

The following specification guide has been prepared to assist design professionals in the preparation of a specification section incorporating Solomon Colors, Inc. Ultrafiber reinforcement for concrete.

Utilize these paragraphs to insert text into Specification Section 03 24 00 Fibrous Reinforcing or similarly titled section governing this work. Consider 03 30 00 Cast-in-Place Concrete, or 03 35 00 Concrete Finishing.

Blue text includes instructions to the design professional. Black text is intended for insertion into project specifications.

PART 1 - GENERAL

REFERENCES

- A. ASTM International (ASTM):
 1. A820/A820M - Standard Specification for Steel Fibers for Fiber-Reinforced Concrete.
 2. C1116 – Standard Specification for Fiber-Reinforced Concrete.
 3. D6942 - Standard Test Method for Stability of Cellulose Fibers in Alkaline Environments.
 4. D7357 - Standard Specification for Cellulose Fibers for Fiber-Reinforced Concrete.

SUBMITTALS

- A. Product Data: Manufacturer's descriptive data.

PART 2 - PRODUCTS

MATERIALS

Utilize the following for a micro fiber and steel fiber blend that reduces early age plastic shrinkage and provides long term crack control.

- A. Fibrous Reinforcing:
 1. Source: Solomon UltraFiber 302 Blend by Solomon Colors, Inc. www.solomoncolors.com
 2. Material: Alkali-resistant natural cellulose fibers with CFS cold drawn steel fibers.
 3. Meet ASTM A820/A820M, ASTM D7357, and ASTM C1116, Section 4.1.4, Type IV.
 4. Average length: 0.083 inch (2.1 mm).
 5. Average tensile strength: 110 ksi (750 N/mm²).

**** OR ****

Utilize the following for cellulose fiber reinforcing that provides excellent secondary reinforcement and superior finishing qualities, and accepts color and finishes cleanly.

- A. Fibrous Reinforcing:
 1. Source: Solomon UltraFiber 500 by Solomon Colors, Inc. www.solomoncolors.com
 2. Material: Alkali-resistant natural cellulose fibers.
 3. Meet ASTM A820/A820M, ASTM D7357, and ASTM C1116, Section 4.1.4, Type IV.
 4. Stability: Exceed ICC-ES requirements of 90 percent average Zero-Span Stability Ratio (ZSSR) after exposure to saturated calcium hydroxide and 1.0N sodium hydroxide, tested to ASTM D6942.
 5. Average length: 0.083 inch (2.1 mm).
 6. Average tensile strength: 110 ksi (750 N/mm²).

MIXES

- A. Add fibrous reinforcing to concrete during mixing; follow manufacturer's instructions.