

100Gb/s QSFP28 EDR SR4 850nm 100m MMF Optical Transceiver

Features

- Supports IBTA InfiniBand EDR
- Up to 100Gb/s data rate
- Selectable retiming for both Tx & Rx
- Programmable Tx input equalizer
- Programmable Rx output amplitude
- Programmable Rx output emphasis
- SFF-8665 compliant QSFP28
- Single 3.3V supply
- QSFP28 power class 3
- 2.2 W power dissipation (typ, with retiming)
- Bit Error Rate (BER) 1E-15 with InfiniBand systems
- Class 1 laser safety
- Up to 100m on OM4 and 70m on OM3 multimode fiber at 100Gb/s
- Up to 100m on OM3 at 40Gb/s
- SFF-8636 compliant digital diagnostic monitoring (DDM)
- Hot pluggable
- RoHS compliant
- SFF-8636 compliant I2C management interface



Description

QSFP-100G-SR4H transceiver is a 4-channel, pluggable, QSFP28 optical transceiver designed for use in 100Gb/s EDR InfiniBand systems. This module incorporates integrated circuit technology, in order to provide high performance at low power. The transceiver operates over parallel multi-mode (MMF) fiber, using a nominal wavelength of 850nm, and is SFF-8665 compliant.

The transceiver has a standard QSFP28 connector on the electrical side towards the host system supporting EDR. The optical interface is composed of four optical channels/fibers in each direction, intended for a parallel MMF cable via a standard MP0 connector. Each channel/fiber operates at signaling rates up to 25.78125GBd.

The QSFP-100G-SR4H transceiver has selectable re-timing in both transmit and receive directions as well as it provides digital diagnostic monitoring of supply voltage, temperature, transmit/receive power, and laser bias.

Rigorous production testing ensures the best out-of-the-box installation experience, performance, and durability.

Absolute Maximum Ratings

Table1-Absolute Maximum Ratings							
Parameter	Min.	Max.	Units				
Storage Temperature	-40	+85	٥C				
Supply Voltage	-0.3	3.6	V				
Damage Threshold	3.4		dBm				
Data input voltage	-0.3	3.465	V				
Control input voltage	-0.3	4.0	V				

Operational Information

Table2-Operational Information						
Parameter	Min.	Typical	Max.	Units		
Supply voltage	3.135	3.3	3.465	V		
Power dissipation (no retiming)		1.5	1.8	W		
Power dissipation (retiming on all lanes)		2.2	2.5	W		
Supply noise tolerance (10Hz - 10MHz)	66			mVpp		
Operating case temperature	0		70	°C		
Operating relative humidity	5		85	%RH		



Mechanical Schematics



Figure 1 Mechanical Schematics

Warnings

Handling Precautions: This device is susceptible to damage as a result of electrostatic discharge (ESD). A static free environment is highly recommended. Follow guidelines according to proper ESD procedures.

Laser Safety

Radiation emitted by laser devices can be dangerous to human eyes. Avoid eye exposure to direct or indirect radiation.



Further Information:

Web	www.naddod.com		
Email	For order requirements: sales@naddod.com	For cooperation: agency@naddod.com	
	For customer service: support@naddod.com	For other informations: info@naddod.com	
	For technical support: tech@naddod.com		

Disclaimer

1. We are committed to continuous product improvement and feature upgrades, and the contents contained in this manual are subject to change without notice.

2. Nothing herein should be construed as constituting an additional warranty.

3. NADDOD assumes no responsibility for the use or reliability of equipment or software not provided by NADDOD.

Copyright © NADDOD.COM All Rights Reserved, 2022

NADDOD - Explore the Digital Future of Intelligence HPC, Networking, Data Center, ISP Solutions