

V&V Reference Report

L2 ASCDS Version : 8.4.4

Observation 10902 - L2 Version 2
Chandra X-Ray Center

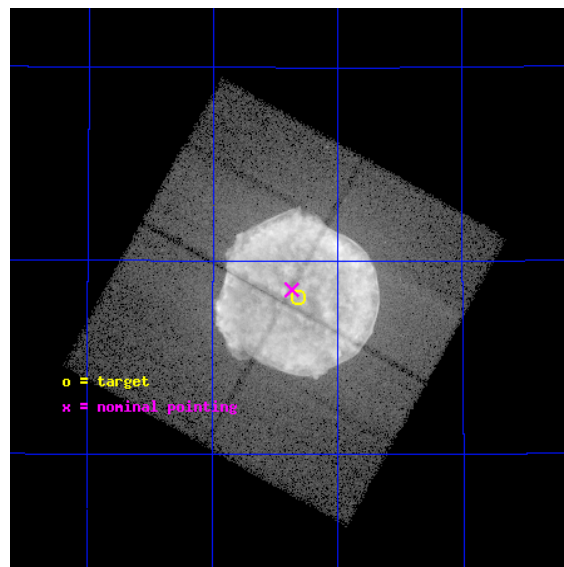
L2 Processing Date : Jun 4 2012

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1 Front

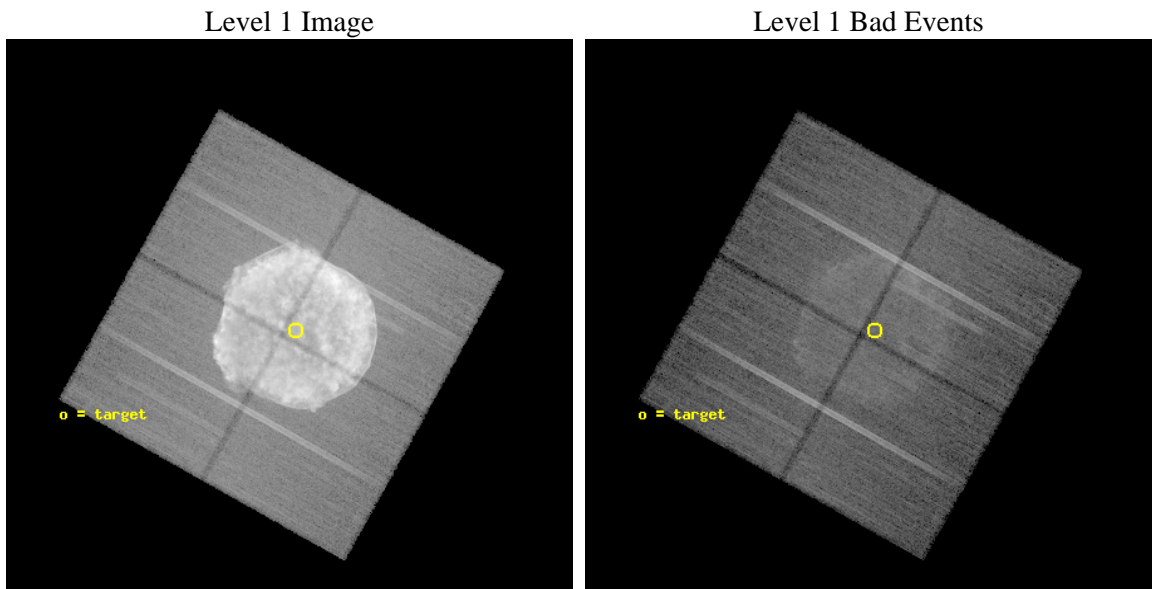
seq_num	501025	Sequence number
obs_id	10902	Observation id
title	A Deep Cycle 10 Chandra Observation of the Tycho Supernova Remnant	
observer	Prof. John Hughes	Principal investigator
object	Tycho's SNR	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	6.329167	Observer's specified target RA [deg]
dec_targ	64.136111	Observer's specified target Dec [deg]
ra_nom	6.3419368170103	Nominal RA [deg]
dec_nom	64.141967000289	Nominal Dec [deg]
roll_nom	29.197205450245	Nominal Roll [deg]
revision	2	Processing version of data
ontime	40055.100308061	Sum of GTIs [s]
livetime	39531.7509344	Livetime [s]
ontime0	40051.959337711	Sum of GTIs [s]
ontime1	40055.100308061	Sum of GTIs [s]
ontime2	40048.818387449	Sum of GTIs [s]
ontime3	40055.100308061	Sum of GTIs [s]
l2events	2683427	Number of level 2 events



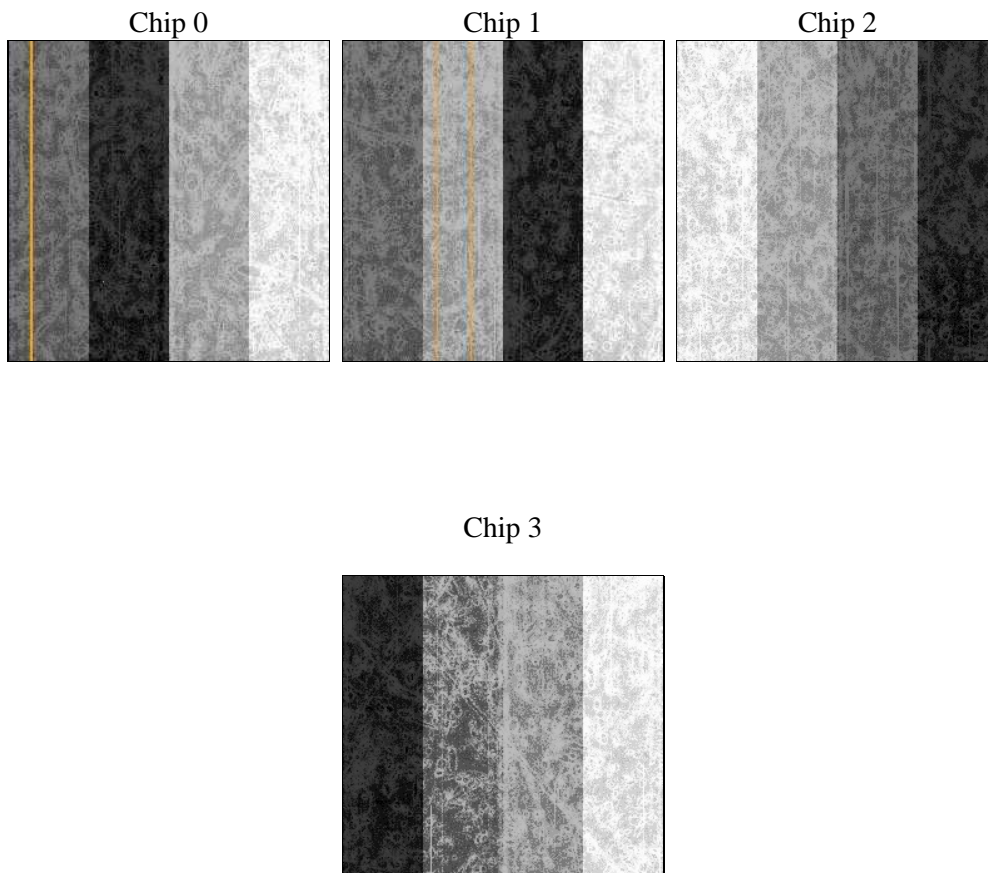
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	40000.000000	[s] Scheduled observation exposure time
ascdsver	8.4.4	Processing system revision	ontime	40055.100308061	Sum of GTIs [s]
caldbver	4.4.9	 	ontime0	40051.959337711	Sum of GTIs [s]
date	2012-06-04T16:03:44	Date and time of file creation	ontime1	40055.100308061	Sum of GTIs [s]
revision	2	Processing version of data	ontime2	40048.818387449	Sum of GTIs [s]
			ontime3	40055.100308061	Sum of GTIs [s]
			l1events	4048422	Number of level 1 events

2.1.4 Events

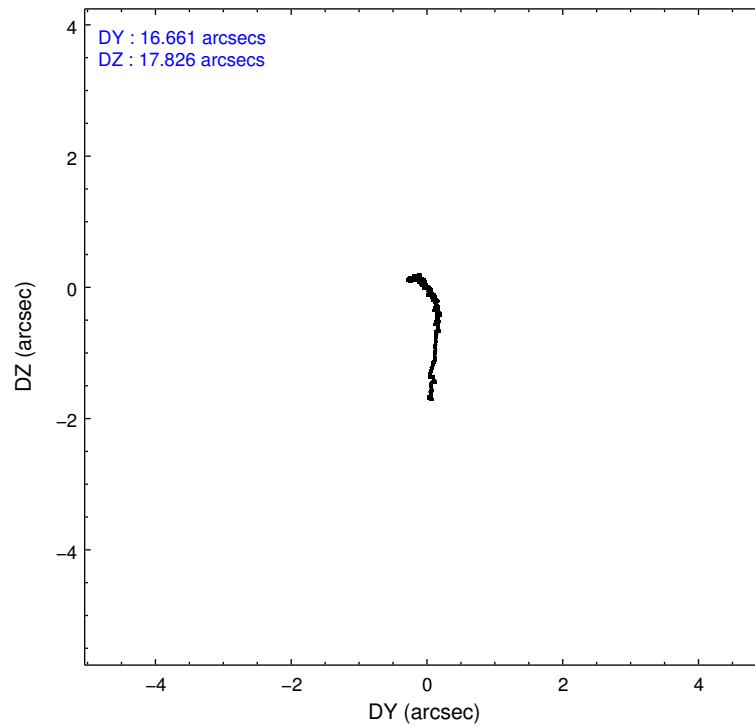
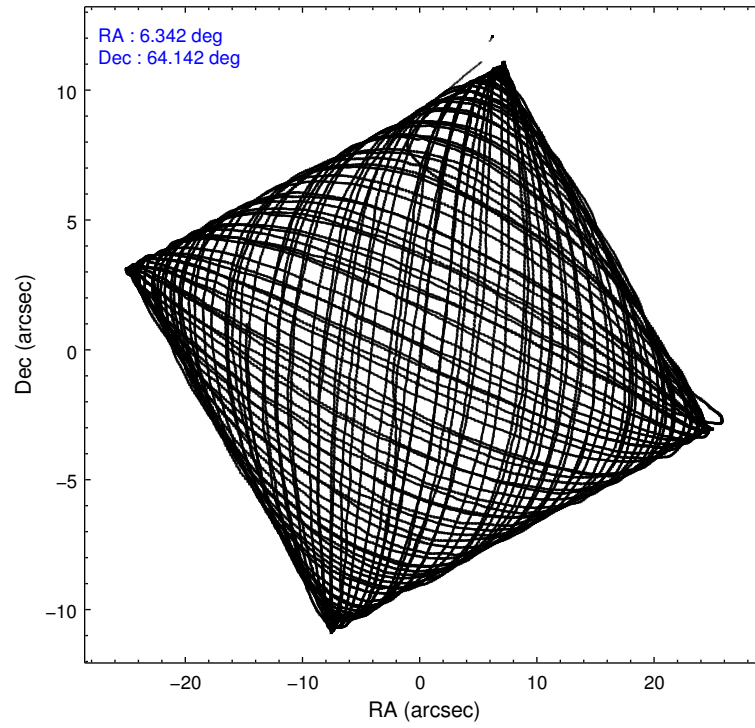
	ccd 0	ccd 1	ccd 2	ccd 3
level 1 events	677178	822253	1124092	1424899
rejected events	286453	280842	328466	322264
rejected %	42%	34%	29%	22%

	ccd 0	ccd 1	ccd 2	ccd 3
grade 0 events	310712	432537	659306	916273
	45%	52%	58%	64%
grade 1 events	2413	2869	5900	7854
	0%	0%	0%	0%
grade 2 events	42058	57607	73629	102380
	6%	7%	6%	7%
grade 3 events	13032	17825	22906	31108
	1%	2%	2%	2%
grade 4 events	12798	17384	22942	30992
	1%	2%	2%	2%
grade 5 events	11517	13421	13118	16573
	1%	1%	1%	1%
grade 6 events	12154	16102	16904	21972
	1%	1%	1%	1%
grade 7 events	272494	264508	309387	297747
	40%	32%	27%	20%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-0123	ACIS-0123	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	6.309882	6.341936817010264	Subarray requested	NONE	NONE
[deg] Pointing Dec	64.118291	64.14196700028945	Alternating exposures requested	N	N
[deg] Pointing Roll	29.017354	29.19720545024543	[s] Primary exposure time	0.000000	3.1
[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)	356225625.184000	356223508.64759			
Observation start date	2009-04-15T23:32:39	2009-04-15T22:58:28			
[s] Observation end time (MET)	356265625.184000	356265956.4622			
Observation end date	2009-04-16T10:39:19	2009-04-16T10:45:56			
Read mode	TIMED	TIMED			

2.3 Aspect

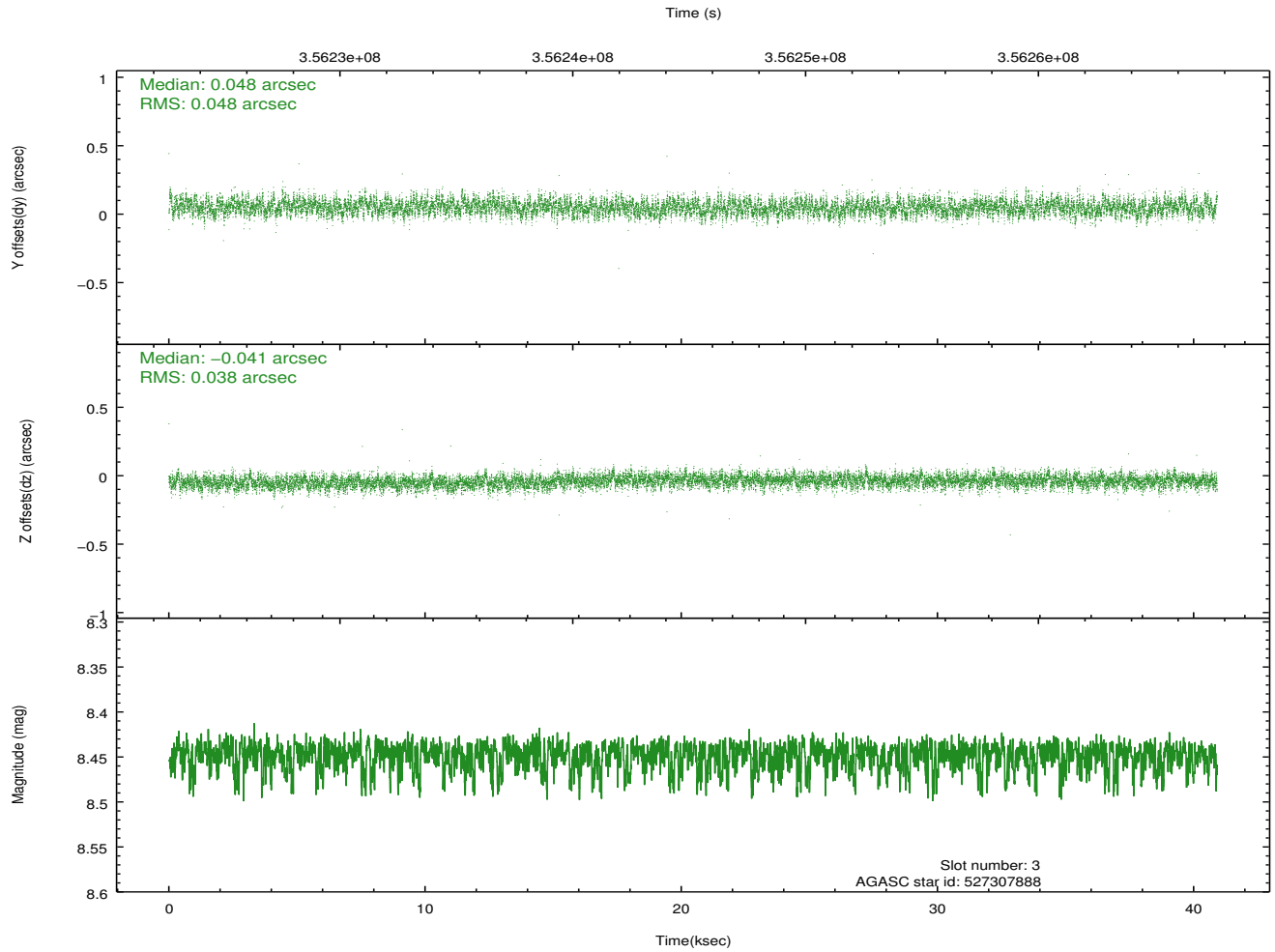
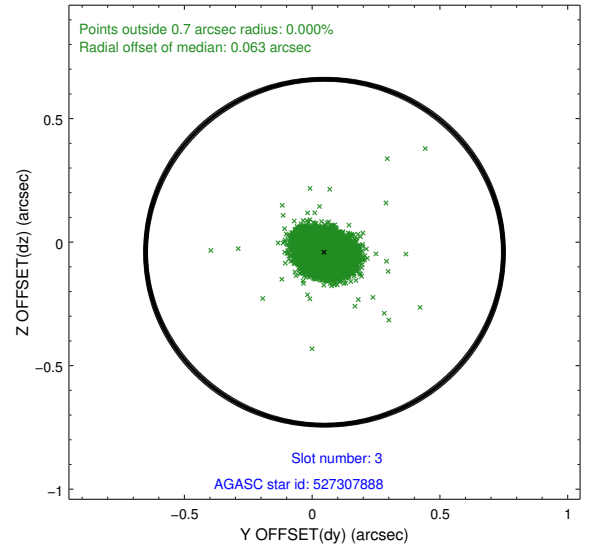
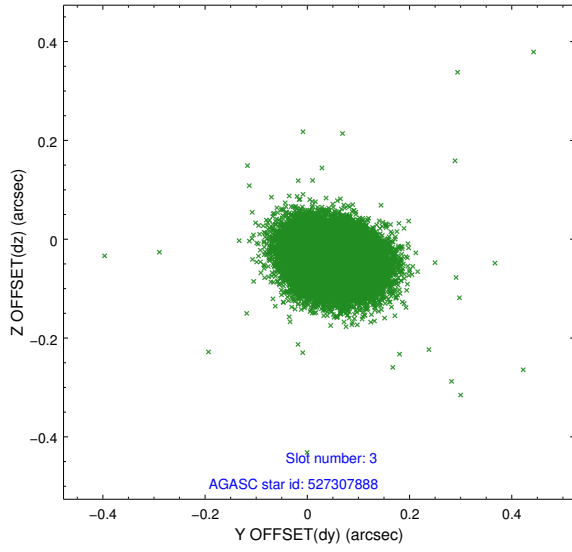


Slot Statistics

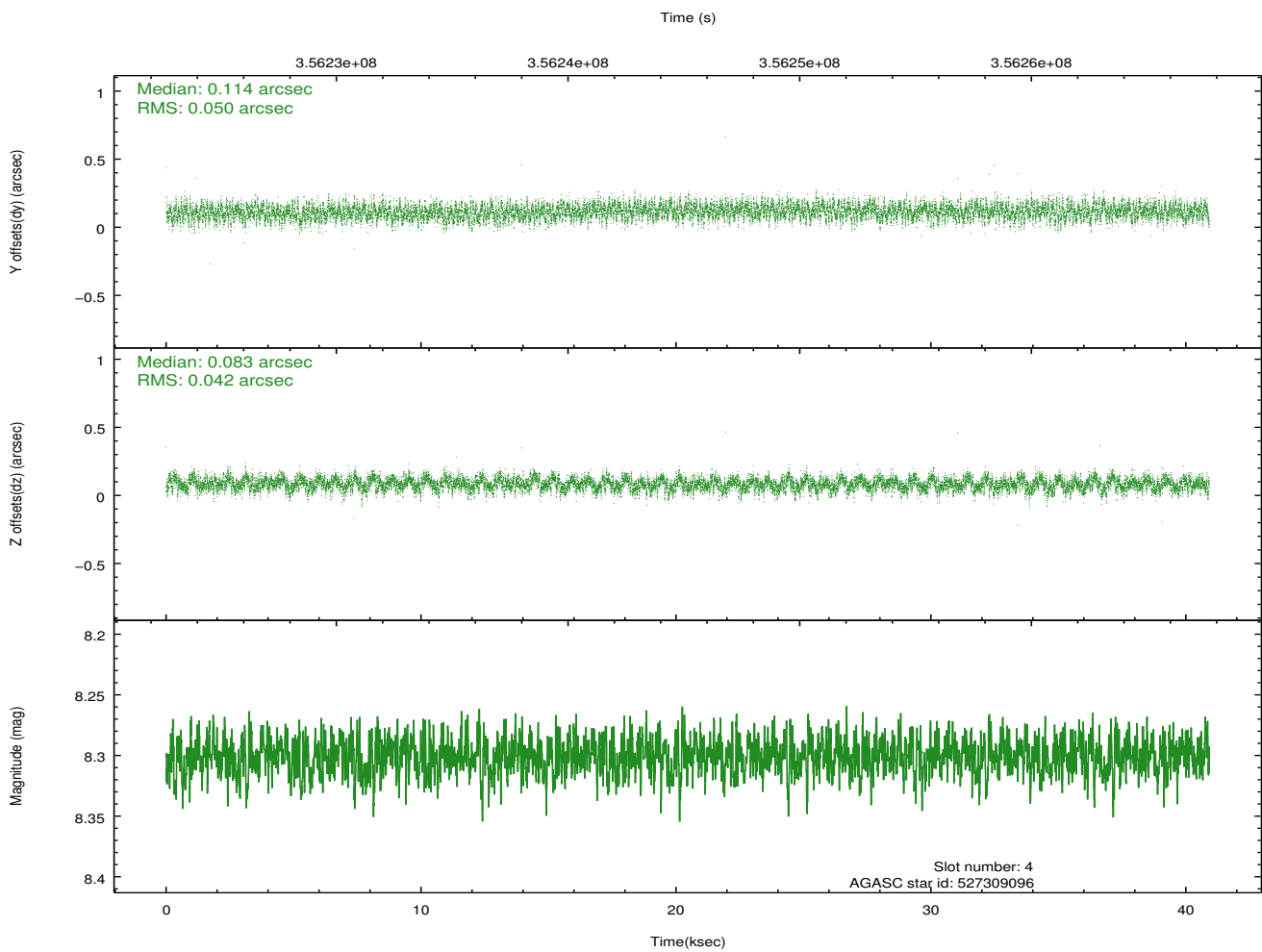
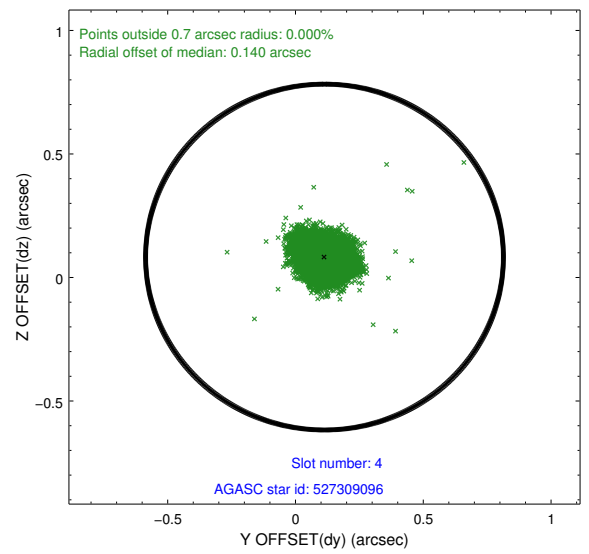
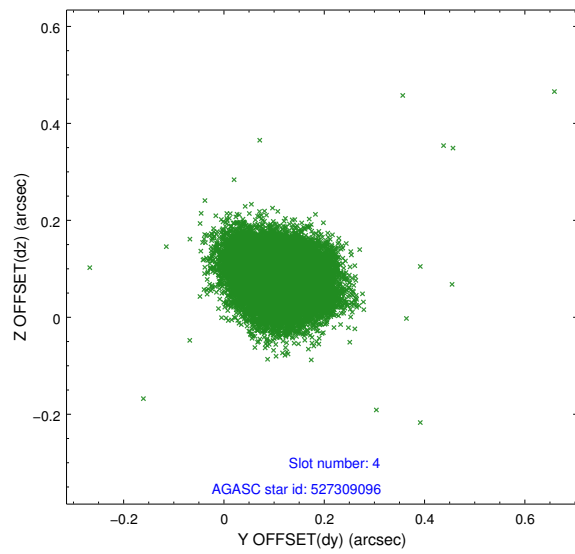
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-I-1	7.00	9980	-0.033	-0.056	0.033	0.053	0.000000	0.000000	922.74	-841.28
1	FID	ACIS-I-4	6.94	9979	0.173	0.080	0.028	0.042	0.000000	0.000000	2142.97	1058.65
2	FID	ACIS-I-5	6.99	9979	-0.237	0.046	0.014	0.024	0.000000	0.000000	-1825.47	1056.44
3	GUIDE	527307888	8.45	19948	0.048	-0.041	0.064	0.104	4.965121	64.287990	-1529.32	1572.37
4	GUIDE	527309096	8.30	19952	0.114	0.083	0.069	0.111	7.726277	64.064373	1868.38	-1229.19
5	GUIDE	527310400	7.73	19958	-0.056	-0.219	0.066	0.105	6.292387	64.638680	885.29	1651.36
6	GUIDE	526789120	8.88	19947	-0.047	0.057	0.087	0.142	5.233481	63.667511	-2282.86	-572.62
7	GUIDE	526791328	8.62	19946	-0.061	0.118	0.081	0.127	7.600207	63.681314	1048.34	-2355.99

2.4 Star Slots

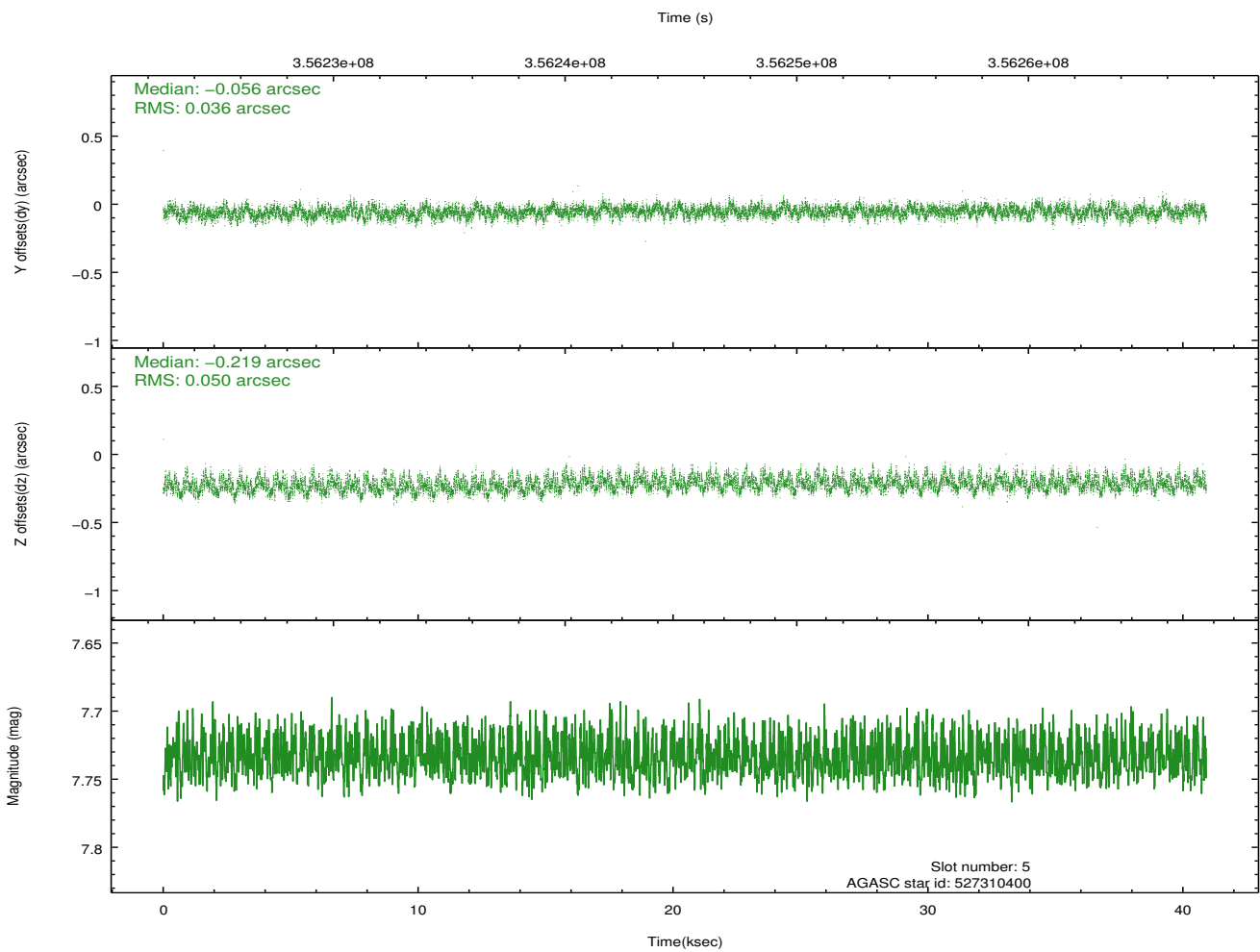
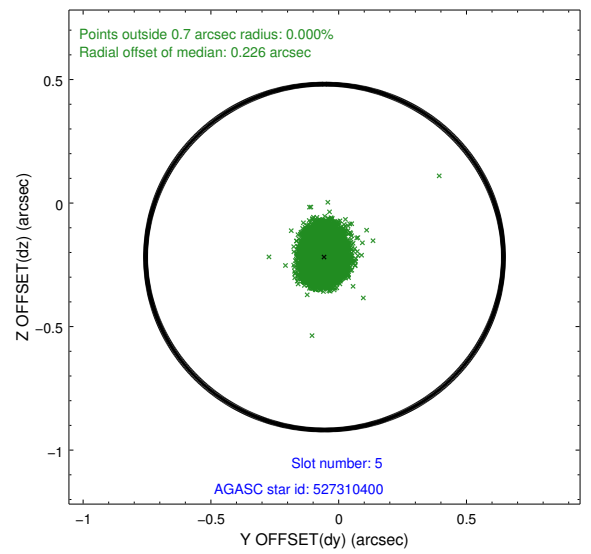
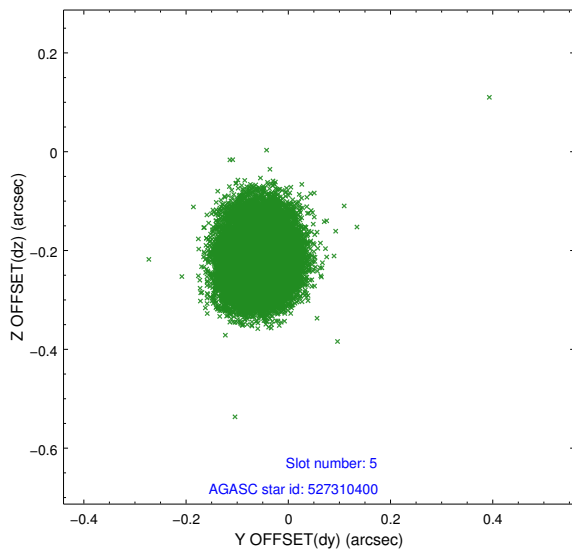
2.4.1 Slot 3



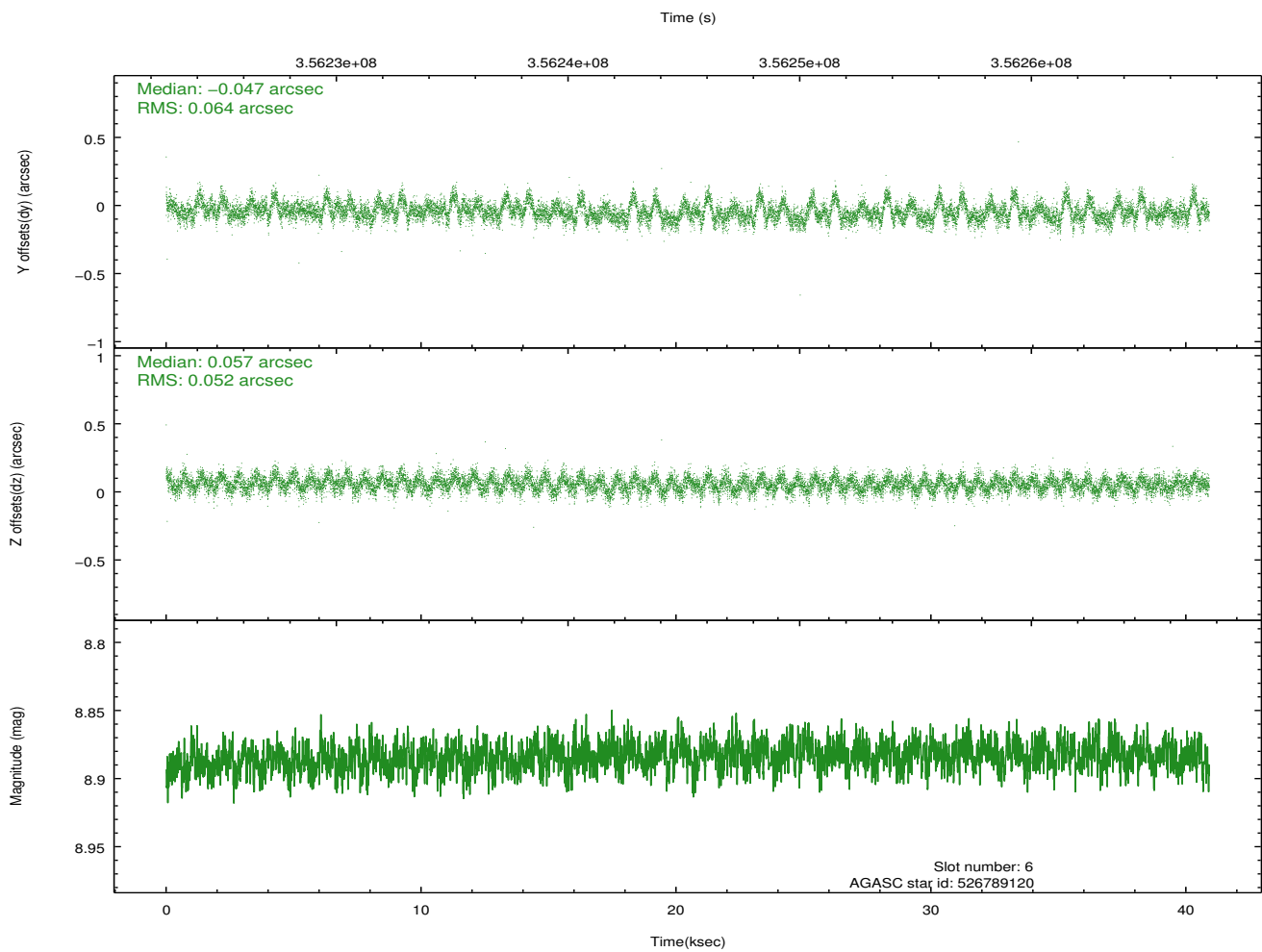
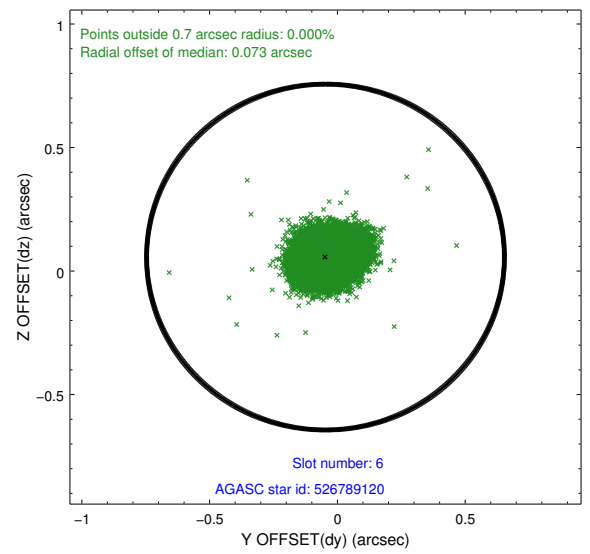
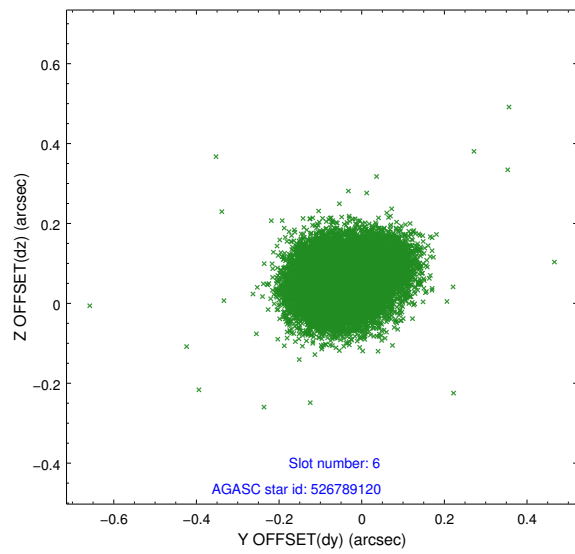
2.4.2 Slot 4



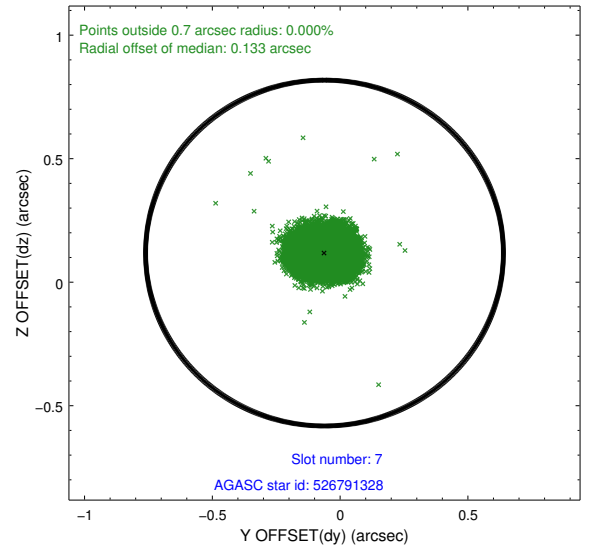
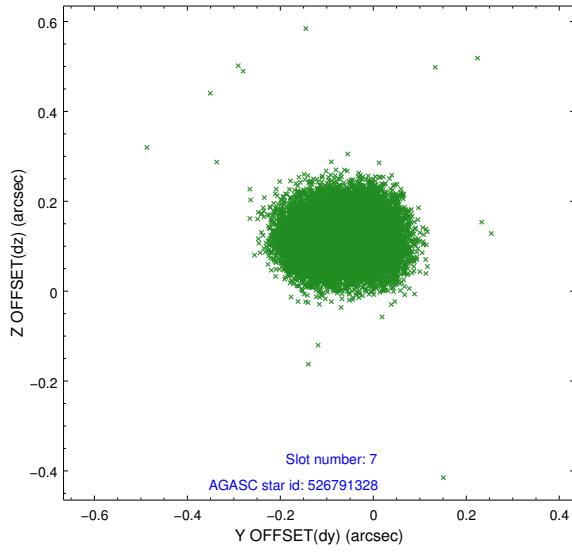
2.4.3 Slot 5



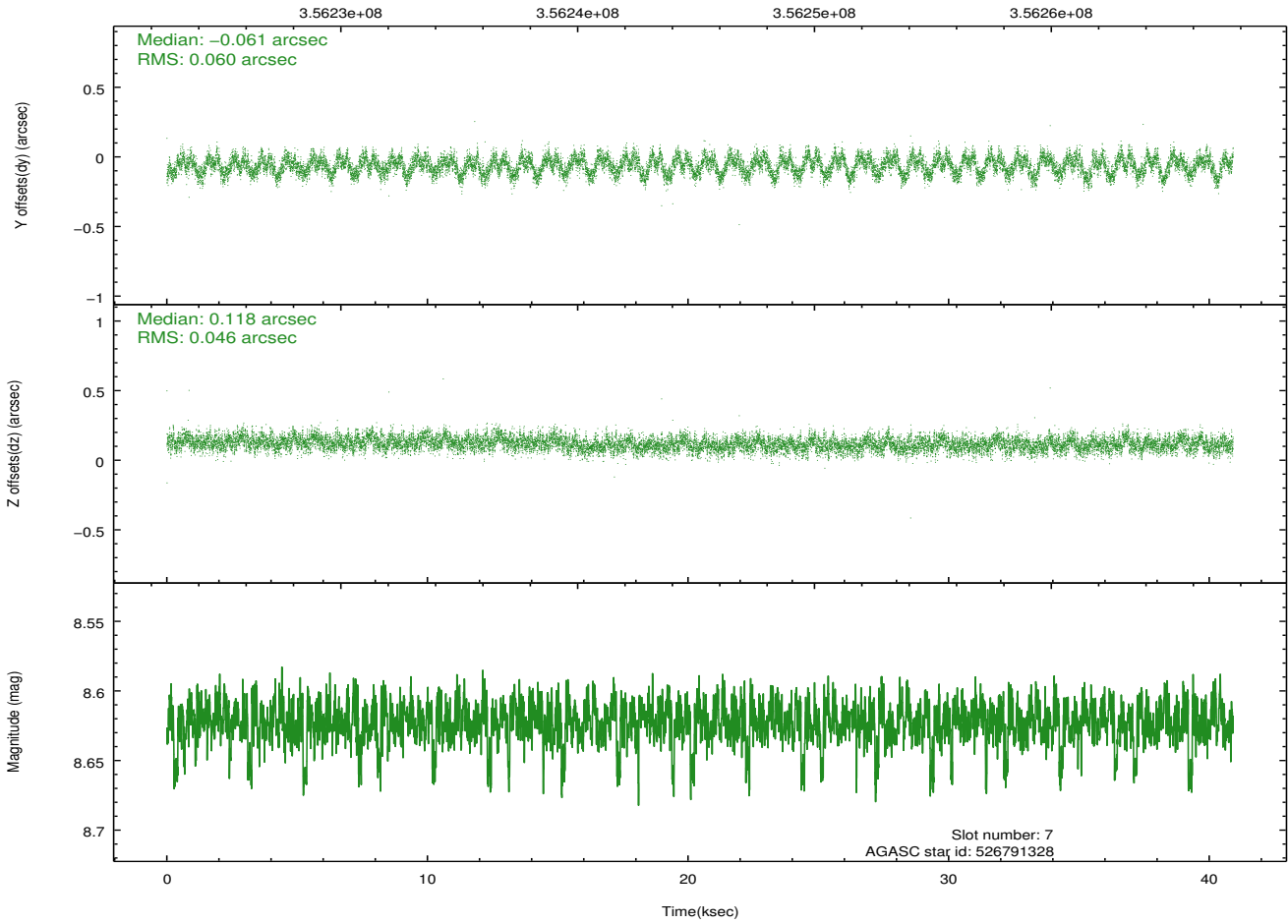
2.4.4 Slot 6



2.4.5 Slot 7

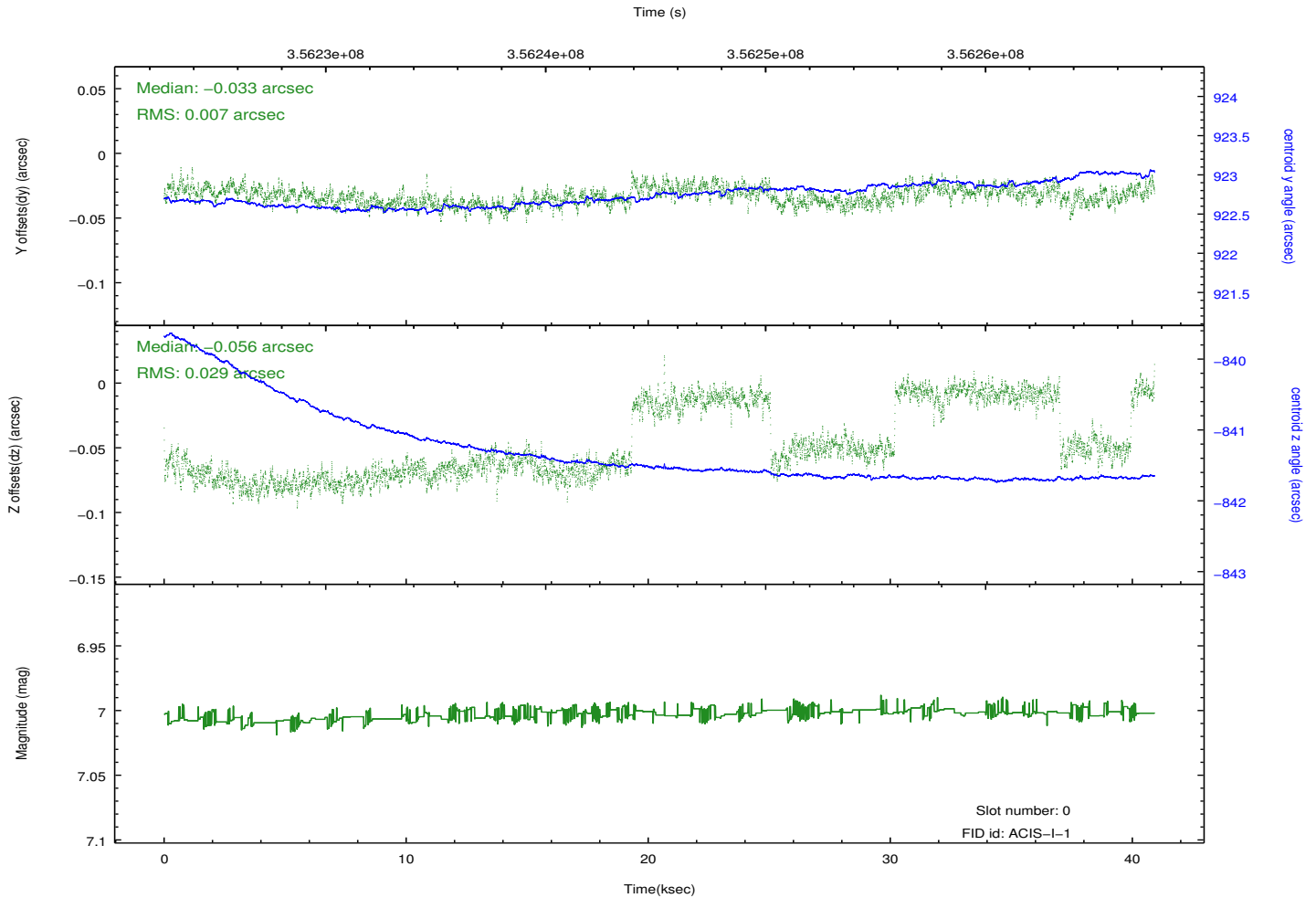
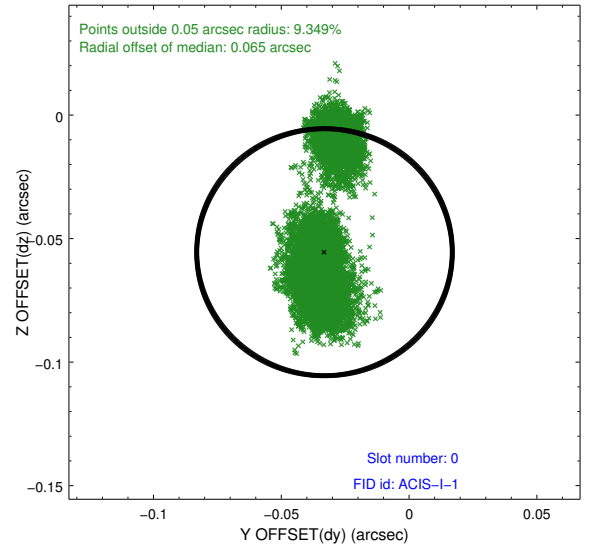
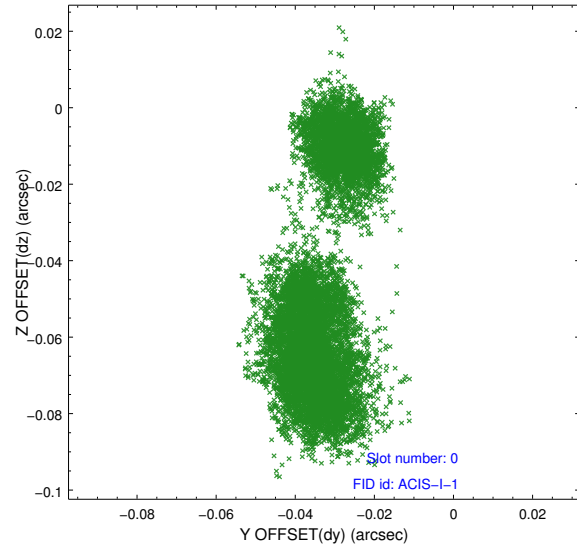


Time (s)

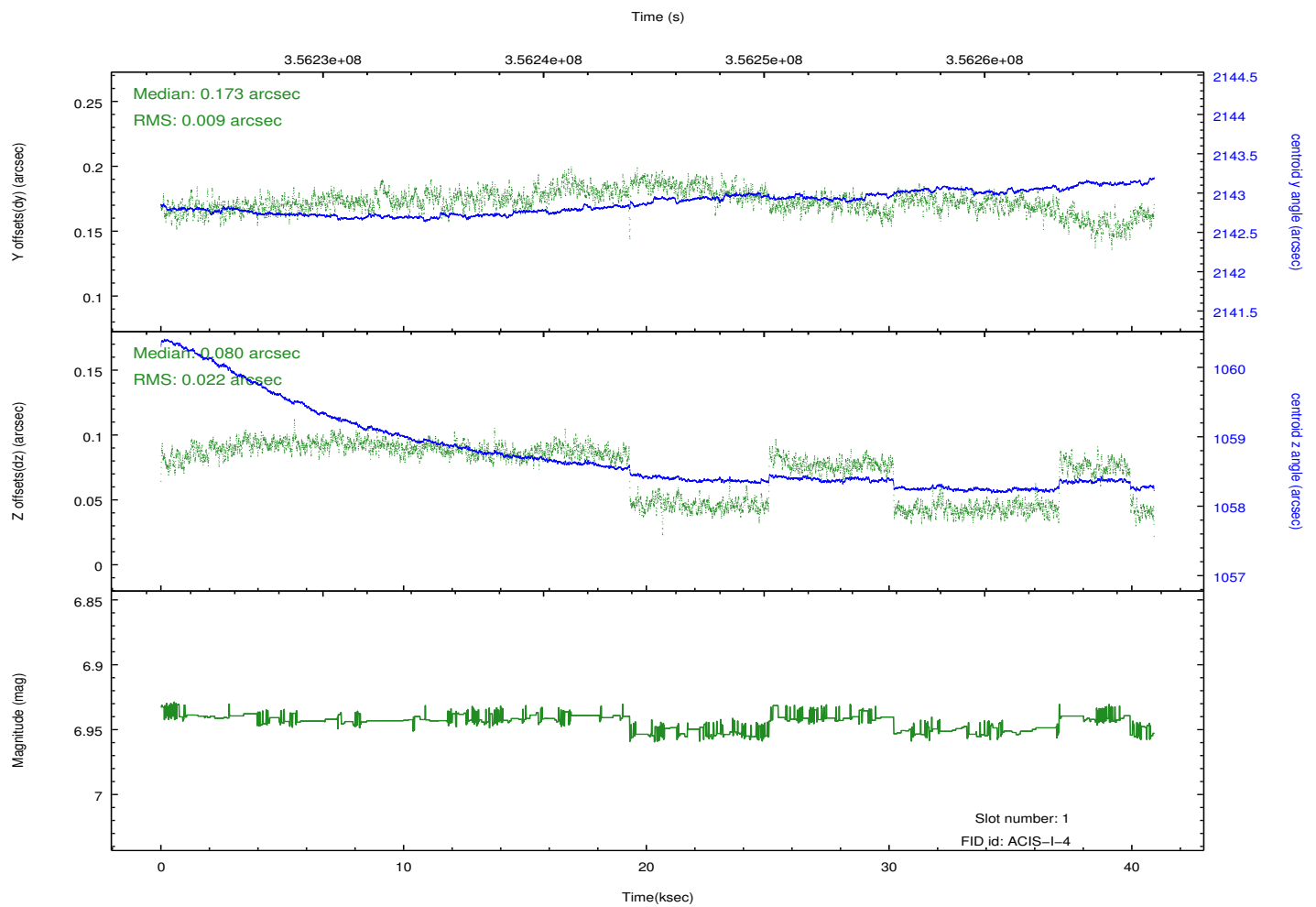
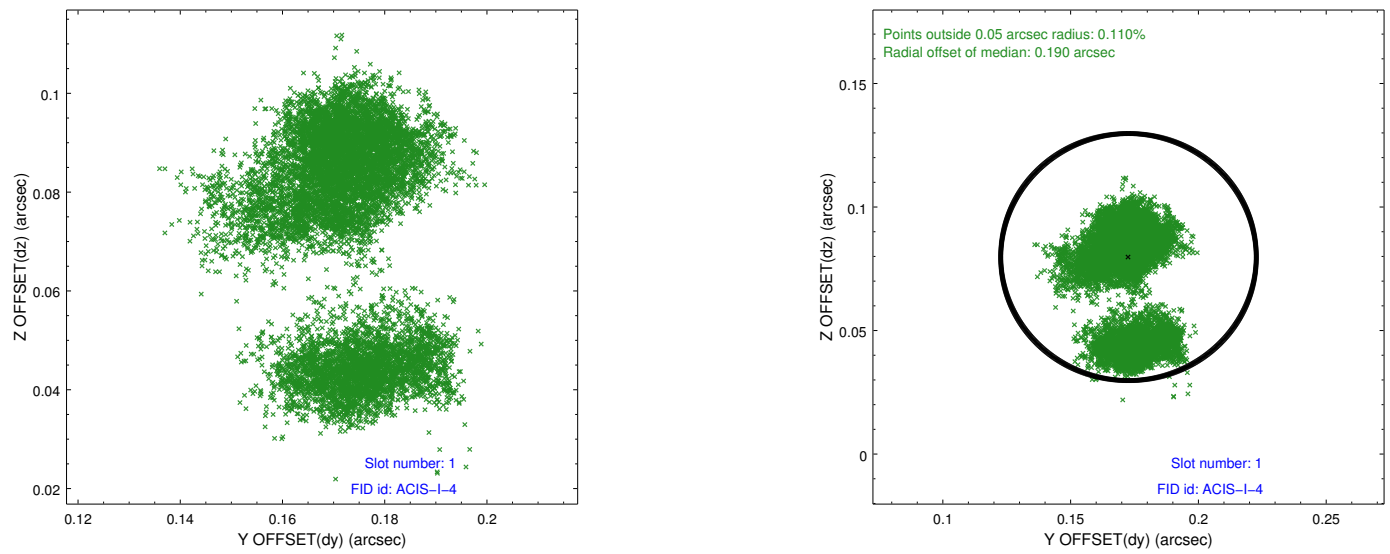


2.5 FID Slots

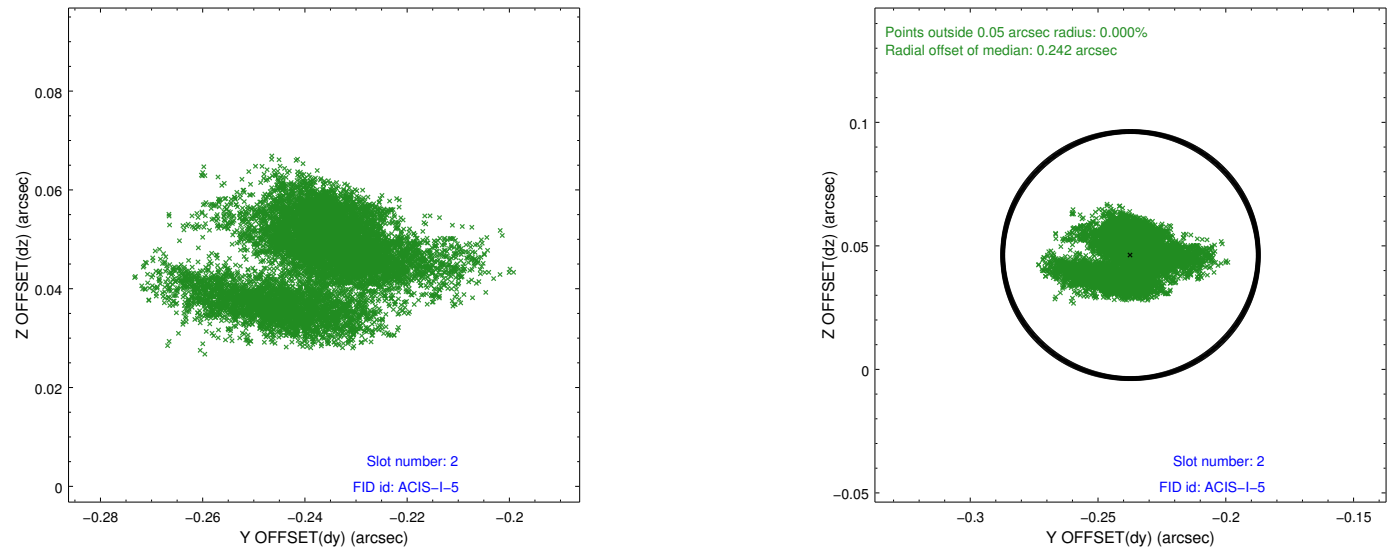
2.5.1 Slot 0



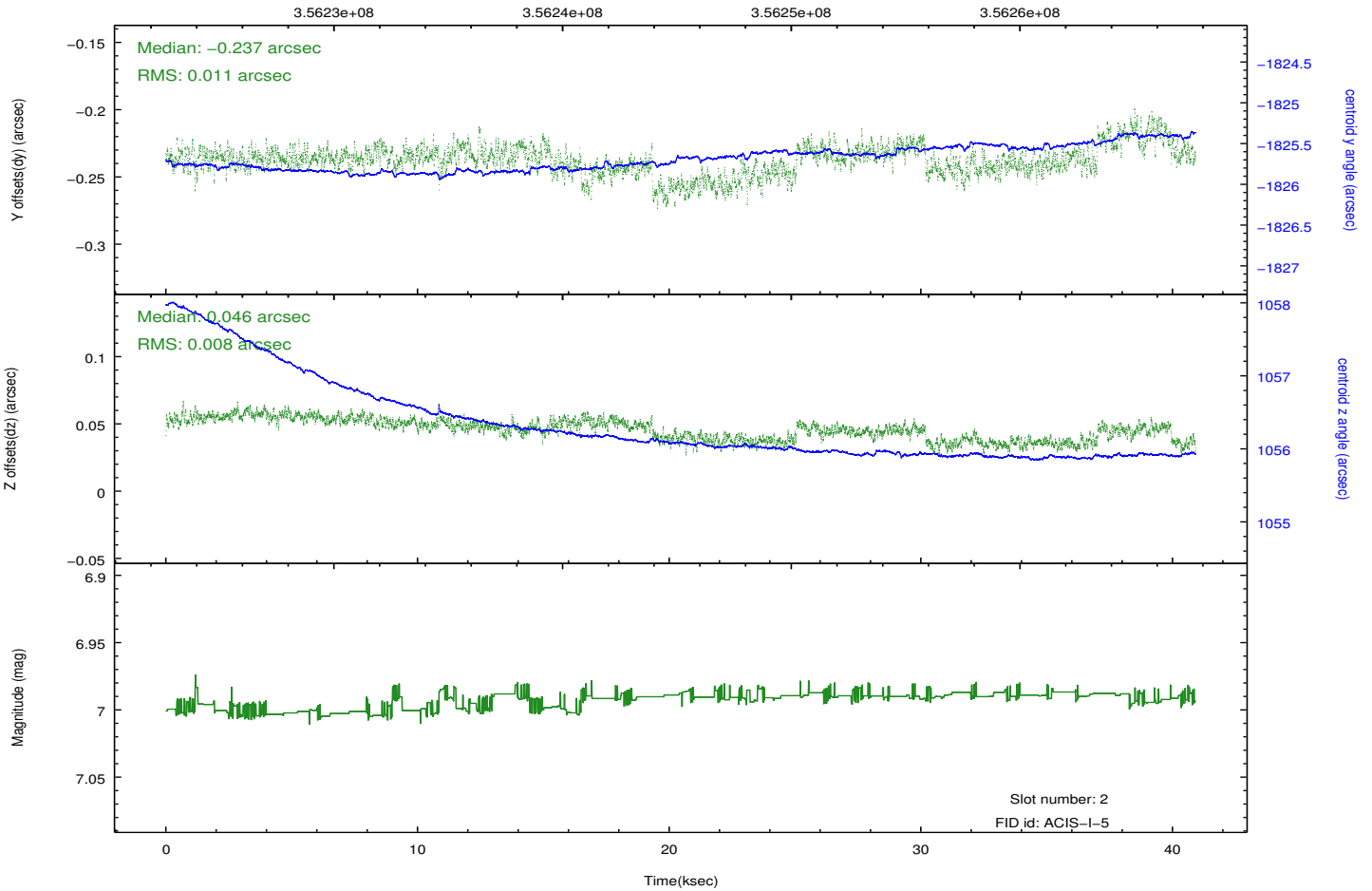
2.5.2 Slot 1



2.5.3 Slot 2



Time (s)



A Summary

A.1 Status

V&V Scientist	Jen Lauer
V&V Date (YYYY-MM-DD)	2012.06.08
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	40.0551003

A.2 Comments

Roll preference met.