

# V&V Reference Report

## L2 ASCDS Version : 8.4.3

Observation 5494 - L2 Version 2  
Chandra X-Ray Center

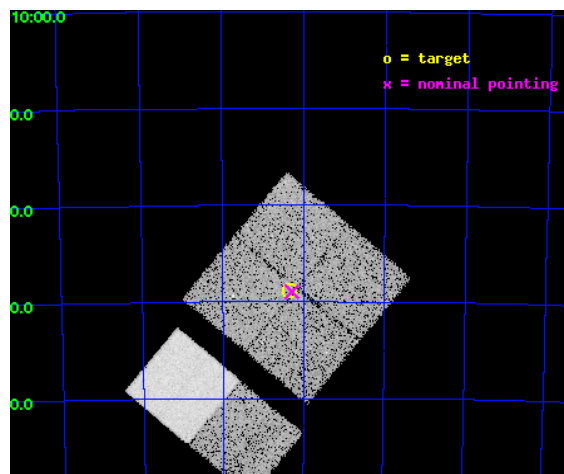
L2 Processing Date : Mar 27 2012

## 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

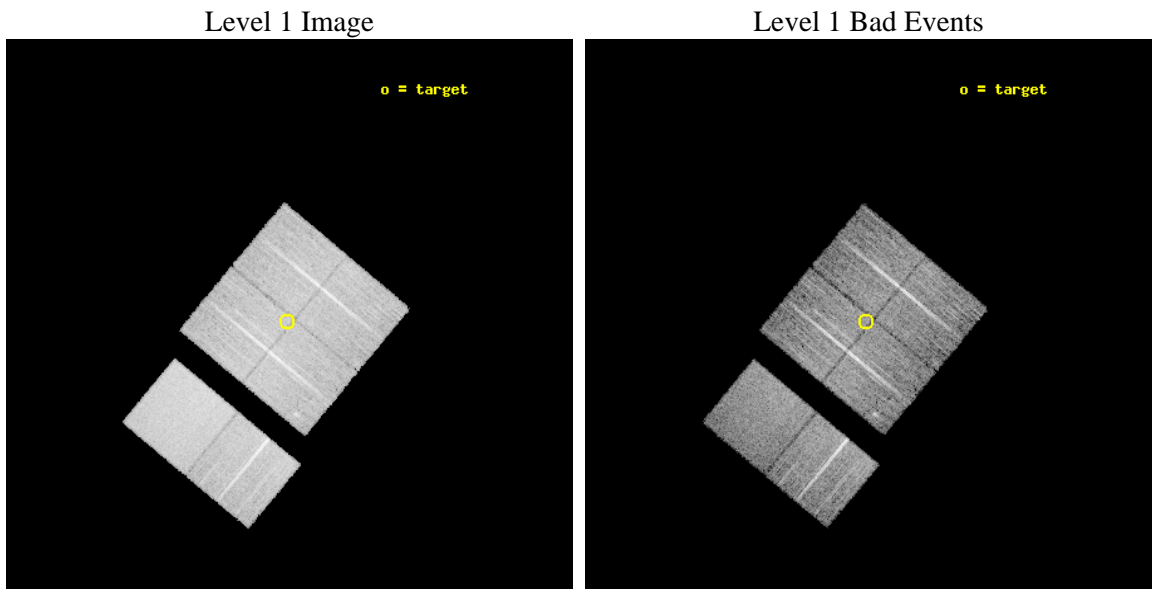
seq_num	400424	Sequence number
obs_id	5494	Observation id
title	Discovering X-ray pulsars in the Wing of the Small Magellanic Cloud	&#160
observer	Prof Malcolm Coe	Principal investigator
object	SMCwing 15	Source name
dtcycle	0	&#160
cycle	P	events from which exps? Prim/Second/Both
ra_targ	19.0875	Observer's specified target RA [deg]
dec_targ	-73.648333	Observer's specified target Dec [deg]
ra_nom	19.071525925057	Nominal RA [deg]
dec_nom	-73.649692445196	Nominal Dec [deg]
roll_nom	219.78245581554	Nominal Roll [deg]
revision	2	Processing version of data
ontime	10035.199962616	Sum of GTIs [s]
livetime	9908.1282182174	Livetime [s]
ontime0	10035.199962616	Sum of GTIs [s]
ontime1	10035.199962616	Sum of GTIs [s]
ontime2	10031.958972424	Sum of GTIs [s]
ontime3	10035.199962616	Sum of GTIs [s]
ontime6	10035.199962616	Sum of GTIs [s]
ontime7	10035.199962616	Sum of GTIs [s]
l2events	92946	Number of level 2 events



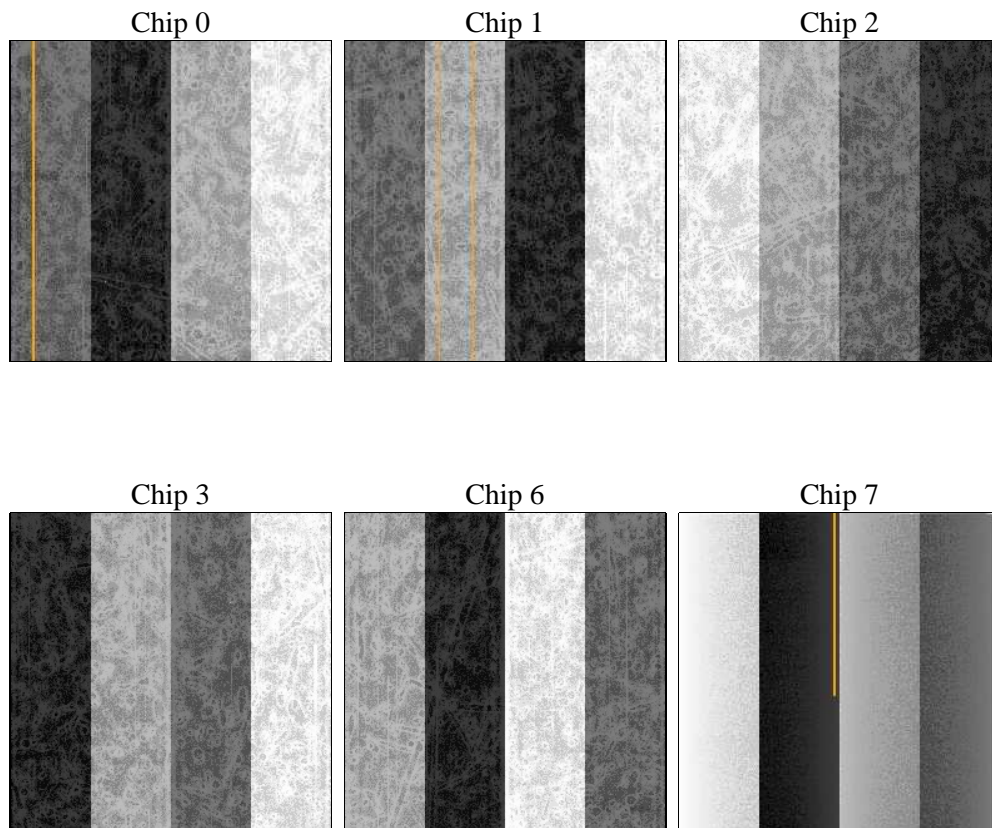
## 2 OBI

### 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	10035.199962616	Sum of GTIs [s]
caldbver	4.4.8	&#160	ontime0	10035.199962616	Sum of GTIs [s]
date	2012-03-27T03:30:16	Date and time of file creation	ontime1	10035.199962616	Sum of GTIs [s]
revision	2	Processing version of data	ontime2	10031.958972424	Sum of GTIs [s]
			ontime3	10035.199962616	Sum of GTIs [s]
			ontime6	10035.199962616	Sum of GTIs [s]
			ontime7	10035.199962616	Sum of GTIs [s]
			l1events	535638	Number of level 1 events

### 2.1.4 Events

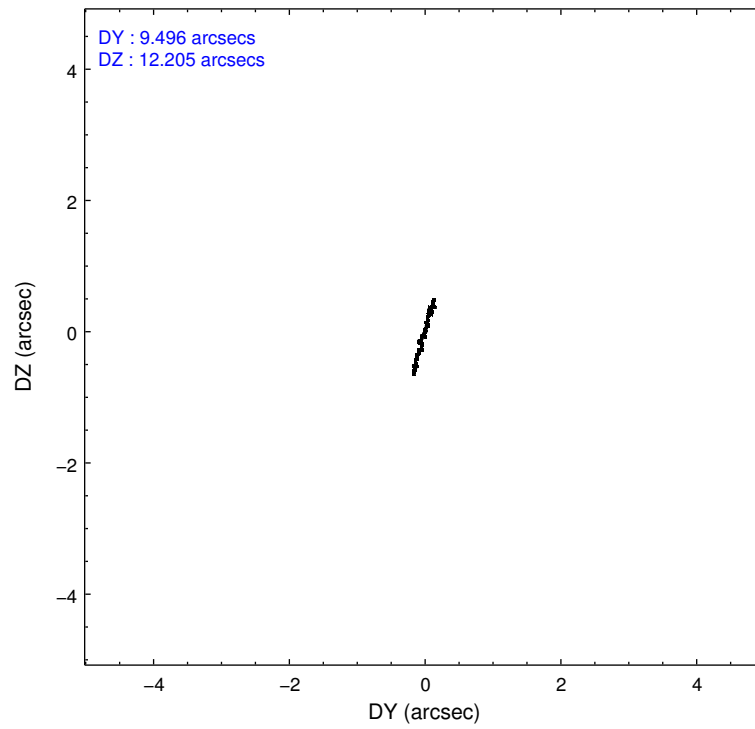
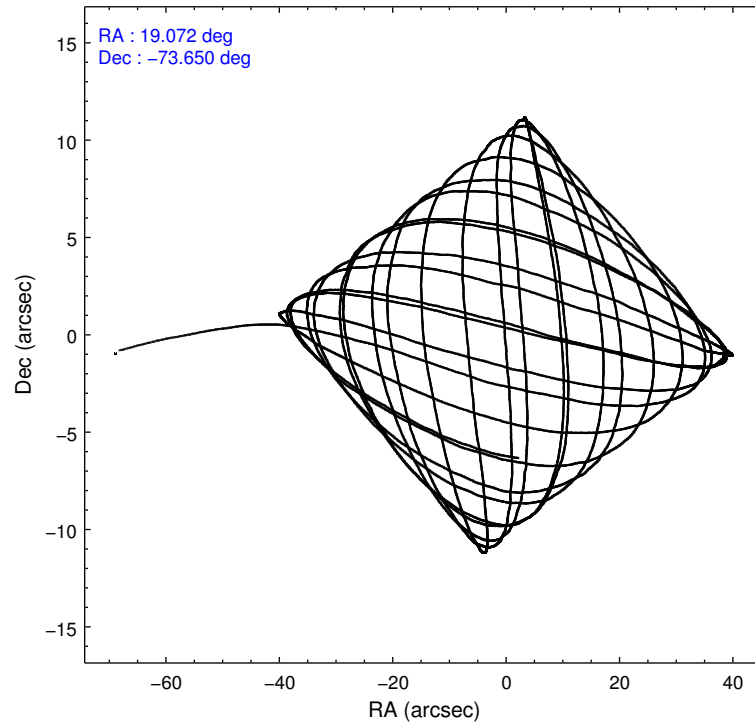
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6	ccd 7		ccd 0	ccd 1	ccd 2	ccd 3	ccd 6	ccd 7
level 1 events	79287	80599	85462	85509	89242	115539	grade 0 events	4586	5190	4677	4596	3882	4176
rejected events	68790	68462	75169	75203	79074	67545		5%	6%	5%	5%	4%	3%
rejected %	86%	84%	87%	87%	88%	58%	grade 1 events	58	42	52	69	44	105
								0%	0%	0%	0%	0%	0%
							grade 2 events	2168	2577	2148	1961	2244	9687
								2%	3%	2%	2%	2%	8%
							grade 3 events	1003	1155	975	975	944	4159
								1%	1%	1%	1%	1%	3%
							grade 4 events	923	1083	966	936	940	4181
								1%	1%	1%	1%	1%	3%
							grade 5 events	3359	3792	3254	3921	4029	11074
								4%	4%	3%	4%	4%	9%
							grade 6 events	1821	2147	1532	1845	2160	25829
								2%	2%	1%	2%	2%	22%
							grade 7 events	65369	64613	71858	71206	74999	56328
								82%	80%	84%	83%	84%	48%

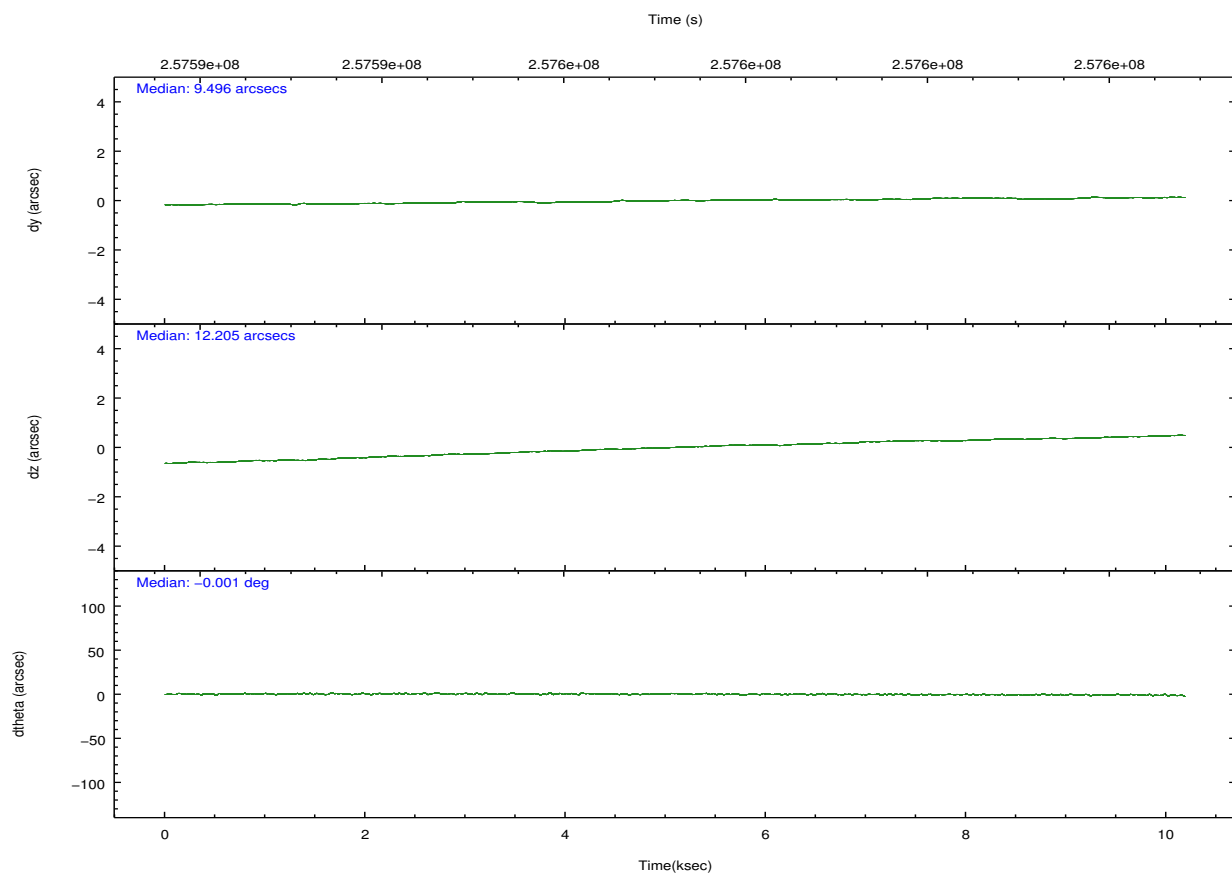
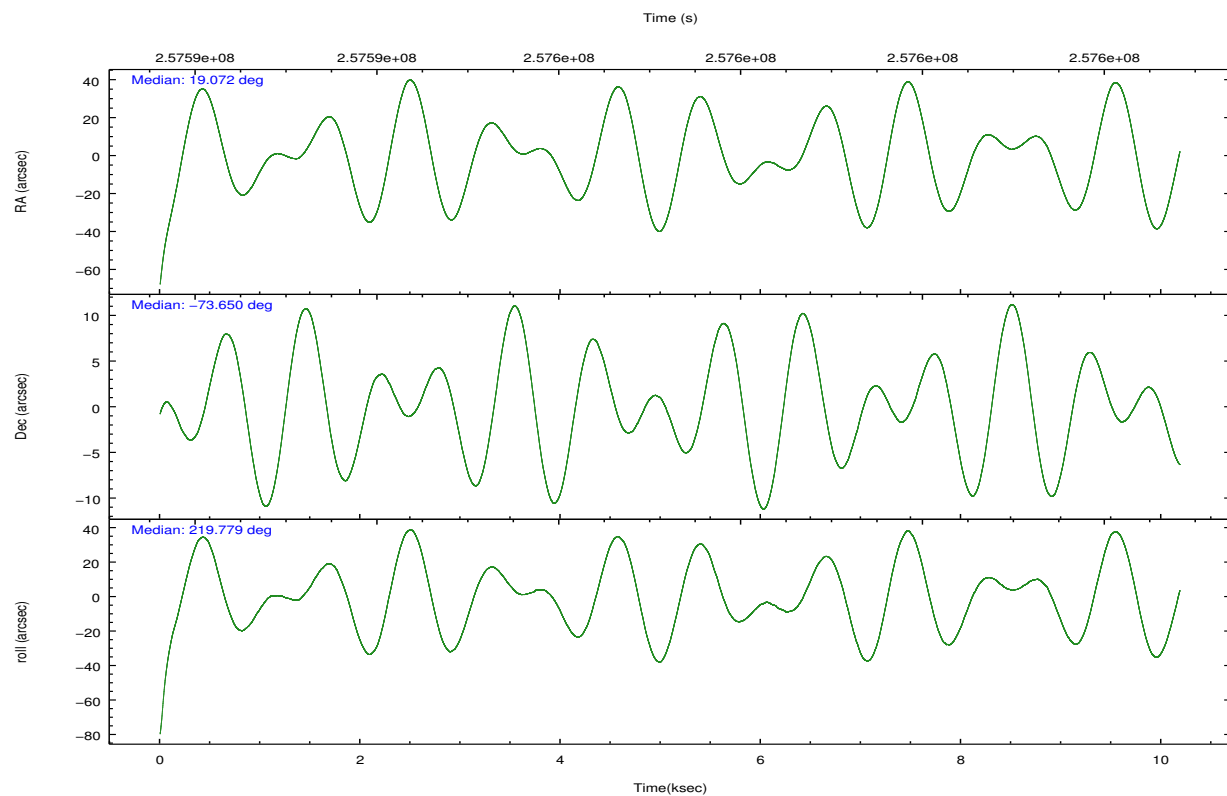


## 2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-012367	ACIS-012367	Obspar file type	PREDICTED	ACTUAL
Grating	NONE	NONE	Obspar update status	NONE	UPDATED
Data mode	FAINT	FAINT	Number of optional ACIS chips dropped	0	0
Observation mode	POINTING	POINTING	On-chip summing requested	N	N
[deg] Pointing RA	19.104940	19.0715259250573	Subarray requested	NONE	NONE
[deg] Pointing Dec	-73.623943	-73.64969244519638	Alternating exposures requested	N	N
[deg] Pointing Roll	219.605859	219.7824558155354	[s] Primary exposure time	0.000000	3.2
[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)	257592319.184000	257591318.05399			
Observation start date	2006-03-01T09:24:14	2006-03-01T09:08:38			
[s] Observation end time (MET)	257602319.184000	257602453.65451			
Observation end date	2006-03-01T12:10:54	2006-03-01T12:14:13			
Read mode	TIMED	TIMED			

## 2.3 Aspect



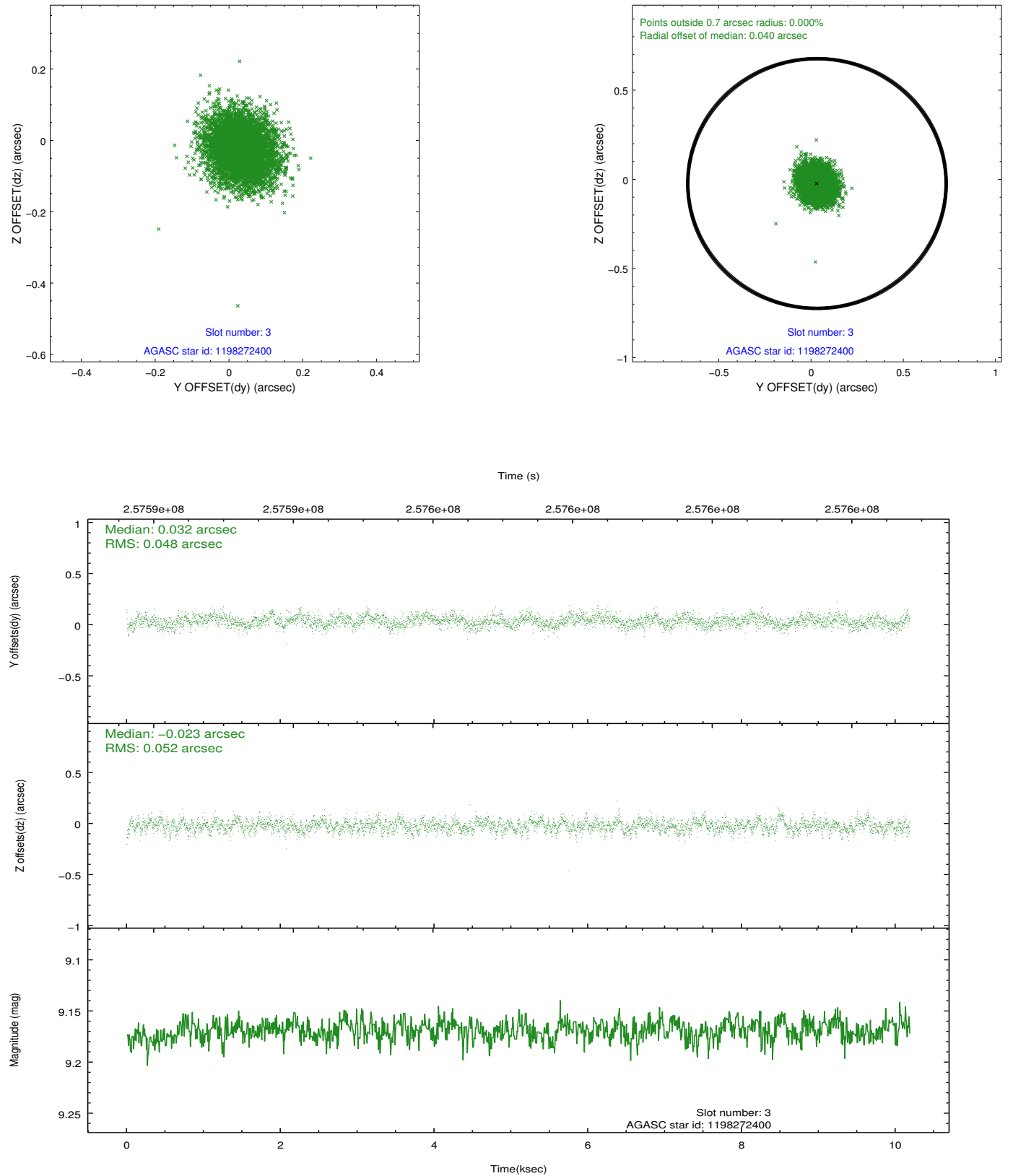


### Slot Statistics

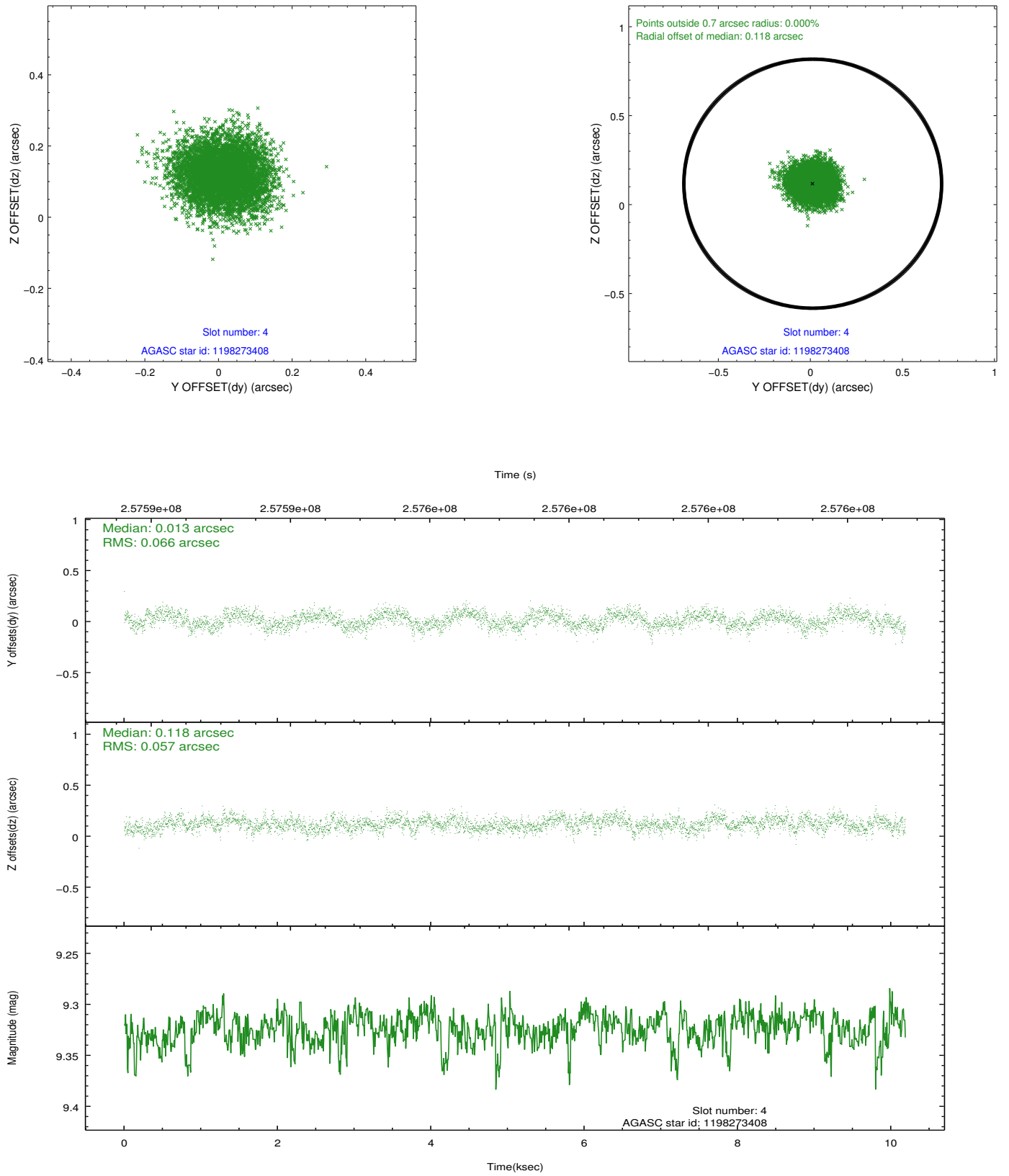
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-I-1	7.24	2485	0.055	0.002	0.017	0.034	0.000000	0.000000	930.17	-835.71
1	FID	ACIS-I-5	7.23	2485	-0.195	0.069	0.007	0.014	0.000000	0.000000	-1817.86	1061.65
2	FID	ACIS-I-6	7.25	2485	0.049	-0.000	0.015	0.030	0.000000	0.000000	395.20	1706.62
3	GUIDE	1198272400	9.17	4965	0.032	-0.023	0.075	0.123	20.411923	-73.620598	-1020.47	847.86
4	GUIDE	1198273408	9.32	4968	0.013	0.118	0.095	0.147	17.532323	-73.621495	1237.50	-1007.56
5	GUIDE	1198276744	8.61	4970	-0.169	0.002	0.089	0.141	19.489008	-74.153493	925.36	1710.51
6	GUIDE	1198282824	7.32	4968	0.002	-0.201	0.067	0.108	18.044095	-73.907062	1471.07	118.38
7	GUIDE	1198269920	8.26	4969	0.117	0.106	0.060	0.098	20.316466	-73.033728	-2326.39	-815.50

## 2.4 Star Slots

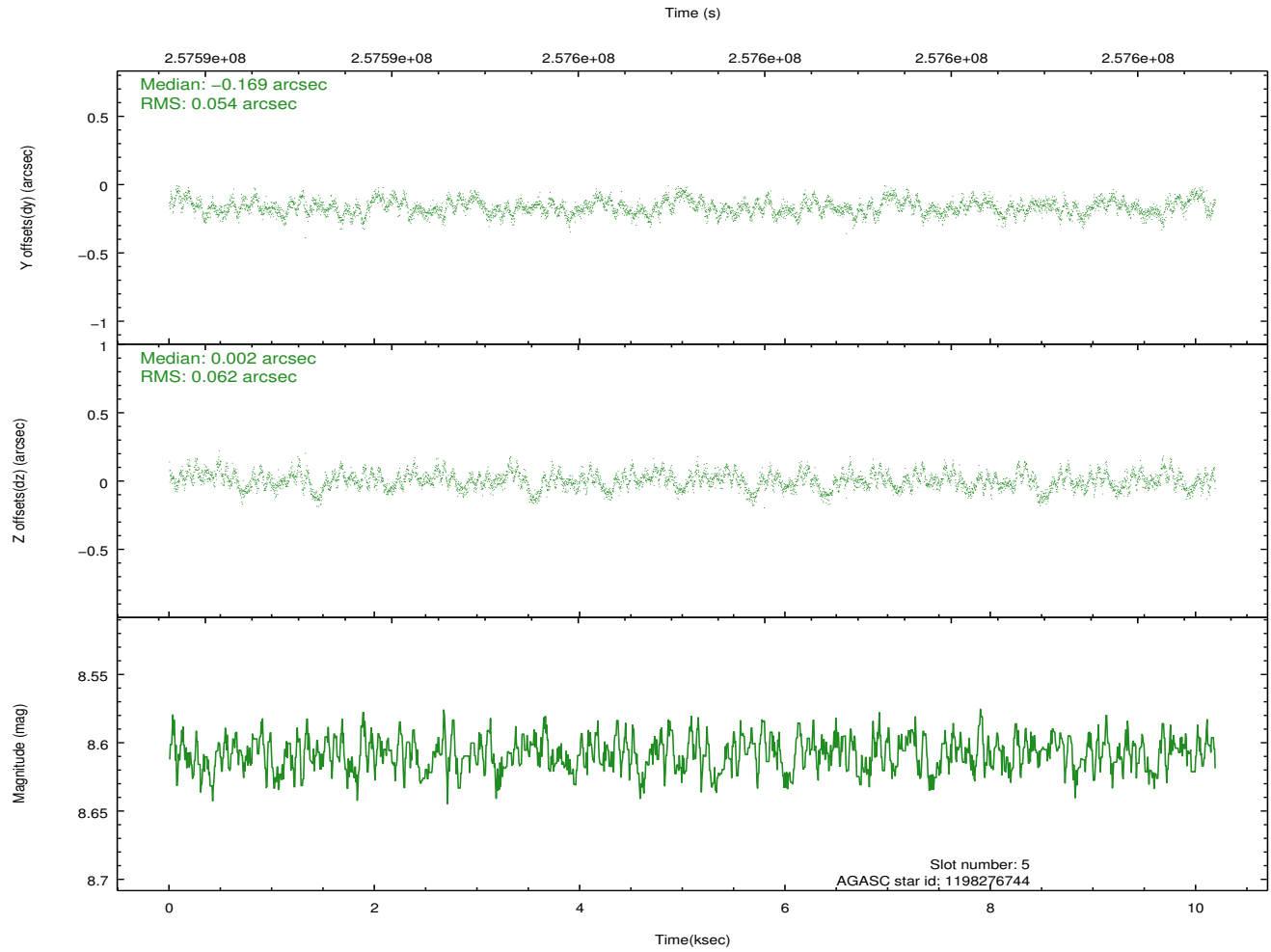
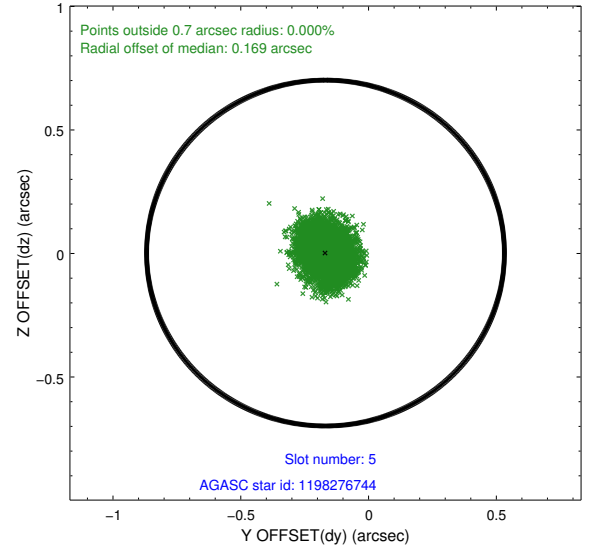
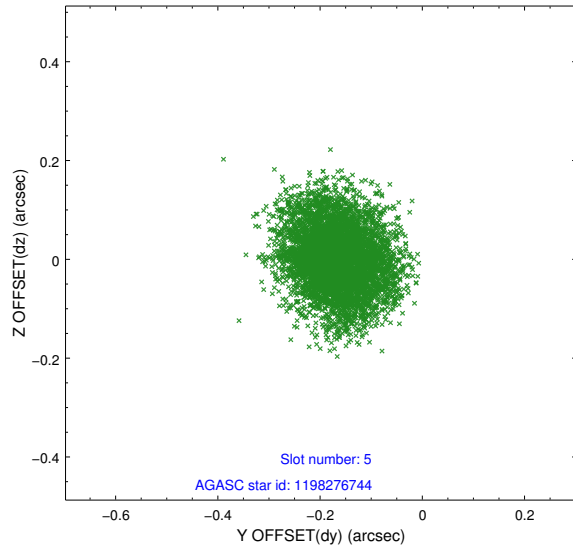
### 2.4.1 Slot 3



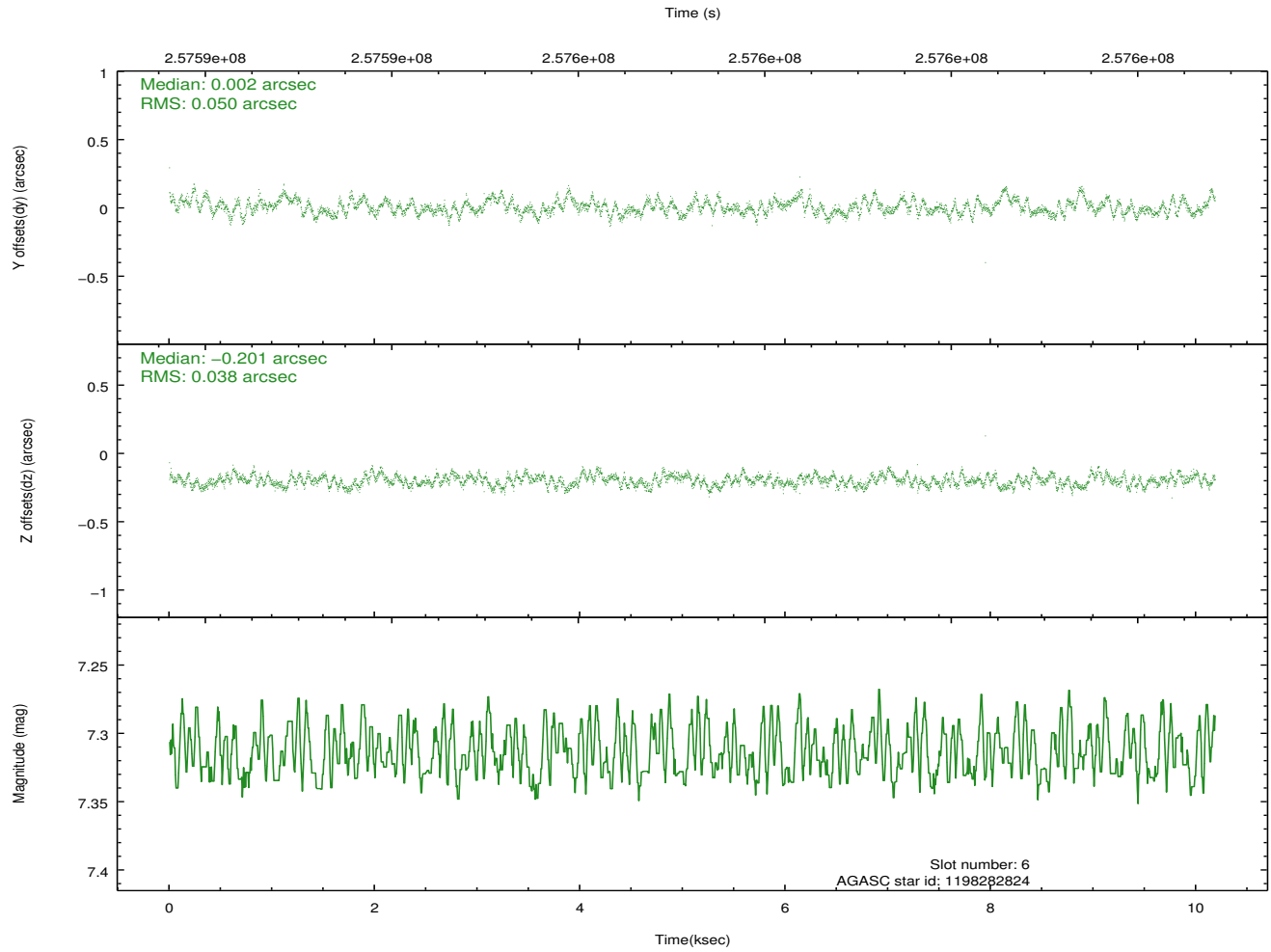
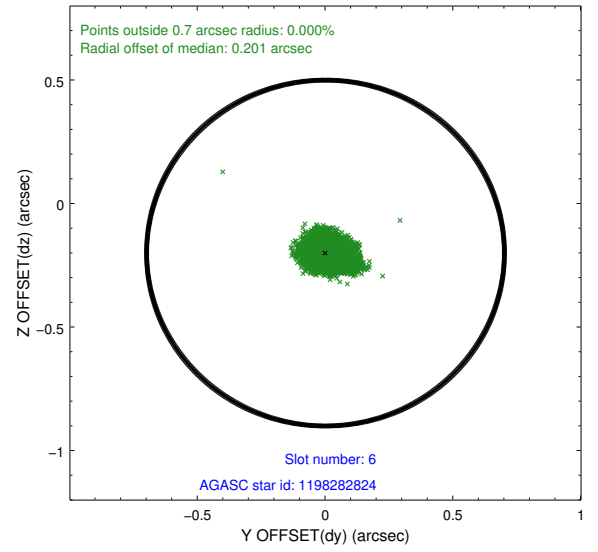
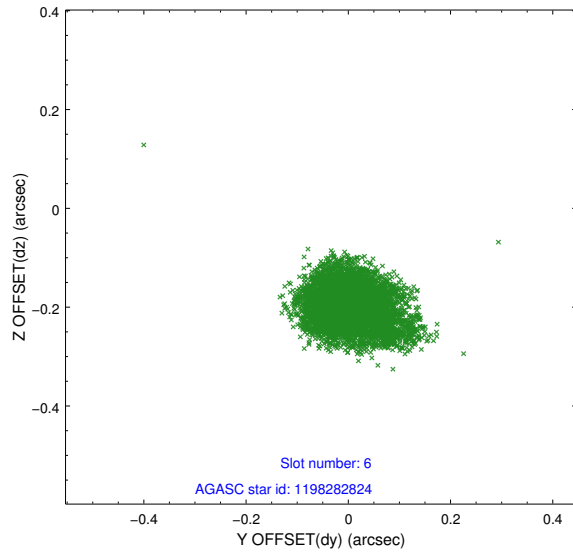
## 2.4.2 Slot 4



### 2.4.3 Slot 5

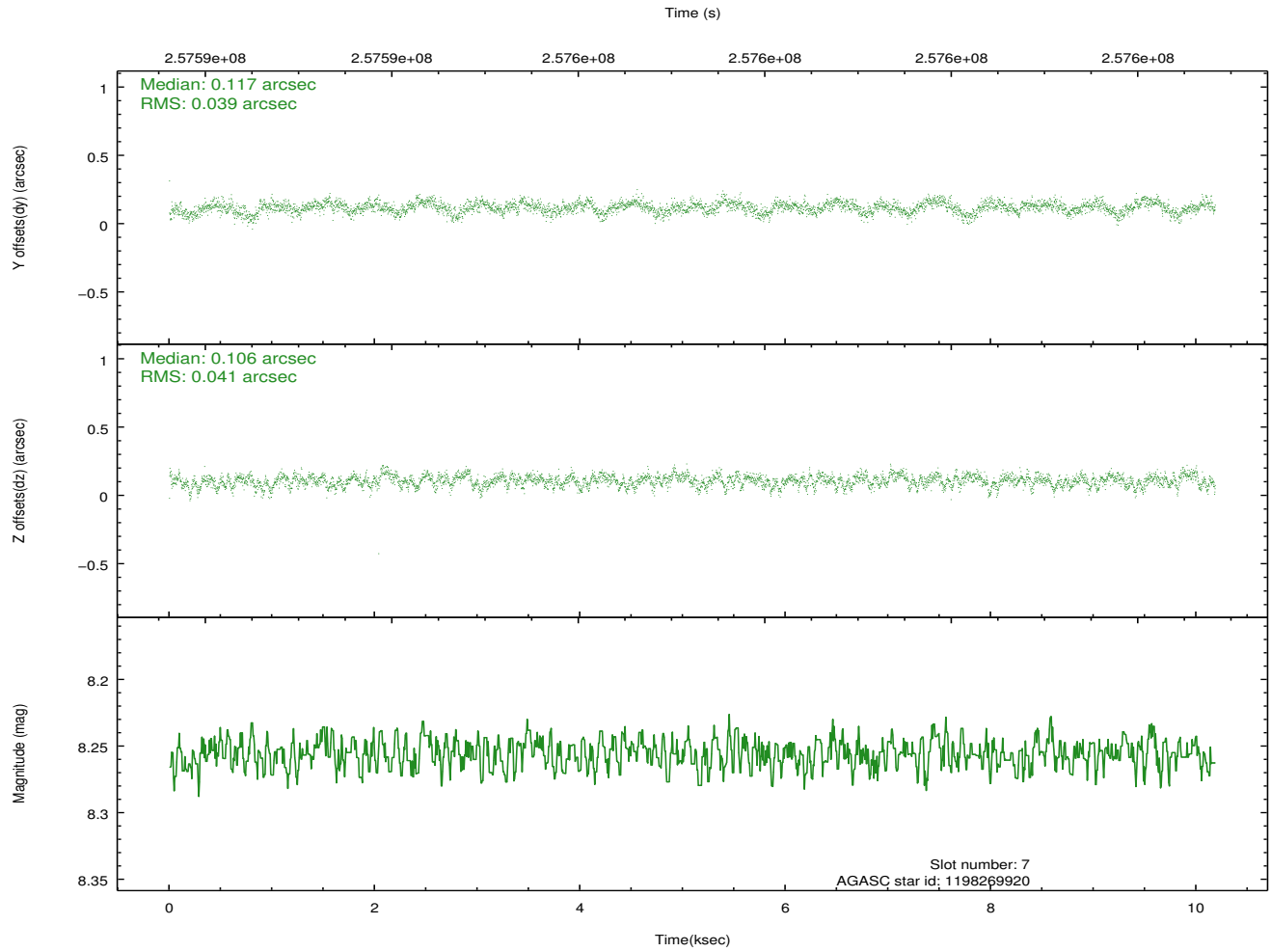
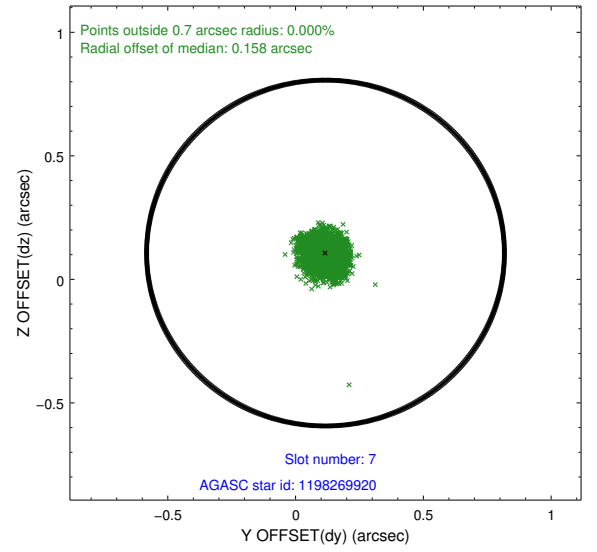
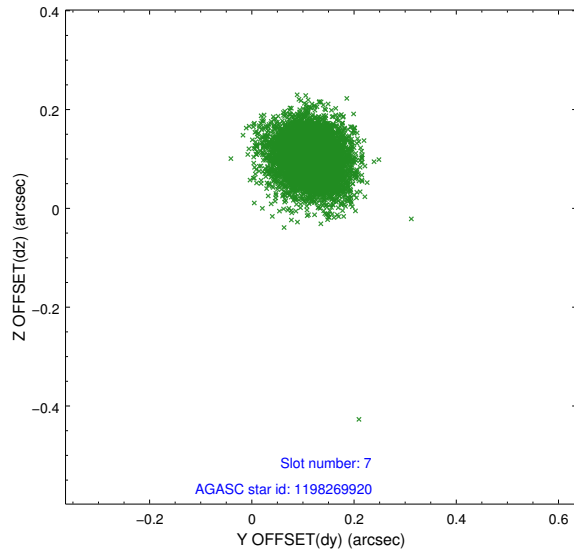


## 2.4.4 Slot 6



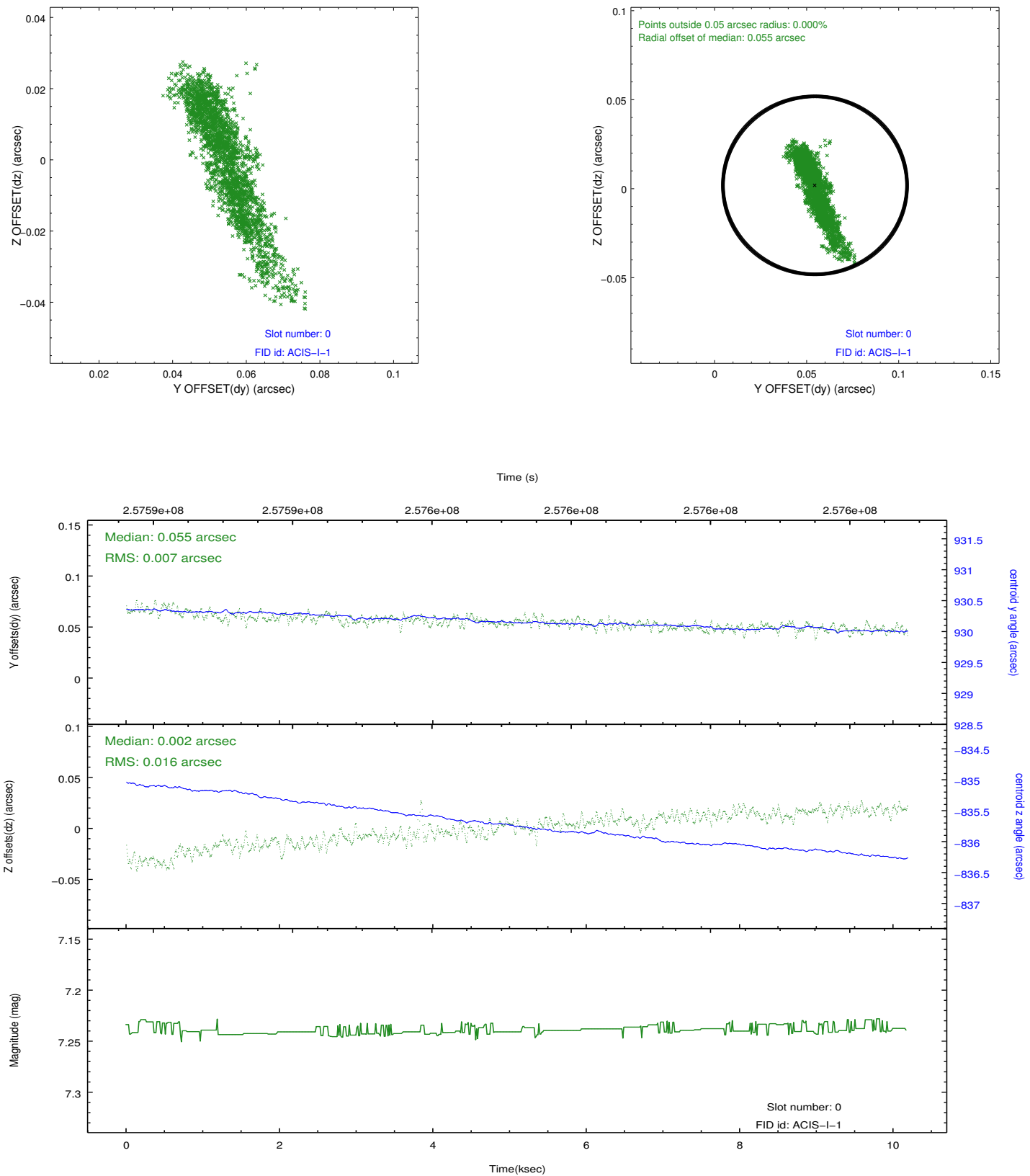


## 2.4.5 Slot 7

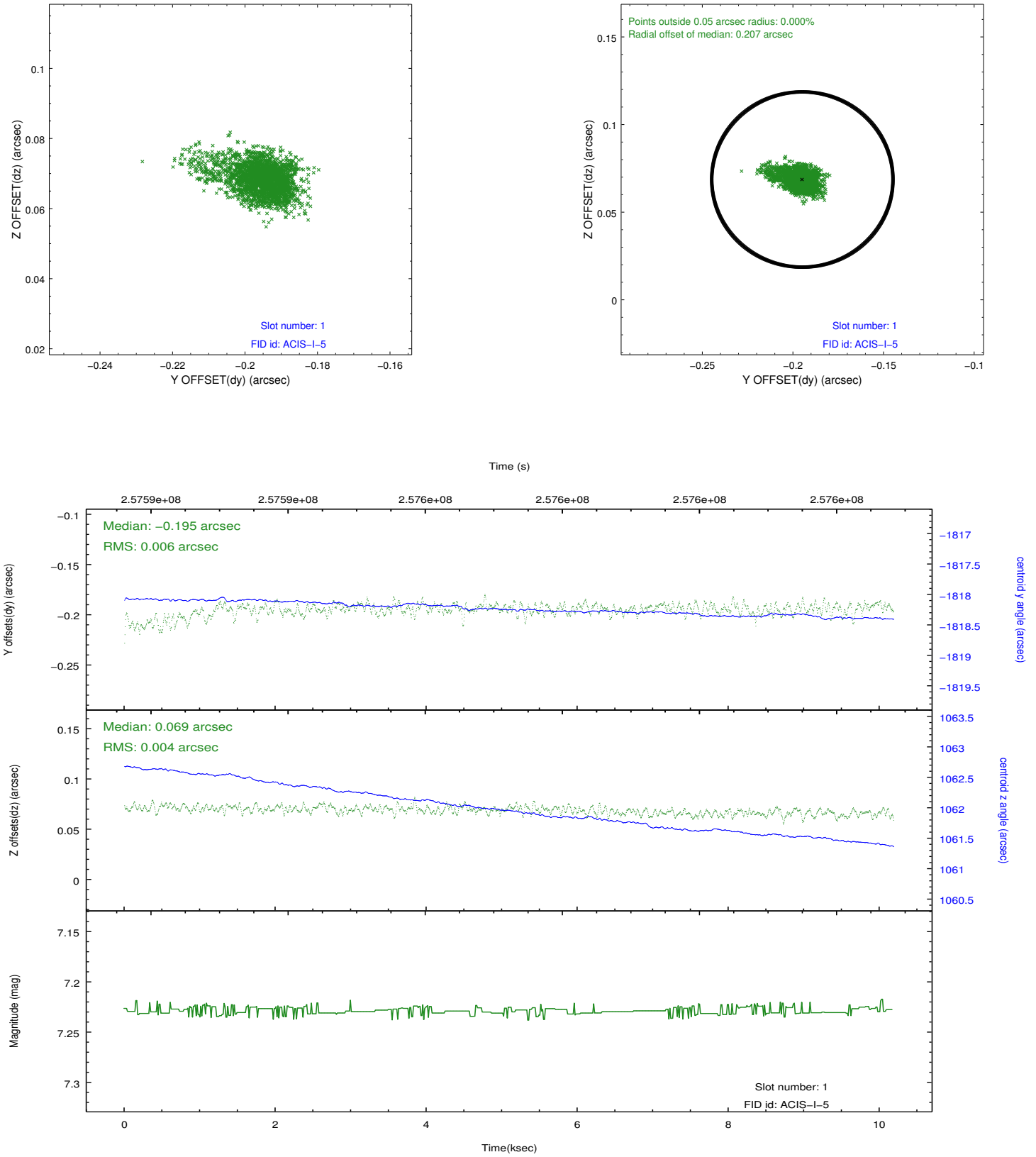


## 2.5 FID Slots

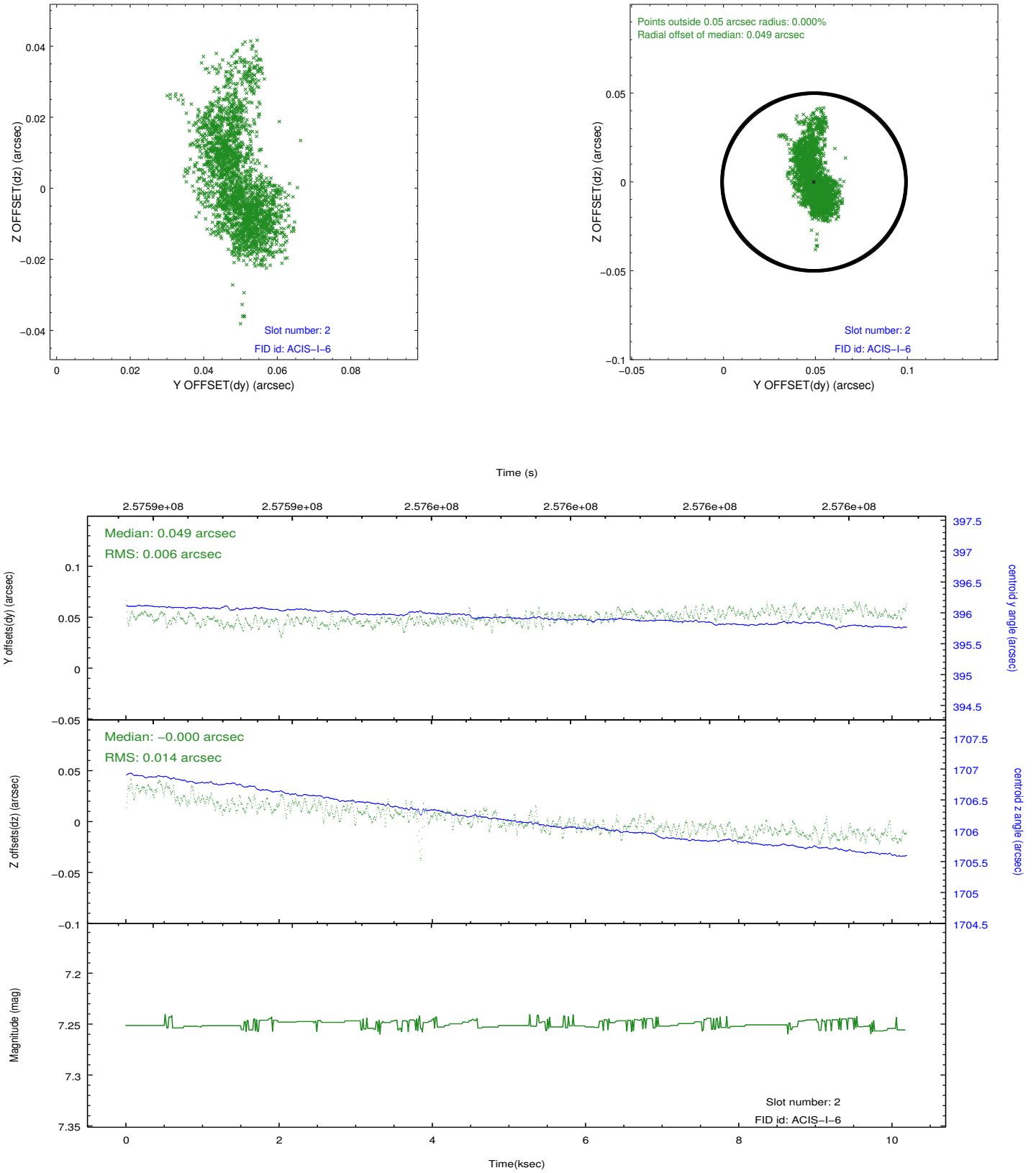
### 2.5.1 Slot 0



## 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	10.0351999

### A.2 Comments