

# V&V Reference Report

## L2 ASCDS Version : 8.4.3

Observation 12715 - L2 Version 2  
Chandra X-Ray Center

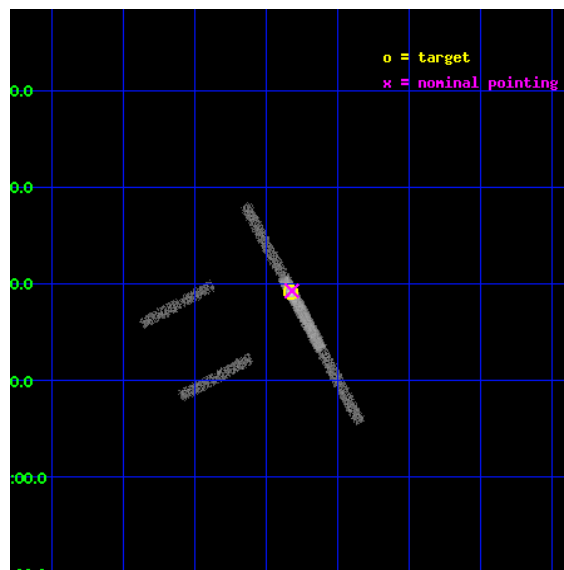
L2 Processing Date : Feb 28 2012

## 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>A</b>	<b>Summary</b>	<b>17</b>
A.1	Status . . . . .	17
A.2	Comments . . . . .	17

# 1 Front

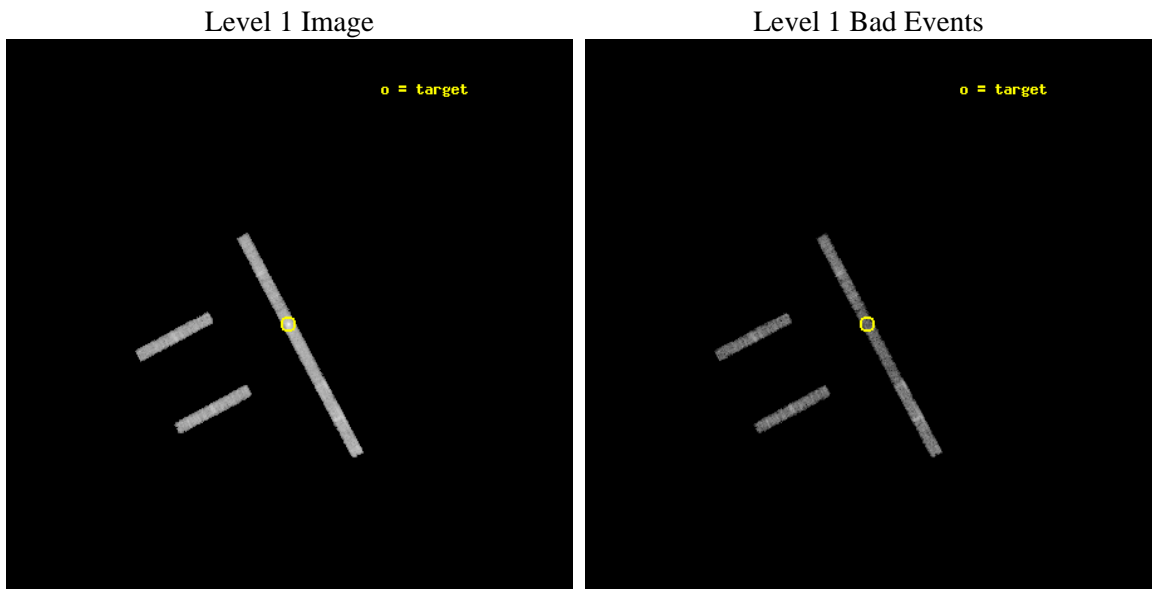
seq_num	702351	Sequence number
obs_id	12715	Observation id
title	First X-ray observations of Low-Power Compact Steep Spectrum Sources	&#160
observer	Dr Magdalena Kunert-Bajraszewska	Principal investigator
object	1321+045	Source name
dtcycle	0	&#160
cycle	P	events from which exps? Prim/Second/Both
ra_targ	201.082083	Observer's specified target RA [deg]
dec_targ	4.318667	Observer's specified target Dec [deg]
ra_nom	201.08060985314	Nominal RA [deg]
dec_nom	4.321318627682	Nominal Dec [deg]
roll_nom	61.926933666935	Nominal Roll [deg]
revision	2	Processing version of data
ontime	10064.449018896	Sum of GTIs [s]
livetime	9507.0634692148	Livetime [s]
ontime2	10064.284858882	Sum of GTIs [s]
ontime3	10064.366938889	Sum of GTIs [s]
ontime6	10064.407978892	Sum of GTIs [s]
ontime7	10064.449018896	Sum of GTIs [s]
ontime8	10063.584858894	Sum of GTIs [s]
l2events	13073	Number of level 2 events



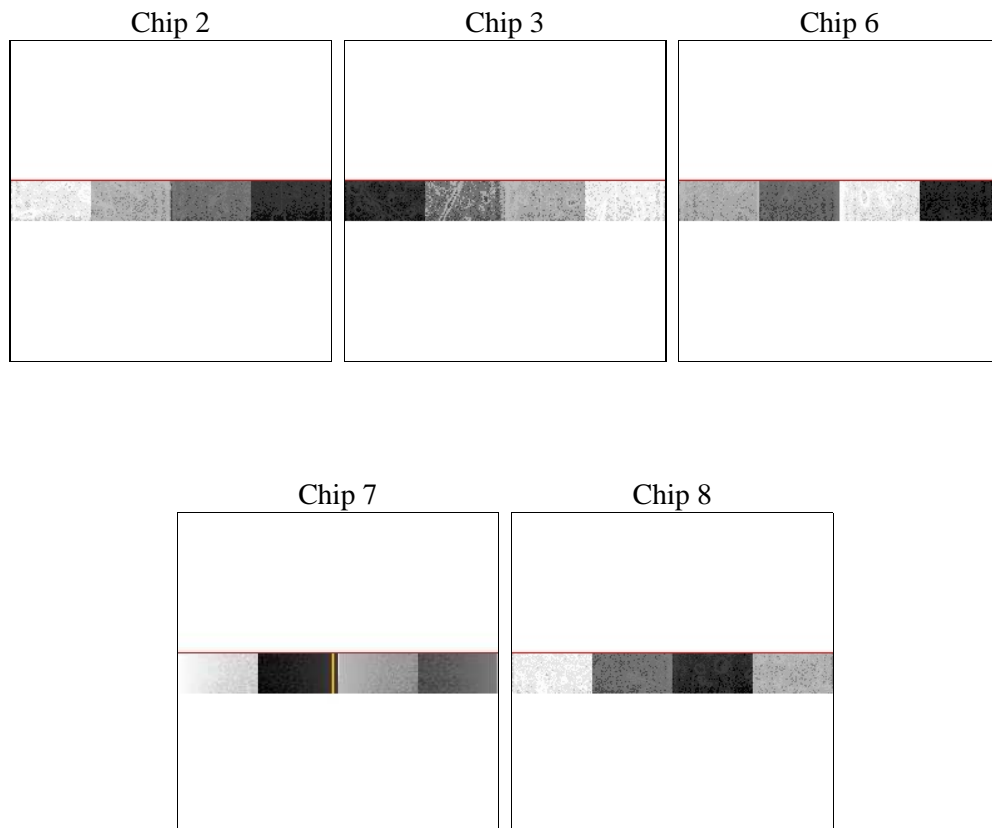
## 2 OBI

### 2.1 OBI

#### 2.1.1 Images



#### 2.1.2 Bias



### 2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	10000.000000	[s] Scheduled observation exposure time
ascdsver	8.4.3	Processing system revision	ontime	10064.449018896	Sum of GTIs [s]
caldsver	4.4.8	&#160	ontime2	10064.284858882	Sum of GTIs [s]
date	2012-02-28T16:34:43	Date and time of file creation	ontime3	10064.366938889	Sum of GTIs [s]
revision	2	Processing version of data	ontime6	10064.407978892	Sum of GTIs [s]
			ontime7	10064.449018896	Sum of GTIs [s]
			ontime8	10063.584858894	Sum of GTIs [s]
			l1events	64503	Number of level 1 events

### 2.1.4 Events

	ccd 2	ccd 3	ccd 6	ccd 7	ccd 8
level 1 events	10127	10551	11077	15761	16987
rejected events	8982	9411	9794	6450	13011
rejected %	88%	89%	88%	40%	76%

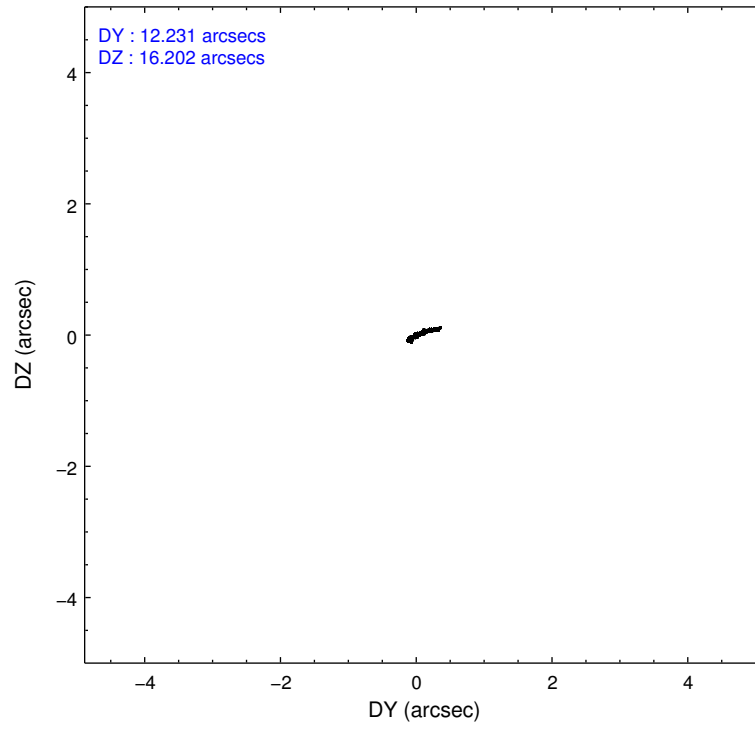
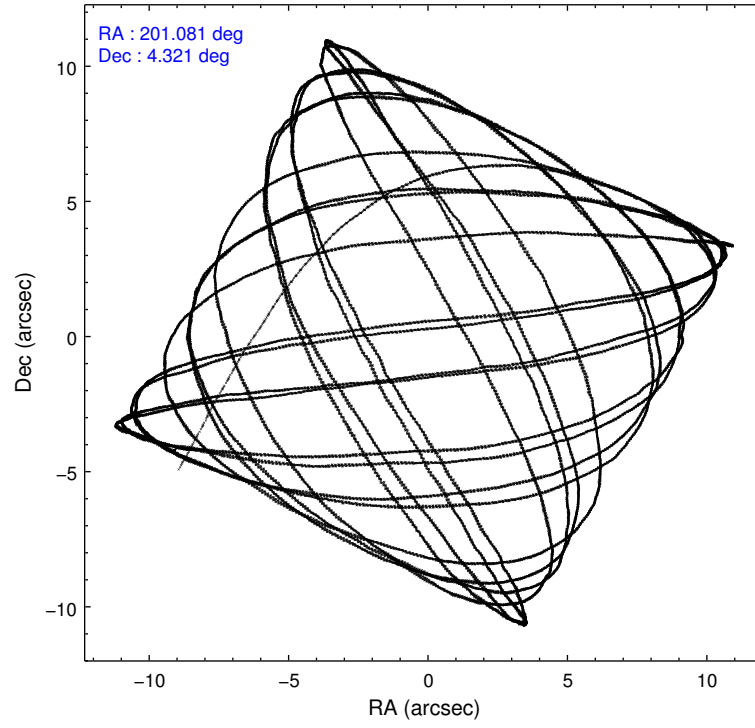
	ccd 2	ccd 3	ccd 6	ccd 7	ccd 8
grade 0 events	331	341	390	1746	919
	3%	3%	3%	11%	5%
grade 1 events	3	7	7	7	9
	0%	0%	0%	0%	0%
grade 2 events	227	220	223	2178	873
	2%	2%	2%	13%	5%
grade 3 events	184	197	206	1110	452
	1%	1%	1%	7%	2%
grade 4 events	225	183	203	1087	427
	2%	1%	1%	6%	2%
grade 5 events	329	419	432	1286	558
	3%	3%	3%	8%	3%
grade 6 events	178	199	261	3190	1305
	1%	1%	2%	20%	7%
grade 7 events	8650	8985	9355	5157	12444
	85%	85%	84%	32%	73%

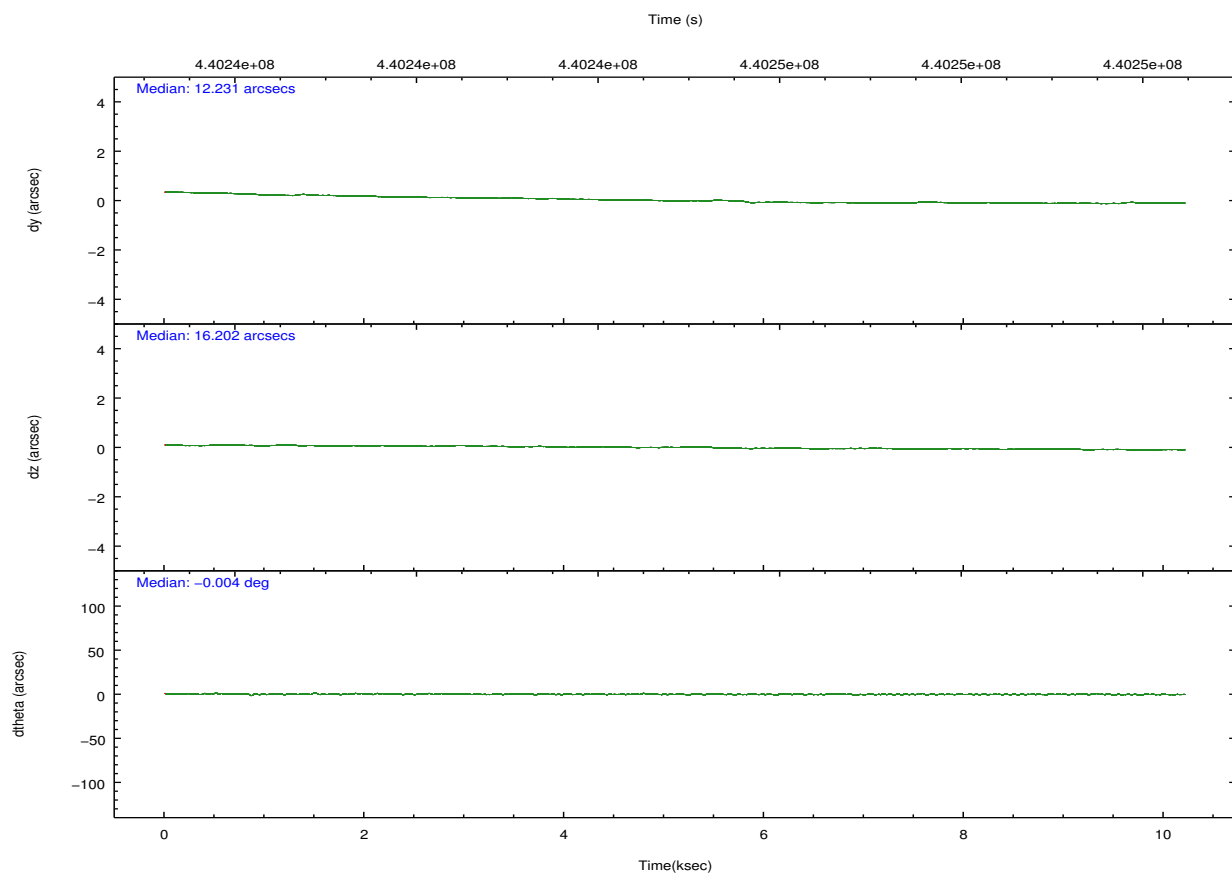
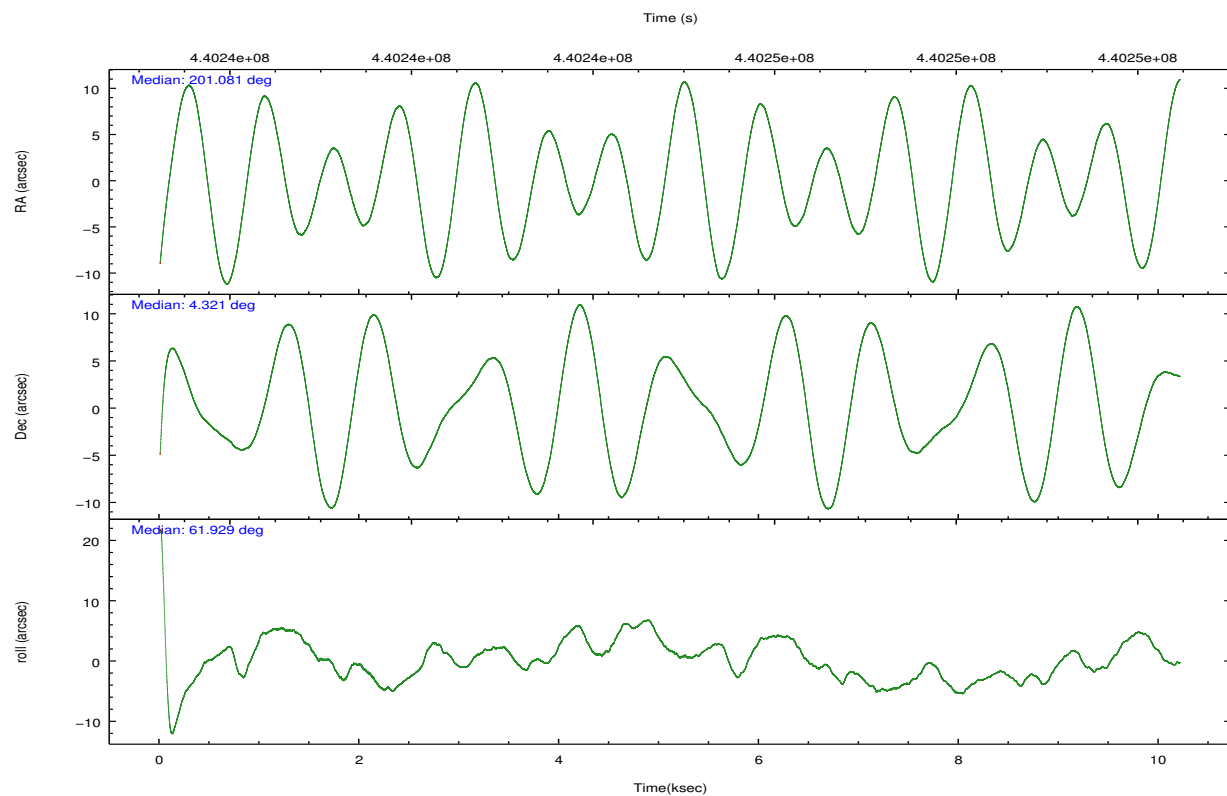


## 2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-23678	ACIS-23678	Obspar file type	PREDICTED	ACTUAL
Grating	NONE	NONE	Obspar update status	NONE	UPDATED
Data mode	FAINT	FAINT	CCD I0 on	N	N
Observation mode	POINTING	POINTING	CCD I1 on	N	N
[deg] Pointing RA	201.081884	201.0806098531391	CCD I2 on	O4	Y
[deg] Pointing Dec	4.293994	4.321318627681969	CCD I3 on	O2	Y
[deg] Pointing Roll	61.770166	61.92693366693454	CCD S0 on	N	N
[mm] SIM focus pos	-0.684267	-0.6828225247311905	CCD S1 on	N	N
[mm] SIM defocus	0	0.001444936568705701	CCD S2 on	O1	Y
[mm] SIM translation stage pos	-190.132523	-190.1425803651734	CCD S3 on	Y	Y
[mm] SIM translation stage offset	0	0.01005778216563158	CCD S4 on	O3	Y
[s] Observation start time (MET)	440239963.184000	440239229.70283	CCD S5 on	N	N
Observation start date	2011-12-14T08:51:37	2011-12-14T08:40:29	Number of optional ACIS chips dropped	0	0
[s] Observation end time (MET)	440249963.184000	440250589.26593	On-chip summing requested	N	N
Observation end date	2011-12-14T11:38:17	2011-12-14T11:49:49	Subarray requested	CUSTOM	1/8
Read mode	TIMED	TIMED	Subarray start row	449	449
			Subarray row count	128	128
			Alternating exposures requested	N	N
			[s] Primary exposure time	0.000000	0.7

## 2.3 Aspect



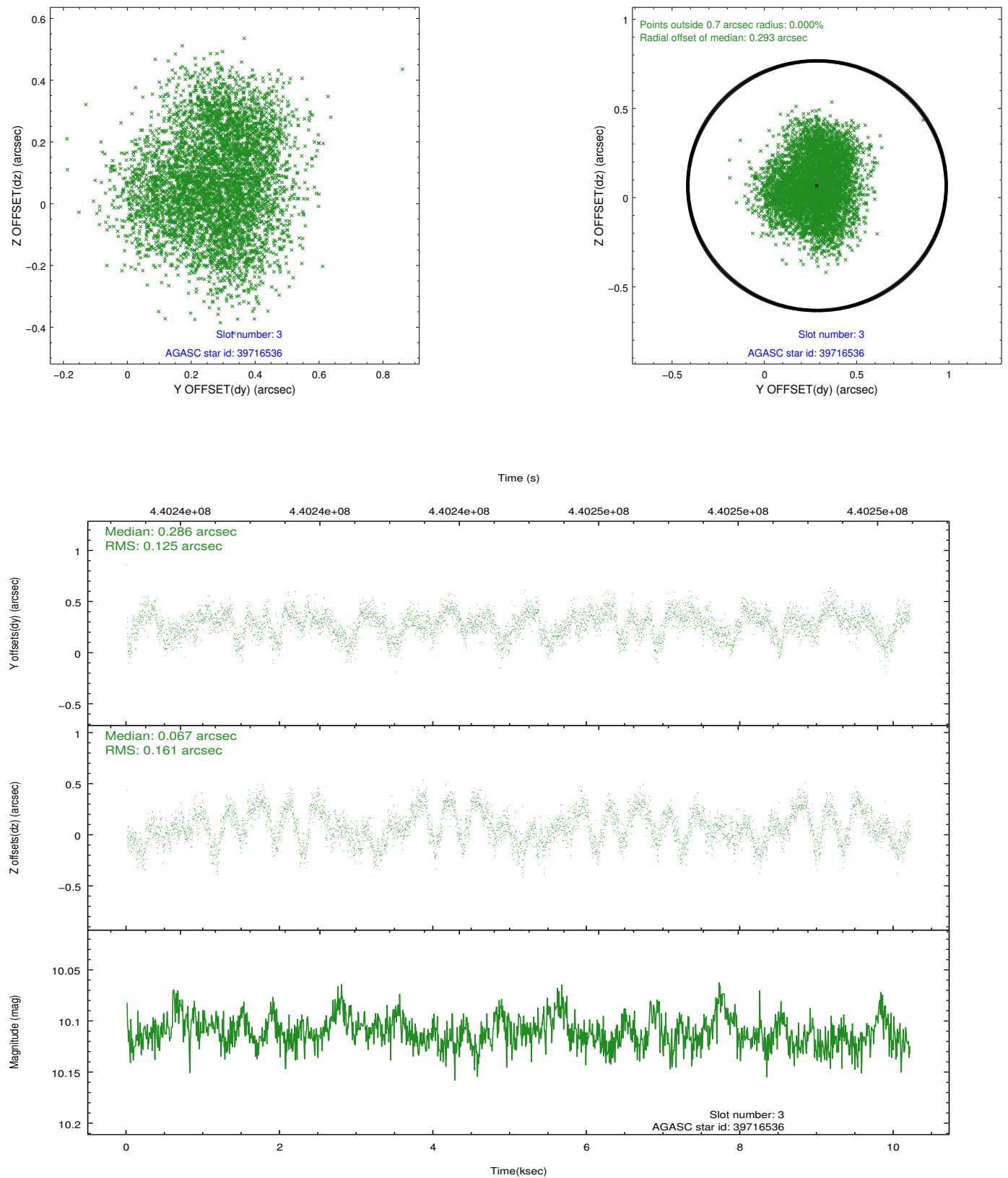


### Slot Statistics

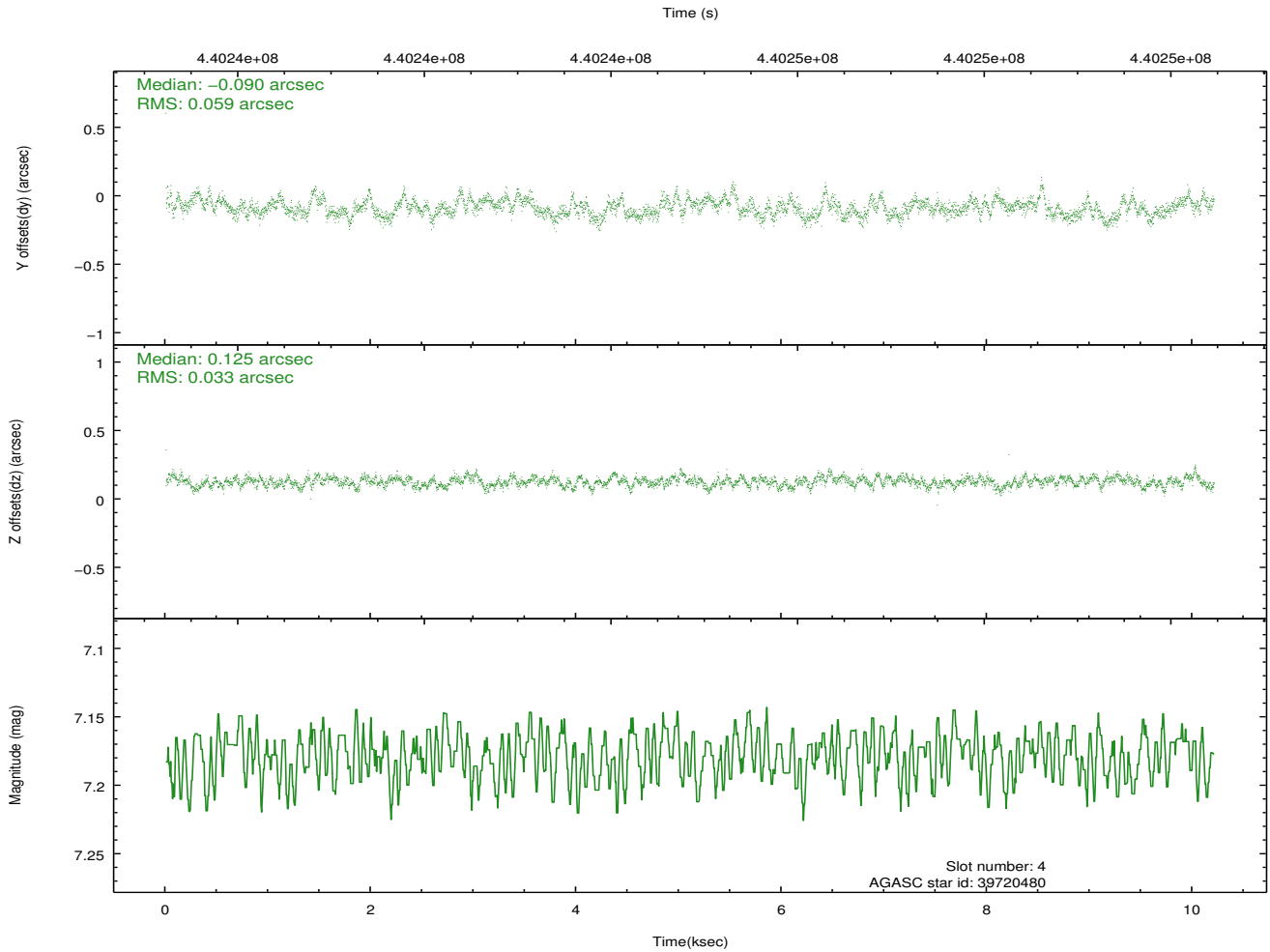
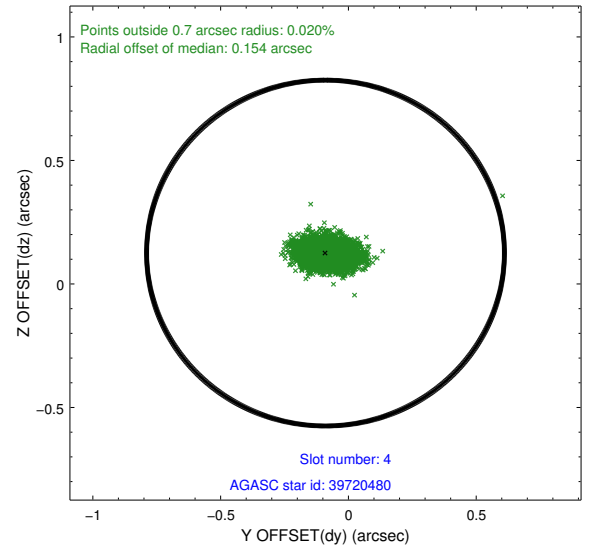
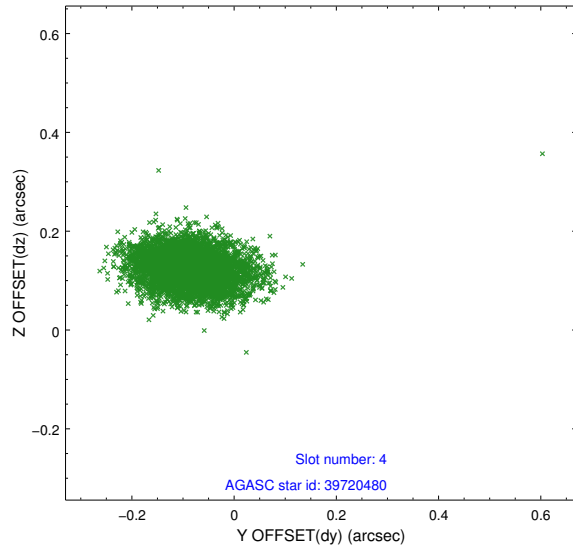
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-S-2	6.90	2490	-0.046	-0.005	0.007	0.012	0.000000	0.000000	-765.21	-1737.56
1	FID	ACIS-S-4	6.99	2490	0.174	0.024	0.007	0.012	0.000000	0.000000	2148.05	170.41
2	FID	ACIS-S-5	7.02	2490	-0.158	-0.010	0.009	0.016	0.000000	0.000000	-1817.50	164.64
3	GUIDE	39716536	10.11	4973	0.286	0.067	0.225	0.336	201.155033	3.862768	-1244.15	-964.87
4	GUIDE	39720480	7.18	4980	-0.090	0.125	0.068	0.117	201.177441	4.402072	505.21	-117.98
5	GUIDE	39720832	10.18	4962	-0.268	0.027	0.212	0.346	201.562552	4.221693	587.53	-1643.16
6	GUIDE	39721936	9.62	4976	-0.033	0.075	0.136	0.222	201.230183	4.242524	88.88	-556.31
7	GUIDE	39722112	9.84	4957	0.112	-0.294	0.151	0.267	200.524263	4.157318	-1378.06	1532.66

## 2.4 Star Slots

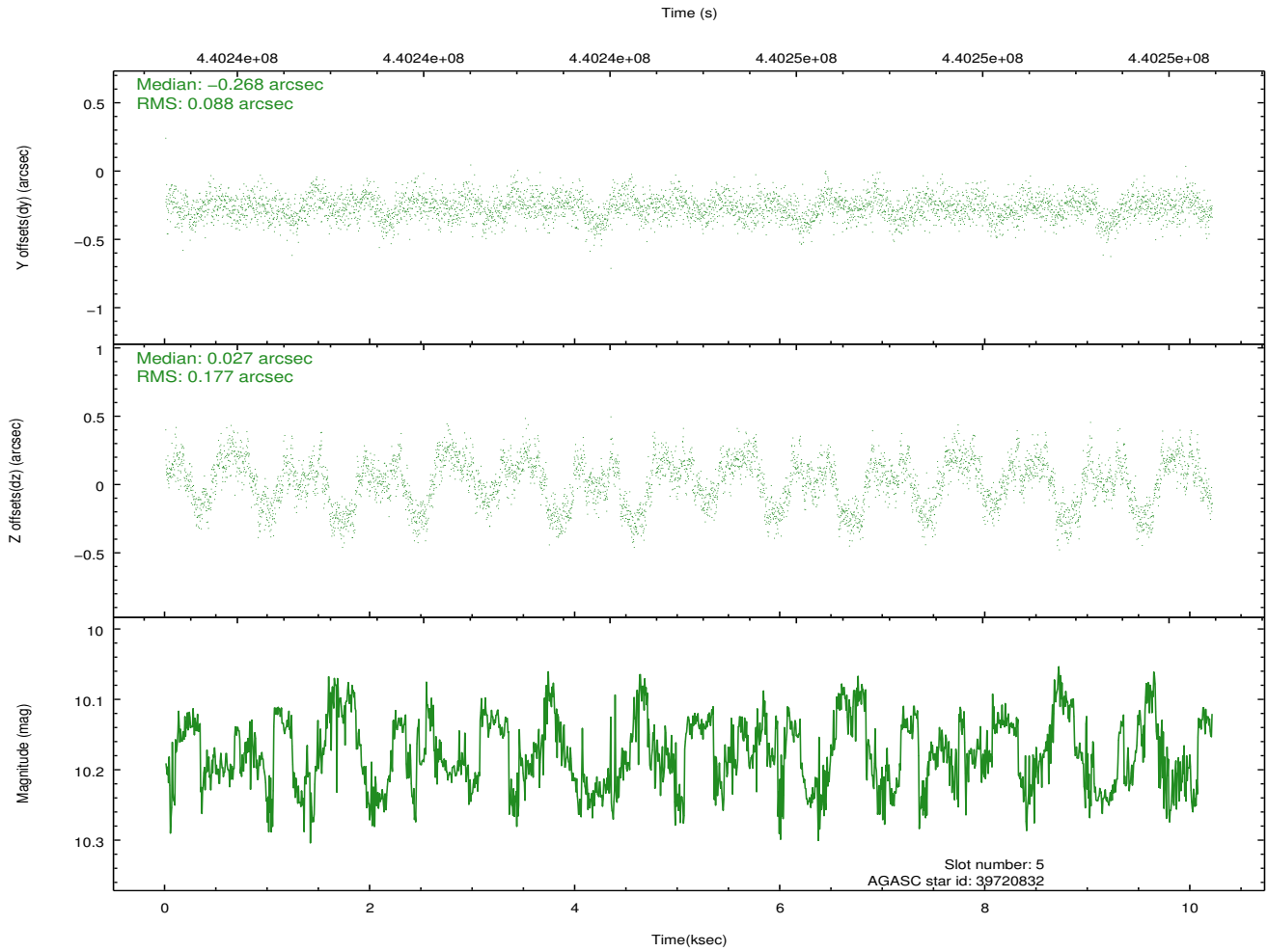
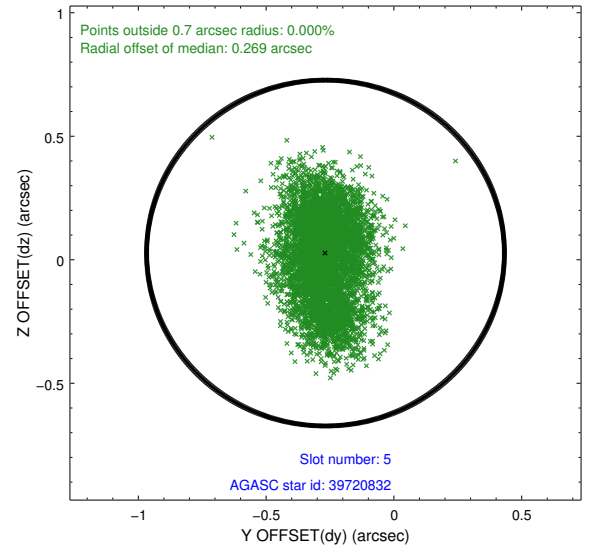
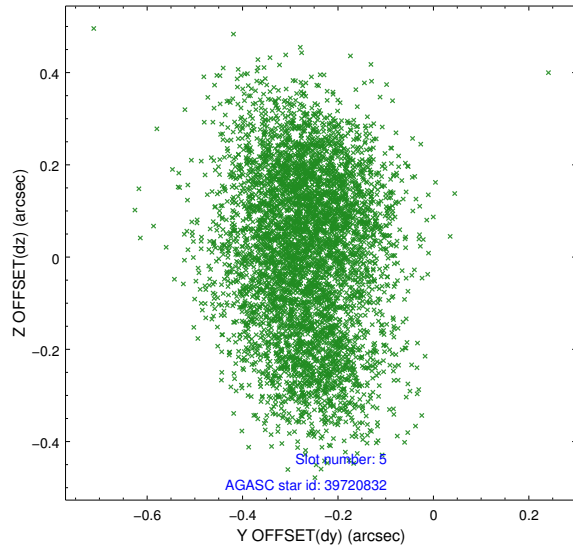
### 2.4.1 Slot 3



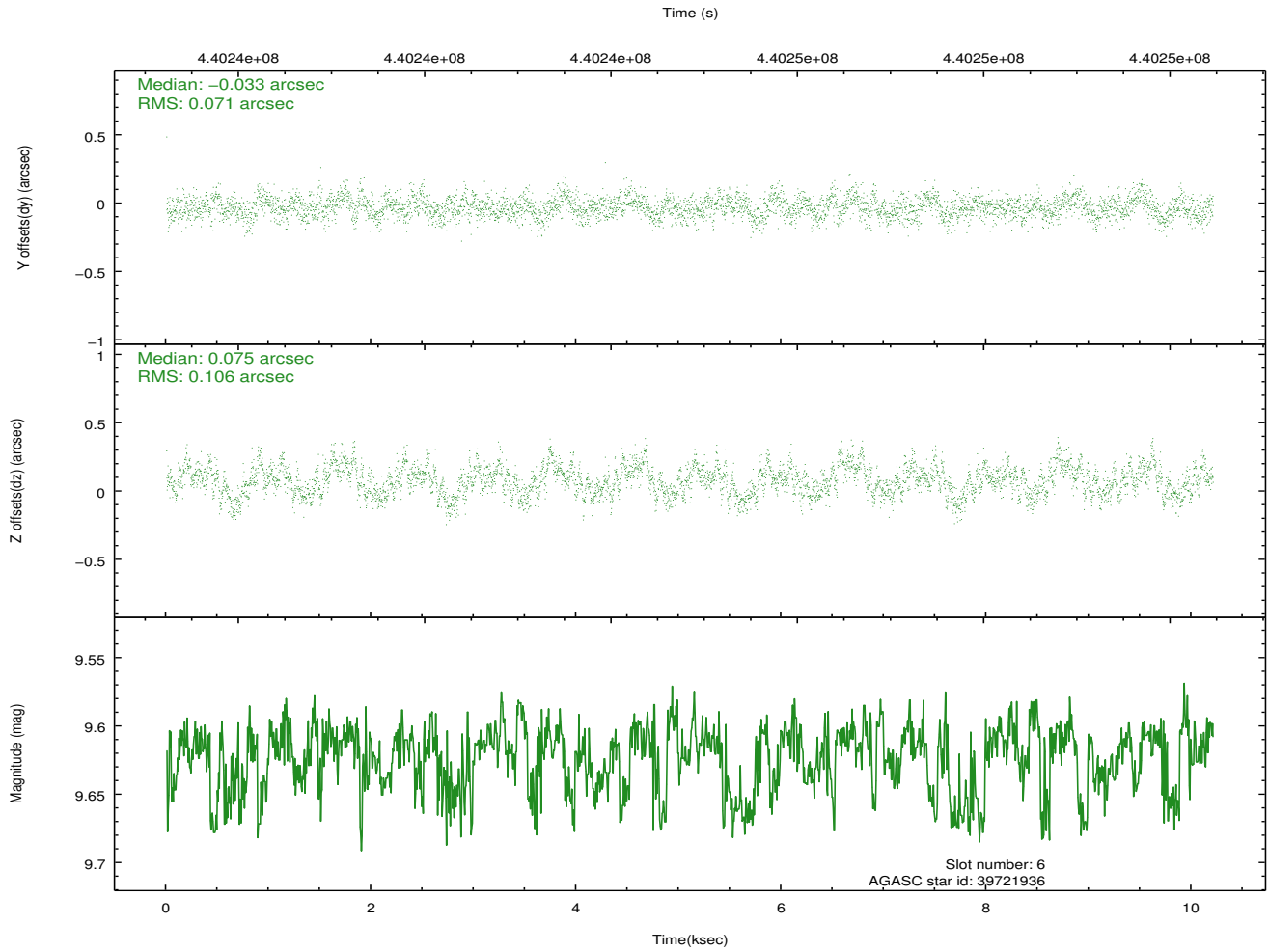
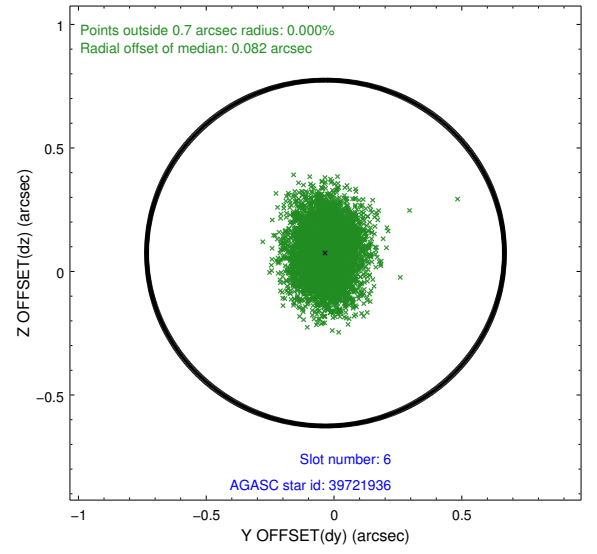
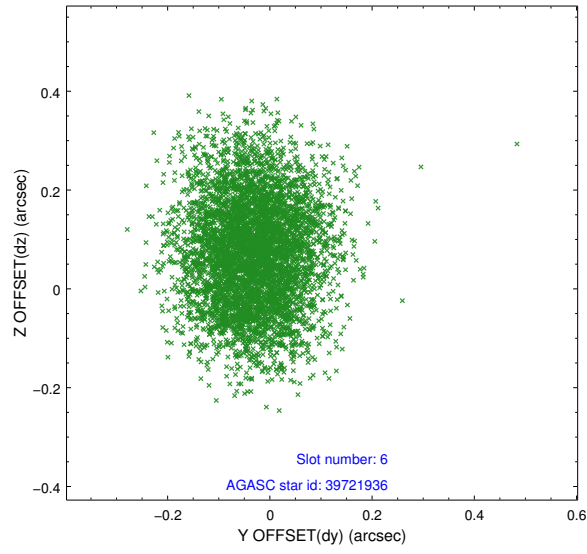
## 2.4.2 Slot 4



### 2.4.3 Slot 5

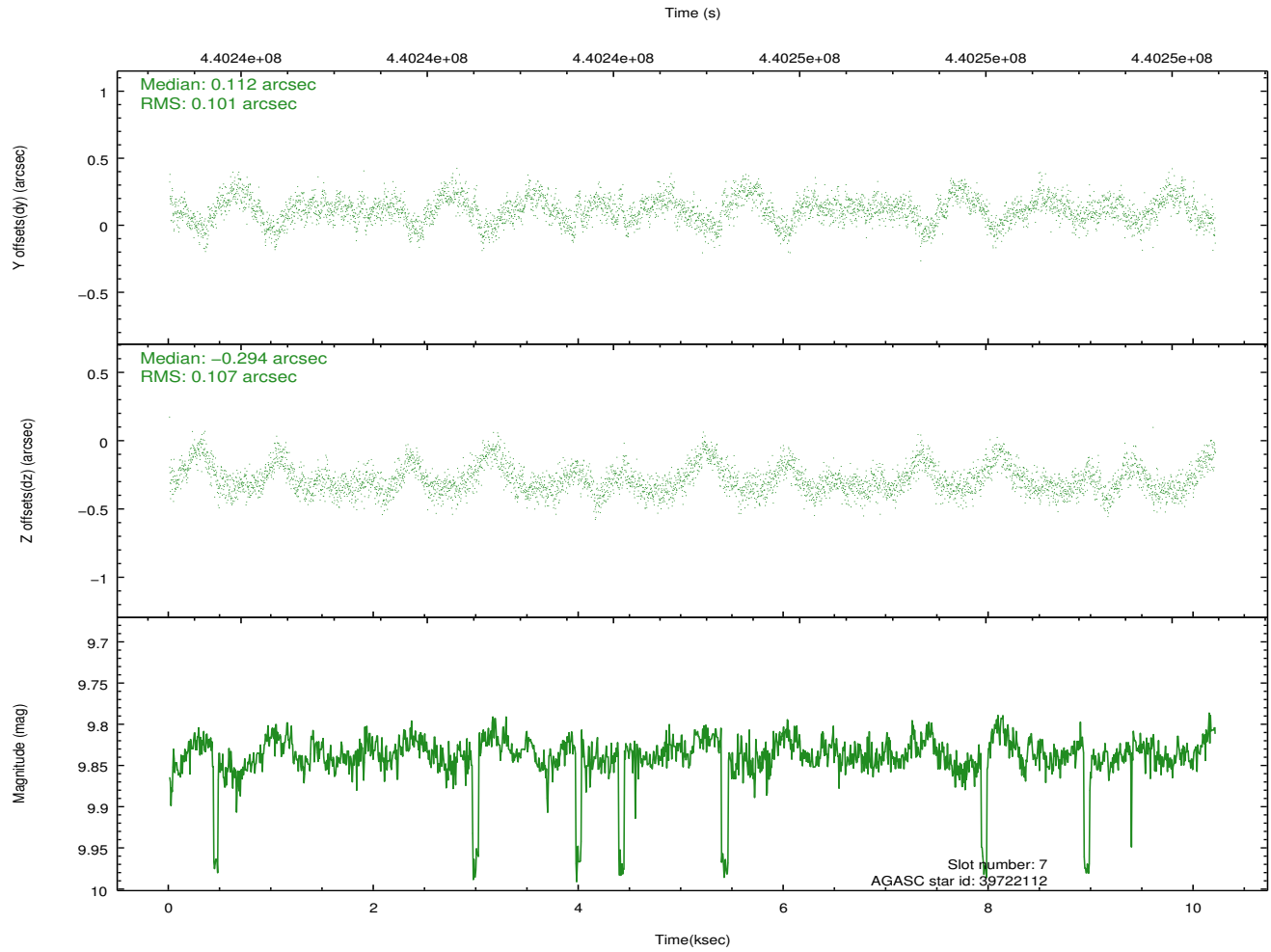
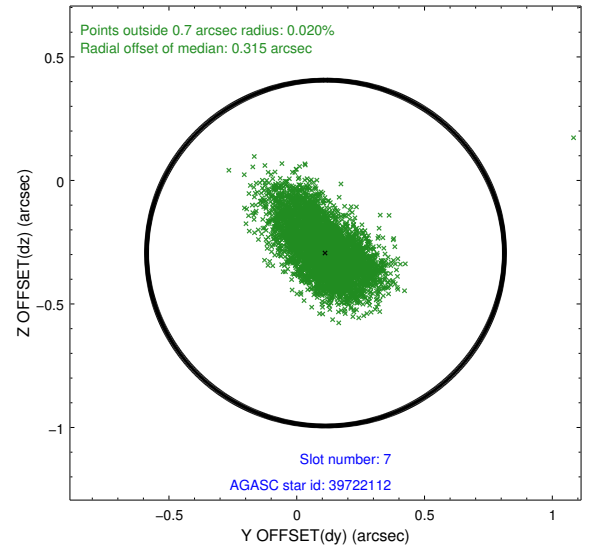
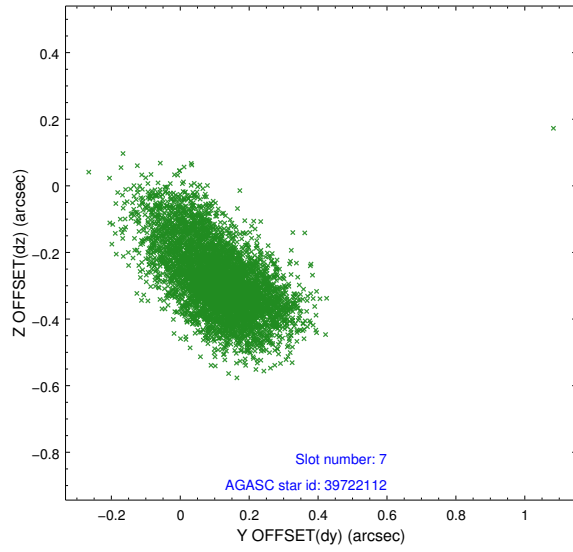


## 2.4.4 Slot 6



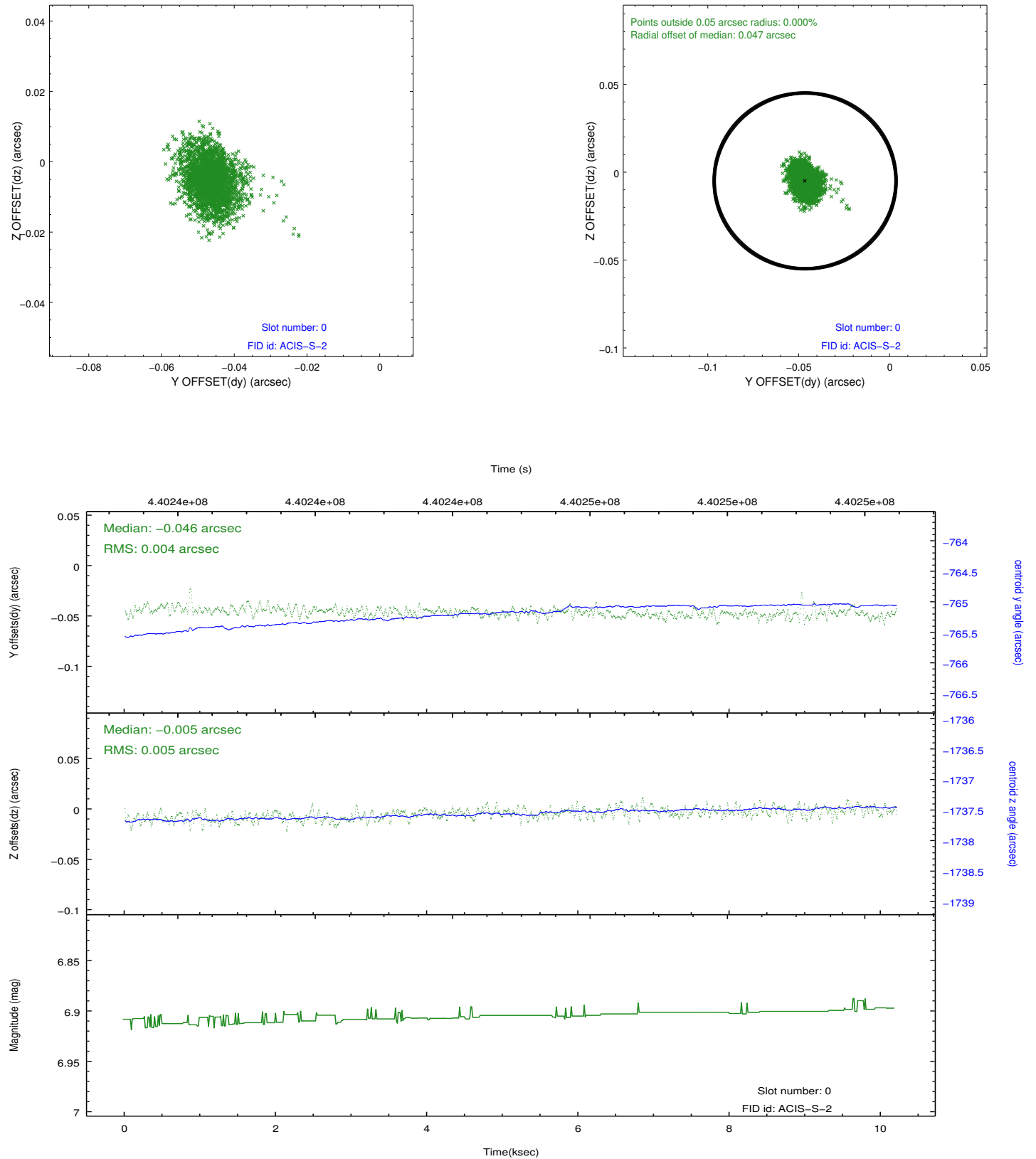


## 2.4.5 Slot 7

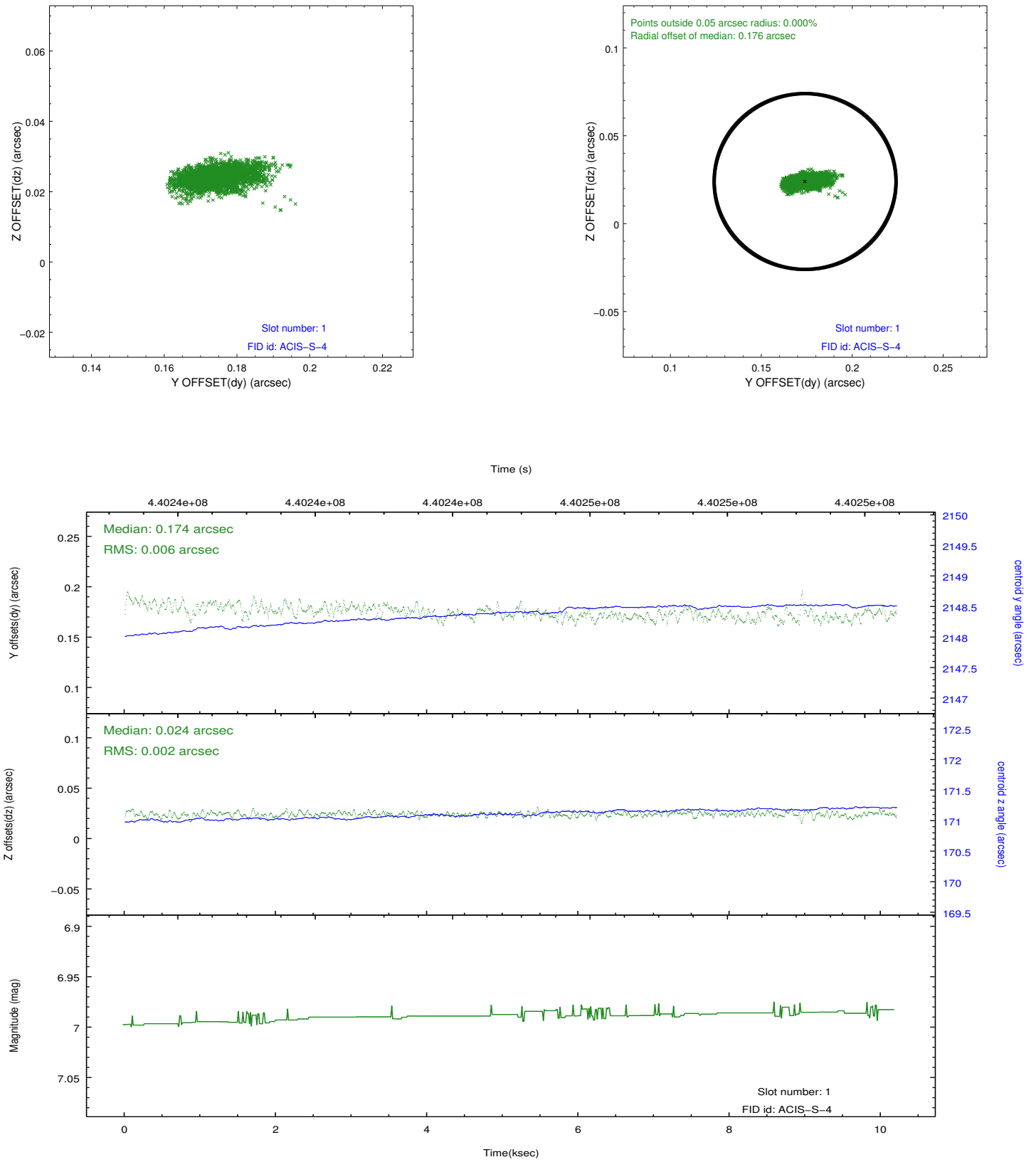


## 2.5 FID Slots

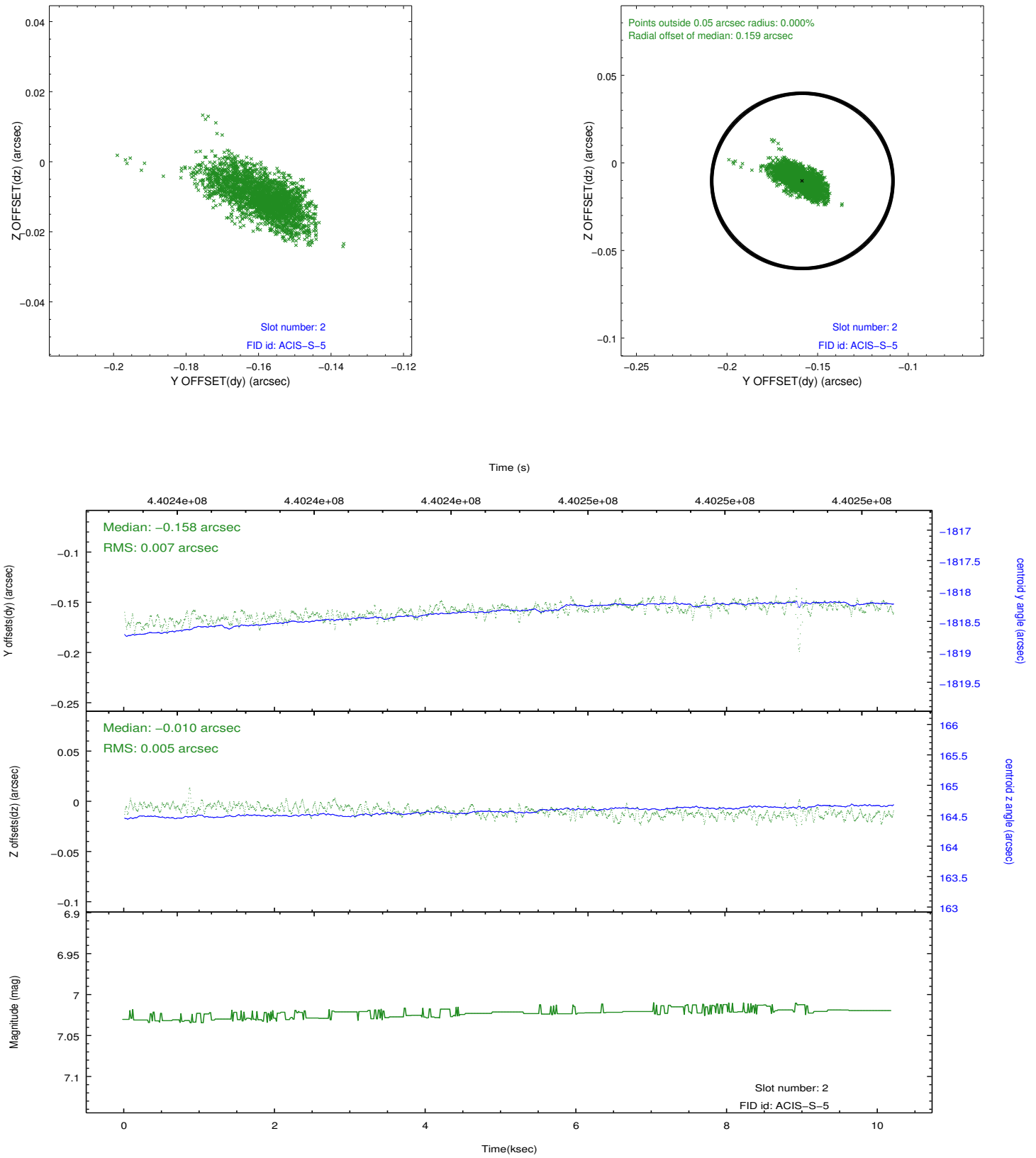
### 2.5.1 Slot 0



## 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)	2012.02.29
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	10.064449021816

### A.2 Comments