

MX

Mini-eXpanded Beam Optical Connectors



Lightweight, easy-to-deploy fiber connectivity solutions.

The MX connector series from Grass Valley, a Belden Brand, represents a major breakthrough for fiber in field production. Using advanced expanded beam technology, this is the most dependable, easiest to maintain fiber connector available.

Reliability by Design

Unlike conventional pin-and-socket butt-joint connectors, the MX mating interface consists of easy to clean lenses. There are no recesses to trap dirt or interfere with signal transfer. Cleaning is simply a matter of wiping off the lenses with a lint-free cloth. Fiber ends are protected from the elements and each other.

There is no physical contact between fibers or between mating lenses. Similarly, there are no fragile sleeves or alignment mechanisms to break.

Reliability means dependability, and you can depend on a more predictable, repeatable mating every time, thanks to expanded beam technology.



MX Mini-eXpanded Beam Optical Connectors

KEY FEATURES

- Expanded beam technology
- High reliability design
- Shell kits, cable adapter kits and inserts available for flexibility in design
- Small and lightweight
- Easy cleaning
- Two or four fiber versions
- Non-contacting design of mating fibers
- Single-mode or multimode
- Hermaphroditic operation
- Durable construction
- Proven in harsh environments
- Jam nut or flange mount receptacles
- Protective rubber plug grip
- Integral threaded dust covers

SPECIFICATIONS

Optical Performance

Insertion loss, typical:

- 1 dB, single-mode
- 0.8 dB, multimode

Insertion loss, max:

- 1.5 dB, single-mode
- 1 dB, multimode

Mechanical

Durability: Per IEC 61300-2-2, 3000 cycles, mate and unmate

Storage temp: -55° to 95° C (-67° to 203° F)

Operating temp: -40° to 85° C (-40° to 185° F)

Salt spray: Per IEC 60068-2-52 ,severity 1, 40° C (104° F), 93% RH, 4 cycles of 2 hours spraying followed by storage

Sealing immersion: Per IEC 60529, IPX8, 5m (16.4 ft.), 24 hours

Dust: Per IEC 60529, IP6X, 4 hours

Rain: Per IEC 60529, IPX4, 10 liters (2.64 gal.)/min, 1 hour

Bump: Per IEC 60068-2-29, EB, half sinusoidal, 50 Gb/s, 4,000 bumps, 6 directions

Vibration: Per TIA/EIA-455-11C, test cond. II, 10G, 10-500 Hz, 12 sweeps, 15 minutes each

Retention: Per TIA/EIA-455-6B, Meth 1,1000N, 10 minutes

Flex: Per TIA/EIA-455-1B, ±90°, 15 cycles/min for 10 minutes

Twist: Per TIA/EIA-455-36B, ±90°, 15 cycles/min for 1,000 cycles, 4 kg (8.8 lbs.) load

Free fall: Per IEC 60068-2-32, procedure 1, 1,200 mm (47.24 in.) height, 500 drops on concrete

ORDERING

Contact your Grass Valley representative.



GVB-1-0437A-EN-DS

WWW.GRASSVALLEY.COM

Join the Conversation at [GrassValleyLive](#) on Facebook, Twitter, YouTube and [Grass Valley - A Belden Brand](#) on LinkedIn.



Belden, Belden Sending All The Right Signals and the Belden logo are trademarks or registered trademarks of Belden Inc. or its affiliated companies in the United States and other jurisdictions. Grass Valley is a trademark or registered trademark of Grass Valley. Belden Inc., Grass Valley and other parties may also have trademark rights in other terms used herein.

Copyright © 2014 Grass Valley. All rights reserved. Specifications subject to change without notice.