

V&V Reference Report

L2 ASCDS Version : 8.5.1.1

Observation 53696 - L2 Version 1
Chandra X-Ray Center

L2 Processing Date : May 13 2013

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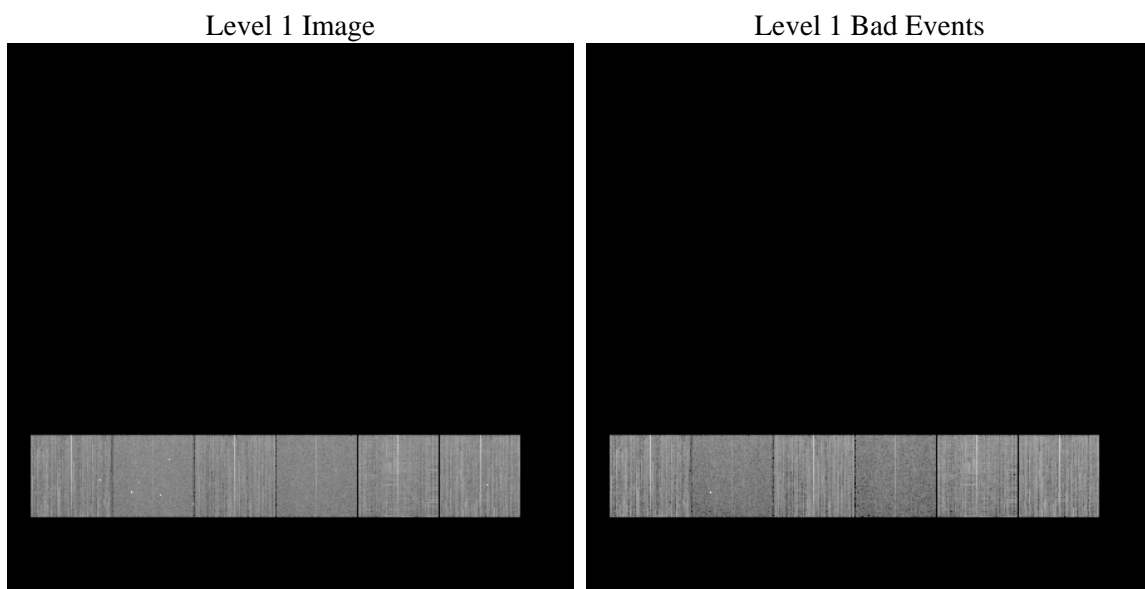
1 Front

| | | |
|----------|---|---|
| seq_num | | Sequence number |
| obs_id | 53696 | Observation id |
| title | ACIS-456789 diagnostics | Proposal title |
| observer | CHANDRA engineering request/realtime commanding | Principal investig |
| object | | Source name |
| dtycle | 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 | 205.92725185471 | Nominal RA [deg] |
| dec_nom | -13.065530739368 | Nominal Dec [deg] |
| roll_nom | 253.91351179841 | Nominal Roll [deg] |
| revision | 1 | Processing version of data |
| ontime | 8286.5462355018 | Sum of GTIs [s] |
| livetime | 8181.6169975087 | Livetime [s] |
| ontime4 | 8286.4231154919 | Sum of GTIs [s] |
| ontime5 | 8286.5051954985 | Sum of GTIs [s] |
| ontime6 | 8286.4641554952 | Sum of GTIs [s] |
| ontime7 | 8286.5462355018 | Sum of GTIs [s] |
| ontime8 | 8286.3820754886 | Sum of GTIs [s] |
| ontime9 | 8286.5872755051 | Sum of GTIs [s] |
| l2events | 245206 | Number of level 2 events |

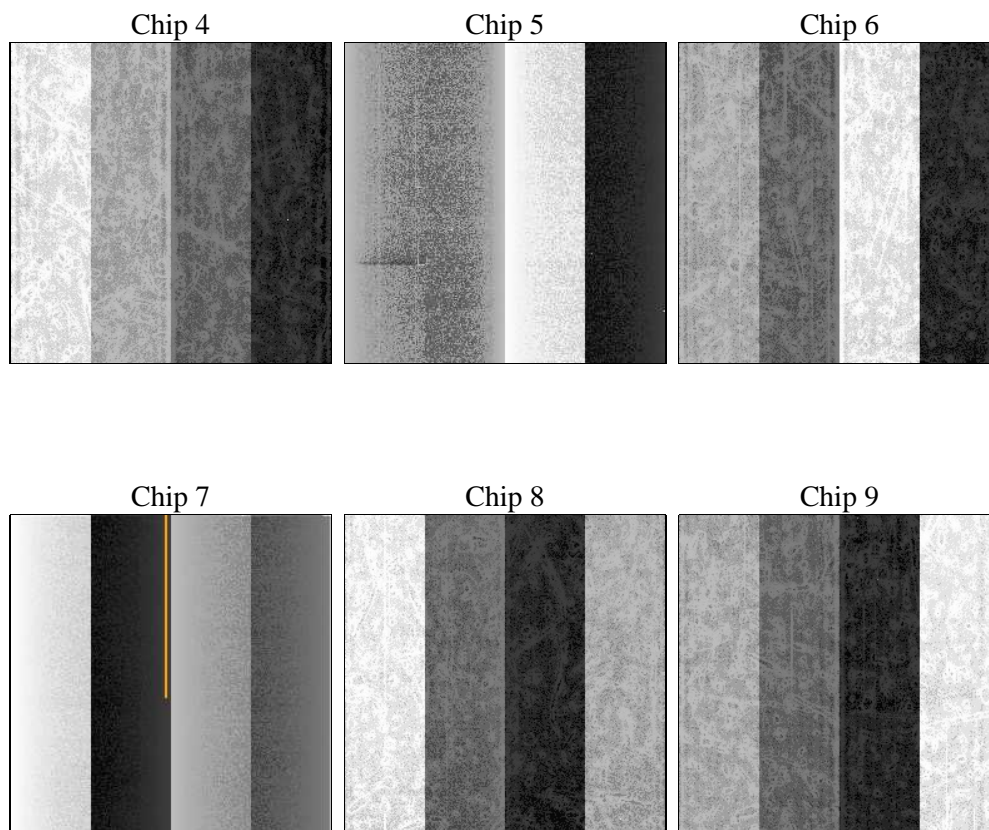
2 OBI

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 | 8.5.1.1 | Processing system revision | ontime | 8286.5462355018 | Sum of GTIs [s] |
| caldbver | 4.5.6 | | ontime4 | 8286.4231154919 | Sum of GTIs [s] |
| date | 2013-05-14T03:10:11 | Date and time of file creation | ontime5 | 8286.5051954985 | Sum of GTIs [s] |
| revision | 1 | Processing version of data | ontime6 | 8286.4641554952 | Sum of GTIs [s] |
| | | | ontime7 | 8286.5462355018 | Sum of GTIs [s] |
| | | | ontime8 | 8286.3820754886 | Sum of GTIs [s] |
| | | | ontime9 | 8286.5872755051 | Sum of GTIs [s] |
| | | | l1events | 931087 | 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 | 157271 | 143337 | 159779 | 128672 | 169538 | 172490 | grade 0 events | 19713 | 9721 | 17291 | 8781 | 19637 | 19540 |
| rejected events | 122052 | 76821 | 124971 | 68596 | 125903 | 136010 | | 12% | 6% | 10% | 6% | 11% | 11% |
| rejected % | 77% | 53% | 78% | 53% | 74% | 78% | grade 1 events | 168 | 258 | 89 | 102 | 98 | 118 |
| | | | | | | | | 0% | 0% | 0% | 0% | 0% | 0% |
| | | | | | | | grade 2 events | 6250 | 23807 | 6941 | 14724 | 8846 | 6610 |
| | | | | | | | | 3% | 16% | 4% | 11% | 5% | 3% |
| | | | | | | | grade 3 events | 2455 | 2351 | 2240 | 4968 | 3435 | 2346 |
| | | | | | | | | 1% | 1% | 1% | 3% | 2% | 1% |
| | | | | | | | grade 4 events | 2367 | 2292 | 2247 | 4919 | 3303 | 2325 |
| | | | | | | | | 1% | 1% | 1% | 3% | 1% | 1% |
| | | | | | | | grade 5 events | 3109 | 6367 | 3185 | 7854 | 4175 | 3542 |
| | | | | | | | | 1% | 4% | 1% | 6% | 2% | 2% |
| | | | | | | | grade 6 events | 4434 | 28345 | 6089 | 26684 | 8414 | 5659 |
| | | | | | | | | 2% | 19% | 3% | 20% | 4% | 3% |
| | | | | | | | grade 7 events | 118775 | 70196 | 121697 | 60640 | 121630 | 132350 |
| | | | | | | | | 75% | 48% | 76% | 47% | 71% | 76% |

2.2 Compared Parameters

| Parameter | Planned | Actual | Parameter | Planned | Actual |
|-----------------------------------|---------------------|----------------------|---------------------------------------|-----------|---------|
| Instrument | ACIS | ACIS | Obspar format version number | 7 | 7 |
| Detector | ACIS-456789 | ACIS-456789 | Obspar file type | PREDICTED | ACTUAL |
| Grating | NONE | NONE | Obspar update status | NONE | UPDATED |
| Data mode | FAINT | FAINT | Number of optional ACIS chips dropped | 0 | 0 |
| Observation mode | SECONDARY | SECONDARY | On-chip summing requested | N | N |
| [deg] Pointing RA | 0 | 205.9272518547076 | Subarray requested | NONE | NONE |
| [deg] Pointing Dec | 0 | -13.06553073936795 | Alternating exposures requested | N | N |
| [deg] Pointing Roll | 0.0 | 253.9135117984063 | [s] Primary exposure time | 3.2 | 3.2 |
| [mm] SIM focus pos | -1.429586 | -1.428180813131781 | | | |
| [mm] SIM defocus | 0.1037507710433287 | 0.1051558262725154 | | | |
| [mm] SIM translation stage pos | 250.455976 | 250.466033080201 | | | |
| [mm] SIM translation stage offset | 0 | -0.01005468664627074 | | | |
| [s] Observation start time (MET) | 484844557.348305 | 484844556.3233 | | | |
| Observation start date | 2013-05-13T15:02:37 | 2013-05-13T15:02:36 | | | |
| [s] Observation end time (MET) | 484854737.648857 | 484854736.62386 | | | |
| Observation end date | 2013-05-13T17:52:18 | 2013-05-13T17:52:16 | | | |
| Read mode | TIMED | TIMED | | | |

2.3 Star Slots

2.4 FID Slots

A Summary

A.1 Status

| | |
|----------------------------|-----------------|
| V&V Scientist | Jen Lauer |
| V&V Date (YYYY-MM-DD) | 2013.05.14 |
| V&V Edition | 1 |
| V&V Disposition and Status | OK |
| V&V Charge Time | 8.2865462355018 |

A.2 Comments