

V&V Reference Report

L2 ASCDS Version : 8.4.4

Observation 8672 - L2 Version 2
Chandra X-Ray Center

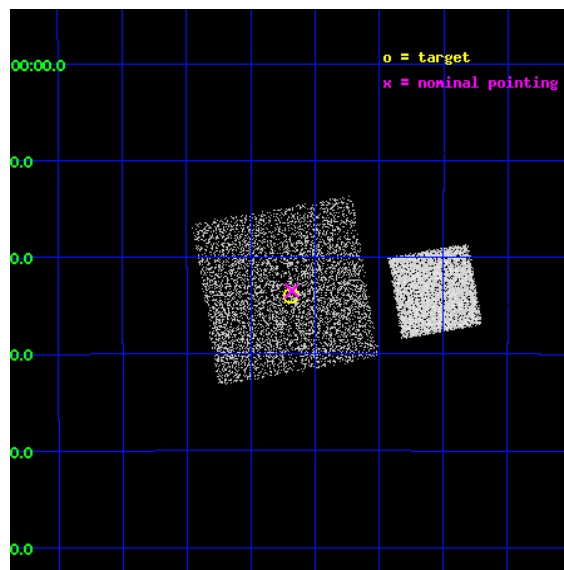
L2 Processing Date : May 15 2012

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1 Front

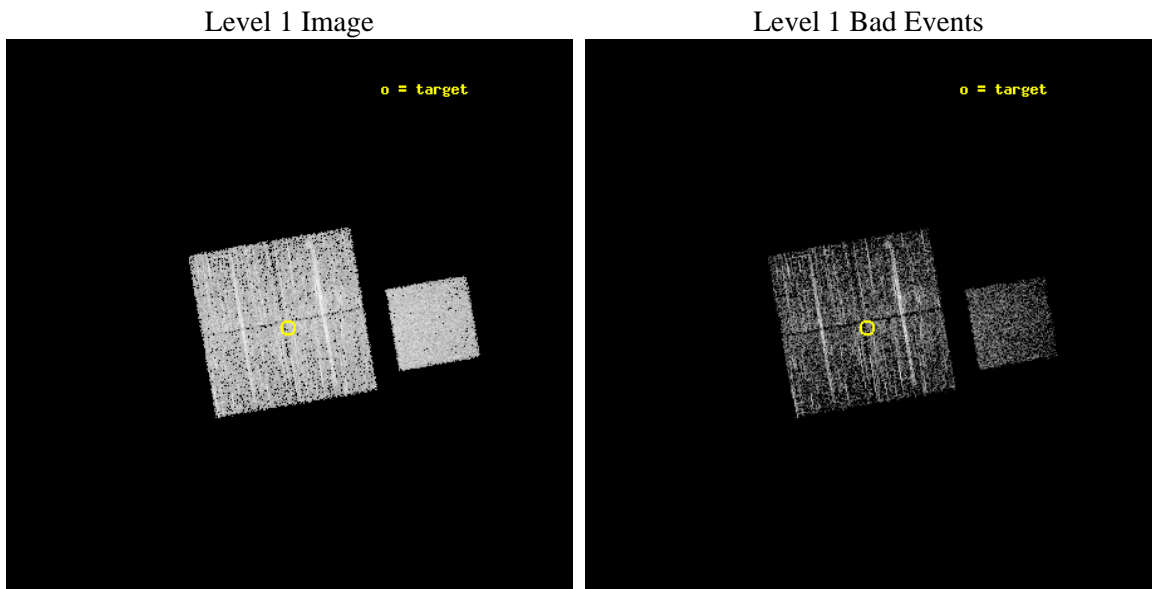
| | | |
|----------|---------------------------------------------------------------------------------------------------|---------------------------------------------|
| seq_num | 400723 | Sequence number |
| obs_id | 8672 | Observation id |
| title | The Galactic Bulge Survey: categorising the plethora of faint X-ray sources in the Galactic Bulge | Proposal title |
| observer | Prof Mariano Mendez | Principal investigator |
| object | GBSGTO3 | Source name |
| dtcycle | 0 | |
| cycle | P | events from which exps? Prim/Second/Both |
| ra_targ | 266.171273 | Observer's specified target RA [deg] |
| dec_targ | -26.3995 | Observer's specified target Dec [deg] |
| ra_nom | 266.17009643995 | Nominal RA [deg] |
| dec_nom | -26.391401710033 | Nominal Dec [deg] |
| roll_nom | 80.208116761854 | Nominal Roll [deg] |
| revision | 2 | Processing version of data |
| ontime | 2182.4000167847 | Sum of GTIs [s] |
| livetime | 2153.8853539059 | Livetime [s] |
| ontime0 | 2182.4000167847 | Sum of GTIs [s] |
| ontime1 | 2182.4000167847 | Sum of GTIs [s] |
| ontime2 | 2182.4000167847 | Sum of GTIs [s] |
| ontime3 | 2182.4000167847 | Sum of GTIs [s] |
| ontime7 | 2182.4000167847 | Sum of GTIs [s] |
| l2events | 15616 | Number of level 2 events |



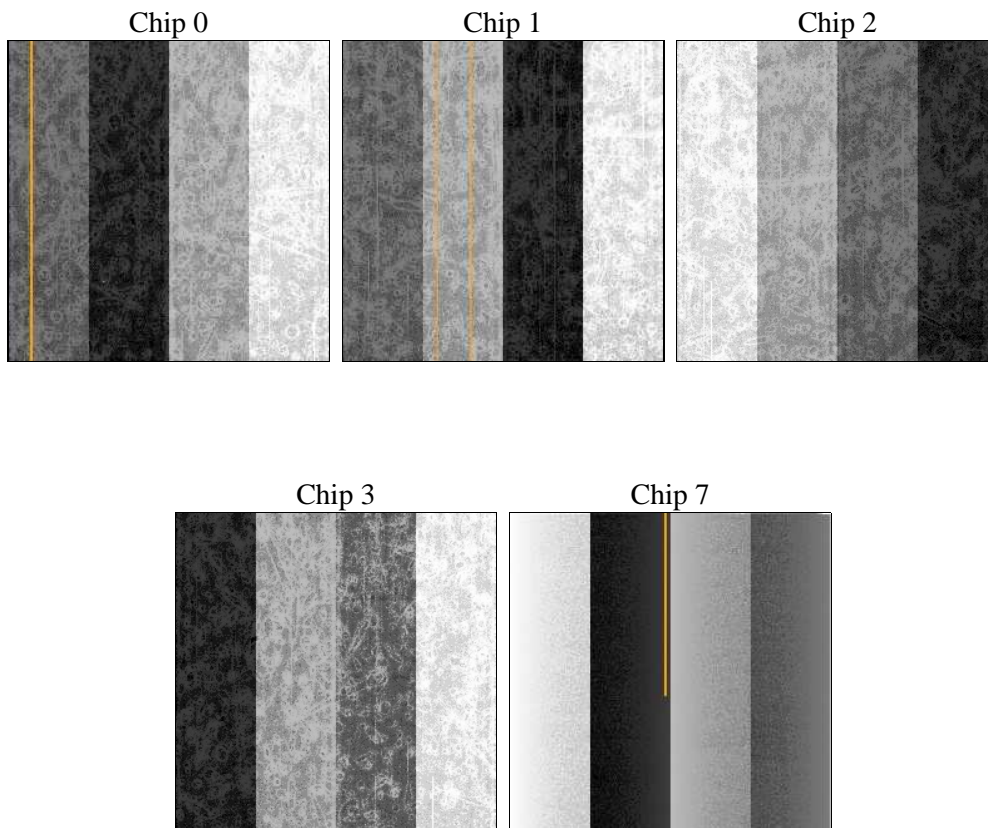
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

| | | | | | |
|----------|---------------------|--------------------------------|----------------|-----------------|-----------------------------------------|
| obi_num | 1 | Obi number | sched_exp_time | 2000.000000 | [s] Scheduled observation exposure time |
| ascdsver | 8.4.4 | Processing system revision | ontime | 2182.4000167847 | Sum of GTIs [s] |
| caldbver | 4.4.9 | | ontime0 | 2182.4000167847 | Sum of GTIs [s] |
| date | 2012-05-15T03:06:52 | Date and time of file creation | ontime1 | 2182.4000167847 | Sum of GTIs [s] |
| revision | 2 | Processing version of data | ontime2 | 2182.4000167847 | Sum of GTIs [s] |
| | | | ontime3 | 2182.4000167847 | Sum of GTIs [s] |
| | | | ontime7 | 2182.4000167847 | Sum of GTIs [s] |
| | | | l1events | 121697 | Number of level 1 events |

2.1.4 Events

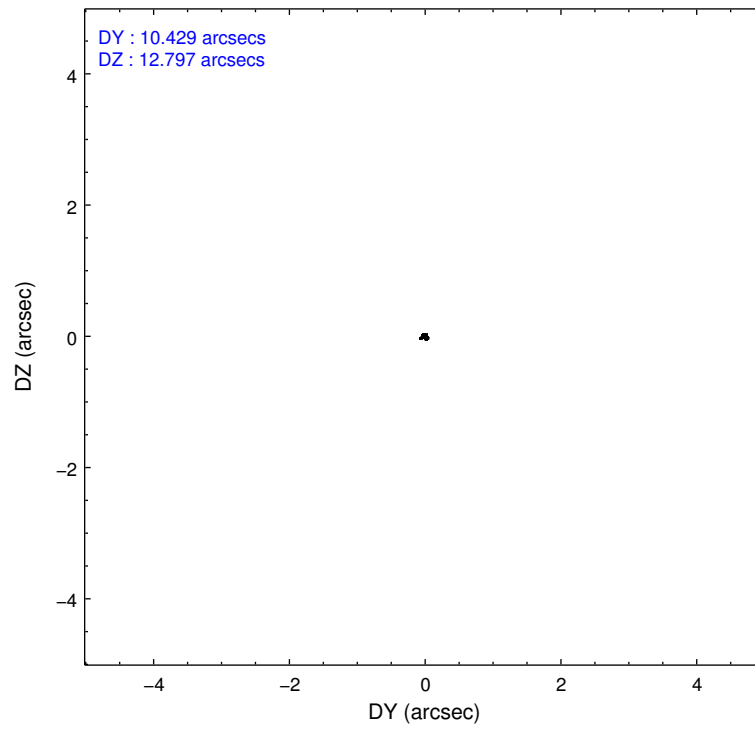
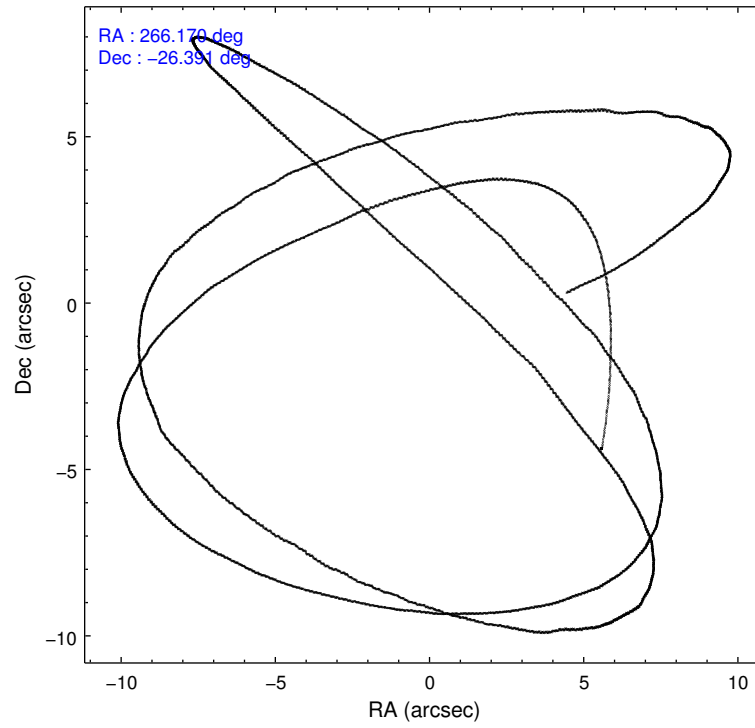
| | ccd 0 | ccd 1 | ccd 2 | ccd 3 | ccd 7 |
|-----------------|-------|-------|-------|-------|-------|
| level 1 events | 24288 | 22260 | 24262 | 23501 | 27386 |
| rejected events | 22299 | 20086 | 22329 | 21574 | 18184 |
| rejected % | 91% | 90% | 92% | 91% | 66% |

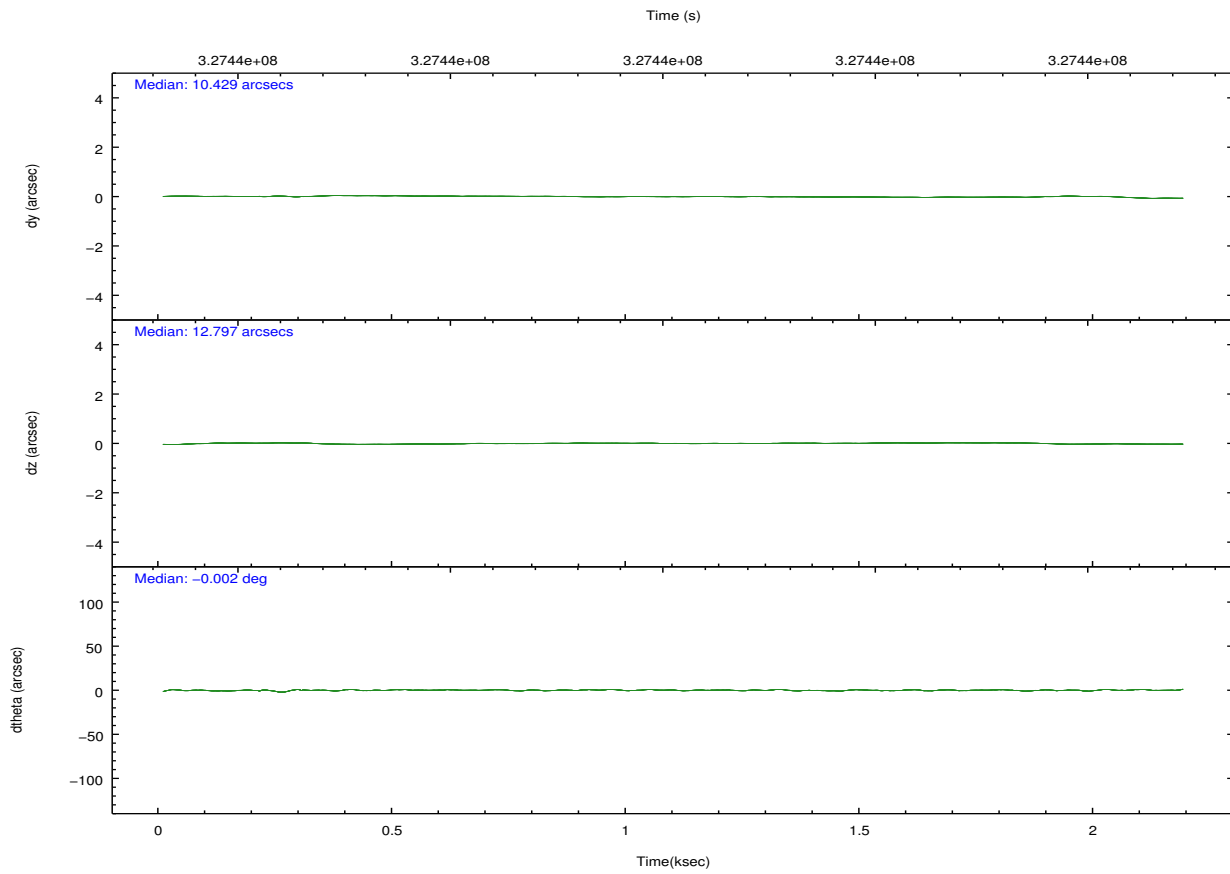
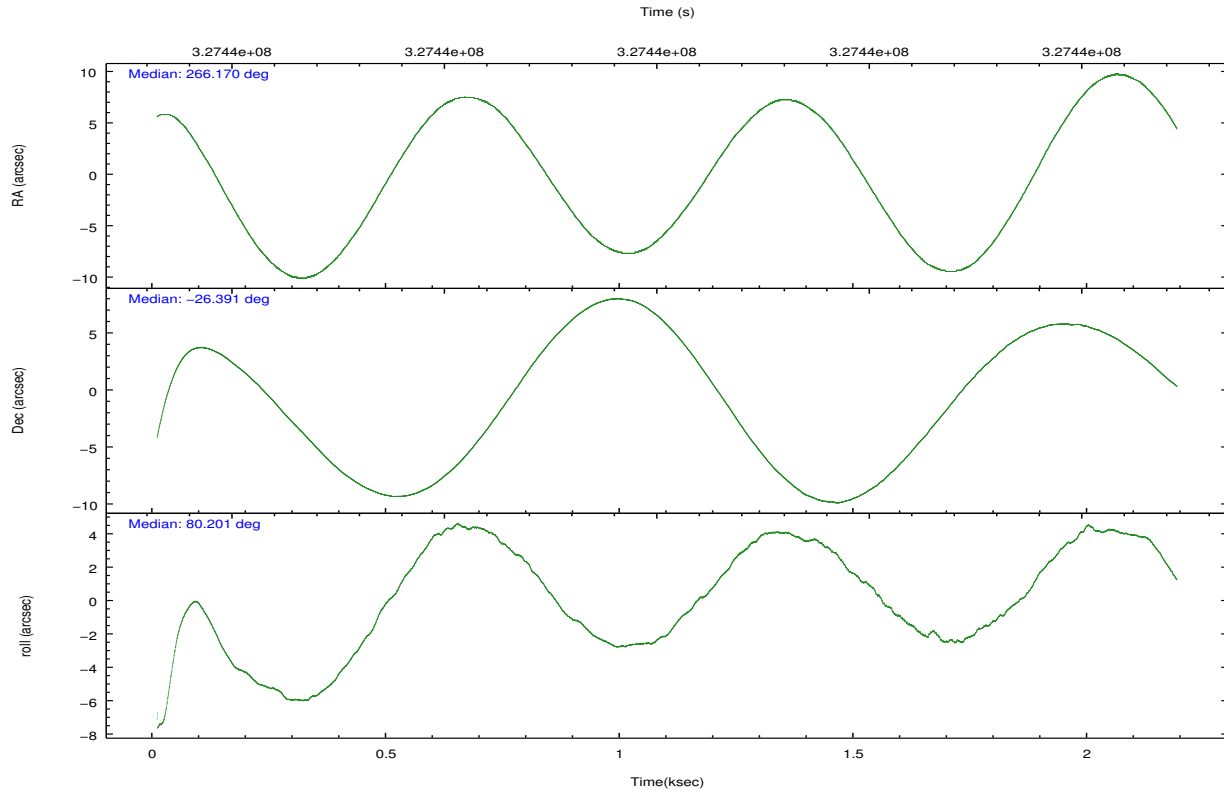
| | ccd 0 | ccd 1 | ccd 2 | ccd 3 | ccd 7 |
|----------------|-------|-------|-------|-------|-------|
| grade 0 events | 1159 | 1215 | 1026 | 1040 | 1266 |
| | 4% | 5% | 4% | 4% | 4% |
| grade 1 events | 16 | 10 | 15 | 15 | 41 |
| | 0% | 0% | 0% | 0% | 0% |
| grade 2 events | 682 | 696 | 611 | 507 | 2536 |
| | 2% | 3% | 2% | 2% | 9% |
| grade 3 events | 261 | 290 | 236 | 310 | 1142 |
| | 1% | 1% | 0% | 1% | 4% |
| grade 4 events | 238 | 291 | 301 | 276 | 1207 |
| | 0% | 1% | 1% | 1% | 4% |
| grade 5 events | 880 | 926 | 834 | 979 | 2874 |
| | 3% | 4% | 3% | 4% | 10% |
| grade 6 events | 418 | 532 | 442 | 454 | 6492 |
| | 1% | 2% | 1% | 1% | 23% |
| grade 7 events | 20634 | 18300 | 20797 | 19920 | 11828 |
| | 84% | 82% | 85% | 84% | 43% |

2.2 Compared Parameters

| Parameter | Planned | Actual | Parameter | Planned | Actual |
|-----------------------------------|---------------------|-----------------------|---------------------------------------|-----------|---------|
| Instrument | ACIS | ACIS | Obspar format version number | 7 | 7 |
| Detector | ACIS-01237 | ACIS-01237 | 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 | 266.180818 | 266.1700964399492 | CCD I2 on | Y | Y |
| [deg] Pointing Dec | -26.417253 | -26.39140171003264 | CCD I3 on | Y | Y |
| [deg] Pointing Roll | 80.004246 | 80.20811676185397 | 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 | N | N |
| [mm] SIM translation stage pos | -233.592463 | -233.5874344608287 | CCD S3 on | O1 | Y |
| [mm] SIM translation stage offset | 0 | -0.005018542100998502 | CCD S4 on | N | N |
| [s] Observation start time (MET) | 327442114.184000 | 327440769.45661 | CCD S5 on | N | N |
| Observation start date | 2008-05-17T20:07:29 | 2008-05-17T19:46:09 | Number of optional ACIS chips dropped | 0 | 0 |
| [s] Observation end time (MET) | 327444114.184000 | 327444248.30678 | On-chip summing requested | N | N |
| Observation end date | 2008-05-17T20:40:49 | 2008-05-17T20:44:08 | Subarray requested | NONE | NONE |
| Read mode | TIMED | TIMED | Alternating exposures requested | N | N |
| | | | [s] Primary exposure time | 0.000000 | 3.1 |

2.3 Aspect





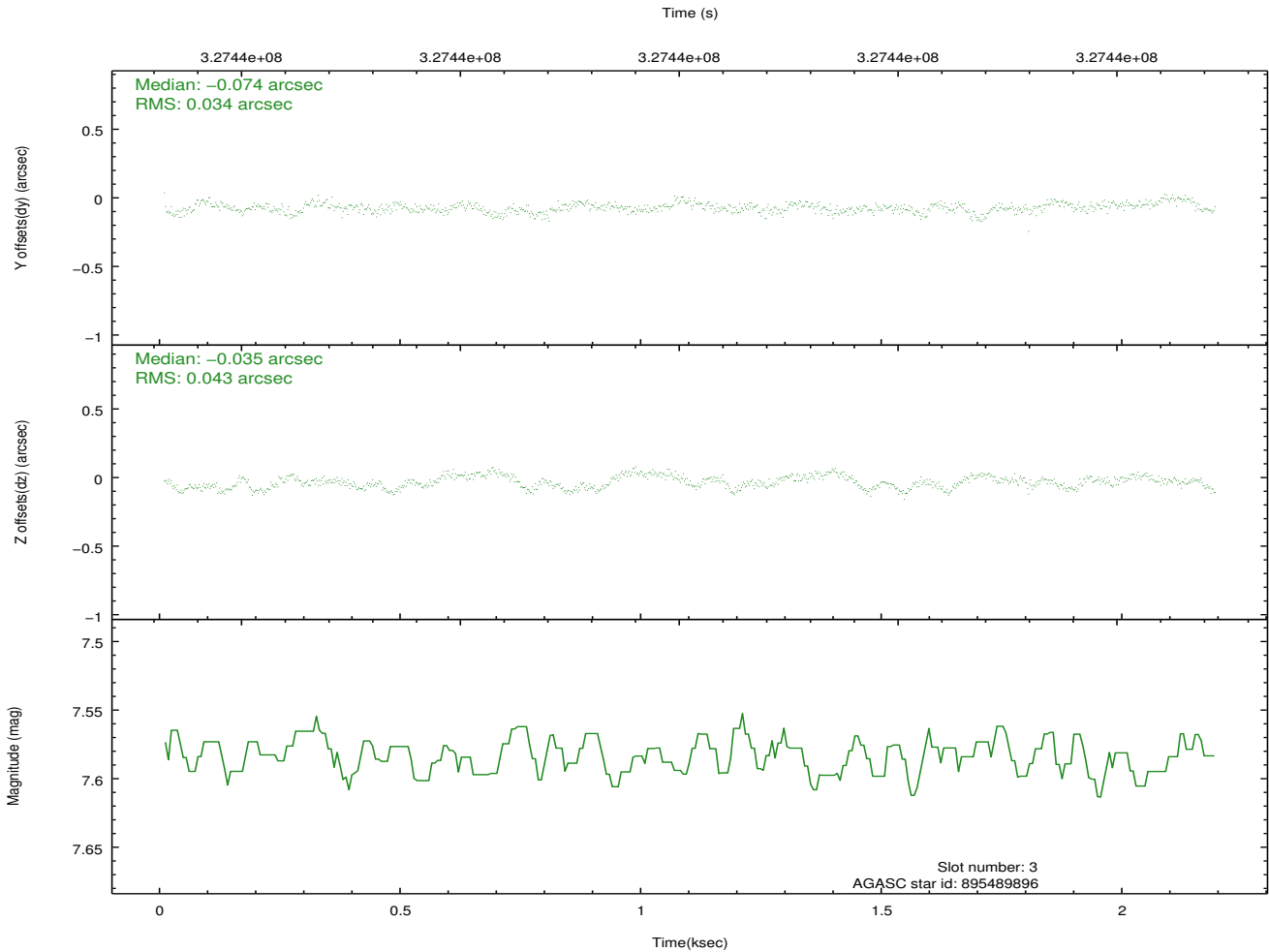
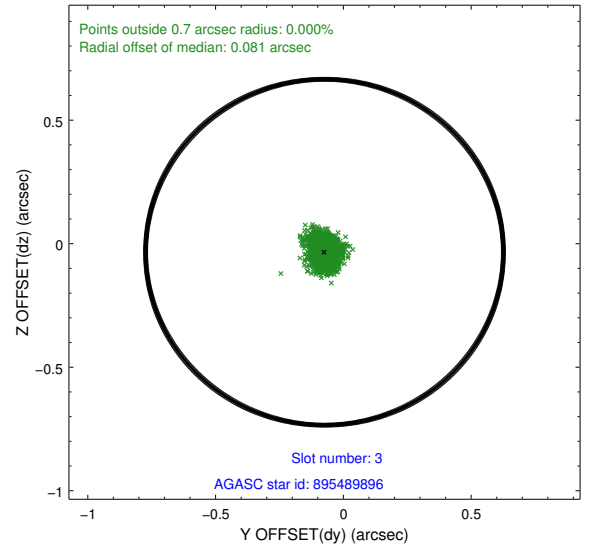
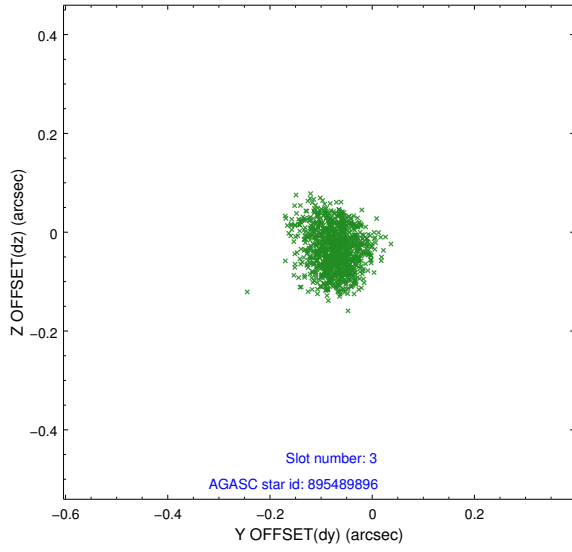
Slot Statistics

| slot | status | id | mag | n_pts | med_dy | med_dz | dr1 | dr2 | ra | dec | mean_y | mean_z |
|------|--------|-----------|------|-------|--------|--------|-------|-------|------------|------------|----------|----------|
| 0 | FID | ACIS-I-1 | 7.01 | 533 | 0.044 | 0.013 | 0.007 | 0.011 | 0.000000 | 0.000000 | 929.20 | -836.33 |
| 1 | FID | ACIS-I-5 | 7.00 | 533 | -0.190 | 0.061 | 0.006 | 0.011 | 0.000000 | 0.000000 | -1817.48 | 1059.73 |
| 2 | FID | ACIS-I-6 | 7.00 | 533 | 0.054 | -0.004 | 0.006 | 0.011 | 0.000000 | 0.000000 | 391.52 | 1707.54 |
| 3 | GUIDE | 895489896 | 7.58 | 1066 | -0.074 | -0.035 | 0.059 | 0.092 | 266.605795 | -26.200300 | 1005.32 | -1216.47 |
| 4 | GUIDE | 896013040 | 7.34 | 1066 | 0.133 | 0.033 | 0.055 | 0.089 | 266.506589 | -26.972299 | -1786.49 | -1377.63 |
| 5 | GUIDE | 896013056 | 8.53 | 1066 | 0.101 | 0.240 | 0.062 | 0.105 | 266.762141 | -26.954413 | -1586.16 | -2174.66 |
| 6 | GUIDE | 896015880 | 8.49 | 1066 | -0.191 | -0.316 | 0.069 | 0.110 | 265.986633 | -26.306686 | 281.00 | 684.00 |
| 7 | GUIDE | 896009584 | 9.26 | 1063 | 0.027 | 0.080 | 0.103 | 0.173 | 266.891313 | -26.347528 | 639.42 | -2213.86 |

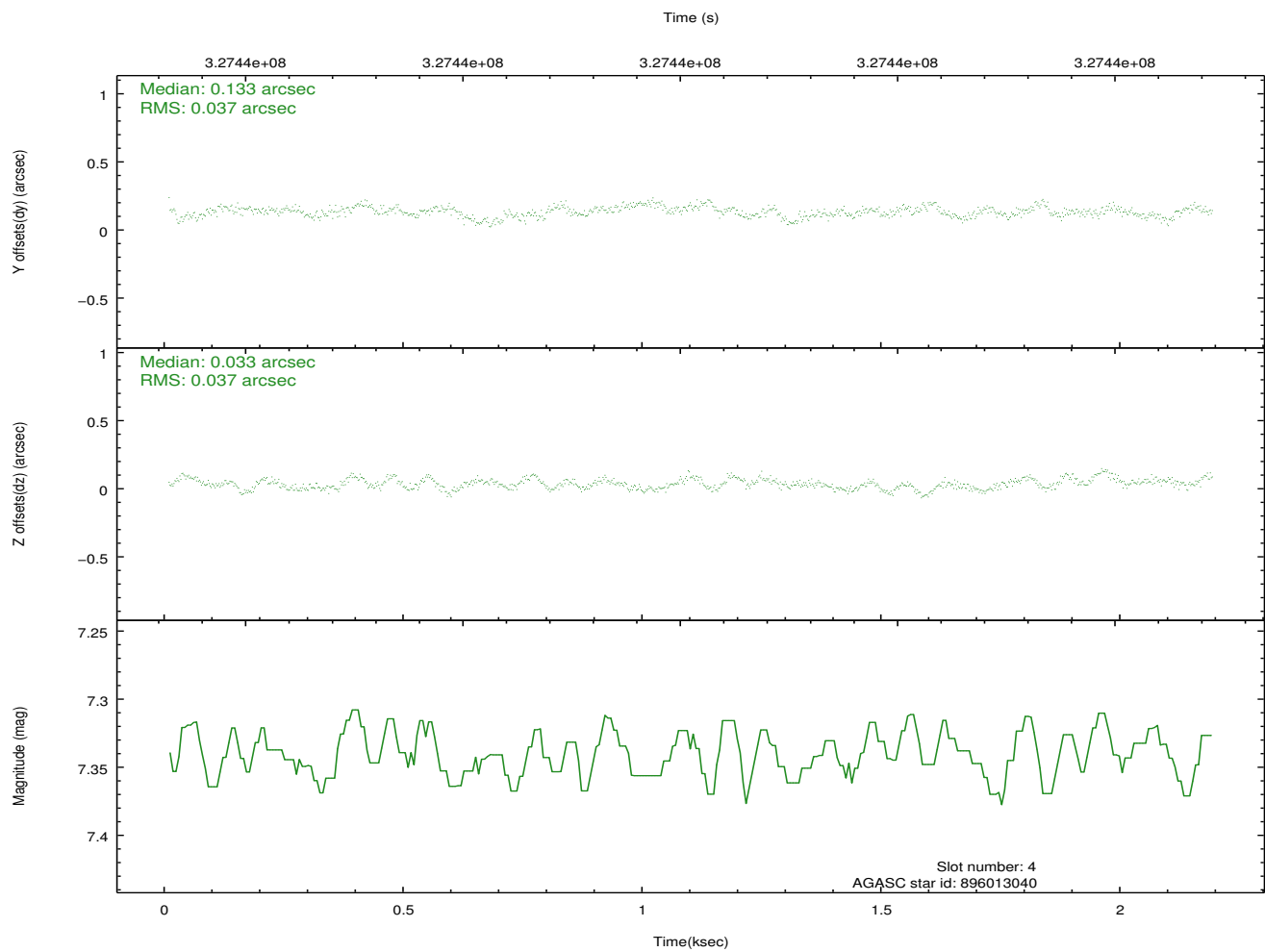
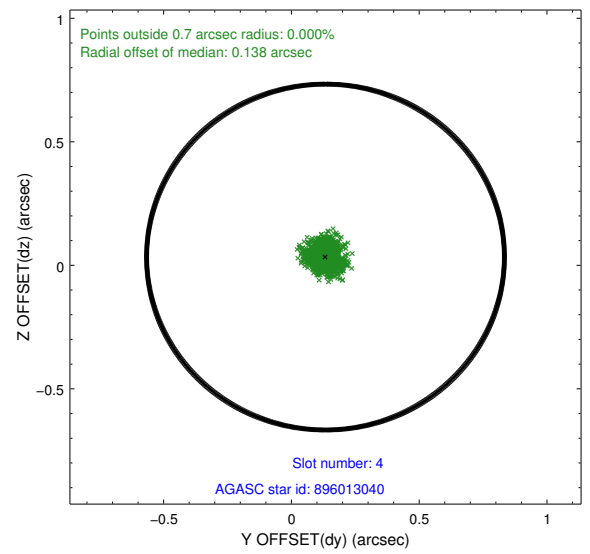
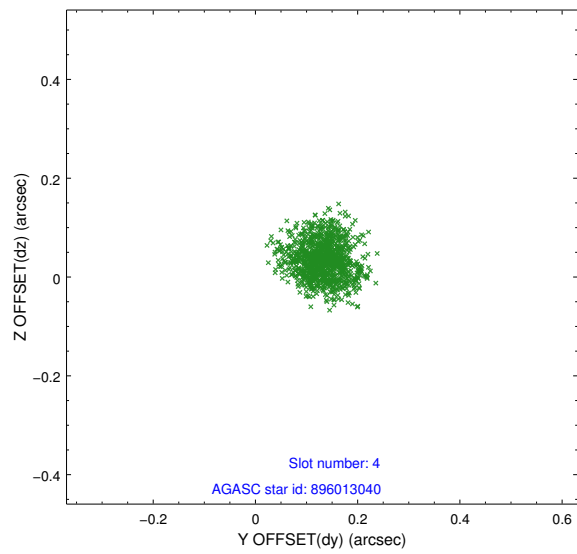
∞

2.4 Star Slots

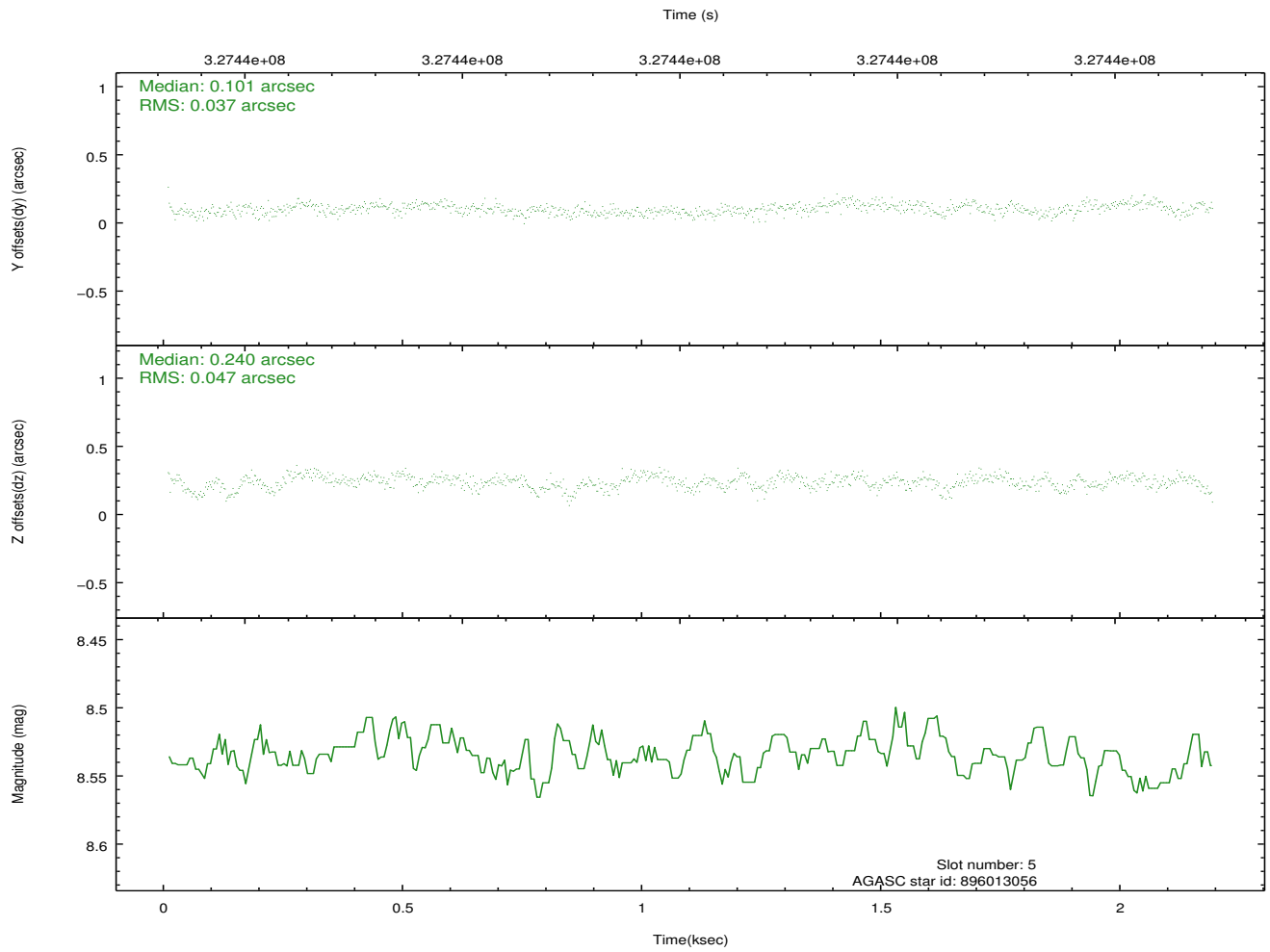
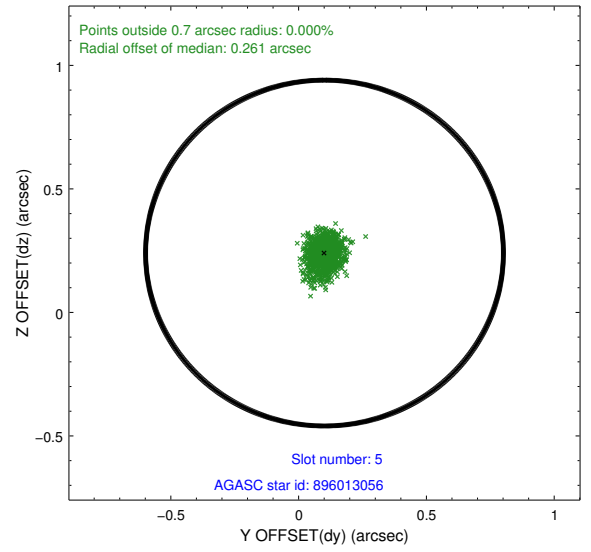
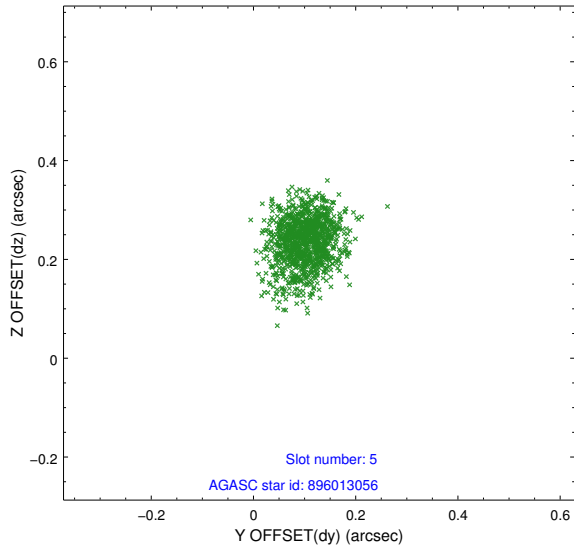
2.4.1 Slot 3



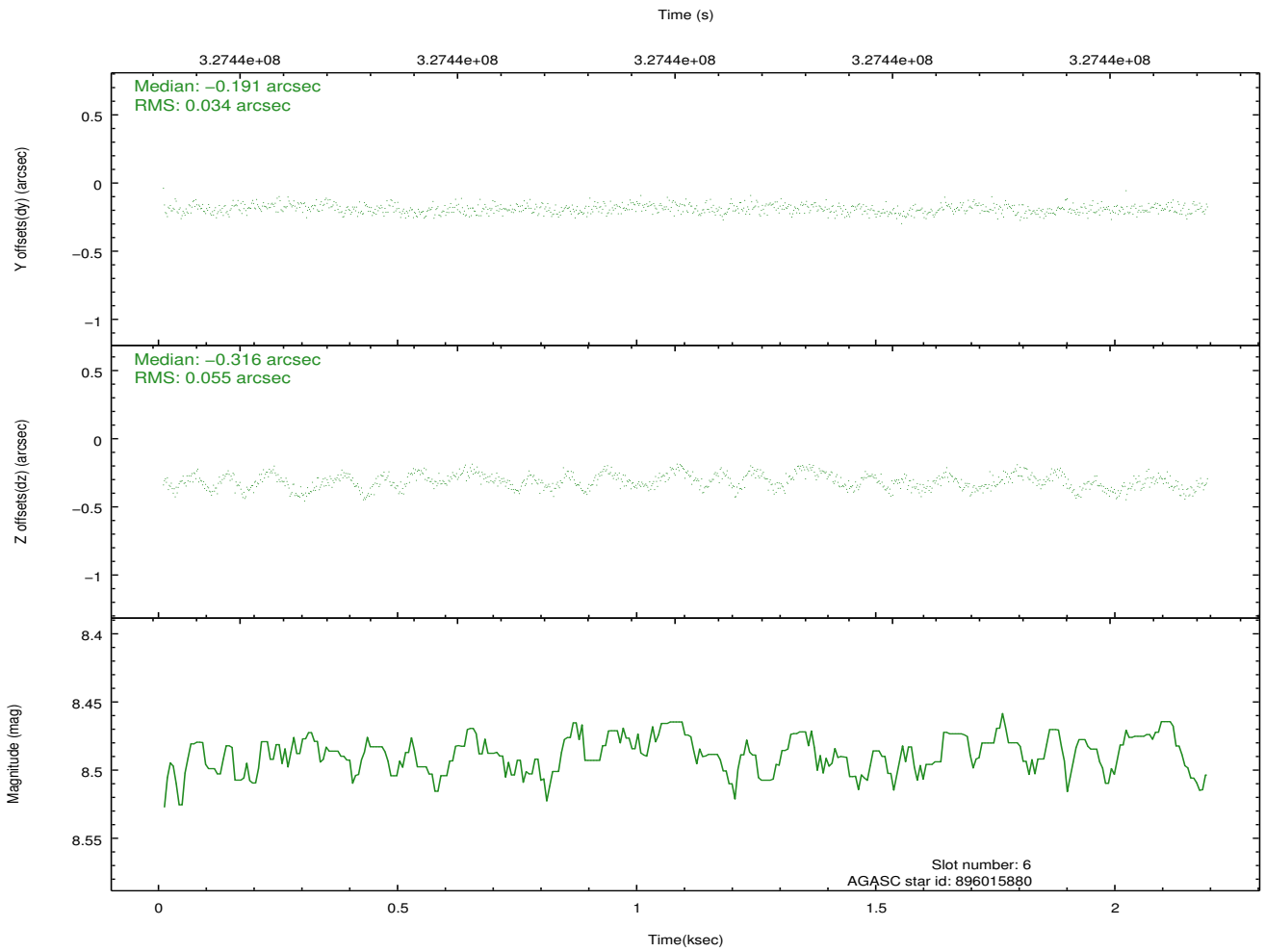
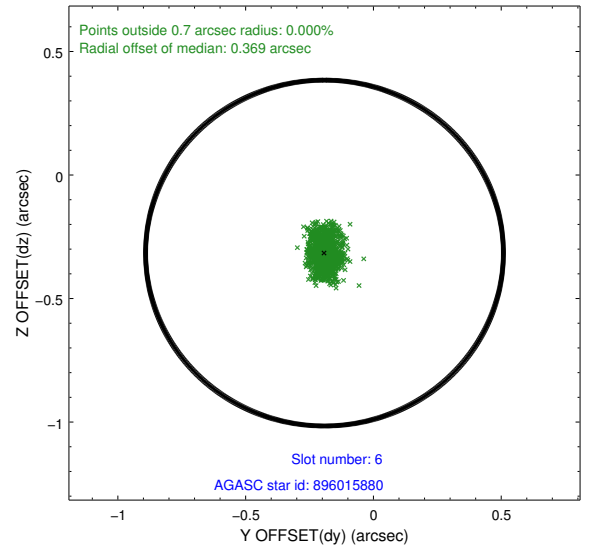
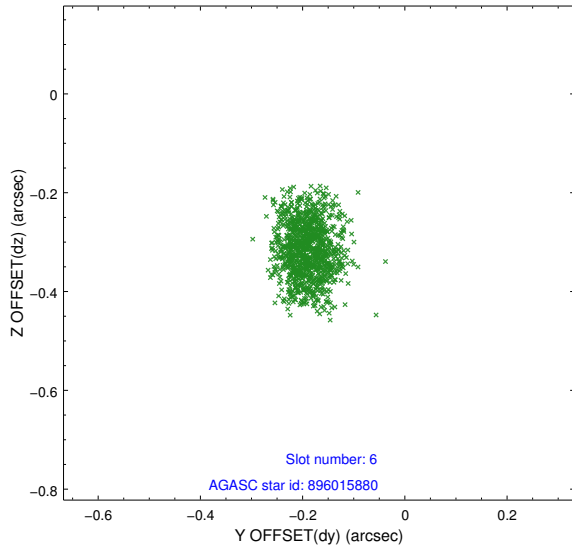
2.4.2 Slot 4



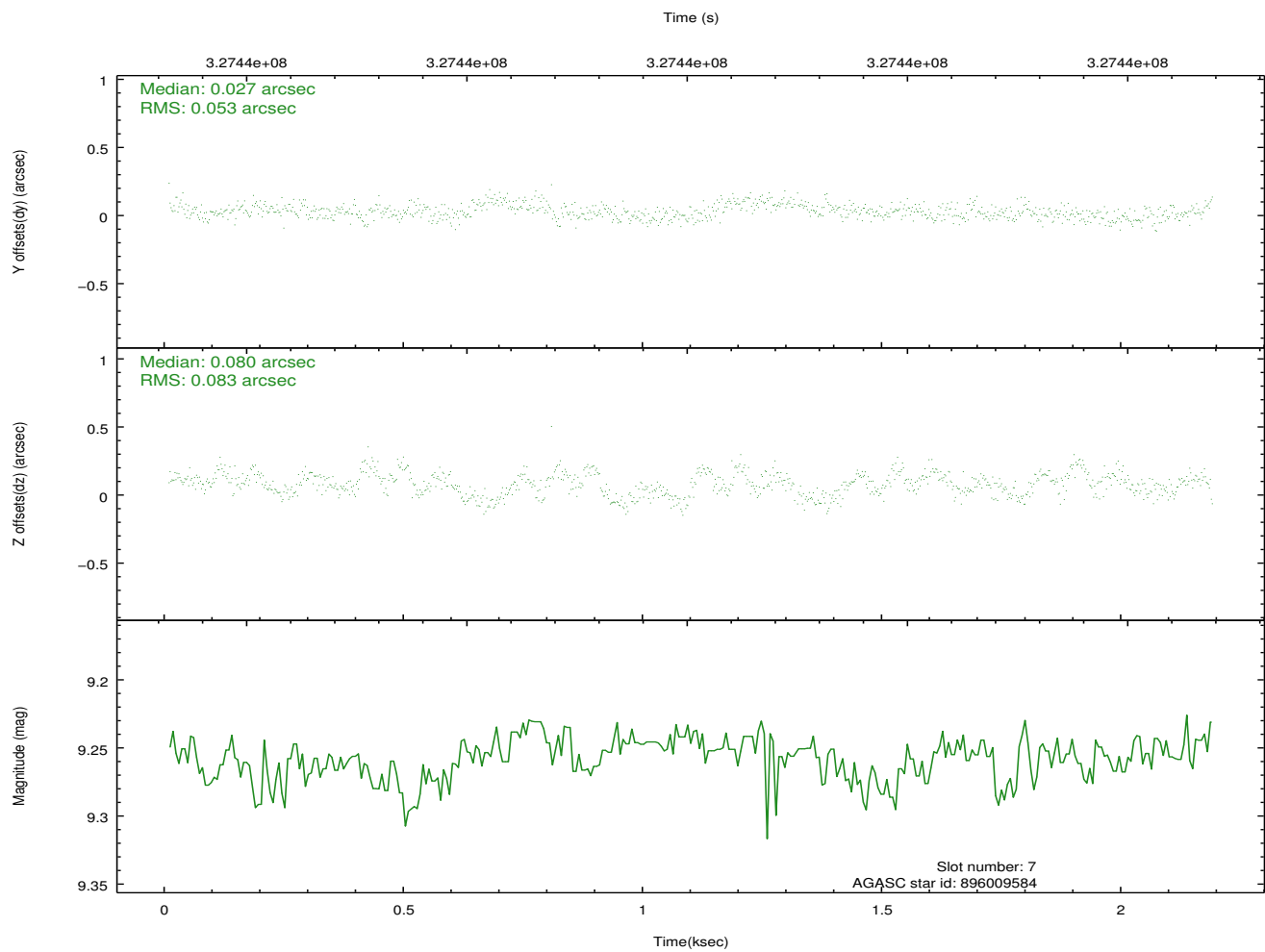
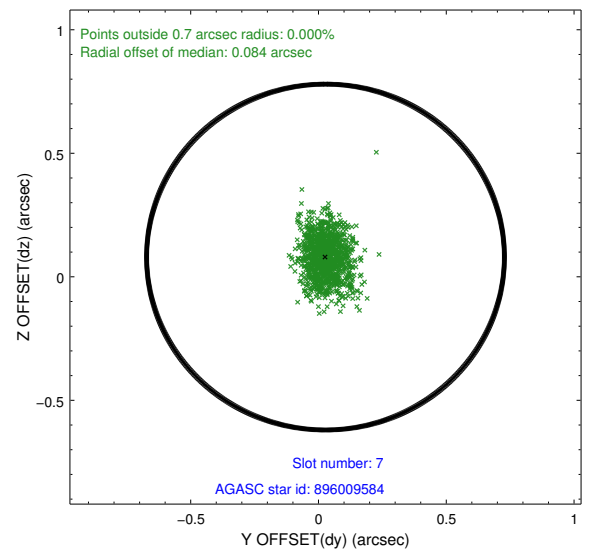
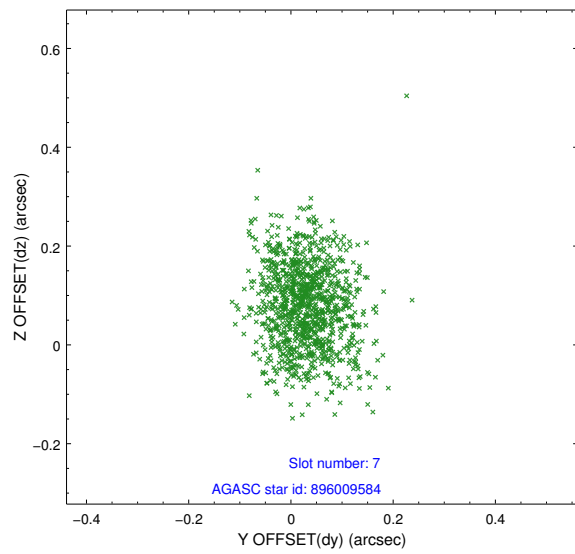
2.4.3 Slot 5



2.4.4 Slot 6

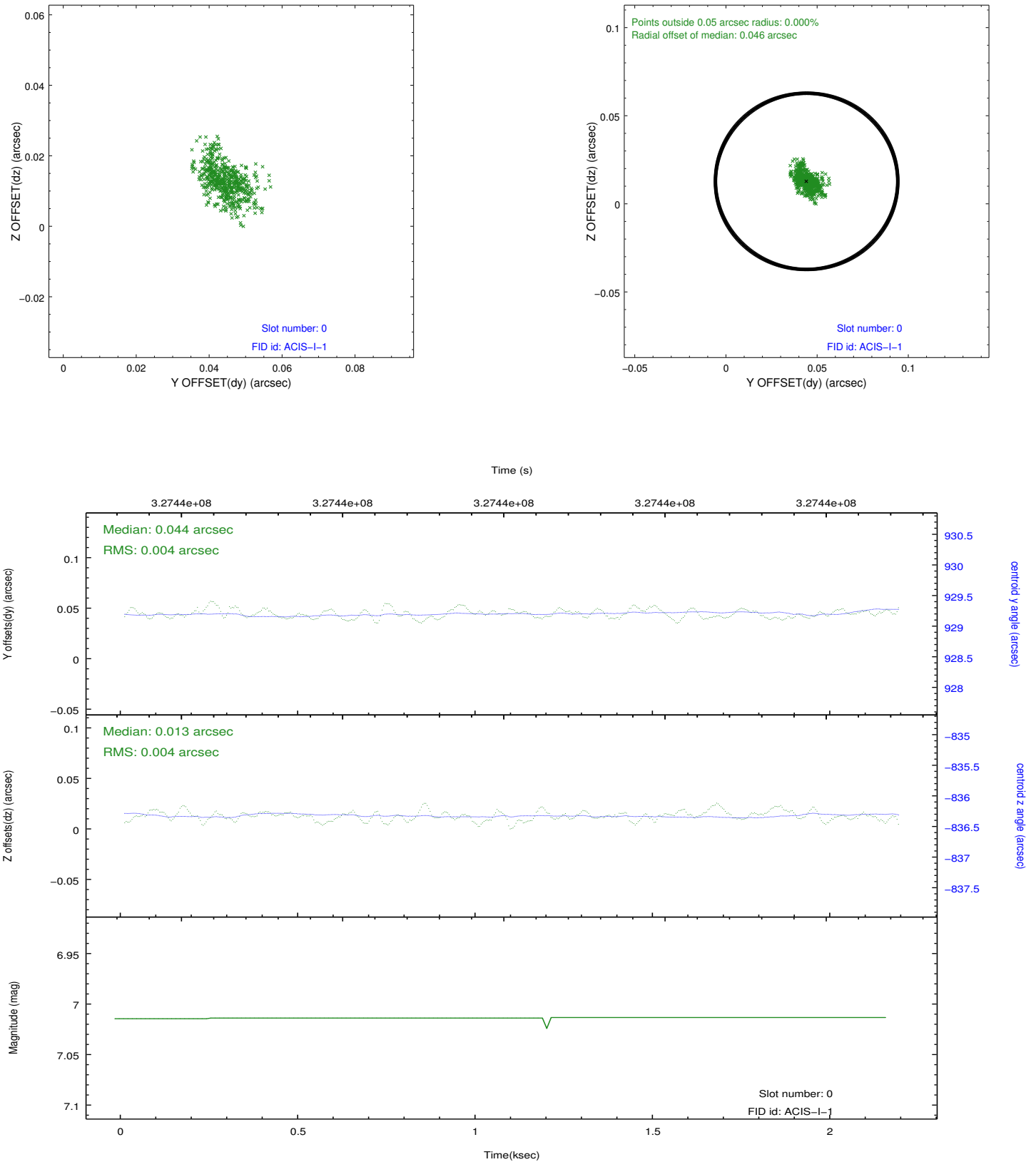


2.4.5 Slot 7

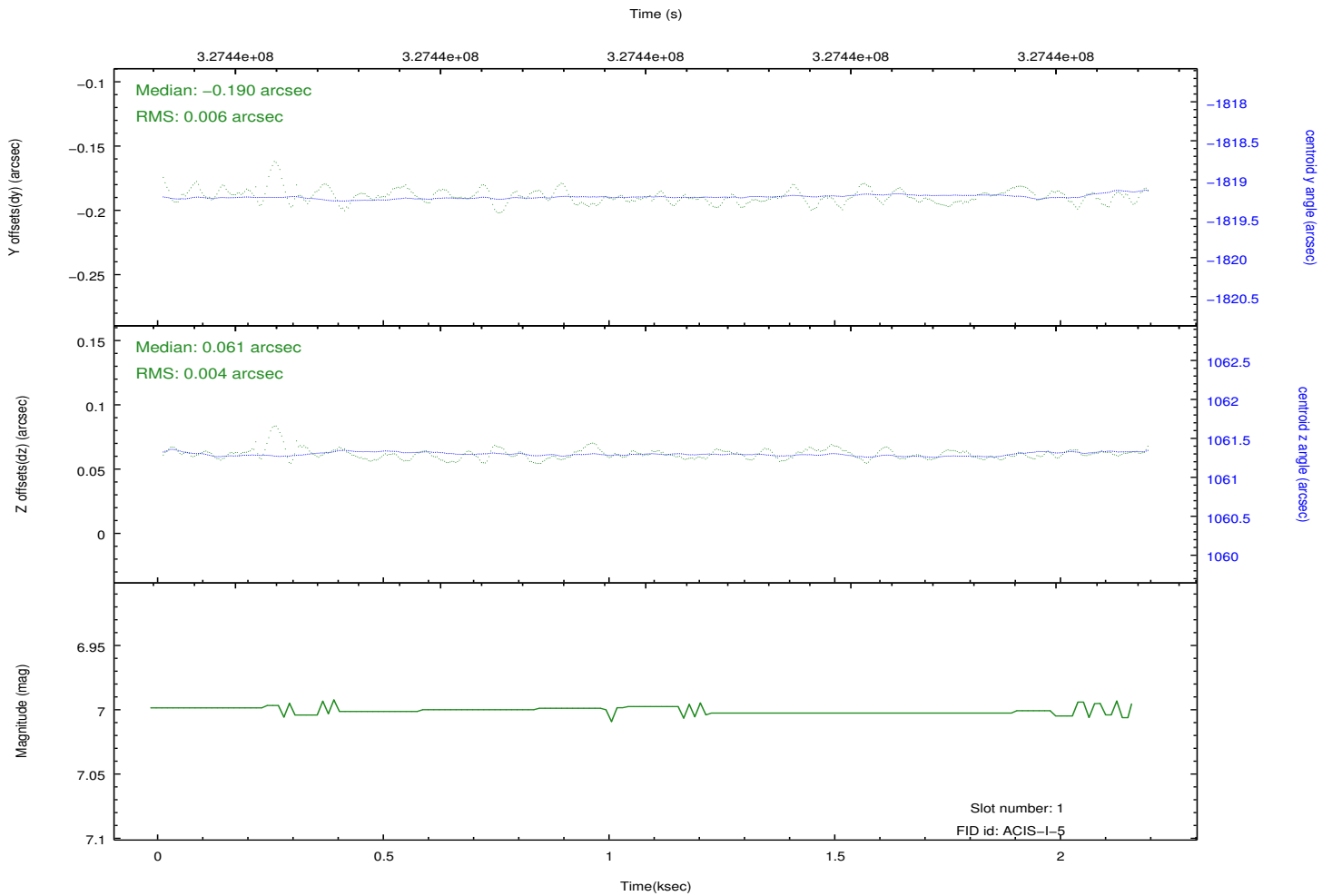
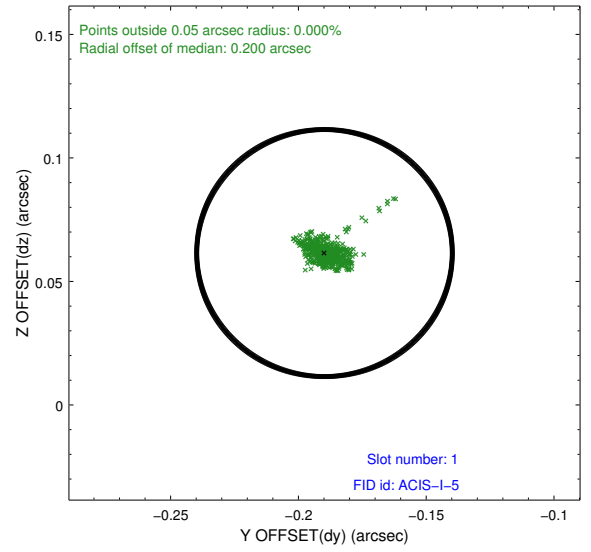
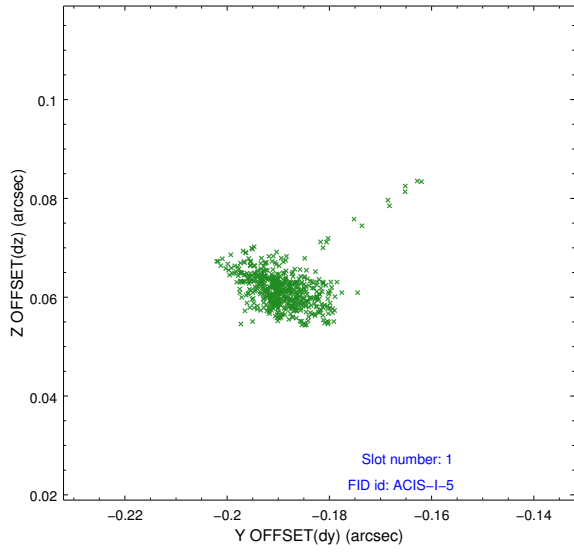


2.5 FID Slots

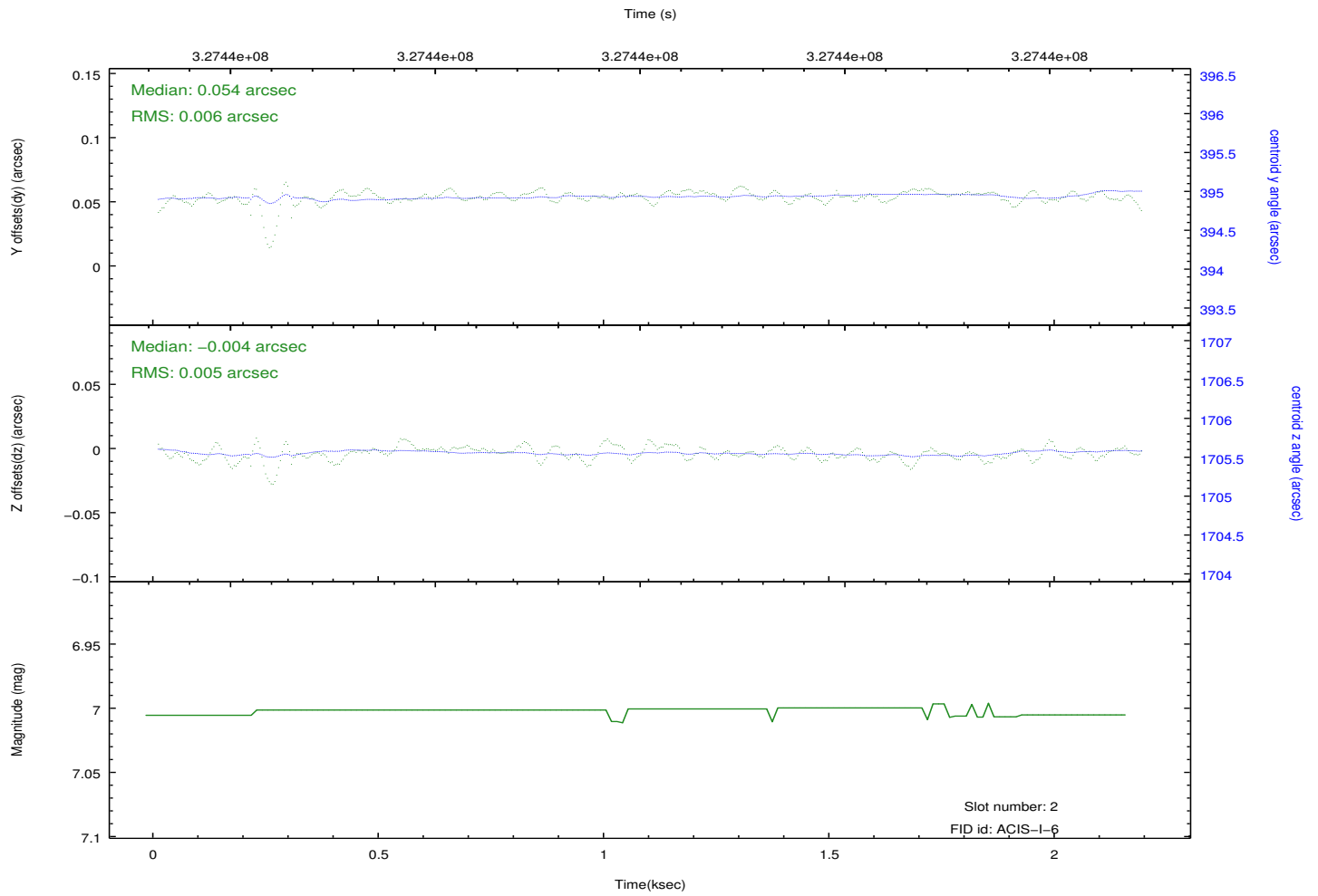
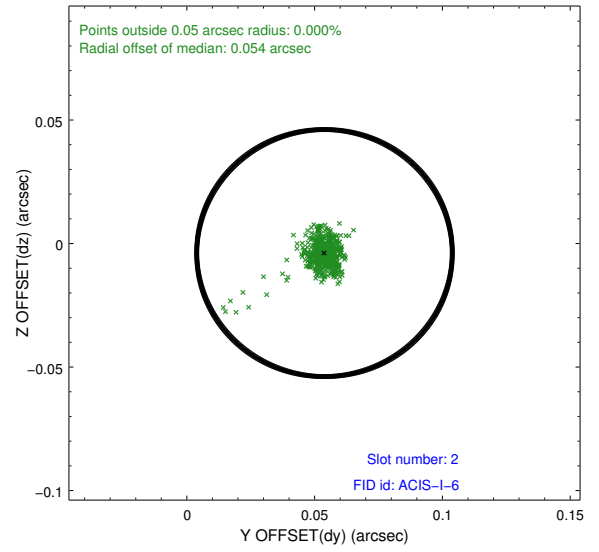
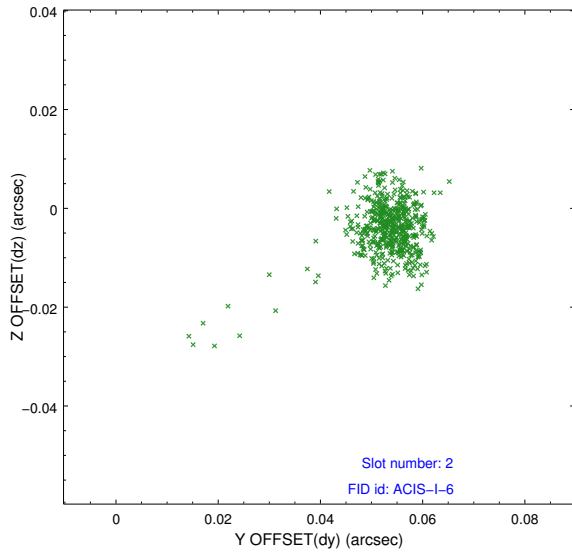
2.5.1 Slot 0



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) | 2012.05.21 |
| V&V Edition | 1 |
| V&V Disposition and Status | OK |
| V&V Charge Time | 2.18240001 |

A.2 Comments