



Environmental Testing Services for the Utility Sector

Electric power utilities are actively addressing the unprecedented pace of regulatory change within the industry. TestAmerica is at the forefront in providing utilities comprehensive laboratory testing for air, water, soil and coal combustion residuals (CCR).

Our expertise includes support of RCRA Subtitle D groundwater monitoring projects, testing of CCR material, NPDES Monitoring, decommissioning and manufactured gas plant (MGP) site investigations. TestAmerica's chemists have the commitment, resources and experience to address the environmental challenges faced by the electric power utility industry.

Subtitle D Groundwater Monitoring

In April 2015, EPA finalized the rule for disposal of CCR from electric utilities, requiring CCR landfills and surface impoundments to be regulated as solid waste landfills. Further, the rule requires coal fired power plants to develop and implement Subtitle D groundwater monitoring programs for 30 years.

TestAmerica has more than 20 years of RCRA Subtitle D testing experience in support of solid waste landfills. We have developed a programmatic approach to groundwater monitoring, addressing many areas that can potentially contribute to false positives in routine groundwater monitoring.

Evaluation of CCR Material

In November 2010, EPA published *Background Information for the Leaching Environmental Assessment Framework (LEAF) Test Methods*. The LEAF methods are a suite of four leaching tests, three of which are batch tests, and one dynamic test. The LEAF test methods take into consideration the factors of pH and liquid/solid ratio, as

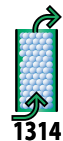
well as the granular, compacted, or monolithic form of the material. LEAF test methods use a tiered and flexible testing approach, which allows for a project-specific design that is more representative of the site conditions.

LEAF methods can be used to estimate the potential release of constituents from waste material, to assess the treatment of the material, and/or evaluate the material for beneficial use. TestAmerica has supported many projects where insitu stabilization was evaluated as a treatment option. TestAmerica's LEAF methods include:



SW-846 Method 1313 - pH Dependence

Liquid-Solid Partitioning as a Function of Extract pH for Constituents in Solid Materials using a Parallel Batch Extraction.



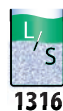
SW-846 Method 1314 - Percolation Column

Liquid-Solid Partitioning as a Function of Liquid-to-Solid Ratio for Constituents in Solid Materials using an Up-flow Percolation Column Procedure.



SW-846 Method 1315 - Mass Transfer Rates

Mass Transfer Rates of Constituents in Monolithic or Compacted Granular Materials using a Semi-dynamic Tank Leaching Procedure.



SW-846 Method 1316 - Batch L/S

Liquid-Solid Partitioning as a Function of Liquid-to-Solid Ratio for Constituents in Solid Materials using a Parallel Batch Extraction Procedure.



Decommissioning of CCR Facilities

Retiring a utility asset is complex. In addition to routine testing, hazardous material associated with the site may need to be evaluated if it is potentially associated with building material and debris.

TestAmerica's national network of laboratories provides comprehensive testing for a variety of complex matrices. This support includes testing for:

- Asbestos Containing Materials (ACM)
- Lead based paint
- PCB Aroclors in debris and ambient air
- Waste characterization

TestAmerica also supports environmental testing for site assessments and for the final divestiture strategy for decommissioned properties.

NPDES Monitoring

In November 2015, EPA finalized the Effluent Limitation Guidelines rule. Under the rule, steam/electric power facilities have NPDES permits for direct discharge to surface water, or for pretreatment and discharge to a POTW.

TestAmerica provides environmental testing and Project Management support to meet the new standards. Customizable deliverables allow for quick and easily identification of exceedances and trends, reducing risk and simplifying the review process.

MGP Site Investigations

TestAmerica provides laboratory testing for the legacy challenges associated with Manufactured Gas Plant (MGP) sites. Our support includes testing of soil, sediment and water, as well as the ambient air testing required during material and debris removal. We assist with the logistical needs of sampling including bottles, coolers and courier service, while also offering affordable quick turnaround to support time sensitive decisions.

Deliverables That Are Easy to Use

TestAmerica's Laboratory Information Management System (LIMS) creates a single report and electronic deliverable (EDD), regardless of analysis location, saving time and reducing costs. Reports are searchable, color coded and tabbed for easy navigation. EDDs are offered in more than 1000 formats, mitigating the risk of errors associated with manual data entry into a database.

TestAmerica Offers 24/7 Access to Data

TotalAccess®, TestAmerica's 24/7, online data delivery solution, allows clients to track all aspects of their environmental data program. Offered as a value added service to all of our clients, TotalAccess® includes the following time and cost saving features:

- Rapid access to data and deliverables for real time decision making
- Customizable EDD creation with comparison of results to preloaded regulatory standards
- Data trending capabilities by sample and analyte
- Consolidation of multiple events into one EDD
- Budget tracking and deliverable storage



**Supporting the Quality You Demand,
the Consistency You Seek and the Value You Expect.**

www.testamericainc.com
866.785.LABS