

V&V Reference Report

L2 ASCDS Version : 10.4.1

Observation 17007 - L2 Version 2
Chandra X-Ray Center

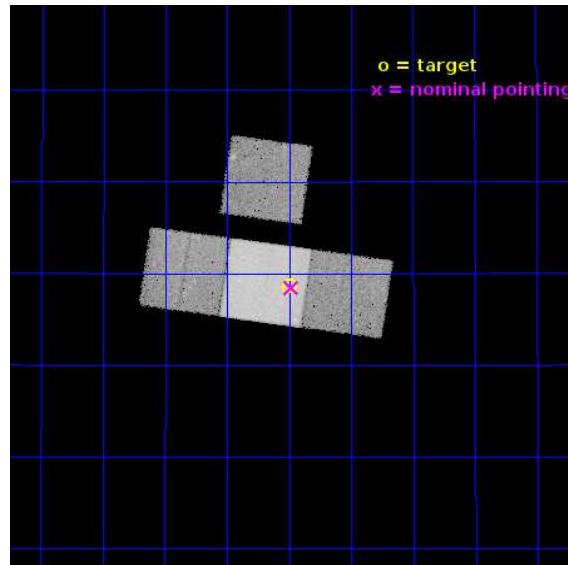
L2 Processing Date : Sep 16 2015

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1 Front

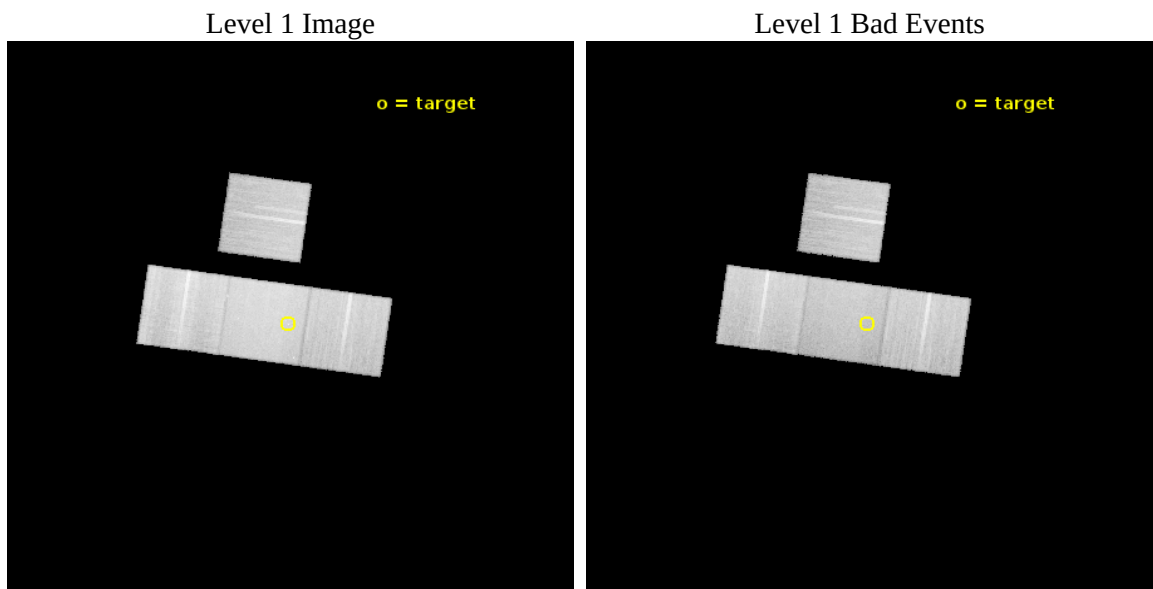
seq_num	601200	Sequence number
obs_id	17007	Observation id
title	Does the IMF vary with galaxy mass? The X-ray binary population of a key galaxy, NGC7457	Proposal title
observer	Dr Mark Peacock	Principal investigator
object	NGC 7457	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	345.249583	Observer's specified target RA [deg]
dec_targ	30.145	Observer's specified target Dec [deg]
ra_nom	345.24529692299	Nominal RA [deg]
dec_nom	30.141013757722	Nominal Dec [deg]
roll_nom	188.1587784576	Nominal Roll [deg]
revision	2	Processing version of data
ontime	45268.526659966	Sum of GTIs [s]
livetime	44677.060032949	Livetime [s]
ontime3	45268.444579959	Sum of GTIs [s]
ontime6	45268.485620022	Sum of GTIs [s]
ontime7	45268.526659966	Sum of GTIs [s]
ontime8	45268.403540015	Sum of GTIs [s]
l2events	206910	Number of level 2 events



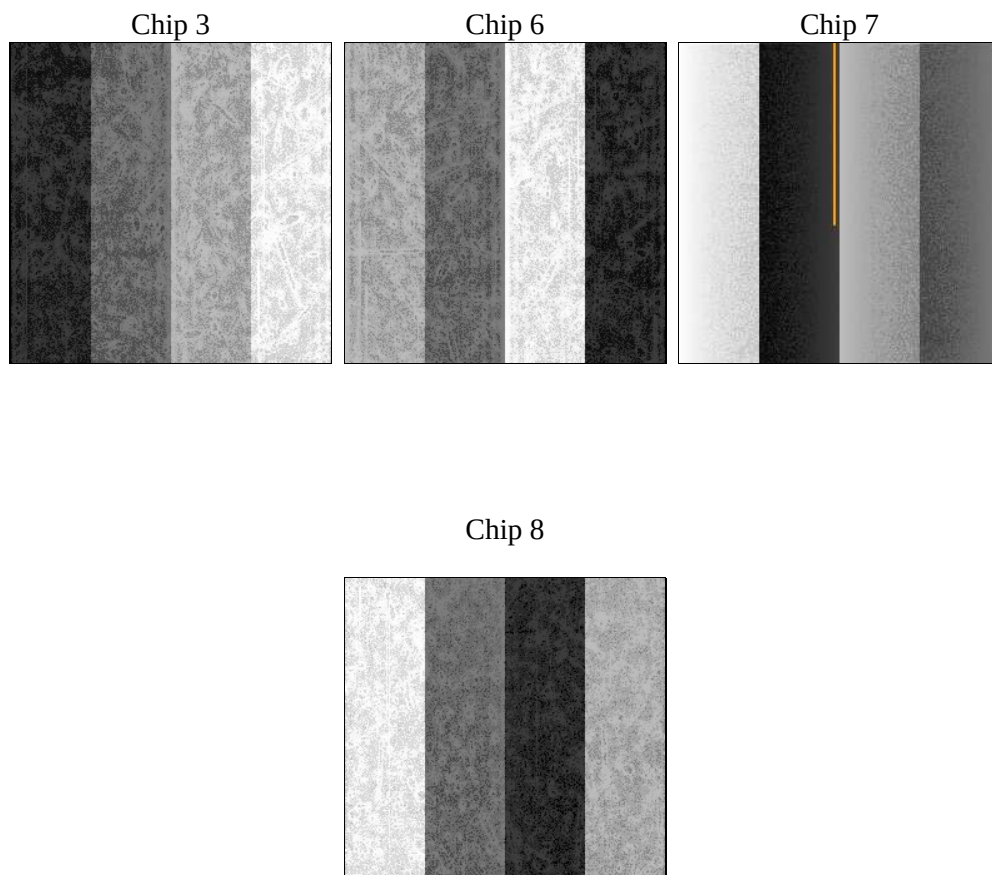
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	45204.192000	[s] Scheduled observation exposure time
ascdsver	10.4.1	Processing system revision	ontime	45268.526659966	Sum of GTIs [s]
caldsver	4.6.8	 	ontime3	45268.444579959	Sum of GTIs [s]
date	2015-09-16T17:40:53	Date and time of file creation	ontime6	45268.485620022	Sum of GTIs [s]
revision	2	Processing version of data	ontime7	45268.526659966	Sum of GTIs [s]
			ontime8	45268.403540015	Sum of GTIs [s]
			l1events	1106073	Number of level 1 events

2.1.4 Events

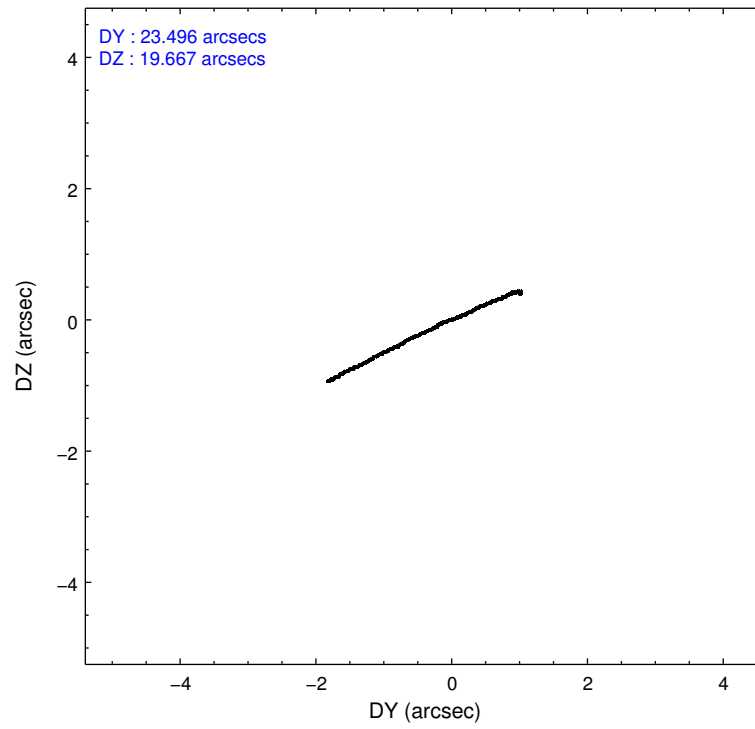
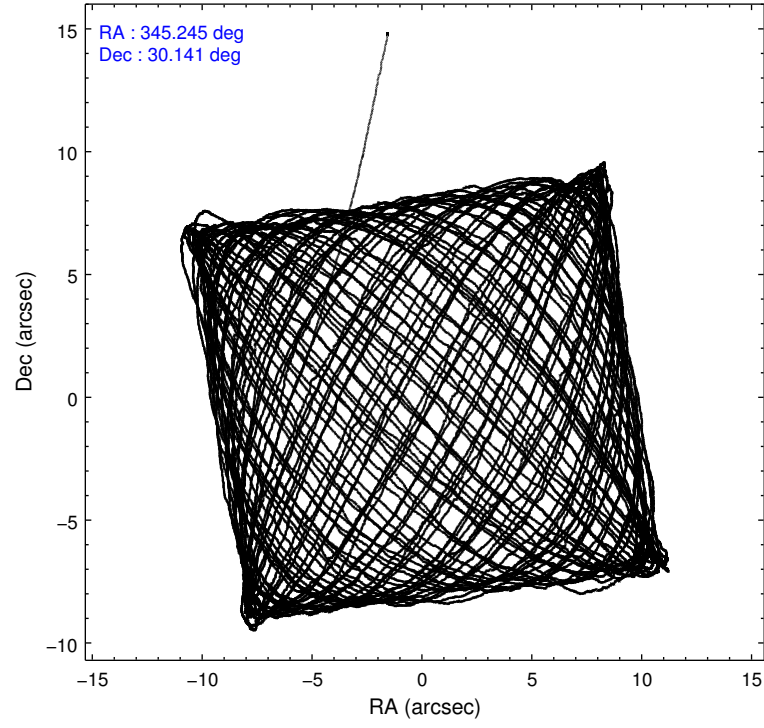
	ccd 3	ccd 6	ccd 7	ccd 8
level 1 events	230627	248457	316858	310131
rejected events	205729	221016	181046	235320
rejected %	89%	88%	57%	75%

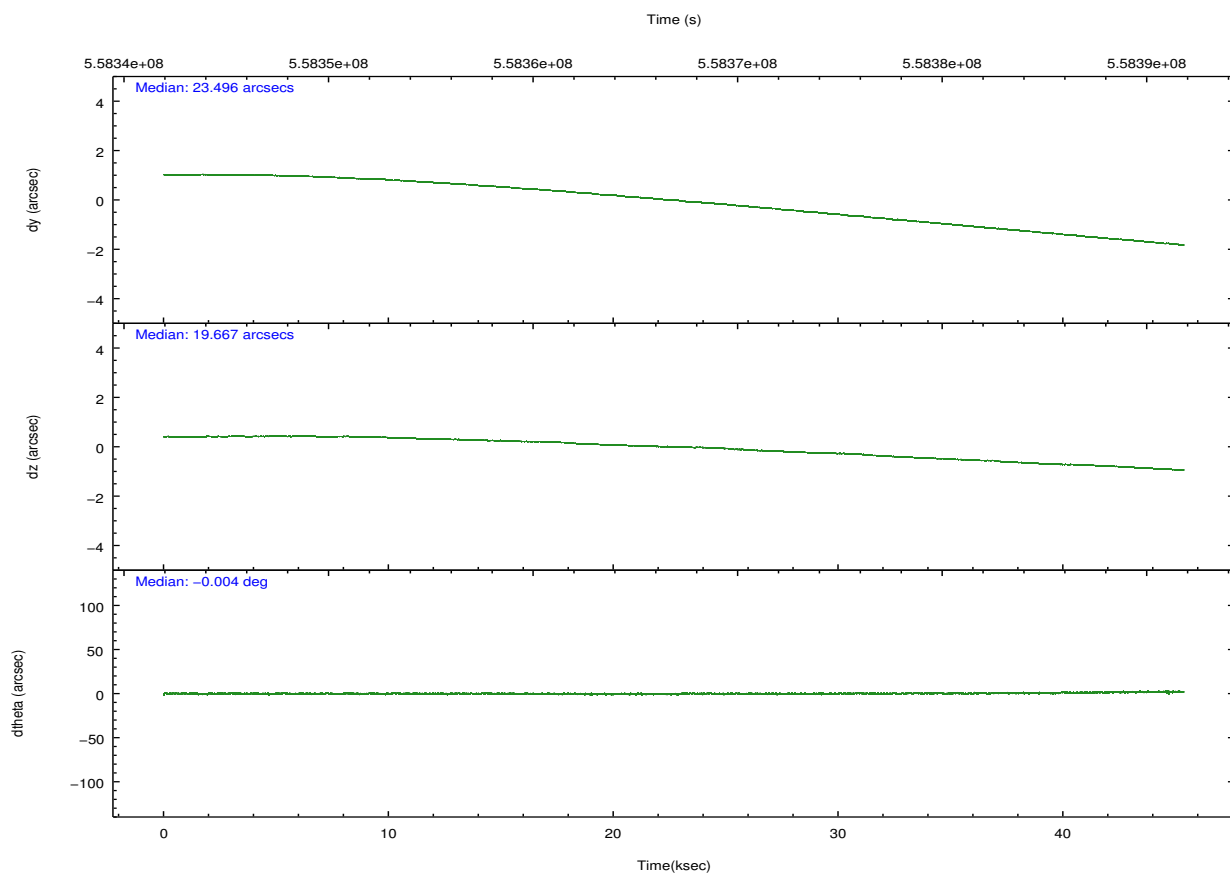
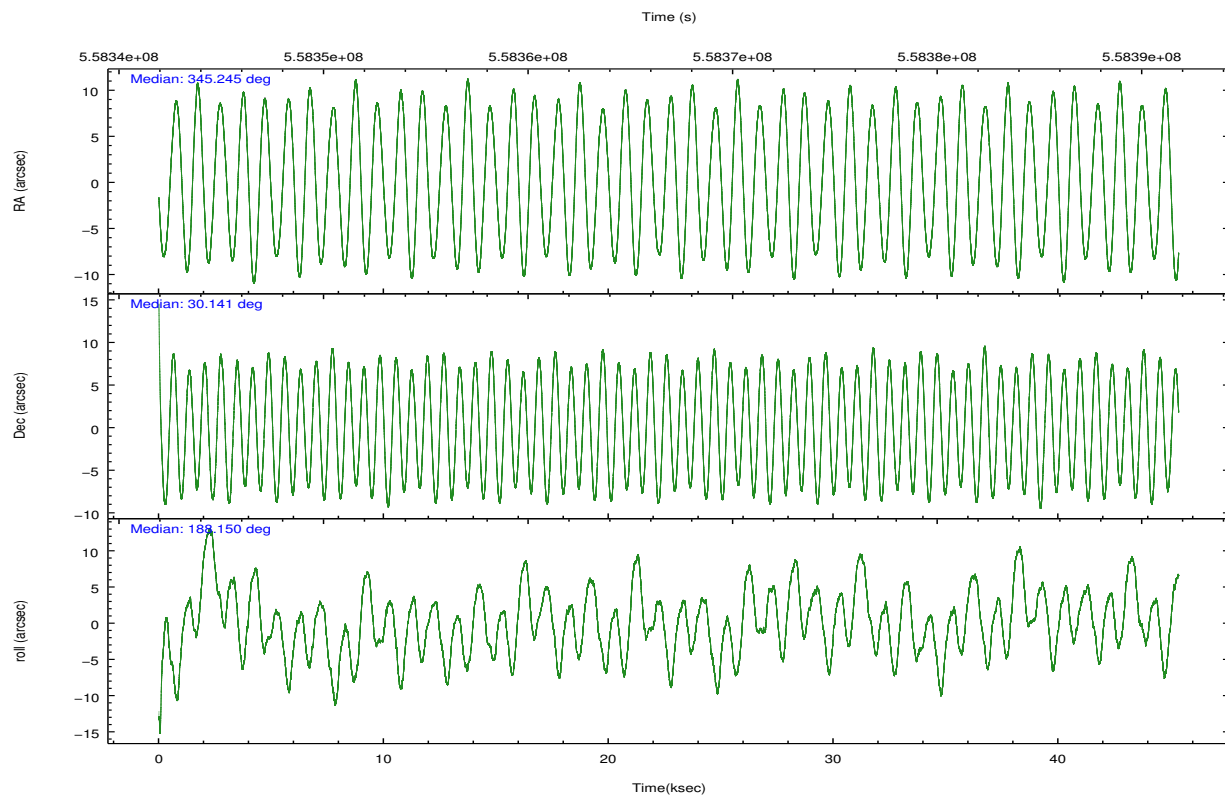
	ccd 3	ccd 6	ccd 7	ccd 8
grade 0 events	8757	8490	11145	20536
	3%	3%	3%	6%
grade 1 events	113	100	354	202
	0%	0%	0%	0%
grade 2 events	5335	6727	28539	18253
	2%	2%	9%	5%
grade 3 events	2724	2584	10576	7757
	1%	1%	3%	2%
grade 4 events	2638	2523	10134	7258
	1%	1%	3%	2%
grade 5 events	11511	11041	30110	16739
	4%	4%	9%	5%
grade 6 events	5444	7120	75435	21009
	2%	2%	23%	6%
grade 7 events	194105	209872	150565	218377
	84%	84%	47%	70%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-3678	ACIS-3678	Obspar file type	PREDICTED	ACTUAL
Grating	NONE	NONE	Obspar update status	NONE	UPDATED
Data mode	FAINT	FAINT	CCD I0 on	N	N
Observation mode	POINTING	POINTING	CCD I1 on	N	N
[deg] Pointing RA	345.270009	345.2452969229851	CCD I2 on	N	N
[deg] Pointing Dec	30.158246	30.14101375772192	CCD I3 on	O1	Y
[deg] Pointing Roll	187.989743	188.1587784576008	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	Y	Y
[mm] SIM translation stage pos	-190.132523	-190.1425803651734	CCD S3 on	Y	Y
[mm] SIM translation stage offset	0	0.01005778216563158	CCD S4 on	O2	Y
[s] Observation start time (MET)	558344363.184000	558343114.04205	CCD S5 on	N	N
Observation start date	2015-09-11T07:38:15	2015-09-11T07:18:34	Number of optional ACIS chips dropped	0	0
[s] Observation end time (MET)	558389567.184000	558389791.51968	On-chip summing requested	N	N
Observation end date	2015-09-11T20:11:39	2015-09-11T20:16:31	Subarray requested	NONE	NONE
Read mode	TIMED	TIMED	Alternating exposures requested	N	N
			[s] Primary exposure time	0.000000	3.1

2.3 Aspect



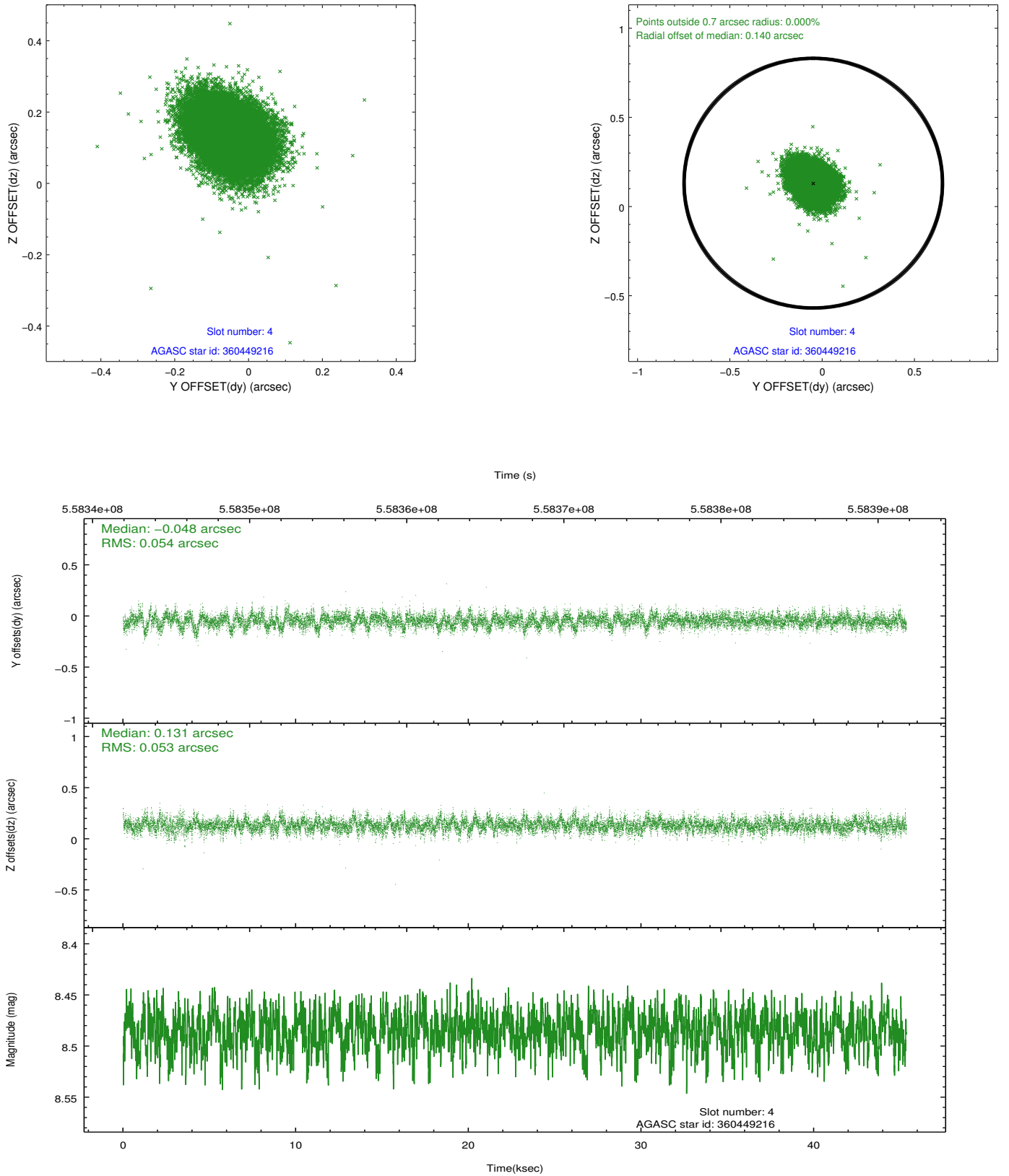


Slot Statistics

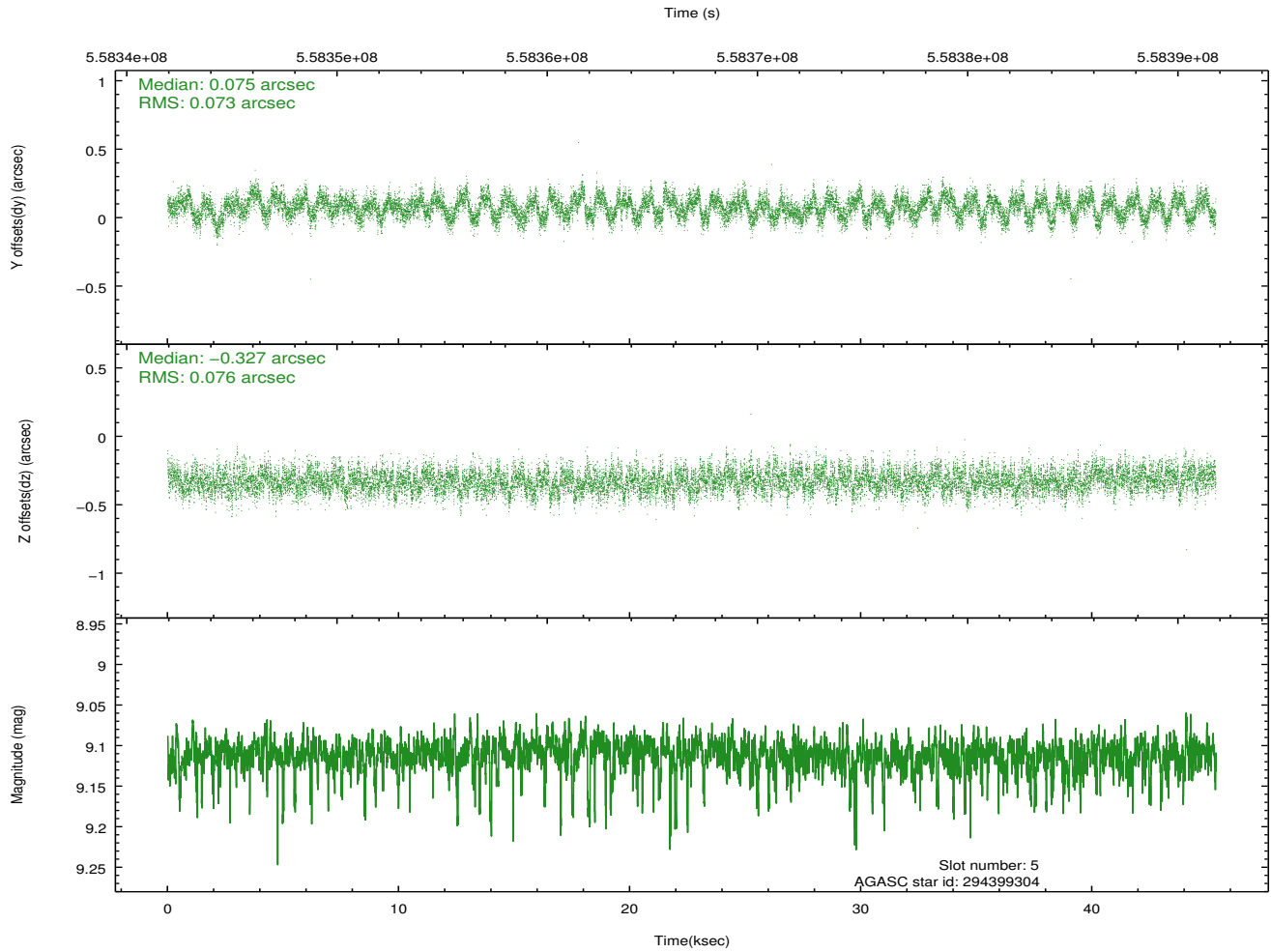
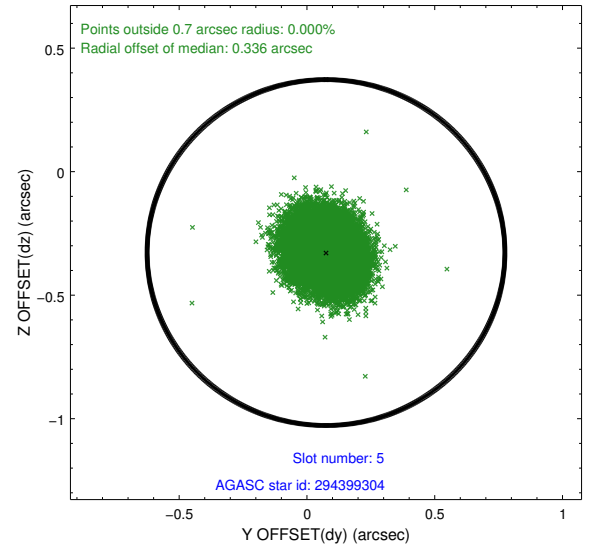
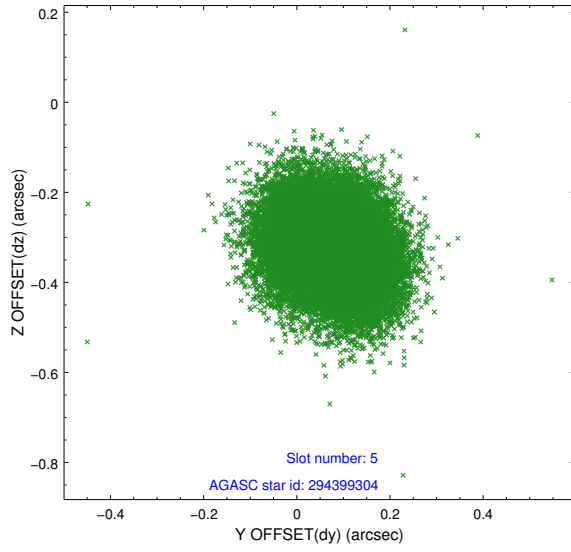
slot	status	used	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID		ACIS-S-2	7.14	11064	-0.200	-0.118	0.043	0.053	0.000000	0.000000	-776.75	-1741.16
1	FID		ACIS-S-4	7.24	11063	0.478	0.128	0.039	0.076	0.000000	0.000000	2137.18	167.60
2	FID		ACIS-S-5	7.26	11064	-0.300	-0.002	0.034	0.048	0.000000	0.000000	-1829.71	161.11
3	OMITTED			0.00	0	0.000	0.000	0.000	0.000	0.000000	0.000000	0.00	0.00
4	GUIDE	used	360449216	8.48	22119	-0.048	0.131	0.078	0.134	344.607331	30.221870	2009.25	-518.64
5	GUIDE	used	294399304	9.11	22106	0.075	-0.327	0.114	0.178	344.902322	29.451908	1494.70	2356.00
6	GUIDE	used	360463360	8.92	22118	0.012	0.135	0.123	0.197	344.479749	30.284956	2368.63	-801.08
7	GUIDE	used	360456096	9.11	22106	-0.038	0.060	0.131	0.216	344.537529	30.365373	2148.87	-1061.61

2.4 Star Slots

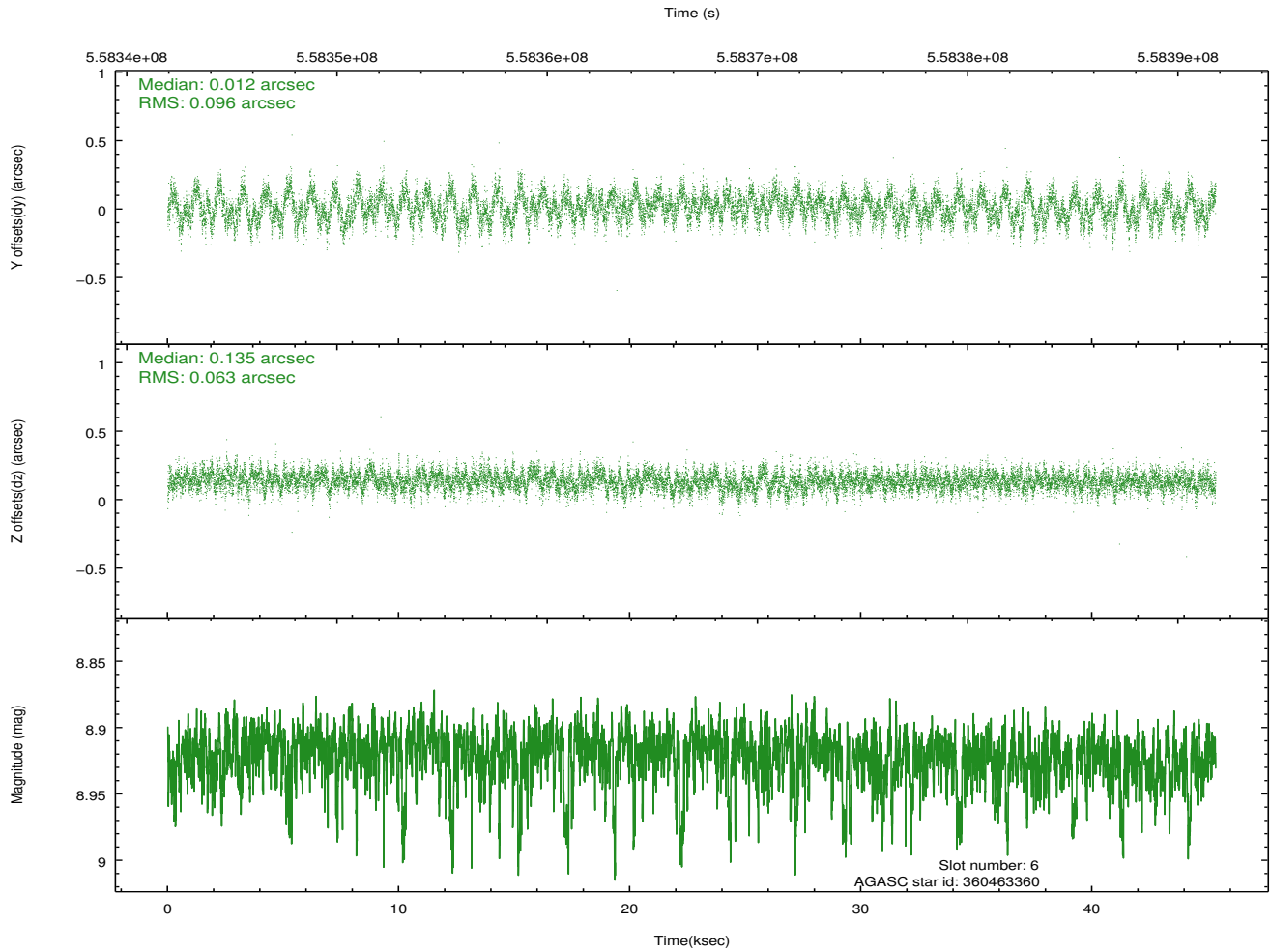
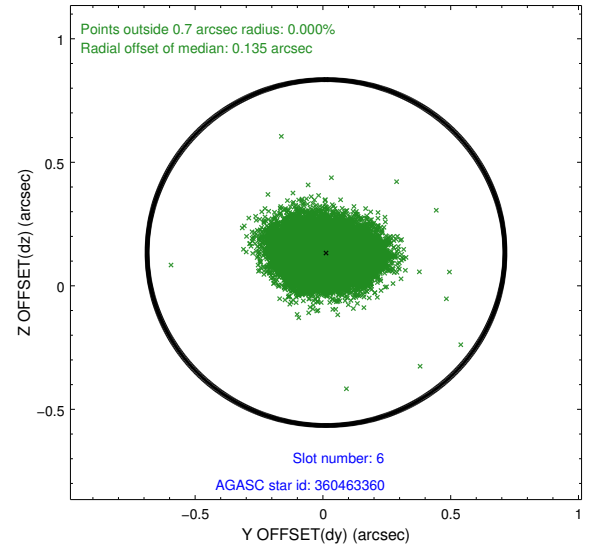
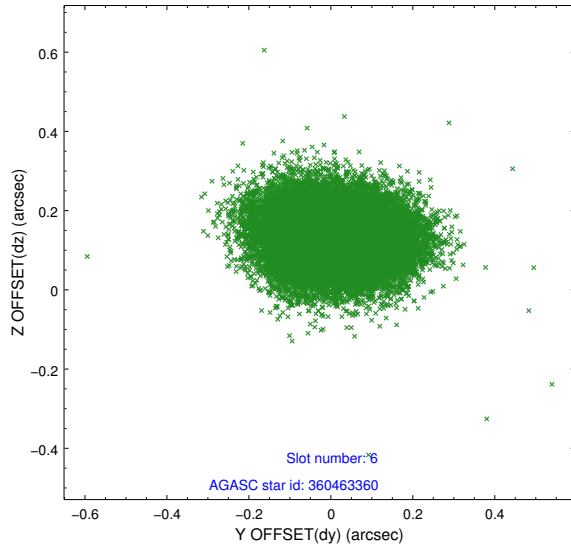
2.4.1 Slot 4



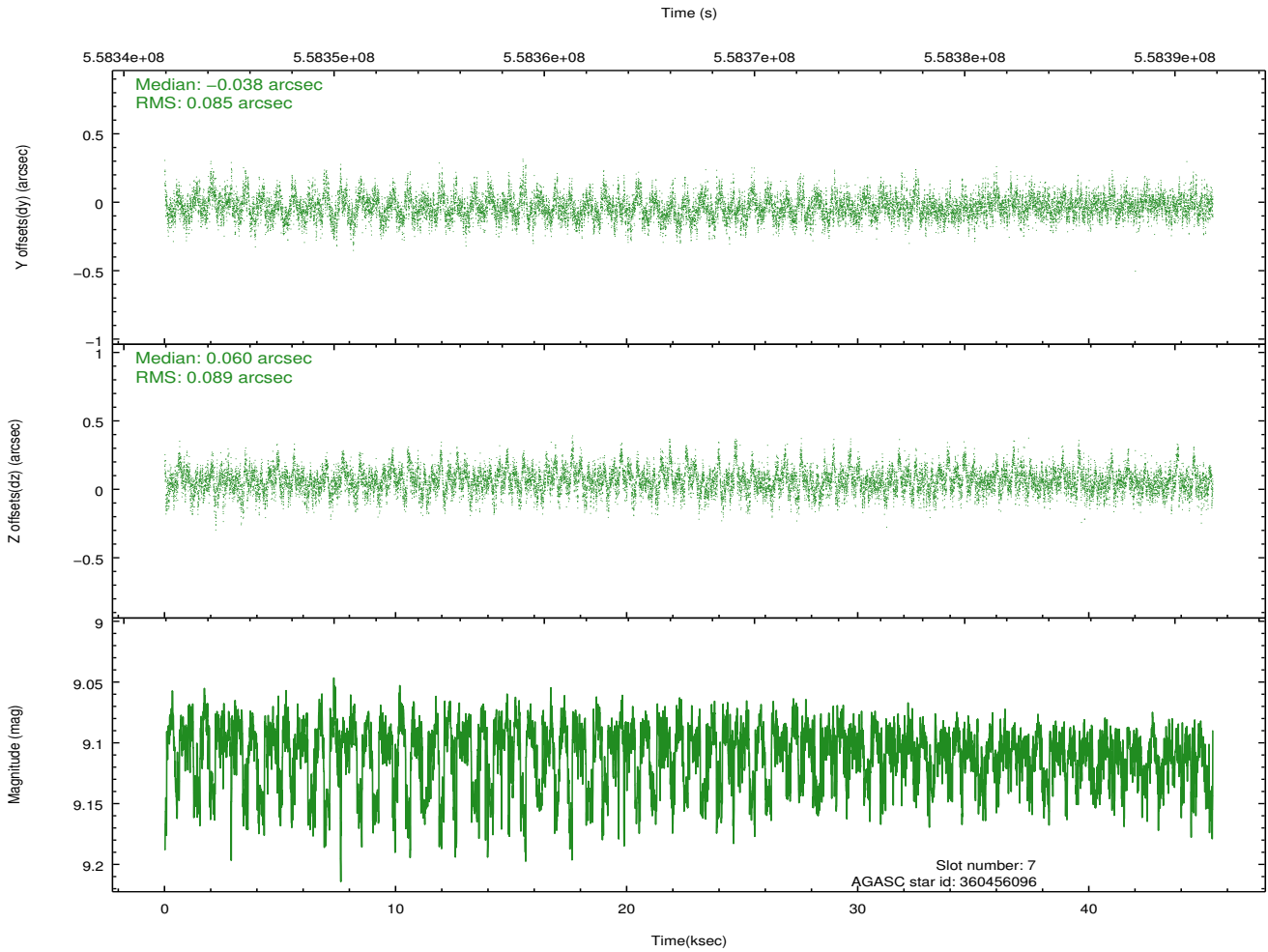
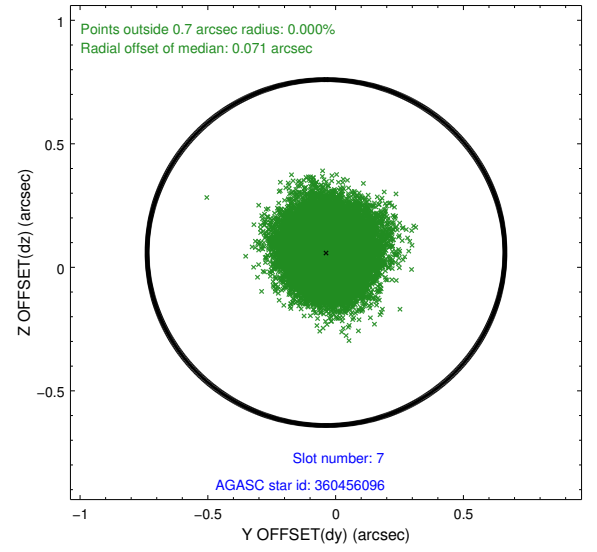
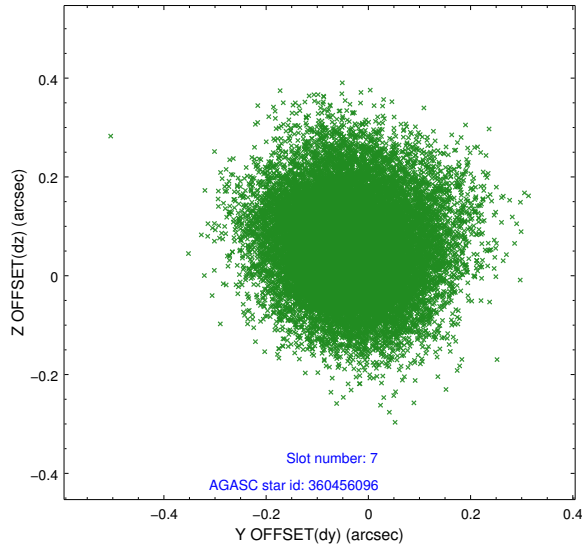
2.4.2 Slot 5



2.4.3 Slot 6

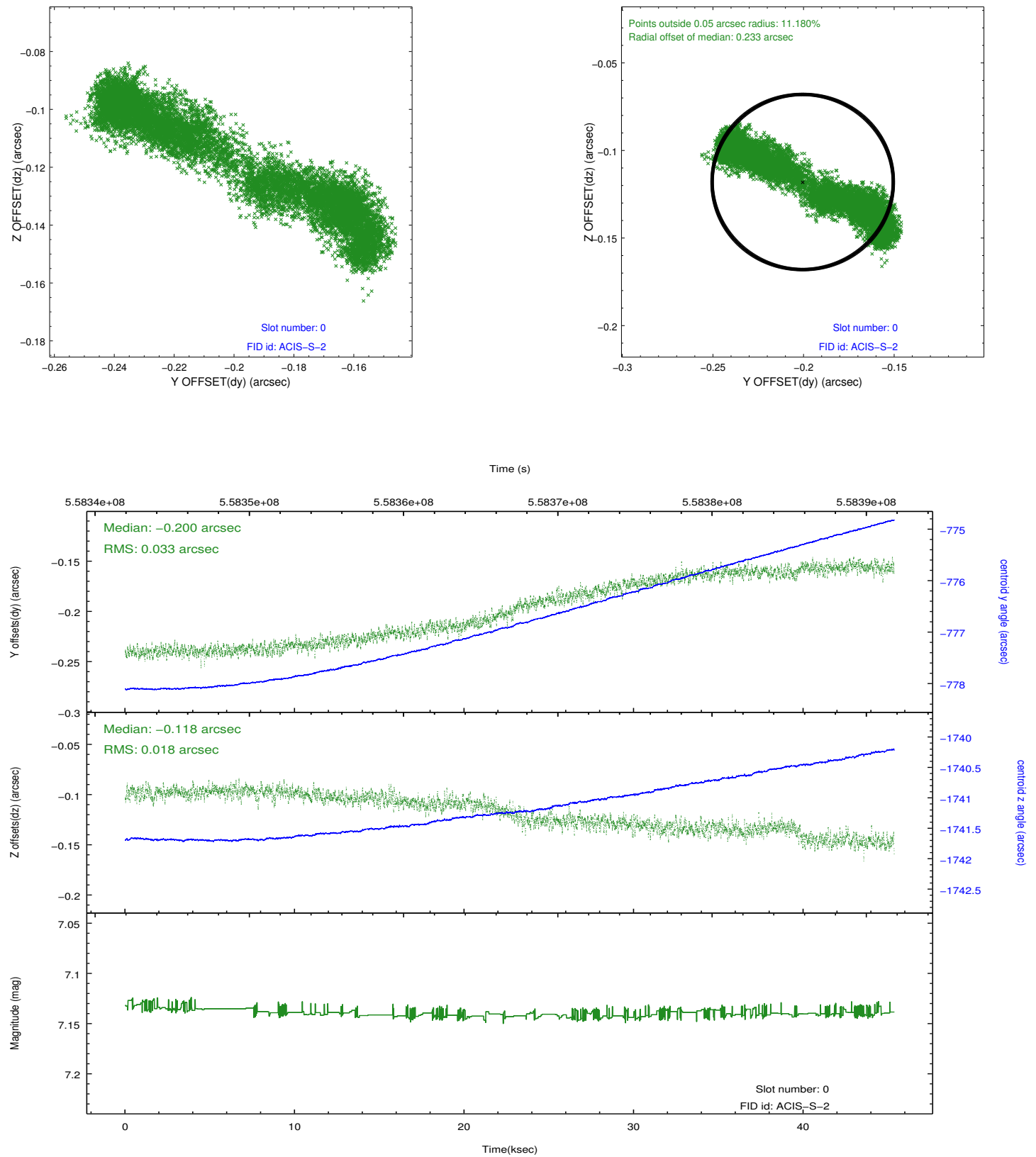


2.4.4 Slot 7

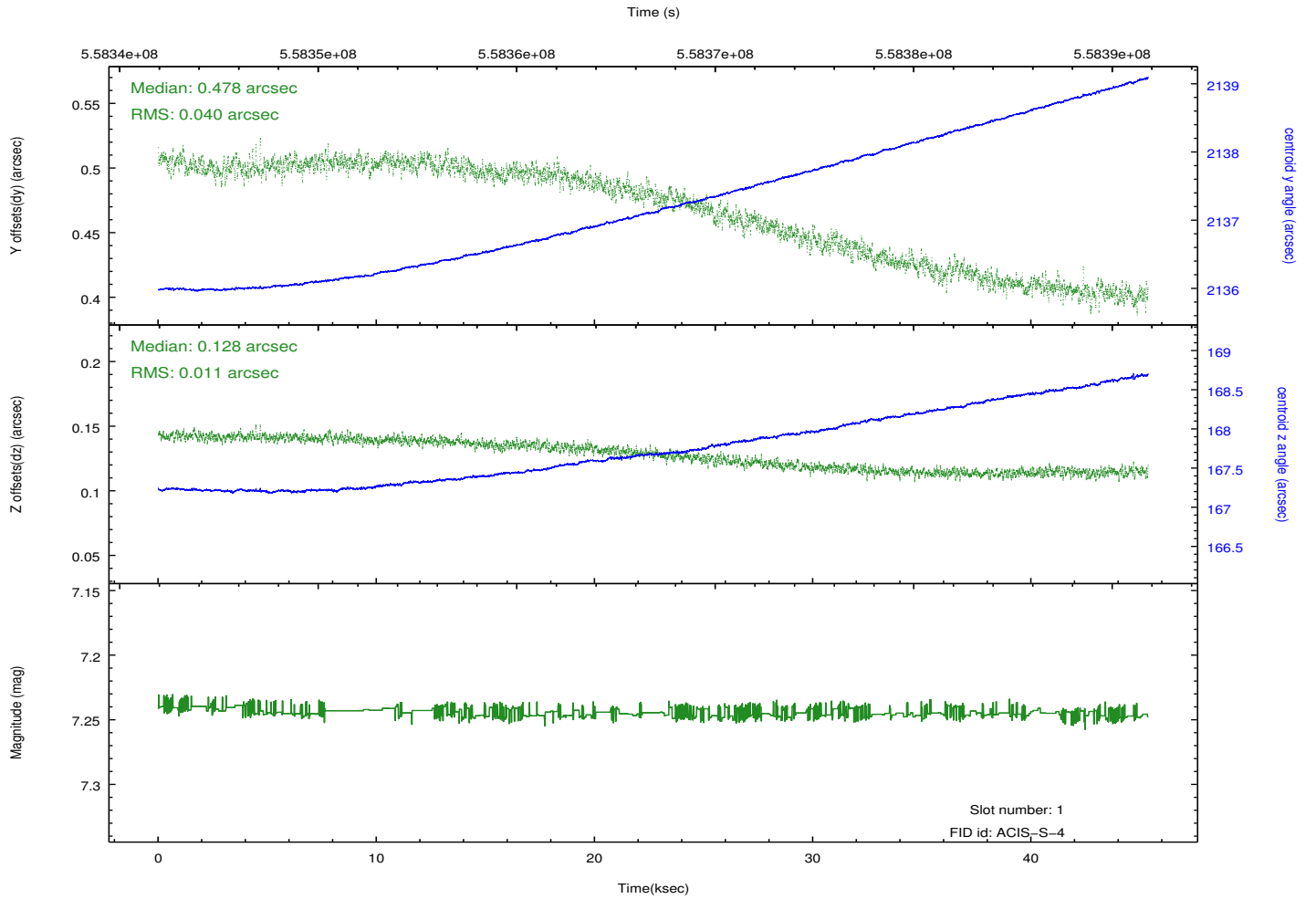
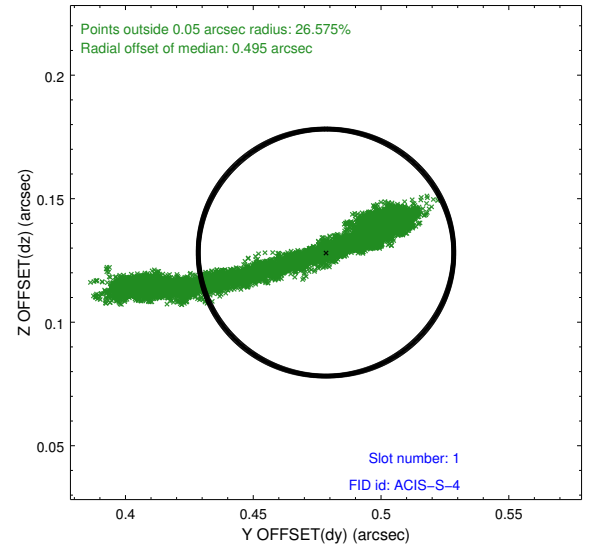
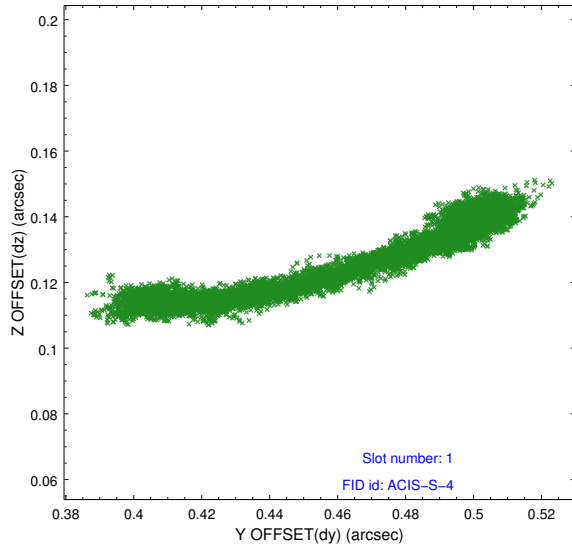


2.5 FID Slots

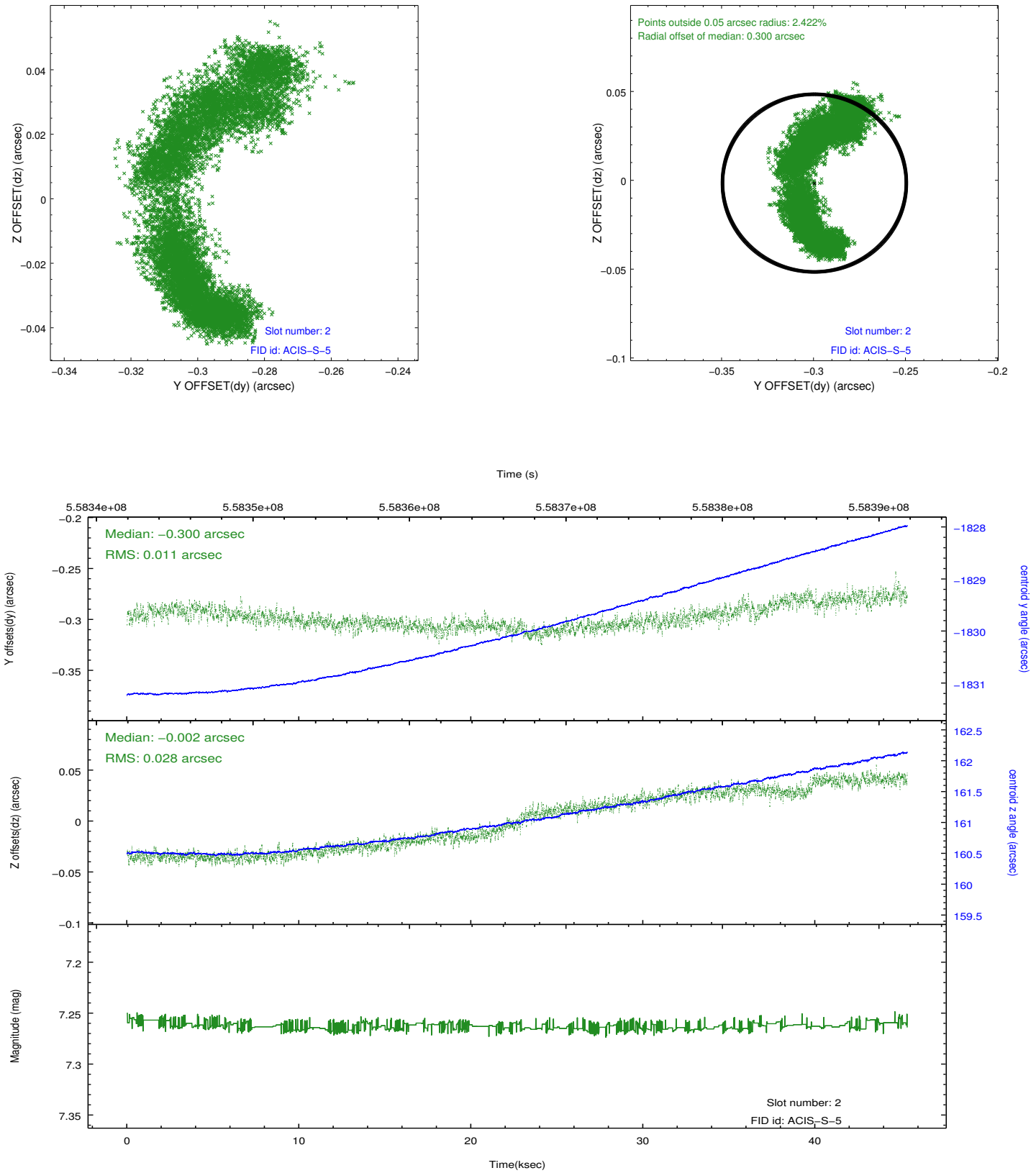
2.5.1 Slot 0



2.5.2 Slot 1



2.5.3 Slot 2



A Summary

A.1 Status

V&V Scientist	Beth Sundheim
V&V Date (YYYY-MM-DD)	2015.09.16
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	45.268526659966

A.2 Comments

Joint proposal with HST.

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 star from the solution.