

Natural Gas Transmission Pipelines

Guidance for Maintaining Rights-of-Way

As part of PG&E's commitment to pipeline safety excellence, we consult with state and federal regulators and leading industry experts to help guide our pipeline safety initiatives. This fact sheet highlights guidance from two national pipeline safety organizations: the Pipelines and Informed Planning Alliance (PIPA) and the Pipeline Safety Trust. Comprised of approximately 130 stakeholder groups, PIPA is led and supported by the United States Department of Transportation's Pipeline and Hazardous Materials Safety Administration (PHMSA). The Pipeline Safety Trust is an independent, pipeline safety oversight non-profit organization.

PIPA's 2010 Report

PIPA's landmark report, entitled *Partnering to Further Enhance Pipeline Safety in Communities Through Risk-Informed Land Use Planning: Final Report of Recommended Practices* (PIPA Report, November 2010), details best practices for transmission pipeline operators, property owners, local governments and real estate commissions.

From the PIPA Report (pg 6):

"When transmission pipelines are located in proximity to where people live, work, shop, or travel, pipeline safety concerns must be incorporated into every level of the decision-making and land development approval process."

A cornerstone of the report is the importance of maintaining a clear right-of-way (ROW) free of structures, trees and certain vegetation. Trees can interfere with a pipeline operator's ability to maintain, inspect and safely operate the system.

From the PIPA Report (pg 41):

"A clear ROW enables the transmission pipeline operator to conduct inspections and testing to verify pipeline integrity and to perform general maintenance and repairs as needed... Tree roots have the potential to damage pipeline coatings which may contribute to the loss of integrity of the pipeline."

For more information about PIPA, or to download a copy of the report, please visit www.pipa-info.com.

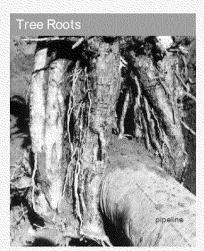
Example Photos from the PIPA Report

The PIPA Report includes photos that "illustrate situations on the transmission pipeline right-of-way that should be avoided." (Appendix C, pg 19-20)

Incompatible Vegetation



Example of incompatible vegetation planted within the ROW.



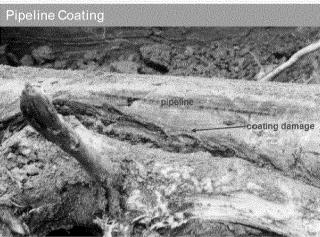
Example of the impact tree roots can have on a pipeline.

"PG&E" refers to Pacific Gas and Electric Company, a subsidiary of PG&E Corporation. ©2014 Pacific Gas and Electric Company. All rights reserved.

From the PIPA Report (Appendix C, pg 20-22):

"The tree roots have impeded the pipeline operator's ability to access and evaluate the condition of the transmission pipeline. Pipeline coatings may also be damaged by tree roots. Coatings need to remain intact to protect the transmission pipeline from external corrosion."





Pipeline Safety Trust's Guide for Landowners

In September 2011, the Pipeline Safety Trust published a guide for landowners intended to enhance safety by providing information about pipelines, basic rights and responsibilities, and where landowners can look for more information. Similar to the PIPA Report, the *Landowner's Guide to Pipelines* refers to pipeline safety as "a shared responsibility" (Landowner's Guide, pg 29).

From Landowner's Guide (pg 29):

"We believe that pipeline safety is like a three-legged stool with the industry, regulators and public each serving as one leg of the stool and each playing a crucial role. If any leg of the stool falters, pipeline safety is at risk."

Industry operators, such as PG&E, are responsible for installing, operating and maintaining safe pipelines. Landowners also play an equally vital role in enhancing pipeline safety.

From Landowner's Guide (pg 29).

"... the best way to protect your interests is to learn what you can about pipelines, what your pipeline easement agreement requires, and who to call if there is a problem."

For more information about the Pipeline Safety Trust, or to download a copy of the full report, please visitwww.pstrust.org.

Learn what PG&E is doing

As part of PG&E's Pipeline Pathways program, we are working cooperatively with property owners and municipalities to identify and remove structures, trees and incompatible vegetation located in the area above the pipeline. By improving access to our pipeline rights-of-way, PG&E can more safely operate the natural gas system. Learn more about Pipeline Pathways by visiting us at www.pge.com/pipelineaccess.or.calling.us.at.1-877-259-8314.