



U.S. Department of Transportation  
Pipeline and Hazardous Materials  
Safety Administration



# **PHMSA**

## **Office of Pipeline Safety**



# **Public Awareness Program Effectiveness Evaluation Reviews**

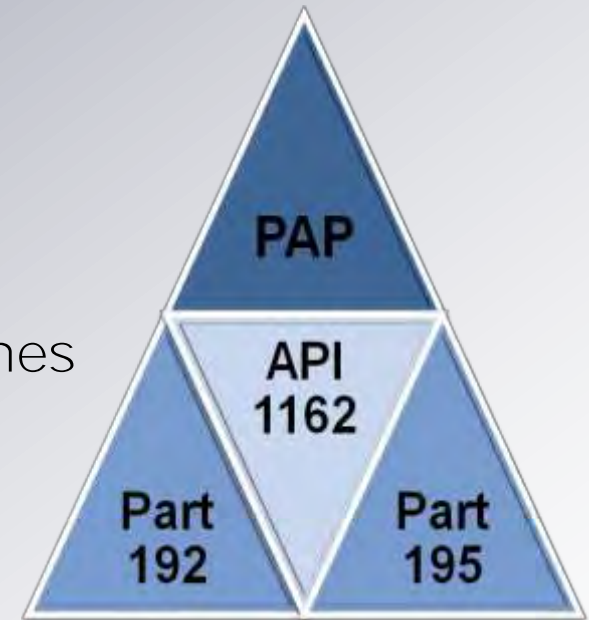
**Western Regional Gas Conference  
August 24, 2011**

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# Public Awareness Regulations

- Final Rule in May 2005 (Docket 15852)
  - Incorporated by reference the guidelines in API RP 1162, Public Awareness Programs for Pipeline Operators, 1<sup>st</sup> Edition
    - 192.616 for Natural Gas Pipelines
    - 195.440 for Hazardous Liquids Pipelines





## 8.5 SUMMARY OF BASELINE EVALUATION PROGRAM

Table 8-1—Summary of Baseline Evaluation Program

The results of the evaluation need to be considered and revisions/updates made in the public awareness program plan, implementation, materials, frequency and/or messages accordingly

Evaluation Approaches	Evaluation Techniques	Recommended Frequency
Self Assessment of Implementation	Internal review, <i>or</i> third-party assessment <i>or</i> regulatory inspection	Annually
Pre-Test Effectiveness of Materials	Focus groups (in-house or external participants)	Upon design or major redesign of public awareness materials or messages
Evaluation of effectiveness of program implementation: <ul style="list-style-type: none"> <li>• Outreach</li> <li>• Level of knowledge</li> <li>• Changes in behavior</li> <li>• Bottom-line results</li> </ul>	<ol style="list-style-type: none"> <li>1. Survey: Can assess outreach efforts, audience knowledge and changes in behavior               <ul style="list-style-type: none"> <li>• Operator-designed and conducted survey, or</li> <li>• Use of pre-designed survey by third-party or industry association, or</li> <li>• Trade association conducted survey segmented by operator, state or other relevant separation to allow application of results to each operator.</li> </ul> </li> <li>2. Assess notifications and incidents to determine anecdotal changes in behavior.</li> <li>3. Documented records and industry comparisons of incidents to evaluate bottom-line results.</li> </ol>	<p>No more than four years apart.</p> <p>Operator should consider more frequent as a supplement or upon major redesign of program.</p>
Implement changes to the Public Awareness Program as assessment methods above suggest.	Responsible person as designated in written Public Awareness Program	As required by findings of evaluations.

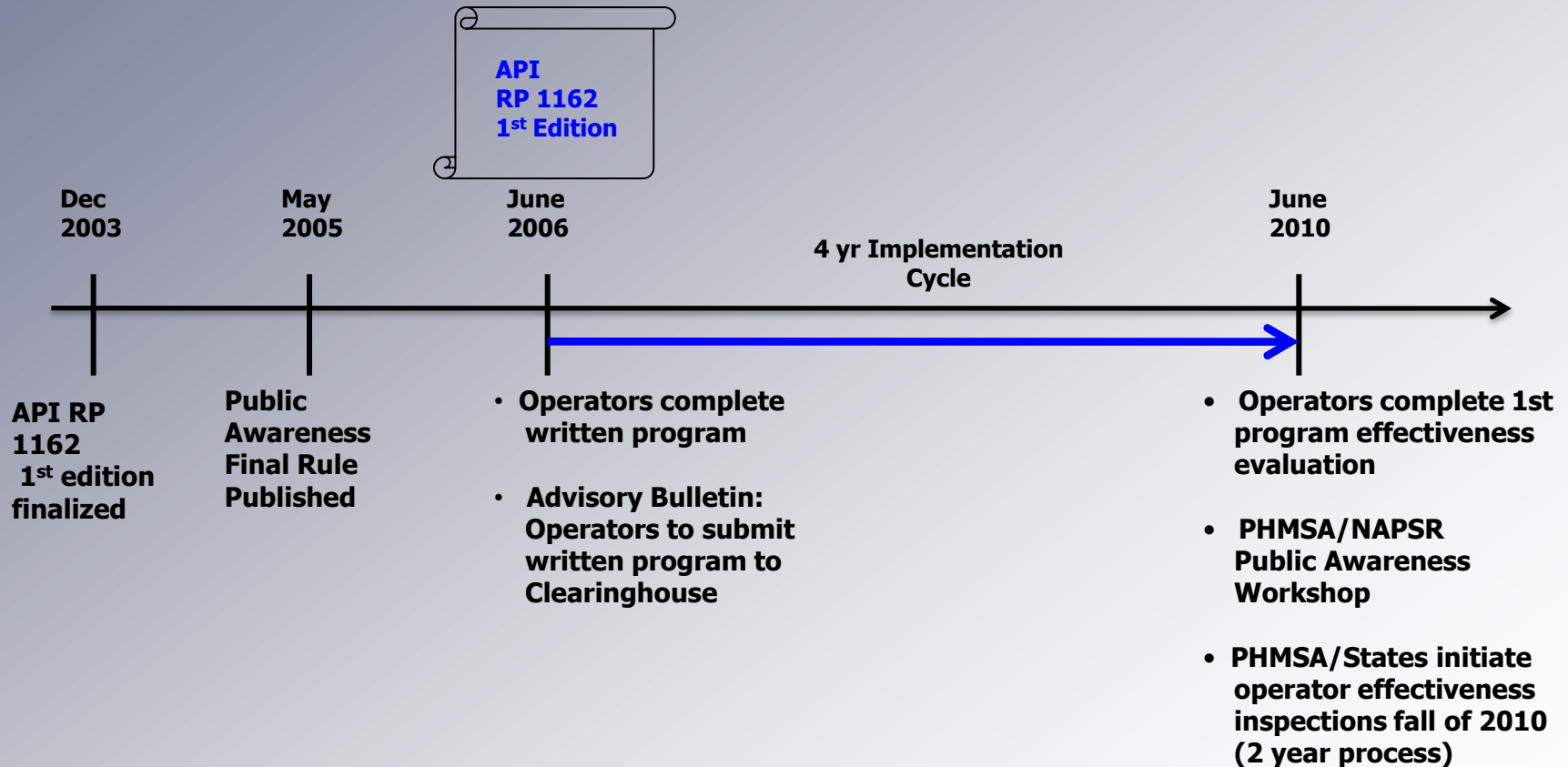


From API 1162, 1<sup>st</sup> Edition

**June 2010: Operators' Initial Four-Year Evaluations of Effectiveness Due**



# Chronology & Background Timeline





# National Transportation Safety Board Recommendation

**NTSB Accident Report NTSB/PAR-09/01:**

**PHMSA is to –**

**“Initiate a program to evaluate pipeline operators’ public education programs, including pipeline operators’ self- evaluations of their public education programs. Provide the NTSB with a timeline for implementation and completion of this evaluation. (P-09-03)”**



# Public Awareness Inspections

- **Ongoing inspections since 2006, starting with Clearinghouse review**
- **Focus has been on:**
  - **Did the operator have a written program?**
  - **Was it tailored to specific pipeline assets?**
  - **Was the program being implemented?**
- **June 2010: Operators' initial four-year evaluation of effectiveness due**



# Public Awareness Effectiveness Inspection Focus

- **Ad Hoc Team worked to develop inspection forms and guidance**
- **Focus on program effectiveness evaluations:**
  - If/How operator evaluated their program for effectiveness? What were the evaluation results or findings?**
  - What improvements were identified? Implemented?**
- **May verify operator implemented according to their written program or probe deeper**
- **Emphasis placed on continuous improvement**
- **From initial inspections conducted (~ 2 days each)**
- **Public Awareness Effectiveness inspections from 2010 - 2012**



# Inspection Sections

- 1. Administration and Development of PAP**
- 2. Program Implementation**
- 3. Program Evaluation (Annual Audits)**
- 4. Program Evaluation (Results)**
- 5. Inspection Results**



# Inspection Format

## **1. Administration and Development of Public Awareness Program**

- Step 1: Define Program Objectives
- Step 2: Obtain Management Commitment and Support
- Step 3: Identify Program Administration
- Step 4: Identify Pipeline Assets to be Included within the Program
- Step 5: Identify the Four Stakeholder Audiences
- Step 6: Determine Message Type and Content for Each Audience



# Inspection Format

## **2. Program Implementation**

- Step 7: Establish Baseline Delivery Frequency for Each Message
- Step 8: Establish Delivery Methods to Use for Each Message
- Step 9: Assess Considerations for Supplemental Program Enhancements
- Step 10: Implement Program and Track Progress



# Inspection Format

## **3. Program Evaluation (Annual Audits)**

## **4. Program Evaluation (Effectiveness)**

Step 11: Perform Program Evaluation

Step 12: Implement Continuous Improvement



# Inspection Format

## **5. Inspection Results**

Summary

Findings



# Initial Inspection Observations

**“How effective is your public awareness program?”**

- **Operators collected effectiveness evaluation data**
  - **Survey/assessment data is not = completing the effectiveness evaluation**
  - **Any findings or conclusions related to effectiveness?**
  - **Changes identified?**
  - **Can operator describe methodology used?**



# Initial Inspection Observations

- **Many operators used third party contractors**
  - Direct mailings, public meetings, evaluations, advertising, television, radio adds**
  - Customize to meet operator needs**
  - Important to stay engaged with QA/QC & oversight:**
    - Mailing list accuracy (direct mailings/print ads)**
    - New developments**
    - Returned or undeliverable mailing follow-up**
    - Understand your requirements**
    - Operators (not contractors) are responsible for PAP Compliance**



# Initial Inspection Observations

- **Stakeholder list identification (SIC codes, geo-coding, address lists, shape files, street databases)**
- **Some operators had proof of mailings sent out**
- **Specific and generic messages used**
- **Generic messages may lead to confusion**
- **Acceptable if:**
  - **Baseline requirements still met (each stakeholder audience)**
  - **Specific to operator's pipeline system/unique attributes (i.e. odorized line?)**
  - **Specifies the type of products**



# Initial Inspection Observations

- **Public meetings, operator presence (yes & no)**
- **Sample sizes and % limits defined by the operator**
  - **Not prescribed by regulator**
  - **Be able to explain methodology to support data/results**
- **Non-English speaking language considerations across the board**
  - **Data/Analysis to support decisions**
  - **Census data, county courthouse records, school records, hospital records, field personnel, focus groups**



# Initial Inspection Observations

- **Three annual audit methods used (internal self-assessments, third party audits, regulatory inspections)**
- **Annual audit & effectiveness evaluation (year 4); documented?**
- **Evaluation feedback:**
  - **Phone/online surveys/questionnaires**
  - **One-call center data**
  - **Response cards**
  - **Website hits**
- **Documentation/justification not always there**
  - **PAP changes, annual audits, methodologies**
  - **Key changes and recommendations**



# Good Practices Observed

- **Creative outreach approaches:**
  - **National 811 campaigns**
  - **Children campaigns (videos, radio clips, contests)**
  - **Website development**
  - **Email messages**
  - **Magazine centerfolds**
- **Collecting baseline data since 2006, understand trends**
- **Public meeting tracking attendance since 2006 and following up with those who did not**
- **Some operators use management system to schedule and document program activities**



# Good Practices Observed

- **Numerous supplemental activities:**
  - **Tracking excavators who hit line or dig without one-call ticket**
  - **More frequent mailings to stakeholders**
  - **Messages in multiple languages**
    - **Website**
    - **Posters**
    - **Emergency # translates to other languages (Spanish, French, Japanese, Russian, Korean, Arabic, etc)**
- **24 hour public awareness phone #**
- **Participate with Emergency Response (ER) officials in emergency exercises and drills**



# Looking Ahead

- **Inspection activities:**

- **Ramping up inspections—PHMSA to complete by 12-31-2012**
- **Inspection form/guidance is finalized**
- **Training schedule has been finalized for Federal/State inspectors**
- **FAQs published April, 2011**
- **Information on Stakeholder Communications website**

- **Operators:**

- **Evaluated program for effectiveness (data, results, findings)**
- **Lessons learned (changes needed?)**
- **Implementing changes? What's the plan?**



# API RP 1162 2nd Edition

- **API published RP 1162 2nd Edition**
- **Operator is still required to comply with the 1st edition incorporated in the regulations**
- **If PHMSA determines that the revision is appropriate to incorporate into regulation, may incorporate into rule at later date**



# Considerations

- Public Awareness vs. Public Education
- The word educate implies a one-way action
- The word awareness implies a two-way action
  - The recipient not only received the information but perceives, has knowledge of, understands, or is otherwise cognizant of the information being presented
  - The information is provided, the recipient gives feedback
- The significance of this word change cannot be overlooked or downplayed
- The current rules now require a pipeline operator to
  1. provide information to stakeholder audiences, and
  2. to measure if and how well the stakeholder audiences grasped the information.



# Considerations

- Outreach levels (one size does not fit all)
  - PHMSA will not set outreach levels or percentages for desired messages
  - Rather operators explain how they derived at the percentage limits and how they addressed their program to fill gaps
- “Must”, “May”, “Should”
  - “Must” – means an action is mandatory
  - “May” – means an action is permitted or authorized but not required
  - “Should” – When PHMSA incorporated, by reference, API RP 1162 (1<sup>st</sup> edition) into the pipeline safety regulations, **the word “should” changed from meaning a recommendation to meaning a requirement for regulated pipeline systems**



# Considerations

- **“Should”** – means an action is required unless an operator provides justification
  - To be valid the justification must:
    - be written,
    - be based on a sound engineering and/or safety analysis,
    - adequately explain why compliance with the action is not practicable for the specific pipeline system,
    - adequately explain why compliance with the action is not necessary for safety on that specific pipeline system, and
    - provide a level of safety equal to, or greater than, that which would be provided had the operator followed the action
- This is consistent with numerous regulatory interpretations PHMSA has issued since 1970. Operators still have due process, if needed



# Considerations

- The intent of the regulation is that messages should **provide “enough information so that in the event of a pipeline emergency, the intended audience will know how to identify a potential hazard, protect themselves, notify emergency response personnel, and notify the pipeline operator” (API RP 1162, Section 4)**
- Generic messages do not meet the intent of the PAP regulations because they do not necessarily provide **“awareness”**
- Message content must be pipeline system and product specific



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# Useful Links

- **PHMSA Website:**

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

- **Federal Regulations:**

<http://www.gpoaccess.gov/cfr>

- **Stakeholder Communications:**

<http://primis.phmsa.dot.gov/comm/>

- **National Pipeline Mapping System (NPMS):**

[www.npms.phmsa.dot.gov](http://www.npms.phmsa.dot.gov)

- **Grant Information:** [www.grants.gov](http://www.grants.gov)

- **State Damage Prevention Grants:**

<http://primis.phmsa.dot.gov/sdp/>

- **Technical Assistance Grants (TAG):**

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



# QUESTIONS?

**Thank You!**

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