



Part Number: 2183R

4K UHD Media Cable, 4 Pair 23 AWG, PVC Jacket, CMR

Product Description

4K UHD Media Cable, 4-Pair, F/UTP O/A Foil Shielded, Riser CMR-LP (0.6A), 23 AWG Solid Bare Copper Conductors, Helical TC Drain, Solid Polyolefin Insulation, FR Polypropylene Rod Filler, Corrugated Flex Shield, Rip Cord, PVC Jacket

Technical Specifications

Product Overview

Environmental Space:	Riser
Suitable Applications:	HDBaseT, Full 5-Play, 4K (UHD/DCI), POH, POE

Physical Characteristics (Overall)

Conductor

AWG	Stranding	Material	No. of Pairs
23	Solid	BC - Bare Copper	4

Total Number of Conductors:	8
-----------------------------	---

Insulation

Material
PO - Polyolefin

Color Chart

Number	Color
1	White/Blue Stripe & Blue
2	White/Orange Stripe & Orange
3	White/Green Stripe & Green
4	White/Brown Stripe & Brown

Outer Shield Material

Type	Material	Material Trade Name	Coverage [%]	Drainwire Material	Drainwire AWG
Corrugated Tape	Aluminum Foil-Polyester	Beldfoil®	100 %	TC - Tinned Copper	26

Outer Jacket Material

Material	Nominal Diameter	Ripcord
PVC - Polyvinyl Chloride	0.290 in	Yes

Electrical Characteristics

Capacitance

Max. Capacitance Unbalance	Nom.Mutual Capacitance
330 pF/100m	15 pF/ft

Shielding:	F/UTP - Overall Foil Tape
------------	---------------------------

Construction and Dimensions

Total Number of Pairs:	4
------------------------	---

Conductor DCR

Max. Conductor DCR	Max. DCR Unbalance
9.38 Ohm/100m	5 %

Delay

Max. Delay	Max. Delay Skew	Nominal Velocity of Propagation (VP) [%]
@ 100 MHz 537.6 ns/100m	45 ns/100m	72 %

High Freq

Frequency [MHz]	Max. Insertion Loss (Attenuation)	Min. NEXT [dB]	Min. PSNEXT [dB]	Min. ACR [dB]	Min. PSACR [dB]	Min. ACRF (ELFEXT) [dB]	Min. PSACRF (PSELFEXT) [dB]	Min. RL (Return Loss) [dB]	Max./Min. Input Impedance (unFitted)
1 MHz	2.0 dB/100m	65.3 dB	62.3 dB	63.3 dB	60.3 dB	63.8 dB	60.8 dB	20.0 dB	100 +/- 15
4 MHz	3.8 dB/100m	56.3 dB	53.3 dB	52.5 dB	49.5 dB	51.8 dB	48.8 dB	23.0 dB	100 +/- 15
8 MHz	5.3 dB/100m	51.8 dB	48.8 dB	46.5 dB	43.5 dB	45.7 dB	42.7 dB	24.5 dB	100 +/- 15
10 MHz	5.9 dB/100m	50.3 dB	47.3 dB	44.4 dB	41.4 dB	43.8 dB	40.8 dB	25.0 dB	100 +/- 15
16 MHz	7.5 dB/100m	47.2 dB	44.2 dB	39.8 dB	36.8 dB	39.7 dB	36.7 dB	25.0 dB	100 +/- 15
20 MHz	8.4 dB/100m	45.8 dB	42.8 dB	37.4 dB	34.4 dB	37.8 dB	34.8 dB	25.0 dB	100 +/- 15
25 MHz	9.3 dB/100m	44.3 dB	41.3 dB	35.0 dB	32.0 dB	35.8 dB	32.8 dB	24.3 dB	100 +/- 15
31.25 MHz	10.5 dB/100m	42.9 dB	39.9 dB	32.4 dB	29.4 dB	33.9 dB	30.9 dB	23.6 dB	100 +/- 15
62.5 MHz	14.8 dB/100m	38.4 dB	35.4 dB	23.6 dB	20.6 dB	27.9 dB	24.9 dB	21.5 dB	100 +/- 15
100 MHz	18.8 dB/100m	35.3 dB	32.3 dB	16.5 dB	13.5 dB	23.8 dB	20.8 dB	20.1 dB	100 +/- 15
125 MHz	21.0 dB/100m	33.8 dB	30.8 dB	12.8 dB	9.8 dB	21.9 dB	18.9 dB	19.4 dB	100 +/- 22
155 MHz	23.4 dB/100m	32.4 dB	29.4 dB	9.0 dB	6.0 dB	20.0 dB	17.0 dB	18.8 dB	100 +/- 22
175 MHz	24.9 dB/100m	31.7 dB	28.7 dB	6.8 dB	3.8 dB	18.9 dB	15.9 dB	18.4 dB	100 +/- 22
200 MHz	26.6 dB/100m	30.8 dB	27.8 dB	4.1 dB	1.1 dB	17.8 dB	14.8 dB	18.0 dB	100 +/- 22
250 MHz	29.8 dB/100m	29.3 dB	26.3 dB			15.8 dB	12.8 dB	17.3 dB	100 +/- 22
300 MHz	32.7 dB/100m	28.1 dB	25.1 dB			14.3 dB	11.3 dB	16.8 dB	100 +/- 22
400 MHz	35.4 dB/100m	27.1 dB	24.1 dB			12.9 dB	9.9 dB	16.3 dB	100 +/- 22
450 MHz	37.9 dB/100m	26.3 dB	23.3 dB			11.8 dB	8.8 dB	15.9 dB	100 +/- 32
500 MHz	42.5 dB/100m	24.8 dB	21.8 dB			9.8 dB	6.8 dB	15.2 dB	100 +/- 32

Voltage

UL Voltage Rating
300V RMS

Cold Bend Test: -20°C Compliance per UL 1581

Applicable Standards & Environmental Programs

CEC/C(UL) Specification:	CMR
EU Directive 2000/53/EC (ELV):	Yes
EU Directive 2002/96/EC (WEEE):	Yes
EU Directive 2003/11/EC (BFR):	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:	Yes
Other Standards:	C(UL)US CMR 90C OR (UL) CMR-LP (0.6A) OR CL3R-LP (0.6A)
EU CE Mark:	Yes
EU REACH SVHC Compliance (yyyy-mm-dd):	2017-07-10
EU RoHS Compliance Date (yyyy-mm-dd):	2004-01-01
CPR Euroclass:	Eca
CA Prop 65 (CJ for Wire & Cable):	Yes
MII Order #39 (China RoHS):	Yes
Telecommunications Standards:	ANSI/TIA-568-C.2 Category 5e

Standards

ISO/IEC Compliance:	11801 ed 2.2 (2011) Class D
ANSI/TIA Category:	Category 5e
ANSI Compliance:	S-90-661-2012 Category 5e, ANSI/NEMA WC-63.1 Category 5e
IEEE Specification:	POE per 802.3af & POE+ 802.3at-2009
NEC/(UL) Specification:	CMR

Flame Test

UL Flammability:	UL 1666 Riser
------------------	---------------

Safety

UL Voltage Rating:	300 V RMS
--------------------	-----------

Suitability

Suitability - Aerial:	No
Suitability - Burial:	No
Suitability - Hazardous Locations:	No
Suitability - Indoor:	Yes
Suitability - Non-Halogenated:	No
Suitability - Oil Resistance:	No
Suitability - Outdoor:	No
Suitability - Sunlight Resistance:	No

Mechanical Characteristics

Storage Temp Range:	-20°C To +75°C
Installation Temp Range:	0°C To +75°C
Operating Temp Range:	-20°C To +75°C
Bulk Cable Weight:	37(lbs/1000ft)
Max Recommended Pulling Tension:	45(lbs)
Min Bend Radius/Minor Axis:	1.25(in)
Min Bend Radius/Installation:	3.0(in)

Temperature Range

UL Temp Rating:	90°C
-----------------	------

Plenum/Non-Plenum

Plenum (Y/N):	No
Plenum Number:	2183P

History

Variants

Item #	Color
2183R 0101000	BLACK
2183R 010A1000	BLACK
2183R 0105000	BLACK
2183R 006A1000	BLUE, LIGHT
2183R 009A1000	WHITE

© 2017 Belden, Inc

All Rights Reserved.

Although Belden makes every reasonable effort to ensure their accuracy at the time of this publication, information and specifications described here in are subject to error or omission and to change without notice, and the listing of such information and specifications does not ensure product availability.

Belden provides the information and specifications herein on an "ASIS" basis, with no representations or warranties, whether express, statutory or implied. In no event will Belden be liable for any damages (including consequential, indirect, incidental, special, punitive, or exemplary damages) whatsoever, even if Belden has been advised of the possibility of such damages, whether in an action under contract, negligence or any other theory, arising out of or in connection with the use, or inability to use, the information or specifications described herein.

All sales of Belden products are subject to Belden's standard terms and conditions of sale.

Belden believes this product to be in compliance with EU RoHS(Directive 2002/95/EC, 27-Jan-2003). Material manufactured prior to the compliance date may be instock at Belden facilities and in our Distributor's inventory. The information provided in this Product Disclosure, and the identification of materials listed as reportable or restricted within the Product Disclosure, is correct to the best of Belden's knowledge, information, and belief at the date of its publication. The information provided in this Product Disclosure is designed only as a general guide for the safe handling, storage, and any other operation of the product itself or the one that it becomes a part of. This Product Disclosure is not to be considered a warranty or quality specification. Regulatory information is for guidance purposes only. Product users are responsible for determining the applicability of legislation and regulations based on their individual usage of the product.

Belden declares this product to be in compliance with EU LVD (Low Voltage Directive 73/23/EEC), as amended by directive 93/68/EEC.