

# V&V Reference Report

## L2 ASCDS Version : 8.4.4

Observation 9095 - L2 Version 2  
Chandra X-Ray Center

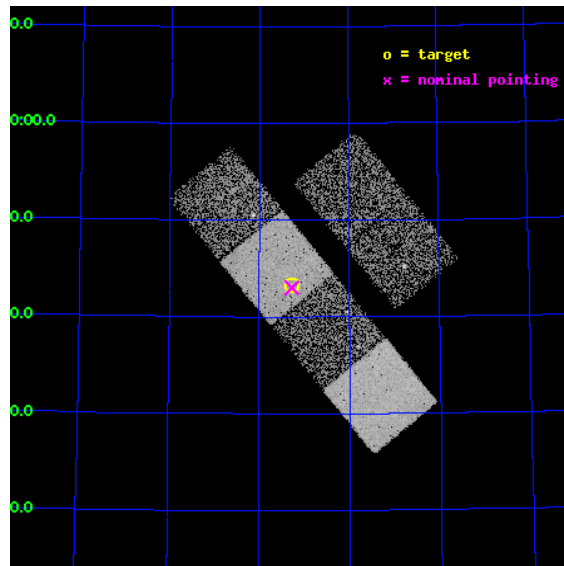
L2 Processing Date : May 7 2012

## Contents

<b>1</b>	<b>Front</b>	<b>2</b>
<b>2</b>	<b>OBI</b>	<b>3</b>
2.1	OBI . . . . .	3
2.1.1	Images . . . . .	3
2.1.2	Bias . . . . .	3
2.1.3	Parameters . . . . .	4
2.1.4	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
<b>A</b>	<b>Summary</b>	<b>17</b>
A.1	Status . . . . .	17
A.2	Comments . . . . .	17

# 1 Front

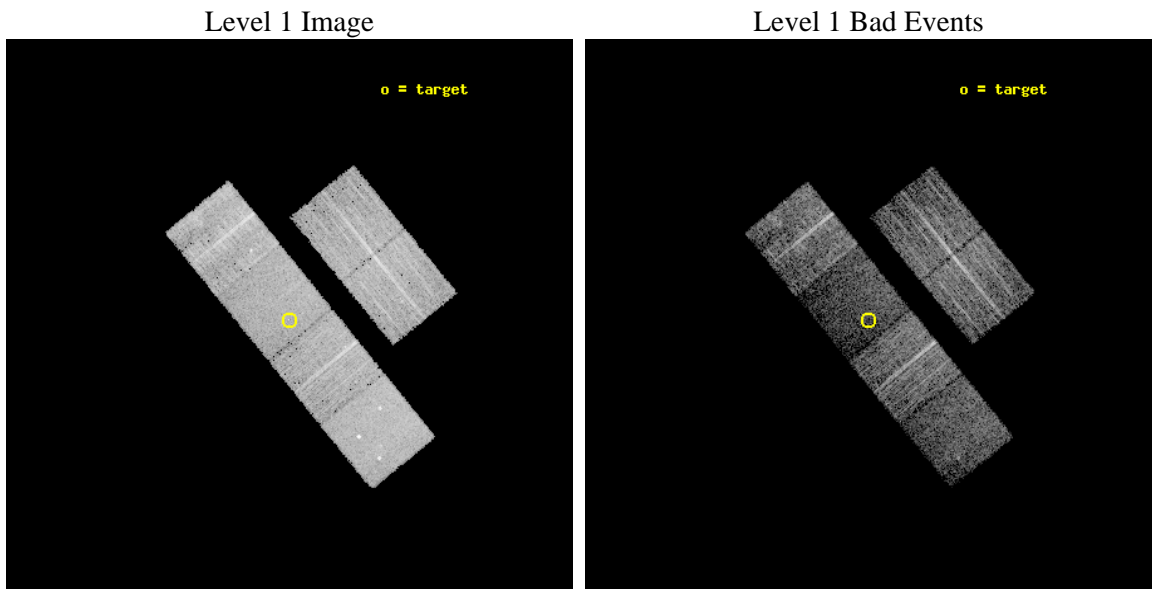
seq_num	500958	Sequence number
obs_id	9095	Observation id
title	Chandra Observations of Young, Energetic Supernovae	Proposal title
observer	Prof. David Pooley	Principal investigator
object	SN 2005kd	Source name
dtycycle	0	&#160
cycle	P	events from which exps? Prim/Second/Both
ra_targ	60.820417	Observer's specified target RA [deg]
dec_targ	71.721917	Observer's specified target Dec [deg]
ra_nom	60.818662748121	Nominal RA [deg]
dec_nom	71.717053844239	Nominal Dec [deg]
roll_nom	230.79102847377	Nominal Roll [deg]
revision	2	Processing version of data
ontime	5039.9999812841	Sum of GTIs [s]
livetime	4976.1804667975	Livetime [s]
ontime2	5039.9999812841	Sum of GTIs [s]
ontime3	5039.9999812841	Sum of GTIs [s]
ontime5	5039.9999812841	Sum of GTIs [s]
ontime6	5039.9999812841	Sum of GTIs [s]
ontime7	5039.9999812841	Sum of GTIs [s]
ontime8	5039.9999812841	Sum of GTIs [s]
l2events	55719	Number of level 2 events



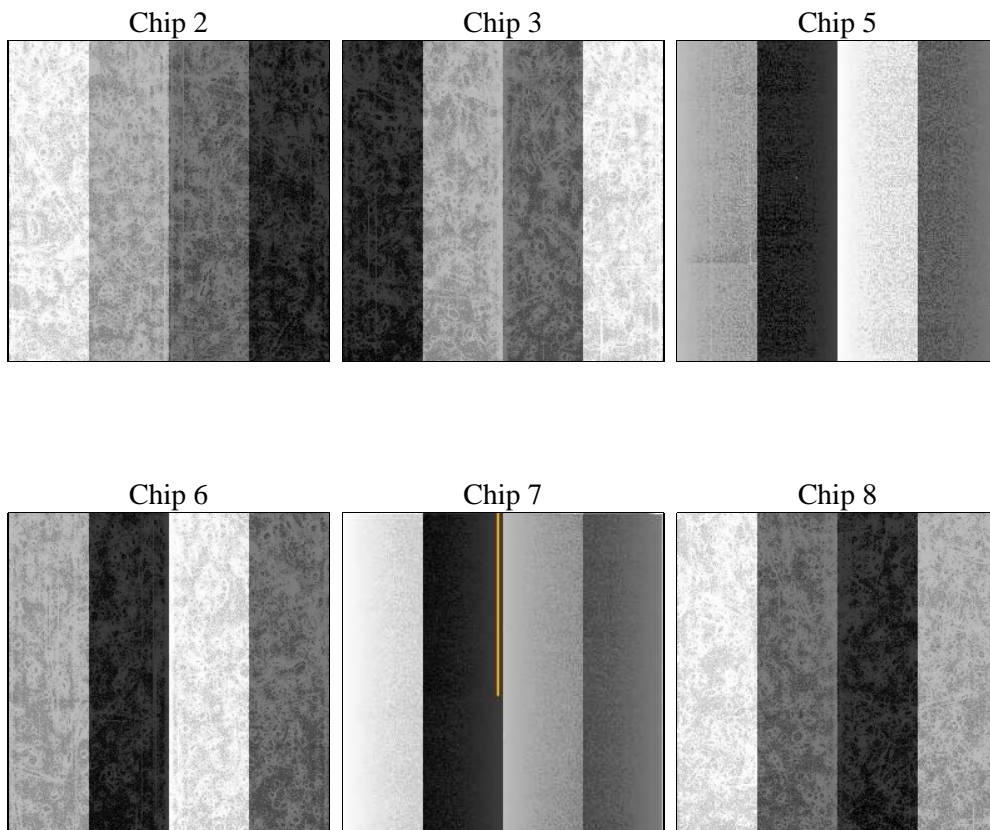
## 2 OBI

### 2.1 OBI

#### 2.1.1 Images



#### 2.1.2 Bias



### 2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	5000.000000	[s] Scheduled observation exposure time
ascdsver	8.4.4	Processing system revision	ontime	5039.9999812841	Sum of GTIs [s]
caldbver	4.4.9	&#160	ontime2	5039.9999812841	Sum of GTIs [s]
date	2012-05-07T14:34:39	Date and time of file creation	ontime3	5039.9999812841	Sum of GTIs [s]
revision	2	Processing version of data	ontime5	5039.9999812841	Sum of GTIs [s]
			ontime6	5039.9999812841	Sum of GTIs [s]
			ontime7	5039.9999812841	Sum of GTIs [s]
			ontime8	5039.9999812841	Sum of GTIs [s]
			l1events	260501	Number of level 1 events

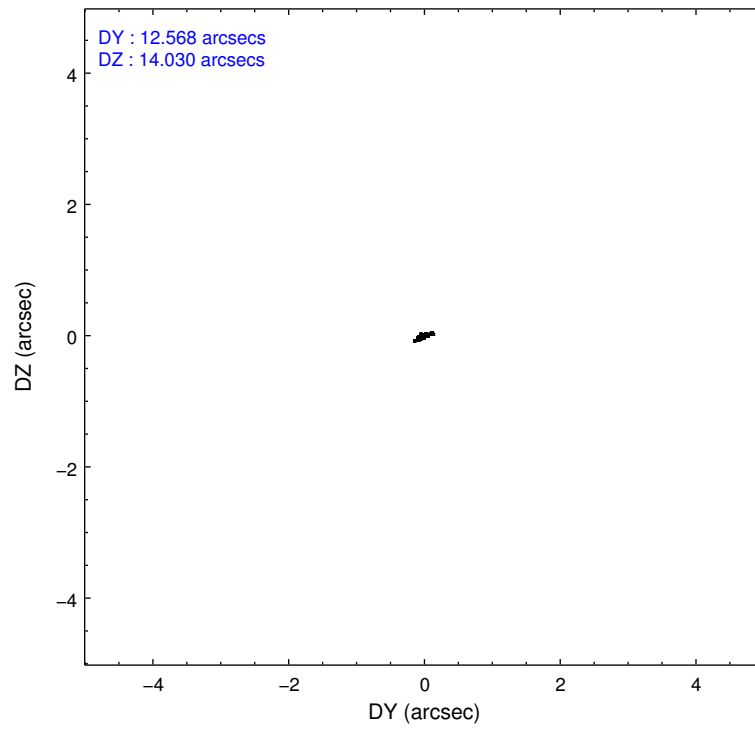
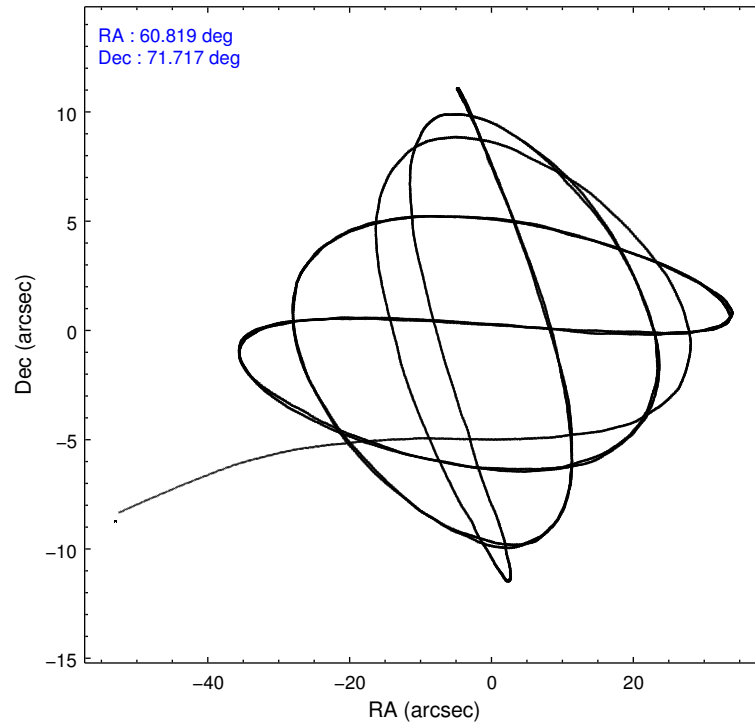
### 2.1.4 Events

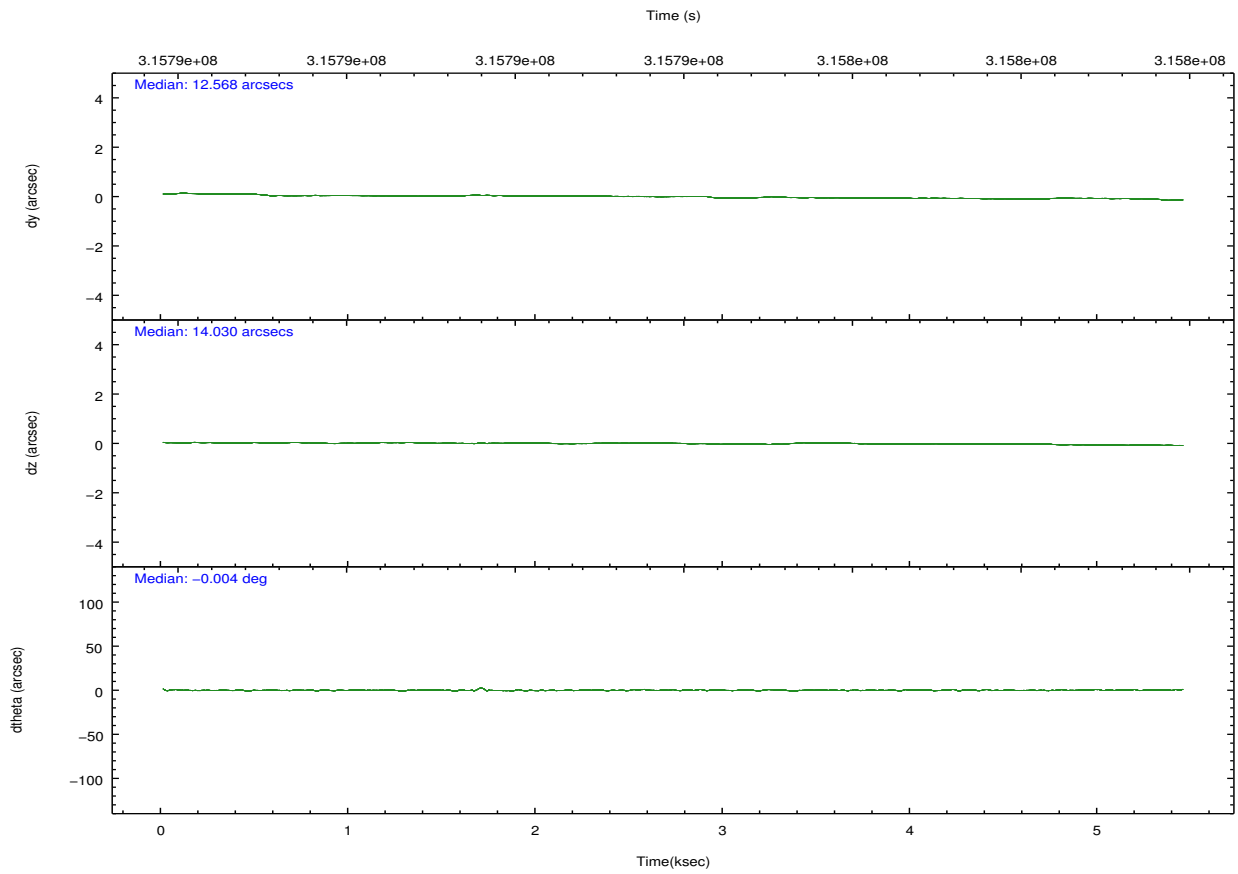
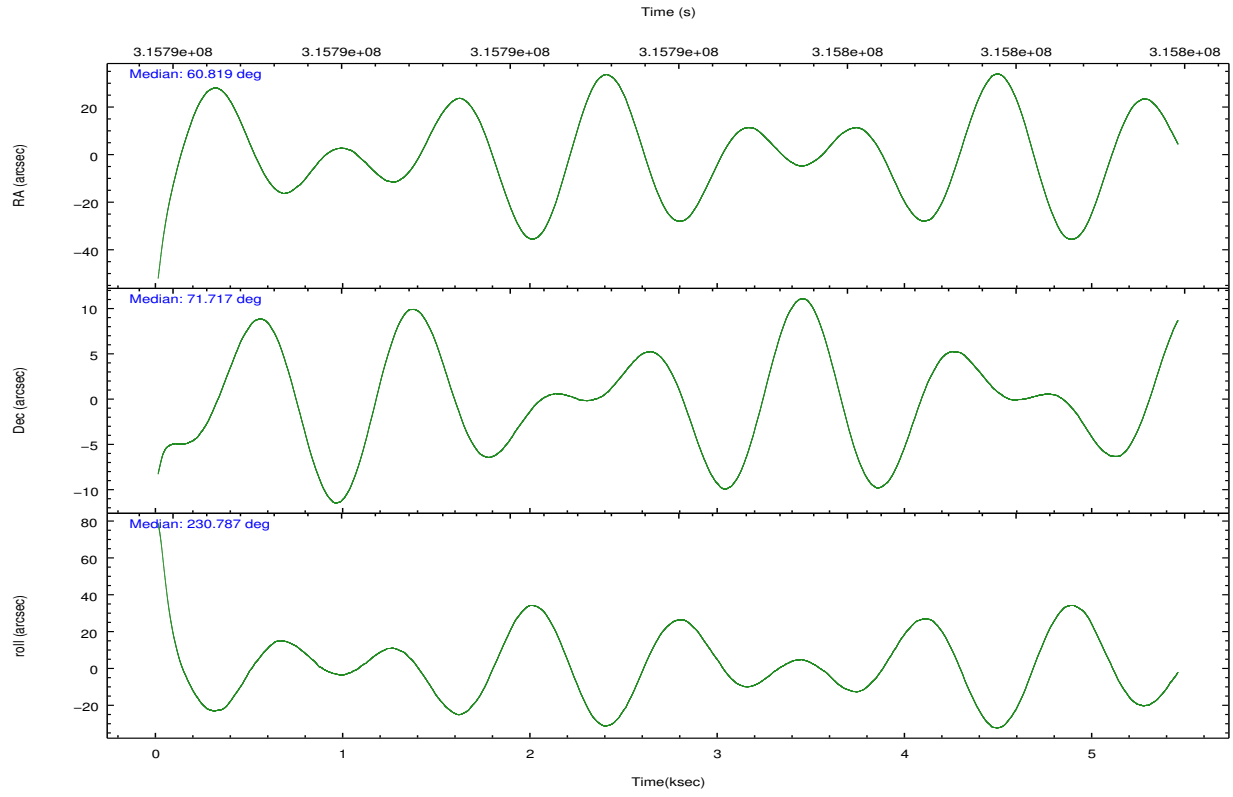
	ccd 2	ccd 3	ccd 5	ccd 6	ccd 7	ccd 8		ccd 2	ccd 3	ccd 5	ccd 6	ccd 7	ccd 8
level 1 events	43342	38907	49627	41202	37451	49972	grade 0 events	1502	1297	3074	1542	1897	3576
rejected events	39418	35372	23476	37090	19010	37516		3%	3%	6%	3%	5%	7%
rejected %	90%	90%	47%	90%	50%	75%	grade 1 events	31	20	113	24	62	36
								0%	0%	0%	0%	0%	0%
							grade 2 events	908	780	7681	912	3940	2937
								2%	2%	15%	2%	10%	5%
							grade 3 events	411	400	1181	418	1729	1327
								0%	1%	2%	1%	4%	2%
							grade 4 events	426	375	1165	446	1739	1215
								0%	0%	2%	1%	4%	2%
							grade 5 events	1145	1332	4105	1344	3845	2010
								2%	3%	8%	3%	10%	4%
							grade 6 events	680	688	13059	796	9166	3402
								1%	1%	26%	1%	24%	6%
							grade 7 events	38239	34015	19249	35720	15073	35469
								88%	87%	38%	86%	40%	70%

## 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	VFAINT	VFAINT	CCD I0 on	N	N
Observation mode	POINTING	POINTING	CCD I1 on	N	N
[deg] Pointing RA	60.831173	60.81866274812072	CCD I2 on	O1	Y
[deg] Pointing Dec	71.744163	71.71705384423873	CCD I3 on	O2	Y
[deg] Pointing Roll	230.622460	230.7910284737717	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	-190.1400660498719	CCD S3 on	Y	Y
[mm] SIM translation stage offset	0	0.00754346686406393	CCD S4 on	Y	Y
[s] Observation start time (MET)	315791661.184000	315790513.31536	CCD S5 on	N	N
Observation start date	2008-01-03T23:53:16	2008-01-03T23:35:13	Number of optional ACIS chips dropped	0	0
[s] Observation end time (MET)	315796661.184000	315797464.8657	On-chip summing requested	N	N
Observation end date	2008-01-04T01:16:36	2008-01-04T01:31:04	Subarray requested	NONE	NONE
Read mode	TIMED	TIMED	Alternating exposures requested	N	N
			[s] Primary exposure time	0.000000	3.2

## 2.3 Aspect



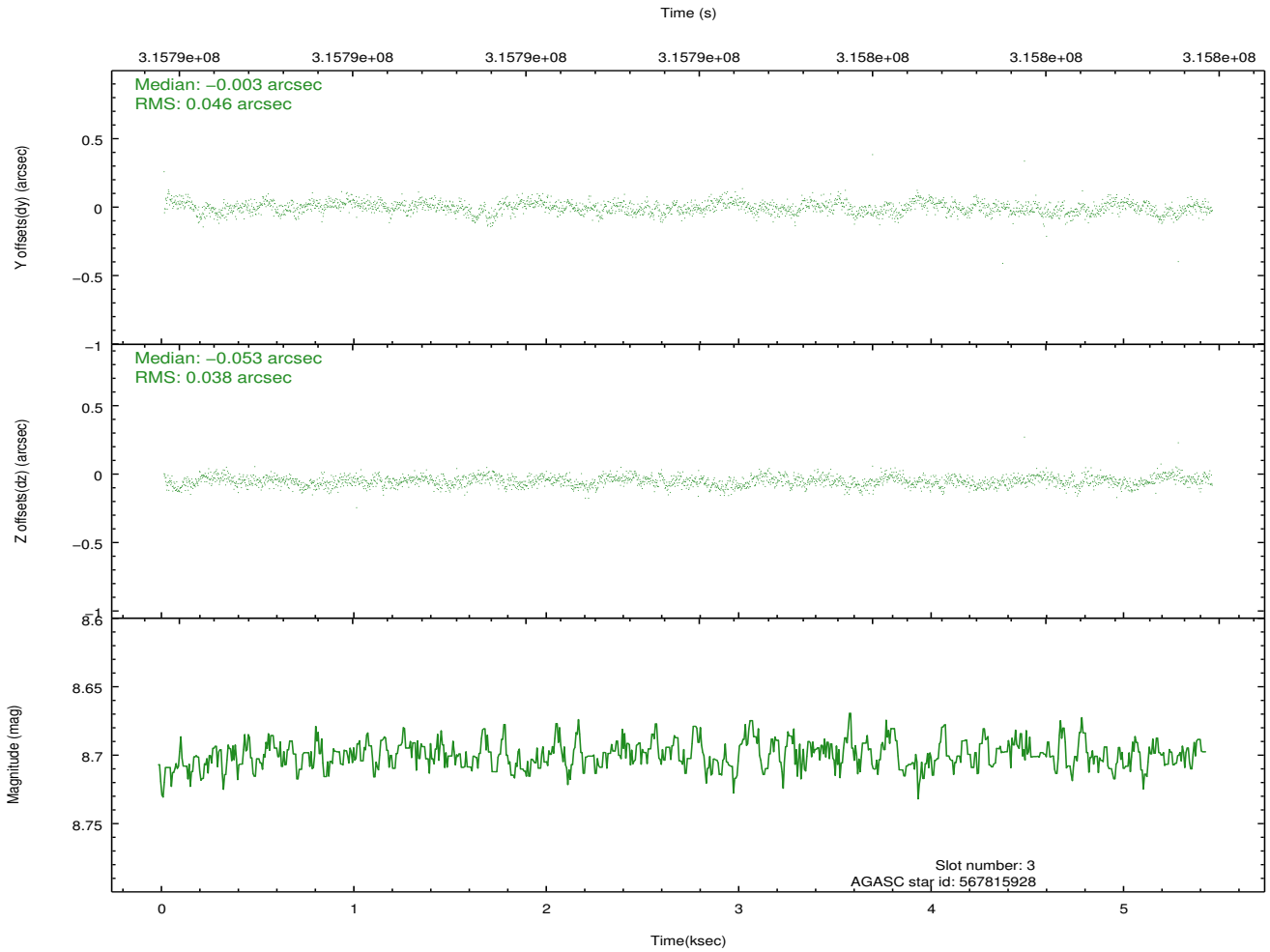
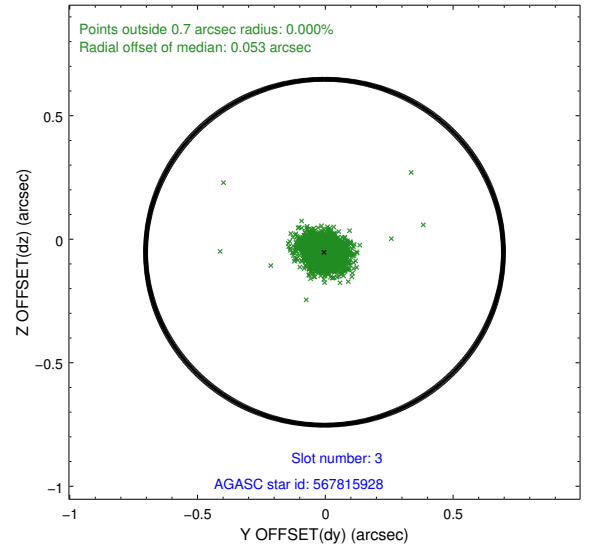
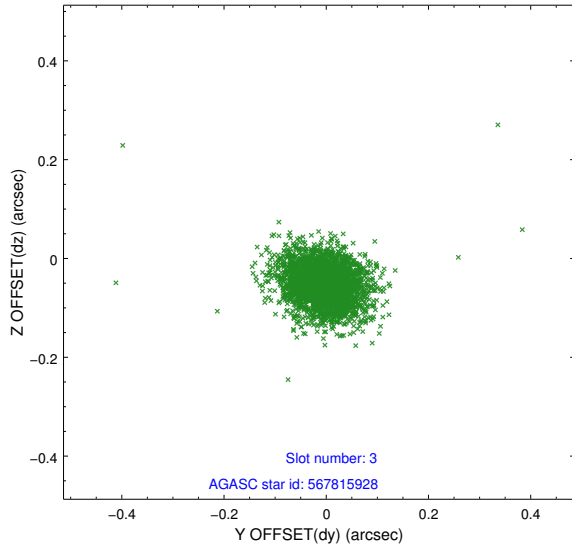


### Slot Statistics

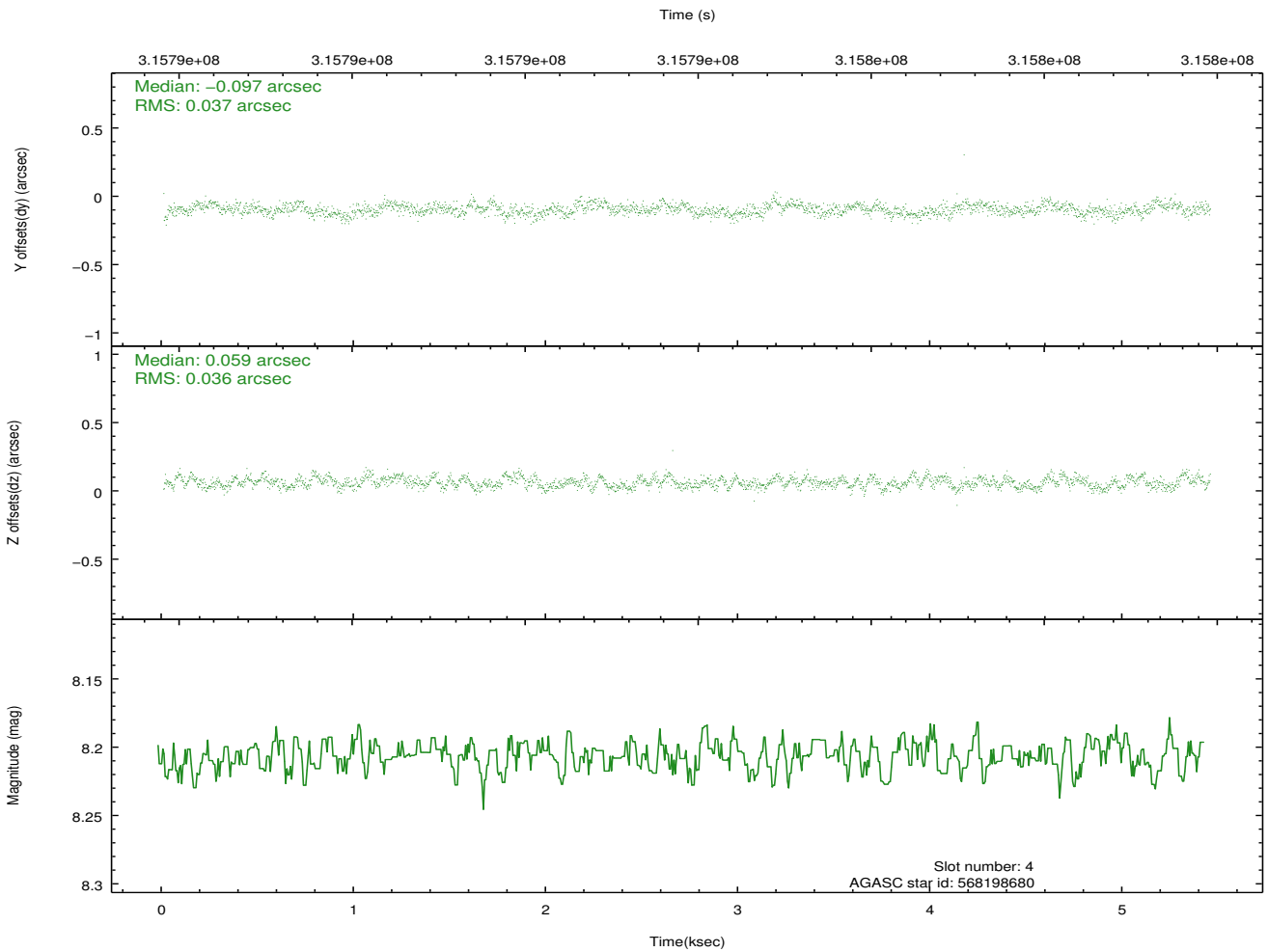
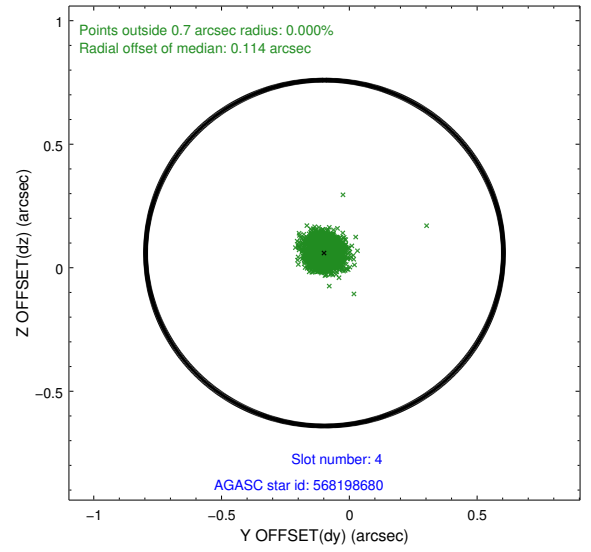
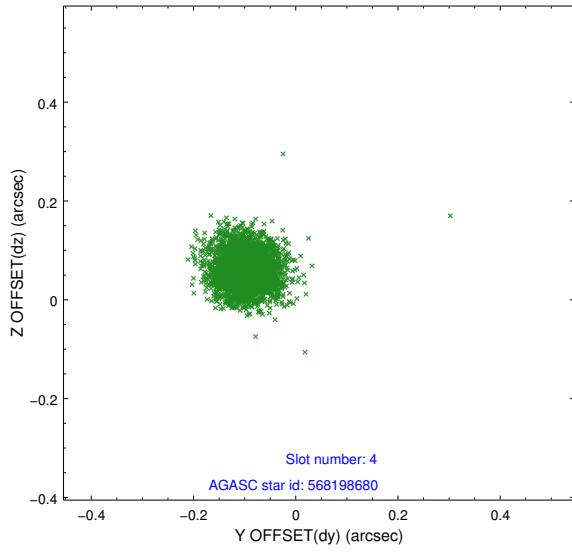
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-S-2	7.09	1329	-0.039	-0.047	0.006	0.011	0.000000	0.000000	-765.48	-1735.43
1	FID	ACIS-S-4	7.19	1329	0.144	0.031	0.007	0.014	0.000000	0.000000	2147.46	172.01
2	FID	ACIS-S-5	7.23	1329	-0.136	0.024	0.007	0.012	0.000000	0.000000	-1817.02	166.90
3	GUIDE	567815928	8.70	2657	-0.003	-0.053	0.060	0.101	60.409658	71.196836	1832.39	870.91
4	GUIDE	568198680	8.21	2655	-0.097	0.059	0.055	0.086	59.410139	71.449860	1837.60	-597.57
5	GUIDE	568213952	6.59	2658	-0.014	-0.019	0.069	0.115	59.125962	71.821614	979.91	-1674.92
6	GUIDE	568333744	9.41	2653	0.011	-0.056	0.084	0.140	62.697048	71.995817	-2041.55	1009.34
7	GUIDE	568333952	9.34	2651	0.105	0.066	0.092	0.152	61.257515	72.228674	-1646.98	-745.22

## 2.4 Star Slots

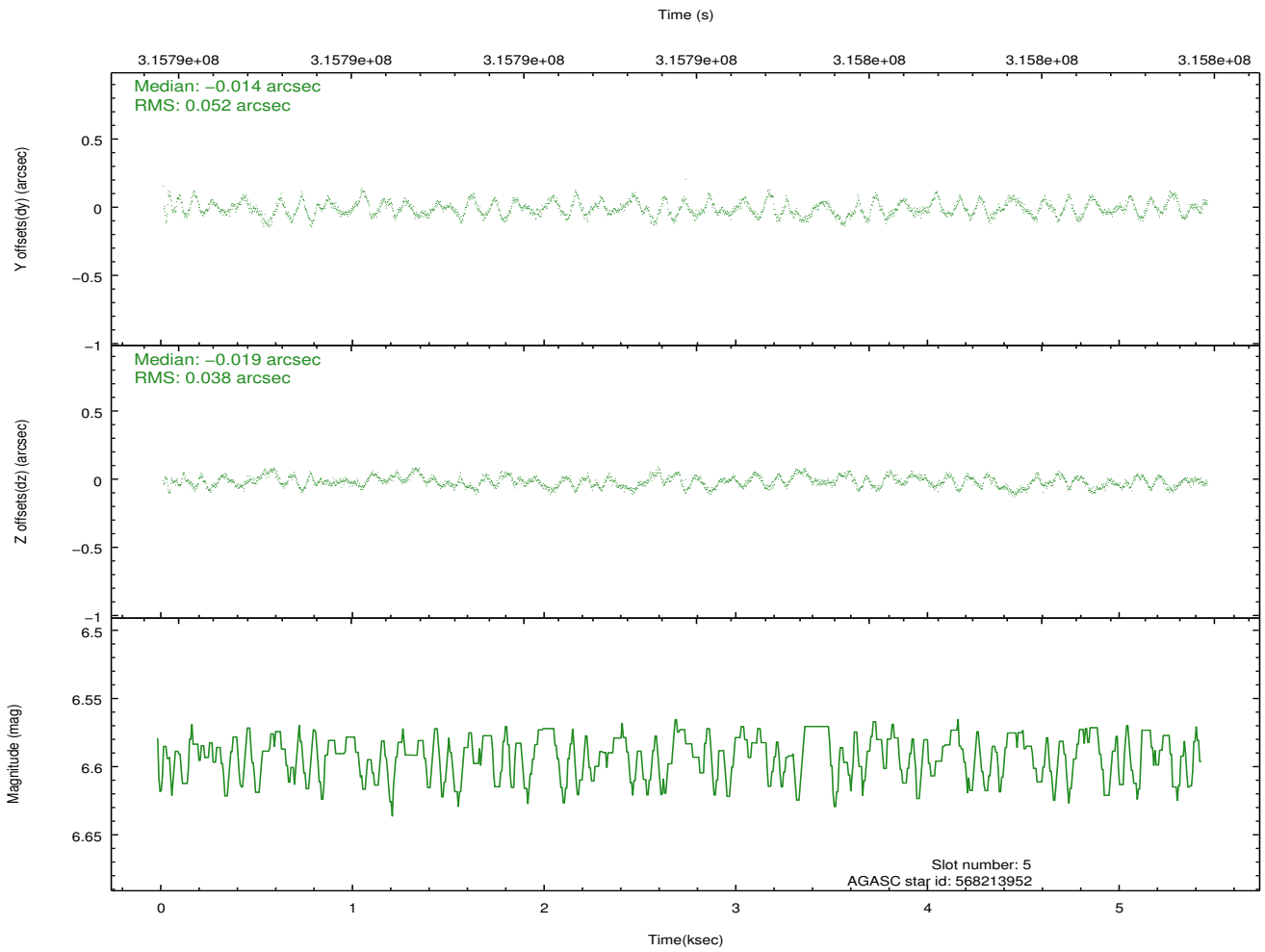
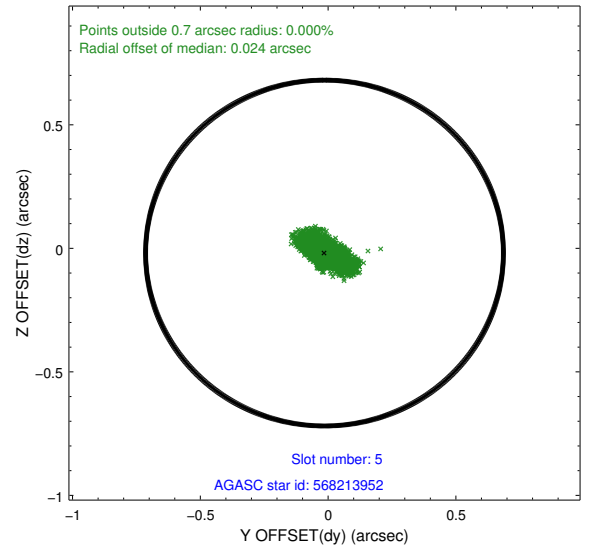
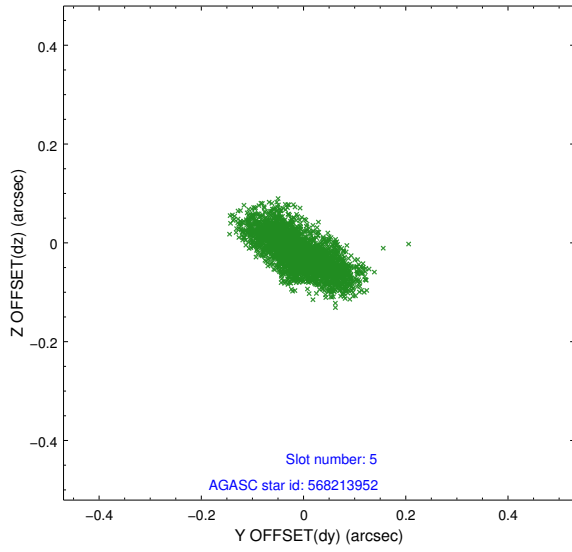
### 2.4.1 Slot 3



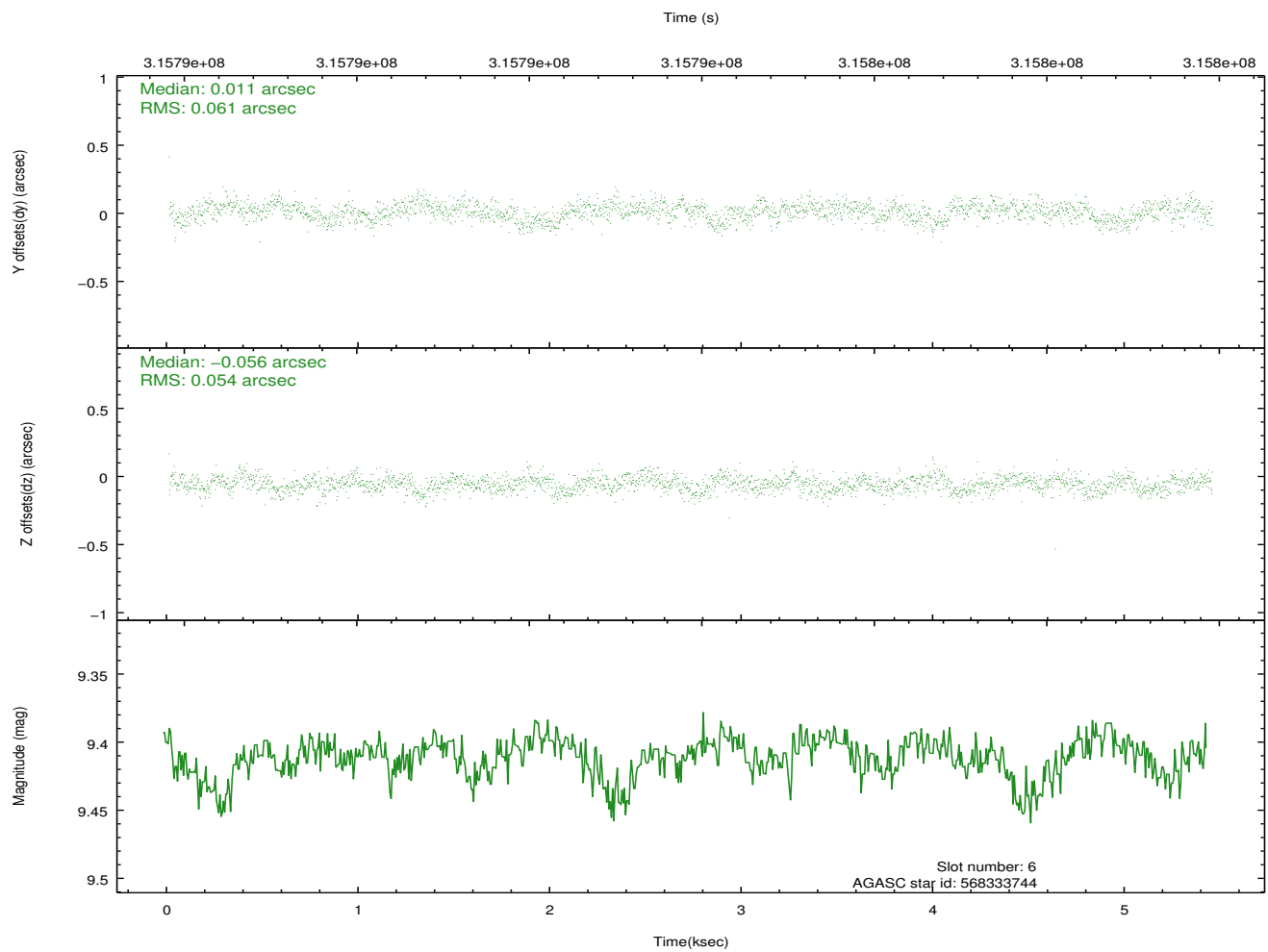
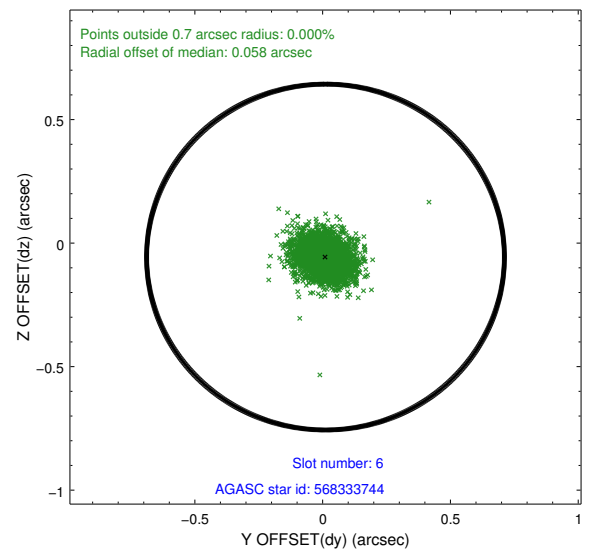
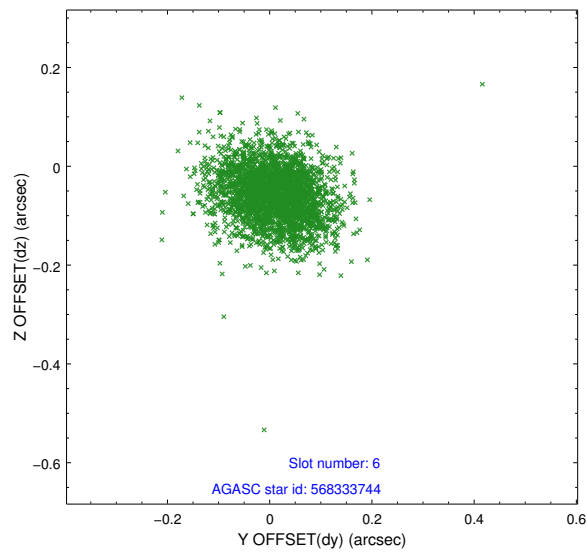
### 2.4.2 Slot 4



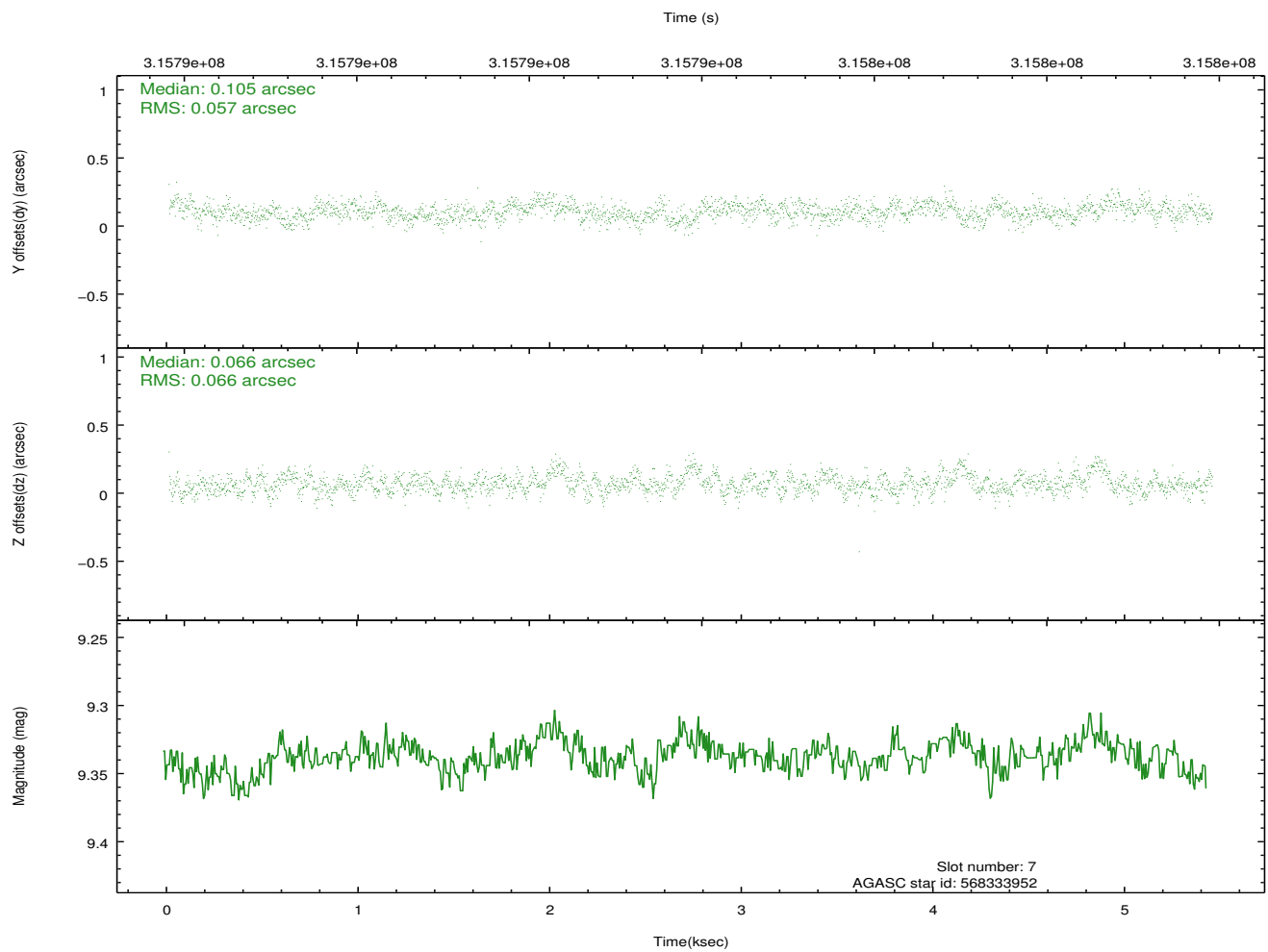
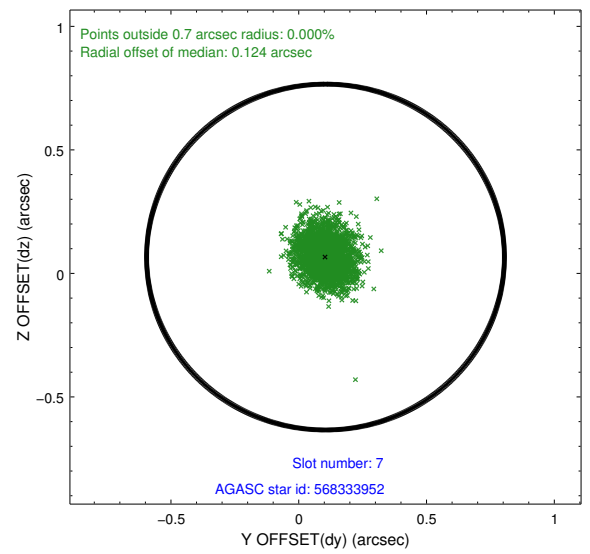
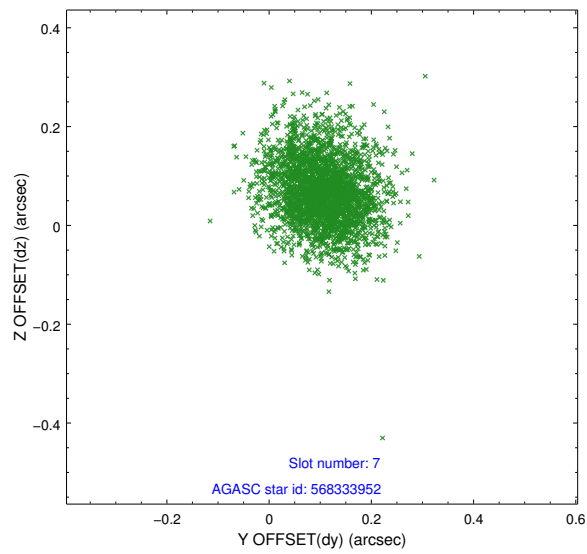
### 2.4.3 Slot 5



## 2.4.4 Slot 6

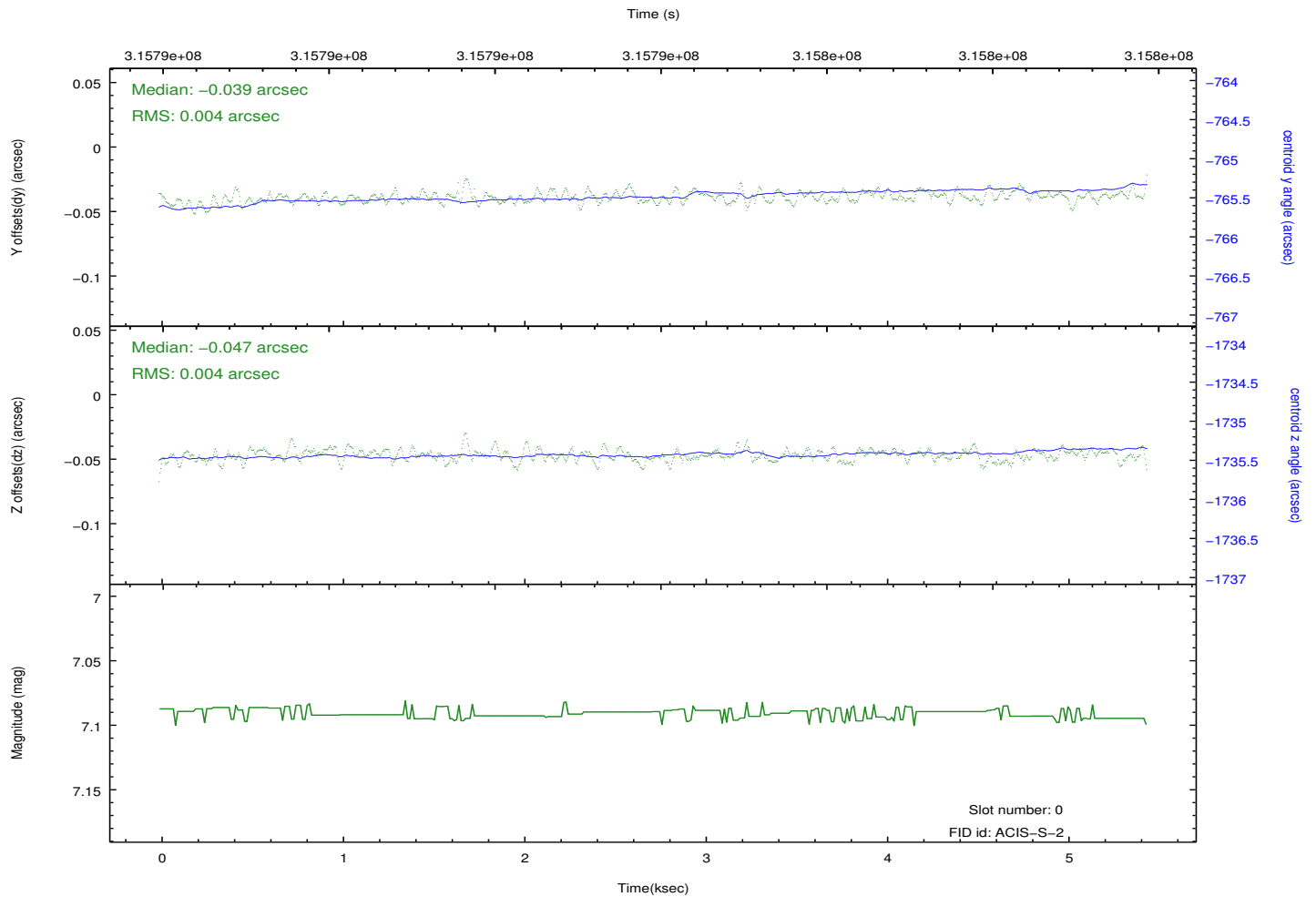
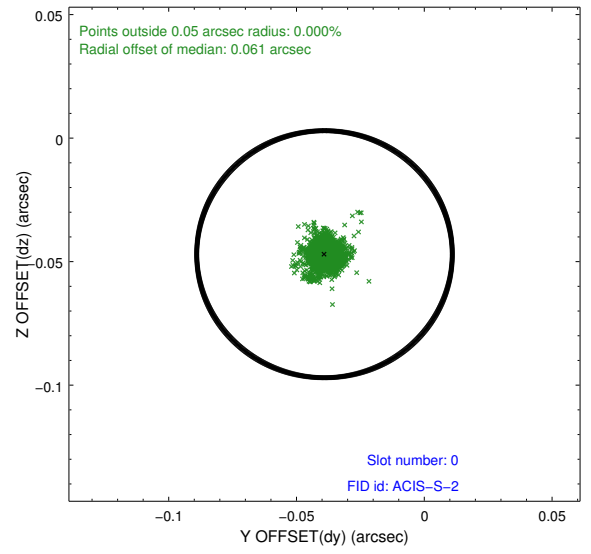
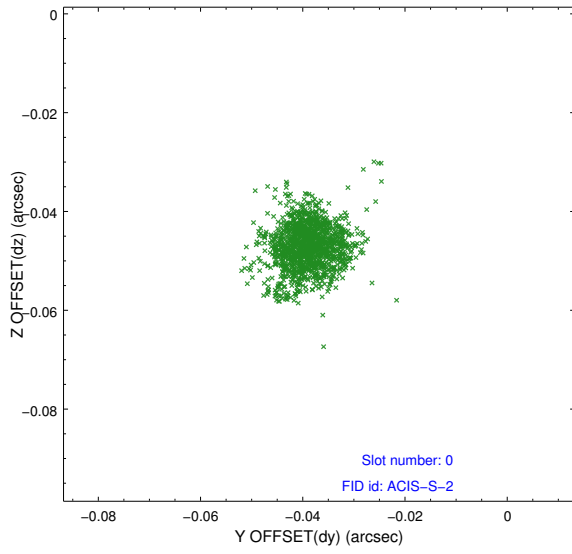


## 2.4.5 Slot 7

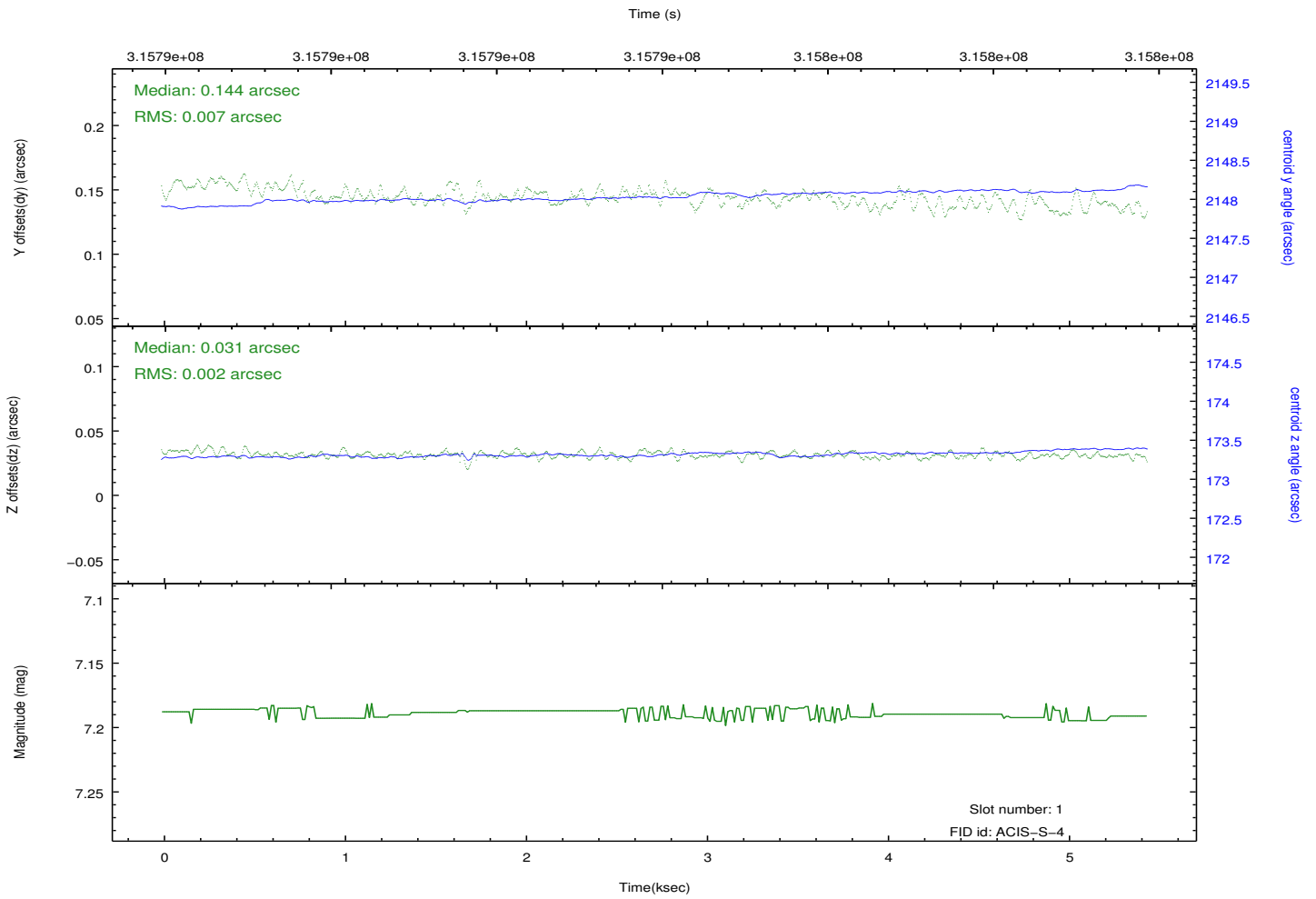
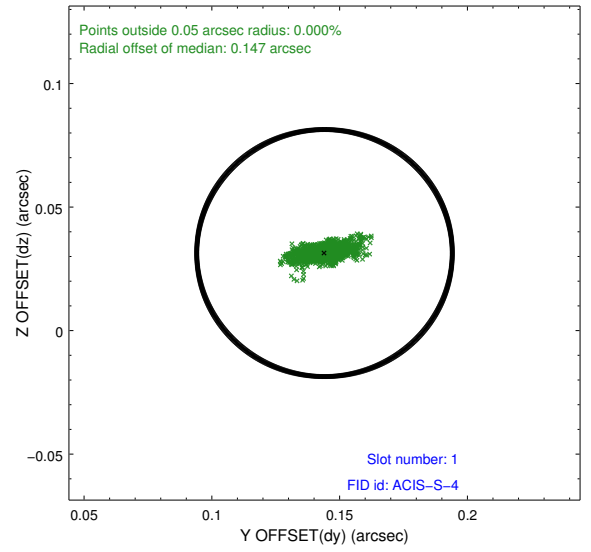
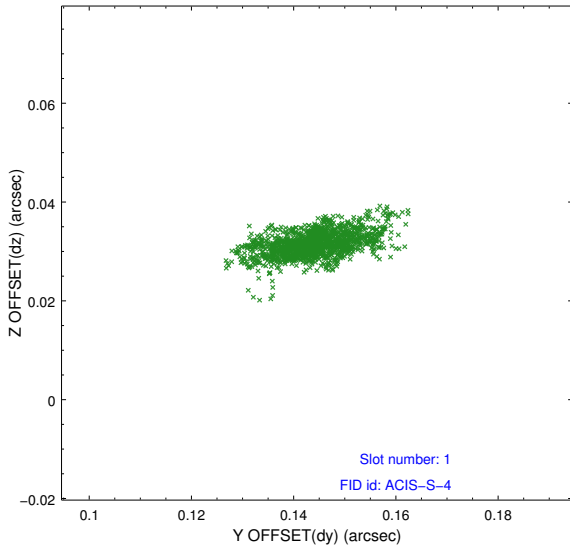


## 2.5 FID Slots

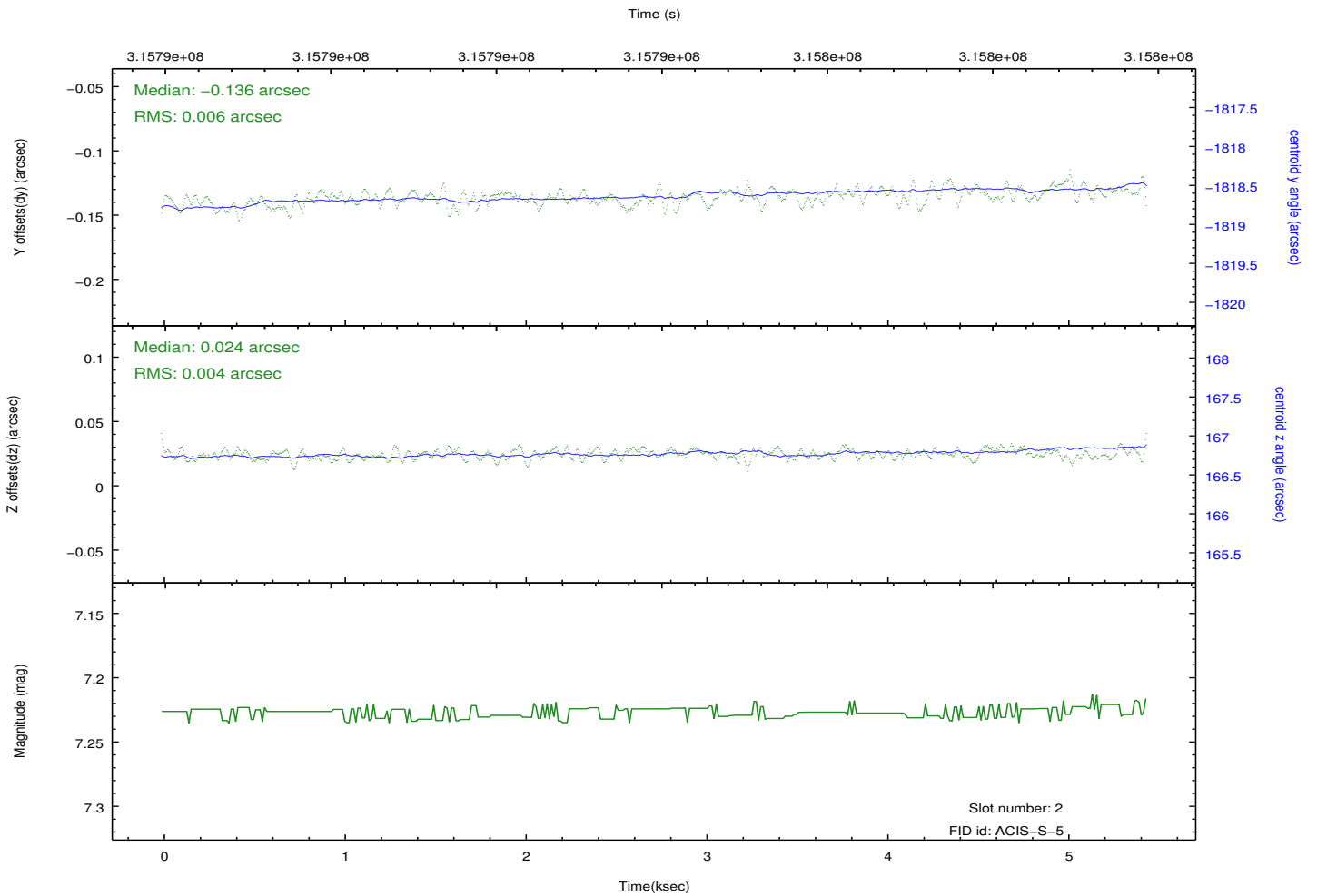
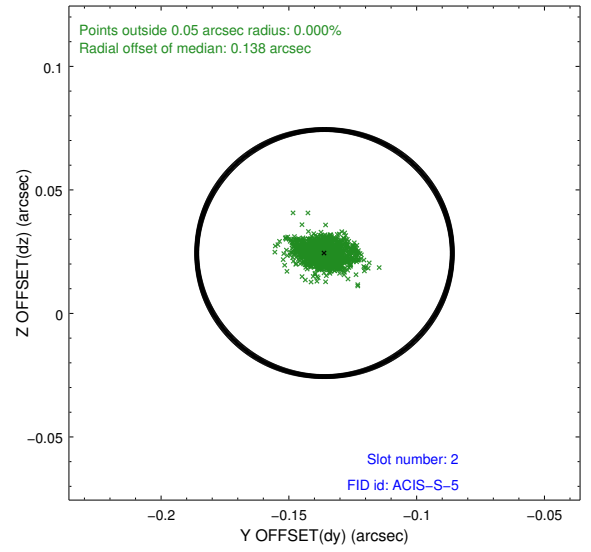
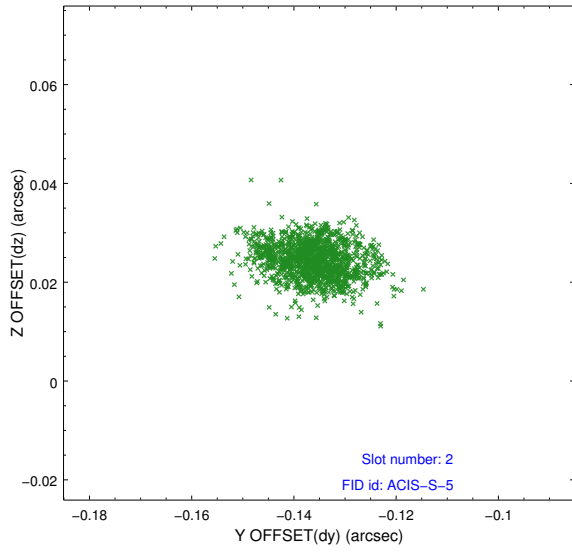
### 2.5.1 Slot 0



## 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)	2012.05.09
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	5.03999998

## A.2 Comments