# HART Termination Board HiSHPTB/32/YOK-AI-R-02



- Yokogawa Centum 3000 CS AAI135 replacement FTA
- 32 channels of I/O

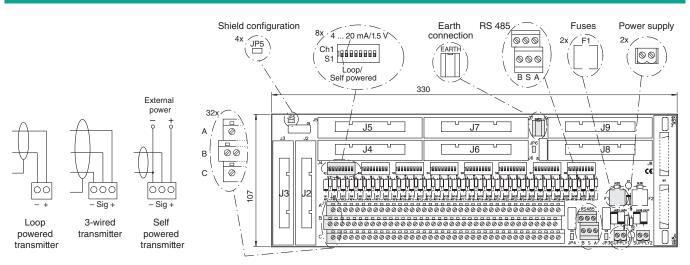
- 2- or 3-wire or self powered transmitters
- Short-circuit protected
- Plug-n-play wiring capabilities



#### Function

The Termination Board designed for easy HiDMux2700 Multiplexer integration with the Yokogawa Centum 3000 CS system. With the Multiplexer integrated into the board and plug-n-play option for the DCS equipment, this provides a very clean access to the HART signals, while reducing the need for marshalling cabinets and reducing equipment that require extra cabinet space. The HART Termination Board provides a robust solution for on-line HART communications, interfaces up to 32 field located HART devices, and, it allows the user to replace standard DCS field termination panels.

#### Connection



#### **Technical Data**

Release date: 2022-02-18 Date of issue: 2022-02-18 Filename: 907236\_eng.pdf

Supply		
Rated voltage	Ur	20 30 V DC
Fusing		3.15 A , 5 x 20 mm (0.2 x 0.8 inch)
Power dissipation		0.7 W , with Multiplexer
Reverse polarity protection		no
HART signal channels (intrinsically safe)		
HART signal channels		
Number of channels		32 unbalanced signal loops
Redundancy		
Supply		no
Galvanic isolation		

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### HART Termination Board

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HART signal channels	30 V DC
Ambient conditions	
Ambient temperature	0 55 °C (32 131 °F)
Relative humidity	5 90 %, non-condensing
Mechanical specifications	
Core cross section	2.5 mm <sup>2</sup> (16 AWG)
Connection	field side: screw terminals control side: KS connector (proprietary) RS 485 interface: removable screw terminals power: removable screw terminals
Mass	approx. 500 g
Dimensions	330 x 107 x 208 mm (12.9 x 4.2 x 8.2 inch) (W x H x D) , depth including module assembly with HiDMux2700
Mounting	DIN rail mounting
General information	
Supplementary information	Observe the certificates, declarations of conformity, instruction manuals, and manuals where applicable. For information see www.pepperl-fuchs.com.

 Refer to "General Notes Relating to Pepperl+Fuchs Product Information".

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#### **Additional Information**

#### **Connection assignment**

Connector	Channels
J1	Channel 1 32
J2	Channel 1 8, primary
J3	Channel 1 8, secondary
J4	Channel 9 16, primary
J5	Channel 9 16, secondary
J6	Channel 17 24, primary
J7	Channel 17 24, secondary
J8	Channel 25 32, primary
J9	Channel 25 32, secondary

#### Configuration

		Switch	Field and DCS have the same signal (4 mA 20 mA or 1 V 5 V)	sign	vert a 4 mA 20 mA al from the field into the 5 V signal for DCS	Switch	Self powered device	Loop powered device
S1	Channel 1	1	Off		On		Off	On
	Channel 2	3	Off			4	Off	On
	Channel 3	5	Off	On		6	Off	On
	Channel 4	7	Off	On		8	Off	On
S2	Channel 5	1	Off		On		Off	On
	Channel 6	3	Off	On		4	Off	On
	Channel 7	5	Off	On		6	Off	On
	Channel 8	7	Off	On		8	Off	On
S3	Channel 9	1	Off	On			Off	On
	Channel 10	3	Off	On		4	Off	On
	Channel 11 5		Off	On		6	Off	On
	Channel 12	7	Off	On		8	Off	On
S4	Channel 13	1	Off	On	On		Off	On
	Channel 14 3		Off	On		4	Off	On
	Channel 15	5	Off	On		6	Off	On
	Channel 16	7	Off	On		8	Off	On
S5	Channel 17	1	Off	On		2	Off	On
	Channel 18	3	Off	On		4	Off	On
	Channel 19	5	Off	On		6	Off	On
	Channel 20	7	Off	On		8	Off	On
S6	Channel 21	1	Off	On		2	Off	On
	Channel 22 3		Off	On		4	Off	On
	Channel 23 5		Off	On		6	Off	On
	Channel 24 7		Off	On		8	Off	On
S7	Channel 25	1	Off	On		2	Off	On
	Channel 26 3		Off	On		4	Off	On
	Channel 27 5		Off	On		6	Off	On
	Channel 28 7		Off	On		8	Off	On
S8	Channel 29 1		Off	On		2	Off	On
	Channel 30 3		Off	On		4	Off	On
	Channel 31 5		Off	On		6	Off	On
	Channel 32	Channel 32 7 Off		On		8	Off	On
Jump	Jumper Analog input			Galvanic grounding Capacitive gr		Capacitive groun	ding	
JP3	RS	485			closed opened			
JP4	Fiel	d side chann	els 1 32		closed opened			
IP5	JP5 DCS side channels 1 16			closed opened				

JP6

Refer to "General Notes Relating to Pepperl+Fuchs Product Information"

DCS side channels 17 ... 32

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opened

#### HiSHPTB/32/YOK-AI-R-02

## HART Termination Board

Yokogawa I/O interface

• AAI135

Refer to "General Notes Relating to Pepperl+Fuchs Product Information".

