

V&V Reference Report

L2 ASCDS Version : 10.5.1.1

Observation 18456 - L2 Version 1
Chandra X-Ray Center

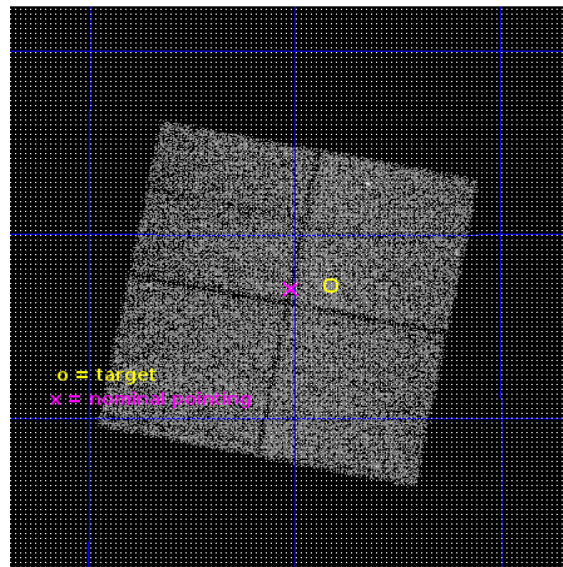
L2 Processing Date : Oct 1 2016

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

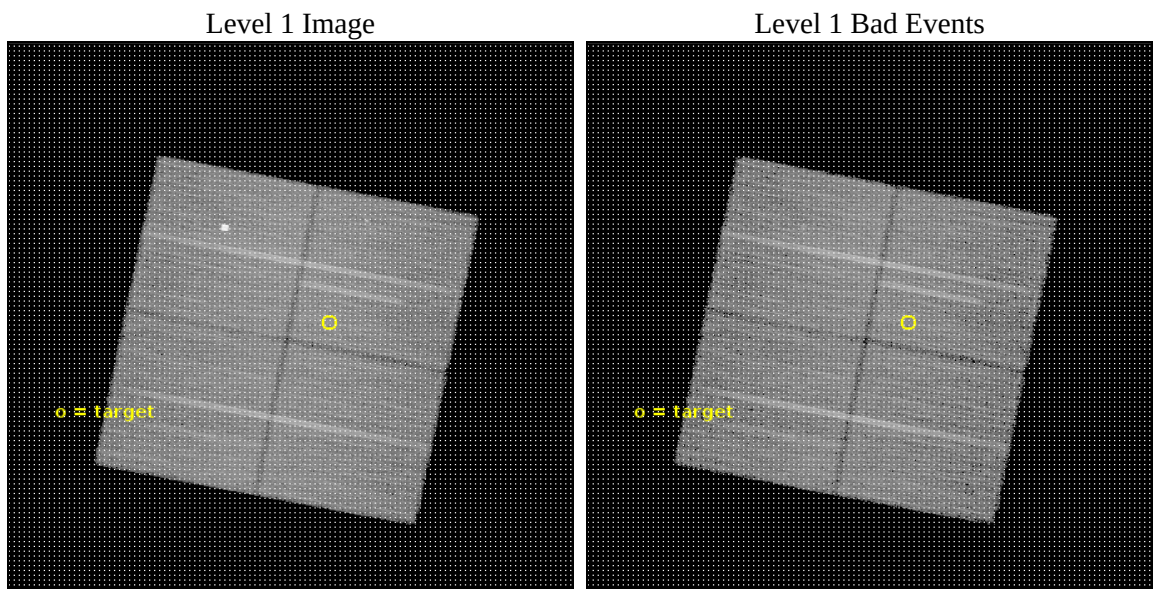
seq_num	601258	Sequence number
obs_id	18456	Observation id
title	Followup on galaxy Diffuse Emission	Proposal title
observer	Gordon Garmire	Principal investigator
object	NGC3938	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	178.205833	Observer's specified target RA [deg]
dec_targ	44.120833	Observer's specified target Dec [deg]
ra_nom	178.2540474882	Nominal RA [deg]
dec_nom	44.117684083114	Nominal Dec [deg]
roll_nom	11.175121591338	Nominal Roll [deg]
revision	1	Processing version of data
ontime	46131.10035491	Sum of GTIs [s]
livetime	45528.363567551	Livetime [s]
ontime0	46127.959364653	Sum of GTIs [s]
ontime1	46127.959394574	Sum of GTIs [s]
ontime2	46118.536483765	Sum of GTIs [s]
ontime3	46131.10035491	Sum of GTIs [s]
l2events	75367	Number of level 2 events



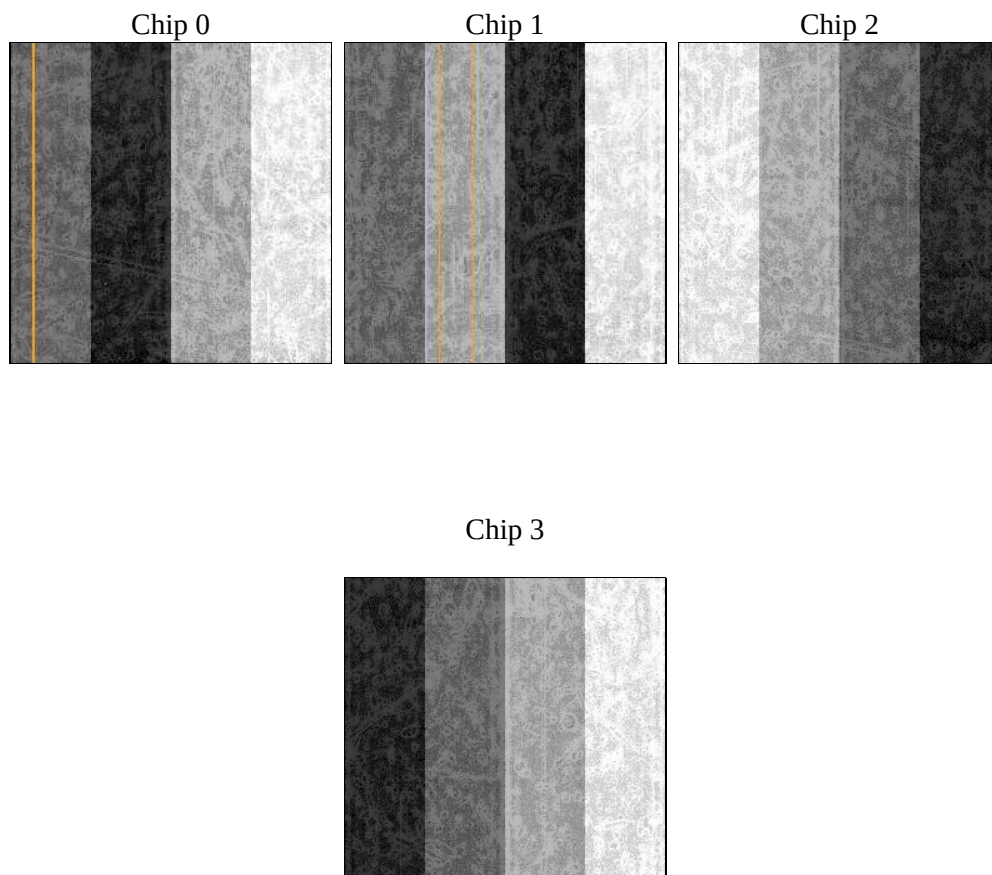
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	46000.000000	[s] Scheduled observation exposure time
ascdsver	10.5.1.1	Processing system revision	ontime	46131.10035491	Sum of GTIs [s]
caldbver	4.7.2	 	ontime0	46127.959364653	Sum of GTIs [s]
date	2016-10-01T23:12:58	Date and time of file creation	ontime1	46127.959394574	Sum of GTIs [s]
revision	1	Processing version of data	ontime2	46118.536483765	Sum of GTIs [s]
			ontime3	46131.10035491	Sum of GTIs [s]
			l1events	947375	Number of level 1 events

2.1.4 Events

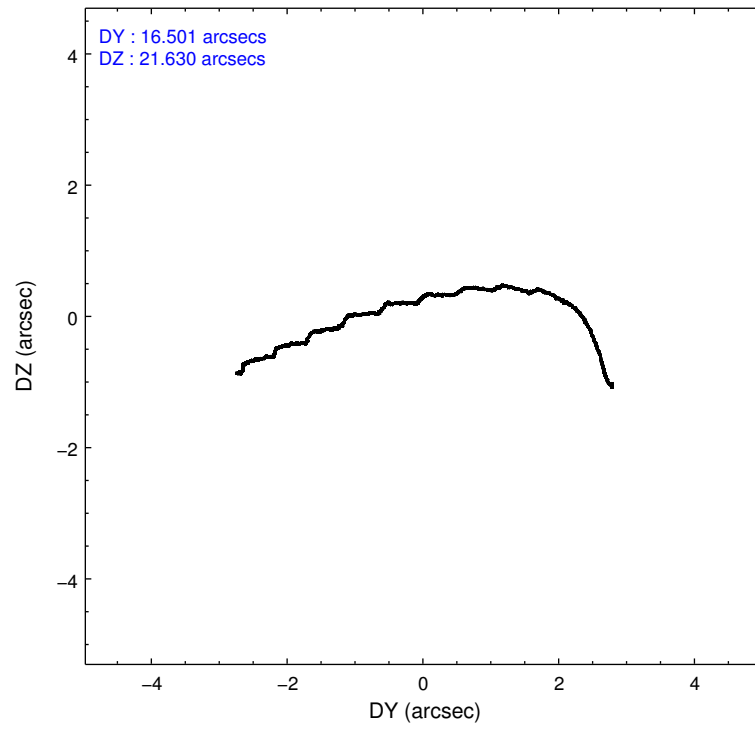
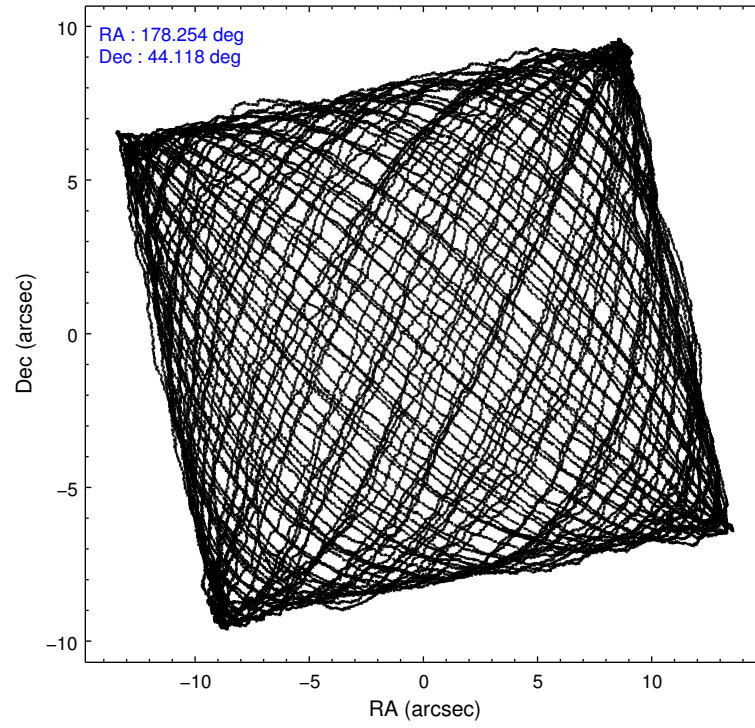
	ccd 0	ccd 1	ccd 2	ccd 3
level 1 events	221839	222087	264616	238833
rejected events	197540	196983	227402	216044
rejected %	89%	88%	85%	90%

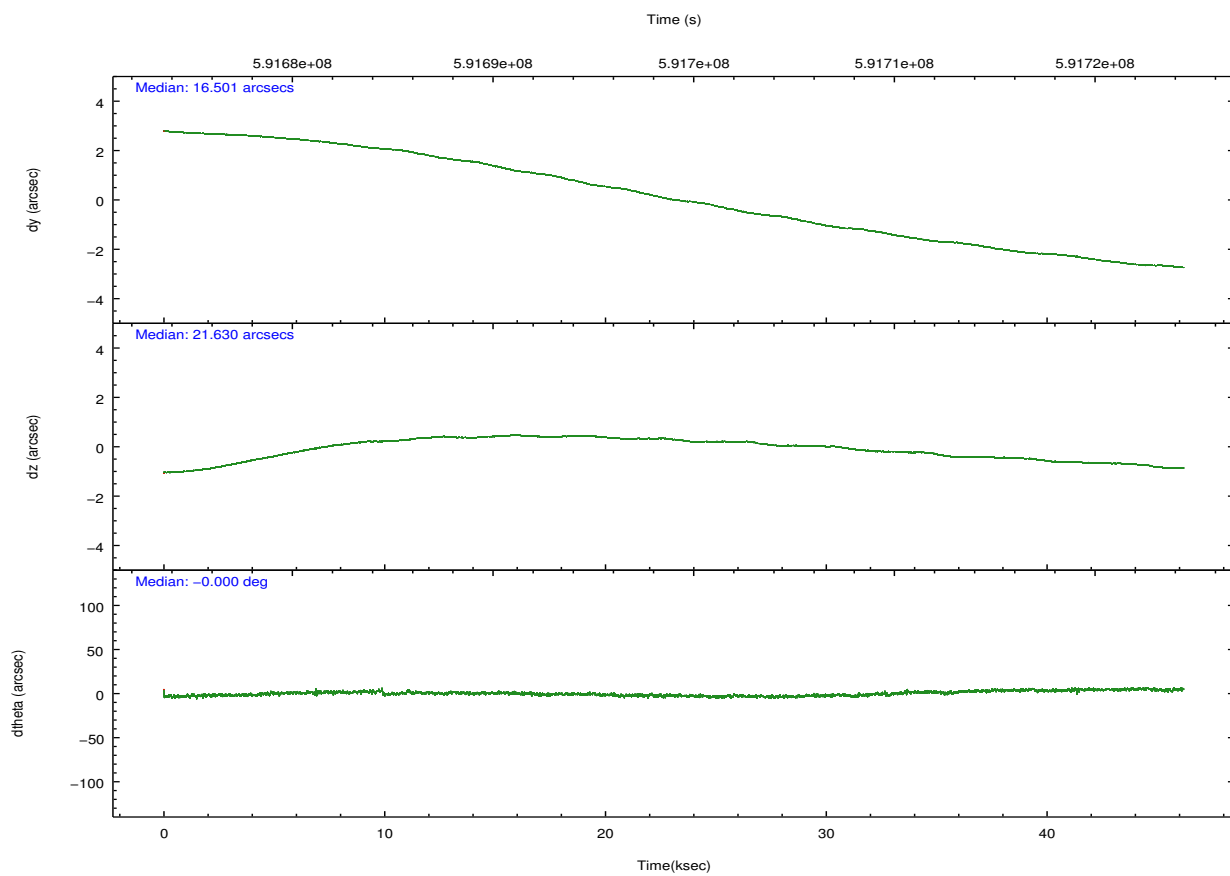
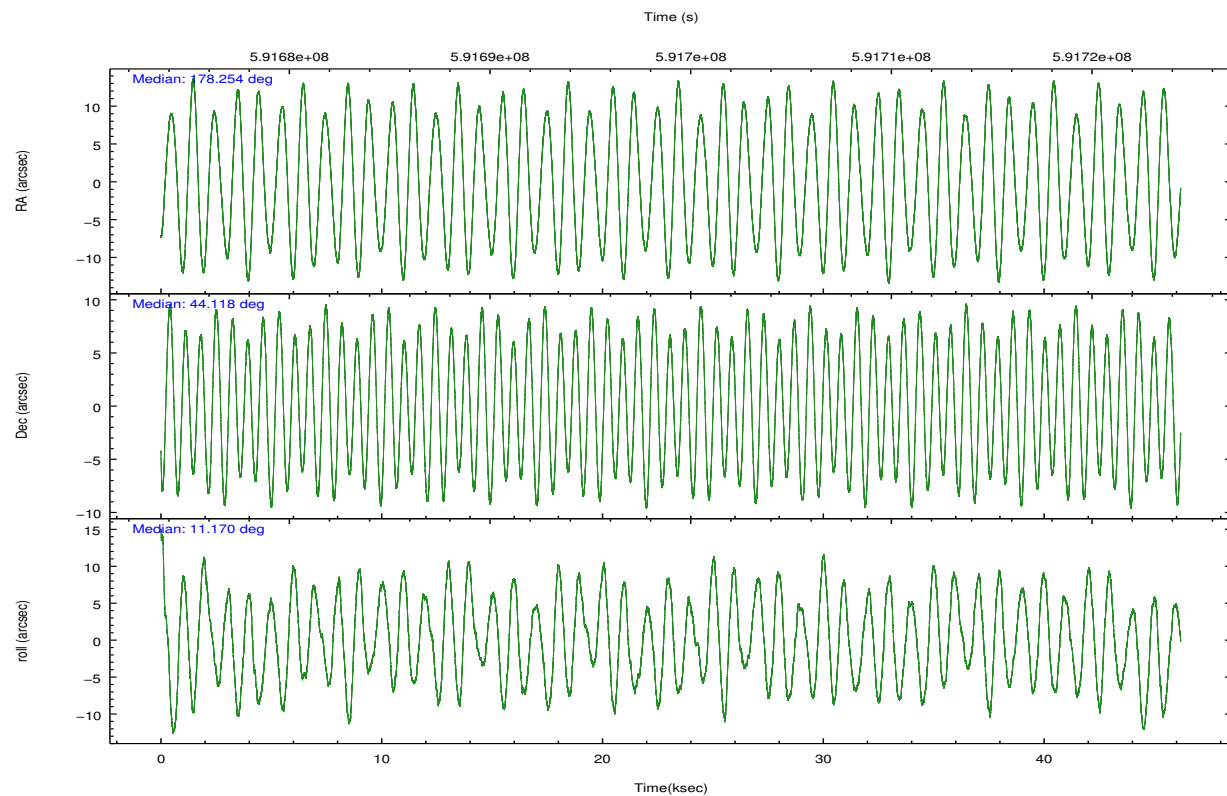
	ccd 0	ccd 1	ccd 2	ccd 3
grade 0 events	9257	9394	9277	9636
	4%	4%	3%	4%
grade 1 events	130	113	124	174
	0%	0%	0%	0%
grade 2 events	6381	6045	20045	4991
	2%	2%	7%	2%
grade 3 events	2440	2588	2097	2292
	1%	1%	0%	0%
grade 4 events	2291	2601	2367	2276
	1%	1%	0%	0%
grade 5 events	5369	6005	4787	6323
	2%	2%	1%	2%
grade 6 events	3933	4476	3429	3594
	1%	2%	1%	1%
grade 7 events	192038	190865	222490	209547
	86%	85%	84%	87%

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	VFAINT	VFAINT	CCD I0 on	Y	Y
Observation mode	POINTING	POINTING	CCD I1 on	Y	Y
[deg] Pointing RA	178.225208	178.2540474882049	CCD I2 on	Y	Y
[deg] Pointing Dec	44.099441	44.11768408311362	CCD I3 on	Y	Y
[deg] Pointing Roll	10.986515	11.17512159133811	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	-233.592463	-233.5874344608287	CCD S3 on	N	N
[mm] SIM translation stage offset	0	-0.005018542100998502	CCD S4 on	N	N
[s] Observation start time (MET)	591676090.184000	591674793.39249	CCD S5 on	N	N
Observation start date	2016-10-01T02:27:02	2016-10-01T02:06:33	Number of optional ACIS chips dropped	1	1
[s] Observation end time (MET)	591722090.184000	591722983.77027	On-chip summing requested	N	N
Observation end date	2016-10-01T15:13:42	2016-10-01T15:29:43	Subarray requested	NONE	NONE
Read mode	TIMED	TIMED	Alternating exposures requested	N	N
			[s] Primary exposure time	0.000000	3.1

2.3 Aspect



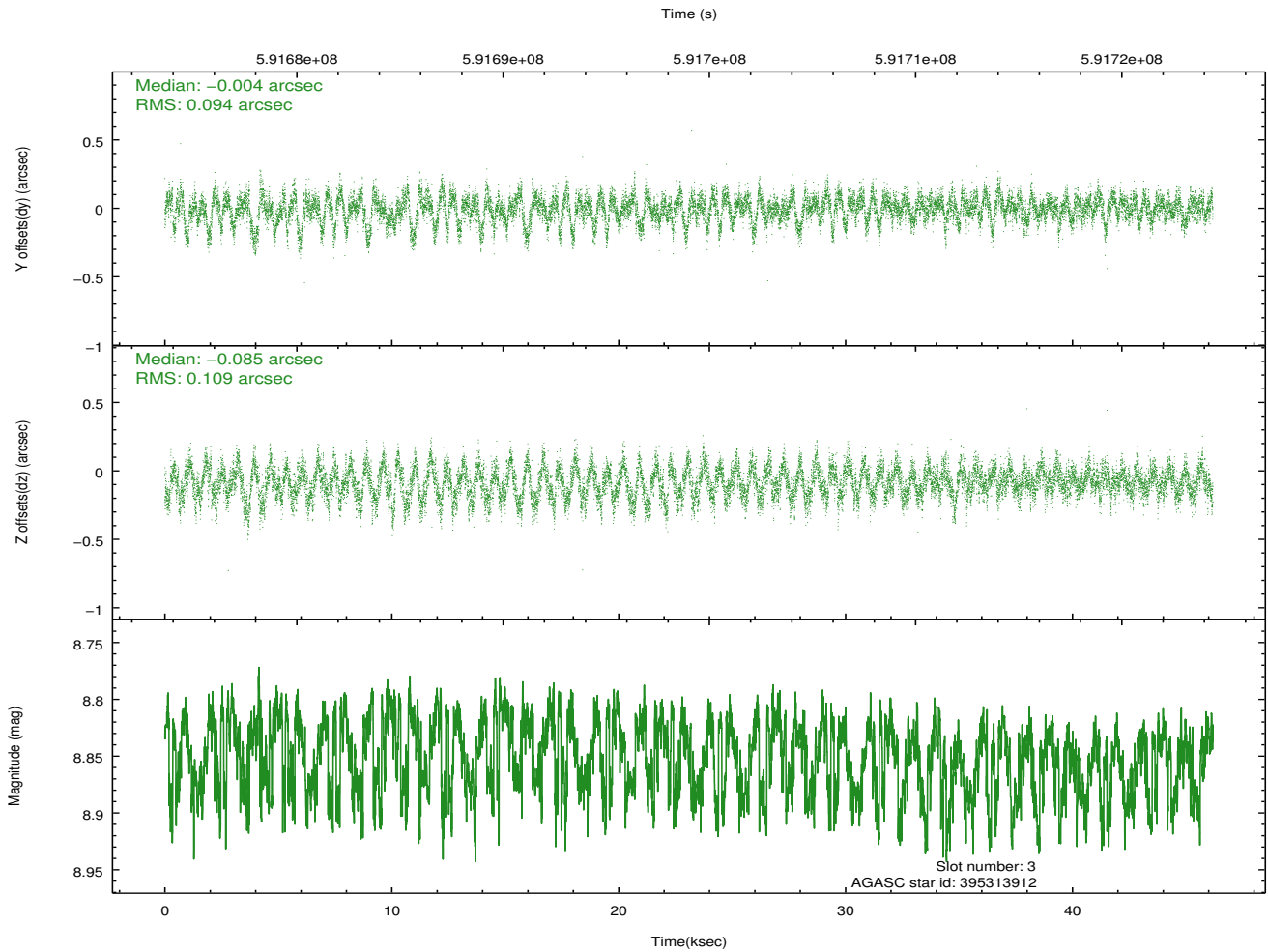
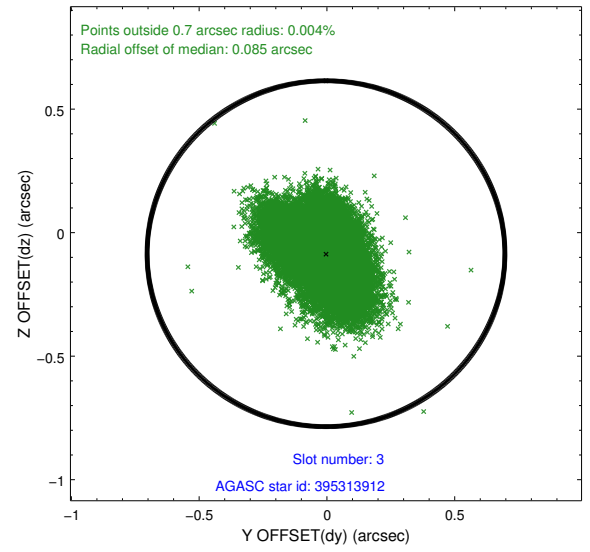
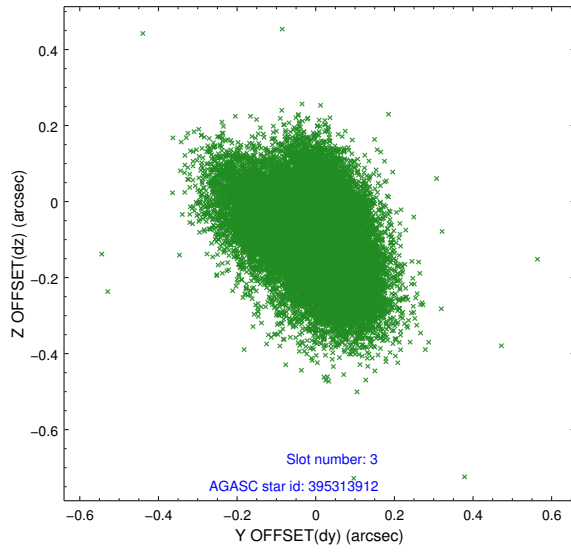


Slot Statistics

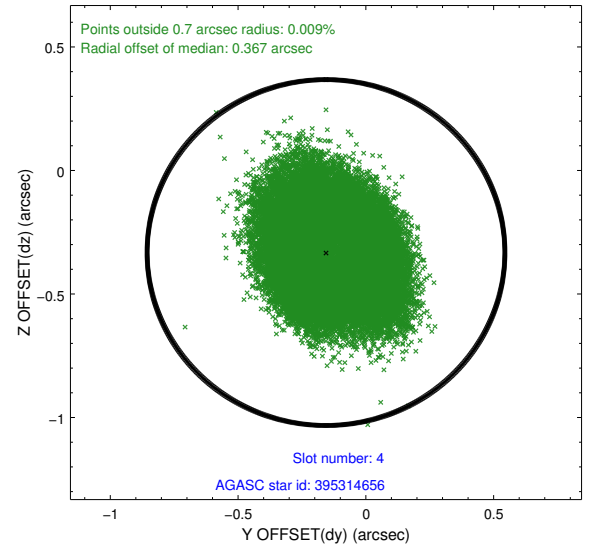
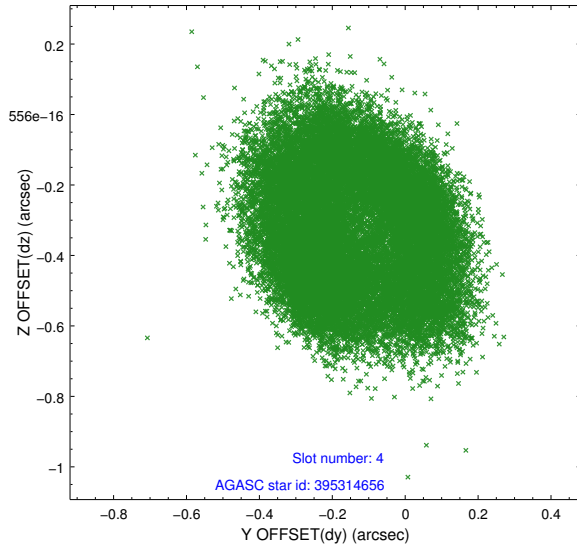
slot	status	used	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID		ACIS-I-1	7.17	11265	-0.041	-0.073	0.031	0.042	0.000000	0.000000	922.76	-845.38
1	FID		ACIS-I-2	7.06	11264	-0.312	-0.126	0.038	0.051	0.000000	0.000000	-771.62	-851.83
2	FID		ACIS-I-4	7.09	11263	0.252	0.269	0.055	0.064	0.000000	0.000000	2143.00	1054.73
3	GUIDE	used	395313912	8.85	22517	-0.004	-0.085	0.152	0.253	178.075487	44.228225	-291.43	528.91
4	GUIDE	used	395314656	9.27	22509	-0.156	-0.332	0.247	0.350	177.438863	44.537587	-1678.88	1941.94
5	GUIDE	used	395317568	8.97	22516	0.138	0.258	0.178	0.285	178.190375	43.600155	-431.58	-1746.38
6	GUIDE	used	395322648	9.02	22520	0.174	0.612	0.169	0.266	177.581980	43.466398	-2082.30	-1909.92
7	GUIDE	used	395315296	9.54	22506	-0.193	-0.456	0.275	0.429	178.489175	44.734885	1098.77	2117.92

2.4 Star Slots

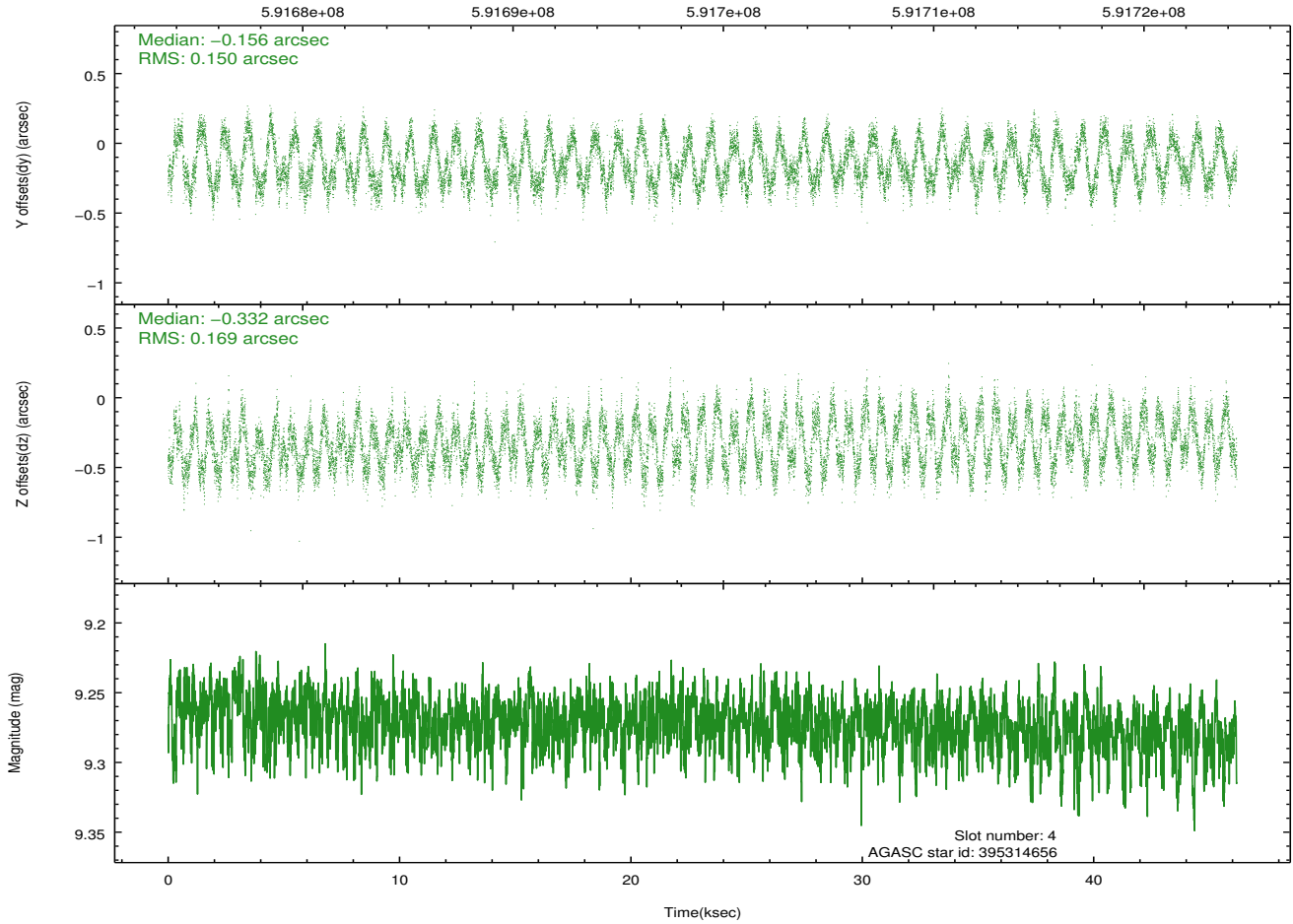
2.4.1 Slot 3



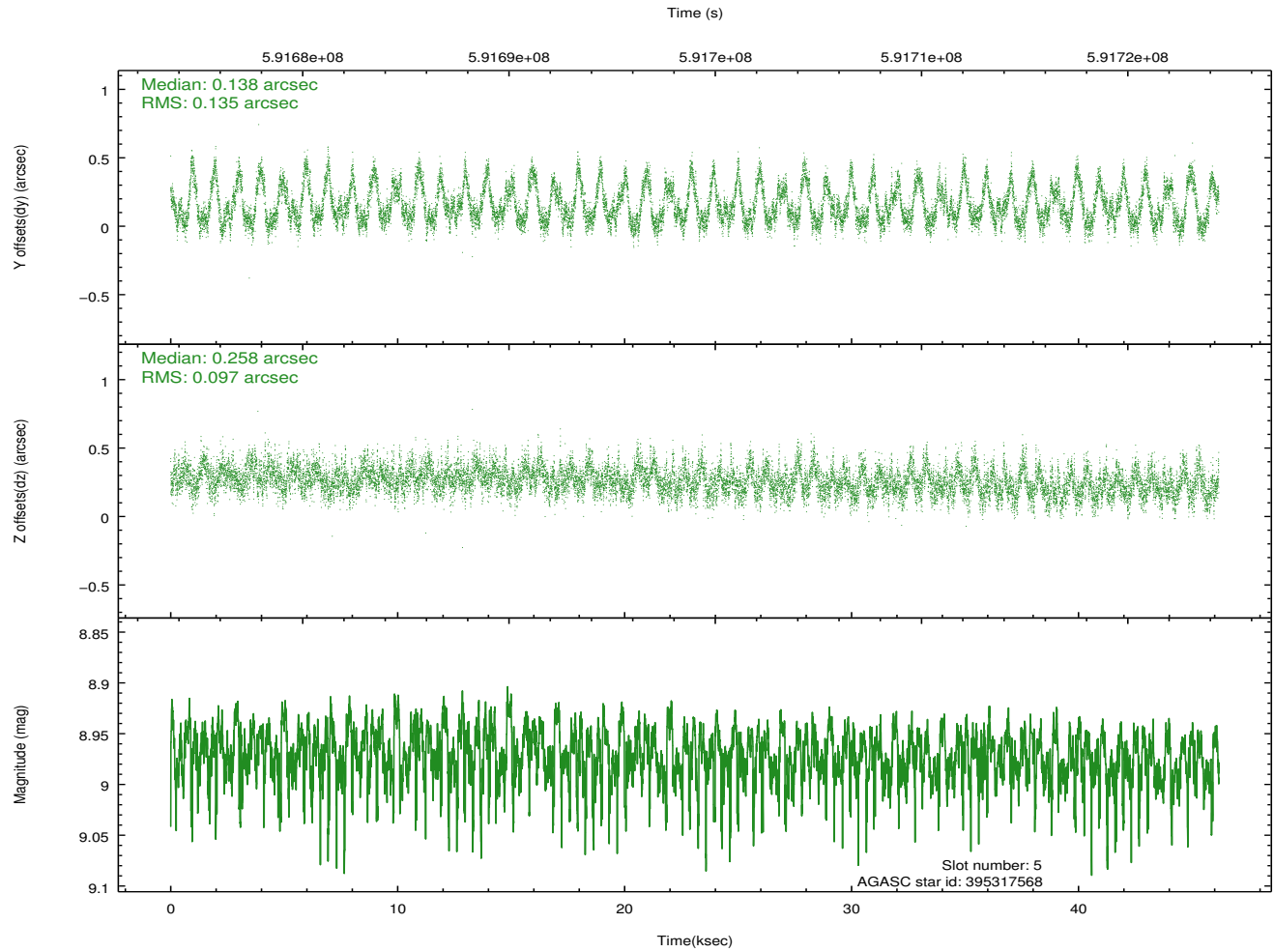
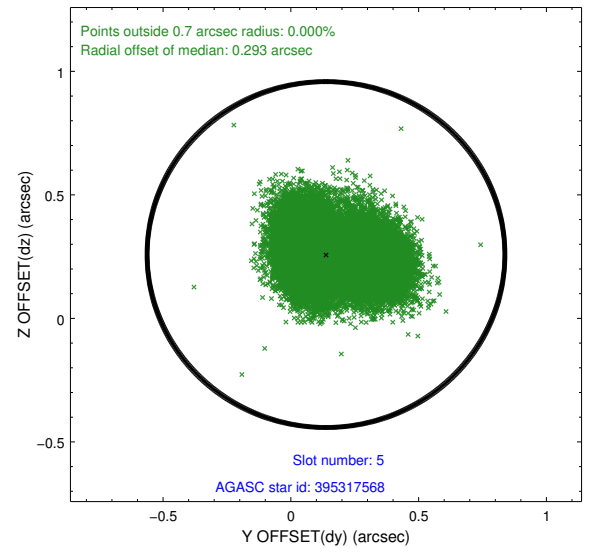
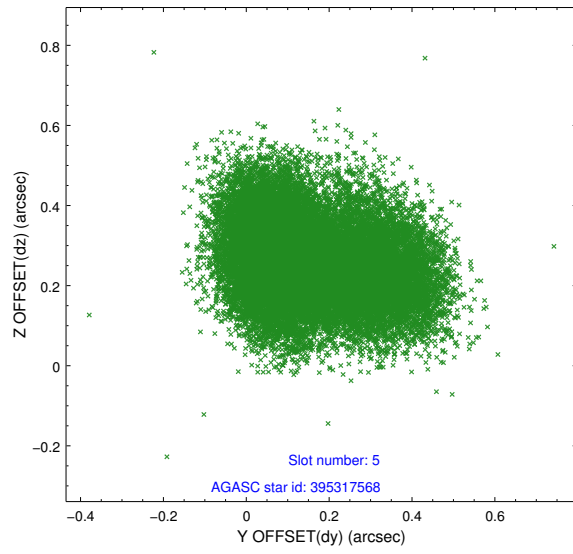
2.4.2 Slot 4



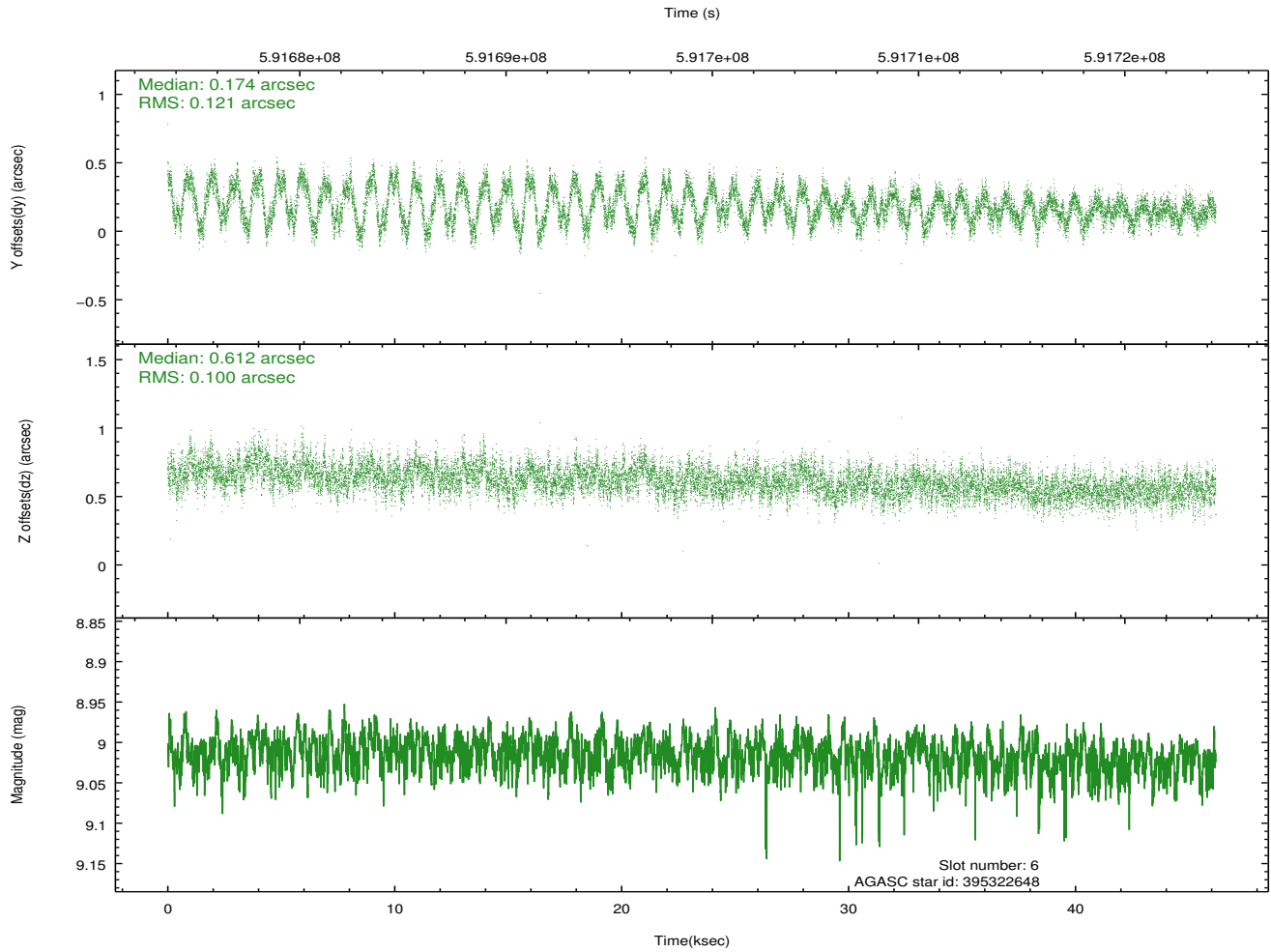
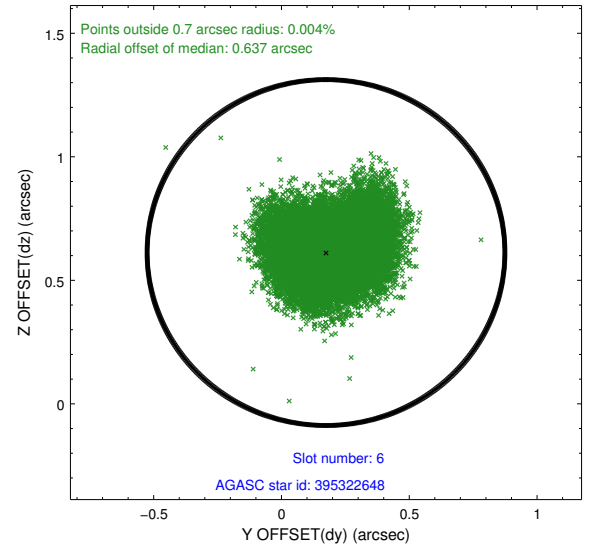
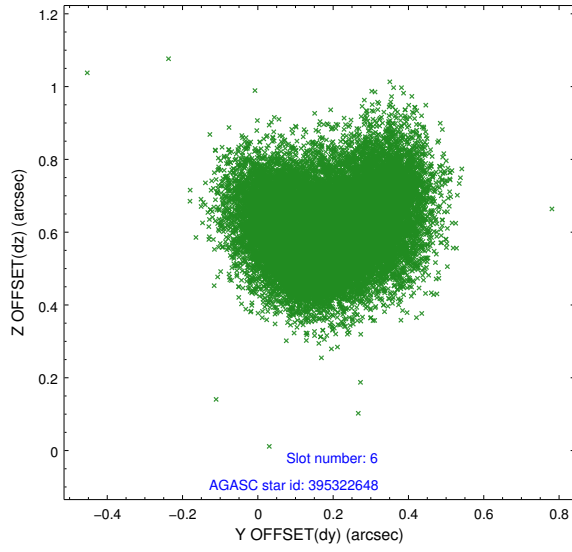
Time (s)



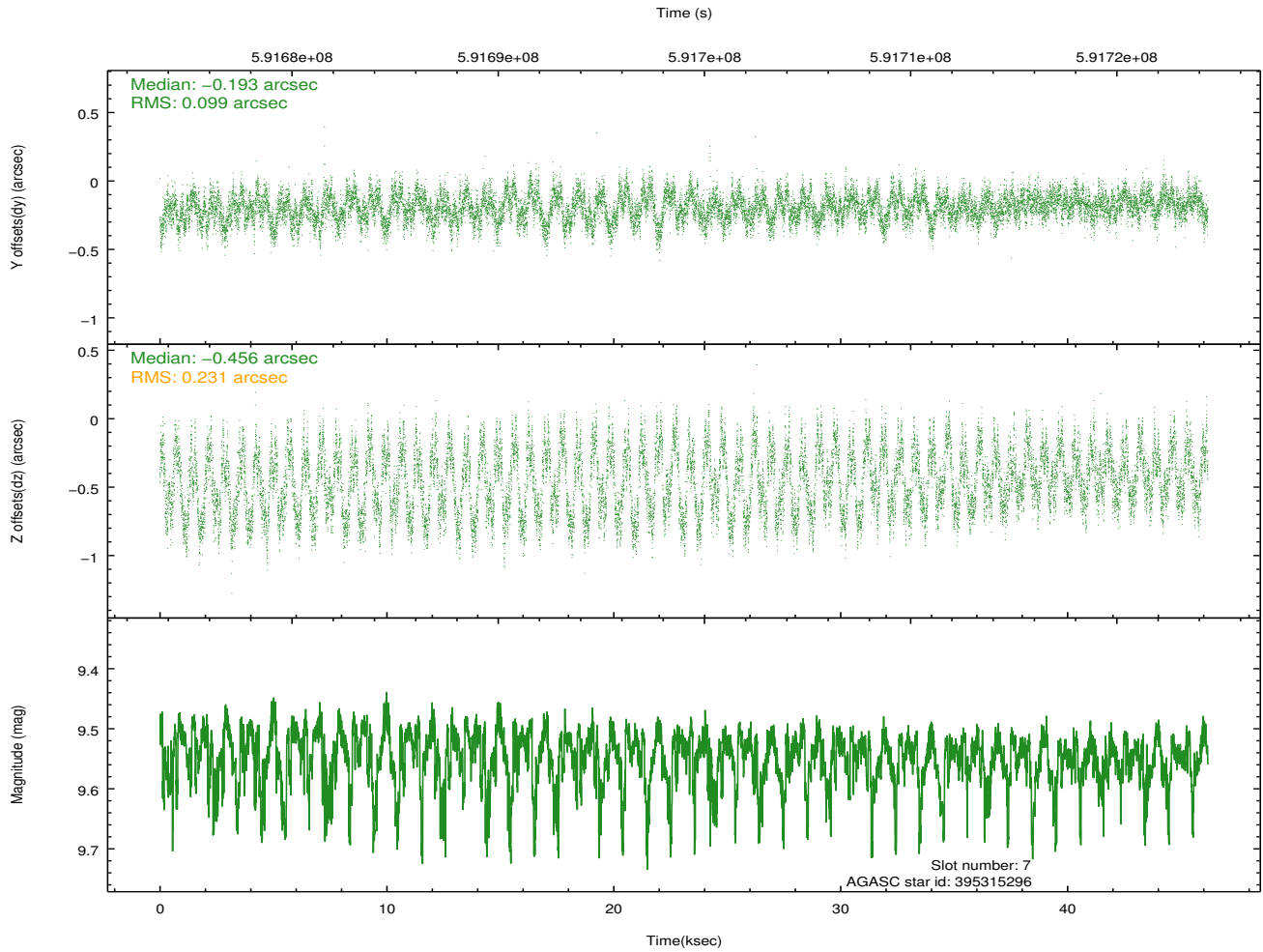
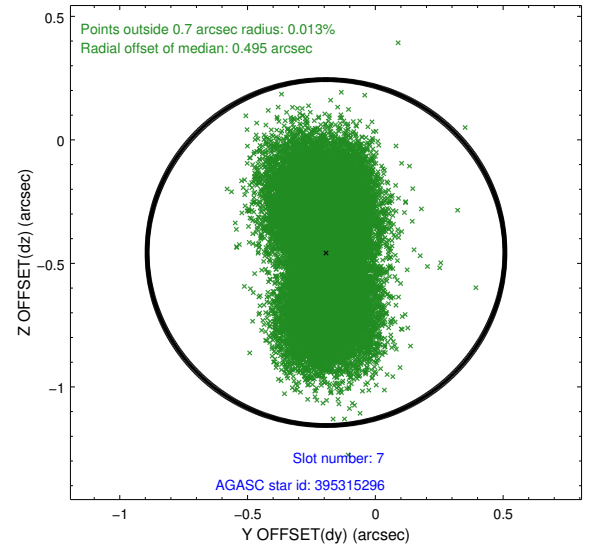
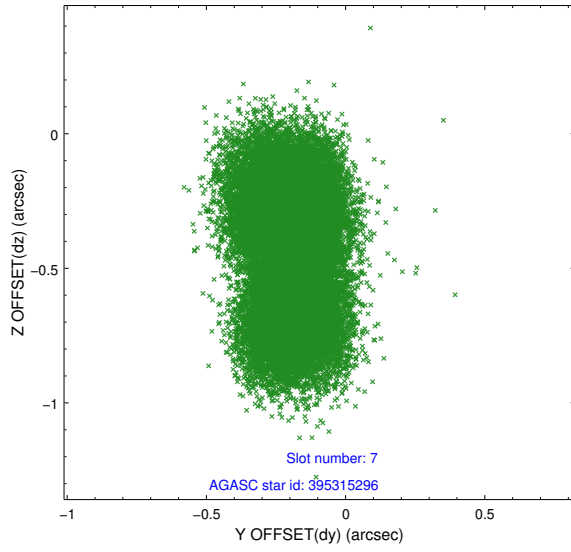
2.4.3 Slot 5



2.4.4 Slot 6

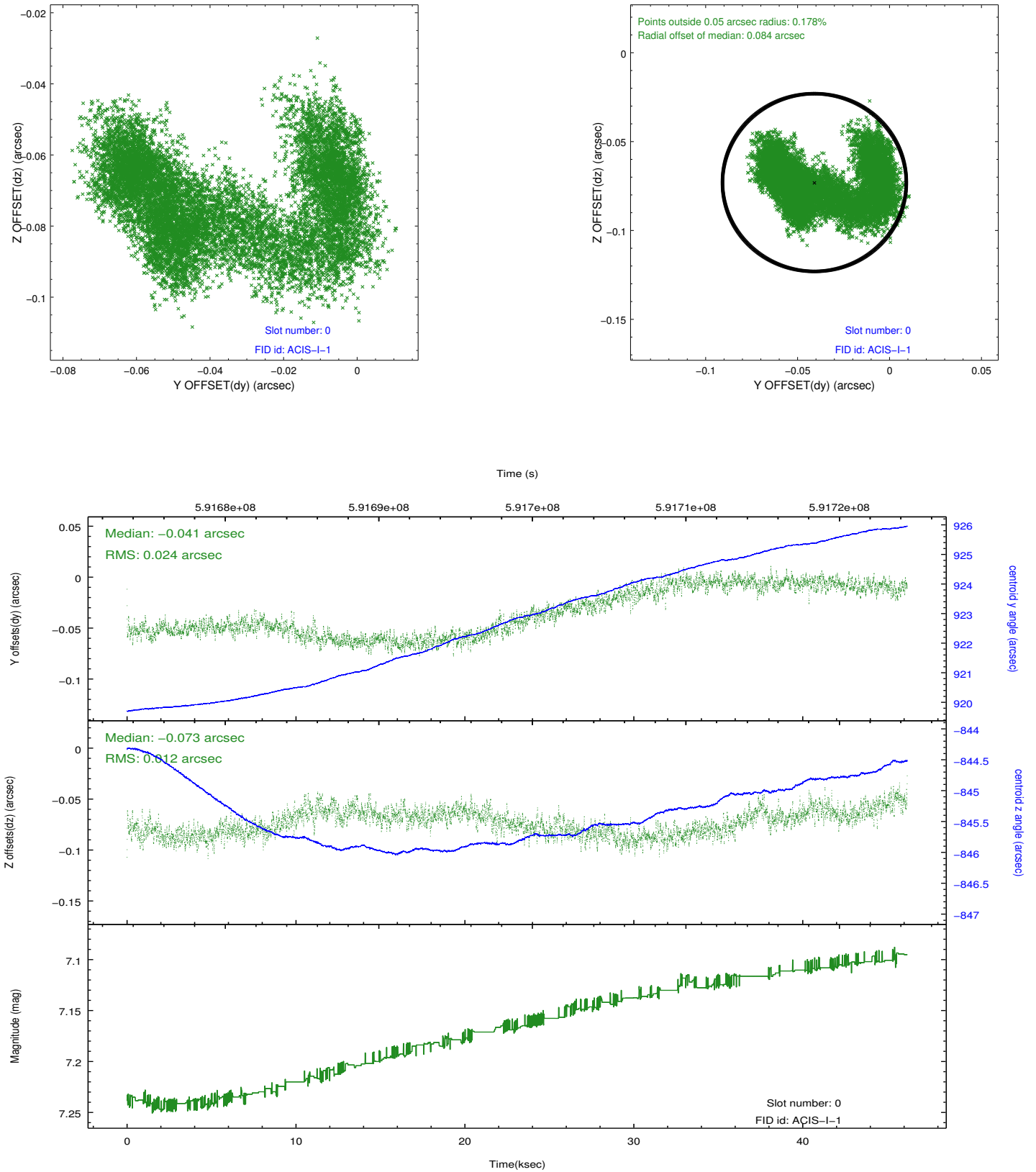


2.4.5 Slot 7

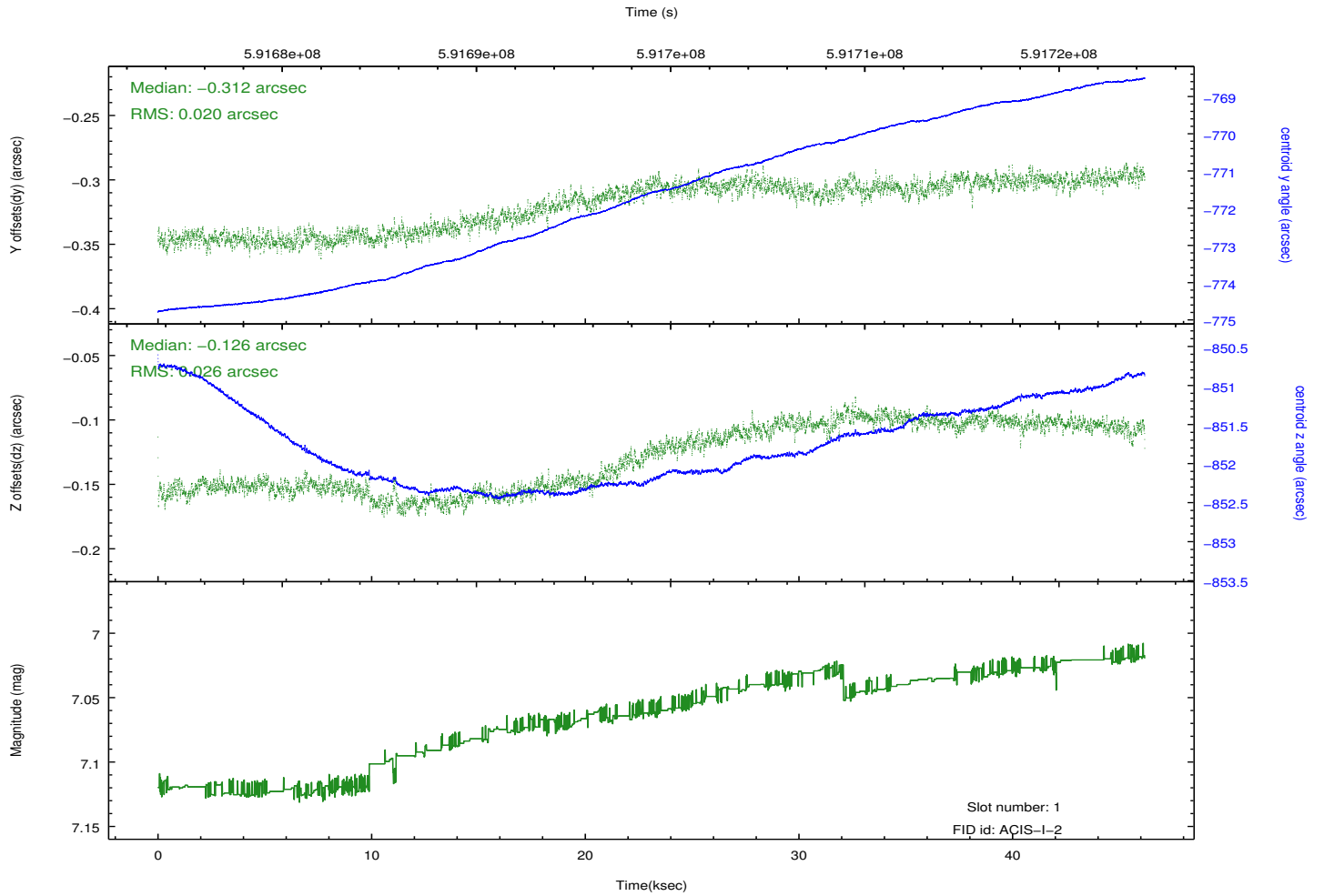
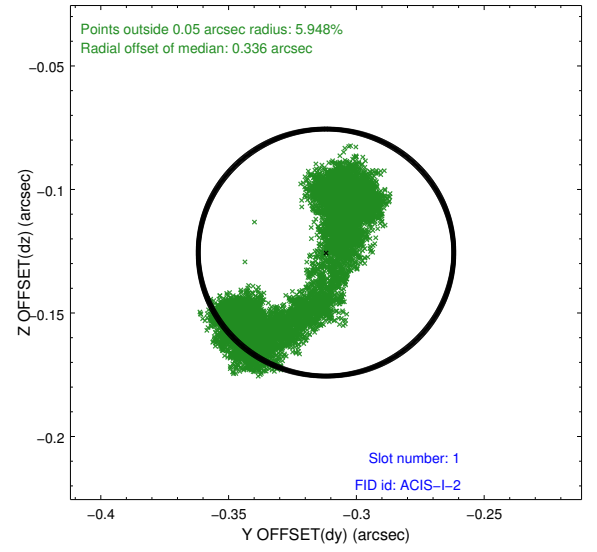
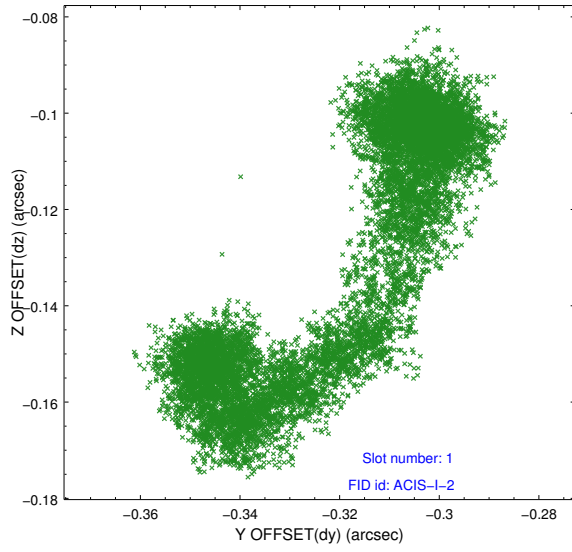


2.5 FID Slots

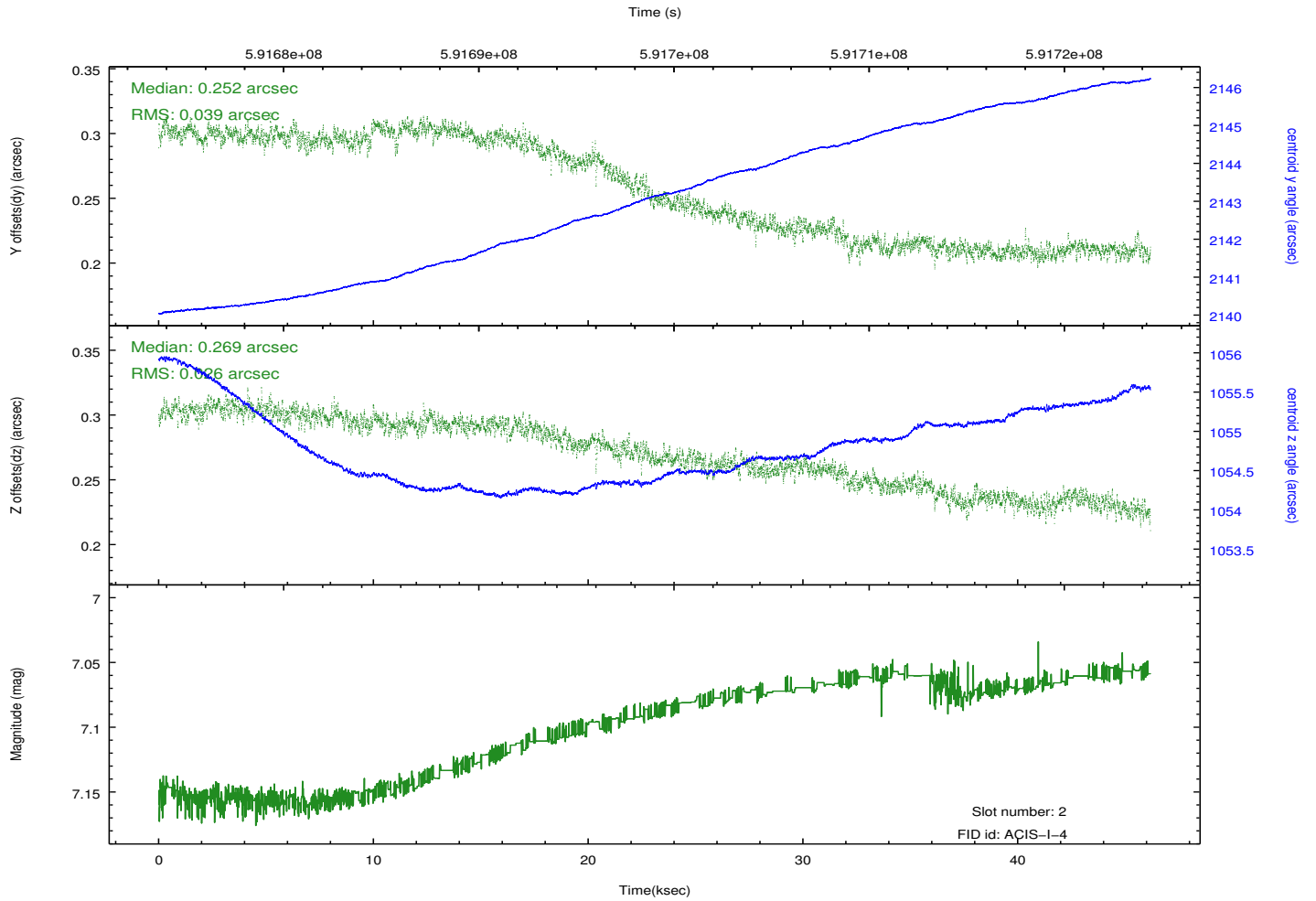
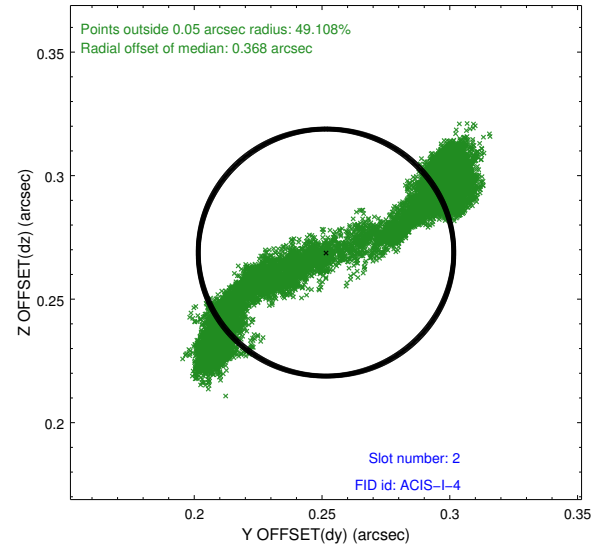
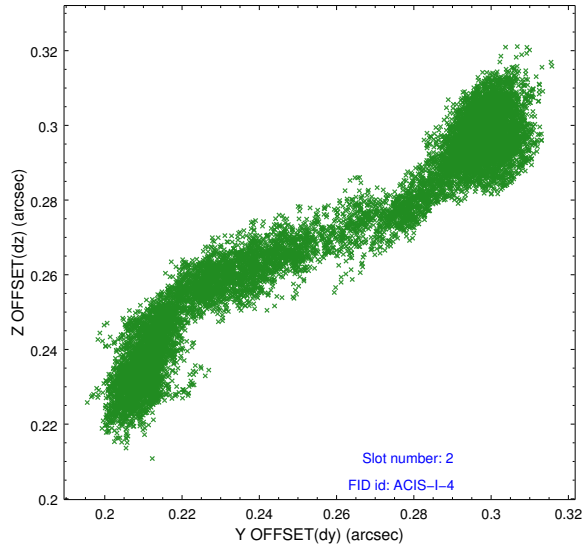
2.5.1 Slot 0



2.5.2 Slot 1



2.5.3 Slot 2



A Summary

A.1 Status

V&V Scientist	Joy Nichols
V&V Date (YYYY-MM-DD)	2016.10.03
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	46.13110035491

A.2 Comments