

DIAMOND

Fiber Optic Components

CABLE ASSEMBLIES AND ADAPTERS

Unlike conventional ferrules, the Diamond lensed ferrule operates on the Expanded Beam principle. Setting new standards in terms of optical performance by using single-mode fibers, lensed ferrules are used for applications that were not suitable, until now, because of high optical requirements.

XB lensed ferrule

FEATURES

- ▶ High precision ferrule
- ▶ Single mode fiber 9µm
- ▶ Low insertion Loss
- ▶ Similar RL to standard contact connectors
- ▶ High power reliability

XB2 connectors

FEATURES

- ▶ Push-Pull
- ▶ 2 channel
- ▶ Contactless connection
- ▶ 900µm Fiber or 2mm Cable
- ▶ Easy Cleaning
- ▶ Mating durability: 500 cycling
- ▶ Max 3W at 1550nm
- ▶ Field repair

STANDARDS

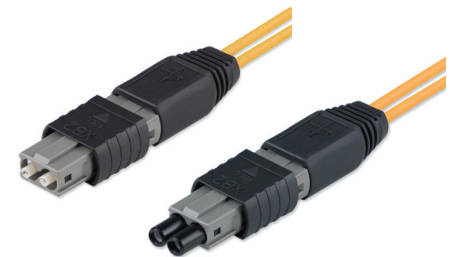
- ▶ Performance standard IEC 61753-1
- ▶ RoHs compliant
- ▶ Reach

XB2

Compact Lensed Ferrule Technology



Lensed ferrule



XB2 male and female connectors



XB2 adapter

OPTICAL SPECIFICATIONS

MEASUREMENT / TEST	METHOD	VALUES SINGLE MODE
Insertion loss, random mated	IEC 61300-3-34	IL type 0.6 dB max 1 dB
Return loss	IEC 61300-3-6	RL min. 35 dB

MECHANICAL AND ENVIRONMENTAL CONDITIONS

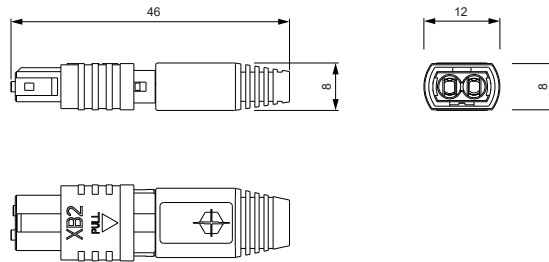
MEASUREMENT / TEST	METHOD	VALUES
Change of temperature (Reliability)	IEC 61300-2-22	-25°C / +70°C / 1 h
Cold	IEC 61300-2-17	-25°C / 96 h
Dry heat (Reliability)	IEC 61300-2-19	+40°C / 96 h
Damp heat, cyclic	IEC 61300-2-46	+25°C / +55°C / 95% r.h. / 144 h
Fibre retention	IEC 61300-2-6	40 N / 2 min
Vibration, sinusoidal	IEC 61300-2-1	10 Hz - 55 Hz / 30 min
Mating durability	IEC 61300-2-2	500 cycles

DRAWINGS AND DIMENSIONS

XB2 MALE AND FEMALE CONNECTORS

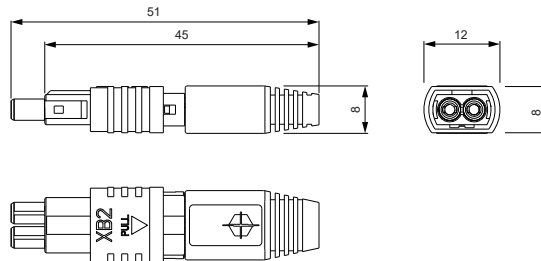
XB2 male connector

Ferrule material: Zirconia/Lense
 External parts: Plastic



XB2 female connector

Ferrule material: Zirconia/Lense
 External parts: Plastic



XB2 adapter

