

DATA SHEET

TB842 Compact Product Suite hardware selector



TB842 ModuleBus Optical Port is a communication interface between the Cl801 or Cl840/Cl840A FCI and the TB820/TB820V2/TB840/TB840A ModuleBus modem of an I/O cluster or ABB drives units via the Optical ModuleBus. TB842 connects to Cl801 via TB806 and to Cl840/Cl840A via TU847 and TB806 for single I/O or via TU846 and TB846 for redundant I/O.

TB842 can be used in both a simplex optical configuration as well as in a duplex optical configuration. In a simplex configuration, the optical ModuleBus nodes are connected in a ring. In a duplex configuration, the optical ModuleBus nodes are connected in a row. TB842 has a connector for fiber optic connections and a connection to the communication interface module.

The module is equipped with a Transmitter/Receiver for up to 10 Mbit/s. Both plastic and HCS (Hard Clad Silica) optic fiber with connectors (Agilent's, former Hewlett-Packard, Versatile Link) can be used with the TB842. A Modulebus must have the same type of transmitter/receiver on each node.

Features and benefits

• 1 fiber optic port for the Optical ModuleBus expansion

Connection to CI801 and CI840/CI840A

More info

Opto Cable for TB842 according to HP.

Plastic Optical Fiber (POF) (TK811V... or TK812V...) up to 15 meters.

- Extra low loss attenuation
- Simplex or duplex cable
- Latching simplex or duplex connector.
- Cable attenuation maximum 4 dB Hard Clad Silica (HCS) fiber up to 200 meters.
- Riser or plenum
- Simplex or duplex cable
- Latching simplex or duplex connector
- ${\scriptstyle \bullet}$ Cable attenuation maximum 2 dB

| General info | | |
|----------------------------------|------------------------|--|
| Article number | 3BSE022464R1 | |
| Communication protocol | Modulebus | |
| Master or slave | N/A | |
| Line redundancy | Yes | |
| Module redundancy | Yes | |
| Hot Swap | Yes | |
| Used together with HI Controller | No | |
| Mounting | Vertical or Horizontal | |

| Detailed data | | |
|--------------------------------|---|--|
| Connector | Agilent's, former Hewlett-Packard, Versatile Link | |
| 24 V consumption typ. | 20 mA | |
| ModuleBus current distribution | Fiber optic interface, one transmit and one receive connection for max. 10 Mbit/s. Wavelength 650 nm | |
| Power dissipation | 0.5 W | |

| Environment and certification | | |
|-------------------------------|---|--|
| CE- marking | Yes | |
| Electrical Safety | EN 61010-1, UL 61010-1, EN 61010-2-201, UL 61010-2-201 | |
| Hazardous location | cULus Hazardous Location Class1 Zone 2, ATEX Zone 2 | |
| Marine certificates | ABS, BV, DNV-GL, LR | |
| Temperature, Operating | 0 to +55 °C (+32 to +131 °F), approvals are issued for +5 to +55 °C | |
| Temperature, Storage | -40 to +70 °C (-40 to +158 °F) | |
| Relative humidity | 5 to 95 %, non-condensing | |
| Max ambient temperature | 55 °C (131 °F), for vertical mounting 40 °C (104 °F) | |
| Equipment class | Class I according to IEC 60536; (earth protected) | |
| Ingress protection | IP20 according to IEC 60529 | |
| RoHS compliance | DIRECTIVE/2011/65/EU (EN 50581:2012) | |
| WEEE compliance | DIRECTIVE/2012/19/EU | |

| Dimensions | | |
|------------|------------------|--|
| Width | 17.6 mm (0.69") | |
| Height | 56.7 mm (2.23") | |
| Depth | 42.3 mm (1.67") | |
| Weight | 90 g (0.20 lbs.) | |



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