DATASHEET 4.0

# **DCP-1610**

10 channel, 1G-16Gbps, Transponder, SFP+ to SFP+, PM



## DCP-1610 IN SHORT

- Modular ½ width 1U ten channel transponder for use with DCP-2 modular xwdm system
- Supported Protocols:
  - o 10G Ethernet (LAN & WAN)
  - 1G Ethernet
  - o STM-64 & OC192
  - o 16G Fibre Channel
  - 8G Fibre Channel
- OTN line side protocol with/without GFEC G.709
- Low power consumption
- SFP+ interfaces, tunable DWDM, DWDM, CWDM, LR and SR
- Encryption AES-256-GCM
- Comprehensive client and line performance monitoring
- PRBS traffic test
- Plug and play operation
- Front to back airflow
- API, CLI, SNMP, GUI

# DCP-1610 VERSATILE 1G/10G/40G & 8G/16G 10 CHANNEL TRANSPONDER

The DCP-1610 is a high density multilane transponder module for the DCP-2 1U chassis system.

Each DCP-1610 offers ten independent transponders operating from 1G to 16G line rates, enabling 20 x DWDM channels per 1U (40 x DWDM channel per 2U) for high capacity needs.

40G interfaces can be transported via 4x10G wavelength groups with CWDM or DWDM traffic being supported.

The DCP-1610 is perfect for new xwdm transmission installations or as part of any modern disaggregated DWDM deployment strategy (for example any of the Open Source Hardware initiatives) and can be used with any mux/demux platform compliant to ITU DWDM standard G.694.1 or CWDM standard G.694.2.

G.709 FEC is available on all interfaces for 8G/10G/40G protocols to extend the transmission distance in amplified systems.

8G/10G/16G/40G traffic can be encrypted using next generation encryption techniques compliant to FIPS 140-2 Suite B.

For 8G/10G/40G traffic this encryption can be combined with GFEC G.709 for long distance transport.

## **TECHNICAL SPECIFICATIONS**

#### PRODUCT CONFIGURATION

10x1G-16G Transponder, SFP+ to SFP+

#### LINE INTERFACE

Optical interface: SFP+ Line rate: up to 14.3Gbps DWDM ITU-T G.694.1

8G/16G traffic:

16G DWDM ER

8G DWDM ZR

8G DWDM ER

8G CWDM ZR

8G CWCM ER

1G-10G traffic:

Multirate from 1G to 11.1G

Tunable ER 40km

Tunable ZR 80km

DWDM ER 40km

DWDM ZR 80km

#### **CLIENT INTERFACE**

Optical interface: SFP+

1G-16G traffic:

SR, LR

1G-10G traffic:

SR, LR

#### **NETWORK MANAGEMENT**

Management and console ports

4 x RJ45 LAN ports 10/100/1000Base-T

1 x SFP LAN port 1000 Base-X

1 x RS-232 serial port

1 x RJ-45 local host 10/100/1000 Base-T

## **MANAGEMENT PROTOCOLS**

CLI, GUI, SNMP, HTTP, HTTPS, SSH, Syslog, RADIUS, SNTP, TFTP and FTP Web server application

## **ONLINE ACCESS MANAGER (OAM)**

Facility loopback (client and line interfaces), PRBS, ALS, LLF Event logger alarms

#### **VISUAL INDICATORS**

Indicator LED: Client link Client Tx Client Rx Line link Line Tx Line Rx

Status LED:

System Critical / Major / Minor / Power

#### PERFORMANCE MONITORING

Layer 1 PM for all services

OTN PM for uplink

Optical power Rx & Tx levels for all optical ports

#### **SOFTWARE UPGRADES**

Traffic hitless software upgrades

### **APS (FUTURE RELEASE)**

Automatic protection switching

## **ENCRYPTION (OPTION)**

AES-256-GCM

## **ENVIRONMENT**

Operating temp:0° C to 45° C Humidity: 5% to 85% RHI

Cooling: front to back and back to front straight

through air flow

## **DIMENSIONS DCP-1610, INCLUDING SFP+ HOUSING**

(HxWxD)

1.73 x 8.07 x 10.63" 44 x 205 x 270mm

## ORDERING INFORMATION

Part number Description

DCP-1610 10 channel, 1G-16Gbps, Transponder, SFP+ to SFP+, PM