Helping save energy and achieve sustainable designs

Solar Cable
A multiconductor solar cable designed for any solar application. Its tough jacket also resists sunlight, ozone, and UV radiation. It is designed specifically for solar inverters and similar applications.

PV/PVT Wire
Our photovoltaic wire gives you flexible choices to meet UL 4703 PV wire and UL 4703 PV wire/TÜV 2 PFG 1169 wire requirements.

Xtra-Guard 4 Cable
Xtra-Guard 4 features a wide temperature range of -50°C to +125°C. The cable provides outstanding ultraviolet light stability in all jacket colors, along with resistance to oils, solvents, and chemicals.

Low Smoke Zero Halogen Cable
Our LSZH cables are suited to such applications as rapid transit, industrial, commercial, and similar confined-space applications where the low-smoke cables can save lives and potentially reduce damage to electronic components.

Our commitment to environmentally responsible designs includes products that recycle more easily and safely, help renewable wind and energy deliver power reliably, and make machinery operate more efficiently.

Xtra-Guard 4 Cable
A performance cable designed to withstand the temperature extremes of the wind turbine environment. It provides good resistance to oils, solvents, and chemicals, and is approved for wind turbine tray (WTTC) applications.

Series XM Cable
A flexible WTTC-rated control cable that combines a premium-grade PVC jacket and finely stranded conductors to offer continuous-duty flexing without cracking or degrading.

Flexible Motor Supply Cable
With a diameter smaller than most comparable motor supply cables, this WTTC cable is well-suited for the tight spaces in wind turbines for connecting AC drives, servo drives, and variable-frequency drives.

Xtra-Guard Torsion Flex Cable
With superior performance in high-flex and high-torsion applications, such as motion control and robotics, these cables are rated for up to 14 million flex cycles.

Instrumentation Cable
Available in a wide range of configurations for monitoring and telemetry needs. These cables provide excellent UV resistance and are designed for environments that demand accurate measurement and reliability.

Series V Energy-Efficient Variable Frequency Drive Cable
The VFD cable enables sophisticated control of motors by allowing their speed and torque to be precisely adjusted. This enables the machine to only use as much energy as is required, leading to lower energy costs and reduced maintenance and downtime.

Series SF Composite Servo Cable
Our servo cables bring a new level of flexibility to the integration and monitoring of servo drives. Composite cables add two additional individually shielded twisted pairs for brake or temperature control, leading to lower costs, greater efficiency, and smaller footprint.

EcoWire Plus
A 100% recyclable alternative to XLPE-insulated wire, with all the benefits of standard EcoWire with added resistance to the hazardous oils and chemicals common in industrial environments.

Low Smoke Zero Halogen Cable
Our LSZH cables are suited to such applications as rapid transit, industrial, commercial, and similar confined-space applications where the low-smoke cables can save lives and potentially reduce damage to electronic components.
EcoWire is the latest innovation in hook-up wire. A true engineering breakthrough, EcoWire combines increased performance with a minimized environmental impact. EcoWire derives its advantage from modified polyphenylene ether insulation (mPPE). It is inherently lighter and more durable than PVC.

mPPE Insulation: All the Advantages in Smaller, Lighter Wire

Environmentally friendly

EcoWire contains no halogens, phthalates, or heavy metals. It meets RoHS and WEEE requirements for the elimination of hazardous substances and recyclability.

Better Performance than PVC

- Up to 45% smaller diameter
- Up to 40% lighter

Better dielectric strength

The superior dielectric properties of mPPE make possible a reduced wall thickness while maintaining the same electrical properties as PVC. EcoWire’s diameter is up to 45% smaller than equivalent wires.

Low specific gravity

The 1.03 specific gravity of mPPE is 25% to 40% lower than other insulation materials, such as PVC, polyethylene, and cross-linked polyethylene.

Along with the reduced wall thickness, the low specific gravity yields significant weight savings of up to 40%.

Recyclable

EcoWire’s mPPE thermoplastic insulation can be easily recycled since it does not contain hazardous materials.

EcoWire Metrics

Now expanding AlphaWire’s popular EcoWire product line with EcoWire Metric. With excellent dielectric strength and durability, the new hook-up wire will meet CE Conformance, with a VW-1 high temperature rating, and Halogen-free.

With up to 45% smaller diameter to save space and make routing easier, EcoWire Plus withstands oils, fuels, solvents, and other hazardous liquids.
EcoWire specifications

**Standard EcoWire**

**Materials**
- Conductors: Stranded or solid tinned copper
- Insulation: Modified polyphenylene ether

**Electrical**
- Voltage: 600 volts

**Physical and Mechanical**
- Temperature Range: -40°C to +105°C

**Availability**
- 100 ft (30.5 m), 1000 ft (305 m), 5000 ft (1525 m), and 25,000 ft (7625 m) lengths
- 14 AWG and smaller is also available in 5000 ft Reel and 25,000 ft Drum

**Approvals**
- CSA AWM I A/B FT1
- UL AWM 11028
- UL VW-1
- CE

**EcoWire Plus**

**Materials**
- Conductors: Stranded bare copper
- Insulation: Modified polyphenylene ether

**Physical and Mechanical**
- Temperature Range: -40°C to +110°C

**Availability**
- 100 ft (30.5 m) and 1000 ft (305 m) lengths

**Approvals**
- ISO 6722 Ultra Thin Wall
- ISO 6722 Thin Wall
- CE

**Colors**
- White, Black, Red, Green, Yellow, Blue, Brown, Orange, Slate, Violet, Yellow/Green, Dark Blue

---

### Part No. | Conductor Size | Stranding | Insulation Thickness | Wire Diameter
---|---|---|---|---
6710 | 28 | 0.07 | 7/36 | 7 x 0.12 | 0.010 | 0.24 | 0.034 | 0.86
6711 | 26 | 0.14 | 7/34 | 7 x 0.16 | 0.010 | 0.24 | 0.038 | 0.97
6712 | 24 | 0.22 | 7/32 | 7 x 0.20 | 0.010 | 0.24 | 0.043 | 1.09
6713 | 22 | 0.35 | 7/30 | 7 x 0.25 | 0.010 | 0.24 | 0.049 | 1.24
6714 | 20 | 0.51 | 10/30 | 10 x 0.25 | 0.010 | 0.24 | 0.055 | 1.40
6715 | 18 | 0.81 | 16/30 | 16 x 0.25 | 0.010 | 0.24 | 0.067 | 1.70
6715S | 18 | 0.82 | Solid | Solid | 0.010 | 0.24 | 0.059 | 1.50
6716 | 16 | 1.32 | 26/30 | 26 x 0.25 | 0.011 | 0.28 | 0.081 | 2.06
6717 | 14 | 2.09 | 41/30 | 41 x 0.25 | 0.011 | 0.28 | 0.096 | 2.44
6717S | 14 | 2.08 | Solid | Solid | 0.011 | 0.28 | 0.086 | 2.18
6718 | 12 | 3.31 | 65/30 | 65 x 0.25 | 0.012 | 0.30 | 0.117 | 2.97
6719 | 10 | 5.37 | 105/30 | 105 x 0.25 | 0.012 | 0.30 | 0.142 | 3.61

---

### Part No. | Conductor Size | Stranding | Insulation Thickness | Wire Diameter
---|---|---|---|---
6820 | 28 | 0.09 | - | 7/36 | 7 x 0.12 | 0.008 | 0.20 | 0.031 | 0.79
6821 | 26 | 0.14 | 0.13 | 7/34 | 7 x 0.16 | 0.008 | 0.20 | 0.035 | 0.89
6822 | 24 | 0.23 | 0.22 | 7/32 | 7 x 0.20 | 0.008 | 0.20 | 0.040 | 1.02
6823 | 22 | 0.35 | 0.35 | 7/30 | 7 x 0.25 | 0.008 | 0.20 | 0.046 | 1.17
6824 | 20 | 0.56 | 0.5 | 7/28 | 7 x 0.32 | 0.008 | 0.20 | 0.054 | 1.37
6825 | 18 | 0.81 | 0.75 | 19/0.0092 | 19 x 0.23 | 0.008 | 0.20 | 0.062 | 1.57
6826 | 17 | 0.96 | 1 | 19/30 | 19 x 0.25 | 0.008 | 0.20 | 0.066 | 1.68
6827 | 16 | 1.23 | - | 19/29 | 19 x 0.29 | 0.010 | 0.24 | 0.076 | 1.96
6828 | 15 | 1.53 | 1.5 | 19/28 | 19 x 0.32 | 0.010 | 0.24 | 0.083 | 2.11
6829 | 14 | 1.94 | 2 | 19/27 | 19 x 0.36 | 0.012 | 0.30 | 0.095 | 2.41
6830 | 12 | 3.08 | 3 | 19/25 | 19 x 0.46 | 0.015 | 0.38 | 0.120 | 3.05
6831 | 10 | 4.92 | 5 | 19/23 | 19 x 0.57 | 0.017 | 0.43 | 0.147 | 3.73
## Product comparison

<table>
<thead>
<tr>
<th>Wire Type</th>
<th>Voltage (V)</th>
<th>Temperature Range</th>
<th>Approvals</th>
<th>Wall Thickness</th>
<th>Halogen?</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Standard EcoWire</strong></td>
<td>600</td>
<td>-40°C to +105°C</td>
<td>CSA AWM Style 11028&lt;br&gt;UL AWM Style 11028&lt;br&gt;RoHS Compliant&lt;br&gt;REACH Compliant&lt;br&gt;UL VW-1</td>
<td>0.010” to 0.012”&lt;br&gt;(0.24 to 0.32 mm)</td>
<td>No</td>
</tr>
<tr>
<td><strong>PVC (UL AWM 1015)</strong></td>
<td>600</td>
<td>-20°C to +105°C</td>
<td>UL AWM Style 1015&lt;br&gt;CSA TEW-105&lt;br&gt;RoHS Compliant</td>
<td>0.031” to 0.32”&lt;br&gt;(0.79 to 0.81 mm)</td>
<td>Yes</td>
</tr>
<tr>
<td><strong>EcoWire Plus</strong></td>
<td>300</td>
<td>-40°C to +110°C</td>
<td>ISO 6722 Ultra Thin Wall&lt;br&gt;ISO 6722 Thin Wall Type&lt;br&gt;RoHS Compliant&lt;br&gt;REACH Compliant</td>
<td>0.008” to 0.017”&lt;br&gt;(0.20 to 0.43 mm)</td>
<td>No</td>
</tr>
<tr>
<td><strong>XLPE (UL AWM 3271)</strong></td>
<td>600</td>
<td>-55°C to +125°C</td>
<td>UL AWM Style 3271&lt;br&gt;CSA CL1251-XLPE&lt;br&gt;MIL-W-16878E Type D&lt;br&gt;RoHS Compliant</td>
<td>0.032”&lt;br&gt;(0.81 mm)</td>
<td>Yes</td>
</tr>
</tbody>
</table>

### Samples for comparison

- **6715 (EcoWire)**
- **6825 (EcoWire Plus)**
- **3075 (PVC)**
- **7044 (XLPE)**
EcoWire Metric

**Specifications**

**Materials**
- **Conductors**: Stranded or solid tinned copper
- **Insulation**: Modified polyphenylene ether

**Electrical**
- **Voltage**: 600 volts

**Physical and Mechanical**
- **Temperature Range**: -40°C to +105°C

**Availability**
- 100 ft (30.5 m), 1000 ft (305 m), 5000 ft (1525 m), and 25,000 ft (7625 m) lengths
- 14 AWG and smaller is also available in 5000 ft Reel and 25,000 ft Drum

**Approvals**
- CSA AWM I A/B FT1
- UL AWM 11028
- UL VW-1
- CE
- IEC 60332-2

**RoHS compliant**
- Reach compliant

**Colors**
- White, Black, Red, Green, Yellow, Blue, Brown, Orange, Slate, Violet, Yellow/Green, Dark Blue

---

<table>
<thead>
<tr>
<th>Part No.</th>
<th>Voltage</th>
<th>Size</th>
<th>Stranding</th>
<th>Insulation Thickness</th>
<th>Nominal Diameter</th>
<th>Insulation Material</th>
</tr>
</thead>
<tbody>
<tr>
<td>67025</td>
<td>28</td>
<td>0.07</td>
<td>32/10</td>
<td>0.31</td>
<td>0.65</td>
<td>MPPE</td>
</tr>
<tr>
<td>67050</td>
<td>26</td>
<td>0.14</td>
<td>28/16</td>
<td>0.31</td>
<td>0.97</td>
<td>MPPE</td>
</tr>
<tr>
<td>67075</td>
<td>24</td>
<td>0.22</td>
<td>42/16</td>
<td>0.31</td>
<td>1.20</td>
<td>MPPE</td>
</tr>
<tr>
<td>67010</td>
<td>22</td>
<td>0.35</td>
<td>56/16</td>
<td>0.31</td>
<td>1.38</td>
<td>MPPE</td>
</tr>
<tr>
<td>67015</td>
<td>20</td>
<td>0.51</td>
<td>84/16</td>
<td>0.31</td>
<td>1.69</td>
<td>MPPE</td>
</tr>
<tr>
<td>67250</td>
<td>18</td>
<td>0.81</td>
<td>140/16</td>
<td>0.31</td>
<td>2.18</td>
<td>MPPE</td>
</tr>
</tbody>
</table>
The cables you trust. The service you deserve.

Every application is critical and cable and wire failure is not an option when the safety of your equipment and personnel is paramount. Choose Alpha products since the integrity of your system is only as robust as the products you use.

Superior availability.

Alpha offers wire and cable from stock in most sizes and constructions, in both small and large put-ups, so you can order it when you need it. Our products are available for same-day shipment, eliminating long lead times.

Service and support, second-to-none.

Selecting the correct wire or cable for your critical application is essential to overall system reliability, performance, and safety. So we make it easy for you select the right Alpha product for your specific application. Our online resources include a wire and cable selection guide, technical information, full product catalog, and a distributor locator to make it easy to select and get the wire or cable you need. Can’t find what you’re looking for? Design the cable to your specification. It’s easy, just visit www.alphawire.com!