

V&V Reference Report

L2 ASCDS Version : 8.4.3

Observation 12441 - L2 Version 2
Chandra X-Ray Center

L2 Processing Date : Feb 10 2012

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1 Front

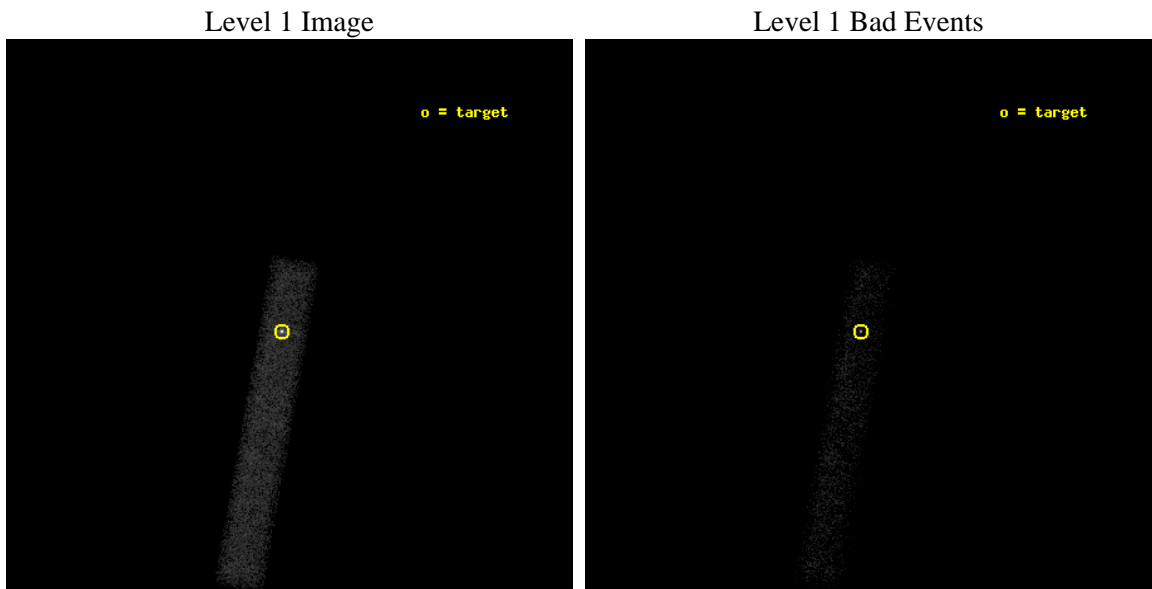
seq_num	401182	Sequence number
obs_id	12441	Observation id
title	Following a black hole candidate X-ray transient to quiescence	Pro
observer	dr P Jonker	Principal investigator
object	MAXIJ1659-152	Source name
dtycycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	254.757	Observer's specified target RA [deg]
dec_targ	-15.257972	Observer's specified target Dec [deg]
ra_nom	254.75366479567	Nominal RA [deg]
dec_nom	-15.254338534532	Nominal Dec [deg]
roll_nom	100.02536417944	Nominal Roll [deg]
revision	2	Processing version of data
ontime	20009.598807335	Sum of GTIs [s]
livetime	18147.649925027	Livetime [s]
ontime7	20009.598807335	Sum of GTIs [s]
l2events	23744	Number of level 2 events



2 OBI

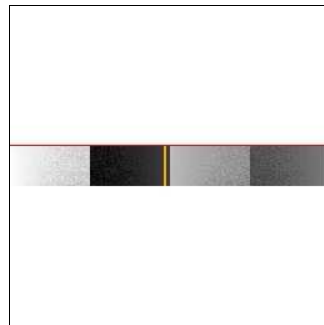
2.1 OBI

2.1.1 Images



2.1.2 Bias

Chip 7



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	20000.000000	[s] Scheduled observation exposure time
ascdsver	8.4.3	Processing system revision	ontime	20009.598807335	Sum of GTIs [s]
caldbver	4.4.7	 	ontime7	20009.598807335	Sum of GTIs [s]
date	2012-02-10T06:12:46	Date and time of file creation	l1events	36363	Number of level 1 events
revision	2	Processing version of data			

2.1.4 Events

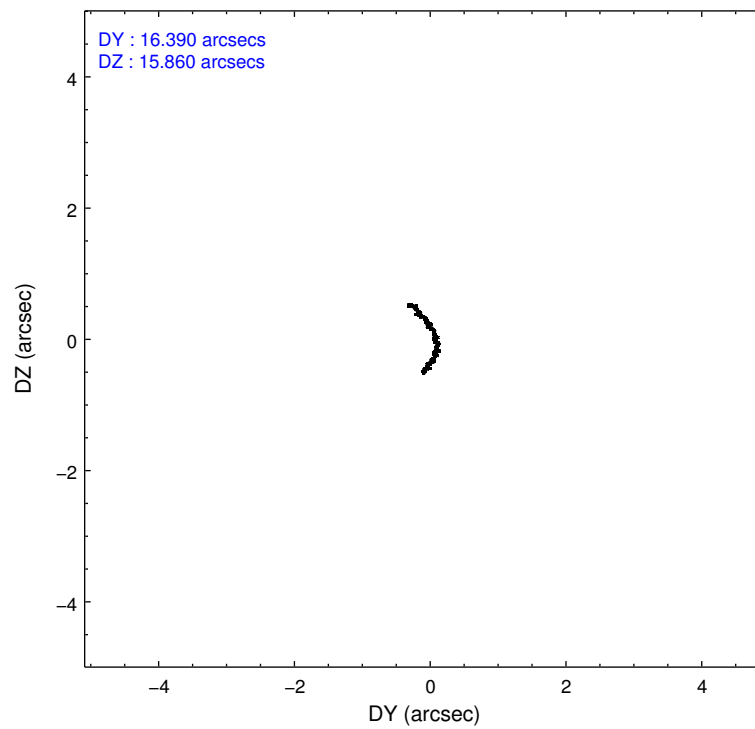
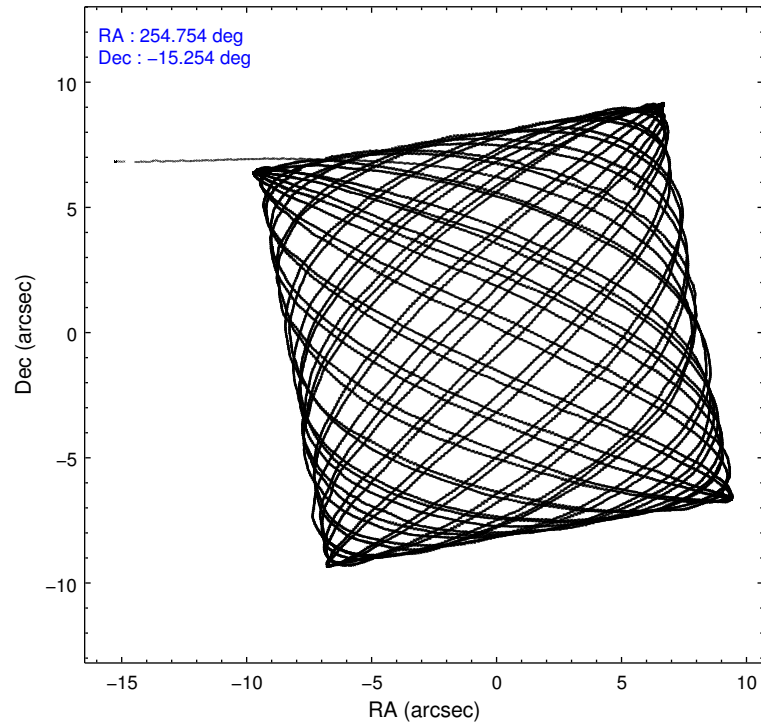
	ccd 7
level 1 events	36363
rejected events	12111
rejected %	33%

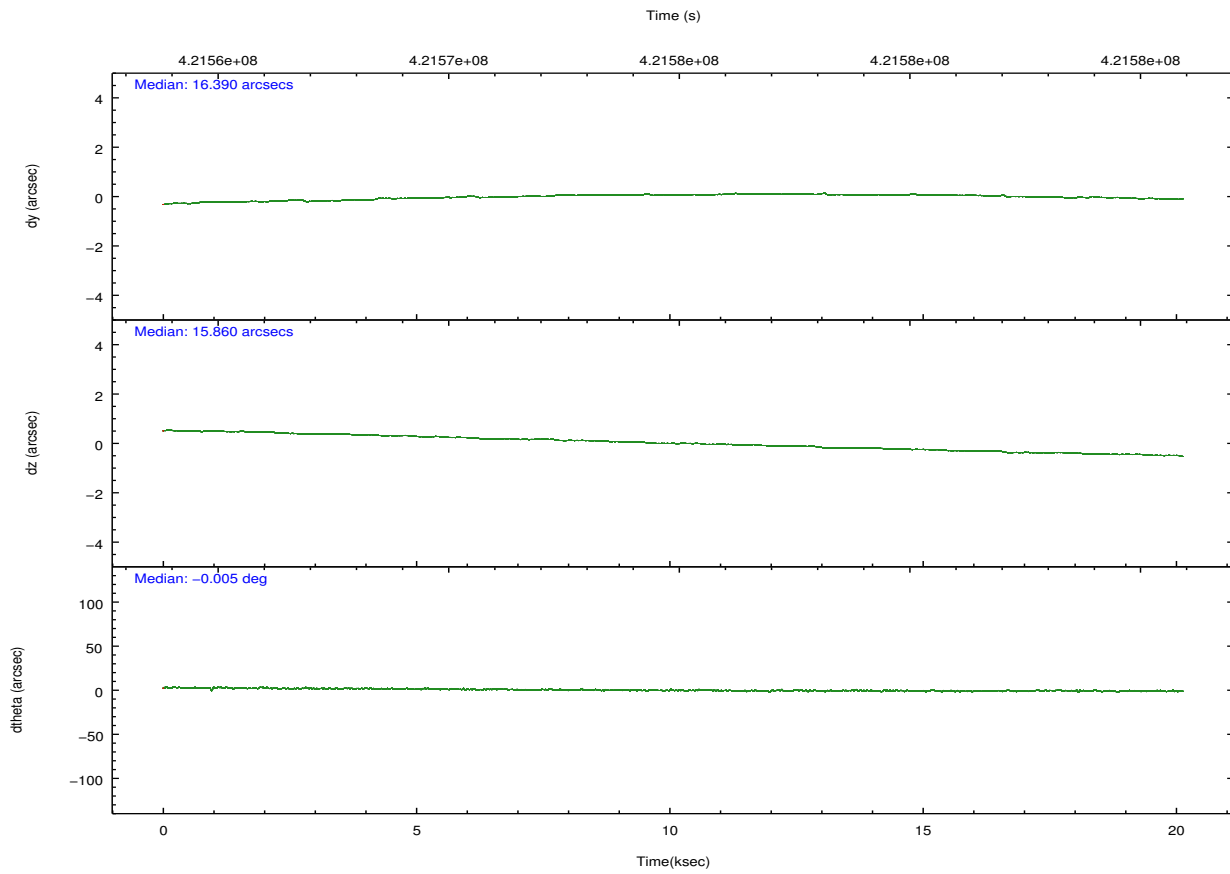
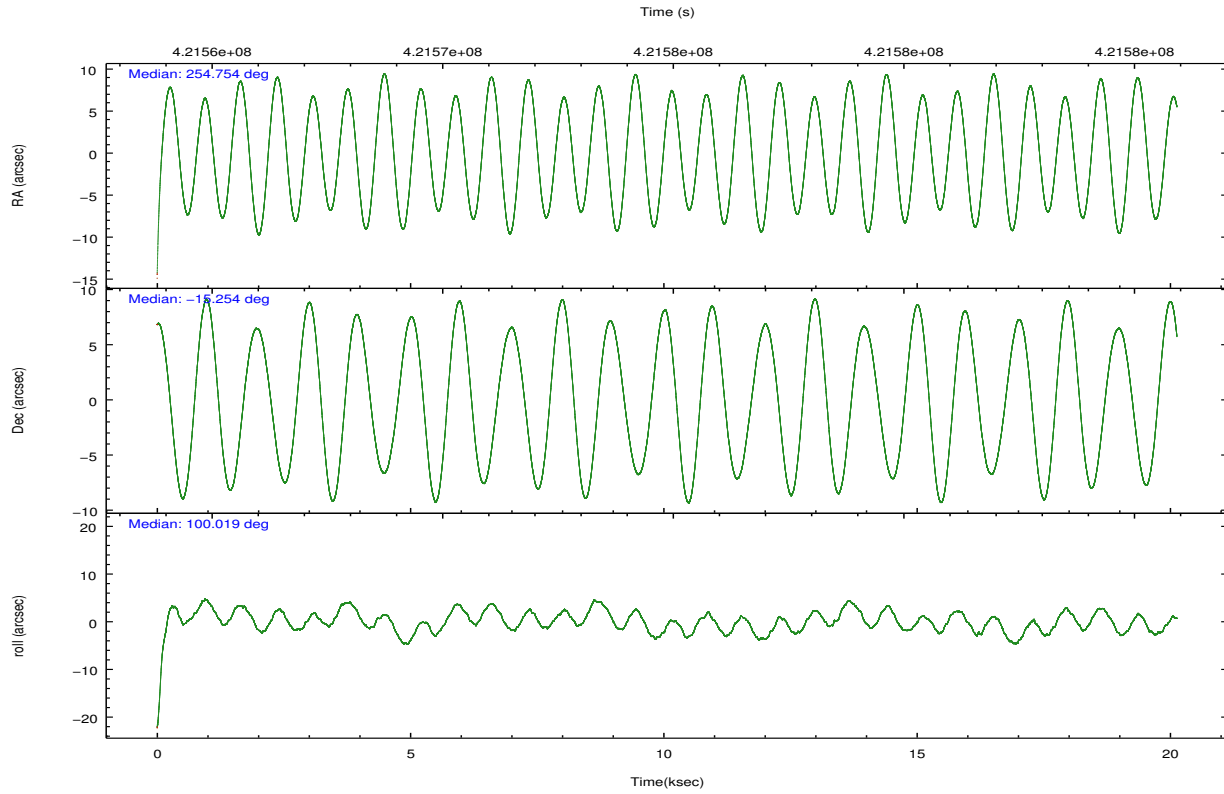
	ccd 7
grade 0 events	4179
	11%
grade 1 events	90
	0%
grade 2 events	5645
	15%
grade 3 events	3035
	8%
grade 4 events	2871
	7%
grade 5 events	2609
	7%
grade 6 events	8522
	23%
grade 7 events	9412
	25%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-7	ACIS-7	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	254.772178	254.7536647956742	Subarray requested	CUSTOM	1/8
[deg] Pointing Dec	-15.275041	-15.25433853453159	Subarray start row	449	449
[deg] Pointing Roll	99.873611	100.0253641794432	Subarray row count	128	128
[mm] SIM focus pos	-0.684267	-0.6828225247311905	Alternating exposures requested	N	N
[mm] SIM defocus	0	0.001444936568705701	[s] Primary exposure time	0.000000	0.4
[mm] SIM translation stage pos	-190.132523	-190.1400660498719			
[mm] SIM translation stage offset	0	0.00754346686406393			
[s] Observation start time (MET)	421564928.184000	421563790.29728			
Observation start date	2011-05-12T05:21:02	2011-05-12T05:03:10			
[s] Observation end time (MET)	421584928.184000	421585464.94841			
Observation end date	2011-05-12T10:54:22	2011-05-12T11:04:24			
Read mode	TIMED	TIMED			

2.3 Aspect



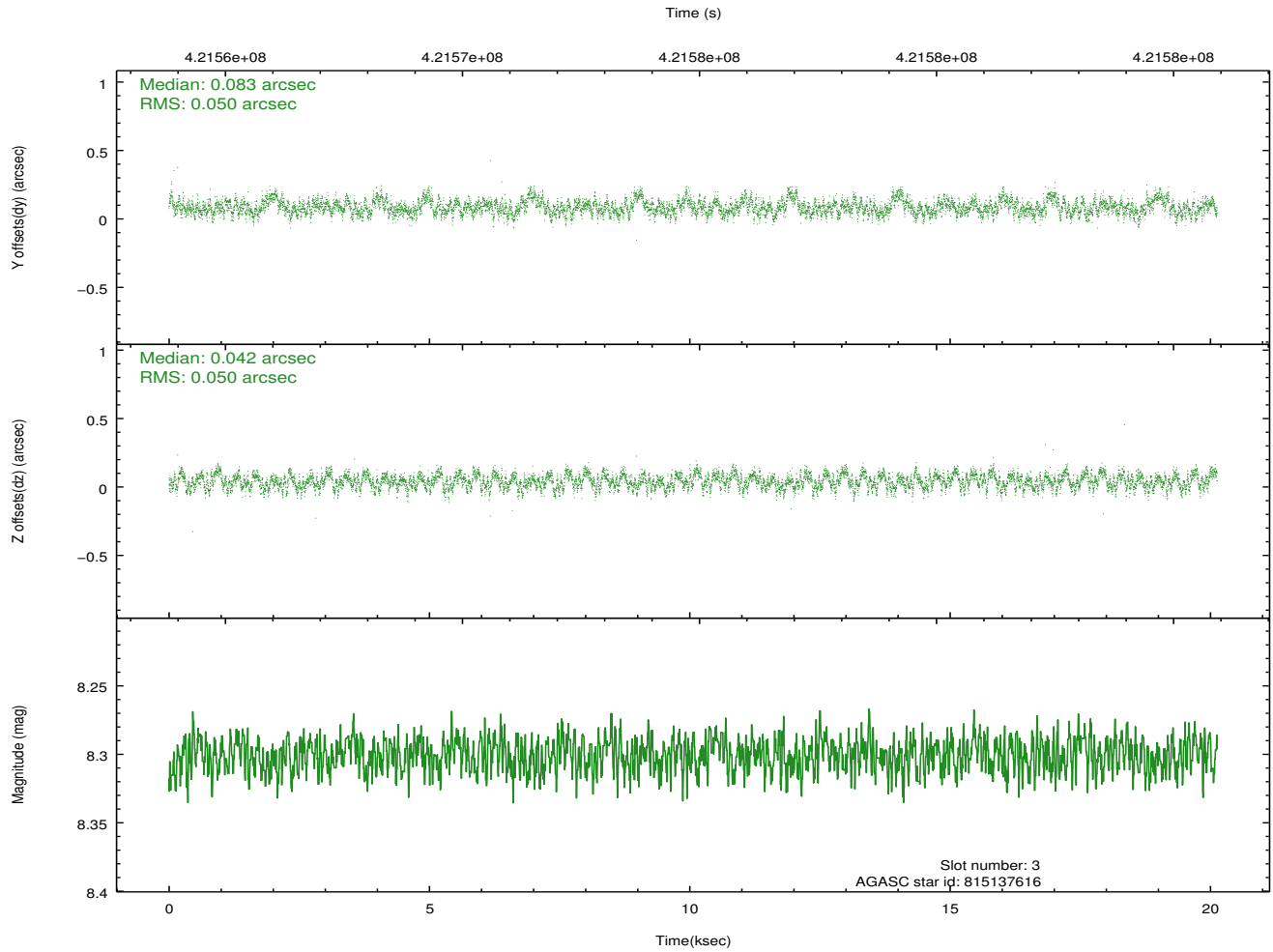
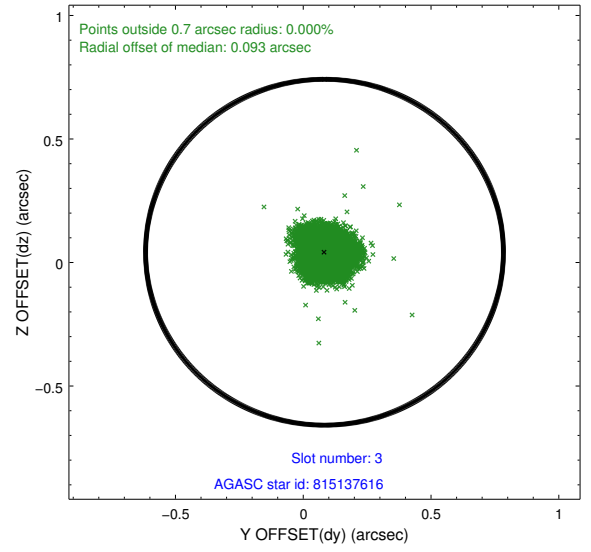
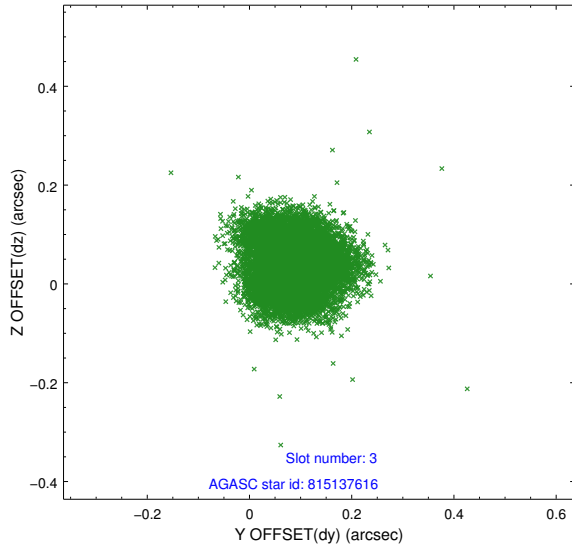


Slot Statistics

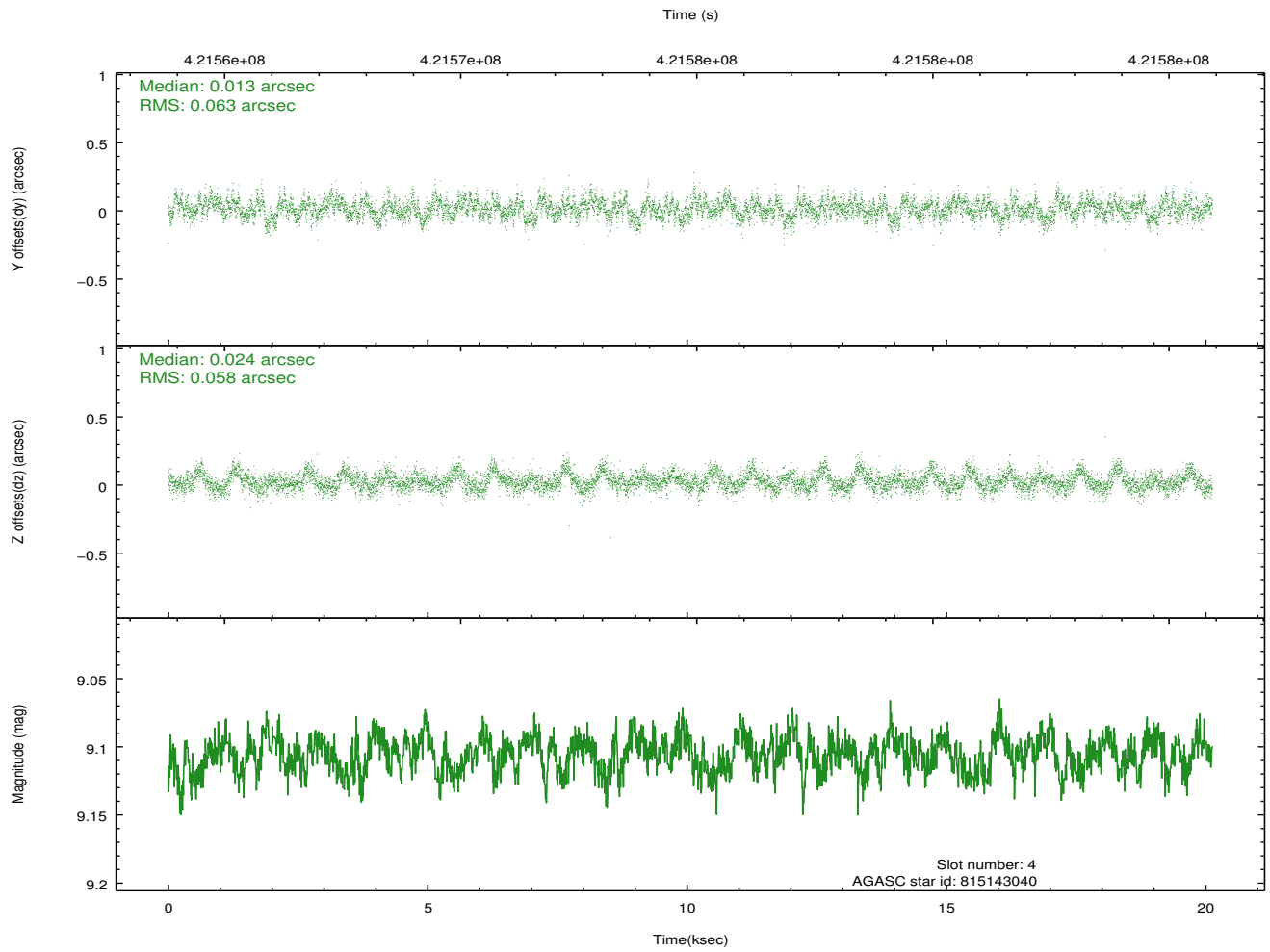
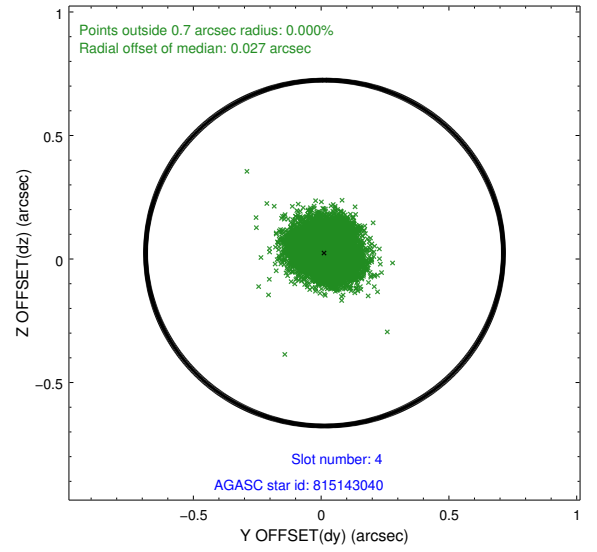
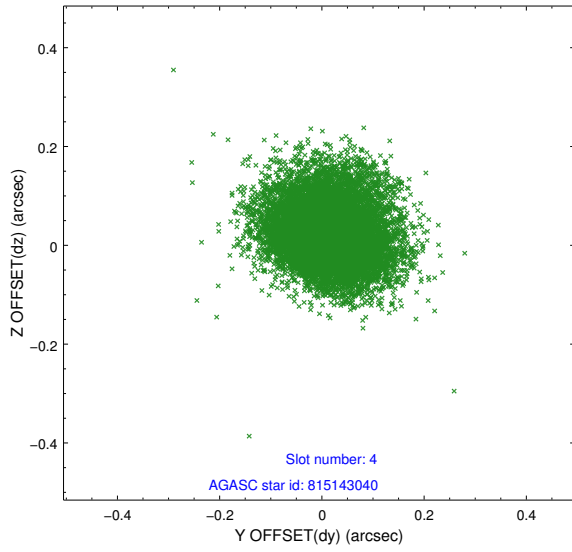
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-S-1	7.01	4911	0.121	-0.067	0.010	0.022	0.000000	0.000000	926.77	-1732.97
1	FID	ACIS-S-2	6.94	4910	-0.117	0.007	0.011	0.019	0.000000	0.000000	-769.26	-1737.64
2	FID	ACIS-S-6	7.16	4909	-0.026	0.064	0.009	0.015	0.000000	0.000000	392.21	808.30
3	GUIDE	815137616	8.30	9819	0.083	0.042	0.076	0.117	254.741671	-15.811997	-1886.85	435.93
4	GUIDE	815143040	9.11	9809	0.013	0.024	0.092	0.149	254.348135	-15.924918	-2055.05	1847.83
5	GUIDE	741216560	9.02	9817	-0.046	0.123	0.084	0.136	254.839054	-14.734715	1876.44	-562.29
6	GUIDE	815138728	6.65	9821	-0.122	-0.647	0.054	0.083	254.111345	-15.485495	-356.95	2388.72
7	GUIDE	815141352	9.55	9781	0.071	0.462	0.123	0.216	255.512221	-15.578094	-1518.95	-2339.72

2.4 Star Slots

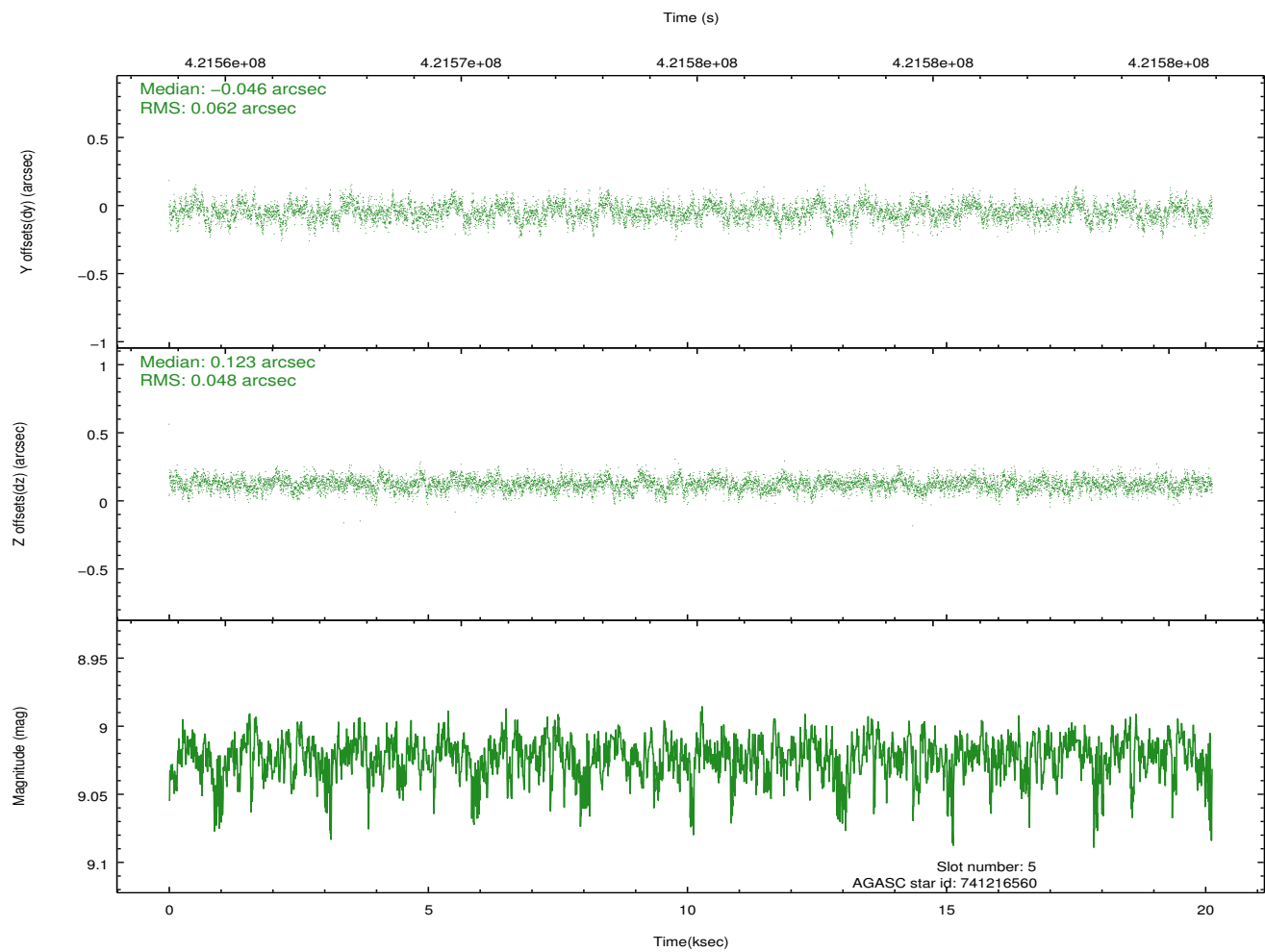
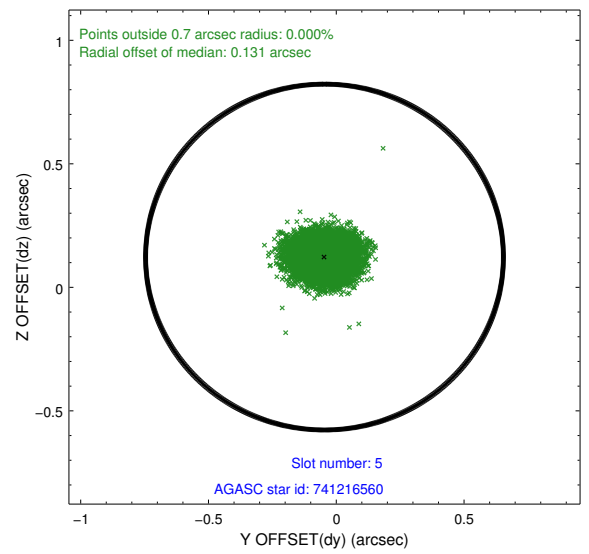
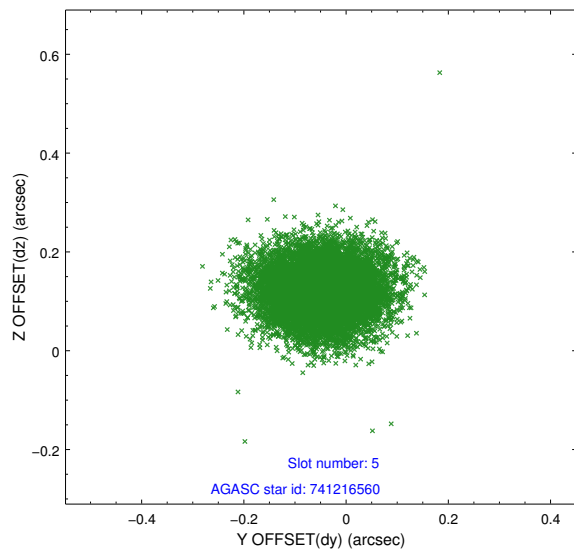
2.4.1 Slot 3



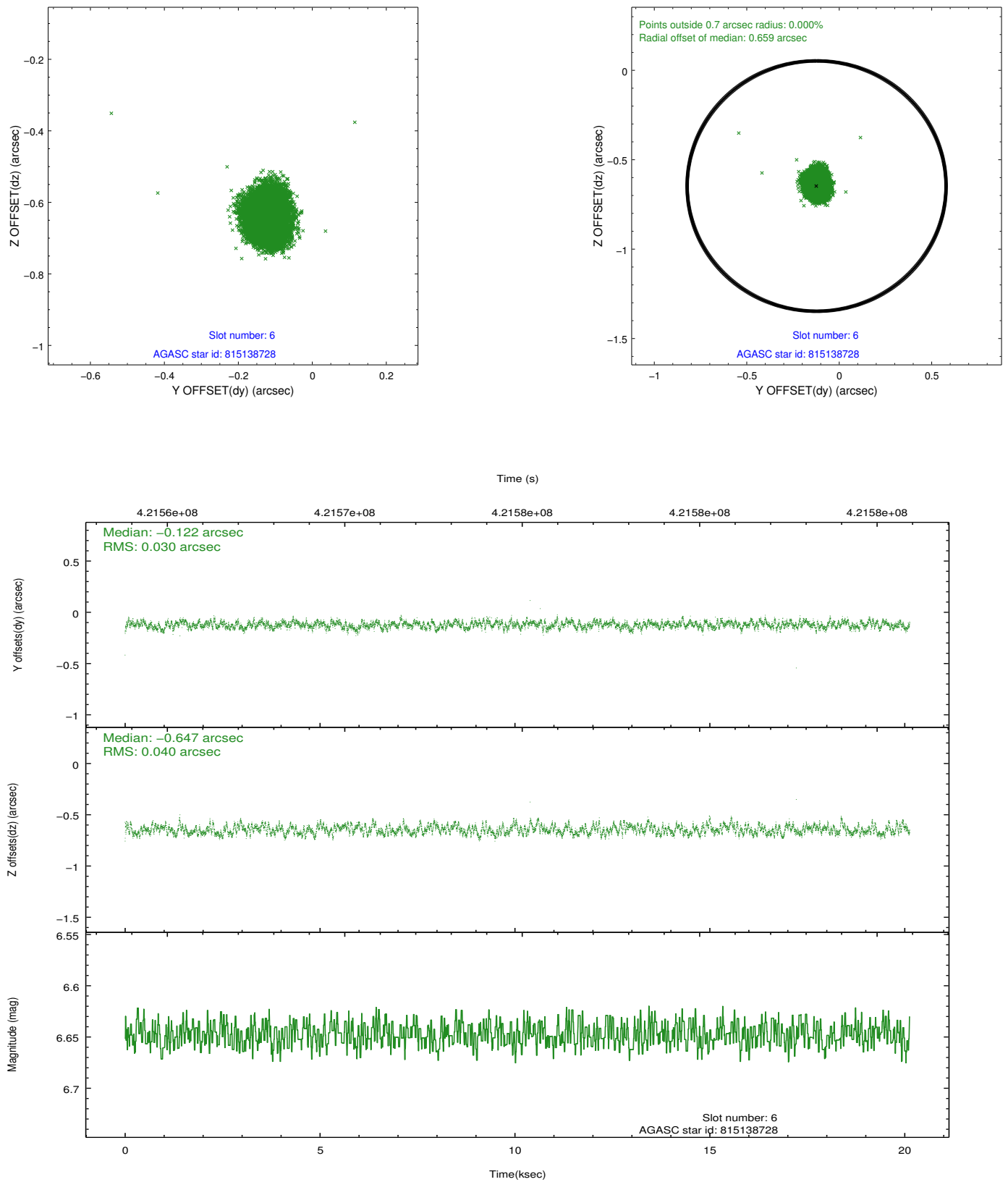
2.4.2 Slot 4



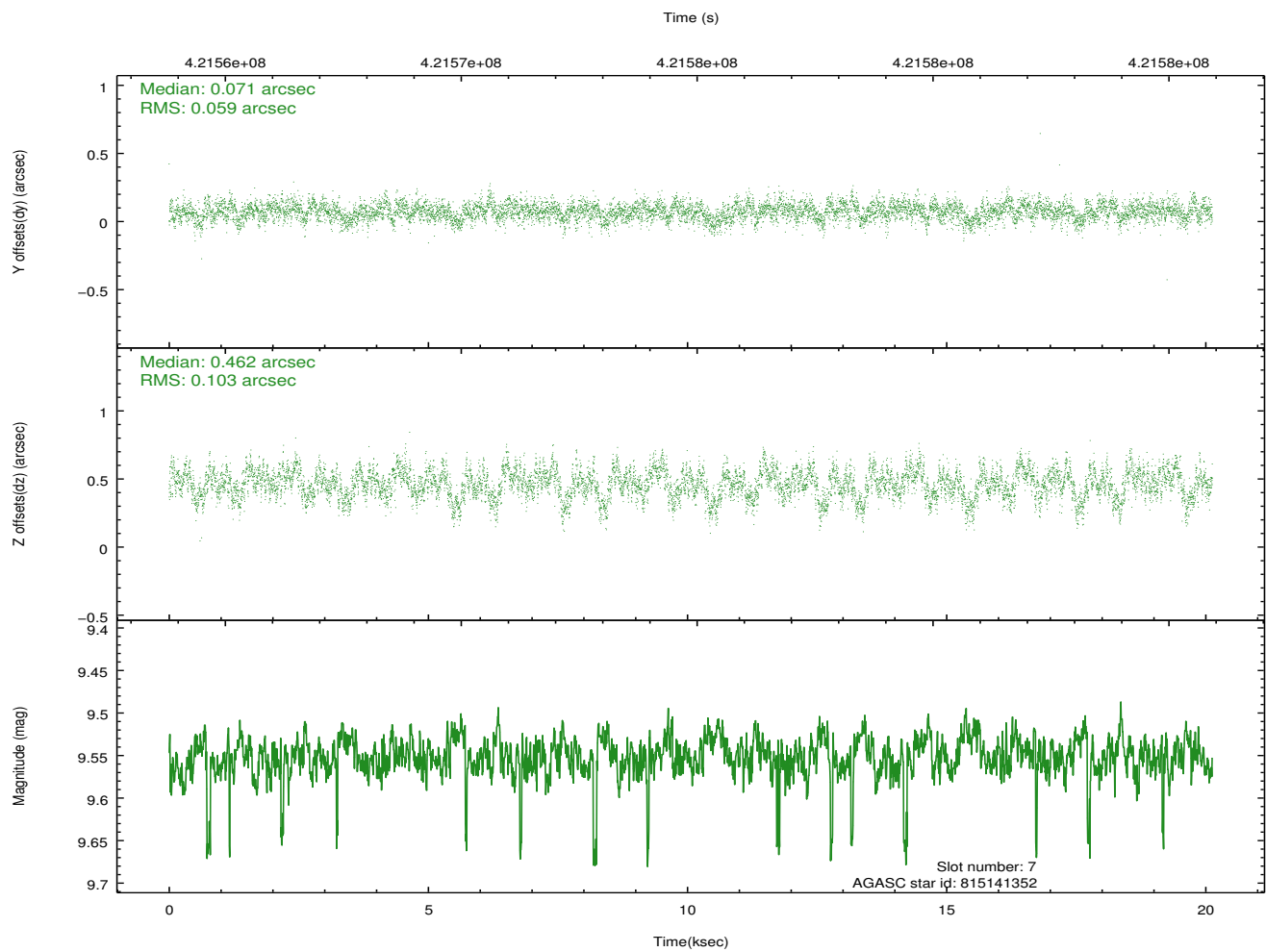
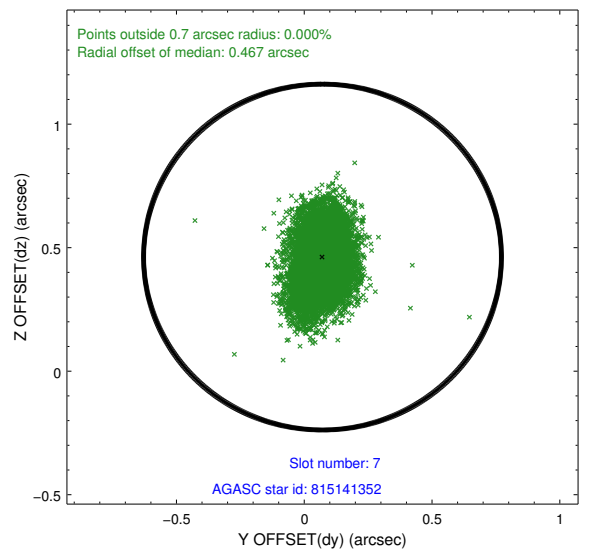
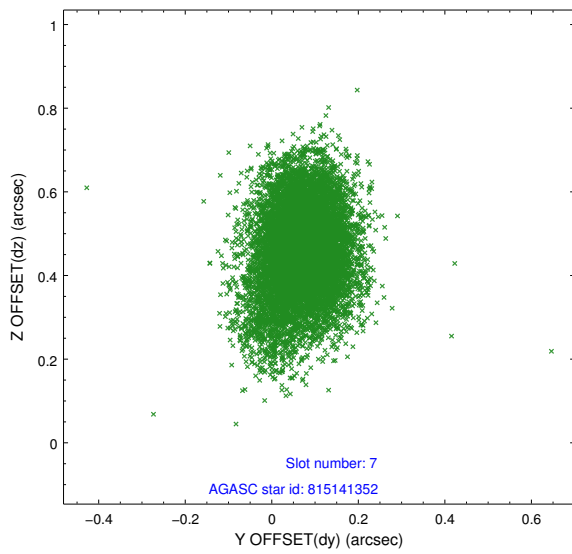
2.4.3 Slot 5



2.4.4 Slot 6

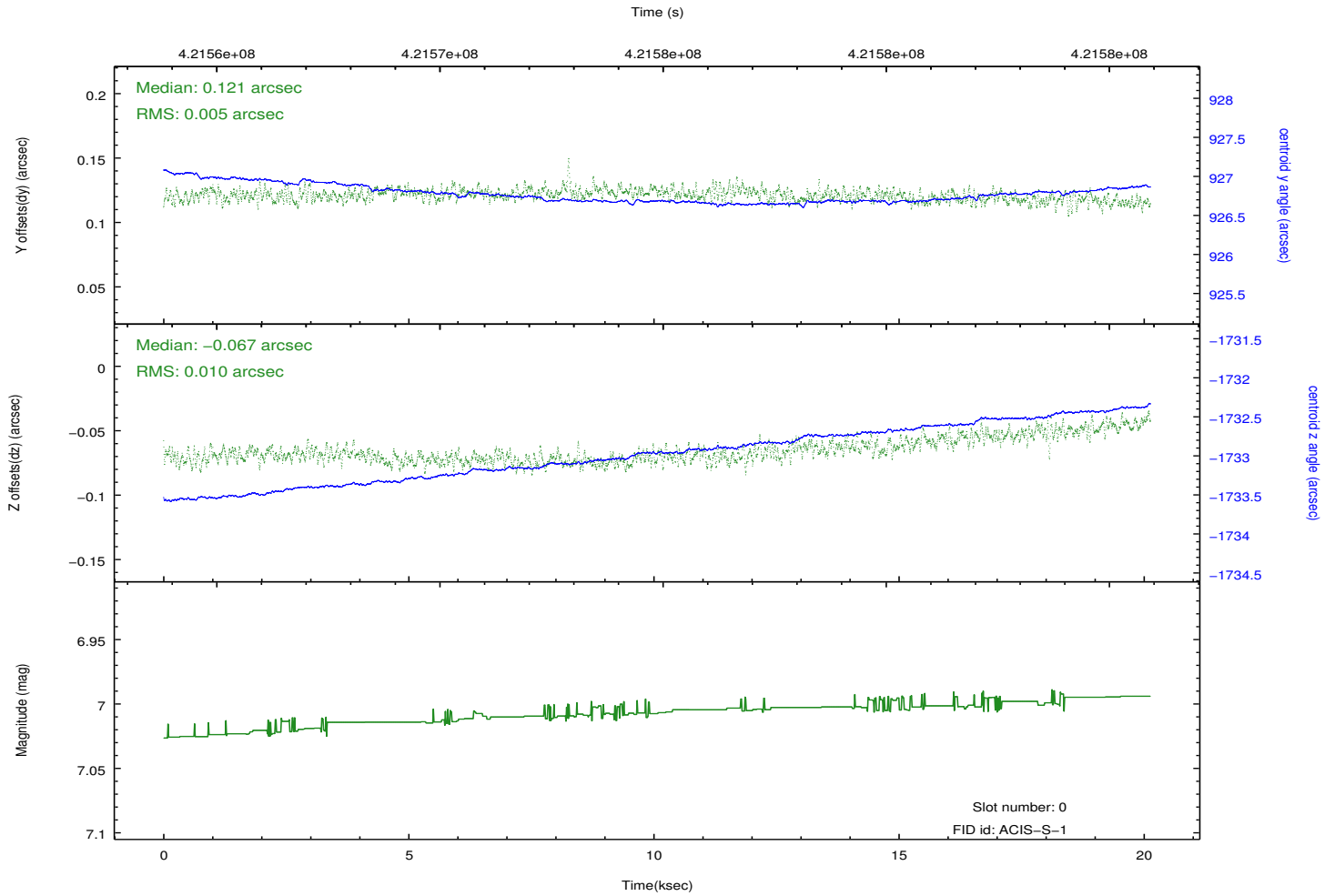
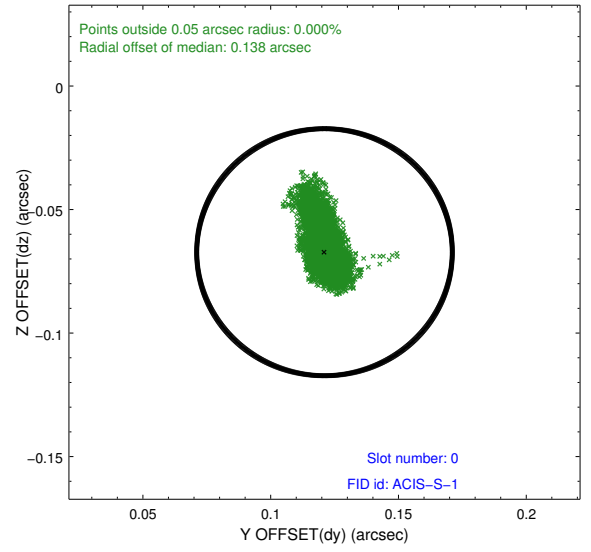
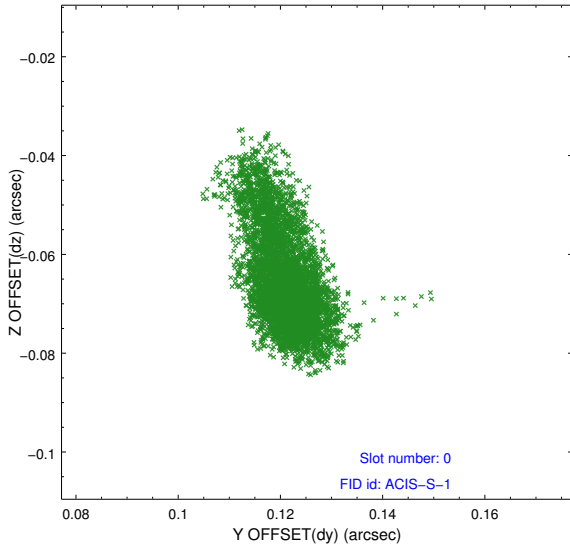


2.4.5 Slot 7

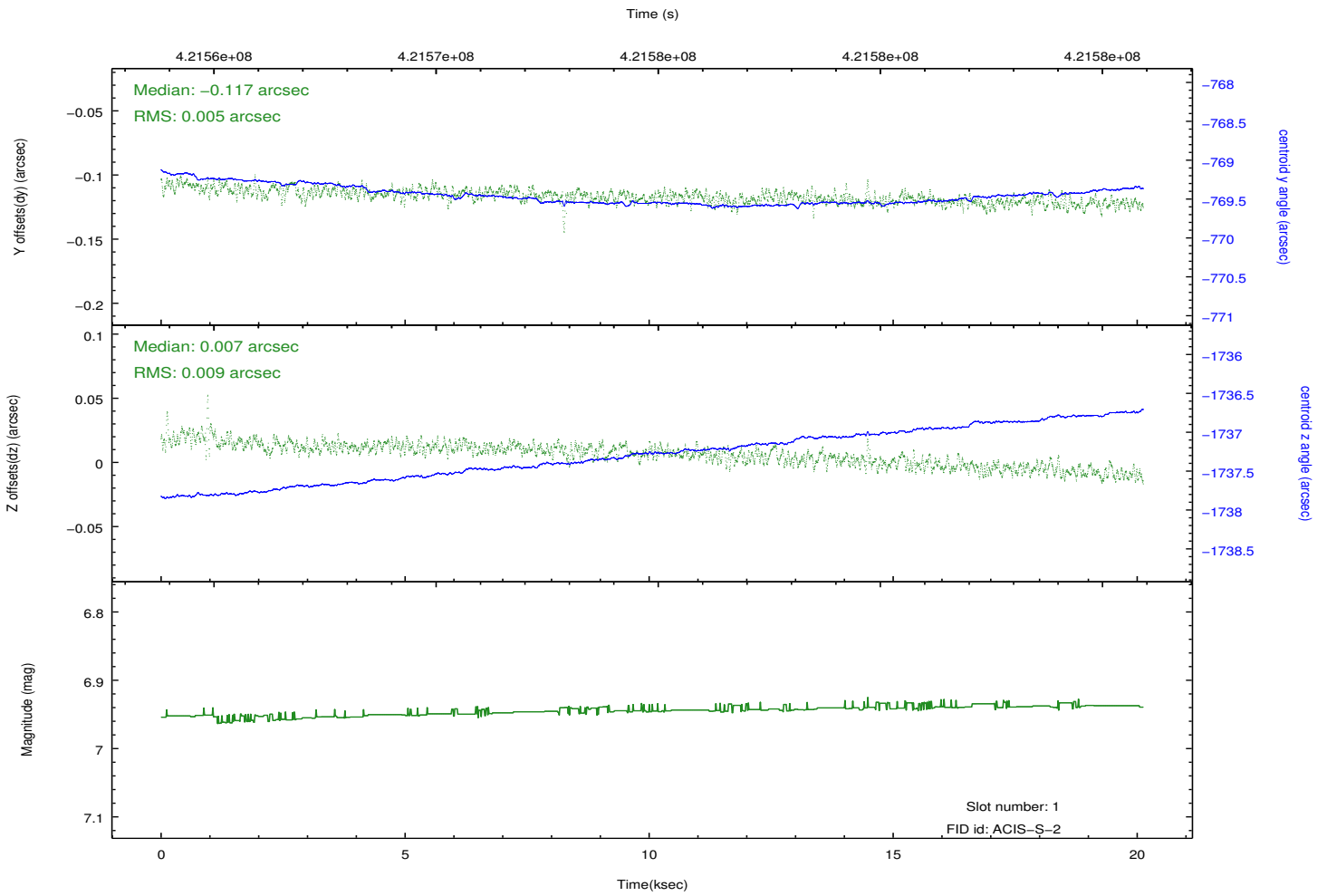
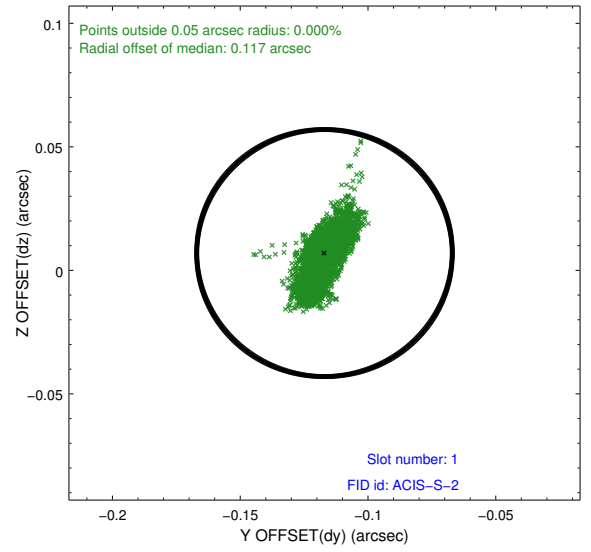
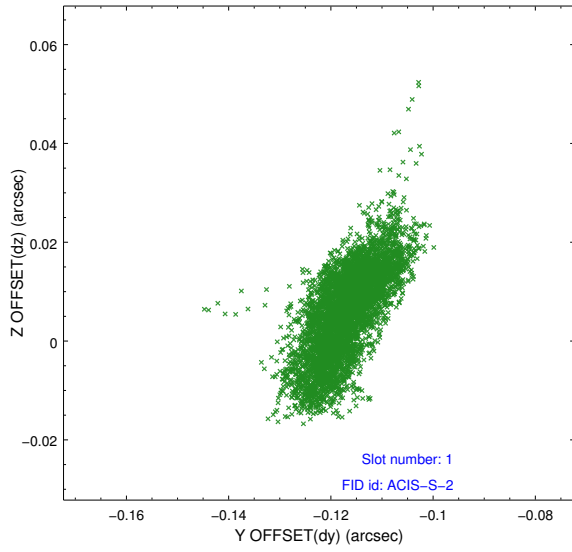


2.5 FID Slots

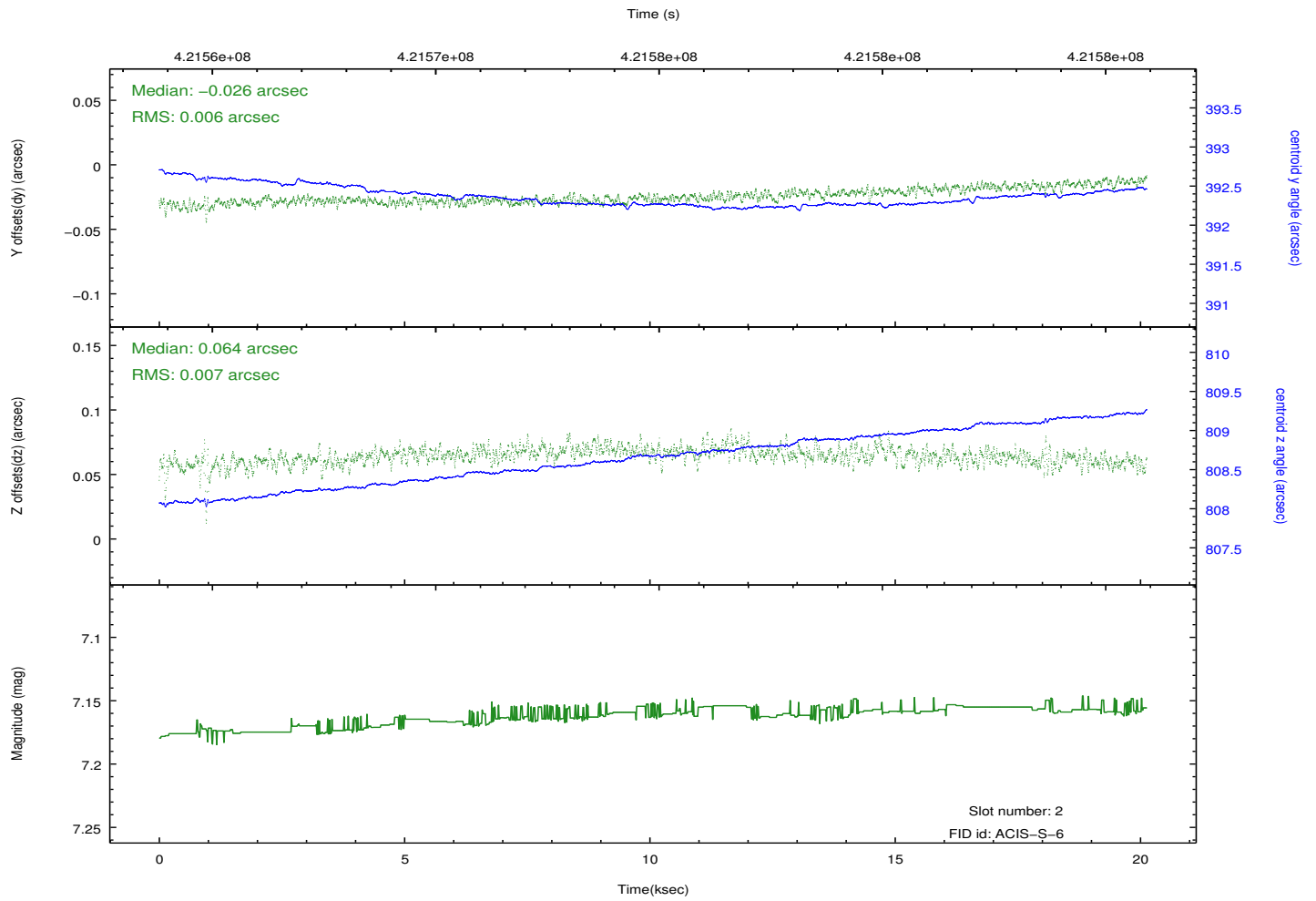
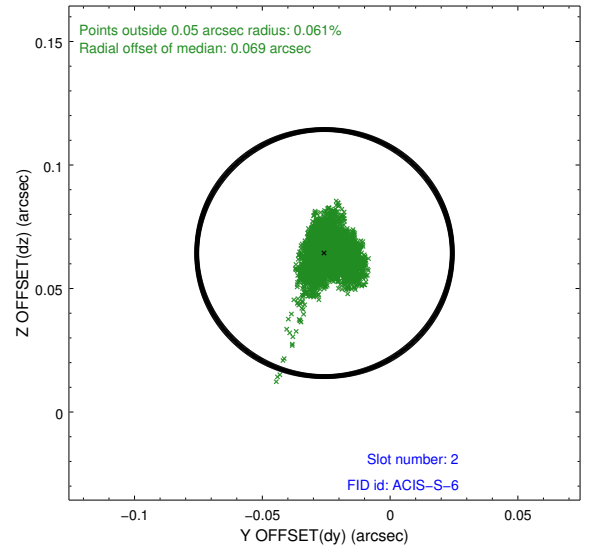
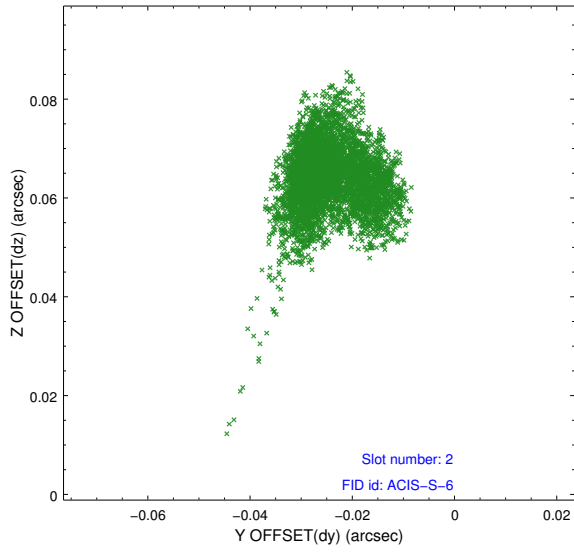
2.5.1 Slot 0



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)	2012.02.13
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	20.009598807335

A.2 Comments

The data for this observation have been processed using the 'EDSER' sub-pixel event-repositioning algorithm of Li et al. (2004, ApJ, 610, 1204). Small-scale features should become sharper for sources near the aim point. The improvement will be less noticeable for off-axis sources where the size of the point-spread function is comparable to or larger than the size of an ACIS pixel. To take full advantage of the improvement, images should be binned on spatial scales smaller than the size of an ACIS pixel. Note that, at present, the point-spread function has not been calibrated for data to which the EDSEr algorithm has been applied. If dither was disabled for the observation, then the algorithm can introduce artificial aliasing effects on spatial scales smaller than a pixel. If you would prefer to use no sub-pixel adjustment or to apply a coordinate randomization, then use `acis_process_events` to reprocess the data with the parameter `pix_adj=NONE` or `RANDOMIZE`, respectively.

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Joint Proposal: NRAO. Monitor constraint met.