# TECHNICAL DATA SHEET

# Pumadeq<sup>™</sup> Flex 31MV

Cold Fluid-Applied, PUMA, reinforced, flashing membrane

Physical Property	Typical Value	Test Method
Appearance	White, Light Gray	-
Application Temperature (Ambient)	40 °F to 90 °F (0 °C to 32 °C), can be lower	-
Abrasion Resistance	64mg	ASTM C501-84 (2009) - C17 wheel, 1000 grams, 1000 cycles
Hardness	35, Shore D	ASTM C2240-05 (as per C836M-10)
Solids Content by Volume	100%	ASTM D1644-2001 Method A
Adhesion	> 425 psi, substrate failure	ASTM C1583/ ASTM C1583M-04
Tensile Strength	1680 psi	ASTM D638-08
Elongation	283%	ASTM D638-08
VOC Content (maximum)	0 g/l	ASTM C1250-05

## Description

Pumadeq<sup>™</sup> Flex 31MV is an elastic, medium viscosity, waterproofing membrane based on polyurethane modified Methyl methacrylate (PUMA) technology. Pumadeq<sup>®</sup> technology combines the speed of PMMA application with the elasticity of Polyurethane. It exhibits much greater elongation and flexibility than PMMA's. Pumadeq<sup>™</sup> Flex 31MV, is applied on vertical and horizontal surfaces.

#### **Features**

- Cures within 1 hour, even at very low temperatures
- · Abrasion, puncture, and UV resistant
- Solvent-free
- VOC compliant

## Usage

Pumadeg™ Flex 31MV forms a waterproofing membrane in Pumadeg™ systems. Pumadeg™ systems are used for:

- PMR
- IRMA
- plaza decks
- green roofs
- split slabs
- parking decks
- balconies and walkways
- water retention

## **Application**

Site conditions: All surfaces should be prepared as per the approved Henry Pumadeq™ specification. The <u>surface temperature</u> must be at least 6 °F above the dew point and rising. Use a surface dew point meter. Air and surface temperatures must be between 32 °F and 90 °F.

Surface preparation: Substrates to be coated must be firm, dry, load bearing, and primed with the appropriate Henry primer. Any surface must be free of dust and contaminants that would impair adhesion of **Pumadeq™ Flex 31MV**. If the surface is contaminated or overcoat times exceed 48 hours, wipe with **Pumadeq™ Cleaning Fluid** and clean cloths.

If there are any doubts about the suitability of a substrate, further advice should be sought from a Henry representative and a small trial area applied and tested appropriately.

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**Product mixing:** Prior to using **Pumadeq™ Flex 31MV**, it must be thoroughly mixed, using an electric, slow speed (300-400rpm), high torque drill with CLEAN, spiral, mixing paddle (Jiffy type), to achieve a uniform distribution of the catalyst and paraffin contained in the product.

Only catalyze the amount of material that can be applied within the estimated pot life.

- 1) Pre-mix the resin for minimum 1 minute.
- 2) Then mix resin together with **Pumadeq™ Catalyst**, for 1 minute minimum.
- 3) The Catalyst blend is added in accordance with an average of resin, ambient and substrate temperatures guidelines:

These rates will also be affected by resin and air temperatures.

 $40^{\circ}F \rightarrow \text{add } 10 \text{ volume oz. per gallon resin}$   $50^{\circ}F \rightarrow \text{add } 8 \text{ volume oz. per gallon resin}$   $60^{\circ}F \rightarrow \text{add } 6 \text{ volume oz. per gallon resin}$   $70^{\circ}F \rightarrow \text{add } 4 \text{ volume oz. per gallon resin}$   $80^{\circ}F \rightarrow \text{add } 3 \text{ volume oz. per gallon resin}$   $90^{\circ}F \rightarrow \text{add } 2 \text{ volume oz. per gallon resin}$ 

At temperatures below 40°F, consult Henry® reps.

Do not mix new material with old, uncured material as this can significantly reduce work times. Use new pails frequently. Decant onto substrate and spread to prolong working time.

**Pot Life: 10-15 minutes** if **Pumadeq™ Catalyst** mix volumes followed. The working time of all Pumadeq™ materials will be influenced by the amount of **Pumadeq™ Catalyst** added, the length of time they are mixed, the substrate and ambient temperatures, and how quickly they are removed from the mixing pail and spread on the substrate.

**Product Application:** For best results, apply freshly catalyzed material – use small batch sizes. After mixing thoroughly, decant onto deck in evenly spaced strips, as soon as possible. **Pumadeq™ Flex 31MV** is applied evenly by medium nap (1/2") roller and brushes. Allow for saturation of rollers and brushes.

Do not install **Pumadeq™ Flex 31MV** beyond cured primer. Extend **Pumadeq™ Flex 31MV** one (1) inch beyond anticipated area of fabric reinforcement. Roll or brush fabric for proper adhesion and removal of voids, folds, and wrinkles. Lap adjoining fabric edges a minimum of three (3) inches.

Application Rate: Install one (1) layer of Pumadeq<sup>™</sup> Flex 31MV at thirty (30) sq.ft./gal. Back coat Fleece with Pumadeq<sup>™</sup> Flex 31MV before applying. Apply second layer of Pumadeq<sup>™</sup> Flex 31MV at fifty (50) sq.ft./gal. Total rate = 20sf/gal.

WFT-DFT: 80mils

Re-coat and Traffic Times: Minimum 1 hour. If the surface is contaminated or overcoat times exceed 48 hours, clean with a clean cloth and Pumadeq™ Cleaning Fluid. Allow Pumadeq™ Cleaning Fluid to evaporate before over coating.

Product Restrictions and Limitations: Do not apply too thickly or paraffin will not fully evaporate, causing incomplete cure.

**NOTE**: Before using **Pumadeq™ Flex 31MV**, please refer to Safety Data Sheet (SDS). Ensure the same safe working methods are followed for all persons in the work area. Wear suitable protective clothing, butyl rubber or nitrile gloves and safety goggles with side shields during mixing and application.

When **Pumadeq**<sup>TM</sup> **Flex 31MV** is applied in enclosed areas without natural ventilation, forced ventilation must be arranged. Avoid strong concentration of vapor as well as direct contact with skin or eyes.

If concentration exceeds recommended limits in SDS, a NIOSH approved respirator (OSHA 29 CFR 1910.134) is required Pumadeq™ Flex 31MV has a low flashpoint; keep away from all sources of ignition and do not smoke,

Uncured polymers and curing agents may be alkaline, toxic or both.

They may cause allergic reactions or hypersensitivity reactions.

Contact with skin – wash immediately with soap and water.

Contact with eyes – rinse immediately with lots of water and seek medical attention.

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# Pumadeg<sup>™</sup> Flex 31MV

## Coverage

Minimum coating coverage is 20sf/gallon. Dry film thickness (DFT) should be a minimum of 80 mills. Application rates should be adjusted to meet each particular substrate's specified requirements. Coverage rates are theoretical and do not take into account material loss due to surface texture, etc.

For Henry System and Gold Seal Warranty, refer to the appropriate approved Henry specification for application and coverage rate requirements.

### Clean-up

Clean-up of tools and equipment may be accomplished by using **Pumadeq™ Cleaning Fluid**, Acetone or MEK. Read and follow all Health and Safety instructions on SDS. Wash body with soap and water. Ensure all materials are mixed and cured before disposal, in accordance with federal, state and local regulations. Dispose of all packaging in accordance with federal, state and local regulations.

## **Packaging**

5 and 2.5 gallons, in metal pails

#### Colors

White, Light Gray

## Shelf Life/ Storage

Six months in unopened containers stored between 32 °F and 75 °F. Storing the material at a higher temperature may reduce its shelf life. Under dry, ventilated conditions and out of direct sunlight. Keep in an upright position and do not over stack.

For more information, visit www.henry.com or for technical assistance call us at 800-486-1278. For more information on Henry's product warranty and liability disclaimer please visit www.henry.com/warranty. Refer to the Safety Data Sheet prior to using this product. The Safety Data Sheet is available at www.henry.com or by emailing Henry Product Support at productsupport@henry.com or by calling 800-486-1278.

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