

TBE-D5016-GMI-003

16-pos Term. Board for D5000/D6000 Series with Terminals

This Termination Board with Enclosure (TBE) provides terminals for the direct connection between the I/O Card of the system and D5000 / D6000 Series modules.

The Intrinsically Safe protection and signal isolation between Safe and Hazardous Area, is provided by D5000 Series Associated Apparatus. The 24 Vdc Power Supply of the TBE is connected to two plug-in terminal blocks, for a redundant power supply.

FEATURES

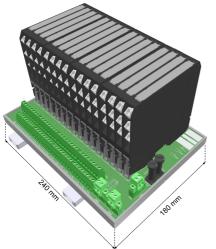
- Universal board interfaces with terminals
- 16 positions Termination Board for up to 32 channels
- Zone 2 Installation (pending)
- Power supplies fault monitoring
- Mounting hardware provided for single DIN Rail mounting kit

SUPPORTED CARDS & MODULES

SYSTEM	I/O CARD	CARDS / BOARDS	MODULES
Any	Al 16 ch	1	D5011S, D5014S, D5015S*, D5016S*, D5072S, D6001S, D6011S, D6014S, D6015S*, D6016S*, D6017S*, D6072S
Any	Al 16 ch	2	D5011D, D5014D, D5016D*, D5072D, D6001D, D6011D, D6014D, D6016D*, D6072D
Any	AO 16 ch	1	D5020S, D6001S, D6020S
Any	AO 16 ch	2	D5020D, D6001D, D6020D
Any	DI 16 ch	1	D5031S, D5032S, D5034S, D5037S, D5038S*, D5093S, D6001S, D6031S, D6032S, D6034S, D6037S, D6038S*
Any	DI 16 ch	2	D5031D, D5032D, D5034D, D5037D, D5038D*, D5038X*, D5093D, D6001D, D6031D, D6032D, D6034D, D6037D, D6038D*, D6038X*
Any	DO 16 ch	1	D5040S, D5048S, D5049S, D5090S, D5091S, D5094S, D5095S, D5096S, D5097S, D5098S, D5099S, D6001S
Any	DO 16 ch	2	D5040D, D5098D, D5099D, D6001D

For more detailed information, refer to Instruction Manual.

TERMINATION BOARD IMAGE



TECHNICAL DATA

General

Number of positions: 16 Maximum number of channels: 32

Supply

24 Vdc nom (20 to 30 Vdc), reverse polarity protected, double terminal blocks for redundant power supply, with OR diodes to mix supply voltages.

Max allowed current consumption: 1.5 A (as total supply). Connection: by polarized plug-in disconnect screw terminal blocks to accommodate terminations up to 2.5 mm², screw fix. Protection fuse: 4 A time lag.

Fault detection

The on-board diagnostic monitors both power supplies integrity and the module cumulative fault. Any malfunction is reported by deactivating a solid-state relay and activating the corresponding LEDs. Alarm is issued if:

1) Power supply 1 or 2 < 17 Vdc or

2) Power supply 1 or 2 > 33 Vdc or

3) Module cumulative fault ON.

Alarm is removed if:

1) 20 Vdc < Power supply 1 and 2 < 30 Vdc and

2) No module cumulative fault.

Ouptut rating: 100 mA 35 V (≤ 1 V voltage drop).

I/O Card Interface

Connection: 32+32 screw terminal blocks to accommodate terminations up to 2.5 mm², with exact correspondence to module 1-to-4 terminals.

Environmental conditions

Operating temperature: temperature limits -40 to +70 °C. **Max altitude:** 2000 m a.s.l.

Storage temperature: temperature limits -45 to +80 °C.

Mounting

Hardware included for mounting on single DIN-rail 35 mm. Weight: about 1.4 kg, excluding modules. Location: installation in Safe Area/Zone 2 (pending). Dimensions: Width 240 mm, Depth 180 mm, Height 154 mm.

ORDERING INFORMATION

Ordering codes TBE-D5016-GMI-003



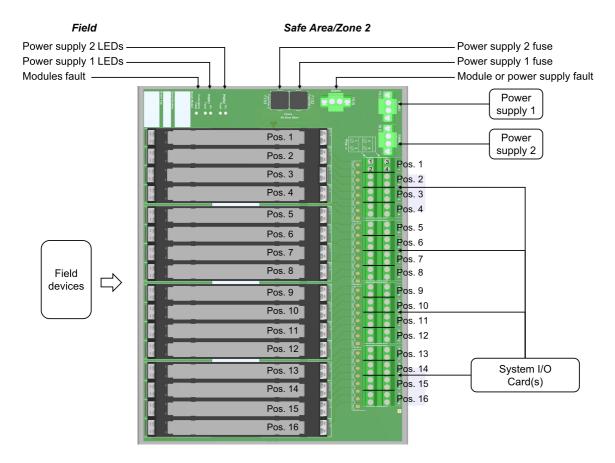
Functional Safety Management Certification: GM International is certified to conform to IEC61508:2010 part 1 clauses 5-6 for safety related syste www.gminternational.com

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FUNCTION DIAGRAM

Additional installation diagrams may be found in Instruction Manual.



Temp. TMP0031 Rev.1

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