

## BRADY B-595 VINYL FILM WITH PERMANENT ADHESIVE

TDS No. B-595

Effective Date: 08/31/2011

### **Description:**

Brady B-595 indoor/outdoor marking film is a high gloss, durable, flexible, pressure sensitive adhesive product, designed for use in cartridge form with BBP® 31 Sign and Label Printer, GlobalMark™ Industrial Label Maker, MiniMark™ Industrial Label Printer, PowerMark® Sign and Label Maker, Labelizer® Plus Sign and Label Maker, VersaPrinter™ Sign and Label Maker, BMP® 71 Label Printer, BMP® 21 Label Printer, IDXPERT™ Labeling Printer, and the HandiMark® Portable Label Maker.

### **Details:**

#### **Use:**

B-595 is used for Pipemarkers, Arrow Tape, Warehouse Marking, Warning Panels, Safety Signs, Arc Flash and Visual Workplace labels.

Brady B-595 is RoHS compliant to 2005/618/EC MCV amendment to RoHS Directive 2002/95/EC.

#### **Special Properties:**

Permanent acrylic pressure sensitive adhesive can be applied at cold temperature.

#### **Substrate Type:**

Vinyl film

#### **Standard Material Colors:**

White, red, yellow, green, blue, orange, black, gray, brown, gold, purple, and clear

#### **Standard Legend Colors:**

Black, white, red, green, blue, yellow, orange and magenta

#### **Thickness (PSTC-33):**

Total: 0.004 in. (0.10mm)

#### **Adhesive Properties:**

Adhesion to Steel (PSTC-101)

15 Minute Dwell (Avg.) -- 80 oz/in. (87.5 N/100mm)

Ultimate Dwell (72 Hrs.) 85 oz/in. (93 N/100mm)

Tack (ASTM D 2979) (Avg.) 1100 g (10.5 N)

Adhesion to Powder Coated Metal (PSTC-101)

15 Minute Dwell (Avg.) 60 oz/in (65 N/100mm)

Ultimate Dwell (72 Hrs.) 75 oz/in (82 N/100mm)

Adhesion to Polypropylene (PSTC-101)

15 Minute Dwell (Avg.) 60 oz/in (65 N/100mm)

Adhesion to Textured ABS (PSTC-101)

15 Minute Dwell (Avg.) 37 oz/in (40 N/100mm)

Adhesion to Glass (PSTC-101)

15 Minute Dwell (Avg.) 82 oz/in (90 N/100mm)

- **Note** - B-595 is not recommended for Bare Concrete or Unpainted Wood

#### **Abrasion Resistance (Method 5306 of U.S. Federal Test Method Std. No. 191A):**

CS-10 wheels, 500 g wts.

The printed legend withstands up to 250 cycles

**Gloss (ASTM D 523):**

60° 50 Gardner Units minimum

**Minimum Application Temperature**

0°F (-18°C)

**Service Temperature**

-40°F to 180°F (-40°C to 82°C)

**Average Outdoor Durability:**

8-10 years (Average expected outdoor life of product will depend on user definition of failure, climatic conditions, mounting techniques, and material color.) The 8-10 year outdoor durability applies to the vinyl label stock only; ribbon durability will vary. A polyester overlamine is recommended for harsh environments - long term exposure to wind and rain.

**Chemical Resistance:**

Samples were printed with the standard performance R10000 ribbon using the BBP® 31 Sign and Label Printer. Testing conducted at room temperature.

| REAGENT                | 7 DAY IMMERSION | DIP TEST | RUB TEST |
|------------------------|-----------------|----------|----------|
| 30% Sulfuric Acid      | NE              | NE       | NE       |
| 10% Sulfuric Acid      | NE              | NE       | NE       |
| 30% Hydrochloric Acid  | NE              | NE       | NE       |
| 10% Hydrochloric Acid  | NE              | NE       | NE       |
| Glacial Acetic Acid    | F               | F        | NE       |
| 5% Acetic Acid         | NE              | NE       | NE       |
| 50% Sodium Hydroxide   | NE              | NE       | NE       |
| 10% Sodium Hydroxide   | F               | NE       | NE       |
| 10% Ammonia            | NE              | NE       | NE       |
| 5% Sodium Hypochlorite | NE              | NE       | NE       |
| Methyl Ethyl Ketone    | F               | F        | F        |
| Acetone                | F               | F        | F        |
| Toluene                | F               | F        | F        |
| Methanol               | F               | NE       | F        |
| Isopropyl Alcohol      | F               | NE       | NE       |
| Heptane                | F               | NE       | NE       |
| Mineral Spirits        | F               | F        | NE       |
| Turpentine             | F               | F        | NE       |
| Kerosene               | F               | F        | NE       |
| Diesel Fuel            | NE              | NE       | NE       |
| Gasoline               | F               | F        | F        |
| ASTM #3 Oil            | NE              | NE       | NE       |

|                     |    |    |    |
|---------------------|----|----|----|
|                     |    |    |    |
| SAE 20 Oil          | NE | NE | NE |
| 10% Sodium Chloride | NE | NE | NE |
| Alconox®            | NE | NE | NE |
| Deionized Water     | NE | NE | NE |

NE = No Effect

NT = Not Tested

F = Failed (affected sample)

7 Day Immersion: Immersed in reagent for 7 days.

Dip Test: Five 10 minute dips in reagent with 30 minute recovery.

Rub Test: Rubbed sample for 1 minute with swab soaked in reagent.

Shelf Life and Fitness for Use: Product testing, customer feedback, and history of similar products, support a customer performance expectation of one year from the date of receipt for this product as long as this product is stored in its original packaging in an environment below 80°F (27°C) and 60% RH. However, it remains the responsibility of the user to assess the risk of using such product. We encourage customers to develop functional testing protocols that will qualify a product's fitness for use, in their actual applications.

**Trademarks:**

ANSI: American National Standards Institute (U.S.A.)

ASTM: American Society for Testing and Materials (U.S.A)

Alconox® is a registered trademark of Alconox Co.

BBP® 31 is a registered trademark of Brady Worldwide, Inc.

BMP® 21 is a registered trademark of Brady Worldwide, Inc.

BMP® 71 is a registered trademark of Brady Worldwide, Inc.

Fed. Spec.: United States Federal Specification (U.S.A.)

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IDXPART™ is a trademark of Brady Worldwide, Inc.

Labelizer® is a registered trademark of Brady Worldwide, Inc.

MINIMARK™ is a trademark of Brady Worldwide, Inc.

PSTC: Pressure Sensitive Tape Council (U.S.A.)

Powermark™ is a trademark of Brady Worldwide, Inc.

SAE: Society of Automotive Engineers (U.S.A.)

VersaPrinter™ is a trademark of Brady Worldwide, Inc.

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Brady North America | 6555 W. Good Hope Road | Milwaukee, WI 53223 | USA | Tel: 414-358-6600 | Fax: 800-292-2289

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| Glacial Acetic Acid    | F               | F        | NE       |
| 5% Acetic Acid         | NE              | NE       | NE       |
| 50% Sodium Hydroxide   | NE              | NE       | NE       |
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| 10% Ammonia            | NE              | NE       | NE       |
| 5% Sodium Hypochlorite | NE              | NE       | NE       |
| Methyl Ethyl Ketone    | F               | F        | F        |
| Acetone                | F               | F        | F        |
| Toluene                | F               | F        | F        |
| Methanol               | F               | NE       | F        |
| Isopropyl Alcohol      | F               | NE       | NE       |
| Heptane                | F               | NE       | NE       |
| Mineral Spirits        | F               | F        | NE       |
| Turpentine             | F               | F        | NE       |
| Kerosene               | F               | F        | NE       |
| Diesel Fuel            | NE              | NE       | NE       |
| Gasoline               | F               | F        | F        |
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|                     |    |    |    |
|---------------------|----|----|----|
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