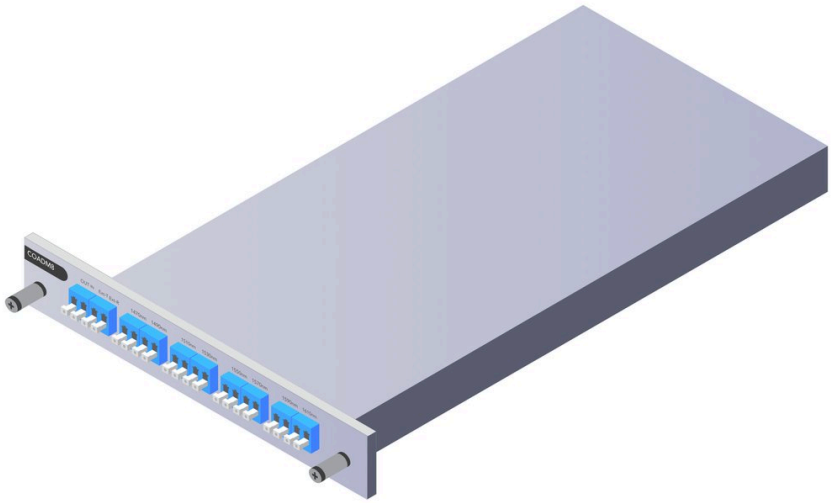
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OTN SYSTEMS WDM PLATFORMS

CWDM OADM Module

The CWDM OADM Module is a passive thin-film-filter (TFF) optical add-drop multiplexer for CWDM network wavelength uplink/downlink applications. It operates on the ITU-T grid with 20nm channel spacing across 1260–1620nm, dropping and adding selected channels while passing the rest through transparently, with low insertion loss and high channel isolation.



HIGHLIGHTS

Low insertion loss

Thin-film-filter technology keeps both through-path and add/drop-path insertion loss low.

High channel isolation

≥30dB adjacent / ≥40dB non-adjacent channel isolation.

1 to 16 channels dropped

Five drop-count options, transparent pass-through for the remaining channels.

High stability & reliability

Conforms to ITU-T G.694.2 and Telcordia GR-1209/GR-1221.

Three package options

ABS box, LGX box or 1U rackmount, to match the installation style.

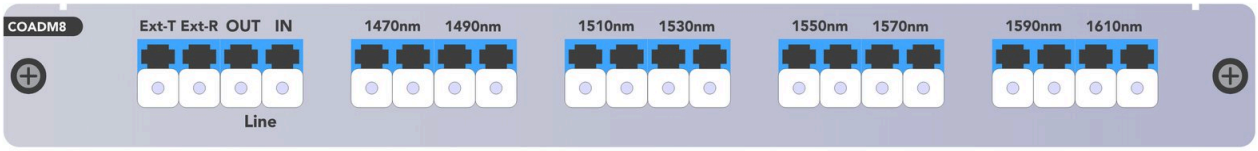
RoHS-6 compliant

Lead-free construction.

FORMAT

ABS MODULE | LGX | 1U

FRONT PANEL



SPECIFICATIONS

Optical	
Operating Wavelength Range	1260–1620nm
Channel Center Wavelength	ITU-T grid
Channel Spacing	20nm
Channel Bandwidth	ITU ±6.5nm
Flatness	≤0.5dB
Adjacent Channel Isolation	≥30dB
Non-Adjacent Channel Isolation	≥40dB
Return Loss	≥45dB
Directionality	≥45dB
Polarization-Related Loss	≤0.2dB
Polarization Mode Dispersion	≤0.2ps
Maximum Withstanding Optical Power	≤500mW
Environmental & Mechanical	
Operating Temperature	0°C–+70°C
Storage Temperature	−40°C–+85°C
Compliance	ITU-T G.694.2 · Telcordia GR-1209-CORE · Telcordia GR-1221-CORE · RoHS-6
Package Type	ABS box · LGX box · 1U 19” rackmount

CHANNEL COUNT

CHANNEL COUNT	THROUGH-PATH INSERTION LOSS	ADD/DROP-PATH INSERTION LOSS
1	≤0.8dB	≤0.8dB
2	≤1.2dB	≤1.2dB
4	≤1.8dB	≤2.0dB
8	≤2.6dB	≤3.2dB
16	≤4.5dB	≤5.3dB
16WP	≤4.5dB	≤5.3dB

16WP is a distinct {Channels} value: instead of a contiguous 16-channel run, it uses all 18 channels except CH39 (1391nm) and CH41 (1411nm), the two channels most affected by the fibre water-peak absorption band, for standard (non low-water-peak) G.652 fibre. {Start} is fixed at CH27 for this plan.

CWDM CHANNEL GRID REFERENCE

CHANNEL	WAVELENGTH
CH27	1271nm
CH29	1291nm
CH31	1311nm
CH33	1331nm
CH35	1351nm
CH37	1371nm
CH39	1391nm
CH41	1411nm
CH43	1431nm
CH45	1451nm
CH47	1471nm
CH49	1491nm
CH51	1511nm
CH53	1531nm
CH55	1551nm
CH57	1571nm
CH59	1591nm
CH61	1611nm

ORDERING INFORMATION

NAME	CWDM OADM Module
DESCRIPTION	CWDM OADM Module, passive thin-film-filter (TFF) optical add-drop multiplexer for CWDM wavelength uplink/downlink applications, ITU-T G.694.2 grid, 20nm channel spacing, 1260-1620nm. Drops and adds selected channels while passing the rest through transparently.
PART NUMBER	WDM-COADM- **{Start}** - **{Channels}** - **{Format}**

{Start}	First dropped channel number, CH27–CH61 (ITU-T G.694.2 grid, step 2); fixed at CH27 when {Channels} is "16WP", required
{Channels}	1 · 2 · 4 · 8 · 16 · 16WP, see Channel Count table above, required
{Format}	ABS (ABS box) · LGX (LGX box) · 1U (1U rackmount), required

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