
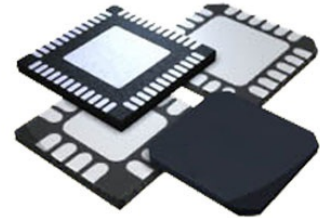


Digital Crosspoint Single 4x4 5Gbps 44-Pin QFN EP Tray

Manufacturer:	Microchip Technology, Inc
Package/Case:	QFN
Product Type:	Switches
RoHS:	RoHS Compliant/Lead free 
Lifecycle:	Active



Images are for reference only

[Inquiry](#)

General Description

The SY58040U is a low jitter, low skew, high-speed 4x4 crosspoint switch optimized for precision telecom and enterprise server/storage distribution applications. The SY58040U distributes clock frequencies from DC to 4GHz, and data rates to 5Gbps guaranteed over temperature and voltage. The SY58040U differential input includes Micrel's unique, 3-pin input termination architecture that directly interfaces to any differential signal (AC- or DC-coupled) as small as 100mV (200mVpp) without any level shifting or termination resistor networks in the signal path. The outputs are 50Ω source-terminated CML with extremely fast rise/fall times guaranteed to be less than 60ps. The SY58040U features a patent-pending isolation design that significantly improves on channel-to-channel crosstalk performance. The SY58040U operates from a 2.5V ±5% or 3.3V ±10% supply and is guaranteed over the full industrial temperature range of -40°C to +85°C. The SY58040U is part of Micrel's high-speed, Precision Edge® product line.

Key Features

Provides crosspoint switching between any input pair to any output pair

Guaranteed AC performance over temperature and voltage:

DC to >5Gbps throughput

Unique, patent-pending, channel-to-channel isolation design provides superior crosstalk performance

Ultra-low jitter design:

Unique, patent-pending, 50Ω input termination extended CMVR, and VT pin accepts DC- and ACcoupled differential inputs

400mV CML output swing

50Ω source terminated outputs minimize round-trip reflections

Power supply 2.5V ±5% or 3.3V ±10%

Available in 44-pin (7mm x 7mm) MLF® package

Pb-Free green package

Recommended For You

SY89540UMY

Microchip Technology, Inc
QFN

SY58023UMG

Microchip Technology, Inc
QFN

SY55858UHG-TR

Microchip Technology, Inc
TQFP-32

SY58023UMI

Microchip Technology, Inc
QFN-16

SY55858UHG

Microchip Technology, Inc
TQFP32

SY56034ARMG

Microchip Technology, Inc
QFN

SY55854UYY

Microchip Technology, Inc
SSOP16

SY89540UMY-TR

Microchip Technology, Inc
VQFN44

SY58023UMG-TR

Microchip Technology, Inc
VQFN-16

SY55859LMI

Microchip Technology, Inc
QFN

SY58024UMG-TR

Microchip Technology, Inc
VQFN

SY55859LMG

Microchip Technology, Inc
QFN-32

SY55854UYI

Microchip Technology, Inc
TSSOP16

SY55858UHI

Microchip Technology, Inc
QFP32

SY56040ARMY

Microchip Technology, Inc
VQFN