

Leak Detection Workshop

Date: April 29-30, 2003

Course Description:

The **Leak Detection workshop** is intended for those individuals, who are a beginner in the field to someone, who has good understanding on what is going on and wants to know more about tank safety and spill prevention. The workshop is a 2-day event at the Missouri Department of Natural Resources Regional Office in Lees Summit, Missouri. The course will be featuring **Ken Wilcox & Associates, Simmons** and **Tanknology**, as our featured lecturers.

Ken Wilcox and Associates will be discussing the “**Principles of Leak Detection in tanks and pipelines**” and will furnish EPA’s current reference manual and later at his facility, hands-on training on how to test the various leak detectors on today’s market.

Simmons will discuss “**Inventory Control**”; “**Statistical Inventory Reconciliation and SIR combined with automation**” and will briefly discuss tank and line testing with mechanical and electronic line leak operational testing” and how SIR relates to release detection.

Tanknology will discuss “**Cathodic Protection, and Stage I & II Vapor Recovery Testing**”; and will briefly discuss how these test relates to tank and line testing with mechanical and electronic line leak operational testing.

This course will give the attendee the opportunity to have hands on experience and see how the equipment works and review simple trouble shooting techniques. We encourage the audience to ask questions and discuss what they seen in the field with our guest lecturers.

Registration available at: Mid-America Regional Council web-page: <http://www.marc.org> or call John Staples at 816.474.4240 or Marty Vodicka at the Missouri Department of Natural Resources at 816.622.7009 for any questions.

Attendance is limited to 30 students.
Cost: \$150.00 per Student

Location of Training:

**Missouri Department of Natural Resources
Kansas City Regional Office
500 NE Colbern Rd
Lees Summit, MO 64086
816. 622.7000**

From I-70 take Hwy-291 South to the Colbern Street exit and make a right onto Colbern Rd. The Regional Office entrance is just pass the Missouri Department of Transportation Office (the first building) on the right (across from Ray Steven’s Car lot) and the Regional Office is located on the North-side of the parking lot. See attach map for location.

**Ken Wilcox and Associates Facility
1125 Valley Ridge Drive
Grain Valley MO
816.443.2494**

From the Regional Office, take Hwy-291 North to I-70 East to the Grain Valley exit, take a left onto Buckner Tarsney Road and another left, West on the North Outer Road and make a right hand turn on Valley Ridge Drive and KWA is on the right at 1125. See attach map for location.

The agenda is subject to change.

LEAK DETECTION WORKSHOP AGENDA

After the morning lecture the class will be divided into two groups and will be back together the following day for the final lecture:

DAY ONE: April 29

Morning: Teams one & two will meet at the Missouri Department of Natural Resources Regional Office at 8:00 am. (will meet at the Regional Office)

Principles of Leak Detection by Ken Wilcox and Associates (KWA)

Tanks

- Automatic Tank Gauges
- Precision Testing
- SIR
- CITLDS
- Interstitial monitors

Pipelines

- Mechanical devices
- Electronic devices
- External Monitors (Non-volumetric)

Third Party Evaluations and what they mean

- Use of the National Workgroup on Leak Detection Evaluation List
- How they are contacted
- Limitations of these evaluations

How to tell if a leak detector is working

- Use of the EPA Manual
- Use of the KWA Manual
- Other training material

Afternoon: Team One (will meet at the KWA facility)

Hands-on experience with ATG's and pipeline leak detectors

- How to get information from an ATGS.
- How to test mechanical leak detectors
 - Functional Test
 - Leak rate test for 3 gal/hr
- Non-volumetric methods
 - Interstitial monitors
 - Vacuum
 - Pressure
 - Types of switches
 - Product sensitive cables
 - Others

Afternoon: Team Two (will meet at the Regional Office)

Simmon's SIR

- Methods of Leak Detection
- Inventory Control
- Statistical Inventory Reconciliation
- SIR combined with automation

DAY TWO: April 30

Morning at 8:00 am: Team Two (will meet at the KWA facility)

Hands-on experience with ATG's and pipeline leak detectors

How to get information from an ATGS.

How to test mechanical leak detectors

Functional Test

Leak rate test for 3 gal/hr

Non-volumetric methods

Interstitial monitors

Vacuum

Pressure

Types of switches

Product sensitive cables

Others

Morning: Team One at 8:00 am (will meet at the Regional Office)

Simmon's SIR

Methods of Leak Detection

Inventory Control

Statistical Inventory Reconciliation

SIR combined with automation

Afternoon at 1:00 pm: Teams One & Two (will meet at the Regional Office)

Tanknology

Cathodic Protection

Tank and Line Precision Testing

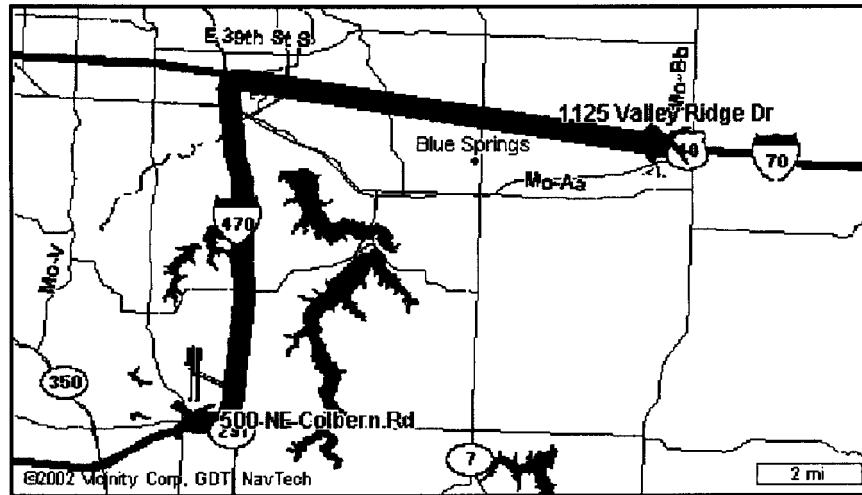
Mechanical and electronic Line leak detector operational testing

Stage I & II Vapor recovery testing

Directions from the Kansas City Regional Office to the Ken Wilcox Facility

From:
500 NE Colbern Rd, Lees
Summit, MO 64086-4711

To:
1125 Valley Ridge Dr, Grain
Valley, MO 64029-9094



The estimated travel time is 0 hours, 16 minutes for 16.63 miles of travel, total of 5 steps.

Step	Directions	Elapsed Distance
1	Begin at 500 NE Colbern Rd on NE Colbern Rd and go 0.6 miles	0.6
2	Turn left on ramp to I-470 and go 6 miles	7.0
3	Turn right on ramp to I-70 and go 9 miles	15.8
4	Continue on ramp to Mo-Bb,S Buckner Tarsney Rd and go 0.3 miles	16.1
5	Turn left on N Outer Rd and go 0.5 miles to 1125 Valley Ridge Dr	16.6

These driving directions are provided only as a rough guideline.
Please be sure to call ahead to verify the location and directions.



Location of the Missouri Department of Natural Resources Kansas City Regional Office

500 NE Colbern Rd
Lees Summit, MO 64086-4711

