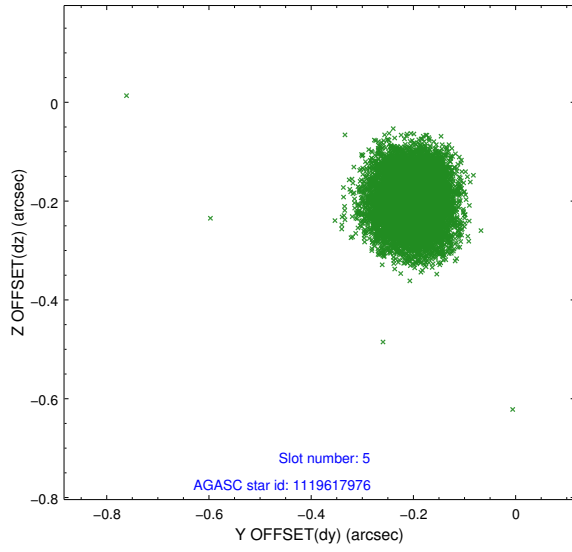


## 2.4.2 Slot 4

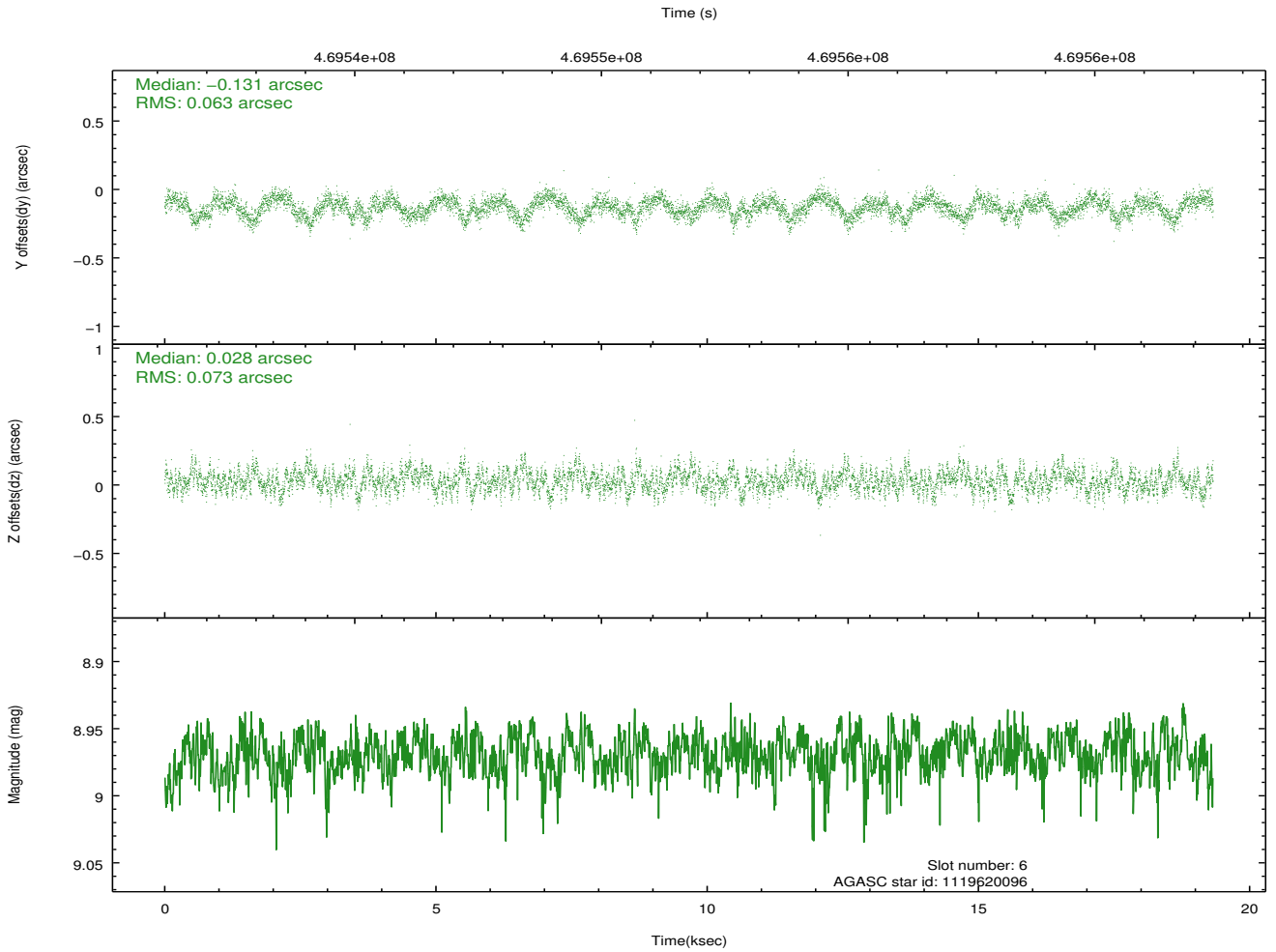
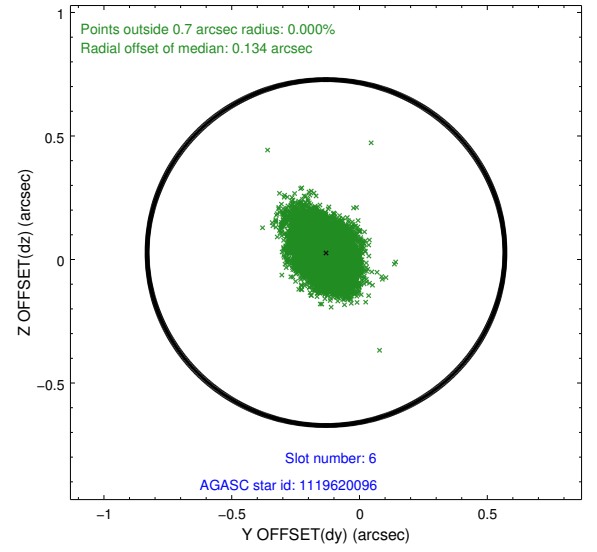
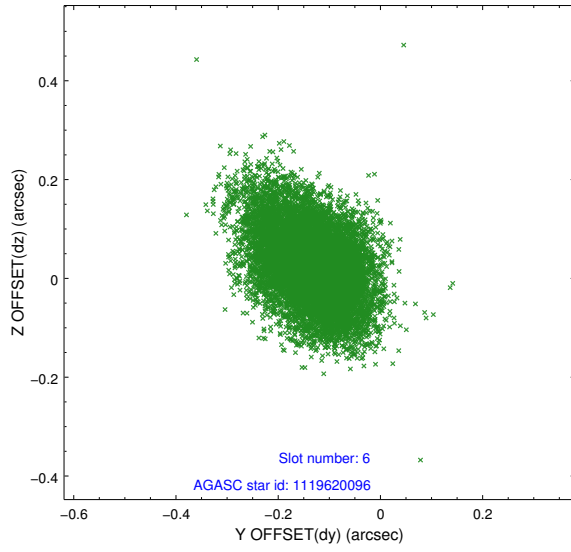




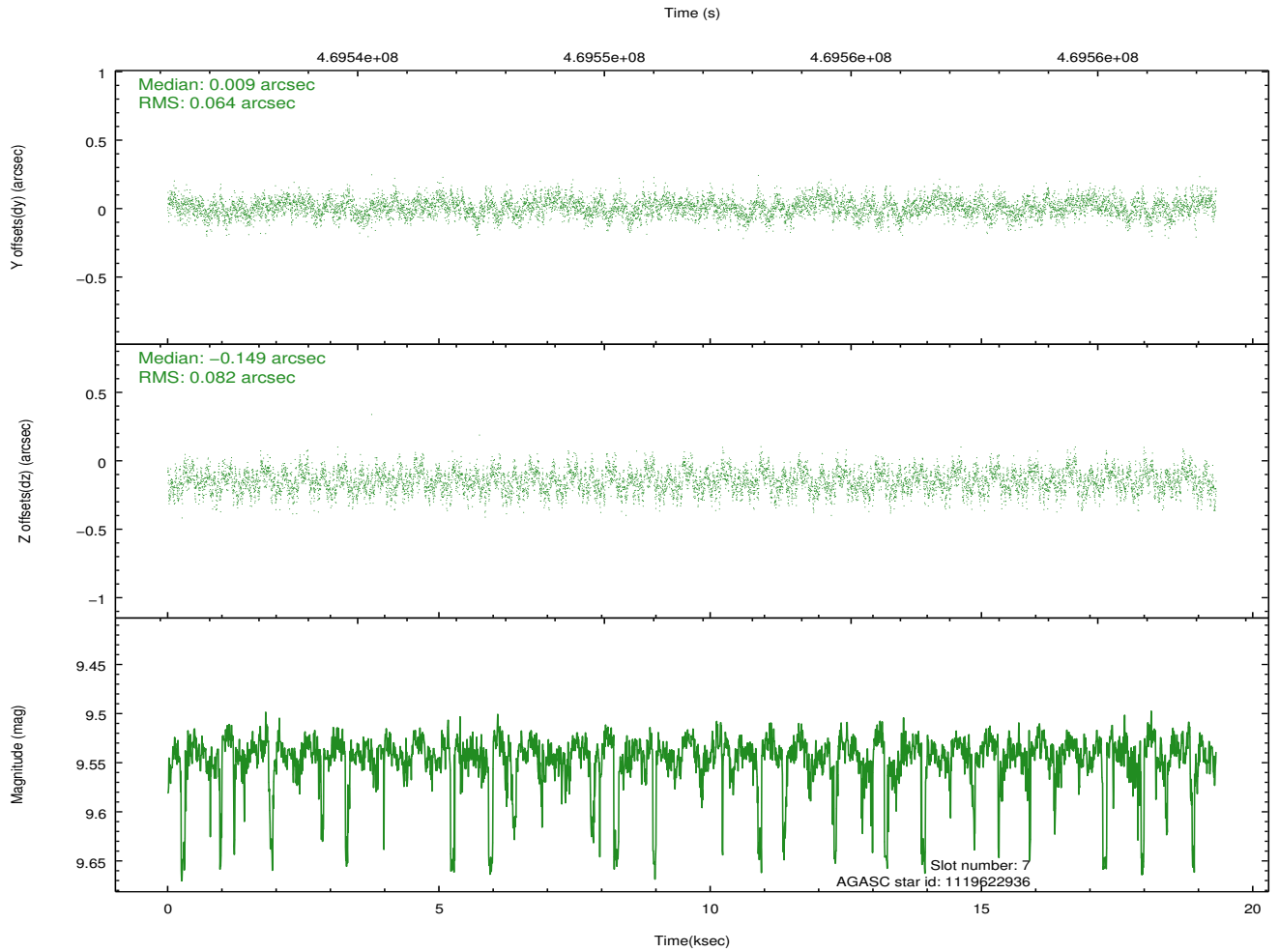
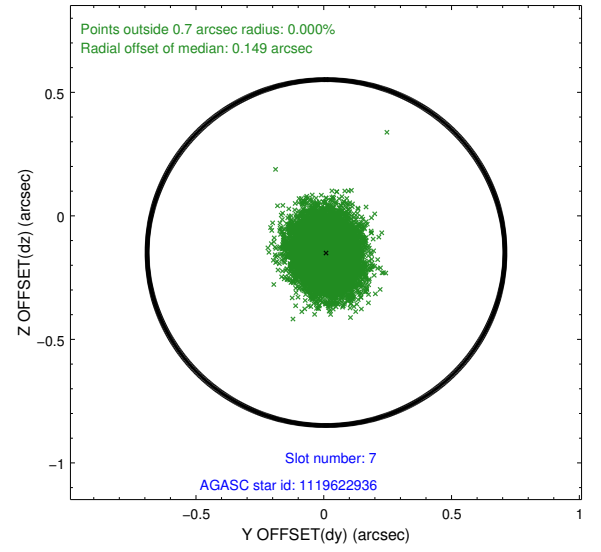
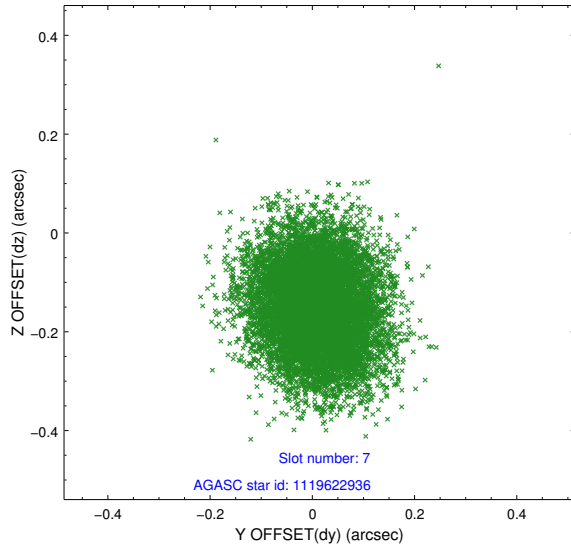
### 2.4.3 Slot 5



## 2.4.4 Slot 6

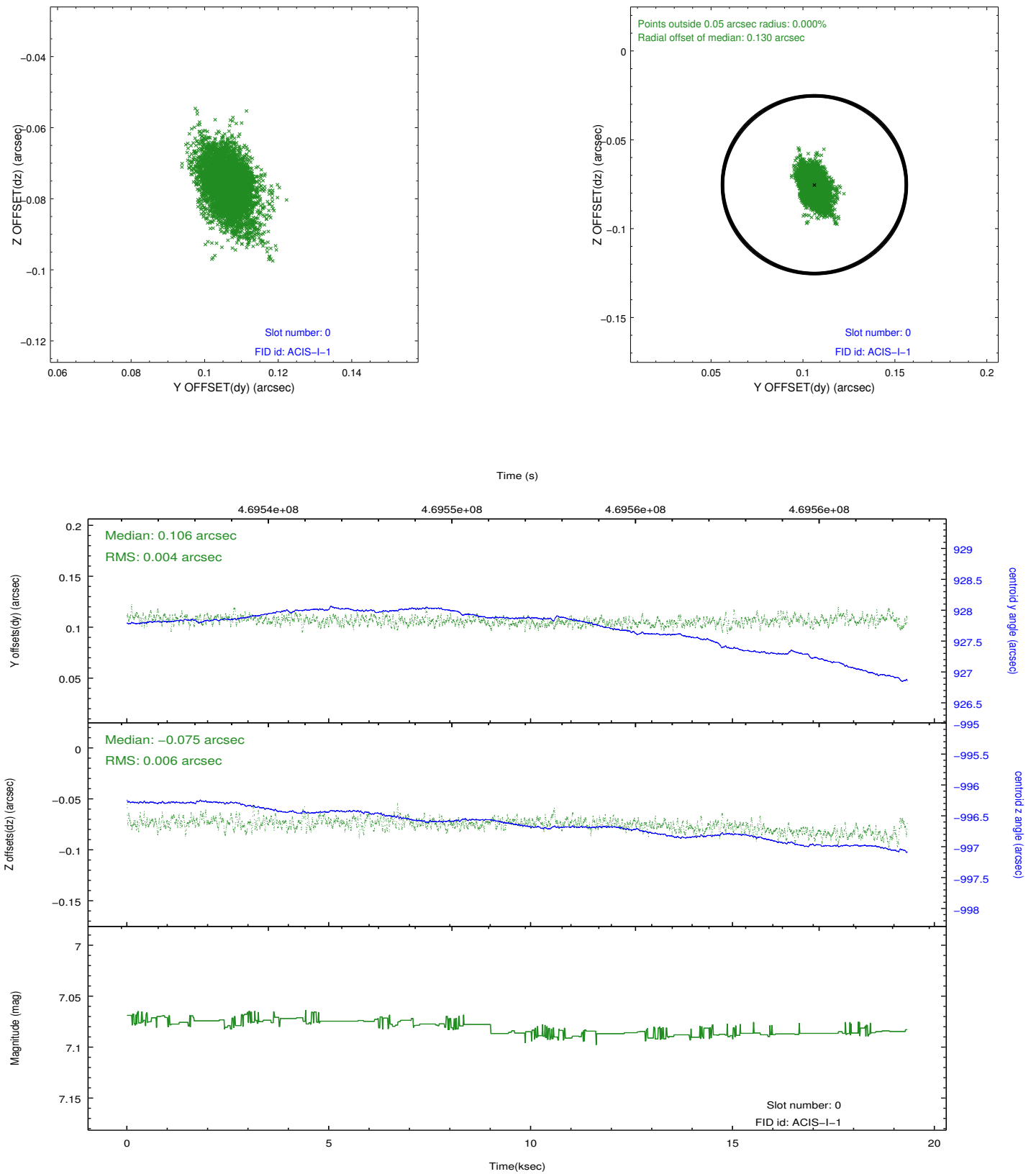


## 2.4.5 Slot 7

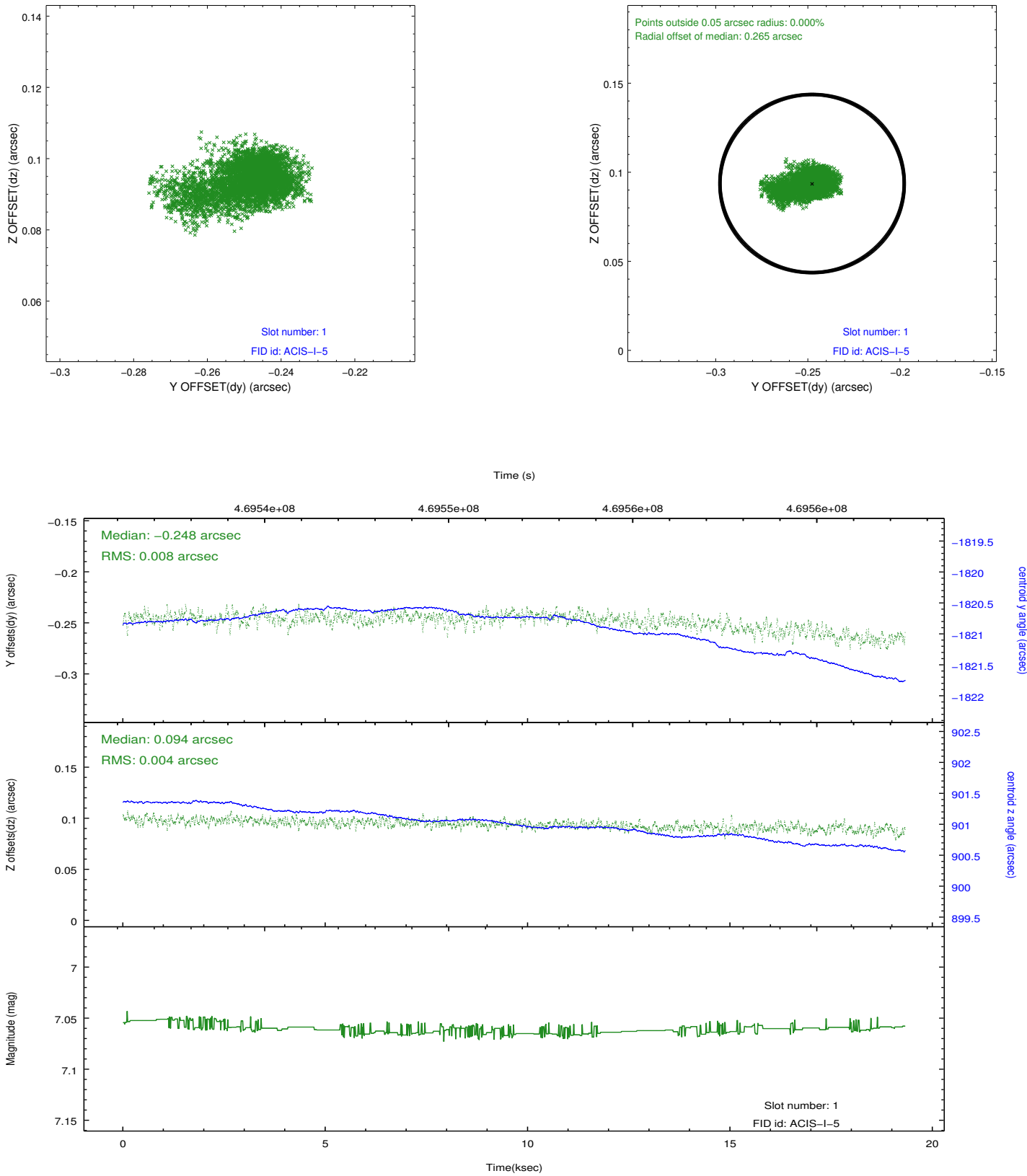


## 2.5 FID Slots

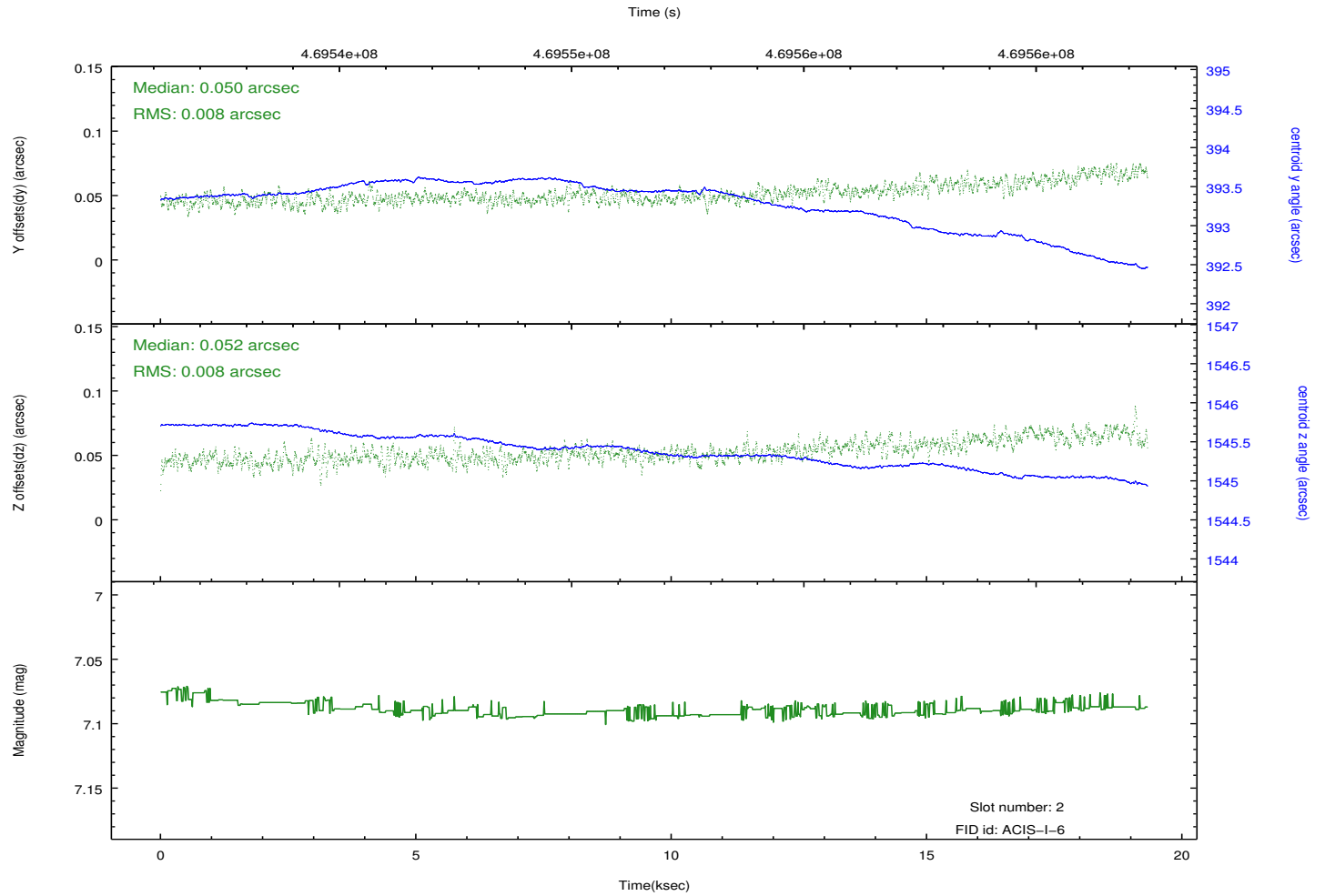
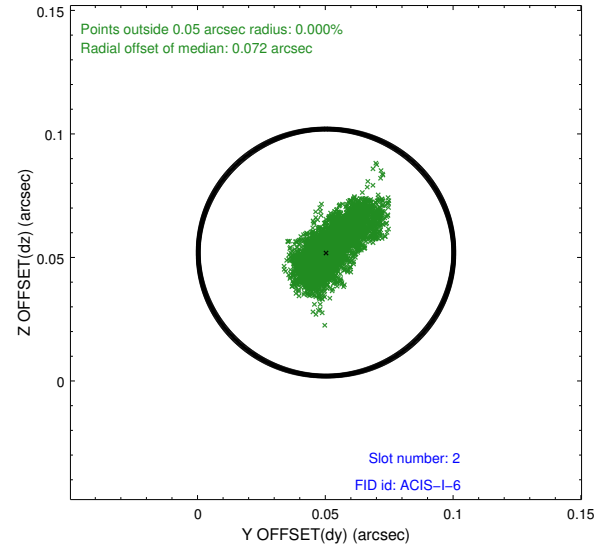
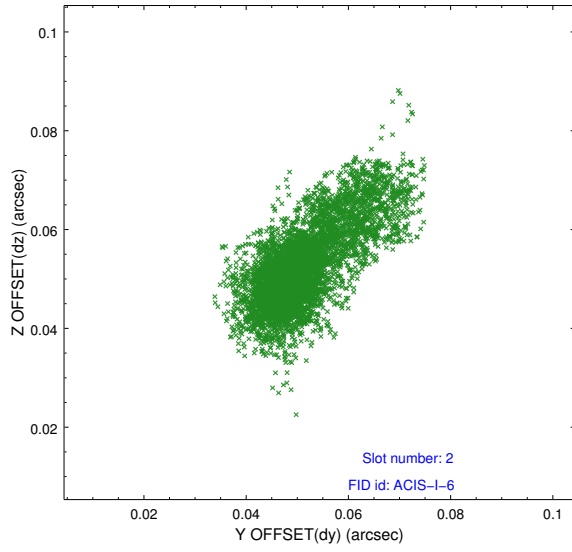
### 2.5.1 Slot 0



## 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)	2014.12.03
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	18.584500142932

## A.2 Comments

Joint proposal with HST.

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.