

## High-Performance Reinforcements

The OCV™ High-Performance Reinforcements product platform features ShieldStrand®, XStrand®, FliteStrand® and WindStrand® high-strength reinforcement products targeted at ballistics, industrial, aerospace and wind energy markets.

Building on its heritage of leadership and innovation in glass fiber reinforcement and composite technology, Owens Corning developed a new generation of reinforcement technology that redefines the availability and value of high-performance glass fiber materials.

Owens Corning high-performance reinforcements offer these benefits:

- Strength – Up to 50 percent higher strength with S-glass versus conventional E-glass
- Modulus (stiffness) – Up to 20 percent higher modulus with S-glass versus conventional E-glass fibers
- Fatigue – End-use parts have higher fatigue properties, a key requirement for high-performance composite applications
- Impact Resistance – Up to 80 percent better impact resistance than conventional E-glass fibers
- Aging and Corrosion Resistance – Better aging and corrosion resistance than E-CR and conventional E-glass fibers
- Temperature Resistance – Better resistance at elevated temperatures than conventional E-glass fibers

Proprietary technology provides the nucleus for the growing array of products with special properties. In 2006, Owens Corning introduced large-scale production to high-strength glass fiber, an achievement previously thought to be technically unfeasible.

Capacity for the new direct-melt process is about 50 times the size of parameters typically used to produce high-strength glass. This scale production process was developed to make high-performance reinforcements widely available and achieve a level of value that enhances their competitiveness.

Wider availability provides greater choice and security of supply, encouraging the use of high-performance glass fiber reinforcements by designers and manufacturers.