
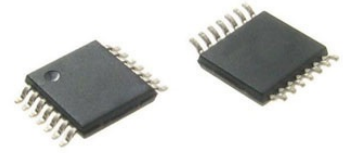


Video Amp Quad 5V 14-Pin TSSOP T/R

Manufacturer:	Texas Instruments, Inc
Package/Case:	TSSOP14
Product Type:	Amplifier ICs
RoHS:	RoHS Compliant/Lead free 
Lifecycle:	Active



Images are for reference only

[Inquiry](#)

General Description

Fabricated using the revolutionary complementary Silicon-Germanium (SiGe) BiCom3X process, the THS7374 is a low-power, single-supply 3 V to 5 V four-channel integrated video buffer. It incorporates a sixth-order Butterworth filter (able to be bypassed) which is useful as a digital-to-analog converter (DAC) reconstruction filter or an analog-to-digital converter (ADC) anti-aliasing filter. The 9.5-MHz filter is a perfect choice for SDTV video that includes composite (CVBS), s-video, Y'U'V', G'B'R' (R'G'B'), and Y'P'BP'R 480i/576i.

As part of the THS7374 flexibility, the input can be configured for either ac or dc-coupled inputs. The 300-mV output level shift allows for a full sync dynamic range at the output with 0-V input. The ac-coupled modes include a transparent sync-tip clamp option for CVBS, Y', and G'B'R' signals with sync. AC-coupled biasing for C'P'BP'R channels can easily be achieved by adding an external resistor.

The THS7374 is the perfect choice for all video buffer applications. Its rail-to-rail output stage with 6-dB gain allows for both ac and dc line driving. The ability to drive two lines per channel, or 75-Ω loads, allows for maximum flexibility as a video line driver. The 9.6-mA total quiescent current at 3.3 V and 0.1-μA disabled current makes it an excellent choice for portable or other power-sensitive applications.

The THS7374 is available in a TSSOP-14 package that is lead-free and green (RoHS) compliant.

Key Features

4-SDTV Video Amplifiers for CVBS, S-Video, Y'P'BP'R 480i/576i, Y'U'V', or G'BR' (R'G'B')

Integrated Low-Pass Filters:

6th-Order 9.5-MHz (-3 dB) Butterworth

-1 dB Passband Bandwidth at 8.2-MHz

54-dB Attenuation at 27-MHz

150-MHz (-3 dB) Filter Bypass Mode

Versatile Input Biasing

DC-Coupled with 300-mV Output Shift

AC-Coupled with Sync-Tip Clamp

AC-Coupled with Biasing Allowed

Built-in 6-dB Gain (2 V/V)

+3-V to +5-V Single-Supply Operation

Rail-to-Rail Output:

Output Swings Within 100 mV from the Rails to Allow AC or DC Output Coupling

Supports Driving 2 Lines per Channel

Low 9.6-mA at 3.3-V Total Quiescent Current

0.1- μ A Disabled Supply Current Function

Low Differential Gain/Phase of 0.15%/0.3°

Lead-Free and Green TSSOP-14 Package

Recommended For You

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