




Product: [7428WS](#) 

MachFlex™, 17+1G C #16 Str BC, PVC-NYL Ins, OA TC Brd, TPE Jkt, TPE Jkt, 1000V WTTTC, 600V TC-ER

 [Request Sample](#)

Product Description

MachFlex™ for High Flex, 17+1G Conductor 16AWG (26x30) Bare Copper, PVC-NYL Insulation, Overall Tinned Copper Braid(85%) Shield, TPE Inner Jacket, TPE Outer Jacket, 1000V WTTTC, 600V TC-ER

Technical Specifications

Product Overview

Suitable Applications:	Robotics, Robot, Continuous Flex
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Construction Details

Conductor

Element	Size	Stranding	Material
	16	26x30	BC - Bare Copper
Ground Wire	16	26x30	BC - Bare Copper

Insulation

Material	Nom. Insulation Diameter	Color Code
PVC/Nylon - Polyvinyl Chloride + Nylon	0.101 in (2.57 mm)	Black and Numbered 1, Black and Numbered 2, Black and Numbered 3, Black and Numbered 4, Black and Numbered 5, Black and Numbered 6, Black and Numbered 7, Black and Numbered 8, Black and Numbered 9, Black and Numbered 10, Black and Numbered 11, Black and Numbered 12, Black and Numbered 13, Black and Numbered 14, Black and Numbered 15, Black and Numbered 16, Black and Numbered 17, Green/Yellow

Outer Shield

Shield Type	Material	Coverage
Braid	Tinned Copper (TC)	85%

Inner Jacket

Material	Nom. Thickness	Nom. Diameter
TPE - Thermoplastic Elastomer	0.025 in (0.64 mm)	0.56 in (14 mm)

Outer Jacket

Material	Nom. Thickness	Nom. Diameter
TPE - Thermoplastic Elastomer	0.063 in (1.6 mm)	0.714 in

Electrical Characteristics

Electricals

Nom. Conductor DCR
4 Ohm/1000ft (13 Ohm/km)

Voltage

UL Voltage Rating
1000 V RMS, 600 V RMS

Mechanical Characteristics

Temperature

UL Temperature
75°C Dry, 90°C Wet

Bend Radius

Flexing Min.
7.15 in

Max. Pull Tension:	630 lbs (290 kg)
Bulk Cable Weight:	351 lbs/1000ft (522 kg/km)

Standards and Compliance

Environmental Suitability:	Sunlight Resistance, Oil Resistance
Flammability / Reaction to Fire:	UL1685 UL Loading, 1202
NEC / UL Compliance:	TC-ER, WTTTC
AWM Compliance:	AWM 20328, AWM I/II A/B
CEC / C(UL) Compliance:	CIC, TC
European Directive Compliance:	EU Directive 2015/863/EU (RoHS 2 amendment), EU Directive 2011/65/EU (RoHS 2), EU Directive 2012/19/EU (WEEE)
APAC Compliance:	China RoHS II (GB/T 26572-2011)

History

Update and Revision:	Revision Number: 0.379 Revision Date: 09-07-2025
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Part Numbers

Variants

Item #	Color	Putup Type	Length	UPC	Footnote
7428WS 060250	Chrome	Reel	250 ft	612825186465	C
7428WS 0601000	Chrome	Reel	1,000 ft	612825186458	C
7428WS 0605000	Chrome	Reel	5,000 ft	612825186472	

Footnote:	C - CRATE REEL PUT-UP.
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