

**Public Page**  
**Managing the Integrity of Early Pipelines**  
**Agreement DTRS56-03-T-0003**  
**2<sup>nd</sup> Quarterly Status Report**  
**Period July 1, 2003 to September 30, 2003**  
**Contractor: Battelle**

The focus of this project is managing the condition of vintage pipelines such that integrity is ensured. The first three milestones have been met – an overview of the work products developed to meet these milestones follows.

The first three milestones were met in Q1. The first identified degradation mechanisms operative on pipelines such that integrity can be ensured by managing the threat to safety posed by this degradation. The second milestone involved known fabrication and construction anomalies and defects in the steel (pipe body) and the long seam. The third milestone developed flow charts to implement the criteria developed in meeting the first two milestones, with these criteria being embedded in decision points within the information and decision flow.

Work in Q2 has focused on developing the quantitative framework to evaluate degradation kinetics for each of the key degradation modes identified in Q1. This has been completed for each of these modes and the method codified for fatigue. Work continues into the next quarter in reference to SCC and hydrogen cracking. When completed this work comprises the next payable milestone.

Point of Contact:

Brian Leis

Battelle, 505 King Ave.

Columbus, Ohio 43201

[leis@battelle.org](mailto:leis@battelle.org)

Voice: 614-424-4421

Fax: 614-458-4421