

# V&V Reference Report

## L2 ASCDS Version : 7.6.9

Observation 3402 - L2 Version 001  
Chandra X-Ray Center

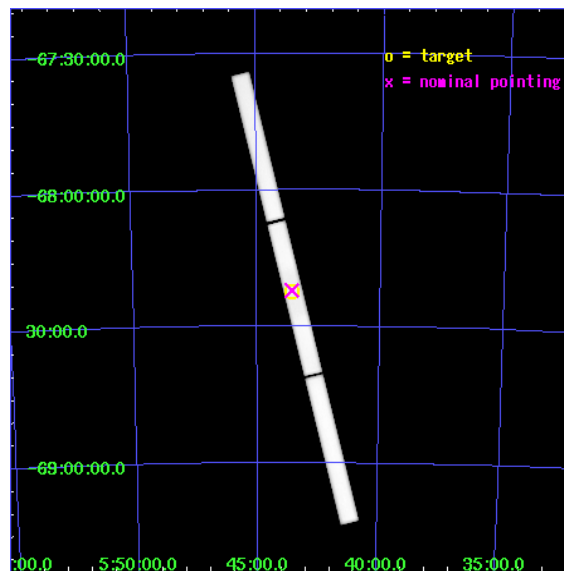
L2 Processing Date : Jan 5 2007

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# 1 Front

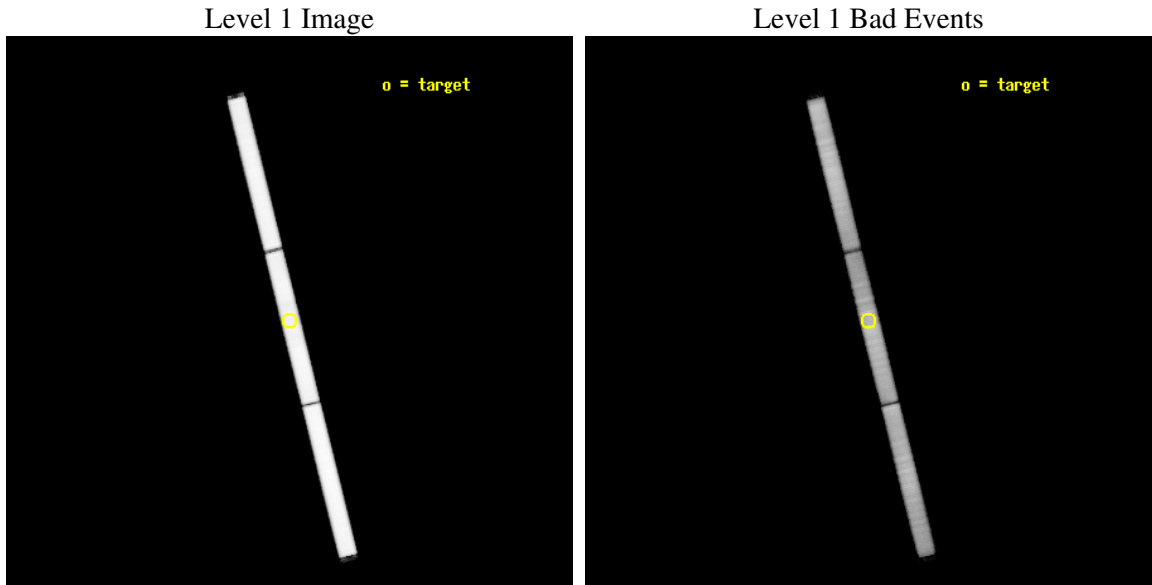
seq_num	300048
obs_id	3402
title	A HIGH RESOLUTION SPECTROSCOPIC OBSERVATION OF CAL 83
observer	Prof. FREDERIK PAERELS
object	CAL 83
ra_targ	85.892083
dec_targ	-68.372944
ra_nom	85.895561512538
dec_nom	-68.368370167565
roll_nom	75.981620689751
revision	2
ontime	62335.633723438
livetime	61404.839343619
l2events	5385760



## 2 OBI

### 2.1 OBI

#### 2.1.1 Images



### 2.1.2 Parameters

obi_num	0
ascdsver	7.6.9
caldbver	3.2.4
date	2007-01-05T12:05:47
revision	2

sched_exp_time	62415.889000
ontime	62419.427476764
l1events	6992901

### 2.1.3 Events

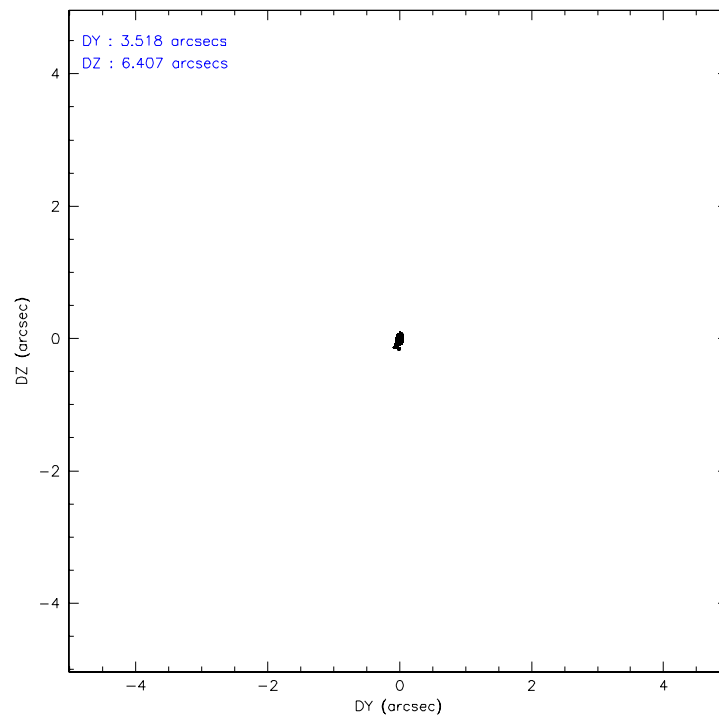
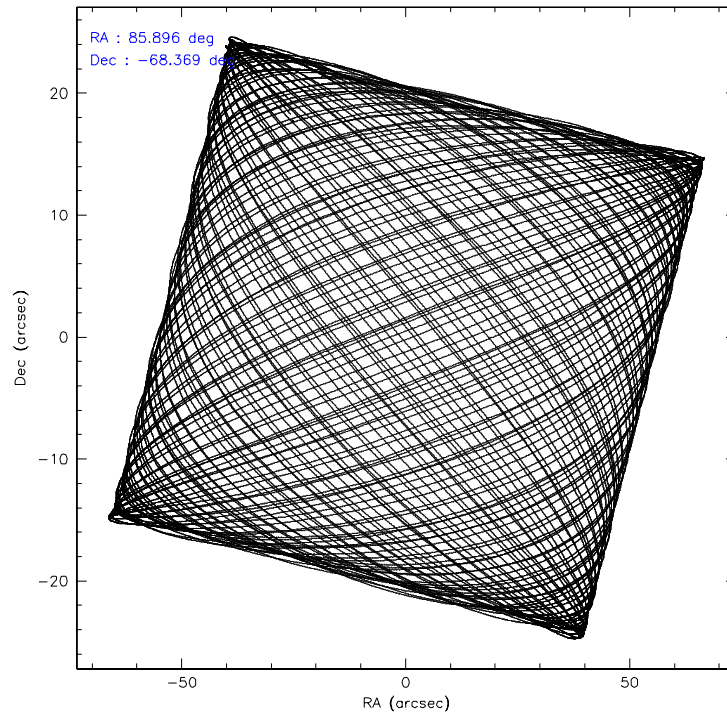
#### Level 1 Events

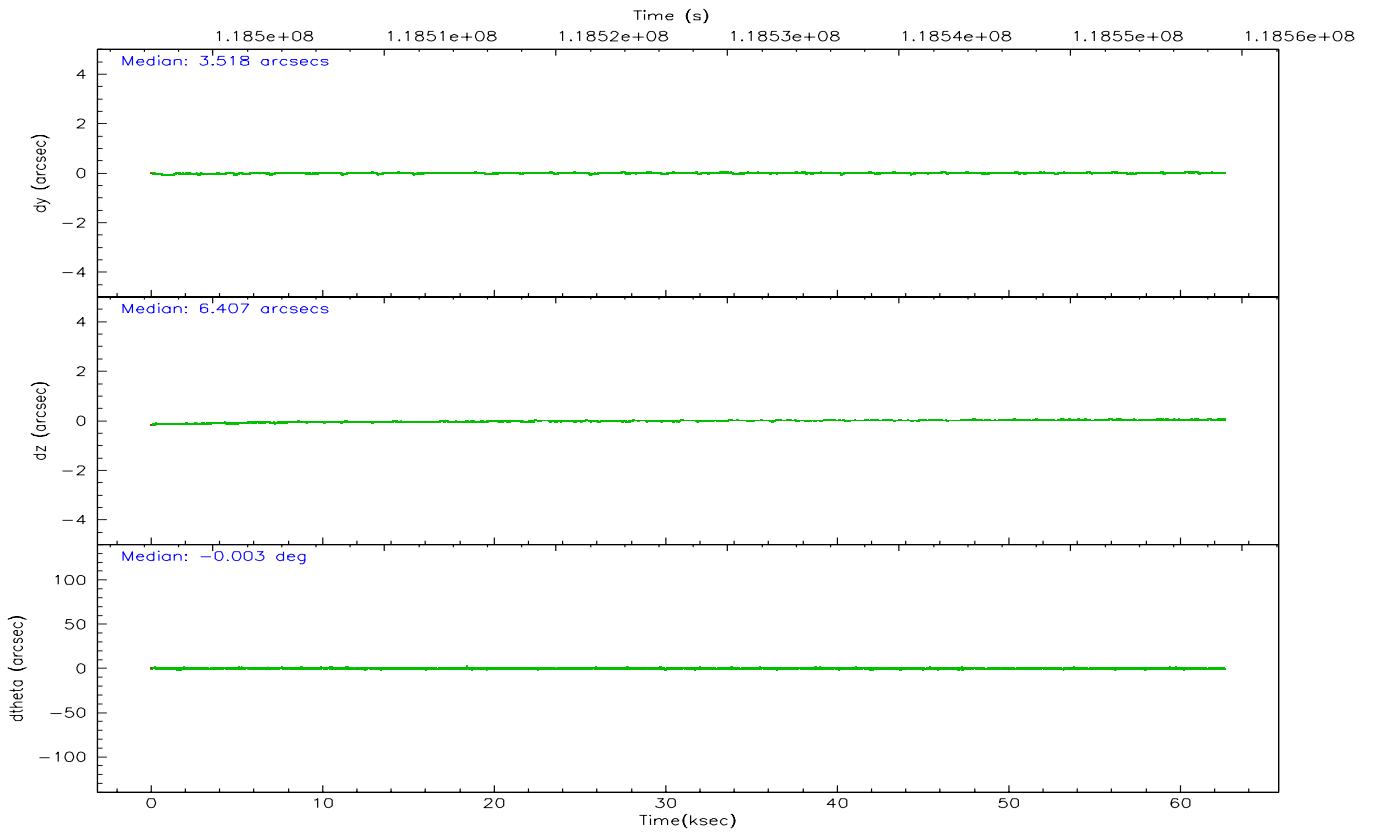
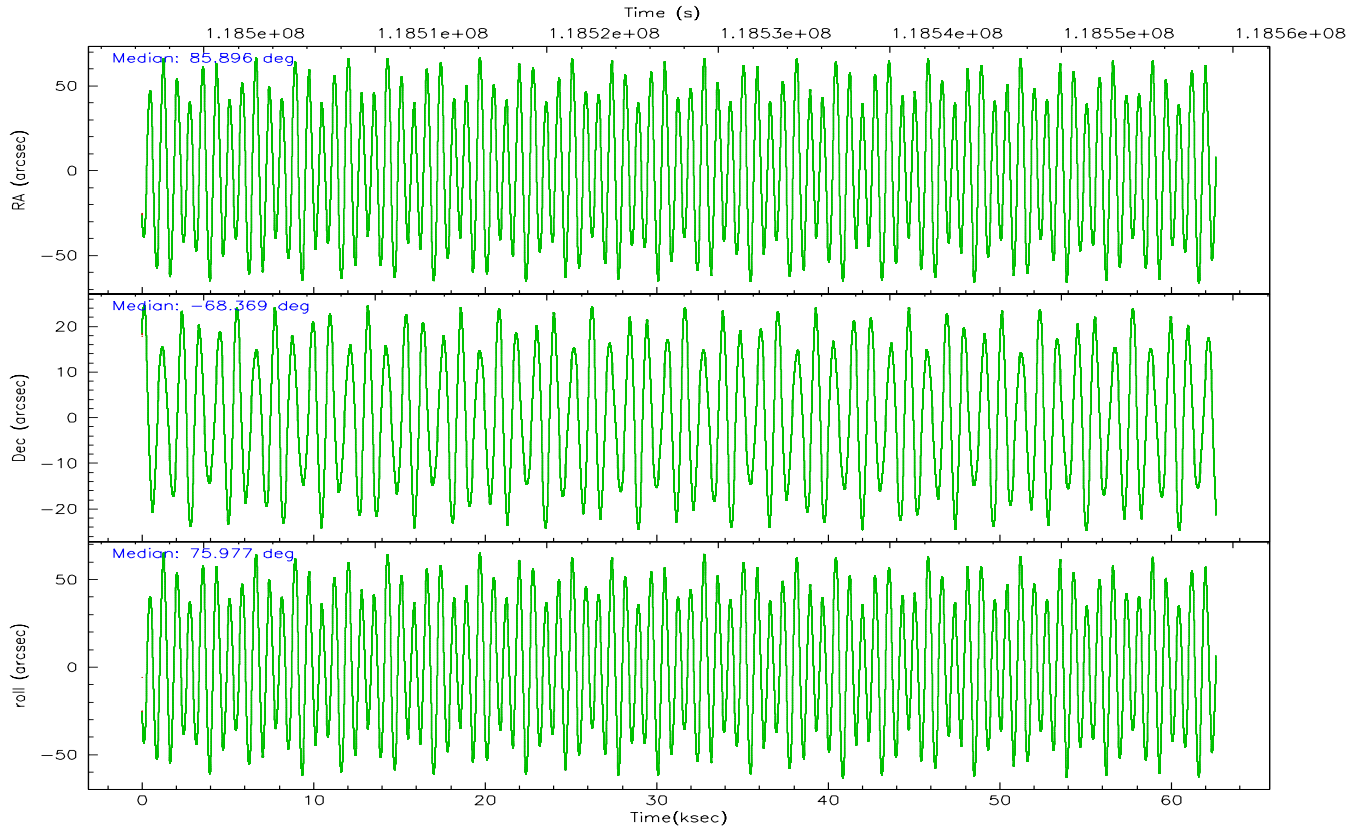
	<b>segment 1</b>	<b>segment 2</b>	<b>segment 3</b>
level 1 events	2500052	2264182	2228667
rejected events	327223	340273	423836
rejected %	13%	15%	19%

## 2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	HRC	HRC	Obspar format version number	6	6
Detector	HRC-S	HRC-S	Obspar file type	PREDICTED	ACTUAL
Grating	LETG	LETG	Obspar update status	NONE	UPDATED
Data mode	OBSERVING	OBSERVING			
Observation mode	POINTING	POINTING			
Pointing RA	85.920583	85.89556151253821			
Pointing Dec	-68.395504	-68.3683701675649			
Pointing Roll	75.937542	75.98162068975064			
SIM focus pos (mm)	-1.429586	-1.428180813131781			
SIM defocus (mm)	0.1037507710433287	0.1051558262725154			
SIM translation stage pos (mm)	250.455976	250.466033080201			
SIM translation stage offset (mm)	0	-0.01005468664627074			
Observation start time	118496584.184000	118496101.41572			
Observation start date	2001-10-03T11:42:00	2001-10-03T11:35:01			
Observation end time	118558999.184000	118559560.70574			
Observation end date	2001-10-04T05:02:15	2001-10-04T05:12:40			

## 2.3 Aspect



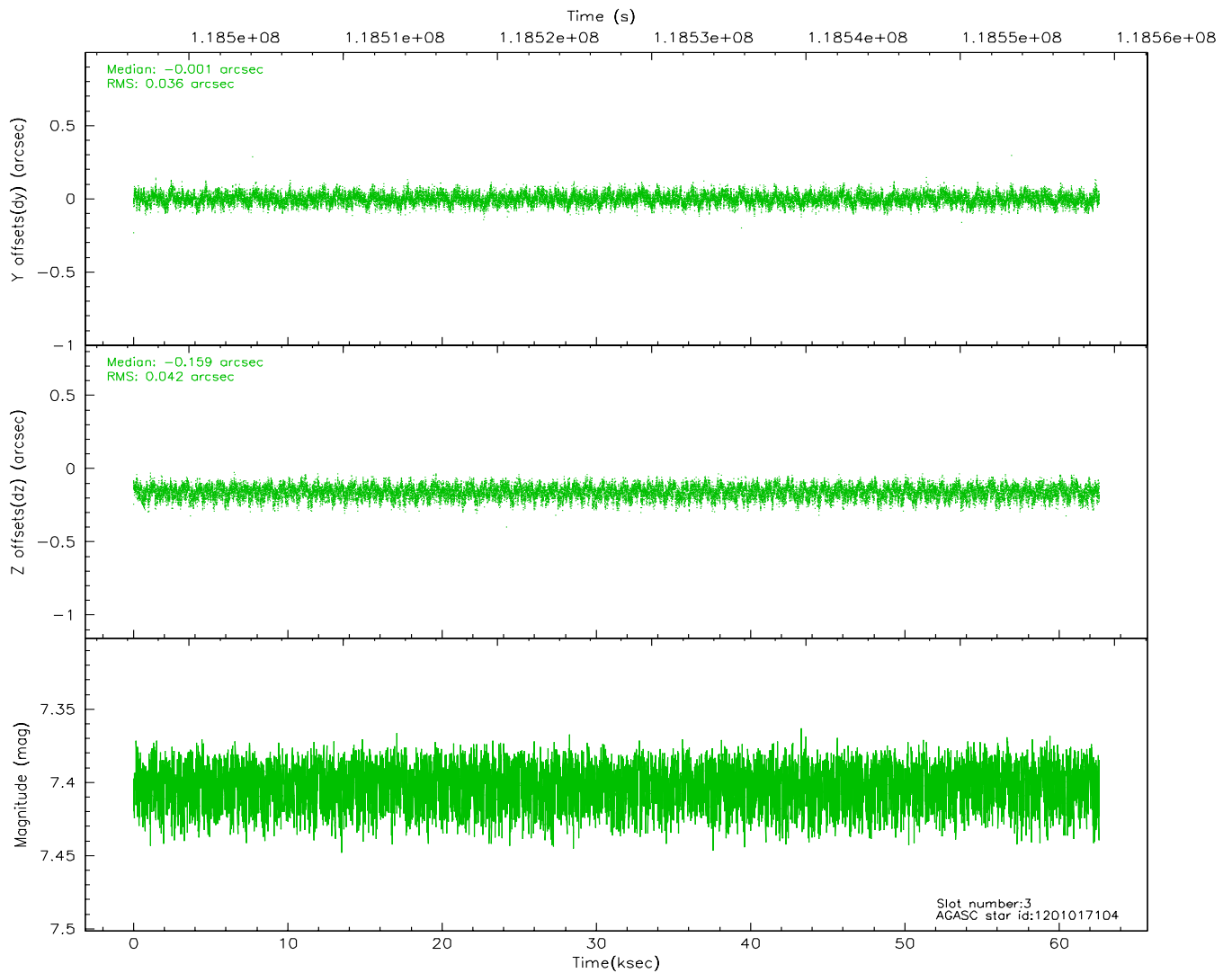
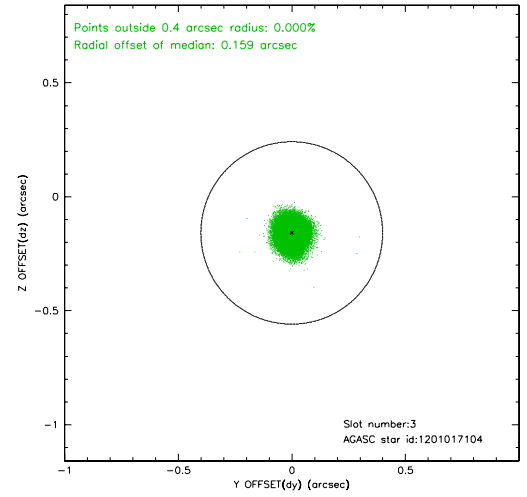
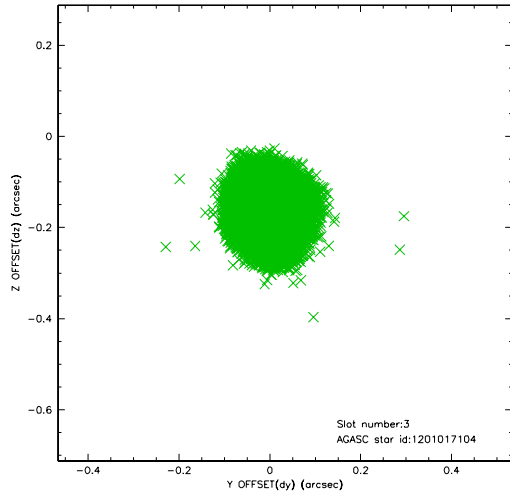


### Slot Statistics

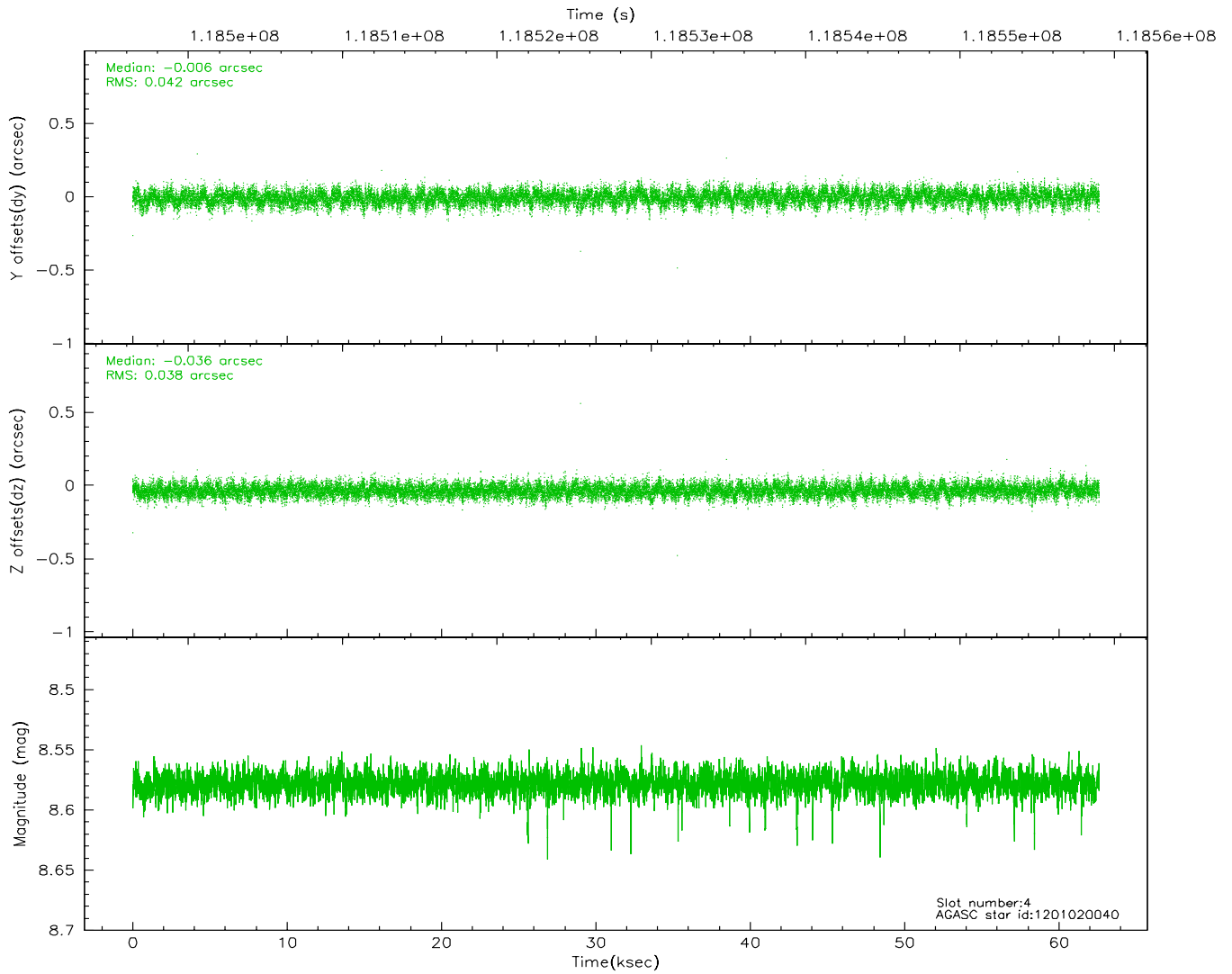
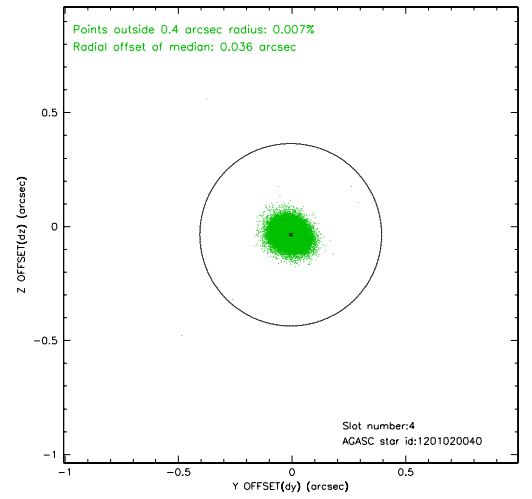
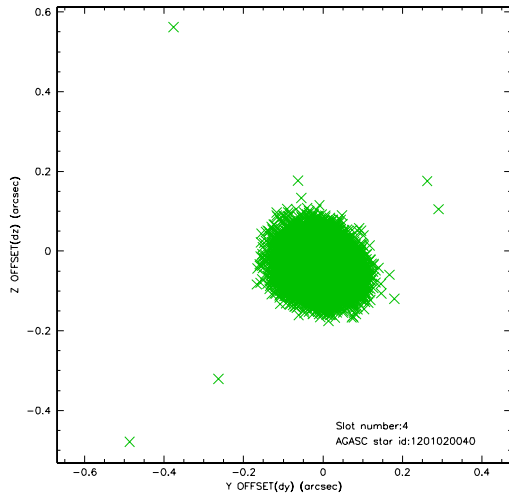
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	HRC-S-1	6.95	15273	0.153	-0.116	0.007	0.012	0.000000	0.000000	-1157.55	-454.92
1	FID	HRC-S-2	6.95	15273	0.082	-0.090	0.005	0.008	0.000000	0.000000	1241.98	-447.57
2	FID	HRC-S-3	6.98	15272	0.155	-0.096	0.007	0.012	0.000000	0.000000	-1160.19	574.60
3	GUIDE	1201017104	7.40	30541	-0.001	-0.159	0.060	0.094	85.906081	-68.081291	1092.96	294.11
4	GUIDE	1201020040	8.58	30538	-0.006	-0.036	0.060	0.097	85.379163	-68.879396	-1863.05	257.45
5	GUIDE	1201018000	8.88	30540	-0.087	0.096	0.073	0.119	86.429836	-67.864420	2019.97	-205.59
6	GUIDE	1201017288	9.74	30513	0.092	0.030	0.126	0.201	84.358094	-68.728983	-1685.07	1681.54
7	GUIDE	1201017368	9.50	30533	-0.001	0.073	0.114	0.189	87.970426	-68.052014	1825.74	-2385.11

## 2.4 Star Slots

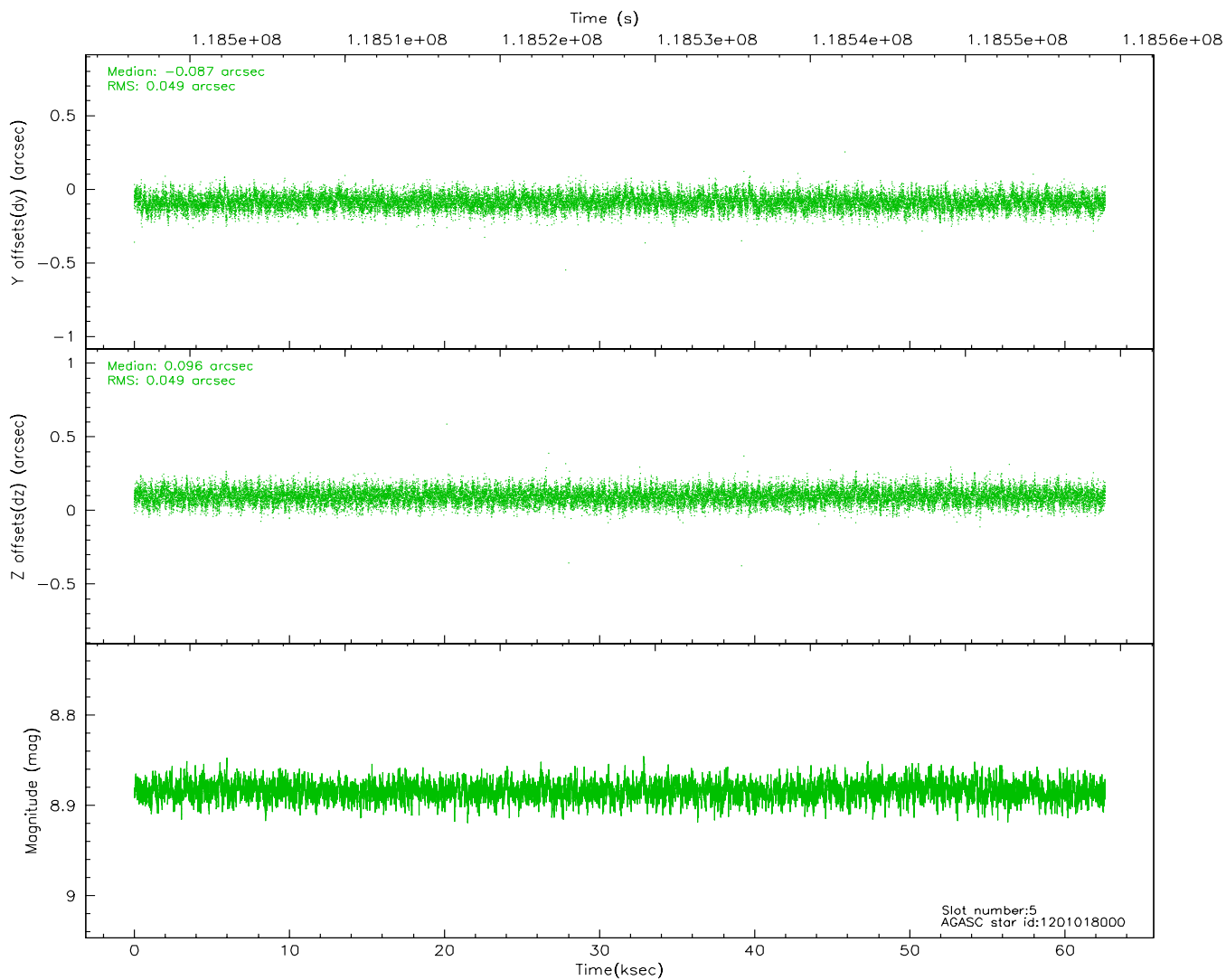
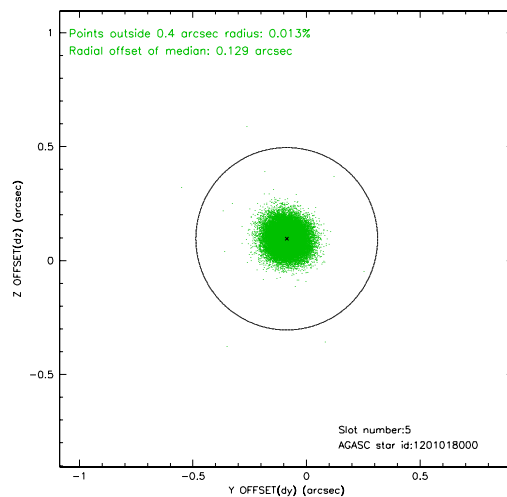
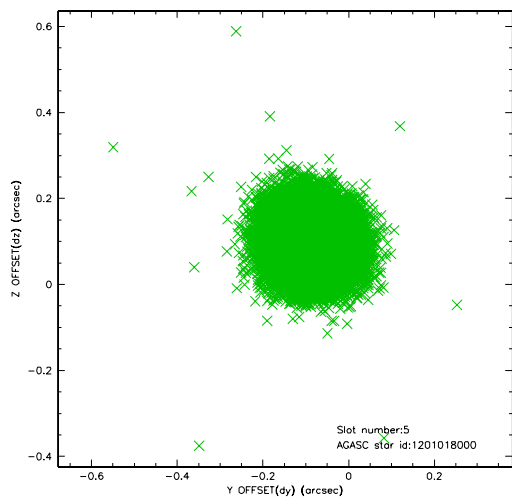
### 2.4.1 Slot 3



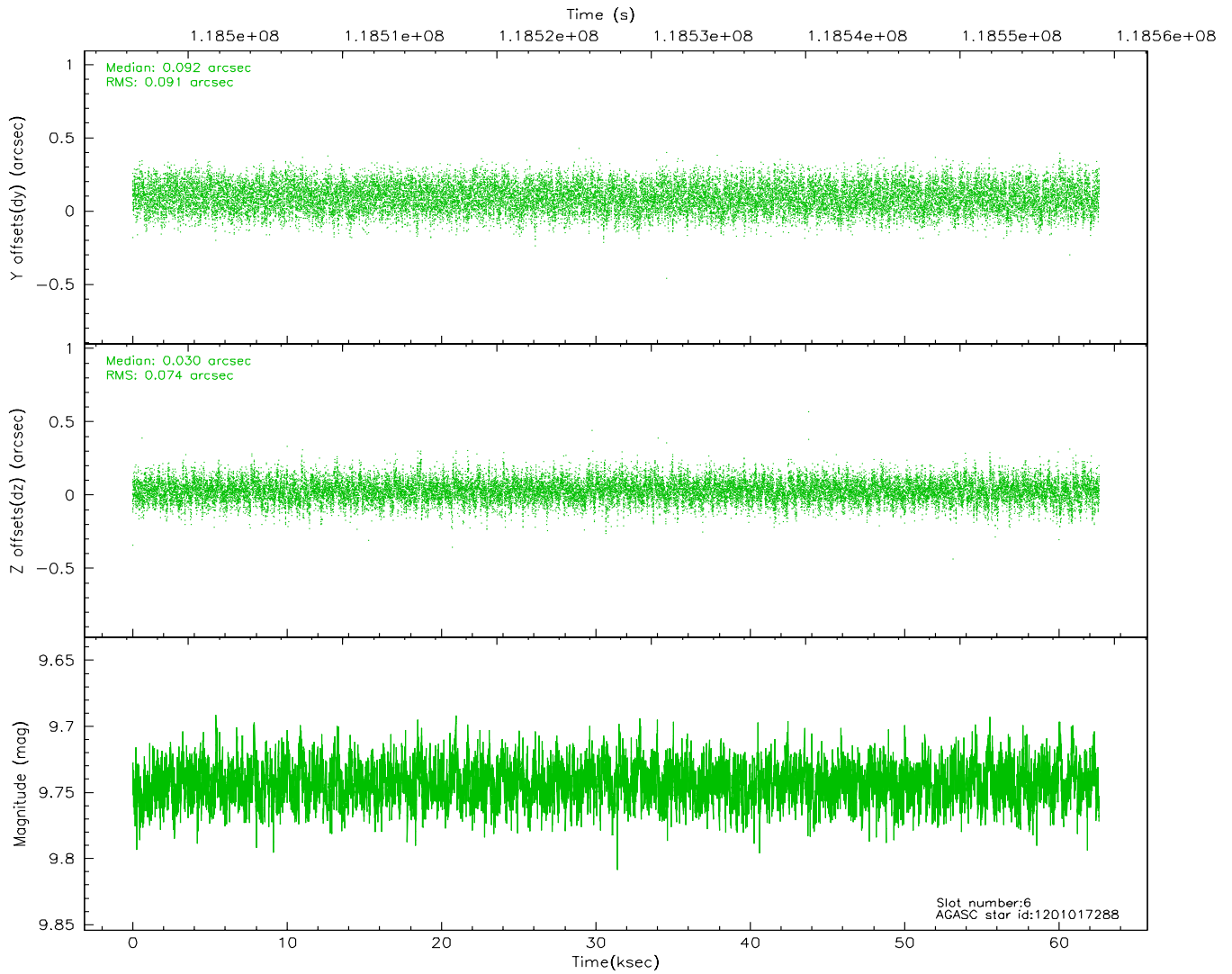
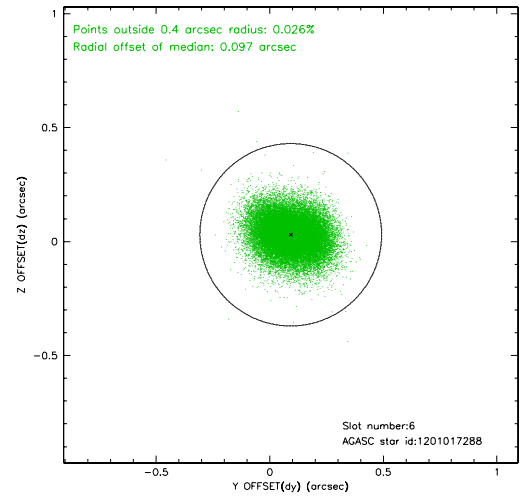
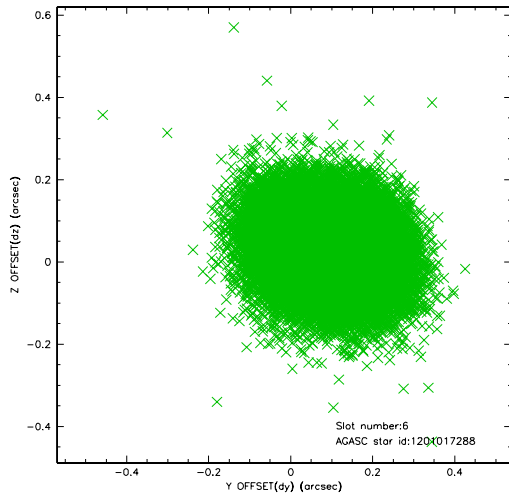
### 2.4.2 Slot 4



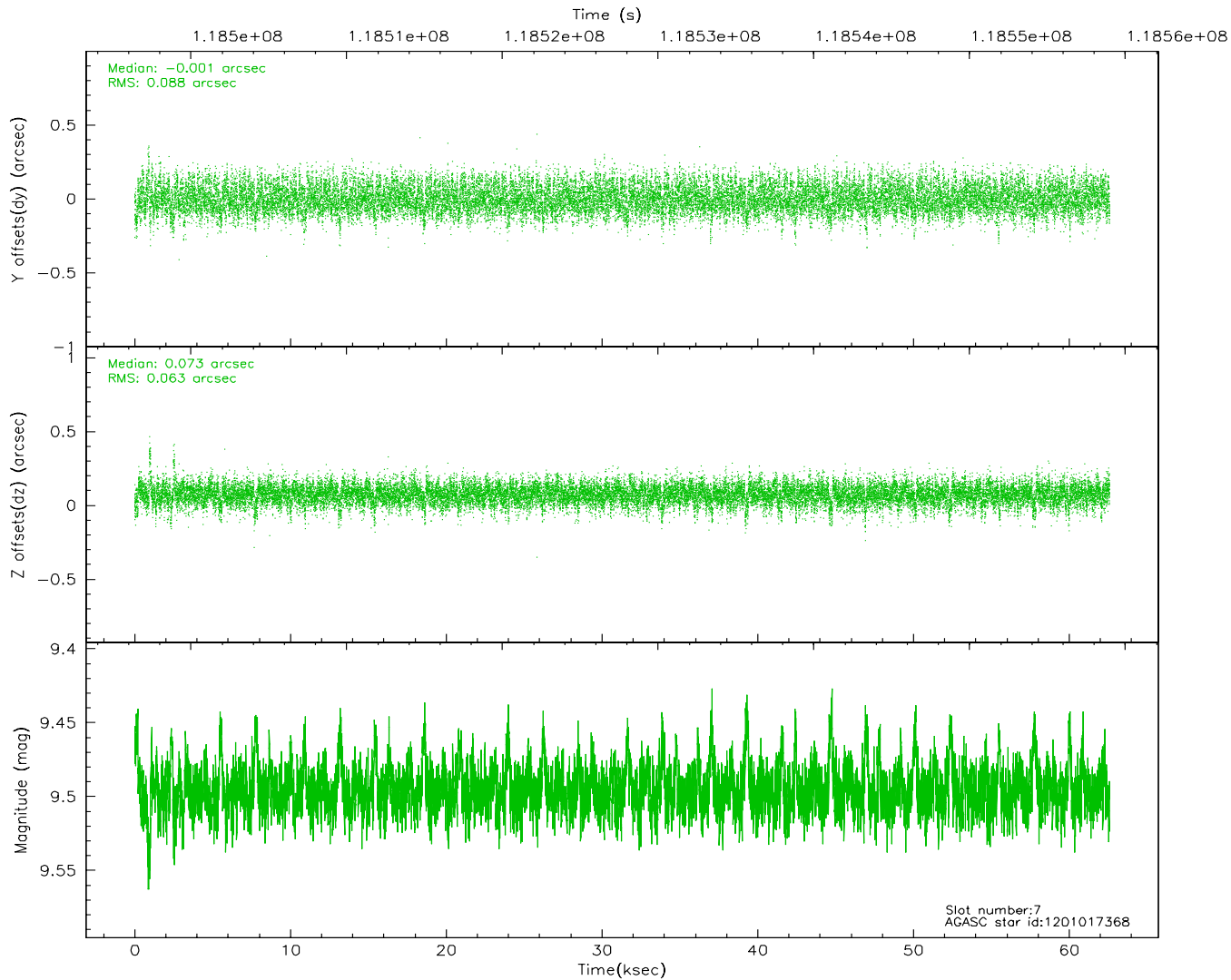
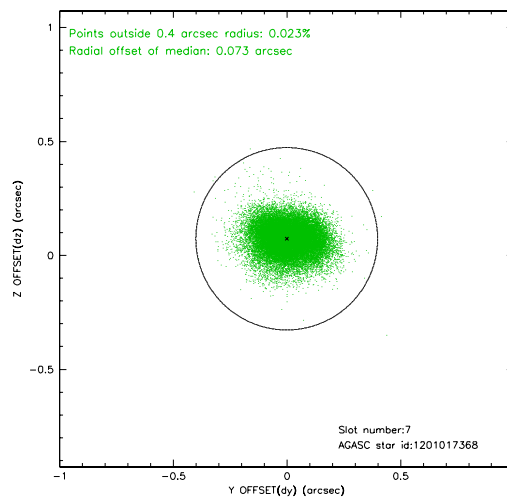
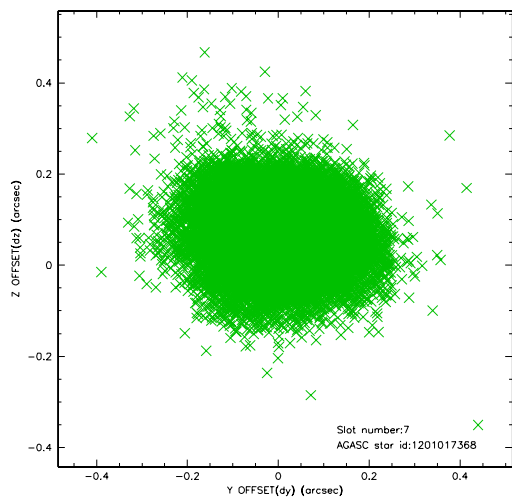
### 2.4.3 Slot 5



### 2.4.4 Slot 6

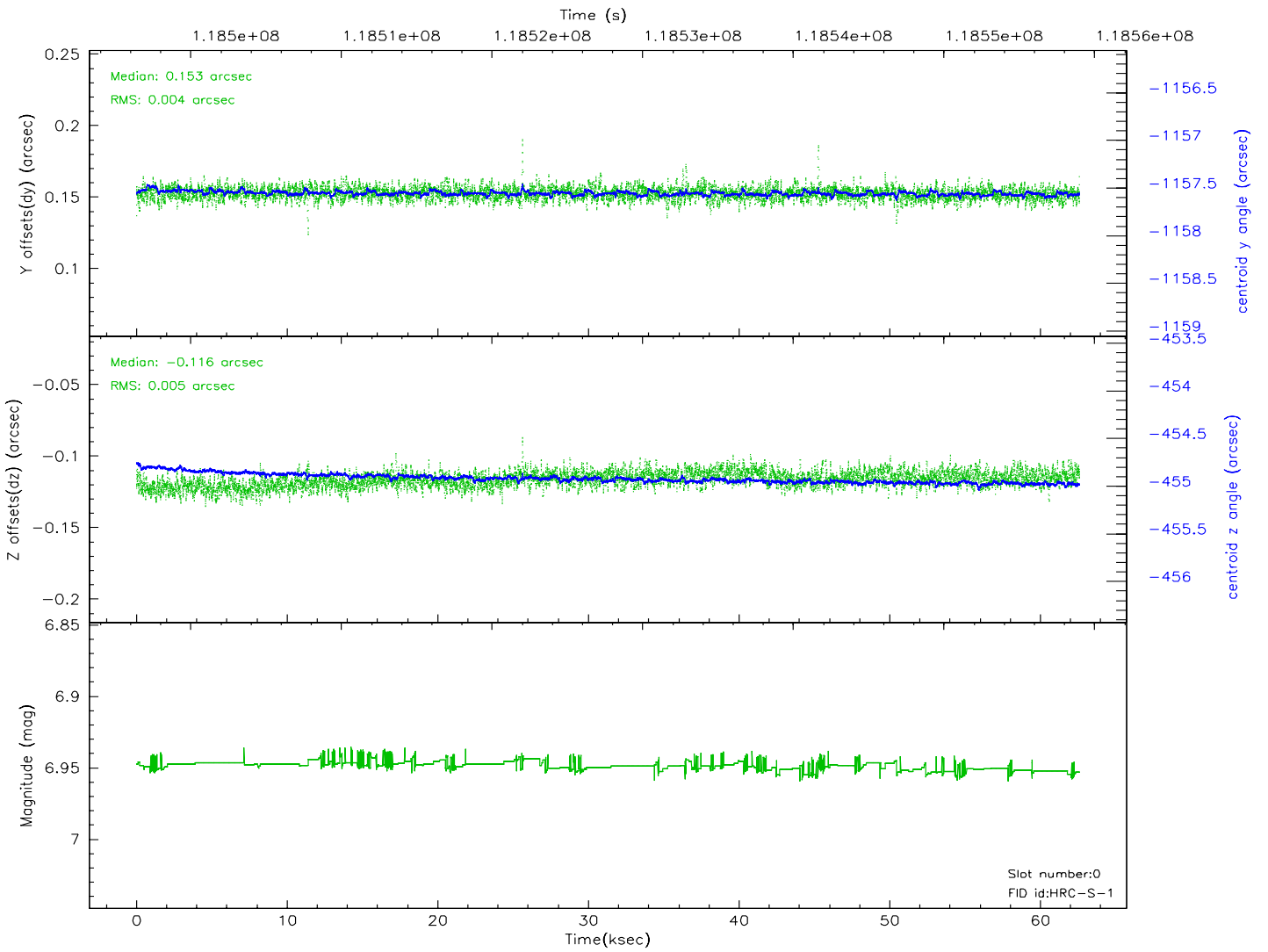
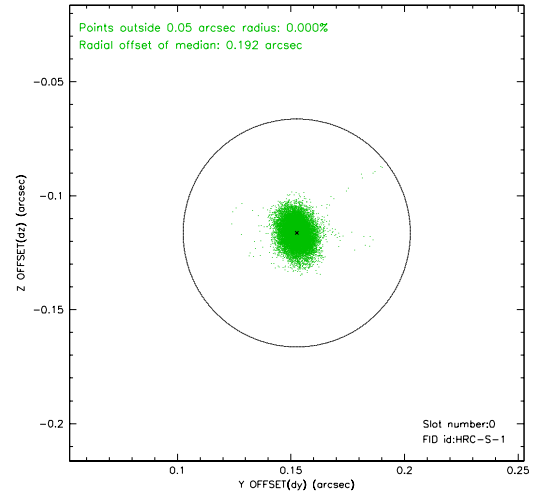
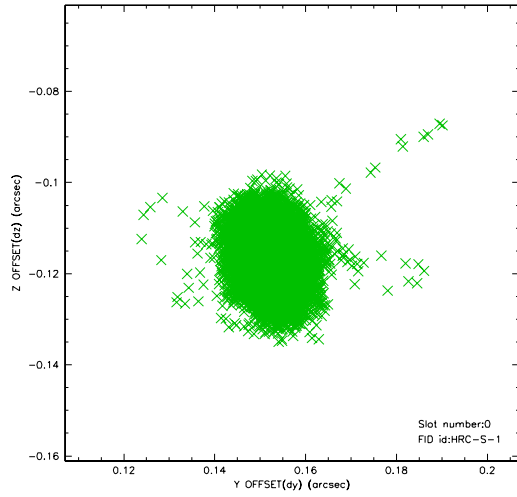


## 2.4.5 Slot 7

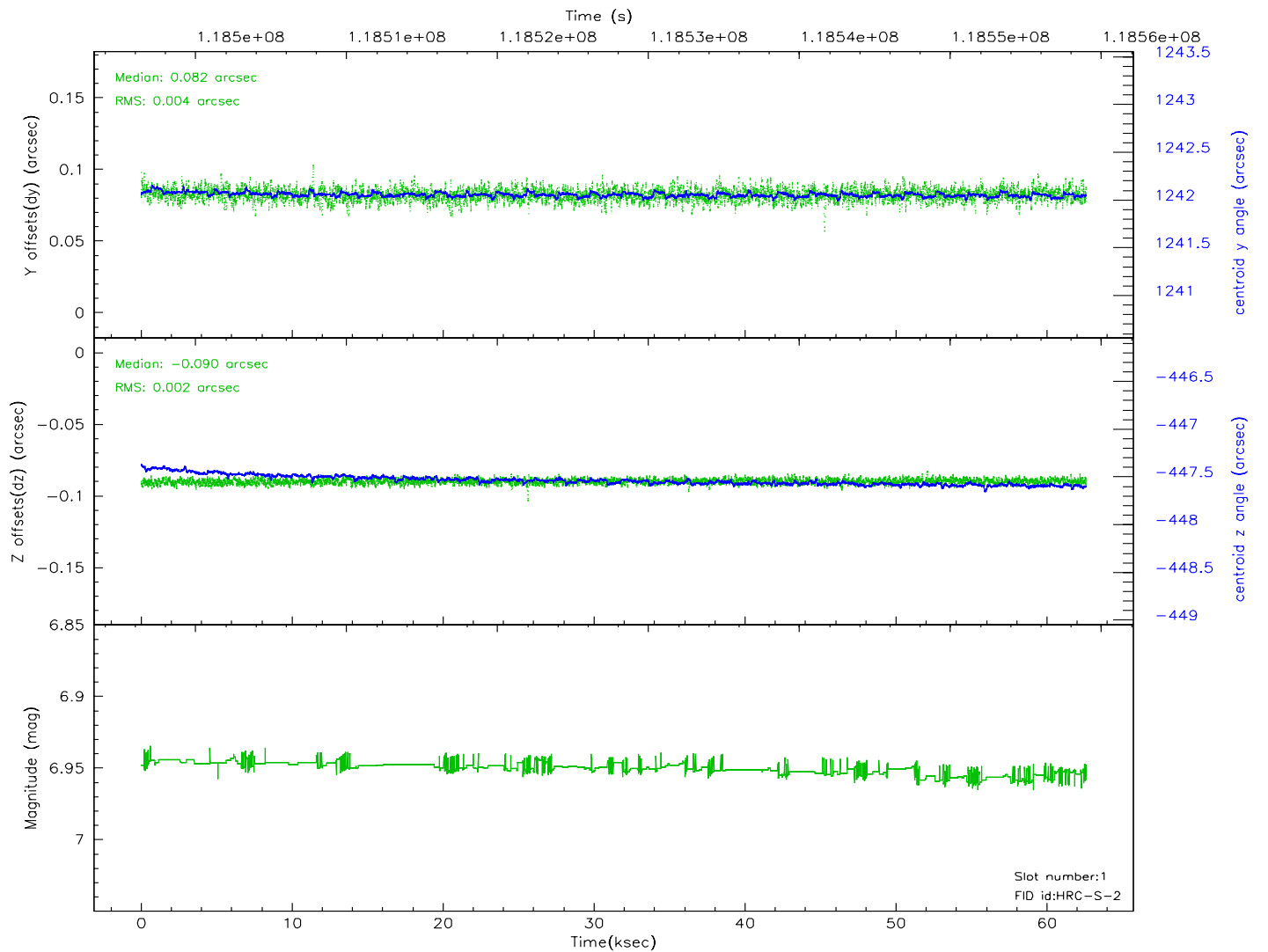
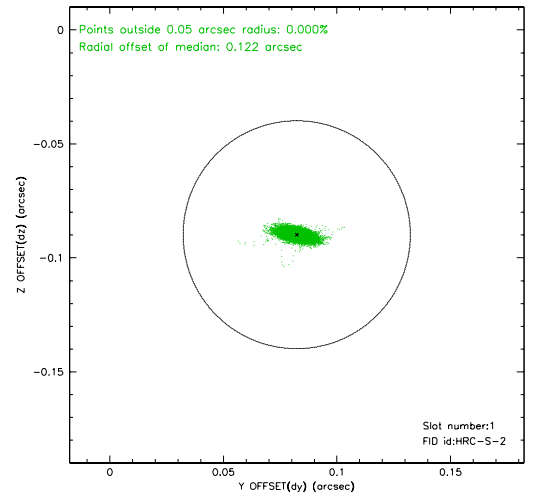
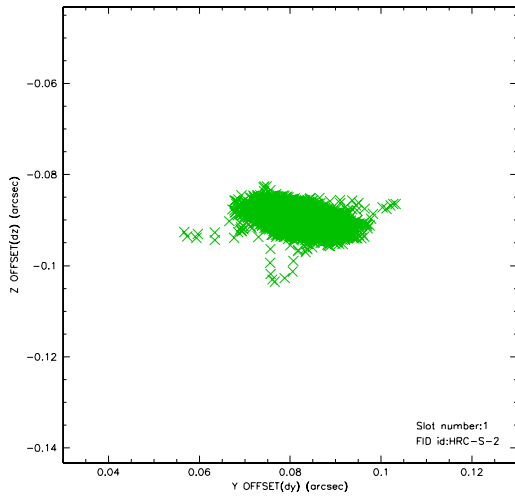


## 2.5 FID Slots

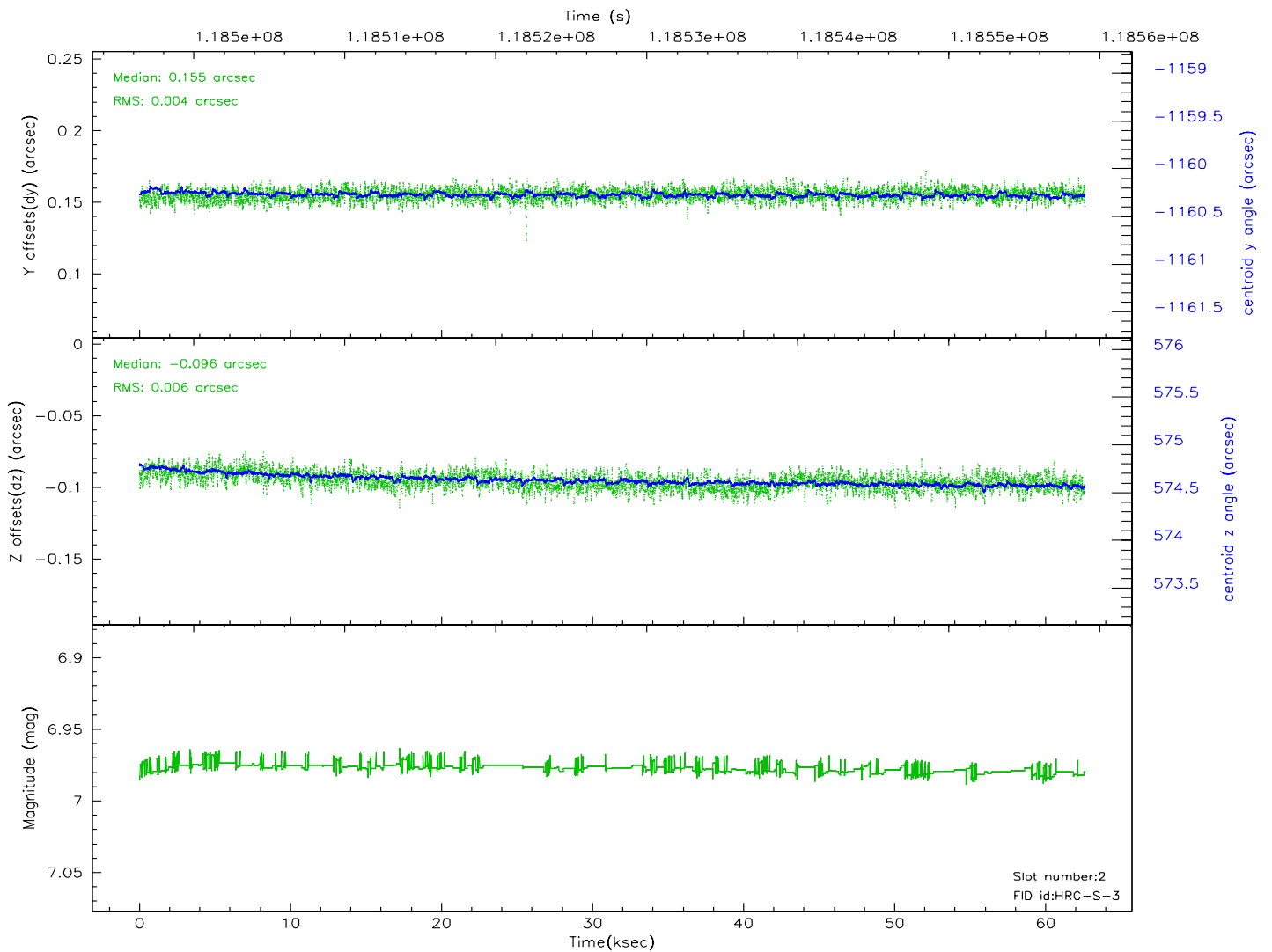
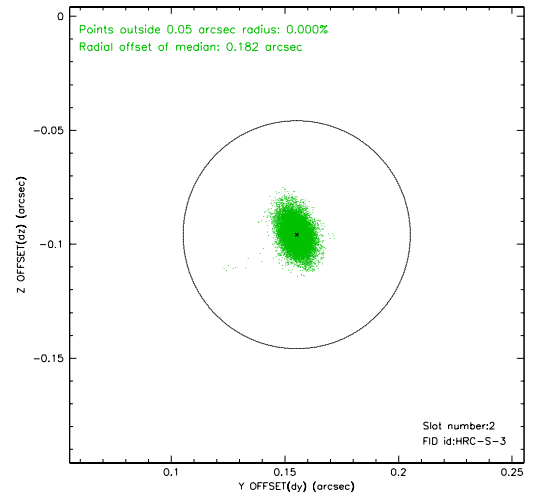
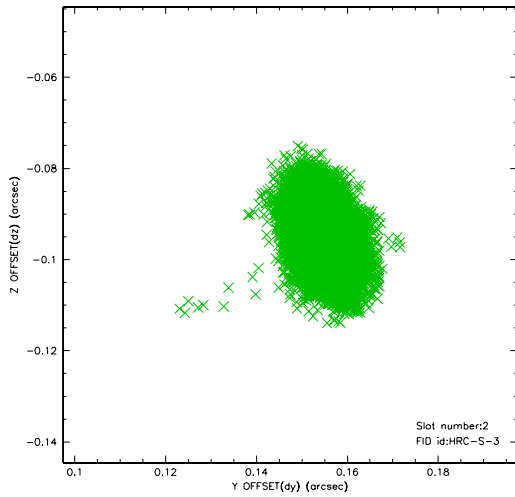
### 2.5.1 Slot 0



## 2.5.2 Slot 1

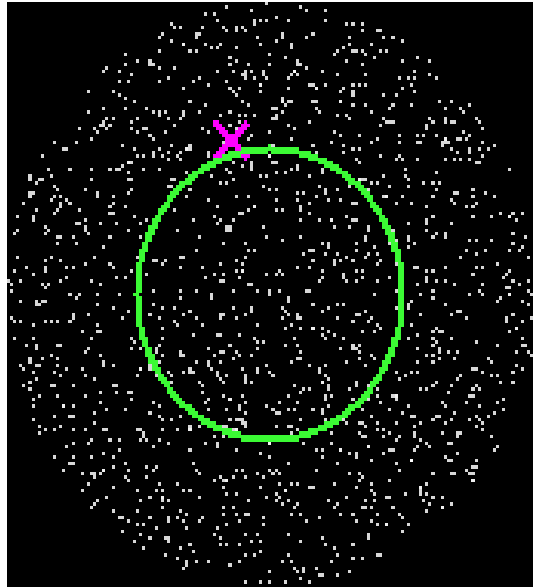


### 2.5.3 Slot 2



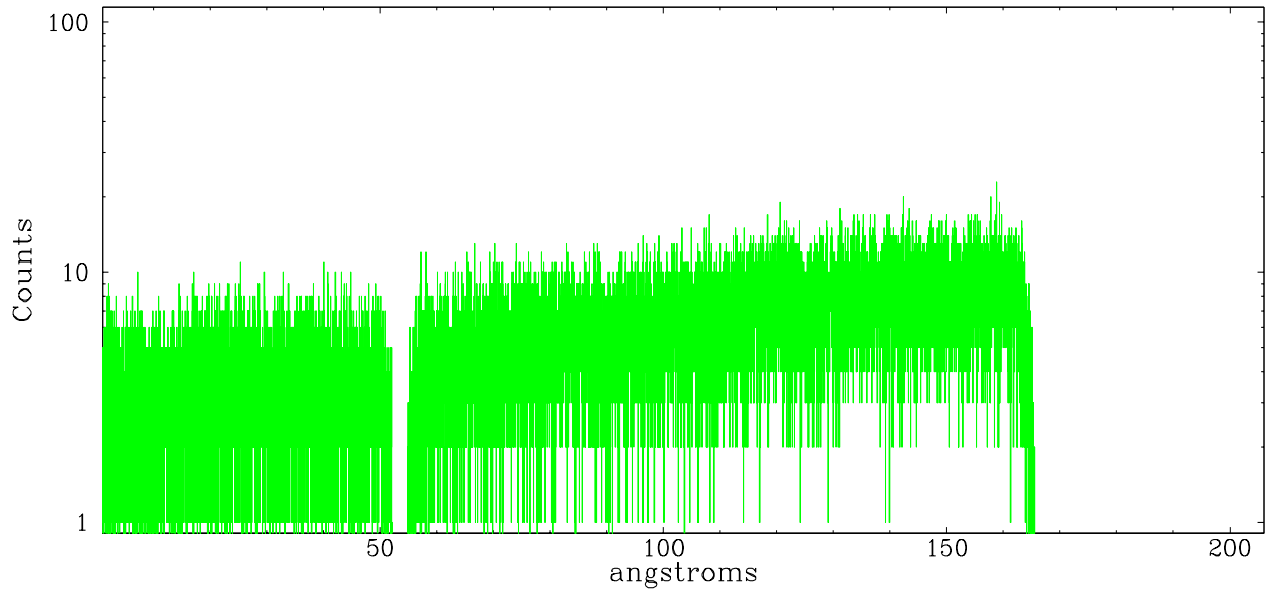
## 3 Gratings

### 3.1 LETG Arm

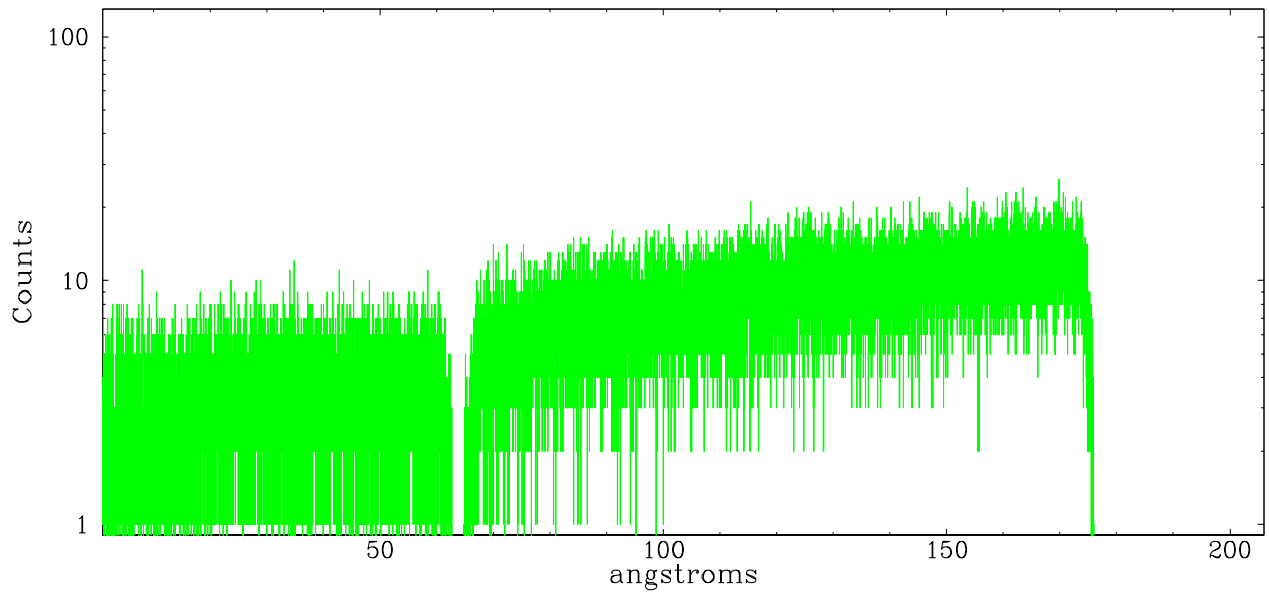


LETG Zero Order

leg order -1



leg order +1



# A Summary

## A.1 Status

V&V Scientist	Joy Nichols
V&V Date (YYYY-MM-DD)	2007.02.01
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	62.313

## A.2 Comments

Source not detected. Zeroth order position defaulted to the coordinates given by the observer. Large variations in count rate during this observation are likely the result of a high radiation environment.