

# V&V Reference Report

## L2 ASCDS Version : 8.4.5

Observation 5274 - L2 Version 3  
Chandra X-Ray Center

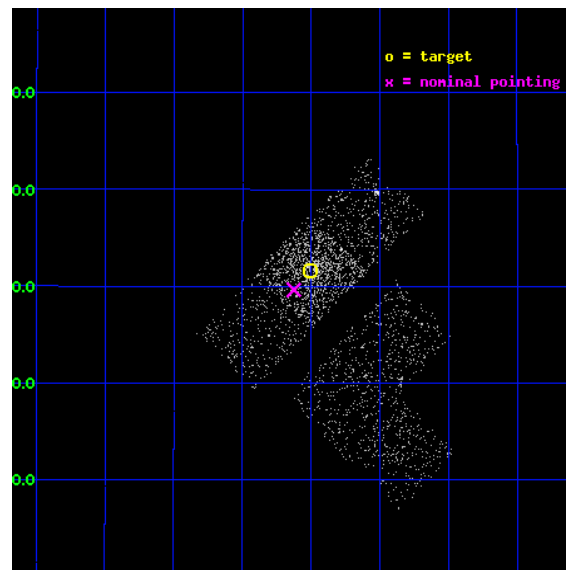
L2 Processing Date : Nov 8 2012

## 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

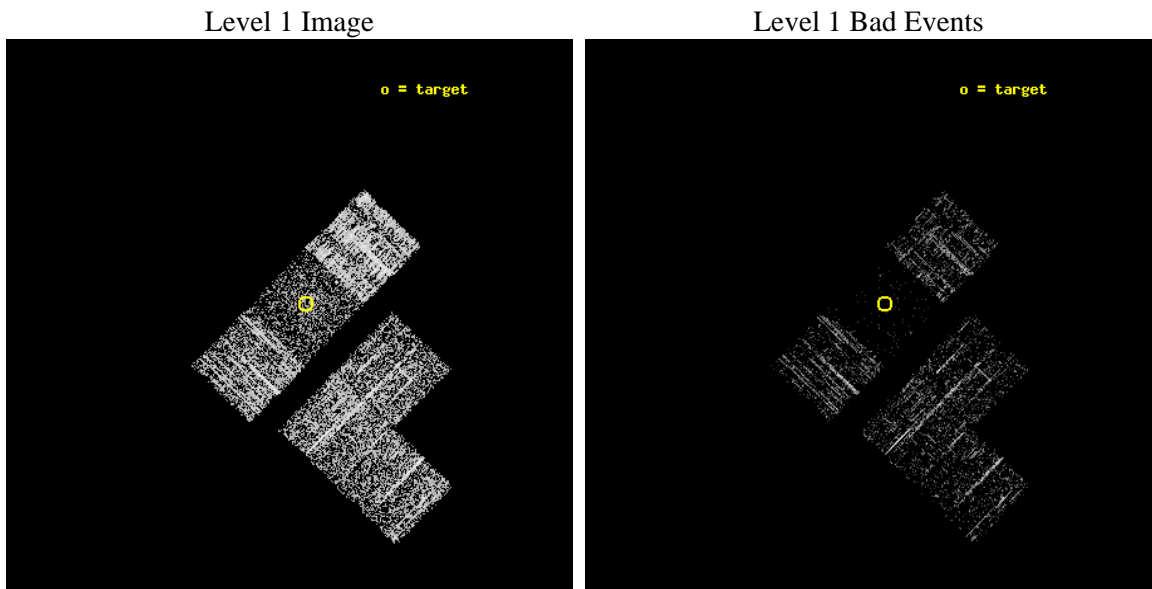
seq_num	100051	Sequence number
obs_id	5274	Observation id
title	High Resolution Imaging of the Source of Comet Encke's X-Rays Over One Nuclear Rotation	Proposal title
observer	Dr. Carey Lisse	Principal investigator
object	2P/Encke (2003)	Source name
dtcycle	0	&#160
cycle	P	events from which exps? Prim/Second/Both
ra_targ	287.37673	Observer's specified target RA [deg]
dec_targ	16.52592	Observer's specified target Dec [deg]
ra_nom	287.40651317086	Nominal RA [deg]
dec_nom	16.493892263154	Nominal Dec [deg]
roll_nom	314.1481039911	Nominal Roll [deg]
revision	3	Processing version of data
ontime	1475.1999945045	Sum of GTIs [s]
livetime	1456.5201239152	Livetime [s]
ontime0	1475.1999945045	Sum of GTIs [s]
ontime2	1475.1999945045	Sum of GTIs [s]
ontime3	1475.1999945045	Sum of GTIs [s]
ontime6	1475.1999945045	Sum of GTIs [s]
ontime7	1475.1999945045	Sum of GTIs [s]
ontime8	1475.1999945045	Sum of GTIs [s]
l2events	2899	Number of level 2 events



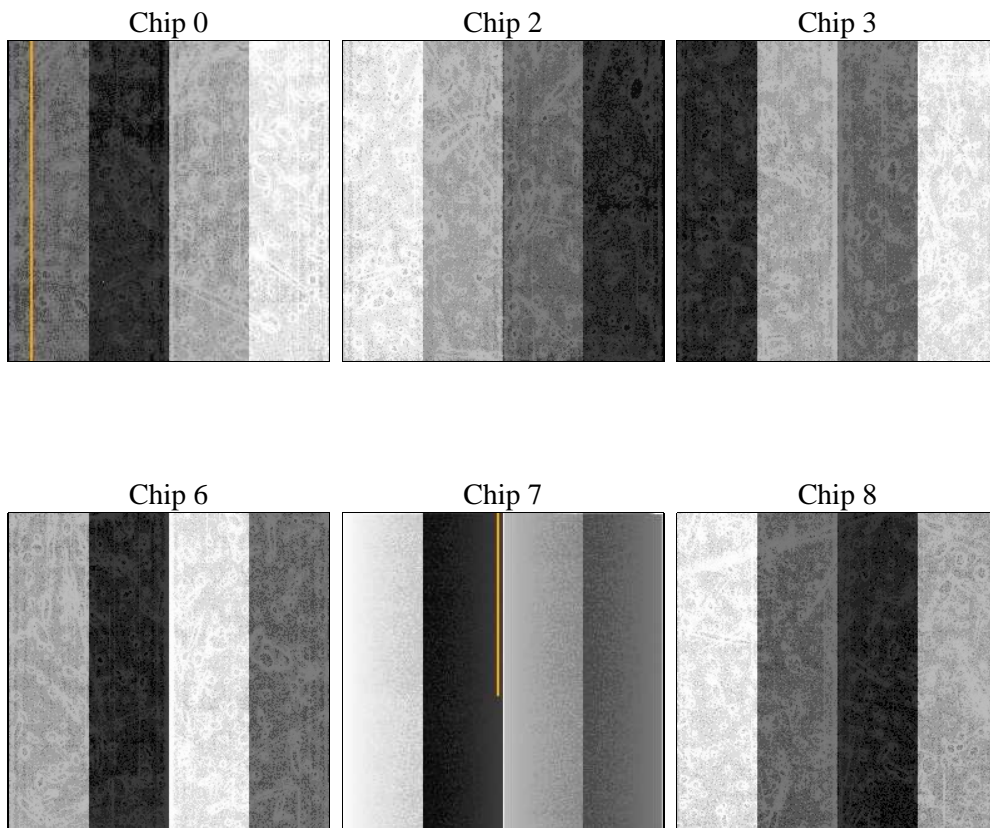
## 2 OBI

### 2.1 OBI

#### 2.1.1 Images



#### 2.1.2 Bias



### 2.1.3 Parameters

obi_num	1	Obi number	sched_exp_time	1290.000000	[s] Scheduled observation exposure time
ascdsver	8.4.5	Processing system revision	ontime	1475.1999945045	Sum of GTIs [s]
caldsver	4.5.2	&#160	ontime0	1475.1999945045	Sum of GTIs [s]
date	2012-11-08T03:02:53	Date and time of file creation	ontime2	1475.1999945045	Sum of GTIs [s]
revision	3	Processing version of data	ontime3	1475.1999945045	Sum of GTIs [s]
			ontime6	1475.1999945045	Sum of GTIs [s]
			ontime7	1475.1999945045	Sum of GTIs [s]
			ontime8	1475.1999945045	Sum of GTIs [s]
			l1events	38366	Number of level 1 events

### 2.1.4 Events

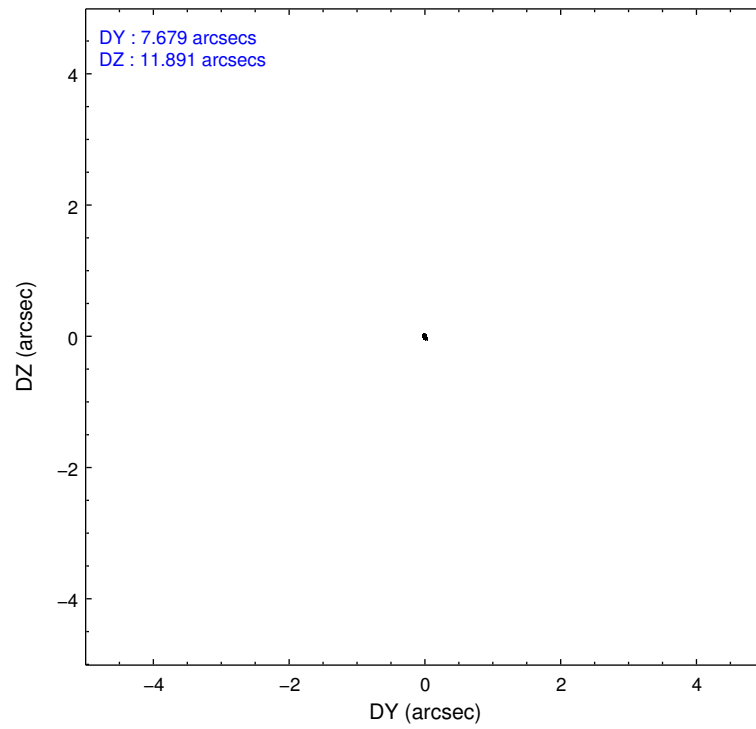
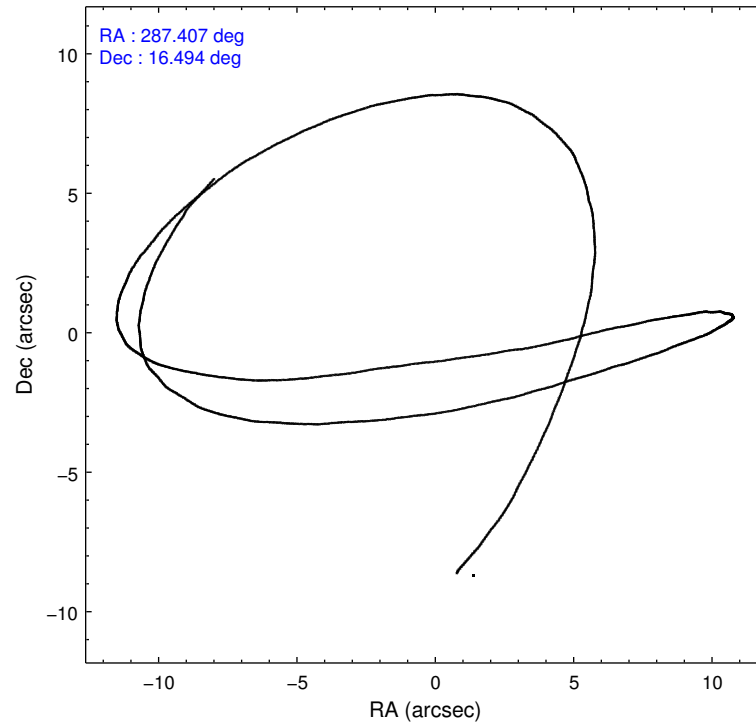
	ccd 0	ccd 2	ccd 3	ccd 6	ccd 7	ccd 8
level 1 events	5473	6715	5664	6803	2343	11368
rejected events	4996	6176	5288	6333	969	7018
rejected %	91%	91%	93%	93%	41%	61%

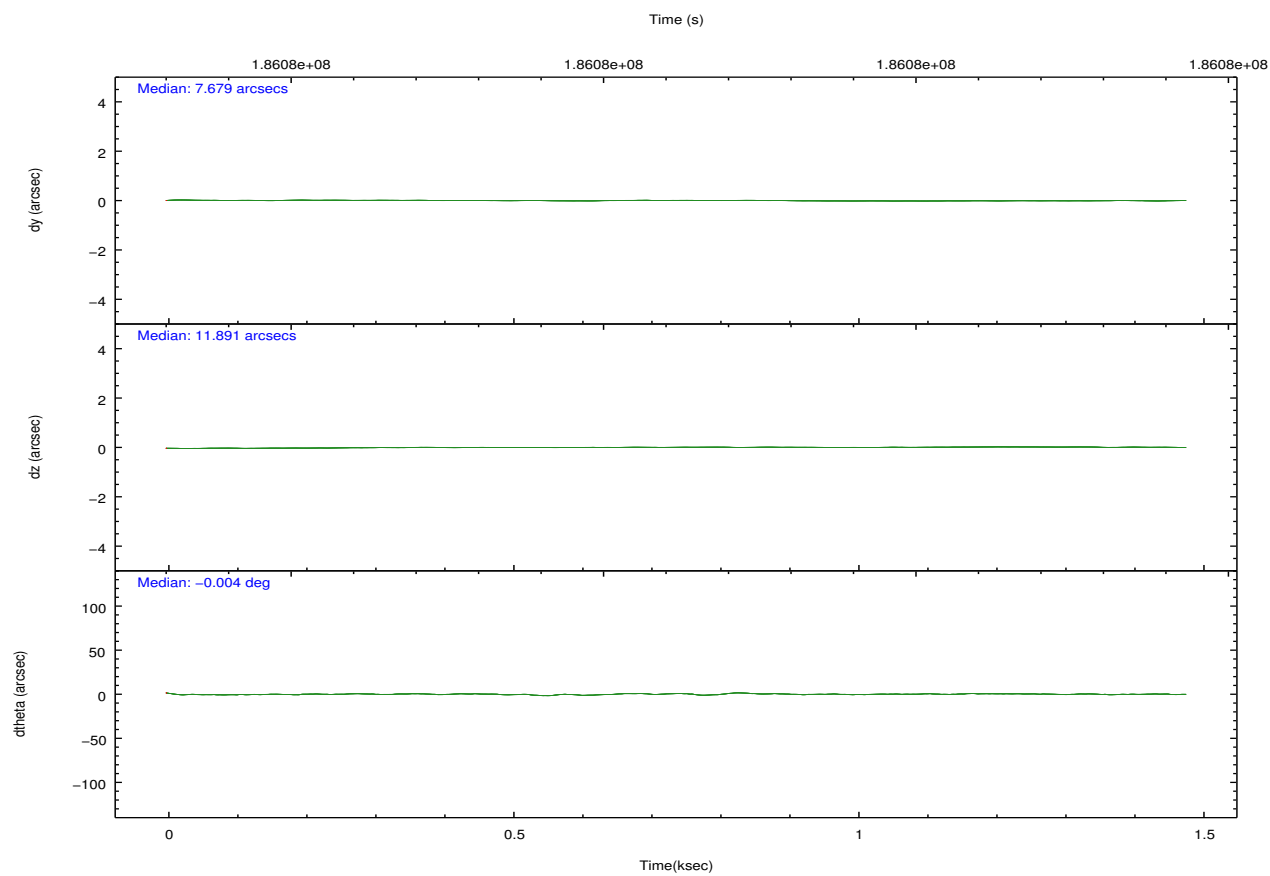
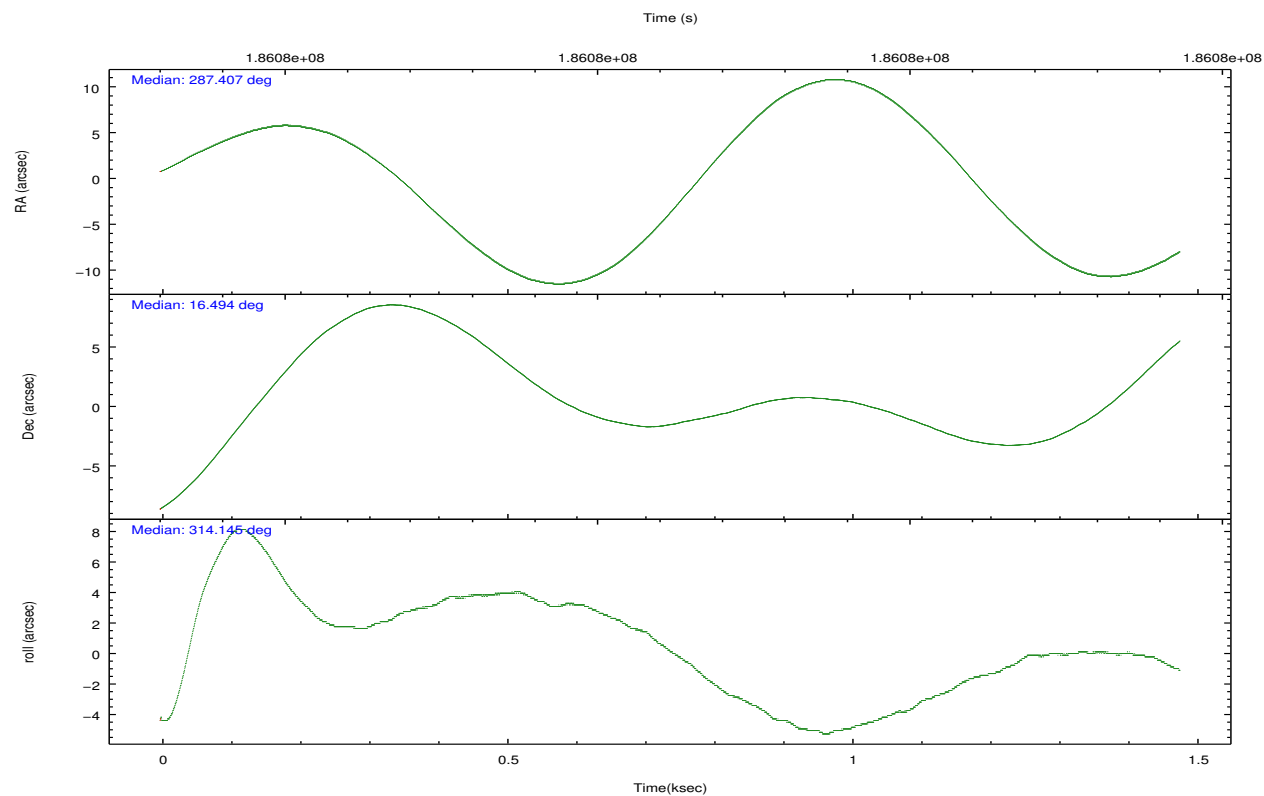
	ccd 0	ccd 2	ccd 3	ccd 6	ccd 7	ccd 8
grade 0 events	238	324	194	274	434	1614
	4%	4%	3%	4%	18%	14%
grade 1 events	3	2	2	2	7	14
	0%	0%	0%	0%	0%	0%
grade 2 events	164	151	99	150	440	855
	2%	2%	1%	2%	18%	7%
grade 3 events	53	45	53	52	209	915
	0%	0%	0%	0%	8%	8%
grade 4 events	41	64	43	50	190	844
	0%	0%	0%	0%	8%	7%
grade 5 events	62	33	44	62	163	173
	1%	0%	0%	0%	6%	1%
grade 6 events	61	58	64	53	437	1208
	1%	0%	1%	0%	18%	10%
grade 7 events	4851	6038	5165	6160	463	5745
	88%	89%	91%	90%	19%	50%

## 2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-023678	ACIS-023678	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	287.379103	287.4065131708621	Subarray requested	NONE	NONE
[deg] Pointing Dec	16.501010	16.49389226315362	Alternating exposures requested	N	N
[deg] Pointing Roll	313.999321	314.1481039910997	[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)	186075064.184000	186074687.85782			
Observation start date	2003-11-24T15:30:00	2003-11-24T15:24:47			
[s] Observation end time (MET)	186076354.184000	186076487.7579			
Observation end date	2003-11-24T15:51:30	2003-11-24T15:54:47			
Read mode	TIMED	TIMED			

## 2.3 Aspect





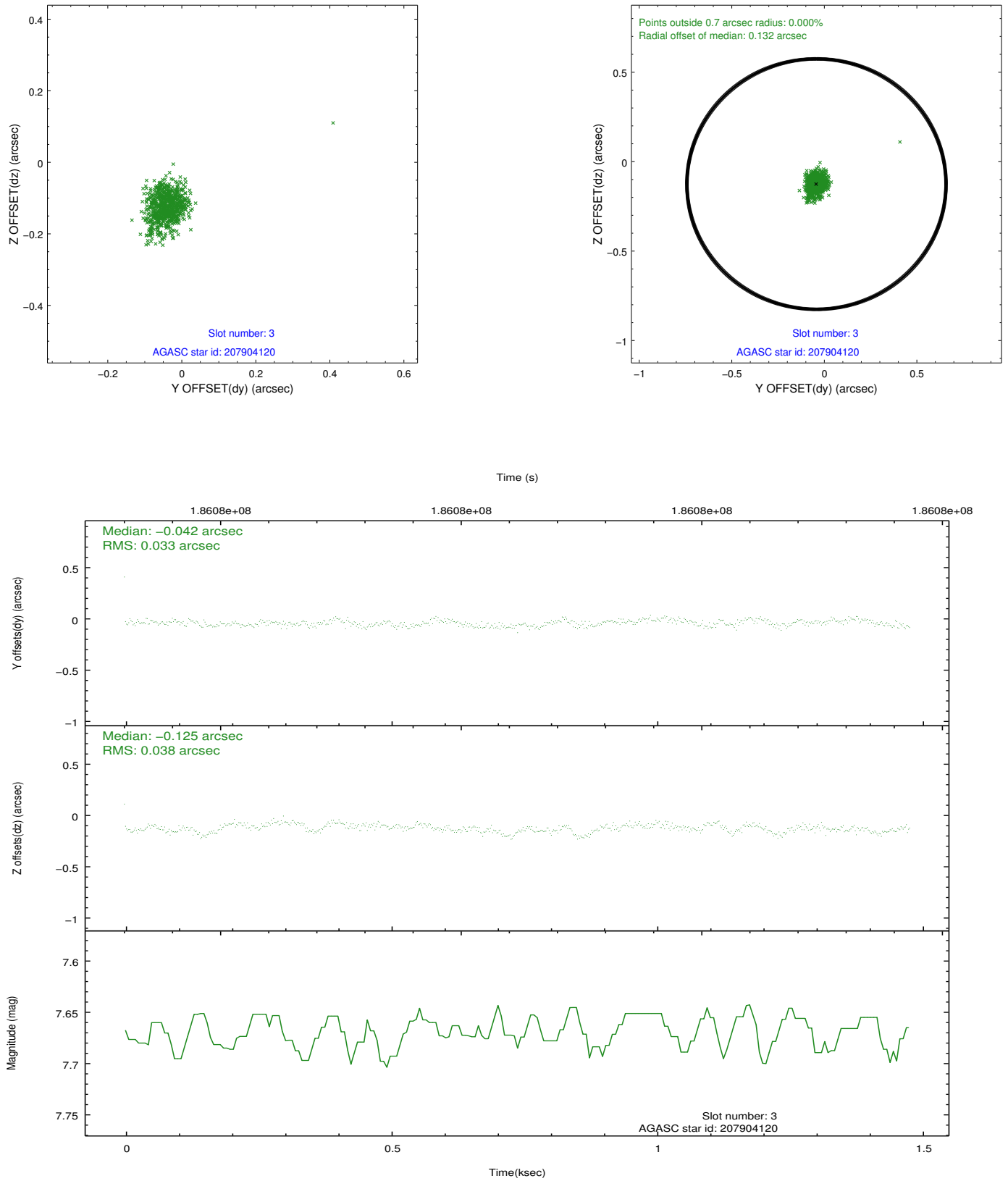
### Slot Statistics

slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-S-4	7.19	361	0.054	-0.005	0.006	0.009	0.000000	0.000000	2152.95	175.46
1	FID	ACIS-S-5	7.23	361	-0.043	0.007	0.005	0.010	0.000000	0.000000	-1807.57	169.44
2	FID	ACIS-S-6	7.34	361	-0.041	0.011	0.007	0.011	0.000000	0.000000	396.28	813.16
3	GUIDE	207904120	7.67	722	-0.042	-0.125	0.049	0.081	286.904195	16.289988	-594.61	-1706.69
4	GUIDE	207916440	6.85	722	-0.194	-0.122	0.076	0.105	287.167522	16.851310	-1414.45	349.27
5	GUIDE	208416976	8.34	722	-0.070	0.038	0.052	0.084	287.326965	17.073967	-1610.30	1304.28
6	GUIDE	208421840	9.22	722	0.096	0.108	0.080	0.127	287.570311	16.918850	-626.85	1521.07
7	GUIDE	209596088	9.37	721	0.206	0.099	0.094	0.149	288.150718	16.305149	2354.99	1434.28

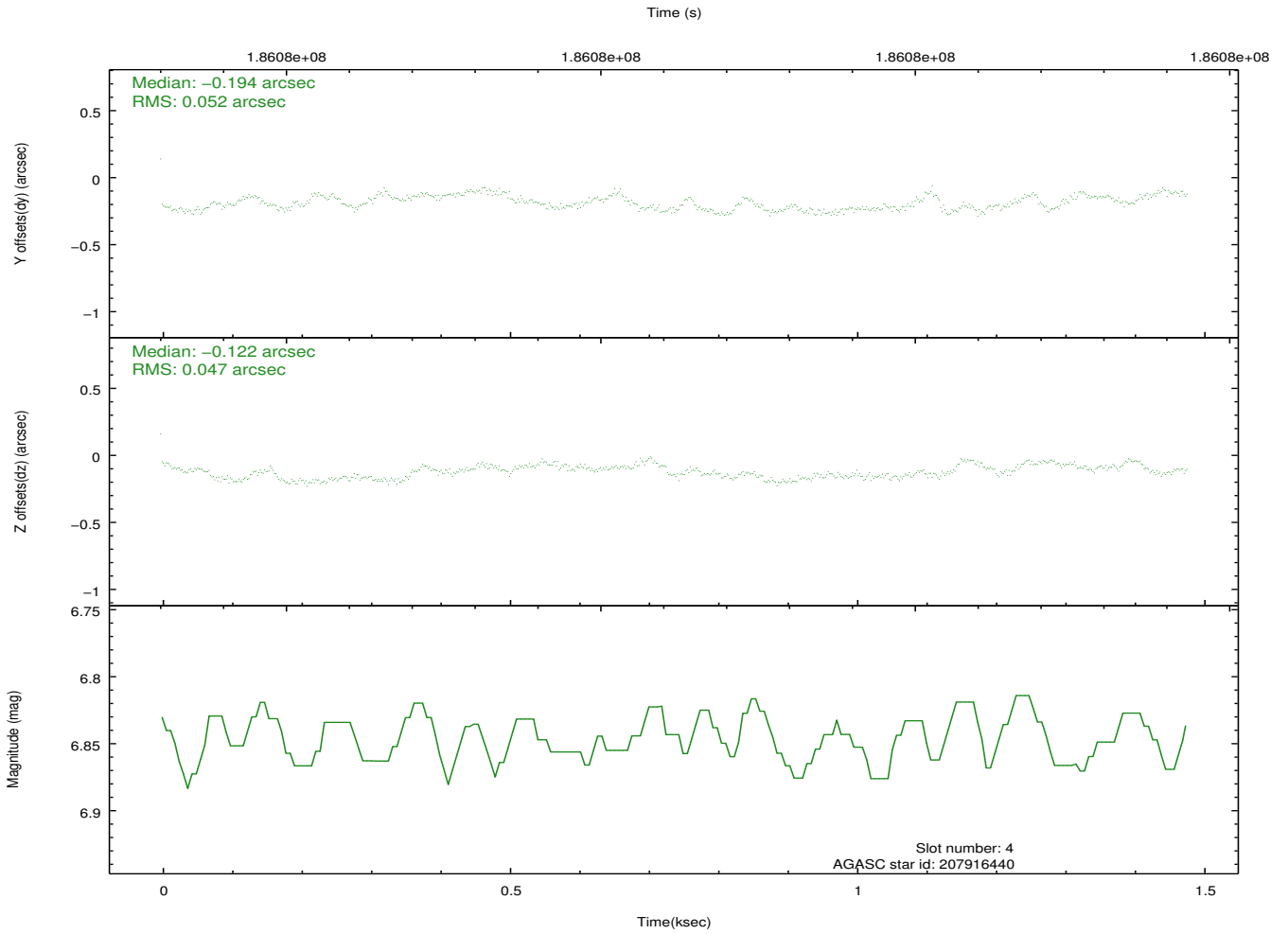
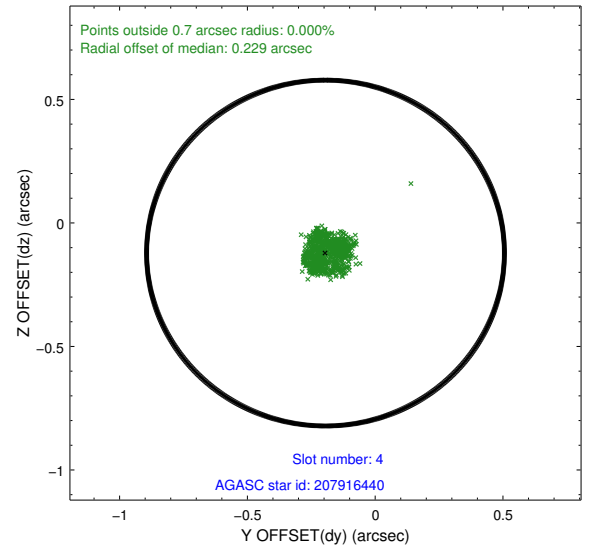
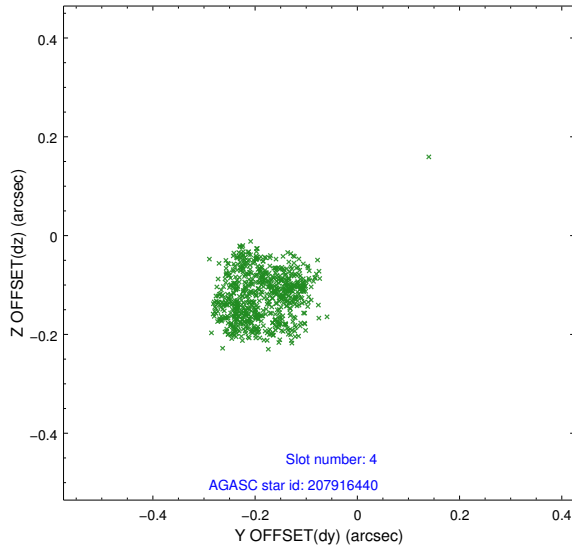


## 2.4 Star Slots

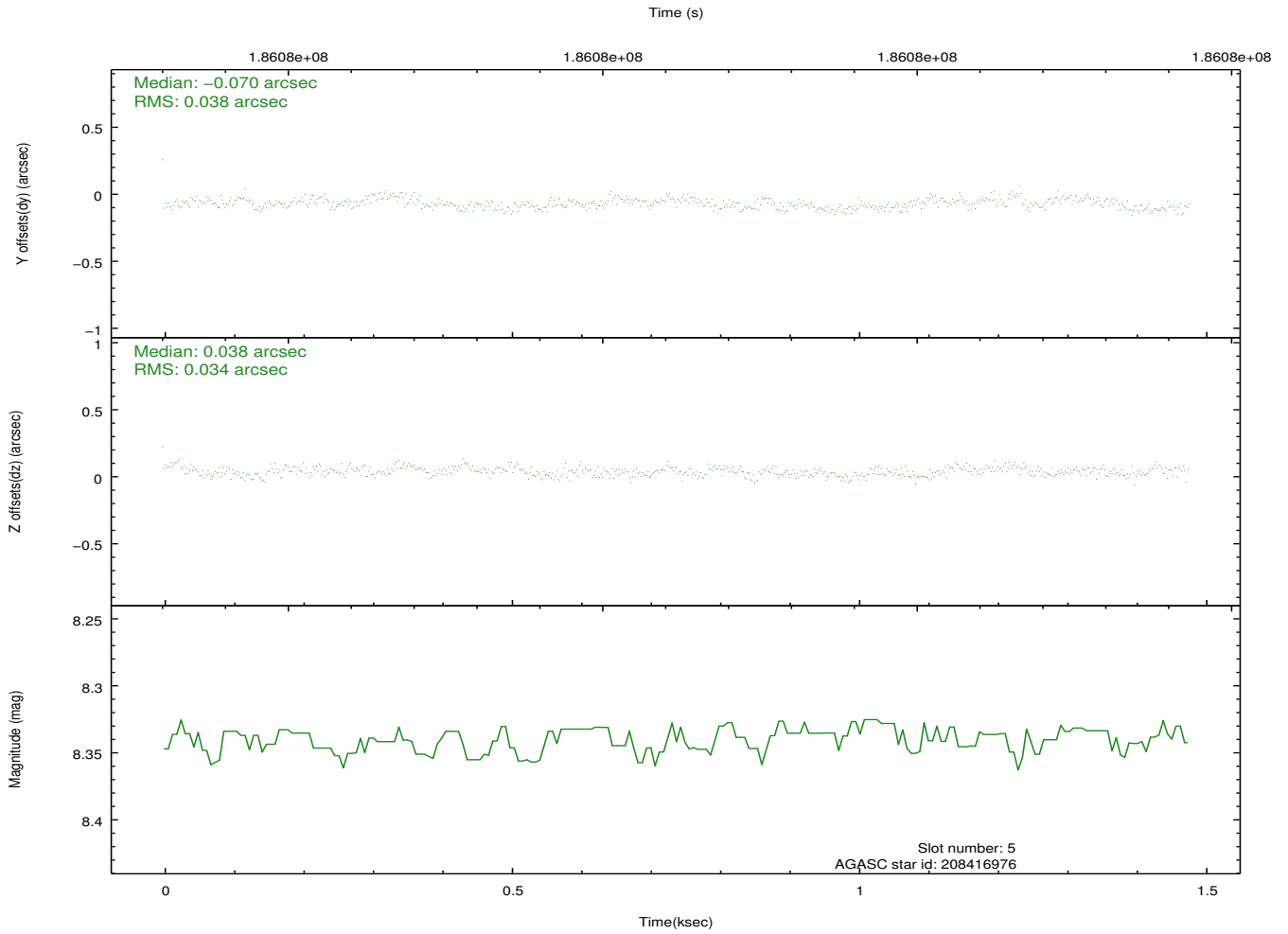
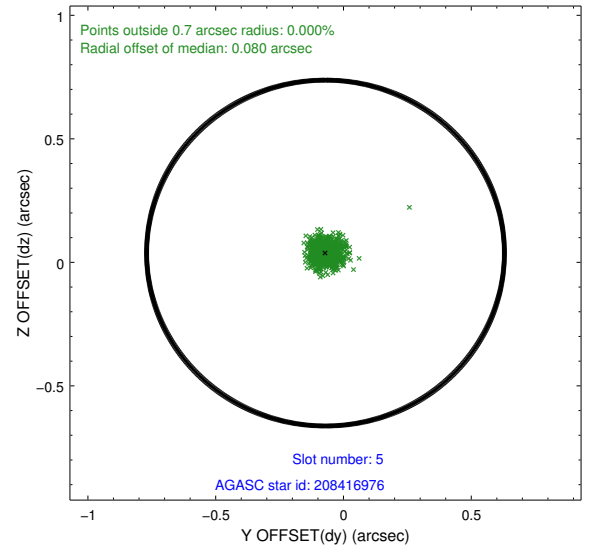
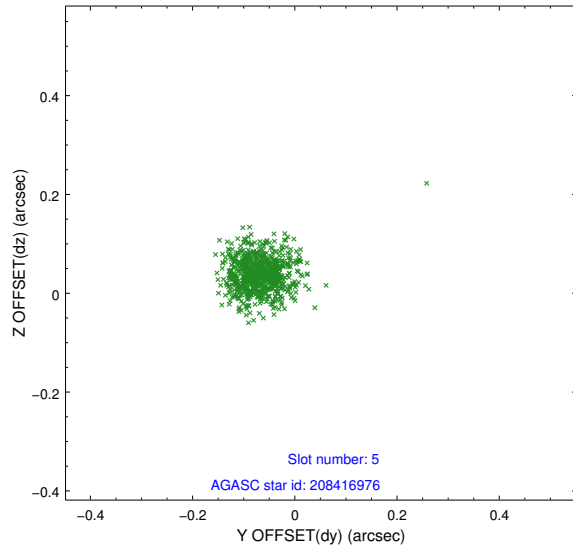
### 2.4.1 Slot 3



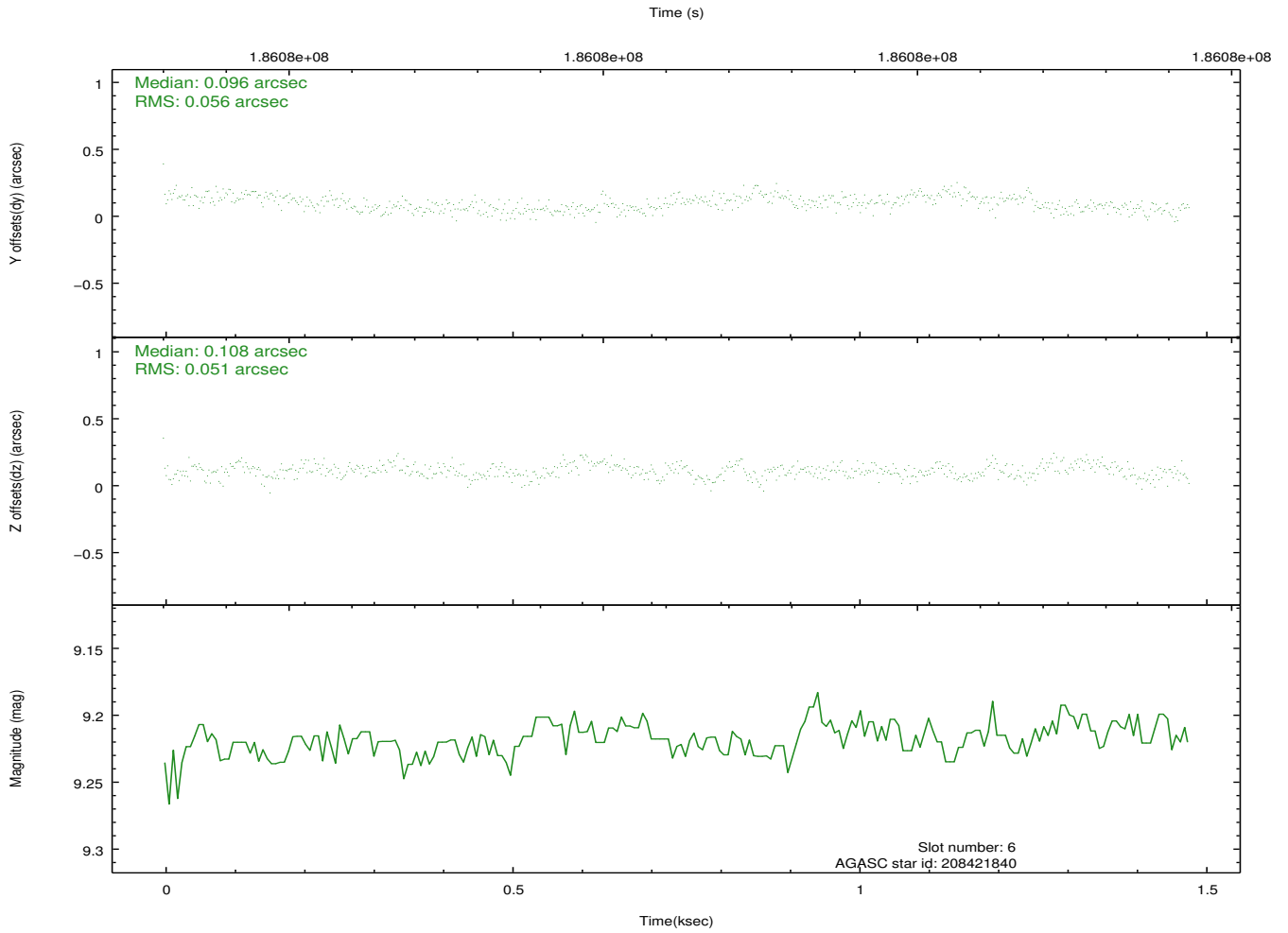
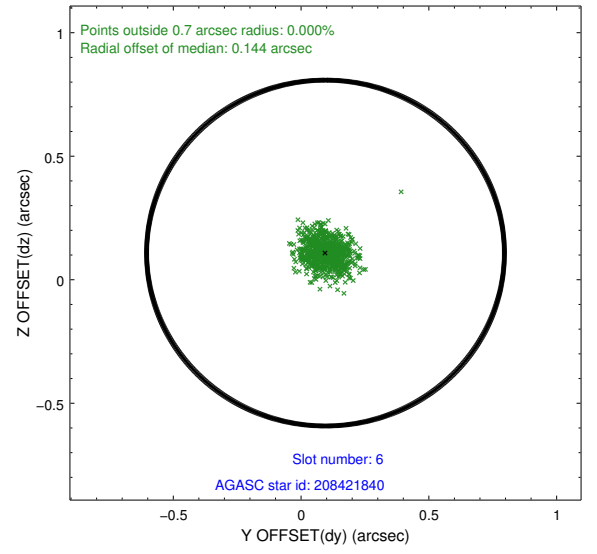
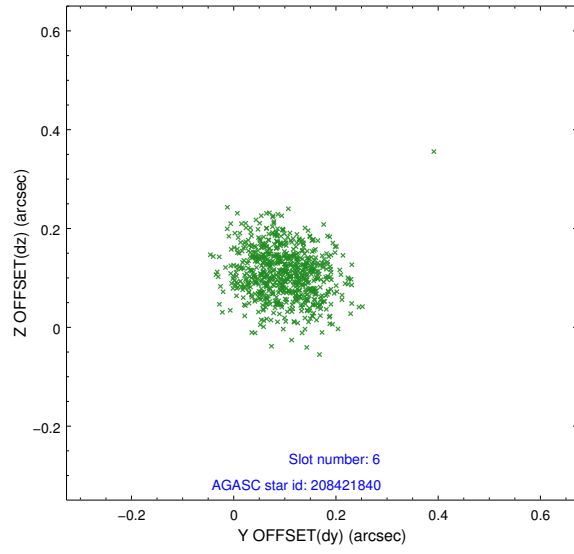
## 2.4.2 Slot 4



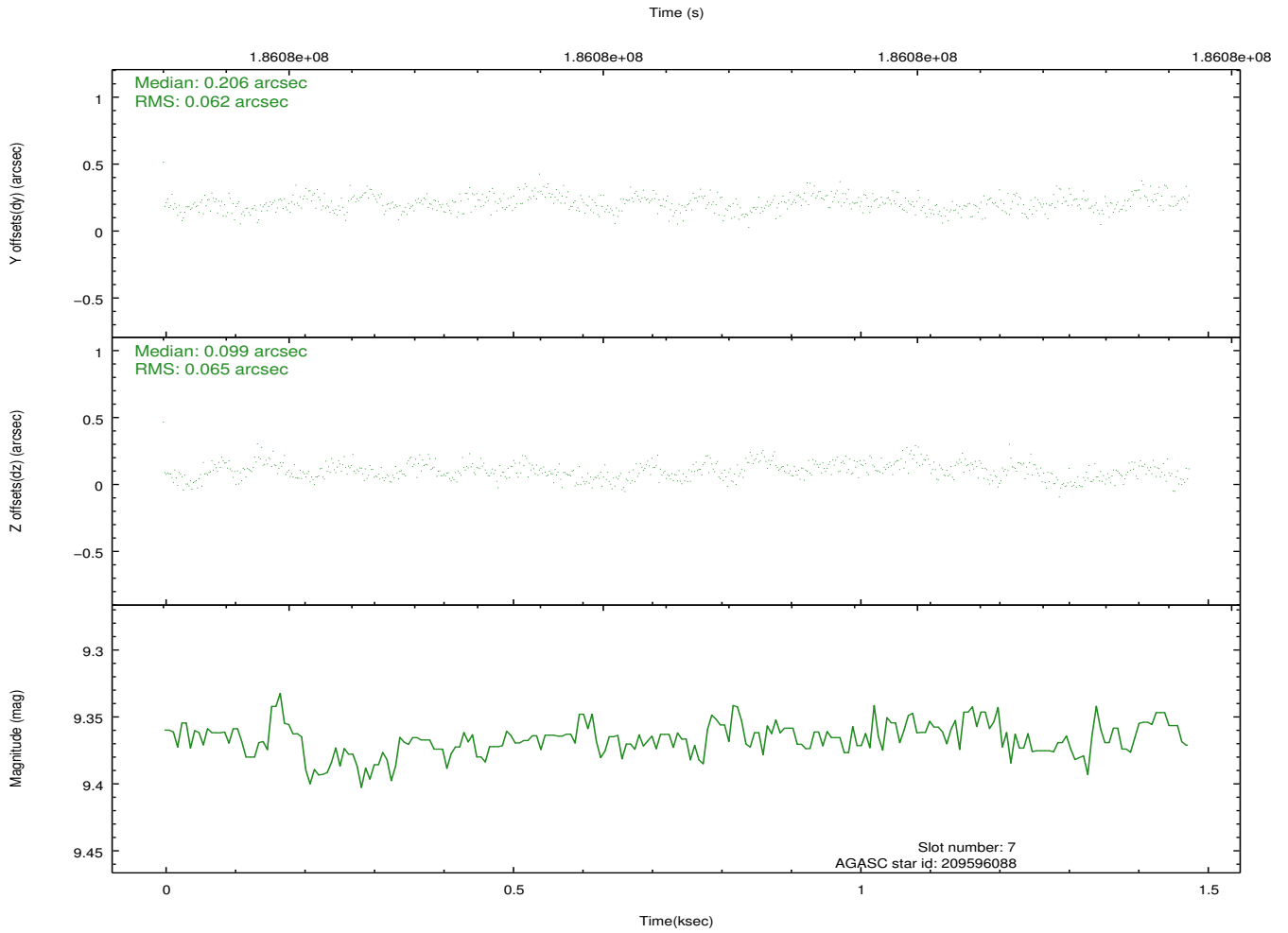
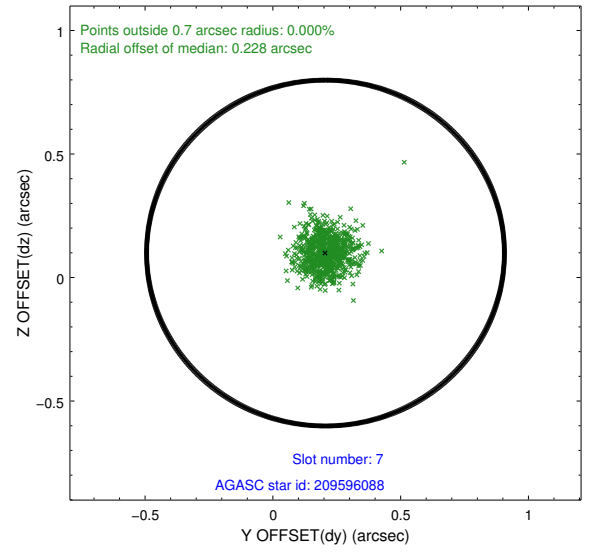
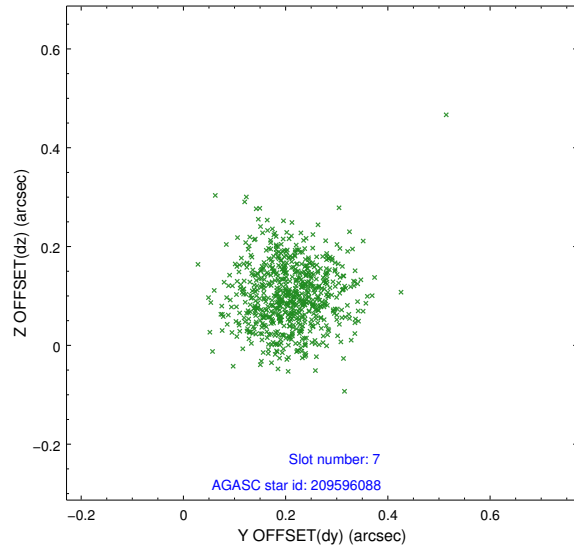
### 2.4.3 Slot 5



## 2.4.4 Slot 6

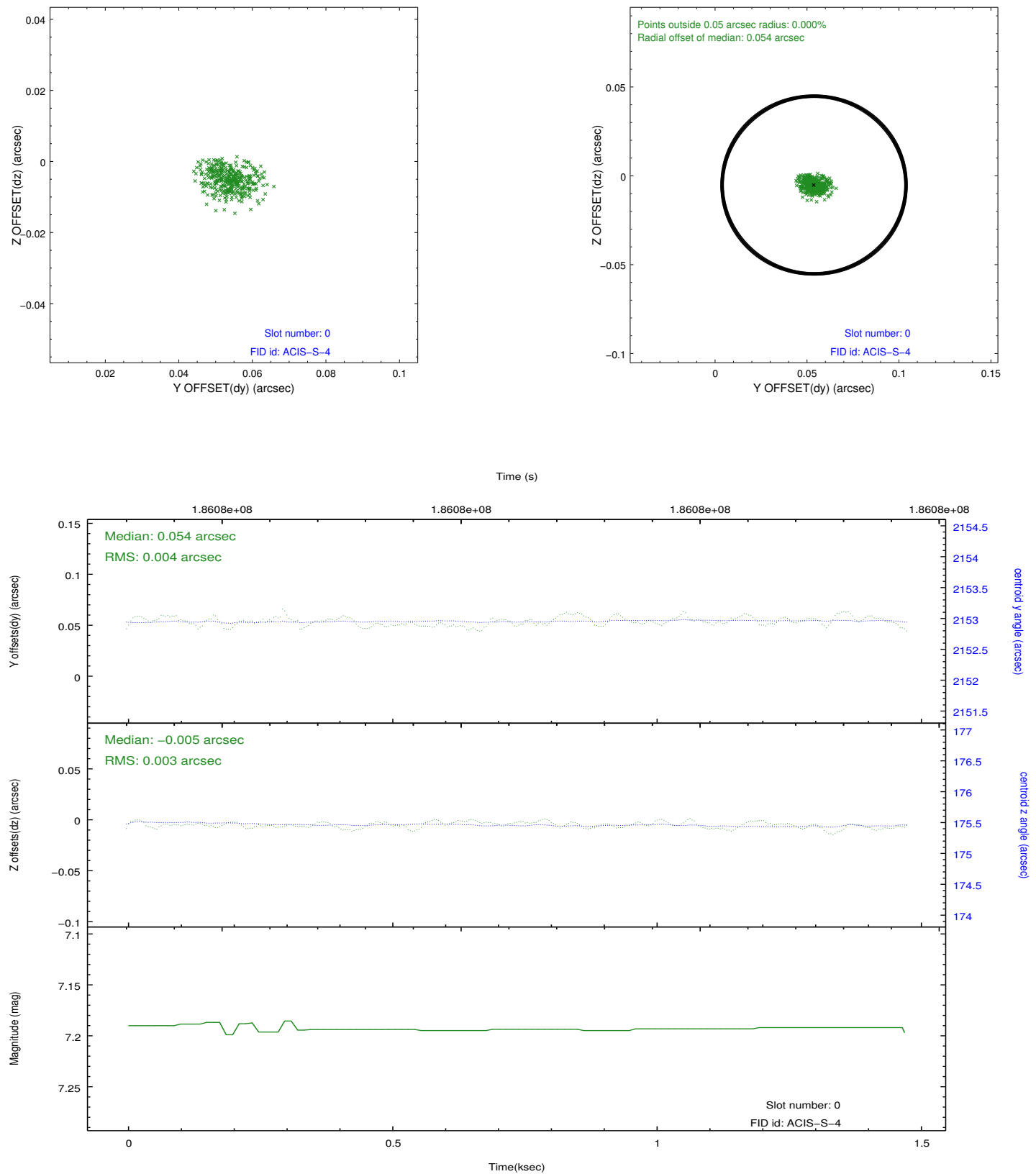


## 2.4.5 Slot 7

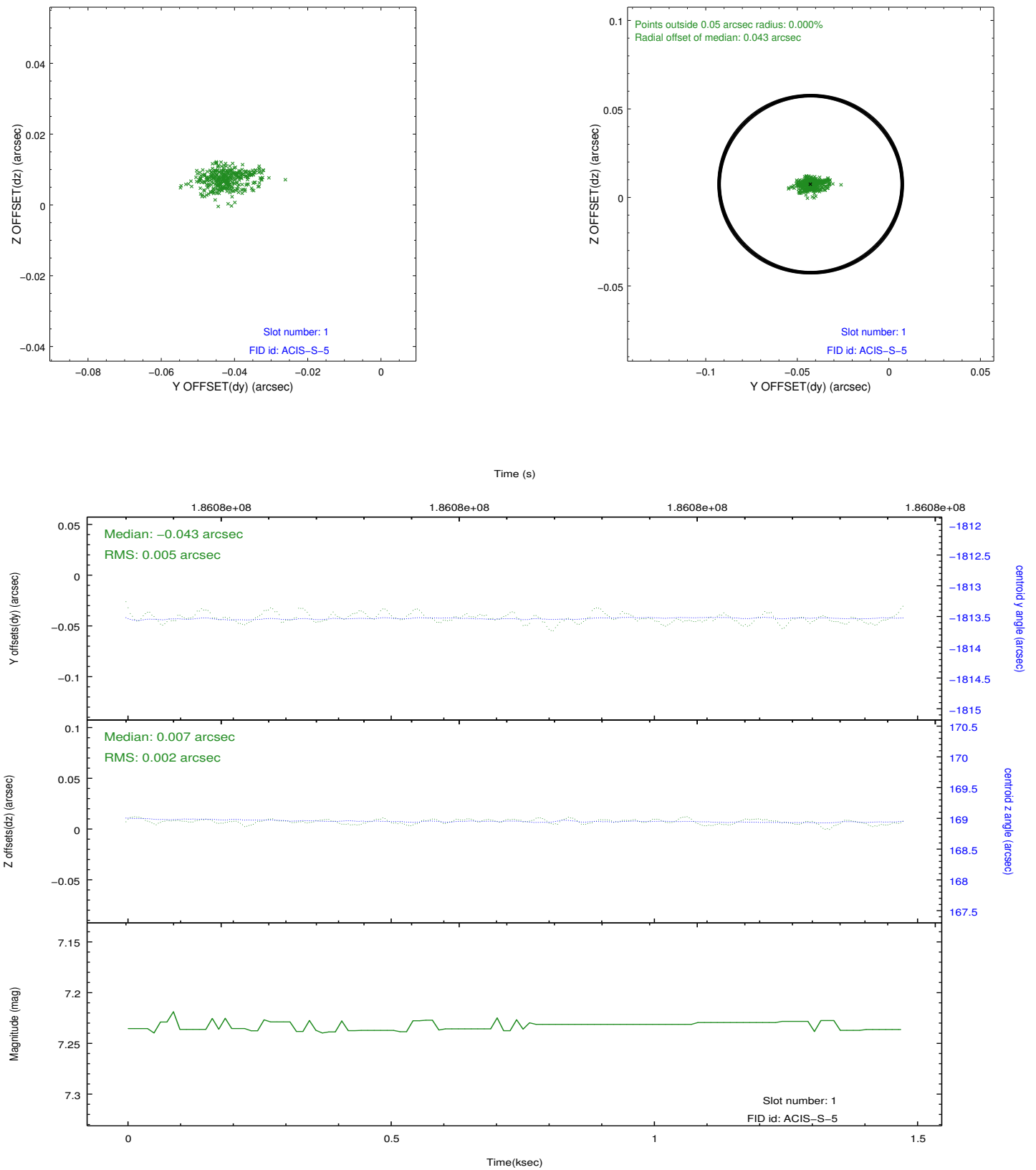


## 2.5 FID Slots

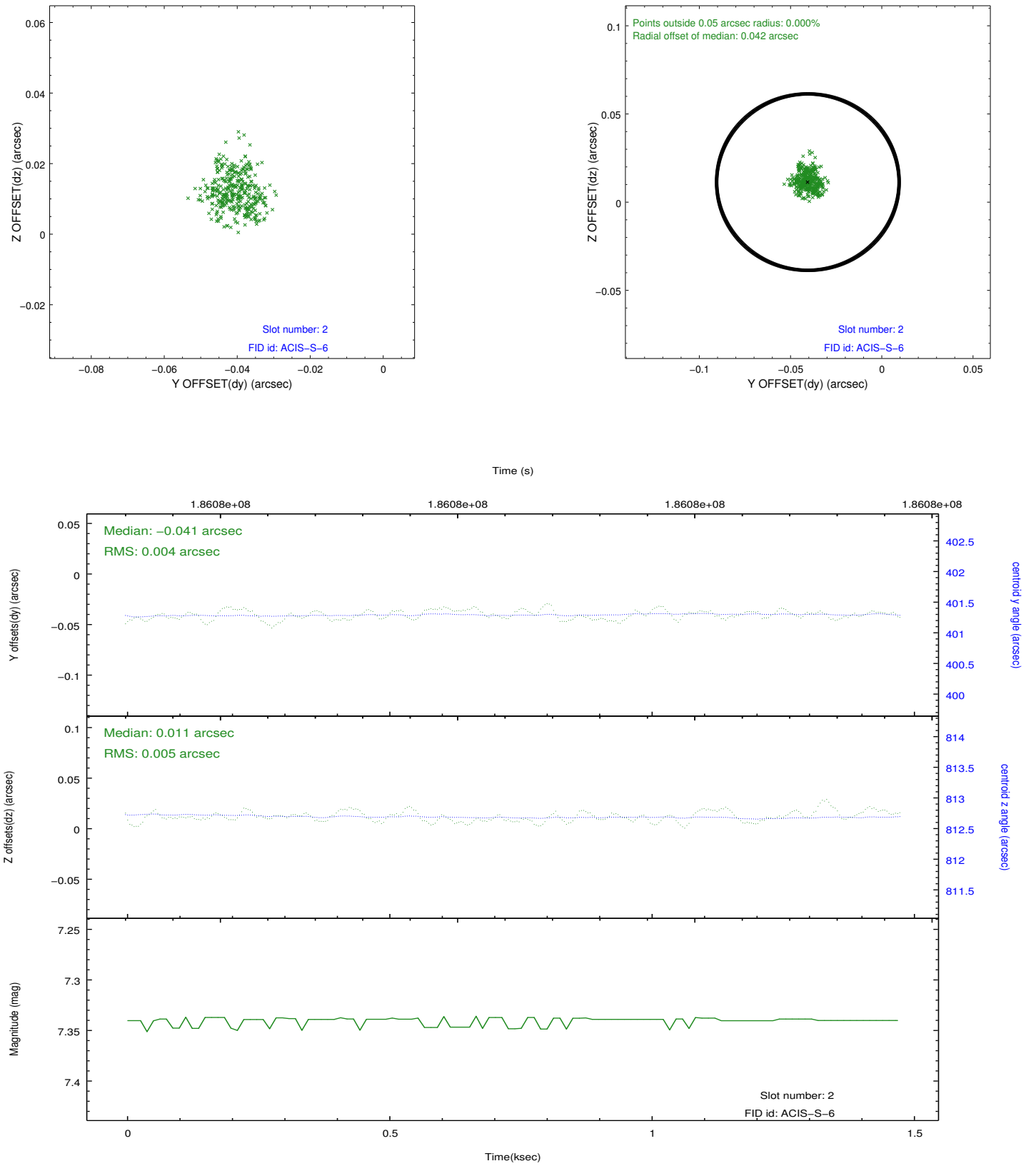
### 2.5.1 Slot 0



## 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)	2012.12.02
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	1.475

## A.2 Comments

This is a moving target. Users will need to run `sso_freeze` or similar software to position the events in the reference frame of the target.