

# **UNITRONIC® BUS PB FD P A**

Halogenfree, highly flexible PROFIBUS cable - UL/CSA certified

Bus cable for PROFIBUS-DP, -FMS and FIP. UL/CSA approved, Halogen free and enhanced flame retardance. Temperature range from -40 °C bis +80 °C

### Info

A for Advanced

here: UL and CSA certifications









Halogen-free



Oil-resistant



Power chain

## **Benefits**

For use where the combination of a halogen-free outer sheath with properties similar to PUR and enhanced flame-retardance is required

Cables can be used for PROFIBUS-DP as well as PROFIBUS-FMS and FIP

# **Application range**

PROFIBUS DP (in accordance with DIN 19245 and EN 50170, e.g. for SIEMENS SIMATIC® NET, also suitable for FIP - Factory Instrumentation Protocol).

For highly flexible applications (power chains, moving machine parts)

Suitable for torsional applications which are typical for the loop in wind turbine generators (WTG)

# **Product features**

Halogen-free Flame-retardant according IEC 60332-1-2 Oil-resistant

Last Update (10.12.2022)
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Product Management www.lappkabel.de
You can find the current technical data in the corresponding data sheet.
PN 0456 / 02\_03.16



# UNITRONIC® BUS PB FD P A

Based on the bit rates listed, in accordance with PNO specifications the following maximum cable lengths for a bus segment apply (cable type A, PROFIBUS-DP):

93.75 kbit/s = 1200 m 187.5 kbit/s = 1000 m 500 kbit/s = 400 m 1.5 Mbit/s = 200 m 12.0 Mbit/s = 100 m

# Norm references / Approvals

Certification: UL/CSA type CMX in accordance with UL 444 and CSA C22.2 no. 214

# **Product Make-up**

Stranded bare copper wire

Core insulation: foam skin, (O2YS)

Overall screening with copper braid and plastic-laminated aluminium foil

Outer sheath: PUR, violet (RAL 4001)

# **Technical Data**

Classification ETIM 5: ETIM 5.0 Class-ID: EC000830

ETIM 5.0 Class-Description: Data cable

Classification ETIM 6: ETIM 6.0 Class-ID: EC000830

ETIM 6.0 Class-Description: Data cable

Mutual capacitance: (800 Hz): max. 30 nF/km

Peak operating voltage: (not for power applications) 250 V

Minimum bending radius: 65 mm

Test voltage: Core/core: 1500 V rms

Characteristic impedance:  $150 \pm 15 \text{ Ohm}$ 

Temperature range: Flexing: -30°C to +70°C

Fixed installation: -40°C to +80°C

### Note

Unless specified otherwise, the shown product values are nominal values. Detailed values (e.g. tolerances) are available upon request

Copper price basis: EUR 150/100 kg. Refer to catalogue appendix T17 for the definition and calculation of copper-related surcharges.

Please find our standard lengths at: www.lappkabel.de/en/cable-standardlengths

Packaging size: coil ≤ 30 kg or ≤ 250 m, otherwise drum

Please specify the preferred type of packaging (e.g.  $1 \times 500$  m drum or  $5 \times 100$  m coils).

SIMATIC® is a registered trademark of SIEMENS AG. FIP is a registered trademark of World FIP

Lapp Kabel is a member of the PROFIBUS user organisation (PNO)

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Prices are net prices without VAT and surcharges. Sale to business customers only.



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Article number		Number of pairs and conductor diameter (mm)	Outer diameter [mm]	Copper index (kg/km)	Weight (kg/km)
Highly flexible application					
2170822	UNITRONIC® BUS PB FD P A	1 x 2 x 0.64	8	30.1	58