

V&V Reference Report

L2 ASCDS Version : 8.4.3

Observation 7189 - L2 Version 2
Chandra X-Ray Center

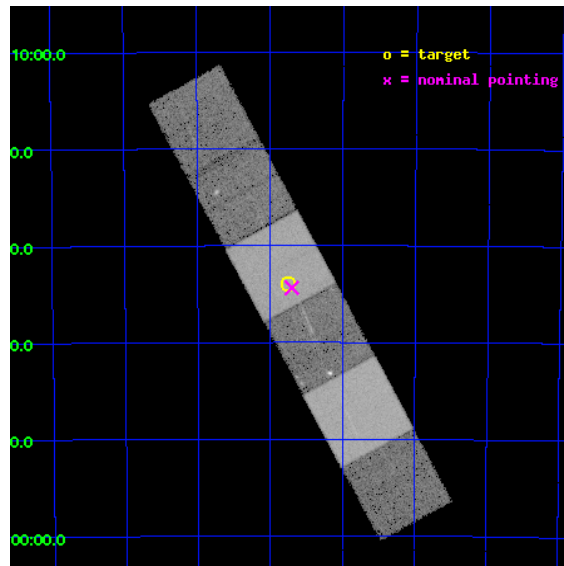
L2 Processing Date : Apr 4 2012

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1 Front

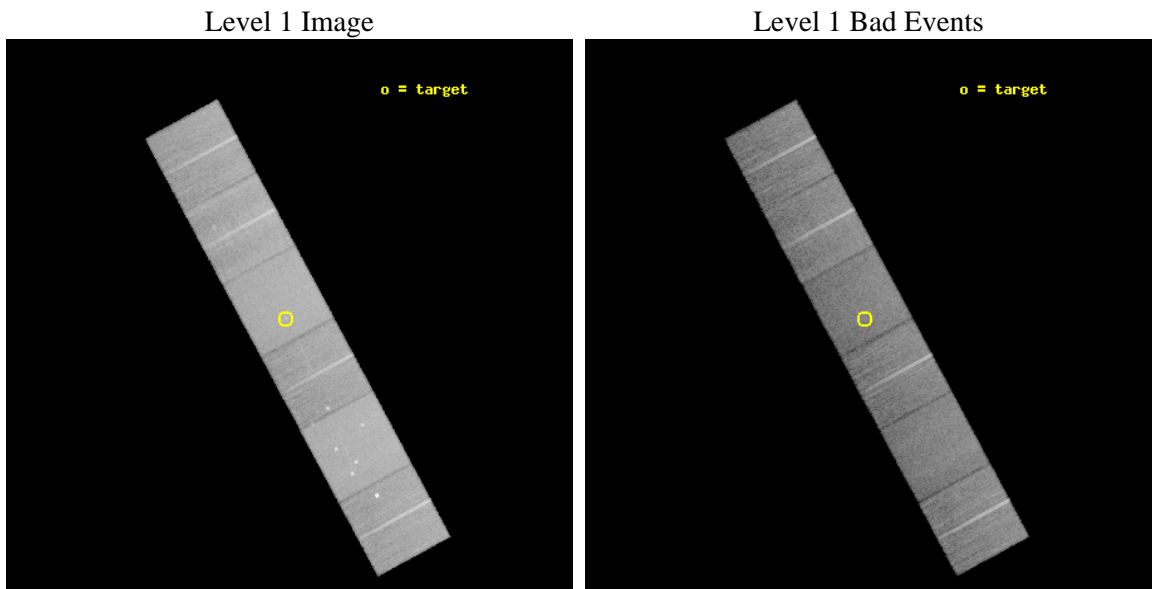
seq_num	200334	Sequence number
obs_id	7189	Observation id
title	A Chandra HETGS Survey of O-Stars	Proposal title
observer	Dr Wayne Waldron	Principal investigator
object	HD93250	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	161.1875	Observer's specified target RA [deg]
dec_targ	-59.565194	Observer's specified target Dec [deg]
ra_nom	161.17564771627	Nominal RA [deg]
dec_nom	-59.572801532677	Nominal Dec [deg]
roll_nom	241.64640832188	Nominal Roll [deg]
revision	2	Processing version of data
ontime	17948.799933136	Sum of GTIs [s]
livetime	17721.521420912	Livetime [s]
ontime4	17948.799933136	Sum of GTIs [s]
ontime5	17948.799933136	Sum of GTIs [s]
ontime6	17948.799933136	Sum of GTIs [s]
ontime7	17948.799933136	Sum of GTIs [s]
ontime8	17948.765767306	Sum of GTIs [s]
ontime9	17948.724727333	Sum of GTIs [s]
l2events	284460	Number of level 2 events



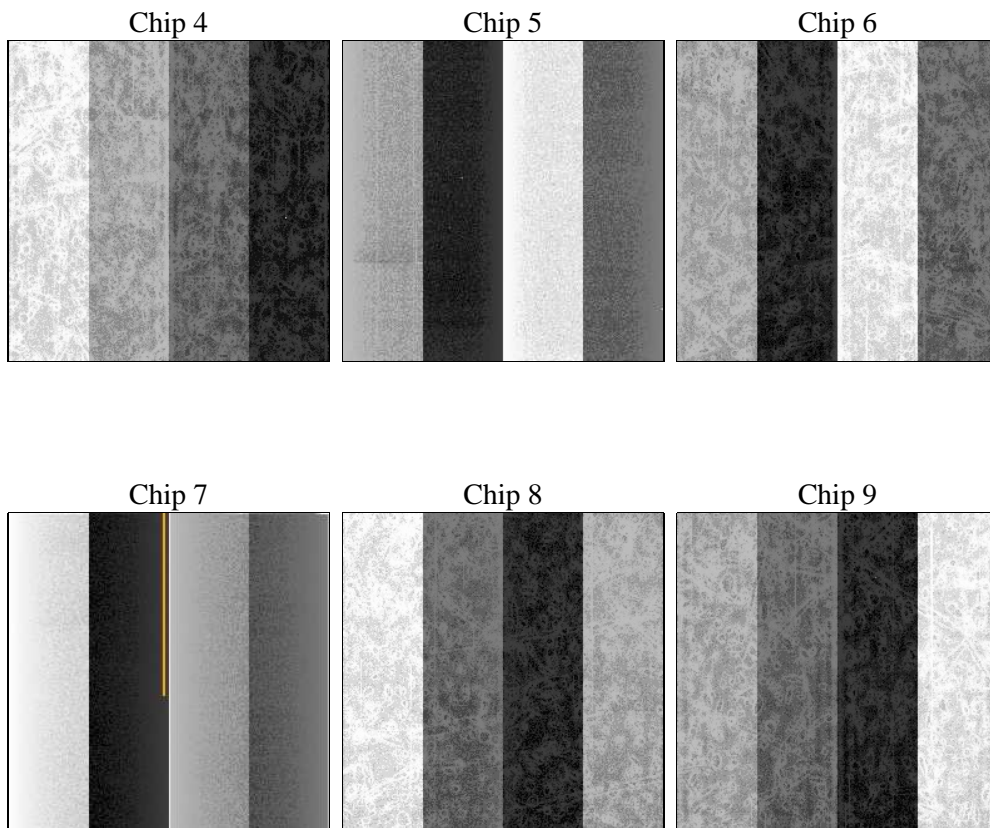
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	18000.000000	[s] Scheduled observation exposure time
ascdsver	8.4.3	Processing system revision	ontime	17948.799933136	Sum of GTIs [s]
caldsver	4.4.9	 	ontime4	17948.799933136	Sum of GTIs [s]
date	2012-04-04T00:48:04	Date and time of file creation	ontime5	17948.799933136	Sum of GTIs [s]
revision	2	Processing version of data	ontime6	17948.799933136	Sum of GTIs [s]
			ontime7	17948.799933136	Sum of GTIs [s]
			ontime8	17948.765767306	Sum of GTIs [s]
			ontime9	17948.724727333	Sum of GTIs [s]
			l1events	1215968	Number of level 1 events

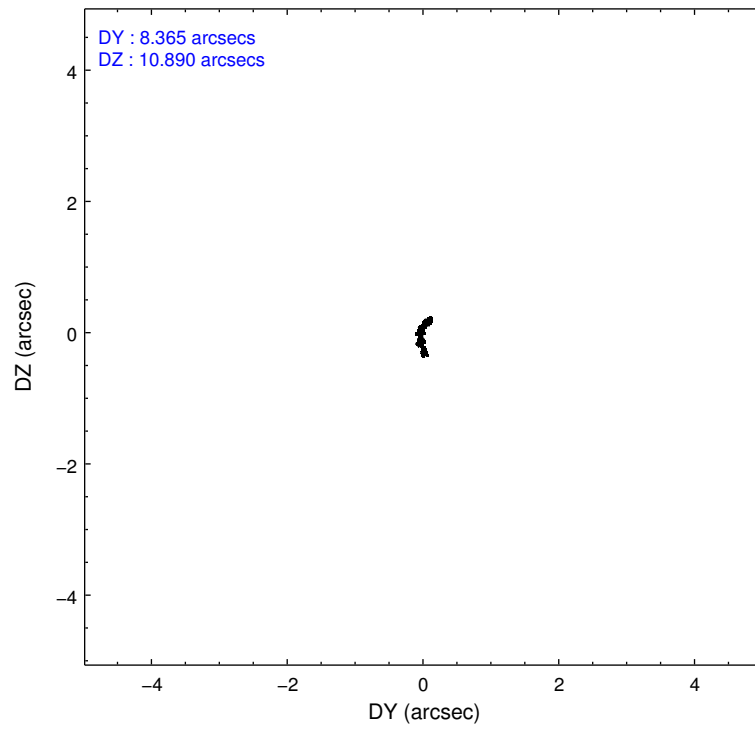
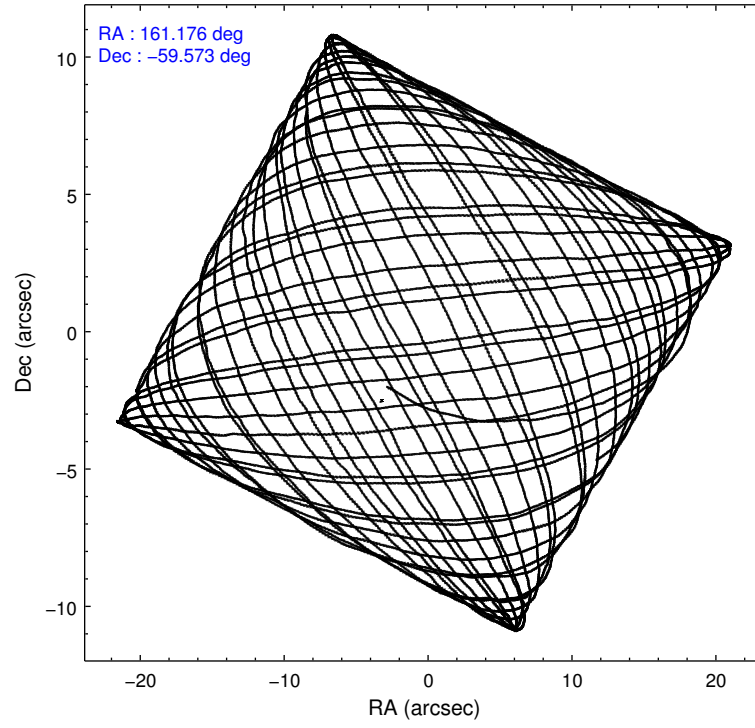
2.1.4 Events

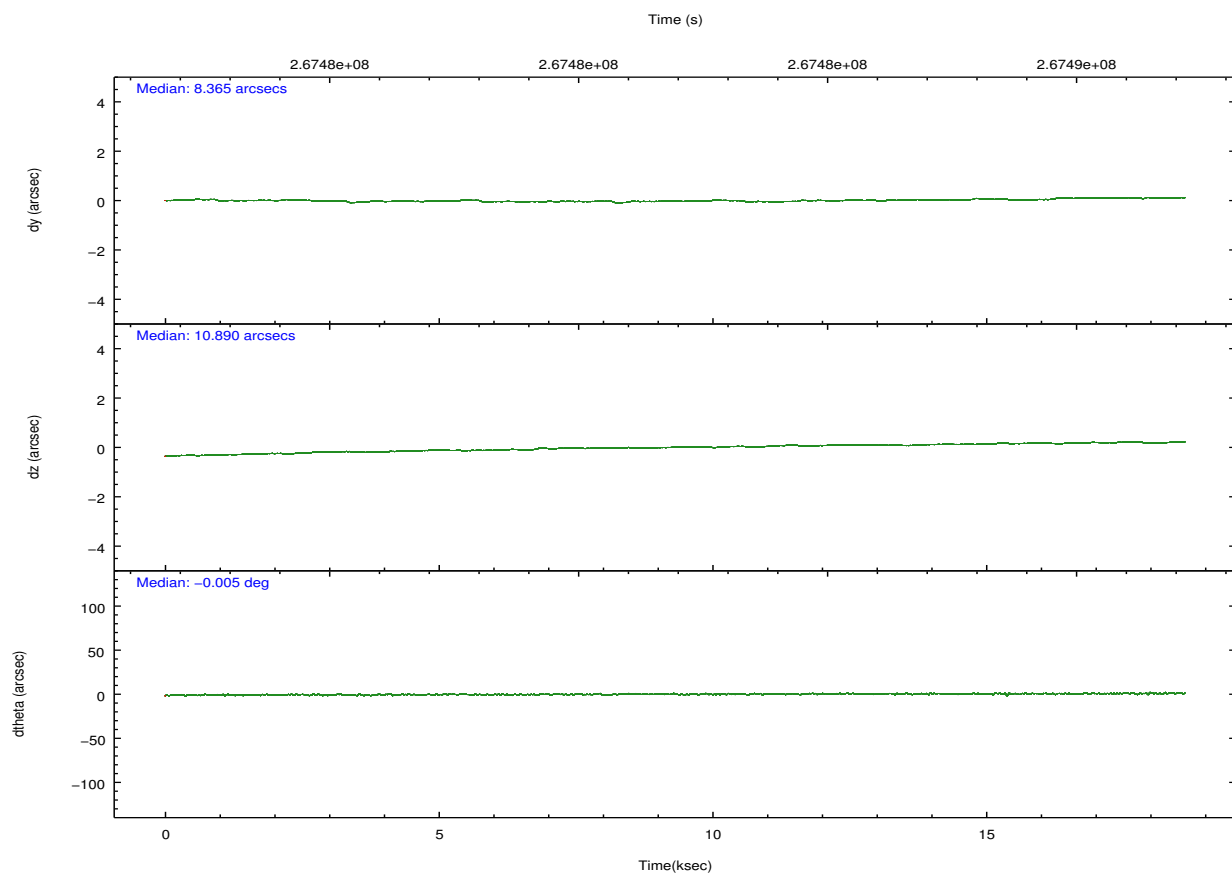
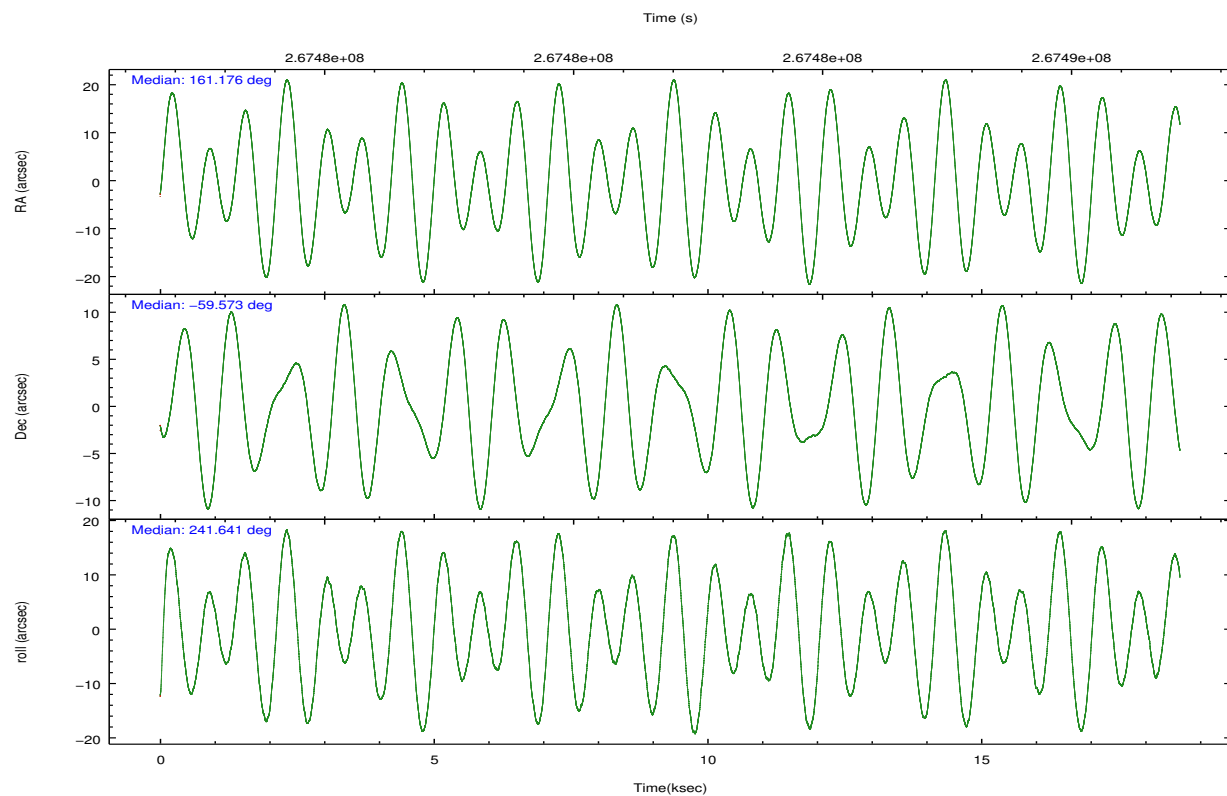
	ccd 4	ccd 5	ccd 6	ccd 7	ccd 8	ccd 9		ccd 4	ccd 5	ccd 6	ccd 7	ccd 8	ccd 9
level 1 events	192594	253454	169008	226556	207432	166924	grade 0 events	15639	12762	12164	8916	15672	9042
rejected events	165489	134578	143836	130550	160876	145956		8%	5%	7%	3%	7%	5%
rejected %	85%	53%	85%	57%	77%	87%	grade 1 events	192	321	102	225	175	119
								0%	0%	0%	0%	0%	0%
							grade 2 events	4317	35670	4808	19588	10059	3958
								2%	14%	2%	8%	4%	2%
							grade 3 events	2061	4725	2083	8235	4809	2061
								1%	1%	1%	3%	2%	1%
							grade 4 events	1946	4505	1968	8290	4478	1940
								1%	1%	1%	3%	2%	1%
							grade 5 events	7262	17966	7492	20868	9926	8014
								3%	7%	4%	9%	4%	4%
							grade 6 events	3153	61250	4153	51001	11544	3974
								1%	24%	2%	22%	5%	2%
							grade 7 events	158024	116255	136238	109433	150769	137816
								82%	45%	80%	48%	72%	82%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-456789	ACIS-456789	Obspar file type	PREDICTED	ACTUAL
Grating	HETG	HETG	Obspar update status	NONE	UPDATED
Data mode	FAINT	FAINT	Number of optional ACIS chips dropped	0	0
Observation mode	POINTING	POINTING	On-chip summing requested	N	N
[deg] Pointing RA	161.173305	161.1756477162721	Subarray requested	NONE	NONE
[deg] Pointing Dec	-59.545608	-59.57280153267657	Alternating exposures requested	N	N
[deg] Pointing Roll	241.487765	241.6464083218843	[s] Primary exposure time	0.000000	3.2
[mm] SIM focus pos	-0.684267	-0.6828225247311905			
[mm] SIM defocus	0	0.001444936568705701			
[mm] SIM translation stage pos	-190.132523	-190.1425803651734			
[mm] SIM translation stage offset	0	0.01005778216563158			
[s] Observation start time (MET)	267473244.184000	267471918.25219			
Observation start date	2006-06-23T18:06:19	2006-06-23T17:45:18			
[s] Observation end time (MET)	267491244.184000	267492443.87815			
Observation end date	2006-06-23T23:06:19	2006-06-23T23:27:23			
Read mode	TIMED	TIMED			

2.3 Aspect



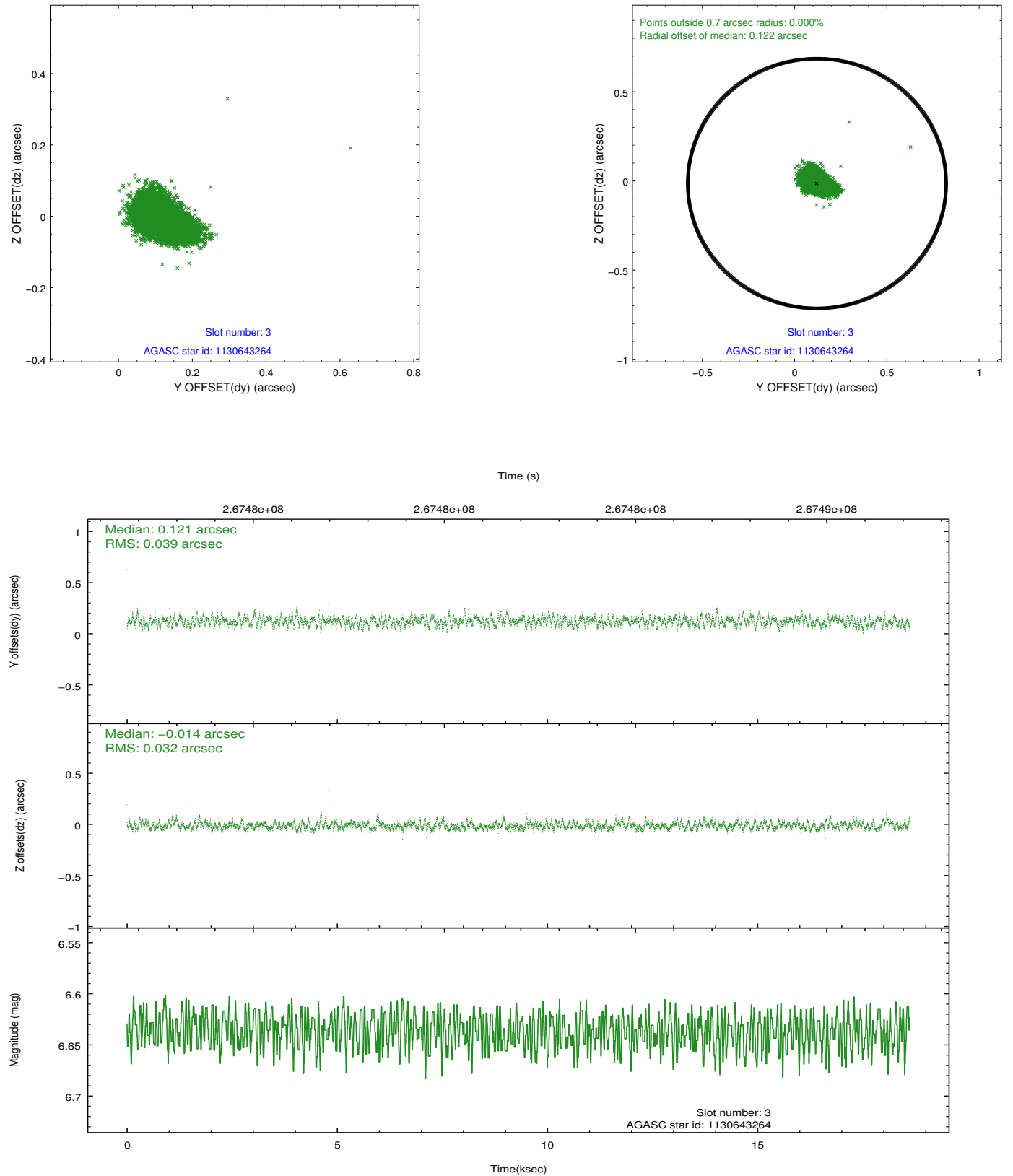


Slot Statistics

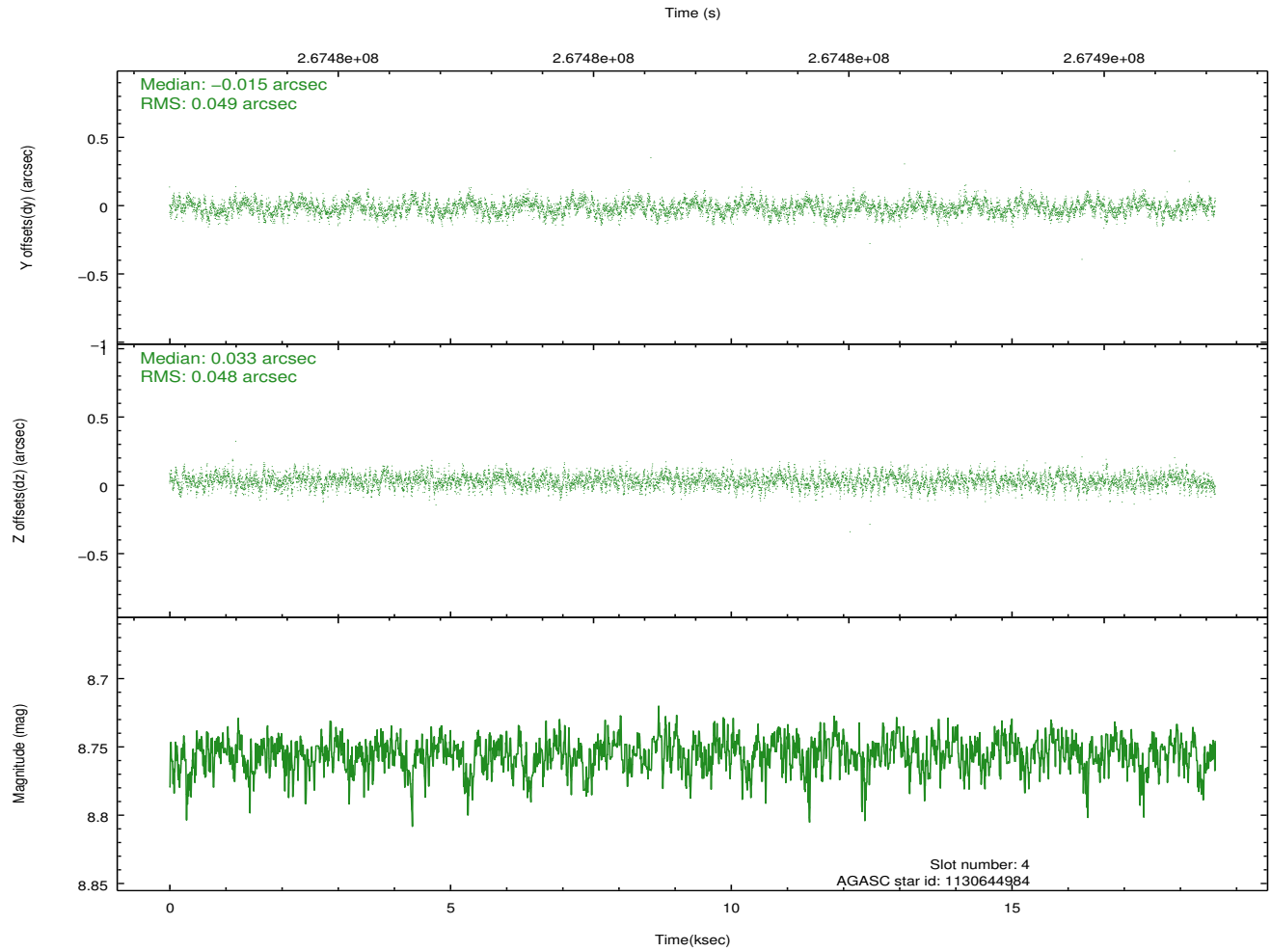
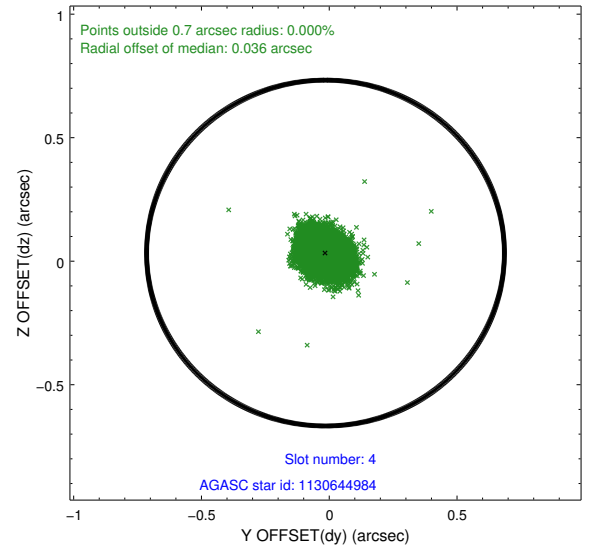
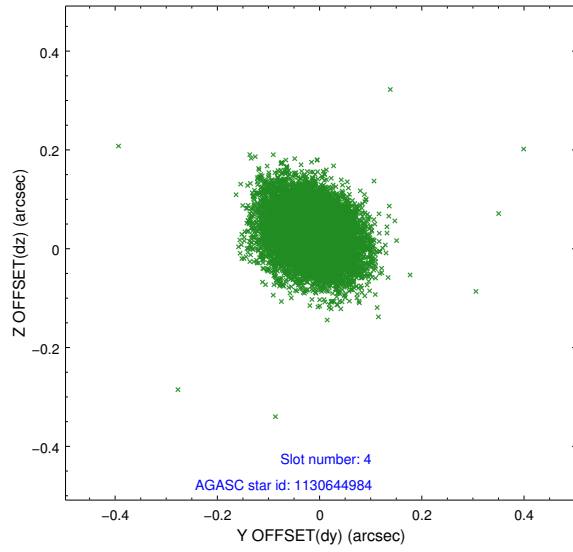
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-S-1	7.19	4544	0.059	-0.082	0.011	0.021	0.000000	0.000000	934.94	-1727.80
1	FID	ACIS-S-5	7.24	4542	-0.118	0.028	0.007	0.012	0.000000	0.000000	-1814.12	169.65
2	FID	ACIS-S-6	7.35	4543	0.037	0.065	0.009	0.016	0.000000	0.000000	400.24	813.88
3	GUIDE	1130643264	6.64	9087	0.121	-0.014	0.053	0.089	160.322990	-59.676912	1162.30	-1127.53
4	GUIDE	1130644984	8.76	9081	-0.015	0.033	0.073	0.117	162.123834	-59.745452	-179.74	1864.18
5	GUIDE	1130630792	8.81	9083	-0.224	-0.086	0.071	0.116	160.614173	-58.659021	-2300.80	-2441.64
6	GUIDE	1130645296	9.07	9083	0.037	-0.096	0.102	0.165	162.541185	-59.548371	-1160.14	2209.46
7	GUIDE	1174027824	9.16	9075	0.078	0.163	0.085	0.139	161.465908	-60.192420	1797.28	1572.66

2.4 Star Slots

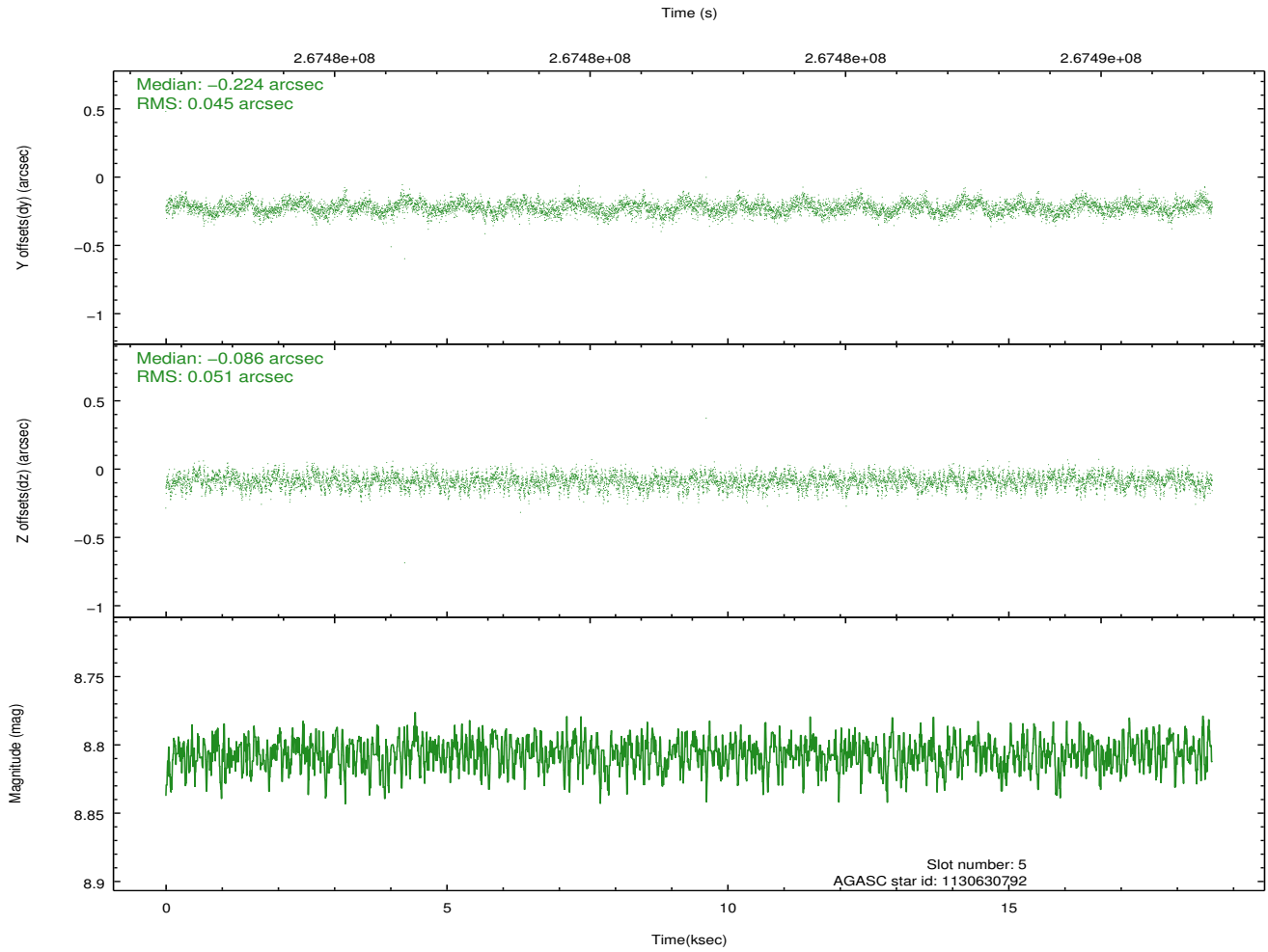
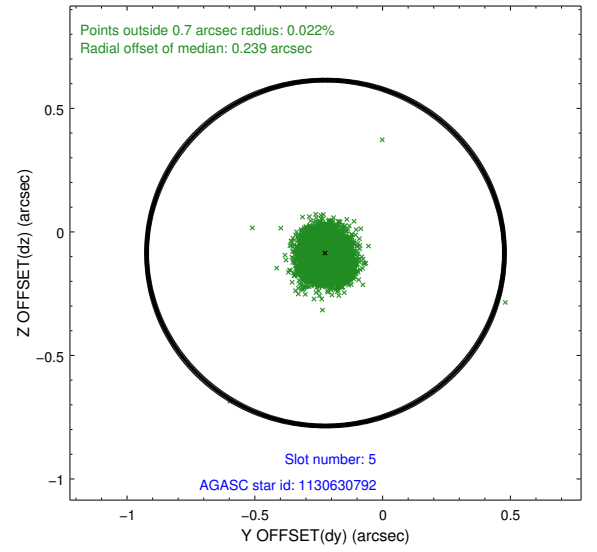
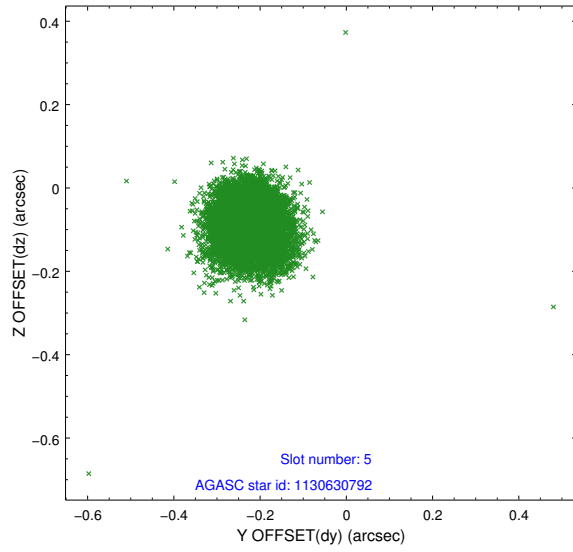
2.4.1 Slot 3



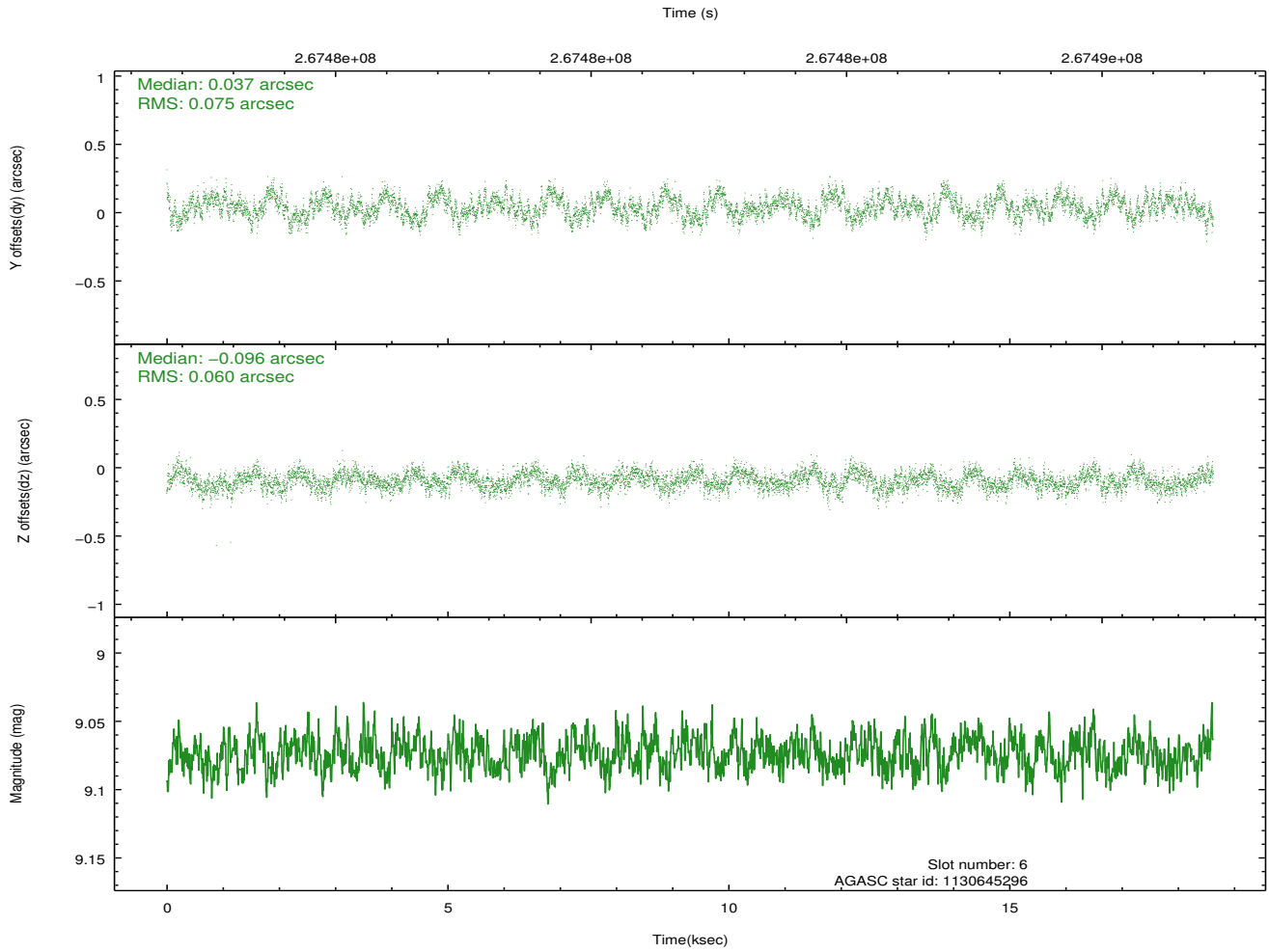
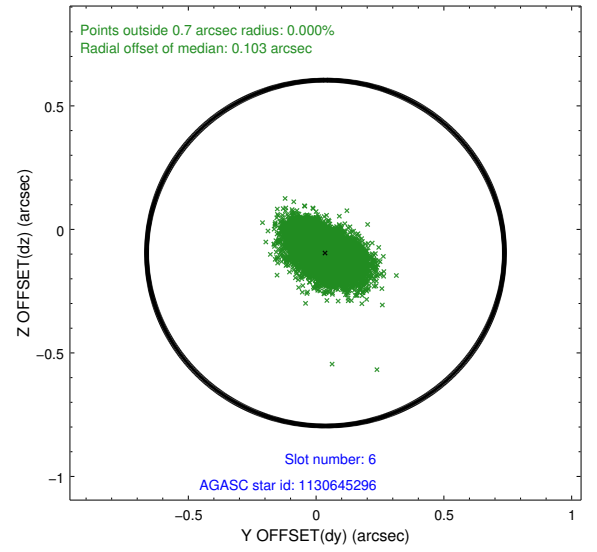
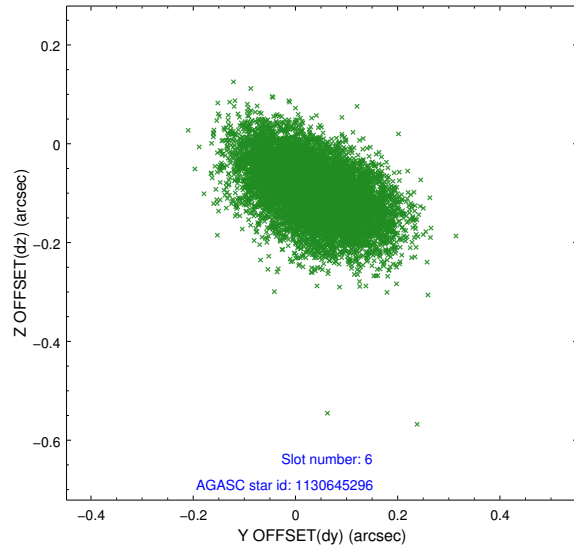
2.4.2 Slot 4



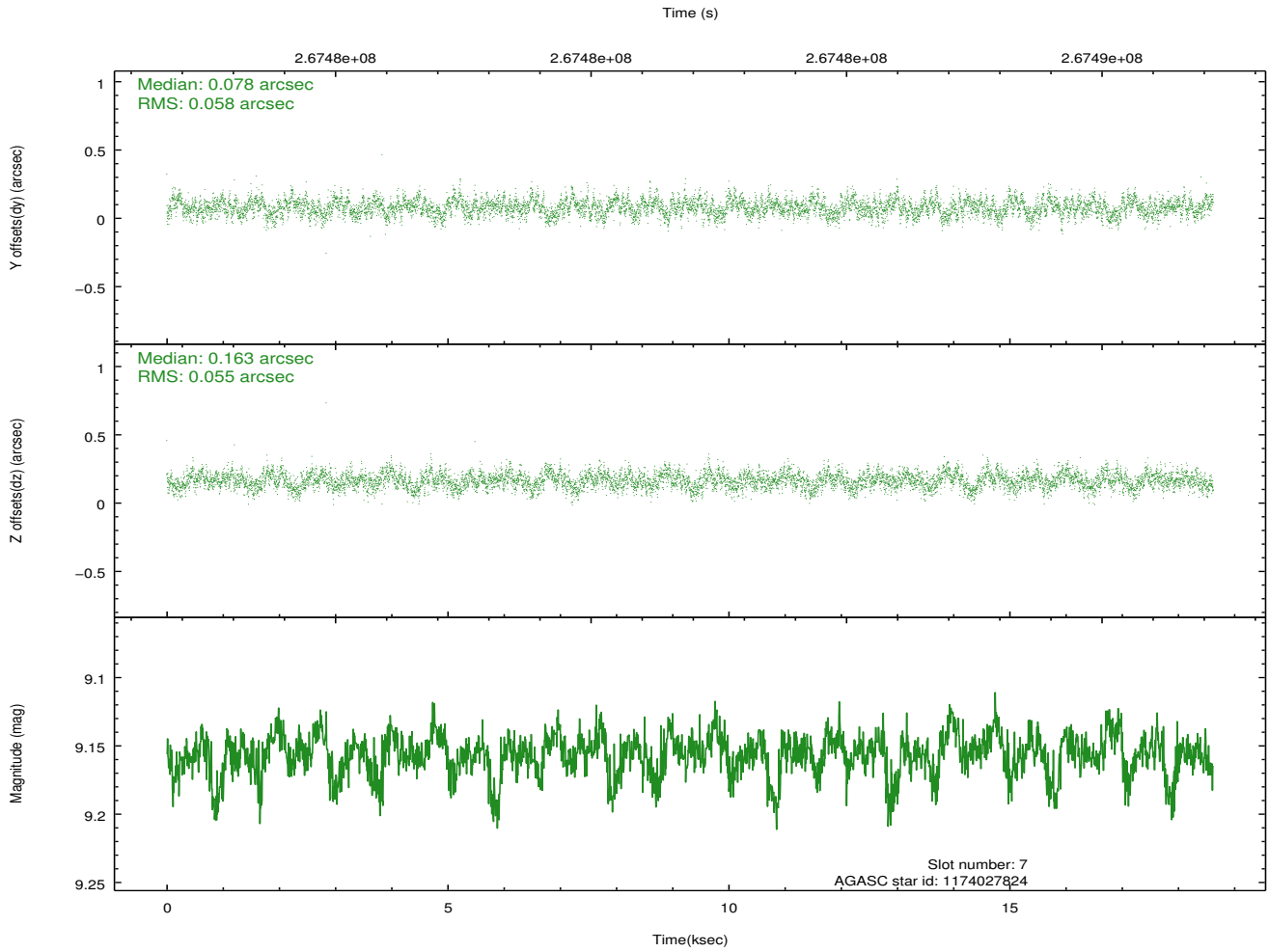
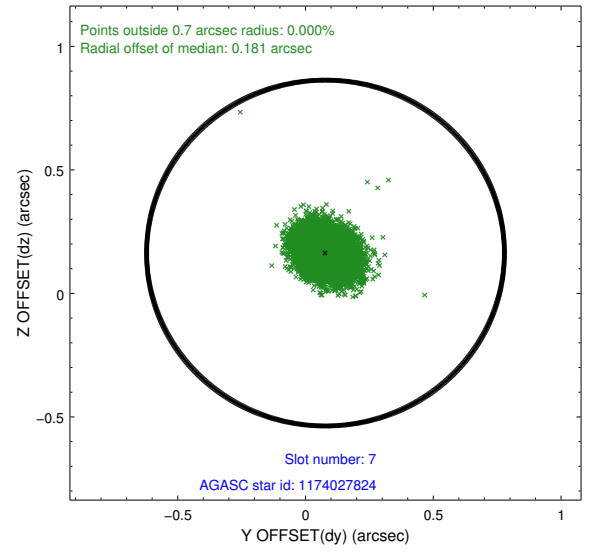
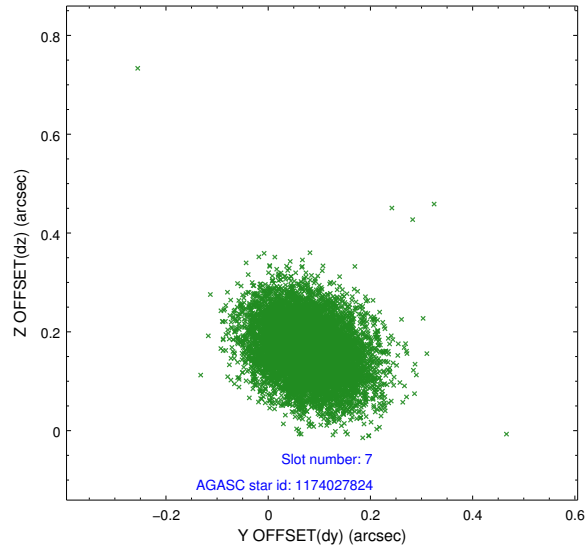
2.4.3 Slot 5



2.4.4 Slot 6

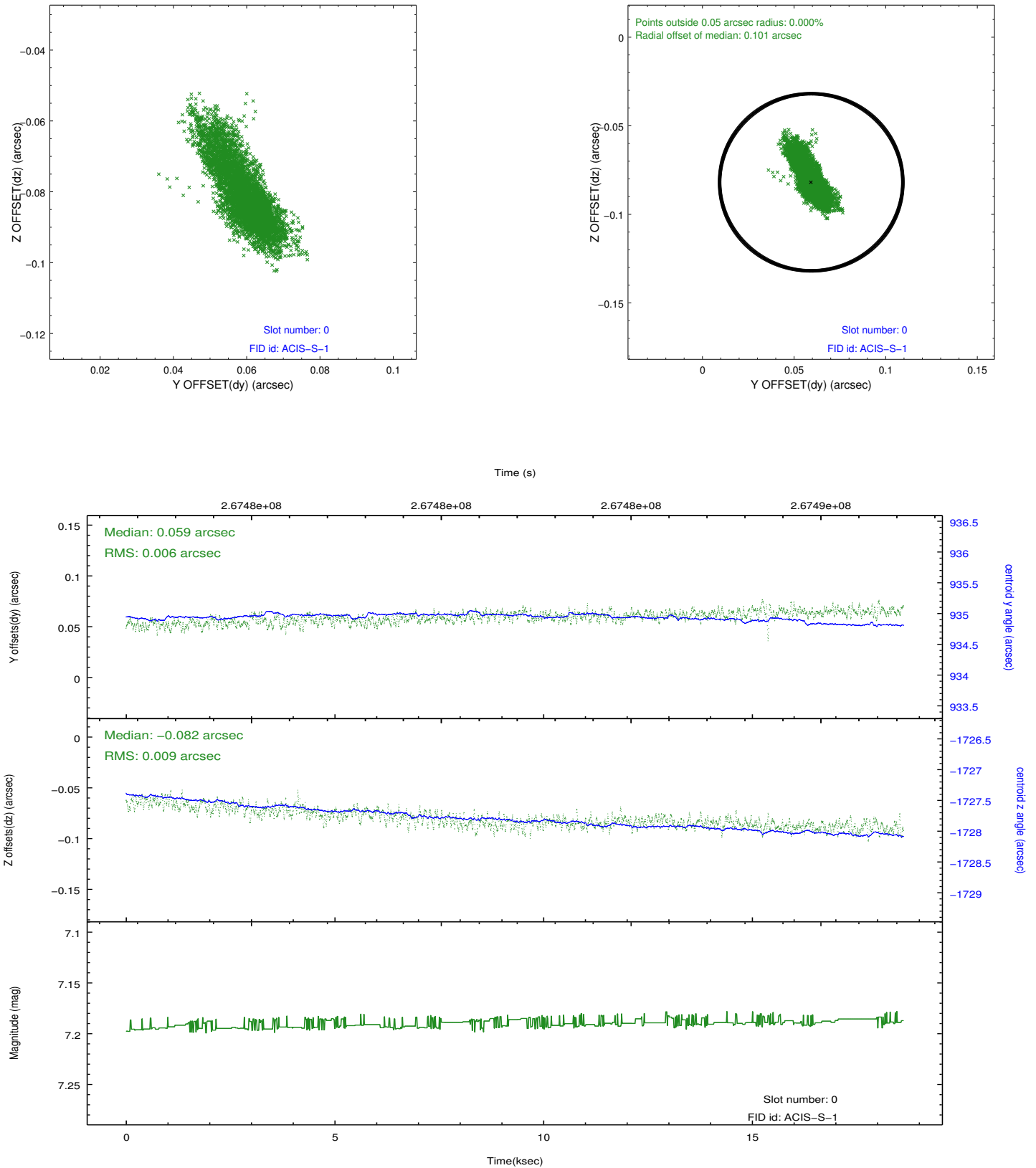


2.4.5 Slot 7

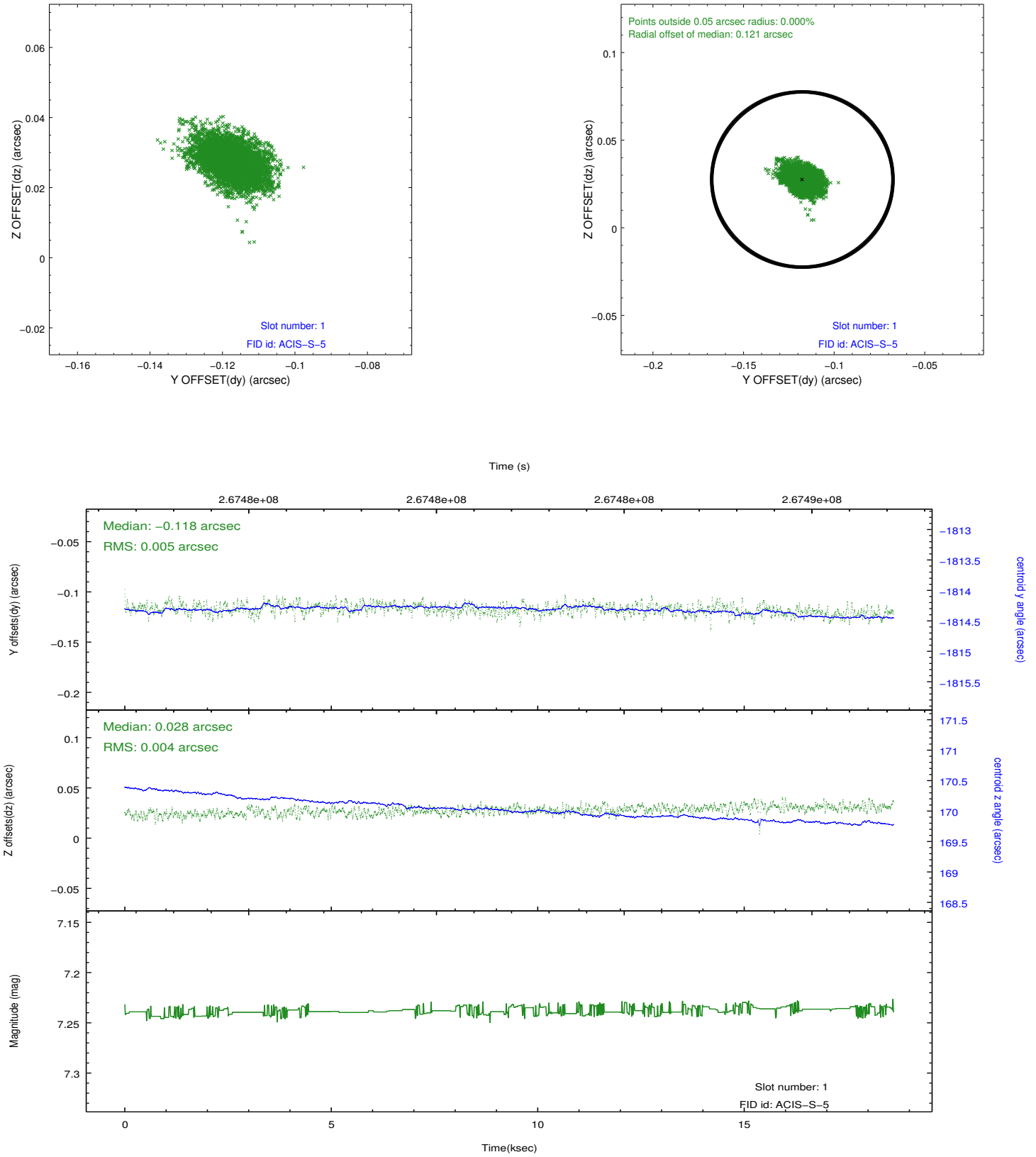


2.5 FID Slots

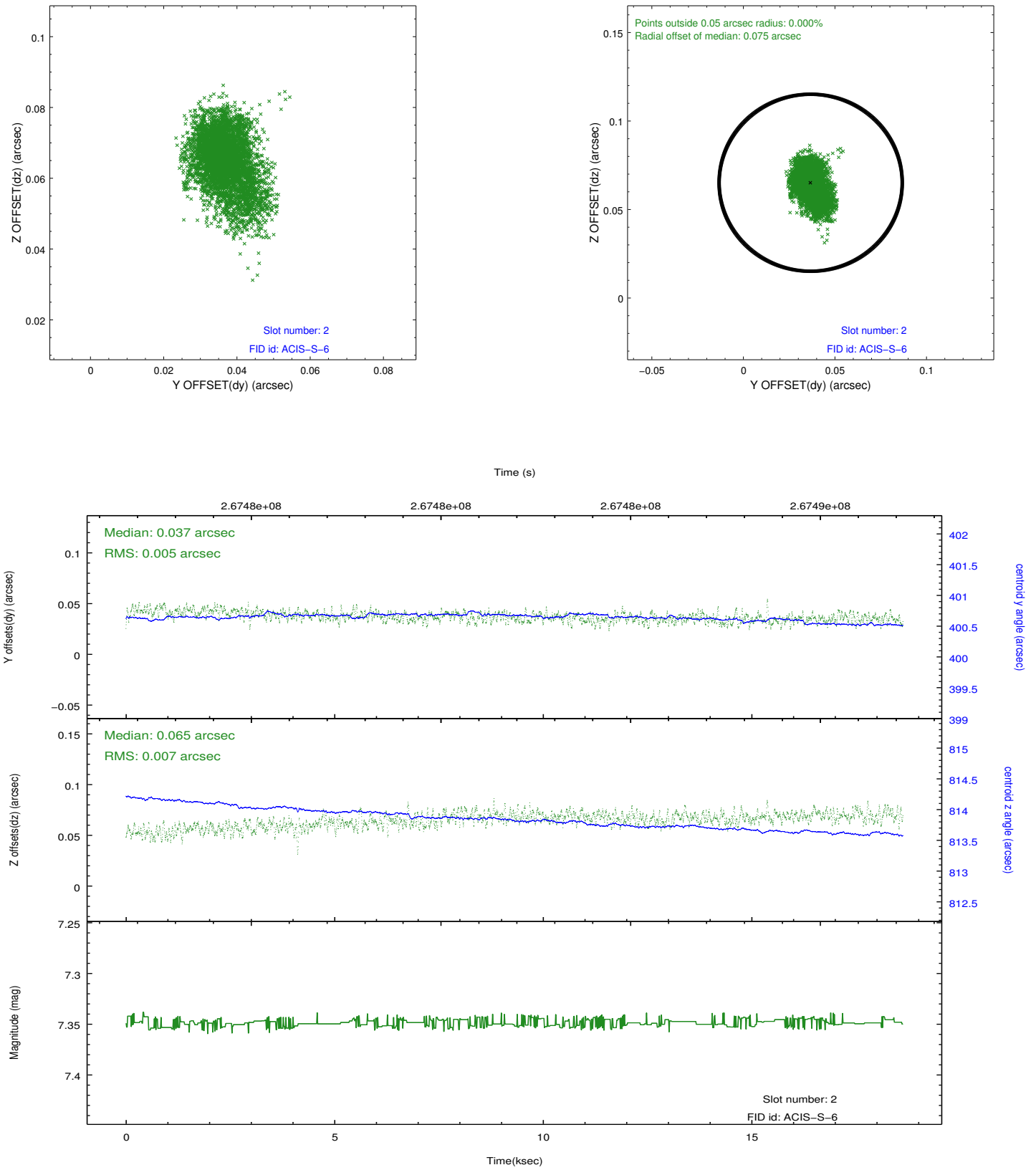
2.5.1 Slot 0



2.5.2 Slot 1

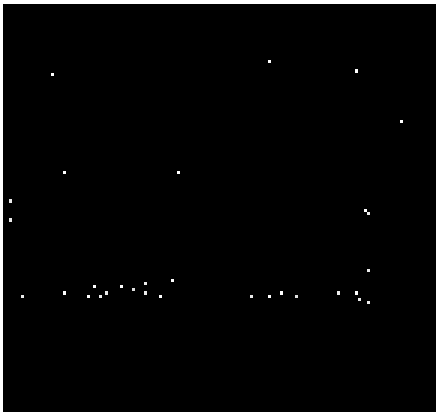


2.5.3 Slot 2

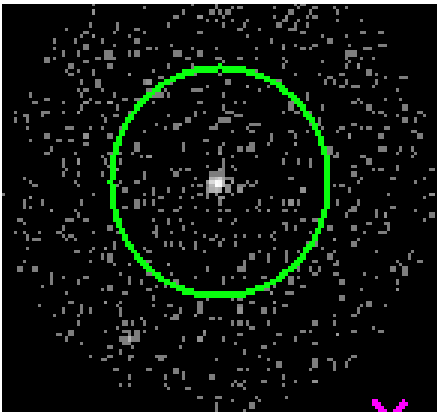


3 Gratings

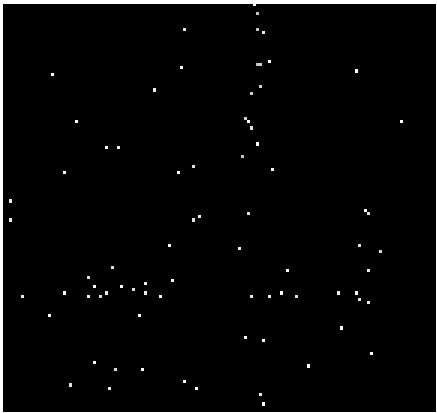
3.1 HEG Arm



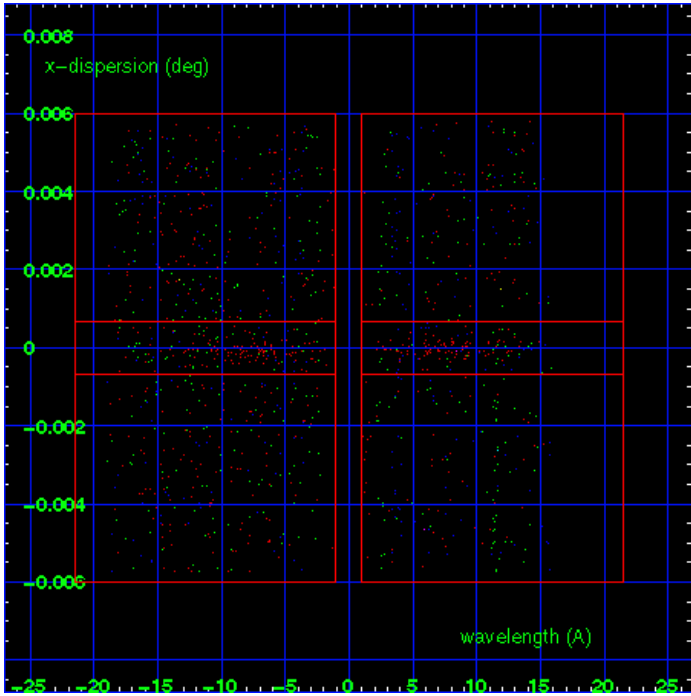
HEG Order Sort 123



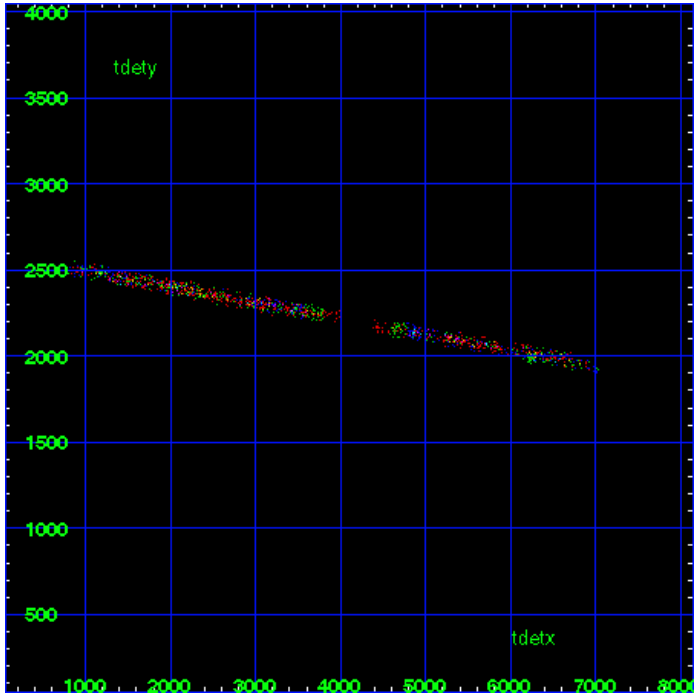
HEG Zero Order



HEG Order Sort ALL

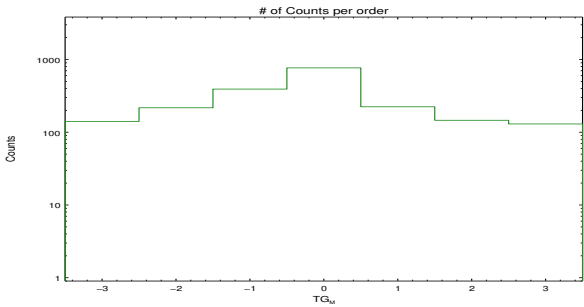


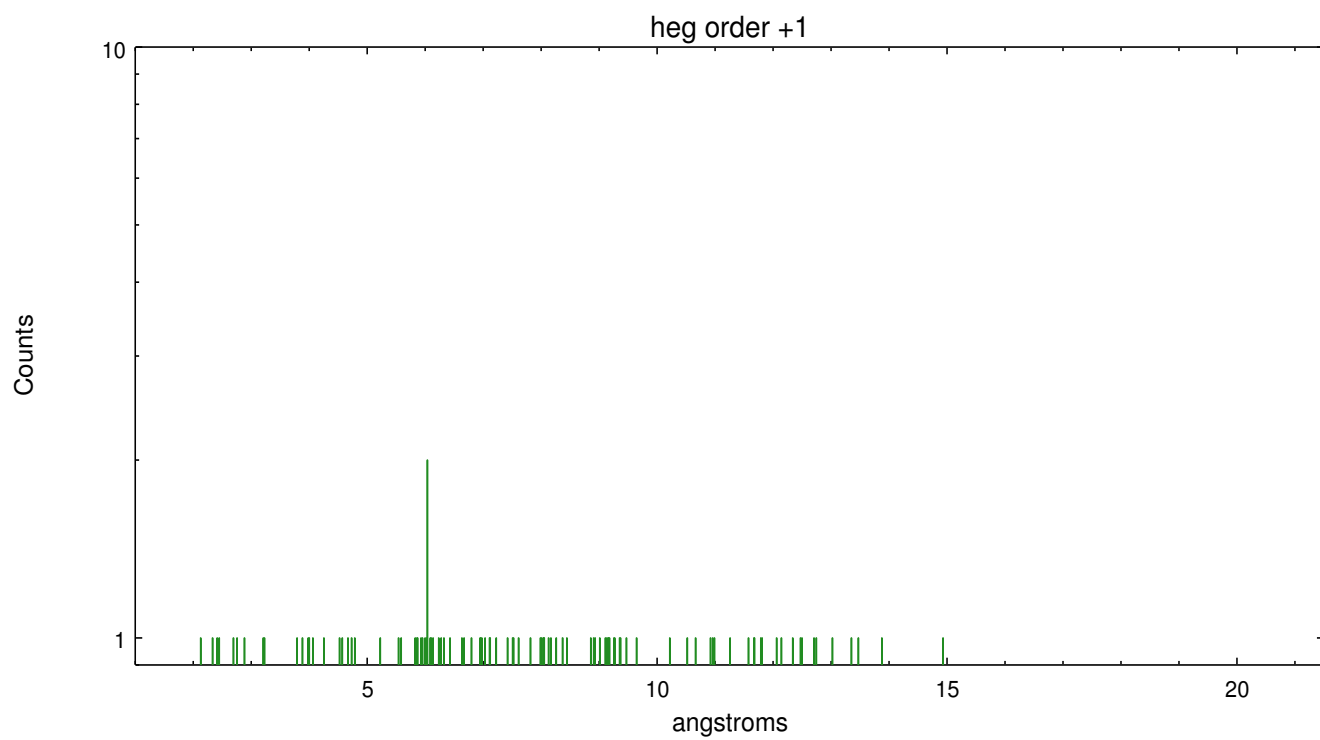
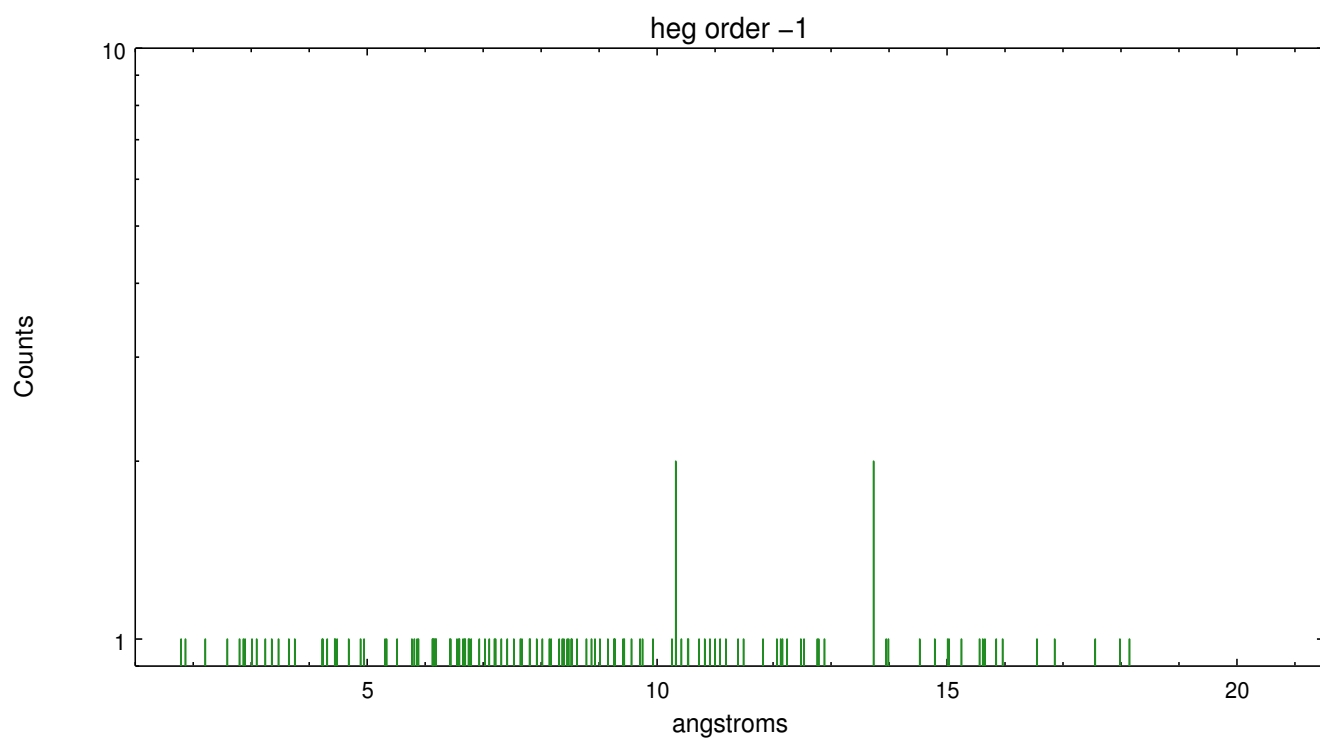
Spot Image HEG



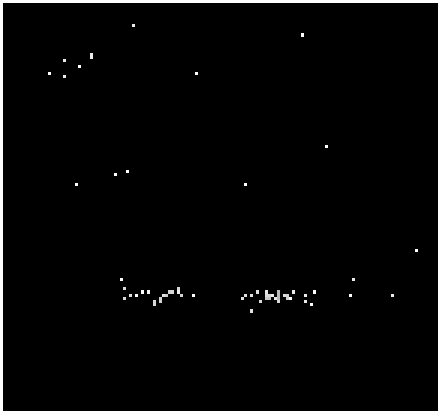
Full Detector HEG

	order -3	order -2	order -1	order 0	order 1	order 2	order 3
Events	141	217	392	767	224	146	130

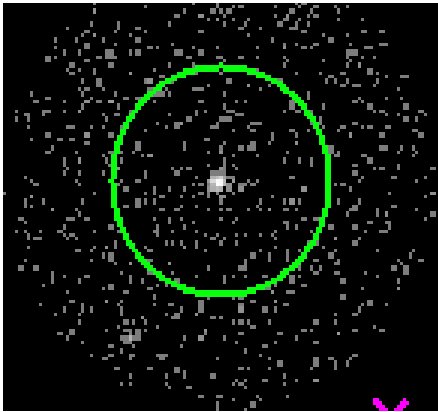




3.2 MEG Arm



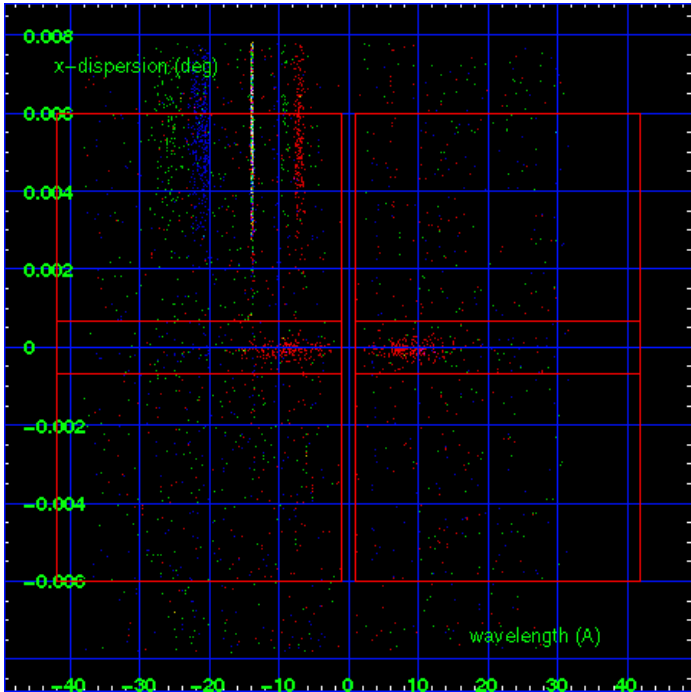
MEG Order Sort 123



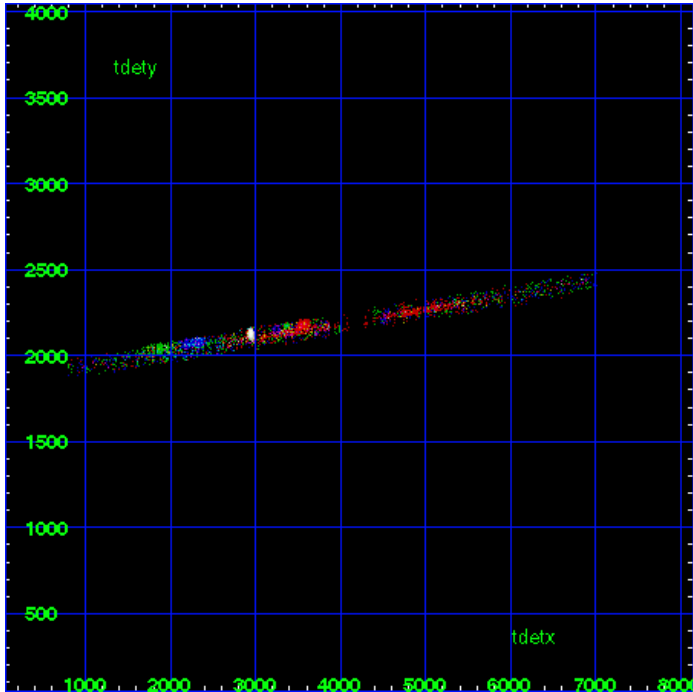
MEG Zero Order



MEG Order Sort ALL

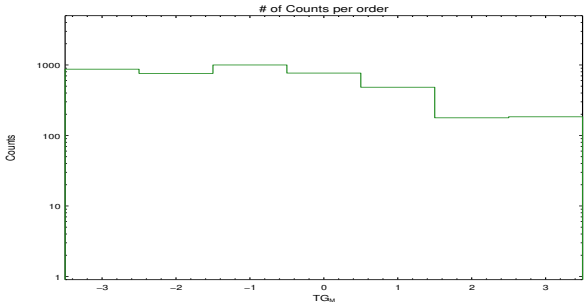


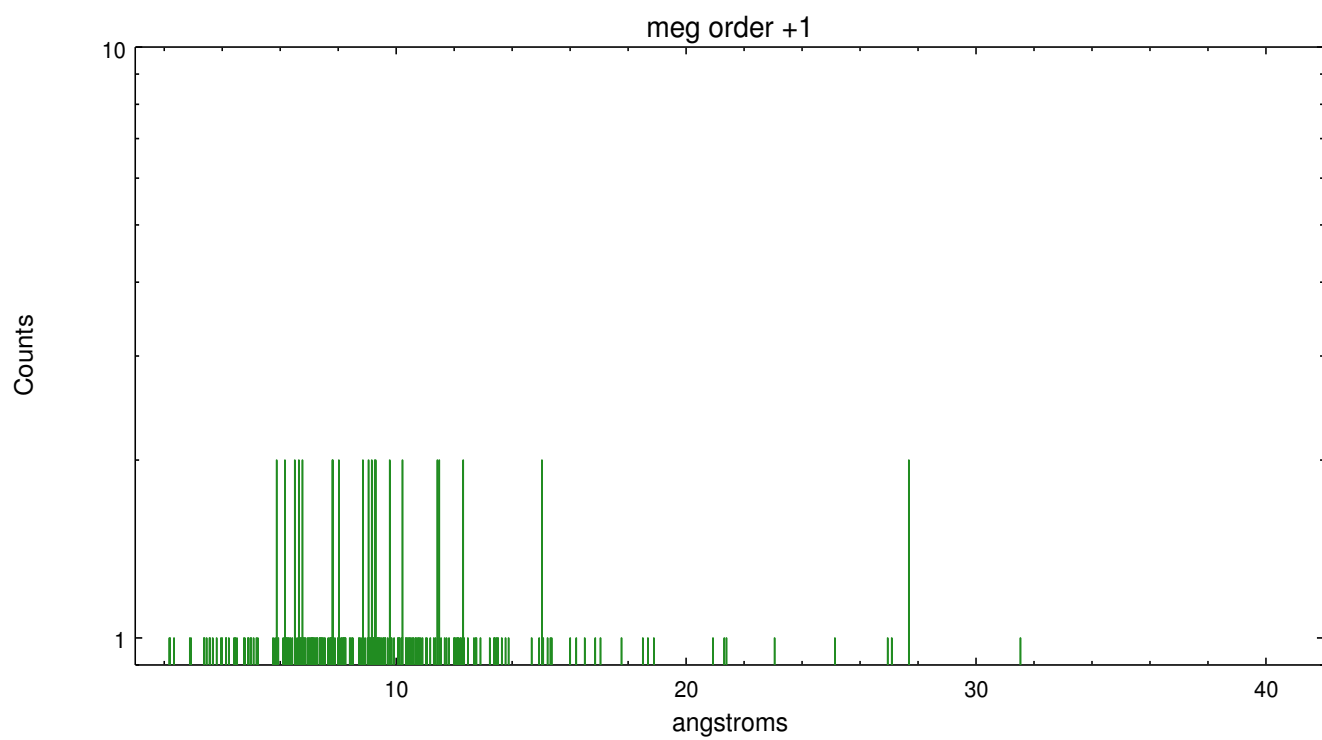
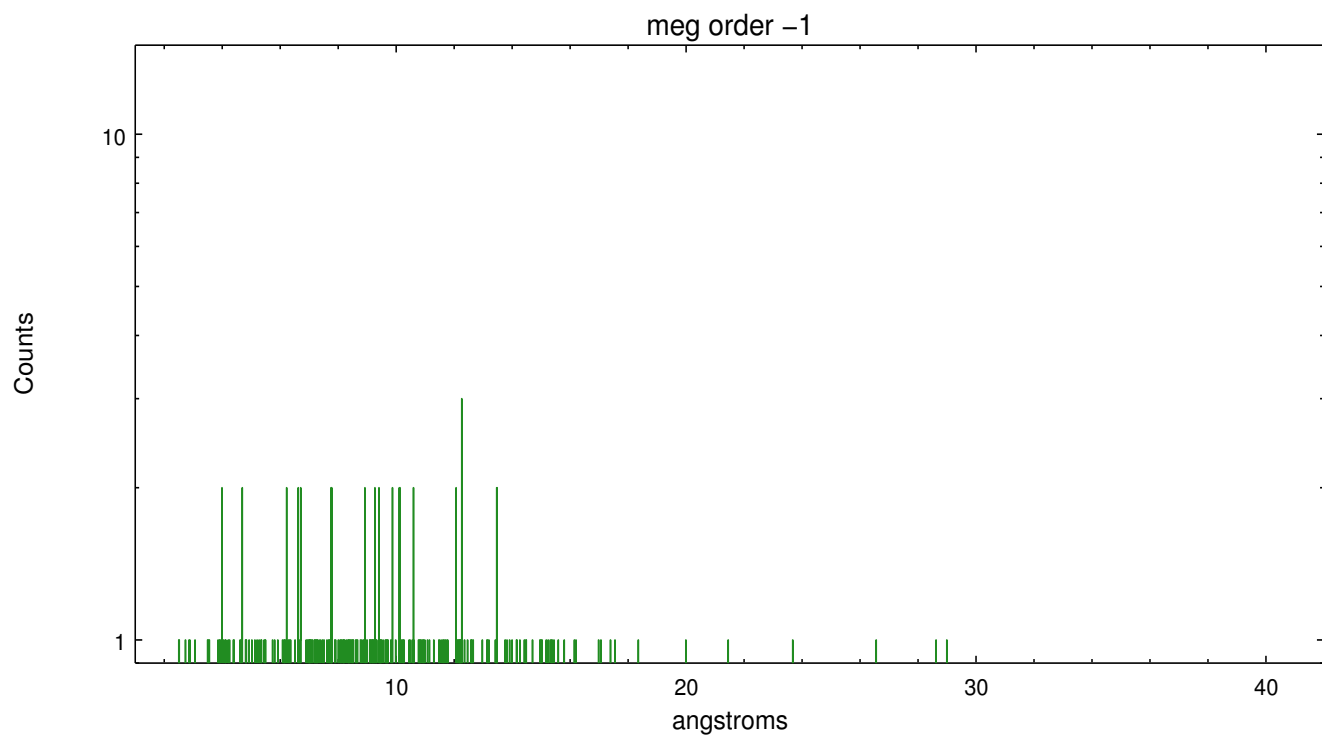
Spot Image MEG



Full Detector MEG

	order -3	order -2	order -1	order 0	order 1	order 2	order 3
Events	871	759	1000	767	483	178	184





A Summary

A.1 Status

V&V Scientist	Joy Nichols
V&V Date (YYYY-MM-DD)	2012.04.09
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	17.9487999

A.2 Comments

Multiple sources in the field may cause contamination of the primary extraction at some wavelengths. Extraction is of HD 93250. Warning: HD 93162 is within the background region on the MEG minus arm at about 12-13A. The background will be contaminated in this region. Broad dispersed spectral arms are also seen. This off-axis source appears adequately rejected by order-sorting and binning from the default source region. Features may appear in the background spectrum.