

Analog Multiplexer Single 16:8 48-Pin TSSOP T/R



General Description

Diodes' PI3L series of logic circuits are produced using the Company's advanced sub-micron CMOS technology, achieving industry leading performance. The PI3L301D is a 16- to 8-bit multiplexer/demultiplexer LAN Switch. Industry leading advantages include a propagation delay of less than 250ps, resulting from its low channel resistance and I/O capacitance. The device multiplexes differential outputs from a Gigabit Ethernet transceiver (PHY) device to one of two corresponding B1 or B2 outputs. The switch is bidirectional and offers little or no attenuation of the high-speed signals at the outputs. It is designed for low bit-to-bit skew, high channel-to-channel noise isolation and is compatible with various standards, such as 10/100/1000 Base-T (Ethernet). Generally, this part can be used to replace mechanical relays in low-voltage LAN applications that interface a physical layer over CAT 5 or CAT 6 unshielded twisted pair cable through an isolation transformer.

Key Features

RON is 4Ω typical Low bit-to-bit skew: 200ps Low crosstalk: –27dB @ 250MHz Low Current Consumption: 20μA Near-Zero propagation delay: 250ps Switching speed: 9ns Channel On-Capacitance: 9.5pF (typical) VCC Operating Range: +3.0V to +3.6V ESD >3000V... Human Body Model

Packaging (Pb-free & Green available): 48-pin 240 mil wide plastic TSSOP (A)

Application

Dual Physical Layer Device sharing to one interface connector

SONET OC-12(622Mbps) signal routing

Routes physical layer signals for 10/100/1000 Mbit Ethernet





Recommended For You

PI4MSD5V9546AZYEX	PI5USB30213XEAEX	PI3B3257AQE
Diodes Inc	Diodes Inc	Diodes Inc
QFN	QFN24	QSOP16
PI3USB102ZLEX	PI3USB221FZUAEX	PI3USB32212ZLEX
Diodes Inc	Diodes Inc	Diodes Inc
TQFN10	QFN10	QFN
PI2PCIE24227HE	PI3USB221EZWEX	PI3A27518ZDEX
Diodes Inc	Diodes Inc	Diodes Inc
QFN	UDFN3030-10	QFN
PI3USB30532ZLEX	PI3PCIE3412AZHEX	PI2PCIE2412ZHE
Diodes Inc	Diodes Inc	Diodes Inc
TQFN40	TQFN-42	QFN
PI3DBS16222ZLEX	PI3PCIE3412ZHE	PI4MSD5V9546ALEX
Diodes Inc	Diodes Inc	Diodes Inc

QFN

QFN

TSSOP