

Alpha Wire | 711 Lidgerwood Avenue, Elizabeth, NJ 07207 Tel: 1-800-52 ALPHA (25742), Web: www.alphawire.com

# Customer Specification PART NO. V16002

## Construction

				Diameters (	ln)	
1) Component 1		4 X 1 COND	4 X 1 COND			
a) Conductor		2 (133(7x19)/23	2 (133(7x19)/23) AWG TC		0.330	
b) Insulation		0.061" Wall, No	0.061" Wall, Nom. XLPE		0.454	
(1) Print		ALPHANUMER INVERTED	ALPHANUMERIC NUMBERS - 1-ONE ALTERNATING AND INVERTED			
(2) Color(s)						
Cond	Color	Cond	Color	Cond	Color	
1	BLACK#1	3	BLACK#3			
2	BLACK#2	4	GREEN OR GREEN/YELLOW			
2) Cable Assembly		4 Components	4 Components Cabled			
a) Twists:		0.8 Twists/foot	0.8 Twists/foot (min)			
3) Shield:		A/P/A Tape, 25	A/P/A Tape, 25% Overlap, Min.			
a) Drain Wire		4 x 8 (133(7X19	4 x 8 (133(7X19)/29) AWG TC			
b) Braid		TC,85% Covera	TC,85% Coverage, Min.			
4) Jacket		0.088" Wall, No	0.088" Wall, Nom.,PVC		1.310 (1.353 Max.)	
a) Color(s)		BLACK	BLACK			
b) Print		4C2 SHIELDED OR 600V TC-EF WET SUN RES LLXXXXX CS CE ROHS (SEQ * = Factory Code	ALPHA WIRE-* P/N V16002 4C2 SHIELDED 1000V FLEXIBLE MOTOR SUPPLY CABLE OR 600V TC-ER (UL) RHW-2 CDRS XLPE/PVC 90C DRY/ WET SUN RES DIR BUR 2 AWG P-07-KA080006-MSHA LLXXXXX CSA AWM I/II A/B 1000V 90C FT4 CE ROHS (SEQ FOOTAGE) * = Factory Code [Note: Product may have c(UL) or CSA markings depending upon plant of manufacture.]			

# **Applicable Specifications**

1) UL			
a) Component 1	RHW-2Wet/Dry	90°C Dry / 90°C Wet / 600 V <sub>RMS</sub>	
	XHHW-2Wet/Dry	90°C Dry / 90°C Wet / 600 V <sub>RMS</sub>	
b) Overall	тс	90°C Dry / 90°C Wet / 600 V <sub>RMS</sub>	
	EXPOSED RUN		
	DIRECT BURIAL		
	SUN RES		
	1000V Flexible Motor Supply Cable		
	WTTC	90°C / 1000 V <sub>RMS</sub>	
2) CSA International	AWM I/II A/B	90°C / 1000 V <sub>RMS</sub>	
	FT4		
	C(UL) TC	90°C Dry / 90°C Wet / 600 V <sub>RMS</sub>	
	C(UL) CIC CONTROL	90°C Dry / 90°C Wet / 600 V <sub>RMS</sub>	
	C(UL) -25C		
3) Other	PMSHA Specification		
4) CE:	EU Low Voltage Directive 2006/95/E0	EU Low Voltage Directive 2006/95/EC	

# Environmental

1) CE: EU Directive 2011/65/EU(RoHS2):				
	This product complies with European Directive 2011/65/EU (RoHS Directive) of the European Parliament and of the Council of 8 June 2011. No Exemptions are required for RoHS Compliance on this item. Consult Alpha Wire's web site for RoHS C of C.			
2) REACH Regulation (EC 1907/2006):				
	This product does not contain Substances of Very High Concern (SVHC) listed on the European Union's REACH candidate list in excess of 0.1% mass of the item. For up-to-date information, please see Alpha's REACH SVHC Declaration.			
3) California Proposition 65:	The outer surface materials used in the manufacture of this part meet the requirements of California Proposition 65.			

## Properties

Physical & Mechanical Properties				
1) Temperature Range	-40 to 90°C			
2) Bend Radius	8X Cable Diameter			
3) Pull Tension	2700 Lbs, Maximum			
4) Sunlight Resistance	Yes			
5) Direct Burial	Yes			
Electrical Properties	(For Engineering purposes only)			
1) Voltage Rating	1000 V <sub>RMS</sub>			
2) Characteristic Impedance	46 Ω			
3) Inductance	0.153 µH/ft, Nominal			
4) Mutual Capacitance	40 pf/ft @1 kHz, Nominal			
5) Ground Capacitance	72 pf/ft @1 kHz, Nominal			
6) Conductor DCR	0.16 Ω/1000ft @20°C, Nominal			
7) OA Shield DCR	0.15 Ω/1000ft @20°C, Nominal			
8) Current	104 amps per conductor @30°C, Maximum			
9) Insulation Resistance	300 MΩ/MFt (Est.)			

## Other

1) Packaging	
a) Bulk(Made-to-order)	?

#### www.alphawire.com

Alpha Wire | 711 Lidgerwood Avenue, Elizabeth, NJ 07207

#### Tel: 1-800-52 ALPHA (25742)

Although Alpha Wire ("Alpha") makes every reasonable effort to ensure there accuracy at the time of publication, information and specifications described herein are subject to errors or omissions and to changes without notice, and the listing of such information and specifications does not ensure product availability.

Alpha provides the information and specifications herein on an "AS IS" basis, with no representations or warranties, whether express, statutory or implied. In no event will Alpha be liable for any damages (including consequential, indirect, incidental, special, punitive, or exemplary) whatsoever, even if Alpha had been advised of the possibility of such damages, whether in an action under contract, negligence or any other theory, arising out of or in connection with the use, or inability to use, the information or specifications described herein.



## **EU/China ROHS CERTIFICATE OF COMPLIANCE**

To Whom It May Concern:

Alpha Wire Part Number: V16002

V16002, RoHS-Compliant Commencing With 10/1/2005 Production

Note: all colors and put-ups

This document certifies that the Alpha part number cited above is manufactured in accordance with Directive 2011/65/EU of the European Parliament, better known as the RoHS Directive (commonly known as RoHS 2), with regards to restrictions of the use of certain hazardous substances used in the manufacture of electrical and electronic equipment. This certification extends to amending Directive 2015/863/EU which expanded the list of restricted substances to 10 items (commonly known as RoHS 3) The reader is referred to these Directives for the specific definitions and extents of the Directives. **No Exemptions are required for RoHS Compliance on this item**. Additionally, Alpha certifies that the listed part number is in compliance with China RoHS "Marking for Control of Pollution by Electronic Information Products" standard SJ/T 11364-2014.

Substance	Maximum Control Value
Lead	0.1% by weight (1000 ppm)
Mercury	0.1% by weight (1000 ppm)
Cadmium	0.01% by weight (100 ppm)
Hexavalent Chromium	0.1% by weight (1000 ppm )
Polybrominated Biphenyls (PBB)	0.1% by weight (1000 ppm)
Polybrominated Diphenyl Ethers (PBDE),	
Including Deca-BDE	0.1% by weight (1000 ppm)
Bis(2-ethylhexyl) phthalate (DEHP)	0.1% by weight (1000 ppm)
Butyl benzyl phthalate (BBP)	0.1% by weight (1000 ppm)
Dibutyl phthalate (DBP)	0.1% by weight (1000 ppm)
Diisobutyl phthalate (DIBP)	0.1% by weight (1000 ppm)

The information provided in this document and disclosure is correct to the best of Alpha Wire's knowledge, information and belief at the date of its release. The information provided is designed only as a general guide for the safe handling, storage, and any other operation of the product itself or the one that it will become part of. The intent of this document is not to be considered a warranty or quality specification. Regulatory information is for guidance purposes only. Product users are responsible for determining the applicability of legislation and regulations based on their individual usage of the product.

Authorized Signatory for the Alpha Wire:

Dave Watson, Director of Engineering & QA Alpha Wire 711 Lidgerwood Ave. Elizabeth, NJ 07207 Tel: 1-908-925-8000 10/15/2020

### **Mouser Electronics**

Authorized Distributor

Click to View Pricing, Inventory, Delivery & Lifecycle Information:

Alpha Wire:

V16002 BK199 V16002 BK001 V16002 BK005