



## Nighttime Basin Rehabilitation at Bonham Water Treatment Plant

In the summer of 2024, the North Texas Municipal Water District completed critical rehabilitation of Sedimentation Basins 1 and 2 at the Bonham Water Treatment Plant. The cast-in-place concrete surfaces had suffered extensive deterioration, and the common walls between the two basins exhibited shrinkage cracks that were actively leaking. To address these concerns, Epoxytec certified applicator Texas Premier Coatings, LLC was selected as the field applicator and proposed a high-performance solution using Epoxytec Mortartec Ceramico and Epoxytec Series 457 CPP Sprayliner 61.

To prepare the surfaces, Texas Premier conducted dry abrasive blasting in accordance with SSPC-SP13/NACE No. 6, achieving an ICRI CSP5 profile suitable for both resurfacing and lining. Due to peak summer temperatures in Texas, application work was conducted at night to reduce the effects of concrete outgassing—an essential consideration in ensuring a strong bond and consistent film build.

Mortartec Ceramico was applied via a Graco M680 mortar pump at a thickness of 1/4 inch, providing structural resurfacing across the deteriorated concrete—totaling approximately 34,000 square feet between both basins. This resurfacer was selected for its ability to rebuild surfaces up to 1 inch in depth and its unlimited recoat window, which allowed for seamless transition to the topcoat. Before lining, the leaking cracks along the shared walls were addressed with chemical grout injection to halt active infiltration.

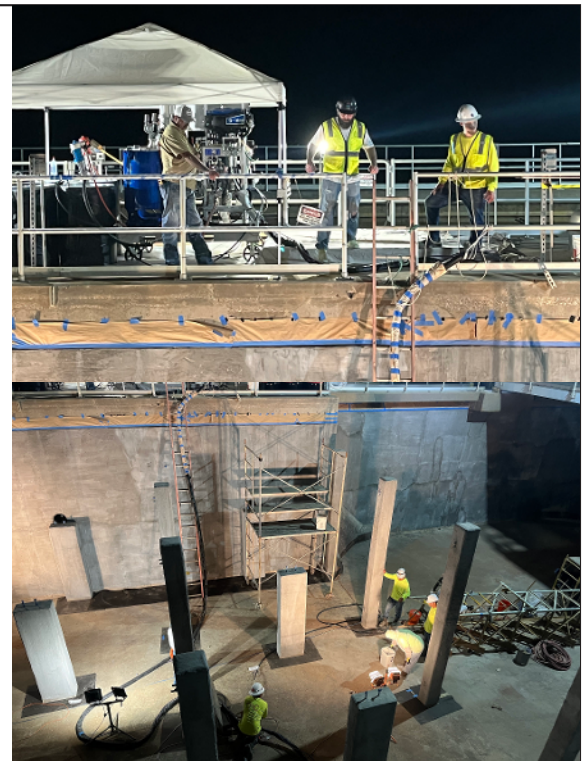
Once repaired, the basins were lined with Series 457 CPP Sprayliner 61, a structural-grade epoxy applied at a minimum of 125 mils DFT using specialized plural-component spray equipment. The system was chosen for its chemical resistance to ferric chloride—used in the plant's treatment process—and for its ability to mitigate future infiltration and protect the substrate over time.

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### Featured Products

**CPP Sprayliner 61**

**Mortartec Ceramico**



### Project Information

#### Location

Bonham, Texas

#### Completion Date

August 30, 2024

#### Structure

Water Treatment Plant Sedimentation Basins (Concrete, Cast-in-Place)

#### Owner

North Texas Municipal Water District (NTMWD) Wylie, Texas

#### Applicator

Texas Premier Coatings, LLC

Above: Crews stage and monitor the plural-component spray equipment during nighttime application at Bonham WTP.

Below: Surface preparation and spray application underway at Bonham WTP Sedimentation Basins 1 & 2



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## Project Name (cont.).

**According to Texas Premier's owner, Josh Rickman, Series 457 applied smoothly and held thickness well—even at high builds—making it a preferred choice for this demanding environment.**

Josh and his team also appreciated the on-site support from Tnemec Technical Services, who demonstrated how to mitigate any remaining outgassing by back-troweling the liner with a rubber float to ensure a smooth, pinhole-free finish.

This project highlights the power of integrated surface repair and lining technologies and showcases the strength of collaboration between the applicator, product manufacturer, and technical support team in delivering long-term durability in critical water treatment infrastructure.



Above: Crews apply Epoxytec Series 457 CPP Sprayliner 61 to basin walls at Bonham WTP while the plural-component equipment operates from above.

Below: A Texas Premier Coatings crew member applies Epoxytec Series 457 CPP Sprayliner 61 to interior surfaces

