

# V&V Reference Report

## L2 ASCDS Version : 8.1.2

Observation 792 - L2 Version 4

Chandra X-Ray Center

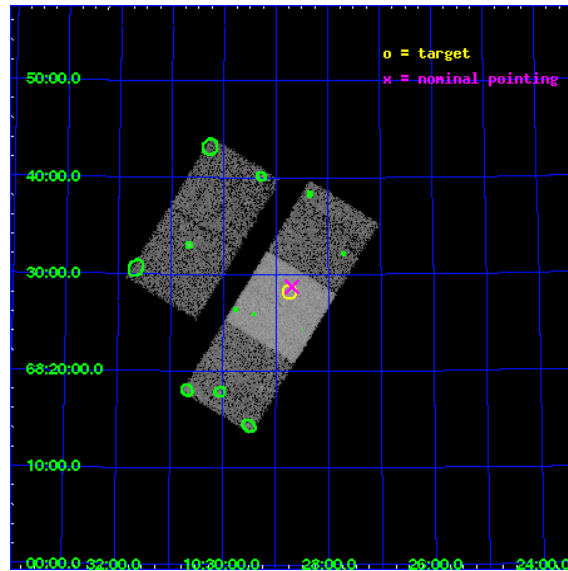
L2 Processing Date : Dec 2 2009

## Contents

<b>1</b>	<b>Front</b>	<b>2</b>
<b>2</b>	<b>OBI</b>	<b>3</b>
2.1	OBI . . . . .	3
2.1.1	Images . . . . .	3
2.1.2	Bias . . . . .	3
2.1.3	Parameters . . . . .	4
2.1.4	Events . . . . .	4
2.2	Compared Parameters . . . . .	5
2.3	Aspect . . . . .	6
2.4	Star Slots . . . . .	9
2.4.1	Slot 3 . . . . .	9
2.4.2	Slot 4 . . . . .	10
2.4.3	Slot 5 . . . . .	11
2.4.4	Slot 6 . . . . .	12
2.4.5	Slot 7 . . . . .	13
2.5	FID Slots . . . . .	14
2.5.1	Slot 0 . . . . .	14
2.5.2	Slot 1 . . . . .	15
2.5.3	Slot 2 . . . . .	16
<b>3</b>	<b>Point Sources</b>	<b>17</b>
<b>A</b>	<b>Summary</b>	<b>18</b>
A.1	Status . . . . .	18
A.2	Comments . . . . .	18

# 1 Front

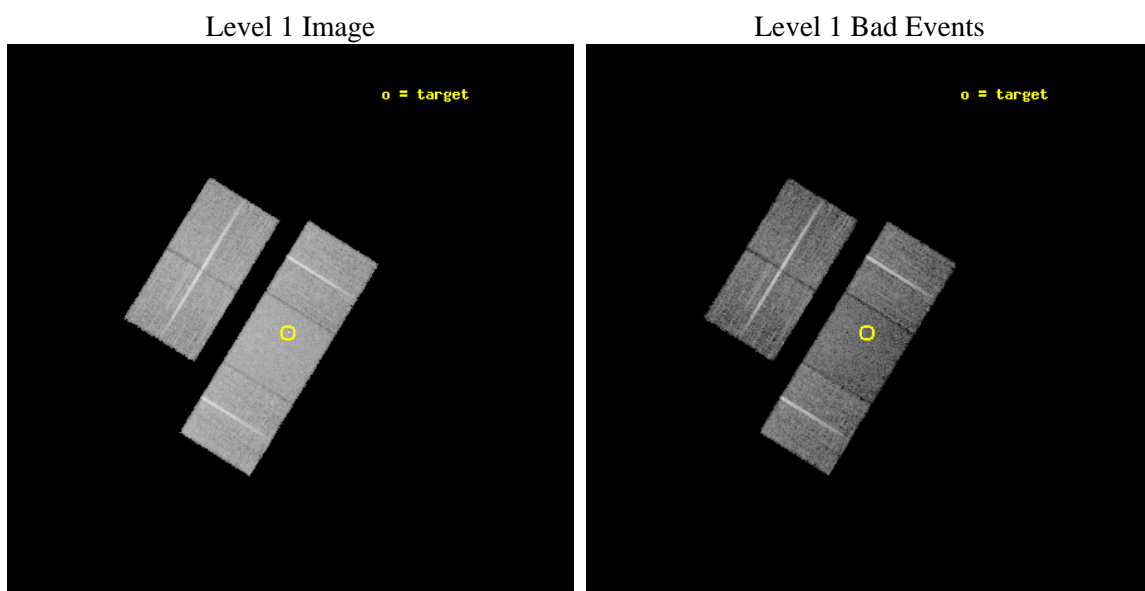
seq_num	600095	Sequence number
obs_id	792	Observation id
title	PROPOSAL TO STUDY THE HOT GAS INTERIOR OF A SUPERGIANT SHELL IN THE NEARBY DWARF GALAXY IC 2574	Proposal title
observer	DR. FABIAN WALTER	Principal investigator
object	IC 2574	Source name
dtcycle	0	&#160
cycle	P	events from which exps? Prim/Second/Both
ra_targ	157.183333	Observer's specified target RA
dec_targ	68.469444	Observer's specified target Dec
ra_nom	157.17345371115	Nominal RA
dec_nom	68.478987836134	Nominal Dec
roll_nom	121.54794830519	Nominal Roll
revision	4	Processing version of data
ontime	10166.130468495	Sum of GTIs [s]
livetime	10037.400803194	Livetime [s]
ontime2	10166.089428492	Sum of GTIs [s]
ontime3	10166.007348493	Sum of GTIs [s]
ontime6	10166.048388496	Sum of GTIs [s]
ontime7	10166.130468495	Sum of GTIs [s]
ontime8	10165.966308497	Sum of GTIs [s]
l2events	68769	Number of level 2 events



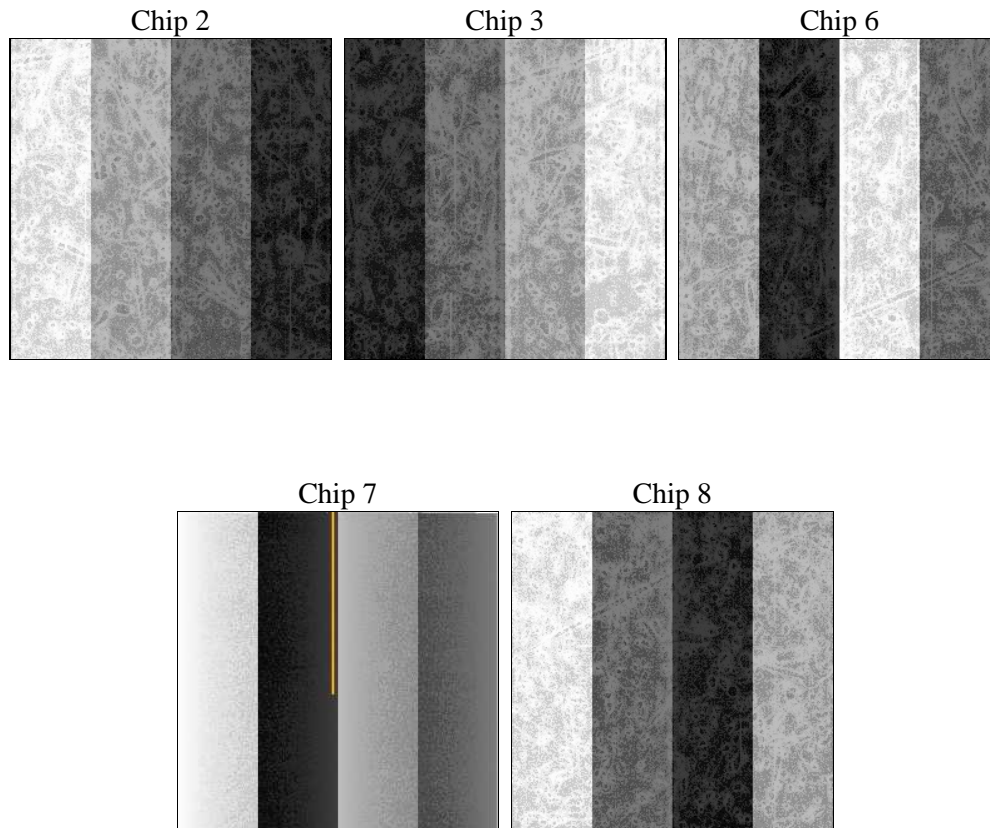
## 2 OBI

### 2.1 OBI

#### 2.1.1 Images



#### 2.1.2 Bias



### 2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	11000.000000	Scheduled observation exposure time
ascdsver	8.1.2	ASCDS version number	ontime	10166.130468495	Sum of GTIs [s]
caldsver	4.1.4	&#160	ontime2	10166.089428492	Sum of GTIs [s]
date	2009-12-02T06:31:54	Date and time of file creation	ontime3	10166.007348493	Sum of GTIs [s]
revision	3	Processing version of data	ontime6	10166.048388496	Sum of GTIs [s]
			ontime7	10166.130468495	Sum of GTIs [s]
			ontime8	10165.966308497	Sum of GTIs [s]
			l1events	446998	Number of level 1 events

### 2.1.4 Events

	ccd 2	ccd 3	ccd 6	ccd 7	ccd 8
level 1 events	82468	84499	83313	96168	100550
rejected events	75127	76733	75036	56526	83521
rejected %	91%	90%	90%	58%	83%

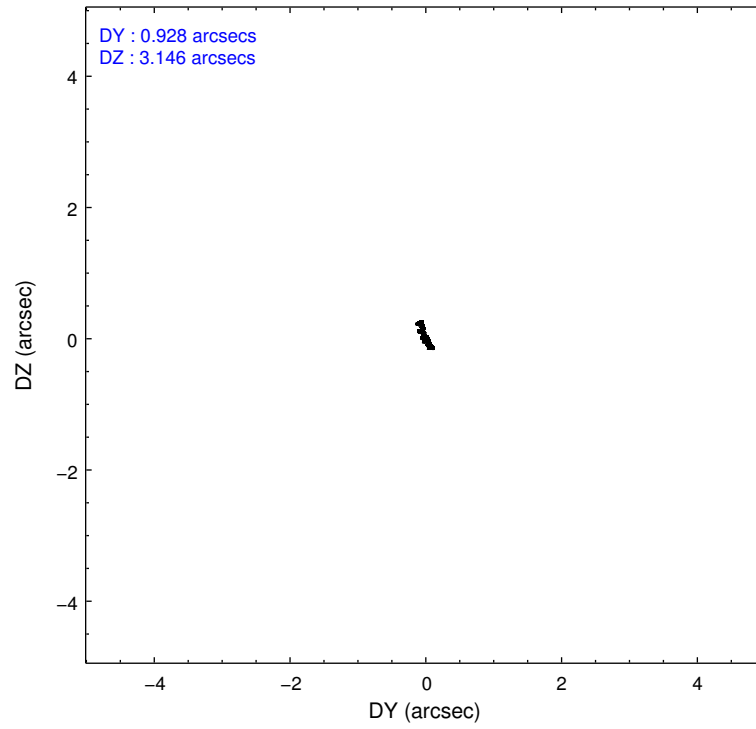
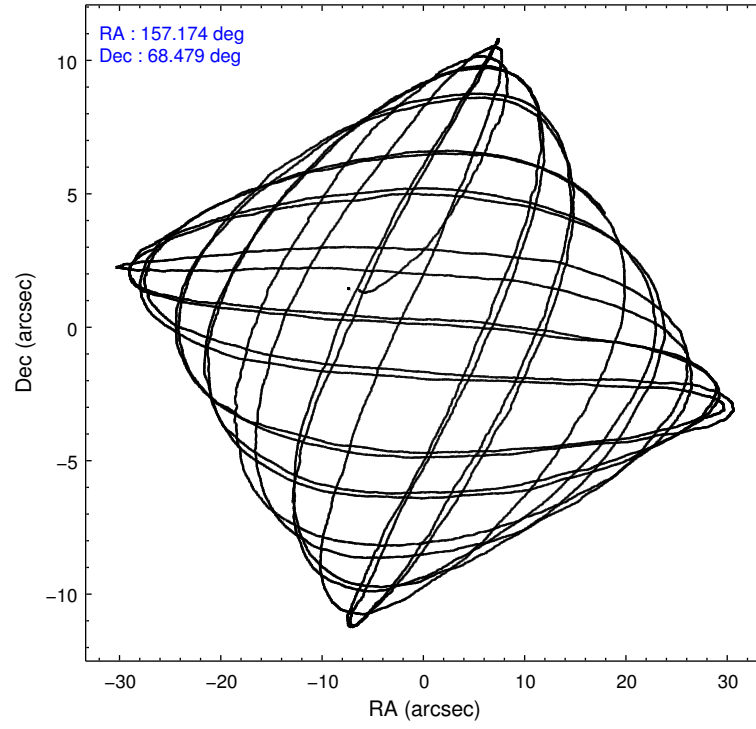
	ccd 2	ccd 3	ccd 6	ccd 7	ccd 8
grade 0 events	1475	1708	1655	2791	3827
	1%	2%	1%	2%	3%
grade 1 events	17	19	17	52	37
	0%	0%	0%	0%	0%
grade 2 events	2886	3164	3229	8395	5620
	3%	3%	3%	8%	5%
grade 3 events	485	481	512	2355	1218
	0%	0%	0%	2%	1%
grade 4 events	543	469	529	2154	1144
	0%	0%	0%	2%	1%
grade 5 events	1472	1534	1792	5463	2474
	1%	1%	2%	5%	2%
grade 6 events	1953	1944	2353	23955	5248
	2%	2%	2%	24%	5%
grade 7 events	73637	75180	73226	51003	80982
	89%	88%	87%	53%	80%

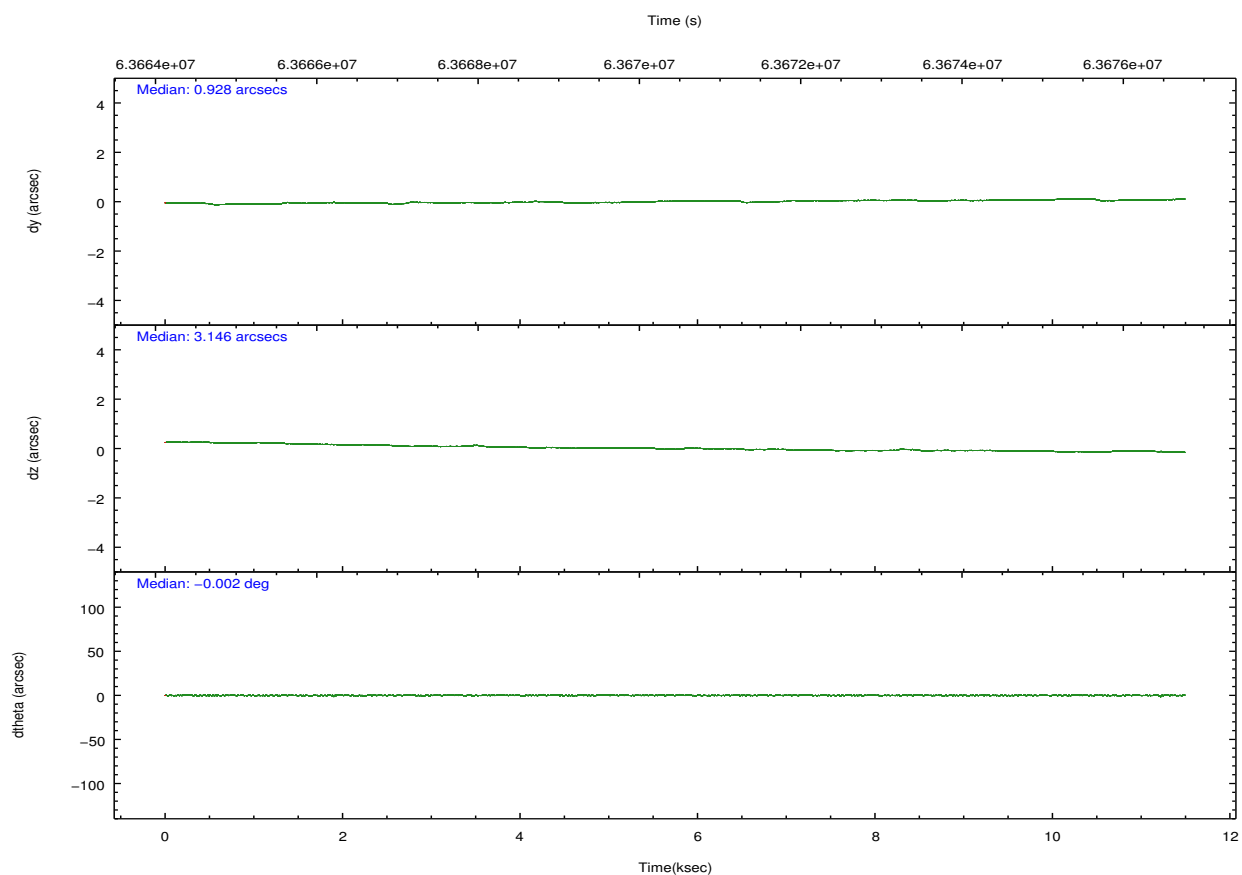
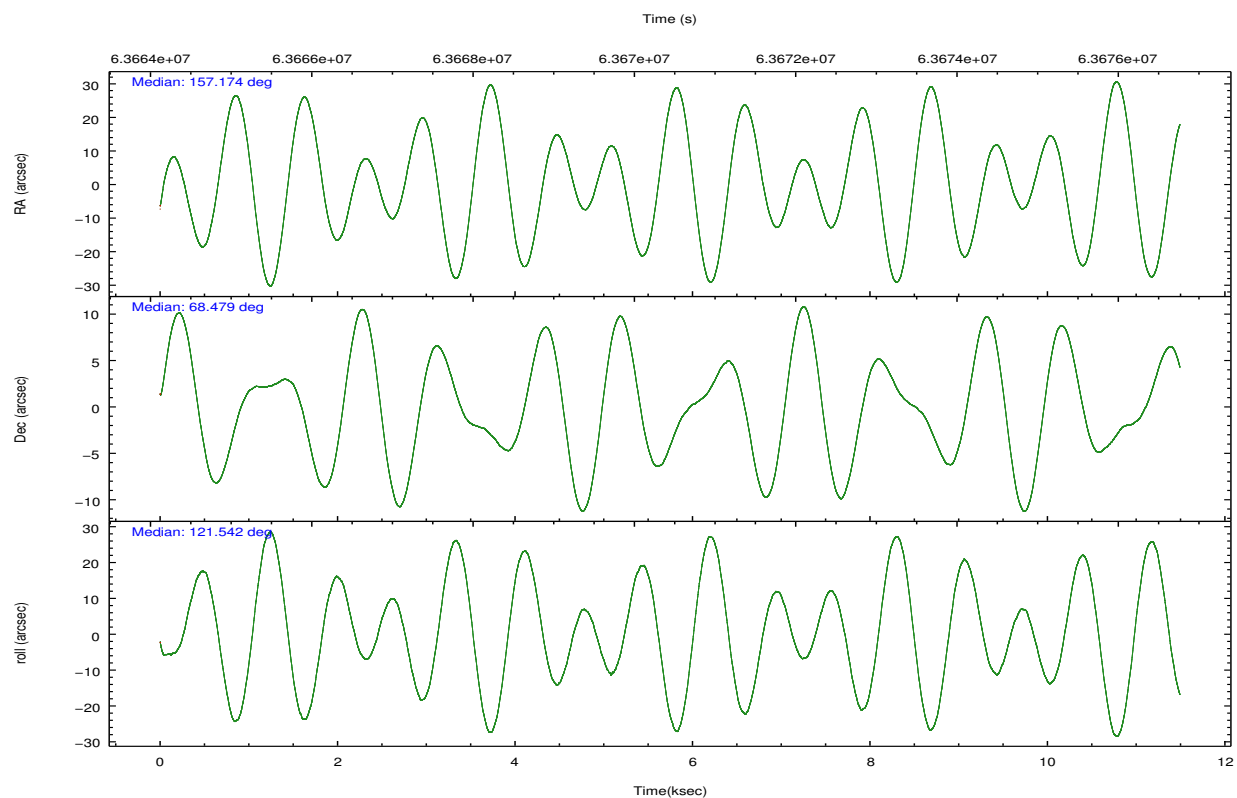


## 2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	6	6
Detector	ACIS-23678	ACIS-23678	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
Pointing RA	157.239387	157.1734537111512	Subarray requested	NONE	NONE
Pointing Dec	68.465784	68.47898783613435	Alternating exposures requested	N	N
Pointing Roll	121.329989	121.5479483051948	Primary exposure time	0.000000	3.2
SIM focus pos (mm)	-0.684267	-0.6828225247311905			
SIM defocus (mm)	0	0.001444936568705701			
SIM translation stage pos (mm)	-190.132523	-190.1425803651734			
SIM translation stage offset (mm)	0	0.01005778216563158			
Observation start time	63665189.184000	63664300.844368			
Observation start date	2000-01-07T20:45:25	2000-01-07T20:31:40			
Observation end time	63676189.184000	63676477.33231			
Observation end date	2000-01-07T23:48:45	2000-01-07T23:54:37			
Read mode	TIMED	TIMED			

## 2.3 Aspect



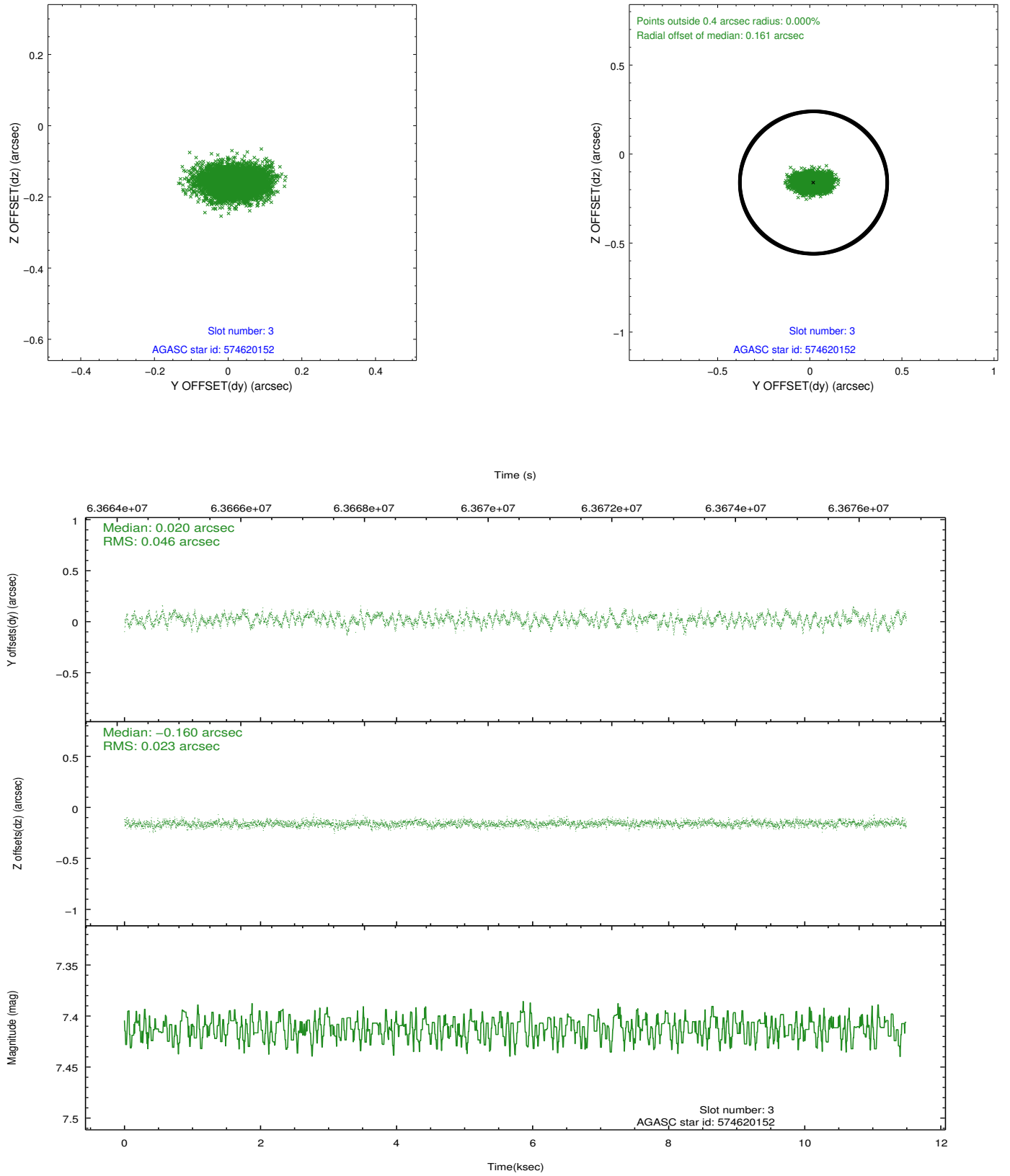


Slot Statistics

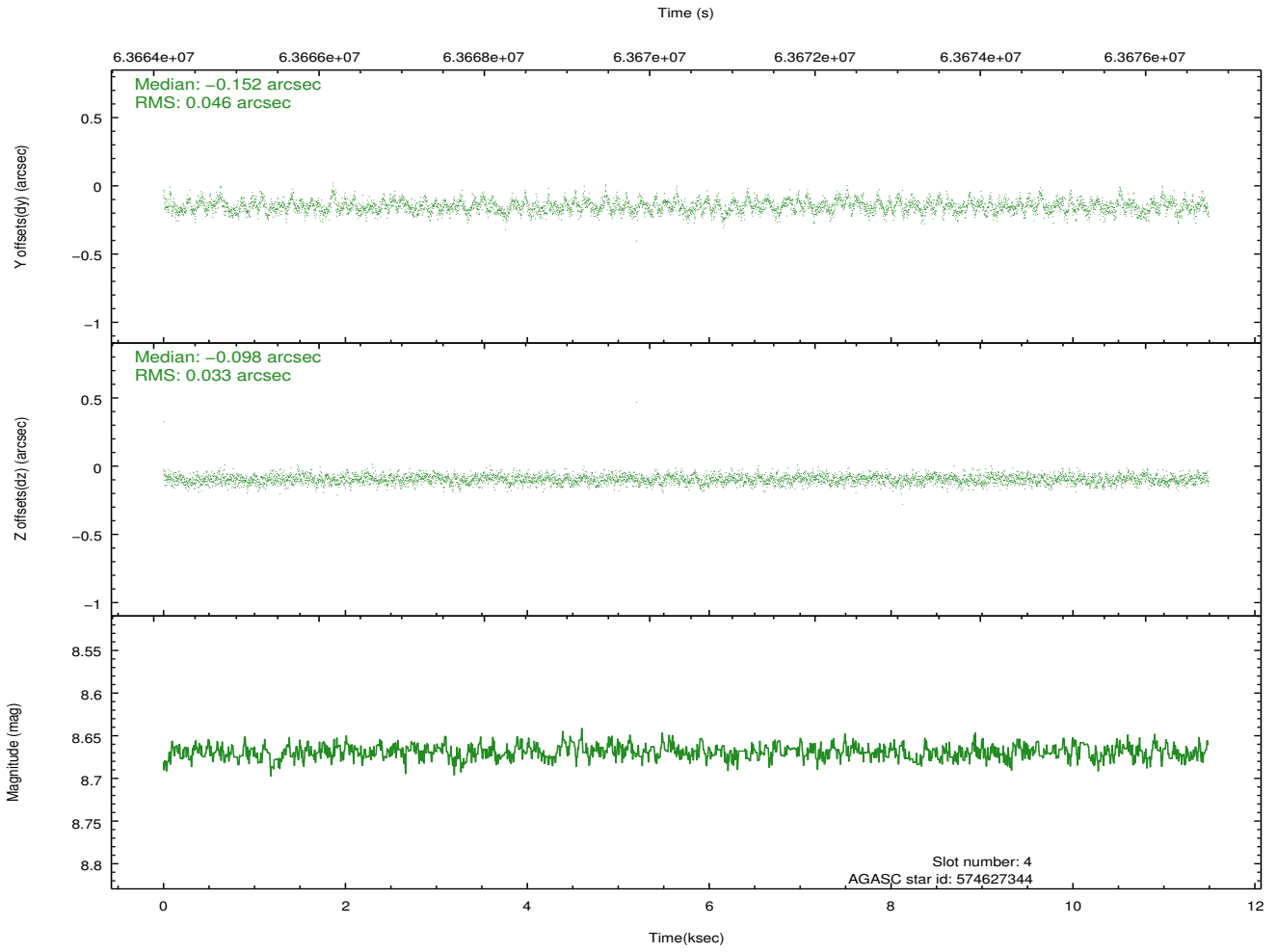
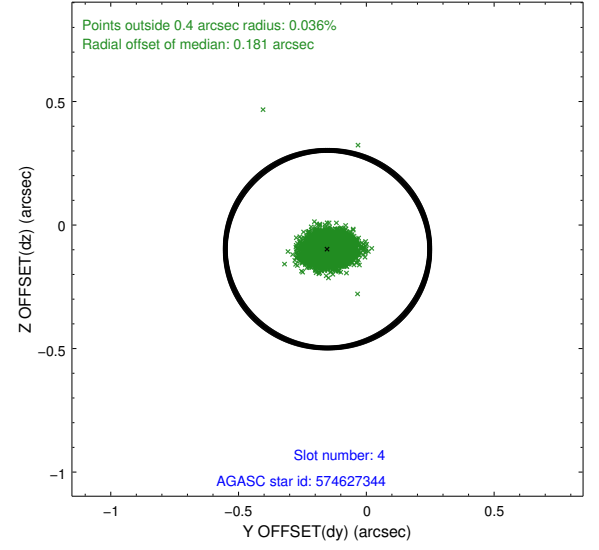
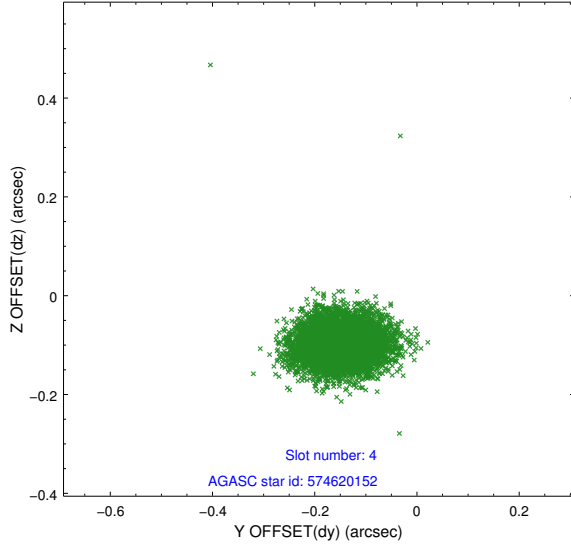
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-S-1	7.20	5607	0.032	-0.009	0.010	0.017	0.000000	0.000000	942.46	-1719.86
1	FID	ACIS-S-4	7.22	5606	-0.012	-0.005	0.008	0.012	0.000000	0.000000	2159.99	184.10
2	FID	ACIS-S-5	7.24	5607	-0.046	0.027	0.007	0.011	0.000000	0.000000	-1806.21	178.07
3	GUIDE	574620152	7.41	5607	0.020	-0.160	0.054	0.091	156.578760	67.685209	-1926.52	2230.23
4	GUIDE	574627344	8.67	5605	-0.152	-0.098	0.058	0.098	156.161632	68.920176	2133.18	336.08
5	GUIDE	574626440	8.60	5606	-0.030	0.123	0.070	0.116	158.694461	68.863503	261.02	-2368.67
6	GUIDE	574621648	9.22	5606	0.094	0.107	0.067	0.109	158.027037	68.140264	-1543.62	-295.92
7	GUIDE	574629832	9.11	5604	0.068	0.031	0.064	0.104	156.861737	68.856665	1458.48	-312.94

## 2.4 Star Slots

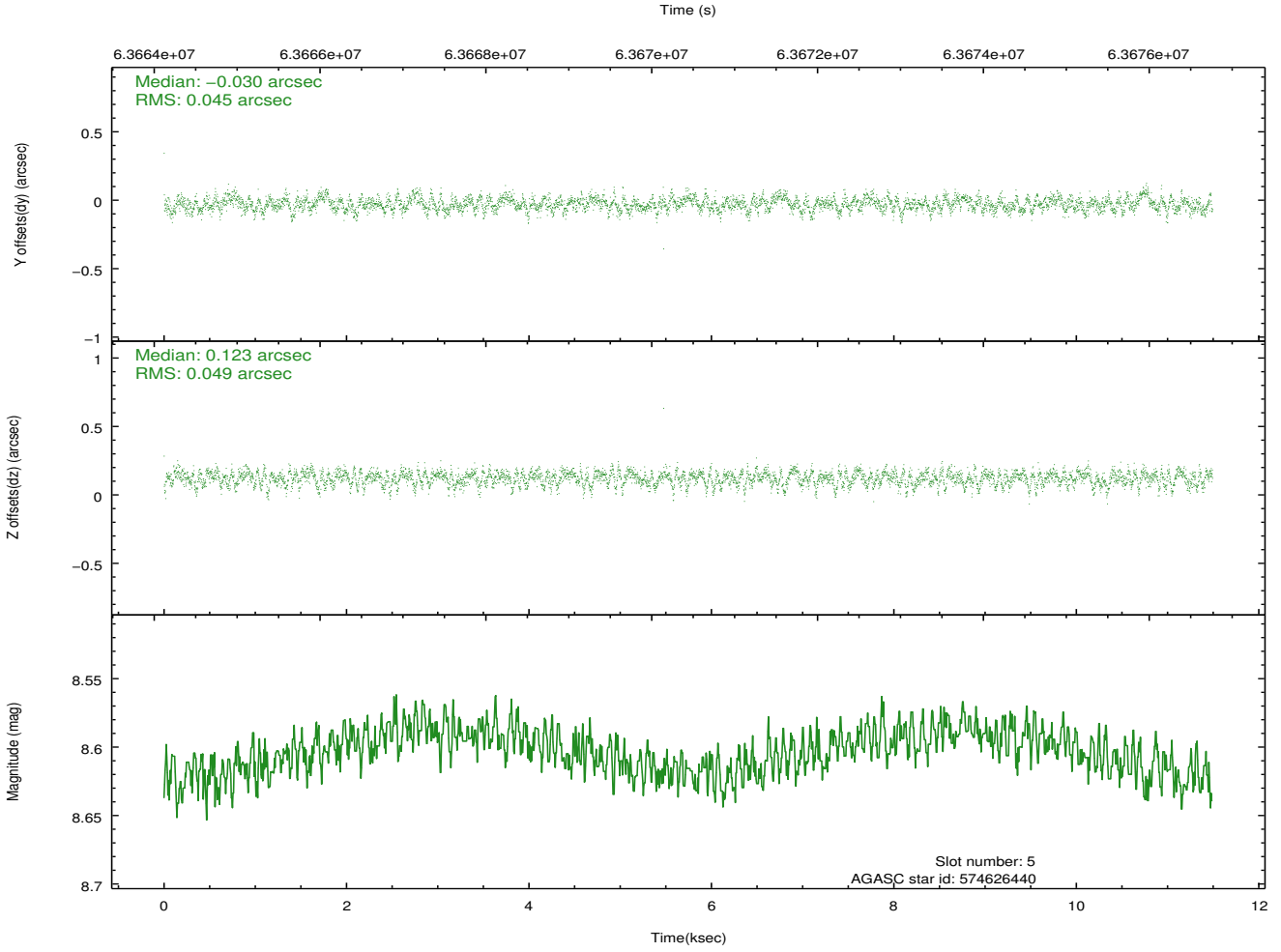
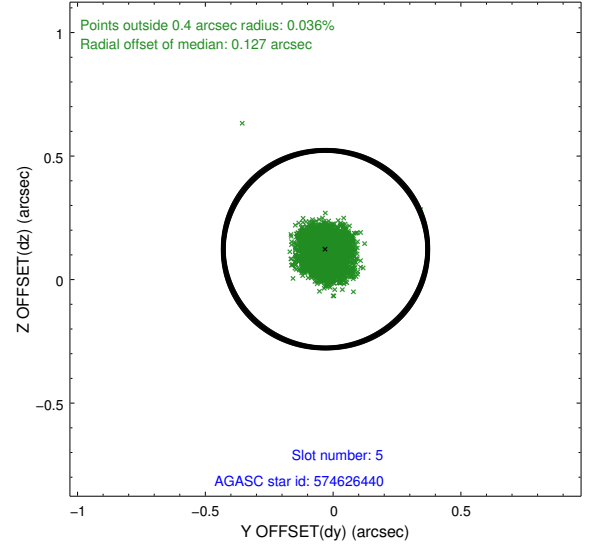
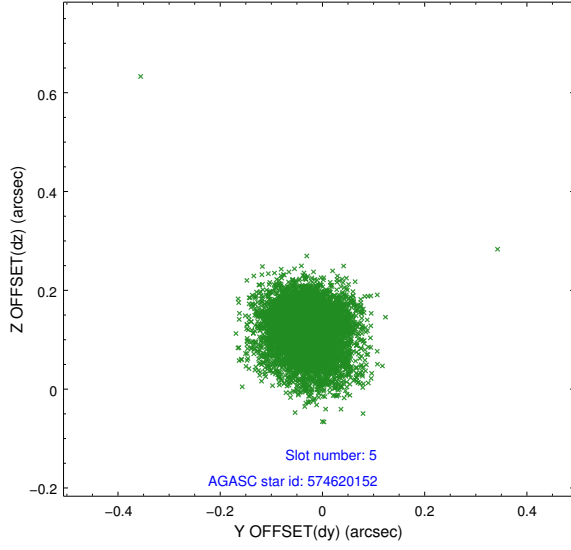
### 2.4.1 Slot 3



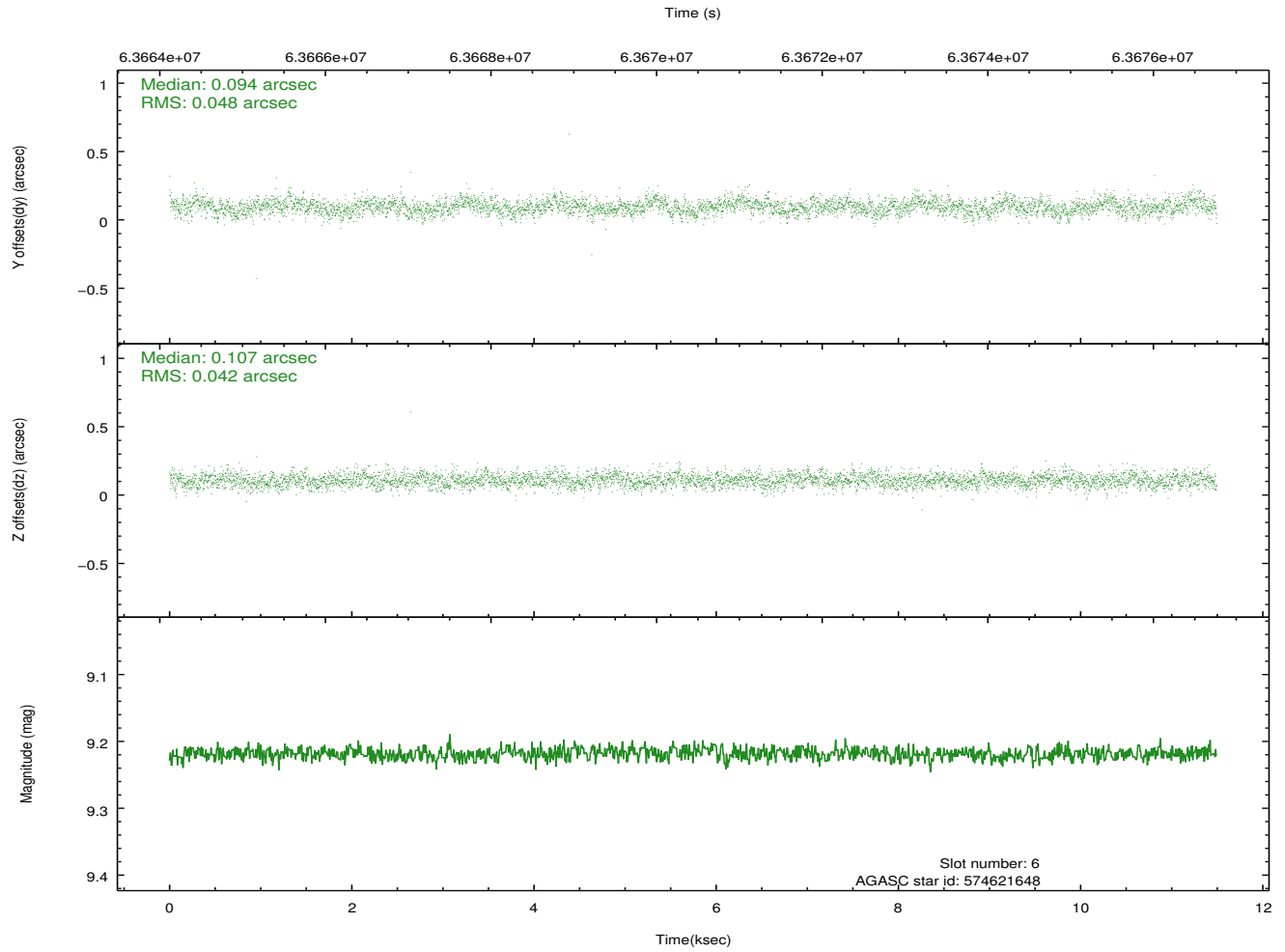
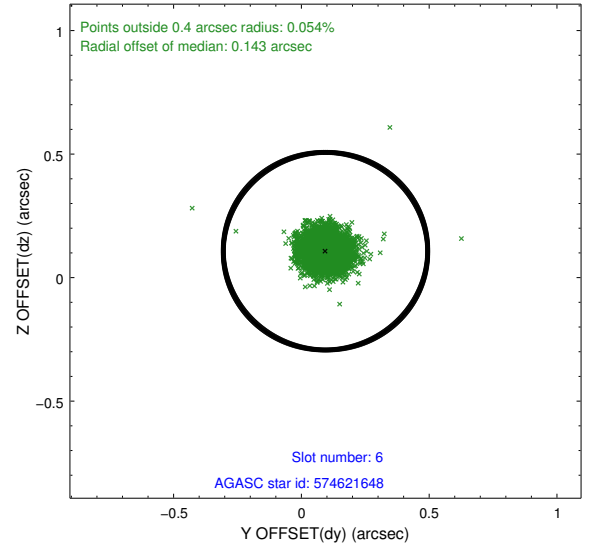
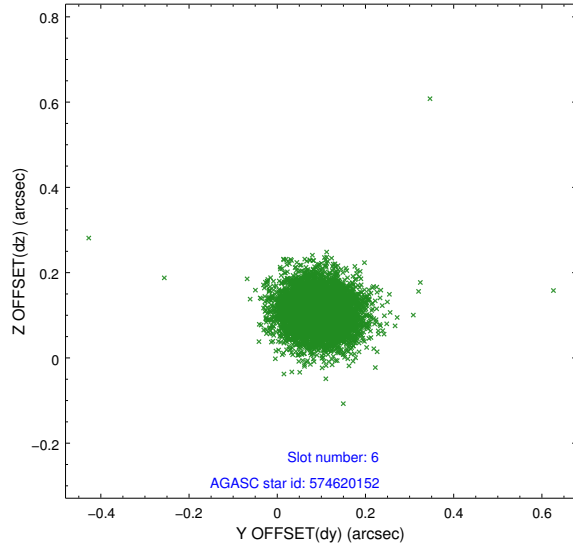
## 2.4.2 Slot 4



### 2.4.3 Slot 5

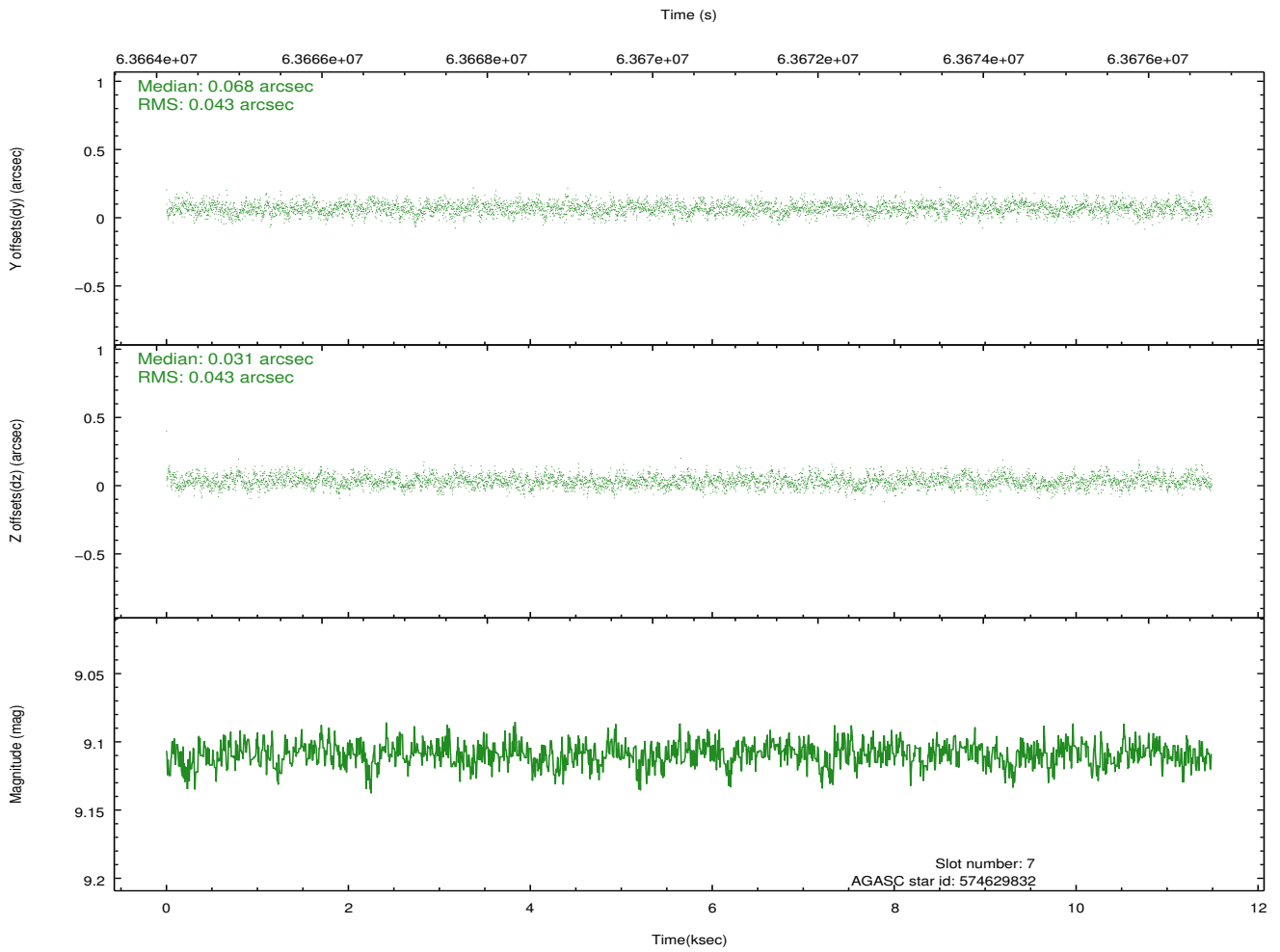
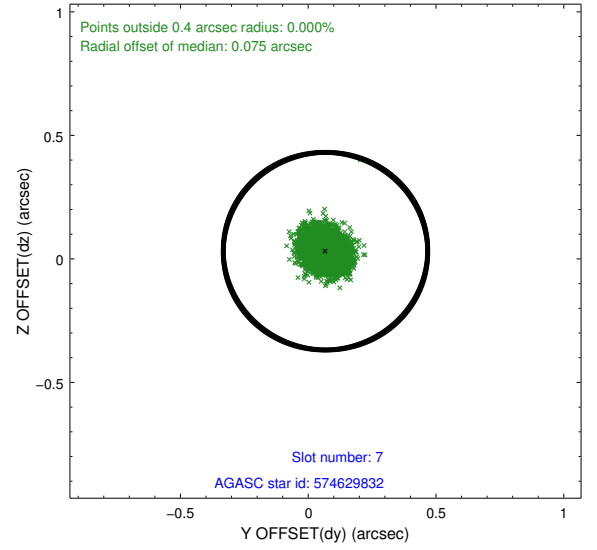
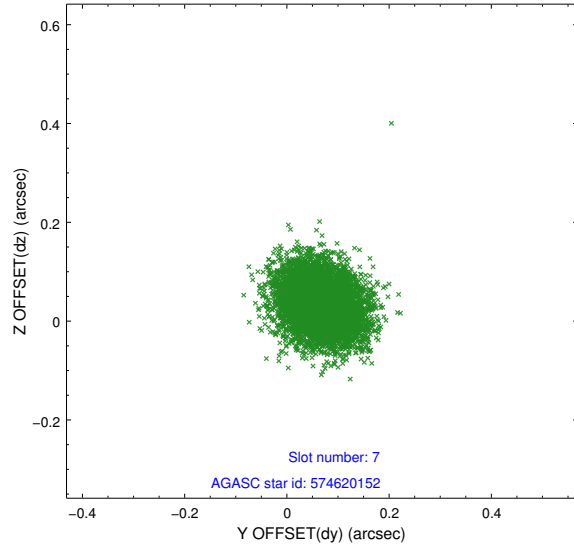


## 2.4.4 Slot 6



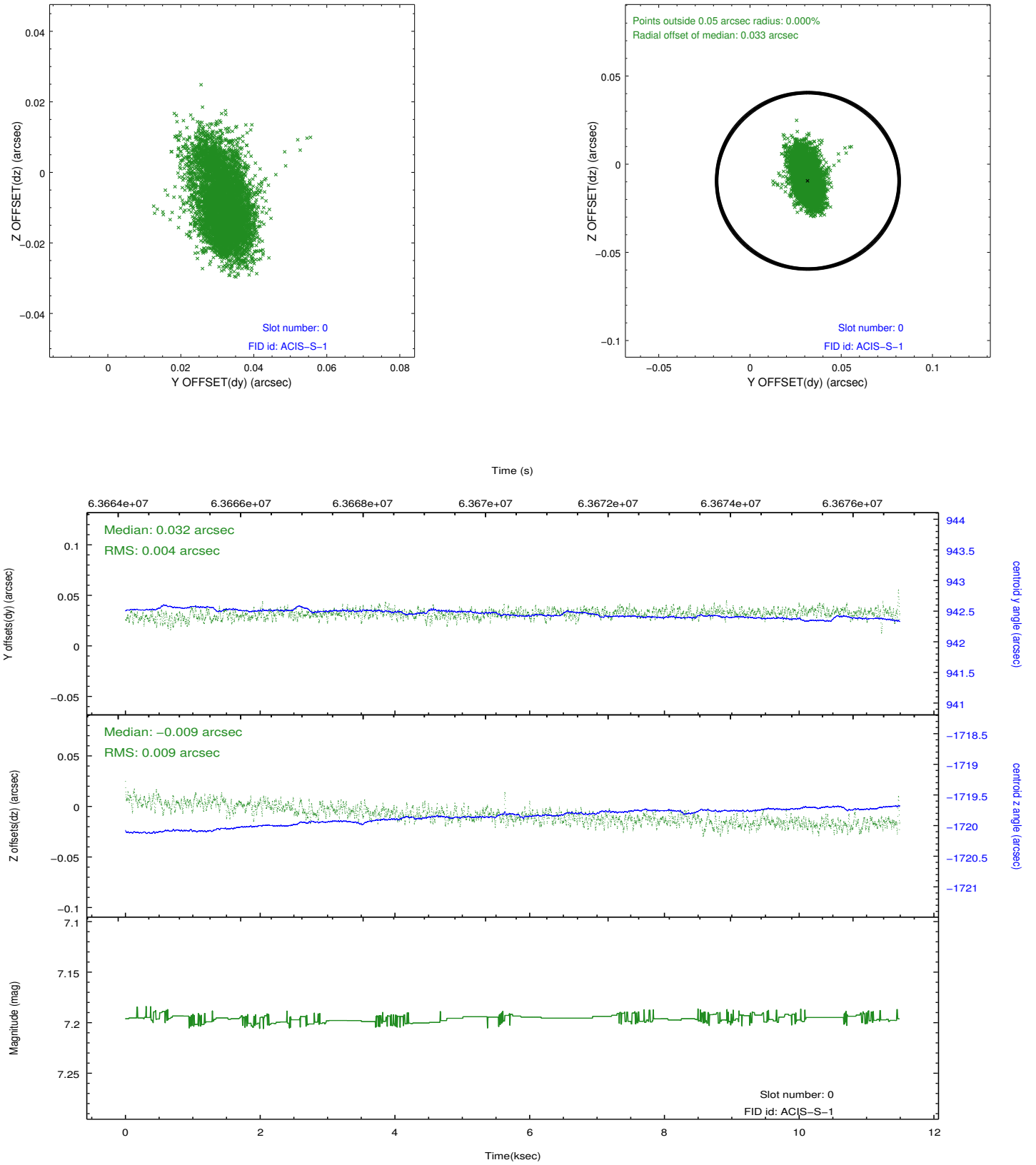


## 2.4.5 Slot 7

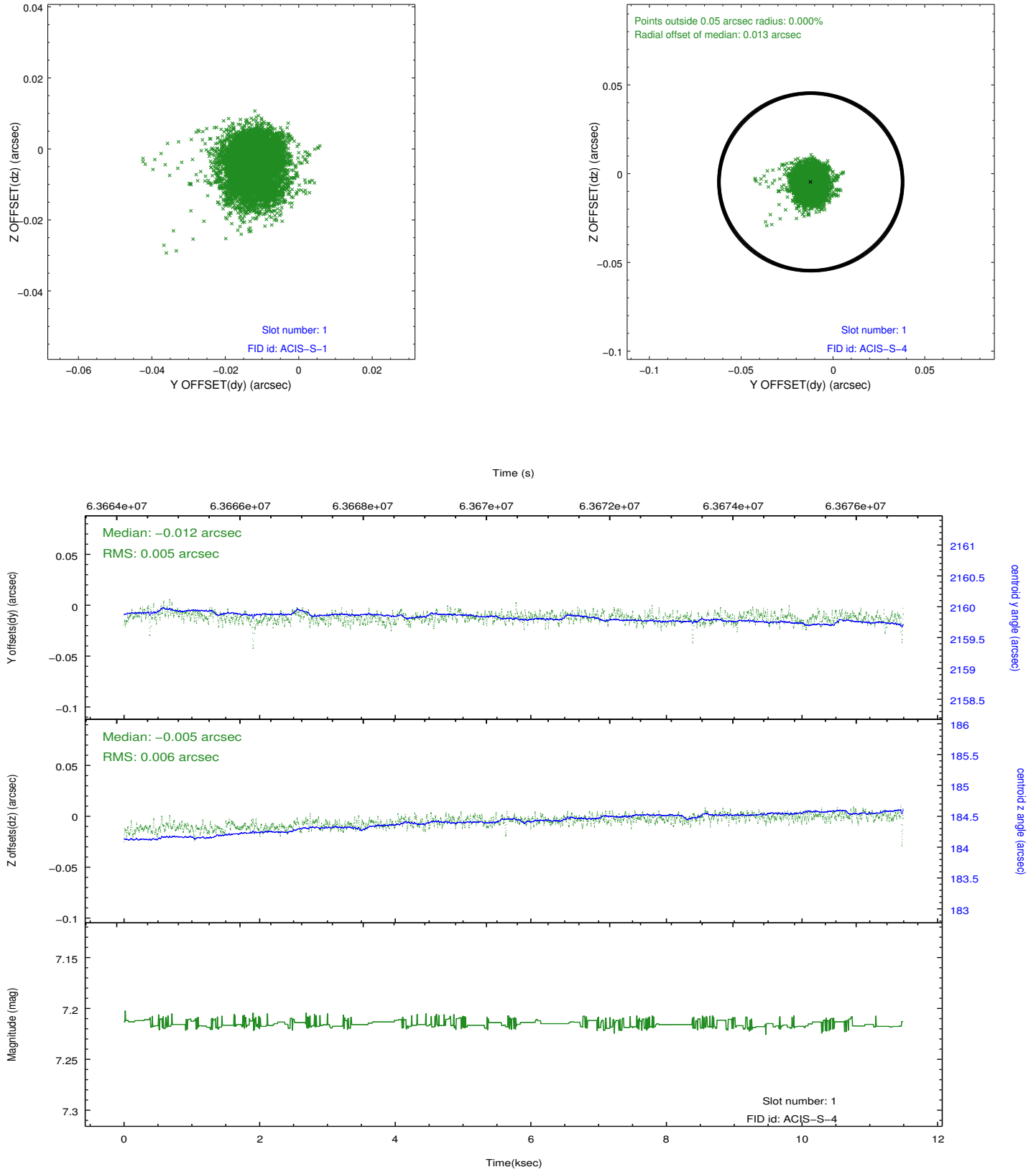


## 2.5 FID Slots

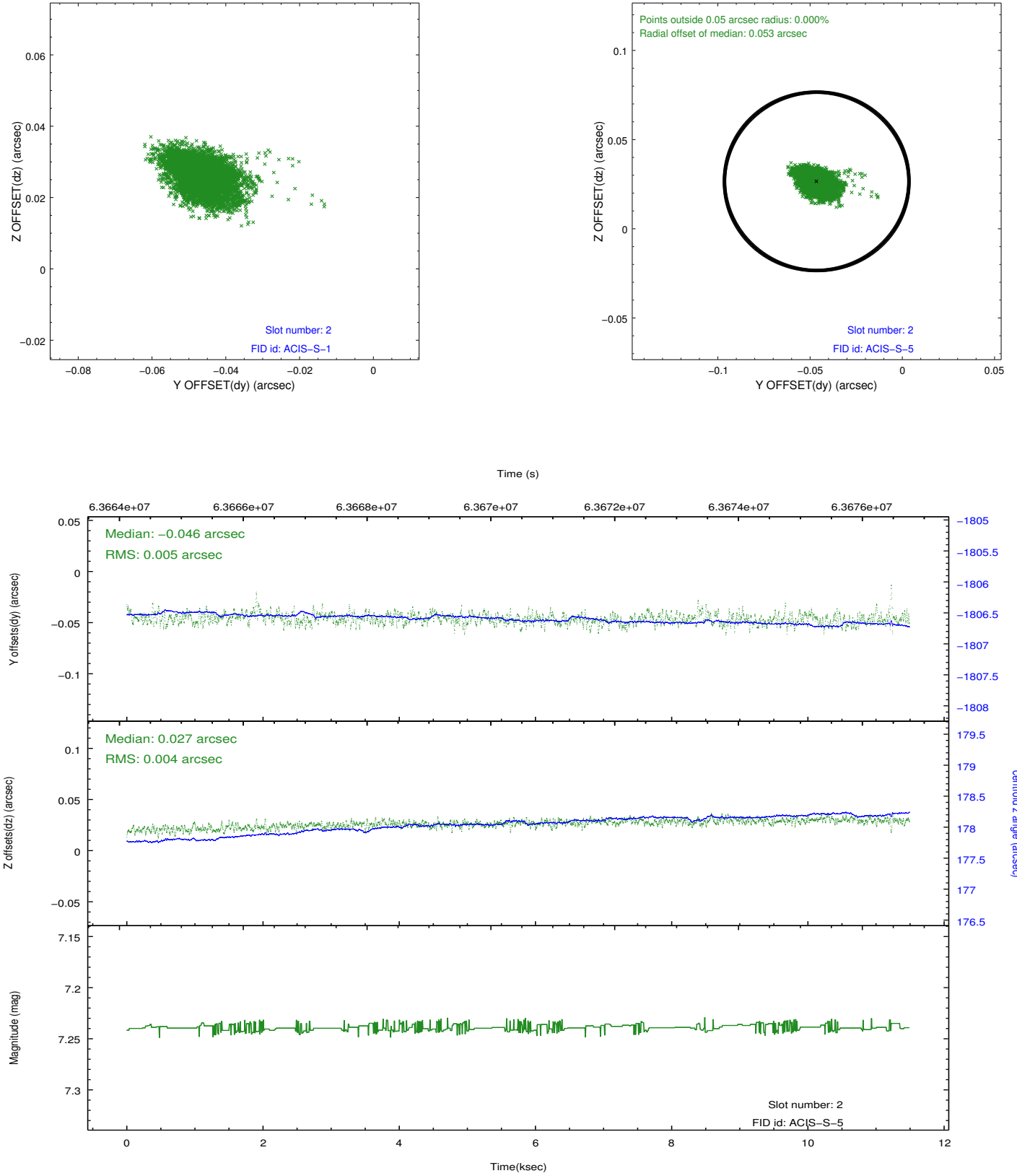
### 2.5.1 Slot 0



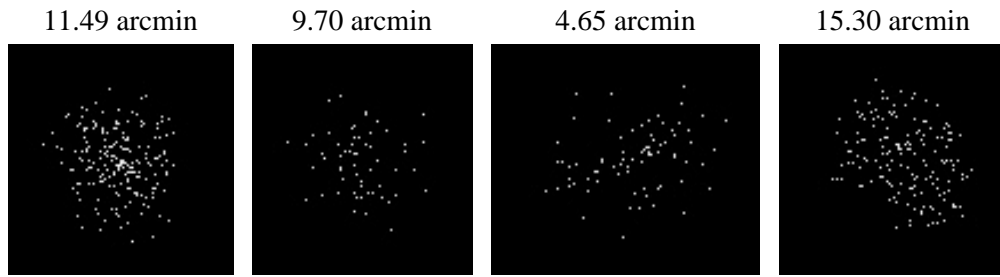
## 2.5.2 Slot 1



## 2.5.3 Slot 2



### 3 Point Sources



# A Summary

## A.1 Status

V&V Scientist	Beth Sundheim
V&V Date (YYYY-MM-DD)	2009.12.08
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	10.166

## A.2 Comments

Focal plane temperature is warmer than -118.7 C degrees during the entire observation. This temperature is the upper limit of the verified ACIS calibration for the front-illuminated chips. The focal plane temperature is also warmer than -116.7 degrees C for the entire observation. This temperature is the upper limit of the verified ACIS calibration for the back-illuminated chips. The ACIS spectral response calibration is less accurate at these warmer temperatures than it is at -119.7 C. Users whose science objectives depend on the most accurate spectral response (ie: fitting line-rich spectra) may notice an effect. Users whose science objectives do not depend on the most accurate spectral response should not notice an effect.