

## <u>Greenstone</u> 100 Floor Coating

400 Lombardi Avenue, Green Bay, WI 54304 ♦ 920-435-1548 ♦ info@greenstonepolymer.com ♦ www.greenstonepolymer.com

### product data

SELECTION & SPECIFICATION DATA

TYPE & GPS 100 Floor Coating is a 100% solids epoxy floor surfacer formulated with aluminum oxide to provide an

**DESCRIPTION** exceptionally tough wear-resistant surface with outstanding chemical resistance.

ADVANTAGES Cures quickly to form an impact and extremely abrasion resistant system, cured at temperatures as low as

50°F. Excellent adhesion to concrete, steel, and wood. Minimum down time. Sanitary, non-shrinking polymer.

Easy to clean - USDA acceptable.

CHEMICAL Not affected by water, oil, brine, most acids, and alkalines. For specific recommendations, please refer to

**RESISTANCE** Greenstone's Chemical Resistance Guide, or contact Technical Service.

**USES**Used as part of a polymer system for resurfacing floors in food production plants, aisle ways, chemical spill

containment area's, industrial production facilities, and pulp and paper mills.

GOVERNMENT

**AGENCY** 

Meets the requirements of the U.S. Department of Agriculture (USDA) for use as an incidental food contact

flooring system.

FOR INDUSTRIAL USE ONLY!

PHYSICAL DATA Working Time - approximately 50 minutes at 75°F.

Abrasion Resistance - 85 mg average loss / 1000 cycles. ASTM D4060 CS17 Wheel

Flexural Strength - ASTM D790 - 12,400 PSI Hardness (Shore D) - ASTM D2240 - 75

Impact Resistance - Mil-D-3134J - Direct: >160 in lb

Tensile Strength - ASTMD638 - 6,000 PSI

Potlife - 30 minutes at 75°F.

Cure Time - hardens in 12-18 hours at 75°F. The warmer the temperature, the faster it cures. Allow a minimum cure of 24 hours for light traffic, and 96 hours for heavy traffic loads and chemical spillage.

**Solids - 100%** 

Colors - Standard Color Chart - Light Gray, Standard Gray, Dark Gray, Tile Red, Cream, Tan, Safety Yellow,

Safety Orange, Safety Green, Safety Blue, Safety Red (special colors available upon request).

PACKAGING /
COVERAGE

100 Floor Coating - 2:1 By Volume Mix Ratio.

1 GALLON KIT - covers approximately 100 square feet at 16 mils - containing the following -

1 container - Part A (resin)

1 container - Part B (hardener)

3 GALLON KIT - covers approximately 300 square feet at 16 mils - containing the following -

1 container - Part A (resin)

1 container - Part B (hardener)

15 GALLON KIT - covers approximately 1500 square feet at 16 mils - containing the following -

2 container - Part A (resin)

1 container - Part B (hardener)

SUPPLEMENTAL PRODUCTS

310 Surfacer, 330 Mortar, 350 Grout, 300 Coving, 330 Primer, 300 Flex, 160 Block Filler

#### SURFACE PREPARATION AND SUBSTRATES

# SURFACE PREPARATION

**New Concrete**: must have a minimum of 28 days cure, and no curing agents or sealers shall be used. Remove oil, grease or other loose or foreign materials and contaminants. A good bonding tooth, the texture of rough sandpaper, is required to maximize adhesion, with the removal of all glaze. Examples of mechanical surface prep including, but not limited to -

- A. Sandblast with steel shot, fine silica, or other similar material.
- B. Wheel Abrader
- C. Scarify

**Existing Concrete:** remove all loose, weak concrete, and any paint wax, oil, grease or other contaminants. Once the concrete has been cleaned and neutralized, mechanical surface preparation shall be used to provide a good bonding tooth, a texture of rough sandpaper, with the removal of all glaze. Examples of mechanical surface preparation including, but not limited to -

- A. Sandblast with steel shot, fine silica, or other similar material.
- B. Wheel Abrader
- B. Scarify

<u>Note:</u> Holes and depressions 1/4" or deeper should be prefilled with 350 grout, or a similar system, prior to application. All surfaces must be dry prior to application of polymer system.

**Metal Surfaces**: Degrease surface prior to sandblasting. Use organic solvents, alkaline solutions, steam, hot water with detergents, or other systems that will completely remove dirt, oil, grease, etc. Blast the surface to near white SSPC-SP 10-70, or NACE No. 2 using a Venturi blast nozzle with 100psi air. To produce the 4 mil minimum anchor pattern or tooth, the blasting media used shall be a properly graded, clean, sharp angular abrasive similar to Humble Abrasive Flint S7 (6-30 mesh), Steel Grit (HG25), or Black Beauty (BB1040).

#### MIXING AND EQUIPMENT

#### **MIXING**

2 Parts Component A: 1 Part Component B (2:1 By Volume) Mix Part A and B thoroughly, with a low rpm "jiffy" type mixer for 2 minutes until completely homogeneous, and spread evenly at approximately 16 mils (approximately 106 square feet per gallon).

**Important!** - The working life of the mixed blend is approximately 50 minutes. Mixed materials remaining in a container will produce heat. Keep away from combustible materials. Do not reseal mixed containers!

#### **APPLICATION AND SAFETY**

#### **APPLICATION**

**Caution!** Application in direct sunlight, resulting in rising surface temperature, may cause blistering of the materials due to expansion of entrapped air or moisture in the concrete. Concrete surfaces that have been in direct sunlight must be shaded for 24 hours prior to application, and remain shaded until the initial set of the polymer. When the substrate temperature is rising, it is recommended to postpone application.

Minimum application temperature: Do not apply when substrate temperature is below 50°F.

For application, the 100 Floor Coating resin & hardener should be at a minimum temperature of 75°F. Always spread the material as soon as blended. The pot life is approximately 30 minutes, and the working life is approximately 50 minutes.

Spread the mixed system with a medium (3/8") nap roller at a rate of 16-20 mils (80-100 square feet per gallon), per coat. 2 coats are recommended to provide good film continuity.

**SEED COAT:** If required, immediately broadcast a good, clean, graded 30 mesh silica sand or comparable aggregate (not supplied) into the base coat at a rate of approximately 1/2# per square foot, or until the base coat is completely covered without any visible wet or shiny spots. Allow the polymer to cure until the loose sand can be removed without disturbing the base coat.

**CURE TIME** - Will harden in approximately 12-18 hours at 75°F. The warmer the temperature, the faster the cure. Allow 24 hours, at 75°F, for light traffic, and 96 hours for full cure.

**CLEAN-UP** - Cured or hardened 100 is almost impossible to remove. Clean tools and equipment immediately with hot soapy water, or a mixture a acetone and ethanol.

#### SAFETY

Observe good personal hygiene. Certain personnel may be sensitive to various types of resins which may cause dermatitis. Avoid contact with skin and breathing of vapor. Read and follow all caution statements on product info bulletin, material safety data sheet and container labels for this product. This bulletin provides standard information for the system and application procedure. Since varying application conditions may not be covered, consult GREENSTONE Technical Service Department for further information.

Not recommended for 1 coat applications.

We guarantee our product to be free of defects in material and workmanship, and to be in accordance with our company quality control standards. All data, statements and recommendations made herein are based upon information we believe to be reliable, but are made without any representation or guarantee or warranty of accuracy and are made with reservation of all patent rights. Our products are sold on the condition that the user will evaluate them, as well as our recommendations, to determine their suitability for his own purpose before adoption. Also, statements regarding the use of our products or processes are not to be construed as recommendations for their use in violation of any applicable laws or regulations. Liability under any condition shall be limited to replacement of material only. No liability is assumed or implied, for injury to personnel, labor costs, product loss or any other expenses incidental to the structure or operation of the plant and equipment where the system is being applied.