

V&V Reference Report

L2 ASCDS Version : 10.5

Observation 18659 - L2 Version 1
Chandra X-Ray Center

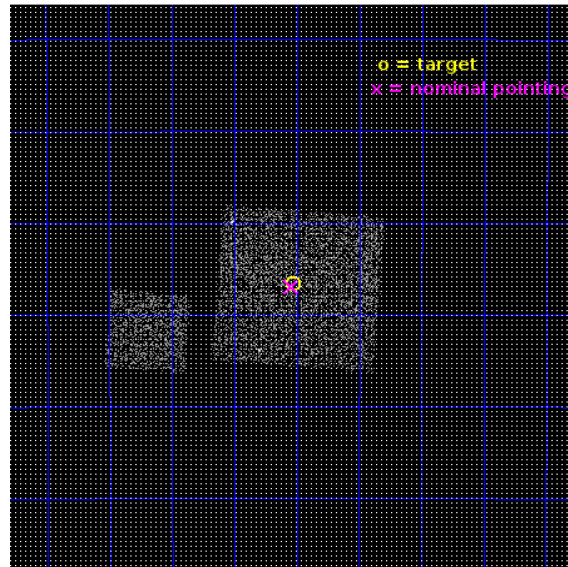
L2 Processing Date : Jul 31 2016

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

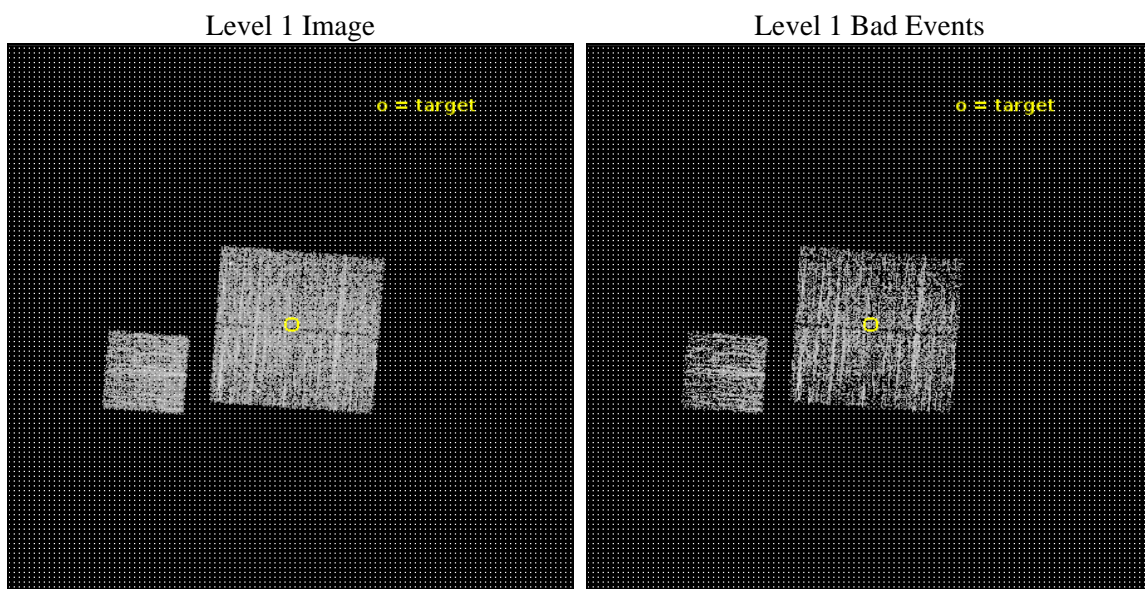
seq_num	300383	Sequence number
obs_id	18659	Observation id
title	X-raying the Galactic center/bulge interface	Proposal title
observer	Q. Daniel Wang	Principal investigator
object	GC-GB interface	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	264.75714	Observer's specified target RA [deg]
dec_targ	-29.27662	Observer's specified target Dec [deg]
ra_nom	264.76068983435	Nominal RA [deg]
dec_nom	-29.282411495404	Nominal Dec [deg]
roll_nom	274.50646179575	Nominal Roll [deg]
revision	1	Processing version of data
ontime	1955.6805362701	Sum of GTIs [s]
livetime	1930.1281303127	Livetime [s]
ontime0	1955.5574163198	Sum of GTIs [s]
ontime1	1955.5984562635	Sum of GTIs [s]
ontime2	1955.6394963264	Sum of GTIs [s]
ontime3	1955.6805362701	Sum of GTIs [s]
ontime6	1955.5163762569	Sum of GTIs [s]
l2events	7150	Number of level 2 events



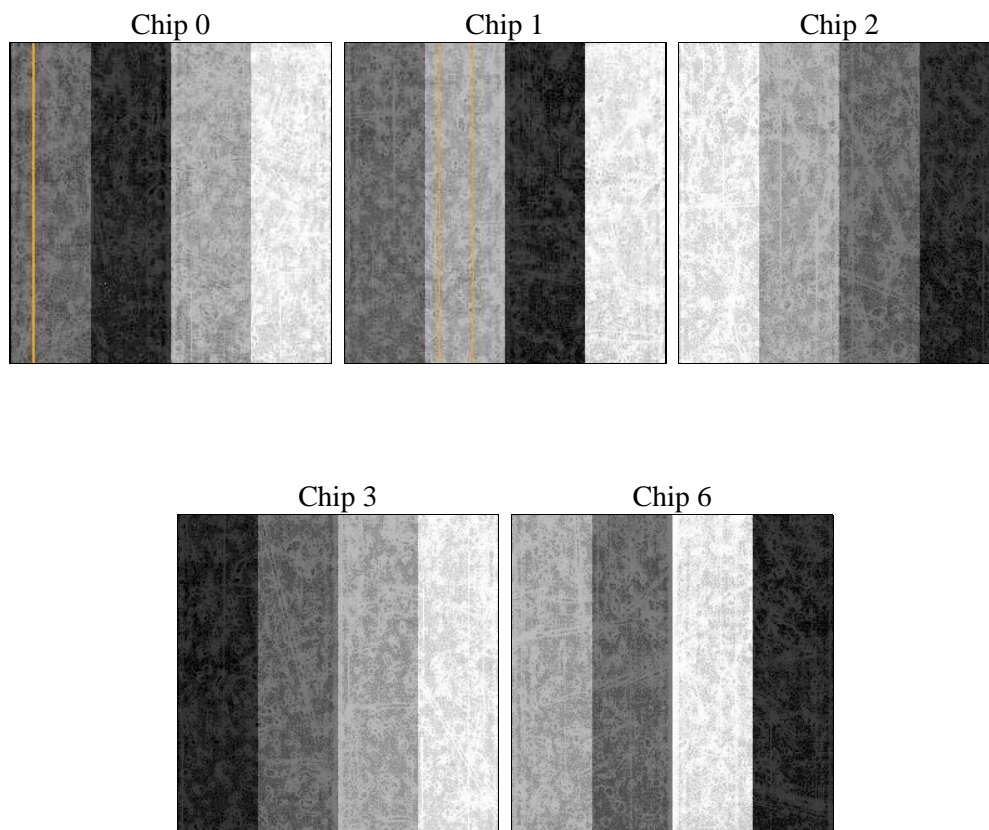
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	2180.000000	[s] Scheduled observation exposure time
ascdsver	10.5	Processing system revision	ontime	1955.6805362701	Sum of GTIs [s]
caldsver	4.7.2	 	ontime0	1955.5574163198	Sum of GTIs [s]
date	2016-07-31T17:53:06	Date and time of file creation	ontime1	1955.5984562635	Sum of GTIs [s]
revision	1	Processing version of data	ontime2	1955.6394963264	Sum of GTIs [s]
			ontime3	1955.6805362701	Sum of GTIs [s]
			ontime6	1955.5163762569	Sum of GTIs [s]
			l1events	64344	Number of level 1 events

2.1.4 Events

	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6
level 1 events	12992	11152	14358	12642	13200
rejected events	11403	9327	12592	10908	11685
rejected %	87%	83%	87%	86%	88%

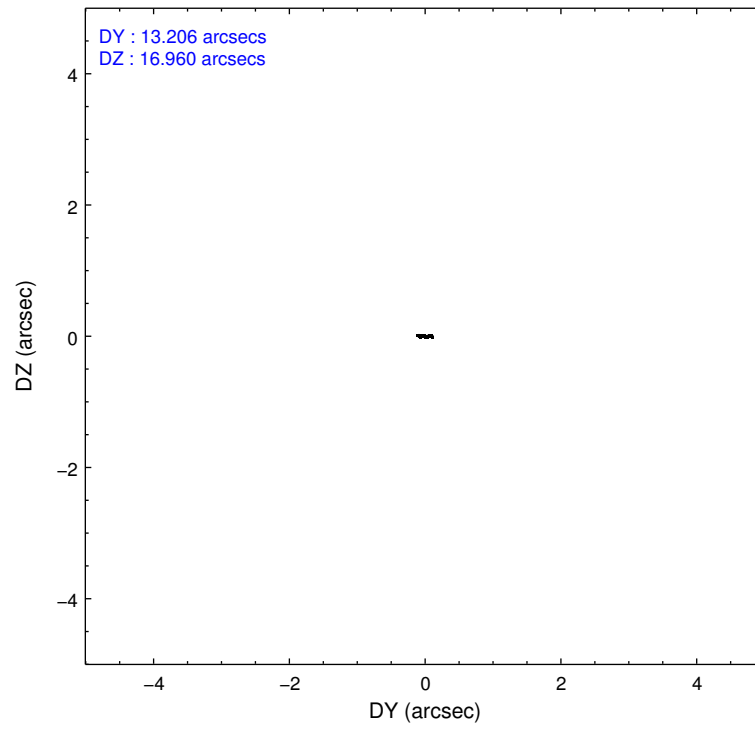
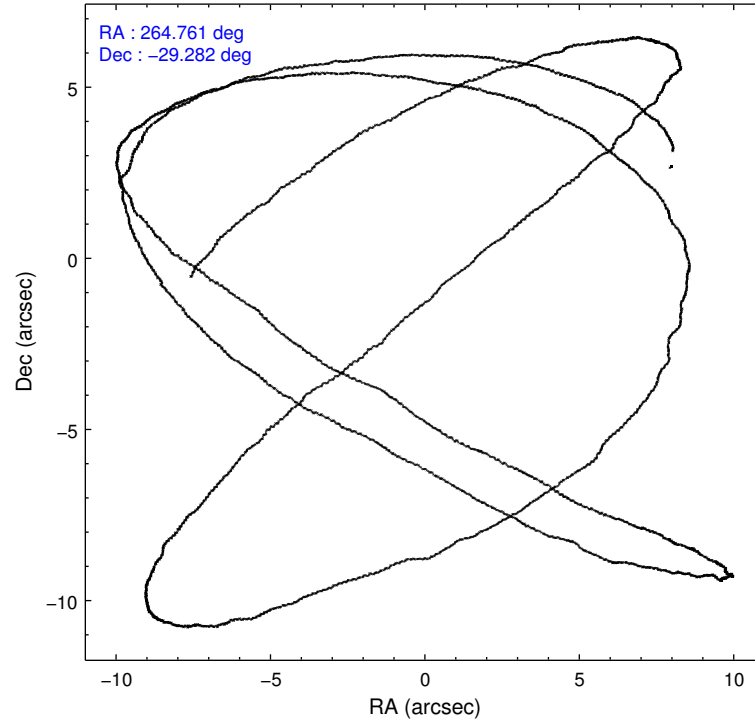
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6
grade 0 events	628	789	746	764	568
	4%	7%	5%	6%	4%
grade 1 events	9	6	8	2	8
	0%	0%	0%	0%	0%
grade 2 events	375	410	409	341	347
	2%	3%	2%	2%	2%
grade 3 events	154	143	171	176	131
	1%	1%	1%	1%	0%
grade 4 events	120	142	141	157	163
	0%	1%	0%	1%	1%
grade 5 events	579	528	559	624	619
	4%	4%	3%	4%	4%
grade 6 events	314	344	301	300	307
	2%	3%	2%	2%	2%
grade 7 events	10813	8790	12023	10278	11057
	83%	78%	83%	81%	83%

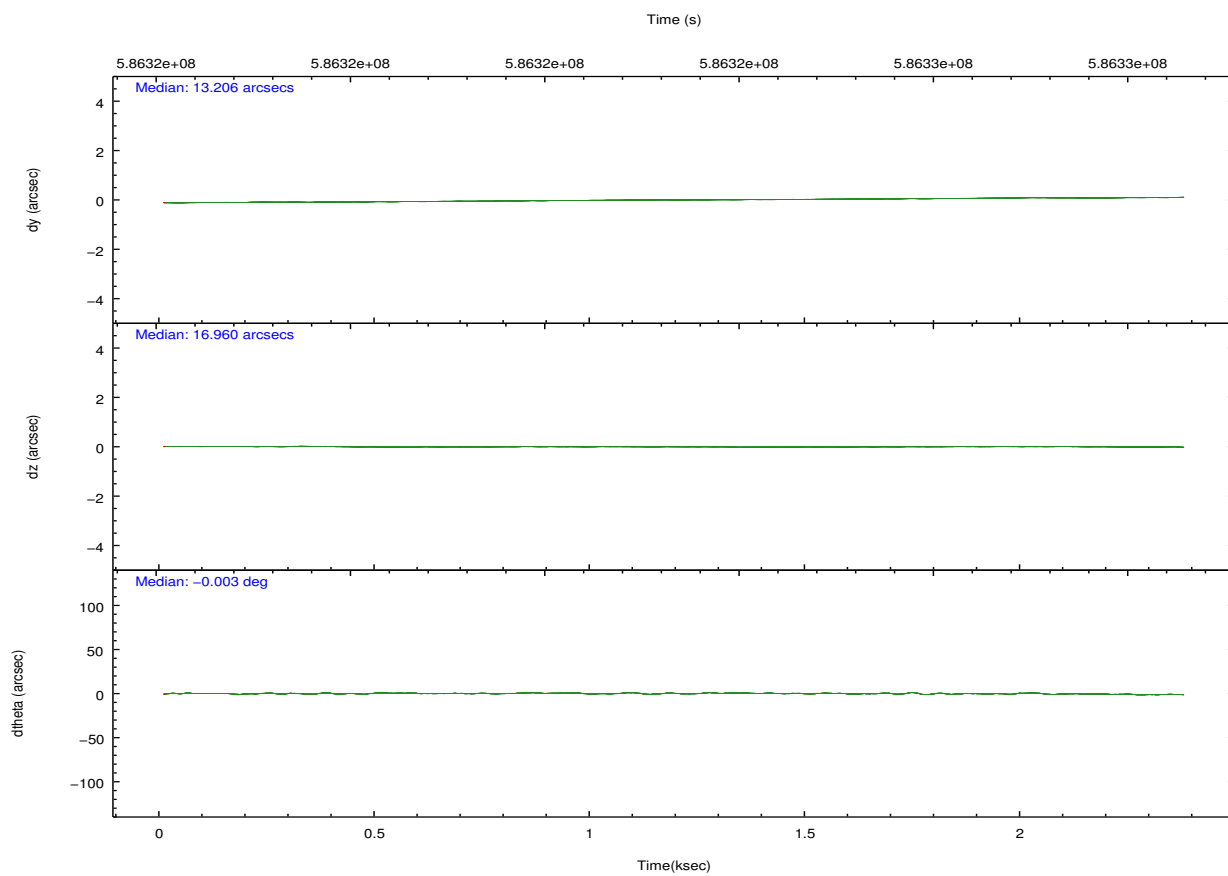
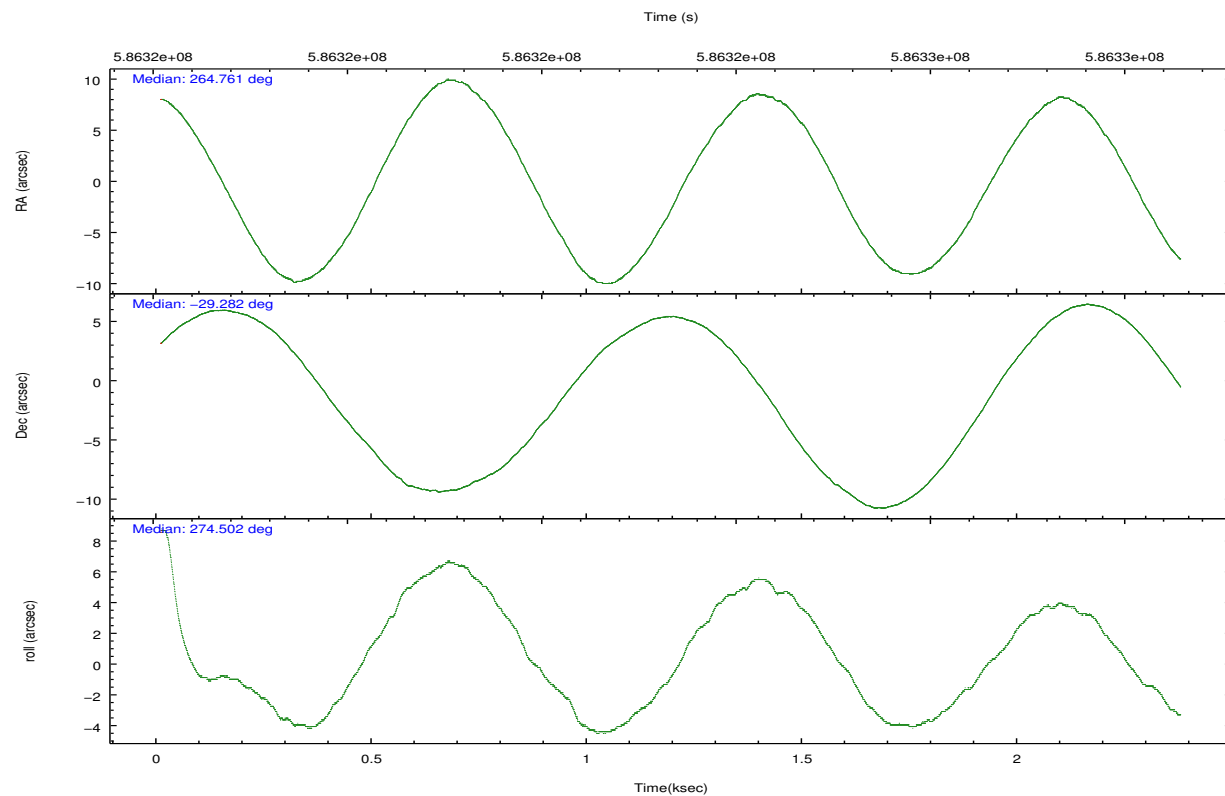
2.2 Compared Parameters

Parameter	Planned	Actual
Instrument	ACIS	ACIS
Detector	ACIS-01236	ACIS-01236
Grating	NONE	NONE
Data mode	VFAINT	VFAINT
Observation mode	POINTING	POINTING
[deg] Pointing RA	264.742588	264.7606898343483
[deg] Pointing Dec	-29.260009	-29.28241149540438
[deg] Pointing Roll	274.288871	274.5064617957525
[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)	586323850.184000	586323473.5972199
Observation start date	2016-07-31T03:43:02	2016-07-31T03:37:53
[s] Observation end time (MET)	586326030.184000	586326163.70987
Observation end date	2016-07-31T04:19:22	2016-07-31T04:22:43
Read mode	TIMED	TIMED

Parameter	Planned	Actual
Obspar format version number	7	7
Obspar file type	PREDICTED	ACTUAL
Obspar update status	NONE	UPDATED
CCD I0 on	Y	Y
CCD I1 on	Y	Y
CCD I2 on	Y	Y
CCD I3 on	Y	Y
CCD S0 on	N	N
CCD S1 on	N	N
CCD S2 on	O1	Y
CCD S3 on	N	N
CCD S4 on	N	N
CCD S5 on	N	N
Number of optional ACIS chips dropped	0	0
On-chip summing requested	N	N
Subarray requested	NONE	NONE
Alternating exposures requested	N	N
[s] Primary exposure time	0.000000	3.1

2.3 Aspect



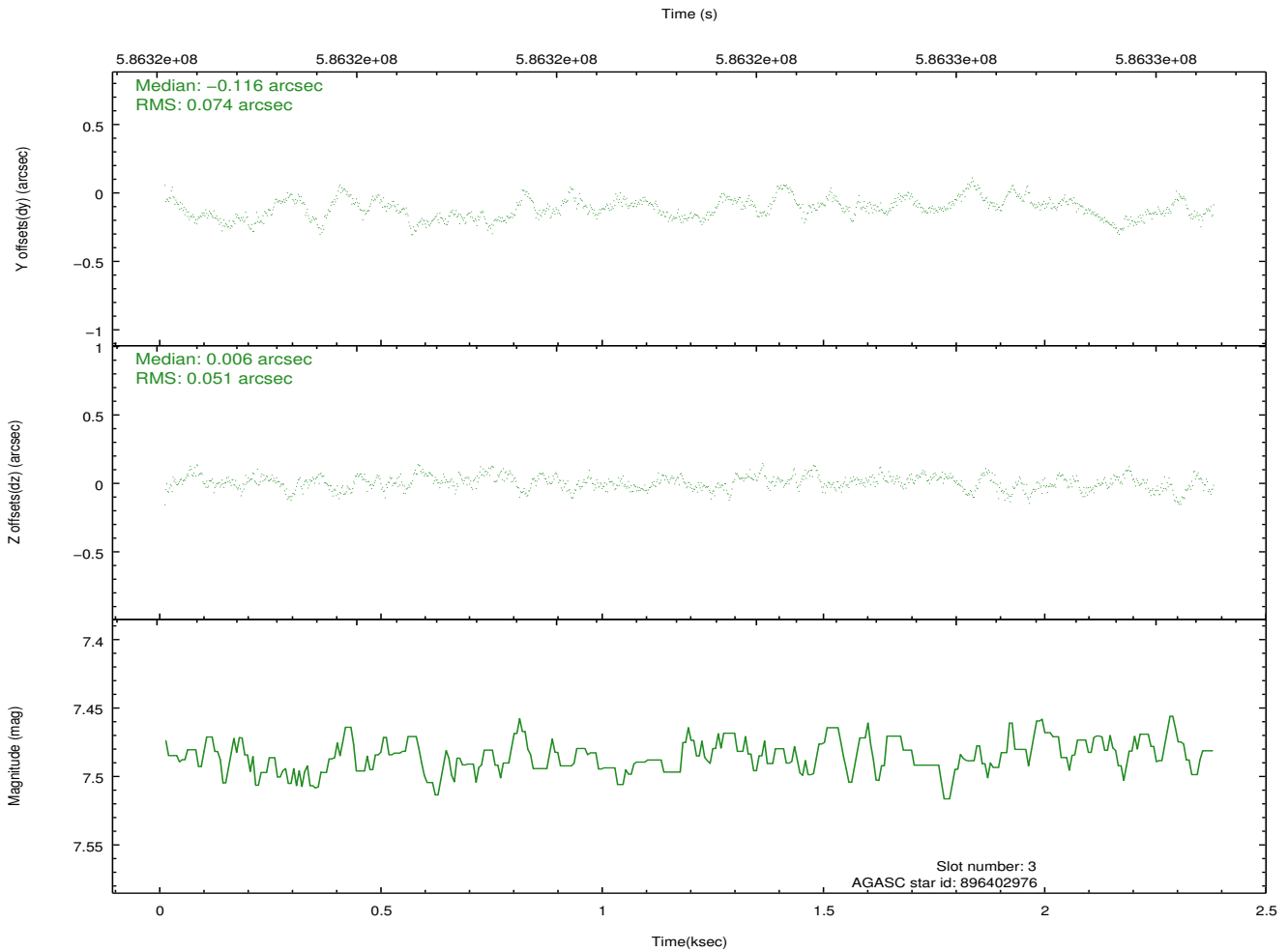
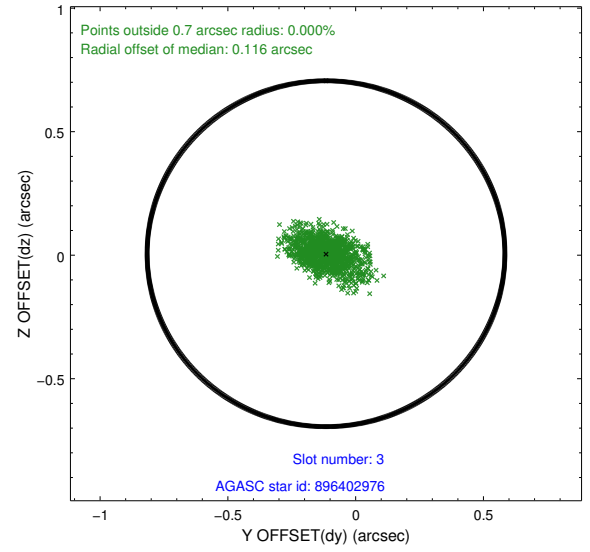
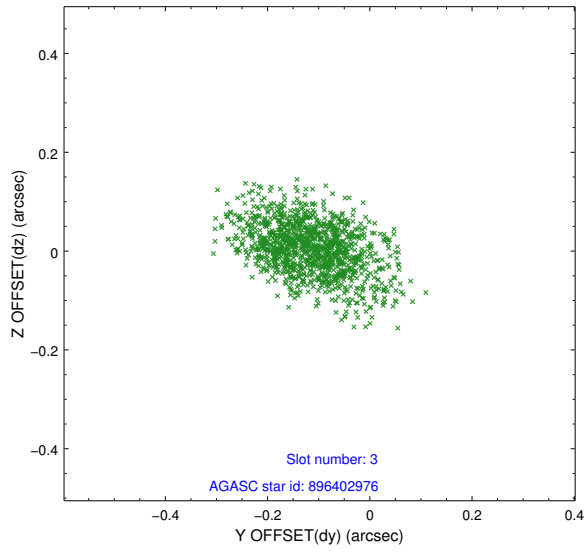


Slot Statistics

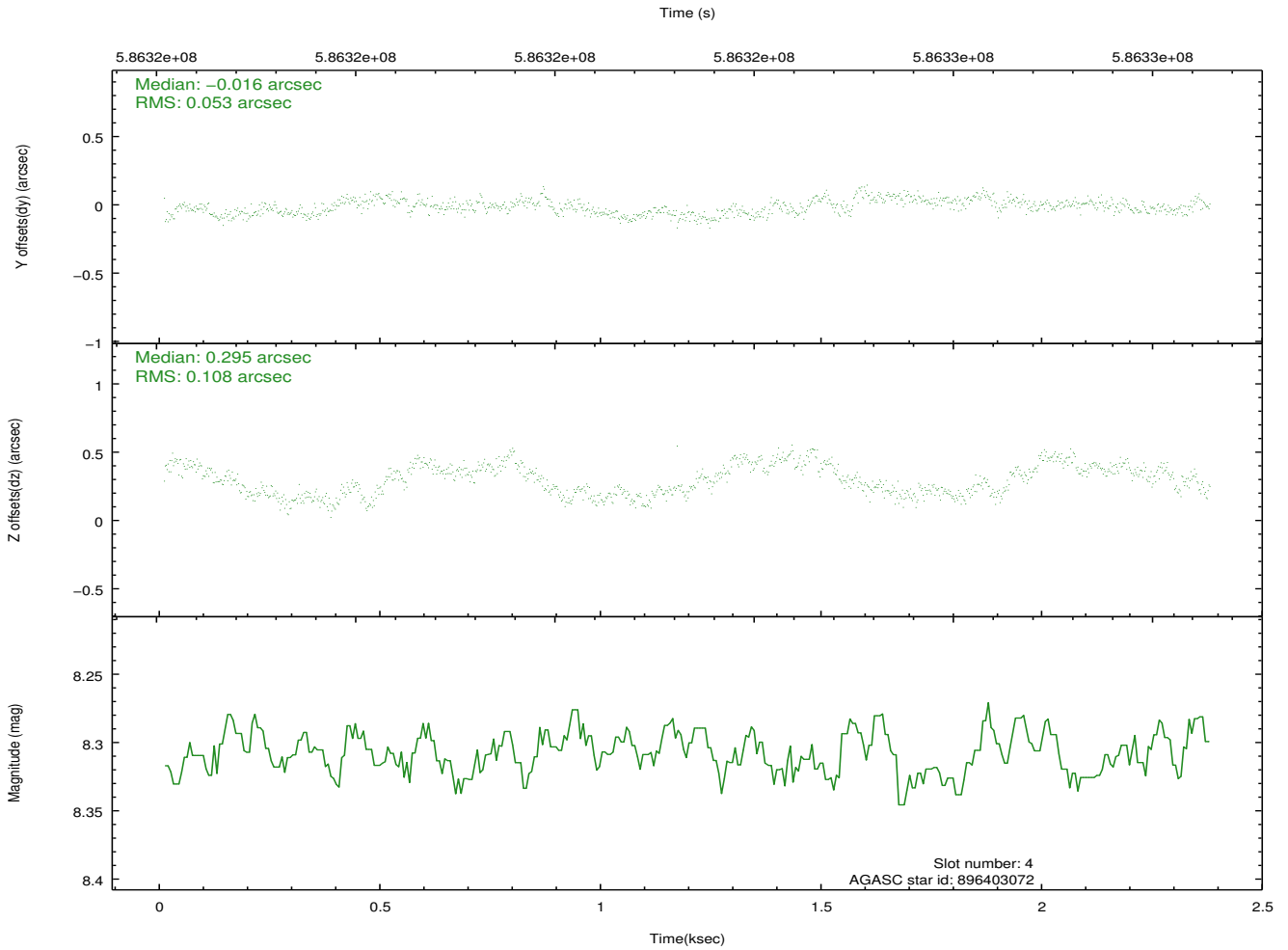
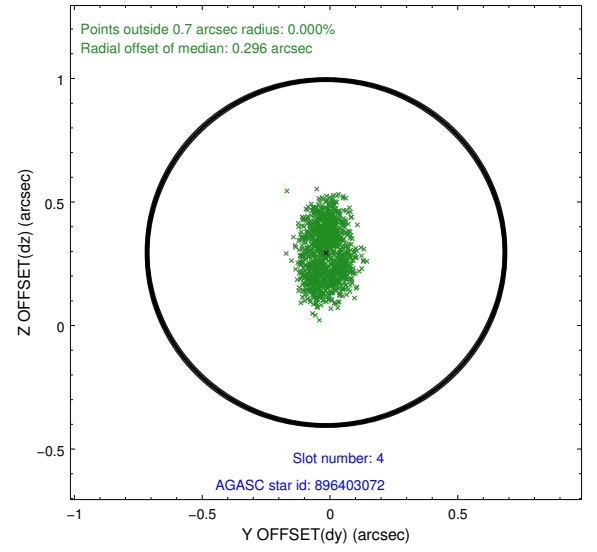
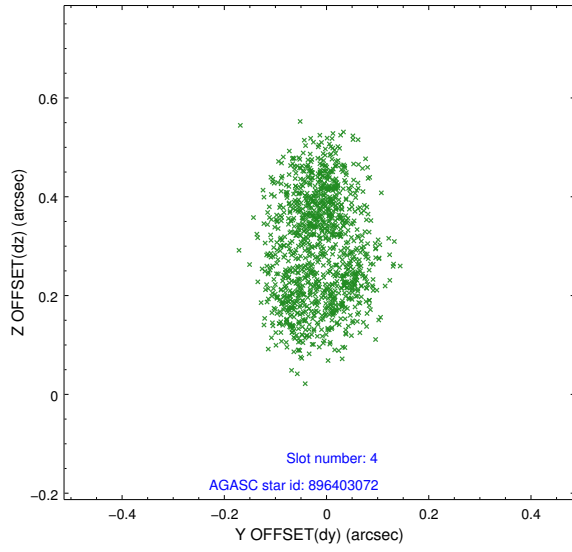
slot	status	used	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID		ACIS-I-1	7.05	579	0.065	-0.042	0.010	0.017	0.000000	0.000000	926.38	-840.64
1	FID		ACIS-I-5	7.06	579	-0.279	0.044	0.008	0.012	0.000000	0.000000	-1820.58	1055.52
2	FID		ACIS-I-6	7.05	579	0.125	0.068	0.008	0.013	0.000000	0.000000	388.97	1703.18
3	GUIDE	used	896402976	7.49	1157	-0.116	0.006	0.092	0.166	265.099474	-28.923203	-1122.10	1211.71
4	GUIDE	used	896403072	8.31	1156	-0.016	0.295	0.130	0.194	263.956439	-28.943077	-1314.19	-2383.95
5	GUIDE	used	896404376	6.64	1157	0.176	-0.356	0.098	0.148	264.835179	-29.530972	994.98	213.74
6	GUIDE	used	896405480	8.22	1155	-0.243	0.148	0.100	0.156	265.220460	-29.599691	1336.30	1400.24
7	GUIDE	used	896406904	8.98	1155	0.203	-0.080	0.130	0.207	264.311862	-29.742267	1635.96	-1471.58

2.4 Star Slots

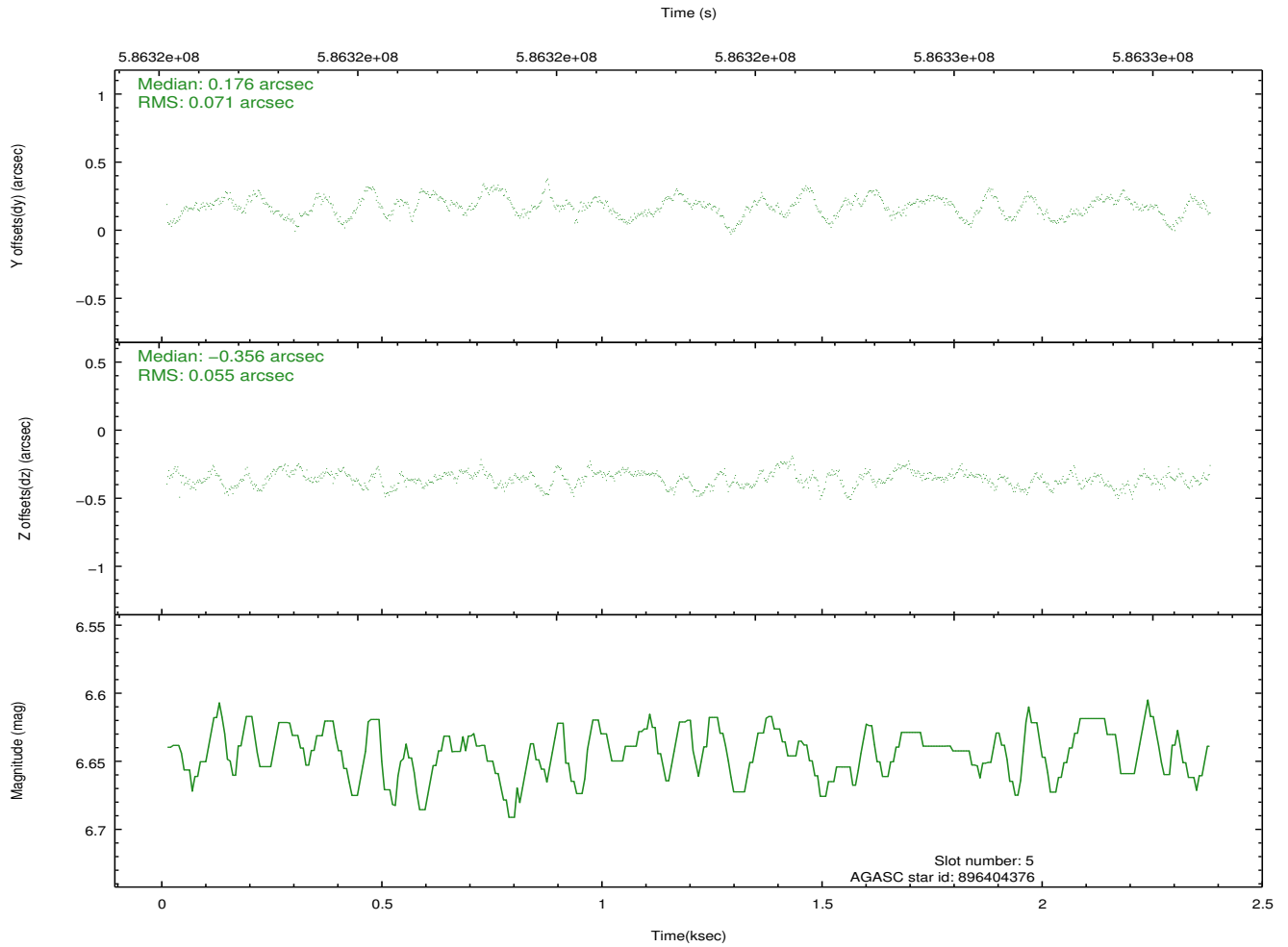
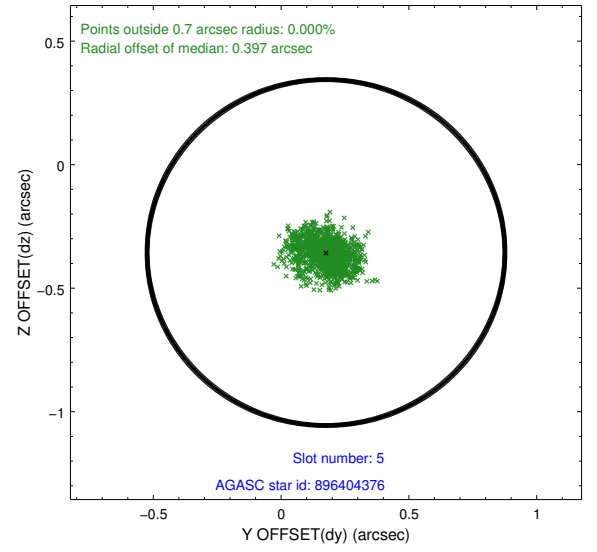
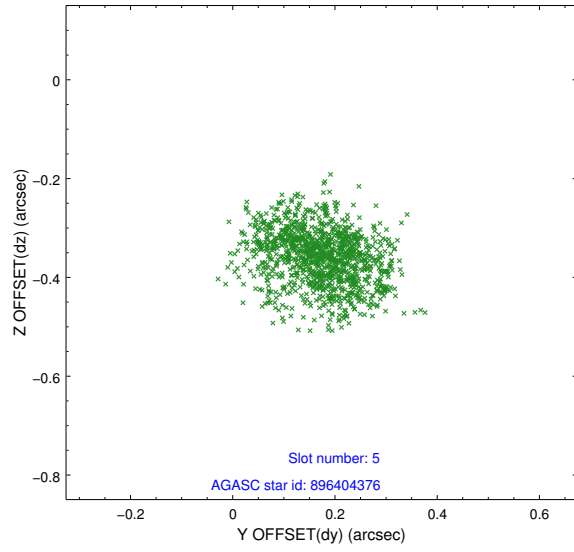
2.4.1 Slot 3



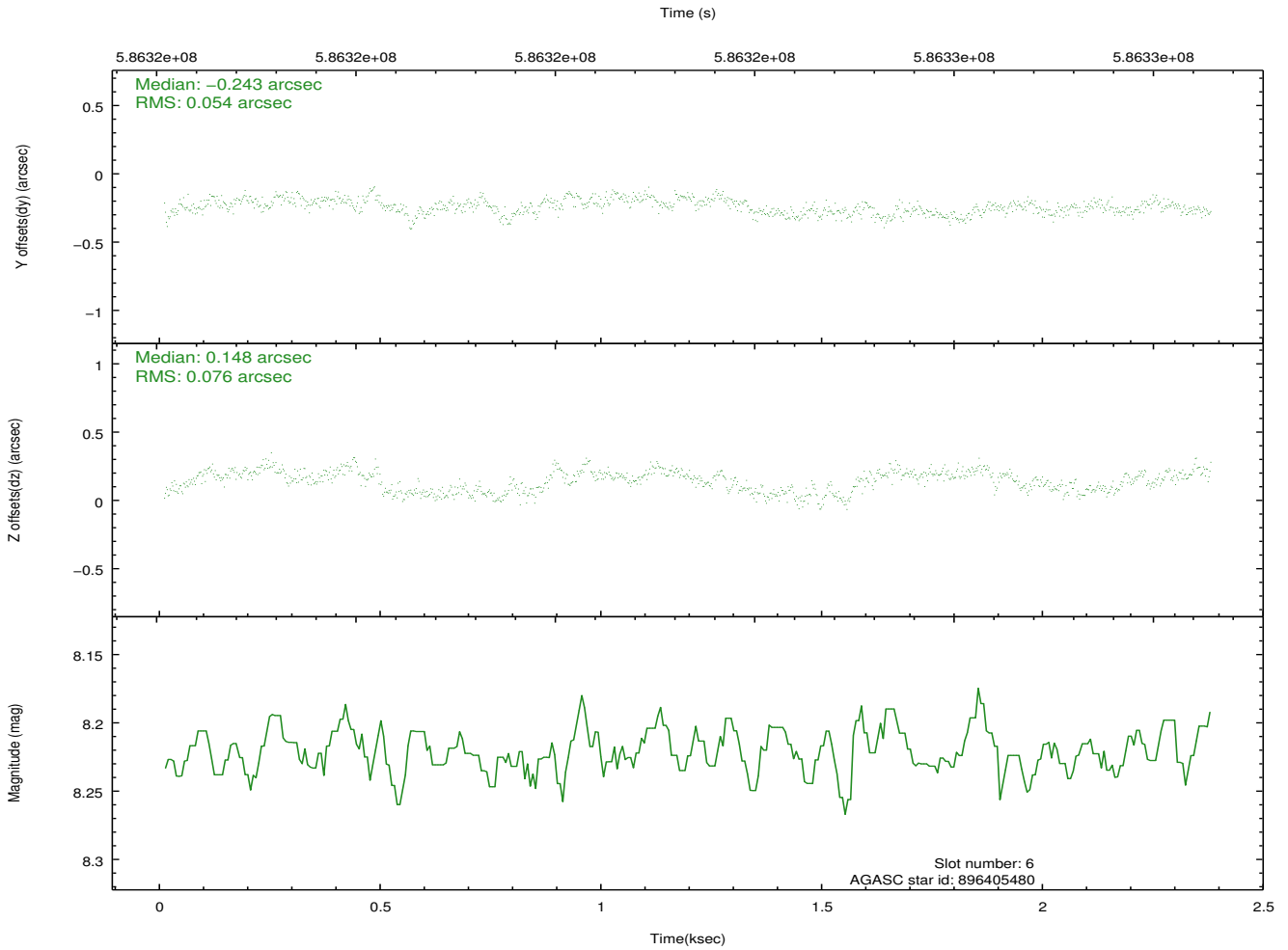
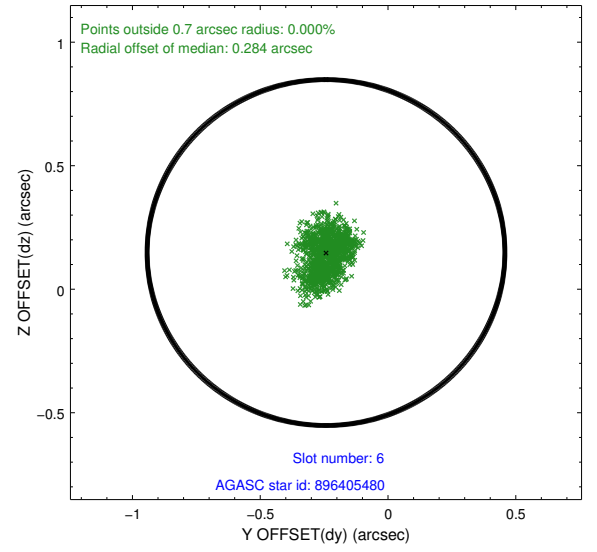
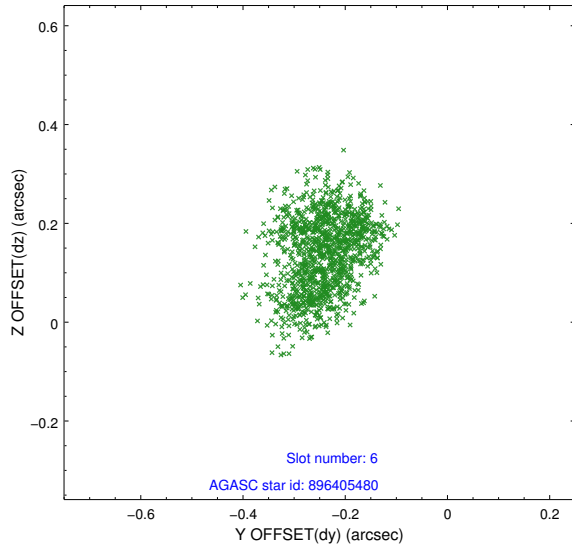
2.4.2 Slot 4



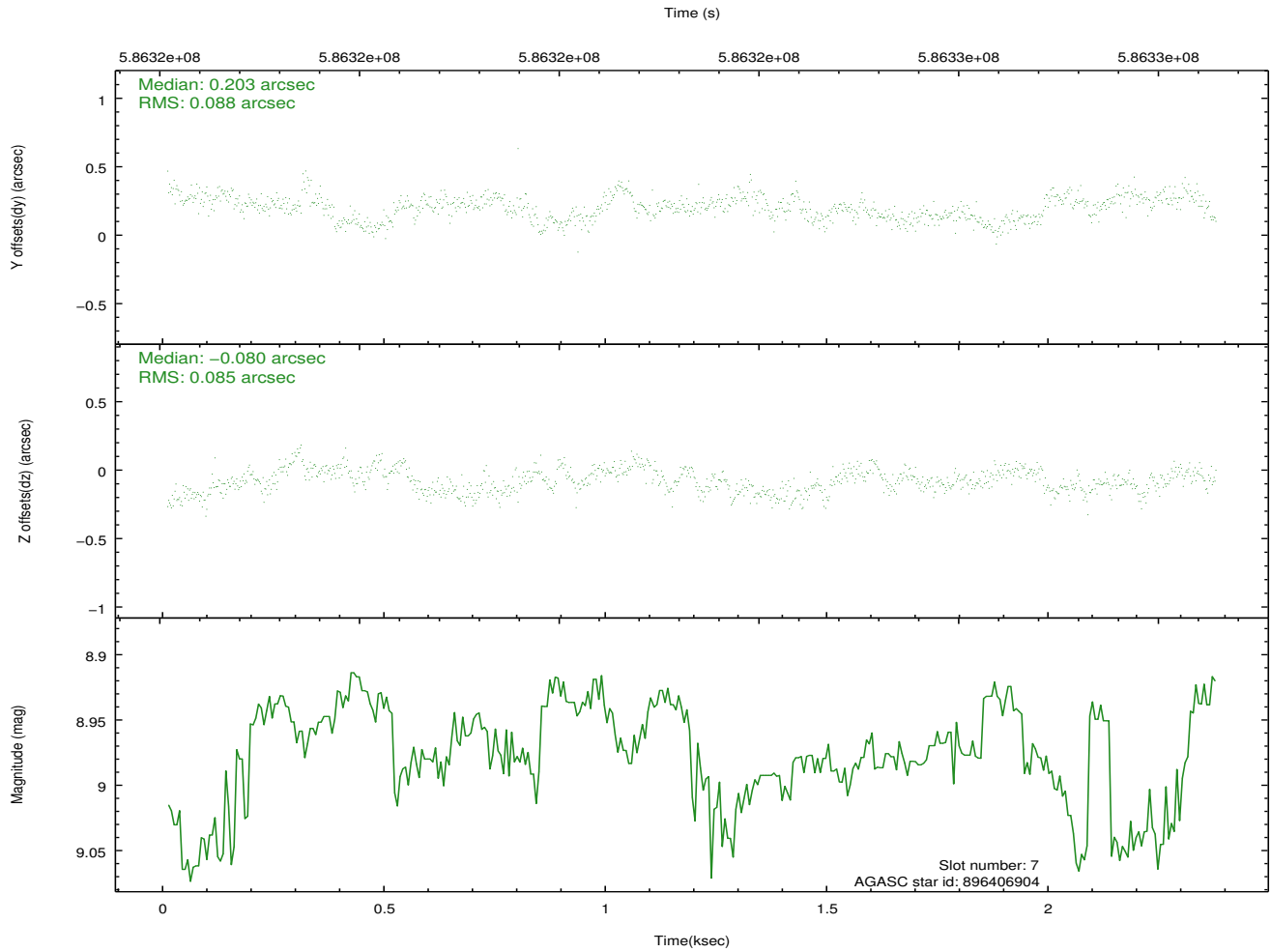
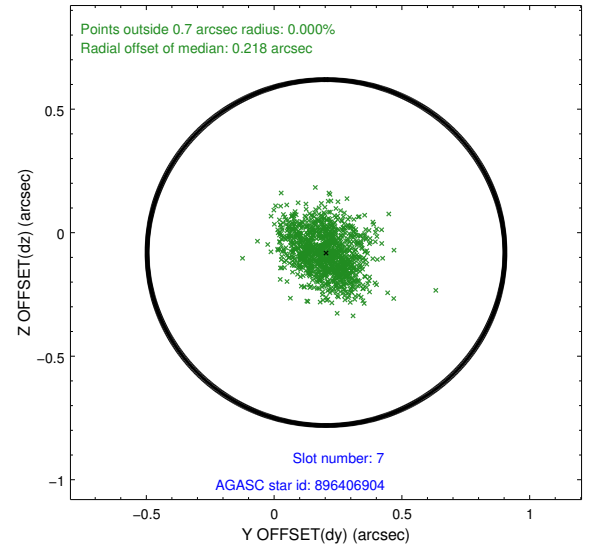
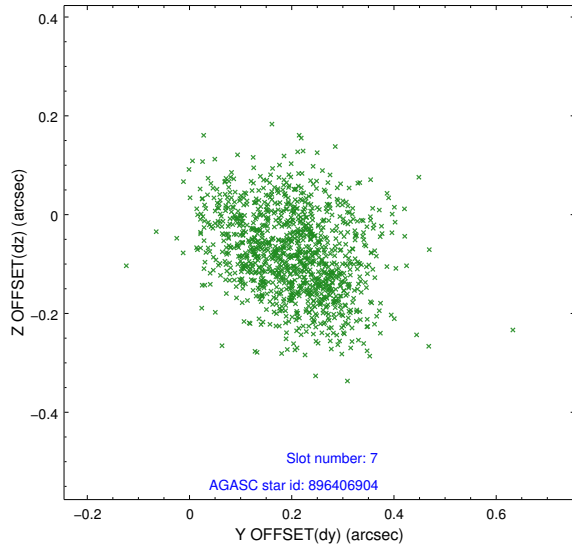
2.4.3 Slot 5



2.4.4 Slot 6

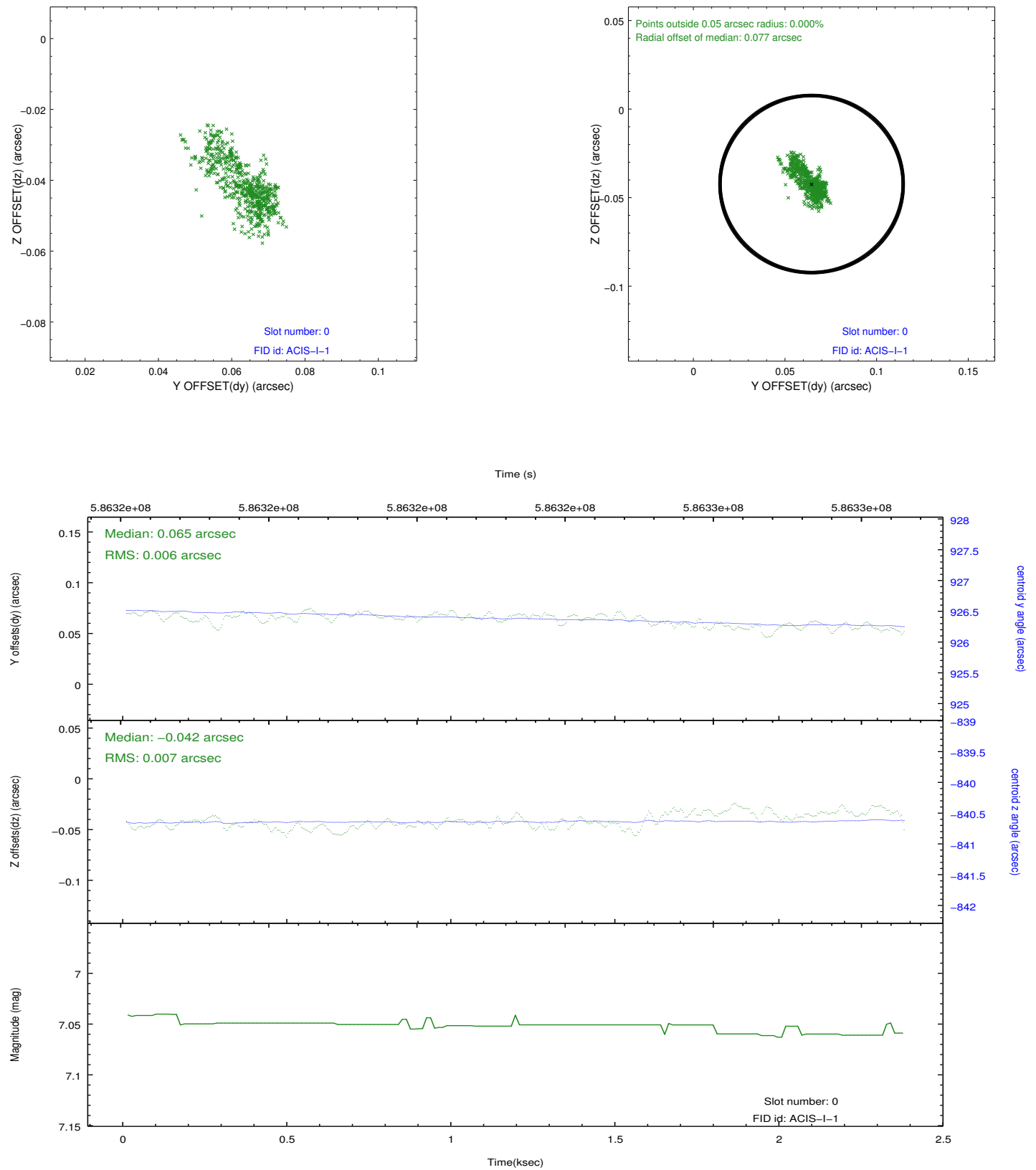


2.4.5 Slot 7

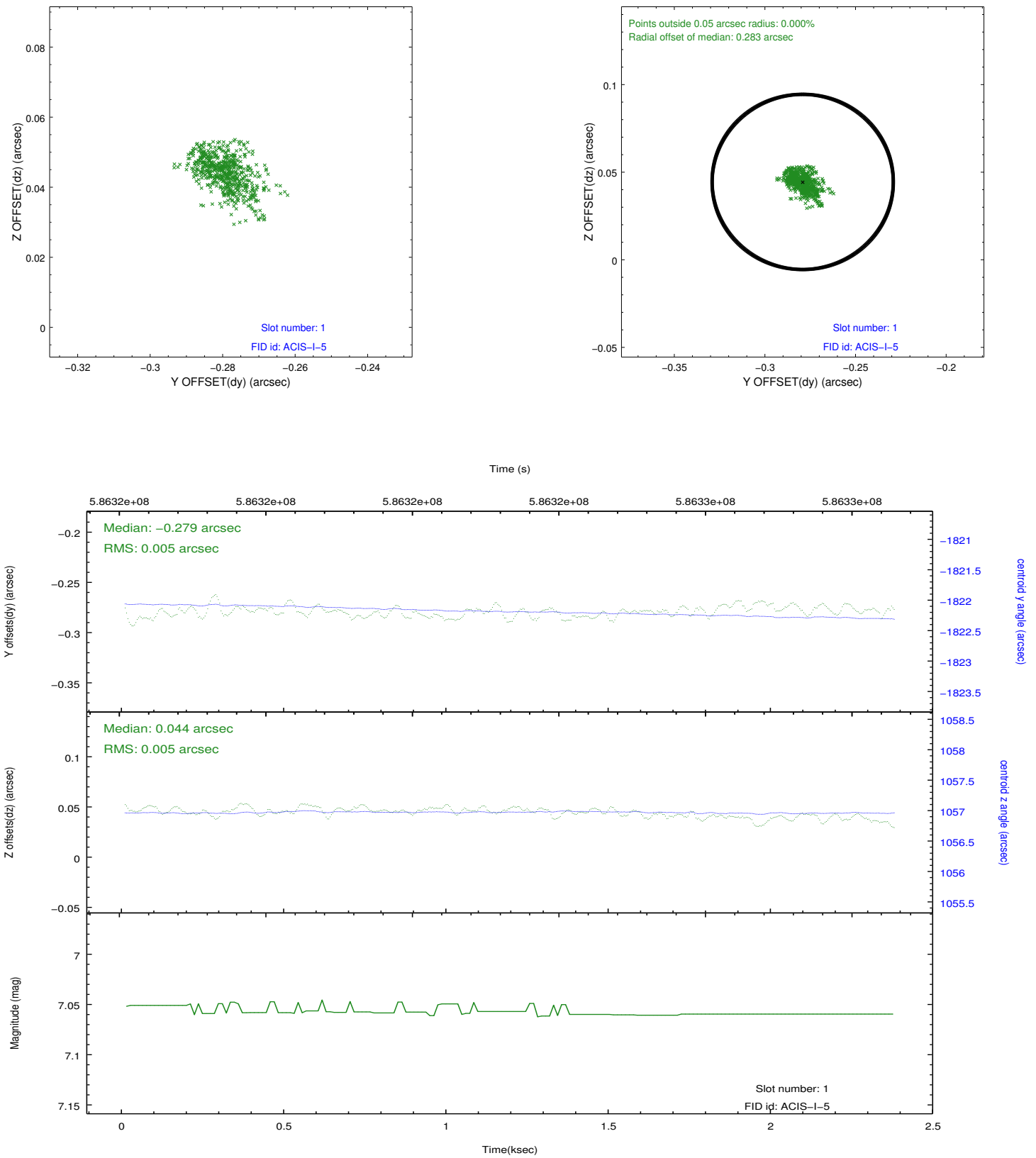


2.5 FID Slots

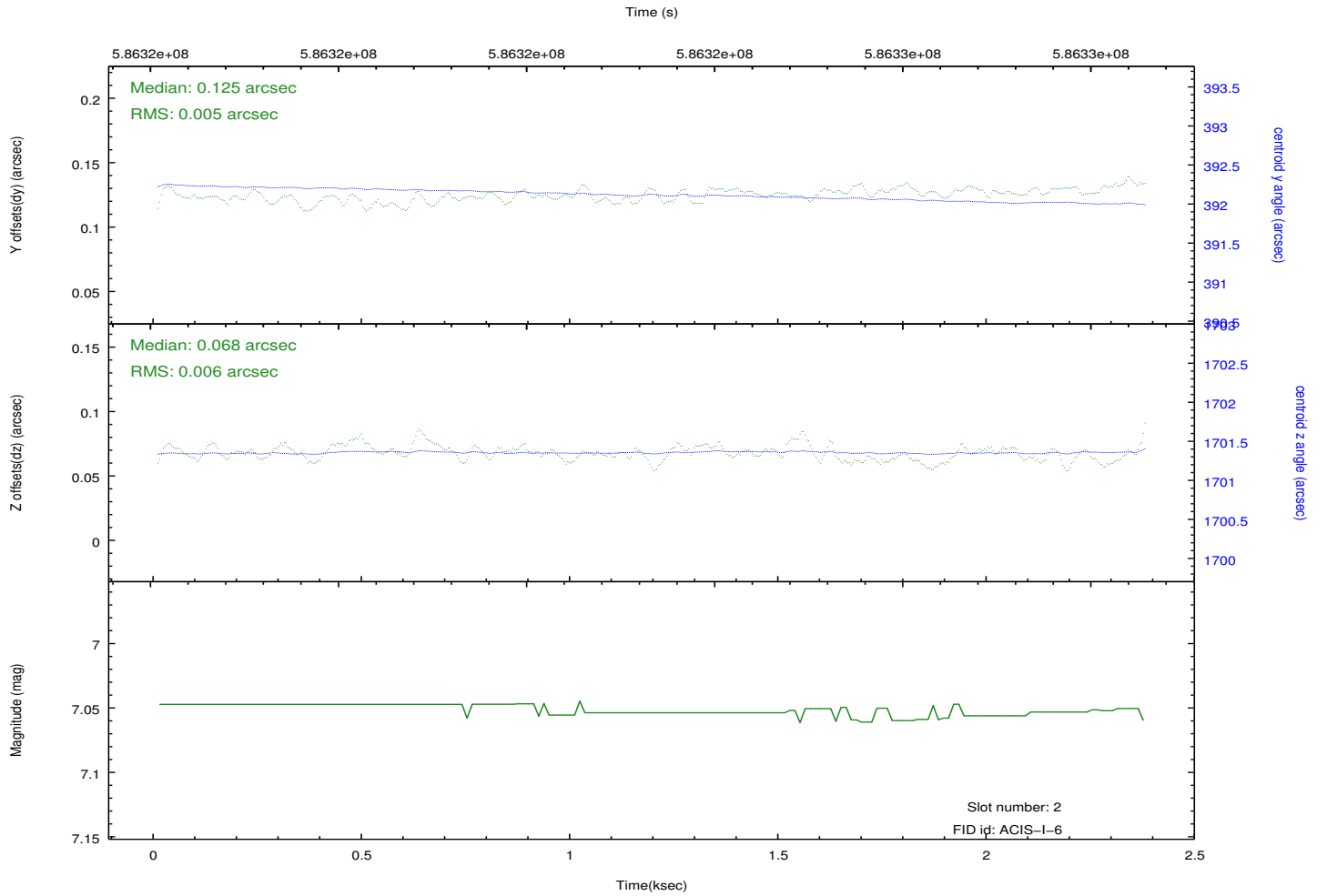
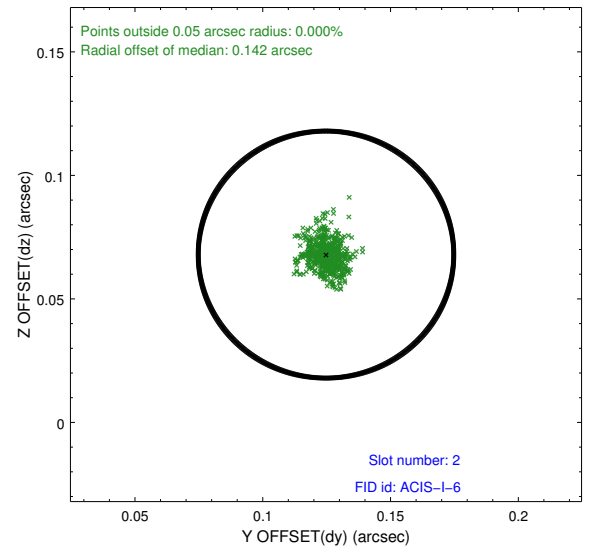
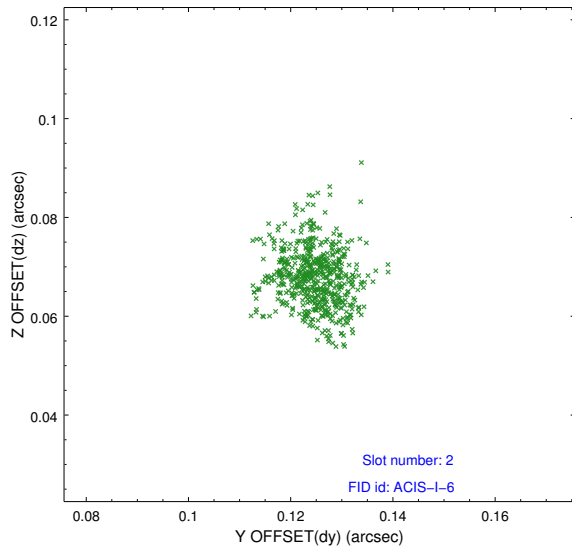
2.5.1 Slot 0



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)	2016.08.01
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	1.9556805362701

A.2 Comments