

1671A Coax - 50 Ohm Microwave Cable

For more Information
please call

1-800-Belden1

**Description:**

RG-405/U type, 24 AWG solid .020" silver-plated copper-covered steel conductor, TFE Teflon® insulation, copper-tin composite shield (100% coverage), unjacketed.

Physical Characteristics (Overall)**Conductor****AWG:**

| # Coax | AWG | Stranding | Conductor Material | Dia. (in.) |
|--------|-----|-----------|--|------------|
| 1 | 24 | Solid | SPCCS - Silver Plated Copper Covered Steel | .020 |

Insulation**Insulation Material:**

| Insulation Trade Name | Insulation Material | Dia. (in.) |
|-----------------------|---------------------------|------------|
| Teflon® | TFE - Tetrafluoroethylene | .062 |

Outer Shield**Outer Shield Material:**

| Layer # | Type | Outer Shield Material | Coverage (%) |
|---------|-------|-----------------------|--------------|
| 1 | Tape | Copper Foil | 100 |
| 2 | Braid | Tin-Filled Composite | 100 |

Outer Jacket**Outer Jacket Material:**

| Outer Jacket Material |
|-----------------------|
| Unjacketed |

Overall Cable

Overall Nominal Diameter: 0.085 in.

Mechanical Characteristics (Overall)

| | |
|---|----------------------------|
| Operating Temperature Range: | -70°C To +200°C |
| UL Temperature Rating: | 105°C (UL AWM Style 10245) |
| Non-UL Temperature Rating: | 200°C |
| Bulk Cable Weight: | 11.900 lbs/1000 ft. |
| Max. Recommended Pulling Tension: | 26 lbs. |
| Min. Bend Radius (Install)/Minor Axis: | 0.120 in. |
| Min. Bend Radius (Continuous Flexing): | 0.370 in. |

Applicable Specifications and Agency Compliance (Overall)**Applicable Standards & Environmental Programs**

| | |
|--|-----------------------------|
| AWM Specification: | UL Style 10245 (30 V 105°C) |
| EU CE Mark: | Yes |
| EU Directive 2000/53/EC (ELV): | Yes |
| EU Directive 2002/95/EC (RoHS): | Yes |
| EU RoHS Compliance Date (mm/dd/yyyy): | 01/01/2005 |

| | |
|-----------------------------------|-------|
| EU Directive 2002/96/EC (WEEE): | Yes |
| EU Directive 2003/11/EC (BFR): | Yes |
| CA Prop 65 (CJ for Wire & Cable): | Yes |
| MII Order #39 (China RoHS): | Yes |
| RG Type: | 405/U |

Flame Test

| | |
|-------------------|-----------------|
| Other Flame Test: | Horizontal Wire |
|-------------------|-----------------|

Suitability

| | |
|------------------------|-----|
| Suitability - Indoor: | Yes |
| Suitability - Outdoor: | Yes |

Plenum/Non-Plenum

| | |
|---------------|----|
| Plenum (Y/N): | No |
|---------------|----|

Electrical Characteristics (Overall)

Nom. Characteristic Impedance:

Impedance (Ohm)

50

Nom. Inductance:

Inductance (µH/ft)

.07

Nom. Capacitance Conductor to Shield:

Capacitance (pF/ft)

29.5

Nominal Velocity of Propagation:

VP (%)

69.5

Nominal Delay:

Delay (ns/ft)

1.46

Nom. Conductor DC Resistance:

DCR @ 20°C (Ohm/1000 ft)

64.2

Nominal Outer Shield DC Resistance:

DCR @ 20°C (Ohm/1000 ft)

10.2

Maximum VSWR:

| Freq. (MHz) | Max. VSWR |
|-------------|-----------|
| 500 | 1.1:1 |
| 20000 | 1.3:1 |

Nom. Attenuation:

| Freq. (MHz) | Attenuation (dB/100 ft.) |
|-------------|--------------------------|
| 500 | 15.0 |
| 1000 | 22.2 |
| 2000 | 32.8 |
| 3000 | 41.2 |
| 5000 | 54.9 |
| 7000 | 66.4 |
| 10000 | 81.2 |
| 15000 | 102 |
| 18000 | 113 |
| 20000 | 120 |

Max. Power Rating:

| Freq. (MHz) | Rating (W) |
|-------------|------------|
| 500 | 180 |
| 1000 | 119 |
| 2000 | 79 |
| 3000 | 62 |
| 5000 | 46 |
| 7000 | 37 |
| 10000 | 30 |
| 15000 | 24 |
| 18000 | 21 |
| 20000 | 20 |

Max. Operating Voltage - UL:

| Voltage |
|-------------------------------|
| 30 V RMS (UL AWM Style 10245) |

Max. Operating Voltage - Non-UL:

| Voltage |
|------------|
| 1500 V RMS |

Other Electrical Characteristic 1: Shield effectiveness values are typical/nominal values.

Shield Effectiveness:

| Freq. (MHz) | Effectiveness (dB) |
|-------------|--------------------|
| 9000.000 | 120.000 |

Misc. Information (Overall)**Notes (Overall)**

Notes: US Patents 4, 694, 122 & 5, 293, 001. Patent held in the U.S., Singapore, Australia, Germany, France, and England. Patent pending in Japan. Teflon® is a registered trademark of E. I. duPont de Nemours and Co. used under license by Belden, Inc.

Related Documents:

No related documents are available for this product

Put Ups and Colors:

| Item # | Putup | Ship Weight | Color | Notes | Item Desc |
|---------------|----------|-------------|-------------|-------|-------------------------|
| 1671A TIN100 | 100 FT | 1.900 LB | TIN - COLOR | | #24 TFE BRD TINNED COAX |
| 1671A TIN1000 | 1,000 FT | 12.000 LB | TIN - COLOR | V | #24 TFE BRD TINNED COAX |
| 1671A TIN50 | 50 FT | 1.100 LB | TIN - COLOR | | #24 TFE BRD TINNED COAX |
| 1671A TIN500 | 500 FT | 6.500 LB | TIN - COLOR | V | #24 TFE BRD TINNED COAX |

Notes:

V = 250' PUT-UP EXACT LENGTH MAXIMUM OF 3 PIECES MINIMUM LENGTH 50' 500' PUT-UP EXACT LENGTH MAXIMUM OF 5 PIECES MINIMUM LENGTH 50'

Revision Number: 4 Revision Date: 11-16-2010

© 2012 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 herein 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 "AS IS" 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 in stock 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.

1671A Coax - 50 Ohm Microwave Cable