

# V&V Reference Report

## L2 ASCDS Version : 8.4.4

Observation 9570 - L2 Version 2  
Chandra X-Ray Center

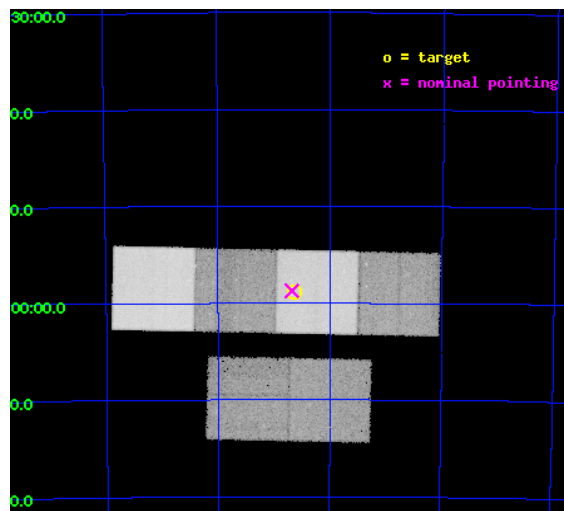
L2 Processing Date : May 17 2012

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# 1 Front

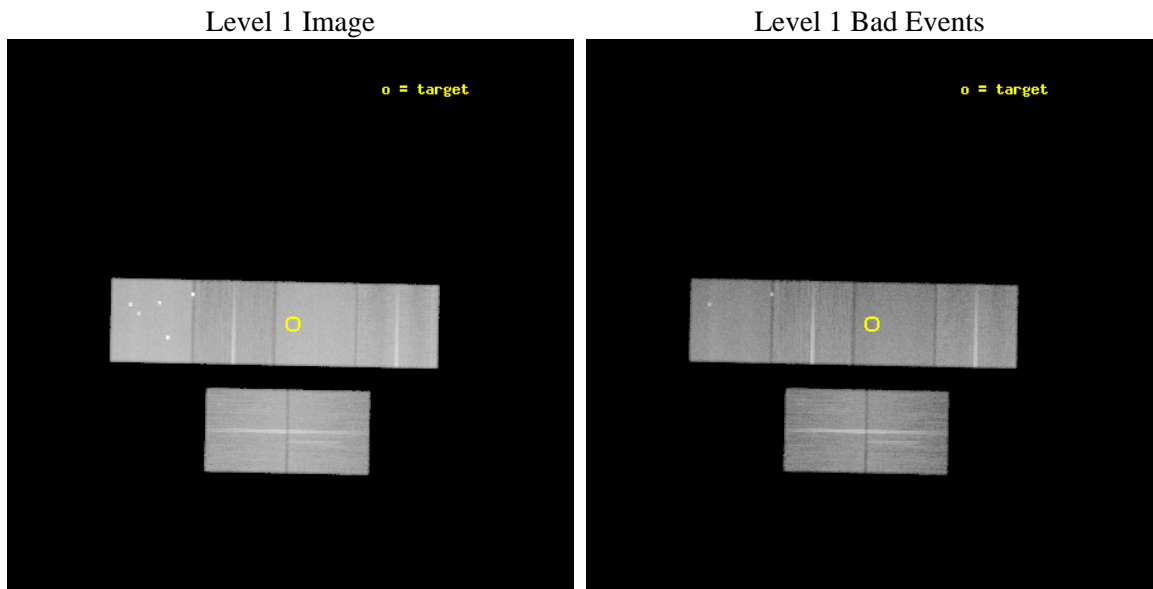
seq_num	600711	Sequence number
obs_id	9570	Observation id
title	Galaxies across the Octaves: A Chandra Legacy Survey of SINGS Galaxies	Proposal title
observer	Dr Leigh Jenkins	Principal investigator
object	IC 4710	Source name
dtcycle	0	&#160
cycle	P	events from which exps? Prim/Second/Both
ra_targ	277.159167	Observer's specified target RA [deg]
dec_targ	-66.981667	Observer's specified target Dec [deg]
ra_nom	277.16958709186	Nominal RA [deg]
dec_nom	-66.979052449132	Nominal Dec [deg]
roll_nom	1.1662064249586	Nominal Roll [deg]
revision	2	Processing version of data
ontime	31071.699517369	Sum of GTIs [s]
livetime	30678.250948949	Livetime [s]
ontime2	31071.740557373	Sum of GTIs [s]
ontime3	31071.576397359	Sum of GTIs [s]
ontime5	31071.658477366	Sum of GTIs [s]
ontime6	31071.617437363	Sum of GTIs [s]
ontime7	31071.699517369	Sum of GTIs [s]
ontime8	31068.294307411	Sum of GTIs [s]
l2events	504524	Number of level 2 events



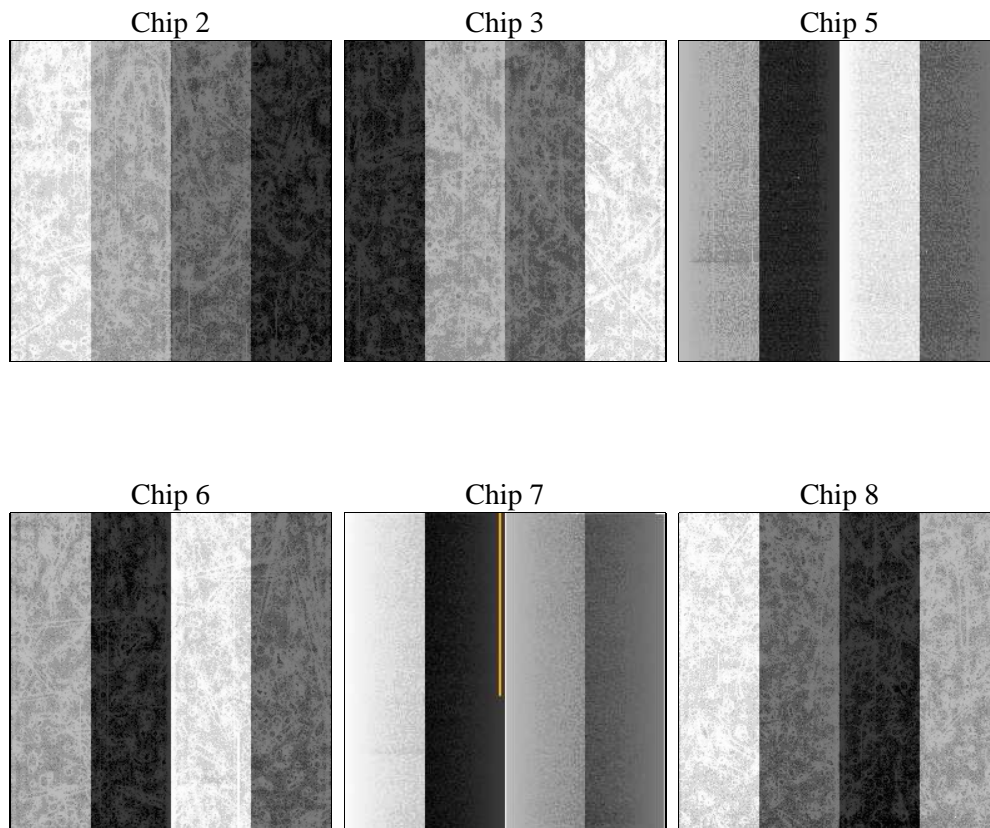
## 2 OBI

### 2.1 OBI

#### 2.1.1 Images



#### 2.1.2 Bias



### 2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	31311.109000	[s] Scheduled observation exposure time
ascdsver	8.4.4	Processing system revision	ontime	31071.699517369	Sum of GTIs [s]
caldbver	4.4.9	&#160	ontime2	31071.740557373	Sum of GTIs [s]
date	2012-05-17T03:29:38	Date and time of file creation	ontime3	31071.576397359	Sum of GTIs [s]
revision	2	Processing version of data	ontime5	31071.658477366	Sum of GTIs [s]
			ontime6	31071.617437363	Sum of GTIs [s]
			ontime7	31071.699517369	Sum of GTIs [s]
			ontime8	31068.294307411	Sum of GTIs [s]
			l1events	2180801	Number of level 1 events

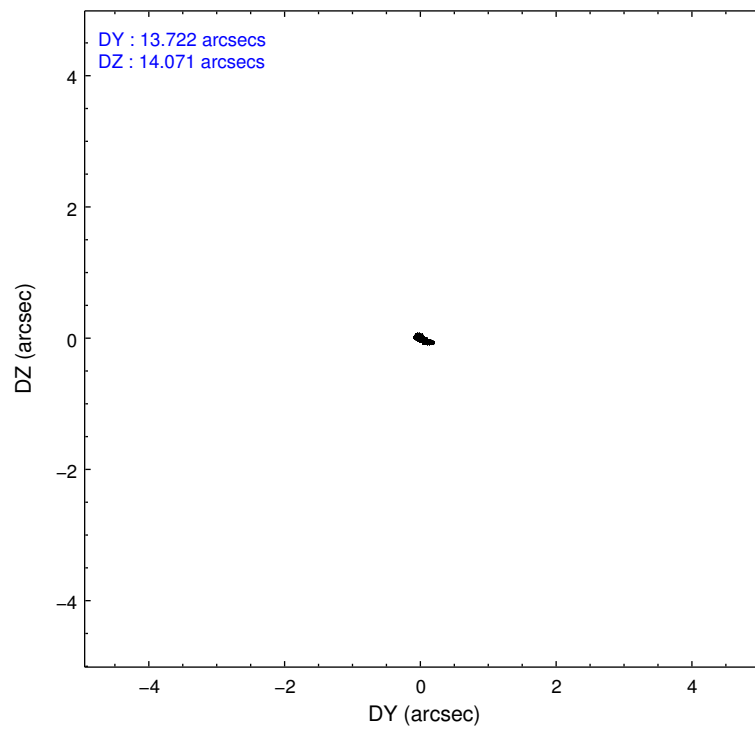
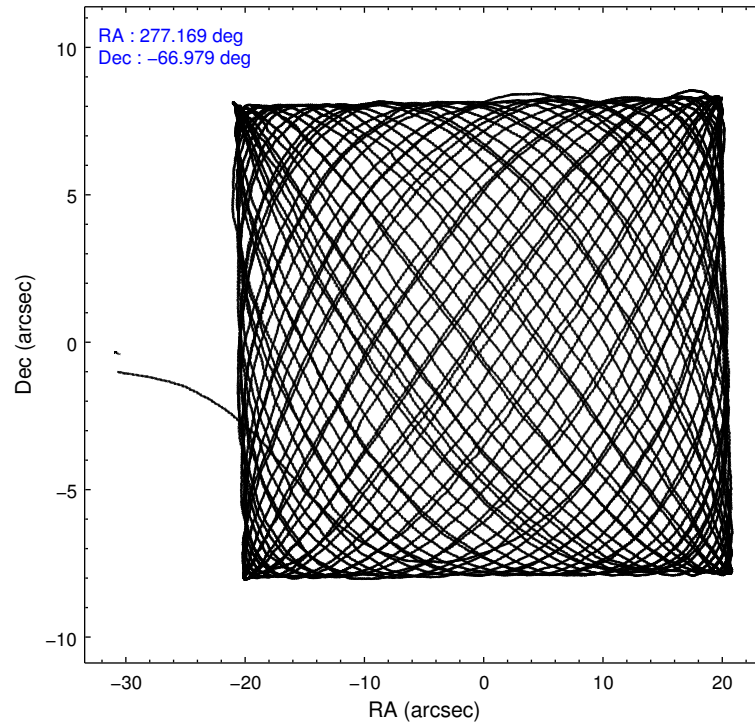
### 2.1.4 Events

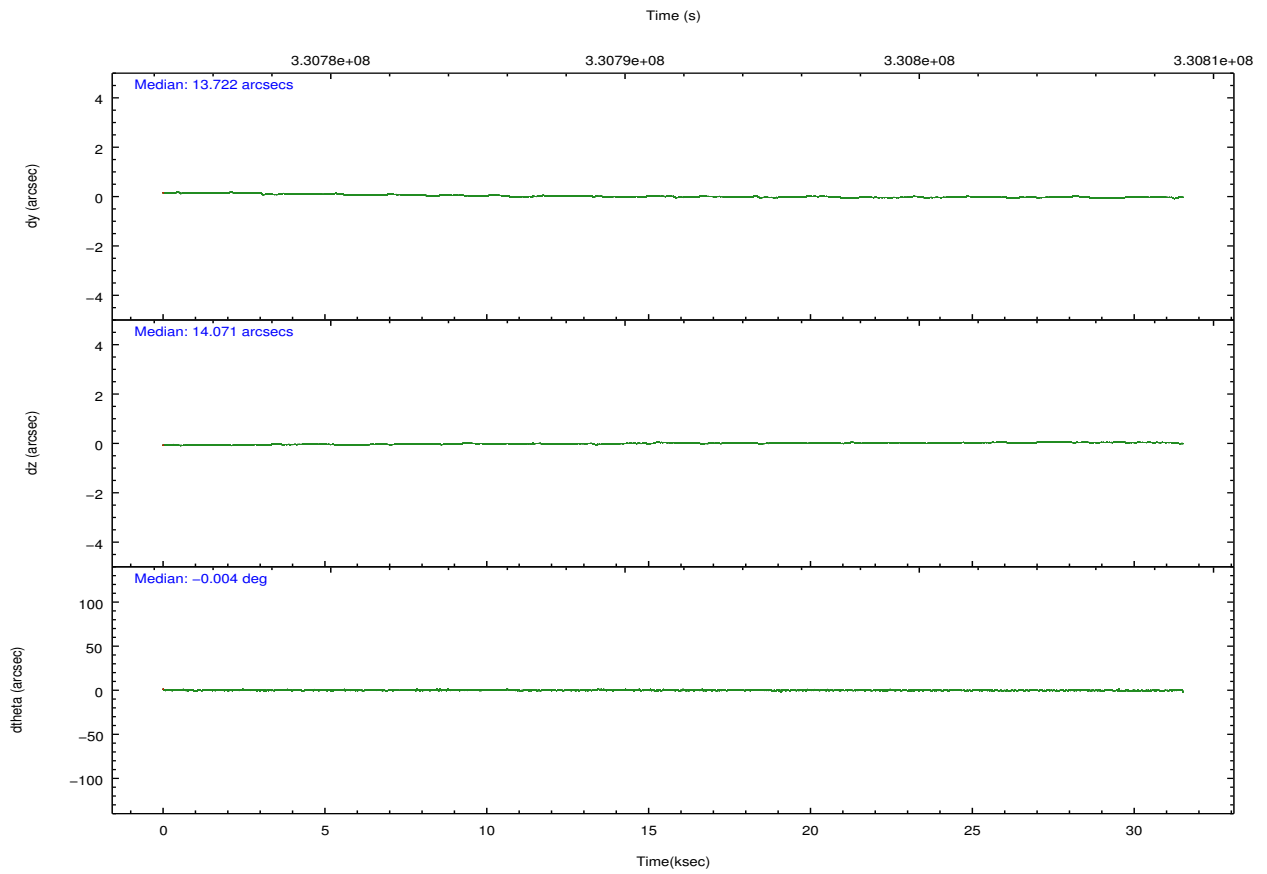
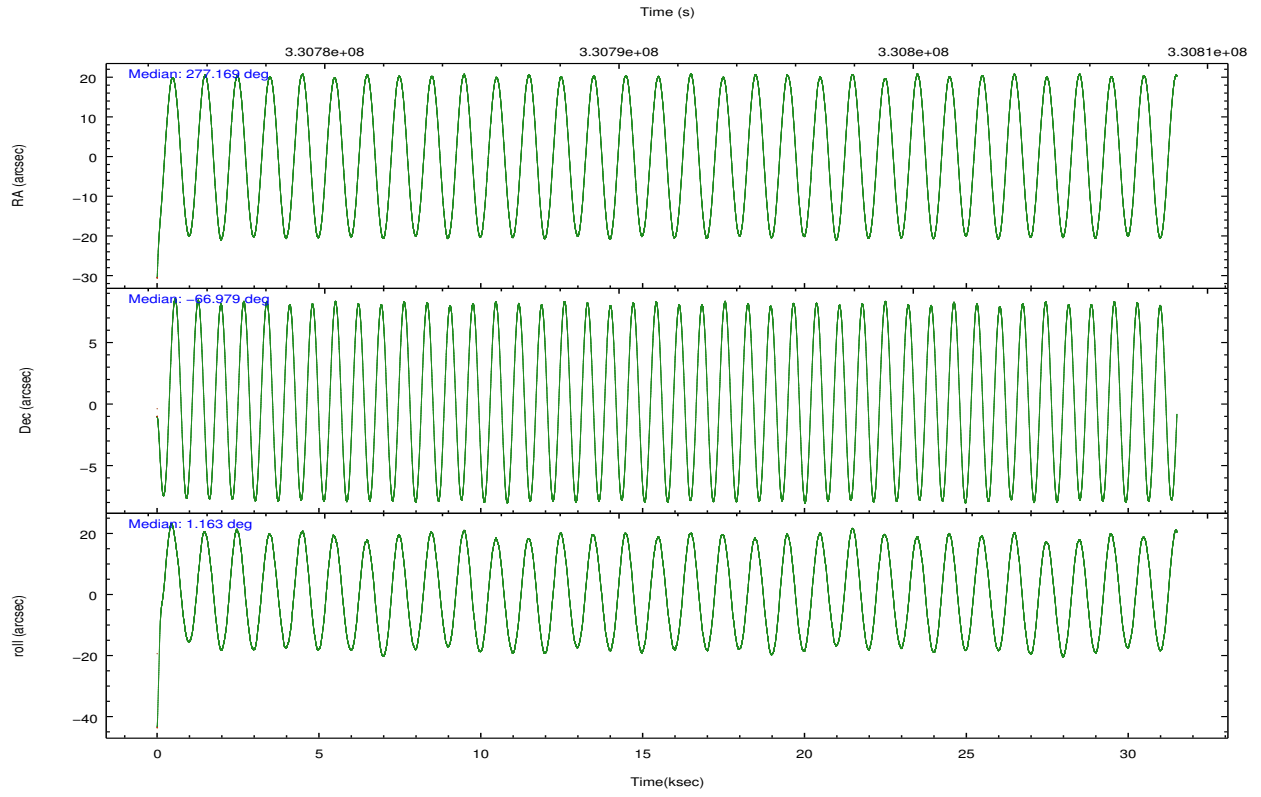
	ccd 2	ccd 3	ccd 5	ccd 6	ccd 7	ccd 8		ccd 2	ccd 3	ccd 5	ccd 6	ccd 7	ccd 8
level 1 events	302311	288003	483471	304472	421011	381533	grade 0 events	15172	15899	29298	14665	15428	27964
rejected events	266972	251920	255047	267401	246035	293889		5%	5%	6%	4%	3%	7%
rejected %	88%	87%	52%	87%	58%	77%	grade 1 events	226	204	1138	175	447	302
								0%	0%	0%	0%	0%	0%
							grade 2 events	7678	7042	67366	8056	35684	20184
								2%	2%	13%	2%	8%	5%
							grade 3 events	3173	3423	9565	3392	14923	8859
								1%	1%	1%	1%	3%	2%
							grade 4 events	3238	3338	7434	3438	14682	8459
								1%	1%	1%	1%	3%	2%
							grade 5 events	11974	13816	33989	14265	39514	19162
								3%	4%	7%	4%	9%	5%
							grade 6 events	6081	6382	114780	7521	94279	22187
								2%	2%	23%	2%	22%	5%
							grade 7 events	254769	237899	219901	252960	206054	274416
								84%	82%	45%	83%	48%	71%

## 2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-235678	ACIS-235678	Obspar file type	PREDICTED	ACTUAL
Grating	NONE	NONE	Obspar update status	NONE	UPDATED
Data mode	FAINT	FAINT	CCD I0 on	N	N
Observation mode	POINTING	POINTING	CCD I1 on	N	N
[deg] Pointing RA	277.110230	277.1695870918559	CCD I2 on	O1	Y
[deg] Pointing Dec	-66.993492	-66.9790524491317	CCD I3 on	O2	Y
[deg] Pointing Roll	0.954955	1.166206424958586	CCD S0 on	N	N
[mm] SIM focus pos	-0.684267	-0.6828225247311905	CCD S1 on	Y	Y
[mm] SIM defocus	0	0.001444936568705701	CCD S2 on	Y	Y
[mm] SIM translation stage pos	-190.132523	-190.1425803651734	CCD S3 on	Y	Y
[mm] SIM translation stage offset	0	0.01005778216563158	CCD S4 on	Y	Y
[s] Observation start time (MET)	330776066.184000	330775132.54448	CCD S5 on	N	N
Observation start date	2008-06-25T10:13:21	2008-06-25T09:58:52	Number of optional ACIS chips dropped	0	0
[s] Observation end time (MET)	330807377.184000	330807601.47107	On-chip summing requested	N	N
Observation end date	2008-06-25T18:55:12	2008-06-25T19:00:01	Subarray requested	NONE	NONE
Read mode	TIMED	TIMED	Alternating exposures requested	N	N
			[s] Primary exposure time	0.000000	3.2

## 2.3 Aspect



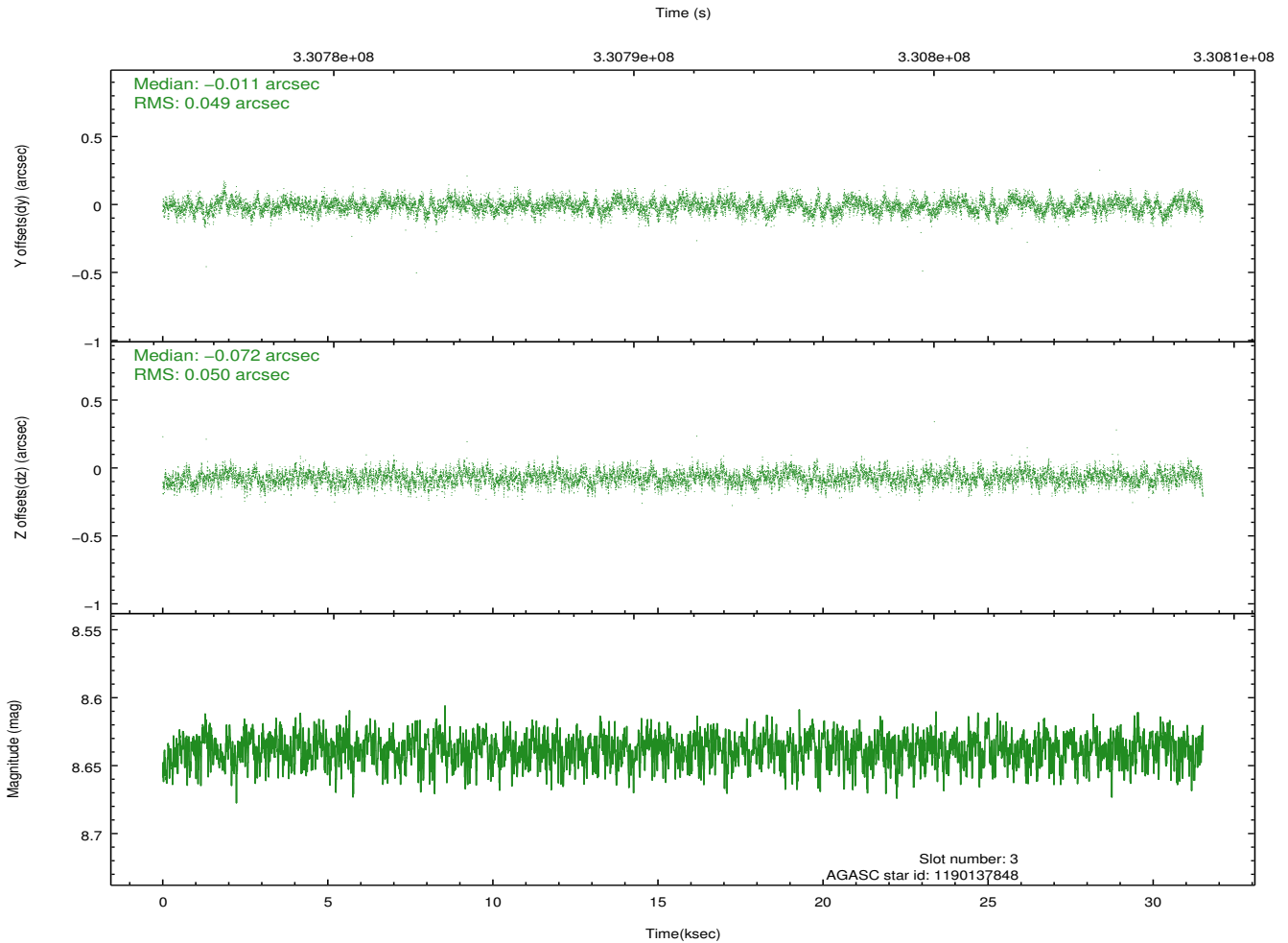
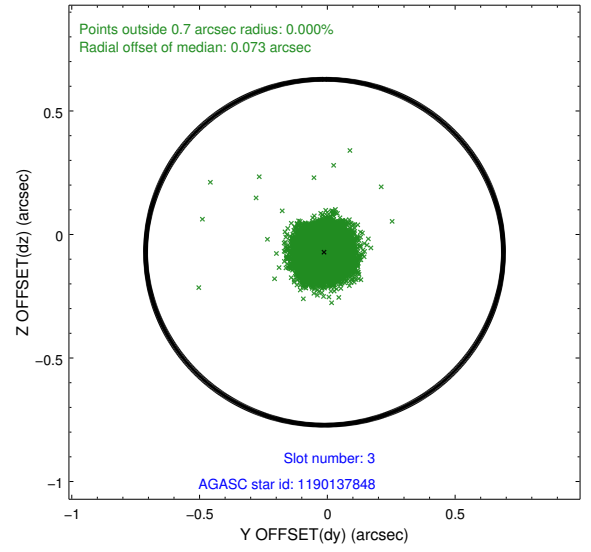
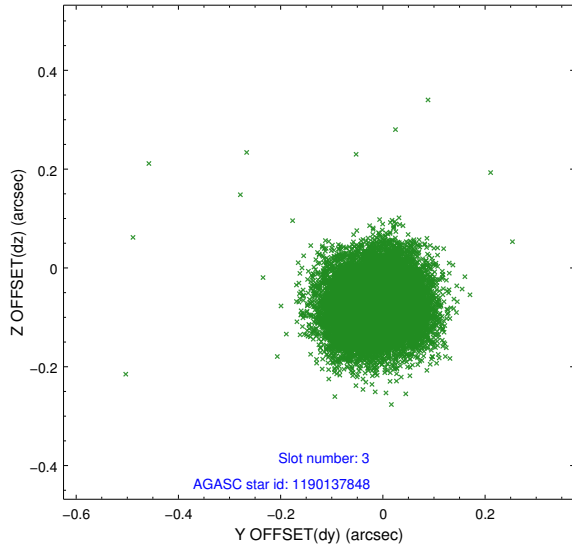


### Slot Statistics

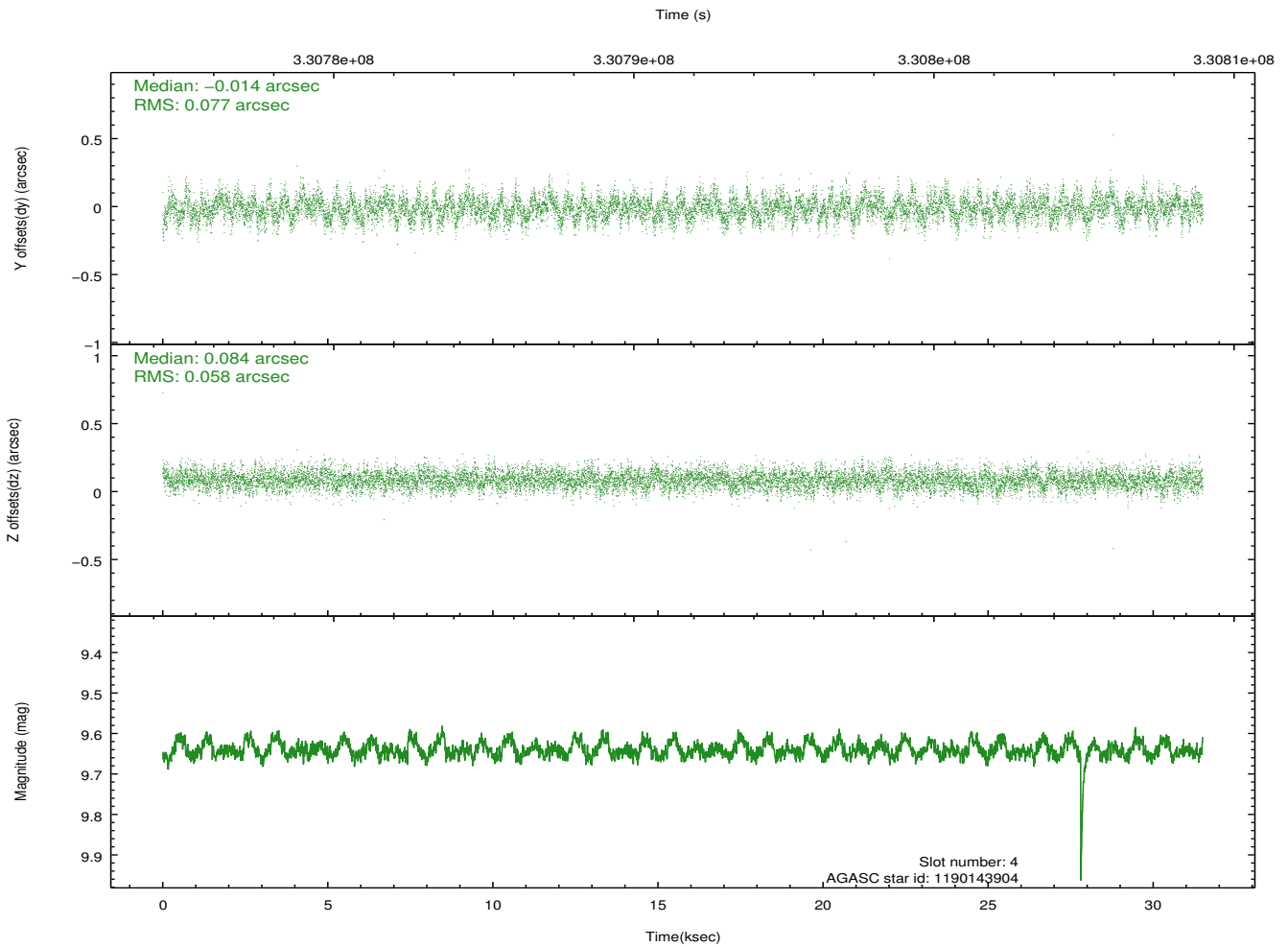
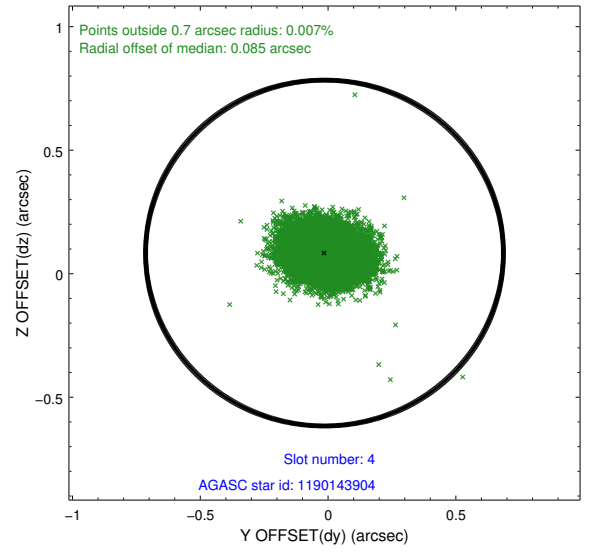
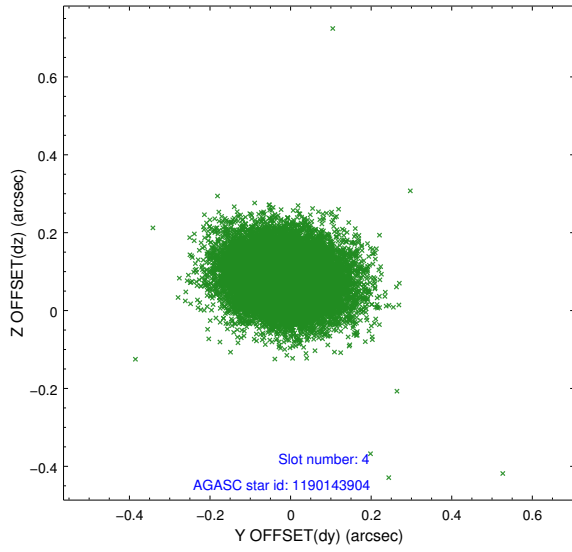
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-S-2	6.95	7683	-0.054	-0.042	0.007	0.011	0.000000	0.000000	-766.72	-1735.41
1	FID	ACIS-S-4	7.04	7684	0.175	0.038	0.006	0.011	0.000000	0.000000	2146.75	173.10
2	FID	ACIS-S-5	7.07	7684	-0.152	0.013	0.006	0.011	0.000000	0.000000	-1819.59	166.80
3	GUIDE	1190137848	8.64	15360	-0.011	-0.072	0.074	0.119	276.509501	-66.657293	-836.34	1220.24
4	GUIDE	1190143904	9.64	15347	-0.014	0.084	0.101	0.166	278.397431	-67.114609	1794.43	-484.13
5	GUIDE	1190148984	9.32	15281	0.139	0.078	0.110	0.185	276.454552	-67.059851	-923.37	-228.08
6	GUIDE	1190149424	9.12	15360	-0.103	-0.070	0.091	0.151	278.461360	-67.188365	1873.60	-753.10
7	GUIDE	1190149512	9.53	15343	-0.001	-0.019	0.126	0.195	275.988872	-66.681323	-1578.78	1136.05

## 2.4 Star Slots

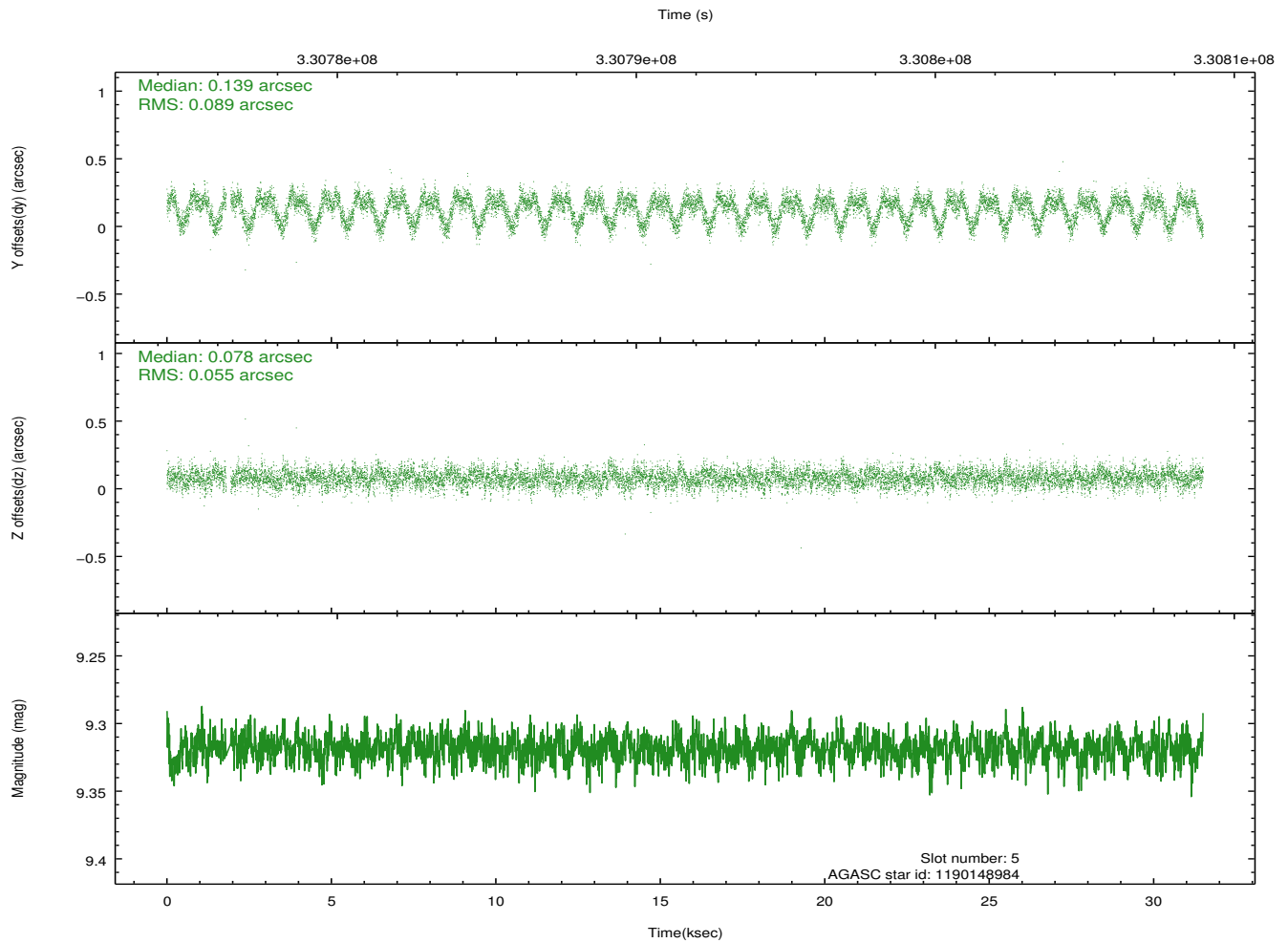
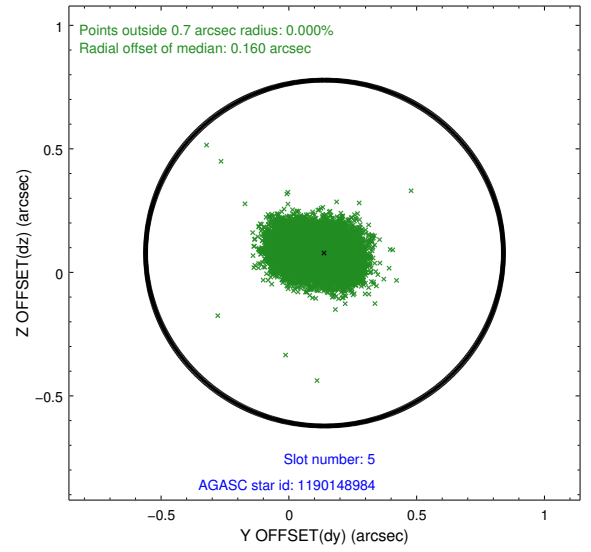
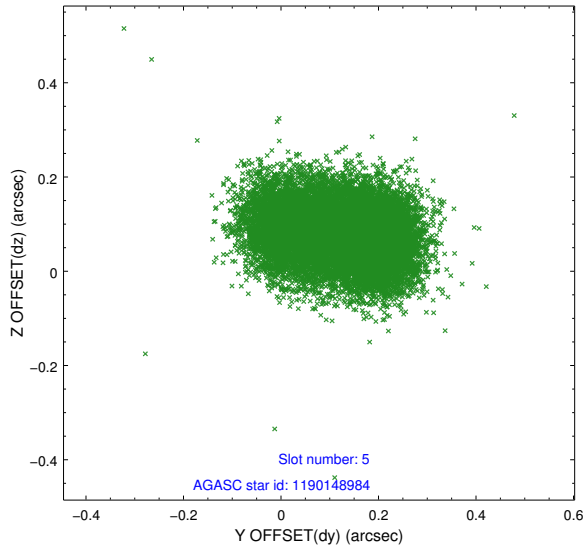
### 2.4.1 Slot 3



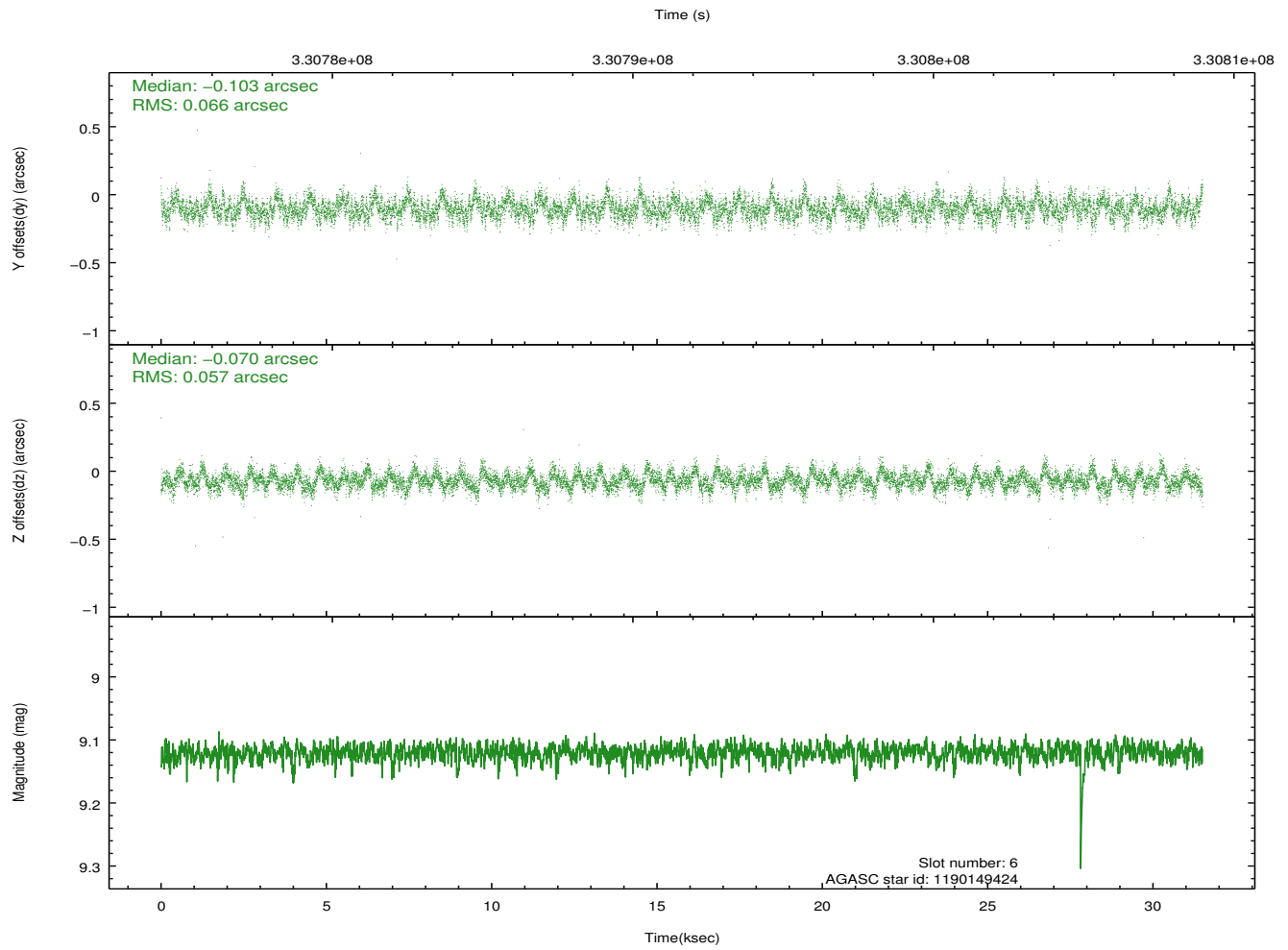
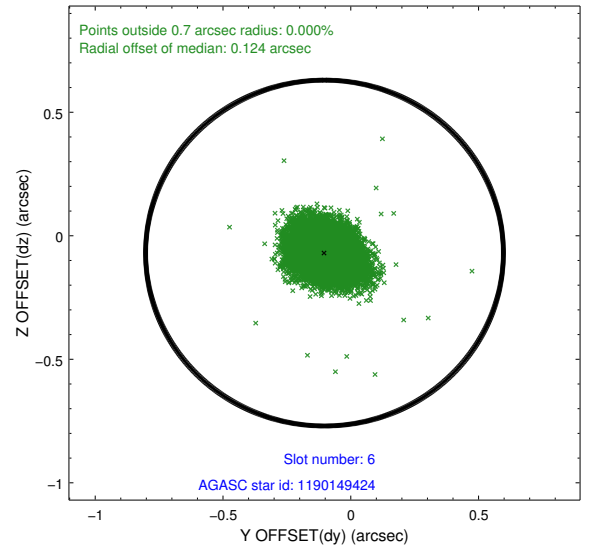
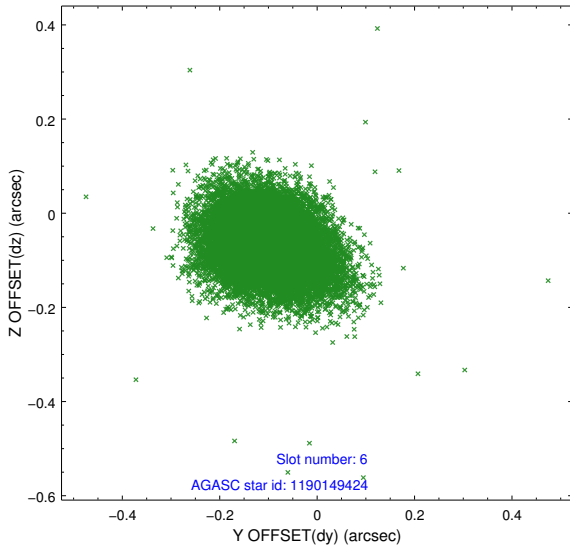
## 2.4.2 Slot 4



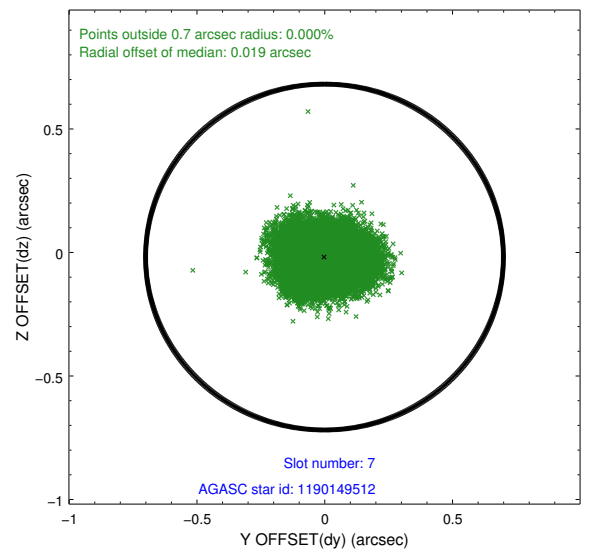
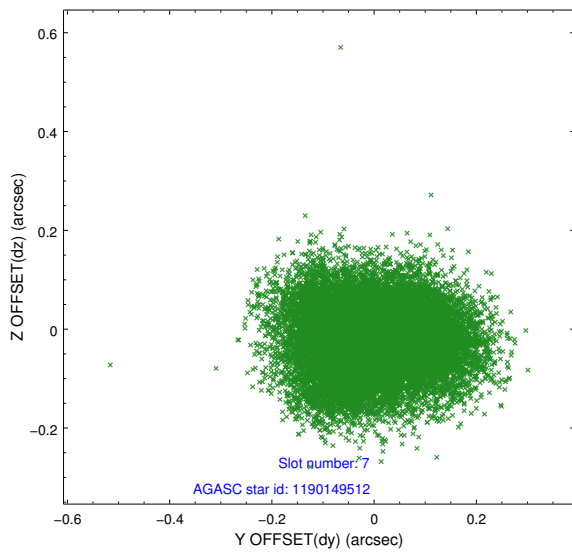
### 2.4.3 Slot 5



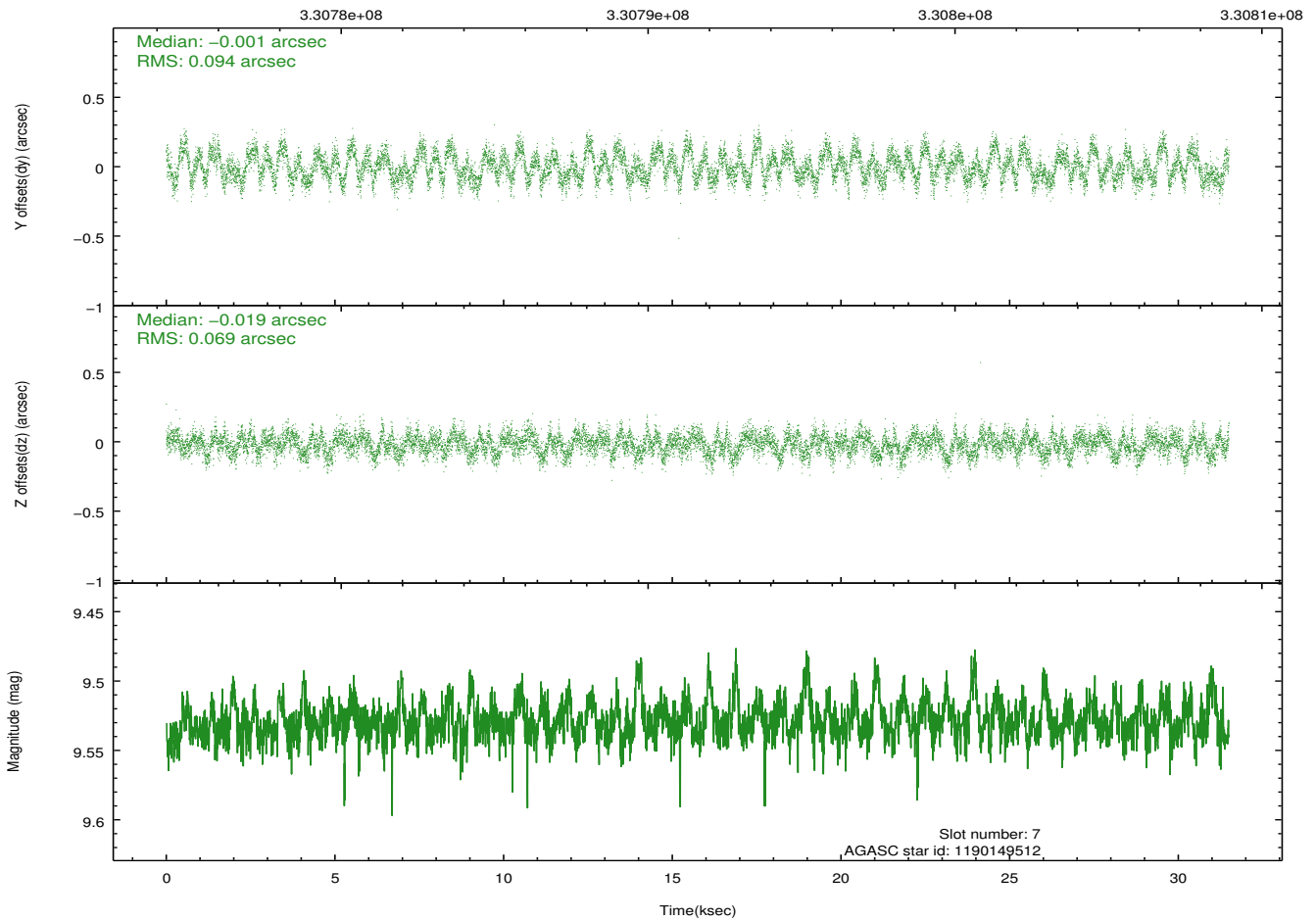
### 2.4.4 Slot 6



## 2.4.5 Slot 7

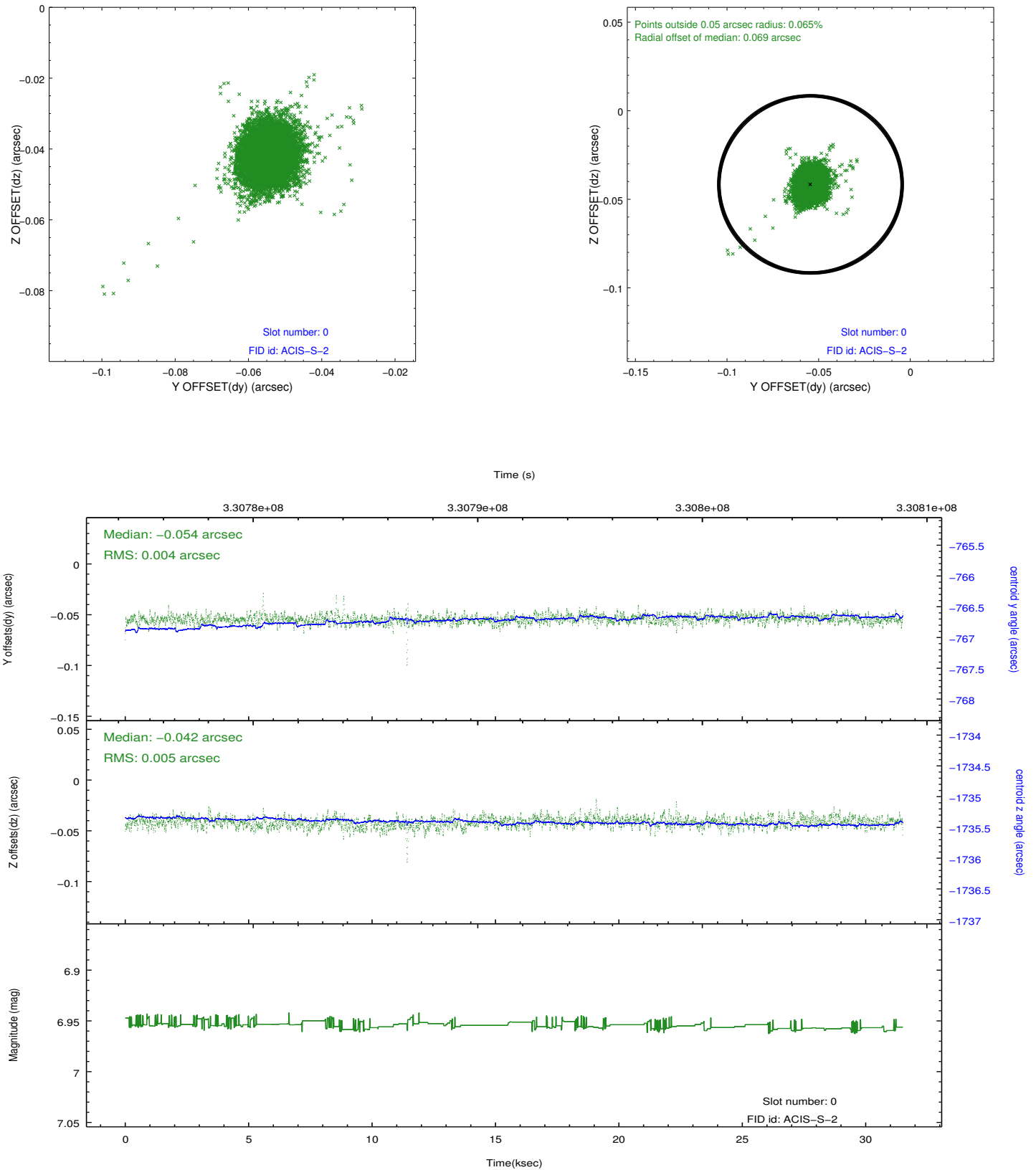


Time (s)

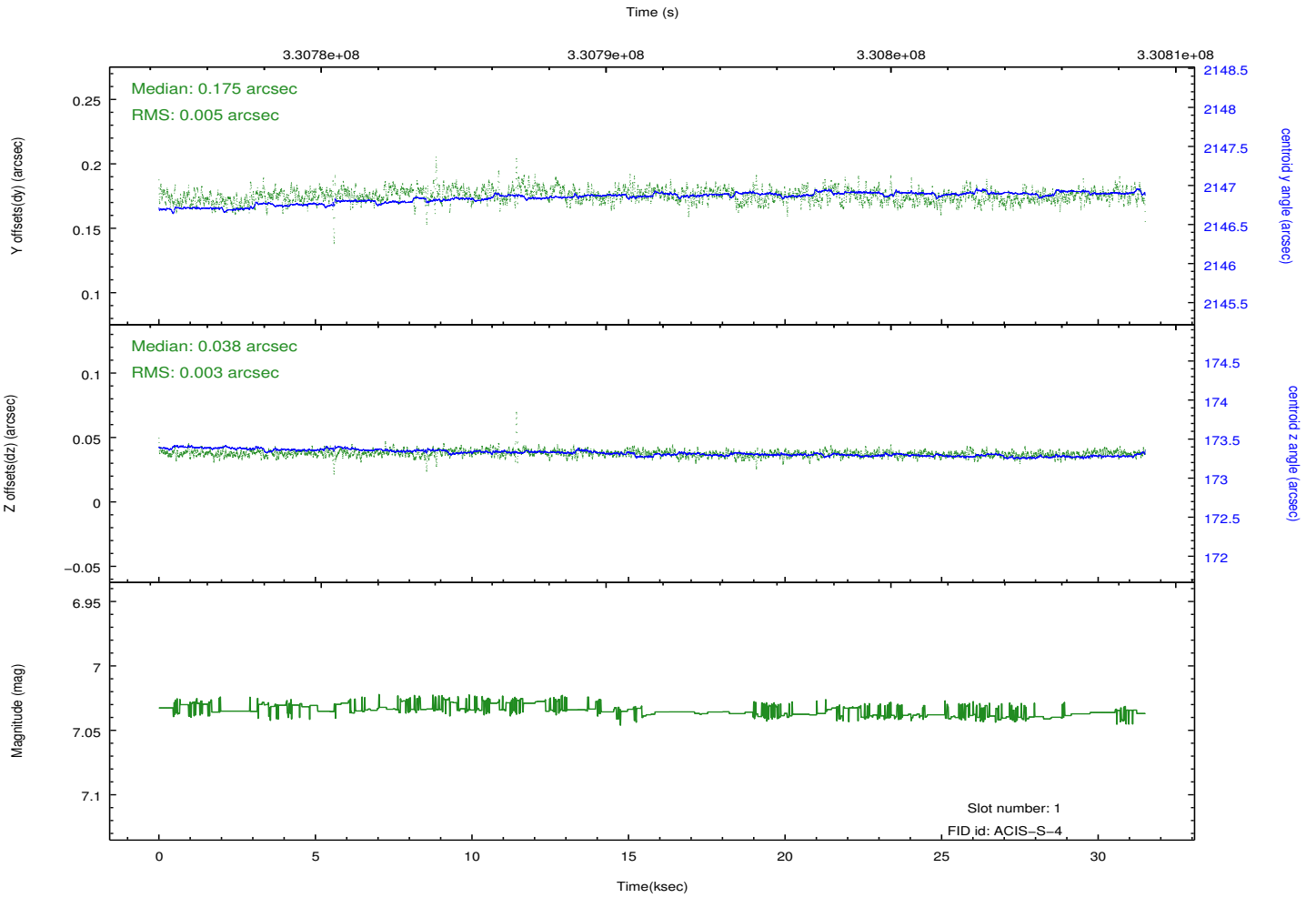
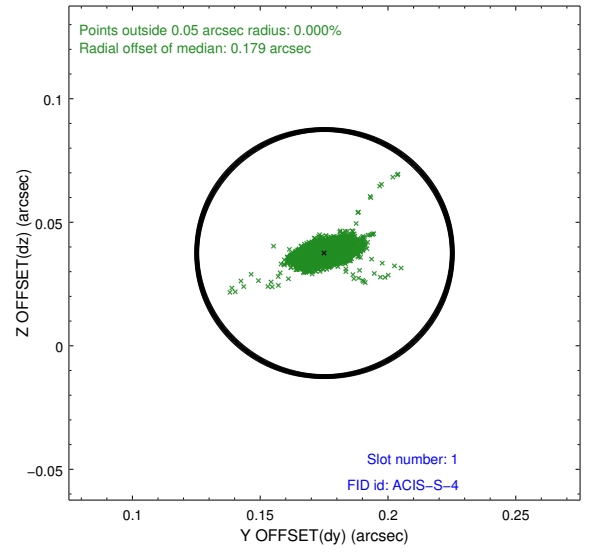
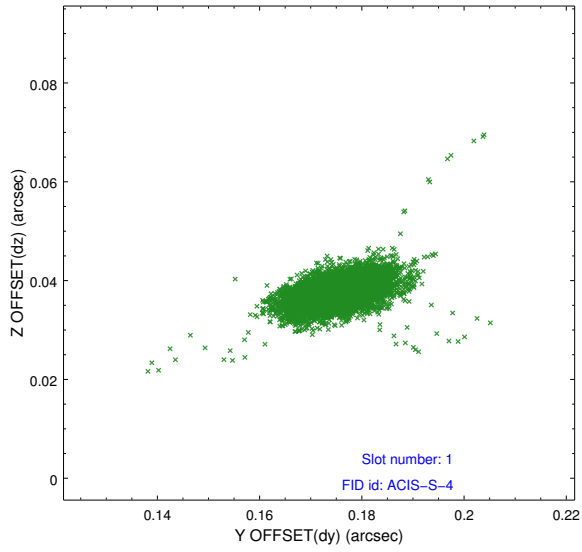


## 2.5 FID Slots

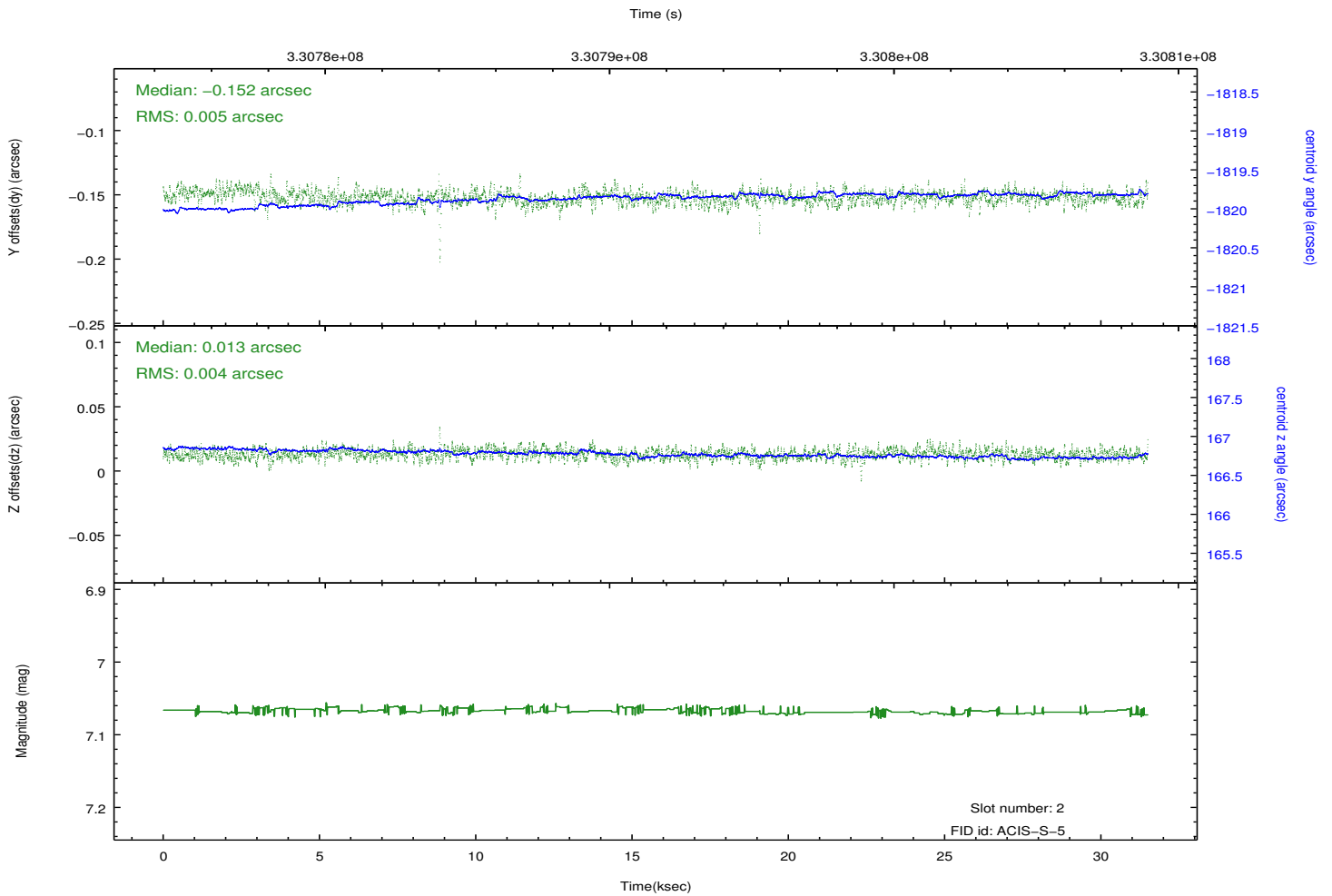
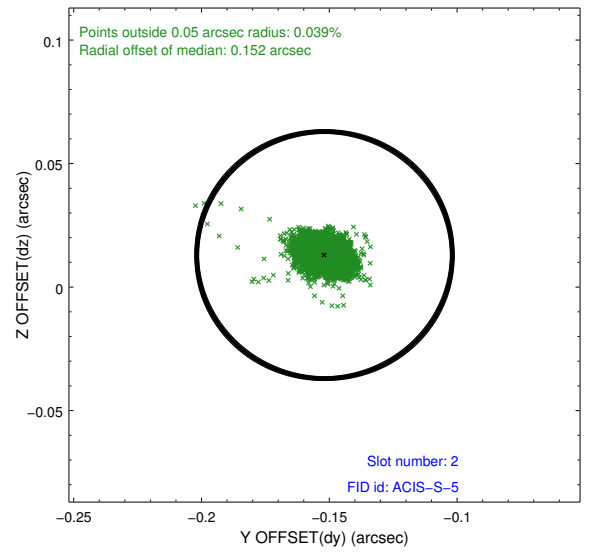
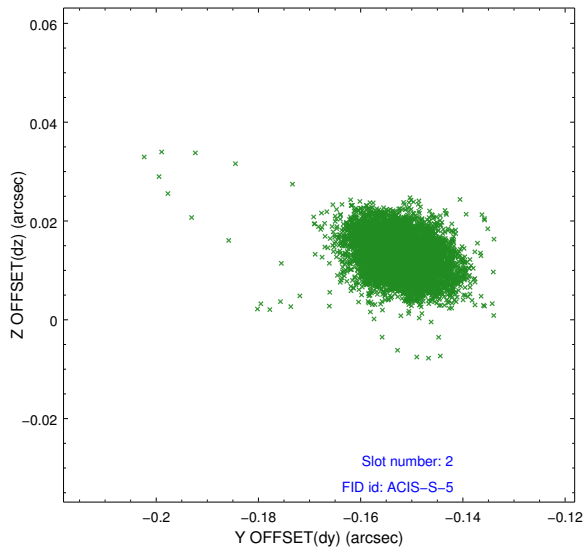
### 2.5.1 Slot 0



## 2.5.2 Slot 1



### 2.5.3 Slot 2



# A Summary

## A.1 Status

V&V Scientist	Beth Sundheim
V&V Date (YYYY-MM-DD)	2012.05.23
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	31.0719998

## A.2 Comments