

# Application for Evaluation of: Mr. Manhole

**Brief Description:** The Mr. Manhole system is a safe and effective method to quickly remove and replace a manhole frame and lid. The system is used to remove the frame and lid by cutting a circular groove in the road outside the frame and removing the frame and lid with no manual labor. The system includes a rebuild method that leaves the frame exactly level with the road and stops all leakage in the manhole chimney section. The system is mechanized for safety and produces a long lasting repair considerably faster than the conventional method at a fraction of the cost. Traffic can be reinstated in 24 hours or sooner if fast set concrete is used. The repair method is engineered and has a few variations to fit your specific needs. The specifications can be downloaded at [www.mrmanhole.com](http://www.mrmanhole.com). The system is in use in 35 States and parts of Europe and has been used on many state projects.

**Manufacturer:** Critex, LLC

**Address:** 125 S. Canal St., Delphos, OH 45833

**Web Address:** [www.mrmanhole.com](http://www.mrmanhole.com)

**Contact:** Trip Davis

**Phone:** 419-741-9075

**Fax:** 419-692-1600

**Email:** [sales@mrmanhole.com](mailto:sales@mrmanhole.com)

## 1. Use

**Recommended Uses:** Use the system to remove and replace manhole frames and lids for fine adjusting, such as after a repaving operation. The system is widely used to reduce leakage in manhole structures.

## 2. Background

**Briefly describe the manufacturer and product background:** Mr. Manhole is located in Delphos, Ohio. The company has produced patented manhole repair tools for the past fourteen years, and sells tools and materials through distributors. The company's products include tools and materials for the repair of manhole chimneys as well as water valve boxes. The company provides training, and technical support for its installers.

## 3. Description

**Features/Advantages:** The Mr. Manhole System is fast, making high volume manhole chimney replacement possible. The system creates a permanent chimney structure that is leak free, always level with the road, easy to adjust during repaving operations, and environmentally responsible. The Mr. Manhole system is a very safe system. Currently, many back injuries occur in the field of manhole rehabilitation. The system eliminates the heavy lifting associated with this type work.

**Specifications:** See Attached

**Composition:** The materials used are PVC pipe, terpolymer sealants, bentonite waterstop, epoxy coated steel, pourable asphalt sealant, black concrete dye, acrylic polymer concrete curing and sealing compound, and ready mix concrete.

**Installation Method/Instructions:** The manhole frame and lid are removed from the road using a proprietary Six Shooter mounted on a standard skid steer loader. The rebuild consists of a PVC liner placed on the manhole cone and trimmed to slope and height with a battery powered saw via a mark made by the Easy Slope tool. The frame and lid are placed on the liner and seals are installed making the repair waterproof. The repair is finished by placing concrete to road level, dyeing the material black and sealing the interface between the repair and the road with the included sealant.

**Special Tools:** Six Shooter, Easy Slope tool, Material package.

**Special Equipment:** Skid Steer or Track Loader with Auger Drive.

**Warranty:** Tool Warranty attached, Repair Warranty by installer (5 year).

**Availability:** Immediate.

**Samples Available:** Yes.

#### 4. Maintenance

**Evaluation Criteria:** Seal at interface with road.

**Schedule:** 24 months.

**Responsibility:** Road maintenance.

**Method:** Hot tar seal.

**Special Tools:** Hot Tar Equipment.

**Special Equipment:** No.

**Do Maintenance Forces Require Training?:** No.

**Availability of Training, if Required:** Immediate.

## 5. Standards

**Does the product meet any generally accepted industry standards, requirements, or specifications including those from AASHTO, ASTM, FHWA?:** yes, ASTM D-1784, ASTM D-2412, ASTM D-2444, ASTM D-2152, ASTM F-1803, ASTM D-71, ASTM D-6

## 6. Previous Uses, Research, Evaluation

List agencies with contacts who have used, evaluated, or conducted research on the product. Include whether the use was experimental or routine, how long it was used, and if test results or reports are available:

**Company:** Materials Testing, Inc.

**Contact:** Brad J. Core, P.E.

**Address:** 1660 S. Defiance Trail, Spencerville, OH, 45887

**Phone:** 419-647-6163

**Relationship:** Conducted Research. Vylon Liner Compression Test Data attached. Square Repairs versus Round Repairs report attached.

**Company:** E.L. Robinson

**Contact:** Doug Cade, P.E., P.S.

**Address:** 415 Center St., Ironton, OH, 45638

**Phone:** 740-532-2411

**Relationship:** Specified the type of repair as created with the Mr. Manhole system for a 1,033 chimney repair project in Ironton, Ohio. The project was funded in part with monies from the American Reinvestment and Recovery Act.

**Website:** [www.elrobinson.com](http://www.elrobinson.com)

**Company:** Allen County Ohio Sanitary Engineering Department

**Contact:** Stephen Kayatin, P.E.

**Address:** 3230 N. Cole St., Lima, OH, 45801

**Phone:** 419-331-6080

**Relationship:** Evaluated the system and implemented it into sanitary sewer specifications.

**Company:** City of Scottsbluff, NE

**Contact:** Lynn Garton, Water Reclamation Supervisor

**Address:** 1818 Avenue A, Scottsbluff, NE, 69361

**Phone:** 308-630-6292

**Relationship:** Has used the system routinely since 2008.

**Company:** Union Sanitary District

**Contact:** Tom Herlihy, Field Supervisor

**Address:** 5072 Benson Rd., Union City, CA, 94587

**Phone:** 510-477-7629

**Relationship:** Has used the system routinely since 2008

**Website:** [www.unionsanitary.com](http://www.unionsanitary.com)

Articles and Testimonials are attached.

## 7. Costs

**Royalty Cost:** None

## 8. Additional Comments

The design criteria of the equipment are safety, quality, and speed. The tools and methods are very safe, yield a high quality repair, and save money. The system is thoroughly engineered and is specified in over 25 cities in the United States.