PRODUCT DESCRIPTION

ARclad® 93319 is a low surface energy tape that provides high adhesion to plastics such as polyethylene and polypropylene.

FEATURES

- High adhesion to low energy surfaces
- Die-cuttable
- Maintains adhesion at elevated temperatures
- High shear strength

BENEFITS

- High adhesion to most surfaces including plastics and stainless steel
- Paper liner facilitates die-cutting
- Self wound

PRODUCT APPLICATIONS

Suggested for use in bonding to low surface energy surfaces such as polypropylene and polyethylene plastics or powder-coated surfaces. It is necessary, as with all pressure-sensitive tapes, that the surface to which the tape is to be applied be clean and dry. Users should assure the product meets the specific needs of their application(s). Adhesives Research can tailor the product to meet the needs of specific applications as requested by customers.

PRODUCT PROFILE AND DIAGRAM

Paper Liner: 5.2 mil (130 μm)
Adhesive: 2.2 mil (55 μm) AS-293

ADHESIVE PERFORMANCE PROPERTIES – Typical Values*

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
<th>Test Method</th>
</tr>
</thead>
<tbody>
<tr>
<td>Liner Release Easy</td>
<td>14 g/2 in.</td>
<td>ART #1031</td>
</tr>
<tr>
<td>Liner Release Tight</td>
<td>150 g/2 in.</td>
<td></td>
</tr>
<tr>
<td>180° Peel Adhesion to Polypropylene (5 min. dwell)</td>
<td>65.4 oz/in.</td>
<td>ART #1005</td>
</tr>
<tr>
<td>180° Peel Adhesion to HDPE (5 min. dwell)</td>
<td>40.2 oz/in.</td>
<td>ART #1005</td>
</tr>
<tr>
<td>180° Peel Adhesion to Stainless Steel (5 min. dwell)</td>
<td>83.2 oz/in.</td>
<td>ART #1005</td>
</tr>
<tr>
<td>Static Shear (1/2 in. x 1/2 in., 500 g)</td>
<td>1000 min.</td>
<td>ART #2054</td>
</tr>
</tbody>
</table>

*All stated values are nominal and should only be used as a guide for selection. They are not specifications.

STORAGE AND SHELF LIFE

Unconverted product should be stored at 70°F ± 20°F (21°C ± 11°C) and 50% ± 20% relative humidity, out of direct sunlight. The shelf life of the product has not been established.
Note: The information contained on this data sheet is based upon test results of limited quantities of this material and may be modified by Adhesives Research following additional production experience and evaluation. This data should not be used in preparing specifications. Products identified as developmental may be subject to modification by Adhesives Research, Inc.

(5 January 2016)

APPLICATION AND STORAGE OF PRESSURE-SENSITIVE ADHESIVE TAPES
Pressure-sensitive adhesive tapes function as a mechanical product; however, the adhesive itself is a chemical composition that can be sensitive to environmental conditions. A purchaser of pressure-sensitive adhesive products should be aware of the shelf life of each product and not purchase more than it can use before the expiration date. Shipping and storage conditions affect shelf life. The optimum storage temperature is 70°F (21 °C). Cool, dry storage is recommended.

For best results...
1) The surfaces you wish to bond should be clean and free of oil, moisture and dust. If the surface temperature is below 40°F, it may be difficult to achieve a proper bond.
2) Do not use a pressure-sensitive adhesive product where it will be exposed to temperatures lower or higher than those designated for each product. Heat can destroy the effectiveness of the bond and extreme cold can cause the adhesive to harden and not adhere properly.
3) When the tape is applied, use firm hand or lamination pressure to achieve contact between the adhesive and the surface to which it is applied. Hand rollers or nip rollers may be needed for certain products or applications. Consult your AR sales representative if you need additional information.

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AR limits the purchaser’s remedies in the event of a breach of any warranty. The purchaser’s exclusive remedy and AR’s obligations for a breach of any warranty shall be as set forth in the Sales Order Acknowledgment.

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