

V&V Reference Report

L2 ASCDS Version : 10.1.1

Observation 53197 - L2 Version 1
Chandra X-Ray Center

L2 Processing Date : Dec 1 2013

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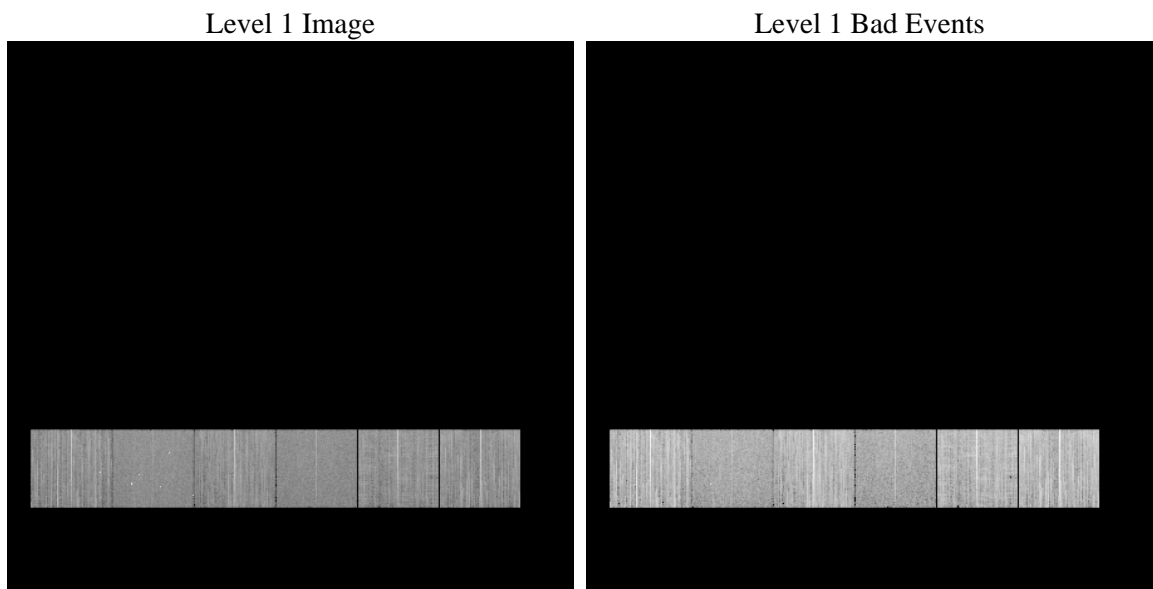
1 Front

| | | |
|----------|---|---|
| seq_num | | Sequence number |
| obs_id | 53197 | Observation id |
| title | ACIS-456789 diagnostics | Proposal title |
| observer | CHANDRA engineering request/realtime commanding | Principal investig |
| object | | Source name |
| dtcycle | 0 | |
| cycle | P | events from which exps? Prim/Second/Both |
| ra_targ | 0.0 | Observer's specified target RA [deg] |
| dec_targ | 0.0 | Observer's specified target Dec [deg] |
| ra_nom | 192.04130240079 | Nominal RA [deg] |
| dec_nom | -45.277955941606 | Nominal Dec [deg] |
| roll_nom | 99.543513322546 | Nominal Roll [deg] |
| revision | 1 | Processing version of data |
| ontime | 8245.7263794541 | Sum of GTIs [s] |
| livetime | 8141.3140270571 | Livetime [s] |
| ontime4 | 8245.6032594442 | Sum of GTIs [s] |
| ontime5 | 8245.6853394508 | Sum of GTIs [s] |
| ontime6 | 8245.6442994475 | Sum of GTIs [s] |
| ontime7 | 8245.7263794541 | Sum of GTIs [s] |
| ontime8 | 8245.5622194409 | Sum of GTIs [s] |
| ontime9 | 8245.7674194574 | Sum of GTIs [s] |
| l2events | 220479 | Number of level 2 events |

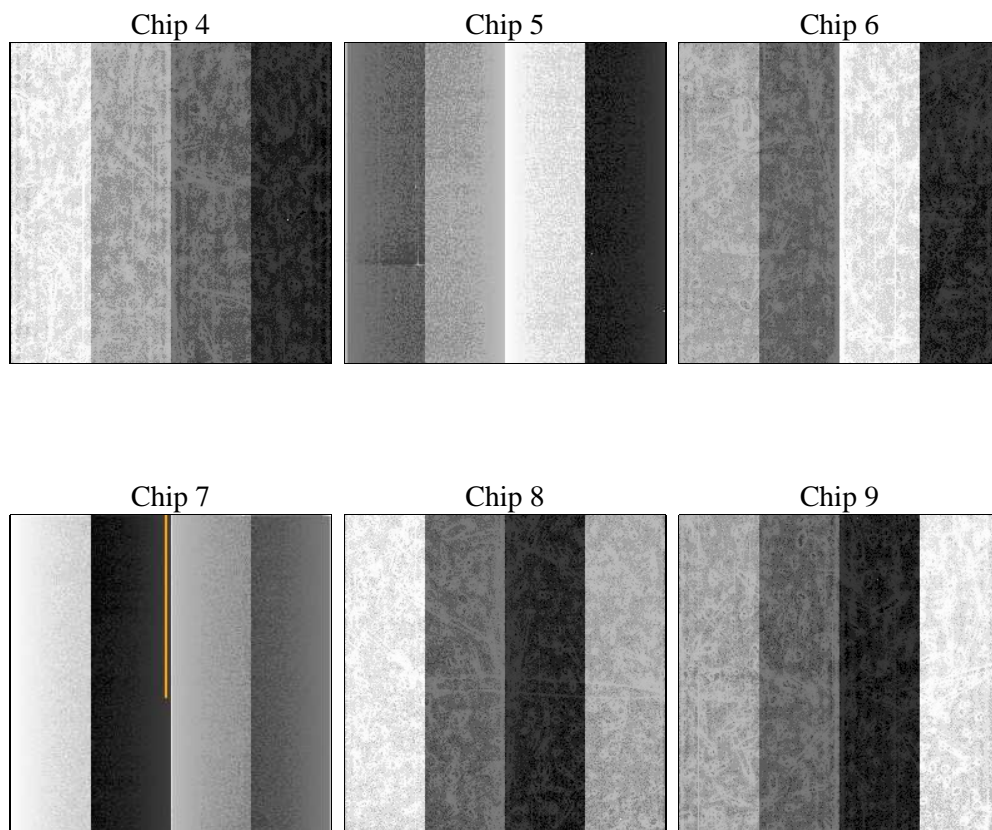
2 OBI

2.1 OBI

2.1.1 Images



2.1.2 Bias



2.1.3 Parameters

| | | | | | |
|----------|---------------------|--------------------------------|----------------|-----------------|---|
| obi_num | 0 | Obi number | sched_exp_time | 0.0 | [s] Scheduled observation exposure time |
| ascdsver | 10.1.1 | Processing system revision | ontime | 8245.7263794541 | Sum of GTIs [s] |
| caldsver | 4.5.9 | | ontime4 | 8245.6032594442 | Sum of GTIs [s] |
| date | 2013-12-01T05:20:33 | Date and time of file creation | ontime5 | 8245.6853394508 | Sum of GTIs [s] |
| revision | 1 | Processing version of data | ontime6 | 8245.6442994475 | Sum of GTIs [s] |
| | | | ontime7 | 8245.7263794541 | Sum of GTIs [s] |
| | | | ontime8 | 8245.5622194409 | Sum of GTIs [s] |
| | | | ontime9 | 8245.7674194574 | Sum of GTIs [s] |
| | | | l1events | 888942 | Number of level 1 events |

2.1.4 Events

| | ccd 4 | ccd 5 | ccd 6 | ccd 7 | ccd 8 | ccd 9 | | ccd 4 | ccd 5 | ccd 6 | ccd 7 | ccd 8 | ccd 9 |
|-----------------|--------|--------|--------|--------|--------|--------|----------------|--------|-------|--------|-------|--------|--------|
| level 1 events | 155251 | 132708 | 152910 | 121896 | 158325 | 167852 | grade 0 events | 16942 | 8444 | 15089 | 7975 | 17445 | 14898 |
| rejected events | 124605 | 71402 | 122226 | 66607 | 119041 | 138306 | | 10% | 6% | 9% | 6% | 11% | 8% |
| rejected % | 80% | 53% | 79% | 54% | 75% | 82% | grade 1 events | 124 | 187 | 72 | 100 | 102 | 79 |
| | | | | | | | | 0% | 0% | 0% | 0% | 0% | 0% |
| | | | | | | | grade 2 events | 5636 | 22004 | 6186 | 13652 | 8156 | 5718 |
| | | | | | | | | 3% | 16% | 4% | 11% | 5% | 3% |
| | | | | | | | grade 3 events | 2116 | 2169 | 2053 | 4545 | 3216 | 2084 |
| | | | | | | | | 1% | 1% | 1% | 3% | 2% | 1% |
| | | | | | | | grade 4 events | 2130 | 2112 | 2009 | 4472 | 3140 | 2007 |
| | | | | | | | | 1% | 1% | 1% | 3% | 1% | 1% |
| | | | | | | | grade 5 events | 3129 | 6212 | 3125 | 7596 | 4206 | 3366 |
| | | | | | | | | 2% | 4% | 2% | 6% | 2% | 2% |
| | | | | | | | grade 6 events | 3953 | 26888 | 5504 | 24889 | 7530 | 4997 |
| | | | | | | | | 2% | 20% | 3% | 20% | 4% | 2% |
| | | | | | | | grade 7 events | 121221 | 64692 | 118872 | 58667 | 114530 | 134703 |
| | | | | | | | | 78% | 48% | 77% | 48% | 72% | 80% |

2.2 Compared Parameters

| Parameter | Planned | Actual |
|-----------------------------------|----------------------|----------------------|
| Instrument | ACIS | ACIS |
| Detector | ACIS-456789 | ACIS-456789 |
| Grating | NONE | NONE |
| Data mode | FAINT | FAINT |
| Observation mode | SECONDARY | SECONDARY |
| [deg] Pointing RA | 0 | 192.0413024007932 |
| [deg] Pointing Dec | 0 | -45.27795594160565 |
| [deg] Pointing Roll | 0.0 | 99.54351332254605 |
| SIM focus pos (mm) | -1.4281808131 | -1.4281808131 |
| [mm] SIM defocus | 0.1051557500557434 | 0.1051557500557434 |
| SIM translation stage pos (mm) | 250.4660330802 | 250.4660330802 |
| [mm] SIM translation stage offset | -0.01005726120527584 | -0.01005726120527584 |
| [s] Observation start time (MET) | 502183140.543707 | 502183140.543707 |
| Observation start date | 2013-11-30T07:19:01 | 2013-11-30T07:19:00 |
| [s] Observation end time (MET) | 502191938.801469 | 502191938.801469 |
| Observation end date | 2013-11-30T09:45:39 | 2013-11-30T09:45:38 |
| Read mode | TIMED | TIMED |

| Parameter | Planned | Actual |
|---------------------------------------|-----------|----------|
| Obspar format version number | 7 | 7 |
| Obspar file type | PREDICTED | ACTUAL |
| Obspar update status | OVERRIDE | OVERRIDE |
| Number of optional ACIS chips dropped | 0 | 0 |
| On-chip summing requested | N | N |
| Subarray requested | NONE | NONE |
| Alternating exposures requested | N | N |
| [s] Primary exposure time | 3.2 | 3.2 |

2.3 Star Slots

2.4 FID Slots

A Summary

A.1 Status

| | |
|----------------------------|-----------------|
| V&V Scientist | Joy Nichols |
| V&V Date (YYYY-MM-DD) | 2013.12.02 |
| V&V Edition | 1 |
| V&V Disposition and Status | OK |
| V&V Charge Time | 8.2457263794541 |

A.2 Comments