



COORDINATED RESPONSE EXERCISE[®]

Pipeline Safety Training For First Responders



EMERGENCY RESPONSE MANUAL

Overview

Operator Profiles

Emergency Response

NENA Pipeline Emergency Operations

Signs of a Pipeline Release

High Consequence Area Identification

Pipeline Industry ER Initiatives

Pipeline Damage Reporting Law

2024



Foreword

In an ongoing effort to improve public safety, environmental health, and damage prevention, nearly all pipeline operators in Kansas have joined together to sponsor training and educational programs that raise community awareness about pipelines. The operators' goal is to work with local emergency officials, public officials, and excavators to improve the effectiveness of pipeline safety and incident response efforts.

Public safety and environmental protection are top priorities in any pipeline-incident response.

While serious pipeline incidents are rare, pipeline operators appreciate the hard work and effort of those emergency officials who are involved in helping return a community affected by an incident to normal. Because pipeline operators care about the safety of the community, they developed this resource covering the critical tasks that need to be considered when responding to a pipeline incident. General information about pipelines and damage prevention is also included to help support your National Incident Management System (NIMS), National Association of State Fire Marshals (NASFM) and agency training, knowledge and other best practices.

Please become familiar with the information in this resource and be prepared to work together with the operator in the unlikely event of a pipeline incident in your community.

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What is a Pipeline?

The term **pipeline** as referenced in this guide, includes **transmission, local distribution and gathering systems**.

Transmission pipelines for natural gas, liquid petroleum (diesel, gasoline, or crude oil), and liquid natural gas (propane, butane, or anhydrous ammonia) move products from the production area or refinery to outlets such as bulk storage terminals or loading facilities. Transmission systems can operate from relatively low pressures to over 1000 (psi). Pipeline diameters range from several inches to several feet.

Local distribution systems may also transport liquid petroleum and natural gas. Liquid petroleum distribution systems transport product from the bulk storage facility by rail car or tank trucks. **Local natural gas distribution companies (LDCs)** use pipelines to move natural gas from a city gate or town border station to distribution systems. Local distribution systems transport natural gas through mains that are usually located along or under city streets to service lines that connect to homes and businesses. Distribution systems can operate up to 200 psi. Pipeline diameters range from 2 to 24 inches.

Gathering pipelines link the production areas to central collection points. Gathering systems can operate from 500 to 1,400 (psi). Pipeline diameters range from 2 to 20 inches.



The Pipeline System

America's energy transportation network consists of more than 2 million miles of pipelines operated by more than 3,000 companies, providing 65% of natural energy. Although these pipelines exist in all 50 states, most people are unaware that the vast network even exists. This is due to the strong safety record of pipeline operators and the fact that most of the pipelines are located underground.

The U.S. Department of Transportation's (DOT) Pipeline and Hazardous Materials Safety Administration (PHMSA), which administers the nation's pipeline safety program through the Office of Pipeline Safety (OPS) along with state regulatory agencies, is responsible for the oversight of natural gas and hazardous liquid pipelines. Their mission is to ensure the safe and reliable operation of the nation's pipeline transportation system, all the while protecting the people, property and environments located around the pipelines. Pipeline operators are equally committed to public safety and environmental responsibility. As a result, pipelines are considered the safest, cleanest, and most economical way to transport large quantities of natural gas, oil, and other chemicals to businesses and homes across the United States.



Know what's below.
Call before you dig.



Pipeline marker signs are located at road, railroad, and navigable waterway crossings. These markers identify the approximate location of a pipeline at numerous points along the pipeline right-of-way. Each operator's marker may look different, but the purpose and information on the marker is the same. Markers are required to provide three critical pieces of information:

- Material transported
- Emergency phone number
- Pipeline operator

Markers are placed near pipelines, but not necessarily on top of them. For these reasons it is critical that you know the general area, product carried, the name of the operator and their emergency number as the pipeline marker does not provide exact depth, location, diameter or operating pressures. In addition, a pipeline may not follow a straight line between adjacent markers.



It is a federal crime to damage or remove a pipeline marker; however sometimes markers are removed, knocked down or obstructed. Suspect a pipeline is nearby if you see the following:

- A pipeline marker sign
- A buried pipeline that's exposed and visible
- A pipeline facility and equipment, i.e., wellhead or pump/compressor station
- A regulator or meter setting
- A refinery, processing plant, distribution station



- Painted metal or plastic posts
- Signs located near roads, railroads & along pipeline right-of-ways
- Pipeline casing vent
- Marker for pipeline patrol airplane

Look for signs of a pipeline release using your 3 senses

As an emergency official, you can recognize a pipeline incident by using your senses of sight, sound and smell, or through the use of electronic detection equipment.



Mist or cloud of vapor



CO2 vapor cloud



Fire or explosion

A pipeline incident exists when there is a pipeline leak, fire, explosion, natural disaster, accidental release or operational failure that disrupts normal operating conditions.

Pipeline control center personnel keep a watchful eye over potential incidents by constantly monitoring the daily operation of pipelines. As a result, pipeline operators are able to minimize the impact of leaks and prevent incidents by remotely initiating emergency shutdowns, starting and stopping pumps, and opening and closing valves.

Despite the industry's best efforts to monitor and protect pipelines, incidents can happen. Pipelines that were built years ago in rural areas may now lie beneath populated areas. A minor scrape or dent from construction and excavation activities can cause a break or leak in these pipelines. This is why we ask to partner with you to keep our critical infrastructure and our communities safe

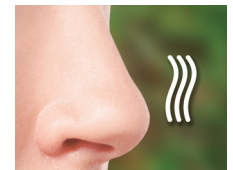


Sight



Sound

A hissing, whistling or roaring noise



Smell

Strange and unusual gaseous or chemical odors



Petroleum on the ground



Dying vegetation on green corridor



Sheen or film on water



Water bubbling or standing in unusual areas



Use the information in this resource to make initial decisions upon arrival at the scene of a pipeline incident. It should not be considered a substitute for emergency response training, knowledge, or sound judgment. Contact the pipeline operator or the National Association of State Fire Marshals to learn more about pipeline incident prevention and response. And, for emergency response to pipeline hazards, please consult the Emergency Response Guidebook.

Employ the National Incident Management System (NIMS), a consistent, nationwide approach for federal, state, tribal, and local governments to work effectively and efficiently together to prepare for and respond to all hazards, including acts of terrorism. Visit www.fema.gov/emergency/nims/index.shtm for more information.

Approach cautiously from upwind

- Do not drive or enter into a leak or vapor cloud area.
- Do not park over a manhole or storm drain.
- Gather information/establish incident command/identify command structure
- Initiate communications with pipeline/gas company representative ASAP.
- Control/deny entry: vehicle, boat, train, aircraft, foot traffic, media – refer all media questions to pipeline Public Information Officers (PIOs).

If a pipeline incident occurs, the emergency response team needs to immediately:

- Confirm the presence and identity of the pipeline product.
- Initiate protective actions.
- Secure the area.
- Request the assistance of qualified personnel.

Meanwhile, the pipeline operator will focus on the pipeline damage and on bringing the incident to a conclusion as quickly and safely as possible. Their personnel are trained to recognize dangers and respond appropriately to minimize and control pipeline-incident hazards.

911 Dispatch personnel play a critical role in effective response to pipeline incidents. For correct and prompt response in the event of a pipeline incident, it is important to know who the companies are in your respective jurisdictions, their contact information and the products being transported. Actions taken by dispatchers can save lives, direct the appropriate emergency responders to the scene and protect our nations' infrastructure from additional issues that can be caused by an improper response. Follow these simple guidelines in the case of a pipeline incident:

- Gather the proper information (if possible)
- Company, product, phone numbers on markers/signs and characteristics of any product being released

- Know the appropriate response to each product
- Know the wind direction at the time
- Warn of ignition sources if possible
- Dispatch appropriate emergency responders
- Contact the pipeline company

Identify the problem

- **Pipeline type, product, and nature of incident –**
Determine the identity of the product via pipeline marker, facility documents, monitoring and detection equipment, and your senses of sight, sound and smell.
- **Exposures**
Identify structures and occupancies in the area and any special needs for people located there.
- **Environmental conditions**
Identify weather conditions that may affect the incident. Determine whether the pipeline product may release into a water system or other environmentally sensitive area and take action to prevent contamination.
- **Safety considerations**
Identify any unique safety hazards or considerations associated with the incident.
- **Pipeline isolation**
Determine whether the pipeline can be isolated.
- **Incident potential**
Identify the potential for the incident to escalate into a more serious event.

Consult product information documents and the **Emergency Response Guidebook** published by PHMSA/DOT to learn about the specific hazards associated with and emergency responses to the products transported through pipelines in your community.

Establish site control

Site management and incident control involve managing and securing the physical layout of the incident area. You want to employ the Incident Command System (ICS). From a command post, the emergency response team can assess the situation, evaluate the hazards and risks, and determine whether or not officials should intervene. Continually reassess the situation and modify the response accordingly.

Respond to protect people, property and the environment from hazards

• Employ public protective actions.

- Evacuate or protect-in-place.
- Provide medical assistance.
- Refer to product information documents to identify health and fire hazards and personal safety precautions. Use monitoring equipment to evaluate atmospheric conditions and determine whether it is safe to enter the area. Do not attempt to enter the area without appropriate personal protective equipment.

• Secure the area.

- Set up barricades to control crowds and traffic.
- Eliminate ignition sources. Do not light a match, start an engine, use a cell phone or a telephone, switch lights on/off, or do anything that may cause a spark.

• Do not operate pipeline equipment.

• Notify the railroad authority of any vapor cloud over or near a railway.

• Control spills (confinement).

- Prevent the entry of liquid products into waterways, sewers, basements, or confined areas. Divert the spill to an open area, if possible.
- If flammable liquids are involved, use Class B firefighting foams for vapor suppression.
- Conduct air monitoring.
- Cover storm drains and sewers ahead of the release.
- Do not touch, breathe, or make contact with leaking liquids!

• Control leaks (containment).

- Operate pipeline equipment only with permission. Attempting to isolate or operate pipeline valves unless under the direction of the pipeline operator may create additional problems that are worse than the original event.
- Do not touch natural gas plastic piping. It may generate a static spark that could act as an ignition source.
- Avoid ignition sources.

• Control fires.

- Flammable liquids and gases give off a tremendous amount of radiant heat. Protect exposures as appropriate.

- Never extinguish a flammable gas fire. Always control or isolate the source of the leak.
- Permit the fire to self-extinguish and consume any residual fuel that may remain inside or around the pipeline.
- Eliminate ignition sources, such as engines, electric motors, pilot lights, burn barrels, cell phones, cigarettes, ungrounded tools, and emergency radios.

When responding to a pipeline incident, you can help protect your community by understanding the hazards associated with the products transported through pipelines. Consult product information documents and the Emergency Response Guidebook published by PHMSA/ DOT to learn about the specific hazards associated with and emergency responses to the products transported through pipelines in your community.

Contact the pipeline operator

Communication provides for timely and effective management, coordination, and dissemination of all pertinent information to all the stakeholders. Call the pipeline operator as soon as possible!

Be prepared to provide your contact information, location, and information about the incident, such as the size, characteristics and behavior of a leak. Also, notify the operator of any change in the incident conditions, such as a vapor cloud moving or enlarging.

**Per federal requirements, pipeline companies are required to communicate important information to all agencies and departments that may respond to a pipeline emergency. In addition to educating emergency responders when to notify operators they are required to "identify the types of gas pipeline emergencies of which the operator notifies the officials". Emergency Responders need to know that "pipeline operators will contact emergency officials in the event of an emergency". Some examples of when an operator may notify responders include, but are not limited too: Leak, fire, explosion, natural disaster, bodily injury, accidental release or operational failure that disrupts normal operating conditions.*

Coordinate response efforts with the pipeline operator

Work together to ensure the incident priorities are accomplished in a safe, timely and effective manner.

When the pipeline operator's area representatives arrive, they will identify themselves, establish contact with the incident commander, and may request continued assistance with incident control. Operator representatives are trained to minimize hazards and determine when the incident is over. The pipeline operator will take the following steps to ensure public safety and environmental protection:

- | | |
|--|--|
| • Shut down the pipeline | • Take steps to protect the environment. |
| • Close valves to isolate the problem. | • Excavate and repair the damaged pipeline. |
| • Identify hazardous areas. | • Work with emergency officials and the public in the affected area. |
| • Dispatch personnel to the scene. | |

Pipeline Operator Efforts

In response to federal regulations and in accordance with corporate commitments to protect our communities, pipeline operators use several damage prevention measures to monitor and ensure safe pipeline operation.

These include:

- Regular internal maintenance inspections and integrity tests
- Ongoing pipeline maintenance programs
- Routine patrol and visual inspection of pipeline right-of-ways
- Satellite and other remote communication technologies
- Constant pipeline monitoring
- Participation in state one-call underground damage prevention program
- Pipeline marker program
- Pipeline Integrity Management Plan (IMP)
- Emergency response plans

Though operational disruptions are infrequent, pipeline operators go to great efforts to be prepared for any type of incident. Pipeline operators:

- Develop emergency response and crisis management plans
- Accumulate manpower and equipment necessary to respond to incidents quickly
- Develop extensive training and drill programs
- Work closely with federal, state and local agencies to prepare for and respond effectively to an incident

As a result of regular damage prevention activities and response planning, pipeline operators are able to ensure pipeline integrity, achieve safety goals, and comply with applicable laws and regulations.



Federal codes regulate the planning, design, operation, maintenance, inspection and testing of pipelines.



Smart Pig: An internal inspection tool

Integrity Management

Operators use Integrity Management Plans (IMPs) to prevent pipeline leaks and spills, respond to emergency incidents, determine which pipelines could affect High Consequence Areas (HCAs), and identify opportunities to lower the operating risks of a pipeline. HCAs are segments along transmission pipelines that require supplemental hazard assessment and prevention programs because, in the event of a release, they could result in greater consequences to health and safety or the environment.

Contact your local pipeline operators to determine if HCAs are located in your area of responsibility.



Emergency Official Efforts

It's always better to prevent an accident than to respond to an incident. You can help prevent damage in your community by being aware of pipeline locations, promoting pipeline awareness and damage prevention, and watching for suspicious activities near pipelines:

- **Be aware of pipelines in your area.**
 - Search the Pipeline Integrity Management Mapping Application (PIMMA) on the National Pipeline Mapping System (NPMS) website: npms.phmsa.dot.gov. Learn who operates pipelines in your area, products they carry and know how to contact them.



- Look for their pipeline marker signs and look who operates the pipelines in your area.
- Contact local pipeline operators to discuss the pipelines and emergency response plans in your area.
- **Promote the use of the state one-call.**
 - State law requires everyone in your community including farming, road or utility work to contact the one-call at least two days prior to excavation, excluding Saturday, Sunday and legal holidays, prior to excavation. The pipeline operator will mark its underground facilities, including any pipelines in the excavation area, and may remain on site during excavation near a pipeline. Remind excavators to use this free service – it's the law!
- **Report suspicious activities on or near a pipeline, exposed pipe, or damaged facilities to the pipeline operator.**
 - In our nation's time of heightened security, it is more important than ever to guard pipelines against damage or attack. Homeland Security and infrastructure protection is a shared responsibility. Help protect these valuable assets. If you suspect something say something. Call your local emergency dispatch.

Emergency Response for Public Safety Personnel

When responding to a storage field incident, your first job as an emergency responder is to take all necessary actions to safeguard the public. Such action should include immediately clearing the area of people, barricading the area and standing by at a safe distance. Your next step will be to contact the storage field operator. Keep in mind when setting up emergency response, a storage field incident may involve the release of product for several days until the specialized emergency response equipment, coordinated by the storage field operator, becomes available. It is also important for emergency responders to know and understand the type of product being released.



If ignition has not occurred, precautions should be taken to prevent ignition, such as rerouting vehicle traffic, air traffic and shutting down nearby railroads. When ignition has occurred, prevent the spread of fire but do not attempt to extinguish the burning product.

It is important for emergency responders to know where all storage fields are located within your response area and the products they contain. As well, emergency responders need to know who the storage field operators are and to meet on a regular basis to discuss emergency response.

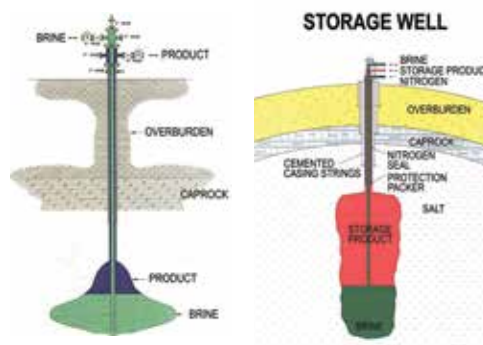
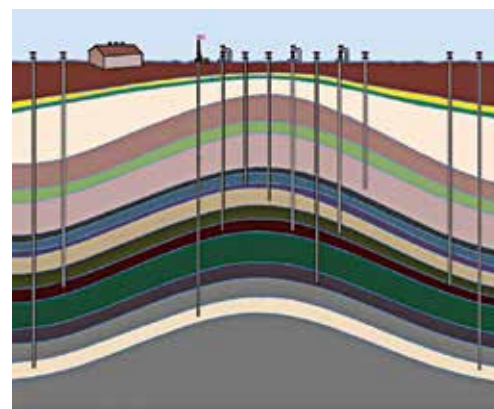
What Should I Do If I Suspect An Emergency?

- ☒ Notify storage field operator as soon as possible
- ☒ Always be aware of wind direction
- ☒ Walk into the wind, away from possible hazardous fumes.
- ☒ Do not drive into a leak or vapor cloud
- ☒ Monitor combustible atmosphere, if equipment is available
- ☒ Determine hazardous area and escape routes
- ☒ The emergency phone number can be found on all pipeline markers and all wellhead locations

Underground Porosity Gas Storage Fields in Kansas

Field Name	Status	Operator	County
Adolf *	ABD		Barton
Alden	Active	Southern Star	Rice
Bohem	Active	Colorado Interstate Gas	Morton
Borchers North	Active	Pan Gas Storage	Meade
Boyer	P&A	Cities Service	
Brehm	Active	Oneok	Pratt
Buffalo	Active	Cherokee Wells	Wilson
Collinson	P&A		Cowley
Colony-Welda	Active	Southern Star	Anderson
Craig	P&A		Johnson
Cunningham	Active	Northern Natural Gas	Pratt & Kingman
Elk City	Active	Southern Star	Elk, Montgomery, Chautauqua
Fredonia	Active	Cherokee Wells	Wilson
Konold East	Active	Oneok	Pratt
Liberty North	Active	Atmos Energy	Montgomery
Liberty South	Active	Atmos Energy	Montgomery
Longton	Active-ABD	Quest Cherokee	Chautauqua
Lyons	Active	Northern Natural Gas	Rice
McLouth	Active	Southern Star	Leavenworth & Jefferson
Piqua	Active	Southern Star	Woodson & Allen
North Derby	Active	Hawker Beechcraft	Sedgwick
Welda N	Active	Southern Star	Anderson
Welda S	Active	Southern Star	Anderson

FERC regulated



If I find a well on my property that appears to be abandoned, what should I do?

You should access the KCC's abandoned well reporting form. To complete the form, you must provide information including, but not limited to, the legal description of the acreage where the well is located and your contact information. A field agent may contact you for additional information to facilitate the KCC's investigation.

Who is responsible for plugging abandoned wells on my property?

That question must be answered on a case-by-case basis after reviewing available records concerning the well. However in general, the current or last operator of the well is responsible for properly plugging the well. If no responsible party for plugging the well can be located, the Conservation Division has a fund for plugging abandoned wells. When wells are plugged using money from this fund, plugging is based on a priority system considering the wells age, construction, effect on the environment and effect on public safety.

As a landowner, can I be responsible for plugging abandoned wells on my property?

K.S.A. 55-179 makes landowners responsible for plugging wells on their property only if the landowner has tampered with the well or assumed responsibility for the well in writing. As a landowner, you should never knock over or cutoff above ground well casing or bury wells. Not only can doing so be dangerous, it may make you a responsible party to plug the well. If you find abandoned wells on your property, report them using the abandoned well reporting form.

When is a well considered to be abandoned?

Legally a well is abandoned when the well has not been in use for over 90 days for wells not fully equipped for immediate service and 365 days for fully equipped wells and the well has not been granted temporary abandonment status by the Conservation Division.

If I'm the landowner but not the mineral owner and there are wells operating on my property, how can I find out who the operator is?

If the wells are oil wells and there are tanks on the property associated with the wells, there should be an operator sign on or near the tanks with information about the current operator. If the well is a gas well, there may be no identification with the well. You can call the Conservation Division or the appropriate district office for assistance. You will need to provide the legal description for the well's location.

Why are there so many abandoned wells found in Kansas?

Oil and gas development in the state started in the late 1800's and generally proceeded from the Eastern part of Kansas west. Although there was some regulation of oil and gas development starting in the late 1930's, comprehensive regulation did not begin until the mid-1980's. Over the years numerous wells drilled from the late 1800's through the 1970's were abandoned without being properly plugged. Over time, many of these wells were buried or overgrown with trees and brush that make them hard to find even today.

To report the location of an abandoned oil or gas well, contact the appropriate KCC District Field office. Plugging of abandoned wells is on a priority basis. Wells having ongoing or potential for environmental damage or public safety considerations receive the highest priority.

District Field Offices are:

District 1

Dodge City, Kansas (Southwest Kansas)
(620) 682-7933

District 2

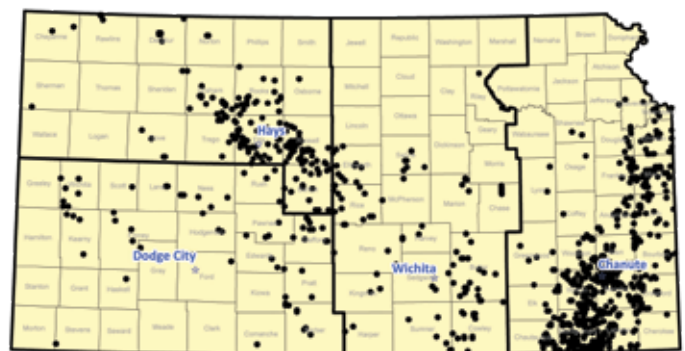
Wichita, Kansas (South & North Central Kansas)
(316) 337-7400

District 3

Chanute, Kansas (Eastern Kansas)
(620) 902-6450

District 4

Hays, Kansas (Northwestern Kansas)
(785) 261-6250



Statewide distribution of state funded abandoned wells plugged since 1996

Underground Storage Facility Contacts - Natural Gas and Natural Gas Liquids

SALT CAVERNS

Bushton Underground Storage Facility – ONEOK

Bedded Salt Liquid Storage
Tom Lumpkins
785-324-0541

CHS Conway Storage Terminal

Brent Alumbaugh
844-721-6611

Conway East – Williams MidContinent Fractionation and Storage

Steve Wilson
620-834-2186

Conway West – Williams MidContinent

Fractionation and Storage
Steve Wilson
620-834-2186

Hutchinson – Conway and Yaggy Underground Storage Facilities

Bryan Stephens
620-718-7051

Mitchell – Williams MidContinent Fractionation and Storage

Steve Wilson
620-834-2186

POROSITY

Brehm and Konold Storage Facilities – ONEOK

Jonathan Hill
580-750-0259

Boehm Gas Storage – Kinder Morgan Colorado Interstate

877-712-2288

Borchers North Storage Field – Panhandle Eastern Pipeline/ Southwest Gas Storage Company

Jake Shrewsbury
620-626-1121

Cunningham Storage – Northern Natural Gas

Jay Russell
620-546-1696

Liberty Storage – Atmos Energy

Dustin Atherton
620-330-2847

Lyons Storage – Northern Natural Gas

Joe Jesson
620-491-8246



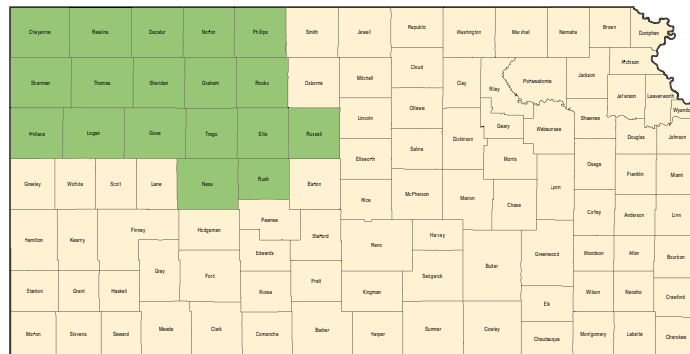
REGIONAL MATRIX

Emergency Contact Numbers by Homeland Security Region and County



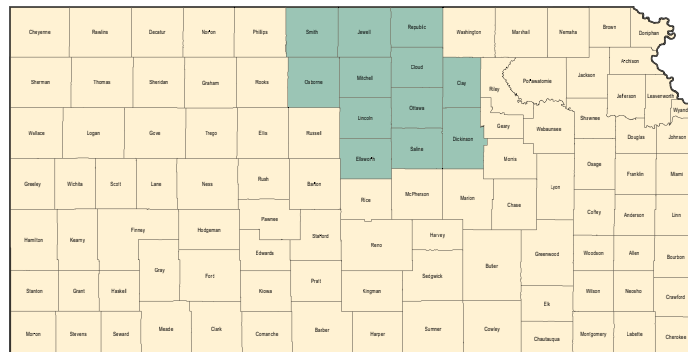
Northwest Region

Pipeline Company	Emergency Contact	Cheyenne	Decatur	Ellis	Gove	Graham	Logan	Ness	Norton	Phillips	Rawlins	Rooks	Rush	Russell	Sheridan	Sherman	Thomas	Trego	Wallace
Atmos Energy	1-866-322-8667							X					X						
Black Hills Energy	1-800-694-8989	X														X			X
Coffeyville Resources Crude Transportation LLC	1-800-982-4112									X		X							
DCP Operating Company, LP	1-800-435-1679																		
	1-888-204-1781			X	X		X							X		X	X	X	
Energy Transfer (Crude Oil)	1-800-753-5531						X	X					X	X		X			X
Great Salt Plains Pipeline, LLC	1-866-219-0015							X											
Jayhawk Pipeline LLC	1-888-542-9575							X		X		X		X				X	
Kansas Gas Service	1-888-482-4950			X									X	X					
Kaw Pipe Line Company	1-888-542-9575			X										X				X	
Kinder Morgan Cheyenne Plains Gas Pipeline Company, LLC Kinder Morgan Colorado Interstate Gas Company, L.L.C.	1-877-712-2288						X									X			X
Magellan Midstream Partners, LP	1-800-720-2417						X	X					X			X			X
Midwest Energy, Inc.	1-800-222-3121	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
Northern Natural Gas	1-888-367-6671							X					X						
ONEOK Field Services Company, L.L.C. Mid Continent Market Center, L.L.C. (MCMC)	1-888-675-3302												X						
ONEOK NGL Pipeline LLC	1-800-666-9041	X		X		X					X			X	X		X	X	
Plains Pipeline	1-800-708-5071													X					X
Pony Express Pipeline (PXP)	1-855-220-1762		X			X			X		X	X							
Tallgrass Interstate Gas Transmission (TIGT)	1-888-763-3690	X	X	X	X	X	X	X	X	X	X	X	X		X	X	X	X	X
Williams Overland Pass Pipeline	1-855-945-5762	X		X	X						X			X	X		X	X	



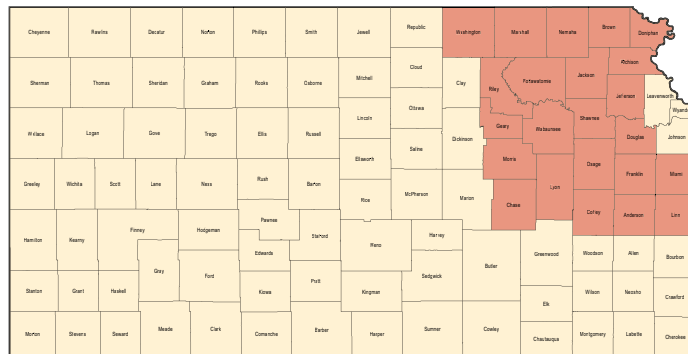
North Central Region

Pipeline Company	Emergency Contact	Clay	Cloud	Dickinson	Ellsworth	Jewell	Lincoln	Mitchell	Osborne	Ottawa	Republic	Saline	Smith
Atmos Energy	1-866-322-8667			X									
Black Hills Energy	1-800-694-8989	X	X							X	X		
DCP Operating Company, LP	1-800-435-1679				X								
	1-888-204-1781												
Energy Transfer (Crude Oil)	1-800-753-5531				X								
Enterprise Products Operating LLC	1-888-883-6308	X		X	X					X		X	
Jamestown Municipal Gas	1-785-439-6621		X										
Jayhawk Pipeline LLC	1-888-542-9575				X				X				
Kansas Gas Service	1-888-482-4950	X	X	X	X	X	X	X	X	X	X	X	X
Midwest Energy, Inc.	1-800-222-3121				X				X		X		X
Northern Natural Gas Company	1-888-367-6671	X	X		X		X			X			
NuStar Pipeline Operating Partnership L.P.	1-800-759-0033	X	X	X						X	X	X	
ONEOK Field Services Company, L.L.C. / Mid-Continent Market Center, L.L.C. (MCMC)	1-888-675-3302				X								
ONEOK NGL Pipeline, L.L.C.	1-800-666-9041				X								
ONEOK North System, L.L.C.	1-888-844-5658	X	X	X	X		X			X		X	
Pony Express Pipeline (PXP)	1-855-220-1762				X		X		X				
Tallgrass Interstate Gas Transmission (TIGT)	1-888-763-3690			X			X		X	X	X		X
TC Energy	1-866-920-0007				X							X	
	1-800-447-8066	X		X	X								
Williams Overland Pass Pipeline	1-855-945-5762				X								



Northeast Region

Pipeline Company	Emergency Contact	Anderson	Atchison	Brown	Chase	Coffey	Doniphan	Douglas	Franklin	Geary	Jackson	Jefferson	Linn	Lyon	Marshall	Miami	Morris	Nemaha	Osage	Pottawatomie	Riley	Shawnee	Wabaunsee	Washington
Atmos Energy	1-866-322-8667				X	X		X				X	X			X	X							
Black Hills Energy	1-800-694-8989							X	X	X				X		X			X					X
City of Alma (Flint Hills Area Natural Gas Operators)	1-785-765-3323																						X	
City of Auburn (Flint Hills Area Natural Gas Operators)	1-785-357-8095																					X		
City of Burlingame (Flint Hills Area Natural Gas Operators)	1-785-654-3431																		X					
City of Eskridge (Flint Hills Area Natural Gas Operators)	1-785-765-3323																						X	
City of Harveyville (Flint Hills Area Natural Gas Operators)	1-785-765-3323																						X	
City of Havensville (Flint Hills Area Natural Gas Operators)	1-785-456-5427																		X					
City of McFarland (Flint Hills Area Natural Gas Operators)	1-785-456-4056																						X	
City of Osage City (Flint Hills Area Natural Gas Operators)	1-785-528-3714																	X						
City of Reading (Flint Hills Area Natural Gas Operators)	1-620-699-3870													X										
Energy Transfer (Crude Oil)	1-800-753-5531				X	X								X										
Enbridge / Platte Company	1-800-858-5253			X			X						X		X			X						
Enterprise Products Operating LLC	1-888-883-6308							X				X					X		X			X	X	X
Kansas Gas Service	1-888-482-4950	X	X	X		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
KPC Pipeline, LLC	1-800-467-2751	X			X	X		X						X		X								
Magellan Midstream Partners, LP	1-800-720-2417	X	X	X	X		X	X				X	X	X		X			X			X		
Northern Natural Gas Company	1-888-367-6671																							X
NuStar Pipeline Operating Partnership L.P.	1-800-759-0033														X						X			
ONEOK North System, LLC	1-888-844-5658		X							X	X	X							X			X	X	X
Panhandle Eastern Pipe Line	1-800-225-3913	X			X	X		X						X		X								
Phillips 66 Pipeline LLC	1-877-267-2290	X				X		X						X		X								
Rockies Express Pipeline (REX)	1-877-436-2253			X			X								X			X						
Tallgrass Interstate Gas Transmission (TIGT)	1-888-763-3690							X	X					X		X	X		X				X	
TC Energy Liquids	1-866-920-0007			X			X			X	X				X			X		X	X			X
TC Energy Natural Gas	1-800-447-8066			X			X			X	X				X			X		X	X			X



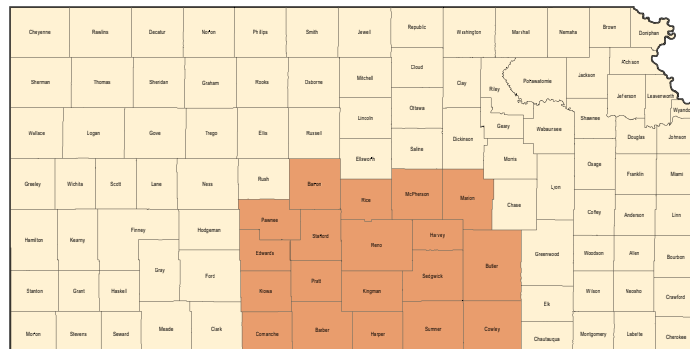
KC Metro Region

Pipeline Company	Emergency Contact	Johnson	Leavenworth	Wyandotte
Atmos Energy	1-866-322-8667	X	X	X
Enterprise Products Operating LLC	1-888-883-6308		X	
Evergy	1-816-654-1499	X		
Holly Energy Partners - Operating L.P.	1-877-748-4464	X		
Kansas Gas Service	1-888-482-4950	X	X	X
KPC Pipeline, LLC	1-800-467-2751	X		X
Magellan Midstream Partners, LP	1-800-720-2417	X	X	X
Panhandle Eastern Pipe Line	1-800-225-3913	X		
Phillips 66 Pipeline LLC	1-877-267-2290	X		X
Tallgrass Interstate Gas Transmission (TIGT)	1-888-763-3690	X		

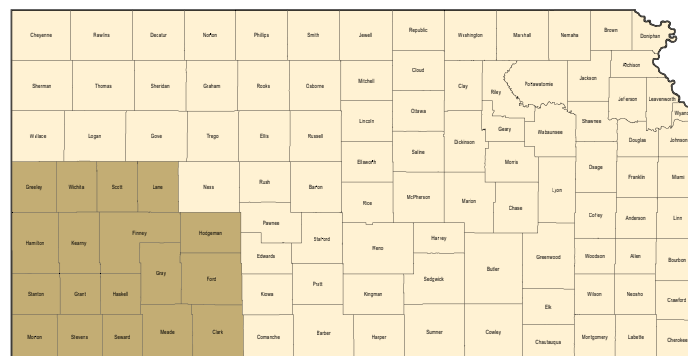


South Central Region

Pipeline Company	Emergency Contact	Barber	Barton	Butler	Comanche	Cowley	Edwards	Harper	Harvey	Kingman	Kiowa	Marion	McPherson	Pawnee	Pratt	Reno	Rice	Sedgwick	Stafford	Sumner
Atmos Energy	1-866-322-8667	X						X				X								X
Black Hills Energy	1-800-694-8989					X	X	X	X	X			X	X		X	X	X		X
CHS McPherson Refinery Inc. Pipeline	1-844-721-6611												X							
City of Lyons	1-800-694-8989																X			
Coffeyville Resources Crude Transportation, LLC	1-800-982-4112			X		X														
DCP Operating Company, LP	1-800-435-1679		X		X						X									
	1-888-204-1781																			
Enable Midstream Partners	1-800-474-1954					X														X
Energy Transfer (Crude Oil)	1-800-753-5531	X	X	X			X	X	X	X	X			X	X	X	X	X	X	X
Energy Transfer (Natural Gas)	1-877-839-7473							X												
	1-800-375-5702																			
Enterprise Products Operating LLC	1-888-883-6308			X	X	X			X		X	X	X		X	X	X	X		
Evonik	1-316-522-8181																	X		
Great Salt Plains Pipeline, LLC	1-866-219-0015	X		X				X	X	X				X		X	X	X	X	
Holly Energy Partners - Operating L.P.	1-877-748-4464			X		X														
Jayhawk Pipeline, L.L.C.	1-888-542-9575		X	X	X				X		X		X		X	X	X	X	X	
Kansas Gas Service	1-888-482-4950	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
KAW Pipe Line Company	1-888-542-9575		X														X			
Kinder Morgan - Cheyenne Plains Gas Pipeline Co, LLC Kinder Morgan - Colorado Interstate Gas Company, L.L.C.	1-877-712-2288										X									
KPC Pipeline, LLC	1-800-467-2751	X		X	X	X		X		X		X	X				X	X		
Magellan Midstream Partners, LP	1-800-720-2417		X	X		X	X	X	X	X			X	X	X	X		X	X	X
Midwest Energy, Inc.	1-800-222-3121		X											X					X	
Northern Natural Gas Company	1-888-367-6671		X				X			X	X			X	X		X		X	
NuStar Pipeline Operating Partnership L.P.	1-800-759-0033			X		X			X				X			X		X		
ONEOK Field Services Company, L.L.C. Mid Continent Market Center, L.L.C. (MCMC)	1-888-675-3302		X	X	X			X	X	X		X			X	X	X	X		
ONEOK NGL Pipeline, L.L.C.	1-800-666-9041		X	X			X	X	X	X	X		X		X	X	X	X	X	X
ONEOK North System, L.L.C.	1-888-844-5658								X				X			X	X	X		
Panhandle Eastern Pipe Line	1-800-225-3913	X		X				X	X	X	X	X			X	X				
Phillips 66 Pipeline LLC	1-877-267-2290	X		X	X	X		X		X			X			X		X		X
Plains Pipeline, L.P.	1-800-708-5071	X			X															
Pony Express Pipeline (PXP)	1-855-220-1762			X		X			X				X					X		
Tallgrass Interstate Gas Transmission (TIGT)	1-888-763-3690		X													X				
Targa Pipeline Mid-Continent (West OK) LLC	1-800-722-7098	X			X			X												X
TC Energy Liquids	1-866-920-0007			X	X	X	X				X	X	X			X	X		X	
TC Energy Natural Gas	1-800-447-8066																			
Williams Bluestem Pipeline	1-855-945-5762							X					X			X		X		X
Williams Mid Continent Fractionation and Storage	1-855-945-5762												X			X	X			
Williams Overland Pass Pipeline	1-855-945-5762		X										X				X			

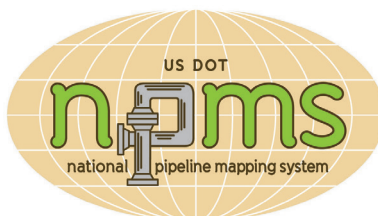


Southwest Region

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Note: The enclosed information to assist in emergency response planning is delivered by Kansas Pipeline Association on behalf of the above members. Visit the National Pipeline Mapping System at www.npms.phmsa.dot.gov to determine additional transmission companies operating in your area.



25090 W. 110th Terrace
Olathe, KS 66061
Phone: 913-254-6300
Fax: 913-254-6399
Website: www.atmosenergy.com

Atmos Energy Corporation is the nation's largest fully regulated, natural gas-only distributor of safe, clean, efficient and affordable energy. An S&P 500 company headquartered in Dallas, Atmos Energy serves more than 3 million distribution customers in over 1,400 communities across eight states and manages proprietary pipeline and storage assets, including one of the largest intrastate natural gas pipeline systems in Texas.

At Atmos Energy, our vision is to be the safest provider of natural gas services. After all, we live in the communities we serve.

Natural gas is a reliable, efficient, affordable and environmentally responsible energy source. However, our nation's existing natural gas delivery network is aging and needs to be replaced. That's why we're continuing to invest, to fortify replace and expand our system. Our spending will continue to rise as we increase the pace of pipe replacement. We're not only investing in the safety and reliability of our system, but also in the growth, economic expansion and welfare of our communities. We want everyone to enjoy the benefits of natural gas for generations to come.

Safely owning, operating and modernizing such a dynamic system requires a strong partnership between the communities we serve, the regulators who oversee our activities and the investors and creditors who

ensure we have the financial resources necessary to continue improving our system

SYSTEM SAFETY

Like most utility companies, Atmos Energy has installed pipeline over several decades and used different materials throughout our system, and some are being modernized through pipe replacement programs.

We operate our system safely and in full compliance with state and federal regulations. We do this by monitoring our system, repairing leaks, and operating an emergency hotline 24 hours a day, 7 days a week to respond and investigate reports of natural gas leaks.

EMPLOYEE SAFETY

To perform their work well, Atmos Energy personnel involved in pipeline inspection and improvement are highly trained. Field employees spend about one-fifth of their time in the classroom plus get training and education on-the-job. They also get extensive training in the safest ways to work and in keeping customers and communities safe.

PUBLIC SAFETY

We have robust safety outreach efforts through our public awareness campaigns, community involvement, and continued relationships with regulators, city leaders and first responders. We ensure our employees are trained to keep safety as our highest

24-Hour Emergency Contact: 1-866-322-8667

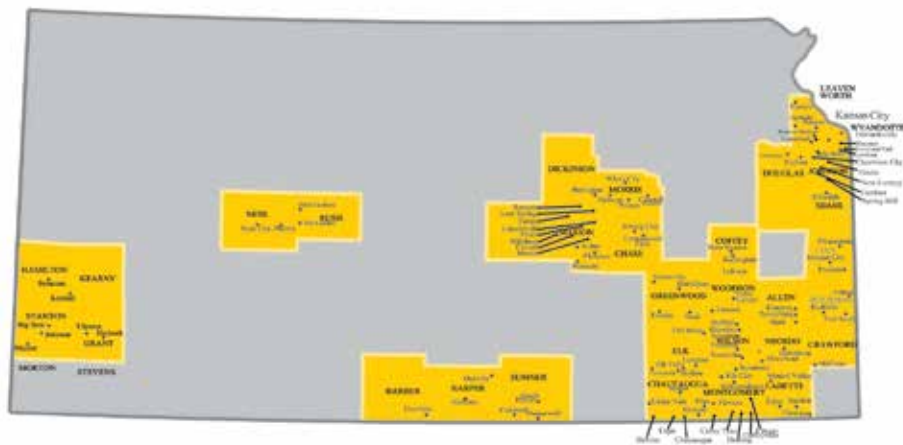
PRODUCTS/ DOT GUIDEBOOK ID#/ GUIDE#:
Natural Gas 1971 115

KANSAS COUNTIES OF OPERATION:

Allen	Leavenworth
Barber	Linn
Bourbon	Marion
Chase	Miami
Chautauqua	Montgomery
Coffey	Morris
Crawford	Morton
Dickinson	Neosho
Douglas	Ness
Elk	Rush
Grant	Stanton
Greenwood	Stevens
Hamilton	Sumner
Harper	Wilson
Jefferson	Woodson
Johnson	Wyandotte
Labette	

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

priority in every customer encounter whether it is face-to-face or through our contact centers. It's how we invest in homes, lives and generations.





2330 N Hoover Rd
Wichita, KS 67205
Website: www.blackhillsenergy.com

COMPANY PROFILE

Black Hills Energy, a subsidiary of Black Hills Corp. (NYSE: BKH), serves 118,000 natural gas customers in 67 Kansas communities. We follow a tradition of improving life with energy and a vision to be the energy partner of choice. We are a subsidiary of Black Hills Corp. (NYSE: BKH), a growth-oriented, vertically integrated energy company based in Rapid City, South Dakota. Safety is always our first priority. Black Hills Corp.'s 2,900 employees partner to produce results that are improving life with energy. For more information, please visit www.blackhillsenergy.com.

COMMITMENT TO SAFETY, HEALTH & ENVIRONMENT

Safety Policy

Black Hill Energy is committed to providing customers with safe, reliable natural gas service by providing an environment that is free from recognized hazards for employees and customers.

Black Hills Energy employees perform daily proactive tasks to ensure the integrity of its pipeline system. Integrity Management Plans are implemented to further protect zones defined by pipeline regulators as High Consequence Areas. These areas are located near high-pressure natural gas pipelines and can include – but aren't limited to – playgrounds, hospitals, schools, daycares, and retirement and correctional facilities.

Emergency Response

Black Hills Energy has detailed emergency procedures for responding to a natural gas emergency with a priority to protect life first, then property and the environment. Our procedures and abilities to respond to an emergency are exchanged with local emergency officials so that we can engage in mutual assistance to minimize hazards

to life or property. To view a list of gas operators and maps of the transmission pipelines in a community, go to the National Pipeline Mapping System web site, www.npms.phmsa.dot.gov. BHE's Emergency contact number is 1-800-694-8989.

Black Hills Energy seeks opportunities to educate the public about natural gas. The company also partners with volunteer fire departments to provide hands-on training exercises for firefighters to practice techniques to effectively extinguish natural gas fueled fires under controlled circumstances.

Public Awareness Program

Black Hills Energy's Public Awareness Program was developed under the guidance of API RP1162 and is intended to educate stakeholder audiences along the geographic areas in which the company has distribution or transmission facilities – this includes customers, affected public along both the distribution and transmission pipelines, local and state emergency response and planning agencies, local public officials and governing councils, and excavators. Educating stakeholders can help prevent pipeline emergencies and can also help recognize, report and respond to a suspected pipeline emergency in a timely manner.

Additional information is available online.

- Black Hills Energy's home page www.blackhillsenergy.com
- List of natural gas service operators and maps of transmission pipeline systems: www.npms.phmsa.dot.gov

Emergency Contact: 1-800-694-8989

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:
Natural Gas 1971 115

KANSAS COUNTIES OF OPERATION:

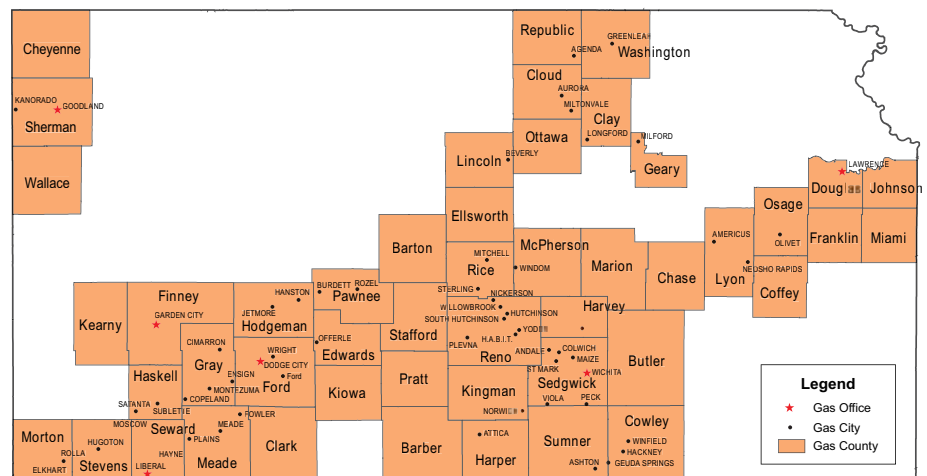
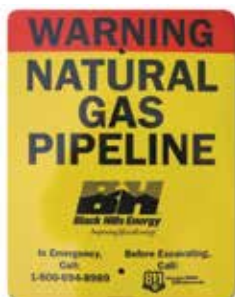
Cheyenne	McPherson
Clay	Meade
Cloud	Miami
Cowley	Morton
Douglas	Osage
Edwards	Ottawa
Finney	Pawnee
Ford	Reno
Franklin	Republic
Geary	Rice
Gray	Sedgwick
Harper	Seward
Harvey	Sherman
Haskell	Stevens
Hodgeman	Sumner
Kingman	Wallace
Lyon	Washington

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

- Excavation practices near underground facilities: www.commongroundalliance.com



**Know what's below.
Call before you dig.**





Farmer-owned with global connections

2000 S. Main
McPherson, KS 67460
Non-Emergency Number: (855)-4-CHSPIPE
Email: publicawareness@chsinc.com
Website: www.chspipelines.com

CHS Inc. is the nations largest farmer-owned cooperative, which accesses crude oil from our two refineries and moves refined fuel products to the market place via nearly 2,000+ miles of pipeline and 11 terminals in ND, MT, NE, KS, OK, WI and TX.

CHS McPherson Refinery Inc. Pipelines



CHS operates 5 five distinct lines that transport various refined products to and from the refinery and underground storage caverns in Conway, KS. These five lines carry gasoline, NGL's, butane, propane and pentane. These products are often referred to as highly volatile liquids or HVL's.

In addition to the refinery and products pipeline, CHS's facilities include a regional office at McPherson and a crude oil trucking fleet of approximately 80 transports which operate in western Kansas. CHS also owns 100% of Jayhawk Pipeline, L.L.C., 100% of Kaw Pipe Line Company and 50% of Osage Pipe Line L.L.C.

Jayhawk Pipeline, L.L.C.



Formed in 1957, Jayhawk Pipeline is 100% owned by CHS Inc. based out of McPherson, Kansas. Jayhawk currently transports approximately 140,000 barrels per day of crude oil in both intrastate and interstate commerce, and is connected to all the major crude oil pipelines in Kansas. Jayhawk has over 70 employees. Jayhawk Pipeline, LLC operates nearly 800 miles of regulated pipeline throughout Kansas, Nebraska, Oklahoma and Texas and is the operator of Kaw Pipe Line Company and the Hooker-Clawson Pipeline.

Kaw Pipe Line Company

Kaw Pipe Line Company is 100% owned by the CHS McPherson Refinery Inc. and is operated by Jayhawk Pipeline, L.L.C.. Kaw includes pipeline located in 5 Kansas counties. Kaw receives crude oil from various truck unloading stations throughout central and North Central Kansas. Crude oil received is transported to delivery points near Chase and Lyons, Kansas.

COMMITMENT TO SAFETY, HEALTH & ENVIRONMENT

CHS Inc. is committed to participation in public education and furthering the general awareness of benefits and potential hazards surrounding pipeline operations in your community. Our companies highest priority is the transportation of crude oil in a reliable, safe and environmentally friendly manner. CHS Inc. is dedicated to these goals and follows all applicable pipeline rules and regulations, as well as industry best practices. Ensuring the mechanical integrity and utilizing safety management systems on its pipeline systems is an important ingredient toward accomplishing those goals.

To this end, CHS Inc. has created and implemented a comprehensive pipeline Integrity Management Plan (IMP), Damage Prevention Plan (DP), Spill Response Plan (SRP), Safety Management System (SMS) and Public Awareness Program (PAP). Through these efforts, the operator enhances public safety, further protects the environment, and reduces the risk of third-party damage to the pipeline system. The company provides the needed support, resources, and funding required to accomplish these goals. For additional information, contact CHS Inc. via the above website, phone number, or email.

24-Hour Emergency Contact:

CHS McPherson Refinery Inc. Pipeline
1-844-721-6611

Jayhawk Pipeline, L.L.C.
1-888-542-9575

Kaw Pipe Line Company
1-888-542-9575

PRODUCTS/ DOT GUIDEBOOK ID#/ GUIDE#:

Butane	1075	115
Crude Oil	1267	128
Diesel Fuel	1202/1993	128
Fuel Oil #1 & #2	1202	128
Gasoline	1203	128
Natural Gas	1971	115
NGL's	1075	11
Pentane	1265	128
Propane	1075/1978	115

KANSAS

COUNTIES OF OPERATION:

CHS McPherson Refinery Inc.

McPherson

Jayhawk Pipeline, L.L.C.

Barton	Osborne
Butler	Phillips
Clark	Pratt
Comanche	Rice
Ellsworth	Rooks
Harvey	Russell
Haskell	Sedgwick
Kiowa	Seward
McPherson	Stafford
Meade	Stevens
Morton	Trego
Ness	

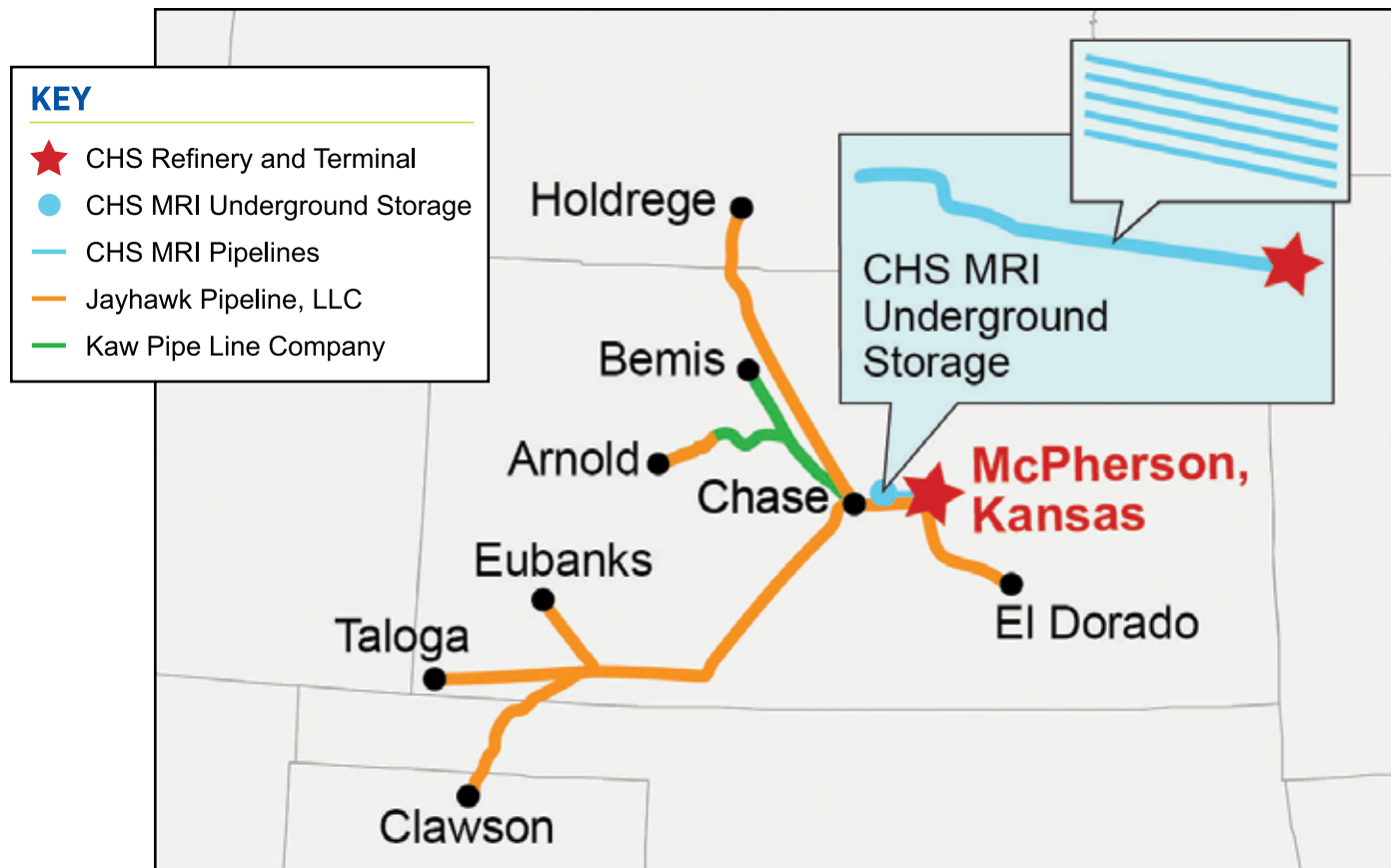
Kaw Pipe Line Company

Barton	Russell
Ellis	Trego
Rice	

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.



2000 S. Main
McPherson, KS 67460
Non-Emergency Number: (855)-4-CHSPIPE
Email: publicawareness@chsinc.com
Website: www.chspipelines.com





Chanute
a TRADITION of INNOVATION

COMMITMENT TO SAFETY, HEALTH & ENVIRONMENT

In support of their commitment to public awareness, damage Prevention, and safety, some Kansas Municipalities have joined the Kansas Pipeline Association (KPA) program. Typically, these pipeline operators transport natural

gas through distribution lines providing natural gas to service their customers. These operators odorize their natural gas products with an odorant. Typical operating pressures for municipalities range from ounces to approximately 60 psi. while some municipalities may have lines with pressures exceeding 60 psi.

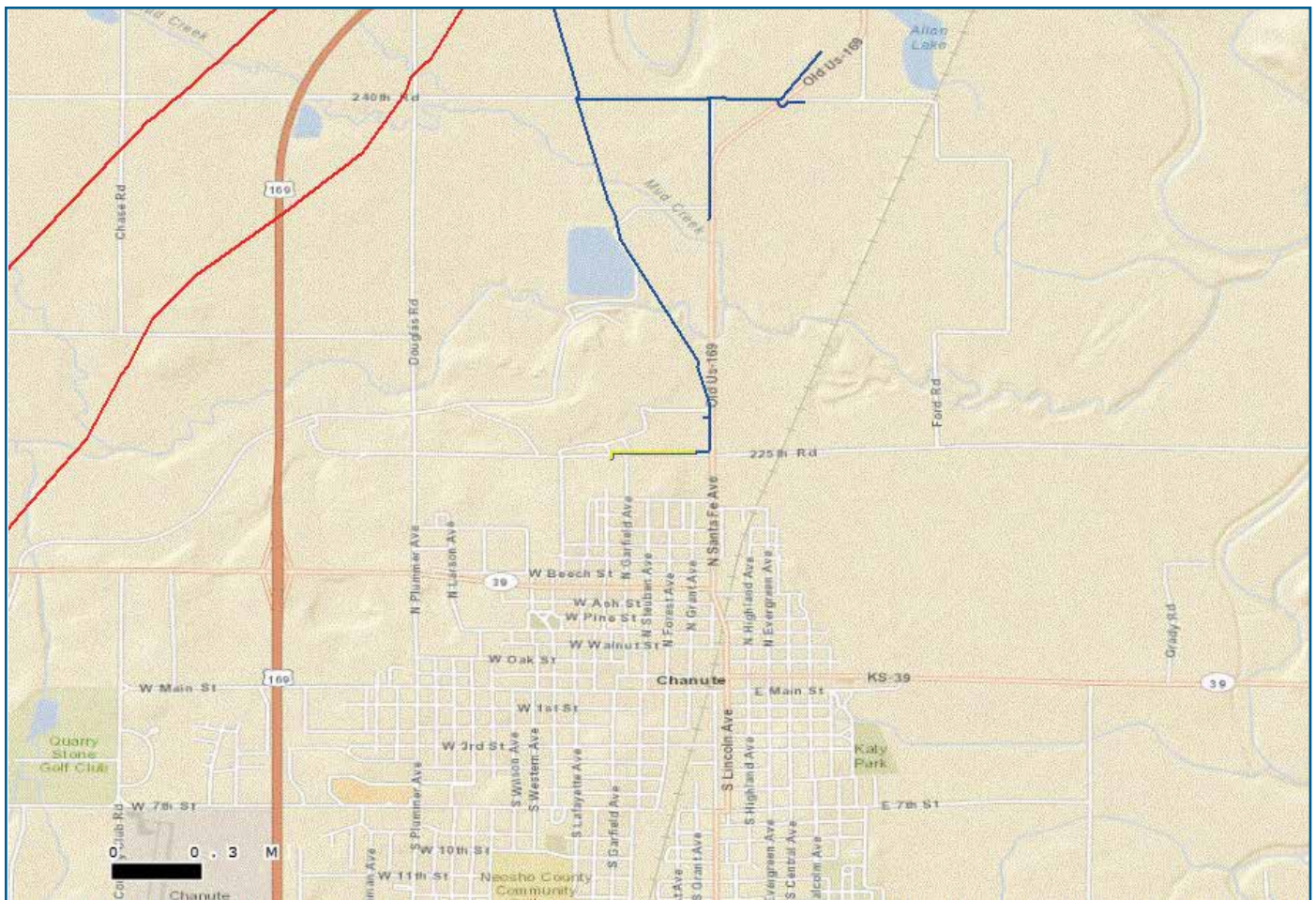
24-Hour Emergency Contact:
1-620-431-5270

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:
Natural Gas 1971 115

KANSAS
COUNTIES OF OPERATION:

Neosho

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.





The City of Lyons operates approximately 34 miles of natural gas pipeline in Rice county.

COMMITMENT TO SAFETY, HEALTH & ENVIRONMENT

In support of their commitment to public awareness, damage Prevention, and safety, some Kansas Municipalities have joined the Kansas Pipeline Association (KPA) program. Typically, these pipeline operators transport natural gas through distribution lines providing natural gas to service their customers. These operators odorize their natural gas products with an odorant. Typical operating pressures for municipalities range from ounces to approximately 60 psi. while some municipalities may have lines with pressures exceeding 60 psi

ABOUT NATURAL GAS

According to statistics from the National Transportation Safety Board, natural gas pipelines and mains are the safest method of transportation. Natural gas provides about 24 percent of all the energy used in the United States. Gas utilities serve more than 60 million residential, commercial and industrial customers through underground pipelines.

Natural gas is a naturally abundant gas found deep beneath the earth's surface. It is odorless and colorless and produces very few emissions. It is also considered the cleanest fuel because of its clean-burning qualities.

WHAT ARE THE SIGNS OF A NATURAL GAS PIPELINE LEAK?

- Blowing or hissing sound
- Dust blowing from a hole in the ground
- Continuous bubbling in wet or flooded areas
- Gaseous or hydrocarbon odor
- Dead or discolored vegetation in a green area
- Flames, if a leak has ignited

WHAT SHOULD I DO IF I SUSPECT A PIPELINE LEAK?

Your personal safety should be your first concern:

- Evacuate the area and prevent anyone from entering
- Abandon any equipment being used near the area
- Avoid any open flames
- Avoid introducing any sources of ignition to the area (such as cell phones, pagers, 2-way radios)
- Do not start/turn off motor vehicles/ electrical equipment
- Call 24-HR Emergency Response (Black Hills Energy) at 800-694-8989 or 911
- Notify the pipeline company
- Do not attempt to extinguish a natural gas fire
- Do not attempt to operate any pipeline valves

PIPELINE SAFETY

System failures occur infrequently along the nation's network of interstate natural gas pipeline facilities, and many of these are caused by damage from others digging near the pipeline. We watch for unauthorized digging, but we request your help too.

We participate in One-Call Centers and strongly encourage those who are going to dig to call their state One-Call Center or the 811 "Call before you dig" hotline to allow pipeline companies and owners of other buried utilities a chance to mark the underground facilities in the area before digging begins.

PIPELINE LOCATION AND MARKERS

Pipeline markers are used to indicate the approximate location of a natural gas pipeline and to provide contact information. Aerial patrol planes also use the markers to identify the pipeline route. Markers should never be removed or relocated by anyone

24-Hour Emergency Contact: 1-800-694-8989

PRODUCTS/ DOT GUIDEBOOK ID#/ GUIDE#:

Natural Gas 1971 115

KANSAS

COUNTIES OF OPERATION:

Rice

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

CITY OF LYONS CONTACT INFORMATION

201 W Main
Lyons, KS 67554

Ed Truelove - City Administrator
Phone: 620-257-2320

Jared Jones - Public Works Director
Phone: 620-257-2320



PO Box 3516
411 NE Washington Blvd.
Bartlesville, OK 74006
Website: www.coffeyvillecrude.com

COMPANY PROFILE

Coffeyville Resources Crude Transportation operates its gathering and pipeline trucking systems located in Bartlesville and Pauls Valley, Oklahoma, and Iola, Plainville and Winfield, Kansas. The gathering system is comprised of approximately 950 miles of owned, leased, and joint venture pipelines and associated tankage and truck transportation facilities. The gathering business purchases crude from independent crude oil producers in Kansas, Missouri, Nebraska, Oklahoma, and Texas.

For more information, please visit www.CVRenergy.com.



CALL BEFORE YOU DIG

Statistics indicate that damage from excavation-related activities is a leading cause of pipeline accidents. If you are a homeowner, farmer, excavator, or developer, we need your help in preventing pipeline emergencies.

The Plan is Simple

1. Call your state's One Call Center at least two working days before excavation is scheduled to begin.
2. Wait the required amount of time.
3. One of our trained technicians will mark the location of the pipeline at no cost to you.
4. Respect the line markers.
5. Dig with care.

SIGNS OF A PETROLEUM PRODUCT RELEASE

- Sight** - A pool of liquid on the ground near a pipeline, a rainbow sheen on water, a dense white cloud or fog over a pipeline, or discolored vegetation.
- Sound** - An unusual noise coming from the pipeline, like a hissing or roaring sound.
- Smell** - An unusual chemical odor, such as gas or oil.

WHAT TO DO IF A LEAK OCCURS

- Leave the leak area immediately.
- Do not touch, breathe, or make contact with leaking liquids.
- Do not light a match, start an engine, use a telephone, switch light or do anything that may create a spark.
- From a safe location, call 9-1-1 or your local emergency response number and the pipeline company, 1-800-982-4112. Give your name, phone number, a description of the leak and its location.
- Warn others to stay away.
- Do not drive into a leak or vapor cloud area.

24-Hour Emergency Contact: 1-800-982-4112

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:
Crude Oil 1267 128

KANSAS COUNTIES OF OPERATION:

Allen	Neosho
Butler	Phillips
Chautauqua	Rooks
Cowley	Wilson
Montgomery	

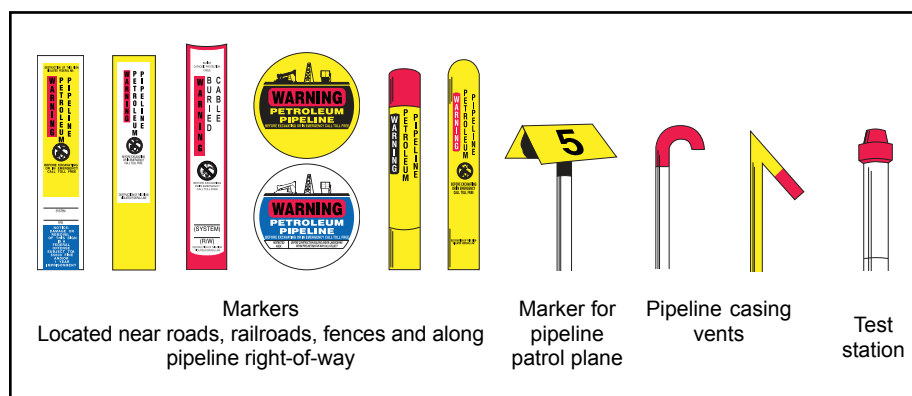
Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

PIPELINE MARKERS

The U.S Department of Transportation (DOT) requires the use of signs to indicate the location of underground pipelines. Markers like these are located at road, railroad, and navigable waterway crossings. Markers are also posted along the pipeline right-of-way.

The markers display:

- The material transported in the pipeline
- The name of the pipeline operator
- A telephone number where the operator can be reached in the event of an emergency





DCP Midstream
 2331 CityWest Blvd, HQ-S820-03
 Houston, TX 77042
 (713) 735-3600
 Website: www.dcpmidstream.com

The link between natural gas exploration and production and the end use customer is known as the midstream segment of the natural gas industry. DCP Midstream leads the midstream segment as one of the nation's largest natural gas gatherers, the largest natural gas liquids (NGLs) producer, and one of the largest NGL marketers.

COMMITMENT TO SAFETY, HEALTH AND ENVIRONMENT

At DCP Midstream, we design, install, test, operate and maintain our pipelines to meet or exceed regulatory standards. We test our pipelines to withstand a higher pressure than encountered in daily use. Our employees receive regular, thorough training on how to safely operate and maintain our pipeline systems and respond to the unexpected incidents. As part of our ongoing damage prevention program, we patrol our pipeline right-of-way corridors to spot potential safety problems, such as possible leak or unauthorized construction. DCP Midstream performs

preventive maintenance activities to ensure the safety and integrity of our lines is maintained.

DCP Midstream is committed to the safe operation of our pipelines. We conduct periodic preparedness training and outreach to local officials and emergency responders.

Copies of the DCP Midstream Emergency Response Plan(s) are available upon request by contacting the Corporate office listed on the top of this page.

ONLINE TRAINING AVAILABLE

The American Petroleum Institute (API) and the Association of Oil Pipelines (AOPL) have developed a **FREE** online training portal designed to provide training on emergency response techniques for hazardous liquids or natural gas pipeline incidents. Please visit www.nasfm-training.org/pipeline to register.



Emergency Contact:

1-800-435-1679 or 1-888-204-1781

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:

Natural Gas	1971	115
Natural Gas Liquids	1075	115

KANSAS

COUNTIES OF OPERATION:

Barton	Grant	Seward
Clark	Haskell	Sherman
Comanche	Kearny	Stevens
Ellis	Kiowa	Thomas
Ellsworth	Logan	Trego
Ford	Meade	
Gove	Russell	

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

PRODUCTS TRANSPORTED

Product: Natural Gas

Leak Type: Gas

Vapors: Lighter than air and will generally rise and dissipate. May gather in a confined space and travel to a source of ignition.

Product Hazards: Will be easily ignited by heat, sparks or flames and will form explosive mixtures with air. Vapors may cause dizziness or asphyxiation without warning and may be toxic if inhaled at high concentrations. Contact with gas or liquefied gas may cause burns, severe injury and/or frostbite.

Product: Natural Gas Liquids

Leak Type: Gas

Vapors: Initially heavier than air, spread along ground and may travel to source of ignition and flash back. Product is colorless, tasteless and odorless.

Product Hazards: Will be easily ignited by heat, sparks or flames and will form explosive mixtures with air. Vapors may cause dizziness or asphyxiation without warning and may be toxic if inhaled at high concentrations. Contact with gas or liquefied gas may cause burns, severe injury and/or frostbite. Fire may produce irritating and/or toxic gases.



1300 Main St.
Houston, TX 77002
Phone: 713-989-7000
Website: www.energytransfer.com

Energy Transfer Partners, a Texas-based energy company founded in 1995 as a small intrastate natural gas pipeline company, is now one of the largest and most diversified master limited partnerships in the United States.

Strategically positioned in all of the major U.S. production basins, the company owns and operates a geographically diverse portfolio of energy assets, including midstream, intrastate and interstate transportation and storage assets. Energy Transfer operates nearly 125,000 miles of natural gas, crude oil, natural gas liquids and refined products pipelines and related facilities, including terminalling, storage, fractionation, blending and various acquisition and marketing assets in 41 states.

For more information about local operations of **Enable**, please contact us:

Cowley and Sumner Counties:

Jeff Avery
Operations Manager
405-576-8229 (w), 405-697-9349 (m)
jeffrey.avery@energytransfer.com



**24-Hour Emergency Contact:
1-800-474-1954**

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:
Natural Gas 1971 115

**KANSAS
COUNTIES OF OPERATION:**

Cowley Sumner

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.





915 N. Eldridge Parkway, Suite 1100
Houston, TX 77079
Public Awareness: 1-888-293-7867
Email: uspublicawareness@enbridge.com
Website: www.enbridge.com

Life takes energy: to heat our homes, to feed our families, to fuel our vehicles. Enbridge connects people to the energy they need to help fuel their quality of life.

In the United States alone, more than two million miles of pipelines deliver petroleum and natural gas products. Every year, Enbridge invests in the latest technology and training to meet the high environmental and safety standards our neighbors expect, and to keep pipelines the safest, most efficient and most reliable way to move energy resources.

Call or click before you dig

811 and **ClickBeforeYouDig.com** are free services designed to keep you safe when digging. Calling or clicking is always the safest option anytime you are moving dirt. At least two to three business days before your project (depending on state law), simply call 811 or visit **www.ClickBeforeYouDig.com** with important details about your work, including:

- The type of work you'll be doing and a description of the area
- The date and time your project will begin
- Your worksite's address, the road on which it's located and the nearest intersection
- Driving directions or GPS coordinates
- Within two to three business days, professional locators will mark underground utility lines—including pipelines (marked with yellow flags or paint)—so you can work around them, saving yourself from possible injury or property damage.

Pipeline location and markers

All pipeline markers provide the name of the pipeline operator, product being transported and a telephone number for reporting pipeline emergencies. These markers should never be used as a

Emergency responder education program

Enbridge offers a free online education program to provide public safety and local public officials with the information needed to safely and effectively respond to a pipeline emergency. This program focuses on information specific to the disciplines of firefighting, law enforcement, 9-1-1 dispatch, emergency medical services, emergency management and local government. Additionally, course completion may count for state-level continuing education (CE) credits. Register for the training at **www.mypipelinetraining.com**.

reference for a pipeline's exact location. You can also find out where other companies' pipelines are in your area by going to the National Pipeline Mapping System website at **<https://www.npms.phmsa.dot.gov>**.



What if there is an emergency?

Enbridge facilities are designed to be quickly isolated with block valves for rapid containment in the event of an emergency. We have pre-arranged plans with local emergency personnel and periodically conduct emergency drills with these groups.

24-Hour Emergency Contact: 1-800-858-5253

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:		
Crude Oil	1267	128

KANSAS COUNTIES OF OPERATION:

Allen	Marshall
Bourbon	Montgomery
Brown	Nemaha
Chautauqua	Neosho
Doniphan	Wilson
Linn	

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

Incident Command System

Enbridge utilizes the Incident Command System (ICS) for managing a response to an emergency.

The ICS organizational structure is designed to coordinate with other responding agencies and to include those agencies inside a unified Command Post for a coordinated response.

In the event of an emergency

1. Abandon any equipment being used in or near the area, moving upwind of the product release
2. Warn others to stay away
3. **If emergency services have not been notified, call 911 and then call the 24-hour pipeline emergency number for your area**
4. Follow instructions given to you by local emergency responders and Enbridge

Actions Specific to Emergency Officials

1. Secure the site and determine a plan to evacuate or shelter in place.
2. Monitor for hazardous atmospheres
3. Control and redirect traffic as needed
4. Provide immediate access to Enbridge Pipeline representatives
5. Implement your local emergency plan



1300 Main St.
Houston, TX 77002
Phone: 713-989-7000
Website: www.energytransfer.com

Energy Transfer, a Texas-based energy company founded in 1995 as a small intrastate natural gas pipeline company, is now one of the largest and most diversified master limited partnerships in the United States.

Strategically positioned in all of the major U.S. production basins, the company owns and operates a geographically diverse portfolio of energy assets, including midstream, intrastate and interstate transportation and storage assets. Energy Transfer operates nearly 125,000 miles of natural gas, crude oil, natural gas liquids and refined products pipelines and related facilities, including terminalling, storage, fractionation, blending and various acquisition and marketing assets in 41 states.

Energy Transfer operates approximately 28,400 miles of natural gas pipelines, 4,800 miles of natural gas liquids pipelines, 10,770 miles of crude oil pipelines, 2,200 miles of refined products and three storage facilities. Our midstream assets include approximately 40,000 miles of natural gas gathering pipelines and more than 62 processing, treating and conditioning plants.

For more information about local operations of **Energy Transfer**, please contact us:

Finney, Grant, Hamilton, Haskell, Kearny, Meade, Morton, Seward and Stanton counties:

Josh Messenger
Operations Manager
620-315-8253 (w), 620-640-5124 (m)
joshua.messenger@energytransfer.com

Barber, Barton, Butler, Chase, Coffey, Edwards, Ellsworth, Greenwood, Harper, Harvey, Hodgeman, Kingman, Kiowa, Lane, Logan, Lyon, Ness, Pawnee, Pratt, Reno, Rice, Rush, Russell, Scott, Sedgwick, Sherman, Stafford, Sumner, Wallace, and Woodson counties:

Raul Delgadillo
Operations Manager
720-613-7003 (w), 303-453-9424 (m)
raul.delgadillo@energytransfer.com

24-Hour Emergency Contact:

NGL: 1-877-839-7473

Crude: 1-800-753-5531

Natural Gas: 1-800-375-5702

or 1-877-404-2730

PRODUCTS / DOT GUIDEBOOK ID# / GUIDE#:

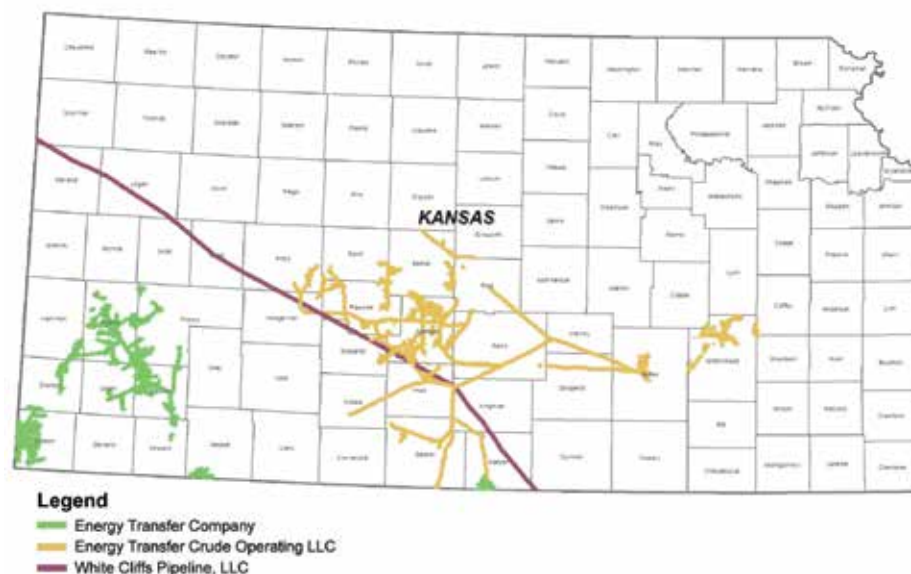
Crude Oil	1267	128
Natural Gas	1971	115
Natural Gas Liquids	1075	115

KANSAS

COUNTIES OF OPERATION:

Barber	Lyon
Barton	Meade
Butler	Morton
Chase	Ness
Coffey	Pawnee
Edwards	Pratt
Ellsworth	Reno
Finney	Rice
Grant	Rush
Greenwood	Russell
Hamilton	Scott
Harper	Sedgwick
Harvey	Seward
Haskell	Sherman
Hodgeman	Stafford
Kearny	Stanton
Kingman	Sumner
Kiowa	Wallace
Lane	Woodson
Logan	

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.





1100 Louisiana
Houston, TX 77002
Public Awareness: 1-888-806-8152
Email: publicawareness@eprod.com
Website: www.enterpriseproducts.com

COMPANY INFORMATION, ASSETS AND PRODUCTS TRANSPORTED

Enterprise Products Partners L.P. is a leading North American provider of midstream energy services to producers and consumers of natural gas, NGLs, crude oil, refined products and petrochemicals. Enterprise transports natural gas, NGLs, petrochemicals and crude oil through a network of pipelines throughout the United States.

The Mid-America Pipeline (MAPL) System extends over 9,000 miles of Natural Gas Liquids pipelines through 13 states. In Kansas, it operates approximately 1,480 miles throughout the state and transports Natural Gas, Iso-Butane, Normal Butane, Propane, Y-Grade (Demethanized Mix), Ethane-Propane Mix (E/P), Y-Grade, Refined Grade Butane, Naptha, Unleaded, Diesel and Natural Gasoline. For additional information on Enterprise, visit www.enterpriseproducts.com.

LOCATING ENTERPRISE PIPELINES – PIPELINE VIEWER TOOL

To find more information regarding location and products transported in our pipelines within one (1) mile of a specific address, visit our website at: www.enterpriseproducts.com/pipelineviewer. Please note the asset map and pipeline viewer tool are for informational purposes only.

You can also find out where other companies' pipelines are in your area by going to the National Pipeline Mapping System website at www.npms.phmsa.dot.gov.

EMERGENCY RESPONSE PLAN

An Emergency Response Plan is developed for each pipeline facility to contain, control and mitigate the various types of emergency conditions/situations that could occur at one of our facilities. For more information regarding Enterprise Products emergency response plans and procedures, contact us at publicawareness@eprod.com.

EMERGENCY RESPONSE CAPABILITIES

The Company's qualified personnel are trained in safe operations and emergency response activities and participate in exercises reflecting various types of emergency scenarios and environmental sensitivities. The Company utilizes the First Responder/ Emergency Response Team concept to handle emergency incidents at its facilities. Employees receive hands on training in fire fighting, hazardous material spill response and rescue/ medical/first aid training. In addition, we maintain a well trained team of employees from various Company locations as members of the Corporate Emergency Organization. This team, as well as an array of emergency response equipment (including, but not limited to, cell phones, fire extinguisher, supplied breathing air, and air monitoring equipment), can be mobilized and deployed to assist in handling emergency situations that may occur at a Company facility or pipeline location.

Enterprise Products utilizes its 24-hour/365 day a year, Pipeline Operations Control Center (888-883-6308) as a hub of communications in emergency response situations. Our manned control center monitors the flow, pressure, temperatures, and other conditions throughout the pipeline systems and is an integral part of our communication during emergency situations.

ENTERPRISE PRODUCTS' RESPONSE IN AN EMERGENCY

- We will immediately dispatch personnel to help handle the emergency at the site.
- We will provide information to public safety officials to aid in their response to the emergency.
- We will take necessary operating actions such as closing and opening valves to minimize the impact of the leak.

24-Hour Emergency Contact:

1-888-883-6308

PRODUCTS/ DOT GUIDEBOOK ID#/ GUIDE#:

Butane	1011	115
Ethane	1035	115
Ethane Propane Mix	1961	115
Iso-Butane	1075	115
Natural Gas	1971	115
Natural Gasoline	1203	128
Naptha	1334	133
Propane	1075	115
Unleaded & Diesel	1202	128
Refined Grade Butane	1075	115
Y-Grade		
Demethanized Mix	1954	115

KANSAS

COUNTIES OF OPERATION:

Butler	McPherson
Chautauqua	Meade
Clark	Montgomery
Clay	Morris
Comanche	Osage
Cowley	Ottawa
Dickinson	Pratt
Douglas	Reno
Ellsworth	Rice
Grant	Saline
Harvey	Sedgwick
Haskell	Seward
Jefferson	Shawnee
Kiowa	Wabaunsee
Leavenworth	Washington
Marion	

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.



- Public safety personnel and others unfamiliar with the pipeline should not attempt to operate any of the valves on the pipeline, unless instructed to do so by Enterprise Products personnel. Improper operation of the pipeline valves could make the situation worse and cause other accidents to happen.

INCIDENT COMMAND SYSTEM

Enterprise Products utilizes an expandable Incident Command System. Depending upon the size and complexity of an incident, additional Company or contract personnel may be added as needed. Additional federal, state or local agencies may be integrated into the Incident Command System by utilizing a Unified Command Structure.

SPILL RESPONSE EQUIPMENT CAPABILITIES

We maintain emergency response equipment at some of our facilities. We also have agreements with various oil spill response organizations to provide the appropriate level of response with spill response equipment including trailers containing spill booms, sorbent

materials, boats, motors, hand tools, power tools, pumps, hoses, personal protective equipment, first aid and miscellaneous supplies. These companies also have expert personnel trained in emergency response and cleanup methods.

CONTACTS

Jordan Schroader

1426 Fifth Ave.
McPherson, KS 67460
Phone: 620-834-2028
jschroader@eprod.com

Counties of responsibility: Butler, Chautauqua, Clark, Comanche, Cowley, Dickinson, Ellsworth, Harvey, Kiowa, Marion, McPherson, Meade, Montgomery, Ottawa, Pratt, Reno, Rice, Saline, Sedgwick

Eric Randall

18805 Highway 6
Greenwood, NE 68366
Phone: 402-789-8802
Email: erandall@eprod.com

Counties of responsibility: Clay, Washington

Robert Hornung

1015 North Jefferson
Kearney, MO 64060
Phone: 816-858-7802
Email: Rhornug@eprod.com

Counties of responsibility: Douglas, Jefferson, Leavenworth, Morris, Osage, Shawnee, Wabaunsee

Roger Belveal

2645 County Road CC
Skellytown, TX 79080
Phone: 806-848-2603
Email: rbelveal@eprod.com

Counties of responsibility: Grant, Haskell, Seward



P.O. Box 418679
 Kansas City, MO 64141-9679
 Phone: 816-556-2200
 Website: www.evergy.com

ABOUT EVERGY, INC.

Evergy, Inc. (NYSE: EVRG), formerly KCP&L & Westar Energy, serves approximately 1.6 million customers in Kansas and Missouri. We generate nearly half the power we provide to homes and businesses with emission-free sources. We support our local communities where we live and work, and strive to meet the needs of customers through energy savings and innovative solutions.

COMMITMENT TO SAFETY, HEALTH & ENVIRONMENT

Evergy is committed to safety for our customers and employees. We have numerous programs dedicated to inform and educate our customers and employees. Evergy is aware of the consequences generating power can have on our air, water and the many types of life that depend on both. Because of this, we helped pioneer efforts to reduce the environmental impact of electric generation. We follow all appropriate regulations and procedures that apply to these 3.2 miles of gas line that fall under the regulatory oversight of the Kansas Corporation Commission and other regulatory agencies. Please note that this gas line is used solely by Evergy therefore no other customers are supplied by

this gas line. We have the following mechanisms, but not limited to, in place to ensure adequate protection of our gas line:

- Cathodic Protection
- Visual Inspections by employees and independent third party
- Member of the Kansas "One-Call" organization
- Member of Kansas Pipeline Association (KPA)
- Ongoing training and certification of employees and contractors that come into contact with pipeline
- Control valve that can be remotely operated 24 hours a day, 7 days a week
- Emergency plan in place that is initiated in case of an incident. This plan is also utilized for day-to-day operations and maintenance.

24-Hour Emergency Contact: 1-816-654-1499

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:

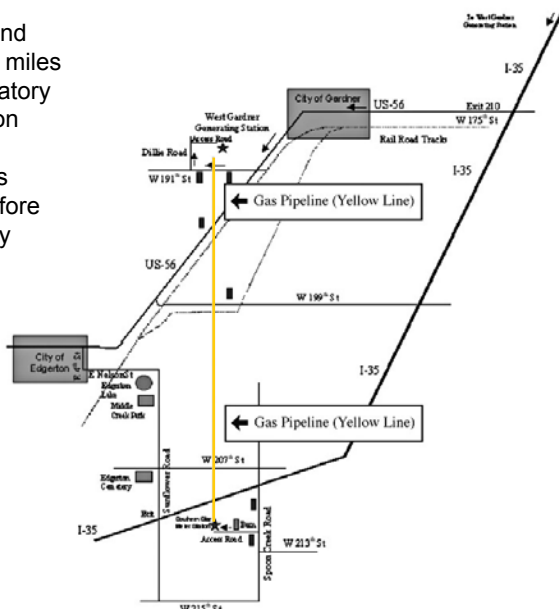
Natural Gas 1971 115
 Used solely by Evergy. No retail customers attached.

KANSAS COUNTIES OF OPERATION:

Johnson

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

**DANGER
 NATURAL GAS
 PIPELINE
 EVERGY
 816-654-1499**





6601 S. Ridge Road
Haysville, KS 67060
Phone: (316) 522-8181
Website: www.evonik.com

Evonik is one of the world's leading specialty chemicals companies. The central elements of our strategy for sustained value creation are profitable growth, efficiency and values. Around 80 percent of sales come from market-leading positions, which we are systematically expanding. We concentrate on high-growth megatrends, especially health, nutrition, resource efficiency and globalization. For more information visit www.evonik.com.

At Evonik, safety is our #1 priority. We believe safety is no accident, so we monitor our facilities 24-7. Evonik has established safety standards that meet and/or exceed regulatory requirements.

IN THE EVENT OF A SUSPECTED GAS EMERGENCY:

Isolate the area and restrict entry. Only trained emergency response personnel and designated Evonik employees should be in the vicinity.

Establish isolation zones. Based upon measurements from combustible gas indicator instruments, seal off the area to any persons other than trained personnel and designated Evonik employees. Gas clouds, odor or lack thereof is not sufficient to establish safe zones.

Avoid creating sparks. Potential ignition sources for Hydrogen includes static electricity, electrical motors, firearms, non-explosion-proof flashlights or tools, and any open flame or sparks. Do not light a match, start an engine, use a cellular/mobile/telephone, switch lights on and off or do ANYTHING that may create even the slightest spark.

Make the operator aware of the situation, immediately. Check the posted right-of-way or station signs to find out what company operates the pipeline and how to contact the operator and any other operators in the area.

Let the escaping gas burn if it is on fire. Attempting to extinguish a gas fire may result in a secondary explosion. If necessary, provide cooling for nearby exposures that are threatened by the fire.

Let Evonik personnel cut off the fuel supply. DO NOT operate the valves yourself.

Avoid forced ventilation of structures and excavations. Forced ventilation can actually increase the possibility of a flammable atmosphere.

PHYSICAL AND CHEMICAL PROPERTIES OF HYDROGEN

Form : Compressed gas

Color : Colorless gas

Odor : None

Molecular Weight : 2.02 g/mol

Relative vapor density : 0.07 (air = 1)

Relative density : 0.07 (water = 1)

Density : 0.006 lb/ft³ (0.0001 g/cm³) at 70 °F (21 °C)

Specific Volume : 191.97 ft³/lb (11.9830 m³/kg) at 70 °F (21 °C)

Boiling point/range : -423 °F (-252.9 °C)

Critical temperature : -400 °F (-240 °C)

Melting point/range : -435 °F (-259.2 °C)

Autoignition temperature : 1,040 °F (560 °C)

Upper flammability limit : 75 %(V)

Lower flammability limit : 4 %(V)

Water solubility : 0.0016 g/l

24-Hour Emergency Contact: 1-316-522-8181

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:		
Hydrogen	1049	115

KANSAS COUNTIES OF OPERATION:

Sedgwick

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

EMERGENCY OVERVIEW OF HYDROGEN

- Burns with an invisible flame.
- High pressure gas.
- Can cause rapid suffocation.
- Extremely flammable.
- May form explosive mixtures in air.
- Immediate fire and explosion hazard exists when mixed with air at concentrations exceeding the lower flammability limit (LFL).
- High concentrations that can cause rapid suffocation are within the flammable range and should not be entered.
- Avoid breathing gas.
- Self contained breathing apparatus (SCBA) may be required.





City of Alma
City of Auburn
City of Burlingame
City of Eskridge
City of Harveyville

City of Havensville
City of McFarland
City of Osage City
City of Reading

The City of Alma, City of Auburn, City of Burlingame, City of Eskridge, City of Harveyville, City of Havensville, City of McFarland, City of Osage City, and the City of Reading have joined together to form the Flint Hills Gas Group. In total these Municipalities operate approximately 224 miles of pipeline in Lyon, Osage, Pottawatomie, Shawnee and Wabaunsee Counties.

COMMITMENT TO SAFETY, HEALTH & ENVIRONMENT

In support of their commitment to public awareness, damage prevention, and safety, these Kansas Municipalities have joined the Kansas Pipeline Association (KPA) program. Typically these pipeline operators transport natural gas through distribution lines providing natural gas to service their customers. These operators odorize their natural gas with an odorant. Typical operating pressures for municipalities range from ounces to approximately 60 psi while some may have lines with pressures exceeding 60 psi.



CALL BEFORE YOU DIG

- Call Kansas One Call before you begin any excavation
- Wait the required amount of time
- One of our trained technicians will mark the location of our lines at no cost to you
- Respect the line marks
- Dig with care

SIGNS OF A NATURAL GAS LEAK

- Blowing or hissing sound
- Dust blowing from a hole in the ground
- Bubbling in wet or flooded areas
- Rotten egg odor
- Dead or discolored vegetation in a green area
- Fire

WHAT TO DO IF YOU SUSPECT A LEAK

- Personal safety should be your first priority
- Evacuate the area and prevent anyone from entering
- Abandon any type of equipment being used near the area
- Avoid any open flames or sparks
- Call 911 from a safe area
- Notify the pipeline company

PIPELINE MARKERS

Pipeline markers are signs to indicate the general location of a pipeline. Markers like those pictured below are located at road, railroad and waterway crossings.

For more specific information contact:

City of Alma785-765-3502
City of Auburn785-256-2442
City of Burlingame785-654-2414
City of Eskridge785-449-2621
City of Harveyville.....785-589-2440
City of Havensville785-948-2310
City of McFarland785-765-2265
City of Osage City.....785-528-3714
City of Reading620-699-3870



24-Hour Emergency Contact: see numbers listed below

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:
Natural Gas 1971 115

KANSAS COUNTIES OF OPERATION:

Lyon Shawnee
Osage Wabaunsee
Pottawatomie

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

24/HR. EMERGENCY CONTACTS 911 OR

City of Alma785-765-3323
City of Auburn785-357-8095
City of Burlingame785-654-3431
City of Eskridge785-765-3323
City of Harveyville.....785-765-3323
City of Havensville785-456-5427
City of McFarland785-456-4056
City of Osage City.....785-528-3714
City of Reading620-699-3870



Gary Climate Solutions GCS Stewart Carbon Dioxide Pipeline is located in and east of Garden City, Kansas in the Southwestern Kansas. This carbon dioxide pipeline is located entirely within Finney County and includes 15 miles of pipeline regulated by the Pipeline and Hazardous Material Safety Administration (PHMSA) of the U.S. Department of Transportation. The pipeline is a single purpose closed-system that delivers carbon dioxide produced at an ethanol plant in Garden City to an oil field operated by Samuel Gary Jr. & Associates. One compressor at the ethanol plant, with approximately 3,000 horsepower, delivers 7-8 MMCFD of carbon dioxide to the Stewart Oil Field. Gary Climate Solutions main office is in Denver, Colorado.

COMMITMENT TO SAFETY, HEALTH & ENVIRONMENT

Gary Climate Solutions GCS Stewart carbon dioxide pipeline is regulated under the rigorous safety regulations of the PHMSA. We maintain a proactive and continuous effort to provide a safe working environment for all our employees and contractors and to protect the safety of our neighbors and families in the Garden City area. Towards these goals, our company is committed to complying with all applicable

environmental, health and safety laws and regulations. The company is committed at all levels of management to effective and safe operation of our pipeline system, using appropriate technology and experienced personnel. Gary Climate Solutions will make every reasonable effort to anticipate and manage risk through business processes that emphasize prevention but with adequate preparations to effectively respond in the event of an incident. This includes on-going training and cooperative education programs, such

24-Hour Emergency Contact: 1-620-275-9055

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:
Carbon Dioxide 1971 115

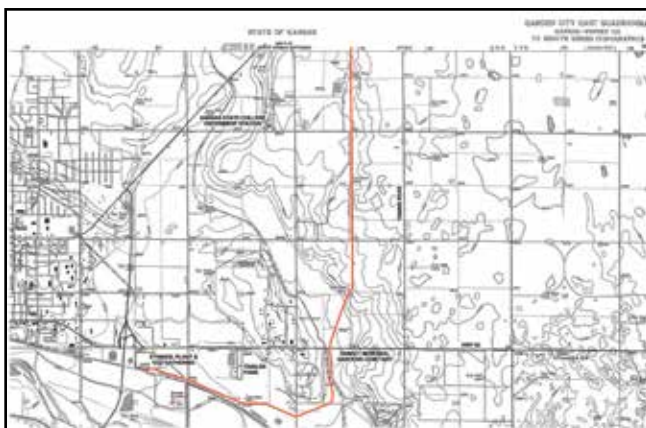
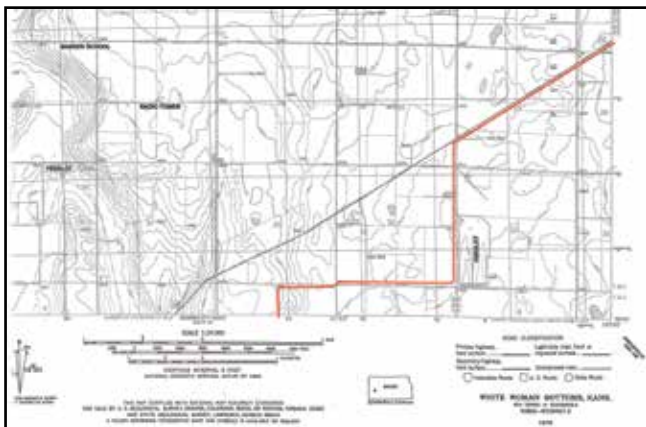
KANSAS COUNTIES OF OPERATION:

Finney*

* indicates "regulated" or "jurisdictional" pipelines

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

as those available through the Kansas Pipeline Association. Gary Climate Solutions, through its safety programs, also conducts periodic reviews and evaluations of our assets and operations as appropriate to identify hazards, verify compliance, and continuously improve our safety performance.





WHO IS GREAT SALT PLAINS PIPELINE, LLC

Great Salt Plains Pipeline, LLC operates a network of crude oil pipelines that provide energy security for our customers.

In accordance with Federal regulations, Great Salt Plains Pipeline also has developed and maintains an Integrity Management Plan (IMP) that outlines how we assess, inspect, and repair the pipeline to ensure safe operations and to keep the surrounding community and environment safe. For information on GSPP's Integrity Management Plan, contact us at publicawareness@mvppurchasing.com.

At Great Salt Plains Pipeline, we are committed to conducting our pipeline and terminal operations in a safe, environmentally sound manner. In order to protect the public and environment, we perform comprehensive risk assessments then develop prevention and mitigation plans that reduce those risks. In addition, Federal and state government agencies frequently audit and inspect the programs, procedures, and safety aspects of our operations. While every necessary measure is taken to ensure safe facility operations, accidents can and do occur. However, we remain committed to the safety and wellbeing of our communities. This brochure is to inform you about the Great Salt Plains Pipeline in your neighborhood and to provide important safety advice.

If you observe any unusual or suspicious activity near our pipeline facilities or in the unlikely event an emergency occurs, please call us at any time using one of the numbers listed in this document.

WHAT ARE THE SIGNS OF A CRUDE OIL PIPELINE LEAK?

- Amber to black liquid
- Hissing or roaring sound
- Rotten egg, gasoline, tar or "skunk-like" odor
- Dead or discolored vegetation in a green area
- Flames, if a leak has ignited

WHAT SHOULD I DO IF I SUSPECT A PIPELINE LEAK?

Your personal safety should be your first concern:

- Evacuate the area and prevent anyone from entering
- Abandon any equipment being used near the area
- Avoid any open flames
- Avoid introducing any sources of ignition to the area (such as cell phones, pagers, 2-way radios)
- Do not start/turn off motor vehicles/electrical equipment
- Call 911 or contact local fire or law enforcement
- Notify the pipeline company
- Do not attempt to extinguish a crude oil fire
- Do not attempt to operate any pipeline valves

PIPELINE SAFETY

System failures occur infrequently along the nation's network of interstate natural gas pipeline facilities, and many of these are caused by damage from others digging near the pipeline. We watch for unauthorized digging, but we request your help too.

REMINDERS BEFORE YOU DIG

Kansas One Call law requires all excavators planning to conduct an excavation on public or private property to notify the Kansas 811 One Call Center at least 2 full business days prior to digging. Before digging near or around the pipeline, contact Kansas 811 at 1-800-344-7233. The call center is available 24 hours a day, 7 days a week and will alert Great Salt Plains Pipeline

EMERGENCY CONTACT: 1-866-219-0015

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:		
Crude Oil	1267	128

KANSAS COUNTIES OF OPERATION:

Barber	Ness
Butler	Pawnee
Harper	Reno
Harvey	Rice
Hodgeman	Sedgwick
Kingman	Stafford

OKLAHOMA COUNTIES OF OPERATION:

Alfalfa	Major
Garfield	Noble
Kingfisher	Payne

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

so we can properly mark or indicate the underground pipeline path, provide information about the route, or give clearance to dig. For more information, visit www.callbeforeyoudig.org.

A federally-mandated national "Call Before You Dig" number, 811, was created to help protect you from unintentionally hitting underground utility lines while working on digging projects. As an alternative to Kansas 811, you can also call 811 before digging to get the underground utility lines marked for FREE. To learn more about 811, visit www.call811.com.

For even more information on digging safely, contact the Common Ground Alliance at 703-836-1709 or visit www.commongroundalliance.com.





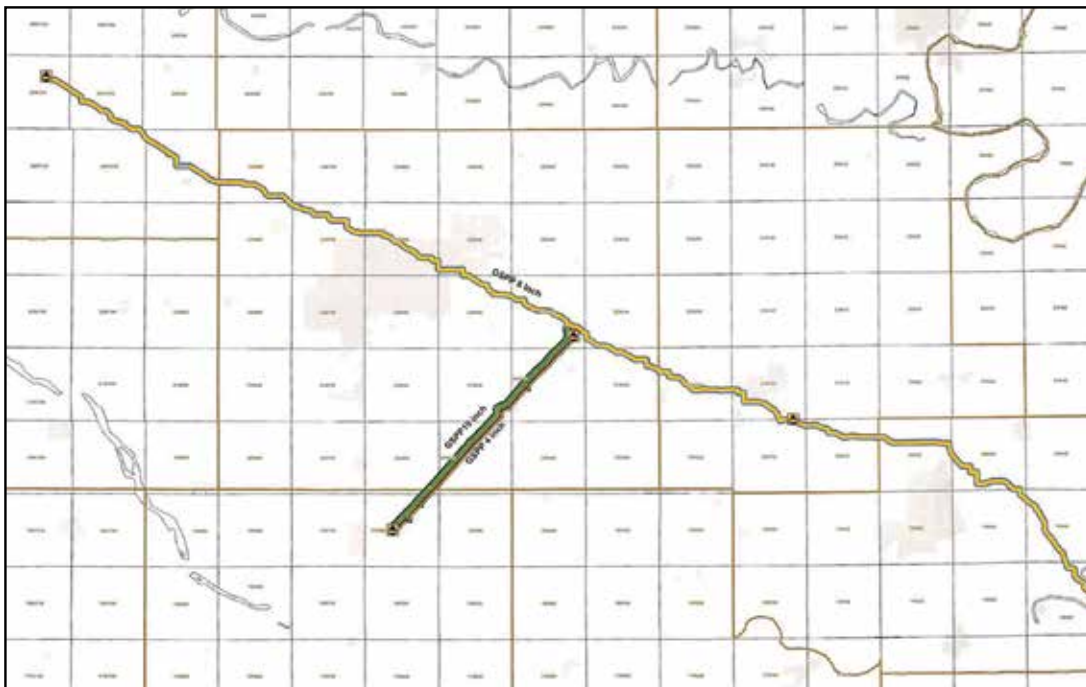
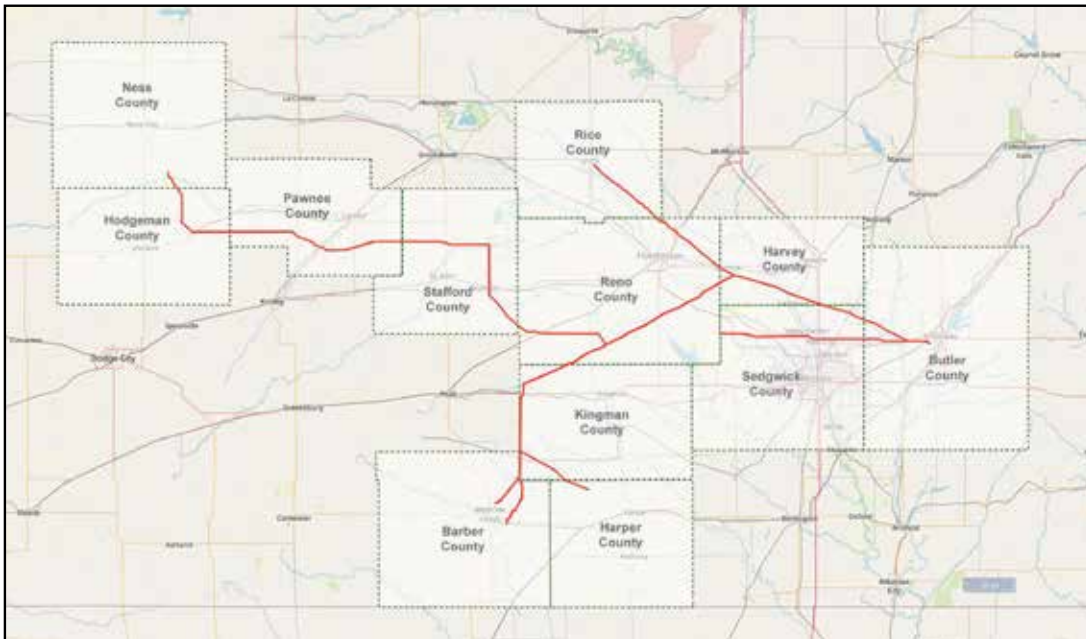
PIPELINE LOCATION AND MARKERS

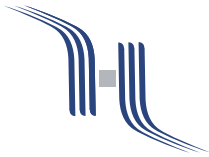
Pipeline markers are used to indicate the approximate location of a natural gas pipeline and to provide contact information. Aerial patrol planes also use the markers to identify the pipeline route. Markers should never be removed or relocated by anyone other than a pipeline operator.

You can also find out where other companies' pipelines are in your area by going to the National Pipeline Mapping System website at www.npms.phmsa.dot.gov.

EMERGENCY RESPONSE PLANS

An Emergency Response Plan is developed for each pipeline facility to contain, control and mitigate the various types of emergency conditions/ situations that could occur at one of our facilities. For more information regarding Great Salt Plain Pipelines emergency response plans and procedures, contact us at publicawareness@mvpurchasing.com.





1602 W. Main St.
Artesia, NM 88210
Phone: (887) 748-4464
Website: www.hollyenergy.com

HOLLY ENERGY PARTNERS

ABOUT US - HEALTH, SAFETY AND THE ENVIRONMENT

Holly Energy Partners (HEP) dedicates significant time, effort and resources to ensure our petroleum pipelines and terminals continue to operate safely. Ongoing efforts by our employees keep the operation of our pipelines, terminals, and other associated facilities operating efficiently and compliant under the guidance of federal, state, and local requirements.

To achieve the highest level of protection for the communities in which we operate and our employees, we focus our efforts on implementing industry standards and Best Practices in addition to compliance with applicable rules and regulations.

SYSTEM INTEGRITY AND RELIABILITY

In an effort for HEP to successfully meet our goal of protecting communities, our people and the environment, we assess risks and identify actions to mitigate those risks to ensure the highest level of integrity and reliability for our pipelines. Our Integrity Management Programs guide us in preventing releases from our facilities and pipelines. This is achieved by determining those operations which could affect High Consequence Areas (HCA's) such as populated areas and areas that are sensitive to environmental issues. We inspect our pipelines regularly using technologically advanced inspection equipment. Our pipelines are monitored 24 hours a day 7 days a week by trained personnel in a central control center using advanced technology, communication and computer systems.



811 CALL BEFORE YOU DIG

HEP is a member of each State's One-Call system where we operate. This is a free service to inform underground utilities and pipeline owners of any planned excavation activities that could potentially affect our pipelines. We ensure the management of all One-Calls is done according to State requirements and encourage the use of 8-1-1 to all excavators to promote safe digging practices.



1-800-344-7233



EMERGENCY PREPAREDNESS AND RESPONSE

To maintain preparedness to respond to an emergency, HEP maintains relationships with local emergency responders and public officials.

24-Hour Emergency Contact: 1-877-748-4464

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:		
Crude Oil	1267	128
Diesel Fuel	1202/1993	128
Gasoline	1203	128
Gas Oil	1202	128

KANSAS COUNTIES OF OPERATION:

Butler Johnson
Cowley

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

Whenever operating conditions may change, we are alerted and the condition is investigated and we take appropriate action to ensure the pipeline is shutdown or isolated as necessary. In the event of an emergency, HEP personnel will take actions to minimize the impact of a release from the pipeline to people, property and the community.

PRODUCTS TRANSPORTED IN YOUR AREA

PRODUCT	LEAK TYPE	VAPORS
HAZARDOUS LIQUIDS [SUCH AS: CRUDE OIL, DIESEL FUEL, GASOLINE, AND OTHER REFINED PRODUCTS]	Liquid	Initially heavier than air and spread along ground and collect in low or confined areas. Vapors may travel to source of ignition and fl ash back. Explosion hazards indoors, outdoors or in sewers.
HEALTH HAZARDS	Inhalation or contact with material may irritate or burn skin and eyes. Fire may produce irritating, corrosive and/or toxic gases. Vapors may cause dizziness or suffocation. Runoff from fire control or dilution water may cause pollution.	



Osage Pipe Line Company, LLC



Sinclair Transportation Company

Jessica Presler
309 Walnut Street
Jamestown, KS 66948
Phone: (785) 439-6621

Jamestown Municipal Gas

ABOUT JAMESTOWN MUNICIPAL GAS

Jamestown Municipal Gas is dedicated to the safety and integrity of its residents and property owners along our system. We operate 18 miles of 4" main, 15 miles of which is ran between 60-70 psi, and the rest is 20-25 psi after it comes through our reg. station in town.

WHAT ARE THE SIGNS OF A NATURAL GAS PIPELINE LEAK?

- Blowing or hissing sound
- Dust blowing from a hole in the ground
- Continuous bubbling in wet or flooded areas
- Gaseous or hydrocarbon odor
- Dead or discolored vegetation in a green area
- Flames, if a leak has ignited

WHAT SHOULD I DO IF I SUSPECT A PIPELINE LEAK?

Your personal safety should be your first concern:

- Evacuate the area and prevent anyone from entering
- Abandon any equipment being used near the area
- Avoid any open flames
- Avoid introducing any sources of ignition to the area (such as cell phones, pagers, 2-way radios)
- Do not start/turn off motor vehicles/ electrical equipment
- Call 911 or contact local fire or law enforcement
- Notify the pipeline company
- Do not attempt to extinguish a natural gas fire
- Do not attempt to operate any pipeline valves

PIPELINE SAFETY

System failures occur infrequently along the nation's network of interstate natural gas pipeline facilities, and many of these are caused by damage from others digging near the pipeline. We watch for unauthorized digging, but we request your help to notify us.

ALWAYS CALL 811 BEFORE YOU DIG!



**Know what's below.
Call before you dig.**

PIPELINE LOCATION AND MARKERS

Pipeline markers are used to indicate the approximate location of a natural gas pipeline and to provide contact information. Aerial patrol planes also use the markers to identify the pipeline route. Markers should never be removed or relocated by anyone other than a pipeline operator.

You can also find out where other companies' pipelines are in your area by going to the National Pipeline Mapping System website at www.npms.phmsa.dot.gov.

24-Hour Emergency Contact: 1-785-439-6621

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:
Natural Gas 1971 115

KANSAS COUNTIES OF OPERATION:

Cloud

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

EMERGENCY RESPONSE PLANS

An Emergency Response Plan is developed for each pipeline facility to contain, control and mitigate the various types of emergency conditions/ situations that could occur at one of our facilities. For more information regarding Jamestown Municipal Gas's emergency response plans and procedures, contact us directly.



7421 W. 129th St.
P.O. Box 25957
Overland Park, KS 66213-2634
Phone: 800-794-4780
Website: www.KansasGasService.com

Kansas Gas Service, a division of ONE Gas Inc., delivers safe, clean and reliable natural gas to more than 648,000 residential, commercial and industrial customers across Kansas. Natural gas is delivered to the company's distribution systems from transmission lines, some of which are owned by Kansas Gas Service, at operating pressures typically between 150 psig and 1,000 psig. Natural gas is then delivered through distribution pipelines that generally operate at 60 psig or less. Kansas Gas Service maintains, operates and monitors approximately 21,325 miles of transmission, distribution and service pipelines.

AUTHORIZED OPERATION OF METER VALVES

A plumber may operate the company's meter valve to facilitate work on customers' natural gas lines or appliances and to restore authorized natural gas service after repairs and testing are completed. However, only the company or its authorized agent shall operate the company's meter valve to initiate service. This practice allows Kansas Gas Service to perform various safety checks and properly record the account activation.

COMMITMENT TO SAFETY, HEALTH & ENVIRONMENT

Kansas Gas Service is committed to constructing and maintaining a pipeline delivery system that complies with applicable state and federal guidelines, industry standards and safety regulations. We apply approved pipeline integrity management techniques that monitor system performance and ensure system reliability. In the event of a natural gas emergency, trained

employees respond immediately and adhere to an emergency response plan devoted to protect life, public property and company property.

PIPELINE SAFETY AND INTEGRITY MANAGEMENT

The company's Pipeline Integrity Management Program (IMP) meets the requirements of the Department of Transportation (DOT) CFR Part 192, Subpart O, and the company's Distribution Integrity Management Program (DIMP) meets the requirements of DOT CFR 192, subpart P. These regulations identify specific practices, processes and procedures that company operations follow to operate effectively. The primary goal of these regulations is to provide assurance to the public of pipeline safety and to ensure system integrity. Compliance requirements also involve right-of-way surveillance, pipeline inspection and measures to monitor and control internal and external corrosion. Installation of natural gas mains, services and related facilities must also conform to specific requirements. These requirements are mandated by the Department of Transportation Title 49, CFR Part 192, entitled "The Transportation of Natural Gas and Other Gases by Pipeline: Minimum Federal Safety Standards." Kansas Gas Service, in partnership with public safety officials, municipalities and other local jurisdictions, strives to ensure adopted codes, regulations and standards are followed. In areas that are not covered by city code, use of the International Fuel Gas Code is encouraged.

EMERGENCY RESPONSE

Kansas Gas Service maintains and operates a 24 hour a day, seven days a week gas control center, which is fully staffed to respond to all natural-gas-related emergencies. To assist in the emergency control of natural gas, we offer a variety of training programs and materials for emergency response personnel. In partnership with public safety officials and the communities we serve, we apply basic safeguards to ensure the safety and welfare of our affected public remains a top priority.

24-Hour Emergency Contact: 888-482-4950

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:		
Natural Gas	1971	115

KANSAS COUNTIES OF OPERATION:

Allen	Lincoln
Anderson	Linn
Atchison	Lyon
Barber	Marion
Barton	Marshall
Bourbon	McPherson
Brown	Meade
Butler	Miami
Cherokee	Mitchell
Clark	Montgomery
Clay	Morris
Cloud	Morton
Coffey	Nemaha
Comanche	Neosho
Cowley	Osage
Crawford	Osborne
Dickinson	Ottawa
Doniphan	Pawnee
Douglas	Pottawatomie
Edwards	Pratt
Elk	Reno
Ellis	Republic
Ellsworth	Rice
Ford	Riley
Franklin	Rush
Geary	Russell
Grant	Saline
Gray	Sedgwick
Greenwood	Seward
Harper	Shawnee
Harvey	Smith
Haskell	Stafford
Jackson	Stanton
Jefferson	Sumner
Jewell	Wabaunsee
Johnson	Washington
Kingman	Wilson
Kiowa	Woodson
Labette	Wyandotte
Leavenworth	

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.





With approximately 62,000 miles of pipelines, Kinder Morgan is the largest natural gas transporter and largest storage operator in North America. Our pipelines reach deep into the traditional Gulf Coast supply areas, the prolific Rockies supply basins, and many important natural gas shale plays including Eagle Ford, Haynesville, Fayetteville, Barnett, Utica and Marcellus that will play a significant role in meeting the nation's long-term natural gas supply. We serve the major consuming markets of the entire United States.

COMMITMENT TO SAFETY, HEALTH & ENVIRONMENT

In Kansas our pipelines transport natural gas. We monitor our operations 24-hours a day, every day. We ensure public safety and safe pipeline operations through employee training, regular testing, right-of-way aerial and foot patrols and adherence to our comprehensive Integrity Management plan and procedures.

In addition to our 24-hour monitoring and ongoing safety and security procedures, Kinder Morgan relies on information from neighbors, contractors and government and safety officials to help local field personnel protect the pipeline and identify possible damage or suspicious activity.

Colorado Interstate Gas Company:
2 North Nevada Ave.
Colorado Springs, Colorado 80903

Local Offices for Pueblo Area:
HC01 Box 84
Richfield, KS 67953
Phone: 620/592-1426

1487 US Highway 50
Lakin, KS 67860
620/355-4328

18280 KC Avenue 13
Mullinville, KS 67109
Phone: 719/520-3704

24-Hour Emergency Contact: 1-877-712-2288

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:
Natural Gas 1971 115

KANSAS COUNTIES OF OPERATION:

Finney	Lane
Ford	Logan
Greeley	Morton
Hamilton	Scott
Hodgeman	Sherman
Kearny	Wallace
Kiowa	

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

CIG Kansas Pipelines





KPC Pipeline, LLC

ABOUT KPC PIPELINE, LLC

KPC Pipeline, LLC ("KPC") owns and operates a 1,120 mile interstate gas pipeline which transports natural gas from Oklahoma and Kansas to metropolitan Wichita, Kansas City and interconnecting pipeline markets. The KPC system includes three compressor stations with a total of 14,680 horsepower and has a capacity of approximately 160 MMcf/day. KPC has bidirectional interconnections with Enogex and Panhandle Eastern as well as supply interconnects with ANR Pipeline, Kansas Gas Services Transportation System. In addition, KPC can both receive gas from and deliver gas to Panhandle Eastern in its production and market zones. KPC is capable of distributing Anadarko and Arkoma basin gas into the Midwest and throughout Kansas, as well as accessing Oklahoma markets via Enogex. KPC is one of just a few pipelines that can facilitate north/south gas deliveries between various supply and market regions in the U.S.

WHAT DOES KPC DO IF A LEAK OCCURS?

To prepare for the event of a leak, KPC regularly communicates, plans, and

trains with local emergency responders. Upon the notification of an incident or leak KPC will immediately dispatch trained personnel to assist emergency responders.

KPC employees and emergency responders are trained to protect life, property and facilities in the case of an emergency. KPC employees will also take steps to minimize the amount of product that leaks out and to isolate the emergency.

MAINTAINING SAFETY AND INTEGRITY OF PIPELINES

KPC invests significant time and capital maintaining the quality and integrity of their pipeline systems. Most active pipelines are monitored 24 hours a day via manned control centers. KPC also utilizes on-ground observers to identify potential dangers. Control center personnel continually monitor the pipeline system and assess changes in pressure and flow. They notify field personnel if there is a possibility of a leak. Automatic to isolate a leak.

Gas transmission and hazardous liquid pipeline operators have developed supplemental hazard and assessment programs known as Integrity

24-Hour Emergency Contact: 1-800-467-2751

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:
Natural Gas 1971 115

KANSAS COUNTIES OF OPERATION:

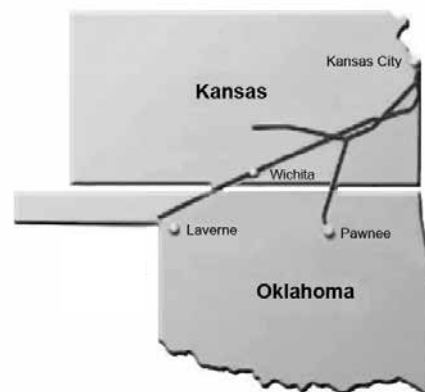
Anderson	Harper
Barber	Johnson
Butler	Kingman
Chase	Lyon
Coffey	Marion
Comanche	McPherson
Cowley	Miami
Elk	Rice
Franklin	Sedgwick
Greenwood	Wyandotte

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

Management Programs (IMPs). Specific information about KPC's program may be found by contacting us directly.

HOW TO GET ADDITIONAL INFORMATION

For an overview of KPC's IMP, contact us at 800-467-2751. For an overview of KPC's Emergency Response Plan please call 913-764-6015.



Know what's below.
Call before you dig.

CGA
Common Ground Alliance





Magellan Pipeline Company, LP
Magellan Crude Oil Pipeline Company LP
Magellan Pipelines Holdings LP
Magellan Terminals Holdings LP
Magellan Operating Company, LLC

One Williams Center
Tulsa, OK 74172
(Headquarters) (800) 574-6671
(Local Toll Free) (800) 772-0480
Website: www.magellanlp.com

SYSTEM OVERVIEW

Name of system:

Magellan Midstream Partners, L.P.

Name of operator:

Magellan Midstream Partners, L.P.

Type of system:

Transmission

List of products transported in

system: Butane, Crude Oil, Propane, Refined Petroleum Products (Diesel Fuel, Gasoline), and Jet Fuel.

OPERATOR OVERVIEW

Magellan Midstream Partners, L.P., a wholly owned subsidiary of ONEOK, Inc., is principally engaged in the transportation, storage and distribution of refined products and crude oil. Magellan operates a 9,800 mile refined products pipeline system with 54 connected terminals as well as 25 independent terminals not connected to our pipeline system, two marine terminals (one of which is owned through joint venture) and a 2,200 mile crude oil pipeline system.



Our pipeline markers can be typically identified by the black and red bands at the top.

COMMITMENT TO SAFETY, HEALTH & ENVIRONMENT

Magellan Midstream Partners, L.P. operates with a focus on safe, reliable, environmentally responsible, legally compliant and sustainable operations. Our pipelines are designed, installed, tested, operated, and maintained according to strict standards employed by our company, the pipeline industry and the federal government. Safety, honesty, responsibility, and efficiency are at the core of Magellan's business.

FREQUENTLY ASKED QUESTIONS

1. How can an emergency responder or LEPC obtain maps of the pipeline?

Emergency responders and local planning/zoning authorities may obtain detailed maps of our system from field operations staff or contact us directly via email at: damageprevention@magellanlp.com or call 888-945-2255. In addition, the National Pipeline Mapping System (www.npms.phsa.dot.gov) provides a list of pipeline operators in your community as well as the location of pipelines and other information.

2. How will Magellan and response agencies work together during Pipeline Emergencies?

Local response agencies are expected to play a key role in the first few hours of a response, protecting the public, isolating the area and using local materials such as dirt or sand to help safely contain the event. Magellan personnel will join a Unified Command and can provide key response equipment such as air monitors, vacuum trucks, emergency spill contractors, heavy construction equipment and specialized command post contractors

24-Hour Emergency Contact: (800) 720-2417

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:

Butane	1075/1011	115
Crude Oil	1267	128
Diesel Fuel	1202/1993	128
Gasoline	1971	115
Jet Fuel	1863	128
Propane	1978/1075	115

KANSAS COUNTIES OF OPERATION:

Allen	Harvey	Pawnee
Anderson	Hodgeman	Pratt
Atchison	Jefferson	Reno
Barton	Johnson	Rush
Bourbon	Kingman	Scott
Brown	Labette	Sedgwick
Butler	Lane	Shawnee
Chase	Leavenworth	Sherman
Chautauqua	Linn	Stafford
Cherokee	Logan	Sumner
Cowley	Lyon	Wallace
Crawford	McPherson	Wichita
Doniphan	Miami	Wilson
Douglas	Montgomery	Woodson
Edwards	Neosho	Wyandotte
Greenwood	Ness	
Harper	Osage	

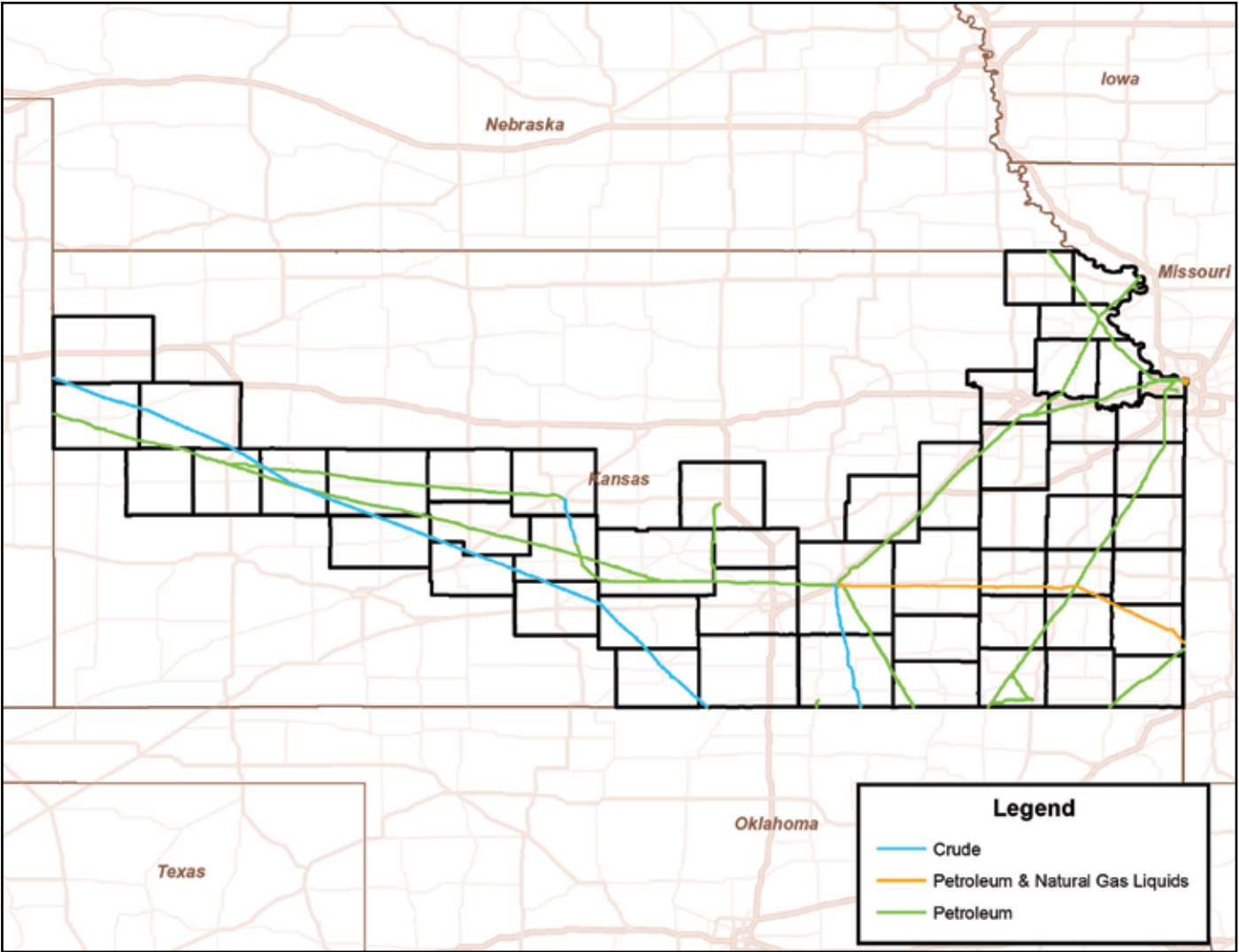
Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

3. How can an emergency responder learn more about the company's official emergency plans?

If interested in learning more about our facility response plan, please contact your local Magellan field representative or contact Magellan Corporate directly via email at: damageprevention@magellanlp.com.

4. How can responders learn more about pipeline responding training opportunities?

Visit www.pipelineemergencies.com. or visit www.magellanlp.com for more information and additional resources.





MERIT ENERGY COMPANY

13727 Noel Road, Suite 1200
Dallas, TX 75240
972-701-8377
Website: www.meritenergy.com

ABOUT MERIT ENERGY COMPANY

Merit Energy Company, headquartered in Dallas Texas, specializes in oil and natural gas production, and is the owner/operator of several regulated pipelines around the United States.

WHAT DOES MERIT ENERGY COMPANY DO IF A LEAK OCCURS?

To prepare for the event of a leak, pipeline companies regularly communicate, plan and train with local emergency responders. Upon the notification of an incident or leak the pipeline company will immediately dispatch trained personnel to assist emergency responders.

Pipeline operators and emergency responders are trained to protect life, property and facilities in the case of an emergency. Pipeline operators will also take steps to minimize the amount of product that leaks out and to isolate the pipeline emergency.

MAINTAINING SAFETY AND INTEGRITY OF PIPELINES

Merit Energy Company invests significant time and capital maintaining the quality and integrity of their pipeline systems. Most active pipelines are monitored 24 hours a day via manned control centers. Merit Energy Company also utilizes aerial surveillance and/or on-ground observers to identify potential dangers. Control center personnel continually monitor the pipeline system and assess changes in pressure and flow. They notify field personnel if there is a possibility of a leak. Automatic shut-off valves are sometimes utilized to isolate a leak.

HOW TO GET ADDITIONAL INFORMATION

For an overview of Merit Energy Company, go to www.meritenergy.com or contact us at 972-701-8377. For more detailed information about Merit Energy's products that are transported in your area, please visit www.npms.phmsa.dot.gov.

24-Hour Emergency Contact: 1-800-735-1212

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:		
Natural Gas	1971	115

KANSAS COUNTIES OF OPERATION:

Grant	Morton
Haskell	Seward
Meade	Stevens

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

**BEFORE EXCAVATING OR
IN AN EMERGENCY
CALL TOLL FREE**

1-800-735-1212

**MERIT ENERGY
COMPANY**





Midwest Energy, Inc.

1330 Canterbury Drive
Hays, KS 67601
Phone: 800-222-3121
Website: www.mwenergy.com

Midwest Energy, Inc., is the only customer-owned electric and natural gas cooperative in Kansas. Headquartered in Hays, Midwest Energy serves nearly 50,000 electric and 42,000 natural gas customers in 40 central and western Kansas counties.

Midwest Energy provides natural gas distribution services to customers in 35 counties through a network of 3,000 miles of gas distribution line, most operating at 700 psi or less. These gas distribution lines serve schools, hospitals, businesses and homes in rural communities, as well as irrigation customers throughout Midwest Energy's service area.

With seven customer service offices and natural gas operations centers in Atwood, Colby, Great Bend, Hays, Phillipsburg, Scott City and WaKeeney. Midwest Energy is building a brighter future for its customer owners by providing safe, reliable and efficient energy services, while fostering leadership and growth throughout the region.

COMMITMENT TO SAFETY, HEALTH & ENVIRONMENT

Safety always comes first at Midwest Energy, both for our employees and for our customerowners.

All 25 Midwest Energy offices and warehouses met strict federal and state safety standards, qualifying them for the Kansas Department of Labor's Safety and Health Achievement Recognition Program (SHARP) certification. Midwest Energy continuously improves upon its aggressive training and safety program, to ensure our personnel are operating in compliance with all safety standards and employing industry best practices.

Public safety and education are also a priority. Midwest Energy is a member of Kansas OneCall, and actively promotes 811 and Dig Safe awareness in the communities it serves. Dozens of public safety demonstrations explaining the safety risks associated with electricity and natural gas are provided to first responders, industry groups and grade and high school students.

You can learn more about Midwest Energy's commitment to safety, health and the environment by visiting our web site, at www.mwenergy.com.

24-Hour Emergency Contact: 1-800-222-3121

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:
Natural Gas 1971 115

KANSAS COUNTIES OF OPERATION:

Barton	Osborne
Cheyenne	Pawnee
Decatur	Phillips
Ellis	Rawlins
Ellsworth	Republic
Finney	Rooks
Gove	Rush
Graham	Russell
Grant	Scott
Gray	Sheridan
Greeley	Sherman
Hamilton	Smith
Haskell	Stafford
Kearny	Thomas
Lane	Trego
Logan	Wallace
Ness	Wichita
Norton	

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.





1111 South 103rd Street
Omaha, NE 68124
Phone: 1-888-367-6671
Website: www.northernnaturalgas.com

Please share this important information with others in your organization

COMPANY PROFILE

Northern Natural Gas (Northern) is a subsidiary of Berkshire Hathaway Energy, based in Omaha, Nebraska, and operates an interstate natural gas high pressure, transmission pipeline system extending from Texas to the upper Midwest. The system includes over 14,000 miles of natural gas pipeline, capable of 5.8 billion cubic feet per day (Bcf/d) of market area capacity, plus 1.78 Bcf/d of field capacity. Northern has a total of five natural gas storage facilities, three of which are underground facilities and the other two are Liquefied Natural Gas (LNG) facilities. All five total 75 Bcf which includes 4 Bcf of liquefied natural gas. At times, Northern's pipelines may be odorized, please check with your Northern Natural Gas representative to learn more. Northern provides transportation and storage services to approximately 81 utilities and numerous end-use customers in the upper Midwest. **Pipeline pressures can reach as high as 1,600 pounds per square inch gauge. Pipeline sizes range from 2 inches to 36 inches in diameter. The maximum potential impact radius (PIR) is 1,000 feet.**

Call 811 before digging. A pipeline representative must be present when excavating within 25 feet of the pipeline.

HOW CAN YOU TELL WHERE A PIPELINE IS LOCATED?

Since natural gas pipelines are built underground, line markers are used to indicate the approximate location of the pipelines. However, these markers do not indicate how deep the pipeline is buried. Also the route can take twists and turns between markers. It is a crime for any person to deliberately damage, destroy, or remove any pipeline sign or right-of-way marker. Never assume the pipeline lies in a straight line. Always call your state One Call Center before digging. Pipelines can lose cover by natural erosion or other forces. Certain types of deep farming activities require advanced notification before disturbing the soil. Some examples are: chisel plowing, waterway work and drain tiling. If you observe indications that a pipeline is shallow, exposed or damaged, immediately contact the Northern Natural Gas 24-hour Operations Communication Center at 1-888-367-6671. Call 811 or visit NPMS at: www.npms.phmsa.dot.gov to learn more.

WHO SHOULD I CALL IF I DETECT A GAS LEAK IN MY HOME?

If you suspect a natural gas leak inside your home or on your service line, immediately evacuate and contact 911 and your local gas company from a safe location. Northern operates the pipeline that delivers gas to local distribution companies. The distribution companies then deliver the gas to homes and businesses.

IF YOU ARE A PUBLIC SAFETY OFFICIAL:

A public safety official must take whatever steps are necessary to safeguard the public in the event of a pipeline emergency. The following points are offered as a guide.

- Notify the appropriate pipeline company. Report the type (leak, rupture, fire) and the location of the emergency. If it is a Northern Natural Gas pipeline, call the toll-free 24-hour Operations Communication Center: 1-888-367-6671.
- Establish a safety zone around the emergency site and control access.
- Use initial evacuation of 1,320 feet (1/4 mile) until advised further.
- If gas is not burning, avoid doing anything that may ignite it. Be aware of wind direction and remove potential ignition sources.

While emergency response agencies are doing their part, Northern employees will do what needs to be done to protect lives and property.

- They will first protect people.
- If a fire does not already exist, they will remove all sources of ignition.
- They will help people in distress.



24-Hour Emergency Contact: 1-888-367-6671

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:
Natural Gas 1971 115

KANSAS COUNTIES OF OPERATION:

Barton	Kiowa
Clark	Lincoln
Clay	Meade
Cloud	Ness
Edwards	Ottawa
Ellsworth	Pawnee
Finney	Pratt
Ford	Rice
Grant	Rush
Gray	Seward
Haskell	Stafford
Hodgeman	Washington
Kingman	

Changes may occur. Contact the operator to discuss its pipeline systems and areas of operation.

- They will eliminate the natural gas source. If it is possible to do so from the location of the emergency, they will. In many cases, the natural gas must be shut off at a remote location. It is important for you to know that Northern employees are responsible for operating the valves that isolate the affected facilities.
- Is your group or agency interested in a presentation or additional information? Call the Northern emergency number at 1-888-367-6671 and ask to establish a public education liaison. Together we will determine the appropriate Northern field location nearest you and then provide you a means to contact Northern's local representative for more details.
- For more general information visit www.pipelineawareness.org/training



**Know what's below.
Call before you dig.**
www.call811.com



NuStar Energy - Central East Region
 7340 W. 21st North, Suite 200
 Wichita, KS 67205
 Phone: 316-773-9000
 PublicAwarenessCE@nustarenergy.com
 Website: www.nustarenergy.com

ABOUT NUSTAR PIPELINE OPERATING PARTNERSHIP L.P.

The goal of the NuStar Energy Pipeline Public Awareness Program is to enhance safety and environmental protection through increased public awareness and knowledge. Public awareness programs should raise the awareness of the affected public and key stakeholder audiences of the presence of pipelines in their communities and increase their understanding of the role of pipelines in transporting energy.

NuStar Pipeline Operating Partnership L.P. is a subsidiary of NuStar Energy L.P. Our business unit consists of pipeline systems, ranging between 3" to 16" in diameter, that transports refined petroleum products, including gasoline, diesel, and propane throughout Kansas, Nebraska, Iowa, South Dakota, North Dakota, and Minnesota. We also operate an anhydrous ammonia pipeline system in Louisiana, Arkansas, Missouri, Illinois, Indiana, Iowa and Nebraska ranging between 3" to 10" in diameter. Anhydrous ammonia is primarily used as agricultural fertilizer and used as a feedstock to a number of industrial applications.

Please read and keep these important safety messages located in the brochure and company profile provided in the event you need to reference them in the future.

Contact us for more information about our Integrity Management Program or Emergency Response Plan.

COMMITMENT TO SAFETY, HEALTH & ENVIRONMENT

At NuStar, the health and safety of our personnel, customers, and neighbors and the protection of the environment are core business values. NuStar is committed to achieving health, safety and environmental (HSE) excellence throughout the organization. NuStar emphasizes its HSE commitment through internal audits, public awareness, damage prevention, pipelines integrity management, emergency response preparedness, and other programs. In addition, most of NuStar's pipelines are operated via satellite communication systems from a central control room located in San Antonio, TX. This control center is equipped with state-of-the-art computer systems designed to continuously monitor real-time operational data, operate equipment associated with the delivery of crude oil, refined products, and anhydrous ammonia, and control safety measures to ensure smooth and safe operation of our pipelines.



24-Hour Emergency Contact: 1-800-759-0033

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:

Refined Products		
Gasoline	1203	128
Diesel Fuel	1202/1993	128
Propane (HVL)	1075/1978	115

KANSAS COUNTIES OF OPERATION:

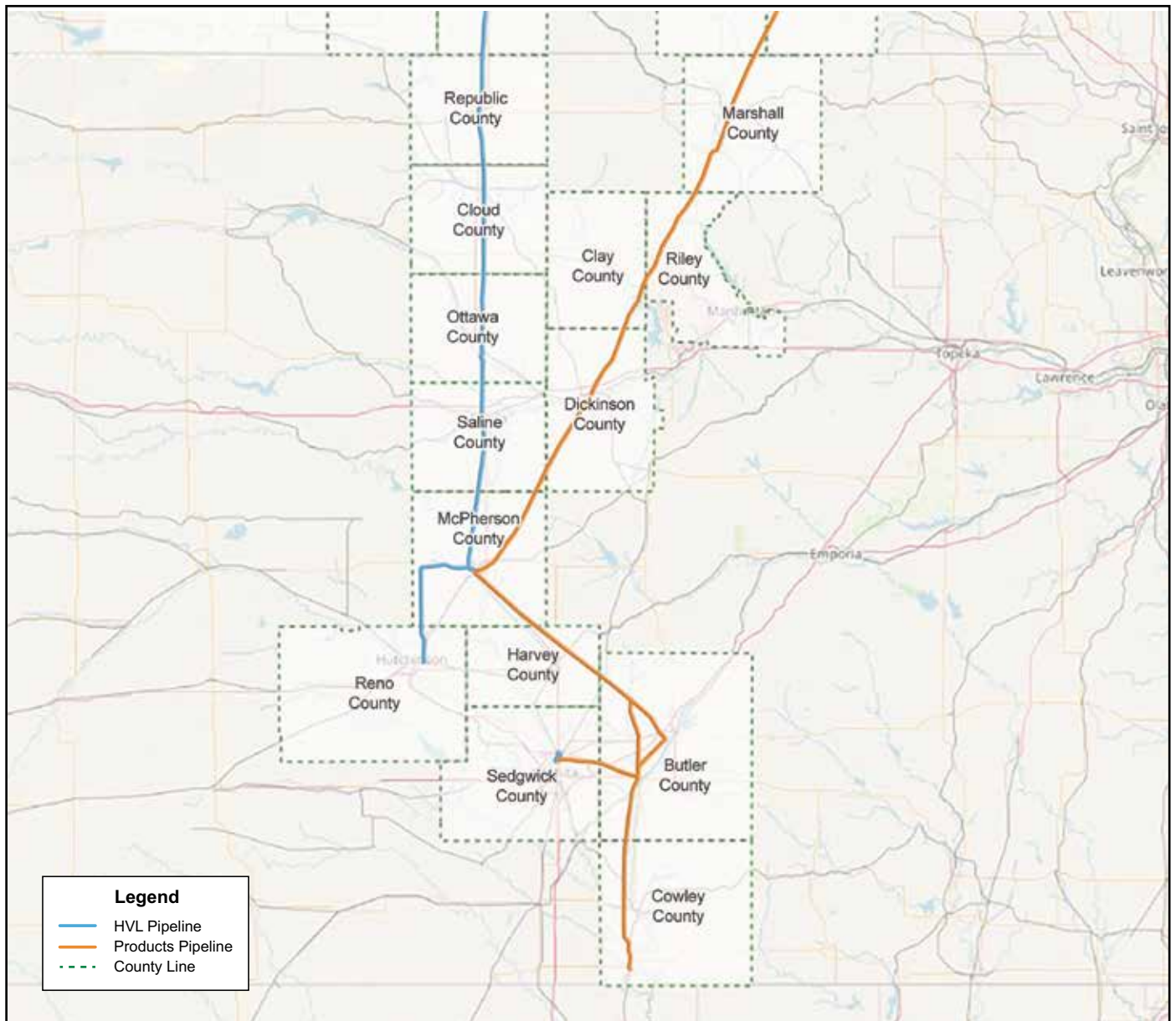
Butler	McPherson
Clay	Ottawa
Cloud	Reno
Cowley	Republic
Dickenson	Riley
Harvey	Saline
Marshall	Sedgwick

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.



BE PREPARED

Please visit Emergency Response Portal to register for access to more information about NuStar's Emergency Response Plan including how to contact us directly from the site. If you are already registered, you will receive email notifications when there are additional resources in your area of jurisdiction.



Base map courtesy of openstreetmap.org



ONEOK Plaza
100 West Fifth Street
Tulsa, OK 74103
Phone: 918-588-7000

ABOUT ONEOK, INC.

ONEOK, Inc. is a leading midstream service provider that owns one of the nation's premier natural gas liquids systems, connecting NGL supply in the Mid-Continent, Permian and Rocky Mountain regions with key market centers and an extensive network of natural gas gathering, processing, storage and transportation assets.

ONEOK applies our core capabilities of gathering, processing, fractionating, transporting, storing and marketing natural gas and NGLs through vertical integration across the midstream value chain to provide our customers with premium services while generating consistent and sustainable earnings growth.

ONEOK Field Services Company, L.L.C.(OFS), a subsidiary of ONEOK, Inc. has natural gas gathering, processing and fractionation operations in the NGL-rich Cana-Woodford Shale, Woodford Shale, the Springer Shale, the Stack, SCOOP and the Mississippian Lime areas of Oklahoma. OFS operates approximately 3,425.8 miles of gas gathering pipelines in Kansas with diameters that range from 2.375" - 30".

COMMITMENT TO SAFETY, HEALTH & THE ENVIRONMENT

ONEOK is committed to operating in a safe, reliable, environmentally responsible and sustainable manner. Environmental, safety and health is our primary focus at ONEOK. ONEOK is purposeful in improving employee and process safety. Our key performance indicators keep ONEOK focused improving results. We continue to make improvements in reducing our environmental impact by conserving resources, recycling and utilizing efficient technologies.

EMERGENCY NOTIFICATION(S) :

Call 911 first when requiring assistance in responding to a pipeline event.

Call ONEOK's 24 hour emergency number 888-675-3302 and provide the following information:

- Location;
- Nature of the problem; and
- A telephone number at which a responsible person can be contacted.

EMERGENCY RESPONSE PERSONNEL

Although Emergency Officials are familiar with the steps required to safeguard the public, ONEOK has planned responses to unique emergency situations that may arise with its pipeline facilities and operations. It is important that ONEOK practice their emergency response efforts to be prepared when an unlikely event occurs.

EMERGENCY RESPONSE PLANS

ONEOK has developed specific facility response plans based on the knowledge of its own personnel, available equipment, tools and materials. These plans are accessible at each facility. This document provides a general overview of ONEOK's capabilities. For more detailed information or to review the Emergency Response Plan, please contact Donnie Krumsiek at 918-561-8019.

MUTUAL UNDERSTANDING

In the unlikely event of a pipeline emergency, ONEOK employees are prepared to respond in coordination with local police and fire departments and other emergency responders. We meet with responders to discuss our emergency response plans and each plan is designed to protect people, the environment and property.

If a pipeline event occurs, emergency response officials will be notified, and ONEOK operations personnel will be dispatched to the site. ONEOK response personnel will respond putting safety first in their response efforts.

If you or another emergency response organization established an Incident Command Center prior to the arrival of ONEOK personnel, the first ONEOK employee who arrives at the site should be introduced to the Incident Commander as the ONEOK Representative.

24-Hour Emergency Contact:

1-888-675-3302

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:

Natural Gas	1971	115
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KANSAS COUNTIES OF OPERATION:

Barton	Kingman
Butler	Marion
Clark	Meade
Comanche	Morton
Ellsworth	Pratt
Finney	Reno
Grant	Rice
Gray	Rush
Greely	Scott
Hamilton	Sedgwick
Harper	Seward
Harvey	Stanton
Haskell	Stevens
Kearny	

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

PUBLIC SAFETY AND EVACUATIONS

Evacuation plans and procedures should reflect your department's available assets and capabilities of your emergency response organization. Expert knowledge of your area is key to creating the best evacuation, traffic control and rerouting, and railroad stoppage plans in order to limit public exposure and minimize accidental ignition.

ONEOK will provide product hazard information to the emergency responders to assist in establishing safe zones relative to the products which are being transported through the pipeline system. These established safe zones will assist in identification of those whom may be requested to evacuate the area.

FIRE OR EXPLOSION

ONEOK does not employ dedicated fire response personnel and must rely on the capabilities of local

emergency responders. ONEOK through memberships in state pipeline associations, provide training opportunities to Emergency Responders. Other agencies, including the State Fire Marshall's office may also provide pipeline emergency response training. The U.S. Department of Transportation Emergency Response Guidebook provides information on potential hazards, public safety and emergency response.

RESCUE OR MEDICAL DUTIES

Emergency response personnel will be contacted to assist with any needed rescue. Coordination will be made with emergency services and/or with a local hospital or medical provider in the event of a medical emergency.

PIPELINE EQUIPMENT AND FACILITIES

Federal law requires that pipeline operators to have specific training when operating a pipeline system. ONEOK requests that Emergency Officials not attempt to operate pipeline valve or equipment. In doing so, these actions may worsen an event.

BOMB OR SECURITY THREAT

ONEOK relies on the public to be its eyes and ears along the pipeline. If you witness any act of vandalism, loitering, receive a bomb threat involving a ONEOK facility or other suspicious activity along the right of way or pipeline facility, please report it immediately to the ONEOK's Pipeline Control Center at 888-675-3302.

NATURAL DISASTERS

When a natural disaster (hurricane, storm, flood, tornado, volcano or earthquake) strikes or is pending, the area will be closely monitored. Pipeline facilities will be inspected after the disaster. ONEOK personnel may contact emergency officials to assist in identifying any road closures that may hamper accessibility to the facility. If damage occurs in your area please contact ONEOK and a field employee

will respond to the concern or damage which has been reported.

RIGHT-OF-WAY ACTIVITY

One of the greatest threats to safe pipeline operation is the accidental damage caused by excavation, construction, farming activities, and homeowner construction and maintenance. Awareness is crucial in preventing these accidents. Call IMMEDIATELY if you see suspicious or questionable activity near the pipeline right of way.

Be aware that pipelines frequently share rights of way with other utilities (electric power lines, additional pipelines) or modes of transportation (roadways, railroads, etc.). Incidents such as lightning strikes, fires, train derailments, etc. on or near the right of way can damage an underground pipeline. Should incidents such as these occur and a pipeline operated by ONEOK is nearby, please call the ONEOK emergency number at 888-675-3302 to report the incident.

NATIONAL PIPELINE MAPPING SYSTEM

The US Department of Transportation, Pipeline and Hazardous Materials Safety Administration, Office of Pipeline Safety has created a web-based system

to assist emergency responders in locating and identifying pipelines within their area as well as the Operator of the pipeline system.

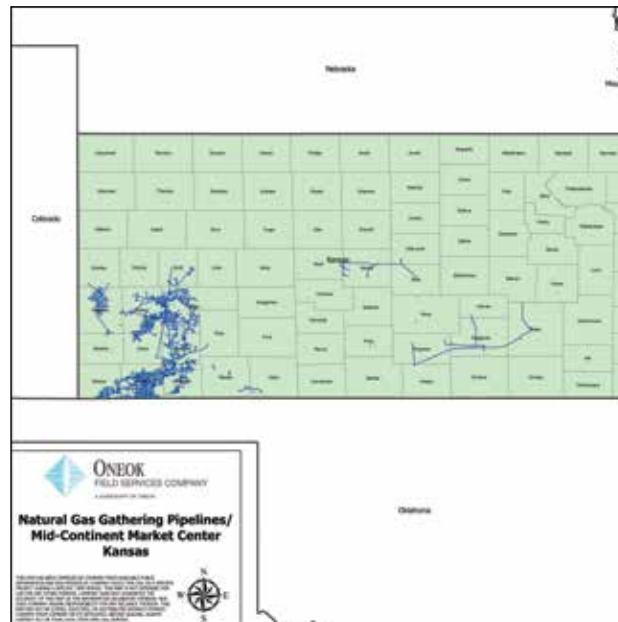
Not all of ONEOK pipelines are included in the NPMS mapping system. Production, distribution and gathering pipelines are exempt from reporting pipelines into the National Pipeline Mapping System.

INTEGRITY MANAGEMENT

In accordance with federal regulatory requirements, ONEOK has developed a hazard assessment program known as an Integrity Management Plan (IMP). This plan focuses on the identification and mitigation of hazards to the pipeline system. Specific information about ONEOK's program may be found by contacting our Integrity Manager, Scott Henderson at ScottBrian.Henderson@oneok.com.

CLOSURE

ONEOK values Emergency Officials and Responders. We appreciate the knowledge and capabilities each responder brings when assisting in a pipeline emergency. If ONEOK can offer your department any additional information, please contact us.



**CONTACT
US**

pipelineawareness@oneok.com | 1-918-561-8019 | www.oneok.com
Emergency Number: 1-888-675-3302



ONEOK
NGL PIPELINE

A SUBSIDIARY OF ONEOK



**Know what's below.
Call before you dig.**

ONEOK Plaza
100 West Fifth Street
Tulsa, OK 74103
Phone: 918-588-7000
Website: www.oneok.com

ABOUT ONEOK, INC.

ONEOK, Inc. is a leading midstream service provider that owns one of the nation's premier natural gas liquids systems, connecting NGL supply in the Mid-Continent, Permian and Rocky Mountain regions with key market centers and an extensive network of natural gas gathering, processing, storage and transportation assets.

ONEOK applies our core capabilities of gathering, processing, fractionating, transporting, storing and marketing natural gas and NGLs through vertical integration across the midstream value chain to provide our customers with premium services while generating consistent and sustainable earnings growth.

ONEOK NGL Pipeline, L.L.C. operates approximately 2,213.4 miles of pipeline across the state of Kansas that gathers, and transport products known as natural gas liquids. These products, at any given time, can be a varied mixture of NGL (Natural Gas Liquids), LPG (Liquid Petroleum Gas) or HVL (Highly Volatile Liquids). They are a mixture consisting of ethane, propane, butane, natural gasoline, ethane-propane mixture and propylene. Pipeline diameters range from 3.5" - 20".

COMMITMENT TO SAFETY, HEALTH & THE ENVIRONMENT

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EMERGENCY NOTIFICATION(S) :

Call 911 first when requiring assistance in responding to a pipeline event.

Call ONEOK's 24 hour emergency number 800-666-9041 and provide the following information:

- Location;
- Nature of the problem; and
- A telephone number at which a responsible person can be contacted.

EMERGENCY RESPONSE PERSONNEL

Although Emergency Officials are familiar with the steps required to safeguard the public, ONEOK has planned responses to unique emergency situations that may arise with its pipeline facilities and operations. It is important that ONEOK practice their emergency response efforts to be prepared when an unlikely event occurs.

EMERGENCY RESPONSE PLANS

ONEOK has developed specific facility response plans based on the knowledge of its own personnel, available equipment, tools and materials. These plans are accessible at each facility. This document provides a general overview of ONEOK's capabilities. For more detailed information or to review the Emergency Response Plan, please contact Donnie Krumsiek at 918-561-8019.

MUTUAL UNDERSTANDING

In the unlikely event of a pipeline emergency, ONEOK employees are prepared to respond in coordination with local police and fire departments and other emergency responders. We meet with responders to discuss our emergency response plans and each plan is designed to protect people, the environment and property.

If a pipeline event occurs, emergency response officials will be notified, and ONEOK operations personnel will be dispatched to the site. ONEOK response personnel will respond putting safety first in their response efforts.

If you or another emergency response organization established an Incident Command Center prior to the arrival of ONEOK personnel, the first

24-Hour Emergency Contact: 1-800-666-9041

PRODUCTS/ DOT GUIDEBOOK ID#/ GUIDE#:		
NGL	1203	128

KANSAS COUNTIES OF OPERATION:

Barton	Kiowa
Butler	McPherson
Cheyenne	Meade
Clark	Pratt
Edwards	Rawlins
Ellis	Reno
Ellsworth	Rice
Ford	Russell
Graham	Sedgwick
Grant	Seward
Gray	Sheridan
Harper	Stafford
Harvey	Sumner
Haskell	Thomas
Kingman	Trego

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

ONEOK employee who arrives at the site should be introduced to the Incident Commander as the ONEOK Representative.

PUBLIC SAFETY AND EVACUATIONS

Evacuation plans and procedures should reflect your department's available assets and capabilities of your emergency response organization. Expert knowledge of your area is key to creating the best evacuation, traffic control and rerouting, and railroad stoppage plans in order to limit public exposure and minimize accidental ignition.

ONEOK will provide product hazard information to the emergency responders to assist in establishing safe zones relative to the products which are being transported through the pipeline system. These established safe zones will assist in identification of those whom may be requested to evacuate the area.

FIRE OR EXPLOSION

ONEOK does not employ dedicated fire response personnel and must rely on the capabilities of local emergency responders. ONEOK through memberships in state pipeline associations, provide training opportunities to Emergency Responders. Other agencies, including the State Fire Marshall's office may also provide pipeline emergency response training. The U.S. Department of Transportation Emergency Response Guidebook provides information on potential hazards, public safety and emergency response.

RESCUE OR MEDICAL DUTIES

Emergency response personnel will be contacted to assist with any needed rescue. Coordination will be made with emergency services and/or with a local hospital or medical provider in the event of a medical emergency.

PIPELINE EQUIPMENT AND FACILITIES

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BOMB OR SECURITY THREAT

ONEOK relies on the public to be its eyes and ears along the pipeline. If you witness any act of vandalism, loitering, receive a bomb threat involving a ONEOK facility or other suspicious activity along the right of way or pipeline facility, please report it immediately to the ONEOK's Pipeline Control Center at 888-844-5658.

NATURAL DISASTERS

When a natural disaster (hurricane, storm, flood, tornado, volcano or earthquake) strikes or is pending, the area will be closely monitored. Pipeline facilities will be inspected after the disaster. ONEOK personnel may contact emergency officials to assist

in identifying any road closures that may hamper accessibility to the facility. If damage occurs in your area please contact ONEOK and a field employee will respond to the concern or damage which has been reported.

RIGHT-OF-WAY ACTIVITY

One of the greatest threats to safe pipeline operation is the accidental damage caused by excavation, construction, farming activities, and homeowner construction and maintenance. Awareness is crucial in preventing these accidents. Call IMMEDIATELY if you see suspicious or questionable activity near the pipeline right of way.

Be aware that pipelines frequently share rights of way with other utilities (electric power lines, additional pipelines) or modes of transportation (roadways, railroads, etc.). Incidents such as lightning strikes, fires, train derailments, etc. on or near the right of way can damage an underground pipeline. Should incidents such as these occur and a pipeline operated by ONEOK is nearby, please call the ONEOK emergency number at 888-844-5658 to report the incident.

NATIONAL PIPELINE MAPPING SYSTEM

The US Department of Transportation, Pipeline and Hazardous Materials

Safety Administration, Office of Pipeline Safety has created a web-based system to assist emergency responders in locating and identifying pipelines within their area as well as the Operator of the pipeline system.

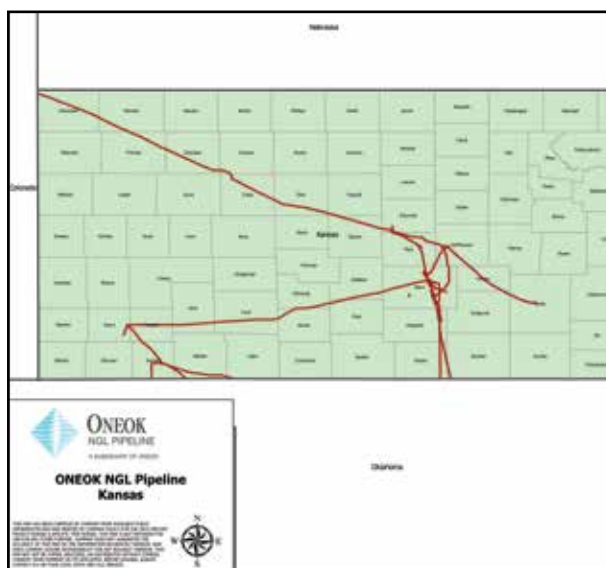
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CLOSURE

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**CONTACT
US**

pipelineawareness@oneok.com | 1-918-561-8019 | www.oneok.com
Emergency Number: 1-800-666-9041



ONEOK
NORTH SYSTEM
A SUBSIDIARY OF ONEOK



Local Office
Windom Station
420 US HWY 56
Windom, KS 67491

ONEOK Plaza
100 West Fifth Street
Tulsa, OK 74103
Phone: 918-588-7000
Website: www.oneok.com

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ONEOK applies our core capabilities of gathering, processing, fractionating, transporting, storing and marketing natural gas and NGLs through vertical integration across the midstream value chain to provide our customers with premium services while generating consistent and sustainable earnings growth.

ONEOK North System, L.L.C. operates FERC-regulated NGL pipelines in Kansas, Missouri, Nebraska, Iowa, Illinois and Indiana that span approximately 1,600 miles and has a capacity to transport up to 134,000 barrels per day, with additional capacity under lease. The pipeline transports NGL purity products and various refined products, including unleaded gasoline and diesel fuel throughout the Midwest markets, particularly near Chicago, Illinois. These NGL products are then stored or distributed to our customers, such as petrochemical manufacturers, heating fuel users, ethanol producers, refineries, exporters and propane distributors. This system includes approximately 978,000 barrels of storage capacity, both mined cavern and above-ground storage tanks, 22 mainline pumping stations and eight NGL propane, butane and 14# natural gas truck loading terminals. A portion of the North System transports refined petroleum products, including unleaded gasolines and diesel, from Kansas to Iowa which consists of three refined-products terminals and connecting pipelines. In Kansas, ONEOK North System, L.L.C operates approximately 673.1 miles of pipeline with diameters ranging from 4.50" - 12.750".

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MUTUAL UNDERSTANDING

In the unlikely event of a pipeline emergency, ONEOK employees are prepared to respond in coordination with local police and fire departments and other emergency responders. We

24-Hour Emergency Contact: 1-888-844-5658

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:

Butane	1075/1011	115
Diesel Fuel	1202/1993	128
Gasoline	1203	128
Iso-Butanes	1969/1075	115
Natural Gasoline	1203	128
Propane	1075/1978	115
Raw Feed	1203	128

KANSAS COUNTIES OF OPERATION:

Atchison	McPherson
Clay	Ottawa
Cloud	Pottawatomie
Dickinson	Reno
Ellsworth	Rice
Geary	Saline
Harvey	Sedgwick
Jackson	Shawnee
Jefferson	Wabaunsee
Lincoln	Washington

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NATURAL DISASTERS

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RIGHT-OF-WAY ACTIVITY

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Be aware that pipelines frequently share rights of way with other utilities (electric power lines, additional pipelines) or modes of transportation (roadways, railroads, etc.). Incidents such as lightning strikes, fires, train derailments, etc. on or near the right of way can damage an underground pipeline. Should incidents such as these occur and a



pipeline operated by ONEOK is nearby, please call the ONEOK emergency number at 888-844-5658 to report the incident.

NATIONAL PIPELINE MAPPING SYSTEM

The US Department of Transportation, Pipeline and Hazardous Materials Safety Administration, Office of Pipeline Safety has created a web-based system to assist emergency responders in locating and identifying pipelines within their area as well as the Operator of the pipeline system.

Not all of ONEOK pipelines are included in the NPMS mapping system. Production, distribution and gathering pipelines are exempt from reporting pipelines into the National Pipeline Mapping System.

INTEGRITY MANAGEMENT

In accordance with federal regulatory requirements, ONEOK has developed a hazard assessment program known as an Integrity Management Plan (IMP). This plan focuses on the identification and mitigation of hazards to the pipeline system. Specific information about ONEOK's program may be found by contacting our Integrity Manager, Scott Henderson at ScottBrian.Henderson@oneok.com.

CLOSURE

ONEOK values Emergency Officials and Responders. We appreciate the knowledge and capabilities each responder brings when assisting in a pipeline emergency. If ONEOK can offer your department any additional information, please contact us.



**CONTACT
US**

pipelineawareness@oneok.com | 1-918-561-8019 | www.oneok.com
Emergency Number: 1-888-844-5658



PANHANDLE EASTERN PIPE LINE
An ENERGY TRANSFER Partnership

1300 Main St.
Houston, TX. 77002
Phone: 713-989-7000
Website: www.energytransfer.com

Energy Transfer Partners, a Texas-based energy company founded in 1995 as a small intrastate natural gas pipeline company, is now one of the largest and most diversified master limited partnerships in the United States.

Strategically positioned in all of the major U.S. production basins, the company owns and operates a geographically diverse portfolio of energy assets, including midstream, intrastate and interstate transportation and storage assets. Energy Transfer operates nearly 125,000 miles of natural gas, crude oil, natural gas liquids and refined products pipelines and related facilities, including terminalling, storage, fractionation, blending and various acquisition and marketing assets in 41 states.

Panhandle Eastern Pipe Line an approximately 6,000-mile natural gas pipeline system with access to diverse supply sources, extends from producing areas in the Anadarko Basin of Texas, Oklahoma and Kansas through Missouri, Illinois, Indiana, Ohio and into Michigan. Our Midwest customer base includes some of the nation's largest utility and industrial natural gas users.

For more information about local operations of **Panhandle Eastern Pipe Line**, please contact us:

Anderson, Chase, Coffey, Franklin, Johnson, Lyon and Miami counties

Brian Andersen
Operations Manager
913-669-1887 (w)
brian.andersen@energytransfer.com

Meade and Seward counties:

Jake Shrewsbury
Operations Manager
620-626-1121 (w), 620-482-5674 (m)
jake.shrewsbury@energytransfer.com

Butler, Clark, Ford, Harvey, Kingman, Kiowa, Marion, Reno, Kiowa and Pratt counties:

Loren Zimmerman
Operations Manager
620-388-4028 (m)
loren.zimmerman@energytransfer.com

Barber and Harper counties:

Jason Hembree
Operations Manager
580-609-8021 (w), 580-747-2413 (m)
jason.hembree@energytransfer.com

Grant, Haskell and Kearny counties:

Gary Garrison
Operations Manager
806-621-2360 (w), 580-651-7232 (m)
gary.garrison@energytransfer.com

24-Hour Emergency Contact:
1-800-225-3913

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:
Natural Gas 1971 115

KANSAS
COUNTIES OF OPERATION:

Anderson	Johnson
Barber	Kearny
Butler	Kingman
Chase	Kiowa
Clark	Lyon
Coffey	Marion
Ford	Meade
Franklin	Miami
Grant	Pratt
Harper	Reno
Harvey	Seward
Haskell	

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.





Corporate Headquarters:
Phillips 66 Pipeline LLC
2331 Citywest Blvd
Houston, TX 77042
www.phillips66pipeline.com

PHILLIPS 66 PIPELINE LLC OWNS OR OPERATES OVER 900 MILES OF PIPELINE AND 3 STORAGE TERMINALS IN KANSAS

Operating with Integrity

Pipelines are one of the most reliable methods to move energy products, helping to meet our nation's growing economic and energy needs. They operate under many government regulations and industry standards. These measures address all aspects of pipeline operation, such as where and how they are built, operated and maintained -- and Phillips 66 Pipeline LLC applies best practices that often exceed requirements.

Committed to Safety and Reliability

Our commitment to safety goes further, with the goal that everyone who lives or works near our assets is aware of our lines and facilities, adopts safe digging practices, learns the signs of a potential pipeline leak and knows how to quickly respond if he or she suspects a problem. As part of our on-going damage prevention program, we employ many tactics to ensure the safety of our communities.

Emergency Response Capabilities

Phillips 66 Pipeline LLC has committed resources to prepare and implement its emergency response plans and has obtained, through contract, the necessary private personnel and equipment to respond to a worst case discharge, to the maximum extent practical.

Communications

Phillips 66 Pipeline LLC employs a 24-hour Control Center as a hub of communication in emergency response situations. On-site communications are conducted using cellular phones; and portable radios and/or land-line telephone systems from facilities and offices.

Incident Command System

Phillips 66 Pipeline LLC utilizes an expandable Incident Command System. Personnel and federal, state and local agencies may be integrated into the Unified Command Structure, scalable to the size and complexity of an incident.

Spill Response Equipment

Phillips 66 Pipeline LLC maintains emergency response trailers and equipment at strategically-located facilities. Response equipment may include spill boom (as needed and of various types, sizes and lengths), absorbent materials, boats, motors, hand and power tools, pumps, hoses, personal protective equipment (PPE), first aid and miscellaneous supplies. Each trailer is inspected; equipment is deployed during drills on a regular basis.

Oil Spill Contractors

Certified Oil Spill Response Organizations (OSROs) are under contract by Phillips 66 Pipeline LLC for use in this area. Oil Spill Response Limited (OSRL) and associated STAR Contractors are used globally.

The Phillips 66 Pipeline LLC Emergency Response Action Plan (ERAP) contains specific contact and resource information for these companies. In addition, these OSROs are invited to participate in training and pre-planning exercises with Phillips 66 Pipeline LLC local and regional response teams. OSROs and Co-Ops can be relied upon for an appropriate level of response, with spill response equipment and trained personnel.

EMERGENCY CONTACT: 1-877-267-2290

PRODUCTS/ DOT GUIDEBOOK ID#/ GUIDE#:

Avgas	1863	128
Butane	1075	115
Diesel	1202	128
Ethanol	1170	127
Gasoline	1203	128
Kerosene	1223	128
Naphtha	1268	128
Propane	1075	115

KANSAS COUNTIES OF OPERATION:

Allen	Johnson
Anderson	Kingman
Barber	Lyon
Butler	McPherson
Coffey	Miami
Comanche	Reno
Cowley	Sedgwick
Franklin	Sumner
Greenwood	Woodson
Harper	Wyandotte
Harvey	

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

Response Plans and Maps

To view and download emergency response plans and procedures, visit <https://my.spatialobjects.com/erpp/home>.

To view maps of our locations, visit <https://www.phillips66pipeline.com/maps/>



ADDITIONAL INFORMATION AND RESOURCES

Visit the following industry and government sites for important safety references and educational materials.

National Association of State Fire Marshal's "Pipeline Emergencies"
www.pipelineemergencies.com

PHMSA Emergency Response Guidebook
www.phmsa.dot.gov/hazmat/erg/emergency-response-guidebook-erg

National Pipeline Mapping System
www.npms.phmsa.dot.gov

Phillips 66 Pipeline LLC ERAP Portal
<https://my.spatialobjects.com/erpp/home>

Pipelines and Informed Planning Alliance
<http://primis.phmsa.dot.gov/comm/pipa/landuseplanning.htm>

CONTACT

PHILLIPS 66 PIPELINE LLC

Phillips 66 Pipeline LLC Headquarters
 2331 Citywest Blvd
 Houston, TX 77042
www.phillips66pipeline.com

Local Contacts

Robert McKenzie
 2400 E 37th Street N
 Wichita, KS. 67219
 Phone: 316-821-2260
Robert.J.McKenzie@p66.com
 Counties covered: Barber, Butler, Comanche, Cowley, Greenwood, Harper, Harvey, Kingman, McPherson, Reno, Sedgwick, Sumner

Rusty Lee
 2029 Fairfax Trafficway
 Kansas City, KS 66115
 Phone: 913-342-0510 Ext 7001
Rusty.D.Lee@p66.com
 Counties covered: Wyandotte

Denny Landess
 25760 W. 343rd St
 Paola, KS 66071
 Phone: (+1) 913-294-2166 x17
Denny.A.Landess@p66.com
 Counties covered: Anderson, Coffey, Franklin, Greenwood, Johnson, Lyon, Miami, Wyandotte

Non-Emergency Phone Number
 800-231-2566

Emergency Phone Number
 877-267-2290



Headquarters
Plains Pipeline, L.P.
333 Clay St., Ste 1600
Houston, TX 77002
Website: www.plains.com

COMPANY OVERVIEW

Plains Pipeline, L.P. is engaged in the interstate and intrastate gathering, transportation, storage, and marketing of crude oil, as well as the marketing of refined products and liquefied petroleum gas (LPG). Plains is one of the largest independent midstream crude oil companies in North America, handling over 7 million barrels of crude oil per day through our extensive network of assets located in key producing basins and transportation gateways in the United States and Canada.

Plains Pipeline, L.P. owns and operates approximately 49 miles of regulated crude oil gathering pipelines and several hundred miles of non-regulated crude oil gathering pipelines throughout western Kansas.

COMMUNICATIONS

Plains Pipeline, L.P. utilizes its 24-hour Pipeline Control Center in Midland, Texas (1-800-708-5071) as a hub of communications in emergency response situations. The control room contains computer systems designed to continuously monitor real-time operational data, up to and including measurement of product quantities injected and delivered through the pipelines, product flow rates, and pressure and temperature variations. In the event deviations from normal flow conditions are detected, a trained pipeline controller will analyze the conditions to determine whether the abnormal conditions indicate a pipeline leak. The controller takes appropriate action based on this information.

Pump stations, storage facilities and meter measurement points along the pipeline systems are linked by telephone, microwave, satellite or radio communication systems for remote monitoring and/or control by the Pipeline Control Center. In addition, Plains utilizes cellular phones and satellite telephones for notifications and emergency response operations.

EMERGENCY RESPONSE CAPABILITY & PLAN

Plains Pipeline, L.P. has established a written emergency plan and procedures in the event of an emergency situation that will, as necessary, promptly shut down and isolate a pipeline, dispatch first responders and take measures to protect human health and the environment. Plains maintains emergency response equipment at strategically located facilities and has obtained, through contract, private emergency response resources, equipment, and/or personnel to ensure a rapid organized and safe response to any emergency situation.

Plains routinely conducts mock emergency response drills, utilizing an expandable Incident Command System, to practice emergency preparedness and procedures.

For more information regarding Plains' Emergency Response Plan and Procedures, please contact us at pipelineawareness@plains.com.

PIPELINE MAPPING

The Department of Transportation (DOT) maintains a website that allows public access to pipeline maps showing all pipelines in your county that are subject to DOT pipeline safety regulations. Go to www.npms.phmsa.dot.gov. This website also provides access to the Pipeline Integrity Management Mapping Application (PIMMA). The application contains sensitive pipeline infrastructure information that can be viewed by only those directly employed with a government agency. For mapping specific to Plains Pipeline, please contact us at pipelineawareness@plains.com.

24-Hour Emergency Contact: 1-800-708-5071

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:
Crude Oil 1267 128

KANSAS COUNTIES OF OPERATION:

Barber	Montgomery
Clark	Russell
Comanche	Scott
Hodgeman	Wallace

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

SPILL RESPONSE EQUIPMENT

Plains Pipeline, L.P. maintains emergency response equipment at strategically located facilities. This equipment includes spill boom (of various types, sizes and lengths as needed in different areas) sorbent materials, boats, motors, hand tools, power tools, pumps, hoses, personal protective equipment, first aid and miscellaneous supplies. Emergency response equipment is maintained at all Plains facilities. For detailed information, please contact us at pipelineawareness@plains.com.

CONTACT

Plains Public Awareness: 800-406-7159





Scout Energy Management, LLC, is an SEC registered investment advisor and an affiliate of Scout Energy Partners known collectively as Scout. Scout is a private energy investment manager and an upstream oil and gas operator with assets from North Dakota through the Central Plains to South Texas. The Scout Operations Center, located in Ulysses, Kansas, operates in 8 counties of Southwest Kansas. Scout operates & contract operates 1.8 miles of regulated Intra-state pipeline in 2 of the 11 counties. Scout operates 205 compressors with approximately 121,000 horsepower available, which delivers an average of 217 MMCFD from 6,200 wells. The Scout operated pipeline consists of approximately 4000 miles of gathering pipeline & compression stations scattered within a 55-mile radius of Ulysses. Company headquarters are located in Dallas, Texas.

COMMITMENT TO SAFETY, HEALTH & ENVIRONMENT

A fundamental commitment at Scout Energy is the protection our employees, our contractors, the public, and the environment. Scout's HSE policy guides all of our activities and will not be compromised in any business endeavor.

We will:

- Comply with all applicable environmental, health and safety laws and regulations.
- Implement the HSE Policy through demonstrated leadership and the application of appropriate resources.
- Assign responsibility and accountability throughout Scout for HSE performance by setting quantifiable goals, tracking progress and reporting results.
- Anticipate and manage risk through business processes that emphasize prevention but prepare us to effectively respond in the event of an incident.
- Train our employees so we can operate safely and meet our HSE commitment.
- Expect that all contractors and other parties engaged in activities on our operated properties comply with our standards as well as all applicable HS&E laws and regulations.
- Conduct reviews and evaluations of our assets and operations as appropriate to identify hazards, verify compliance, and continuously improve HS&E performance.

24-Hour Emergency Contact: 1-866-645-3511

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:
Natural Gas 1971 115

KANSAS COUNTIES OF OPERATION:

Finney	Morton
Grant	Stanton
Haskell	Stevens
Kearney	

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

PRODUCTS TRANSPORTED

Product: Natural Gas

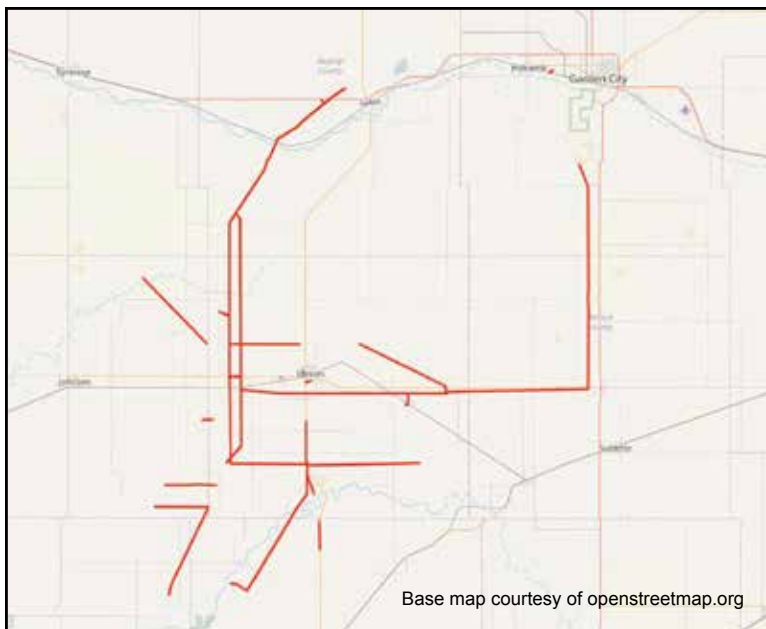
Leak Type: Gas

Vapors: Lighter than air and will generally rise and dissipate. May gather in a confined space and travel to a source of ignition.

Health Hazards: Will be easily ignited by heat, sparks or flames and will form explosive mixtures with air. Vapors may cause dizziness or asphyxiation without warning and may be toxic if inhaled at high concentrations. Contact with gas or liquefied gas may cause burns, severe injury and/or frostbite.

HOW TO GET ADDITIONAL INFORMATION

For an overview of Scout Energy Management, LLC's HSE Program contact our HSE Manager's Office at 972-325-1170.



Base map courtesy of openstreetmap.org





PONY EXPRESS PIPELINE

The approximately 900-mile Pony Express (PXP) crude oil pipeline originates in Guernsey, Wyo., and runs through Colorado, Nebraska and Kansas, connecting with three refineries before terminating in Cushing, Oklahoma. PXP sources oil from the Bakken, Denver Julesburg and Powder River plays, delivering five distinct common streams for our customers – Bakken Light Sweet, Mixed Sweet, Niobrara, Pony Express Light and Central Kansas Uplift – to the Cushing oil hub for distribution to markets across the country. Placed in service in 2014, Pony Express has a transportation capacity of more than 400,000 barrels a day. The pipeline is constructed of 22- and 24-inch steel pipe and has an average MAOP of 900.

ROCKIES EXPRESS PIPELINE

Rockies Express Pipeline (REX) is one of the United States' largest pipelines and is the nation's northernmost bi-directional natural gas header system. The pipeline is jointly owned by Tallgrass (75 percent) and Phillips 66 (25 percent). REX became fully operational in 2009 and stretches about 1,700 miles from northwestern Colorado and Wyoming to eastern Ohio. Built with 42- and 36-inch diameter steel pipe, REX taps major supply basins in the Rocky Mountain and Appalachian regions and serves energy markets across a vast segment of North America. REX has a long-haul capacity of 4.4 billion cubic feet per day of natural gas and an MAOP of 1,480.

TALLGRASS INTERSTATE GAS TRANSMISSION

Tallgrass Interstate Gas Transmission (TIGT) owns and operates approximately 4,650 miles of natural gas transportation pipelines in Colorado, Wyoming, Kansas, Nebraska and Missouri. To help balance seasonal loads, TIGT also owns the Huntsman natural gas storage facility, located in Cheyenne County, Nebraska, which has approximately 16 billion cubic feet of storage capacity. The pipeline is constructed of between 2- and 24-inch steel pipe and has an average MAOP of 750. TIGT serves, through local distribution companies (LDCs), largely rural residential, commercial, and agricultural customers in Colorado, Kansas, Nebraska, Wyoming and Missouri. TIGT also delivers natural gas for a significant number of commercial and industrial loads, including ethanol and power plants.



24-Hour Emergency Contact:

Pony Express Pipeline
855-220-1762

Rockies Express Pipeline
877-436-2253

Tallgrass Interstate Gas Transmission
888-763-3690

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:

Crude Oil	1267	128
Natural Gas	1971	115

KANSAS

COUNTIES OF OPERATION:

Pony Express Pipeline (PXP)

Butler	McPherson
Cowley	Norton
Decatur	Osborne
Ellsworth	Rawlins
Graham	Rooks
Harvey	Sedgwick
Lincoln	

Rockies Express Pipeline (REX)

Brown	Marshall
Doniphan	Nemaha

Tallgrass Interstate Gas Transmission (TIGT)

Barton	Ness
Cheyenne	Norton
Decatur	Osage
Dickinson	Osborne
Ellis	Ottawa
Finney	Phillips
Franklin	Rawlins
Geary	Reno
Gove	Republic
Graham	Rooks
Grant	Rush
Greeley	Scott
Hamilton	Sheridan
Johnson	Sherman
Kearny	Smith
Lane	Thomas
Lincoln	Trego
Logan	Wabaunsee
Lyon	Wallace
Miami	Wichita
Morris	

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

COMMITMENT TO SAFETY, HEALTH AND ENVIRONMENT

Tallgrass operates Pony Express Pipeline, Rockies Express Pipeline, Tallgrass Interstate Gas Transmission and Trailblazer Pipeline. Tallgrass takes seriously its responsibility to ensure the health and safety of our employees, the general public and the environment. We comply with all federal, state and local laws and regulations, and we

meet or exceed industry standards and best practices. Highly trained and experienced personnel monitor our pipelines 24 hours a day, 7 days a week using sophisticated Supervisory Control and Data Acquisition (SCADA) systems so we have real-time information regarding the safety and integrity of our pipeline. We patrol our pipelines by foot, vehicle and aircraft to ensure safety and identify potential concerns such as encroachments.

We have emergency shut-down systems that can isolate anomalies anywhere in our system quickly and safely. As part of our ongoing education efforts, we work regularly with first responders – using tools such as tabletop exercises and hands-on mock drills – to ensure they are familiar with our assets and know what to do in the unlikely event of an emergency. In addition, Tallgrass is an active member of Common Ground Alliance, working together to educate stakeholders on pipeline safety and to promote safe excavation.

For more information about our commitment to safety and our public awareness, damage prevention and emergency preparedness activities and resources, please visit www.tallgrass.com or contact Tallgrass directly.

Map is available upon request.





COMMITMENT

Targa Resources (Targa) is a leading provider of midstream services and is one of the largest independent midstream infrastructure companies in North America. Targa owns and operates more than 33,500 miles of natural gas, crude oil, natural gas liquids, and refined products pipelines across 7 states.

Targa is committed to the protection of the public and the environment through the safe operation and maintenance of its pipeline systems. Qualified personnel are trained in emergency response activities and participate in drills and exercises reflecting various types of response levels and emergency scenarios.

Targa has committed the necessary resources to fully prepare and implement emergency response plans and has obtained through contract the necessary private personnel and equipment to respond, to the maximum extent practicable, to a "worst case" discharge or substantial threat of such a discharge.

COMMUNICATIONS

Targa 24-Hours Pipeline Control Centers located in Sulphur, Louisiana and Tulsa, Oklahoma are used as hubs for communications in all emergency situations. On-site communications are conducted via cell phone, and/or portable radios and land lines.

EMERGENCY RESPONSE EQUIPMENT

Equipment and materials necessary for emergency response are kept at local Targa facilities. These materials may include: spill boom, sorbent materials, boats, motors, hand and power tools, pumps, hoses, personal protective equipment, first aid and miscellaneous supplies.

OIL SPILL CONTRACTORS

Targa maintains agreements with Certified Oil Spill Response Organizations (OSROs). These groups can be relied upon for an appropriate level of response with spill response equipment and trained personnel.

IF YOU ARE A PUBLIC SAFETY OFFICIAL ...

...you know to take whatever steps you deem necessary to safeguard the public in the event of a pipeline emergency. The following suggestions are offered as a guide:

- Secure the area around the leak to a safe distance. This could include the evacuation of people from homes, businesses, schools, and other locations, as well as the erection of barricades to control access to the emergency site and similar precautions.
- If the pipeline leak is not burning, take steps to prevent ignition. This could include prohibiting smoking, rerouting traffic, and shutting off the electricity and gas supply.
- If the pipeline leak is burning, try to prevent the spread of fire but do not attempt to extinguish it. Burning petroleum products: will not explode. If the fire is extinguished, gas or vapor will collect and could explode when reignited by secondary fires.
- Contact the pipeline company as quickly as possible. Pipeline marker signs show the pipeline company's name, emergency telephone number, and pipeline contents.

TARGA'S ACTIONS DURING AN EMERGENCY

We will immediately dispatch personnel to the site to help handle the emergency and to provide information to public safety officials to aid in the response to the emergency. We will also take the necessary operating actions starting and stopping equipment, closing and opening valves, and similar steps to minimize the impact of the leak.

EMERGENCY CONTACT: 1-800-722-7098

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:		
Natural Gas	1971	115

KANSAS COUNTIES OF OPERATION:

Barber	Harper
Comanche	Sumner

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

Public safety personnel and others unfamiliar with the pipeline involved in the emergency should not attempt to operate any of the valves on the pipeline. Improper operation of the pipeline valves could make the situation worse and cause other accidents to happen.

IF YOU OR YOUR COMPANY PERFORMS EXCAVATION WORK ...

... or if you are a homeowner or a farmer who occasionally digs on your property, we need your help in preventing pipeline emergencies. Records show that damage from excavation-related activities, particularly from equipment digging into pipelines, is the number one cause of pipeline accidents. Without proper coordination, excavation activities in the vicinity of underground pipelines can result in very dangerous situations.

LOOK FOR PIPELINE MARKERS

To determine if there are pipelines in the area where excavation is planned, look for pipeline markers at nearby roads, railroads and fences. Don't try to guess the route or location of the pipeline from where the markers are placed. Call the pipeline company at the telephone number shown on the marker at least 48 hours before you dig. Most states legally require excavators to call "One-Call."

They will send a representative to mark the exact location and route and depth of the pipeline at no charge.

WHAT TO DO IF YOU ARE DIGGING AND DISTURB A PIPELINE

Even if you cause what seems to be only minor damage to the pipeline, notify the pipeline company immediately. A gouge, scrape, dent, or crease to the pipe or coating may cause a future break or leak. It is imperative that the pipeline owner inspects and repairs any damage to the line.

For more information on Targa's Pipeline Emergency Response Plan, please visit our corporate website or contact the following email address:
www.targaresources.com or
public-awareness@targaresources.com

IF YOU LIVE OR WORK NEAR A PIPELINE, HOW CAN YOU TELL WHERE A PIPELINE IS LOCATED? LOOK FOR THESE SIGNS:



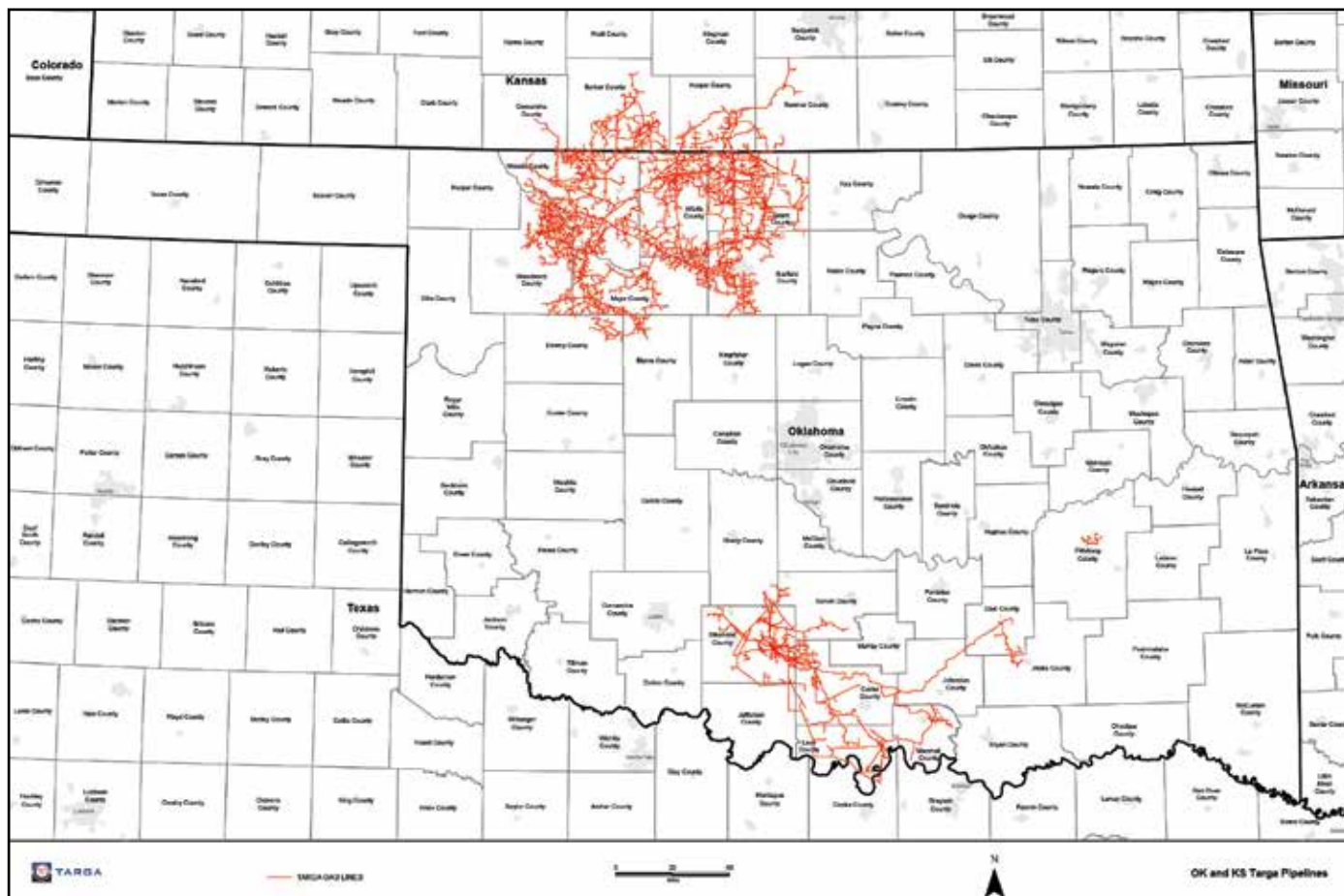
Located near roads, railroads and along pipeline right-of-ways

Painted metal or plastic posts

Pipeline casing vent

Marker for pipeline patrol plane

NOTE: Emergency phone numbers on signs.



KANSAS:

COUNTIES OF OPERATION

Brown, Butler, Clark, Clay, Comanche, Cowley, Dickinson, Doniphan, Edwards, Ford, Geary, Jackson, Kiowa, Marion, Marshall, McPherson, Meade, Nemaha, Pottawatomie, Reno, Rice, Riley, Saline, Stafford, Washington.

ABOUT TC ENERGY

For more than 70 years, TC Energy has been safely operating pipelines, storage facilities and power-generation plants in the U.S., Canada and Mexico. We operate more than 57,900 miles of natural gas pipelines and 3,000 miles of liquids (crude oil) pipelines, transporting the energy that Americans use every day.

CONTACT INFORMATION

For more detailed information, please contact our Public Awareness team at:

1-855-458-6715

public_awareness@tcenergy.com

www.tcenergy.com/sustainability/safety/safe-digging/

You can obtain access to view maps for TC Energy pipeline and facilities by following instructions at:

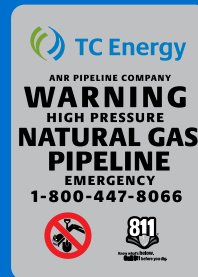
www.npms.phmsa.dot.gov



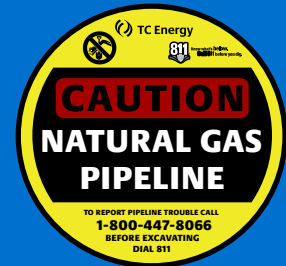
RIGHT-OF-WAY SIGNS

Pipeline marker signs are placed along the right-of-way at road crossings, railway crossings and watercourse crossings. They display the name of the operator, product and emergency contact number.

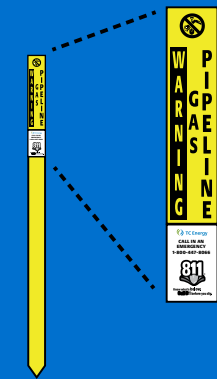
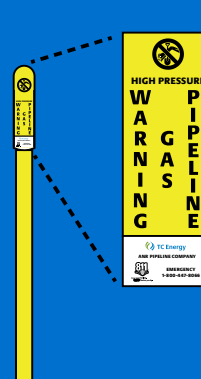
MARKER SIGNS



MARKER
"BULLET" POST



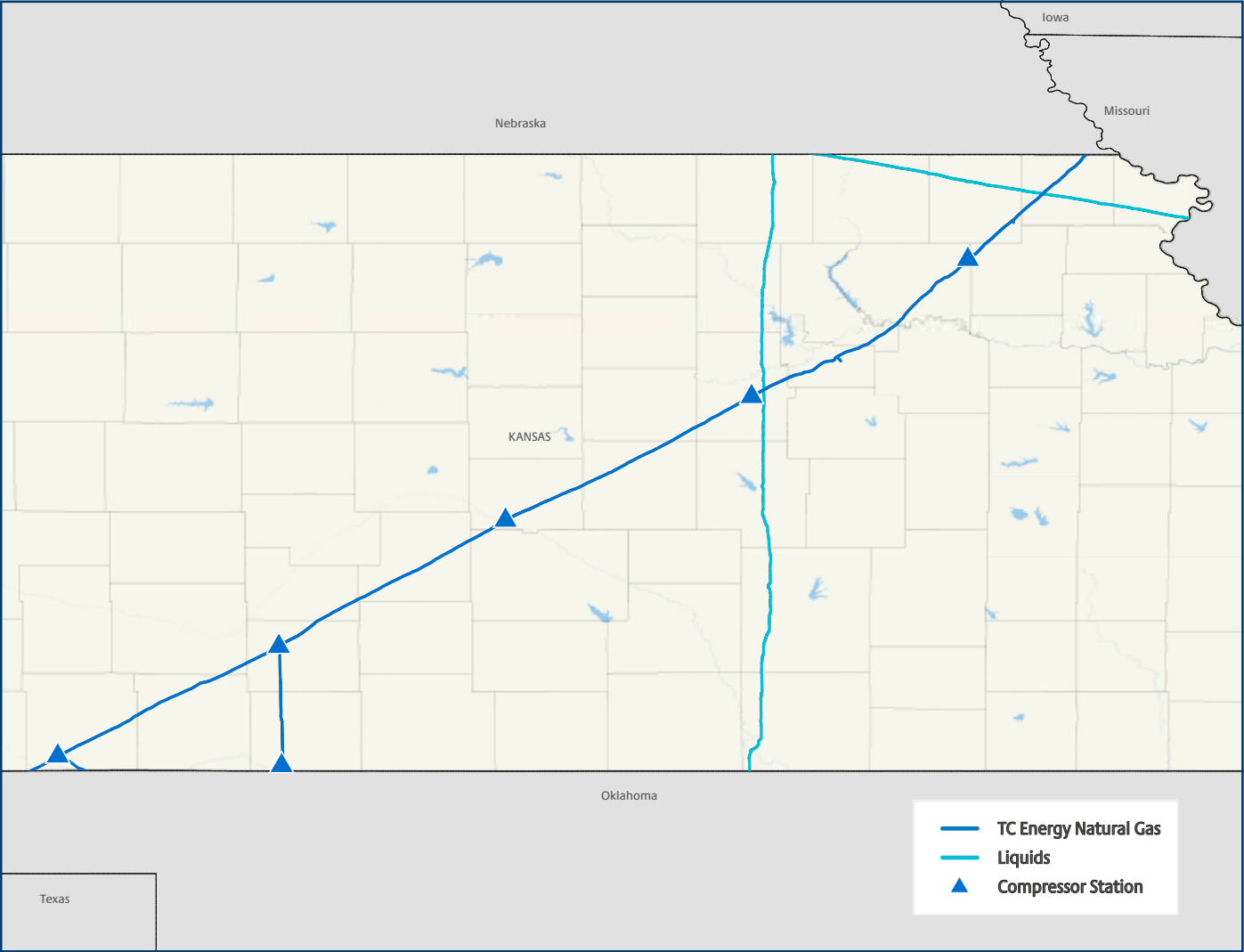
MARKER
"SLAT" POST



EMERGENCY CONTACTS:
See Map On Back

KANSAS:

TC ENERGY OPERATIONS MAP



Emergency numbers

Use the map above to find the emergency number for pipelines in your area.
In the case of an emergency, if you dial the wrong number, your call will be directed to the appropriate operator.

TC Energy Natural Gas 1-800-447-8066
Liquids 1-866-920-0007



TUMBLEWEED MIDSTREAM

41707 County Road P
Cheyenne Wells, CO 80810
Phone: (719) 767-8602

Website: www.tumbleweedmidstream.com

ABOUT TUMBLEWEED MIDSTREAM

Tumbleweed Midstream was founded and began operation of the Ladder Creek Gathering system and Ladder Creek Helium Plant in 2019. The Ladder Creek Gathering system serves natural gas producers operating in eastern Colorado and western Kansas. The system includes 42 miles of NGL pipeline and 23 miles of residue gas pipeline.

More information on Tumbleweed Midstream can be found at:
www.tumbleweedmidstream.com.

WHAT ARE THE SIGNS OF A NATURAL GAS PIPELINE LEAK?

- Blowing or hissing sound
- Dust blowing from a hole in the ground
- Continuous bubbling in wet or flooded areas
- Gaseous or hydrocarbon odor
- Dead or discolored vegetation in a green area
- Flames, if a leak has ignited

WHAT DOES TUMBLEWEED MIDSTREAM DO IF A LEAK OCCURS?

PROTECT LIFE

- Follow Emergency Response Plan(s) as applicable
- Evacuate personnel and public to a safe point and isolate area
- Provide safe rescue of personnel
- Provide first aid; call EMS

MITIGATE SITUATION

- Shut off hazardous energy sources
- Find closest valve to limit fuel to site
- Call appropriate agencies

COMMUNICATE UP

- Employees – inform supervisors of emergency
- Supervisors – assess the situation and keep lines of communication open to both on-site employees and operations management

SECURE SITE

- Control traffic
- Setup safe perimeter/evaluate wind (use gas detection meter)
- Cooperate with law enforcement and appropriate agencies
- Refer media to spokesperson



MAINTAINING SAFETY AND INTEGRITY OF PIPELINES

Tumbleweed Midstream invests significant time and capital maintaining the quality and integrity of their pipeline system. Active pipelines are monitored 24 hours a day via manned control centers.

Tumbleweed Midstream participates in Kansas811, a qualified one-call center and utilizes aerial surveillance and/or non-ground observers to identify potential dangers. Control center personnel continually monitor the pipeline system and assess changes in pressure and flow. They notify field personnel if there is a possibility of a leak. Automatic shut-off valves are sometimes utilized to isolate a leak.



24-Hour Emergency Contact: 1-719-767-8700

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:

Natural Gas Liquids	1972	115
Natural Gas	1971	115

KANSAS COUNTIES OF OPERATION:

Greeley

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

You can also find out where other companies' pipelines are in your area by going to the National Pipeline Mapping System website at www.npms.phmsa.dot.gov.

EMERGENCY RESPONSE PLANS

An Emergency Response Plan is developed for each pipeline and facility to contain, control and mitigate the various types of emergency conditions/situations that could occur at one of our facilities. For more information regarding Tumbleweed Midstream Ladder Creek Pipelines emergency response plans and procedures, contact us at info@tumbleweedmidstream.com or 719-767-8602.



Pipeline Diameter: 4" to 8"



Headquarters:
One Williams Center
PO Box 2400
Tulsa, OK 74172
Phone: 800-945-5426

Local Office:
Williams Mid-Continent Fractionation
839 Kiowa Rd
McPherson, KS 67460
Phone: 620-834-2100

Williams is one of North America's largest natural gas gatherers and processors, dedicated to becoming the most reliable midstream service provider in the industry. We are focused on running largescale assets and running them well.

The Bluestem Pipeline is a 189.2 mile-long, 16-inch diameter Natural Gas Liquid (NGL) pipeline in Kansas and Oklahoma. The Bluestem system is designed to initially transport 110,000 BPD with an ultimate planned design flow rate of 225,000 BPD of Y- Grade NGL. The primary source of the NGL flowing into Conway is from the existing Overland Pass Pipeline (OPPL) system. The OPPL currently transports NGL from southern Wyoming and Northern Colorado into salt cavern storage at the Mid-Continent Fractionation and Storage facility. Bluestem will receive NGL from

storage at Conway and transport it south for delivery to Targa Resources at Kingfisher, OK.

Williams, through its subsidiaries, finds, produces, gathers, processes, and transports natural gas. Williams' operations are concentrated in the Pacific Northwest, Rocky Mountains, Gulf Coast and Eastern Seaboard. More information is available at <http://www.williams.com>.

COMMITMENT TO SAFETY, HEALTH & ENVIRONMENT

Williams is committed to safety and reliability. Overland Pass Pipeline is monitored 24 hours a day, seven days a week by highly skilled operations personnel using sophisticated, state-of-the-art technology. Our company has a long-standing mission to be an exceptional neighbor in the communities where we have operations. Williams' employees volunteer, donate money, and serve on boards of nonprofit organizations. We pride ourselves on promoting responsible development, being responsible operators and working with landowners, government, and regulatory agencies.

EMERGENCY PREPAREDNESS

As partners in safety, we value the unique skills and expertise of our local emergency response organizations. Working together, the energy industry and emergency response agencies have built positive, collaborative relationships. Company representatives meet regularly with firefighters, emergency management officials, law enforcement officers, public officials, and planning agencies to review emergency response procedures.

24-Hour Emergency Contact: 1-855-945-5762

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:
Natural Gas Liquids

KANSAS COUNTIES OF OPERATION:

Harper	Sedgwick
McPherson	Sumner
Reno	

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

In case of an emergency, Williams will immediately dispatch personnel to the site to help handle the emergency and to provide information to emergency responders. We will also take the necessary operating actions – starting and stopping equipment, closing, and opening valves, and other steps – to minimize the impact of the emergency. Emergency Response Plans have been developed by Williams in conjunction with existing emergency plans developed by federal, state, and local authorities. These plans are presented annually to the local emergency planning organizations.

For more information on our Emergency Response Plans, please call:

Kody Cox
839 Kiowa Rd.
McPherson, KS 67460
Phone: 620-654-6461
Kody.Cox@Williams.com





Headquarters:
One Williams Center
PO Box 2400
Tulsa, OK 74172
Phone: 800-945-5426

Local Office:
Williams Mid-Continent Fractionation
839 Kiowa Rd
McPherson, KS 67460
Phone: 620-834-2100

Today, more than 20 million barrels of storage for ethane, propane, butane, natural gasoline and naphtha can be found at Williams' Conway facilities. This underground storage meets the needs of customers by providing rail, truck and high-volume product movements from four distinct facilities – Conway Underground East, Conway West, Mitchell and Hutchinson Rail Facility.

Along with a 107,000-plus barrel per day fractionator, these caverns make Conway a vital hub for a major portion of hydrocarbons moving through the Midwest.

Conway East:

- Rail dock is capable of spotting 30 rail cars at once. The automated truck dock simultaneously can service four truck loading and two unloading
- Connects to eight pipelines

Mitchell:

- 31 active caverns with flow rates of 5,000 barrels per hour of ethane propane mix and 3,000 barrels per hour of propane
- Connected to Conway West with a 10-inch propane line, a 16-inch ethane-propane line and a 12-inch brine line

Conway West:

- 49 active caverns, some with 20-inch casing, were designed to handle the high flow rates needed to service the Conway hub

Hutchinson Rail Facility:

- Rail loading and unloading facility that can pipeline NGL's from Hutchinson to Conway Storage Caverns.
- Temporarily stores NGL Products with the capacity of 44,000 Barrels in above ground storage tanks.
- Capable of staging 150 railcars on site with direct connection to the BNSF railroad

Conway Fractionator:

- Sits adjacent to Conway West and is jointly owned by Williams Partners, L.P., ConocoPhillips and ONEOK
- Operated by Williams
- Receives liquid demethanized mix from Oklahoma, Colorado, Texas, New Mexico, Wyoming

- Process separates the demethanized mix into its five components by thermal distillation: ethane/propane mix, propane, iso butane, normal butane and natural gasoline
- These purity products are either stored in an underground cavern or moved to one of the pipelines located in the area and transported to a petrochemical facility.

COMMITMENT TO SAFETY, HEALTH & ENVIRONMENT

During the past few years, significant maintenance and safety improvements have been made at Conway. Besides equipping the caverns at Conway East with safety devices such as: Emergency Shutdown valves, hazardous gas monitors, pressure transmitters, and fire detection probes along with other improvements, a battery of logs and integrity tests have been completed to assure the reliability of the cavern and well casing.

A total of 90 Williams employees operate the Conway-area facilities. These employees have a long history of running reliable, safe facilities and providing seamless product movements, processing and storage for an industry that operates 24 hours a day, seven days a week, 365 days a year.

24-Hour Emergency Contact: 1-855-945-5762

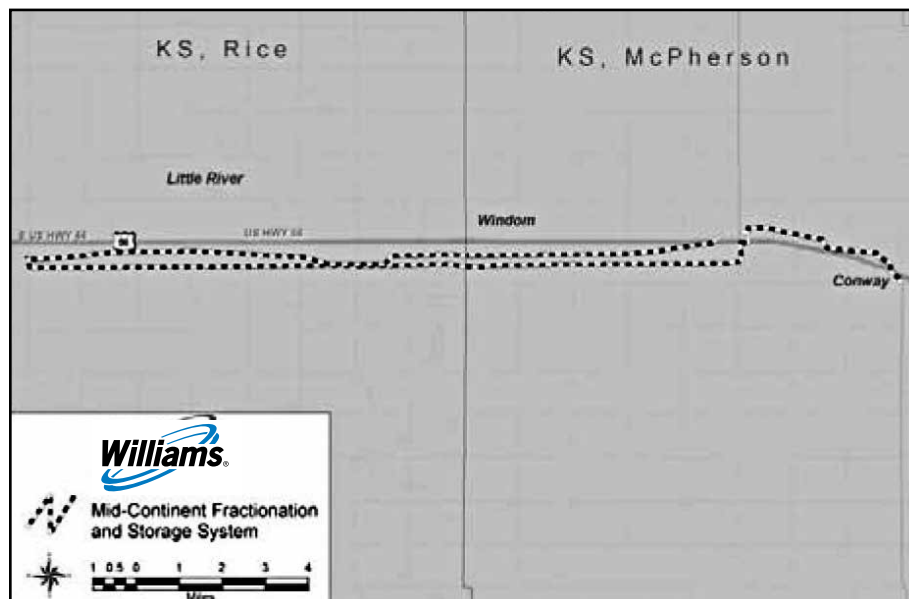
PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:
Natural Gas Liquids

KANSAS COUNTIES OF OPERATION:

McPherson Rice
Reno

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

For more information call 620-834-2100 or email PublicSafety@Williams.co





Website: www.williams.com **Email:** PublicSafety@Williams.com

Headquarters:
One Williams Center
PO Box 2400
Tulsa, OK 74172
Phone: 800-945-5426

Local Office:
Williams Mid-Continent Fractionation
839 Kiowa Rd
McPherson, KS 67460
Phone: 620-834-2100

Williams is one of North America's largest natural gas gatherers and processors, dedicated to becoming the most reliable midstream service provider in the industry. We're focused on running large-scale assets and running them well.

Overland Pass Pipeline Company is a joint venture that ONEOK Partners and Williams established in May 2006. The Overland Pass Pipeline includes a 760-mile natural gas liquids (NGL) pipeline from Opal, Wyo., to the Mid-Continent NGL market center in Conway, Kan., along with 150- and 125-mile extensions into the Piceance and Denver-Julesburg Basins in Colorado, respectively.

The Overland Pass Pipeline is designed to transport approximately 140,000 barrels per day of natural gas liquids.

Williams, through its subsidiaries, finds, produces, gathers, processes and transports natural gas. Williams' operations are concentrated in the Pacific Northwest, Rocky Mountains, Gulf Coast and Eastern Seaboard. More information is available at <http://www.williams.com>.

COMMITMENT TO SAFETY, HEALTH & ENVIRONMENT

Williams is committed to safety and reliability. Overland Pass Pipeline is monitored 24 hours a day, seven days a week by highly-skilled operations personnel using sophisticated, state-of-the-art technology.

Our company has a long-standing mission to be an exceptional neighbor in the communities where we have operations. Williams' employees volunteer, donate money and serve on boards of non-profit organizations. We pride ourselves on promoting responsible development, being responsible operators and working with landowners, government and regulatory agencies.

Emergency Preparedness

As partners in safety, we value the unique skills and expertise of our local emergency response organizations. Working together, the energy industry and emergency response agencies have built positive, collaborative relationships. Company representatives meet regularly with firefighters, emergency management officials, law enforcement

24-Hour Emergency Contact: 1-855-945-5762

PRODUCTS/DOT GUIDEBOOK ID#/GUIDE#:
Natural Gas Liquids

KANSAS COUNTIES OF OPERATION:

Barton	Rawlins
Cheyenne	Rice
Ellis	Russell
Ellsworth	Sheridan
Gove	Thomas
McPherson	Trego

Changes may occur. Contact the operator to discuss their pipeline systems and areas of operation.

officers, public officials, and planning agencies to review emergency response procedures. In case of an emergency, Williams will immediately dispatch personnel to the site to help handle the emergency and to provide information to emergency responders. We will also take the necessary operating actions – starting and stopping equipment, closing and opening valves, and other steps – to minimize the impact of the emergency.

Emergency Response Plans have been developed by Williams in conjunction with existing emergency plans developed by federal, state and local authorities. These plans are presented annually to the local emergency planning organizations. For more information on our Emergency Response Plans, please call:

Kody Cox
839 Kiowa Rd.
McPherson, KS, 67460
Phone: 620-654-6461
Kody.cox@williams.com



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This product information guide is a compilation from various material safety data sheet (SDS) sources. The information is presented in good faith and believed to be accurate, however we cannot guarantee that the health and safety precautions are adequate for all individuals and situations. This product information guide is not a substitute for SDS. It is the user's obligation to evaluate and use this information for reference purposes only. It is also the user's responsibility to contact the pipeline operators directly to request SDS and other product specifications for the materials transported in their pipelines.



OTHER NAMES:

- AMMONIA
- LIQUID AMMONIA
- NITRO-SIL
- SPIRIT OF HARTSHORN
- NH₃

CHEMICAL FAMILY:

ALKALI, INORGANIC
NITROGEN COMPOUND

CAS #:

7664-41-7

APPEARANCE:

COLORLESS CRYOGENIC
LIQUID OR GAS.

ODOR:

AMMONIACAL (STRONG)

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POTENTIAL HAZARDS

FIRE OR EXPLOSION

- May burn in the presence of open flames or sparks, but will not ignite readily.
- Autoignition temperature: 1,204° F.
- Slightly explosive in presence of reducing materials (hypochlorites or other halogenated compounds).
- Vapors are initially heavier than air and spread along ground.
- Products of ignition: Nitrogen oxides (NO, NO₂).

HEALTH

- Toxic; vapor poisonous if inhaled.
- Gas or liquid is extremely irritating and corrosive to body tissue (eyes, nose, throat, respiratory tract).
- Vapors release unpleasant, pungent, odor; vapors cannot be tolerated, even at low concentrations.
- 25 ppm: eye, nose and throat irritation begins.
- 300 ppm: immediate danger to life and health.
- 2500 ppm: laryngeal spasm resulting in rapid asphyxia.
- 5000 ppm: can cause immediate death.
- Contact with gas or liquid will burn skin and eyes, and cause severe injury or frostbite.
- Fire will produce irritating, corrosive and/or toxic fumes.

CORRECTIVE RESPONSE

FIRE

- Extinguishing Media: Dry chemical, CO₂, water spray, fog, or regular foam.
- Do not direct water directly into spilled liquid; water will warm cryogenic liquid resulting in greater gasification.
- Use water fog to suppress vapors.
- Cool containing vessels with water to prevent pressure build-up, autoignition or explosion; move vessels away from the incident area, if possible without risk.
- Contain run-off water for later recovery and treatment.

LEAK

- Isolate leak area immediately for at least 330 to 660 feet in all directions; adjust size of exclusion zone based on circumstances and threat of release.
- Gases are heavier than air and will spread along ground and collect in low or confined areas. Prevent entryway into waterways, sewers, basements or confined areas.
- Ventilate closed spaces before entering.
- Wear fully encapsulating, vapor protective clothing and breathing apparatuses when responding to leaks with no fire.
- Do not touch or walk through spilled material.

ENVIRONMENT

- Harmful to aquatic life in very low concentrations.
- Runoff from fire control may cause water pollution.

PUBLIC SAFETY

- Isolate leak area immediately for at least 330 to 660 feet in all directions; adjust size of exclusion zone based on circumstances and threat of release.
- Keep unauthorized personnel away.
- Stay upwind.
- Keep out of low areas.
- Ventilate closed spaces before entering.
- Approach from and maintain upwind location.

PROTECTIVE CLOTHING

- Wear positive pressure self-contained breathing apparatus (SCBA).
- Wear chemical protective clothing that is specifically recommended by the manufacturer. It may provide little or no thermal protection.
- Structural firefighters' protective clothing provides limited protection in fire situations ONLY; it is not effective in spill situations.

- Do not direct water at source or leak; may increase product temperature or cause icing to occur.
- Isolate area until gas has dispersed.

FIRST AID

- Move victim to fresh air.
- Call emergency medical service or 9-1-1.
- Apply artificial respiration if victim is not breathing.
- Do not use mouth-to-mouth method if victim ingested or inhaled the substance; induce artificial respiration with the aid of a pocket mask equipped with a one-way valve or other proper respiratory medical device.
- Administer oxygen if breathing is difficult.
- Remove and isolate contaminated clothing and shoes.
- In case of contact with liquefied gas, thaw frosted parts with lukewarm water.
- In case of contact with substance, immediately flush skin or eyes with running water for at least 30 minutes.
- Keep victim warm and quiet.
- Keep victim under observation.
- Effects of contact or inhalation may be delayed.
- Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves.

OTHER NAMES:

- LIQUID PETROLEUM GAS (LPG)
- N-BUTANE: "NORMAL" BUTANE
- BUTYL HYDRIDE
- LP GAS
- LPG
- LIQUEFIED BUTANE; ISO-BUTANE; 2-METHYLPROPANE
- TRIMETHYL METHANE
- "ISO" BUTANE MIX: FIELD GRADE BUTANE

CHEMICAL FAMILY:

PETROLEUM HYDROCARBON,
ALIPHATIC HYDROCARBON,
ALKANE, PARAFFIN

CAS #:

N-BUTANE: 106-97-8;
ISO-BUTANE: 75-28-5; BUTANE
MIX: MIXTURE

APPEARANCE:

COLORLESS

ODOR:

ODORLESS

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POTENTIAL HAZARDS**FIRE OR EXPLOSION**

- Extremely Flammable!
- Easily ignited by heat, spark or flames.
- Will form explosive mixtures with air.
- Vapors are heavier than air and can travel considerable distances to a source of ignition and flashback.
- May be explosive if allowed to enter into drains or sewers.

HEALTH

- Direct eye or skin contact with liquefied gas can result in skin/eye burns and/or frostbite.
- Inhalation of high concentrations (10,000 ppm) can cause drowsiness and mild intoxication.
- Higher concentrations (over 10,000 ppm) can cause loss of consciousness, asphyxiation and death.
- Fire may produce irritating and/or toxic gases.

CORRECTIVE RESPONSE**FIRE**

- Extinguishing media: Dry chemical, carbon dioxide (CO₂), water spray or fog.

Caution: EXTREMELY FLAMMABLE!
Evacuate area of all unnecessary personnel.

- Shut off source, if possible.
- Use water fog or spray to cool exposed equipment and containers.
- Allow fire to burn until gas flow is shut off, if possible.

LEAK

- Eliminate all sources of ignition (no smoking, flares, sparks or flames in immediate area).
- All equipment used when handling the product must be grounded.
- Use water spray to reduce vapors or divert vapor cloud drift.
- Do not direct water at source of leak.

PUBLIC SAFETY

- Isolate area immediately for at least 160 to 330 feet in all directions. If there is a large area affected, consider an initial downwind evacuation for at least 1/2 mile.
- Keep unauthorized personnel away.
- Stay upwind.
- Keep out of low areas.

PROTECTIVE CLOTHING

- Use NIOSH/MSHA approved self-contained breathing apparatus (SCBA).
- Structural firefighters' protective clothing will only provide limited protection.

FIRST AID

- Move victim to fresh air.
- Call emergency medical service or 9-1-1.
- Apply artificial respiration if victim is not breathing.
- Administer oxygen if breathing is difficult.
- Remove and isolate contaminated clothing and shoes.
- Clothing frozen to skin should be thawed before being removed.
- In case of contact with liquefied gas, thaw frosted parts with lukewarm water.
- Keep victim warm and quiet.
- Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves.

OTHER NAMES:

- CARBON DIOXIDE
- DRY ICE
- CO₂

CHEMICAL FAMILY:

CARBONATE

CAS #:

124-38-9

APPEARANCE:COLORLESS CRYOGENIC
LIQUID OR GAS.**ODOR:**

ODORLESS

POTENTIAL HAZARDS**FIRE OR EXPLOSION**

- Non-Flammable.
- Chemically active metals, sodium, potassium, or hot titanium may cause fire.

HEALTH

- Heavier than air gas will displace air and act as an asphyxiant.
- Inhalation of high concentrations of product can paralyze the respiratory center.
- Increased inhalation causes decreased breathing rate. Unconsciousness and death may result.
- Respiratory related medical problems are aggravated by exposure.
- Frostbite can occur on contact with liquid.

CORRECTIVE RESPONSE**FIRE**

- Keep chemically active metals, sodium, potassium, or hot titanium away from the incident area, as they can cause a fire to occur.

LEAK

- Evacuate all personnel from the area.
- Ventilate if in an enclosed space.
- Stop flow of gas as soon as can be done safely.
- Exhaust spills to the atmosphere until sufficient oxygen is available in the exposure area.

PUBLIC SAFETY

- Evacuate all personnel from the area.
- Keep area well ventilated. Heavier than air gas will displace air and act as an asphyxiant.

PROTECTIVE CLOTHING

- Wear self-contained pressure demand breathing apparatus.
- Wear eye protection, such as a face shield or goggles.
- Wear protective clothing, such as gloves and impervious clothing.

FIRST AID

- Remove victim to uncontaminated area and administer artificial respiration, such as CPR.
- Obtain medical assistance.

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OTHER NAMES:

- PETROLEUM CRUDE
- "SOUR CRUDE"

CHEMICAL FAMILY:

COMPLEX AND VARYING MIXTURE OF PARAFFINIC, OLEFINIC, NAPHTHENIC AND AROMATIC HYDROCARBONS. MAY CONTAIN SULFUR AND NITROGEN COMPOUNDS, OXYGENATED COMPOUNDS AND WATER

CAS #:

8002-05-9

APPEARANCE:

BLACK, BROWN, GREENISH OR AMBER LIQUID

ODOR:

MILD TO SULFUROUS

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POTENTIAL HAZARDS**FIRE OR EXPLOSION**

- Danger! Extremely flammable liquid and vapor.
- Vapors may cause flash fire or explosion.
- This product may liberate highly toxic and flammable hydrogen sulfide (H₂S) gas.

HEALTH

- The vapor space of drums or tank cars may contain hydrogen sulfide (H₂S) gas.
- Overexposure to naphthalene, a minor component of this product, may cause skin, eye and respiratory tract irritation, anemia, loss of vision, nervous system effects and kidney and thymus damage. Also, exposure to naphthalene has produced "respiratory tract" tumors in laboratory animals.
- Inhalation can cause severe central nervous system depression (including unconsciousness). Material has been related to cancer in humans. May cause headaches and dizziness. Repeated excessive exposures may cause blood disorders such as anemia and leukemia.
- Product may be absorbed through the skin in harmful amounts. May produce skin cancer with prolonged and repeated contact. Moderately irritating to the skin. Prolonged or repeated contact can result in defatting and drying of the skin, which may result in skin irritation and dermatitis (rash).
- Ingestion can be irritating to mouth, throat, and stomach. Product may be harmful or fatal if swallowed. Pulmonary aspiration hazard. After ingestion, may enter lungs and produce damage.

- Eyes: Moderately irritating to the eyes.
- Cancer hazard.
- May cause (target organ or system) damage. (e.g., lung, nervous system, blood disorders, liver, kidney, immune system, cardiovascular system, thyroid, testicular, ovarian, etc.).
- Pre-Existing Medical Conditions: The following diseases or disorders may be aggravated by exposure to this product: skin; eye; blood-forming organs; nervous system, respiratory system; lung (asthma-like conditions).

PUBLIC SAFETY

- The vapor space of drums or tank cars may contain hydrogen sulfide (H₂S) gas. The container should be carefully vented in a well-ventilated area away from people in order to dissipate this toxic and flammable head.
- Keep personnel upwind from leak.
- If this material is released into a work area, evacuate the area immediately.
- Approach from and maintain upwind location.

PROTECTIVE CLOTHING

- Use chemical splash goggles and face shield.
- Protective gloves are recommended when prolonged skin exposure cannot be avoided.
- Concentration in air determines the level of respiratory protection needed. Use only NIOSH certified respiratory equipment.

CORRECTIVE RESPONSE**FIRE**

- Extinguishing media: water spray; regular foam; dry chemical; carbon dioxide (CO₂).
- Use water spray

Note: Water or foam may cause frothing.

- Use water spray to cool fire-exposed tanks and containers.
- Wear structural fire-fighting gear.

LEAK

- Prevent ignition, stop leak and ventilate the area.
- Contain spilled liquid with sand or earth.
- Do NOT use combustible materials such as sawdust.
- Absorb spill with inert material, such as dry sand or earth, then place in a chemical waste container.
- Vacuum or sweep up material and place in a disposal container.
- Vapor can be controlled using a water fog.

- Water streams should not be directed to the liquid as this will cause the liquid to boil and generate more vapor.
- Keep personnel upwind from leak.
- If this material is released into a work area, evacuate the area immediately.
- Use appropriate personal protective equipment.

FIRST AID

- Inhalation: Remove victim to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen and continue to monitor. Get immediate medical attention.
- Skin: Wash with soap and water. Get medical attention if irritation develops or persists.
- Eye: Flush eye with water for 15 minutes. Get medical attention. If eye irritation persists, obtain medical treatment.
- Ingestion: Do not induce vomiting! Do not give liquids! Get medical attention immediately.
- Remove contaminated clothing. Wash clothing before reuse.
- Destroy contaminated shoes and other leather products.

OTHER NAMES:

- NATURAL GAS CONDENSATE
- GAS DRIPS

CHEMICAL FAMILY:

COMPLEX AND VARYING MIXTURE OF PARAFFINIC, OLEFINIC, NAPHTHENIC AND AROMATIC HYDROCARBONS. MAY CONTAIN SULFUR AND NITROGEN COMPOUNDS, OXYGENATED COMPOUNDS AND WATER

CAS #:

8002-05-9

APPEARANCE:

BLACK, BROWN, GREENISH OR AMBER LIQUID

ODOR:

MILD TO SULFUROUS

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POTENTIAL HAZARDS**FIRE OR EXPLOSION**

- Danger! Extremely flammable liquid and vapor.
- Vapors may cause flash fire or explosion.
- This product may liberate highly toxic and flammable hydrogen sulfide (H₂S) gas.

HEALTH

- The vapor space of drums or tank cars may contain hydrogen sulfide (H₂S) gas.
- Overexposure to naphthalene, a minor component of this product, may cause skin, eye and respiratory tract irritation, anemia, loss of vision, nervous system effects and kidney and thymus damage. Also, exposure to naphthalene has produced "respiratory tract" tumors in laboratory animals.
- Inhalation can cause severe central nervous system depression (including unconsciousness). Material has been related to cancer in humans. May cause headaches and dizziness. Repeated excessive exposures may cause blood disorders such as anemia and leukemia.
- Product may be absorbed through the skin in harmful amounts. May produce skin cancer with prolonged and repeated contact. Moderately irritating to the skin. Prolonged or repeated contact can result in defatting and drying of the skin, which may result in skin irritation and dermatitis (rash).
- Ingestion can be irritating to mouth, throat, and stomach. Product may be harmful or fatal if swallowed. Pulmonary aspiration hazard. After ingestion, may enter lungs and produce damage.

- Eyes: Moderately irritating to the eyes.
- Cancer hazard.
- May cause (target organ or system) damage. (e.g., lung, nervous system, blood disorders, liver, kidney, immune system, cardiovascular system, thyroid, testicular, ovarian, etc.).
- Pre-Existing Medical Conditions: The following diseases or disorders may be aggravated by exposure to this product: skin; eye; blood-forming organs; nervous system, respiratory system; lung (asthma-like conditions).

PUBLIC SAFETY

- The vapor space of drums or tank cars may contain hydrogen sulfide (H₂S) gas. The container should be carefully vented in a well-ventilated area away from people in order to dissipate this toxic and flammable head.
- Keep personnel upwind from leak.
- If this material is released into a work area, evacuate the area immediately.
- Approach from and maintain upwind location.

PROTECTIVE CLOTHING

- Use chemical splash goggles and face shield.
- Protective gloves are recommended when prolonged skin exposure cannot be avoided.
- Concentration in air determines the level of respiratory protection needed. Use only NIOSH certified respiratory equipment.

CORRECTIVE RESPONSE**FIRE**

- Extinguishing media: water spray; regular foam; dry chemical; carbon dioxide (CO₂).
- Use water spray

Note: Water or foam may cause frothing.

- Use water spray to cool fire-exposed tanks and containers.
- Wear structural fire-fighting gear.

LEAK

- Prevent ignition, stop leak and ventilate the area.
- Contain spilled liquid with sand or earth.
- Do NOT use combustible materials such as sawdust.
- Absorb spill with inert material, such as dry sand or earth, then place in a chemical waste container.
- Vacuum or sweep up material and place in a disposal container.
- Vapor can be controlled using a water fog.

- Water streams should not be directed to the liquid as this will cause the liquid to boil and generate more vapor.
- Keep personnel upwind from leak.
- If this material is released into a work area, evacuate the area immediately.
- Use appropriate personal protective equipment.

FIRST AID

- Inhalation: Remove victim to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen and continue to monitor. Get immediate medical attention.
- Skin: Wash with soap and water. Get medical attention if irritation develops or persists.
- Eye: Flush eye with water for 15 minutes. Get medical attention. If eye irritation persists, obtain medical treatment.
- Ingestion: Do not induce vomiting! Do not give liquids! Get medical attention immediately.
- Remove contaminated clothing. Wash clothing before reuse.
- Destroy contaminated shoes and other leather products.

OTHER NAMES:

- LP GAS
- Y-GRADE
- PG
- RAW FEED
- RAW PRODUCT

CHEMICAL FAMILY:

PETROLEUM DISTILLATE
ALIPHATIC & AROMATIC
HYDROCARBON

CAS #:

64741-48-6

APPEARANCE:

COLORLESS LIQUID UNDER
PRESSURE

ODOR:

HYDROCARBON ODOR

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POTENTIAL HAZARDS**FIRE OR EXPLOSION**

- Extremely flammable.
- Vapors form flammable or explosive mixtures with air at room temperature.
- Vapor/gas may spread to ignition sources and flashback.
- Explosion hazard if exposed to extreme heat or to physical or thermal shock.
- Combustion may produce COx, NOx, and SOx.

HEALTH

- Danger! Toxic hydrogen sulfide (H₂S) may be present in confined vapor spaces.
- H₂S can cause respiratory paralysis and death, depending on concentration and duration of exposure.
- Do not rely on ability to smell vapors, since odor fatigue occurs rapidly.
- Skin: Direct contact with gas under pressure may cause frostbite (cold burns) and skin damage.
- Eye: Vapors, fumes or mists may cause eye irritation.
- Inhalation: Asphyxiant gas; high concentrations can displace oxygen causing the feeling of suffocation and can cause central nervous system depression from oxygen deprivation. May cause cardiac sensitization.

- Potential reproductive hazard.
- Short-term contact may result in tissue destruction and severe burns.
- Cancer hazard.
- Contains Benzene, which is a known human carcinogen.
- Overexposure may cause systemic damage.

PUBLIC SAFETY

- Isolate area for 1 mile in all directions and deny entry to unnecessary people.
- Eliminate all sources of ignition.
- Remove victims from exposure into fresh air.
- Stay upwind and keep out of low areas.
- Containers can build up pressure if exposed to heat or fire; keep everyone away from storage tank ends.

PROTECTIVE CLOTHING

- Firefighters must wear NIOSH-approved positive pressure breathing apparatus (SCBA) with full face mask and full protective equipment.
- Wear safety glasses or goggles to prevent eye contact.
- Wear appropriate chemical protective gloves to avoid skin contact.
- Use appropriate respiratory protection, if ventilation cannot reduce airborne concentrations.

CORRECTIVE RESPONSE**FIRE**

- Extinguishing media: Dry chemical, carbon dioxide (CO₂), water spray, regular foam, or fog.

Caution: These products have a very low flashpoint. Use of water when fighting fire may be inefficient.

- Do not use a straight stream of water. Product will float and can be reignited on surface of water.

LEAK

- Eliminate all sources of ignition (no smoking, flares, sparks or flames in immediate area).
- All equipment used when handling this product must be grounded.
- Prevent entry into waterways, sewers, basements or confined areas.
- Absorb or cover with dry earth, sand or other non-combustible material and transfer to containers.
- Use clean non-sparking tools to collect absorbed materials.

FIRST AID

- Move victim to fresh air.
- Call emergency medical service or 9-1-1.
- Apply artificial respiration if victim is not breathing.
- Administer oxygen if breathing is difficult.
- Remove and isolate contaminated clothing and shoes.
- In case of contact with substance, immediately flush skin or eyes with running water for at least 20 minutes.
- Wash skin with soap and water.
- Keep victim warm and quiet.
- Ensure that medical personnel are aware of the material(s) involved and take precautions to protect themselves.

OTHER NAMES:

- DIESEL OIL 1 AND 2
- X GRADE
- X-1 DIESEL
- DISTILLATE BLEND
- MIDDLE DISTILLATE

CHEMICAL FAMILY:

PETROLEUM DISTILLATE
ALIPHATIC & AROMATIC
HYDROCARBON

CAS #:

68476-34-6

APPEARANCE:

CLEAR, STRAW-COLORED
LIQUID. (HIGH SULFUR MAY
BE DYED RED)

ODOR:

KEROSENE

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POTENTIAL HAZARDS**FIRE OR EXPLOSION**

- Highly Combustible! Easily ignited by heat, spark or flames.
- When heated above flashpoint, these materials will release flammable vapors, which if exposed to an ignition source, can burn in the open or be explosive in confined spaces.
- Mists or sprays may be flammable at temperatures below the normal flash point (130° F).
- Avoid contact with strong acids, alkalis, and oxidizers such as liquid chlorine and oxygen.

HEALTH

- Liquid is moderately irritating to eyes and skin.
- Release during high pressure may result in injection of oil into the skin causing local necrosis.
- Inhalation of vapors or mist may cause mild irritation to the upper respiratory tract.
- High concentrations may result in central nervous system depression, headache, dizziness, and nausea. In extreme cases, unconsciousness and death may occur.
- Inhalation of high levels of mist may result in chemical pneumonitis.
- Ingestion of product may result in vomiting; aspiration (breathing) of vomitus into the lung must be avoided as even small quantities may result in aspiration pneumonitis, evidenced by coughing, labored breathing, and cyanosis (bluish skin). In severe cases death may occur.

CORRECTIVE RESPONSE**FIRE**

- Extinguishing media: Dry chemical, carbon dioxide (CO₂), water spray, regular foam, or fog.

Caution: These products have a very low flashpoint. Use of water when fighting fire may be inefficient.

- Do not use a straight stream of water. Product will float and can be reignited on surface of water.

LEAK

- Eliminate all sources of ignition (no smoking, flares, sparks or flames in immediate area).
- All equipment used when handling this product must be grounded.
- Prevent entry into waterways, sewers, basements or confined areas.
- Absorb or cover with dry earth, sand or other non-combustible material and transfer to containers.
- Use clean non-sparking tools to collect absorbed materials.

PUBLIC SAFETY

- Isolate leak area immediately for at least 80 to 160 feet in all directions. If there is a large affected area, consider downwind evacuation for at least 1,000 feet.
- Keep unauthorized personnel away.
- Stay upwind.
- Keep out of low areas.
- Ventilate closed spaces before entering.

PROTECTIVE CLOTHING

- Do not enter confined space without full bunker gear (helmet with face shield, bunker coats, gloves and rubber boots), including a positive pressure self-contained breathing apparatus (SCBA).
- Structural firefighters' protective clothing will only provide limited protection.

FIRST AID

- Move victim to fresh air.
- Call emergency medical service or 9-1-1.
- Apply artificial respiration if victim is not breathing.
- Administer oxygen if breathing is difficult.
- Remove and isolate contaminated clothing and shoes.
- In case of contact with substance, immediately flush skin or eyes with running water for at least 20 minutes.
- Wash skin with soap and water.
- Keep victim warm and quiet.
- Ensure that medical personnel are aware of the material(s) involved and take precautions to protect themselves.

OTHER NAMES:

- BIMETHYL
- DIMETHYL
- ETHYL HYDRIDE
- METHYLMETHANE

CHEMICAL FAMILY:

HYDROCARBONS, GAS

CAS #:

74-84-0

APPEARANCE:

COLORLESS GAS

ODOR:

ODORLESS

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POTENTIAL HAZARDS**FIRE OR EXPLOSION**

- Extremely flammable. Will be easily ignited by heat, sparks or flames.
- Will form explosive mixtures with air.
- Vapor or gas may spread to ignition sources and flashback.
- Combustion may produce COx.
- Containers can build up pressure if exposed to heat (fire).

HEALTH

- Skin: Direct contact with compressed gas may cause frostbite (cold burns) and skin damage. Short-term contact may result in tissue destruction and severe burns.
- Eye: Direct contact with compressed gas may cause frostbite (cold burns) and permanent damage.
- Inhalation: Asphyxiant gas. High concentrations in the immediate area can displace oxygen causing the feeling of suffocation and can cause central nervous system depression from oxygen deprivation. May cause cardiac sensitization, including arrhythmia and death due to cardiac arrest, or other cardiac effects from severe or prolonged oxygen deprivation. Overexposure may cause systemic damage including target organ effects.

- Pre-existing respiratory, cardiovascular and nervous systems conditions may be aggravated by exposure.

PUBLIC SAFETY

- Eliminate and/or shut off ignition sources and keep ignition sources out of the area.
- Isolate area for 1 mile in all directions and deny entry to unnecessary people.
- Evacuate area endangered by release, as required.
- Stay upwind.
- Keep out of low areas.
- Do not eat, drink or smoke in areas of use or storage.

PROTECTIVE CLOTHING

- Firefighters must wear MSHA/NIOSH approved positive pressure breathing apparatus (SCBA) with full face mask and full protective equipment.
- Wear chemical safety goggles to prevent eye contact.
- Wear appropriate chemical protective gloves to avoid skin contact.
- Use appropriate respiratory protection, if ventilation cannot reduce airborne concentrations.

CORRECTIVE RESPONSE**FIRE**

- Extinguishing media: Use water spray, dry chemical, alcohol foam, all-purpose AFFF or carbon dioxide (CO₂).
- Do not attempt to extinguish fire if gas source cannot be shut off first.
- Isolate for 1 mile in all directions if tank, rail car or tank truck is involved in fire.
- Eliminate and/or shut off ignition sources and keep ignition sources out of the area.
- Be aware that a Boiling Liquid Expanding Vapor Explosion (BLEVE) may occur unless surfaces are kept cool with water. Stay away from storage tank ends, which can build up pressure if exposed to heat (fire).
- Withdraw immediately in case of rising sound from venting safety device on container or any discoloration of storage tank due to fire.

LEAK

- Isolate area for at least 160 to 330 feet to preserve public safety and deny entry. For large leaks, consider initial evacuation for at least 1/2 mile.
- Keep ignition sources out of area and shut off all ignition sources. Ground lines and equipment used during transfer to reduce the possibility of static spark-initiated fire or explosion. Use nonsparking tools.
- Ventilate area.

- Use water spray to reduce and disperse gas or vapor and to protect personnel attempting to stop a leak.
- Use water spray to cool adjacent structures and to protect personnel. Containers can build up pressure if exposed to heat (fire). Stay away from storage tank ends.
- If product is released into the environment, take immediate steps to stop and contain release.

FIRST AID

- Move victim to fresh air.
- Call 911 or emergency medical service.
- Give artificial respiration if victim is not breathing.
- Administer oxygen if breathing is difficult.
- Remove and isolate contaminated clothing and shoes.
- Clothing frozen to the skin should be thawed before being removed.
- In case of contact with liquefied gas, thaw frosted parts with lukewarm water.
- In case of burns, immediately cool affected skin for as long as possible with cold water. Do not remove clothing if adhering to skin.
- Keep victim warm and quiet.
- Ensure that medical personnel are aware of the material(s) involved and take precautions to protect themselves.

OTHER NAMES:

- E/P
- LP GAS
- LPG
- G-GRADE

CHEMICAL FAMILY:

MIXTURE OF ETHANE,
PROPANE, METHANE,
ISOBUTANE, N-BUTANE,
CARBON DIOXIDE

CAS #:

68475-58-1

APPEARANCE:

COLORLESS GAS

ODOR:

ODORLESS

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POTENTIAL HAZARDS**FIRE OR EXPLOSION**

- Extremely flammable. May explode if exposed to extreme heat or to physical or thermal shock.
- Vapors form flammable or explosive mixtures with air at room temperature.
- Vapor or gas may spread to ignition sources and flashback.
- Combustion may produce COx.
- Containers can build up pressure if exposed to heat (fire).

HEALTH

- Skin: Direct contact with compressed gas may cause frostbite (cold burns) and skin damage. Short-term contact may result in tissue destruction and severe burns.
- Eye: Direct contact with compressed gas may cause frostbite (cold burns) and permanent damage.
- Inhalation: Asphyxiant gas. High concentrations in the immediate area can displace oxygen causing the feeling of suffocation and can cause central nervous system depression from oxygen deprivation. May cause cardiac sensitization, including arrhythmia and death due to cardiac arrest, or other cardiac effects from severe or prolonged oxygen deprivation. Overexposure may cause systemic damage including target organ effects.

- Pre-existing respiratory, cardiovascular and nervous systems conditions may be aggravated by exposure.

PUBLIC SAFETY

- Eliminate and/or shut off ignition sources and keep ignition sources out of the area.
- Isolate area for 1 mile in all directions and deny entry to unnecessary people.
- Evacuate area endangered by release, as required.
- Stay upwind.
- Keep out of low areas.
- Do not eat, drink or smoke in areas of use or storage.

PROTECTIVE CLOTHING

- Firefighters must wear MSHA/NIOSH approved positive pressure breathing apparatus (SCBA) with full face mask and full protective equipment.
- Wear chemical safety goggles to prevent eye contact.
- Wear appropriate chemical protective gloves to avoid skin contact.
- Use appropriate respiratory protection, if ventilation cannot reduce airborne concentrations.

CORRECTIVE RESPONSE**FIRE**

- Extinguishing media: Use water spray, dry chemical, alcohol foam, all-purpose AFFF or carbon dioxide (CO₂).
- Do not attempt to extinguish fire if gas source cannot be shut off first.
- Isolate for 1 mile in all directions if tank, rail car or tank truck is involved in fire.
- Eliminate and/or shut off ignition sources and keep ignition sources out of the area.
- Be aware that a Boiling Liquid Expanding Vapor Explosion (BLEVE) may occur unless surfaces are kept cool with water. Stay away from storage tank ends, which can build up pressure if exposed to heat (fire).
- Withdraw immediately in case of rising sound from venting safety device on container or any discoloration of storage tank due to fire.

LEAK

- Isolate area for at least 160 to 330 feet to preserve public safety and deny entry. For large leaks, consider initial evacuation for at least 1/2 mile.
- Keep ignition sources out of area and shut off all ignition sources. Ground lines and equipment used during transfer to reduce the possibility of static spark-initiated fire or explosion. Use nonsparking tools.
- Ventilate area.

- Use water spray to reduce and disperse gas or vapor and to protect personnel attempting to stop a leak.
- Use water spray to cool adjacent structures and to protect personnel. Containers can build up pressure if exposed to heat (fire). Stay away from storage tank ends.
- If product is released into the environment, take immediate steps to stop and contain release.

FIRST AID

- For frostbite or freeze burns, immerse or flush affected area with warm water. Get immediate medical attention.
- Either hot or cold contact burns require immediate medical attention. Flush immediately with large amounts of water for at least 15 minutes. Hold eyelids away from eyeball to ensure thorough rinsing. Get immediate medical attention.
- Inhalation: Remove to fresh air. If not breathing, institute rescue breathing. If breathing is difficult, ensure airway is clear and give oxygen.
- Keep affected person warm and at rest. Get immediate medical attention.
- Note to physician: In cases of acute poisoning, artificial respiration and oxygen may be useful. Do NOT give Epinephrine, Ephedrine or similar Adrenergic drugs; they may induce fatal ventricular fibrillation.

OTHER NAMES:

- DIESEL OIL
- HEATING OIL
- OFF-ROAD DIESEL FUEL

CHEMICAL FAMILY:

PETROLEUM HYDROCARBON

CAS #:

68476-30-2

APPEARANCE:

GREEN, SLIGHTLY VISCOUS LIQUID

ODOR:

PETROLEUM

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POTENTIAL HAZARDS

FIRE OR EXPLOSION

- Extremely flammable. Will be easily ignited by heat, sparks or flames.
- Vapors form flammable or explosive mixtures with air at room temperature.
- Vapor or gas may spread to ignition sources and flashback.
- Runoff to sewer may create fire or explosion hazard.
- Containers may explode when heated.

HEALTH

- Inhalation or contact with material may irritate or burn skin and eyes.
- Fire may produce irritating, corrosive and/or toxic gases.
- Vapors may cause dizziness or suffocation.
- Runoff from fire control or dilution water may cause pollution.

PUBLIC SAFETY

- As an immediate precautionary measure,

isolate spill or leak area for at least 50 meters (150 feet) in all directions.

- Keep unauthorized personnel away.
- Stay upwind.
- Keep out of low areas.
- Ventilate closed spaces before entering.

PROTECTIVE CLOTHING

- Firefighters must wear MSHA/NIOSH approved positive pressure breathing apparatus (SCBA) with full face mask and full protective equipment.
- Wear chemical safety goggles to prevent eye contact.
- Wear appropriate chemical protective gloves to avoid skin contact.
- Use appropriate respiratory protection, if ventilation cannot reduce airborne concentrations.

CORRECTIVE RESPONSE

FIRE

- CAUTION: All these products have a very low flash point: Use of water spray when fighting fire may be inefficient.

SMALL FIRE

- Dry chemical, CO₂, water spray or regular foam.

LARGE FIRE

- Water spray, fog or regular foam.
- Use water spray or fog; do not use straight streams.
- Move containers from fire area if you can do it without risk.

FIRE INVOLVING TANKS OR CAR/TRAILER LOADS

- Fight fire from maximum distance or use unmanned hose holders or monitor nozzles.
- Cool containers with flooding quantities of water until well after fire is out.
- Withdraw immediately in case of rising sound from venting safety devices or discoloration of tank.
- ALWAYS stay away from tanks engulfed in fire.
- For massive fire, use unmanned hose holders or monitor nozzles; if this is impossible, withdraw from area and let fire burn.

LEAK

- ELIMINATE all ignition sources (no smoking, flares, sparks or flames in immediate area).
- All equipment used when handling the product must be grounded.
- Do not touch or walk through spilled material.
- Stop leak if you can do it without risk.
- Prevent entry into waterways, sewers, basements or confined areas.

- A vapor suppressing foam may be used to reduce vapors.
- Absorb or cover with dry earth, sand or other non-combustible material and transfer to containers.
- Use clean non-sparking tools to collect absorbed material.

FIRST AID

- Move victim to fresh air.
- Call 911 or emergency medical service.
- Give artificial respiration if victim is not breathing.
- Administer oxygen if breathing is difficult.
- Remove and isolate contaminated clothing and shoes.
- In case of contact with substance, immediately flush skin or eyes with running water for at least 20 minutes.
- Wash skin with soap and water.
- In case of burns, immediately cool affected skin for as long as possible with cold water. Do not remove clothing if adhering to skin.
- Keep victim warm and quiet.
- Ensure that medical personnel are aware of the material(s) involved and take precautions to protect themselves.

OTHER NAMES:

- STRAIGHT-RUN GAS
- VACUUM GAS OIL
- ATMOSPHERIC GAS OIL
- LIGHT GAS OIL
- HYDROCRACKED GAS OIL

CHEMICAL FAMILY:

PETROLEUM HYDROCARBON

CAS #:

68814-87-9

APPEARANCE:LIGHT AMBER TO DARK GREEN
VISCIOUS LIQUID**ODOR:**

GASOLINE LIKE

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POTENTIAL HAZARDS**FIRE OR EXPLOSION**

- **HIGHLY FLAMMABLE:** Will be easily ignited by heat, sparks or flames.
- Vapors may form explosive mixtures with air.
- Vapors may travel to source of ignition and flash back.
- Most vapors are heavier than air. They will spread along ground and collect in low or confined areas (sewers, basements, tanks).
- Vapor explosion hazard indoors, outdoors or in sewers.
- Those substances designated with a (P) may polymerize explosively when heated or involved in a fire.
- Runoff to sewer may create fire or explosion hazard.
- Containers may explode when heated.
- Many liquids are lighter than water.
- Substance may be transported hot.

HEALTH

- Inhalation or contact with material may irritate or burn skin and eyes.
- Fire may produce irritating, corrosive and/or toxic gases.
- Vapors may cause dizziness or suffocation.
- Runoff from fire control or dilution water may cause pollution.

CORRECTIVE RESPONSE**FIRE**

CAUTION: All these products have a very low flash point: Use of water spray when fighting fire may be inefficient.

CAUTION: For mixtures containing alcohol or polar solvent, alcohol-resistant foam may be more effective.

SMALL FIRE

- Dry chemical, CO₂, water spray or regular foam.

LARGE FIRE

- Water spray, fog or regular foam.
- Do not use straight streams.
- Move containers from fire area if you can do it without risk.

FIRE INVOLVING TANKS OR CAR/TRAILER LOADS

- Fight fire from maximum distance or use unmanned hose holders or monitor nozzles.
- Cool containers with flooding quantities of water until well after fire is out.
- Withdraw immediately in case of rising sound from venting safety devices or discoloration of tank.
- ALWAYS stay away from tanks engulfed in fire.
- For massive fire, use unmanned hose holders or monitor nozzles; if this is impossible, withdraw from area and let fire burn.

SPILL OR LEAK

- ELIMINATE all ignition sources (no smoking, flares, sparks or flames in immediate area).

PUBLIC SAFETY

- CALL Emergency Response Telephone Number on Shipping Paper first. If Shipping Paper not available or no answer, refer to appropriate telephone number listed on the inside back cover.
- As an immediate precautionary measure, isolate spill or leak area for at least 50 meters (150 feet) in all directions.
- Keep unauthorized personnel away.
- Stay upwind.
- Keep out of low areas.
- Ventilate closed spaces before entering.

PROTECTIVE CLOTHING

- Wear positive pressure self-contained breathing apparatus (SCBA).
- Structural firefighters' protective clothing will only provide limited protection.

EVACUATION**Large Spill**

- Consider initial downwind evacuation for at least 300 meters (1000 feet).

Fire

- If tank, rail car or tank truck is involved in a fire, ISOLATE for 800 meters (1/2 mile) in all directions; also, consider initial evacuation for 800 meters (1/2 mile) in all directions.

- All equipment used when handling the product must be grounded.
- Do not touch or walk through spilled material.
- Stop leak if you can do it without risk.
- Prevent entry into waterways, sewers, basements or confined areas.
- A vapor suppressing foam may be used to reduce vapors.
- Absorb or cover with dry earth, sand or other non-combustible material and transfer to containers.
- Use clean non-sparking tools to collect absorbed material.

FIRST AID

- Move victim to fresh air.
- Call 911 or emergency medical service.
- Give artificial respiration if victim is not breathing.
- Administer oxygen if breathing is difficult.
- Remove and isolate contaminated clothing and shoes.
- In case of contact with substance, immediately flush skin or eyes with running water for at least 20 minutes.
- Wash skin with soap and water.
- In case of burns, immediately cool affected skin for as long as possible with cold water. Do not remove clothing if adhering to skin.
- Keep victim warm and quiet.
- Ensure that medical personnel are aware of the material(s) involved and take precautions to protect themselves.

OTHER NAMES:

- PETROL
- PETROLEUM NAPHTHA (RAFFINATE)
- LIGHT PETROLEUM DISTILLATE
- TOLUENE
- BENZIN; *LEADED REGULAR, REGULAR UNLEADED, PREMIUM UNLEADED, SILVER LEAD FREE, ULTIMATE LEAD-FREE (PREMIUM)

CHEMICAL FAMILY:

ALCOHOLS AND ETHERS

CAS #:

68425-31-0

APPEARANCE:

CLEAR, COLORLESS LIQUID

ODOR:

DISTINCT HYDROCARBON ODOR

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POTENTIAL HAZARDS**FIRE OR EXPLOSION**

- Highly Combustible! Easily ignited by heat, spark or flames.
- When heated above flashpoint, these materials will release flammable vapors, which if exposed to an ignition source, can burn in the open or be explosive in confined spaces.
- Mists or sprays may be flammable at temperatures below the normal flash point (130° F).
- Vapors may settle in low or confined areas, or travel a long distance to an ignition source and flashback explosively.

HEALTH

- Excessive exposure to vapors may produce headaches, dizziness, nausea, drowsiness, irritation of eyes, nose and throat and central nervous system depression.
- Ingestion of product may result in vomiting; aspiration (breathing) of vomitus into the lungs must be avoided as even small amounts can cause chemical pneumonia and/or death.
- Benzene is a known carcinogen.
- Fire may produce irritating, corrosive and/or toxic gases.

PUBLIC SAFETY**CORRECTIVE RESPONSE****FIRE**

- Extinguishing media: Dry chemical, carbon dioxide (CO₂), water spray, regular foam, or fog.

Caution: These products have a very low flashpoint: Use of water when fighting fire may be inefficient.

- Do not use a straight stream of water. Product will float and can be reignited on surface of water.

LEAK

- Eliminate all sources of ignition (no smoking, flares, sparks or flames in immediate area).
- All equipment used when handling this product must be grounded.
- Prevent entry into waterways, sewers, basements or confined areas.
- Absorb or cover with dry earth, sand or other non-combustible material and transfer to containers.
- Use clean non-sparking tools to collect absorbed materials.

- Isolate leak area immediately for at least 80 to 160 feet in all directions. If there is a large affected area, consider downwind evacuation for at least 1,000 feet.
- Keep unauthorized personnel away.
- Stay upwind.
- Keep out of low areas.
- Ventilate closed spaces before entering.

PROTECTIVE CLOTHING

- Do not enter confined space without full bunker gear (helmet with face shield, bunker coats, gloves and rubber boots), including a positive pressure self-contained breathing apparatus (SCBA).
- Structural firefighters' protective clothing will only provide limited protection.

FIRST AID

- Move victim to fresh air.
- Call emergency medical service or 9-1-1.
- Apply artificial respiration if victim is not breathing.
- Administer oxygen if breathing is difficult.
- Remove and isolate contaminated clothing and shoes.
- In case of contact with substance, immediately flush skin or eyes with running water for at least 20 minutes.
- Wash skin with soap and water.
- Keep victim warm and quiet.
- Ensure that medical personnel are aware of the material(s) involved and take precautions to protect themselves.

OTHER NAMES:

- DIHYDROGEN
- MOLECULAR HYDROGEN
- UN 1049
- H₂

CHEMICAL FAMILY: PERMANENT GAS

CAS #:
1333-74-0

APPEARANCE: COLORLESS

ODOR: ODORLESS

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POTENTIAL HAZARDS

FIRE OR EXPLOSION

- HIGHLY FLAMMABLE.
- Will be easily ignited by heat, sparks or flames.
- Will form explosive mixtures with air.
- Vapors from liquefied gas are initially heavier than air and spread along ground.
CAUTION: Hydrogen (UN1049), Deuterium (UN1957), Hydrogen, refrigerated liquid (UN1966) and Methane (UN1971) are lighter than air and will rise. Hydrogen and Deuterium fires are difficult to detect since they burn with an invisible flame. Use an alternate method of detection (thermal camera, broom handle, etc.)
- Vapors may travel to source of ignition and flash back.
- Cylinders exposed to fire may vent and release flammable gas through pressure relief devices.
- Containers may explode when heated.
- Ruptured cylinders may rocket

HEALTH

- Vapors may cause dizziness or asphyxiation without warning.

- Some may be irritating if inhaled at high concentrations.
- Contact with gas or liquefied gas may cause burns, severe injury and/or frostbite.
- Fire may produce irritating and/or toxic gases

PUBLIC SAFETY

- As an immediate precautionary measure, isolate spill or leak area for at least 100 meters (330 feet) in all directions.
- Keep unauthorized personnel away.
- Stay upwind.
- Many gases are heavier than air and will spread along ground and collect in low or confined areas (sewers, basements, tanks).
- Keep out of low areas.

PROTECTIVE CLOTHING

- Wear positive pressure self-contained breathing apparatus (SCBA).
- Structural firefighters' protective clothing will only provide limited protection.
- Always wear thermal protective clothing when handling refrigerated/cryogenic liquids.

CORRECTIVE RESPONSE

FIRE

- DO NOT EXTINGUISH A LEAKING GAS FIRE UNLESS LEAK CAN BE STOPPED.
CAUTION: Hydrogen (UN1049), Deuterium (UN1957) and Hydrogen, refrigerated liquid (UN1966) burn with an invisible flame. Hydrogen and Methane mixture, compressed (UN2034) may burn with an invisible flame.
- Extinguishing media: Dry chemical, carbon dioxide (CO₂), water spray, regular foam, or fog.
- Move containers from fire area if you can do it without risk.

FIRE INVOLVING TANKS

- Fight fire from maximum distance or use unmanned hose holders or monitor nozzles.
- Cool containers with flooding quantities of water until well after fire is out.
- Do not direct water at source of leak or safety devices; icing may occur.
- Withdraw immediately in case of rising sound from venting safety devices or discoloration of tank.
- ALWAYS stay away from tanks engulfed in fire.
- For massive fire, use unmanned hose holders or monitor nozzles; if this is impossible, withdraw from area and let fire burn.

LEAK

- ELIMINATE all ignition sources (no smoking, flares, sparks or flames in immediate area).
- All equipment used when handling the product must be grounded.
- Do not touch or walk through spilled material.
- Stop leak if you can do it without risk.
- If possible, turn leaking containers so that gas escapes rather than liquid.
- Use water spray to reduce vapors or divert vapor cloud drift. Avoid allowing water runoff to contact spilled material.
- Do not direct water at spill or source of leak.

FIRST AID

- Move victim to fresh air.
- Call 911 or emergency medical service.
- Give artificial respiration if victim is not breathing.
- Administer oxygen if breathing is difficult.
- Remove and isolate contaminated clothing and shoes.
- Clothing frozen to the skin should be thawed before being removed.
- In case of contact with liquefied gas, thaw frosted parts with lukewarm water.
- In case of burns, immediately cool affected skin for as long as possible with cold water. Do not remove clothing if adhering to skin.
- Keep victim warm and quiet.
- Ensure that medical personnel are aware of the material(s) involved and take precautions to protect themselves.

OTHER NAMES:

- NAPHTHA
- HEAVY ENDS
- PETROLEUM NAPHTHA

CHEMICAL FAMILY:

PETROLEUM DISTILLATES,
N.O.S FLAMMABLE LIQUIDS

CAS #:

64741-42-0

APPEARANCE:

CLEAR, LIGHT STRAW-
COLORED LIQUID

ODOR:

GASOLINE

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POTENTIAL HAZARDS

FIRE OR EXPLOSION

- Flowing NAPHTHA can be ignited by self generated static electricity.
- Containers should be grounded and bonded.
- Runoff to sewer may create fire explosion hazard downstream from the source.

HEALTH

- Liquid is moderately irritating to eyes and skin.
- Inhalation is irritating to mucous membrane and respiratory tract. Can act as a simple Asphyxiant. Overexposure may lead to headache, drowsiness, nausea, fatigue, Pneumonitis, pulmonary edema, central nervous system depression, leading to coma and respiratory arrest.
- Ingestion may cause stomach irritation, gastritis. Possible effects are headache, nausea, drowsiness, loss of consciousness, convulsions, cyanosis, pneumonitis, pulmonary edema and central nervous system depression, congestion, capillary hemorrhaging, of the lung and internal organs. Aspiration hazard if vomiting occurs.
- Contact with full strength or even dilute formulations of this product or exposure above and/or below the TLV may aggravate pre- existing dermatitis or respiratory disorders in certain individuals. This product contains benzene, which can cause degeneration in blood forming organs leading to anemia, which may further degrade to leukemia. N-hexane has been shown to cause cardiac sensitization, central and peripheral nervous system disorders, and reproductive/fetal effects in laboratory tests.

PUBLIC SAFETY

- Remove sources of heat or ignition including internal combustion engines and power tools. Clean up spill, but do not flush to sewer or surface water.
- Ventilate area. Use approved respiratory protection where occupational exposure limits may be exceeded.

PROTECTIVE CLOTHING

- Use approved respiratory protective equipment for cleaning large spills or entry into large tanks, vessels or other confined spaces or in situations where airborne concentrations may exceed occupational exposure levels.
- Remove contact lenses and wear chemical safety glasses or goggles where contact with liquid or mist may occur.
- Wear impervious gloves when contact with skin may occur. Use face shield where splashing may occur.

CORRECTIVE RESPONSE

FIRE

- Extinguishing media: Dry Chemical, Foam, Or Carbon Dioxide.
- Use a smothering technique for extinguishing fire of this flammable liquid. Do not use a forced water stream directly on NAPHTHA fires as this will scatter the fire. Use water spray to cool fireexposed containers. Firefighters should wear selfcontained breathing apparatus and full protective clothing.

LEAK

- Remove sources of heat or ignition including internal combustion engines and power tools.
- Clean up spill, but do not flush to sewer or surface water.
- Ventilate area. Use approved respiratory protection where occupational exposure limits may be exceeded.

FIRST AID

- Remove to fresh air. If breathing has stopped, apply artificial respiration. Get immediate medical attention.
- Flush eyes thoroughly with water for at least 15 minutes. Get medical attention.
- Remove contaminated clothing and shoes. Wash affected areas with soap and water.
- Do not induce vomiting. If spontaneous vomiting occurs's keep head lower their than hips to prevent aspiration. Hold the head of the victim lower than their hips to prevent aspiration.

OTHER NAMES:

- METHANE
- MARSH GAS
- WELL HEAD GAS
- FUEL GAS
- LEASE GAS
- SOUR GAS

CHEMICAL FAMILY:

PETROLEUM HYDROCARBON
MIX: ALIPHATIC
HYDROCARBONS (ALKANES),
AROMATIC HYDROCARBONS,
INORGANIC COMPOUNDS

CAS #:

64741-42-0

APPEARANCE:

GAS

ODOR:

NONE TO SLIGHT
HYDROCARBON ODOR.
LOCAL DISTRIBUTION
SYSTEMS TYPICALLY CONTAIN
AN ODORANT, SUCH AS
MERCAPTAN OR OTHER
'SKUNK' SCENT.

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POTENTIAL HAZARDS

FIRE OR EXPLOSION

- Extremely flammable - easily ignited by heat, sparks or flames.
- Will form explosive mixtures with air.
- Vapor may travel to ignition source and flashback.

HEALTH

- *If sour gas (hydrogen sulfide) is present, an immediate, extreme health hazard exists.

Note: Please see hydrogen sulfide (H₂S) fact page.

- Natural gas acts as an anesthetic at high concentrations (i.e. enclosed spaces causing displacement of oxygen), producing dizziness, headache, loss of coordination and narcosis.
- Extremely high concentrations can cause irritation or asphyxiation by exclusion of oxygen.
- Natural gas may or may not contain mercaptans to odorize. If it does not, natural gas is odorless, tasteless and colorless.
- Fire may produce irritating and/or toxic gases.

CORRECTIVE RESPONSE

FIRE

- Extinguishing media: Class B fire extinguishing media such as carbon dioxide (CO₂) or dry chemical. Fire fighting should be attempted only by those who are adequately trained. Water spray or fog are recommended for large fires.
- Keep the surrounding area cool with water spray and prevent further ignition of combustible material.

LEAK

- Eliminate all ignition sources (no smoking, flares, sparks or flames in immediate area).
- All equipment used when handling this product must be grounded.
- Do not direct water at source of leak.
- Prevent spreading of vapors through sewers, ventilation systems and confined areas.
- Isolate area until gas is dispersed.

PUBLIC SAFETY

- Isolate leak area immediately for at least 160 to 330 feet in all directions, and if a large area is affected, consider an initial downwind evacuation for at least half a mile.
- Keep unauthorized personnel away.
- Stay upwind.

PROTECTIVE CLOTHING

- Wear positive pressure self-contained breathing apparatus (SCBA).
- Structural firefighters' protective clothing will only provide limited protection.

FIRST AID

- Move victim to fresh air.
- Call emergency medical service or 9-1-1.
- Apply artificial respiration if victim is not breathing.
- Administer oxygen if breathing is difficult.
- Remove and isolate contaminated clothing and shoes.
- Keep victim warm and quiet.
- Ensure that medical personnel are aware of the material(s) involved and take precautions to protect themselves.

OTHER NAMES:

- NGLS
- Y-GRADE
- RAW PRODUCT

CHEMICAL FAMILY:

MIXTURE

CAS #:

64741-48-6

APPEARANCE:

COLORLESS TO STRAW
COLORED LIQUID

ODOR:

PETROLEUM ODOR

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POTENTIAL HAZARDS

FIRE OR EXPLOSION

- Danger Extremely Flammable!
- Highly flammable vapors, which are heavier than air, may accumulate in low areas.
- Vapors may travel long distances to a point of ignition and flashback.
- Liquid propane will vaporize rapidly at well below ambient temperatures and readily form flammable mixtures with air.
- Flames impinging on product storage vessels above the liquid level will cause sudden vessel failure, resulting in a BLEVE (Boiling Liquid Expanding Vapor Explosion), unless the vessel surfaces are kept cool with water.
- Toxic carbon oxides and/or sulfur oxides may be released when burned.

HEALTH

- Eye: May cause irritation including pain, blurred vision, redness, tearing, and superficial corneal turbidity.
- Skin: May cause slight irritation. Extreme exposure may produce discoloration, muscle weakness, breathing difficulties and other central nervous system effects. Direct contact with liquefied gas may cause freeze burns.
- Inhalation: At high concentrations a simple asphyxiant. May produce nausea, diarrhea,

loss of appetite, dizziness, disorientation, headache, excitation, rapid respiration, drowsiness, labored breathing, anesthesia and other central nervous system effects. May cause lung paralysis and asphyxiation. Extreme overexposure may cause unconsciousness and respiratory arrest.

- Contains Benzene, a known carcinogen in humans.

PUBLIC SAFETY

- All non-essential personnel should be evacuated immediately.
- Avoid vapor cloud, even with proper respiratory equipment.

PROTECTIVE CLOTHING

- Firefighters must use proper protective equipment including breathing apparatus to protect against hazardous combustion products and/or oxygen deficiencies.
- Wear protective equipment/garments if exposure conditions warrant. Use only NIOSH/MSHA approved self-contained breathing apparatus and safety glasses with side shields, and rubber or other impervious gloves.
- Use explosion-proof equipment.

CORRECTIVE RESPONSE

FIRE

- Extinguishing media: Dry chemical powder, halon, foam, or carbon dioxide (CO₂).
- Firefighting should only be performed by those adequately trained.
- Evacuate area of all unnecessary personnel.
- Shut off product source and allow fire to burn itself out.
- Use water fog or spray to cool exposed containers and equipment to prevent overheating, flashbacks or explosions.
- Flames impinging on product storage vessels above the liquid level will cause sudden vessel failure, resulting in a BLEVE (Boiling Liquid Expanding Vapor Explosion), unless the vessel surfaces are kept cool with water.

LEAK

- Eliminate ignition sources.
- Liquid spills will vaporize rapidly and produce vapor cloud. Vapors are heavier than air, will stay in low-lying areas, and will not readily disperse. Use water spray to reduce vapors or divert vapor cloud drift.
- Ventilate enclosed areas to prevent formation of flammable or oxygen-deficient atmospheres. Venting of gas to atmosphere should be avoided.
- Avoid vapor cloud even with proper respiratory equipment.

- Waste mixtures containing these gases should not be allowed to enter drains or sewers where there is a danger of ignition and/or explosion.
- This material should be disposed of as an auxiliary fuel or burned in a properly designed flare or incinerator.
- Avoid breathing vapor. Use self-contained breathing apparatus (SCBA) if appropriate.

FIRST AID

- Inhalation: Move victim to area of fresh air. For respiratory distress give air, oxygen or administer cardiopulmonary resuscitation if needed. Seek medical attention.
- Eye: Flush eyes gently with water for at least 15 minutes. If illness or adverse symptoms develop, seek medical attention.
- Skin: Immediately flush skin with water for 15 minutes. Frozen tissue should be gradually warmed using warm water. Do not use hot water! Cryogenic burns may occur as evidenced by blistering. Protect affected area with dry gauze and get prompt medical attention.
- Ingestion: Seek immediate medical attention.
- Remove and isolate contaminated clothing and shoes.
- Clothing frozen to skin should be thawed before being removed.

OTHER NAMES:

- M-GRADE
- #14 GASOLINE
- PETROLEUM DISTILLATES
- LP GAS
- LPG
- Y-GRADE

CHEMICAL FAMILY:

PETROLEUM HYDROCARBON MIXTURE

CAS #:

68425-31-0

APPEARANCE:

COLORLESS

ODOR:

HYDROCARBON ODOR

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POTENTIAL HAZARDS

FIRE OR EXPLOSION

- Flammable.
- Dense smoke may be generated while burning.
- Carbon monoxide, carbon dioxide, and other oxides may be generated as products of combustion.
- May react with strong oxidizing agents.

HEALTH

- Eye: Avoid eye contact; product and vapors are slightly irritating.
- Skin: May be absorbed through skin. Avoid skin contact; product causes skin irritation. Prolonged or repeated contact may result in contact dermatitis, making skin more susceptible to other irritants, sensitizers and disease.
- Inhalation: Avoid prolonged inhalation of vapors. Acute, chronic exposure to vapors may be irritating to respiratory tract. Severe intoxication may lead to drowsiness, dullness, numbness, and headache followed by dizziness, weakness and nausea. At extreme high concentrations where oxygen is displaced, asphyxiation may occur.
- Ingestion: Do not ingest. Ingestion of small quantities is usually nonfatal unless aspiration occurs. Aspiration may lead to chemical pneumonitis, which is characterized by pulmonary edema and hemorrhage, and may be fatal.
- Pre-existing conditions may make skin more susceptible to irritation.

PUBLIC SAFETY

- Isolate area and prevent entry of unauthorized personnel.
- Maintain adequate ventilation to maintain concentrations below specified exposure or flammable limits.

PROTECTIVE CLOTHING

- Use a NIOSH-certified air respirator or self-contained breathing apparatus. Do NOT use compressed oxygen in hydrocarbon atmospheres.
- If material could be splashed into eyes, wear plastic face shield or splash-proof safety goggles.
- For prolonged or repeated exposure, use impervious synthetic rubber clothing (boots, gloves, aprons, etc.) over parts of body subjected to exposure.

CORRECTIVE RESPONSE

FIRE

- Extinguishing media: Use dry chemical, foam or carbon dioxide (CO₂).
- Use water to cool containers exposed to heat or flame.

LEAK

- Contain spill immediately. Do not allow spill to enter sewer or waterways.
- Remove all sources of ignition.
- Provide adequate ventilation during clean up to maintain concentrations below specified exposure or flammable limits.
- Absorb with appropriate inert material such as sand, clay, etc. Large spills may be picked up using vacuum pumps, shovels, buckets, or other means to place material in drums or other suitable containers. All disposal must comply with federal, state and local regulations.

FIRST AID

- Eye: Immediately flush eyes with large amounts of water and continue flushing. Seek medical attention if eye irritation persists.
- Skin: Remove contaminated clothing. Wash contaminated area thoroughly with soap and water. Use a hand or skin lotion to prevent dryness. If redness or irritation occurs, seek medical attention. Launder or discard contaminated clothing appropriately; safely dispose of contaminated leather articles.
- Inhalation: If victim exhibits signs of vapor intoxication, remove to fresh air. If breathing has stopped or is irregular, administer artificial respiration and supply oxygen, if available. If victim is unconscious, remove to fresh air and seek immediate medical attention.
- Ingestion: Do not induce vomiting due to aspiration hazard. If vomiting occurs, lower head below knees to avoid aspiration. Seek medical attention.

OTHER NAMES:

- AMYL HYDRIDE
- N-PENTANE

CHEMICAL FAMILY:

ALKANE HYDROCARBON

CAS #:

109-66-0

APPEARANCE:

COLORLESS LIQUID

ODOR:

STRONG GASOLINE

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POTENTIAL HAZARDS

FIRE OR EXPLOSION

- **HIGHLY FLAMMABLE:** Will be easily ignited by heat, sparks or flames.
- Vapors may form explosive mixtures with air.
- Vapors may travel to source of ignition and flash back.
- Most vapors are heavier than air. They will spread along ground and collect in low or confined areas (sewers, basements, tanks).
- Vapor explosion hazard indoors, outdoors or in sewers.
- Those substances designated with a (P) may polymerize explosively when heated or involved in a fire.
- Runoff to sewer may create fire or explosion hazard.
- Containers may explode when heated.
- Many liquids are lighter than water.
- Substance may be transported hot.
- For UN3166, if Lithium ion batteries are involved, also consult Emergency Response Guidebook, GUIDE 147.
- If molten aluminum is involved, refer to Emergency Response Guidebook, GUIDE 169.

HEALTH

- Inhalation or contact with material may irritate or burn skin and eyes.
- Fire may produce irritating, corrosive and/or toxic gases.
- Vapors may cause dizziness or suffocation.

CORRECTIVE RESPONSE

FIRE

CAUTION: All these products have a very low flash point: Use of water spray when fighting fire may be inefficient.

CAUTION: For mixtures containing alcohol or polar solvent, alcohol-resistant foam may be more effective.

Small Fire

- Dry chemical, CO₂, water spray or regular foam.

Small Fire

- Water spray, fog or regular foam.
- Do not use straight streams.
- Move containers from fire area if you can do it without risk.

Fire Involving Tanks or Car/Trailer Loads

- Fight fire from maximum distance or use unmanned hose holders or monitor nozzles.
- Cool containers with flooding quantities of water until well after fire is out.
- Withdraw immediately in case of rising sound from venting safety devices or discoloration of tank.
- ALWAYS stay away from tanks engulfed in fire.
- For massive fire, use unmanned hose holders or monitor nozzles; if this is impossible, withdraw from area and let fire burn.

SPILL OR LEAK

- ELIMINATE all ignition sources (no smoking, flares, sparks or flames in immediate area).

- Runoff from fire control or dilution water may cause pollution.

PUBLIC SAFETY

- CALL Emergency Response Telephone Number on Shipping Paper first. If Shipping Paper not available or no answer, refer to appropriate telephone number listed on the inside back cover.
- As an immediate precautionary measure, isolate spill or leak area for at least 50 meters (150 feet) in all directions.
- Keep unauthorized personnel away.
- Stay upwind.
- Keep out of low areas.
- Ventilate closed spaces before entering.

PROTECTIVE CLOTHING

- Wear positive pressure self-contained breathing apparatus (SCBA).
- Structural firefighters' protective clothing will only provide limited protection.

EVACUATION

Large Spill

- Consider initial downwind evacuation for at least 300 meters (1000 feet).

Fire

- If tank, rail car or tank truck is involved in a fire, ISOLATE for 800 meters (1/2 mile) in all directions; also, consider initial evacuation for 800 meters (1/2 mile) in all directions.

- All equipment used when handling the product must be grounded.
- Do not touch or walk through spilled material.
- Stop leak if you can do it without risk.
- Prevent entry into waterways, sewers, basements or confined areas.
- A vapor suppressing foam may be used to reduce vapors.
- Absorb or cover with dry earth, sand or other non-combustible material and transfer to containers.
- Use clean non-sparking tools to collect absorbed material.

FIRST AID

- Move victim to fresh air.
- Call 911 or emergency medical service.
- Give artificial respiration if victim is not breathing.
- Administer oxygen if breathing is difficult.
- Remove and isolate contaminated clothing and shoes.
- In case of contact with substance, immediately flush skin or eyes with running water for at least 20 minutes.
- Wash skin with soap and water.
- In case of burns, immediately cool affected skin for as long as possible with cold water. Do not remove clothing if adhering to skin.
- Keep victim warm and quiet.
- Ensure that medical personnel are aware of the material(s) involved and take precautions to protect themselves.

OTHER NAMES:

- LIQUID PETROLEUM GAS (LPG)
- HD-5 PROPANE
- A-108
- C3
- P-GRADE
- PROPANE COMMERCIAL
- DIMETHYLMETHANE
- PROPYL HYDRIDE
- ALKANE
- C3H8

CHEMICAL FAMILY:

PROPANE, ETHANE, ISO-BUTANE, N-BUTANE, ETHYL MERCAPTAN
(USED AS MALODORANT)

CAS #:

74-98-6

APPEARANCE:

GAS AT ROOM TEMPERATURE.
LIQUID WHEN STORED UNDER PRESSURE

ODOR:

ODORLESS IN NATURAL STATE. MAY HAVE "SKUNK" OR "ROTTEN EGG" SCENT OF MALODORANT ADDITIVE

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POTENTIAL HAZARDS**FIRE OR EXPLOSION**

- Danger Extremely Flammable!
- Highly flammable vapors are heavier than air, may accumulate in low areas, and travel long distances to a point of ignition and then flashback.
- Liquid vaporizes rapidly at well below ambient temperatures and readily forms flammable mixtures with air. Rapid escape of vapor may create static charge causing fire.
- Flames impinging on product storage vessels above the liquid level will cause sudden vessel failure, resulting in a BLEVE (Boiling Liquid Expanding Vapor Explosion), unless the vessel surfaces are kept cool with water.
- Toxic CO_x, SO_x, NO_x, smoke and irritating fumes may be released when burned.
- Highly reactive with oxygen and strong oxidizing agents. Severe explosion hazard when exposed to chlorine dioxide.

HEALTH

- Inhalation: At high concentrations a simple asphyxiant, reducing oxygen available for breathing. Extreme overexposure may produce dizziness, headache, rapid breathing, fatigue, unconsciousness and death. Combustion byproducts may be toxic and/or asphyxiants. May cause cardiac sensitization and central nervous system damage.
- Eye: Gas is non-irritating but direct contact with liquid or frost particles can cause severe or permanent eye damage.

CORRECTIVE RESPONSE**FIRE**

- Extinguishing media: Dry chemical, foam, carbon dioxide (CO₂).
- Shut off product source and allow fire to burn itself out.
- Use water fog or spray to cool exposed containers and equipment to prevent overheating, flashbacks or explosions.
- Stay away from storage tank ends, which can build up pressure from heat. Withdraw immediately in case of rising sound from venting safety device or tank discoloration.

LEAK

- Eliminate all possible sources of ignition and stop source of release using explosion-proof equipment and non-sparking tools in areas where explosive vapors may form.
- Use water spray to reduce vapors.
- Venting gas to atmosphere should be avoided. Ventilate enclosed areas to prevent formation of flammable or oxygen-deficient atmospheres.
- Liquid spills vaporize rapidly and produce vapor cloud. Vapors are heavier than air and will not readily disperse. Avoid vapor cloud even with proper respiratory equipment.

- Skin: Direct contact with liquid and pressurized gas can cause freeze burns. Short-term contact may result in tissue destruction and severe burns.

PUBLIC SAFETY

- Evacuate area and deny entry to non-essential personnel. Isolate area for 1 mile in all directions.
- Remove victims to fresh air.
- Stay upwind and keep out of low areas.

PROTECTIVE CLOTHING

- Firefighters must use proper protective equipment including breathing apparatus to protect against hazardous combustion products and/or oxygen deficiencies.
- Avoid breathing vapor. Use NIOSH/ MSHA approved self-contained breathing apparatus (SCBA) if appropriate.
- Use goggles and face shield when handling liquefied gases. Safety glasses and/or face shield are recommended when handling high-pressure cylinders, piping and wherever vapors may be discharged.
- Prevent potential skin contact with liquid/vapors, which may cause frostbite. Use properly insulated gloves, boots, and other protective gear.

- Waste mixtures containing these gases should not be allowed to enter drains or sewers where there is a danger of ignition and/or explosion.

FIRST AID

- Inhalation: Move victim to area of fresh air and keep person warm and at rest. For respiratory distress give air, oxygen or administer cardiopulmonary resuscitation if needed. Seek medical attention.
- Eye: Flush eyes gently with water for at least 15 minutes, keeping eyelids open. If eye tissue is frozen, seek immediate medical attention.
- Skin: Soak frozen tissue in warm water to gradually thaw affected area. Do NOT rub area, flush with water or use hot water, or remove frozen clothing from frostbitten areas. If frostbite has not occurred, wash contaminated skin with soap and water. Cryogenic burns may occur as evidenced by blistering. Protect affected area with dry gauze and get prompt medical attention.
- Ingestion: Seek immediate medical attention.

OTHER NAMES:

- REFINERY GRADE - PROPANE/PROPYLENE MIX

CHEMICAL FAMILY:

PROPYLENE, PROPANE, N-BUTANE, ETHANE

CAS #:

MIXTURE

APPEARANCE:

COLORLESS

ODOR:

ODORLESS

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POTENTIAL HAZARDS**FIRE OR EXPLOSION**

- Extremely flammable!
- Vapors form flammable or explosive mixtures with air at room temperature.
- Vapor or gas may spread to distant ignition source and flashback.
- Combustion may produce COx, NOx and SOx.
- Explosion hazard if exposed to extreme heat or to physical or thermal shock.
- May have hazardous or explosive reactions with oxides of nitrogen.
- Stay away from storage tank ends, which can build up pressure if exposed to heat (fire). Be aware that a BLEVE (Boiling Liquid Expanding Vapor Explosion) may occur unless surfaces are kept cool with water.

HEALTH

- Inhalation: Asphyxiant gas. High concentrations can displace oxygen causing the feeling of suffocation and can cause central nervous system depression from oxygen deprivation. May cause cardiac sensitization.
- Skin: Direct contact may cause frostbite (cold burns) and skin damage. Short-term contact may result in tissue destruction and severe burns.
- Eye: Direct contact with compressed gas may cause frostbite (cold burns) and permanent damage.

CORRECTIVE RESPONSE**FIRE**

- Extinguishing media: Use water spray, dry chemical, alcohol foam, all-purpose AFFF or carbon dioxide (CO2).
- Shut off source of flow if possible. Do NOT attempt to extinguish fire if gas source cannot be shut off first.
- Stay away from storage tank ends, which can build up pressure if exposed to heat (fire). Withdraw immediately in case of rising sound from venting safety device or any tank discoloration.

LEAK

- Ventilate area.
- Use water spray to disperse gas or vapor, cool adjacent structures and protect personnel.
- Eliminate and/or shut off all ignition sources in area. Use non-sparking tools.
- Take immediate steps to stop and contain any release into the environment.

PUBLIC SAFETY

- Evacuate area and deny entry to unnecessary personnel.
- Isolate area at least 106 to 330 feet and up to 1 mile in all directions, in case of leak or fire.
- Stay upwind and keep out of low areas.

PROTECTIVE CLOTHING

- Firefighters must wear NIOSH-approved positive pressure breathing apparatus (SCBA) with full face mask and full protective equipment.
- Wear chemical safety goggles and face shield. Have eye-washing facility available where eye contact can occur.
- Avoid skin contact; use appropriate chemical protective gloves.
- Use appropriate respiratory protection if ventilation cannot reduce airborne concentrations below acceptable limits. Use NIOSH-approved self-contained breathing apparatus with full face mask respirator in positive-pressure mode.

FIRST AID

- Skin: For frostbite or freeze burns, keep affected area warm by immersing or flushing with warm water. Get immediate medical attention.
- Eye: Burns due to either hot or cold contact require immediate medical attention. Flush immediately with large amounts of water for at least 15 minutes. Hold eyelids away from eyeball to ensure thorough rinsing. Get immediate medical attention.
- Inhalation: Remove to fresh air. If not breathing, institute rescue breathing. If breathing is difficult, ensure airway is clear and give oxygen. Keep affected person warm and at rest. Get immediate medical attention.

[illegible][illegible][illegible][illegible]





Coordinated Response Exercise



Discussion Based Exercise

Natural Disasters

- Tornadoes
- Wildfires/Forest Fires
- Flooding/Mudslides/Slips
- Earthquakes

Human Error

- Vehicle accidents involving above ground valve sites
- Third party strikes by contractors and excavators
- Agricultural activities, field tilting

National Security Threats

- Cyberterrorism involving pipeline systems
- IED's on pipeline assets

These training programs can also go hand in hand with Homeland Security Exercise and Evaluation Programs (HSEEP)




Coordinated Exercise Discussion

Discussion Questions

- **Pipeline Operators:** How do you typically find out about an emergency, and what protocols go into effect when a product release occurs on your system that your local emergency responders may not be aware of (behind the scenes)?
- **Emergency Responders:** How will we deliver coordinated, prompt, reliable and actionable information to the whole community about what is happening? (Mission: Response; Public Information & Warning)
- **Pipeline Operators:** Do you always know where emergency responders will set up an Incident Command Post (ICP)?
- **Emergency Responders:** How will we establish and maintain a unified and coordinated operations structure that appropriately integrates all critical stakeholders and supports the execution of core capabilities? (Mission: Response; Operational Coordination)

Coordinated Response Exercise Discussion

Discussion Questions

- **Pipeline Operators:** How will you get access to the scene if a secured perimeter has been established?
- **Emergency Responders:** How will we conduct appropriate measures to ensure the protection of the health and safety of the public and workers, as well as the environment, from all hazards in support of responder operations and the affected communities? (Mission: Response; Environmental Response/ Health & Safety)
- **Pipeline Operators:** How will you typically handle communications;
 - At the scene between pipeline operators?
 - At the scene between pipeline operators and the JCP / other emergency responders?
 - Between field pipeline personnel and Control Centers / SCADA Centers?
- **Emergency Responders:** How can we ensure the capacity for timely communications in support of security, situational awareness, and operations by any and all means available, among and between affected communities in the impact area and all response forces? (Mission: Response; Operational Communications)


This image shows a full page of blank handwriting practice paper. It features approximately 28 evenly spaced horizontal blue lines across the entire page, providing a guide for letter height and placement. The lines are consistent in color and thickness throughout.



Discussion-Based Exercise Recap

- Timely notification of the incident
- Denied entry at scene of incident
- Quick access to remote valves/ICP
- Getting equipment into the area
- Communications with incident command
- Clear lines of communication (both ways)
- Face to face meetings with local officials
- Pre-planning with emergency services



National Emergency Number Association

Pipeline Emergency Operations Standard

NENA's pipeline emergency operations workshop recommendations

- Awareness of pipelines affecting the 911 service area
- Pipeline leak recognition and initial response actions
- Additional notices to pipeline operators



Initial intake checklist

- Quick reference guide in program materials

Pipeline emergency operations standard/model recommendations

- Access the full report through nena.org

"Actions taken during this time frame significantly impact the effectiveness of the response and are critical to public safety"



NEW PHMSA Rule – Impact on PSAPs

For both natural gas and hazardous liquids pipelines

- Rupture mitigation valves must be installed on all newly constructed and replaced pipelines 6" in diameter or greater for onshore gas transmission, Type A gas gathering and hazardous liquid pipelines
 - This does not include natural gas distribution pipelines
- Pipeline operators must contact 9-1-1 or **Emergency Management** with a 'notice of potential rupture'

How does this rule potentially affect PSAPs

- How will your agency process this call when notified of a 'potential' release?
 - Will you record it and **not** pass it on to your response agencies?
 - Will you record and pass that information on to your response agencies?
 - Will this require your PSAP (and emergency services) to develop written policies?
 - Where, potentially, could this call be coming from?
 - Pipeline control center locations
 - Contacting a PSAP through the non-emergency number (no Automatic Number Identification (ANI), No Automatic Location Identification (ALI))
 - Is this number monitored 24/7?
- Pipeline operators were required to update their Emergency Response Plans (ERP) with this requirement in October 2022

Product Characteristics

Hazardous Liquids
ER Guide 128 (Pages 192-193)*

- Crude oil, jet fuel, gasoline and other refined products
- Liquid in and liquid out of the pipeline


Highly Volatile Liquids
ER Guide 133 (Pages 166-167)*

- Propane, Butane, Ethane and natural gas liquids
- Liquid in and vapor out of the pipeline

Natural Gas
ER Guide 133 (Pages 166-167)*

- Gas in and gas out of the pipeline
- Odorant Mercaptan added where required

*These ER Guide and page numbers are from the 2020 edition of the Emergency Response Guidebook



Product Characteristics Resources

Mobile Applications: Android and iPhone

- ERG 2020** - The 2020 Emergency Response Guidebook is available as a mobile application for Android and iPhone.
- Chemical Safety Data Sheets - CSDS** - A mobile application for Android and iPhone that provides access to Chemical Safety Data Sheets (CSDS) for various chemicals.
- NIOSH Pocket Guide** - A mobile application for Android and iPhone that provides access to the NIOSH Pocket Guide to Chemical Hazards.
- CAMEO Chemicals** - A web-based application that provides access to Chemical Abstracts, Chemical Safety Data Sheets, and other chemical information.
- Chemical Emergency Response** - A mobile application for Android and iPhone that provides access to emergency response information for various chemicals.
- NIOSH Mobile Pocket Guide** - A mobile application for Android and iPhone that provides access to the NIOSH Pocket Guide to Chemical Hazards.

For 24/7/365 emergency information, call 1-800-455-6113 or visit www.cerclis.org. For more information, visit www.epa.gov/emergencyresponse.

Anhydrous Ammonia (NH₃)

ER Guide 125 (Pages 186-187)

Potential Hazards


- Toxic; may be fatal if inhaled, ingested or absorbed through skin
- Cloud may not be visible
- Vapors are initially heavier than air and spread along ground
- Wear full protective clothing/SCBA

Health Hazards

- Vapors may cause dizziness or suffocation
- Vapors are extremely irritating and corrosive
- Contact with gas or liquefied gas may cause burns, severe injury and/or frostbite
- Fire will produce irritating, corrosive and/or toxic gases
- (LEL) 15% to (UEL) 28% (NIOSH Pocket Guide to Chemicals)

Public Safety


- Immediate precautionary measure, isolated spill or leak area at least 330 ft all directions
- Keep unauthorized personnel away
- Stay upwind and/or upstream
- Vapors are lighter than air



Carbon Dioxide (CO₂)

Description and release characteristics
ER Guide 120 (Pages 176-177)

- CO₂ is a colorless, odorless gas in its purest form
- In the pipeline, CO₂ travels in the form of a liquid
- If a release were to occur, it would be as a gas and have a slightly musty odor
- A refrigeration effect would occur with a release, producing a vapor cloud (similar to a white smoke cloud), and could be easily dispersed by the wind
- Touching the pipeline or the escaping CO₂ near the leak could cause frostbite
- In its gas form, seeks low-lying areas such as valleys and ditches
- CO₂ is nonflammable and non-toxic, however, in large amounts it could be harmful if inhaled or lead to difficulty in breathing



CORE Petroleum Products Batching

Pipeline Products Batching

The diagram shows a cross-section of a pipeline with different colored segments representing different petroleum products. From left to right, the segments are labeled: Diesel (blue), Jet Fuel (green), Transmix (yellow), Regular Gas (orange), Premium Gas (red), and Transmix (purple).

CORE Emergency Response and 811

Derailments, car accidents, excavating/farming mishaps, natural disasters, and wildfires

PHMSA Advisory Bulletin (2012-08)

- Based on National Transportation Board recommendation
- Inform emergency responders about the benefits of 811
- Identify underground utilities in the area
- Notify underground utilities in the area

A photograph showing several emergency responders in high-visibility vests and hard hats standing on a road next to a grassy area, likely investigating an incident.

CORE Above Ground Storage Tanks

Considerations when responding to tank farms/ terminals

Work with your local operator to:

- Develop an effective response plan
- Identify products and hazards
- Determine evacuation radius

Response recommendations:

- Cool tank(s) or nearby containers by flooding with water
- Use unmanned hose holders/monitor nozzles
- Do not direct water at safety devices or icing may occur
- Let product burn, even after air supply line/system is closed
- Beware of the potential for **Boiling Liquid Expanding Vapor Explosion (BLEVE)**

Two photographs are included: an aerial view of a storage tank farm with several large cylindrical tanks, and a ground-level photo of a storage tank with a fire burning on its side.

CORE Underground Storage Fields

Emergency response "non-intervention"

- Emergency contact information found on pipeline markers and all wellhead locations
- Always be aware of wind direction; walk into the wind, away from hazardous fumes
- Do not drive into a leak or vapor cloud
- Monitor combustible atmosphere
- Determine hazardous area and escape routes

The diagram illustrates three types of underground storage fields: Depleted Fields, Salt Formations, and Depleted Aquifers. It shows the subsurface layers and the location of wells and storage caverns.

Underground Storage Fields

Salt Caverns

- Can store liquids or gas
- Caverns in salt beds created with high pressure water
- Water and salt mix creates brine
- Brine pumped out / product pumped in
- When product needed, brine pumped in, pushing product out

Porosity Gas Storage

- Formed naturally
- Vary in types of "porous rock"
- Pressurized wells
- Can cover many square miles
- Can contain millions of gallons of product
- Billions of cubic feet

See Information in the Emergency Response Manual

Underground Storage Fields

Salt Caverns

Porosity Gas Storage

Abandoned Oil & Gas Wells

<https://kcc.ks.gov/oil-gas/abandoned-wells>

The Kansas Corporation Commission is actively looking for abandoned oil and gas wells. Commission field staff investigates these wells in order to determine if they pose a risk to public safety or the environment.

A form will allow you to submit information about abandoned oil and gas wells in Kansas and may be used in the examination of a reported well. If necessary, you may be contacted by a Commission employee for additional information.

Thank you for assisting the Commission in identifying these wells. If you have any questions, please contact us using the information below:

District Field Offices are:

District 1 Dodge City, Kansas (Southwest Kansas)	(620) 662-7933
District 2 Wichita, Kansas (South & North Central Kansas)	(316) 337-7400
District 3 Chanute, Kansas (Eastern Kansas)	(620) 432-2300
District 4 Hays, Kansas (Northwestern Kansas)	(785) 261-6250

See Information in the Emergency Response Manual

Local Distribution Systems

Caution

- Be aware, not all natural gas leaks are from excavation; unintended leaks from stoves, water, heaters, furnaces, etc. can occur
- When called out on natural gas leak events, use combustible gas indicators
- Mercaptan can be stripped as it travels through soil
- Frost heaves, breaking pipes
- Gas meter breaks due to snow buildup from melting snow falling from roofs

Excess flow valve meter tags

Identification tags [192.381(c)]

- The presence of an excess flow valve on the service lines must be marked with an identification tag. The identification tag will typically be located at the top of the service riser below the meter stop valve

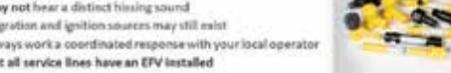


Excess Flow Valve (EFV)



Local Distribution Lines

- Automatic reduction of gas flow should a service line break
- May not completely stop the flow of natural gas
- May not hear a distinct hissing sound
- Migration and ignition sources may still exist
- Always work a coordinated response with your local operator
- Not all service lines have an EFV installed



The diagram illustrates the installation and function of an Excess Flow Valve (EFV) on a local distribution line. It shows a cross-section of the ground with a main gas line and a service line. A yellow excavator is shown on the left, labeled '3rd Party Damage'. In the center, the text 'Earthquake or Settling' is displayed. On the right, two workers are shown with a truck, labeled 'Directional Drilling or Digging a Post Hole'. A yellow line represents the gas flow, and a red line indicates the location of the EFV. A label 'Excess Flow Valve' points to the valve on the service line.

The diagram compares the explosive limits for two types of gases: Natural Gas and Liquefied Petroleum Gas (LPG). It uses a vertical stack of three colored boxes to represent the range of gas concentrations in air that can explode. The top box is blue (Rich), the middle is red (Explosive), and the bottom is yellow (Lean). The boundaries between these regions are marked with percentages of gas in air.

Gas Type	Region	Lower Explosive Limit (LEL)	Upper Explosive Limit (UEL)
Natural Gas	Rich	15% Gas in Air	100% UEL
	Explosive	3.5% Gas in Air	100% UEL
	Lean	0%	0%
Liquefied Petroleum Gas	Rich	10% Gas in Air	100% UEL
	Explosive	2% Gas in Air	100% UEL
	Lean	0%	0%

Lower / Upper explosive limits depend on characteristics of specific product



Farm Taps

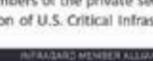
- Mainly in rural areas, some natural gas pipeline companies may have facilities commonly referred to as “farm tap”
- These natural gas settings are made up of valves, pipes, regulators, relief valves and a meter. It may be located near the home or within the general vicinity
- To report the smell of gas near a farm tap, call 911 and the local gas distribution company from a safe distance





InfraGard – Protect Critical Infrastructure

InfraGard is a partnership between the FBI and members of the private sector for the protection of U.S. Critical Infrastructure.



INFRAGARD MEMBER ALLIANCES

*Thousands of members, one mission:
Protecting critical infrastructure, the foundation of American life.*

<http://infogard.org>

16 Critical Infrastructure Sectors:

- Chemical
- Commercial Facilities
- Communications
- Critical Manufacturing
- Dams
- Defense Industrial Base
- **Emergency Services**
- **Energy**
- Financial Services
- Food and Agriculture
- Government Facilities
- Healthcare and Public Health
- Information Technology
- Nuclear Reactors, Materials, and Waste
- Transportation Services
- Water & Wastewater Systems

[illegible][illegible][illegible][illegible]

Emergency Response Plans for Gas and Hazardous Liquid Pipeline Operators

Federal regulations for both gas and hazardous liquid pipelines require operators to have written procedures for responding to emergencies involving their pipeline facility. Because pipelines are often located in public space, the regulations further require that operators include procedures for planning with emergency and other public officials to ensure a coordinated response. Please contact your local pipeline operators for information regarding their company specific emergency response plan.

Natural Gas

Each operator shall establish written procedures to minimize the hazard resulting from a gas pipeline emergency. At a minimum, the procedures must provide for the following:

- Receiving, identifying, and classifying notices of events which require immediate response by the operator.
- Establishing and maintaining adequate means of communication with appropriate fire, police, and other public officials.
- Prompt and effective response to a notice of each type of emergency, including the following:
 1. Gas detected inside or near a building.
 2. Fire located near or directly involving a pipeline facility.
 3. Explosion occurring near or directly involving a pipeline facility.
 4. Natural disaster.
- The availability of personnel, equipment, tools, and materials, as needed at the scene of an emergency.
- Actions directed toward protecting people first and then property.
- Emergency shutdown and pressure reduction in any section of the operator's pipeline system necessary to minimize hazards to life or property.
- Making safe any actual or potential hazard to life or property.
- Notifying appropriate fire, police, and other public officials of gas pipeline emergencies and coordinating with them both planned responses and actual responses during an emergency.
- Safely restoring any service outage.
- Each operator shall establish and maintain liaison with appropriate fire, police, and other public officials to:
 1. Learn the responsibility and resources of each government organization that may respond to a gas pipeline emergency;
 2. Acquaint the officials with the operator's ability in responding to a gas pipeline emergency;
 3. Identify the types of gas pipeline emergencies of which the operator notifies the officials; and
 4. Plan how the operator and officials can engage in mutual assistance to minimize hazards to life or property.

**Reference 49 CFR 192.615*

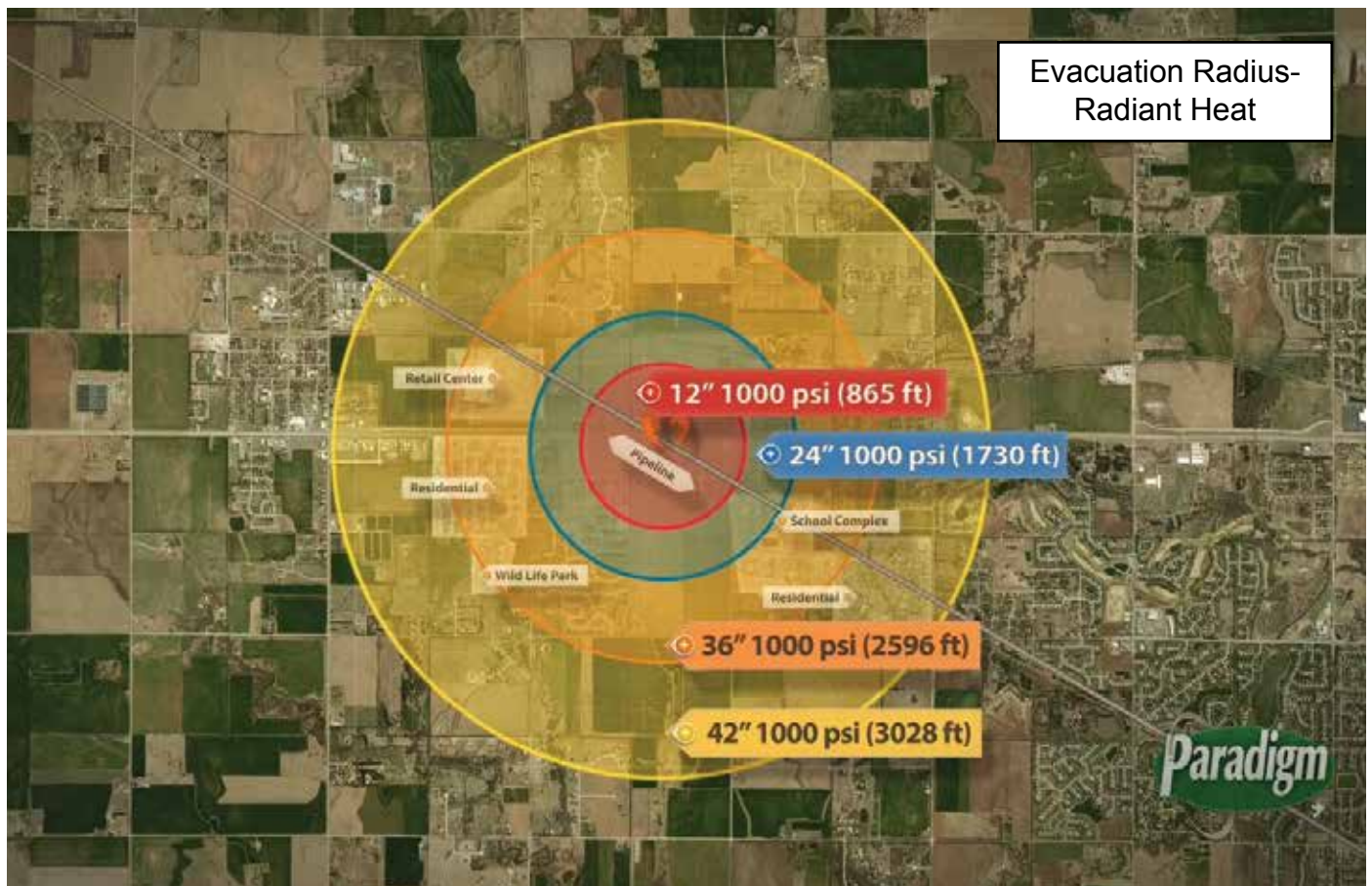
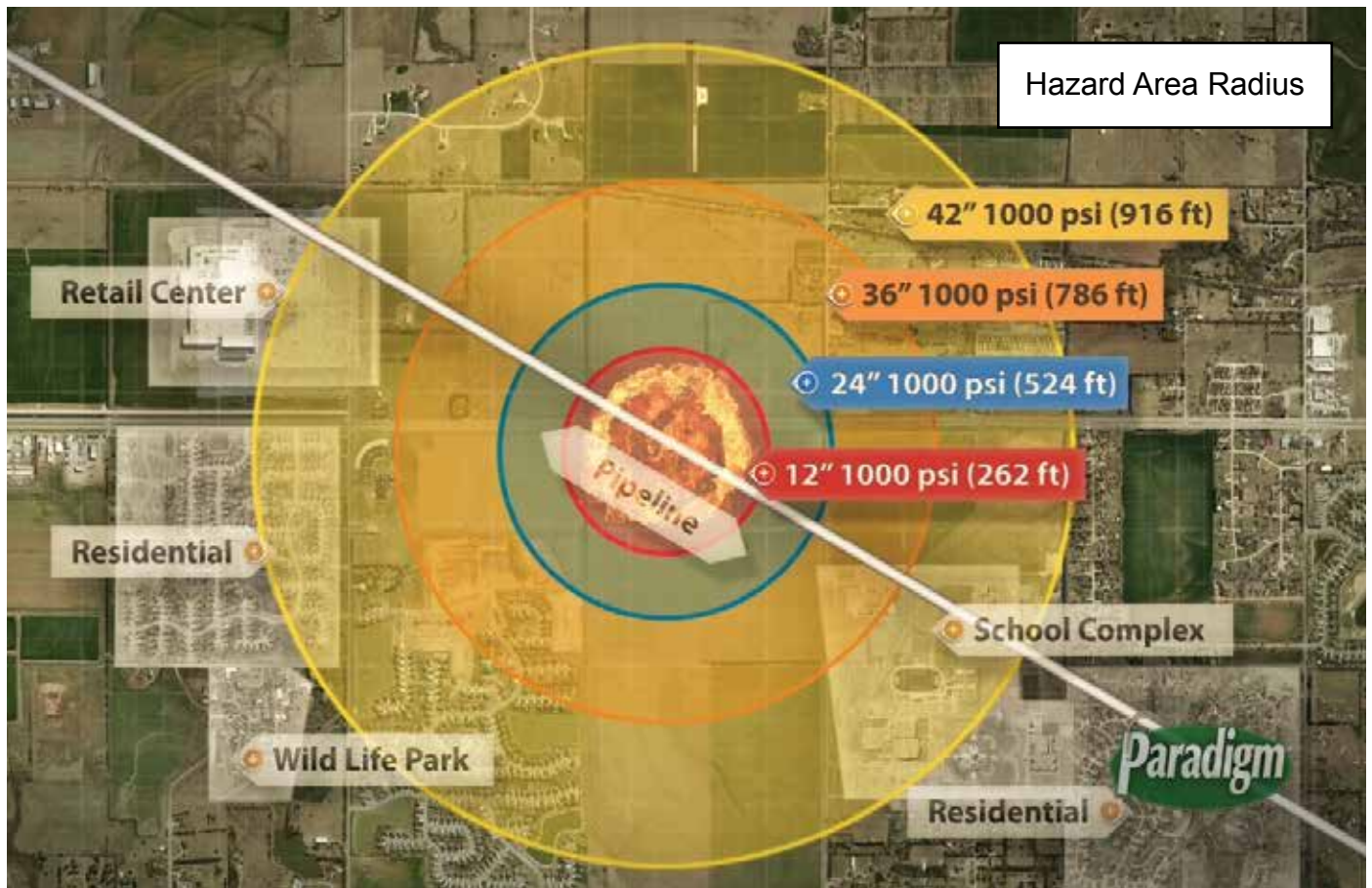
Hazardous Liquids

(a) General: Each operator shall prepare and follow for each pipeline system a manual of written procedures for conducting normal operations and maintenance activities and handling abnormal operations and emergencies. This manual shall be reviewed at intervals not exceeding 15 months, but at least once each calendar year, and appropriate changes made as necessary to insure that the manual is effective. This manual shall be prepared before initial operations of a pipeline system commence, and appropriate parts shall be kept at locations where operations and maintenance activities are conducted.

Emergencies. The manual required by paragraph (a) of this section must include procedures for the following to provide safety when an emergency condition occurs:

- Receiving, identifying, and classifying notices of events which need immediate response by the operator or notice to fire, police, or other appropriate public officials and communicating this information to appropriate operator personnel for corrective action.
- Prompt and effective response to a notice of each type emergency, including fire or explosion occurring near or directly involving a pipeline facility, accidental release of hazardous liquid or carbon dioxide from a pipeline facility, operational failure causing a hazardous condition, and natural disaster affecting pipeline facilities.
- Having personnel, equipment, instruments, tools, and material available as needed at the scene of an emergency.
- Taking necessary action, such as emergency shutdown or pressure reduction, to minimize the volume of hazardous liquid or carbon dioxide that is released from any section of a pipeline system in the event of a failure.
- Control of released hazardous liquid or carbon dioxide at an accident scene to minimize the hazards, including possible intentional ignition in the cases of flammable highly volatile liquid.
- Minimization of public exposure to injury and probability of accidental ignition by assisting with evacuation of residents and assisting with halting traffic on roads and railroads in the affected area, or taking other appropriate action.
- Notifying fire, police, and other appropriate public officials of hazardous liquid or carbon dioxide pipeline emergencies and coordinating with them preplanned and actual responses during an emergency, including additional precautions necessary for an emergency involving a pipeline system transporting a highly volatile liquid.
- In the case of failure of a pipeline system transporting a highly volatile liquid, use of appropriate instruments to assess the extent and coverage of the vapor cloud and determine the hazardous areas.
- Providing for a post accident review of employee activities to determine whether the procedures were effective in each emergency and taking corrective action where deficiencies are found.

**Reference 49 CFR 195.402*



NENA Pipeline Emergency Operations - Call Intake Checklist

In accordance with NENA Pipeline Emergency Operations Standard/Model Recommendation NENA 56-007 (<https://www.nena.org/?page=PipelineEmergStnd>)

GOALS FOR INITIAL INTAKE:

1. Obtain and Verify Incident Location, Callback and Contact Information
2. Maintain Control of the Call
3. Communicate the Ability to HELP the Caller
4. Methodically and Strategically Obtain Information through Systematic Inquiry to be Captured in the Agency's Intake Format
5. Recognize the potential urgency of situations involving the release of dangerous gases or liquids related to pipelines or similar events of this nature and immediately begin the proper notifications consistent with agency policy
6. Perform all Information Entries and Disseminations, Both Initial and Update

FIRST RESPONSE CALL INTAKE CHECKLIST

The focus of this Standard is on the first minute of the call intake process. Actions taken during this time frame significantly impact the effectiveness of the response and are critical to public safety.

The following protocol is intended as a solid framework for call intake, but should not in any manner rescind or override agency procedures for the timing of broadcasts and messaging.

These procedures are established as recommended practices to consider with existing agency policy and procedure to ensure the most swift and accurate handling of every incident involving the release of dangerous gases or hazardous liquids.

All information should be simultaneously entered, as it is obtained by the telecommunicator, into an electronic format (when available) that will feed/populate any directed messages which will be sent to emergency responders in conjunction with on-air broadcasts.

Location:

Request exact location of the incident (structure addresses, street names, intersections, directional identifiers, mile posts, etc.) and obtain callback and contact information.

Determine Exactly What Has Happened:

Common signs of a pipeline leak are contained in Table 1 below. If any of these conditions are reported, THIS IS A PIPELINE EMERGENCY.

TABLE 1
Common Indications of a Pipeline Leak

Condition	Natural Gas (lighter than air)	LPG & HVL (heavier than air)	Liquids
An odor like rotten eggs or a burnt match	X	X	
A loud roaring sound like a jet engine	X	X	
A white vapor cloud that may look like smoke		X	
A hissing or whistling noise	X	X	
The pooling of liquid on the ground			X
An odor like petroleum liquids or gasoline		X	X
Fire coming out of or on top of the ground	X	X	
Dirt blowing from a hole in the ground	X	X	
Bubbling in pools of water on the ground	X	X	
A sheen on the surface of water		X	X
An area of frozen ground in the summer	X	X	
An unusual area of melted snow in the winter	X	X	
An area of dead vegetation	X	X	X

From April Heinze at NENA October 2022

A recent change made at the federal level will begin to impact your Emergency Communications Center (ECC) very soon. In April 2022, the Pipeline and Hazardous Materials Safety Administration (PHMSA), a subset of the National Highway Traffic Safety Administration (NHTSA), updated a rule for Pipeline Operators. The rule went into effect on October 5, 2022. The PHMSA rule is 49 CFR § 192.615(a)(8) and § 195.402(e)(7). It requires pipeline operators to contact the appropriate PSAP immediately upon notification of a potential rupture. The rule specifies the following:

A Notification of Potential Rupture is an observation of any unanticipated or unexplained:

- Pressure loss outside of the pipeline's normal operating pressure
- Rapid release of a large volume of a commodity (e.g., natural gas or hazardous liquid)
- Fire or explosion in the immediate vicinity

ECCs will begin to receive calls from pipeline operators for situations that may not be dispatchable. Of the three potential rupture notifications, the "pressure loss outside of the pipeline's normal operating pressure" will be the most difficult for responders to locate and mitigate. The operators will contact the ECC at the same time they are sending a technician to check the potential problem and determine the actual location. Many pipeline segments span an extensive area that could cross multiple ECC and Fire Department boundaries. Based on recent discussions with pipeline operators, they will call ECCs to fulfill the rule requirements to place the ECC on standby for a potential problem. They also want the ECC to contact them if the ECC receives any calls that may confirm there is a problem.

PHMSA and pipeline operators lack an understanding of local ECC and first responder policies and procedures. Some pipeline operators have already sent letters to ECCs that serve the areas their pipeline infrastructure is located. It does not appear that PHMSA engaged the ECC community before adopting the rule, nor have they communicated this information to the responder community.

So, what does this mean for your ECC? ECCs are responsible for intaking information and dispatching appropriate resources. They are not in the habit of intaking details of a potential emergency and doing nothing with it. To do nothing creates liability issues for your ECC. ECC Managers should work with local Fire Departments to develop local policy regarding handling these calls. The policy will need to address whether to hold the information until further information is provided from the pipeline operator or, if a dispatch is to be made, what resources need to be sent. The policy should also address how to properly notify the pipeline operator if the ECC or responders discover that a potential rupture is, in fact, an actual rupture. ECC management should incorporate pipeline maps into their local GIS systems or maintain a map easily accessible to call-takers of the pipeline infrastructure within their jurisdiction. PHMSA has a pipeline mapping system that ECCs can use, <https://www.npms.phmsa.dot.gov/>. In addition, the ECC should consider specific questions within their call intake guides.

Specific Questions that ECCs may want to incorporate for potential rupture situations include:

1. What commodity might be leaking, and how severe does the potential leak appear?
2. What is the point-to-point location span of the potential rupture?
3. Is any special equipment needed for responders to mitigate the potential problem?

To comply with the new PHMSA rule, pipeline operators must contact ECCs reliably. Some pipeline operators are local or regional companies with existing relationships with the ECCs in their area. However, many pipeline operators serve a large geographic area and may not have established relationships with every ECC within their service area. Those pipeline operators may utilize the NENA Enhanced PSAP Registry and Census (EPRC) to obtain PSAP contact information. NENA strongly encourages you to verify the accuracy of your PSAP's contact information in the EPRC database. ECC 24/7/365 emergency contact number(s) should be 10-digit lines answered as quickly as possible. Callers should not be required to interact with a phone tree or wait on hold if possible. Access to the EPRC is free for ECCs. To learn more and to request user accounts if you do not already use the EPRC, visit nena.org/eprc.

Pipeline Emergency

Call Gas Control Or Pipeline Control Center

Use **Pipeline Emergency Response Planning**

Information Manual for contact information

Phone number on warning markers

Use state One-Call System, if applicable

Control Center Needs To Know

Your name & title in your organization

Call back phone number – primary, alternate

Establish a meeting place

Be very specific on the location (**use GPS**)

Provide City, County and State

Injuries, Deaths, Or Property Damage

Have any known injuries occurred?

Have any known deaths occurred?

Has any severe property damage occurred?

Traffic & Crowd Control

Secure leak site for reasonable distance

Work with company to determine safety zone

No traffic allowed through any hot zone

Move sightseers and media away

Eliminate ignition sources

Fire

Is the leak area on fire?

Has anything else caught on fire besides the leak?

Evacuations

Primary responsibility of emergency agency

Consult with pipeline/gas company

Fire Management

Natural Gas – DO NOT put out until supply stopped

Liquid Petroleum – water is NOT recommended;
foam IS recommended

Use dry chemical, vaporizing liquids, carbon dioxide

Ignition Sources

Static electricity (*nylon windbreaker*)

Metal-to-metal contact

Pilot lights, matches & smoking, sparks from phone

Electric switches & motors

Overhead wires

Internal combustion engines

Garage door openers, car alarms & door locks

Firearms

Photo equipment

High torque starters – diesel engines

Communication devices – not intrinsically safe

High Consequence Areas Identification*

Pipeline safety regulations use the concept of “High Consequence Areas” (HCAs), to identify specific locales and areas where a release could have the most significant adverse consequences. Once identified, operators are required to devote additional focus, efforts, and analysis in HCAs to ensure the integrity of pipelines.

Releases from pipelines can adversely affect human health and safety, cause environmental degradation, and damage personal or commercial property. Consequences of inadvertent releases from pipelines can vary greatly, depending on where the release occurs, and the commodity involved in the release.

What criteria define HCAs for pipelines?

Because potential consequences of natural gas and hazardous liquid pipeline releases differ, criteria for HCAs also differ. HCAs for natural gas transmission pipelines focus solely on populated areas. (Environmental and ecological consequences are usually minimal for releases involving natural gas.) Identification of HCAs for hazardous liquid pipelines focuses on populated areas, drinking water sources, and unusually sensitive ecological resources.

HCAs for hazardous liquid pipelines:

- Populated areas include both high population areas (called “urbanized areas” by the U.S. Census Bureau) and other populated areas (areas referred to by the Census Bureau as a “designated place”).
- Drinking water sources include those supplied by surface water or wells and where a secondary source of water

supply is not available. The land area in which spilled hazardous liquid could affect the water supply is also treated as an HCA.

- Unusually sensitive ecological areas include locations where critically imperiled species can be found, areas where multiple examples of federally listed threatened and endangered species are found, and areas where migratory water birds concentrate.

HCAs for natural gas transmission pipelines:

- An equation has been developed based on research and experience that estimates the distance from a potential explosion at which death, injury or significant property damage could occur. This distance is known as the “potential impact radius” (or PIR), and is used to depict potential impact circles.
- Operators must calculate the potential impact radius for all points along their pipelines and evaluate corresponding impact circles to identify what population is contained within each circle.
- Potential impact circles that contain 20 or more structures intended for human occupancy; buildings housing populations of limited mobility; buildings that would be hard to evacuate. (Examples are nursing homes, schools); or buildings and outside areas occupied by more than 20 persons on a specified minimum number of days each year, are defined as HCA's.

* <https://primis.phmsa.dot.gov/comm/FactSheets/FSHCA.htm>

Identified Sites*

Owners and companies of gas transmission pipelines are regulated by the US Department of Transportation (DOT). According to integrity management regulations, gas pipeline companies are required to accept the assistance of local public safety officials in identifying certain types of sites or facilities adjacent to the pipeline which meets the following criteria:

- (a) A small, well-defined outside area that is occupied by twenty or more persons on at least 50 days in any twelve-month period (the days need not be consecutive). Examples of such an area are playgrounds, parks, swimming pools, sports fields, and campgrounds.
- (b) A building that is occupied by 20 or more persons on at least 5 days a week for 10 weeks in any 12 month period (the days and weeks need not be consecutive). Examples included in the definition are: religious facilities, office buildings, community centers, general stores, 4-H facilities, and roller rinks.

- (c) A facility that is occupied by persons who are confined, are of impaired mobility, or would be difficult to evacuate. Examples of such a facility are hospitals, schools, elder care, assisted living/nursing facilities, prisons and child daycares.

If you know of sites within your jurisdiction that fit any of the above requirements, please go to isr.pipelineportal.com to provide this valuable information to pipeline companies.

* 49 CFR §192.903.

Training Center

Supplemental training available for agencies and personnel that are unable to attend:

- Train as your schedule allows
- Download resources including pipeline operator specific information
 - Sponsoring pipeline operator contact information
 - Product(s) transported

- Submit Agency Capabilities Survey
- Receive Certificate of Completion

Visit <https://trainingcenter.pdigm.com/> to register for training





Kansas Intelligence Fusion Center (KIFC)

Summary

- The Kansas Intelligence Fusion Center (KIFC) is a multi-discipline center designed to gather, analyze, and disseminate homeland security intelligence needed to protect Kansans.
 - The KIFC's extensive access to classified information enables production of customized analysis addressing the broad spectrum of threats facing our state.
 - The KIFC integrates all relevant disciplines to produce tactical analysis critical for preventing and responding to terrorism as well as strategic analysis critical for policy-makers who must allocate diminishing homeland security resources.
 - As lead agency for the KIFC, the Attorney General's Office assigns a full-time Coordinator (Director) to develop analytical capabilities, build multi-agency partnerships and facilitate intelligence analysis; as well as a Privacy Officer to ensure KIFC operations are consistent with protecting the privacy rights and civil liberties of our citizens.
-

KIFC Mission

The KIFC combines the efforts and perspectives of personnel from all relevant disciplines (local, tribal, state and federal agencies and private sector entities) in the process of all-source research and analysis to produce homeland security intelligence products.

- Develop analysis capability utilizing classified and unclassified information (all source analysis) to identify threats/trends most relevant to Kansas.
- Develop state-wide reporting and dissemination network.
- Develop STRA TEG/C intelligence analysis products containing information necessary for Kansas leadership to apply homeland security resources and efforts with the greatest precision (i.e. make better decisions).
- Develop TACTICAL intelligence analysis products, containing actionable information, that support Kansas first responder efforts to: prevent terrorist, asymmetric or international criminal attacks or to respond, mitigate and recover from natural or manmade disaster.

Crisis City

Crisis City was developed in response to initiatives by Governor Kathleen Sebelius and the Adjutant General of Kansas, Major General Tod Bunting, in April 2007 initially to fill the need to enhance the State's capability to defend against terrorism threats and respond to disasters and emergencies. Since then the mission of Crisis City has expanded to: "Provide Kansas first responders and those who do the dirty work, including the Kansas National Guard and our public and private partners, with a world class, multi-discipline, multi-agency training environment that has no rival." Crisis City provides state of the art training facilities to all emergency response and support



agencies, whether in one of its classrooms or on any of the training venues. Crisis City is a multi-use, fully functional training complex for local, state, and federal responders,

Emergency Management professionals, public and private industry safety professionals, and military operations in support of civil authorities.

6401 W. M60 Road • Lindsborg, KS 67456 • Phone:785-452-9838 • Fax:785-309-0573 • www.crisiscitykansas.com

Rail Venue: This venue includes a diesel engine, two boxcars, two liquid cars, a grain/coal car, and a two level passenger car. It is suitable for derailment search and rescue operations, hazardous material search and containment operations, train stoppage training and many other such training operations.



Urban Village

Urban Village: The Urban village simulates a small urban setting with a number of buildings of varying stories. This venue is suited for search and rescue operation, breaching and shoring operations, law enforcement and military search and extraction as well as closequarters small-arms combat operation.

Search and Rescue Tower: The Search and Rescue Venue is a three story structure suited for high rise rescue operations, rope rescue, military and law enforcement search and extraction operations, and shoring operations.



Search & Rescue Tower



Kansas Pipeline

Kansas Pipeline Association: In Kansas, more than 47,000 miles of piping runs throughout the state. The pipeline industry has an excellent safety record, but in those rare instances when an incident does occur and products are released, it is imperative that emergency responders are trained to handle the situation appropriately. This venue will equip personnel with the skills necessary to deal with 3rd party damage, abnormal operating

Two Collapsed Structures: Two large collapsed structures with underlying tunnel infrastructure suited for collapsed structure search and rescue operations, breaching and shoring operations, K-9 search for both rescue dog and cadaver dog operations, and heavy equipment extraction operations.

The Main Building: The main building has a large classroom for up to 150 people and a smaller classroom for up to 50 people, a command tower with a 300 degree view of all of Crisis City for observers/controllers and incident commanders can control operation on all venues while maintaining line of sight contact with all personnel.

conditions and any incident that could potentially affect the public.

K-9 search and rescue: Agility and directional courses.

Active shooter and forced entry venue: This is a computer operated electronic venue for the use of lethal force training.

Airplane and helicopter fuselage: This venue is used for training of down aircraft and search & rescue.

Pipeline Damage Reporting Law As Of 2007

H.R. 2958 Emergency Alert Requirements

Any person, including a government employee or contractor, who while engaged in the demolition, excavation, tunneling, or construction in the vicinity of a pipeline facility:

A. Becomes aware of damage to the pipeline facility that may endanger life or cause serious bodily harm or damage to property; or

B. Damages the pipeline facility in a manner that may endanger life or cause serious bodily harm or damage to property, shall promptly report the damage to the operator of the facility and to other appropriate authorities.

Websites:

Call Before You Clear

www.callbeforeyouclear.com

American Gas Association

www.aga.org

Common Ground Alliance

www.commongroundalliance.com

Computer-Aided Management of Emergency Operations (CAMEO)

www.epa.gov/cameo

Federal Emergency Management Agency

www.fema.gov

Government Emergency Telecommunications Services (GETS)

www.dhs.gov/government-emergency-telecommunications-service-gets

Infrastructure Protection – NIPC

www.infragard.net

Interstate Natural Gas Association of America

www.ingaa.org

Kansas 911 Coordinating Council

www.kansas911.org

Kansas Corporation Commission

kcc.state.ks.us/

Kansas Emergency Management Association (KEMA)

www.kema.org

Kansas One-Call

www.kansas811.com/

Kansas Pipeline Association

www.kpa-awareness.com

National Emergency Number Association (NENA)

www.nena.org

National Fire Protection Association (NFPA)

www.nfpa.org

National One-Call Dialing Number: 811

www.call811.com

National Pipeline Mapping System

www.npms.phmsa.dot.gov

National Response Center

www.nrc.uscg.mil or 800-424-8802

Occupational Safety and Health Administration (OSHA)

www.osha.gov

Pipeline and Hazardous Materials Safety Administration

www.phmsa.dot.gov

Pipelines and Informed Planning Alliance (PIPA)

<http://primis.phmsa.dot.gov/comm/pipa/landuseplanning.htm>

Pipeline Safety Trust

www.pstrust.org

Southern Gas Association

www.southerngas.org

Training Center

<https://nasfm-training.org/pipeline/>

Wireless Information System for Emergency Responders (WISER)

www.wiser.nlm.nih.gov

FOR EMERGENCY RESPONSE INFORMATION, REFER TO DOT GUIDEBOOK.

FOR COPIES: (202) 366-4900

<http://www.phmsa.dot.gov/hazmat/outreach-training/erg>

FOR MORE INFORMATION ON THE NASFM PIPELINE EMERGENCIES PROGRAM

www.pipelineemergencies.com

FOR FACILITATORS & EMERGENCY RESPONDER TRAINING:

Paradigm Liaison Services, LLC

www.pdigm.com/PLS

Presenter/Contact Information:		Key Take-Aways:	
		✓	
		✓	
		✓	
		✓	
		✓	
Comments to Remember			
Questions to Ask			
New Concepts to Explore			

EMERGENCY CONTACT LIST

OPERATOR	EMERGENCY NUMBER
Atmos Energy	1-866-322-8667
Black Hills Energy	1-800-694-8989
CHS McPherson Refinery Inc. Pipeline.....	1-844-721-6611
City of Chanute	1-620-431-5270
City of Lyons.....	1-800-694-8989
Coffeyville Resources Crude Transportation, LLC	1-800-982-4112
DCP Operating Company, LP	1-800-435-1679
or	1-888-204-1781
Enable Midstream Partners	1-800-474-1954
Enbridge / Platte Pipe Line Company.....	1-800-858-5253
Energy Transfer (Crude).....	1-800-753-5531
Energy Transfer (NGL)	1-877-839-7473
Energy Transfer Natural Gas	1-800-375-5702
or	1-877-404-2730
Enterprise Products Operating LLC.....	1-888-883-6308
Evergy	1-816-654-1499
Evonik.....	1-316-522-8181
Flint Hills Area Natural Gas Operators (City of Alma).....	1-785-765-3323
Flint Hills Area Natural Gas Operators (City of Auburn)	1-785-357-8095
Flint Hills Area Natural Gas Operators (City of Burlingame).....	1-785-654-3431
Flint Hills Area Natural Gas Operators (City of Eskridge).....	1-785-765-3323
Flint Hills Area Natural Gas Operators (City of Harveyville)	1-785-765-3323
Flint Hills Area Natural Gas Operators (City of Havensville).....	1-785-456-5427
Flint Hills Area Natural Gas Operators (City of McFarland).....	1-785-456-4056
Flint Hills Area Natural Gas Operators (City of Osage City).....	1-785-528-3714
Flint Hills Area Natural Gas Operators (City of Reading)	1-620-699-3870
Gary Climate Solutions, LLC	1-620-275-9055
Great Salt Plains Pipeline, LLC	1-866-219-0015
Holly Energy Partners - Operating L.P.	1-877-748-4464
Jamestown Municipal Gas.....	1-785-439-6621
Jayhawk Pipeline, L.L.C.	1-888-542-9575
Kansas Gas Service	1-888-482-4950
Kaw Pipe Line Company	1-888-542-9575
Kinder Morgan - Cheyenne Plains Gas Pipeline Company, LLC	1-877-712-2288
Kinder Morgan - Colorado Interstate Gas Company, L.L.C	1-877-712-2288
KPC Pipeline, LLC.....	1-800-467-2751
Magellan Midstream Partners, LP	1-800-720-2417
Merit Energy Company.....	1-800-735-1212
Midwest Energy, Inc.	1-800-222-3121
Northern Natural Gas Company.....	1-888-367-6671
NuStar Pipeline Operating Partnership L.P.	1-800-759-0033
ONEOK Field Services Company LLC.....	1-888-675-3302
ONEOK Mid-Continent Market Center LLC.....	1-888-675-3302
ONEOK NGL Pipeline LLC.....	1-800-666-9041
ONEOK North System LLC	1-888-844-5658
Panhandle Eastern Pipe Line	1-800-225-3913
Phillips 66 Pipeline LLC	1-877-267-2290
Plains Pipeline, L.P.	1-800-708-5071
Scout Energy Management, LLC	1-866-645-3511
Tallgrass - Pony Express Pipeline	1-855-220-1762
Tallgrass - Rockies Express Pipeline	1-877-436-2253
Tallgrass - Tallgrass Interstate Gas Transmission	1-888-763-3690
Targa Pipeline Mid-Continent (West OK) LLC	1-800-722-7098
TC Energy Natural Gas	1-800-447-8066
TC Energy Liquids	1-866-920-0007
Tumbleweed Midstream, LLC	1-719-767-8700
Williams Bluestem Pipeline	1-855-945-5762
Williams Mid Continent Fractionation and Storage	1-855-945-5762
Williams Overland Pass Pipeline	1-855-945-5762

Note: The above numbers are for emergency situations. Additional pipeline operators may exist in your area.
Visit the National Pipeline Mapping System at www.npms.phmsa.dot.gov for transmission companies not listed above.

COMPANY	PHONE NUMBER
Kansas811.....	811 or 1-800-344-7233
Kansas Corporation Commission Abandoned Wells (Primary)	1-316-337-6035
Kansas Corporation Commission Abandoned Wells (After Hours)	1-316-722-8955



Kansas Pipeline Association
P.O. Box 9123
Wichita, KS 67277
1-866-577-1162
kpa-awareness.com