

PHMSA

New England Pipeline Safety Seminar

October 19-20, 2016

Pipeline Safety Regulatory Update
Portland, Maine



PIPES ACT OF 2016

The Protecting our Infrastructure of Pipelines and Enhancing Safety (PIPES) Act of 2016, was passed by Congress and signed into law on June 22, 2016.

- It authorizes funding for PHMSA from 2016 to 2019.
- It sets deadlines for PHMSA and requires regular reporting to Congress on the status of “outstanding regulations.”



PIPES ACT OF 2016

“Outstanding Regulations” means a Final Rule required under this Act, the Pipeline Safety Act of 2011, or an earlier Act, that has not been published in the Federal Register.

Congress requires an initial (120 days) report from PHMSA, and then one every 90 days on the status of each “outstanding regulation,” until a Final Rule has been published in the Federal Register for each one.



Rulemaking Acronyms

- **ANPRM** – Advance Notice of Proposed Rulemaking
 - Used to gather information
- **NPRM** – Notice of Proposed Rulemaking
 - Defines intent and scope of proposed regulations
- **SNPRM** – Supplemental Notice of Proposed Rulemaking
 - Additions to, or changes in, intent or scope



Rulemaking Acronyms

- **IFR** – Interim Final Rule
 - Typically used for an identified safety issue
- **FR** – Final Rule
 - Implementation date, depending on significance of regulation and time to implement
- **DFR** – Direct Final Rule
 - Used for non-controversial issues



“Outstanding Regulations”

“Pipeline Safety: Safety of Hazardous Liquid Pipelines” *What is proposed?*

49 CFR § 195.1, All gathering lines to be

“covered” for reporting requirements

- 195.2, Expands the definition of hazardous liquid to include biofuels
- 195.2, Defines “significant stress corrosion cracking” (SCC)



“Outstanding Regulations”

“Pipeline Safety: Safety of Hazardous Liquid Pipelines” *What is proposed?*

- 195.11 – Increases safety requirements for Regulated Rural Gathering Lines, to include assessments and remediation
- Adds 195.13 - Reporting requirements for gravity lines
- Under 195.120 – Passage of Internal Inspection Devices, further defines cases of impracticability & emergencies



“Outstanding Regulations”

“Pipeline Safety: Safety of Hazardous Liquid Pipelines” *What is proposed?*

- 195.134 – Expands leak detection requirements (each hazardous liquid pipeline transporting liquid in a single phase must have a leak detection system)
- 195.401 to require pipelines not under IMP to correct conditions as per new 195.422 (which requires remediation)
- Adds 195.414 – Requires inspection and remediation of pipelines in areas affected by extreme weather, disasters, etc.



“Outstanding Regulations”

“Pipeline Safety: Safety of Hazardous Liquid Pipelines” *What is proposed?*

- Adds 195.416 –Pipeline Assessments (for pipelines currently not subject to IMP requirements)
- Changes 195.422 from “Pipeline Repairs” to “Pipeline Remediation” (lists anomalies, repair schedules, etc.)
- Expands 195.444 to require leak detection systems for jurisdictional pipelines



“Outstanding Regulations”

“Pipeline Safety: Safety of Hazardous Liquid Pipelines” *What is proposed?*

195.452 – Changes to the IMP requirements include:

- Categories of pipelines covered
- Written plan deadlines
- Assessment method requirements
- Baseline assessment completion dates
- Analyze for seismicity
- Etc.



“Outstanding Regulations”

“Pipeline Safety: Safety of Hazardous Liquid Pipelines”

- This is a NPRM, published 10/13/15,
(80 FR 61610)
- Comment period closed 1/8/16
- FR projected to publish in October 2016



“Outstanding Regulations”

“Pipeline Safety: Safety of Gas Transmission and Gathering Pipelines”

What is proposed?

- Expansion of IM requirements beyond HCA’s
- Repair criteria for HCA and non-HCA areas
- Assessment methods and corrosion control



“Outstanding Regulations”

“Safety of Gas Transmission and Gathering Pipelines”

What is proposed?

- Jurisdiction of gas gathering lines
- Integrity verification process (IVP)
- Elimination of the grandfather clause



“Outstanding Regulations”

“Safety of Gas Transmission and Gathering Pipelines”

What is proposed?

- Pig launcher / receiver safety
- IMP Management of Change (MOC)
- Assessment intervals



“Outstanding Regulations”

“Safety of Gas Transmission and Gathering Pipelines”

What is proposed?

- MAOP verification requirements
- Spike test requirements
- Seismicity
- Etc.



“Outstanding Regulations”

“Pipeline Safety: Safety of Gas Transmission and Gathering Pipelines”

- This is a NPRM, published 4/8/16
- (81 Fed. Reg. 20721)
- Comment period closed 7/7/16



“Outstanding Regulations”

Underground Storage Facilities

Not later than 2 years after the date of enactment of the PIPES Act of 2016, (6/22/16) the Secretary, in consultation with the heads of other relevant Federal agencies, shall issue minimum safety standards for underground natural gas storage facilities.



“Outstanding Regulations”

Underground Storage Facilities

- Consider operation, environmental protection, and Integrity Management
- Consider recommendations of the Aliso Canyon natural gas leak task force
- User Fees for operators of underground storage facilities



“Outstanding Regulations”

Underground Storage Facilities

- Not in the rulemaking process at this time
- An Underground Storage Facility Team is currently working on development



“Outstanding Regulations”

Emergency Order Authority

If the Secretary determines that an unsafe condition or practice is causing an imminent hazard, he may issue an emergency order imposing restrictions, prohibitions, and safety measures on owners or operators of gas or hazardous liquid pipeline facilities, without prior notice or an opportunity for a hearing, but only to the extent necessary to abate the imminent hazard.



“Outstanding Regulations”

Emergency Order Authority

Not later than 60 days after the date of enactment of the PIPES Act of 2016, (6/22/16) the Secretary shall issue temporary regulations to carry out this Emergency Order Authority.

Not later than 270 days of enactment – Final Regulations must be issued.



“Outstanding Regulations”

“Pipeline Safety: Amendments to Parts 192 and 195 to require Valve Installation and Minimum Rupture Detection Standards”

This proposed rule would address:

Requiring installation of Automatic Shutoff Valves (ASVs), Remote Control Valves (RCVs) or Equivalent Technology



“Outstanding Regulations”

“Pipeline Safety: Amendments to Parts 192 and 195 to require Valve Installation and Minimum Rupture Detection Standards”

This proposed rule would address:

Establish performance based meaningful metrics for rupture detection of gas and liquid transmission lines

Rupture detection metrics to be integrated with the ASV and RCV placement to minimize spill volumes



“Outstanding Regulations”

“Pipeline Safety: Amendments to Parts 192 and 195 to require Valve Installation and Minimum Rupture Detection Standards”

Nothing on this has been published yet in the FR, but an NPRM is projected to publish Fall 2016



“Outstanding Regulations”

Operator Qualification, Cost Recovery and Accident and Incident Notification and other Changes

What is proposed?

- OQ requirements expanded to include new construction
- PHMSA fees for safety reviews of large design and/or construction projects
- Telephonic notification to NRC within 1 hour of confirmed discovery (confirmed discovery now defined)



“Outstanding Regulations”

Operator Qualification, Cost Recovery and Accident and Incident Notification and other Changes

- NPRM (80 FR 39915) Published 7/10/15
- Comment period closed 9/8/2015
- FR projected to publish in October 2016



“Outstanding Regulations”

“Pipeline Safety: Expanding the use of Excess Flow Valves (EFVs) in Gas Distribution Systems to Applications Other Than Single-Family Residences”.

What is proposed?

Require EFV on branched service lines serving more than one single family residence > 10 psi

Final Rule



“Excess Flow Valve Final Rule”

- 49 CFR Part 192
- [Docket No. PHMSA-2011-0009; Amdt. No 192-121]
- RIN 2137-AE71
- Pipeline Safety: Expanding the Use of Excess Flow Valves in Gas Distribution Systems to Applications Other Than Single-Family Residences



“Excess Flow Valve Final Rule”

- Summary of the Major Provisions of the Regulatory Action
- This final rule amends the Federal pipeline safety regulations by adding four new categories of service for which EFV installation will be required. These four new categories are for new and entirely replaced services. The existing EFV installation requirement for SFRs served by a single service line remains unchanged.



“Excess Flow Valve Final Rule”

The new categories of service are as follows:

- Branched service lines to a SFR installed concurrently with the primary SFR service line (a single EFV may be installed to protect both lines);
- Branched service lines to a SFR installed off a previously installed SFR service line that does not contain an EFV;



“Excess Flow Valve Final Rule”

The new categories of service are as follows:

- Multifamily installations, including duplexes, triplexes, fourplexes, and other small multifamily buildings (e.g., apartments, condominiums) with known customer loads at time of service installation, based on installed meter capacity, up to 1,000 SCFH per service; and



“Excess Flow Valve Final Rule”

Operators will be required to give all customers notice of the option to request an EFV installation, except where such installation is not required under § 192.383(c) (i.e., where the service line does not operate at a pressure of 10 psig or greater through the year, the operator has experienced contaminants in the gas stream that could interfere with EFV operation, an EFV could interfere with operation and maintenance activities, or an EFV meeting performance standards in § 192.381 is not available).



“Excess Flow Valve Final Rule”

Finally, this final rule also amends the Federal pipeline safety regulations by requiring curb valves, or EFVs, if appropriate, for applications operating above 1,000 SCFH.



Presentation Overview

- ✓ Excavation Damage Prevention Rules
- ✓ State DP Enforcement Evaluations
- ✓ Promoting 811



Excavation Damage - Thomson, GA

Georgia – July 2010

- 8" Liquid propane gas line ruptured and explosion
- 1 person injured, frostbite burns
- 1 person killed
- Double wide mobile home, jeep, bulldozer and 20 acres of woodland were destroyed
- 50 firefighters battled fire for 5 hours









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Pipeline and Hazardous Materials
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Excavation Damage to Pipelines

- 1995-2015: 16.8% incidents 
 - 32.3% injuries
 - 37.7% fatalities



- Congress supports the goals and ideals of National Safe Digging Month



Damage Prevention Rules

Part 192.614 and 195.442

- damage prevention program for operators

written DP program

participate in
qualified one-call

PIPES Act 2006

- excavators must: 1) *use one-call*; 2) *pay attention to marks*; 3) *report damage*
- operators must: 1) *respond to locate request*; 2) *accurately mark*
- damage prevention grants to states
- enforcement by PHMSA

ANPRM - October 29, 2009

NPRM - April 2, 2012

Final Rule

Published FR: July 23, 2015

need rules
published in FR

Effective date: January 1, 2016



What is an Excavation Activity?

- Excavation
- Blasting
- Boring
- Backfilling
- Tunneling
- Removal of aboveground structures by explosive or mechanical means
- Other earthmoving operations



Excavation: “covers all excavation activity involving both mechanized and non-mechanized equipment, including *hand tools*”

Excavator: “any person or legal entity, public or private, proposing to or engaging in excavation”



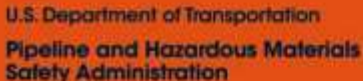
The New Rule

New Part 196

- **Standards for excavators digging near pipelines**

Part 198, added Subpart D

- **Seven criteria for assessing the adequacy of State DP enforcement programs; assessment process**
- **Administrative procedures for States to contest a notice of inadequacy**



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Cost Benefit Analysis

“if this regulatory action prevents just one average reportable incident per year, this final rule would be cost beneficial”

“over the past 24 years, the average reportable incident caused \$282,930 in property damage alone”



Does Part 196 Apply to Homeowners?

YES!



“PHMSA has eliminated the homeowner exemption originally proposed because homeowners excavating on their own property without first calling 811 poses a significant risk of excavation damage to pipelines”.



PHMSA's Position on Exemptions

“There are no exemptions in the final rule. PHMSA will be considerate of exemptions in state laws when undertaking Federal enforcement action.”



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Part 196, Subpart B – Damage Prevention Requirements



Part 196, Subpart C – Enforcement

PHMSA can assess *civil* and *criminal* penalties for violations of Part 196, but only in States that have an inadequate enforcement program.

\$200,000 per day
up to \$2,000,000



Note: PHMSA collected fines go to U.S. Treasury



Preamble Outlines Two Policies (FR 43840)

1. State Enforcement Program Evaluation Criteria (198.55)

2. Federal Enforcement Policy

“The policies are not part of the rule; they are flexible and can evolve as the rule is implemented.”



Federal Enforcement Policy

- PHMSA may use its enforcement authority in any excavation damage case involving a violation of Part 196
- PHMSA focus – serious violations that could directly impact safety
- PHMSA is flexible how it learns about incident that may warrant enforcement - complaints from stakeholders, incident reports, media, other mechanisms
- PHMSA will be cognizant of state requirements (i.e. exemptions, waiting periods, tolerance zones, etc.)



Part 198 Subpart D Highlights

State Damage Prevention Enforcement Programs

- PHMSA review state enforcement programs annually
- PHMSA **MAY** take immediate action against excavators
- State has 5 years to meet PHMSA criteria (**MAY** reduce grant, not to exceed 4% previous year funds)
- Governor can petition PHMSA for temporary waiver of penalty, but needs clear plan of action and timeline



Part 198.55 Criteria for Adequate State Enforcement Programs

1. Does state have the authority to enforce law using civil penalties?
2. Has the state designated a state agency or other body as the authority responsible for enforcement?

If the answer to either of these questions is “no” - will likely be deemed inadequate.



Part 198.55 Criteria for Adequate State Enforcement Programs

3. Are penalties sufficient to deter noncompliance?

Lack documentation showing use of enforcement and appropriate sanctions for violations, “likely” be deemed ineffective

Records that demonstrate rate of excavation damage reduced due to enforcement - this alone will not result in overall ineffective rating

Public availability of damage prevention law enforcement information and statistics via web site - this alone will not result in overall ineffective rating



Part 198.55 Criteria for Adequate State Enforcement Programs

4. Does authority have a reliable mechanism to learn about damage?

PHMSA will look for reporting mechanisms that encourage parity – i.e do potential violations identify both excavators and operators. PHMSA will review methods used to make stakeholders aware of the process and requirements for reporting damage incidents - this alone will not result in overall ineffective rating



Part 198.55 Criteria for Adequate State Enforcement Programs

5. Does state employ investigation practices that are adequate to find the responsible party?

PHMSA will look for enforcement patterns that demonstrate penalties applied to responsible party(s), not just to one stakeholder group (ie look at operators, utility owners and excavators) - this alone will not result in overall ineffective rating.

6. Does state damage prevention law include Part 196 Subpart B?

PHMSA will review state requirements in PIPES Act - this alone will not result in overall ineffective rating



Part 198.55 Criteria for Adequate State Enforcement Programs

**7. Does state limit exemptions for excavators?
(written justification from state – will be available to public)**

PHMSA will expect documentation for all notification (excavators) and membership (one-call) exemptions, including type and reason for exemptions, and data or other evidence that justifies exemptions - this alone will not result in overall ineffective rating.



Part 198.55 Summary of Criteria for Adequate State Enforcement Programs

(Listed in order of importance)

- **Noncompliance with criteria 1,2 - state likely deemed inadequate**
- **Noncompliance with criteria 3 - likely deemed inadequate**
- **Noncompliance with criteria 4, 5, 6 or 7 will not result in ineffective rating, but noncompliance in combination could result in a state being deemed inadequate**



Key Points

- Rule designed to incentivize states to implement effective enforcement programs
- PHMSA available to assist states to improve programs/laws
- PHMSA expects state programs to be “fair and balanced”
- Once PHMSA makes determination of inadequate state program, PHMSA has immediate authority to take action against excavators



Progress of State Evaluations

- **29 State enforcement program evaluations complete**
- **Finalizing State evaluation checklist and guidance based on initial evaluations**
 - **Goal: consistency in evaluations**
- **PHMSA's goal is to evaluate all 50 state enforcement programs in calendar year 2016**
- **8 letters mailed – adequate or not**



PHMSA State Evaluation Letters

- Virginia →
- Connecticut →
- West Virginia →
- Mississippi →
- Alaska →
- Montana →
- Colorado →
- Nevada →



PHMSA Supports

National 811 Day

National 811 Day is observed each year on August 11. Digging without knowing the approximate location of underground utilities can result in damage to gas, electric, communications, water and sewer lines, which can lead to service disruptions, fatalities, serious injuries and costly repairs.

Always Call 811 Before You Dig

To learn more about National 811 Day, please visit:

<http://www.Call811.com>



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811 Outreach

- Strong support across PHMSA and DOT for 811 awareness
- 2016 general campaigns:
 - Paid radio, TV and web advertising



Additional Information

- PHMSA website: <http://phmsa.dot.gov/pipeline/safety-awareness-and-outreach/excavator-enforcement>



Rulemaking Process

Where can I find information on the Status of rulemakings?

<http://www.phmsa.dot.gov/pipeline/regs>

Then select from the “Rulemaking Menu” on the upper right area of the page:

- Rulemaking Home
- Rulemaking Archives
- Rulemaking Pending



Alert Notices & Advisory Bulletins

- **Alert Notices** - a notice of a situation of immediate safety concern
- **Advisory Bulletins** - an advisory of a safety concern that an operator should follow as it applies to their facilities and operations
 - matters that have potential to become safety or environmental risks



Advisory Bulletin (ADB)

ADB– 2016-04

Ineffective Protection. Detection, and Mitigation of Corrosion Resulting from Insulated Coatings on Buried Pipelines

To remind all owners and operators of hazardous liquid, CO₂ and gas pipelines to consider the overall integrity of facilities to ensure the safety of the public and operating personnel and to protect the environment.



Advisory Bulletin (ADB)

ADB– 2016-04

Ineffective Protection. Detection, and Mitigation of Corrosion Resulting from Insulated Coatings on Buried Pipelines ...continued...

Operators are reminded to review pipeline operations to ensure that pipeline segments both buried and insulated have effective coating and corrosion-control systems to protect against cathodic protection shielding, conduct in-line inspections for all threats, and ensure in-line tool findings are accurate, verified, and conducted for all pipeline threats.



Advisory Bulletin (ADB)

ADB–2016-03

To: Owners and Operators of Petroleum Gas and Natural Gas Facilities in Areas subject to Heavy Snowfall or Abnormally icy Weather.

Advises owners and operators of the need to take appropriate steps to prevent damage to pipeline facilities from accumulated snow or ice. Past events on natural gas distribution system facilities appear to have been related to either stress of snow and ice or the malfunction of pressure control equipment due to ice blockage of pressure control equipment vents. Take precautionary actions.



Advisory Bulletin (ADB)

ADB–2016-02

Underground Gas Storage Facilities

<https://federalregister.gov/a/2016-02228>

PHMSA is issuing this advisory bulletin to remind all owners and operators of underground storage facilities used for the storage of natural gas, as defined in 49 CFR part 192, to consider the overall integrity of the facilities to ensure the safety of the public and operating personnel and to protect the environment.



Advisory Bulletin (ADB)

ADB-2016-02

Underground Gas Storage Facilities ...*continued*...

Operators are reminded to review their operations to identify the potential of facility leaks and failures caused by corrosion, chemical damage, mechanical damage, or other material deficiencies in piping, valves, etc., and the importance of reviewing the location of operations and shut-off and isolation systems and reviewing and updating emergency plans as necessary.



Advisory Bulletin (ADB)

ADB-2016-01

Water Crossings & Areas Prone to Flooding

PHMSA is issuing this advisory bulletin to remind all owners and operators of gas and hazardous liquid pipelines of the potential for damage to pipeline facilities caused by severe flooding and actions that operators should consider taking to ensure the integrity of pipelines in the event of flooding, river scour, and river channel migration.



FR, Miscellaneous Changes to Pipeline Safety Regulations, Response To Petitions For Reconsideration.

- **Sept. 30, 2015**

- The effective date of the amendment to 49 CFR 192.305, published at 80 FR 12779, March 11, 2015, is delayed indefinitely.

(concerning not using operator personnel to perform a required inspection if the operator personnel performed the construction task requiring inspection)



FR, Miscellaneous Changes to Pipeline Safety Regulations, Response To Petitions For Reconsideration.

Please note, the effective date for all the other amendments contained in the final rule remains October 1, 2015.

195.204 Inspection – general, has similar wording and **is** in effect as of October 1, 2015.

The regulation also states that “Nothing in this section prohibits the operator from inspecting construction tasks with operator personnel who are involved in other construction tasks.”



IFR, maximum civil penalties

- PHMSA is revising references in its regulations to the maximum civil penalties for violations of the Federal Pipeline Safety Laws, or any PHMSA regulation or order issued thereunder. Federal agencies are required to adjust their civil monetary penalties effective August 1, 2016, and then annually thereafter, to account for changes in inflation.
- PHMSA finds good cause to amend the regulation related to civil penalties without notice and opportunity for public comment.



Violated statute	CFR Citation	Base year	Current maximum civil penalty	Revised maximum civil penalty
49 U.S.C. 60101 <i>et seq.</i> , and any regulation or order issued thereunder.	49 CFR 190.223 (a)	2012	\$200,000 for each violation for each day the violation continues, with a maximum penalty not to exceed \$2,000,000 for a related series of violations	\$205,638 for each violation for each day the violation continues, with a maximum penalty not to exceed \$2,056,380 for a related series of violations.
49 U.S.C. 60103 ; 49 U.S.C. 60111	49 CFR 190.223 (a)	1996	A penalty not to exceed \$50,000, which may be in addition to other penalties under 40 U.S.C. 60101 , <i>et seq</i>	An administrative civil penalty not to exceed \$75,123, which may be in addition to other penalties assessed under 49 U.S.C. 60101 , <i>et seq</i> .
49 U.S.C. 60129	49 CFR 190.223 (d)	2005	A penalty not to exceed \$1,000	A penalty not to exceed \$1,194.





QUESTIONS???



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