

INA332AIDGKR

INST Amp Single R-R O/P 5.5V 8-Pin VSSOP T/R

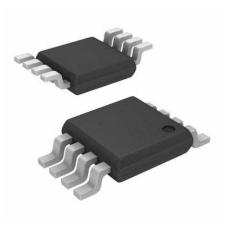
Manufacturer: <u>Texas Instruments, Inc</u>

Package/Case: MSOP8

Product Type: Amplifier ICs

RoHS: RoHS Compliant/Lead free

Lifecycle: Active



Images are for reference only

Inquiry

General Description

The INA332 and INA2332 are rail-to-rail output, low-power CMOS instrumentation amplifiers that offer wide range, single-supply, and bipolar-supply operation. Using a special manufacturing flow, the INA332 family provides the lowest cost available, while still achieving low-noise amplification of differential signals with low quiescent current of $415\mu A$ (dropping to $0.01\mu A$ when shutdown). Returning to normal operation within microseconds, this INA can be used for battery or multichannel applications.

Configured internally in a gain of 5V/V, the INA332 offers flexibility in higher gains by choosing external resistors.

The INA332 rejects line noise and its harmonics because common-mode error remains low even at higher frequencies.

High bandwidth and slew rate make the INA332 ideal for directly driving sampling Analog-to-Digital (A/D) converters as well as general-purpose applications. With high precision, low cost, and small packages, the INA332 outperforms discrete designs.

Additionally, because they are specified for wide temperature range of -55° C to $+125^{\circ}$ C and operating range of -65° C to $+150^{\circ}$ C, the INA331 family can be used in demanding environments.

Key Features

DESIGNED FOR LOW COST

HIGH GAIN ACCURACY: G = 5, 0.07%, 2ppm/°C

GAIN SET WITH EXT. RESISTORS FOR >5V/V

HIGH CMRR: 73dB DC, 50dB at 45kHz

LOW BIAS CURRENT: 0.5pA

BANDWIDTH, SLEW RATE: 2.0MHz, 5V/µs

RAIL-TO-RAIL OUTPUT SWING: (V+)-0.02V

WIDE TEMPERATURE RANGE: -55°C to +125°C

LOW QUIESCENT CURRENT: 490 µA max/chan

SHUT DOWN: 0.01 µA

MSOP-8 SINGLE AND TSSOP-14 DUAL PACKAGES

APPLICATIONS

INDUSTRIAL SENSOR AMPLIFIERS: Bridge, RTD, Thermocouple, Position

PHYSIOLOGICAL AMPLIFIERS: ECG, EEG, EMG

A/D CONVERTER SIGNAL CONDITIONING

DIFFERENTIAL LINE RECEIVERS WITH GAIN

FIELD UTILITY METERS

PCMCIA CARDS

AUDIO AMPLIFIERS

COMMUNICATION SYSTEMS

TEST EQUIPMENT

AUTOMOTIVE INSTRUMENTATION

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Recommended For You

INA823DT INA333AIDRGR INA101AM

Texas Instruments, Inc Texas Instruments, Inc Texas Instruments, Inc

SOP8 SON-8 CAN10

INA141UA INA101AG

Texas Instruments, Inc

Texas Instruments, Inc

Texas Instruments, Inc

SOP8 DIP8

INA116UA

Texas Instruments, Inc

SOP16

INA129PA

Texas Instruments, Inc

DIP8

TLV2254IN

Texas Instruments, Inc

DIP-14

INA333AIDRGT

Texas Instruments, Inc

SON8

INA101CM

Texas Instruments, Inc

CAN10

TLV2464IN

Texas Instruments, Inc

DIP14

INA101SM

Texas Instruments, Inc

CAN10

INA141PA

Texas Instruments, Inc

DIP

INA2126UA

Texas Instruments, Inc

SOP16