

# V&V Reference Report

## L2 ASCDS Version : 7.6.8.1

Observation 2526 - L2 Version 001  
Chandra X-Ray Center

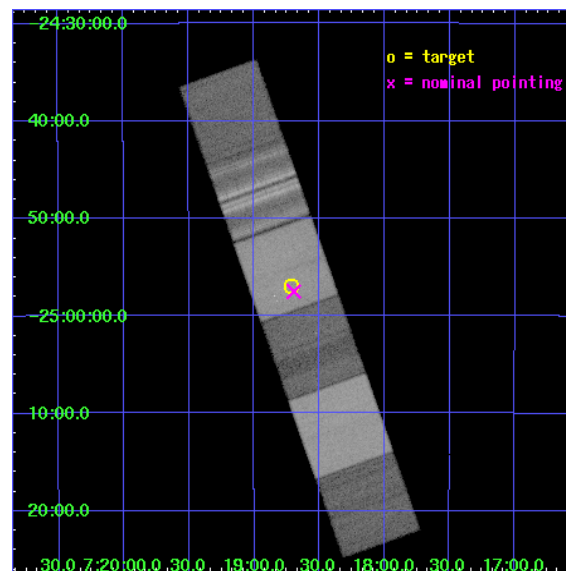
L2 Processing Date : Sep 11 2006

## Contents

<b>1</b>	<b>Front</b>	<b>2</b>
<b>2</b>	<b>OBI</b>	<b>3</b>
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
<b>3</b>	<b>Gratings</b>	<b>17</b>
3.1	HEG Arm . . . . .	17
3.2	MEG Arm . . . . .	19
<b>A</b>	<b>Summary</b>	<b>21</b>
A.1	Status . . . . .	21
A.2	Comments . . . . .	21

# 1 Front

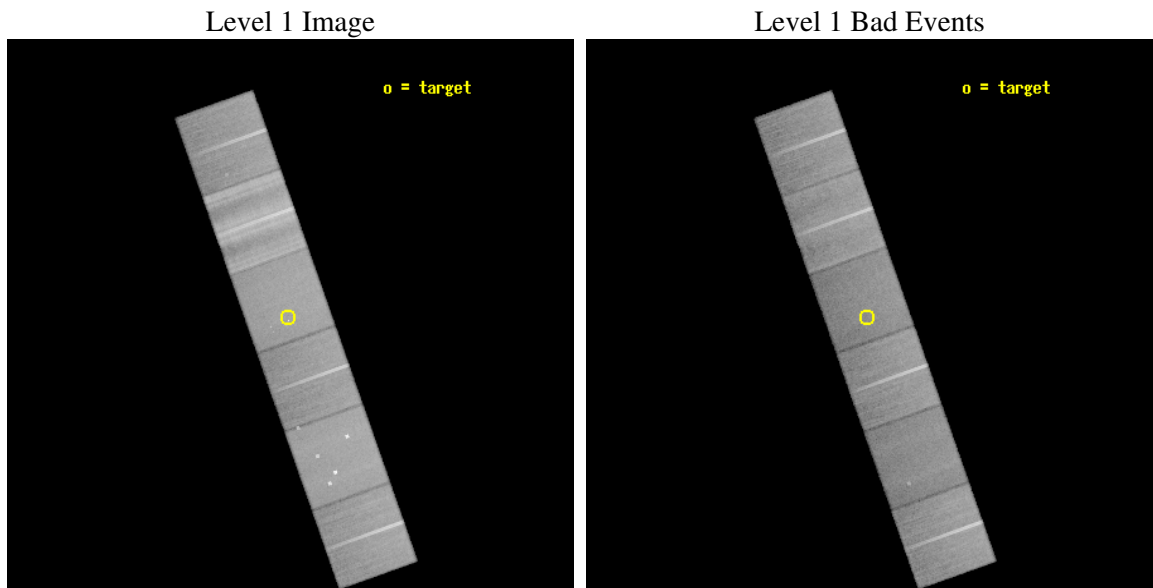
seq_num	200134
obs_id	2526
title	HIGH RESOLUTION SPECTROSCOPY OF THE YOUNG STELLAR CLUSTER NGC 2362
observer	Prof. Claude Canizares
object	NGC2362
dtcycle	0
cycle	P
ra_targ	109.679167
dec_targ	-24.949972
ra_nom	109.6738561775
dec_nom	-24.958392071548
roll_nom	250.45438651464
revision	2
ontime	44454.399834394
livetime	43891.491456465
ontime4	44454.399834394
ontime5	44454.399834394
ontime6	44454.399834394
ontime7	44454.399834394
ontime8	44447.917963743
ontime9	44454.399834394
l2events	662668



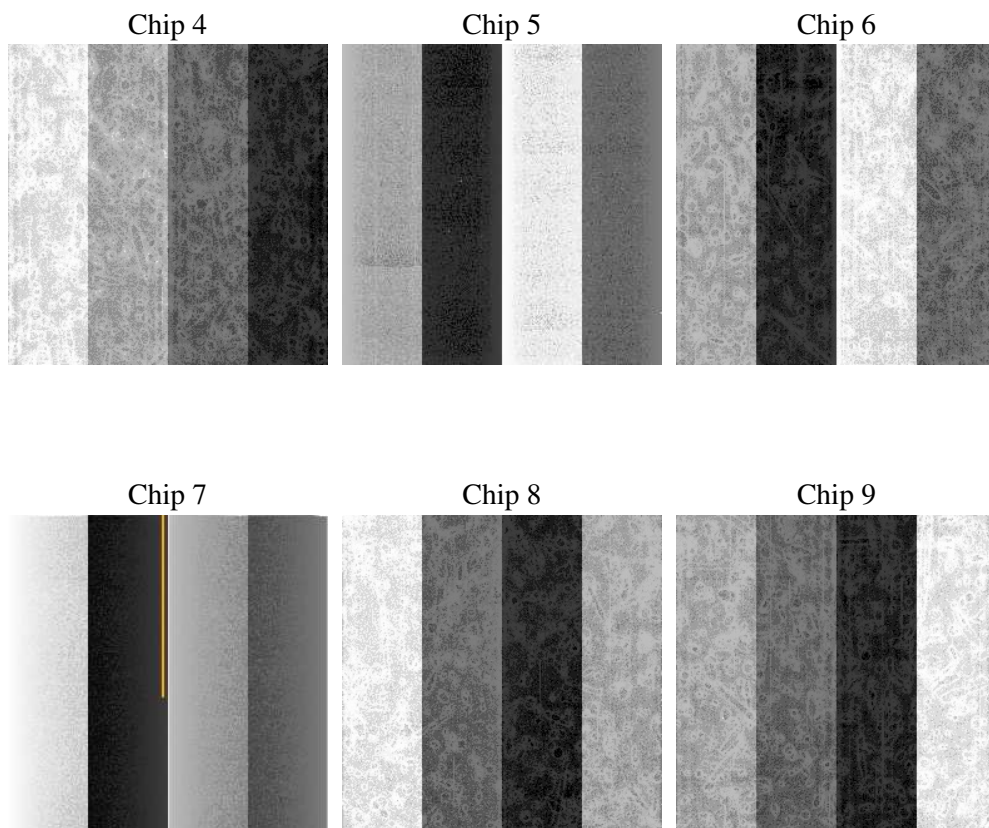
## 2 OBI

### 2.1 OBI

#### 2.1.1 Images



#### 2.1.2 Bias



### 2.1.3 Parameters

obi_num	1
ascdsver	7.6.8.1
caldsver	3.2.3
date	2006-09-11T11:23:54
revision	2

sched_exp_time	44500.000000
ontime	44460.016800225
ontime4	44460.016770303
ontime5	44460.016800225
ontime6	44460.016770303
ontime7	44460.016800225
ontime8	44453.534899652
ontime9	44460.016770303
l1events	2570509

### 2.1.4 Events

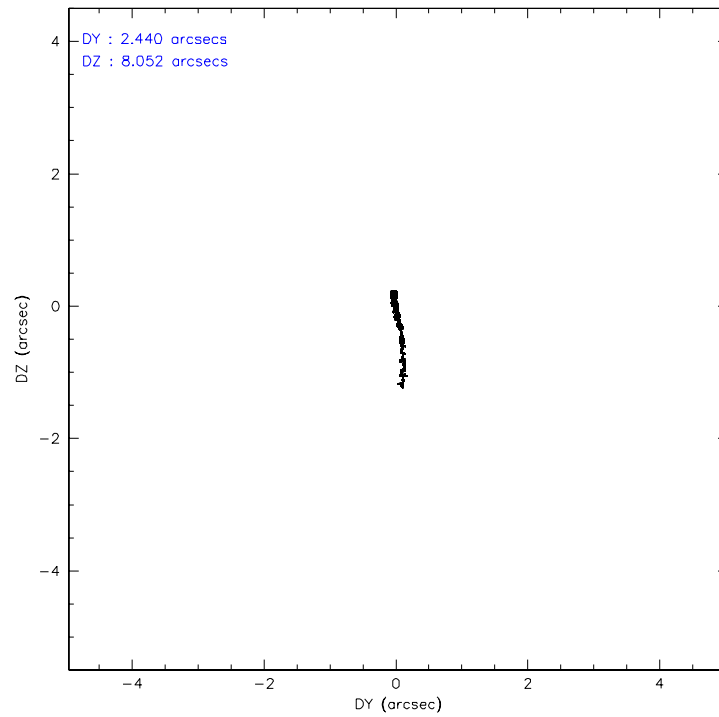
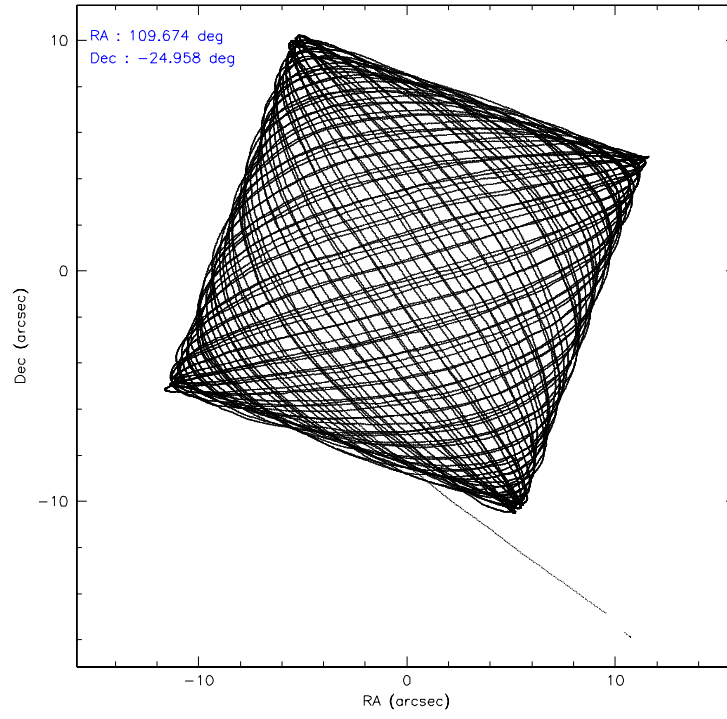
	ccd 4	ccd 5	ccd 6	ccd 7	ccd 8	ccd 9
level 1 events	400240	462911	367981	419277	564227	355873
rejected events	331558	234659	306007	232229	331925	294130
rejected %	82%	50%	83%	55%	58%	82%

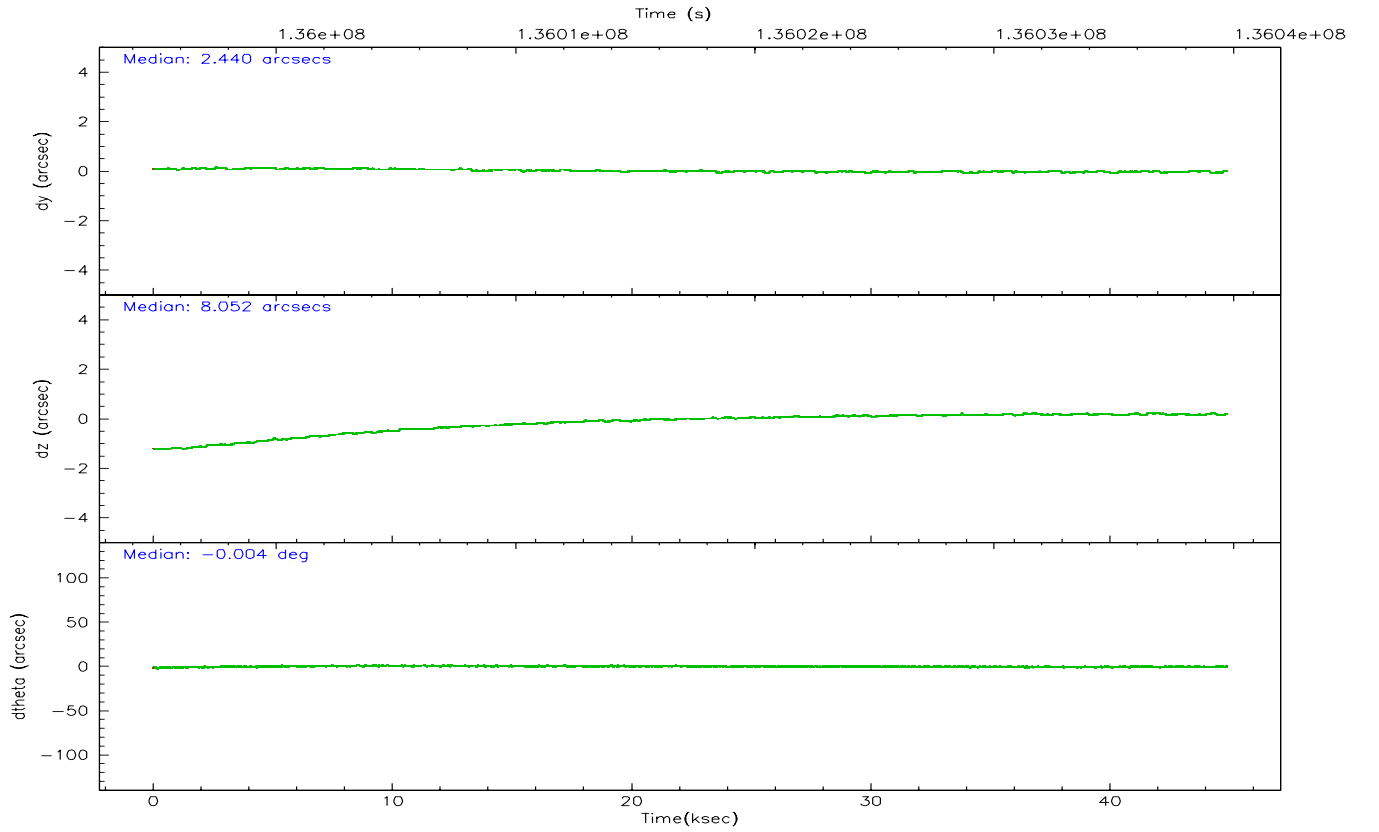
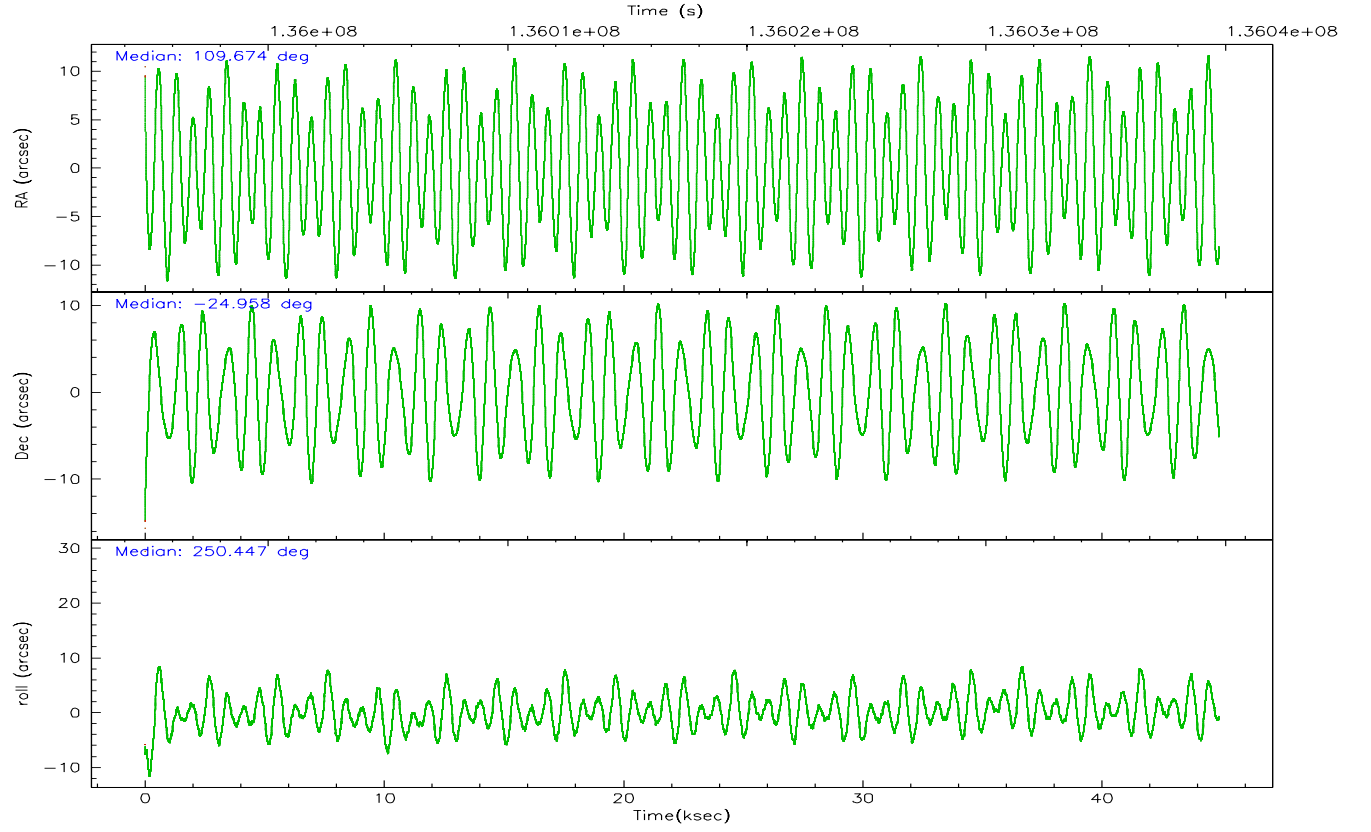
	ccd 4	ccd 5	ccd 6	ccd 7	ccd 8	ccd 9
grade 0 events	34557	23906	32402	12101	84756	31979
	8%	5%	8%	2%	15%	8%
grade 1 events	300	370	231	257	643	207
	0%	0%	0%	0%	0%	0%
grade 2 events	16838	71435	11844	47125	36372	11751
	4%	15%	3%	11%	6%	3%
grade 3 events	4320	6638	4213	9997	33791	4379
	1%	1%	1%	2%	5%	1%
grade 4 events	4162	5905	4123	9871	29939	4185
	1%	1%	1%	2%	5%	1%
grade 5 events	10319	20434	12173	25817	17489	12538
	2%	4%	3%	6%	3%	3%
grade 6 events	8814	120394	9400	107976	47464	9459
	2%	26%	2%	25%	8%	2%
grade 7 events	320930	213829	293595	206133	313773	281375
	80%	46%	79%	49%	55%	79%

## 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	On-chip summing requested	N	N
Observation mode	POINTING	POINTING	Subarray requested	NONE	NONE
Pointing RA	109.668047	109.6738561774951	Alternating exposures requested	N	N
Pointing Dec	-24.931666	-24.9583920715483	Primary exposure time	0.000000	3.2
Pointing Roll	250.295311	250.4543865146353			
SIM focus pos (mm)	-0.684267	-0.6828225247311905			
SIM defocus (mm)	0	0.001444936568705701			
SIM translation stage pos (mm)	-190.132523	-190.1400660498719			
SIM translation stage offset (mm)	0	0.00754346686406393			
Observation start time	135995250.184000	135994176.41903			
Observation start date	2002-04-24T00:26:26	2002-04-24T00:09:36			
Observation end time	136039750.184000	136040498.22091			
Observation end date	2002-04-24T12:48:06	2002-04-24T13:01:38			
Read mode	TIMED	TIMED			

## 2.3 Aspect



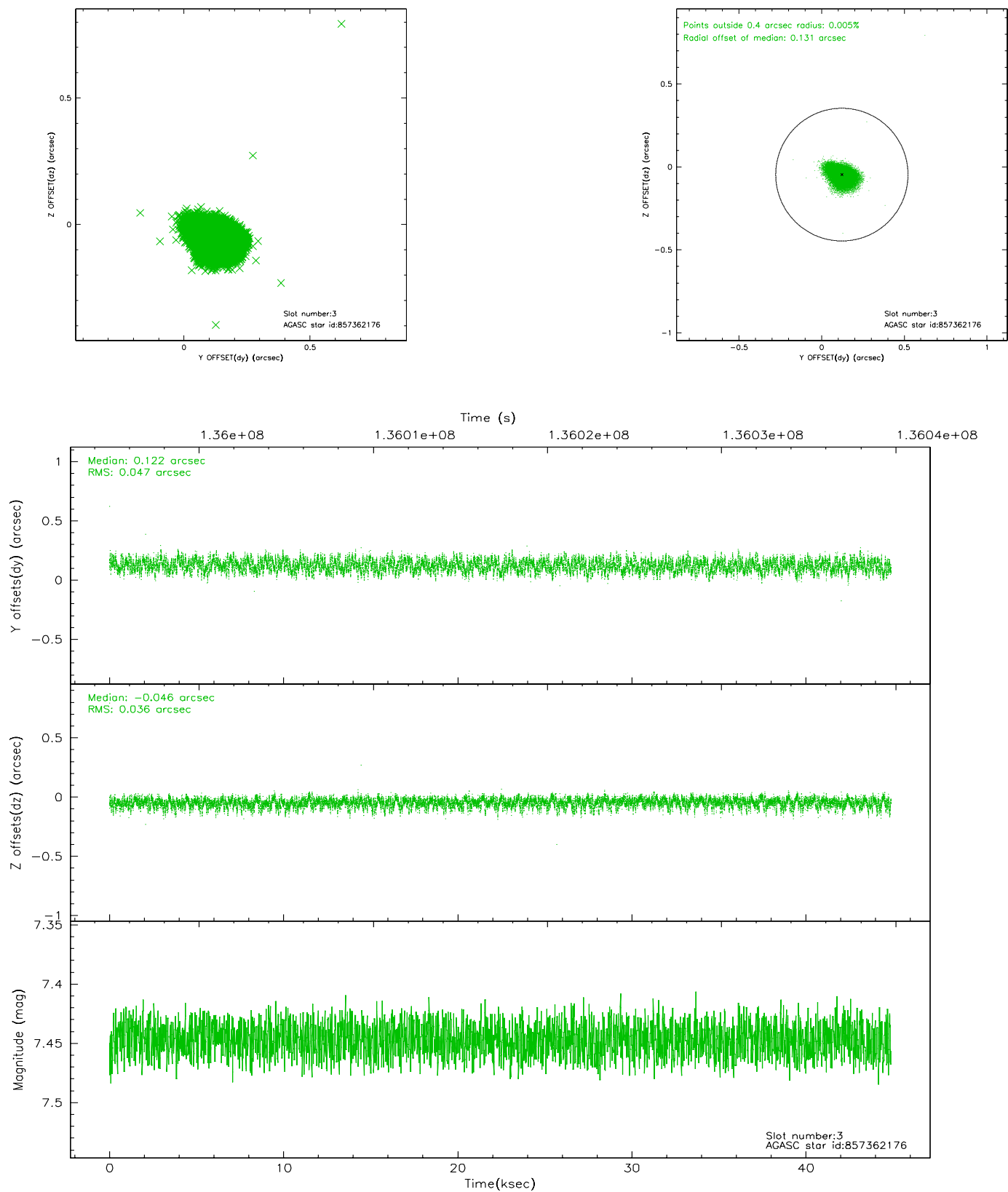


### Slot Statistics

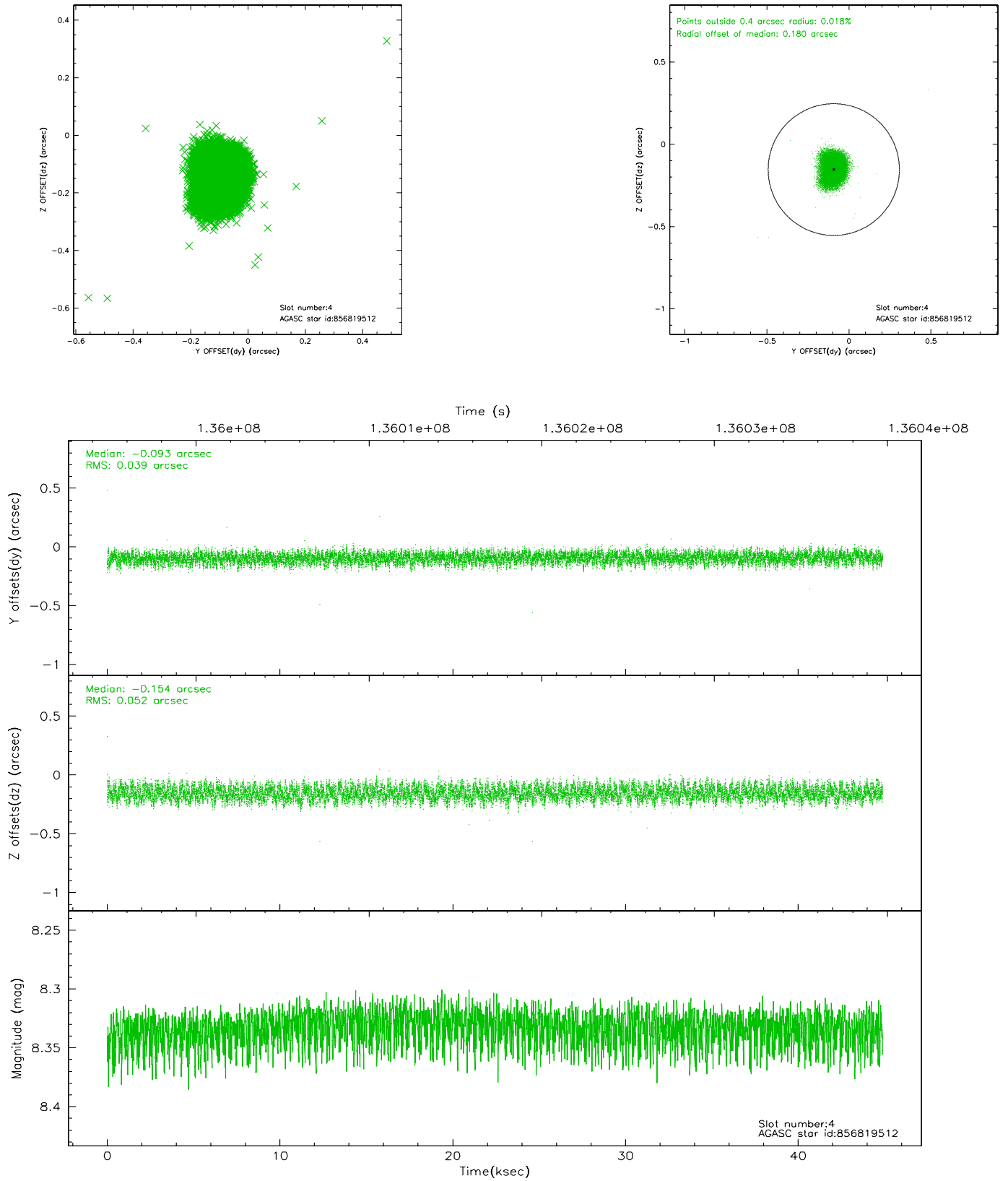
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-S-1	7.19	10954	0.009	0.019	0.016	0.039	0.000000	0.000000	940.93	-1724.69
1	FID	ACIS-S-5	7.24	10954	0.034	0.038	0.007	0.015	0.000000	0.000000	-1808.01	172.94
2	FID	ACIS-S-6	7.36	10953	-0.065	-0.045	0.016	0.053	0.000000	0.000000	406.46	816.78
3	GUIDE	857362176	7.45	21906	0.122	-0.046	0.064	0.101	109.209415	-25.159020	1277.57	-1129.64
4	GUIDE	856819512	8.33	21905	-0.093	-0.154	0.069	0.111	109.292794	-24.352083	-1547.13	-1861.66
5	GUIDE	857351440	9.06	21901	-0.008	-0.039	0.071	0.116	109.072756	-25.276289	1826.01	-1404.21
6	GUIDE	857371208	9.30	21899	-0.081	0.103	0.095	0.155	110.071536	-24.829278	-789.32	1117.80
7	GUIDE	857369368	9.36	21893	0.058	0.140	0.101	0.164	110.148795	-25.173974	296.02	1770.26

## 2.4 Star Slots

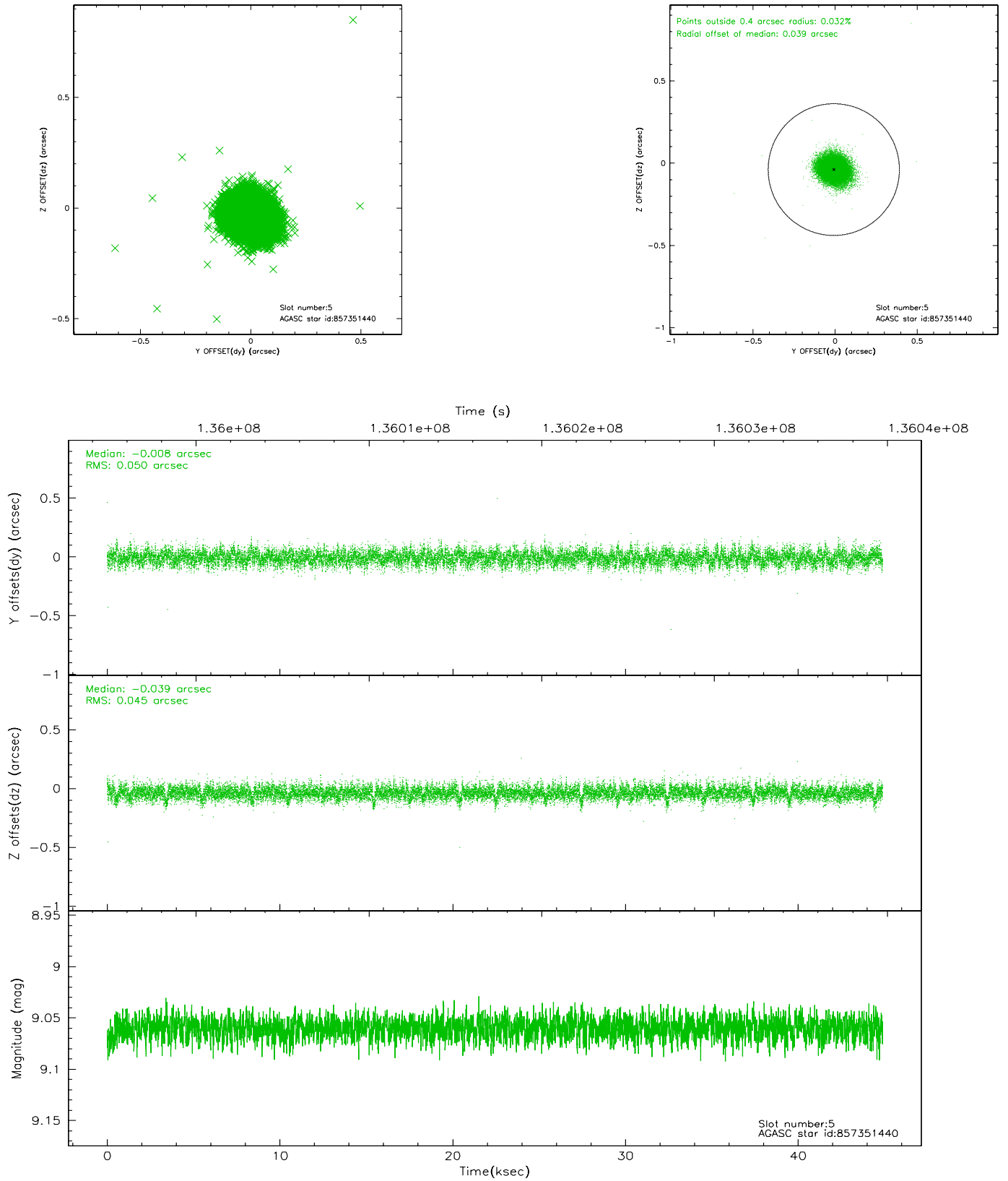
### 2.4.1 Slot 3



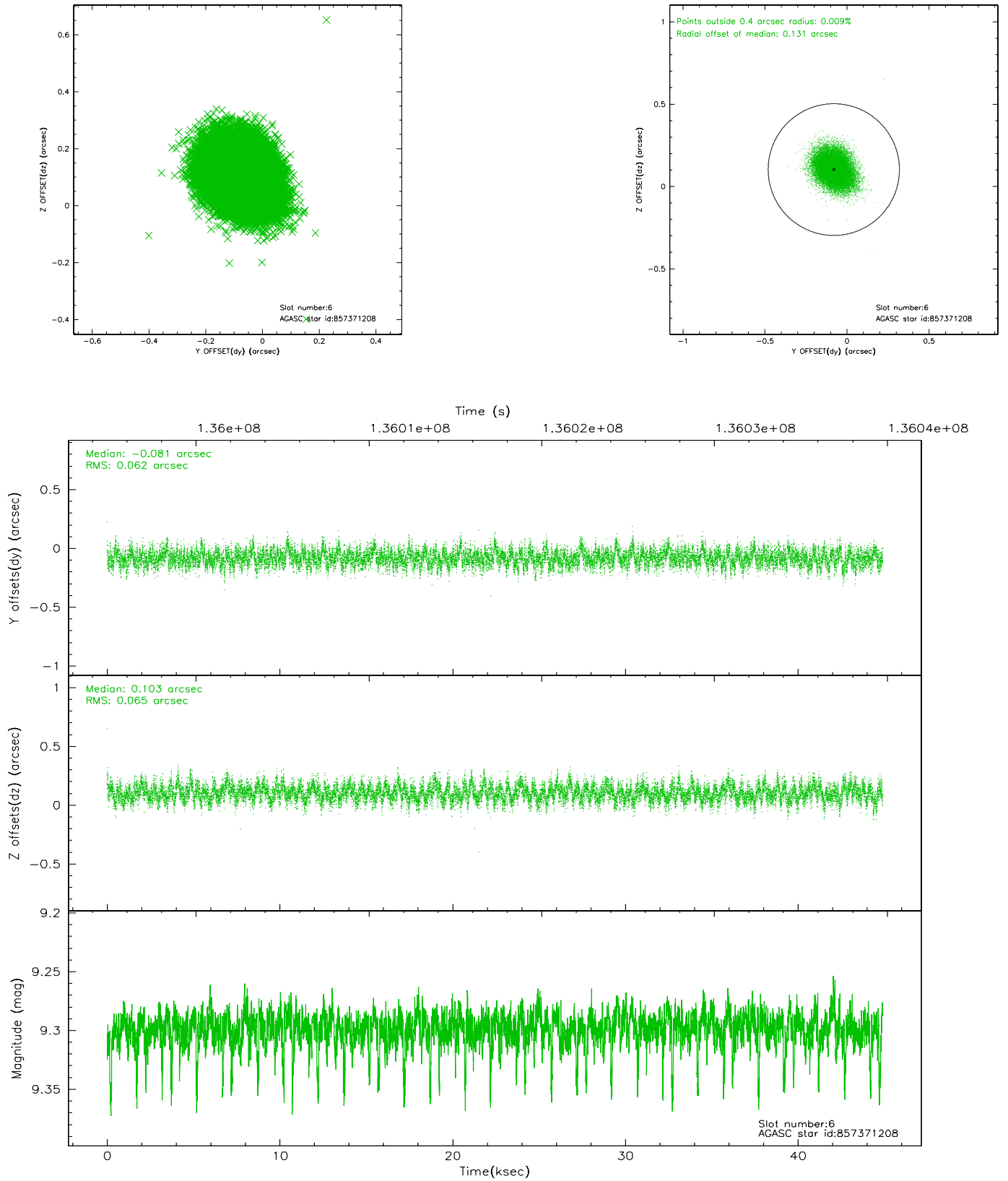
## 2.4.2 Slot 4



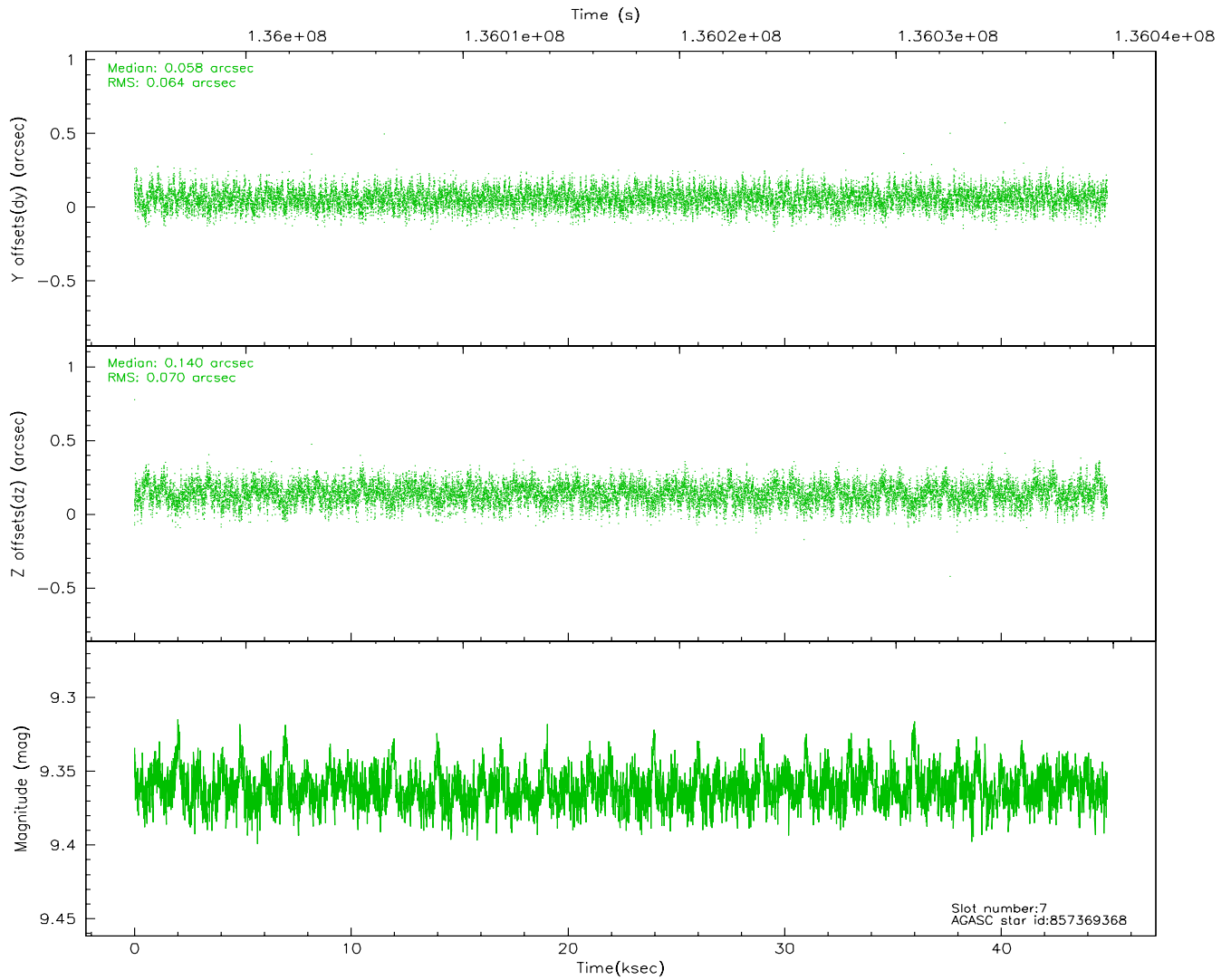
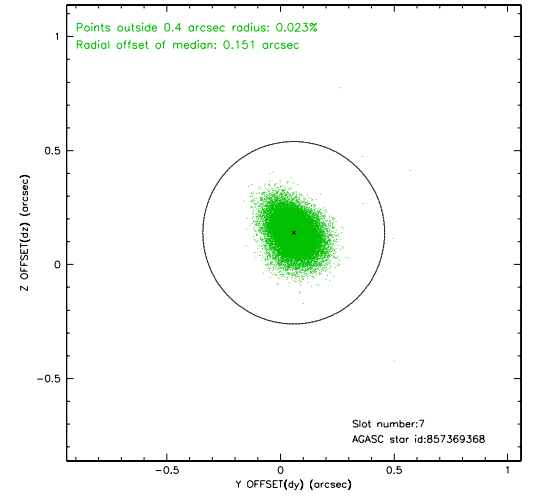
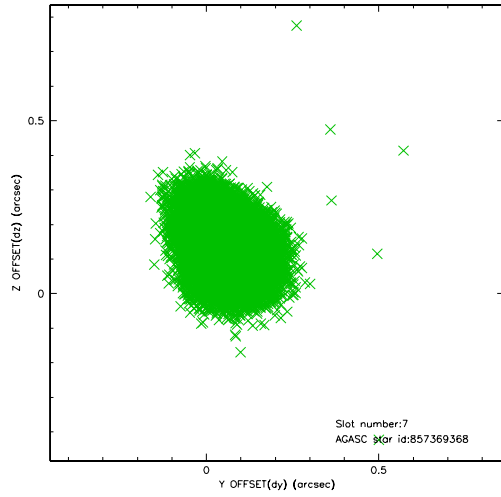
### 2.4.3 Slot 5



## 2.4.4 Slot 6

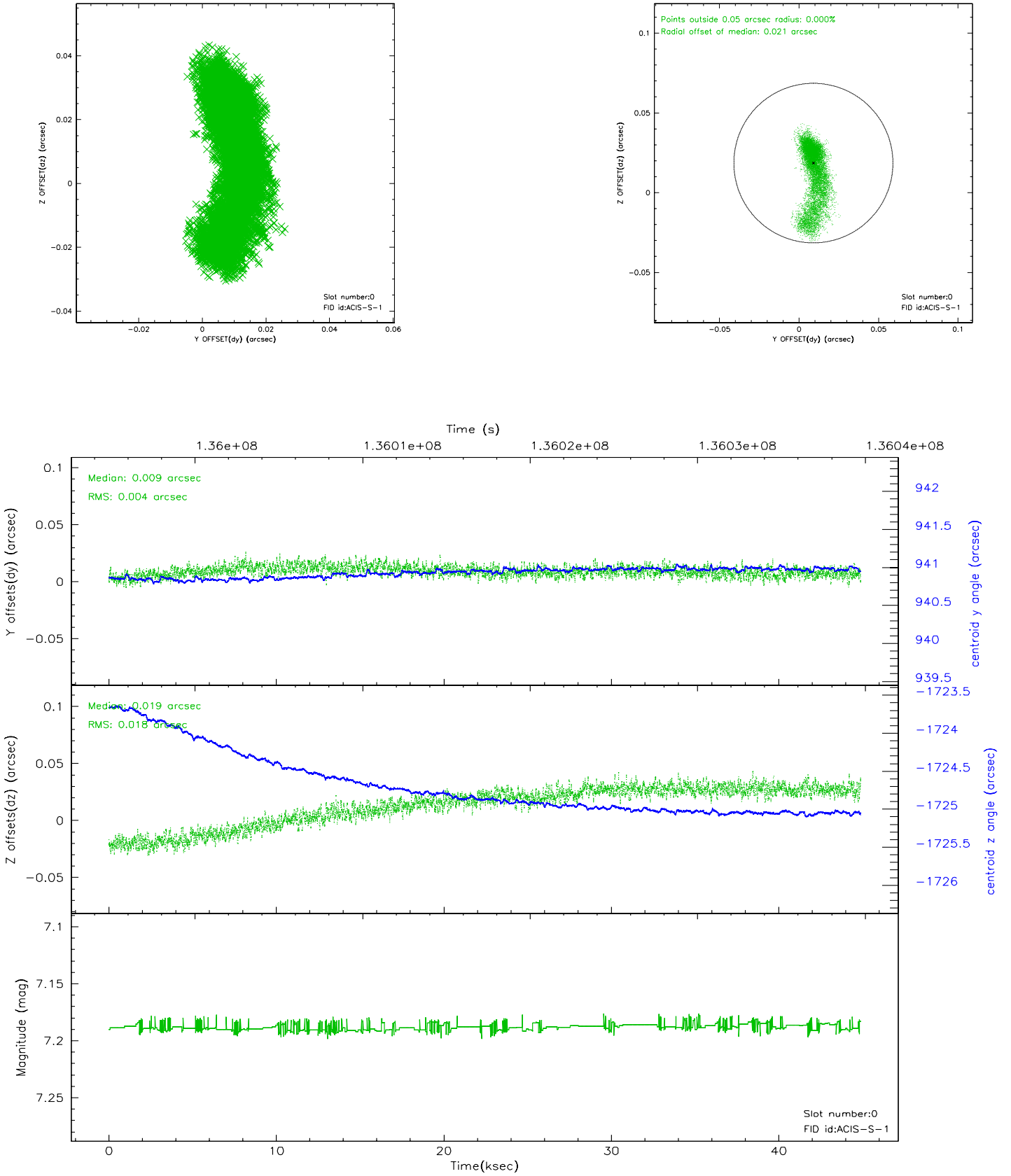


## 2.4.5 Slot 7

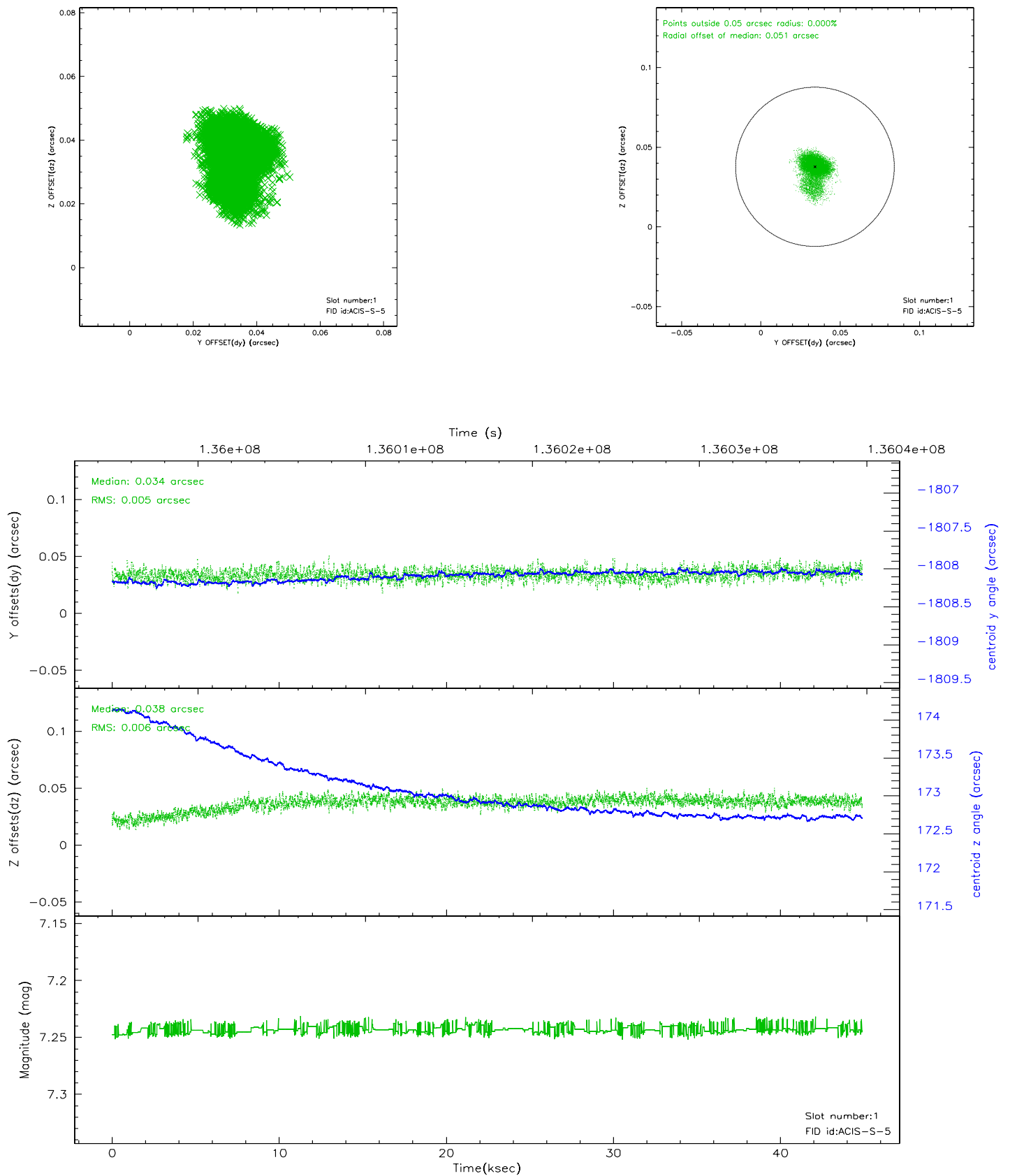


## 2.5 FID Slots

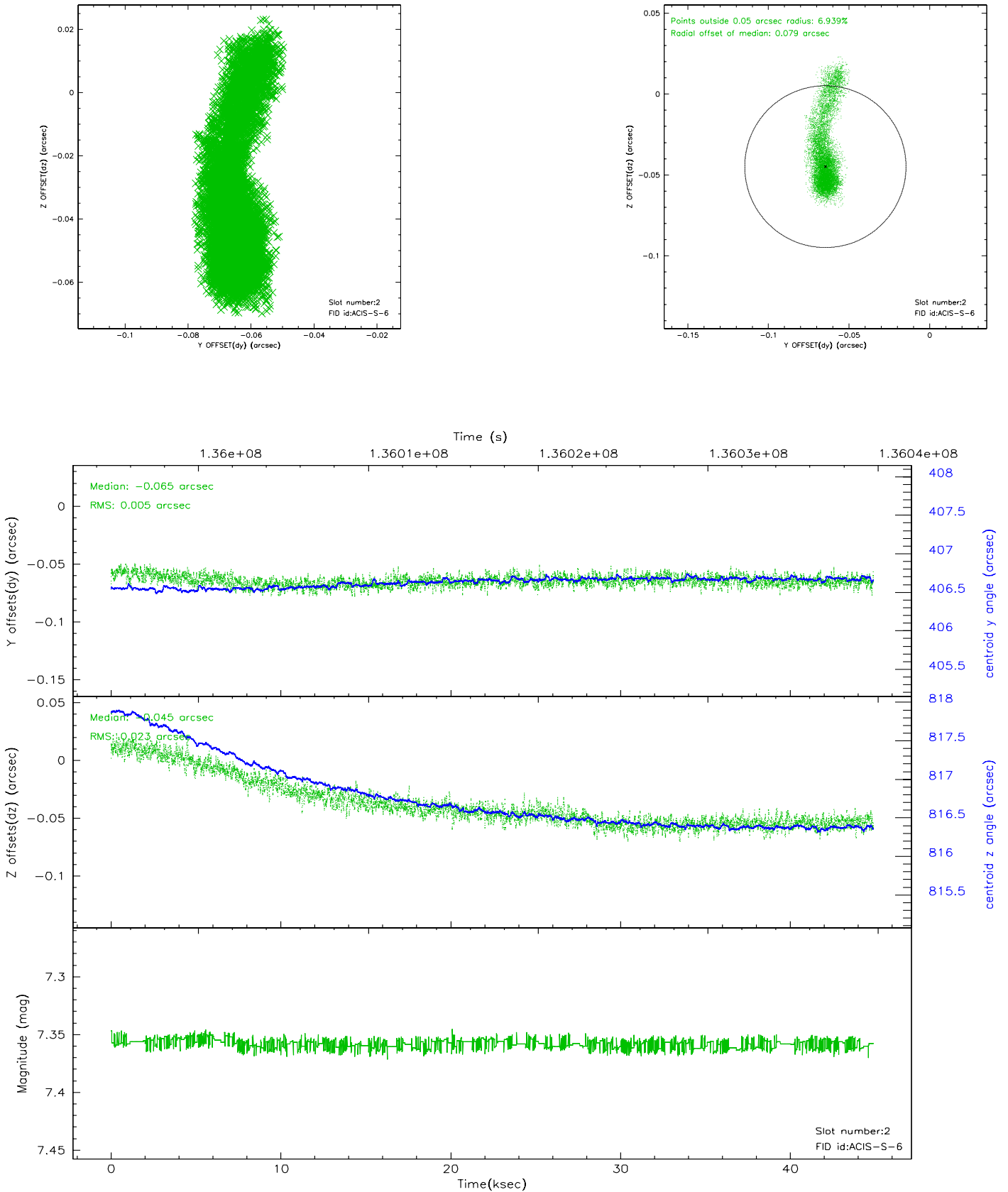
### 2.5.1 Slot 0



## 2.5.2 Slot 1



### 2.5.3 Slot 2

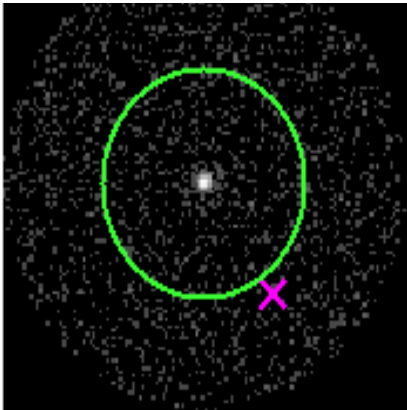


# 3 Gratings

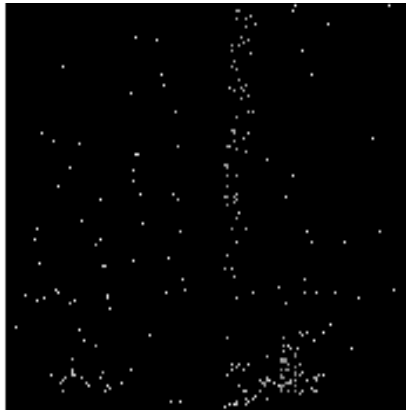
## 3.1 HEG Arm



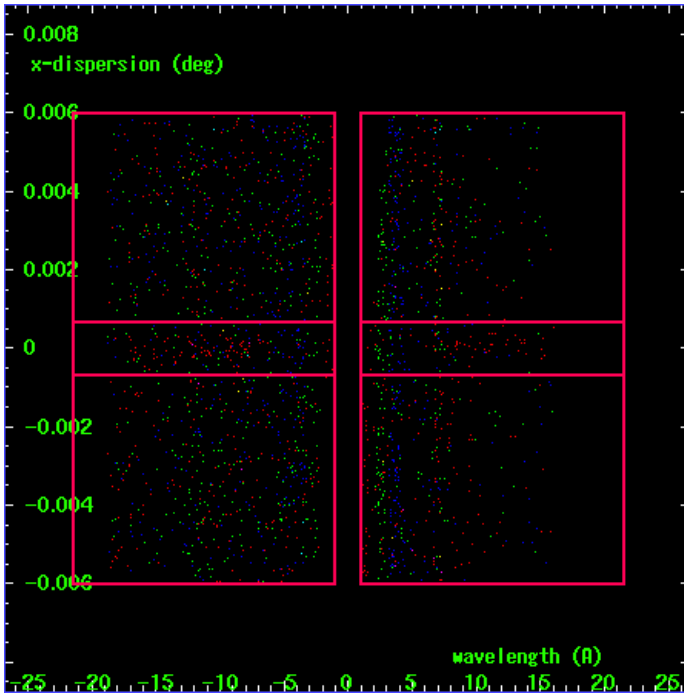
HEG Order Sort 123



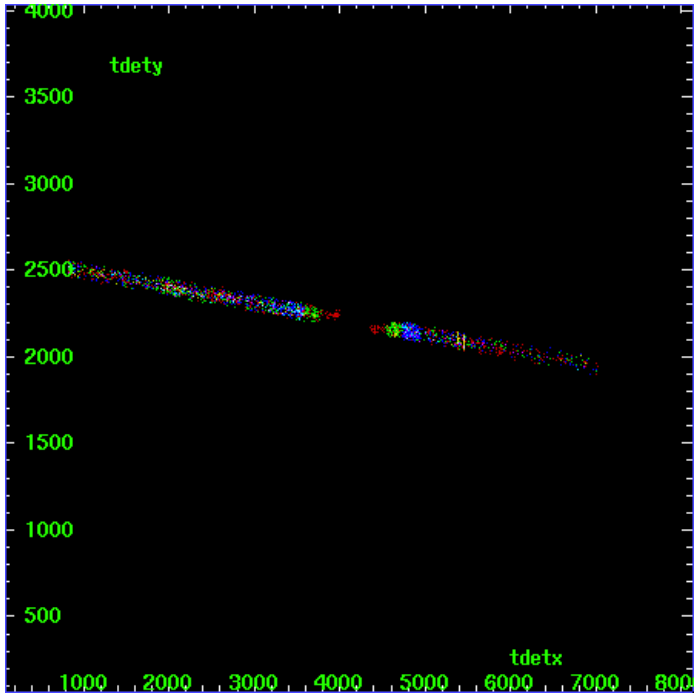
HEG Zero Order



HEG Order Sort ALL

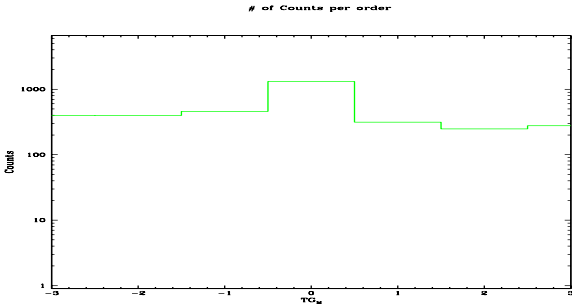


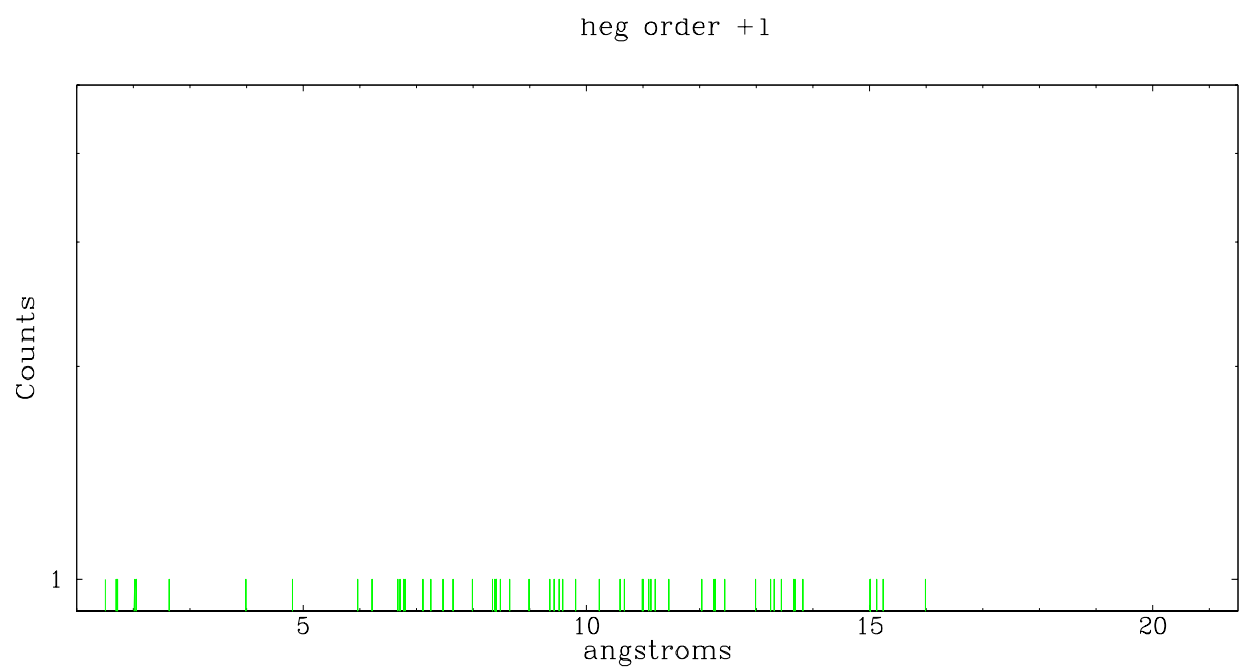
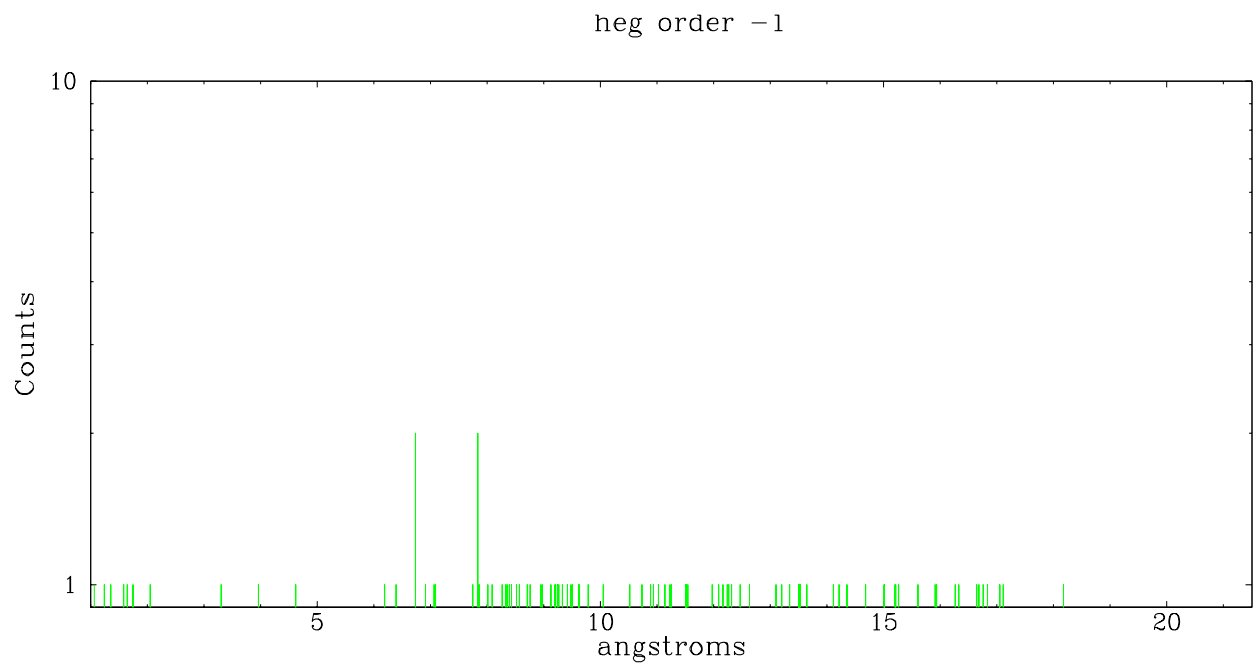
Spot Image HEG



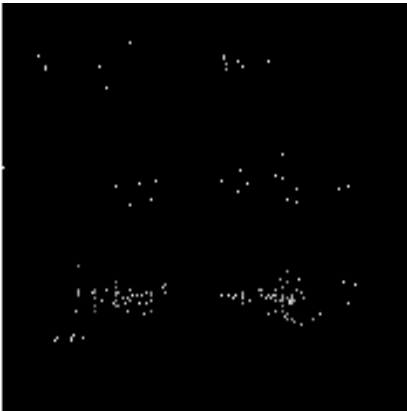
Full Detector HEG

	order -3	order -2	order -1	order 0	order 1	order 2	order 3
Events	395	398	458	1317	315	248	277

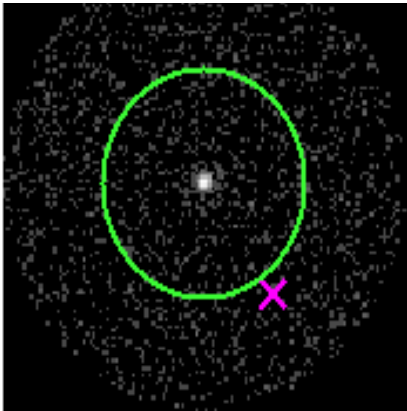




3.2 MEG Arm



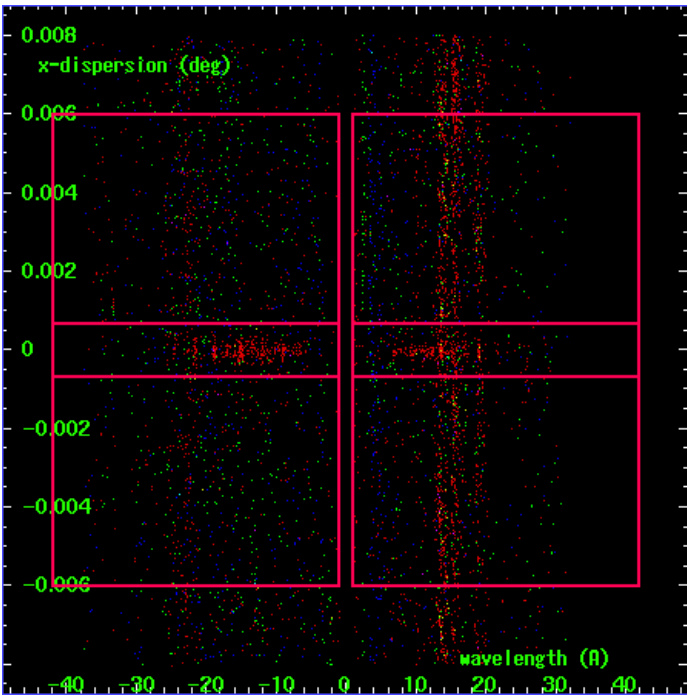
MEG Order Sort 123



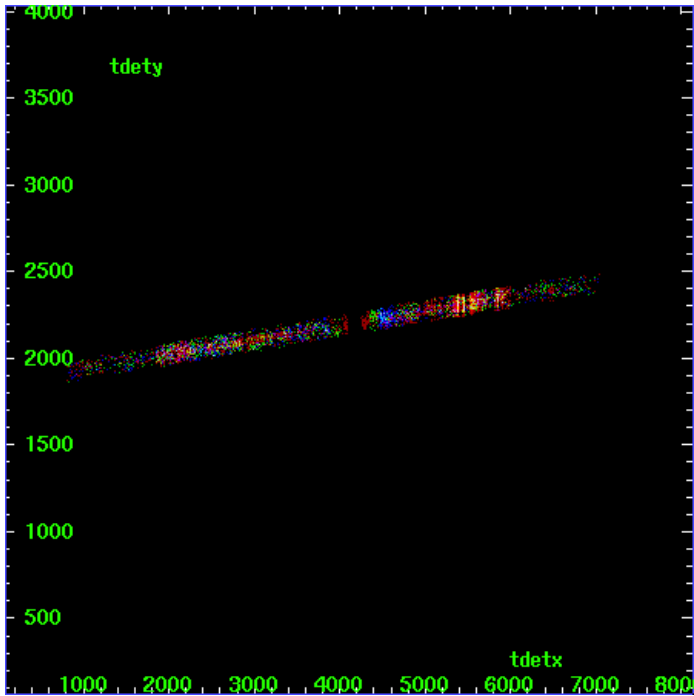
MEG Zero Order



MEG Order Sort ALL

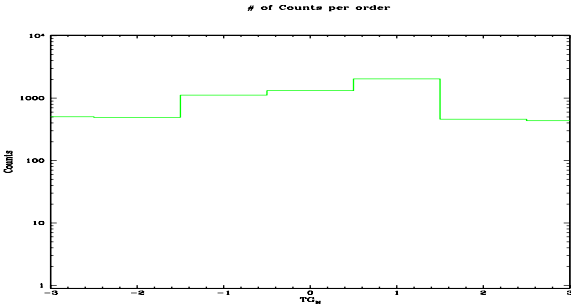


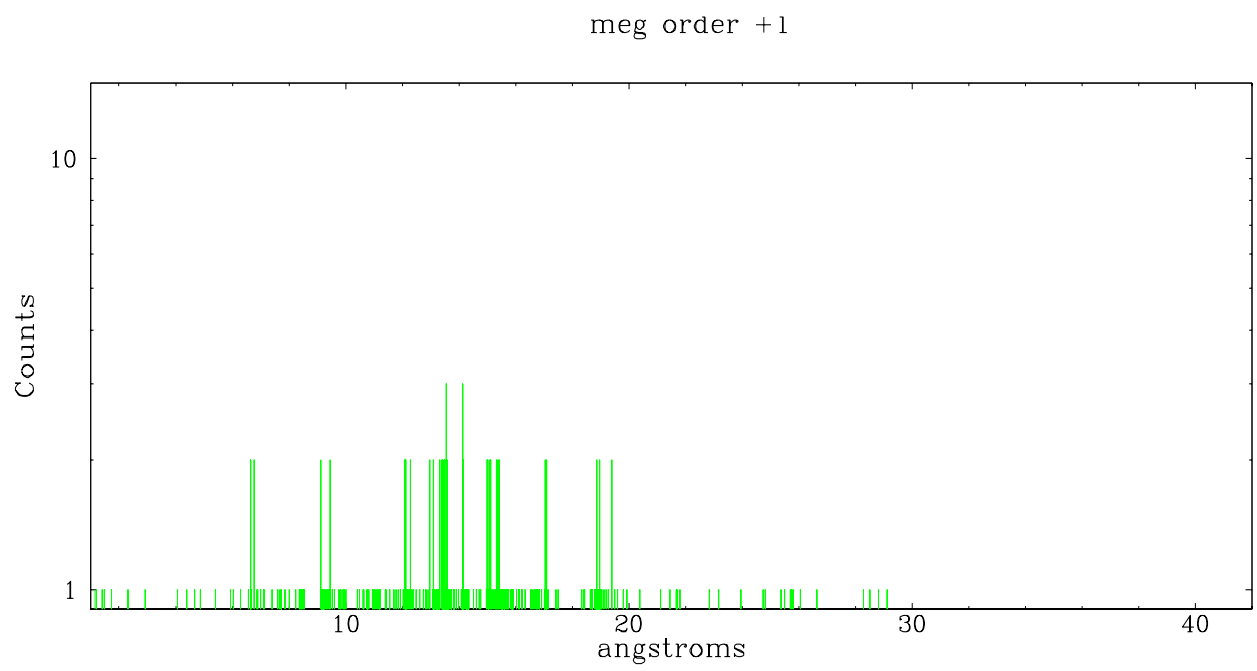
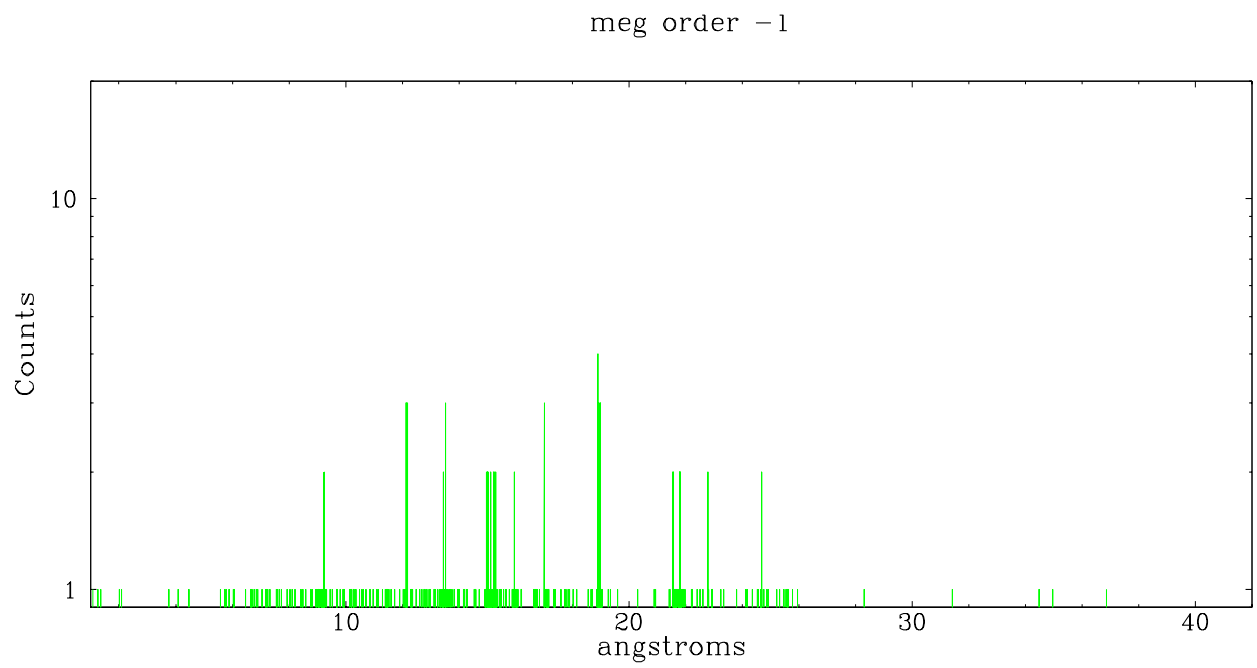
Spot Image MEG



Full Detector MEG

	order -3	order -2	order -1	order 0	order 1	order 2	order 3
Events	502	494	1118	1317	2035	461	435





## A Summary

### A.1 Status

V&V Scientist	Beth Sundheim
V&V Date (YYYY-MM-DD)	2006.09.11
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	44.457

### A.2 Comments