Description

XYPEX MEGAMIX I is a thin parging coat for the waterproofing and resurfacing of vertical concrete surfaces, as a cap coat for Xypex Concentrate, or as an architectural rendering. Megamix I is a unique blend of Portland cement, treated silica sand, fibers and proprietary chemicals. It is mixed with Xycrylic Admix to produce enhanced bond. Megamix I is applied by brush, trowel or spray up to a thickness of 10 mm. The high performance characteristics of Megamix I are enhanced by Xypex’s unique crystalline waterproofing and protection technology.

NOTE: For patching or resurfacing deteriorated concrete, requiring a thicker parging coat (between 10 mm to 50 mm) refer to the product data sheet for Xypex Megamix II.

Recommended for:

- Waterproof coating for vertical concrete block surfaces and cast-in-place concrete walls
- A secondary or cap coat for Xypex Concentrate applications to porous concrete surfaces
- Lining for swimming pools, tunnels and tanks

Advantages

- Excellent adhesion and bond to concrete substrates
- Easy to apply
- Fiber reinforced
- Reduces surface absorption
- Provides good surface for painting or as a final finished surface
- Used as a cap-coat over Xypex Concentrate for rapid return to service applications
- Approved for use with potable water

Packaging

Megamix I is available in 27.2 kg pails.

Storage

Xypex products must be stored dry at a minimum temperature of 7°C. Shelf life is one year.

Coverage

Required coating thickness will vary depending on project requirements. At the recommended thickness of 3.2 mm, one 27.2 kg pail of Megamix I will cover 4.4 m². Megamix I may be applied as thin as 1.6 mm provided it is used as a cap coat over a coat of Xypex Concentrate.

Laboratory Test Data

<table>
<thead>
<tr>
<th>Physical Property</th>
<th>Test Method</th>
<th>Laboratory Test Results</th>
</tr>
</thead>
<tbody>
<tr>
<td>Compressive Strength</td>
<td>ASTM C109</td>
<td>16.7 24.9</td>
</tr>
<tr>
<td>@ 7 days</td>
<td></td>
<td></td>
</tr>
<tr>
<td>@ 28 days</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Tensile Bond Pull-Off</td>
<td>ACI 503R Appendix A</td>
<td>1.54 1.24</td>
</tr>
<tr>
<td>Concrete Block</td>
<td></td>
<td></td>
</tr>
<tr>
<td>24 hr Concentrate</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Water Permeability/Absorption</td>
<td>CSN 73 2578</td>
<td>87% reduction</td>
</tr>
</tbody>
</table>

Note: Sample prepared with 5.4 litre of Xycrylic Admix per a 27.2 kg pail of Megamix I. For bond and absorption, mixture was applied at 1.6 mm thick onto pressure washed surface. Results may vary significantly based on environmental, project and other conditions.

Application Procedures

1. SURFACE PREPARATION  Remove loose, delaminated or unsound concrete by high pressure water blast, grit blast or other means. The concrete surface to be treated with Megamix I must be clean and free from dirt, oil, paint, or other foreign substances that could hinder bond. Structural repairs (i.e. cracks, faulty construction joints, rock pockets, tie holes, spalled concrete, etc.) should be performed prior to the application of the Megamix I coating. A roughened, open capillary surface texture such as ICR CSP 3 - 5 is typically required to achieve adequate bond.

2. WETTING CONCRETE SURFACE  The concrete or masonry surface must be thoroughly saturated with clean water to control substrate suction. Maintain surface in saturated, surface dry (SSD) condition during application to prevent the premature drying out of the Megamix I coating.

3. MIXING PROCEDURES  Prepare the mixing liquid by combining 1 part Xycrylic Admix with 2 parts clean water. Mix 5.4 - 5.7 litres of the mixing liquid with one 27.2 kg pail of Megamix I powder. Mix thoroughly to a creamy consistency. Let mixture stand for 3 - 5 minutes, re-agitate and then apply.

4. APPLYING MEGAMIX I  Ensure surface is saturated, surface dry (SSD) just prior to application. Apply Megamix I at a rate of 2.9 to 6.4 kg/m² to produce a thickness between 1.6 mm to 3.2 mm depending on the porosity of

Concrete Waterproofing By Crystallization™
the substrate. For spray application contact the Technical Services Department of Xypex Chemical Corporation or your local Xypex representative for specific details.

For applications such as concrete block walls where Xypex Concentrate is to be used as the initial coat in a two-coat system, the Concentrate coating should be installed as per the manufacturer’s standard instructions. The recommended application thickness for a cap-coat is 3.2 mm. Megamix I should be applied over the Concentrate coating after the Concentrate has set and hardened for 12 - 24 hours. During this time, moist cure the Xypex Concentrate coating per the Xypex product data sheet instructions. Maintain the Concentrate coating in a SSD condition during the installation of the Megamix I as a cap-coat. The Megamix I coating should not be applied later than 48 hours after the application of Xypex Concentrate.

NOTE:
i. Setting time can vary under differing ambient and concrete surface temperatures.

ii. Megamix I should not be mixed and placed at temperatures below 3°C and rising or above 30°C and dropping. Contact the Technical Department of Xypex Chemical Corporation or your local Xypex Technical Services Representative for technical support in such situations.

iii. Prior to the installation, it is recommended that a test section be completed under anticipated ambient and project conditions to demonstrate appropriate bond strength.

5. CURING When used with Xycrylic Admix as specified above, Megamix I should not require any further curing. However, if weather conditions result in rapid evaporation (such as very hot or windy), then after the Megamix I coating has fully set a fine mist of water should be sprayed on the coating 2 - 3 times for one day.

NOTE: In potable water applications, maintain Megamix I coating at a minimum of 15°C for at least 48 hours by appropriate heating and hoarding measures.

Technical Services
For more instructions, alternative application / curing methods, or information concerning the compatibility of the Xypex treatment with other products or technologies, contact the Technical Services Department of Xypex Chemical Corporation or your local Xypex Technical Services Representative.

Certification
Xypex Megamix I satisfies the requirements of EN 1504-3; Initial Type Testing (ITT) according to EN 1504-3 was certified by BSI as the Notifying Body.