Screened power & VFD / motor supply cables

VFDAP 600/1000V Type MC

VFDAP 600/1000 V Type MC Armored VFD Cable

UL 1569 Type MC aluminum-armored copper-tape VFD motor cable

UL 1569 Type MC | U0/U 600/1000 V · 4 kV AC | Armoured EMC

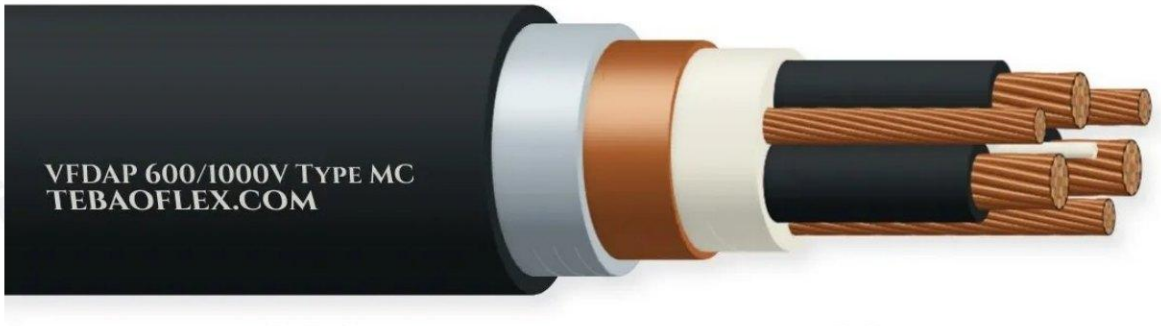


Application

VFDAP 600/1000 V Type MC integrates stranded bare copper phases, three symmetrical bare grounds, copper tape screening, and interlocked aluminum armor under a black PVC jacket for NEC industrial installations.

Typical uses: Variable frequency drive (VFD) motor bays, Industrial pumps, fans & compressor skids, Process plants, oil & gas & HVAC systems, Heavy manufacturing & plant MCC feeders

Construction





Cross-section, not to scale

1	**Conductor**	ASTM B8 Class B stranded bare annealed copper · ASTM B8 Class B / UL 44
2	**Core insulation**	UL 44 XHHW-2 thermoset XLPE (90 °C wet/dry) · UL 1569 Type MC
3	**Core assembly & separator**	Concentric cabled assembly with low-friction fleece or polyester binder tape · UL 1569 Type MC
4	**EMC metallic screen**	Helical bare copper tape shield (100% radial coverage) · EMC ≥ 85% / 100% foil
5	**Metallic armour**	Interlocked aluminum strip armor (UL 1569 Type MC) · UL 1569 Type MC
6	**Outer sheath**	Black UV- & oil-resistant PVC overall jacket over armor · IEEE 1202 / FT4 Flame

Technical data

Typical values

Rated voltage U0/U	600/1000 V	AC test voltage	4 kV AC / 5 min
Conductor class	ASTM B8 Class B bare Cu	EMC screen	Helical bare copper tape shield (100%
Insulation resistance	≥ 1,000 MΩ·km at 20 °C	Temp. range (fixed)	-40 °C to +90 °C
Temp. range (flexing)	-20 °C to +90 °C	Short-circuit temp.	+250 °C (5 s)
Min. bending radius	12 × OD (fixed)	Flame retardance	IEEE 1202 / FT4 Flame
Oil & chemical perf.	UL Oil Res I/II	Environmental / EMC	Direct Burial & Sun Res
Outer sheath	Black UV- & oil-resistant PVC overall		

Sizes

12 standard constructions

Tick the sizes you need and send this page to info@tebaoflex.com or WhatsApp +86 185 9591 3361.

Cores × AWG/kcmil	Outer Ø ≈ mm	Max. R20 Ω/km	Copper index kg/km	Weight ≈ kg/km	Min. bend R 12×D mm
☐ 3×14 AWG + 3×18 AWG	15.9	8.450	130	381	191
☐ 3×12 AWG + 3×16 AWG	16.9	5.310	181	474	203
☐ 3×10 AWG + 3×14 AWG	18.2	3.340	260	614	218
☐ 3×8 AWG + 3×14 AWG	21.5	2.100	356	849	258
☐ 3×6 AWG + 3×12 AWG	23.6	1.320	531	1,153	283
☐ 3×4 AWG + 3×12 AWG	27.2	0.832	760	1,602	326
☐ 3×2 AWG + 3×10 AWG	31.6	0.523	1,168	2,344	379
☐ 3×1/0 AWG + 3×6 AWG	35.8	0.329	1,948	3,583	430
☐ 3×2/0 AWG + 3×6 AWG	38.3	0.261	2,338	4,239	460
☐ 3×4/0 AWG + 3×4 AWG	44.9	0.164	3,668	6,409	539
☐ 3×350 kcmil + 3×2 AWG	54.1	0.099	5,962	10,119	649
☐ 3×500 kcmil + 3×2 AWG	61.3	0.070	8,074	13,529	736

- Max. conductor DC resistance R20 at 20 °C per ASTM B172 / B8 (bare copper).
- Minimum bending radius calculated at 12 × nominal outer diameter (OD). Custom core counts and lengths available on request.

Standards and approvals

- UL 1569 Type MC
- UL 44 XHHW-2
- CSA C22.2 No. 131 Teck/ACIC
- EN 10204 3.1 Factory Test Certificate
- CE, RoHS 2 (2011/65/EU) & REACH

Certifications

Management systems: ISO 9001, ISO 14001, ISO 45001

Request a quotation

Send the size, length and destination. An application engineer replies within 2 business hours.

WhatsApp / phone
+86 185 9591 3361

Email
info@tebaoflex.com

Web
tebaoflex.com/cables/vfdap-600-1000v-type-mc-armored-vfd-cable

Typical values for this cable type, based on UL 1569 Type MC · UL 44 XHHW-2 · CSA C22.2 No. 131 Teck/ACIC. Values for your order are confirmed in the quotation. Subject to change without notice. Jiangsu Tebaoflex Special Cable Co., Ltd., Taicang, Jiangsu, China.