



Acrylic *Plus* Tape Series PT1000

Technical Data Sheet

April 2009

Supersedes Technical Data Sheets for PT1100 and PT1500 Dated August 2003

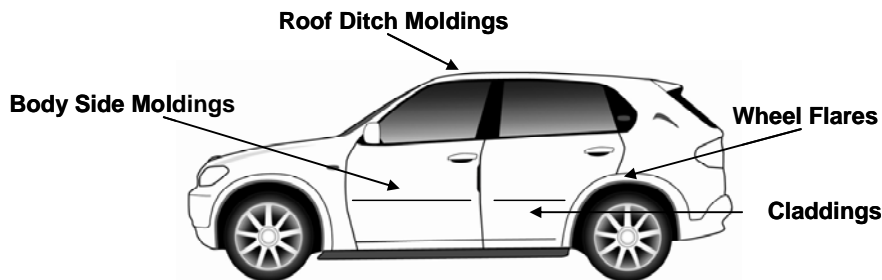
General Description 3M™ Acrylic *Plus* Tape Series PT1000 is a black, double-coated acrylic foam tape designed for the attachment of automotive exterior trim parts such as body side moldings and claddings.

3M Tape Series PT1000 offers the following key features:

- Superior adhesion performance to automotive paint surfaces, including the newest scratch- and mar-resistant formulations
- High conformability
- Black, high-strength core with low elongation properties
- Cold temperature impact resistance
- Easy liner release

The highly conformable core, which improves adhesive wet out, combines with high performance adhesive systems to provide excellent part adhesion to the most challenging surfaces. The black color and low elongation properties improve the bond-line appearance of the attached part.

Applications Some typical applications for 3M Tape Series PT1000 include body side moldings, claddings, roof ditch moldings and wheel flares.

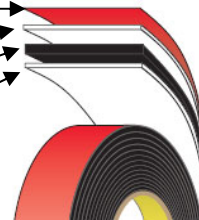


Shelf Life One year from date of receipt by customer when stored at 4° C - 30° C (40° F - 100° F) and 0 – 95% relative humidity. Optimum storage conditions are 22° C (72° F) and 50% relative humidity.

Product Construction

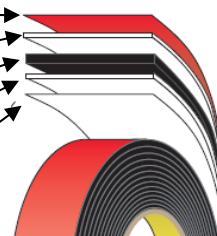
3M Acrylic *Plus* Tapes PT1100 and PT1500

- GL-1 easy-release liner
- VR-2 acrylic adhesive
- Black acrylic foam
- VR-1 acrylic adhesive



3M Acrylic *Plus* Tapes PT1100 T and PT1500 T

- GL-3 easy-release liner
- VR-2 acrylic adhesive
- Black acrylic foam
- VR-1 acrylic adhesive
- Secondary liner



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Physical Properties

| | PT1100 | PT1500 | PT1100 T | PT1500 T |
|------------------|--|--|--|--|
| Thickness | 1.14 mm (0.045 in.) | 1.52 mm (0.060 in.) | 1.14 mm (0.045 in.) | 1.52 mm (0.060 in.) |
| Range | +/- 0.13 mm (0.005 in.) | +/- 0.13 mm (0.005 in.) | +/- 0.13 mm (0.005 in.) | +/- 0.13 mm (0.005 in.) |
| Density | 545 kg/m ³ (34 lb/ft ³) | 521 kg/m ³ (32.5 lb/ft ³) | 545 kg/m ³ (34 lb/ft ³) | 521 kg/m ³ (32.5 lb/ft ³) |
| Range | +/- 80 kg/m ³ (5 lb/ft ³) | +/- 80 kg/m ³ (5 lb/ft ³) | +/- 80 kg/m ³ (5 lb/ft ³) | +/- 80 kg/m ³ (5 lb/ft ³) |

Liner Options

GL-3 (T versions)

GL-1

Configuration

Red Polyethylene
1-side silicone-coated with secondary liner
Red Polyethylene
2-side silicone-coated

Heat-Bond Tab Compatibility

Yes
(3M™ Tabbing Tape 5400)
No
Contact 3M technical service for options

Roll Width and Length

3M™ Acrylic Plus Tapes are available in the following standard widths. Millimeter widths are rounded to the nearest whole numbers and 1/8-inch increments starting with 1/4 inch.

Minimum widths:
4 mm Levelwound
5 mm Planetary
(Standard versions)
6 mm Planetary
(T versions)

Planetary

PT1100

| Roll Width | Roll Width Tolerance | Roll Length (maximum) |
|-------------------------------|-----------------------------|------------------------|
| < 8 mm (< 0.276 in) | +/- 0.40 mm (+/-0.015 in.) | 66 meters (72 yards) |
| 8 - 9 mm (0.276 - 0.375 in) | +/- 0.40 mm (+/-0.015 in.) | 99 meters (108 yards) |
| 10 - 18 mm (0.394 - 0.709 in) | +/- 0.40 mm (+/-0.015 in.) | 132 meters (144 yards) |
| > 18 mm (> 0.709 in.) | +/- 0.80 mm (+/- 0.031 in.) | 132 meters (144 yards) |

PT1500

| Roll Width | Roll Width Tolerance | Roll Length (maximum) |
|----------------------|----------------------------|-----------------------|
| < 10 mm (< 0.315 in) | +/- 0.40 mm (+/-0.015 in.) | 66 meters (72 yards) |
| > 10 mm (0.394) | +/- 0.40 mm (+/-0.015 in.) | 99 meters (108 yards) |

PT1100 T

| Roll Width | Roll Width Tolerance | Roll Length (maximum) |
|-------------------------------|-----------------------------|------------------------|
| < 8 mm (< 0.276 in) | +/- 0.40 mm (+/-0.015 in.) | 66 meters (72 yards) |
| 8 - 9 mm (0.276 - 0.375 in) | +/- 0.40 mm (+/-0.015 in.) | 99 meters (108 yards) |
| 10 - 18 mm (0.394 - 0.709 in) | +/- 0.40 mm (+/-0.015 in.) | 132 meters (144 yards) |
| > 18 mm (> 0.709 in.) | +/- 0.80 mm (+/- 0.031 in.) | 132 meters (144 yards) |

PT1500 T

| Roll Width | Roll Width Tolerance | Roll Length (maximum) |
|----------------------|----------------------------|-----------------------|
| < 10 mm (< 0.315 in) | +/- 0.40 mm (+/-0.015 in.) | 66 meters (72 yards) |
| > 10 mm (0.394) | +/- 0.40 mm (+/-0.015 in.) | 99 meters (108 yards) |

Levelwound

PT1100 - PT1100T

| Roll Width | Roll Width Tolerance | Roll Length (maximum) |
|-------------------------------|----------------------------|------------------------|
| 4 - 14 mm (0.157 - 0.551 in) | +/- 0.40 mm (+/-0.015 in.) | 900 meters (984 yards) |
| 15 - 16 mm (0.591 - 0.630 in) | +/- 0.40 mm (+/-0.015 in.) | 700 meters (765 yards) |

PT1500 - PT1500 T

| Roll Width | Roll Width Tolerance | Roll Length (maximum) |
|------------------------------|----------------------------|------------------------|
| 4 - 16 mm (0.157 - 0.630 in) | +/- 0.40 mm (+/-0.015 in.) | 500 meters (545 yards) |

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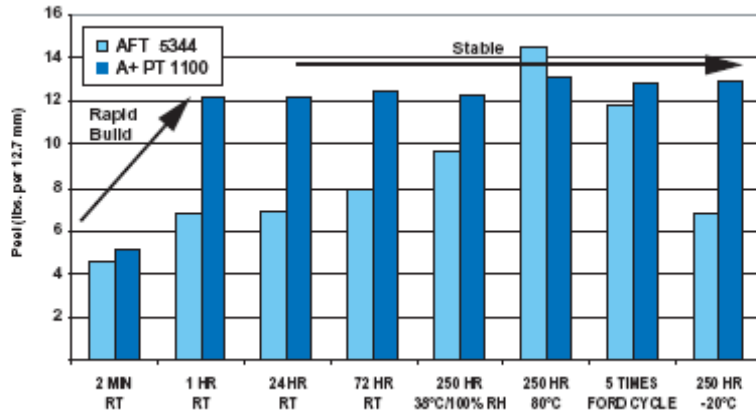
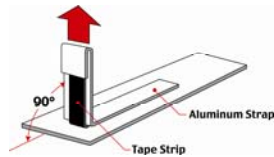
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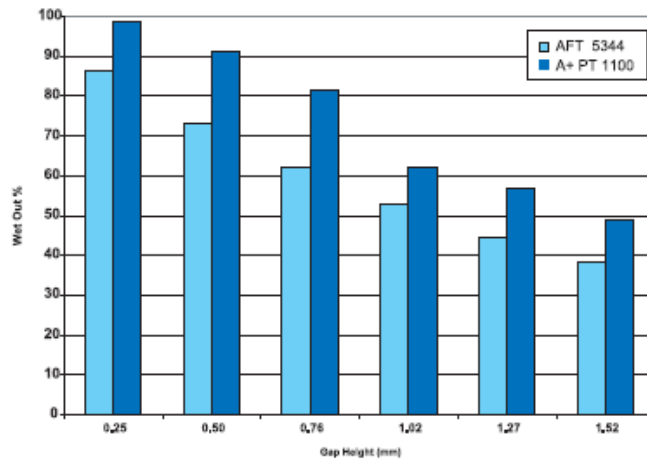
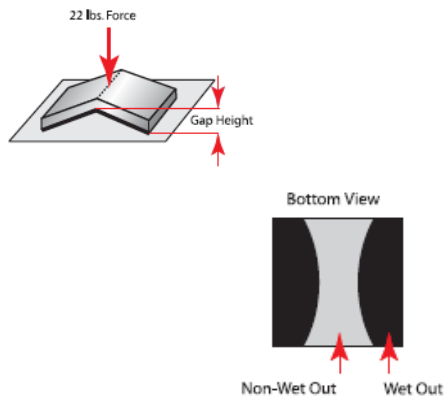
Performance Properties

Typical performance of 3M™ Acrylic Plus Tape Series PT1000 is shown below. Peel values depend on paint composition. These values are for reference only.

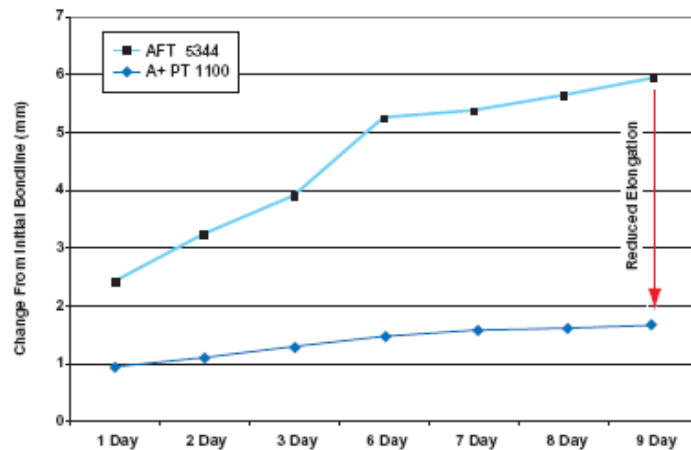
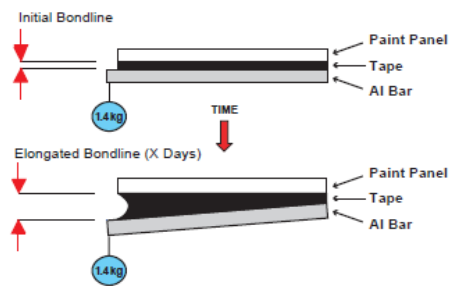
90° Peel Adhesion Testing



High Conformability (Angled Gap)



Low Elongation Core (Static Break Away)



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Contact Information The information provided in this technical document is intended as a guide for this product. For more information or help in selecting a 3M product for an application, please contact 3M HELPS at 1-888-3M HELPS (1-888-364-3577).

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