

V&V Reference Report

L2 ASCDS Version : 8.4.5

Observation 2157 - L2 Version 3
Chandra X-Ray Center

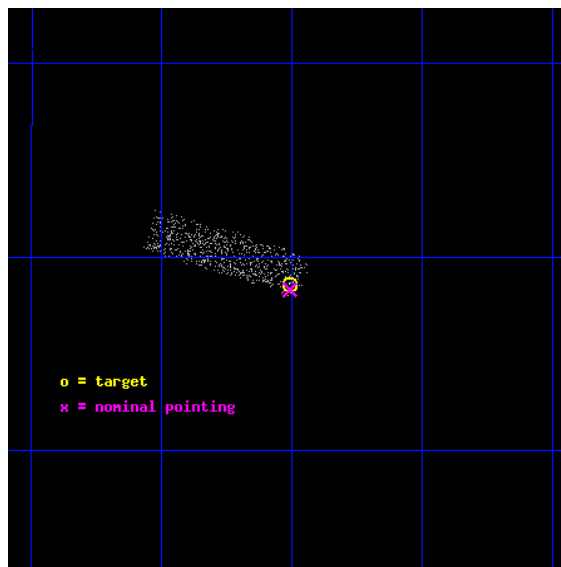
L2 Processing Date : Sep 10 2012

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1 Front

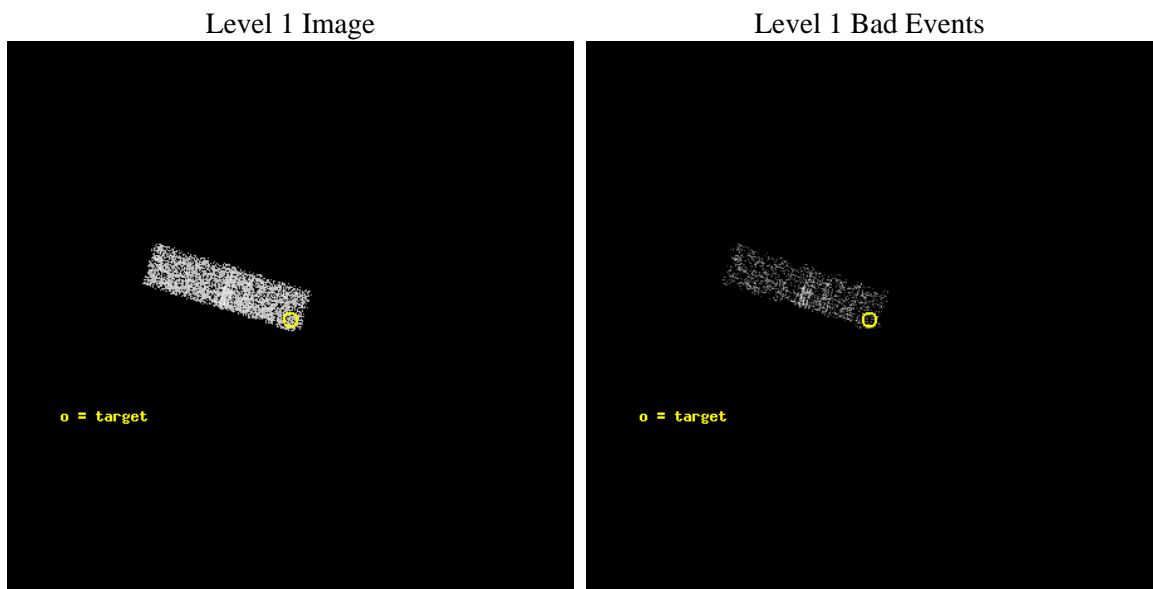
| | | |
|----------|--------------------------------------|---------------------------------------------|
| seq_num | 700347 | Sequence number |
| obs_id | 2157 | Observation id |
| title | RED QUASARS AND THE X-RAY BACKGROUND | Proposal title |
| observer | Dr. Belinda Wilkes | Principal investigator |
| object | 2MASSJ023430+2438 | Source name |
| dtcycle | 0 | |
| cycle | P | events from which exps? Prim/Second/Both |
| ra_targ | 38.6275 | Observer's specified target RA [deg] |
| dec_targ | 24.643194 | Observer's specified target Dec [deg] |
| ra_nom | 38.627035470834 | Nominal RA [deg] |
| dec_nom | 24.638463958177 | Nominal Dec [deg] |
| roll_nom | 287.28499622813 | Nominal Roll [deg] |
| revision | 3 | Processing version of data |
| ontime | 4137.5999846011 | Sum of GTIs [s] |
| livetime | 3935.698644156 | Livetime [s] |
| ontime3 | 4137.5999846011 | Sum of GTIs [s] |
| l2events | 771 | Number of level 2 events |



2 OBI

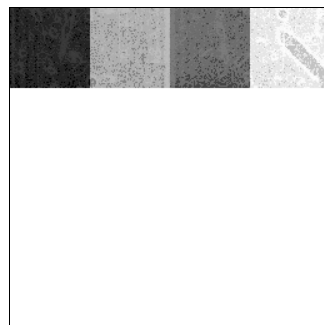
2.1 OBI

2.1.1 Images



2.1.2 Bias

Chip 3



2.1.3 Parameters

| | | | | | |
|----------|---------------------|--------------------------------|----------------|-----------------|-----------------------------------------|
| obi_num | 0 | Obi number | sched_exp_time | 4300.000000 | [s] Scheduled observation exposure time |
| ascdsver | 8.4.5 | Processing system revision | ontime | 4137.5999846011 | Sum of GTIs [s] |
| caldsver | 4.5.1.1 | | ontime3 | 4137.5999846011 | Sum of GTIs [s] |
| date | 2012-09-07T03:40:50 | Date and time of file creation | l1events | 7805 | Number of level 1 events |
| revision | 3 | Processing version of data | | | |

2.1.4 Events

| | |
|-----------------|--------------|
| | ccd 3 |
| level 1 events | 7805 |
| rejected events | 6874 |
| rejected % | 88% |

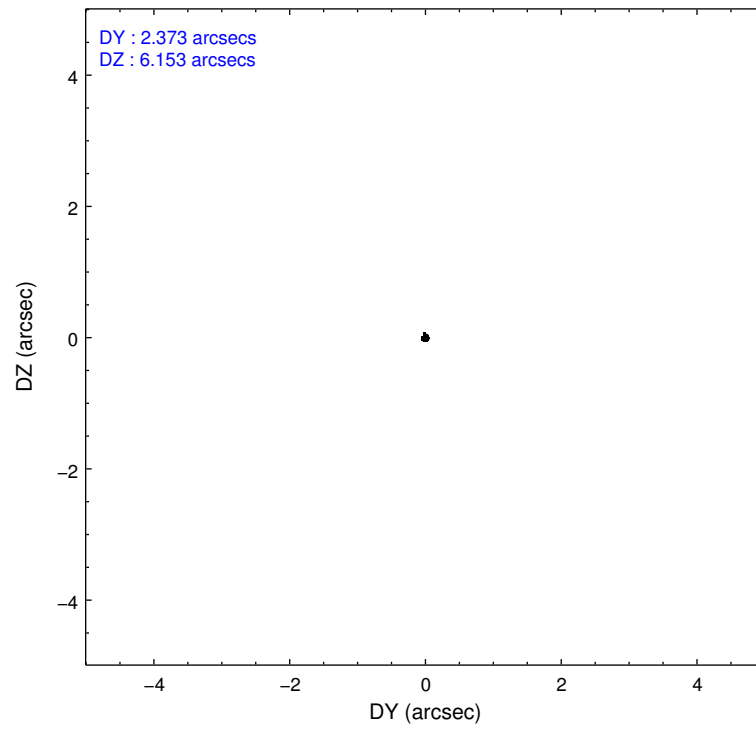
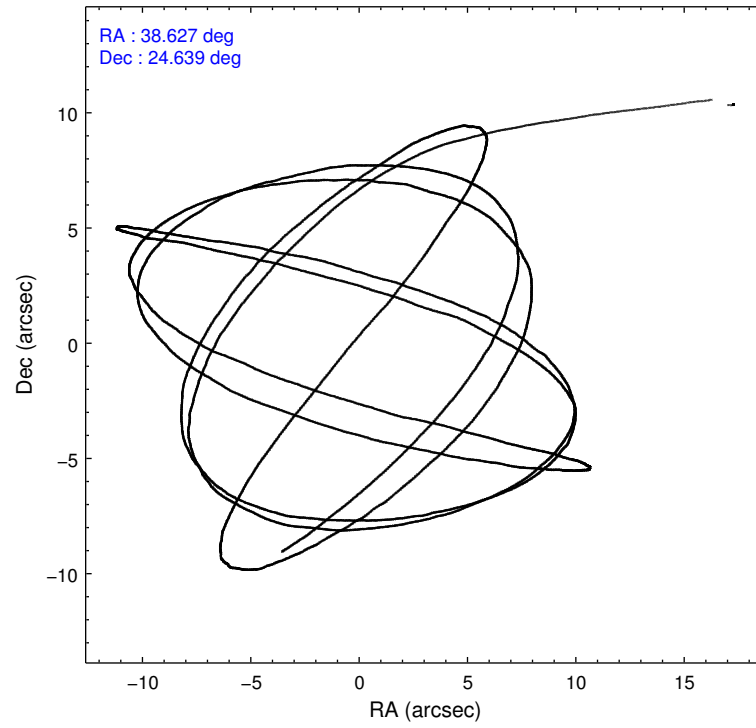
| | |
|----------------|--------------|
| | ccd 3 |
| grade 0 events | 310 |
| | 3% |
| grade 1 events | 1 |
| | 0% |
| grade 2 events | 182 |
| | 2% |
| grade 3 events | 152 |
| | 1% |
| grade 4 events | 126 |
| | 1% |
| grade 5 events | 228 |
| | 2% |
| grade 6 events | 161 |
| | 2% |
| grade 7 events | 6645 |
| | 85% |

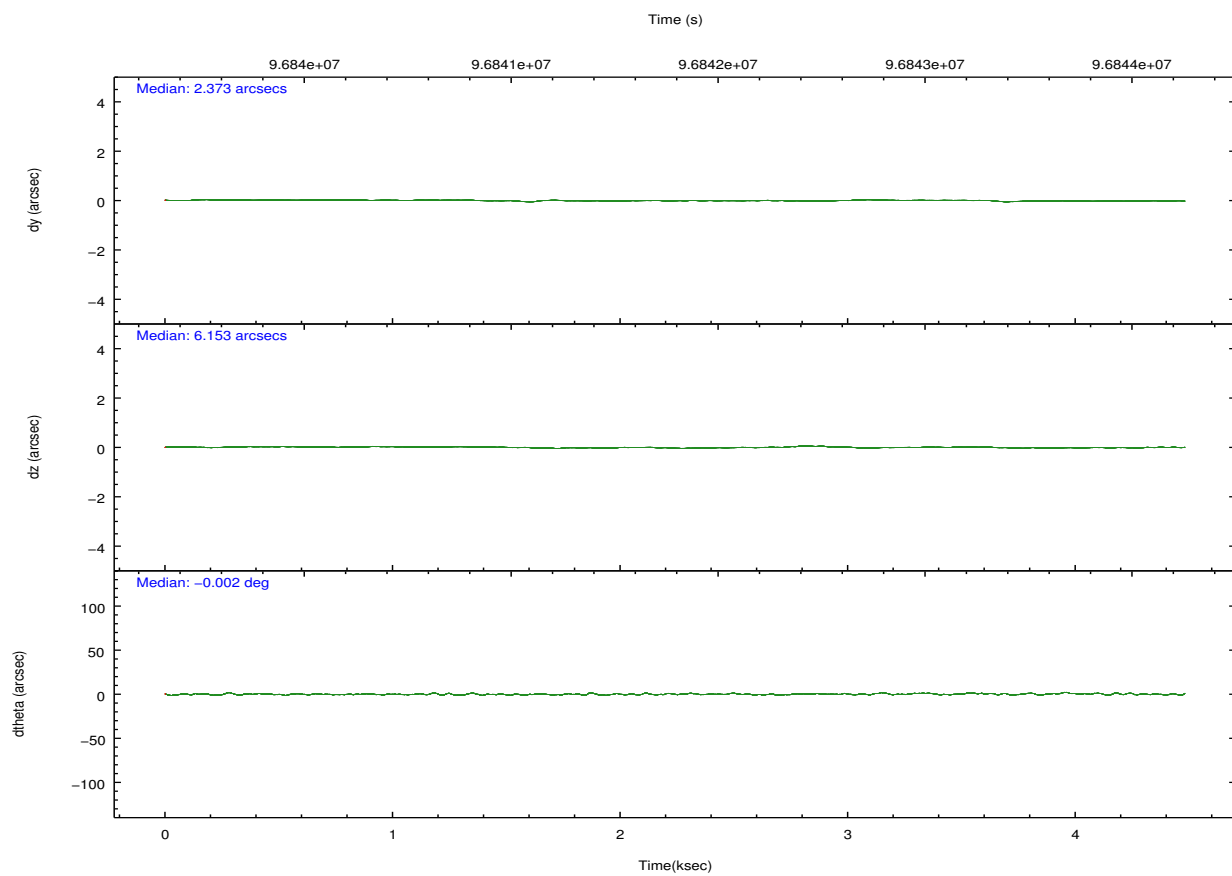
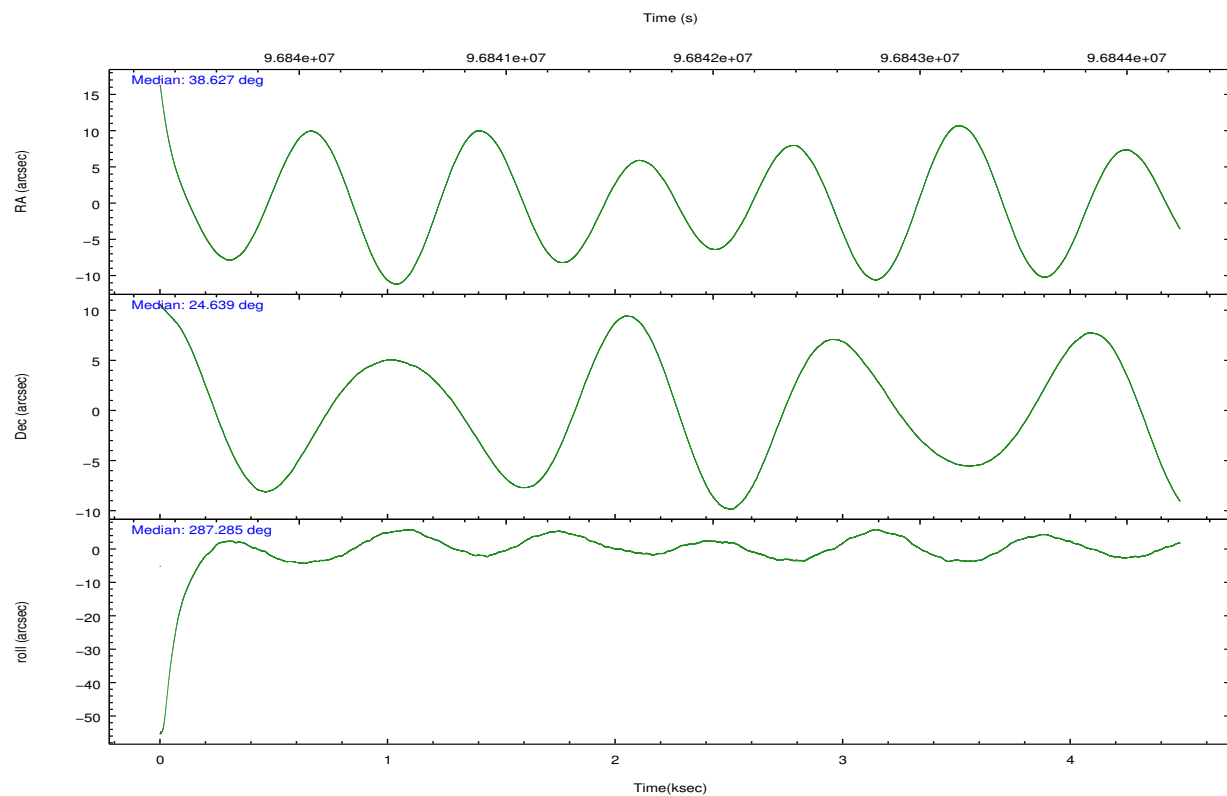
2.2 Compared Parameters

| Parameter | Planned | Actual |
|-----------------------------------|---------------------|-----------------------|
| Instrument | ACIS | ACIS |
| Detector | ACIS-3 | ACIS-3 |
| Grating | NONE | NONE |
| Data mode | VFAINT | VFAINT |
| Observation mode | POINTING | POINTING |
| [deg] Pointing RA | 38.604773 | 38.62703547083371 |
| [deg] Pointing Dec | 24.657078 | 24.63846395817669 |
| [deg] Pointing Roll | 287.085697 | 287.2849962281265 |
| [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) | 96839734.184000 | 96839032.39610501 |
| Observation start date | 2001-01-25T19:54:30 | 2001-01-25T19:43:52 |
| [s] Observation end time (MET) | 96844034.184000 | 96844513.07131501 |
| Observation end date | 2001-01-25T21:06:10 | 2001-01-25T21:15:13 |
| Read mode | TIMED | TIMED |

| Parameter | Planned | Actual |
|---------------------------------------|-----------|---------|
| Obspar format version number | 7 | 7 |
| Obspar file type | PREDICTED | ACTUAL |
| Obspar update status | NONE | UPDATED |
| Number of optional ACIS chips dropped | 0 | 0 |
| On-chip summing requested | N | N |
| Subarray requested | CUSTOM | 1/4 |
| Subarray start row | 769 | 769 |
| Subarray row count | 256 | 256 |
| Alternating exposures requested | N | N |
| [s] Primary exposure time | 0.000000 | 0.8 |

2.3 Aspect



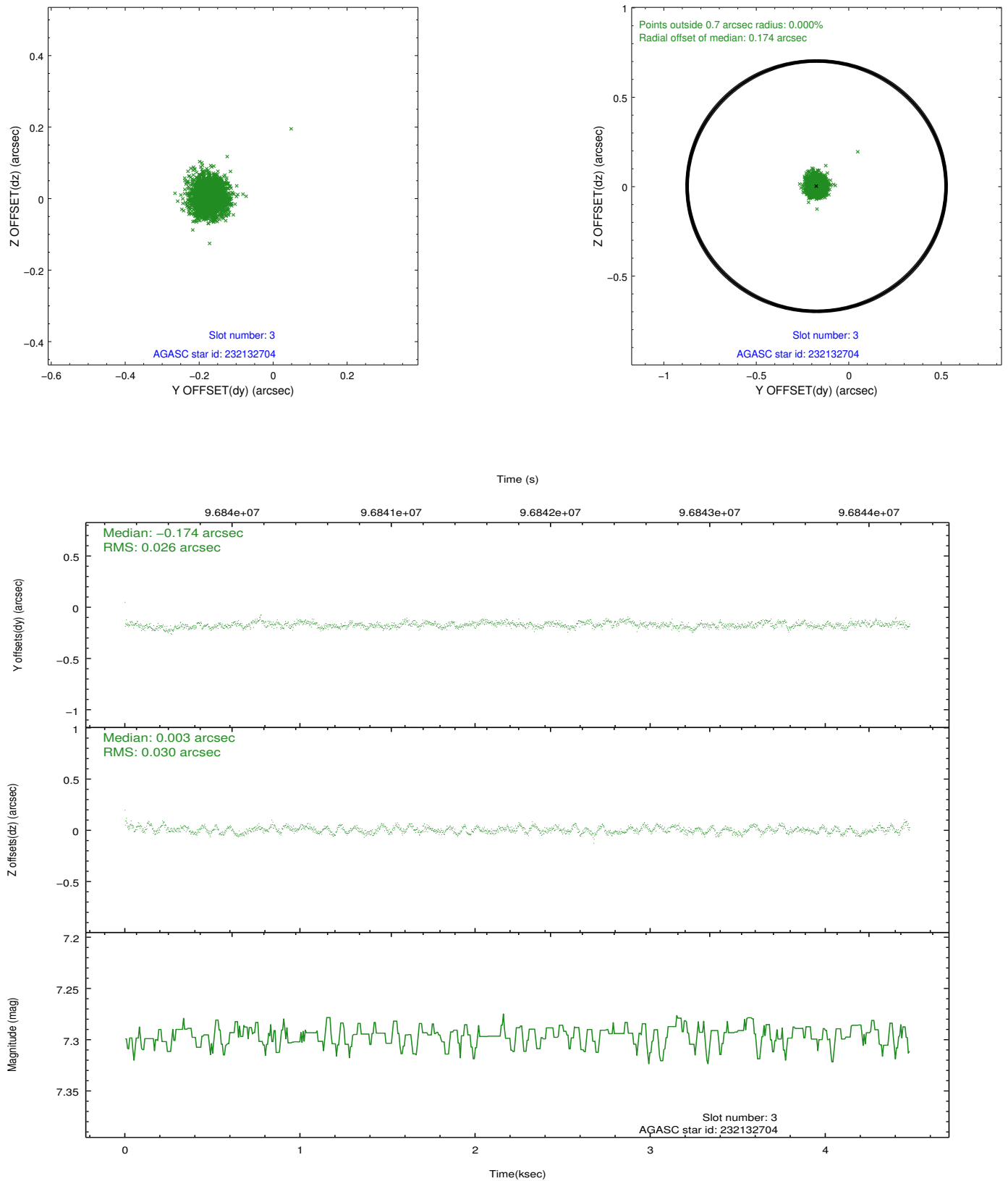


Slot Statistics

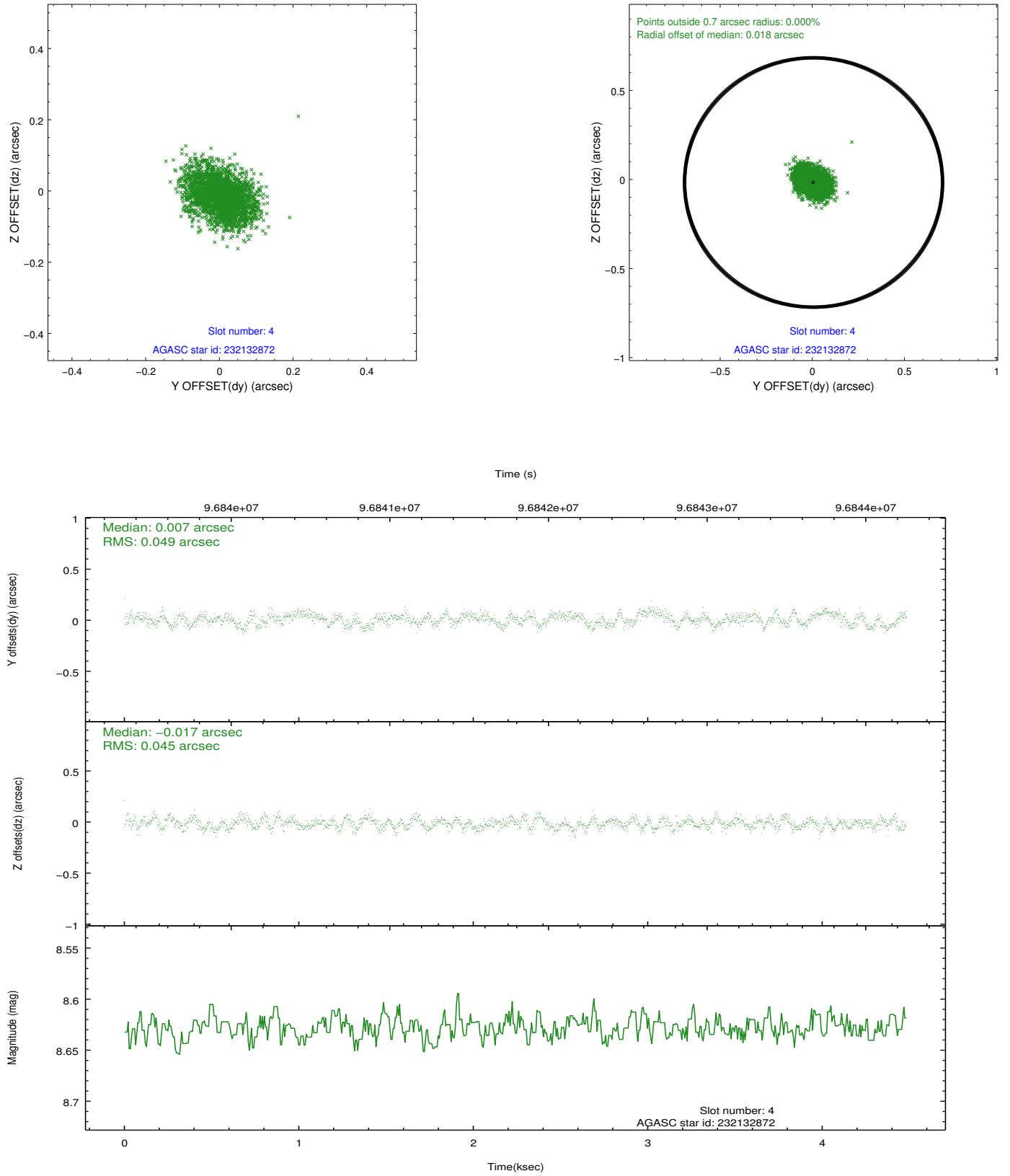
| slot | status | id | mag | n_pts | med_dy | med_dz | dr1 | dr2 | ra | dec | mean_y | mean_z |
|------|--------|-----------|------|-------|--------|--------|-------|-------|-----------|-----------|----------|---------|
| 0 | FID | ACIS-I-2 | 7.15 | 1092 | -0.032 | -0.049 | 0.009 | 0.016 | 0.000000 | 0.000000 | -756.77 | -835.94 |
| 1 | FID | ACIS-I-4 | 7.18 | 1094 | -0.024 | 0.040 | 0.006 | 0.011 | 0.000000 | 0.000000 | 2156.68 | 1069.63 |
| 2 | FID | ACIS-I-5 | 7.23 | 1094 | -0.044 | 0.079 | 0.009 | 0.015 | 0.000000 | 0.000000 | -1808.83 | 1069.09 |
| 3 | GUIDE | 232132704 | 7.30 | 2187 | -0.174 | 0.003 | 0.042 | 0.066 | 38.639596 | 25.015828 | -1200.10 | 488.29 |
| 4 | GUIDE | 232132872 | 8.63 | 2187 | 0.007 | -0.017 | 0.071 | 0.112 | 38.661286 | 24.892760 | -756.11 | 426.20 |
| 5 | GUIDE | 231606152 | 9.13 | 2184 | 0.163 | 0.058 | 0.070 | 0.114 | 39.231809 | 24.207684 | 2147.91 | 1494.63 |
| 6 | GUIDE | 232139376 | 9.31 | 2185 | 0.108 | -0.066 | 0.070 | 0.114 | 38.384648 | 24.434242 | 556.61 | -924.28 |
| 7 | GUIDE | 232132888 | 9.22 | 2186 | -0.104 | 0.022 | 0.069 | 0.115 | 38.450959 | 25.274530 | -2270.65 | 174.32 |

2.4 Star Slots

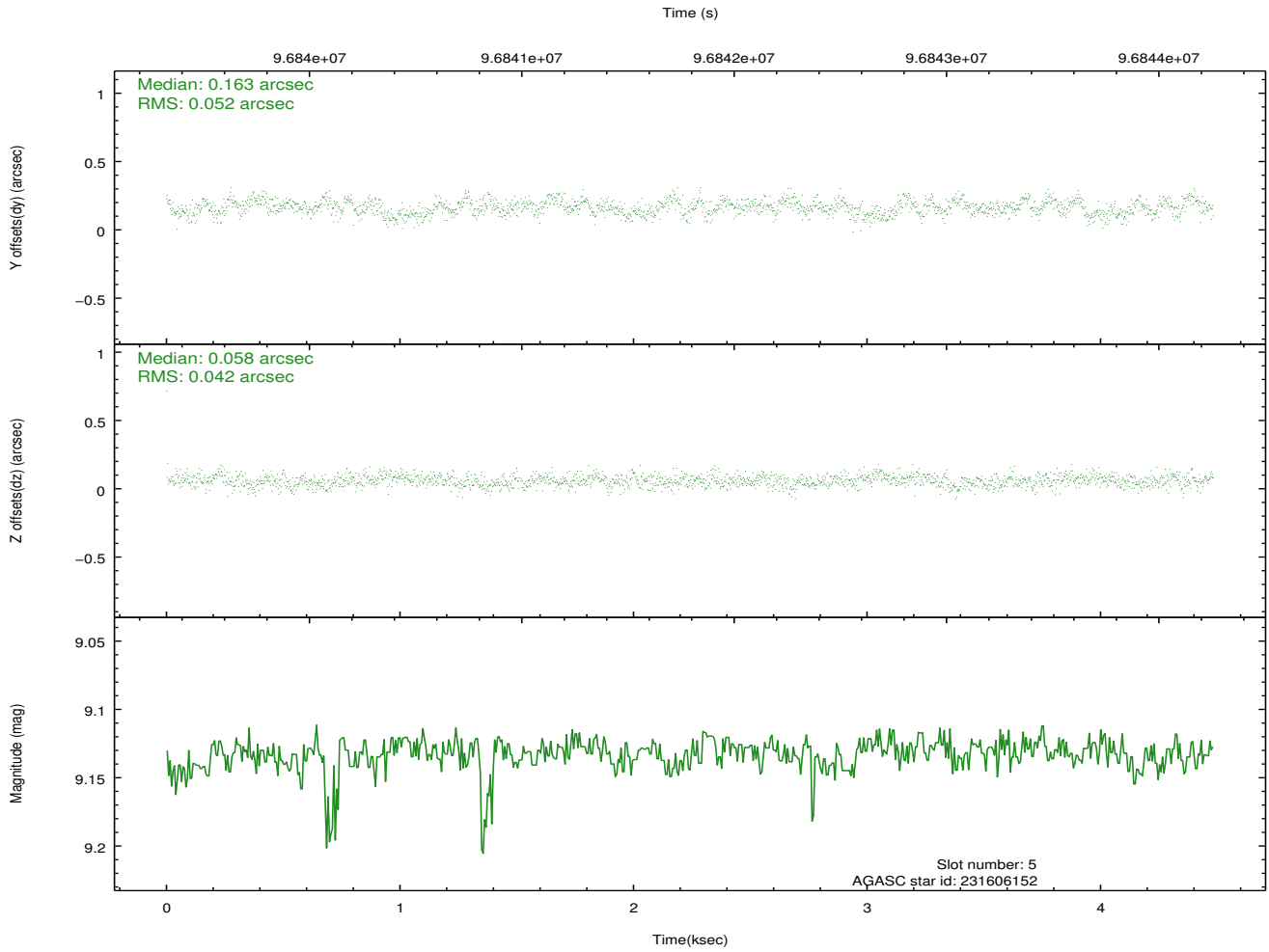
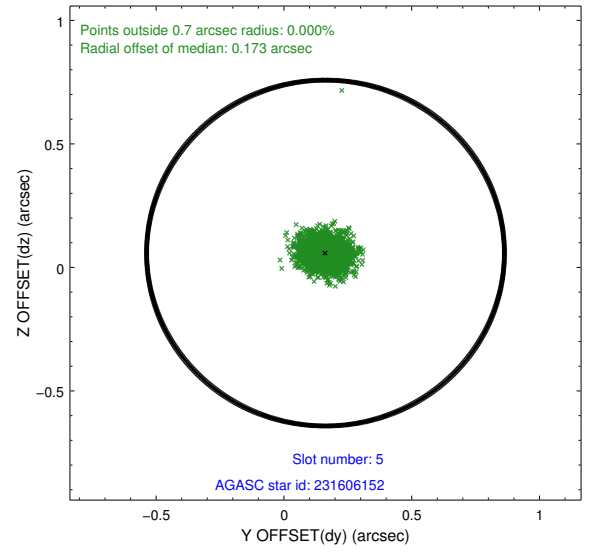
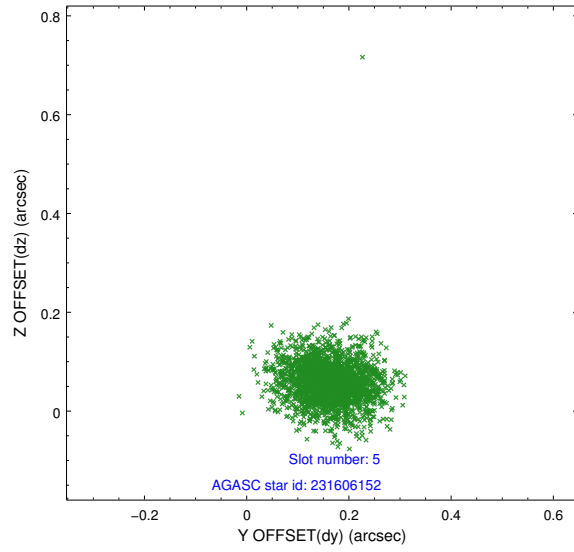
2.4.1 Slot 3



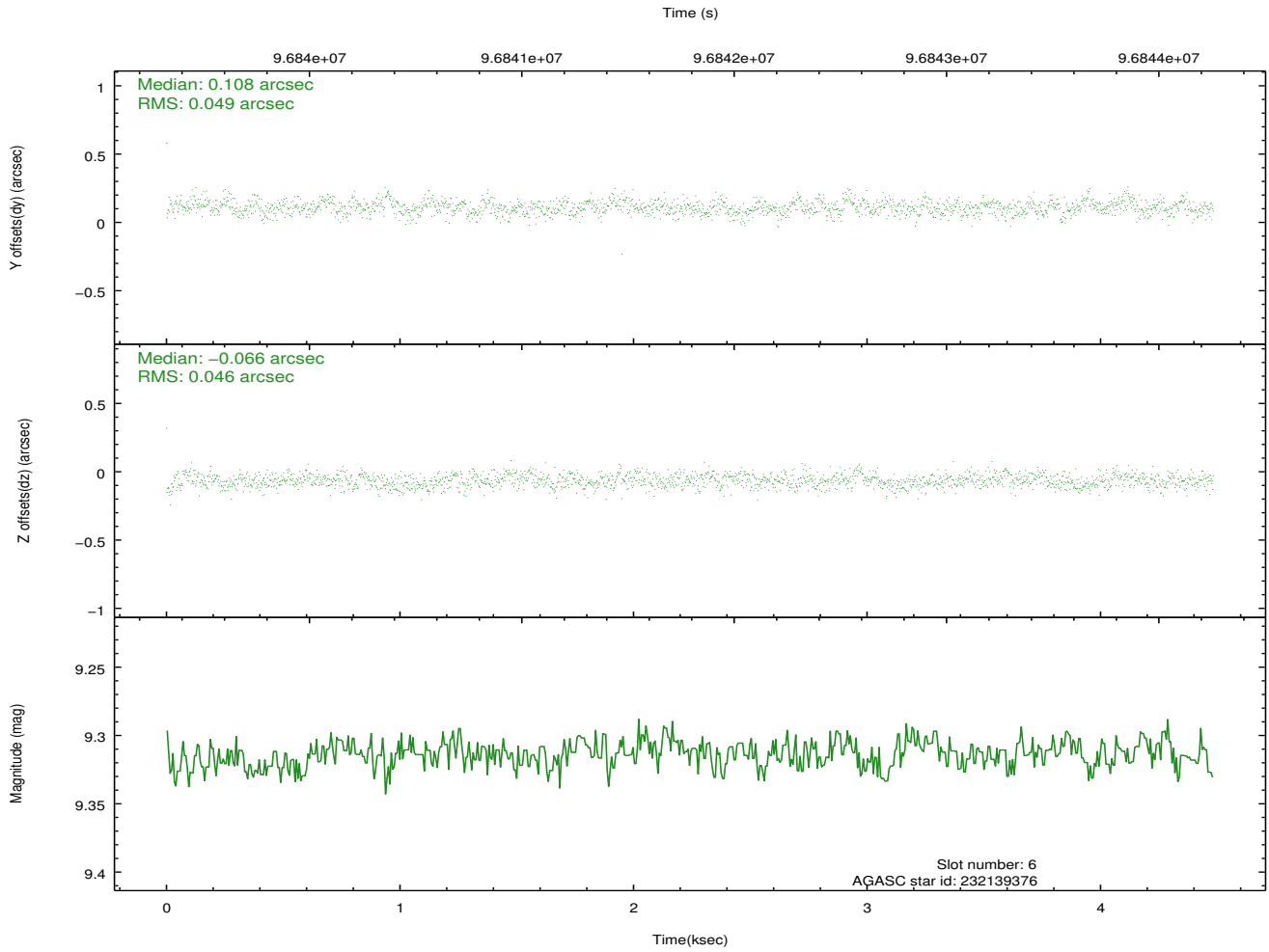
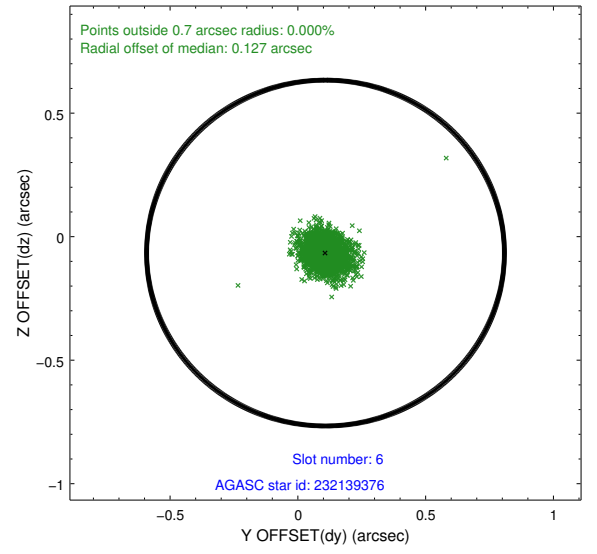
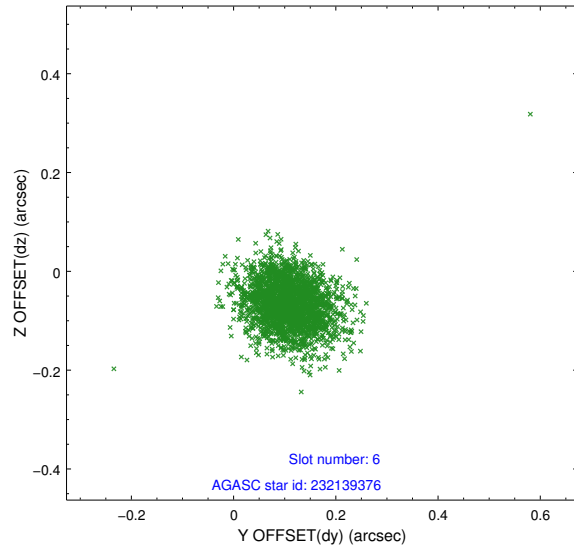
2.4.2 Slot 4



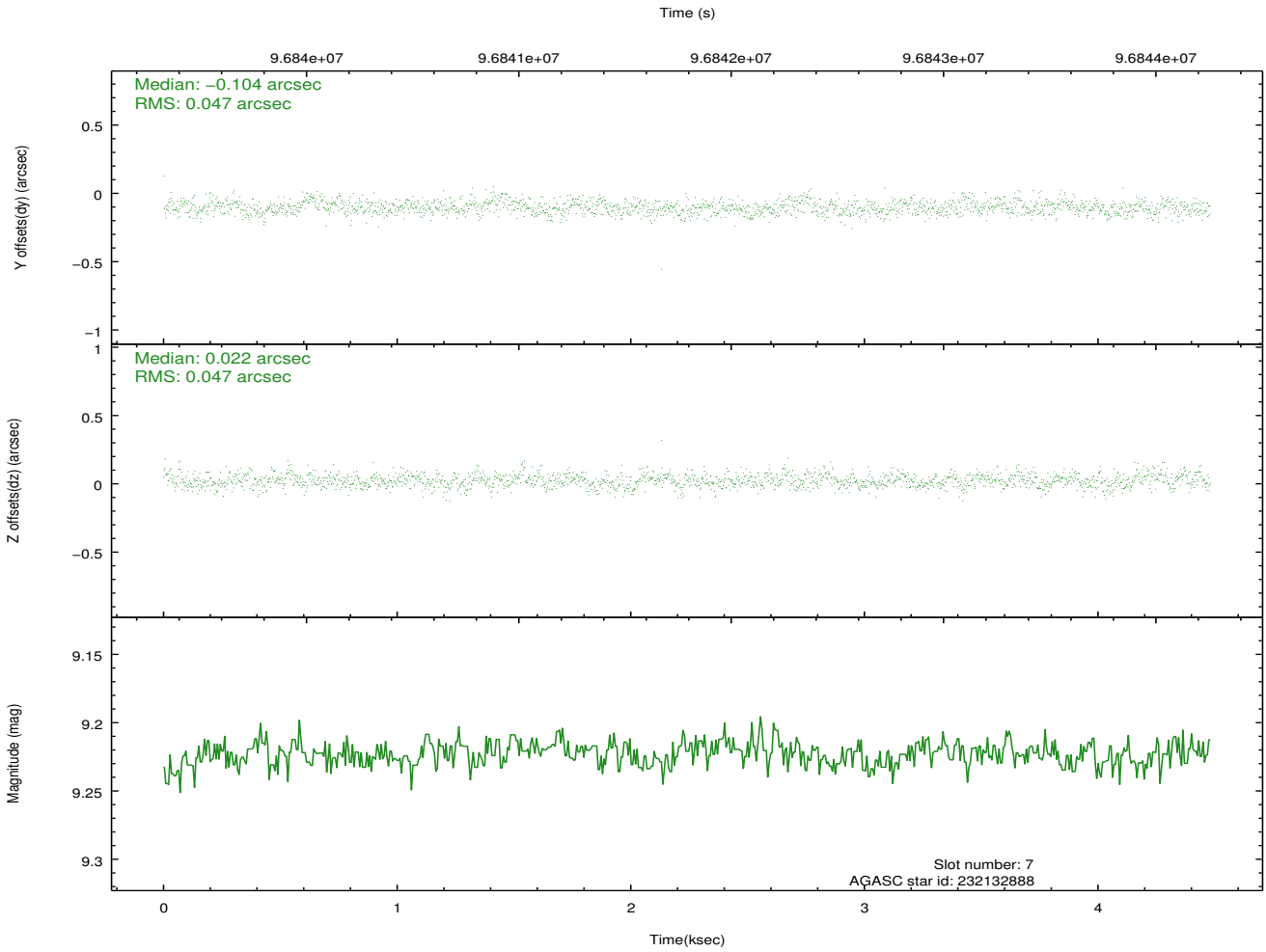
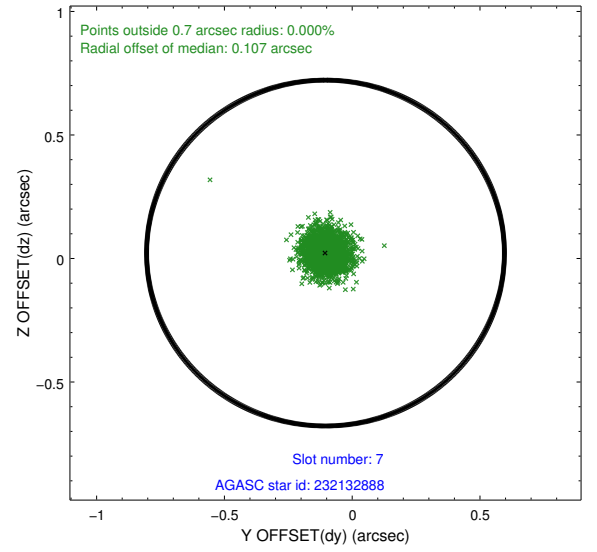
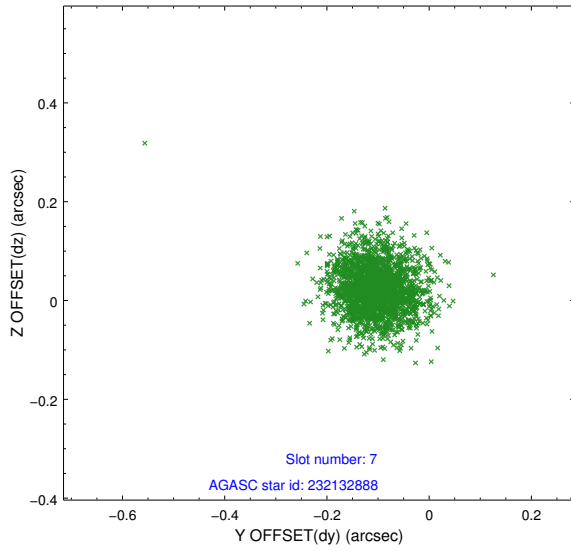
2.4.3 Slot 5



2.4.4 Slot 6

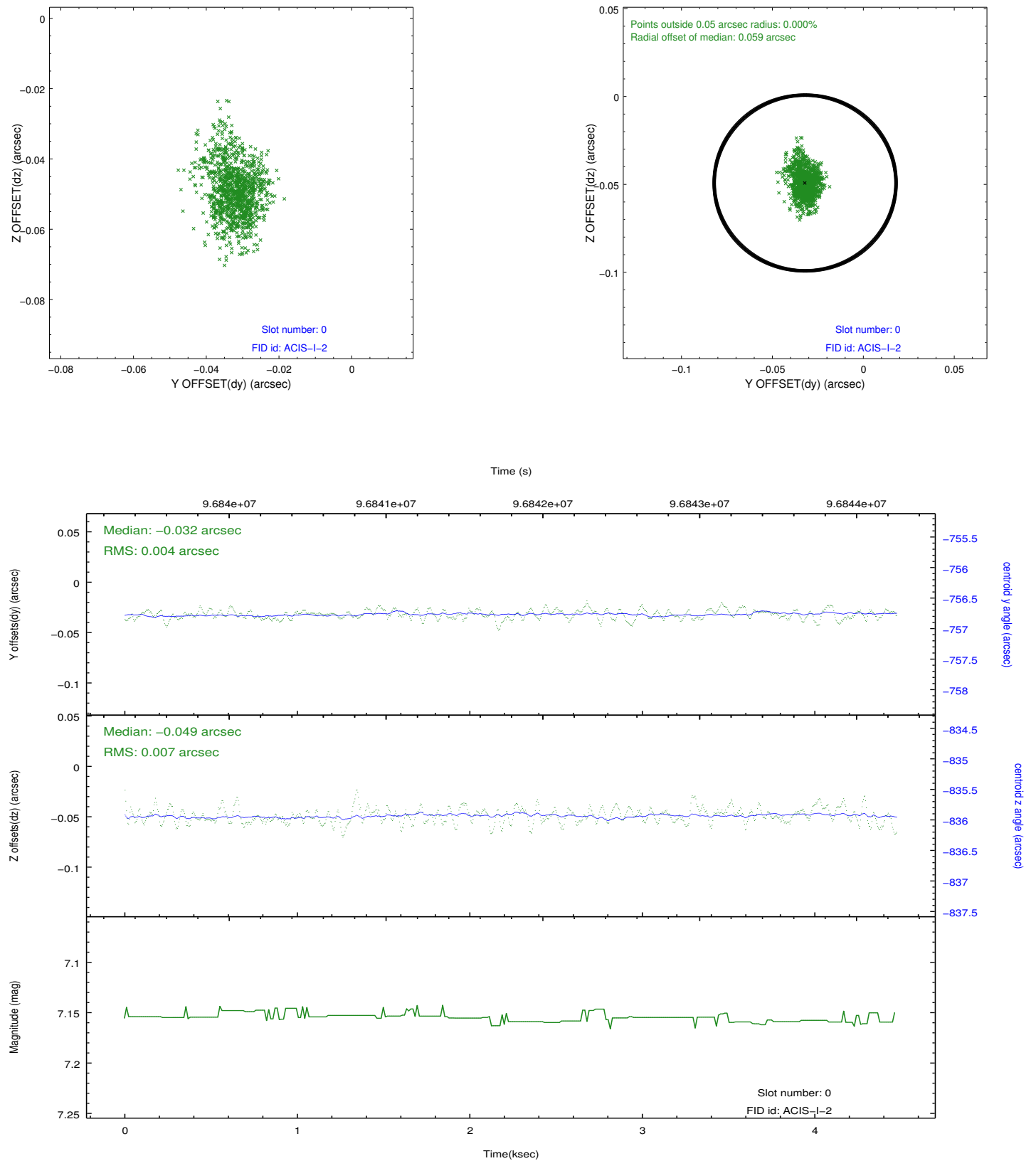


2.4.5 Slot 7

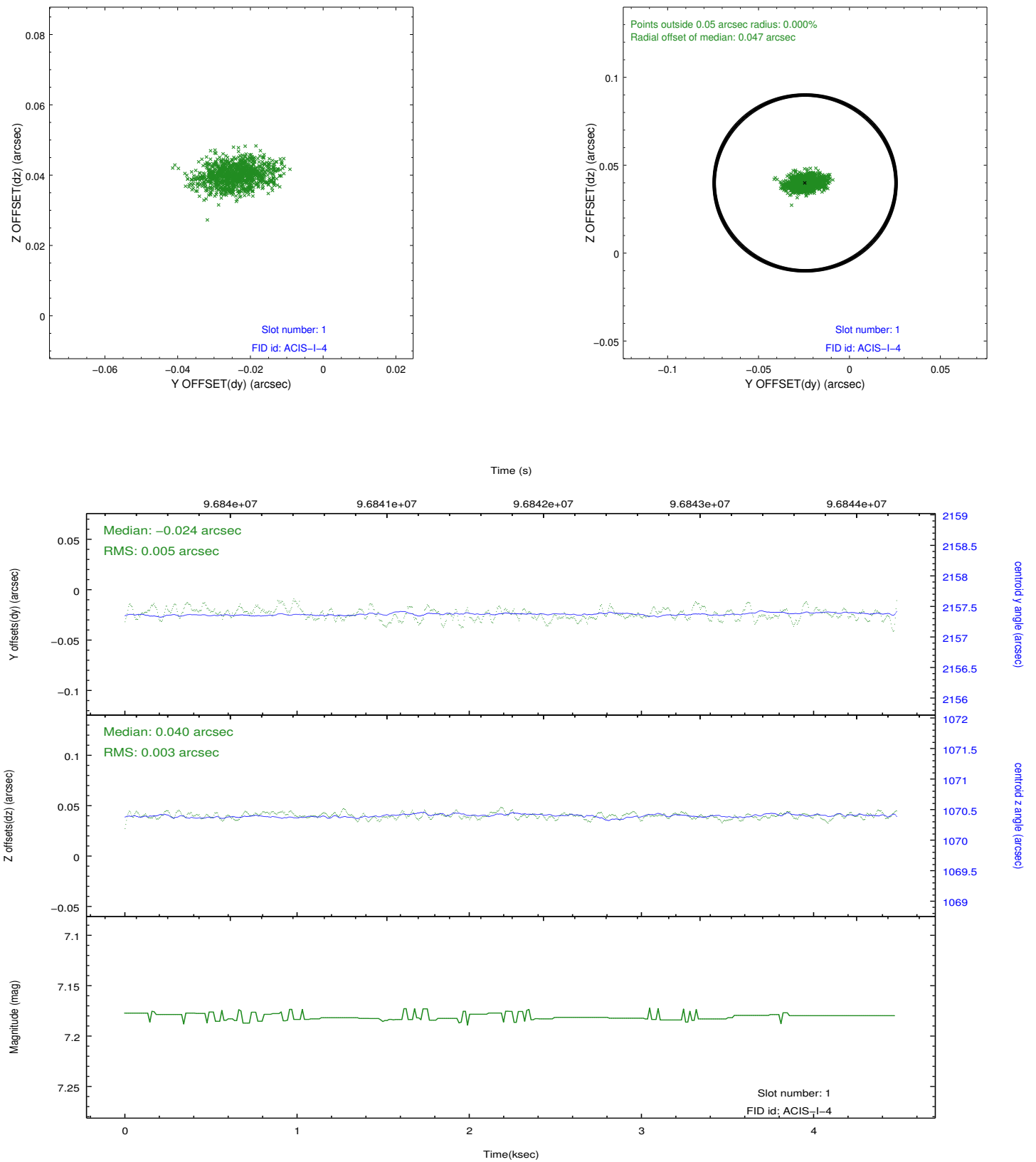


2.5 FID Slots

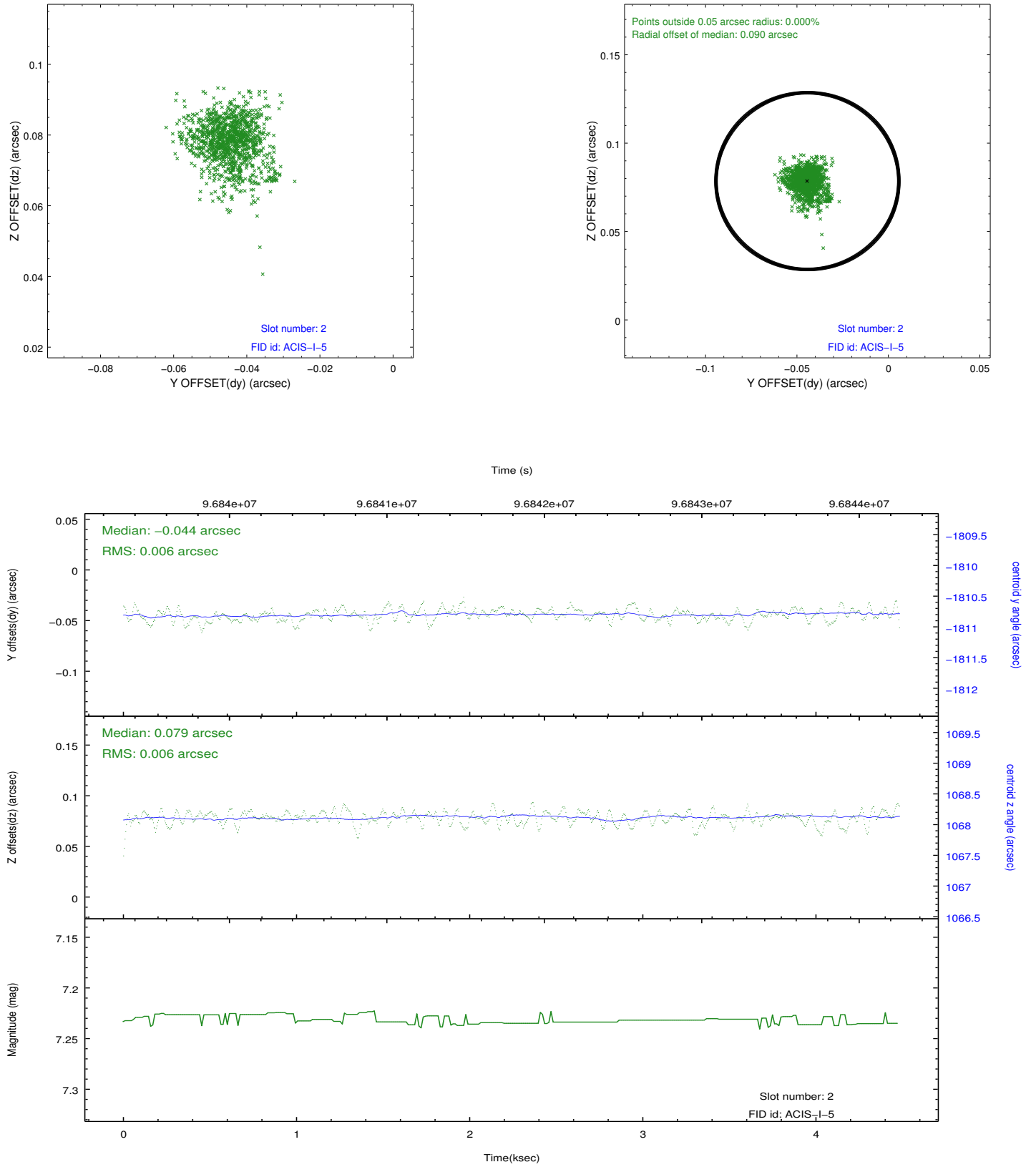
2.5.1 Slot 0



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) | 2012.09.17 |
| V&V Edition | 1 |
| V&V Disposition and Status | OK |
| V&V Charge Time | 4.138 |

A.2 Comments