

# *COGCC Operator Meeting*

## 2016 Flowline Audit Summary

February 14th, 2017



**COLORADO**

**Oil & Gas Conservation  
Commission**

Department of Natural Resources

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# *Agenda*

- 2016 Audit Results
- Audit Review: Strengths and Improvements
- Common Issues Encountered by Operators
- 2017 Audit Process
- Questions

# COGCC Auditing Results

## 2016 Recap

- 24 Operator Audits
  - ✓ 2,760 Wells audited
  - ✓ Over 3,800 Flowline Pressure Tests reviewed
  - ✓ DJ, Piceance, and North Park Basins
  - ✓ Onsite and electronic audits

# Audit Review - Strengths

- High Participation
- Explanations of pressure test discrepancies
- GPS use for flowline locations
- FLIR camera use for confirming leaks
- Documentation of Flowline pressure testing procedures

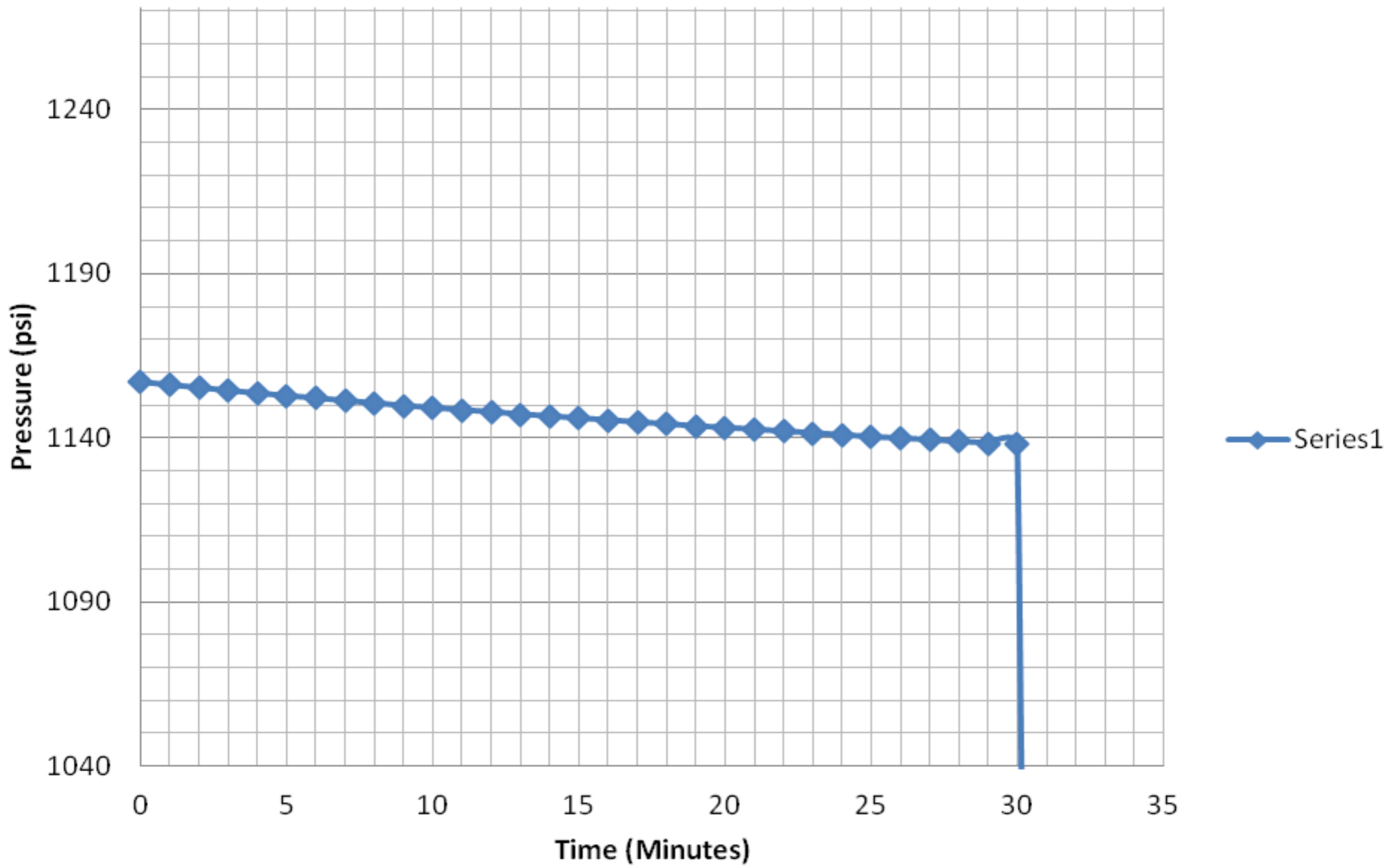
# Audit Review - Improvements

- Provide more detailed root causes and preventative measures on Form 19 Spill/Release Report
- Document the Flowline Integrity Program
  - Material Selection
  - Inspection Details
  - Flowline Failure and Repair Procedures
  - Spill Response
  - Corrosion and Cathodic Protection Details
- Create an electronic database for storing records
- Include temperature on pressure chart
- Allow lines to stabilize before commencing pressure test

# What Makes a Passing Test?

- Pressure deviation less than 10% (Per Flowline Guidance)
- Stabilization within last five minutes of test (+/- 1% of test pressure)
- NOTE: provide comments about the pressure test, including abnormal changes that may have occurred
- Failed Pressure Test
  - List actions taken upon failure

# Good Example - Pressure Test Graph

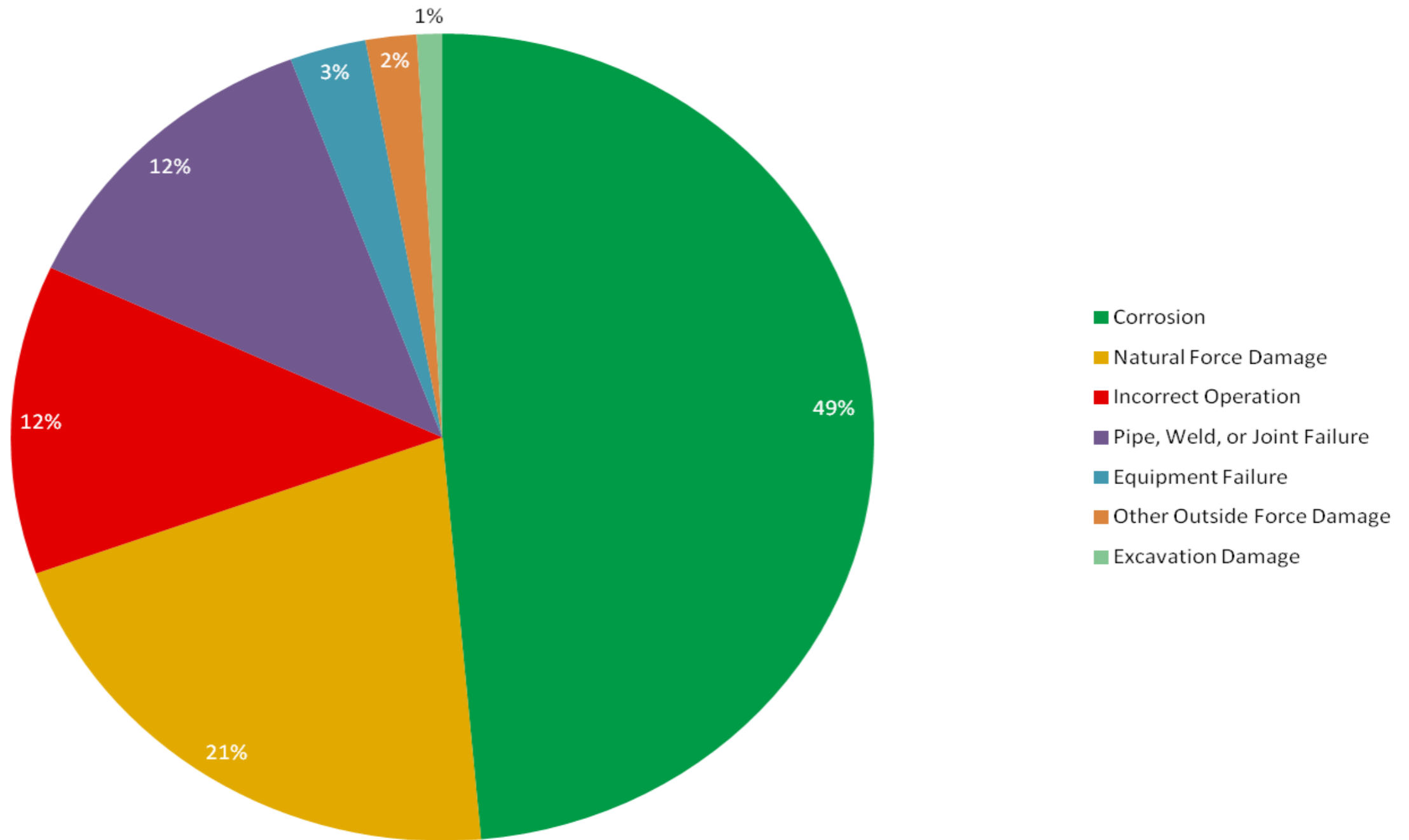


# Common Issues Encountered by Operators

- Internal Corrosion
- Freezing
- Poly Fusion Failures



## Apparent Causes of Flowline Releases January 1, 2016 - December 31, 2016



# 2017 Audit Process

- Priority Factor Scores used for COGCC to select Flowlines for Audit:
  - Top 33% of Flowlines susceptible to audit
  - Highest 10% will be audited
  - Floodplains

## Goals for 2017

- Mid-Sized Operators
- Water Floods
- San Juan Basin Operators
- On-site Visits and Electronic Submittals

# Flowline Priority Based Model Factors

1. Population density - 10%
2. Environmental risks - 20%
3. # of Spills (last 5 years) on location - 13%
4. Years in Service - 35%
5. # of Integrity-Related Corrective Actions - 10%
6. Time since last inspection - 12%

Priority score = ((Population \* 10%) + (Environmental \* 20%) + (Last Inspection \* 12%) + (Years in Service \* 35%) + (Spills \* 13%) + (Corr. Actions \* 10%)) \* 20

# What To Expect

- Certified Letter one month before audit
- List of Targeted Wells
- Flowline Audit Topics to be discussed or submitted electronically
- Flowline Audit Completion Document

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