

Features:

- Supports 8.0Gb/s to 10.7Gb/s bit rates
- Hot-pluggable XFP footprint, Built-in digital diagnosis
- Maximum link length of 100km with SMF
- 1550nm Cooled EML laser and APD photodiode
- XFP MSA package with duplex LC connector
- No reference clock required
- Single +3.3V power supply
- Power dissipation <3.5W
- RoHS compatible
- Temperature range: 0 to +70°C



Applications:

- SONET OC-192&SDH STM-64 at 9.953Gbps
- 10GBASE-100km 10G Ethernet
- 10G Fiber Channel Applications
- OC192 over FEC at 10.709Gbps
- Other optical links, up to 10.7Gbps

1. Absolute Maximum Ratings

Parameter	Symbol	Min	Max	Unit
Supply Voltage	Vcc	-0.5	4.5	V
Storage Temperature	Ts	-40	+85	°C
Operating Humidity	-	5	85	%

Note: Any stress beyond the maximum ratings can result in permanent damage. The device specifications are guaranteed only under the recommended operating conditions.

2. Recommended Operating Conditions

Parameter	Symbol	Min	Typ	Max	Unit
Operating Case Temperature	Tc	0		+70	°C
Power Supply Voltage @3.3V	Vcc	3.135	3.30	3.465	V
Power Supply Current	Icc			1000	mA
Data Rate		8.0		11.1	Gbps

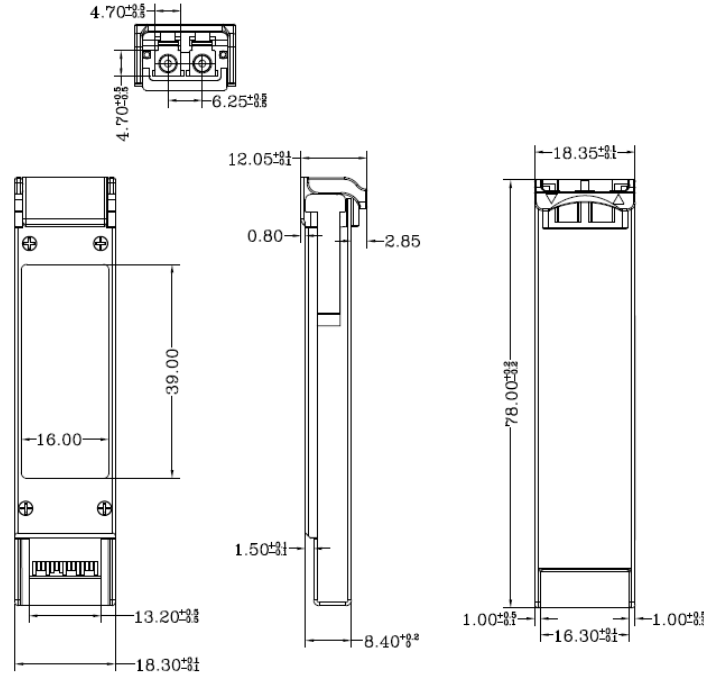
3. Optical and Electrical Characteristics

Parameter	Symbol	Min	Typ	Max	Unit	Notes
Transmitter						
Centre Wavelength	λ_c	1530		1560	nm	
Spectral Width (-20dB)	$\Delta\lambda$			1	nm	
Side-Mode Suppression Ratio	SMSR	30			dB	
Average Output Power	P _{out}	1.0		+4.0	dBm	1
Extinction Ratio	ER	8.2			dB	
Data Input Swing Differential	V _{IN}	180		950	mV	2
Input Differential Impedance	Z _{IN}	90	100	110	Ω	
TX Disable	Disable		2.0	Vcc	V	
	Enable		0	0.8	V	
Receiver						
Centre Wavelength	λ_c	1260		1600	nm	
Receiver Sensitivity				-25	dBm	3
Receiver Overload		-7			dBm	3
LOS De-Assert	LOSD			-26	dBm	
LOS Assert	LOSA	-35			dBm	
LOS Hysteresis		0.5		4	dB	
Data Output Swing Differential	V _{out}	400	600	800	mV	2
LOS	High	2.0		Vcc	V	
	Low			0.8	V	

Notes:

1. The optical power is launched into SMF.
2. Internally AC-coupled.
3. Measured with a PRBS 231-1 test pattern @9953Mbps, BER $\leq 1 \times 10^{-12}$.

4. Mechanical Diagram



Note: External physical characteristics are subject to variation. This may include, but is not limited to, external case designs, pull tab colors and/or shapes, removal latch styles or colors, and label sizes and placement. These variations do not affect the function or characteristics of the transceivers.

5. Ordering Information

OEM	Part Number	OEM	Part Number
Adtran	1442980G1C-100KM-A	Cisco	XFP-10GZR-OC192LR-100-A
Alcatel-Lucent	3HE05833CA-100KM-A	Fujitsu	FIM31052-100-A
Alcatel-Lucent	3HE05761CA-A	Juniper	XFP-10G-Z-OC192-LR2-100KM-A
Alcatel-Lucent	3HE01545AA-100-A	MSA Generic	AN-XFP-ZR-100KM
Brocade-Foundry	10G-XFP-ZR-100KM-A	MSA OnePort	OP-XFP-ZRL-OC192-100
Calix	100-01507-100KM-A		

6. Contact Information

Tel: 800.590.9535

Web: <http://www.approvednetworks.com>