

# 1310/1550 Wavelength Division Multiplexer (WDM) Dual Line Filter



## Key Features

- Low insertion loss
- 50 dB high Isolation
- Extended operating temperature range suitable for uncontrolled environment
- Exceptional reliability and environmental stability
- Excellent temperature stability
- Supports unidirectional and bidirectional operations

## Applications

- Add/drop node in metro network
- Supervisory application

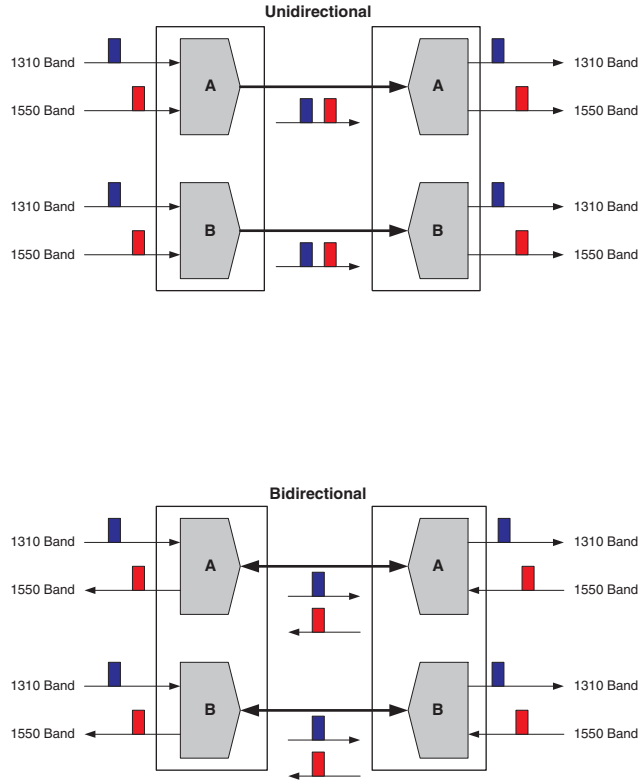
The JDSU dual 1310/1550 band WDM module, based on thin-film filter (TFF) technology, provides extremely high performance. With low insertion loss, low polarization sensitivity, and high temperature stability, this module is well suited to WDM network applications. With very high isolation, the module supports both bidirectional and unidirectional transportations. And with an extended operating temperature range and high reliability, it can be deployed in uncontrolled environments, away from the central office.

Using the dual 1310/1550 WDM module, new systems on CWDM or DWDM bands can be combined with legacy systems on a 1310 nm band without disruption. Additionally, the module can be used to mux or demux supervisory channel (1310nm).

Easily customizable, the dual 1310/1550 WDM module can be configured from a standard list of packaging and connector options.

## 2

### Functional Diagram



### Specifications

| Parameter                   | Specification |                |
|-----------------------------|---------------|----------------|
| 1310 passband               | Minimum       | 1260 – 1360 nm |
| 1550 passband               | Minimum       | 1480 – 1620 nm |
| Insertion loss <sup>1</sup> |               |                |
| 1310 to Common              | Maximum       | 1.2 dB         |
| 1550 to Common              | Maximum       | 1.2 dB         |
| Channel isolation           | Minimum       | 50 dB          |
| Polarization dependent loss | Maximum       | 0.1 dB         |
| Return loss                 | Minimum       | 45 dB          |
| Directivity                 | Minimum       | 50 dB          |
| Optical power               | Maximum       | 500 mW         |
| Operating temperature range |               | -40 – 85°C     |
| Storage temperature range   |               | -40 – 85°C     |
| Operating humidity          |               | 5 – 85%        |

1. Including connectors' loss.

**Channel Plan**
**Channel**
**Description**

|   |        |
|---|--------|
| 1 | A_COM  |
| 2 | A_1310 |
| 3 | A_1550 |
| 4 | B_COM  |
| 5 | B_1310 |
| 6 | B_1550 |

**Ordering Information**

For more information on this or other products and their availability, please contact your local JDSU account manager or JDSU directly at 1-800-498-JDSU (5378) in North America and +800-5378-JDSU worldwide, or via e-mail at [customer.service@jdsu.com](mailto:customer.service@jdsu.com).

**Sample: WDM-D1315001**

# WDM-D131500

| Code | Packaging                    |
|------|------------------------------|
| 0    | LGX <sup>1</sup>             |
| 1    | 1U 19-inch rack <sup>1</sup> |
| 2    | 1U 23-inch rack <sup>1</sup> |

| Code | Connector Type |
|------|----------------|
| 1    | SC/UPC         |
| 2    | SC/APC         |
| 3    | Duplex LC/UPC  |
| 4    | Duplex LC/APC  |
| 5    | LC/UPC         |
| 6    | LC/APC         |

1. Detailed package drawings are available upon request.