



4914-015, 020, 025 VHB™ Acrylic Foam Tape

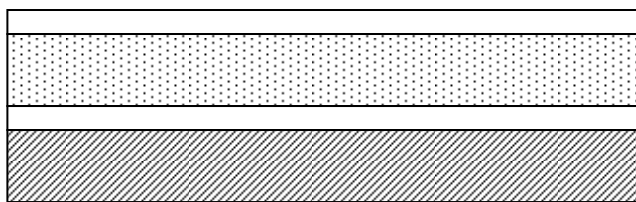
Technical Data Sheet

2012.09

1. Product Description

3M 4914-015,-02,-025 are the thinner type of VHB™, which are double coated acrylic foam with acrylic pressure sensitive adhesive on both side, and have excellent static shear, peel adhesion and resistance to solvents, UV light and elevated temperature. They are suitable for the application that is required thinner bonding thickness to reduce a space.

2. Construction



Acrylic adhesive
Acrylic foam
Acrylic adhesive
Paper liner

3. Advantages

1. Low caliper
2. High sealing ability
3. High peel strength
4. Good resistance to spring back force

4. Typical Physical Performance:

Physical property

| Products No. | | 4914-015 | 4914-02 | 4914-025 |
|-----------------------------------|------------------|----------|---------|----------|
| Color | | White | | |
| Thickness | VHB (mm) | 0.15 | 0.20 | 0.25 |
| | Paper liner (mm) | 0.08 | | |
| Foam density (g/cm ³) | | 1.29 | | |

Adhesion property

| | 4914-015 | 4914-02 | 4914-025 |
|---|----------|---------|----------|
| 90° Peel Adhesion (N/cm) | 20 | 21 | 26 |
| T-Peel Adhesion (N/cm) | 16.5 | 17.5 | 15 |
| Dynamic Shear Strength (N/cm ²) | 225 | 220 | 218 |

Adhesion on various substrates

| | | 4914-015 | 4914-02 | 4914-025 |
|--------------------------------|------------------------------|----------|---------|----------|
| 90 degree peel adhesion (N/cm) | Stainless Steel (SUS 304 BA) | 20 | 21.5 | 26 |
| | Acrylic Plate | 14 | 15.5 | 16 |
| | ABS Plate | 15 | 16.3 | 17 |
| | Polycarbonate | 13.6 | 14.2 | 21 |

Test Method

Thickness:

Digital caliper gauge with caliper foot of 5mm diameter

Tape density:

Cut tape specimen 1 x 3", measure thickness, determine the mass of the specimen. Calculate the density from volume and mass.

90°C Peel Adhesion:

Tape between stainless steel and anodized aluminum foil.

Roll down twice in each direction using 10kg steel roller.

72 hours dwell at room temperature.

Testing speed 300 mm/min.

T-Peel Adhesion:

Using anodized aluminum foil.

Roll down twice in each direction using 10kg steel roller.

72 hours dwell at room temperature.

Testing speed 300 mm/min.

Dynamic Shear Strength:

To stainless steel.

Roll down twice in each direction using 10kg steel roller.

3 hours dwell at 65degree Ce.

Testing speed 300 mm/min.

Other information

Operating temperature range: At less than -20°C, impact resistance performance decrease.

Degradation of adhesive may be caused for long range using under condition over 150°C.

Storage Condition:

Tape may change its appearance when it is exposed in high temperature and humidity for a long time.

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This product was manufactured under a 3M quality system registered to ISO 9002 standards.

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