

V&V Reference Report

L2 ASCDS Version : 10.5.1.1

Observation 18066 - L2 Version 1
Chandra X-Ray Center

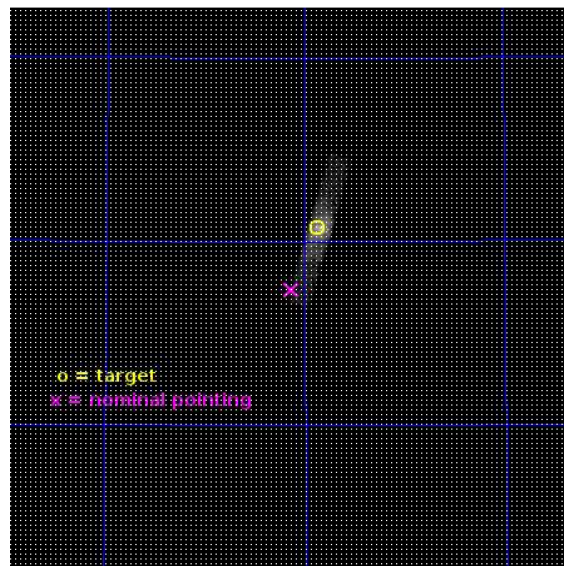
L2 Processing Date : Sep 4 2016

Contents

1	Front	2
2	OBI	3
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
A	Summary	17
A.1	Status	17
A.2	Comments	17

1 Front

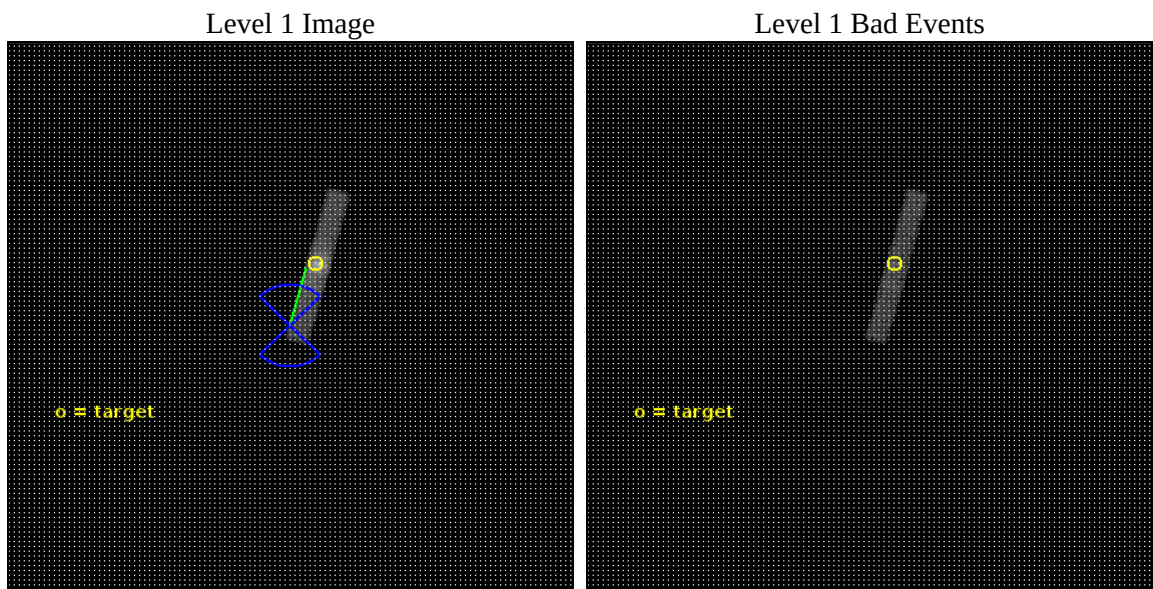
seq_num	601248	Sequence number
obs_id	18066	Observation id
title	Timing and Spectral Studies of the Extreme Binary Population in M82	
observer	Professor Fiona Harrison	Principal investigator
object	M82 offset 1	Source name
dtcycle	0	
cycle	P	events from which exps? Prim/Second/Both
ra_targ	148.969583	Observer's specified target RA [deg]
dec_targ	69.679444	Observer's specified target Dec [deg]
ra_nom	149.03431781004	Nominal RA [deg]
dec_nom	69.62298852988	Nominal Dec [deg]
roll_nom	15.329782769223	Nominal Roll [deg]
revision	1	Processing version of data
ontime	25099.5	Sum of GTIs [s]
livetime	23195.604761201	Livetime [s]
ontime3	25099.5	Sum of GTIs [s]
l2events	51225	Number of level 2 events



2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias

Chip 3



2.1.3 Parameters

obi_num	0	Obi number	sched_exp_time	25000.000000	[s] Scheduled observation exposure time
ascdsver	10.5.1.1	Processing system revision	ontime	25099.5	Sum of GTIs [s]
caldsver	4.7.2	 	ontime3	25099.5	Sum of GTIs [s]
date	2016-09-04T03:43:24	Date and time of file creation	l1events	85060	Number of level 1 events
revision	1	Processing version of data			

2.1.4 Events

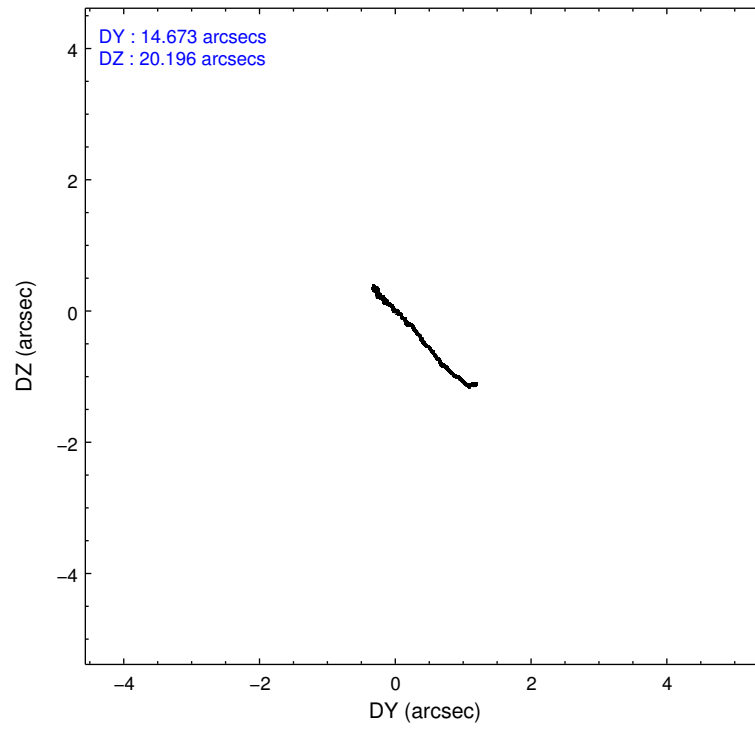
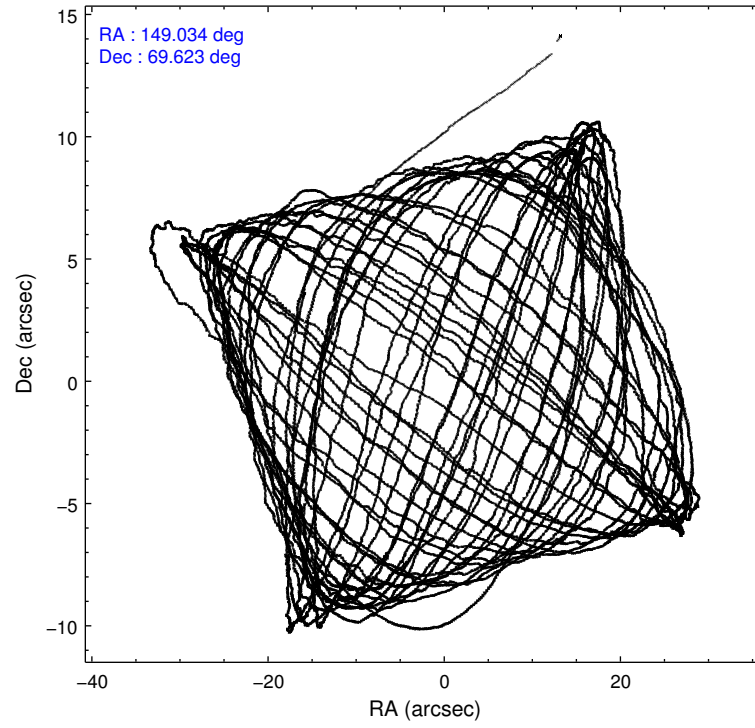
	ccd 3
level 1 events	85060
rejected events	25557
rejected %	30%

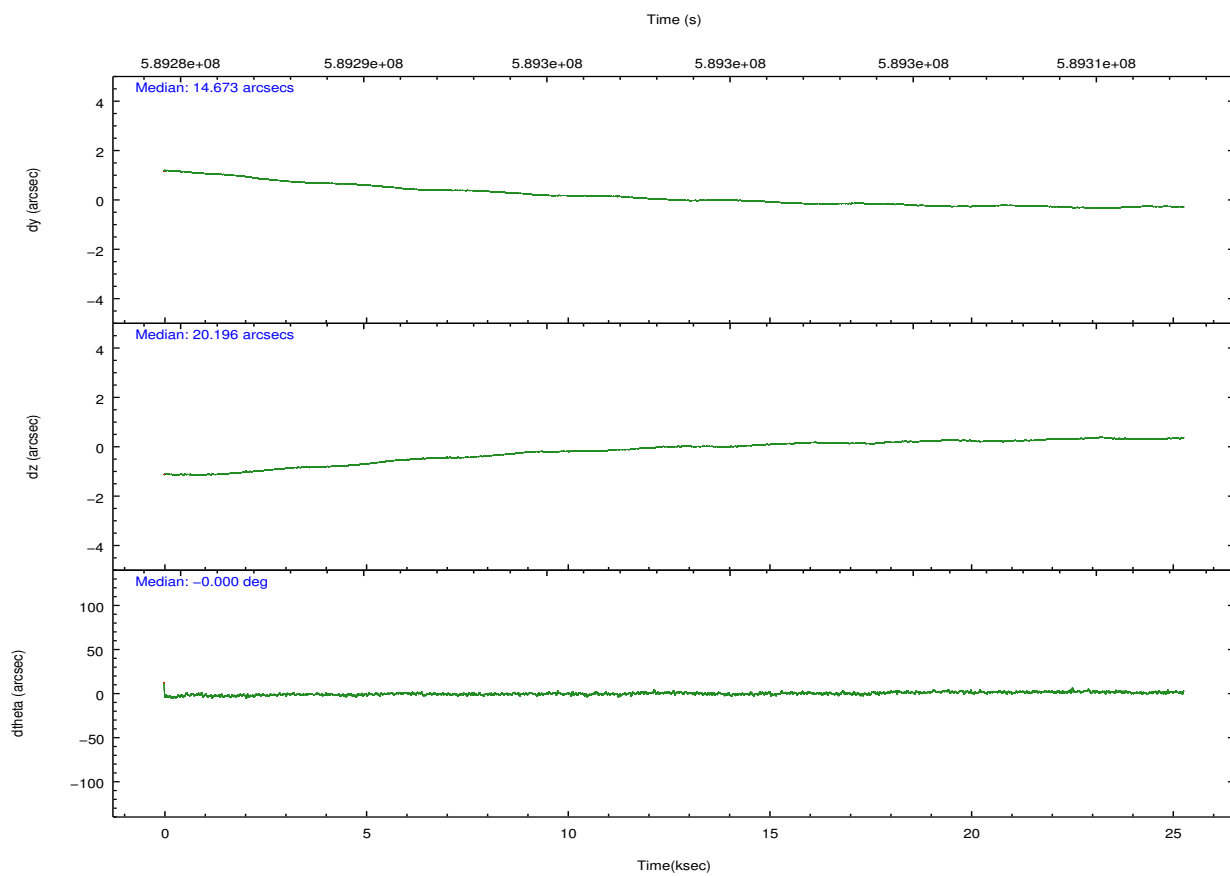
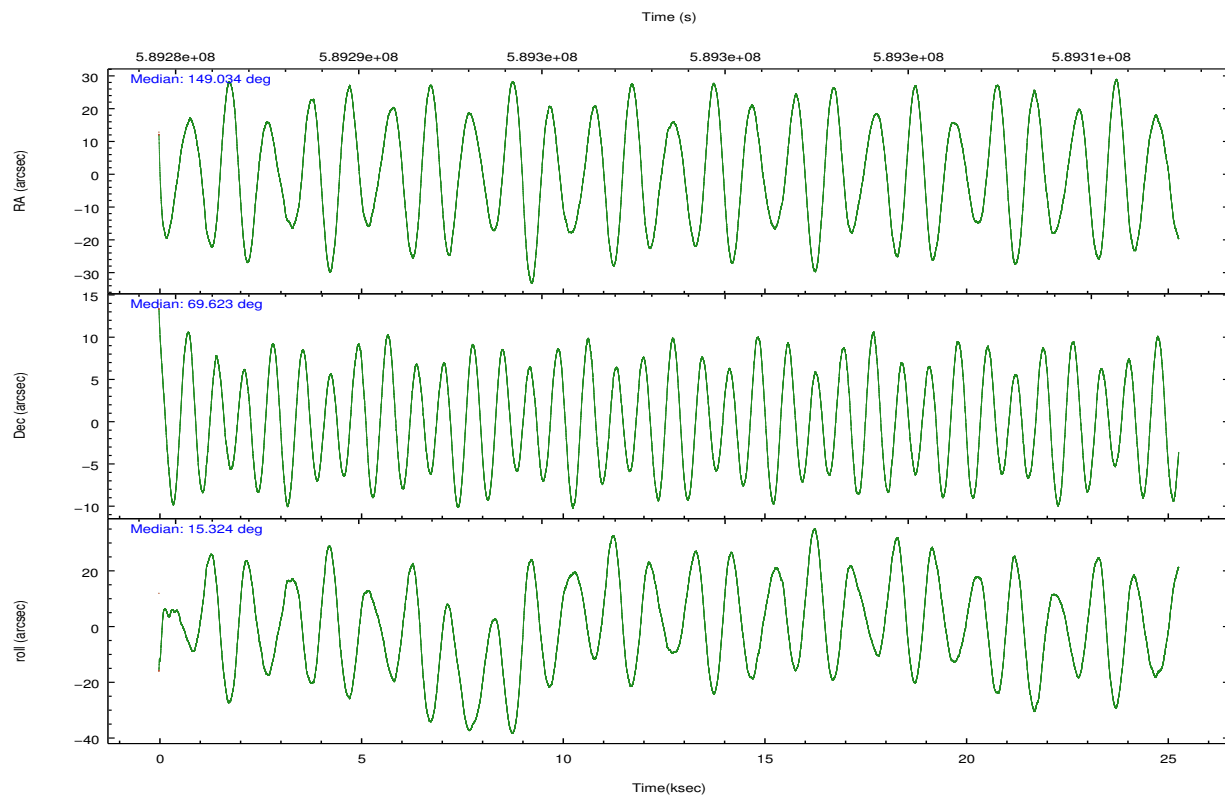
	ccd 3
grade 0 events	46567
	54%
grade 1 events	944
	1%
grade 2 events	5974
	7%
grade 3 events	2386
	2%
grade 4 events	2451
	2%
grade 5 events	1522
	1%
grade 6 events	2132
	2%
grade 7 events	23084
	27%

2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	7	7
Detector	ACIS-3	ACIS-3	Obspar file type	PREDICTED	ACTUAL
Grating	NONE	NONE	Obspar update status	NONE	UPDATED
Data mode	FAINT	FAINT	Number of optional ACIS chips dropped	0	0
Observation mode	POINTING	POINTING	On-chip summing requested	N	N
[deg] Pointing RA	148.978854	149.0343178100388	Subarray requested	CUSTOM	1/8
[deg] Pointing Dec	69.603288	69.62298852987985	Subarray start row	897	897
[deg] Pointing Roll	15.173088	15.32978276922316	Subarray row count	128	128
[deg] Roll angle	180.000000	180.000000	Alternating exposures requested	N	N
[deg] Roll tolerance	45.000000	45.000000	[s] Primary exposure time	0.000000	0.5
Roll constraint allows 180D rotation	Y	Y			
[mm] SIM focus pos	-0.782348	-0.7809083437167272			
[mm] SIM defocus	0	0.001439871863259334			
[mm] SIM translation stage pos	-233.592463	-233.5874344608287			
[mm] SIM translation stage offset	0	-0.005018542100998502			
[s] Observation start time (MET)	589286083.184000	589284734.64241			
Observation start date	2016-09-03T10:33:35	2016-09-03T10:12:14			
[s] Observation end time (MET)	589311083.184000	589312122.64399			
Observation end date	2016-09-03T17:30:15	2016-09-03T17:48:42			
Read mode	TIMED	TIMED			

2.3 Aspect



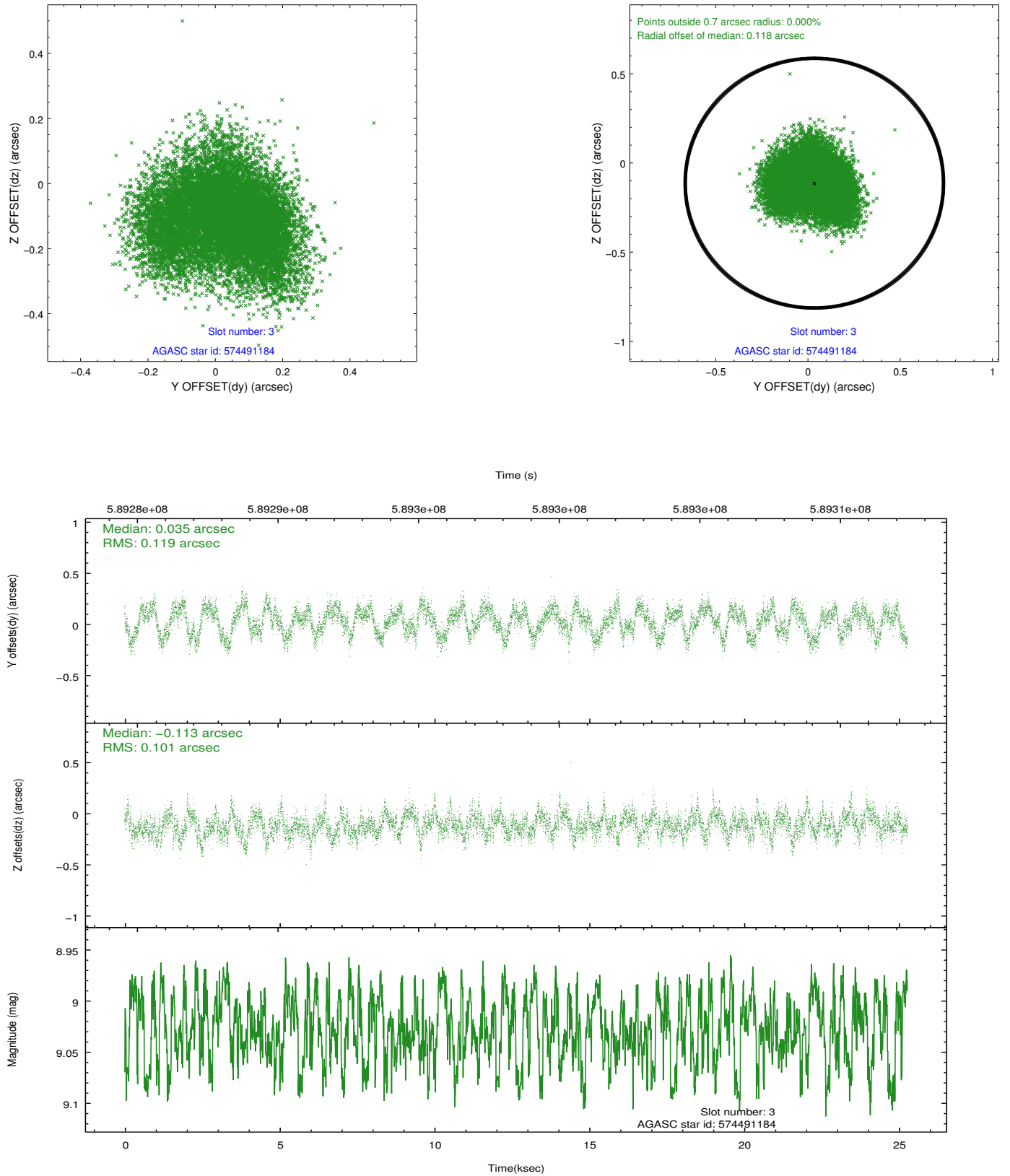


Slot Statistics

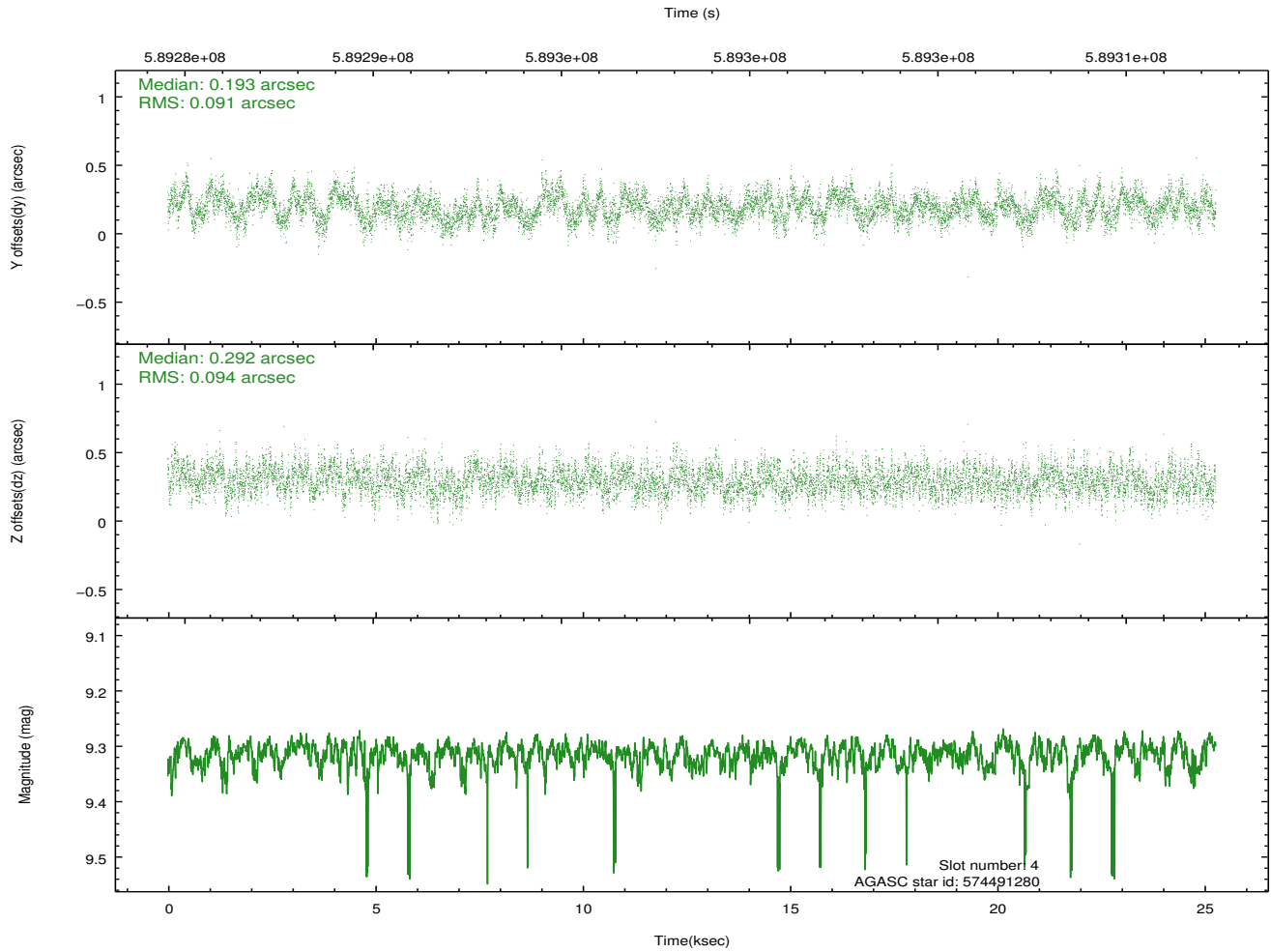
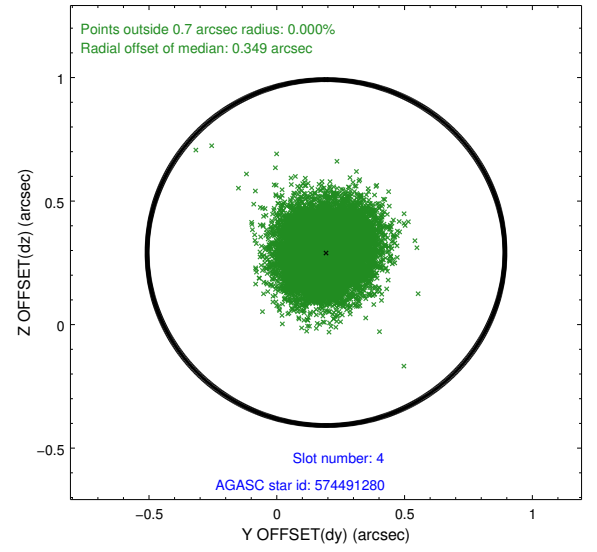
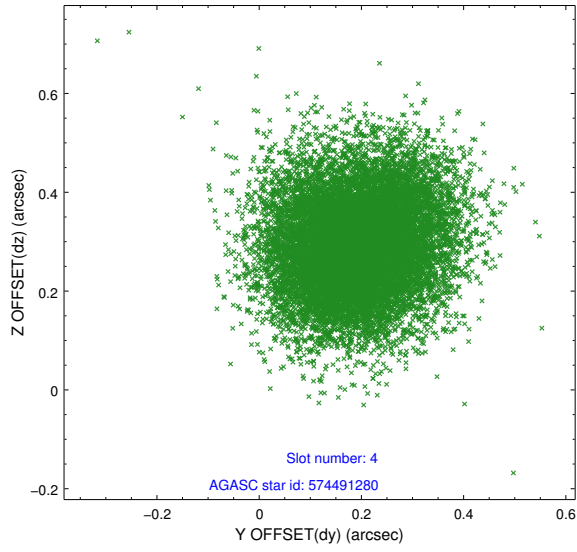
slot	status	used	id	mag	n_pts	med_dy	med_dz	dr1	dr2	ra	dec	mean_y	mean_z
0	FID		ACIS-I-1	7.17	6167	-0.018	-0.027	0.027	0.061	0.000000	0.000000	924.58	-843.79
1	FID		ACIS-I-2	7.08	6166	-0.285	-0.116	0.021	0.037	0.000000	0.000000	-769.71	-850.35
2	FID		ACIS-I-4	7.11	6164	0.207	0.208	0.016	0.028	0.000000	0.000000	2144.69	1056.14
3	GUIDE	used	574491184	9.03	12327	0.035	-0.113	0.170	0.262	148.582453	69.768699	-319.58	705.64
4	GUIDE	used	574491280	9.31	12326	0.193	0.292	0.140	0.225	148.611567	69.450135	-593.62	-409.73
5	GUIDE	used	574491872	9.22	12323	0.219	-0.078	0.154	0.245	147.207613	69.765453	-1968.55	1166.43
6	GUIDE	used	574886496	8.48	12320	-0.479	-0.298	0.103	0.171	148.945563	70.041136	372.72	1532.58
7	GUIDE	used	574489568	9.68	12321	0.051	0.186	0.196	0.310	147.223974	69.438157	-2287.92	38.06

2.4 Star Slots

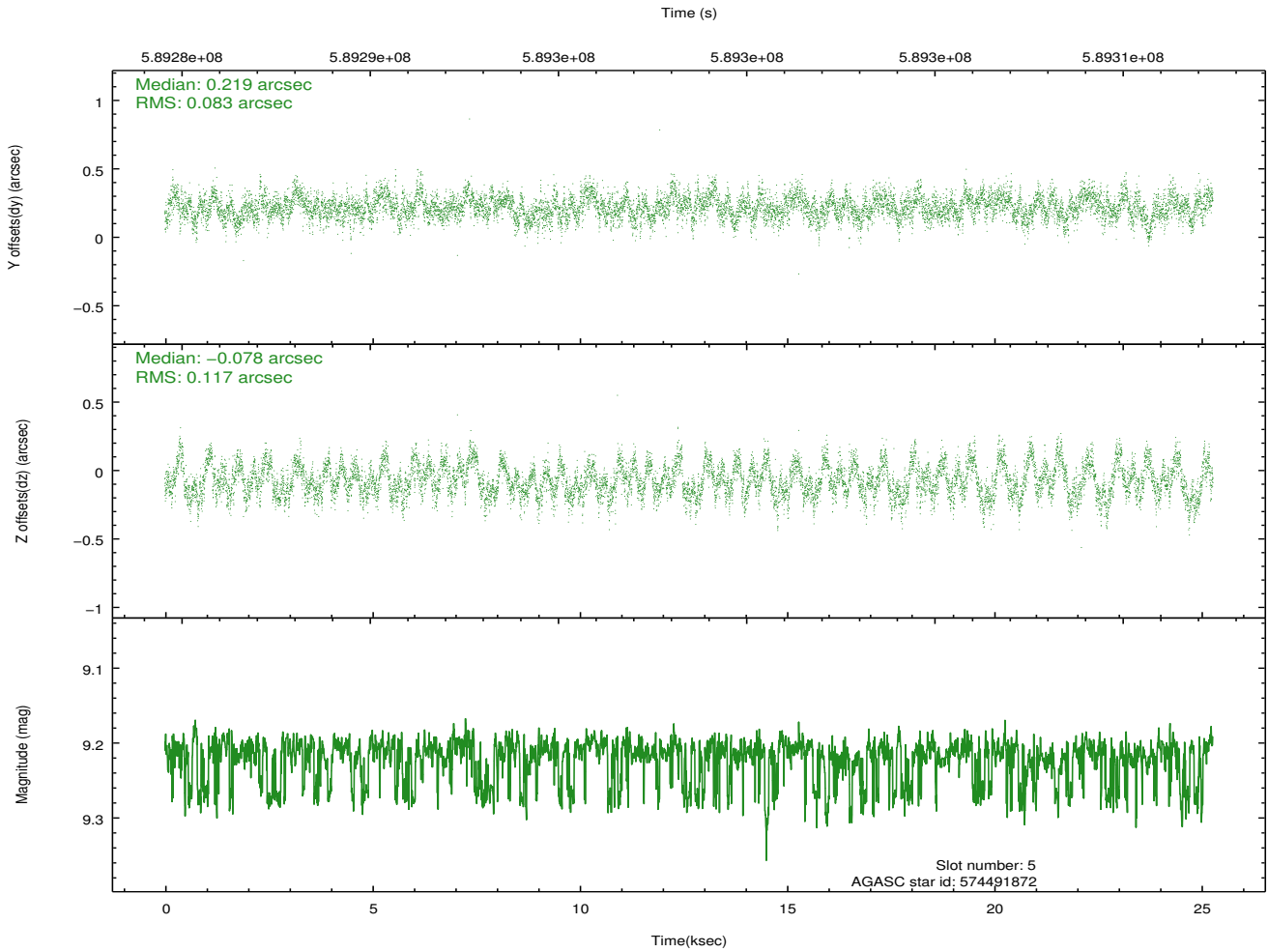
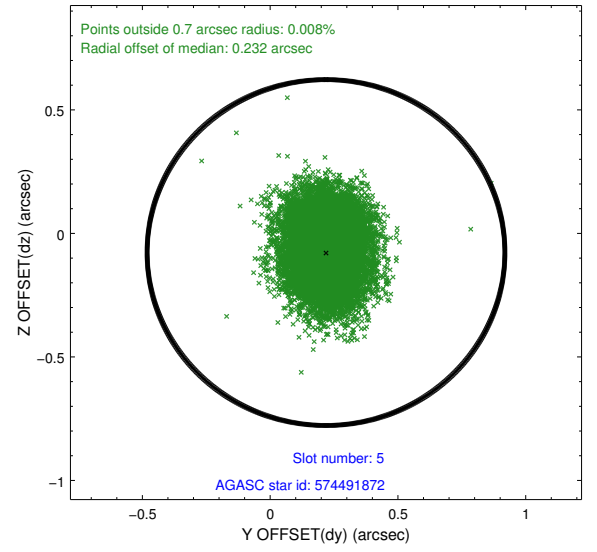
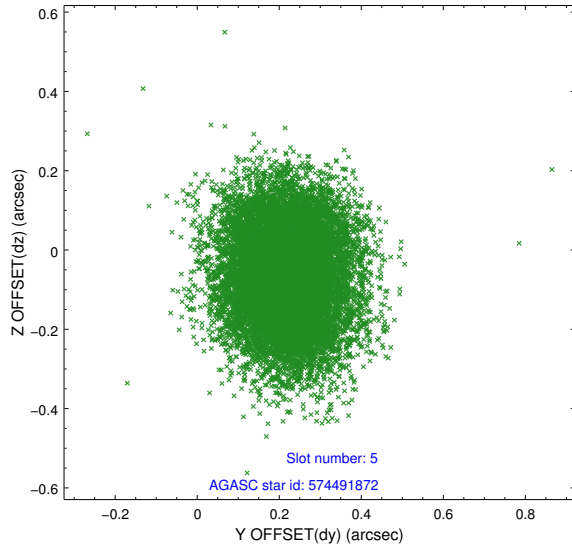
2.4.1 Slot 3



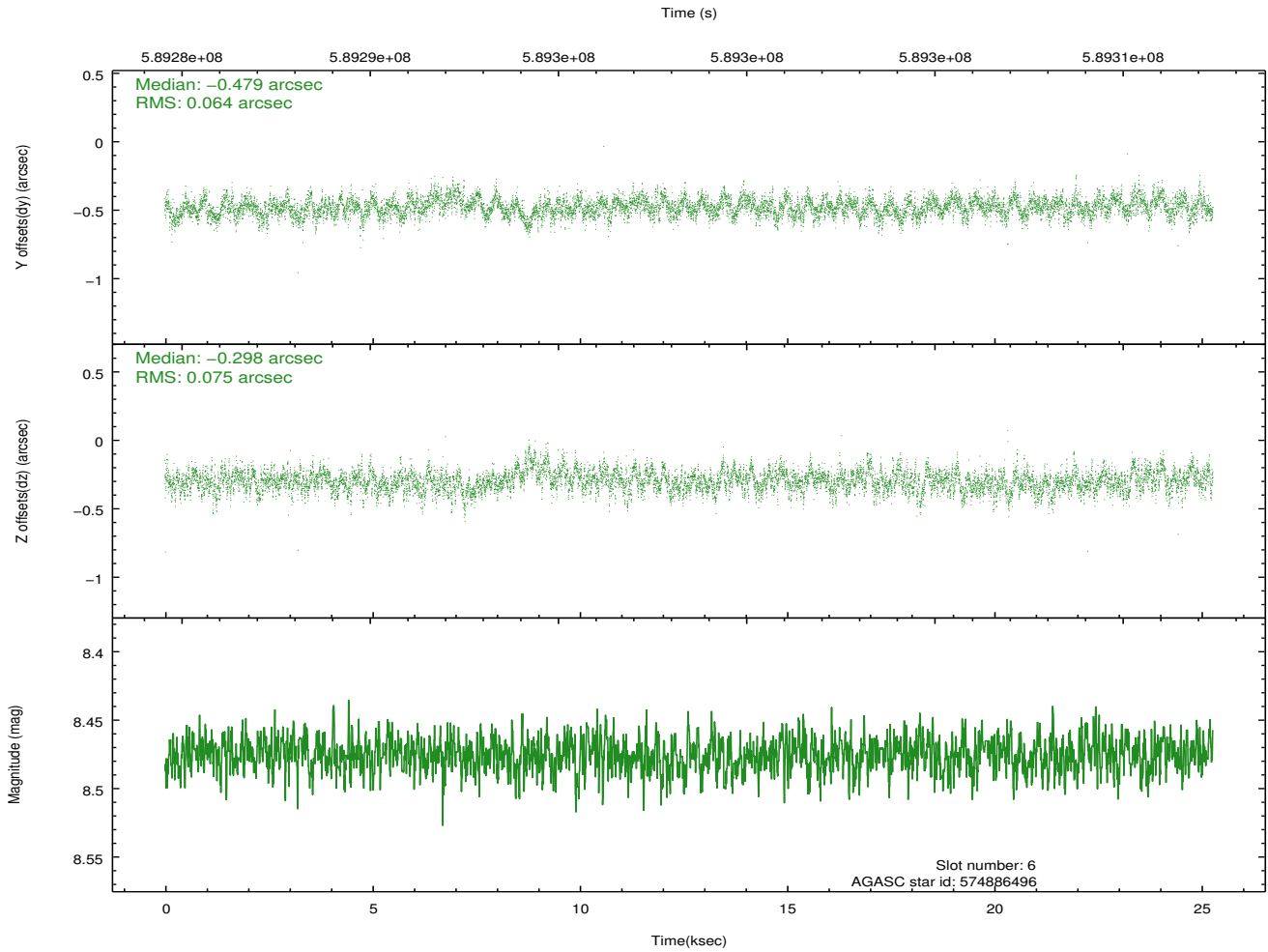
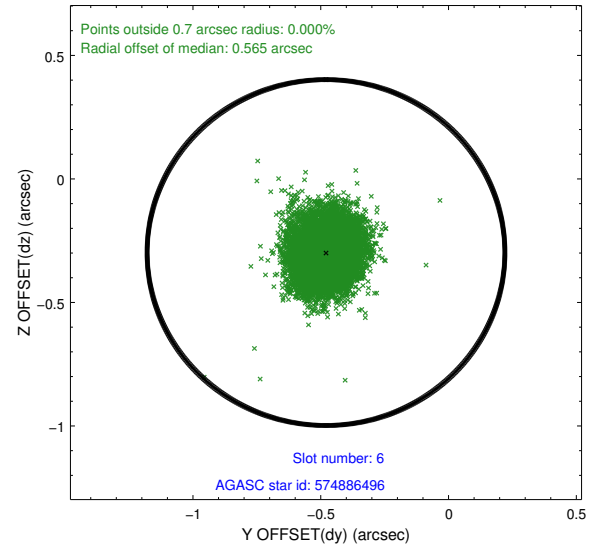
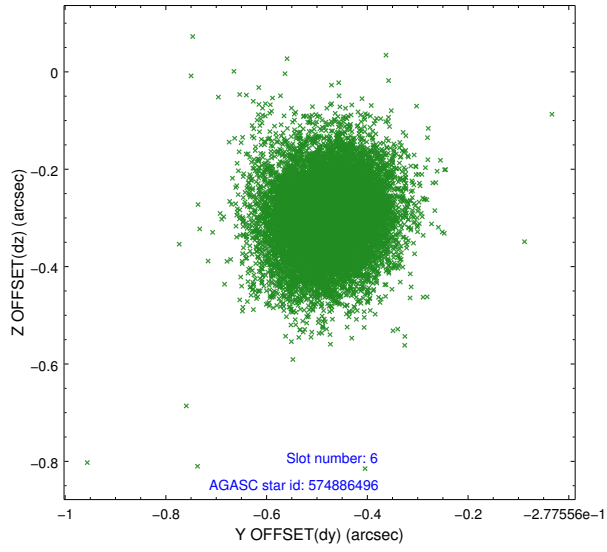
2.4.2 Slot 4



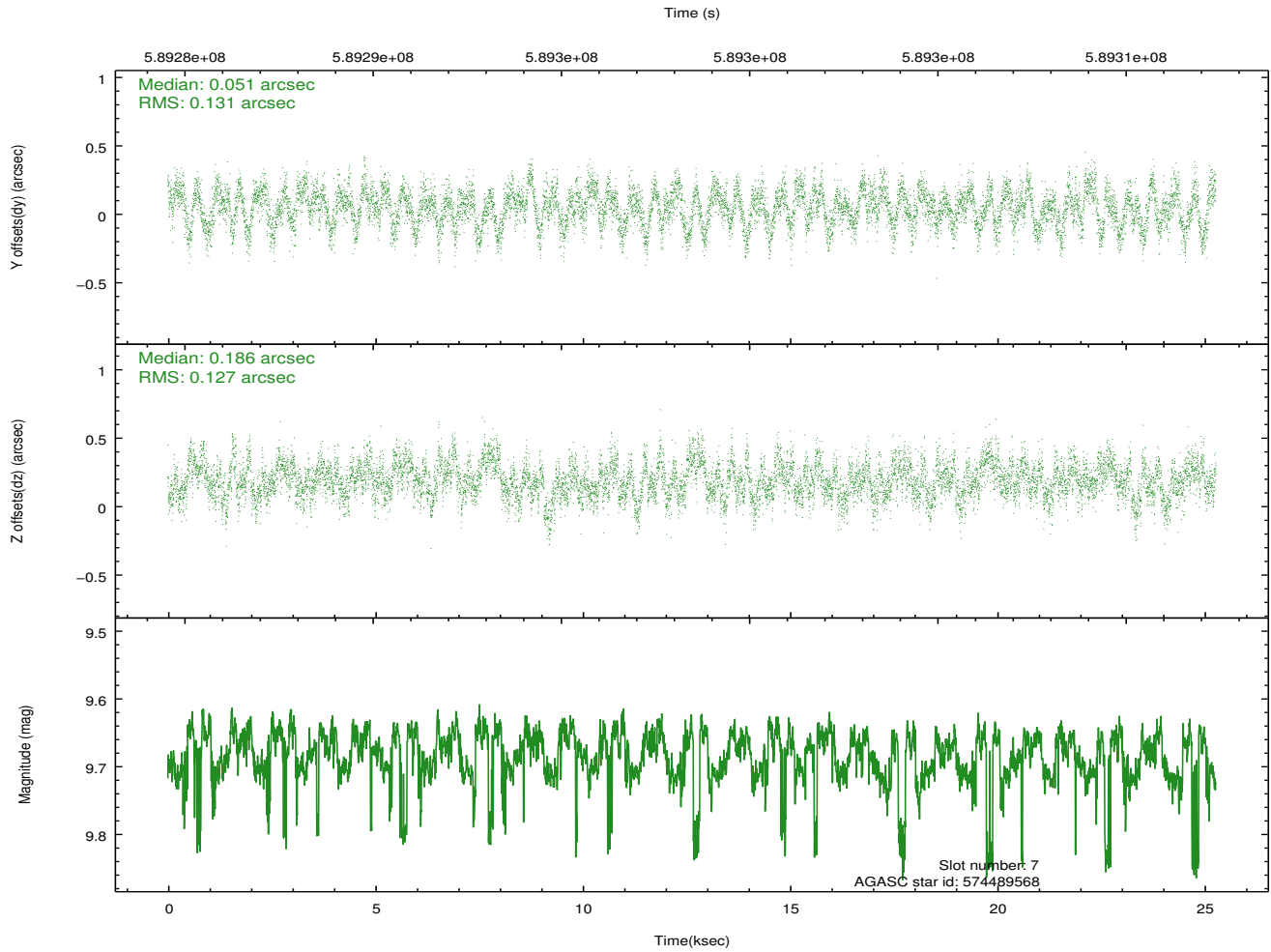
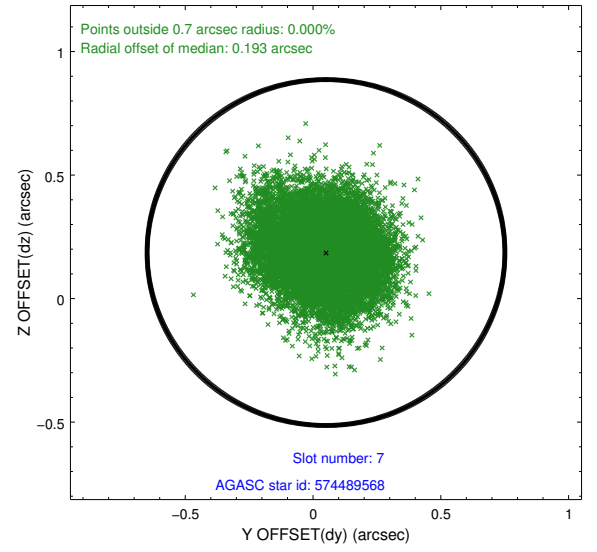
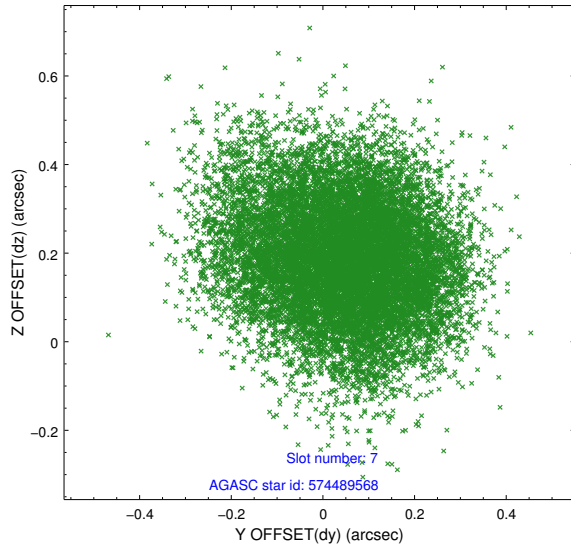
2.4.3 Slot 5



2.4.4 Slot 6

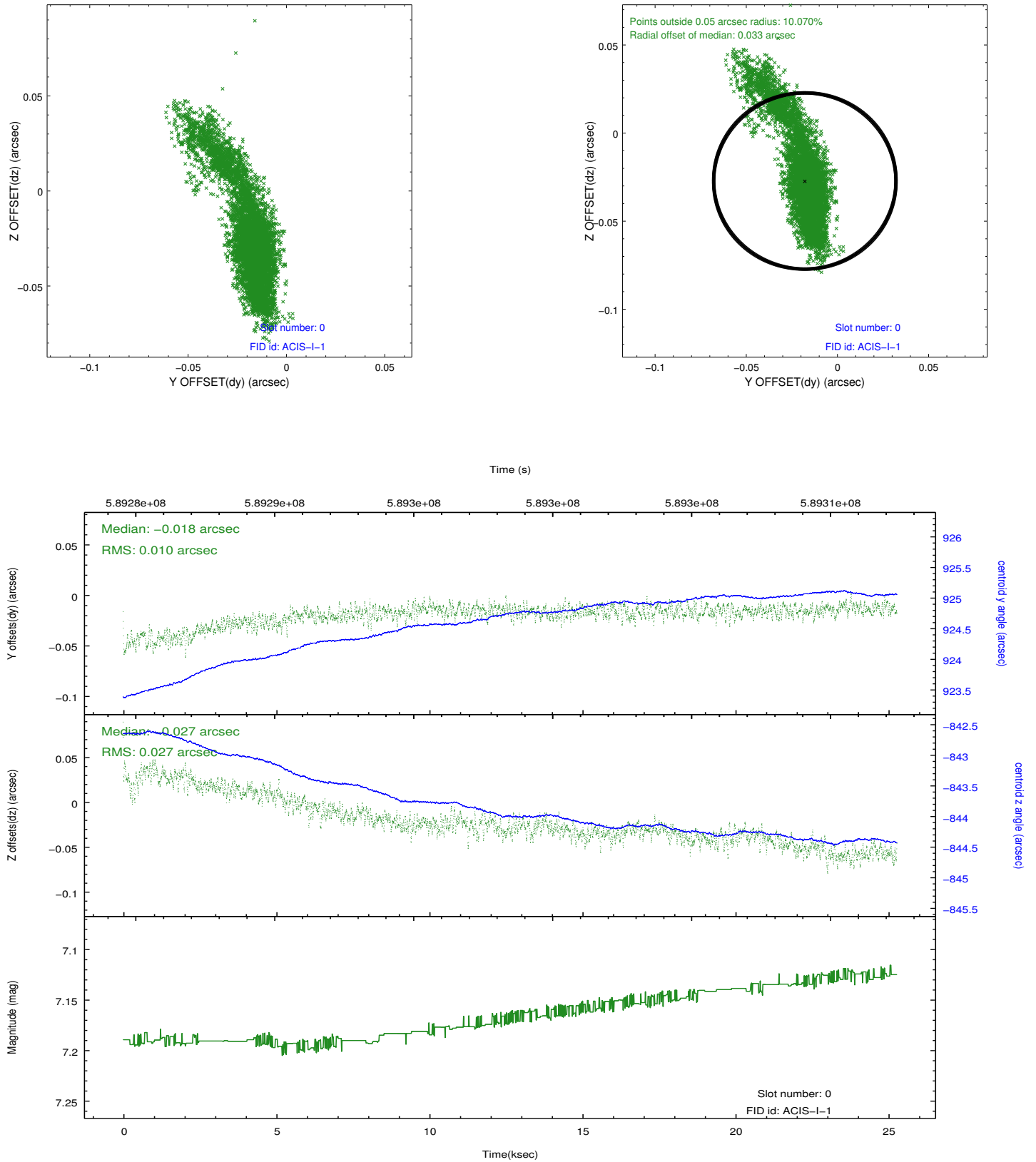


2.4.5 Slot 7

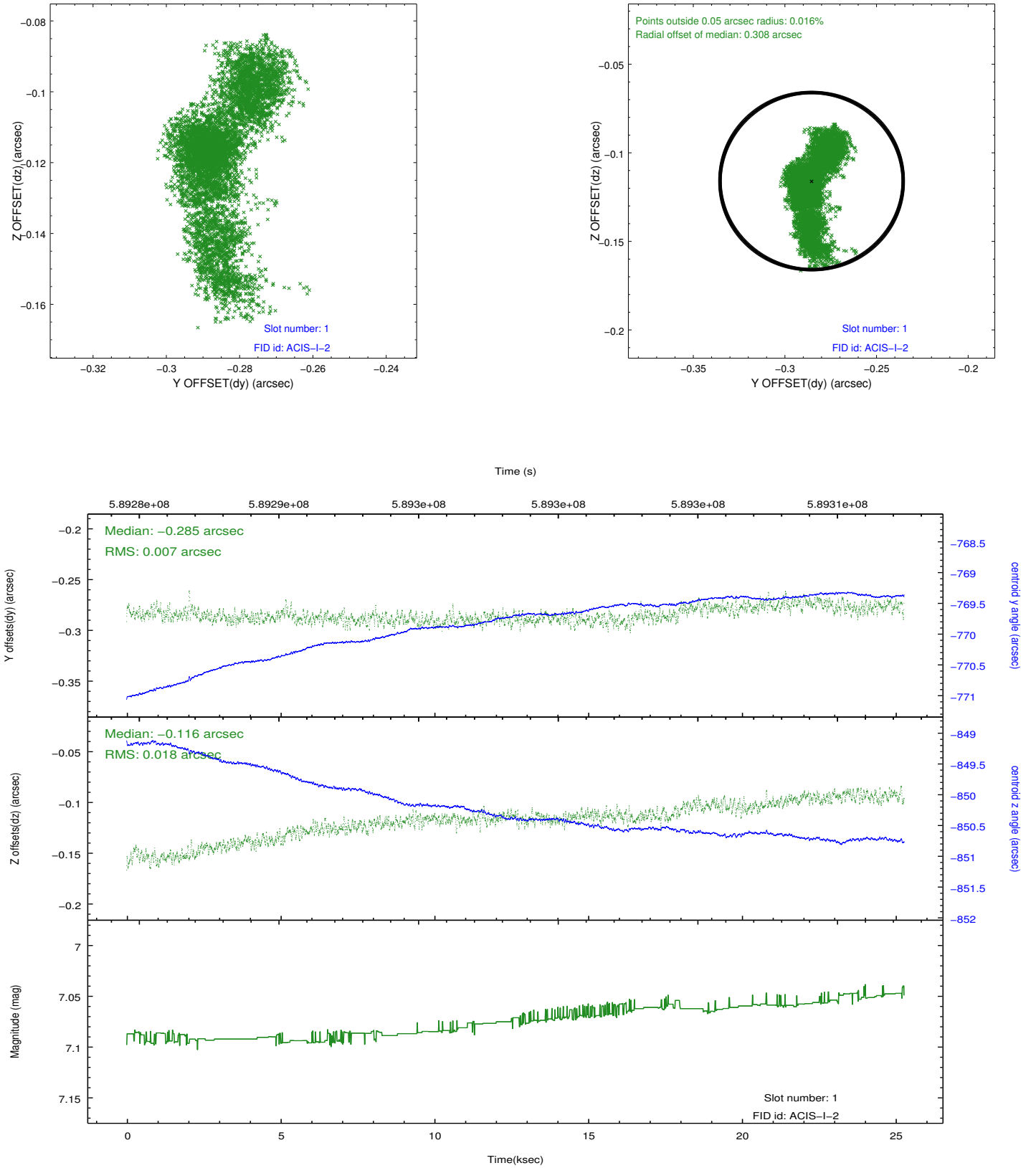


2.5 FID Slots

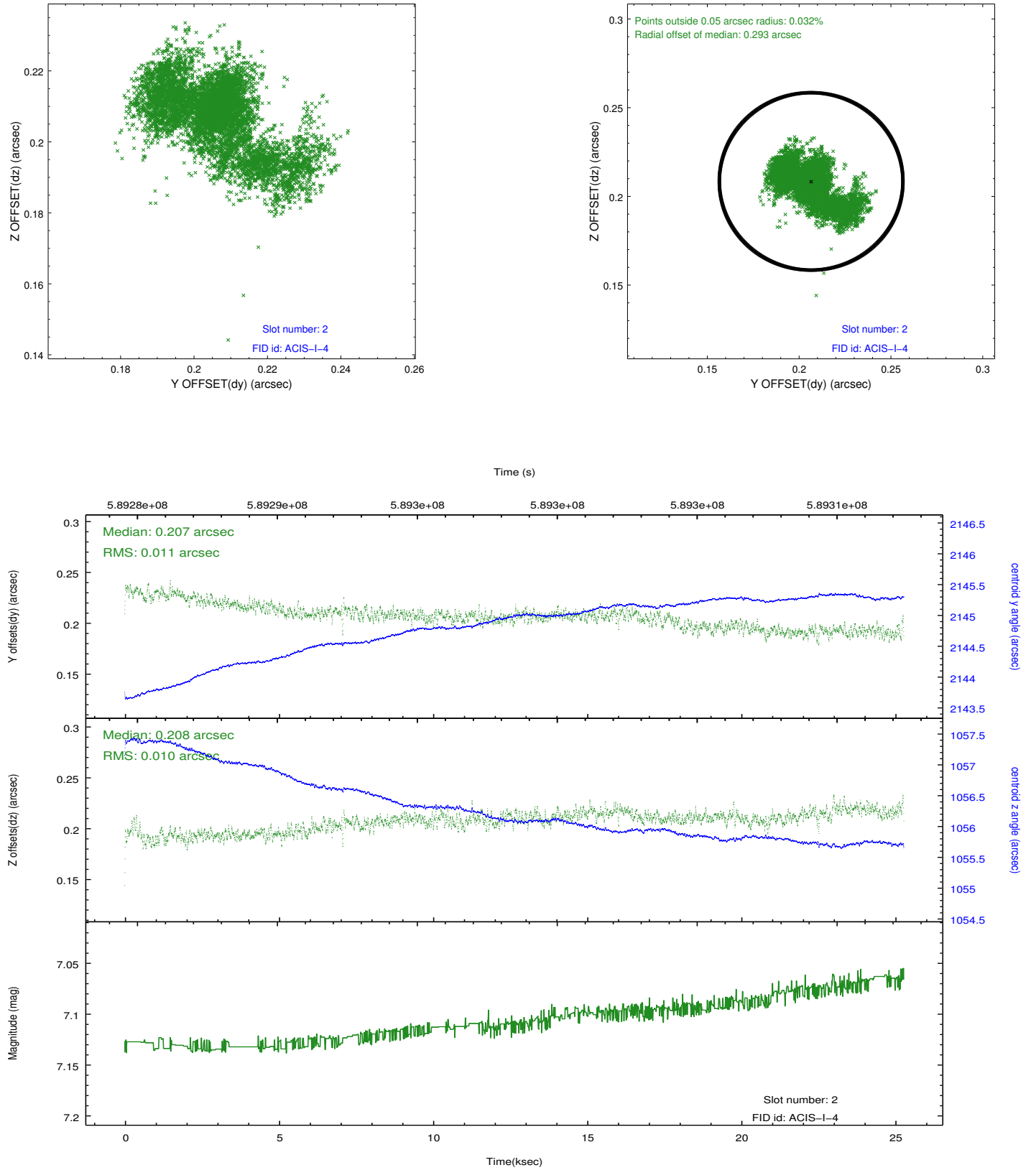
2.5.1 Slot 0



2.5.2 Slot 1



2.5.3 Slot 2



A Summary

A.1 Status

V&V Scientist	Beth Sundheim
V&V Date (YYYY-MM-DD)	2016.09.05
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	25.0995

A.2 Comments

Roll preference met.