

V&V Reference Report

L2 ASCDS Version : 7.6.9

Observation 2529 - L2 Version 001
Chandra X-Ray Center

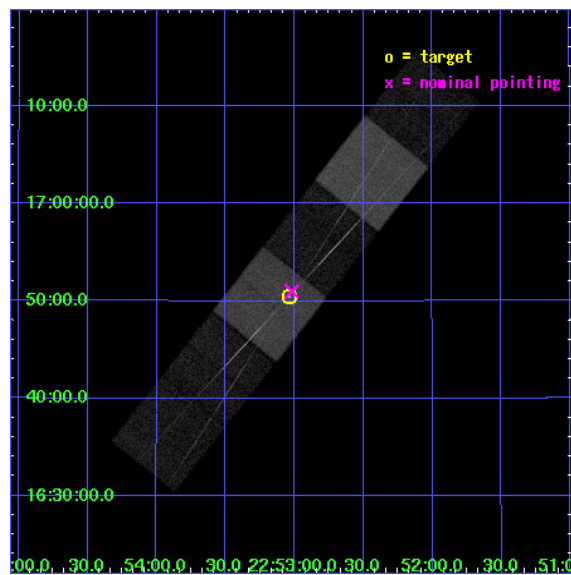
L2 Processing Date : Sep 22 2006

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

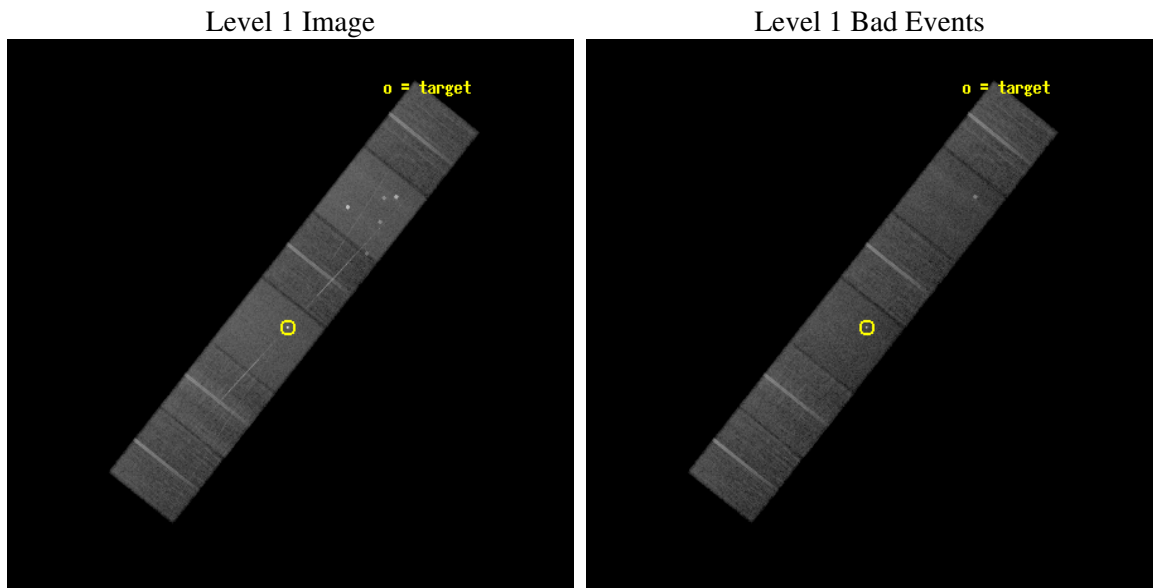
seq_num	200137
obs_id	2529
title	HETGS SPECTROSCOPY OF THE LONG-PERIOD ACTIVE BINARY, IM PEGASI.
observer	Dr. David Huenemoerder
object	IM PEG
dtcycle	0
cycle	P
ra_targ	343.259583
dec_targ	16.841194
ra_nom	343.25479083138
dec_nom	16.849748917783
roll_nom	128.39055363801
revision	2
ontime	25145.599906325
livetime	24827.191179449
ontime4	25145.599906325
ontime5	25145.599906325
ontime6	25145.599906325
ontime7	25145.599906325
ontime8	25145.599906325
ontime9	25145.599906325
l2events	264200



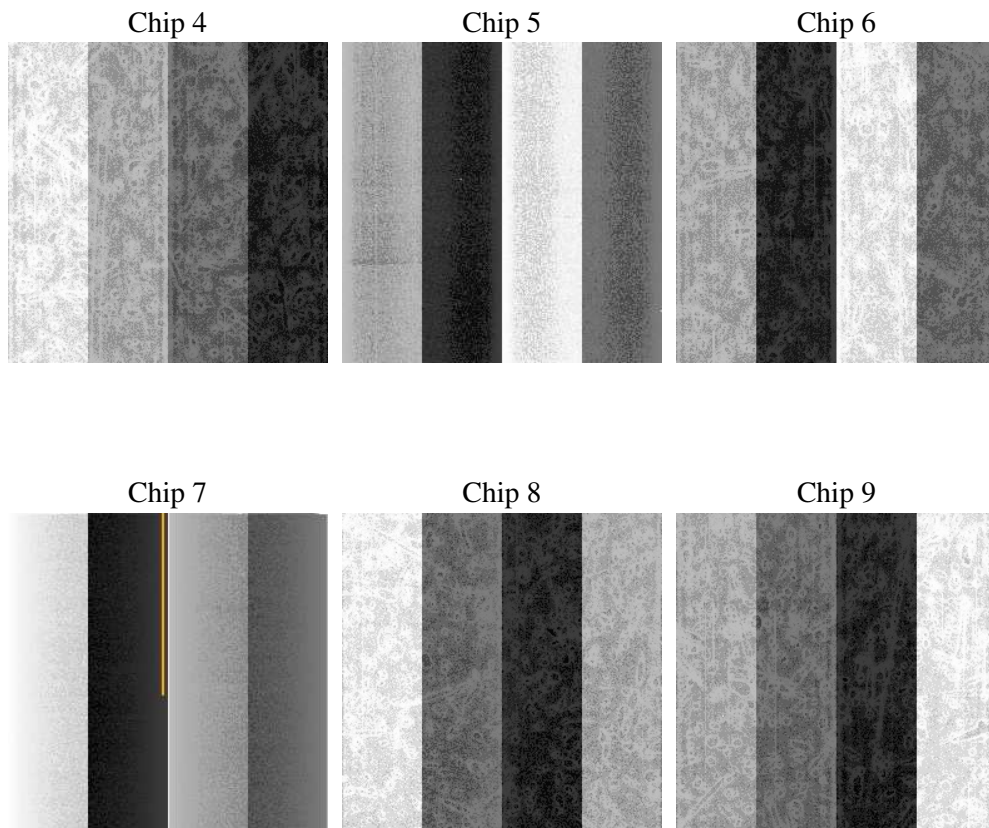
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	0
ascdsver	7.6.9
caldsver	3.2.3
date	2006-09-22T23:07:23
revision	2

sched_exp_time	25000.000000
ontime	26812.815831125
ontime4	26689.656291217
ontime5	26812.815831125
ontime6	26709.105900079
ontime7	26812.815831125
ontime8	26712.34694007
ontime9	26705.864810228
l1events	1286255

2.1.4 Events

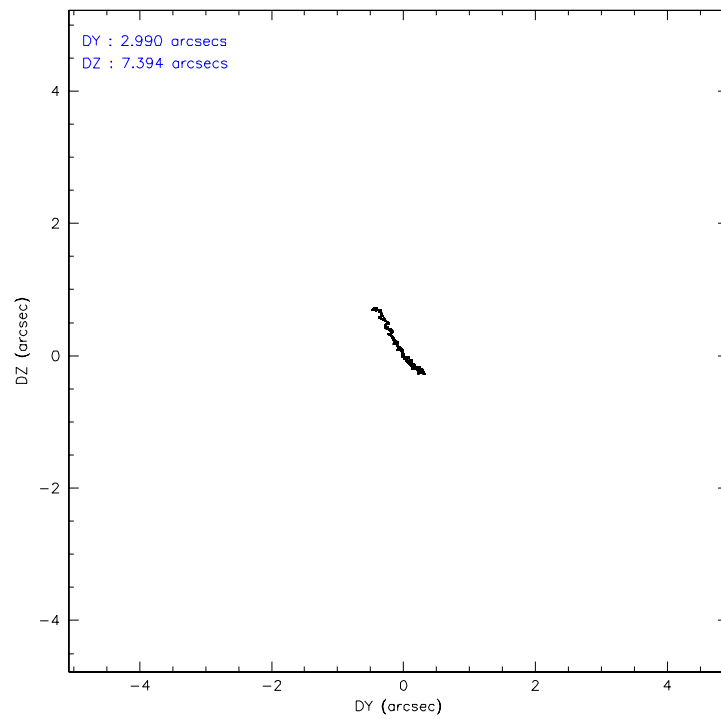
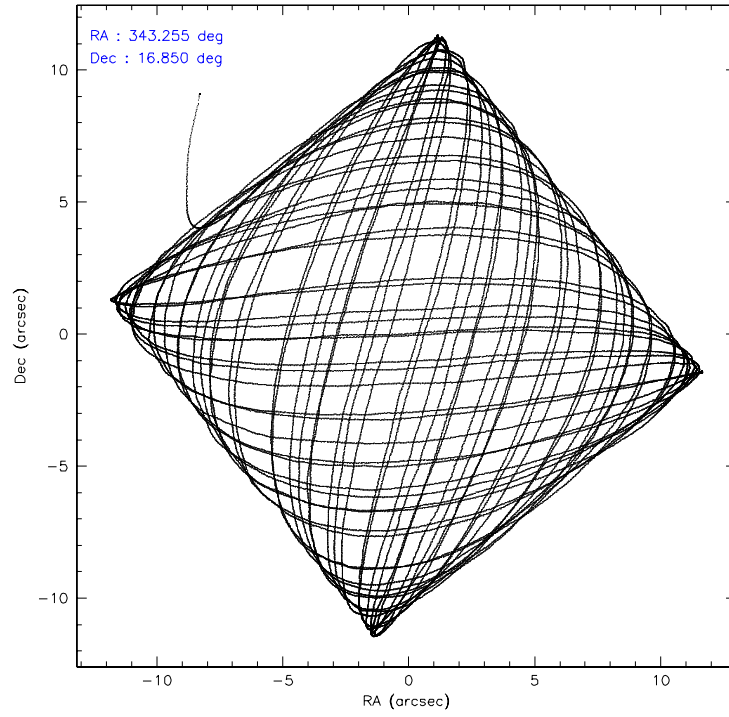
	ccd 4	ccd 5	ccd 6	ccd 7	ccd 8	ccd 9
level 1 events	196479	265442	183872	240132	224023	176307
rejected events	175984	150991	159239	150854	178354	156066
rejected %	89%	56%	86%	62%	79%	88%

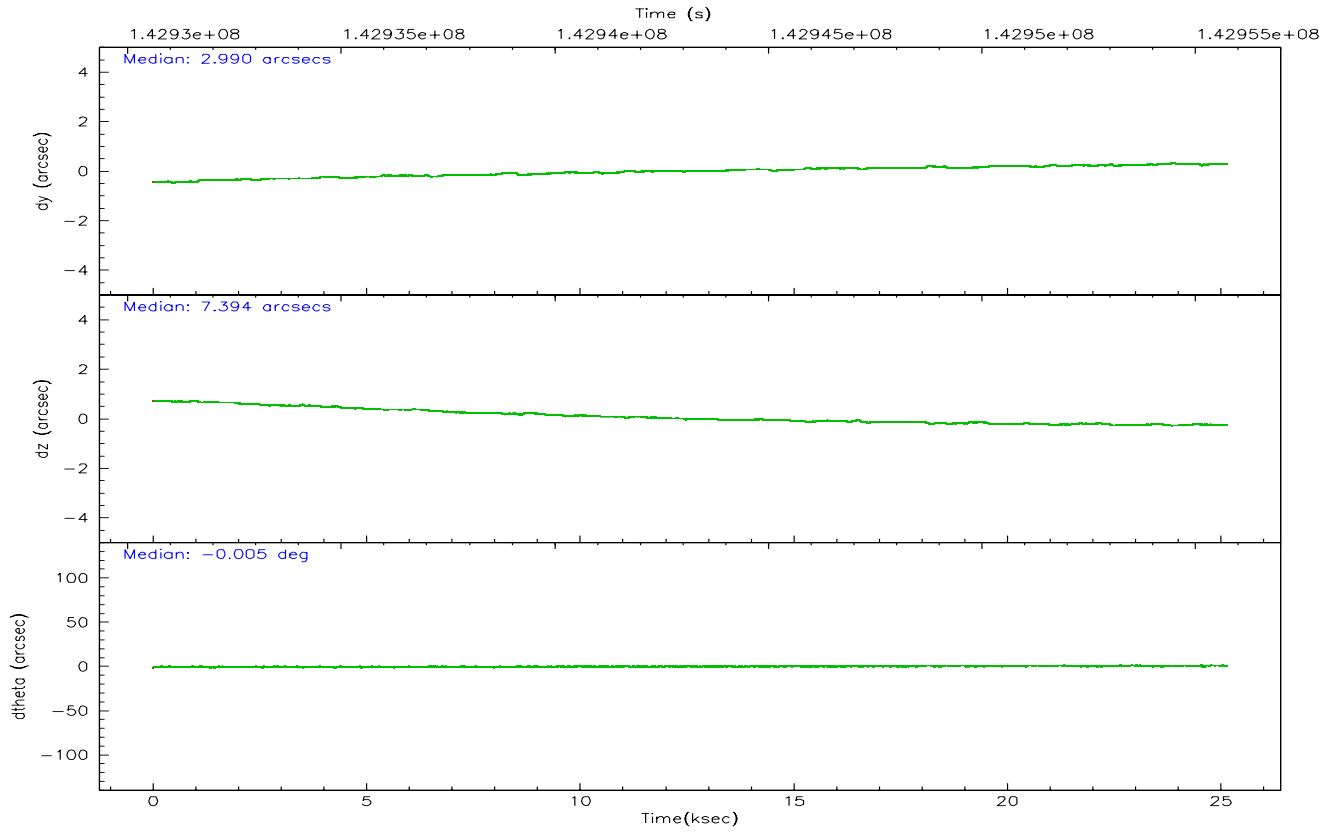
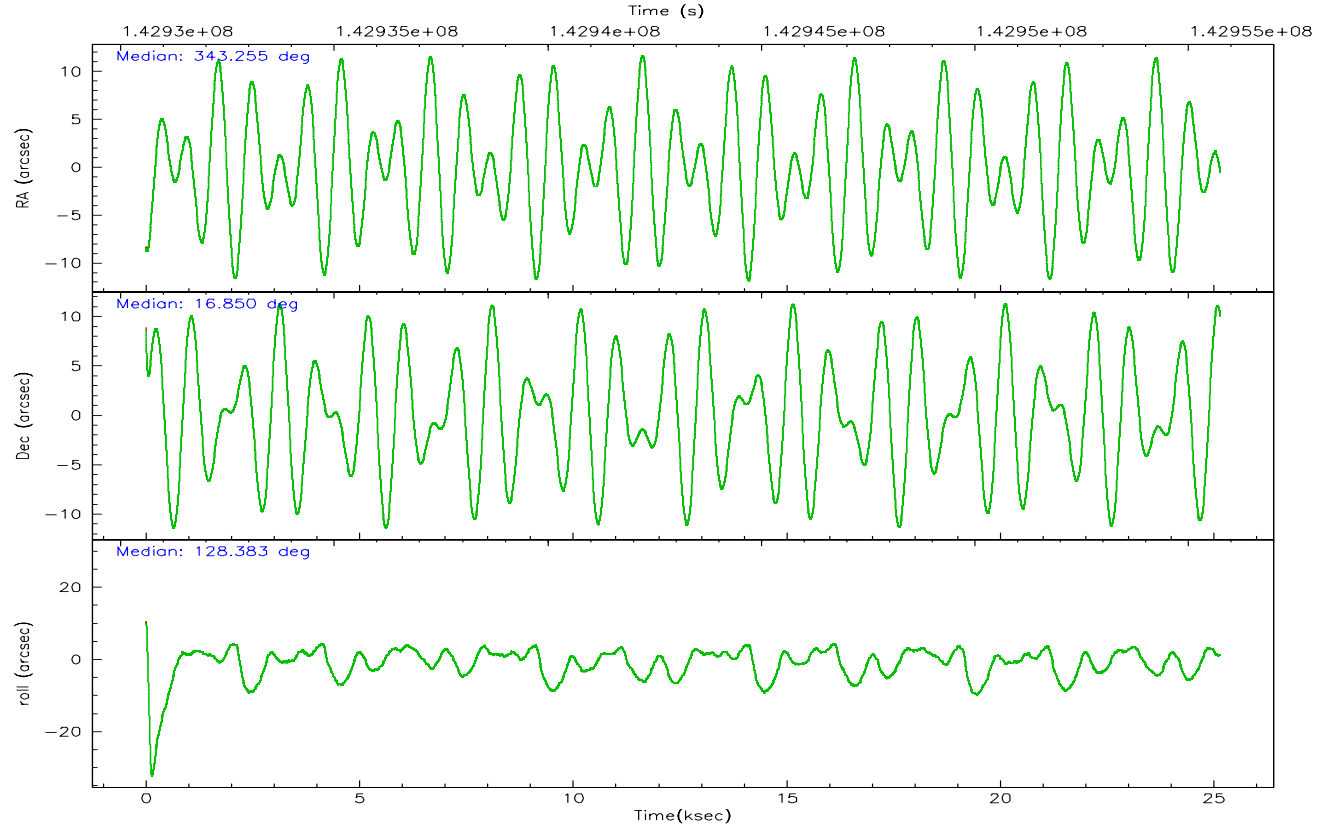
	ccd 4	ccd 5	ccd 6	ccd 7	ccd 8	ccd 9
grade 0 events	8720	16876	12601	6390	17505	8941
	4%	6%	6%	2%	7%	5%
grade 1 events	107	209	98	255	128	94
	0%	0%	0%	0%	0%	0%
grade 2 events	5366	35924	4683	22932	9862	4319
	2%	13%	2%	9%	4%	2%
grade 3 events	1956	2786	2258	5373	4709	2058
	0%	1%	1%	2%	2%	1%
grade 4 events	1914	2679	2169	5202	4362	2016
	0%	1%	1%	2%	1%	1%
grade 5 events	6477	12502	7628	16062	9676	7686
	3%	4%	4%	6%	4%	4%
grade 6 events	3795	63849	4117	54809	11603	4140
	1%	24%	2%	22%	5%	2%
grade 7 events	168144	130617	150318	129109	166178	147053
	85%	49%	81%	53%	74%	83%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	6	6
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
Pointing RA	343.281389	343.2547908313844	Subarray requested	NONE	NONE
Pointing Dec	16.840022	16.84974891778324	Alternating exposures requested	N	N
Pointing Roll	128.226194	128.390553638009	Primary exposure time	0.000000	3.2
SIM focus pos (mm)	-0.684267	-0.6828225247311905			
SIM defocus (mm)	0	0.001444936568705701			
SIM translation stage pos (mm)	-187.132523	-187.1254020033014			
SIM translation stage offset (mm)	-3	-3.007120579706367			
Observation start time	142930739.184000	142928854.68996			
Observation start date	2002-07-13T06:57:55	2002-07-13T06:27:34			
Observation end time	142955739.184000	142956551.7286			
Observation end date	2002-07-13T13:54:35	2002-07-13T14:09:11			
Read mode	TIMED	TIMED			

2.3 Aspect



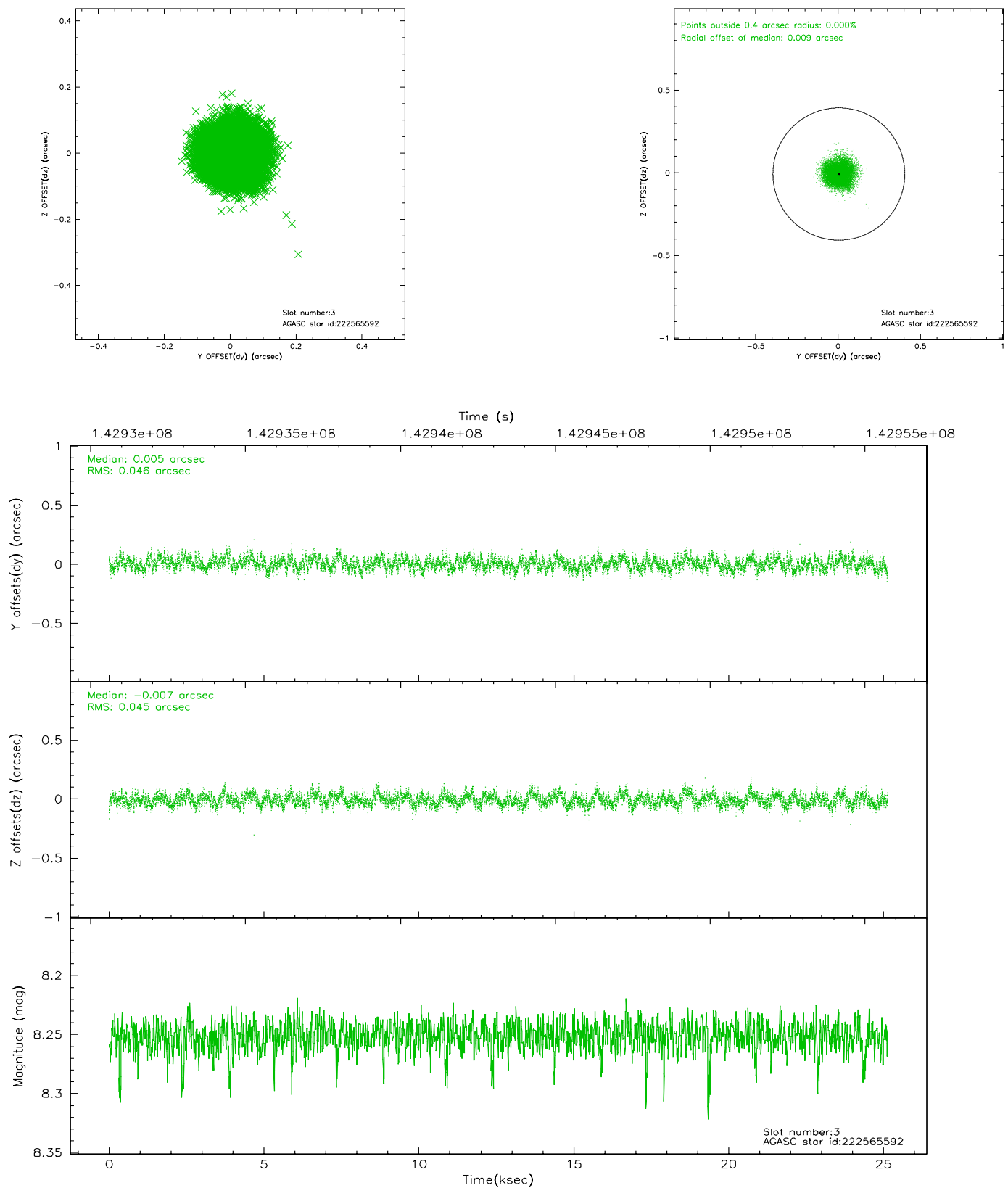


Slot Statistics

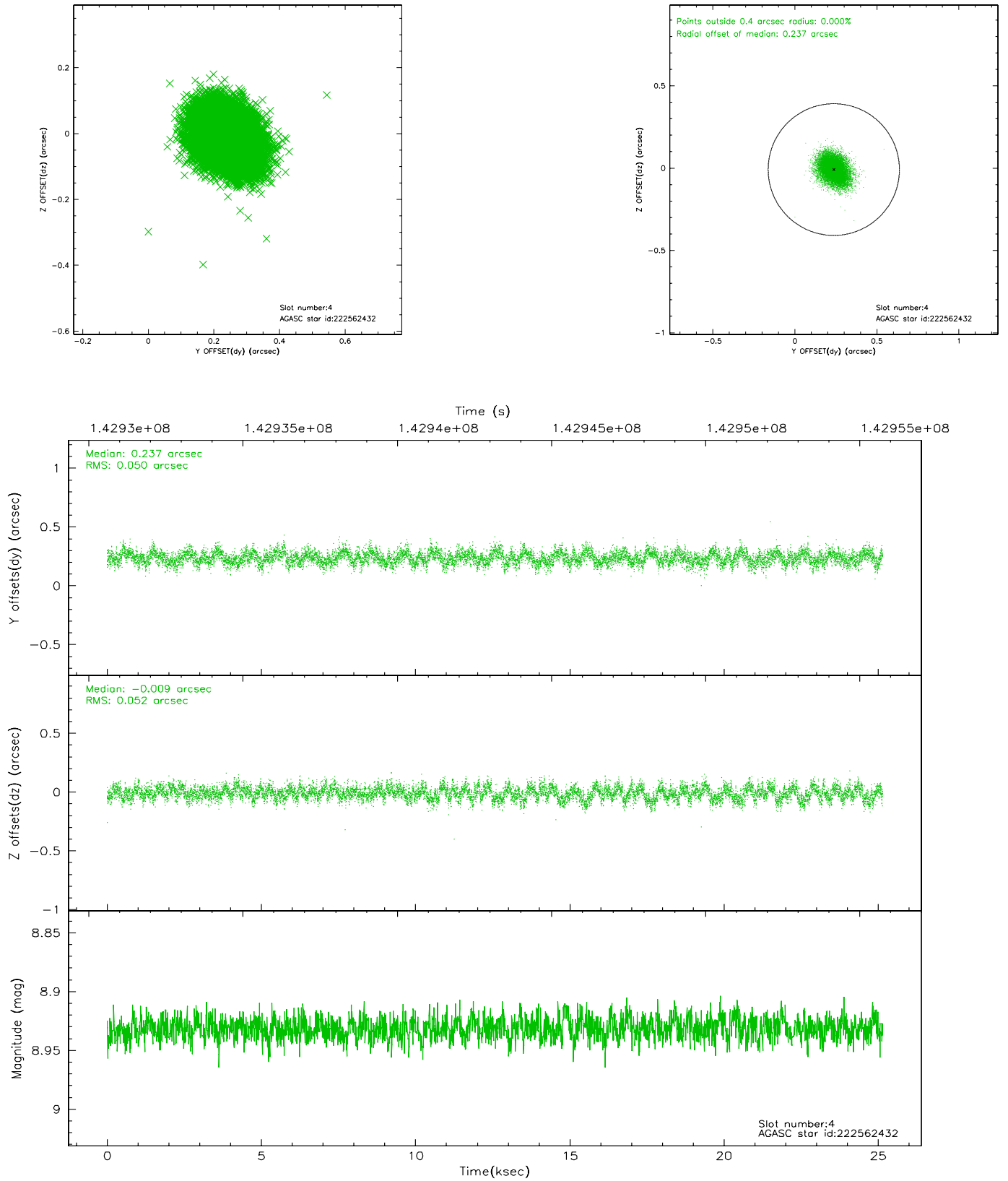
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-S-2	7.10	6134	-0.039	-0.011	0.013	0.020	0.000000	0.000000	-755.41	-1790.78
1	FID	ACIS-S-4	7.20	6134	-0.030	0.022	0.011	0.018	0.000000	0.000000	2157.78	117.65
2	FID	ACIS-S-5	7.24	6134	0.037	-0.002	0.016	0.028	0.000000	0.000000	-1808.06	111.35
3	GUIDE	222565592	8.25	12266	0.005	-0.007	0.070	0.108	343.291662	16.508291	-960.60	711.85
4	GUIDE	222562432	8.93	12268	0.237	-0.009	0.077	0.124	343.698150	16.309399	-2390.83	50.22
5	GUIDE	222563736	8.82	12265	0.071	-0.159	0.080	0.126	343.076284	16.308502	-1065.28	1740.60
6	GUIDE	223089808	9.09	12266	-0.346	0.216	0.078	0.126	343.220223	17.508272	2018.96	-1322.65
7	GUIDE	222571232	9.54	12265	0.037	-0.039	0.132	0.204	343.021766	16.540282	-293.18	1371.70

2.4 Star Slots

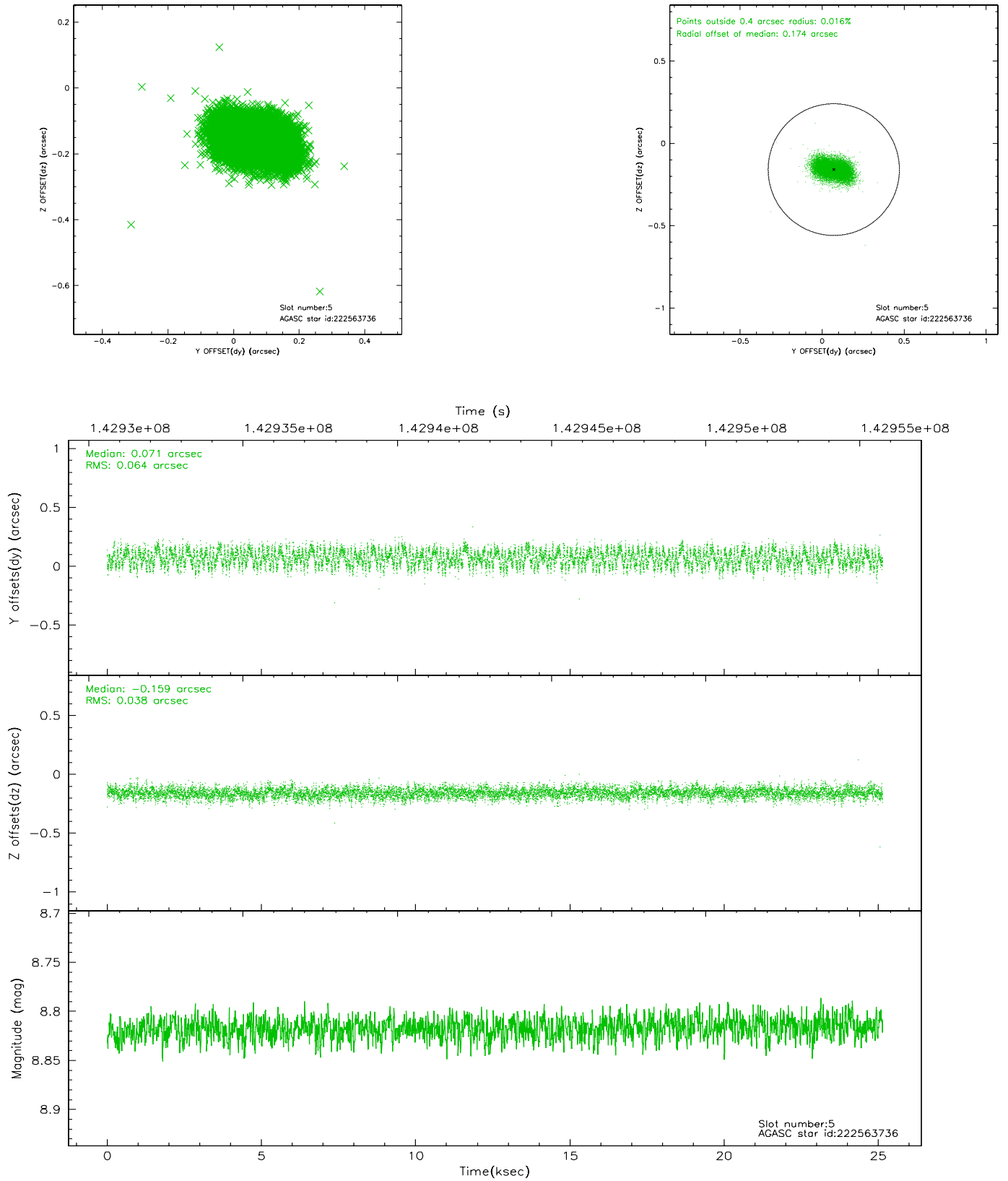
2.4.1 Slot 3



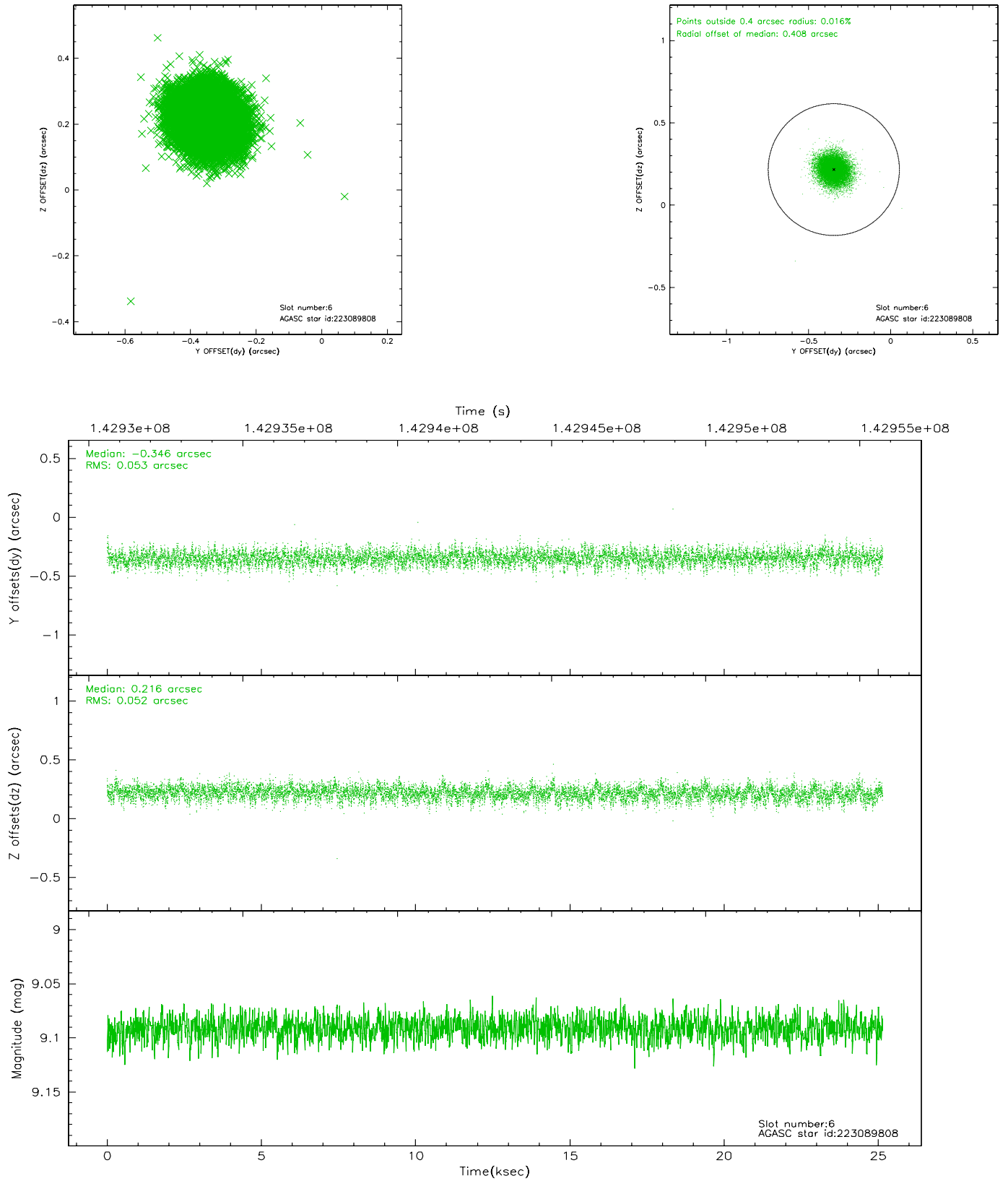
2.4.2 Slot 4



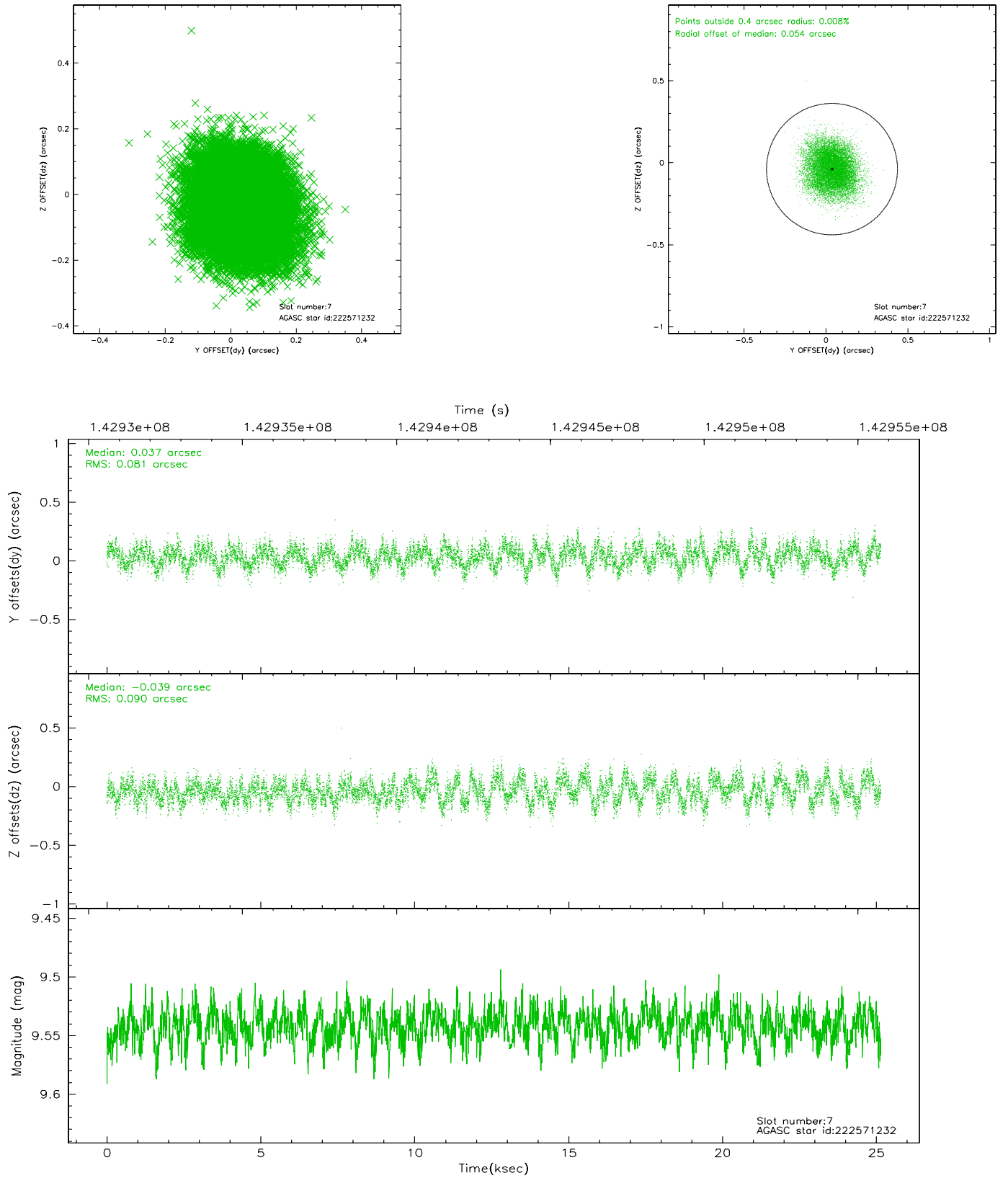
2.4.3 Slot 5



2.4.4 Slot 6

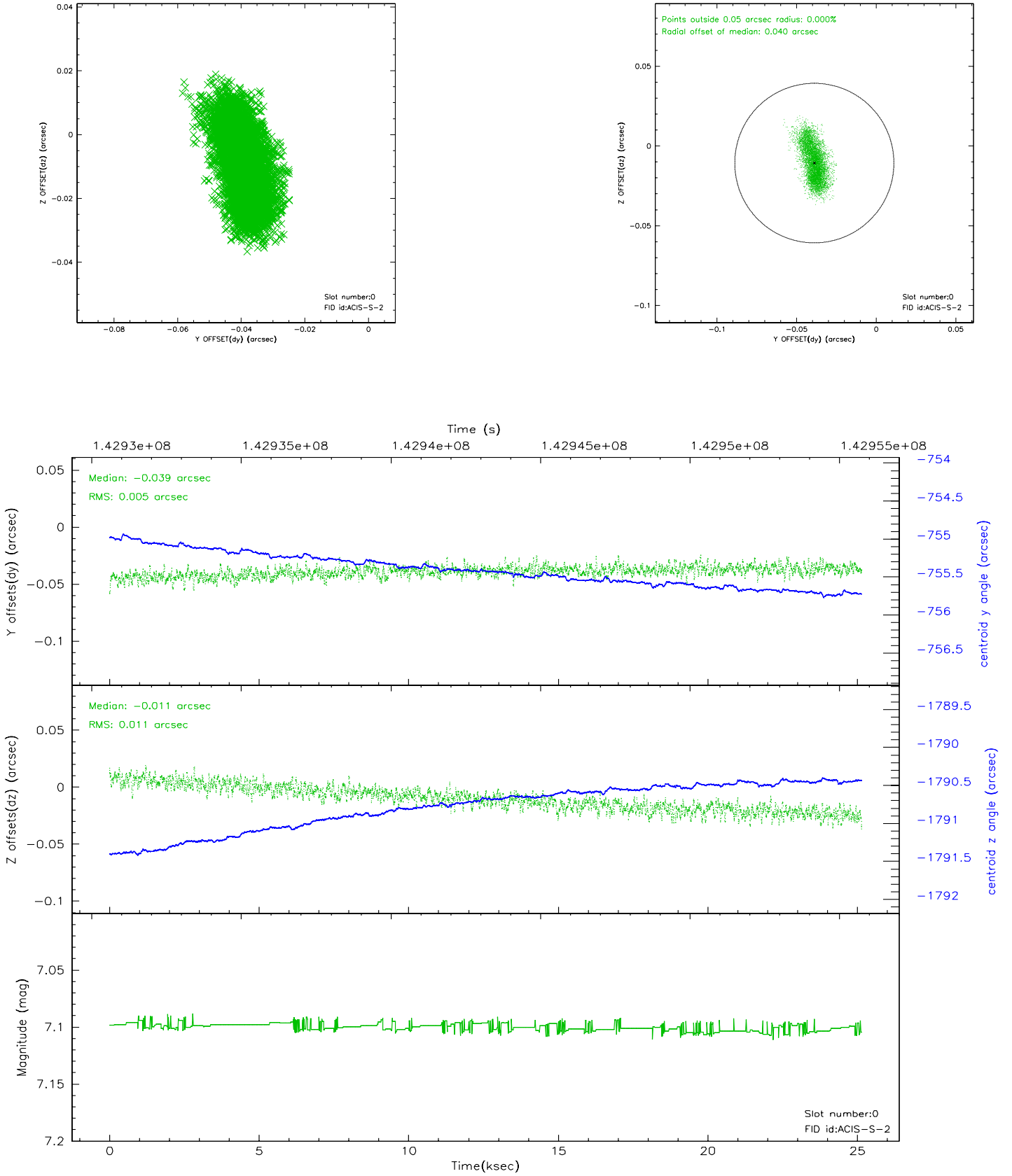


2.4.5 Slot 7

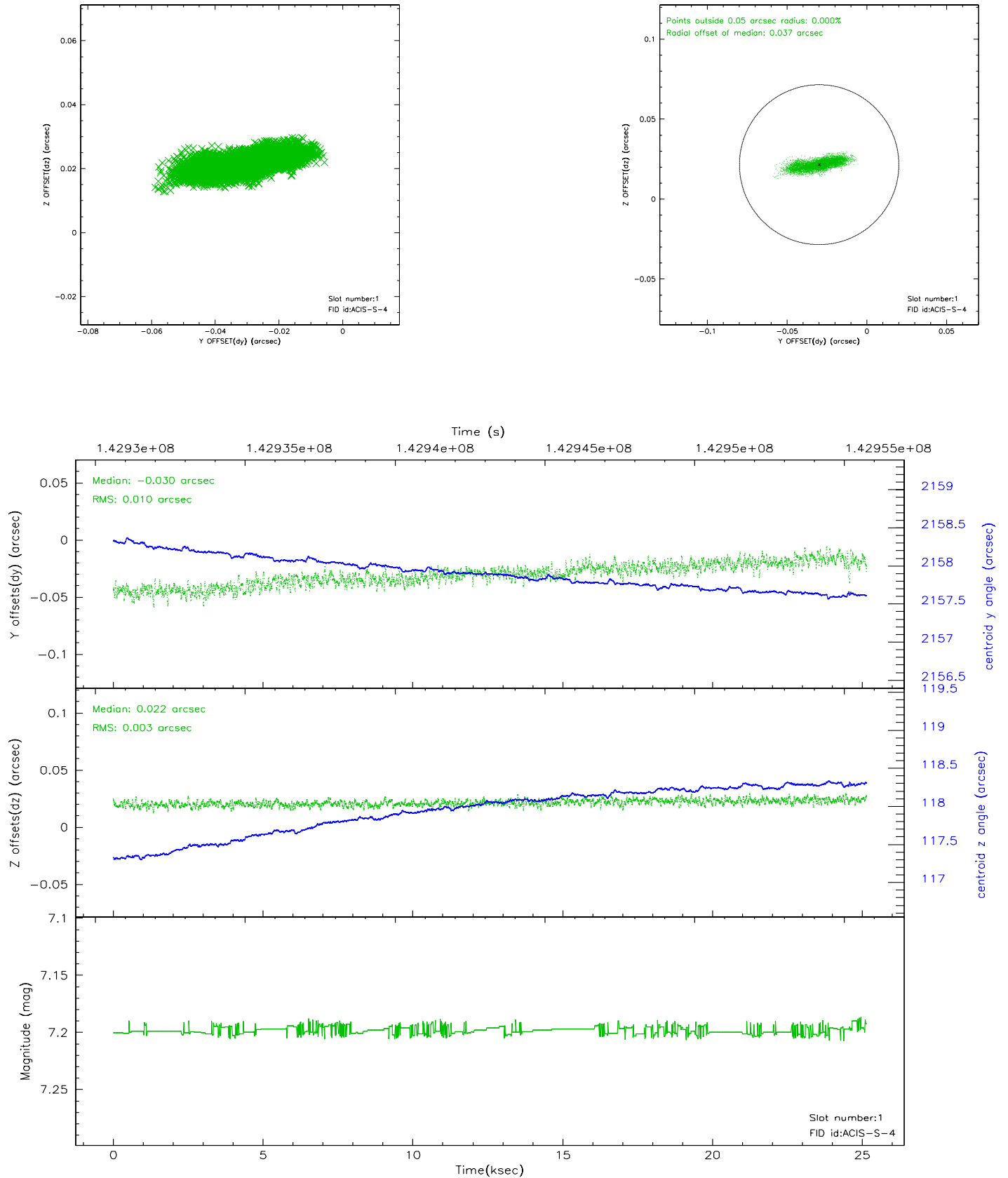


2.5 FID Slots

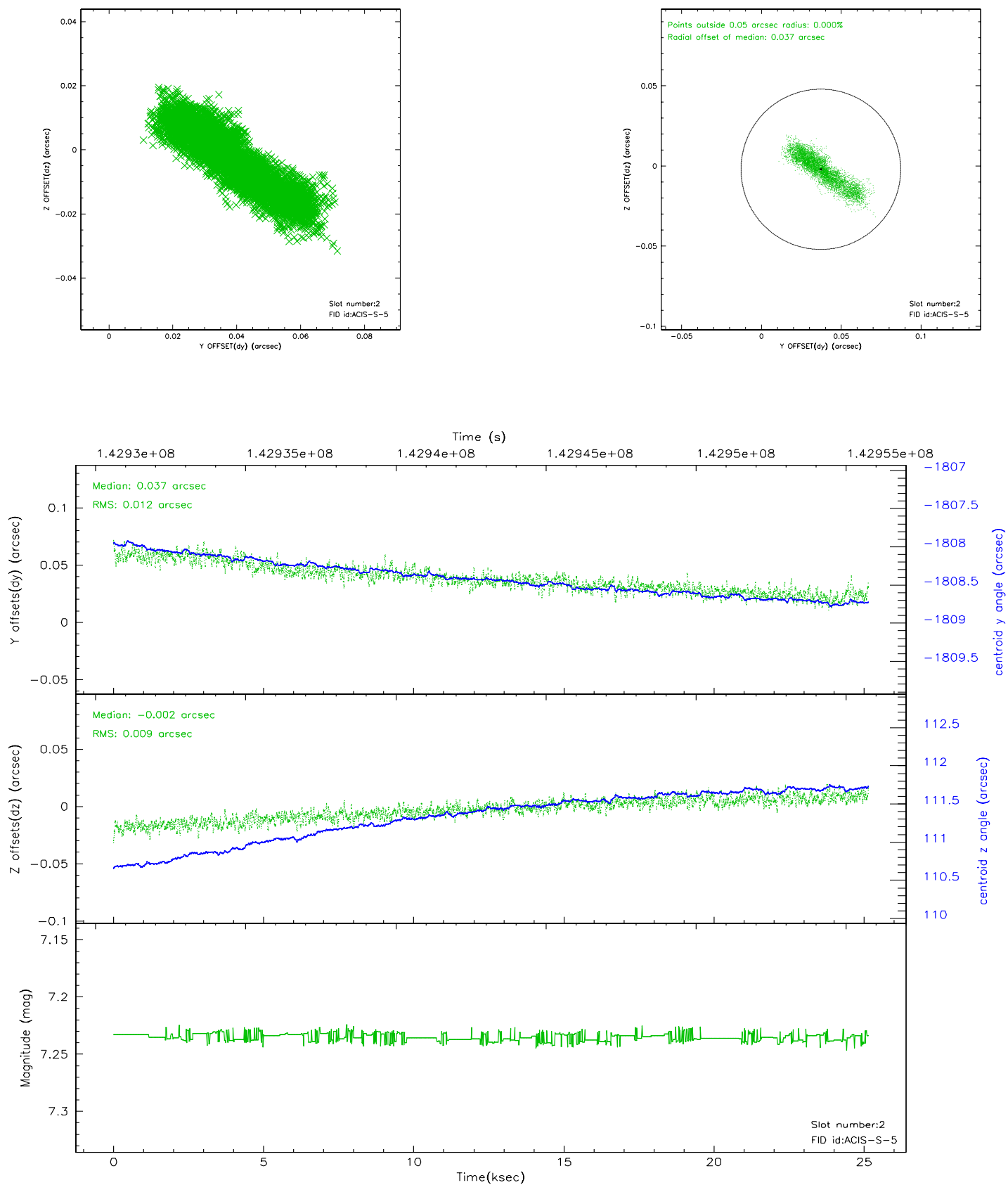
2.5.1 Slot 0



2.5.2 Slot 1



2.5.3 Slot 2

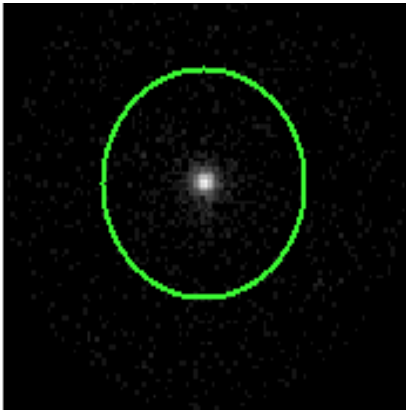


3 Gratings

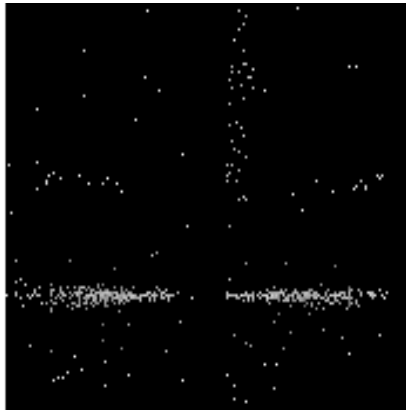
3.1 HEG Arm



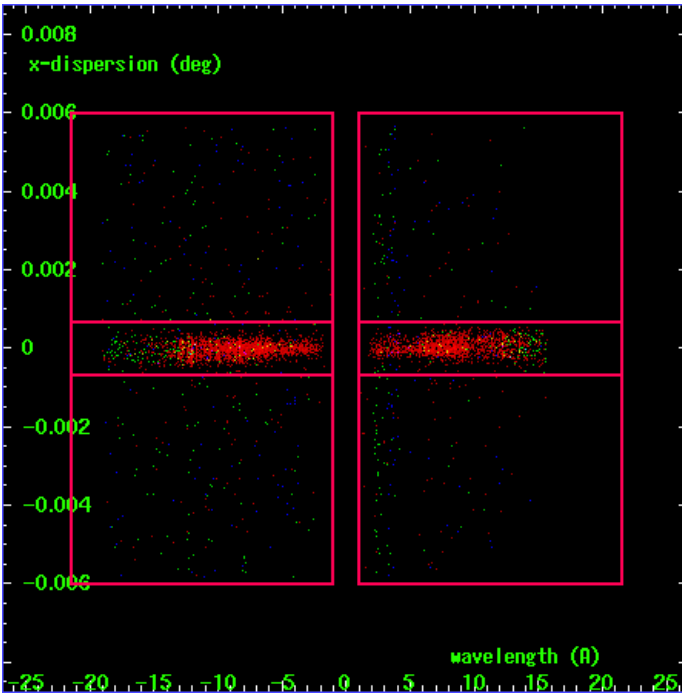
HEG Order Sort 123



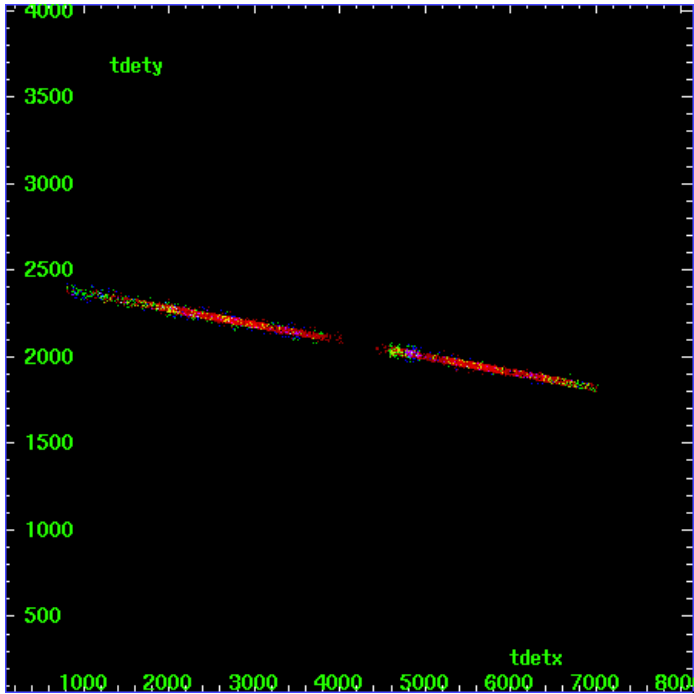
HEG Zero Order



HEG Order Sort ALL

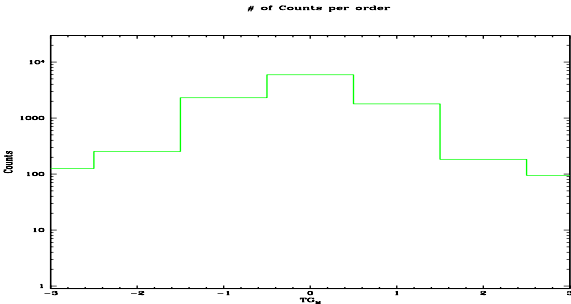


Spot Image HEG

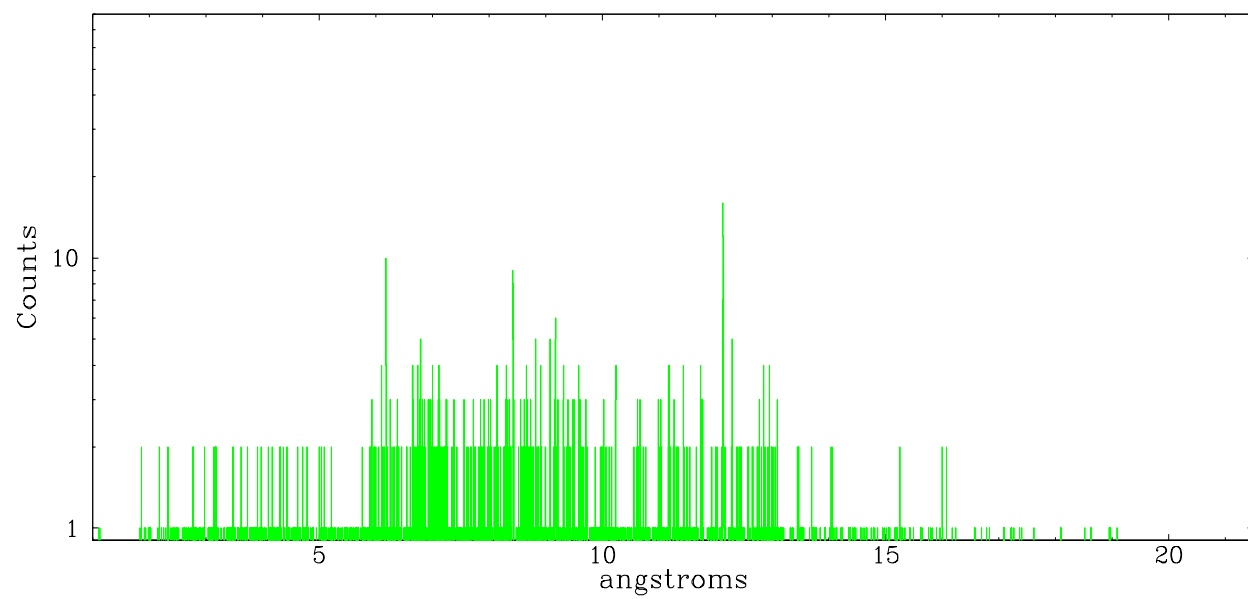


Full Detector HEG

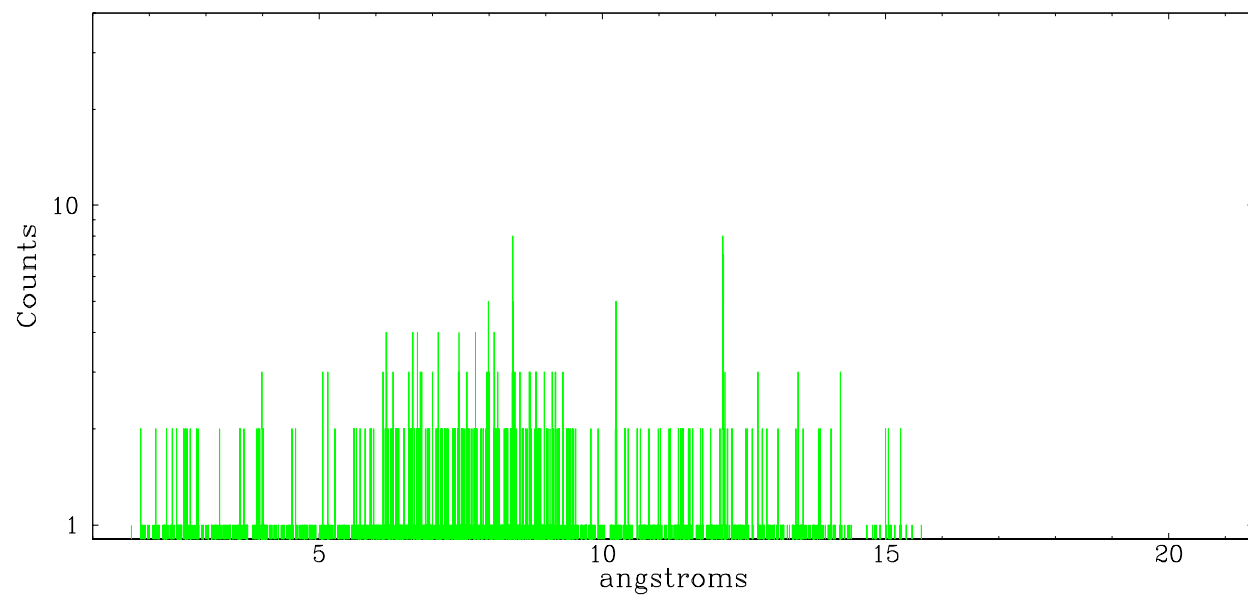
	order -3	order -2	order -1	order 0	order 1	order 2	order 3
Events	126	252	2298	5918	1795	183	95



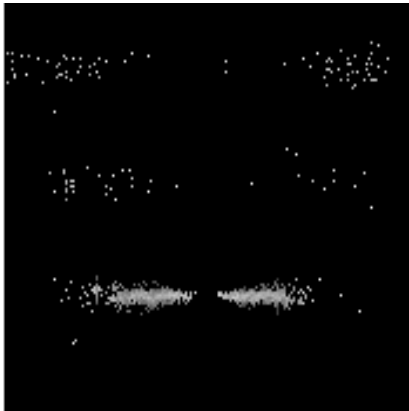
heg order -1



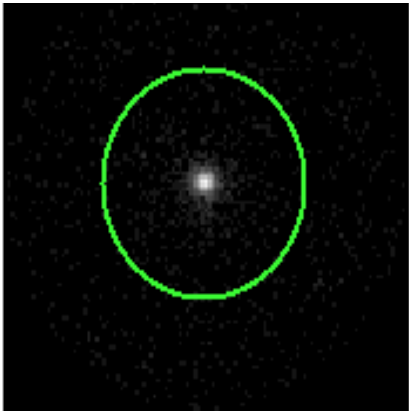
heg order +1



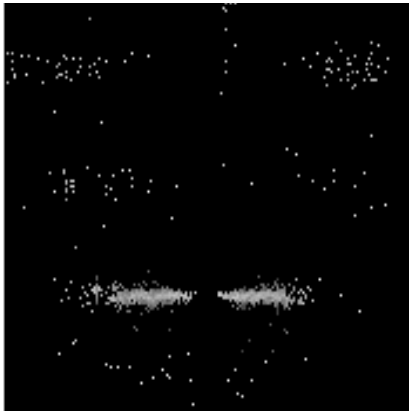
3.2 MEG Arm



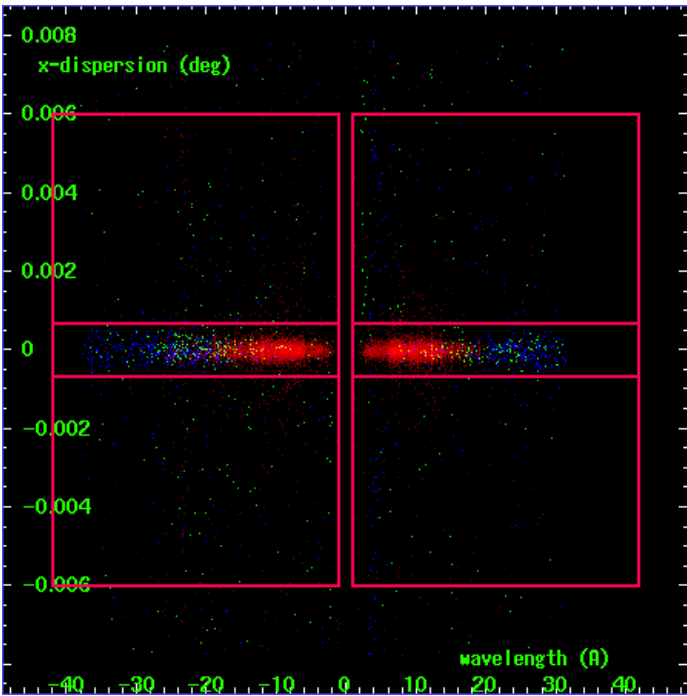
MEG Order Sort 123



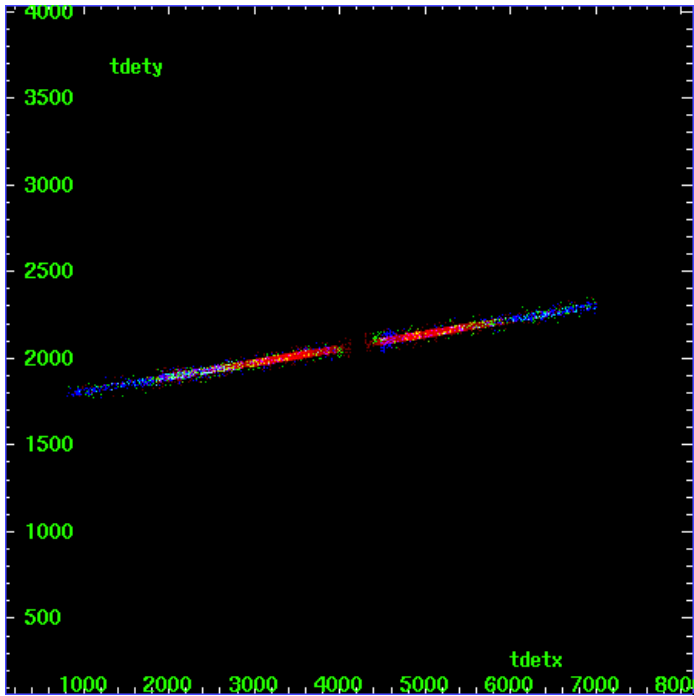
MEG Zero Order



MEG Order Sort ALL

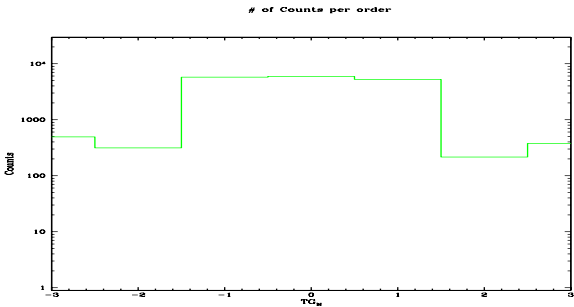


Spot Image MEG

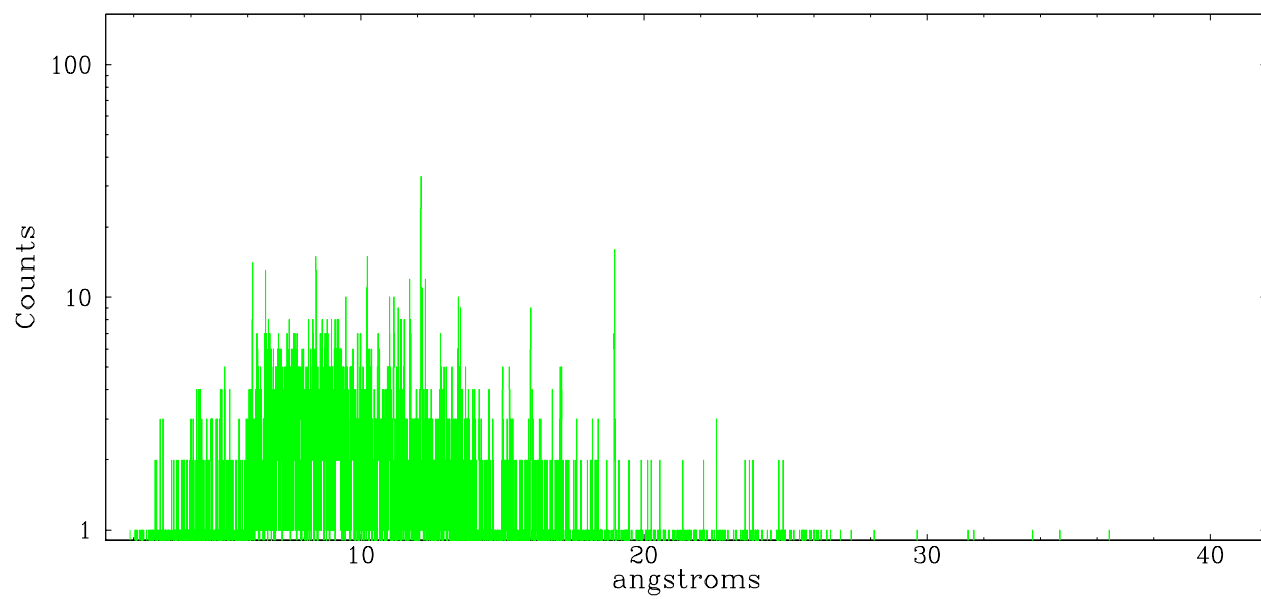


Full Detector MEG

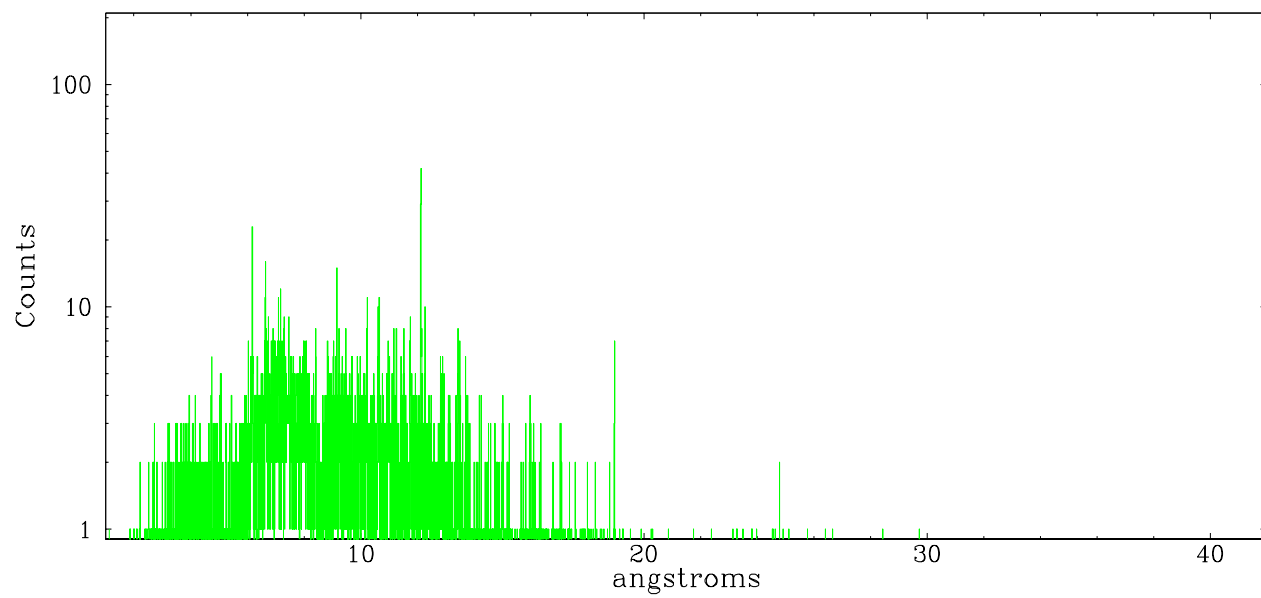
	order -3	order -2	order -1	order 0	order 1	order 2	order 3
Events	494	314	5752	5918	5239	215	378



meg order -1



meg order +1



A Summary

A.1 Status

V&V Scientist	Beth Sundheim
V&V Date (YYYY-MM-DD)	2006.09.24
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	25.145

A.2 Comments