

CONCRETE EPOXY 10H.V.

Shrinkage:

PRODUCT DESCRIPTION

Pioneer Pro Concrete Epoxy # 10 H.V. is a thermosetting type of concrete adhesive specially designed to have the following advantages:

- 1. It cures on damp or dry conditions.
- 2. No sagging when applied on vertical or sloping surfaces, up to 1/8" thick films.
- 3. When cured, it exhibits tough, hard, durable and infusible bond between concrete and wood, metal, masonry or asbestos

USES

As an Epoxy Adhesive:

- 1. Bonding old concrete to freshly poured concrete topping, thus eliminating "cold joints" between old and new concrete.
- Replaces cement in bonding pre-cast, concrete structural units such as concrete decors under damp or dry conditions.
- Bonding wood or metal to concrete surfaces such as anchoring machinery to a concrete floor.
- 4. Anchoring and grouting concrete or ceramic floor tiles over cement, wood or steel.

As an Epoxy Mortar:

- 1. Patching spalled and damaged areas in concrete structures.
- As a tack coat or primer before pouring fresh concrete topping when bringing low areas to proper grade.

TECHNICAL DATA

Table 1.	
PHYSICAL PROPERTIES: UNCURED STATE	
Color:	
Part A	Gray
Part B	Beige
Viscosity	
/Consistency:	thixotropic paste
Solid Content:	100%
Mixing Ratio:	Part A : Part B - 1 : 1 by
1000	volume
Potlife:	2 hours
Curing Time(Initial):	6 - 8 hours
Tack Free Time:	4 - 6 hours
Shelf Life:	18 months
Coverage:	One gallon set will yield
	6,600 cubic centimeter depending on surface
	roughness & porosity.

Table 2. PHYSICAL PROPERTIES: CURED STATE		
Tensile Strength:	3,000 ± 500psi	
Compressive Strength:	8,500 ± 500psi	
Flexural Strength:	7,000 ± 500psi	
Hardness (Shore D):	80-90	

-negligible

Note: Two independent testing laboratories, U.P. Industrial Research Center and Philippine Rock Laboratory, tested its binding and flexural strength properties, respectively; U.P. Industrial Research Center binding test indicated that at 10,150 ft. lbs. bending moment, cracks occurred on concrete outside epoxy bindings. (Specimen: Pioneer Pro Concrete Epoxy #10 H.V. joint concrete beam).

Philippine Rock Laboratory tested for the suitability of Pioneer Pro Concrete Epoxy #10 H.V. as a bonding agent in concrete structures using their testing methods, results showed that the flexural strength of Pioneer Pro Concrete Epoxy #10 H.V. over concrete is superior, at 545 psi, concrete failed, 1/4" away from the joint.

APPLICATION PARAMETERS

Surface Preparation

Concrete surface must be free of dirt, paint, oil grease, lose materials and other contaminants. On oil surfaces, wash with soap and water or acid etching (10% muriatic acid of hydrochloric acid) is recommended.

Mixing

Mix equal volumes of Part A and Part B. Blend well until uniform color is obtained. To avoid wastage, prepare only the amount consumable within one (1) hour.

Method

After thorough blending of mixture has been done, apply the adhesive on both surfaces to be bonded by spatula, trowel or putty knife. In bonding old to new concrete, coat old concrete with Pioneer Pro Concrete Epoxy #10 H.V. and pour fresh concrete immediately over epoxy tack coat. For an effective bond, applied epoxy should be very tacky before pouring the fresh concrete mixture, having minimal water content, such as, a slump of two (2) inches.

CONCRETE EPOXY 10H.V.

Cleaning

Pioneer Pro Concrete Epoxy #10 H.V. can be removed in its uncured state through the use of kerosene, toluene and ketones.

Health and Safety Precautions

Avoid prolonged or repeated skin contact. In case of skin contact, wash thoroughly with soap and water. If contact with eyes occurs, flush thoroughly with clean water and seek medical attention immediately.

PACKAGING

Pioneer Pro Concrete Epoxy #10 L.V. is available in gallon and quart can sets.

