

Receiver with Demultiplex Output Type D 1230 5111



- 8-channel receiver
- 8 : 1 demultiplex function
- 2 NPN transistor outputs
- Enable and disable output operation
- D-housing
- Plug-in type module
- LED-indications for supply and output
- AC or DC power supply

Product Description

Dupline® receiver with demultiplex output (8:1) for multiplex transmission on Dupline® channels. Applicable for transmitters with frequency input

(type FFD 1680, SPEC 918). Increases the transmission capacity of a Dupline® system to max. 3825 x 8-bit measured values.

Ordering Key

D 1230 5111 024

Type: Dupline®
D-housing
Receiver
No. of channels
Output type
Supply

Type Selection

Supply	Ordering no. 8 channels 2 x 10 V/10 mA
24 VAC	D 1230 5111 024
120 VAC	D 1230 5111 120
220 VAC	D 1230 5111 220
12 VDC	D 1230 5111 712

Code Module: No code module required. D 1230 5111 automatically uses the highest available channel group of the Dupline® installation.

Output Specifications

Outputs	1 NPN transistor (enable)	1 NPN transistor (disable)
Output voltage V_{BB}	10 VDC	10 VDC
Reverse polarity protection	Yes	Yes
Current per output	≤ 2.5 mA	≤ 2.5 mA
Total load capability	100%	100%
Short-circuit protection	None	None
Built-in protective diodes	None	None
Off-state leakage current	≤ 100 µA	≤ 100 µA
Output voltage drop	≤ 1.2 V	≤ 1.2 V
Cable length	≤ 3 m	≤ 3 m
Dielectric voltage Output - Dupline®	≥ 2 kVAC (rms)	None
Response time	< 1 pulse train	< 1 pulse train

Supply Specifications

Power supply AC types	Overvoltage cat. III (IEC 60664)
Rated operational voltage through pins A1 & A2	220 230 VAC +6%, -15% (IEC 60038) 120 120 VAC ± 10% (IEC 60038) 024 24 VAC ± 10%
Frequency	45 to 65 Hz
Voltage interruption	≤ 40 ms
Rated operational power	Typ. 2.5 VA
Rated impulse withstand voltage	220 4 kV 120 2.5 kV 024 800 V
Dielectric voltage Supply - Dupline®	≥ 2 kVAC (rms)
Supply - Outputs	≥ 2 kVAC (rms)
Alternative DC supply (V_{DD} in) through pins 3 & 9	12 VDC ± 10%
Reverse polarity protection	Yes
Rate operational current	≤ 20 mA
Inrush current	≤ 1 A
Rated impulse withstand voltage	800 V
Dielectric voltage Supply - Dupline®	None
Supply - Enable output	≥ 2 kVAC (rms)
Supply - Disable output	None
AC types as supply source	
Source voltage (V_{DD} out) through pins 3 & 9	12 VDC
Source current	≤ 40 mA
Fan out	≤ 4 modules 700
Cable length	≤ 3 m

General Specifications

Output OFF delay upon loss of Dupline® carrier	Undefined	Humidity (non-condensing)	20 to 80%
Power ON delay	Undefined, ≤ 1 s	Mechanical resistance Shock Vibration	15 G (11 ms) 2 G (6 to 55 Hz)
Indication for Supply ON Output ON (enable)	LED, green LED, red	Dimensions Material (see "Technical Information")	D - Housing
Environment Degree of protection Pollution degree Operating temperature Storage temperature	IP 40 3 (IEC 60664) -20° to +50°C (-4° to +122°F) -50° to +85°C (-58° to +185°F)	Weight AC types DC types	200 g 125 g

Mode of Operation

8-channel receiver with de-multiplexed outputs for enable and disable functions.

The receiver continuously receives the status of 8 channels on the highest channel group of a Dupline® installation (e.g. channel group P if 128 channels are selected on the channel generator). The status of these 8 channels is compared with the address selected by the DIP switch selector inside the D 1230 5111. As soon as the trans-

mitted channel status is equal to the selected address, the two outputs change state (enable output turns on and disable output turns off).

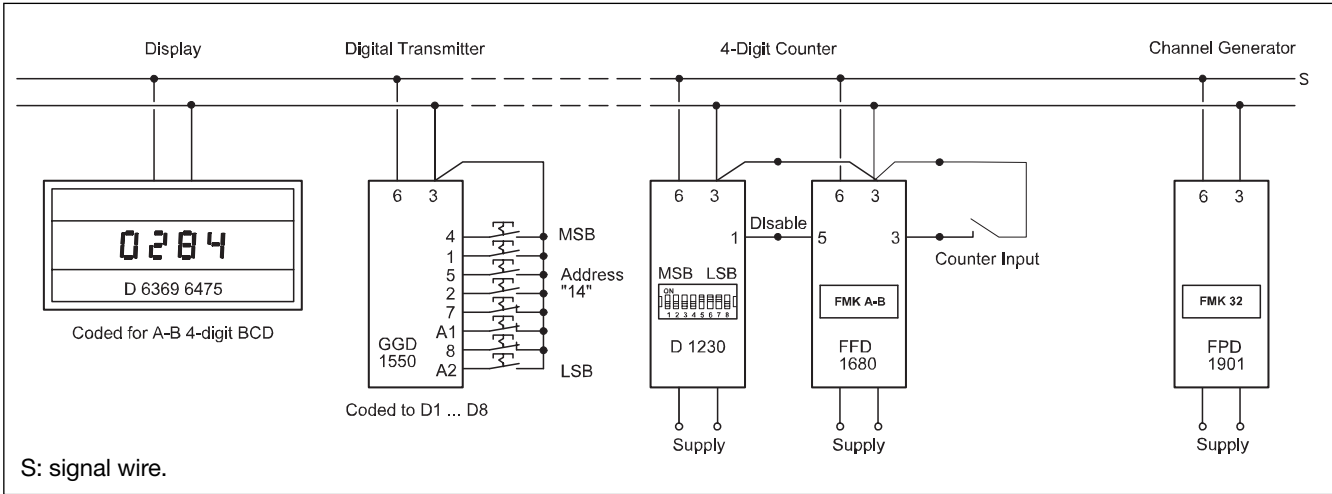
This module used in connection with transmitters for analogue signals (type FFD 15..) allows the transmission of 255 individual analogue values on one channel group. The D 1230 5111 can be used for all Dupline® transmitters that have enable or disable inputs, e.g. FFD 15.., FFD 16.. or SPEC 918.

In the example given below the Dupline® installation uses 32 channels (FMK 32 of the channel generator). Therefore, the address setup of the D 1230 5111 is compared with the status of channel group D. As soon as the status of channel group D (provided by the transmitter GGD 1550) is equal to the address setup, the disable output of the D 1230 5111 turns off. This causes the FFD 1680 to transmit the counter value on channel groups A-B for dis-

play on the D6369 6475 (coded for channel groups A-B).

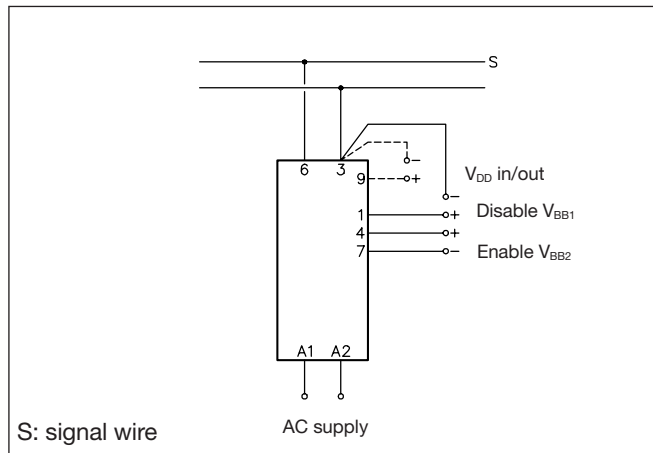
Note: If DC-supplied D 1230 5111 receivers are used, the length of the supply bus must not exceed 3 m in order to avoid disturbance unbalancing the Dupline®.

Example

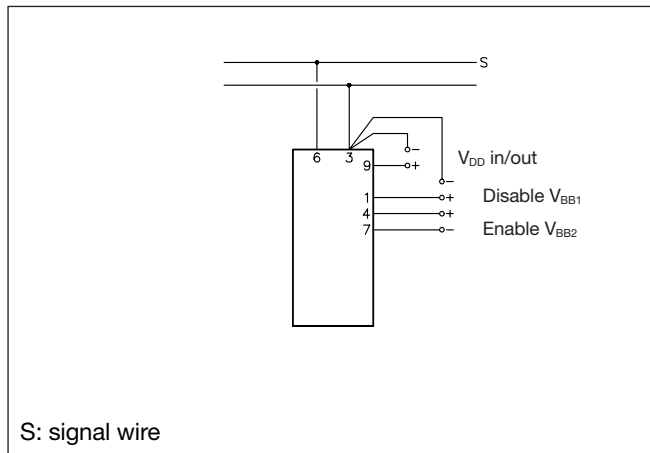


Wiring Diagrams

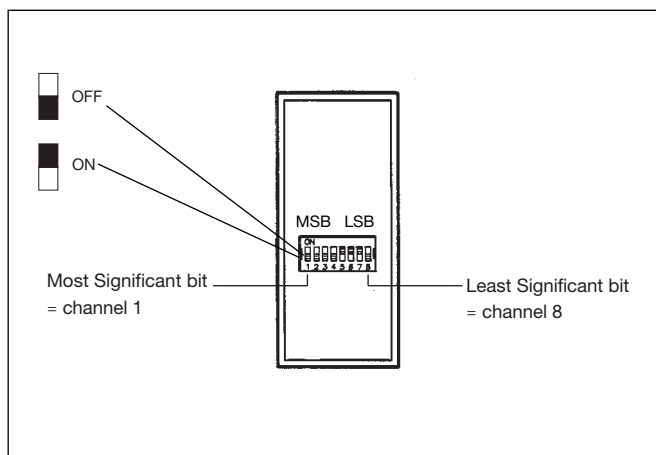
D 1230 5111 024/120/220
AC supply (DC supply V_{DD})



D 1230 5111 712
DC supply



Address Selection



Accessories

Socket	D 411
Socket cover	BB 5
Hold down spring	HF
Front mounting bezel	FRS 2
DIN-rail for D 411	FMD 411

For further information refer to "Accessories".