

V&V Reference Report

L2 ASCDS Version : 10.9.1

Observation 5144 - L2 Version 4
Chandra X-Ray Center

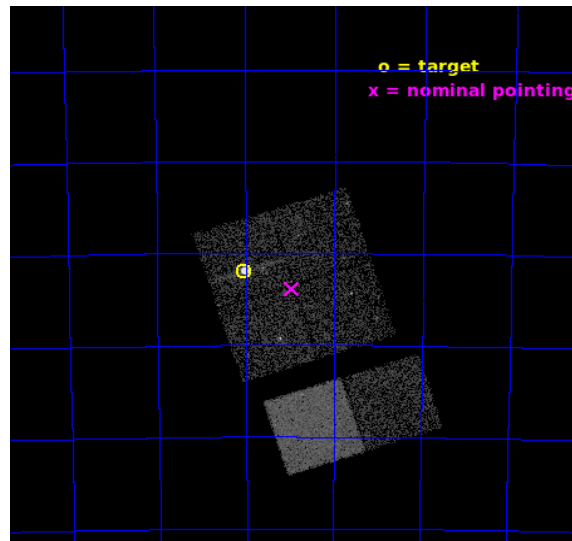
L2 Processing Date : Sep 25 2020

Contents

1	Front	2
2	OBI	3
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
A	Summary	17
A.1	Status	17
A.2	Comments	17

1 Front

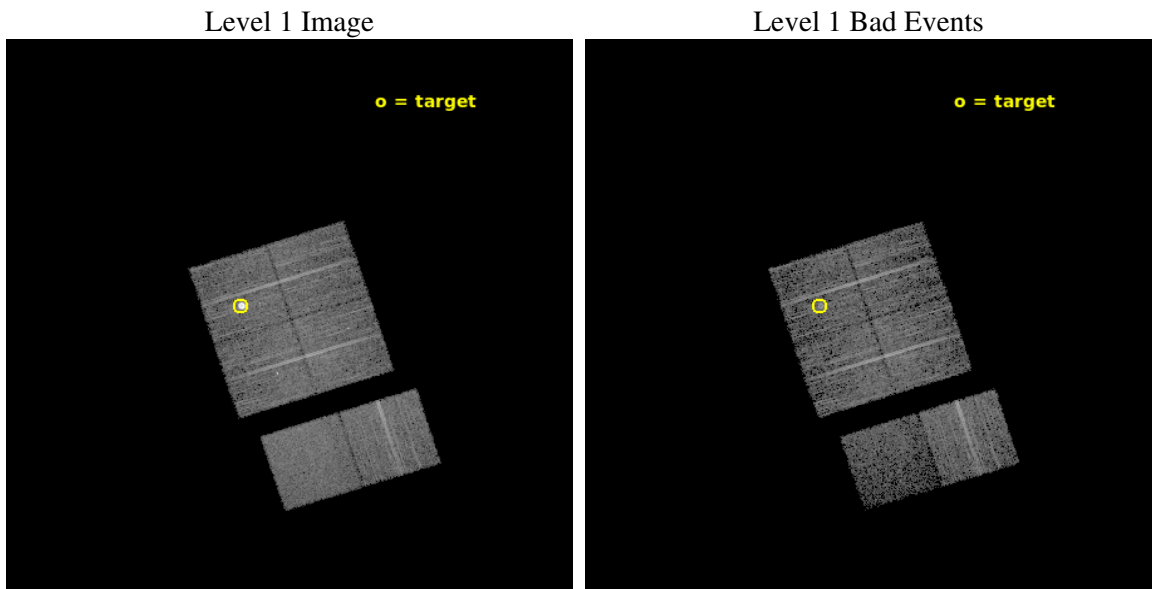
seq_num	590342	Sequence number
obs_id	5144	Observation id
title	AO5B ACIS-I Calibration Observations of E0102-72	Proposal title
observer	CXC Calibration	Principal investigator
object	E0102-72.3	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	16.01	Observer's specified target RA [deg]
dec_targ	-72.032028	Observer's specified target Dec [deg]
ra_nom	15.739359339941	Nominal RA [deg]
dec_nom	-72.064490789392	Nominal Dec [deg]
roll_nom	162.1627923513	Nominal Roll [deg]
revision	4	Processing version of data
ontime	7235.1772265732	Sum of GTIs [s]
livetime	7143.5610560297	Livetime [s]
ontime0	7231.895216316	Sum of GTIs [s]
ontime1	7235.1772265732	Sum of GTIs [s]
ontime2	7235.1999730468	Sum of GTIs [s]
ontime3	7235.1999730468	Sum of GTIs [s]
ontime6	7235.1999730468	Sum of GTIs [s]
ontime7	7235.1999730468	Sum of GTIs [s]
l2events	56219	Number of level 2 events



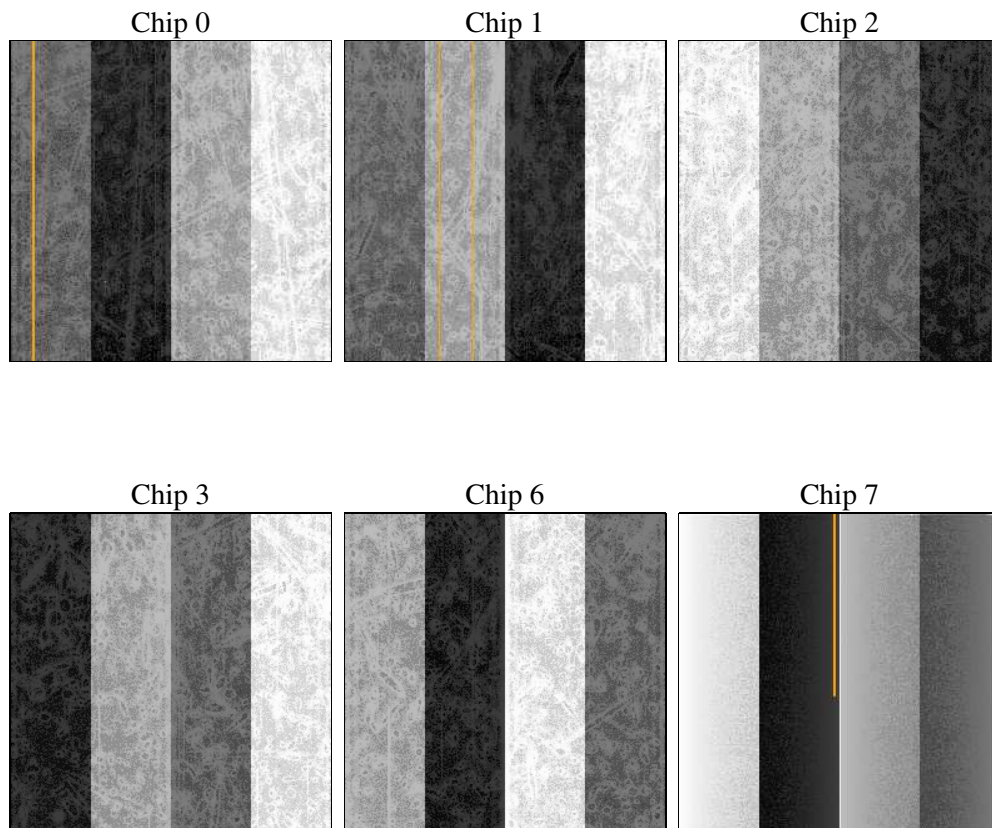
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	7481.000000	[s] Scheduled observation exposure time
ascdsver	10.9.1	Processing system revision	ontime	7235.1772265732	Sum of GTIs [s]
caldsver	4.9.2	 	ontime0	7231.895216316	Sum of GTIs [s]
date	2020-09-25T08:57:21	Date and time of file creation	ontime1	7235.1772265732	Sum of GTIs [s]
revision	4	Processing version of data	ontime2	7235.1999730468	Sum of GTIs [s]
			ontime3	7235.1999730468	Sum of GTIs [s]
			ontime6	7235.1999730468	Sum of GTIs [s]
			ontime7	7235.1999730468	Sum of GTIs [s]
			l1events	253275	Number of level 1 events

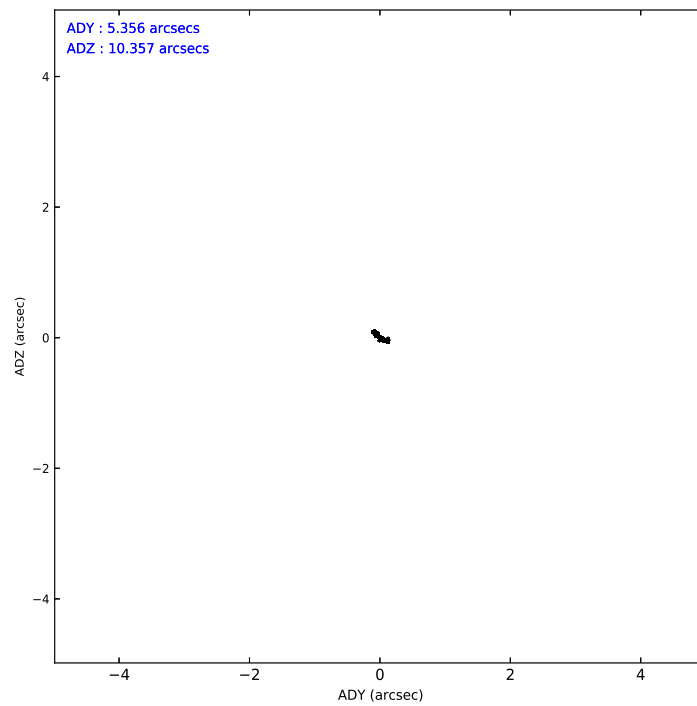
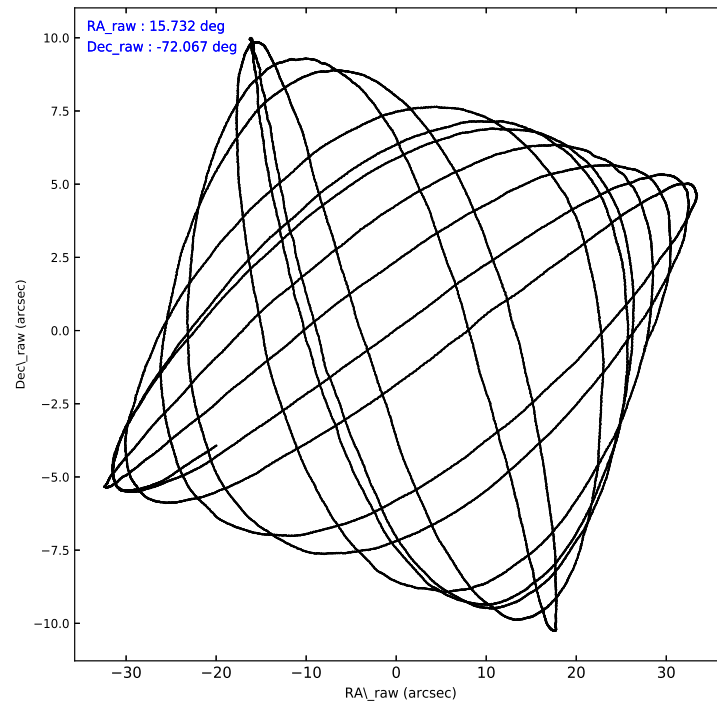
2.1.4 Events

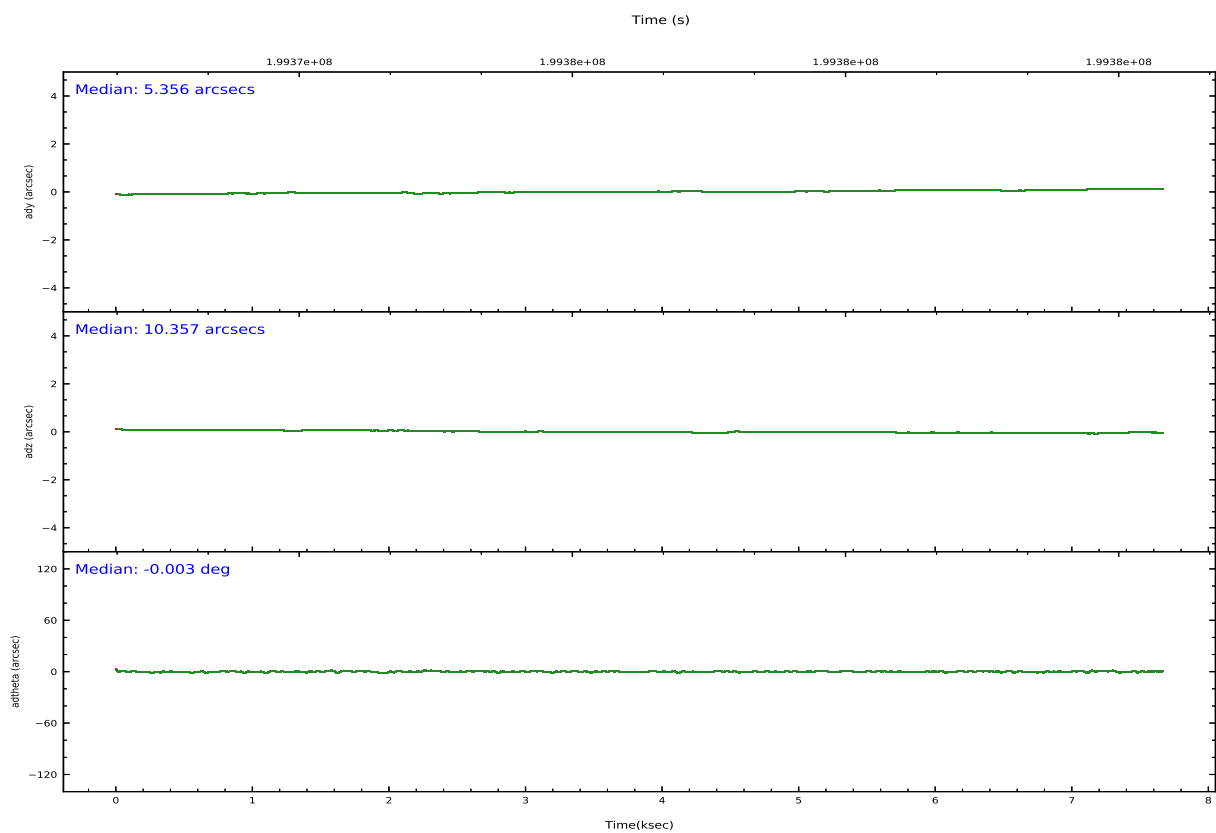
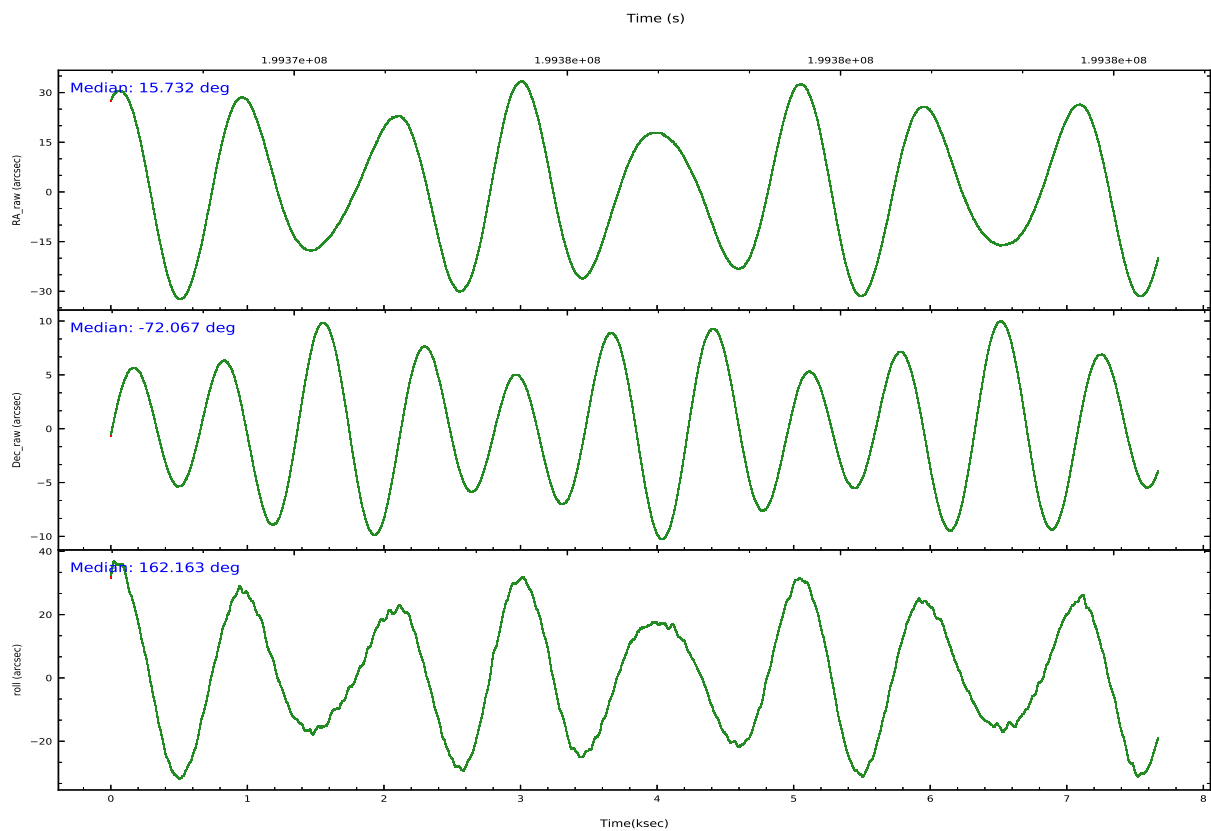
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6	ccd 7		ccd 0	ccd 1	ccd 2	ccd 3	ccd 6	ccd 7
level 1 events	35583	58540	41062	39580	41151	37359	grade 0 events	1588	21018	1737	1970	1636	1900
rejected events	31600	32437	36941	35142	37009	18772		4%	35%	4%	4%	3%	5%
rejected %	88%	55%	89%	88%	89%	50%	grade 1 events	13	196	30	39	10	35
								0%	0%	0%	0%	0%	0%
							grade 2 events	888	2486	827	847	821	3930
								2%	4%	2%	2%	1%	10%
							grade 3 events	449	828	449	477	456	1834
								1%	1%	1%	1%	1%	4%
							grade 4 events	387	827	474	413	446	1804
								1%	1%	1%	1%	1%	4%
							grade 5 events	1144	1332	1144	1377	1386	4176
								3%	2%	2%	3%	3%	11%
							grade 6 events	674	973	641	735	784	9146
								1%	1%	1%	1%	1%	24%
							grade 7 events	30440	30880	35760	33722	35612	14534
								85%	52%	87%	85%	86%	38%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar version number	8	8
Detector	ACIS-012367	ACIS-012367	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	15.818396	15.739359339941	Subarray requested	NONE	NONE
[deg] Pointing Dec	-72.060967	-72.064490789392	Alternating exposures requested	N	N
[deg] Pointing Roll	162.044821	162.1627923513	[s] Primary exposure time	0.000000	3.2
[s] Window start time (MET)	197164864.184000	197164864.184000			
[s] Window stop time (MET)	199670464.184000	199670464.184000			
[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)	199372846.184000	199372469.56406			
Observation start date	2004-04-26T13:19:42	2004-04-26T13:14:29			
[s] Observation end time (MET)	199380327.184000	199380460.46441			
Observation end date	2004-04-26T15:24:23	2004-04-26T15:27:40			
Read mode	TIMED	TIMED			

2.3 Aspect



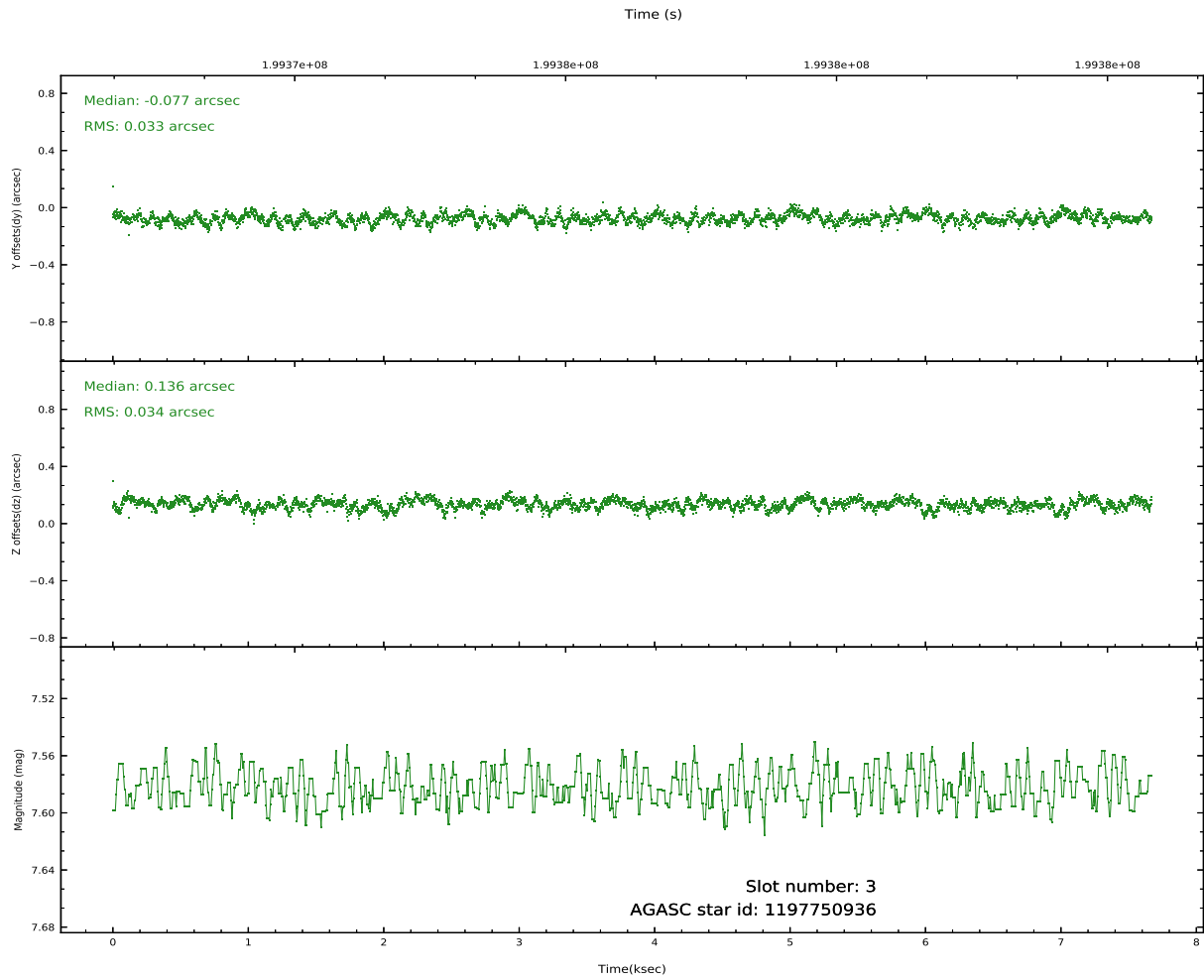
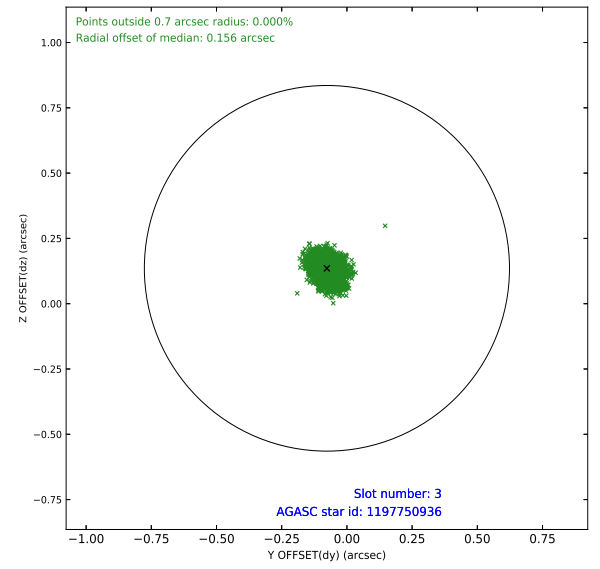
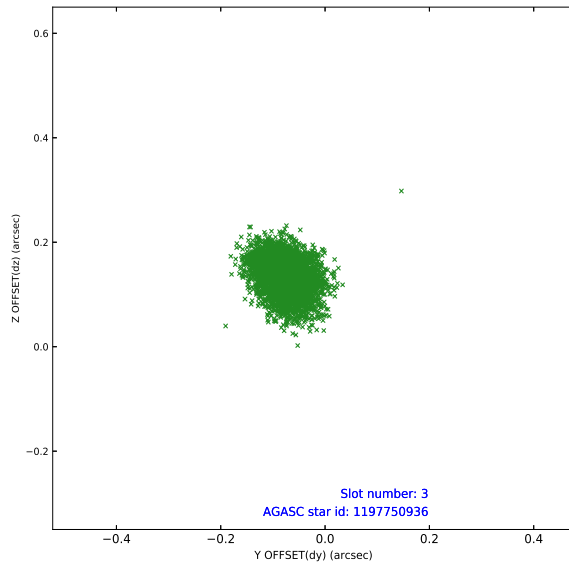


Slot Statistics

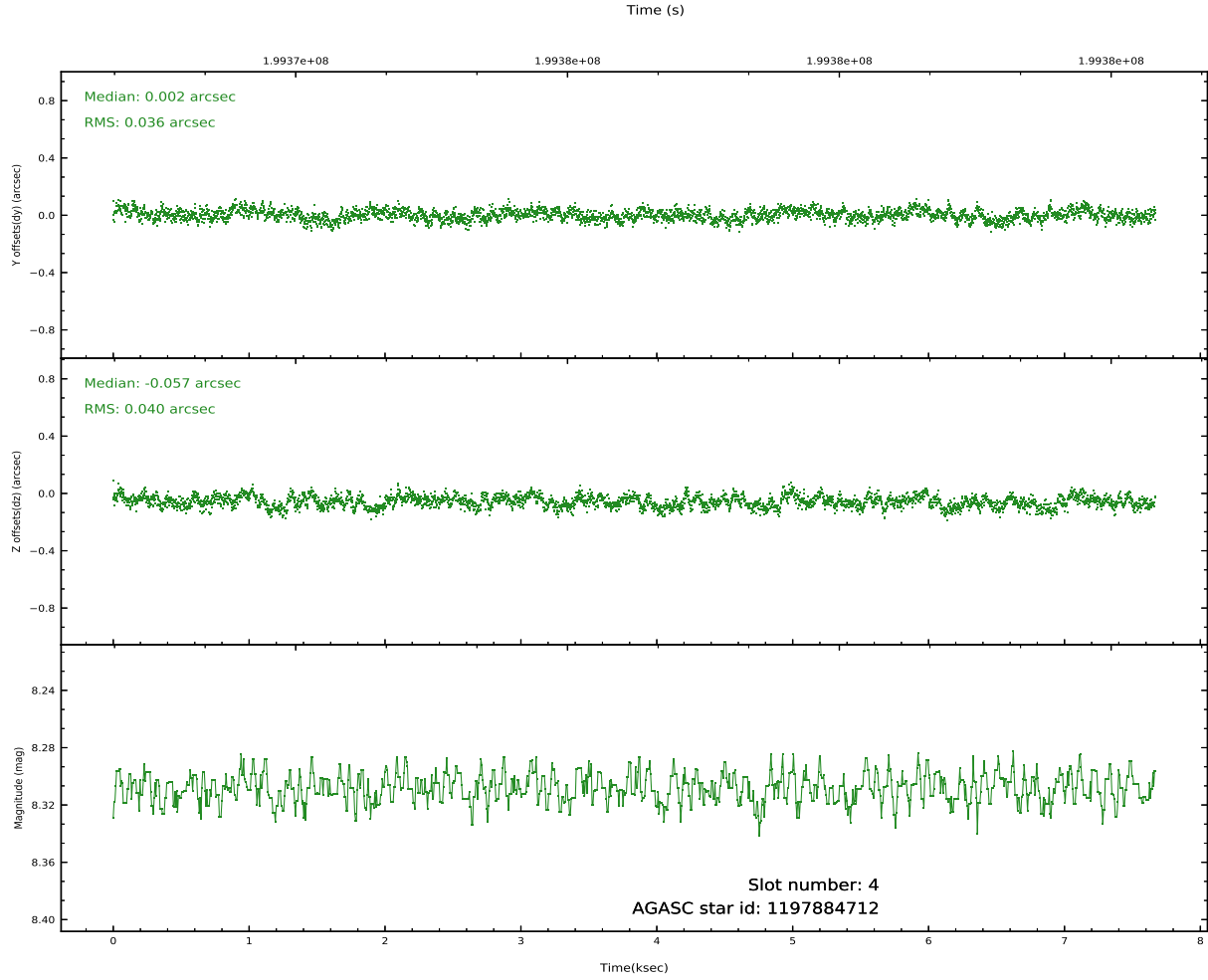
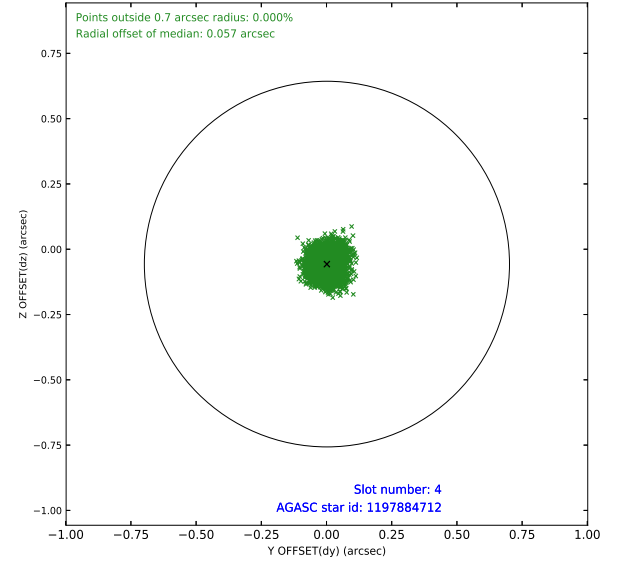
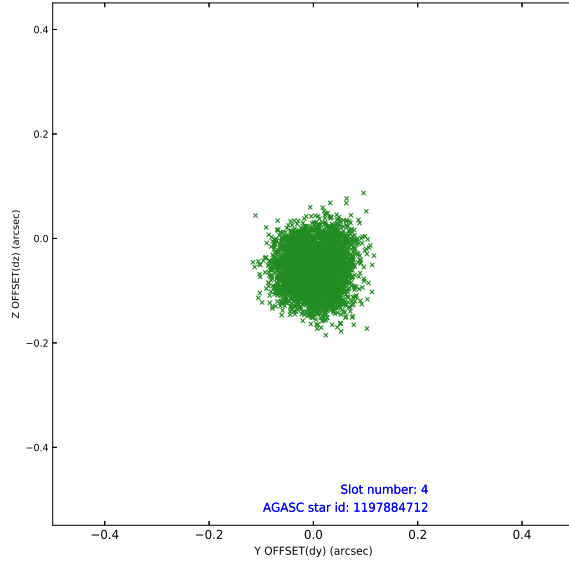
pt	status	used	id	mag	n_pts	frac_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mea
0	FID		ACIS-I-2	7.14	1871	1.000	-0.083	-0.109	0.009	0.016	0.000000	0.000000	-759.88	-840
1	FID		ACIS-I-4	7.18	1871	1.000	0.146	0.080	0.006	0.010	0.000000	0.000000	2154.05	1065
2	FID		ACIS-I-5	7.23	1871	1.000	-0.164	0.097	0.009	0.014	0.000000	0.000000	-1812.86	1064
3	GUIDE	used	1197750936	7.58	3741	1.000	-0.077	0.136	0.051	0.081	15.387940	-71.549550	1033.90	-1597
4	GUIDE	used	1197884712	8.31	3742	1.000	0.002	-0.057	0.059	0.092	16.087398	-72.252690	-493.47	565
5	GUIDE	used	1197885104	9.36	3740	1.000	0.148	0.180	0.087	0.140	17.845067	-72.189368	-2276.33	-212
6	GUIDE	used	1197885328	7.25	3740	1.000	0.039	0.048	0.048	0.076	16.283090	-71.733943	-137.00	-1279
7	GUIDE	used	1198189696	7.37	3741	1.000	-0.113	-0.307	0.059	0.087	15.223750	-72.697522	-102.26	2378

2.4 Star Slots

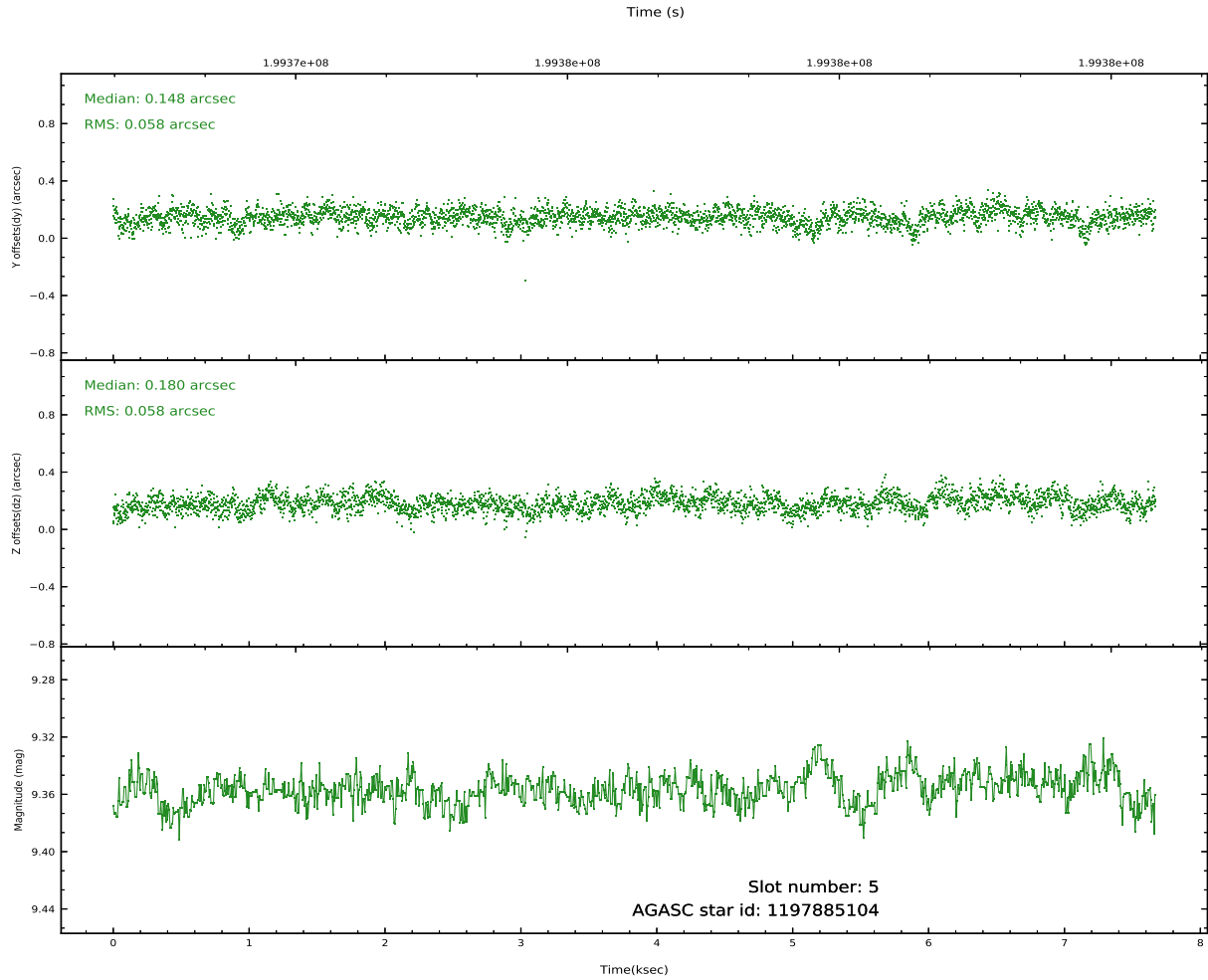
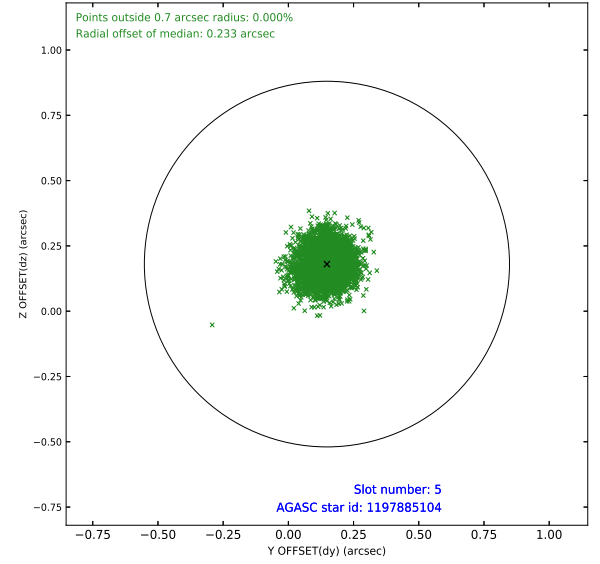
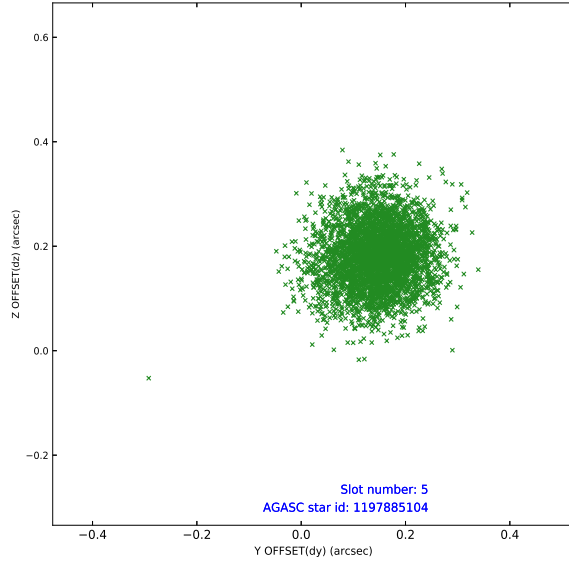
2.4.1 Slot 3



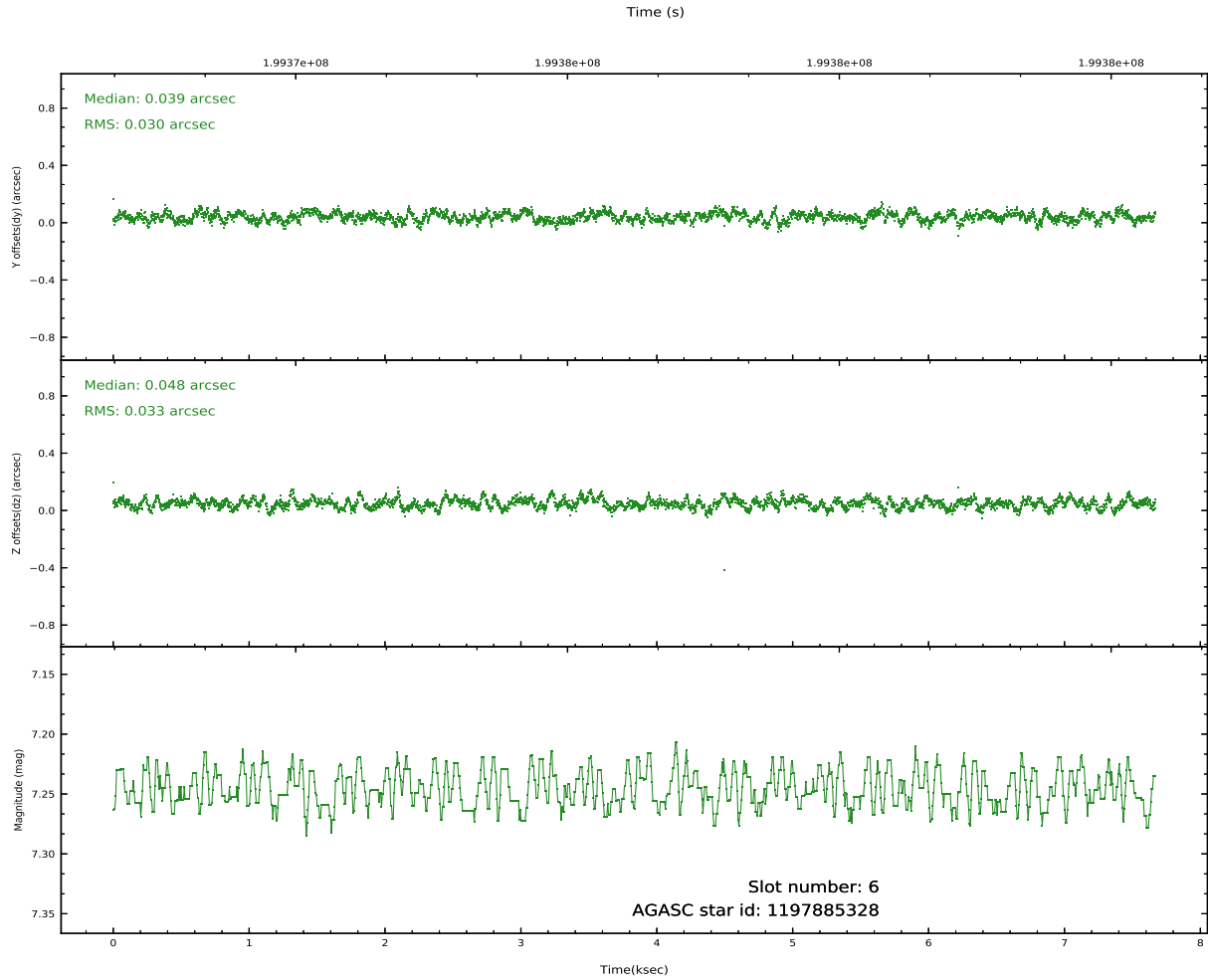
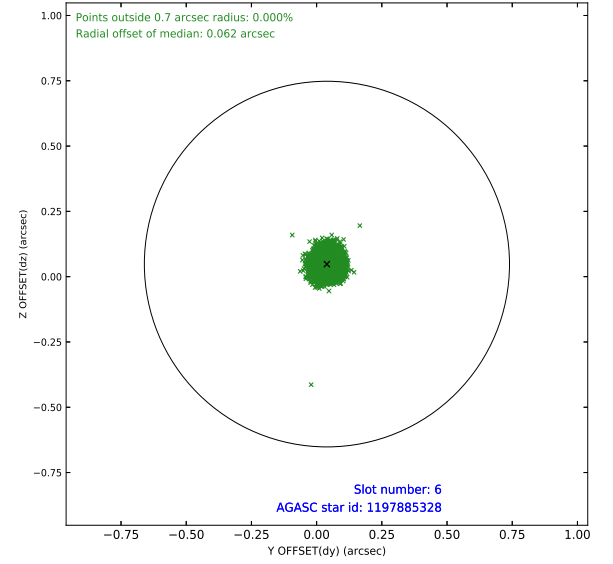
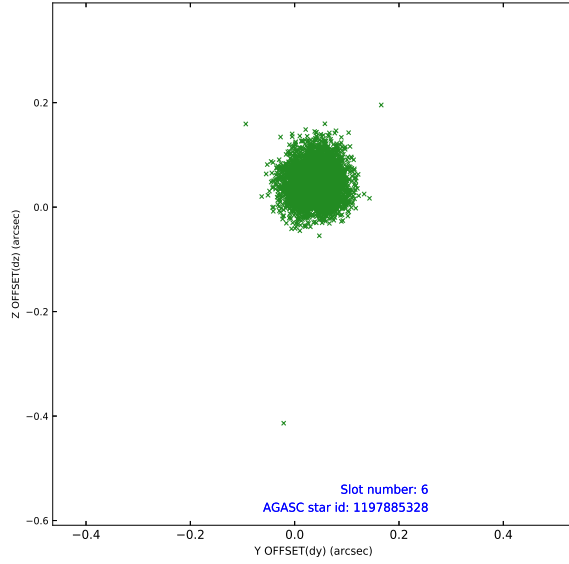
2.4.2 Slot 4



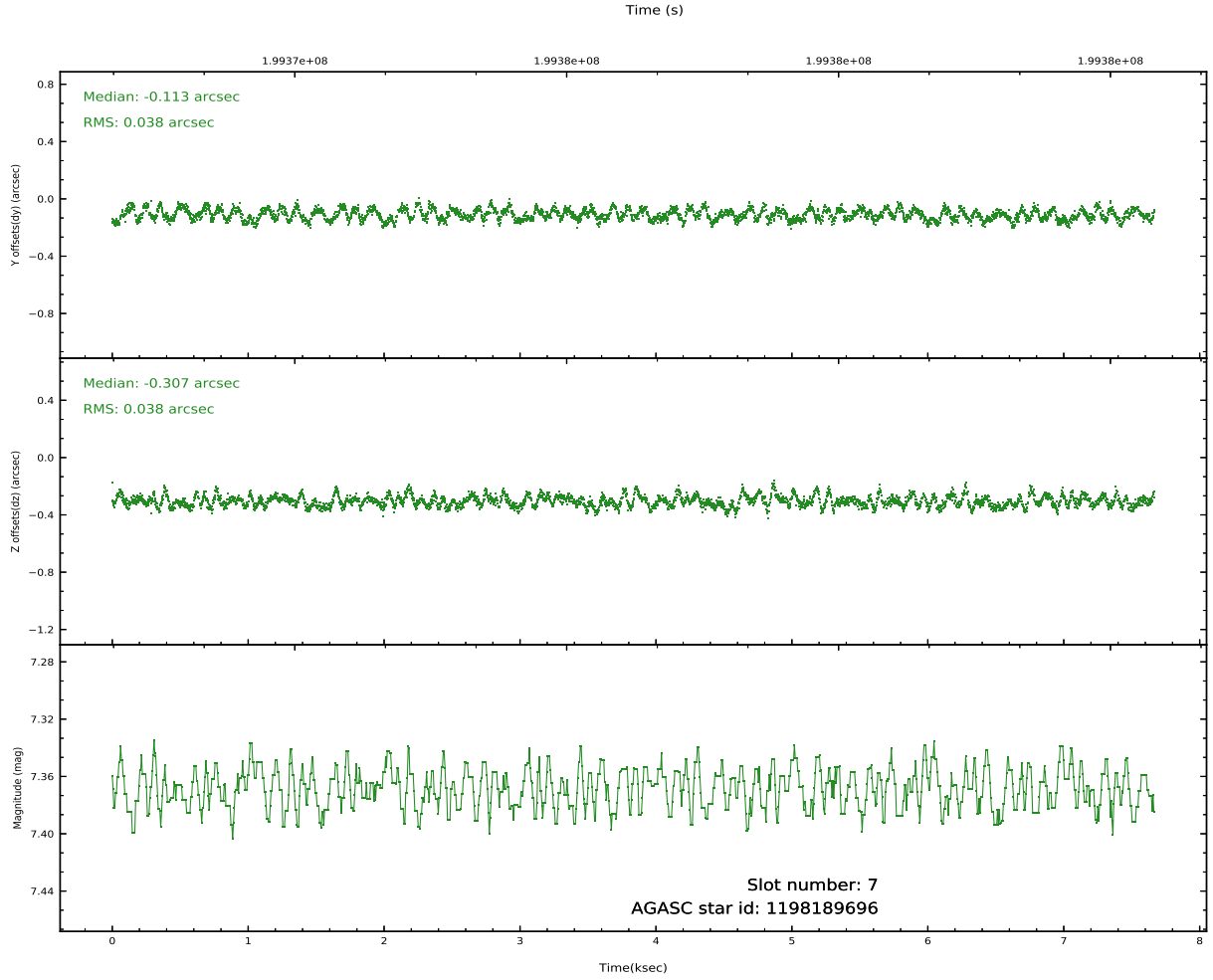
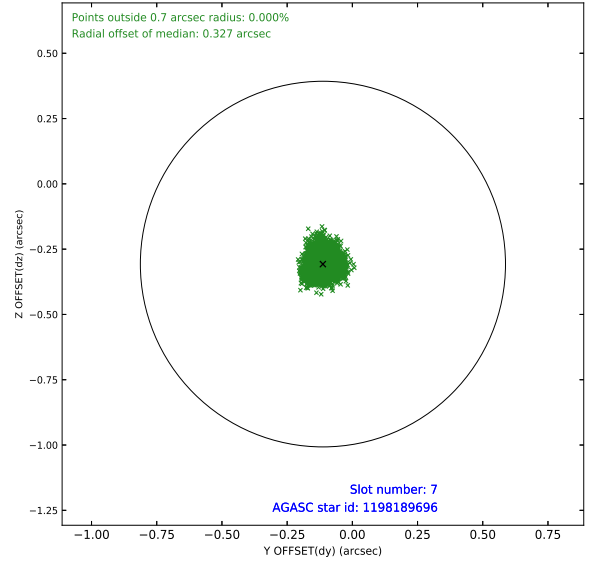
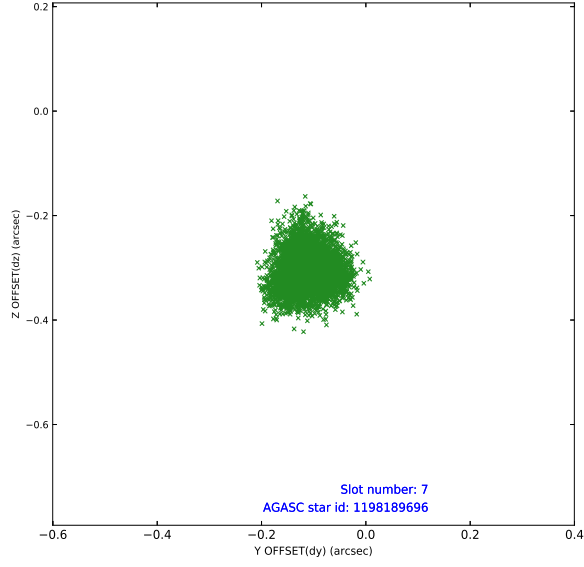
2.4.3 Slot 5



2.4.4 Slot 6

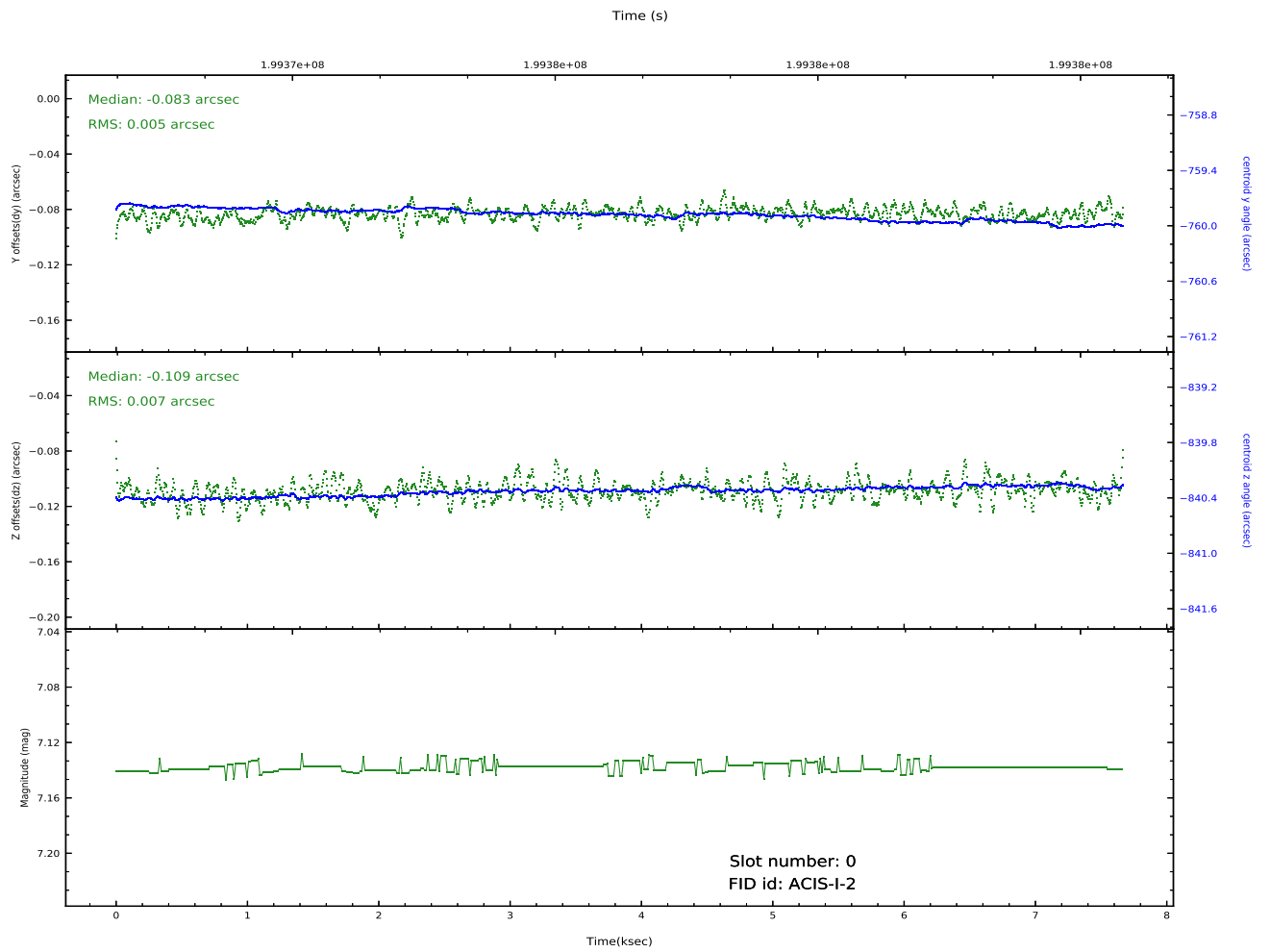
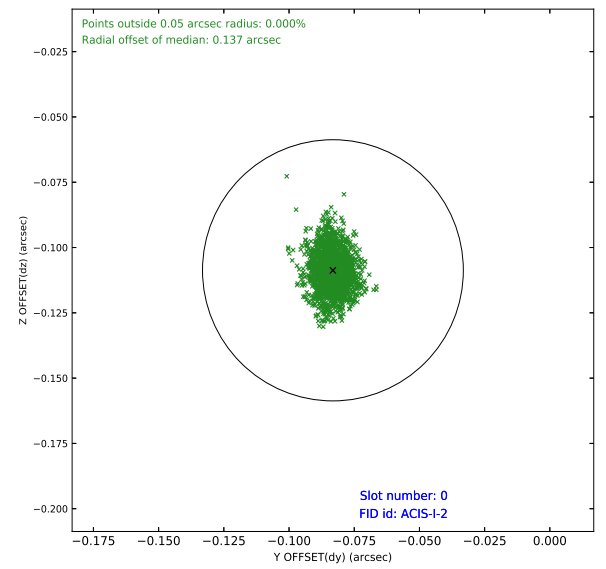
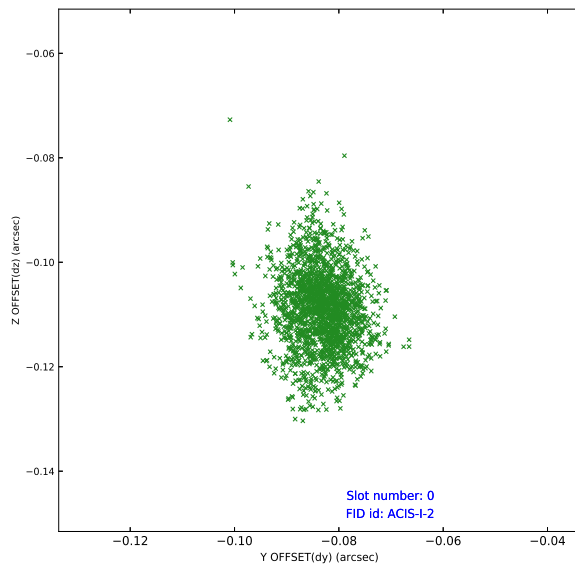


2.4.5 Slot 7

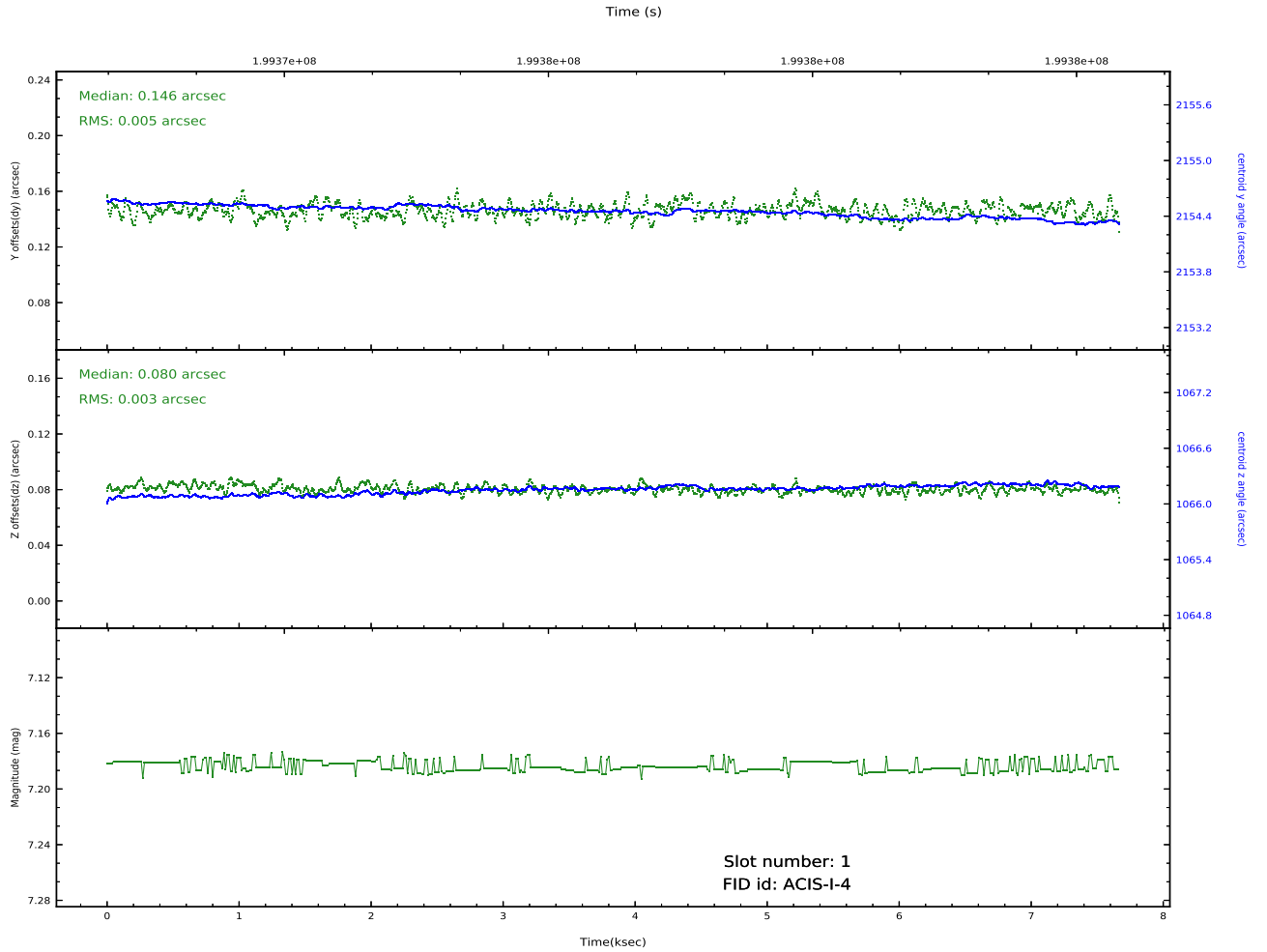
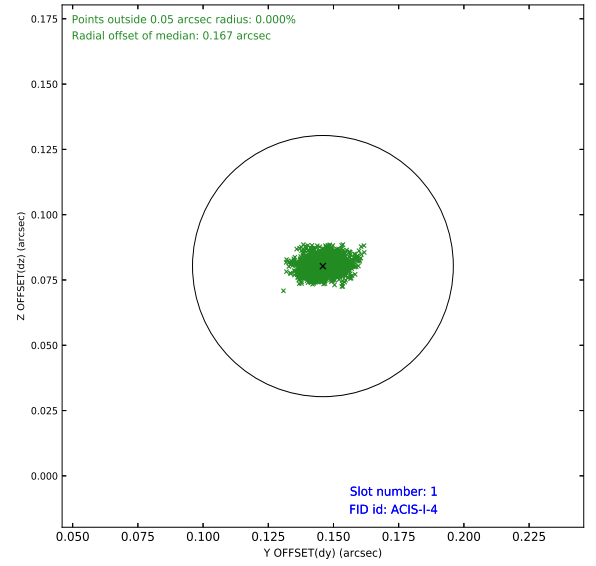
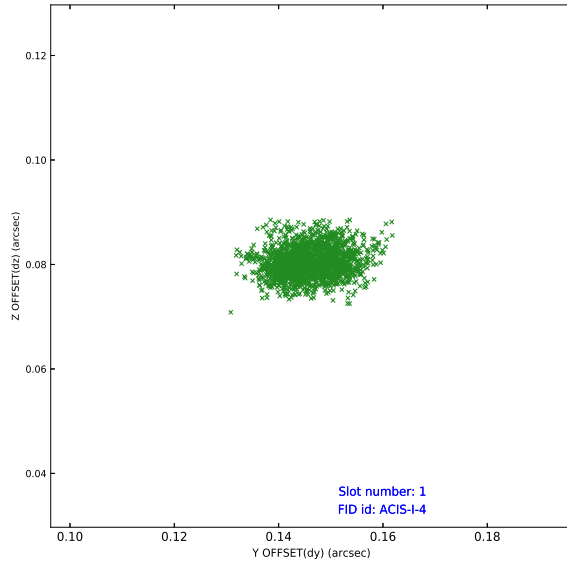


2.5 FID Slots

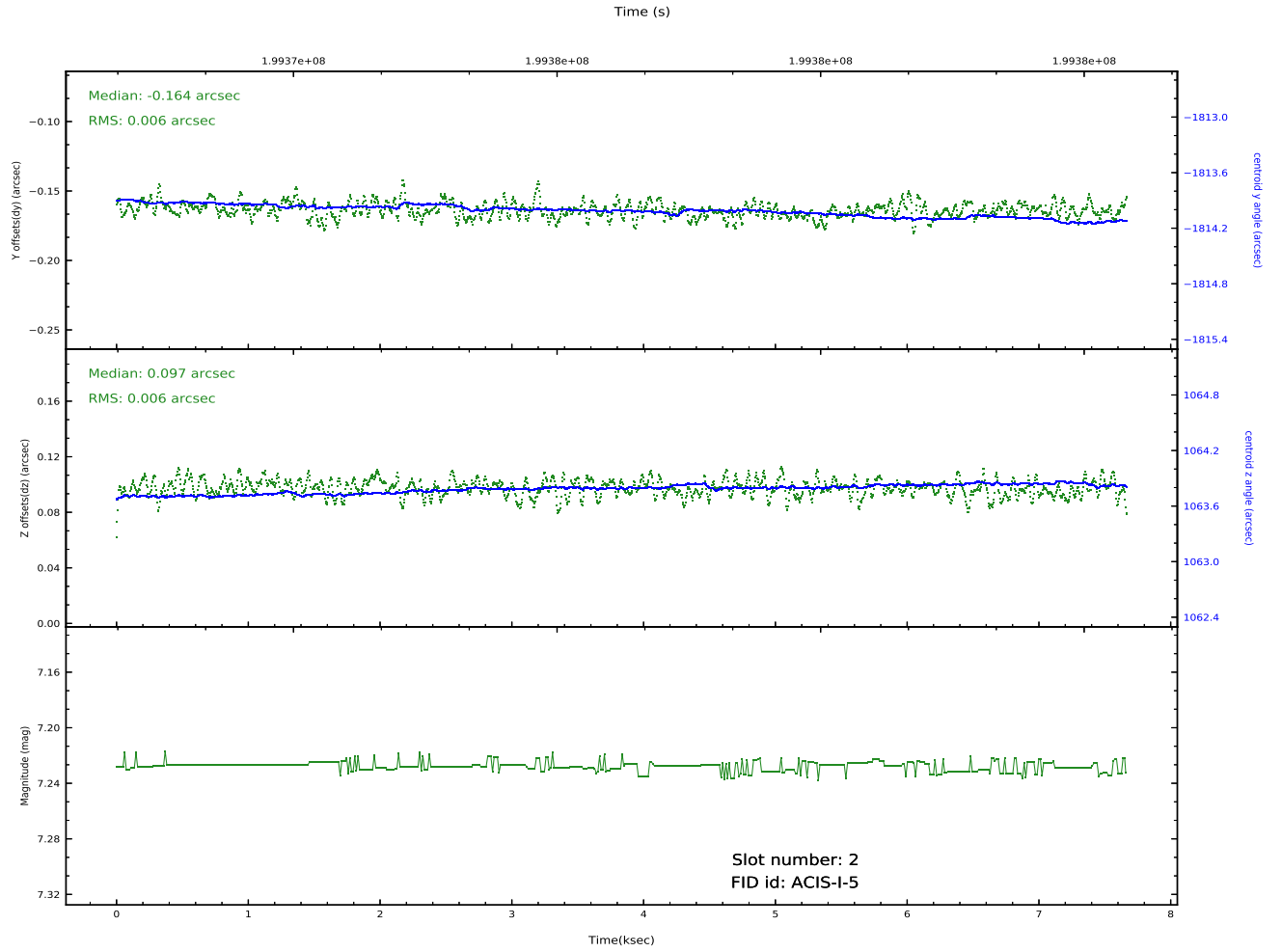
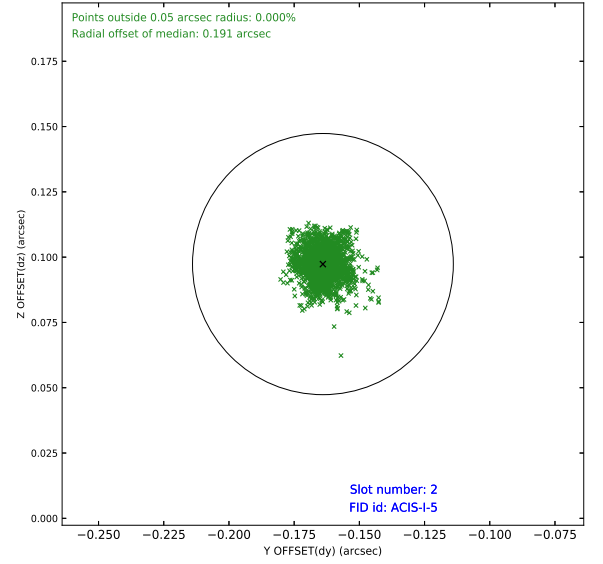
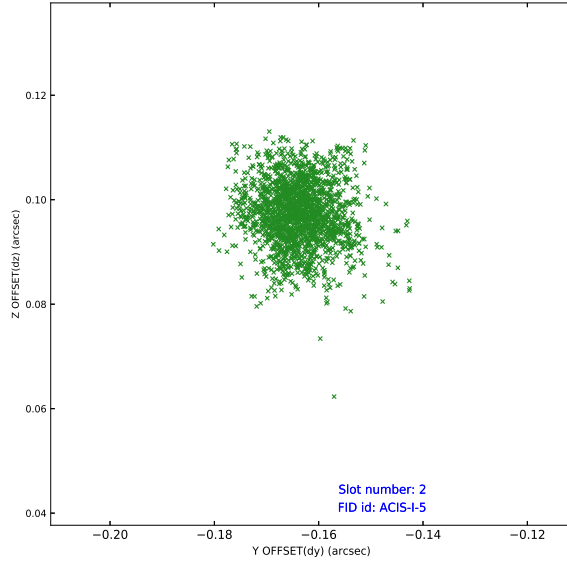
2.5.1 Slot 0



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)	2020.09.25
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	7.238

A.2 Comments

Window preference met.