Part Number: 9730

RS232/422 Low Cap, #24-3pr, FPO, Indiv. Foil, PVC Jkt, CM, 100Ω

Product Description

Computer EIA RS-232/422, Digital Audio Cable, 24 AWG stranded (7x32) tinned copper conductors, Datalene® insulation, twisted pairs, individually shielded with Beldfoil® (100% coverage), 24 AWG stranded tinned copper drain wire, overall PVC jacket.

Technical Specifications

Physical Characteristics (Overall)

Conductor

AWG	Stranding	Material	Nominal Diameter	No. of Conductors	No. of Pairs
24	7x32	TC - Tinned Copper	0.024 in	6	3

Conductor Count:	6
Total Number of Pairs:	3
AWG Size:	24

Insulation

Material	Material Trade Name	Nominal Wall Thickness
FPE - Foamed Polyethylene	Datalene®	0.019 in

Color Chart

Number	Color
1	Black & Red
2	Black & White
3	Black & Green

Inner Shield Material

Type	Material	Material Trade Name	Coverage [%]	Drainwire Material	Drainwire AWG	Drainwire Construction n x D
Tape	Aluminum Foil-Polyester Tape	Beldfoil® (Z-Fold®)	100 %	TC - Tinned Copper	24	7x32 mm

Outer Shield Material

Material
Unshielded

Outer Jacket Material

Material	Nominal Diameter	Nominal Wall Thickness
PVC - Polyvinyl Chloride	0.334 in	0.048 in

Construction and Dimensions

Stranding

Lay Length	Lay Direction	Twists
1.75 in	Left Hand	6.9 twist/ft

Electrical Characteristics

Conductor DCR

Individual Pair Nominal Shield DCR	Nominal Conductor DCR
15 Ohm/1000ft	24 Ohm/1000ft

Capacitance

Nom. Capacitance Conductor to Conductor	Nom. Capacitance Conductor to Other Conductor to Shield	Nom.Mutual Capacitance
12.5 pF/ft	23.2 pF/ft	39 pF/ft

Inductance

Nominal Inductance
0.23 µH/ft

Impedance

Nominal Characteristic Impedance
100 Ohm

High Frequency (Nominal/Typical)

Frequency [MHz]	Nom. Insertion Loss
0.384 MHz	0.74 dB/100m
0.7056 MHz	0.87 dB/100m
0.768 MHz	0.88 dB/100m
1.024 MHz	0.94 dB/100m
1.4112 MHz	1.01 dB/100m
1.536 MHz	1.03 dB/100m
2.048 MHz	1.13 dB/100m
2.8224 MHz	1.29 dB/100m
3.072 MHz	1.35 dB/100m
4.096 MHz	1.57 dB/100m
5.6448 MHz	1.78 dB/100m
6.144 MHz	1.84 dB/100m
8.192 MHz	2.13 dB/100m
11.2896 MHz	2.45 dB/100ft
12.288 MHz	2.57 dB/100ft
24.576 MHz	3.57 dB/100ft

Delay

Max. Delay Skew	Nominal Velocity of Propagation (VP) [%]
76 ns/100m	76 %

High Freq

Frequency [MHz]
0.384 MHz
0.7056 MHz
0.768 MHz
1.024 MHz
1.4112 MHz
1.536 MHz
2.048 MHz
2.8224 MHz
3.072 MHz
4.096 MHz
5.6448 MHz
6.144 MHz
8.192 MHz
11.2896 MHz
12.288 MHz
24.576 MHz

Current

Max. Recommended Current [A]
Amps per conductor @ 25°C: 2.5 A

Current Table Note:	35C Temperature Rise

Voltage

UL Voltage Rating
300V RMS

Temperature Range

UL Temp Rating:	60°C (UL AWM Style 2493)
Operating Temp Range:	-20°C To +80°C

Mechanical Characteristics

Bulk Cable Weight:	42 lbs/1000ft
Max Recommended Pulling Tension:	51 lbs
Min Bend Radius/Minor Axis:	3.5 in

Standards

NEC Articles:	800
NEC/(UL) Specification:	CM
CEC/C(UL) Specification:	CM
UL AWM Style:	2919 (300 V 80°C)
CPR Euroclass:	Eca

Applicable Environmental and Other Programs

EU Directive 2000/53/EC (ELV):	Yes
EU Directive 2003/96/EC (BFR):	Yes
EU Directive 2011/65/EU (ROHS II):	Yes
EU Directive 2012/19/EU (WEEE):	Yes
EU Directive 2015/863/EU:	Yes
EU Directive Compliance:	EU Directive 2003/11/EC (BFR)
EU CE Mark:	Yes
EU RoHS Compliance Date (yyyy-mm-dd):	2004-01-01
CA Prop 65 (CJ for Wire & Cable):	Yes
MII Order #39 (China RoHS):	Yes

Suitability

Suitability - Indoor:	Yes

Flammability, LS0H, Toxicity Testing

UL Flammability:	UL1685 UL Loading
CSA Flammability:	FT1

Part Number

Plenum (Y/N):	No
Plenum Number:	89730

Variants

Item #	Color	Footnote
9730.001000	Chrome	
9730.00152	Chrome	
9730.0030	Chrome	
9730.00305	Chrome	
9730 060100	Chrome	
9730 0601000	Chrome	C
9730 06010000	Chrome	C Y
9730 060500	Chrome	C
9730 0605000	Chrome	C

Footnote:	C - CRATE REEL PUT-UP.
Footnote:	Y - FINAL PUT-UP LENGTH MAY VAR -10% TO +20% FROM LENGTH SHOWN. MAY CONTAIN 2 PIECES. MINIMUM LENGTH OF ANY ONE PIECE IS 1500'.

Product Notes

Notes:	Datalene« insulation features include low dielectric constant and a dissipation factor for high-speed, low-distortion data handling. Physical properties include good crush resistance and light weight.

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