

V&V Reference Report

L2 ASCDS Version : 8.4.5

Observation 599 - L2 Version 4
Chandra X-Ray Center

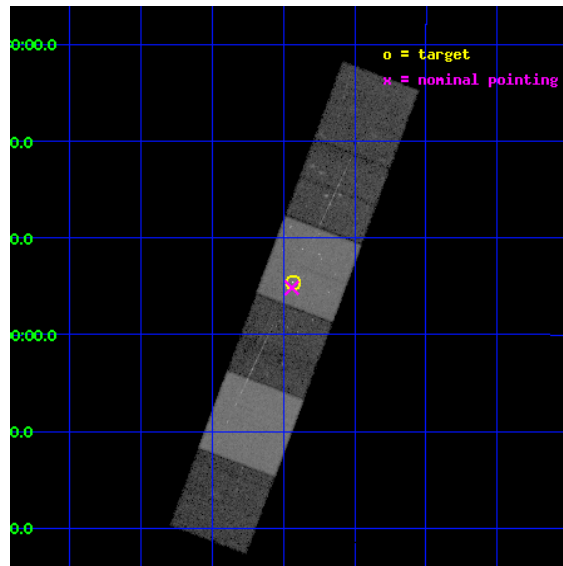
L2 Processing Date : Sep 16 2012

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
3	Gratings	17
3.1	HEG Arm	17
3.2	MEG Arm	19
A	Summary	21
A.1	Status	21
A.2	Comments	21

1 Front

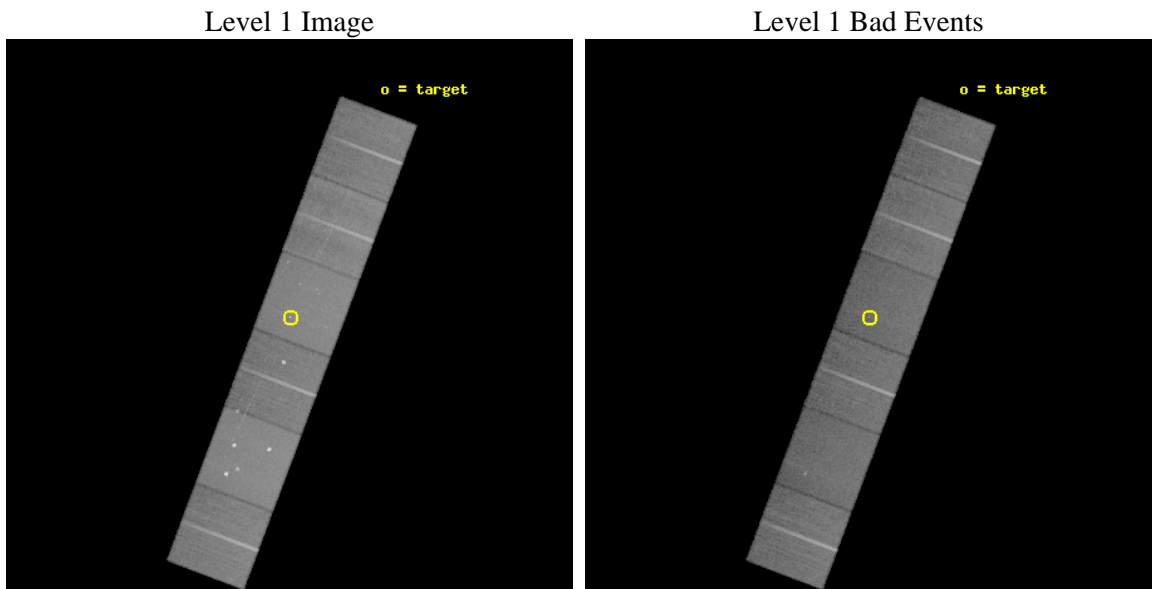
seq_num	200075	Sequence number
obs_id	599	Observation id
title	COLLIDING STELLAR WINDS IN IOTA ORIONIS.	Proposal title
observer	Prof Claude Canizares	Principal investigator
object	IOTA ORIONIS	Source name
dtycycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	83.858333	Observer's specified target RA [deg]
dec_targ	-5.909722	Observer's specified target Dec [deg]
ra_nom	83.860093259605	Nominal RA [deg]
dec_nom	-5.9193714608948	Nominal Dec [deg]
roll_nom	290.6569130895	Nominal Roll [deg]
revision	4	Processing version of data
ontime	37647.109858885	Sum of GTIs [s]
livetime	37170.399485484	Livetime [s]
ontime4	37637.427988246	Sum of GTIs [s]
ontime5	37647.068818882	Sum of GTIs [s]
ontime6	37647.027778894	Sum of GTIs [s]
ontime7	37647.109858885	Sum of GTIs [s]
ontime8	37643.745768636	Sum of GTIs [s]
ontime9	37643.704738647	Sum of GTIs [s]
l2events	368994	Number of level 2 events



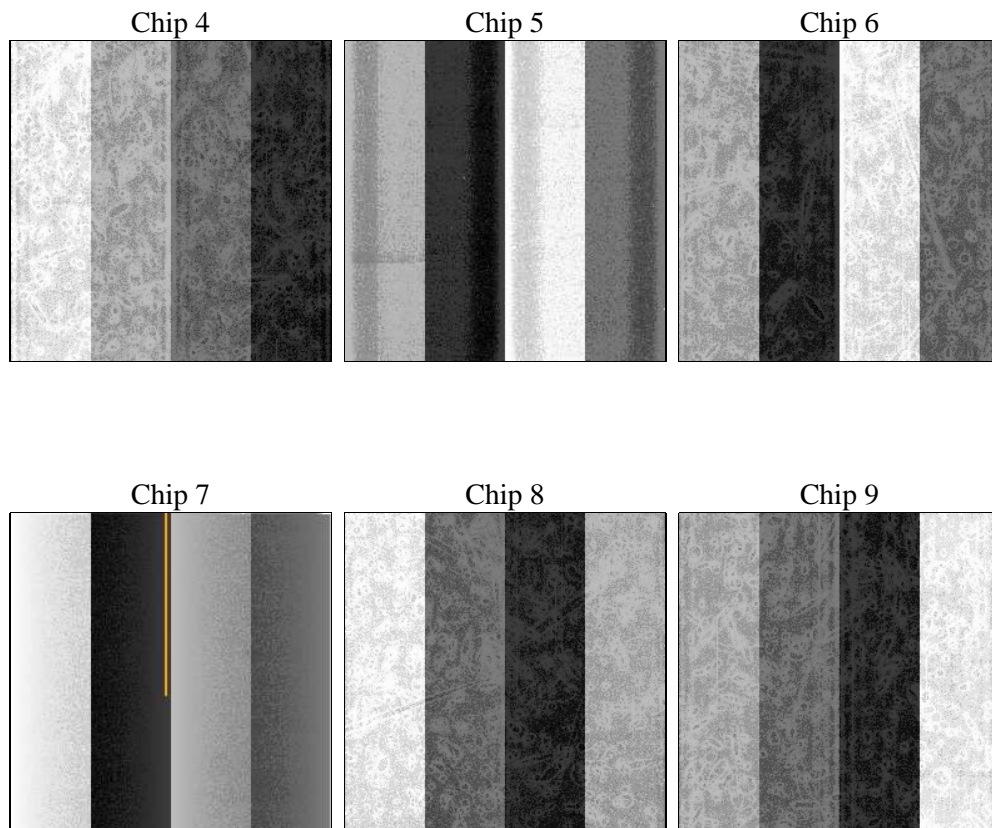
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	37560.673000	[s] Scheduled observation exposure time
ascdsver	8.4.5	Processing system revision	ontime	37647.109858885	Sum of GTIs [s]
caldbver	4.5.1.1	 	ontime4	37637.427988246	Sum of GTIs [s]
date	2012-09-16T03:12:11	Date and time of file creation	ontime5	37647.068818882	Sum of GTIs [s]
revision	4	Processing version of data	ontime6	37647.027778894	Sum of GTIs [s]
			ontime7	37647.109858885	Sum of GTIs [s]
			ontime8	37643.745768636	Sum of GTIs [s]
			ontime9	37643.704738647	Sum of GTIs [s]
			l1events	1671630	Number of level 1 events

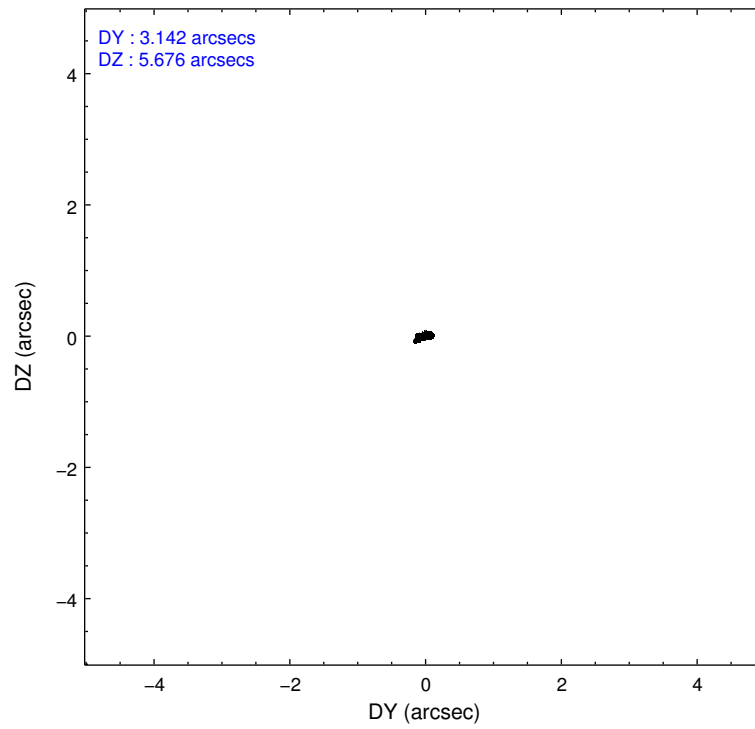
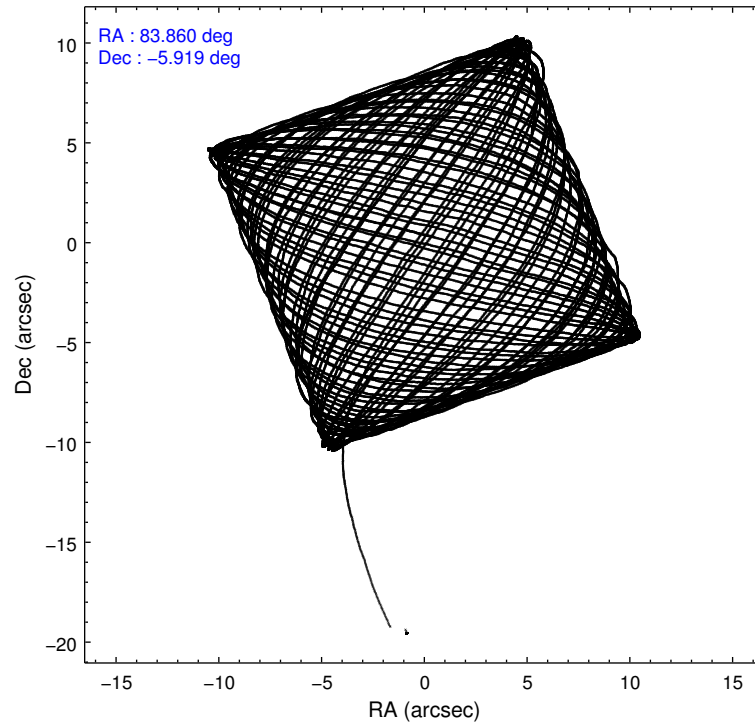
2.1.4 Events

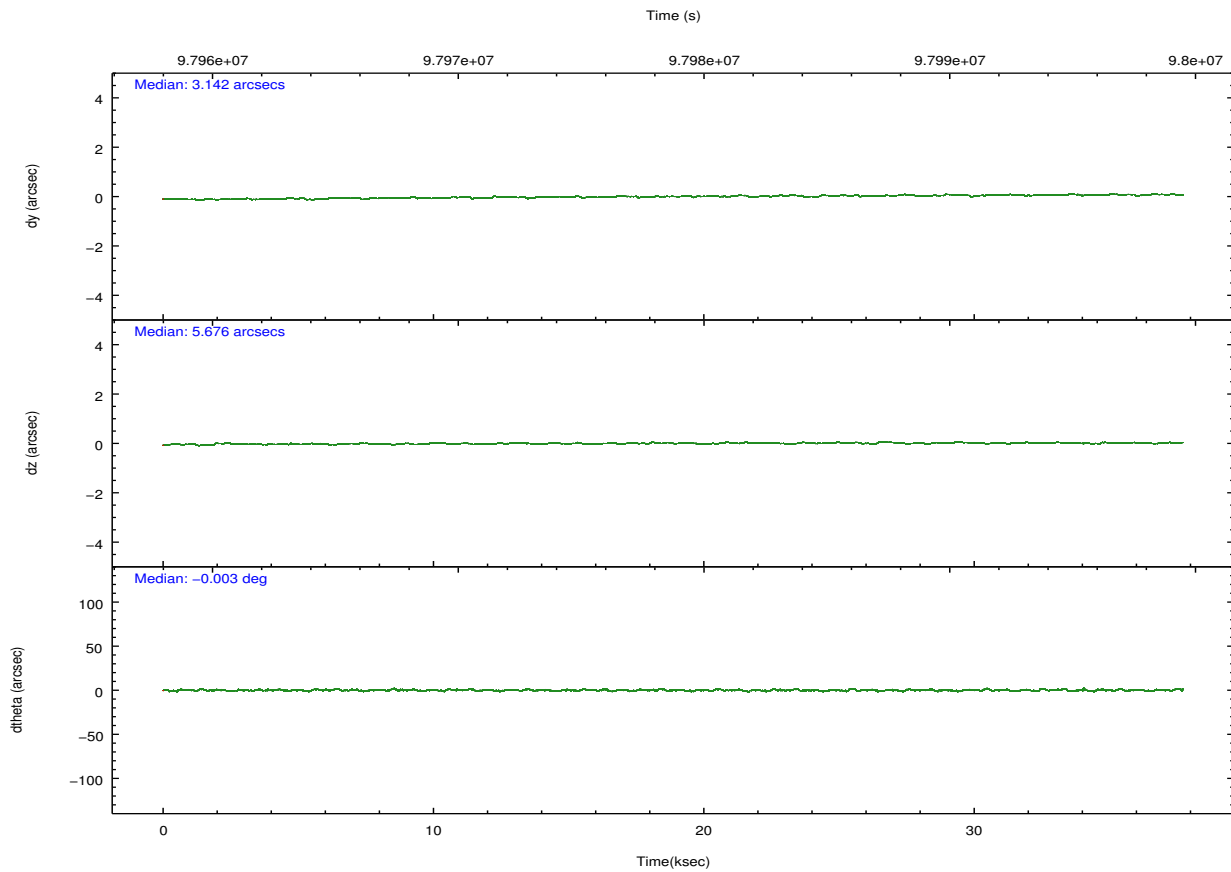
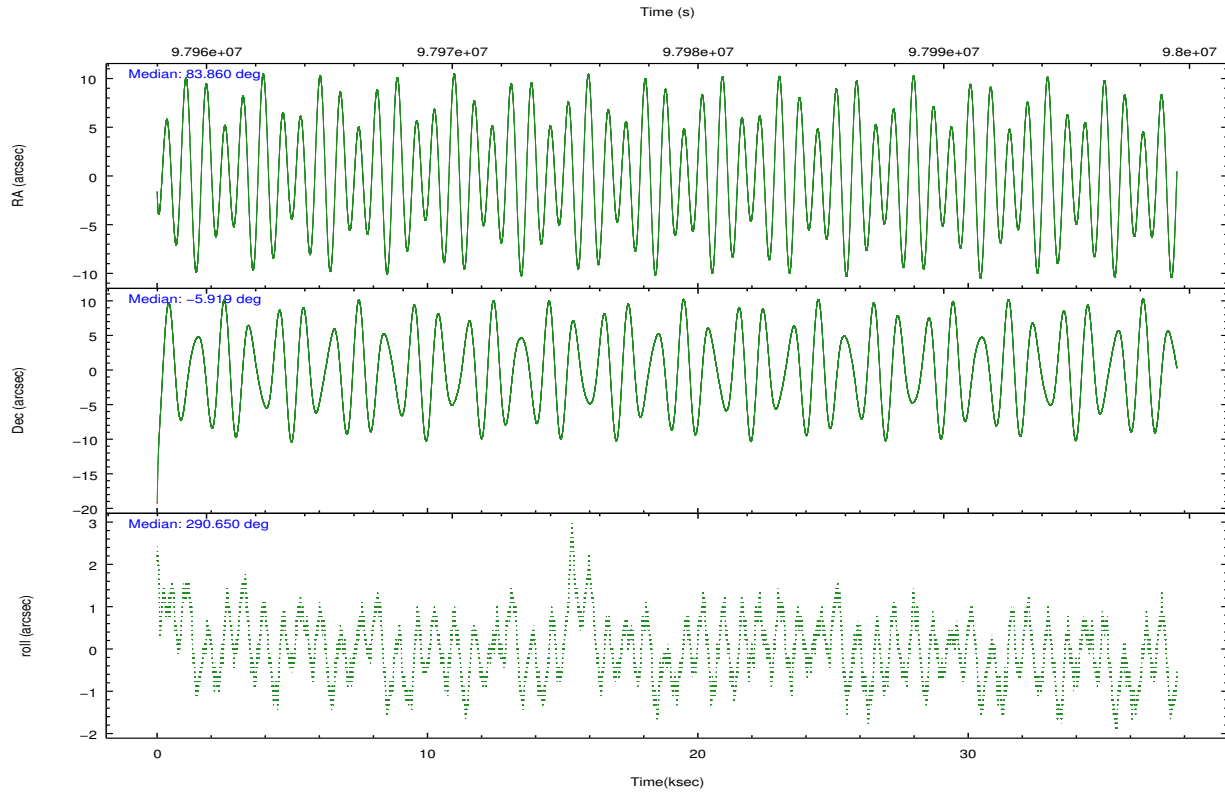
	ccd 4	ccd 5	ccd 6	ccd 7	ccd 8	ccd 9		ccd 4	ccd 5	ccd 6	ccd 7	ccd 8	ccd 9
level 1 events	255193	344641	240101	303343	292861	235491	grade 0 events	11876	35624	17090	13774	21411	13005
rejected events	226849	176139	206840	174107	232714	206042		4%	10%	7%	4%	7%	5%
rejected %	88%	51%	86%	57%	79%	87%	grade 1 events	114	990	136	375	200	118
								0%	0%	0%	0%	0%	0%
							grade 2 events	6616	42603	5454	25902	12476	5595
								2%	12%	2%	8%	4%	2%
							grade 3 events	2619	6707	2690	12067	6010	2823
								1%	1%	1%	3%	2%	1%
							grade 4 events	2460	6498	2668	11881	5650	2621
								0%	1%	1%	3%	1%	1%
							grade 5 events	8209	25223	9930	28839	12840	9961
								3%	7%	4%	9%	4%	4%
							grade 6 events	4784	77091	5362	65624	14601	5405
								1%	22%	2%	21%	4%	2%
							grade 7 events	218515	149905	196771	144881	219673	195963
								85%	43%	81%	47%	75%	83%

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	83.838712	83.86009325960477	Subarray requested	NONE	NONE
[deg] Pointing Dec	-5.902252	-5.919371460894802	Alternating exposures requested	N	N
[deg] Pointing Roll	290.498081	290.6569130894981	[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	-187.132523	-187.1228876879999			
[mm] SIM translation stage offset	-3	-3.009634895007935			
[s] Observation start time (MET)	97960039.184000	97958996.126735			
Observation start date	2001-02-07T19:06:15	2001-02-07T18:49:56			
[s] Observation end time (MET)	97997600.184000	97997914.35323501			
Observation end date	2001-02-08T05:32:16	2001-02-08T05:38:34			
Read mode	TIMED	TIMED			

2.3 Aspect



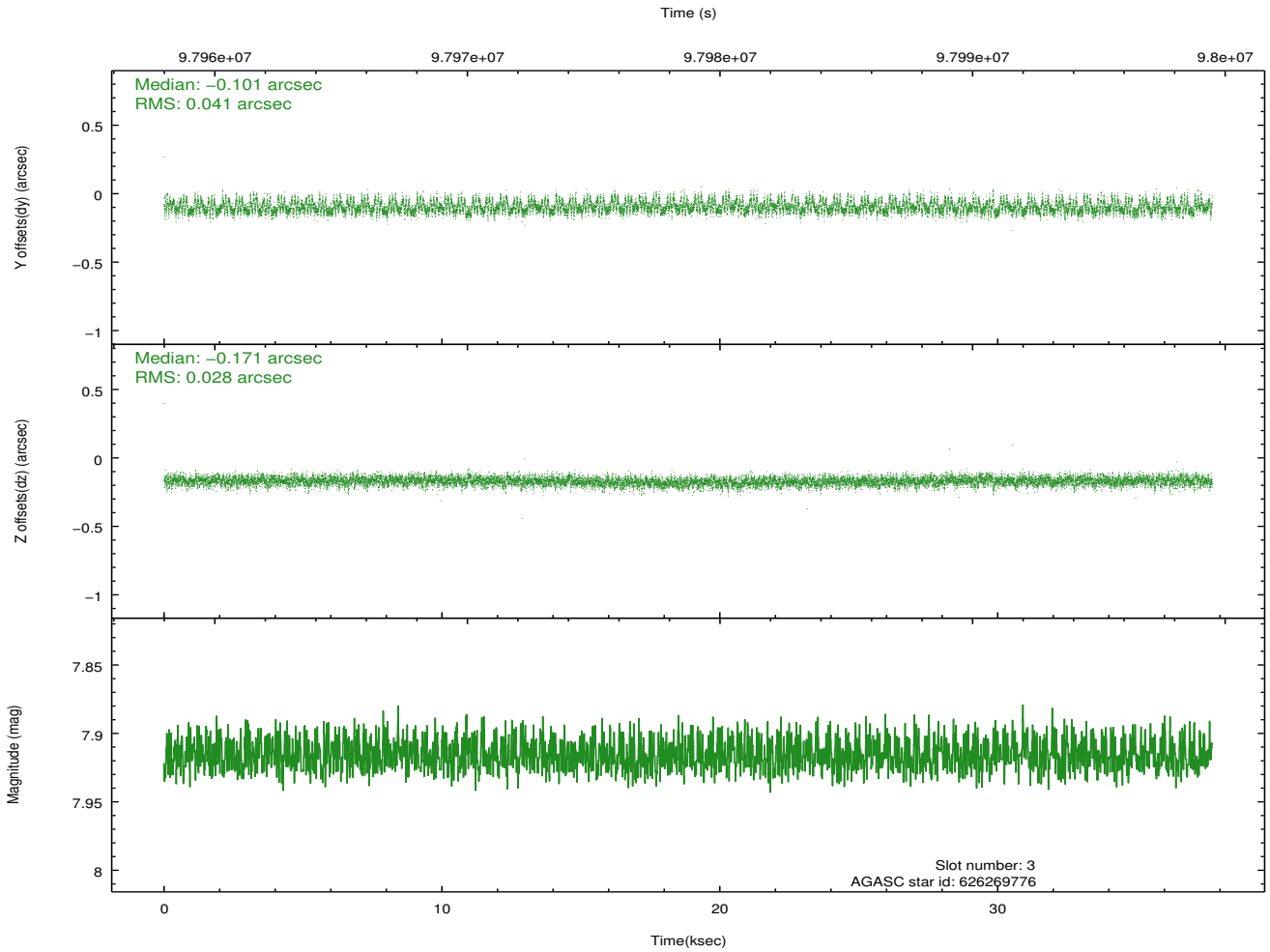
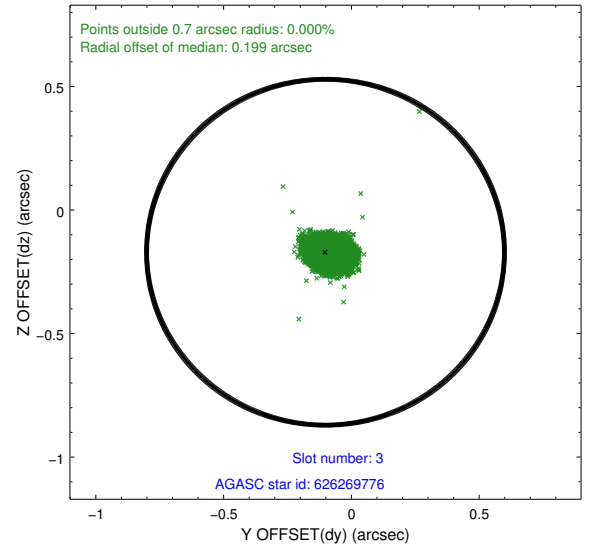
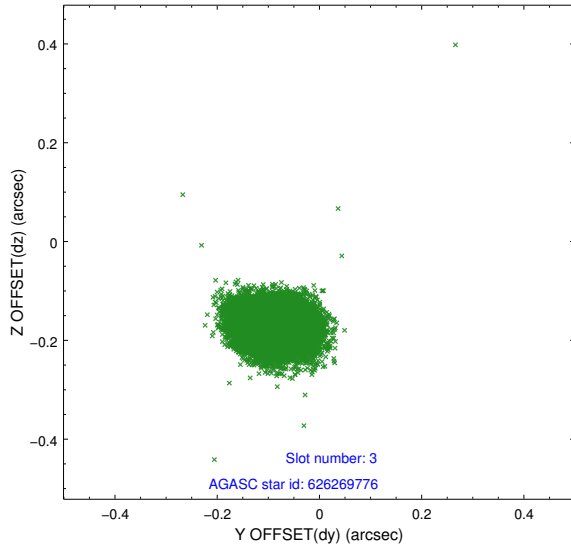


Slot Statistics

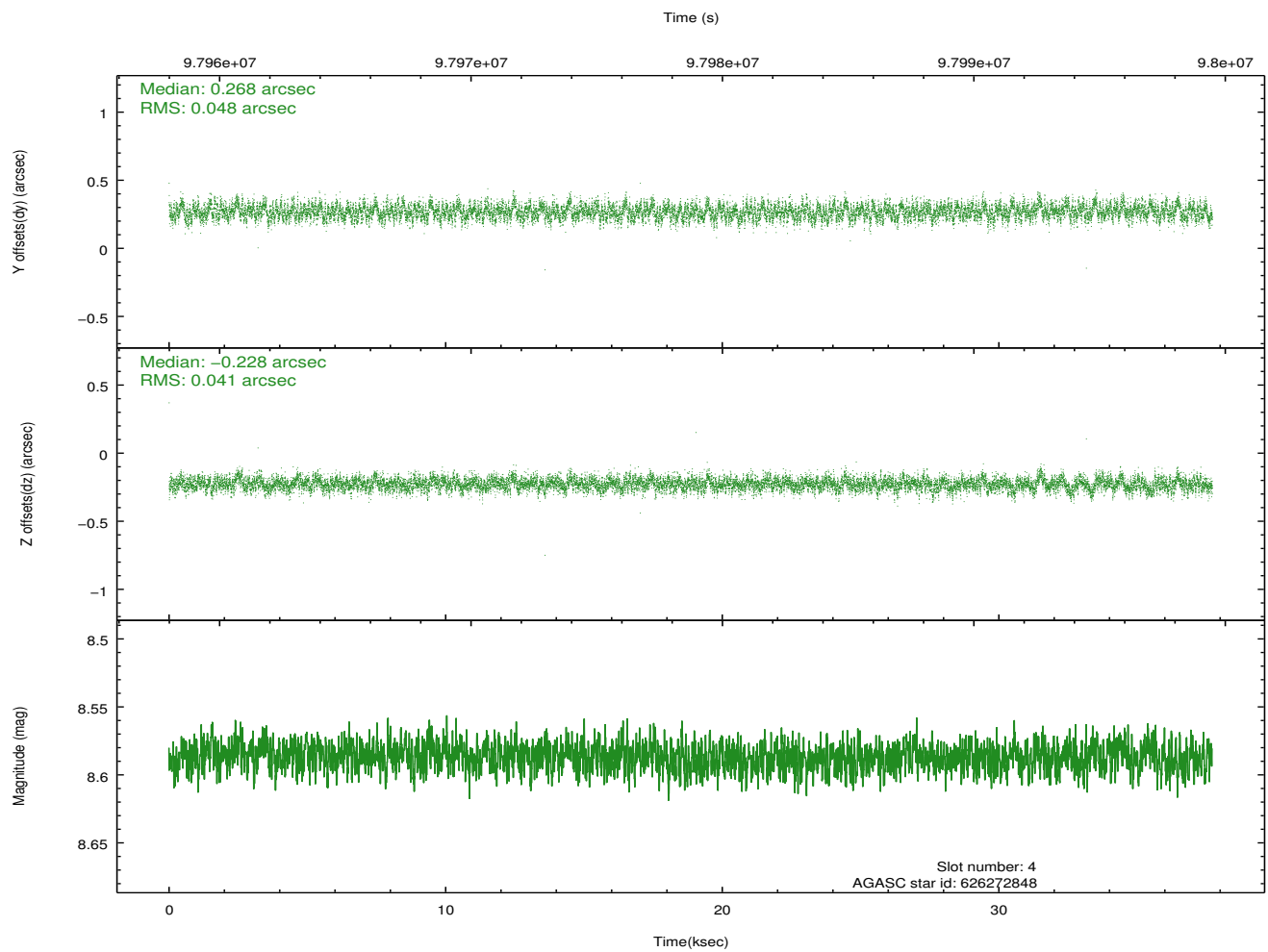
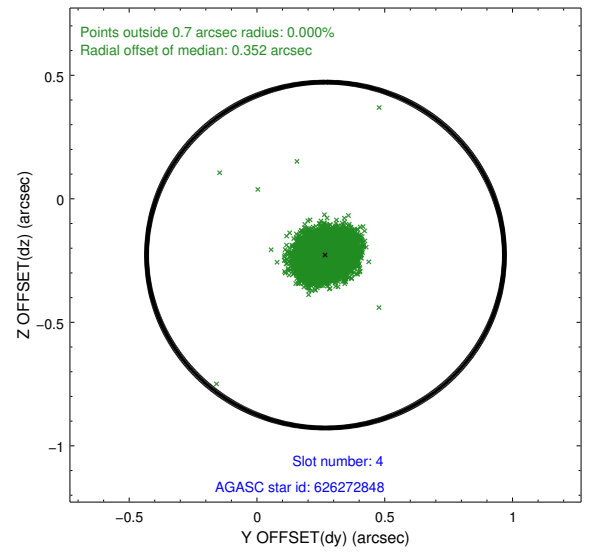
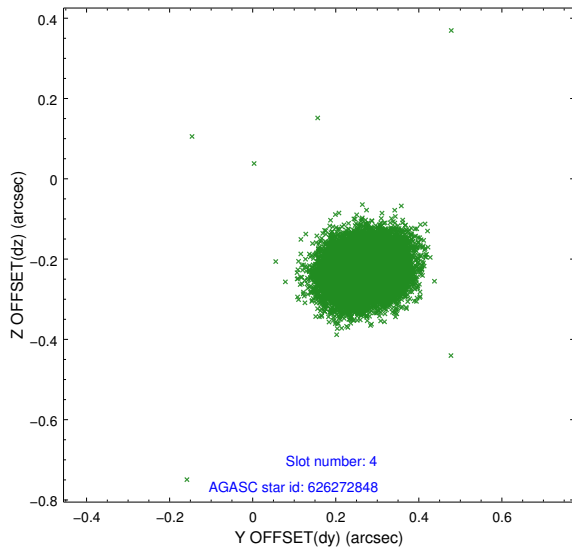
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-S-2	7.10	9200	-0.011	-0.049	0.011	0.020	0.000000	0.000000	-755.61	-1788.98
1	FID	ACIS-S-4	7.19	9199	-0.015	0.019	0.008	0.014	0.000000	0.000000	2157.68	119.49
2	FID	ACIS-S-5	7.23	9197	-0.004	0.039	0.012	0.020	0.000000	0.000000	-1808.38	113.27
3	GUIDE	626269776	7.92	18387	-0.101	-0.171	0.052	0.086	83.358607	-6.532867	1526.93	-2403.82
4	GUIDE	626272848	8.59	18390	0.268	-0.228	0.067	0.108	84.129003	-6.453841	2225.02	277.07
5	GUIDE	626272880	7.66	18393	0.190	-0.044	0.071	0.109	83.815609	-6.032748	412.22	-242.05
6	GUIDE	625744200	8.29	18399	-0.040	0.140	0.055	0.089	83.695760	-5.570729	-1296.42	-61.97
7	GUIDE	626398088	8.99	18393	-0.322	0.304	0.076	0.121	84.581490	-6.133042	1711.15	2199.26

2.4 Star Slots

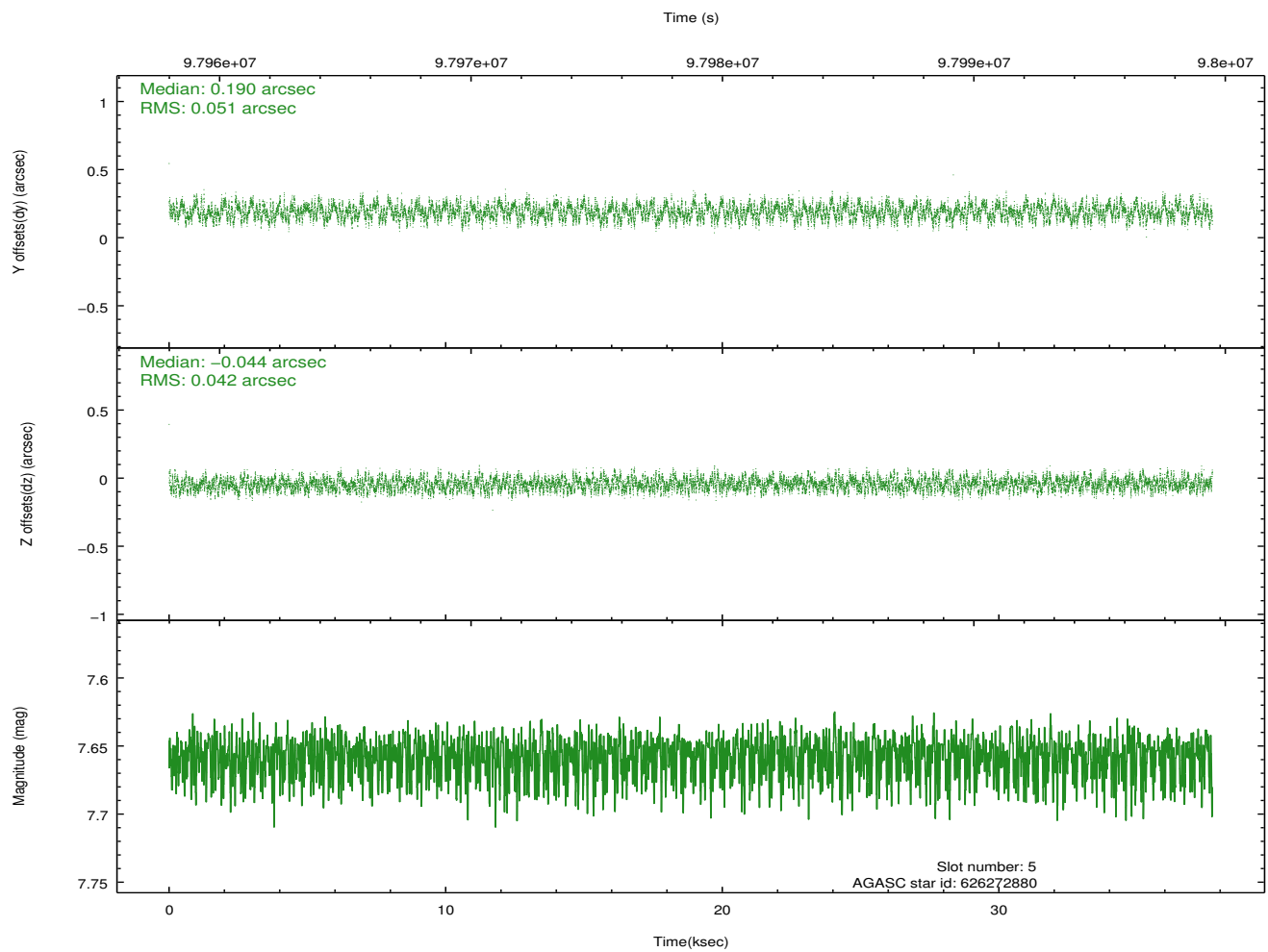
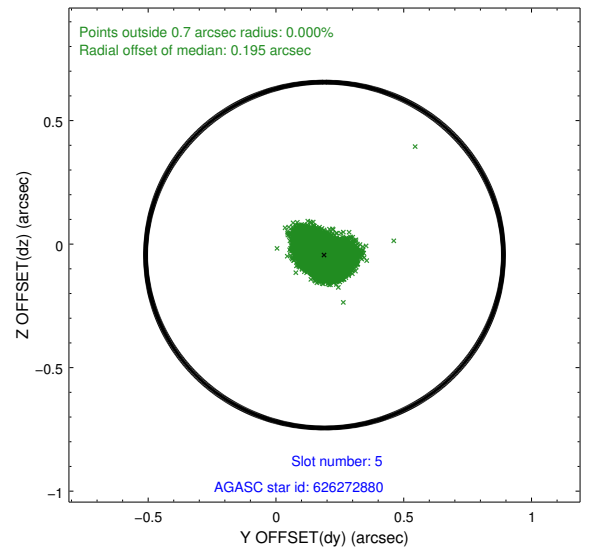
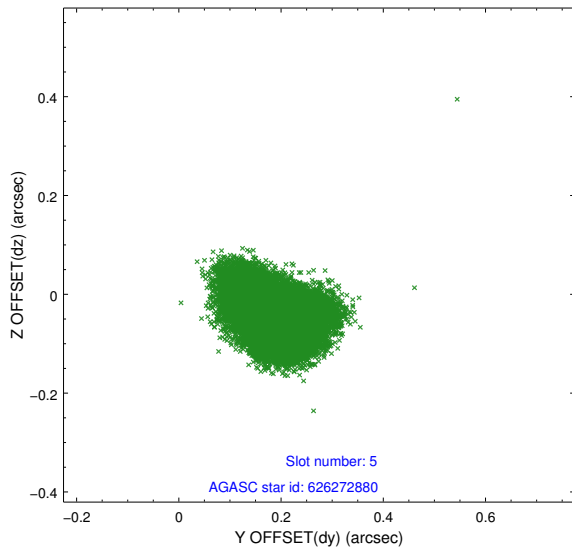
2.4.1 Slot 3



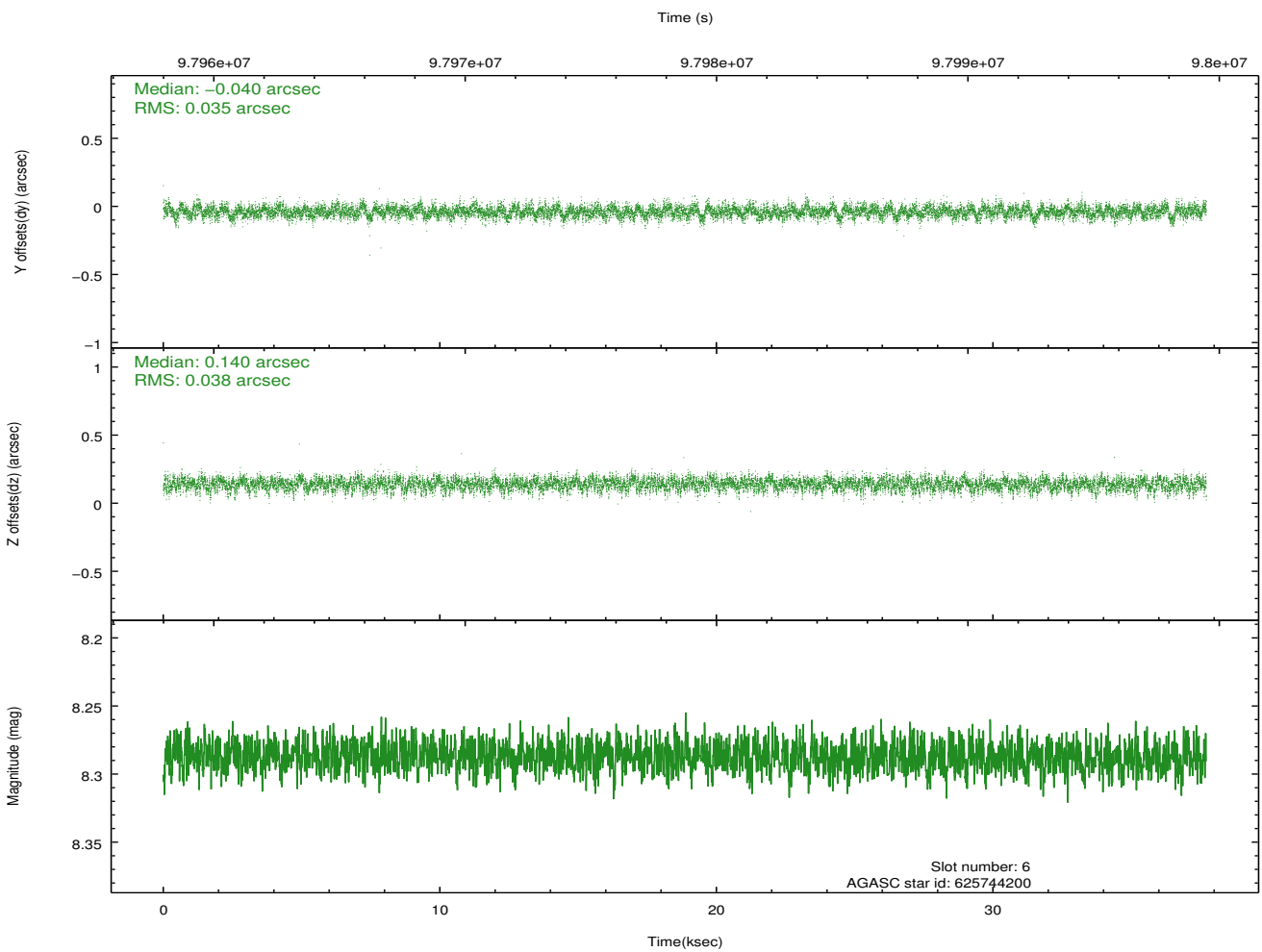
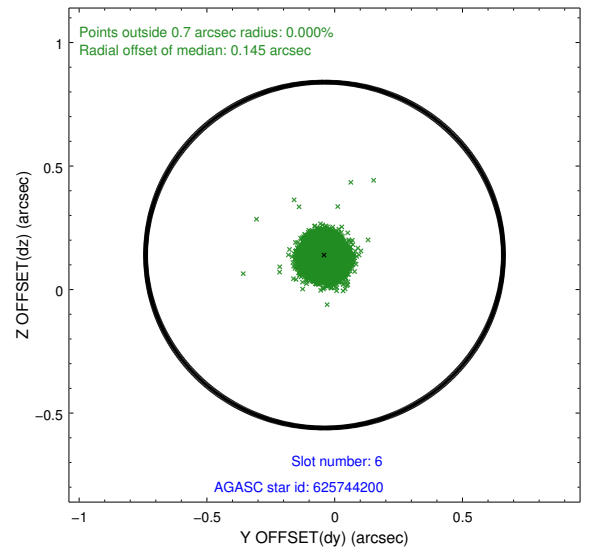
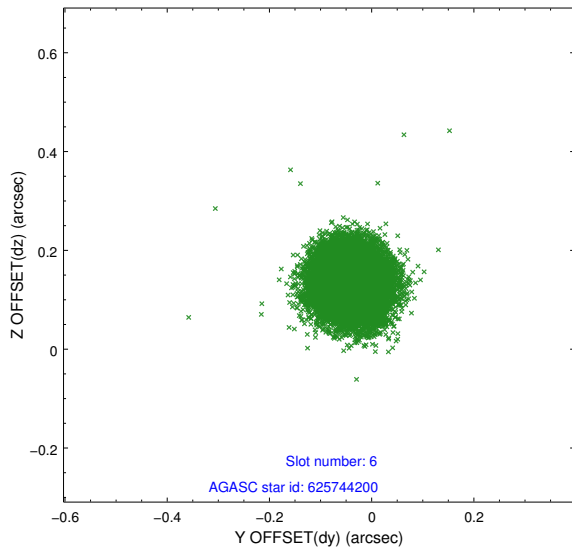
2.4.2 Slot 4



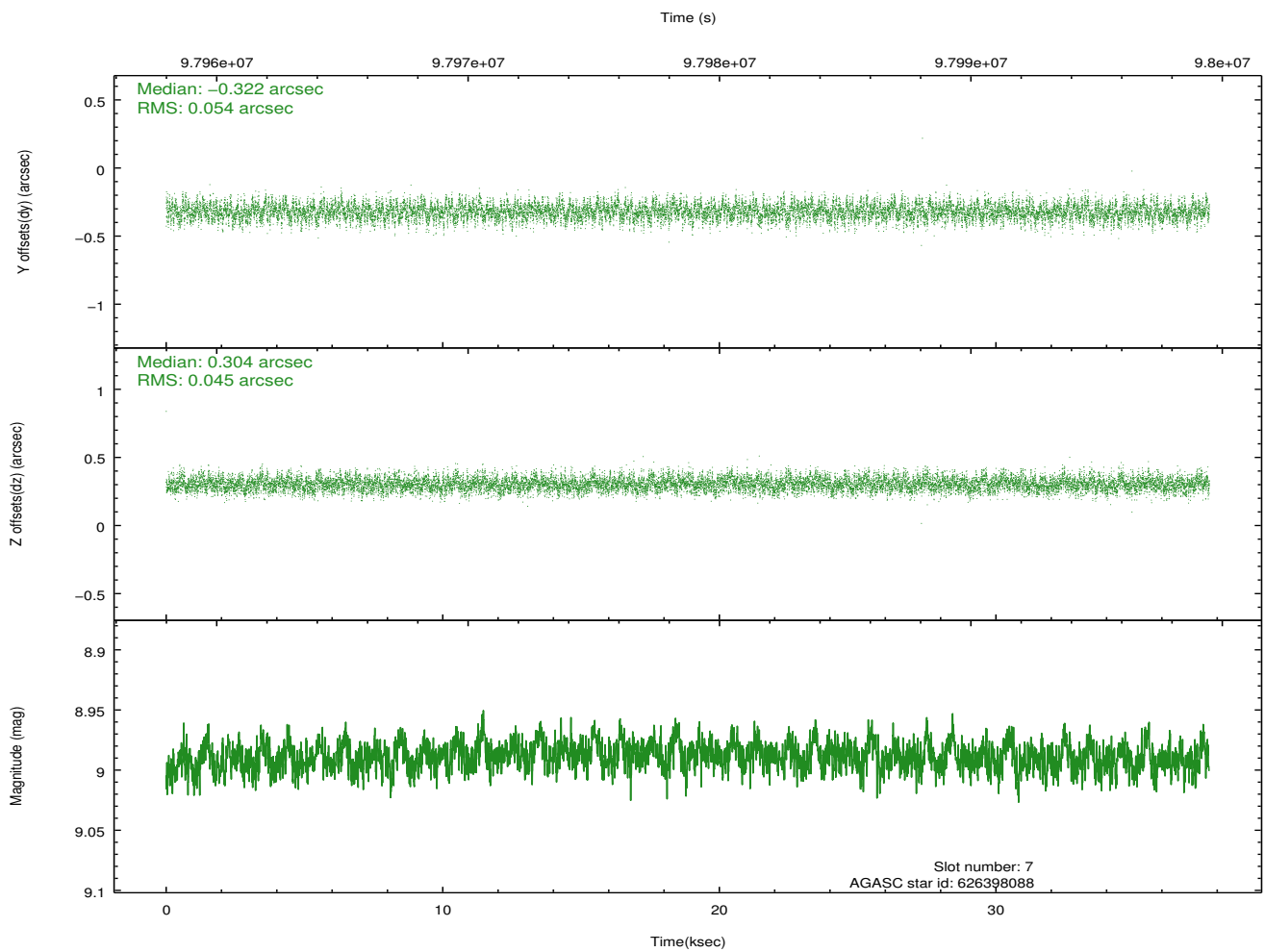
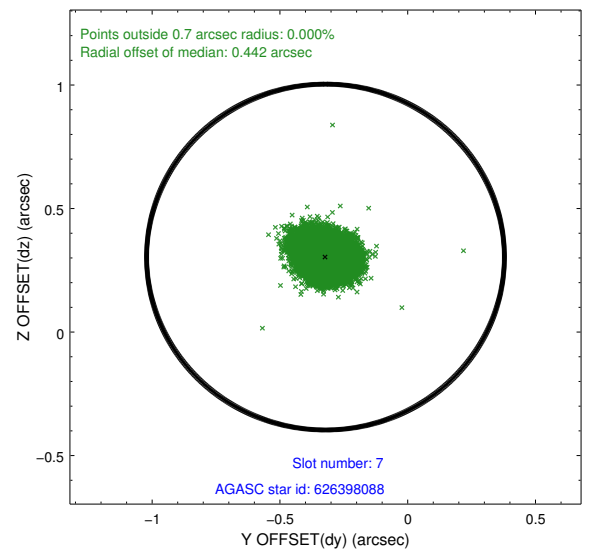
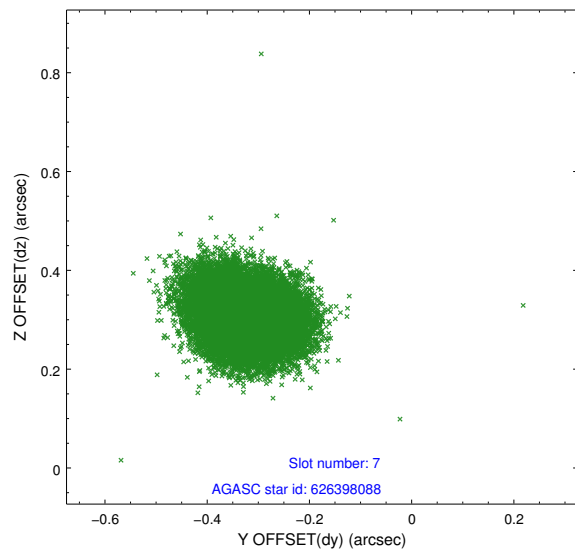
2.4.3 Slot 5



2.4.4 Slot 6

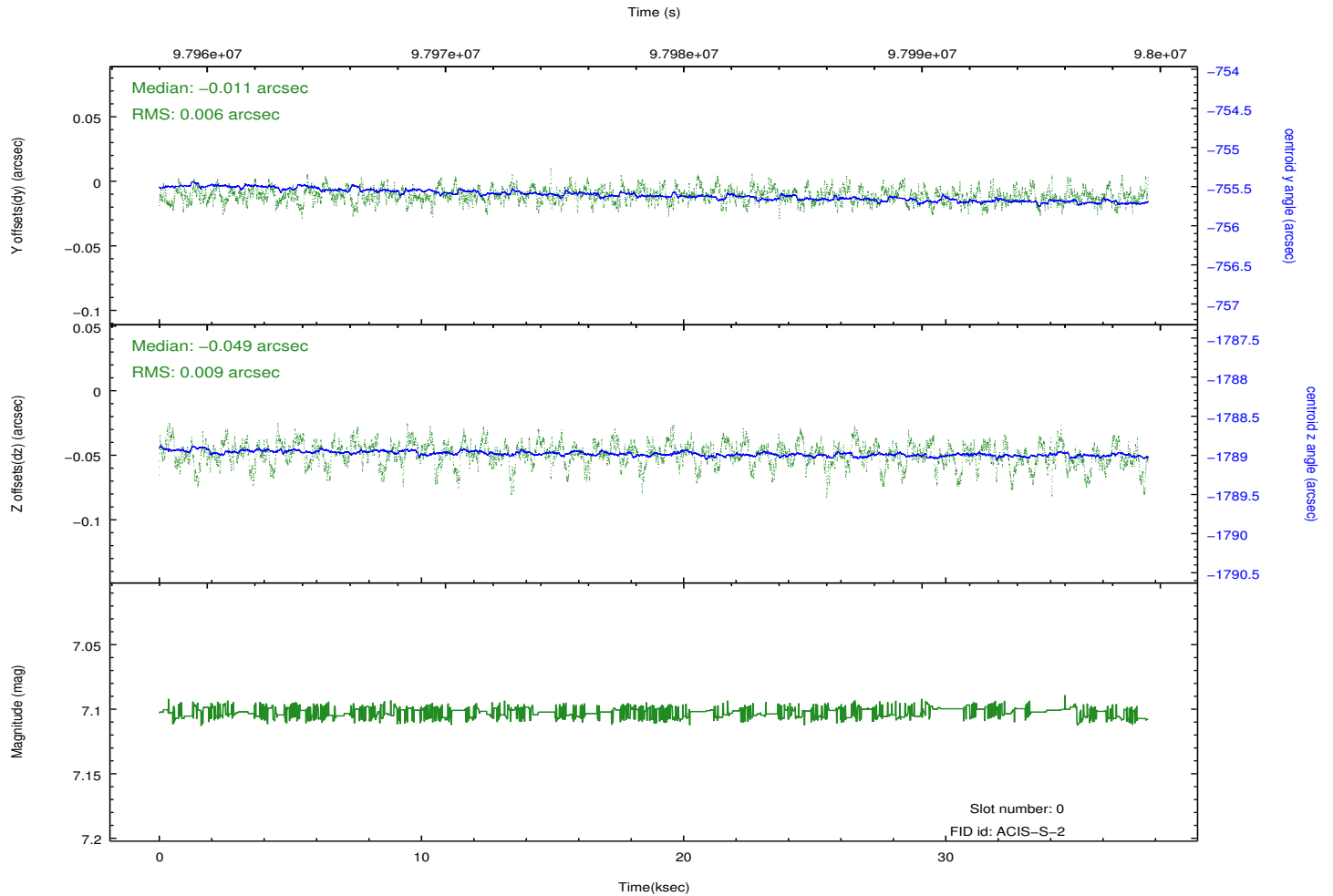
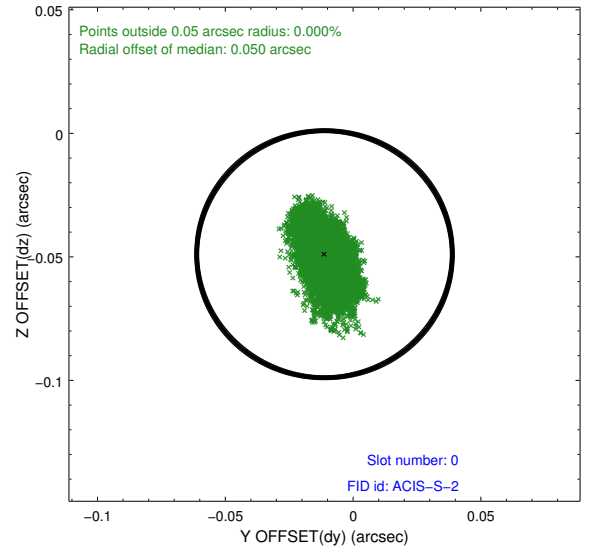
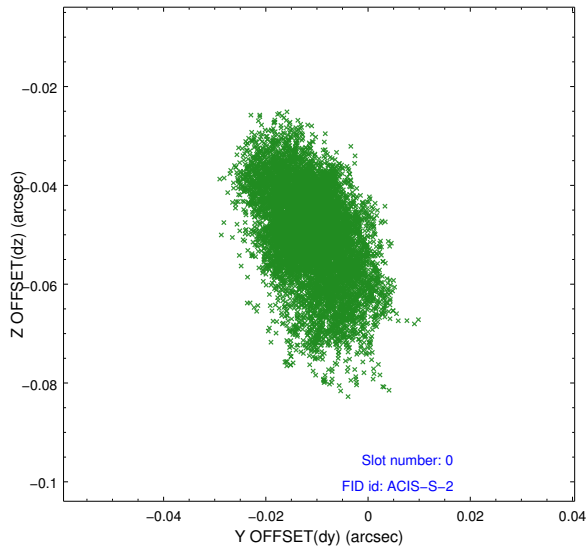


2.4.5 Slot 7

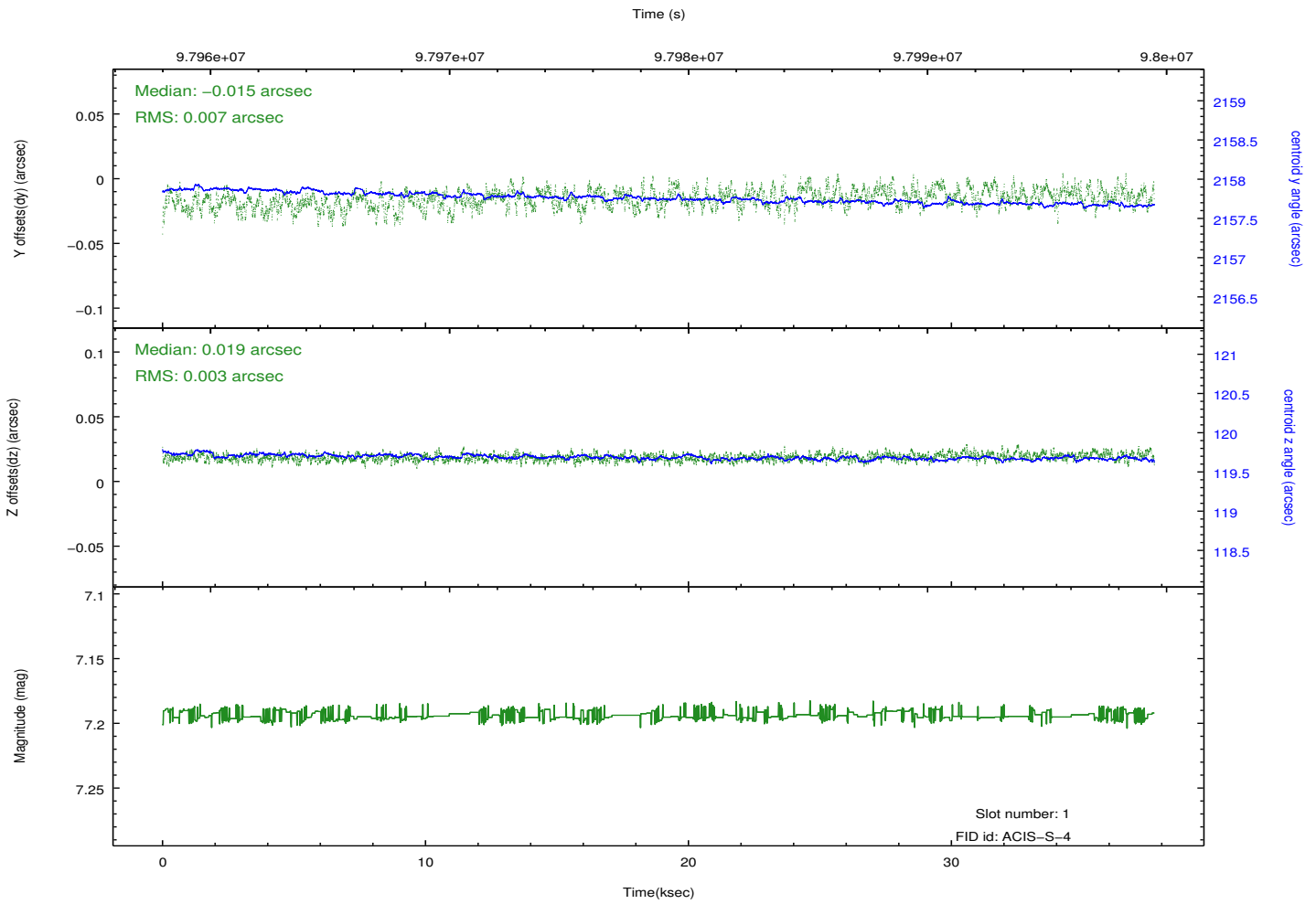
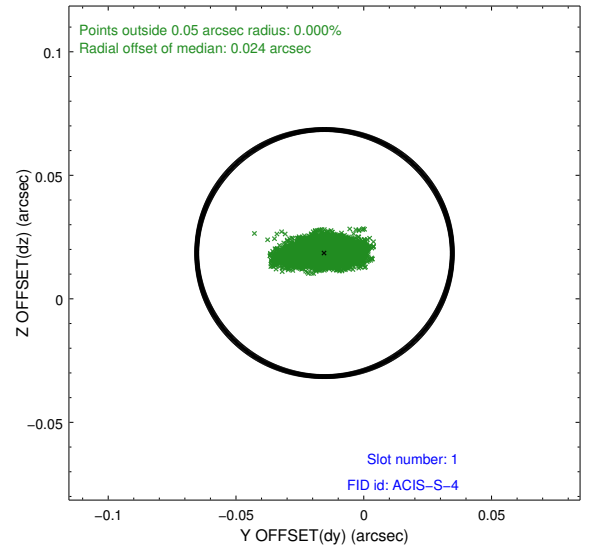
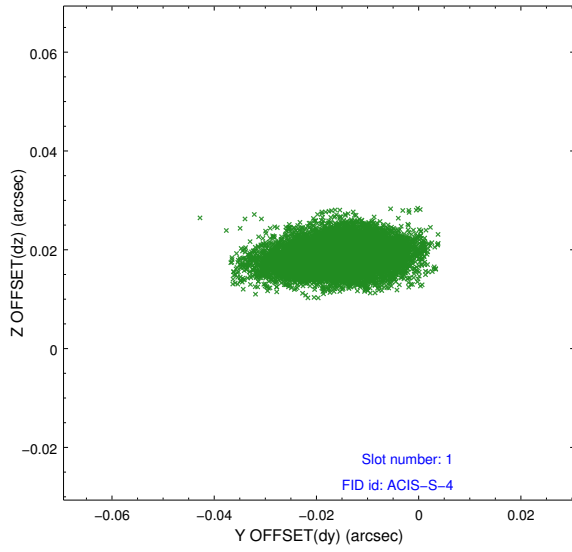


2.5 FID Slots

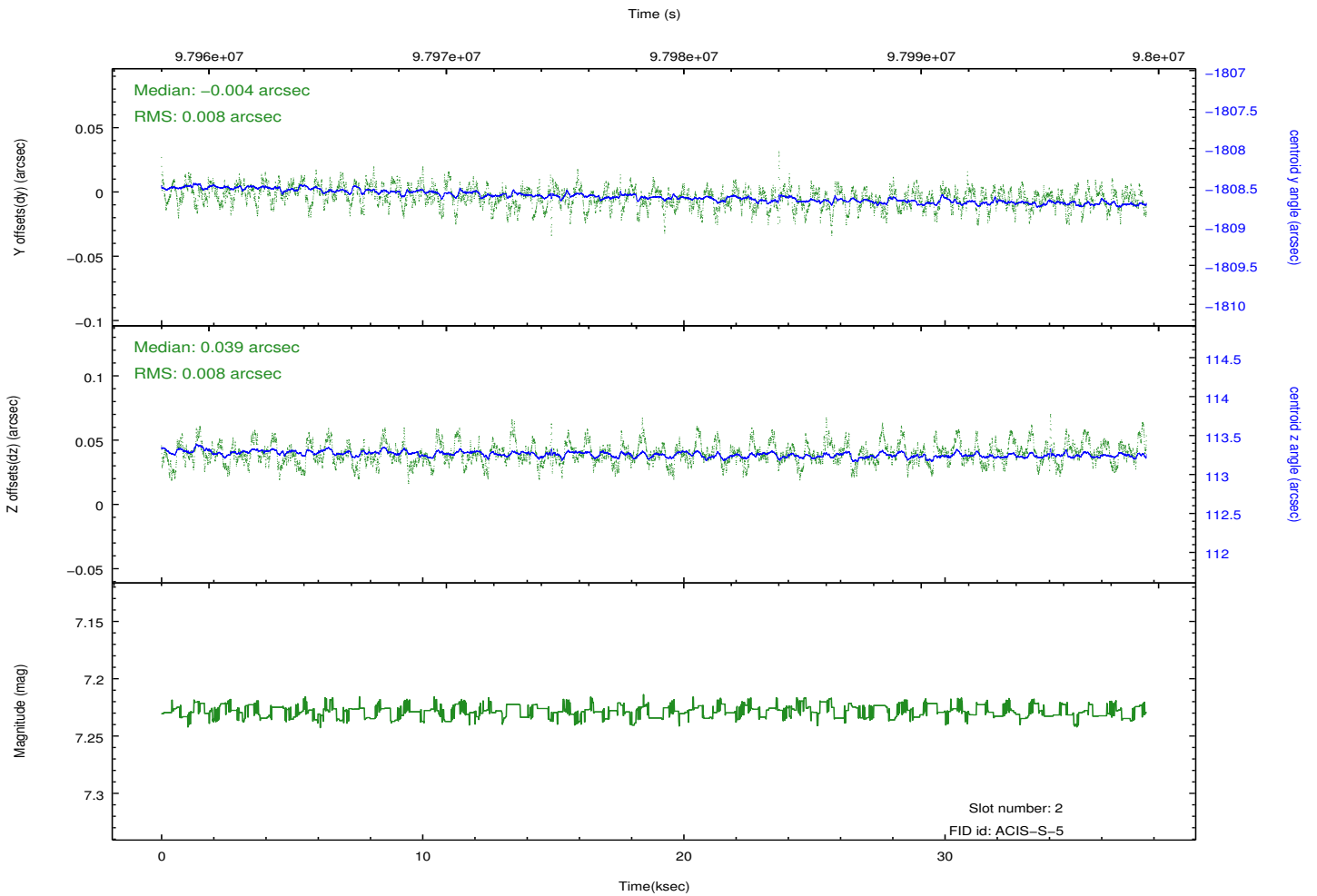
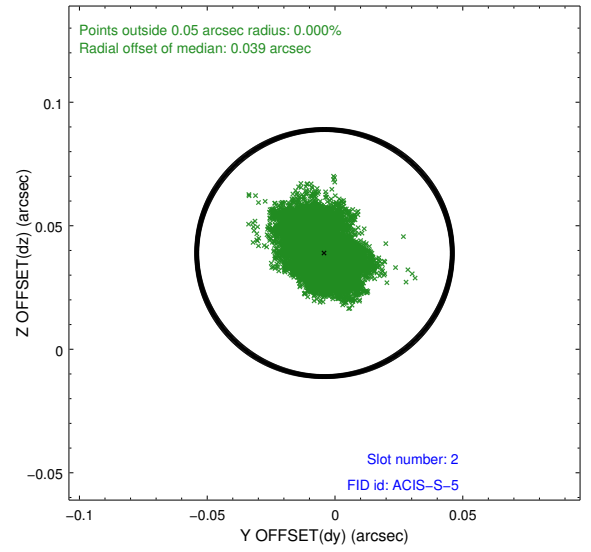
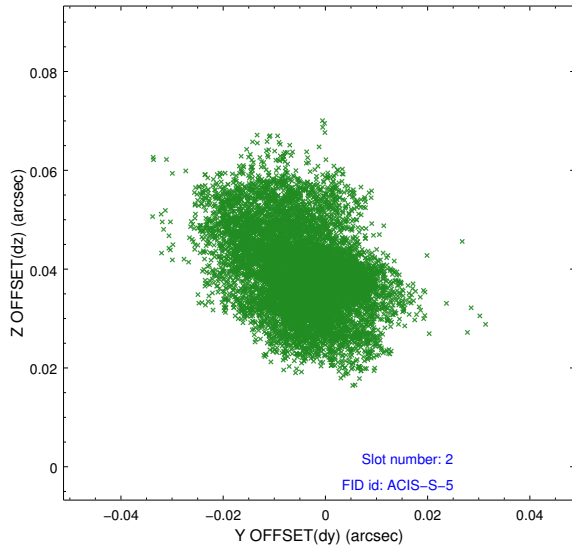
2.5.1 Slot 0



2.5.2 Slot 1



2.5.3 Slot 2

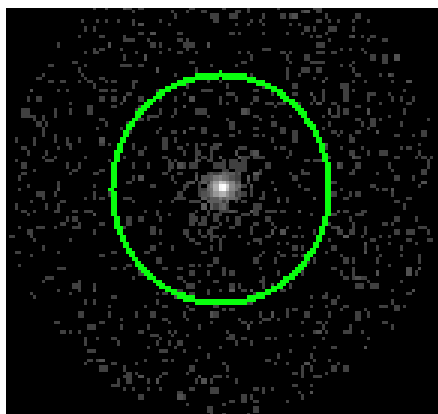


3 Gratings

3.1 HEG Arm



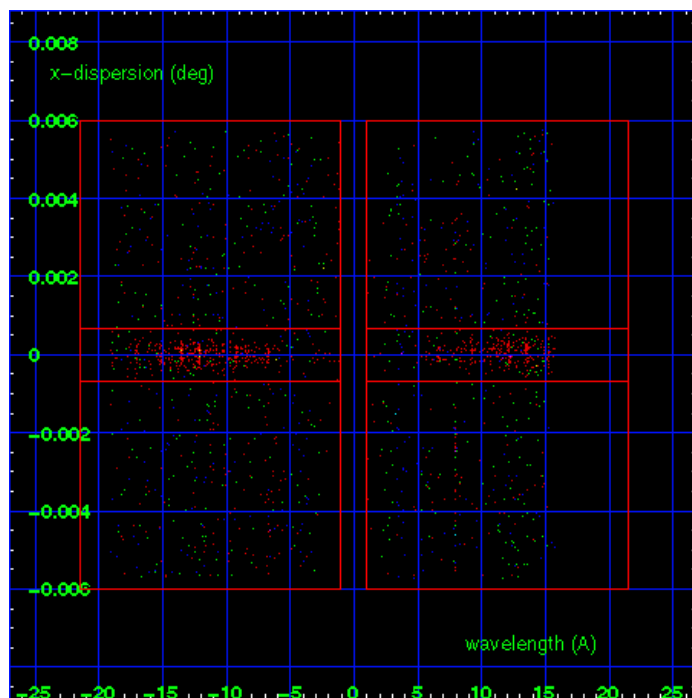
HEG Order Sort 123



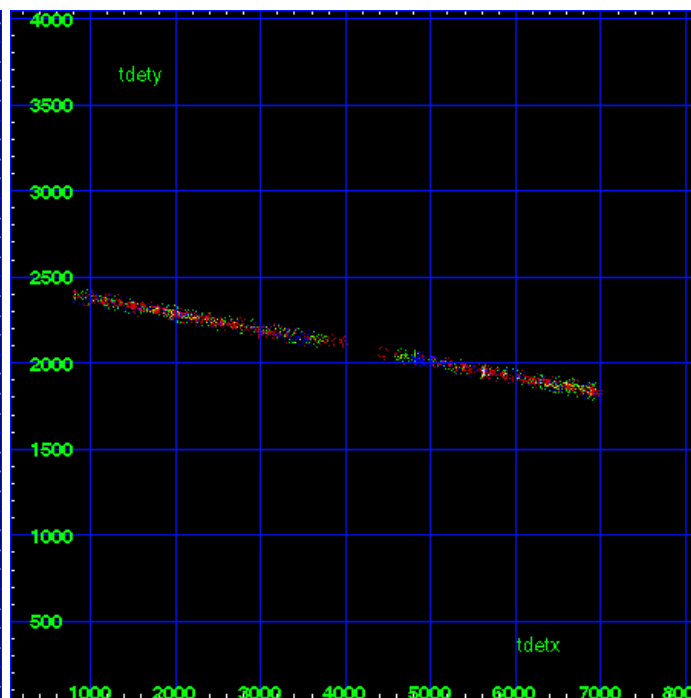
HEG Zero Order



HEG Order Sort ALL

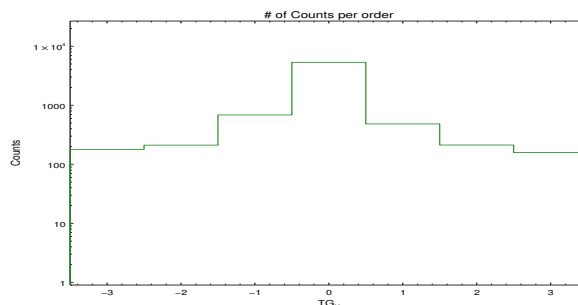


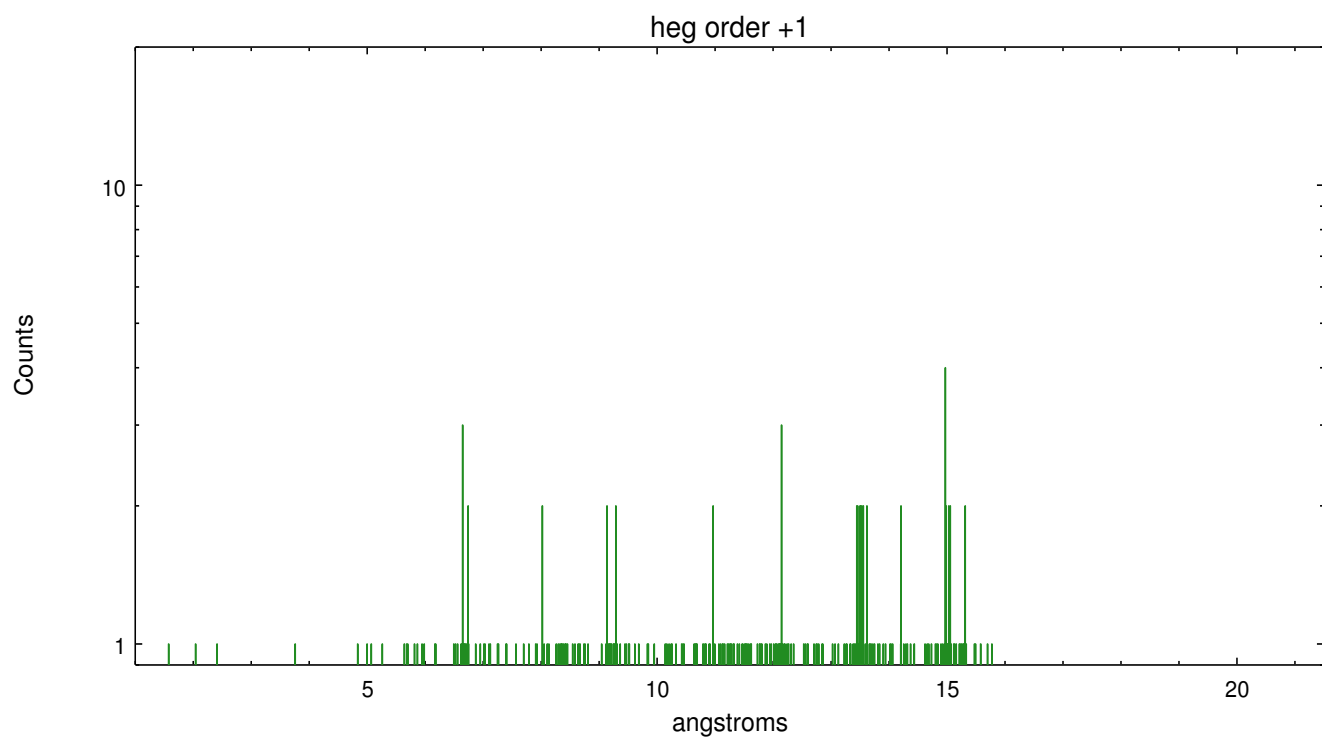
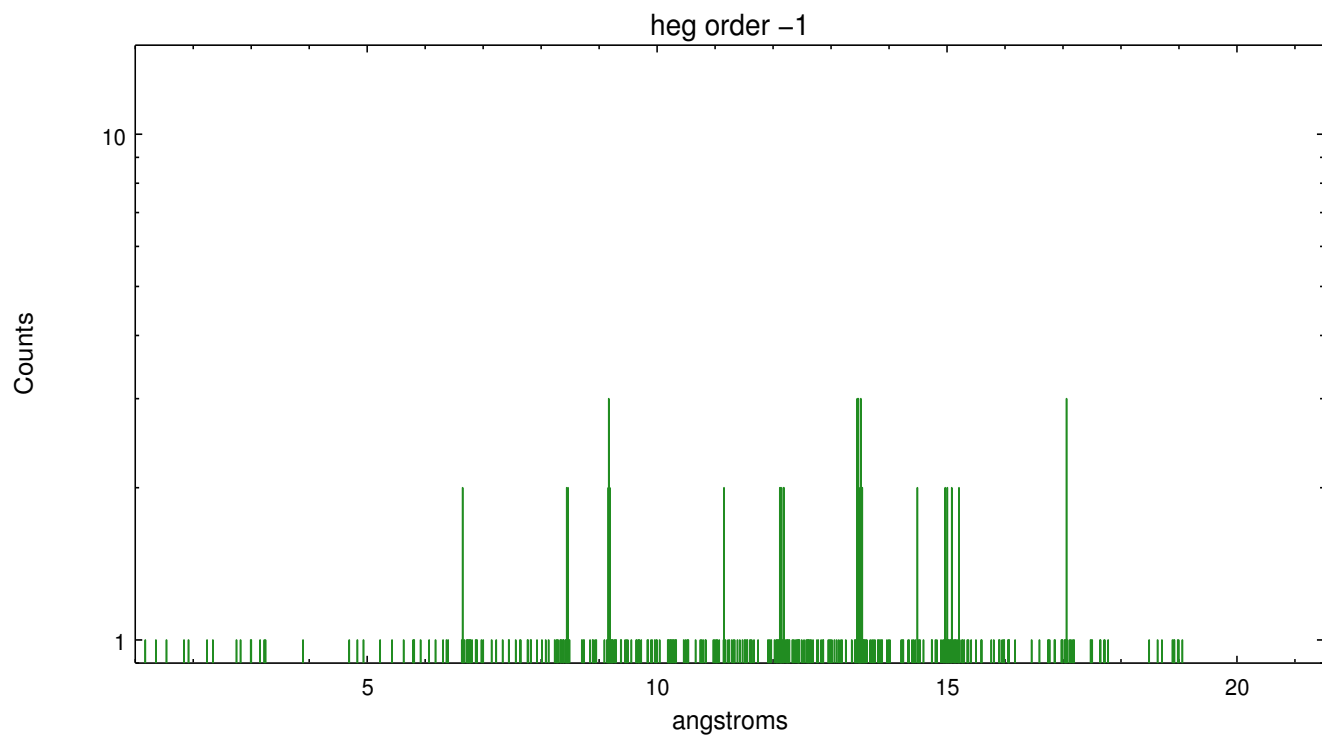
Spot Image HEG



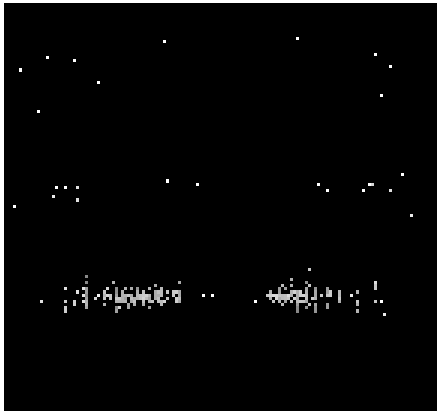
Full Detector HEG

	order -3	order -2	order -1	order 0	order 1	order 2	order 3
Events	179	211	685	5341	483	212	158

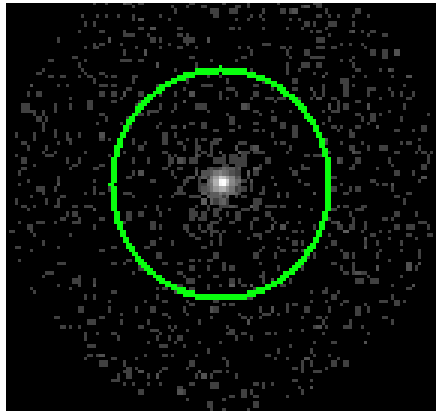




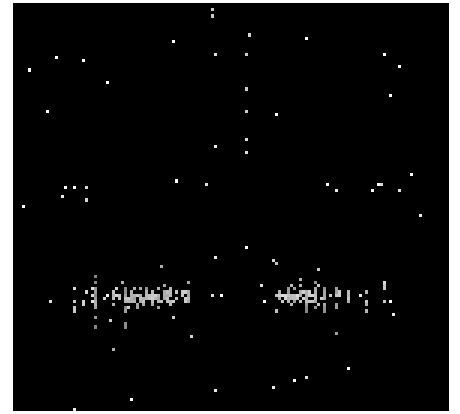
3.2 MEG Arm



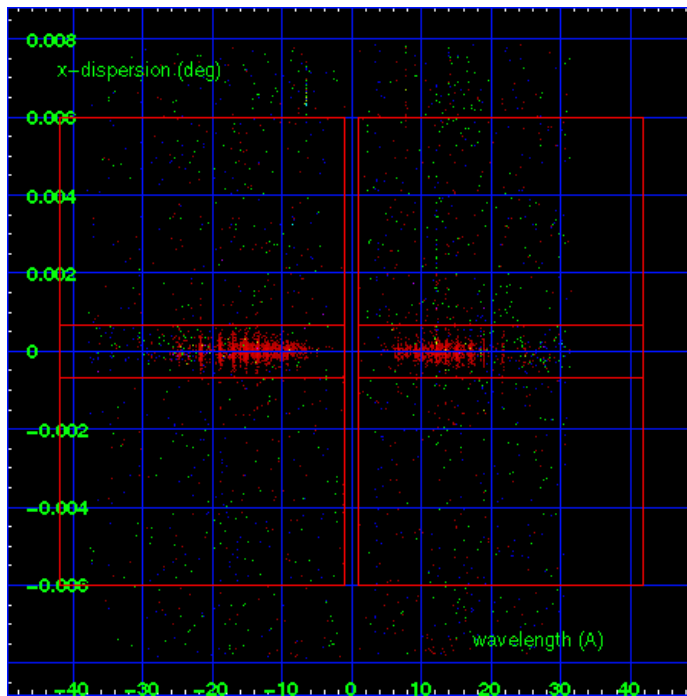
MEG Order Sort 123



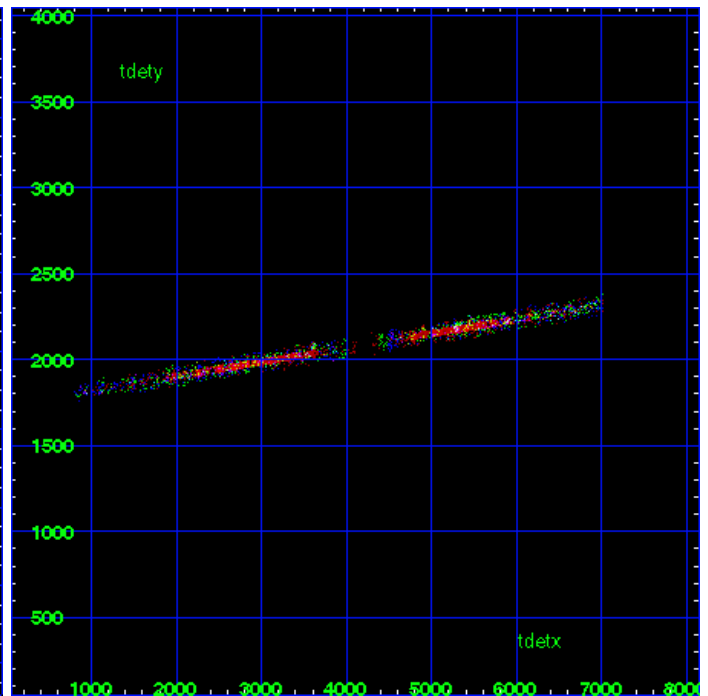
MEG Zero Order



MEG Order Sort ALL

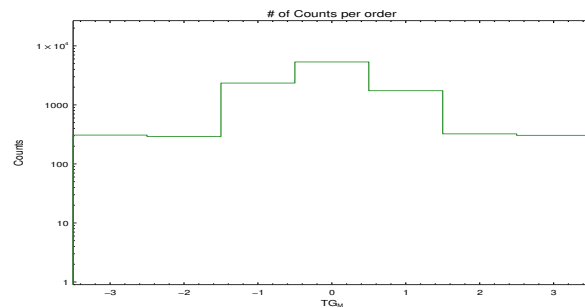


Spot Image MEG

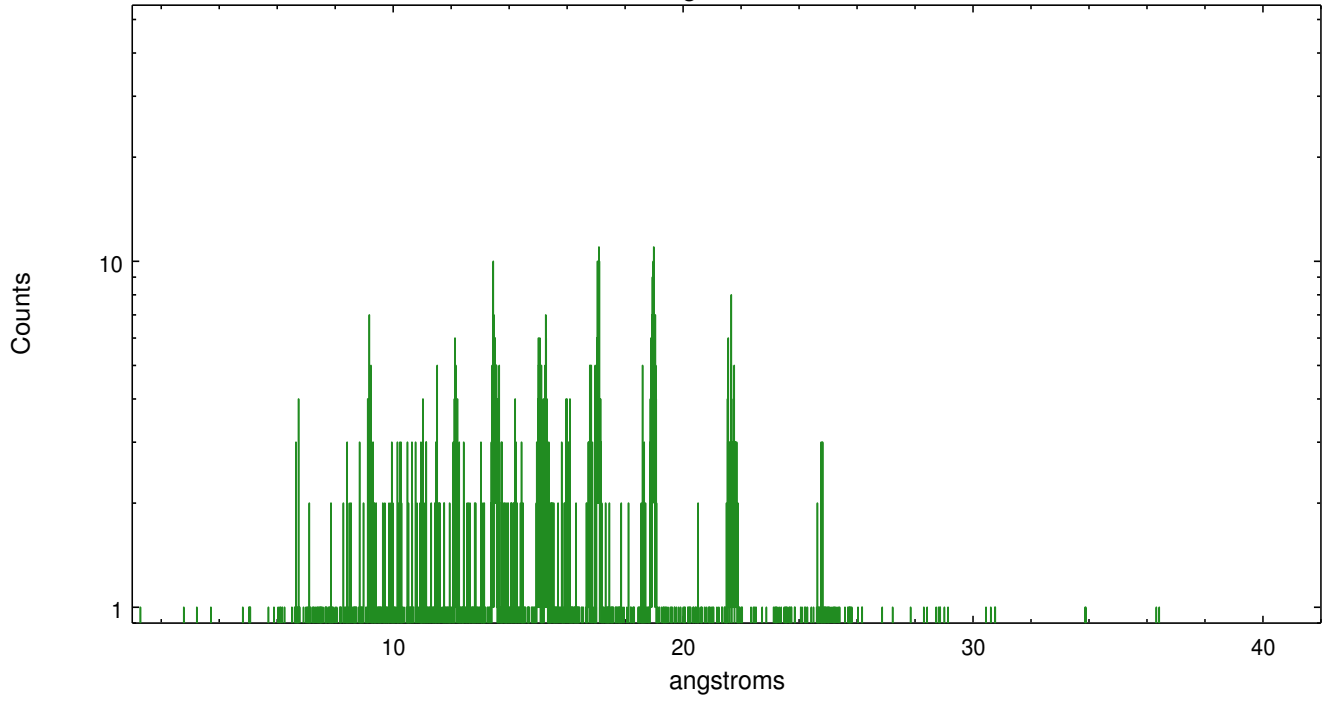


Full Detector MEG

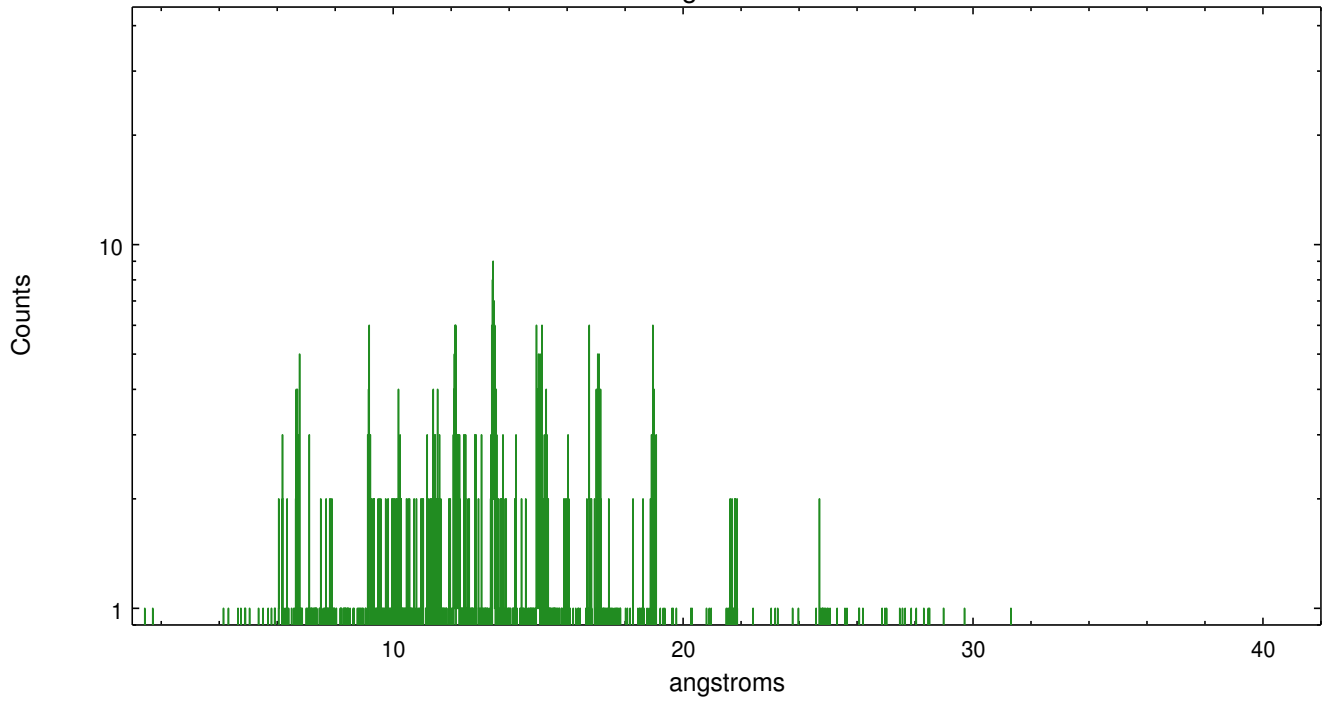
	order -3	order -2	order -1	order 0	order 1	order 2	order 3
Events	308	292	2344	5341	1739	323	305



meg order -1



meg order +1



A Summary

A.1 Status

V&V Scientist	Joy Nichols
V&V Date (YYYY-MM-DD)	2012.09.18
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	37.644

A.2 Comments

Multiple sources; extraction is of iota Ori. Another source, HBC 465, lies in center of HEG plus region. Multiple sources in the field may cause contamination of the primary extraction at some wavelengths. Additional sources in field (zeroth order only).