

Brocade® Fabric OS® 9.x Open Systems Compatibility Matrix

Version 1.3; September 2021

This document summarizes equipment that is known to be compatible with the Brocade® Fabric OS® (FOS) 9.x family. Products that are named in the compatibility tables reflect equipment that has been tested at Broadcom or tested externally.

NOTE: This information is constantly being updated. For the latest compatibility information, visit vendor websites, some of which are listed in [Related Websites](#).

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Chapter 2: Brocade FOS 9.x Platforms

To find out more about Brocade FOS 9.x platforms and to view product briefs for these products, visit the following website:

<https://www.broadcom.com/products/fibre-channel-networking>

NOTE All Brocade FOS 9.x platforms in the following table support hot code activation unless otherwise noted.

NOTE Support for 8G speed on Gen 7 Fibre Channel platforms requires 32G optics when 8G connectivity is supported by the platform.

NOTE Support for 4G speed on Gen 6 Fibre Channel platforms requires 16G optics when 4G connectivity is supported by the platform.

Supported FOS 9.x Models
Gen 6 Fibre Channel Platforms
Brocade G610 Switch
Brocade G620 Switch
Brocade G630 Switch
Brocade 7810 Extension Switch
Brocade G648 SAN I/O Module for HPE Synergy Frame 12000 (FOS 8.2.0_gft only)
Brocade MXG610s SAN I/O Module for Dell PowerEdge MX7000 (FOS 8.1.0_Inx only)
Brocade X6-8 and X6-4 Directors Port blades: FC32-48, FC32-64 Intelligent blades: SX6 Extension blade
Gen 7 Fibre Channel Platforms
Brocade G720 Switch
Brocade X7-8 and X7-4 Directors Port blades: FC64-48, FC32-X7-48, FC32-64 Intelligent blades: SX6 Extension blade

Chapter 7: WDM Network Solutions

7.1 Brocade General Compatibility with WDM Solutions

Broadcom supports all WDM networking solutions that are compliant with Fibre Channel standards for ISL extensions when configured in R_RDY mode.

Note the following limitations with WDM support:

- FEC should be turned off for 10G and 16G links.
- Lossless capability cannot be guaranteed over a DWDM network.
- ISL R_RDY mode is added to the base switch when configured to run Virtual Fabrics in FOS 8.2.1 and higher. Manual configuration of R_RDY mode on both sides is required.
- In general, Broadcom does not recommend the use of ISL Trunking over WDM links. Refer to your preferred vendor's configuration and support documentation for guidance on the use of ISL Trunking with their WDM equipment.

Check with your WDM networking vendor for qualification test details and supported product functionality and configurations with Brocade switches.

Smartoptics comments:

Above restrictions are NOT valid for transparent Smartoptics embedded C/DWDM solutions.

With Smartoptics:

- VC_RDY Mode is supported - no need to configure ISL R_RDY Mode
- FEC can be enabled for 16G links
- ISL trunking over Smartoptics DWDM links is supported

(In FOS v8.2.1 the ISL R_RDY mode with support for Base switch XIS L was introduced to be able to run XISLs over long distance WDM solutions, which aren't transparent.)

8.2 Smartoptics

Vendor	Application	Part Number	Data Rate (Gb/s)	Brocade Models
Smartoptics	8G DWDM 0–80km	8G-ZR-Dxxx-BR1	8	G620, X6 FC32-48 blade FOS 9.0.1a or beyond
	16G DWDM 0–40 km	16G-ER-Dxxx-BR1 (Note 1)	16	G620, SX6, FC32-48 FOS 8.1.2 or beyond G610 FOS 8.1.2 or beyond G630 FOS 8.2.0 or beyond G648 FOS 8.2.0_gft MXG610s FOS 8.1.0_Inx
		16G-ER-BR2 (E/O-Wrap support)		G620, SX6, FC32-48 FOS 8.1.2 or beyond G610 FOS 8.1.2 or beyond G630 FOS 8.2.0 or beyond MXG610s FOS 8.1.0_Inx
	16G DWDM 0–40 km, 1530 nm and 1550 nm	16G-ER-Dxxx-BR1 (Note 2)	16	G620, SX6, FC32-48 FOS 8.1.2 or beyond G610 FOS 8.1.2 or beyond G630 FOS 8.2.0 or beyond MXG610s FOS 8.1.0_Inx
		16G-ER-Dxxx-BR2 (E/O-Wrap support)		G620, SX6, FC32-48 FOS 8.1.2 or beyond G610 FOS 8.1.2 or beyond G630 FOS 8.2.0 or beyond G648 FOS 8.2.0_gft MXG610s FOS 8.1.0_Inx

Vendor	Application	Part Number	Data Rate (Gb/s)	Brocade Models
	16G DWDM 0–40 km (Note 3)	16G-ER-Dxxx-BR1	16	G620, SX6, FC32-48 FOS 8.1.2 or beyond G610 FOS 8.1.2 or beyond G630 FOS 8.2.0 or beyond G648 FOS 8.2.0_gft MXG610s FOS 8.1.0_Inx
		16G-ER-Dxxx-BR2 (E/O-Wrap support)		G620, SX6, FC32-48 FOS 8.1.2 or beyond G610 FOS 8.1.2 or beyond G630 FOS 8.2.0 or beyond G648 FOS 8.2.0_gft MXG610s FOS 8.1.0_Inx
		16G-ER-DxxS-BR2		X6 FC32-48 blade, SX6, G610, G620, G630, X7 with FC32-X7-48 blade FOS 9.0.1a or beyond
	16G DWDM 40–120 km (Note 3 & 4)	16G-ER-Dxxx-BR1 used together with M-Series Open Line System		G620, SX6, FC32-48 FOS 8.1.2 or beyond G610 FOS 8.1.2 or beyond G630 FOS 8.2.0 or beyond G648 FOS 8.2.0_gft MXG610s FOS 8.1.0_Inx
		16G-ER-Dxxx-BR2 used together with M-Series Open Line System (E/O- Wrap support)		G620, SX6, FC32-48 FOS 8.1.2 or beyond G610 FOS 8.1.2 or beyond G630 FOS 8.2.0 or beyond G648 FOS 8.2.0_gft MXG610s FOS 8.1.0_Inx

Vendor	Application	Part Number	Data Rate (Gb/s)	Brocade Models
	32G DWDM (Note 5) with DCP-M40-ER Open Line System	32G-IR-DXXX-BR	32	X6 FC32-48 blade, SX6, G610, G620, G630 FOS 8.2.1c or beyond G648 FOS 8.2.0_gft MXG610s FOS 8.1.0_Inx FOS 9.0.0 or beyond supports D_Port and MAPS with these optics.
	32G DWDM	32G-IR-DxxS-BR		X6 FC32-48 blade, SX6, G610, G620, G630, G648, MXG610s, X7 FC64-48 blade, X7 FC32-X7-48 blade, G720 FOS 9.0.0a or beyond

Note 1	For Dxxx, use any wavelength between D210 and D600.		
Note 2	For CWDM 1530	Use any of Dxxx = D520 to D610	
	For CWDM 1550	Use any of Dxxx = D260 to D420	
Note 3	<p>Dxxx = D180 (1563.05 nm), D190 (1562.23 nm), D200 (1561.42 nm), D210 (1560.61 nm), D220 (1559.79 nm), D230 (1558.98 nm), D240 (1558.17 nm), D250 (1557.36 nm), D260 (1556.55 nm), D270 (1555.75 nm), D280 (1554.94 nm), D290 (1554.13 nm), D300 (1553.33 nm), D310 (1552.52 nm), D320 (1551.72 nm), D330 (1550.92 nm), D340 (1550.12 nm), D350 (1549.32 nm), D360 (1548.51 nm), D370 (1547.72 nm), D380 (1546.92 nm), D390 (1546.12 nm), D400 (1545.32 nm), D410 (1544.53 nm), D420 (1543.73 nm), D430 (1542.94 nm), D440 (1542.14 nm), D450 (1541.35 nm), D460 (1540.56 nm), D470 (1539.77 nm), D480 (1538.98 nm), D490 (1538.19 nm), D500 (1537.40 nm), D510 (1536.61 nm), D520 (1535.82 nm), D530 (1535.04 nm), D540 (1534.25 nm), D550 (1533.47 nm), D560 (1532.68 nm), D570 (1531.90 nm), D580 (1531.12 nm), D590 (1530.33 nm), D600 (1529.55 nm), D610 (1528.77 nm)</p> <p>Smartoptics CWDM transceivers work with any ITU standardised DWDM Mux/Demuxes.</p>		
Note 4	Extended distances beyond the reach of standard ER and ZR transceivers use the M-Series 1U Open Line System. M-Series OLS is a 1U DWDM Mux/Demux with management and amplification.		
Note 5	<p>xxx = (1) 915 (1565.50 nm) (2) 916 (1564.68 nm) (3) 917 (1563.86 nm) (4) 918 (1563.05 nm) (5) 919 (1562.23 nm) (6) 921 (1560.61 nm) (7) 922 (1559.79 nm) (8) 923 (1558.98 nm) (9) 924 (1558.17 nm) (10) 925 (1557.36 nm) (11) 926 (1556.55 nm) (12) 927 (1555.75 nm) (13) 928 (1554.94 nm) (14) 929 (1554.13 nm) (15) 930 (1553.33 nm) (16) 931 (1552.52 nm) (17) 932 (1551.72 nm) (18) 933 (1550.92 nm) (19) 934 (1550.12 nm) (20) 935 (1549.32 nm) (21) 936 (1548.51 nm) (22) 937 (1547.72 nm) (23) 938 (1546.92 nm) (24) 939 (1546.12 nm) (25) 940 (1545.32 nm) (26) 941 (1544.53 nm) (27) 942 (1543.73 nm) (28) 943 (1542.94 nm) (29) 944 (1542.14 nm) (30) 945 (1541.35 nm) (31) 946 (1540.56 nm) (32) 947 (1539.77 nm) (33) 948 (1538.98 nm) (34) 949 (1538.19 nm) (35) 950 (1537.40 nm) (36) 951 (1536.61 nm) (37) 952 (1535.82 nm) (38) 953 (1535.04 nm) (39) 954 (1534.25 nm) (40) 955 (1533.47 nm) (41) 956 (1532.68 nm) (42) 957 (1531.90 nm) (43) 958 (1531.12 nm) (44) 959 (1530.33 nm) (45) 960 (1529.55 nm) (46) 961 (1528.77 nm)</p>		
For help with link design, please contact info@Smartoptics.com .			

