



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

Customer Specification

PART NO. F16049LW

Construction

				Diameters (In)	
1) Component 1		49 X 1 COND			
a) Conductor		16 (65/34) AWG BC		0.059	
b) Insulation		0.016" Wall, Nom. PVC/ 0.005" Wall NYLON		0.101	
(1) Print		ALPHANUMERIC NUMBERS - 1-ONE ALTERNATING AND INVERTED			
(2) Color Code		Alpha Wire Color Code LW			
Cond	Color	Cond	Color	Cond	Color
1	GREEN/YELLOW	18	DK. BLUE#17	35	DK. BLUE#34
2	DK. BLUE#1	19	DK. BLUE#18	36	DK. BLUE#35
3	WHITE/BLUE	20	DK. BLUE#19	37	DK. BLUE#36
4	DK. BLUE#3	21	DK. BLUE#20	38	DK. BLUE#37
5	DK. BLUE#4	22	DK. BLUE#21	39	DK. BLUE#38
6	DK. BLUE#5	23	DK. BLUE#22	40	DK. BLUE#39
7	DK. BLUE#6	24	DK. BLUE#23	41	DK. BLUE#40
8	DK. BLUE#7	25	DK. BLUE#24	42	DK. BLUE#41
9	DK. BLUE#8	26	DK. BLUE#25	43	DK. BLUE#42
10	DK. BLUE#9	27	DK. BLUE#26	44	DK. BLUE#43
11	DK. BLUE#10	28	DK. BLUE#27	45	DK. BLUE#44
12	DK. BLUE#11	29	DK. BLUE#28	46	DK. BLUE#45
13	DK. BLUE#12	30	DK. BLUE#29	47	DK. BLUE#46
14	DK. BLUE#13	31	DK. BLUE#30	48	DK. BLUE#47
15	DK. BLUE#14	32	DK. BLUE#31	49	DK. BLUE#48
16	DK. BLUE#15	33	DK. BLUE#32		
17	DK. BLUE#16	34	DK. BLUE#33		
2) Cable Assembly		49 Components Cabled			
a) Twists:		1.4 Twists/foot (min)			
b) Core Wrap		REMAI Tape, 25% Overlap, Min.			
3) Jacket		0.085" Wall, Nom.,TPE		1.069+/- 0.051	
a) Color(s)		BLACK			
b) Print		ALPHA WIRE-* P/N F16049LW 49C 16 AWG (1.31mm2) TFFN SERIES F (UL) TYPE TC-ER 90C 600V OIL RES I/II SUN RES OR TYPE PLTC 90C OR C(UL) CIC CONTROL/TC 90C PVC/NYLON INS FT4 16 AWG ---- LLXXXXXX CSA AWM I/II A/B 90C 600V FT4 CE ROHS (DATE CODE) (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	MTW	90°C Dry / 60°C Wet / 600 V _{RMS}
	TFFN	90°C / 600 V _{RMS}
b) Overall	TC	90°C / 600 V _{RMS}
	EXPOSED RUN	
	SUN RES	
	PLTC	90°C
	OIL RES I/II	
2) CSA International	AWM I/II A/B	90°C / 600 V _{RMS}
	FT4	
	C(UL) CIC CONTROL	90°C / 600V V _{RMS}
	C(UL) TC	90°C / 600V V _{RMS}
3) CE:	EU Low Voltage Directive 2006/95/EC	

Environmental

1) EU Directive 2002/95/EC(RoHS):	
	All materials used in the manufacture of this part are in compliance with EU Directive 2002/95/EU regarding the restriction of use of certain hazardous substances in electrical and electronic equipment. Consult Alpha Wire's web site for compliance Date of Manufacture.
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	-25 to 90°C(static), -5 to 90°C (dynamic)
2) Bend Radius	10X Cable Diameter(static), 10X Cable Diameter(dynamic)
3) Pull Tension	993 Lbs, Maximum
4) Sunlight Resistance	Yes
Electrical Properties	
(For Engineering purposes only)	
1) Voltage Rating	600 V _{RMS}
2) Capacitance	31 pf/ft @1 kHz, Nominal Conductor to Conductor
3) Inductance	0.18 µH/ft, Nominal
4) Conductor DCR	4.3 /1000ft @20°C, Nominal

Other

Packaging	Flange x Traverse x Barrel (inches)
a) Bulk(Made-to-order)	

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RoHS CERTIFICATE OF COMPLIANCE

To Whom It May Concern:

Alpha Wire Part Number:F16049LW

F16049LW , RoHS-Compliant Commencing With8/1/2005Production

*This document certifies that the Alpha part numbers cited above are manufactured in accordancewith Directive 2002/95/EC of the European Parliament and of the Council of 27 January 2003,better known as the RoHS Directives, with regards to restrictions of the use of certain hazardousubstances used in the manufacture of electrical and electronic equipment. The reader is referredto these Directives for the specific definitions and extents of these Directives. **No Exemptions arerequired for RoHS Compliance on this item.***

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)	0.1% by weight (1000 ppm)
Including Deca-BDE	0.1% by weight (1000 ppm)

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

Authorized Signatory for the Alpha Wire Company:

A handwritten signature in black ink, appearing to read 'Dave Watson'.

Dave Watson, Director of Engineering & QA

11/2/2012

Mouser Electronics

Authorized Distributor

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