

# Hybrid Passive Copper QSFP to SFP+ 10Gb/s Cables Datasheet

Mellanox's hybrid QSFP to SFP+ passive copper cables are compliant with SFF-8431 and SFF-8436 specifications and provide connectivity between devices using QSFP port on one end to an SFP+ port on the other end. The cables use state-of-the-art signal processing technology to fill the expanding need for cost-effective data center interconnects. Mellanox's unique quality passive copper cable solutions provide a power-efficient replacement for active power connectivity such as fiber optic cables. Optimizing systems to operate with Mellanox's hybrid QSFP to SFP+ passive copper cables significantly reduces power consumption and enlarges the connectivity opportunities of the system. Rigorous cable production testing ensures the best out-of-the-box installation experience, performance and durability.



Table 1 - Cable Specifications and Ordering Information

Maximum Reach @ 10Gb/s (m)	AWG	Part Number
1	30	MC2309130-001
2	30	MC2309130-002
3	30	MC2309130-003
4	24	MC2309124-004
5	24	MC2309124-005
7	24	MC2309124-007

Table 2 - Absolute Maximum Ratings

Parameter	Parameter Range
Operating Voltage	3V
Operating Case Temperature	0°C to 70°C
Storage Ambient Temperature	-10°C to 75°C

Table 3 - Operating Conditions

Parameter	Minimum	Typical	Maximum	Units
Supply Voltage	3.15	3.3	3.45	V
Data Rate per Lane	1.0	-	10.5	Gb/s

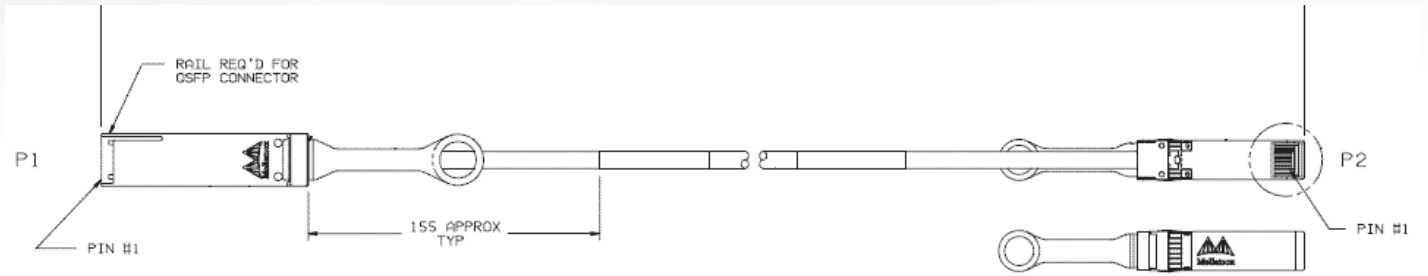
Table 4 - Physical Data

Parameter	Description	30 AWG	28 AWG	Units
Cable Diameter	-	4.5	6.5	mm
Bend Radius	Minimum Sustained Bend	25	35	mm

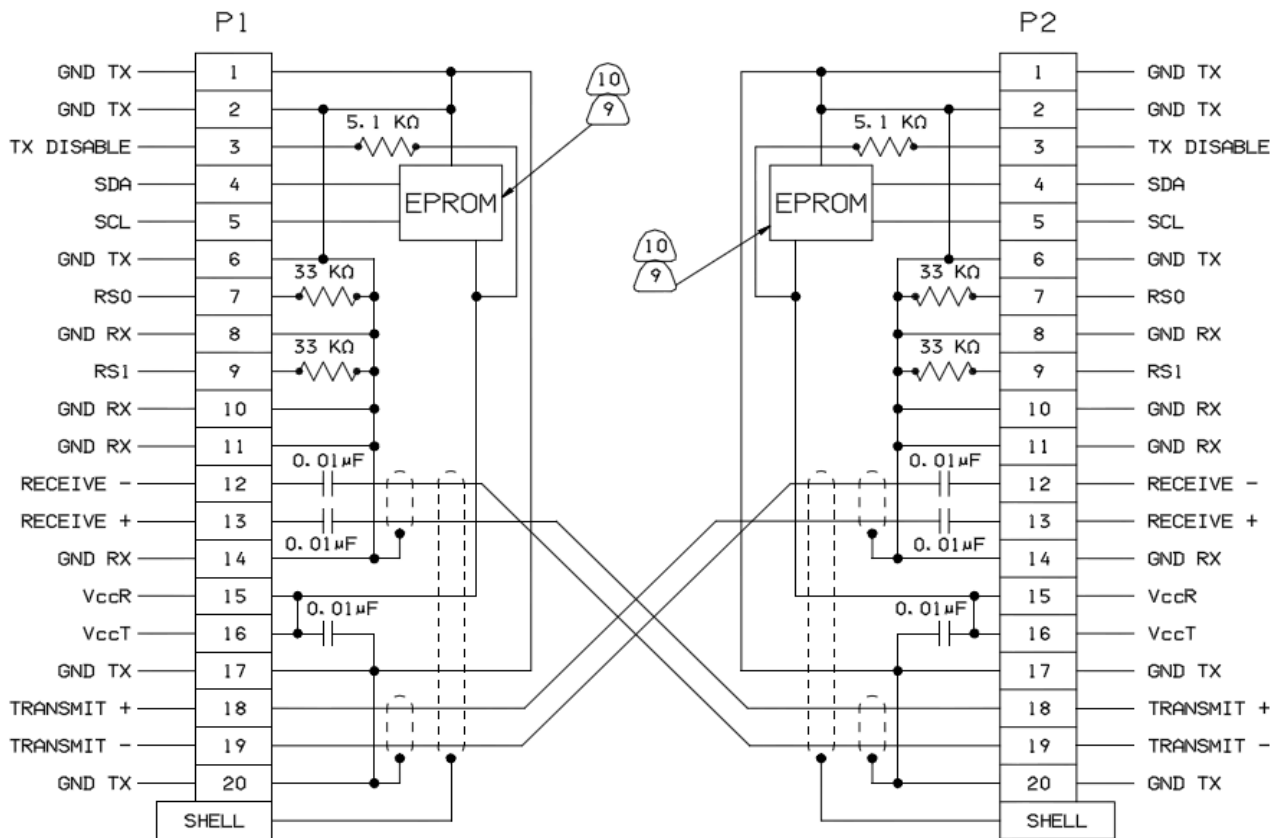
## HIGHLIGHTS

- Compliant to industry standards
  - *InfiniBand Architecture specification*
  - *QSFP MSA SFF-8436*
  - *SFP+ MSA SFF-8431*
- 100% production tested on Mellanox adapters and switches
- Superior signal integrity
- Bit Error Rate (BER) less than 10<sup>-15</sup>
- Low crosstalk
- Low insertion loss
- Matched impedance
- Secure latching mechanism
- Serial numbers printed at each end
- RoHS-5 compliant
- 1-year warranty

### Mechanical Information



### QSFP/SFP+ Connector Pinout



### Warranty Information

The Mellanox hybrid copper cables include a 1-year limited hardware warranty, which covers parts repair or replacement.

### Additional Information

For more information about Mellanox cable solutions, please contact your Mellanox Technologies sales representative or visit: [www.mellanox.com](http://www.mellanox.com) => Products => Cables and Modules



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