E-TUFF® MORTAR
Medium Viscosity Epoxy Mortar and Grout

1.01 DESCRIPTION
E-Tuff® Mortar is a two-component, 100% solids, moisture-insensitive, medium viscosity, high strength, multipurpose liquid epoxy adhesive. With aggregate or other mineral fillers, it can be used as a mortar or grout to resurface or patch damaged concrete slabs and walls. Please use the correct product grade that complies with VOC regulations as per federal, state, county and city regulations/codes at the place of installation of product.

1.02 USES
- Bond Freshly Mixed Concrete to Hardened Concrete
- Can Be Used as an Anchoring Adhesive
- Fill Voids and Cracks in Concrete And Masonry
- Use as a Binder in an Epoxy Mortar

1.03 FEATURES
- 100% Solids
- Easy Dispensing
- Excellent Adhesion
- Fast Setting, High Strength, High Modulus
- Friendly 1:1 Mix Ratio
- Moisture Tolerant
- No Volatile Organic Compounds (VOC’s)
- Non-Sag Gel Consistency

1.04 TECHNICAL DATA
ASTM C881 and AASHTO M235, Types I, II, IV & V Grade 2, Classes B & C specifications

1.05 PACKAGING
20 oz., 600 ml side-by-side cartridge
1 gallon (3.8 liters) units
2 gallon (7.6 liters) units
10 gallon (37.9 liters) units

1.06 COLOR
Concrete Gray

1.07 COVERAGE
As a Mortar: 1 gallon with 50 lbs (22.78 kgs) sand <0.43 cuft (0.012 cum)
As a Bonder: 50-100 sqft/gallon or 2-1 gallon/100 sqft (0.8-0.41 li- ters/sqm)

1.08 PREPARATION
Concrete shall have reached its design strength and be dimensionally stable. All surface contamination must be removed by mechanical means, creating a surface profile of exposed sound aggregate. Metal surfaces should be sandblasted to white metal finish and wiped clean with solvent.

1.09 MIXING
3 parts of oven-dried silica sand to 1 part of mixed epoxy by volume.
Mix only until all aggregate is wetted out. Always test a small amount of E-Tuff Mortar to verify that the product has been thoroughly mixed and will harden properly before proceeding. Do not thin with any solvent.

1.10 APPLICATION
Precondition E-Tuff Mortar to 65–95°F (18–35°C) for easy-dispersing.
To bond to old concrete: Use a brush, roller or squeegee to apply about 15 to 30 mils (0.38 to 0.76 mm) thick bond line. Place fresh concrete when epoxy is still tacky.
To gravity feed cracks: Blow vee-notched crack with oil-free compressed air. Seal underside if cracks reflect through. Pour mixed epoxy into cracks. Repeat until completely filled.
To patch and grout: Prime substrate with neat mixed epoxy. Place epoxy mortar using trowels before primer become tack-free

1.11 CLEANUP
Clean sprayer, tools, and equipment with Xylene or lacquer thinner while the product is still wet.

1.12 STORAGE AND SHELF LIFE
Store in a horizontal position to prevent moisture accumulation on the drum head. The material should be stored between 40–95°F (4–35°C) in a cool, dry area away from direct sunlight. The shelf life of properly stored is 12 months from the date of manufacture. An excessive temperature differential and/or high humidity can shorten the shelf life expectancy.

1.13 LIMITATIONS
- FOR WELL VENTILATED OR EXTERIOR USE ONLY!
- The minimum substrate temperature is 40°F (5°C).

1.14 CAUTION
Avoid breathing of vapors. Forced local exhaust is recommended to effectively minimize the exposure. NIOSH approved, organic vapor respirators and forced exhaust are recommended in confined areas, or when conditions (such as heated polymer, sanding, etc.) may cause high vapor concentrations. Do not weld on, burn or torch the E-Tuff Mortar or any epoxy material. Hazardous vapor is released when an epoxy is burned. Avoid skin or eye contact. Wash skin with soap and water if contact occurs. If eye contact occurs flush with water for 15
minutes and obtain medical attention.

READ SDS PRIOR TO USING PRODUCT. FOR PROFESSIONAL USE ONLY. KEEP OUT OF REACH OF CHILDREN. MADE IN THE USA.

<table>
<thead>
<tr>
<th>PHYSICALS</th>
</tr>
</thead>
<tbody>
<tr>
<td>Compressive Properties (ASTM D695)</td>
</tr>
<tr>
<td>7 day cure</td>
</tr>
<tr>
<td>Compressive Strength</td>
</tr>
<tr>
<td>Compressive Modulus</td>
</tr>
<tr>
<td>Tensile Properties (ASTM D638)</td>
</tr>
<tr>
<td>7 day cure</td>
</tr>
<tr>
<td>Tensile Strength</td>
</tr>
<tr>
<td>Tensile Elongation</td>
</tr>
<tr>
<td>Bond Strength (ASTM C882)</td>
</tr>
<tr>
<td>2-day cure</td>
</tr>
<tr>
<td>7-day cure</td>
</tr>
<tr>
<td>Flexural Strength (ASTM D790)</td>
</tr>
<tr>
<td>Shear Strength (ASTM D732)</td>
</tr>
<tr>
<td>Gel Time</td>
</tr>
<tr>
<td>Viscosity</td>
</tr>
<tr>
<td>Tack Free Time (73°F or 23°C)</td>
</tr>
<tr>
<td>Water Absorption (ASTM D570)</td>
</tr>
<tr>
<td>Shrinkage on Cure (ASTM D2566)</td>
</tr>
<tr>
<td>Heat Deflection Temperature (ASTM D648)</td>
</tr>
<tr>
<td>Thermal Compatibility (ASTM C884)</td>
</tr>
</tbody>
</table>

Please read all information in the General & Safety Guidelines, Technical Data Sheets, Guide Specifications and Safety Data Sheets (SDS) before applying material. PSI Products are for “Professional Use Only” and preferably applied by professionals who have prior experience with the PSI Products or have undergone training in application of PSI Products. Published technical data and instructions are subject to change without notice. Contact your local PSI representative or visit our website for current technical data, instructions, and project specific recommendations.

LIMITED WARRANTY
PSI warrants its products to be free of manufacturing defects and that they will meet PSI current published physical and chemical properties. Seller’s sole responsibility shall be to replace that portion of the product which proves to be defective. There are no other warranties by PSI of any nature whatsoever expressed or implied, including any warranty of merchantability or fitness for a particular purpose in connection with this product. PSI shall not be liable for damages of any sort, including remote or consequential damages resulting from any claimed breach of any warranty whether expressed or implied. PSI shall not be responsible for use of this product in a manner to infringe on any patent held by others. In addition, no warranty or guarantee is being issued with respect to appearance, color, fading, chalking, staining, shrinkage, peeling, normal wear and tear or improper application by the applicator. Damage caused by abuse, neglect and lack of proper maintenance, acts of nature and/or physical movement of the substrate or structural defects are also excluded from the limited warranty. PSI reserves the right to conduct performance tests on any material claimed to be defective prior to any repairs by owner, general contractor, or applicator.

DISCLAIMER
All guidelines, recommendations, statements, and technical data contained herein are based on information and tests we believe to be reliable and correct, but accuracy and completeness of said tests are not guaranteed and are not to be construed as a warranty, either expressed or implied. It is the user’s responsibility to satisfy himself, by his own information and test, to determine suitability of the product for his own intended use, application and job situation and user assumes all risk and liability resulting from his use of the product. We do not suggest or guarantee that any hazard listed herein are the only ones which may exist. Neither seller nor manufacturer shall be liable to the buyer or any third person for any injury, loss or damage directly or indirectly resulting from use of, or inability to use, the product. Recommendations or statements, whether in writing or oral, other than those contained herein shall not be binding upon the manufacturer, unless in writing and signed by a corporate officer of the manufacturer. Technical and application information is provided for the purpose of establishing a general profile of the material and proper application procedures. Test performance results were obtained in a controlled environment and PSI makes no claim that these tests or any other tests, accurately represent all environments.

© 2020 Poly-Tuff Systems International Corp. All rights reserved. REV20200118_AG