

TRAY CABLE - POWER - W/ INSULATED GROUND - 600V/1000V XHHW-2 INNERS

ENGINEERING SPECIFICATIONS

Standards

Underwriters Laboratories Standard UL-44, UL-1277, UL-1581, UL-1685, UL-2556; ASTM Stranding Class B3, B8, B787; Federal Specification A-A-59544, NEMA WC-70/ICEA S-95-658; NFPA 70 (NEC®) Article 336, 392; UL-1685 Method 1 (70,000 Btu/hr) Flame Test; NEMA WC 57/ICEA S-73-532; ICEA T-29-520 (210,000 Btu/hr) Flame Test; ARRA 2009 Section 1605 "Buy American" Compliant; RoHS Compliant; MasterSpec Division 26 Sections 260519, 260523; IEEE 1202 (FT4) optional. UL Listing #E-179429



CONSTRUCTION

Conductors

Bare, soft-annealed stranded copper conductors per ASTM-B3, ASTM-B8 and ASTM-B787

Insulation

Cross-linked polyethylene (XLPE) High Heat Water Resistant. Rated for use in wet or dry locations at temperatures not to exceed 90°C dry or wet to meet UL-44 requirements for type XHHW-2 wire. Suitable for use in low-leaking circuits requiring a dielectric constant of 3.5 or less.

Ground Conductor

XLPE insulated green ground

Assembly

The insulated conductors are cabled together with a green insulated ground. Nylon rip-cord is supplied for easy stripping.

Color Coding

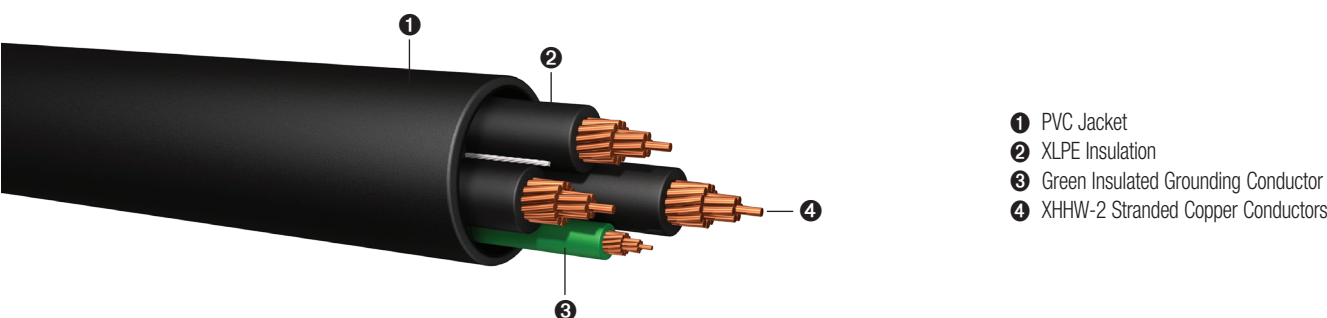
Black insulation with ICEA Method 4 printed number

Overall Jacket

Flame retardant, sunlight-resistant, black PVC jacket. Also available in chlorinated polyethylene jacket (CPE) by request.

APPLICATIONS

Primarily used for connecting power devices in commercial and industrial environments. Suitable for installation in channels, ducts, wireways, cable trays, and raceways. Approved for direct burial in wet or dry locations and outdoors in cable trays where sunlight-resistant rating is required. Cables constructed and listed for applications requiring TC-ER-JP rating. Encore Wire's Type TC-ER is acceptable for use in Class 1, Division 2 and Class 2, Division 2 locations where utilized with listed fittings rated for the classified location and condition of exposure to which the listed fittings are applied.



- 1 PVC Jacket
- 2 XLPE Insulation
- 3 Green Insulated Grounding Conductor
- 4 XHHW-2 Stranded Copper Conductors

| Size (AWG) | No. of Conductors | | Size of Ground Wire (AWG) | Outside Jacket Thickness PVC (in) | | Allowable Ampacity (Amps) ¹ | | | Outside Diameter (in) | | Approximate Net Weight (lbs/1000 ft) | | Standard Packaging (ft) |
|------------|-------------------|---|---------------------------|-----------------------------------|-------|----------------------------------------|------|------|-----------------------|-------|--------------------------------------|------|-------------------------|
| | | | | 3 | 4 | 60°C | 75°C | 90°C | 3 | 4 | 3 | 4 | |
| 8 | 3 | 4 | 10 AWG Green Insulated | 0.060 | 0.060 | 40 | 50 | 55 | 0.660 | 0.705 | 318 | 388 | 1000' 5000' Reels |
| 6 | 3 | 4 | 8 AWG Green Insulated | 0.060 | 0.060 | 55 | 65 | 75 | 0.740 | 0.810 | 455 | 561 | 1000' 4000' Reels |
| 4 | 3 | 4 | 8 AWG Green Insulated | 0.080 | 0.080 | 70 | 85 | 95 | 0.930 | 1.080 | 707 | 903 | 1000' 3000' Reels |
| 2 | 3 | 4 | 6 AWG Green Insulated | 0.080 | 0.080 | 85 | 115 | 130 | 1.058 | 1.165 | 1032 | 1290 | 1000' 2000' Reels |
| 1 | 3 | 4 | 6 AWG Green Insulated | 0.080 | 0.080 | 95 | 130 | 145 | 1.185 | 1.308 | 1206 | 1645 | 1000' 2000' Reels |
| 1/0 | 3 | 4 | 6 AWG Green Insulated | 0.080 | 0.080 | 110 | 150 | 170 | 1.275 | 1.405 | 1520 | 1934 | 1000' 2000' Reels |
| 2/0 | 3 | 4 | 6 AWG Green Insulated | 0.080 | 0.080 | 125 | 175 | 195 | 1.378 | 1.518 | 1834 | 2429 | 500' 1000' 2000' Reels |
| 3/0 | 3 | 4 | 4 AWG Green Insulated | 0.080 | 0.080 | 145 | 200 | 225 | 1.488 | 1.638 | 2252 | 2882 | 1000' 2000' Reels |
| 4/0 | 3 | 4 | 4 AWG Green Insulated | 0.080 | 0.080 | 165 | 230 | 260 | 1.608 | 1.758 | 2743 | 3552 | 1000' 1500' Reels |

¹ Ampacity of conductors are based on NFPA 70 (NEC) Table 310.15(B)(16). See 110.14(C), 240.4(D) and 310.15(B) for other limitations where applicable.

60°C when terminated to equipment for circuits rated 100 amperes or less or marked for size 14 AWG through 1 AWG conductor.

75°C when terminated to equipment for circuits rated over 100 amperes or marked for conductors larger than 1 AWG.

90°C for ampacity derating purposes.

When the neutral is considered current-carrying conductor, the ampacity of 4/C cables shall be reduced by a factor of 0.80 per NEC 310.15(B)(3)(a).

The above data is approximate and subject to normal manufacturing tolerances.

PRINT LEGEND: ENCORE WIRE CORPORATION (SIZE) W/G TYPE TC-ER-JP CABLE XHHW-2 CDRS SUN-RES 600V/1000V DIR-BUR (UL) DATE/TIME/OPER/QC

Last Edit: 5/21/24

TRAY CABLE - POWER - W/ INSULATED GROUND - 600V/1000V

XHHW-2 INNERS

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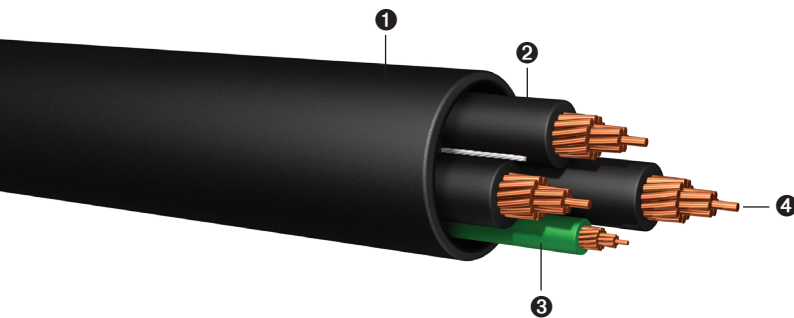
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|------------|-------------------|---|---------------------------|-----------------------------------|-------|----------------------------------------|------|------|-----------------------|-------|--------------------------------------|-------|-------------------------|
| | | | | 3 | 4 | 60°C | 75°C | 90°C | 3 | 4 | 3 | 4 | |
| 250 | 3 | 4 | 4 | 0.080 | 0.080 | 215 | 255 | 290 | 1.782 | 1.974 | 3158 | 3994 | 1000' 1500' Reels |
| 300 | 3 | 4 | 3 | 0.110 | 0.110 | 240 | 285 | 320 | 1.968 | 2.156 | 3843 | 4846 | 1000' 1500' Reels |
| 350 | 3 | 4 | 3 | 0.110 | 0.110 | 260 | 310 | 350 | 2.081 | 2.302 | 4320 | 5565 | 1000' 1500' Reels |
| 400 | 3 | 4 | 3 | 0.110 | 0.110 | 280 | 335 | 380 | 2.187 | 2.421 | 4857 | 6288 | 1000' 1500' Reels |
| 500 | 3 | 4 | 2 | 0.110 | 0.110 | 320 | 380 | 430 | 2.383 | 2.639 | 5958 | 7590 | 1000' 1500' Reels |
| 600 | 3 | 4 | 2 | 0.110 | 0.110 | 350 | 420 | 475 | 2.697 | 2.990 | 7358 | 9378 | 1000' 1500' Reels |
| 750 | 3 | 4 | 1 | 0.110 | 0.110 | 400 | 475 | 535 | 3.015 | 3.347 | 8752 | 11307 | 1000' 1500' Reels |

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800.962.9473

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