

# V&V Reference Report

## L2 ASCDS Version : 10.9.2

Observation 20700 - L2 Version 2  
Chandra X-Ray Center

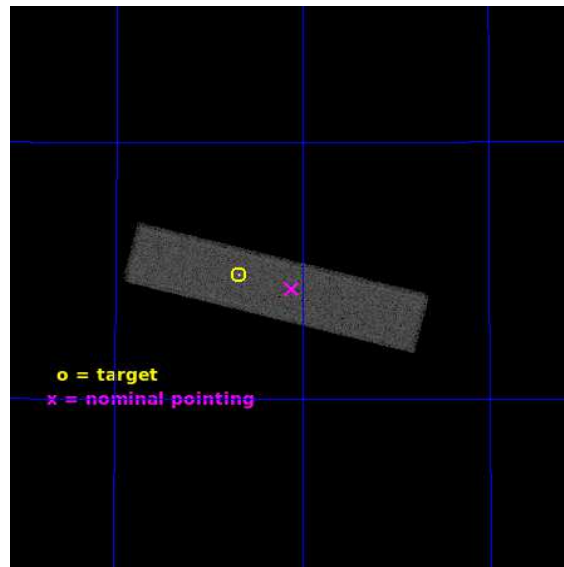
L2 Processing Date : Oct 27 2020

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# 1 Front

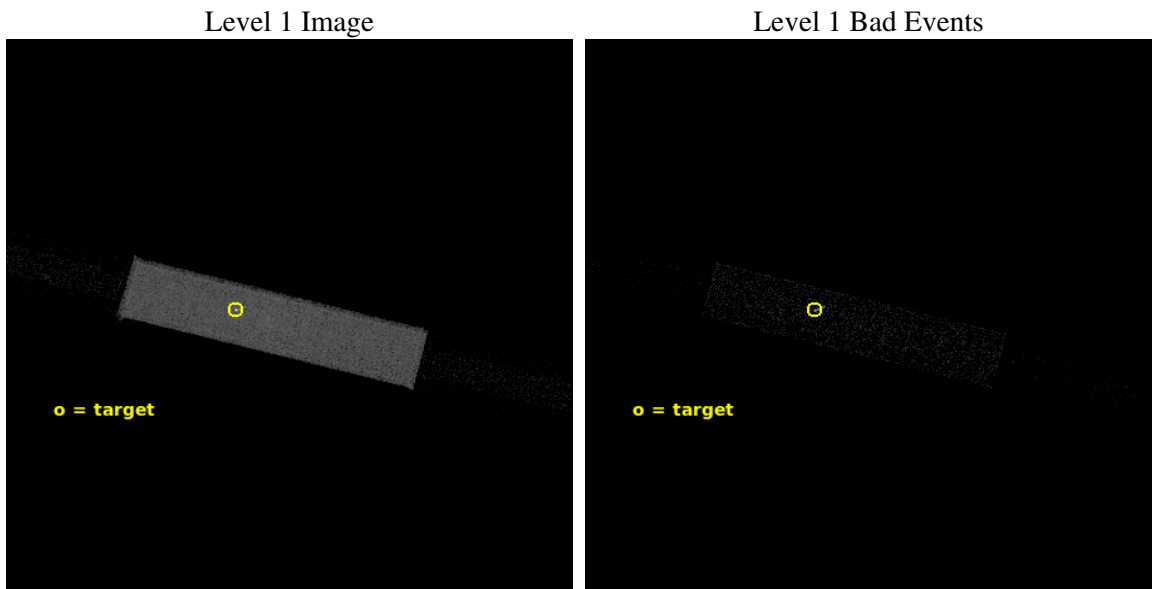
seq_num	291411	Sequence number
obs_id	20700	Observation id
title	AO-19 Calibration Observations to Monitor the Spatial Variations in the HRC-S Gain	Proposal title
observer	CXC Calibration	Principal investigator
object	ArLac	Source name
ra_targ	332.17	Observer's specified target RA [deg]
dec_targ	45.742306	Observer's specified target Dec [deg]
ra_nom	332.02716337252	Nominal RA [deg]
dec_nom	45.715442712975	Nominal Dec [deg]
roll_nom	194.39995282179	Nominal Roll [deg]
revision	2	Processing version of data
ontime	1171.8313196898	[s]
livetime	1161.7431895661	Ontime multiplied by DTCOR
l2events	78077	Number of level 2 events



## 2 OBI

### 2.1 OBI

#### 2.1.1 Images



### 2.1.2 Parameters

obi_num	0	Obi number	sched_exp_time	1000.000000	[s] Scheduled observation exposure time
ascdsver	10.9.2	Processing system revision	ontime	1171.8313196898	[s]
caldbver	4.9.3	&#160	l1events	117996	Number of level 1 events
date	2020-10-27T16:49:06	Date and time of file creation			
revision	2	Processing version of data			

### 2.1.3 Events

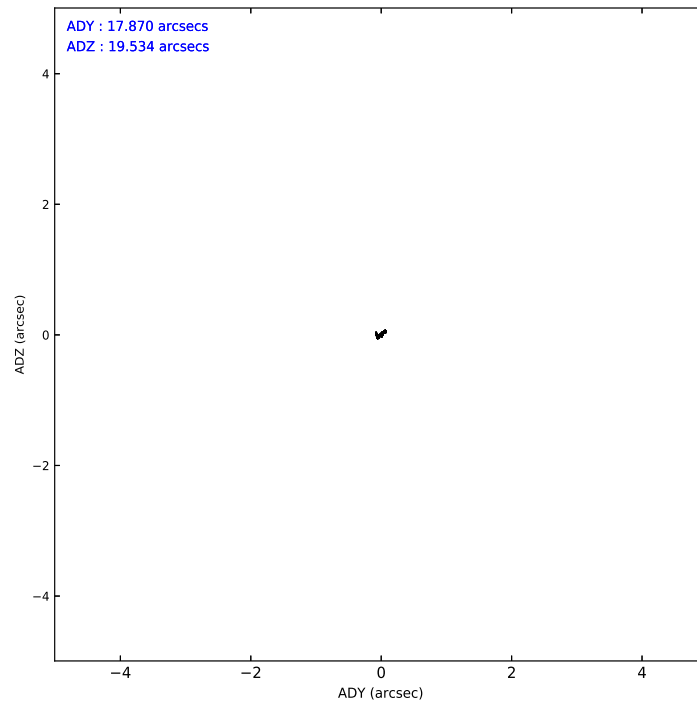
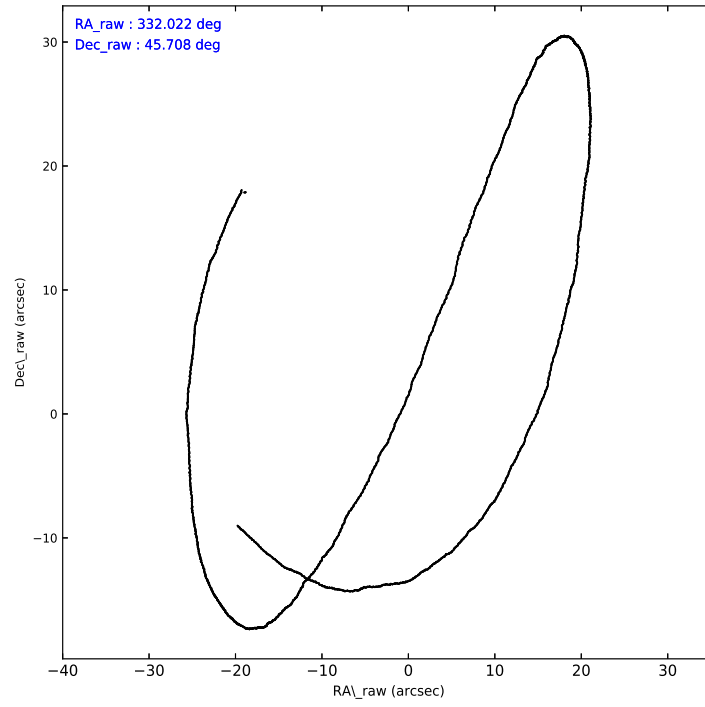
Level 1 Events

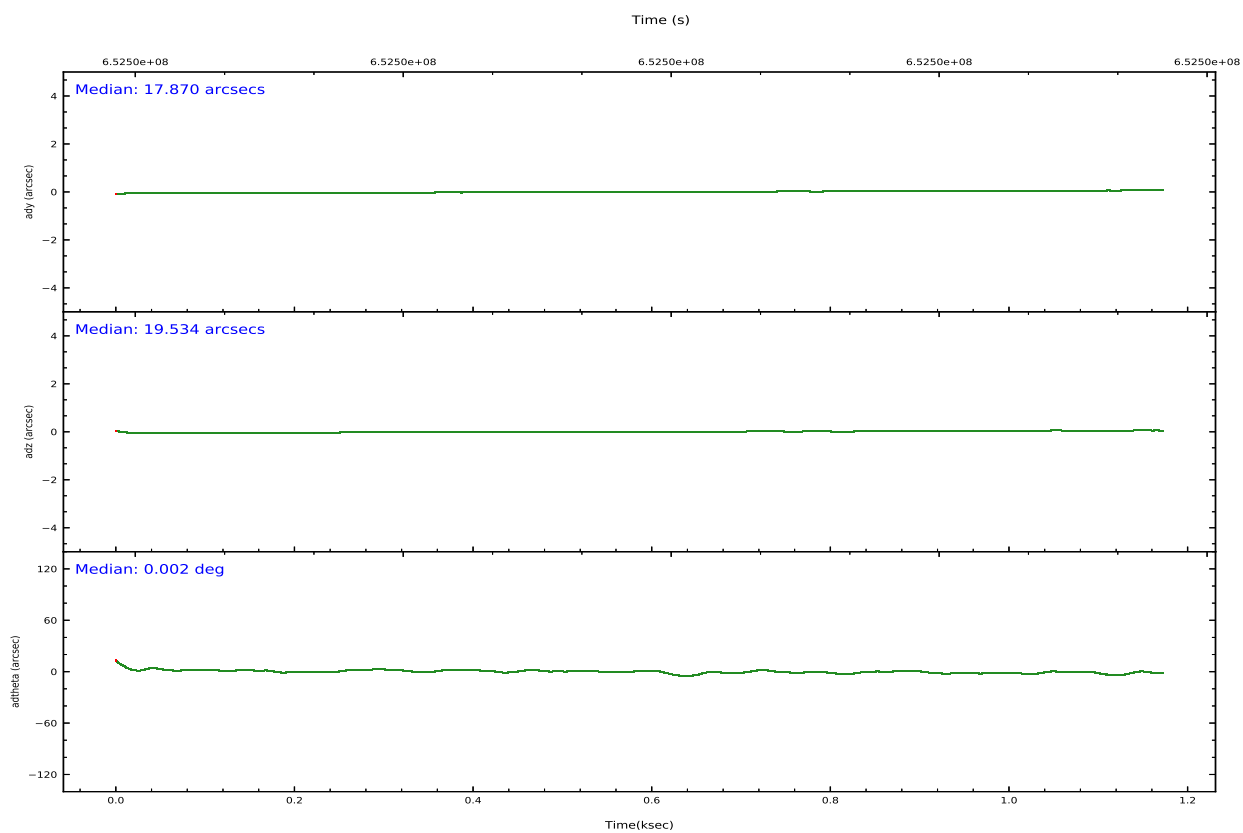
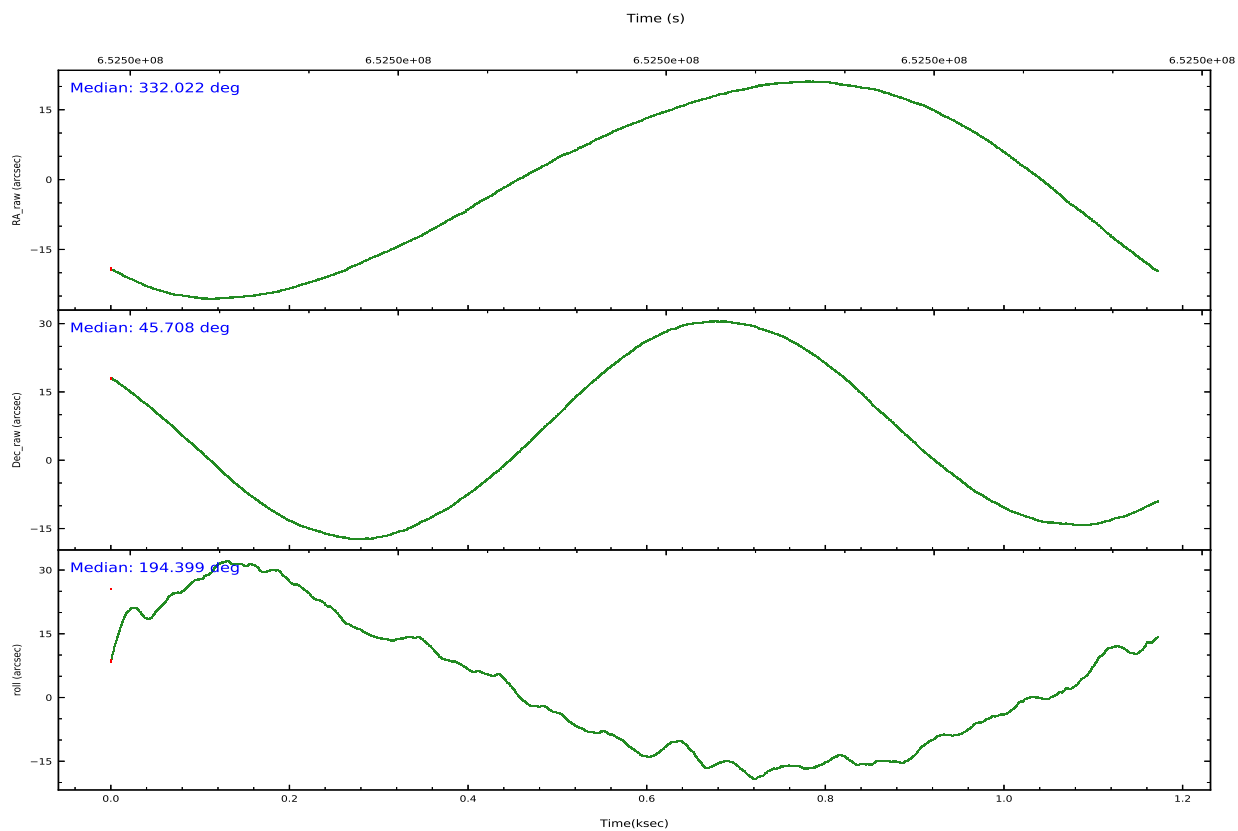
	segment 1	segment 2	segment 3
level 1 events	1071	115943	982
rejected events	1071	25134	982
rejected %	100%	21%	100%

## 2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	HRC	HRC	Obspar version number	8	8
Detector	HRC-S	HRC-S	Obspar file type	PREDICTED	ACTUAL
Grating	NONE	NONE	Obspar update status	NONE	UPDATED
Data mode	OBSERVING	OBSERVING			
Observation mode	POINTING	POINTING			
[deg] Pointing RA	332.050128	332.02716337252			
[deg] Pointing Dec	45.730828	45.715442712975			
[deg] Pointing Roll	194.320718	194.39995282179			
[mm] SIM focus pos	-1.533336	-1.526339935833849			
[mm] SIM defocus	7.710433287538843e-07	0.006996703570447904			
[mm] SIM translation stage pos	250.455976	250.466033080201			
[mm] SIM translation stage offset	0	-0.01005468664627074			
[s] Observation start time (MET)	652502051.184000	652501674.8385			
Observation start date	2018-09-05T02:33:02	2018-09-05T02:27:54			
[s] Observation end time (MET)	652503051.184000	652503185.17609			
Observation end date	2018-09-05T02:49:42	2018-09-05T02:53:05			

## 2.3 Aspect





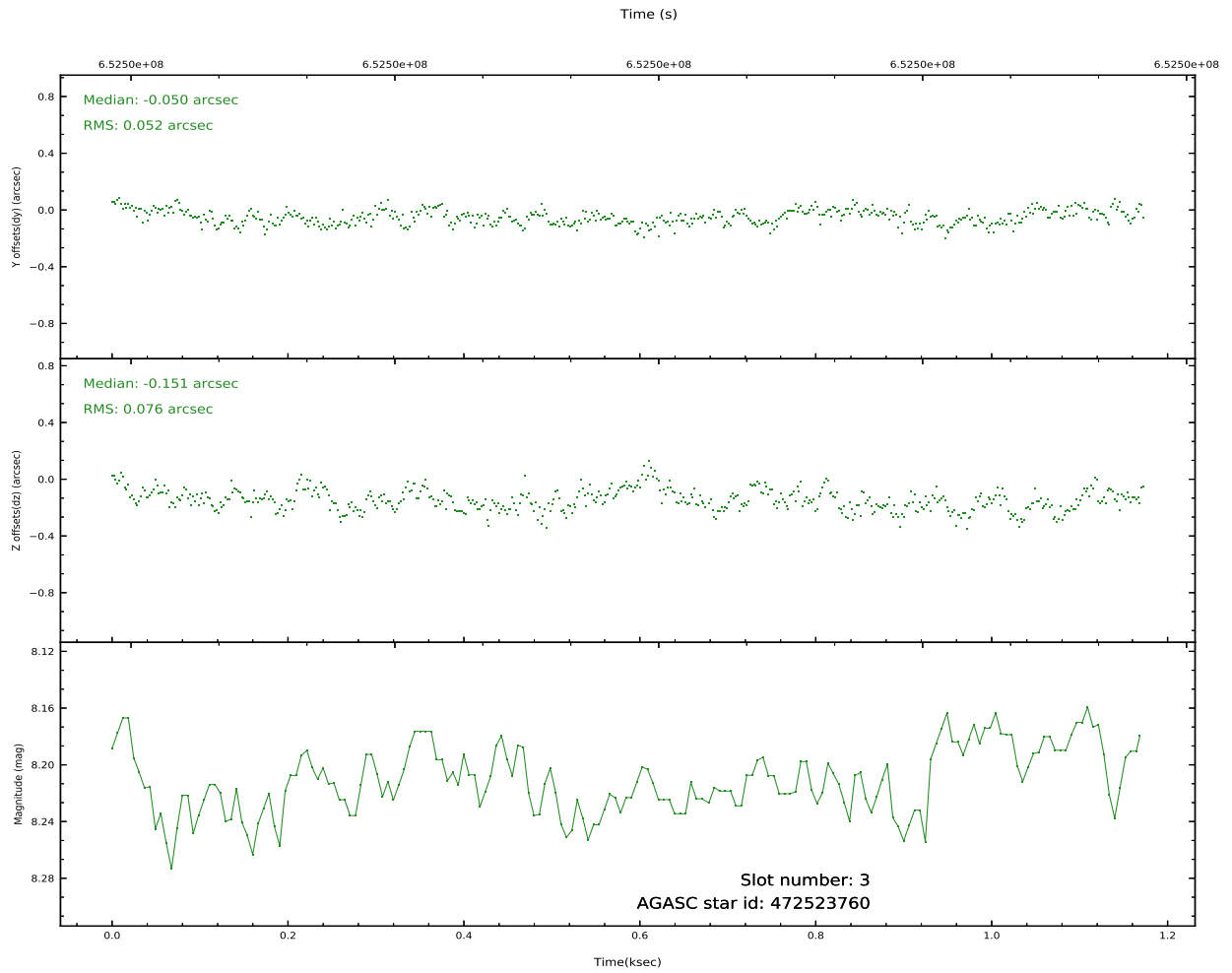
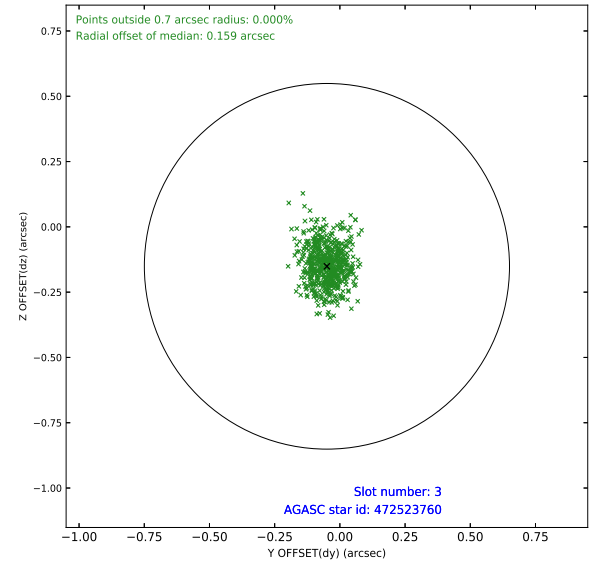
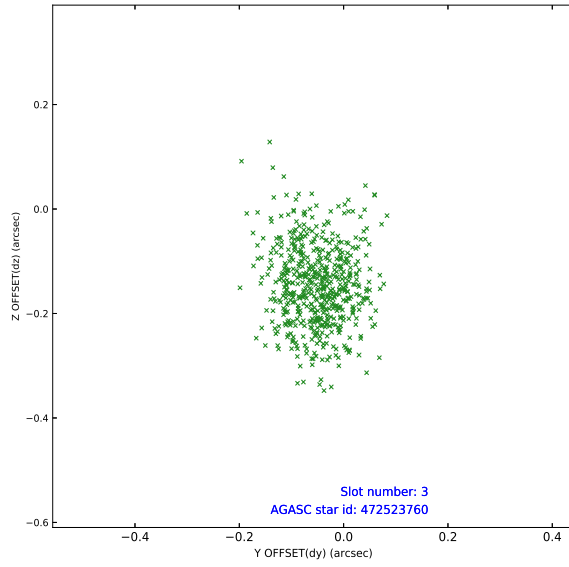
Slot Statistics

pt	status	used	id	mag	n_pts	frac_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mea
0	FID		HRC-S-1	7.05	287	1.000	0.097	-0.294	0.007	0.012	0.000000	0.000000	-1172.36	-468
1	FID		HRC-S-3	7.03	287	1.000	0.056	0.082	0.009	0.017	0.000000	0.000000	-1179.11	559
2	FID		HRC-S-4	7.01	287	1.000	0.235	-0.086	0.005	0.011	0.000000	0.000000	1222.00	565
3	GUIDE	used	472523760	8.21	572	1.000	-0.050	-0.151	0.095	0.162	331.645363	45.403260	1281.79	883
4	GUIDE	used	472527720	6.98	573	1.000	-0.228	-0.131	0.115	0.186	331.460205	45.112509	2002.44	1779
5	GUIDE	used	472535576	7.82	573	1.000	-0.024	0.069	0.129	0.201	331.438373	46.291802	976.67	-2338
6	GUIDE	used	472533912	9.12	573	1.000	0.046	0.023	0.158	0.270	331.791136	46.368695	56.55	-2392
7	GUIDE	used	472665256	8.95	572	1.000	0.263	0.187	0.112	0.185	332.808125	46.195041	-2245.85	-1168

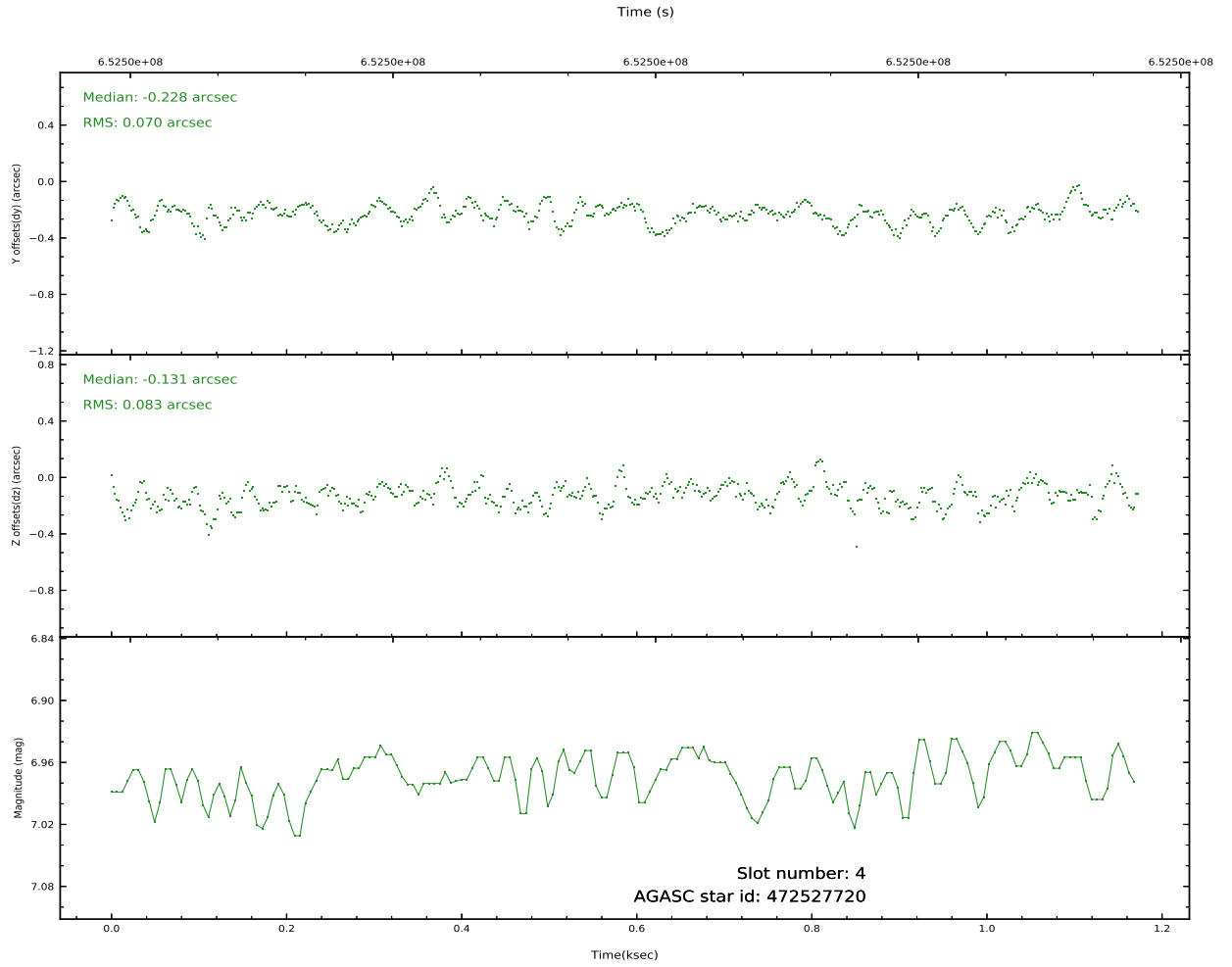
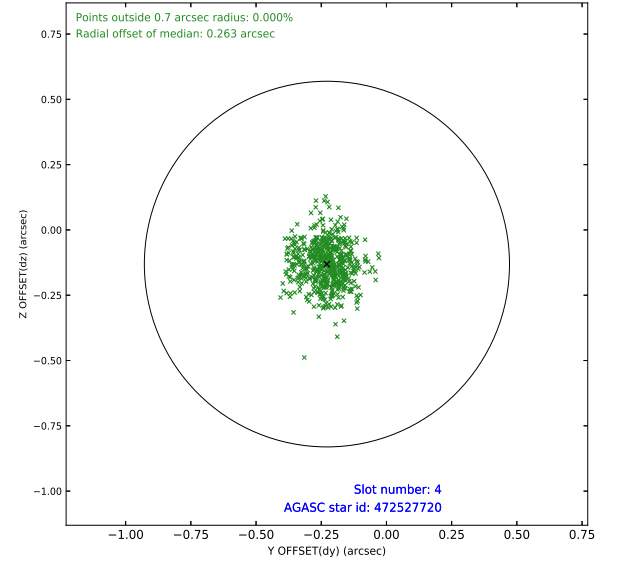
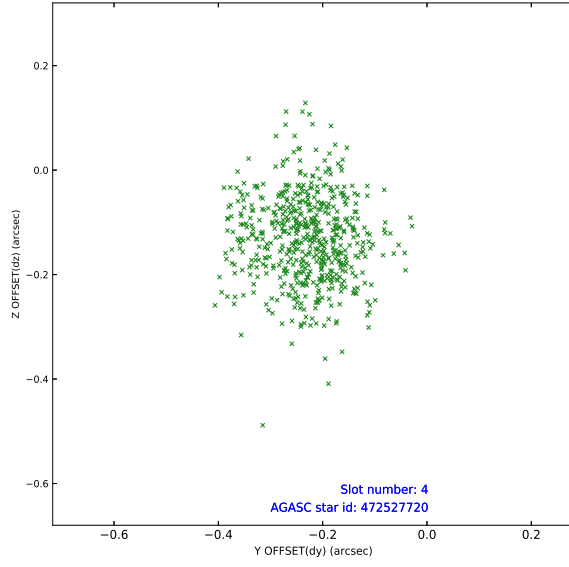


## 2.4 Star Slots

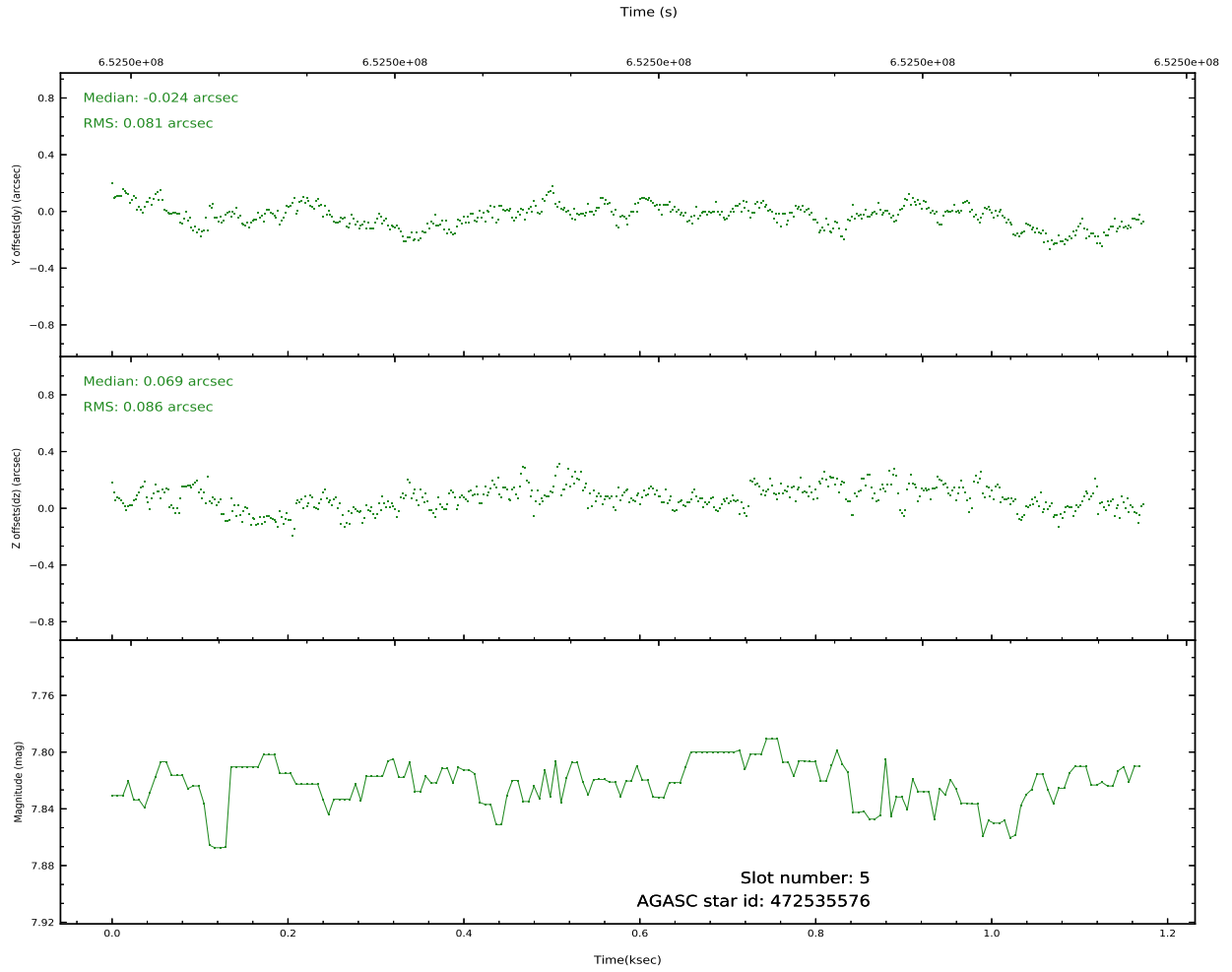
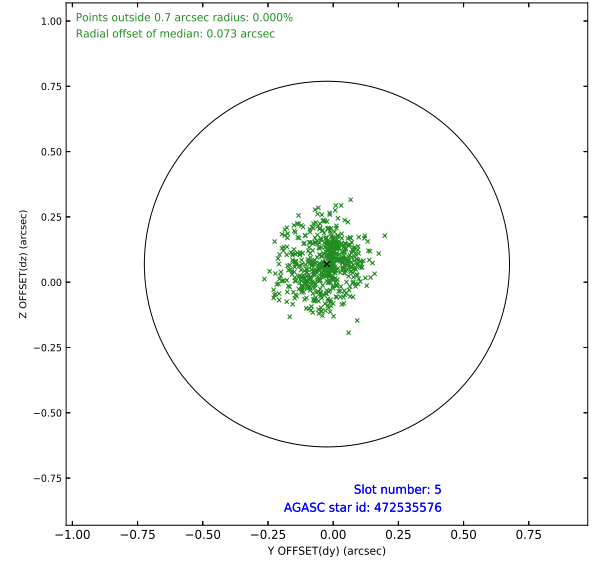
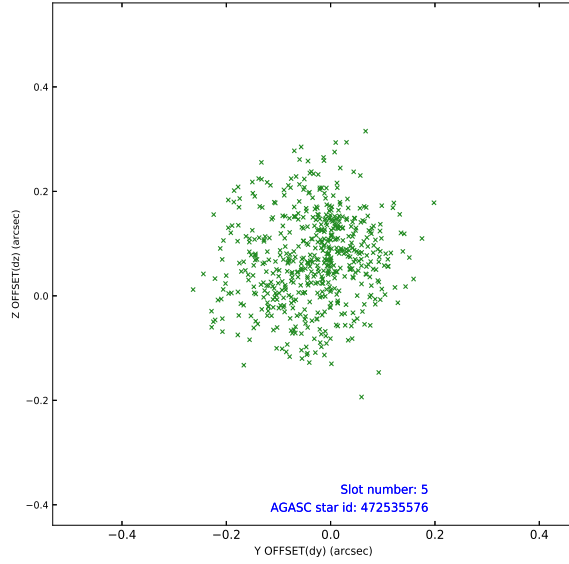
### 2.4.1 Slot 3



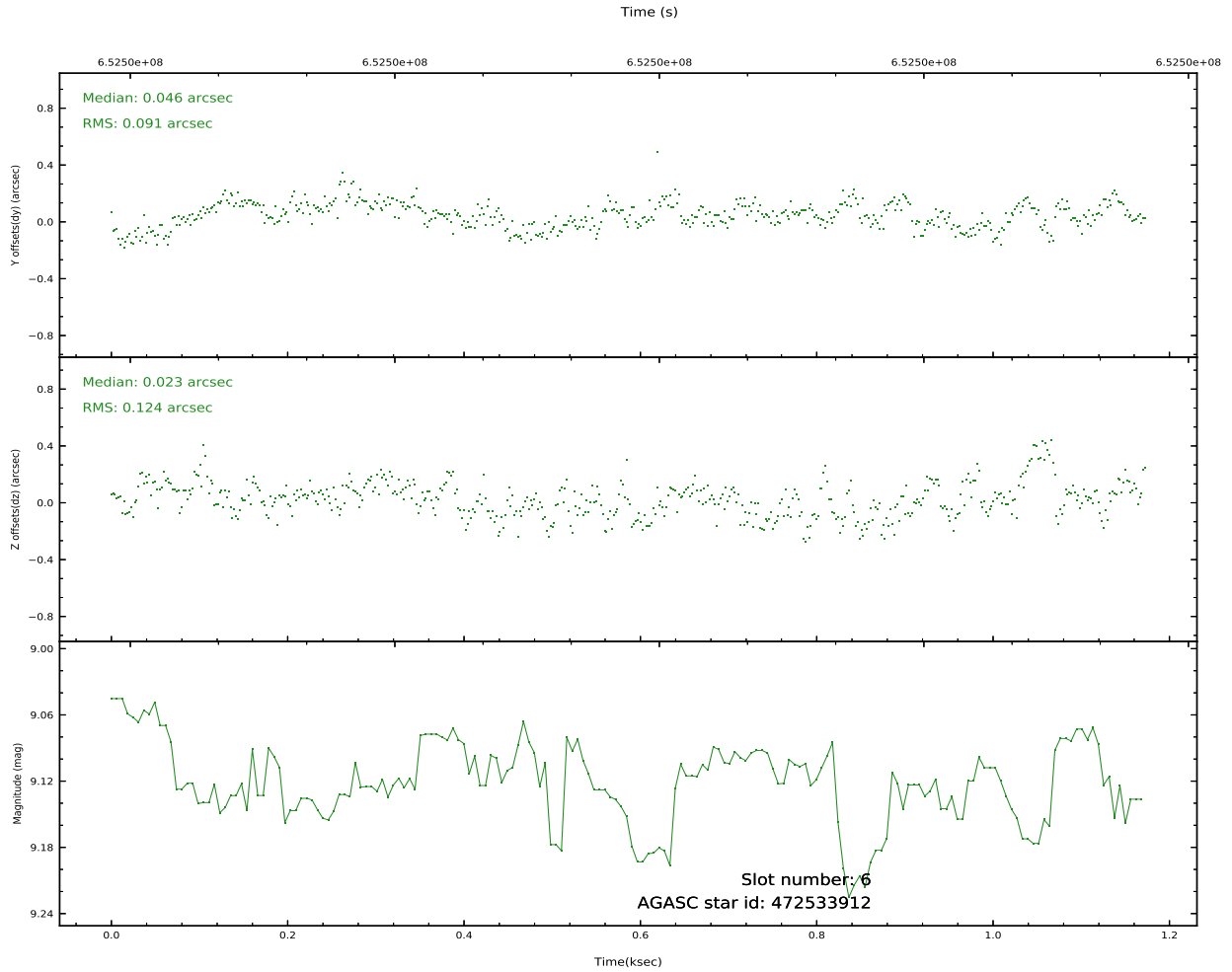
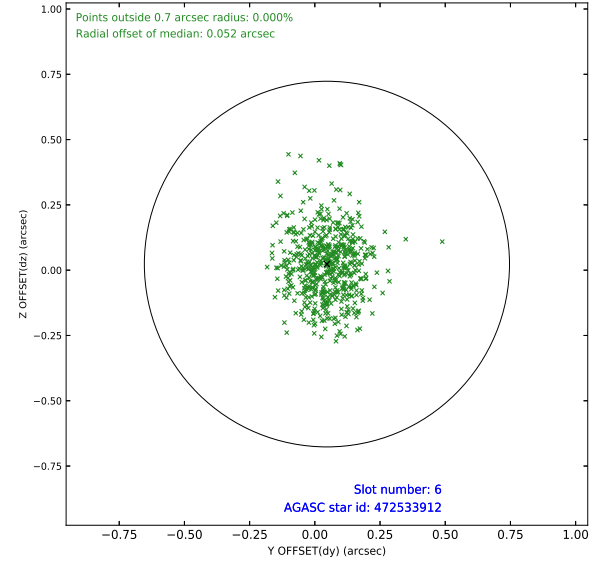
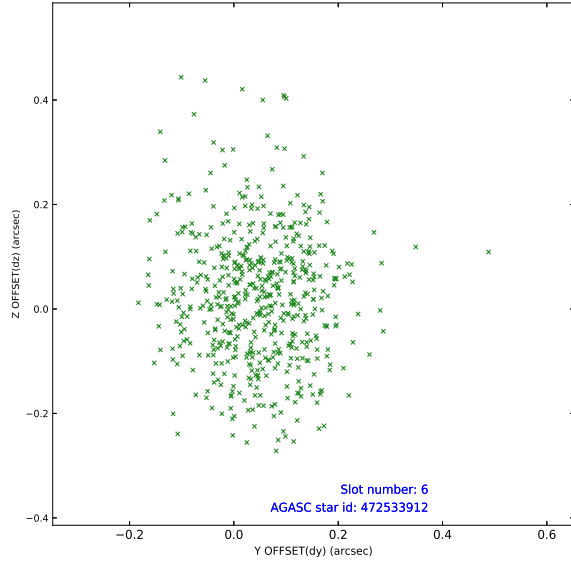
## 2.4.2 Slot 4



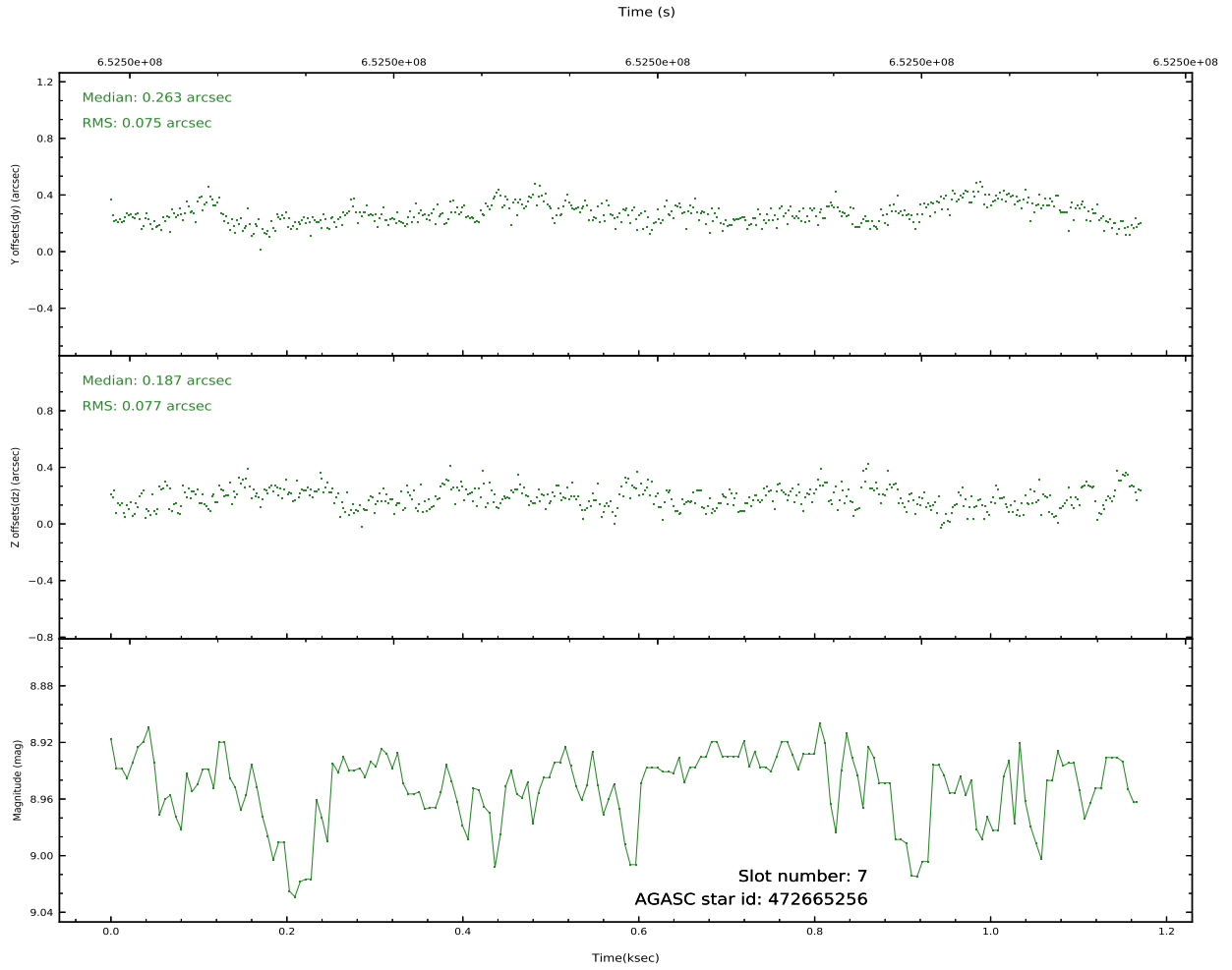
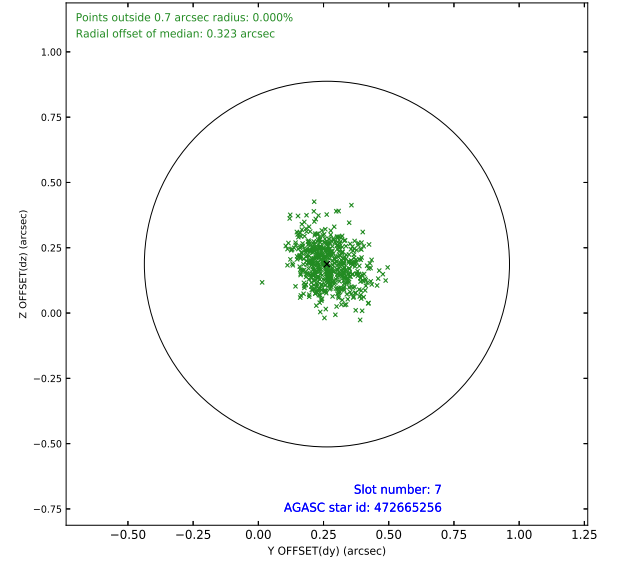
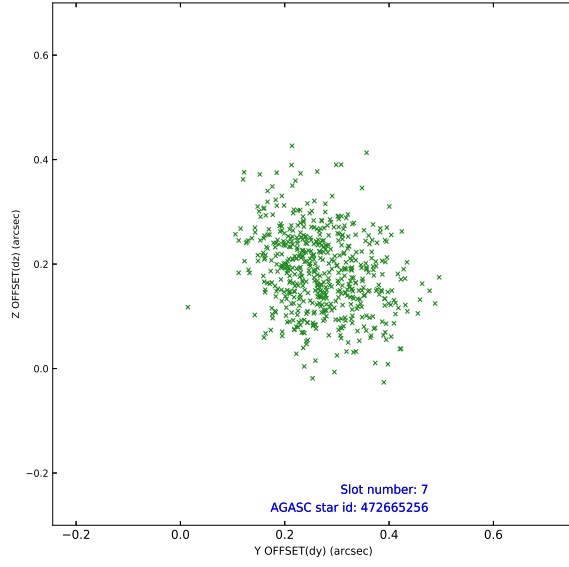
### 2.4.3 Slot 5



## 2.4.4 Slot 6

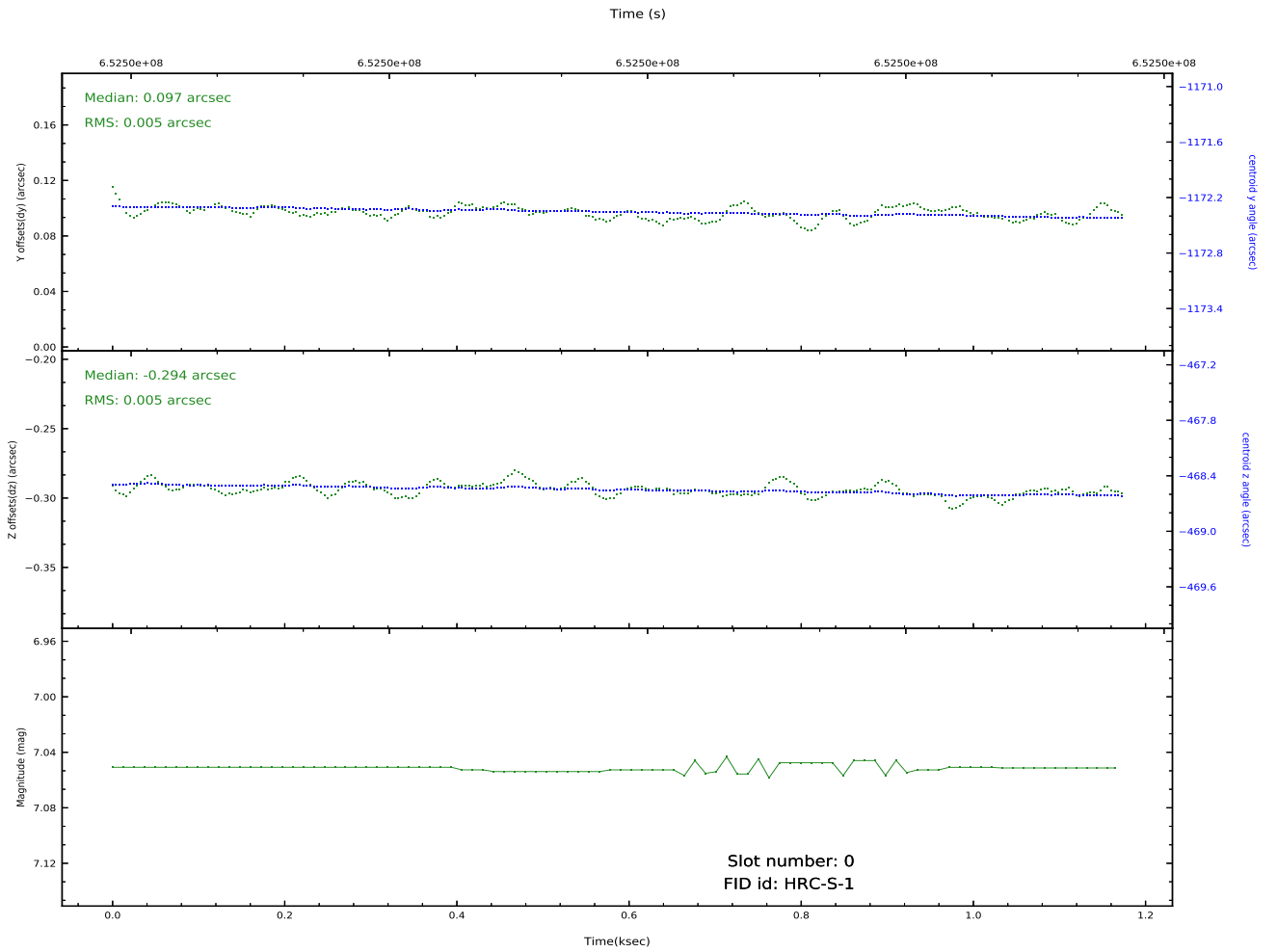
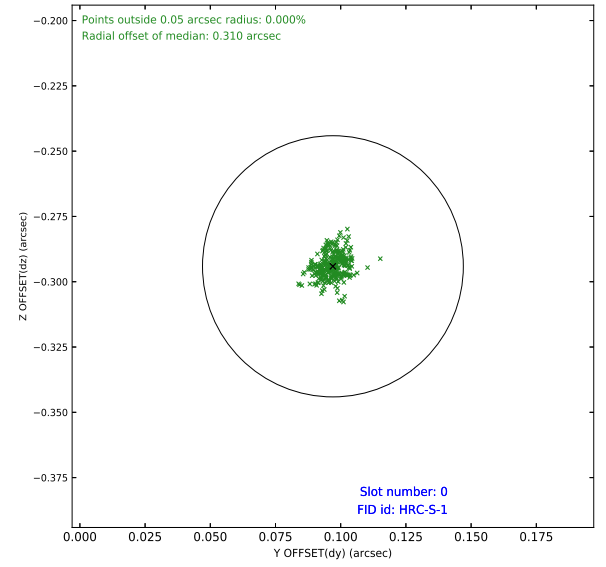
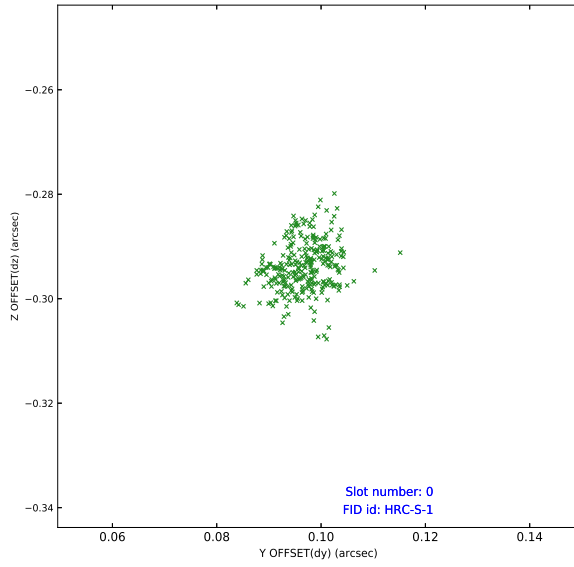


## 2.4.5 Slot 7

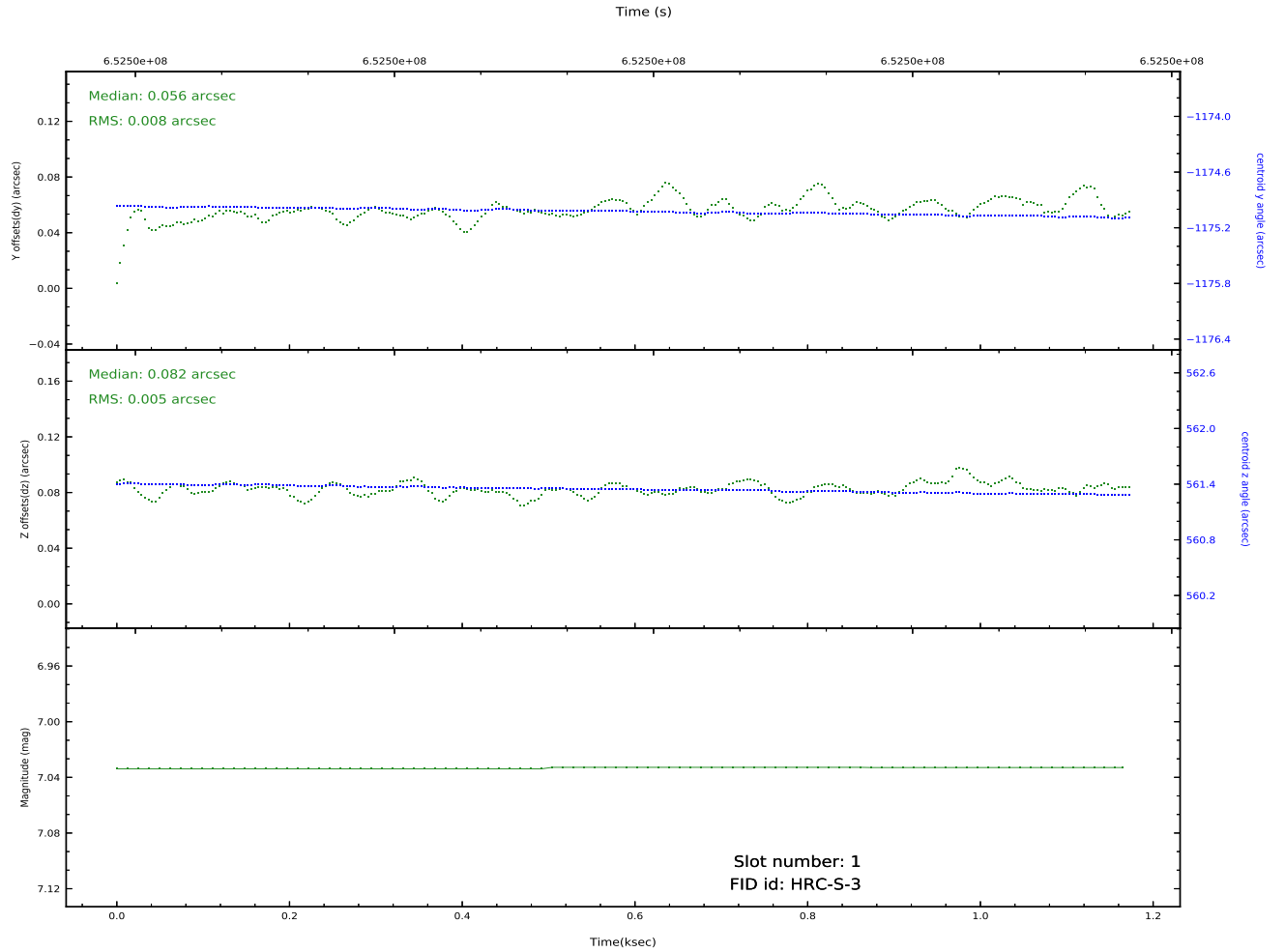
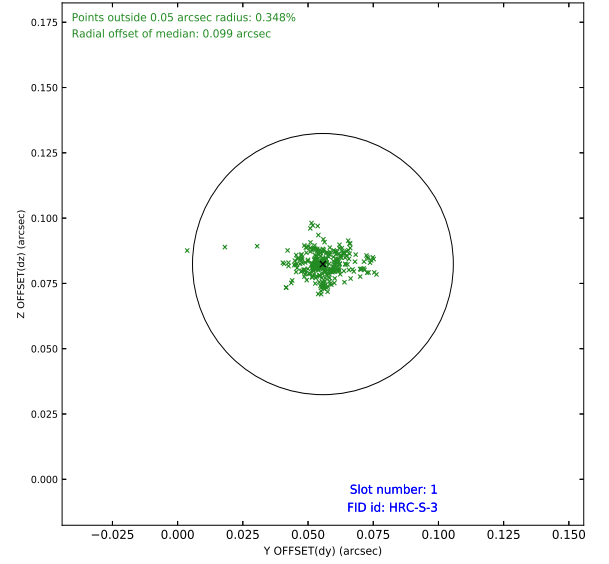
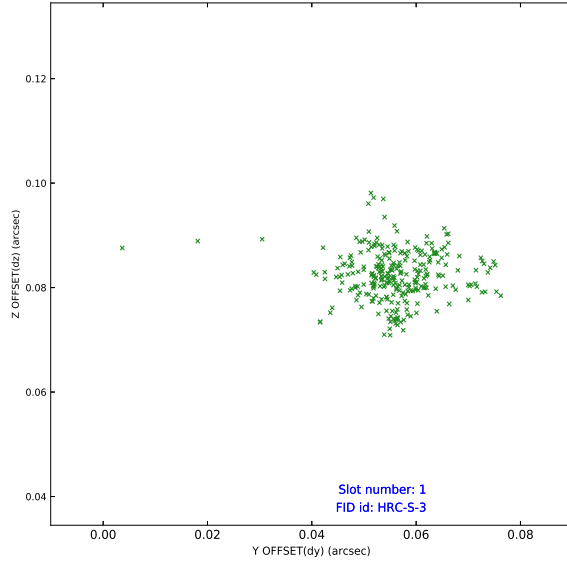


## 2.5 FID Slots

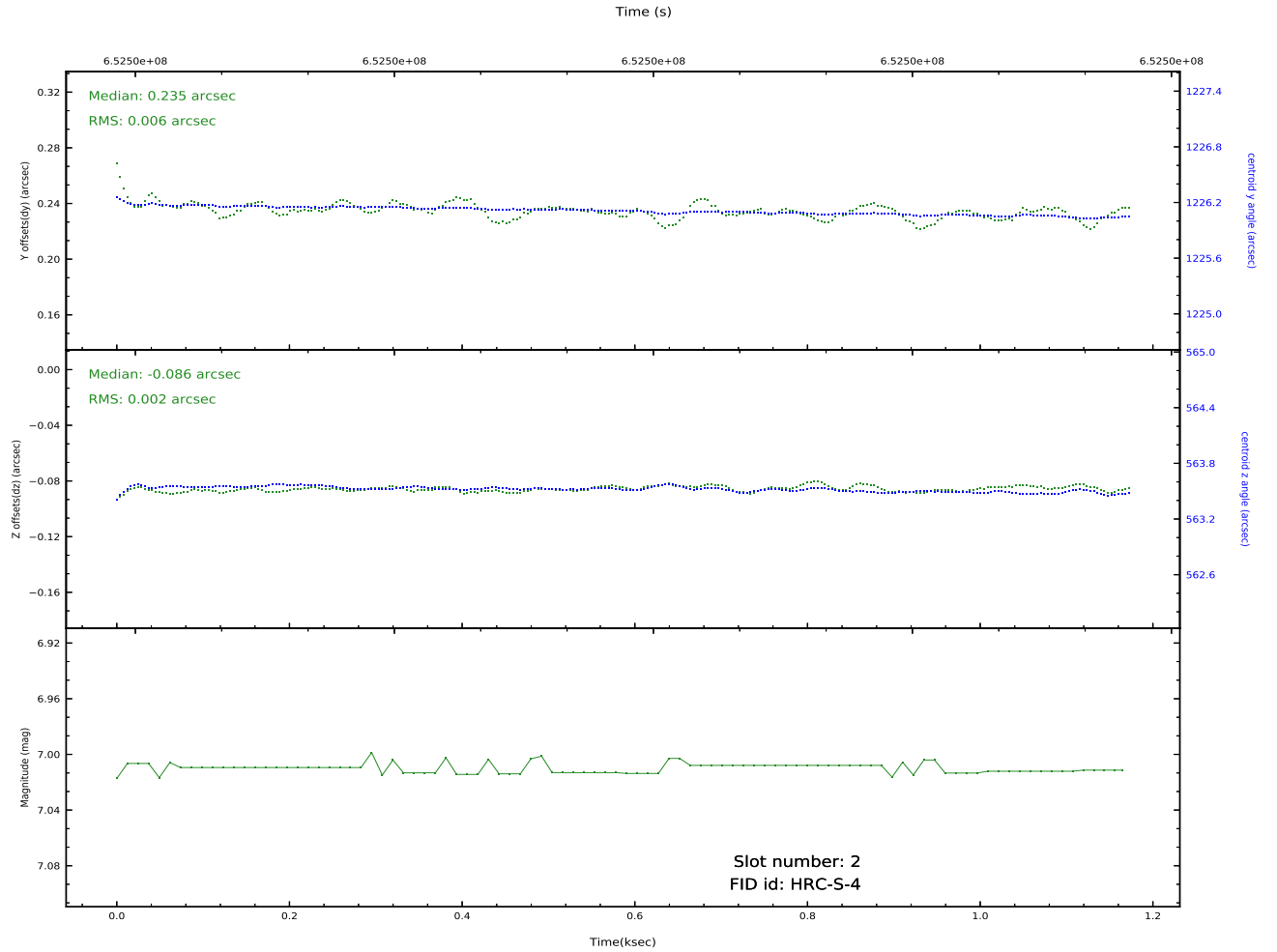
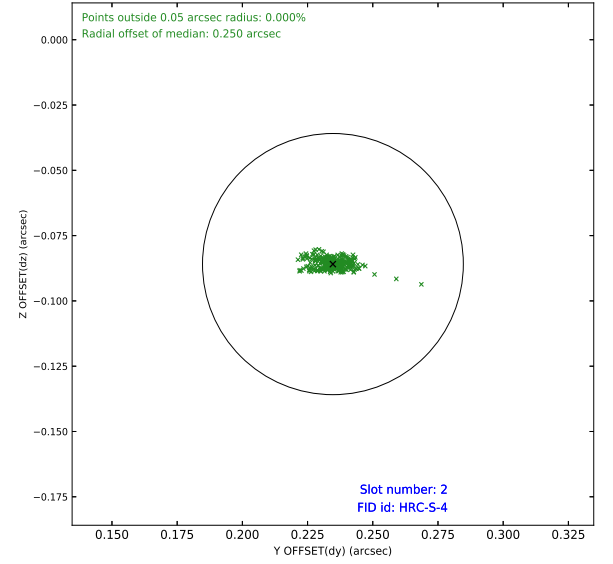
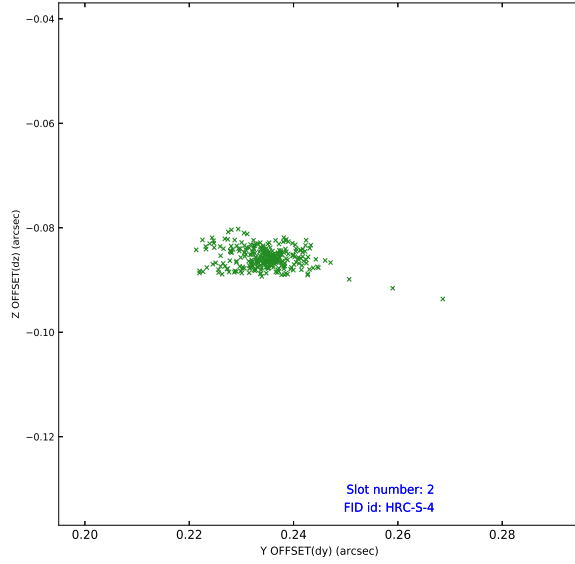
### 2.5.1 Slot 0



## 2.5.2 Slot 1



## 2.5.3 Slot 2





## A Summary

### A.1 Status

V&V Scientist	Jen Lauer
V&V Date (YYYY-MM-DD)	2020.10.28
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	1.1718313196898

### A.2 Comments