

REFLECTIVE THERMAL PROTECTION

FEATURES AND BENEFITS

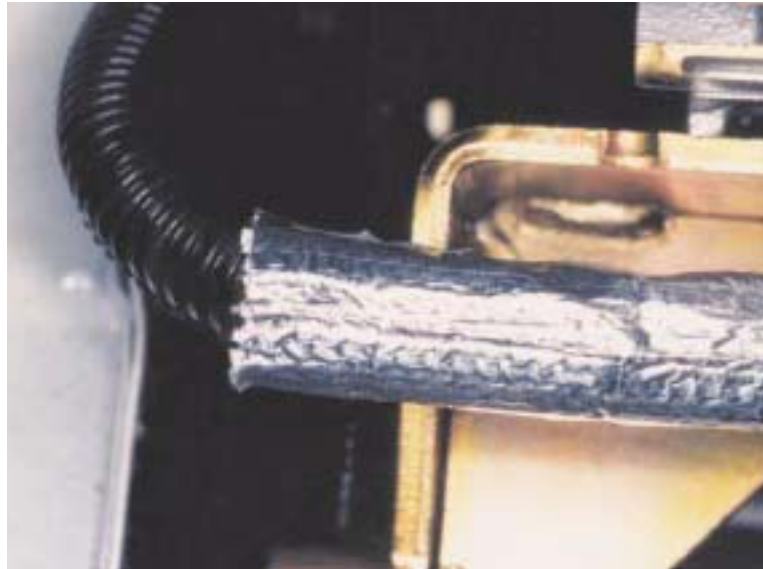
- Tubular Sleeve no sew line
- Excellent protection against radiant heat
- Working temperature : 200 ° C
- Flexible
- Low Profile
- Fluid and chemical resistant
- Easy installation

TYPICAL APPLICATIONS

- Tubings and hoses
- A/C lines
- Hydraulic and fuel lines
- Control cables
- Engine Wire Harnesses

Our manufacturing sites are certified ISO 9000, QS 9000 or ISO/TS 16949 and ISO 14001.

ReflectSleeve™ 1451



Bentley-Harris® ReflectSleeve 1451 is a one-piece fiberglass sleeve that is laminated to an aluminum foil.

A special manufacturing process permits the sleeve to boast a virtually seamless and non fraying construction. This features make **ReflectSleeve 1451** a low profile and aesthetic solution, easy to apply onto the application it protects.

The outer aluminum finish is highly reflective while the inner layer of the fiberglass greatly increases insulating efficiency.

ReflectSleeve 1451 provides a maximum protection for tubings and hoses, engine wire harnesses and other critical components requiring radiant heat protection. It also provides superior fluid resistance.

1451

BentleyHarris®
Protection Products

PERFORMANCE DATA

Test	Tested Property	Result
SAE J2302	Thermal Performance	See graph below
ISO 6722	Heat ageing : 3000h at 200°C	Neither any visible degradation or loss of flexibility Shrinkage < 10%
FMVSS 302 Test Method D45 1333	Flame Resistance	Non flammable Type A
Test method D47 1924	Fluid Resistance	No visible degradation or alteration after being exposed to the following test cycles : <ul style="list-style-type: none"> immersion for 15s at 22°C followed by a drying period of 24h at 150°C : motor oil, protection oil, automatic transmission fluid, mineral hydraulic fluid, zinc chloride (drying at 23°C) immersion for 2h at 70°C (in vapour) followed by a drying period of 4h at 23°C : battery fluid immersion for 24h at 70°C : windshield cleaner and at 118°C : engine coolant

STANDARD SIZES

Nominal internal diameter (mm)	Packaging (m)
10	150
13	150
16	100
19	100
22	100
25	100
32	100
38	50
45	50
51	50

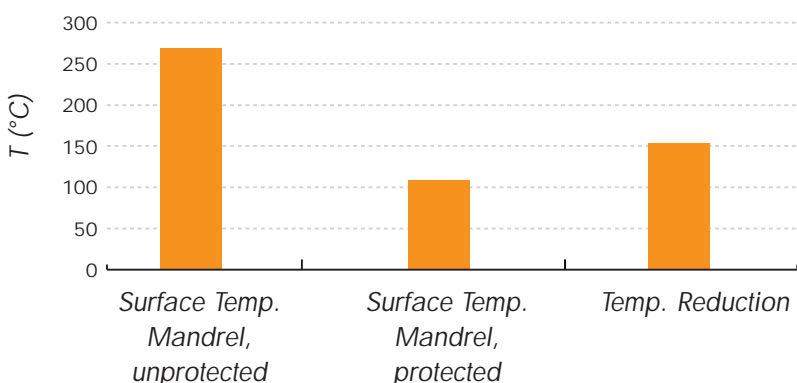
AVAILABILITY

Bentley-Harris® ReflectSleeve 1451 is available in a range of sizes from 10 mm to 51 mm. ReflectSleeve 1451 is available in spools or cut to the following specifications :

- Recommended standard cut length ≤ 500 mm are in 5 mm increments,
- Recommended standard cut length ≥ 501 mm are in 10 mm increments.

Packaging is in accordance with GALIA Standard (ODETTE). Finish is aluminum. All numeric data shows typical or average values.

THERMAL PERFORMANCE (SAE J 2302)



*Heat Source Temperature : 540 °C,
25 mm below ceramic mandrel.
Diameter of the ceramic mandrel : 19 mm.
Diameter of the sleeve : 22 mm.*

The information and illustrations given herein are believed to be reliable. Federal-Mogul makes no warranties as to their accuracy or completeness and reserves the right to change them without notice. Federal-Mogul disclaims any liability in connection with their use. Federal-Mogul's only obligations are those in the standard terms of sale for this product and Federal-Mogul will not be liable for any consequential or other damages arising out of the use or misuse of this product. Users should make their own evaluations to determine the suitability of the product for specific applications.