2200 US Highway 27 South
Richmond, IN 47374
Tel: 1-800-52 ALPHA
Web: www.alphawire.com

Customer Specification

PART NO. 75021

Construction

		Diameters (In)
1) Component 1	2 X 1 PAIR	
a) Conductor	24 (7/32) AWG BC	0.024
b) Insulation	0.010" Wall, Nom. Polypropylene (PP)	0.044
(1) Color(s)		

Pair	Color	Pair	Color	Pair	Color
1	BLU - WHT/BLU	2	ORG - WHT/ORG		

c) Pair	2/Cond Cabled Together	
(1) Lay Length:	Various Lay	
2) Cable Assembly	2 Components Bunch Cabled	
a) Twists:	4.0 Twists/foot	
b) Core Wrap	Clear Mylar Tape, 25% Overlap, Min.	
3) Shield:	Alum/Mylar Tape, 25% Overlap, Min.	
a) Foil Direction	Foil Facing In	
b) Drain Wire	24 (7/32) AWG TC	
4) Jacket	0.035" Wall, Nom.,TPE	0.300 Avg. (0.309 Max.)
a) Color(s)	BLACK, RED	
b) Ripcord	Nylon	
c) Print	ALPHA WIRE-* P/N 75021 2PR 24 AWG XTRAGUARD(R) INDUSTRIAL ETHERNET (UL) C(UL) TYPE CMR 75C FT4 ANSI/TIA-568-C.2 CAT5E VERIFIED CE ROHS (SEQUENTIAL FOOTAGE MARKING) * = Factory Code	

Applicable Specifications

1) UL	CMR	75°C
	FT4	
2) CSA International	C(UL) TYPE CMR	75°C
	FT4	
3) CE:	EU Low Voltage Directive 2014/35/EU	

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.

Properties

Physical & Mechanical Properties	
1) Temperature Range	-50 to 75°C
2) Bend Radius	8X Cable Diameter
3) Pull Tension	17.6 Lbs, Maximum
4) Sunlight Resistance	Yes
Electrical Properties	(For Engineering purposes only)
1) Voltage Rating	300 V_{RMS}
2) Characteristic Impedance	100 ω +/- 15
3) Mutual Capacitance	5.6 nf/100m Max
4) Velocity of Propagation	70 % Nom.
5) Conductor DCR	9.38 ω/100m @20°C, Max
6) Skew	45 ns/100m, Max
7) Pair to Ground Unbalance	330 pf/100m, Max
8) DC Unbalance of a Pair	5%, Max
9) Insertion Loss, Max dB/100m	2.4 @ 1 MHz
	4.9 @ 4 MHz
	6.9 @ 8 MHz
	7.8 @ 10 MHz
	9.9 @ 16 MHz
	11.1 @ 20 MHz
	12.5 @ 25 MHz
	14.1 @ 31.25 MHz
	20.4 @ 62.5 MHz
	26.4 @ 100 MHz

Other

Packaging	Flange x Traverse x Barrel (inches)
a) 1000 FT	16 x 11 x 8 Continuous length
b) 500 FT	12 x 10 x 5 Continuous length
	[Spool dimensions may vary slightly]

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EU/UK/China ROHS CERTIFICATE OF COMPLIANCE

To Whom It May Concern:

Alpha Wire Part Number: 75021

75021, RoHS-Compliant Commencing With 3/21/2012 Production

Note: all colors and put-ups

This document certifies that the Alpha part number cited above, including all packaging materials, 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). This product also complies with UK - RoHS. 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. This product is also in compliance with China RoHS 2 per GB/T 26572-2011.

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 5/8/2024

Alpha Wire
2200 US Highway 27 South
Richmond, IN 47374
Tel: 1-908-925-8000