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Pipeline & Hazardous Materials Safety Administration

Research and Development Forum



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Improvements to Technology

Pipelines operating today have benefited from...

- Advances in materials
- Shortened timeframes on high integrity welds
- Coatings that are more durable and repairable
- Corrosion control that is more understood
- In Line Inspection that is much more accurate and being applied to un-piggable lines



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Why is OPS Involved?

Because...

- Pipelines must operate safely
- Good operator performance must be maintained
- Technologies for the field must be fostered
- Standards require strengthening
- Knowledge must be disseminated and translated into good performance
- R&D funding is declining
- Many current and future technical issues still need solutions



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Which Technology Issues are Significant?

- Finding better ways to prevent and categorize damage
- Validating integrity assessment methodologies are working
- Improving encroachment monitoring and leak detection systems
- Increasing the accuracy and application of In line Inspection
- Enhancing design, construction and materials performance
- Fostering risk management ideas into emerging issues such as LNG



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Implementing Technology Improvements

To be successful

- Efforts must be well planned
- Researchers must provide high quality results
- Technology transfer must be facilitated
- Benefits from research should be identified and measured
- Stakeholders must be involved



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How is OPS Stepping up to the Plate?

Since 2002

- Issued 4 research solicitations
- Awarded 49 projects
- Obligated over \$12.5 million-OPS & \$15 million industry co-funding
- Fostered greater “Stakeholder” involvement
- Responded to Congressional, IG and GAO recommendations
- Applied for U.S. Patents
- Strengthened standards



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What is “Our” Challenge?

- Maintaining the safety, security and reliability of an aging pipeline infrastructure through effective regulations
- Managing significant energy demand forecasts
- Protecting the environment while addressing national energy needs
- Fostering the development of new technologies and strengthening industry consensus standards through R&D.
- Leveraging R&D resources while improving R&D performance
- Conducting an effective program of technology transfer and communication with stakeholders



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OPS Remains Committed to...

- Continue intergovernmental and industry coordination with research activities
- Insure our research outputs are of high quality and that desired impacts are measured
- Provide a transparent research program for all stakeholders
- Continue using the R&D Forum to set a national pipeline research agenda



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We Need Your Help!

- Technology Transfer
- Standard Organizations
- Test Beds for Technology Demonstrations
- Coordination of Industry Research and Resources