

400Hz Cables

GP 400 SF

Supply cable - SymmetricalFlex

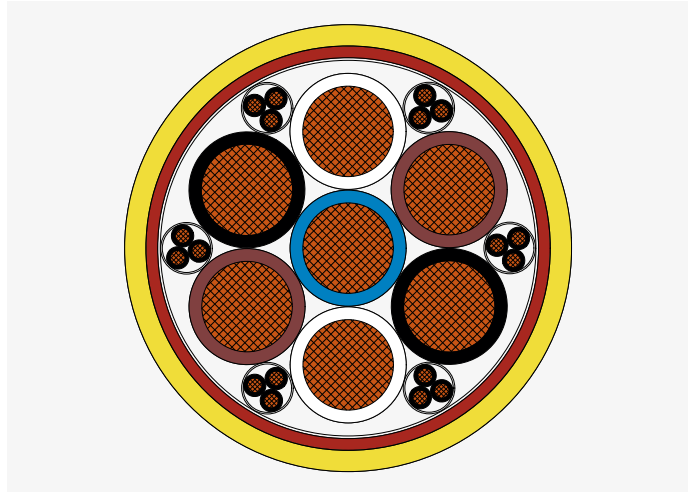


Application

For flexible use on mobile GPUs, in PIT systems, on frequency converters and as a flexible extension for operating lengths over 25 metres.

Outstanding features

- » low capacity insulation
- » very flexible and smooth handling
- » very good installation in narrowest spaces
- » good resistance
- » low wear
- » with wear indicator



Construction

Conductor:	bare copper strands, fine wires acc. to IEC 60228 class 5
Insulation:	SABIX®
Colour code:	1,0 mm ² : black with numbers 25,0 resp. 35,0 mm ² : blue, 2 x (white, brown, black)
Stranding:	1,0 mm ² : cores twisted to triples, wrapped with non-woven tape
Stranding:	all elements optimized stranded in layers, wrapped with non-woven tape
Inner sheath:	special polymer, red
Outer sheath:	special polymer, yellow
Marking example:	SAB BRÖCKSKES · D-Viersen · GP 400 SF 7x35,0mm ² +6x3x1,0mm ² 3400-0101 CE and continuous meter marking

Technical Data

Nominal voltage:	1,0 mm ² : U _o /U max. 115/200 V 25,0 resp. 35,0 mm ² : U _o /U 0,6/1 kV
Testing voltage:	core/core 4000 V AC 50 Hz
Min. bending radius	
fixed laying:	4 x d
flexible application:	6 x d
for one single bend:	3 x d
Temperature range	
fixed laying:	-40/+70 °C
flexible application:	-30/+70 °C
Fire performance:	acc. to IEC 60332-1-2
Oil resistance:	good - acc. to EN 50290-2-22
Chem. resistance:	good against acids, alkalines, solvents, hydraulic liquids, etc.
Weather resistance:	good
Salt water resistance:	good
Hydrolysis and microbial resistance:	good
Ozone resistance:	good
Abrasion:	acc. to UL 2556-2021 and JIS C3005
Fuel resistant:	petrol, diesel and kerosene (Jet A-1)
Mechanical resistance:	characteristics of the outer sheath: <ul style="list-style-type: none"> ▶ good tensile strength ▶ good abrasion resistance ▶ good notch resistance
Absence of harmful substances:	acc. to RoHS directive of the European Union

Current carrying capacity

With reference to LV112-3 and based on an application-related current-time profile and the following operating conditions:

- ▶ ambient temperatures up to max. 52°C
- ▶ two phases of the same colour connected to one conductor
- ▶ other cores (35mm² bl and 1mm²) unloaded
- ▶ laying individually on or on surfaces

25,0 mm²

- » 231 A for max. 10 min.
- » 262,5 A for max. 5 min.
- » 294 A for max. 10 s
- » 420 A for max. 2 s

35,0 mm²

- » 286 A for max. 10 min.
- » 325 A for max. 5 min.
- » 364 A for max. 10 s
- » 520 A for max. 2 s

Installation instructions for PIT systems see page 25

item no.	no. of cores x cross section n x mm ²	outer-ø mm	copper figure kg/km	cable weight ≈ kg/km	ohmic resistance max. Ω/km
34000100	7 x 25,0 + 6 x 3 x 1,0	min. 38,0 - max. 39,9	1853	2757	25,0 mm ² : 0,78 1,0 mm ² : 19,5
34000102	7 x 25,0 + 6 x 4 x 1,0	min. 38,0 - max. 39,9	1910	2820	25,0 mm ² : 0,78 1,0 mm ² : 19,5
34000101	7 x 35,0 + 6 x 3 x 1,0	min. 42,0 - max. 44,0	2525	3235	35,0 mm ² : 0,554 1,0 mm ² : 19,5
34000103	7 x 35,0 + 6 x 4 x 1,0	min. 42,0 - max. 44,0	2583	3320	35,0 mm ² : 0,554 1,0 mm ² : 19,5