

V&V Reference Report

L2 ASCDS Version : 10.9.2

Observation 21055 - L2 Version 3
Chandra X-Ray Center

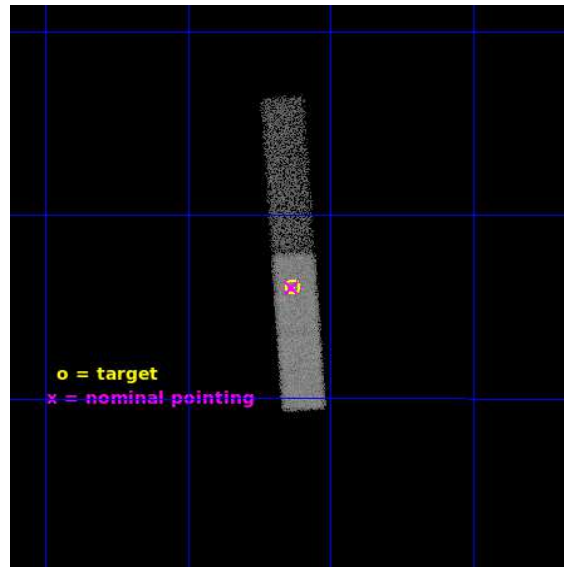
L2 Processing Date : Oct 25 2020

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1 Front

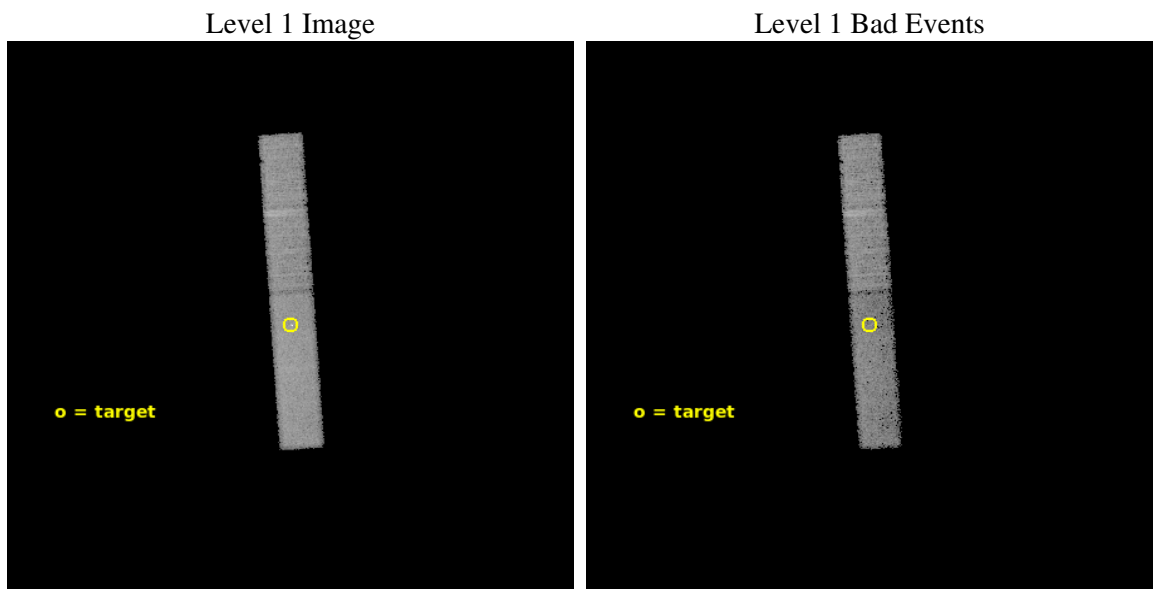
seq_num	703550	Sequence number
obs_id	21055	Observation id
title	The X-ray-radio morphology anomaly in a high-redshift quasar jet	P
observer	Diana Worrall	Principal investigator
object	J1421-0643	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	215.2825	Observer's specified target RA [deg]
dec_targ	-6.732306	Observer's specified target Dec [deg]
ra_nom	215.28366621249	Nominal RA [deg]
dec_nom	-6.7327700159091	Nominal Dec [deg]
roll_nom	86.156912668425	Nominal Roll [deg]
revision	3	Processing version of data
ontime	25603.784000993	Sum of GTIs [s]
livetime	24487.169090467	Livetime [s]
ontime6	25603.742961049	Sum of GTIs [s]
ontime7	25603.784000993	Sum of GTIs [s]
l2events	34812	Number of level 2 events



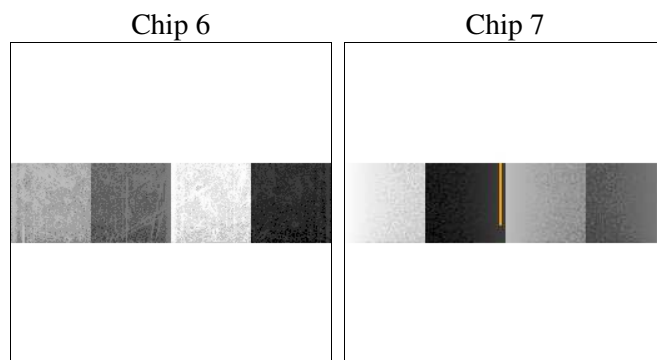
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	25500.000000	[s] Scheduled observation exposure time
ascdsver	10.9.2	Processing system revision	ontime	25603.784000993	Sum of GTIs [s]
caldbver	4.9.3	 	ontime6	25603.742961049	Sum of GTIs [s]
date	2020-10-25T05:18:18	Date and time of file creation	ontime7	25603.784000993	Sum of GTIs [s]
revision	3	Processing version of data	l1events	117563	Number of level 1 events

2.1.4 Events

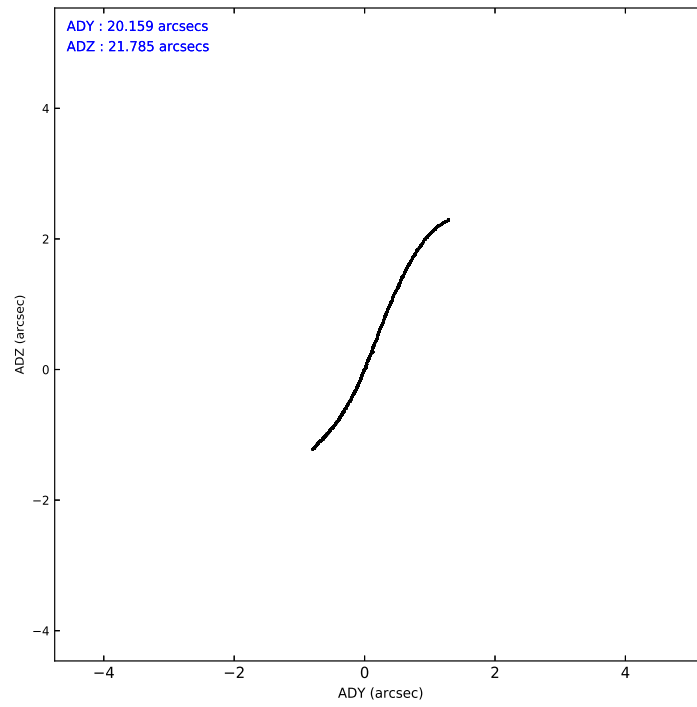
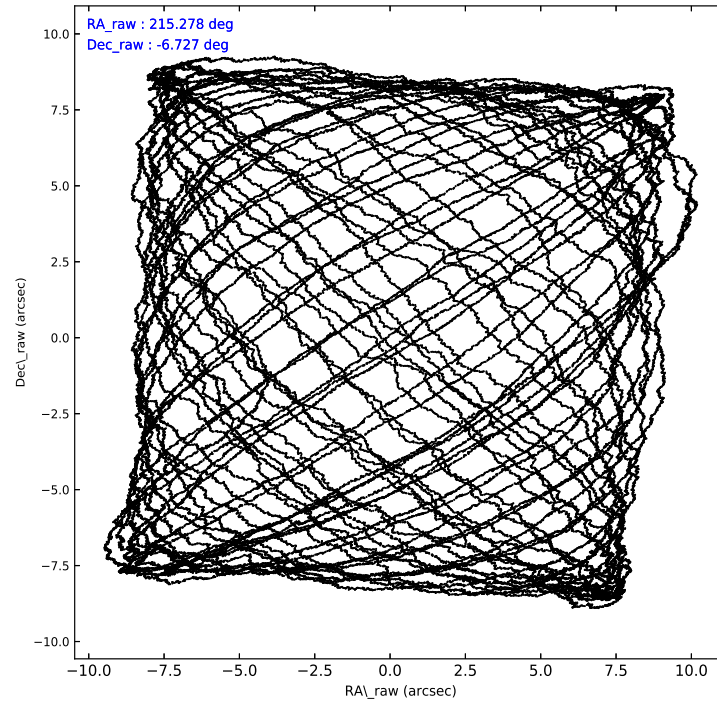
	ccd 6	ccd 7
level 1 events	54536	63027
rejected events	48235	32411
rejected %	88%	51%

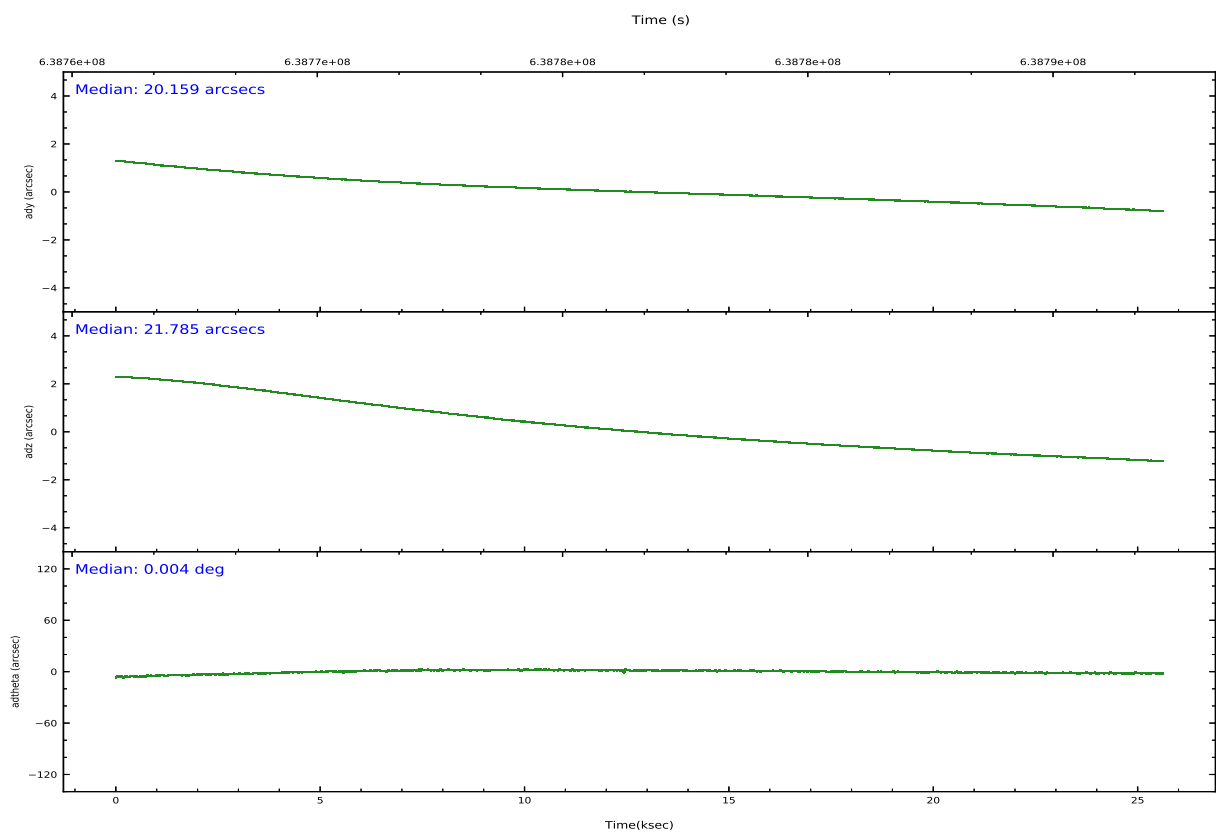
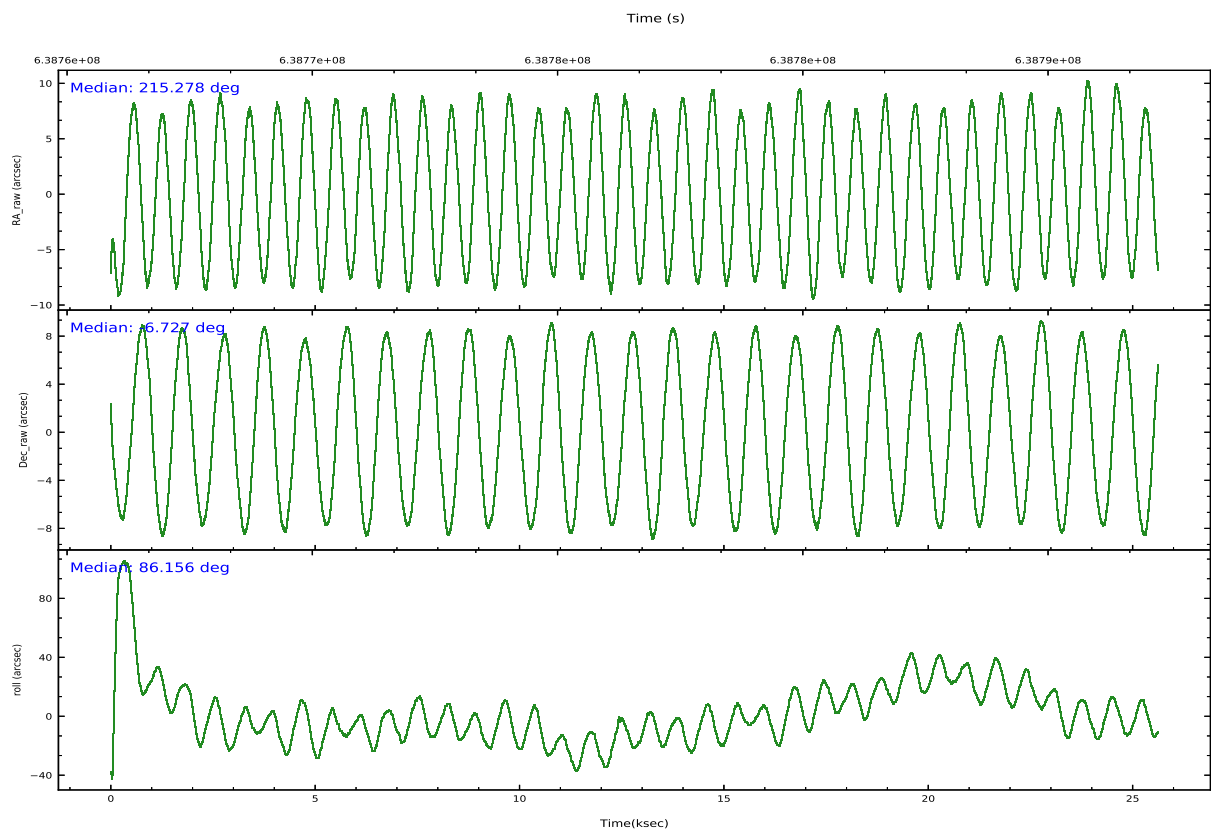
	ccd 6	ccd 7
grade 0 events	1835	3164
	3%	5%
grade 1 events	23	107
	0%	0%
grade 2 events	1270	6600
	2%	10%
grade 3 events	965	3313
	1%	5%
grade 4 events	964	3290
	1%	5%
grade 5 events	2266	6573
	4%	10%
grade 6 events	1267	14251
	2%	22%
grade 7 events	45946	25729
	84%	40%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar version number	8	8
Detector	ACIS-67	ACIS-67	Obspar file type	PREDICTED	ACTUAL
Grating	NONE	NONE	Obspar update status	NONE	UPDATED
Data mode	VFAINT	VFAINT	CCD I0 on	N	N
Observation mode	POINTING	POINTING	CCD I1 on	N	N
[deg] Pointing RA	215.290222	215.28366621249	CCD I2 on	N	N
[deg] Pointing Dec	-6.751046	-6.7327700159091	CCD I3 on	N	N
[deg] Pointing Roll	86.000910	86.15691266842499	CCD S0 on	N	N
[mm] SIM focus pos	-0.684267	-0.6828225247311905	CCD S1 on	N	N
[mm] SIM defocus	0	0.001444936568705701	CCD S2 on	O1	Y
[mm] SIM translation stage pos	-190.132523	-190.1400660498719	CCD S3 on	Y	Y
[mm] SIM translation stage offset	0	0.00754346686406393	CCD S4 on	N	N
[s] Observation start time (MET)	638765193.184000	638763920.87545	CCD S5 on	N	N
Observation start date	2018-03-30T02:45:24	2018-03-30T02:25:20	Number of optional ACIS chips dropped	0	0
[s] Observation end time (MET)	638790693.184000	638791487.73958	On-chip summing requested	N	N
Observation end date	2018-03-30T09:50:24	2018-03-30T10:04:47	Subarray requested	CUSTOM	1/4
Read mode	TIMED	TIMED	Subarray start row	385	385
			Subarray row count	256	256
			Alternating exposures requested	N	N
			[s] Primary exposure time	0.000000	0.9

2.3 Aspect



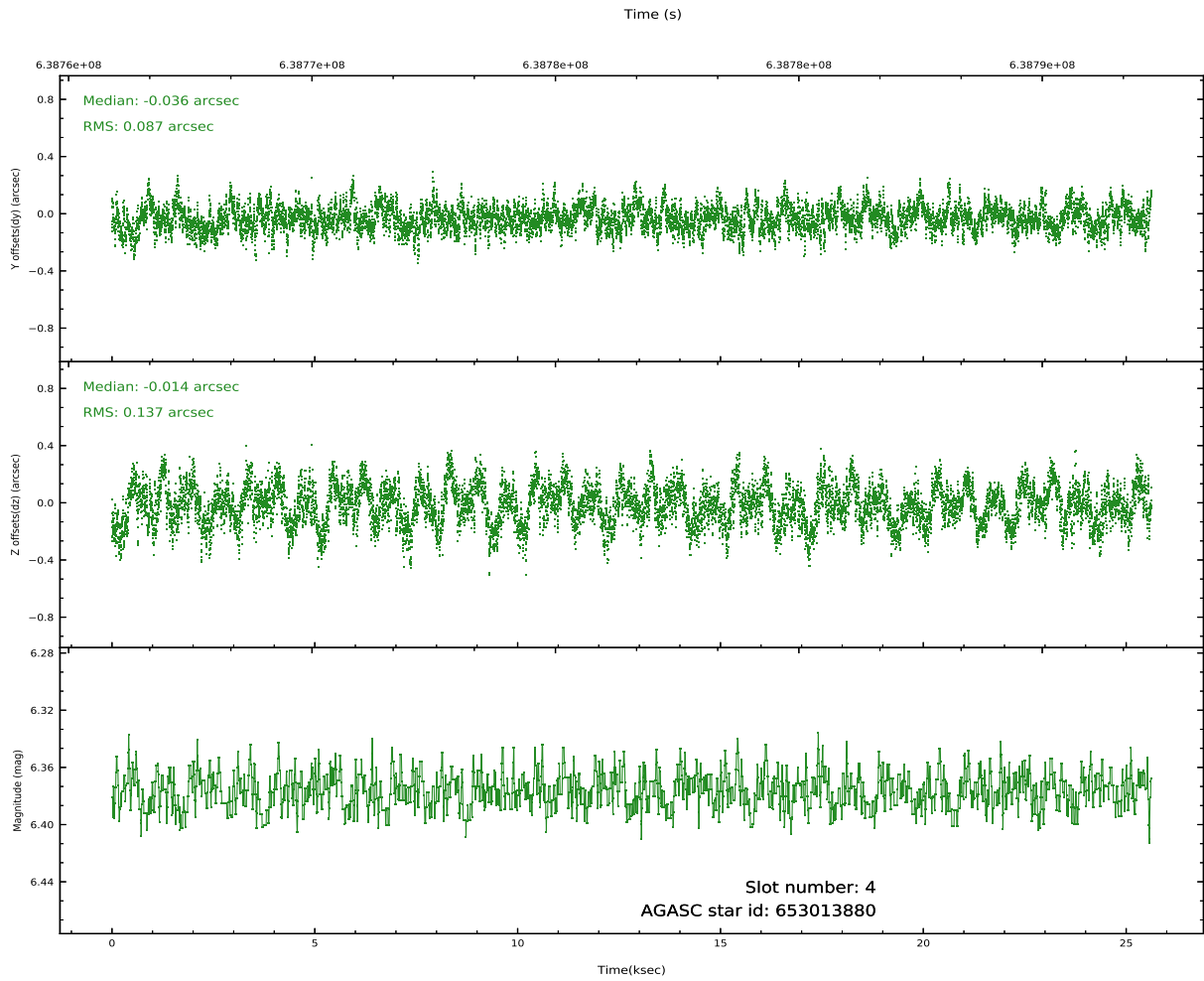
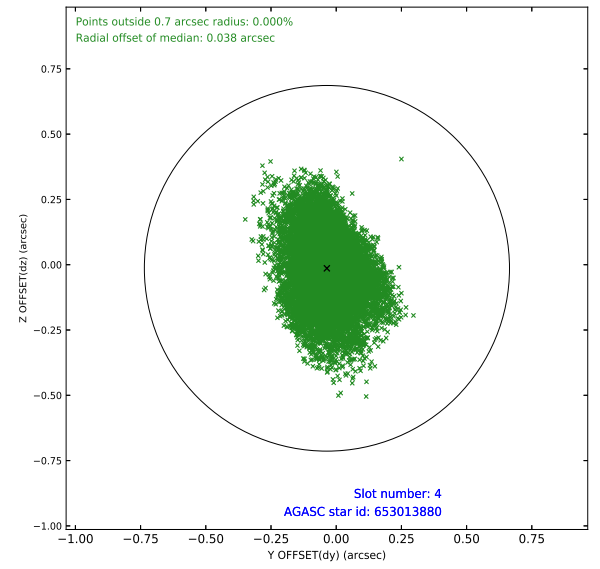
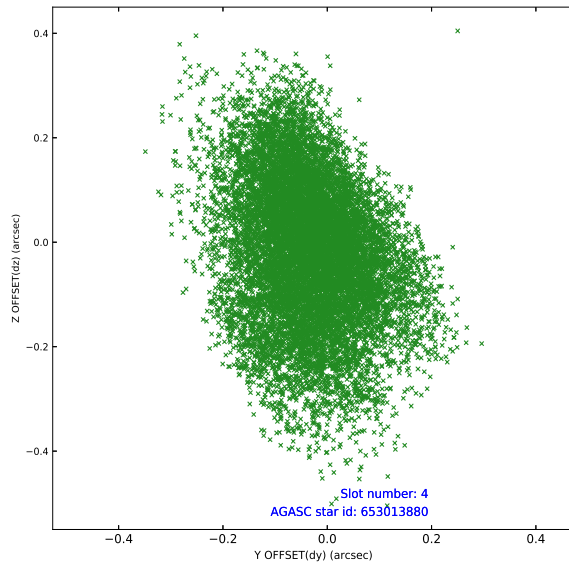


Slot Statistics

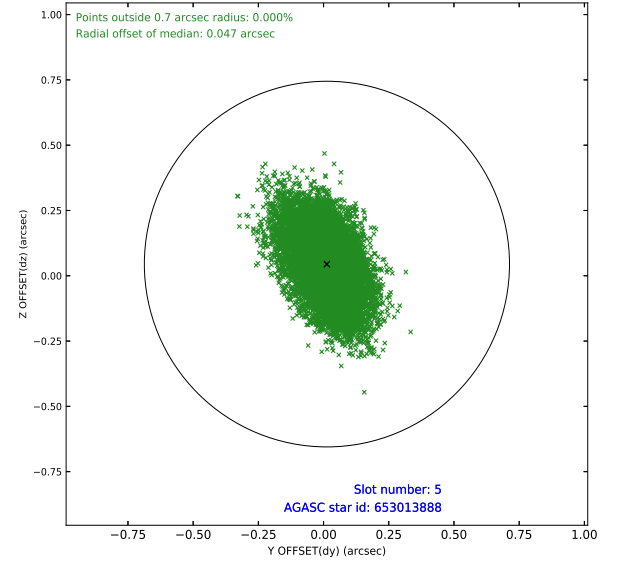
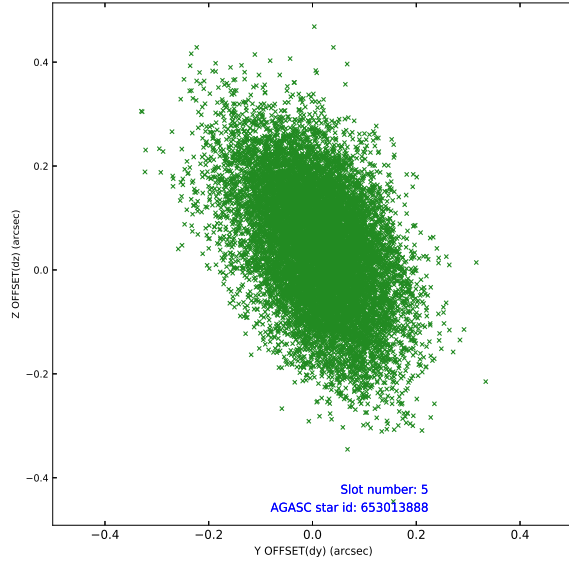
pt	status	used	id	mag	n_pts	frac_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mea
0	FID		ACIS-S-2	7.00	6250	1.000	0.120	-0.087	0.021	0.035	0.000000	0.000000	-773.48	-1743
1	FID		ACIS-S-4	7.11	6247	1.000	0.068	-0.032	0.020	0.039	0.000000	0.000000	2139.98	164
2	FID		ACIS-S-5	7.11	6250	1.000	-0.221	0.129	0.021	0.029	0.000000	0.000000	-1826.24	158
3	OMITTED			0.00	0	0.000	0.000	0.000	0.000	0.000	0.000000	0.000000	0.00	0
4	GUIDE	used	653013880	6.38	12501	1.000	-0.036	-0.014	0.172	0.282	214.971669	-6.746165	-62.63	1139
5	GUIDE	used	653013888	7.80	12500	1.000	0.013	0.045	0.147	0.251	214.671610	-7.013692	-1098.85	2139
6	GUIDE	used	653139552	10.04	12394	1.000	0.089	0.032	0.321	0.536	215.072064	-6.202290	1915.74	917
7	GUIDE	used	653141776	9.29	12483	1.000	-0.075	-0.077	0.174	0.289	215.017653	-6.536026	704.35	1026

2.4 Star Slots

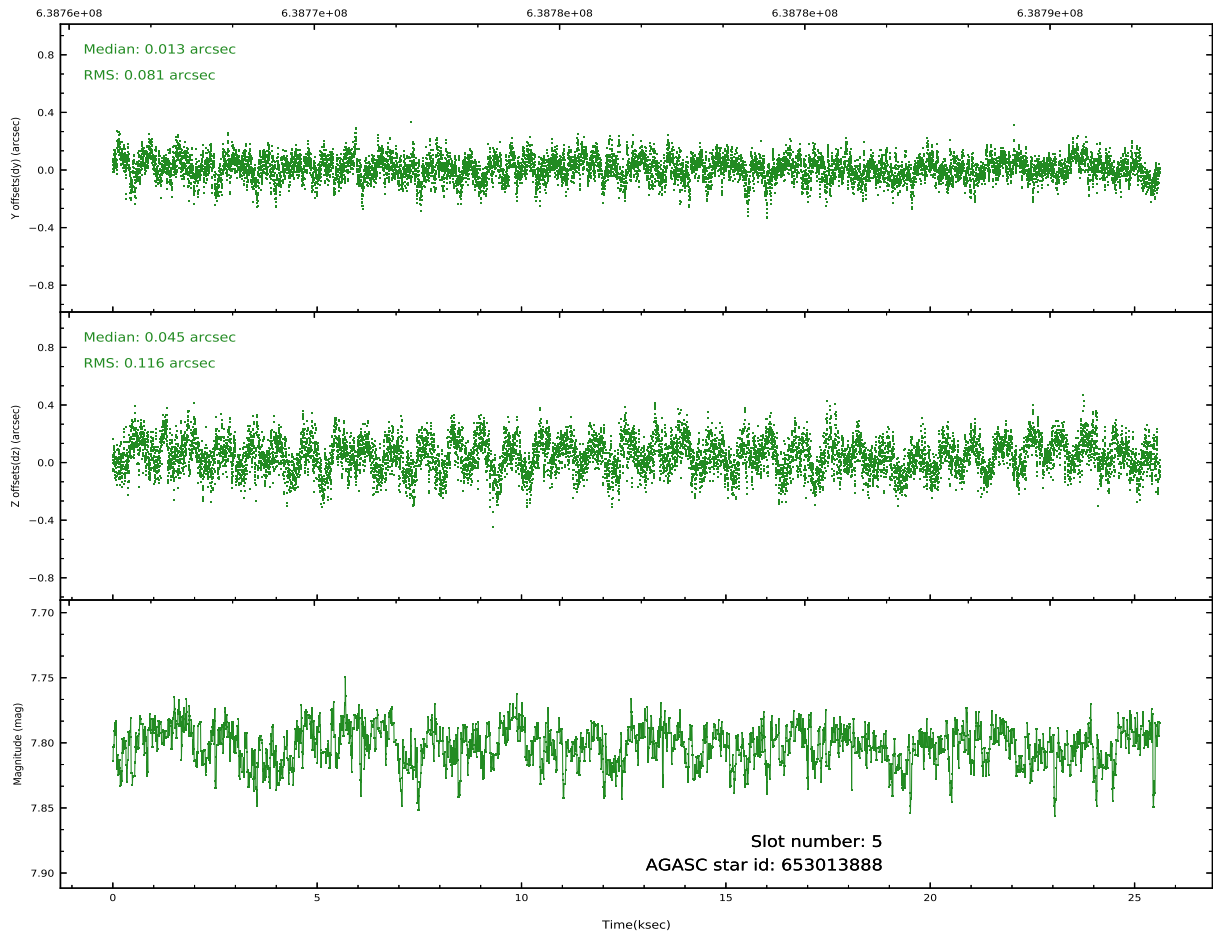
2.4.1 Slot 4



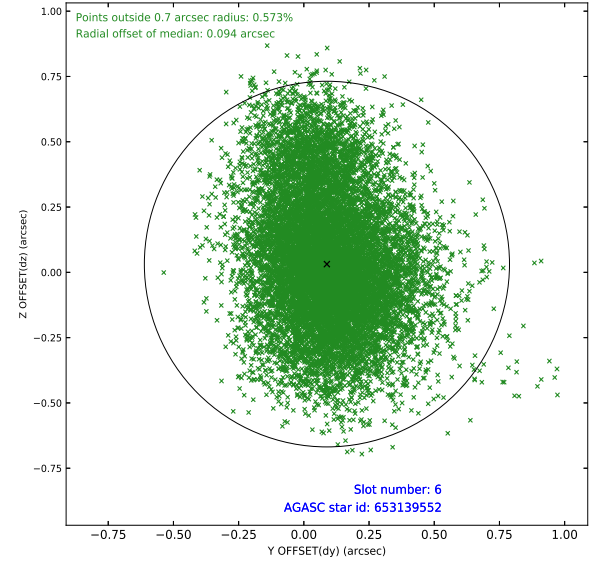
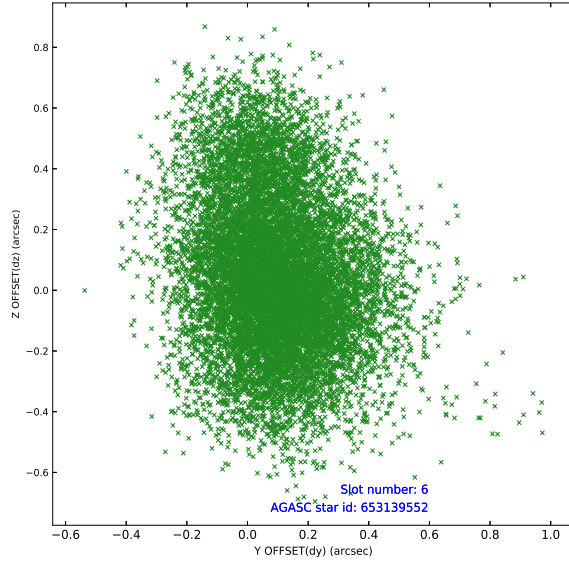
2.4.2 Slot 5



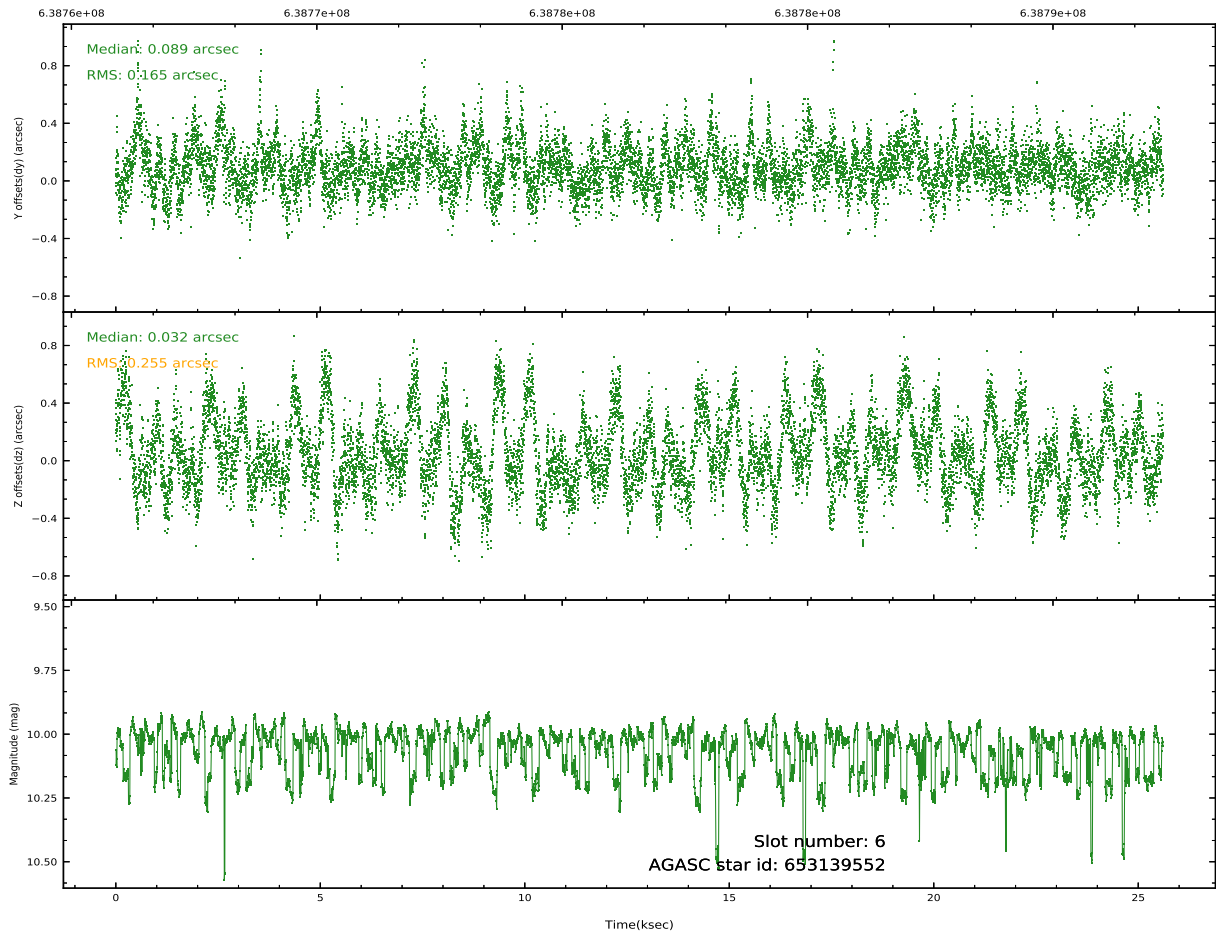
Time (s)



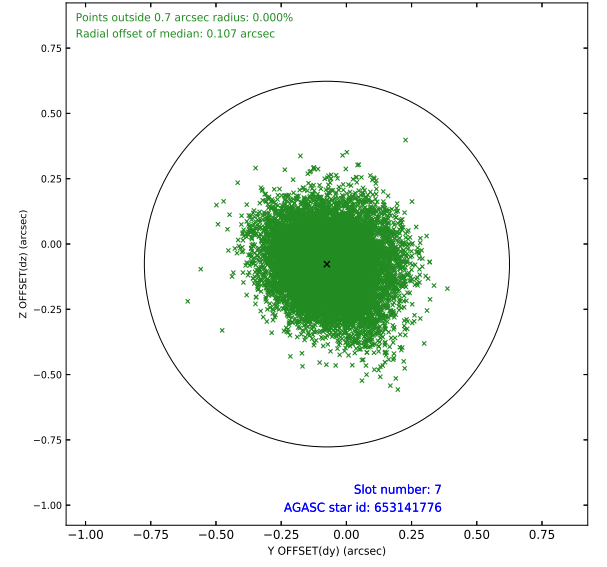
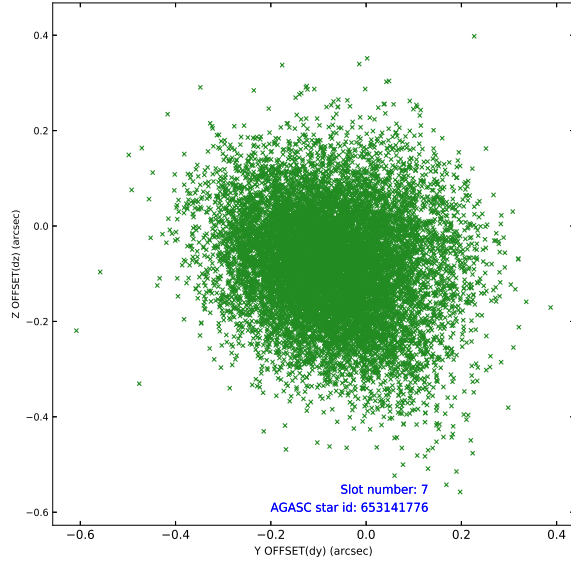
2.4.3 Slot 6



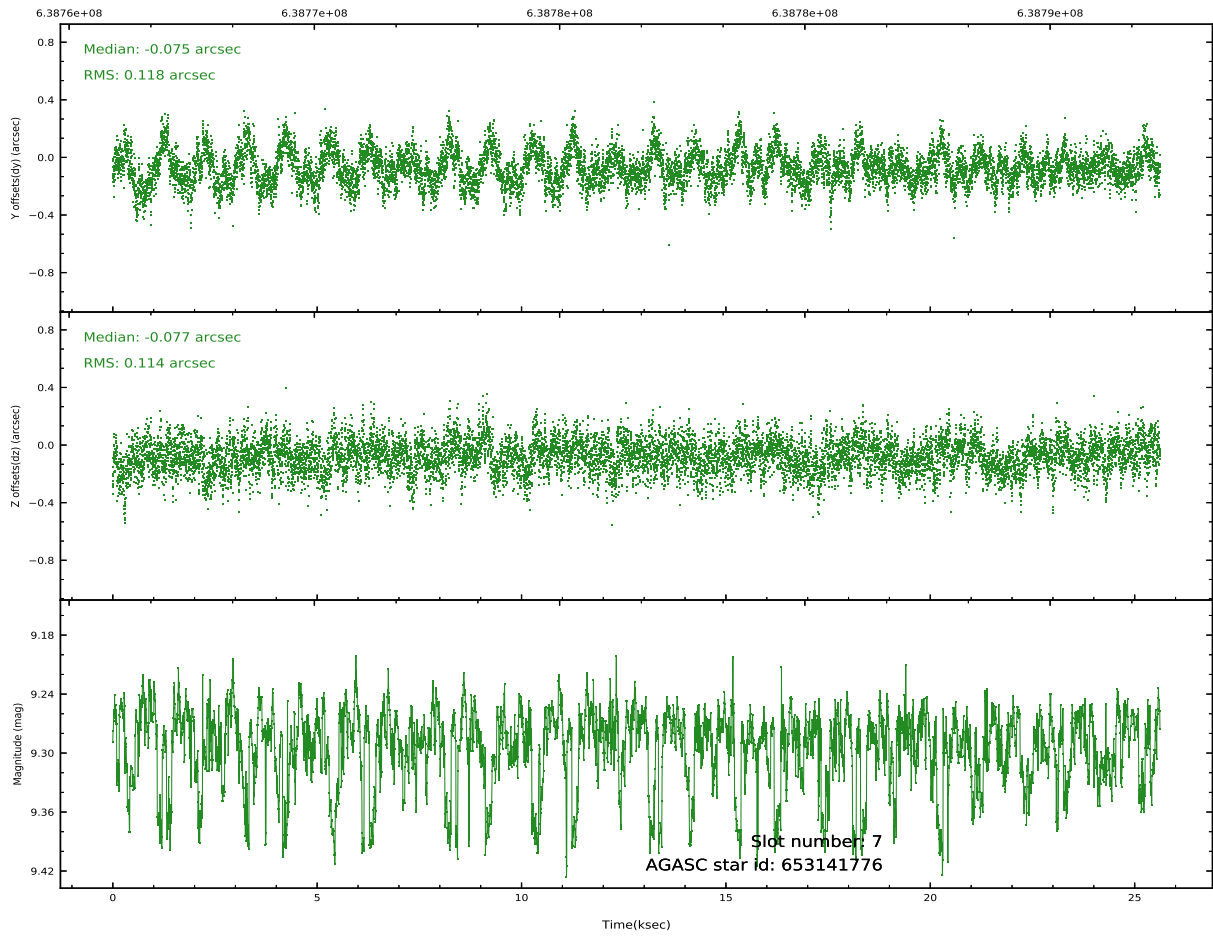
Time (s)



2.4.4 Slot 7

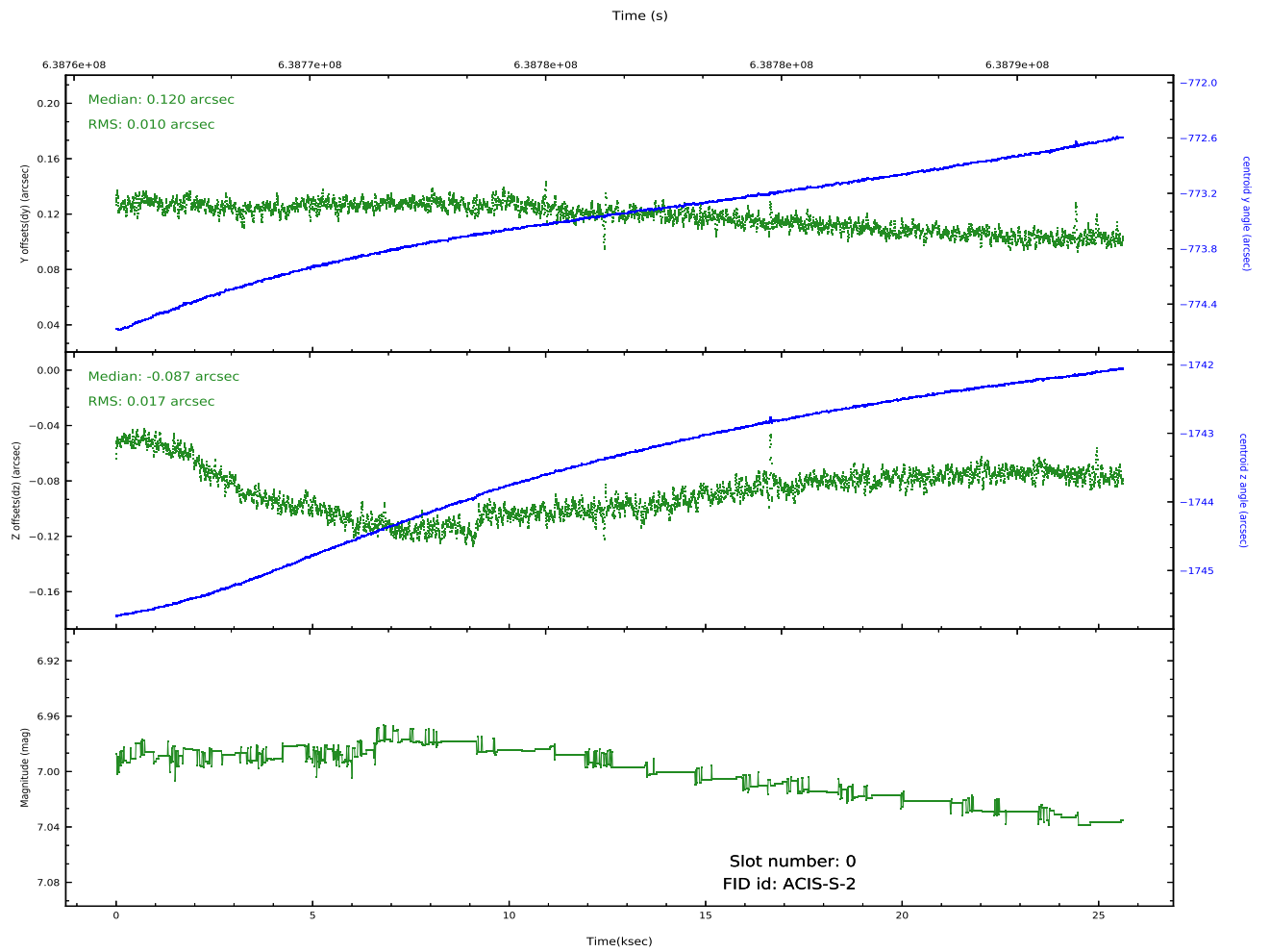
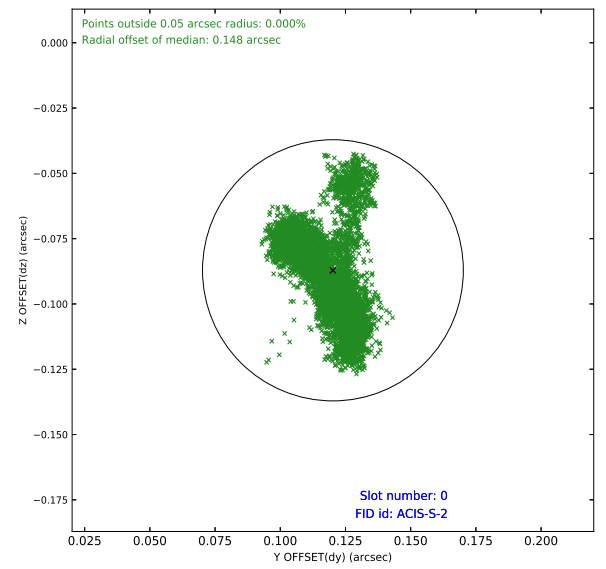
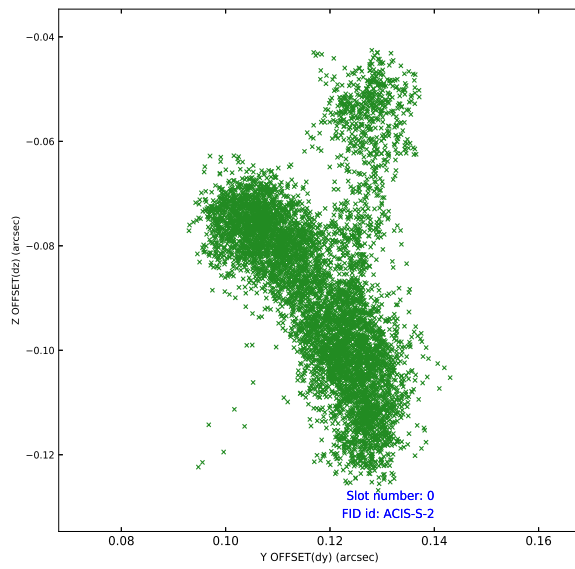


Time (s)

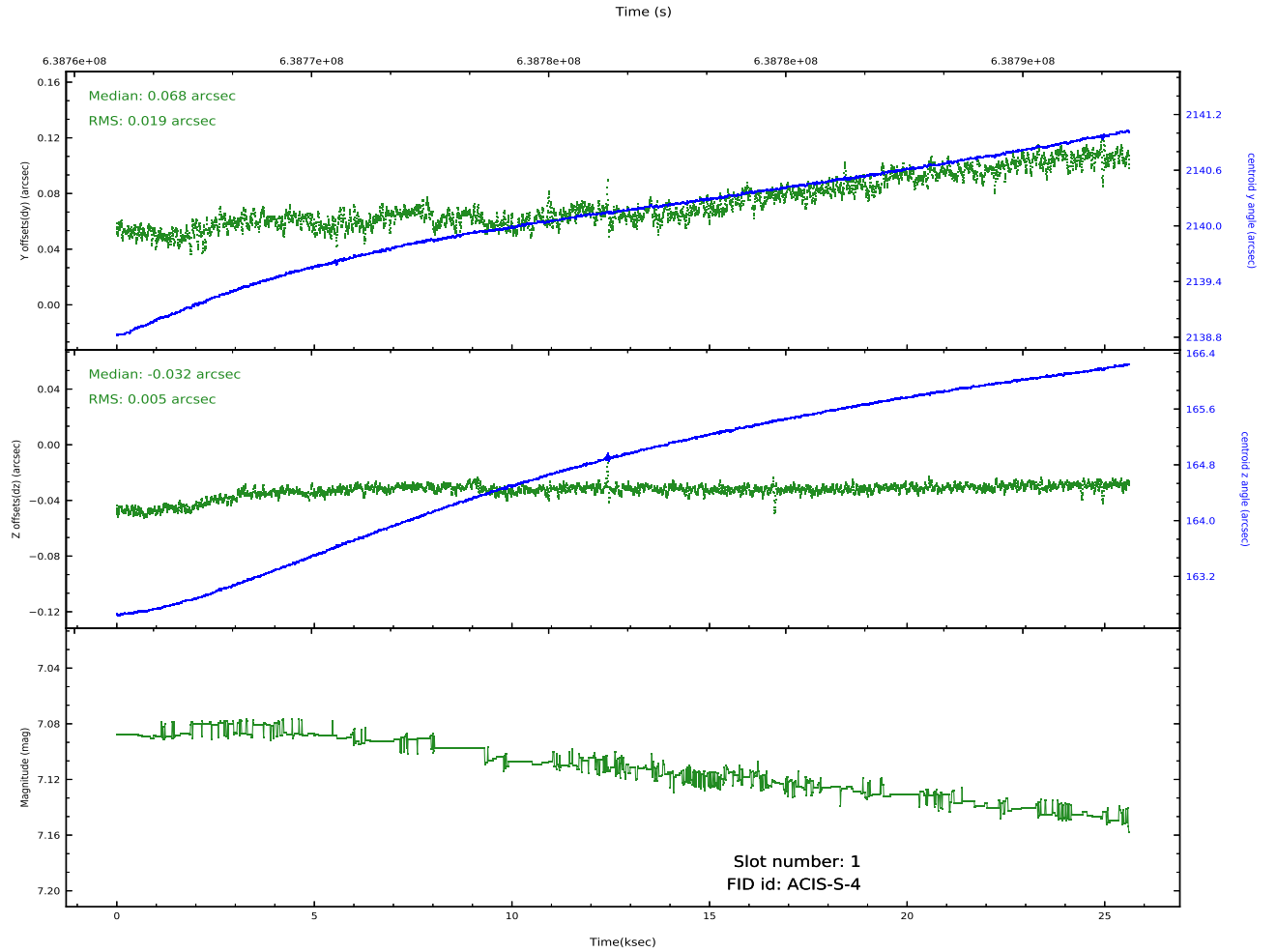
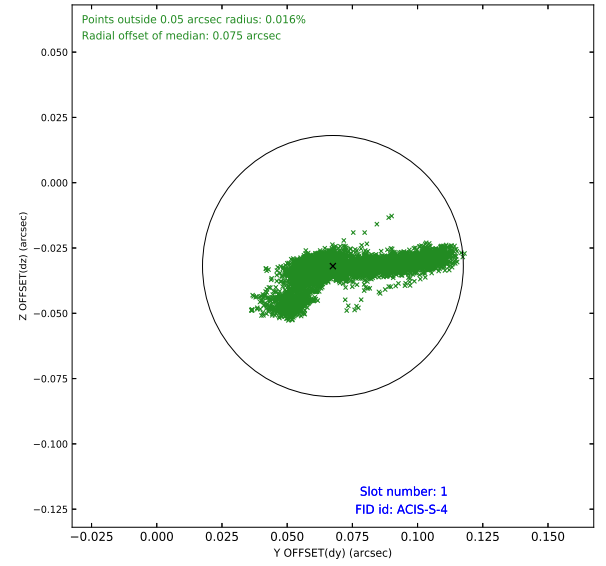
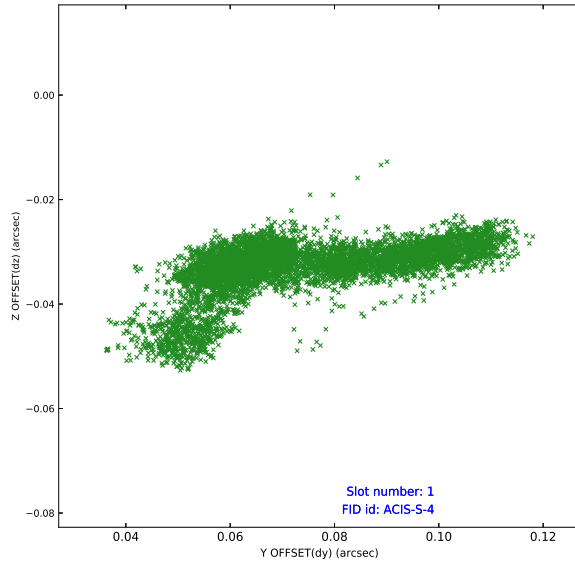


2.5 FID Slots

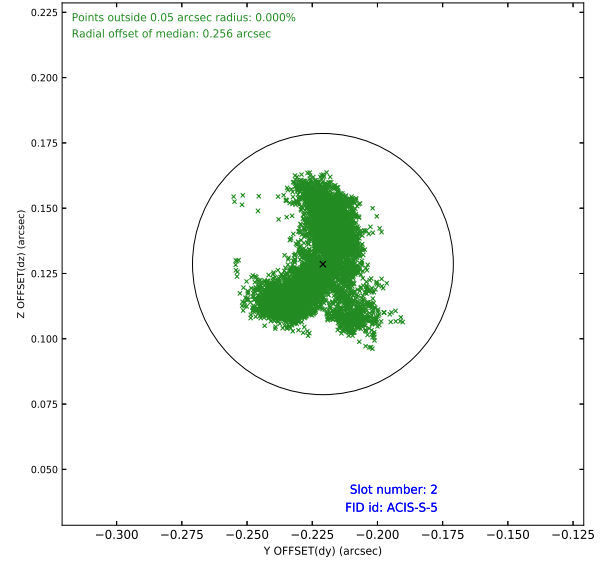
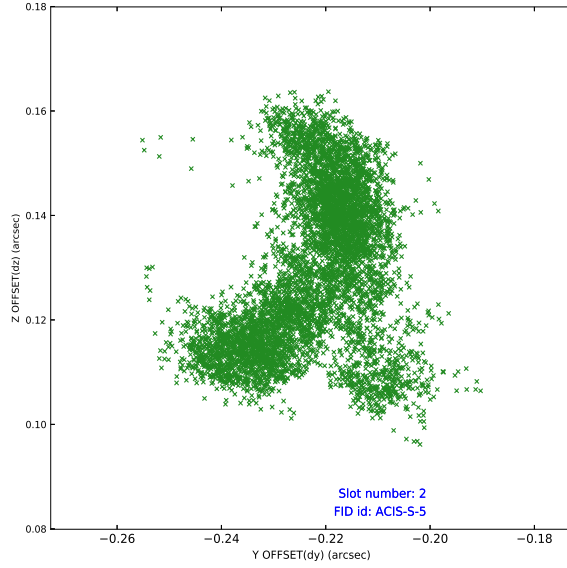
2.5.1 Slot 0



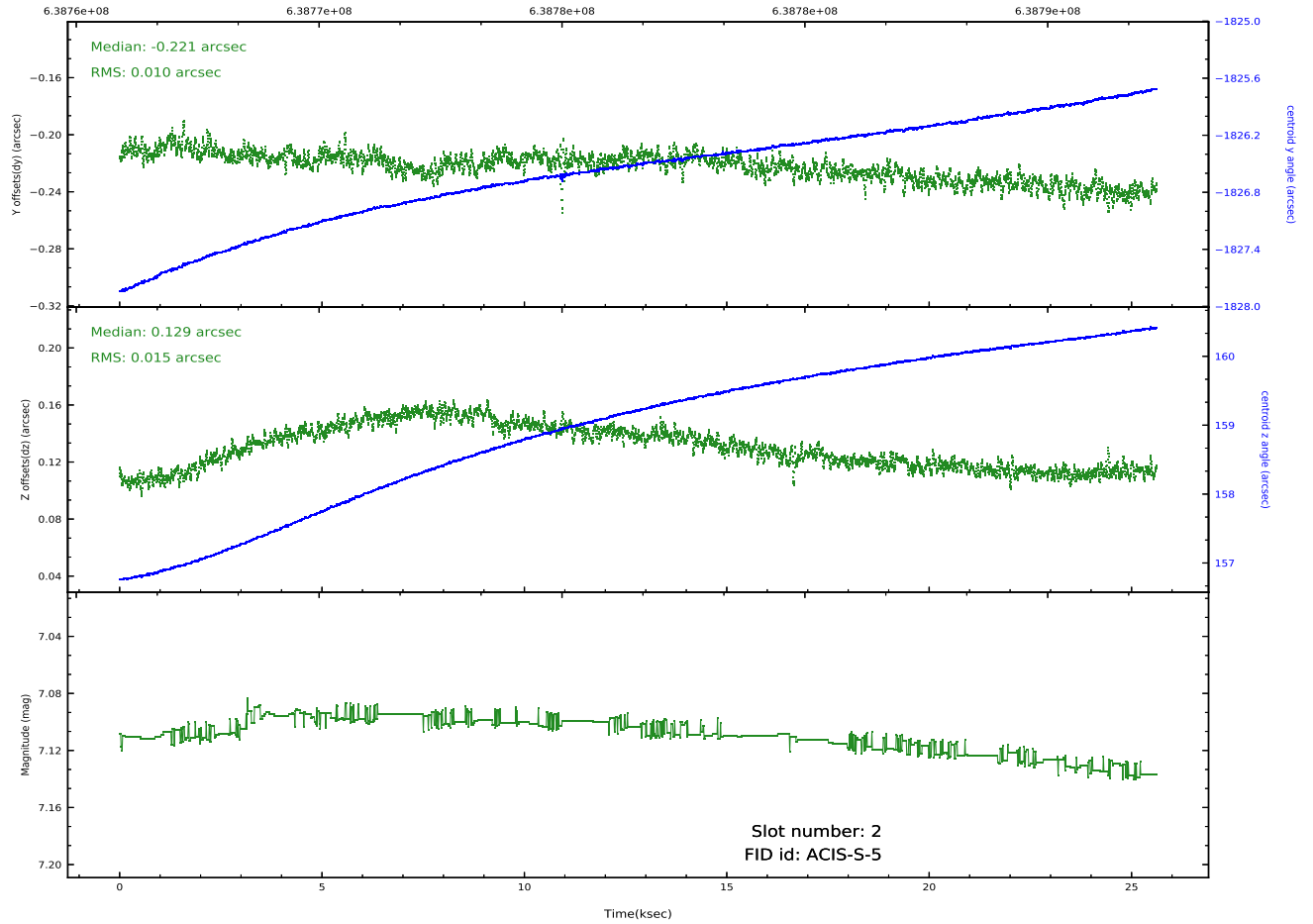
2.5.2 Slot 1



2.5.3 Slot 2



Time (s)



A Summary

A.1 Status

V&V Scientist	Beth Sundheim
V&V Date (YYYY-MM-DD)	2020.10.29
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	25.603784005523

A.2 Comments

Joint proposal with HST and NRAO.

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The guide star in slot 3 was removed from the aspect solution due to poor data quality. The aspect solution is improved by the removal of this guide star from the solution.