



# Storm + Sanitary

Solutions for Infrastructure Repair

MILLIKEN INFRASTRUCTURE 

A *Milliken* COMPANY

# Milliken Infrastructure Solutions

The care and maintenance of infrastructure has become a global issue, and one of the most critical areas of concern today is the capture and movement of storm and sewer water. Faced with limited budgets, asset owners are confronted with the problem of making vital repairs while looking to extend the life of their systems and avoid costly replacement.

Restoring, rehabilitating or strengthening existing assets provides considerable savings over the design and replacement of systems that have deteriorated due to weather, poor maintenance, initial design inadequacies, or reached the end of predicted service life. Milliken Infrastructure has a series of solutions that can be used alone, or in conjunction with each other, to address the problems encountered on a day-to-day basis.

## Why MIS?

By taking a systems approach, we deliver smart, practical solutions designed to meet the specific needs of the market. With a foundation in science, we bring innovations that offer significant chemical, physical, environmental and economic advantages. Third-party tested and verified, our products are built to last, not only enhancing the strength of rehabilitation, but also saving the expense of future repairs.



### Engineering Expertise

- Assess challenges and recommend customized solutions
- Leverage multiple technology platforms with delivery systems
- Provide in-depth documentation and third-party validation



### Technical Support

- Deliver in-field training and support
- Provide responsive and on-demand service



### Project Optimization

- Lower total project cost
- Improve contractor productivity
- Reduce civil impact
- Extend life cycle



Repair solutions are customized to meet the needs of your application.

APPLICATION	Concrete Cloth™	GeoSpray®	GeoPlug™	GeoFuse™	RenewWrap™
Berm Protection	✓				
Culvert Rehabilitation	✓	✓	✓	✓	
Ditch Lining	✓				
Slope Protection	✓				
Manhole Lining		✓	✓	✓	
Concrete Sewer Rehabilitation		✓	✓	✓	✓
Water Treatment Facility Piping					✓

## Geosynthetic Cementitious Composite Mat

### Concrete Cloth™

The Concrete Cloth™ material, licensed from Concrete Canvas, is a three-dimensional flexible cement impregnated fabric that hardens after hydration to form a durable concrete layer. Classified as a Geosynthetic Cementitious Composite Mat (GCCM), it is used in a variety of civil infrastructure markets. Once hydrated, the cloth cures quickly to form a rigid, durable and waterproof 5000 psi concrete surface.

## Geopolymer Mortar Systems

As the global leader in geopolymer technology, our products are specifically designed and formulated for use in harsh sanitary sewers as well as other stormwater environments. By creating contractor-friendly, just-add-water solutions that can be used alone or as a system, Milliken Infrastructure Solutions geopolymers are a cost-effective trenchless alternative to a dig and replace process. They are styrene-free, contain no leachable toxins and are suitable for drinking water applications.

### GeoSpray®

GeoSpray® geopolymer can be applied by pouring, troweling, spraying or centrifugal casting to almost any surface or shape, making it ideal for rehabilitating pipes, tunnels and containment areas. Unlike other cementitious mortars and grouts, GeoSpray geopolymer facilitates the creation of a new structural pipe within the old pipe. This process requires no digging, virtually eliminating traffic delays, and is faster to install than many other repair or rehabilitation products. The result is improved performance and strength, and lower total installed costs than alternative methods, including cured-in-place pipe, spiral wound pipe and sliplining.

### GeoSpray® AMS

GeoSpray® AMS is a geopolymer system that combines our award winning GeoSpray product with a proprietary post treatment. The system is designed to combat the effects of microbial induced corrosion (MIC) that can be encountered in traditional sanitary sewer environments.

### GeoPlug™

GeoPlug™ mortar is a rapid-setting geopolymer water infiltration patch designed to quickly fill, plug, and stop the active flow of water until a structural repair can be completed. The product expands into holes and cracks in corrugated metal pipe, pre-cast concrete pipe, tanks, floors, wells, manholes, pump stations and similar structures.

### GeoFuse™

GeoFuse™ coating is an advanced geopolymer-based elastomeric, acid-resistant coating material that is designed to impart chemical resistance and self-healing properties to concrete, brick, rock, metal or wood. This two-part system is a specially formulated crystalline structure that continues to expand in the presence of water, sealing cracks and pores, and forming a waterproof protective coating.

## Structural Strengthening Solutions

Milliken Infrastructure Solutions focuses on developing solutions to strengthen and stabilize buildings and infrastructure. Our fiber-reinforced polymer (FRP) products are used for a wide range of concrete and masonry structural members in buildings and parking facilities, including columns, beams, slabs, pipes and more.

### RenewWrap™ FRP

The RenewWrap™ FRP strengthening system comprises a wide range of carbon and glass fiber FRP reinforcements and compatible saturating resins, including our ICC-ES certified (ESR-3663) FRP strengthening system.

To learn how Milliken Infrastructure Solutions can address your infrastructure needs, please visit [infrastructure.milliken.com](http://infrastructure.milliken.com) or contact your sales representative.

