Hybrid 8j36 Traveler

November 15, 1999

1 Connectivity

Repairs on shorts:

Fixes for opens: CHMOD through hole via was open. This was repaired with a wire using one of the extra pins on the connector field and the hybrid tested out fine.

2 Chips

The following chips were assembled on this hybrid (in the order that the chips get read out):
Hybrid 8J36 has die: 048-019 048-021 048-022 048-023 045-037 045-038 045-039 045-040

3 Data Analysis Summary

The following summarizes the findings of the Burn-in data analysis program. The first chip in the readout name is numbered 0.

```
% Hybrid 8j9 classification info. Created 14:12:32 11/05/99

Hybrid 8j9 quality: bad
Chip classification: bad bad bad bad bad bad bad bad
Bad channels: N_bad_total = 1024 (too many to list all of them)
Bad cells: none
Random bad capacitors: none
Channels at pedestal needed for DCMS: 33.7 32.7 33.6 34.7 31.8 33.2 33.1 32.6
```

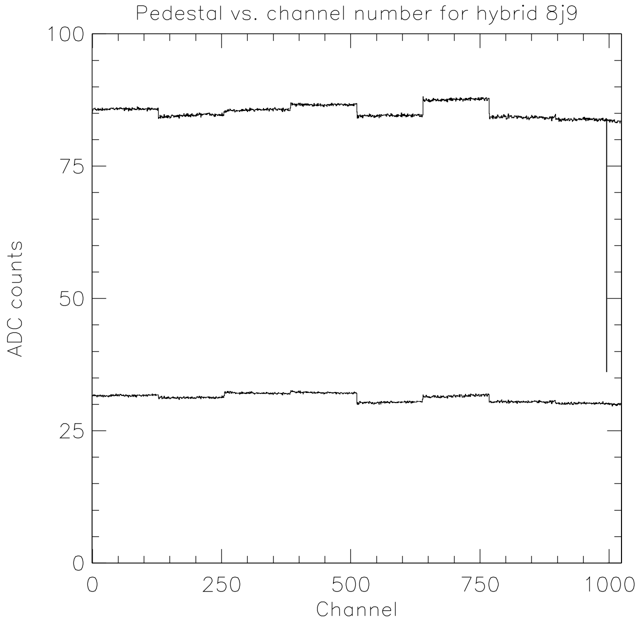
4 Comments

this one was burned in as 8j9 by accident so we had to copy over the files and rename them.

5 Pedestal

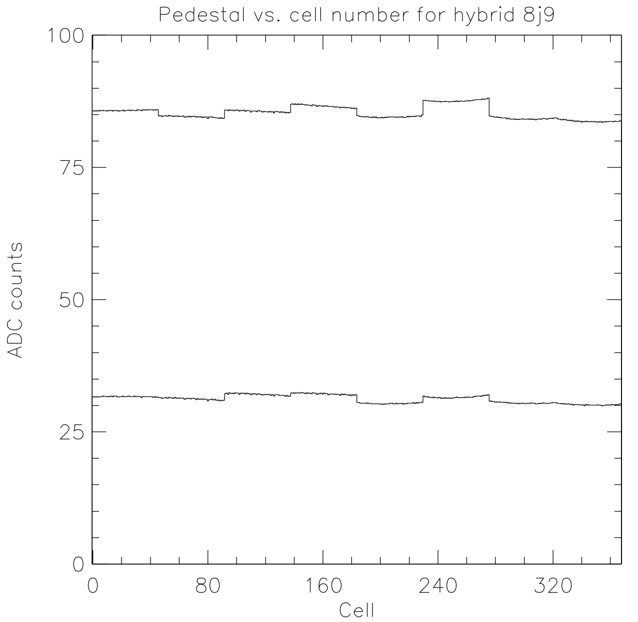
The following plot shows the pedestals vs. channel number with and without charge injection:

Pedestal for each Channel



The following plot shows the average pedestal vs. pipeline cell ID with and without charge injection. The x-axis is cell ID offset by 46 for each chip. Thus cell ID 5 for chip 1 is at x=5, chip 2 at x=51, chip 3 at x=97, etc.

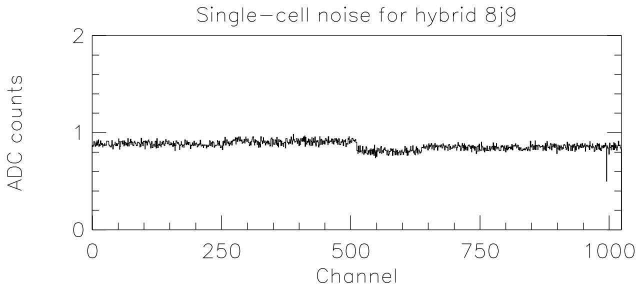
Pedestal vs. Pipeline Cell ID

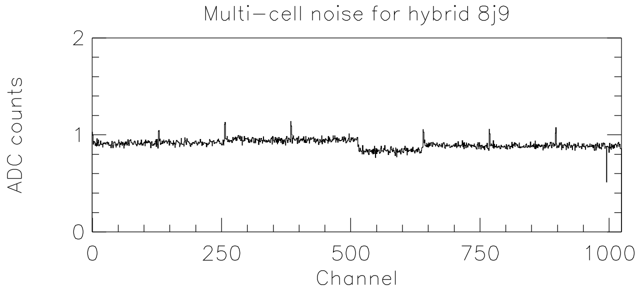


6 Noise

The following plots show the single-cell and multi-cell RMS noise:

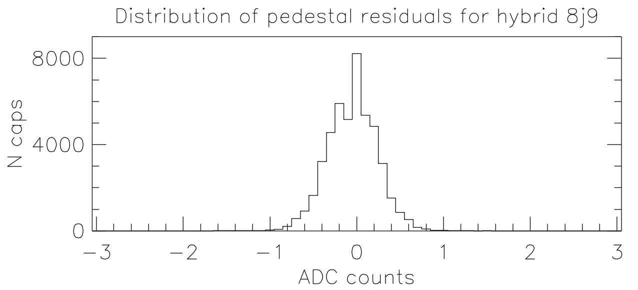
RMS Noise

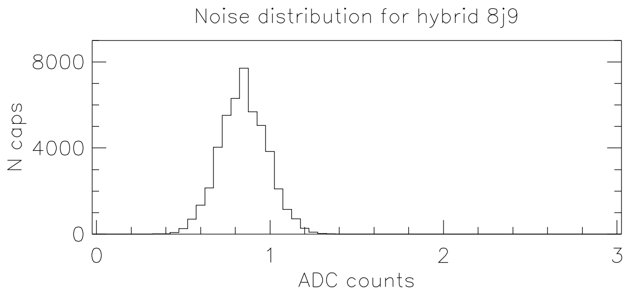




The following are histograms of the pedestal of each pipeline capacitor relative to the chip average (top); and the RMS noise of each capacitor (bottom):

Distribution of Pedestals and Noise





7 Currents

The following plots show the supply currents per chip as a function of measurment number. Currents are measured approximately every 10 minutes:

Supply Currents During Burn-in