## PICMATES° CAT 6A 10G BASE-T 4 PAIR CABLE



**Conductor:** Silver-Plated High Strength Copper Alloy

Dielectric: PFA

Fluoropolymer Spline: Binder: PTFE Tape

### **COLOR CODES**

Blue, White/Blue Stripe Pair #1: Pair #3: Green, White/Green Stripe Orange, White/Orange Stripe Pair #2: Pair #4: Brown, White/Brown Stripe

The E6A6826 Cat 6a Ethernet cable (exceeding ANSI/TIA-568-C.2 CAT 6a Channel Requirements) incorporates innovative design features to provide maximum electrical performance in a small, lightweight, and flexible package. E6A6826 delivers 10 Gigabit performance, up to 214 ft. by incorporating differential lay lengths between pairs and utilizing a foil and braided shield. It features a silver-plated high-strength copper conductor and flexible, laser-markable PTFE jacket for technical performance. E6A6826 cables provide the performance necessary for demanding applications such as cabin management systems (CMS), in-flight entertainment (IFE), and Ethernet backbones.

Jacket:

#### PHYSICAL DATA

Conductor:	26 AWG Stranded SPHSCA
Shield Coverage:	100% (Foil), 80% (Braid)
Temperature Range:	-55 to +200°C
Outer Diameter: in (mm)	0.22 (5.59)
Minimum Bend Radius: in (mm)	0.66 (16.76)
<b>Weight:</b> lbs/100 ft (kg/100 m)	3.2 (4.8)

#### **ENVIRONMENTAL DATA**

**Skydrol Resistant:** SAE AS4373E. Method 601 **RoHS Compliant:** RoHS Directive 2002/95/EC) Flame / Smoke Requirements: FAR Part 25.869 (a) App. F.

Part 1. (a)(3)

Berry Specialty Metals Compliance: Complies with DFARS

252.225-7014, Alt 1

#### **ELECTRICAL DATA**

Impedance:	100 ohms
Capacitance: pF/ft (m)	14.5 (47.6)
Velocity of Propagation:	70%
Dielectric Voltage Rating: (kV, RMS)	1.5
DC Resistance: ohms/1000 ft (m)	44.8 (147)
Max Distance: ft (m)	214 (65)

Shield #2: Silver-Plated Copper Braid

PTFE, White (Laser Markable)

#### ATTENUATION DATA

	Nom / Max	Nom / Max
Frequency	dB/100 ft	(dB/100 m)
@10 MHz	2.6/3.0	(8.5/9.8)
@100 MHz	8.2/9.7	(26.9/31.8)
@250 MHz	13.2/15.8	(43.3/51.8)
@500 MHz	19.3/23.0	(63.3/75.5)

All values nominal, unless otherwise noted





# CONTACTS/CONNECTORS FOR PART # E6A6826

PART #	CONTACT TYPE	TOOL PART #
110725	Shielded CAT 6a, Plug w/Protective Boot	<b>110729</b> - RJ45 Crimp Tool
110731	Shielded CAT 6, Plug w/ATUM Strain Relief	<b>110729</b> - RJ45 Crimp Tool
110790	Shielded CAT 6, Plug w/ATUM Strain Relief (fits Amphenol® (RJF) ruggedized backshell)	<b>110729</b> - RJ45 Crimp Tool
110913	Shielded CAT 6a, 90° Plug w/ATUM Strain Relief	110701 - Soft Jaw Clamping Pliers
110904	Shielded CAT 6a, 90° Plug w/ATUM Strain Relief	110701 - Soft Jaw Clamping Pliers
111007	Shielded CAT 6a, Plug w/Clamp Nut Strain Relief	110701 - Soft Jaw Clamping Pliers
111009	Shielded CAT 6a, Plug w/Clamp Nut Strain Relief	110701 - Soft Jaw Clamping Pliers
110937	Shielded CAT 6a, Jack w/ATUM Strain Relief	110701 - Soft Jaw Clamping Pliers
110938	Shielded CAT 6a, Jack w/ATUM Strain Relief	110701 - Soft Jaw Clamping Pliers

