

Choose the Industry Leader

As the leading OC-3 and OC-12 SONET multiplexer in North America, the FLM150 ADM provides the quality, power and flexibility required to help your network stay competitive. Local exchange carriers, competitive carriers and independent telcos have overwhelmingly chosen FLM 150 ADM to provide proven, cost-effective solutions for their OC-3 and OC-12 transport requirements.

Expand with Your Customers

The FLM150 ADM offers flexibility that starts with its array of network and tributary support:

- Survivable SONET architectures:
 - Terminal
 - Unidirectional path switched ring (UPSR)
 - Linear add/drop
 - Optical hub
 - In-service upgrades from one architecture to another
- Variety of tributary interfaces:
 - DS1 and DS3 interfaces
 - EC1 and OC-3 interfaces
 - Ethernet LAN interface
 - DS3 UNI ATM interface
 - Extensive VT1.5 and STS-1 time slot assignment control

Direct Ethernet and cell relay support lets you provide transparent LAN service. Each FASTLANE™-based LAN port can connect across your SONET network to another LAN or cell relay port at any FLM 150 ADM or FACTR® node. You can also interconnect any cell relay port to another cell relay port on your network. This lets you expand your service offerings and lessen your customers' costs.

With the FLM150 ADM transmux card, you gain all the advantages of an integrated M13 multiplexer. For DS1 access or loop networks, you can now hand off DS3 signals at carrier points of presence without having to install external legacy M13 boxes.

FLM150 ADM supports all configurations from a single shelf and set of plug-in cards, which saves time and money when your network needs upgrading. A simple software provisioning command allows in-service configuration changes from terminal to UPSR or linear ADM operation. By replacing OC-3 optics with OC-12 optics, the FLM150 ADM allows connection to higher-capacity OC-12 rings with direct DS1 interfaces—saving equipment and installation costs as your network changes and grows.

Route Traffic Any Way You Want It

A key strength of the FLM 150 ADM is its bandwidth management:

- Any-port-to-any-port TSA
- Full STS-1 grooming
- Full VT1.5 grooming to DS1, EC1 and OC-3 tributaries

This allows many types of connections that will simplify your network:

- Drop and continue
- Broadcast
- Hairpinning
- One-way and two-way connections

Combine Multiple Products for the Best Solution

FLM 150 ADM interconnects smoothly with our other products to give you the greatest network flexibility. You can mix and match different products in the same network. For example, you can combine FLM 150 ADM, FLM 600 ADM and FACTR on the same OC-12 ring. Plus, SONET DCC interconnection means you get full network management support across your entire Fujitsu network.



- Time Proven Solution
- Transparent LAN Service
- Survivable SONET
- DCC Interconnection

Features and Specifications

Architectures

- Terminal
- Unidirectional path switched ring (UPSR)
- Linear add/drop
- Optical hub

Capacity

- Three STS-1s available for add/drop with EC1, OC-3 or OC-12 line connections

SONET Network Interfaces

- Line EC1, OC-3, OC-12* (*UPSR only)

Interfaces

- | | |
|-----------------------|----|
| • DS1 | 84 |
| • DS3, EC1 | 3 |
| • OC-3/3c | 2 |
| • Ethernet | |
| • 10Base-T, 10Base-FL | 8 |
| • 100Base-T | 2 |
| • DS3 UNI | 4 |

Optics

- 1310 nm and 1550 nm optical units
- FC, SC and ST connectors

TSA/TSI Switch Capacities

- 84 x 84 VT1.5
- 3 x 3 STS-1
- 12 x 12 STS-1 for OC-12 UPSR
- VT path switching and grooming into any EC1 or OC-3 tributary

Protection

- | | |
|------------|-----|
| • DS1 | 1:7 |
| • DS3, EC1 | 1:1 |
| • Optical | 1+1 |

Synchronization

- DS1 BITS primary and secondary clock output/input
- Line timing derived from OC-3/OC-12 signal
- Line timing derived from OC-3 or EC1 tributary
- Internal clock
- Synchronization status messaging

Operations

- TL1 protocol over X.25, OSI/X.25, OSI/LCN or IP/LCN
- Software download and remote memory backup
- Supported by FLEXR® Plus and NETSMART™ 1500 network management systems
- Supported by FLEXR and FLEXR GT craft user interfaces
- OSMINE compliant

Power Consumption/Heat Dissipation

- | | |
|----------------------------------|---------|
| • Maximum | 142 W |
| • Typical (28 DS1 ring) | 82 W |
| • Maximum Heat Dissipation | 484 BTU |
| • Heat Dissipation (28 DS1 ring) | 280 BTU |

Operating Environment

- Temperature -40° to 65°C (-40° to 149°F)
- Humidity 5% to 95% (Non-condensing)
- Convection cooling for all applications
- NEBS compliant

Physical Characteristics

- | | |
|--------------|-----------------|
| | (HxWxD) |
| • Dimensions | 10.5 x 23 x 12" |
| • Weight | 83 lb (38 kg) |

Features and Specifications subject to change without notice.

Fujitsu Network Communications, Inc.

2801 Telecom Parkway, Richardson, TX 75082

800.777.FAST FAX 972.479.6900

www.fnc.fujitsu.com

© Copyright 2002 Fujitsu Network Communications, Inc.

FASTLANE™, FACTR®, FLEXR® Plus and NETSMART™ are registered and/or proprietary trademarks of Fujitsu Network Communications, Inc. FUJITSU (and design)® and the THE POSSIBILITIES ARE INFINITE™ are registered and/or proprietary trademarks of Fujitsu Limited and are used with permission by its authorized licensees. All Rights Reserved.