



TECHNICAL DATA SHEET

TECHNICAL DATA SHEET
MIL-PRF-85285E POLYURETHANE
PAGE 1 OF 2

PRODUCT: A two-component aliphatic, polyester polyurethane coating.

DESCRIPTION: MIL-PRF-85285E Polyurethane Coating is an aerospace grade, two component chemically cured product that forms a film that is resistant to chemicals, solvents and abrasion. This product has excellent adhesion to most substrates and is recommended for heavy duty industrial applications where a tough, chemical resistant coating is required. This coating is available in a 4:1 mixture for brush, roll and spray applications. It is specially formulated for superior ultraviolet ray resistance and exterior durability.

PROPERTIES:

SOLIDS (Weight)..... 67 - 70%**
SOLIDS (Volume)..... 55 - 57%**
VISCOSITY..... 70 - 90 KU

GLOSS:@60 DEG

Gloss Colors..... Minimum 90%
Semi-gloss Colors..... 15 - 45%
Camouflage Colors..... Maximum 5%
COLORS..... Full Range
POT LIFE(77 degrees F)..... 6 - 8 Hours*
TACK FREE..... 2 Hours*
RECOAT..... Overnight*
LIGHT SERVICE..... 24 Hours*
FULL SERVICE..... 7 Days*

VOC (Maximum) TYPE I..... 420 g/L
TYPE II..... 340 g/l
TYPE IV..... 420 g/l

*Higher temperatures will accelerate dry times and decrease pot life, lower temperatures will lengthen cure times and slightly increase pot life.

**Values will vary with color.

ADVANTAGES:

- (1). Excellent Exterior Durability
- (2). Abrasion Resistant
- (3). Chemical Resistant
- (4). Meets ASTM Standard Tests
- (5). Resistant to Corrosive Fumes



TECHNICAL DATA SHEET

(6). Meets Military Specification

TECHNICAL DATA SHEET
MIL-PRF-85285E POYURETHANE
PAGE 2 OF 2

SURFACE PREPARATION: Surface to be coated must be clean, structurally sound and free of all foreign contaminants including dirt, wax, loose paint or grease. Greasy or oily surfaces should be solvent cleaned with care taken not to paint over moist or wet surfaces. The recommended primer is MIL-P-23377G or MIL-P-85582. The use of alkyd based primers under this coating is not advisable.

Old paint in peeling condition must be removed. Sandblasting or wire brushing are the preferred methods. Chalky paint must also be wire brushed for maximum adhesion.

APPLICATION: MIL-PRF-85285E Polyurethane Coating can be brushed rolled or sprayed. Mechanically mix each component, then combine at a ratio of 4 part pigmented component to 1 part catalyst by volume. Let admixed material stand for 15 minutes before using to allow for chemical induction. If thinning is required, use MIL-T-81772B Type I Polyurethane Thinner.

PRECAUTIONS:

USE WITH ADEQUATE VENTILATION.

CONTENTS ARE FLAMMABLE.

AVOID CONTACT WITH SKIN AND EYES.

READ MATERIAL SAFETY DATA SHEET BEFORE USING.

KEEP OUT OF THE REACH OF CHILDREN.

FOR INDUSTRIAL USE ONLY.