

# V&V Reference Report

## L2 ASCDS Version : 8.4.5

Observation 2319 - L2 Version 3  
Chandra X-Ray Center

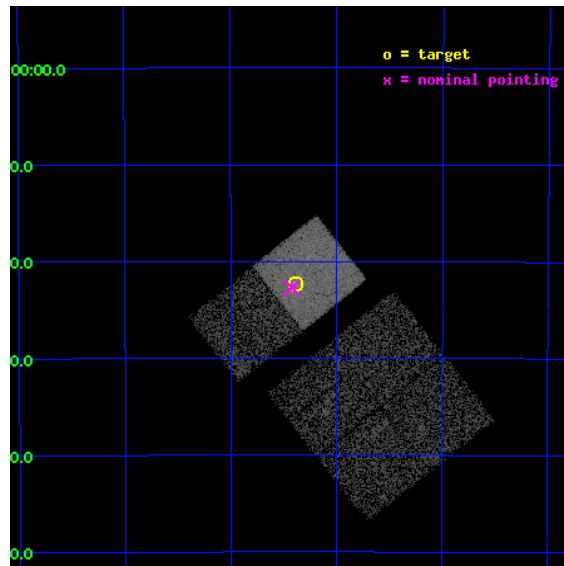
L2 Processing Date : Sep 2 2012

## 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

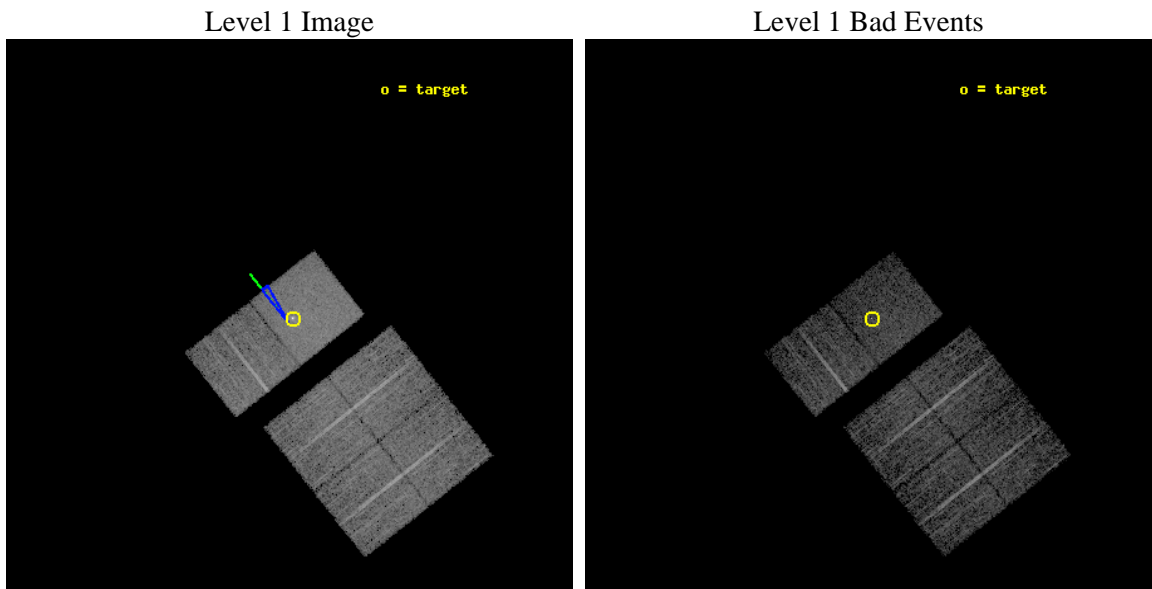
seq_num	700108	Sequence number
obs_id	2319	Observation id
title	EXTENDED X-RAY EMISSION AROUND NEARBY SEYFERTS	Proposal title
observer	Dr. Stephen Murray	Principal investigator
object	NGC 7582	Source name
dtcycle	0	&#160
cycle	P	events from which exps? Prim/Second/Both
ra_targ	349.596667	Observer's specified target RA [deg]
dec_targ	-42.371389	Observer's specified target Dec [deg]
ra_nom	349.60554231257	Nominal RA [deg]
dec_nom	-42.378792690344	Nominal Dec [deg]
roll_nom	321.66261270677	Nominal Roll [deg]
revision	3	Processing version of data
ontime	5942.3590752035	Sum of GTIs [s]
livetime	5867.1133465342	Livetime [s]
ontime0	5942.3590752035	Sum of GTIs [s]
ontime1	5939.1180850416	Sum of GTIs [s]
ontime2	5942.359045282	Sum of GTIs [s]
ontime3	5942.359045282	Sum of GTIs [s]
ontime6	5942.359045282	Sum of GTIs [s]
ontime7	5942.3590752035	Sum of GTIs [s]
l2events	43777	Number of level 2 events



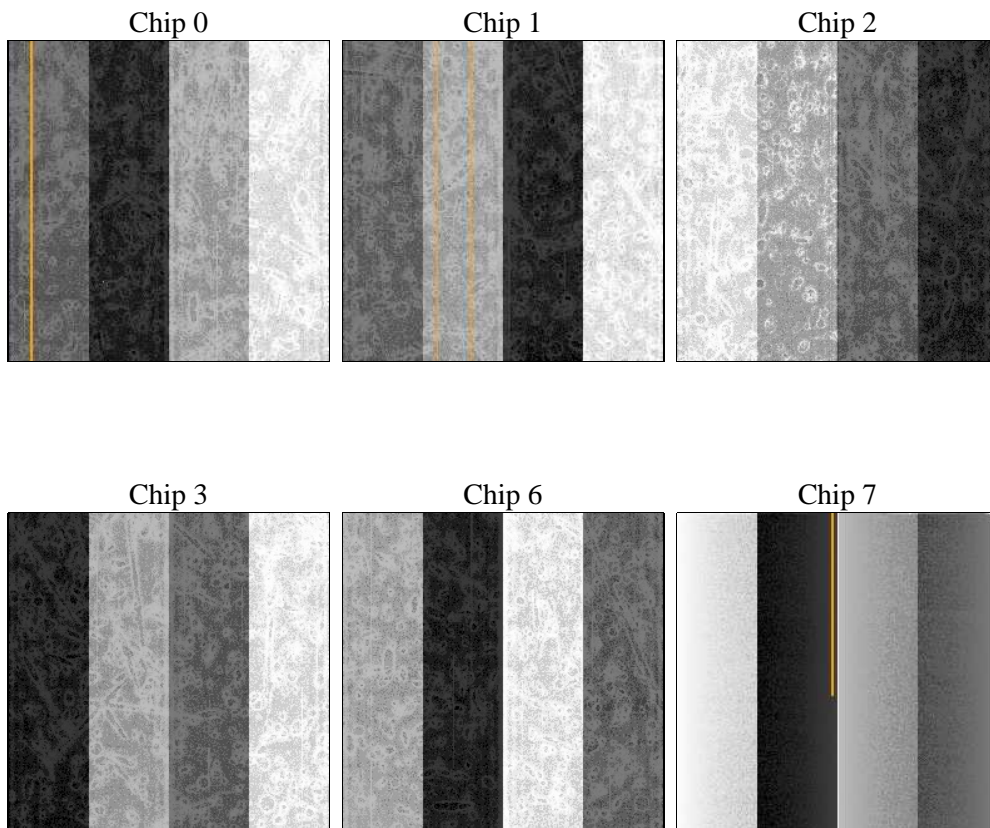
## 2 OBI

### 2.1 OBI

#### 2.1.1 Images



#### 2.1.2 Bias



### 2.1.3 Parameters

obi_num	1	Obi number	sched_exp_time	6000.000000	[s] Scheduled observation exposure time
ascdsver	8.4.5	Processing system revision	ontime	5942.3590752035	Sum of GTIs [s]
caldsver	4.5.1.1	&#160	ontime0	5942.3590752035	Sum of GTIs [s]
date	2012-09-02T09:39:30	Date and time of file creation	ontime1	5939.1180850416	Sum of GTIs [s]
revision	3	Processing version of data	ontime2	5942.359045282	Sum of GTIs [s]
			ontime3	5942.359045282	Sum of GTIs [s]
			ontime6	5942.359045282	Sum of GTIs [s]
			ontime7	5942.3590752035	Sum of GTIs [s]
			l1events	234670	Number of level 1 events

### 2.1.4 Events

	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6	ccd 7		ccd 0	ccd 1	ccd 2	ccd 3	ccd 6	ccd 7
level 1 events	35753	33137	37965	37402	37455	52958	grade 0 events	1810	1804	1853	1791	2010	3171
rejected events	31459	28880	33876	33356	32910	26868		5%	5%	4%	4%	5%	5%
rejected %	87%	87%	89%	89%	87%	50%	grade 1 events	16	14	12	8	15	62
								0%	0%	0%	0%	0%	0%
							grade 2 events	911	846	814	824	900	5025
								2%	2%	2%	2%	2%	9%
							grade 3 events	448	450	368	383	436	2426
								1%	1%	0%	1%	1%	4%
							grade 4 events	401	438	397	382	400	2330
								1%	1%	1%	1%	1%	4%
							grade 5 events	1321	1415	1229	1385	1465	4448
								3%	4%	3%	3%	3%	8%
							grade 6 events	730	723	659	671	805	13186
								2%	2%	1%	1%	2%	24%
							grade 7 events	30116	27447	32633	31958	31424	22310
								84%	82%	85%	85%	83%	42%

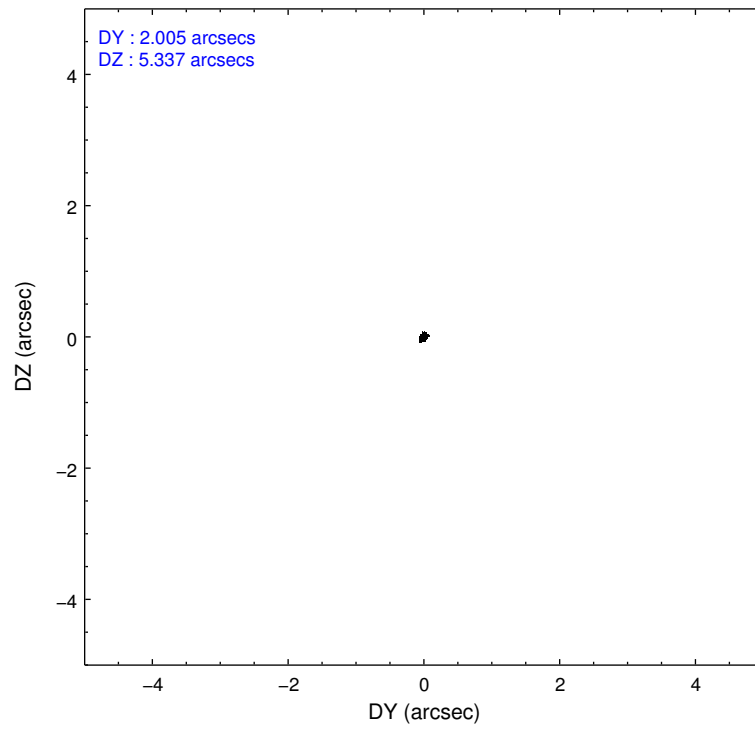
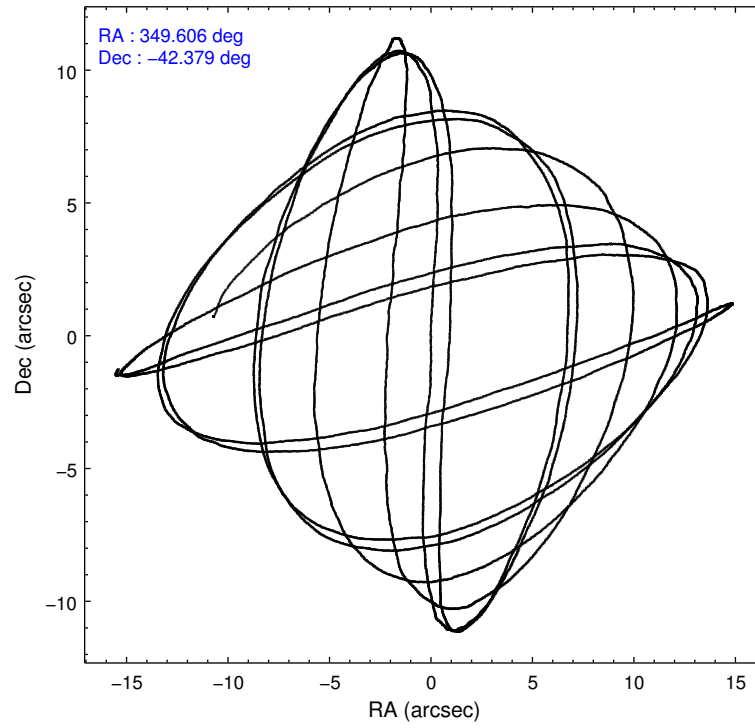


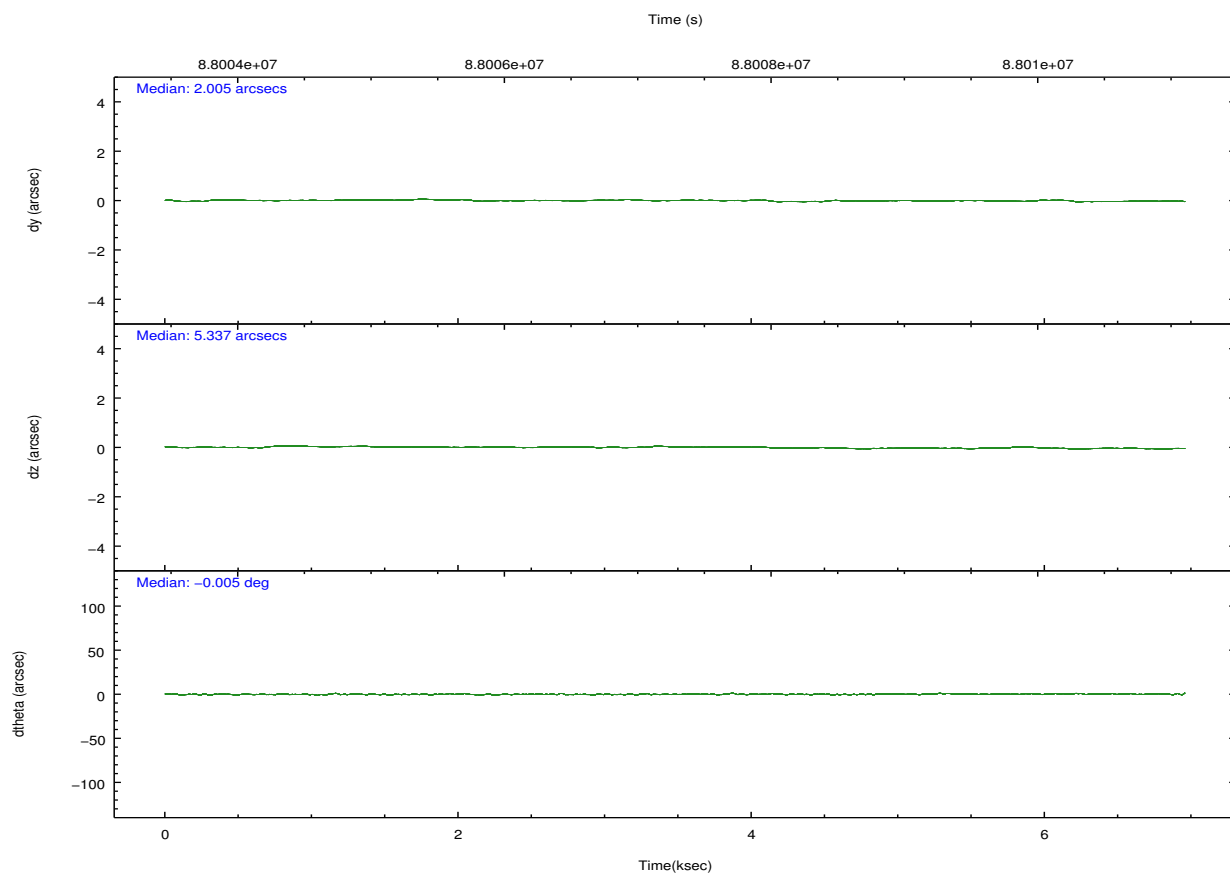
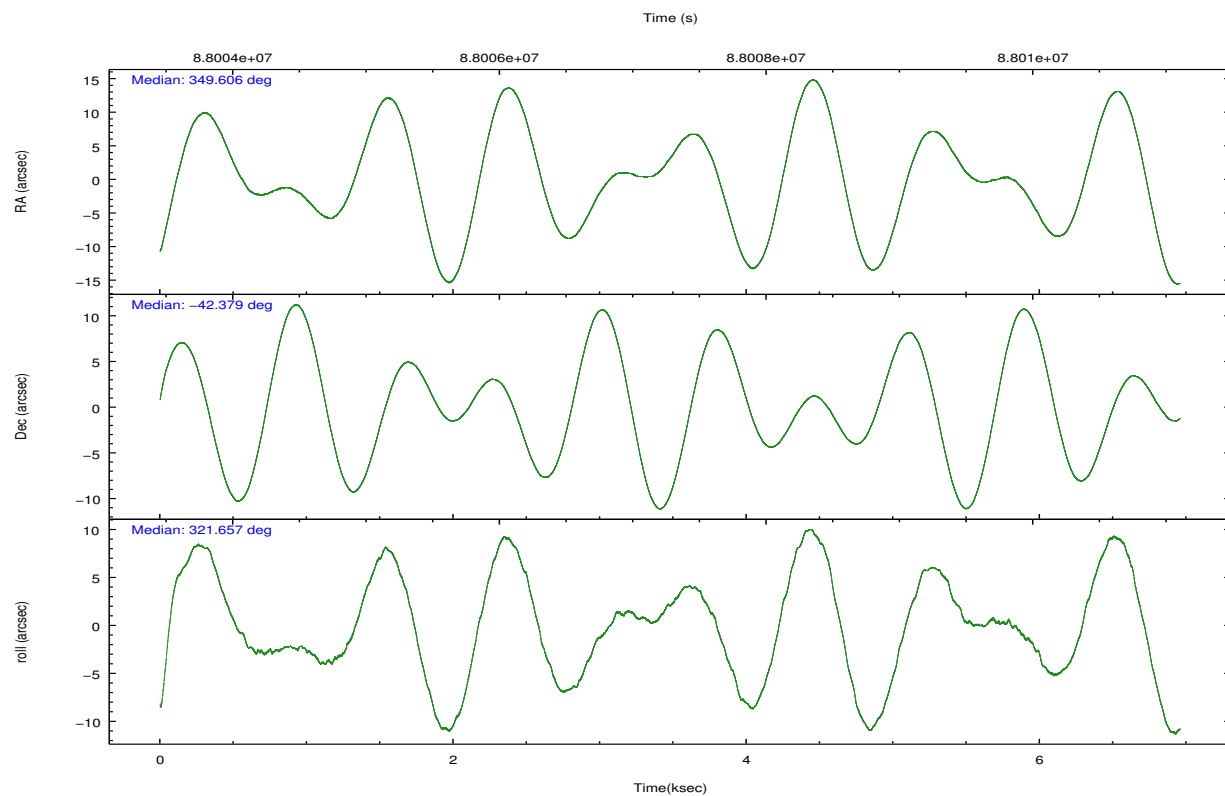
## 2.2 Compared Parameters

Parameter	Planned	Actual
Instrument	ACIS	ACIS
Detector	ACIS-012367	ACIS-012367
Grating	NONE	NONE
Data mode	VFAINT	VFAINT
Observation mode	POINTING	POINTING
[deg] Pointing RA	349.568806	349.605542312574
[deg] Pointing Dec	-42.375031	-42.37879269034372
[deg] Pointing Roll	321.481220	321.6626127067678
[deg] Roll angle	325.000000	325.000000
[deg] Roll tolerance	5.000000	5.000000
Roll constraint allows 180D rotation	N	N
[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)	88004759.184000	88003415.721552
Observation start date	2000-10-15T13:44:55	2000-10-15T13:23:35
[s] Observation end time (MET)	88010759.184000	88011553.196859
Observation end date	2000-10-15T15:24:55	2000-10-15T15:39:13
Read mode	TIMED	TIMED

Parameter	Planned	Actual
Obspar format version number	7	7
Obspar file type	PREDICTED	ACTUAL
Obspar update status	NONE	UPDATED
Number of optional ACIS chips dropped	0	0
On-chip summing requested	N	N
Subarray requested	NONE	NONE
Alternating exposures requested	N	N
[s] Primary exposure time	0.000000	3.2

## 2.3 Aspect



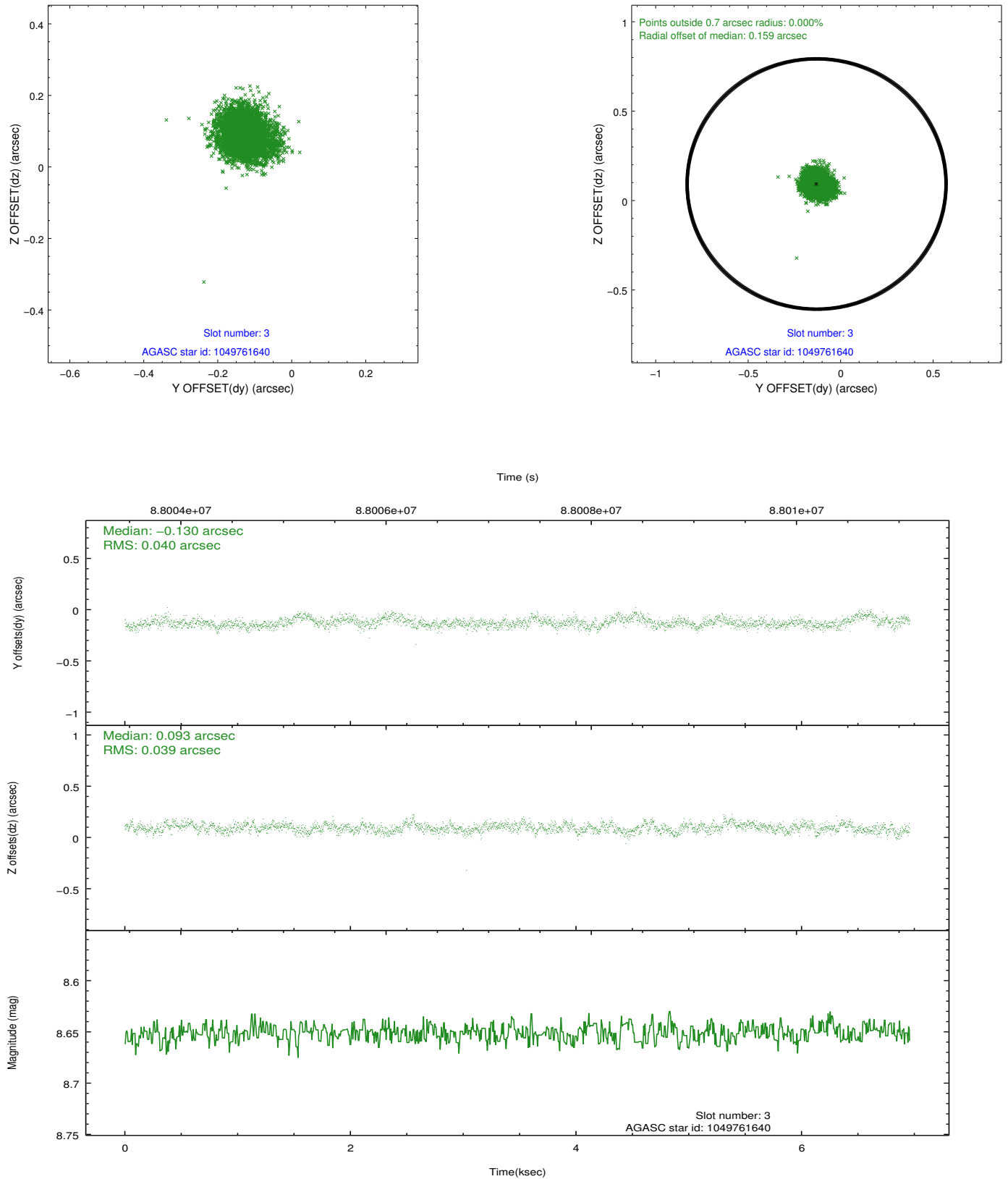


### Slot Statistics

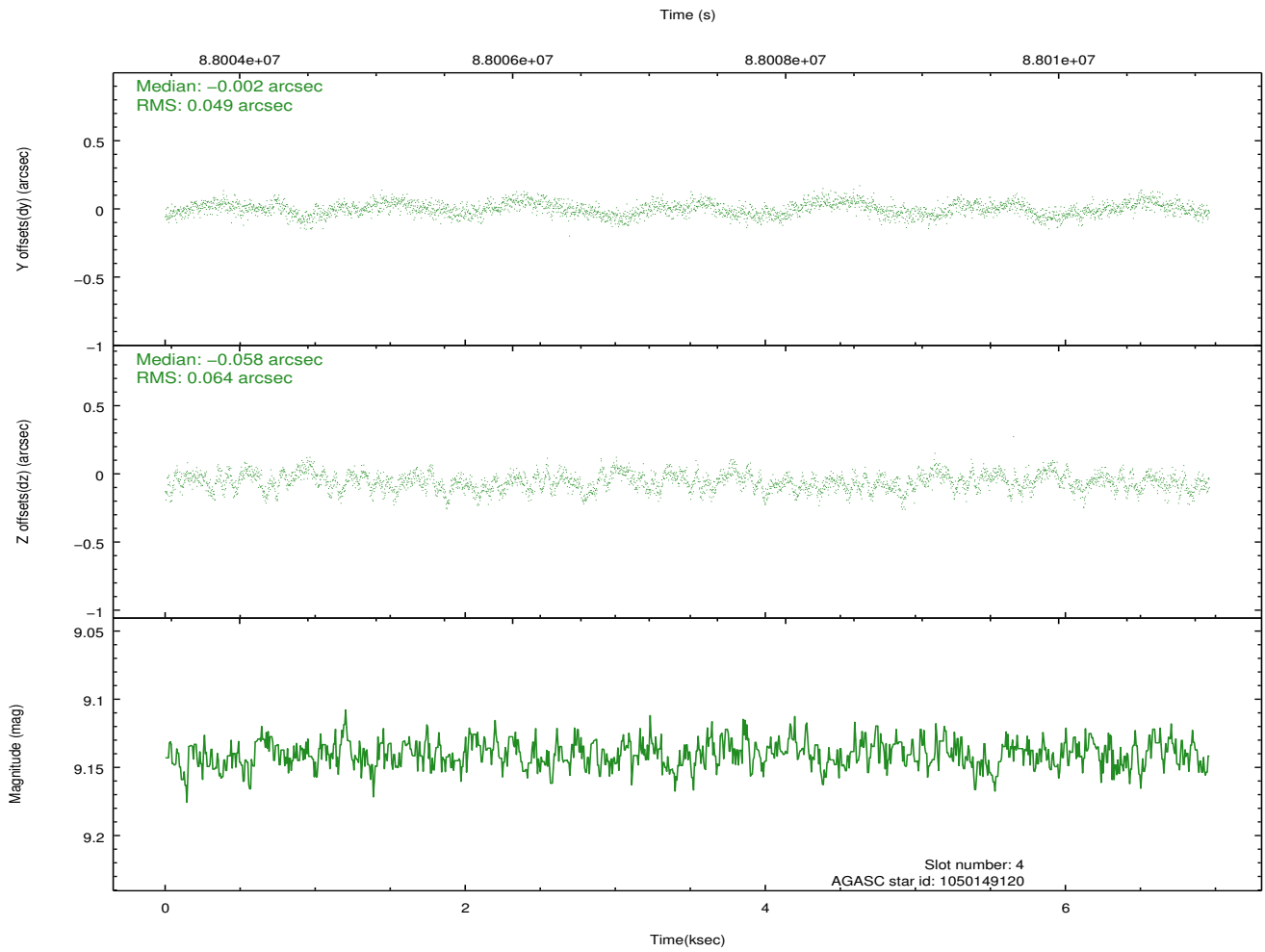
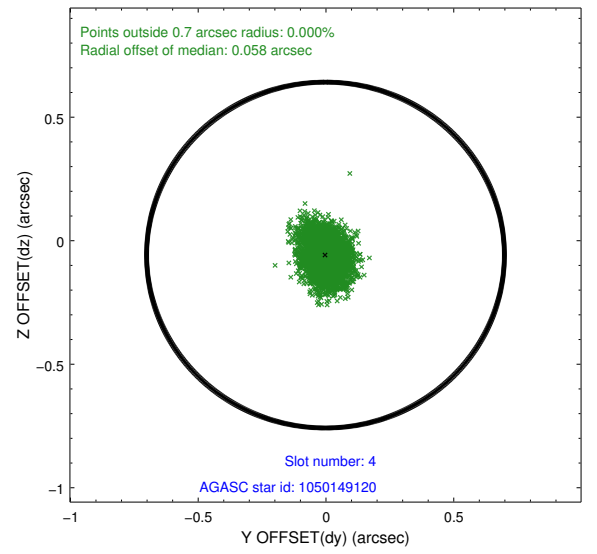
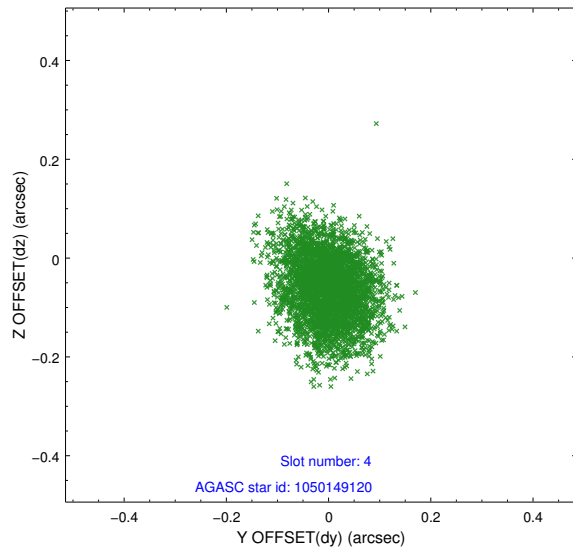
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-S-3	7.36	1695	-0.075	-0.030	0.007	0.012	0.000000	0.000000	58.53	-1855.54
1	FID	ACIS-S-4	7.21	1695	0.010	0.054	0.006	0.011	0.000000	0.000000	2158.77	181.17
2	FID	ACIS-S-5	7.24	1695	0.037	-0.015	0.006	0.010	0.000000	0.000000	-1806.35	175.76
3	GUIDE	1049761640	8.65	3391	-0.130	0.093	0.060	0.096	349.142415	-42.207499	-1264.68	-238.62
4	GUIDE	1050149120	9.14	3390	-0.002	-0.058	0.086	0.141	348.946168	-42.587694	-812.00	-1631.84
5	GUIDE	1050158072	9.11	3391	-0.071	-0.055	0.106	0.165	348.738453	-42.733577	-908.61	-2386.48
6	GUIDE	1050149848	10.20	3388	0.029	-0.123	0.173	0.274	349.007658	-42.828628	-140.32	-2205.11
7	GUIDE	1051067360	10.07	3387	0.168	0.150	0.121	0.196	350.420093	-42.504159	2063.13	1034.05

## 2.4 Star Slots

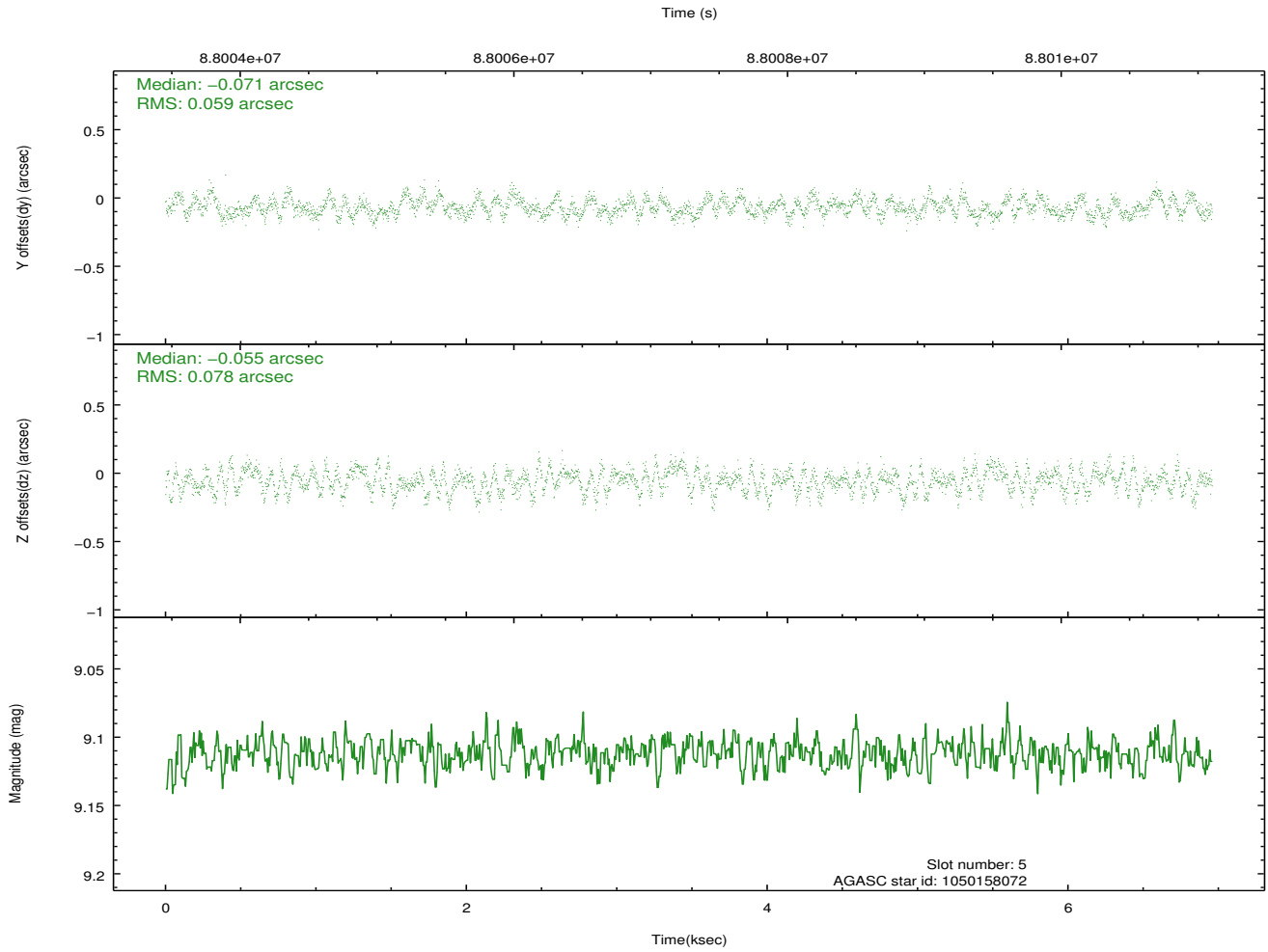
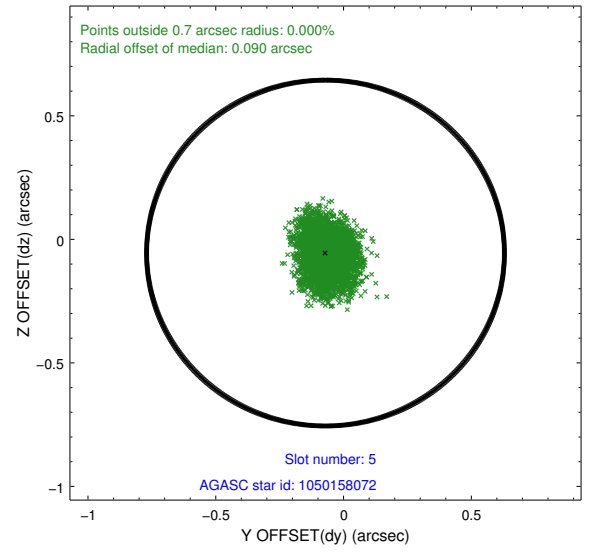
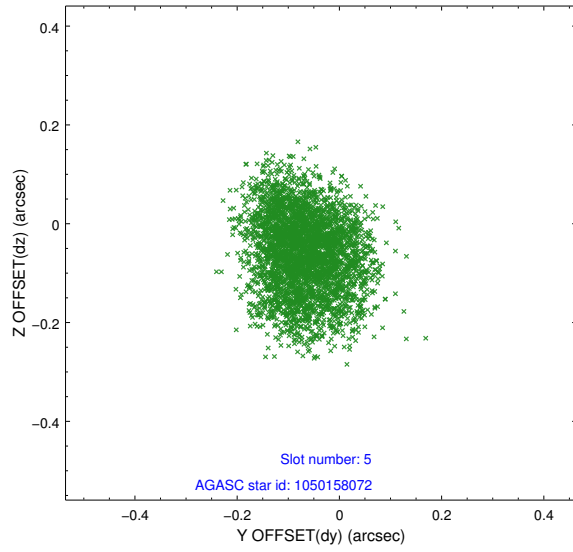
### 2.4.1 Slot 3



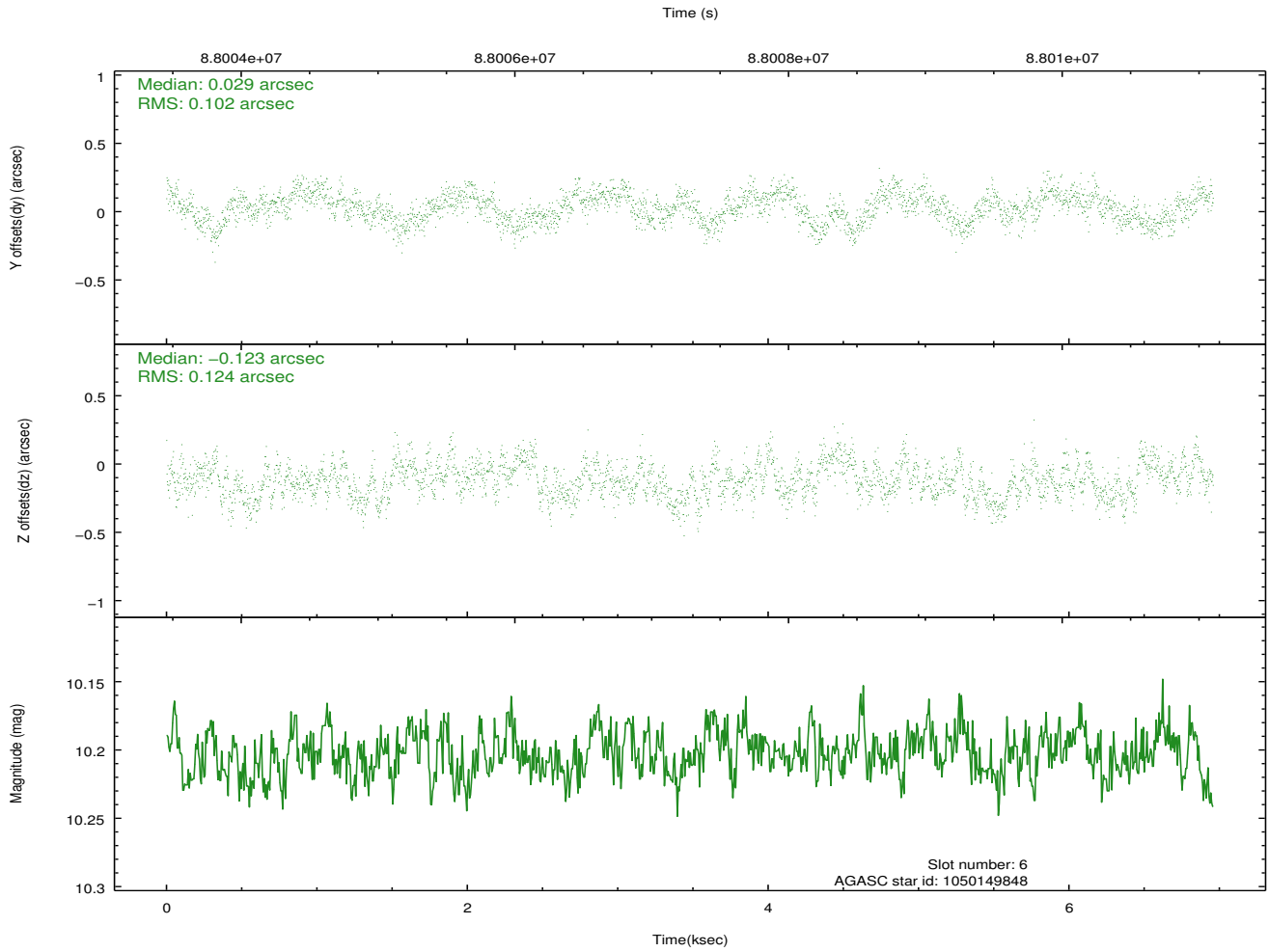
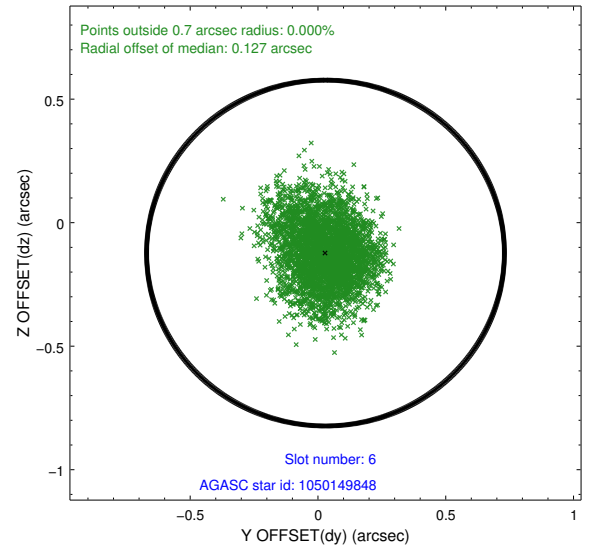
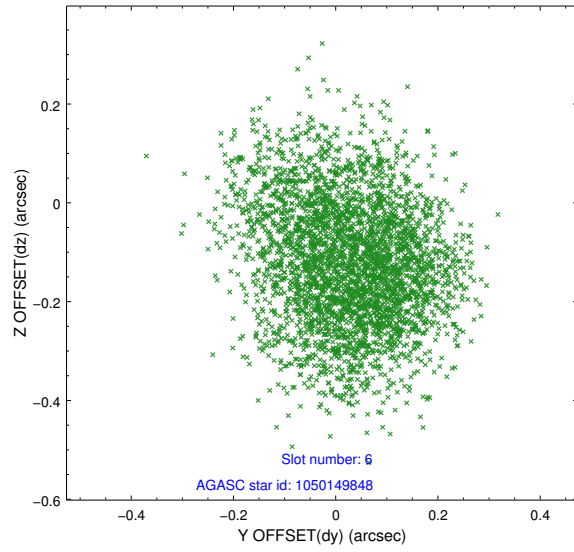
## 2.4.2 Slot 4



### 2.4.3 Slot 5

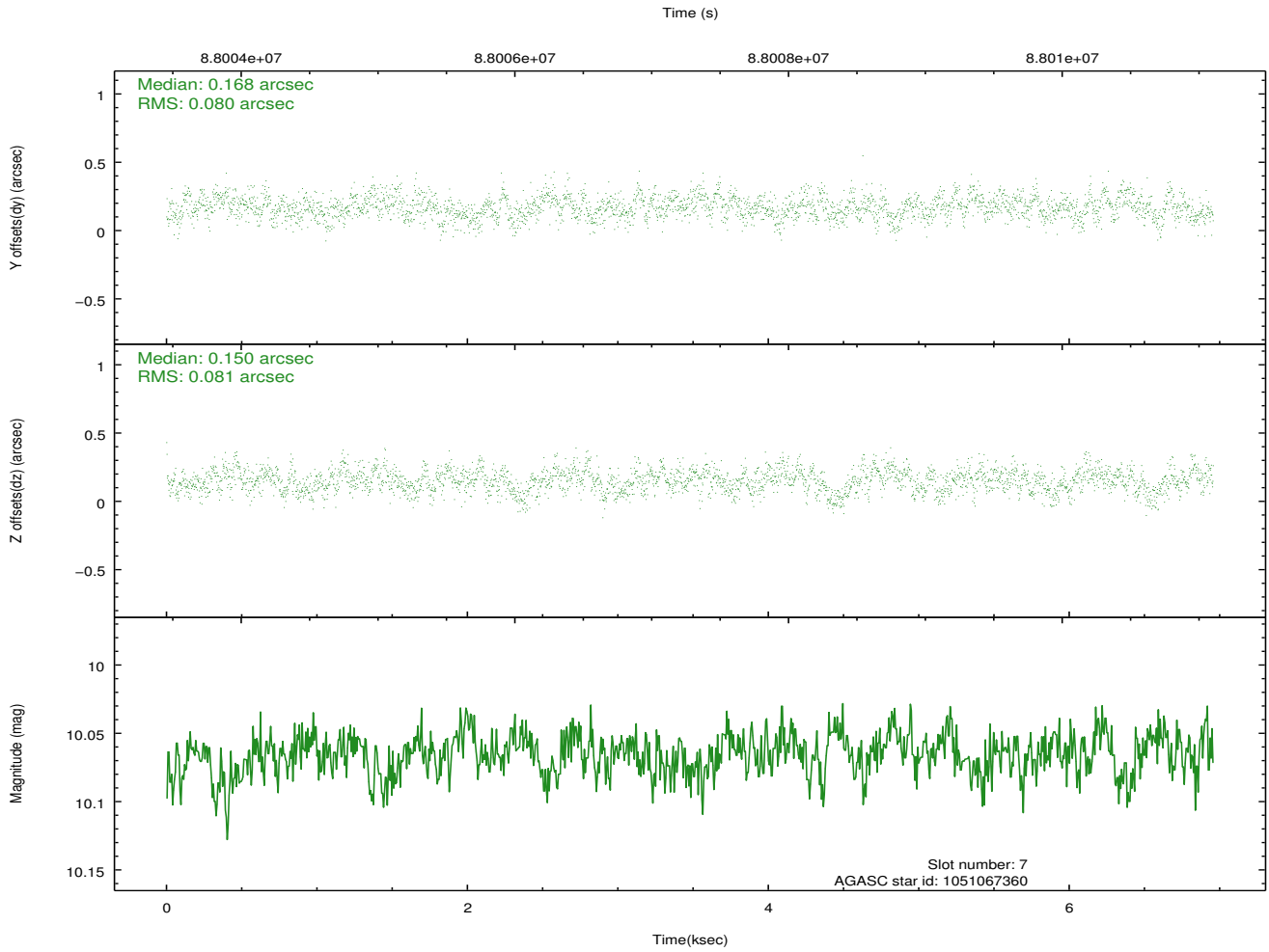
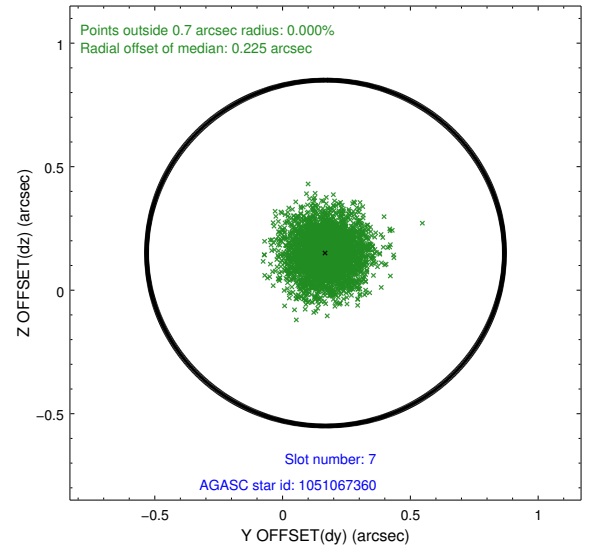
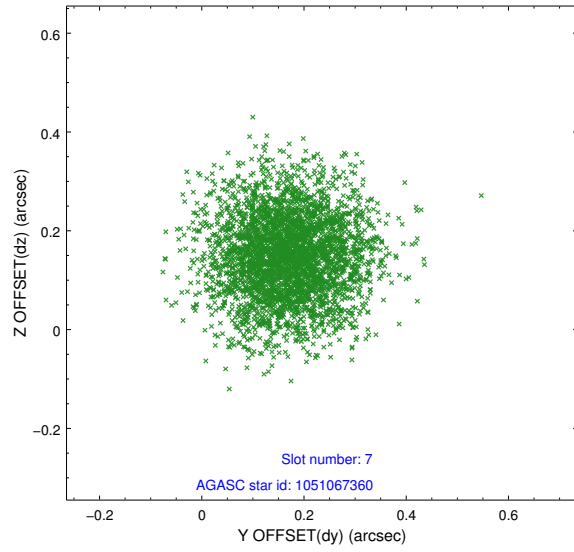


## 2.4.4 Slot 6



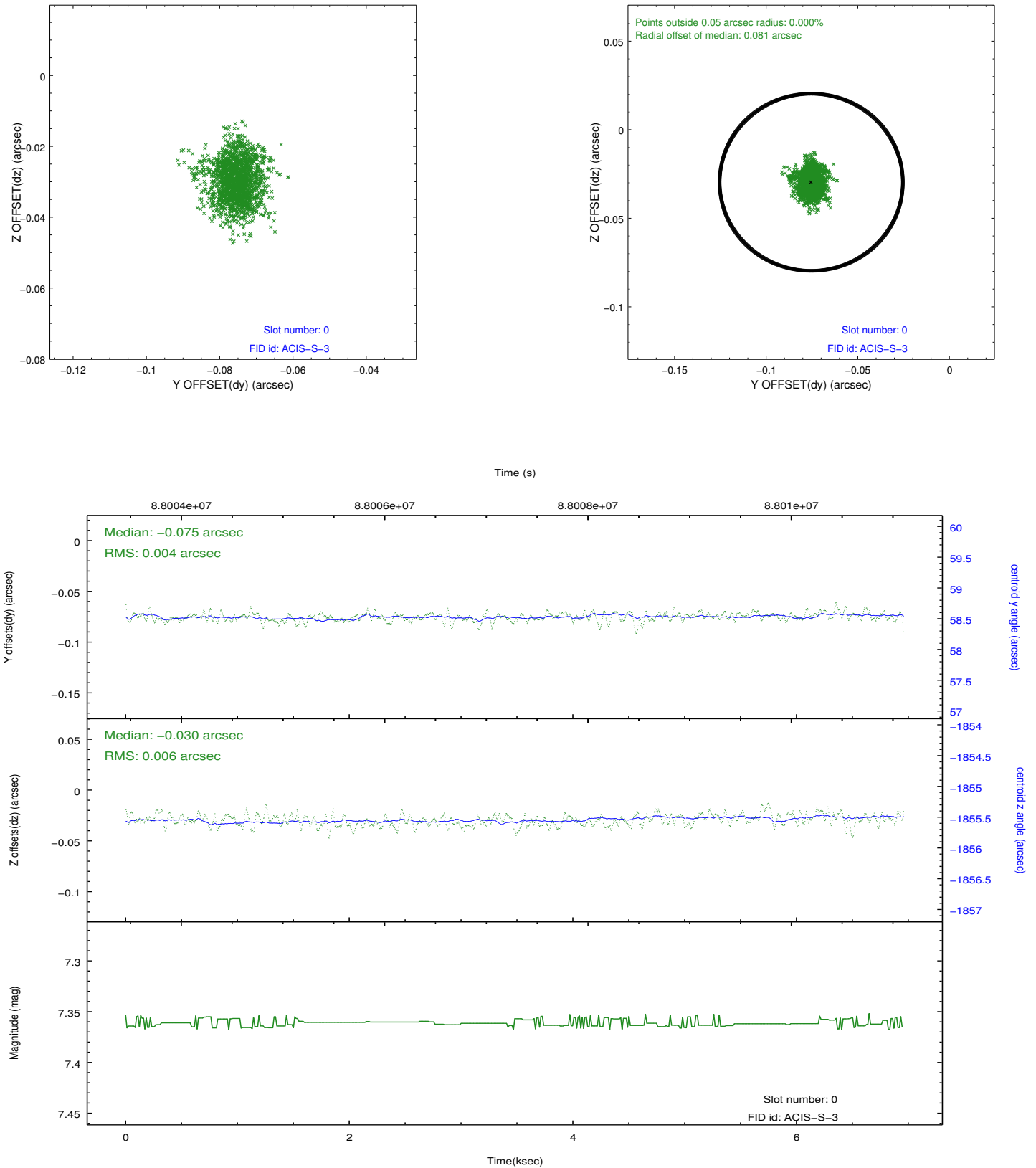


## 2.4.5 Slot 7

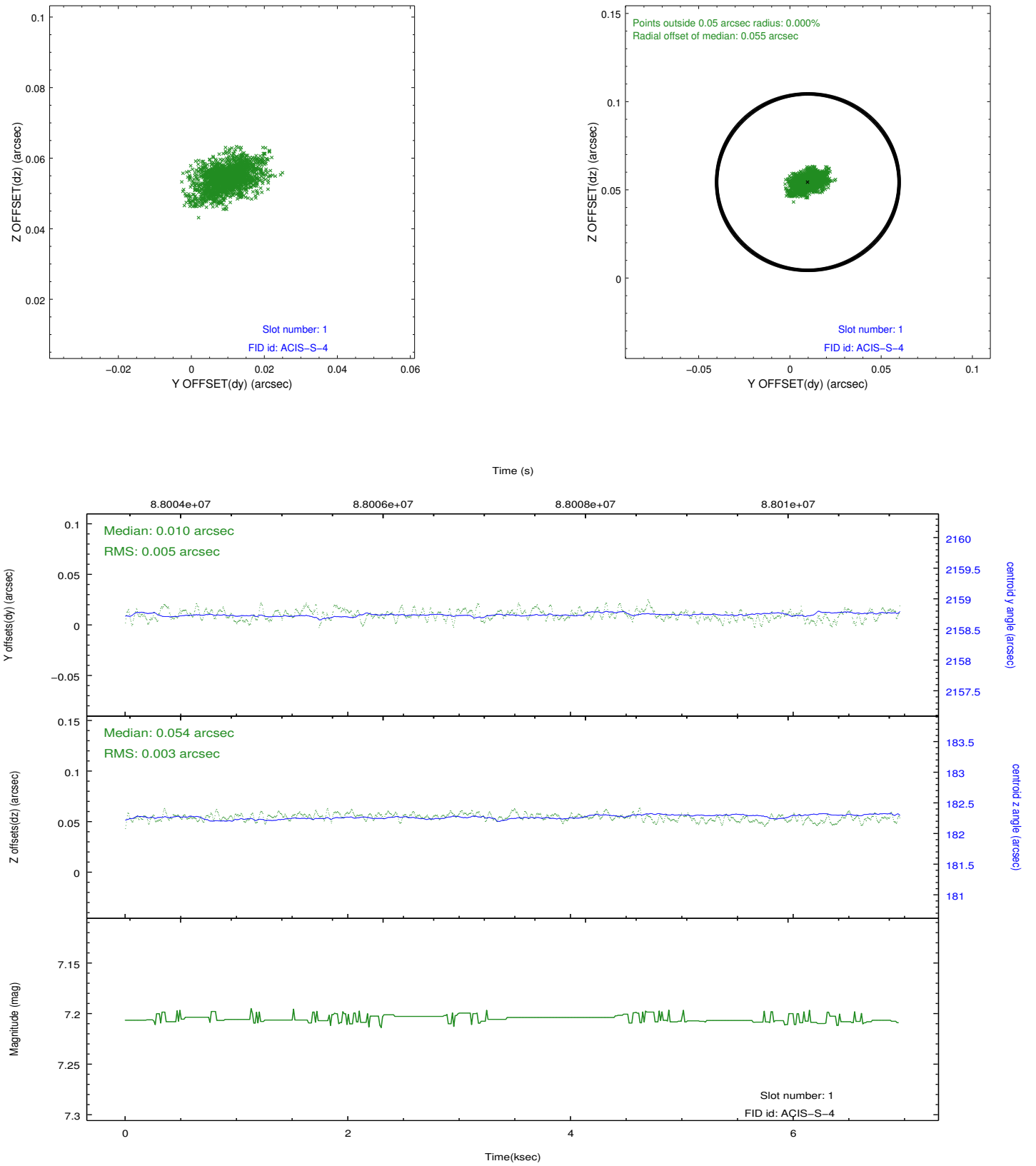


## 2.5 FID Slots

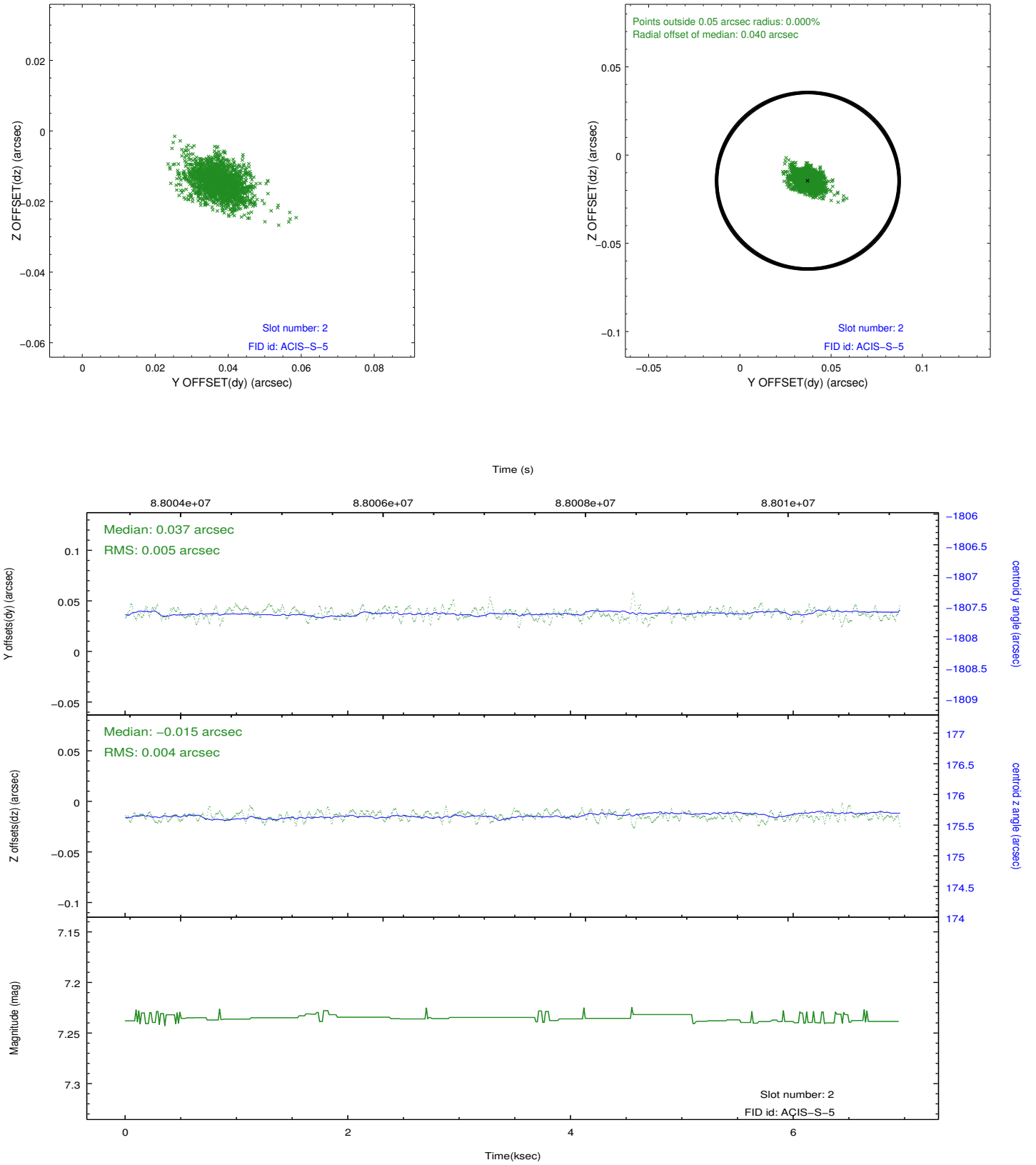
### 2.5.1 Slot 0



## 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)	2012.09.09
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	5.945

### A.2 Comments

Roll preference met.