

LT1167 - Single Resistor Gain Programmable, Precision Instrumentation Amplifier; Package: SO; Pins: 8; Temperature Range: 0°C to 70°C

Manufacturers [Analog Devices, Inc](#)

Package/Case SOP8

Product Type Amplifier ICs

RoHS

Lifecycle



Images are for reference only

Please submit RFQ for LT1167CS8 or [Email to us: sales@ovaga.com](mailto:sales@ovaga.com) We will contact you in 12 hours.

[RFQ](#)

## General Description

The LT1167 is a low power, precision instrumentation amplifier that requires only one external resistor to set gains of 1 to 10,000. The low voltage noise of 7.5nV/√Hz (at 1kHz) is not compromised by low power dissipation (0.9mA typical for ±2.3V to ±15V supplies).

The part's high accuracy (10ppm maximum nonlinearity, 0.08% max gain error = 1) and PSRR (105dB),>

The LT1167, offered in 8-pin PDIP and SO packages, requires significantly less PC board area than discrete multi op amp and resistor designs.

The LT1167-1 offers the same performance as the LT1167, but its input current characteristic at high common mode voltage better supports applications with high input impedance (see the Applications Information section).

## Features

Single Gain Set Resistor:>

Gain Error:>

Input Offset Voltage Drift:  $0.3\mu\text{V}/^\circ\text{C}$  Max

Meets IEC 1000-4-2 Level 4 ESD Tests with Two External 5k Resistors

Gain Nonlinearity:>

Input Offset Voltage:>

Input Bias Current: 350pA Max

PSRR at>

CMRR at>

Supply Current: 1.3mA Max

Wide Supply Range:  $\pm 2.3\text{V}$  to  $\pm 18\text{V}$

1kHz Voltage Noise:  $7.5\text{nV}/\sqrt{\text{Hz}}$

0.1Hz to 10Hz Noise:  $0.28\mu\text{V}$ P-P

Available in 8-Pin PDIP and SO Packages

## Application

Bridge Amplifiers

Strain Gauge Amplifiers

Thermocouple Amplifiers

Differential to Single-Ended Converters

Medical Instrumentation





## Related Products



### [LTC1151CSW#PBF](#)

Analog Devices, Inc  
SOIC-16



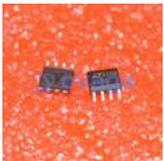
### [LTC2053CMS8](#)

Analog Devices, Inc  
MSOP8



### [LT1491ACS](#)

Analog Devices, Inc  
SOP14



### [LTC1150CS8](#)

Analog Devices, Inc  
SOP8



### [LT1498CS8](#)

Analog Devices, Inc  
SOP-8



### [LTC1150CN8](#)

Analog Devices, Inc  
DIP8



### [LT6105IMS8](#)

Analog Devices, Inc  
MSOP-8



### [LT1013CN8](#)

Analog Devices, Inc  
DIP-8