

# V&V Reference Report

## L2 ASCDS Version : 8.3.2

Observation 62770 - L2 Version 4  
Chandra X-Ray Center

L2 Processing Date : Aug 15 2010

## Contents

<b>1</b>	<b>Front</b>	<b>2</b>
<b>2</b>	<b>OBI</b>	<b>3</b>
2.1	OBI . . . . .	3
2.1.1	Images . . . . .	3
2.1.2	Bias . . . . .	3
2.1.3	Parameters . . . . .	4
2.1.4	Events . . . . .	4
2.2	Compared Parameters . . . . .	5
2.3	Star Slots . . . . .	6
2.4	FID Slots . . . . .	6
<b>A</b>	<b>Summary</b>	<b>7</b>
A.1	Status . . . . .	7
A.2	Comments . . . . .	7

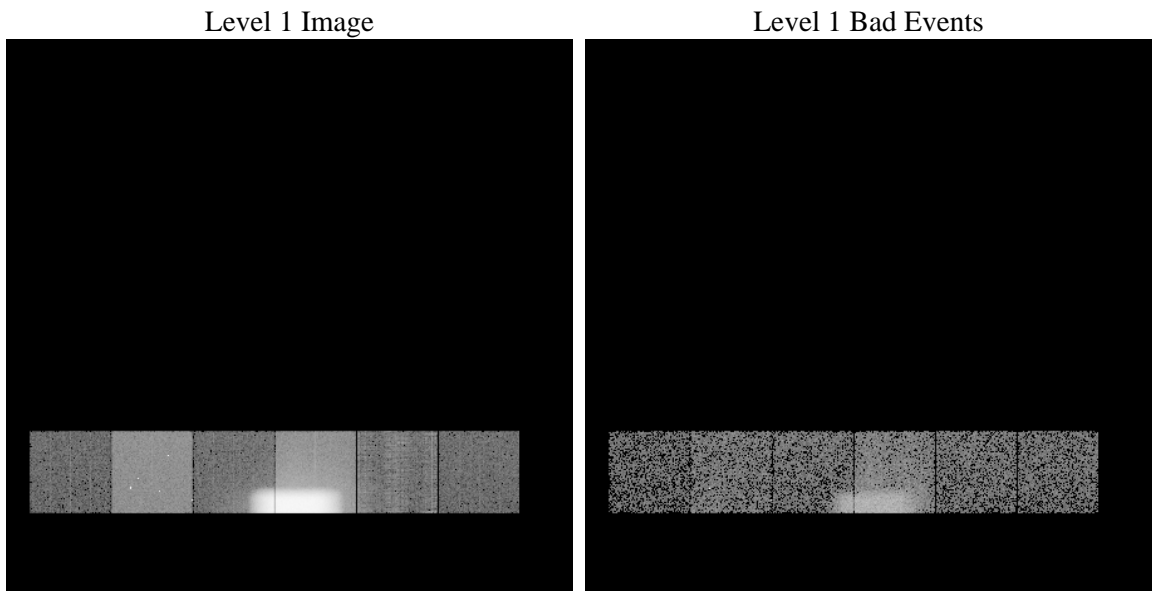
# 1 Front

seq_num	0	Sequence number
obs_id	62770	Observation id
title	ACIS-S internal cal,S2, S3	Proposal title
observer	CHANDRA orbital activation and checkout	Principal investigator
object	&#160	Source name
dtcycle	0	&#160
cycle	P	events from which exps? Prim/Second/Both
ra_targ	0.0	Observer's specified target RA
dec_targ	0.0	Observer's specified target Dec
ra_nom	195.39628828927	Nominal RA
dec_nom	28.964567376607	Nominal Dec
roll_nom	254.93328553034	Nominal Roll
revision	4	Processing version of data
ontime	7446.9463209137	Sum of GTIs [s]
livetime	7355.4710087324	Livetime [s]
ontime4	7446.8642409146	Sum of GTIs [s]
ontime5	7446.9052809104	Sum of GTIs [s]
ontime6	7446.7411209121	Sum of GTIs [s]
ontime7	7446.9463209137	Sum of GTIs [s]
ontime8	7446.8232009113	Sum of GTIs [s]
ontime9	7446.7821609154	Sum of GTIs [s]
l2events	655104	Number of level 2 events

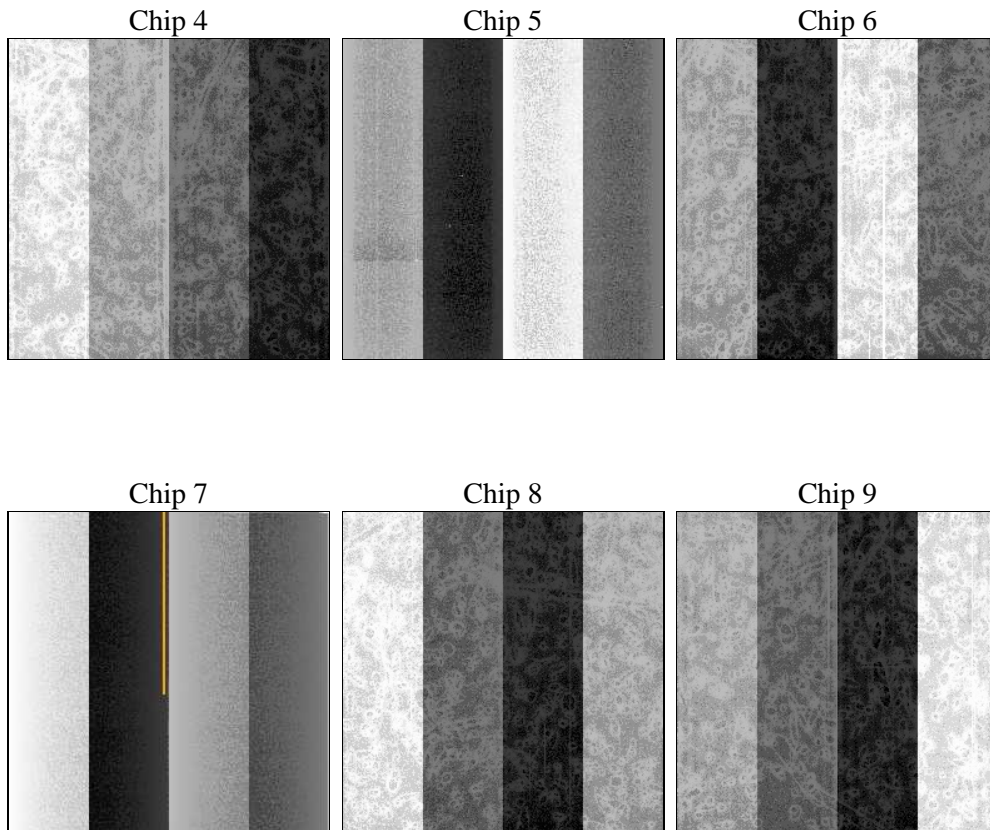
## 2 OBI

### 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	Scheduled observation exposure time
ascdsver	8.3.2	ASCDS version number	ontime	7446.9463209137	Sum of GTIs [s]
caldbver	4.3.0	&#160	ontime4	7446.8642409146	Sum of GTIs [s]
date	2010-08-15T12:34:34	Date and time of file creation	ontime5	7446.9052809104	Sum of GTIs [s]
revision	4	Processing version of data	ontime6	7446.7411209121	Sum of GTIs [s]
			ontime7	7446.9463209137	Sum of GTIs [s]
			ontime8	7446.8232009113	Sum of GTIs [s]
			ontime9	7446.7821609154	Sum of GTIs [s]
			l1events	723287	Number of level 1 events

### 2.1.4 Events

	ccd 4	ccd 5	ccd 6	ccd 7	ccd 8	ccd 9
level 1 events	18360	70238	107140	476694	31171	19684
rejected events	5032	7729	7996	17371	6489	5893
rejected %	27%	11%	7%	3%	20%	29%

	ccd 4	ccd 5	ccd 6	ccd 7	ccd 8	ccd 9
grade 0 events	3405	4733	40875	94642	6248	3359
	18%	6%	38%	19%	20%	17%
grade 1 events	30	334	341	455	66	21
	0%	0%	0%	0%	0%	0%
grade 2 events	2999	14874	18827	106783	5416	2942
	16%	21%	17%	22%	17%	14%
grade 3 events	1233	1070	7333	37713	2536	1328
	6%	1%	6%	7%	8%	6%
grade 4 events	1215	997	7271	37213	2312	1173
	6%	1%	6%	7%	7%	5%
grade 5 events	4884	6848	6650	12348	6197	5736
	26%	9%	6%	2%	19%	29%
grade 6 events	4594	41382	25843	187540	8396	5125
	25%	58%	24%	39%	26%	26%
grade 7 events	0	0	0	0	0	0
	0%	0%	0%	0%	0%	0%

## 2.2 Compared Parameters

Parameter	Planned	Actual	Parameter	Planned	Actual
Instrument	ACIS	ACIS	Obspar format version number	6	6
Detector	ACIS-456789	ACIS-456789	Obspar file type	PREDICTED	ACTUAL
Grating	NONE	NONE	Obspar update status	NONE	UPDATED
Data mode	FAINT	FAINT	On-chip summing requested	N	N
Observation mode	SECONDARY	SECONDARY	Subarray requested	NONE	NONE
Pointing RA	0	195.396288289271	Alternating exposures requested	N	N
Pointing Dec	0	28.96456737660693	Primary exposure time	0.000000	3.3
Pointing Roll	0.0	254.9332855303412			
SIM focus pos (mm)	-0.684267	0.255451383487682			
SIM defocus (mm)	0	0.9397188447875782			
SIM translation stage pos (mm)	-190.132523	-190.1325231039672			
SIM translation stage offset (mm)	0	5.209593894051068e-07			
Observation start time	49787768.5	49787766.343879			
Observation start date	1999-07-31T05:56:08	1999-07-31T05:56:06			
Observation end time	49796934.176	49796931.894189			
Observation end date	1999-07-31T08:28:54	1999-07-31T08:28:51			
Read mode	TIMED	TIMED			

**2.3 Star Slots**

**2.4 FID Slots**

# A Summary

## A.1 Status

V&V Scientist	Beth Sundheim
V&V Date (YYYY-MM-DD)	2010.08.16
V&V Edition	1
V&V Disposition and Status	OK
V&V Charge Time	7.4469463209137

## A.2 Comments

This ACIS internal calibration observation was acquired before the ACIS door was open. A reflection of the door is visible in the image.

==

Focal plane temperature is warmer than -118.7 C degrees during this observation. The ACIS spectral response calibration for the front-illuminated chips is less accurate at these warmer temperatures than it is at -119.7 C. The back-illuminated chips are not affected at the focal plane temperatures recorded for this observation.