

V&V Reference Report

L2 ASCDS Version : 10.9.2

Observation 20579 - L2 Version 2
Chandra X-Ray Center

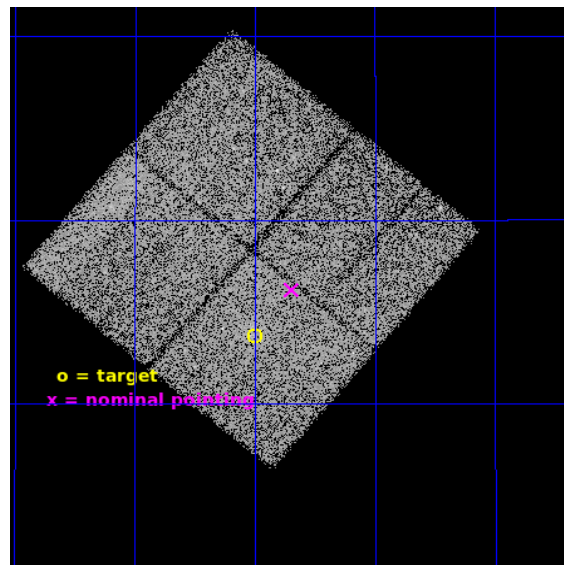
L2 Processing Date : Oct 29 2020

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1 Front

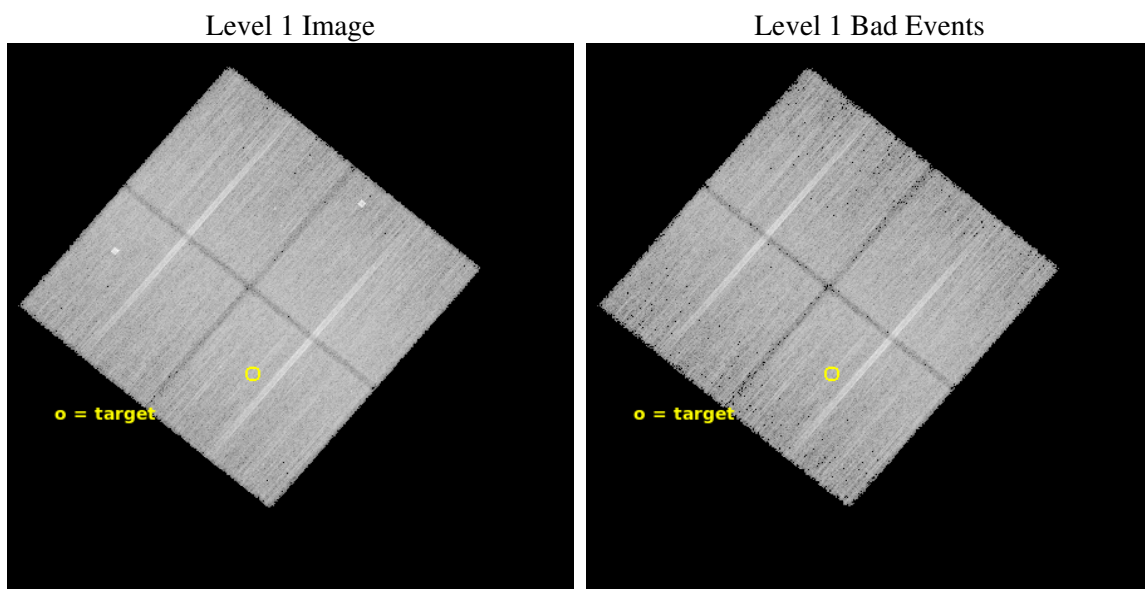
seq_num	801778	Sequence number
obs_id	20579	Observation id
title	The Chandra Strong Lens Sample: Revealing Baryonic Physics In Strong Lensing Selected Clusters	Proposal title
observer	Matthew Bayliss	Principal investigator
object	SDSSJ1152+3313	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	178.0	Observer's specified target RA [deg]
dec_targ	33.228333	Observer's specified target Dec [deg]
ra_nom	177.96144930202	Nominal RA [deg]
dec_nom	33.270231094032	Nominal Dec [deg]
roll_nom	130.06694939218	Nominal Roll [deg]
revision	2	Processing version of data
ontime	31079.58478725	Sum of GTIs [s]
livetime	30673.507131547	Livetime [s]
ontime0	31079.461667299	Sum of GTIs [s]
ontime1	31079.502707243	Sum of GTIs [s]
ontime2	31076.402747154	Sum of GTIs [s]
ontime3	31079.58478725	Sum of GTIs [s]
l2events	89099	Number of level 2 events



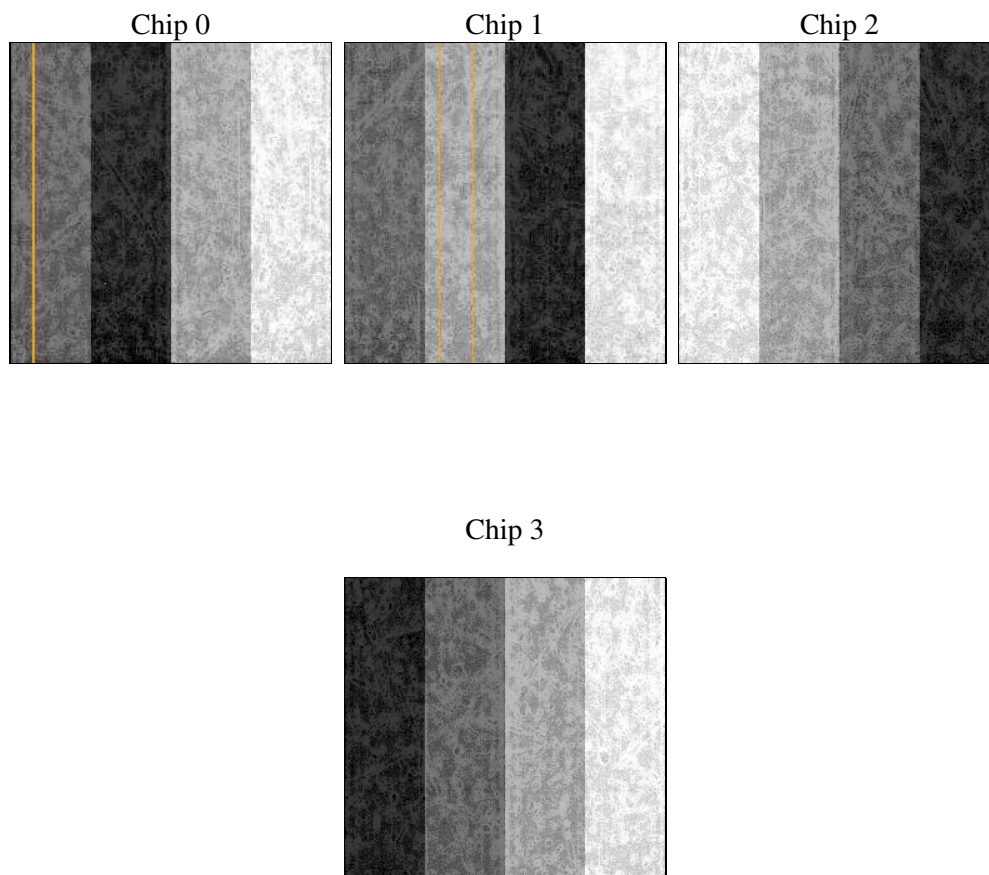
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	31000.000000	[s] Scheduled observation exposure time
ascdsver	10.9.2	Processing system revision	ontime	31079.58478725	Sum of GTIs [s]
caldsver	4.9.3	 	ontime0	31079.461667299	Sum of GTIs [s]
date	2020-10-29T14:33:40	Date and time of file creation	ontime1	31079.502707243	Sum of GTIs [s]
revision	2	Processing version of data	ontime2	31076.402747154	Sum of GTIs [s]
			ontime3	31079.58478725	Sum of GTIs [s]
			l1events	939200	Number of level 1 events

2.1.4 Events

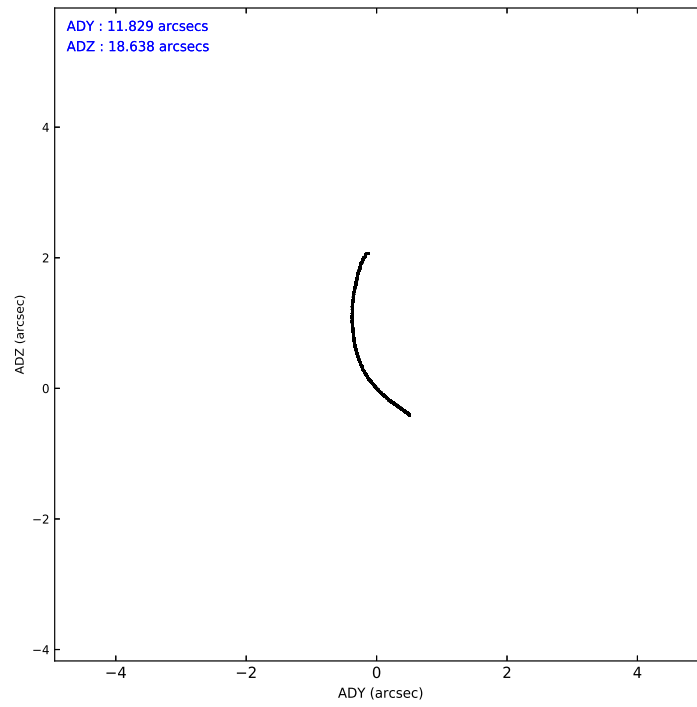
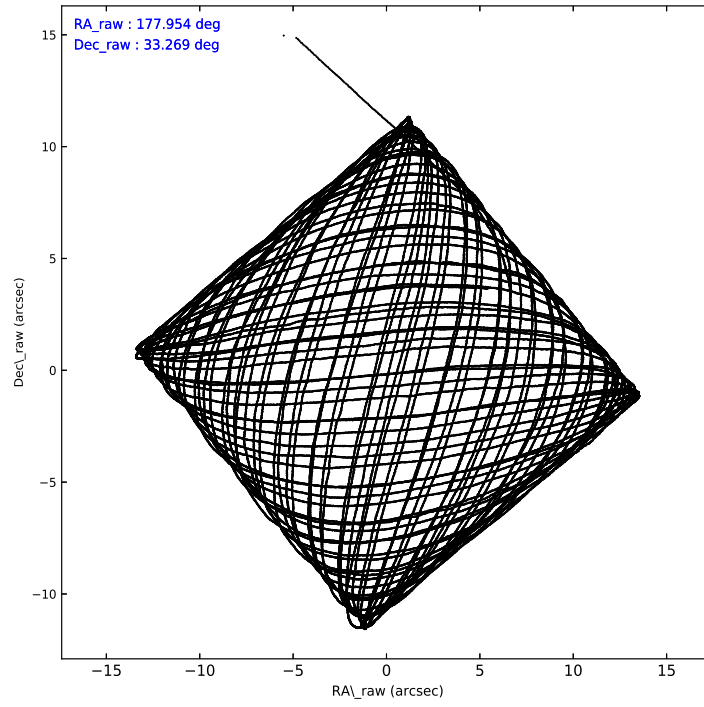
	ccd 0	ccd 1	ccd 2	ccd 3
level 1 events	224673	227251	246829	240447
rejected events	197761	196948	219671	214844
rejected %	88%	86%	88%	89%

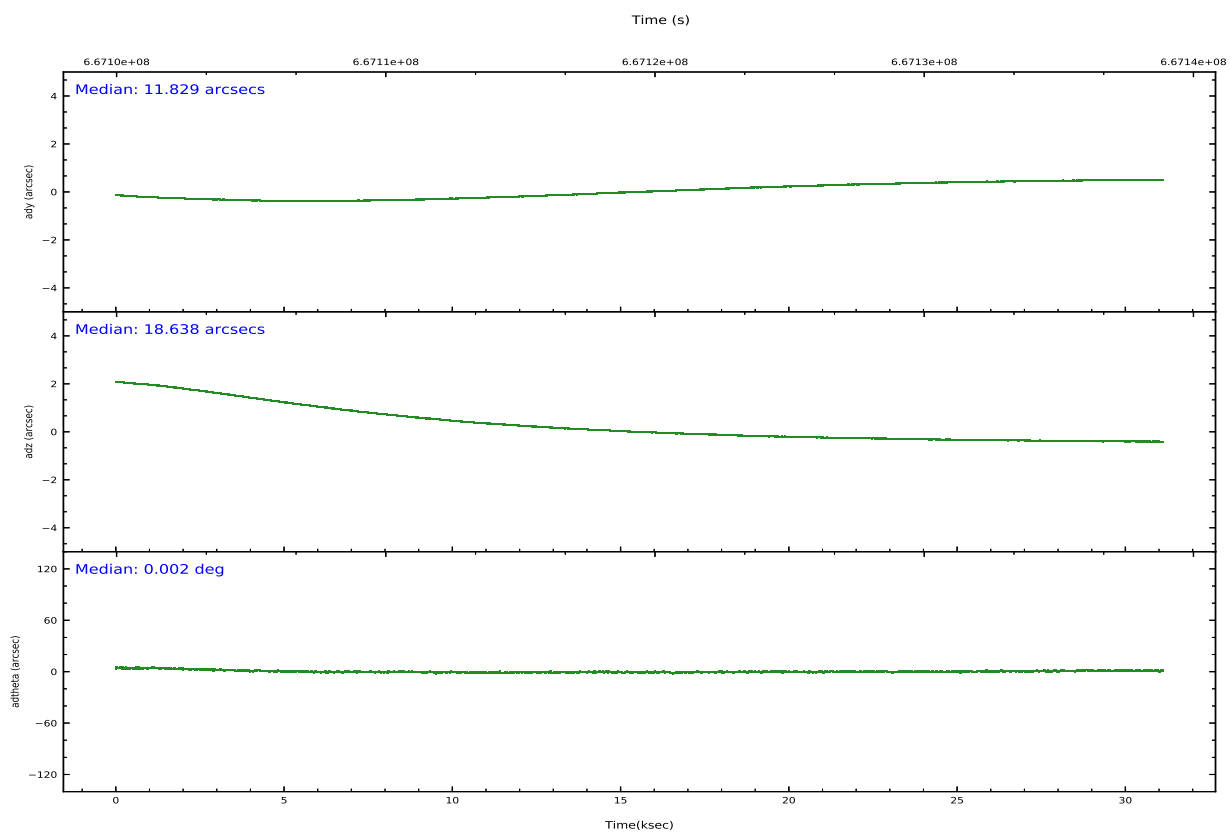
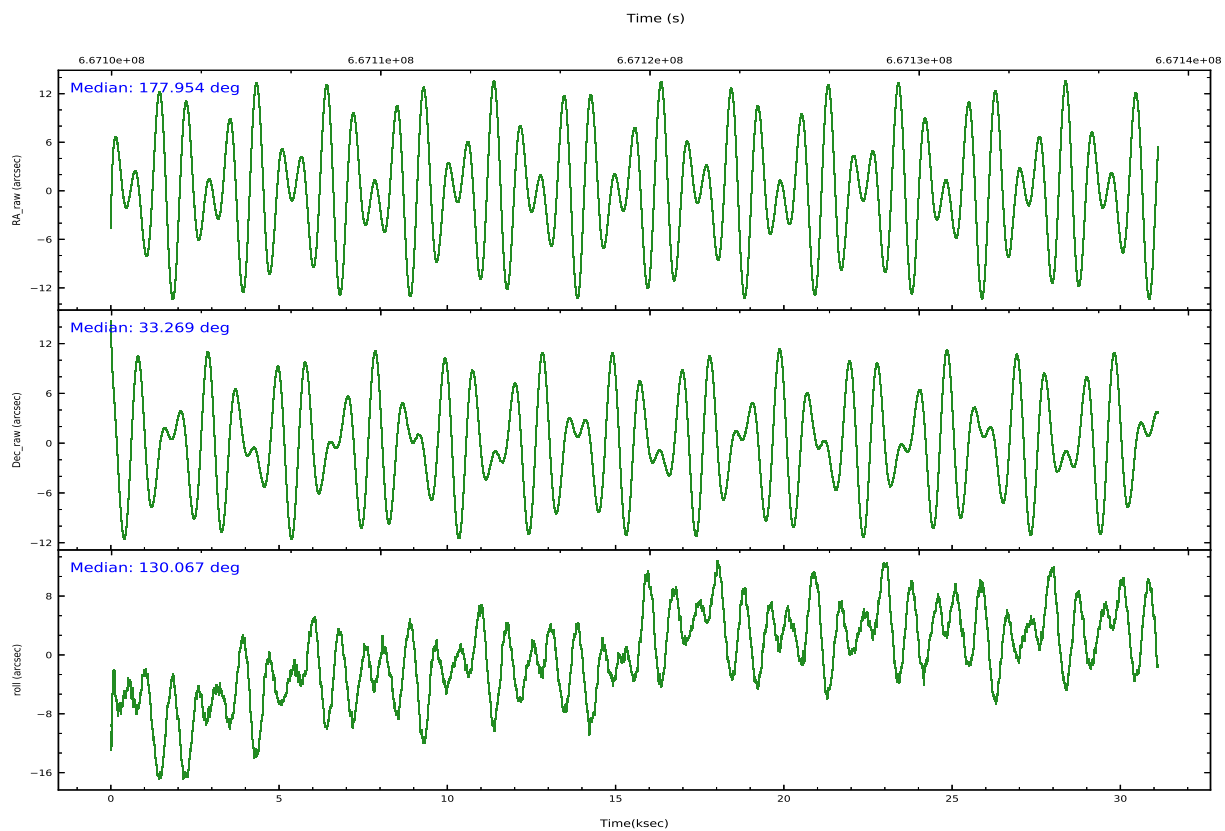
	ccd 0	ccd 1	ccd 2	ccd 3
grade 0 events	9113	10598	10482	9305
	4%	4%	4%	3%
grade 1 events	139	128	160	120
	0%	0%	0%	0%
grade 2 events	6725	7471	6330	5594
	2%	3%	2%	2%
grade 3 events	2695	2643	2622	2669
	1%	1%	1%	1%
grade 4 events	2565	2713	2569	2664
	1%	1%	1%	1%
grade 5 events	10216	10332	9431	11292
	4%	4%	3%	4%
grade 6 events	5814	6880	5159	5374
	2%	3%	2%	2%
grade 7 events	187406	186486	210076	203429
	83%	82%	85%	84%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar version number	8	8
Detector	ACIS-0123	ACIS-0123	Obspar file type	PREDICTED	ACTUAL
Grating	NONE	NONE	Obspar update status	NONE	UPDATED
Data mode	VFAINT	VFAINT	CCD I0 on	Y	Y
Observation mode	POINTING	POINTING	CCD I1 on	Y	Y
[deg] Pointing RA	177.984879	177.96144930202	CCD I2 on	Y	Y
[deg] Pointing Dec	33.260019	33.270231094032	CCD I3 on	Y	Y
[deg] Pointing Roll	129.850225	130.06694939218	CCD S0 on	N	N
[mm] SIM focus pos	-0.782348	-0.7809083437167272	CCD S1 on	N	N
[mm] SIM defocus	0	0.001439871863259334	CCD S2 on	O1	N
[mm] SIM translation stage pos	-225.840463	-225.8433433320239	CCD S3 on	O2	N
[mm] SIM translation stage offset	-7.752	-7.749109670905796	CCD S4 on	N	N
[s] Observation start time (MET)	667104099.184000	667102821.80084	CCD S5 on	N	N
Observation start date	2019-02-21T02:40:30	2019-02-21T02:20:21	Number of optional ACIS chips dropped	2	2
[s] Observation end time (MET)	667135099.184000	667135536.7278	On-chip summing requested	N	N
Observation end date	2019-02-21T11:17:10	2019-02-21T11:25:36	Subarray requested	NONE	NONE
Read mode	TIMED	TIMED	Alternating exposures requested	N	N
			[s] Primary exposure time	0.000000	3.1

2.3 Aspect



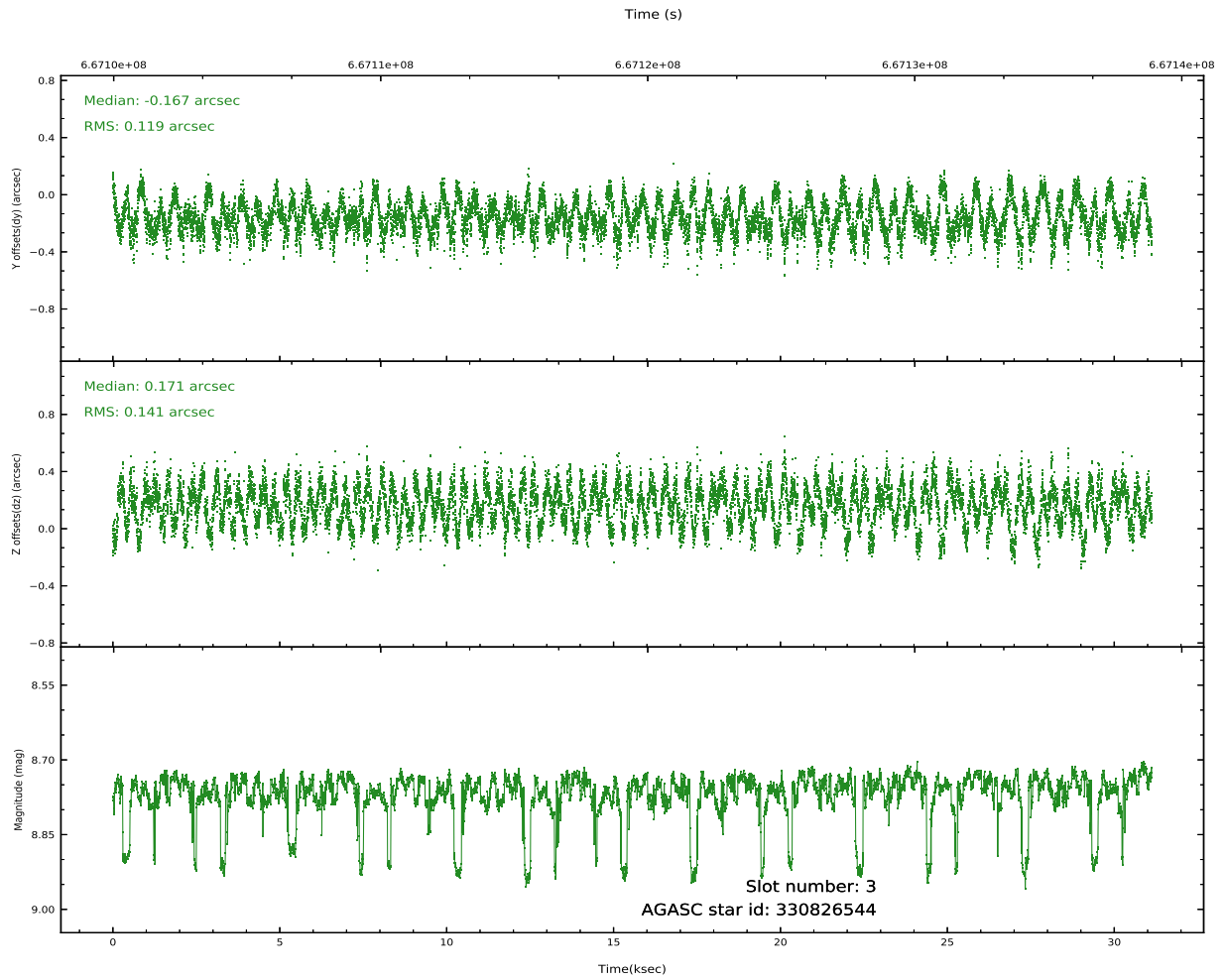
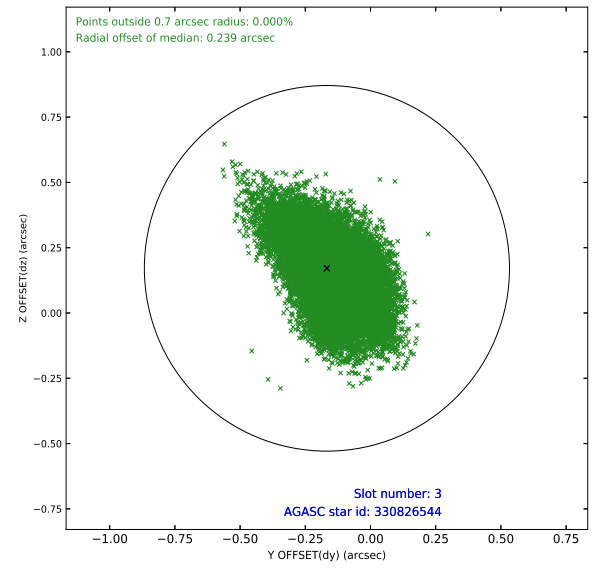
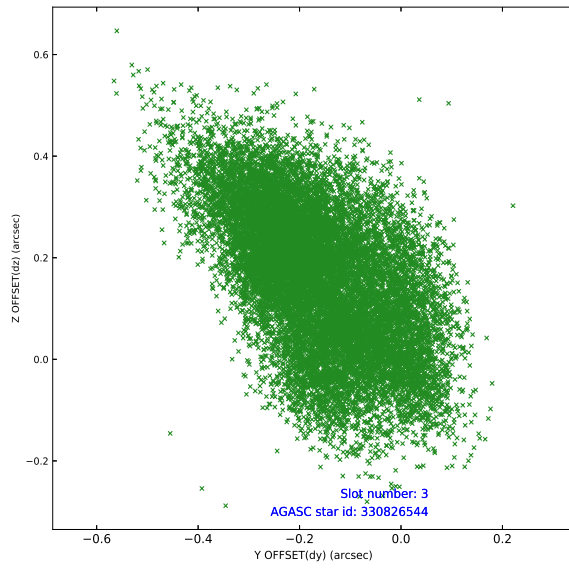


Slot Statistics

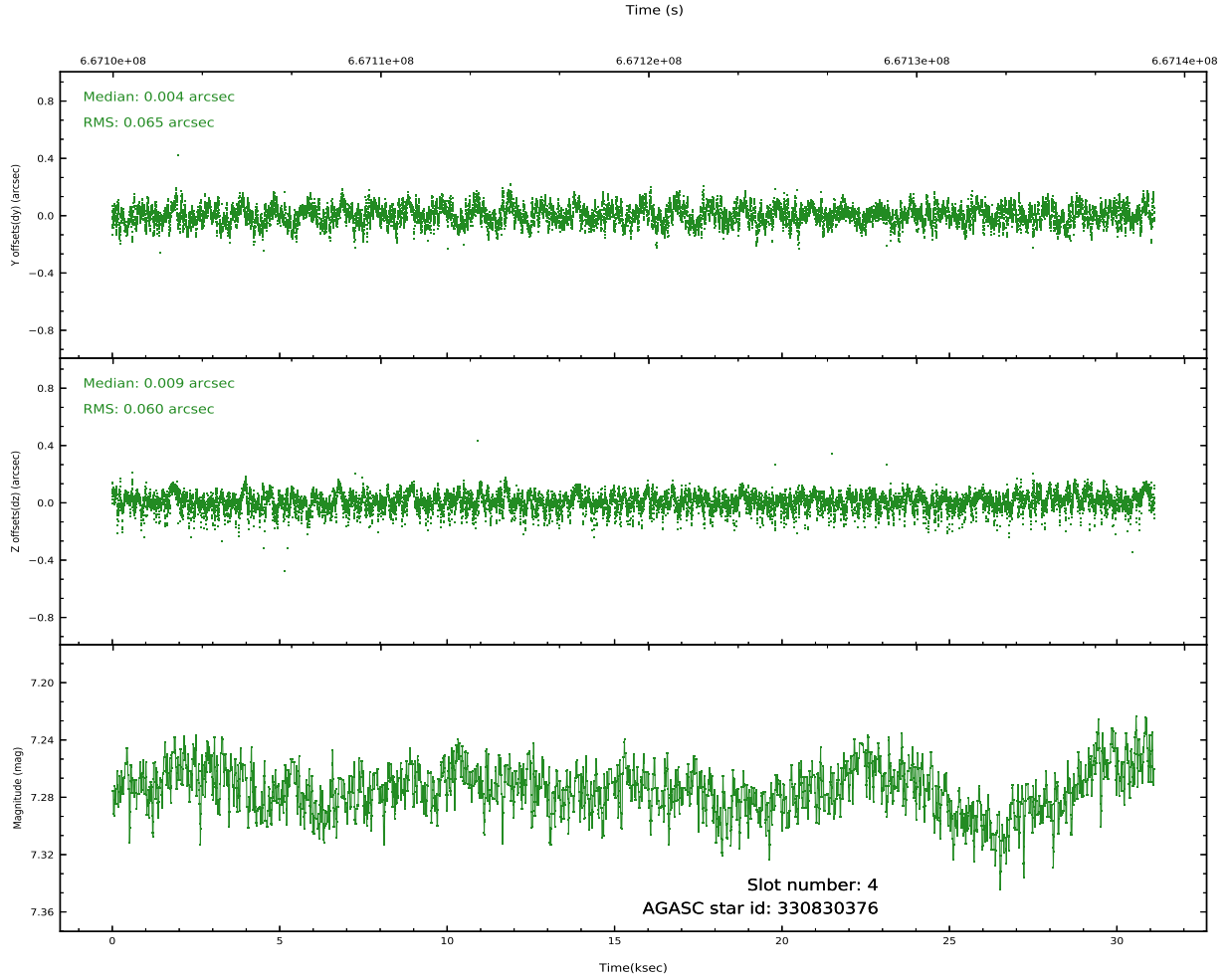
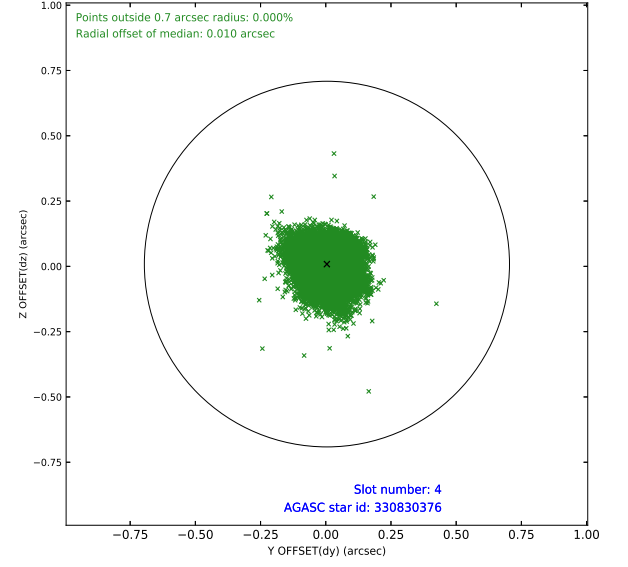
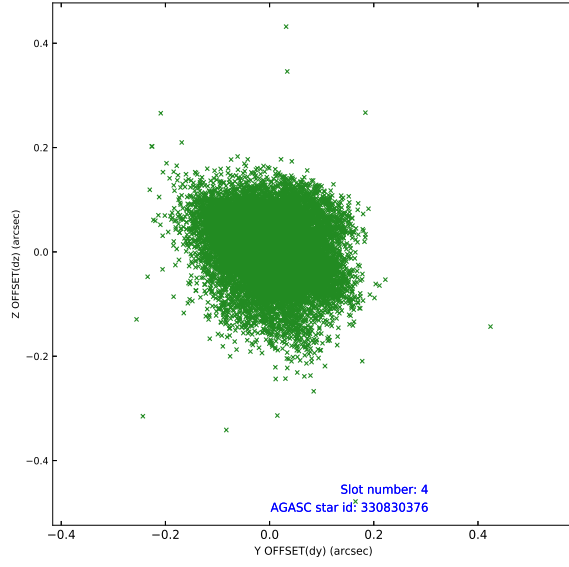
pt	status	used	id	mag	n_pts	frac_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mea
0	FID		ACIS-I-1	7.22	7591	1.000	0.318	-0.225	0.020	0.099	0.000000	0.000000	927.77	-1002
1	FID		ACIS-I-5	7.20	7590	1.000	-0.361	0.265	0.016	0.024	0.000000	0.000000	-1820.83	896
2	FID		ACIS-I-6	7.24	7591	1.000	-0.047	0.031	0.023	0.087	0.000000	0.000000	393.08	1540
3	GUIDE	used	330826544	8.76	15171	1.000	-0.167	0.171	0.198	0.314	177.786937	32.479414	-1770.99	2263
4	GUIDE	used	330830376	7.27	15181	1.000	0.004	0.009	0.094	0.154	178.448287	33.615276	94.01	-1887
5	GUIDE	used	330831912	7.08	15181	1.000	0.155	0.096	0.111	0.192	177.742152	33.604240	1418.81	-235
6	GUIDE	used	330844312	6.58	15183	1.000	0.040	-0.228	0.133	0.222	177.789626	33.375013	694.98	184
7	GUIDE	used	331106272	8.42	15175	1.000	-0.032	-0.040	0.115	0.202	178.047234	33.847790	1505.70	-1498

2.4 Star Slots

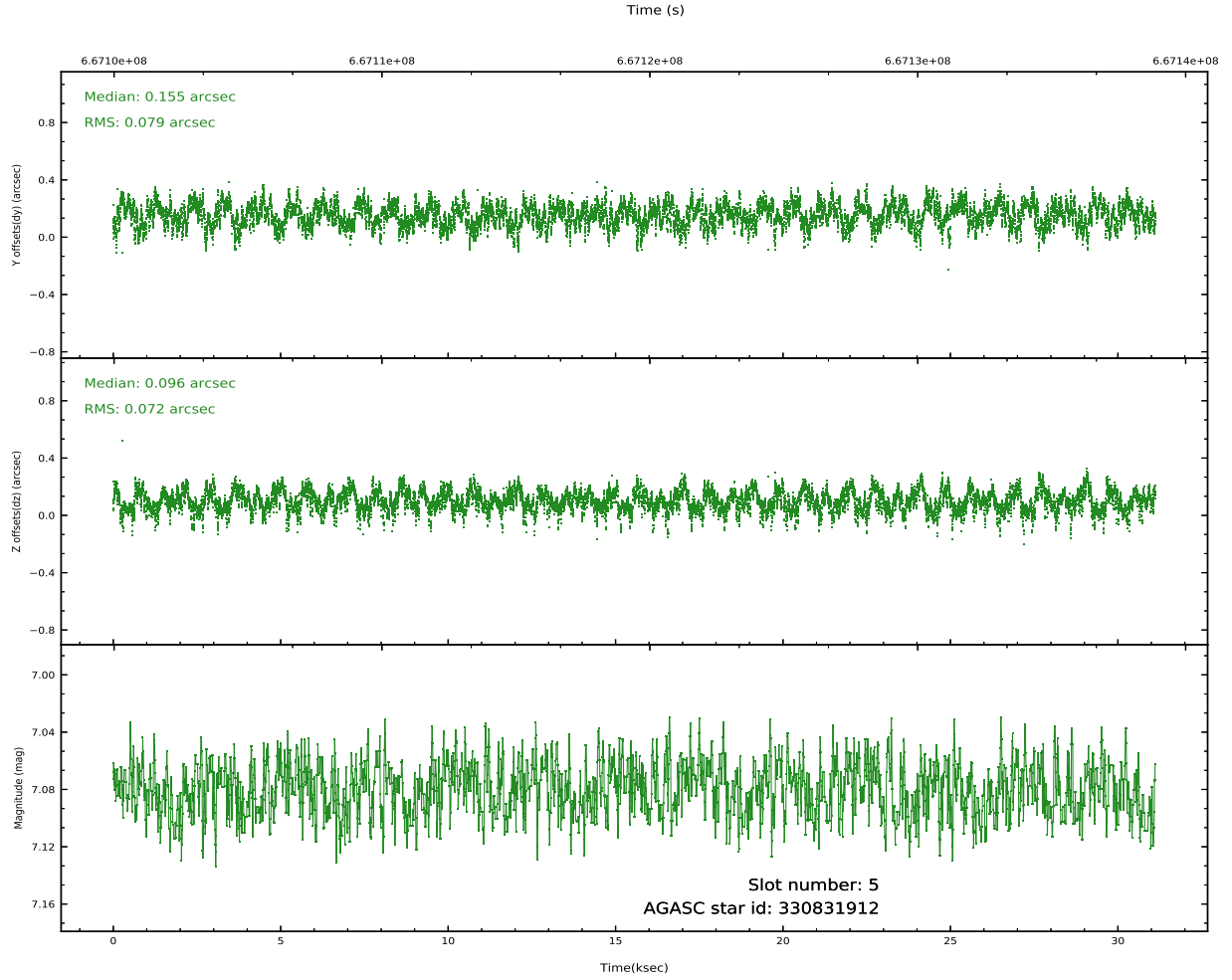
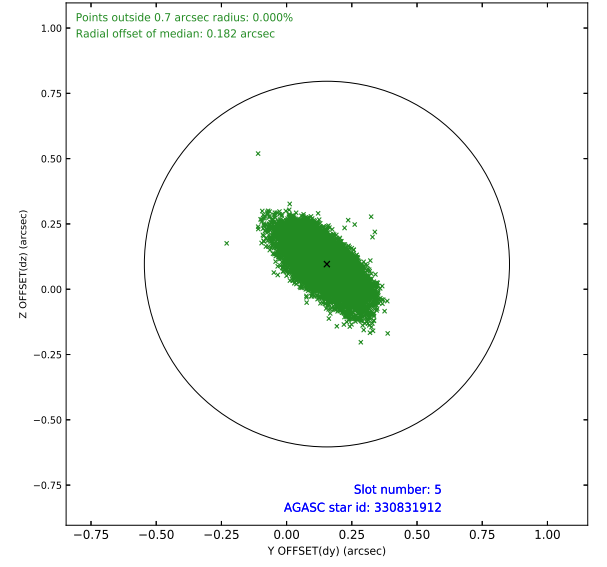
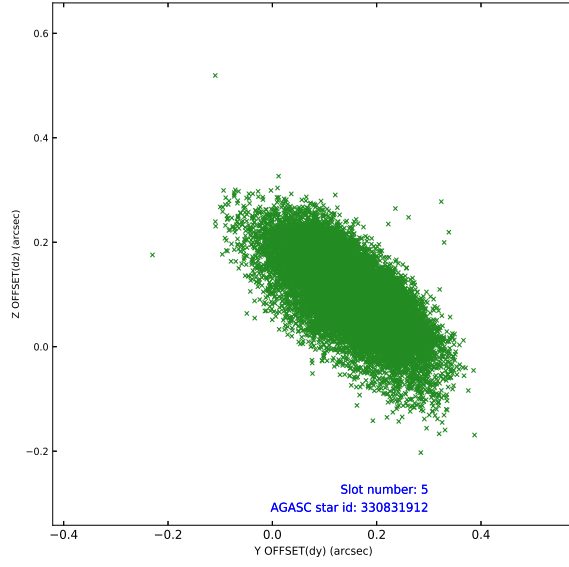
2.4.1 Slot 3



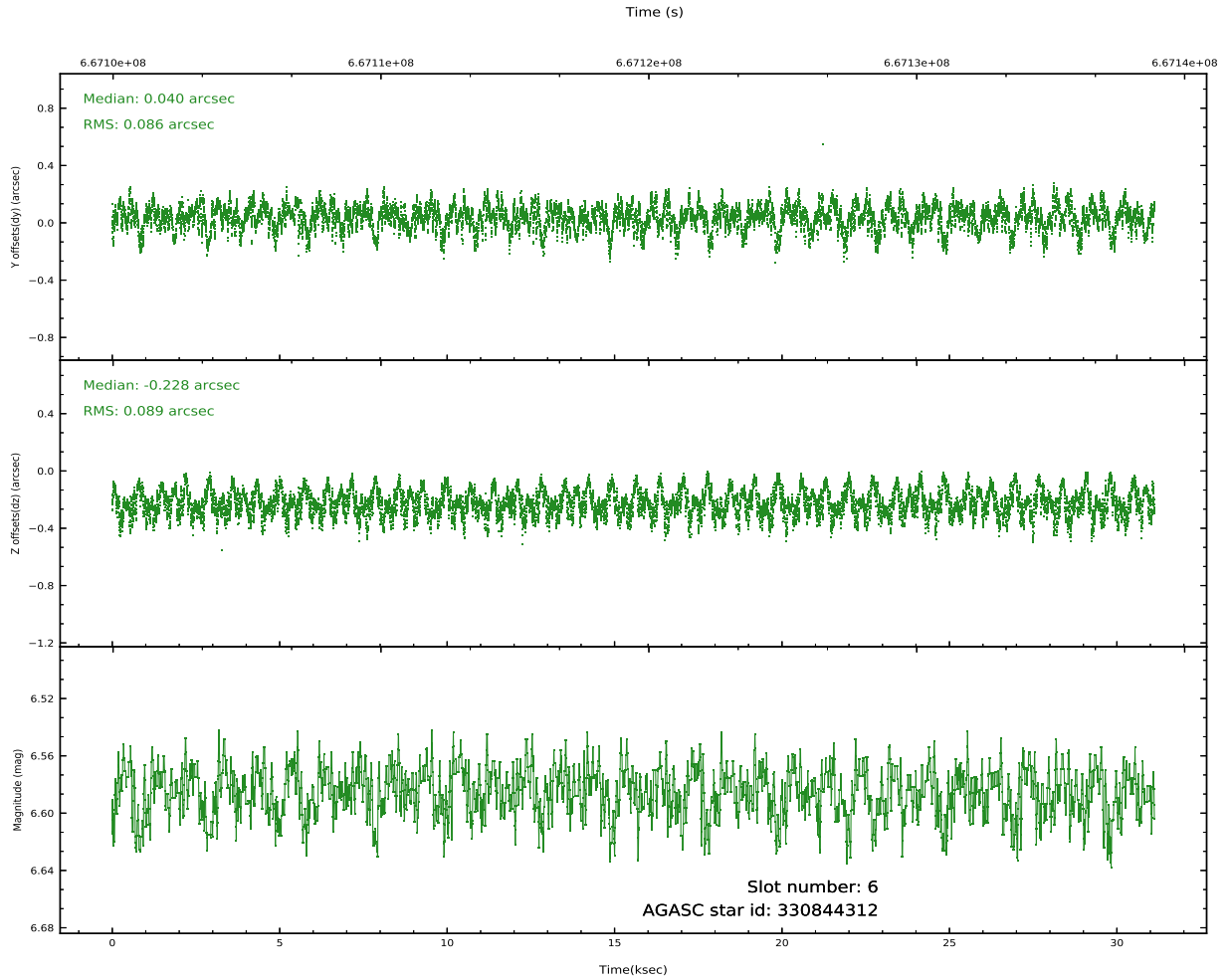
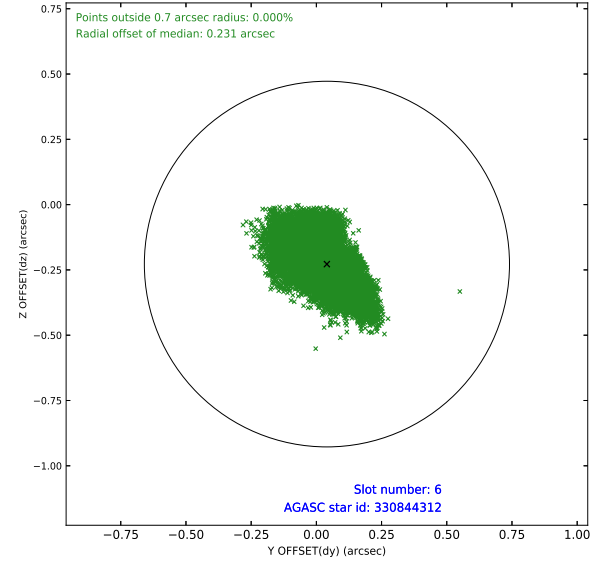
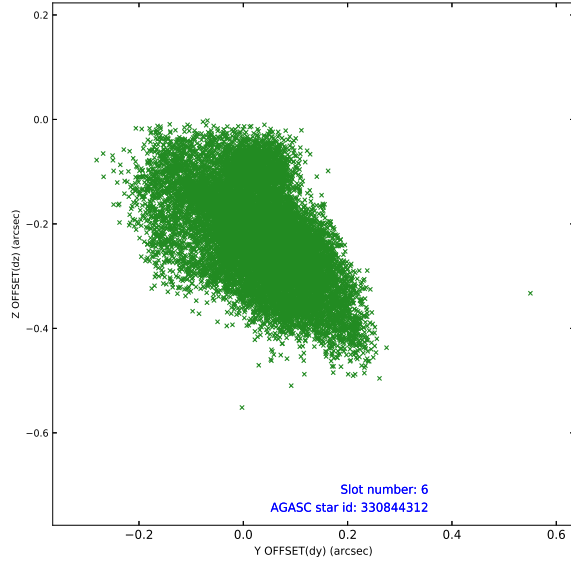
2.4.2 Slot 4



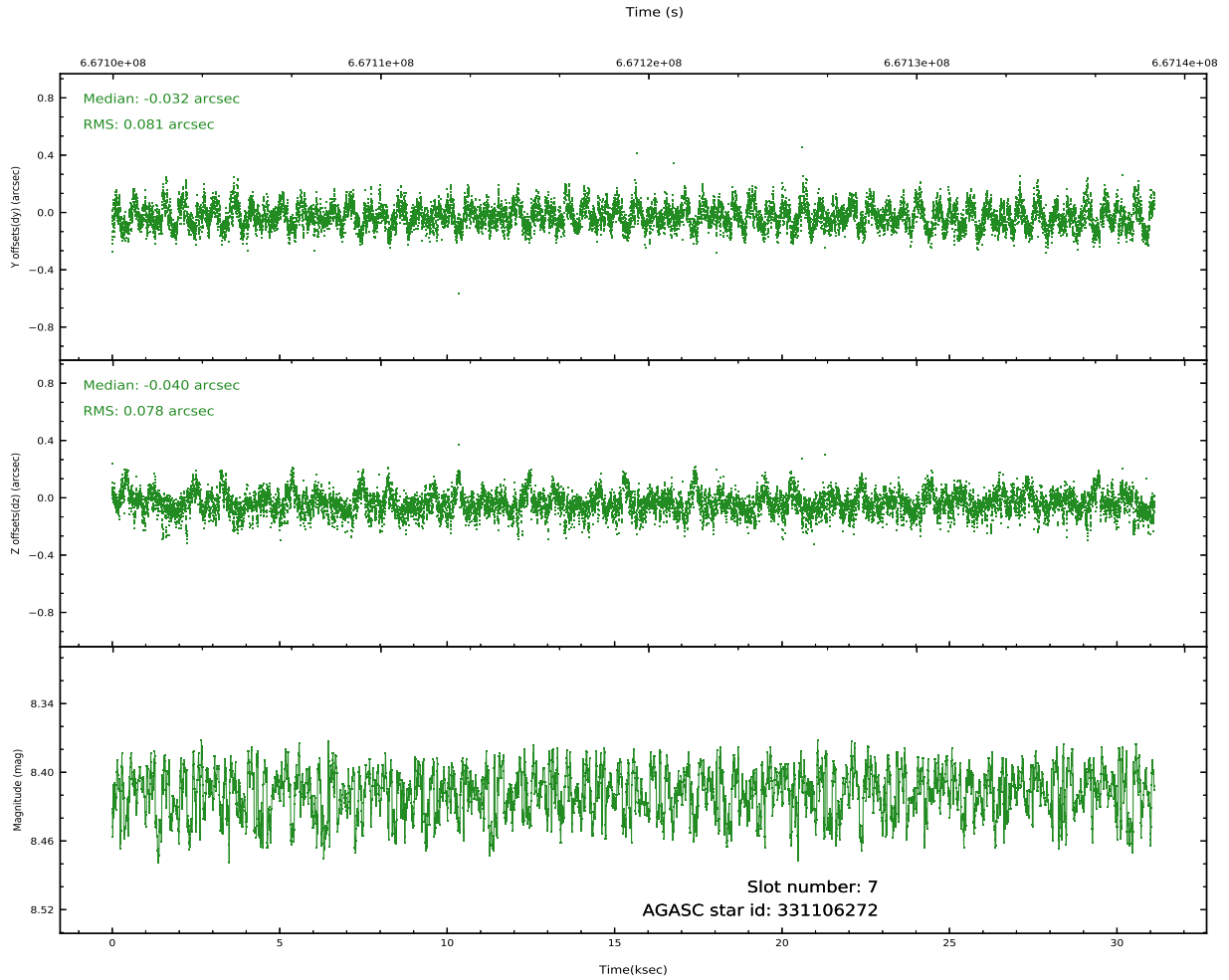
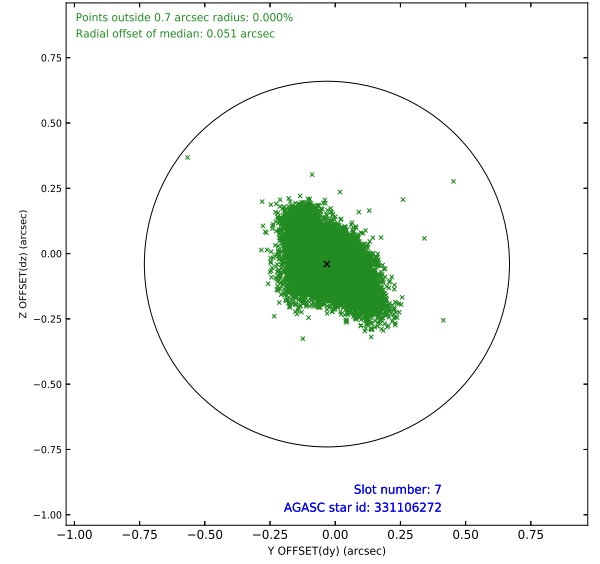
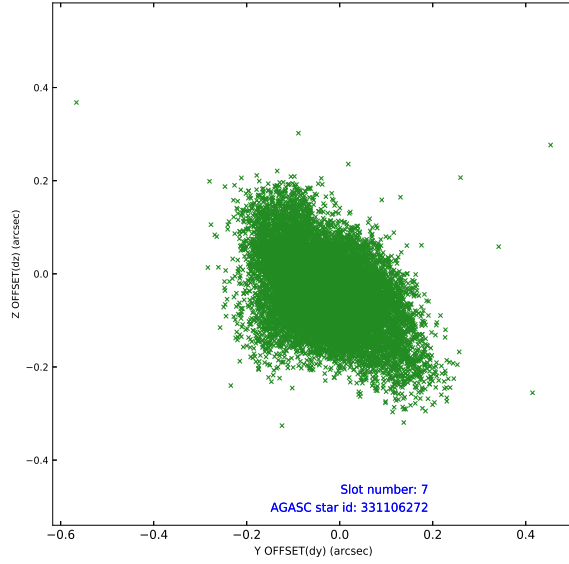
2.4.3 Slot 5



2.4.4 Slot 6

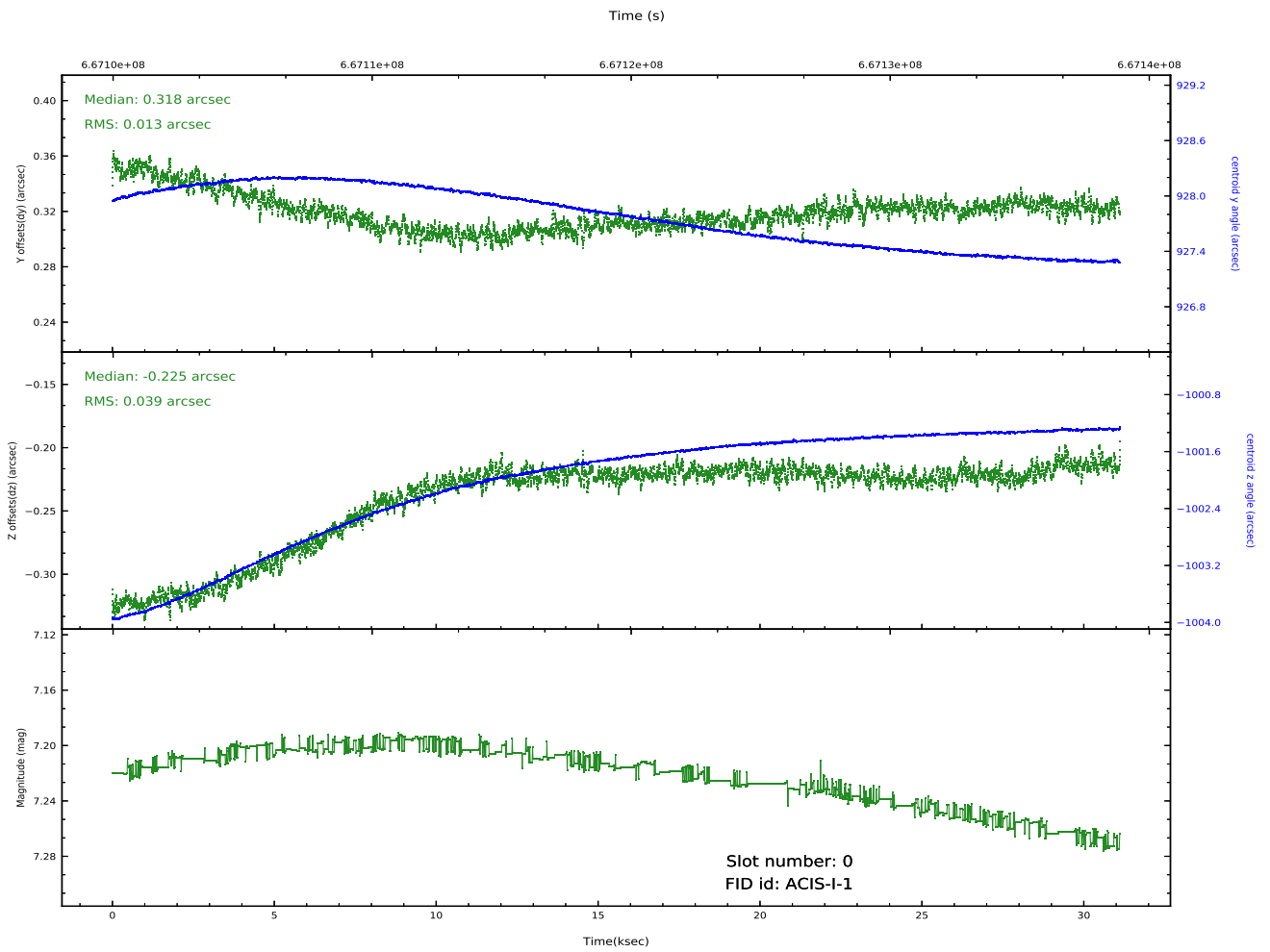
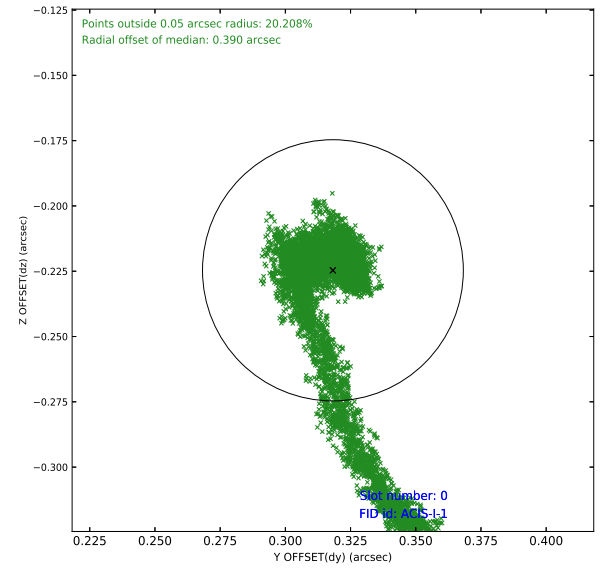
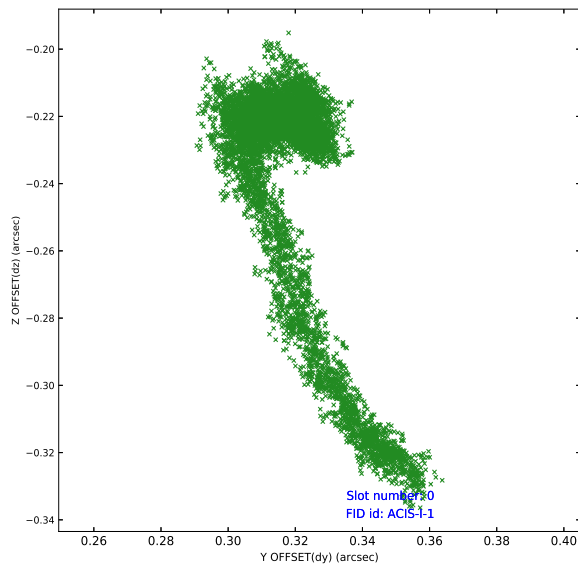


2.4.5 Slot 7

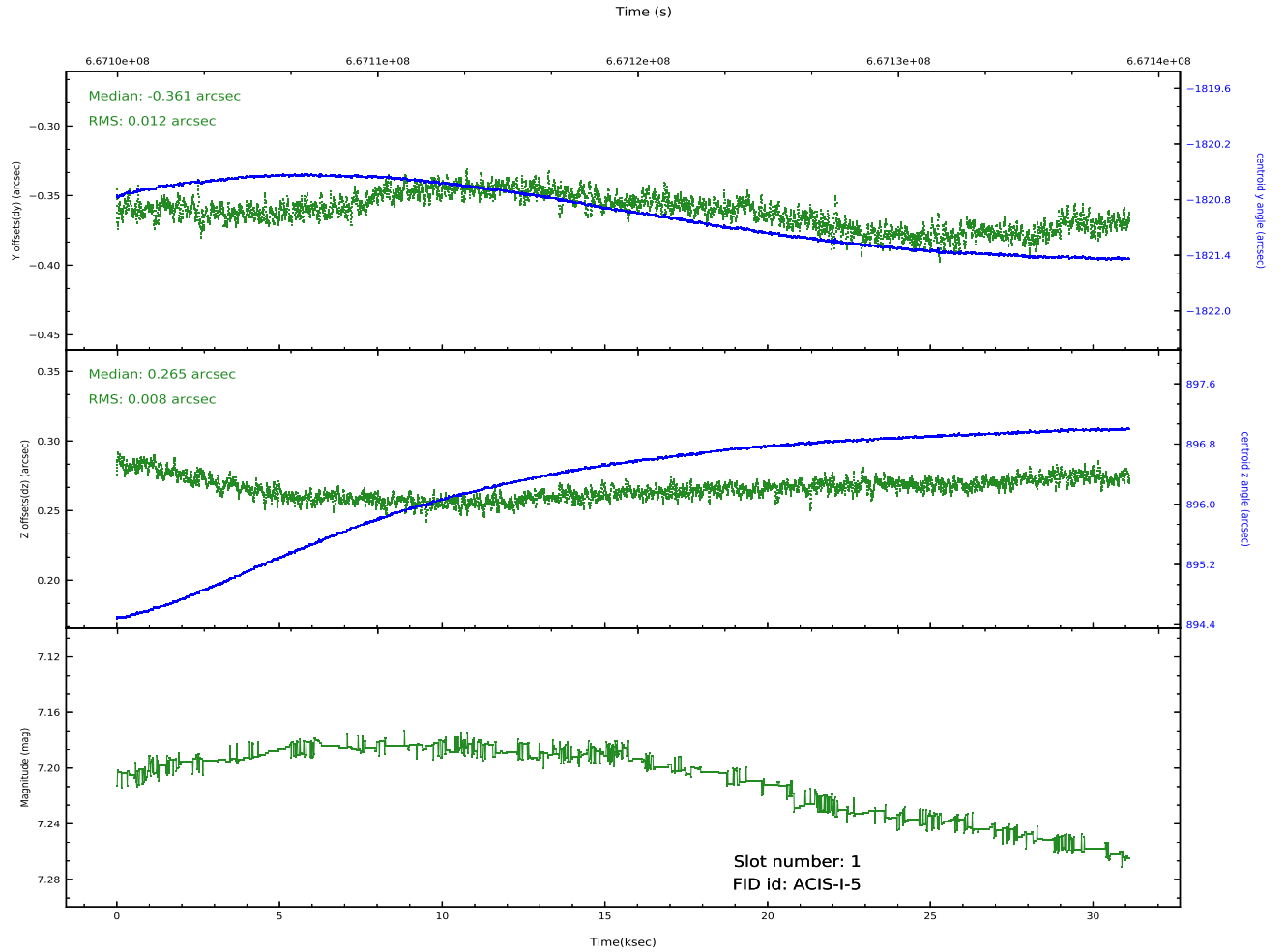
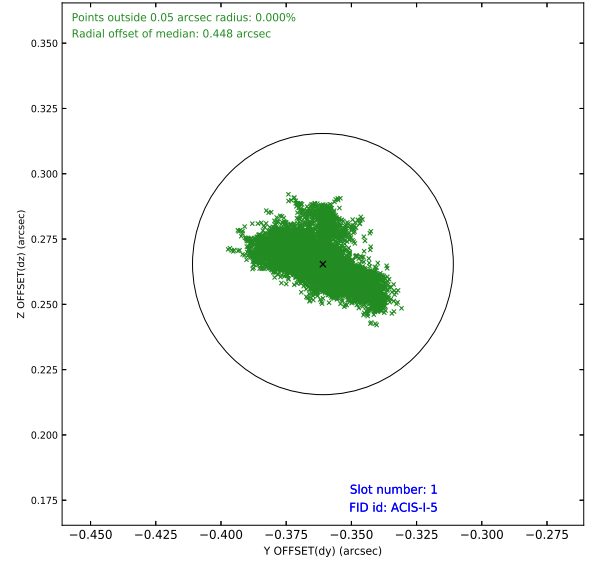
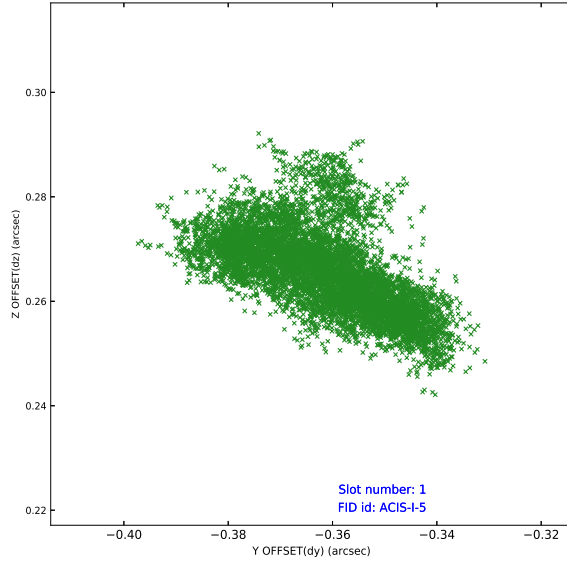


2.5 FID Slots

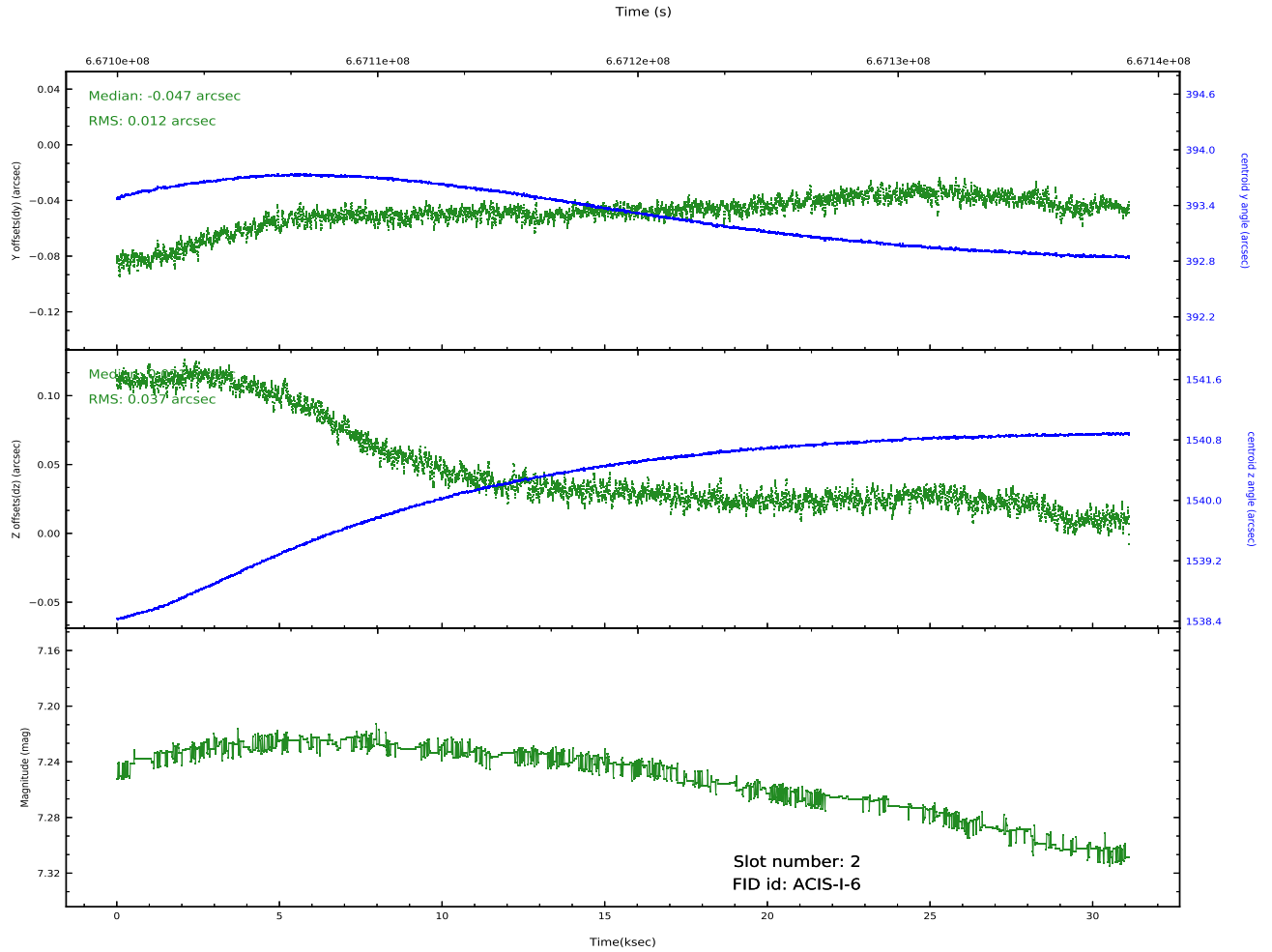
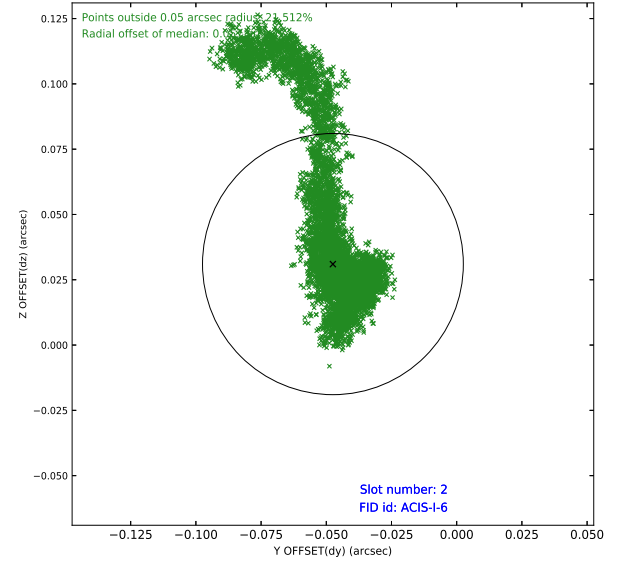
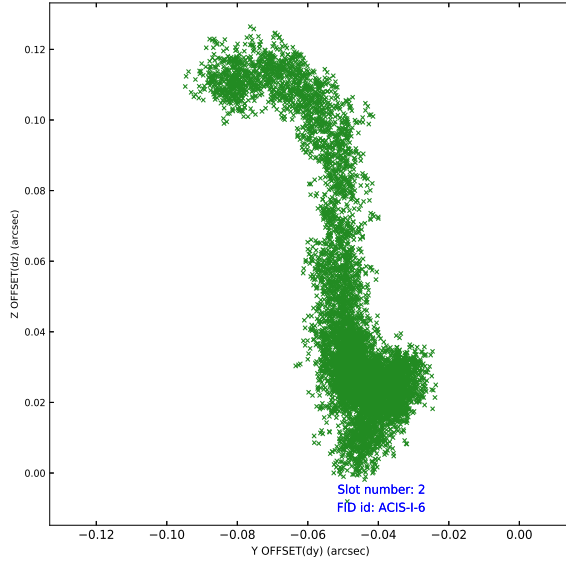
2.5.1 Slot 0



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)	2020.10.30
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	31.079584786892

A.2 Comments

Joint proposal with HST. Two optional chips were dropped.