

V&V Reference Report

L2 ASCDS Version : 10.9.1

Observation 5907 - L2 Version 4
Chandra X-Ray Center

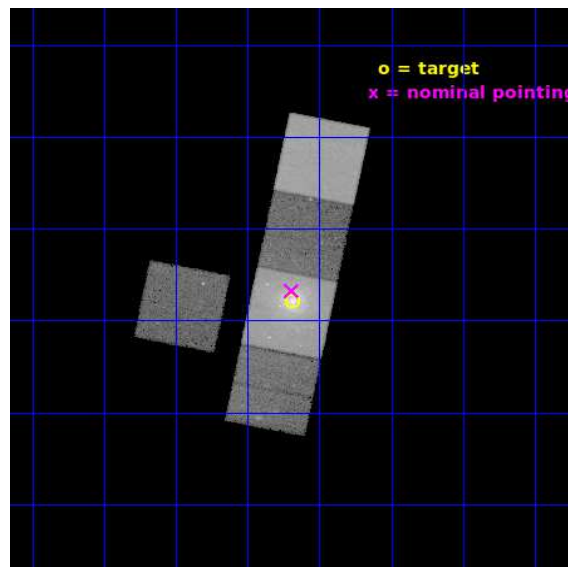
L2 Processing Date : Oct 7 2020

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

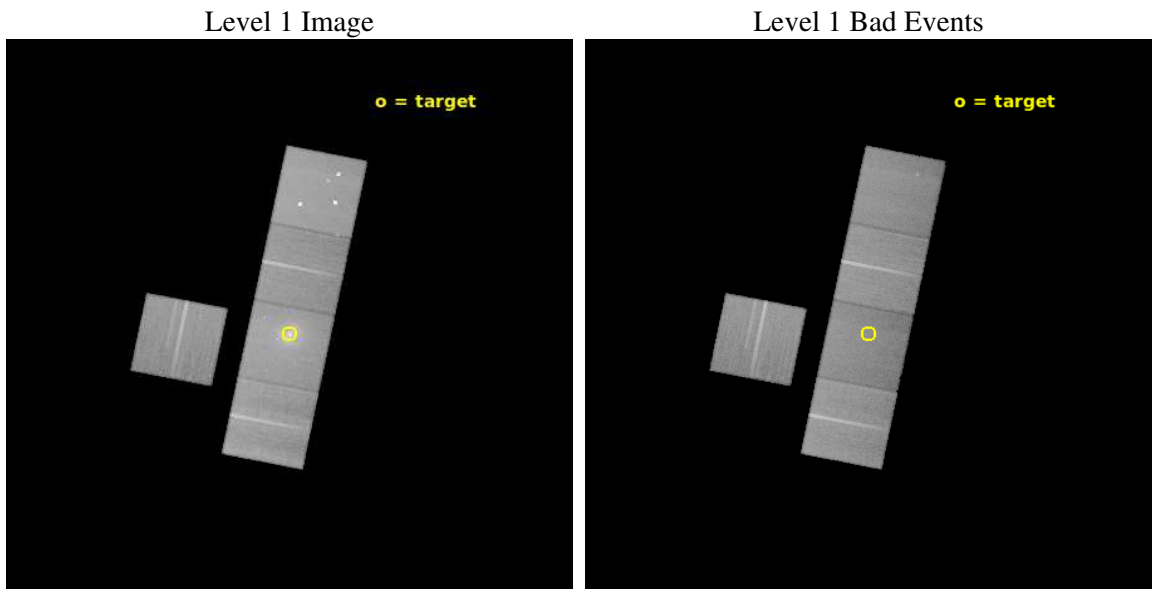
seq_num	600426	Sequence number
obs_id	5907	Observation id
title	Stellar Mass Loss Versus External Accretion in the X-ray Bright Elliptical NGC 5813	Proposal title
observer	Craig Sarazin	Principal investigator
object	NGC5813	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	225.297083	Observer's specified target RA [deg]
dec_targ	1.701972	Observer's specified target Dec [deg]
ra_nom	225.29799678211	Nominal RA [deg]
dec_nom	1.7209432330492	Nominal Dec [deg]
roll_nom	101.42712099329	Nominal Roll [deg]
revision	4	Processing version of data
ontime	49038.899905682	Sum of GTIs [s]
livetime	48398.170576501	Livetime [s]
ontime3	49038.899905682	Sum of GTIs [s]
ontime5	49038.899905682	Sum of GTIs [s]
ontime6	49029.476954907	Sum of GTIs [s]
ontime7	49038.899905682	Sum of GTIs [s]
ontime8	49026.335905015	Sum of GTIs [s]
l2events	543249	Number of level 2 events



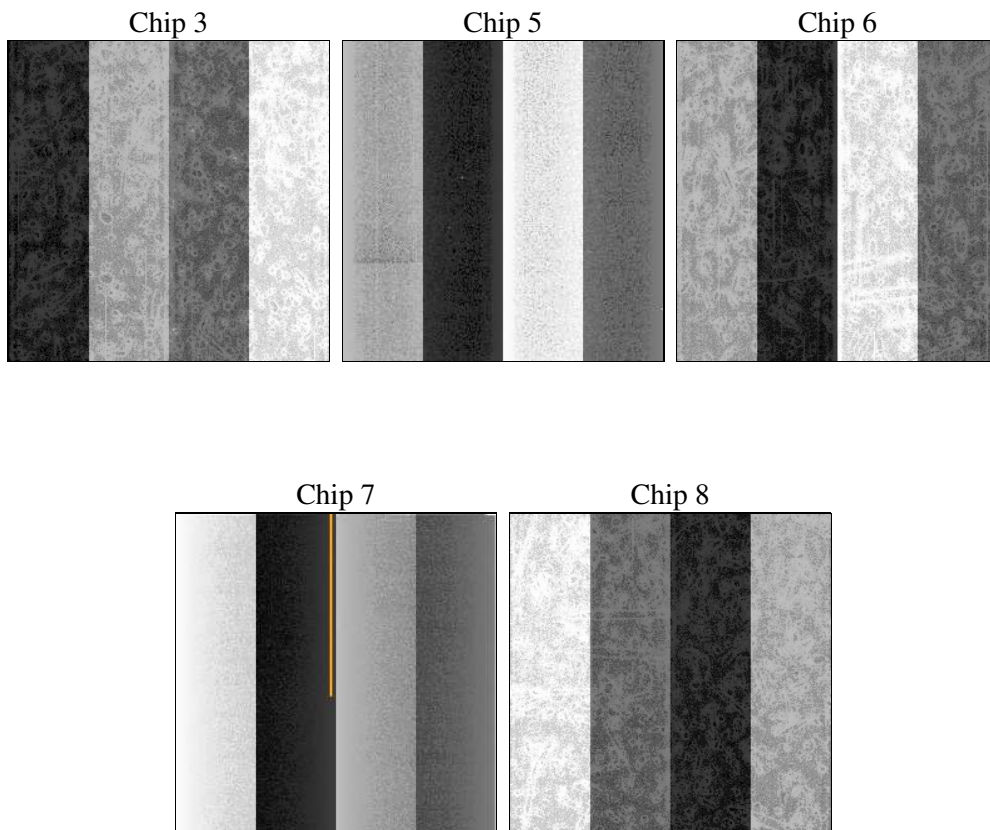
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	49000.000000	[s] Scheduled observation exposure time
ascdsver	10.9.1	Processing system revision	ontime	49038.899905682	Sum of GTIs [s]
caldbver	4.9.2	 	ontime3	49038.899905682	Sum of GTIs [s]
date	2020-10-07T16:29:14	Date and time of file creation	ontime5	49038.899905682	Sum of GTIs [s]
revision	4	Processing version of data	ontime6	49029.476954907	Sum of GTIs [s]
			ontime7	49038.899905682	Sum of GTIs [s]
			ontime8	49026.335905015	Sum of GTIs [s]
			l1events	1901735	Number of level 1 events

2.1.4 Events

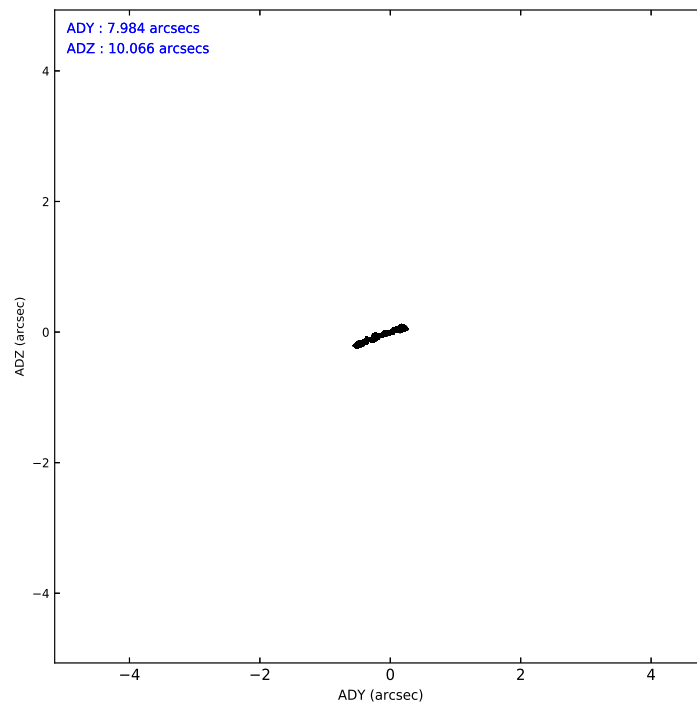
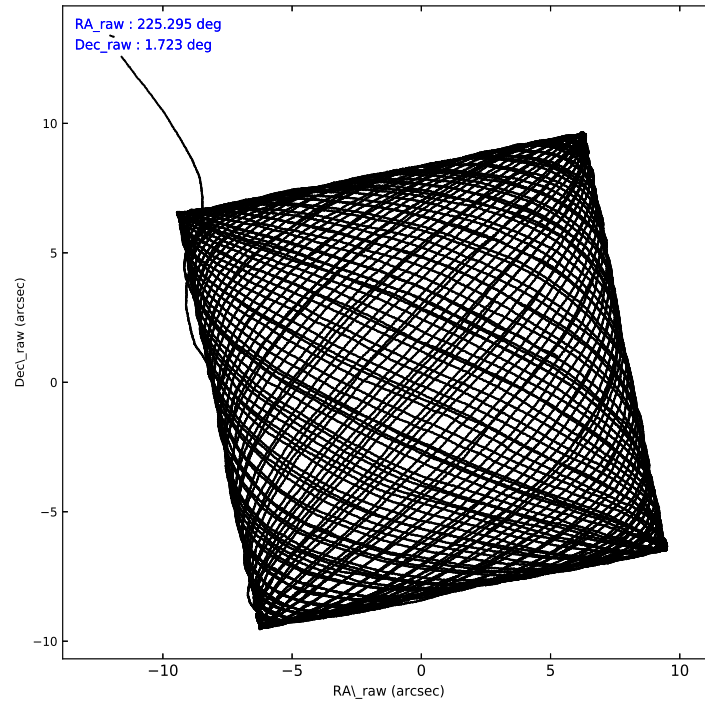
	ccd 3	ccd 5	ccd 6	ccd 7	ccd 8
level 1 events	299325	451055	313195	449569	388591
rejected events	269243	212160	276516	188547	295280
rejected %	89%	47%	88%	41%	75%

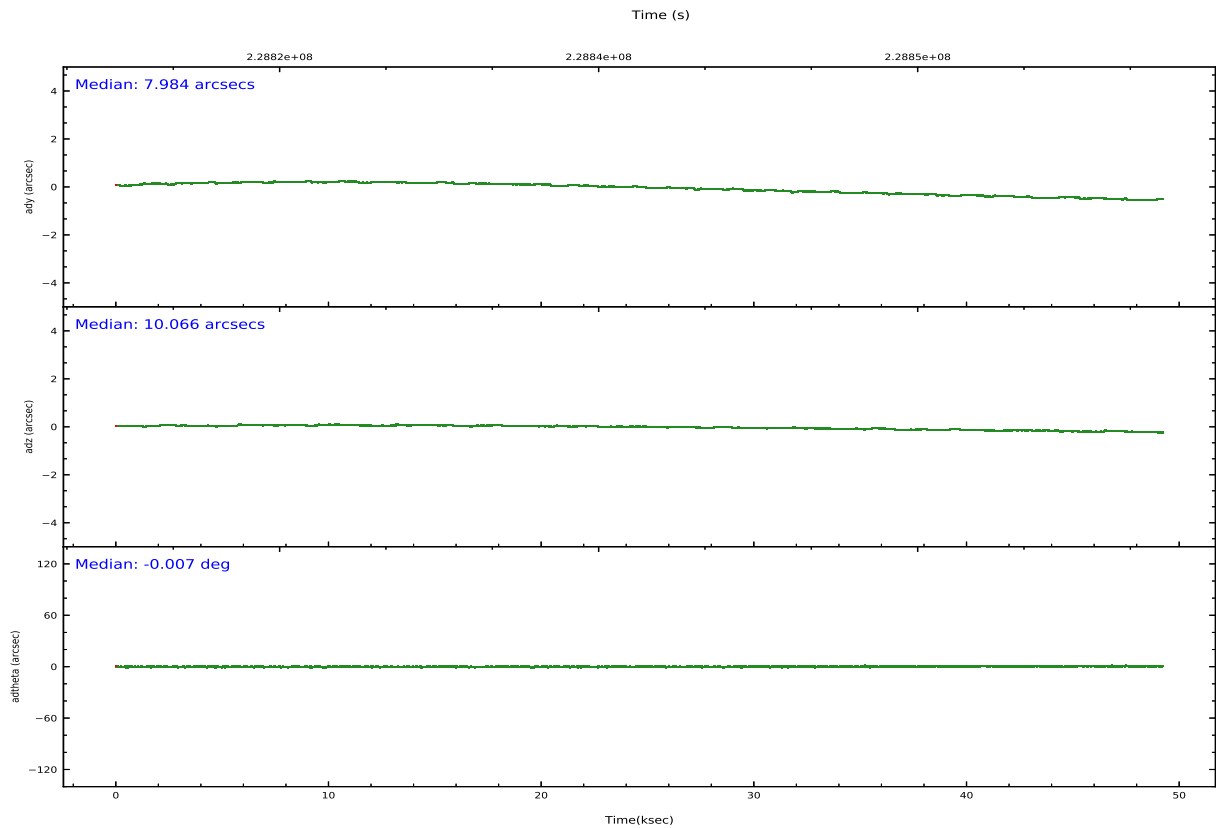
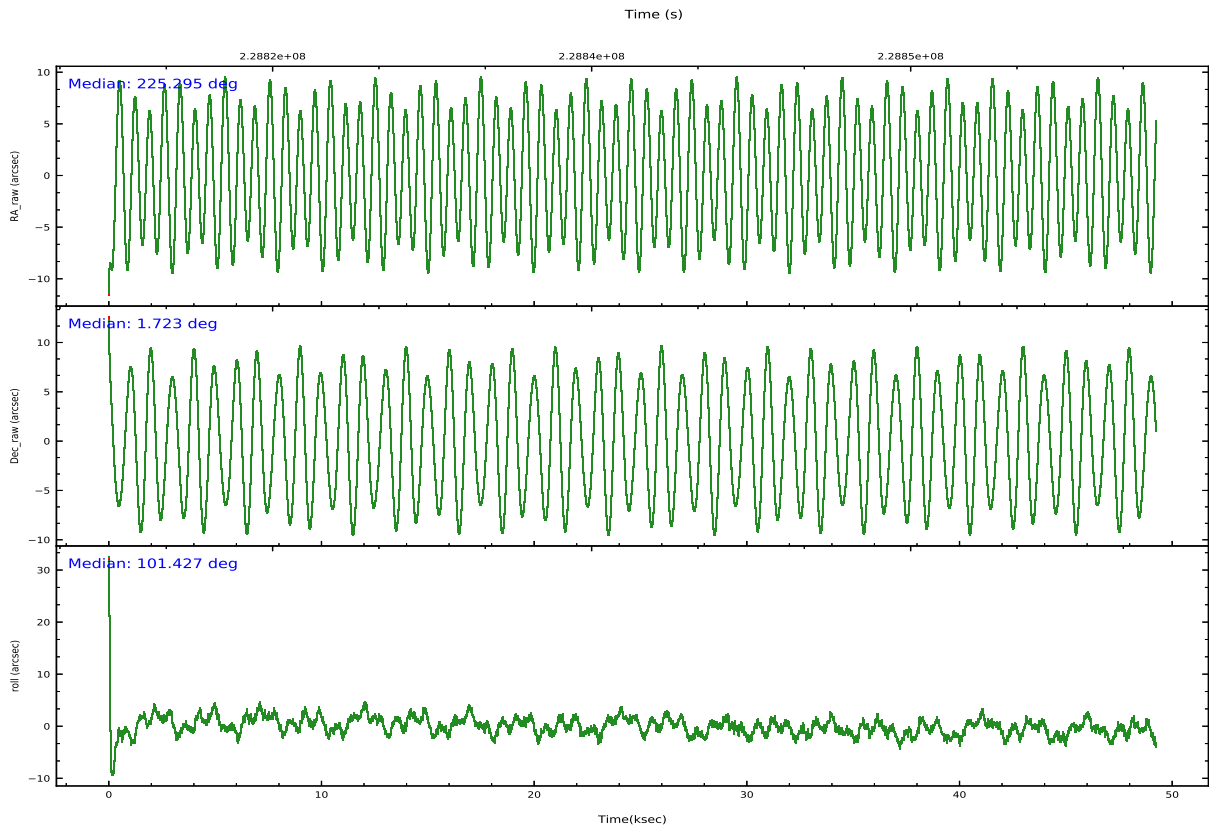
	ccd 3	ccd 5	ccd 6	ccd 7	ccd 8
grade 0 events	11435	47881	15683	50384	29946
	3%	10%	5%	11%	7%
grade 1 events	170	919	164	336	292
	0%	0%	0%	0%	0%
grade 2 events	6239	65368	7213	60020	20252
	2%	14%	2%	13%	5%
grade 3 events	3379	9414	3627	27470	10021
	1%	2%	1%	6%	2%
grade 4 events	3311	9044	3510	27055	9495
	1%	2%	1%	6%	2%
grade 5 events	12267	33847	12408	36722	17737
	4%	7%	3%	8%	4%
grade 6 events	5719	107211	6651	96112	23599
	1%	23%	2%	21%	6%
grade 7 events	256805	177371	263939	151470	277249
	85%	39%	84%	33%	71%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar version number	8	8
Detector	ACIS-35678	ACIS-35678	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	225.312978	225.29799678211	Subarray requested	NONE	NONE
[deg] Pointing Dec	1.702425	1.7209432330492	Alternating exposures requested	N	N
[deg] Pointing Roll	101.272121	101.42712099329	[s] Primary exposure time	0.000000	3.1
[mm] SIM focus pos	-0.684267	-0.6828225247311905			
[mm] SIM defocus	0	0.001444936568705701			
[mm] SIM translation stage pos	-190.132523	-190.1400660498719			
[mm] SIM translation stage offset	0	0.00754346686406393			
[s] Observation start time (MET)	228812543.184000	228811523.0438			
Observation start date	2005-04-02T07:01:19	2005-04-02T06:45:23			
[s] Observation end time (MET)	228861543.184000	228861861.30859			
Observation end date	2005-04-02T20:37:59	2005-04-02T20:44:21			
Read mode	TIMED	TIMED			

2.3 Aspect



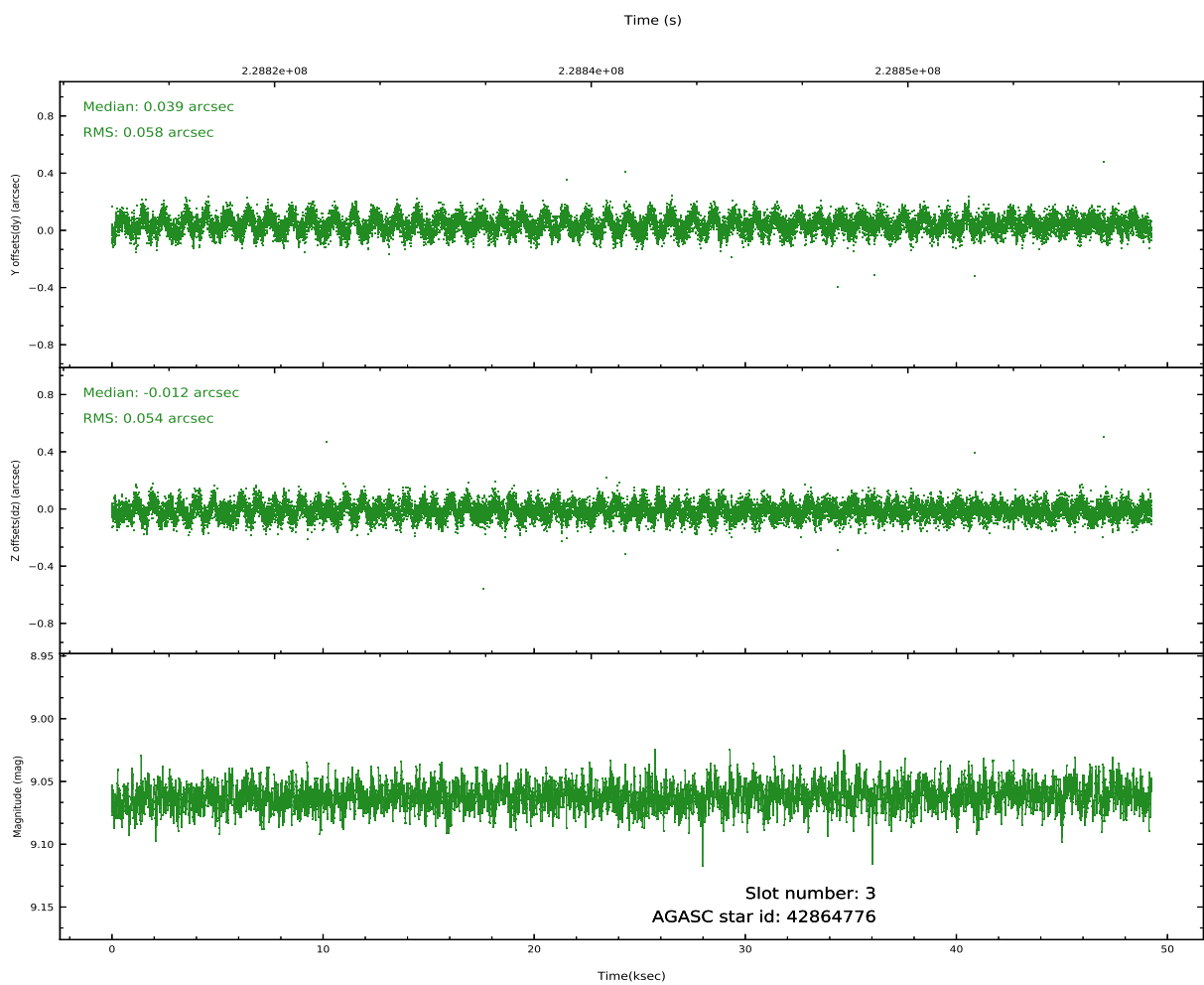
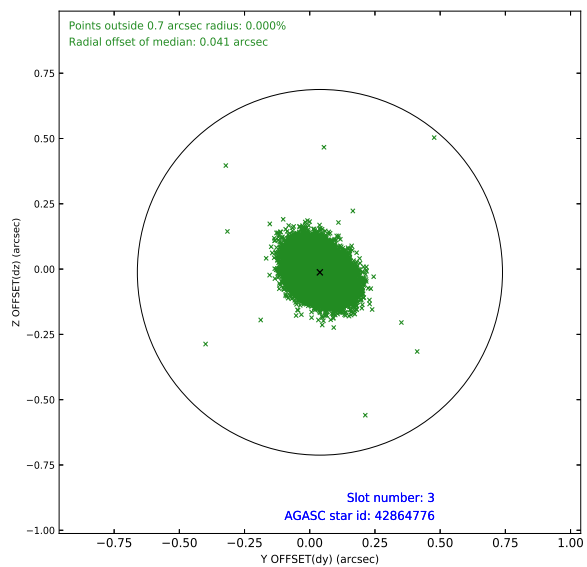
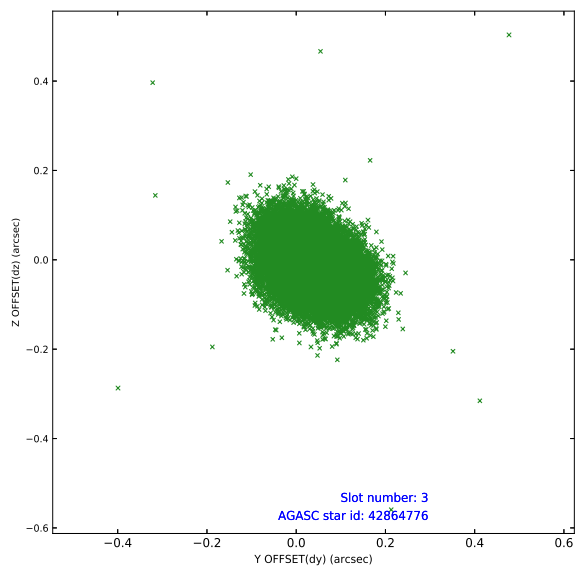


Slot Statistics

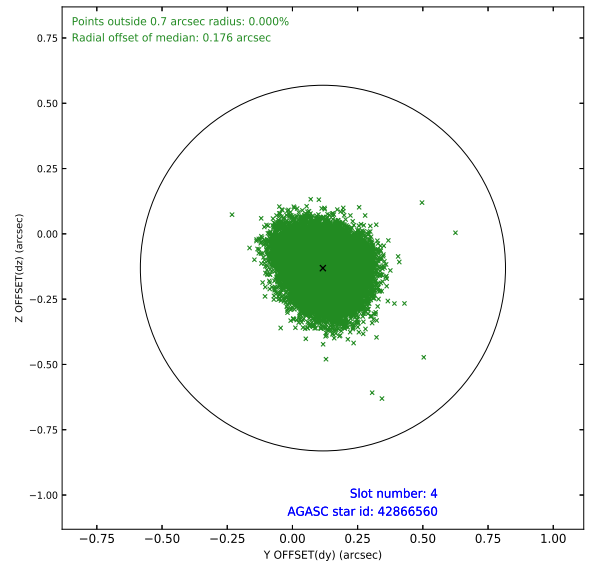
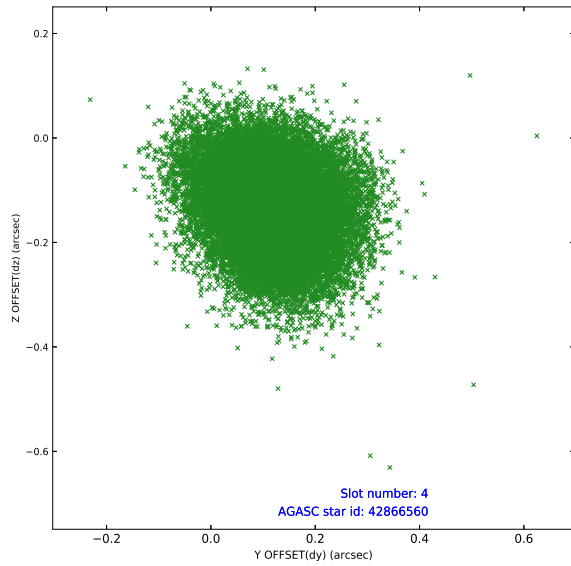
slot	status	used	id	mag	n_pts	frac_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_x
0	FID		ACIS-S-1	7.19	12012	1.000	0.016	-0.067	0.008	0.015	0.000000	0.000000	935.40	-1726
1	FID		ACIS-S-4	7.21	12012	1.000	0.136	0.043	0.013	0.022	0.000000	0.000000	2152.87	177
2	FID		ACIS-S-5	7.23	12010	1.000	-0.178	0.036	0.013	0.023	0.000000	0.000000	-1813.73	170
3	GUIDE	used	42864776	9.06	24011	1.000	0.039	-0.012	0.084	0.135	224.993302	1.618488	-71.87	1187
4	GUIDE	used	42866560	9.82	24000	1.000	0.117	-0.131	0.115	0.186	224.848820	1.191876	-1475.91	1997
5	GUIDE	used	42869600	9.44	24010	1.000	0.010	-0.082	0.120	0.186	224.875445	1.123032	-1737.86	1952
6	GUIDE	used	43778880	9.05	24009	1.000	0.060	0.021	0.088	0.139	225.720242	1.617889	-584.03	-1377
7	GUIDE	used	44304040	8.12	24009	1.000	-0.228	0.202	0.073	0.119	225.823407	2.372575	2007.69	-2271

2.4 Star Slots

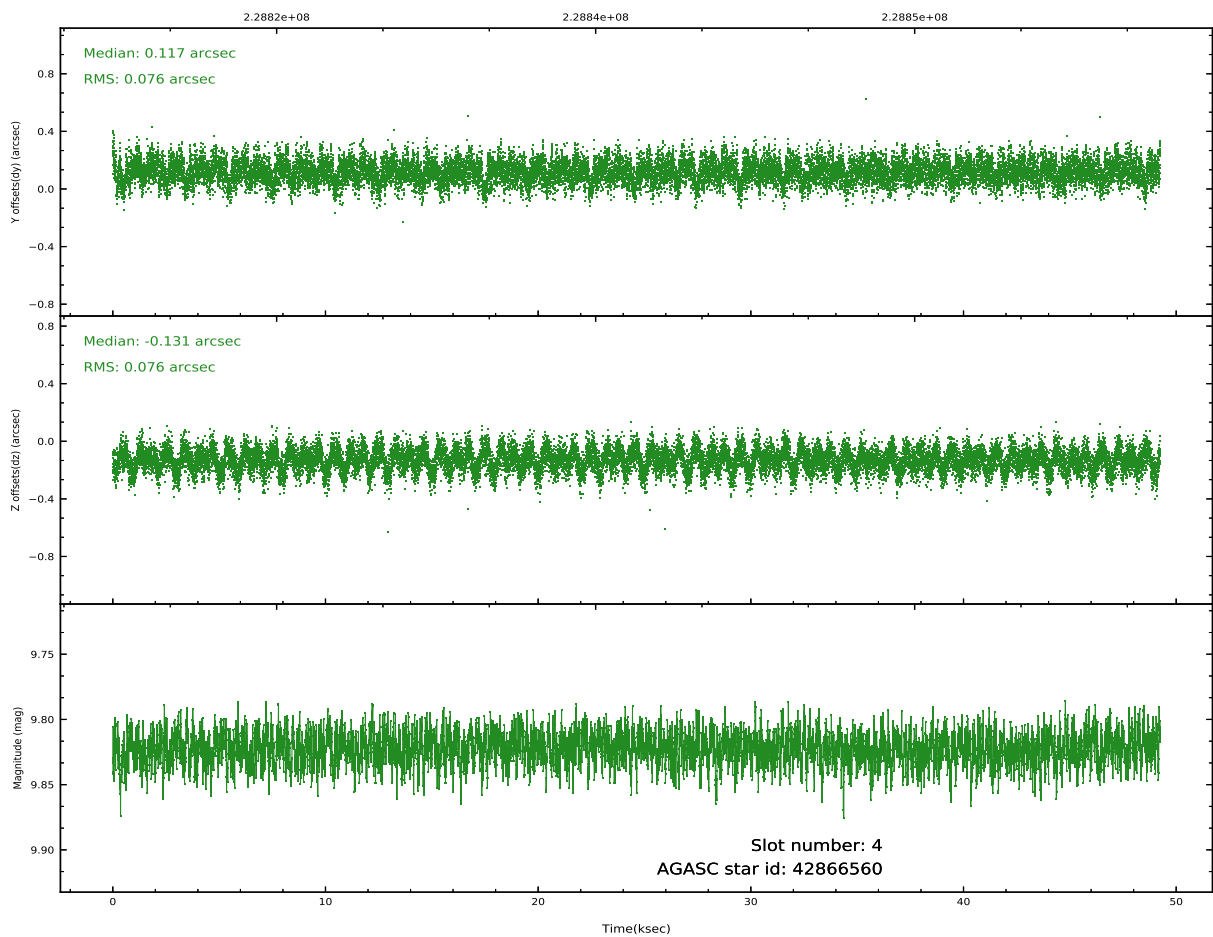
2.4.1 Slot 3



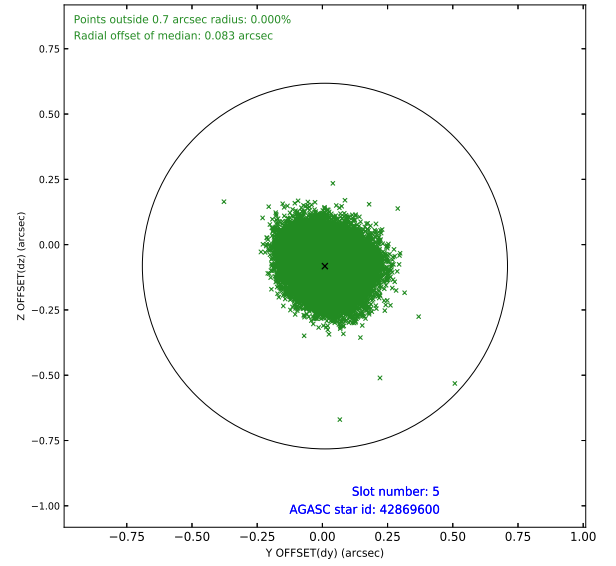
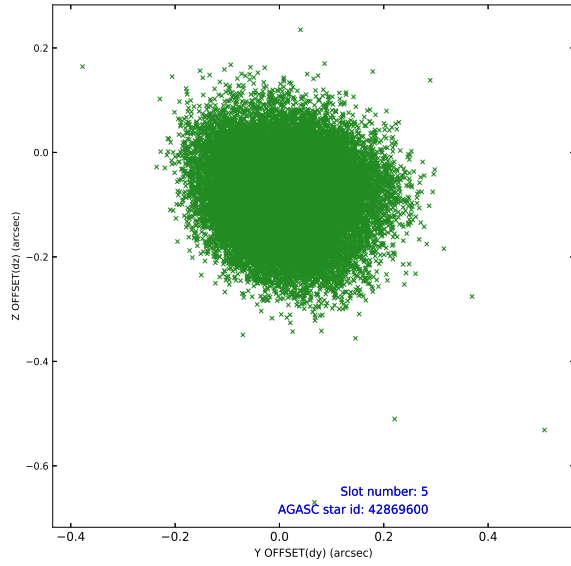
2.4.2 Slot 4



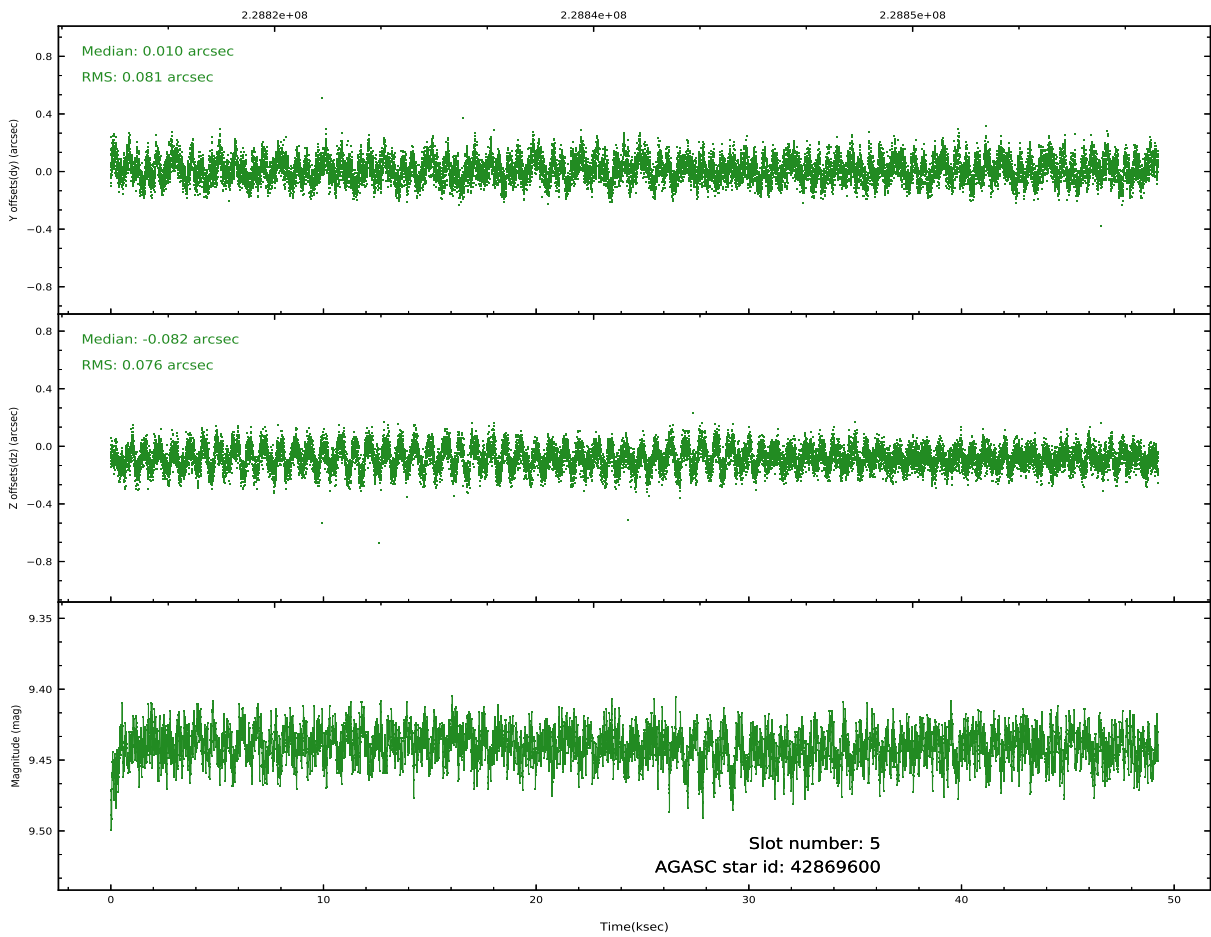
Time (s)



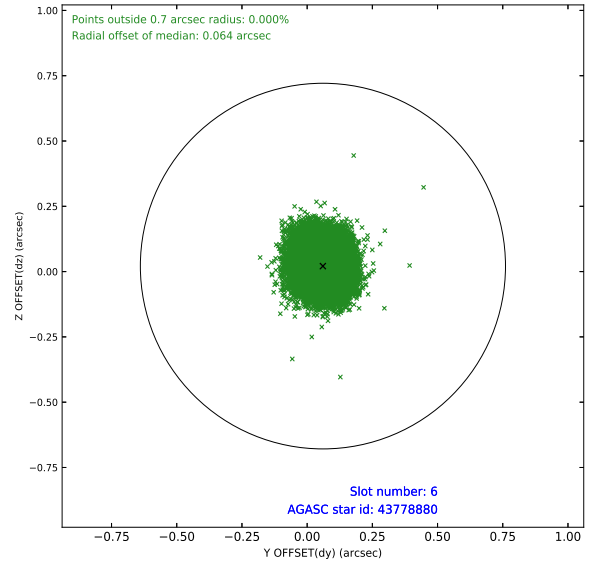
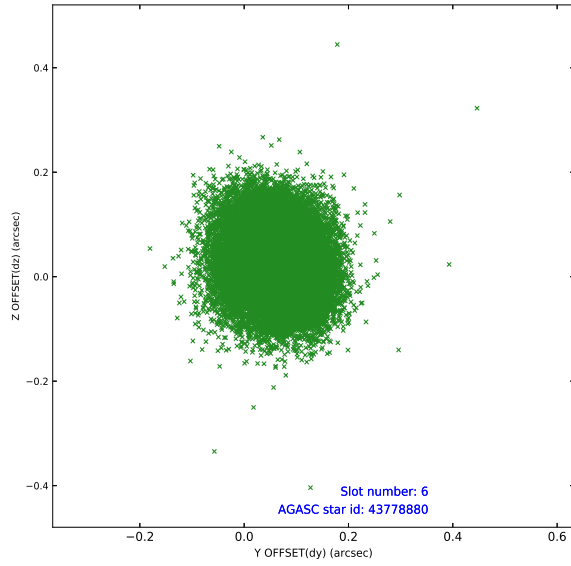
2.4.3 Slot 5



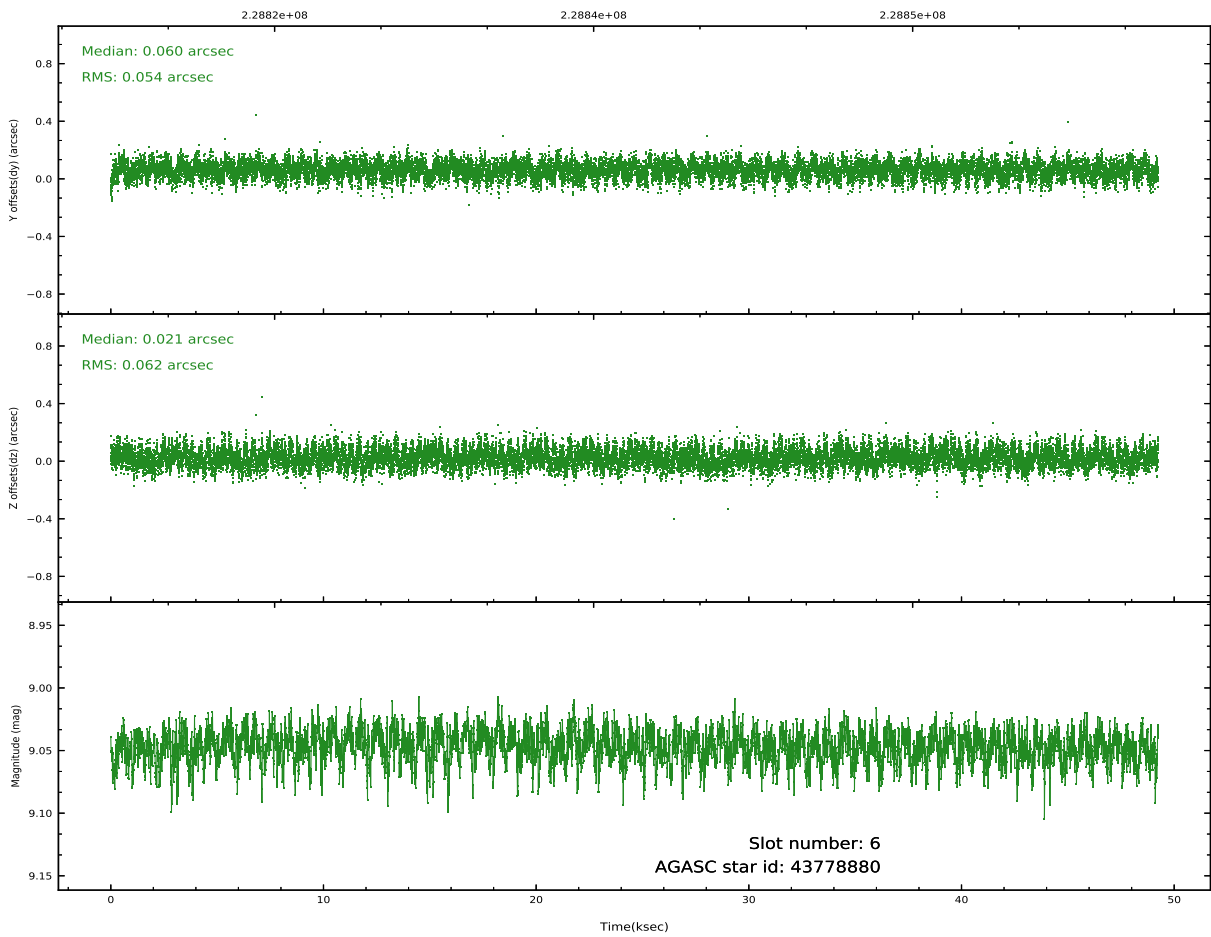
Time (s)



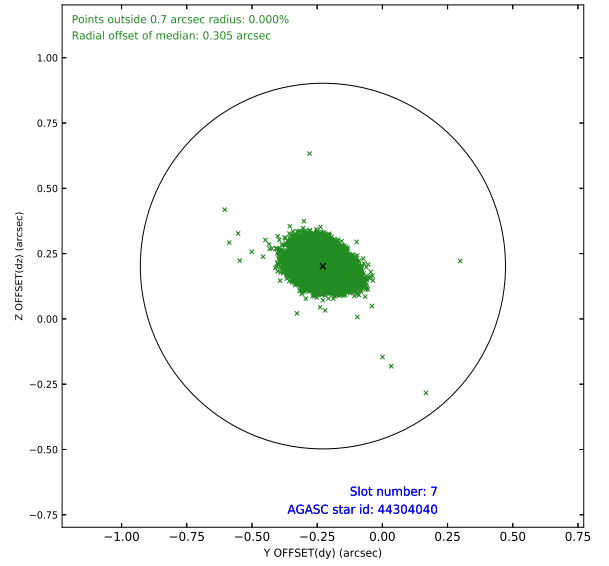
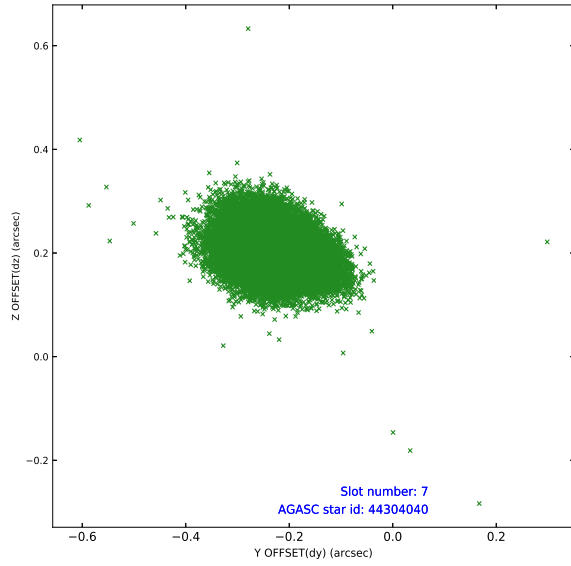
2.4.4 Slot 6



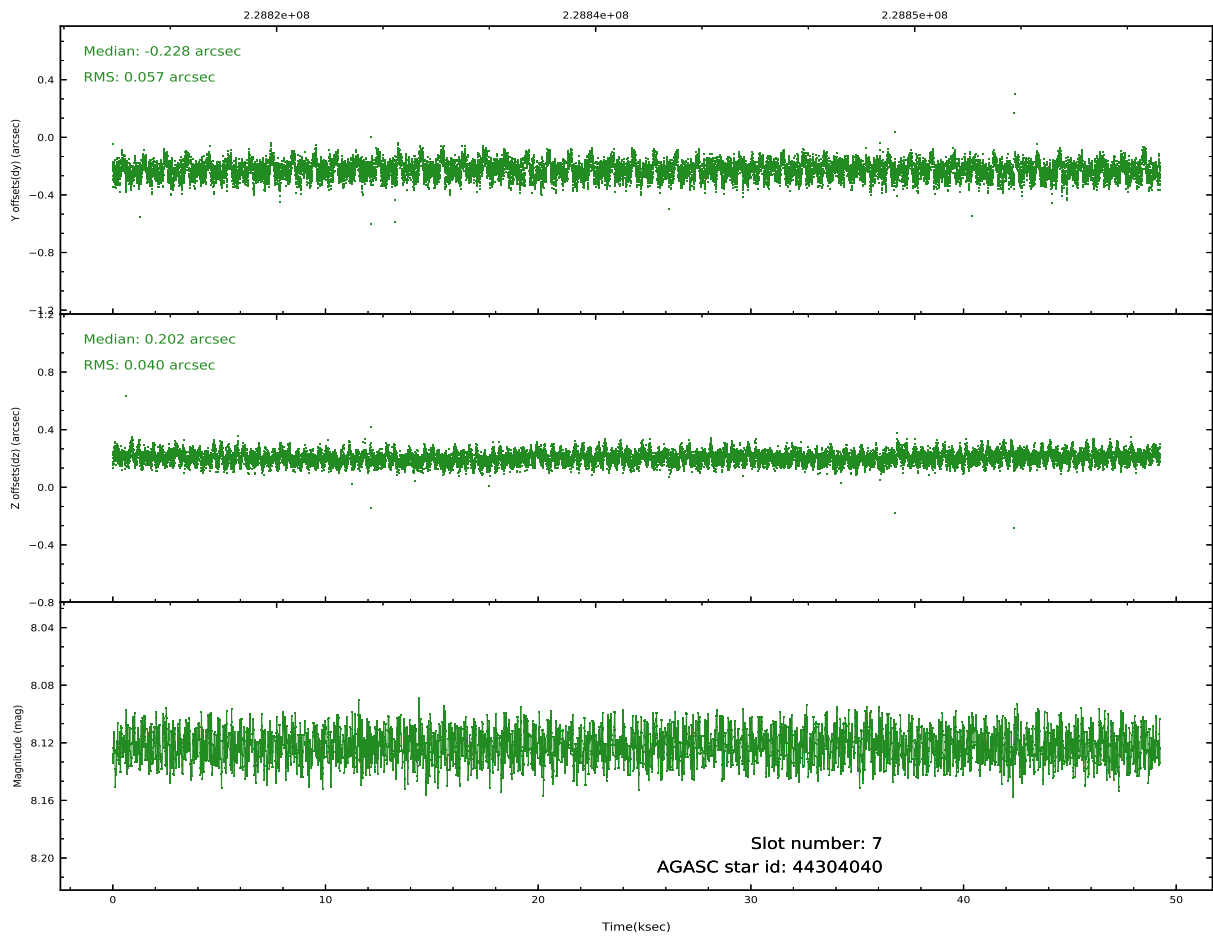
Time (s)



2.4.5 Slot 7

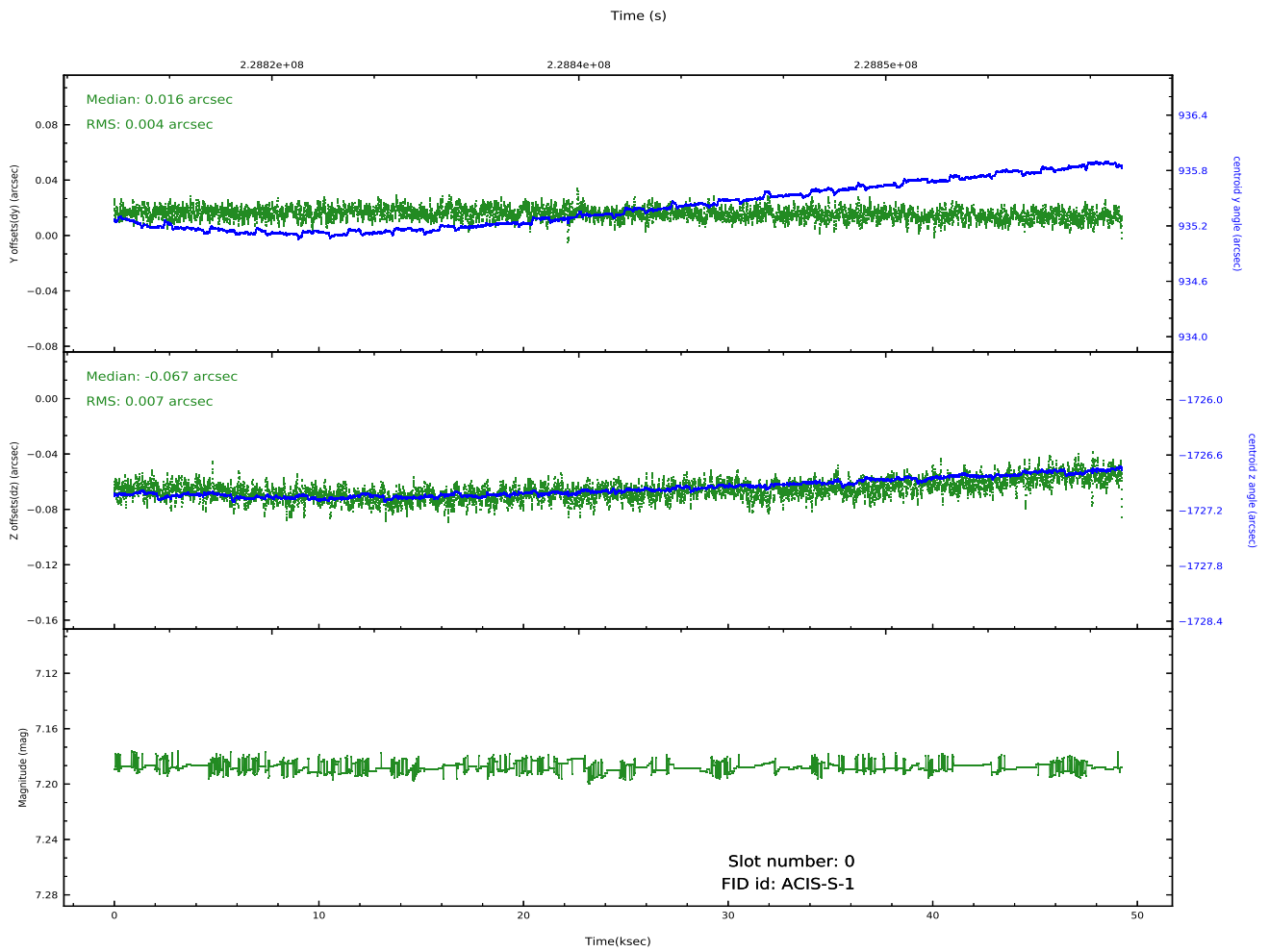
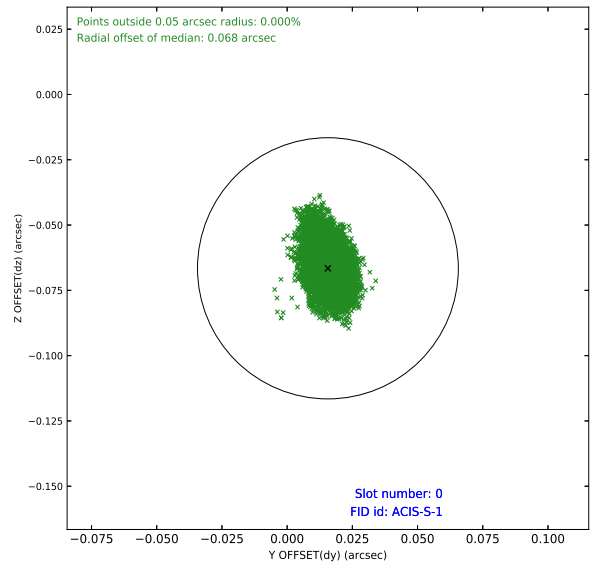
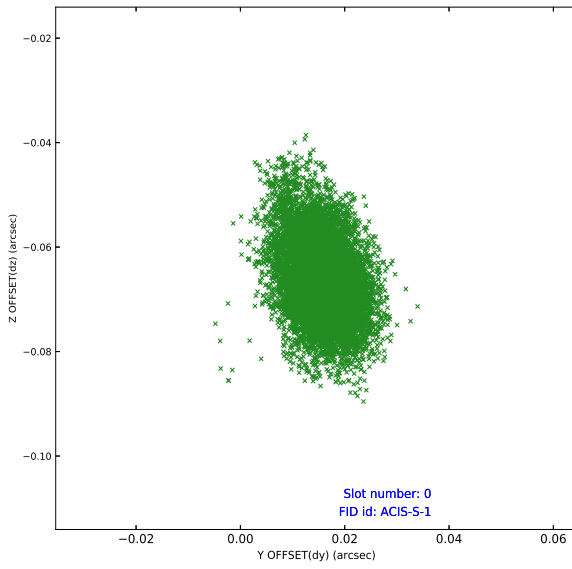


Time (s)

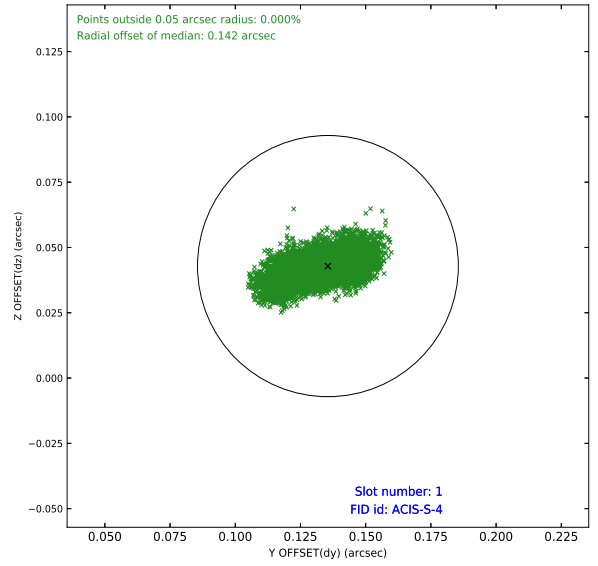
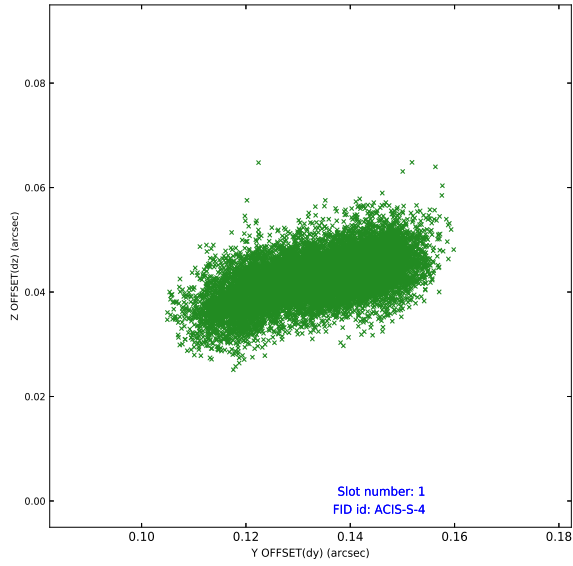


2.5 FID Slots

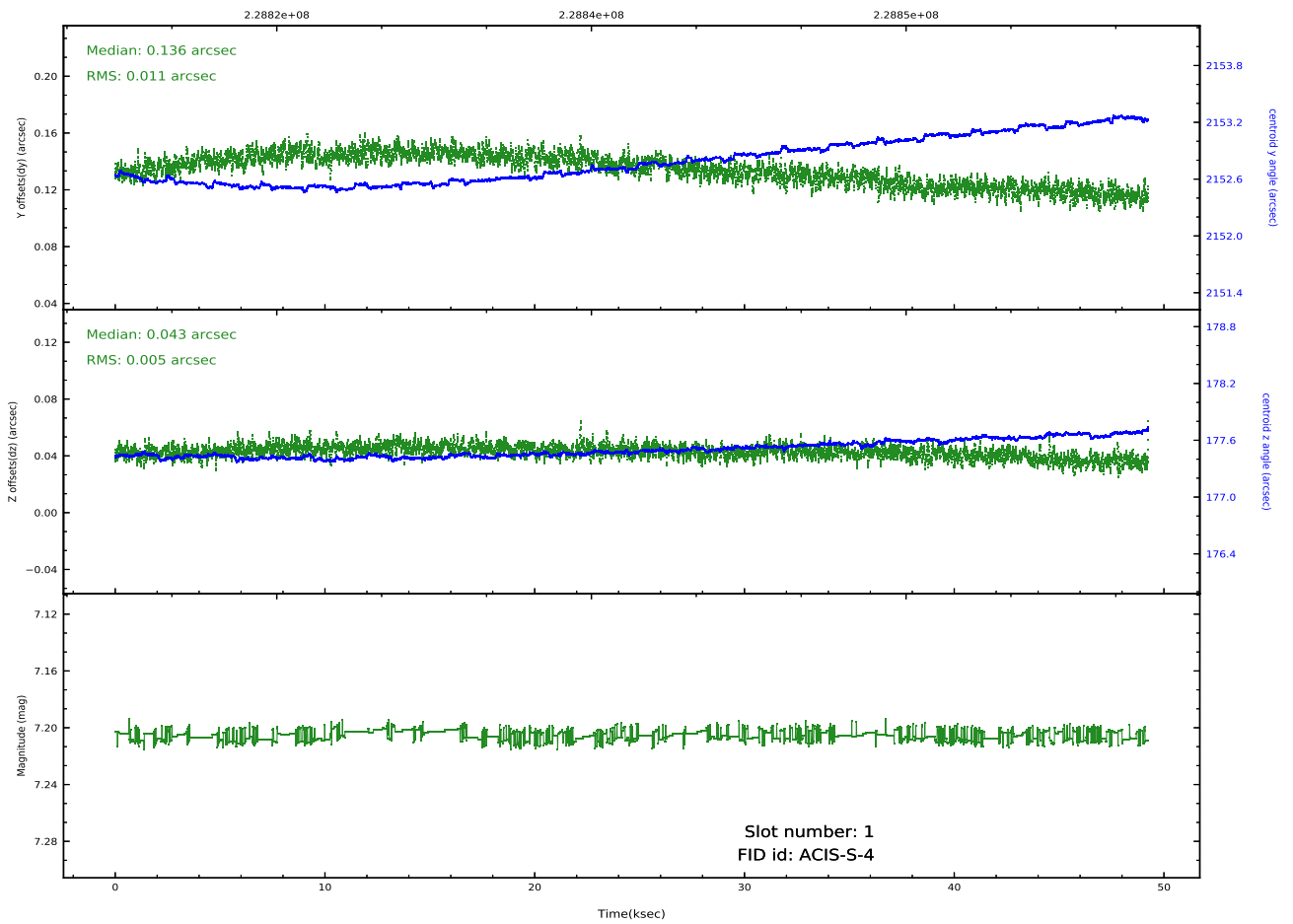
2.5.1 Slot 0



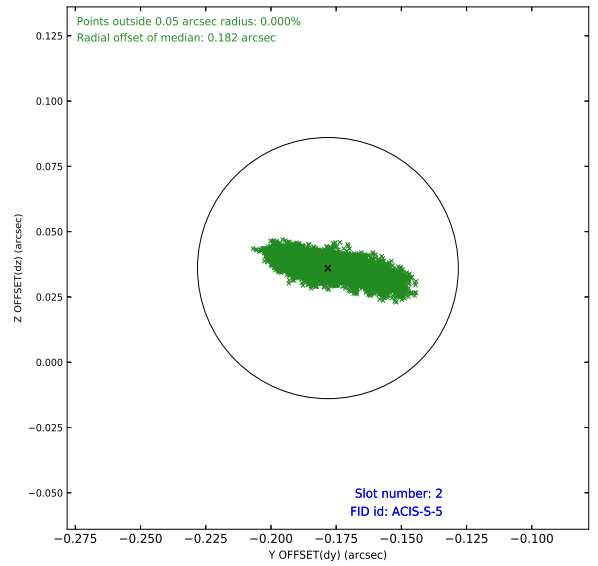
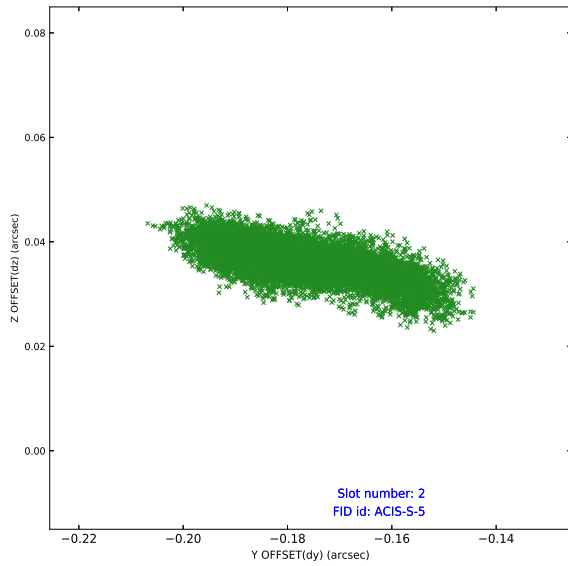
2.5.2 Slot 1



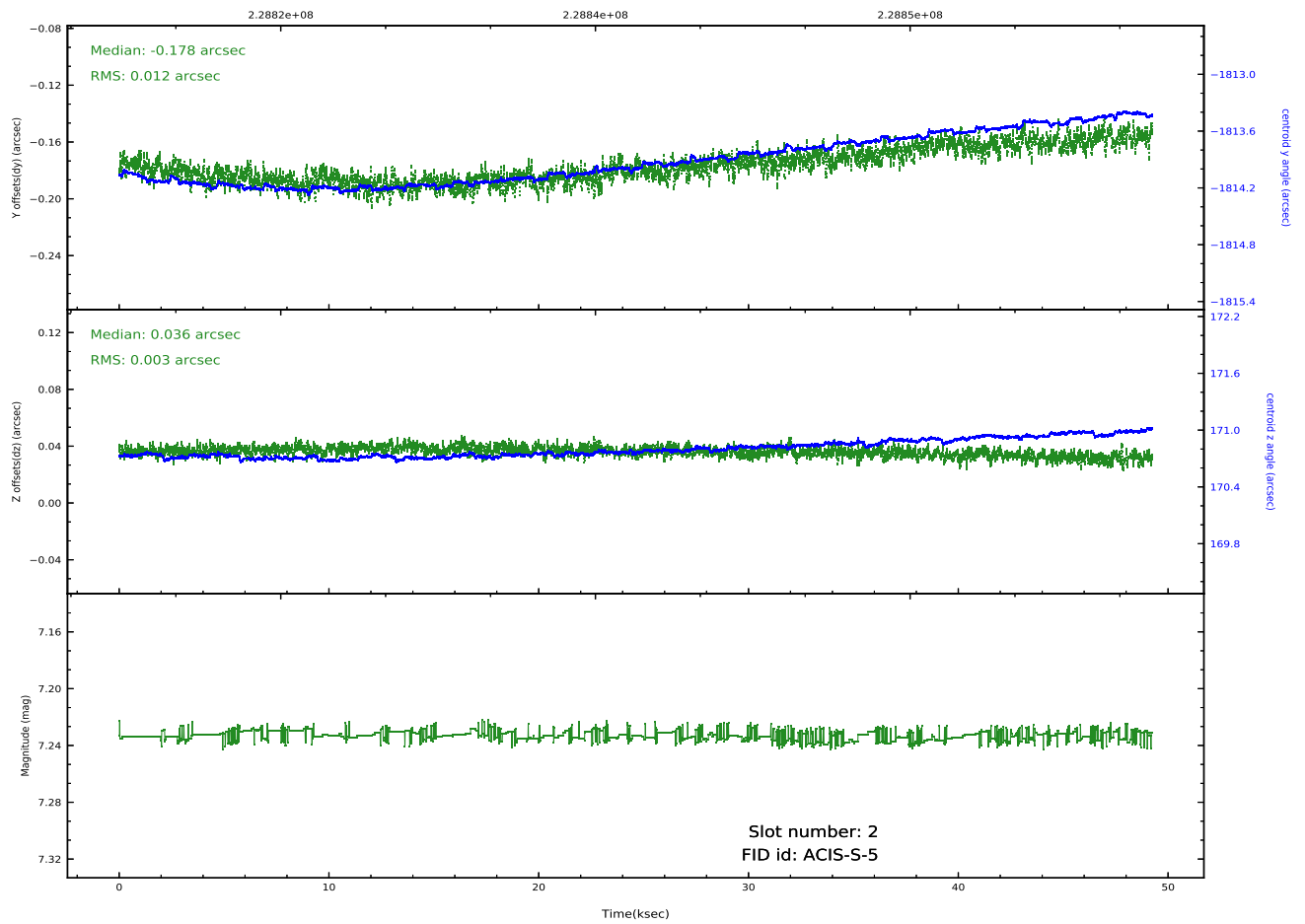
Time (s)



2.5.3 Slot 2



Time (s)



A Summary

A.1 Status

V&V Scientist	Beth Sundheim
V&V Date (YYYY-MM-DD)	2020.10.08
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	49.03889

A.2 Comments