

# V&V Reference Report

## L2 ASCDS Version : 8.4.3

Observation 6753 - L2 Version 2  
Chandra X-Ray Center

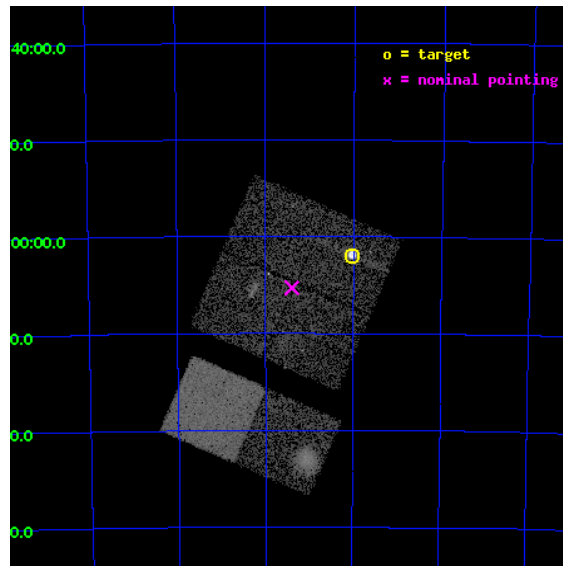
L2 Processing Date : Mar 28 2012

## 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

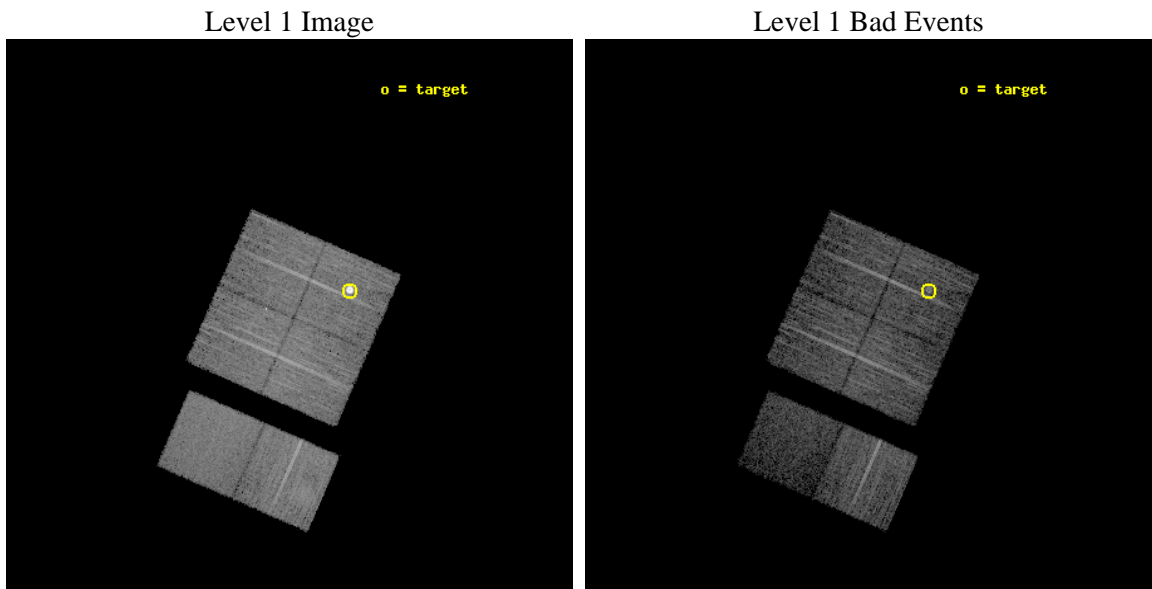
seq_num	590436	Sequence number
obs_id	6753	Observation id
title	AO7 ACIS-I Calibration Observations of E0102-72	Proposal title
observer	Dr. CXC Calibration	Principal investigator
object	E0102-72[I0,-120,4.7,-5.68,0]	Source name
dtcycle	0	&#160
cycle	P	events from which exps? Prim/Second/Both
ra_targ	16.01	Observer's specified target RA [deg]
dec_targ	-72.032028	Observer's specified target Dec [deg]
ra_nom	16.349711191666	Nominal RA [deg]
dec_nom	-72.088276791039	Nominal Dec [deg]
roll_nom	203.532369667	Nominal Roll [deg]
revision	2	Processing version of data
ontime	7257.5999729633	Sum of GTIs [s]
livetime	7165.6998721036	Livetime [s]
ontime0	7257.5999729633	Sum of GTIs [s]
ontime1	7254.3589827716	Sum of GTIs [s]
ontime2	7257.5999729633	Sum of GTIs [s]
ontime3	7251.1179825664	Sum of GTIs [s]
ontime6	7257.5999729633	Sum of GTIs [s]
ontime7	7257.5999729633	Sum of GTIs [s]
l2events	64621	Number of level 2 events



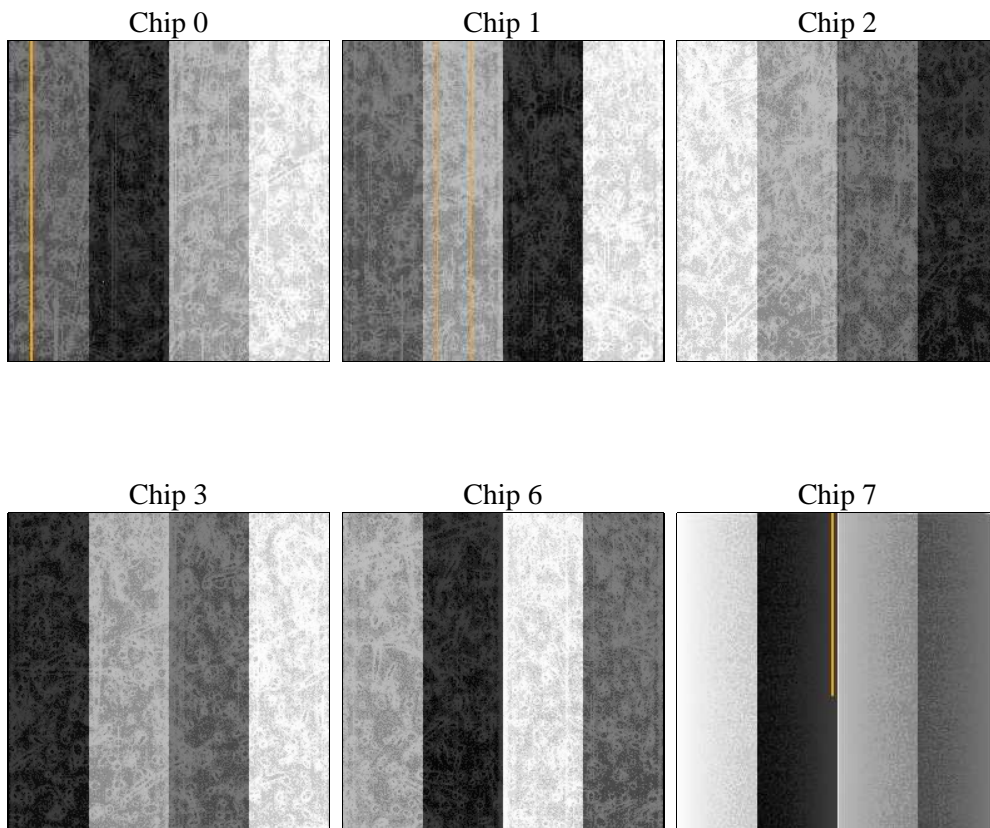
## 2 OBI

### 2.1 OBI

#### 2.1.1 Images



#### 2.1.2 Bias



### 2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	7500.000000	[s] Scheduled observation exposure time
ascdsver	8.4.3	Processing system revision	ontime	7257.5999729633	Sum of GTIs [s]
caldsver	4.4.8	&#160	ontime0	7257.5999729633	Sum of GTIs [s]
date	2012-03-28T03:14:25	Date and time of file creation	ontime1	7254.3589827716	Sum of GTIs [s]
revision	2	Processing version of data	ontime2	7257.5999729633	Sum of GTIs [s]
			ontime3	7251.1179825664	Sum of GTIs [s]
			ontime6	7257.5999729633	Sum of GTIs [s]
			ontime7	7257.5999729633	Sum of GTIs [s]
			l1events	314794	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	66670	44973	54194	50104	53145	45708	grade 0 events	19179	1868	2273	2385	3624	2236
rejected events	42091	39888	48974	44561	46109	23202		28%	4%	4%	4%	6%	4%
rejected %	63%	88%	90%	88%	86%	50%	grade 1 events	174	27	30	42	37	45
								0%	0%	0%	0%	0%	0%
							grade 2 events	2614	1099	1175	1140	1250	4753
								3%	2%	2%	2%	2%	10%
							grade 3 events	933	582	467	546	577	2154
								1%	1%	0%	1%	1%	4%
							grade 4 events	855	561	476	540	572	2178
								1%	1%	0%	1%	1%	4%
							grade 5 events	1441	1562	1324	1642	1658	5070
								2%	3%	2%	3%	3%	11%
							grade 6 events	1015	978	835	934	1017	11196
								1%	2%	1%	1%	1%	24%
							grade 7 events	40459	38296	47614	42875	44410	18076
								60%	85%	87%	85%	83%	39%

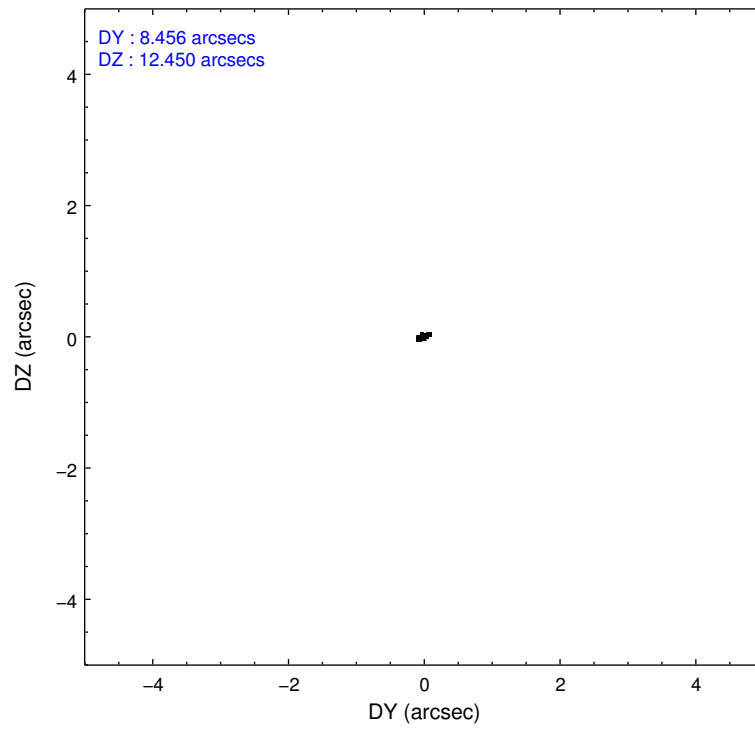
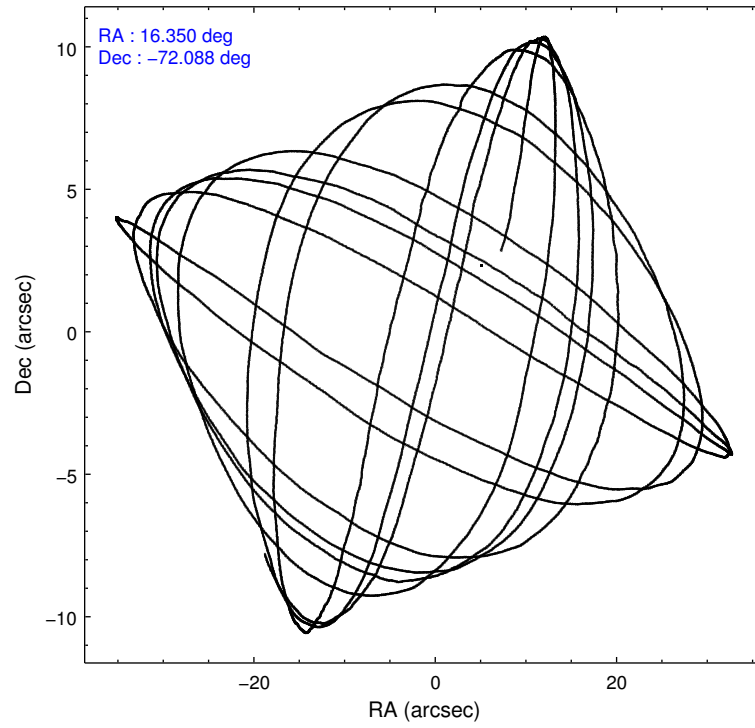


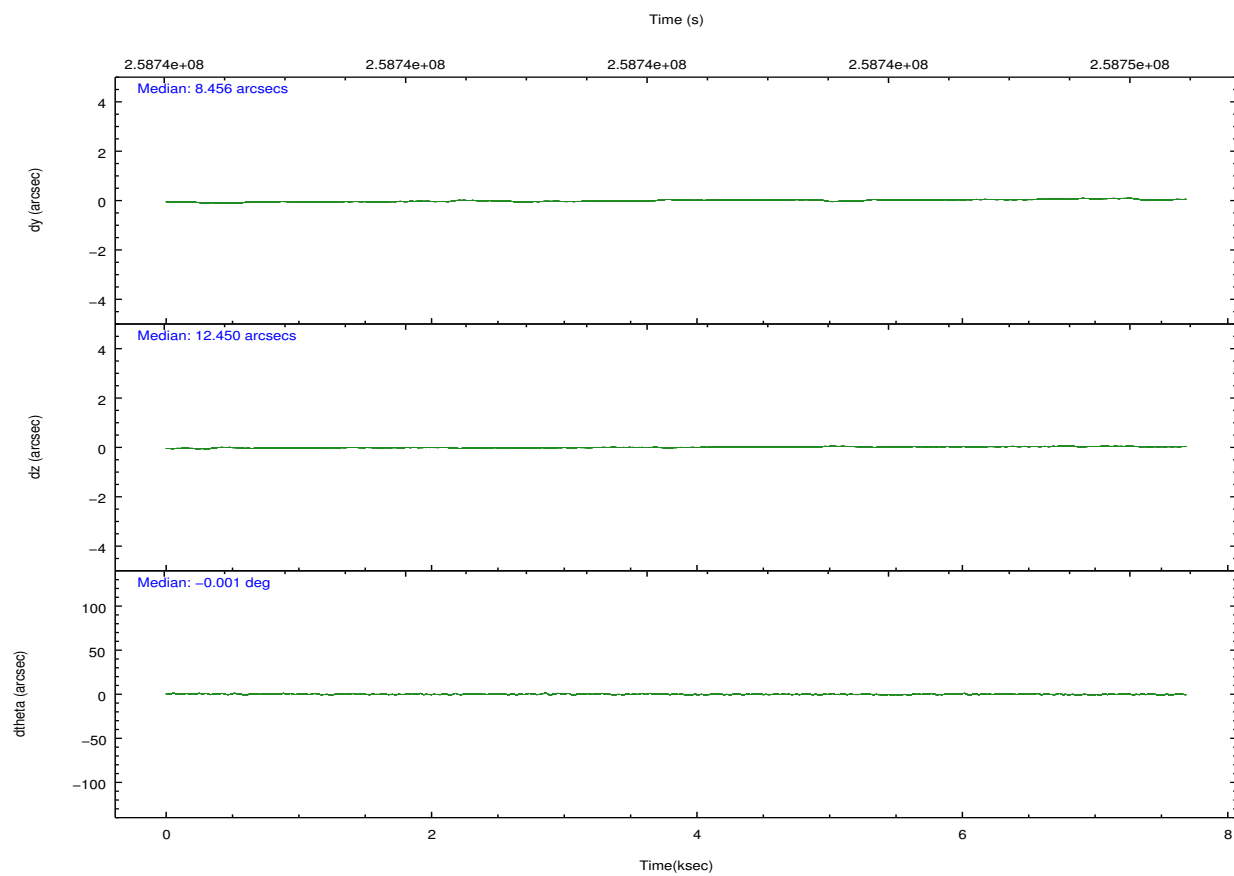
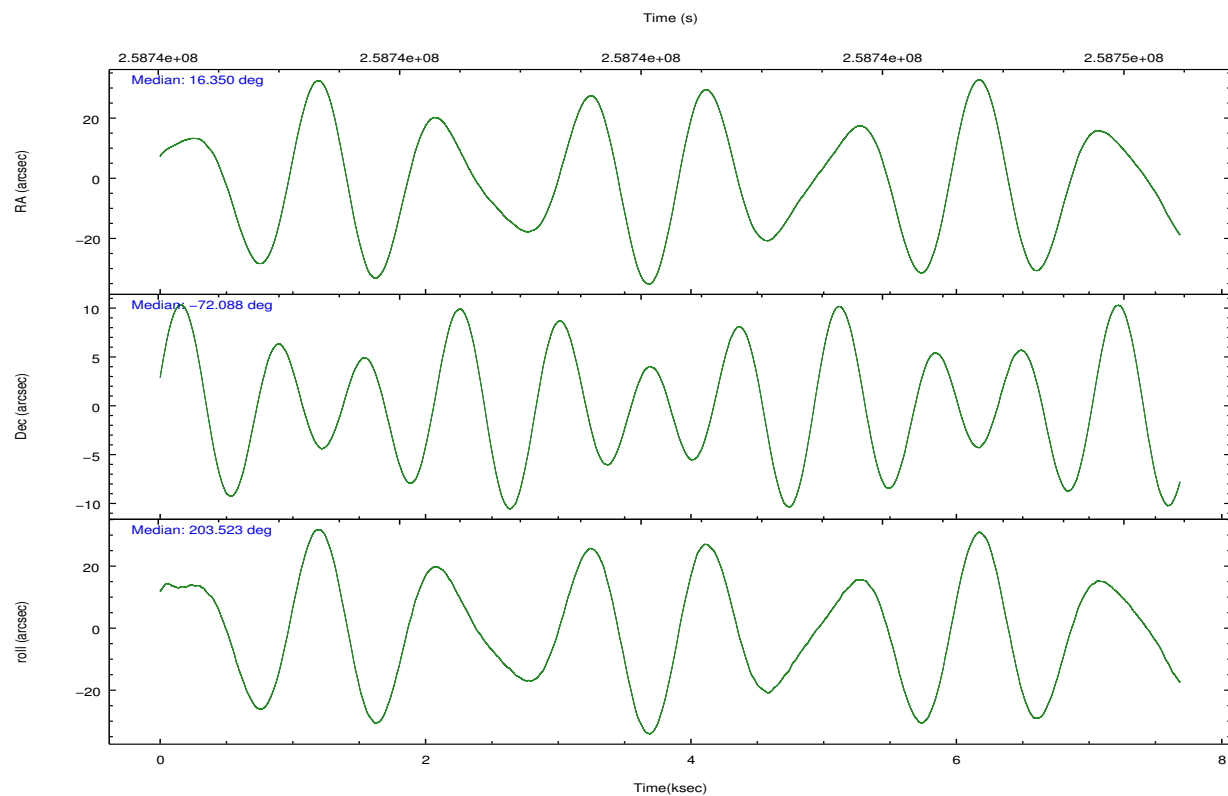
## 2.2 Compared Parameters

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	16.402225	16.34971119166628
[deg] Pointing Dec	-72.066199	-72.08827679103854
[deg] Pointing Roll	203.373656	203.5323696670014
[s] Window start time (MET)	247190464.184000	247190464.184000
[s] Window stop time (MET)	260150465.184000	260150465.184000
[mm] SIM focus pos	-0.782348	-0.7809083437167272
[mm] SIM defocus	0	0.001439871863259334
[mm] SIM translation stage pos	-233.592463	-233.5874344608287
[mm] SIM translation stage offset	0	-0.005018542100998502
[s] Observation start time (MET)	258738586.184000	258738210.08231
Observation start date	2006-03-14T15:48:41	2006-03-14T15:43:30
[s] Observation end time (MET)	258746086.184000	258746219.43268
Observation end date	2006-03-14T17:53:41	2006-03-14T17:56:59
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



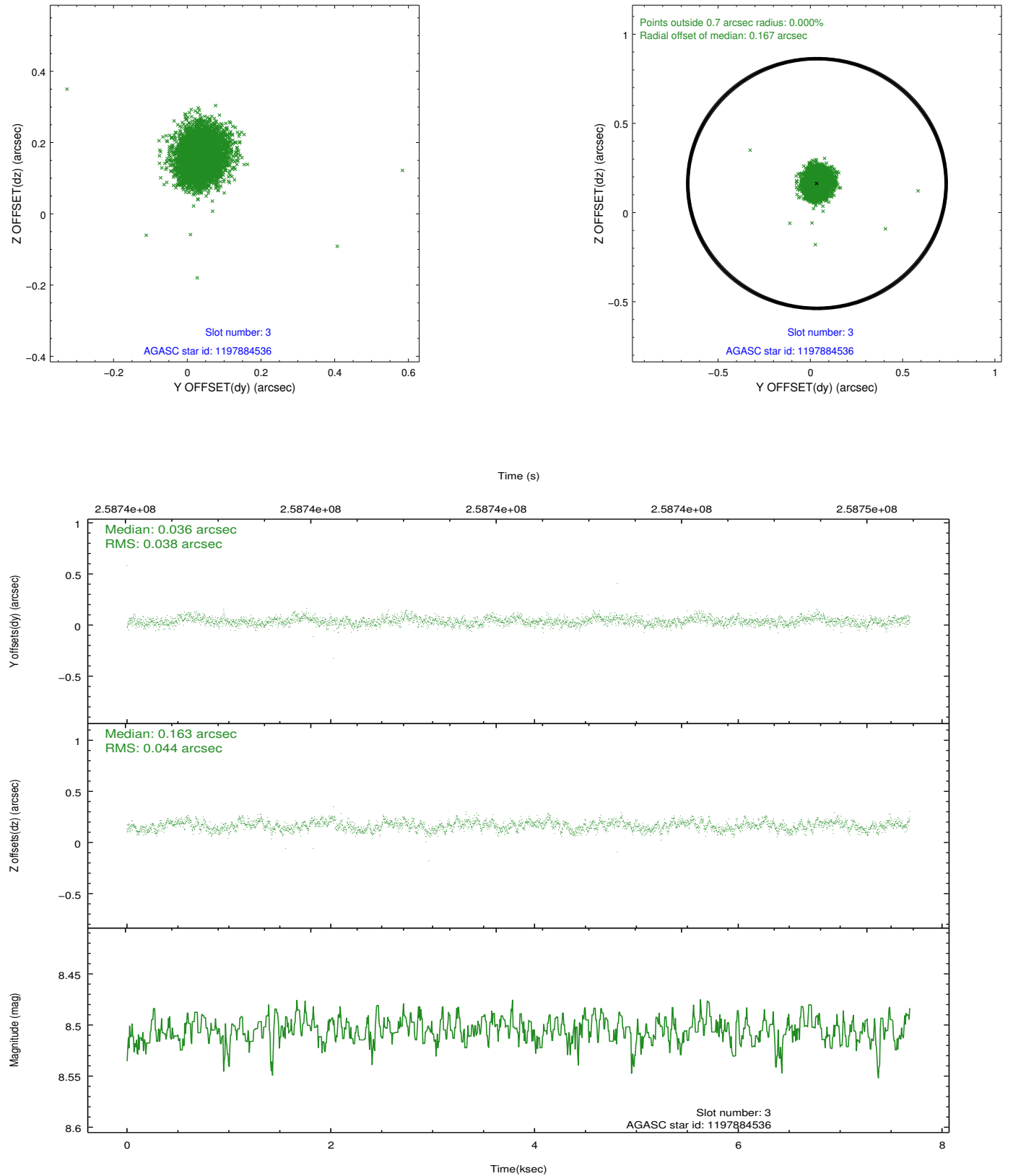


### Slot Statistics

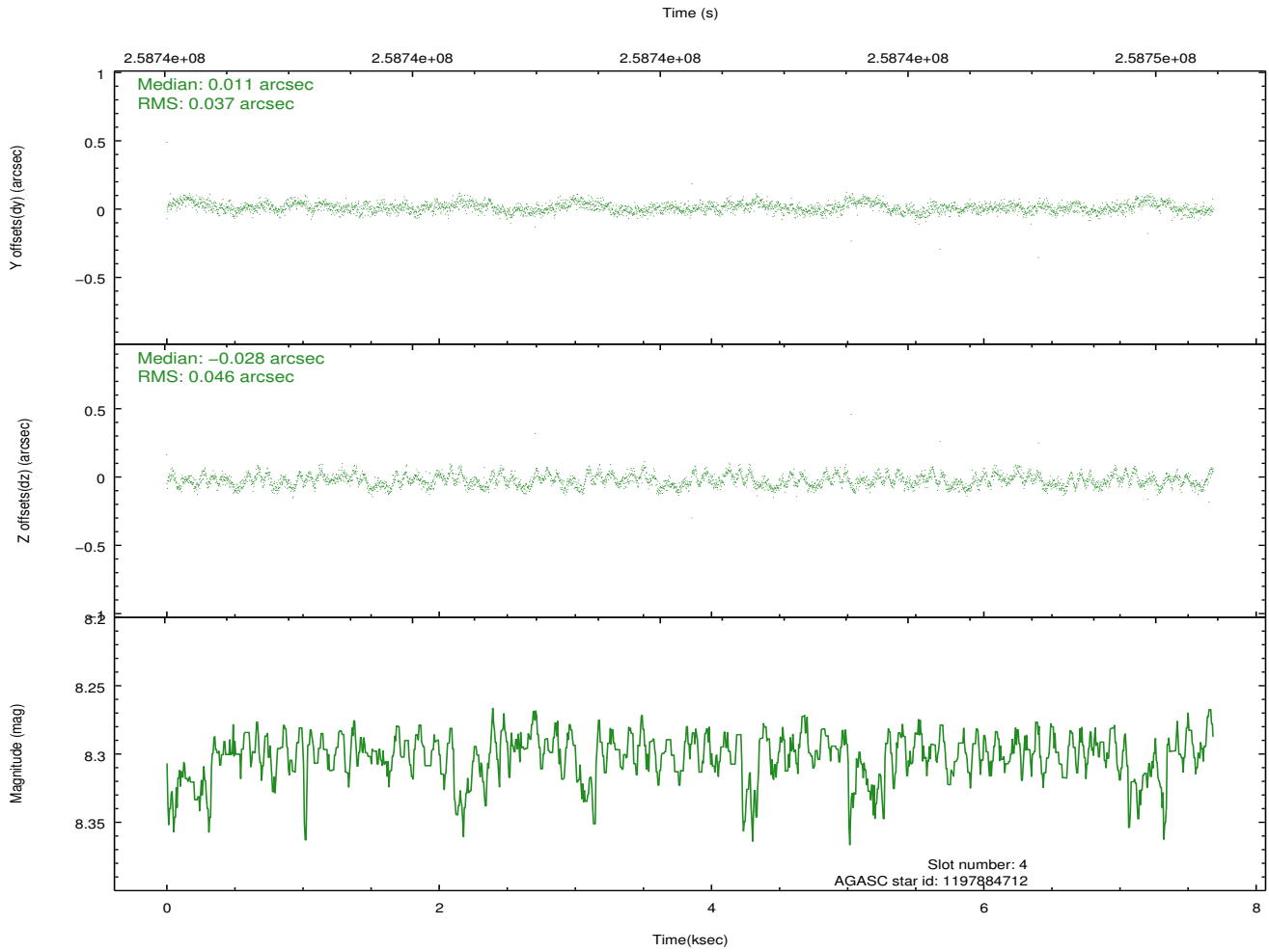
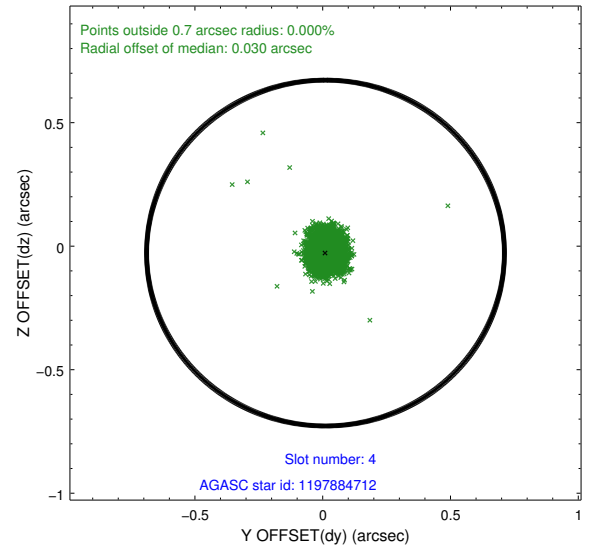
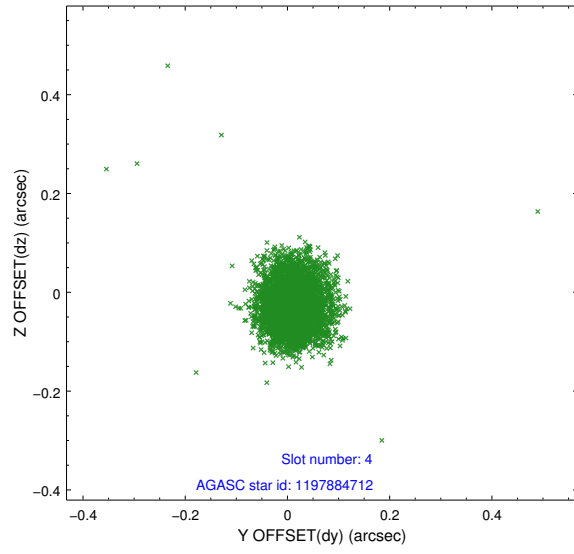
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-I-1	7.24	1875	0.053	0.002	0.007	0.012	0.000000	0.000000	931.22	-836.00
1	FID	ACIS-I-5	7.22	1875	-0.189	0.069	0.006	0.010	0.000000	0.000000	-1816.68	1061.23
2	FID	ACIS-I-6	7.25	1875	0.045	-0.001	0.007	0.012	0.000000	0.000000	396.01	1706.46
3	GUIDE	1197884536	8.51	3750	0.036	0.163	0.060	0.096	17.160729	-71.835289	-1108.47	-420.29
4	GUIDE	1197884712	8.30	3749	0.011	-0.028	0.061	0.096	16.087398	-72.252690	583.94	480.22
5	GUIDE	1197885328	7.24	3750	0.090	0.157	0.055	0.087	16.283090	-71.733943	-350.88	-1150.80
6	GUIDE	1198189696	7.36	3750	-0.122	-0.045	0.054	0.089	15.223750	-72.697522	2064.73	1597.36
7	GUIDE	1198283128	7.76	3749	-0.018	-0.245	0.064	0.098	17.272580	-72.642428	-31.74	2281.58

## 2.4 Star Slots

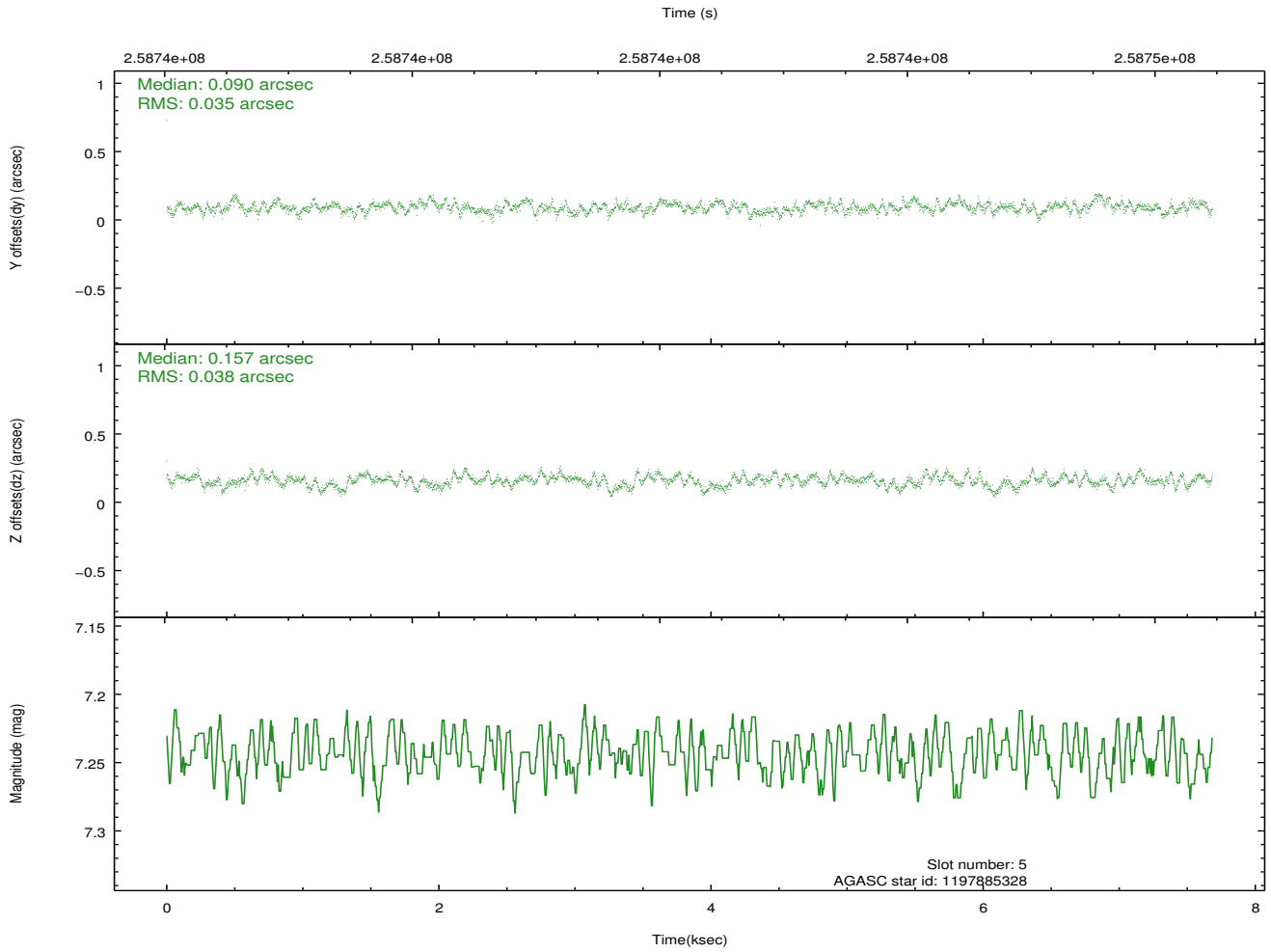
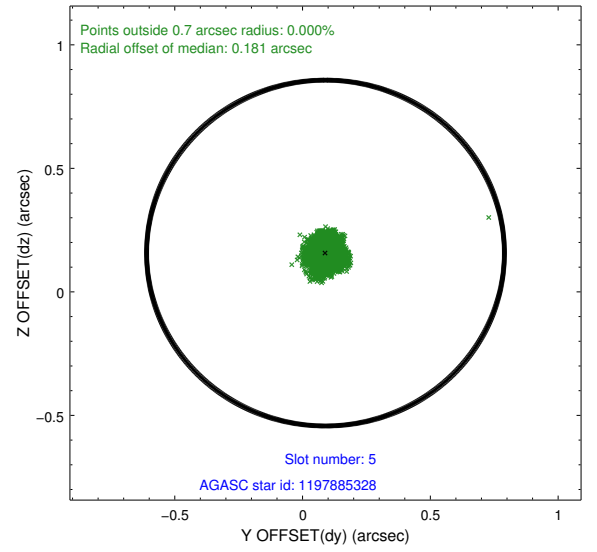
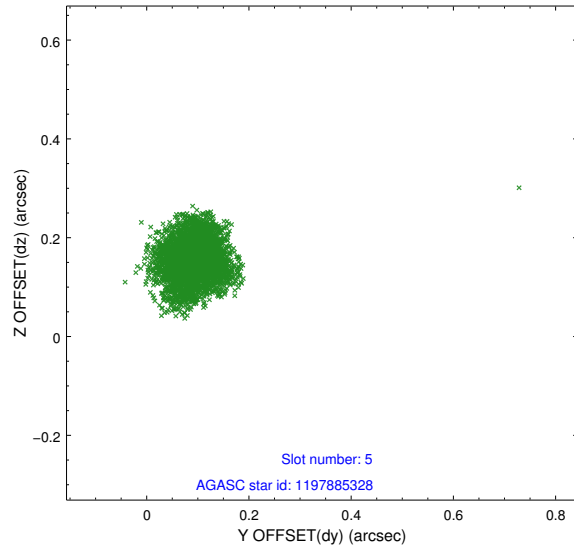
### 2.4.1 Slot 3



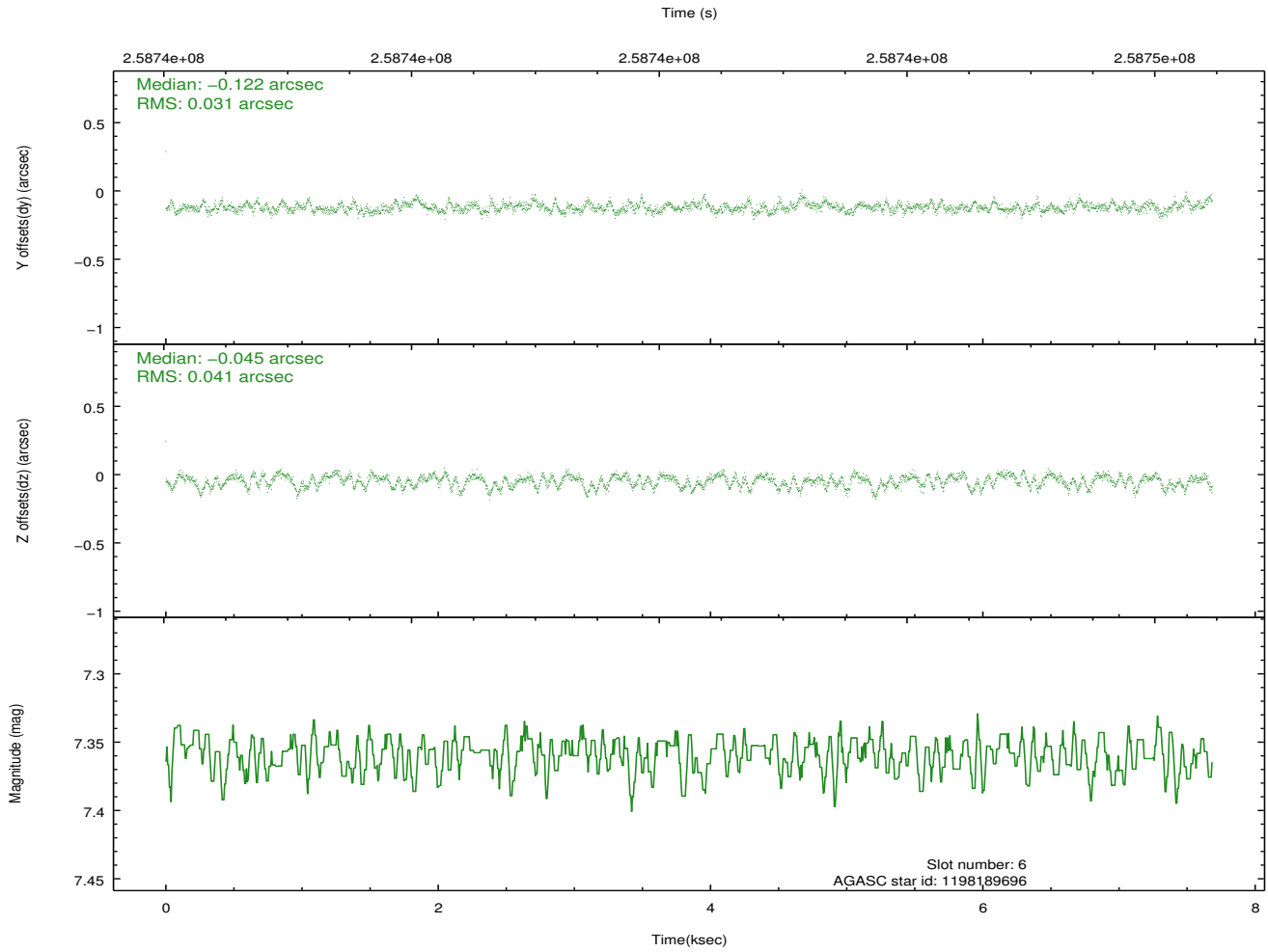
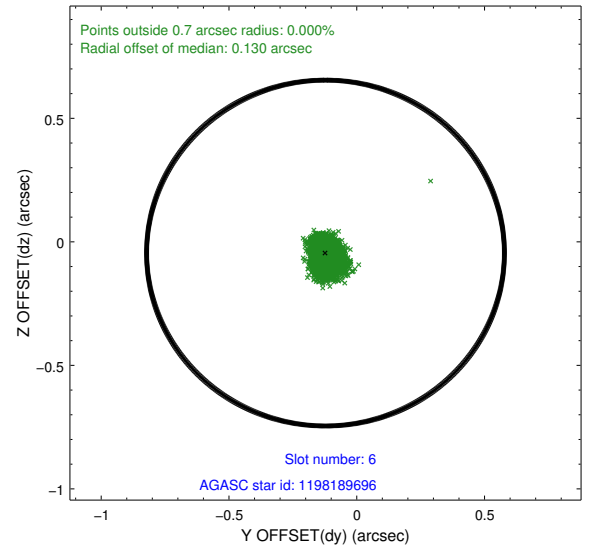
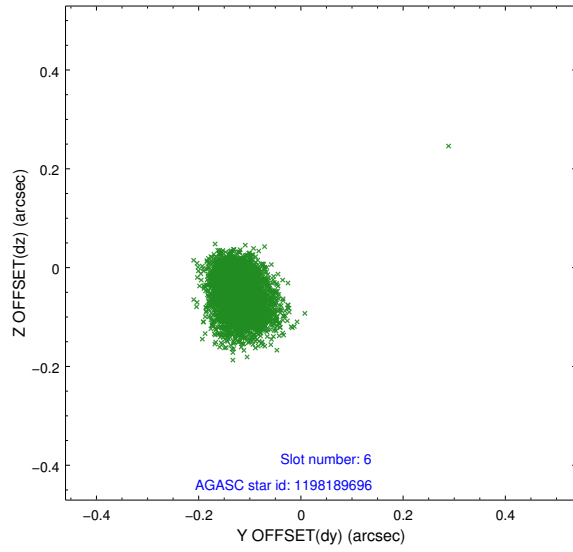
## 2.4.2 Slot 4



### 2.4.3 Slot 5

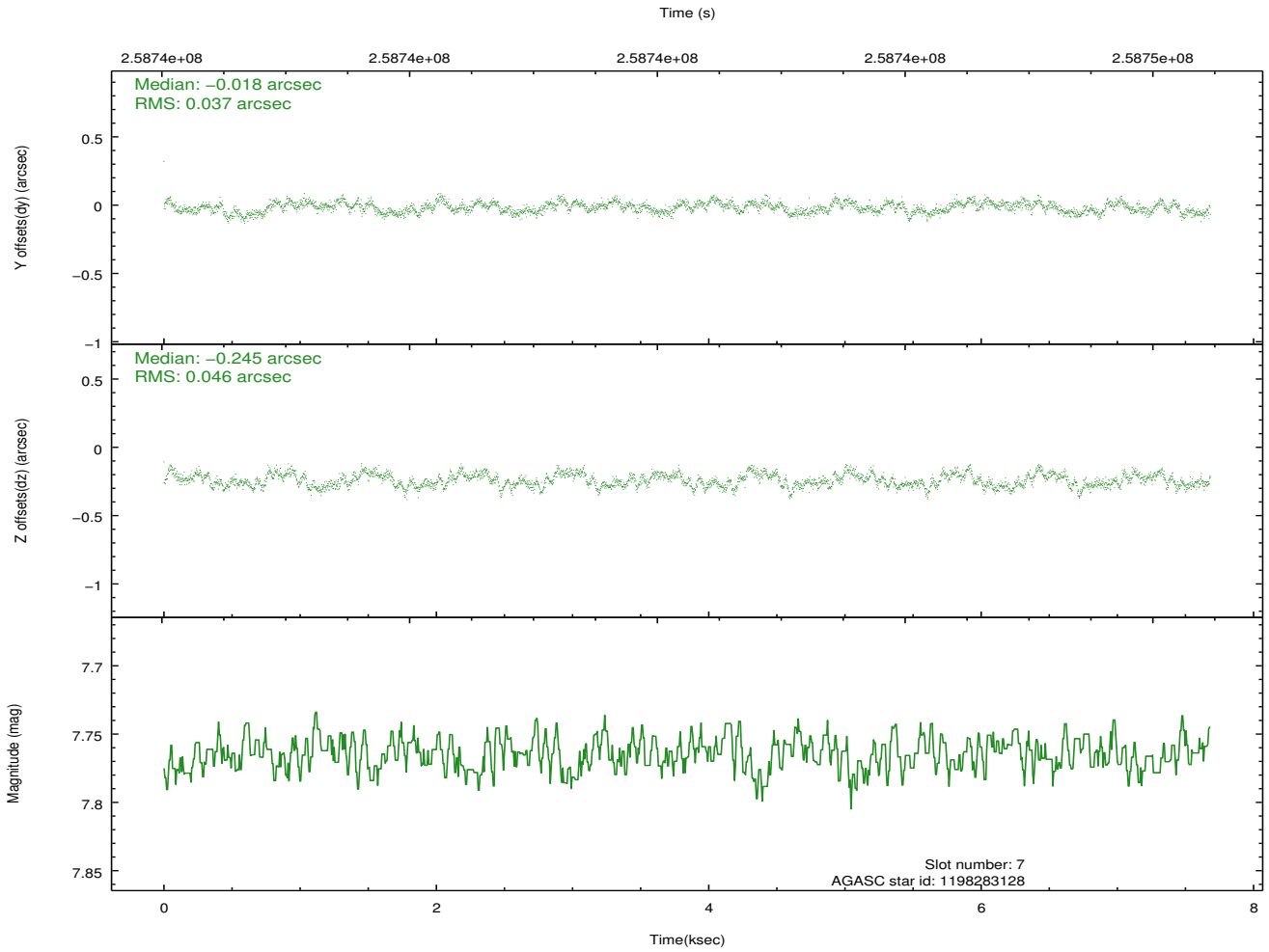
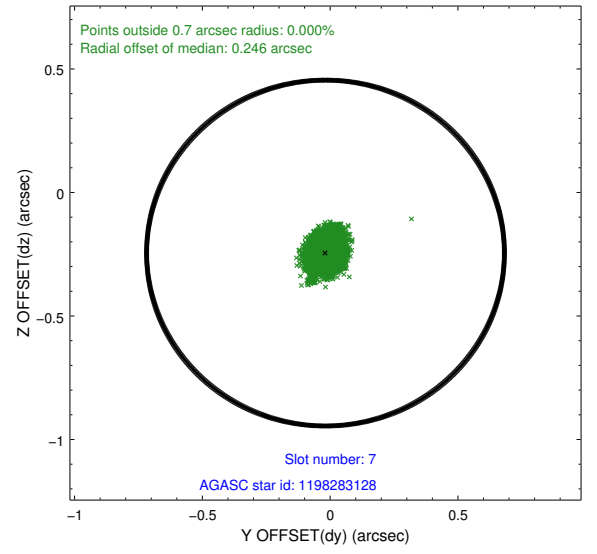
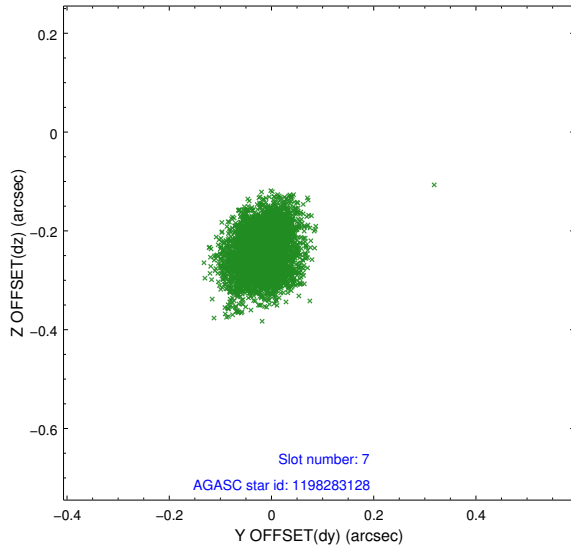


## 2.4.4 Slot 6



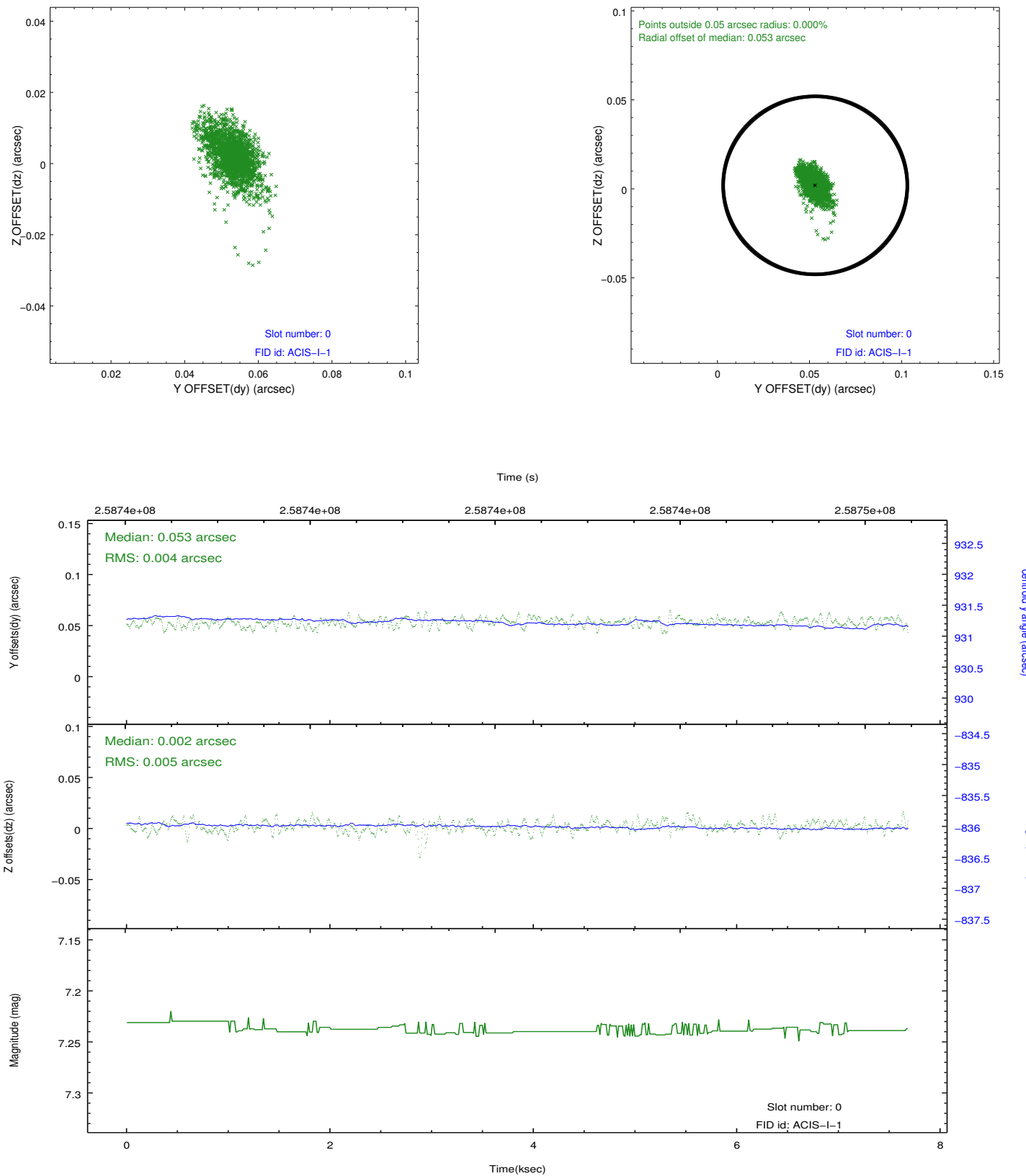


### 2.4.5 Slot 7

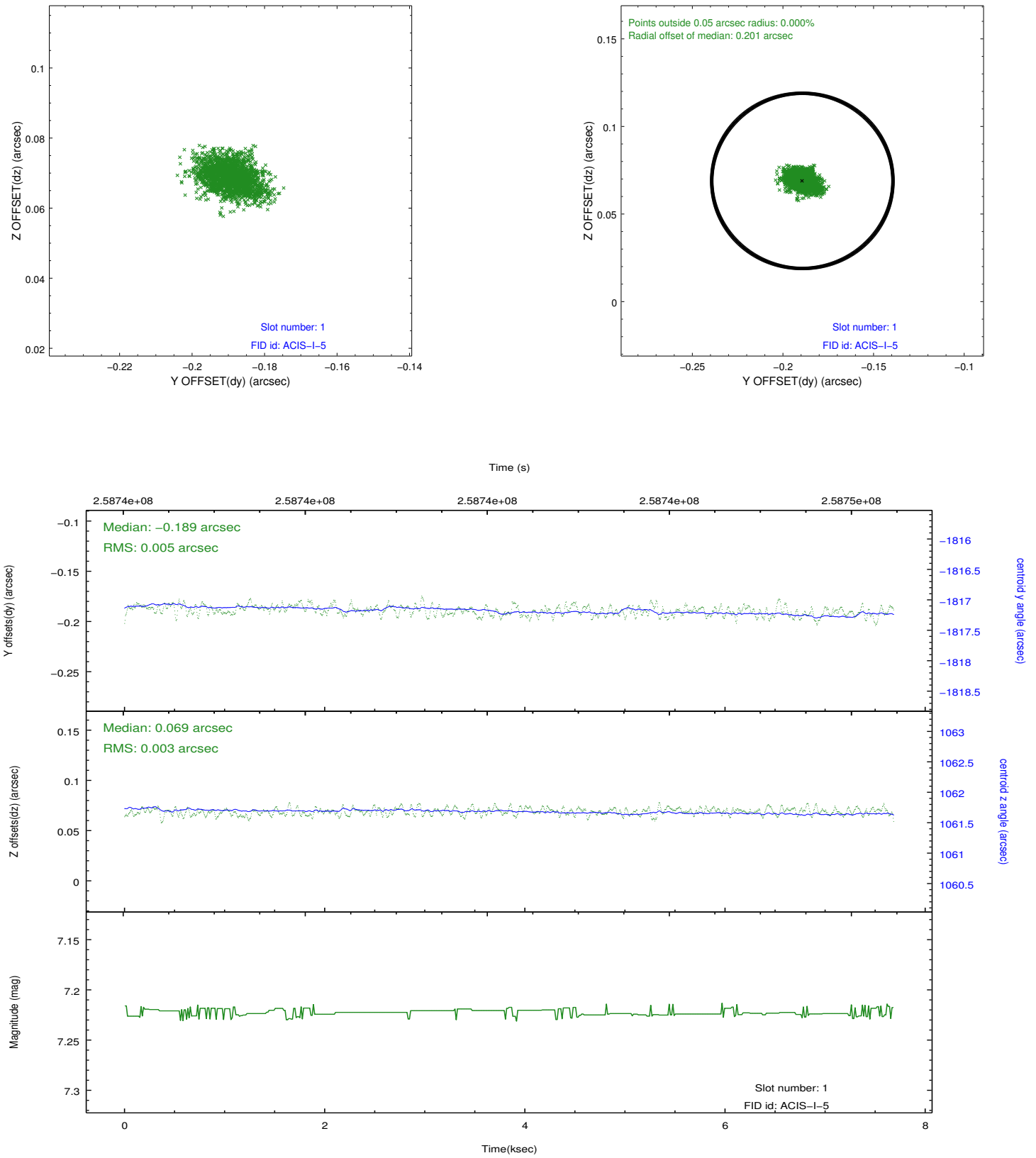


## 2.5 FID Slots

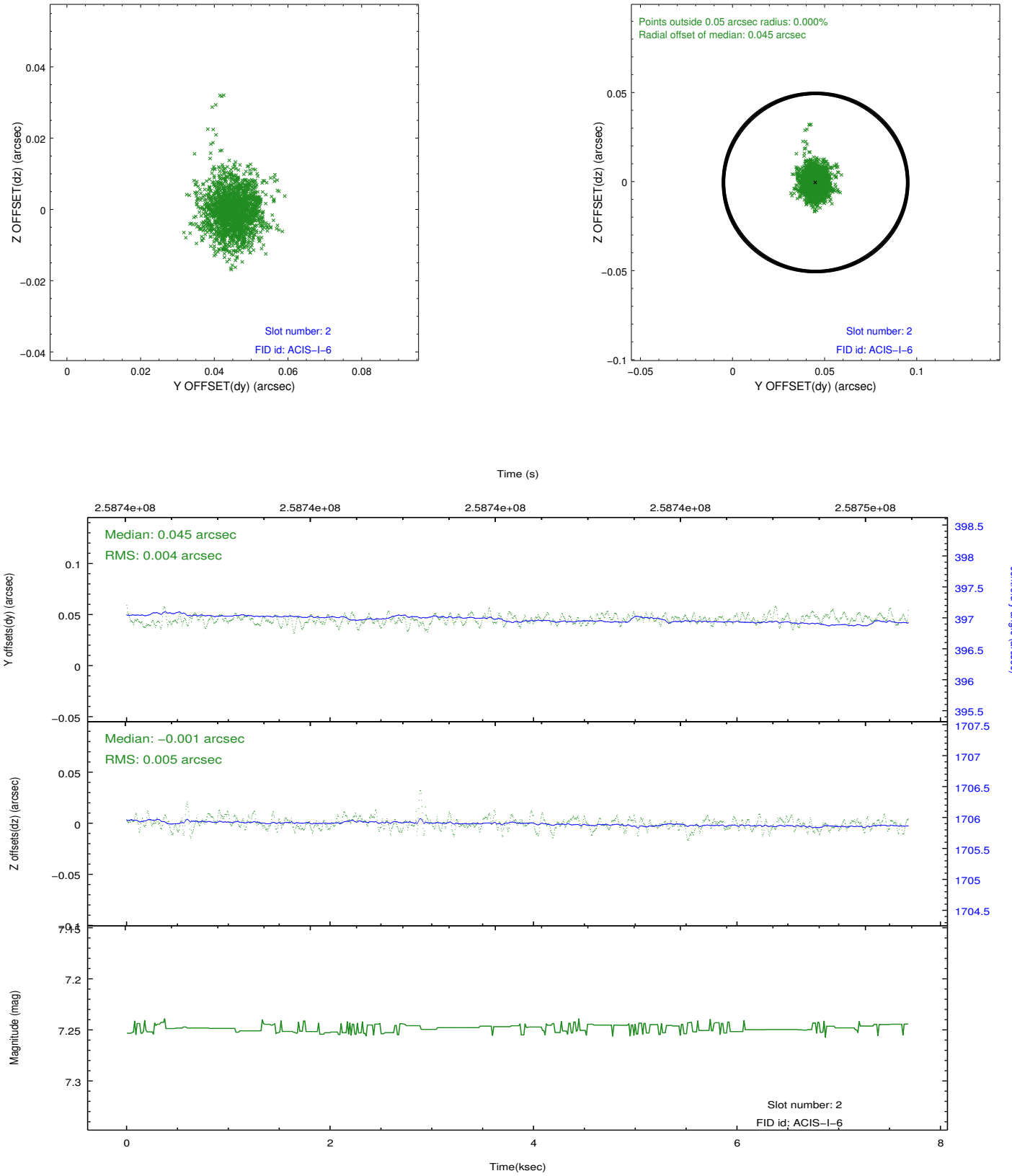
### 2.5.1 Slot 0



## 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)	2012.03.28
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	7.25759997

### A.2 Comments

Window constraint met.