

1/2" (12.7mm) RF COAXIAL CABLE

68.RF.1/2



DESCRIPTION:

- Core conductor of copper coated aluminum
- Foamed polyethylene insulation with solid polyethylene internal and external layer
- Corrugated copper external conductor
- Jacket of black polyethylene

APPLICATIONS:

Jumpers in microwave or cellular telephony systems

PROPERTIES:

- Low loss insulation
- High conductivity
- External corrugated conductor increases flexibility
- Available in specific lengths upon request, with or without connectors

| MECHANICAL PROPERTIES | | | | | | |
|-------------------------------|------------------------|--|---------------------|---------------------------|----------------------------------|------------------------|
| Core Conductor Diameter | Insulation Diameter | Diameter Over External Conductor | Overall Diameter | Minimum Bend Radius | Packaging Standard Lengths | Net Weight kg/km |
| 4.8 mm | 12.7 mm | 14 mm | 16 mm | 125 mm | 500 m | 253 |

* Values shown are nominal, subject to manufacturing tolerances.

SPECIFICATIONS:

MIL-C-28830

Quality System, ISO-9001.

| | CTRICAL PROP | PERTIES | | | | |
|-------------------|-------------------|---------------------------|-------------|-------------|-------------|------------|
| c.d. Resistance | c.d. Resistance | Characteristic | Stationary | Propagation | Capacitance | Dielectric |
| of Core | of External | Impedance | Wave Ratio | Speed | | Strength |
| Conductor | Conductor | | VSWR | | | |
| 1. 48 Ω/km | 1. 65 Ω/km | 50 <u>+</u> 1 Ω/km | 1.2 minimum | 88% | 76 pF/m | 4000 volts |

| ATTE | NUATION AND | ER | | | |
|------------------|-------------------------|---------------------|------------------|-------------------------|---------------------|
| Frequency MHz | Attenuation dB/100 m | Average Power kW | Frequency MHz | Attenuation dB/100 m | Average Power kW |
| 10 | 0.69 | 24.8 | 1500 | 9.60 | 0.80 |
| 50 | 1.58 | 4.80 | 2000 | 11.2 | 0.70 |
| 150 | 2.78 | 2.80 | 3000 | 14.3 | 0.55 |
| 300 | 4.08 | 1.90 | 4000 | 16.6 | 0.45 |
| 500 | 5.25 | 1.40 | 5000 | 19.5 | 0.40 |
| 800 | 6.79 | 1.15 | 6000 | 21.8 | 0.35 |
| 960 | 7.50 | 1.00 | 8000 | 26.0 | 0.30 |

Condumex Wire and Cable

2590 114th Street - Grand Prairie, TX 75050 - (800) 925-9473





7/8" (22.2mm) RF COAXIAL CABLE

68.RF.7/8



DESCRIPTION:

- Copper tube core conductor
- Foamed polyethylene insulation with solid polyethylene internal and external layer
- Corrugated copper external conductor
- Jacket of black polyethylene

APPLICATIONS:

• Connection of antennas in microwave or cellular telephony systems.

PROPERTIES:

- Low loss insulation
- High conductivity
- External corrugated conductor increases flexibility
- Available in specific lengths upon request

| MECHANICAL PROPERTIES | | | | | | |
|-------------------------------|------------------------|--|---------------------|---------------------------|----------------------------------|------------------------|
| Core Conductor Diameter | Insulation Diameter | Diameter Over External Conductor | Overall Diameter | Minimum Bend Radius | Packaging Standard Lengths | Net Weight kg/km |
| 9.02 mm | 22.2 mm | 24.8 mm | 27.6 mm | 250 mm | 500 m | 508 |

* Values shown are nominal, subject to manufacturing tolerances.

SPECIFICATIONS:

MIL-C-28830

Quality System, ISO-9001.

| | CTRICAL PROP | PERTIES | | | | |
|-----------------|-------------------|-------------------|-------------|---------------|-------------|------------|
| | | | | Been a setter | | Biologiale |
| c.a. Resistance | c.a. Resistance | Characteristic | stationary | Propagation | Capacitance | Dielectric |
| of Core | of External | Impedance | Wave Ratio | Speed | | Strength |
| Conductor | Conductor | | VSWR | | | |
| 1.06 Ω/km | 1. 06 Ω/km | 50 <u>+</u> 1Ω/km | 1.2 minimum | 89 % | 75 pF/m | 6000 volts |

| ATTE | NUATION AND | ER | | | |
|------------------|-------------------------|---------------------|------------------|-------------------------|---------------------|
| Frequency MHz | Attenuation dB/100 m | Average Power kW | Frequency MHz | Attenuation dB/100 m | Average Power kW |
| 10 | 0.37 | 24.6 | 800 | 3.79 | 3.79 |
| 50 | 0.85 | 10.7 | 960 | 4.20 | 2.1 |
| 150 | 1.50 | 6.0 | 1500 | 5.46 | 1.7 |
| 300 | 2.18 | 4.2 | 2000 | 6.47 | 1.4 |
| 400 | 2.58 | 3.6 | 3000 | 8.32 | 1.1 |
| 500 | 2.90 | 3.1 | 4000 | 9.93 | 0.9 |
| 700 | 3.51 | 2.6 | 5000 | 11.5 | 0.8 |



1-1/4" (31.75mm) RF COAXIAL CABLE

68.RF.1-1/4



DESCRIPTION:

- Copper tube core conductor
- Foamed polyethylene insulation with solid polyethylene internal and external layer
- Corrugated copper external conductor
- Jacket of black polyethylene

APPLICATIONS:

Connection of antennas in microwave or cellular telephony systems.

PROPERTIES:

- Low loss insulation
- High conductivity
- External corrugated conductor increases flexibility
- Available in specific lengths upon request

| | MECHANICAL PROPERTIES | | | | | |
|-------------------------------|------------------------|--|---------------------|---------------------------|----------------------------------|------------------------|
| Core Conductor Diameter | Insulation Diameter | Diameter Over External Conductor | Overall Diameter | Minimum Bend Radius | Packaging Standard Lengths | Net Weight kg/km |
| 13.1 mm | 31.75 mm | 34.7 mm | 38.7 mm | 380 mm | 500 m | 970 |

* Values shown are nominal, subject to manufacturing tolerances.

SPECIFICATIONS:

MIL-C-28830

Quality System, ISO-9001.

| | CTRICAL PROP | PERTIES | | | | |
|-----------------|-----------------|-------------------|-------------|-------------|-------------|--------------|
| | | | | B | | |
| c.a. Resistance | c.a. Resistance | Characteristic | stationary | Propagation | Capacitance | Dielectric |
| of Core | of External | Impedance | Wave Ratio | Speed | | Strength |
| Conductor | Conductor | | VSWR | | | |
| 0.71 Ω/km | 0.41 Ω/km | 50 <u>+</u> 1Ω/km | 1.2 minimum | 89 % | 75 pF/m | 10,000 volts |

| | NUATION AND | ER | | | |
|------------------|-------------------------|---------------------|------------------|-------------------------|---------------------|
| Frequency MHz | Attenuation dB/100 m | Average Power kW | Frequency MHz | Attenuation dB/100 m | Average Power kW |
| 10 | 0.28 | 36.9 | 700 | 2.58 | 3.9 |
| 50 | 0.63 | 16.1 | 800 | 2.79 | 3.6 |
| 108 | 0.94 | 10.8 | 960 | 3.09 | 3.3 |
| 150 | 1.12 | 9.1 | 1250 | 3.60 | 2.8 |
| 300 | 1.62 | 6.3 | 1500 | 4.02 | 2.5 |
| 400 | 1.89 | 5.3 | 2000 | 4.76 | 2.1 |
| 500 | 2.15 | 4.7 | 3000 | 6.08 | 1.7 |

Condumex Wire and Cable

2590 114th Street - Grand Prairie, TX 75050 - (800) 925-9473





1-5/8" (41.275mm) RF COAXIAL CABLE

68.RF.1-5/8



DESCRIPTION:

- Corrugated copper tube core conductor
- Foamed polyethylene insulation with solid polyethylene internal and external layer
- Corrugated copper external conductor
- Jacket of black polyethylene

APPLICATIONS:

Connection of antennas in microwave or cellular telephony systems.

PROPERTIES:

- Low loss insulation
- High conductivity
- External corrugated conductor increases flexibility
- Available in specific lengths upon request

| MECHANICAL PROPERTIES | | | | | | |
|-------------------------------|------------------------|--|---------------------|---------------------------|----------------------------------|------------------------|
| Core Conductor Diameter | Insulation Diameter | Diameter Over External Conductor | Overall Diameter | Minimum Bend Radius | Packaging Standard Lengths | Net Weight kg/km |
| 17.3 mm | 41.3 mm | 46 mm | 49.5 mm | 510 mm | 500 m | 1170 |

* Values shown are nominal, subject to manufacturing tolerances.

SPECIFICATIONS:

MIL-C-28830

Quality System, ISO-9001.

| | CTRICAL PROP | PERTIES | | | | |
|-----------------|-----------------|-------------------|-------------|-------------|-------------|--------------|
| | | | | | | |
| c.d. Resistance | c.d. Resistance | Characteristic | Stationary | Propagation | Capacitance | Dielectric |
| of Core | of External | Impedance | Wave Ratio | Speed | | Strength |
| Conductor | Conductor | | VSWR | | | |
| 0.67 Ω/km | 0.32 Ω/km | 50 <u>+</u> 1Ω/km | 1.2 minimum | 88% | 75 pF/m | 11,000 volts |

| ATTE | NUATION AND | ER | | | |
|------------------|-------------------------|---------------------|------------------|-------------------------|---------------------|
| Frequency MHz | Attenuation dB/100 m | Average Power kW | Frequency MHz | Attenuation dB/100 m | Average Power kW |
| 10 | 0.23 | 51.0 | 800 | 2.35 | 4.8 |
| 50 | 0.51 | 22.1 | 960 | 2.62 | 4.3 |
| 108 | 0.77 | 14.7 | 1500 | 3.43 | 3.3 |
| 150 | 0.92 | 12.4 | 1700 | 3.71 | 3.1 |
| 300 | 1.34 | 8.4 | 2000 | 4.09 | 2.7 |
| 500 | 1.78 | 6.3 | 2300 | 4.47 | 2.5 |
| 700 | 2.18 | 5.2 | 2500 | 4.72 | 2.4 |