PIII® 500 JCAP 1/2” Plenum Trunk and Distribution Coaxial Cable, cream jacket, 2400 ft (732 m) reel

Product Classification

Portfolio: CommScope®
Brand: PIII®
Product Type: Braided coaxial cable
Regional Availability: Asia | Australia/New Zealand | EMEA | Latin America | North America

Construction Materials

Construction Type: Swaged
Center Conductor Material: Copper-clad aluminum wire
Dielectric Material: Foam FEP
Shield (Tape) Material: Swaged aluminum tube
Jacket Material: PVDF

Dimensions

Cable Length: 732 m | 2400 ft
Cable Weight: 127.00 lb/kft
Diameter Over Center Conductor, specific: 0.1090 in per 1 strand
Diameter Over Dielectric: 11.4808 mm | 0.4520 in
Diameter Over Jacket, nominal: 13.310 mm | 0.524 in
Diameter Over Shield (Braid): 12.700 mm | 0.500 in
Jacket Thickness: 0.305 mm | 0.012 in

Electrical Specifications

Capacitance: 52.5 pF/m | 16.0 pF/ft
Characteristic Impedance: 75 ohm
Characteristic Impedance Tolerance: ±2 ohm
Conductor dc Resistance: 1.42 ohms/kft
Dielectric Strength, conductor to shield: 6500 Vdc
Jacket Spark Test Voltage: 1000 Vac
Nominal Velocity of Propagation (NVP): 84 %
Structural Return Loss: 20 dB @ 450–1000 MHz | 24 dB @ 5–450 MHz
Structural Return Loss Test Method: 100% Swept Tested

Environmental Specifications

Environmental Space: Plenum
Flame Test Method: CMP
Operating Temperature: -40 °C to +125 °C (-40 °F to +257 °F)
Safety Standard: cETL | ETL
UL Temperature Rating: 125 °C | 257 °F

General Specifications

- Cable Type: Trunk
- Jacket Color: Cream
- Product Number: 2312K
- Center Conductor Type: Solid
- Packaging Type: Reel

Mechanical Specifications

- Minimum Bend Radius, loaded: 20 times
- Minimum Bend Radius, unloaded: 16 times
- Pulling Tension, maximum: 136 kg | 300 lb

Electrical Performance

<table>
<thead>
<tr>
<th>Frequency</th>
<th>Attenuation (dB/100 m)</th>
<th>Attenuation (dB/100 ft)</th>
</tr>
</thead>
<tbody>
<tr>
<td>5 MHz</td>
<td>0.56</td>
<td>0.17</td>
</tr>
<tr>
<td>10 MHz</td>
<td>0.75</td>
<td>0.23</td>
</tr>
<tr>
<td>50 MHz</td>
<td>1.84</td>
<td>0.56</td>
</tr>
<tr>
<td>100 MHz</td>
<td>2.72</td>
<td>0.83</td>
</tr>
<tr>
<td>200 MHz</td>
<td>4.10</td>
<td>1.25</td>
</tr>
<tr>
<td>400 MHz</td>
<td>6.46</td>
<td>1.97</td>
</tr>
<tr>
<td>700 MHz</td>
<td>9.58</td>
<td>2.92</td>
</tr>
<tr>
<td>900 MHz</td>
<td>11.38</td>
<td>3.47</td>
</tr>
<tr>
<td>1000 MHz</td>
<td>12.40</td>
<td>3.78</td>
</tr>
<tr>
<td>1450 MHz</td>
<td>16.07</td>
<td>4.90</td>
</tr>
<tr>
<td>1800 MHz</td>
<td>18.76</td>
<td>5.72</td>
</tr>
<tr>
<td>2200 MHz</td>
<td>21.71</td>
<td>6.62</td>
</tr>
<tr>
<td>3000 MHz</td>
<td>27.32</td>
<td>8.33</td>
</tr>
</tbody>
</table>

Regulatory Compliance/Certifications

<table>
<thead>
<tr>
<th>Agency</th>
<th>Classification</th>
</tr>
</thead>
<tbody>
<tr>
<td>RoHS 2011/65/EU</td>
<td>Compliant</td>
</tr>
<tr>
<td>ISO 9001:2015</td>
<td>Designed, manufactured and/or distributed under this quality management system</td>
</tr>
</tbody>
</table>