UST Redevelopment Fund and LUST Fund Programs

Stephanie Pfannenstiel, P.G.
Kansas Department of Health & Environment
Bureau of Environmental Remediation
Storage Tank Section
LUST / Investigation Unit Manager
UST Property Redevelopment Trust Fund

- July 1, 2012 - The Kansas Storage Tank Act was amended to provide a reimbursement fund to assist property owners for removal of abandoned petroleum UST(s).

- The new fund allows for reimbursement of 90% of the cost up to $25,000 per facility for permanent closure of USTs.
Where does the money come from?

- The Storage Tank Act establishes two separate Trust Funds to assist owners and operators of storage tanks with the cost of remedial actions. Both funds are designed to provide financial assistance to owners and operators of facilities where contamination from petroleum storage tanks has occurred. The Trust Funds are financed from a $0.01 fee placed on each gallon of petroleum (except aviation fuel) product manufactured in or imported into the state.

- The Kansas Essential Fuels Supply Trust Fund has been redesignated as the UST Redevelopment Fund. The funds credited may be expended to reimburse eligible property owners for allowable expenses for permanent closure of an abandoned underground storage tank. KDHE can also conduct the same activities if the owner or operator of the UST has not been identified or is unable or unwilling to perform permanent closure.
UST Redevelopment Fund and LUST Fund Programs

UST Property Redevelopment Trust Fund

An abandoned UST must exhibit one or more of the following conditions.

- The UST has not been used for more than 3 months.
- The UST does not have a current tank permit.
- The UST has been temporarily out-of-service for more than 12 months.
Who is eligible for the UST Redevelopment Fund

- The property owner has never placed or withdrawn petroleum from the UST.
- The property owner is not the United States government or any of its agencies.
- The property owner is in substantial compliance with the Kansas Storage Tank Act.
Property Owner Requirements

• The property owner must submit, and have approved by KDHE, an application to the Redevelopment Fund.

• Bids must be acquired from persons qualified to perform UST removals.

• Allowable costs must be approved by KDHE.

• A deed restriction must be placed on the property prohibiting the installation of UST's for the 10 years following the date of the UST removal. The applicant must provide a notarized copy of the recorded deed restriction.

• The property owner provides 30 day notice prior to UST removal and access to KDHE to perform an environmental assessment of the site during the UST removal.

• All product lines are to be removed. The option of blowing out the lines and capping is not allowed.
Additional information regarding the Redevelopment Fund.

- The tank removal scope of work is between the applicant and the contractor.
- KDHE only reviews and approves the lowest bid. However, the applicant can pick another contractor as long as the contractor had submitted a bid.
- The contractor can be a general contractor as long as at the time of removal a Kansas licensed contractor is present to oversee the tank removal.
- The fund will reimburse for the removal of a canopy and dispenser island(s).
- Restoration of the site is the applicants choice. I.e. concrete, asphalt, and or gravel.
Problems encountered since the beginning of the program

The USTs are removed and then soil contamination is discovered causing the following issues:

- Costs are not pre-approved to complete the soil removal. The contractor has to send in costs for review and approval before removing any soil.
- Some contractors exponentially increase their rates to complete the soil removal and an agreement could not be reached.
- Soil samples were not collected or analyzed prior to UST removal to satisfy landfill requirements. KDHE’s Bureau of Waste Management requires one lab sample for the first 300 cu yds and a sample every additional 500 cu yds. When the excavation exceeds our estimation another delay occurs when additional lab samples are needed.
- The contractor or KDHE personnel do not have time in their schedules to spend several days on an impromptu soil excavation.
- The contractor would have to scramble to find trucking companies to deliver the soils to the landfill and contact companies to provide backfill material for the excavation.
Problems encountered since the beginning of the program

Everything has to line up in a short amount of time. When it doesn't work out, the contamination is left in the ground which may result in an open project for several years.

The property owners want to continue with their construction plans and not be interrupted months later when a contractor could return to complete the soil removal.

In some instances, they build over the top of the former basin.
Why KDHE proposed to make changes to our UST removal procedures.

EPA requested Kansas to close more sites.

The LUST/Investigation Unit is under new management.

The KDHE District Offices were not promoting the excavation of soils during UST removals.
Steps taken to solve the problems

KDHE utilizes our staff to probe the properties prior to UST removal. This has allowed us to compete the following:

- Costs can be pre-approved to complete the excavation of the contaminated soils with the contractor hired for the UST removal.
- Laboratory analytical data has been collected to satisfy landfill requirements and to obtain Bureau of Waste Management Approval prior to field activities.
- Multiple samples are analyzed across the site to eliminate the need for additional samples during the excavation process.
- The contractor and KDHE personnel can schedule the UST removal and soil excavation accordingly.
- Allows KDHE to collect data by the pump islands and coordinate the excavation of this area if needed.
- KDHE now has a target area(s) for the soil removal.
Case Study: Former Gas & Mor Facility

- 1969 - USTs estimated year in service
- August 2000 – Site Assessment completed.
- October 2007 - 3 gasoline USTs and 1 waste oil UST were assigned an abandoned status by KDHE.
- January 2016 - The property owner declared bankruptcy.
Case Study: Former Gas & Mor Facility

- June 2018 - Site obtained by new property owner through property auction.
- February 2019 - The levels of contamination in groundwater met closing requirements but the soils were still contaminated.
- June 2019 – Property owner applied to the Redevelopment Fund.
- August 2019 – Site probed for characterization
Case Study: Former Gas & Mor Facility

Soil samples were collected around the UST basin and outside of the canopy

- SB5 was the most contaminated.
- Refusal was encountered at 3’ bgs near the UST basin and 9’ near the west end of the canopy.
- 1000 cubic yards of contaminated soil is planned for removal around the UST basin and pump islands.
Property owners responsibility when contamination is discovered

The Property owner is required to enter the Kansas Trust Fund.

• The Trust Fund deductible is $3000.00 plus $500.00 per tank. Once the deductible is met KDHE pays for the remedial efforts until the site reaches a closed status or the $1 Million dollar cap is met.

The property owner becomes liable for the contamination discovered, however they are not required to carry 3rd party liability insurance.

The property owner must register the tanks with KDHE.

If the site is already in the Trust Fund, the property can receive a closed status while keeping the original project open. Depends on what is observed during the removal.

The property can also go forward with 2 open projects to complete the remedial activities.
Procedure for Abandoning a UST in place

As a last resort – When UST is to close to existing structure.

Remove all fluids from the UST.

Make an opening in the top of the UST and remove sludge.

Sludge is placed in barrels and analyzed for disposal.

Fill UST with flowable fill or other approved material (sand).

Collect soil samples around the UST to determine if contamination is present.
Cumulative numbers since implementation

Since 2012:

• 104 applications approved (4 withdrew)
• 94 projects completed
• 276 abandoned UST’s removed
• 7 abandoned UST’s filled-in-place
• 37 UST Trust Fund Applications
• 57 Sites closed after UST removal (no soil contamination)
• 10 Sites Pending Action

Over $1.6 Million was reimbursed to property owners in Kansas through this program.
Kansas LUST Program

Federal Grant – Sites with No Responsible Party

- Kansas has an 85% Federal / 15% State match on funds.

- These funds can be used for:
  - Removal of USTs
  - Initial Investigations
  - Excavations
  - Remedial System Installations
  - Risk Based Corrective Action
Kansas LUST Program – Removal of USTs

A record search is completed on old abandoned sites where tanks have been discovered by:

- Phase II
- Construction activities
- Road expansion
- New property owner
- Call from City and/or County Government

Removed 3 USTs. Only 1 fill port was visible. RP search / Sanborn dated the facility in the 1920s.
Kansas LUST Program – Removal of USTs

Once it’s been determined no responsible party exists the project is put out to bid utilizing our Time and Materials contracted Vendors.

These sites are also probed to collect and analyze soil samples prior to the UST removal to determine the estimated size of the excavation and the size of the landfarm that will be leased for 6-12 months.

These sites are not time critical and we try to utilize landfarming to reduce overall costs of the soil excavation.
Landfarm Requirements

The KDHE Bureau of Waste Management (BWM) must approve the landfarm locations based on several criteria. As a general guide landfarms should not be located within:

- 500 feet of a residence, business, domestic or public water supply;
- 200 feet from waters of the state and property lines; and
- 100 feet from a drainage ditch or other physical feature which channels overland flow
Landfarm Requirements

- A soil berm must be built around the contaminated soil brought to the site to eliminate runoff.
- Soil thickness can not exceed 6”.
- Soils must be turned monthly until PID is below 100 ppm throughout the landfarm.
- Once PID is below 100 ppm - Soils are collected across the landfarm and submitted for analysis.
- BWM reviews the data and requests the removal of the berm.
- Landfarm closed by BWM.
Post Excavation

The site will have a limited site assessment conducted to determine if groundwater contamination is present.

A minimum of 5 monitoring wells are installed.

The site is monitored for a minimum of one year.

Upon completion of the year of monitoring the site is evaluated for closure under a risk assessment.