

V&V Reference Report

L2 ASCDS Version : 7.6.10

Observation 3174 - L2 Version 002
Chandra X-Ray Center

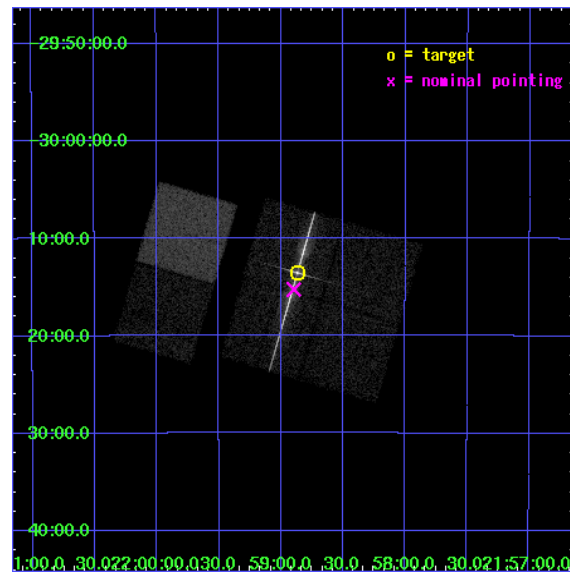
L2 Processing Date : Feb 27 2007

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	LETG Arm	17
A	Summary	19
A.1	Status	19
A.2	Comments	19

1 Front

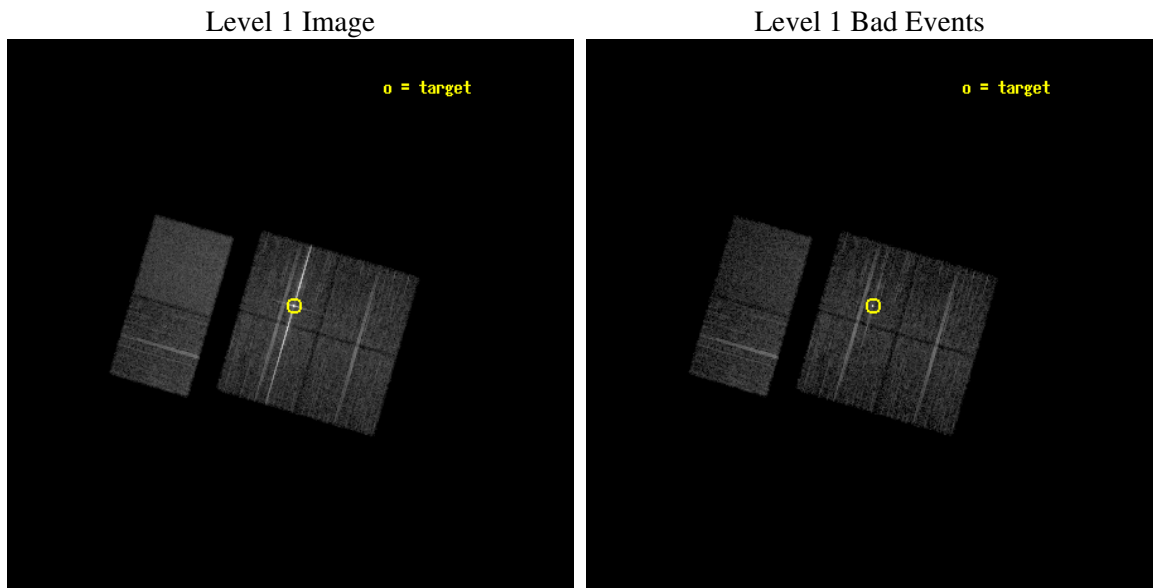
seq_num	790068
obs_id	3174
title	AO3 LETG/ACIS-I CALIBRATION OBSERVATIONS OF PKS2155-304
observer	Dr. CXC Calibration
object	PKS2155-304
dtcycle	0
cycle	P
ra_targ	329.716667
dec_targ	-30.225556
ra_nom	329.72404299217
dec_nom	-30.254287126543
roll_nom	286.35196548237
revision	4
ontime	7792.0000072569
livetime	7693.3330113859
ontime0	7792.0000072569
ontime1	7792.0000072569
ontime2	7792.0000072569
ontime3	7792.0000072569
ontime6	7792.0000072569
ontime7	7792.0000072569
l2events	107278



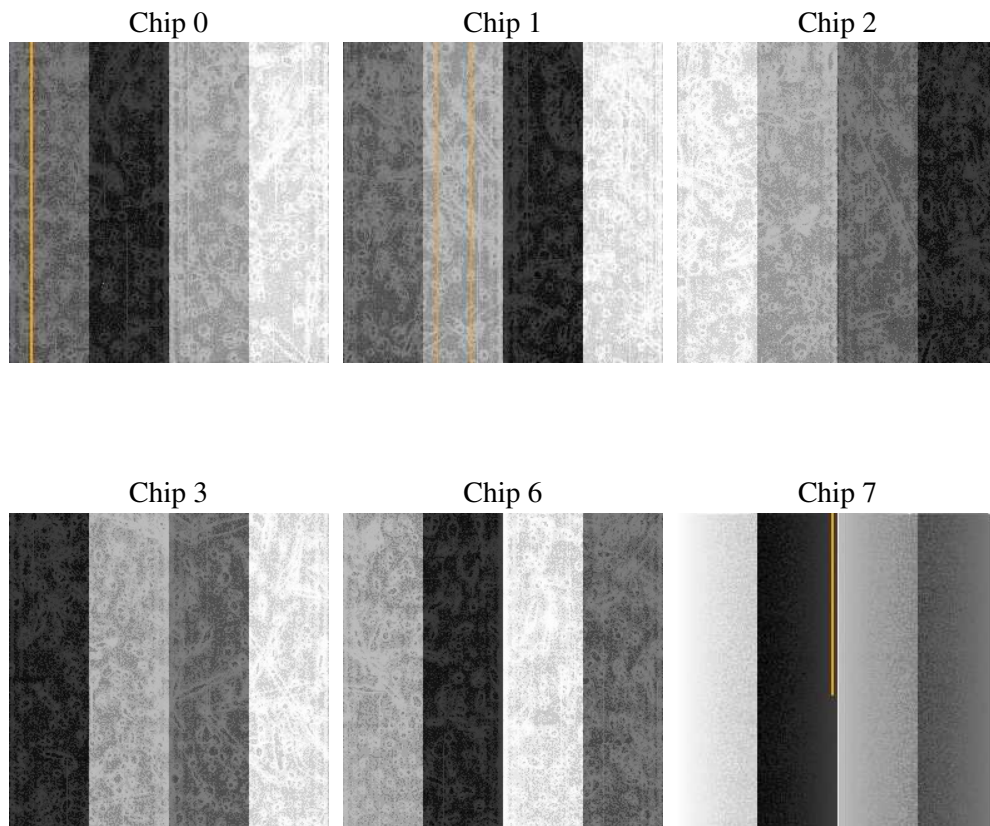
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

obi_num	1
ascdsver	7.6.10
caldbver	3.3.0
date	2007-01-20T10:33:23
revision	2

sched_exp_time	8037.161000
ontime	7792.0000072569
ontime0	7792.0000072569
ontime1	7792.0000072569
ontime2	7792.0000072569
ontime3	7792.0000072569
ontime6	7792.0000072569
ontime7	7792.0000072569
l1events	374378

2.1.4 Events

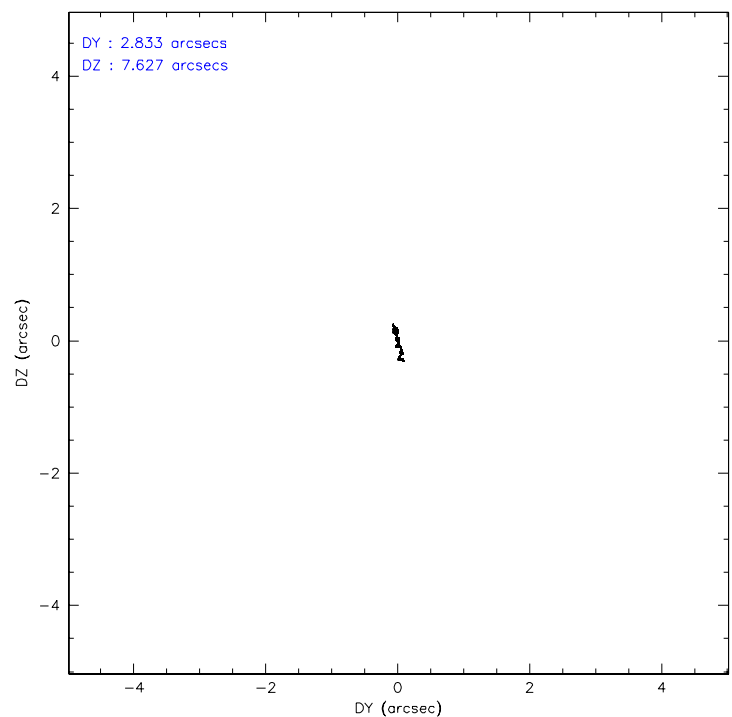
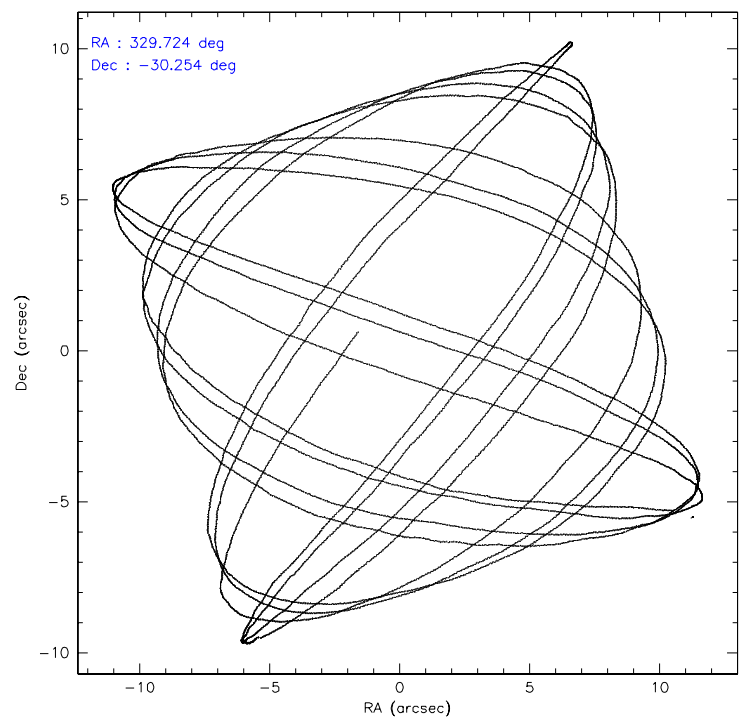
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6	ccd 7
level 1 events	46968	47642	71044	89993	52935	65796
rejected events	41070	41224	44441	46948	47073	38878
rejected %	87%	86%	62%	52%	88%	59%

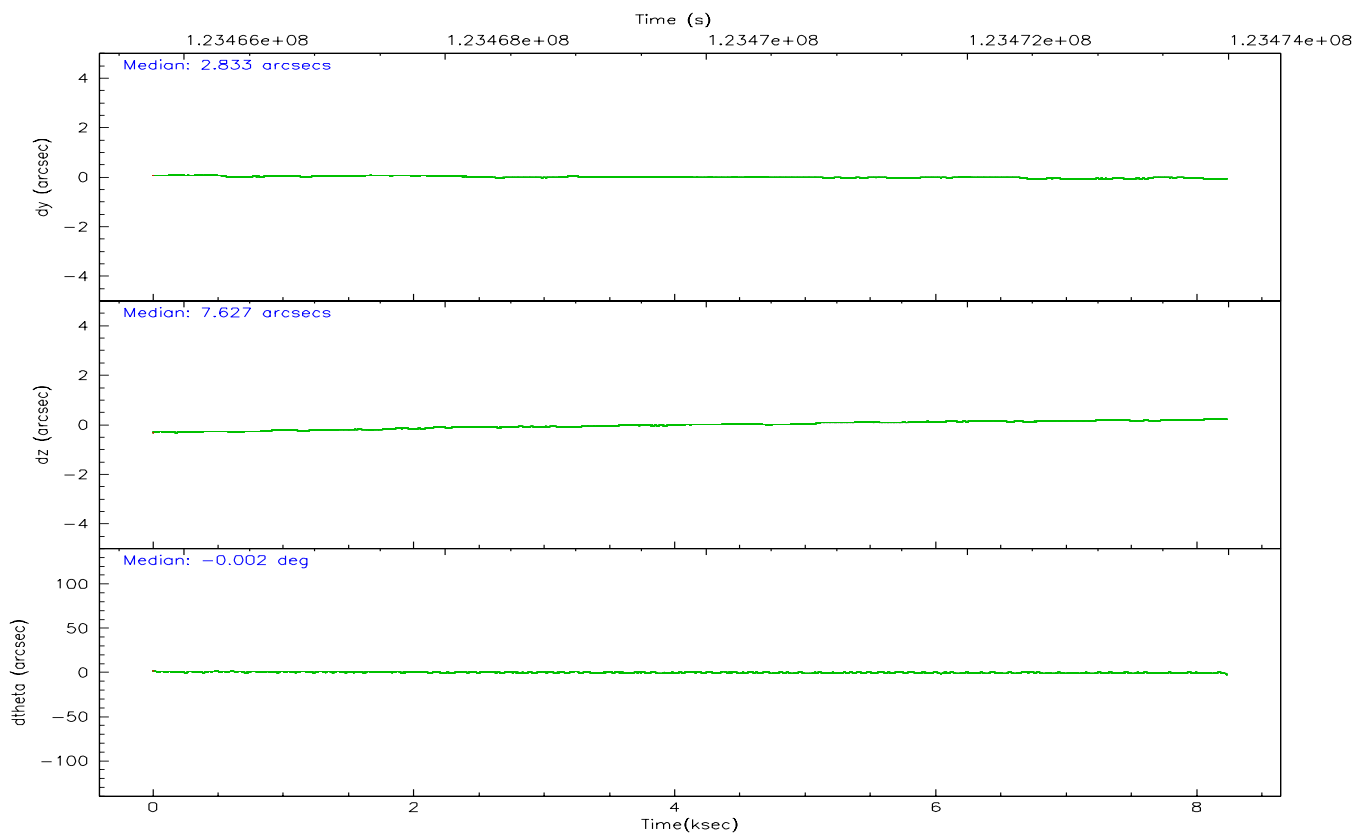
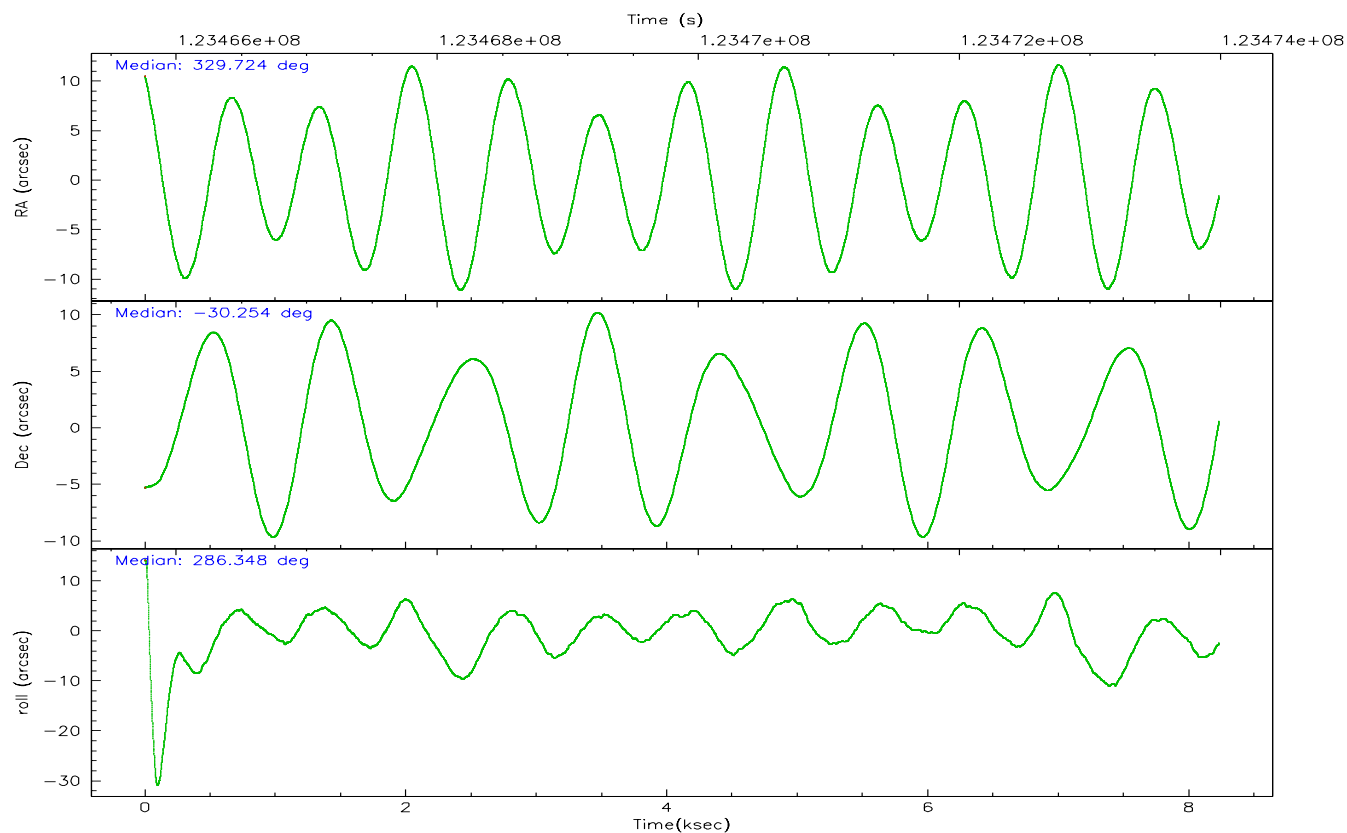
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6	ccd 7
grade 0 events	2453	2571	20300	32443	2216	2396
	5%	5%	28%	36%	4%	3%
grade 1 events	22	21	223	758	26	62
	0%	0%	0%	0%	0%	0%
grade 2 events	1263	1332	3021	4986	1219	5317
	2%	2%	4%	5%	2%	8%
grade 3 events	556	646	1000	1690	609	2403
	1%	1%	1%	1%	1%	3%
grade 4 events	551	643	1025	1728	569	2326
	1%	1%	1%	1%	1%	3%
grade 5 events	1829	2022	1860	2756	2192	6291
	3%	4%	2%	3%	4%	9%
grade 6 events	1077	1234	1273	2225	1259	14495
	2%	2%	1%	2%	2%	22%
grade 7 events	39217	39173	42342	43407	44845	32506
	83%	82%	59%	48%	84%	49%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	6	6
Detector	ACIS-012367	ACIS-012367	Obspar file type	PREDICTED	ACTUAL
Grating	LETG	LETG	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	329.701067	329.7240429921747	Subarray requested	NONE	NONE
Pointing Dec	-30.235359	-30.25428712654274	Alternating exposures requested	N	N
Pointing Roll	286.131639	286.3519654823735	Primary exposure time	0.000000	3.2
Window start time	120960064.184000	120960064.184000			
Window stop time	126144064.184000	126144064.184000			
SIM focus pos (mm)	-0.782348	-0.7809083437167272			
SIM defocus (mm)	0	0.001439871863259334			
SIM translation stage pos (mm)	-226.272463	-226.2682626179875			
SIM translation stage offset (mm)	-7.32	-7.32419038494217			
Observation start time	123465958.184000	123465581.95106			
Observation start date	2001-11-30T00:04:54	2001-11-29T23:59:41			
Observation end time	123473995.184000	123474220.65141			
Observation end date	2001-11-30T02:18:51	2001-11-30T02:23:40			
Read mode	TIMED	TIMED			

2.3 Aspect



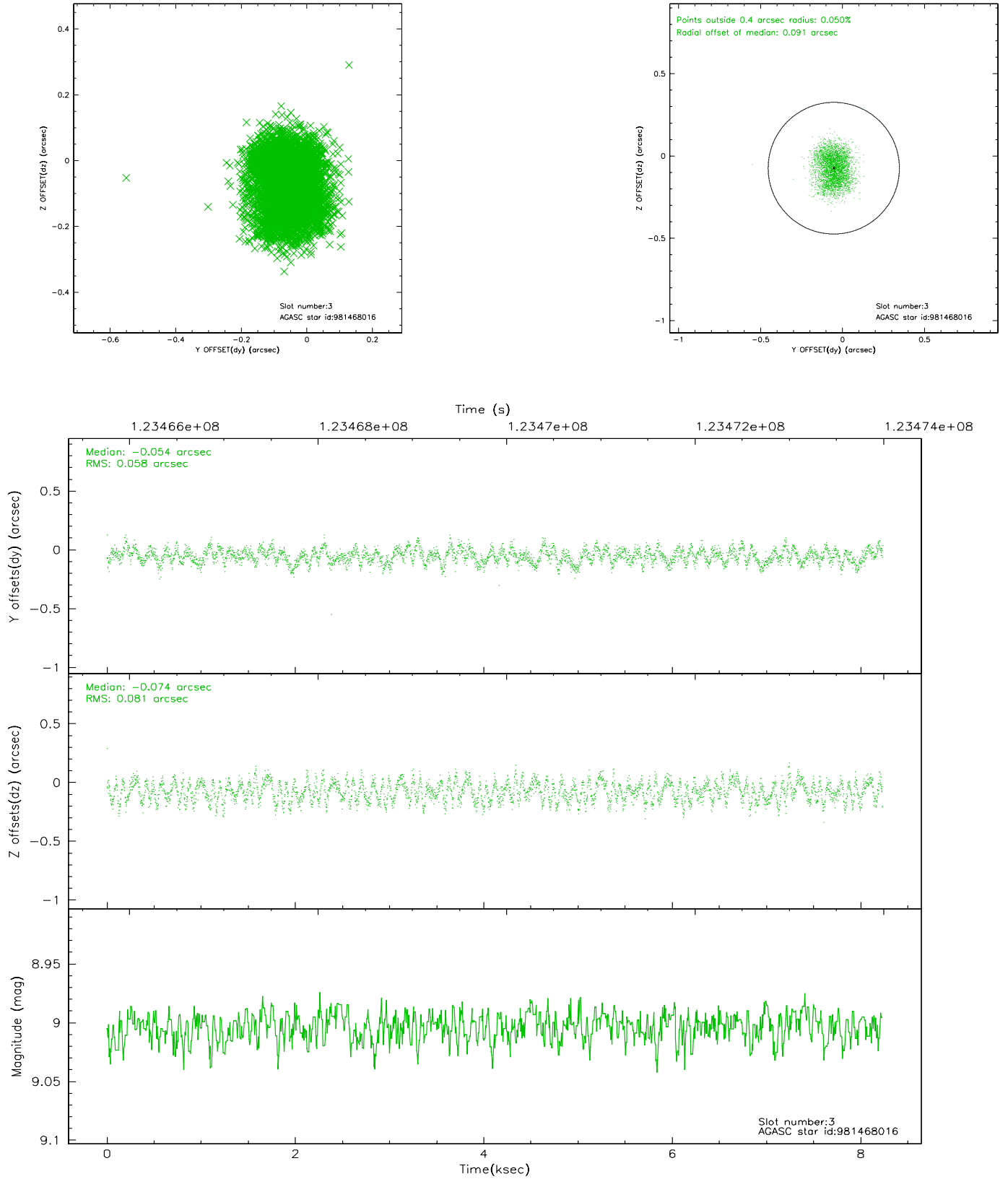


Slot Statistics

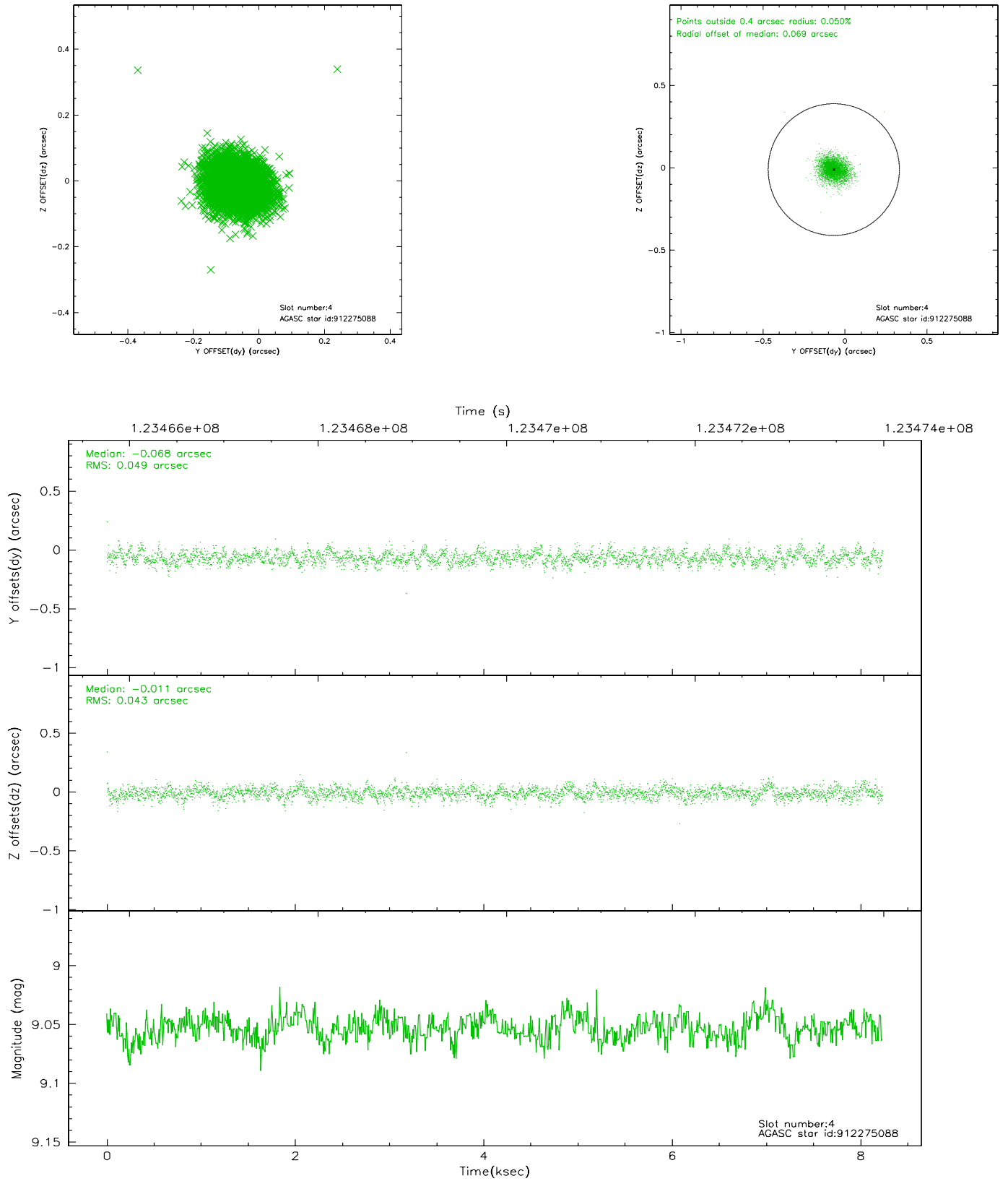
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-I-1	7.23	2009	0.028	0.025	0.008	0.013	0.000000	0.000000	936.85	-981.35
1	FID	ACIS-I-5	7.23	2009	-0.123	0.065	0.007	0.012	0.000000	0.000000	-1811.03	915.77
2	FID	ACIS-I-6	7.26	2009	0.004	-0.019	0.006	0.011	0.000000	0.000000	401.64	1560.96
3	GUIDE	981468016	9.00	4015	-0.054	-0.074	0.110	0.166	328.842457	-30.034984	-1426.73	-2372.89
4	GUIDE	912275088	9.05	4012	-0.068	-0.011	0.068	0.111	329.619228	-29.738698	-1789.08	250.53
5	GUIDE	981478152	9.40	4015	0.001	0.100	0.089	0.140	329.415589	-30.057192	-862.68	-676.25
6	GUIDE	981468128	9.36	4015	0.047	-0.018	0.081	0.130	329.756350	-30.158334	-218.73	242.41
7	GUIDE	981469488	9.60	4013	0.073	0.006	0.093	0.150	329.261199	-30.045155	-1036.06	-1127.03

2.4 Star Slots

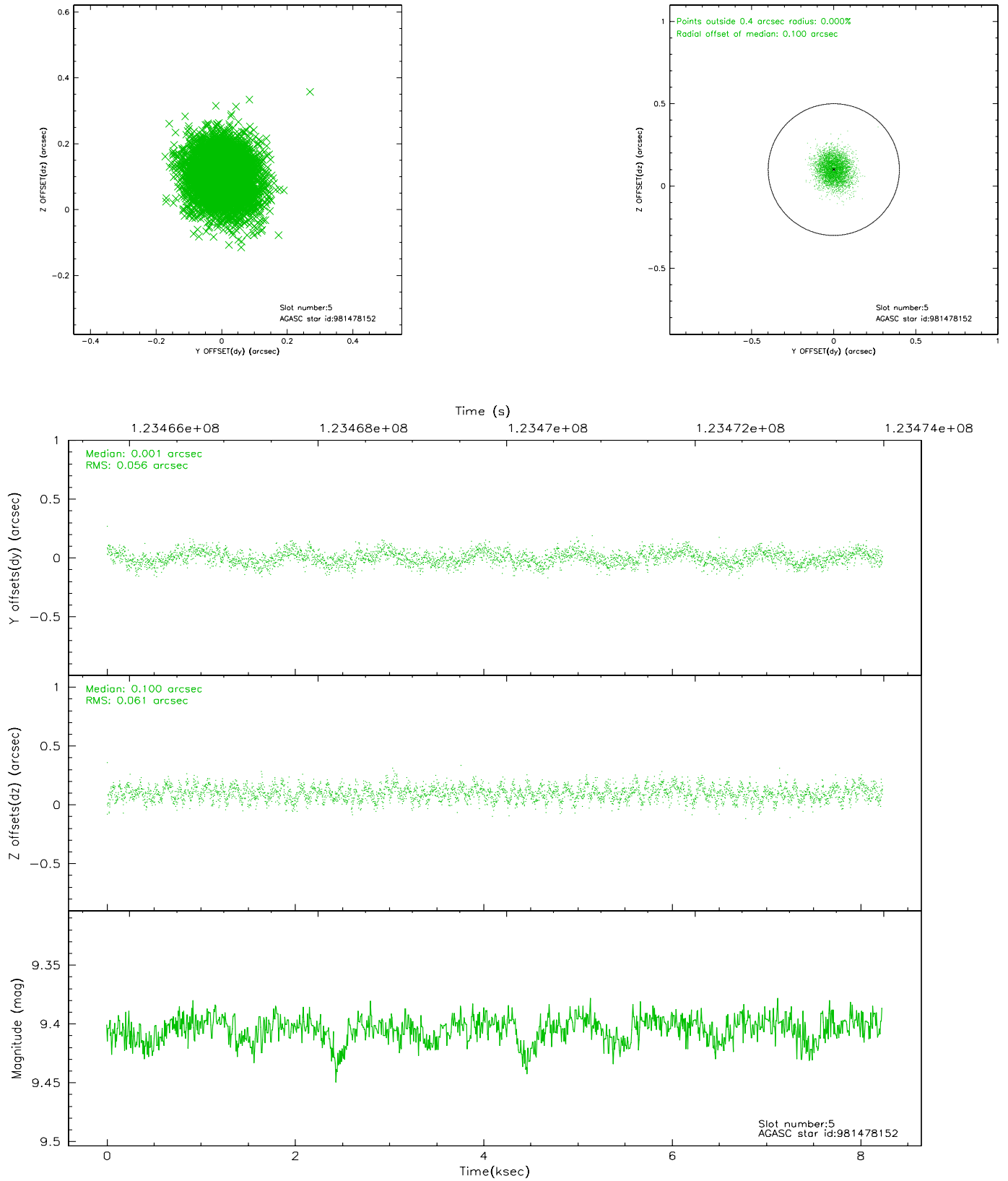
2.4.1 Slot 3



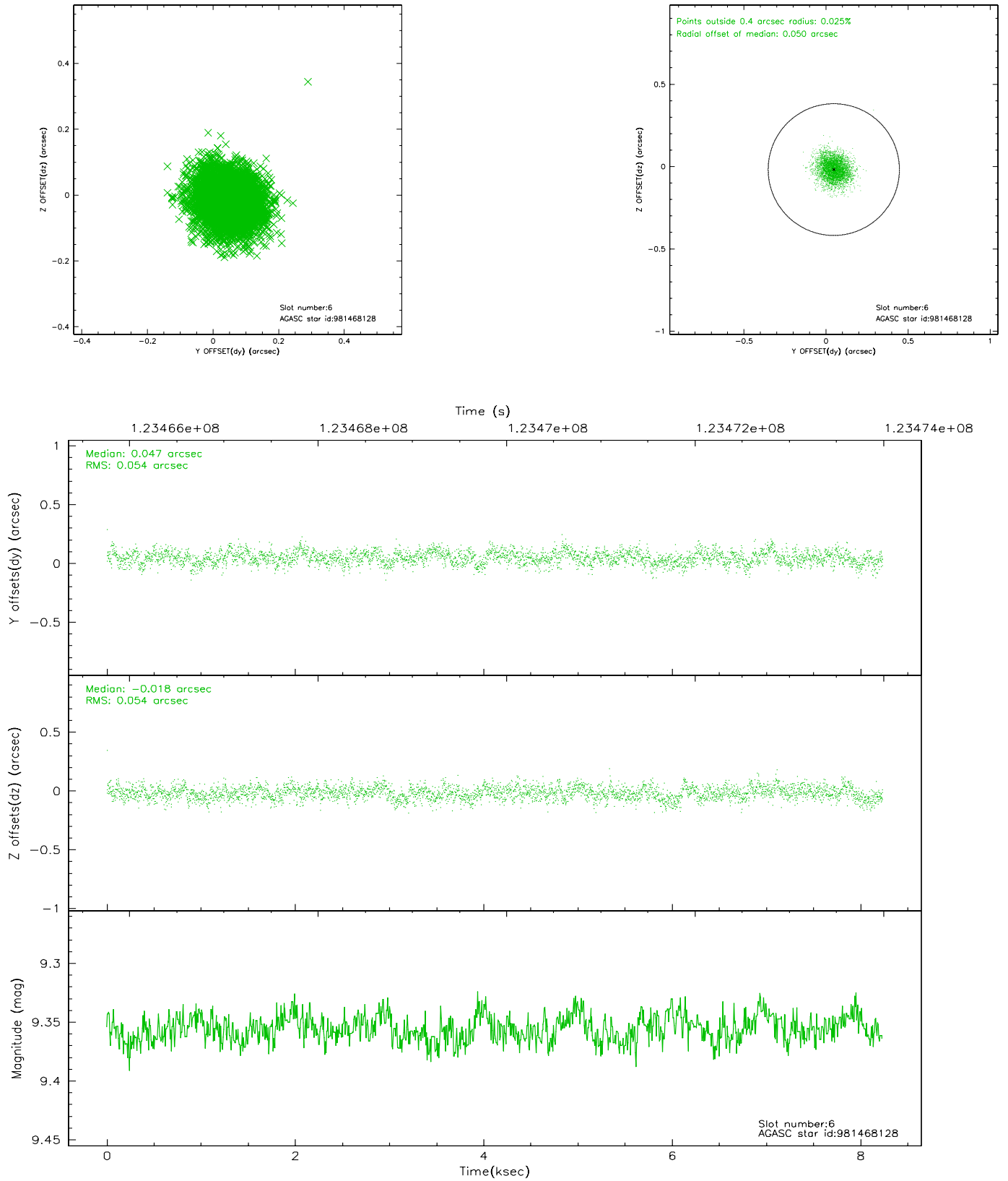
2.4.2 Slot 4



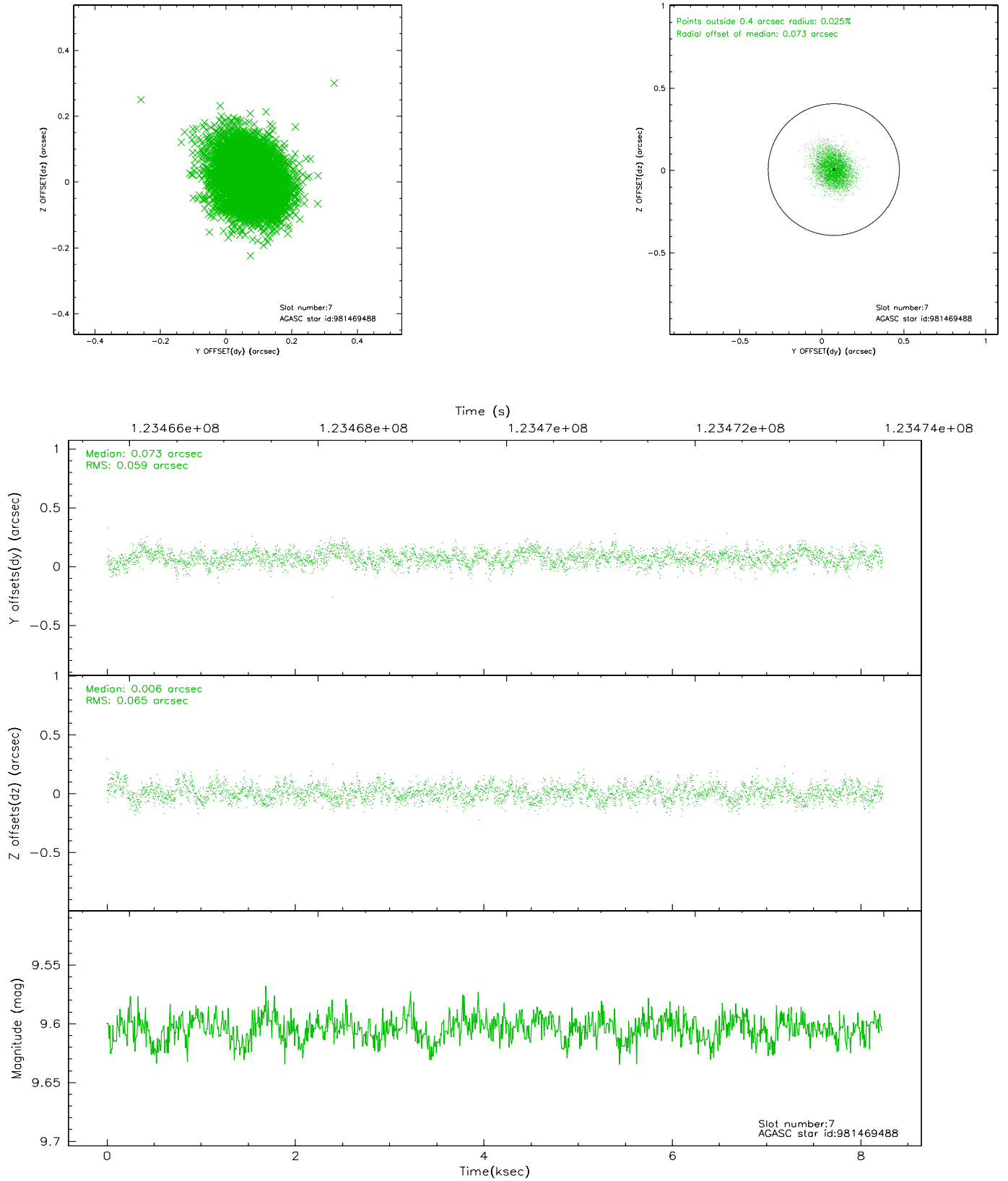
2.4.3 Slot 5



2.4.4 Slot 6

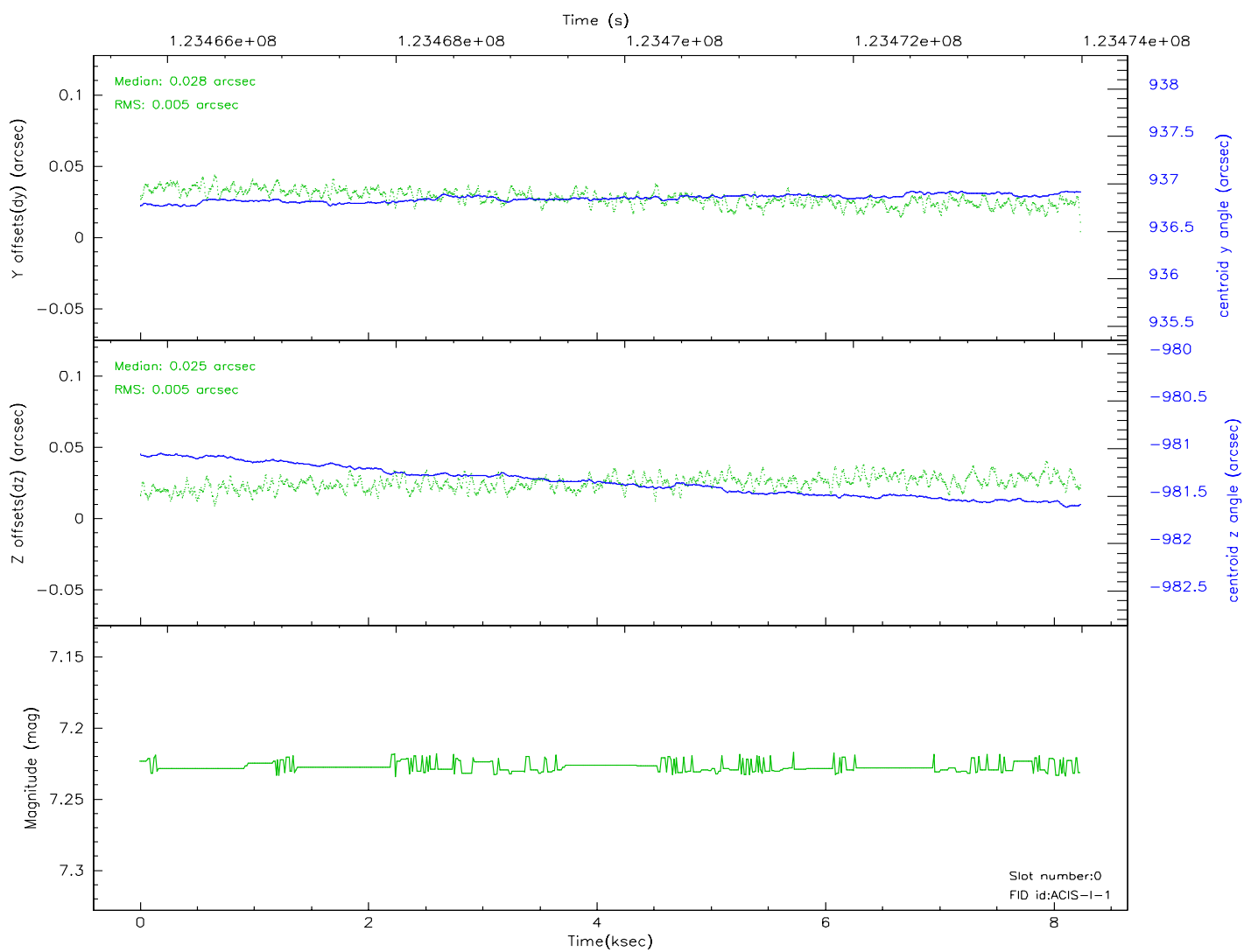
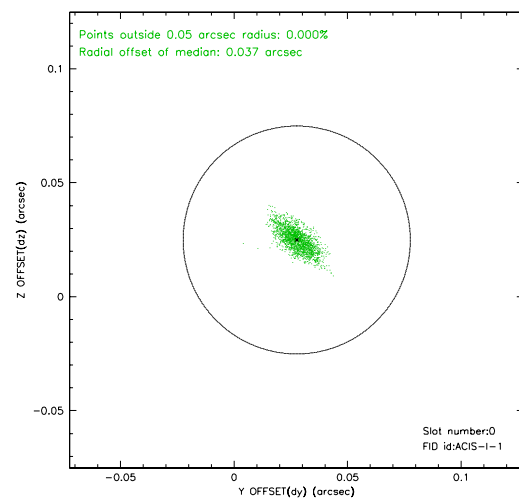
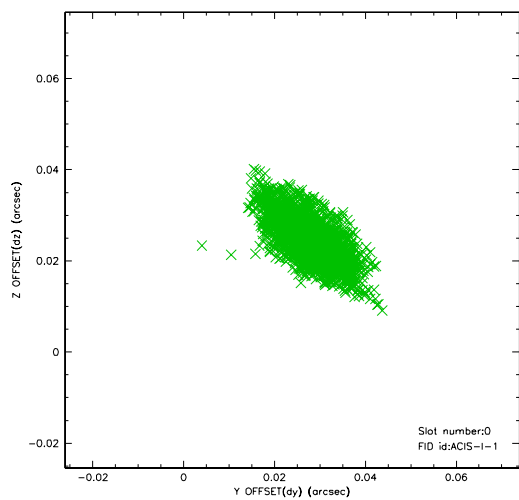


2.4.5 Slot 7

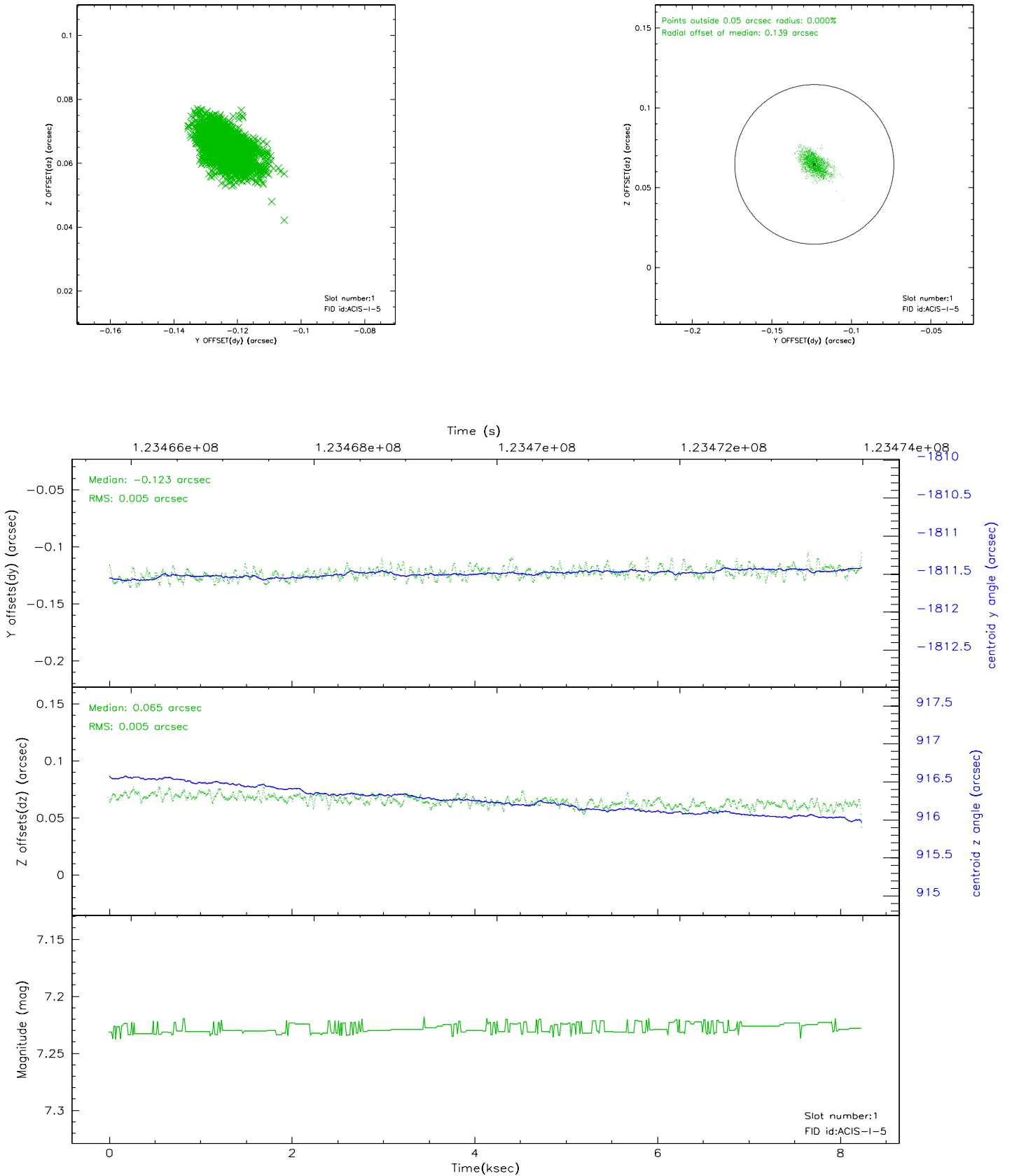


2.5 FID Slots

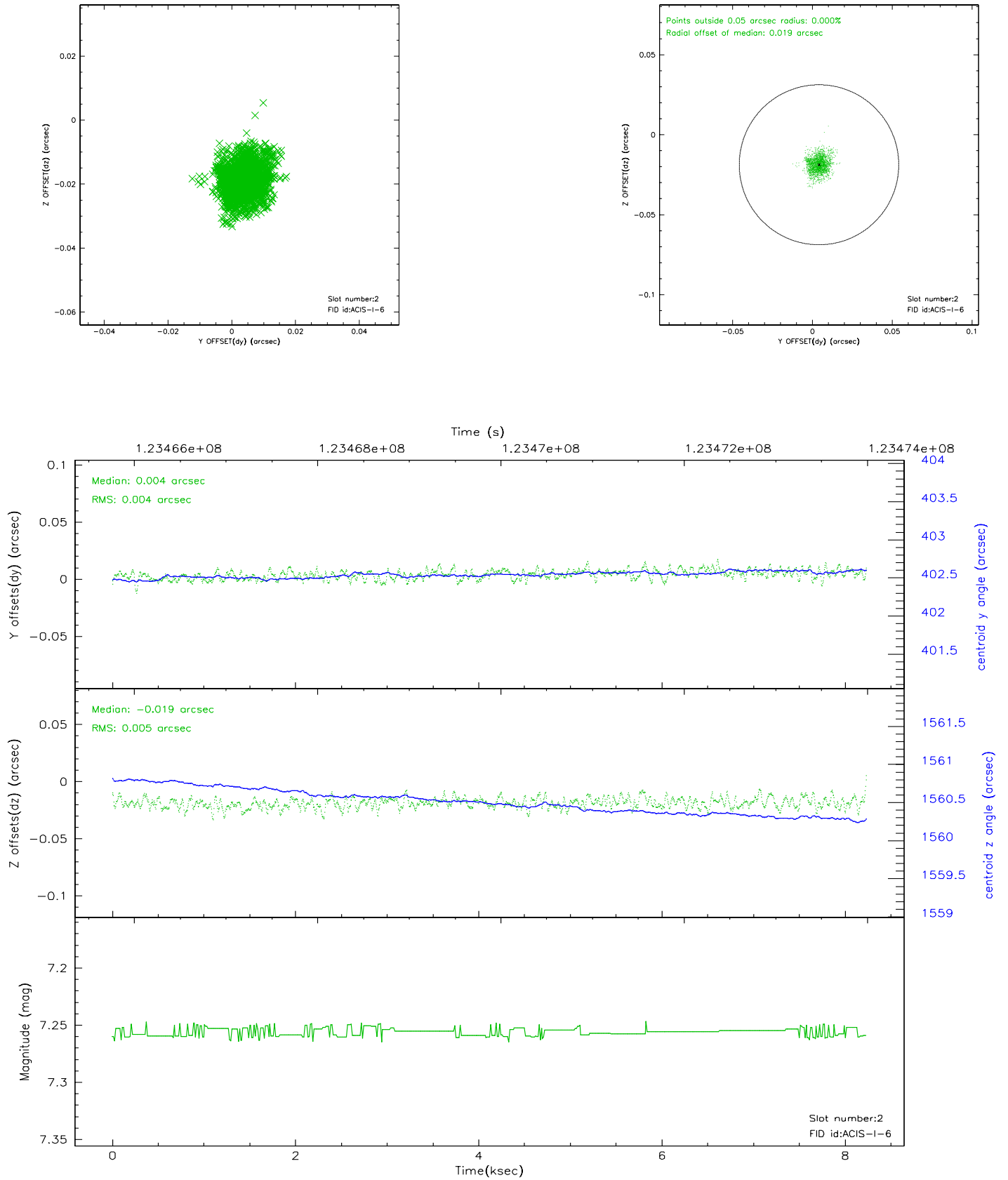
2.5.1 Slot 0



2.5.2 Slot 1

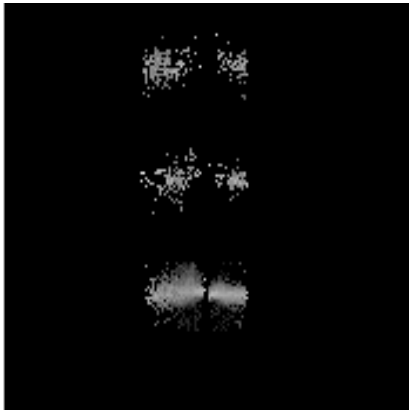


2.5.3 Slot 2

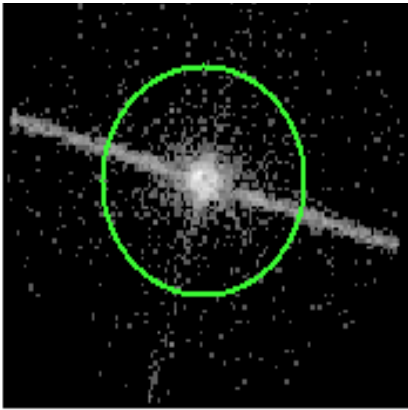


3 Gratings

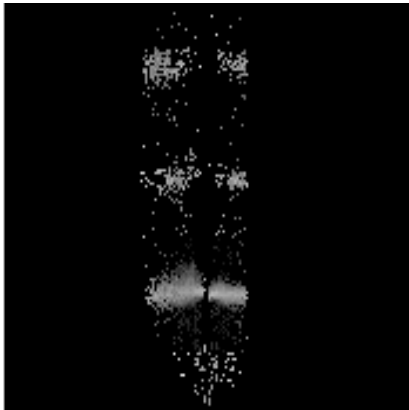
3.1 LETG Arm



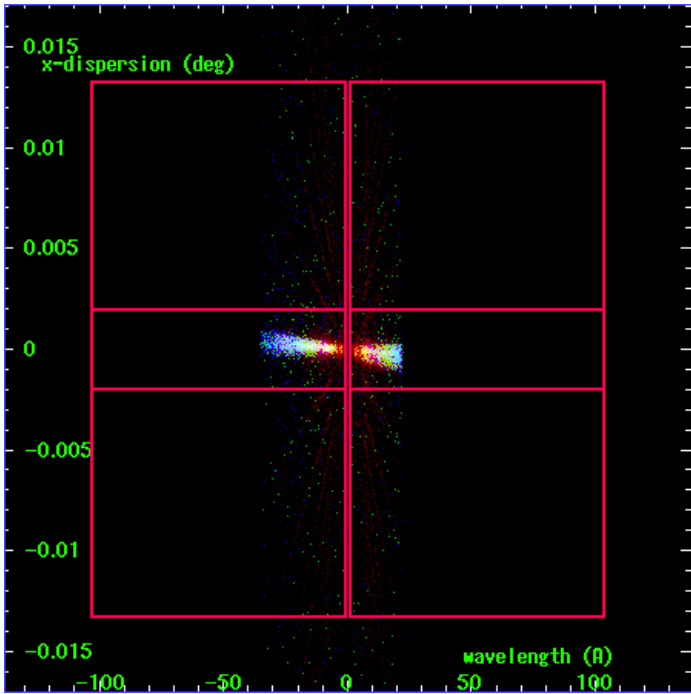
LETG Order Sort 123



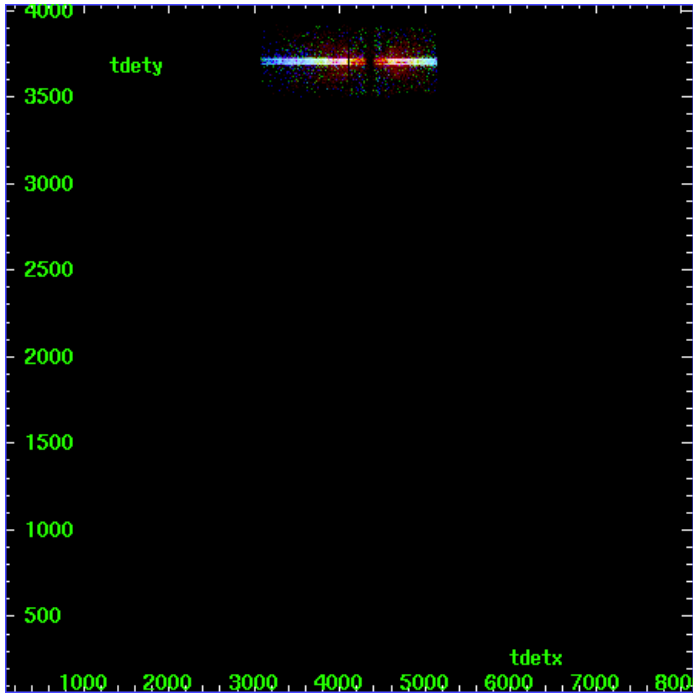
LETG Zero Order



LETG Order Sort ALL

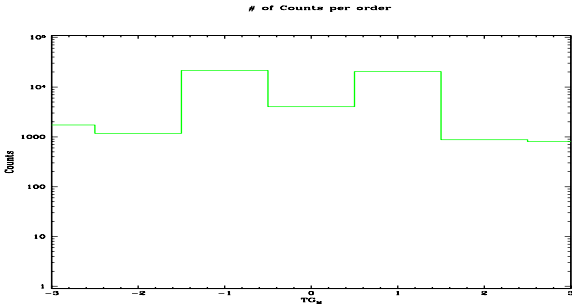


Spot Image LETG

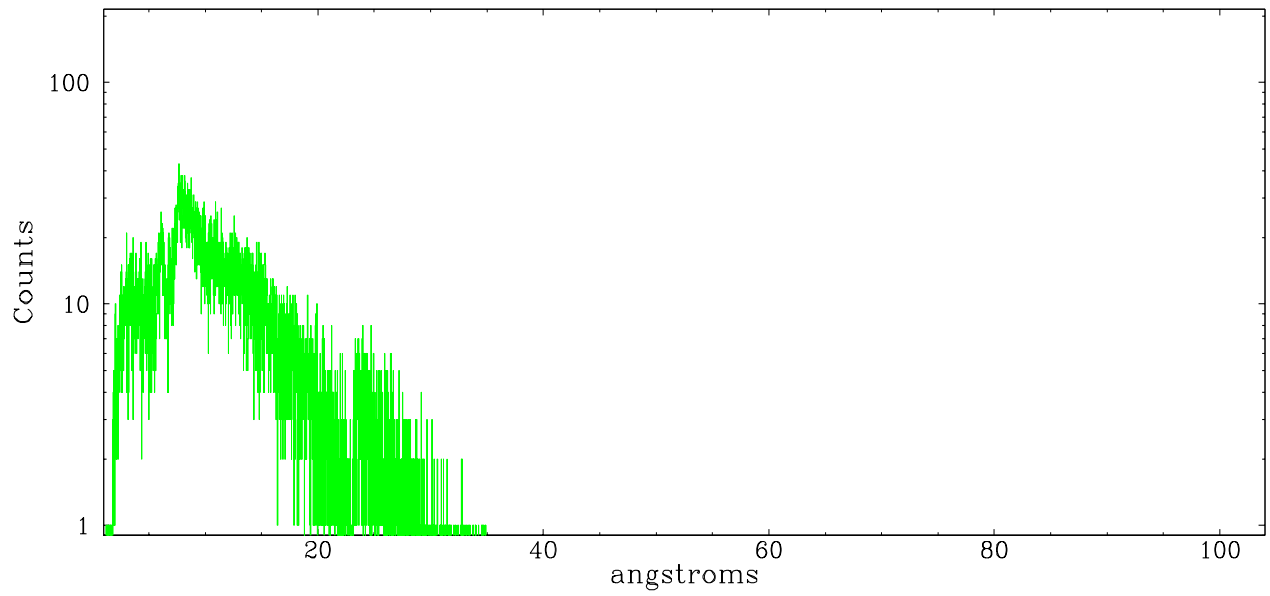


Full Detector LETG

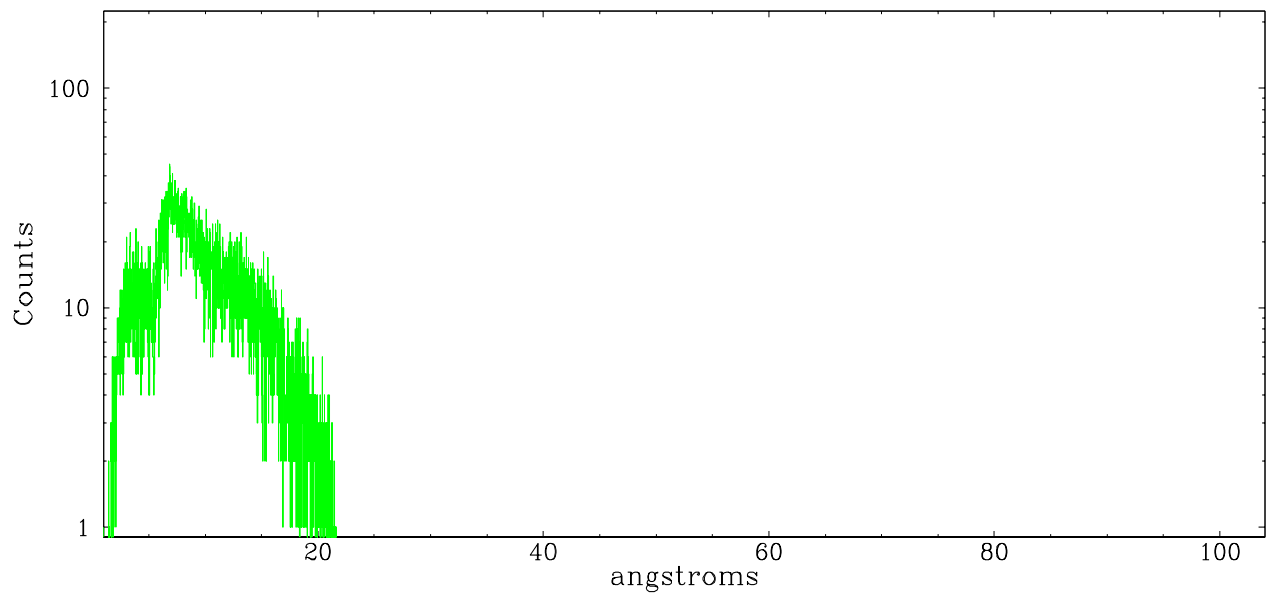
	order -3	order -2	order -1	order 0	order 1	order 2	order 3
Events	1731	1175	21474	4020	20399	873	804



leg order -1



leg order +1



A Summary

A.1 Status

V&V Scientist	David Huenemoerder
V&V Date (YYYY-MM-DD)	2007.03.02
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	7.795

A.2 Comments

Non-standard grating/detector combination required use of osip=NONE in

tg_resolve_events, since there is no order-sorting calibration table
for
ACIS-I.