QSFP-100G-PDACXM-C 100GBASE-CU QSFP28 DAC PASSIVE TWINAX, UP TO 5M



QSFP-100G-PDACXM-C

MSA and TAA Compliant 100GBase-CU QSFP28 Direct Attach Cable (Passive Twinax, Up to 5m)

Features

- QSFP28 conforms to the Small Form Factor SFF8436
- 4-Channel Full-Duplex Passive Copper Cable Transceiver
- Support for multi-gigabit data rates: 16Gb/s 25.78Gb/s (per channel)
- Maximum aggregate data rate: 100Gb/s (4x25.78Gb/s)
- IEEE 802.3bj 100GBase-CR4
- Copper link length up to 5m
- Power Supply: +3.3V
- Low crosstalk
- I2C based two-wire serial interface for EEPROM signature which can be customized
- Operating Temperature: 0°C to 70°C
- ROHS Compliant



Product Description

This is an MSA compliant 100GBase-CU QSFP28 to QSFP28 direct attach cable that operates over passive copper with a maximum reach up to 5.0m (16.4ft). It has been programmed, uniquely serialized, and data-traffic and application tested to ensure it is 100% compliant and functional. This direct attach cable is TAA (Trade Agreements Act) compliant and is built to comply with MSA (Multi-Source Agreement) standards. We stand behind the quality of our products and proudly offer a limited lifetime warranty.

ProLabs' direct attach cables are RoHS compliant and lead-free.

TAA refers to the Trade Agreements Act (19 U.S.C. & 2501-2581), which is intended to foster fair and open international trade. TAA requires that the U.S. Government may acquire only "U.S. – made or designated country end products."



Order Information

Part Number	Description
QSFP-100G-PDAC50CM-C	MSA and TAA Compliant 100GBase-CU QSFP28 Direct Attach Cable (Passive Twinax, 50cm)
QSFP-100G-PDAC1M-C	MSA and TAA Compliant 100GBase-CU QSFP28 Direct Attach Cable (Passive Twinax, 1m)
QSFP-100G-PDAC1-5M-C	MSA and TAA Compliant 100GBase-CU QSFP28 Direct Attach Cable (Passive Twinax, 1.5m)
QSFP-100G-PDAC2M-C	MSA and TAA Compliant 100GBase-CU QSFP28 Direct Attach Cable (Passive Twinax, 2m)
QSFP-100G-PDAC2-5M-C	MSA and TAA Compliant 100GBase-CU QSFP28 Direct Attach Cable (Passive Twinax, 2.5m)
QSFP-100G-PDAC3M-C	MSA and TAA Compliant 100GBase-CU QSFP28 Direct Attach Cable (Passive Twinax, 3m)
QSFP-100G-PDAC5M-C	MSA and TAA Compliant 100GBase-CU QSFP28 Direct Attach Cable (Passive Twinax, 5m)

Recommended Operating Conditions

Parameter	Symbol	Min.	Typical	Max.	Unit
Storage Ambient Temperature		-40		+85	°C
Operating Case Temperature	TC	0		70	°C
Power Supply Voltage	VCC3	3.14	3.3	3.47	V
Power Dissipation	PD		0.5		W
Data Rate Per Lane		1		25.78	

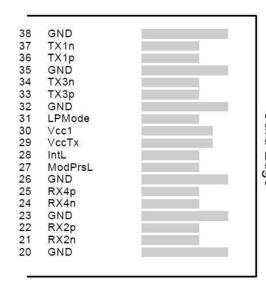
Pin Descriptions

Pin	Logic	Symbol	Name/Descriptions	Ref.
1		GND	Module Ground	1
2	CML-I	Tx2-	Transmitter inverted data input	
3	CML-I	Tx2+	Transmitter non-inverted data input	
4		GND	Module Ground	1
5	CML-I	Tx4-	Transmitter inverted data input	
6	CML-I	Tx4+	Transmitter non-inverted data input	
7		GND	Module Ground	1
8	LVTTL-I	MODSEIL	Module Select	2
9	LVTTL-I	ResetL	Module Reset	2
10		VCCRx	+3.3v Receiver Power Supply	
11	LVCMOS-I	SCL	2-wire Serial interface clock	2
12	LVCMOS-I/O	SDA	2-wire Serial interface data	2
13		GND	Module Ground	1
14	CML-O	RX3+	Receiver non-inverted data output	
15	CML-O	RX3-	Receiver inverted data output	
16		GND	Module Ground	1
17	CML-O	RX1+	Receiver non-inverted data output	
18	CML-O	RX1-	Receiver inverted data output	
19		GND	Module Ground	1
20		GND	Module Ground	1
21	CML-O	RX2-	Receiver inverted data output	
22	CML-O	RX2+	Receiver non-inverted data output	
23		GND	Module Ground	1
24	CML-O	RX4-	Receiver inverted data output	
25	CML-O	RX4+	Receiver non-inverted data output	
26		GND	Module Ground	1
27	LVTTL-O	ModPrsL	Module Present, internal pulled down to GND	
28	LVTTL-O	IntL	Interrupt output should be pulled up on host board	2
29		VCCTx	+3.3v Transmitter Power Supply	
30		VCC1	+3.3v Power Supply	
31	LVTTL-I	LPMode	Low Power Mode	2
32		GND	Module Ground	1
33	CML-I	Tx3+	Transmitter non-inverted data input	
34	CML-I	Tx3-	Transmitter inverted data input	
35		GND	Module Ground	1
36	CML-I	Tx1+	Transmitter non-inverted data input	
37	CML-I	Tx1-	Transmitter inverted data input	
38		GND	Module Ground	1

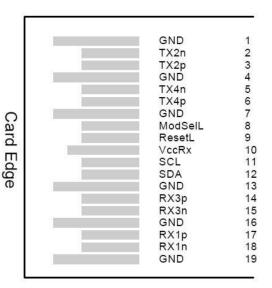
Notes:

- 1. Module circuit ground is isolated from module chassis ground with in the module.
- 2. Open collector; should be pulled up with 4.7k-10k ohms on host board to a voltage between 3.15V and 3.6V.

Electrical Pin-out Details



Top Side Viewed from Top



Bottom Side Viewed from Bottom

Mechanical Specifications

