

抗辐射，四路 2 输入正与非门

查询样片: [SN54AC00-DIE](#)

特性

- 2V 至 6V V_{CC} 运行
- 允许接受输入电压 6V
- 电压为 5V 时， t_{pd} 最大值为 7ns

说明/订购信息

此 SN54AC00-DIE 器件包含 4 个独立 2 输入与非门。每个门在正逻辑中执行布尔函数： $Y = \overline{A \cdot B}$ or $Y = \overline{A} + \overline{B}$

ORDERING INFORMATION⁽¹⁾

| PRODUCT | PACKAGE DESIGNATOR | PACKAGE | ORDERABLE PART NUMBER | PACKAGE QUANTITY |
|----------|--------------------|--|-----------------------|------------------|
| SN54AC00 | TD | Bare die in waffle pack ⁽²⁾ | SN54AC00VTD1 | 100 |
| | | | SN54AC00VTD2 | 10 |

- (1) For the most current package and ordering information, see the Package Option Addendum at the end of this document, or see the TI web site at www.ti.com.
- (2) Processing is per the Texas Instruments space production baseline and is in compliance with the Texas Instruments Quality Control System in effect at the time of manufacture. Electrical screening consists of DC parametric and functional testing at room temperature only. Unless otherwise specified by Texas Instruments AC performance and performance over temperature is not warranted. Visual Inspection is performed in accordance with MIL-STD-883 Test Method 2010 Condition B at 75X minimum.



Please be aware that an important notice concerning availability, standard warranty, and use in critical applications of Texas Instruments semiconductor products and disclaimers thereto appears at the end of this data sheet.



This integrated circuit can be damaged by ESD. Texas Instruments recommends that all integrated circuits be handled with appropriate precautions. Failure to observe proper handling and installation procedures can cause damage.

ESD damage can range from subtle performance degradation to complete device failure. Precision integrated circuits may be more susceptible to damage because very small parametric changes could cause the device not to meet its published specifications.

BARE DIE INFORMATION

| DIE THICKNESS | BACKSIDE FINISH | BACKSIDE POTENTIAL | BOND PAD METALLIZATION COMPOSITION | BOND PAD THICKNESS |
|---------------|------------------------|--------------------|------------------------------------|--------------------|
| 10.5 mils. | Silicon with backgrind | Floating | AlCuTiW | 830 nm |

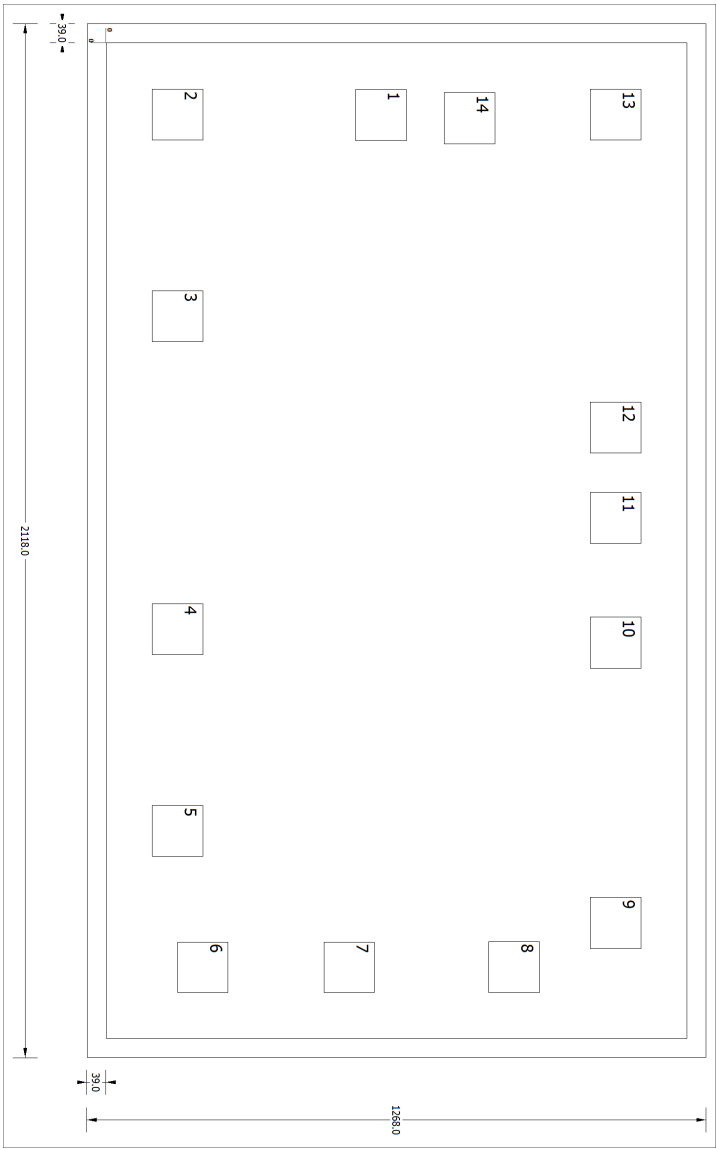


Table 1. Bond Pad Coordinates in Microns

| DESCRIPTION | PAD NUMBER | X MIN | Y MIN | X MAX | Y MAX |
|-------------|------------|--------|-------|--------|-------|
| 1A | 1 | 96.25 | 510.5 | 201.25 | 615.5 |
| 1B | 2 | 95 | 94 | 200 | 199 |
| 1Y | 3 | 508 | 94 | 613 | 199 |
| 2A | 4 | 1149 | 94 | 1254 | 199 |
| 2B | 5 | 1562 | 94 | 1667 | 199 |
| 2Y | 6 | 1841.5 | 145.5 | 1946.5 | 250.5 |
| GND | 7 | 1841.5 | 445.5 | 1946.5 | 550.5 |
| 3Y | 8 | 1841 | 783 | 1946 | 888 |
| 3A | 9 | 1750.5 | 991 | 1855.5 | 1096 |
| 3B | 10 | 1176.5 | 991 | 1281.5 | 1096 |
| 4Y | 11 | 921 | 991 | 1026 | 1096 |
| 4A | 12 | 736 | 991 | 841 | 1096 |
| 4B | 13 | 95 | 991 | 200 | 1096 |
| VCC | 14 | 102.5 | 692 | 207.5 | 797 |

修订历史记录

Changes from Original (April 2013) to Revision A
Page

- Changed bare die diagram [2](#)
- Changed Bond Pad Coordinates [3](#)

PACKAGING INFORMATION

| Orderable part number | Status (1) | Material type (2) | Package Pins | Package qty Carrier | RoHS (3) | Lead finish/ Ball material (4) | MSL rating/ Peak reflow (5) | Op temp (°C) | Part marking (6) |
|-----------------------|---------------|----------------------|-----------------|-----------------------|-------------|--------------------------------------|-----------------------------------|--------------|---------------------|
| SN54AC00VTD1 | Active | Production | null (null) 0 | 100 TUBE | Yes | Call TI | N/A for Pkg Type | 25 to 25 | |
| SN54AC00VTD1.A | Active | Production | null (null) 0 | 100 TUBE | Yes | Call TI | N/A for Pkg Type | 25 to 25 | |
| SN54AC00VTD2 | Active | Production | null (null) 0 | 10 TUBE | Yes | Call TI | N/A for Pkg Type | 25 to 25 | |
| SN54AC00VTD2.A | Active | Production | null (null) 0 | 10 TUBE | Yes | Call TI | N/A for Pkg Type | 25 to 25 | |

⁽¹⁾ **Status:** For more details on status, see our [product life cycle](#).

⁽²⁾ **Material type:** When designated, preproduction parts are prototypes/experimental devices, and are not yet approved or released for full production. Testing and final process, including without limitation quality assurance, reliability performance testing, and/or process qualification, may not yet be complete, and this item is subject to further changes or possible discontinuation. If available for ordering, purchases will be subject to an additional waiver at checkout, and are intended for early internal evaluation purposes only. These items are sold without warranties of any kind.

⁽³⁾ **RoHS values:** Yes, No, RoHS Exempt. See the [TI RoHS Statement](#) for additional information and value definition.

⁽⁴⁾ **Lead finish/Ball material:** Parts may have multiple material finish options. Finish options are separated by a vertical ruled line. Lead finish/Ball material values may wrap to two lines if the finish value exceeds the maximum column width.

⁽⁵⁾ **MSL rating/Peak reflow:** The moisture sensitivity level ratings and peak solder (reflow) temperatures. In the event that a part has multiple moisture sensitivity ratings, only the lowest level per JEDEC standards is shown. Refer to the shipping label for the actual reflow temperature that will be used to mount the part to the printed circuit board.

⁽⁶⁾ **Part marking:** There may be an additional marking, which relates to the logo, the lot trace code information, or the environmental category of the part.

Multiple part markings will be inside parentheses. Only one part marking contained in parentheses and separated by a "-" will appear on a part. If a line is indented then it is a continuation of the previous line and the two combined represent the entire part marking for that device.

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OTHER QUALIFIED VERSIONS OF SN54AC00-DIE :

- Space : [SN54AC00-SP](#)

NOTE: Qualified Version Definitions:

- Space - Radiation tolerant, ceramic packaging and qualified for use in Space-based application

重要通知和免责声明

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