



Technical Data Sheet

3M™ Venture Tape™ UL181A-P and UL181B-FX Aluminum Foil Tape 1581A

Product Description

3M™ Venture Tape™ UL181A-P and US181B-FX Aluminum Foil Tape 1581A is a high temperature, high strength aluminum foil tape coated with a cold weather acrylic pressure sensitive adhesive.

Product Features

- Conformable foil applies easily to both rigid duct board and flexible duct
- Excellent performance in demanding temperature and humidity conditions
- Excellent performance and durability over a wide range of environmental conditions
- Easy to install on site without special tools or application methods


Technical Information Note

The following technical information and data should be considered representative or typical only and should not be used for specification purposes.


Typical Physical Properties

Property	Values	Additional Information
Backing	High strength aluminum foil	
Adhesive Type	Acrylic	
Liner	Paper	
Color	Natural Aluminum	
Backing Thickness (mm)	0.05 mm	View ^
Test Method: ASTM D3652		
Total Tape Thickness (mil)	3.9 mil	View ^
Test Method: ASTM D3652		
Total Tape Thickness (mm)	0.09 mm	View ^



Test Method: ASTM D3652

Backing Thickness	2 mil	View 
Test Method: ASTM D3652		

Typical Performance Characteristics



Property	Values	Additional Information
Tensile Strength	50.8 N/cm	View 

Test Method: ASTM D3759

180° Peel Adhesion	6.6 N/cm	View 
Test Method: ASTM D3330		
Notes: 12 in/min (300 mm/min)		
180° Peel Adhesion	60 oz/in	View 

Test Method: ASTM D3330

Notes: 12 in/min (300 mm/min)

Tensile Strength (lb/in)	29 lb/in	View 
Test Method: ASTM D3759		
Elongation at Break (%)	10 %	View 

Test Method: ASTM D3759

Long Term Temperature Resistance	149 °C	
Minimum Long Term Temperature Resistance	-40 °C	

Long Term Temperature Resistance	300 °F	
Minimum Long Term Temperature Resistance	-40 °F	

Available Sizes

Property	Values	Additional Information
----------	--------	------------------------

Standard Roll Length	55 m
Standard Roll Length	60 yd

Certifications/Standards

- UL181A-P Listed (UL File # MH16587)
- UL181B-FX Listed (UL File # MH16587)
- ULC S102 Listed (Flame/Smoke 0/0) [ULC File # R10984]

Storage and Shelf Life

Store in a clean, dry place. Temperature of 40-80°F (4-26°C) and 40 to 50% relative humidity are recommended. To obtain best performance, use this product within 24 months from date of manufacture.

Bottom Matter

3M
Industrial Adhesives and Tapes Division
3M Center, Building 225-3S-06
St. Paul, MN 55144-1000
800-362-3550

Trademarks

3M is a trademark of 3M Company.

Handling/Application Information

Application Examples

- Vapor seal on reinforced fiberglass duct board
- High performance duct closure
- Sealing flexible duct to rigid duct

References

Property	Values
3m.com Product Page	https://www.3m.com/3M/en_US/p/d/b40067911/
Safety Data Sheet SDS	https://www.3m.com/3M/en_US/company-us/SDS-search/results/?gsaAction=msdsSRA&msdsLocale=en_US&co=ptn&q=1581A

Family Group

Link Tags:

- 1581A

Products	Adhesive Type	Liner	Total Tape Thickness (mm)	Tensile Strength	Long Term Temperature Resistance	Minimum Long Term Temperature Resistance
1581A	Acrylic	Paper	0.09 mm	50.8 N/cm	149 °C	-40 °C

ISO Statement

This Industrial Adhesives and Tapes Division product was manufactured under a 3M quality system registered to ISO 9001 standards.

Information

Technical Information: The technical information, guidance, and other statements contained in this document or otherwise provided by 3M are based upon records, tests, or experience that 3M believes to be reliable, but the accuracy, completeness, and representative nature of such information is not guaranteed. Such information is intended for people with knowledge and technical skills sufficient to assess and apply their own informed judgment to the information. No license under any 3M or third party intellectual property rights is granted or implied with this information.

Product Selection and Use: Many factors beyond 3M’s control and uniquely within user’s knowledge and control can affect the use and performance of a 3M product in a particular application. As a result, customer is solely responsible for evaluating the product and determining whether it is appropriate and suitable for customer’s application, including conducting a workplace hazard assessment and reviewing all applicable regulations and standards (e.g., OSHA, ANSI, etc.). Failure to properly evaluate, select, and use a 3M product and appropriate safety products, or to meet all applicable safety regulations, may result in injury, sickness, death, and/or harm to property.

Warranty, Limited Remedy, and Disclaimer: Unless a different warranty is specifically stated on the applicable 3M product packaging or product literature (in which case such warranty governs), 3M warrants that each 3M product meets the applicable 3M product specification at the time 3M ships the product. 3M MAKES NO OTHER WARRANTIES OR CONDITIONS, EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, ANY IMPLIED WARRANTY OR CONDITION OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, OR ARISING OUT OF A COURSE OF DEALING, CUSTOM, OR USAGE OF TRADE. If a 3M product does not conform to this warranty, then the sole and exclusive remedy is, at 3M’s option, replacement of the 3M product or refund of the purchase price.

Limitation of Liability: Except for the limited remedy stated above, and except to the extent prohibited by law, 3M will not be liable for any loss or damage arising from or related to the 3M product, whether direct, indirect, special, incidental, or consequential (including, but not limited to, lost profits or business opportunity), regardless of the legal or equitable theory asserted, including, but not limited to, warranty, contract, negligence, or strict liability.

Disclaimer: 3M industrial and occupational products are intended, labeled, and packaged for sale to trained industrial and occupational customers for workplace use. Unless specifically stated otherwise on the applicable product packaging or literature, these products are not intended, labeled, or packaged for sale to or use by consumers (e.g., for home, personal, primary or secondary school, recreational/sporting, or other uses not described in the applicable product packaging or literature), and must be selected and used in compliance with applicable health and safety regulations and standards (e.g., U.S. OSHA, ANSI), as well as all product literature, user instructions, warnings, and limitations, and the user must take any action required under any recall, field action or other product use notice. Misuse of 3M industrial and occupational products may result in injury, sickness, or death. For help with product selection and use, consult your on-site safety professional, industrial hygienist, or other subject matter expert. For additional product information, visit www.3M.com.