

INDUSTRIAL CASE STUDY

CONCRETE WATER STORAGE TANK







APPLICATION

Water tanks, especially for storing rainwater, are a vital part of sustainable living. Rainwater tanks are often made of concrete and can be used for storing drinking water, water for irrigation or fire suppression. Concrete is usually the preferred material because they are durable, keep water cool and is relatively inexpensive. The problem lies in the fact that concrete is porous. A concrete water tank must be sealed to prevent water from leaking out and contaminants from leaching in. Concrete is also susceptible to changing weather conditions and will settle, shrink and crack over time.

To be safe and cost-effective, a concrete water tank must have a reliable, durable and long-lasting waterproofing system.

SOLUTION

Spray-on polyurea coatings like those developed by LINE-X, offer ideal water and weatherproofing solutions for concrete tanks. Polyurea coatings are extremely durable, flexible and fast-curing so application time is minimal.

To apply, the concrete is first sandblasted to remove debris and prep the substrate for LINE-X chemical to form a mechanical bond with the surface. A LINE-X pure polyurea coating, XS-350, is then applied directly to the prepped concrete to a thickness of 3mm. All LINE-X coatings are applied at high-temperature and pressure by highly-trained applicators with specialized equipment.

RESULTS

Residential water tanks, like this one, are meant to serve their communities for decades. Municipalities and residents rely on these tanks for daily and sometimes emergency needs. Tank failure could be a serious problem. Thanks to the addition of a LINE-X protective coating, this particular tank is shielded from corrosion, abrasion, extreme temperatures, leaks, and chemical exposure.

This tank will stay in service for many more years, with little to no maintenance needed.

Project Overview: Water-proofing Residential Rainwater Tank

Products Used: LINE-X XS-350

Case Study Provided by: LINE-X France