

# V&V Reference Report

## L2 ASCDS Version : 8.4.3.1

Observation 7400 - L2 Version 2  
Chandra X-Ray Center

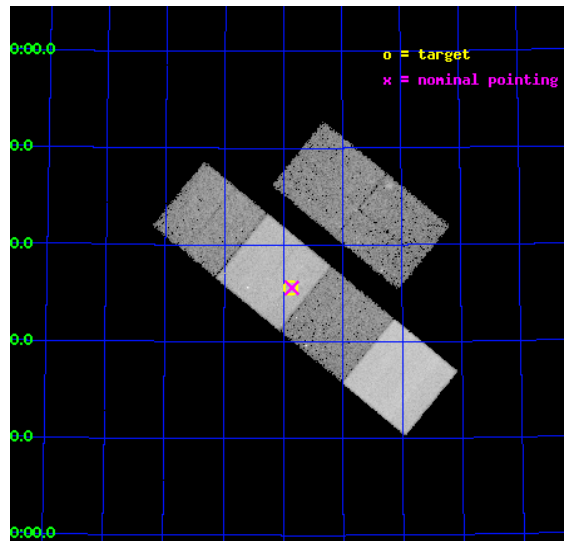
L2 Processing Date : Apr 11 2012

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# 1 Front

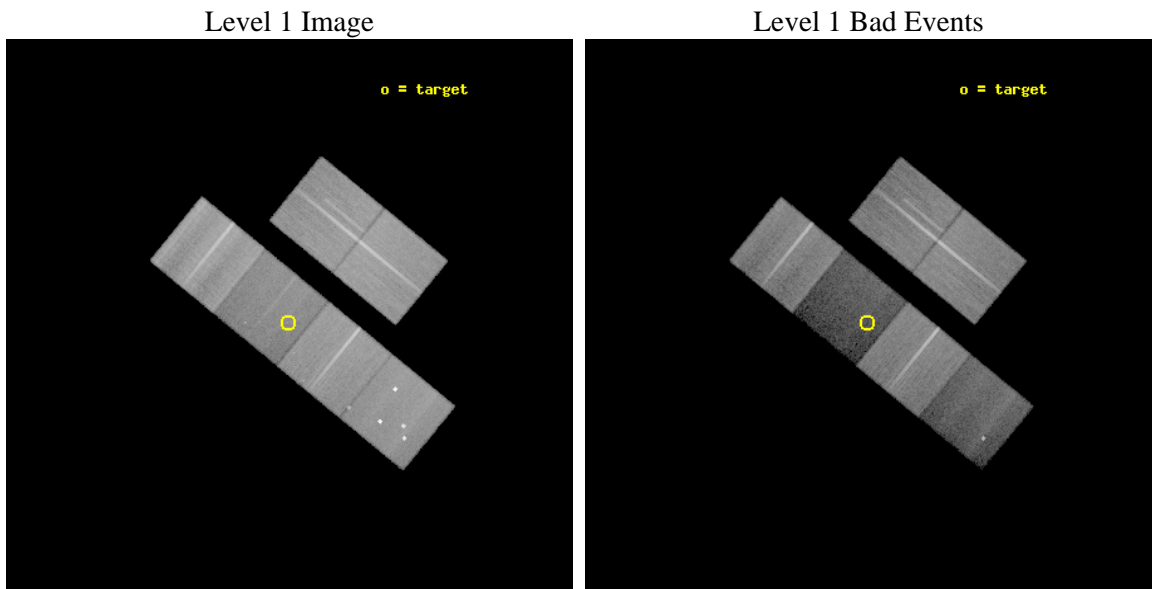
seq_num	500642	Sequence number
obs_id	7400	Observation id
title	The Guitar Nebula: A Bow Shock that Traces ISM Turbulence and Accelerates Relativistic Particles	Proposal title
observer	Dr. Shami Chatterjee	Principal investigator
object	B2224+65	Source name
dtcycle	0	&#160
cycle	P	events from which exps? Prim/Second/Both
ra_targ	336.469167	Observer's specified target RA [deg]
dec_targ	65.592583	Observer's specified target Dec [deg]
ra_nom	336.46423279927	Nominal RA [deg]
dec_nom	65.593073352299	Nominal Dec [deg]
roll_nom	219.31329148619	Nominal Roll [deg]
revision	2	Processing version of data
ontime	37042.848263323	Sum of GTIs [s]
livetime	36573.789414088	Livetime [s]
ontime2	37039.648293138	Sum of GTIs [s]
ontime3	37042.725143313	Sum of GTIs [s]
ontime5	37042.80722332	Sum of GTIs [s]
ontime6	37039.525272608	Sum of GTIs [s]
ontime7	37042.848263323	Sum of GTIs [s]
ontime8	37039.443103075	Sum of GTIs [s]
l2events	260573	Number of level 2 events



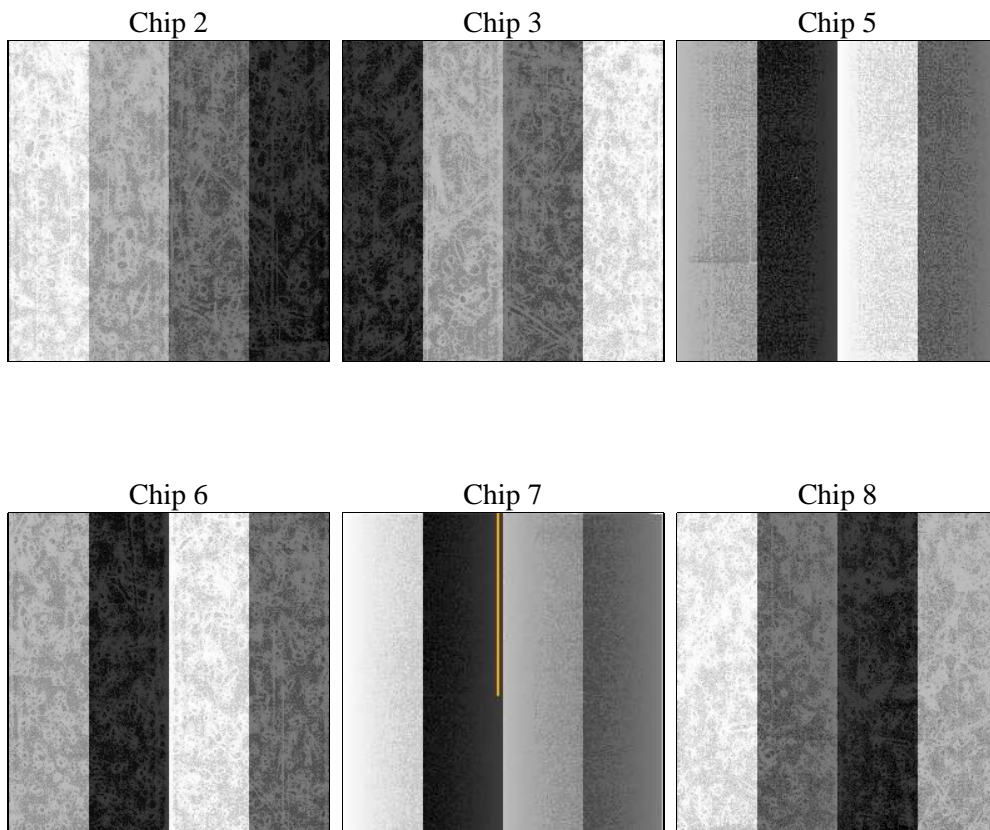
## 2 OBI

### 2.1 OBI

#### 2.1.1 Images



#### 2.1.2 Bias



### 2.1.3 Parameters

obi_num	1	Obi number	sched_exp_time	37000.000000	[s] Scheduled observation exposure time
ascdsver	8.4.3.1	Processing system revision	ontime	37042.848263323	Sum of GTIs [s]
caldbver	4.4.9	&#160	ontime2	37039.648293138	Sum of GTIs [s]
date	2012-04-11T00:53:00	Date and time of file creation	ontime3	37042.725143313	Sum of GTIs [s]
revision	2	Processing version of data	ontime5	37042.80722332	Sum of GTIs [s]
			ontime6	37039.525272608	Sum of GTIs [s]
			ontime7	37042.848263323	Sum of GTIs [s]
			ontime8	37039.443103075	Sum of GTIs [s]
			l1events	1398197	Number of level 1 events

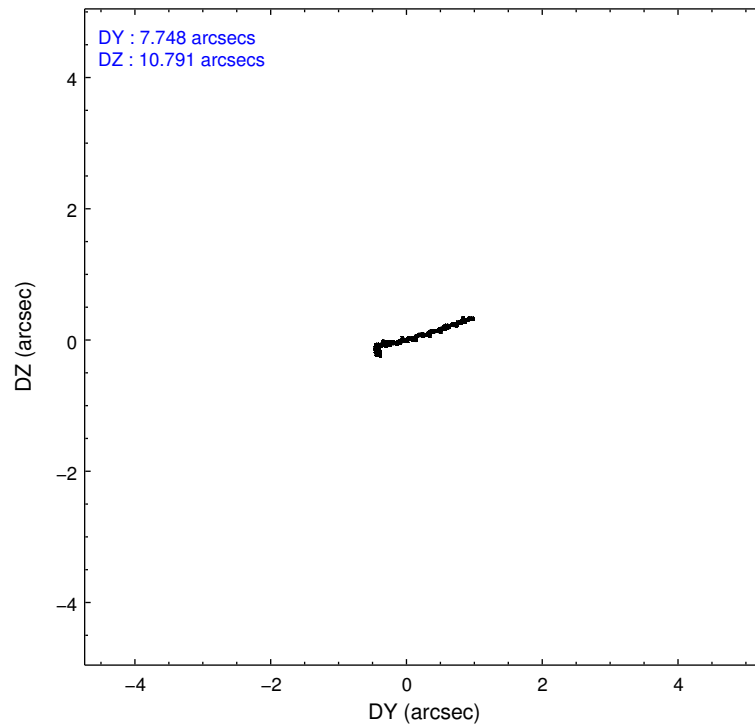
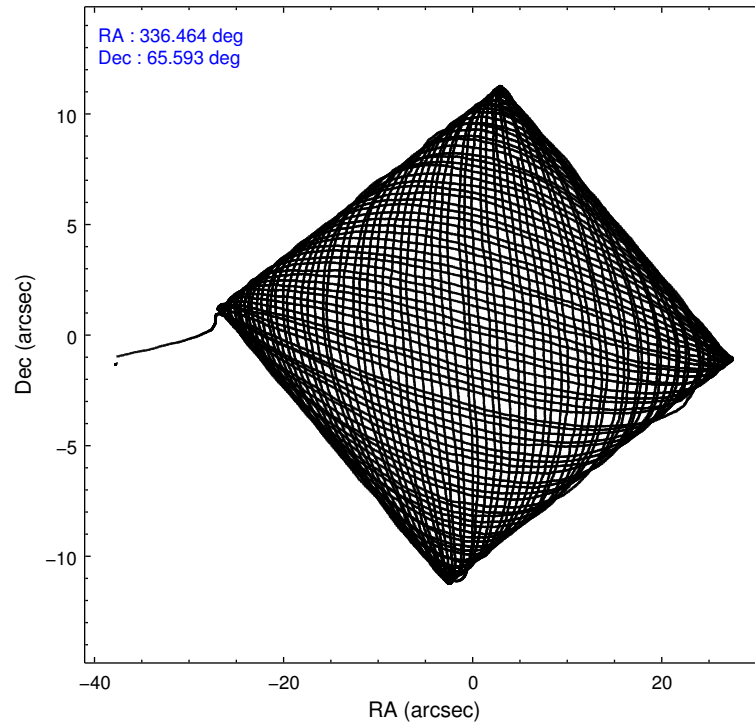
### 2.1.4 Events

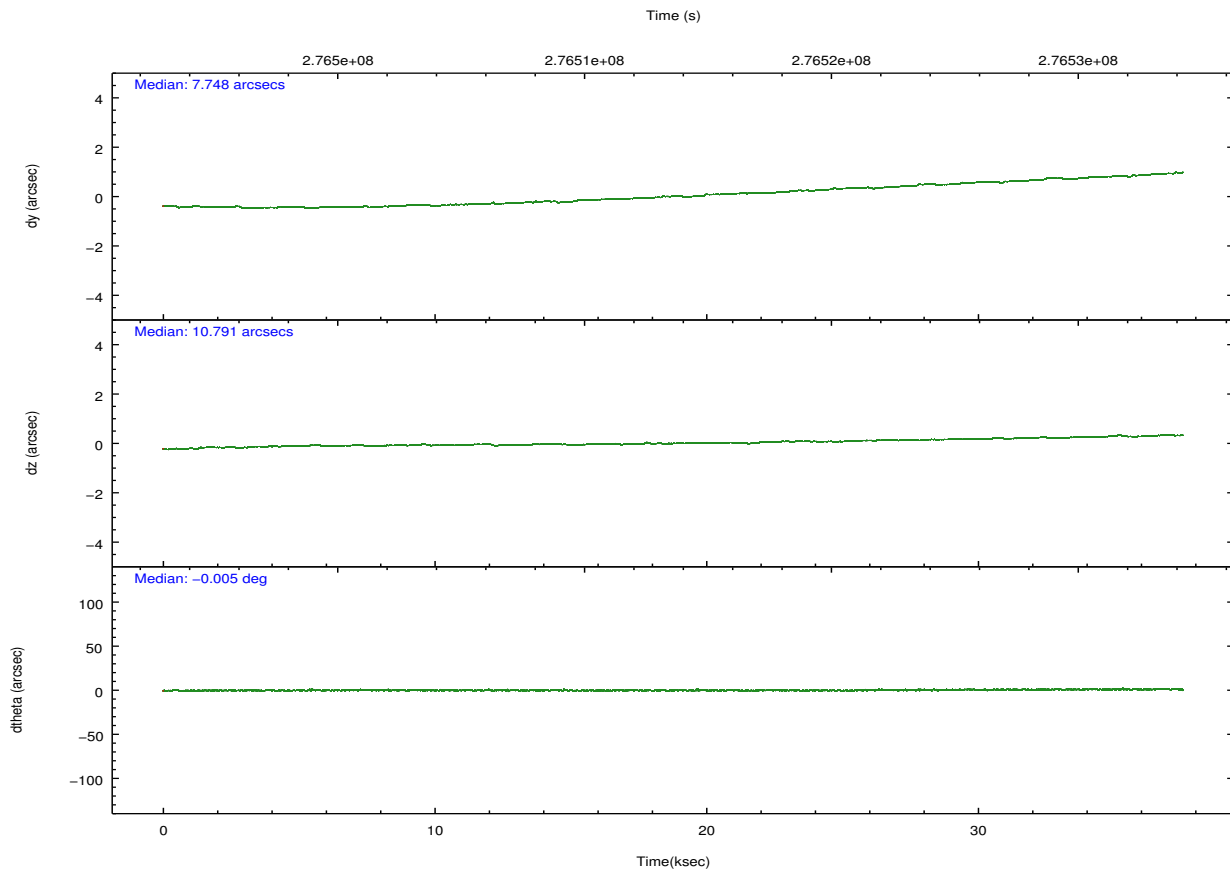
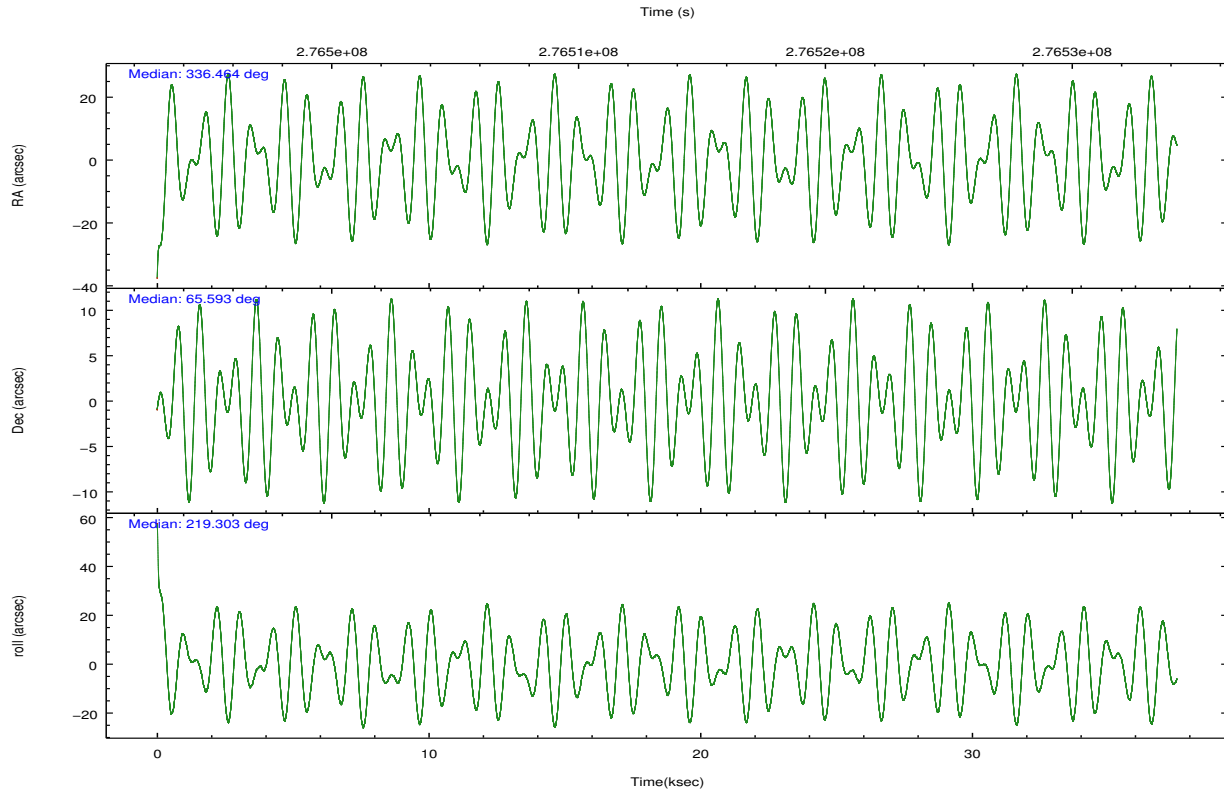
	ccd 2	ccd 3	ccd 5	ccd 6	ccd 7	ccd 8		ccd 2	ccd 3	ccd 5	ccd 6	ccd 7	ccd 8
level 1 events	270594	235149	232076	237850	139117	283411	grade 0 events	8204	7716	39715	8420	10548	20780
rejected events	250195	216246	84028	216713	58895	211202		3%	3%	17%	3%	7%	7%
rejected %	92%	91%	36%	91%	42%	74%	grade 1 events	145	149	2276	105	330	231
								0%	0%	0%	0%	0%	0%
							grade 2 events	4898	3841	40164	4610	19172	16638
								1%	1%	17%	1%	13%	5%
							grade 3 events	2063	2180	6184	2352	8243	8237
								0%	0%	2%	0%	5%	2%
							grade 4 events	2287	2110	5979	2297	8210	7372
								0%	0%	2%	0%	5%	2%
							grade 5 events	3755	4685	16530	4550	14582	8117
								1%	1%	7%	1%	10%	2%
							grade 6 events	2949	3059	56032	3460	34064	19235
								1%	1%	24%	1%	24%	6%
							grade 7 events	246293	211409	65196	212056	43968	202801
								91%	89%	28%	89%	31%	71%

## 2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-235678	ACIS-235678	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	336.486746	336.4642327992651	Subarray requested	NONE	NONE
[deg] Pointing Dec	65.618702	65.59307335229947	Alternating exposures requested	N	N
[deg] Pointing Roll	219.136152	219.3132914861903	[s] Primary exposure time	0.000000	3.2
[mm] SIM focus pos	-0.684267	-0.6828225247311905			
[mm] SIM defocus	0	0.001444936568705701			
[mm] SIM translation stage pos	-190.132523	-190.1400660498719			
[mm] SIM translation stage offset	0	0.00754346686406393			
[s] Observation start time (MET)	276495341.184000	276494161.37568			
Observation start date	2006-10-06T04:14:36	2006-10-06T03:56:01			
[s] Observation end time (MET)	276532341.184000	276532997.09001			
Observation end date	2006-10-06T14:31:16	2006-10-06T14:43:17			
Read mode	TIMED	TIMED			

## 2.3 Aspect



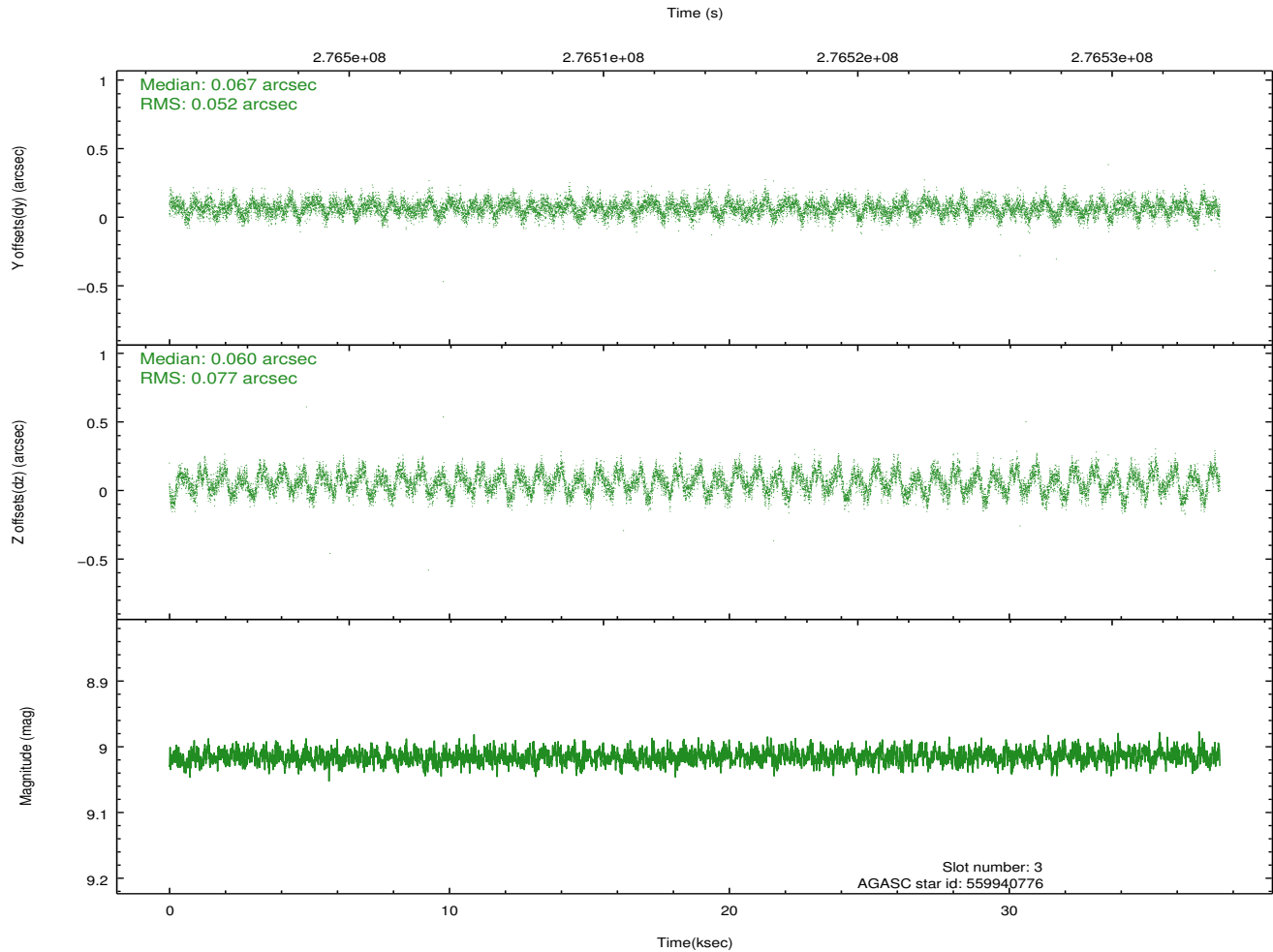
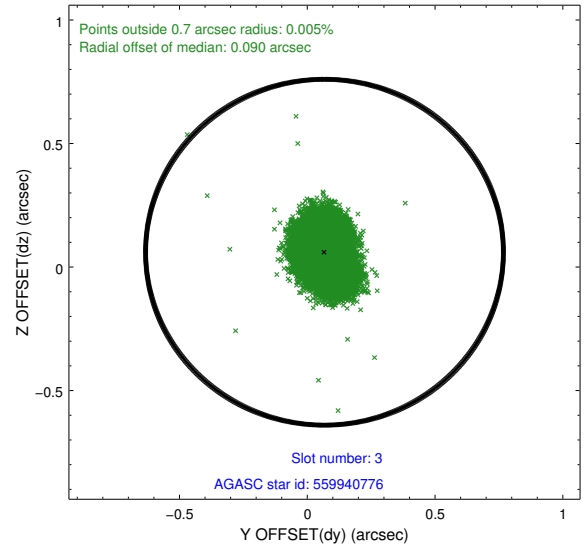
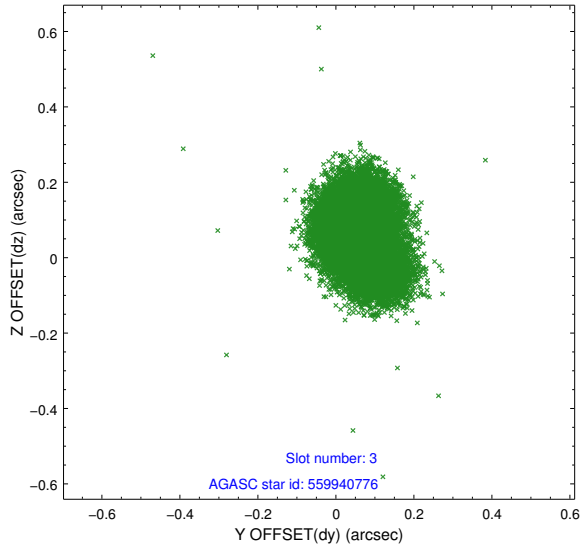


### Slot Statistics

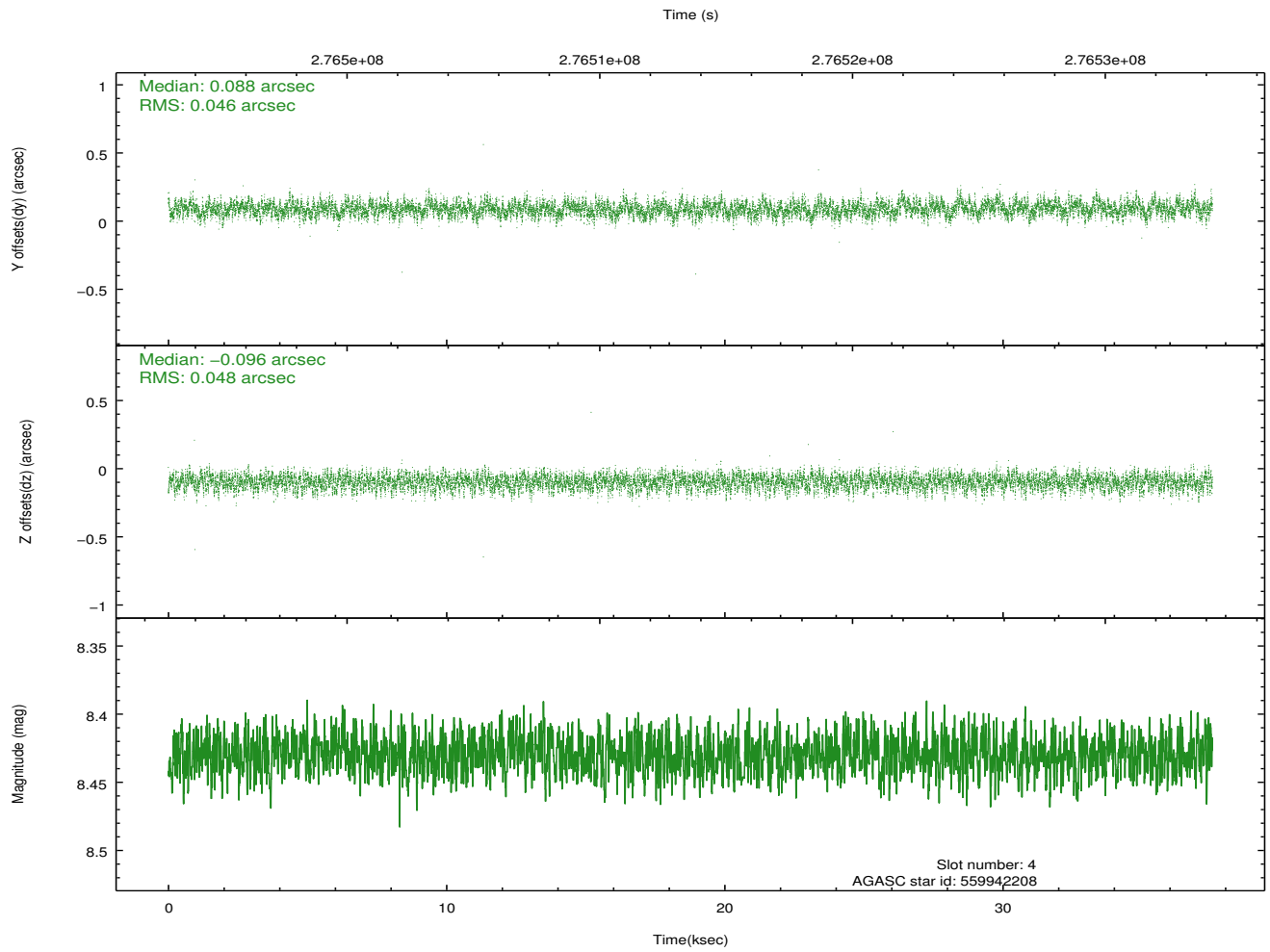
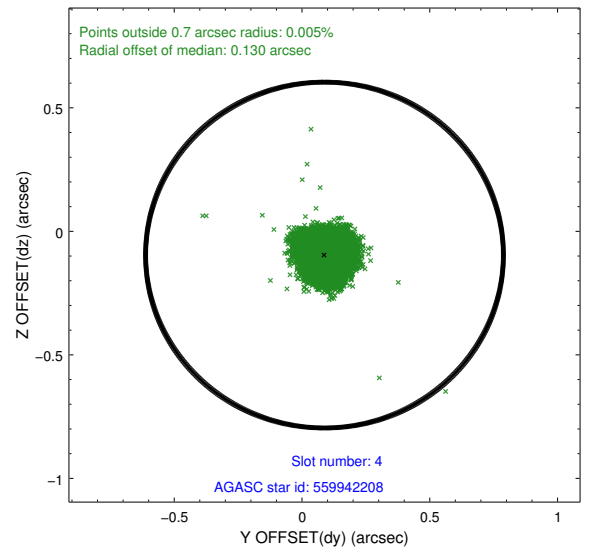
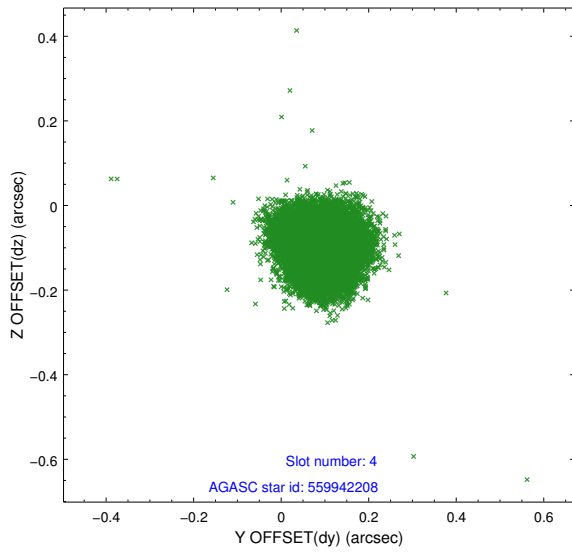
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-S-2	7.10	9155	-0.050	-0.021	0.012	0.020	0.000000	0.000000	-760.61	-1732.13
1	FID	ACIS-S-4	7.21	9155	0.127	0.030	0.013	0.021	0.000000	0.000000	2152.79	176.44
2	FID	ACIS-S-5	7.23	9155	-0.112	-0.000	0.019	0.028	0.000000	0.000000	-1813.52	170.02
3	GUIDE	559940776	9.01	18297	0.067	0.060	0.100	0.156	336.261037	65.268151	1059.78	764.10
4	GUIDE	559942208	8.43	18299	0.088	-0.096	0.070	0.112	336.508890	65.529699	176.93	269.37
5	GUIDE	559942720	8.90	18292	-0.016	-0.157	0.060	0.098	335.954957	65.313508	1311.82	345.04
6	GUIDE	560465152	9.08	18299	-0.100	0.021	0.091	0.155	334.672558	65.626415	2048.94	-1752.25
7	GUIDE	559942656	8.34	18291	-0.036	0.177	0.092	0.138	335.233249	65.304591	2164.83	-326.80

## 2.4 Star Slots

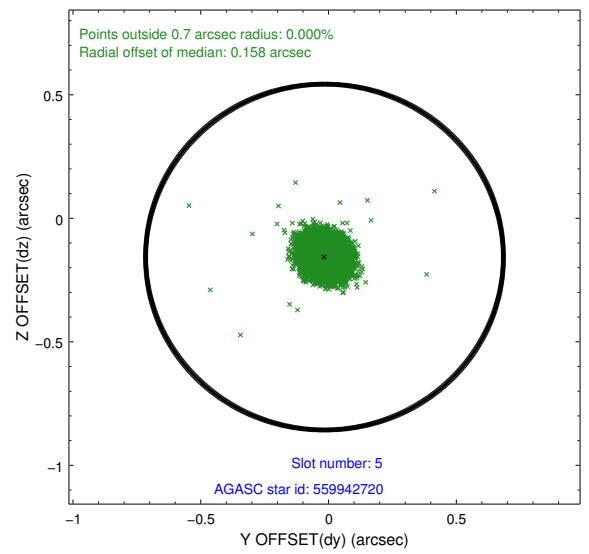
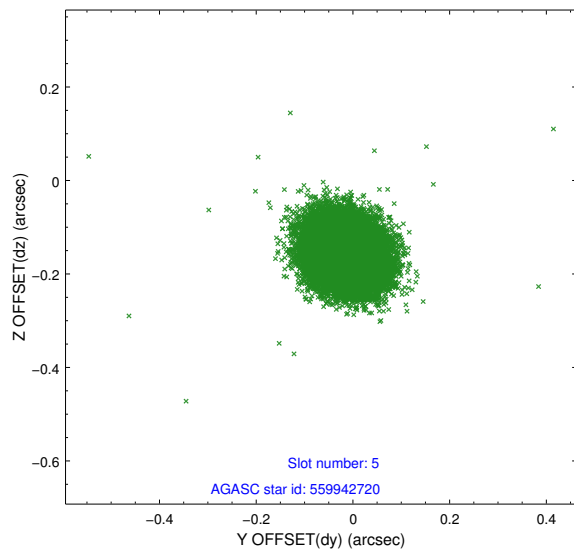
### 2.4.1 Slot 3



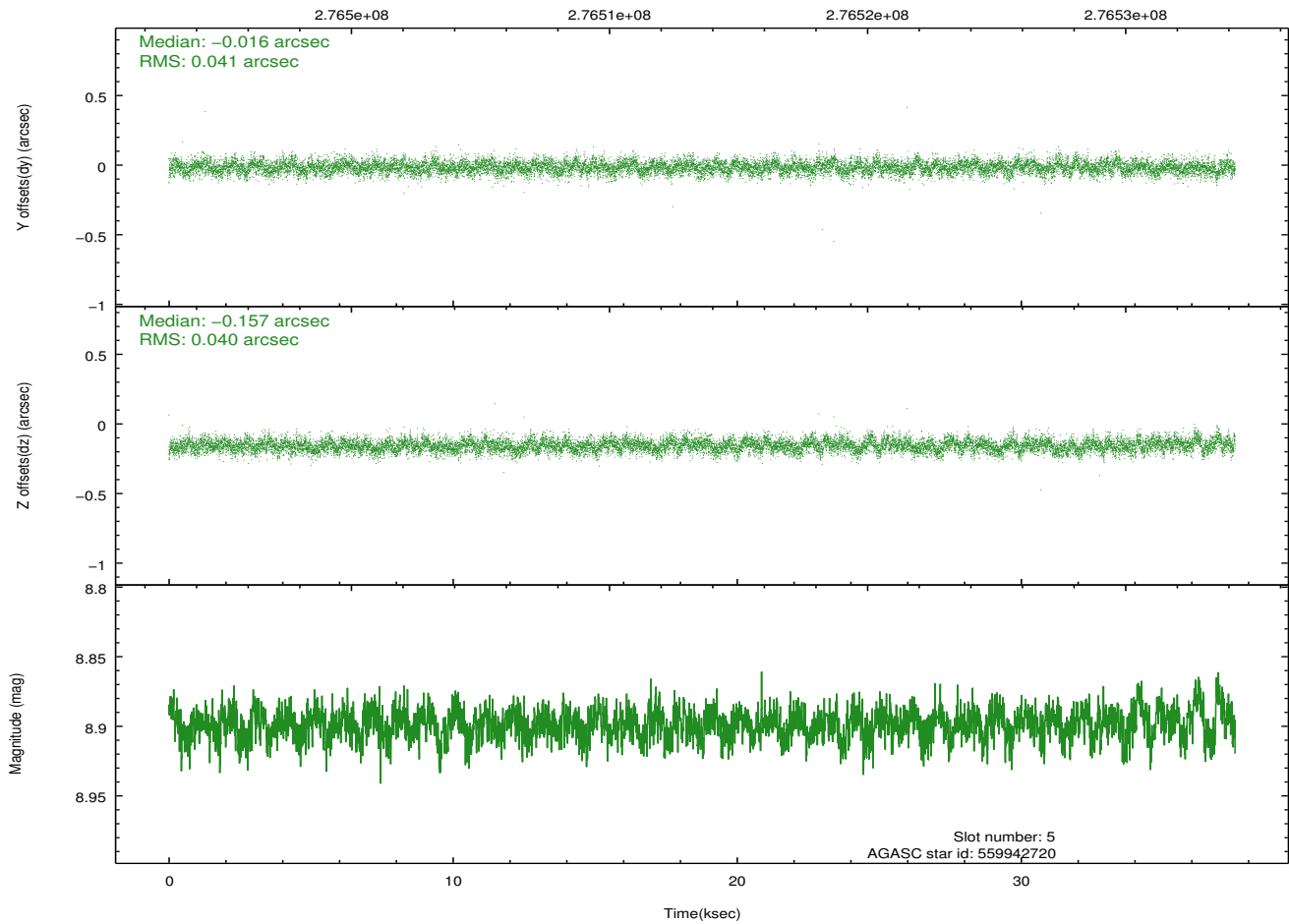
### 2.4.2 Slot 4



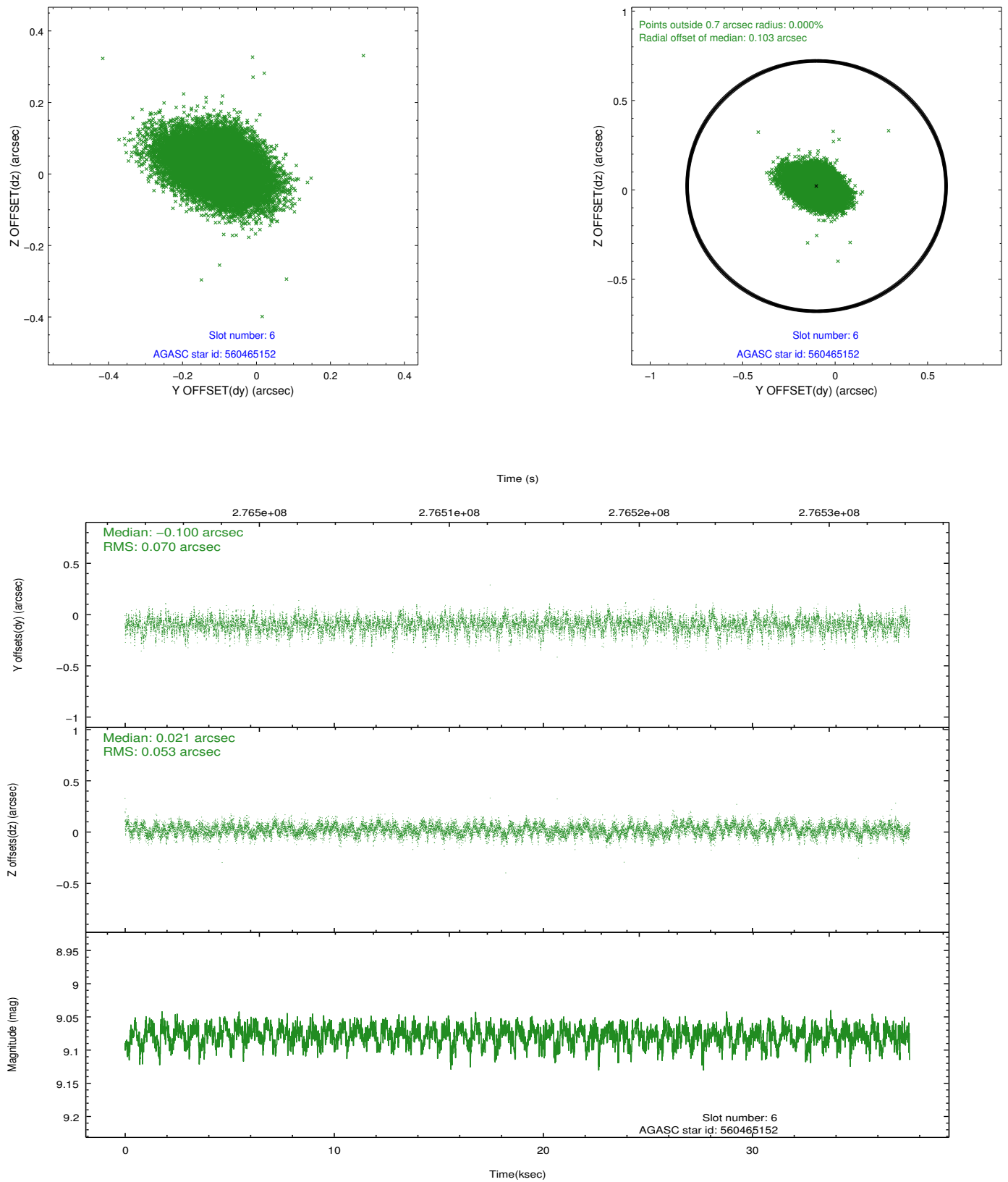
### 2.4.3 Slot 5



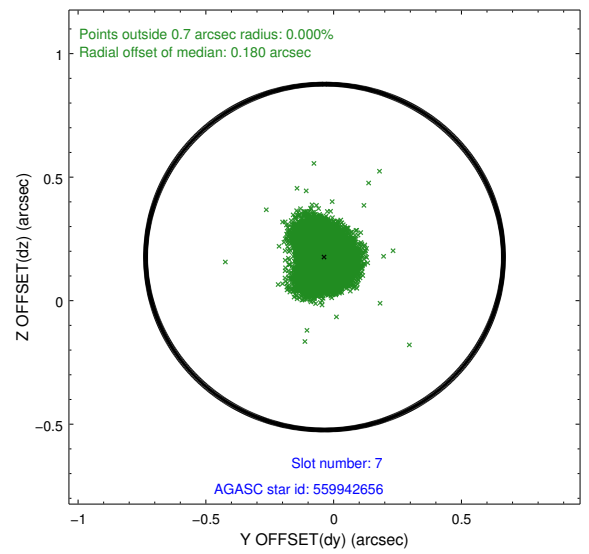
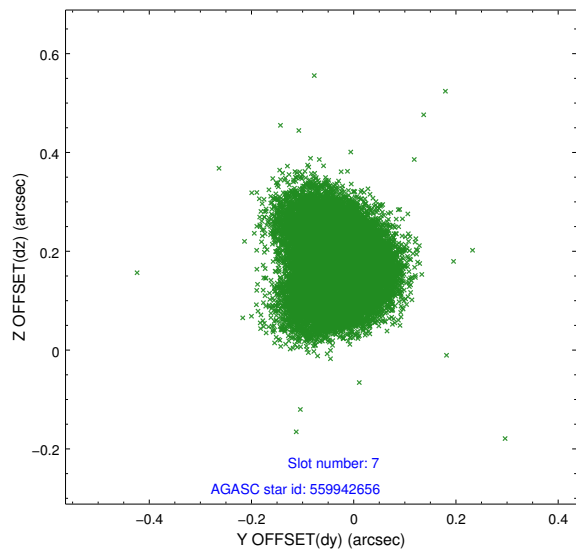
Time (s)



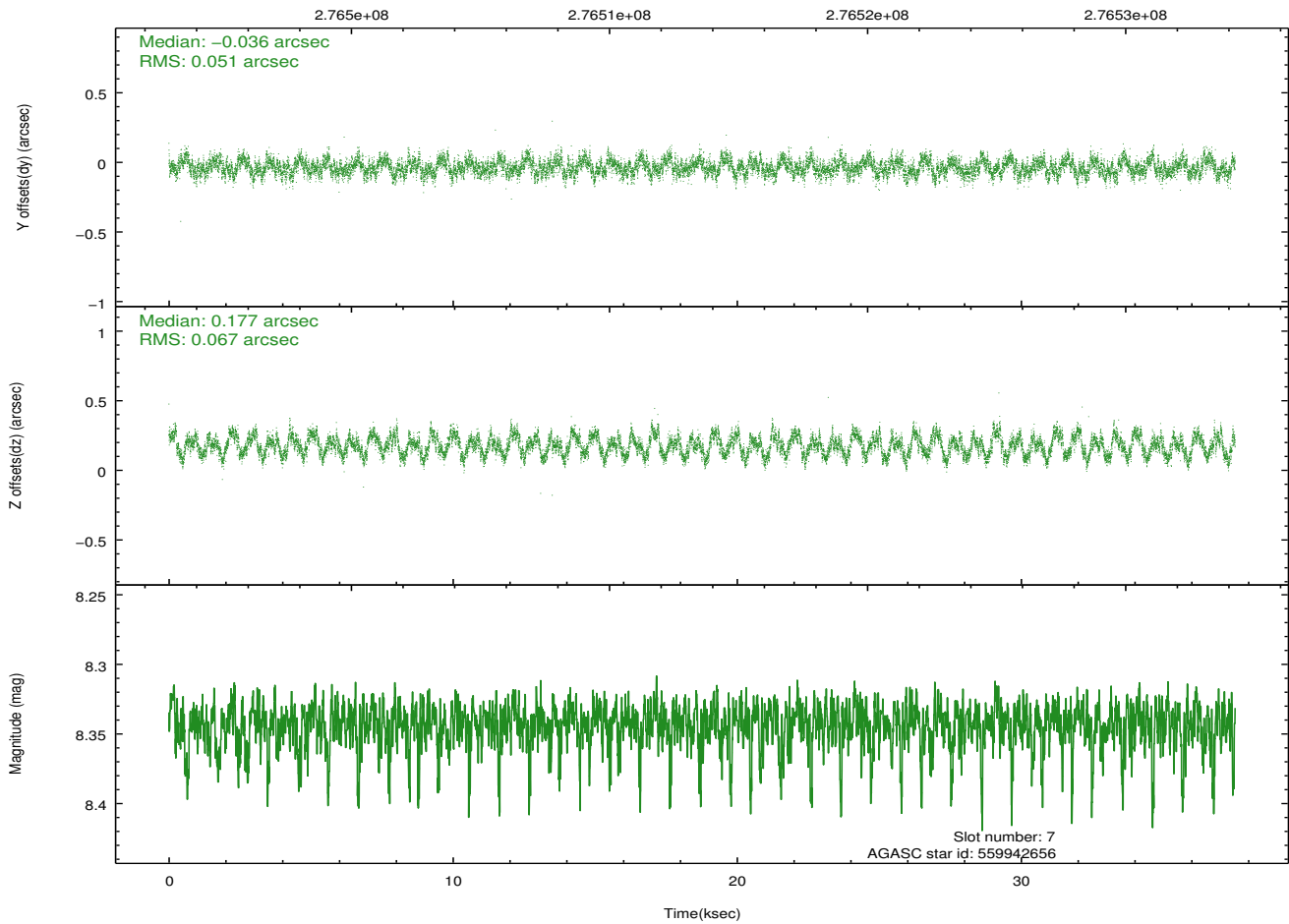
## 2.4.4 Slot 6



## 2.4.5 Slot 7

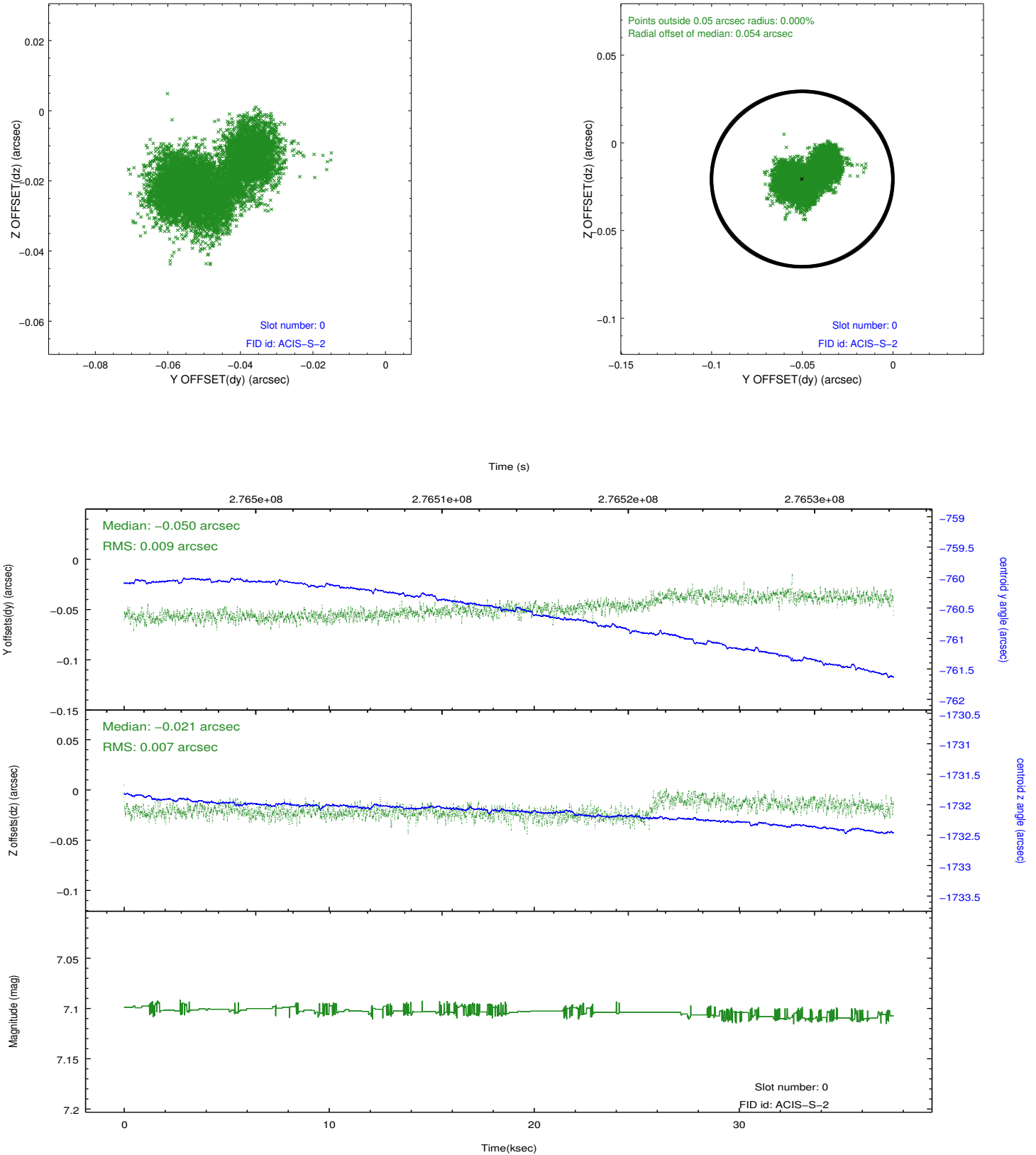


Time (s)

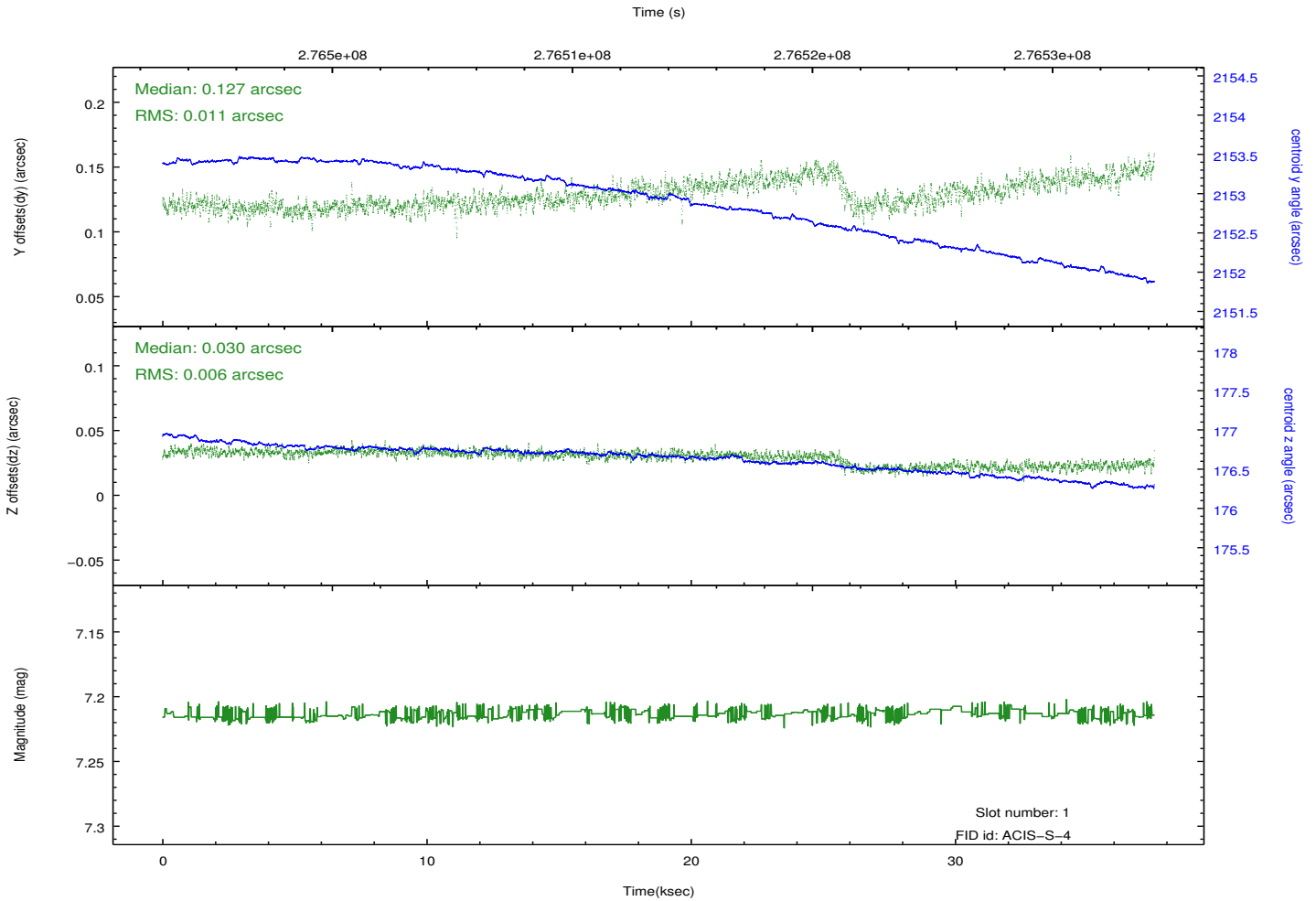
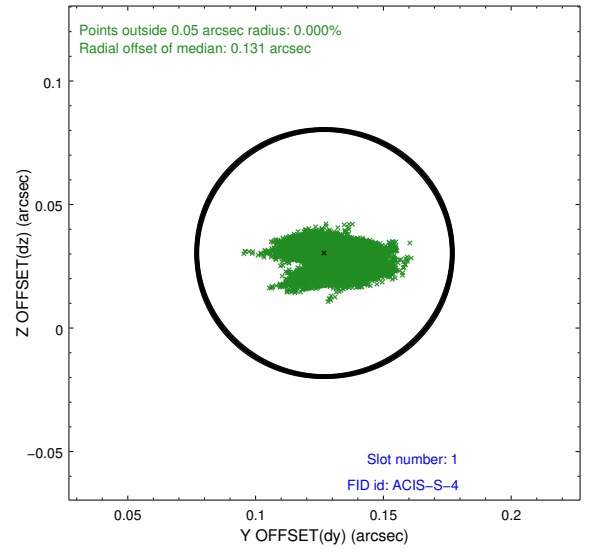
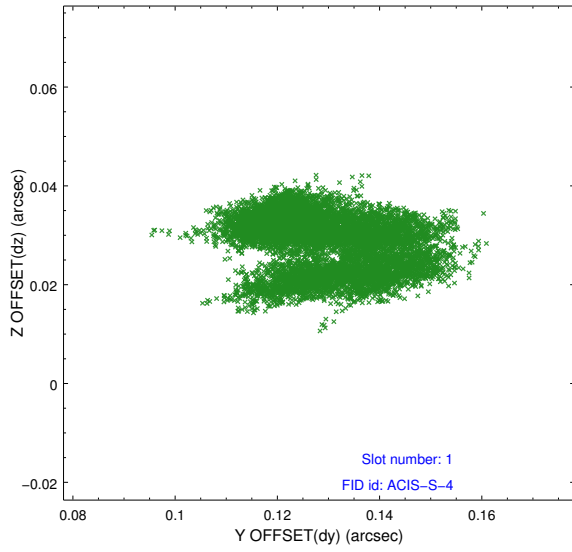


## 2.5 FID Slots

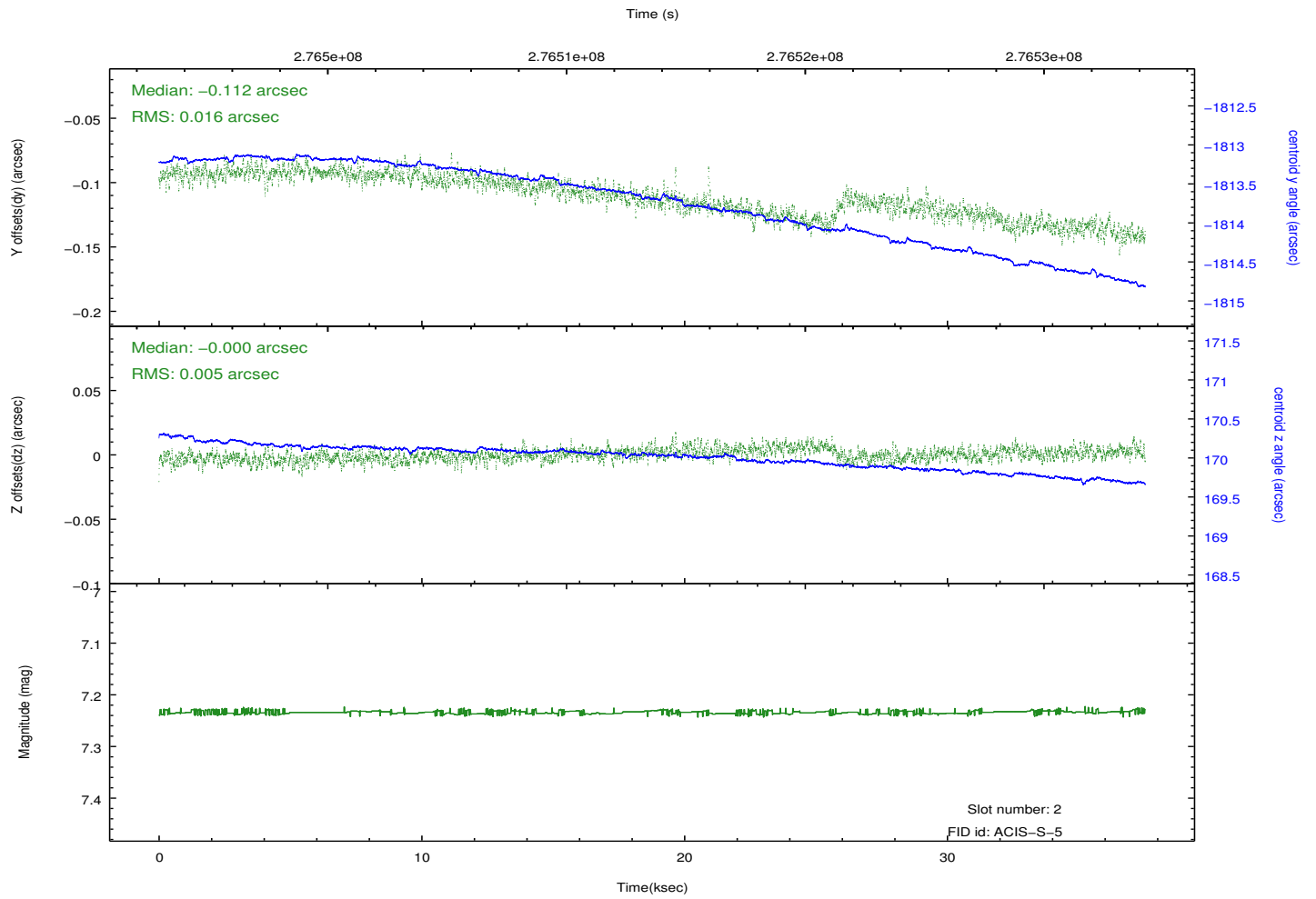
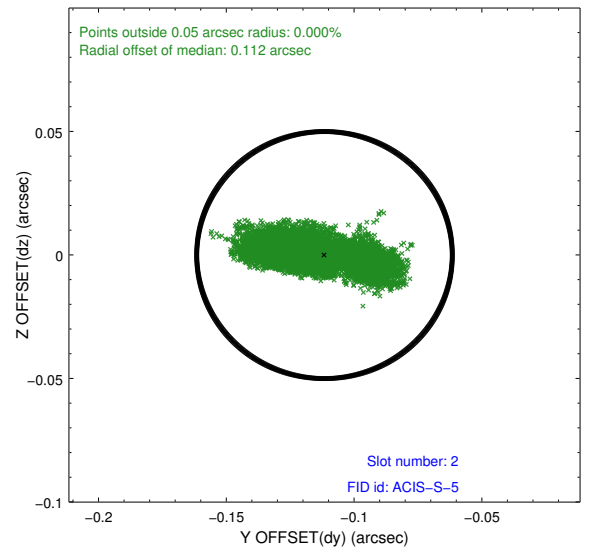
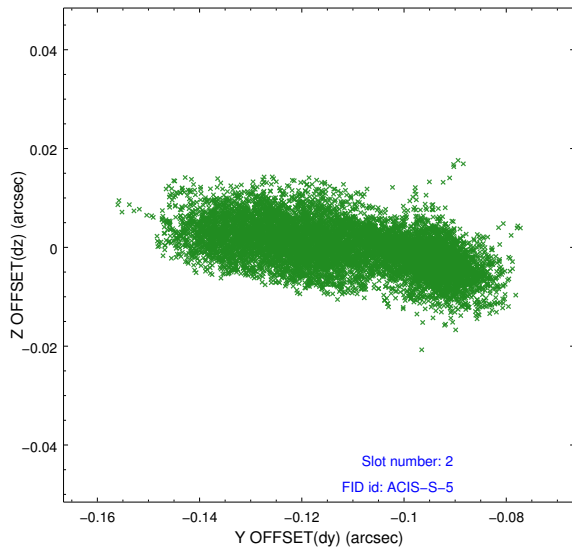
### 2.5.1 Slot 0



## 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)	2012.04.11
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	37.0431998

## A.2 Comments