## Dispersion Compensation Module

MX-DCM-C-Fxx



Maxcom's Dispersion Compensation Modules provides fixed chromatic dispersion compensation for DWDM and CATV networks. The DCMs are available for a range of distances in 20 km increments (between 20 and 120 Km ).

Maxcom DCMs are built to minimize the basic principles behind dispersion compensation. As longer wavelengths travel faster than shorter wavelengths, the DCM will help the pulse reshape itself into its original form.

## Features

- Supports standard single mode optical fiber G.652, 1525~1565nm transmission channel
- Excellent dispersion compensation feature designed to eliminate the influence to system's index, due to residual dispersion
- G. 652 100\% C-band dispersion compensation fiber
- Dispersion compensation value range is $20 \sim 120 \mathrm{Km}$ optional
- Low insertion loss
- Low polarization mode dispersion
- Excellent performance price ratio

Example Application:

## Application

- G. 652 standard single mode fiber, 1525 ~ 1565nm wavelength range and chromatic dispersion slope compensation
- DWDM system in long distance fiber transmission
- Long distance optical fiber link, satellite, microwave
transmission



Technical Index

| Product Type | F20 | $F 40$ | $F 60$ | $F 80$ | $F 100$ | $F 120$ |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: |
| Dispersion value@1545nm (ps/nm) | $-340 \pm 10$ | $-680 \pm 20$ | $-1020 \pm 30$ | $-1360 \pm 40$ | $-1700 \pm 50$ | $-2040 \pm 60$ |
| Optical fiber insertion loss <br> $(1525 \sim 1565 \mathrm{~nm})(\mathrm{dB})$ | $\leqslant 3.4$ | $\leqslant 4.7$ | $\leqslant 6.2$ | $\leqslant 7.9$ | $\leqslant 9.2$ | $\leqslant 11.0$ |
| Polarization mode dispersion <br> (PMD) (ps) | $\leqslant 0.3$ | $\leqslant 0.4$ | $\leqslant 0.5$ | $\leqslant 0.6$ | $\leqslant 0.7$ | $\leqslant 0.8$ |

General Information

| Feature | Index | Supplement |
| :---: | :---: | :---: |
| Storage Temp. $\left({ }^{\circ} \mathrm{C}\right)$ | $-40-85$ |  |
| Size $(\mathrm{mm})$ | $483 \times 279 \times 44$ | $(\mathrm{~W}) \times(\mathrm{D}) \times(\mathrm{H})$ |
| Operational wavelength $(\mathrm{nm})$ | $1528 \sim 1565$ |  |
| Through power $(\mathrm{dBm})$ | $\leqslant 23$ |  |
| Optical fiber connector | SC/APC |  |

Notes: 1.Specified with connectors and adapters.

## Maxcom Part Numbers: MX-DCM-C-Fxx

XX = Selectable Distance in Km. User may select: 20, 40, 60, 80, 100, 120
Units come standard as 1RU 19" Rack Mount with SC/APC Connectors
Supports standard single mode optical fiber G. 652


Layout and Dimension


