

# V&V Reference Report

## L2 ASCDS Version : 8.4.5

Observation 14026 - L2 Version 1  
Chandra X-Ray Center

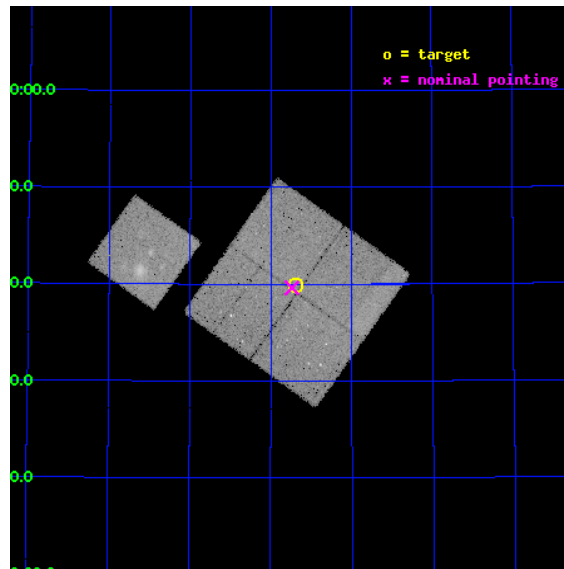
L2 Processing Date : Aug 10 2012

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# 1 Front

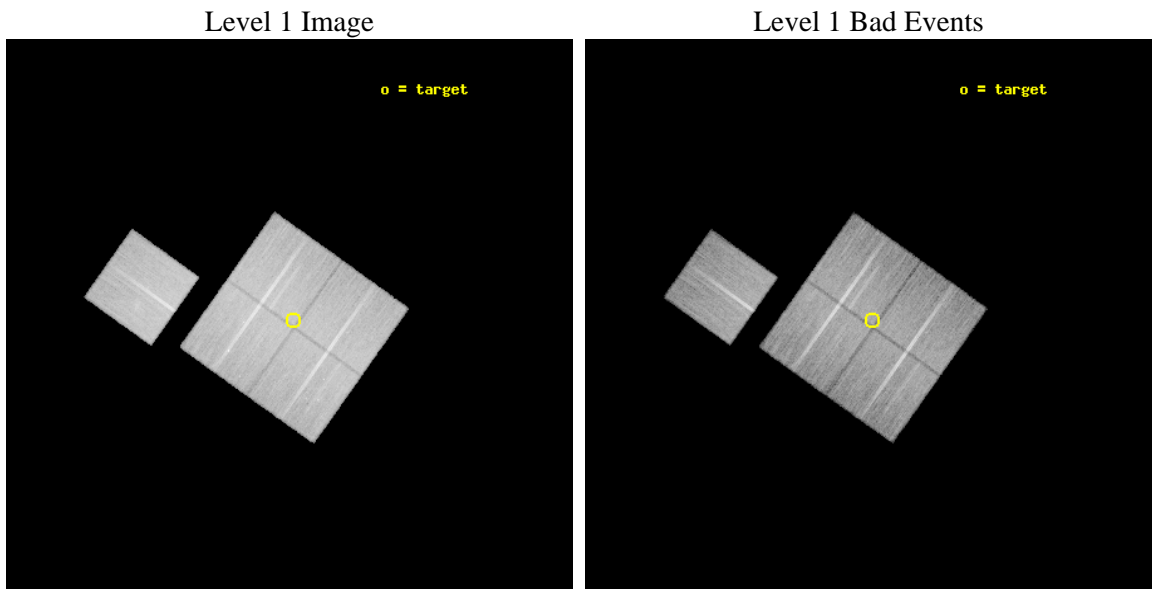
seq_num	801203	Sequence number
obs_id	14026	Observation id
title	No Need for Gas Clumping at the Virial Radius in a Galaxy Group/Cluster?	Proposal title
observer	Dr Philip Humphrey	Principal investigator
object	RXJ1159+5531 Offset 1	Source name
dtcycle	0	&#160
cycle	P	events from which exps? Prim/Second/Both
ra_targ	180.173333	Observer's specified target RA [deg]
dec_targ	55.665306	Observer's specified target Dec [deg]
ra_nom	180.18473688479	Nominal RA [deg]
dec_nom	55.660406203448	Nominal Dec [deg]
roll_nom	305.43469866928	Nominal Roll [deg]
revision	1	Processing version of data
ontime	49584.418430805	Sum of GTIs [s]
livetime	48936.561500489	Livetime [s]
ontime0	49590.700381398	Sum of GTIs [s]
ontime1	49584.418420792	Sum of GTIs [s]
ontime2	49587.559421062	Sum of GTIs [s]
ontime3	49584.418430805	Sum of GTIs [s]
ontime6	49590.700381398	Sum of GTIs [s]
l2events	131562	Number of level 2 events



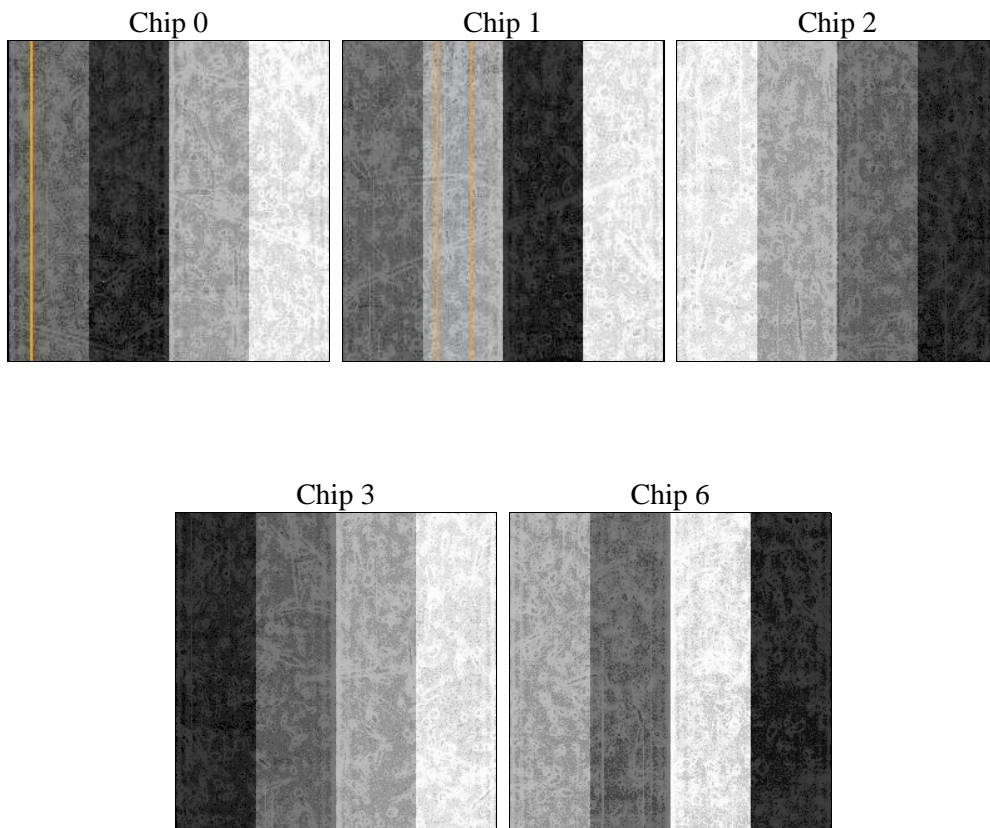
## 2 OBI

### 2.1 OBI

#### 2.1.1 Images



#### 2.1.2 Bias



### 2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	49506.000000	[s] Scheduled observation exposure time
ascdsver	8.4.5	Processing system revision	ontime	49584.418430805	Sum of GTIs [s]
caldbver	4.5.1.1	&#160	ontime0	49590.700381398	Sum of GTIs [s]
date	2012-08-10T14:25:58	Date and time of file creation	ontime1	49584.418420792	Sum of GTIs [s]
revision	1	Processing version of data	ontime2	49587.559421062	Sum of GTIs [s]
			ontime3	49584.418430805	Sum of GTIs [s]
			ontime6	49590.700381398	Sum of GTIs [s]
			l1events	1205927	Number of level 1 events

### 2.1.4 Events

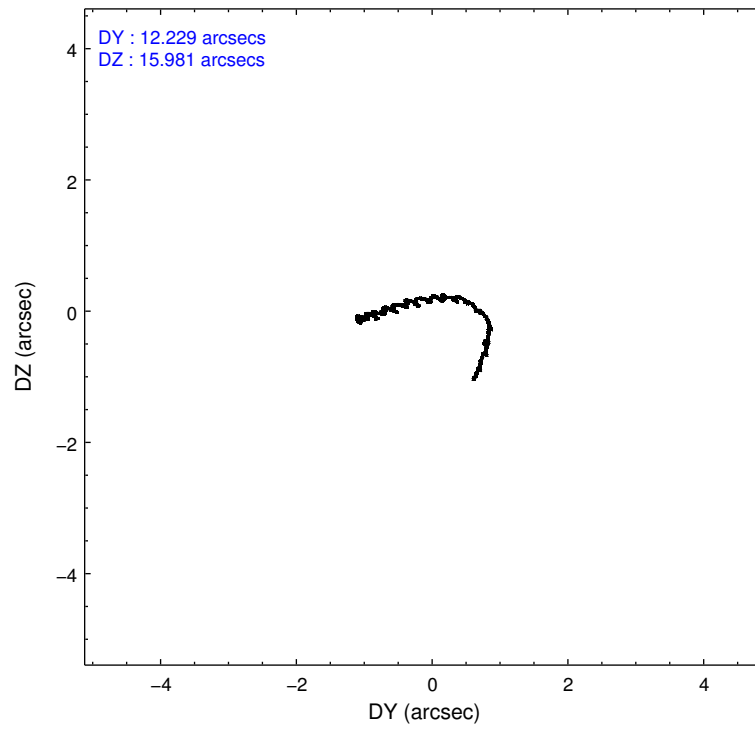
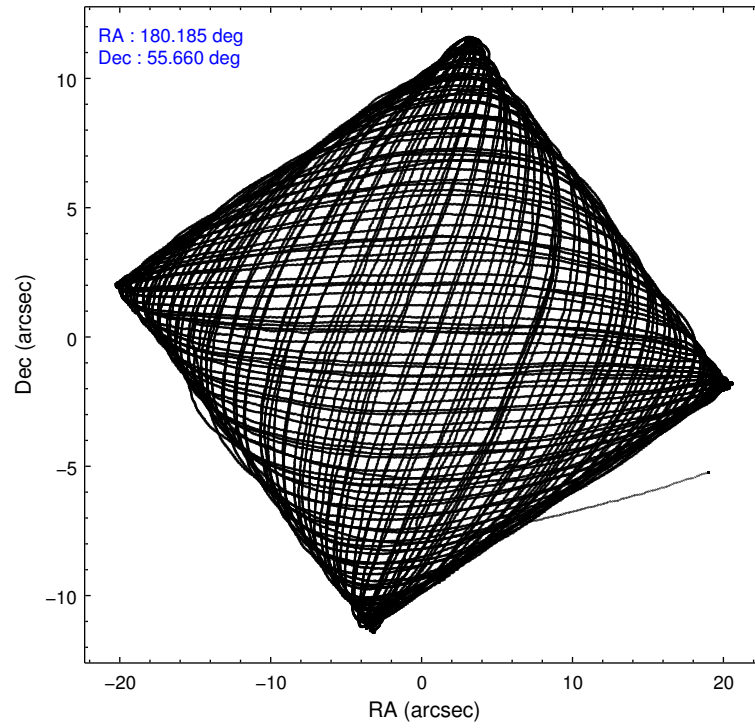
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6
level 1 events	229408	231912	249417	245171	250019
rejected events	198464	198828	219582	217121	216460
rejected %	86%	85%	88%	88%	86%

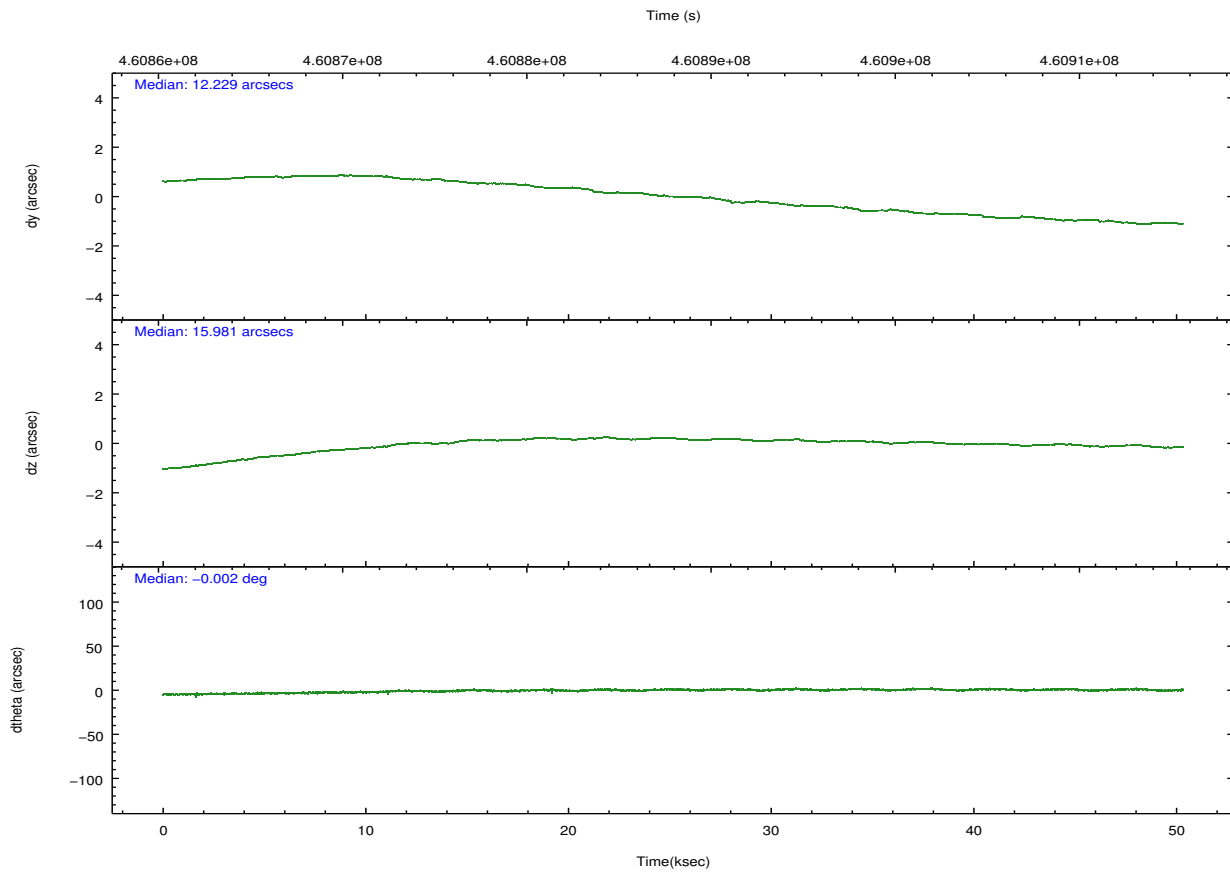
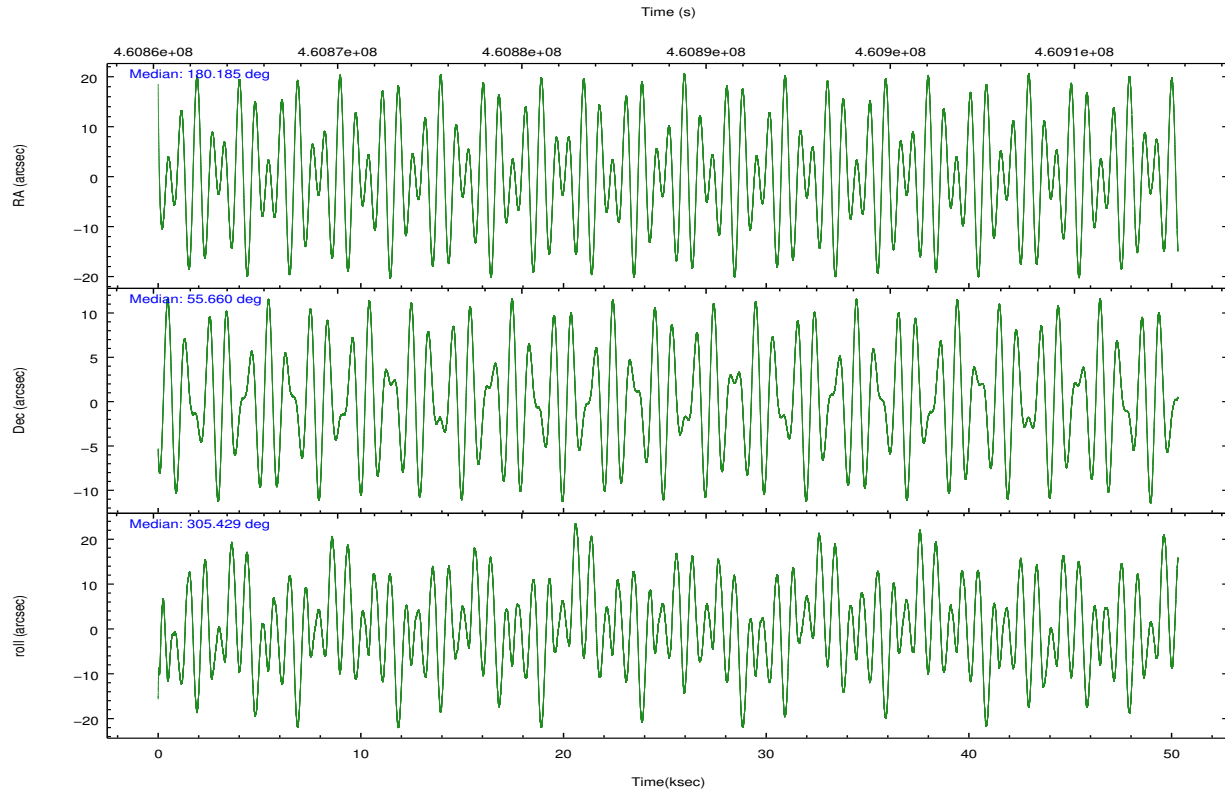
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6
grade 0 events	11303	11690	10773	9725	13192
	4%	5%	4%	3%	5%
grade 1 events	108	119	160	159	134
	0%	0%	0%	0%	0%
grade 2 events	7391	7947	7345	6284	7018
	3%	3%	2%	2%	2%
grade 3 events	3189	3226	3064	3002	3273
	1%	1%	1%	1%	1%
grade 4 events	2959	3263	2932	3074	3219
	1%	1%	1%	1%	1%
grade 5 events	11591	12368	11118	13051	12705
	5%	5%	4%	5%	5%
grade 6 events	6107	6962	5725	5968	6863
	2%	3%	2%	2%	2%
grade 7 events	186760	186337	208300	203908	203615
	81%	80%	83%	83%	81%

## 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	Number of optional ACIS chips dropped	0	0
Observation mode	POINTING	POINTING	On-chip summing requested	N	N
[deg] Pointing RA	180.140303	180.1847368847887	Subarray requested	NONE	NONE
[deg] Pointing Dec	55.671731	55.6604062034479	Alternating exposures requested	N	N
[deg] Pointing Roll	305.262697	305.4346986692788	[s] Primary exposure time	0.000000	3.1
[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)	460863592.184000	460861717.78139			
Observation start date	2012-08-09T01:38:45	2012-08-09T01:08:37			
[s] Observation end time (MET)	460913098.184000	460913590.98417			
Observation end date	2012-08-09T15:23:51	2012-08-09T15:33:10			
Read mode	TIMED	TIMED			

## 2.3 Aspect



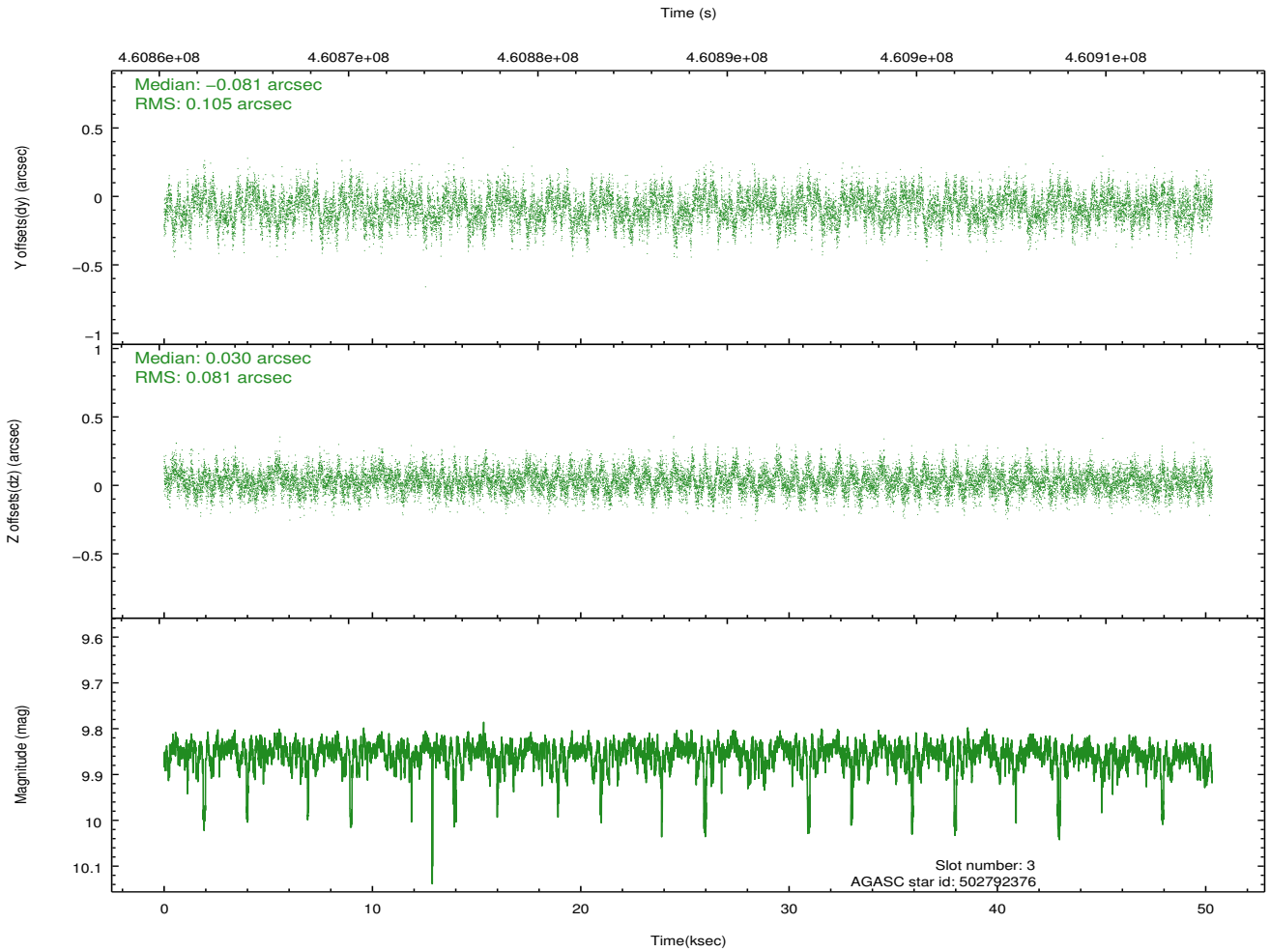
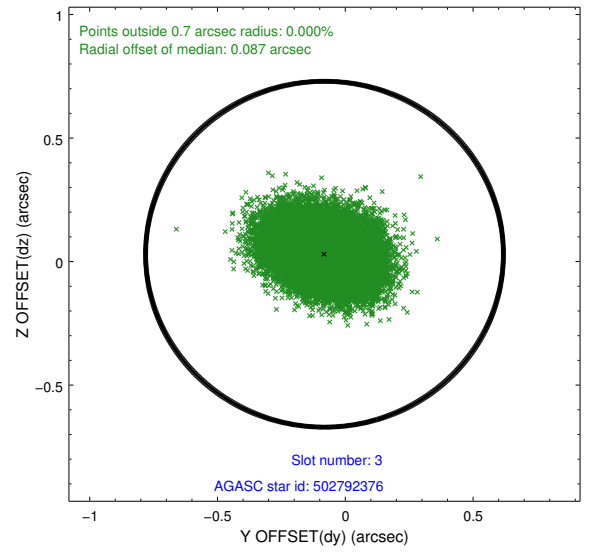
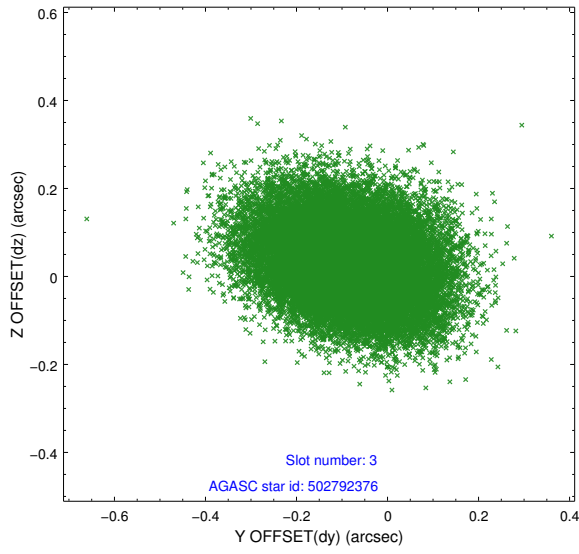


### Slot Statistics

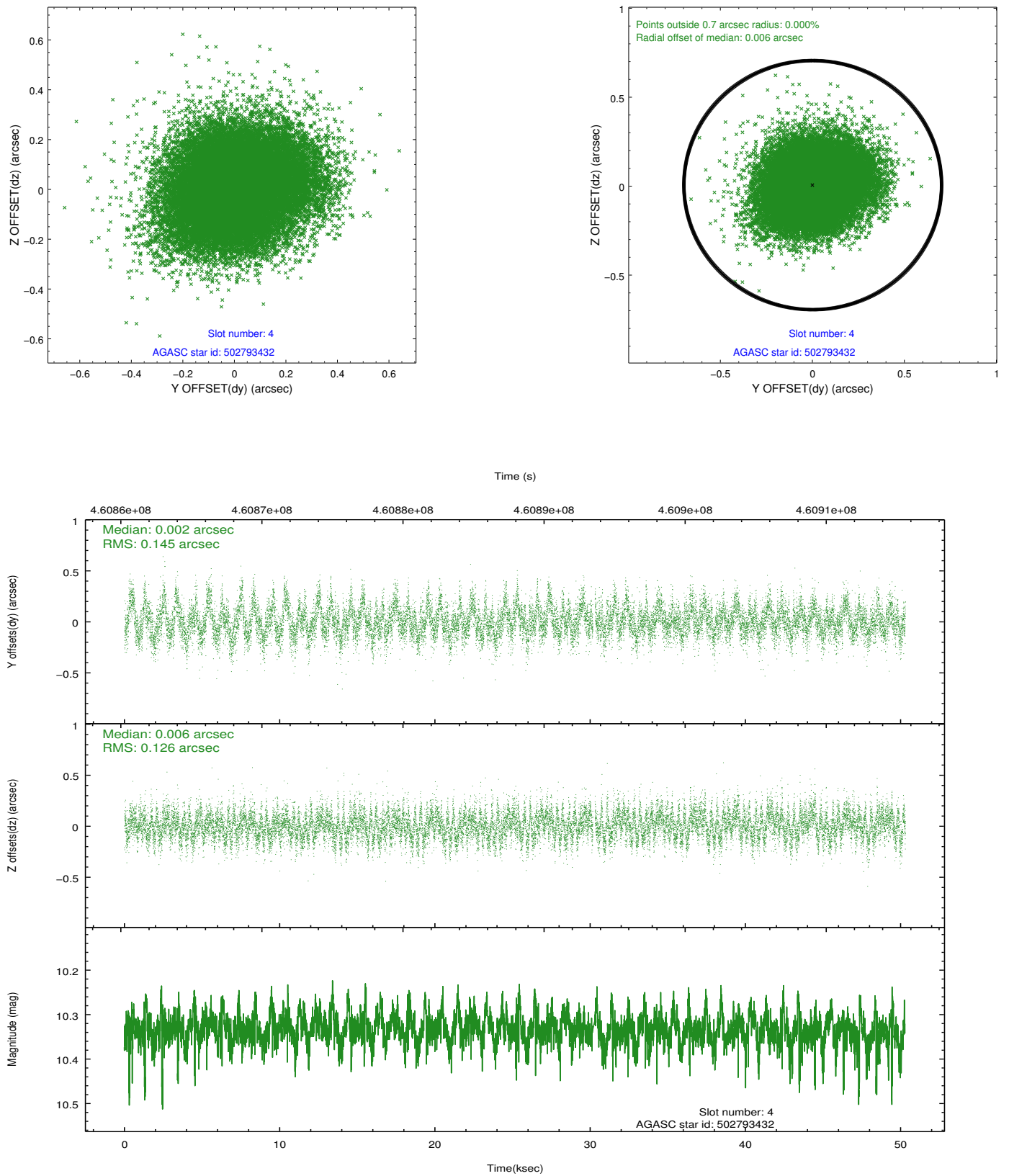
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-I-1	7.03	12270	0.071	-0.054	0.011	0.027	0.000000	0.000000	927.40	-839.59
1	FID	ACIS-I-5	7.02	12272	-0.199	0.074	0.016	0.026	0.000000	0.000000	-1820.98	1058.04
2	FID	ACIS-I-6	7.03	12271	0.034	0.051	0.015	0.035	0.000000	0.000000	392.94	1702.50
3	GUIDE	502792376	9.85	24477	-0.081	0.030	0.141	0.232	180.437493	55.132253	1938.27	-620.67
4	GUIDE	502793432	10.33	24426	0.002	0.006	0.203	0.333	181.325466	55.427686	2098.41	1481.86
5	GUIDE	502793960	9.56	24513	0.132	-0.020	0.172	0.274	179.393376	55.531414	-472.15	-1529.29
6	GUIDE	502795632	9.08	24523	-0.019	-0.117	0.116	0.209	180.454171	55.827001	-90.57	841.91
7	GUIDE	502796064	9.68	24482	-0.036	0.087	0.221	0.321	178.783977	55.701683	-1697.84	-2168.58

## 2.4 Star Slots

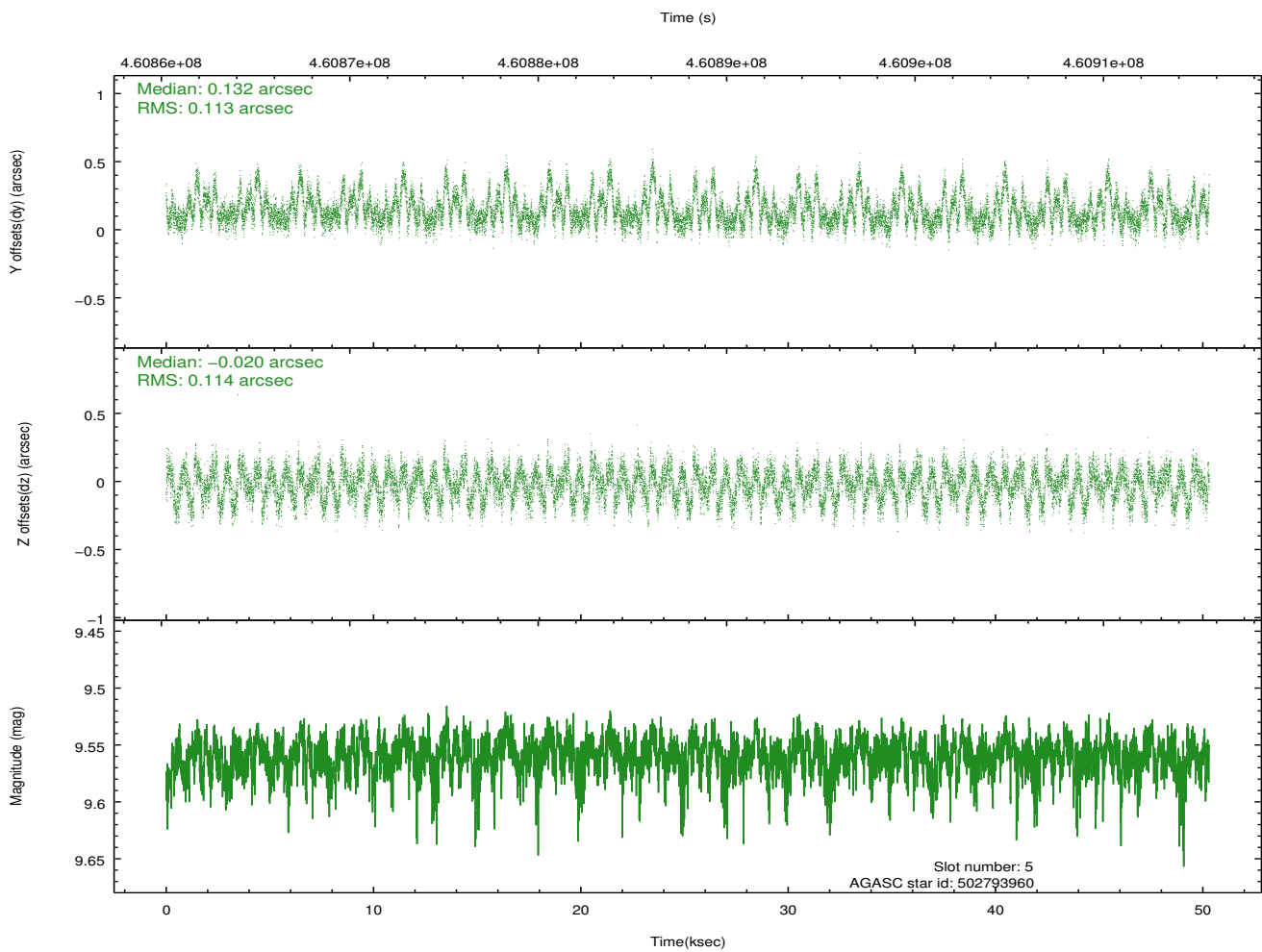
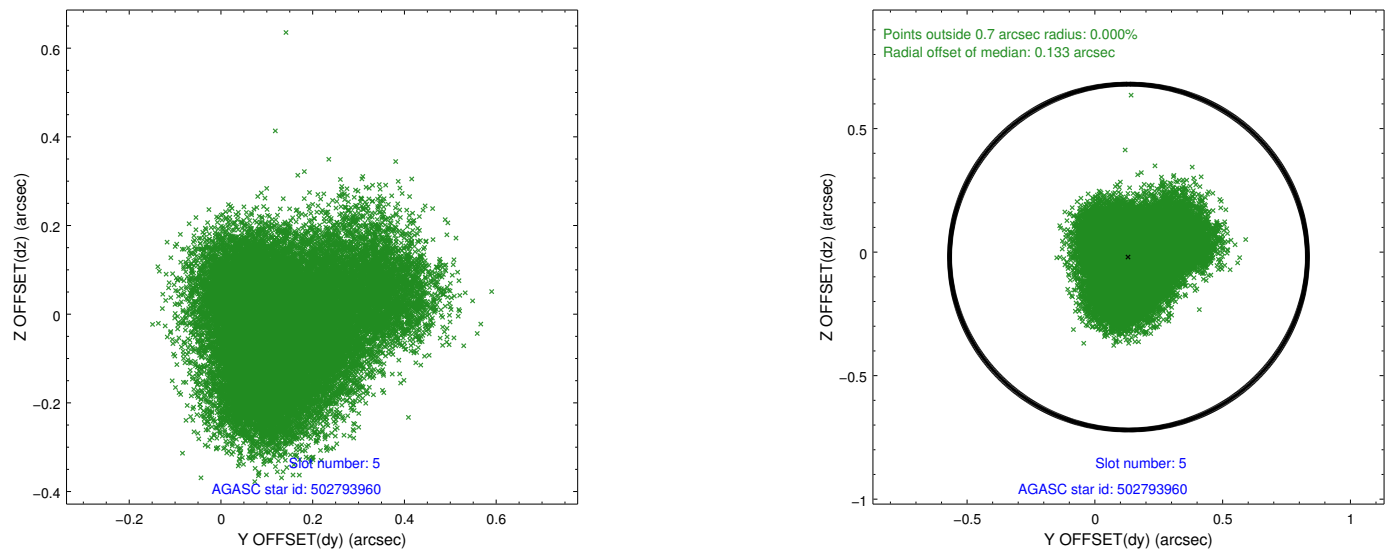
### 2.4.1 Slot 3



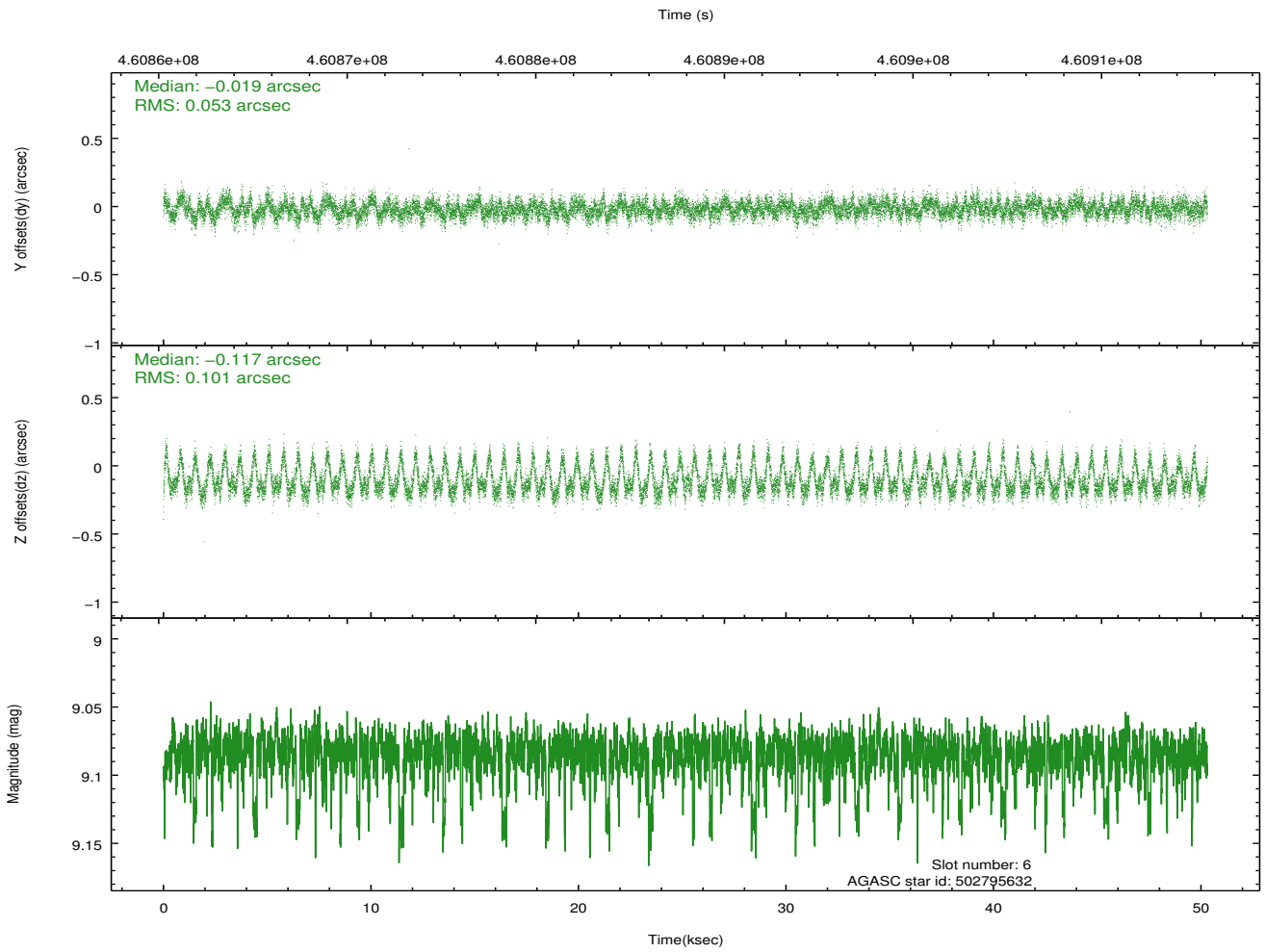
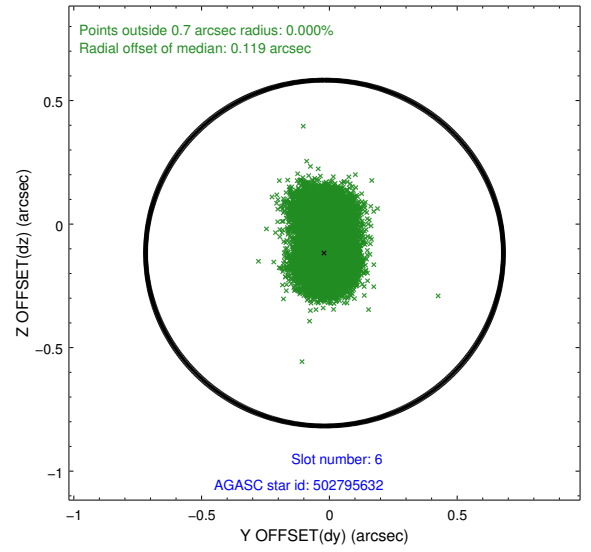
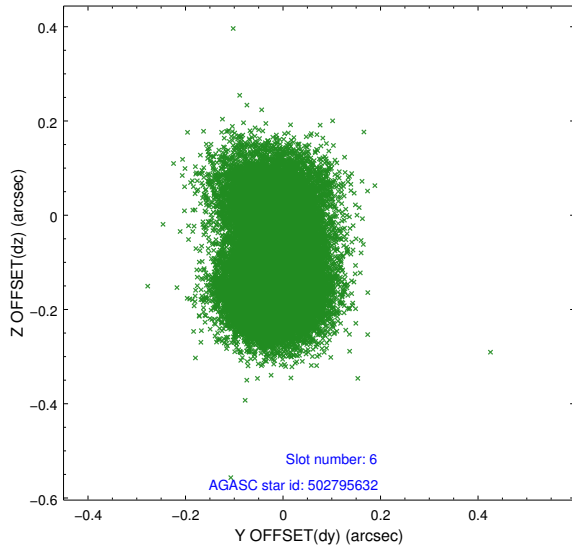
## 2.4.2 Slot 4



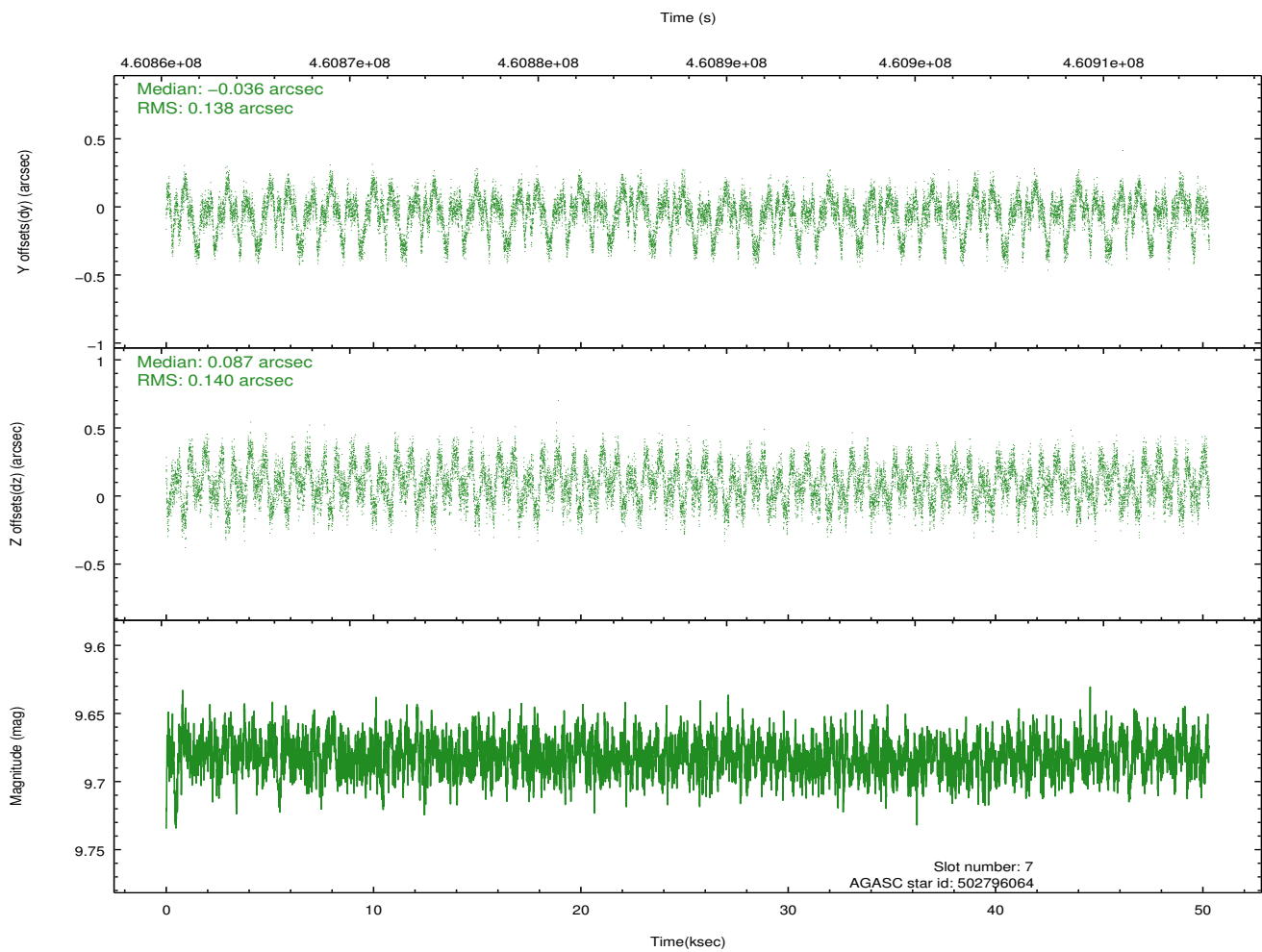
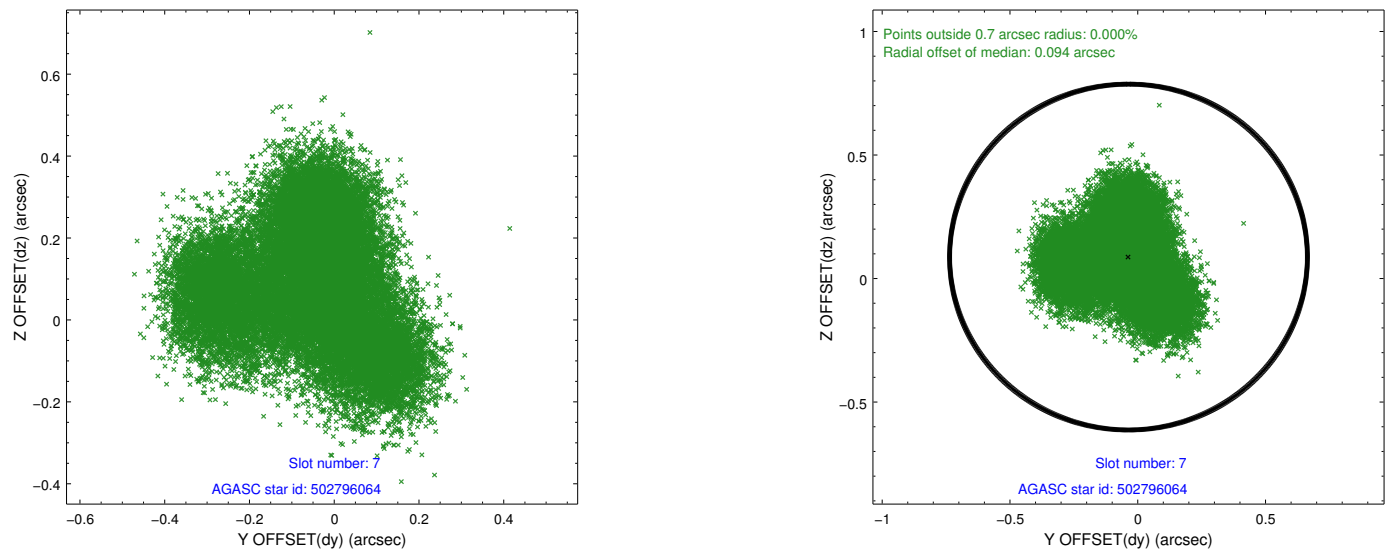
### 2.4.3 Slot 5



### 2.4.4 Slot 6

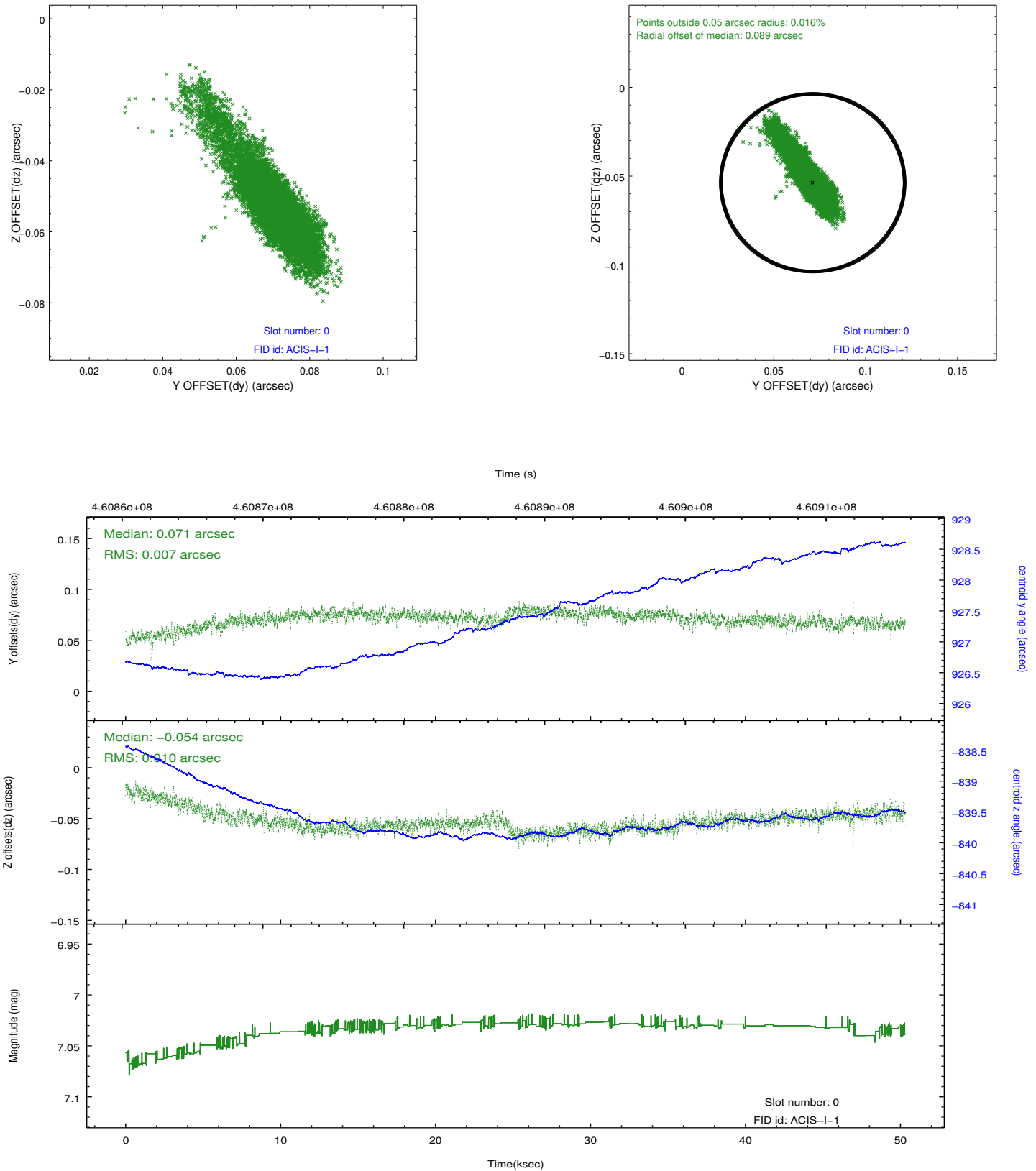


## 2.4.5 Slot 7

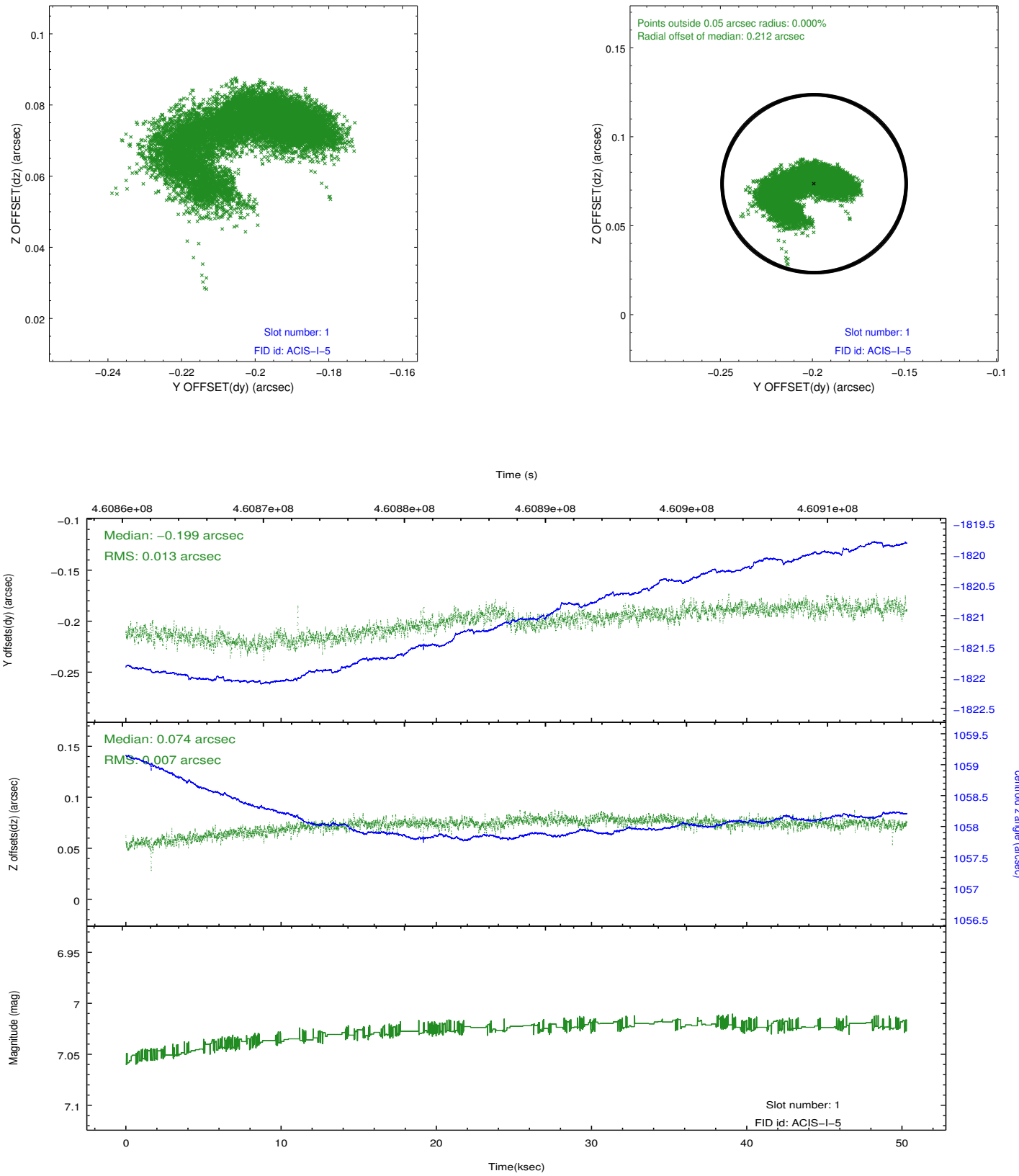


## 2.5 FID Slots

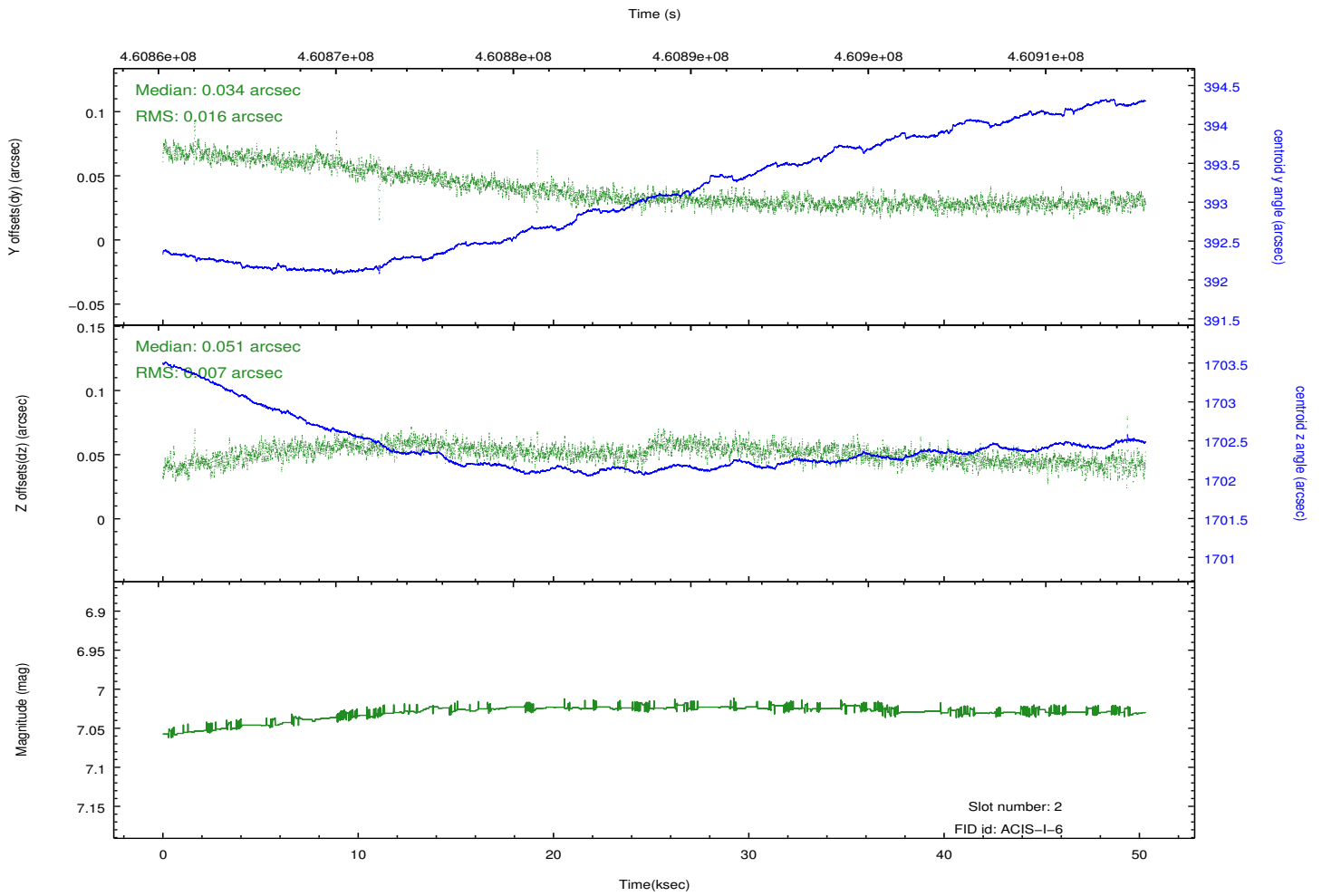
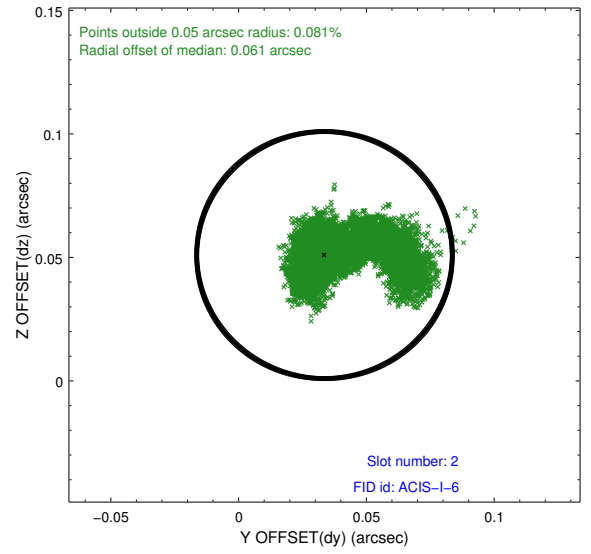
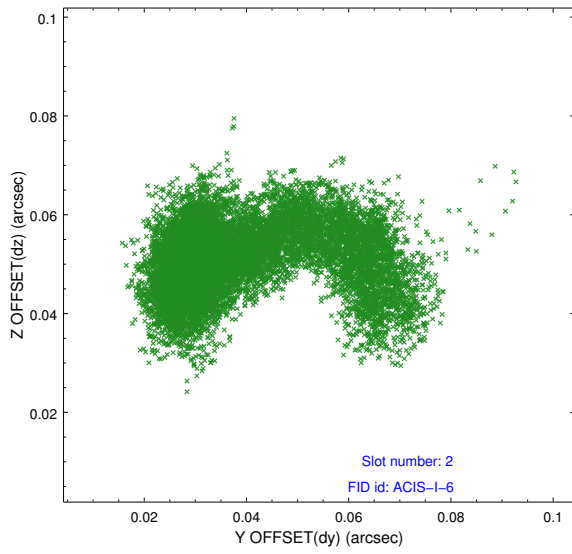
### 2.5.1 Slot 0



## 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)	2012.08.10
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	49.584418430805

## A.2 Comments