

V&V Reference Report

L2 ASCDS Version : 10.9.1

Observation 4575 - L2 Version 5
Chandra X-Ray Center

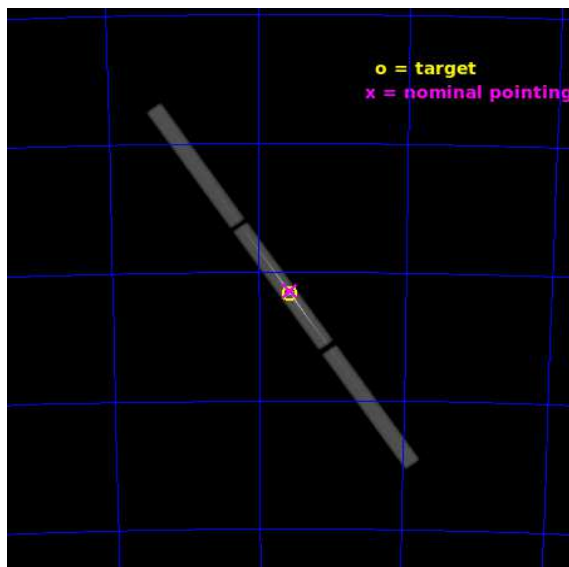
L2 Processing Date : Sep 25 2020

Contents

1	Front	2
2	OBI	3
2.1	OBI	3
2.1.1	Images	3
2.1.2	Parameters	4
2.1.3	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

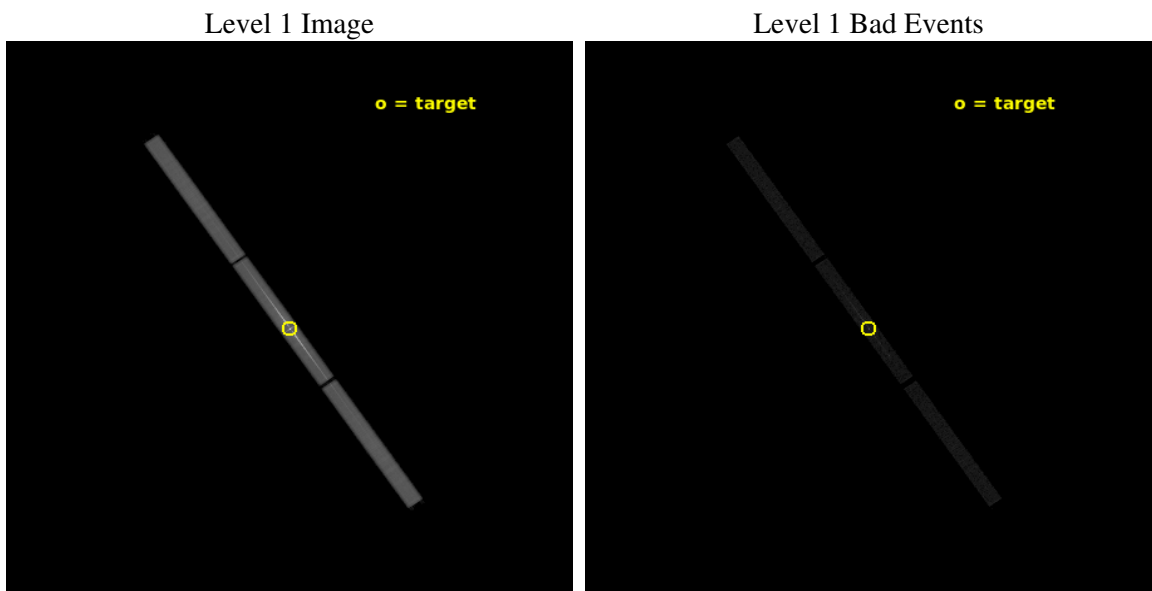
seq_num	400357	Sequence number
obs_id	4575	Observation id
title	High Resolution Spectroscopy of LMC X-3: Probing Local Hot X-ray Absorbing Gas	Proposal title
observer	Dr. Taotao Fang	Principal investigator
object	LMC X-3	Source name
ra_targ	84.734583	Observer's specified target RA [deg]
dec_targ	-64.084167	Observer's specified target Dec [deg]
ra_nom	84.743602841238	Nominal RA [deg]
dec_nom	-64.073866142146	Nominal Dec [deg]
roll_nom	235.06810283383	Nominal Roll [deg]
revision	5	Processing version of data
ontime	19831.957123727	[s]
livetime	19673.3037205	Ontime multiplied by DTCOR
l2events	1428724	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	20000.000000	[s] Scheduled observation exposure time
ascdsver	10.9.1	Processing system revision	ontime	19831.957123727	[s]
caldbver	4.9.2	 	l1events	1924505	Number of level 1 events
date	2020-09-25T08:57:41	Date and time of file creation	tgmethod	TGDETECT	Method used to create src1a file
revision	5	Processing version of data	zo_pos	(32860.21, 32485.25)	src1a sky pixel position

2.1.3 Events

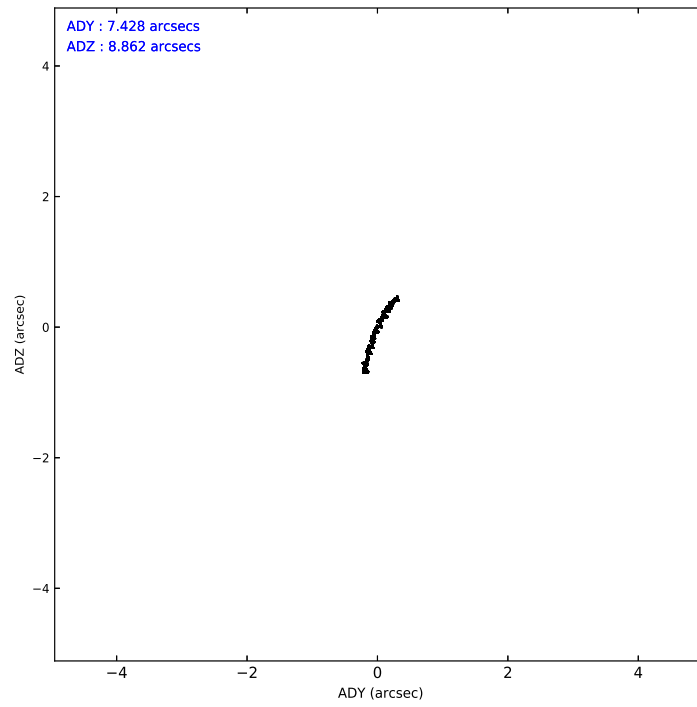
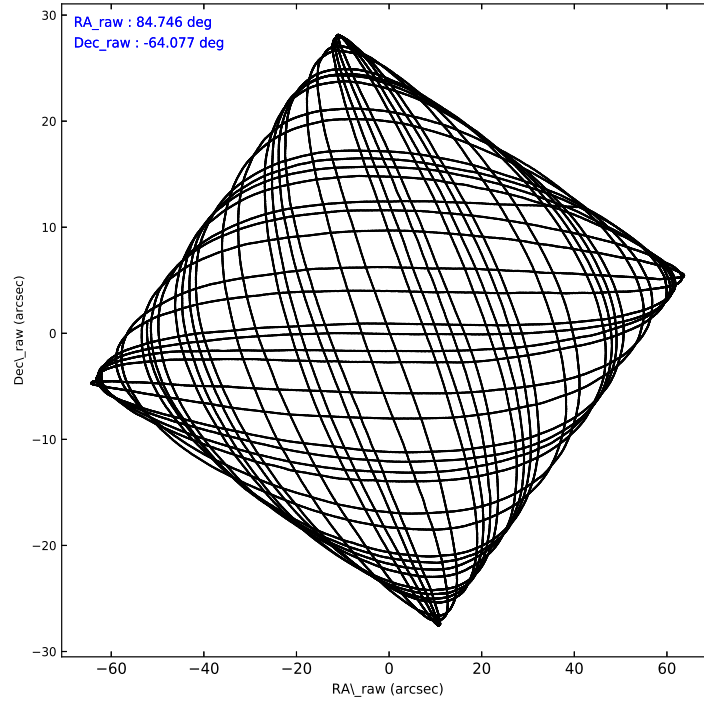
Level 1 Events

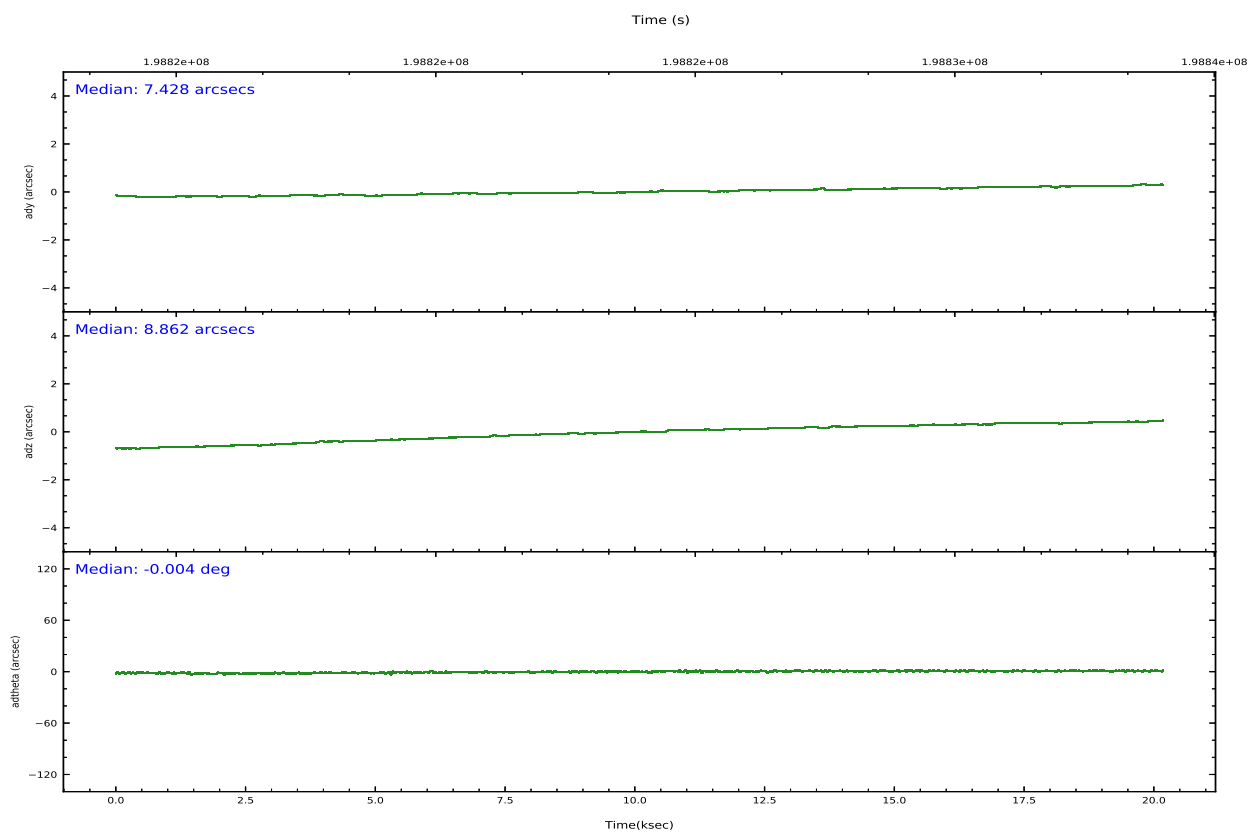
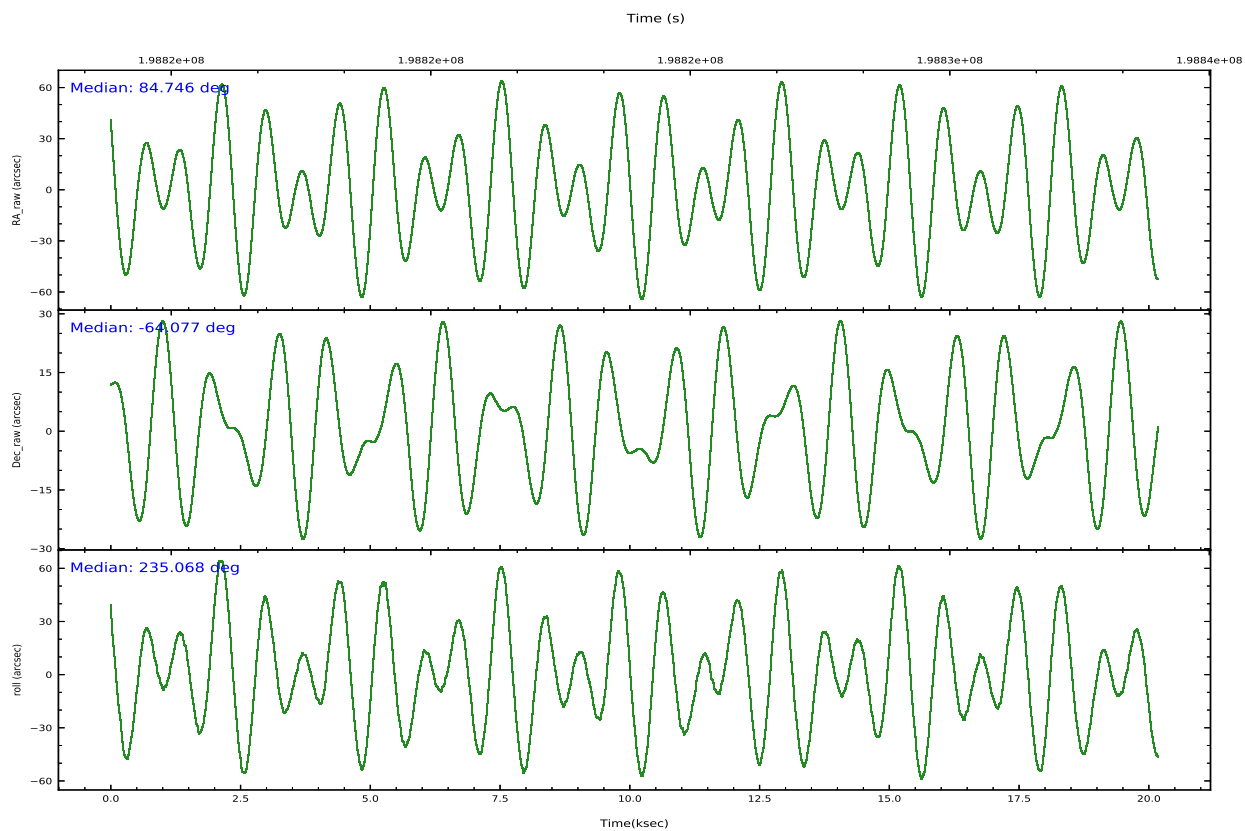
	segment 1	segment 2	segment 3
level 1 events	510500	896472	517533
rejected events	29758	31539	29639
rejected %	5%	3%	5%

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	LETG	LETG	Obspar update status	NONE	UPDATED
Data mode	OBSERVING	OBSERVING			
Observation mode	POINTING	POINTING			
[deg] Pointing RA	84.748080	84.743602841238			
[deg] Pointing Dec	-64.048419	-64.073866142146			
[deg] Pointing Roll	235.006003	235.06810283383			
[mm] SIM focus pos	-1.429586	-1.428180813131781			
[mm] SIM defocus	0.1037507710433287	0.1051558262725154			
[mm] SIM translation stage pos	249.967976	249.9656843351905			
[mm] SIM translation stage offset	0.488	0.4902940583641566			
[s] Observation start time (MET)	198814014.184000	198813127.03941			
Observation start date	2004-04-20T02:05:50	2004-04-20T01:52:07			
[s] Observation end time (MET)	198834014.184000	198835461.27789			
Observation end date	2004-04-20T07:39:10	2004-04-20T08:04:21			

2.3 Aspect



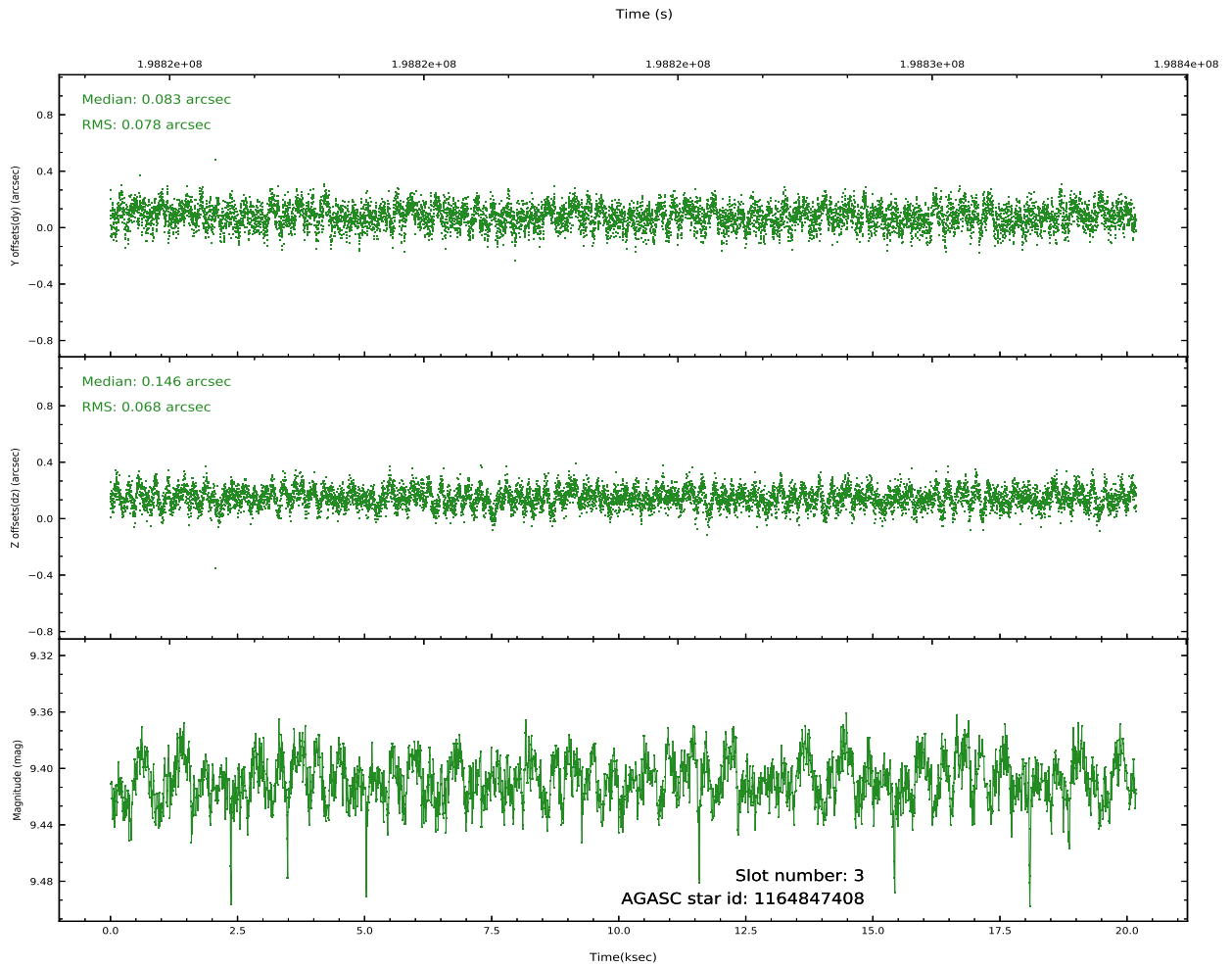
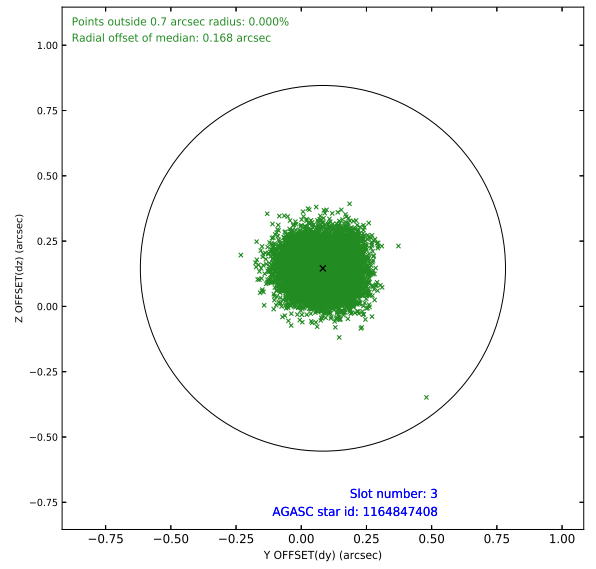
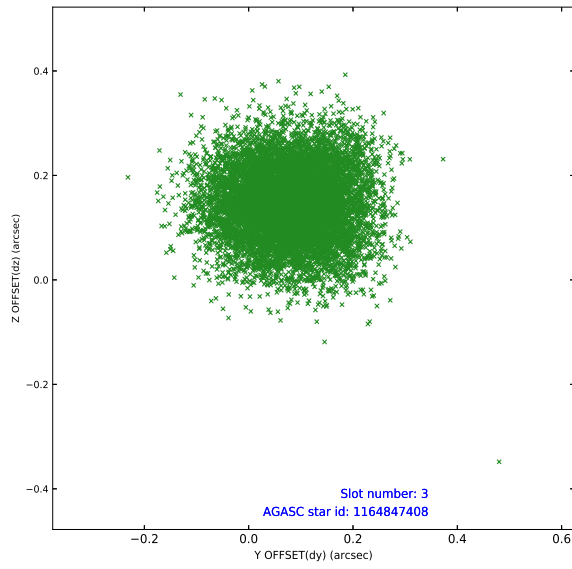


Slot Statistics

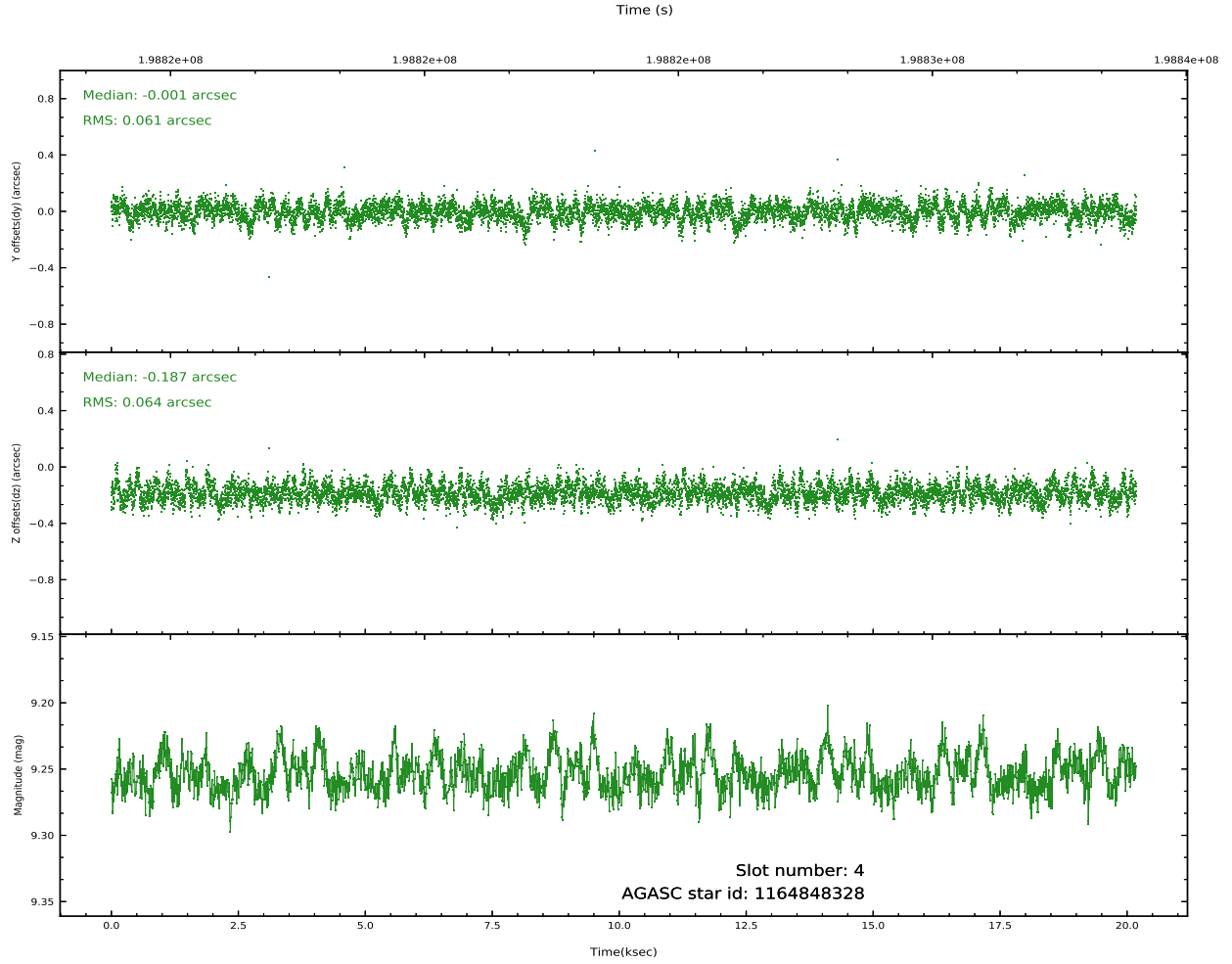
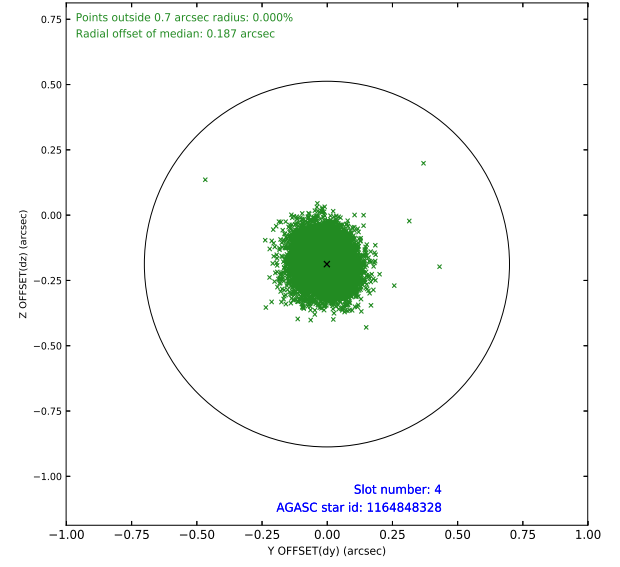
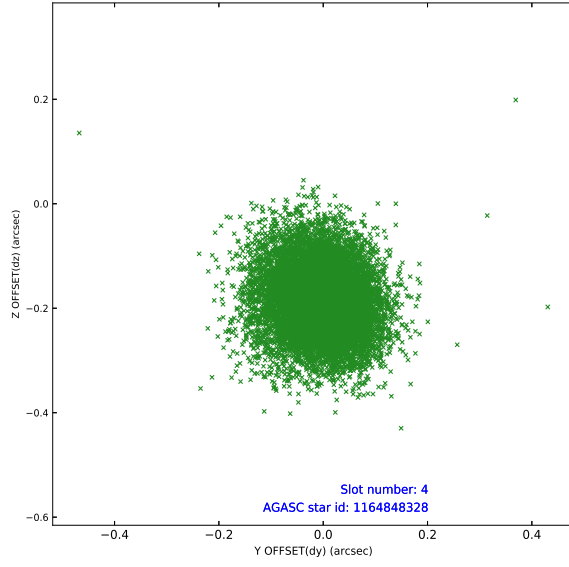
pt	status	used	id	mag	n_pts	frac_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mea
0	FID		HRC-S-1	7.02	4922	1.000	0.119	-0.157	0.017	0.028	0.000000	0.000000	-1161.65	-447
1	FID		HRC-S-2	7.03	4922	1.000	0.154	-0.106	0.006	0.012	0.000000	0.000000	1237.83	-439
2	FID		HRC-S-3	7.04	4922	1.000	0.117	-0.039	0.017	0.027	0.000000	0.000000	-1164.13	582
3	GUIDE	used	1164847408	9.41	9840	1.000	0.083	0.146	0.111	0.178	85.132885	-64.859502	2055.78	2158
4	GUIDE	used	1164848328	9.25	9841	1.000	-0.001	-0.187	0.095	0.153	84.701267	-64.093054	174.07	32
5	GUIDE	used	1166548256	8.77	9839	1.000	0.008	-0.010	0.076	0.125	85.738698	-64.074093	-808.68	1337
6	GUIDE	used	1166544016	9.69	9764	1.000	-0.064	-0.134	0.138	0.226	86.089673	-64.349585	-293.16	2347
7	GUIDE	used	1164319000	10.38	9830	1.000	-0.025	0.181	0.203	0.331	83.956337	-63.392005	-1197.10	-2396

2.4 Star Slots

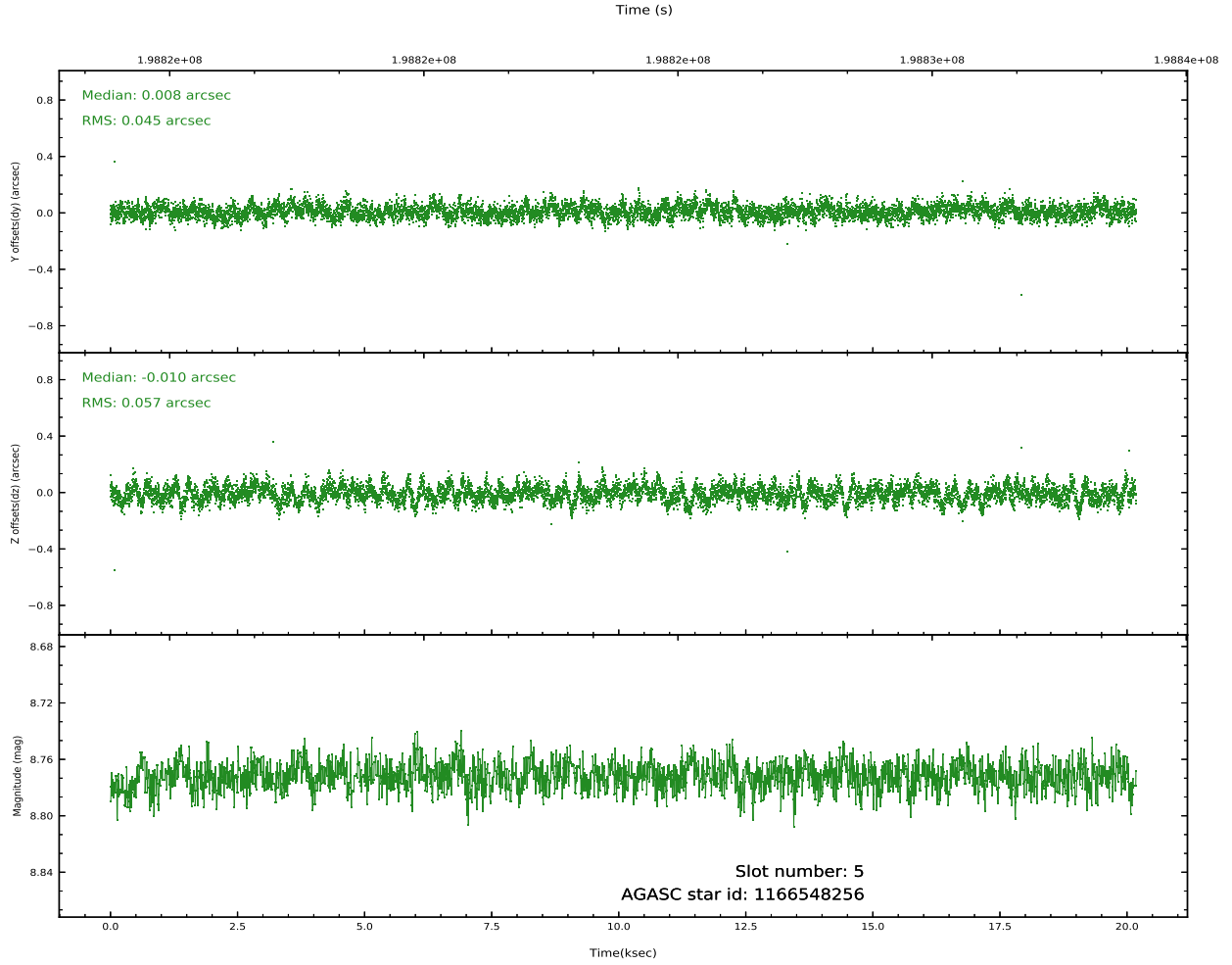
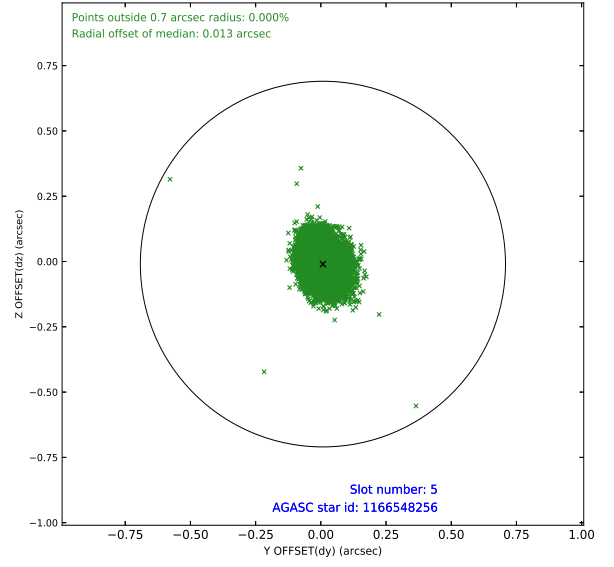
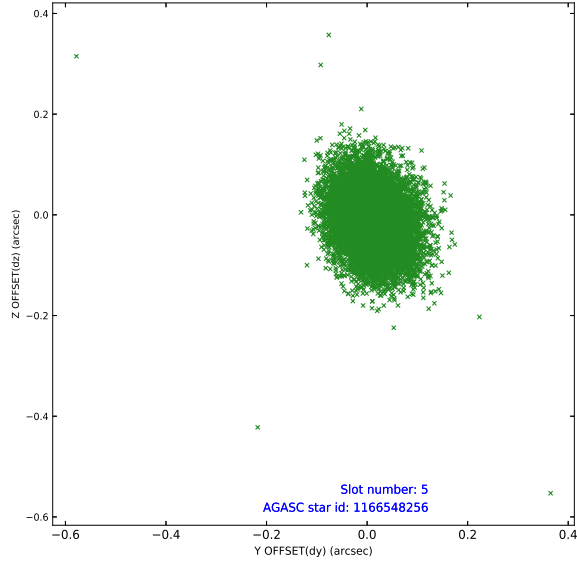
2.4.1 Slot 3



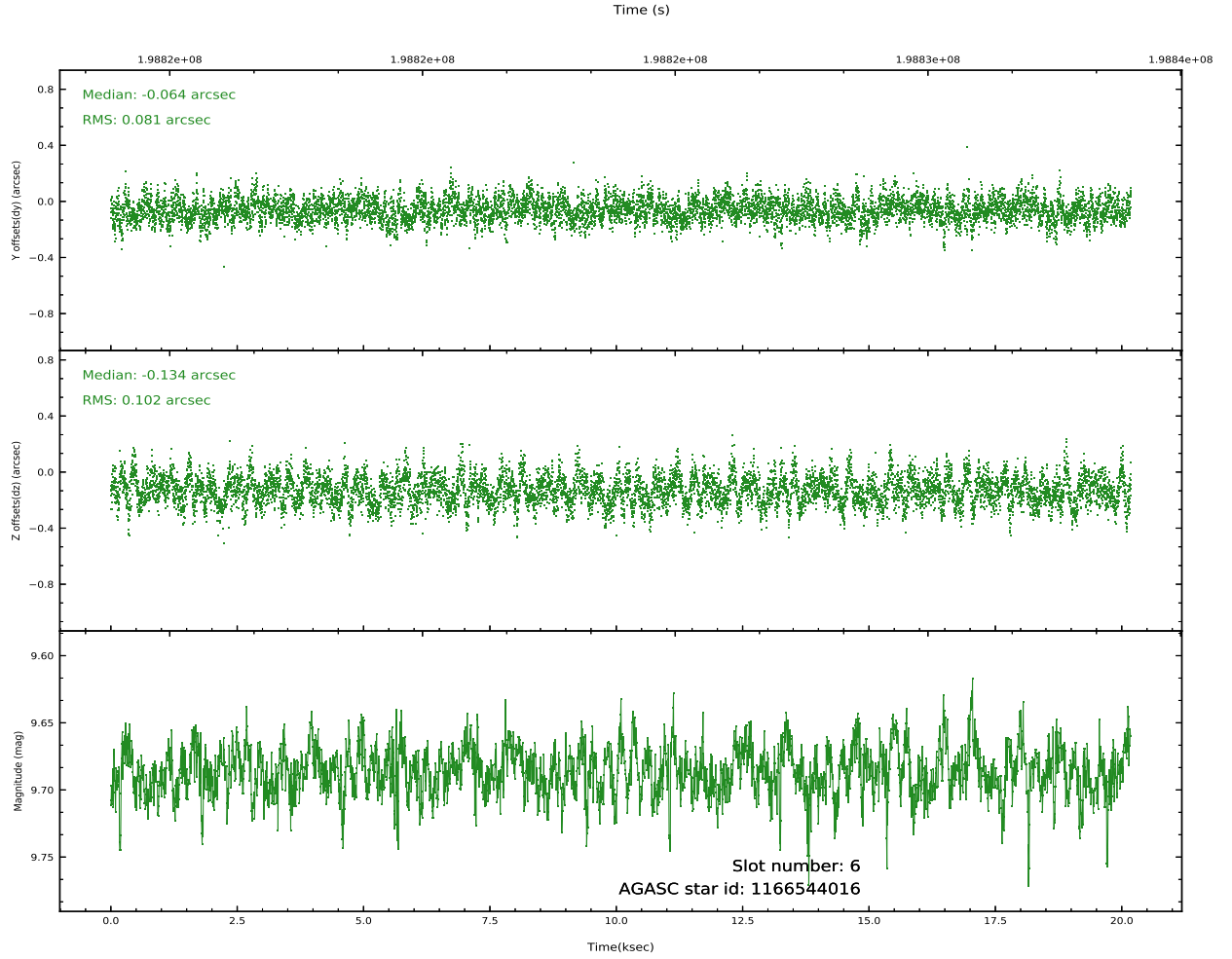
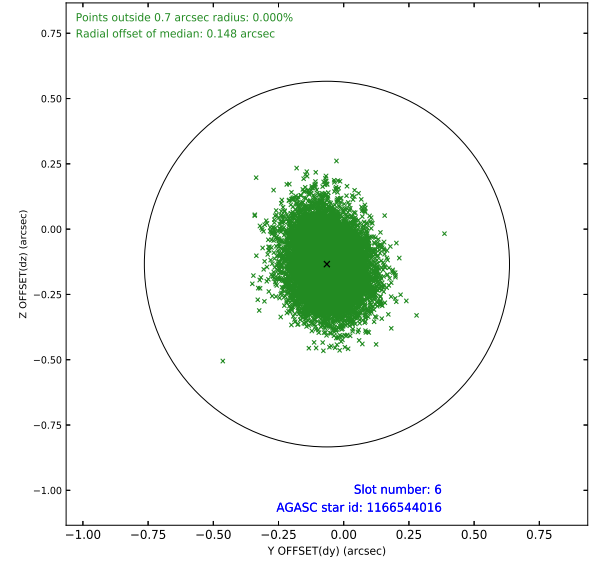
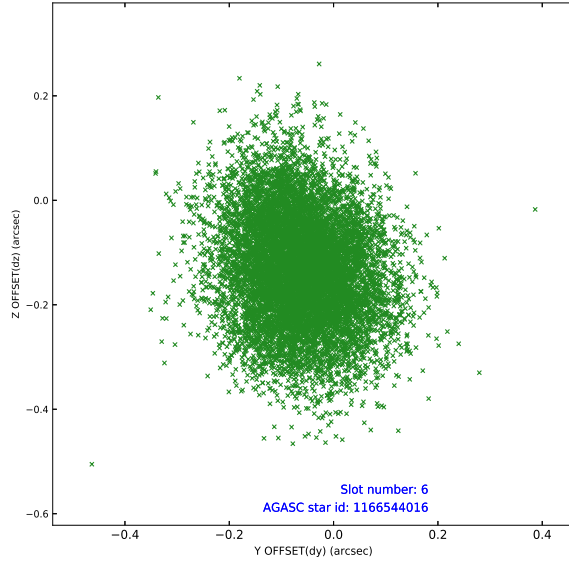
2.4.2 Slot 4



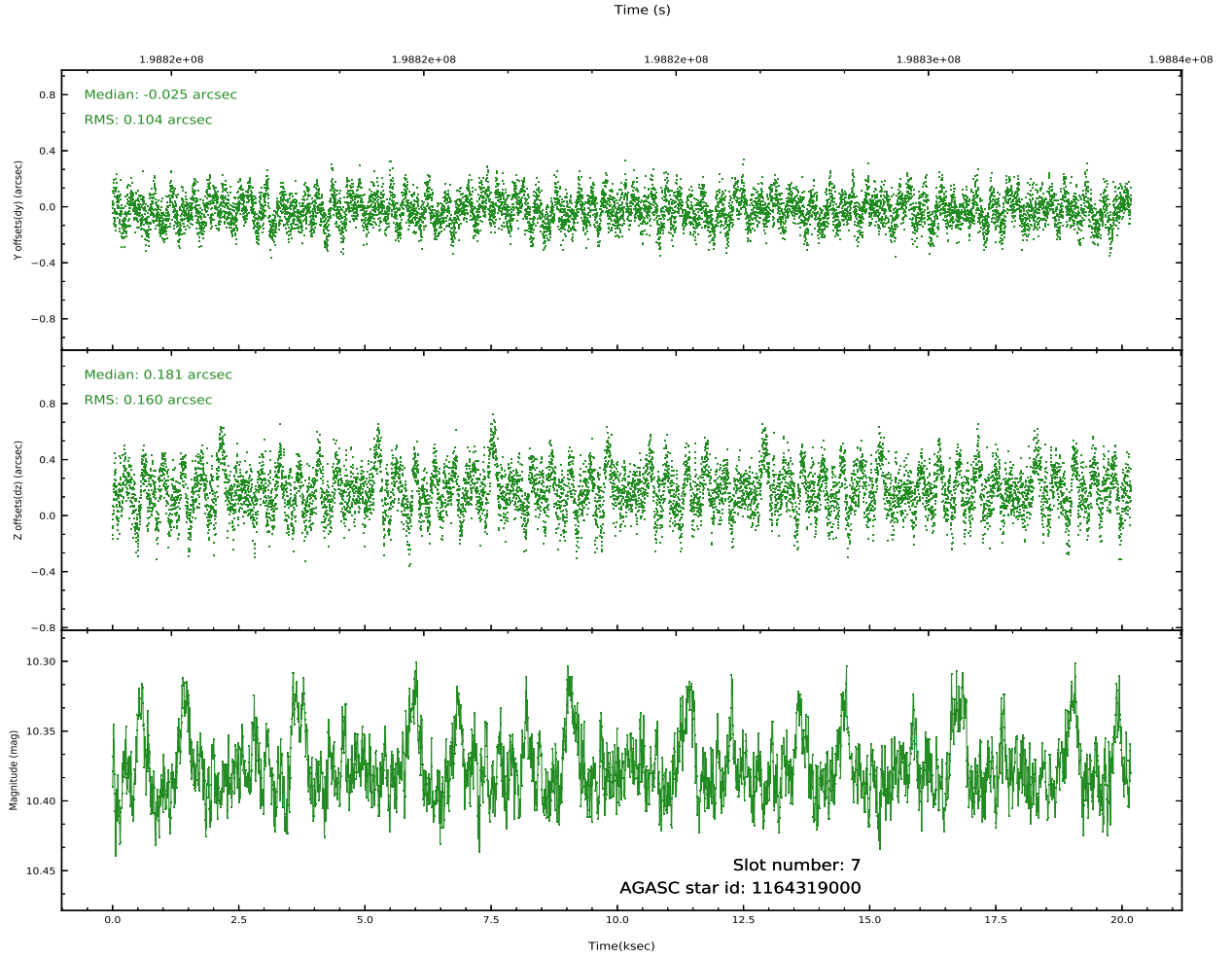
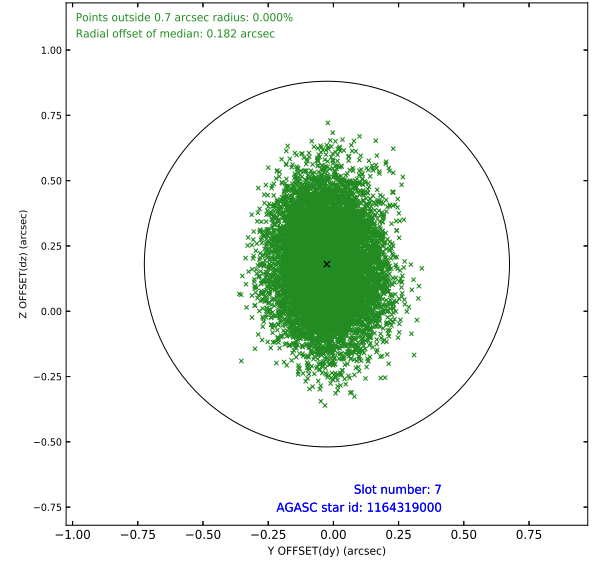
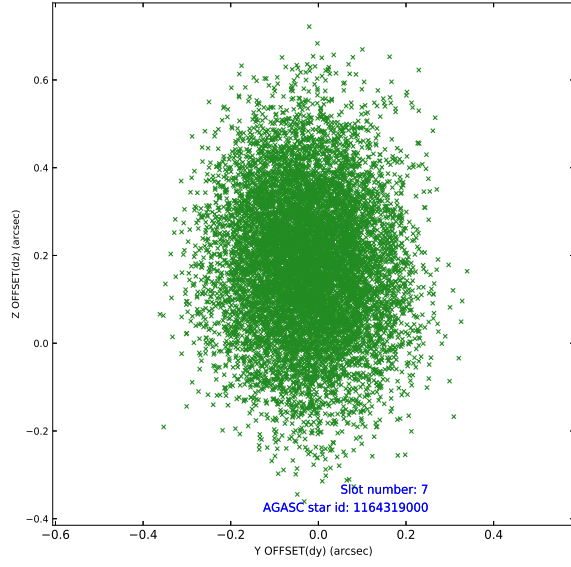
2.4.3 Slot 5



2.4.4 Slot 6

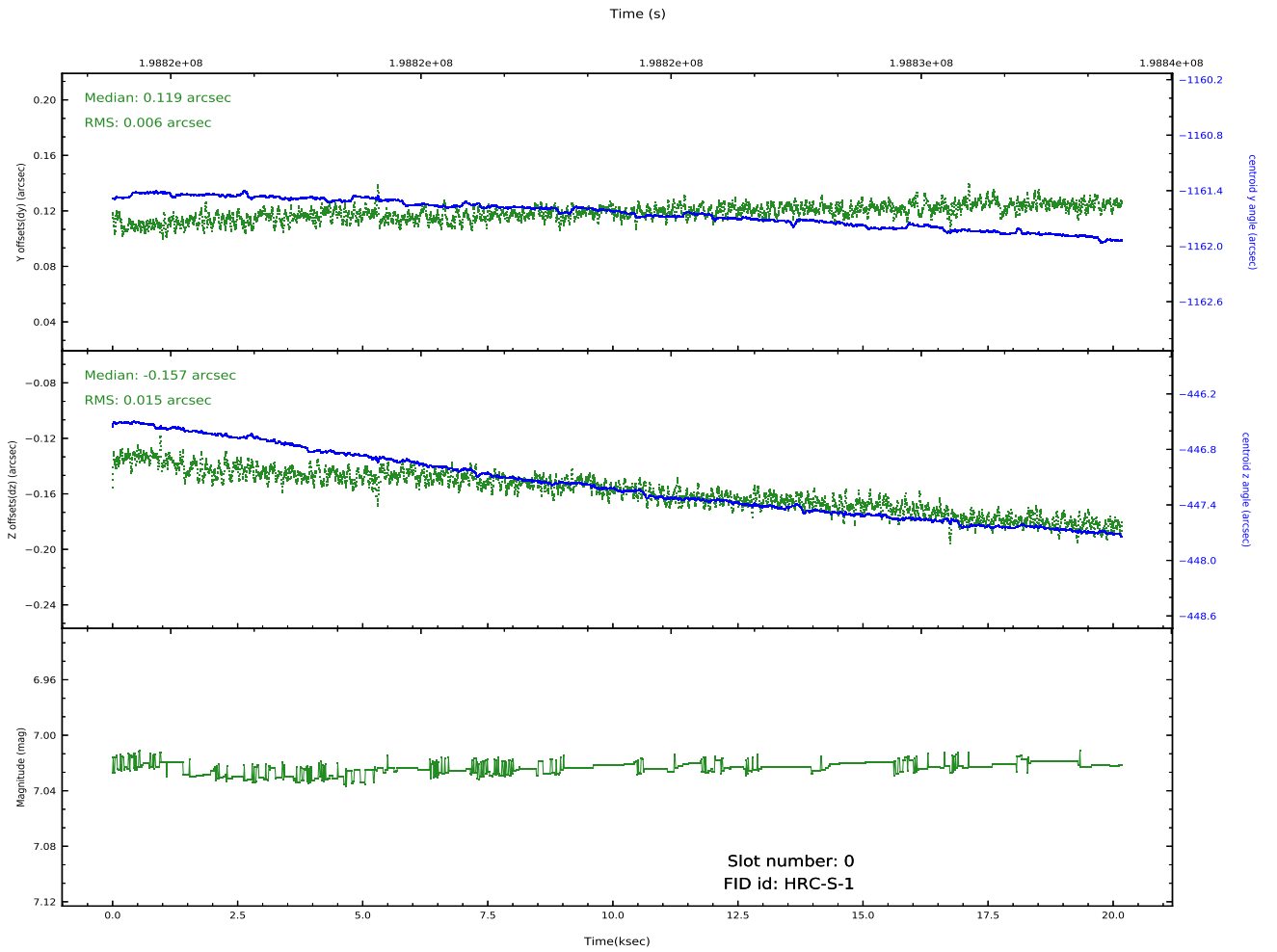
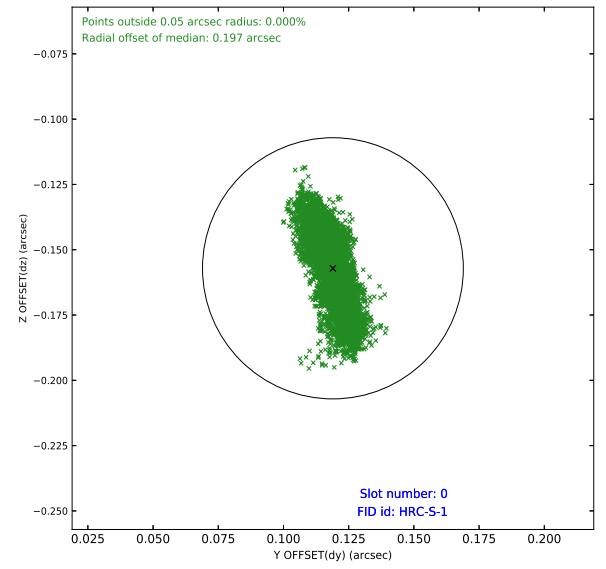
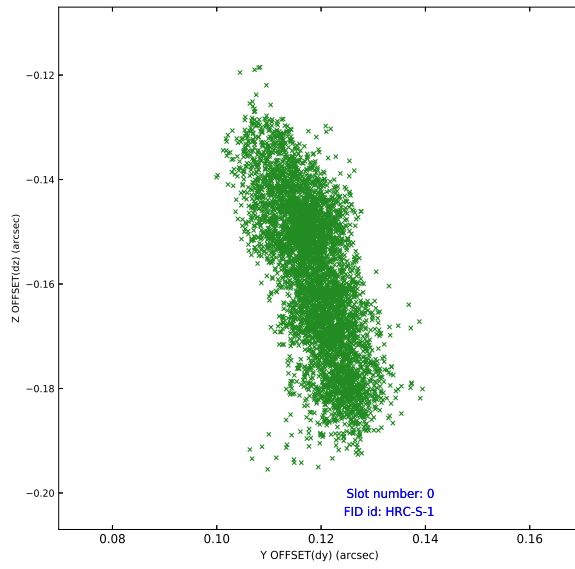


2.4.5 Slot 7

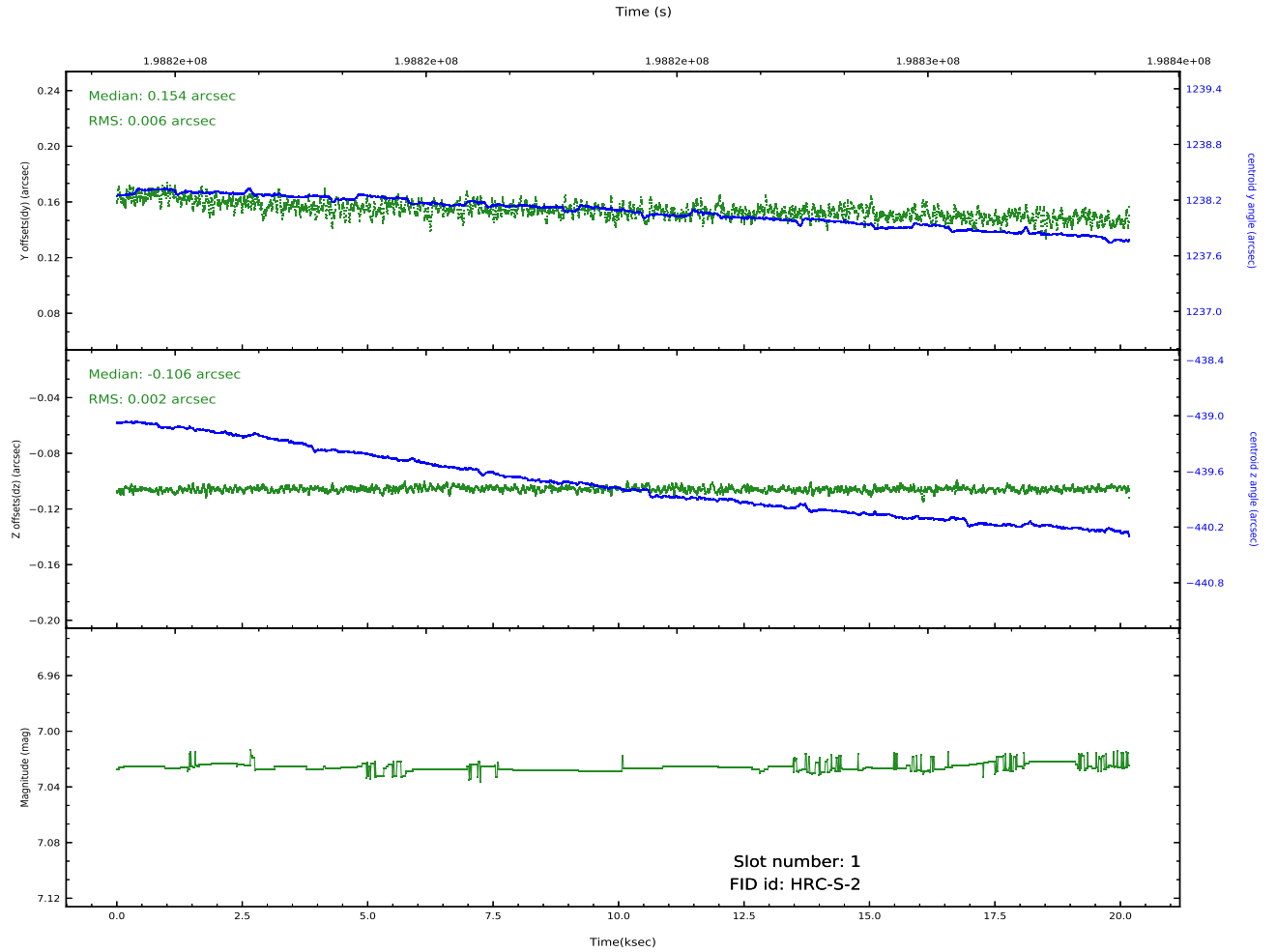
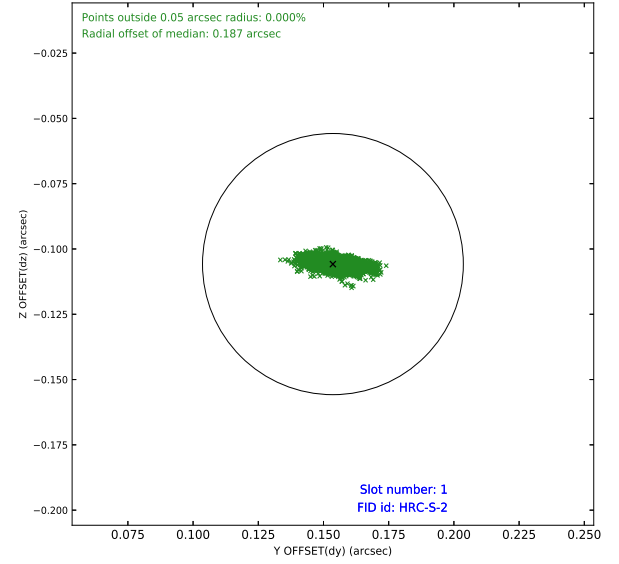
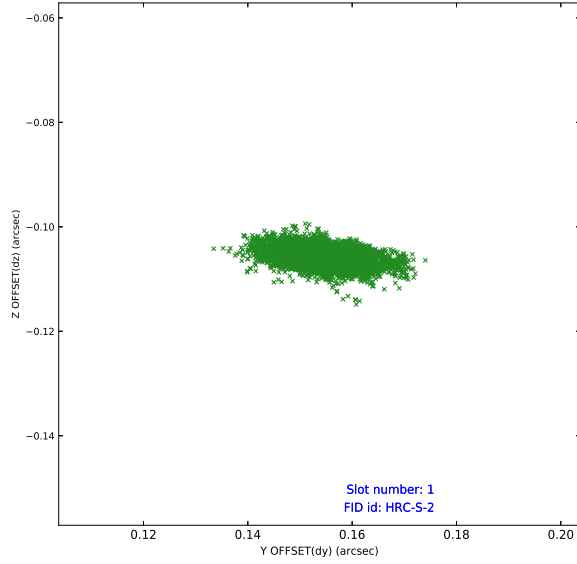


2.5 FID Slots

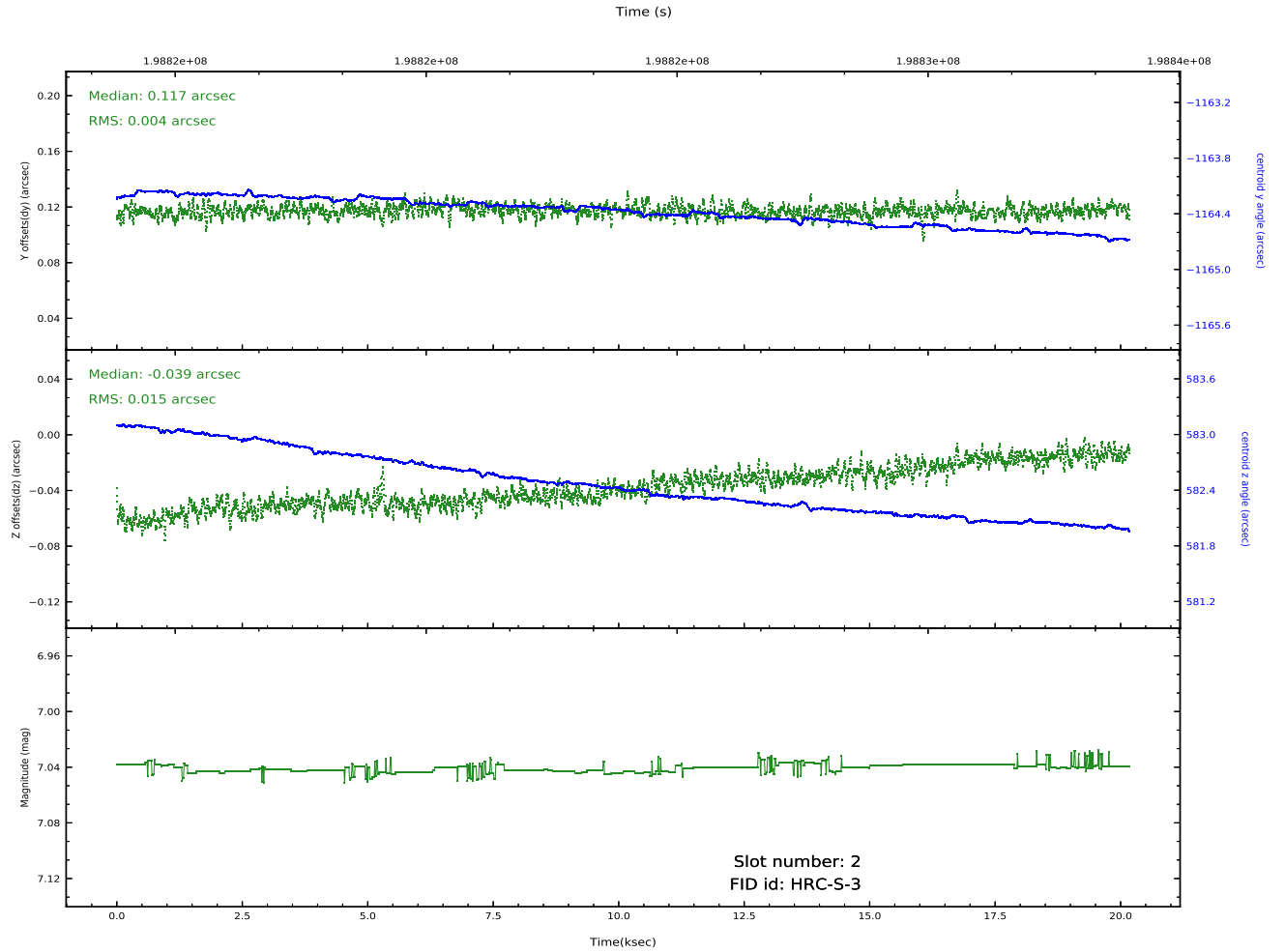
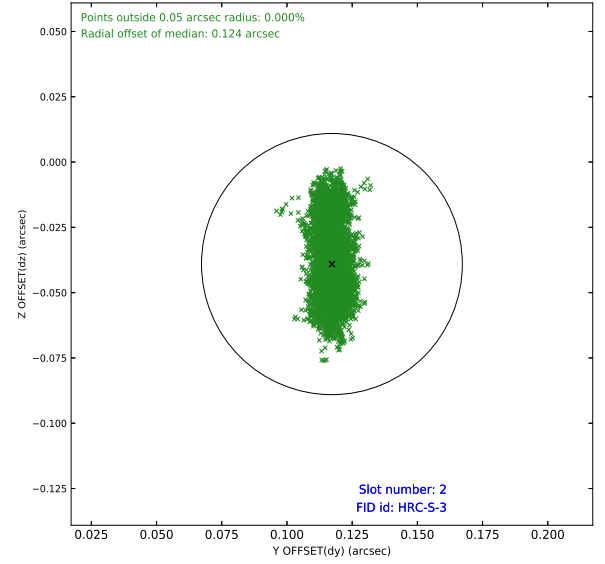
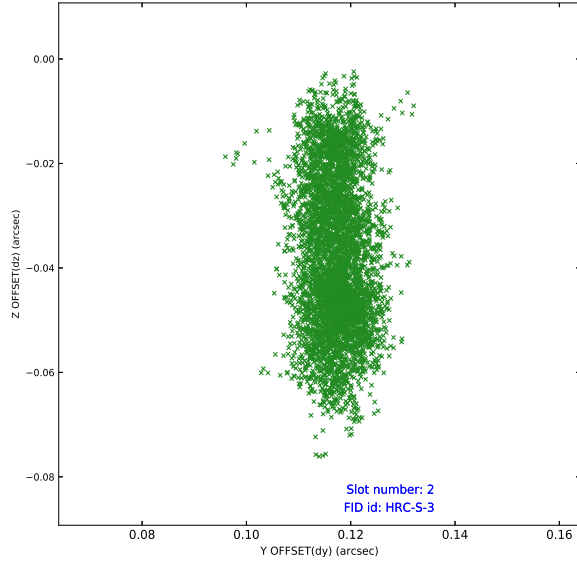
2.5.1 Slot 0



2.5.2 Slot 1

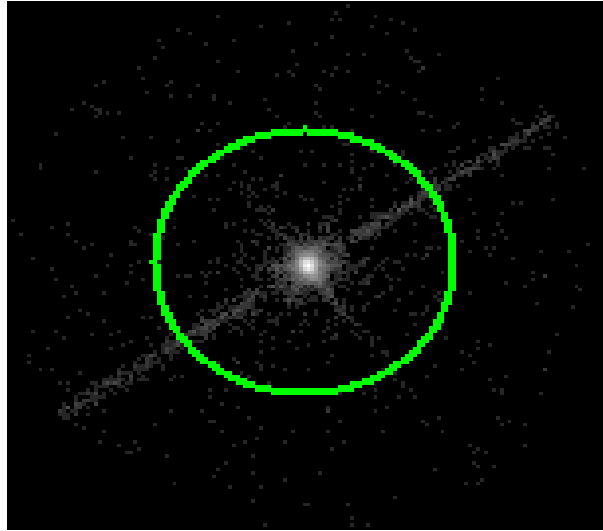


2.5.3 Slot 2

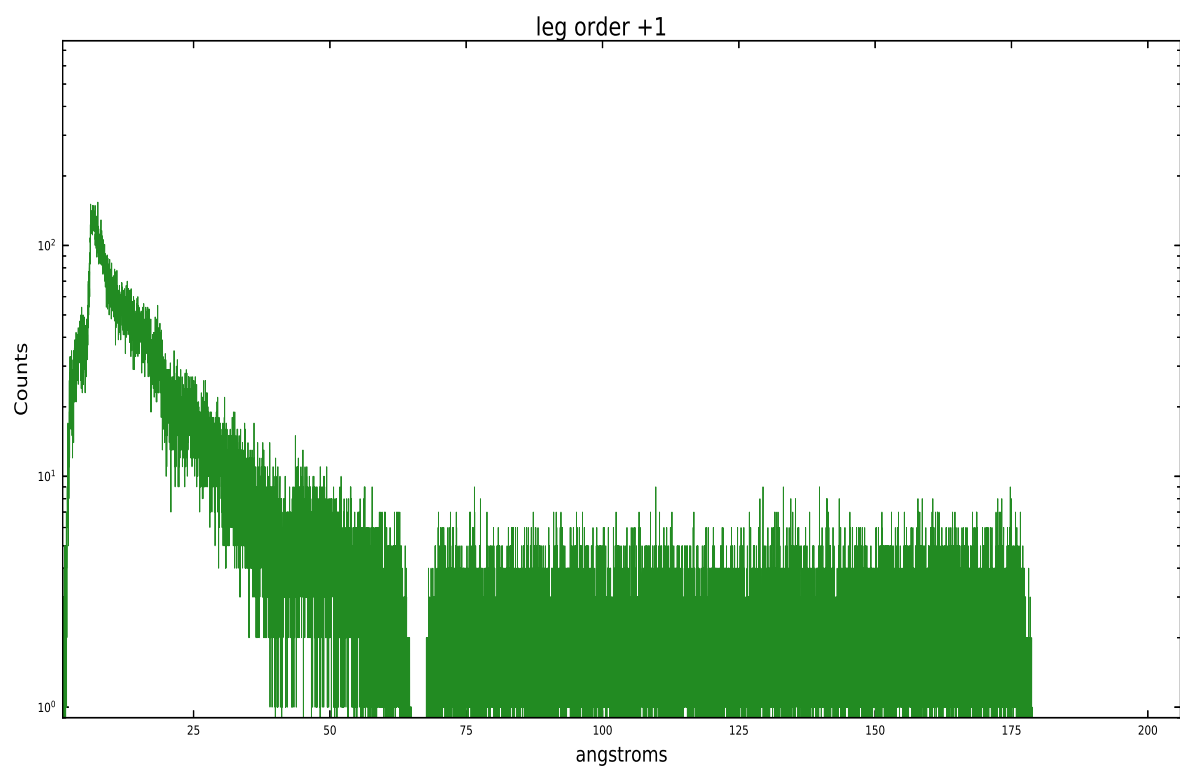
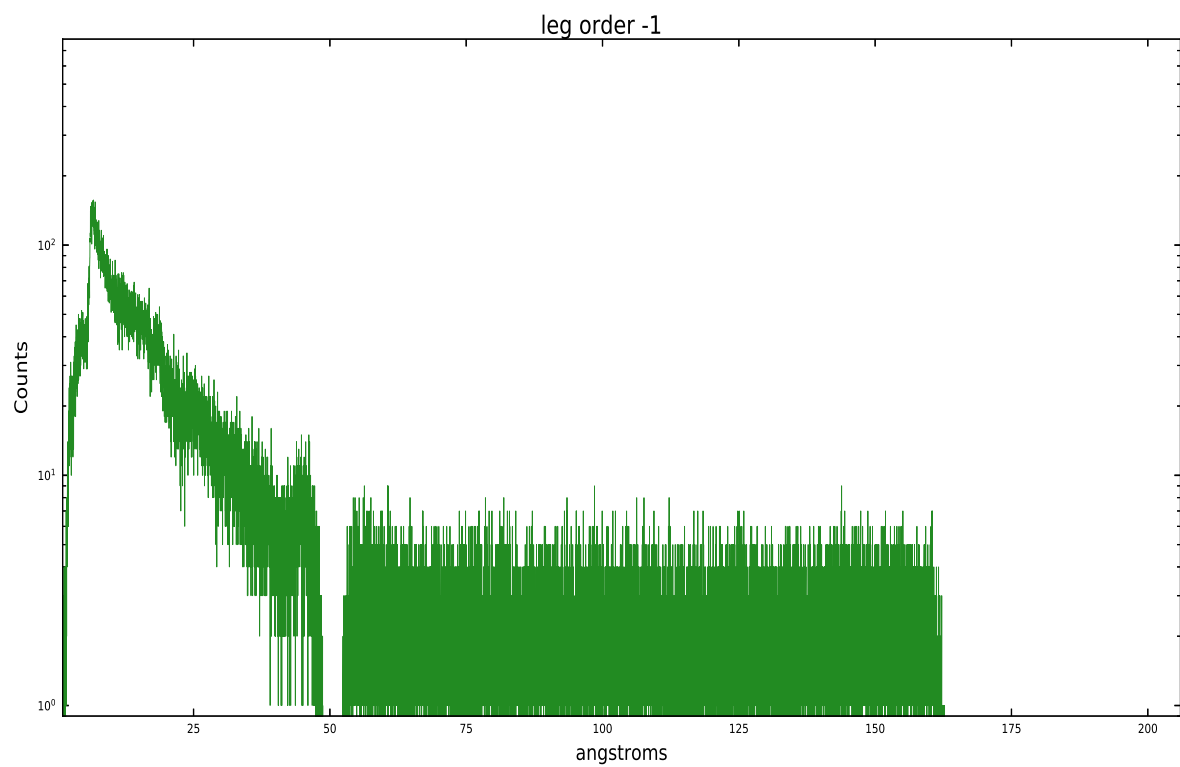


3 Gratings

3.1 LETG Arm



LETG Zero Order



A Summary

A.1 Status

V&V Scientist	David Principe
V&V Date (YYYY-MM-DD)	2020.10.08
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	19.831

A.2 Comments