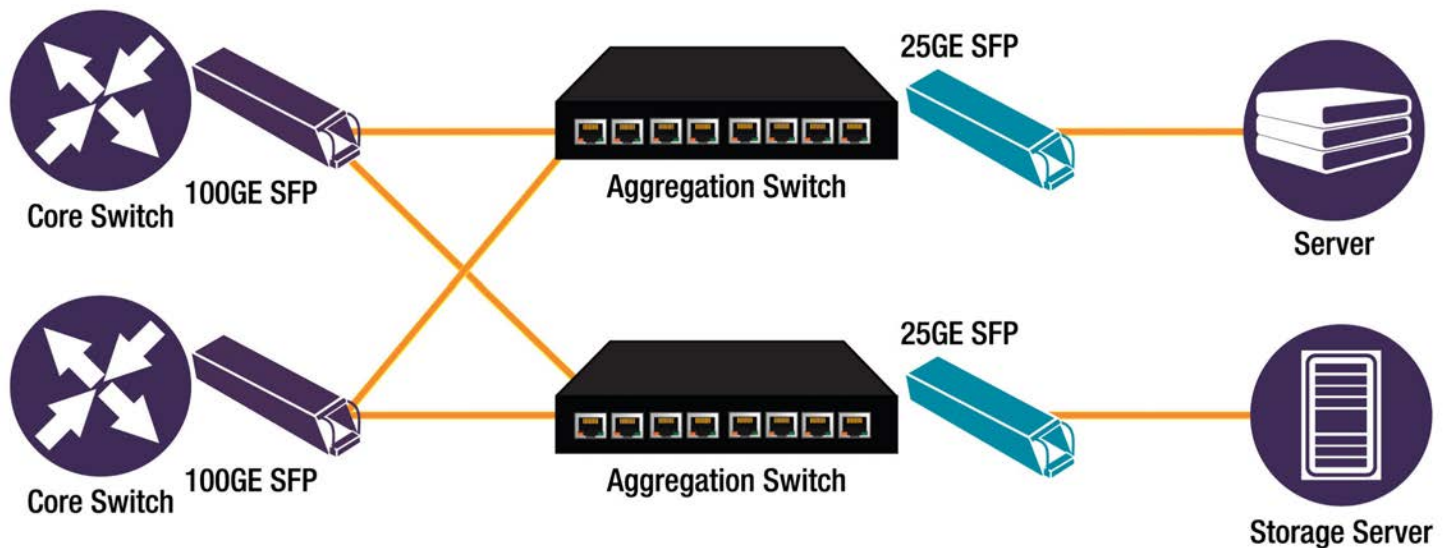# Cisco Compatible 25GBase SFP28 Modules

Applications

- 25G Data Center Connectivity
- 5G eCPRI Fronthaul and Backhaul
- 25GBase-X Ethernet

| Features	Benefits
MSA standard SFP28 form factor	Takes existing module form factors, has a similar structure as current SFP+ or SFP modules, offers a cost-effective solution for high density, high speed I/O data center applications
IEEE 802.3by, IEEE 802.3cc compliant	Support 25 Gb/s Ethernet over multimode and single mode fibers, and provides network operators a cost-effective upgrade path to 25Gb/s that minimizes network design, installation and maintenance costs
Cisco compatibility - guaranteed	The 25G SFP28 complies with MSA standard and fully complies with OEM (such as Cisco) equipment without requiring a workaround and truly "plug-and-play". The 25G SFP28 are verified on real Cisco switches.
10G/25G dual speed	Flexible choice of deployment options, supports 10Gig speed for today and provides future-proof for 25G connectivity
Low power consumption	Less heat dissipation, suitable for high-density connectivity solutions for data center and high-performance computing network applications, provides cost saving and environment friendly
Digital diagnostic monitoring	Allows access to real-time operating parameters, provides component level monitoring, fault isolation and failure prediction functions on their transceiver based applications

Cisco Compatible 25GBase SFP28 Modules

25GBase-X, SFP28 With DMI (LC)
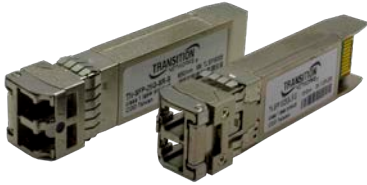
Applications: 25G Ethernet and Fiber Channel for Data Center eCPRI for 5G Fronthaul/Backhaul.

Features

- SFP28 Optical Transceiver with LC connector
- MSA Compliant
- Compliant with 10GBase-xR (TN-SFP-25G-SR-S and TN-SFP-10/25G-LR-S Only)
- Compliant with 25GBase-xR
- Compliant with 5G eCPRI
- Single +3.3V Power Supply
- Power dissipation
  - < 1.2 Watts (TN-SFP25G-SR-S, TN-SFP-10/25G-LR-S)
  - < 2 Watts (TN-SFP-25G-ER, TN-SFP-25G-BX40x-I)
- Compliant with SFF-8431
- Compliant with SFF-8472
- RoHS Compliant

Specifications

Standards	IEEE 802.3z IEEE 802.3 IEEE 802.3ae IEEE 802.3CC
Output Wavelength	-5.5nm < λc < +7.5nm
Dimensions	Width: 0.52" [13 mm] Depth: 2.18" [55 mm] Height: 0.33" [8 mm]
Power Input	3.3V
Environment	Operating: 0°C to 70°C (TN-SFP-25G-SR-S, TN-SFP-10/25G-LR-S, TN-SFP-25G-ER) Operating: -40°C to 85°C (TN-SFP-25G-BX40U-I, TN-SFP-25G-BX40D-I) Storage: -40°C to 85°C
Certifications	IEC-60825, FDA 21, CFR 1040.10 and 1040.11
Warranty	Lifetime

Ordering Information

Duplex

TN-SFP-25G-SR-S
10G/25GBase-SR, SFP28 with DMI 850nm multimode (LC) [100/70 m; 328/230 ft.] Link Budget: 1.9 dB
 *Distance up to 100m on 50/125 OM4 multimode fiber, up to 70 m for 50/125 um OM3 multimode fiber.

TN-SFP-10/25G-LR-S
10G/25GBase-LR, SFP28 with DMI 1310nm single mode (LC) [10 km / 6.2 mi.] Link Budget: 8.3 dB

TN-SFP-25G-ER
25GBase-ER, SFP28 with DMI 1310nm single mode (LC) [40KM / 24.9 mi.] Link budget: 18.0 dB

Extended Operating Temperature
-40°C to +85°C

TN-SFP-25G-BX40U-I
25Gbase-BX, SFP28 with DMI 1270nm TX / 1310nm RX single mode single fiber (LC) [40KM / 24.9 mi.] Link budget: 19.0 dB

TN-SFP-25G-BX40D-I
25Gbase-BX, SFP28 with DMI 1310nm TX / 1270nm RX single mode single fiber (LC) [40KM / 24.9 mi.] Link budget: 19.0 dB

Note: The Transition Networks TN-SFP-xx25G-xR-S Series 25G SFP28 transceiver modules are designed to install in any SFP28 port allowing for 25G/10GBase-X interfaces to the network through the SFP28 connector. The TN-SFP-xx25G-xR-S transceivers are Cisco Compliant* and are designed for bi-directional serial-optical data communication such as 25G Ethernet at speeds up to 26.5 Gbps.

*Transition Networks' SFP28 modules fully comply with the Multi-Sourcing Agreement (MSA). This compliance allows our SFP28 modules to be used in all other MSA compliant SFP28 platforms. In addition, Transition Networks SFP28 modules are also Compliant with all Cisco SFP28 based routers and switches, as well as Cisco's IOS software. Transition Networks SFP28 modules ARE NOT Cisco OEM brand module.

SFPs & CWDM