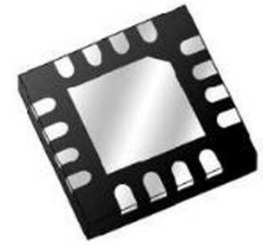


## SP Amp DIFF AMP Single R-R O/P $\pm 2.625V/5.25V$ 16-Pin VQFN EP T/R



Images are for reference only

[Inquiry](#)

**Manufacturer:** [Texas Instruments, Inc](#)

**Package/Case:** QFN-16

**Product Type:** Amplifier ICs

**RoHS:** RoHS Compliant/Lead free 

**Lifecycle:** Active

### General Description

The THS4520 is a wideband, fully differential operational amplifier designed for 5-V data acquisition systems. It has very low noise at 2 nV/ load. The slew rate is 570 V/ $\mu$ s, and with a settling time of 7 ns to 0.1% (2-V step), it is ideal for data acquisition applications. It is designed for unity gain stability.

To allow for dc coupling to ADCs, its unique output common-mode control circuit maintains the output common-mode voltage within 0.25 mV offset (typical) from the set voltage. The common-mode set point defaults to mid-supply by internal circuitry, which may be over-driven from an external source. The input and output are optimized for best performance with their common-mode voltages set to mid-supply. Along with high performance at low power supply voltage, this makes for extremely high performance single supply 5-V and 3.3-V data acquisition systems.

The THS4520 is offered in a Quad 16-pin leadless QFN package (RGT), and is characterized for operation over the full industrial temperature range from  $-40^{\circ}\text{C}$  to  $85^{\circ}\text{C}$ .

## Key Features

Fully Differential Architecture With Rail-to-Rail Outputs

Centered Input Common-mode Range

Minimum Gain of 1 V/V (0 dB)

Bandwidth: 620 MHz

Slew Rate: 570 V/ $\mu$ s

0.1% Settling Time: 7 ns

HD2: -115 dBc at 100 kHz, VOD = 8 VPP

HD3: -123 dBc at 100 kHz, VOD = 8 VPP

Input Voltage Noise: 2 nV/ load. The slew rate is 570 V/ $\mu$ s, and with a settling time of 7 ns to 0.1% (2-V step), it is ideal for data acquisition applications. It is designed for unity gain stability.

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## Recommended For You

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### THS3092D

Texas Instruments, Inc

SOP-8

### THS7316DR

Texas Instruments, Inc

SOP-8

### THS4131IDGNR

Texas Instruments, Inc

MSOP8

### THS4011CD

Texas Instruments, Inc

SOP

### THS7374IPW

Texas Instruments, Inc

TSSOP14

### THS6184RHFR

Texas Instruments, Inc

QFN

### THS4503IDGN

Texas Instruments, Inc

MSOP8

### THS7376IPWR

Texas Instruments, Inc

TSSOP14

### THS7314D

Texas Instruments, Inc

SOP8

### THS4130IDGK

Texas Instruments, Inc

MSOP8

### THS7353PW

Texas Instruments, Inc

TSSOP20

### THS4551IRGTR

Texas Instruments, Inc

VQFN16

**THS4281D**

Texas Instruments, Inc

SOIC-8

**THS4631D**

Texas Instruments, Inc

SOP-8

**THS3061DGN**

Texas Instruments, Inc

MSOP8