

# V&V Reference Report

## L2 ASCDS Version : 10.3.3

Observation 17396 - L2 Version 2  
Chandra X-Ray Center

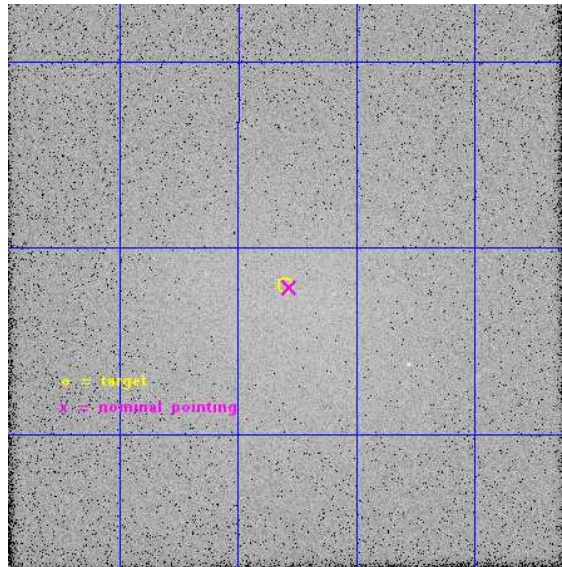
L2 Processing Date : May 27 2015

## 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	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 7 . . . . .	12
2.5	FID Slots . . . . .	13
2.5.1	Slot 0 . . . . .	13
2.5.2	Slot 1 . . . . .	14
2.5.3	Slot 2 . . . . .	15
<b>A</b>	<b>Summary</b>	<b>16</b>
A.1	Status . . . . .	16
A.2	Comments . . . . .	16

# 1 Front

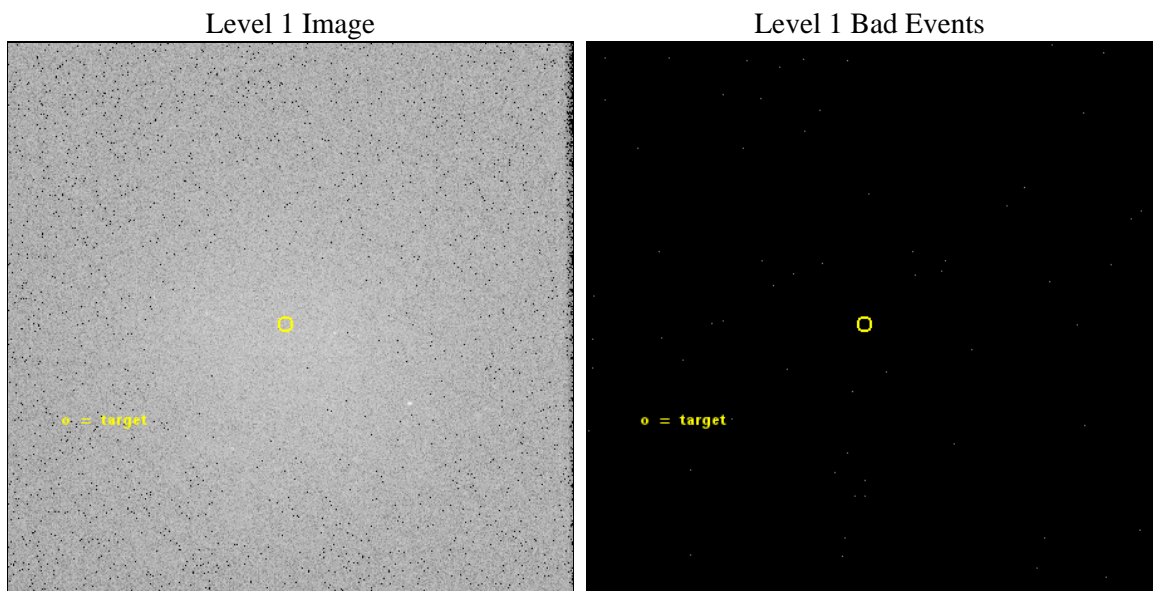
seq_num	890096	Sequence number
obs_id	17396	Observation id
title	AO-16 HRC-I Calibration Observations of the Coma Cluster	Proposal
observer	Dr. CXC Calibration	Principal investigator
object	Coma Cluster	Source name
ra_targ	194.95	Observer's specified target RA [deg]
dec_targ	27.966667	Observer's specified target Dec [deg]
ra_nom	194.94552747572	Nominal RA [deg]
dec_nom	27.964841339811	Nominal Dec [deg]
roll_nom	224.37660782944	Nominal Roll [deg]
revision	2	Processing version of data
ontime	10186.450571895	[s]
livetime	10094.186487313	Ontime multiplied by DTCOR
l2events	810345	Number of level 2 events



## 2 OBI

### 2.1 OBI

#### 2.1.1 Images



### 2.1.2 Parameters

obi_num	1	Obi number	sched_exp_time	10000.000000	[s] Scheduled observation exposure time
ascdsver	10.3.3	Processing system revision	ontime	10186.450571895	[s]
caldbver	4.6.7	&#160	l1events	1095339	Number of level 1 events
date	2015-05-27T19:08:48	Date and time of file creation			
revision	2	Processing version of data			

### 2.1.3 Events

#### Level 1 Events

	<b>segment 0</b>
level 1 events	1095339
rejected events	62391
rejected %	5%

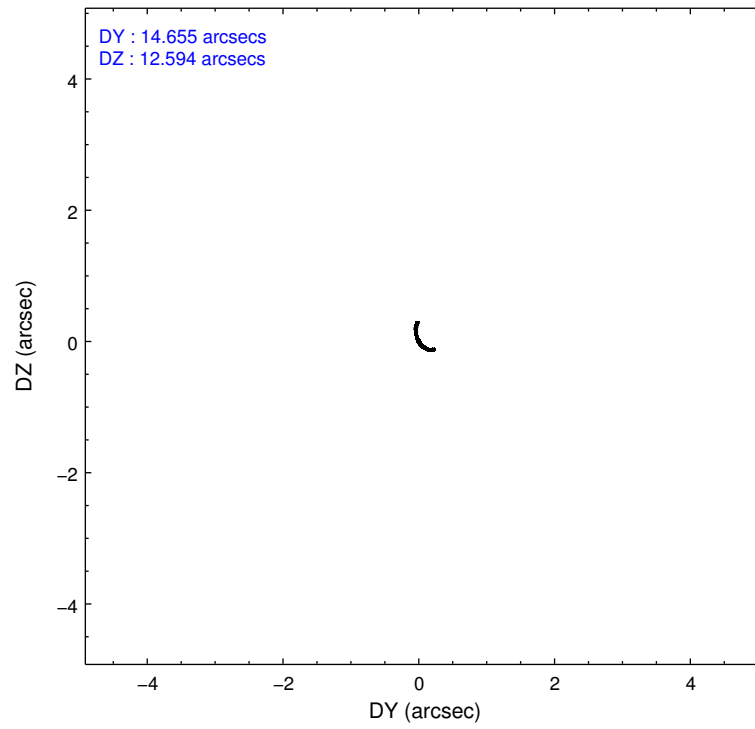
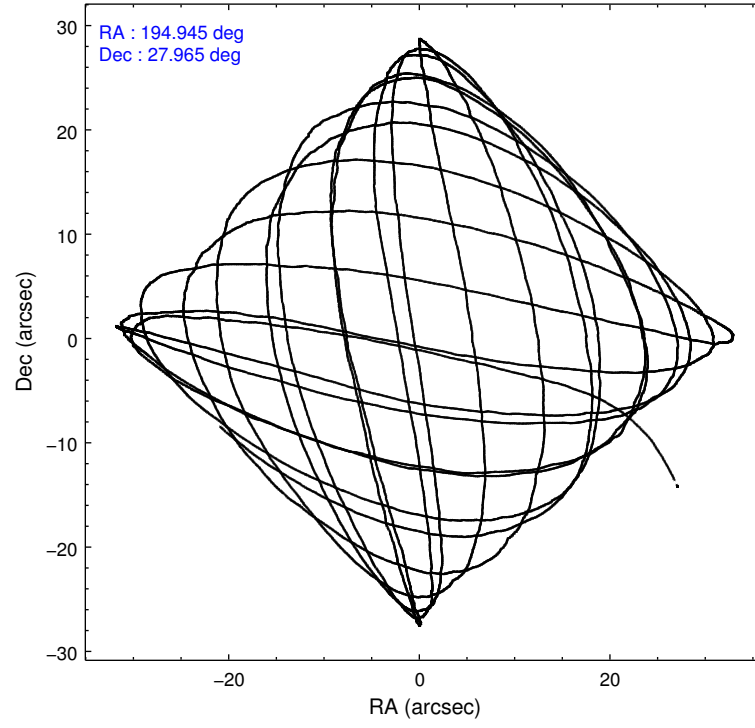


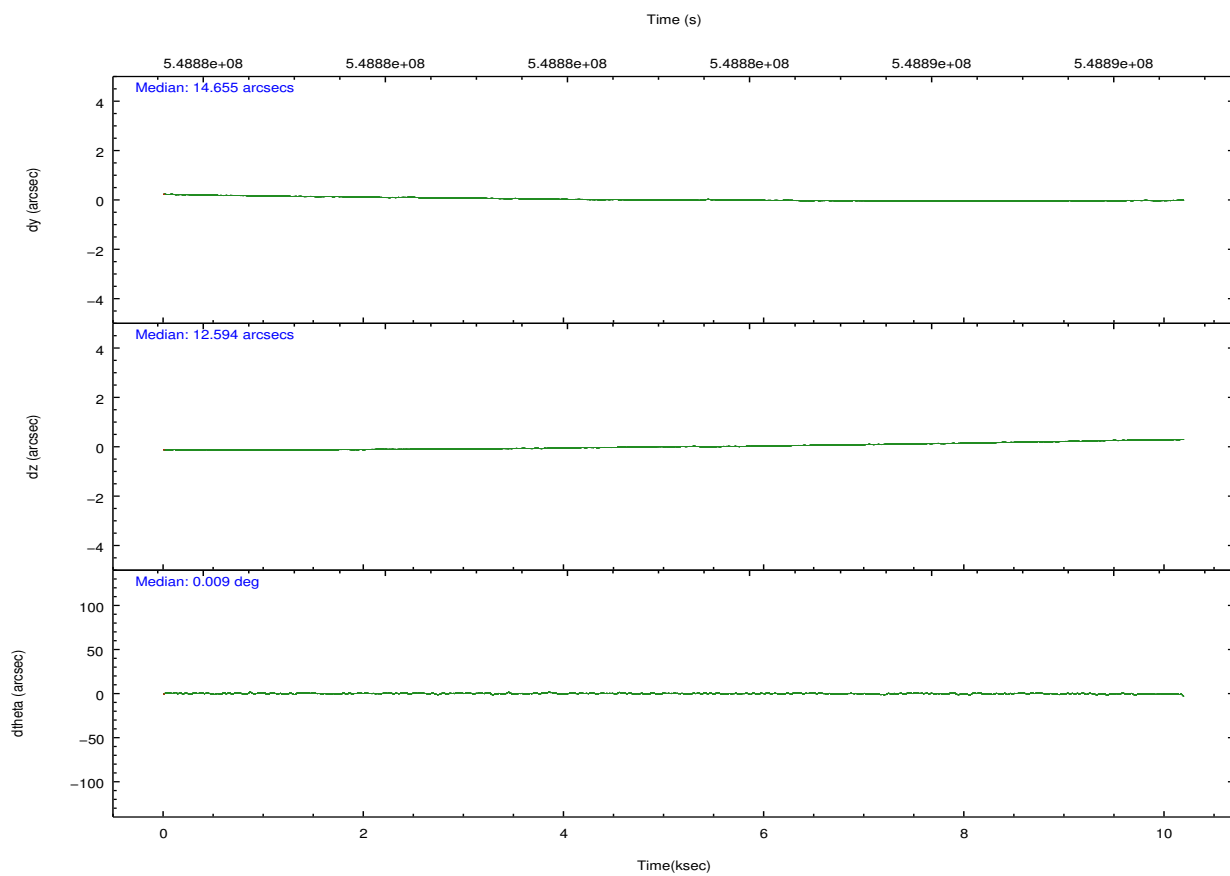
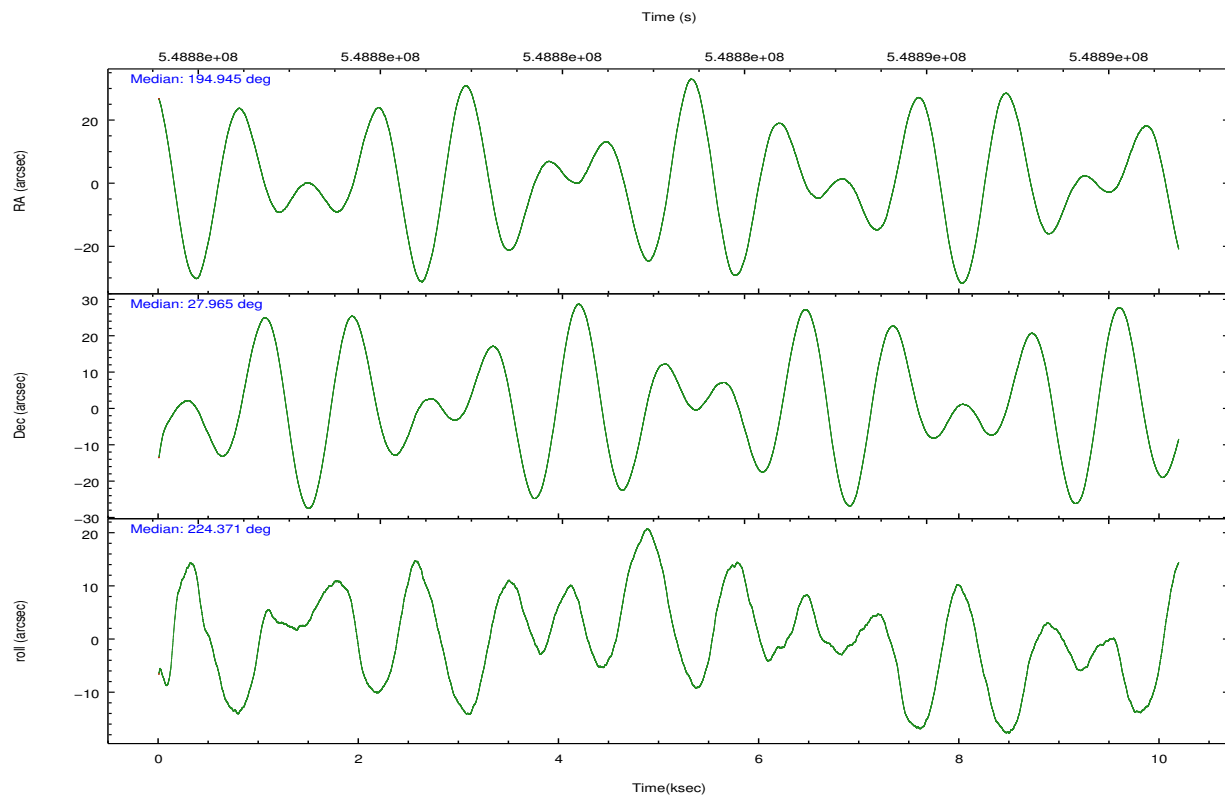
## 2.2 Compared Parameters

Parameter	Planned	Actual
Instrument	HRC	HRC
Detector	HRC-I	HRC-I
Grating	NONE	NONE
Data mode	OBSERVING	OBSERVING
Observation mode	POINTING	POINTING
[deg] Pointing RA	194.953189	194.9455274757228
[deg] Pointing Dec	27.991393	27.96484133981068
[deg] Pointing Roll	224.468501	224.3766078294408
[s] Window start time (MET)	548035267.184000	548035267.184000
[s] Window stop time (MET)	550713667.184000	550713667.184000
[mm] SIM focus pos	-1.040293	-1.038866356238299
[mm] SIM defocus	0	0.001426264420575141
[mm] SIM translation stage pos	126.985494	126.9829799899862
[mm] SIM translation stage offset	0	0.002508901615314585
[s] Observation start time (MET)	548878276.184000	548877437.35935
Observation start date	2015-05-24T18:10:09	2015-05-24T17:57:17
[s] Observation end time (MET)	548888276.184000	548889680.9850301
Observation end date	2015-05-24T20:56:49	2015-05-24T21:21:20

Parameter	Planned	Actual
Obspar format version number	7	7
Obspar file type	PREDICTED	ACTUAL
Obspar update status	NONE	UPDATED

## 2.3 Aspect



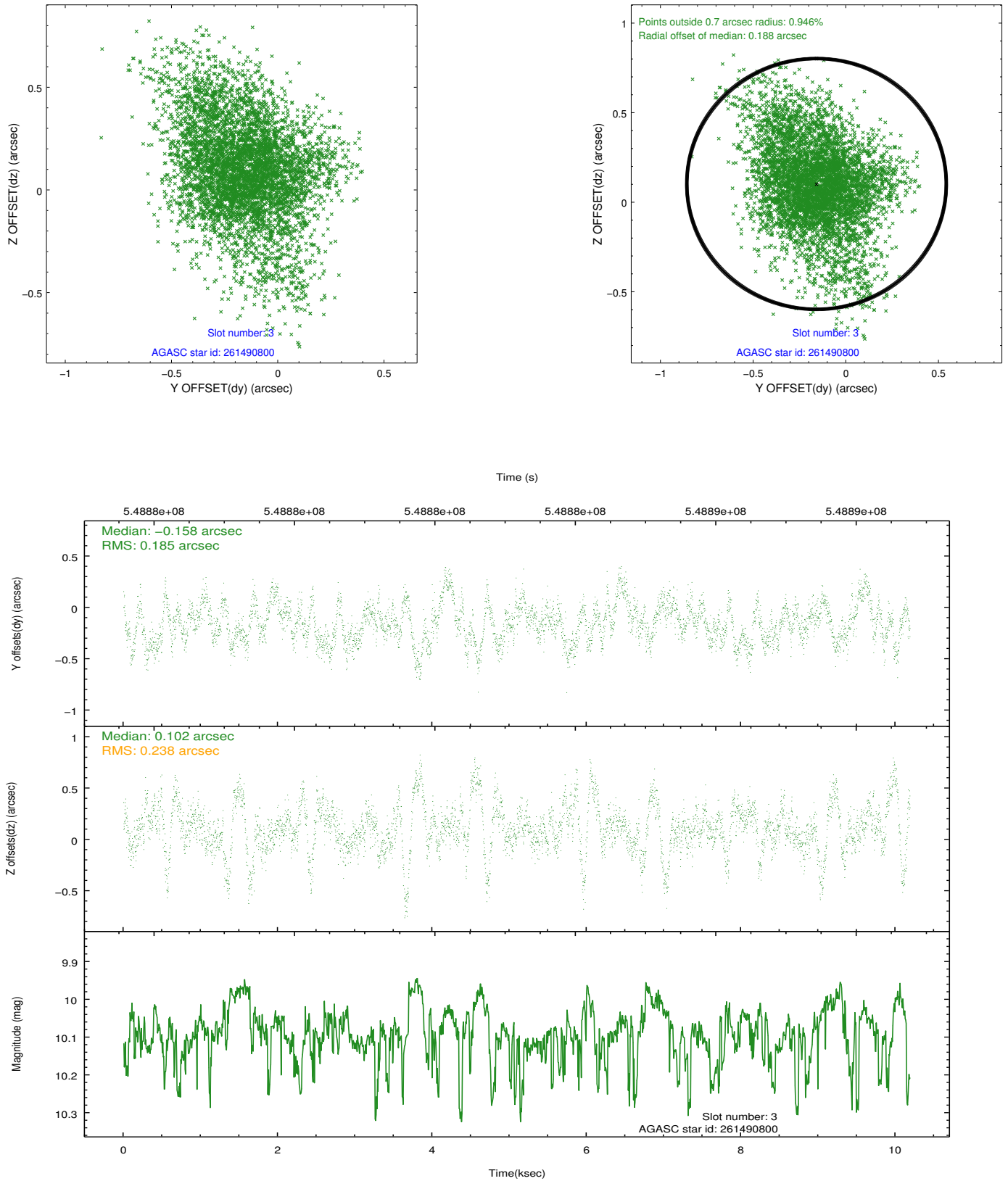


### Slot Statistics

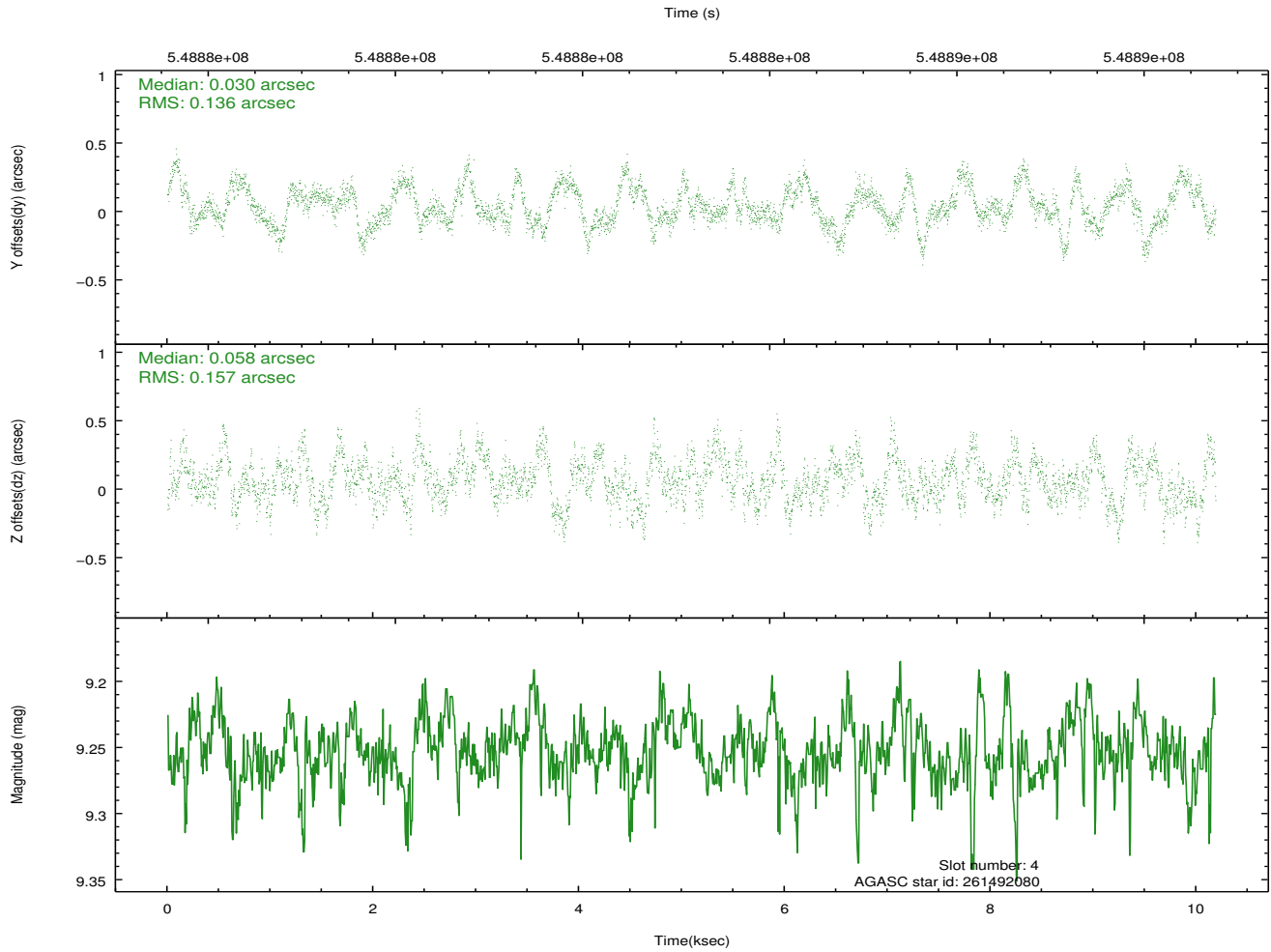
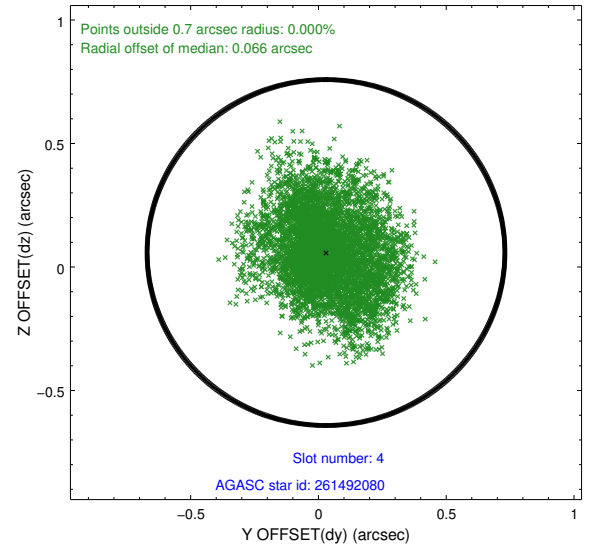
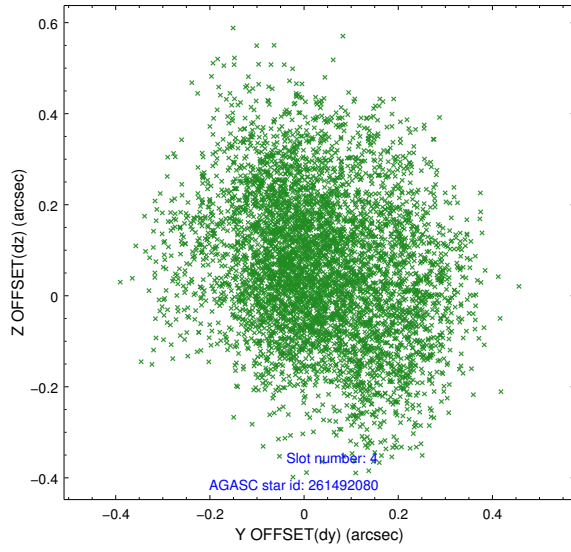
slot	status	used	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID		HRC-I-1	6.96	2486	-0.124	0.041	0.006	0.010	0.000000	0.000000	-770.61	-1300.58
1	FID		HRC-I-2	6.99	2486	0.286	-0.139	0.008	0.015	0.000000	0.000000	842.12	-1302.86
2	FID		HRC-I-3	7.04	2486	-0.043	0.008	0.008	0.014	0.000000	0.000000	-1198.67	1003.42
3	GUIDE	used	261490800	10.09	4968	-0.158	0.102	0.313	0.550	195.029641	27.224508	1759.43	2141.50
4	GUIDE	used	261492080	9.25	4963	0.030	0.058	0.228	0.347	194.976344	28.631585	-1665.93	-1593.08
5	GUIDE	used	261495096	9.89	4958	-0.153	0.035	0.229	0.373	194.411078	28.430653	114.88	-2334.00
6	OMITTED			0.00	0	0.000	0.000	0.000	0.000	0.000000	0.000000	0.00	0.00
7	GUIDE	used	261505232	9.74	4965	0.273	-0.196	0.199	0.321	194.216553	27.802521	2146.55	-1161.99

## 2.4 Star Slots

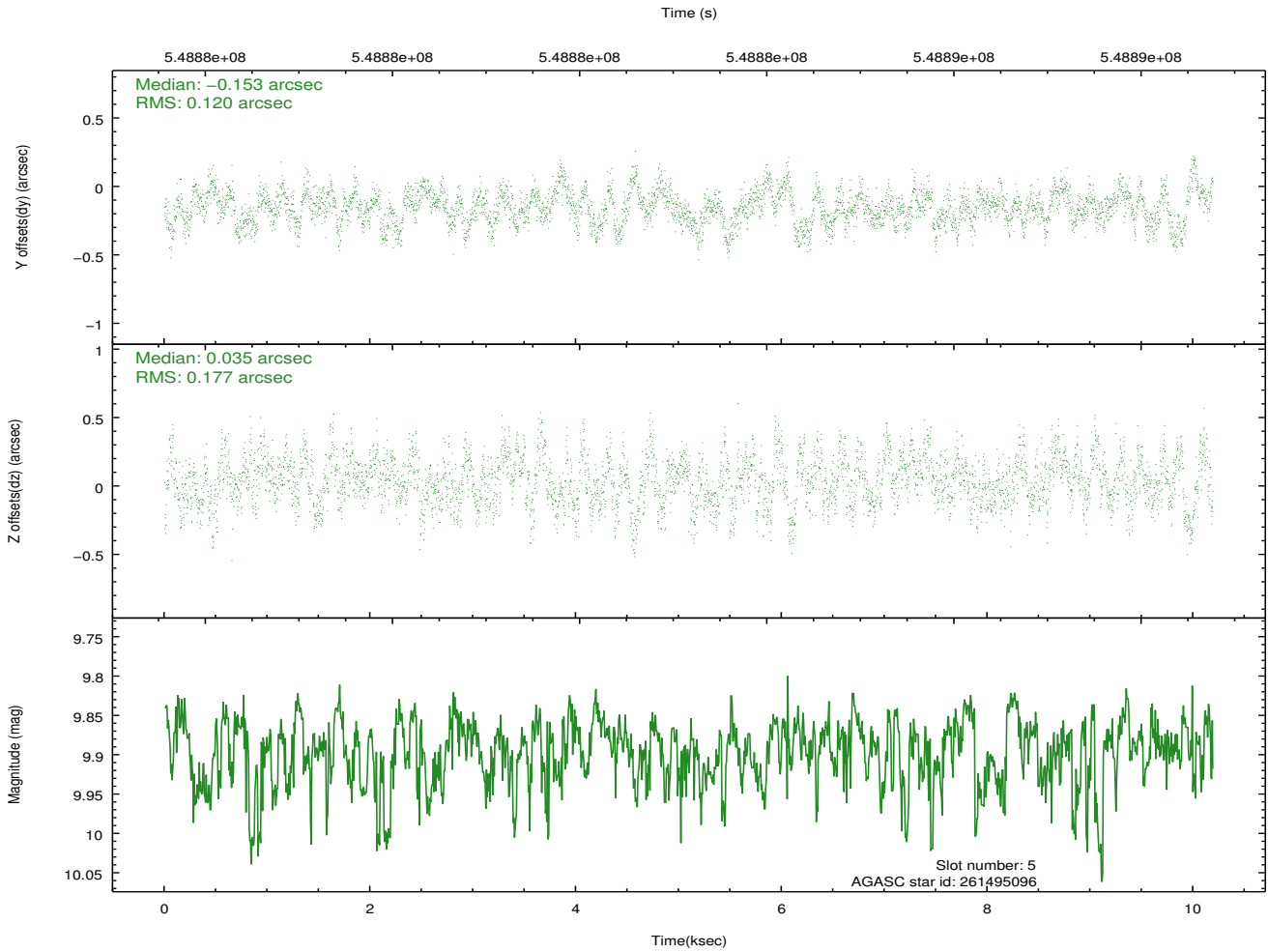
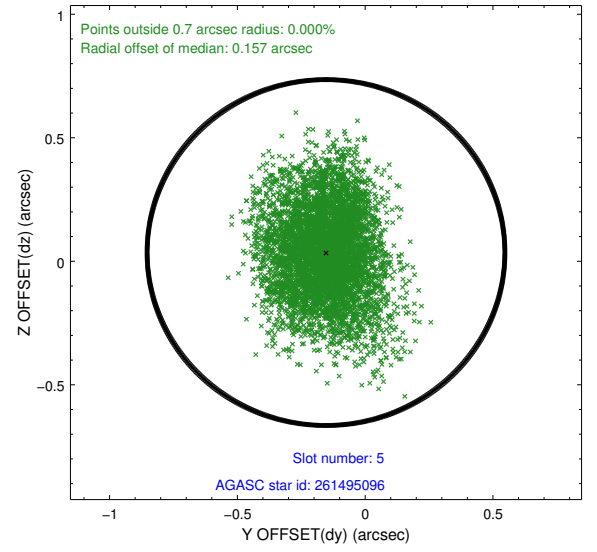
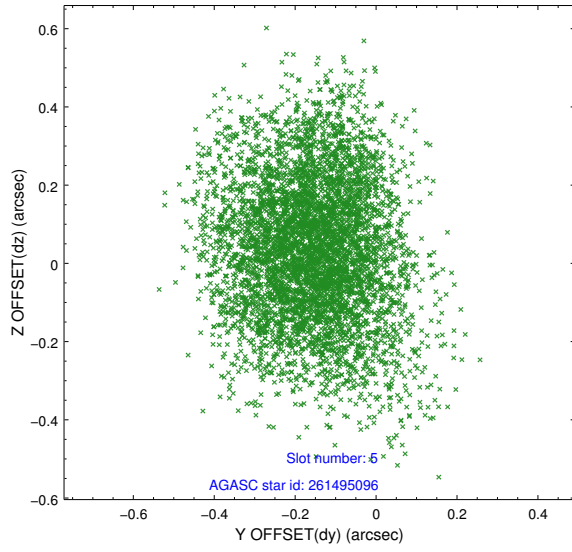
### 2.4.1 Slot 3



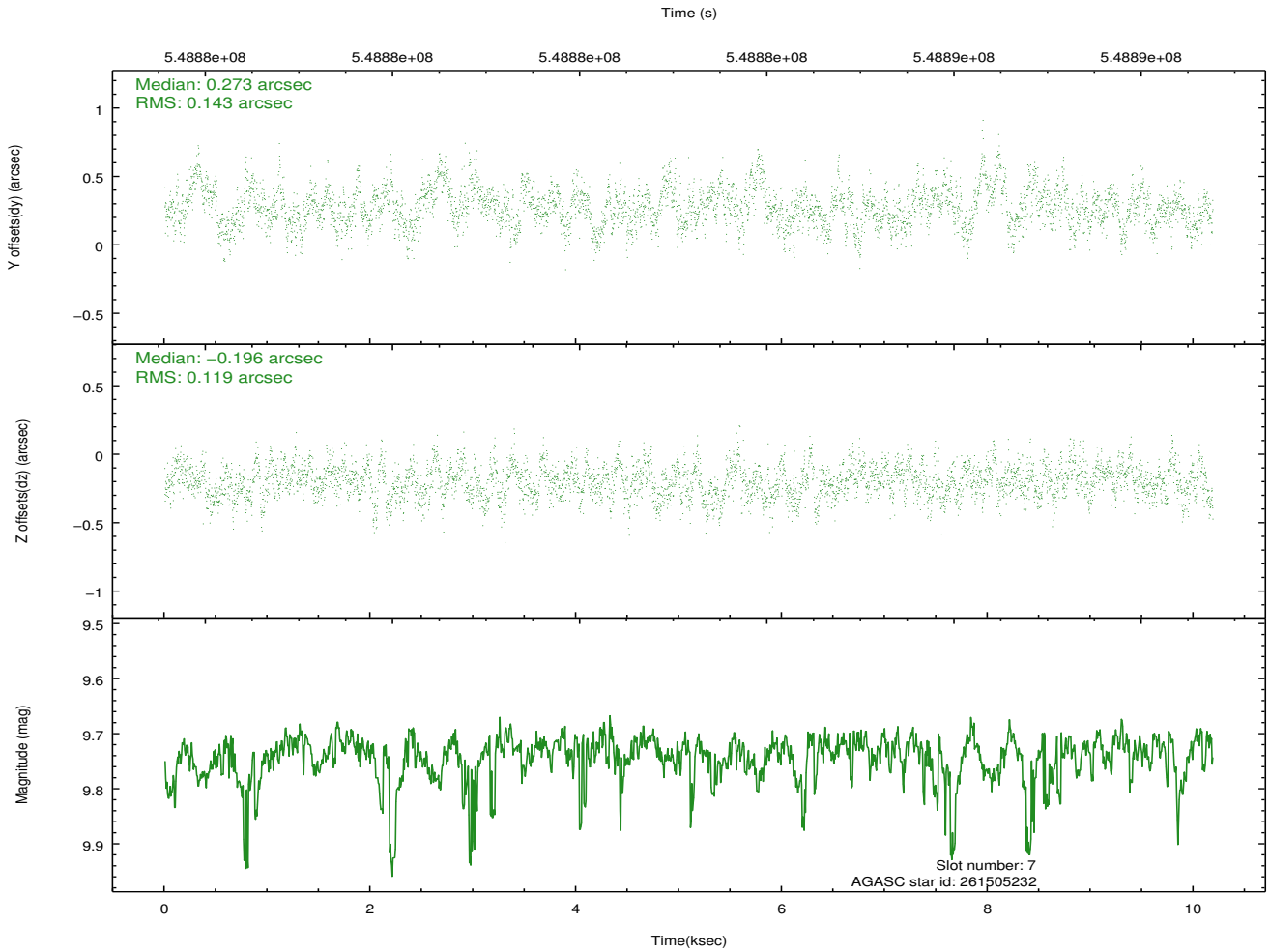
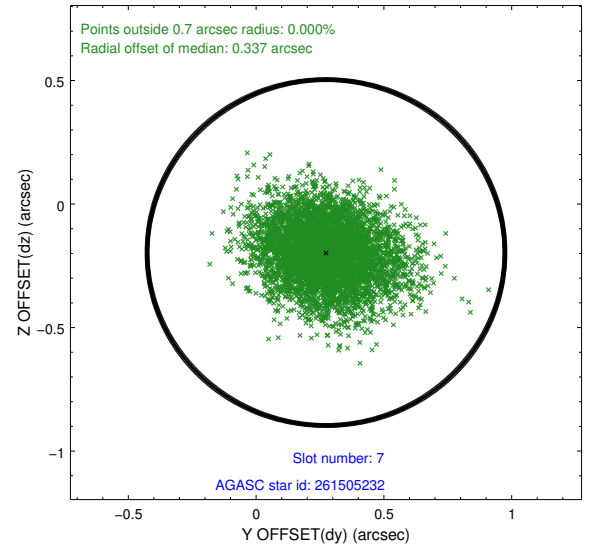
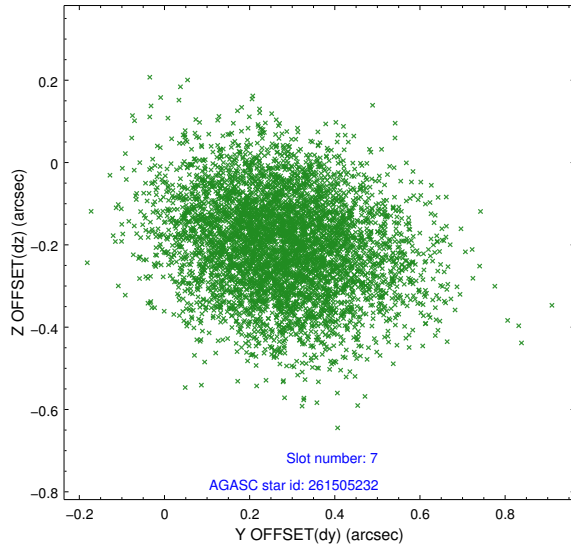
## 2.4.2 Slot 4



### 2.4.3 Slot 5



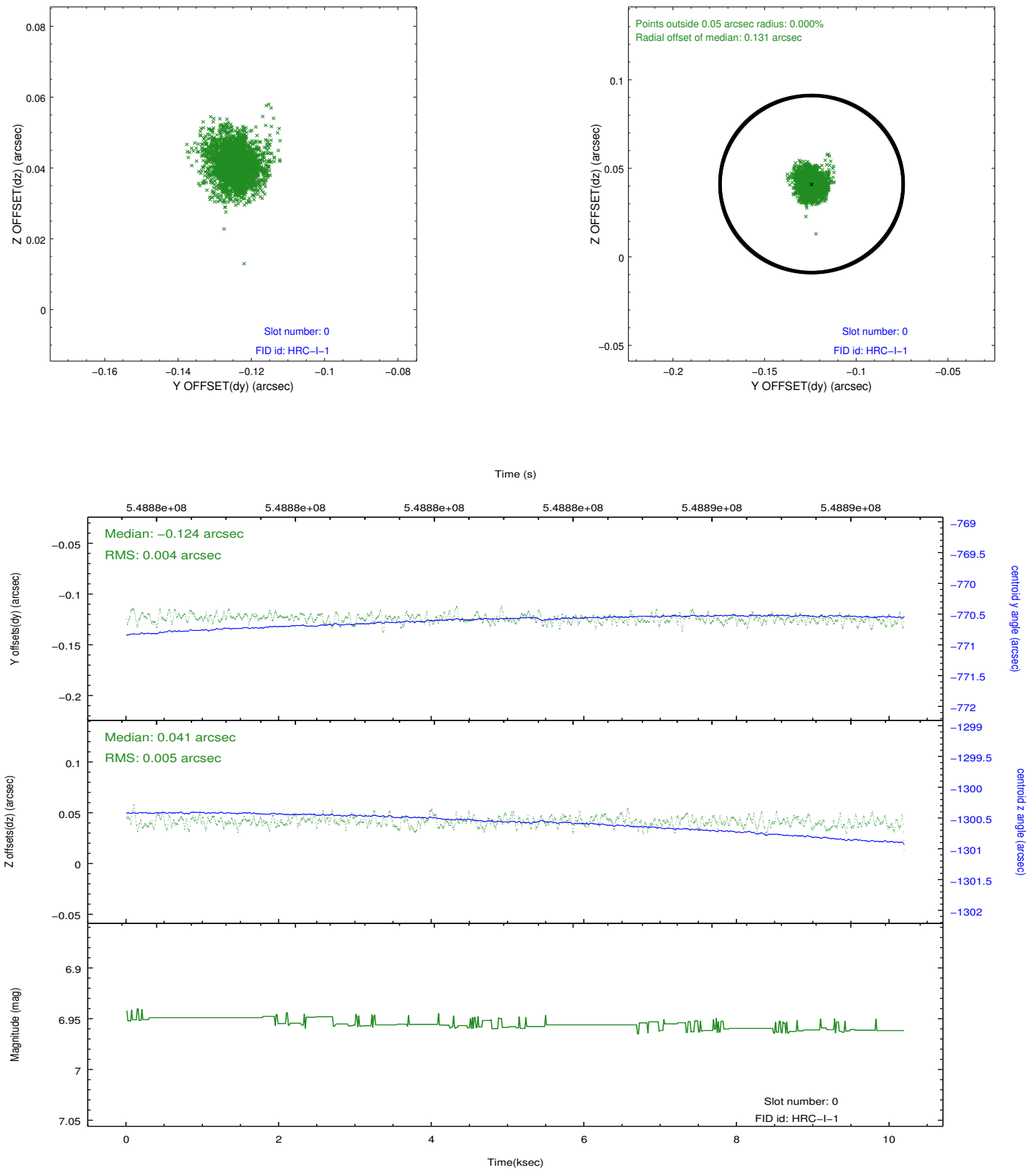
## 2.4.4 Slot 7



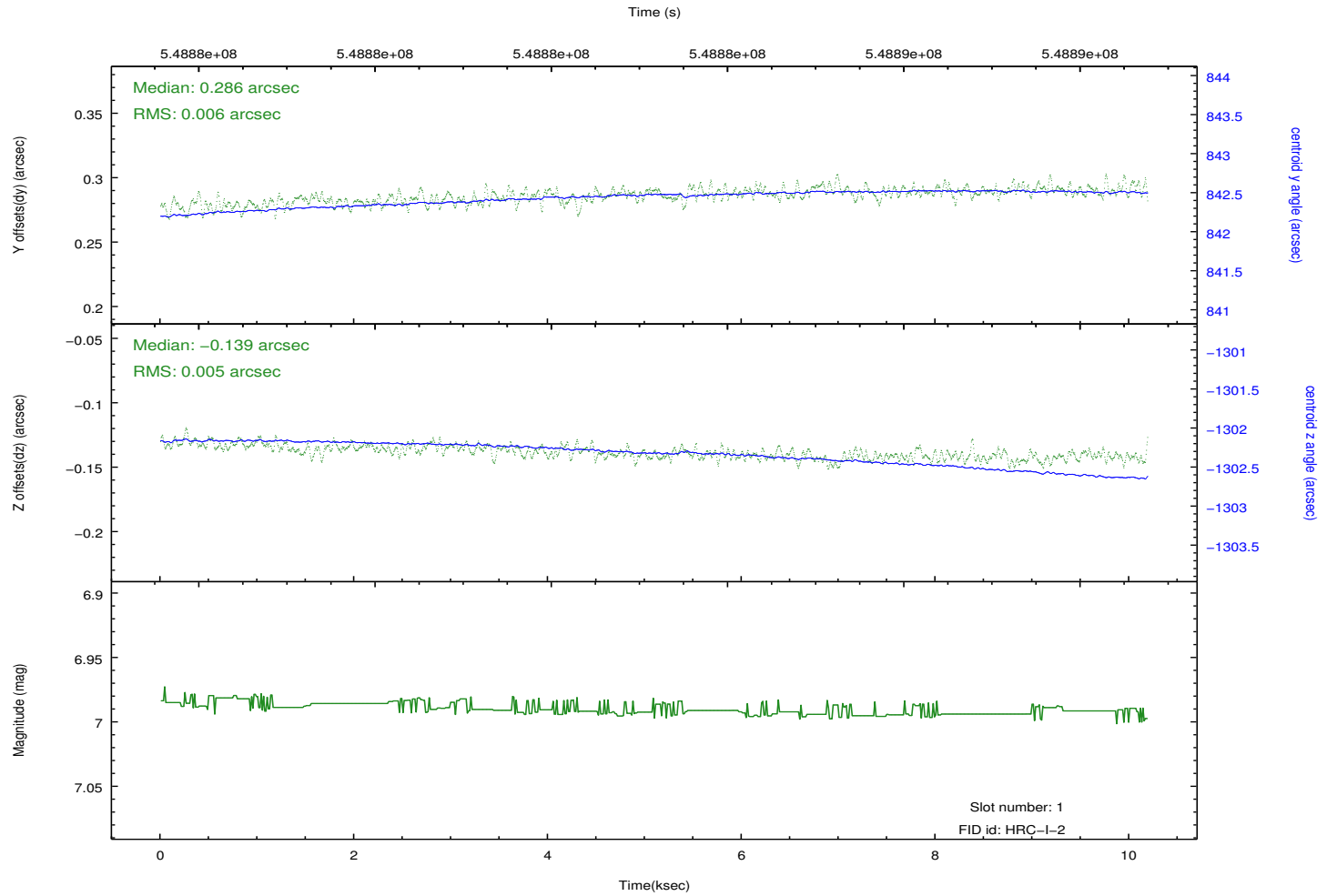
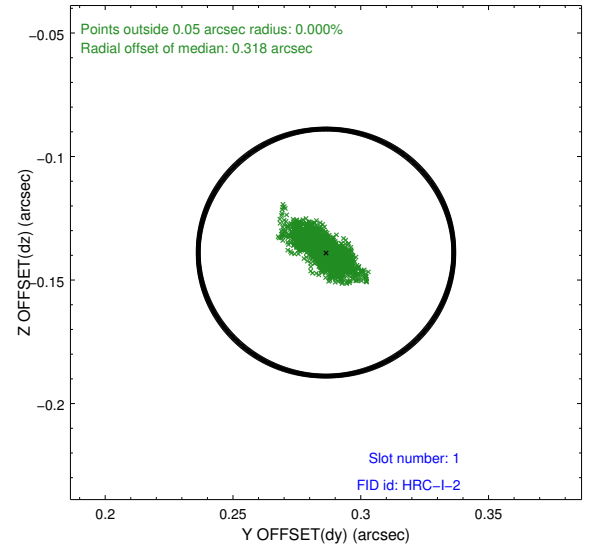
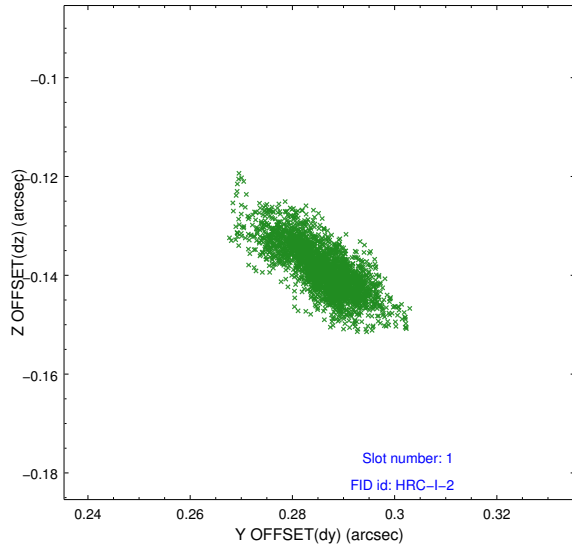


## 2.5 FID Slots

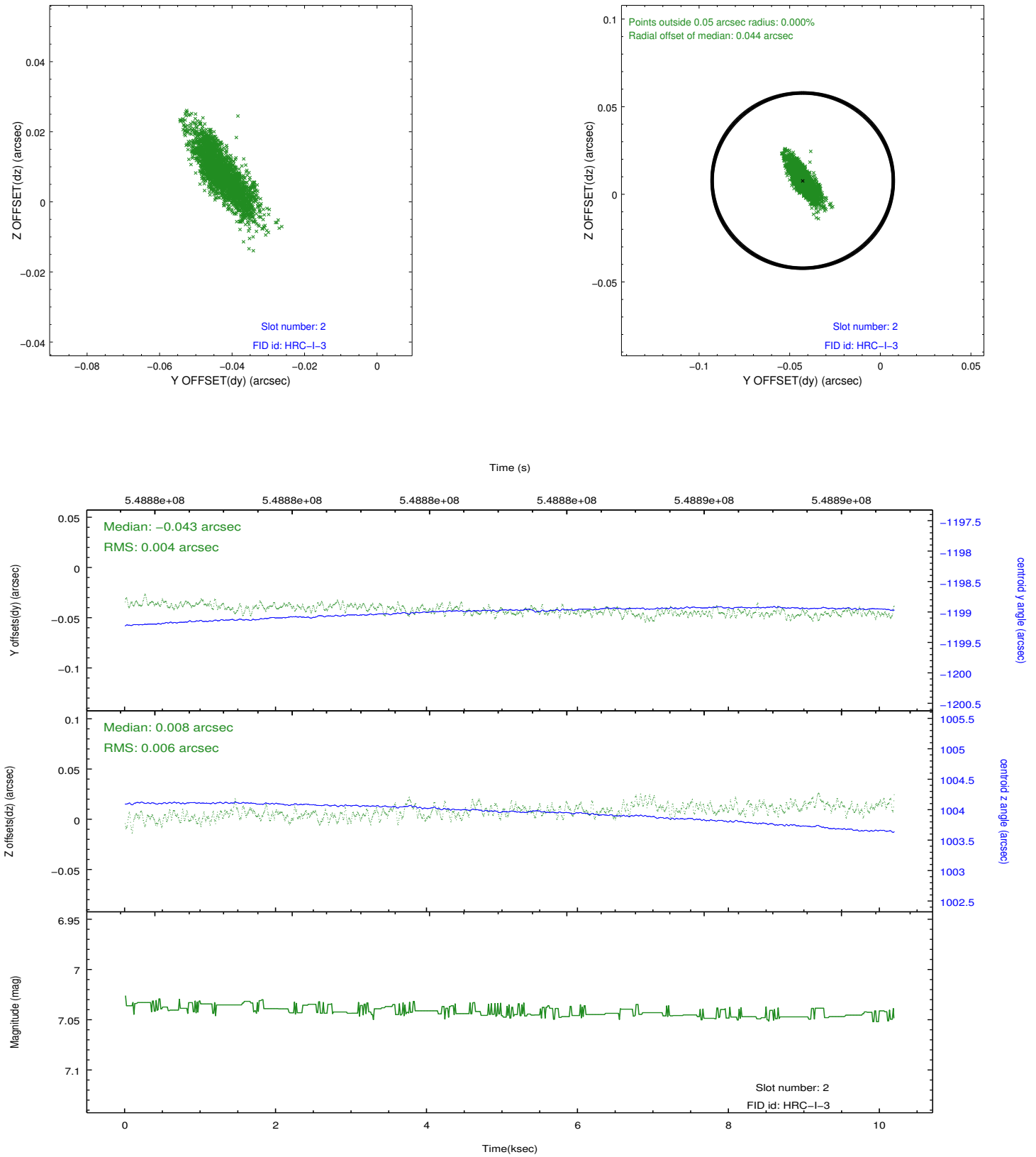
### 2.5.1 Slot 0



## 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)	2015.05.28
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	10.186450571895

## A.2 Comments

Window constraint met.

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The guide star in slot 6 was removed from the aspect solution due to poor data quality. The aspect solution is improved by the removal of this guide star from the solution.