



Aluminum Foil Tape

431 • 439 (Linered)

Technical Data

Product Description A 2-mil nominal dead soft aluminum foil with transparent acrylic adhesive for many permanent sealing, holding, splicing or masking applications requiring the protection offered by a foil backing. (439 tape is linered version)

Product Construction	Backing	Adhesive	Color	Liner (439)	Standard Roll Length
	Aluminum foil	Acrylic	Shiny silver	Tan kraft paper with silicone release	60 yds. (55 m)

Typical Physical Properties **Note: The following technical information and data should be considered representative or typical only and should not be used for specification purposes.**

		ASTM Test Method
Adhesion to Steel:	41 oz./in. width (45 N/100 mm)	D-3330
Tensile Strength at Break:	431 19 lbs./in. width (338 N/100 mm) 439 18 lbs./in. width (315 N/100 mm)	D-3759
Elongation at Break:	431 5% 439 3%	D-3759
Backing Thickness:	1.9 mils (0.05 mm)	D-3652
Total Tape Thickness:	3.1 mils (0.08 mm)	D-3652
Liner Thickness:	439 5.6 mils (0.14 mm)	D-3652
Temperature Use Range:	-65° to 300°F (-54° to 149°C)	
Water Vapor Transmission Rate:	0.1g H ₂ O/100 sq. in./24 hrs. (1.55 g/m ² /24 hrs.)	D-3833
Weight:	0.0096 lbs./yd./in. width (.0048 kg/m/24 mm)	

- General Information**
- Flame resistant. Meets U.L. 723, Class “L” low flammability rating (File R 7311).
 - Meets requirements of F.A.R. 25.853(a).
 - Foil backing provides an excellent reflective surface for both heat and light.
 - Good aging performance both indoors and outdoors.
 - Low moisture vapor transmission rate offers excellent sealing and patching performance.
 - Best results attained when applied to clean dry surfaces above 32°F (0°C).

IMPORTANT: The 3M™ Aluminum Foil Tape 431 and 439 (Linered) are not intended for medical usage. Neither 3M nor the Food and Drug Administration have evaluated or reviewed this tape for medical application. User assumes all risk and liability whatsoever in connection with usage of product in a medical application.

Shelf Life To obtain best performance, use this product within 24 months from date of manufacture and store under normal conditions of 60° to 80°F (16° to 27°C) and 40 to 60% R.H. in the original carton.

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Application Ideas

- Seal and patch tears in truck trailers, as well as other outdoor equipment.
- Reflect heat away from sensitive areas.
- Thermal heat conduction.
- General purpose holding, patching, sealing applications – indoors or out.
- Splicing of thin gauge foils.
- Good maskant in electroplating of aluminum because it will not contaminate the bath.
- Decorative.

Features	Features	Advantages	Benefits
	<ul style="list-style-type: none">• Aluminum foil backing	<ul style="list-style-type: none">• Protection• Heat reflective• Flame resistant	<ul style="list-style-type: none">• Helps protect parts from water, dust or chemical damage• Helps protect parts from heat• Will not support combustion
	<ul style="list-style-type: none">• Acrylic adhesive	<ul style="list-style-type: none">• Long aging	<ul style="list-style-type: none">• Helps reduce replacement need

Technical Information and Data

The technical information and data, recommendations, and other statements provided in this brochure are based on tests or experience which 3M believes to be reliable, but the accuracy or completeness of such information is not guaranteed.

Product Use

Please remember that many factors can affect the use and performance of a 3M product in a particular application. The materials to be used with the 3M product, the surface preparation of those materials, the product selected for use, the conditions in which the product is used, and the time and environmental conditions in which the product is expected to perform are among the many factors that can affect the use and performance of a 3M product. Given the variety of factors that can affect the use and performance of a 3M product, some of which are uniquely within the user's knowledge and control, it is essential that the user evaluate the 3M product to determine whether it is fit for a particular purpose and suitable for the user's method of application.

Limited Warranty and Limited Remedy

The 3M product will be free from defects in material and manufacture for a period of one (1) year from the date of manufacture. 3M MAKES NO OTHER WARRANTIES, EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE OR ANY IMPLIED WARRANTY ARISING OUT OF A COURSE OF DEALING, CUSTOM, OR USAGE OF TRADE. User is responsible for determining whether the 3M product is fit for a particular purpose and suitable for user's method of application. If the 3M product is defective within the warranty period stated above, YOUR EXCLUSIVE REMEDY AND 3M'S SOLE OBLIGATION SHALL BE, AT 3M'S OPTION, TO REPLACE OR REPAIR THE 3M PRODUCT OR REFUND THE PURCHASE PRICE OF THE 3M PRODUCT.

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This Industrial Tape and Specialties Division product was manufactured under a 3M quality system registered to ISO 9002 standards.



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