

## **Macomb Corridor Pipeline - 2019**

Consumers Energy plans to install 7.5 miles of new, 24-inch pipeline in the Macomb Corridor in Shelby Township and Sterling Heights in 2019 as part of the South Oakland Macomb Network project.

Here are answers to frequently asked questions about the project.

### **SAFETY**

#### **Q: What is the standard setback for a pipeline to be installed near homes?**

**A:** Within an easement, setback areas are established to protect the integrity of the pipeline and to allow for future maintenance. Setbacks, which are free of vegetation and encroachments, vary in size but are generally five to 30 feet. This pipeline will be buried at least four feet below ground for safety and pipeline integrity reasons. The easement within the ITC corridor is planned as 10 feet wide with an additional 5 feet of vegetation management easement on the east side.

#### **Q: What are city gates and the safety zones for them?**

**A:** City gate stations are the place where natural gas is odorized, and pressure is stepped down for delivery to homes and businesses. City gates usually are located on utility property. We consider a variety of factors when determining where to place them, including distance to neighboring property. Generally, there are no required setbacks for city gates.

#### **Q: How are gas leaks detected?**

**A:** Consumers Energy performs leak survey of all our pipelines. Leak surveys can be done by walking, driving or review from the air. Frequency depends on the size of the line, operating pressures, class, location, terrain, weather and other relevant factors.

To allow us to respond quickly to any emergency, our employees also continuously monitor a computer system that alerts us to any abnormal pressures or flows in the gas system.

#### **Q: Will controls be placed to stop gas flow on this pipeline?**

**A:** Yes. Consumers Energy has an Over-pressurization Protection (OPP) monitoring system which prevents medium- and high-pressure gas from entering standard pressure lines. Should over-pressurization occur, relief valves are designed to automatically activate and vent excess natural gas to the atmosphere. A network of pneumatic valves is also strategically located on gas lines throughout our system that can be opened and closed as needed.

#### **Q: Can you provide more details about the size, pressure and durability of the proposed pipeline?**

**A:** We plan to use 24-inch diameter steel pipe. The pressure of the natural gas flowing through the pipe will range from 200 to 280 pounds per square inch (PSI). Pipeline life expectancy varies but is expected to be more than 50 years. Besides adding a special protective coating on the pipe before it's placed in the ground, we will also be installing cathodic protection devices which will help protect the

pipe from corrosion. Mitigation of threats and inspections and/or mitigation to ensure the pipeline is safe will continue regardless of age. Operators are required to follow all federal and state code requirements, along with providing pipeline safety data to our regulators.

**Q: Can you share details about the 2017 pipeline rupture in Orion Township?**

**A:** The biggest threat to gas pipelines is the impact of people causing damage because of other work done near the pipe. This was the case for the Orion Township rupture. A thorough investigation of this incident was conducted of the failure site. The investigation found that about 21 feet of fill material was added on top of the pipeline in the affected area over the course of several years. The weight of this material stressed the pipeline and caused it to sag due to the compressibility of the supporting organic soil layer (i.e. a swampy area where soil can shift more easily). This eventually caused the pipeline to rupture.

The Orion Township pipeline rupture in 2017 was an isolated incident. The rupture was totally contained within 90 minutes. There were no injuries and very little property damage. Consumers Energy had never experienced an incident with this cause before and took actions to help ensure it does not happen again, including:

- Enhanced inspection patrols of our gas transmission lines and enhanced focus on fill material placed over our pipelines.
- Enhanced construction standards to evaluate soil compressibility before pipeline construction/replacement projects begin.

**Q: How will a new pipeline enhance safety?**

**A:** The system we use to deliver natural gas to Michigan homes and businesses is safe. Technology simply evolves with time. Consider today's cell phones compared to the dial-up landlines of years past. Pipelines are no exception. Today's pipe is made from stronger material with more durable coating and inspection processes during manufacturing and construction are more thorough. Replacing vintage pipeline that dates to the 1940s is commonsense. Since the original pipeline infrastructure was installed, Macomb County has grown exponentially in terms of residents and businesses – Shelby Township is a prime example. The demand for natural gas has also grown over time. This new pipeline will help ensure that reliable gas service is provided to customers – even on peak demand days. The 24-inch steel pipeline we plan to install as part of this project is strong, durable and will help enhance safety and reliability for decades to come.

**Q: What precautions are taken to ensure public safety?**

**A:** Nothing is more important to Consumer Energy than safety. This includes protecting you (our customer), our employees and the environment. Safety is the top priority on any job related to the South Oakland Macomb Network project. Gas pipelines exist throughout Macomb County, southeast Michigan and everywhere homes are provided with natural gas service. We have many programs in place to maintain the safety of our natural gas system, especially in densely populated areas or places

where people congregate such as schools, parks and campgrounds. Some of our many safety programs include:

- All pipe is factory-tested to ensure it meets our safety standards.
- Our cathodic protection program uses a low-voltage electric current to help reduce or eliminate corrosion.
- We conduct ground and aerial surveys to check our pipelines at least twice a year.
- We respond to more than 300,000 MISS DIG 811 requests each year to mark pipeline locations so excavators can dig safely.
- To allow us to respond quickly to any emergency, our employees continuously monitor a computer system that alerts us to any abnormal pressures or flows in the gas system.
- Consumers Energy has an Over-Pressurization Protection (OPP) monitoring system which prevents medium and high-pressure gas from entering standard pressure lines. Should over-pressurization occur, relief valves are designed to automatically activate and vent excess natural gas to the atmosphere.
- A network of valves is also strategically located on gas lines throughout our system that can be opened and closed as needed.
- Consumers Energy safety liaison employees work directly with third-party contractors who perform work such as road and sewer construction to ensure they know and use safe excavation procedures when working around public utilities.
- We are active members of the Common Ground Alliance, a national organization dedicated to promoting underground utility safety, and the group which spearheaded Call 811 Before You Dig. Company representatives are also actively involved with industry organizations such as the American Gas Association where best practices are shared.
- Each year we share information about safe digging to hundreds of elementary students throughout lower Michigan.

## **ENVIRONMENT**

### **Q: How will the project impact trees and other vegetation on the ITC corridor?**

**A:** Construction will require moving vegetation and encroachments from ITC's property to create a setback within the easement for safety, construction and pipeline integrity reasons. We understand the trees on the ITC right-of-way are important to adjacent landowners. We plan to work with environmental experts to determine a reasonable and effective vegetation removal plan that reduces tree removal to the extent possible and minimizes impact on the environment and local wildlife. After construction, we'll work carefully to restore the work area to establish new vegetation and help the environment while ensuring pipeline integrity. The Consumers Energy real estate team will have individual conversations with property owners regarding the vegetation removal and replacement plans adjacent to their home. We consider the location of existing vegetation, including trees, and environmental impact – along with many other factors – when designing the pipeline route.

### **Q: How will the project impact the environment?**

**A:** Prior to construction, we will obtain all regulatory approvals including environmental permits. Environmental impact studies are part of that regulatory approval process. We often go beyond what's required on major construction projects. On our Saginaw Trail Pipeline project, for example, we used a special pollinator mix to restore more than 125 acres of wild and wetland areas where new pipeline was buried to create new habitat for butterflies, bees and other pollinators. We've worked closely with the Shiawassee National Wildlife Refuge to minimize the project's environmental impact and used an onsite environmental inspector to identify and manage environmental challenges. During 2018 construction, we also rescued two adult turtles and a nest of turtle eggs from the right-of-way. The eggs were incubated under the care of a herpetologist and the hatched turtles will be released back into their habitat in spring 2019. An environmental expert will be onsite daily as this project is constructed.

**Q: What permits are needed for this project and where do they come from?**

**A:** The project requires a variety of state and county permits, covering everything from environmental work to how we impact drains and roads. We will seek permits from Shelby Township related to construction of the Shelby Gate, a new facility planned for the north end of the Macomb Corridor.

## **PROJECT STATUS/DESIGN**

**Q: Have you decided to go forward with this project?**

**A:** We need to diversify our gas supply and modernize our natural gas infrastructure in Macomb and Oakland counties to meet increasing demand, and apply a systematic, planned approach to investment in our overall gas delivery service. This project will enhance and optimize our network to be able to control delivery pressures to a growing metro region. We will take delivery of gas in multiple locations rather than relying one main system feed. Also, much of the current infrastructure, while safe, dates to the 1940s. Technology evolves over time and upgrading the pipes, city gate facilities and other infrastructure that helps us safely and reliably deliver natural gas to local homes and businesses is a commonsense investment. We've spent considerable time, thought and effort designing the South Oakland Macomb Network, carefully selecting and locating the projects to enhance safety, efficiency and reliability while minimizing impact on the environment and local community. The Macomb Corridor pipeline is an important piece of the overall project. We selected the location in large part because using an existing utility corridor is less disruptive than building a pipeline on busy streets or in dense urban areas and is less likely to be impacted by other projects once installed.

**Q: How did you determine where to locate the pipeline inside of the ITC corridor?**

**A:** As is custom, we worked closely with the primary landowner, ITC, to determine design. We weighed several factors, including existing utility infrastructure within the corridor, setback requirements from the existing utility infrastructure (both above and below ground), and state and federal regulations to determine the best possible location for the pipeline. Within the ITC corridor, design considerations included:

- Existing power lines and the setback requirements from those features.

- A cemetery which cannot be disturbed.
- The ITC property narrows along the route.
- Coordination with existing utilities.

**Q: Would the pipeline be installed along the east or west side of ITC power lines?**

**A:** We plan to locate the new gas pipeline on the east side of the ITC Corridor and complete installation on ITC property. The pipeline will be offset from the east corridor boundary – generally 20 feet to the west to allow space for construction activities. **Q: Will the pipeline be constructed solely on ITC property?**

**A:** Construction is planned exclusively on ITC property and will cross county and state road rights-of-way. We do not anticipate impact to any residential properties.

**Q: How does cost factor into the decision of where to locate the pipeline?**

**A:** Cost is not the determining factor in determining design or location, but one of many factors weighed along with safety, pipeline integrity, deliverability and environmental impact.

**Q:** Why not place the new pipeline in the route of the existing pipeline you plan to retire in Oakland County?

**A:** The existing pipeline now runs directly through several residential subdivisions built since the 1940s. In some cases, the existing pipeline runs between houses which are setback a minimum 5-foot distance. This is typical of areas that transition from rural to highly urbanized over time. In cases like these, we consider alternative routes such as along public road right-of-way, and along existing utility corridors whenever possible.

**Q: When will construction start?**

**A:** We must secure the appropriate permits and regulatory approvals before work can begin. We plan to begin pre-construction activity in early spring 2019 and start construction of the pipeline in late spring.

**REAL ESTATE**

**Q: How will the project impact my property value?**

**A:** As we work through design details of the project, we'll talk with you individually to understand questions or concerns about your specific properties. Our goal in these communications is to provide the information you need to answer the questions that are important to you. Our real estate team is committed to communicating clearly. Most of the work will occur in ITC's utility corridor to reduce the number of impacts to property owners and we'll bury the line underground.

**GENERAL**

**Q: Would Consumers Energy post a bond to cover costs for homeowners should a major event occur?**

**A:** No. Consumers Energy would not post such a bond.

**Q: How will the project impact the natural gas rates of landowners near the proposed project area?**

**A:** Under MPSC guidelines we cannot offer special rates to one group of customers over another. This pipeline project will help us deliver safe, reliable and affordably-priced natural gas service to nearby landowners and customers throughout southeast Michigan while transporting gas to underground storage facilities in the summer for delivery to customers during winter and peak demand days. Natural gas bills are historically low. The average household that we serve will pay about \$2.30 a day for natural gas this year. The average price of the natural gas we provide is near its lowest point in 15 years. Our customers pay less for natural gas than the national and Midwest averages.