

## ADG658YRUZ

Data Sheet

Analog Multiplexer Single 8:1 Automotive 16-Pin TSSOP Tube

Manufacturers Analog Devices, Inc

Package/Case TSSOP-16

Product Type Interface - Switches, Multiplexers, Demultiplexers

**RoHS** 

Lifecycle



Images are for reference only

Please submit RFQ for ADG658YRUZ or Email to us: sales@ovaga.com We will contact you in 12 hours.

**RFO** 

## **General Description**

The ADG658 and ADG659 are low voltage, CMOS analognultiplexers comprised of eight single channels and four differential channels, respectively. The ADG658 switches one of eight inputs (S1–S8) to a common output, D, as determined by the 3-bit binary address lines A0, A1, and A2. The ADG659 switches one of four differential inputs to a common differential output, as determined by the 2-bit binary address lines A0 and A1. An EN input on both devices enables or disables the device. When disabled, all channels are switched off.

These devices are designed on an enhanced process that provides lower power dissipation yet gives high switching speeds. These devices can operate equally well as either multiplexers or demultiplexers and have an input range that extends to the supplies. All channels exhibit break-before-make switching action, preventing momentary shorting when switching channels. All digital inputs have 0.8 V to 2.4 V logic thresholds, ensuring TTL/CMOS logic compatibility when using single +5 V or dual  $\pm 5 \text{ V}$  supplies.

The ADG658 and ADG659 are available in 16-lead TSSOP/QSOP packages and 16-lead 4 mm × 4 mm LFCSP packages.

Product Highlights

Single- and dual-supply operation. The ADG658 and ADG659 offer high performance and are fully specified and guaranteed with  $\pm 5$  V,  $\pm 5$  V, and  $\pm 3$  V supply rails.

Automotive temperature range -40°C to +125°C.

Low power consumption, typically  $< 0.1 \mu W$ .

16-lead 4 mm × 4 mm LFCSP packages, 16-lead TSSOPpackage and 16-lead QSOP package.

## **Application Features** 2 V to 12 V single supply Automotive applications Automotive temperature range -40°C to +125°C Automatic test equipment $45~\Omega$ on resistance over full signal range Data acquisition systems Rail-to-rail switching operation Battery-powered systems Single 8-to-1 multiplexer Communication systems 16-lead LFCSP/TSSOP/QSOP packages Audio and video signal routing Typical power consumption <0.1 μW Relay replacement TTL/CMOS compatible inputs Sample-and-hold systems ADG658-EP supports defense and aerospace applications (AQEC standard) Industrial control systems Download(pdf) Military temperature range: -55°C to +125°C Controlled manufacturing baseline One assembly/test site

One fabrication site

Enhanced product change notification

V62/17613 DSCC Drawing Number



## **Related Products**



ADV7181CBSTZ

Analog Devices, Inc

LQFP-64



<u>AD724JR</u>

Analog Devices, Inc SOIC-16



ADV7391WBCPZ

Analog Devices, Inc LFSCP-3



**AD8170AR** 

Analog Devices, Inc SOP8



ADV7393BCPZ

Analog Devices, Inc LFCSP-VQ-40



ADV7390BCPZ

Analog Devices, Inc QFN32



ADV7341BSTZ
Analog Devices, Inc
LQFP-64



Analog Devices, Inc SOIC-16