

Coliseum Boulevard Plume Fact Sheet

What is the Coliseum Boulevard Plume (“CBP”)?

- An area where the groundwater contains trichloroethylene (“TCE”). See map on back of this page.
- Many decades ago, ALDOT used TCE (a common solvent) to test asphalt for highway construction.
- Per the manufacturer’s recommendations at that time, used TCE was discharged into the sewer system.
- Some of the used TCE leaked through sewer pipe joints and eventually made its way to the shallow groundwater.
- A clay layer prevents movement of TCE from the shallow groundwater zone to the deeper groundwater aquifer. There is no TCE in the deeper groundwater aquifer.
- TCE has not been discharged by ALDOT to the sewer system for more than 35 years.

Potential for Exposure to TCE from the CBP is very limited because:

- TCE is contained in the shallow groundwater which is about 10 to 50 feet below land surface.
- The Institutional Control Program for the CBP (see below) includes environmental covenants and deed restrictions on property in the CBP that prohibit access and use of the groundwater without notice and approval of ALDOT.
- ALDOT works closely with 811 “Call Before You Dig”, the City of Montgomery Building Permit Department, utility companies, swimming pool installers, and area well drillers for ALDOT to be notified if there is the potential for contact with groundwater in the CBP area.
- There is no TCE in surface water in the CBP that is accessible to the public.
- There is no TCE in the drinking water in the CBP. All drinking water comes from sources outside the CBP.
- There are no industrial groundwater wells in the CBP that contain TCE.
- Under certain conditions, TCE can form vapor in air. ALDOT has performed air and vapor testing, and continually monitors groundwater where TCE vapors could form. Groundwater monitoring and studies show there is no unacceptable exposure to TCE vapors.

What is being done to address the TCE in the Coliseum Boulevard Plume?

- The remedial or cleanup program consists of TCE capture and treatment, routine testing and long-term monitoring of groundwater and surface water, and engineering and institutional controls to prevent exposure to TCE.
- The remedial program was developed in concert with ADEM with oversight by EPA and ADPH. Technologies and methods to cleanup TCE in groundwater were evaluated, and the combination best suited for the CBP was selected and implemented. Technologies used to cleanup TCE are reviewed every 5-years to determine if any new methods should be implemented.

What is the Engineering Control Program for the CBP?

- Engineering controls for the CBP include treatment in a northeast treatment system (Kilby Ditch system) and a Southwest Treatment Area (SWTA).
- Treatment includes collection of water (i.e., hydraulic control or control of groundwater flow) and treatment of TCE using natural processes (i.e., treatment in engineered wetlands).
- Construction of the Kilby Ditch Treatment System was completed in July 2010 and the Southwest Treatment System was completed in October 2012.
- Samples are collected from the discharge of the wetland treatment systems every two weeks in accordance with ADEM approved plans and permits.

Coliseum Boulevard Plume Fact Sheet

What is the Institutional Control Program for the CBP?

- ALDOT has obtained environmental covenants from property owners in the CBP that:
 - Prohibits access, contact or use of groundwater without notice and approval of ALDOT.
 - Provides ALDOT limited access to the property for investigation of the CBP.
 - Releases ALDOT from future claims, except claims related to personal injury
- Each covenant runs with the land in perpetuity.
- Each covenant is filed and indexed at the Probate Office to give notice to all future title or interest holders.
- Each covenant is enforceable by ALDOT and the ADEM.
- ALDOT reviews property sales and transfers to ensure that new owners are aware of the deed restrictions.
- ALDOT subscribes to AL 811 (Call Before You Dig) to manage construction projects in the CBP area.
- ALDOT notifies stakeholders (well drillers, pool installers, utility companies, Montgomery Area Association of Realtors, etc.) of the CBP institutional control program each year.

What is the Long-Term Monitoring Program for the CBP?

- Monitoring points are placed within and surrounding the CBP to routinely monitor the effectiveness of treatment systems, institutional controls, engineering controls, potential for TCE vapor, surface water, and any changes of the TCE in groundwater. These points include:
 - 100 groundwater monitoring wells are monitored annually.
 - 14 boundary wells and 4 vapor intrusion screening wells are monitored semi-annually.
 - 22 surface water effectiveness locations are sampled quarterly.
 - 2 surface water compliance points are sampled bi-weekly.
- Results are summarized and reported to the Alabama Department of Environmental Management (ADEM) in an Annual Report each year.
- Unexpected changes or exceedances of allowable permit limits will be reported to ADEM as outlined in the Long-Term Monitoring Program. Unexpected changes or exceedances will be investigated, and actions may be needed to address the investigation findings.

What is the Institutional Control Program for the CBP?

- ALDOT has obtained environmental covenants from property owners in the CBP that:
 - Prohibits access, contact or use of groundwater without notice and approval of ALDOT.
 - Provides ALDOT limited access to the property for investigation of the CBP.
 - Releases ALDOT from future claims, except claims related to personal injury
- Each covenant runs with the land in perpetuity.
- Each covenant is filed and indexed at the Probate Office to give notice to all future title or interest holders.
- Each covenant is enforceable by ALDOT and the ADEM.
- ALDOT reviews property sales and transfers to ensure that new owners are aware of the deed restrictions.
- ALDOT subscribes to AL 811 (Call Before You Dig) to manage construction projects in the CBP area.
- ALDOT notifies stakeholders (well drillers, pool installers, utility companies, Montgomery Area Association of Realtors, etc.) of the CBP institutional control program each year.

Have the Treatment Systems and Controls been effective?

- Since completion of the treatment systems, the area of groundwater containing TCE has been reduced overall about 20%. The levels (i.e., concentrations) of TCE are decreasing as expected. Groundwater is

Coliseum Boulevard Plume Fact Sheet

collected and treated at the Kilby Ditch System and the SWTA before being discharged off the site within permitted limits.

- Surface water samples collected every two weeks are consistently below allowable limits.

How long will it take to clean up the CBP?

- The exact time to clean up the CBP is not known but current technical analysis shows it will be greater than 30-years.
- The exact time to clean up cannot be accurately determined because many natural factors control the cleanup time such as rainfall amounts, movement of the groundwater, and surface water flow conditions.
- Because the time to clean up cannot be determined exactly, ALDOT has implemented a combined program that includes treatment, engineering controls, institutional controls, and monitoring.
- The treatment is treating the TCE in groundwater, while the institutional and engineering controls prevent exposure to the TCE during this cleanup process.

Monitoring allows ALDOT to measure the status of the CBP and the effectiveness of the engineering and institutional controls.

How do I get more information?

- Call: Program Administrator at (866) 488-1126 or (334) 202-3355
- Mail: Program Administrator at P.O. Box 2052, Birmingham, AL, 35201
- Website: www.coliseumboulevardplume.com