FLAMEX® EN 50382-2 FFS

FLAMEX SI EN 50382-2 3600V 50 FFS 120°C

Nexans Ref.: 10235715
EAN 13: 3427650139114
Sheathed high temperature flexible shielded Power cables

DESCRIPTION

Application

FLAMEX SI EN 50382-2 type FFS screened power cables are used for fixed installations where enhanced mechanical protection and electrical screening (EMC) is required. The insulation and sheath are designed with state-of-the art silicone materials to withstand high operating temperature and save weight on board of rolling stock equipment. FLAMEX cables are recommended for installations and connections in narrow spaces where an optimal bending radius is required. They provide optimum safety for people and maximal asset protection against all risks of fire.

Construction

- **Conductor**
  Flexible class 5 copper according to IEC 60228
  * tinned copper for 120°C Class
  * plain copper for 150°C Class
- **Insulation**
  Cross-linked silicone type EI 111 according to EN 50382-1
- **Separator**
  Unweaved tape
- **Screen**
  Tinned copper wire braid
- **Separator**
  Unweaved tape
- **Outer sheath**
  Cross-linked silicone type EM 107 according to EN 50382-1
  Colour: black outer layer

Marking

FLAMEX SI - EN 50382-2 - Voltage rate (1800V or 3600V) - cross-section mm² - FFS - temperature class (120°C or 150°C) - NEXANS 279 - week/year

Guide to use

STANDARDS

International EN 45545-2 (HL3)

Halogen free	Rated Voltage Uo/U (Um)	Chemical resistance	Flame retardant	Fire retardant	Smoke density	Gases corrosivity	Gases toxicity
EN 50267	**3.6/6 kV**	**Good**	**EN 60332-1-2**	**EN 50266-2**	**EN/IEC 61034-2**	**IEC 60754**	**EN 50305-9.2**

Cabling rules are given according to EN 50343
- Minimum bending radius (static) : 4 x outer cable diameter
- Minimum bending radius (dynamic) : 6 x outer cable diameter
Pulling tensible force (dynamic) during installation : 50 N/mm² of copper size
Mechanical (static) tensible force : 15N/mm² of copper size
Permissible current carrying capacities : value and calculation method are given in EN 50355

Standards

Construction according to EN 50382-2

CHARACTERISTICS

Construction characteristics	
Insulation	High temperature silicone
Halogen free	EN 50267
Dimensional characteristics	
Conductor cross-section	50 mm²
Conductor diameter	9.2 mm
Nominal outer diameter	- mm
Minimum outer diameter	17.9 mm
Maximum outer diameter	20.5 mm
Approximate weight	782 kg/km
Electrical characteristics	
Rated Voltage Uo/U (Um)	3.6/6 kV
Usage characteristics	
Chemical resistance	Good
Flame retardant	EN 60332-1-2
Fire retardant	EN 50266-2
Smoke density	EN/IEC 61034-2
Gases corrosivity	IEC 60754
Gases toxicity	EN 50305-9.2
Operating temperature, range	-50 - 120 °C
Max. conductor temperature in service	120 °C

Halogen free
EN 50267


Rated Voltage Uo/U (Um)
3.6/6 kV


Chemical resistance
Good


Flame retardant
EN 60332-1-2


Fire retardant
EN 50266-2


Smoke density
EN/IEC 61034-2


Gases corrosivity
IEC 60754


Gases toxicity
EN 50305-9.2