

# **Customer Specification**

#### **PART NO. 86183CY**

#### **Construction**

	_				Diameters (	ln)
1) Component 1	3 X 1 COND					
a) Conductor	18 (41/34) AWG Tinned Copper				0.043	
b) Insulation	0.010" Wall, Nom. PVC	, Semi Rigid			0.063	
(1) Color Code	Alpha Wire Color Code D					
Cond	Color	Cond	Color	C	ond	Color
1	BLACK	2	RED	3		WHITE
2) Cable Assembly	3 Components Cabled					
a) Twists:	8.0 Twists/foot (min)					
b) Orientation:	Components to be arranged from INSIDE LAYER to OUTSIDE LAYER					
c) Core Wrap	Nonwoven Polyester Tape, 25% Overlap, Min.					
3) Shield:	Flex Alum/Mylar Tape, 25% Overlap, Min.					
a) Foil Direction	Foil Facing Out					
b) Drain Wire	26 (7/34) AWG Tinned Copper					
c) Single Serve	Tinned Copper,90% Coverage, Nom.					
4) Jacket	0.040" Wall, Nom.,PVC				0.240+/- 0.011	
a) Color(s)	SLATE					
b) Jacket Separator	Tissue Tape, 25% Over	lap, Min.				
c) Print	ALPHA WIRE-* P/N 86 XTRAGUARD(R) CONT (UL) TYPE PLTC 105C C C(UL) CMG OR AWM 2 CSA AWM I/II A/B FT4 ROHS OIL RESISTANT * = Factory Code [Note: Product may ha	INUOUS FLEX DA DR TYPE CM 1050 2661 105C 300V 105C 300V CE (SEQ FOOTAGE)	ATA CABLE C SUN RES OR LLXXXXXX	on plant c	of manufactur	e.]

## **Applicable Specifications**

1) UL			
a) Component 1	AWM/STYLE 10002	105°C / 300 V <sub>RMS</sub>	
b) Overall	AWM/STYLE 2661	105°C / 300 V <sub>RMS</sub>	
	СМ	105°C	
	SUN RES		
	PLTC	105°C	
2) CSA International	AWM I/II A/B	105°C / 300 V <sub>RMS</sub>	
	C(UL) TYPE CMG	105°C	
	FT4		
3) Other	Oil Resistant		
4) CE:	EU Low Voltage Directive 2014/3	5/EU	

### **Environmental**

EU(RoHS2), EU Directive 2015/863/EU (RoHS3):
This product complies with European Directive 2011/65/EU (RoHS Directive) of the European Parliament and of the Council of 8 June 2011 and the amending Directive 2015/863/EU of 4 June 2015. No Exemptions are required for RoHS Compliance on this item.
)7/2006):
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.
This product may contain substances known to the State of California to cause Cancer or Reproductive Harm, but is exempt from labeling based on the Consent Judgement. See the Alpha Wire website for more information.

# **Properties**

Physical & Mechanical Properties			
1) Temperature Range	-10 to 105°C(static), +5 to 105°C (dynamic)		
2) Bend Radius	8X Cable Diameter(static), 8X Cable Diameter(dynamic)		
3) Pull Tension	43 Lbs, Maximum		
4) Sunlight Resistance	Yes		
<b>Electrical Properties</b>	(For Engineering purposes only)		
1) Voltage Rating	300 V <sub>RMS</sub>		
2) Capacitance	43 pF/ft @1 kHz, Nominal Conductor to Conductor		
3) Ground Capacitance	77 pF/ft @1 kHz, Nominal		
4) Inductance	0.16 μH/ft, Nominal		
5) Conductor DCR	6.9 Ω/1000ft @20°C, Nominal		
6) OA Shield DCR	5.4 Ω/1000ft @20°C, Nominal		

### Other

Packaging	Flange x Traverse x Barrel (inches)	
a) 1000 FT	13.5 x 10 x 4 Continuous length	
b) 500 FT	12 x 5.94 x 5 Continuous length	
c) 100 FT	10.5 x 5 x 3.5 Continuous length	
	[Spool dimensions may vary slightly]	
Notes:		
a) Oil Resistant Jacket (7d @ 60C).		

#### www.alphawire.com

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

To Whom It May Concern:

Alpha Wire Part Number: 86183CY

86183CY, RoHS-Compliant Commencing With 2/15/2018 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)

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Authorized Signatory for the Alpha Wire:

Dave Watson, Director of Engineering 5/4/2024

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