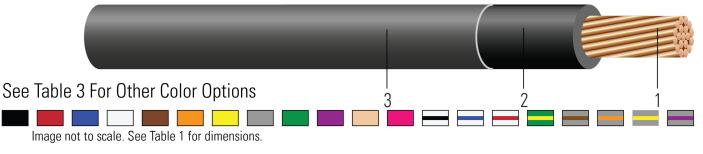


TFN/TFFN Copper

600 Volt. Copper Conductor. PVC Insulation/Nylon Sheath. Heat, Moisture, Oil, and Gasoline Resistant II. Also Rated MTW and AWM.



CONSTRUCTION:

- 1. **Conductor:** Solid soft drawn bare copper per ASTM B3 for TFN. Class K bunch-stranded soft drawn bare copper per ASTM B174 for TFFN.
- 2. Insulation: Heat and moisture resistant PVC
- 3. Sheath: Nylon

APPLICATIONS AND FEATURES:

APPLICATION

Southwire Type TFN/TFFN or MTW or AWM may be used as fixture wire, machine tool wiring, or appliance wiring material as specified in the National Electrical Code® and other applicable codes and standards. Voltage for all applications is 600 volts. Allowable temperatures are as follows:

- TFN/TFFN- Dry locations not to exceed 90°C
- AWM- When rated as appliance wiring material in dry locations, conductor temperatures not to exceed 105°C

- MTW- Wet locations or when exposed to oil at temperatures not to exceed 60°C or dry locations not to exceed 90°C (with ampacity limited to that for 75°C conductor temperature per NFPA 79)

FEATURES

- Gasoline and Oil Resistant II
- MTW- Stranded Constructions Only
- RoHS Compliant

SPECIFICATIONS:

- ASTM B3 Soft or Annealed Copper Wire
- ASTM B174 Standard Specification for Bunch-Stranded Copper
- UL 66 Fixture Wire
- UL 758 Standard for Appliance Wiring Material
- UL 1063 Machine Tool Wiring (MTW)

SAMPLE PRINT LEGEND:

E30071 (UL) XX AWG CU TYPE TFFN OR MTW OR GASOLINE AND OIL RESISTANT II OR AWM 600 VOLTS --- RoHS





Table 1 – Weights and Measurements

AWG/Kcmil No. of Strands inch mil mil inch lb/1000ft lb/1000ft 16 1 26 0.059 15 5 0.101 7 10	Cond. Size Cond. Number Strand Count Diameter Over Conductor Insul. Thickness Jacket Thickness Approx. OD Copper Weight Approx. Weight												
16 1 26 0.059 15 5 0.101 7 10	AWG/Kcmil	AWG/Kcmil No. of Strands inch mil mil inch Ib/1000ft Ib/1000ft											

All dimensions are nominal and subject to normal manufacturing tolerances

 $\ensuremath{\diamond}$ Cable marked with this symbol is a standard stock item

Table 2 – Electrical and Engineering Data

Cond. Size	Cond. Number	Min Bending Radius	DC Resistance @ 25°C	AC Resistance @ 75°C	Inductive Reactance @ 60Hz	Allowable Ampacity At 75°C	Allowable Ampacity At 90°C
AWG/ Kcmil		inch	Ω/1000ft	Ω/1000ft	Ω/1000ft	Amp	Amp
16	1	0.4	4.487	5.406	0.033	-	18

* Ampacities based on 2023 NEC Table 402.5.

* Inductive impedance is based on non-ferrous conduit with one diameter spacing center-to-center.

Table 3 - Stock Code Colors (/ means stripe. Blue/White: Blue with White Stripe)

Size (Strand)	Black	Red	Blue	White	Brown	Orange	Yellow	Gray	Pink	Purple	Tan	Green
18 (Solid)	269779	269795	269803	269787	269845	269837	269829	269878		269860		269811
16 (Solid)	269886	269902	269910	269894	269951	269944	269936	269985		269977		269928
18 (16)	270215	270231	270249	270223	270280	270272	270264	270314	270298	270306		270256
16 (26)	270322	270348	270355	270330	270397	270389	270371	270421	270405	270413	297531	270363

