On 12-9-2015, Army Corps. Of Engineers *OMAHA*DISTRICT Approved For An Oil Pipeline To Be Dug

Underneath Lake Oahe, Just Upstream From The

Standing Rock Sioux Nation, Thus Endangering

Their Water Supply



Graphic source link: http://www.louisianalawblog.com/admiraltyand-maritime/u-s-army-corps-of-engineersprovides-new-resource-for-marine-operators/

The Army Corps. Of Engineers Released The Following Assessment on 12-9-2015:

Summary: Dakota Access, LLC proposes to construct & operate the Dakota Access Pipeline Project which would connect the Bakken and Three Forks crude oil production areas in North Dakota to existing infrastructure in Illinois. In North Dakota, the project crosses federal flowage easements at the Missouri River upstream of Lake Sakakawea in Williams County and federally-owned lands at Lake Oahe in Morton and Emmons counties. The pipeline is 24 inches in diameter where it crosses approximately 2.83 miles of the U.S. Army Corps of Engineers' flowage easements at the Missouri River and is 30 inches in diameter where it crosses approximately 0.21 miles of federal lands at Lake Oahe. The Omaha District is seeking public comments on the environmental assessment for these two project areas.

Geographic Scopes: Missouri River upstream of Lake Sakakawea, Garrison Project, North Dakota; Lake Oahe in Morton and Emmons Counties, North Dakota

Decision/Date: Finding of No Significant Impact/July 25, 2016.¹

¹ U.S. Army Corps. Of Engineers *OMAHA DISTRICT website*, "Dakota Access Pipeline Environmental Assessment": http://www.nwo.usace.army.mil/Missions/Civil-Works/Planning/Project-Reports/Article/633496/dakota-access-pipeline-environmental-assessment/

Lake Oahe is a large reservoir behind Oahe Dam on the Missouri River, *the main & only water source* for the Standing Rock Sioux Nation; the Missouri River of course *also* flows to countless communities through many states down to the Gulf of Mexico. The Dakota Access Pipeline Project is trajected to cross beneath the lake/river in two places. A pipeline rupture would be devastating to the Missouri River, wildlife, & *everyone* who lives downstream.



Source: Energy Transfer Partners LARIS KARKLIS/THE WASHINGTON POST Source link: https://steemit.com/news/@victor-lucas/a-sustainability-dialogue-the-dakota-access-pipeline-and-subjugation-of-native-americans

- On January 4, 2009, a 6.625-inch storage well line operated by Columbia Gas Transmission Company² in Elk View (near Charleston), Kanawha County, West Virginia, ruptured due to internal corrosion pitting complicated by low impact toughness of the pipe material, causing \$29,011 in damage.³
- On January 15, an accidental massive gas release at Pump Station 1 of the trans-Alaskan pipeline by Alyeska Pipeline Service Company⁴ threatened the site at the time. The company that runs the pipeline acknowledges a fire or explosion, had the gas ignited, could have imperiled the station's 60-plus workers and caused "an extended shutdown" of oil fields. There was no ignition or explosion. The incident occurred as BP⁵ workers used a cleaning device called a pig to swab oil out of an old pipeline the company was preparing to decommission. The 34-inch pipe was among major Prudhoe trunk lines found in 2006 to be ravaged with corrosion, due to BP's admitted lack of proper maintenance. A large volume of gas then bypassed the pig somehow, and rushed to Pump Station 1, a key asset through which every drop of oil coming off the North Slope must pass.⁶
- On February 1, a **gas pipeline explosion** rocked the area 2 miles (3.2 km) east of Carthage, Texas.⁷
- On February 11, a pipeline exploded and ignited near a natural gas treatment plant, near Carthage, Texas. There were no injuries.⁸
- At approximately 5 p.m. on February 18, a rupture of pipeline near the pump station and terminal located in Cygnet, Ohio, owned by Philadelphia-based Sunoco, resulted in one of the largest oil spills in Wood County history. Upon learning of the release, the company immediately shut down the pipeline, stopped operations at the pump station and terminal, notified the appropriate authorities, and began an emergency response. As of 11:05 a.m. ET on February 19, the release had been stopped from the pipe. The damaged pipeline, which was operating at the time, released 1,250 barrels (199 m³) of crude oil into a farm field. Eventually, 782 of the 1,250 barrels (199 m³) released

² TransCanada, http://www.columbiapipeinfo.com/infopost/

³ U.S. DOT, Pipeline & Hazardous Materials Safety Administration, 8-2-2011: http://www.phmsa.dot.gov/staticfiles/PHMSA/PipelineFailureReports/CGT_GT_WV_20090104.pdf

⁴ http://www.alyeska-pipe.com/

⁵ **British Petroleum:** http://www.bp.com/

⁶ **Joe Romm, Think Progress, 5-12-2010:** https://thinkprogress.org/stupak-stunner-oil-wells-blowout-preventer-had-leaks-dead-battery-design-flaws-how-can-a-device-that-3363c8775bc9#.9cl1fnyse

⁷ **Adam Gaffin, Universal Hub, 6-14-2015**: http://www.universalhub.com/2015/peaceful-protest-marchagainst-west-roxbury

⁸ Reuters Oil Report, 2-11-2009: http://uk.reuters.com/article/explosion-dcp-texas-idUKN1135208520090211

⁹ WTOL 11, 2-19-2009: http://www.wtol.com/story/9873737/press-release-by-sunoco-logistics

were recovered. Some of the crude oil, approximately 200 barrels (32 m³), did contaminate a local creek.¹⁰

- On May 4, Kinder Morgan's Florida Gas Transmission pipeline¹¹ burst near Palm City and Hobe City (near Port Salerno, Florida). The explosion ejected 106 feet of buried pipe weighing about 5,000 pounds out of the ground and onto the right-of-way between Interstate 95 and the Florida Turnpike (SR-91). The rupture was near a high school that was within the 366-foot potential impact radius. Two people were injured when their car ran off the road, and a Sheriff's deputy walked through a dense cloud and inhaled natural gas. The escaping gas did not ignite. The leak caused \$596,218 in property damage. FGT was cited for safety violations: failing to identify a high-consequence area, failing to test operators for alcohol and drugs, and failing to have prompt emergency response; PHMSA assessed a \$95,000 fine. 12
- On May 5, a natural gas pipeline exploded and caught on fire, near Rockville, Indiana in Parke County, about 24 miles (39 km) north of Terre Haute, Indiana. The cause of this failure was determined to be external corrosion. Additional work performed as a result of this order provided significant indications of external corrosion in various sections of this line. Pictures have been released around the area showing the damage caused. 52 people were evacuated in a one-mile (1.6 km) area of the explosion. No injuries reported. 13 14
- On May 21, an Enbridge pipeline pig sending trap in Superior, Wisconsin leaked from operator error, spilling about 6500 gallons of crude oil. 700 cubic yards of contaminated soil had to be removed. 15 16

10 U.S. DOT, Pipeline & Hazardous Materials Safety Administration:

 $http://www.phmsa.dot.gov/staticfiles/PHMSA/DownloadableFiles/Files/Pipeline/Failure \ \%20Reports/Mid_Valley_HL_OH_2009-02-18_508.pdf$

11 Kinder Morgan's Florida Gas Transmission pipeline:

http://www.kindermorgan.com/pages/business/gas pipelines/east/FGT/default.aspx

12 U.S. DOT, Pipeline & Hazardous Materials Safety Administration:

http://primis.phmsa.dot.gov/comm/reports/enforce/documents/220091002H/220091002H_CAO_05072009.pdf?nocache=4283

13 U.S. DOT, Pipeline & Hazardous Materials Safety Administration:

http://primis.phmsa.dot.gov/comm/reports/enforce/documents/320141008S/320141008S_Notice%20of %20Proposed%20Safety%20Order 12242014.pdf

14 U.S. DOT, Pipeline & Hazardous Materials Safety Administration:

http://primis.phmsa.dot.gov/comm/reports/enforce/documents/320091009H/320091009H_CAO_05132009.pdf?nocache=6515

15 U.S. DOT, Pipeline & Hazardous Materials Safety Administration:

http://primis.phmsa.dot.gov/comm/reports/enforce/documents/320125018/320125018_NOPV %20PCP 08272012.pdf

16 Pro Publica, Pipeline Safety Tracker, 5-21-2009: http://projects.propublica.org/pipelines/incidents/272967

- On July 15, an explosion occurred at Kinder Morgan's Midcontinent Express pipeline¹⁷ natural gas metering station that was under construction, while it was being pressure tested with nitrogen, in Smith County, Mississippi. One worker was killed, and two others injured.¹⁸
- On August 10, operators of a Belle Fourche pipeline¹⁹ incorrectly operated the line, causing it to fail, near Edgerton, Wyoming²⁰. About 30,000 gallons of crude oil was spilled, with about 1,200 gallons being lost.²¹
- On August 17, a pipeline was found leaking by an aerial patrol in Atoka County, Oklahoma²². 50 barrels $(7.9 \, m^3)$ of diesel fuel were estimated to have been released as a result of this accident, and none of it was recovered.²³
- On October 7, a leaking pipeline carrying jet fuel was accidentally ignited by a pipeline repair crew in Upton County, Texas.²⁴
- On October 28, Kinder Morgan's Natural Gas Pipeline Company of America²⁵ above-ground storage tank north of St. Elmo, Illinois caught fire, injuring two workers.
 Welding caused the tank to ignite resulting in several explosions. Two workers were taken to the hospital.²⁶ ²⁷
- On November 5, two people were hurt when an Kinder Morgan's El Paso Natural Gas²⁸ pipeline exploded in the Texas Panhandle near Bushland, Texas²⁹. The explosion left

17 Kinder Morgan's Midcontinent Express pipeline:

http://www.kindermorgan.com/pages/business/gas_pipelines/central/MEP/default.aspx

- 18 Bert Case, KLTV 7, 7-16-2009: http://www.kltv.com/Global/story.asp?s=10741392&clienttype=printable
- 19 **Belle Fourche pipeline:** http://www.bellefourchepipeline.com/
- 20 Edgerton, Wyoming website: http://www.city-data.com/city/Edgerton-Wyoming.html
- 21 U.S. DOT, Pipeline & Hazardous Materials Safety Administration: http://primis.phmsa.dot.gov/comm/reports/operator/OperatorIM_opid_1248.html? nocache=1673#_Incidents_tab_3
- 22 Atoka County, Oklahoma website: http://atoka.oklahoma.usassessor.com/
- 23 U.S. DOT, Pipeline & Hazardous Materials Safety Administration: http://www.phmsa.dot.gov/staticfiles/PHMSA/DownloadableFiles/Files/Pipeline/Failure %20Reports/Explorer HL OK 2009-08-17 508.pdf
- 24 Elias Hernandez, Texas-Fire, 10-8-2009: https://web.archive.org/web/20120315222201/http://www.texas-fire.com/2009/10/upton-county-gas-line-fire-caused-by-leak/
- 25 **Kinder Morgan's Natural Gas Pipeline Company of America's website:** http://www.kindermorgan.com/business/gas_pipelines/central/NGPL/
- 26 Cathy Thoele, The Effingham Daily News, 11-5-2009: http://www.effinghamdailynews.com/news/local_news/fire-rocks-plant-north-of-st-elmo/article_944c2536-0733-5549-ba26-baacb0e805a2.html
- 27 **Nicole Howley, Justice News Flash, 11-3-2009:** http://www.justicenewsflash.com/2009/11/03/fire-explosion-injures-2-gas-plant-workers 200911032491.html
- 28 **Kinder Morgan's El Paso Natural Gas Company, L.L.C.:** http://pipeportal.kindermorgan.com/PortalUI/DefaultB.aspx?TSP=EPNG
- 29 BUSHLAND, TEXAS: https://tshaonline.org/handbook/online/articles/hlb67

- a hole about 30 yards by 20 yards and close to 15 feet (4.6 m) deep. The orange inferno rose about 700 feet in the air; the blast incinerated the home of the Jose Torres family, injuring his wife Agnieszka and daughter Franczeska. The failure was in an abandoned tap, but the exact failure reason remains unknown. The explosion cause \$436,136 in property damage.^{30 31 32}
- Also on November 14, 2009, a newly built 42-inch **gas transmission pipeline** near Philo, Ohio³³ **failed on the second day of operation**. There was no fire, but evacuations resulted. Several indications of pipe deformation were found.³⁴ ³⁵
- From December 3 to 4, a Minnesota Pipeline carrying crude oil leaked in Todd County, Minnesota³⁶, spilling about 5,000 barrels of crude. Pipeline workers had been repairing sections of the 16-inch pipe in a rural area, left on the afternoon of December 3, and the spill occurred during the evening hours of December 3–4.³⁷ ³⁸
- On December 23, a crude oil pipeline started leaking in Galveston, Texas⁴⁰. An estimated 120 barrels $(19 m^3)$ of crude oil were released into the environment.⁴¹
- 30 U.S. DOT, Pipeline & Hazardous Materials Safety Administration, 11-10-2009: http://primis.phmsa.dot.gov/comm/reports/enforce/documents/420091021H/420091021H_CAO_11102009.pdf?nocache=4008
- 31 **JC Cortez & Kevin Welch, Amarillo Globe-News, 6-25-2014**: http://amarillo.com/news/local-news/2014-06-25/bushland-neighborhood-evacuated-after-gas-pipeline-rupture
- 32 U.S. DOT, Pipeline & Hazardous Materials Safety Administration, 4-13-2011: http://primis.phmsa.dot.gov/comm/reports/enforce/documents/420091021H/420091021H_Closure_04132011.pdf
- 33 Philo, Ohio City Data: http://www.city-data.com/city/Philo-Ohio.html
- 34 U.S. DOT, Pipeline & Hazardous Materials Safety Administration, 2-17-2010: http://primis.phmsa.dot.gov/comm/reports/enforce/documents/320091024H/320091024H_CAO_02172010.pdf?nocache=1083
- 35 U.S. DOT, Pipeline & Hazardous Materials Safety Administration, 12-21-2009: http://primis.phmsa.dot.gov/comm/reports/enforce/documents/320091024H/320091024H_Notice%20of %20Proposed%20CAO 12212009.pdf
- 36 Todd County, Minnesota: http://www.co.todd.mn.us/
- 37 Energy Pipeline News, 12-8-2009: http://energypipelinenews.blogspot.com/2009/12/kochs-mpc-line-spills-210000-gallons-of.html
- 38 Pro Publica Pipeline Safety Tracker, 12-4-2009: http://projects.propublica.org/pipelines/incidents/273107
- 39 **Tom Crawford, Staples World, 12-10-2009:** https://web.archive.org/web/20141016232028/http://www.staplesworld.com/news/2009-12-10/front page/001.html
- 40 OFFICIAL WEBSITE OF GALVESTON, TEXAS: http://www.galveston.com/
- 41 U.S. DOT, Pipeline & Hazardous Materials Safety Administration, 9-29-2010: http://www.phmsa.dot.gov/staticfiles/PHMSA/DownloadableFiles/Files/Pipeline/Failure %20Reports/Enterprise%20HL%20TX%202009-12-23.pdf

- On January 2, Enbridge's⁴² Line 2 ruptured near Neche, North Dakota⁴³, releasing about 3,784 barrels of crude oil, of which only 2,237 barrels of were recovered.

 The cause was a material defect.⁴⁴
- On January 7, **a gas pipeline exploded** near Barksdale Air Force Base⁴⁵, Louisiana, in January, **killing a pipeline employee**.⁴⁶
- On February 25, a natural gas liquids (NGL) pipeline ruptured near Pond Creek, Oklahoma⁴⁷, releasing over 575,000 US gallons (2,180,000 L) of NGL's (Natural Gas Liquids), & forcing road closures.⁴⁸
- On March 1, Mid-Valley Pipeline⁴⁹ identified a release of crude oil in the manifold area of the Mid-Valley tank farm in Longview, Texas. Crude oil was observed "gushing" from the soil in the manifold area. About 198 barrels of crude oil were estimated to have been released.⁵⁰
- On March 15, a 24-inch gas pipeline burst near Pampa, Texas.⁵¹
- On March 25, there was a release of 1700 barrels of Vacuum gas oil (VGO) from the FM-1 pipeline into an open in-ground valve pit and the surrounding area in the West Yard of the Sunoco, R&M Philadelphia refinery⁵² in Philadelphia, Pennsylvania⁵³.
- 42 http://www.enbridge.com/~/media/www/Site%20Documents/Delivering%20Energy/2012_Q1%20System %20Config.pdf
- 43 Neche, North Dakota city data: http://www.city-data.com/city/Neche-North-Dakota.html
- 44 "Pipeline explosion at Barksdale kills civilian Air Force News | News from Afghanistan & Iraq". Air Force Times. Associated Press. January 7, 2010. Retrieved April 2,2013.
- 45 Barksdale Air Force Base: http://www.barksdale.af.mil/
- 46 "Pipeline explosion at Barksdale kills civilian Air Force News | News from Afghanistan & Iraq". Air Force Times. Associated Press. January 7, 2010. Retrieved April 2,2013.
- 47 **Pond Creek, Oklahoma official website:** http://www.pondcreekok.com/
- 48 "Highway closed for gas leak " Local news " The Enid News and Eagle, Enid, OK". Enidnews.com. February 25, 2010. Retrieved April 2, 2013.: http://www.enidnews.com/news/local_news/highway-closed-for-gas-leak/article_286e869b-ab4c-57d0-8ba3-e3f3d53963a5.html
- 49 **Mid-Valley Pipeline**, *Bloomberg report*: http://www.bloomberg.com/research/stocks/private/snapshot.asp? privcapid=4155830
- 50 <u>Failure Investigation Report Mid-Valley Pipeline Internal Corrosion</u> Pipeline and Hazardous Materials Safety Administration, November 7, 2011, accessed September 5, 2015, 31 pages: http://www.phmsa.dot.gov/staticfiles/PHMSA/PipelineFailureReports/Mid-Valley%20Pipeline%20HL%20TX%202010-03-01%20508.pdf
- 51 Gamm, Joe (March 16, 2010). "No injuries in gas line rupture north of Pampa". Amarillo Globe-News. Retrieved April 2, 2013: http://amarillo.com/stories/031610/new news7.shtml#.V98t8vArLIU
- 52 Philadelphia Energy Solutions: http://pes-companies.com/
- 53 City of Philadelphia website: http://www.phila.gov/Pages/default.aspx

- On April 5, a crude oil pipeline ruptured near Green River, Wyoming⁵⁴. At least 84,000 US gallons (320,000 L) of crude were spilled. Corrosion in the pipeline was the cause.⁵⁵
- On April 17 Enbridge discovered a leak on the 26-inch Line 2 near Deer River, Minnesota⁵⁶. This leak was due to a crack-like feature associated with the longitudinal weld seam on the inside of the pipe.
- On April 23, a pipeline ruptured near Niles, Kansas, due to previous excavation damage. About 1,659 barrels of natural gasoline contaminated the local ecosystem.⁵⁷
- On May 29, one of BP's Amoco pipelines⁵⁸ leaked nearly 89,000 gallons of gasoline into a farm field. The leak occurred in Constantine Township, St. Joseph County⁵⁹, Michigan. The cause was from a manufacturing defect in the pipe.⁶⁰
- On June 7, a 36-inch gas pipeline explosion and fire in Johnson County, Texas⁶¹, was caused by workers installing poles for electrical lines. One worker killed, and six were injured. Confusion over the location and status of the construction work lead to the pipeline not being marked beforehand.⁶²
- The Red Butte Creek oil spill. On June 12, a Chevron⁶³ crude oil pipeline, damage by lightning, ruptured, causing 800 barrels (130 m3) of crude to spill into Red Butte Creek in Salt Lake City, Utah. Crude then flowed into a pond in Liberty Park.⁶⁴

⁵⁴ City of Green River website: http://www.cityofgreenriver.org/

⁵⁵ https://web.archive.org/web/20100803143750/http://www.nwf.org/News-and-Magazines/Media-Center/News-by-Topic/Global-Warming/2010/~/media/PDFs/Global%20Warming/Reports/Full-Oil-Incident-List.ashx

⁵⁶ Deer River, Minnesota Chamber of Commerce: http://www.deerriver.org/

^{57 &}quot;PHMSA: Stakeholder Communications – Operator Information". *dot.gov.* Retrieved May 23, 2016.: http://primis.phmsa.dot.gov/comm/reports/operator/OperatorIM_opid_395.html? nocache=1547# Incidents tab 3

⁵⁸ **BP's** *Amoco:* http://bp-amoco-gas-stations.find-near-me.info/

⁵⁹ Constantine Township, St. Joseph County *website*: http://www.stjosephcountymi.org/localgovernment/constantine ts.htm

^{60 &}lt;u>"PHMSA: Stakeholder Communications – Operator Information"</u>. *dot.gov*. Retrieved May 23, 2016. : http://primis.phmsa.dot.gov/comm/reports/operator/OperatorIM_opid_395.html? nocache=1547# Incidents tab 3

⁶¹ Johnson County, Texas home page: http://www.johnsoncountytx.org/

⁶² Wilder, Forrest (November 26, 2010). "The Fire Down Below". The Texas Observer. Retrieved April 2, 2013: https://www.texasobserver.org/the-fire-down-below/

⁶³ Chevron oil home page: https://www.chevron.com/

⁶⁴ U.S. Department of Transportation, Pipeline & Hazardous Materials Safety Administration: http://primis.phmsa.dot.gov/comm/reports/enforce/documents/520105028/520105028_NOPV%20PCP %20PCO 11012010.pdf?nocache=2771

- On July 26, the Kalamazoo River oil spill: Enbridge Energy Partners LLP (Enbridge), reported that a 30-inch (760 mm) pipeline belonging to Enbridge burst in Marshall, Michigan. The leak was not reported to Enbridge for 17 hours. Enbridge estimates over 800,000 US gallons (3,000,000 L) of crude oil leaked into Talmadge Creek, a waterway that feeds the Kalamazoo River, whereas EPA reports over 1,139,569 gallons of oil have been recovered as of November 2011.65
- On August 10, the U.S. Environmental Protection Agency (EPA)⁶⁶ & the U.S. Justice Department⁶⁷ announced that Plains All American Pipeline⁶⁸ & several of its operating subsidiaries have agreed to spend approximately \$41 million to upgrade 10,420 miles (16,770 km) of crude oil pipeline operated in the United States. The settlement resolves Plains' Clean Water Act violations for ten crude oil spills in Texas, Louisiana, Oklahoma, and Kansas, & requires the company to pay a \$3.25 million civil penalty.⁶⁹
- On August 17, smell from a mixture of gasoline and diesel fuel were detected in Hammond, Indiana. The source was from a leaking Amoco/BP pipeline in the area, and, about 38,000 gallons of the mixture was released. about 5,000 gallons of the spillage was not recovered. The cause was from external corrosion to the pipeline.⁷⁰
- On September 9, a pipeline leaked crude oil near Lockport, Illinois. EPA officials said the spill was near wetlands that house several endangered species. Federal officials said about 270,000 US gallons (1,000,000 L) of oil were released in Lockport and Romeoville, about 35 miles (56 km) southwest of Chicago.⁷¹

^{65 &}lt;u>U.S. EPA "EPA Response to Enbridge Spill in Michigan""</u>. Epa.gov. Retrieved April 2,2013.: https://web.archive.org/web/20121007172122/http://issuu.com/toledoblade/docs/07302010 the blade

⁶⁶ Environmental Protection Agency (EPA) website: https://www3.epa.gov/

⁶⁷ U.S. Department of Justice: https://www.justice.gov/

⁶⁸ Plains All American Pipeline, L.P., Midstream Energy Company: http://www.plainsallamerican.com/

^{69 &}quot;Plains All American Pipeline Settlement | Compliance and Enforcement | US EPA". Epa.gov. Archived from the original on April 13, 2013. Retrieved April 2, 2013.: https://web.archive.org/web/20130413233436/http://www.epa.gov/compliance/resources/cases/civil/cwa/plainspipeline.html

⁷⁰ Times Staff (August 18, 2010). "Hammond officials deal with oil leak". *nwitimes.com*. Retrieved May 23, 2016: http://www.nwitimes.com/news/local/lake/hammond/hammond-officials-deal-with-oil-leak/article 0227a3a0-e07d-5309-bf82-197fa4d8a0fb.html

⁷¹ U.S. Department of Transportation, Pipeline & Hazardous Materials Safety Administration: http://primis.phmsa.dot.gov/comm/reports/enforce/documents/120105008H/120105008H_Amended %20CAO_11242010.pdf

- On December 1, a valve on a crude oil pipeline leaked about 500 barrels (79 m3) of crude in Salt Lake City, Utah. This failure was only 100 yards from the June 2010 failure on the same pipeline.⁷²
- On December 8, at East Bernard, Texas⁷³, a 24" diameter Tennessee Gas Pipeline exploded, blasting a 12-foot section of ruptured pipe 295 feet and caused \$715,000 in property damage. It took 6 hours for the pipe system to blow down. The cause of the leak was a full guillotine failure of the pipe caused by internal corrosion microbiologically induced due to moisture in the pipe.⁷⁴
- On December 17, a gas line fire and explosion just outside Corpus Christi, Texas⁷⁵ city limits left one person *critically* injured. A man was working on removing an abandoned pipeline when it exploded, and the man's face was severely burned.⁷⁶
- On December 21, a crude oil pipeline was discovered leaking into the Dominguez Channel in the Port of Los Angeles. Over 1,000 gallons of crude oil was recovered, but the pipeline company was alleged to have failed to report the spill to State or Federal pipeline authorities. A 61 count criminal complaint was later filed in this accident.⁷⁷
- On December 28, a pipeline at an underground gas storage facility in Covington County, Mississippi⁷⁸ burst, forcing the evacuation of about two-dozen families for over a week.⁷⁹

^{72 &}quot;Was Chevron's response too slow? | The Salt Lake Tribune". Sltrib.com. December 3, 2010. Retrieved April 2, 2013.: http://www.sltrib.com/sltrib/home/50804000-76/chevron-pipeline-leak-lake.html.csp

⁷³ East Bernard, Texas home page: http://www.eastbernardtx.com/

⁷⁴ PHMSA Failure Investigation Report, July 31, 2011: http://www.phmsa.dot.gov/pv_obj_cache/pv_obj_id_809F127A4DA7F465E375A04D19FF2D8FFBAB1100/filename/TGP GT TX 20101208.pdf

⁷⁵ City of Corpus Christi home page: http://www.cctexas.com/

^{76 &}quot;Gas Line Fire Explosion Critically Burns Man's Face". South Texas: http://www.universalhub.com/2015/peaceful-protest-march-against-west-roxbury

^{77 &}quot;Long Beach pipeline company charged in oil spill". Press-Telegram. Retrieved April 2,2013: http://www.presstelegram.com/technology/20111229/long-beach-pipeline-company-charged-in-oil-spill

⁷⁸ Covington County, Mississippi Chamber of Commerce home page: http://www.covingtonchamber.com/

^{79 &}quot;Covington evacuees still await word to return home – WDAM – Channel 7 – Serving Hattiesburg, Laurel and the Pine Belt". WDAM. March 29, 2013. Retrieved April 2, 2013: http://www.wdam.com/Global/story.asp?S=13782362

- On January 11, personnel from Millennium Pipeline Company, L.L.C. 80 noticed that a gas transmission pipeline was leaking in Tioga County, New York. This 30-inch diameter pipeline was built only 3 years earlier in 2008. A pinhole in a rejected girth weld was found to be the cause of the failure. It appears that during the course of the construction project for the line, the subject pipe section was inadvertently picked up and subsequently installed in the pipeline. PHMSA ordered testing of this pipeline for similar flaws. 81
- A 12-inch cast iron gas main leaking in Philadelphia explodes, killing a repair crew member and injuring six others on January 18.82
- Multiple gas pressure regulators failed, & caused a gas pressure surge in Fairport Harbor, Ohio, on January 24, causing gas fires in 11 houses, and one apartment. 150 gas appliances were damaged or destroyed. Gas company Dominion East Ohio⁸³ says it found fluids & debris in a failed regulator. A year after the explosion, the Public Utilities Commission of Ohio recommended a \$500,000 fine for Dominion.⁸⁴
- Five people were killed, & eight houses were destroyed, in a gas explosion and fire in Allentown, Pennsylvania on February 9. The NTSB had warned UGI about cast iron gas mains needing replacement after the 1990 gas explosion in that city. Between 1976 and the date of the letter, July 10, 1992, two more gas explosions occurred. Three people were killed, 23 injured and 11 houses were destroyed or damaged in those explosions. UGI was cited in 2012 for several safety violations, including a lack of valves on their gas system. 85

⁸⁰ Millennium Pipeline Company, L.L.C.: http://www.millenniumpipeline.com/

⁸¹ U.S. Department of Transportation, Pipeline & Hazardous Materials Safety Administration, July 6th, 2011 report:

 $http://primis.phmsa.dot.gov/comm/reports/enforce/documents/120111013S/120111013S_NOPSO_07062011.\\pdf$

⁸² U.S. Department of Transportation, Pipeline & Hazardous Materials Safety Administration, "Pipeline Replacement Updates": http://opsweb.phmsa.dot.gov/pipeline replacement/

⁸³ https://www.dom.com/residential/dominion-east-ohio

^{84&}quot;Fairport Harbor blasts probed". news-herald.com. February 2, 2011. Retrieved April 2,2013: http://www.news-herald.com/general-news/20110202/fairport-harbor-blasts-probed?viewmode=fullstory

^{85 &}quot;UGI cited for multiple safety violations leading to Allentown gas explosion | Regional: Lehigh Valley – Home". Wfmz.com. June 11, 2012: http://www.wfmz.com/news/news-regional-lehighvalley/Local/UGI-cited-for-multiple-safety-violations-leading-to-Allentown-gas-explosion/14773532

- Late on February 10, a Tennessee Gas Pipeline 36-inch gas transmission pipeline exploded & burned near Lisbon, Ohio. The cause was from stress on a girth weld on the pipeline. 86
- On March 1, a Tennessee Gas Pipeline gas transmission pipeline failed near Cumberland, Ohio. A material or weld defect was the cause.⁸⁷
- Early on March 17, a 20-inch steel natural gas line running through a Minneapolis, Minnesota neighborhood ruptured & gas from it ignited, caused evacuations to buildings nearby, & Interstate 35W was closed from downtown Minneapolis to Highway 62. The Minnesota Office of Pipeline Safety⁸⁸ later found the pipe there wasn't designed to handle the weight of soil & passing cars pressing down on it, & efforts to shore up the pipeline were incorrectly carried out.⁸⁹
- A farmer & rancher near White Oak Township, Michigan smelled gasoline on April 13, & discovered gasoline from a products pipeline leaking into a drainage ditch. As of late September, an estimated 460,000 gallons of gasoline contaminated the ecosystem. 90
- On May 7, a threaded connection failed on a Keystone Pipeline⁹¹ pump at a station in Sargent County, North Dakota, spilling about 400 barrels of crude oil. Due to a number of other leaks on this pipeline system, Keystone's owner, TransCanada Corporation⁹², was given a Corrective Action Order by PHMSA.⁹³

^{86 &}quot;Cause of explosion in Hanover Township determined – 21 News Now, More Local News for Youngstown, Ohio": http://www.wfmj.com/story/15677053/cause-of-explosion-in-hanover-township-determined

⁸⁷ U.S. DOT: http://primis.phmsa.dot.gov/comm/reports/operator/OperatorIM_opid_19160.html

⁸⁸ https://dps.mn.gov/divisions/ops/Pages/default.aspx

^{89 &}quot;Report ID's Cause of Windom Pipeline Explosion". *Southwest Minneapolis, Minnesota Patch*: http://patch.com/minnesota/southwestminneapolis/report-id-s-cause-of-windom-pipeline-explosion

⁹⁰ Southern Illinoisians Against Fracturing the Environment, "List of pipeline accidents in the United States in the 21st century": http://www.dontfractureillinois.net/2013/10/list-of-pipeline-accidents-in-the-united-states-in-the-21st-century/

⁹¹ **Keystone XL Pipeline:** http://www.keystone-xl.com/

⁹² TransCanada Corporation: http://www.transcanada.com/

⁹³ U.S. DEPARTMENT OF TRANSPORTATION PIPELINE AND HAZARDOUS MATERIALS SAFETY ADMINISTRATION OFFICE OF PIPELINE SAFETY WASHINGTON, D.C.: http://primis.phmsa.dot.gov/comm/reports/enforce/documents/320115006H/320115006H_Amended %20CAO_06282011_text.pdf

- An 8-inch NGL pipeline failed in Romeoville, Illinois on May 14, leaking about 4200 gallons of butane. Corrosion inside a casing under a road was the cause of the failure. Corrosion only 2.5 feet from the failure had been seen by a smart pig run in 2007, but was not within action limits at the time.⁹⁴
- On May 19, a 10-inch crude oil pipeline ruptured near Maysville, Oklahoma. Over 42,000 US gallons (160,000 L) of crude contaminated the ecosystem. Internal pipeline corrosion was the cause. 95
- A 2-inch lateral on a crude oil pipeline rupture in Huntington Beach, California on July 1.96
- Late on July 1, a 12-inch Exxon Mobil crude oil pipeline— also known as the Silvertip Pipeline— ruptured, & spilled about 63,000 gallons of oil into the Yellowstone River in south-central Montana. There was confusion in the pipeline control room, causing a delayed pipeline shutdown. The break near Billings fouled the riverbank & forced municipalities & irrigation districts to close intakes. Speculation involves high water flow in the Yellowstone River may have scoured the river bed & exposed the pipe. 99
- On July 20, a six-month-old, 30-inch natural gas pipeline exploded near Gillette, Wyoming, creating a 60-foot (18 m) crater. Construction or installation issues caused the failure. 100 101
- 94 U.S. DEPARTMENT OF TRANSPORTATION PIPELINE AND HAZARDOUS MATERIALS SAFETY ADMINISTRATION OFFICE OF PIPELINE SAFETY CENTRAL REGION KANSAS CITY, MISSOURI:
 - $http://primis.phmsa.dot.gov/comm/reports/enforce/documents/320115008S/320115008S_Notice\%20of\%20Proposed\%20Safety\%20Order_06152011_text.pdf$
- 95 McGurty, Janet (January 20, 2011). "UPDATE 2-Sunoco shuts Oklahoma crude line after Weds. leak". Reuters: http://uk.reuters.com/article/pipeline-outage-sunoco-oklahoma-idUKN2014891220110120
- 96 KTLA.com, "Major Huntington Beach Street Closed After Oil Pipe Bursts": https://web.archive.org/web/20120902094232/http://www.ktla.com/news/landing/ktla-southwest-oil-leak,0,7386337.story
- 97 Cause of explosion in Hanover Township determined 21 News Now, More Local News for Youngstown, Ohio": http://www.wfmj.com/story/15677053/cause-of-explosion-in-hanover-township-determined
- 98 "Exxon Oil Spill in Montana River Prompts Evacuations". Fox News. July 3, 2011: http://www.foxnews.com/us/2011/07/03/exxon-oil-spill-in-montana-river-prompts-evacuations/#ixzz1R8GNIrB2
- 99 "Lawsuits against Exxon Mobil mount over big oil pipeline spills", *Dallas News:* http://www.dallasnews.com/business/energy/20130914-lawsuits-against-exxon-mobil-mount-over-big-oil-pipeline-spills.ece
- 100 United Press International, July 24th, 2011: http://www.upi.com/Business_News/2011/07/24/Wyoming-nat-gas-pipeline-out-of-commission/UPI-87131311487780/
- 101 Charles Rusnell Timothy Sawa and Joseph Loiero, of CBC News, October 24th, 2012: http://www.cbc.ca/news/canada/quality-concerns-arose-before-transcanada-pipeline-blast-1.1276144

- A pipeline carrying jet fuel ruptured in Mango, Florida on July 22. About 31,500 US gallons (119,000 L) of fuel spilled.¹⁰²
- On August 13, an 8-inch NGL pipeline ruptured near Onawa, Iowa at a Missouri River crossing, during flooding conditions. About 818 barrels of Natural Gasoline contaminated the ecosystem. 103 104 105 106
- On August 17, Kinder Morgan's Natural Gas Pipeline Company of America had a flash fire and explosion at a plant south of Herscher, Illinois. Five employees went to the hospital. Kinder Morgan was later cited for pipeline and workplace safety violations.¹⁰⁷ ¹⁰⁸
- A pipeline carrying heating oil was hit by construction workers in East Providence, Rhode Island on August 31, spraying oil on roofs, trees, and pavement, and flowed into storm drains. At least 56,000 US gallons (210,000 L) of oil were spilled. 109
- A 10-inch liquid petroleum gas ("LPG") pipeline failed on September 8 in Mitchell County, Texas. The escaping gas ignited, starting a small brush fire. The cause of the failure was a crack in the weld of a repair sleeve from bending and heat hardening. 110
- On September 20, a farmer digging to lay drainage tile hit a 10-inch gasoline pipeline near Aurelius, New York, spilling about 3,300 US gallons (12 m³) of gasoline.¹¹¹

102 Kevin Brady, of Brandon Patch, July 24th, 2011:

https://web.archive.org/web/20120328041114/http://brandon.patch.com/articles/officials-probe-leak-of-31500-gallons-of-jet-fuel-near-mango-cleanup-ongoing

- 103 U.S. DOT, Pipeline & Hazardous Materials Safety Administration, September 16th, 2011: http://primis.phmsa.dot.gov/comm/reports/enforce/documents/320115010H/320115010H_CAO_09162011.p
- 104 U.S. DOT, Pipeline & Hazardous Materials Safety Administration, August 19th, 2011: http://primis.phmsa.dot.gov/comm/reports/enforce/documents/320115009H/320115009H_CAO_08192011.p
- 105 The Associated Press, August 14th, 2011:

http://www.wowt.com/home/headlines/Gas Leaking Into Missouri River From Pipeline 127693933.html

- 106 The United States Department of Justice, Office of Public Affairs, May 29th, 2012: https://www.justice.gov/opa/pr/mid-america-pipeline-company-and-enterprise-products-operating-pay-1-million-spills-iowa
- 107 Natural Gas Watch.org, August 17th, 2011: http://www.naturalgaswatch.org/?p=817
- 108 **Hazardex**, **August 17th**, **2011**:

http://www.hazardexonthenet.net/article/44270/Gas-plant-explosion-injures-five.aspx?AreaID=2

- 109 Alisha A. Pina, of The Providence Journal, September 3rd, 2011: https://web.archive.org/web/20111016024958/http://www.projo.com/news/environment/content/OIL_SPILL_UPDATE 09-03-11 SKQ4BP2 v15.64660.html
- 110 U.S. DOT, Pipeline & Hazardous Materials Safety Administration, April 19th, 2012: http://www.phmsa.dot.gov/staticfiles/PHMSA/DownloadableFiles/Files/Pipeline/Failure %20Reports/Chevron%20HL%20TX%202011-09-08%20508.pdf
- 111 **Scott Rapp, of The Post-Standard, September 23rd, 2011:** http://www.syracuse.com/news/index.ssf/2011/09/ruptured gasoline pipeline fix.html

- A 2-inch crude oil gathering pipeline failed in Oklahoma on October 12, spilling about 120 barrels of oil. 112
- Early on November 3, an explosion and fire hit a gas Columbia Gas Transmission pipeline¹¹³ compressor station at Artemas in Mann Township, Bedford County, Pennsylvania. The cause was internal corrosion.¹¹⁴ ¹¹⁵
- On November 8, a contractor for Vectren Corp. 116 working on a bare gas main replacement project broke a "short stub" on the main, then failed to notify New Albany, Indiana authorities about the leak. Gas migrated through the soil, and built up in a nearby house, then exploded. Five people had to be hospitalized. 117
- A crew working on a waterline hit a gas distribution pipeline in Fairborn, Ohio on November 12, leading to a gas explosion that killed one man, and injured five others, including children. 118
- On November 16, a Tennessee Gas Pipeline 36-inch gas transmission pipeline exploded and burned near Glouster, Ohio. Two people were injured, with three houses and a barn destroyed, and a barn damaged. The pipeline failed at a girth weld, with landsliding causing more stress on the weld.¹¹⁹
- Late on November 21, a Tennessee Gas Pipeline **24-inch gas transmission pipeline exploded and burned** near Batesville, Mississippi. **The pipeline failed at a sleeve over a wrinkle bend**. 120

112 Reuters, Oil Report, October 24th, 2011:

http://uk.reuters.com/article/pipeline-operations-blueknight-idUKN1E79N0V720111024

113 Columbia Gas Transmission pipeline: http://www.columbiapipeinfo.com/infopost/

114 Steve Bittner, of the Cumberland Times-News, November 3rd, 2011:

http://www.times-news.com/news/local_news/link-to-video-of-artemas-gas-explosion-at-bottom-of/article 55f5bbab-5bbf-5082-91a7-1a53441ea878.html

115 U.S. DOT, Pipeline & Hazardous Materials Safety Administration:

http://primis.phmsa.dot.gov/comm/reports/operator/OperatorIM_opid_2616.html? nocache=7677# Incidents tab 4

116 Vectron Corps. Website: https://www.vectren.com/

117 Daniel Suddeath, of News and Tribune, September 25th, 2012:

http://www.newsandtribune.com/news/business/vectren-agrees-to-settlement-in-gas-explosion/article a54ecf8e-5bc6-56ed-aeb3-2a7242a1c58c.html

118 Fox News U.S., November 13th, 2011:

http://www.foxnews.com/us/2011/11/12/ohio-house-explosion-injures-6-1-missing-officials-say.html? test=latestnews

119 U.S. DOT, Pipeline & Hazardous Materials Safety Administration, November 17th, 2011: http://www.phmsa.dot.gov/staticfiles/PHMSA/DownloadableFiles/320111018H_CAO_11172011%20-%20Tennessee%20Gas.pdf

120 U.S. DOT, Pipeline & Hazardous Materials Safety Administration, November 28th, 2011: http://primis.phmsa.dot.gov/comm/reports/enforce/documents/220111010H/220111010H_CAO_11282011.pd

- On December 3, a Williams Companies¹²¹ gas transmission pipeline exploded and burned in Marengo County, Alabama. A 47-foot section of the pipe was hurled more than 200 feet from the failure area. The gas burned for several hours, and a nearby pipeline was damaged. External corrosion was the cause of the failure, due to issues with the pipeline coating, the cathodic protection level, and the local soil corrosiveness.¹²² ¹²³
- On December 6, explosions and fire erupted at a natural gas pipeline compressor station in Sublette County, Wyoming. Two workers were injured. 124
- On December 10, a landowner using a bulldozer hit an 8-inch and a 12-inch petroleum pipelines near Nemaha, Nebraska, rupturing both lines. The spill size was estimated to be 119,000 gallons of gasoline, jet fuel, and Diesel fuel. Some of the fuels flowed into a creek leading into Jasper Creek. There were questions about the depth of soil coverage for this pipeline. 125 126 127
- A **42-inch natural gas transmission pipeline failed and ignited at a valve** on December 10 in Cache County, Utah. 128 129
- On December 27, controllers for Enterprise Pipeline received an alarm for a leak on an LPG pipeline, a leak found in Loving County, Texas. The cause was a full girth weld failure. During the pipeline repair, a flash fire involving residual pipeline product in the soil occurred, injuring 3 employees. The rupture was attributed to the complete circumferential separation of an acetylene girth weld dating to 1928, and the flash fire was attributed to operator error. 130

121 Williams Company: http://co.williams.com/

122 WSFA 12 News, 2011:

http://www.wsfa.com/story/16181245/pipeline-explodes-in-marengo-county-causes-massive-fire

123 Jason Cannon, of the Demopolis Times, February 21st, 2012:

http://www.demopolistimes.com/2012/02/21/corrosion-cited-in-pipeline-explosion/

124 Jeremy Fugleberg of Star-Tribune, December 6th, 2011:

http://trib.com/news/state-and-regional/two-injured-in-fire-explosions-at-wyoming-natural-gas-site/article 1e7e73ac-e3a0-563a-bff1-0b6a716457da.html

125 Lincoln Journal Star, December 12th, 2011:

 $http://journal star.com/business/local/magellan-pipeline-fixed-near-nemaha-fuel-pumping-to-resume/article_a9db6a3a-2ddb-5d7c-af11-3b329c4576b0.html$

126 Algis J. Laukaitis, of the Lincoln Journal Star, December 12th, 2011:

 $http://journal star.com/news/local/clean-up-begins-on-pipeline-spill-in-nemaha-county/article_97ce305c-051f-5e9f-a93a-34f7ab9e00c2.html$

127 Paul Burkhardt, of the Bloomberg Business Week, December 13th, 2011:

https://web.archive.org/web/20131028144724/http://www.businessweek.com/news/2011-12-13/magellan-reduces-nebraska-line-spill-estimate-to-2-834-barrels.html

128 Bloomberg News, December 12th, 2011:

http://www.denverpost.com/2011/12/12/el-paso-says-no-estimate-for-return-of-ruby-gas-line-in-utah/

129 Ruby Pipeline LLC, December 11th, 2011:

http://ebb.cigco.com/ebbmasterpage/Notices/NoticesAutoTable.aspx?code=RUBY&status=Notice&name=Critical%20Notices&sParam1=0495&sParam3=77&sParam14=D&details=Y

130 U.S. DOT, Pipeline & Hazardous Materials Safety Administration, September 12th, 2013:

http://www.phmsa.dot.gov/staticfiles//PHMSA/PipelineFailureReports/Failure_Investigation_Report_Enterprise Rio Grande Final.pdf

- A 30-inch gas pipeline exploded and burned, in Estill County, Kentucky, on the evening of January 2. The rupture created a crater approximately 86 feet long by 22 feet wide, and expelled a number of pieces of pipe as far as 800 feet from the rupture center. Flames were reported reaching over 1,000 feet high. Residents up to a mile away from the failure were evacuated. The cause was overstress from land movement.¹³¹
- A forest fire caused a gas pipeline to explode and burn in Floyd County, Kentucky on January 7. 132
- On January 9, a man was killed, and another person injured, in a fiery house explosion from a leaking 4-inch cast iron gas main installed in 1950 in Austin, Texas. Gas had been smelled in the area for several weeks prior to this. Gas company crews had looked along the affected property for a leak, but were unable to find it. 133 134
- A Sunoco pipeline ruptured and spilled about 117,000 gallons of gasoline, in Wellington, Ohio, late on January 12. 135
- On January 13, an 8-inch gas pipeline exploded and burned, in a vacant agricultural field, in Rio Vista, California, *contaminating the ecosystem*. 136
- A Tennessee Gas Pipeline **gas compressor had a major leak** "that sounded like a rocket" in Powell County, Kentucky, forcing evacuations of nearby residents on January 14. 137
- A contractor excavating for a communications company caused a massive gas explosion and fire at a condominium complex on January 16 in West Haverstraw, New York, injuring two firefighters and two utility workers. Afterwards, it was found that the excavator's insurance will be insufficient to cover all of the property damage of the incident. 138

131 WYMT News, January 2nd, 2012:

https://web.archive.org/web/20120106210254/http://www.wkyt.com/wymtnews/headlines/136548983.html

132 Maryland Citizens for Safe Gas Pipelines: http://www.ceds.org/gas.html

133 U.S. DOT, Pipeline & Hazardous Materials Safety Administration:

http://opsweb.phmsa.dot.gov/pipeline replacement/

134 Statesman, January 11th, 2012:

http://www.statesman.com/news/news/local/man-feared-dead-in-home-explosion-had-hoped-to-m-1/nRjcb/

135 Michael Baldwin of News Channel 5, January 21st, 2012:

https://web.archive.org/web/20131027232258/http://www.newsnet5.com/dpp/news/local_news/oh_lorain/wel lington-may-have-answers-in-the-coming-weeks

136 Rick Hurd, of The Mercury News, January 13th, 2012:

http://www.mercurynews.com/2012/01/13/no-injuries-damage-after-gas-line-explodes-in-rio-vista/

137 Lex18.com, January 14th, 2012:

https://web.archive.org/web/20120119085823/http://www.lex18.com/news/gas-leak-in-powell-county

138 Akiko Matsuda, of The Journal News, January 20th, 2012:

https://web.archive.org/web/20150223060211/http://www.lohud.com/article/20120121/NEWS03/301200069/Cortlandt-contractor-gas-explosion-may-lack-enough-insurance-lawyer-homeowners-says

- On January 18, the original Colonial Pipeline mainline failed in Belton, South Carolina, spilling about 13,500 gallons of petroleum product into the ecosystem. The failure was caused by internal corrosion. 139
- Workers in Topeka, Kansas were installing a yard sprinkler system on January 30, hit a gas line. Gas from the leak later on exploded in a nearby house, burning a 73-year-old woman, who died several weeks later. 140
- On January 31, a Shell Oil Company fuel pipeline to the Milwaukee, Wisconsin Mitchell International Airport was found to be leaking. Jet fuel had been smelled for about two weeks in the area, and was found in runoff water in the area. The cause was from external corrosion. About 9,000 gallons of fuel were spilled. In 2014, a Shell employee was scheduled to plead guilty to charges of falsifying records of the pipeline. 141
- A Florida Gas Transmission Company **30-inch gas transmission pipeline burst** near Baton Rouge, Louisiana on February 13. 142 143
- On February 15, 2012, in Arenac County, Michigan, oil was discovered in the soil around a 30-inch Enbridge crude oil pipeline. About 800 gallons of crude oil was spilled. 144
- Two cars that were drag racing went off the road they were on, and crash through a fence and into a crude oil pipeline in New Lenox, Illinois on March 3. The pipeline was ruptured, and the crude oil ignited. Two men from the vehicles were killed, and three others seriously burned. 145
- On March 5, a leak at an Enid, Oklahoma pipeline storage facility spread propane fumes in the area, forcing evacuations. There was no fire or explosion. 147

139 Pipeline Safety Tracker by Pro Publica, January 18th, 2012:

http://projects.propublica.org/pipelines/incidents/273705

140 Giang Nguyen and Marques White of WIBW 13, January 31st, 2012:

http://www.wibw.com/home/headlines/Building Explosion 138335069.html

141 Bruce Vielmetti of the Journal Sentinel, November 17th, 2014:

http://archive.jsonline.com/news/milwaukee/ex-shell-pipeline-monitor-to-plead-guilty-in-airport-leak-b99392450z1-282987621.html

142 U.S. DOT, Pipeline & Hazardous Materials Safety Administration, June 24th, 2013:

http://primis.phmsa.dot.gov/comm/reports/enforce/documents/420131014H/420131014H_Corrective %20Action%20Order 06242013.pdf

143U.S. DOT, Pipeline & Hazardous Materials Safety Administration:

http://primis.phmsa.dot.gov/comm/reports/operator/OperatorIM_opid_31174.html? nocache=2826# Incidents tab 3

144U.S. DOT, Pipeline & Hazardous Materials Safety Administration:

http://primis.phmsa.dot.gov/comm/reports/operator/OperatorIM_opid_11169.html? nocache=3470# Incidents tab 3

145Brian Stanley and Steve Metsch of The Chicago Sun-Times, March 6th, 2012:

http://www.firerescue1.com/fire-attack/articles/1247826-2-killed-by-Ill-oil-pipeline-explosion/

146 K.T. Arasu of Reuters, March 7th, 2012:

http://af.reuters.com/article/energyOilNews/idAFL2E8E7FYA20120307?sp=true

147Verde Independent, April 13th, 2013:

http://verdenews.com/Main.asp?SectionID=36&ArticleID=53621

- A crude oil pipeline leaked near Grand Isle, Louisiana on March 17, spilling as much as 8,400 gallons of crude oil. There were no injuries reported.[108]
- On March 29, an employee accidentally left a valve open during maintenance work on a Williams Companies gas compressor station near Springville Township, Pennsylvania. Later, gas leaked through the valve, causing alarms to evacuate workers in the compressor building. Later, the gas exploded and burned. There were no injuries. It was also found there are no agencies enforcing rules on rural gas facilities in that state. [109] [110]
- On April 2, Transcontinental Gas Pipeline Company, reported a leak on their 72nd Street Interstate Transmission Lateral located in North Bergen, New Jersey. Workers discovered a rock in contact with the bottom of the pipe. Upon removing the rock, the pipeline began to leak. There was no fire or injuries reported as a result of this incident.[111]
- A 12-inch gas pipeline exploded and burned for five hours near Gary, Texas on April 4. There were no injuries, but the rupture site was only 200 feet from that pipeline's compressor station. [112]
- On April 6, two gas company workers were mildly burned when attempting to fix a leak on a 4-inch gas pipeline in DeSoto County, Mississippi. The pipeline exploded and burned during the repairs.[113]
- A gas pipeline exploded and burned in Terrebonne Parish, Louisiana, on April 9. The accident was reported first by a satellite monitoring the area to the NRC. There were no injuries.[114]
- Two men escaped with only minor burns after a bulldozer they were using hit a 24-inch gas pipeline near Hinton, Iowa on April 25. Authorities later announced the men did not call 811 for an underground utility locate. [115]
- On April 28, an ExxonMobil 20/22-inch-diameter pipeline ruptured near Torbert in Pointe Coupee Parish, Louisiana, about 20 miles west of Baton Rouge, and crude oil spilled into the surrounding area, and flowed into an unnamed tributary connected to Bayou Cholpe. About 117,000 gallons of crude were spilled, with about 37,000 gallons being lost. The pipeline failed due to a manufacturing defect.[116] [117]
- A 26-inch gas transmission pipeline ruptured on June 6 in a compressor station near Laketon in northeastern Gray County, Texas. Gas escaped from the 50-foot-long rupture, igniting, leaving a crater 30 feet in diameter, burning two acres of agricultural area and telephone poles. There were no injuries. [118]
- On June 8, near Canadian, Texas, a trackhoe operator suffered burns, after a fire from leaking 4-inch gas-gathering pipeline that was undergoing maintenance. Fumes entered the engine of the trackhoe and ignited.[119]
- A contractor was killed and two others injured after an explosion at a BP gas compressor station in Durango, Colorado on June 25. BP, Halliburton, and the other contractors were fined \$7,000 each for safety violations in that work.[120] [121]
- A West Shore Pipe Line petroleum products pipeline burst near Jackson, Wisconsin on July 17, releasing about 54,000 gallons of gasoline. At least one family self evacuated due to the leak. At least 44 water wells nearby were contaminated from benzine in the gasoline, including a municipal well. A LF-ERW seam failure was suspected as the cause. Further testing revealed

- that at least 26 other areas on this pipeline needed repairs, with 22 within the Jackson Marsh Wildlife Area. [122] [123] [124] [125]
- A 14-inch gas gathering pipeline exploded and burned on July 18 near Intracoastal City, Louisiana. There were no injuries or major property damage reported.[126]
- On July 23, a compressor station operated by Williams Companies in Windsor, New York was venting gas in a "routine procedure" during a lightning storm when the vent was ignited by lightning, causing a fireball "hundreds of feet into the air" [127] [128]
- An Enbridge crude oil pipeline ruptured in Grand Marsh, Wisconsin, releasing an estimated 1,200 barrels of crude oil. The pipeline had been installed in 1998. Flaws in the longitudinal welds had been seen during X-ray checks of girth welds. [129]
- Four contract workers were injured during a flash fire at a Wyoming gas processing plant on August 22.[130]
- A jet fuel pipeline near Chicago began leaking on August 27. The burst pipeline spilled an estimated 42,000 gallons of jet fuel into a ditch that empties into the Calumet Sag Channel in Palos Heights, Illinois. External corrosion was the cause of the pipeline failure.[131] [132]
- On August 28, a Atmos Energy repair crew struck an 8-inch gas main in McKinney, Texas, causing a fire. Four Atmos workers were treated for injuries. 1,000 Atmos gas customers lost gas service for a time. [133] [134]
- On September 6, a 10-inch gas gathering pipeline exploded and burned near Alice, Texas. Flames reached 100 feet high, and caused a 10-acre brush fire. There were no injuries. [135]
- An explosion and fire hit a Crestwood Midstream Partners gas compressor station in Hood County, Texas on September 6. Heavy damage to a sheet metal building resulted, but, there were no injuries reported to crew there. [136]
- A Colorado Interstate Gas gas compressor in Rio Blanco County, Colorado caught fire on September 11. There were no reported injuries. [137]
- On September 24, an excavator struck a 4-inch natural gas line on Route 416 in Montgomery, New York. Escaping gas ignited, and it took 90 minutes before the gas was shut off. There were no injuries. [138]
- The operator of an excavator machine narrowly escaped serious injury in Lewiston, Idaho on November 19, when his machine hit a gas pipeline during road work. The resulting fire destroyed a railroad signal, along with several telephone poles, and road construction equipment. The depth of the pipeline has been misjudged at that location. [139] [140]
- On November 20, about 38,000 gallons of crude oil spilled from an Enbridge pipeline at a tank farm in Mokena, Illinois.[141]
- Two men were injured in an explosion and fire at a natural gas production facility east of Price, Utah on November 20.[142]
- On November 23, a gas company worker looking for the source of a reported gas leak in a Springfield, Massachusetts strip club pierce a gas line. The gas later exploded, injuring 21, devastating the strip club, and damaging numerous nearby buildings.[143]
- On November 30, a heavy equipment operator punctured a 12-inch gas transmission pipeline,

- near the city of Madera, California. The adjacent highway, along with several rural roads, was shut down for hours, while houses and businesses in the area were evacuated.[144]
- A malfunction in a gas compressor caused a fire on December 4, north of Fort Worth, Texas. There were no injuries.[145]
- On December 5, a 16-inch gas pipeline at 500 psi of pressure exploded and burned near a natural gas plant in Goldsmith, Texas. A fireball 250 feet high was created after the explosion, destroying 12 to 15 utility poles, and caliche and rocks the size of bowling balls damaged a road. There were no injuries reported. [146]
- On December 11, at approximately 12:40pm, a 20-inch gas pipeline owned by NiSource Inc., parent of Columbia Gas, exploded along I-77 between Sissonville and Pocatalico, West Virginia. Several people suffered minor injuries, four houses were destroyed, and other buildings were damaged. Early reports announced the NTSB was investigating as to why alarms in the control room for this pipeline did not sound for this failure.[147] [148] [149]
- On December 26, a 20-inch Florida Gas Transmission Company pipeline ruptured near Melbourne, Florida, ejecting a 20-foot section of the pipeline. There was no fire or injuries. [150]

[108] Paul Purpura of The Times-Picayune, March 21st, 2012:

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- On January 15, a utility crew struck and ruptured a 4-inch gas pipeline in Lewisville, Texas, causing a nearby house to explode later on. The explosion killed a man.[152]
- An independent contractor installing fiber-optic cable for a cable company in Kansas City, Missouri inadvertently struck an underground gas line on February 19. Gas later caught fire,

- and created an explosion that destroyed a popular local restaurant, killing one of the workers there, and injuring about 15 others near the scene.[153] [154]
- A tug towing a barge struck and ruptured a Chevron LPG pipeline at Bayou Perot, a marshy area on the borders of Jefferson Parish and Lafourche Parish, Louisiana on March 12. The tug Captain was severely burned when the escaping gas ignited, and died several weeks later from those injuries.[155] [156]
- On March 8, pipeline equipment failure resulted in a spill of 6,000 barrels of crude oil, in eastern Columbia County, Arkansas.[157]
- On March 18, a Chevron 8-inch petroleum products pipeline ruptured along a seam, spilling Diesel fuel into Willard Bay State Park near Ogden, Utah. Wildlife was coated with Diesel, but, the fuel was prevented from entering into water supply intakes. About 25,000 gallons of Diesel were spilled. [158] [159]
- A Williams Companies 24-inch gas gathering pipeline failed in Marshall County, West Virginia on March 22. There were no injuries.[160]
- The 2013 Mayflower oil spill occurred when ExxonMobil's 20-inch Pegasus crude oil pipeline spilled near Mayflower, Arkansas on March 29, causing crude to flow through yards and gutters, and towards Lake Conway. Wildlife was coated in some places. Twenty-two houses were evacuated, due to the fumes and fire hazard. Some estimates say the total amount spilled could reach upwards of 300,000 gallons of diluted bitumen were spilled. Hook cracks and extremely low impact toughness in the LF-ERW seam of the pipe were identified as causes of the failure. [161] [162] [163]
- On April 4, an explosion and fire occurred at a gas compressor station near Guthrie, Oklahoma. Nearby houses were evacuated. There were no injuries reported. [164]
- A flash fire at a pipeline gas compressor station broke out when natural gas liquids ignited in Tyler County, West Virginia on April 11, seriously burning three workers, two of whom later died. The workers were performing pipeline pigging operations.[165]
- On April 30, the Pegasus oil pipeline spilled a small amount of crude into a residential yard in Ripley County, Missouri, a month after the same pipe spewed thousands of barrels of crude in Arkansas. The Pegasus pipeline was out of service from the Mayflower, Arkansas spill, accounting for the minimal amount of oil spilled in Missouri. [166]
- On May 9, Diesel fuel was detected to be leaking from a Marathon pipeline in Indianapolis, Indiana. Over 20,000 gallons of Diesel leaked, at a slow rate that was not detected by SCADA systems. Cleanup cause a nearby major road to be shut down for five days. There were no injuries reported. [167]
- Late night on May 14, an explosion and fire hit a Williams Companies gas compressor station near Brooklyn Township, Pennsylvania. There were no reported injuries.[168]
- On May 8, the Kinder Morgan Tejas pipeline compressor station near Crockett, Texas, required an emergency shutdown and subsequently had a fire that caused \$7,502,188 in property damage.[169] [170]
- On May 30, two construction workers were injured, when a fire erupted during welding at a Williams Companies natural gas facility in Hunterdon County, New Jersey.[171]

- A 12-inch gas transmission pipeline failed near Torrington, Wyoming on June 13. LF-ERW seam failure was suspected as cause. There was no fire or injuries.[172]
- On June 18, in Washington Parish, Louisiana, a Kinder Morgan Florida Gas Transmission Company 30" diameter pipeline ruptured and exploded before dawn, jolting residents out of their beds. No one was seriously hurt but 55 homes were evacuated. The blast knocked down trees in an area about 200 yards across and the fire burned those within another 300 yards. "The ground around the crater is completely bare. The dirt around it is just like it had been cooked in a kiln," and an 80-foot section of pipe was destroyed. [173]
- On July 4, a fire involved a gas compressor and a nearby ruptured 2-inch gas pipeline in Gilmore Township, Pennsylvania. There were no injuries.[174]
- An 8-inch natural gas pipeline released gas from a rupture at 1,400 psi, for 90 minutes in New Franklin, Ohio on July 22, forcing 75 people to evacuate the area. Afterward, the local Fire Chief said that pipeline owners refused to give information to first responders in previous requests.[175]
- Early on July 23, a downed 13,000 volt power line sparked a massive gas fire in Mamaroneck, New York when a gas main was damaged by the electricity. Three automobiles were destroyed, and houses were threatened for a time. [176]
- On July 26, a leaking BP 20-inch crude oil pipeline spilled 50 to 100 barrels of crude oil in Washington County, Oklahoma. Some of the crude spilled into a drainage ditch leading to a water reservoir.[177]
- On the evening of August 12, a 10-inch NGL pipeline exploded and caused a massive propaneethane mix fire in Erie, Illinois. A number of nearby residents were evacuated for a while, but, there were no injuries. [178]
- A leak developed on a valve on Longhorn Pipeline in Austin, Texas during maintenance on August 14, spilling about 300 gallons of crude oil. There were no evacuations.[179]
- Atmos Energy crews dug into a 4-inch gas pipeline in Overland Park, Kansas on September 2, causing an explosion and fire. There was no major damage or injuries.[180]
- A 10-inch gas gathering pipeline ruptured and burned in Newton County, Texas on September 21. About a dozen people from nearby houses were evacuated for a time. There were no injuries.[181]
- On September 24, a Denton TX city water utility worker ruptured a 1/2-inch gas pipeline in Denton, Texas, which immediately caused a fire that gave the worker minor burns. There was no other significant damage.[182]
- A farmer near Tioga, North Dakota smelled oil for several days, before discovering a leaking 6-inch 20-year-old Tesoro pipeline under his wheat field, on September 29. Crews tried to burn off the oil at first. The spill size was estimated at 865,000 gallons, and covered over seven acres. There were no injuries. Corrosion was suspected as being the cause. Governor Jack Dalrymple said he wasn't told of the spill until October 9. In May 2014, it was announced that it would 2 1/2 more years before the spilled crude would be cleaned up. [183] [184]
- On October 7, a gas pipeline burst in Howard County, Texas. There was no fire, but, dangerous hydrogen sulfide in the gas forced evacuations of nearby residents. There were no injuries.[185]

- On October 7, authorities were notified of a Lion Oil Trading and Transportation crude oil pipeline leak in Columbia County, Arkansas. It was estimated that the leak started on September 21. Oil spread into a Horsehead Creek tributary.[186]
- A 30-inch Northern Natural Gas pipeline exploded and burned in Harper County, Oklahoma on October 8. 220 feet of the pipe was ejected from the ground. Flames were seen for a number of miles, and four houses nearby were evacuated. Oklahoma Highway 283 was closed for several hours until the fire was determined to be under control and safe. There were no injuries. [187] [188] [189]
- On October 29, a Koch Industries 8-inch pipeline spill about 400 barrels of crude oil near Smithville, Texas. The oil polluted a private stock pond and two overflow reservoirs.[190]
- A Chevron operated 10-inch LPG pipeline was ruptured by contractors for the company installing a Cathodic protection system, near Milford, Texas, on November 14, causing a large fire, and forcing the evacuation of Milford and 200 students of a nearby school. A nearby 14-inch pipeline was threatened by the failure, but did not fail. There were no injuries reported. [191] [192]
- An ExxonMobil gas plant exploded and burned on November 17, near Kingsville, Texas. The plant burned for over a day, but there were no reported injuries.[193]
- On November 18, a gas pipeline burst near Ranger, Texas, causing a fire in a field, with flames reaching 100 feet high. Some houses nearby were evacuated for a time. The owner of the pipeline, Hanlon Gas, had been installing a new compressor station, and they believe a malfunction led to the rupture and fire. There were no injuries reported. [194]
- On November 28 a 30-inch Panhandle Eastern natural gas pipeline exploded in Hughesville, Missouri causing several nearby buildings to catch fire. There was a local evacuation but no injuries. Metallurgical examination determined the root cause of the failure to be corrosion. [195]
- On December 9, a 2-inch pipe on a propane dehydrator failed at the Dixie Pipeline Terminal in Apex, North Carolina, forcing evacuations and sheltering in place at nearby businesses. There was no fire or explosion.[196]
- A Sunoco pipeline was found leaking gasoline on December 20, near Coal Township, Pennsylvania, from external corrosion. The initial spill size was reported as two gallons, but, later on, 480 tons of soil were removed as part of the remediation of that leak. [197] [198]
- On December 27, two natural gas company workers had minor burns when the pipeline they were working leaked, and the escaping gas exploded and ignited in Shrewsbury, Massachusetts. Flames 30 feet high knocked out phone service in the area. [199]

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- On January 7, a Colonial Pipeline line leak from equipment failure in Fountain Inn, South Carolina, spilling about 52,000 gallons of petroleum product, of which around 8,000 gallons was not recovered.[200]
- On January 10, a 12-inch PSNC gas transmission pipeline exploded and burned in Asheville, North Carolina. The cause was damage to the pipeline during installation in 2003. There were no injuries, but the costs of property damage was around \$825,000.[201]
- On February 10, a gas pipeline exploded and burned near Tioga, North Dakota. There were no injuries.[202]
- On February 13, a 30-inch diameter Columbia Gulf Transmission gas pipeline carrying natural gas exploded near Knifley, Kentucky, sending two people to the hospital with injuries, destroying two houses, and alarming residents, who saw flames from miles away. Later, it was determined that Hydrogen embrittlement had caused the pipe failure from when the pipeline was installed in 1965.[203] [204]
- On February 19, a leaking gas main caused a gas build up in a nearby rowhouse, that exploded in [Baltimore, Maryland], killing one youth, and seriously injuring another walking by the area. 3 other people had minor injuries. The area on the gas main near the leak had been patch twice in previous months. [205] [206]
- On March 6, contractors working for Shell Oil Company hit Shell's Houston-to-Houma (Ho-Ho) crude oil pipeline near Port Neches, Texas, spilling 364 barrels of crude oil.[207]
- **2014 East Harlem gas explosion**: On March 12, there was a gas explosion in New York City, New York. NTSB investigators found natural gas in the soil nearby, indicating that the gas leak had existed for a while before the explosion.[208]
- On March 18, a 20-inch Mid-Valley Pipeline Company pipeline failed in Hamilton County, Ohio, spilling at least 364 barrels of crude oil into the adjacent Oak Glen Nature Preserve. Animals in the area were affected. [209] [210]
- On March 18, a 3-inch, half-mile flare waste gas pipeline in a neighborhood in Arvin, California, was discovered leaking, a few blocks from Arvin High School, in a residential area. It had been leaking for as long as two years.[211]
- On March 31, a pipeline running to a Williams Companies LNG storage facility in Plymouth, Washington exploded and sent shrapnel flying that ruptured an LNG storage tank. Nearly 1,000

- residents were evacuated and at least five employees at the facility were injured.[212] [213]
- A 12-inch Williams Companies gas pipeline failed at a weld in Moundsville, West Virginia. The following explosion and fire explosion scorched trees over a 2-acre area near Moundsville. Several houses were evacuated as a precaution. There were no injuries reported. [214]
- On April 17, a private excavator accidentally cut a gas line while doing some work in Union Township, Licking County, Ohio on April 17. The man suffered second degree burns to the upper portion of his body. There was no damage to any buildings.[215]
- On April 23, an explosion and fire hit a Williams Companies gas processing plant in Opal, Wyoming. All 95 residents of the town were evacuated, and part of US Highway 30 was closed for a time. [216] [217]
- On May 6, Sinclair Oil Corporation pipeline operators detected a pressure drop on a pipeline, with the problem being traced two days later to a leak in Knox County, Missouri. A mixture of gasoline and Diesel fuel contaminated soil on a farm.[218]
- On May 12, three workers from Plantation Pipeline inadvertently ruptured their pipeline at a pump station in Anderson County, South Carolina, causing a geyser of gasoline, and spraying the workers with it. There was no fire, but the workers had to be decontaminated at a hospital. [219]
- On May 17, at Port St. John, Florida, Kinder Morgan's 36" Florida Gas Transmission pipeline ruptured, forcing evacuation of 7 homes and halting train traffic through Brevard Co. for 3 hours near the Florida Power & Light plant. Florida Gas Transmission workers searched for a leak when pressure dropped in the line. Homes, vehicle & train traffic were reopened after the remaining gas escaped from the pipe. [220] This pipeline failure caused \$177,321 in property damage. [221]
- On June 26, near East Bernard, Texas, a gas pipeline adjacent to a Kinder Morgan gas compressor plant blew out, destroying the roadway and setting a nearby truck on fire just south of Highway 59. Flames as high as 150 feet were shooting out of the pipeline. The focus was on a 27-inch pipeline that sends gasoline to different tank farms along the line. [222]
- On July 10, a vent stack at a Williams Field Services gas pipeline compressor station in Susquehanna County, Pennsylvania caught fire. Only minor damage was reported at other parts of the station. [223]
- On July 23, at Milledgeville, Georgia, Midway Elementary School faculty and staff were evacuated due to a fire caused by a gas leak at nearby Southern Natural Gas Co. tap station. Fire rescue personnel closed down Highway 441 South for an hour. Due to the amount of pressure, precautionary measures were taken so pipe wouldn't rupture under the road while Southern Natural Gas tried to determine the cause of the leak. "It could be some type of failure in a valve or regulator. Right now we don't know but Southern Natural Gas is looking into it." No injuries were reported. [224]
- On August 4, a Greka 6 inch pipeline spilled over 1,200 gallons of crude oil at the Zick Compressor Station by Williams Field Services in Hop Bottom near Santa Barbara County, California. The oil spread out over less than a mile from the leak and did not enter a river. The station can process 455 million cubic feet of natural gas per day. [225]

- On August 12, a mulching machine hit a 12-inch natural gas pipeline in Rusk County, Texas. The operator of the machine was killed in the following explosion.[226]
- On August 21, four workers were injured in a fire while a crew was performing maintenance on a natural gas pipeline in Garvin County, Oklahoma. The injured workers were treated and released from a hospital, and there was no explosion. [227]
- On September 14, a contract worker performing routine maintenance on a Chevron offshore gas pipeline was killed, and two other workers were injured. The accident occurred 6 miles south of Timbalier Bay off the southeast coast of Louisiana.[228]
- On September 16, more than 500 residents of Benton Township, Michigan, were forced to leave their houses for 10 to 12 hours, after authorities discovered a leak on TransCanada Corporation's 22-inch ANR gas transmission pipeline. [229] [230]
- On October 13, a gas transmission pipeline failed near Centerview, Missouri, causing an explosion and massive fire for several hours. There were no injuries. [231] [232]
- On October 13, a Sunoco/Mid-Valley crude oil pipeline ruptured, and spilled about 168,000 gallons of crude oil in Caddo Parish, Louisiana. Wildlife was killed.[233]
- A 24-inch gas transmission pipeline was hit by excavators on October 23, near Newport, Arkansas. Five nearby houses were evacuated, and two highways and a railroad were closed for a time. There was no fire or injuries. [234]
- On October 28, an 8-inch natural gas condensate pipeline exploded in Monroe County, Ohio. A large fire followed. There were no injuries.[235]
- On December 8, gasoline was discovered leaking from Kinder Morgan <u>Plantation Pipeline</u> in Belton, South Carolina. It was found that the 26-inch pipeline had leaked into a nearby creek. The cause was a failure at a sleeve that was part of an earlier repair. [236] As of April 2015, it was estimated that 8,000 barrels (42 gallons per barrel) or more than 300,000 gallons of gasoline had leaked. After four months of cleanup, only 176,901 gallons of product had been recovered and removed. [237]

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- On January 14, during work to free a trapped inline inspection unit, a leak was discovered on the Evangeline Pipeline, near Cameron Parish, Louisiana. This pipeline had been given a Corrective Action Order in October 2014, due to a number of leaks. [238] [239] [240]
- Also on January 14, a gas pipeline exploded near the Ross Barnett Reservoir in Brandon, Mississippi, creating a sizable crater in the ground and burning 6 acres of vegetation before the fire was extinguished. No injuries were reported. The failure was due to a "hard spot" from manufacturing, that already had a repair sleeve on it. There are 788 sleeves on the Index 129 pipeline from Edna, Texas, to Sterlington, Louisiana; and, 726 sleeves on the Index 130 pipeline from Marchand Junction, Louisiana to Kosciusko, Mississippi. Both were built from pipe made in 1952.[241] [242] [243]
- On January 16, a transmission pipeline operated by Kinder Morgan subsidiary Southern Natural Gas had an equipment malfunction in Walthall County, Mississippi. [244]
- On January 17, oil from a broken pipeline seeped into the Yellowstone River, and contaminated the water supply 10 miles south of Glendive, Montana. The release was from Bridger Pipeline LLC's 12-inch Poplar line, which can carry 42,000 barrels a day of crude from the Bakken formation and runs from Canada south to Baker, Montana. Bridger Pipeline is a subsidiary of True Cos., a privately held Wyoming-based company. The company said in a statement that the pipeline was shut down within an hour of the leak. About 30,000 gallons of crude was spilled, with about 28,000 gallons of crude being lost. [245] [246] [247]
- On January 21, a petroleum products pipeline in Honolulu, Hawaii ruptured, due to external corrosion, spilling about 42,000 gallons of petroleum product, of which about 22,000 gallons was lost.[248]
- On January 21, a crude oil pipeline pump station caught fire northwest of Texas City, Texas. Texas City fire officials said that company officials reported that there had been issues with the pump station over the weekend. [249]
- On January 26, a 20-inch ATEX pipeline carrying ethane exploded and burned in Brooke County, West Virginia. Despite snow in the area, five acres of woodlands burned, and 24,000 gallons of ethane were consumed. The fireball melted siding on nearby homes and damaged

- power lines; it is believed that day's snowy weather lessened the damage. Initial reports suspect a girth weld failure, with the pipeline being less than two years old. There were no injuries.

 [250] [251]
- On January 29, near Bowling Green, Missouri, a rupture in a Rockies Express 42-inch natural gas pipeline blew a 20 by 20-foot crater and forced a six-hour evacuation of 50 families. The rupture occurred in a vacant field a few yards east of Pike County Road 43. Strong winds helped dissipate gas until a temporary cap was put in place. [252] [253] This explosion caused \$2,672,345 in property damage and was due to a fault in the pipe's fabrication or construction. [254]
- On February 10 in Hopkinton, Massachusetts, the temperature caused "natural force damage" to a Kinder Morgan Tennessee Gas Pipeline, causing \$55,150 worth of property damage.[255]
- On February 17, a suspected electrical arc made a hole in a Marathon Petroleum pipeline in Shively, Kentucky, spill about 6,700 gallons of jet fuel. More than 2,500 tons of soil were removed to clean up the area.[256] [257]
- On February 25, a 26-inch crude oil pipeline in Navarro County near the Town of Dawson, Texas, failed, spill about 50 barrels of crude oil. Near the failure, investigation showed that the pipe had lost about 80% of its thickness, due to external corrosion. This anomaly was not seen in a 2011 test of this pipeline. [258]
- On March 2, a Kinder Morgan Tennessee Gas Pipeline leaked due to equipment failure, causing \$281,890 of property damage in Marshall, Mississippi.[259]
- On March 13 a pipeline Patrol pilot identified an oil sheen on a pond near Tehuacana Creek, Texas which was then linked to a leaking 10 inch petroleum products pipeline. About 50 barrels of diesel fuel were spilled. [260]
- On March 20, a pipe owned by Kinder Morgan subsidiary Southern Natural Gas failed in Rolling Fork, Mississippi, and on March 23, another of that subsidiary's pipes failed due to equipment malfunction in Augusta, Georgia, causing \$311,785 in property damage.[261]
- On April 9, 2 Williams Companies pipelines broke within hours of each other in Marshall County, West Virginia. A 4-inch condensate pipeline broke at 8 pm local time, spilling about 132 barrels of condensate into a creek. Around 10:50 pm local time, a 12-inch gas pipeline ruptured. There was no fire or injuries. Heavy rains were said to be the cause of the failures. [262]
- On April 13, a Kinder Morgan / Natural Gas Pipeline Co. of America pipeline exploded and burned near Borger, Texas. One home was evacuated, but, there were no injuries. The explosion, caused by equipment failure due to environmental cracking, caused \$455,000 in property damage. [263]
- On April 17, a 12-inch natural gas pipeline near Fresno, California operated by Pacific Gas and Electric Corp was ruptured by a backhoe. The resulting explosion killed 1 person and injured 12 others.[264]
- On May 15, Kinder Morgan's Tennessee Gas Pipeline leaked in Powell County, Kentucky causing \$23,400 in property damage. [265]
- On May 19, a Plains All American Pipeline oil pipeline ruptured near Refugio State Beach, also

- near Goleta, California, spilling about 124,000 gallons of crude oil. It is referred to as the Refugio Oil Spill.[266]
- On May 31, a 24-inch natural gas back-up pipeline that runs under the Arkansas River in Little Rock, Arkansas ruptured releasing 3.9 million cubic feet of natural gas. The pipeline was not currently in use. No one was injured. A tugboat was damaged. [267] [268]
- On June 9 in Moorehouse Parish, Louisiana, Kinder Morgan's Tennessee Gas Pipeline equipment failed, due to environmental cracking, and leaked, causing \$73,395 in property damage.[269]
- On June 9, a 24-inch natural gas pipeline ruptured in Lycoming County, Pennsylvania. About 130 individuals were evacuated from their homes. No injuries or damage reported, there was no fire The cause was Stress corrosion cracking, [270] [271]
- On June 10, Kinder Morgan's El Paso Natural Gas control/relief equipment failed and leaked in Gray County, Texas.[272]
- On June 13, a 42-inch gas gathering pipeline exploded and burned near Cuero, Texas. 7 homes were evacuated for a time, but there were no injuries. [273]
- On June 15, Kinder Morgan's Natural Gas Pipeline Co. of America equipment failed for unknown causes, with \$260,555 of property damage in Marshall, Texas (that area's third documented Kinder Morgan leak).[274]
- On June 18, in Victoria Texas, Kinder Morgan's Tennessee Gas Pipeline pipe failed due to external corrosion and caused \$159,346 in property damage).[275]
- On June 22, a truck driver was killed when his rig veered off a highway and broke above ground facilities for a propylene pipeline in Houston, Texas. The highway was closed for several hours while the gas dissipated.[276]
- Four workers were hurt on June 25, when a 4-inch gas pipeline exploded at a gas pipeline facility, near White Deer, Texas. 2 of the workers were critically injured. The cause of the explosion was not immediately known. [277]
- On July 10, a fitting on a 20-inch Plains All American Pipeline crude oil pipeline broke, spilling 4200 gallons of crude oil near Grantfork, Illinois. Much of the crude reached a nearby creek. There were no injuries. [278]
- On July 15, two workers were hurt by an explosion, when a bulldozer hit a 4-inch gas pipeline, at an <u>EQT</u> gas compressor station in Worthington, Pennsylvania. [279]
- On August 3, two individuals were injured in Falfurrias, Texas when a natural gas pipeline operated by Kinder Morgan ruptured and exploded due to external corrosion, with \$191.498 in property damage. Later investigation showed that the pipe split along an ERW seam. [280] [281]
- On August 7, a natural gas liquids pipeline in Weld County, Colorado burned, after being struck by a third party. [282]
- On August 13, crew working for Colonial Pipeline damaged one of Colonial's lines in Kannapolis, North Carolina, spilling about 6,000 gallons of petroleum product. About 1,000 gallons of product was lost. [283]
- On August 13, a natural gas pipeline in Cypress, Texas ruptured and leaked while a contract

- crew worked in the area. The pipeline was owned by Gulfsouth Pipeline. There were no injuries or immediate damage; residents were evacuated.[284]
- On August 26, two maintenance divers were injured while working on a pipeline owned by Boardwalk/Gulf South Pipeline Co. 25 miles offshore of Louisiana when the pipeline ruptured, and the gas ignited.[285]
- On September 21, a Colonial Pipeline 32 inch main line was discovered to be leaking in Centreville, Virginia. At least 7,000 gallons of gasoline were spilled, forcing several nearby businesses to close. [286] [287]
- On October 8, an explosion occurred at a Williams Companies pipeline facility in Gibson, Louisiana. 4 employees were killed, and, one other injured. The cause of the explosion was from procedure not being followed during welding work. [288] [289] [290]
- On November 30, about 11,000 gallons of gasoline, butane and propane leaked from a pipeline in eastern Summit County, Utah. [291]
- On December 8, a contractor drilled into an 8-inch buried oil line (200 mm) that transports oil from a holding station in Ventura to a Wilmington refinery near Long Beach while setting new poles for Southern California Edison along State Route 118 near Somis that spilled about 7,980 U.S. gallons (190 barrels).[292]

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- On January 2, 3 people were injured, and numerous homes were damaged in Oklahoma City, Oklahoma, when a leak gas from a gas main entered a home. Preliminary results indicate that a leak occurred at a weld seam on the gas main.[293]
- On January 9, a 30-inch Atmos Energy gas transmission pipeline exploded and burned in Robertson County, Texas. 4 families nearby were evacuated. [294]
- On January 11, butane leaking from a pipeline storage facility, in Conway, Kansas, forced a closure of a nearby highway for a time.[295]
- On February 14, a 6-inch crude oil pipeline broke near Rozet, Wyoming, spilling about 1,500 gallons of crude oil into a creek bed. [296]
- On February 16, an explosion and fire occurred at a gas plant in Frio County, Texas. 2 employees at the plant were injured.[297]
- On February 24, a 10-inch propane pipeline exploded and burned, near Sulphur, Louisiana. There were no injuries. About 208,000 gallons of propane were lost, and, the cause of the failure was not found. [298] [299]
- On March 11, about 30,000 gallons of gasoline spilled from a leaking plug on a pipeline, at a tank farm in Sioux City, Iowa.[300]
- On March 22, about 4,000 gallons of gasoline spilled from a 6-inch petroleum products pipeline in Harwood, North Dakota.[301]
- On April 2, the TransCanada Corporation Keystone Pipeline was observed by a local resident to be leaking, near Freeman, South Dakota. The cause was a crack in a girth weld, and amount of tar sands dilbit spill was about 16,800 gallons.[302] [303]
- On April 12, a pipeline at a gas plant in Woodsboro, Texas exploded, killing 2 men, and injured another worker.[304]
- On April 17, a 10 petroleum products pipeline failed in Wabash County, Illinois, resulting in a sheen on the Wabash River. About 48,000 gallons of diesel fuel was spilled.[305]
- On April 29, a 30-inch Texas Eastern/Spectra Energy pipeline exploded, injuring one man, destroying his home and damaging several others. The incident was reported at 8:17 a.m., near the intersection of Routes 819 and 22 in Salem Township, Westmoreland County, Pennsylvania. Later, Spectra Energy Corp. announced plans to dig up and assess 263 miles of that pipeline, from Pennsylvania to New Jersey. Corrosion had been detected at the failed seam 4 years before the rupture. [306] [307] [308]
- On May 20, a Shell Oil Company pipeline leaked near Tracy, California, spilling about 21,000 gallons of crude oil.[309]
- On June 23, a Crimson Pipeline crude oil line leaked in Ventura County, California. Initial reports said the spill size was from 25,200 gallons to 29,000 gallons, but, later reports estimate 45,000 gallons of crude were spilled.[310] [311]
- On July 6, a Plantation Pipeline line was noticed to be leaking in Goochland County, Virginia. The spill did not reach nearby waterways.[312]
- On August 12, contractors were working on one of the main lines in Sunoco Pipeline LP's

- Nederland, Texas terminal when crude oil burst through a plug that was supposed to hold the oil back in the pipeline and ignited. The contractors were knocked off the platform to the ground, suffering injuries from the fall and severe burns. 7 contractors were injured.[313]
- On September 4, a pipeline broke in Kern County, California, spilling reclaimed water & oil. [314]
- On September 5, a pipeline in Bay Long, Louisiana was hit by dredging operations, resulting in a spill of about 5,300 gallons of crude oil into the water.[315]
- On September 9, a Colonial Pipeline mainline leak was noticed by workers on another project, in Shelby County, Alabama. At least 252,000 gallons of gasoline leaked from line.[316] [317]
- On September 10, a Sunoco pipeline ruptured near Sweetwater, Texas. About 33,000 gallons of crude oil were spilled. The pipeline was just over a year old.[318]
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