

SY58034UMG

Data Sheet

6GHz, 1:6 CML FANOUT BUFFER WITH 2:1 MUX INPUT AND INTERNAL I/O TERMINATION

Manufacturers <u>Microchip Technology, Inc</u>

Package/Case VQFN-32

Product Type Clock & Timer ICs

RoHS Rohs

Lifecycle



Images are for reference only

Please submit RFQ for SY58034UMG or Email to us: sales@ovaga.com We will contact you in 12 hours.

RFO

General Description

The SY58034U is a 2.5V/3.3V precision, high-speed 1:6 fanout buffer capable of handling clocks up to 6GHz. A differential 2:1 MUX input is included for redundant clock switchover applications. The differential input includes Micrel's unique, 3-pin input termination architecture that allows the device to interface to any differential signal (AC- or DC-coupled) as small as 100mV without any level shifting or termination resistor networks in the signal path. The outputs are 50ý source terminated CML, with extremely fast rise/fall times guaranteed to be less than 60ps. The SY58034U operates from a $2.5\text{V} \pm 5\%$ supply or a $3.3\text{V} \pm 10\%$ supply and is guaranteed over the full industrial temperature range of -40°C to +85°C. For applications that require LVPECL outputs, consider the SY58035U or SY58036U Multiplexers. The SY58034U is part of Micrel's high-speed, Precision Edge® product line.

Features

Provides six ultra-low skew copies of the selected input

2:1 MUX input included for clock switchover applications

Guaranteed AC performance over temperature and voltage:

Clock frequency range: DC to >6GHz

Unique input isolation design minimizes crosstalk

Ultra low-jitter design:

60fs RMS phase jitter

Low supply voltage operation: 2.5V and 3.3V

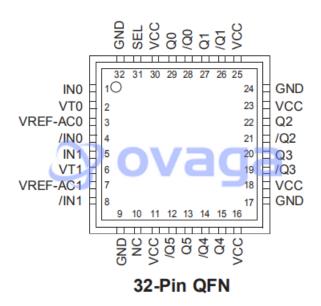
Unique input termination and VT pin accepts DCcoupled and AC-coupled inputs (CML, PECL, LVDS)

Internal 50ý output source termination

400mV CML output swing

Available in 32-pin (5mm x 5mm) QFN package





Related Products



SY58031UMG

Microchip Technology, Inc VQFN-32



SY89833LMG

Microchip Technology, Inc VQFN-16



SY89872UMG

Microchip Technology, Inc VQFN-16



SY89468UHY

Microchip Technology, Inc TQFP-64



SY89467UHY

Microchip Technology, Inc TQFP-64



SY89838UMG

Microchip Technology, Inc VQFN-32



SY89826LHY

Microchip Technology, Inc TQFP-64



SY56011RMG

Microchip Technology, Inc QFN-16