

V&V Reference Report

L2 ASCDS Version : 7.6.7.1

Observation 4640 - L2 Version 001
Chandra X-Ray Center

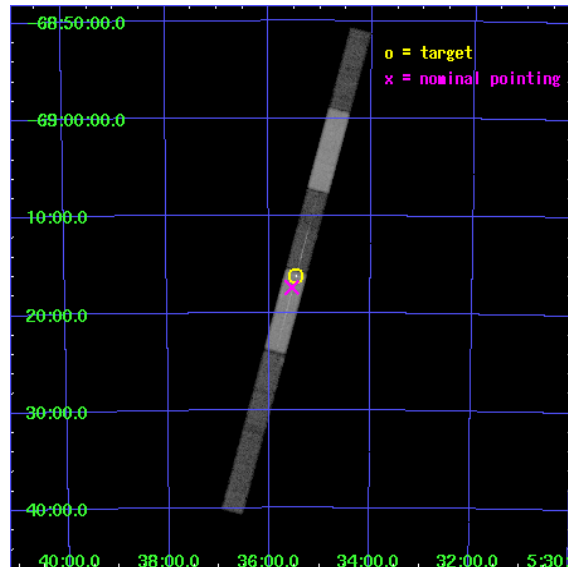
L2 Processing Date : Apr 19 2006

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1 Front

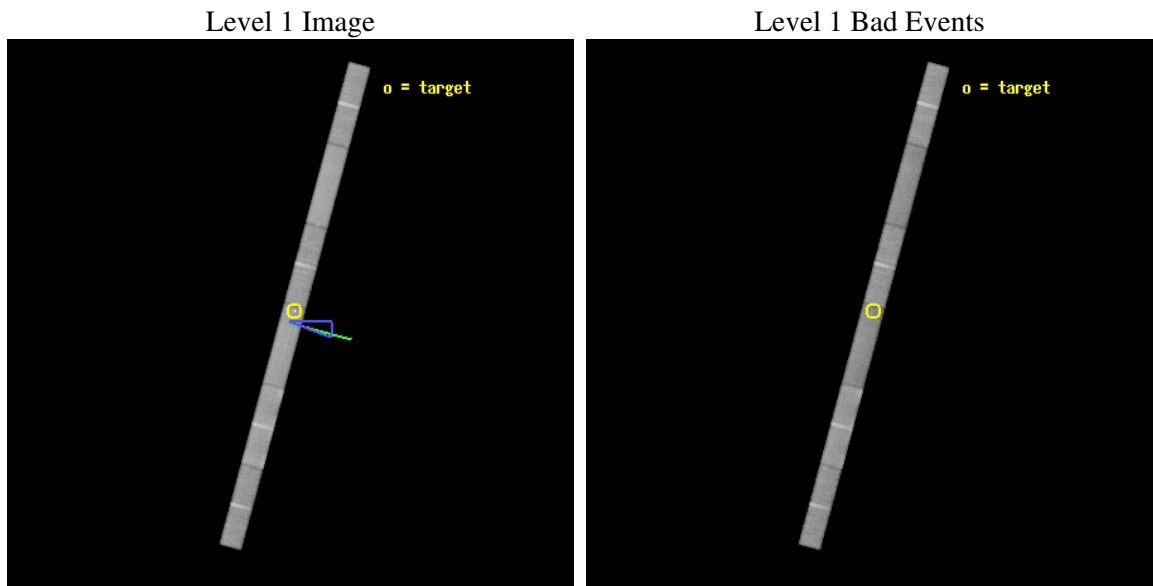
seq_num	500460
obs_id	4640
title	Spatially resolved grating spectrometry of the newborn supernova remnant SNR1987A
observer	Dr. Richard McCray
object	SNR1987A
dtcycle	0
cycle	P
ra_targ	83.866667
dec_targ	-69.26975
ra_nom	83.886559914232
dec_nom	-69.289592298857
roll_nom	105.17522906569
revision	2
ontime	59167.0
livetime	56834.511642204
ontime4	59167.0
ontime5	59167.0
ontime6	59167.0
ontime7	59167.0
ontime8	59167.0
ontime9	59167.0
l2events	197945



2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias

Chip 4

Chip 5

Chip 6



Chip 7

Chip 8

Chip 9



2.1.3 Parameters

obi_num	0
ascdsver	7.6.7.1
caldsver	3.2.1
date	2006-04-19T04:54:22
revision	2

sched_exp_time	59021.803000
ontime	59576.963234246
ontime4	59576.963234246
ontime5	59576.963234246
ontime6	59576.963234246
ontime7	59576.963234246
ontime8	59576.963234246
ontime9	59576.963234246
l1events	933607

2.1.4 Events

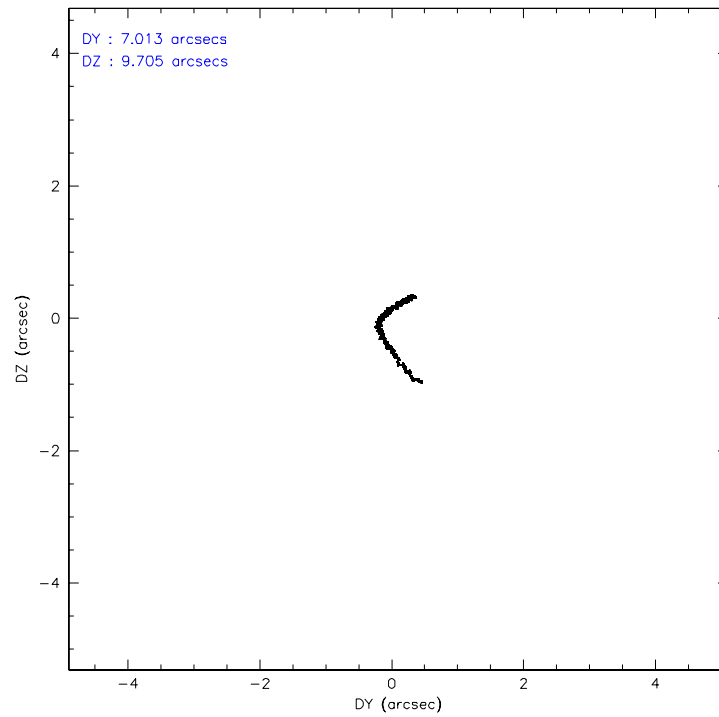
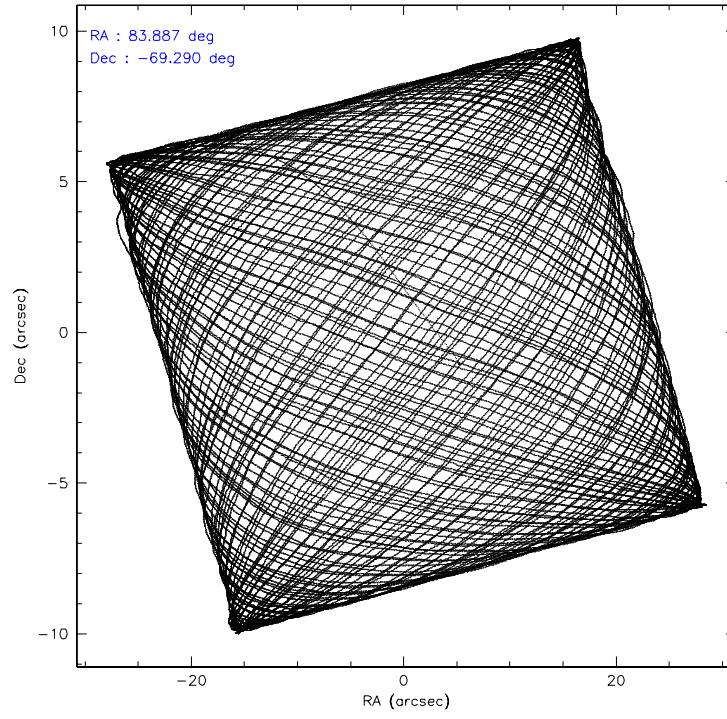
	ccd 4	ccd 5	ccd 6	ccd 7	ccd 8	ccd 9
level 1 events	152842	171572	140736	162722	177738	127997
rejected events	135771	95445	123391	92215	142692	112352
rejected %	88%	55%	87%	56%	80%	87%

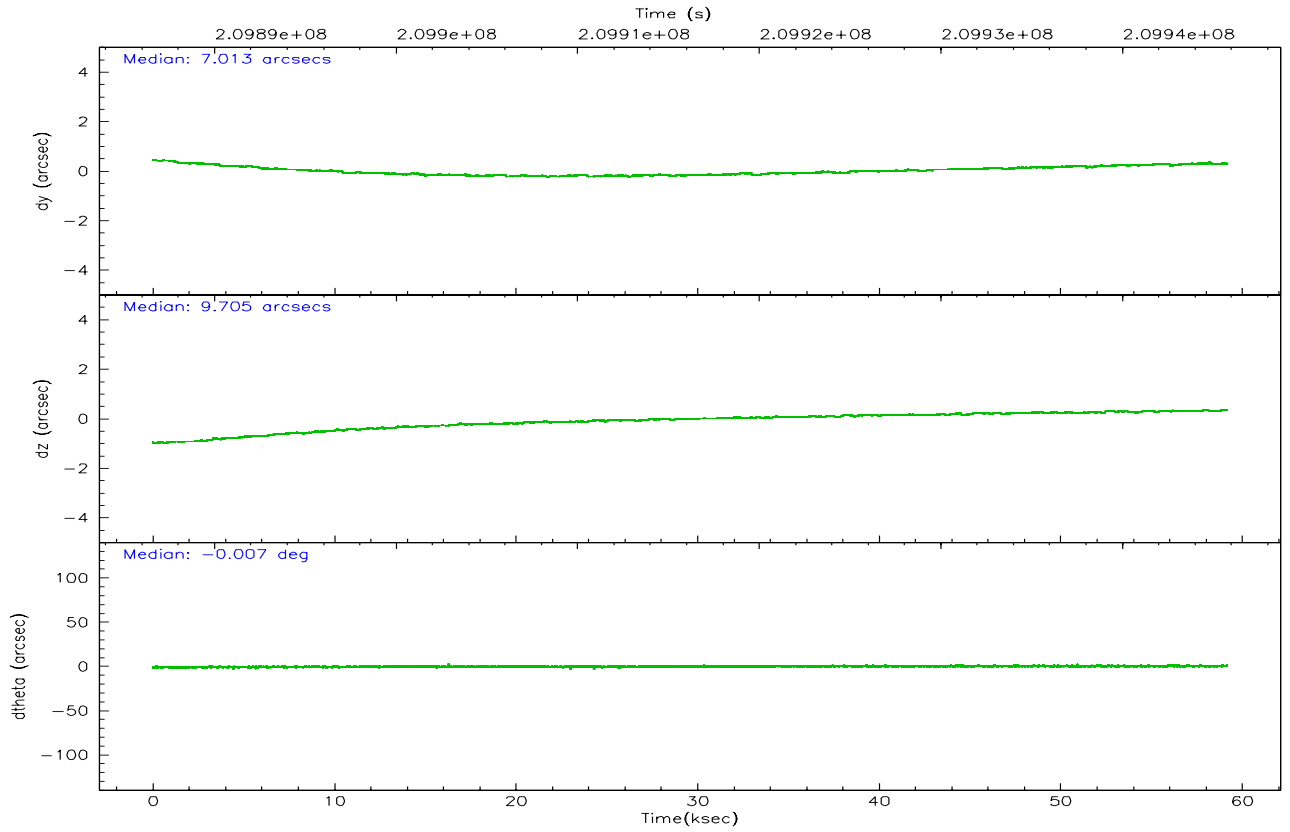
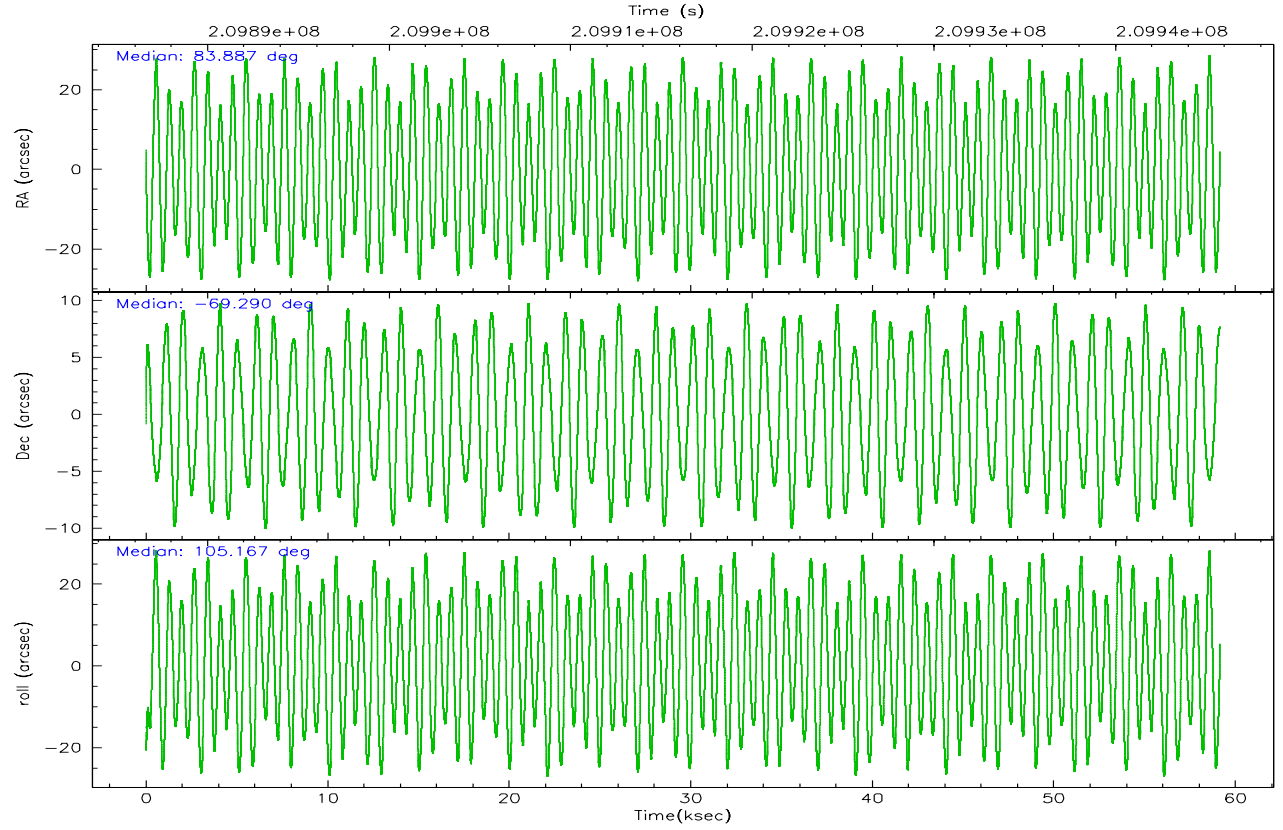
	ccd 4	ccd 5	ccd 6	ccd 7	ccd 8	ccd 9
grade 0 events	6519	4984	6951	6361	10064	5874
	4%	2%	4%	3%	5%	4%
grade 1 events	47	149	38	103	62	43
	0%	0%	0%	0%	0%	0%
grade 2 events	3516	22204	3052	16110	7151	2792
	2%	12%	2%	9%	4%	2%
grade 3 events	2332	3669	2345	6340	4248	2254
	1%	2%	1%	3%	2%	1%
grade 4 events	2170	3503	2247	6189	4016	2047
	1%	2%	1%	3%	2%	1%
grade 5 events	4584	9986	4962	12437	6608	5050
	2%	5%	3%	7%	3%	3%
grade 6 events	2674	42406	2877	35969	9854	2781
	1%	24%	2%	22%	5%	2%
grade 7 events	131000	84671	118264	79213	135735	107156
	85%	49%	84%	48%	76%	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	LETG	LETG	Obspar update status	NONE	UPDATED
Data mode	FAINT	FAINT	On-chip summing requested	N	N
Observation mode	POINTING	POINTING	Subarray requested	CUSTOM	1/4
Pointing RA	83.941966	83.88655991423217	Subarray start row	49	49
Pointing Dec	-69.308481	-69.28959229885702	Subarray row count	256	256
Pointing Roll	105.070441	105.1752290656867	Alternating exposures requested	N	N
Roll angle	100.000000	100.000000	Primary exposure time	0.000000	1
Roll tolerance	10.000000	10.000000			
Roll constraint allows 180D rotation	N	N			
SIM focus pos (mm)	-0.684267	-0.6828225247311905			
SIM defocus (mm)	0	0.001444936568705701			
SIM translation stage pos (mm)	-182.132523	-182.1370004450064			
SIM translation stage offset (mm)	-8	-7.995522138001405			
Observation start time	209886752.184000	209885653.12985			
Observation start date	2004-08-26T05:51:28	2004-08-26T05:34:13			
Observation end time	209945774.184000	209945989.24504			
Observation end date	2004-08-26T22:15:10	2004-08-26T22:19:49			
Read mode	TIMED	TIMED			

2.3 Aspect



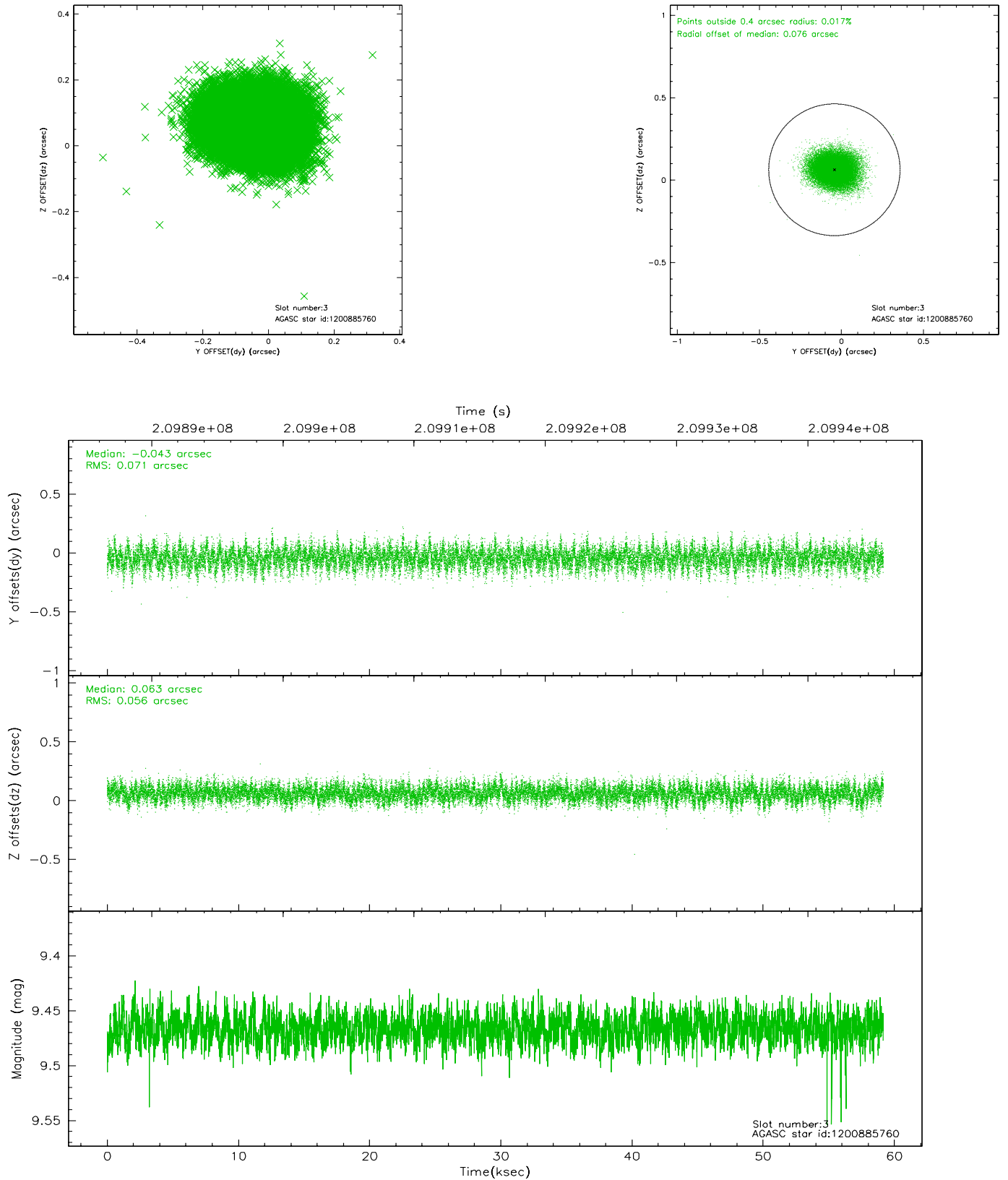


Slot Statistics

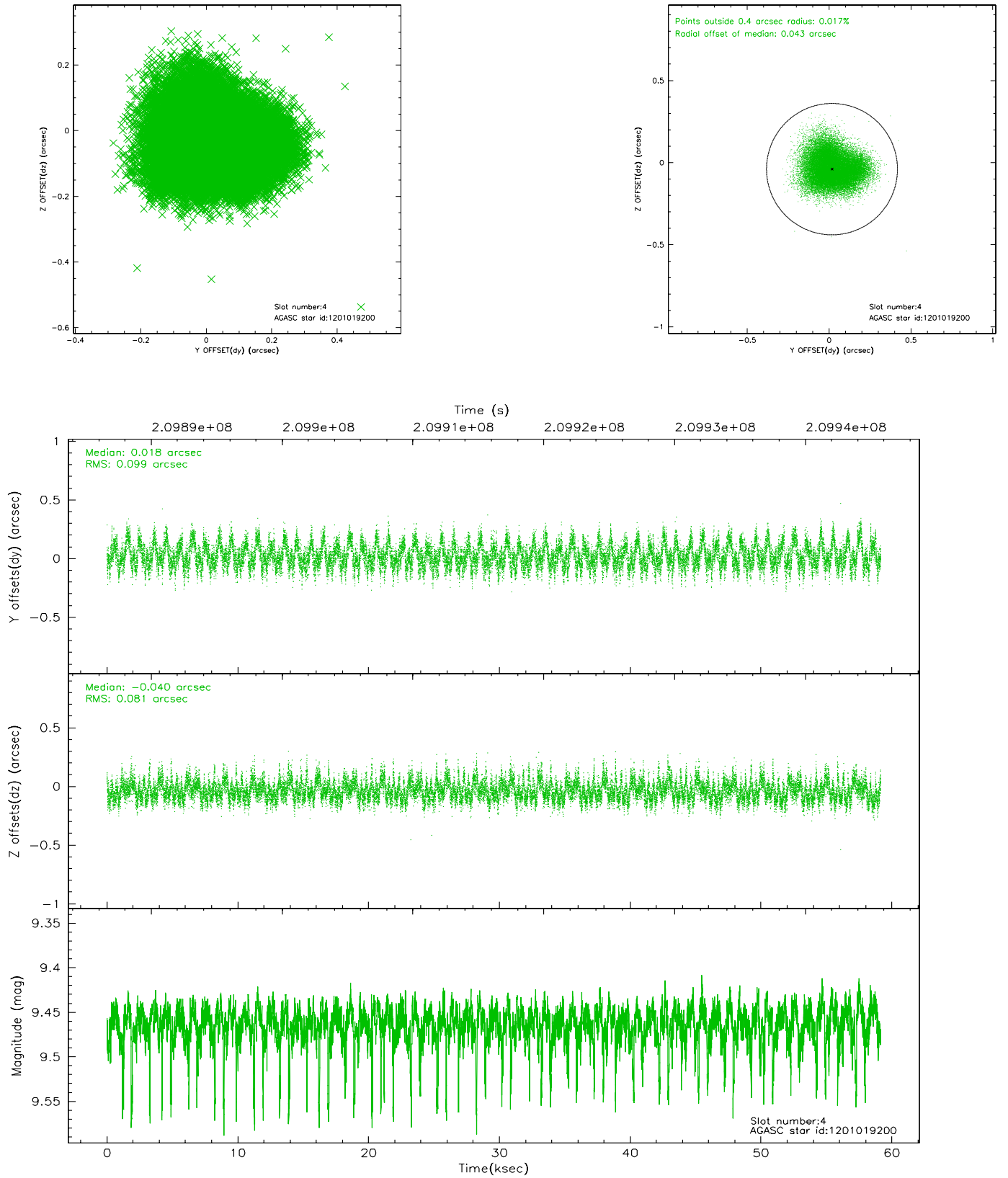
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-S-1	7.18	14431	0.032	0.077	0.009	0.021	0.000000	0.000000	936.91	-1891.08
1	FID	ACIS-S-2	7.09	14431	-0.095	-0.111	0.012	0.045	0.000000	0.000000	-759.14	-1895.85
2	FID	ACIS-S-5	7.22	14432	0.038	0.039	0.008	0.024	0.000000	0.000000	-1812.27	6.38
3	GUIDE	1200885760	9.47	28829	-0.043	0.063	0.096	0.157	83.723637	-68.777667	1918.89	-221.56
4	GUIDE	1201019200	9.46	28734	0.018	-0.040	0.138	0.215	84.213591	-68.777384	1753.89	-838.41
5	GUIDE	1201406184	7.93	28861	-0.047	-0.075	0.063	0.104	82.503234	-69.975517	-1877.84	2341.99
6	GUIDE	1201410616	9.34	28848	0.122	-0.190	0.123	0.195	82.516808	-69.784406	-1213.42	2162.50
7	GUIDE	1201017424	10.20	28762	-0.066	0.245	0.172	0.290	85.854985	-69.248506	-462.16	-2401.65

2.4 Star Slots

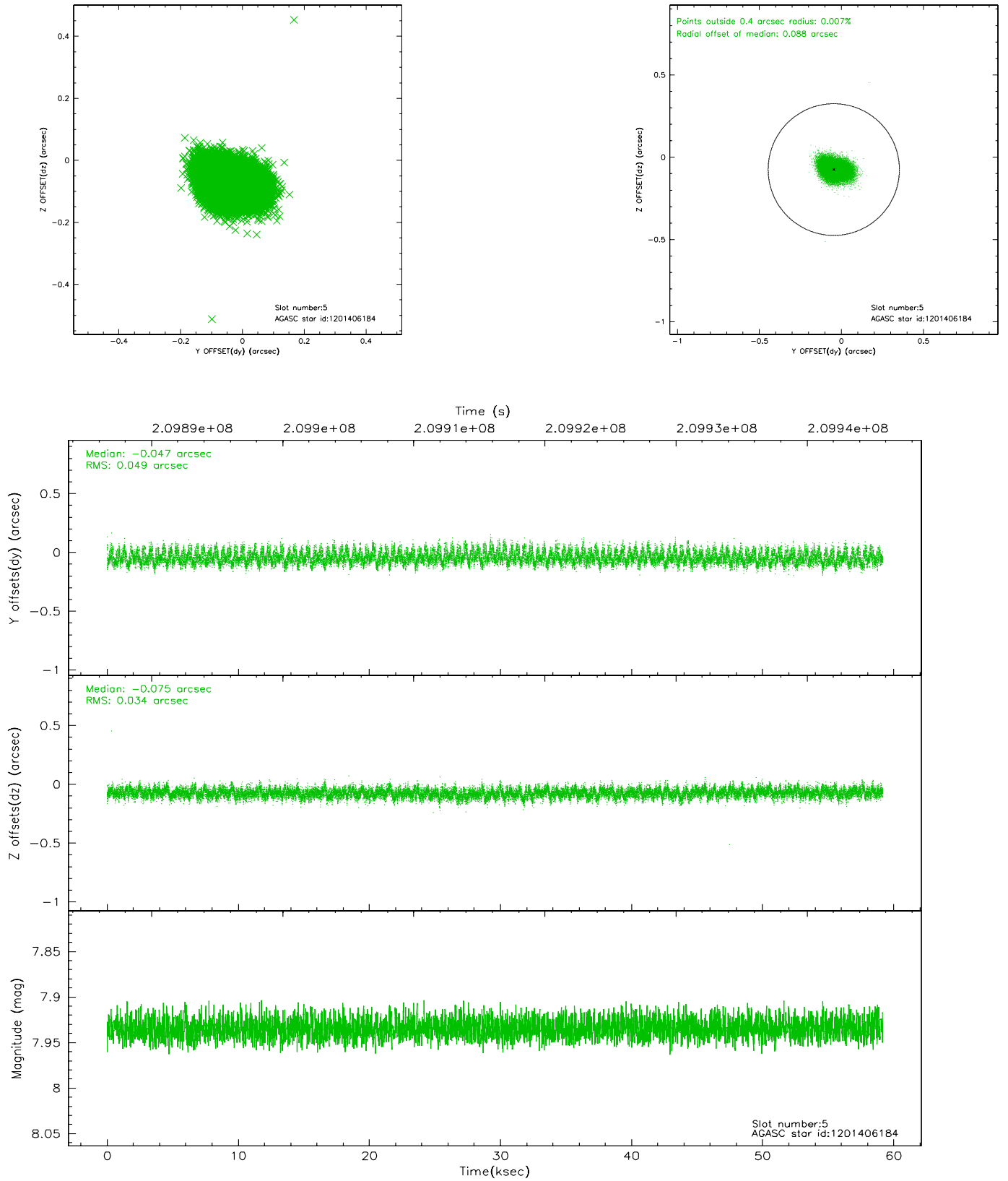
2.4.1 Slot 3



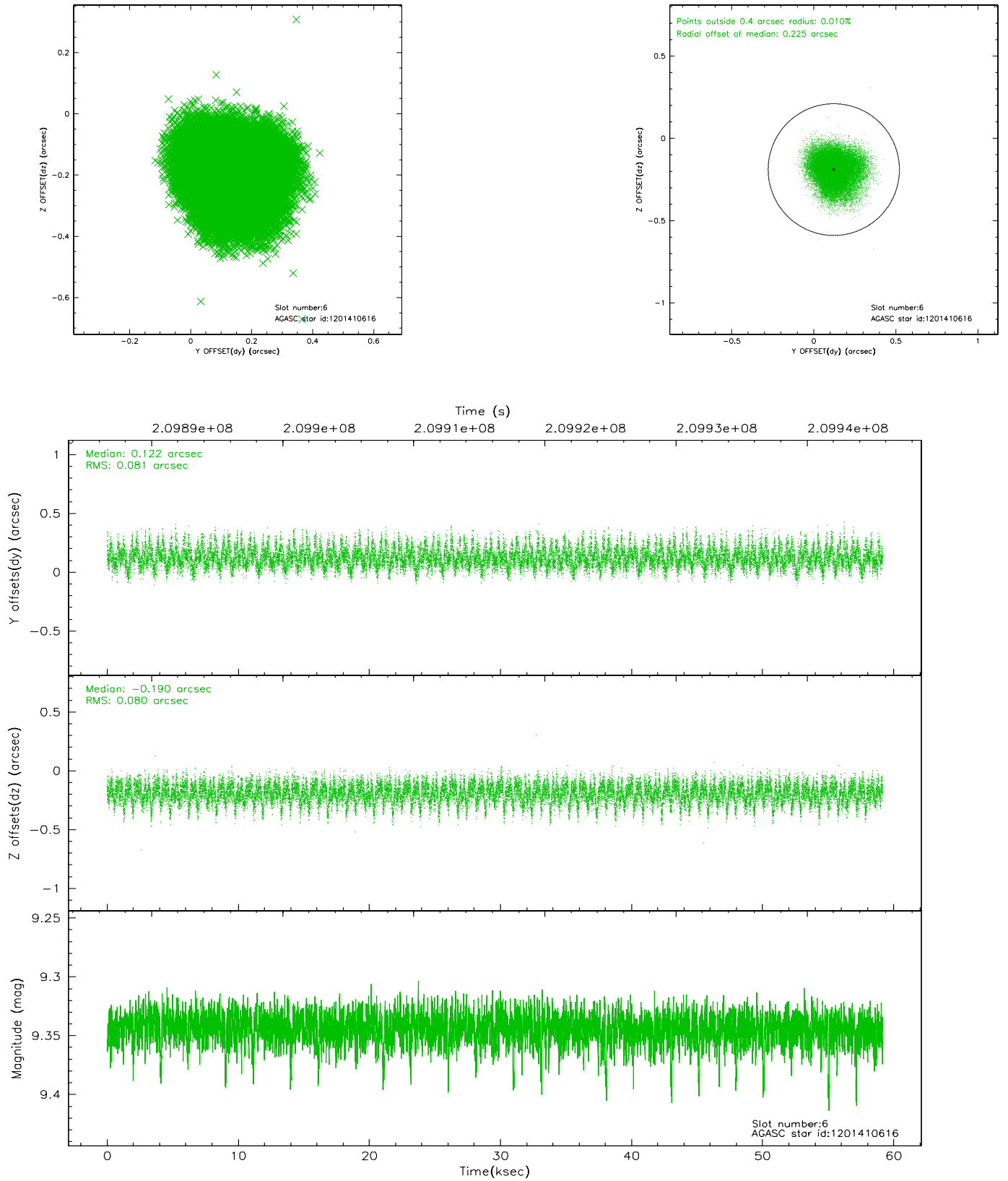
2.4.2 Slot 4



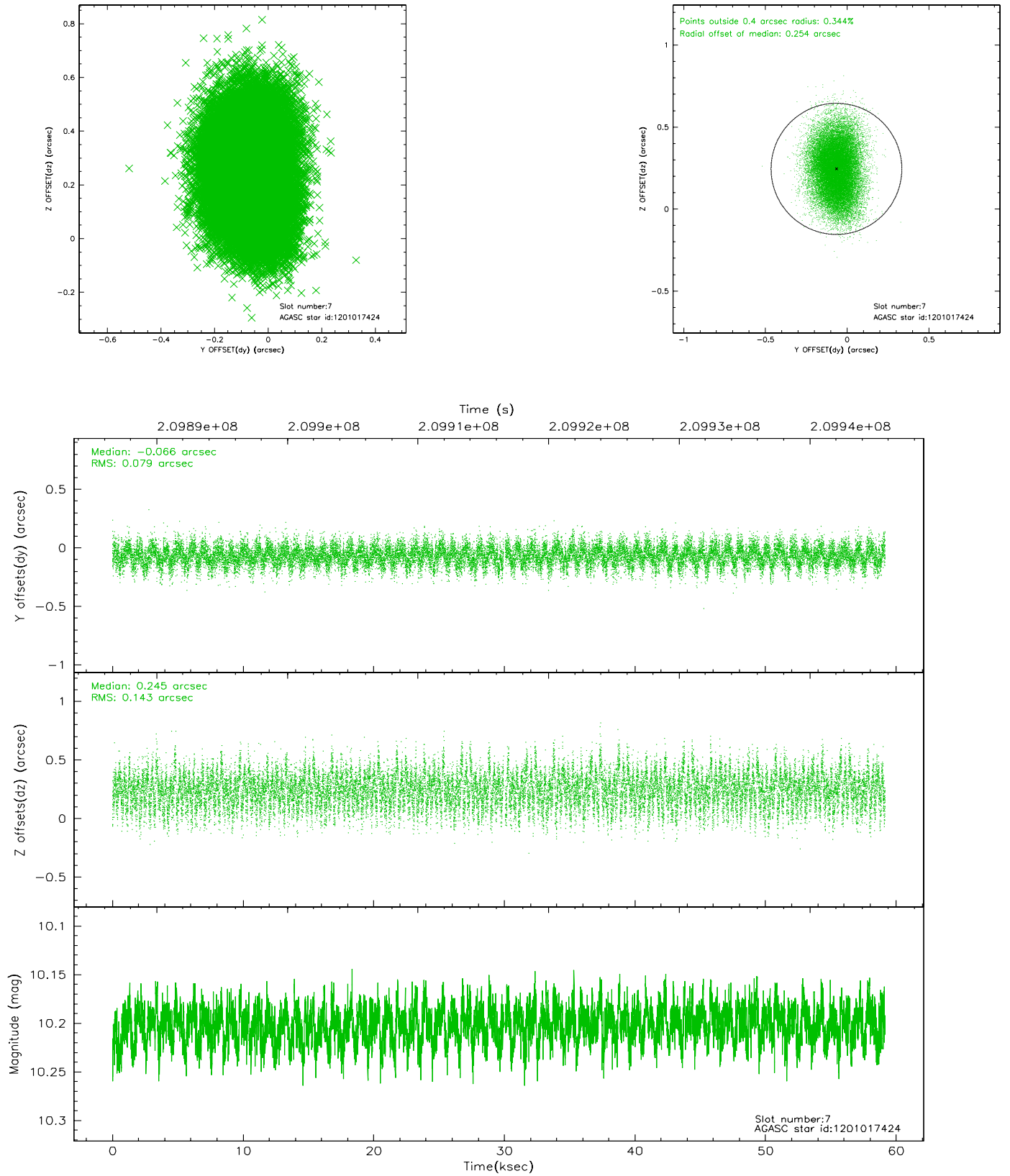
2.4.3 Slot 5



2.4.4 Slot 6

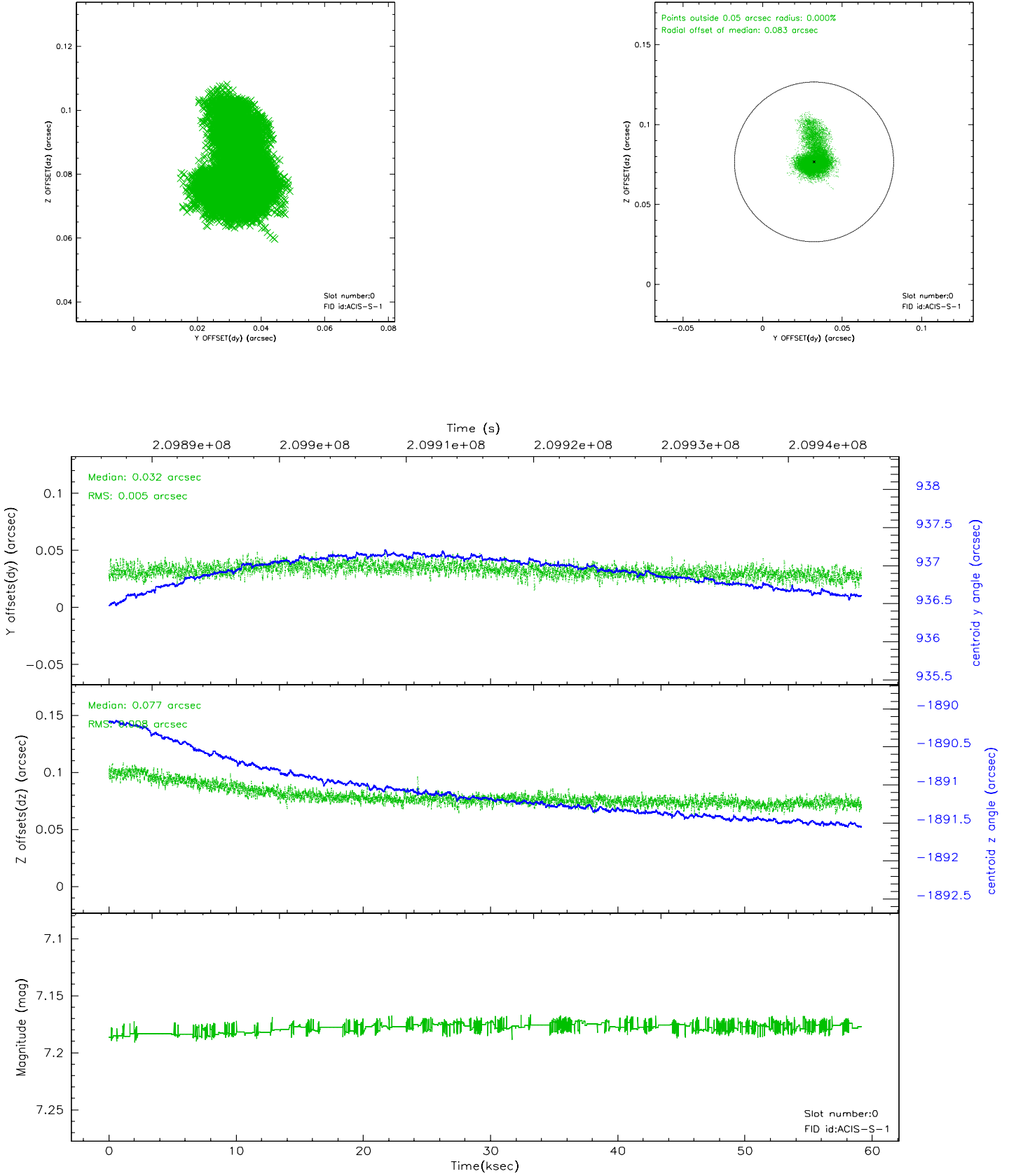


2.4.5 Slot 7

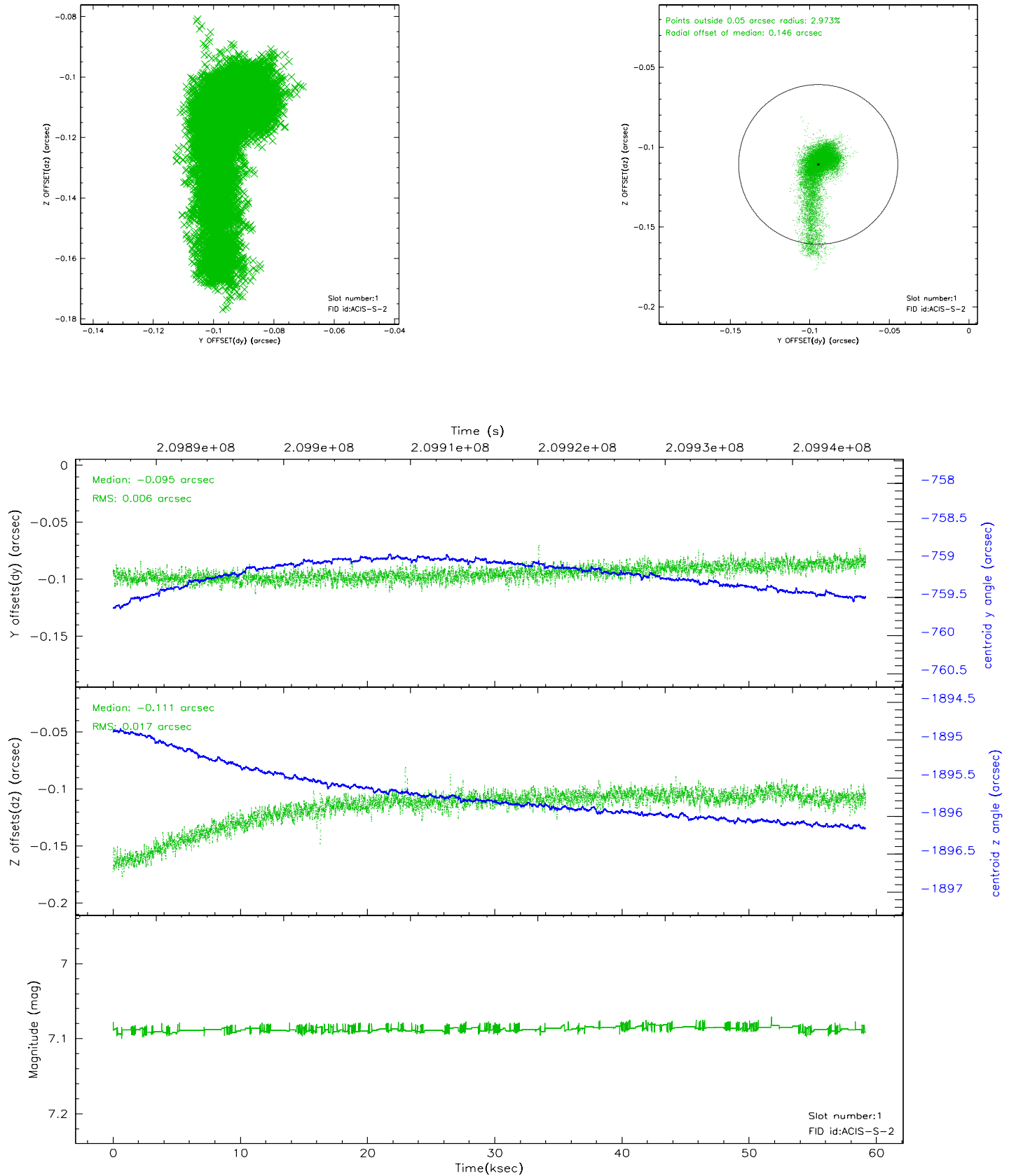


2.5 FID Slots

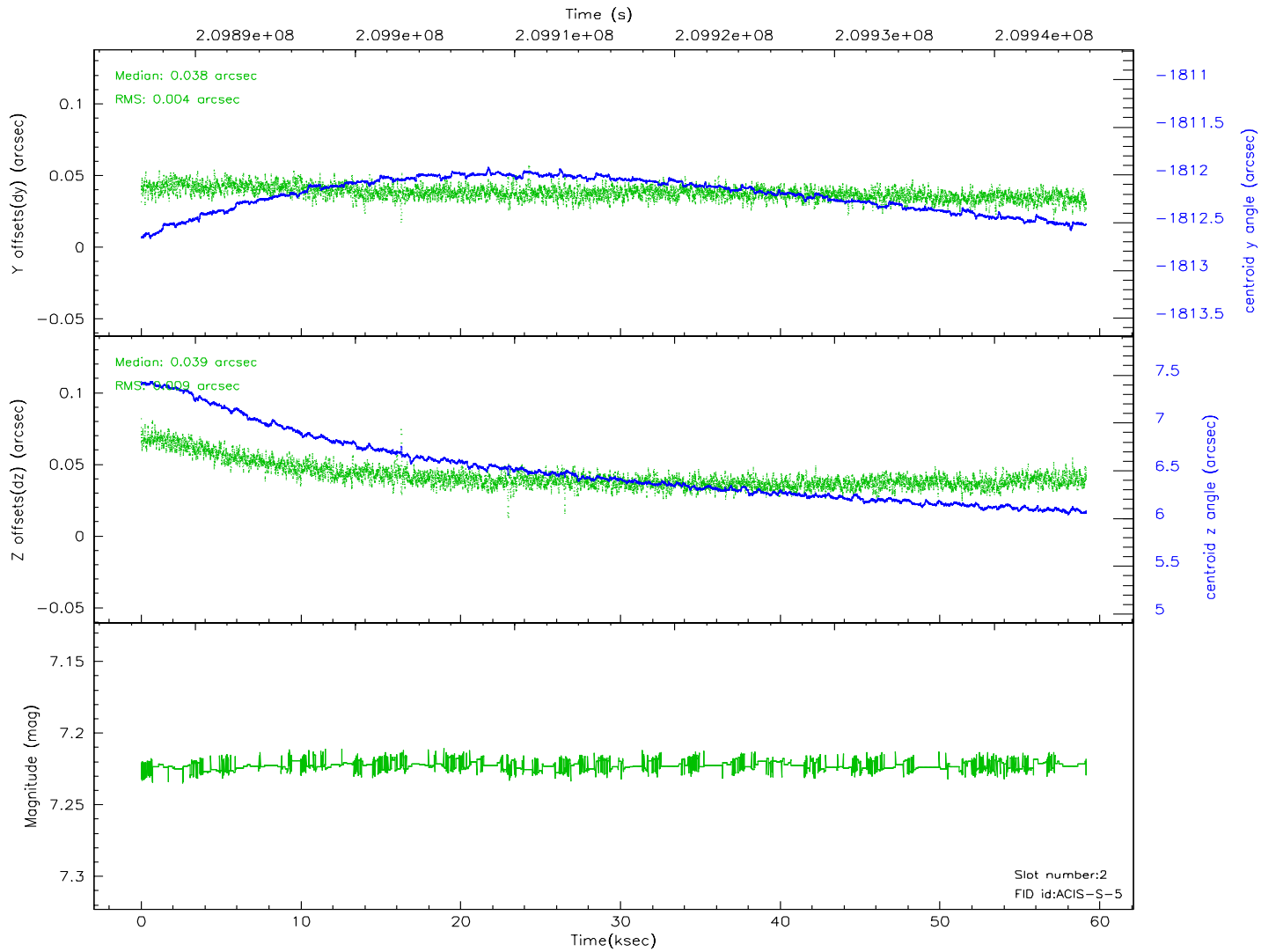
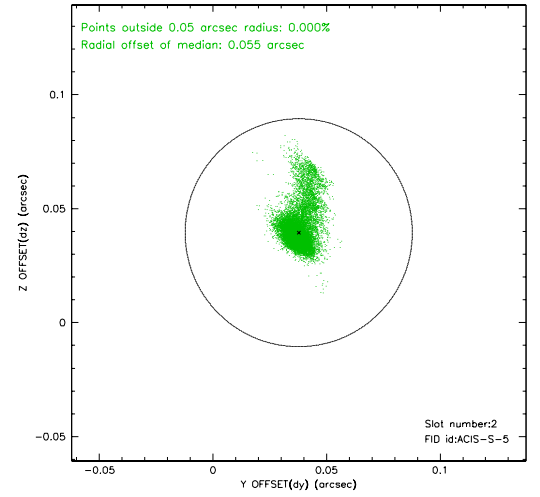
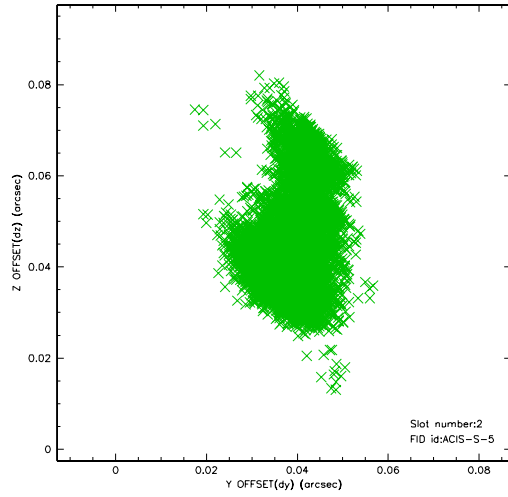
2.5.1 Slot 0



2.5.2 Slot 1



2.5.3 Slot 2

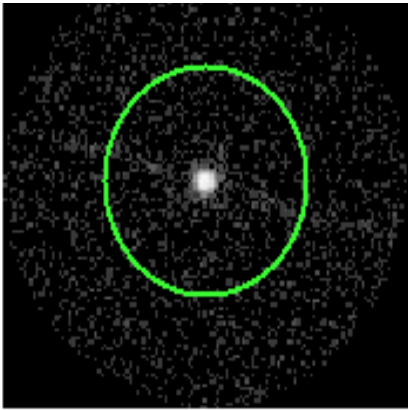


3 Gratings

3.1 LETG Arm



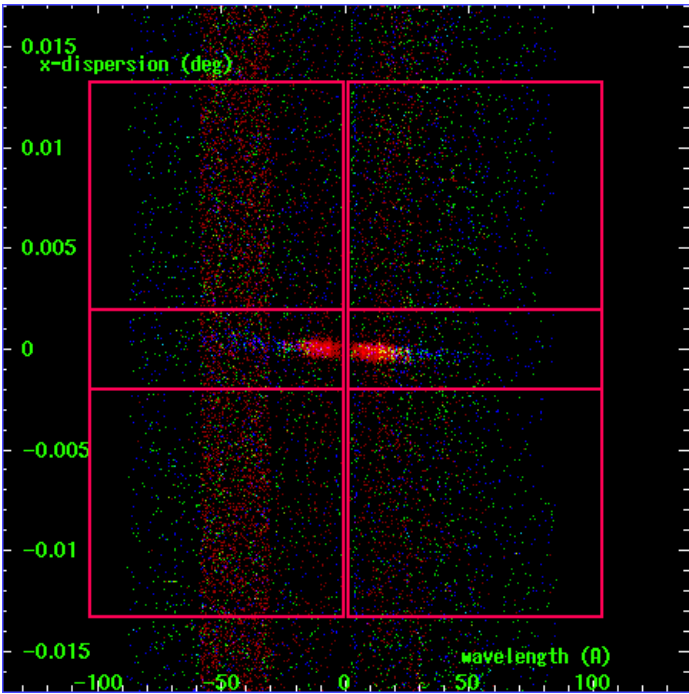
LETG Order Sort 123



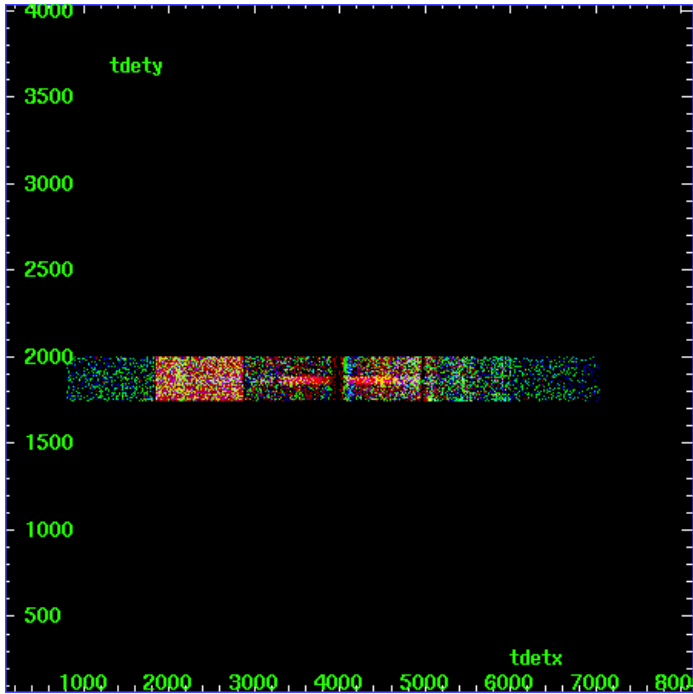
LETG Zero Order



LETG Order Sort ALL

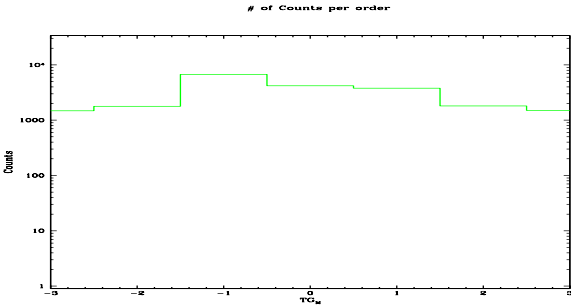


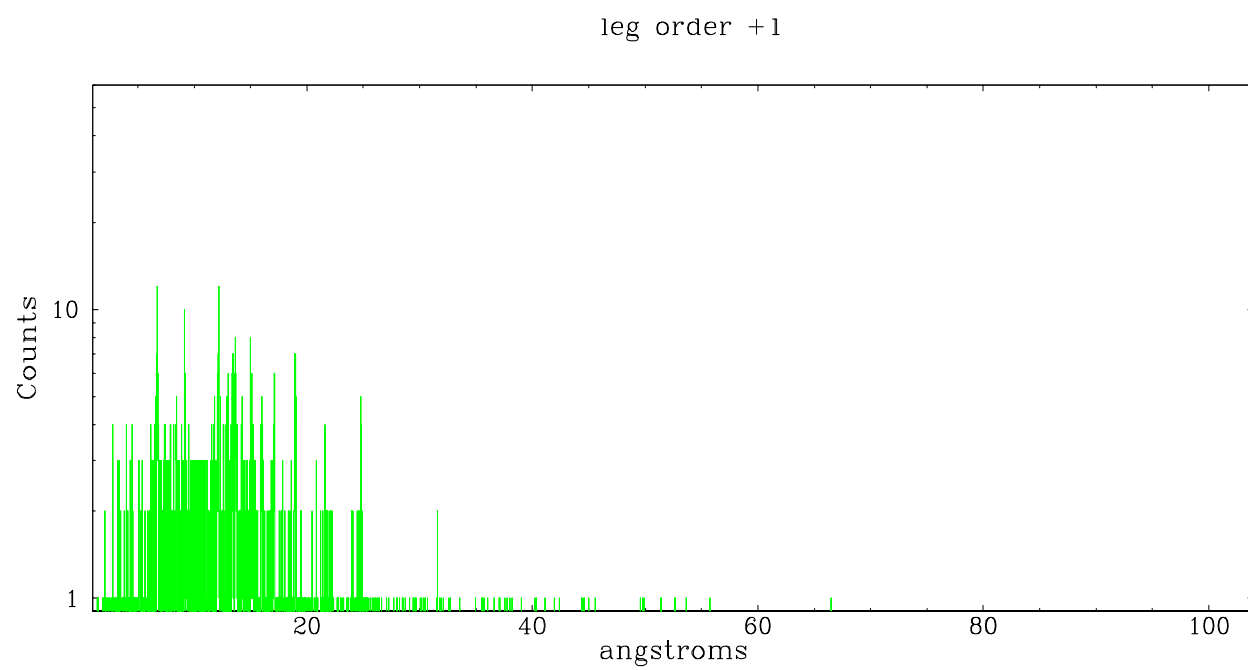
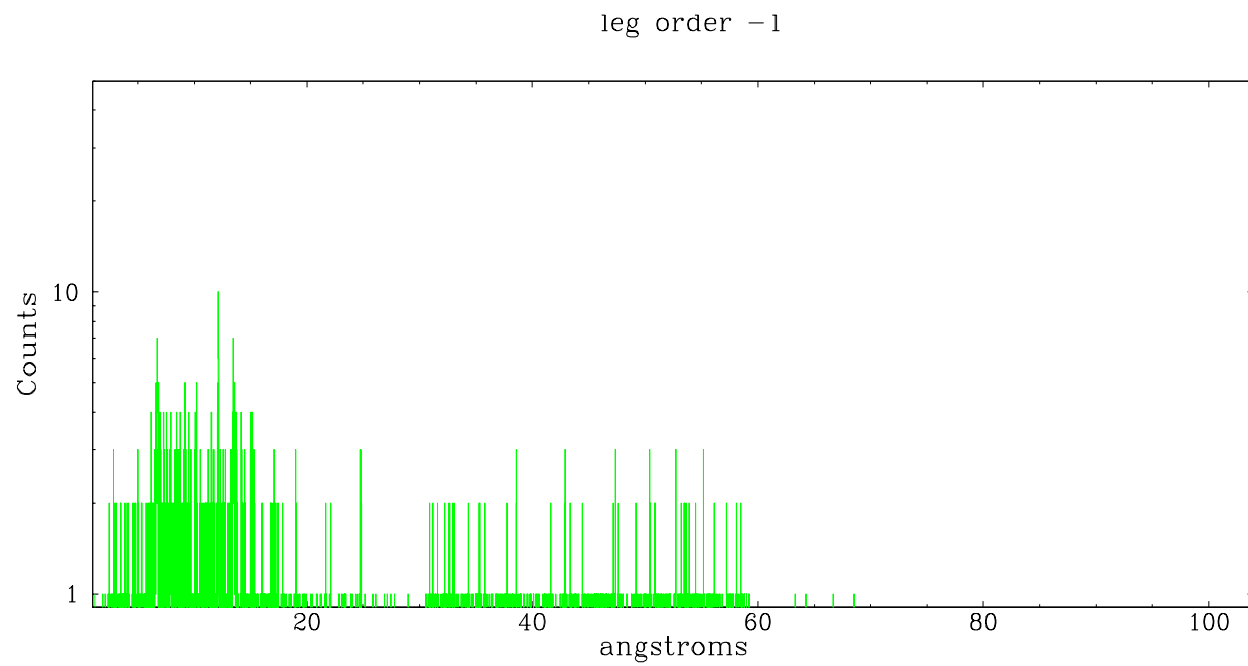
Spot Image LETG



Full Detector LETG

	order -3	order -2	order -1	order 0	order 1	order 2	order 3
Events	1477	1775	6748	4193	3786	1807	1502





A Summary

A.1 Status

V&V Scientist	Joy Nichols
V&V Date (YYYY-MM-DD)	2006.04.19
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	59.167

A.2 Comments