DOT	US Department of Transportation
PHMSA	Pipelines and Hazardous Materials Safety Administration
OPS	Office of Pipeline Safety
	Southwest Region

Principal Investigator	Gene Roberson
Region Director	R.M. Seeley
Date of Report	4/15/2011
Subject	Failure Investigation Report – Texas Gas Transmission Internal Corrosion

Operator, Location, & Consequences

Date of Failure	8/4/2009 and 11/4/2009
Commodity Released	Natural Gas
City/County & State	Grand Chenier/ Cameron LA
OpID & Operator Name	19270 Texas Gas Transmission LLC
Unit # & Unit Name	9704 Euncie District
SMART Activity #	126777
Milepost / Location	Milepost 28
Type of Failure	Leak caused by Internal Corrosion
Fatalities	0
Injuries	0
Description of area impacted	Marshy Area
Property Damage	$249,250 combined for both failures

System Details

This pipeline is a portion of Texas Gas Transmission LLC Unit 9704 – Eunice District. The system consists of 32 miles of 20 inch OD X 0.280 wt. API 5L X-60 ERW line pipe from American Steel. The pipeline was installed in 1981 and has an MAOP of 1052 psig. The line travels from Roanoke Junction to Grand Chenier, LA. The pipeline route traverses mostly through marshy areas and is identified as Class 1 for regulatory documentation. This unit has no history of incidents or releases associated with corrosion or any other causes in the last ten years.

Events Leading up to the Failure

The production volume had fallen off and the line was shut in under pressure. The pipeline has not actively transported gas for the last ten years. Prior to the release, the line was static holding a pressure of 725 psig.

At approximately 10:00 am CST, August 4, 2009, Texas Gas Transmission LLC identified a gas release at approximately Mile Post 28. The location of the leak was in the marsh about 3 miles north of Grand Chenier, LA.

Emergency Response

The line had been shut in therefore block valves on either side of the release location were already closed. Upon notification of the leak, crews were dispatched to monitor the site. Since the leak site was isolated from public exposure, Texas Gas allowed the pipeline to blow down through the leak. Blow down was completed at 9:15pm that evening. The site was secured until plans could be finalized for investigation. Permits were requested for entry into the marsh.

Summary of initial start-up plan and return-to-service, including preliminary safety measures

Upon excavation of the failure, Texas Gas identified internal corrosion as the cause of the failure and installed a PLIDCO split sleeve over the leaking area of pipe on August 24 through 26, 2009 (See Appendix C).

To assess the condition of the pipeline, the operator scheduled an ILI for November 2009. The pipeline was pressured to approximately 50% MAOP to accommodate the running of the ILI tool. During the pressurization of the pipeline, a second leak occurred at approximately Mile Post 30. The operator determined that the second leak was also a result of internal corrosion. A leak clamp was installed at the second leak site and the ILI run was successfully completed on December 10, 2009.

Preliminary data from the ILI run indicated significant metal loss in certain areas between MP 12 and MP 32. This section of the pipeline was blown down to atmospheric pressure and locked out of service. The operator will determine whether to replace or abandon this section.

A section of the pipeline between MP 12 and 0 has been returned to service.

Investigation Findings & Contributing Factors

This incident was reported due to exceeding the cost criteria, there was no fire, explosion or injuries. The Southwest Region followed up on the incident but did not perform an onsite investigation.

The operator indicated that prior to shutting in this pipeline, corrosion inhibitor was injected and internal corrosion monitoring was accomplished by monitoring ER Probes and weight loss coupons. However, upon isolating the system, there was no flow, and the pipeline was no longer injected with inhibitor nor monitored. The operator further determined that the internal corrosion was a result of microbiologically influenced corrosion (MIC).

Appendices

A NRC Reports # 913752 and 922589

B Texas Gas Transmission Incident Reports to PHMSA

C Photographs

NATIONAL RESPONSE CENTER 1-800-424-8802
*** For Public Use ***
Information released to a third party shall comply with any
applicable federal and/or state Freedom of Information and Privacy Laws

Incident Report # 913752

INCIDENT DESCRIPTION

*Report taken at 12:12 on 04-AUG-09
Incident Type: PIPELINE
Incident Cause: EQUIPMENT FAILURE
Affected Area:
The incident was discovered on 04-AUG-09 at 10:00 local time.
Affected Medium: AIR ATMOSPHERE

SUSPECTED RESPONSIBLE PARTY

Organization: TEXAS GAS TRANSMISSION CORPORATION
OWENSBORO, KY 42301

Type of Organization: PRIVATE ENTERPRISE

INCIDENT LOCATION

County: CAMERON
City: GRAND CHEINERE State: LA Zip: 42301

Township: 15 SOUTH Range: 6 WEST 2 MILES NORTH OF HIGHWAY 62 IN A MARSH AREA

RELEASED MATERIAL(S)

CHRIS Code: ONG Official Material Name: NATURAL GAS
Also Known As:
Qty Released: 0 UNKNOWN AMOUNT

DESCRIPTION OF INCIDENT

CALLER STATED THAT A PIPELINE IS VENTING NATURAL GAS ABOUT 20 FEET INTO THE AIR DUE TO UNKNOWN CAUSES.

INCIDENT DETAILS

Pipeline Type: TRANSMISSION
DOT Regulated: YES
Pipeline Above/Below Ground: BELOW
Exposed or Under Water: NO
Pipeline Covered: UNKNOWN

DAMAGES

Fire Involved:	NO	Fire Extinguished: UNKNOWN			
INJURIES:	NO	Hospitalized:	Empl/Crew:	Passenger:	
FATALITIES:	NO	Empl/Crew:	Passenger:	Occupant:	
EVACUATIONS:	NO	Who Evacuated:	Radius/Area:		
Damages:	NO				

Closure Type		Description of Closure	Length of Closure	Direction of Closure
Air:	N			
Road:	N			Major Artery: N
Waterway:	N			
Track:	N			

Passengers Transferred: NO
Environmental Impact: UNKNOWN
Media Interest: NONE Community Impact due to Material:

REMEDIAL ACTIONS

CALLER STATED THE LINE WAS CLOSED OFF AND REPAIRS WILL BE MADE.
Release Secured: YES
Release Rate:
Estimated Release Duration:

WEATHER

Weather: UNKNOWN, °F

ADDITIONAL AGENCIES NOTIFIED

Federal: NONE
State/Local: NONE
State/Local On Scene: NONE
State Agency Number:

NOTIFICATIONS BY NRC

USCG ICC (ICC ONI)
04-AUG-09 12:28
DOT CRISIS MANAGEMENT CENTER (MAIN OFFICE)
04-AUG-09 12:28
U.S. EPA VI (MAIN OFFICE)
04-AUG-09 12:33
FLD INTEL SUPPORT TEAM NEW ORLEANS (SUPERVISOR, FIST NEW ORLEANS)
04-AUG-09 12:28
FLD INTEL SUPPORT TEAM PORT ARTHUR (FIST COMMAND CENTER)
04-AUG-09 12:28
FLD INTEL SUPPORT TEAM PORT ARTHUR (FIELD UNIT)
04-AUG-09 12:28
JFO-LA (COMMAND CENTER)
04-AUG-09 12:28
JFO-LA (FEMA JFO LA)
04-AUG-09 12:28
LA DEPT OF ENV QUAL (MAIN OFFICE)
04-AUG-09 12:28
LA DEPT OF WILDLIFE AND FISHERIES (ATTN: VAUGHAN MCDONALD)
04-AUG-09 12:28
LA OFFICE OF EMERGENCY PREPAREDNESS (MAIN OFFICE)
04-AUG-09 12:28
LA OFFICE OF GOV (MAIN OFFICE)
04-AUG-09 12:28
LA OFFICE OF PUBLIC HEALTH (MAIN OFFICE)
04-AUG-09 12:28
MSU LAKE CHARLES (MAIN OFFICE)
04-AUG-09 12:28
NATIONAL INFRASTRUCTURE COORD CTR (MAIN OFFICE)
04-AUG-09 12:28
NOAA RPTS FOR LA (MAIN OFFICE)
04-AUG-09 12:28
MSU PORT ARTHUR (MAIN OFFICE)
04-AUG-09 12:32
LA STATE POLICE (MAIN OFFICE)
04-AUG-09 12:28
TCEQ (MAIN OFFICE)
04-AUG-09 12:28

ADDITIONAL INFORMATION

GAS BLOW IS ABOUT 20FEET HIGH AND THE PIPELINE HAS BEEN SECURED BUT WILL CONTINUE TO BLOW UNTIL ALL THE PRESSURE IS RELEASED. CALLER STATED THE TOTAL ESTIMATED MATERIAL THAT WILL BE RELEASED IS 12,000,000 CUBIC FEET.

*** END INCIDENT REPORT # 913752 ***

NATIONAL RESPONSE CENTER 1-800-424-8802
*** For Public Use ***
Information released to a third party shall comply with any
applicable federal and/or state Freedom of Information and Privacy Laws

Incident Report # 922589

INCIDENT DESCRIPTION

*Report taken at 12:35 on 04-NOV-09
Incident Type: PIPELINE
Incident Cause: UNKNOWN
Affected Area:
The incident occurred on 04-NOV-09 at 10:50 local time.
Affected Medium: AIR ATMOSPHERE

SUSPECTED RESPONSIBLE PARTY

Organization: BOARDWALK PIPELINE
IOWA, LA 70647

Type of Organization: PRIVATE ENTERPRISE

INCIDENT LOCATION

County: CAMERON
City: CAMERON State: LA

2 MILES NORTH OF MERMENTAU RIVER ROAD (ON THE ROANOKE GRAND CHENIER 20" LINE)

RELEASED MATERIAL(S)

CHRIS Code: ONG Official Material Name: NATURAL GAS
Also Known As:
Qty Released: 0 UNKNOWN AMOUNT

DESCRIPTION OF INCIDENT

CALLER STATED NATURAL GAS RELEASED FROM A 20" PIPELINE INTO THE AIR DUE TO UNKNOWN CAUSES AT THIS TIME.

INCIDENT DETAILS

Pipeline Type: DISTRIBUTION
DOT Regulated: YES
Pipeline Above/Below Ground: ABOVE
Exposed or Under Water: NO
Pipeline Covered: UNKNOWN

DAMAGES

Fire Involved:	NO	Fire Extinguished: UNKNOWN			
INJURIES:	NO	Hospitalized:	Empl/Crew:	Passenger:	
FATALITIES:	NO	Empl/Crew:	Passenger:	Occupant:	
EVACUATIONS:	NO	Who Evacuated:	Radius/Area:		
Damages:	NO				

Closure Type		Description of Closure	Length of Closure	Direction of Closure
Air:	N			
Road:	N			Major Artery: N
Waterway:	N			
Track:	N			

Passengers Transferred: NO
Environmental Impact: UNKNOWN
Media Interest: NONE Community Impact due to Material:

REMEDIAL ACTIONS

ISOLATION WAS CONFIRMED, PIPELINE WAS ISOLATED AT THE TIME, RELEASE IS STILL OCCURRING
Release Secured: NO
Release Rate:
Estimated Release Duration:

WEATHER

Weather: SUNNY, 65ºF

ADDITIONAL AGENCIES NOTIFIED

Federal: NONE
State/Local: LDEQ, LEPC
State/Local On Scene:
State Agency Number: NONE

NOTIFICATIONS BY NRC

USCG ICC (ICC ONI)
04-NOV-09 12:45
DHS PROTECTIVE SECURITY ADVISOR (PSA DESK)
04-NOV-09 12:45
DOT CRISIS MANAGEMENT CENTER (MAIN OFFICE)
04-NOV-09 12:45
FLD INTEL SUPPORT TEAM NEW ORLEANS (SUPERVISOR, FIST NEW ORLEANS)
04-NOV-09 12:45
FLD INTEL SUPPORT TEAM PORT ARTHUR (FIST COMMAND CENTER)
04-NOV-09 12:45
FLD INTEL SUPPORT TEAM PORT ARTHUR (FIELD UNIT)
04-NOV-09 12:45
JFO-LA (COMMAND CENTER)
04-NOV-09 12:45
JFO-LA (FEMA JFO LA)
04-NOV-09 12:45
LA DEPT OF ENV QUAL (MAIN OFFICE)
04-NOV-09 12:45
LA DEPT OF WILDLIFE AND FISHERIES (ATTN: VAUGHAN MCDONALD)
04-NOV-09 12:45
LA OFFICE OF EMERGENCY PREPAREDNESS (MAIN OFFICE)
04-NOV-09 12:45
LA OFFICE OF GOV (MAIN OFFICE)
04-NOV-09 12:45
LA OFFICE OF PUBLIC HEALTH (MAIN OFFICE)
04-NOV-09 12:45
MSU LAKE CHARLES (MAIN OFFICE)
04-NOV-09 12:45
NATIONAL INFRASTRUCTURE COORD CTR (MAIN OFFICE)
04-NOV-09 12:45
NOAA RPTS FOR LA (MAIN OFFICE)
04-NOV-09 12:45
MSU PORT ARTHUR (MAIN OFFICE)
04-NOV-09 12:46
LA STATE POLICE (MAIN OFFICE)
04-NOV-09 12:45
TCEQ (MAIN OFFICE)
04-NOV-09 12:45

ADDITIONAL INFORMATION

CALLER STATES THERE IS APPROXIMATELY 6-8 INCH BUBBLING OF GAS ON TOP OF THE LINE.

*** END INCIDENT REPORT # 922589 ***

NOTICE: This report is required by 49 CFR Part 191. Failure to report can result in a civil penalty not to exceed $25,000 for each violation for each day that such violation persists except that the maximum civil penalty shall not exceed $500,000 as provided in 49 USC 1678. Form Approved OMB No. 2137-0522

Print

U.S. Department of Transportation
Research and Special Programs Administration

INCIDENT REPORT - GAS TRANSMISSION AND GATHERING SYSTEMS

Report Date Aug 31, 2009

No. 20090092 -- 7783
(DOT Use Only)

INSTRUCTIONS

Important: *Please read the separate instructions for completing this form before you begin. They clarify the information requested and provide specific examples. If you do not have a copy of the instructions, you can obtain one from the Office Of Pipeline Safety Web Page at http://ops.dot.gov .*

PART A – GENERAL REPORT INFORMATION

Check one or more boxes as appropriate:
☐ Original Report ☒ Supplemental Report ☒ Final Report

Operator Name and Address

a. Operator's 5-digit Identification Number (when known) / 19270 /

b. If Operator does not own the pipeline, enter Owner's 5-digit Identification Number (when known) / /

c. Name of Operator TEXAS GAS TRANSMISSION LLC

d. Operator street address PO BOX 20008

e. Operator address OWENSBORO, DAVIESS, KY, 42301
City, County or Parrish, State and Zip Code

2. Time and date of the incident

/ 1000 / hr. / 08 / month / 04 / day /2009/ year

3. Location of incident

a. Nearest street or road

b. GRAND CHENIER CAMERON
City and County or Parrish

c. LA
State and Zip Code

d. Mile Post/Valve Station MP 30

e. Survey Station No.

f. Latitude: 29.83333 Longitude: 93.0
(if not available, see instructions for how to provide specific location)

g. Class location description
Onshore: ● Class 1 ○ Class 2 ○ Class 3 ○ Class 4
Offshore: ○ Class 1 *(complete rest of this item)*
Area Block #
State / / or Outer Continental Shelf ☐

h. Incident on Federal Land other than Outer Continental Shelf
○ Yes ● No

i. Is pipeline Interstate ● Yes ○ No

4. Type of leak or rupture
● Leak: ● Pinhole ○ Connection Failure *(complete sec. F5)*
○ Puncture, diameter *(inches)*
○ Rupture: ○ Circumferential – Separation
○ Longitudinal – Tear/Crack, length (inches)
Propagation Length, total, both sides (feet)
○ N/A
○ Other:

5. Consequences *(check and complete all that apply)*
a. ☐ Fatality Total number of people: / 0 /
Employees: / 0 / *General Public:* / 0 /
Non-employee Contractors: / 0 /

b. ☐ Injury requiring inpatient hospitalization Total number of people: / 0 /
Employees: / 0 / *General Public:* / 0 /
Non-employee Contractors: / 0 /

c. ☒ Property damage/loss *(estimated)* Total $ 199250
Gas loss $ 38250 Operator damage $ 161000
Public/private property damage $ 0

d. ☐ Release Occurred in a 'High Consequence Area'

e. ☐ Gas ignited – No explosion f. ☐ Explosion

g. ☐ Evacuation *(general public only)* / 0 / people
Reason for Evacuation:
○ Emergency worker or public official ordered, precautionary
○ Threat to the public ○ Company policy

6. Elapsed time until area was made safe:
/ 1 / hr. / / min.

7. Telephone Report
/ 913752 / NRC Report Number / 08 / month / 04 / day /2009/ year

8. a. Estimated pressure at point and time of incident:
725 *PSIG*

b. Max. allowable operating pressure *(MAOP):* 1052 *PSIG*

c. MAOP established by 49 CFR section:
☐ 192.619 (a)(1) ☐ 192. 619 (a)(2) ☐ 192. 619 (a)(3)
☐ 192.619 (a)(4) ☒ 192. 619 (c)

d. Did an overpressurization occur relating to the incident? ○ Yes ● No

PART B – PREPARER AND AUTHORIZED SIGNATURE

JACK L. ADAMS
(type or print) Preparer's Name and Title

(713) 479-8099
Area Code and Telephone Number

JACK.ADAMS@BWPMLP.COM
Preparer's E-mail Address

(713) 479-1720
Area Code and Facsimile Number

Authorized Signature (type or print) Name and Title

Date

Area Code and Telephone Number

PART C - ORIGIN OF THE INCIDENT

1. Incident occurred on
   - ● Transmission System
   - ○ Gathering System
   - ○ Transmission Line of Distribution System
2. Failure occurred on
   - ● Body of pipe ○ Pipe Seam
   - ○ Joint
   - ○ Component
   - ○ Other: _____
3. Material involved *(pipe, fitting, or other component)*
   - ● Steel
   - ○ Plastic (If plastic, complete all items that apply in a-c)
     Plastic failure was: ☐ a.ductile ☐ b.brittle ☐ c.joint failure
   - ○ Material other than plastic or steel: _____
4. Part of system involved in incident
   - ● Pipeline ○ Regulator/Metering System
   - ○ Compressor Station ○ Other: _____
5. Year the pipe or component which failed was installed: / 1981 /

PART D – MATERIAL SPECIFICATION (if applicable)

1. Nominal pipe size *(NPS)* / 20 / in.
2. Wall thickness / .28 / in.
3. Specification API5L SMYS / 60000 /
4. Seam type ERW
5. Valve type _____
6. Pipe or valve manufactured by AMERICAN STEEL in year / _____ /

PART E – ENVIRONMENT

1. Area of incident
   - ○ Under pavement ○ In open ditch
   - ● Under ground ○ Above ground
   - ○ Inside/under building ○ Under water
   - ○ Other: _____
2. Depth of cover: 48 inches

PART F – APPARENT CAUSE

Important: *There are 25 numbered causes in this section. Check the box to the left of the **primary** cause of the incident. Check one circle in each of the supplemental items to the right of or below the cause you indicate. See the instructions for this form for guidance.*

F1 – CORROSION

If either F1 (1) External Corrosion, or F1 (2) Internal Corrosion is checked, complete all subparts a – e.

1. ○ External Corrosion
2. ● Internal Corrosion

a. Pipe Coating
- ○ Bare
- ● Coated

b. Visual Examination
- ● Localized Pitting
- ○ General Corrosion
- ○ Other: _____

c. Cause of Corrosion
- ○ Galvanic ○ Stray Current
- ○ Improper Cathodic Protection
- ● Microbiological
- ○ Stress Corrosion Cracking
- ○ Other: _____

d. Was corroded part of pipeline considered to be under cathodic protection prior to discovering incident?
○ No ● Yes, Year Protection Started: / 1981 /

e. Was pipe previously damaged in the area of corrosion?
● No ○ Yes, How long prior to incident: / _____ / *years* / _____ / *months*

F2 – NATURAL FORCES

3. ○ Earth Movement => ○ Earthquake ○ Subsidence ○ Landslide ○ Other: _____
4. ○ Lightning
5. ○ Heavy Rains/Floods => ○ Washouts ○ Flotation ○ Mudslide ○ Scouring ○ Other: _____
6. ○ Temperature => ○ Thermal stress ○ Frost heave ○ Frozen components ○ Other: _____
7. ○ High Winds

F3 - EXCAVATION

8. ○ Operator Excavation Damage *(including their contractors)* / Not Third Party

9. ○ Third Party Excavation Damage *(complete a-d)*
   a. Excavator group
      ○ General Public ○ Government ○ Excavator other than Operator/subcontractor
   b. Type: ○ Road Work ○ Pipeline ○ Water ○ Electric ○ Sewer ○ Phone/Cable ○ Landowner ○ Railroad
      ○ Other: _____
   c. Did operator get prior notification of excavation activity?
      ○ No ○ Yes: Date received: / _____ / mo. / _____ / day / _____ / yr.
      Notification received from: ○ One Call System ○ Excavator ○ Contractor ○ Landowner
   d. Was pipeline marked?
      ○ No ○ Yes *(If Yes, check applicable items i – iv)*
      i. Temporary markings: ○ Flags ○ Stakes ○ Paint
      ii. Permanent markings: ○ Yes ○ No
      iii. Marks were *(check one)* ○ Accurate ○ Not Accurate
      iv. Were marks made within required time? ○ Yes ○ No

F4 – OTHER OUTSIDE FORCE DAMAGE

10. ○ Fire/Explosion as primary cause of failure => Fire/Explosion cause: ○ Man made ○ Natural
11. ○ Car, truck or other vehicle not relating to excavation activity damaging pipe
12. ○ Rupture of Previously Damaged Pipe
13. ○ Vandalism

F5 – MATERIAL AND WELDS

Material

14. ○ Body of Pipe => ○ Dent ○ Gouge ○ Wrinkle Bend ○ Arc Burn ○ Other: _____
15. ○ Component => ○ Valve ○ Fitting ○ Vessel ○ Extruded Outlet ○ Other: _____
16. ○ Joint => ○ Gasket ○ O-Ring ○ Threads ○ Other: _____

Weld

17. ○ Butt => ○ Pipe ○ Fabrication ○ Other: _____
18. ○ Fillet => ○ Branch ○ Hot Tap ○ Fitting ○ Repair Sleeve ○ Other: _____
19. ○ Pipe Seam => ○ LF ERW ○ DSAW ○ Seamless ○ Flash Weld
    ○ HF ERW ○ SAW ○ Spiral ○ Other: _____

*Complete a-g if you indicate **any** cause in part F5.*

a. Type of failure:
   ○ Construction Defect => ○ Poor Workmanship ○ Procedure not followed ○ Poor Construction Procedures
   ○ Material Defect

b. Was failure due to pipe damage sustained in transportation to the construction or fabrication site? ○ Yes ○ No

c. Was part which leaked pressure tested before incident occurred? ○ Yes, *complete d-g* ○ No

d. Date of test: /_____/ mo. /_____/ day /_____/ yr.

e. Test medium: ○ Water ○ Natural Gas ○ Inert Gas ○ Other: _____

f. Time held at test pressure: /_____/ hr.

g. Estimated test pressure at point of incident: _____ *PSIG*

F6 – EQUIPMENT AND OPERATIONS

20. ○ Malfunction of Control/Relief Equipment => ○ Valve ○ Instrumentation ○ Pressure Regulator ○ Other: _____
21. ○ Threads Stripped, Broken Pipe Coupling => ○ Nipples ○ Valve Threads ○ Mechanical Couplings ○ Other: _____
22. ○ Ruptured or Leaking Seal/Pump Packing

23. ○ Incorrect Operation
    a. Type: ○ Inadequate Procedures ○ Inadequate Safety Practices ○ Failure to Follow Procedures ○ Other: _____
    b. Number of employees involved who failed post-incident drug test: /_____/ Alcohol test: /_____/
    c. Were most senior employee(s) involved qualified? ○ Yes ○ No d. Hours on duty: /_____/

F7 – OTHER

24. ○ Miscellaneous, *describe:* _____
25. ○ Unknown
    ○ Investigation Complete ○ Still Under Investigation *(submit a supplemental report when investigation is complete)*

PART G – NARRATIVE DESCRIPTION OF FACTORS CONTRIBUTING TO THE EVENT *(Attach additional sheets as necessary)*

LEAK INDICATION IS LOCATED IN MARSH WATER. PIPELINE WAS ISOLATED AND ALLOWED TO BLOWDOWN TO ZERO. SCHEDULING REPAIR ACTIVITY AT THIS TIME.
UPDATE: PLIDCO SPLIT SLEEVE INSTALLED AND PIPELINE RETURNED TO SERVICE 12/07/2009

NOTICE: This report is required by 49 CFR Part 191. Failure to report can result in a civil penalty not to exceed $25,000 for each violation for each day that such violation persists except that the maximum civil penalty shall not exceed $500,000 as provided in 49 USC 1678. Form Approved OMB No. 2137-0522

Print

U.S. Department of Transportation
Research and Special Programs Administration

INCIDENT REPORT - GAS TRANSMISSION AND GATHERING SYSTEMS

Report Date Aug 31, 2009

No. 20090092 -- 7783
(DOT Use Only)

INSTRUCTIONS

Important: *Please read the separate instructions for completing this form before you begin. They clarify the information requested and provide specific examples. If you do not have a copy of the instructions, you can obtain one from the Office Of Pipeline Safety Web Page at http://ops.dot.gov .*

PART A – GENERAL REPORT INFORMATION

Check one or more boxes as appropriate:
☐ Original Report ☒ Supplemental Report ☒ Final Report

Operator Name and Address

a. Operator's 5-digit Identification Number (when known) / 19270 /

b. If Operator does not own the pipeline, enter Owner's 5-digit Identification Number (when known) / /

c. Name of Operator TEXAS GAS TRANSMISSION LLC

d. Operator street address PO BOX 20008

e. Operator address OWENSBORO, DAVIESS, KY, 42301
City, County or Parrish, State and Zip Code

2. Time and date of the incident

/ 1000 / hr. / 08 / month / 04 / day /2009/ year

3. Location of incident

a. _____
Nearest street or road

b. GRAND CHENIER CAMERON
City and County or Parrish

c. LA
State and Zip Code

d. Mile Post/Valve Station MP 30

e. Survey Station No. _____

f. Latitude: 29.83333 Longitude: 93.0
(if not available, see instructions for how to provide specific location)

g. Class location description
Onshore: ● Class 1 ○ Class 2 ○ Class 3 ○ Class 4
Offshore: ○ Class 1 *(complete rest of this item)*
Area _____ Block # _____
State / / or Outer Continental Shelf ☐

h. Incident on Federal Land other than Outer Continental Shelf
○ Yes ● No

i. Is pipeline Interstate ● Yes ○ No

4. Type of leak or rupture
● Leak: ● Pinhole ○ Connection Failure *(complete sec. F5)*
○ Puncture, diameter *(inches)* _____
○ Rupture: ○ Circumferential – Separation
○ Longitudinal – Tear/Crack, length (inches) _____
Propagation Length, total, both sides (feet) _____
○ N/A
○ Other: _____

5. Consequences *(check and complete all that apply)*
a. ☐ Fatality Total number of people: / 0 /
Employees: / 0 / *General Public:* / 0 /
Non-employee Contractors: / 0 /

b. ☐ Injury requiring inpatient hospitalization Total number of people: / 0 /
Employees: / 0 / *General Public:* / 0 /
Non-employee Contractors: / 0 /

c. ☒ Property damage/loss *(estimated)* Total $ 199250
Gas loss $ 38250 Operator damage $ 161000
Public/private property damage $ 0

d. ☐ Release Occurred in a 'High Consequence Area'

e. ☐ Gas ignited – No explosion f. ☐ Explosion

g. ☐ Evacuation *(general public only)* / 0 / people
Reason for Evacuation:
○ Emergency worker or public official ordered, precautionary
○ Threat to the public ○ Company policy

6. Elapsed time until area was made safe:
/ 1 / hr. / / min.

7. Telephone Report
/ 913752 / NRC Report Number / 08 / month / 04 / day /2009/ year

8. a. Estimated pressure at point and time of incident:
725 *PSIG*

b. Max. allowable operating pressure *(MAOP):* 1052 *PSIG*

c. MAOP established by 49 CFR section:
☐ 192.619 (a)(1) ☐ 192. 619 (a)(2) ☐ 192. 619 (a)(3)
☐ 192.619 (a)(4) ☒ 192. 619 (c)

d. Did an overpressurization occur relating to the incident? ○ Yes ● No

PART B – PREPARER AND AUTHORIZED SIGNATURE

JACK L. ADAMS
(type or print) Preparer's Name and Title

(713) 479-8099
Area Code and Telephone Number

JACK.ADAMS@BWPMLP.COM
Preparer's E-mail Address

(713) 479-1720
Area Code and Facsimile Number

_____ Date
Authorized Signature

(type or print) Name and Title

Area Code and Telephone Number

PART C - ORIGIN OF THE INCIDENT

1. Incident occurred on
   - ● Transmission System
   - ○ Gathering System
   - ○ Transmission Line of Distribution System
2. Failure occurred on
   - ● Body of pipe ○ Pipe Seam
   - ○ Joint
   - ○ Component
   - ○ Other: _____
3. Material involved *(pipe, fitting, or other component)*
   - ● Steel
   - ○ Plastic (If plastic, complete all items that apply in a-c)
     Plastic failure was: ☐ a.ductile ☐ b.brittle ☐ c.joint failure
   - ○ Material other than plastic or steel: _____
4. Part of system involved in incident
   - ● Pipeline ○ Regulator/Metering System
   - ○ Compressor Station ○ Other: _____
5. Year the pipe or component which failed was installed: / 1981 /

PART D – MATERIAL SPECIFICATION (if applicable)

1. Nominal pipe size *(NPS)* / 20 / in.
2. Wall thickness / .28 / in.
3. Specification API5L SMYS / 60000 /
4. Seam type ERW
5. Valve type _____
6. Pipe or valve manufactured by AMERICAN STEEL in year / _____ /

PART E – ENVIRONMENT

1. Area of incident
   - ○ Under pavement ○ In open ditch
   - ● Under ground ○ Above ground
   - ○ Inside/under building ○ Under water
   - ○ Other: _____
2. Depth of cover: 48 inches

PART F – APPARENT CAUSE

Important: *There are 25 numbered causes in this section. Check the box to the left of the **primary** cause of the incident. Check one circle in each of the supplemental items to the right of or below the cause you indicate. See the instructions for this form for guidance.*

F1 – CORROSION

If either F1 (1) External Corrosion, or F1 (2) Internal Corrosion is checked, complete all subparts a – e.

1. ○ External Corrosion
2. ● Internal Corrosion

a. Pipe Coating
- ○ Bare
- ● Coated

b. Visual Examination
- ● Localized Pitting
- ○ General Corrosion
- ○ Other: _____

c. Cause of Corrosion
- ○ Galvanic ○ Stray Current
- ○ Improper Cathodic Protection
- ● Microbiological
- ○ Stress Corrosion Cracking
- ○ Other: _____

d. Was corroded part of pipeline considered to be under cathodic protection prior to discovering incident?
○ No ● Yes, Year Protection Started: / 1981 /

e. Was pipe previously damaged in the area of corrosion?
● No ○ Yes, How long prior to incident: / _____ / *years* / _____ / *months*

F2 – NATURAL FORCES

3. ○ Earth Movement => ○ Earthquake ○ Subsidence ○ Landslide ○ Other: _____
4. ○ Lightning
5. ○ Heavy Rains/Floods => ○ Washouts ○ Flotation ○ Mudslide ○ Scouring ○ Other: _____
6. ○ Temperature => ○ Thermal stress ○ Frost heave ○ Frozen components ○ Other: _____
7. ○ High Winds

F3 - EXCAVATION

8. ○ Operator Excavation Damage *(including their contractors)* / Not Third Party

9. ○ Third Party Excavation Damage *(complete a-d)*
   a. Excavator group
      ○ General Public ○ Government ○ Excavator other than Operator/subcontractor
   b. Type: ○ Road Work ○ Pipeline ○ Water ○ Electric ○ Sewer ○ Phone/Cable ○ Landowner ○ Railroad
      ○ Other: _____
   c. Did operator get prior notification of excavation activity?
      ○ No ○ Yes: Date received: / _____ / mo. / _____ / day / _____ / yr.
      Notification received from: ○ One Call System ○ Excavator ○ Contractor ○ Landowner
   d. Was pipeline marked?
      ○ No ○ Yes *(If Yes, check applicable items i – iv)*
      i. Temporary markings: ○ Flags ○ Stakes ○ Paint
      ii. Permanent markings: ○ Yes ○ No
      iii. Marks were *(check one)* ○ Accurate ○ Not Accurate
      iv. Were marks made within required time? ○ Yes ○ No

F4 – OTHER OUTSIDE FORCE DAMAGE

10. ○ Fire/Explosion as primary cause of failure => Fire/Explosion cause: ○ Man made ○ Natural
11. ○ Car, truck or other vehicle not relating to excavation activity damaging pipe
12. ○ Rupture of Previously Damaged Pipe
13. ○ Vandalism

F5 – MATERIAL AND WELDS

Material

14. ○ Body of Pipe => ○ Dent ○ Gouge ○ Wrinkle Bend ○ Arc Burn ○ Other: _____
15. ○ Component => ○ Valve ○ Fitting ○ Vessel ○ Extruded Outlet ○ Other: _____
16. ○ Joint => ○ Gasket ○ O-Ring ○ Threads ○ Other: _____

Weld

17. ○ Butt => ○ Pipe ○ Fabrication ○ Other: _____
18. ○ Fillet => ○ Branch ○ Hot Tap ○ Fitting ○ Repair Sleeve ○ Other: _____
19. ○ Pipe Seam => ○ LF ERW ○ DSAW ○ Seamless ○ Flash Weld
    ○ HF ERW ○ SAW ○ Spiral ○ Other: _____

*Complete a-g if you indicate **any** cause in part F5.*

a. Type of failure:
   ○ Construction Defect => ○ Poor Workmanship ○ Procedure not followed ○ Poor Construction Procedures
   ○ Material Defect

b. Was failure due to pipe damage sustained in transportation to the construction or fabrication site? ○ Yes ○ No

c. Was part which leaked pressure tested before incident occurred? ○ Yes, *complete d-g* ○ No

d. Date of test: /_____/ mo. /_____/ day /_____/ yr.

e. Test medium: ○ Water ○ Natural Gas ○ Inert Gas ○ Other: _____

f. Time held at test pressure: /_____/ hr.

g. Estimated test pressure at point of incident: _____ *PSIG*

F6 – EQUIPMENT AND OPERATIONS

20. ○ Malfunction of Control/Relief Equipment => ○ Valve ○ Instrumentation ○ Pressure Regulator ○ Other: _____
21. ○ Threads Stripped, Broken Pipe Coupling => ○ Nipples ○ Valve Threads ○ Mechanical Couplings ○ Other: _____
22. ○ Ruptured or Leaking Seal/Pump Packing

23. ○ Incorrect Operation
    a. Type: ○ Inadequate Procedures ○ Inadequate Safety Practices ○ Failure to Follow Procedures ○ Other: _____
    b. Number of employees involved who failed post-incident drug test: /_____/ Alcohol test: /_____/
    c. Were most senior employee(s) involved qualified? ○ Yes ○ No d. Hours on duty: /_____/

F7 – OTHER

24. ○ Miscellaneous, *describe:* _____
25. ○ Unknown
    ○ Investigation Complete ○ Still Under Investigation *(submit a supplemental report when investigation is complete)*

PART G – NARRATIVE DESCRIPTION OF FACTORS CONTRIBUTING TO THE EVENT *(Attach additional sheets as necessary)*

LEAK INDICATION IS LOCATED IN MARSH WATER. PIPELINE WAS ISOLATED AND ALLOWED TO BLOWDOWN TO ZERO. SCHEDULING REPAIR ACTIVITY AT THIS TIME.
UPDATE: PLIDCO SPLIT SLEEVE INSTALLED AND PIPELINE RETURNED TO SERVICE 12/07/2009

Figure 1 Photo of leak at MP 28.

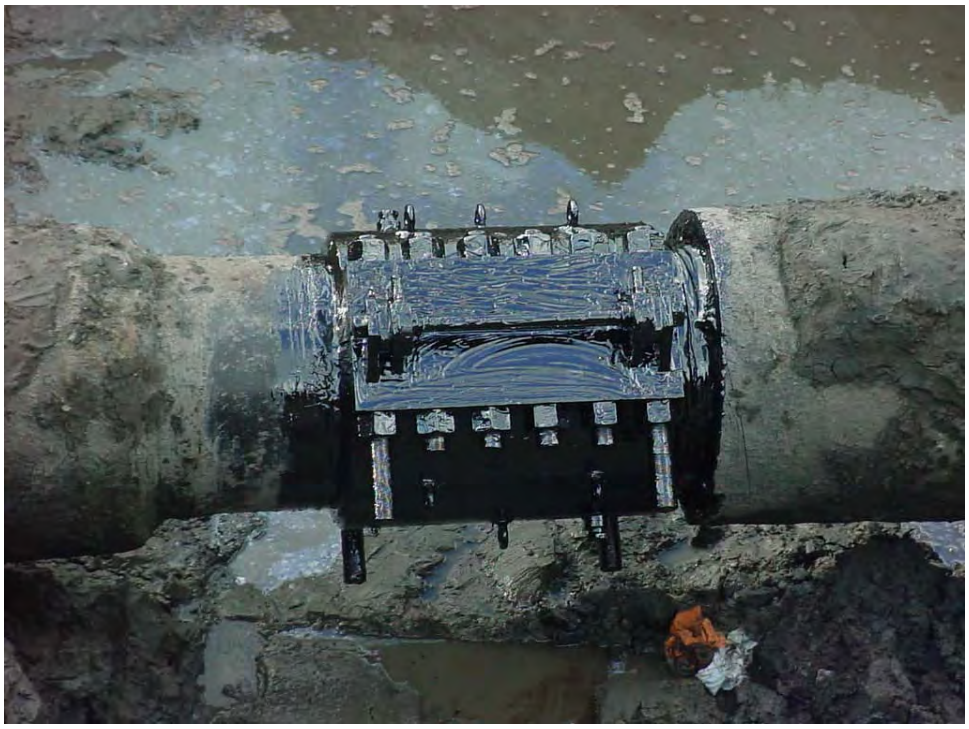

Figure 2 Installed PLIDCO sleeve at leak site MP 28