



Customer Specification

PART NO. M9708120

Construction

| | | | | | |
|-------------------|---------------|--|---------------|--------------------|----------------|
| | | Diameters (In) | | | |
| 1) Component 1 | | 12 X 1 PAIR | | | |
| a) Conductor | | 18 (7/.0152) AWG BC | | 0.046 | |
| b) Insulation | | 0.016" Wall, Nom. PVC | | 0.078 | |
| (1) Print | | ALPHA NUMERIC NUMBERS - WHITE CONDUCTOR ONLY (ONE-1) ALTERNATE INVERTED 2"SPACING(CTR. TO CTR.) | | | |
| (2) Color Code | | Alpha Wire Color Code BW | | | |
| Pair | Color | Pair | Color | Pair | Color |
| 1 | BLACK-WHITE#1 | 5 | BLACK-WHITE#5 | 9 | BLACK-WHITE#9 |
| 2 | BLACK-WHITE#2 | 6 | BLACK-WHITE#6 | 10 | BLACK-WHITE#10 |
| 3 | BLACK-WHITE#3 | 7 | BLACK-WHITE#7 | 11 | BLACK-WHITE#11 |
| 4 | BLACK-WHITE#4 | 8 | BLACK-WHITE#8 | 12 | BLACK-WHITE#12 |
| c) Pair | | 2/Cond Cabled Together | | | |
| (1) Twists: | | 5.3 Twists/foot (min) | | | |
| 2) Component 2 | | 1 X 1 COND | | | |
| a) Conductor | | 22 (7/30) AWG BC | | 0.030 | |
| b) Insulation | | 0.016" Wall, Nom. PVC | | 0.062 | |
| (1) Color(s) | | | | | |
| Cond | Color | Cond | Color | Cond | Color |
| 1 | ORANGE | | | | |
| 3) Cable Assembly | | 13 Components Cabled | | | |
| a) Twists: | | 1.5 Twists/foot (min) | | | |
| b) Core Wrap | | Clear Mylar Tape, 25% Overlap, Min. | | | |
| 4) Shield: | | Alum/Mylar Tape, 25% Overlap, Min. | | | |
| a) Foil Direction | | Foil Facing In | | | |
| b) Drain Wire | | 20 (7/28) AWG TC | | | |
| 5) Jacket | | 0.063" Wall, Nom.,PVC | | 0.664 (0.690 Max.) | |
| a) Color(s) | | BLACK | | | |
| b) Ripcord | | 1 End 810 Denier Nylon | | | |
| c) Print | | ALPHA WIRE-* P/N M9708120 12PR 18 AWG 1C 22 AWG SHIELDED EXXXXX (UL) TYPE PLTC/ITC 105C SUN RES OR CL3 105C OR C(UL) CMG 105C FT4 ROHS * = Factory Code <i>[Note: Product may have c(UL) or CSA markings depending upon plant of manufacture.]</i> | | | |

Applicable Specifications

| | | |
|----------------------|----------------|-------|
| 1) UL | CL3 | 105°C |
| | PLTC | 105°C |
| | ITC | 105°C |
| | SUN RES | |
| 2) CSA International | C(UL) TYPE CMG | 105°C |
| | FT4 | |

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) 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 | -20 to 105°C |
| 2) Bend Radius | 10X Cable Diameter |
| 3) Pull Tension | 319 Lbs, Maximum |
| 4) Sunlight Resistance | Yes |
| Electrical Properties (For Engineering purposes only) | |
| 1) Voltage Rating | 300 V _{RMS} |
| 2) Component 1 | |
| a) Mutual Capacitance | 34 pf/ft @ 1 kHz, Nominal |
| b) Ground Capacitance | 61 pf/ft @ 1 kHz, Nominal |
| c) Characteristic Impedance | 66 |
| d) Inductance | 0.18 µH/ft, Nominal |
| e) Conductor DCR | 6.7 /1000ft @20°C, Nominal |
| f) OA Shield DCR | 6.4 /1000ft @20°C, Nominal |
| 3) Component 2 | |
| a) Ground Capacitance | 105 pf/ft @ 1 kHz, Nominal |
| b) Inductance | 0.06 µH/ft, Nominal |
| c) Conductor DCR | 15.4 /1000ft @20°C, Nominal |
| d) OA Shield DCR | 6.4 /1000ft @20°C, Nominal |

Other

| | |
|------------------------|--------------------------------------|
| Packaging | Flange x Traverse x Barrel (inches) |
| a) 1000 FT | 30 x 14 x 12 Continuous length |
| b) 500 FT | 24 x 14 x 12 Continuous length |
| c) 100 FT | 16 x 11 x 8 Continuous length |
| d) Bulk(Made-to-order) | |
| | [Spool dimensions may vary slightly] |

www.alphawire.com

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

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RoHS CERTIFICATE OF COMPLIANCE

To Whom It May Concern:

Alpha Wire Part Number:M9708120

M9708120 , RoHS-Compliant Commencing With1/1/2006Production

*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", with a long horizontal stroke extending to the right.

Dave Watson, Director of Engineering & QA

11/2/2012

Mouser Electronics

Authorized Distributor

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