


U.I. Lapp GmbH	PRODUCT INFORMATION	
		12.09.2012

For serial transmission of safety-oriented data



Automation



Industrial machinery and plant engineering



Power chain

Application range

For fixed installation and highly flexible applications

For systems such as SafetyBUS p®, based on the well-known CAN bus system

Design

Stranded conductor, 3 cores twisted, colour-coded in accordance with DIN 47100 (white, brown, green), copper braiding, halogen-free outer sheath

UNITRONIC® BUS SAFETY FD P is as per UNITRONIC® BUS SAFETY, but also suitable for highly flexible applications

Flame-retardant according IEC 60332-1-2

Product features

The stated bit rates result in the following cable lengths (maximum) for a bus segment:

500 kbit/s = max. 100 m

250 kbit/s = max. 250 m

125 kbit/s = max. 500 m

50 kbit/s = max. 1,000 m

Remark

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

Copper price basis: EUR 150/100kg. 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 x 500 m drum or 5 x 100 m coils).

SafetyBUS p® is a registered trademark of Pilz GmbH & Co.

Photographs are not to scale and do not represent detailed images of the respective products.

Product Management	Document: LAPP_PRO279EN.pdf	1 / 3
--------------------	-----------------------------	-------

U.I. Lapp GmbH	PRODUCT INFORMATION	
		12.09.2012

Technical Data

Approvals:	Version UNITRONIC® BUS SAFETY FC: AWM Style 2464 (80 °C 300 V)
Mutual capacitance:	(800 Hz): max. 45 nF/km
Peak operating voltage:	(not for power applications) 250 V
Conductor resistance:	(loop): max. 52 ohm/km
Minimum bending radius:	Fixed installation: 10 x cable diameter
Test voltage:	Core/core: 3000 V Core/core: 1500 V (FD- version)
Temperature range:	UNITRONIC BUS SAFETY: Fixed installation: -30 °C to +80 °C UNITRONIC BUS SAFETY FD P: Fixed installation -40 °C to +80 °C Moved: -30 to +80 °C
Characteristic impedance:	120 ohm

Product Management	Document: LAPP_PRO279EN.pdf	2 / 3
--------------------	-----------------------------	-------



12.09.2012

Part number	Article designation	Number of cores and mm ² per conductor	Outer diameter (mm)	Copper index (kg/km)	Weight (kg/km)
for fixed installation					
2170295	UNITRONIC® BUS SAFETY	3 x 0,75	7.6	49.0	68
For highly flexible applications (e.g. power chains)					
2170885	UNITRONIC® BUS SAFETY FD P	3 x 0,75	7.8	49.0	68