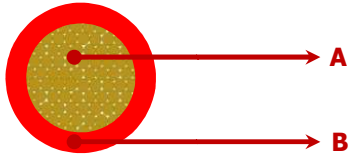


## ÖLFLEX® INFRA FR-LSH

DS 8210011

Valid from: 2018-03-01



A – Annealed Bare Copper Conductor  
B – Flame Retardant PVC Insulation

### Application

OLFLEX® INFRA FR-LSH are ISI marked single-conductor cables with Flame Retardant low smoke thermoplastic PVC-insulation for fixed installation inside of closed conduits and cable ducting systems and on or under plaster as well as in similar closed systems. They are suitable for protected, stationary use in or control units/ switchgear in conjunction with voltages up to 1100 V AC. This product are used in applications where safety of human and property are of utmost importance.

### Design

Conductor : Annealed Bare copper, Class V in acc. to IS 8130/IEC 60228  
Approval : IS 694:2010  
Insulation : PVC compound Type D in acc. to IS 5831:1984  
Current Rating : in acc. to IS 3961  
CE approval : Certified to use CE marking on the product.

### Electrical properties

Nominal voltage 1100 V  
Test voltage 3000 V AC

### Mechanical properties

Min. bending radius occasional flexing: 8 x cable OD  
Fixed installation: 6 x cable OD  
Temperature range occasional flexing: -15 °C up to +70 °C max. Conductor temperature  
Fixed installation: -40 °C up to +80 °C max. Conductor temperature

### Flame retardant properties and other tests

Oxygen Index: > 29 in accordance to ASTM-D 2863  
Temperature Index: minimum 250°C in accordance to ASTM-D 2863  
Smoke Density: Maximum smoke density of 60% as per ASTM-D 2843  
Acid Gas Generation: HCL content maximum 20% as per IEC 754-1  
Flammability in acc. with IS 10810-53 / IEC 60332-1  
Tests acc. to IS 10810

### Special properties

This product conforms to  
RoHS directive (Restriction of the use of certain hazardous substances)

Article No.	Conductor Cross Section	Nominal Outer Diameter (mm)	Copper Weight (Kg/Km) Approx.	Cable Weight (Kg/Km) Approx.	Current rating (A)	Standard Pack Length (m)
8210..1	1 x 0.5 mm <sup>2</sup>	2.2	4.6	10.7	12	90, 180, 270
8210..2	1 x 0.75 mm <sup>2</sup>	2.4	6.7	13.5	14	90, 180, 270
8210..3	1 x 1.0 mm <sup>2</sup>	2.6	8.7	16.0	17	90, 180, 270
8220..1	1 x 1.5 mm <sup>2</sup>	2.9	12.6	21.0	22	90, 180, 270
8220..2	1 x 2.5 mm <sup>2</sup>	3.6	21.1	32.9	29	90, 180, 270
8220..3	1 x 4 mm <sup>2</sup>	4.3	34.9	51.6	36	90, 180, 270
8220..4	1 x 6 mm <sup>2</sup>	4.8	52.6	72.5	48	90, 180, 270
8220..5	1 x 10 mm <sup>2</sup>	6.2	87.6	119.5	70	90, 180, 270
8220..6	1 x 16 mm <sup>2</sup>	7.2	137.1	176.2	98	90, 180, 270

### Product details

This product is offered in following colours

00 – Yellow/Green    01 – Black    02 – Blue    03 – Brown    04 – Red    05 – White  
06 – Grey    07 – Violet    08 – Pink    09 – Orange    11 – Yellow    12 – Green  
14 – Dark Blue

The current rating values given in the table are based on following parameters:  
(Values declared in Air)

- 1 Maximum conductor temperature : 70 °C
- 2 Ambient Temperature in air : 40 °C
- 3 Maximum diameter is governed by IS 694:2010.

### Important:

The current rating shown in the table is by considering maximum possible conductor temperature and ambient conditions for facilitating the heat dissipation. The current rating values depend on various conditions like method of laying, ambient temperature, grouping of cables which have to consider before cable selection and installation process.

Derating factors apply based on application guidelines specified.