

WIZ-912/914

WIZ-924/928

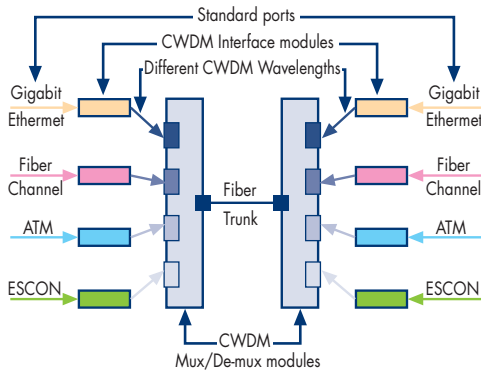
CWDM Multiplexer Modules



Media Wizard CWDM multiplexers and interface modules provide cost-effective wavelength bundling solutions for optical transports. CWDM reduces the cost of building-out service networks by increasing the effective bandwidth of existing fibers and reducing the numbers of required fibers in cable installations.

CWDM (Coarse Wave Division Multiplexing) technology channels data from different sources at different bit rates and different protocols (such as ESCON, Ethernet, Fiber Channel, ATM) onto a single optical link, to be de-multiplexed on the remote side.

wavelengths are 20nm apart eliminating the need for thermally controlled lasers and reducing the power consumption, no amplifiers are used for the transmitted distances. This reduces the cost of the interface modules making CWDM a lower cost alternative to DWDM (Dense Wave Division Multiplexing), while providing the same security, reliability and quality as DWDM systems.



Media Wizard CWDM solutions

The Media Wizard product line provides comprehensive CWDM solutions that include:

- CWDM Multiplexer/De-multiplexer modules – 2, 4 and 8 channel multiplexers over single/dual SM link (available with F/O link redundancy)
- CWDM interface modules supporting a wide range of LAN protocols such as 100/1000M Ethernet, 155/622M ATM, ESCON, Fiber Channel, E1/T1, and more
- Modules are plug-in, hot-swappable and housed in manageable 16- or 4-slot Media Wizard chassis providing space saving (19" 3U/1.5U) CWDM solutions

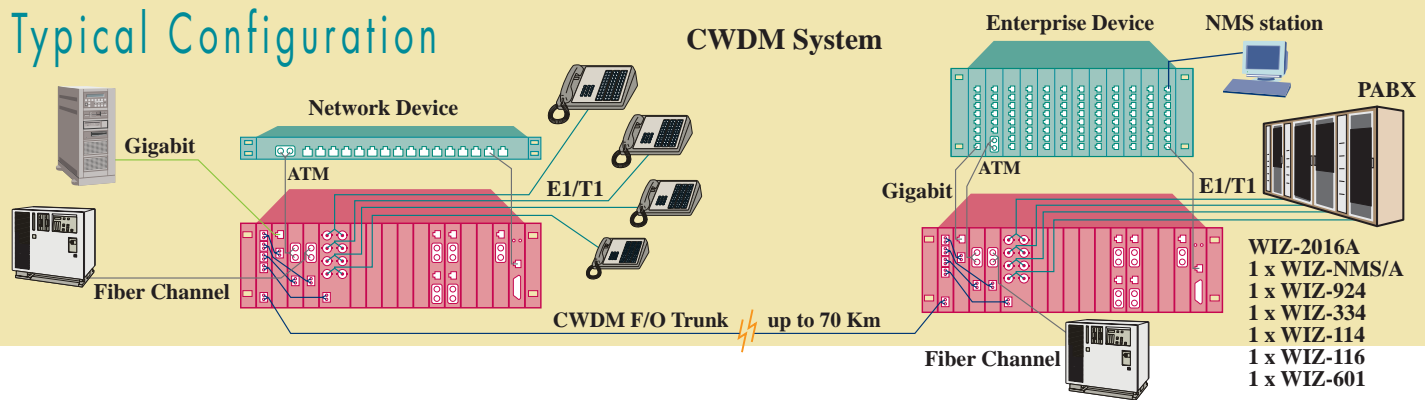
Features

- Two, four, or eight channels may be multiplexed onto a Fiber Link, reducing F/O cabling requirements by a factor of four/eight
- Dual fiber and single fiber trunk solutions
- Available with fiber trunk redundant option
- Up to 8 full duplex 2.125 Gbps over a distance up to 70Km
- SNMP Manageability:
 - User definable CWDM ports with association to the respective CWDM interface module (mng chassis)
 - LED status indication of local links and trunk ports (mng chassis)
 - Automatic trunk redundancy activation (mng chassis for redundancy equipped mux/de-mux modules)
- Secure transmission provided by physical separation between channels
- Robust Telco grade chassis with enhanced management capabilities
- Plug-in manageable, hot-swappable CWDM modules



MEDIA WIZARD

Typical Configuration



Technical Specifications

WIZ-912/914/924/928 CWDM Multiplexer Modules

CWDM Multiplexer Models:

| | |
|---------|--|
| WIZ-912 | CWDM ports: 2x duplex, Trunk port: SF (Single Fiber) |
| WIZ-914 | CWDM ports: 4x duplex, Trunk port: SF (Single Fiber) |
| WIZ-924 | CWDM ports: 4x duplex, Trunk port: DF (Dual Fiber) |
| WIZ-928 | CWDM ports: 8x duplex, Trunk port: DF (Dual Fiber) |

Local CWDM (2/4/8) Ports

| | |
|----------------|---|
| Connectors | Duplex LC |
| Port type | Duplex SM, CWDM wavelengths |
| LED indicators | Link - per port link indication, mng controlled |
| Protocols | Transparent to all protocols |

Trunk Port(s)*

| | |
|----------------|---|
| Connectors | Single/Dual* LC (simplex or duplex) |
| LED indicators | Link - per port link indication, mng controlled *Oper - port operational |
| Distance | Limited only by the CWDM interface devices *Relevant only for redundant trunk ports. |

Wavelengths

A=1470nm, B=1490nm, C=1510nm, D=1530nm, E=1550nm, F=1570nm, G=1590nm, H=1610nm

| | |
|---------|--------------------------|
| WIZ-912 | C, E or D, F |
| WIZ-914 | A, C, E, G or B, D, F, H |
| WIZ-924 | C, D, E, F |
| WIZ-928 | A to H |

Passband Width: 0.5dB >13nm; 30dB >25nm

Insertion Loss

| | |
|------------------------|-------|
| WIZ-912, WIZ-924 | 2.5dB |
| WIZ-914, WIZ-928 | 3.0dB |
| WIZ-912/R*, WIZ-924/R* | 3.5dB |
| WIZ-914/R*, WIZ-928/R* | 4.0dB |

*Versions with trunk redundancy, requires mng.

Return loss: 50dB

Ordering Information

| | |
|-----------|--|
| WIZ-912/A | 2 duplex channel CWDM mux/de-mux, LC, wavelength type = C and E; trunk port: SF SM LC, (0.6PU) |
| WIZ-912/B | 2 duplex channel CWDM mux/de-mux, LC, wavelength type = D and F; trunk port: SF SM LC, (0.6PU) |
| WIZ-914/A | 4 duplex channel CWDM mux/de-mux, LC, wavelength type = A, C, E and G; trunk port: SF SM LC, (0.6PU) |
| WIZ-914/B | 4 duplex channel CWDM mux/de-mux, LC, wavelength type = B, D, F, and H; trunk port: SF SM LC, (0.6PU) |
| WIZ-924 | 4 duplex channel CWDM mux/de-mux, LC, wavelength type = C, D, E and F; trunk port: dual-fiber SM LC, (0.6PU) |
| WIZ-928 | 8 duplex channel CWDM mux/de-mux, LC, wavelength type = A to H; trunk port: dual-fiber SM LC, (0.6PU) |
| WIZ-9xx/R | /R suffix - adds trunk redundancy (secondary trunk port) to the CWDM module, operates only in a managed chassis. |

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All specifications are subject to change without notice. Neither manufacturer nor seller shall be liable for any loss, damage, or injury, direct or consequential, arising from the inability to use the product.

Power Consumption (installed in Media Wizard chassis):

DC Power Consumption (PU) 0.6PU

Module Dimensions

H: 130mm (5.1") x W: 25.4mm (1") x D: 140mm (5.5")

Safety and Emissions:

CE, FCC Part 15, EN60950

Environment

| | |
|------------|----------------------------|
| Operating: | 0 to 45°C (32 to 113°F) |
| Storage: | -40 to 85°C (-40 to 185°F) |
| Humidity: | 10% to 90% non-condensing |

Media Wizard CWDM Interface Modules:

Converters:

- Copper to fiber
- Fiber to fiber

Switches:

- Scalable switching solutions (F/O uplink concentrator)
- Workgroup switches

F/O Multiplexers:

- E1/T1/J1

Supported Protocols

Fast Ethernet, Gigabit Ethernet, ATM-OC3/OC12/OC-48
FDDI, ESCON, Fiber Channel, E1/T1/J1

Distances Supported:

Up-to 70Km, depending on the interface module.

