



DUNBAR-CRFR

2:1 SHRINK RATIO, NEOPRENE, FLEXIBLE, FLAME RETARDENT, TUBING

Applications

DUNBAR-CRFR is used for insulation, strain relief, and abrasion protection on cable harnesses and wire bundles in military and aerospace industries. It provides fluid and solvent resistance, including lubricating oil, aviation and ground-vehicle fuels and hydraulic fluids. Neoprene remains flexible at low temperatures

Features

- ★ Shrink ratio: 50% or more in the radial direction, 10% or less in the axial direction
- ★ In stock for immediate shipments
- ★ Continuous operating temperature: -70 °C (-94 °F) to 121 °C (250 °F)
- ★ Flammability: ASTM D2671 Procedure A
- ★ Excellent abrasion protection for military industries

Standard

- ★ AMS-DTL-23053/1 Class 1 & 2 (Formerly MIL-DTL-23053/1 Class 1 and Class 2)
- ★ RoHS Compliant

Specification Values

| Properties | | Test Methods | Values |
|----------------------|---------------------|-----------------------------------|-------------------------------------|
| Physical | Unaged | Tensile strength | Min. 1500 psi |
| | | Elongation | Min. 225% |
| | | Tensile strength @200% Elongation | Max. 1500 psi |
| | Aged | Tensile strength | Min. 1200 psi |
| | | Elongation | Min. 175% |
| | Fluid Resist. | Tensile strength | Min. 1000 psi |
| | | Elongation | Min. 175% |
| | | Dielectric strength | Min. 250Volts/mil |
| Low temperature flex | | -70°Cx4hrs | No cracks |
| Heat shock | | 200°Cx4hrs | No cracks, flowing, or dripping |
| Electrical | Dielectric strength | ASTM D2671 | Min. 300Volts/mil |
| | Volume resistivity | ASTM D876 | Min. $1 \times 10^{11} \Omega$ - cm |
| Chemical | Copper corrosion | 150°C/16hrs | No corrosion |
| | Fungus resistance | ASTM G21 | No Growth |
| | Water Absorption | ASTM D570 | Max. 1.0 |
| | Flammability | ASTM D2671 | Pass |

Rev. Feb 2015



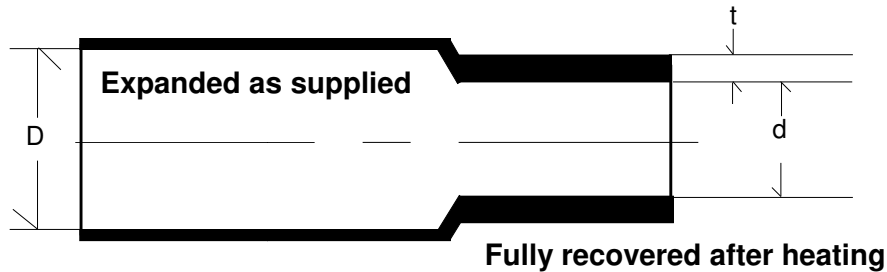
Dunbar Products LLC
Tubing and Identification Products

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Product Dimensions

Minimum Shrink Temperature: 135 °C

| Size | Expanded | | Recovered | | | | Standard Spool Length |
|-----------|---------------------------------|------|---------------------------------|------|----------------------------------|------|-----------------------|
| | Internal Diameter (Minimum) (D) | | Internal Diameter (Maximum) (d) | | Minimum Total Wall Thickness (t) | | |
| Inch Size | In. | mm | In. | mm | In. | mm | Ft. |
| 1/8" | 0.125 | 3.2 | 0.062 | 1.57 | 0.028 | 0.70 | 500 |
| 3/16" | 0.188 | 4.8 | 0.093 | 2.36 | 0.030 | 0.75 | 250 |
| 1/4" | 0.250 | 6.4 | 0.143 | 3.6 | 0.035 | 0.89 | 250 |
| 3/8" | 0.375 | 9.5 | 0.211 | 5.4 | 0.040 | 1.01 | 100 |
| 1/2" | 0.500 | 12.7 | 0.286 | 7.3 | 0.048 | 1.21 | 100 |
| 5/8" | 0.625 | 15.9 | 0.357 | 9.1 | 0.052 | 1.32 | 100 |
| 3/4" | 0.750 | 19.1 | 0.428 | 10.9 | 0.057 | 1.44 | 100 |
| 7/8" | 0.875 | 22.2 | 0.500 | 12.7 | 0.065 | 1.65 | 100 |
| 1" | 1.00 | 25.4 | 0.570 | 14.5 | 0.070 | 1.70 | 100 |
| 1-1/4" | 1.25 | 31.8 | 0.714 | 18.1 | 0.087 | 2.20 | 100 |
| 1-1/2" | 1.5 | 38.1 | 0.857 | 21.8 | 0.095 | 2.41 | 100 |

Standard Color: Black

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