

# AD7798BRUZ

Data Sheet

3-Channel, Low Noise, Low Power, 16-Bit, Sigma Delta ADC with On-Chip In-Amp; Temperature Range: Industrial

Manufacturers <u>Analog Devices, Inc</u>

Package/Case TSSOP-16

Product Type Data Conversion ICs

RoHS Pb-free Halide free



Images are for reference only

Please submit RFQ for AD7798BRUZ or Email to us: sales@ovaga.com We will contact you in 12 hours.

**RFO** 

#### **General Description**

Lifecycle

The AD7798/AD7799 are low power, low noise, complete analog front ends for high precision measurement applications. The AD7798/AD7799 contains a low noise, 16-/24-bit  $\Sigma$ - $\Delta$  ADC with three differential analog inputs. The on-chip, low noise instrumentation amplifier means that signals of small amplitude can be interfaced directly to the ADC. With a gain setting of 64, the rms noise is 27 nV for the AD7799 and 40 nV for the AD7798 when the update rate equals 4.17 Hz.

On-chip features include a low-side power switch, reference detect, programmable digital output pins, burnout currents, and an internal clock oscillator. The output data rate from the part is software-programmable and can be varied from 4.17 Hz to 470 Hz.

The part operates with a power supply from 2.7 V to 5.25 V. The AD7798 consumes a current of  $300 \mu\text{A}$  typical, whereas the AD7799 consumes  $380 \mu\text{A}$  typical. Both devices are housed in a 16-lead TSSOP package.

### **Features**

RMSnoise: 27 nV at 4.17 Hz (AD7799) 65 nV at 16.7 Hz (AD7799) 40 nV at 4.17 Hz (AD7798) 85 nV at Weigh scales

16.7 Hz (AD7798)

Current: 380 µA typical

Power-down: 1 µA maximum

Update rate: 4.17 Hz to 470 Hz 3 differential inputs

Low noise, programmable gain, instrumentation amp

Internal clock oscillator

Simultaneous 50 Hz/60 Hz rejection

Reference detect

Low-side power switch

Programmable digital outputs

Burnout currents

Power supply: 2.7 V to 5.25 V

## **Application**

Pressure measurement

Strain gauge transducers

Gas analysis

Industrial process control

Instrumentation

Portable instrumentation

Blood analysis

Smart transmitters

Liquid/gas chromotography 6-digit

DVM

#### **Related Products**



ADAS3022BCPZ Analog Devices, Inc LFCSP-40



AD574AJNZ Analog Devices, Inc PDIP-28



AD7938BSUZ Analog Devices, Inc TQFP-32



**AD7124-8BCPZ-RL7** Analog Devices, Inc LFCSP-32



AD7266BSUZ Analog Devices, Inc TQPF-32



AD7401YRWZ Analog Devices, Inc SOIC-16



AD7192BRUZ-REEL Analog Devices, Inc TSSOP-24



AD9680BCPZ-500 Analog Devices, Inc LFCSP-64