

V&V Reference Report

L2 ASCDS Version : 8.4.5

Observation 10402 - L2 Version 2
Chandra X-Ray Center

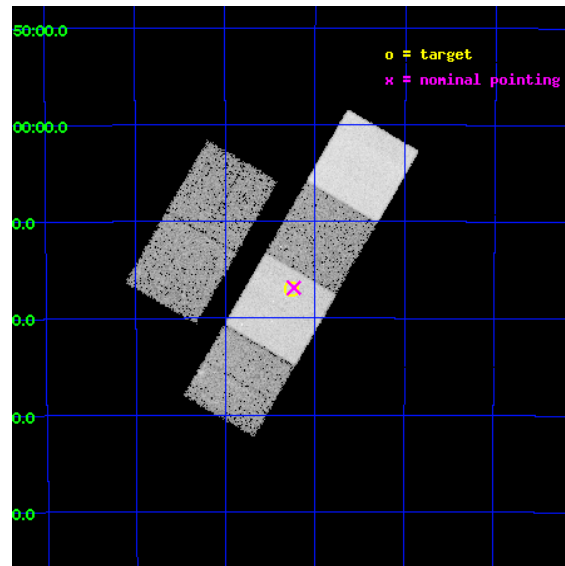
L2 Processing Date : Jun 28 2012

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1 Front

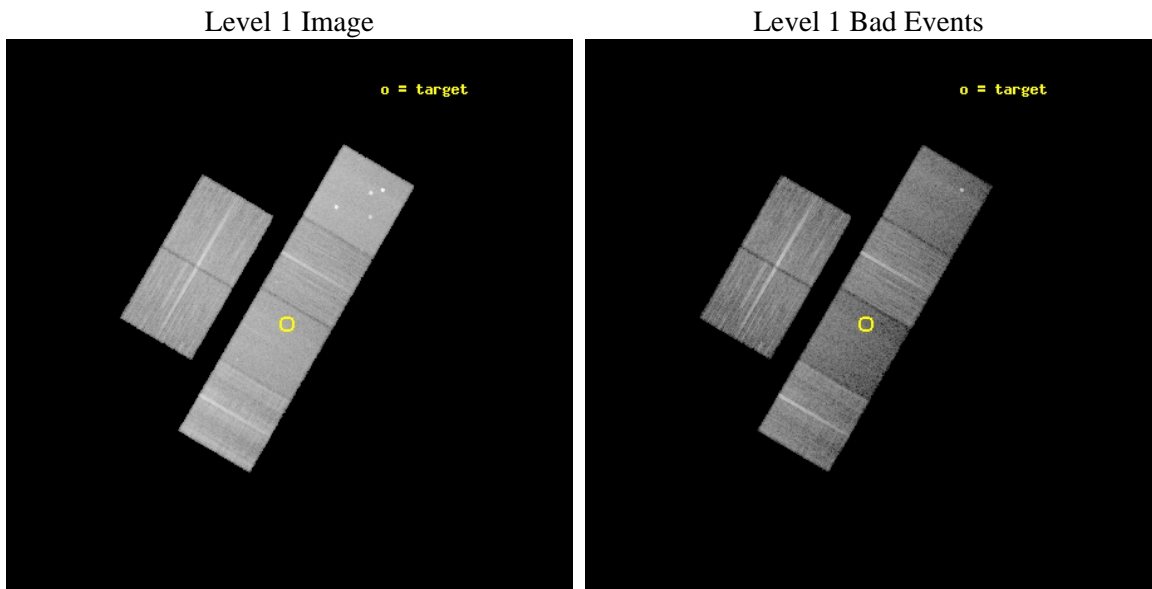
| | | |
|----------|-------------------------------------|---|
| seq_num | 701945 | Sequence number |
| obs_id | 10402 | Observation id |
| title | WPVS 007: the little AGN that could | Proposal title |
| observer | Dr. Karen Leighly | Principal investigator |
| object | WPVS 007 | Source name |
| dtcycle | 0 | |
| cycle | P | events from which exps? Prim/Second/Both |
| ra_targ | 9.815833 | Observer's specified target RA [deg] |
| dec_targ | -51.283611 | Observer's specified target Dec [deg] |
| ra_nom | 9.8089863553295 | Nominal RA [deg] |
| dec_nom | -51.281332797852 | Nominal Dec [deg] |
| roll_nom | 120.22150315667 | Nominal Roll [deg] |
| revision | 2 | Processing version of data |
| ontime | 20047.258160889 | Sum of GTIs [s] |
| livetime | 19793.407707046 | Livetime [s] |
| ontime2 | 20047.299200892 | Sum of GTIs [s] |
| ontime3 | 20040.653080344 | Sum of GTIs [s] |
| ontime5 | 20047.217120886 | Sum of GTIs [s] |
| ontime6 | 20047.176080883 | Sum of GTIs [s] |
| ontime7 | 20047.258160889 | Sum of GTIs [s] |
| ontime8 | 20043.853000641 | Sum of GTIs [s] |
| l2events | 214298 | Number of level 2 events |



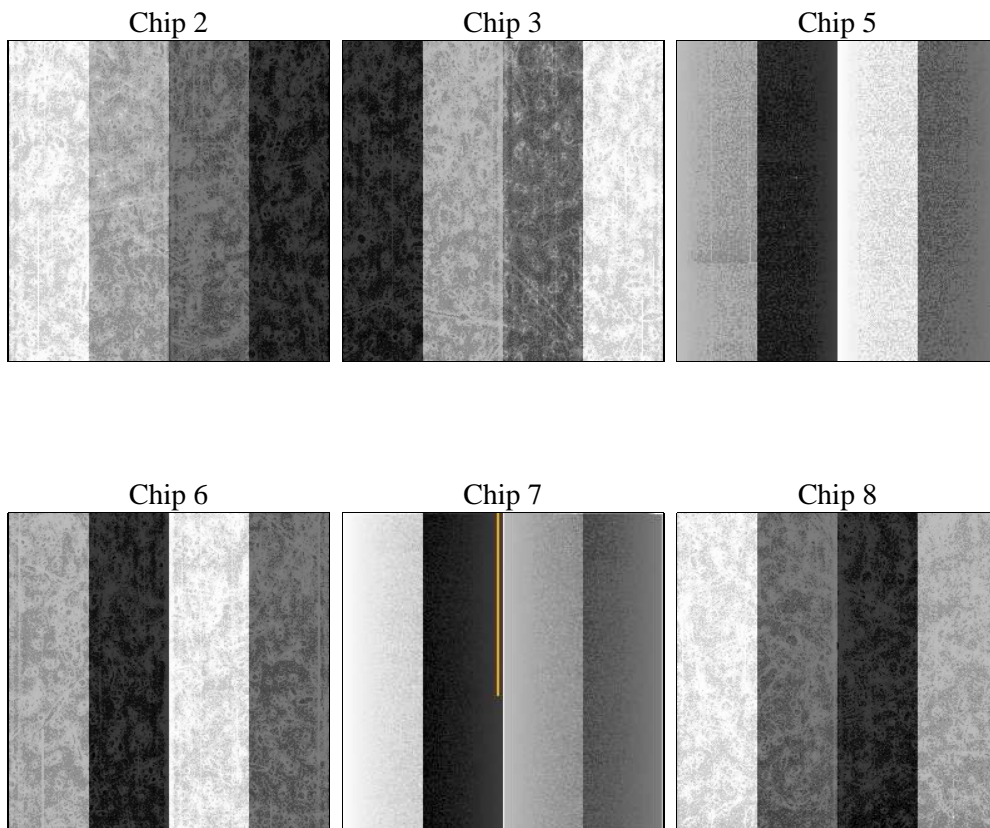
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

| | | | | | |
|----------|---------------------|--------------------------------|----------------|-----------------|---|
| obi_num | 0 | Obi number | sched_exp_time | 20000.000000 | [s] Scheduled observation exposure time |
| ascdsver | 8.4.5 | Processing system revision | ontime | 20047.258160889 | Sum of GTIs [s] |
| caldsver | 4.5.0 | | ontime2 | 20047.299200892 | Sum of GTIs [s] |
| date | 2012-06-28T05:30:09 | Date and time of file creation | ontime3 | 20040.653080344 | Sum of GTIs [s] |
| revision | 2 | Processing version of data | ontime5 | 20047.217120886 | Sum of GTIs [s] |
| | | | ontime6 | 20047.176080883 | Sum of GTIs [s] |
| | | | ontime7 | 20047.258160889 | Sum of GTIs [s] |
| | | | ontime8 | 20043.853000641 | Sum of GTIs [s] |
| | | | l1events | 946779 | Number of level 1 events |

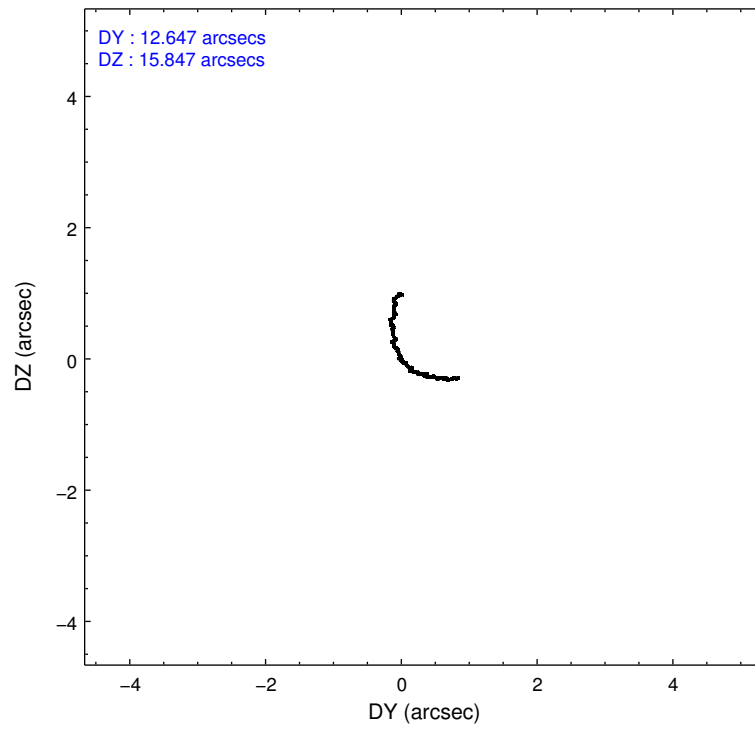
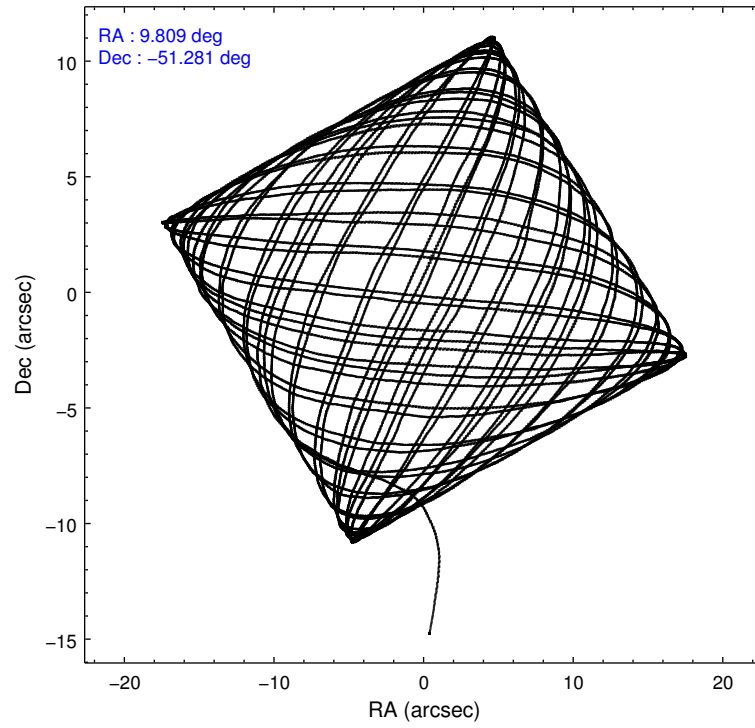
2.1.4 Events

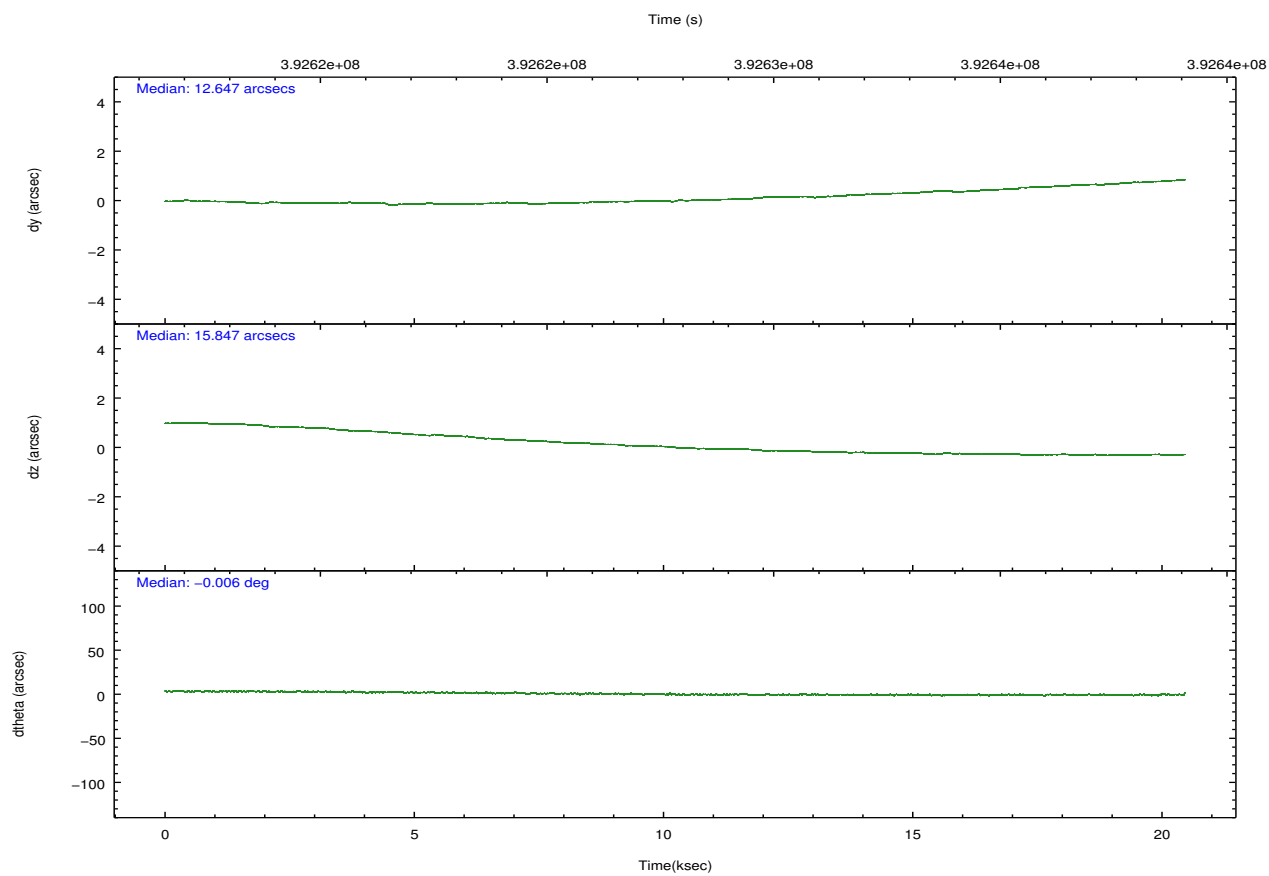
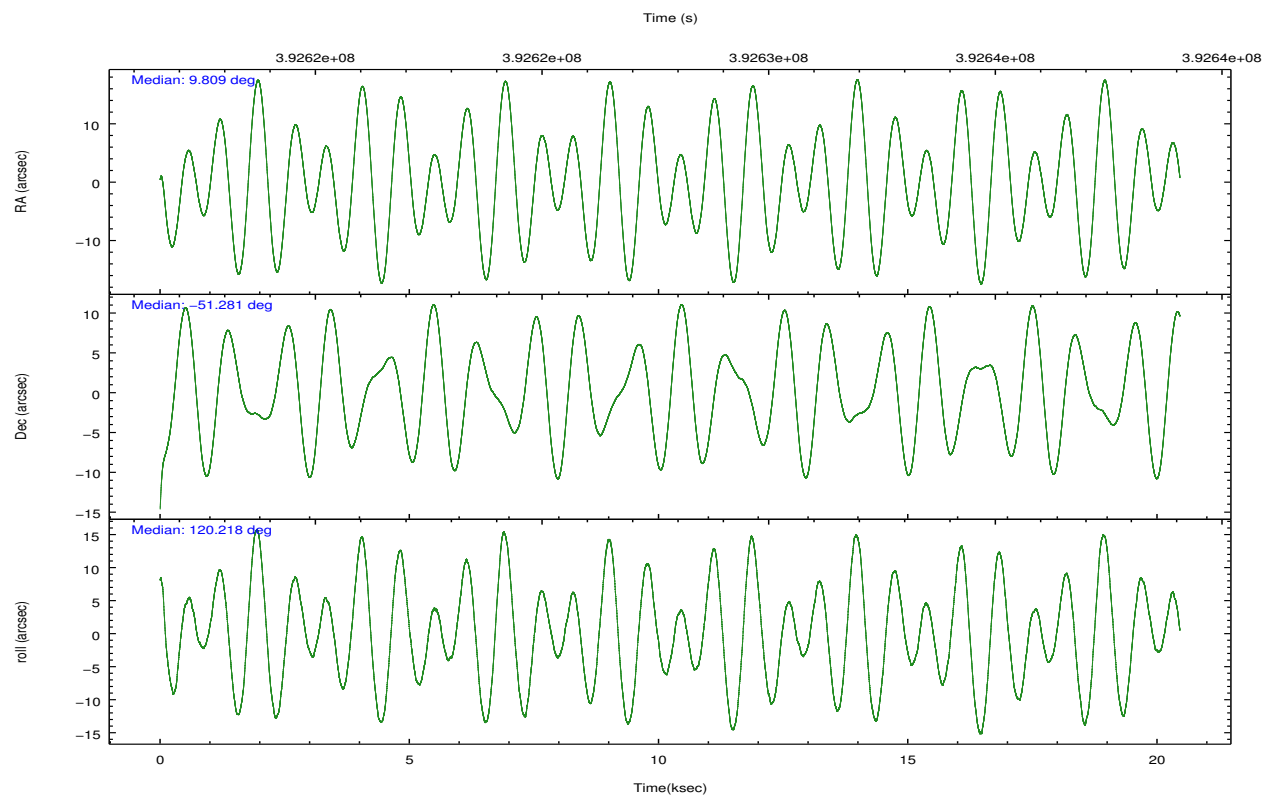
| | ccd 2 | ccd 3 | ccd 5 | ccd 6 | ccd 7 | ccd 8 | | ccd 2 | ccd 3 | ccd 5 | ccd 6 | ccd 7 | ccd 8 |
|-----------------|--------|--------|--------|--------|--------|--------|----------------|--------|--------|-------|--------|-------|--------|
| level 1 events | 151227 | 136228 | 196235 | 141075 | 144776 | 177238 | grade 0 events | 5166 | 5024 | 14190 | 5591 | 7072 | 13372 |
| rejected events | 136559 | 122490 | 91102 | 125752 | 74284 | 129191 | | 3% | 3% | 7% | 3% | 4% | 7% |
| rejected % | 90% | 89% | 46% | 89% | 51% | 72% | grade 1 events | 95 | 72 | 393 | 78 | 238 | 169 |
| | | | | | | | | 0% | 0% | 0% | 0% | 0% | 0% |
| | | | | | | | grade 2 events | 3787 | 3034 | 32006 | 3519 | 15034 | 11440 |
| | | | | | | | | 2% | 2% | 16% | 2% | 10% | 6% |
| | | | | | | | grade 3 events | 1513 | 1519 | 4142 | 1549 | 6515 | 5339 |
| | | | | | | | | 1% | 1% | 2% | 1% | 4% | 3% |
| | | | | | | | grade 4 events | 1538 | 1510 | 3975 | 1596 | 6330 | 5004 |
| | | | | | | | | 1% | 1% | 2% | 1% | 4% | 2% |
| | | | | | | | grade 5 events | 4582 | 5253 | 15175 | 5362 | 15496 | 8136 |
| | | | | | | | | 3% | 3% | 7% | 3% | 10% | 4% |
| | | | | | | | grade 6 events | 2666 | 2658 | 50850 | 3073 | 35548 | 12903 |
| | | | | | | | | 1% | 1% | 25% | 2% | 24% | 7% |
| | | | | | | | grade 7 events | 131880 | 117158 | 75504 | 120307 | 58543 | 120875 |
| | | | | | | | | 87% | 86% | 38% | 85% | 40% | 68% |

2.2 Compared Parameters

| Parameter | Planned | Actual | Parameter | Planned | Actual |
|-----------------------------------|---------------------|----------------------|---------------------------------------|-----------|---------|
| Instrument | ACIS | ACIS | Obspar format version number | 7 | 7 |
| Detector | ACIS-235678 | ACIS-235678 | Obspar file type | PREDICTED | ACTUAL |
| Grating | NONE | NONE | Obspar update status | NONE | UPDATED |
| Data mode | VFAINT | VFAINT | CCD I0 on | N | N |
| Observation mode | POINTING | POINTING | CCD I1 on | N | N |
| [deg] Pointing RA | 9.847239 | 9.80898635532953 | CCD I2 on | O1 | Y |
| [deg] Pointing Dec | -51.294580 | -51.28133279785173 | CCD I3 on | O2 | Y |
| [deg] Pointing Roll | 120.094720 | 120.221503156668 | CCD S0 on | N | N |
| [mm] SIM focus pos | -0.684267 | -0.6828225247311905 | CCD S1 on | Y | Y |
| [mm] SIM defocus | 0 | 0.001444936568705701 | CCD S2 on | Y | Y |
| [mm] SIM translation stage pos | -190.132523 | -190.1425803651734 | CCD S3 on | Y | Y |
| [mm] SIM translation stage offset | 0 | 0.01005778216563158 | CCD S4 on | Y | Y |
| [s] Observation start time (MET) | 392618060.184000 | 392616902.69368 | CCD S5 on | N | N |
| Observation start date | 2010-06-11T04:33:14 | 2010-06-11T04:15:02 | Number of optional ACIS chips dropped | 0 | 0 |
| [s] Observation end time (MET) | 392638060.184000 | 392638673.18229 | On-chip summing requested | N | N |
| Observation end date | 2010-06-11T10:06:34 | 2010-06-11T10:17:53 | Subarray requested | NONE | NONE |
| Read mode | TIMED | TIMED | Alternating exposures requested | N | N |
| | | | [s] Primary exposure time | 0.000000 | 3.2 |

2.3 Aspect



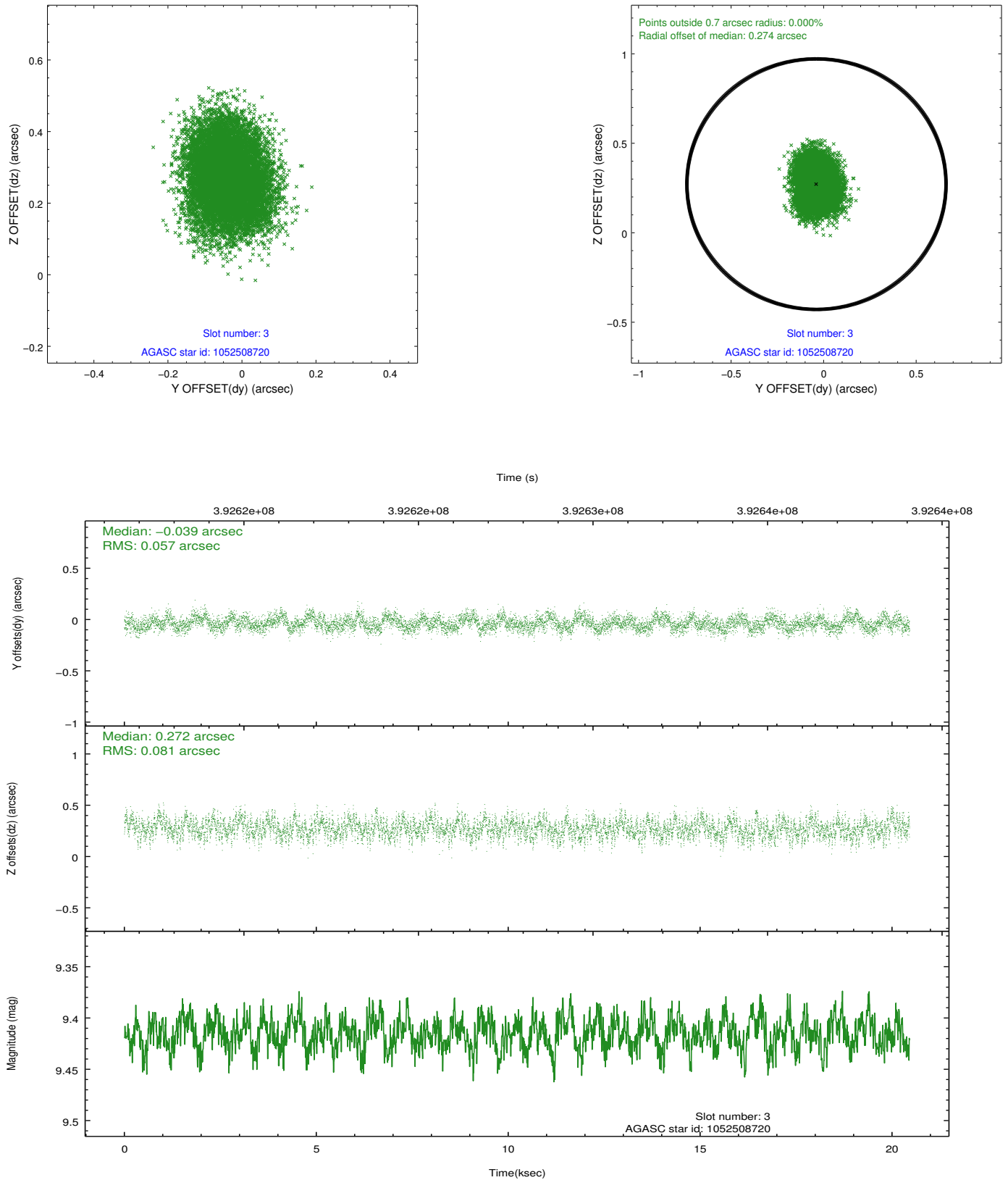


Slot Statistics

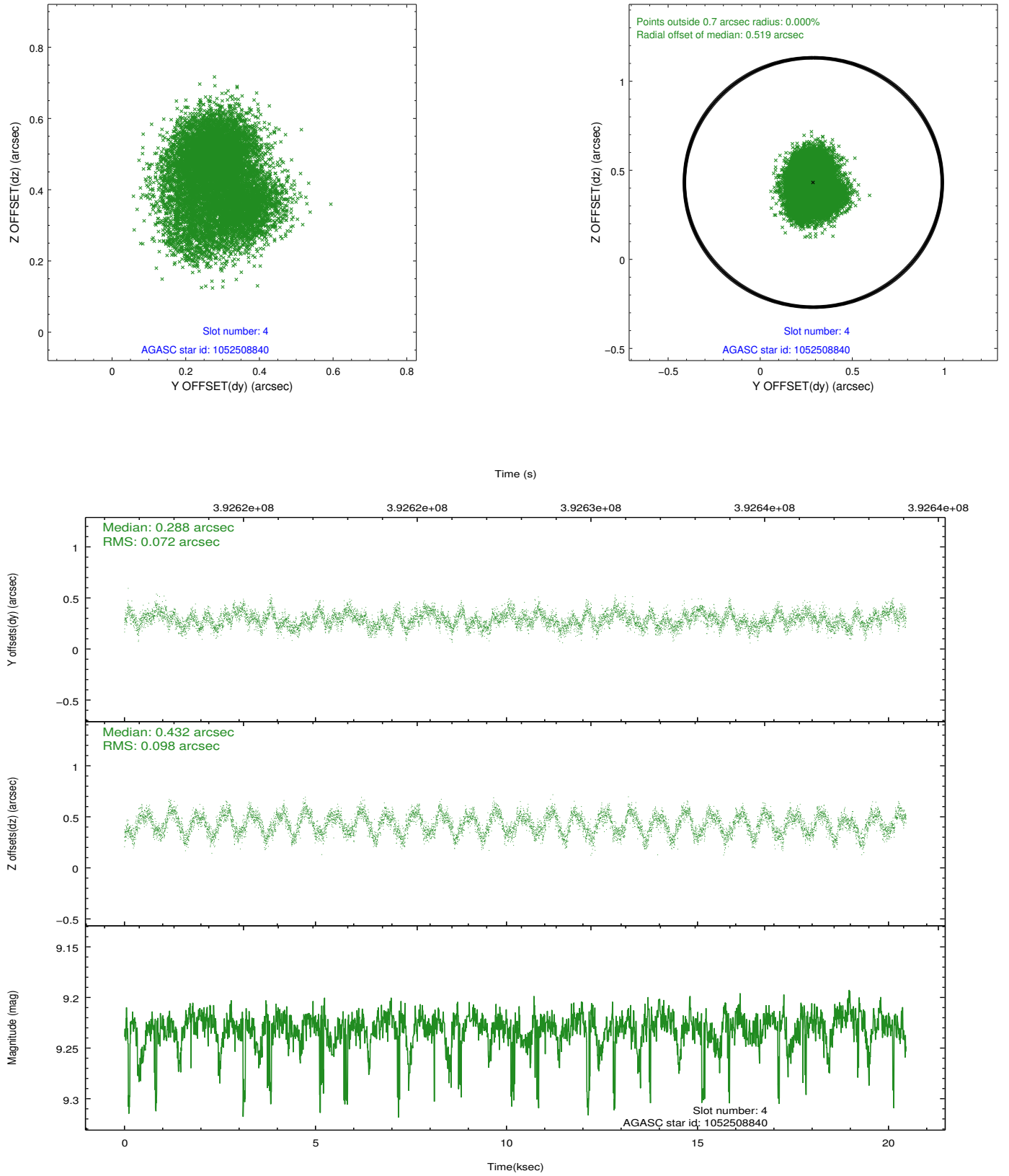
| slot | status | id | mag | n_pts | med_dy | med_dz | dr1 | dr2 | ra | dec | mean_y | mean_z |
|------|--------|------------|------|-------|--------|--------|-------|-------|-----------|------------|----------|----------|
| 0 | FID | ACIS-S-1 | 6.97 | 4988 | 0.083 | -0.083 | 0.016 | 0.030 | 0.000000 | 0.000000 | 930.43 | -1733.07 |
| 1 | FID | ACIS-S-5 | 7.01 | 4988 | -0.136 | 0.047 | 0.021 | 0.032 | 0.000000 | 0.000000 | -1818.69 | 164.43 |
| 2 | FID | ACIS-S-6 | 7.11 | 4989 | 0.032 | 0.044 | 0.024 | 0.033 | 0.000000 | 0.000000 | 395.73 | 808.59 |
| 3 | GUIDE | 1052508720 | 9.42 | 9962 | -0.039 | 0.272 | 0.106 | 0.168 | 10.891663 | -51.295828 | -1197.07 | -2023.14 |
| 4 | GUIDE | 1052508840 | 9.23 | 9965 | 0.288 | 0.432 | 0.132 | 0.200 | 10.903677 | -51.613746 | -2192.84 | -1458.52 |
| 5 | GUIDE | 1052511336 | 8.41 | 9975 | -0.285 | -0.520 | 0.080 | 0.128 | 10.026754 | -51.744882 | -1604.08 | 466.28 |
| 6 | GUIDE | 1052514064 | 9.37 | 9976 | -0.123 | -0.090 | 0.090 | 0.146 | 8.525449 | -51.050347 | 2237.06 | 2160.90 |
| 7 | GUIDE | 1052516296 | 9.55 | 9967 | 0.158 | -0.087 | 0.173 | 0.252 | 9.569819 | -51.431221 | -114.41 | 786.29 |

2.4 Star Slots

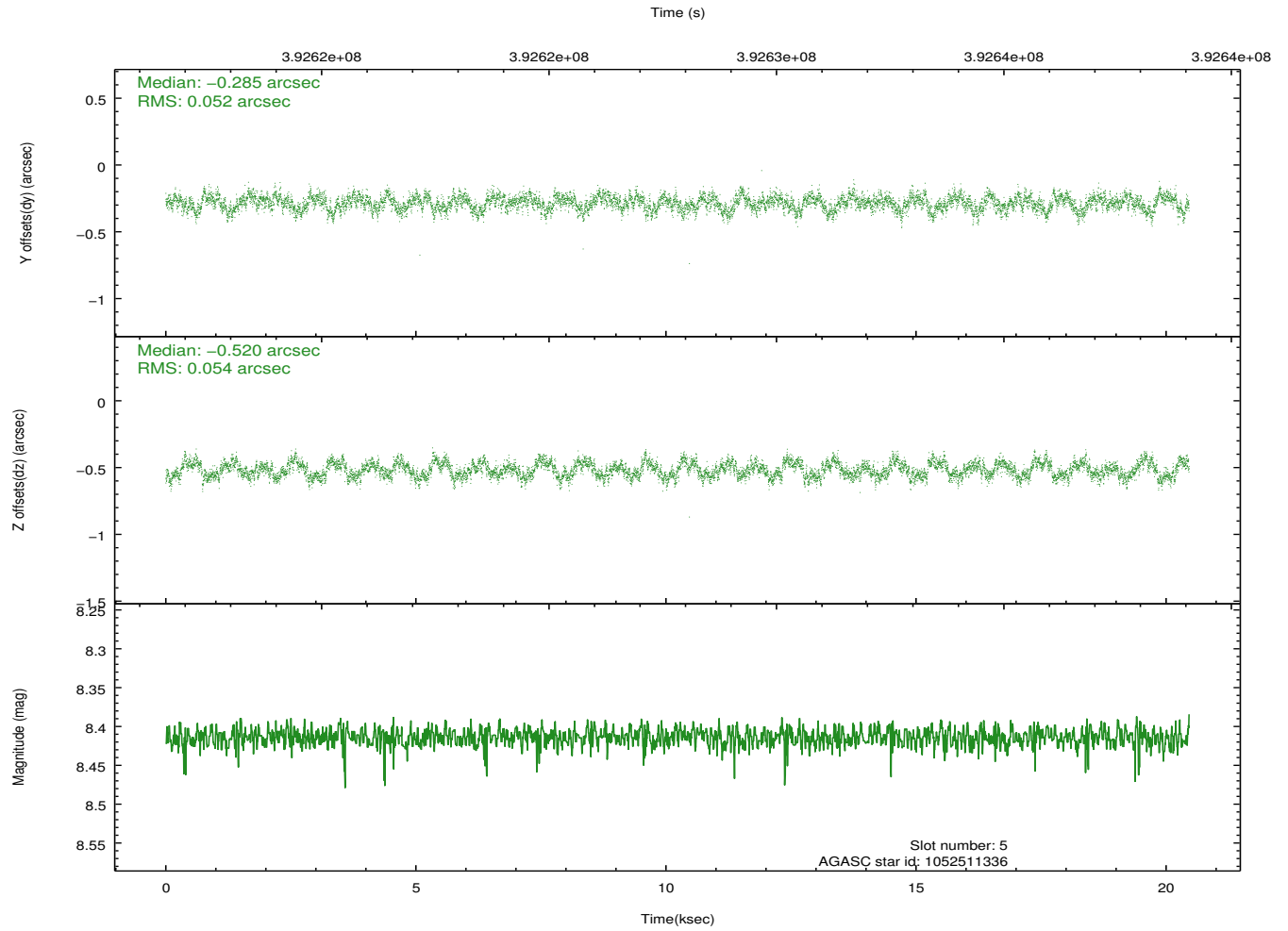
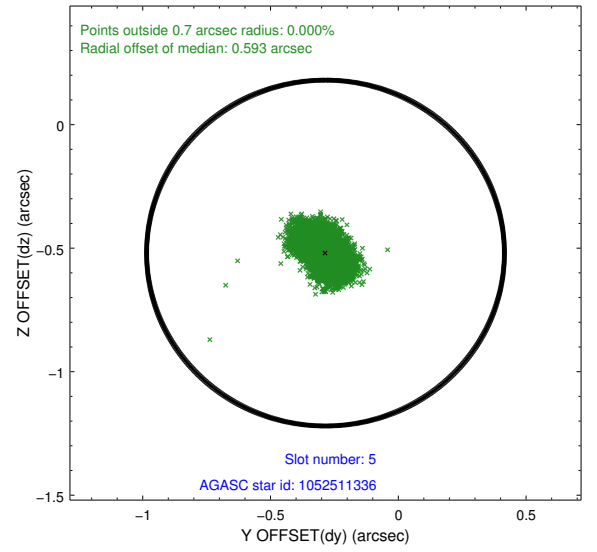
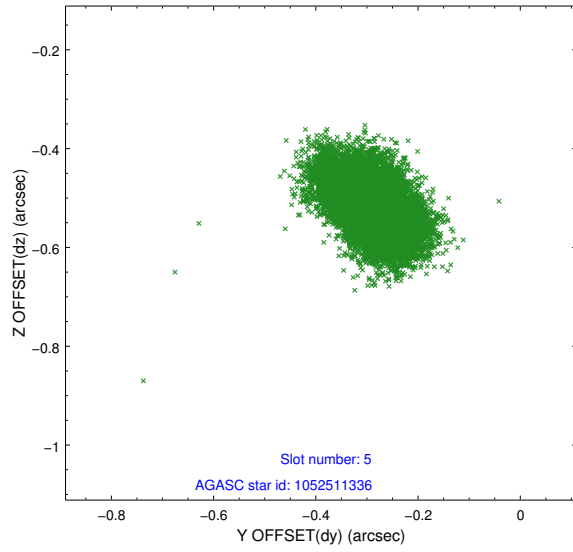
2.4.1 Slot 3



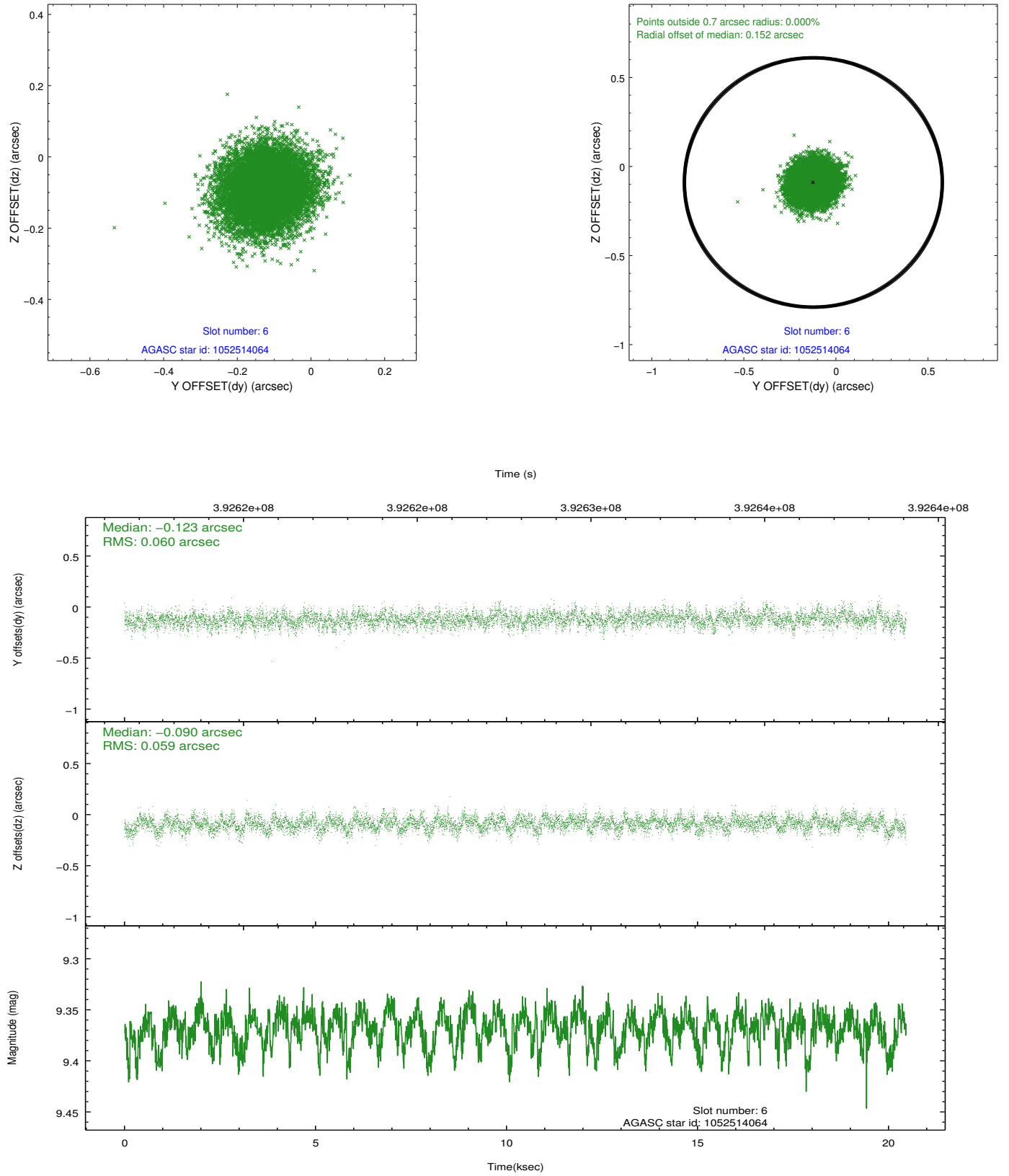
2.4.2 Slot 4



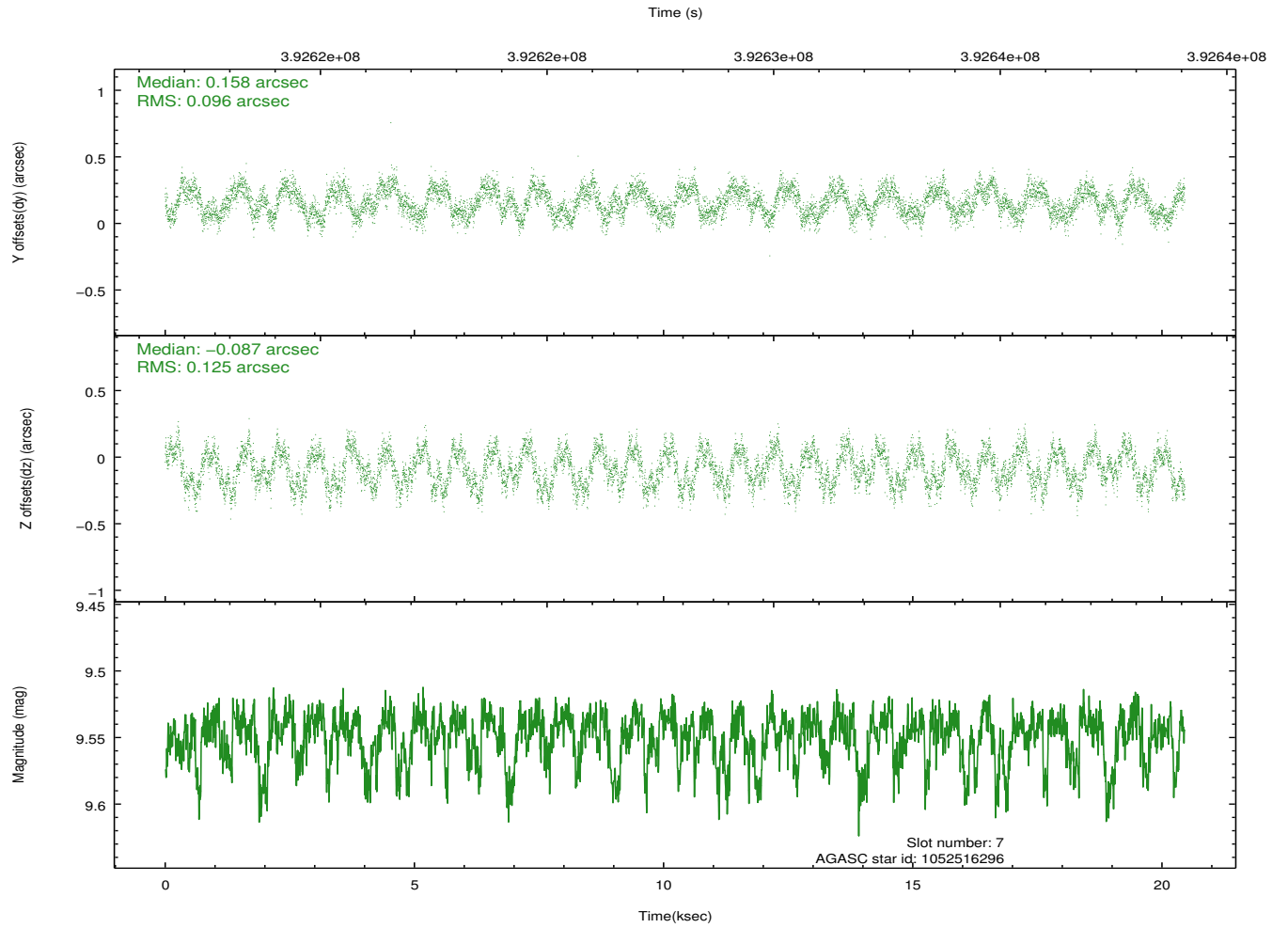
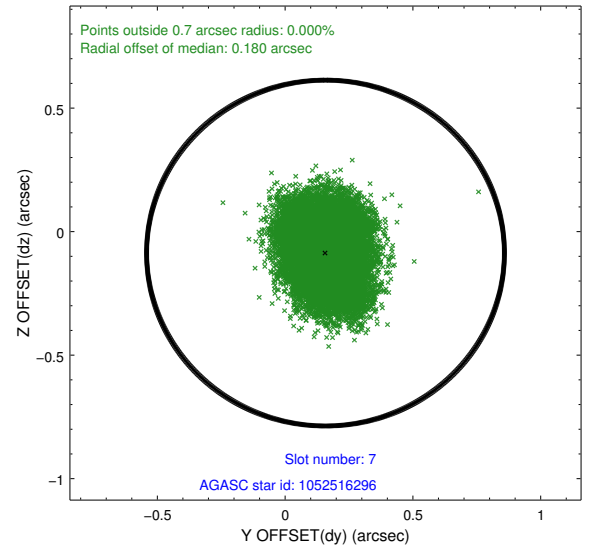
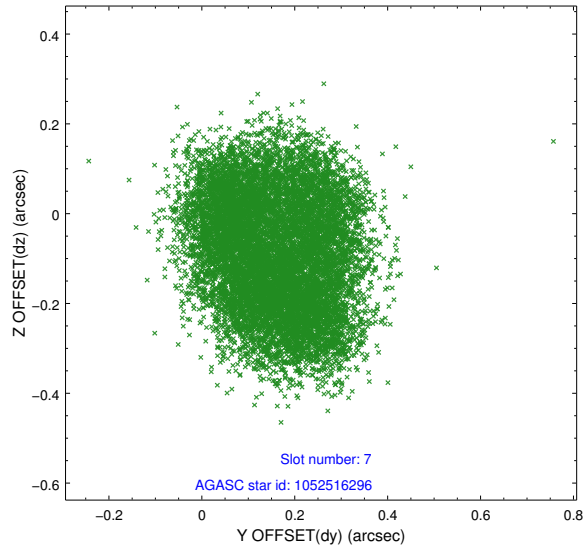
2.4.3 Slot 5



2.4.4 Slot 6

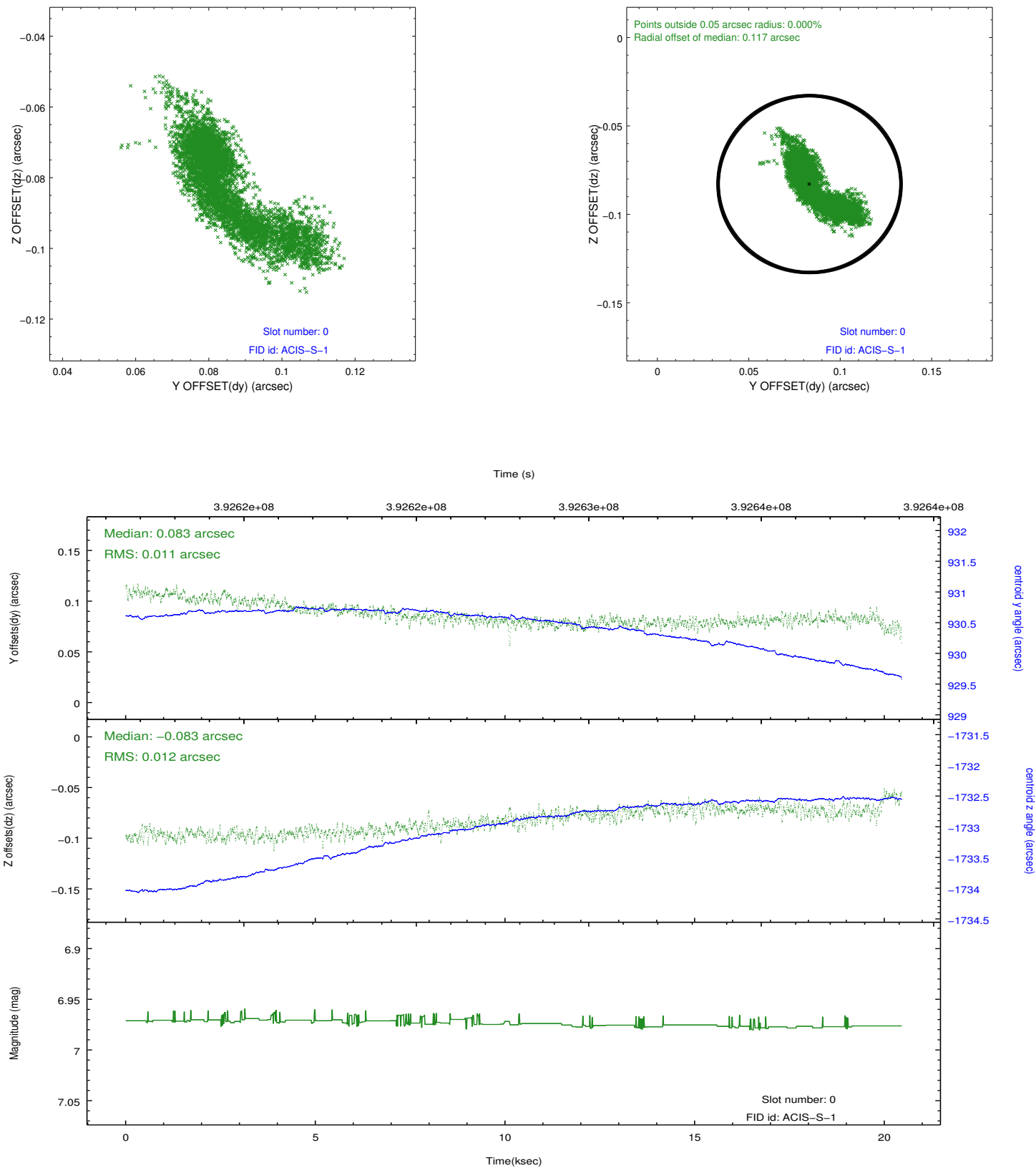


2.4.5 Slot 7

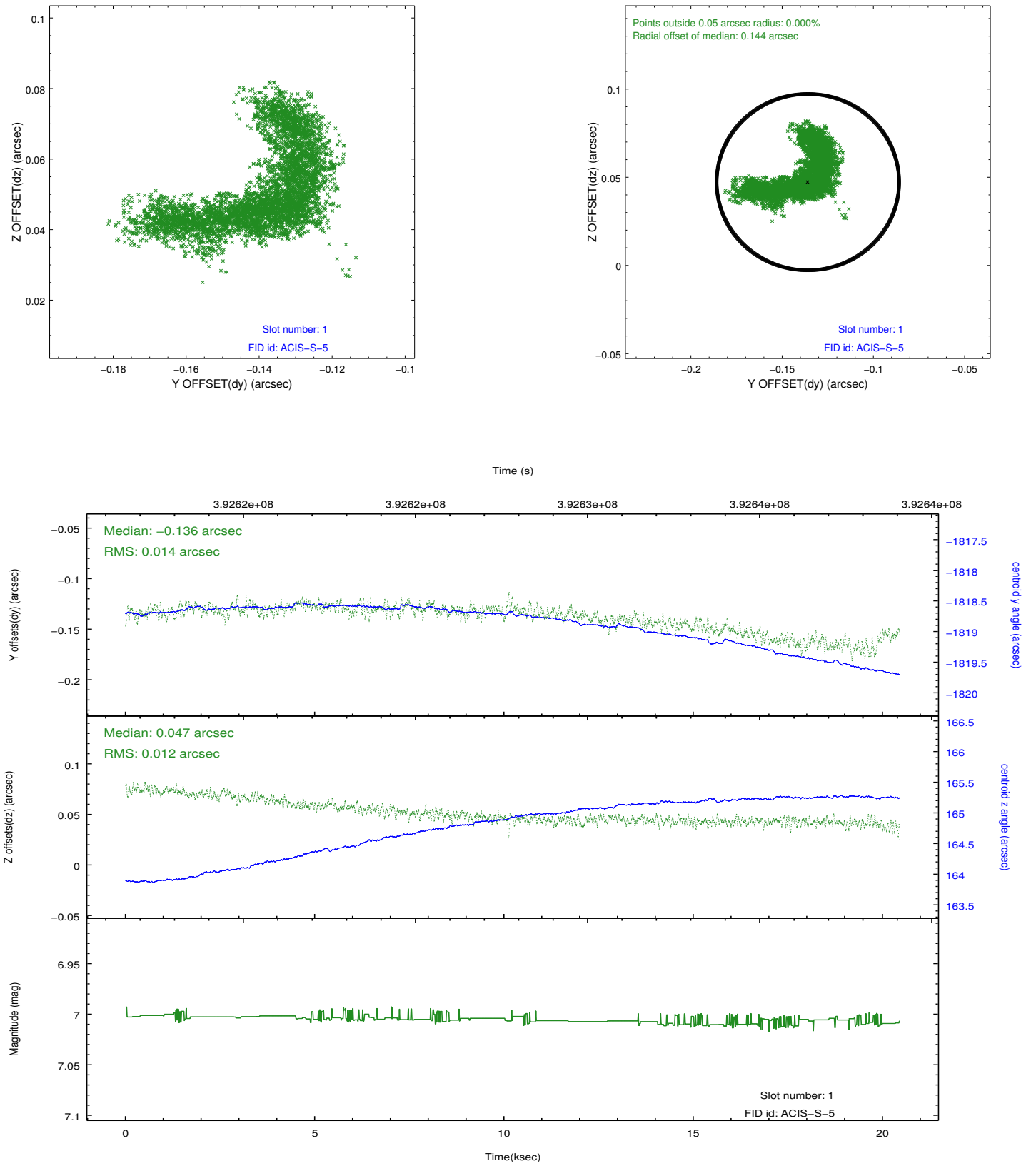


2.5 FID Slots

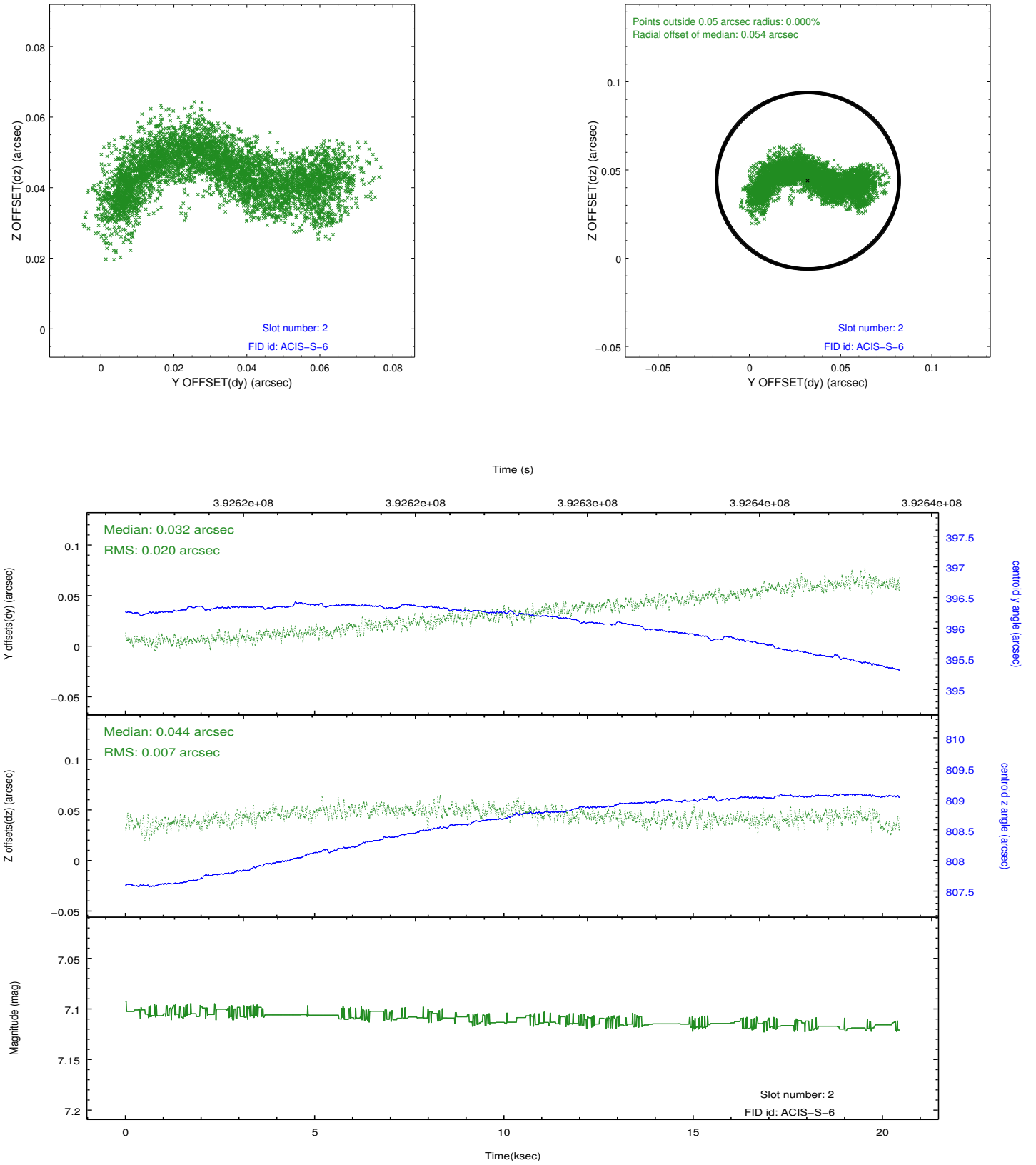
2.5.1 Slot 0



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) | 2012.07.03 |
| V&V Edition | 1 |
| V&V Disposition and Status | OK |
| V&V Charge Time | 20.047258169234 |

A.2 Comments

Joint proposal with HST.