

V&V Reference Report

L2 ASCDS Version : 10.9.2

Observation 20401 - L2 Version 2
Chandra X-Ray Center

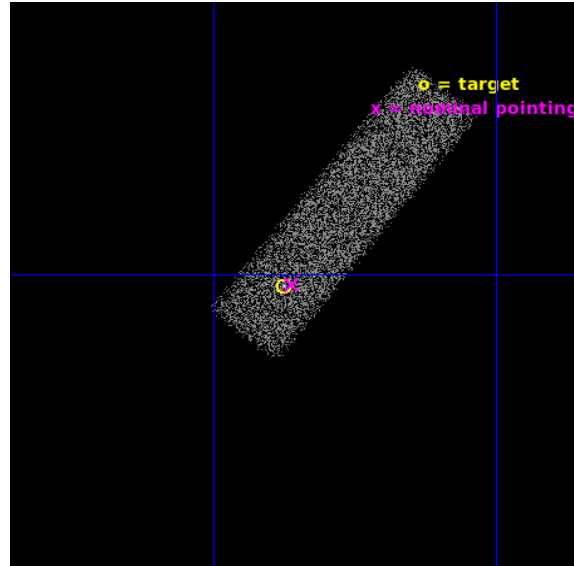
L2 Processing Date : Oct 29 2020

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1 Front

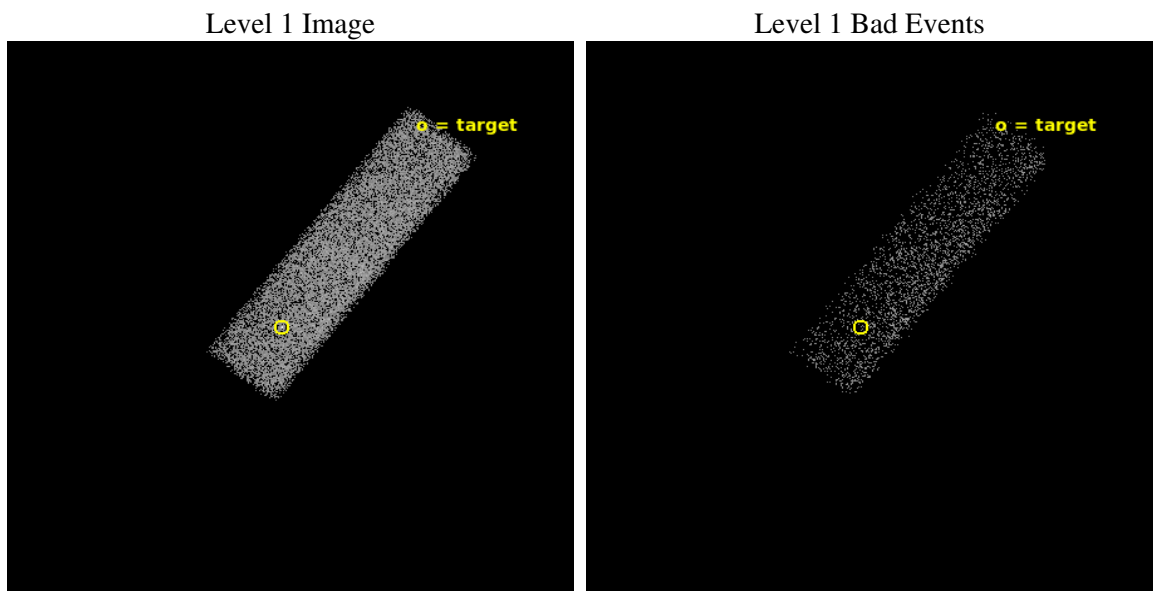
| | | |
|----------|--|---|
| seq_num | 703506 | Sequence number |
| obs_id | 20401 | Observation id |
| title | A SEARCH FOR BEACONS IN THE EARLY UNIVERSE: A SURVEY OF HIGH REDSHIFT RADIO JETS | Proposal title |
| observer | Daniel Schwartz | Principal investigator |
| object | J0833+0959 | Source name |
| dtcycle | 0 | |
| cycle | P | events from which exps? Prim/Second/Both |
| ra_targ | 128.34375 | Observer's specified target RA [deg] |
| dec_targ | 9.994778 | Observer's specified target Dec [deg] |
| ra_nom | 128.34010339641 | Nominal RA [deg] |
| dec_nom | 9.9953700738515 | Nominal Dec [deg] |
| roll_nom | 308.14578084673 | Nominal Roll [deg] |
| revision | 2 | Processing version of data |
| ontime | 10060.79940033 | Sum of GTIs [s] |
| livetime | 9569.8653099302 | Livetime [s] |
| ontime7 | 10060.79940033 | Sum of GTIs [s] |
| l2events | 11962 | Number of level 2 events |



2 OBI

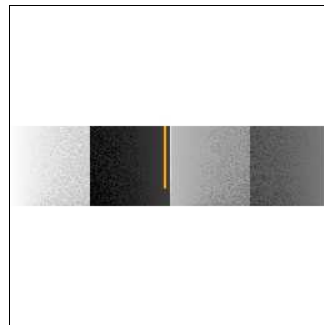
2.1 OBI

2.1.1 Images



2.1.2 Bias

Chip 7



2.1.3 Parameters

| | | | | | |
|----------|---------------------|--------------------------------|----------------|----------------|---|
| obi_num | 0 | Obi number | sched_exp_time | 10000.000000 | [s] Scheduled observation exposure time |
| ascdsver | 10.9.2 | Processing system revision | ontime | 10060.79940033 | Sum of GTIs [s] |
| caldsver | 4.9.3 | | ontime7 | 10060.79940033 | Sum of GTIs [s] |
| date | 2020-10-29T10:15:03 | Date and time of file creation | l1events | 25539 | Number of level 1 events |
| revision | 2 | Processing version of data | | | |

2.1.4 Events

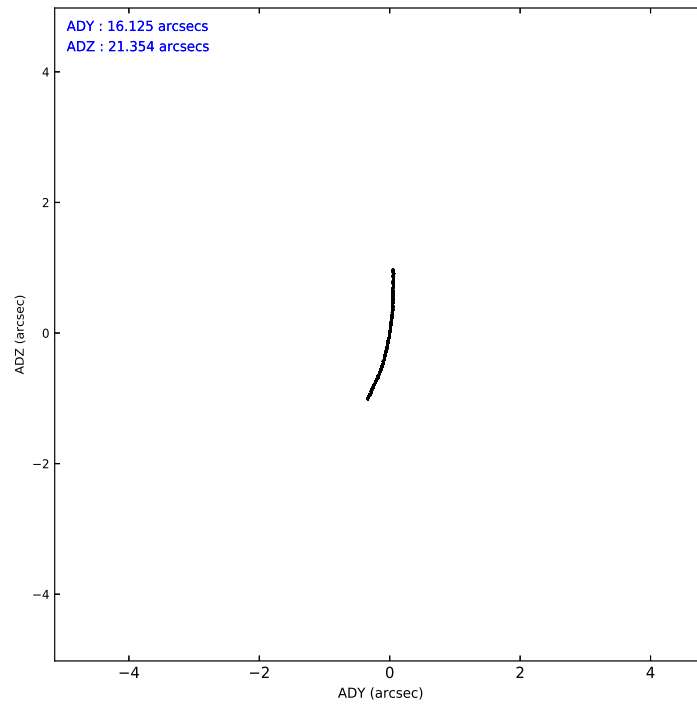
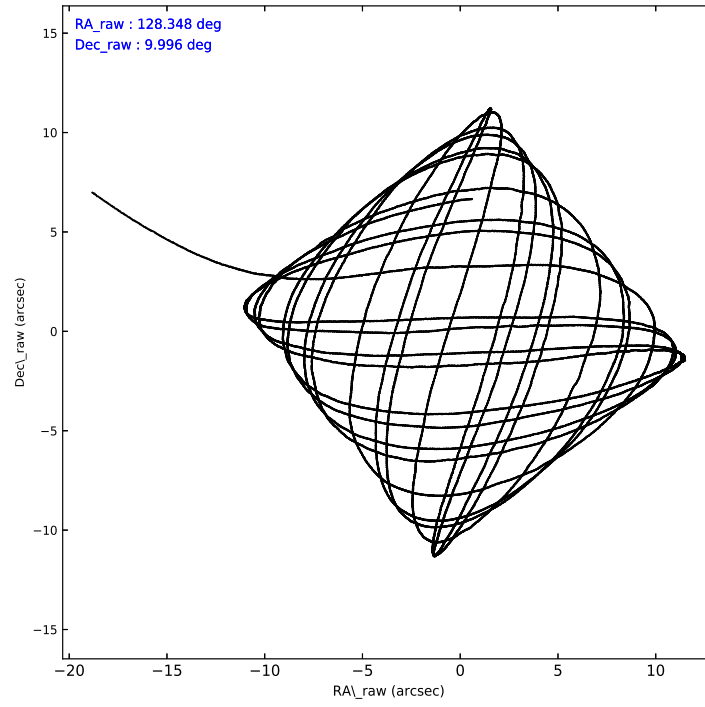
| | |
|-----------------|--------------|
| | ccd 7 |
| level 1 events | 25539 |
| rejected events | 13144 |
| rejected % | 51% |

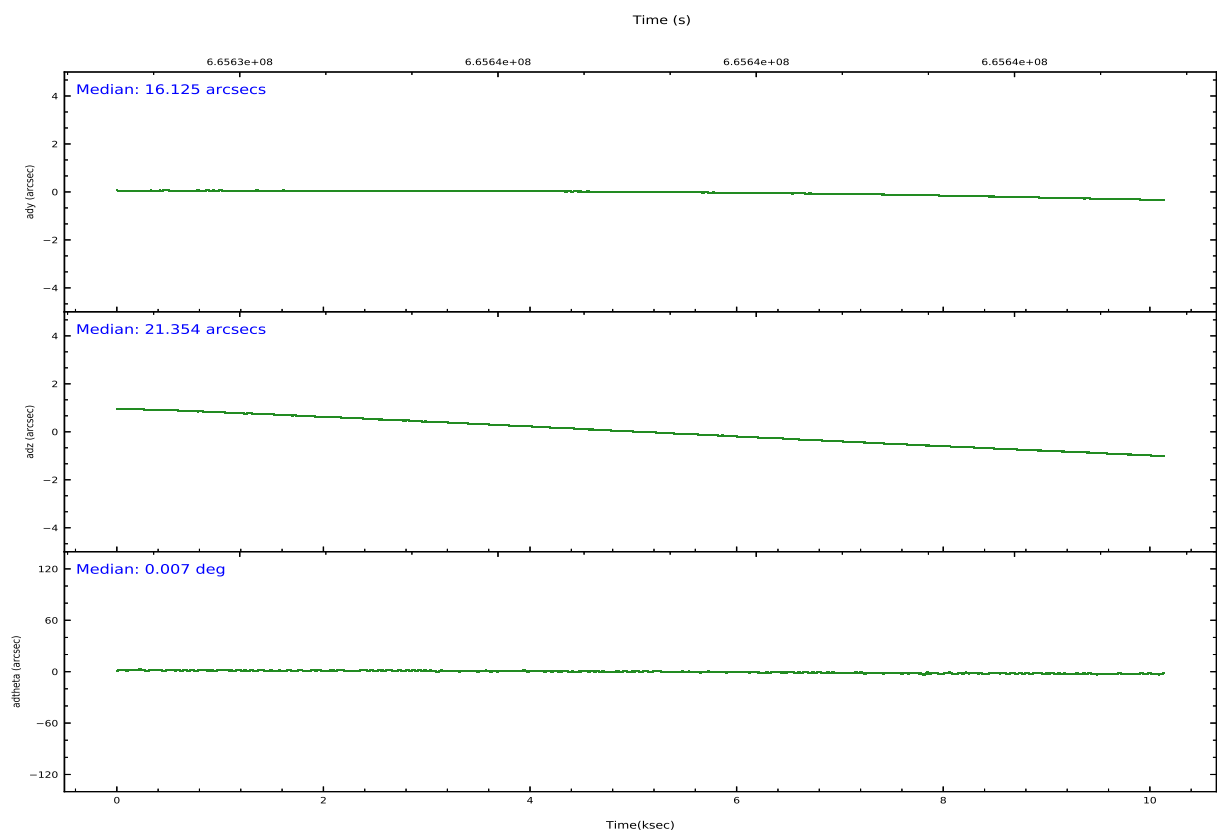
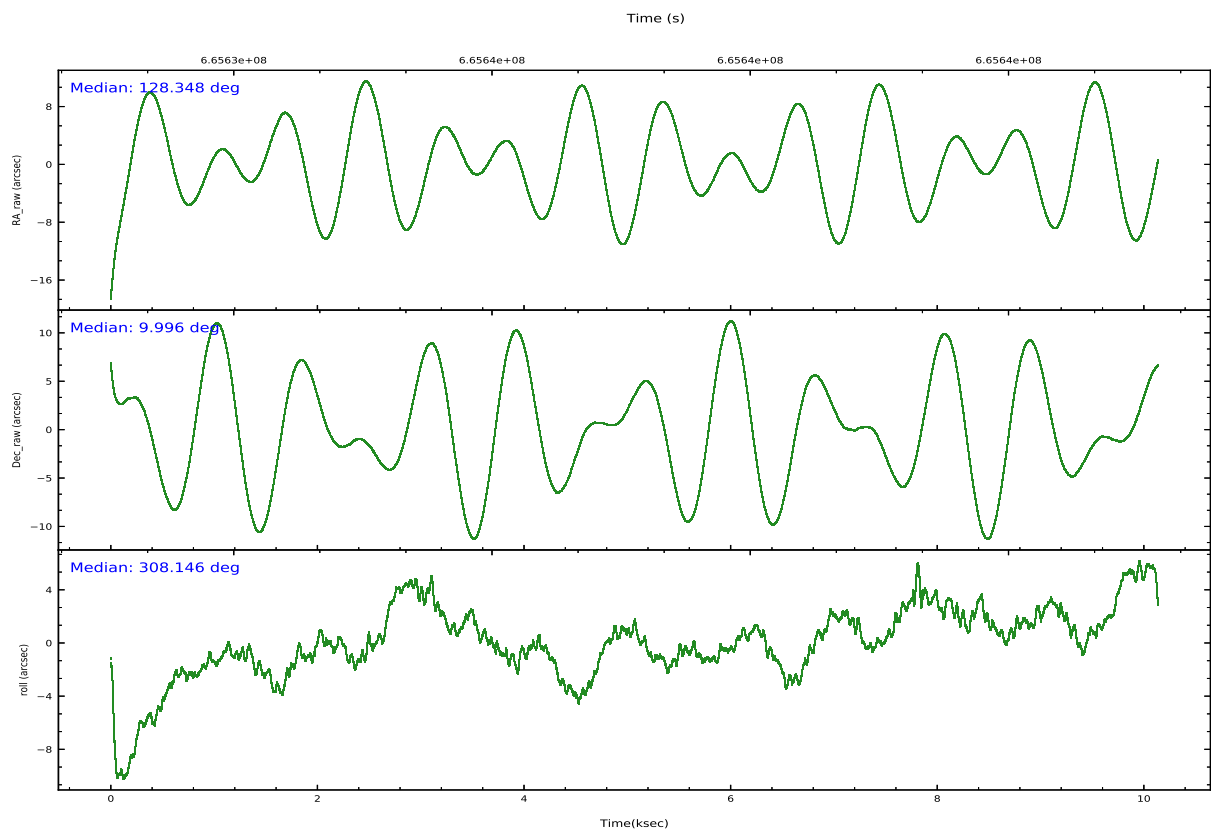
| | |
|----------------|--------------|
| | ccd 7 |
| grade 0 events | 1245 |
| | 4% |
| grade 1 events | 51 |
| | 0% |
| grade 2 events | 2624 |
| | 10% |
| grade 3 events | 1384 |
| | 5% |
| grade 4 events | 1291 |
| | 5% |
| grade 5 events | 2641 |
| | 10% |
| grade 6 events | 5853 |
| | 22% |
| grade 7 events | 10450 |
| | 40% |

2.2 Compared Parameters

| Parameter | Planned | Actual | Parameter | Planned | Actual |
|-----------------------------------|---------------------|----------------------|---------------------------------------|-----------|---------|
| Instrument | ACIS | ACIS | Obspar version number | 8 | 8 |
| Detector | ACIS-7 | ACIS-7 | Obspar file type | PREDICTED | ACTUAL |
| Grating | NONE | NONE | Obspar update status | NONE | UPDATED |
| Data mode | VFAINT | VFAINT | Number of optional ACIS chips dropped | 0 | 0 |
| Observation mode | POINTING | POINTING | On-chip summing requested | N | N |
| [deg] Pointing RA | 128.321910 | 128.34010339641 | Subarray requested | CUSTOM | 1/4 |
| [deg] Pointing Dec | 10.005262 | 9.9953700738515 | Subarray start row | 385 | 385 |
| [deg] Pointing Roll | 308.003797 | 308.14578084673 | Subarray row count | 256 | 256 |
| [mm] SIM focus pos | -0.684267 | -0.6828225247311905 | Alternating exposures requested | N | N |
| [mm] SIM defocus | 0 | 0.001444936568705701 | [s] Primary exposure time | 0.000000 | 0.8 |
| [mm] SIM translation stage pos | -190.132523 | -190.1425803651734 | | | |
| [mm] SIM translation stage offset | 0 | 0.01005778216563158 | | | |
| [s] Observation start time (MET) | 665631448.184000 | 665630070.96284 | | | |
| Observation start date | 2019-02-04T01:36:19 | 2019-02-04T01:14:30 | | | |
| [s] Observation end time (MET) | 665641448.184000 | 665642582.11359 | | | |
| Observation end date | 2019-02-04T04:22:59 | 2019-02-04T04:43:02 | | | |
| Read mode | TIMED | TIMED | | | |

2.3 Aspect



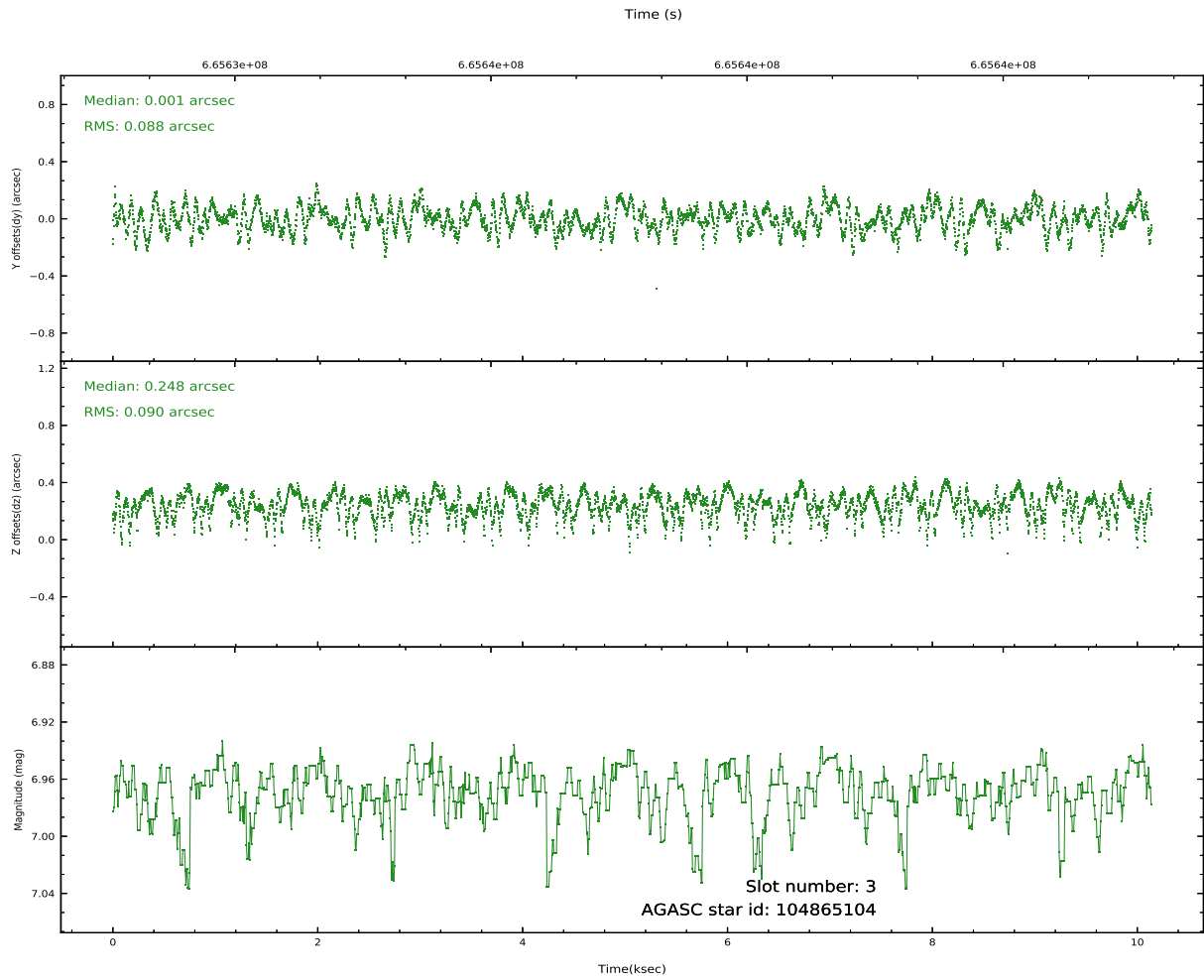
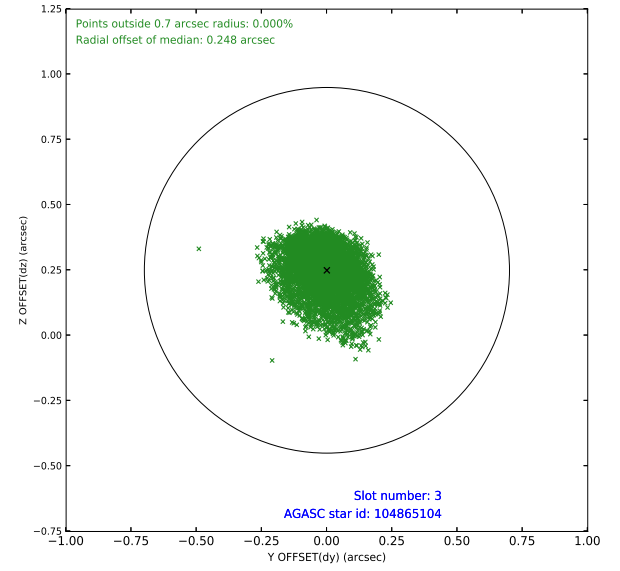
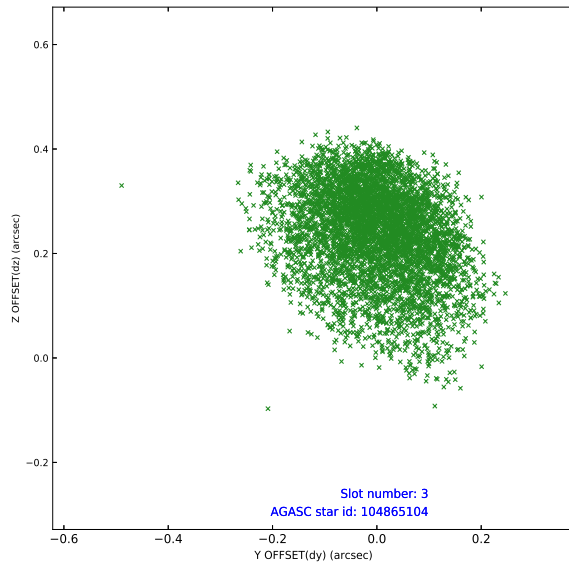


Slot Statistics

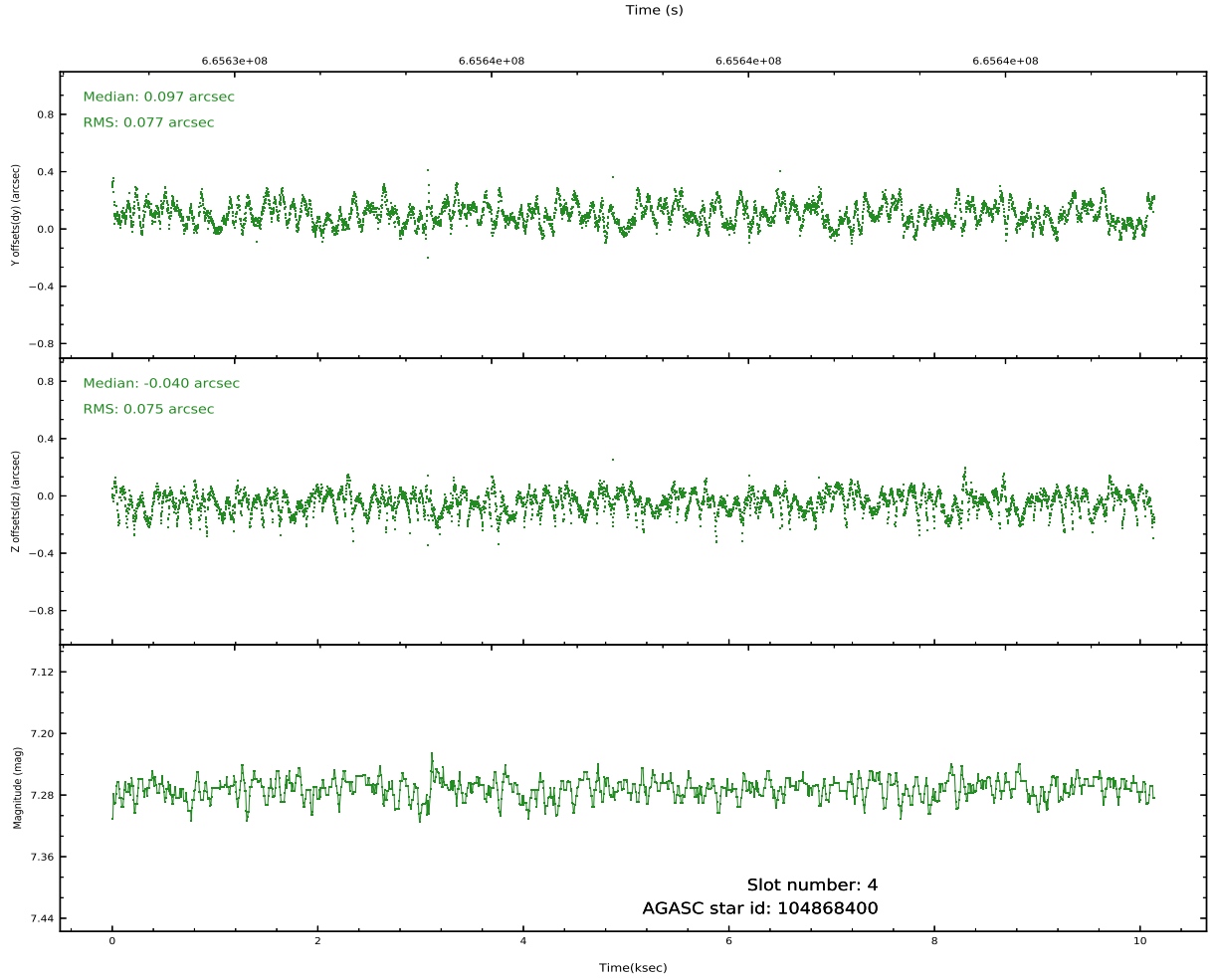
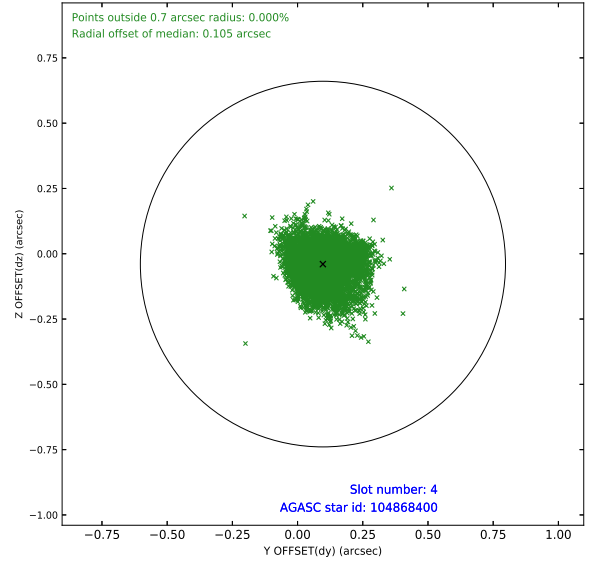
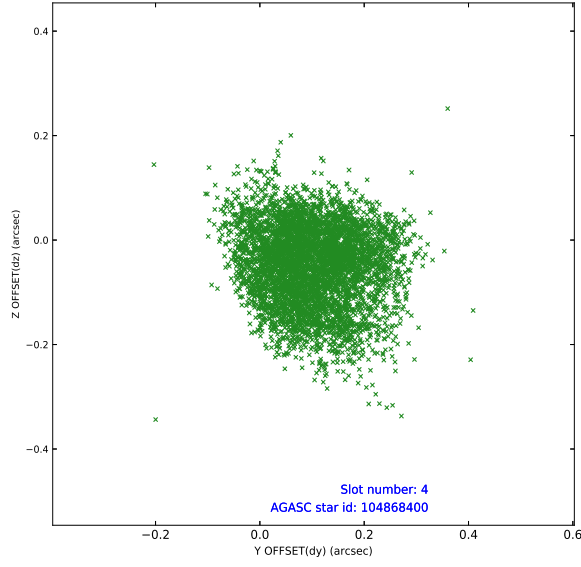
| pt | status | used | id | mag | n_pts | frac_pts | med_dy | med_dz | dr1 | dr2 | ra | dec | mean_y | mea |
|----|--------|------|-----------|------|-------|----------|--------|--------|-------|-------|------------|-----------|----------|-------|
| 0 | FID | | ACIS-S-2 | 6.98 | 2473 | 1.000 | 0.195 | -0.110 | 0.023 | 0.035 | 0.000000 | 0.000000 | -769.22 | -1742 |
| 1 | FID | | ACIS-S-4 | 7.10 | 2458 | 1.000 | 0.070 | -0.066 | 0.017 | 0.030 | 0.000000 | 0.000000 | 2144.06 | 164 |
| 2 | FID | | ACIS-S-5 | 7.07 | 2473 | 1.000 | -0.298 | 0.183 | 0.020 | 0.033 | 0.000000 | 0.000000 | -1821.53 | 159 |
| 3 | GUIDE | used | 104865104 | 6.97 | 4947 | 1.000 | 0.001 | 0.248 | 0.133 | 0.217 | 128.166128 | 10.066005 | -511.62 | -300 |
| 4 | GUIDE | used | 104868400 | 7.27 | 4942 | 1.000 | 0.097 | -0.040 | 0.117 | 0.182 | 127.977058 | 9.814098 | -210.64 | -1387 |
| 5 | GUIDE | used | 104992464 | 8.94 | 4935 | 1.000 | 0.078 | -0.056 | 0.105 | 0.172 | 128.600350 | 10.294895 | -214.01 | 1418 |
| 6 | GUIDE | used | 104999200 | 8.49 | 4912 | 1.000 | -0.022 | -0.172 | 0.120 | 0.190 | 128.802326 | 10.021454 | 1002.48 | 1377 |
| 7 | GUIDE | used | 104999656 | 7.80 | 4880 | 1.000 | -0.156 | 0.045 | 0.109 | 0.180 | 128.491893 | 10.586173 | -1277.24 | 1760 |

2.4 Star Slots

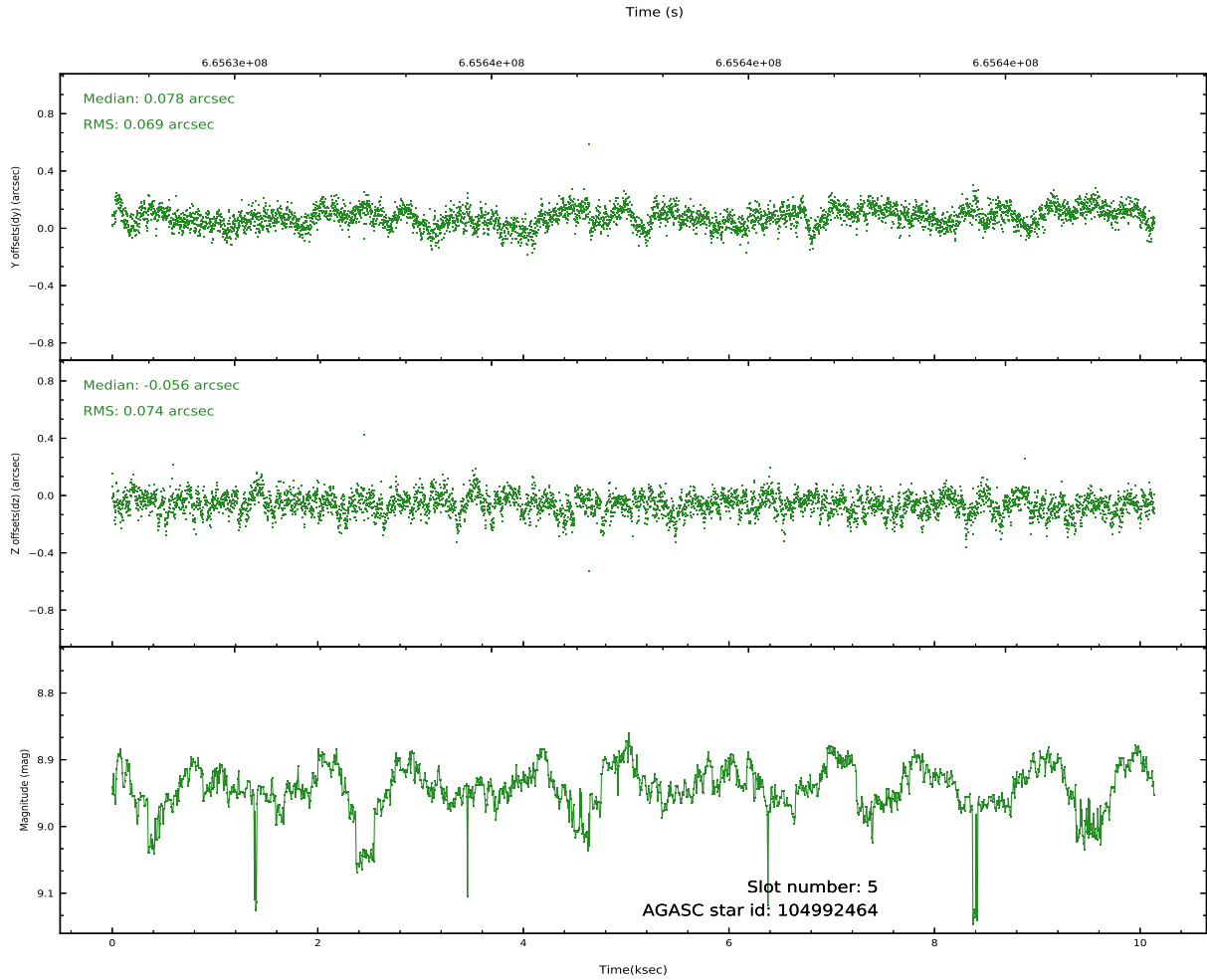
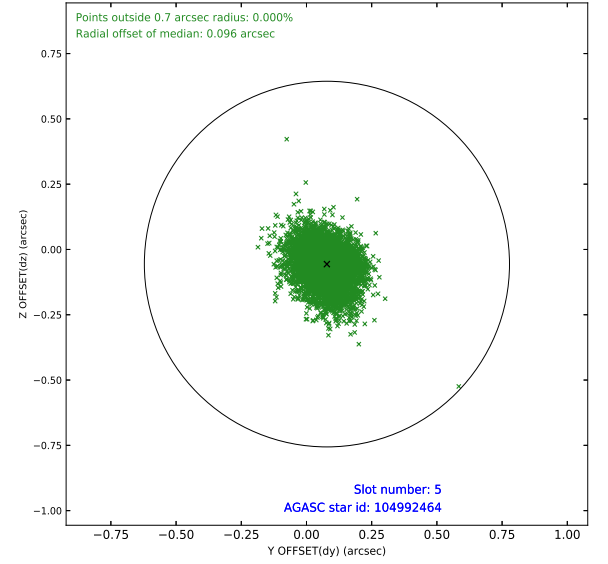
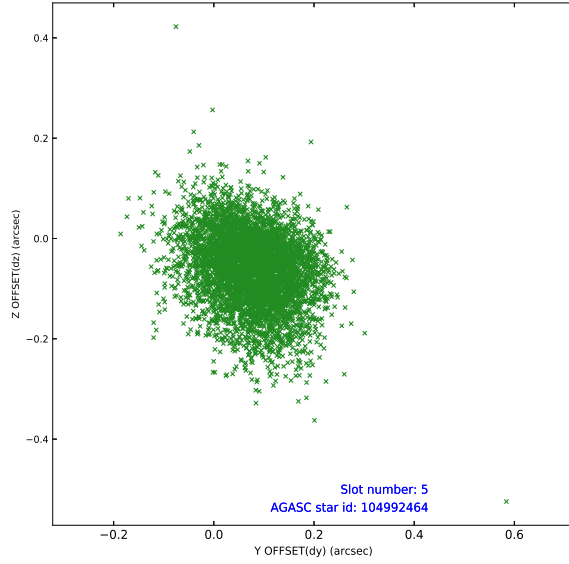
2.4.1 Slot 3



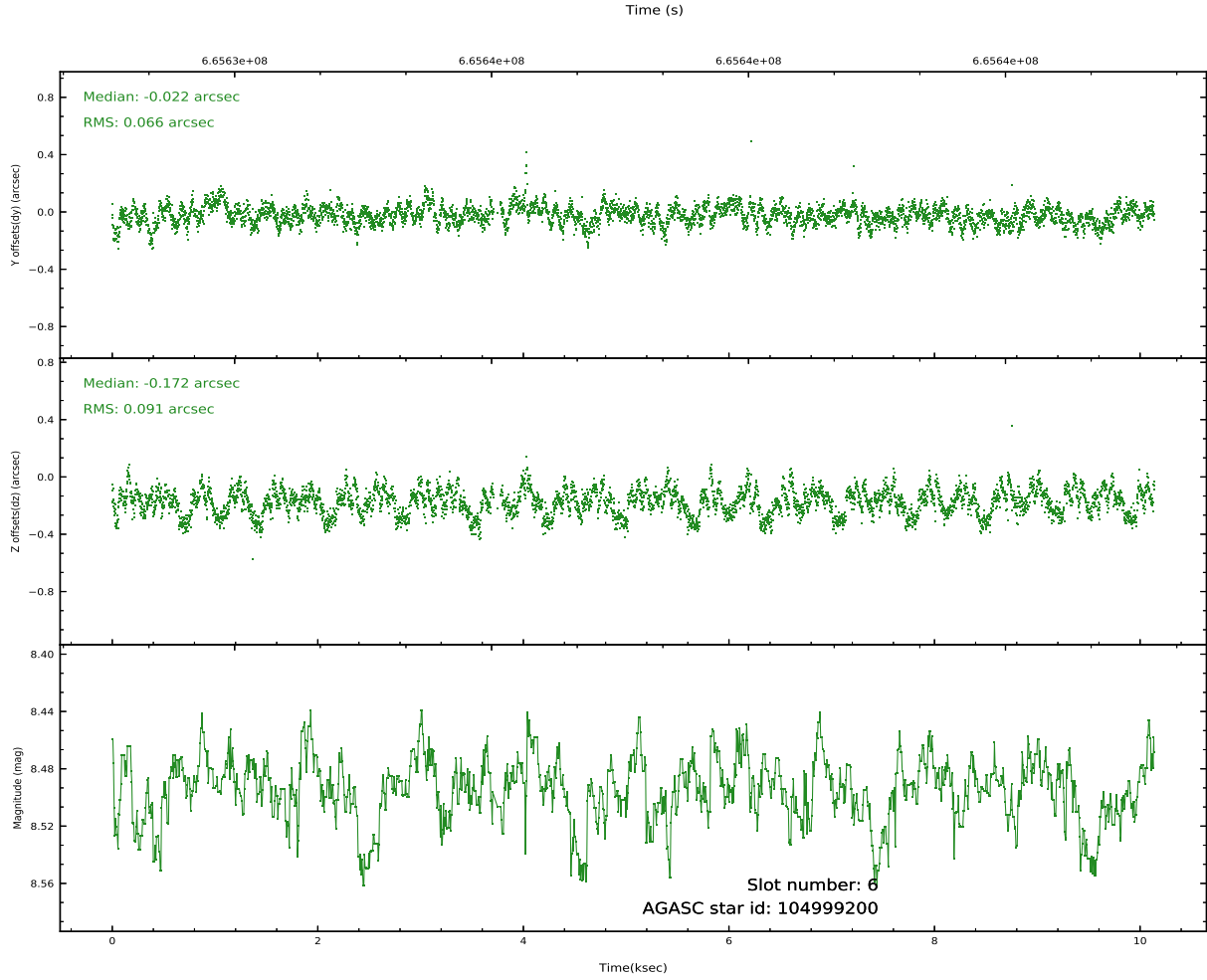
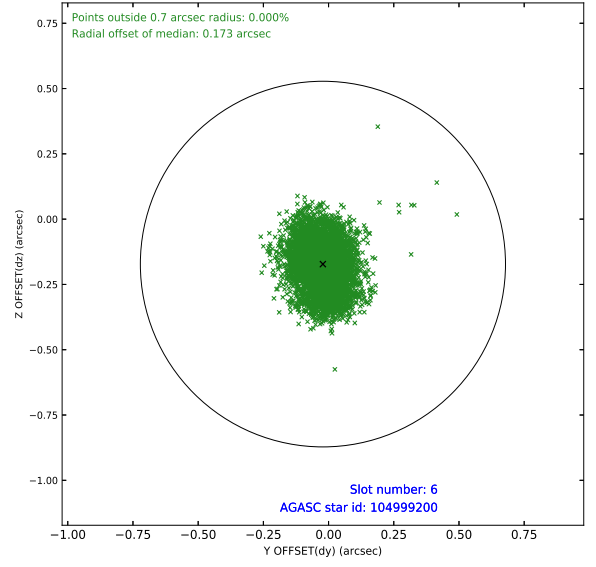
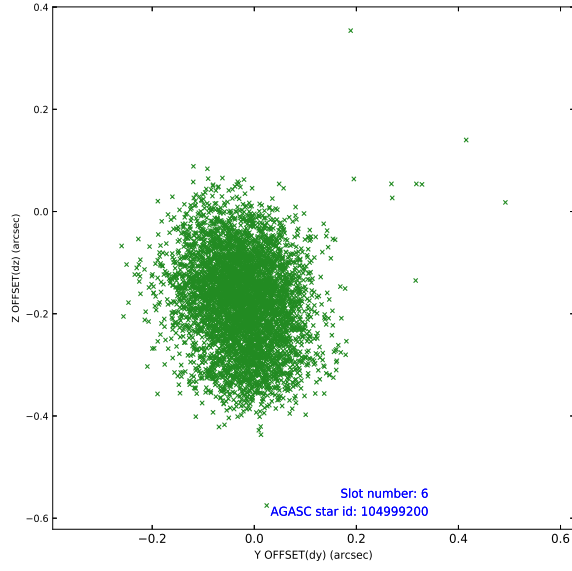
2.4.2 Slot 4



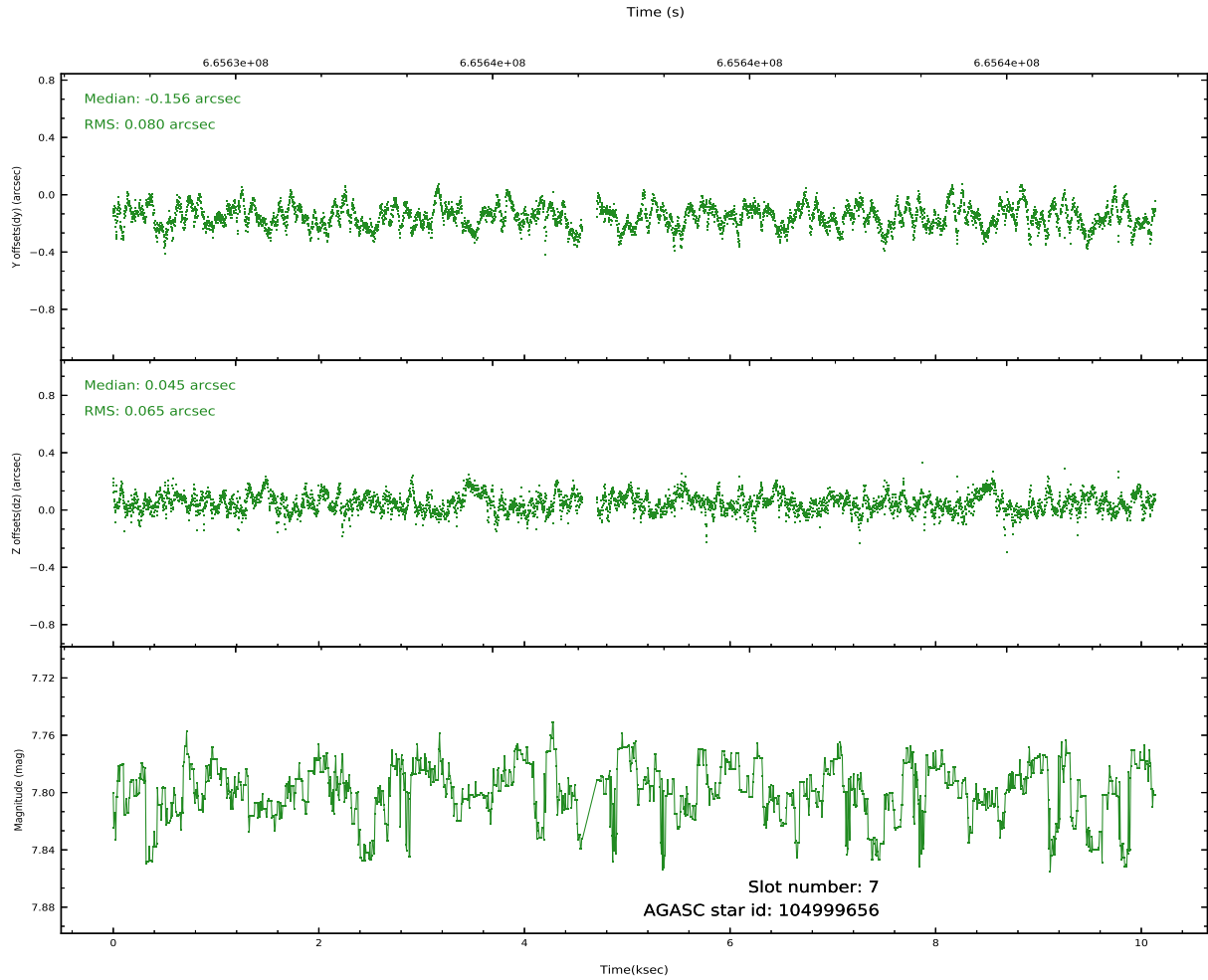
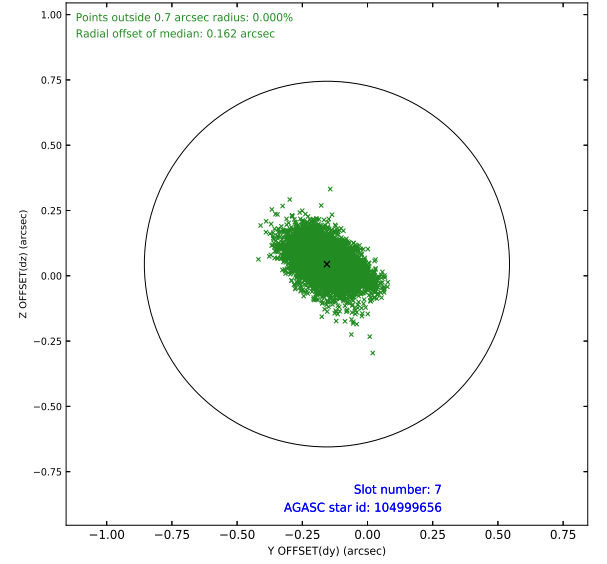
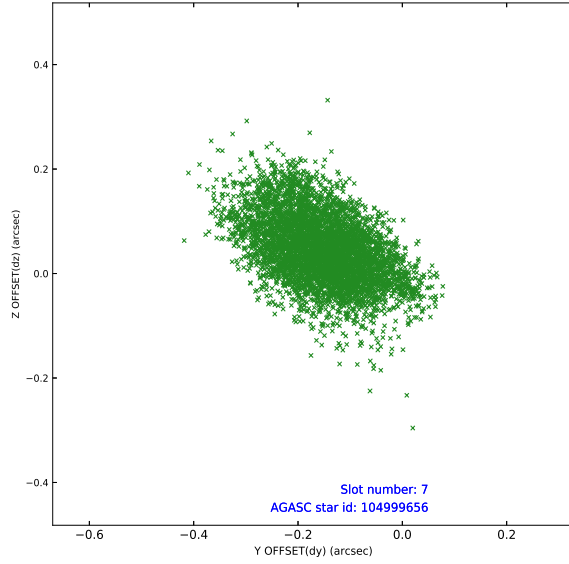
2.4.3 Slot 5



2.4.4 Slot 6

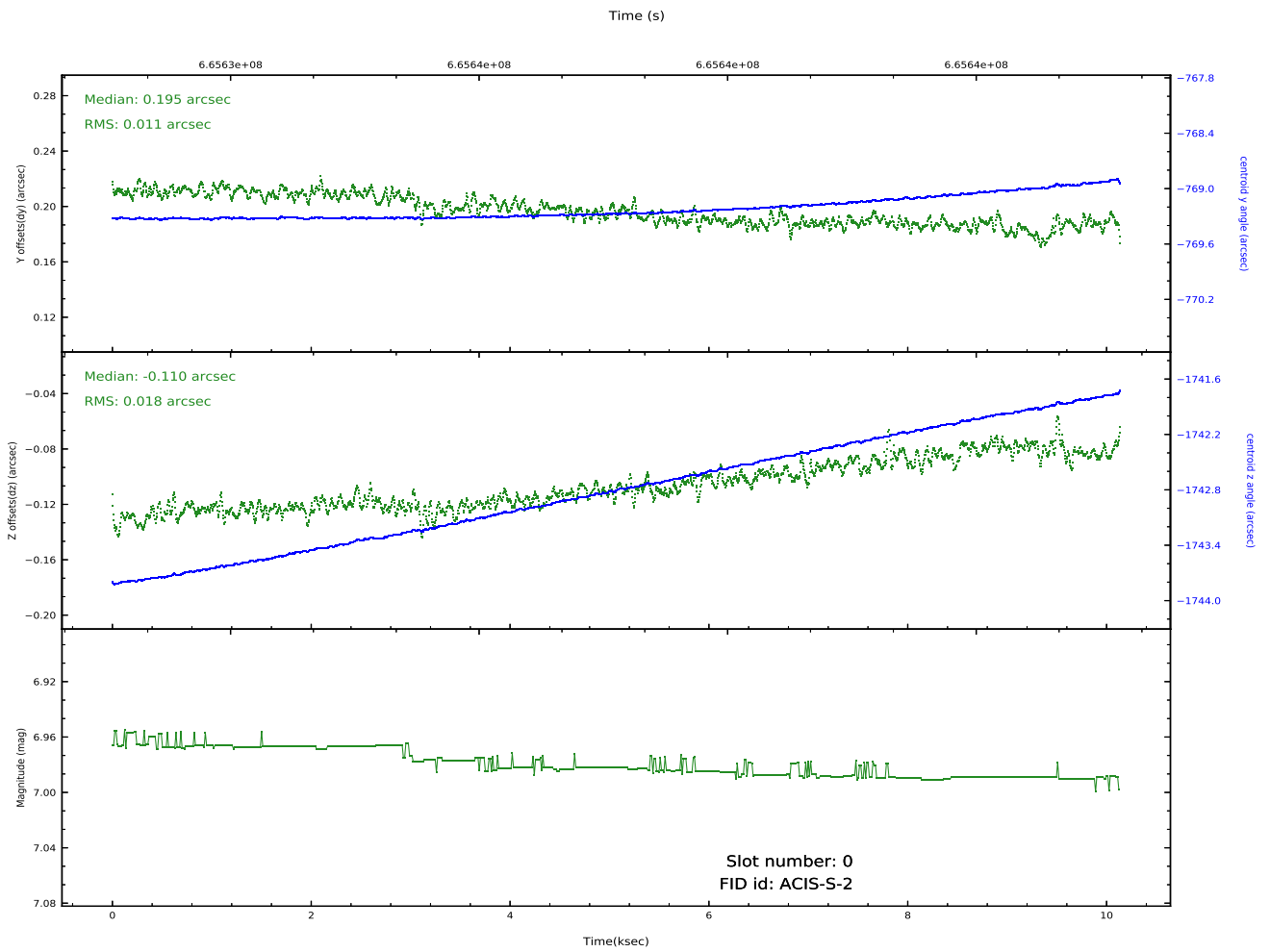
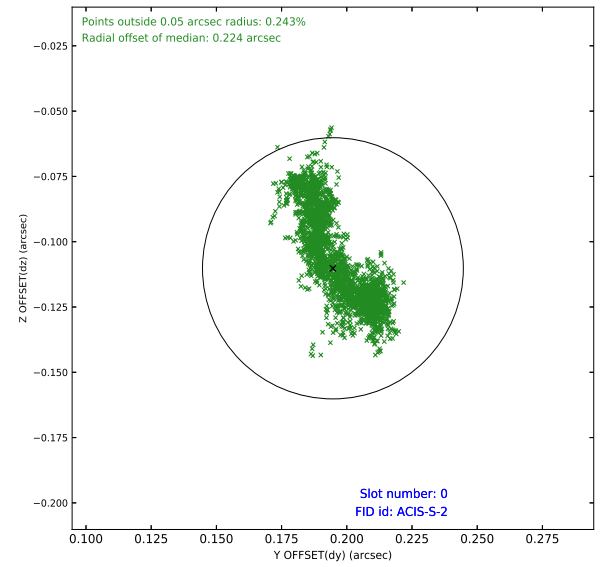
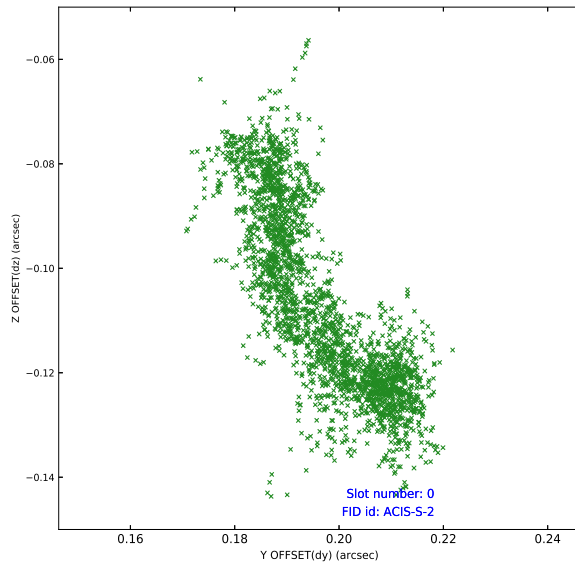


2.4.5 Slot 7

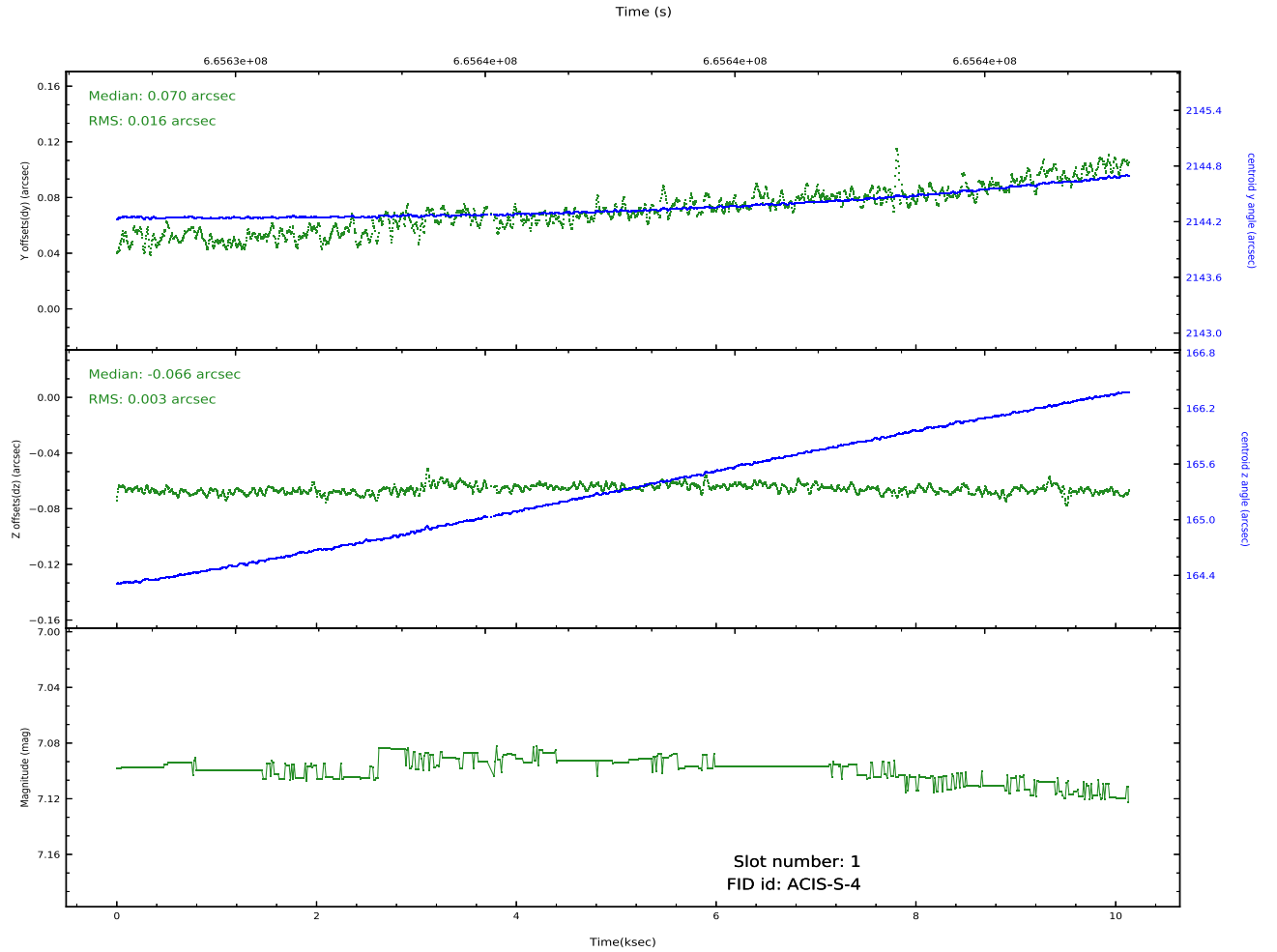
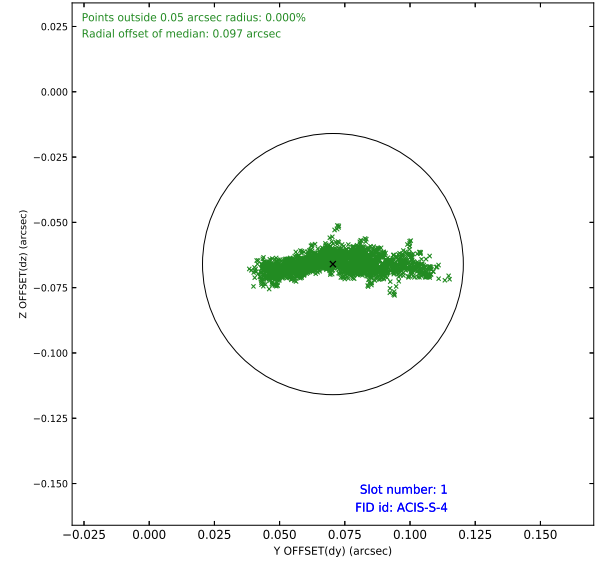
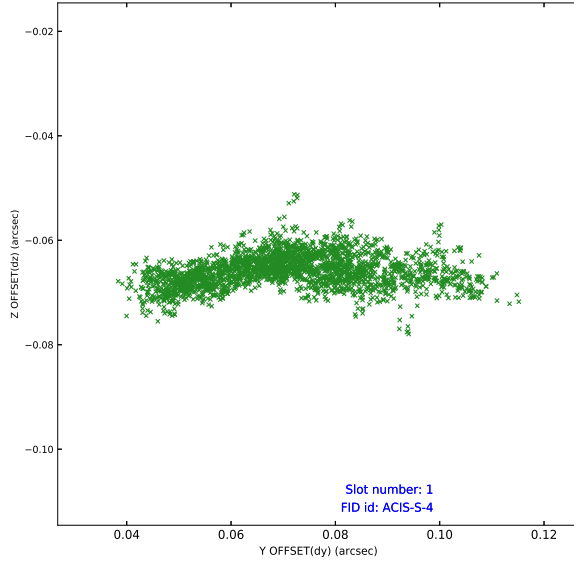


2.5 FID Slots

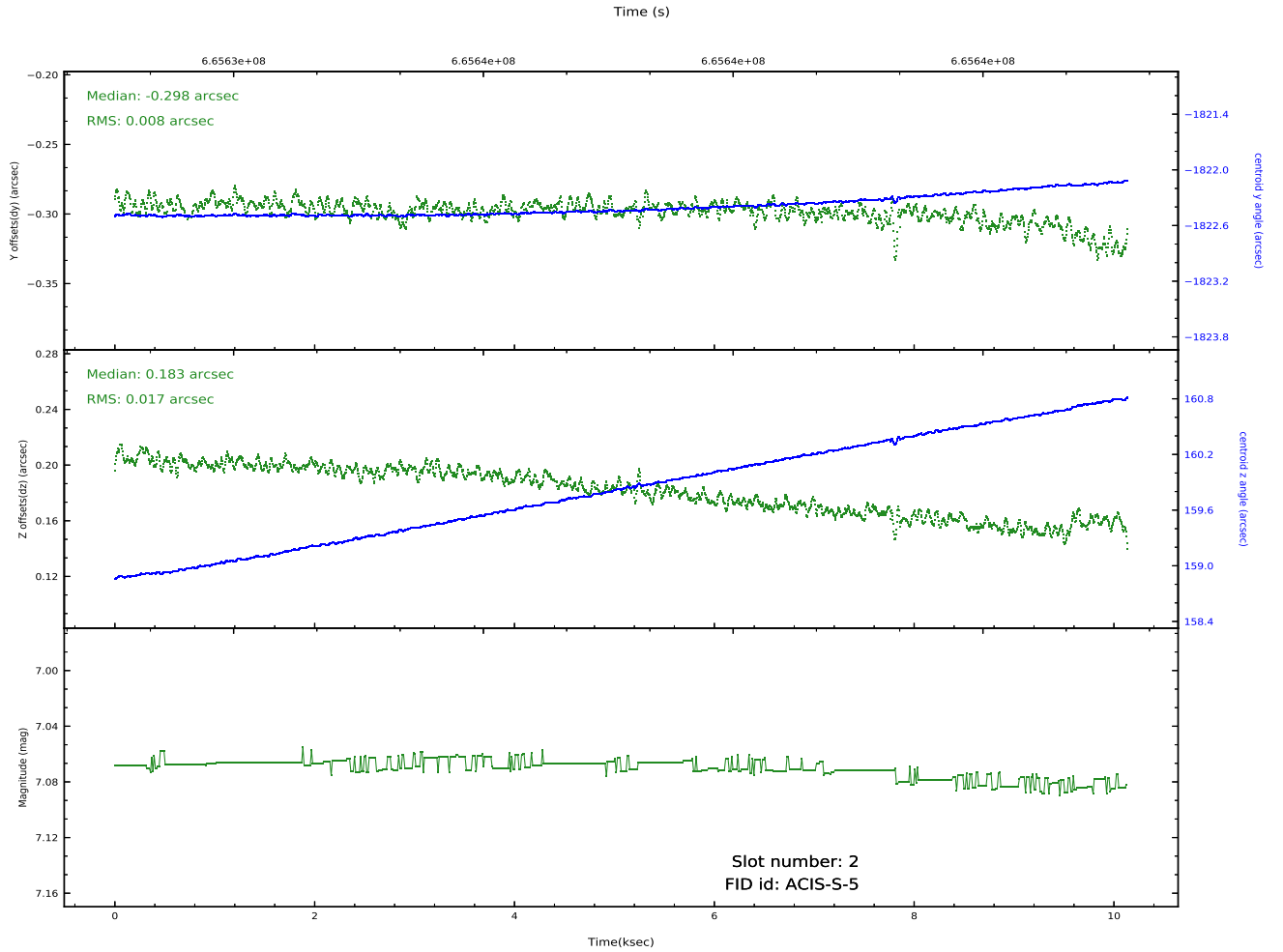
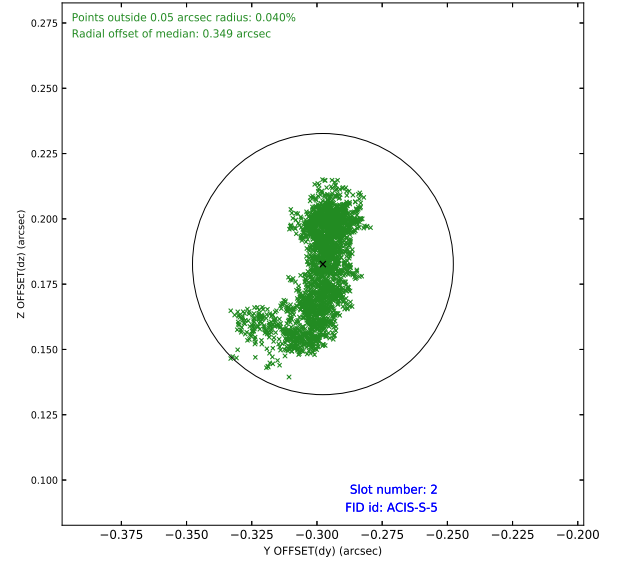
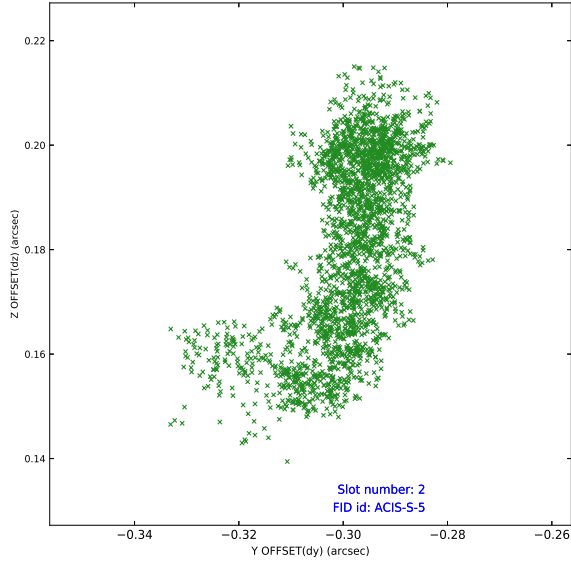
2.5.1 Slot 0



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) | 2020.10.29 |
| V&V Edition | 1 |
| V&V Disposition and Status | OK |
| V&V Charge Time | 10.06079940033 |

A.2 Comments

Roll preference met.