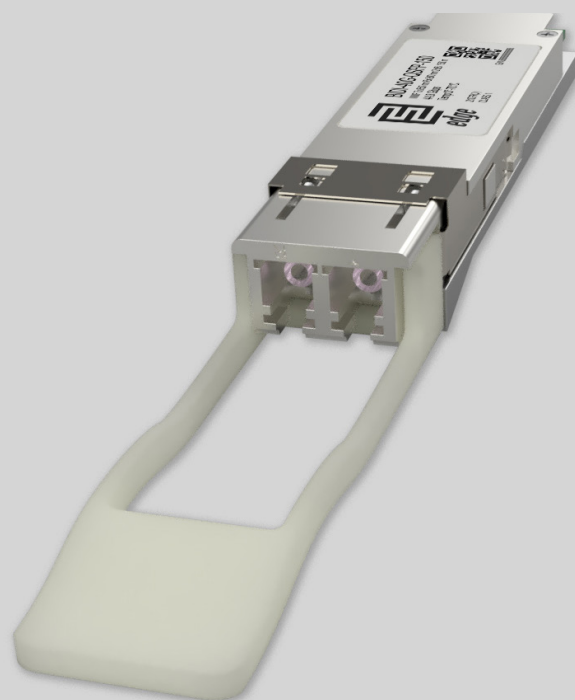


## Key Highlights:

- Type: QSFP+
- Compatibility: Multi-Vendor MSA Compatible
- Tx/Rx Wavelength: 850 nm. / 900 nm.
- Media Type: Multi-Mode Fiber (MMF)
- Optical Budget: 2 dB
- Max. Distance: 100m(OM3), 150m(OM4)
- Data Rate: 39.81-44.8 Gbps
- Temperature: Standard 0°-70°C



## Optical Transceiver: BIDI-40G-QSFP-150

### Product Description:

BIDI-40G-QSFP-150 is Multi-Vendor MSA Compatible QSFP (Quad Small Form-factor Pluggable) Transceiver, operating over pair of multimode optical fiber providing two optical communication lanes. BIDI-40G-QSFP-150 allows to reuse existing 10 Gbps multimode fiber infrastructure when migrating towards 40Gbps. Module has minimum guaranteed optical budget of 2 dB, which in most cases is enough to reach 150 distance using OM4 type multi-mode cable or 100m distance using OM3 type cable. However, distance is just indicative parameter calculated for comfort of identification. Eventually we calculate distance taking in account minimal optical budget and average attenuation of optical cabling in industry. This transceiver use two 20 Gbps channels each transmitting and receiving simultaneously over two wavelength on a single Multi mode fiber strand. BIDI-40G-QSFP-150 uses 20G x VCSEL Laser transmitters and which operating at nominal wavelength 850 nm and 20G x 900 nm PIN Photodiode receivers on each line totally generating 40Gbps full duplex communication. Module support DDM/DOM optical diagnostics, which provide diagnostic information about the present operating conditions. BIDI-40G-QSFP-150 operates in Standard 0°-70°C temperature range and has double LC connector. BIDI-40G-QSFP-150 support 39.81 - 44.8 Gbps data rate and such applications as 40G Ethernet (41.25 Gbps), STM256 (39.81 Gbps), OTU3 (43.108 Gbps) and OTU3e2 (44.58 Gbps). BIDI-40G-QSFP-150 optical transceiver is multi-purpose module used in number of different places of today's networking. Consequently, most popular applications are Internet Service Provider (ISP) Fiber To The Home aggregation and backbone, Mobile operator core and back-haul 40G applications, Data Center networking site interconnections and other optical links.

Transceiver is CE/RoHS certified and it is Compliant with product safety standards. BIDI-40G-QSFP-150 Transceiver is fully compliant to QSFP+ Multi Source Agreement. Consequently, it means that module is compatible with 80% of networking equipment, where is not implemented a special algorithm for protection against third party modules. However – we can provide QSFP+ transceiver with custom-encoded firmware in order to make it work almost in any equipment. Therefore, we will be glad to know what your requirement is. Because our focus is providing top quality service, we are performing serious quality checks before delivery of our products. As a result, we do optical parameter measurements, connector cleanliness tests and QSFP+ transceiver EEPROM memory data validation tests.



## Product Specification:

Parameter	Value
Media Type:	Multi-Mode Fiber (MMF)
TX Wavelength:	Ch1:850nm; Ch2:900nm
RX Wavelength:	Ch1:900nm; Ch2:850nm
Minimum Optical Budget:	2 dB
Maximum Distance:	100 m (OM3) / 150 m (OM4)
Supported Data Rate:	39.81 - 44.8 Gbps
Supported Applications:	40G Ethernet (41.25 Gbps), STM256 (39.81 Gbps), OTU3 (43.108 Gbps) and OTU3e2 (44.58 Gbps)
DDM/DOM:	Supported
Temperature Range:	Standard 0°-70°C
Connectors:	Double LC
Tx Wavelength Bandwidth:	36nm (Ch1:832-868nm and Ch2: 882-918nm)
Rx Wavelength Bandwidth:	36nm (Ch1:882-918nm and Ch2:832-868nm)
Minimum Transmitting Power:	Each Lane -4 dBm
Maximum Transmitting Power:	Each Lane 5 dBm
Receiver Sensitivity:	Each Lane -6 dBm
Receiver Overload:	Each Lane 3 dBm
Transmitter Type:	20G x VSCSEL Laser
Receiver Type:	20G x PIN photodiode
Power:	+3.3V single power supply
Compliance:	QSFP+ MSA, SFF-8436, 40GBASE-SR-BiDi, CE, Class 1 FDA and IEC60825-1 Laser Safety Compliant, RoHS



## Compatibility:

EDGE Optical transceivers can be provided with custom-encoded firmware, in order to provide compatibility with more than 50 vendor brands in data and telecom communications industry:

**MS** - General MSA  
**AD** - ADVA  
**AL** - Alcatel-Lucent  
**AR** - Arista  
**AV** - Avaya  
**BR** - Brocade  
**CN** - Ciena  
**CI** - Cisco  
**DL** - Dell & Force10  
**DK** - D-Link  
**EM** - EMC2  
**ET** - Enterasys

**ER** - Ericsson  
**EX** - Extreme Networks  
**F5** - F5 Networks  
**FO** - Fortinet  
**FU** - Fujitsu  
**H3** - H3C  
**HI** - Hirschmann  
**HP\*** - HP Networking  
**HS\*** - HP Storage  
**HU** - Huawei  
**IB** - IBM  
**IF** - Infinera

**IN** - Intel  
**JU** - Juniper Networks  
**LI** - Linksys  
**ML** - Mellanox  
**ME** - Meraki (Cisco)  
**MT** - MikroTik  
**MO** - Moxa  
**MR** - MRV  
**NG** - Netgear  
**NS** - NSN  
**PA** - Palo Alto Network  
**QL** - Qlogic

**RD** - RAD  
**RU** - Ruijie Networks  
**SM** - Supermicro  
**SY** - Synology  
**TC** - Telco Systems  
**TP** - TP-LINK  
**TN** - Trendnet  
**WG** - WatchGuard  
**ZT** - ZTE  
**XX** - Other

## Warranty:

EDGE Optic's provides a limited **warranty for sixty (60) months** from Purchaser's receipt of the Equipment represented in this data sheet against defective design or workmanship.

