Chip back potential is the level which bulk silicon is maintained by on-chip connection, or it is the level to which the chip back must be connected when specifically stated below. If no potential is given the chip back should be isolated.

**PAD FUNCTIONS:**

1. **A**
2. **B**
3. **QA**
4. **QB**
5. **QC**
6. **QD**
7. **GND**
8. **CLK**
9. **N. CLR**
10. **QE**
11. **QF**
12. **QG**
13. **QH**
14. **VCC**

**13 12 11 10 9**

**2 3 4 5 6 7**

**8**

**14**

 **1**

**.070”**

**.130”**

**DIE ID**

**HC164**

**Top Material: Al**

**Backside Material: Si**

**Bond Pad Size: .004” X .004”**

**Backside Potential: Vcc**

**Mask Ref:**

**APPROVED BY: DK DIE SIZE .070” X .130” DATE: 2/19/16**

**MFG: TEXAS INSTRUMENTS THICKNESS .025” P/N: 54HC164**

**DG 10.1.2**

#### Rev B, 7/19/02