

# V&V Reference Report

## L2 ASCDS Version : 8.4.4

Observation 7935 - L2 Version 2  
Chandra X-Ray Center

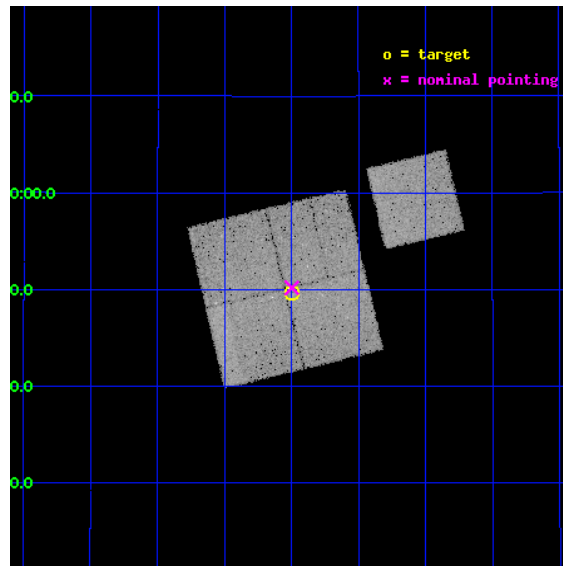
L2 Processing Date : May 1 2012

## 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

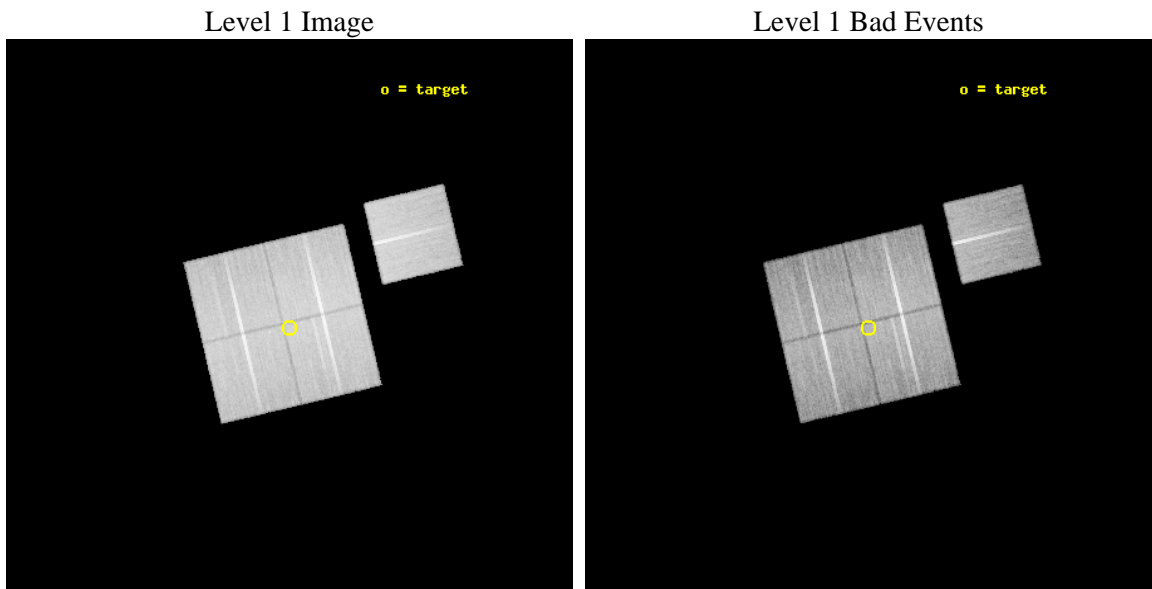
seq_num	800653	Sequence number
obs_id	7935	Observation id
title	A Complete Baryon Census in a Nearby Galaxy Group	Proposal title
observer	Dr. John Mulchaey	Principal investigator
object	NGC2563-P12	Source name
dtcycle	0	&#160
cycle	P	events from which exps? Prim/Second/Both
ra_targ	124.5	Observer's specified target RA [deg]
dec_targ	20.828389	Observer's specified target Dec [deg]
ra_nom	124.49941502687	Nominal RA [deg]
dec_nom	20.836446091972	Nominal Dec [deg]
roll_nom	76.585382036309	Nominal Roll [deg]
revision	2	Processing version of data
ontime	31127.01833868	Sum of GTIs [s]
liveltime	30720.320928708	Livetime [s]
ontime0	31127.018258989	Sum of GTIs [s]
ontime1	31133.300239444	Sum of GTIs [s]
ontime2	31120.736457825	Sum of GTIs [s]
ontime3	31127.01833868	Sum of GTIs [s]
ontime6	31130.159269094	Sum of GTIs [s]
l2events	104068	Number of level 2 events



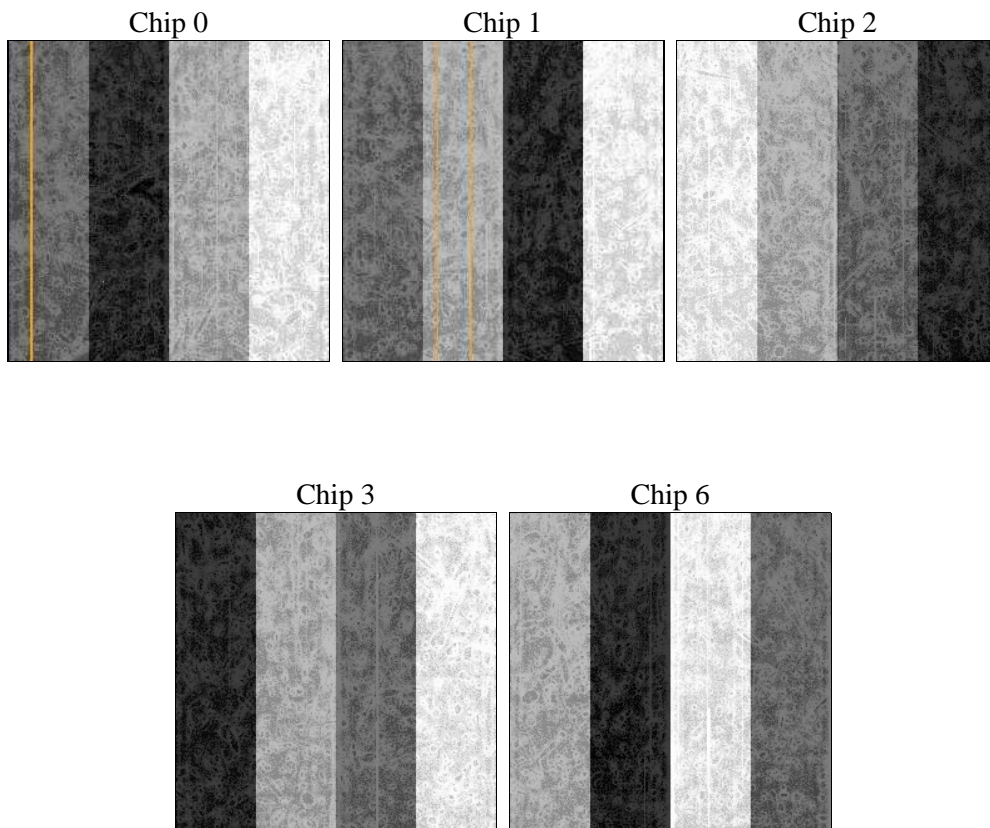
## 2 OBI

### 2.1 OBI

#### 2.1.1 Images



#### 2.1.2 Bias



### 2.1.3 Parameters

obi_num	1	Obi number	sched_exp_time	31000.000000	[s] Scheduled observation exposure time
ascdsver	8.4.4	Processing system revision	ontime	31127.01833868	Sum of GTIs [s]
caldbver	4.4.9	&#160	ontime0	31127.018258989	Sum of GTIs [s]
date	2012-05-01T22:47:51	Date and time of file creation	ontime1	31133.300239444	Sum of GTIs [s]
revision	2	Processing version of data	ontime2	31120.736457825	Sum of GTIs [s]
			ontime3	31127.01833868	Sum of GTIs [s]
			ontime6	31130.159269094	Sum of GTIs [s]
			l1events	1243922	Number of level 1 events

### 2.1.4 Events

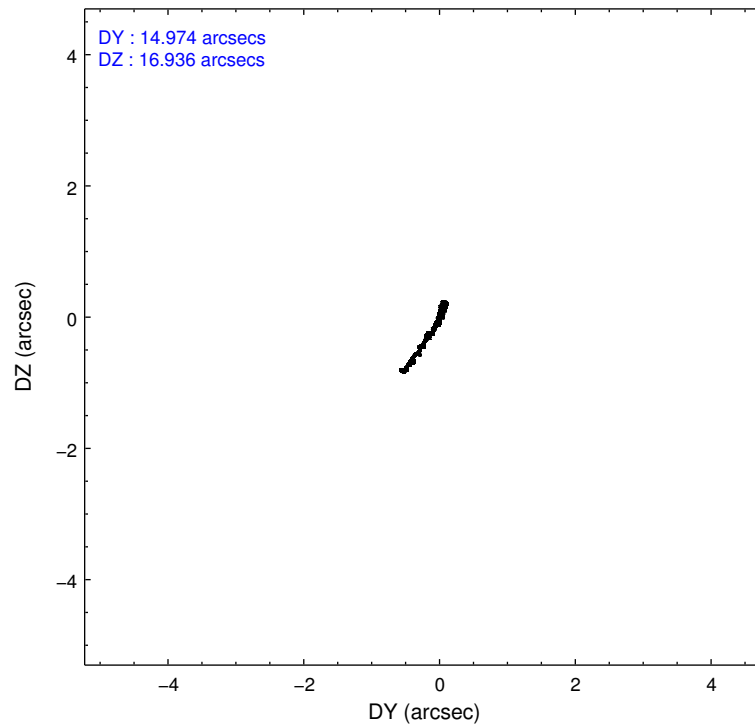
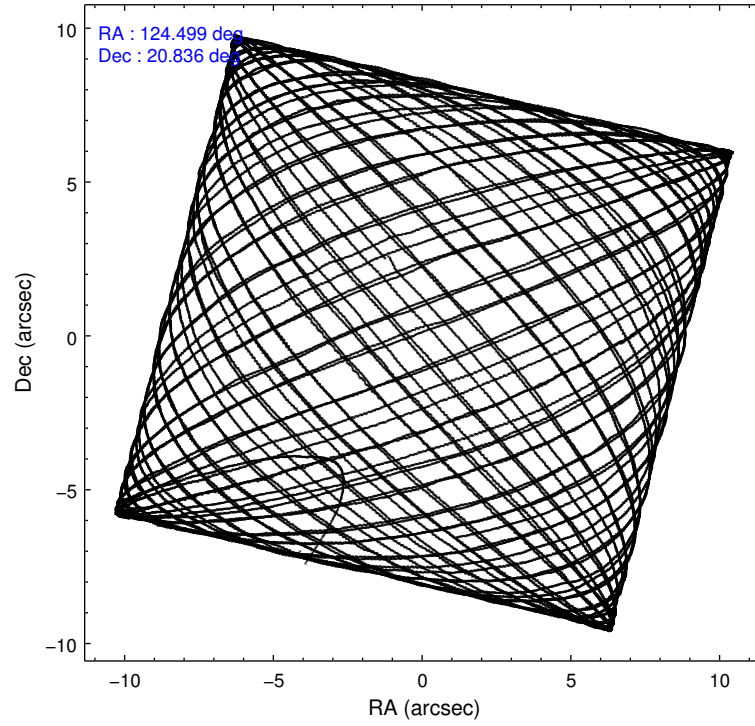
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6
level 1 events	235319	234831	268081	253817	251874
rejected events	210461	206885	243599	230573	226487
rejected %	89%	88%	90%	90%	89%

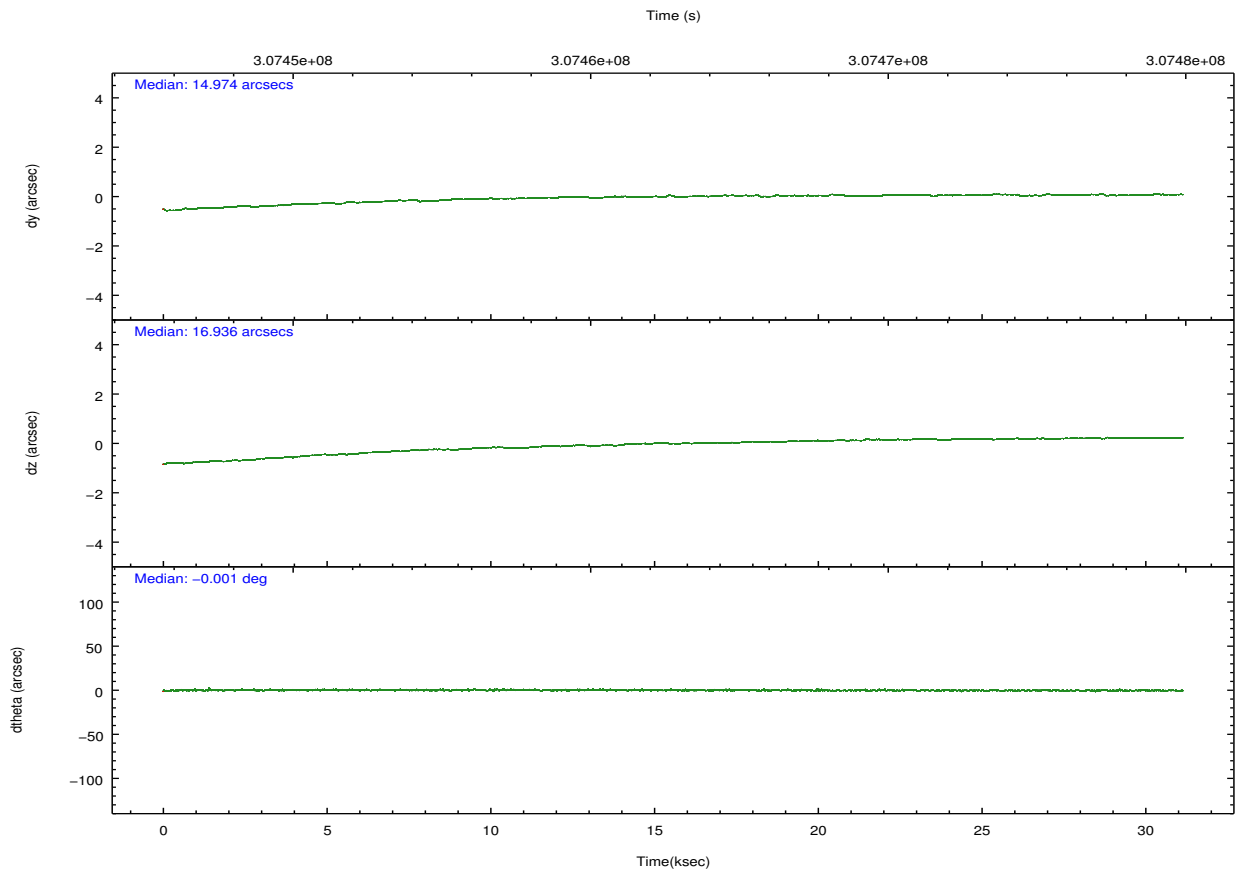
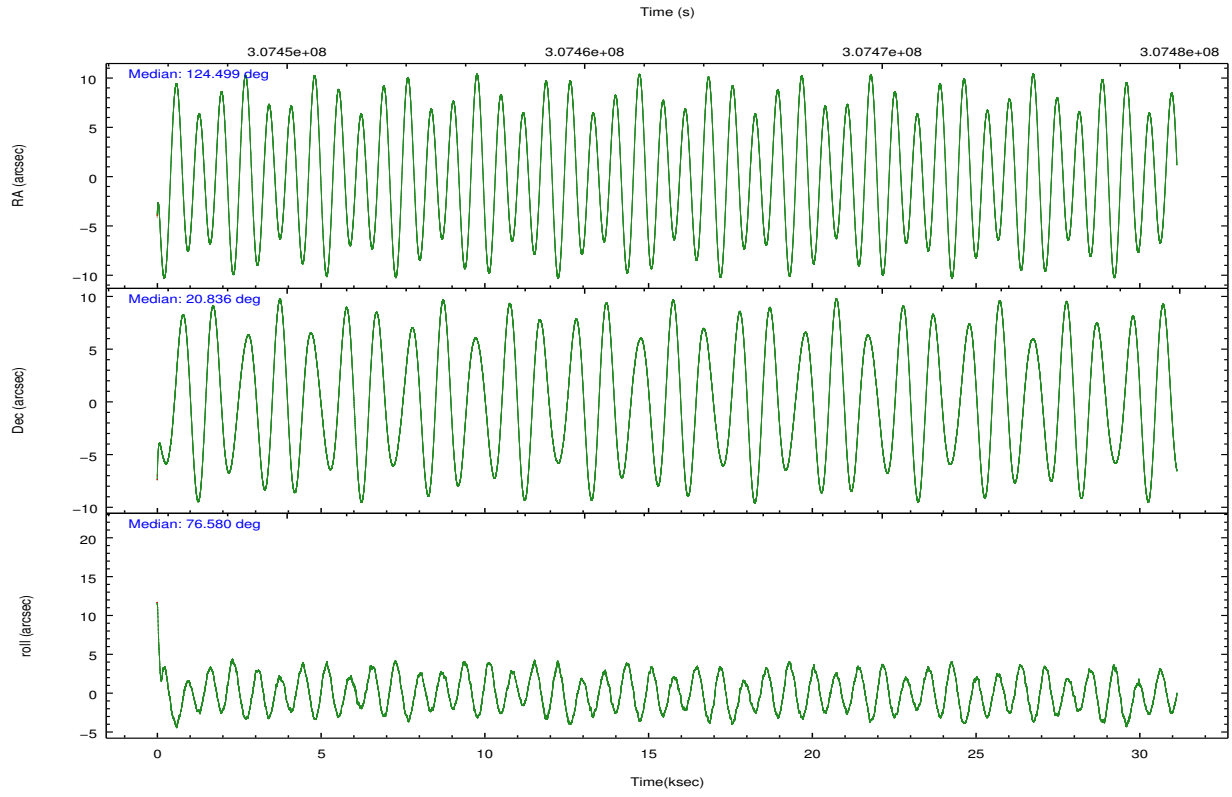
	ccd 0	ccd 1	ccd 2	ccd 3	ccd 6
grade 0 events	8683	10316	8850	8080	8719
	3%	4%	3%	3%	3%
grade 1 events	125	139	152	145	129
	0%	0%	0%	0%	0%
grade 2 events	6036	6420	5897	5279	5820
	2%	2%	2%	2%	2%
grade 3 events	2814	3032	2775	2763	2836
	1%	1%	1%	1%	1%
grade 4 events	2731	2903	2622	2670	2778
	1%	1%	0%	1%	1%
grade 5 events	8824	9667	8150	10232	10121
	3%	4%	3%	4%	4%
grade 6 events	4900	5650	4662	4788	5589
	2%	2%	1%	1%	2%
grade 7 events	201206	196704	234973	219860	215882
	85%	83%	87%	86%	85%

## 2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-01236	ACIS-01236	Obspar file type	PREDICTED	ACTUAL
Grating	NONE	NONE	Obspar update status	NONE	UPDATED
Data mode	VFAINT	VFAINT	CCD I0 on	Y	Y
Observation mode	POINTING	POINTING	CCD I1 on	Y	Y
[deg] Pointing RA	124.507927	124.499415026867	CCD I2 on	Y	Y
[deg] Pointing Dec	20.810126	20.8364460919717	CCD I3 on	Y	Y
[deg] Pointing Roll	76.373665	76.58538203630904	CCD S0 on	N	N
[mm] SIM focus pos	-0.782348	-0.7809083437167272	CCD S1 on	N	N
[mm] SIM defocus	0	0.001439871863259334	CCD S2 on	O1	Y
[mm] SIM translation stage pos	-233.592463	-233.5874344608287	CCD S3 on	N	N
[mm] SIM translation stage offset	0	-0.005018542100998502	CCD S4 on	N	N
[s] Observation start time (MET)	307447334.184000	307446155.49992	CCD S5 on	N	N
Observation start date	2007-09-29T10:01:09	2007-09-29T09:42:35	Number of optional ACIS chips dropped	0	0
[s] Observation end time (MET)	307478334.184000	307479446.98902	On-chip summing requested	N	N
Observation end date	2007-09-29T18:37:49	2007-09-29T18:57:26	Subarray requested	NONE	NONE
Read mode	TIMED	TIMED	Alternating exposures requested	N	N
			[s] Primary exposure time	0.000000	3.1

## 2.3 Aspect



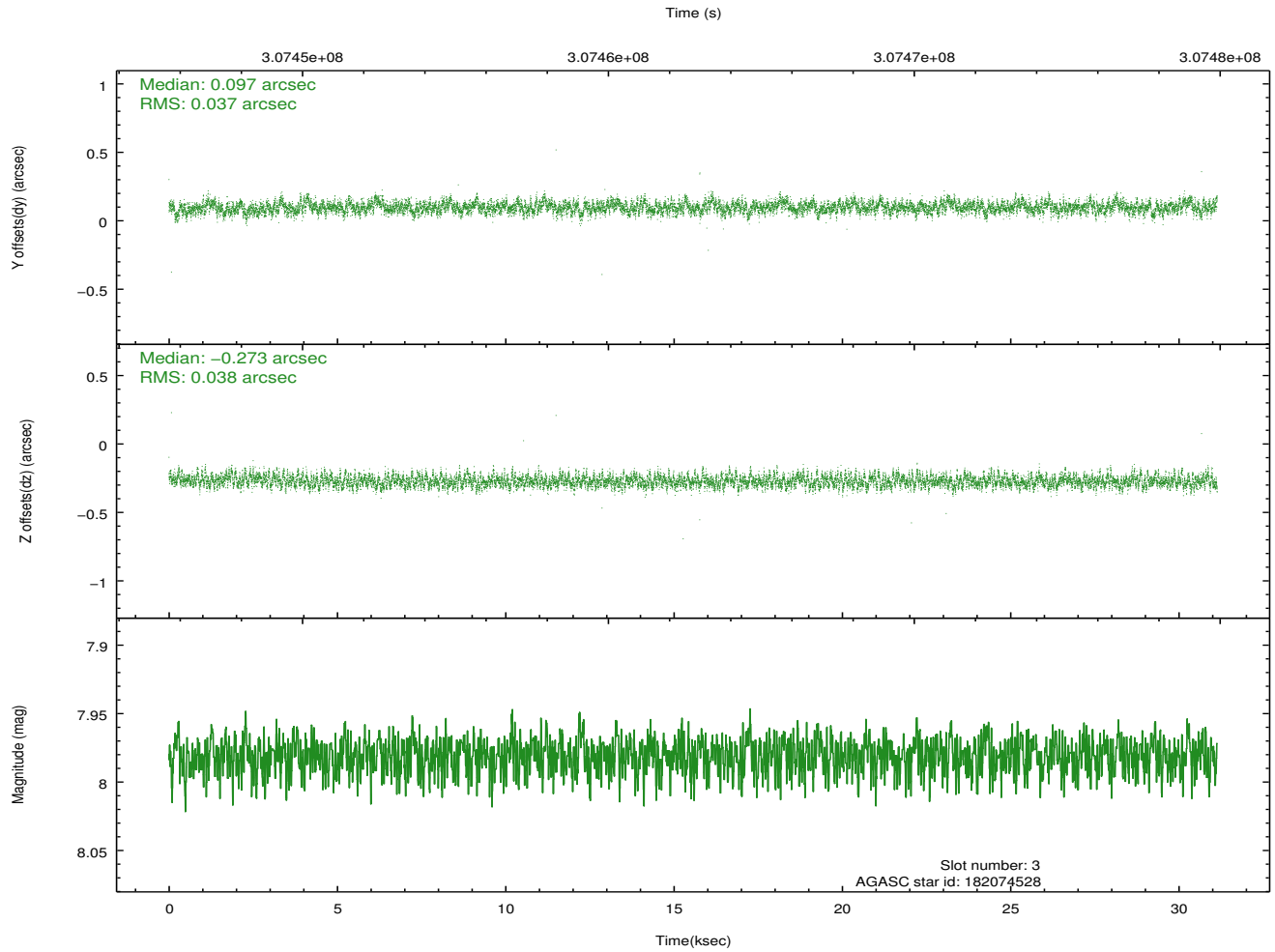
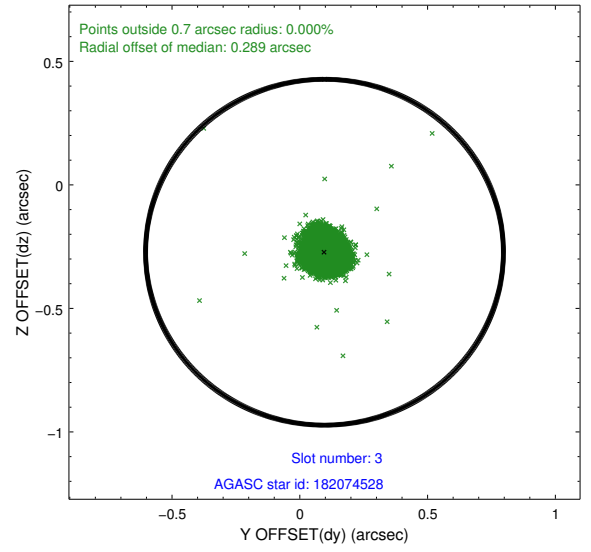
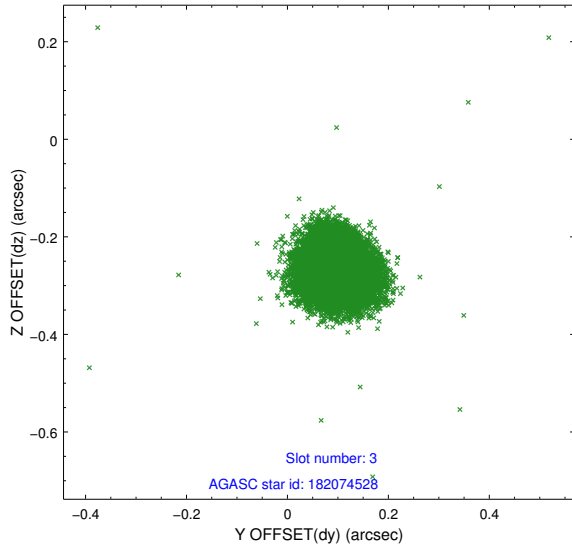


### Slot Statistics

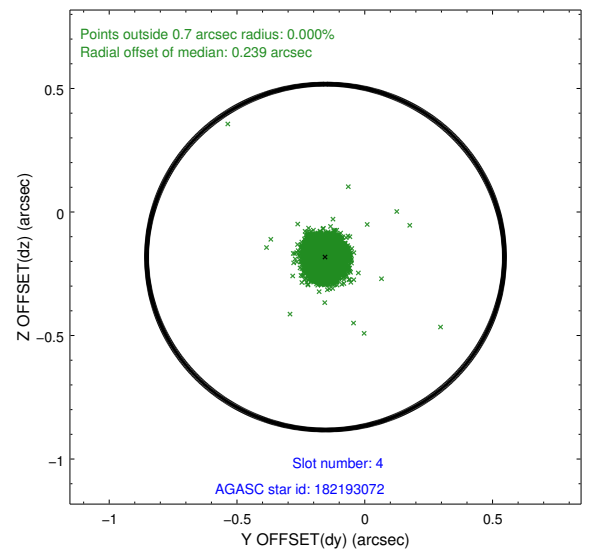
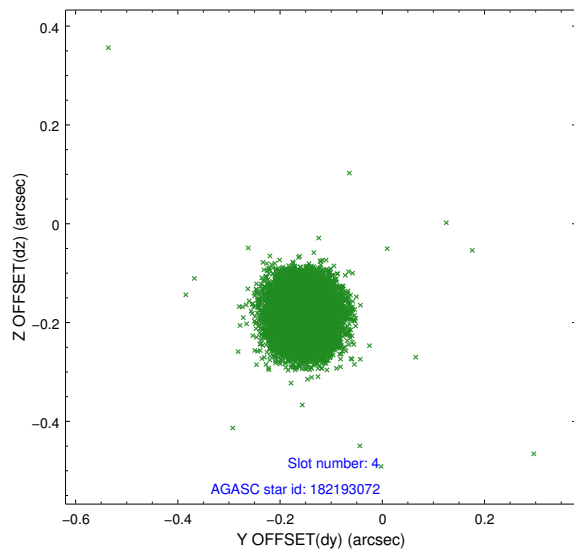
slot	status	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID	ACIS-I-1	7.22	7594	0.057	-0.016	0.014	0.038	0.000000	0.000000	924.60	-840.52
1	FID	ACIS-I-5	7.22	7593	-0.209	0.063	0.008	0.021	0.000000	0.000000	-1823.70	1057.08
2	FID	ACIS-I-6	7.24	7593	0.060	0.023	0.014	0.040	0.000000	0.000000	390.13	1701.57
3	GUIDE	182074528	7.98	15185	0.097	-0.273	0.056	0.088	123.954907	20.745845	-660.32	1755.41
4	GUIDE	182193072	8.12	15184	-0.154	-0.182	0.053	0.085	124.468170	21.177590	1254.16	441.43
5	GUIDE	182202936	7.82	15184	-0.163	0.221	0.065	0.100	124.849962	21.257255	1835.95	-735.53
6	GUIDE	181670344	7.87	15181	0.189	0.266	0.057	0.096	124.942618	20.336943	-1307.22	-1826.79
7	GUIDE	182064712	9.26	15181	0.029	-0.030	0.088	0.142	123.990537	21.583862	2301.72	2340.36

## 2.4 Star Slots

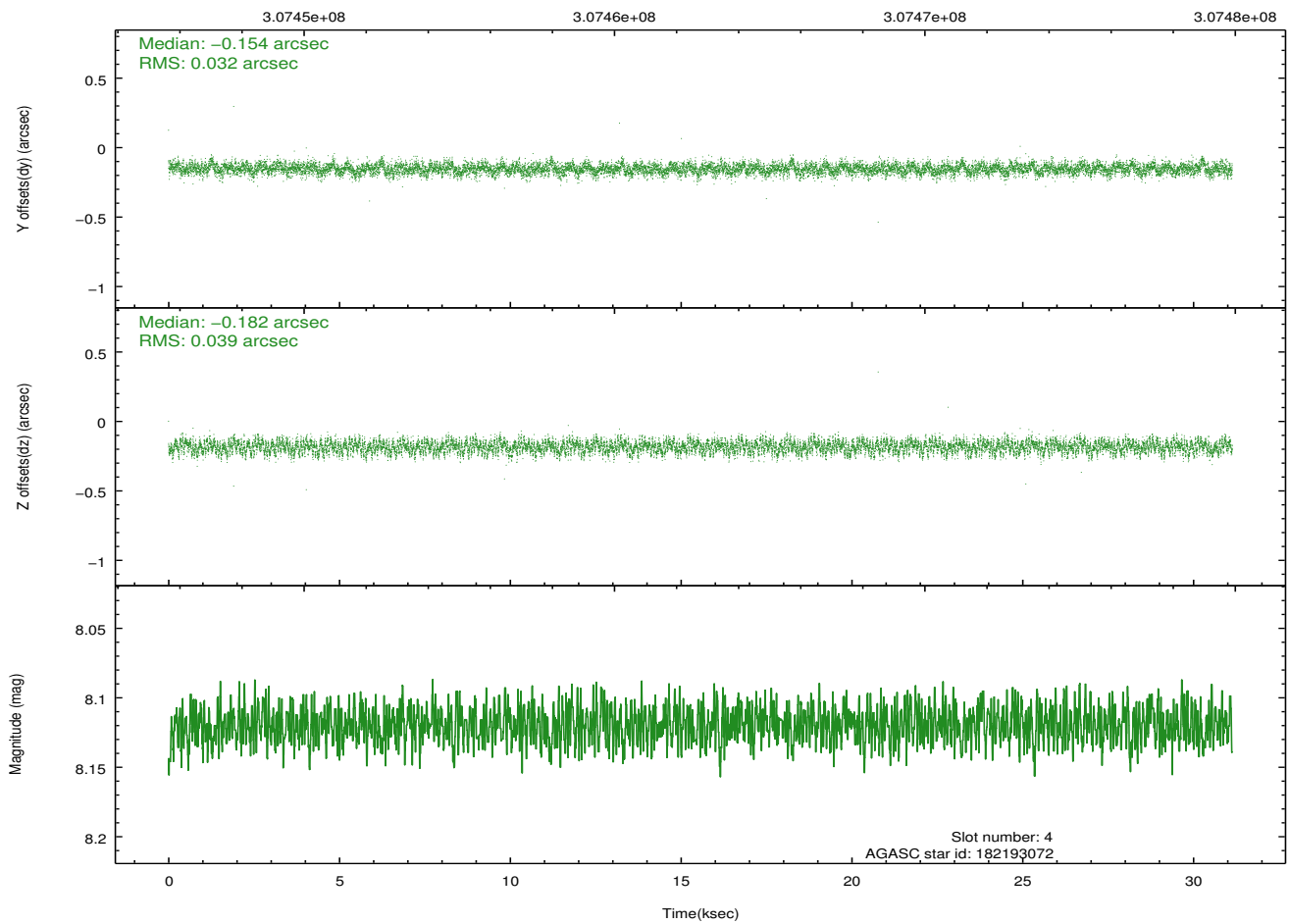
### 2.4.1 Slot 3



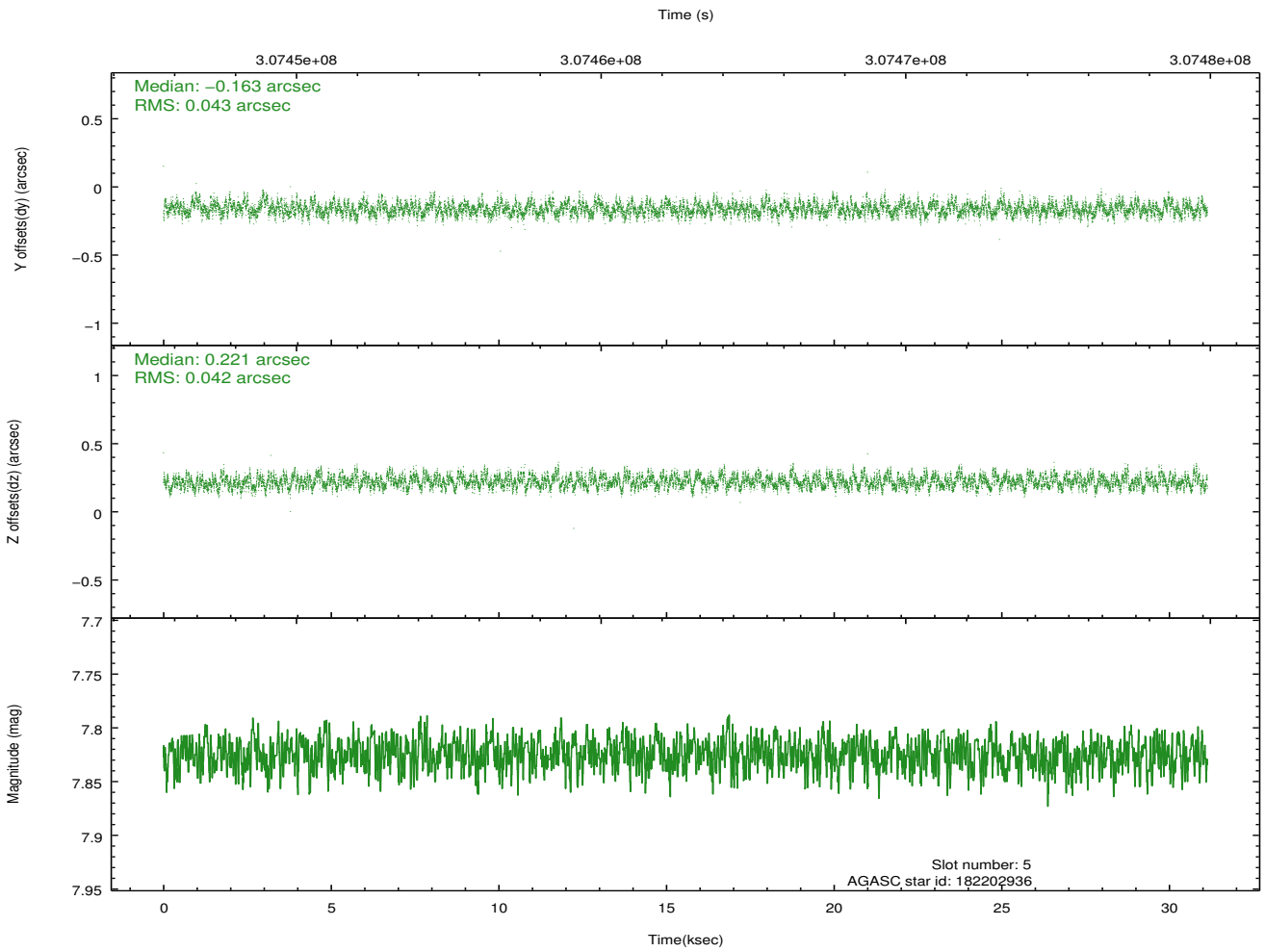
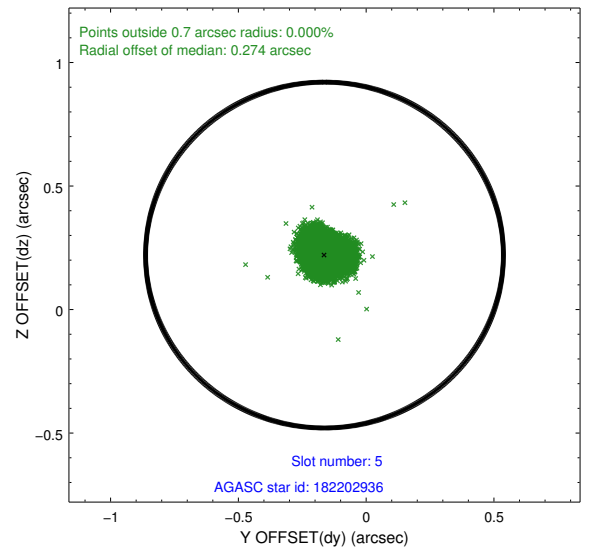
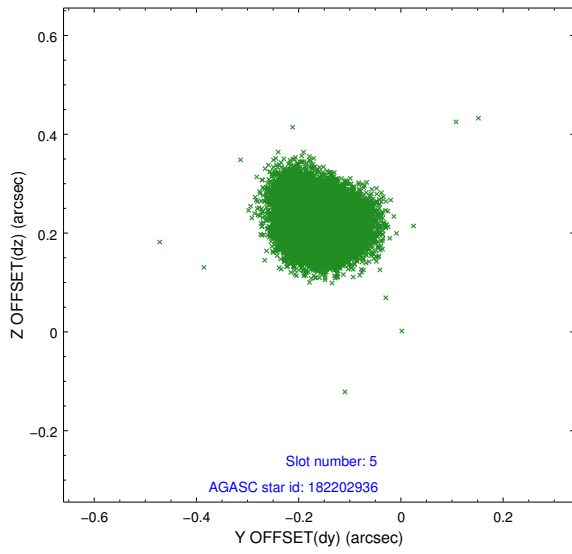
## 2.4.2 Slot 4



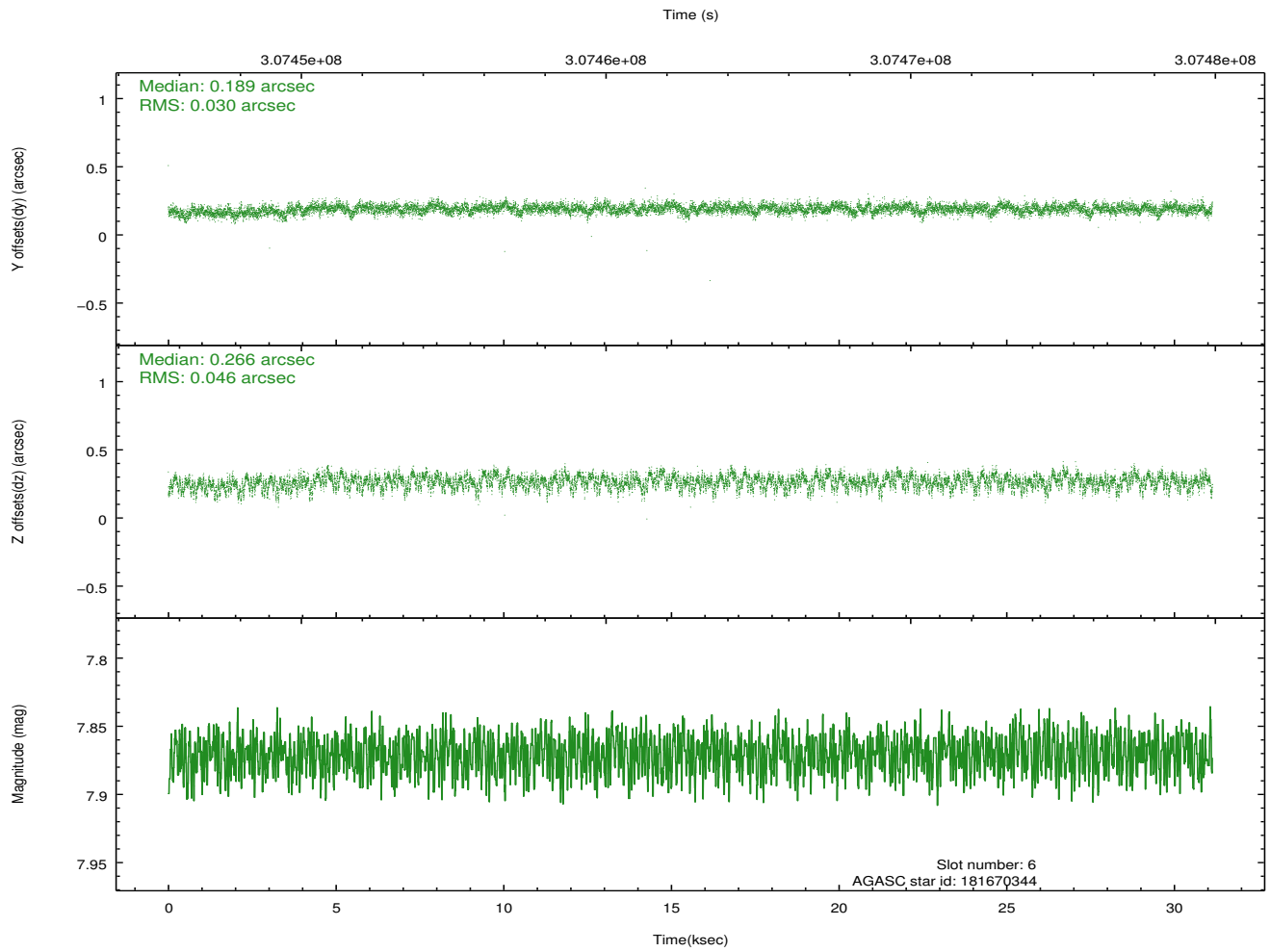
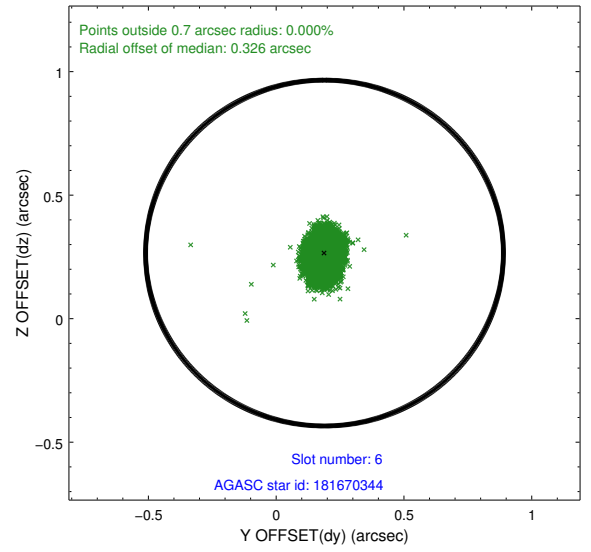
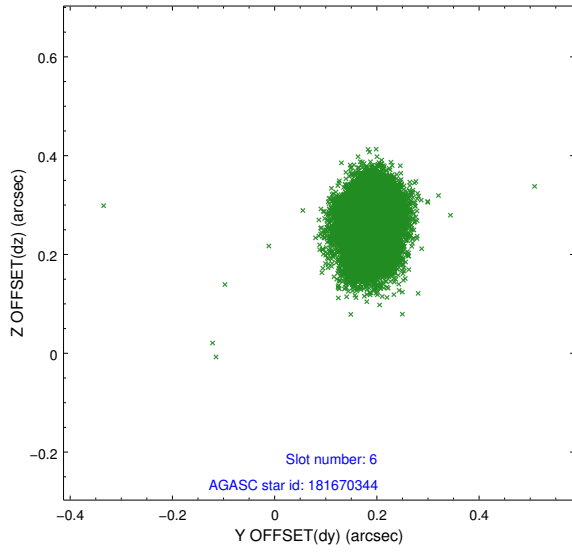
Time (s)



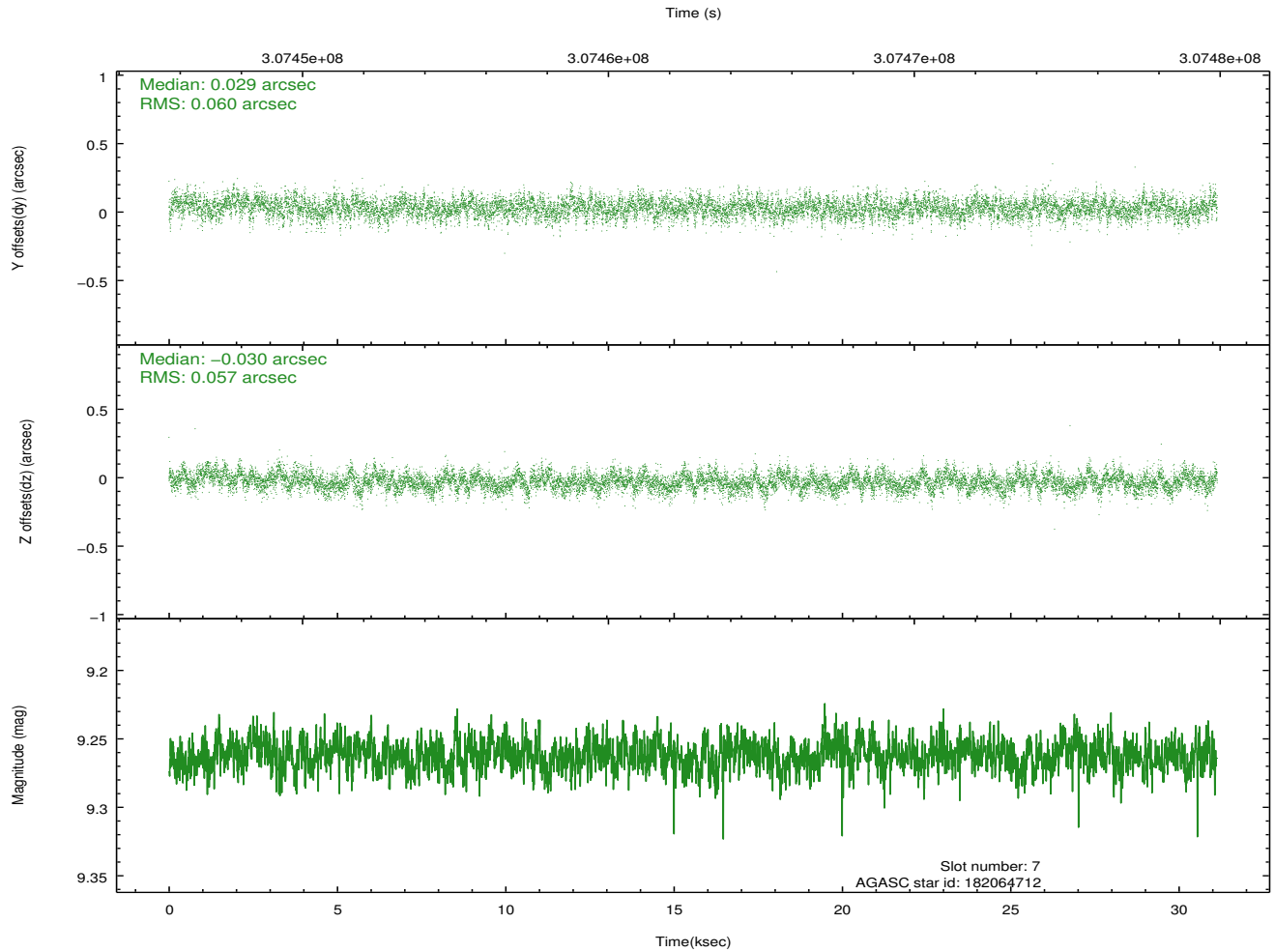
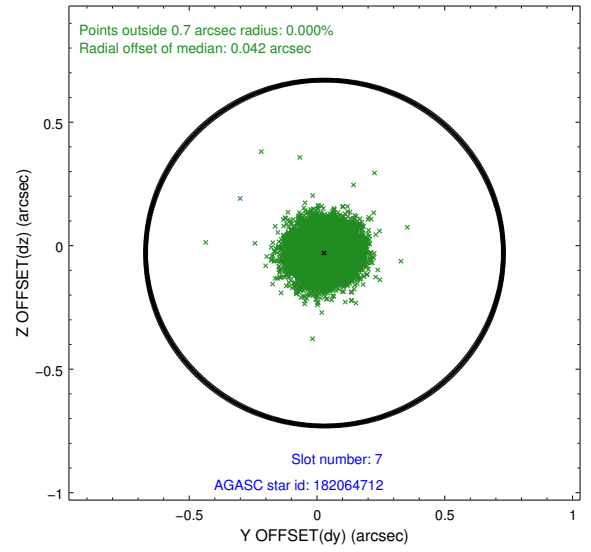
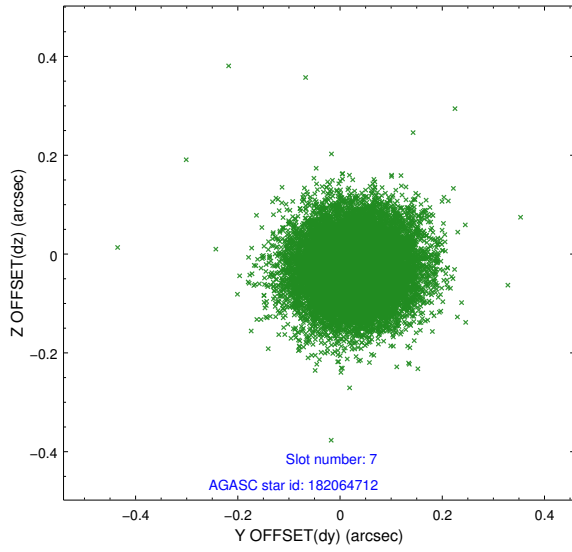
### 2.4.3 Slot 5



## 2.4.4 Slot 6

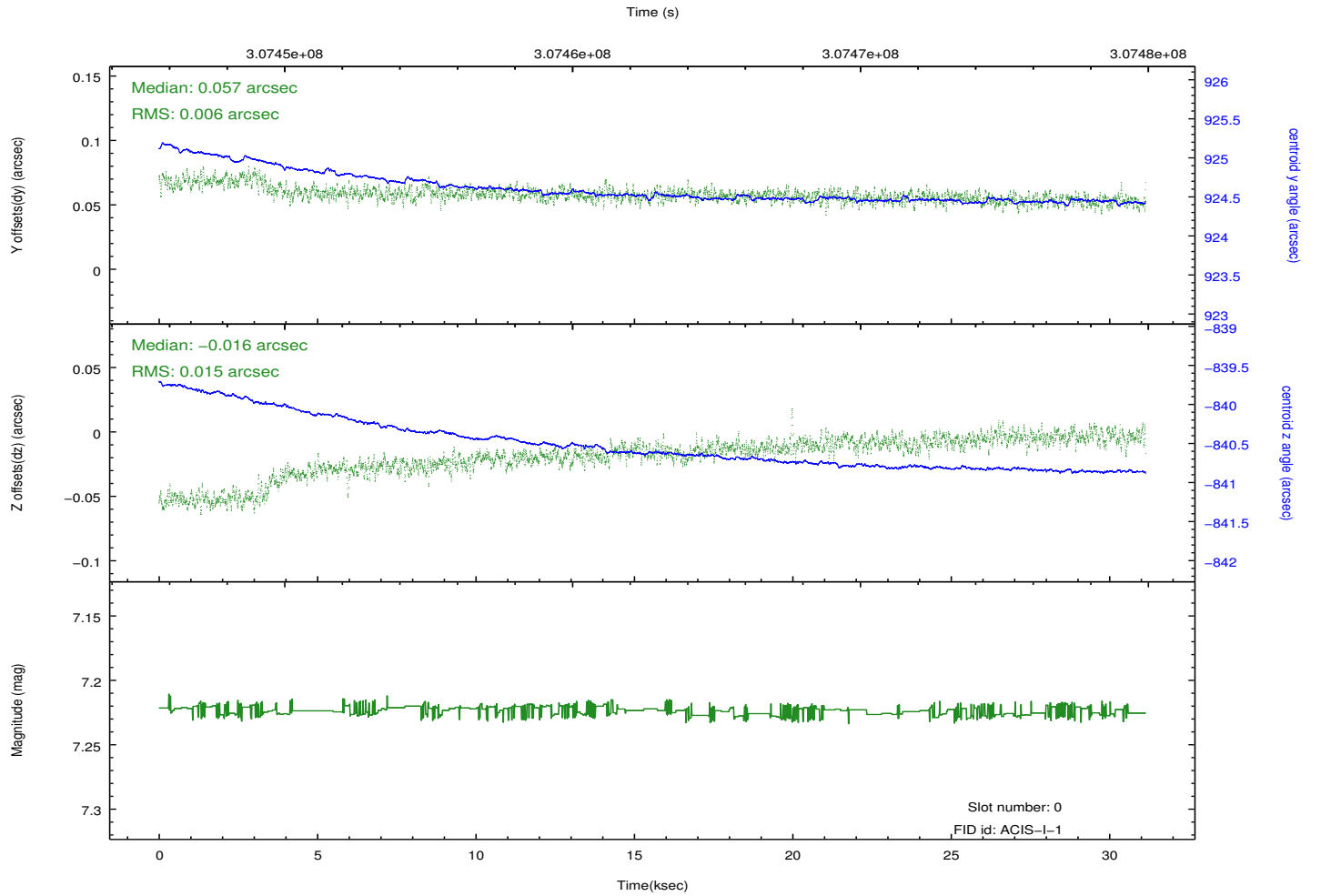
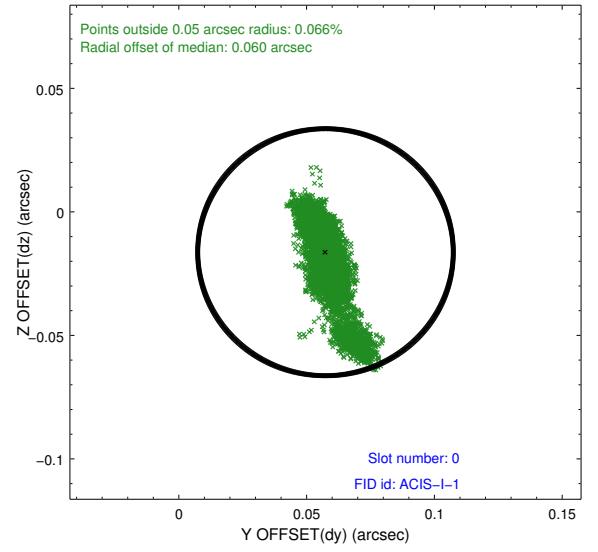
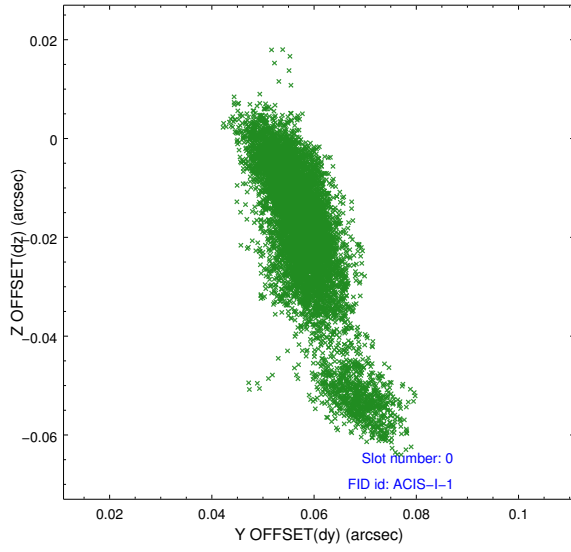


### 2.4.5 Slot 7

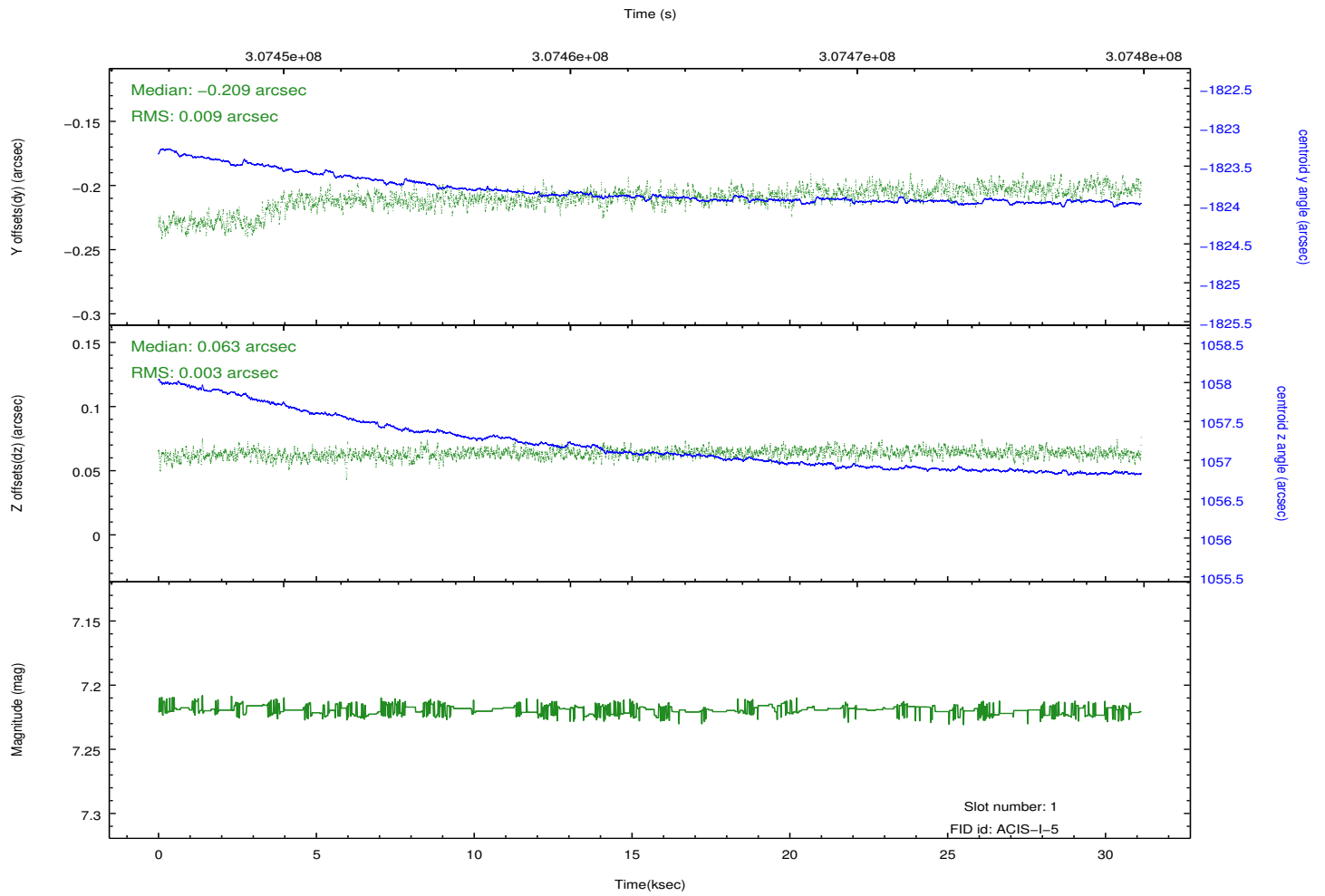
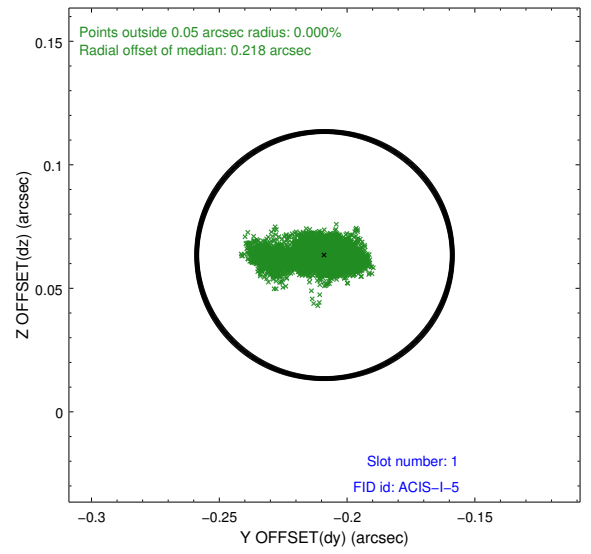
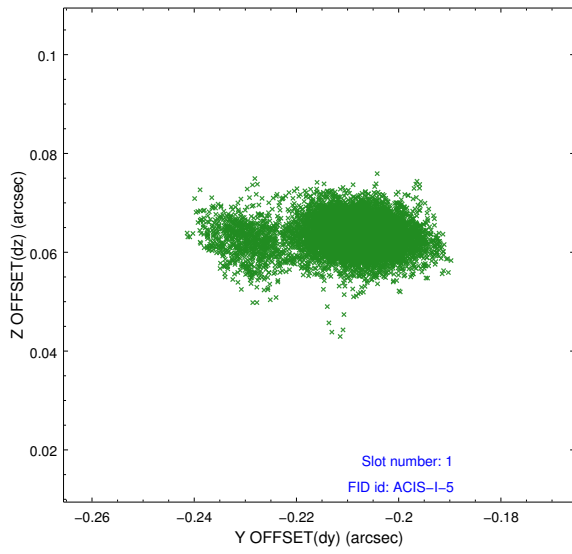


## 2.5 FID Slots

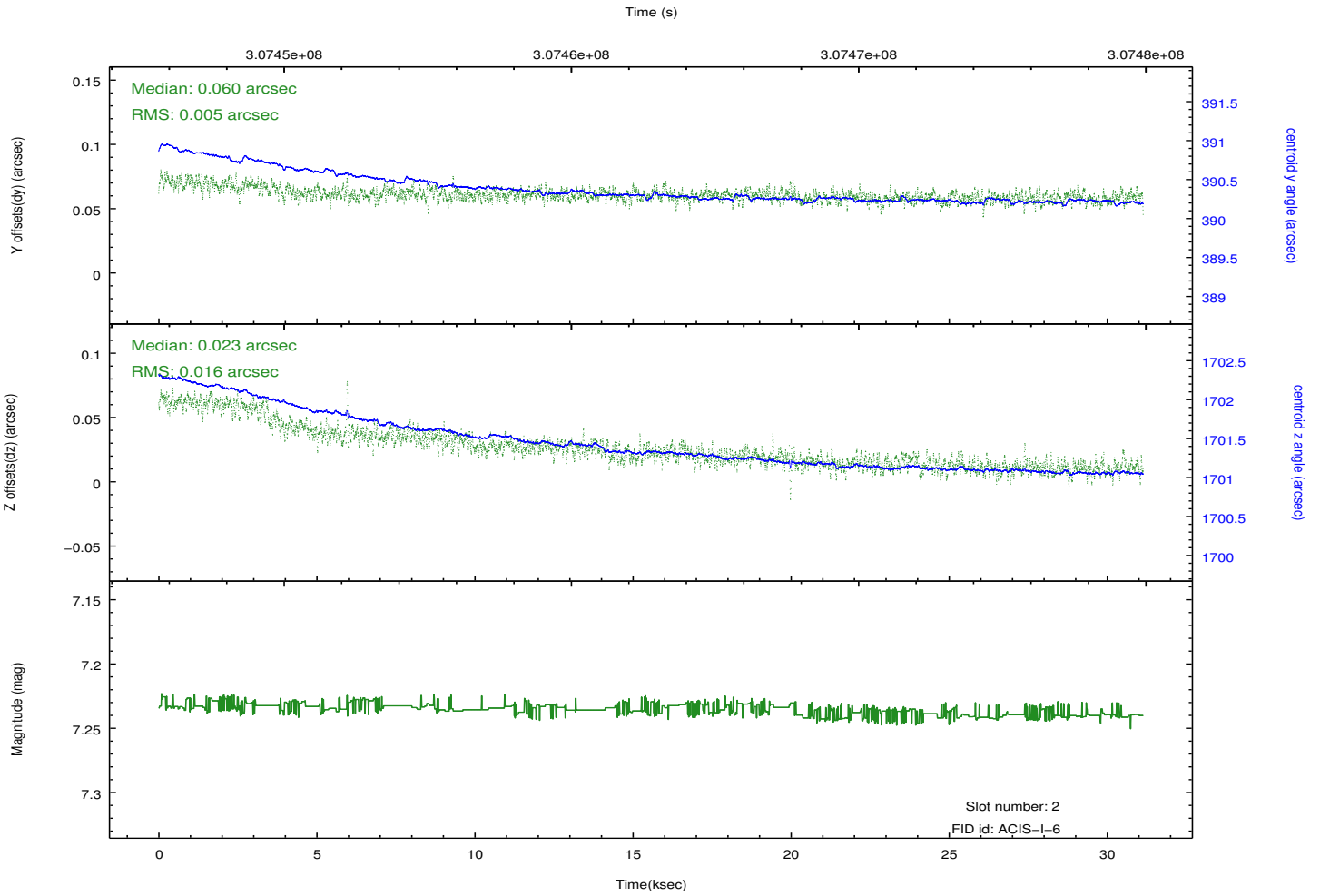
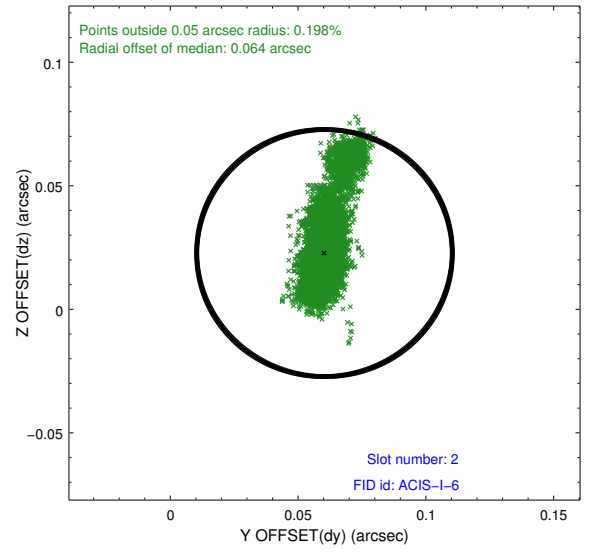
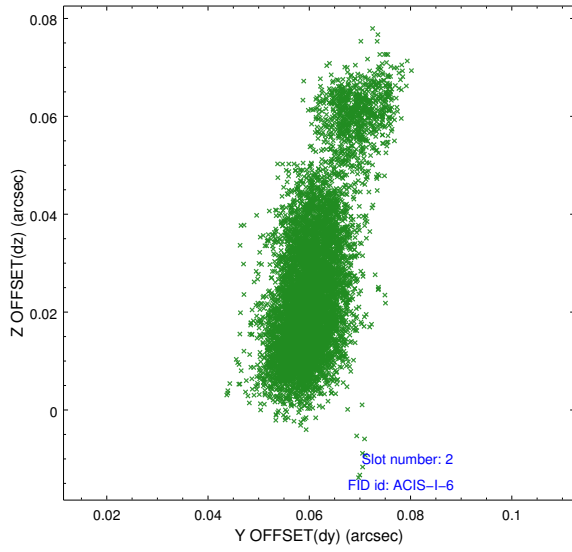
### 2.5.1 Slot 0



## 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)	2012.05.04
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	31.1270183

### A.2 Comments