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|-----------------------------------|-------------------------|-------------------------------------------------------------------------------------|
| <b>0034220</b>                    | <b>DATA SHEET</b>       |  |
| <b>valid from:<br/>2026-06-16</b> | <b>JE-LiYCY...BD EB</b> |                                                                                     |

## Application

JE-LiYCY...BD EB is a connecting cable for industrial electronics. It can be used in measurement and control engineering and also as pulse and data transmission cable.

With the blue outer sheath the cable is designed for the installation of intrinsically safe circuits in hazardous (explosive) areas.

The cable meets the requirements of EN 60079-14 (VDE 0165-1) where a special marking for cables of hazard type "i" (intrinsically safe) is specified.

The cable is suited for limited flexing use and fixed installation in dry and wet rooms on and under plaster.

## Design

|               |                                                                                                                                                                             |
|---------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Design        | acc. to VDE 0815, Table 5<br>Type JE-LiYCY...BD                                                                                                                             |
| Certification | Classification of fire behaviour<br>according to EN 13501-6 and EN 50575<br>(article/dimension range see <a href="http://www.lappkabel.com/cpr">www.lappkabel.com/cpr</a> ) |
| Outer sheath  | Colour of the sheath: sky blue (similar RAL 5015)                                                                                                                           |

## Electrical properties at 20 °C

|                           |                                                                                                   |
|---------------------------|---------------------------------------------------------------------------------------------------|
| Loop resistance           | max. 78.4 Ω/km                                                                                    |
| Insulation resistance     | min. 100 MΩ/km                                                                                    |
| Mutual capacitance        | max. 100 nF/km (at 800 Hz)                                                                        |
| Inductance                | ca. 0.65 mH/km                                                                                    |
| Capacitive coupling       | max. 200 pF/100 m (at 800 Hz)                                                                     |
| Maximum operating voltage | 225 V<br>(not intended to be used in conjunction with low impedance sources, such as power grids) |
| Test voltage              | C/C: 1000 V<br>C/S: 2000 V                                                                        |

## Mechanical and thermal properties

|                        |                                                                                                                                         |
|------------------------|-----------------------------------------------------------------------------------------------------------------------------------------|
| Minimum bending radius | occasional flexing: 15 x outer diameter<br>fixed installation: 6 x outer diameter                                                       |
| Temperature range      | occasional flexing: -5 °C up to +50 °C max. conductor temperature<br>fixed installation: -30 °C up to +70 °C max. conductor temperature |
| Flammability           | flame retardant acc. to IEC 60332-1-2 resp. EN 60332-1-2                                                                                |

|              |                                                                                                                           |
|--------------|---------------------------------------------------------------------------------------------------------------------------|
| <b>Tests</b> | acc. to DIN VDE 0815, Type JE-LiYCY...BD<br>Electrical properties acc. to table 11<br>Tests at the cable acc. to table 21 |
|--------------|---------------------------------------------------------------------------------------------------------------------------|

|                             |                                                                                                                                                                                                                                                                                                                                                        |
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| <b>General requirements</b> | These cables are conform to<br>EU-Directive 2014/35/EU (Low Voltage Directive) and to<br>EU-Directive 2011/65/EU (RoHS, Restriction of the use of certain<br>hazardous substances).<br>These cables (see <a href="http://www.lappkabel.com/cpr">www.lappkabel.com/cpr</a> ) are classified<br>in accordance with the EU-Regulation no. 305/2011 (CPR). |
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|----------------------------------|----------------------------------------------------------------------------------------------|
| <b>Environmental information</b> | These cables meet the substance-specific requirements of the EU Directive 2011/65/EU (RoHS). |
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| <b>Note</b> | Trade product, no LAPP product |
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