

Transmitter for Digital Signals Type G 3420 5502



- 8-channel transmitter
- 8 opto-isolated voltage inputs: 6 to 265 VAC/DC
- H4-housing
- For mounting on DIN-rail (EN 50022)
- LED-indications for supply, input activated and Dupline® carrier
- AC or DC power supply
- Channel coding by GAP 1605

Product Description

Dupline® transmitter for external supply. Detects the signals from 8 devices with voltage outputs of up to 265 VAC/DC, e.g. the presence of mains supply to machinery.

Ordering Key

G 3420 5502 024

Type: Dupline® _____
 H4-housing _____
 Transmitter _____
 No. of channels _____
 Input type _____
 Power supply _____

Type Selection

Supply	Ordering no. 8 channels 6 to 265 VAC/DC
24 VAC	G 3420 5502 024
115 VAC	G 3420 5502 115
230 VAC	G 3420 5502 230
10 to 30 VDC	G 3420 5502 800

Input Specifications

Inputs	8 voltage-type
Input voltage range V_{BB}	6 to 265 VAC/DC
Frequency range on AC	45 to 400 Hz
Input voltage for signal "0"	≤ 1 VAC/DC
Input voltage for signal "1"	≥ 6 VAC/DC
Input current for signal "1"	Typ. 10 mA (V_{BB} 10-18 VDC) lower at other input voltages
Input current limiter	Yes
Inrush current	≤ 450 mA (at $V_{BB} = 265$ VDC)
Operating time for signal "1"	≤ 1 pulse train + 3 ms
Operating time for signal "0"	≤ 1 pulse train + 50 ms
Cable length	≤ 25 m
Dielectric voltage Inputs - Dupline®	≥ 4 kVAC (rms)

Supply Specifications

Power supply AC types	Overvoltage cat. III (IEC 60664)
Rated operational voltage through term. 21 & 22	230 VAC, $\pm 15\%$
115	115 VAC, $\pm 15\%$
024	24 VAC, $\pm 15\%$
Frequency	45 to 65 Hz
Voltage interruption	≤ 40 ms
Rated operational power	Typ. 4.5 VA
Power dissipation	≤ 8 W
Rated impulse withstand voltage	4 kV
230	2.5 kV
115	800 V
024	
Dielectric voltage Supply - Dupline®	≥ 4 kVAC (rms)
Supply - Inputs	≥ 4 kVAC (rms)
Power supply DC type	Overvoltage cat. III (IEC 60664)
Rated operational voltage through term. 21 & 22	10 to 30 VDC (ripple included)
800	≤ 3 V
Ripple	Yes
Reverse-polarity protection	Yes
Power consumption	< 1 W
Power dissipation	≤ 5.5 W
Inrush current	≤ 1 A
Rated impulse withstand voltage	800 V
Dielectric voltage Supply - Dupline®	≥ 200 VAC (rms)
Supply - Inputs	≥ 4 kVAC (rms)

General Specifications

Power ON delay	Typ. 2 s
Power OFF delay	≤ 1 s
Output OFF delay upon loss of Dupline [®] carrier	≤ 20 ms
Indication for Supply ON Input activated Dupline [®] carrier	LED, green LED, red LED, yellow
Environment Degree of protection Pollution degree Operating temperature Storage temperature	IP 20 3 (IEC 60664) -20° to +50°C (-4° to +122°F) -50° to +85°C (-58° to +185°F)
Humidity (non-condensing)	20 to 80%
Mechanical resistance Shock Vibration	15 G (11 ms) 2 G (6 to 55 Hz)
Dimensions Material (see "Technical Information")	H4-housing
Weight	250 g

Mode of Operation

8-channel transmitter with 8 voltage inputs (6 to 265 VAC/DC). stops transmitting on the respective channel.

Each input may be coded individually by means of the code programmer GAP 1605. For details, please refer to the respective data sheet.

When a voltage (6 to 265 VAC/DC) is applied to terminal 25 (input 1), the transmitter transmits on the channel coded for input 1.

Whenever the voltage of the input is < 1 V, the transmitter

Notes:

- Terminals 4 and 24 are internally connected.
- Terminals 4 and 24 are common (minus).

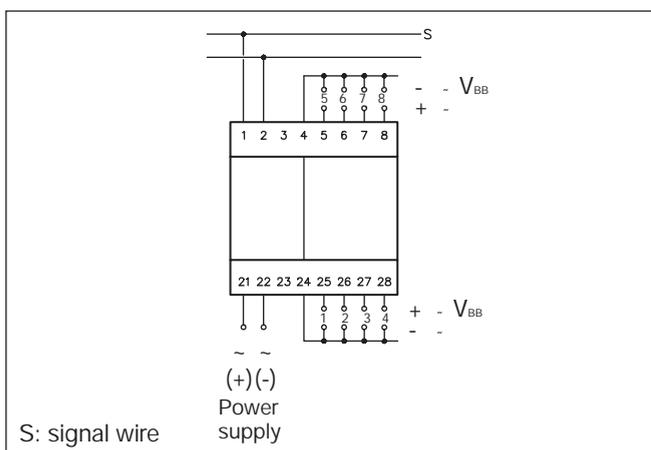
Input connections

- Input 1: terminals 24 & 25
- Input 2: terminals 24 & 26
- Input 3: terminals 24 & 27
- Input 4: terminals 24 & 28
- Input 5: terminals 4 & 5
- Input 6: terminals 4 & 6
- Input 7: terminals 4 & 7
- Input 8: terminals 4 & 8

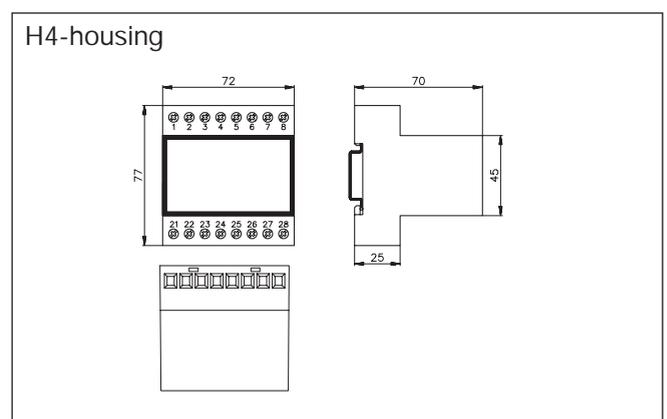
Operation Diagram



Wiring Diagram



Dimensions (mm)



Accessories

DIN-rail FMD 411

For further information, see "Accessories".