



INNOVATIONS FOR LIVING™

# CASE STUDY

## Owens Corning Saves Big Buying FRP Tanks

Chemical storage tanks made with Advantex® E-CR glass fiber reinforcements save about \$2 million vs. stainless steel

### Fabrication Process

- Filament winding

### Reinforcements

- Advantex® E-CR glass fiber reinforcements in both the corrosion barrier and structural portion

### Resin

- Epoxy vinyl ester

### Markets

- Industrial
- Chemical Storage



Owens Corning recently had a chance to experience what the company has been preaching for many years – money can be saved buying chemical storage tanks made with fiberglass-reinforced polymer (FRP) instead of stainless steel.

The Owens Corning buy was a big one – 85 tanks ranging in size from 350 to 40,000 gallons. The estimated savings was also substantial at about \$2 million.

The experience was prompted by a fundamental change in the binder used to make the company's fiberglass insulation. The new binder is made of all-natural ingredients in a formaldehyde-free formulation.

The change is one of the biggest transformations in the company's history, because it redefines how insulation products are made. It also requires having new storage tanks installed at eight facilities throughout North America in an eight-month period between July 2010 and February 2011. To meet delivery deadlines and service all the locations efficiently, Owens Corning purchased the FRP tanks from several fabricators.

All of the corrosion-resistant tanks were made with Owens Corning boron-free Advantex® E-CR glass fiber reinforcements throughout the laminate, from the resin-rich inner corrosion barrier to the structural portions of the tanks.

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“It was nice to be able to leverage our own knowledge in a big way,” said Dave Gordon, director of global sourcing, Owens Corning. “The project also demonstrated that we believe in our products and we are committed to growing with our customers.”

Owens Corning is now sharing its success story with the company's engineering and chemical vendors so they understand the potential for savings with composite storage tanks.

“Our experience will help educate the market and potentially open doors for new clients and applications for our customers,” added Gordon.

## **EcoTouch™ PINK™ FIBERGLAS™ Insulation with PureFiber™ Technology**

Owens Corning introduced a new fiberglass insulation product made with natural materials and a formaldehyde-free formulation. A new binder achieves a balance of environmental responsibility and exceptional performance. The insulation uses a minimum of 30 percent post-consumer recycled content and 50 percent total recycled content – the highest certified percentage in the fiberglass insulation industry. The company's Canadian plants began implementing the new technology late last year and US plants converted in the first quarter of 2011.



**For more about Owens Corning Advantex® glass:**  
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