



### DESCRIPTION

The LABPOX® SAFETY LINES is a 100% solids, two-component (3A:1B), VOC-free, and self-priming specialty epoxy designed for concrete floor safety zone and corridor marking. This product possesses mechanical and chemical properties best suited for commercial, industrial and institutional applications. Offered in a variety of bright colors (Safety Yellow, Safety Red, Safety Green, Safety Blue), its higher viscosity and opacity offers superior coverage with minimum thickness in one single roll or brush application. The LABPOX® SAFETY LINES formulation is based on high-performance cycloaliphatic polyamine technology, displaying outstanding properties and delivering a superior aesthetic finish.

### USES

The LABPOX® SAFETY LINES provides excellent results for the most demanding applications:

- + Safety floor line & zone marking
- + Industrial manufacturing and warehouses
  - + Food/beverage
  - + Pharmaceutical
  - + Automotive & recreational vehicles
- + Commercial & retail
  - + Distribution centers
  - + Shopping malls & outlets
  - + Mechanic shops
- + Institutional & healthcare
  - + Schools
  - + Health clinics & hospitals
  - + Public buildings
- + Recreational
  - + Sports stadiums
  - + Museum
- + Real estate
  - + Office & apartment buildings
  - + Parking garages

### ADVANTAGES

- + Superior opacity (three (3) times more vs regular pretinted epoxy)
- + Easy one coat application system
- + Crisp Line Technology (will not leach under tape)
- + Horizontal or vertical application
- + Low Odor
- + Environment friendly (100% solids, VOC-free and no solvent)
- + Potential for LEED eligibility
- + Superior mechanical and chemical properties suited for the

toughest industrial applications

- + Excellent abrasion resistance
- + High density of the product prevents dirt penetration resulting in low maintenance post application

### APPLICATION DATA

|                                |                                                                                |                |
|--------------------------------|--------------------------------------------------------------------------------|----------------|
| <b>Mix Ratio</b>               | 3A:1B                                                                          |                |
| <b>Packaging</b>               | 4 Gal kit (4 x 3.78L)                                                          |                |
| <b>Color</b>                   | Safety Yellow, Safety Red, Safety Blue, Safety Green                           |                |
| <b>Solids Coverage / GAL</b>   | <b>Mils</b>                                                                    | <b>Sq. Ft.</b> |
|                                | 6                                                                              | 267            |
|                                | 8                                                                              | 200            |
|                                | 10                                                                             | 160            |
|                                | 12                                                                             | 133            |
| <b>Shelf Life</b>              | Six months, in original unopened factory pails under normal storage conditions |                |
| <b>Pot Life</b>                | 30 min                                                                         |                |
| <b>Application Temperature</b> | Min 16°C / 61°F, Max 30°C / 86°F                                               |                |
| <b>Cure Time</b>               | <b>22°C / 72°F and 50% Rel. Hum.</b>                                           |                |
| Working time                   | 30 min                                                                         |                |
| Tack Free                      | 4 h                                                                            |                |
| Recoat                         | 4 - 24 h                                                                       |                |
| Dry Through                    | 10 h                                                                           |                |
| Foot Traffic                   | 24 h                                                                           |                |
| Light Traffic                  | 48 h                                                                           |                |
| Full Cure                      | 1 week                                                                         |                |

### TECHNICAL PROPERTIES

|                                                                                                  |                        |
|--------------------------------------------------------------------------------------------------|------------------------|
| Hardness ASTM D2240                                                                              | 85 Shore D at maturity |
| Abrasion Resistance ASTM D4060<br>(Taber Abraser, Wheel CS 17/1000 g (2.2 lbs)<br>/ 1000 cycles) | 55 mg loss             |
| DRY Coefficient of Friction<br>(Smooth coating) ASTM E303                                        | 1.0                    |
| Pull Off Test ASTM D7234                                                                         | >3 Mpa                 |
| Compressive Strength ASTM D695                                                                   | 13750 psi (95 MPa)     |
| Solids Content by Volume                                                                         | 100%                   |
| Viscosity (A&B)                                                                                  | 1400 +/-100 cps        |
| VOC Content                                                                                      | 0 g/l                  |



## SURFACE PREPARATION

### General application criterias

Surface must be clean, dry, free of grease, oil, paint, curing agents or any other contaminants that may inhibit proper adhesion.

### Concrete application

Concrete must be cured at least 28 days before applying the LABPOX® SAFETY LINES. If the concrete slab is less than 28 days old, install the LABPOX® MVB FAST moisture mitigation system before applying the LABPOX® SAFETY LINES. (refer to the LABPOX® MVB FAST TDS for additional details).

Proper testing procedures should be practiced with regards to moisture vapor transmission. Use a Tramex® CME / CMExpert to measure the moisture content of the concrete slab. Moisture content must be below 4% before applying the product. Multiple moisture content readings taken across entire floor are necessary to detect any abnormalities. If one or more readings over 4% are recorded, additional measures will be required to neutralize the concrete slab moisture before the LABPOX® SAFETY LINES installation. It is imperative to first apply LABPOX® MVB FAST moisture mitigation system on floors showing residual relative moisture readings above 4%, before applying LABPOX® SAFETY LINES.

Opening the pores of the substrate and creating a concrete surface profile is crucial to provide a strong initial mechanical adhesion of the LABPOX® SAFETY LINES. Using shot blaster or diamond floor grinder equipped with grit 16 blades or coarser, mechanically prepare the surface to obtain CSP-2 to CSP-3, as per ICRI guidelines. Vacuum dust prior applying LABPOX® SAFETY LINES.

### Application on existing LABPOX® coating that has cured over 24 hours (passed the recoat window)

Opening the pores and creating a surface profile of the existing LABPOX® coating is crucial to provide a strong mechanical adhesion. Using an orbital floor sander equipped with grit 80 screen mesh or sandpaper, mechanically prepare the surface to obtain a uniform dull finish showing abrasion marks across the entire floor. Vacuum dust and properly wipe the surface with solvent prior installing LABPOX® SAFETY LINES. The solvent must be completely evaporated before applying the product. Conduct adhesion tests if there is a doubt about surface preparation.

### Application on fresh LABPOX® coating that has cured less than 24 hours (within recoat window)

No additional mechanical preparation needed. Simply wipe clean the surface with microfiber to remove any dust or other debris that might have fallen on the surface after the product was installed.

## MIXING

Due to its formulation and to optimize final results, pre-mixing part A is mandatory before adding and mixing with part B. Pre-mix part A at low speed using a Jiffy® or an Exomixer® mixer blade. Special attention must be paid since color pigments may have separated from the rest of the formulation during storage. This is a normal phenomenon and the product will perform to its full potential once mixed. Mixing should be performed until the color is fully uniform.

Use the same batch number when working with pre-tinted products. In the event that products with different batch numbers are used for a same application, we recommend to 1) pre-mix all part A's individually 2) combine all part A's from the different batch numbers together and mix for minimum two minutes until a homogeneous color is obtained.

Then, using a Jiffy® or an Exomixer® mixer blade, mix three parts of A and one part of B together at low speed in a separate container. The mixing container must be clean and free of any outside particle. Mix thoroughly for a minimum of three minutes, until a completely homogeneous mixture is obtained with no apparent streaks or smears. Use a low-speed drill (300-450 rpm) to minimize the air entrapment. It is recommended to activate the mixer in the reverse mode after the first 90 seconds for the liquid to mix from the bottom of the mixing can to the top. Make sure to scrape sides and bottom of mixing container so no unmixed material remains. Mix only the necessary quantity to be used according to the specified pot life / working time. Once the product is properly mixed, it needs to be immediately poured on the floor. Leaving mixed material for too long in a mixing pail will create an exothermic reaction and the product will no longer be usable.

## APPLICATION

Apply only when air and concrete slab temperature is between 16°C / 61°F - 30°C / 86°F and the relative humidity of less than 85%. If a heated floor is installed, ensure that the system is turned off 2-4 hours (depending on type of radiant floor) before application and for the full duration of the cure.

LABPOX® SAFETY LINES is self-priming. Depending on the porosity of the concrete, apply 8-10 mils with a roller, or a brush. A second coat may be an option when installing on very porous concrete. If there is appearance of pin holes during the application, allow sufficient time to go back and either burst the pin holes by rolling the surface back and forth. If the slab is very porous and there is a significant presence of pinholes after applying the first coat, sand and plug the pinholes with epoxy gel.



## RECOAT

Additional coat (if needed). LABPOX® SAFETY LINES chemically adhere without sanding within the 24-hour window. Pass 24 hours, the floor surface should be sanded until a uniform dullness is achieved. There should be no gloss on the prior coating after vacuuming and before applying the next coat. Refer to preparation section for more details.

## LIMITATIONS

Requires a dry substrate. Moisture content of the substrate must be measured with a Tramex® CME / CMExpert and must be below 4% before applying the product. This product should not be applied to concrete substrates that show high levels of moisture/humidity unless a moisture LABPOX® MVB FAST moisture mitigation system is used. Although this product may be applied in a wide range of thickness, limitations may apply when taking into consideration curing time. Everything else being equal, thicker is the film, quicker is the curing time. Drying time will be faster in a hot environment. Conversely, the drying time will be longer in a cold environment and the appearance of the surface may be affected. Leaving mixed material for too long in a mixing pail will create an exothermic reaction and the product will no longer be usable. Do not clean the finished surface during the week following installation. Keep the product stored at room temperature to ensure consistent results. Not suited for exterior applications. Although Labsurface makes reasonable efforts to control the quality of the finished product and its components, ASTM results may vary depending on the quality of the inputs delivered to Labsurface.

The usage of direct-fired, unvented and certain other heat sources are not recommended as they emit byproducts that may negatively impact the curing process of the resin and lead to defects such as amine blush, whitening, loss of adhesion, or other surface imperfections.

Labsurface stands behind the quality of its products. However, Labsurface cannot guarantee results since Labsurface has no control over surface preparation, operating conditions, and application procedures. Clients are solely responsible to test Labsurface's products to determine if they perform as expected.

To meet our strict requirements, we are continuously testing our coatings and on occasion, formulations may be modified to improve certain properties within each coating. Information and data included in this reference document may not be up to date as of the date of reference. Contact Labsurface for further information regarding the limitations of this product.

This product is not immune to transfers of plasticizers contained in rubber, including car tires. Although the transfer of plasticizers phenomenon is very rare, under specific circumstances com-

binning high tire temperature with i) high levels of plasticizers, and/or (ii) certain plasticizer types and/or (iii) certain tire types, it is possible for plasticizers to transfer from the tire rubber to the floor coating. This phenomenon is irreversible and can cause staining of the coated area. Tires should therefore cool down prior to the parking of the vehicle in the coated area.

Pressure washing and power washing (power washing involves water heating while pressure washing uses cold water) must be used with caution. Extreme pressure could damage the coating. Using hot water could also cause irreversible damage. When used to clean polymer coatings, water temperature must not exceed 49°C / 120°F and should be ideally between 32°C and 43°C / 90°F and 110°F.

Exposure to certain chemicals may cause reactions similar to those experienced with allergies. Chemicals that may cause sensitivity include synthetic and natural substances found in the Part A or the Part B of flooring or casting products. Once cross linked and completely cured, those substances are inert and therefore should not result in allergic reactions. Raw materials used by Labsurface do not differ significantly from comparable products manufactured by our competitors.

**Refer to the most recent Material Safety Data Sheet prior using this product.**

## AVAILABLE COLORS

Safety Yellow, Safety Red, Safety Green, Safety Blue

## LABSURFACE

2250, Louis-Blériot, Mascouche, (QC) CANADA J7K 3C1  
Phone: 450 966-9000 / Fax : 450 621-3135  
Labsurface.com