

V&V Reference Report

L2 ASCDS Version : 10.1.1

Observation 16326 - L2 Version 2
Chandra X-Ray Center

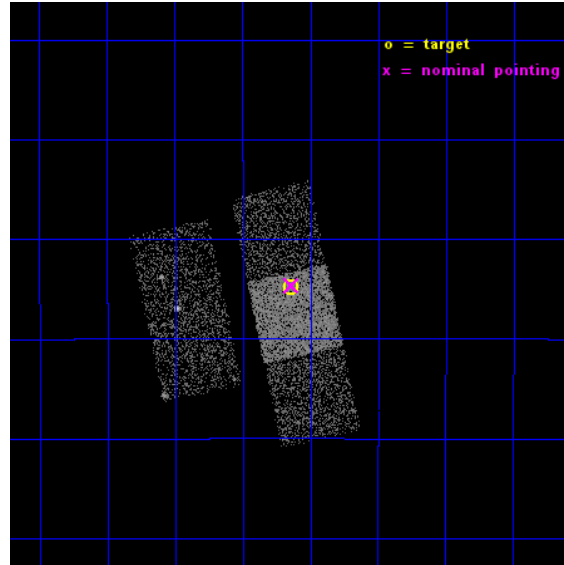
L2 Processing Date : Dec 9 2014

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1 Front

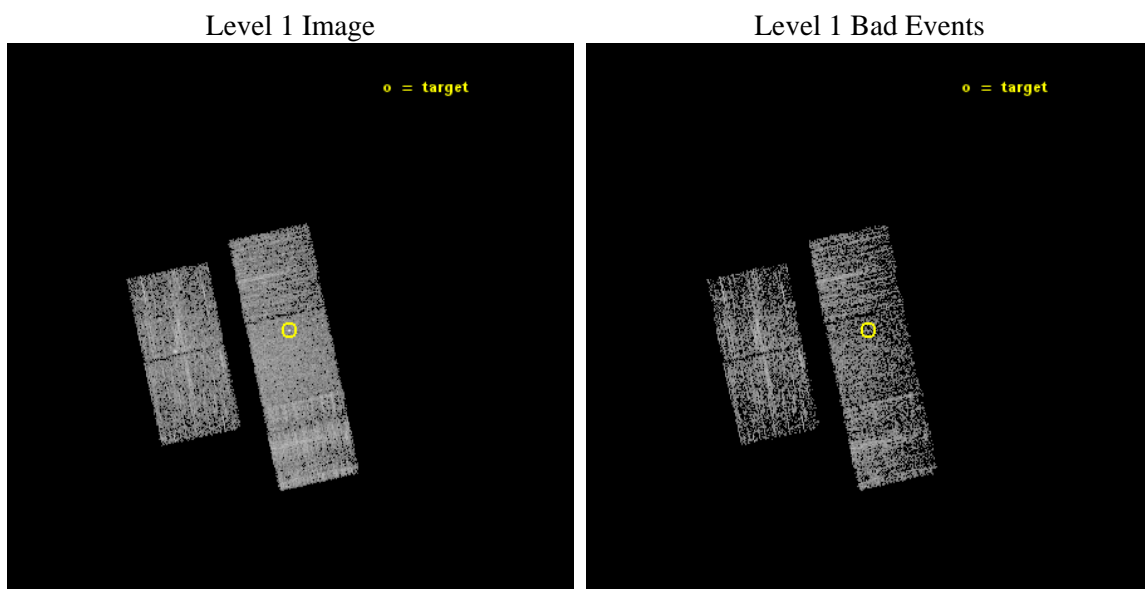
seq_num	200952	Sequence number
obs_id	16326	Observation id
title	X-rays and Disks around Upper Sco Stars	Proposal title
observer	Professor Gordon Garmire	Principal investigator
object	US 16110890-1904468	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	242.787083	Observer's specified target RA [deg]
dec_targ	-19.079667	Observer's specified target Dec [deg]
ra_nom	242.78488032037	Nominal RA [deg]
dec_nom	-19.077525222771	Nominal Dec [deg]
roll_nom	77.849491303716	Nominal Roll [deg]
revision	2	Processing version of data
ontime	3070.9335514307	Sum of GTIs [s]
livetime	3030.8095437929	Livetime [s]
ontime2	3070.7693914175	Sum of GTIs [s]
ontime3	3067.7104811668	Sum of GTIs [s]
ontime6	3070.8925114274	Sum of GTIs [s]
ontime7	3070.9335514307	Sum of GTIs [s]
ontime8	3070.8104314208	Sum of GTIs [s]
l2events	15234	Number of level 2 events



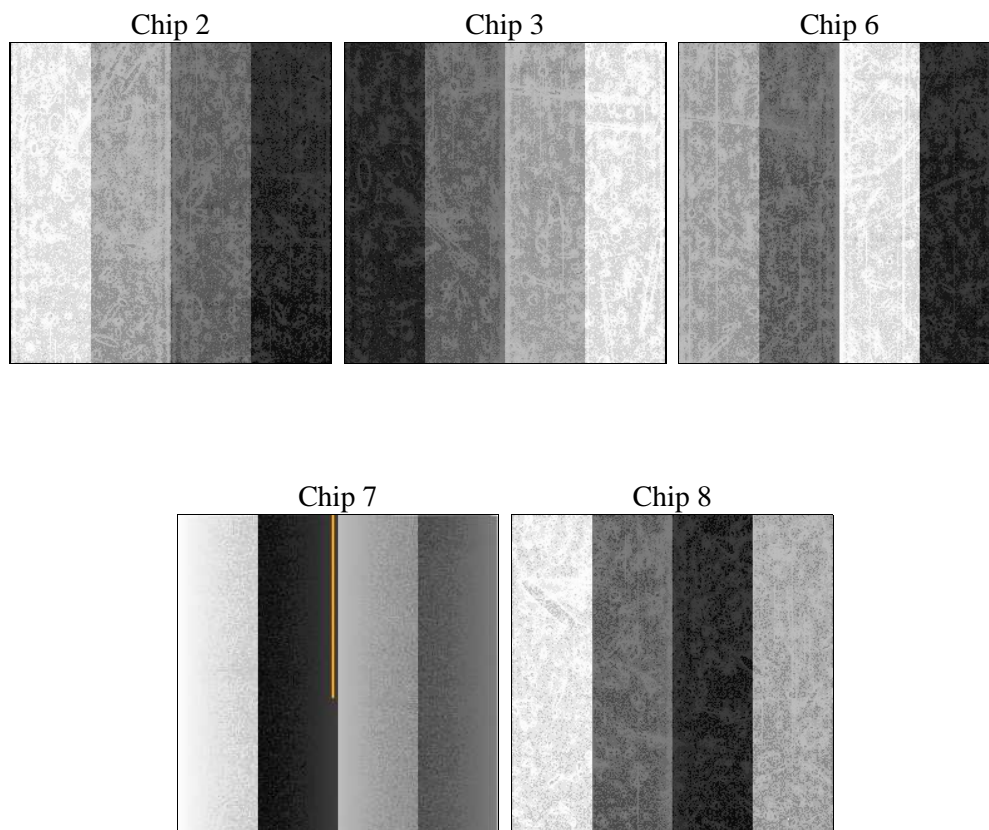
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	3000.000000	[s] Scheduled observation exposure time
ascdsver	10.3.1	Processing system revision	ontime	3070.9335514307	Sum of GTIs [s]
caldsver	4.6.4	 	ontime2	3070.7693914175	Sum of GTIs [s]
date	2014-12-09T21:47:08	Date and time of file creation	ontime3	3067.7104811668	Sum of GTIs [s]
revision	2	Processing version of data	ontime6	3070.8925114274	Sum of GTIs [s]
			ontime7	3070.9335514307	Sum of GTIs [s]
			ontime8	3070.8104314208	Sum of GTIs [s]
			l1events	90030	Number of level 1 events

2.1.4 Events

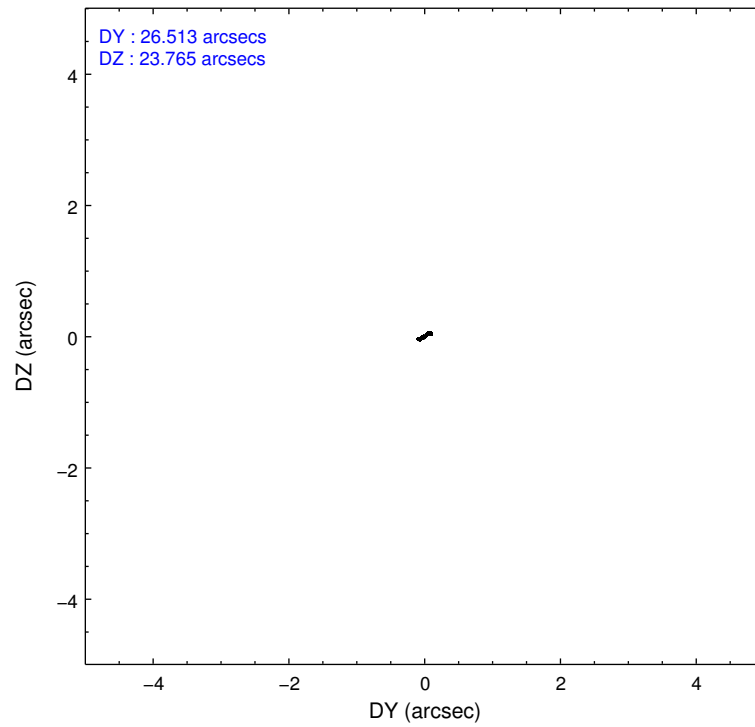
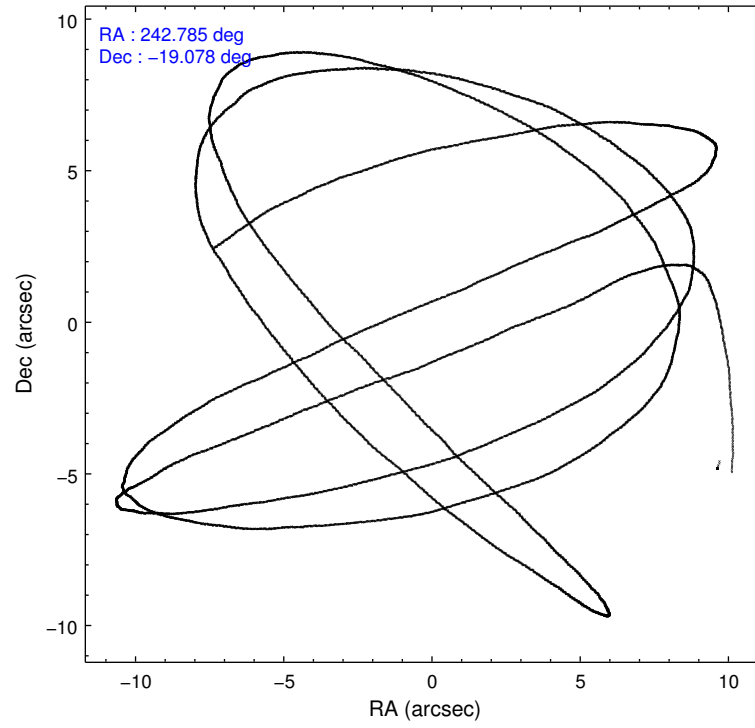
	ccd 2	ccd 3	ccd 6	ccd 7	ccd 8
level 1 events	15895	15062	14956	20068	24049
rejected events	13742	13348	13125	11218	14464
rejected %	86%	88%	87%	55%	60%

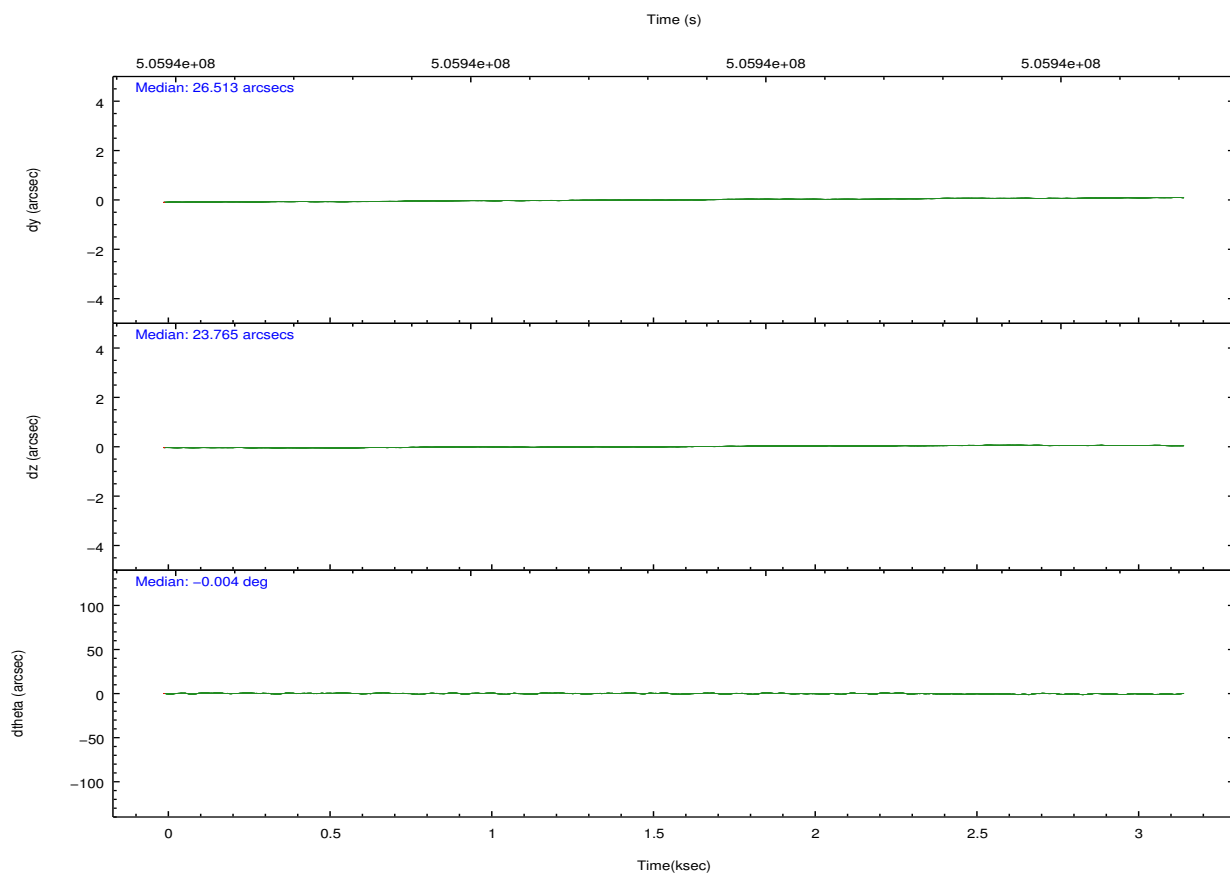
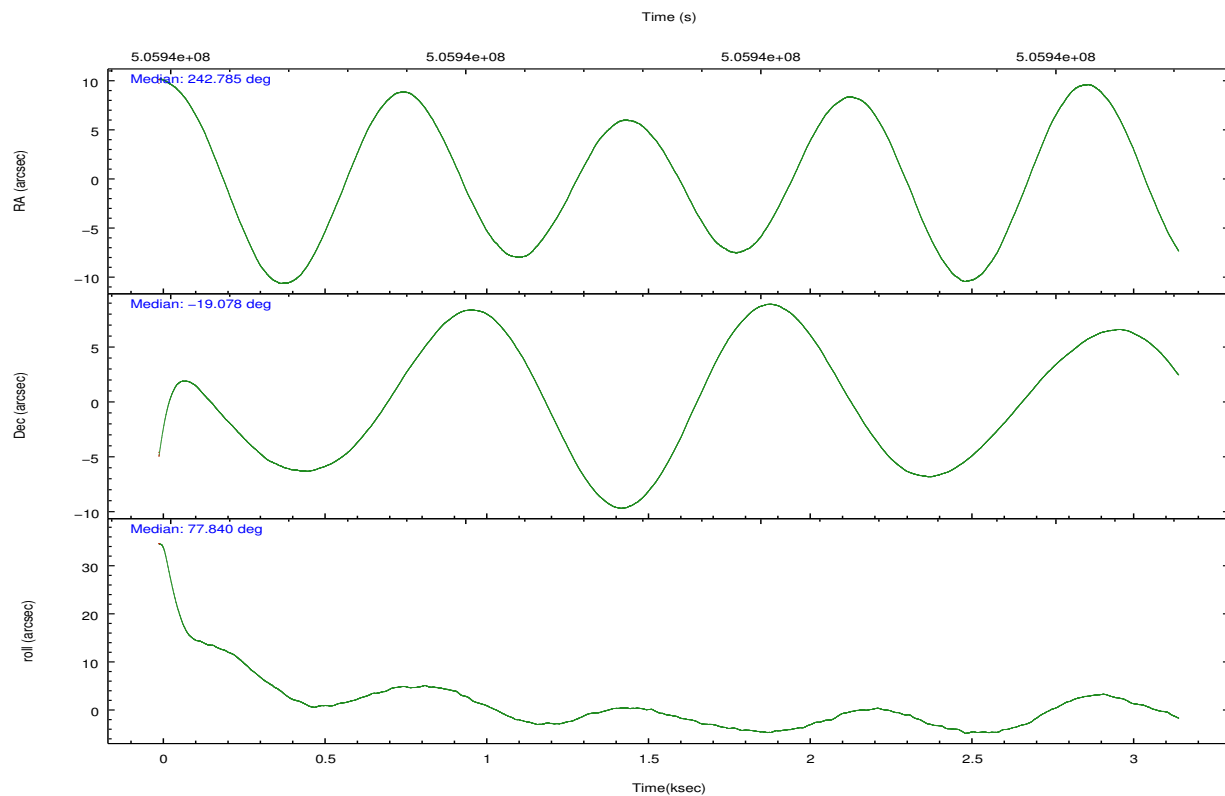
	ccd 2	ccd 3	ccd 6	ccd 7	ccd 8
grade 0 events	973	663	674	881	2757
	6%	4%	4%	4%	11%
grade 1 events	10	10	8	24	20
	0%	0%	0%	0%	0%
grade 2 events	476	388	439	1909	1871
	2%	2%	2%	9%	7%
grade 3 events	170	156	174	749	1311
	1%	1%	1%	3%	5%
grade 4 events	194	177	182	785	1203
	1%	1%	1%	3%	5%
grade 5 events	610	765	784	1982	1081
	3%	5%	5%	9%	4%
grade 6 events	341	332	365	4536	2448
	2%	2%	2%	22%	10%
grade 7 events	13121	12571	12330	9202	13358
	82%	83%	82%	45%	55%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-23678	ACIS-23678	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	242.794048	242.7848803203714	Subarray requested	NONE	NONE
[deg] Pointing Dec	-19.103446	-19.07752522277148	Alternating exposures requested	N	N
[deg] Pointing Roll	77.695813	77.8494913037156	[s] Primary exposure time	0.000000	3.1
[mm] SIM focus pos	-0.684267	-0.6828225247311905			
[mm] SIM defocus	0	0.001444936568705701			
[mm] SIM translation stage pos	-190.132523	-190.1425803651734			
[mm] SIM translation stage offset	0	0.01005778216563158			
[s] Observation start time (MET)	505941260.184000	505939961.01246			
Observation start date	2014-01-12T19:13:13	2014-01-12T18:52:41			
[s] Observation end time (MET)	505944260.184000	505945221.31275			
Observation end date	2014-01-12T20:03:13	2014-01-12T20:20:21			
Read mode	TIMED	TIMED			

2.3 Aspect



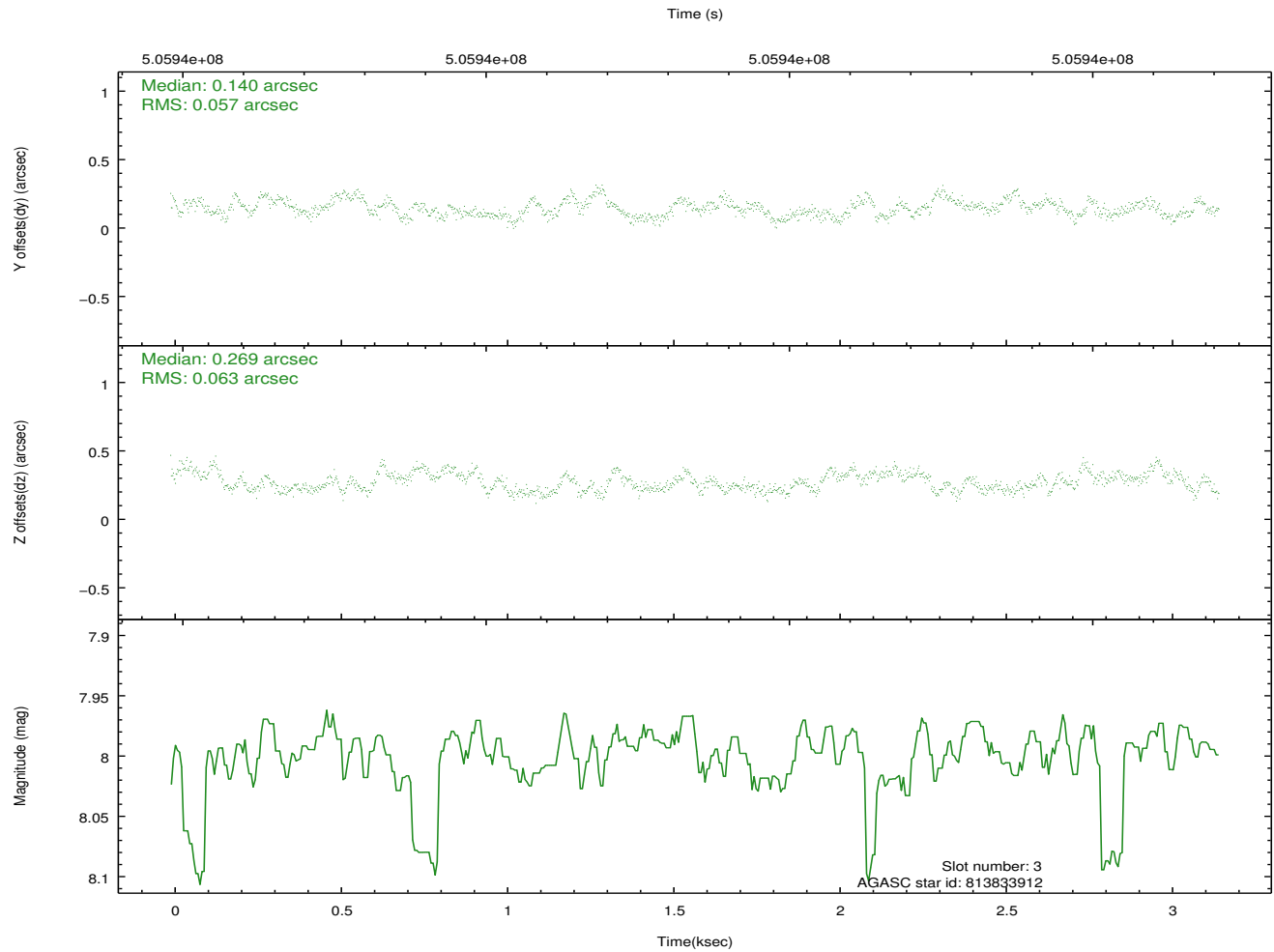
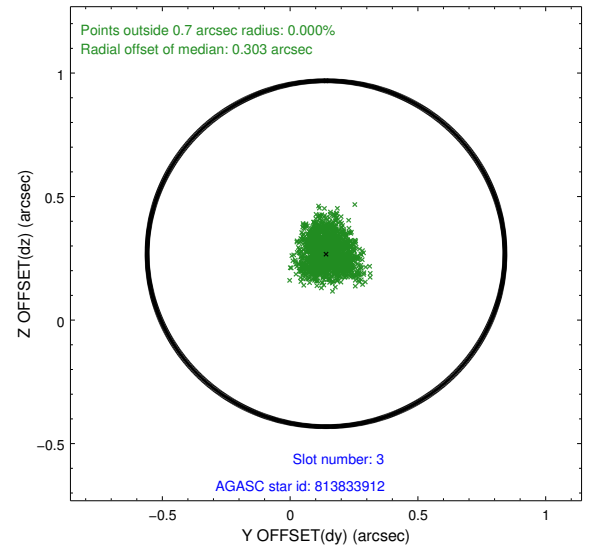
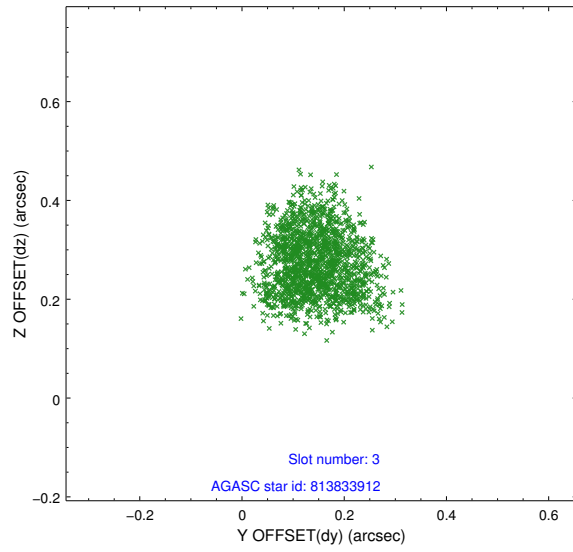


Slot Statistics

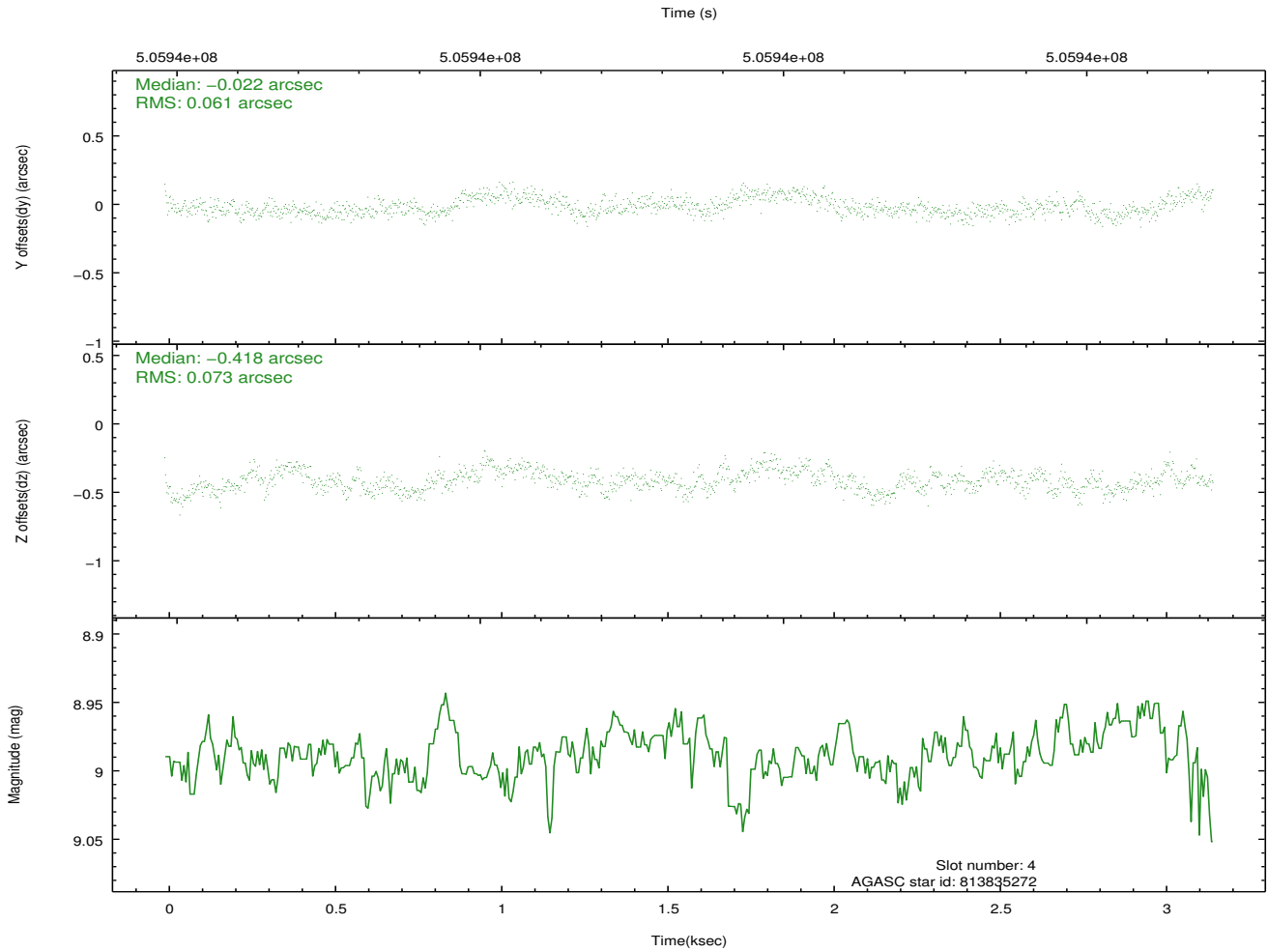
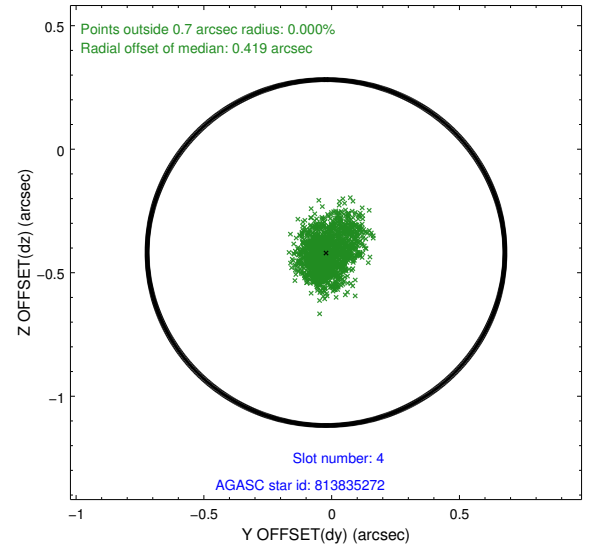
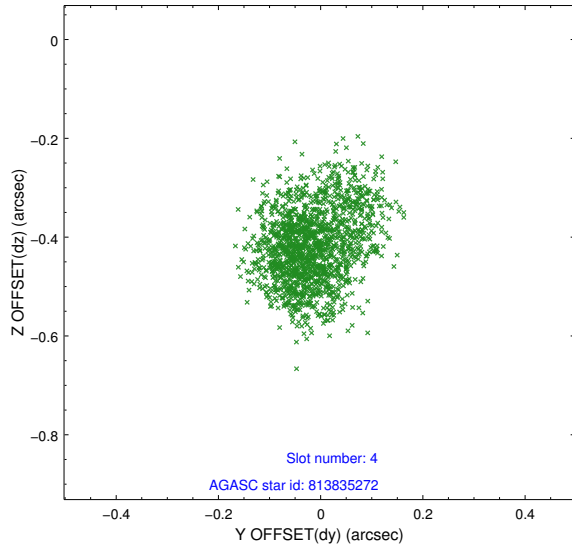
slot	status	used	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID		ACIS-S-2	6.95	770	-0.162	-0.029	0.006	0.011	0.000000	0.000000	-779.97	-1745.36
1	FID		ACIS-S-4	7.03	770	0.304	0.086	0.006	0.011	0.000000	0.000000	2132.84	161.12
2	FID		ACIS-S-5	7.07	770	-0.174	-0.048	0.006	0.010	0.000000	0.000000	-1830.24	156.97
3	GUIDE	used	813833912	8.00	1539	0.140	0.269	0.093	0.141	243.090962	-19.579045	-1458.91	-1348.51
4	GUIDE	used	813835272	8.99	1537	-0.022	-0.418	0.103	0.163	242.272271	-19.047015	-183.58	1776.58
5	GUIDE	used	813836488	8.10	1539	-0.095	-0.476	0.076	0.120	242.260837	-18.995570	-10.76	1856.62
6	GUIDE	used	813836688	8.71	1539	-0.188	0.314	0.102	0.162	243.555491	-18.836806	1484.16	-2330.71
7	GUIDE	used	813838352	7.94	1538	0.152	0.306	0.079	0.124	243.183752	-19.502876	-1123.40	-1599.81

2.4 Star Slots

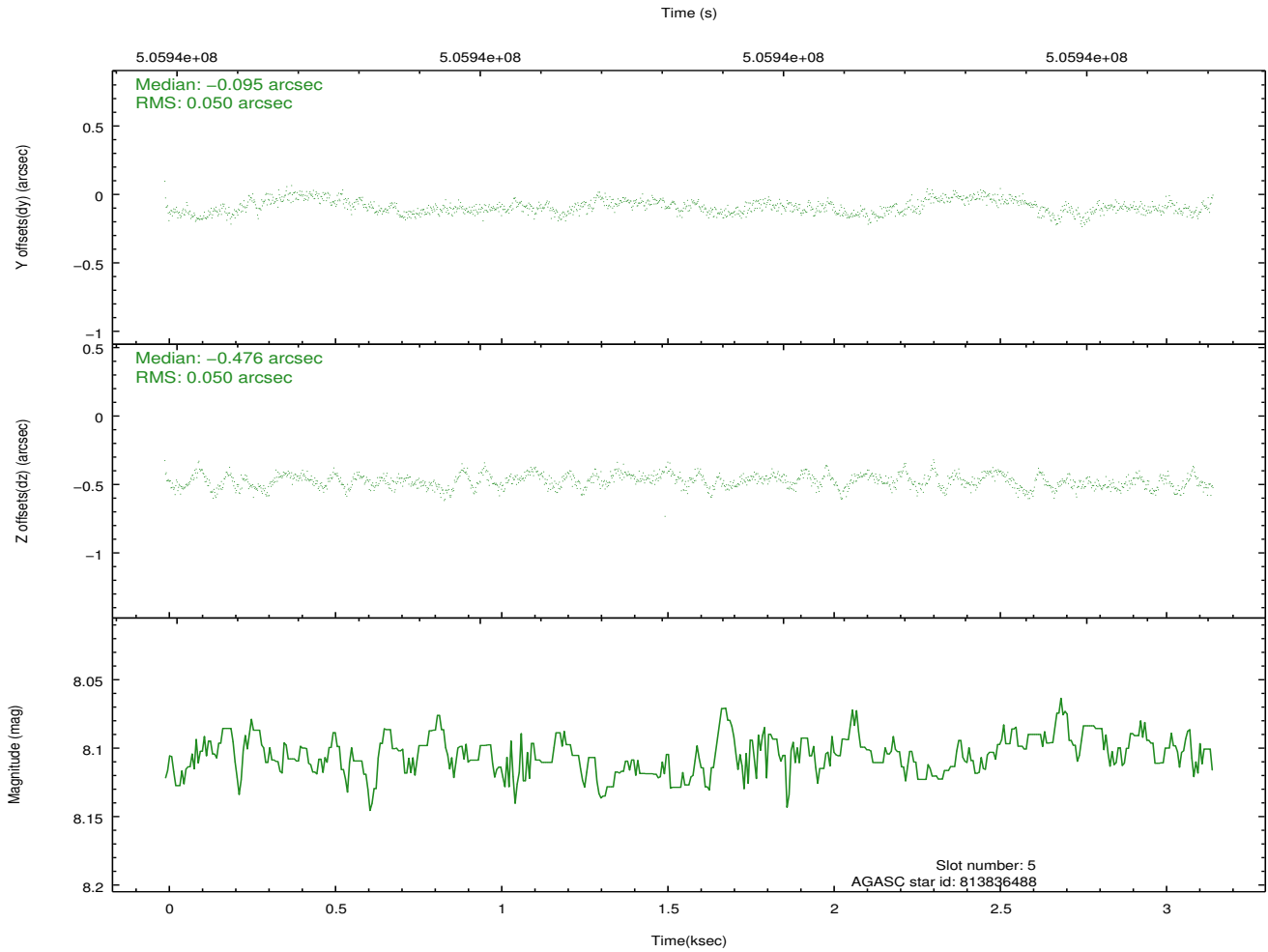
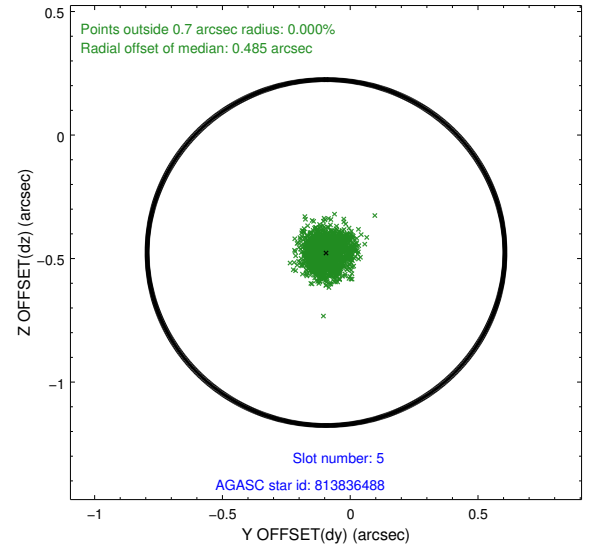
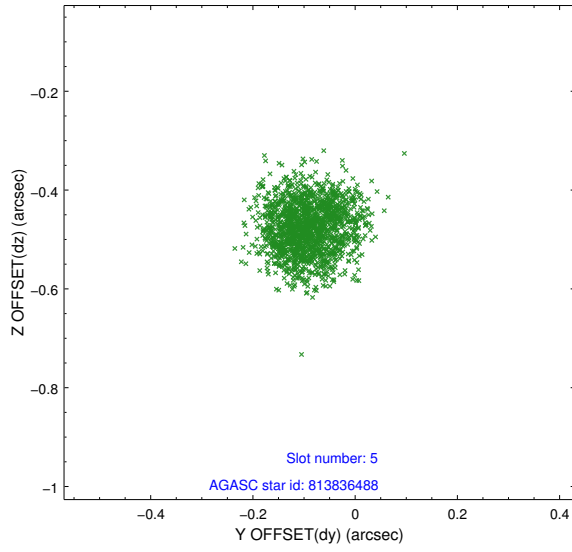
2.4.1 Slot 3



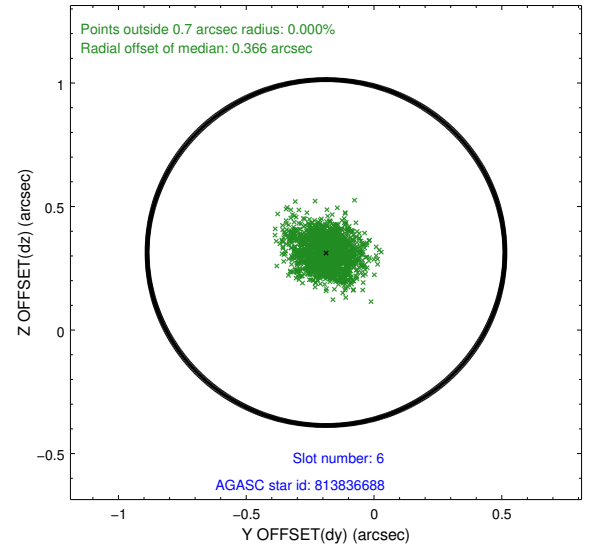
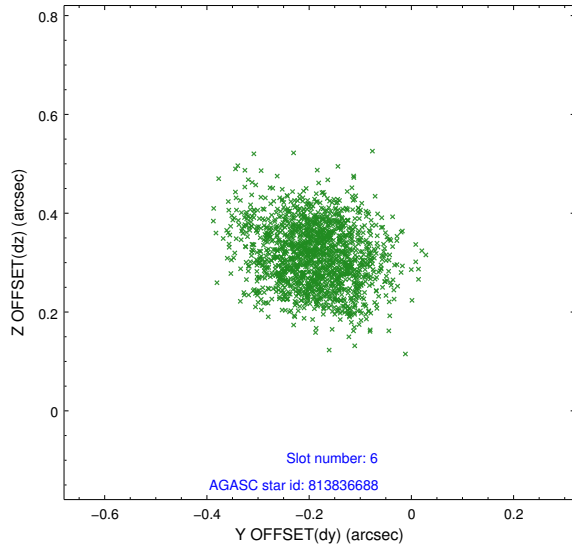
2.4.2 Slot 4



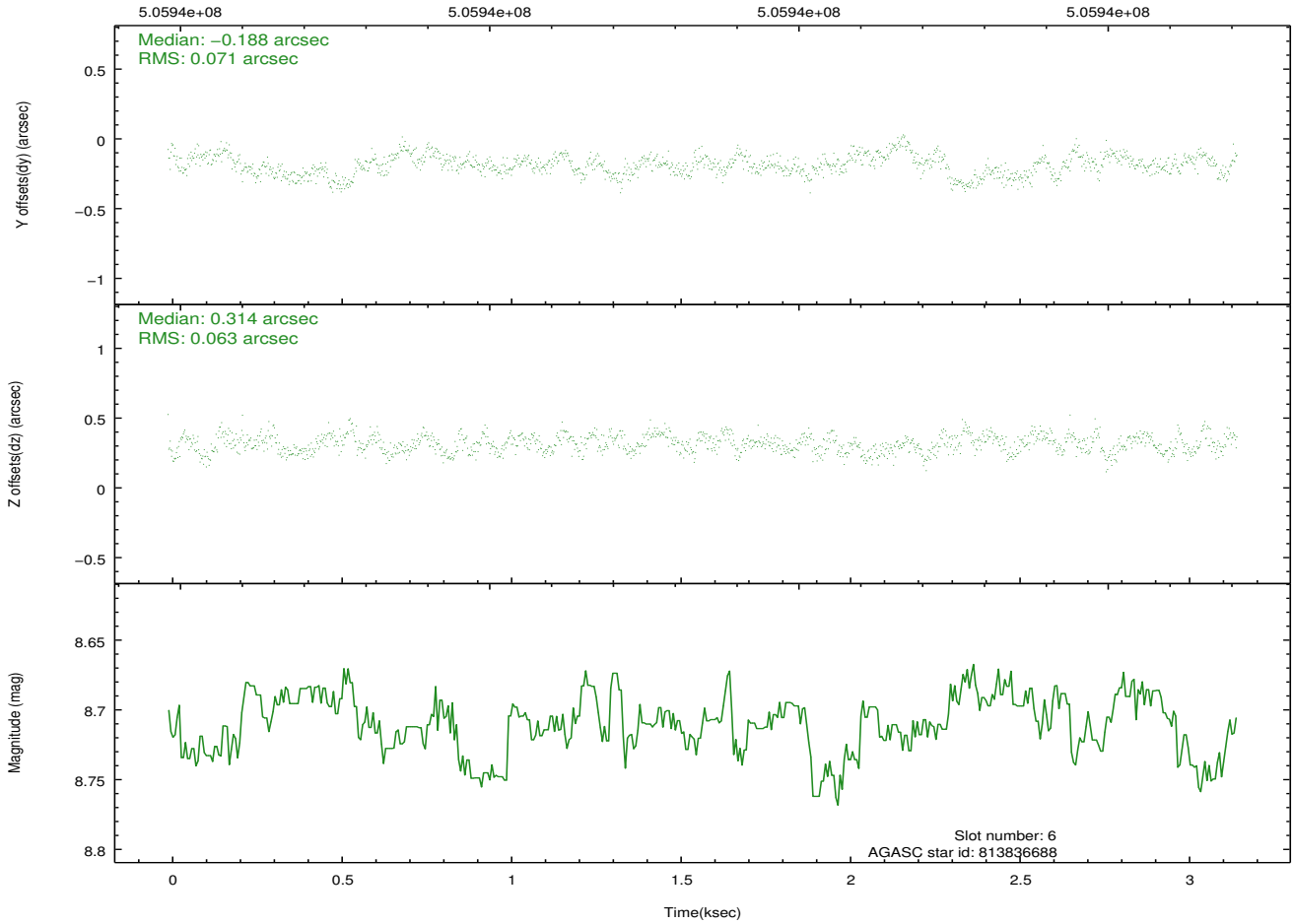
2.4.3 Slot 5



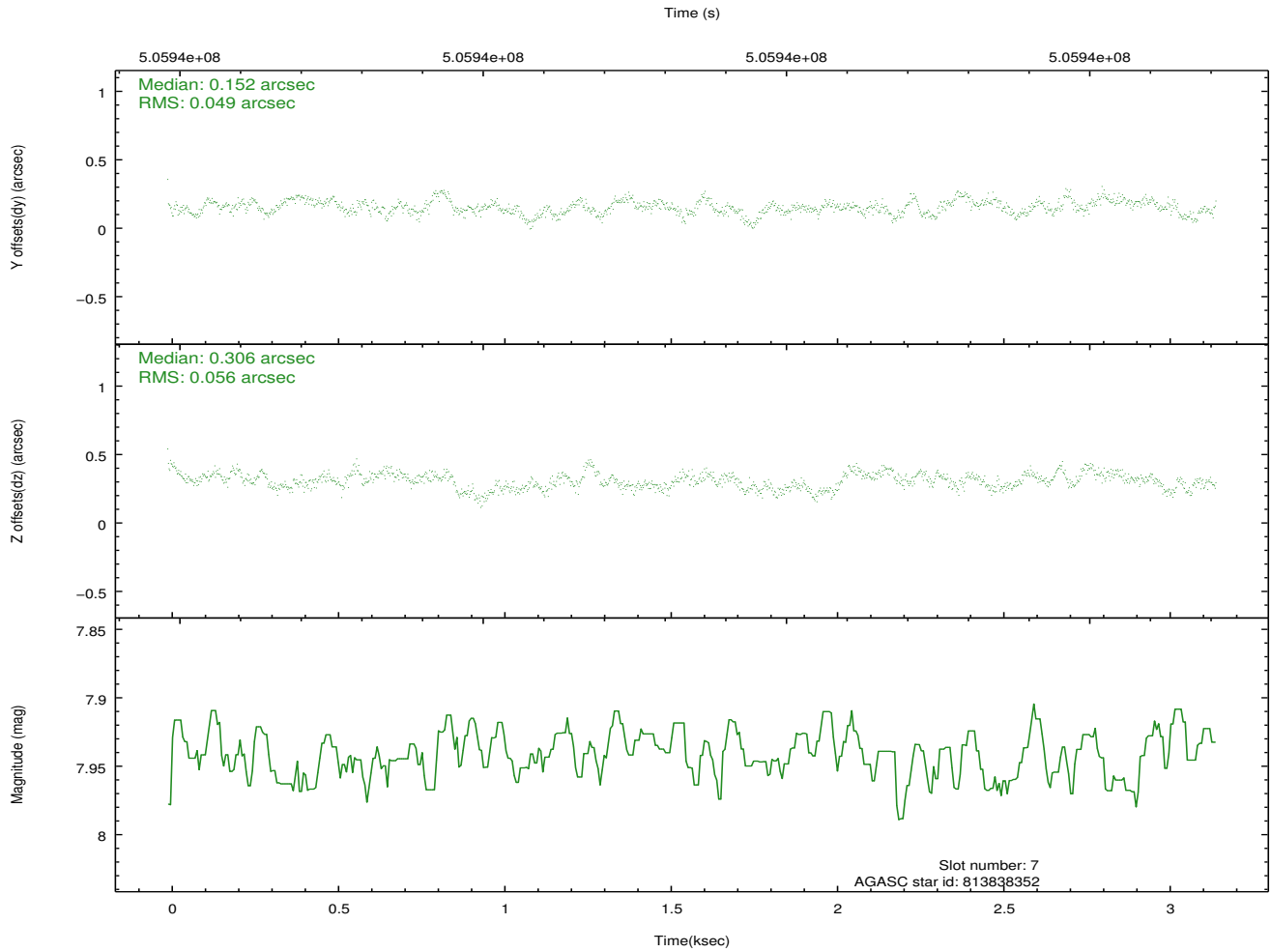
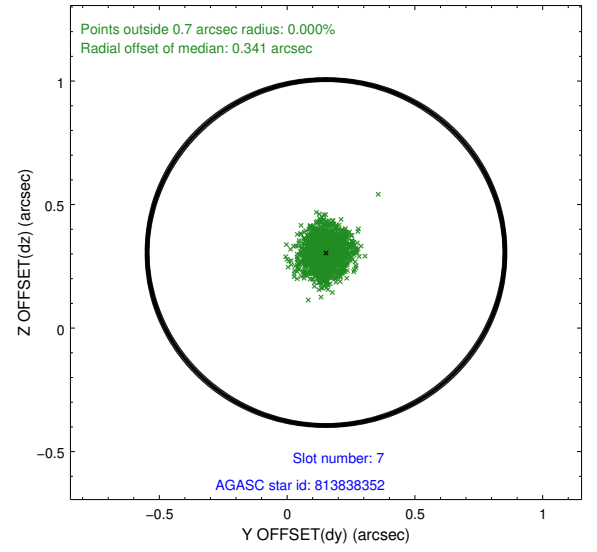
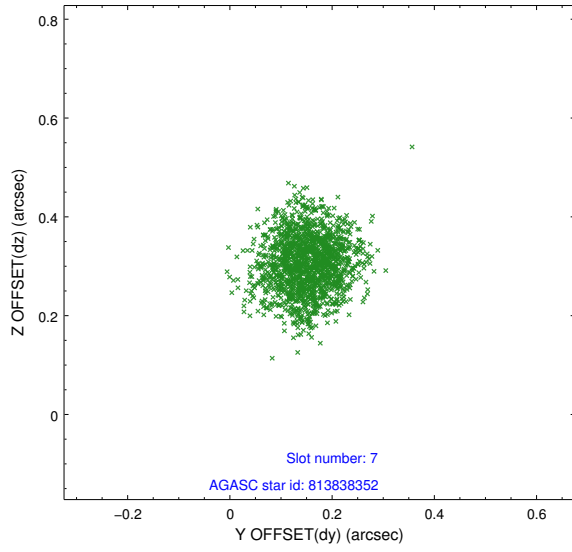
2.4.4 Slot 6



Time (s)

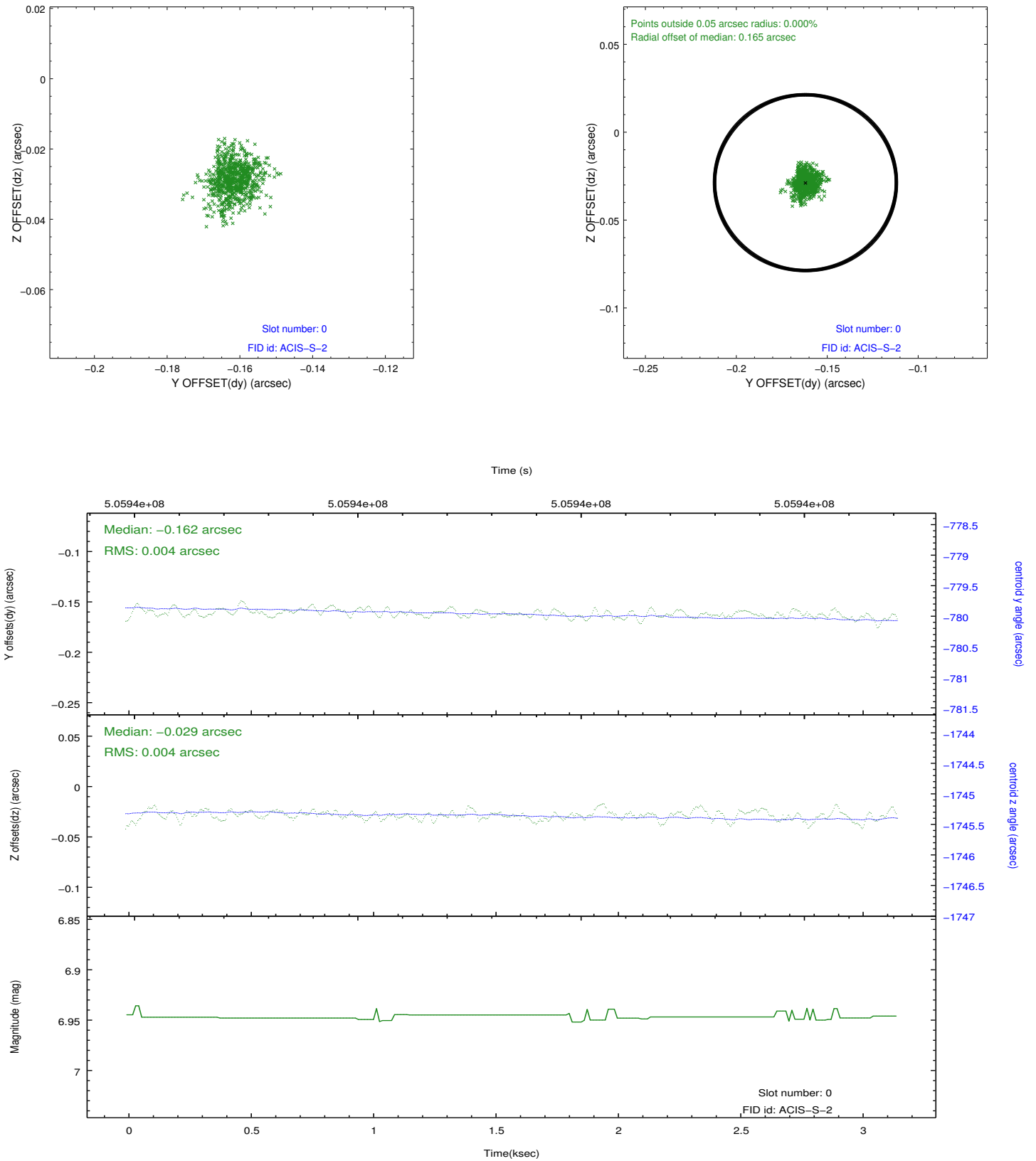


2.4.5 Slot 7

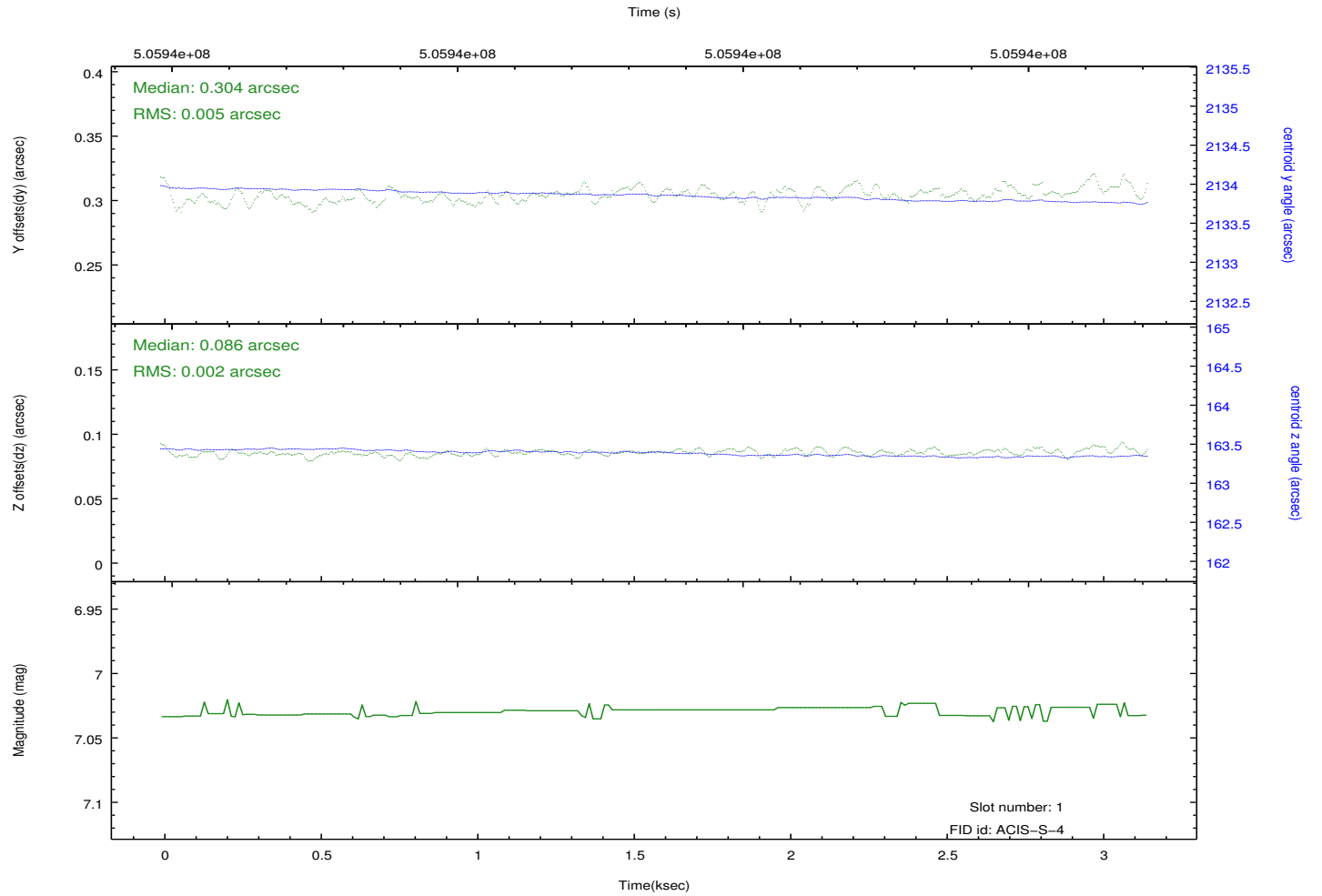
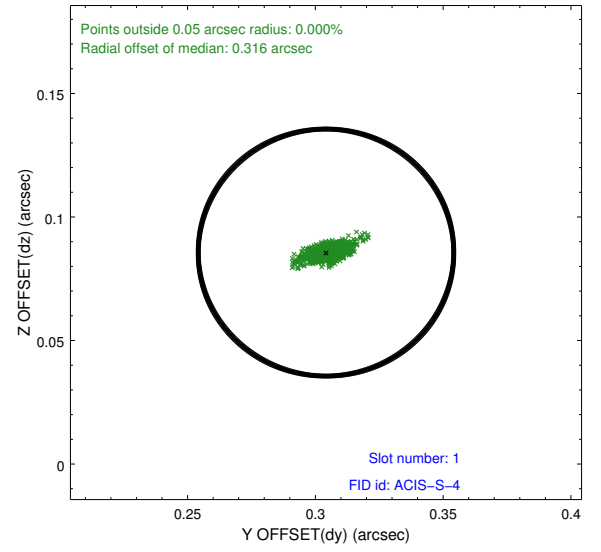
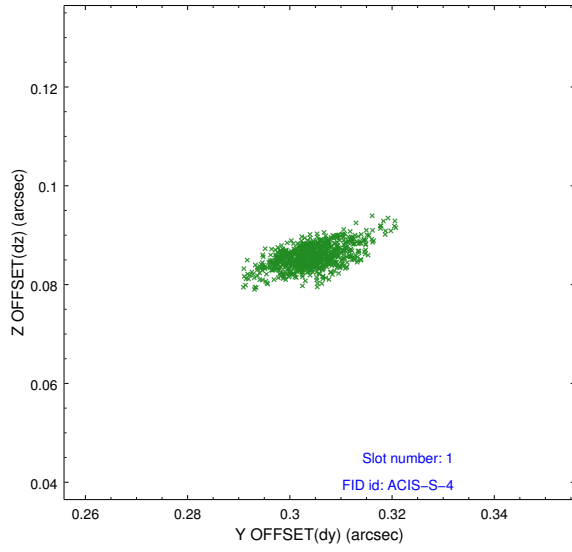


2.5 FID Slots

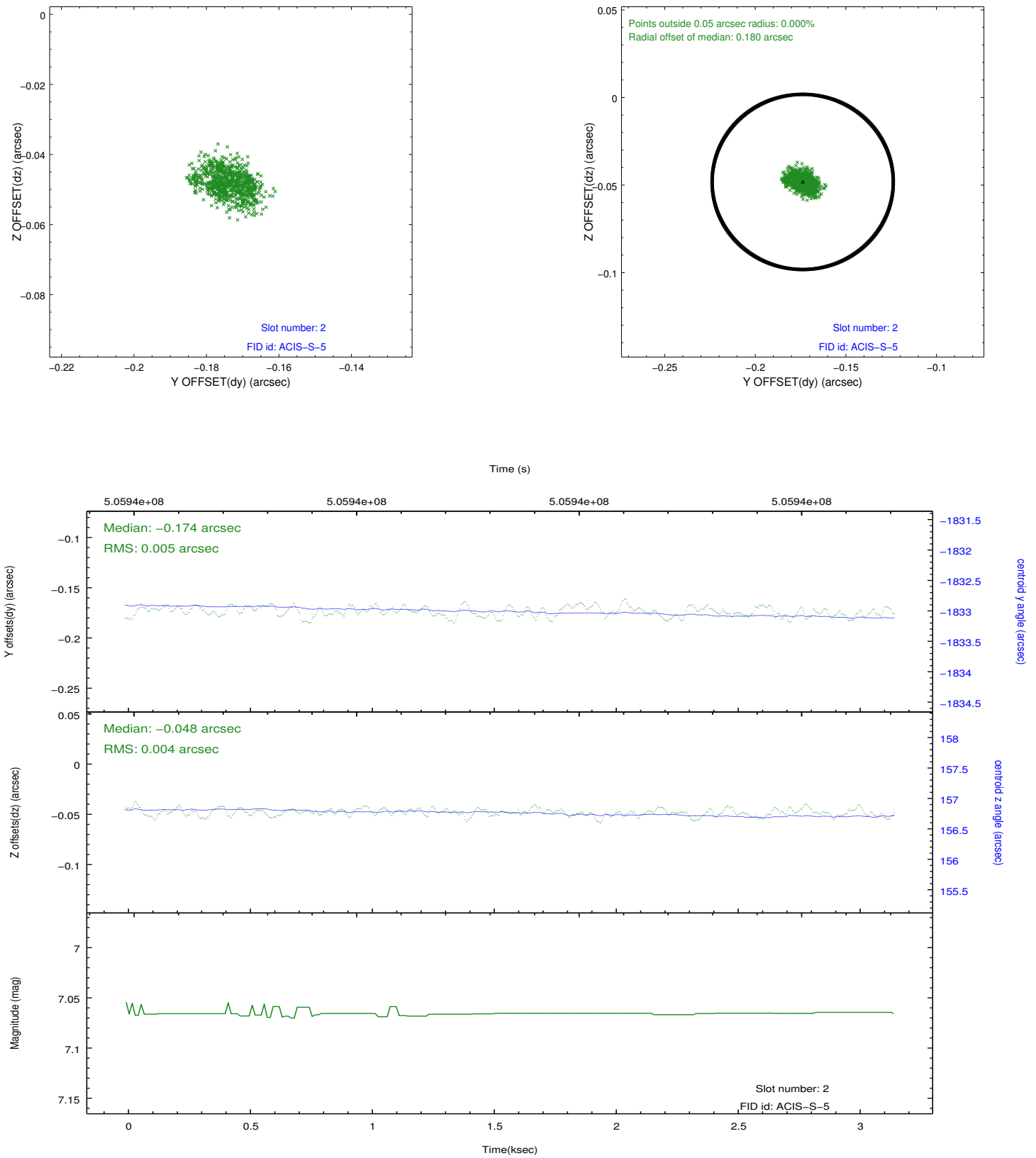
2.5.1 Slot 0



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)	2014.12.16
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	3.0709335514307

A.2 Comments

These data have been reprocessed with new aspect alignment calibration files that correct small mean offsets (up to 0.4 arcsecs) and improve overall astrometric accuracy. The new calibration was determined using data from the time period being reprocessed and was performed using cross-correlation of X-ray sources with radio and optical counterparts.