

# V&V Reference Report

## L2 ASCDS Version : 7.6.7.1

Observation 5159 - L2 Version 001  
Chandra X-Ray Center

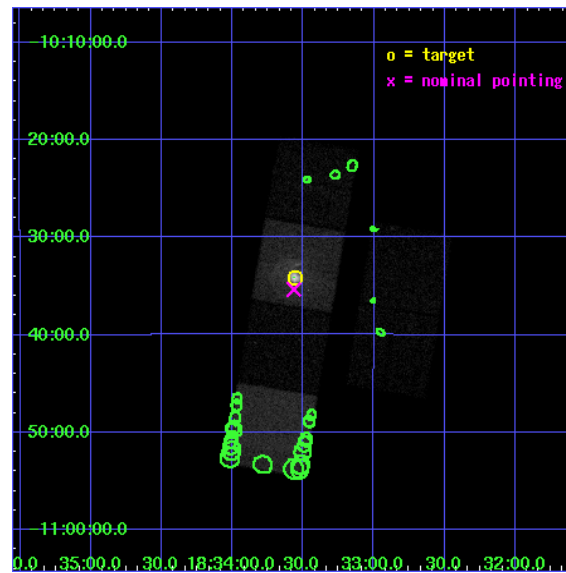
L2 Processing Date : Apr 13 2006

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# 1 Front

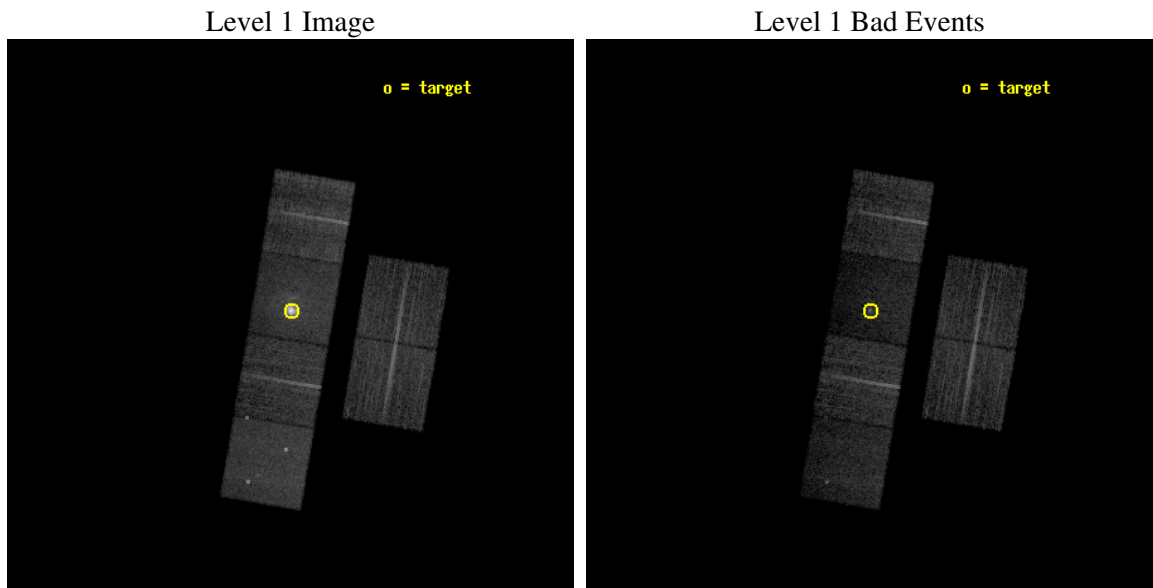
seq_num	590357
obs_id	5159
title	AO5B Observations of the Standard Candles Cas A and G21.5-09
observer	Dr. CXC Calibration
object	G21.5-09[S3,-120,-1.0,0,0]
dtcycle	0
cycle	P
ra_targ	278.389583
dec_targ	-10.568528
ra_nom	278.39139127788
dec_nom	-10.589177373163
roll_nom	279.66616632305
revision	3
ontime	9955.199962914
livetime	9829.1412266818
ontime2	9955.199962914
ontime3	9955.199962914
ontime5	9955.199962914
ontime6	9955.199962914
ontime7	9955.199962914
ontime8	9955.199962914
l2events	119916



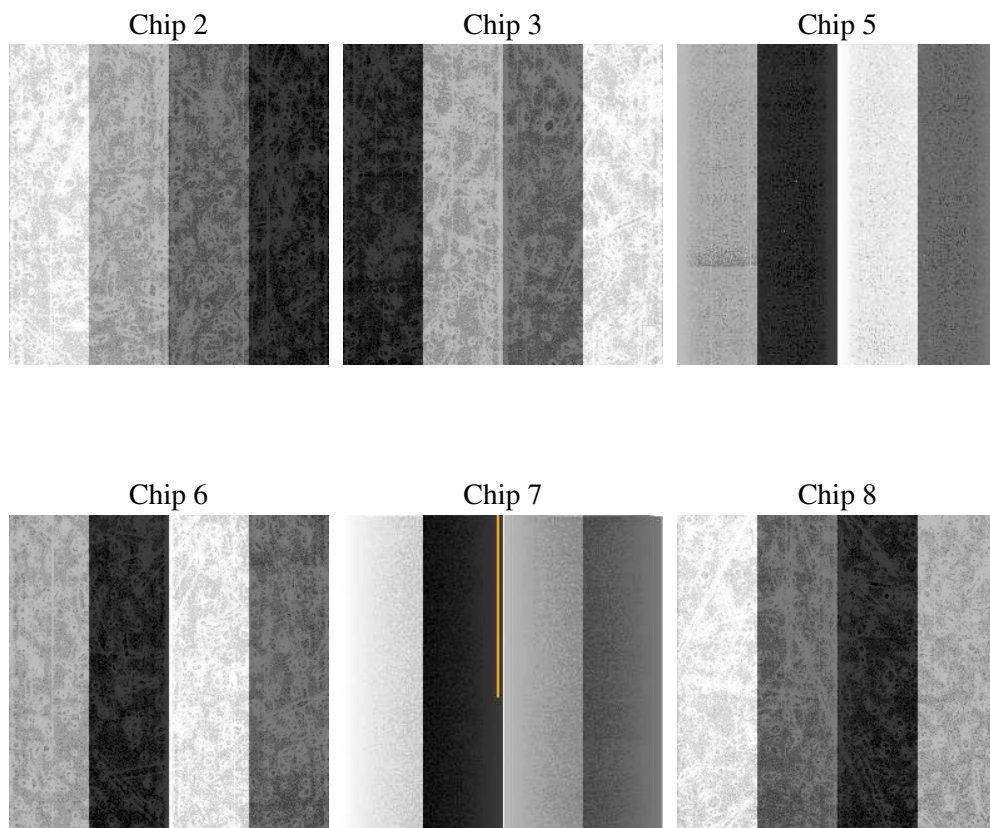
## 2 OBI

### 2.1 OBI

#### 2.1.1 Images



#### 2.1.2 Bias



### 2.1.3 Parameters

obi_num	0
ascdsver	7.6.7.1
caldbver	3.2.1
date	2006-04-13T09:17:10
revision	3

sched_exp_time	10000.000000
ontime	9959.5950065553
ontime2	9959.5950065553
ontime3	9959.5950065553
ontime5	9959.5950065553
ontime6	9959.5950065553
ontime7	9959.5950065553
ontime8	9959.594976604
l1events	441631

### 2.1.4 Events

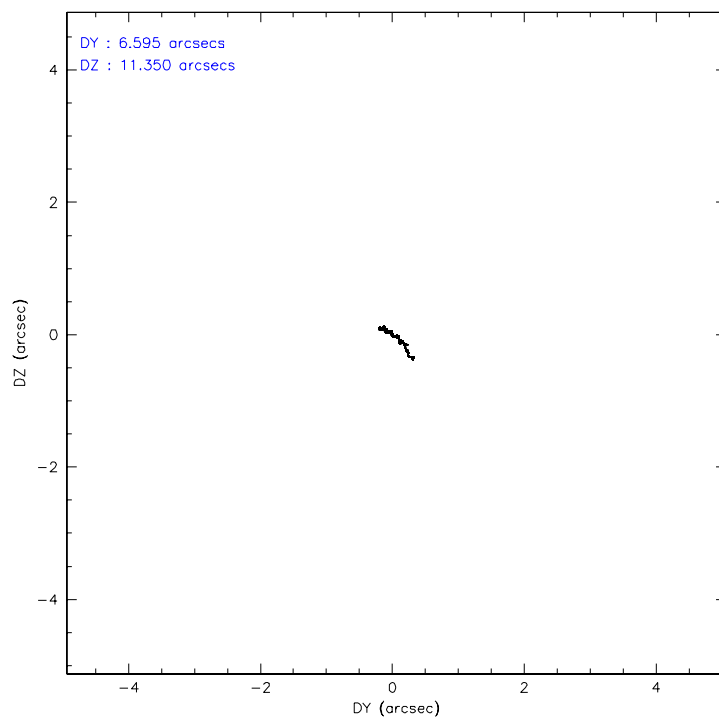
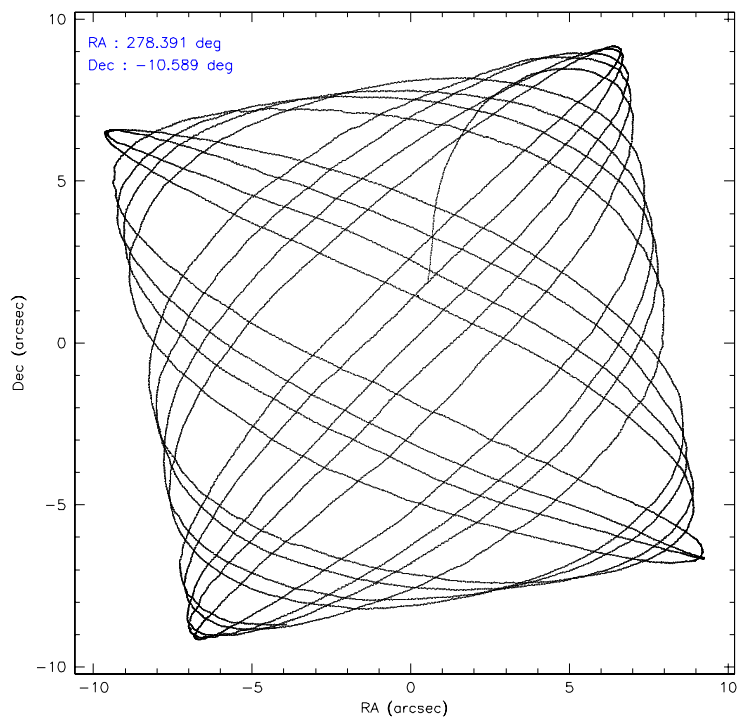
	ccd 2	ccd 3	ccd 5	ccd 6	ccd 7	ccd 8
level 1 events	67052	62062	75622	64915	94721	77259
rejected events	60772	55956	37085	58051	32525	58323
rejected %	90%	90%	49%	89%	34%	75%

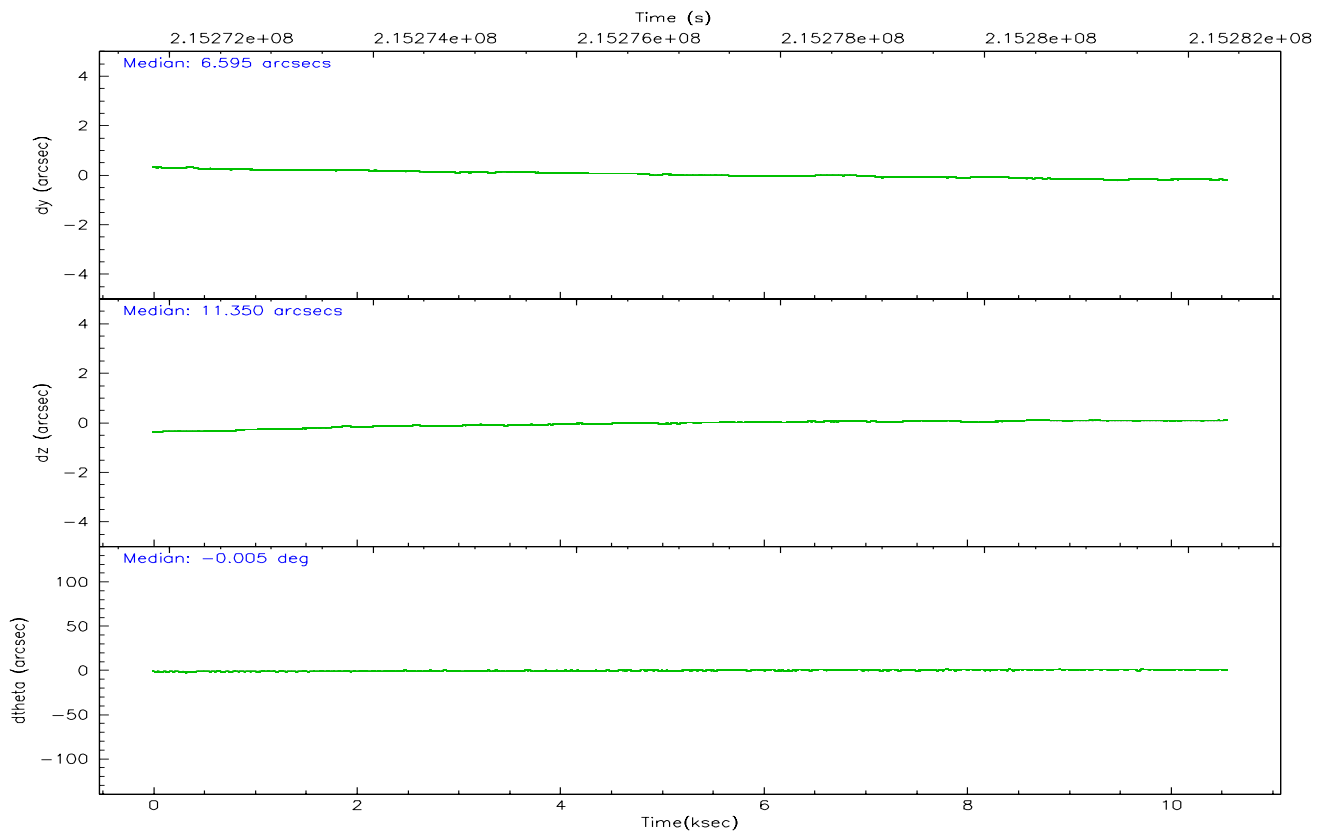
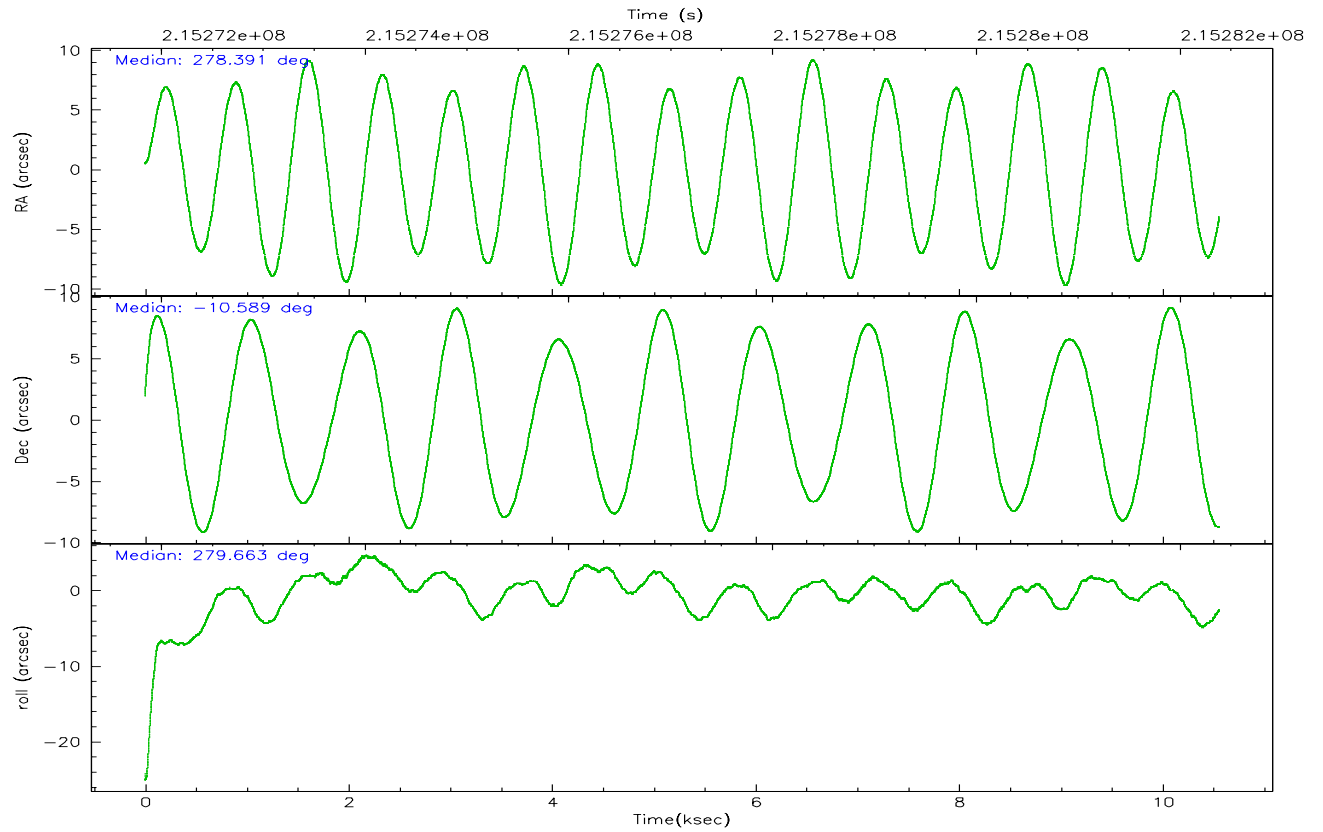
	ccd 2	ccd 3	ccd 5	ccd 6	ccd 7	ccd 8
grade 0 events	2427	2498	3246	2695	8767	5849
	3%	4%	4%	4%	9%	7%
grade 1 events	27	22	59	30	87	61
	0%	0%	0%	0%	0%	0%
grade 2 events	1474	1216	12290	1445	16737	4285
	2%	1%	16%	2%	17%	5%
grade 3 events	685	671	1127	742	5401	1984
	1%	1%	1%	1%	5%	2%
grade 4 events	674	664	1088	677	5121	1842
	1%	1%	1%	1%	5%	2%
grade 5 events	1623	1986	4232	2023	4977	3094
	2%	3%	5%	3%	5%	4%
grade 6 events	1023	1061	20796	1309	26188	5024
	1%	1%	27%	2%	27%	6%
grade 7 events	59119	53944	32784	55994	27443	55120
	88%	86%	43%	86%	28%	71%

## 2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	6	6
Detector	ACIS-235678	ACIS-235678	Obspar file type	PREDICTED	ACTUAL
Grating	NONE	NONE	Obspar update status	NONE	UPDATED
Data mode	VFAINT	VFAINT	On-chip summing requested	N	N
Observation mode	POINTING	POINTING	Subarray requested	NONE	NONE
Pointing RA	278.373418	278.3913912778811	Alternating exposures requested	N	N
Pointing Dec	-10.568488	-10.58917737316285	Primary exposure time	0.000000	3.2
Pointing Roll	279.506262	279.6661663230515			
Window start time	212976064.184000	212976064.184000			
Window stop time	218160064.184000	218160064.184000			
SIM focus pos (mm)	-0.684267	-0.6828225247311905			
SIM defocus (mm)	0	0.001444936568705701			
SIM translation stage pos (mm)	-190.132523	-190.1400660498719			
SIM translation stage offset (mm)	0	0.00754346686406393			
Observation start time	215272391.184000	215271241.17044			
Observation start date	2004-10-27T13:52:07	2004-10-27T13:34:01			
Observation end time	215282391.184000	215283039.43347			
Observation end date	2004-10-27T16:38:47	2004-10-27T16:50:39			
Read mode	TIMED	TIMED			

## 2.3 Aspect





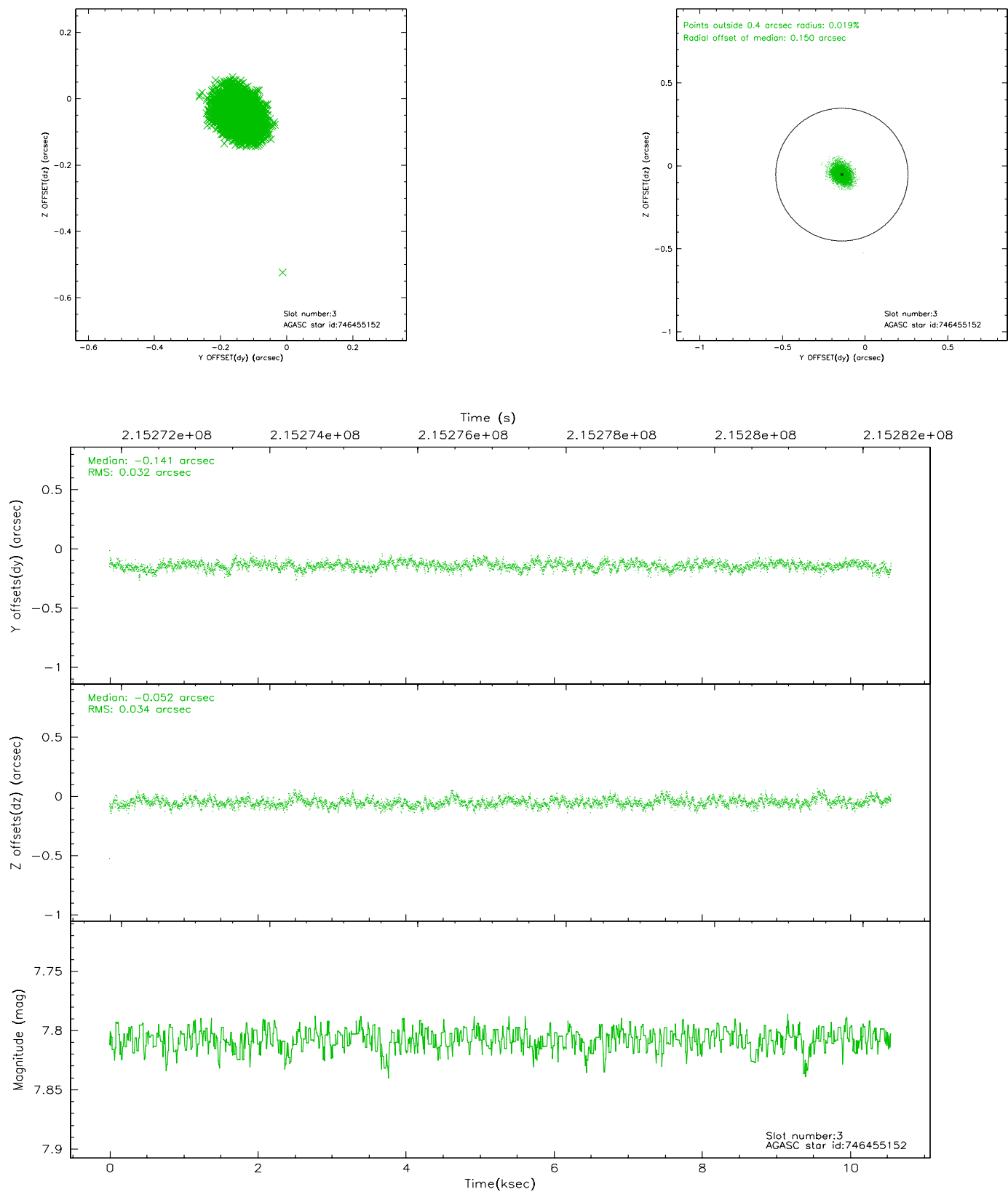
### Slot Statistics

slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-S-2	7.09	2575	-0.037	0.010	0.006	0.010	0.000000	0.000000	-759.38	-1732.59
1	FID	ACIS-S-4	7.21	2575	0.026	0.015	0.007	0.013	0.000000	0.000000	2153.71	175.42
2	FID	ACIS-S-5	7.23	2576	-0.021	-0.016	0.007	0.013	0.000000	0.000000	-1811.60	169.58
3	GUIDE	746455152	7.81	5151	-0.141	-0.052	0.049	0.081	278.447893	-9.976732	-2057.52	612.25
4	GUIDE	746460272	8.93	5147	-0.048	0.008	0.095	0.152	278.847488	-10.152127	-1200.13	1904.44
5	GUIDE	746460328	9.77	5145	-0.146	0.129	0.122	0.196	278.603974	-9.898096	-2244.94	1205.42
6	GUIDE	746462392	8.54	5148	0.122	0.008	0.080	0.122	279.038421	-10.890715	1535.57	2127.58
7	GUIDE	746995400	9.50	5140	0.220	-0.097	0.129	0.207	278.078957	-11.289885	2390.89	-1453.78

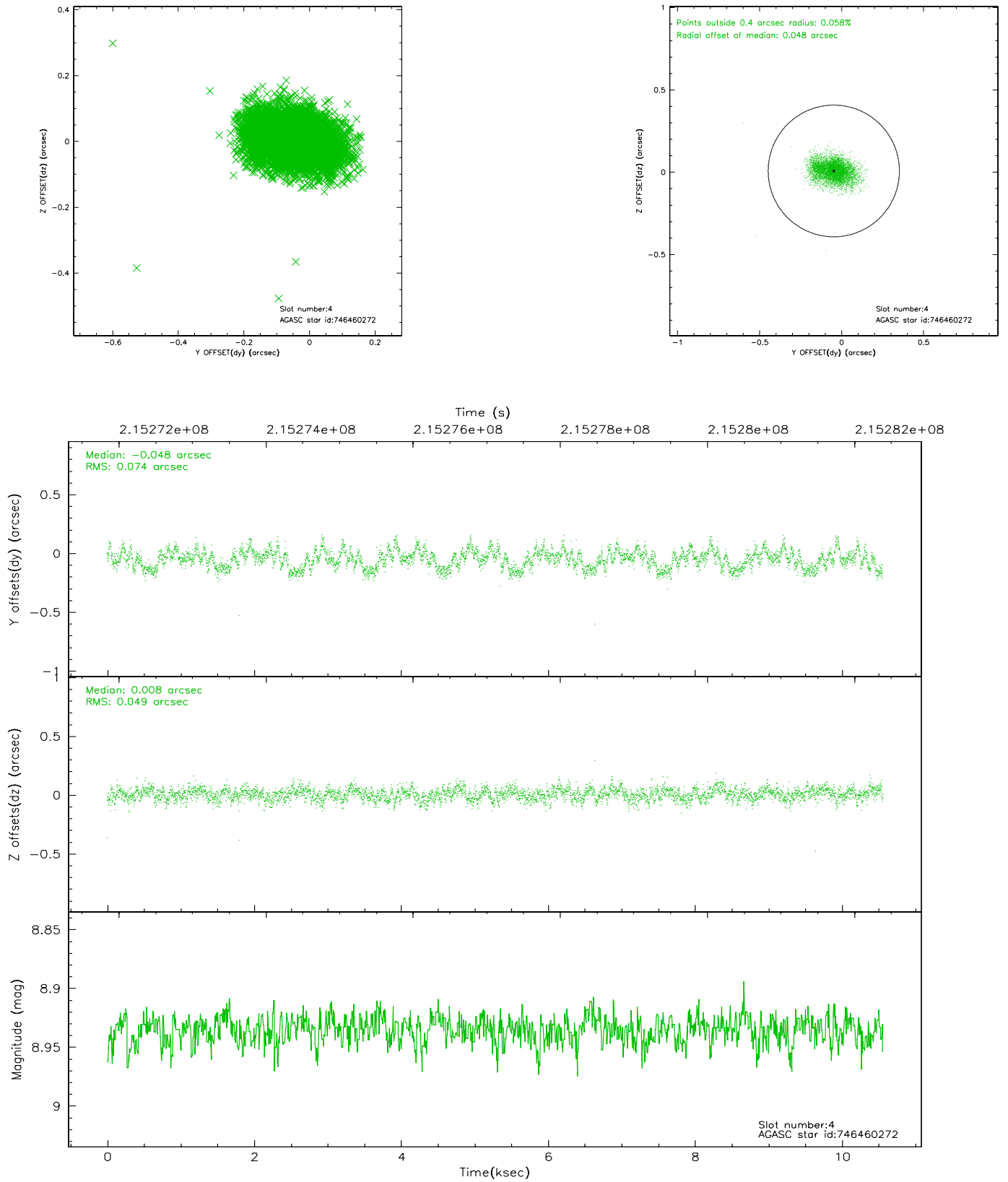


## 2.4 Star Slots

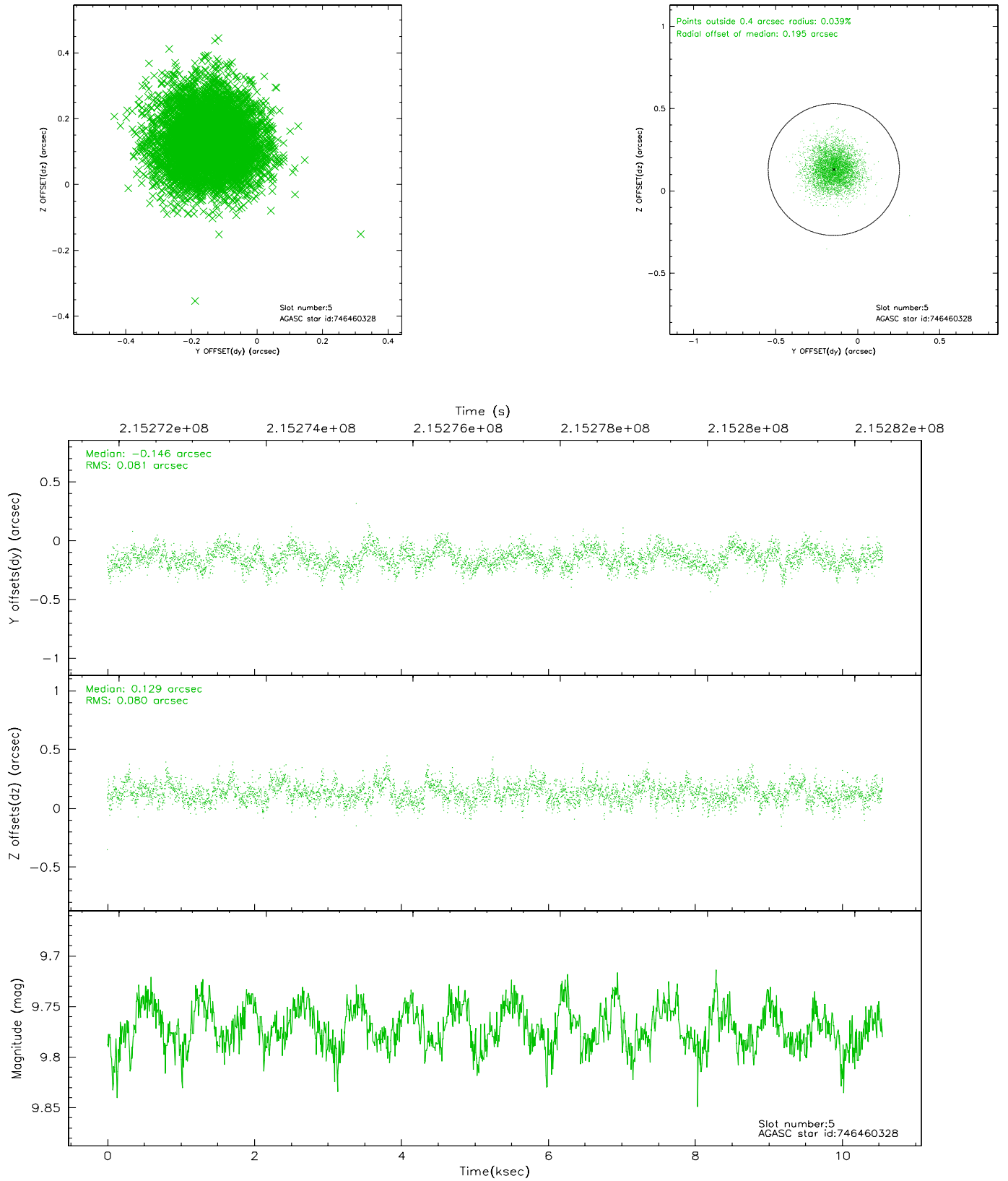
### 2.4.1 Slot 3



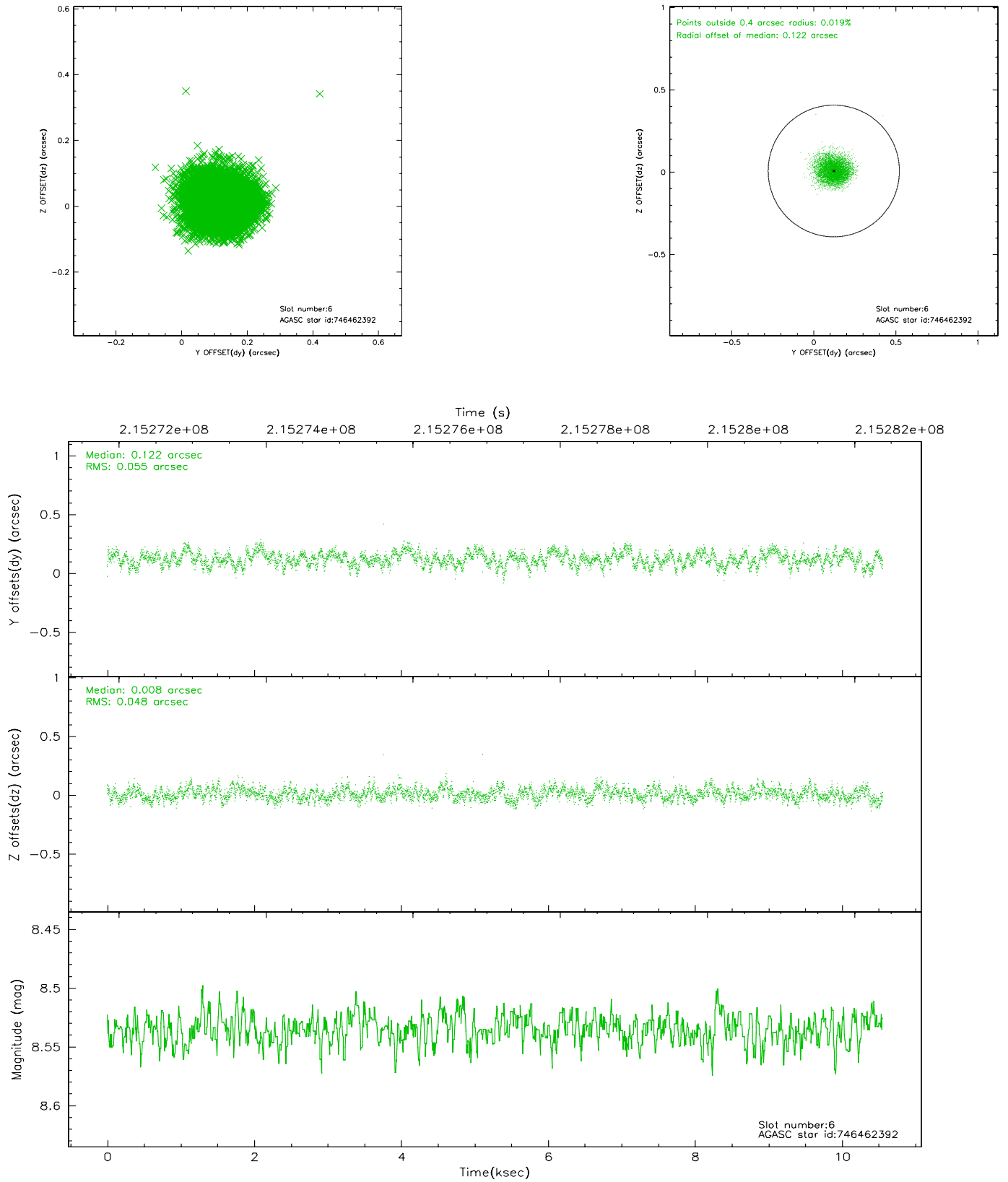
## 2.4.2 Slot 4



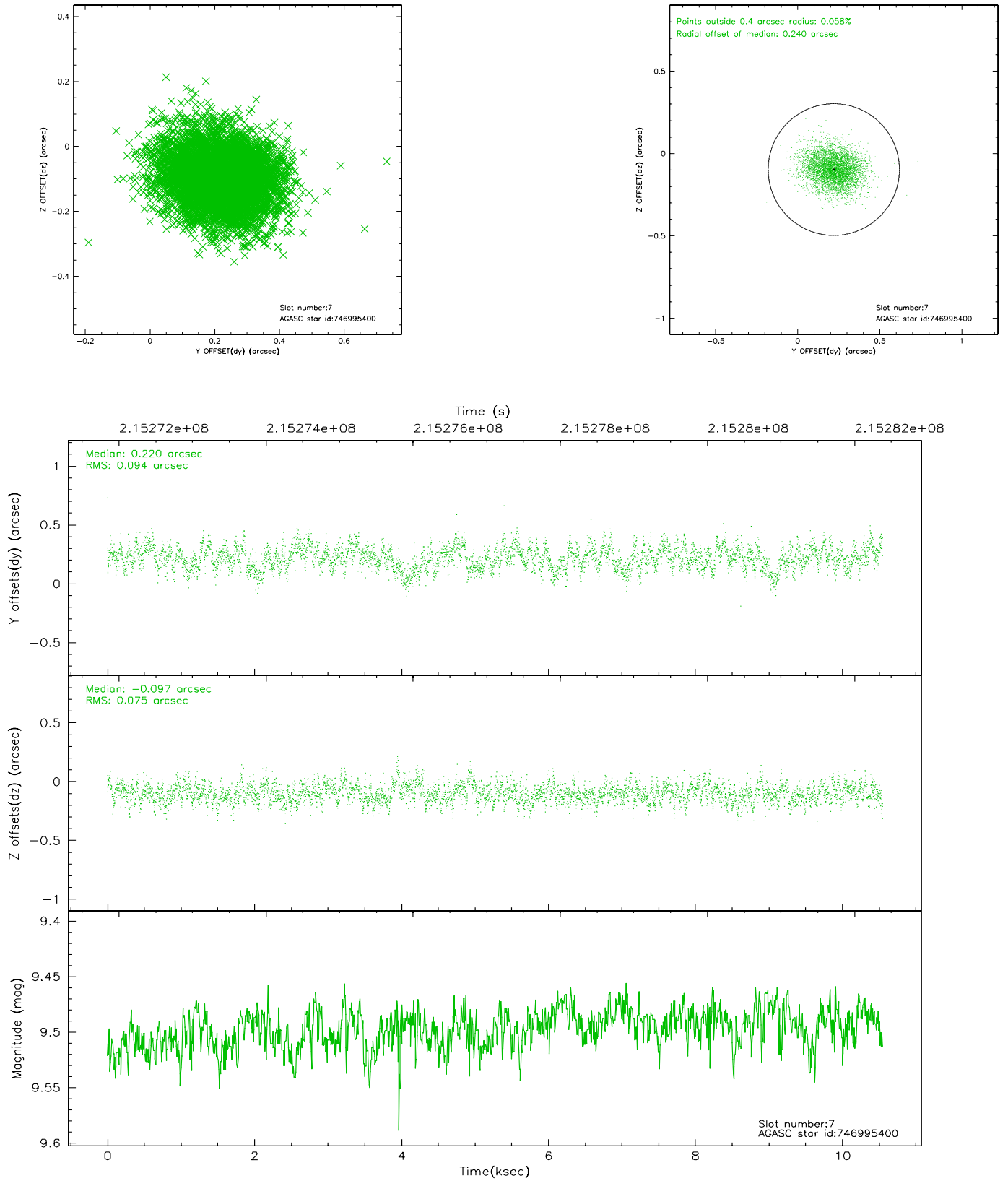
### 2.4.3 Slot 5



## 2.4.4 Slot 6

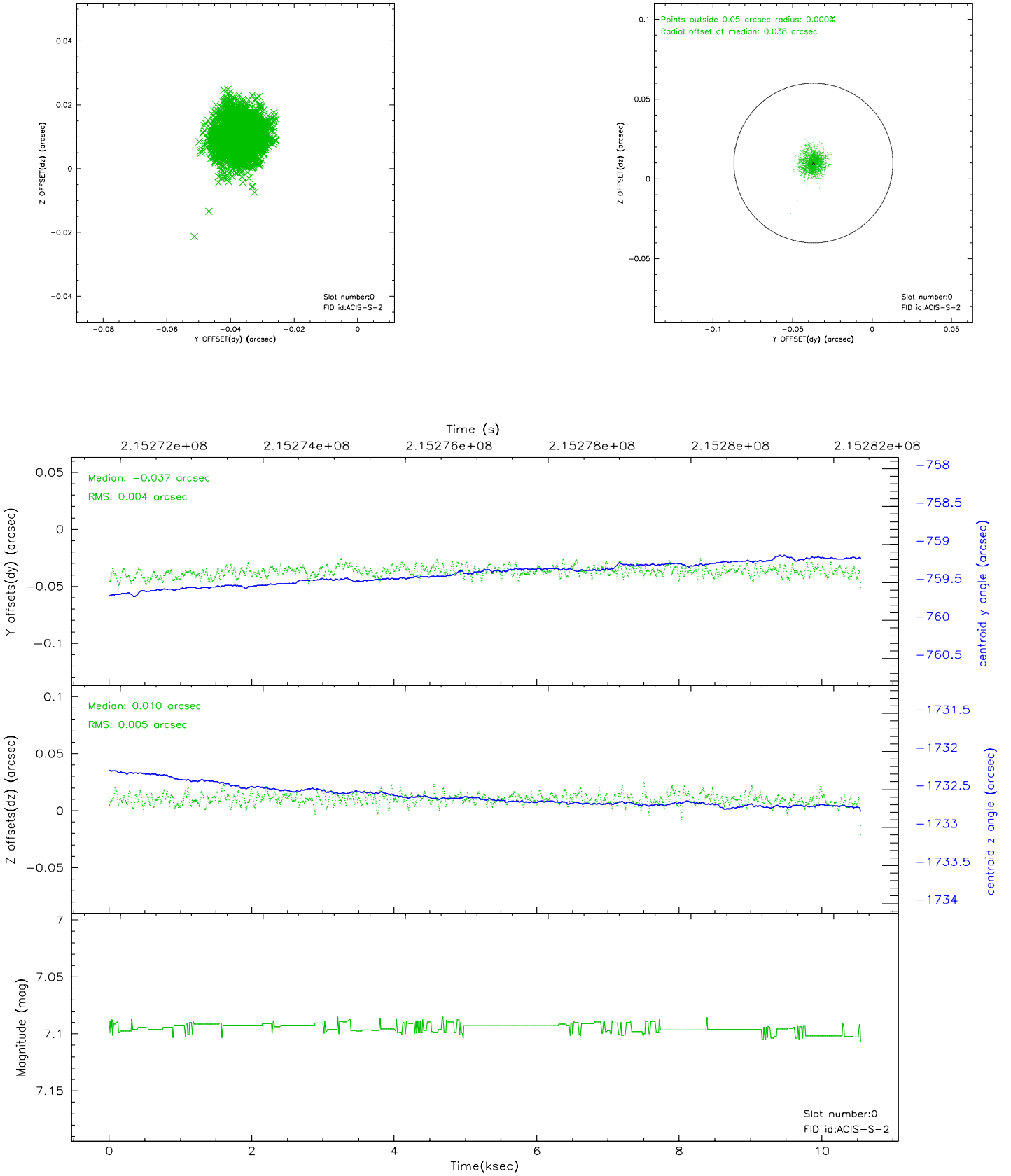


## 2.4.5 Slot 7

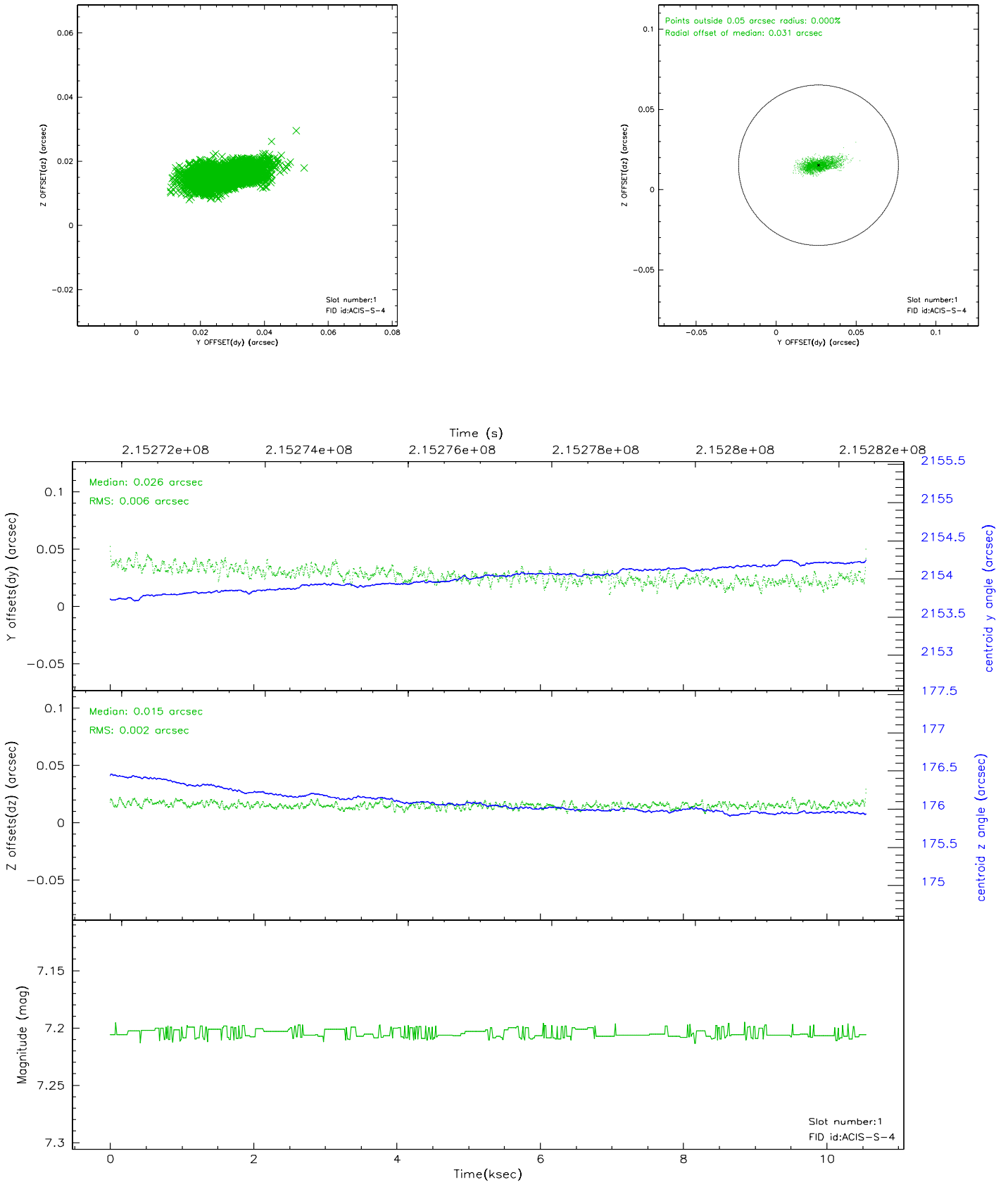


## 2.5 FID Slots

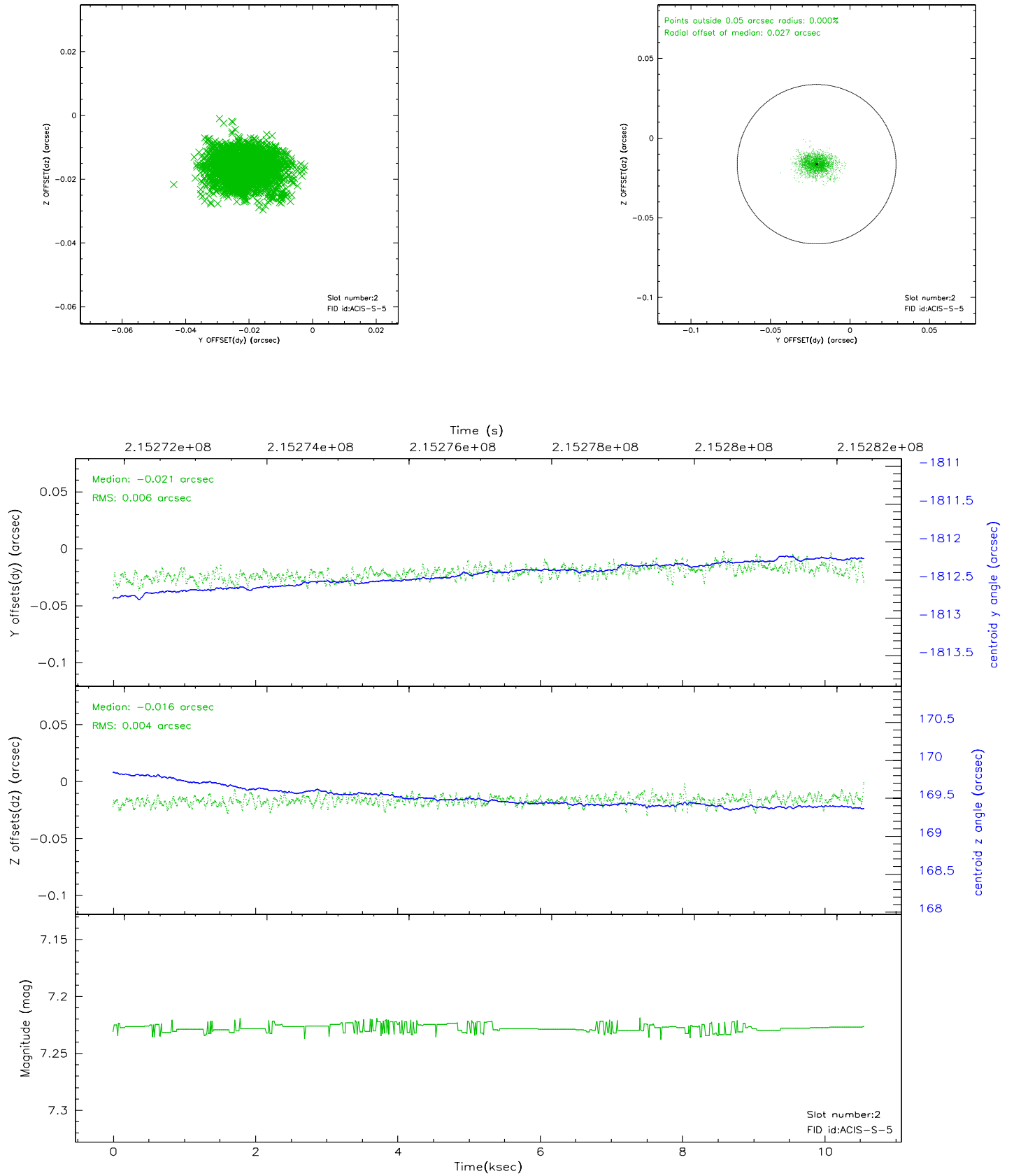
### 2.5.1 Slot 0



## 2.5.2 Slot 1

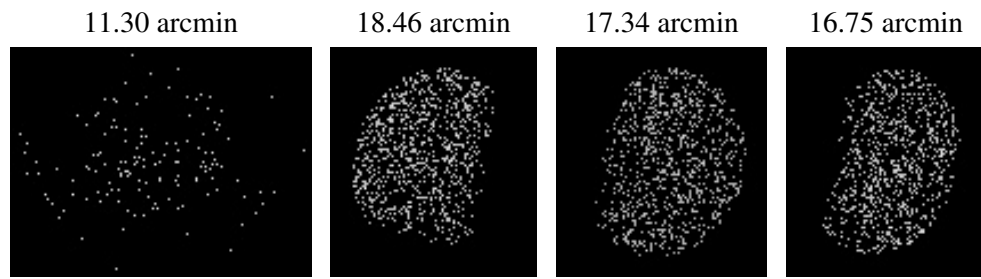


### 2.5.3 Slot 2





### 3 Point Sources



## A Summary

### A.1 Status

V&V Scientist	Jen Lauer
V&V Date (YYYY-MM-DD)	2006.04.13
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	9.955

### A.2 Comments

Window constraint met.