

**ALPHA WIRE**  
**CUSTOMER PRODUCT SPECIFICATION**

**Part Number: 518312**  
**Page 1 of 2 Pages**

**Issue: 1**  
**Issue Date: 8/28/2013**  
**Effective Date: 10/23/2013**

**A. Construction**

- |                |  | <u>Diameters (In)</u> |
|----------------|--|-----------------------|
| 1) Component 1 | 36 X 1 COND                              |                       |
| a) Conductor   | 16 (7.0192) AWG BC                       | 0.058                 |
| b) Insulation  | 0.016" Wall, Nom. PVC/ 0.005" Wall NYLON | 0.100                 |
| (1) Color(s)   |  |                       |

Cond	Color	Cond	Color	Cond	Color
1	BLACK #1	13	BLACK #13	25	BLACK #25
2	BLACK #2	14	BLACK #14	26	BLACK #26
3	BLACK #3	15	BLACK #15	27	BLACK #27
4	BLACK #4	16	BLACK #16	28	BLACK #28
5	BLACK #5	17	BLACK #17	29	BLACK #29
6	BLACK #6	18	BLACK #18	30	BLACK #30
7	BLACK #7	19	BLACK #19	31	BLACK #31
8	BLACK #8	20	BLACK #20	32	BLACK #32
9	BLACK #9	21	BLACK #21	33	BLACK #33
10	BLACK #10	22	BLACK #22	34	BLACK #34
11	BLACK #11	23	BLACK #23	35	WHITE #1
12	BLACK #12	24	BLACK #24	36	WHITE #2

- |                   |  |                    |
|-------------------|--|--------------------|
| 2) Cable Assembly | 36 Components Cabled   |                    |
| a) Twists:        | 1.1 Twists/foot (min)  |                    |
| b) Core Wrap      | Clear Mylar Tape, 25% Overlap, Min.  |                    |
| 3) Jacket         | 0.083" Wall, Nom., PVC   | 0.869 (0.912 Max.) |
| a) Color(s)       | BLACK  |                    |
| b) Print          | ALPHA WIRE-* P/N 518312 36C 16 AWG<br>EXXXXXX (UL) TYPE TC 600V 90C DRY 75C WET<br>SUN RES DIR BUR CE ROHS<br>* = Factory Code |                    |

**B. Applicable Specifications**

- |        |                                     |                             |
|--------|-------------------------------------|-----------------------------|
| 1) UL  | TC<br>SUN RES<br>DIRECT BURIAL      | 90°C / 600 V <sub>RMS</sub> |
| 2) CE: | EU Low Voltage Directive 2006/95/EC |                             |

**C. Environmental Compliance**

- |                                     |   |
|-------------------------------------|---|
| 1) CE:                              | EU Directive 2011/65/EU(RoHS2):<br>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 <a href="#">RoHS C of C</a> . |
| 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 <a href="#">Alpha's REACH SVHC Declaration</a> .  |

**D. Physical & Mechanical Properties**

- |                        |                    |
|------------------------|--------------------|
| 1) Temperature Range   | -25 to 90°C        |
| 2) Bend Radius         | 10X Cable Diameter |
| 3) Pull Tension        | 730 Lbs, Maximum   |
| 4) Sunlight Resistance | Yes                |
| 5) Direct Burial       | Yes                |

**E. Electrical Properties**

- |                   |   |
|-------------------|---|
|                   | (For Engineering purposes only)                 |
| 1) Voltage Rating | 600 V <sub>RMS</sub>                            |
| 2) Capacitance    | 30 pf/ft @1 kHz, Nominal Conductor to Conductor |
| 3) Inductance     | 0.18 µH/ft, Nominal                             |
| 4) Conductor DCR  | 4.2 Ω/1000ft @20°C, Nominal                     |

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**F. Other**

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

**This Design is custom, Made-To-Order & once accepted, the order is NON-CANCELLABLE & NON-RETURNABLE.**

Accepted By: <i>Matthew Sanchez</i>	Date: <i>8/29/13</i>
Company: <i>HONEYWELL</i>	Title: <i>PROJECT ENGINEER</i>

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