**Description:**

PSI Max Ten™ Fibers - Engineered Fibrous Concrete Reinforcement System - 100 percent virgin copolymer, non-fibrillating, fully oriented, monofilament fiber designed to provide a high performance concrete reinforcement system. Max Ten™ Fibers are specifically engineered and manufactured to be used for the reduction of plastic shrinkage cracks, to improve impact, shatter and abrasion resistance, to increase fatigue resistance, to increase toughness and provide long term durability of concrete and cement-based building products. PSI Max Ten™ Fibers meet the material specifications described in ASTM C-1116, Type III, Section 4.1.3 "Synthetic Fiber-Reinforced Concrete and Shotcrete".

**Function:**

- Reduces or replaces non-structural steel reinforcement in high performance concrete applications such as industrial floors, loading docks, bridge decks and shotcrete
- Increases impact, shatter and abrasion resistance of concrete
- Increases fatigue resistance and concrete toughness
- Reduces segregation, plastic settlement and shrinkage cracking
- Reinforces against water migration; reduces permeability of concrete

**Benefits:**

PSI Max Ten™ Monofilament Fibers are an alternate system to welded wire fabric when used for non-structural secondary temperature and shrinkage crack reinforcement in hardened concrete. Saves construction time & money by eliminating purchase, storage, handling, cutting, placing and waste of welded wire fabric - Always positioned in compliance with codes, automatically - Requires no minimum amount of concrete cover - Safe and easy to use - Will not rust or corrode; chemically inert - Nonmagnetic - 100% Alkali proof - Provides long term durability.

**Applications:**

PSI Max Ten™ Monofilament Fibers can significantly enhance the performance of all types of concrete and cement-based building products such as: Industrial Floors, Bridge Decks, Loading Docks, Septic Tanks, Shotcrete.

**Application Rate:**

The standard recommended dosage rate of PSI Max Ten™ Monofilament Fibers is 0.15% to 2.0% by volume added directly to the concrete mixing system, during or after the batching of the other ingredients and mixed at the time and speed recommended by the mixer manufacturer (usually four to five minutes). Additional mixing does not adversely affect the distribution or overall performance of PSI Max Ten™ Fibers. The addition of PSI Max Ten™ Fibers at the recommended dosage rates to a given mix will decrease the slump; however, additional water should not be added. A mid-range water reducer or super-plasticizer should be used to provide the desired workability for placement. Contact your local PSI Fiber™ Representative for alternate dosage rates used in specialty applications.
**Chemical and Physical Properties:**

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Material</td>
<td>Virgin Copolymer</td>
</tr>
<tr>
<td>Fiber</td>
<td>Monofilament</td>
</tr>
<tr>
<td>Type Fiber Length</td>
<td>1.5” (40mm), 2¼” (54 mm)</td>
</tr>
<tr>
<td>Absorption</td>
<td>Nil</td>
</tr>
<tr>
<td>Specific Gravity</td>
<td>0.91</td>
</tr>
<tr>
<td>Tensile Strength</td>
<td>100 - 120 ksi (685 - 825 MPa)</td>
</tr>
<tr>
<td>Acid / Salt Resistance</td>
<td>High</td>
</tr>
<tr>
<td>Thermal Conductivity</td>
<td>Low</td>
</tr>
<tr>
<td>Alkali Resistance</td>
<td>100% (alkali proof)</td>
</tr>
<tr>
<td>Electrical Conductivity</td>
<td>Low</td>
</tr>
</tbody>
</table>

**Mix Designs:**
The addition of PSI Max Ten™ Monofilament Fibers at the normal recommended dosage rate does not require any mix design changes. A mid-range water reducer or super-plasticizer is recommended in concrete placements where improved workability and finishability are desired.

**Finishing:**
PSI Max Ten™ Monofilament Fiber reinforced concrete can be finished by most finishing techniques. PSI Max Ten™ Fibers do not affect the finishing characteristics of concrete. They are non-corrosive, alkali proof and will not stain the concrete surfaces. PSI Fibers™ are compatible with power troweled, hand troweled, colored and broom finished concrete.

**Compatibility:**
PSI Max Ten™ Monofilament Fibers are compatible with all concrete admixtures and performance enhancing chemicals.

**Packaging:**
PSI Max Ten™ Monofilament Fibers are supplied in pre-measured ready to use degradable bags. PSI Max Ten™ Fibers are available in 1.5 to 2 1/4” (40 to 54 mm) length. PSI Max Ten™ Monofilament Fibers are packaged as follows:
- 4.4 lbs (2 kg),
- 5.0 lb bags (2.3 kg),
- 10.0 lb (4.5 kg) boxes.
- 55 lb (25 kg) bales.

**Specification:**
Fibers shall be 100 per cent virgin copolymer, non-fibrillating, fully oriented, monofilament fiber designed to provide a high performance concrete reinforcement system. Fibers shall have been engineered and manufactured for use as secondary reinforcement in ready mix concrete and cement based building products. The fibers are to be used for non-structural temperature and shrinkage crack reinforcement in hardened concrete. The application rate shall be the minimum recommended dosage rate of 0.15% by volume (3.0 lbs per cubic yard / 1.30 kg per cubic meter). The fibers must meet the material specifications described in ASTM C-1116, Type III, Section 4.1.3 “Synthetic Fiber-Reinforced Concrete and Shotcrete”. The fibrous concrete reinforcement system shall be manufactured by: PSI Packaging, Inc, Lafayette GA.

---

**Distributed by:**
Optimet Concrete Products Inc  
4325 Steeles Ave. West Ste 624  
Toronto, ON Canada M3N 1V7  
Tel: (224) 848-4250, Fax: (224) 848-4268

**Manufactured by:**
PSI Packaging Inc.  
1129 South Chattonooga St.  
Lafayette GA 30728  
Tel; (877) 858-5671