

Kentucky Division of Environmental Program Support

Annual Report

Fiscal Year 2016

(July 2015 to June 2016)



September 2016

Energy and Environment Cabinet
Department for Environmental Protection

502-564-2150 and 502-564-6120 (Lab)

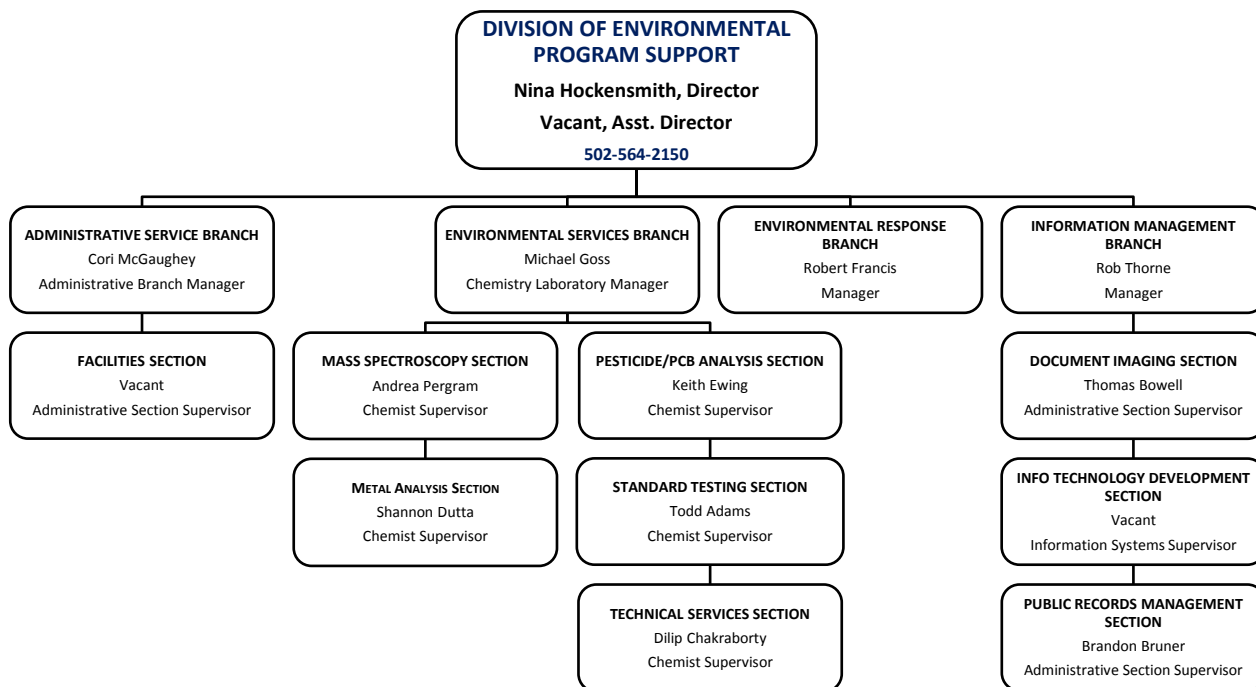
<http://dep.ky.gov/deps/Pages/default.aspx>



DIVISION OF ENVIRONMENTAL PROGRAM SUPPORT

Introduction

The Division of Environmental Program Support (DEPS) was organized in 2009 (Executive Order 2009-538). The department consolidated internal support functions for the department into the new division to create necessary efficiencies and redundancies. These functions included departmental administrative services, environmental laboratory services, and environmental response team (ERT) coordination. In fiscal years 2015 and early 2016, these functions expanded to include information/public records management, application development human resources management, and departmental budgeting.



Division Structure

The Division of Environmental Program Support is composed of four branches – Administrative Support Branch (ASB), Environmental Response Branch (ESB), Information Management Branch (IMB) and Environmental Services Branch (ESB). The Environmental Services Branch is located at 100 Sower Boulevard in Frankfort in the Central Laboratory Complex. The other three branches are located at 300 Sower Boulevard in Frankfort.

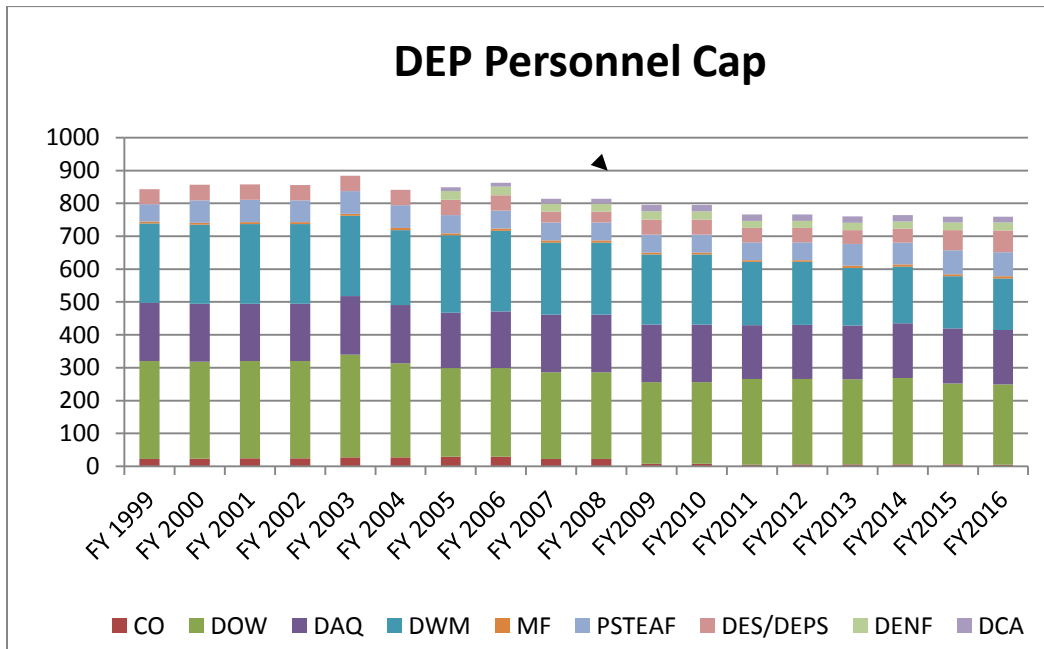
Administrative Support Branch – Activities and Accomplishments

The Administrative Support Branch is responsible for human resource management, budget execution, financial reporting, inventory coordination, facilities management, motor pool, mail processing, and coordination of grant activities, statutory and regulatory reporting functions.

Human Resource Management

Filled Positions

The current number of filled positions within DEP as of the beginning of July 2016 was 717. The FY2016 budgeted personnel cap was 759 positions, although the department averaged 745 filled positions. Historically, DEP's highest number of filled positions was in FY2003-2004 with approximately 821 positions filled and a budgeted personnel cap of 851. Throughout the fiscal year Human Resources (HR) staff worked extremely hard with division managers and supervisors to process actions that allowed DEP to fill critical positions. The department has faced some challenges in maintaining filled positions due to the continued turnover rates related to retirements, transfers, and resignations.



Employee Awards

Due to budget constraints, ACE and ERA Awards continue to be suspended within EEC. On January 15, 2016, the Department held an Employee Awards Program to recognize outstanding employees and employee units (branch, section or program) for Calendar Year 2015.

Energy and Environment Cabinet Scholarships

The scholarship program began in 1991 and scholarships are available to college juniors, seniors, and graduate students in selected academic disciplines, such as engineering, geology, and chemistry. The program is coordinated by the Kentucky Water Resources Research Institute and the scholarship student must agree to work full-time for DEP within 6 months after graduation. To date, DEP has awarded scholarships to 68 students. In May 2015, DEP awarded 2 new students a scholarship. These two students finished their degrees in the spring of 2016; both were sponsored by the Division of Waste Management.

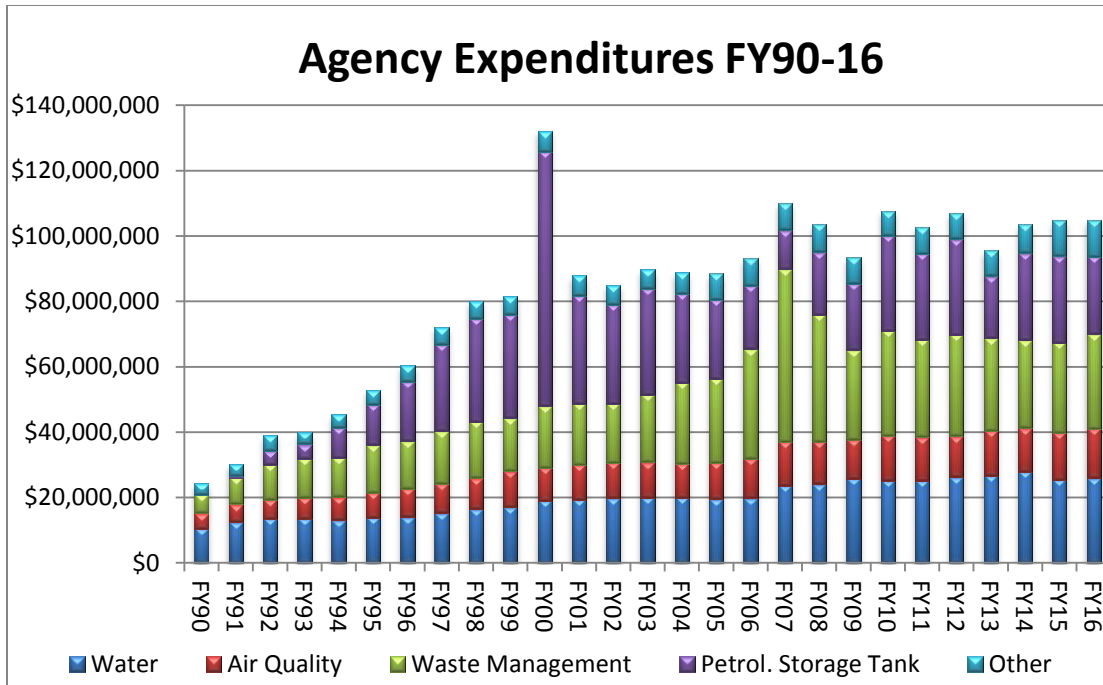
Recruitment/Career Fairs

DEPS is responsible for coordinating attendance for career fair participation. DEPS has scheduled to participate in recruitment activities at the engineering career fair at the University of Kentucky in fiscal year 2016. Participating in events like these will provide an opportunity for the department to attract potential scholarship students as well as future employees.

Financial Management

FY16 Budgets

During fiscal year 2016, all divisions within the Department for Environmental Protection compiled FY2016 operating budgets. The FY16 budgets were monitored throughout the fiscal year and adjustments were made to maximize the use of funds. Some examples include, reallocating rents costs by updating cost allocation data, cash was transferred to capital projects, and equipment was purchased where adequate cash and allotment were available. During FY16, DEPS briefed each division director, as well as the program planning managers within each division using director's packets. The director's packets of budget information are presented each month and used as a means to inform management of programmatic policy decisions available to them through various options and funding sources. The reports provided to each director have been adapted based on the specific needs of each division. Overall, the process is growing each month with very positive feedback from the divisions.



Below are the actual expenditures for DEP in FY16 by division or program area.

	FY16
Commissioner's Office	\$598,438
Water	\$25,891,983
Air Quality	\$15,245,065
Waste Management	\$28,863,432
Env Program Support/Env Services	\$6,895,864
Maxey Flats	\$340,303
PSTEAF	\$23,650,199
Enforcement	\$1,781,142
Compliance Assistance	\$1,550,667
Total Expenditures	\$104,817,092

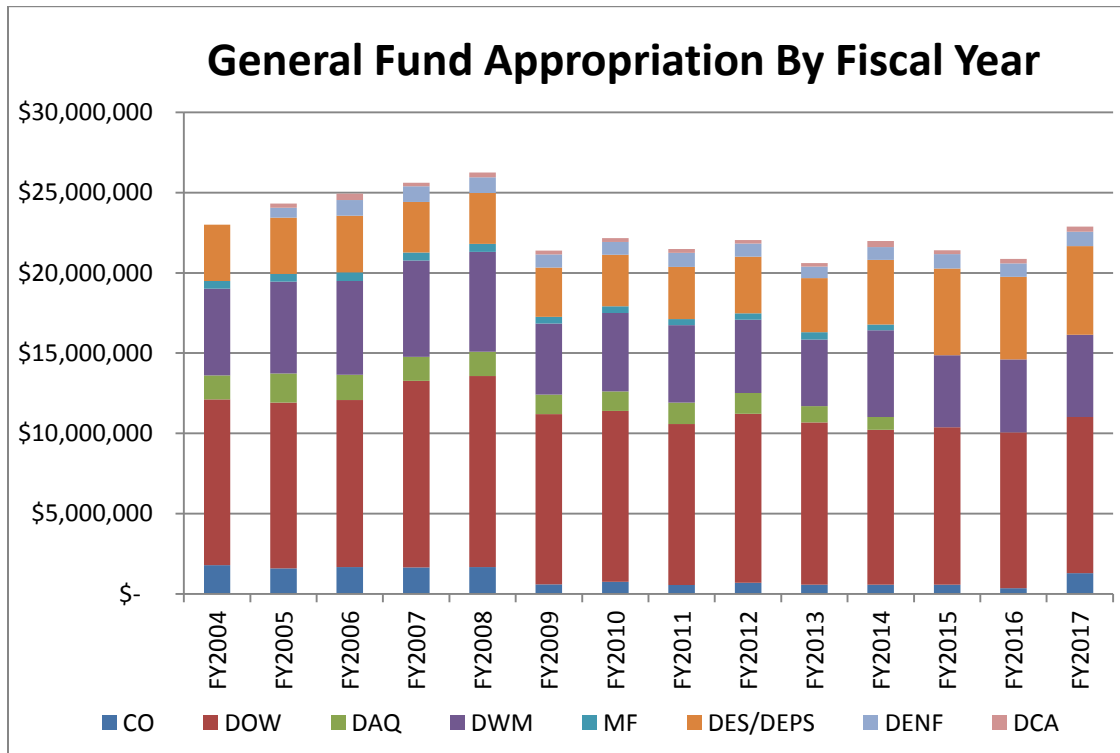
Toward the end of FY16, budget contacts worked with their respective divisions to start the process of compiling and submitting the FY17 operating budget. These budgets remained fairly consistent with FY16 expenditures with exception of a 1% health insurance increase and a 9.82% retirement contribution increase. Other major increases included in the FY16 operating budgets were higher claims expenditures out of DWM/PSTEAF.

FY16 Budget and Managing Budget Reductions

General Funds:

Since January 2008, state agencies have implemented nine rounds of general fund budget cuts, resulting in budget reductions ranging from 20% to 25%. Since FY09, DEP general fund budgets have been reduced by approximately \$5.4M, an approximately 21% general fund reduction from FY08 to

FY16. In FY16, DEP’s general fund budget was \$20,864,500 and included unallotted deferred general fund payroll.



In an effort to offset a portion of the general fund reductions, DEP has been working for the past few years to increase authorization fees for a number of agency programs that historically either had no fee or had not been revised in many years (in some cases greater than 20 years). The agency has been successful in most of these efforts including increasing KPDES and solid waste permit fees.

Other budget reductions:

The enacted 2015-2016 budget included a restricted fund transfer from Petroleum Storage Environmental Assurance Fund to the general fund in the amount of \$8,900,000. Historically, the enacted budget includes transfers to the general fund from PSTEAF.

Buildings and Facilities Management

The Facilities Section of the ASB has maintained a central office motor pool that consists of 67 vehicles and has worked to coordinate and assist with the management of all 266 vehicles owned by the department. The DEP motor pool averages 67 trips and 11 maintenance events per week. In the Fall of 2010, DEP began participation in the “Green Fleets Initiative”. The department continues to work towards our Green Fleets initiative goal.

In fiscal year 2013-2014 DEP added 4 Chevy Volt electric vehicles and their associated charging components to the departmental motor pool. In the last two years the department has logged over 166,000 miles on electric vehicles. We continue to downsize the fleet where applicable and to monitor

vehicle size and usage for efficiency. The department will be installing 2 electric vehicle charging stations at the new building on Sower Boulevard. In 2013, the department received the “*Greenest State Fleet Award*” from the Kentucky Clean Fuels Coalition (KCFC). The award recognizes the extraordinary efforts of the Department to reduce its fuel consumption and improve air quality. DEP was recognized by the Kentucky Clean Fuels Coalition for *Leadership in the “Green Fleets Initiative”* program again in 2016. The department has been recognized consistently since 2011.

The miles per gallon of the entire fleet have increased by 1.06% from 19.79 to 21.02 MPG. The Department greatly increased its public outreach through articles in the Department's blog, the Cabinet's *Land, Air, and Water publication*, and on the Department's webpage in regards to the Green Fleets Initiative. The Department continues to work with the Finance and Administration Cabinet on state-wide fleet improvement efforts, education and outreach. Both organizations will continue coordinating their efforts to increase efficiency.

The Division of Environmental Program (DEPS) provided daily maintenance operations that include addressing up to 20 work orders per day while distributing mail for the Frankfort facilities. The facilities section was also the incident lead in preparing for irregular business operations such as extreme weather events. This section facilitated and compiled operational plans as part of the departmental move in the summer of 2016. The Facilities Section also coordinates and submits the Annual Fixed Assets Inventory Audit for the department.

Safety

The Facilities Section of the ASB continues to coordinate safety guidelines and procedures across the department. During the last year, the section has ensured the successful certifications of 224 employees in the Initial 40 Hour HAZWOPER training and the 8 Hour refresher courses. The section has also held monthly safety meetings, ensured department wide compliance with Frankfort safety and fire codes, planned and executed quarterly safety drills to ensure employees could successfully react to man-made and naturally caused disaster events.

In 2016, DEPS dedicated a position to administering the Department’s CPR Program. The department has implemented an internal CPR program to help lower the cost of having an outside vendor train staff. The coordinator of this program has worked to revamp the CPR class and ensure required staff complies with OSHA CPR certification mandates. During FY16, CPR certified 177 department staff.

Information Management Branch-Activities and Accomplishments

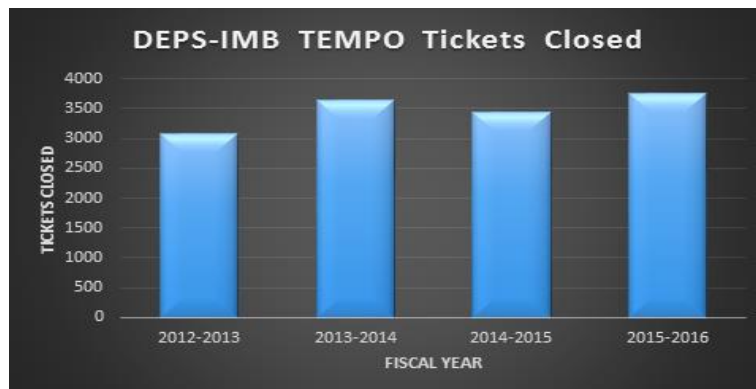
The Information Management Branch (IMB) within the Division of Environmental Program Support consolidates all information technology and dissemination services into one centralized unit. The branch is divided into three sections and houses staff responsible for (1.) application development and support, (2.) scanning and conversion of paper-to-digital files, and (3.) responding to open records requests under the Kentucky Open Records Act.

TEMPO360 Implementation

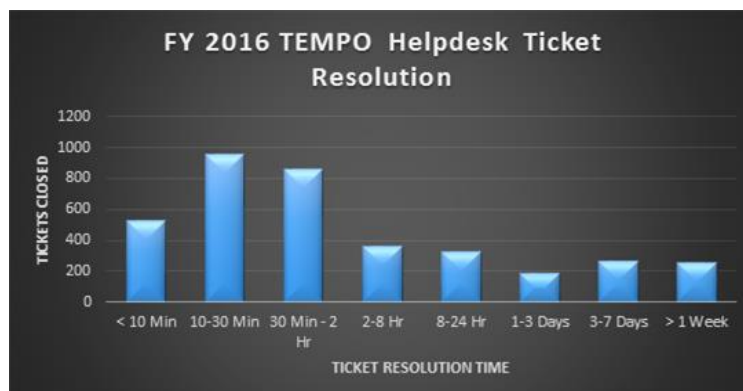
Most of the staff in the Information Management Branch’s Information Technology Development Section (ITDS) spent a large portion of their time in FY16 implementing, improving, and assisting end-users with TEMPO360, and the newest version of the Department’s enterprise-wide environmental regulatory database. TEMPO 360 is a web-based version of the legacy TEMPO database which has been utilized by DEP since 2002. Approximately eight other states are using some form of the TEMPO software. CGI, the vendor for TEMPO360, has worked for several years to develop software that will meet Kentucky’s standards for implementation, and IMB-ITDS deployed TEMPO360 to all DEP users in 2015. IMB-ITDS began implementation of TEMPO360 in February of 2015, and by January of 2016 the entire Department had been trained and implemented in TEMPO360. Though some bugs are still present, this number is a small fraction of what existed prior to initial implementation. IMB-ITDS focused on making the application more efficient for program staff.

TEMPO Support

The implementation of TEMPO360 not only added workload to the IMB-ITDS staff, but also slightly increased the number of helpdesk requests received and processed. Over 3,700 helpdesk requests were processed by IMB staff in FY16.



Even when time-consuming requests for new reports are included, eighty-one percent (81%) of TEMPO Helpdesk Requests tickets were closed in less than 24 hours. The median response time for a helpdesk ticket is 52 minutes. (Please note, calculations exclude tickets that are processed by IMB-ITDS but passed on to other entities for closure.)



TEMPO360 Capital Project

IMB-ITDS was the recipient of a Capital Project for the modernization of our Departmental database. IMB-ITDS completed the implementation of TEMPO360 and closed out the Capital Project in FY16. TEMPO360 is a C# .NET web browser application that was re-platformed from our existing PowerBuilder thick client (Legacy TEMPO). The Department for Environmental Protection made TEMPO our enterprise database for regulatory and environmental processes in 2002 and is fully implemented with interfaces to eMars, ePay, electronic permitting, on-line reporting, and multiple methods of electronic submittals. DEPS estimates the implementation of TEMPO360 will eliminate \$797,282 in operating costs over a 5 year period. Part of this project includes upgrading staff to widescreen dual monitors, which we estimate will expedite reviews by key staff up to 20 to 30 percent.

CROMERR

DEP's formal Cross-Media Electronic Reporting Regulation (CROMERR) application was enhanced and re-written to produce a foundation software for incorporation into new identified projects: ePortal, eForms, a Document-In service and a Document-Out service (as part of a larger effort to support open records request). The NetDMR project has been completed which was the first application to use and support CROMERR. The ePortal and eForms projects, in accordance with Federal EPA guidelines, are required to be CROMERR compliant. During FY16 IMB-ITDS completed the Signature Agreement component, the LexisNexis integration, a security question verification component, and the signature user interface. ITDS is in the process of partnering with the Commonwealth Office of Technology to use the Commonwealth's Single Sign-on to meet some of the CROMERR requirements. DEP has signed a Statement of Work with COT to jointly perform this work. This will allow DEP to be a part of Kentucky OneStop which is utilized by multiple agencies across the Commonwealth.

KWADE

Kentucky Water Assessment Data for Environmental Monitoring (K-WADE) is a system that is used to manage the Kentucky Division of Water monitoring data for lakes, rivers, streams, springs, and wells. This data is used to assess the quality of the Commonwealth's water. The system has a web-based front-end with an Oracle database back-end. IMB-ITDS continues to provide technical support as the K-WADE system is replacing the Ecological Data Application System (EDAS). In FY2016, the report Tool was implemented for K-WADE. The following production level reports have been developed and implemented:

- Field Measurement Details and Sample Results
- Fish Results
- Locales
- Macroinvertebrate Results
- Project Stations
- Sample Results
- Stations

The following four reports are currently in testing and should be implemented by the end of September 2016:

- Station Visits

- Project Visit Activities
- Visit Device Calibration Dates
- Visit Documents

Work has been done to automate processes for the K-WADE system. A new ambient monitoring data upload process is in test and will be available for production before 2017. In addition, an automated process LIMS integration process will be finalized and in production by 2017.

eForms

In order to facilitate the electronic submittal of documents and information to the Department, DEP has created 27 eForms. These eForms allow for direct submission of data and documents to TEMPO with intervention from staff only necessary where requested. Over 12,100 submissions were processed through eForms in FY16.

To meet the demands of programs, IMB added five new eForms in FY16: the Solid Waste Quarterly Waste Quantity Report, the Solid Waste Groundwater and Surface Water Monitoring Sample Data Reporting Form, the Underground Storage Tank Branch Notice of Intent (NOI) Submittal, the DAQ Permit Application Electronic Submittal, and the Municipal Sewer System Submittal.

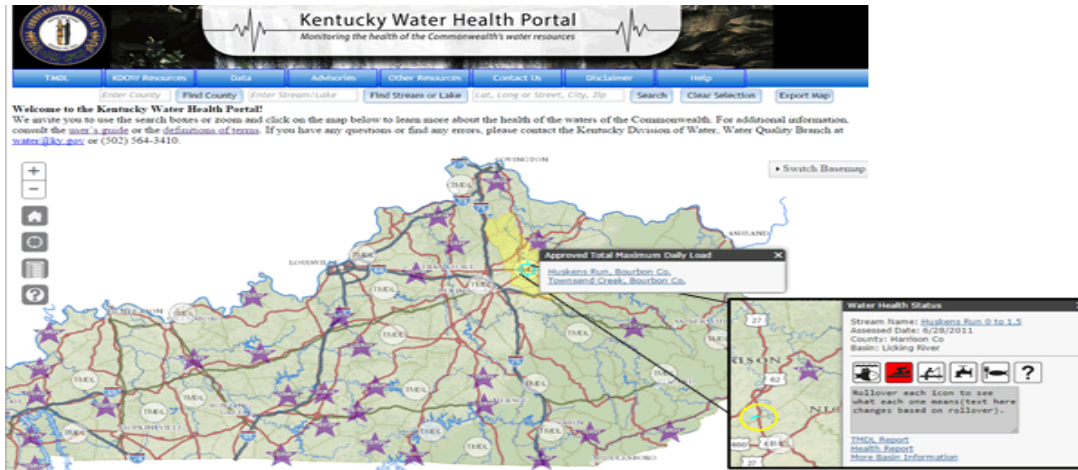
The KYR00 eForm was completely reformatted to make the submittal process completely on-line. In addition, enhancements and/or changes were made to eight other eForms. Work has begun on an eForm for the transportation general permit (KYR50), but it will not go into production until FY17.

PSTEAF Database Conversion

One of the largest accomplishments of the IMB-ITDS in FY16 was the implementation of the Claims and Payments Section of the Underground Storage Tank Branch in TEMPO360. Working in partnership with staff from the UST Branch, IMB-ITDS was able to data convert into TEMPO360 a massive Microsoft Access database that had been implemented in different applications over its 20-year lifespan. The project was more than 5 years in the making, and a full-time contractor was dedicated to the conversion for over 9 months. Several small data clean-up projects are still on-going, but the UST Claims and Payments section is now performing all of their work in TEMPO360.

GIS

In the spring of 2016, DEP's Water Health Portal was selected as the recipient of the 2016 Best of Kentucky Awards from government technology. The Water Health Portal went live to the public in 2015. During fiscal year 2016, DEP has revised the water maps portal located at watermaps.ky.gov. This portal houses all mapping related applications for the Division of Water and has a new responsive (e.g., works on desktop, laptop, tablet and smartphone screens) design.



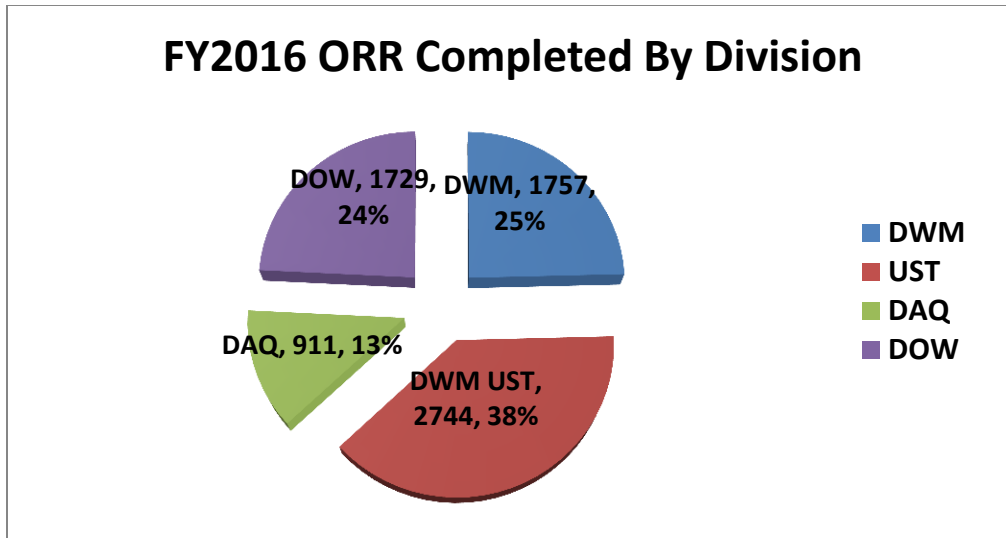
In addition, several new mapping applications were released to the public in FY16; these include the Harmful Algal Bloom Viewer, the Special Use Waters Viewer, the Kentucky River Watershed Story Map, and the Licking River Watershed Story Map. DEP is working with Division of Waste Management to create a new UST map viewer which will identify all active underground storage tanks on a map. This viewer should be made available to the public in the 2nd quarter of FY17.

DEP continues to facilitate the EEC GIS workgroup meetings. The workgroup has had two quarterly meetings and will be instrumental in facilitating the 2016 EEC GIS day presentations in November 2016. Finally, a new inspection collection tool is being piloted using ESRI collector app for the Division of Water Dam Safety program.

Kentucky Open Records Act (KORA)

The Environmental Program Support Division, Information Management Branch, Public Records Management Section staff has completed seven thousand one hundred forty one (7,141) open records requests during the fiscal year 2016. That equates to eight hundred twenty eight (828) or a thirteen percent (13%) increase of completed open records request from the total in the 2015 fiscal year of six thousand three hundred thirteen (6,313). Of those requests for 2016, the Division of Waste Management has completed a total of four thousand five hundred one (4,501) open records request, or sixty three percent (63%) of all requests. The Division of Water has completed one thousand seven hundred twenty nine (1,729) open records request, or twenty four percent (24%) of all requests. The Division for Air Quality has completed nine hundred eleven (911) open records request, or thirteen percent (13%) of all requests. Throughout the year, the staff size was five (5) employees devoted to Open Records. That equates to an average of one thousand four hundred twenty eight (1,428) open records requests completed per employee per fiscal year. That equates to approximately six (6) completed open records requests per employee per working day for the fiscal year.

FY2016 ORR Completed By Division



Digital Imaging

The DEPS IMB Document Imaging Section (DIS) scans nearly all documents that come into the department. The DIS has seven full time employees to handle the high volume on incoming mail and to assist in the management of the file room. The DIS scanned 168,727 documents, which equaled 3,205,915 pages in fiscal year ending June 30, 2016. That is the equivalent of scanning and quality checking almost six stacks of paper as tall as the Capital Plaza Office Tower in Frankfort.



Paper Elimination Project

In an effort to reduce future storage and retrieval costs for the agency, DEPS IMB began working on the Paper Elimination Project (PEP) project to reduce the amount of paper files stored in the file room. The PEP had seven full time and twenty-eight temporary staff devoted to the PEP project at its height. The PEP project began August 2014 with a total of 10,142 linear feet (LF) of historical documents in the file room and was completed May 2016. That equaled 1.92 linear miles of historical documents that needed to be digitized. The completion and accomplishments of the PEP can be attributed to the dedicated and motivated staff of who worked on the PEP project.

Environmental Services Branch – Activities and Accomplishments

The Environmental Services Branch (ESB) provides laboratory-testing services essential for the identification and characterization of environmental pollutants in the Commonwealth. These services are required by KRS 224.10-100(7) "Secure necessary scientific, technical, administrative, and operations services including laboratory services by contract or otherwise"; and (16) "monitor the environment to afford more effective and efficient control practices to identify changes and conditions in ecological systems and to warn of emergency conditions". Additionally, 40 CFR 123.26 - Requirements for Compliance Evaluation Programs states that "State programs shall have inspection and surveillance procedures to determine, independent of information supplied by regulated persons, compliance or non-compliance with applicable program requirements."

It is the mission of the Environmental Services Branch to provide scientific data of known accuracy and precision in a timely manner to programs within the Department for Environmental Protection to enable those programs to make appropriate environmental decisions. The Branch maintains a technically skilled and properly trained staff and a fully equipped environmental laboratory to accomplish its mission.

The ESB has accomplished much over the past several years and expects to continue its reputation for high achievement. The branch attained national accreditation status under the National Environmental Laboratory Accreditation Program (NELAP) in 2007. ESB lab was audited on-site by NELAP assessors in March of 2015 and has responded approvingly to all findings and recommendations that this prestigious accreditation required. The ESB lab was also audited in late April 2015 by the USEPA Region 4 SESD (Drinking Water Laboratory Certification) staff. All responses to EPA's audit findings have been finalized and approved. The lab is currently "Certified" and in good standing with all accrediting entities.

Concurrent with this achievement, the Environmental Services Branch (ESB) continues to maintain a high level of analytical services to the Department. The testing activities of the branch support over 20 individual programs managed by the Division of Water (DOW) and several programs from the Division of Waste Management (DWM). The ESB Lab is also the primary laboratory for the Environmental Response Team (ERT) network. Along with DEP related programs, the ESB lab provides analytical support for select Department of Natural Resources programs as well. Through MOAs the lab does work for both their Cumulative Hydrologic Impact Assessment (CHIA) project and the Abandoned Mine Lands (AML) program. Thus far in 2016 the lab received 234 CHIA and 16 AML samples.

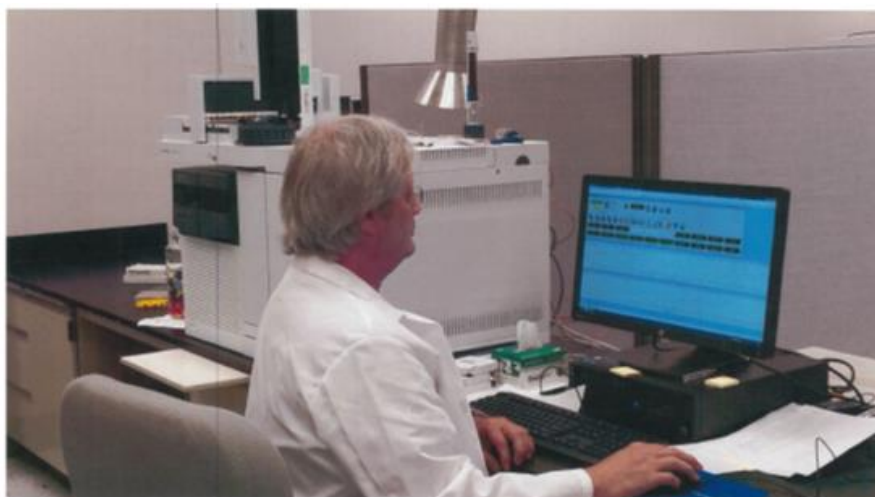
In January of 2014, ESB was needed during an emergency response event involving a major spill of the compound 4-MCHM in West Virginia. This compound was so concentrated and of such a high volume that it was detectable in the Ohio River for hundreds of miles along the Kentucky border for a whole week. The 4-MCHM was not a substance on the list for routine monitoring. After acquiring, researching and developing a method to analyze this compound, ESB with the help of DOW field staff, monitored the Ohio River at various sampling points for 7 continuous days until both the plume and a detectable concentration had passed through Kentucky.

In April of 2016, ESB's expertise and specialized analytical methods were again needed during an emergency response event involving a spill of what turned out to be yellow marking paint in Rockhouse Creek in Martin County. This investigation and media attention even drew the ire of Erin Brockovich. Through the positive identification of titanium in both paint and creek tainted waters DEP was able to put this potential environmental issue to rest.

Replacing equipment with newer, more efficient instruments over the past 5 years has been critical to the lab's ability to maintain productivity without additional staff. Since 2011, the laboratory has been able to acquire funding through various means for the purchase of much needed instrumentation. Examples include: Solid Phase Extractor (2011), Gas Chromatograph –Flame Ionization Detector (2011), Methyl Mercury Analyzer (2013), ICP-MS (2013), Buchi - Accelerated Solvent Extractor (2013), Dionex – High Pressure Liquid Chromatograph (2014), Ion Chromatograph (2014), Discrete Analyzer (2014), Gel

Permeation Chromatograph (2015), Oil & Grease Extractor (2015), Nitrogen Generator (2015), GC MS/MS (2015), and LC MS/MS (2015). An *Atomx* Purge and Trap and *Agilent* Gas Chromatograph Mass Spectrometer were purchased in late 2015 and installed in 2016.

ESB continues to provide testing services for the Department in accordance with the allocated budget monies. In CY2014, the total number of samples analyzed was 4819 and the average turn-around time (TAT) was 27.8 days. In CY2015, the number of samples analyzed (4549) decreased slightly as well as the average TAT 22.1 days. As of August 31st, 2016, the total number of samples received (2684) is lower in comparison to last year's numbers by around 300 samples. This decrease may relate to budgetary constraints and human resource issues in both DEP and DNR Cabinet programs. Moving from Fair Oaks Blvd to the new facility on Sower Blvd. could have also played a part in a decrease of samples collected.



Lee Larimer (Chemist III – Mass Spectrometry Section) reviews Nitrogen Phosphorus Pesticide data on the Agilent 7890B Triple Quad Mass Spectrometer.



Shannon Dutta (Metals Section Supervisor) loads samples onto an Inductively Coupled Plasma Mass Spectrometer (ICPMS) auto sampler.



Gerry Morford (Technical Services Section – Environmental Scientist V) loads an ELISA plate counter for HAB - Microcystin analysis.

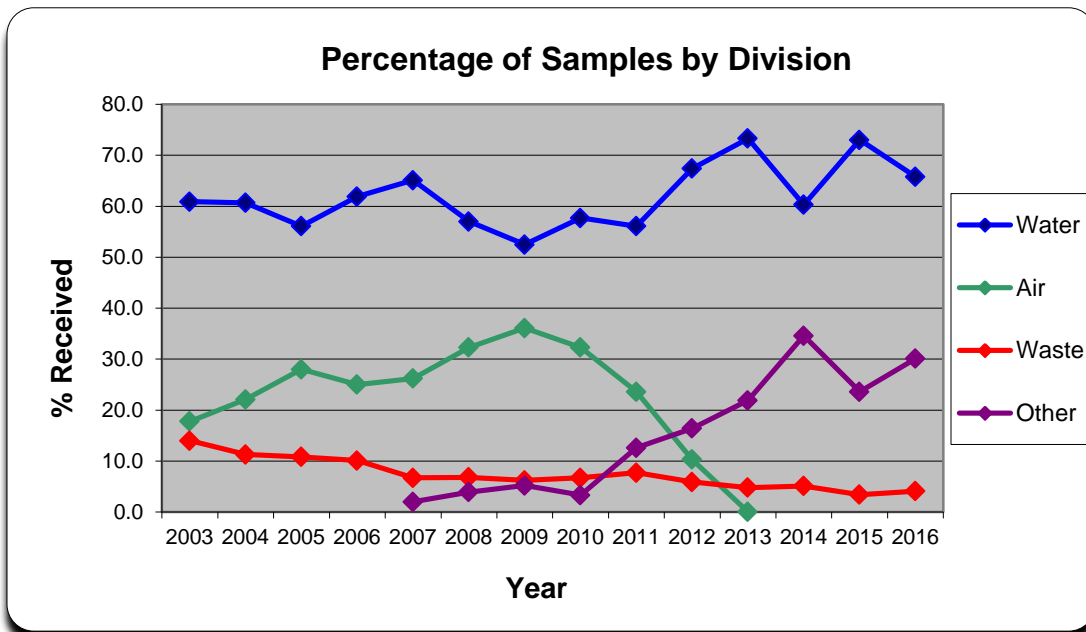
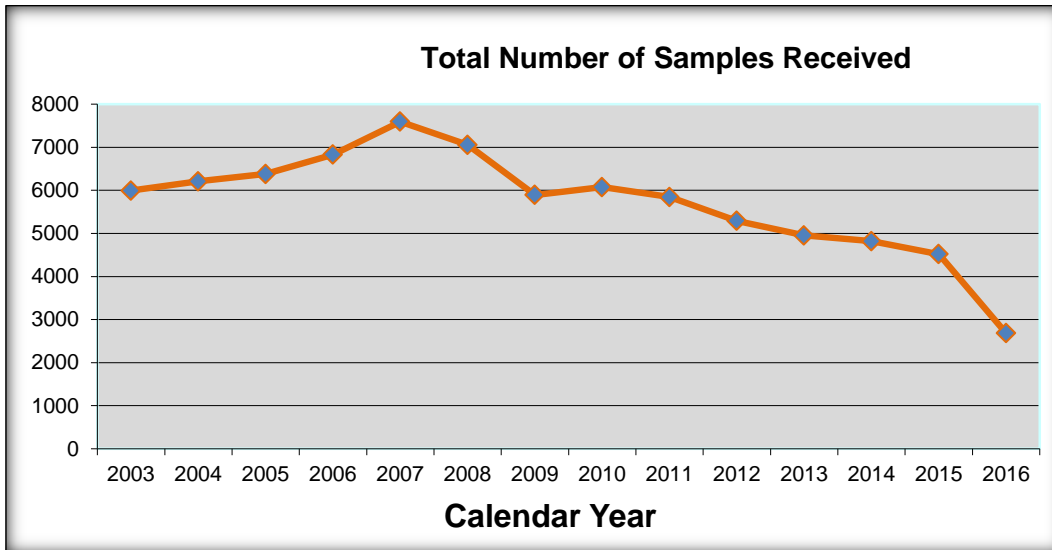
Concurrent with the major consolidation of the department to the 300 Sower location, ESB has undergone some major restructuring of its own in 2016. Underutilized laboratory space was remodeled and a new biology lab was built in open landscape area to make room for the Division of Water, Water Quality Branch, Monitoring Section and the Division for Air Quality, Technical Services Section.

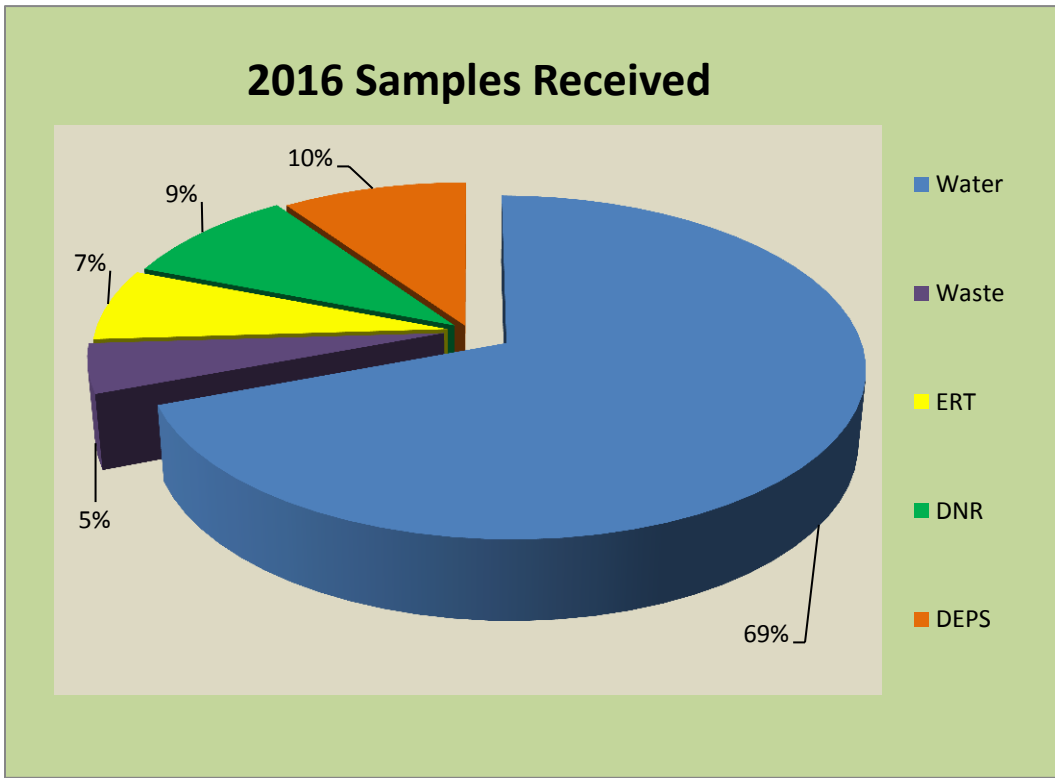
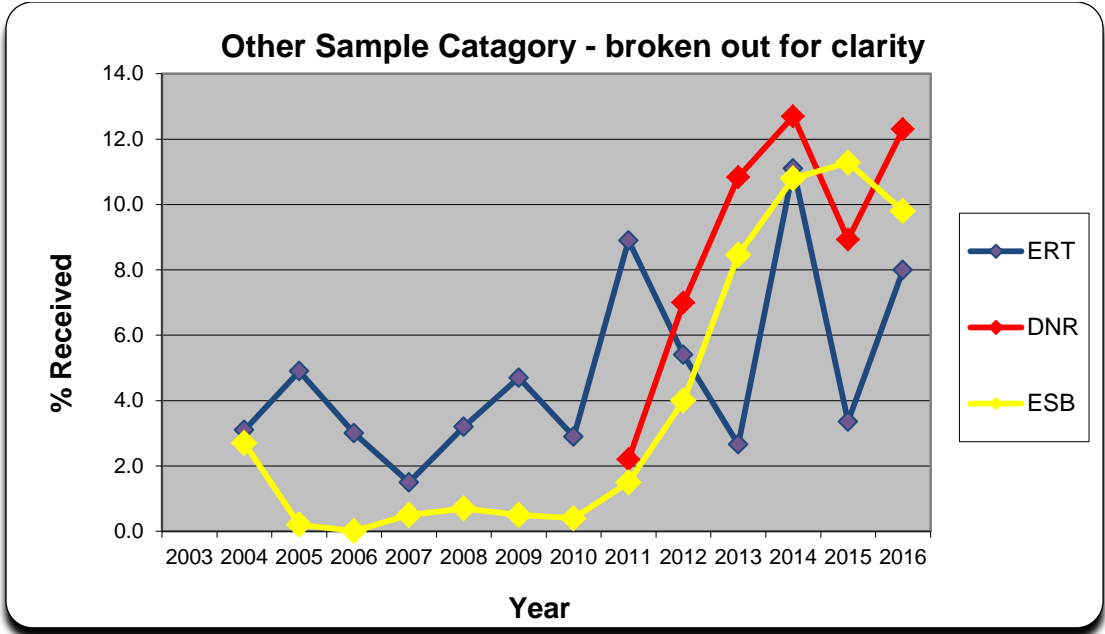
ESB continues to participate in a number of proficiency tests that are a requirement to maintain accreditation under USEPA and NELAP programs. In calendar year 2015, ESB submitted 1493 results to PT providers and received a passing grade of 96.7%. This is an outstanding achievement considering the number of samples that pass through the lab.

Top 10 Programs in 2016

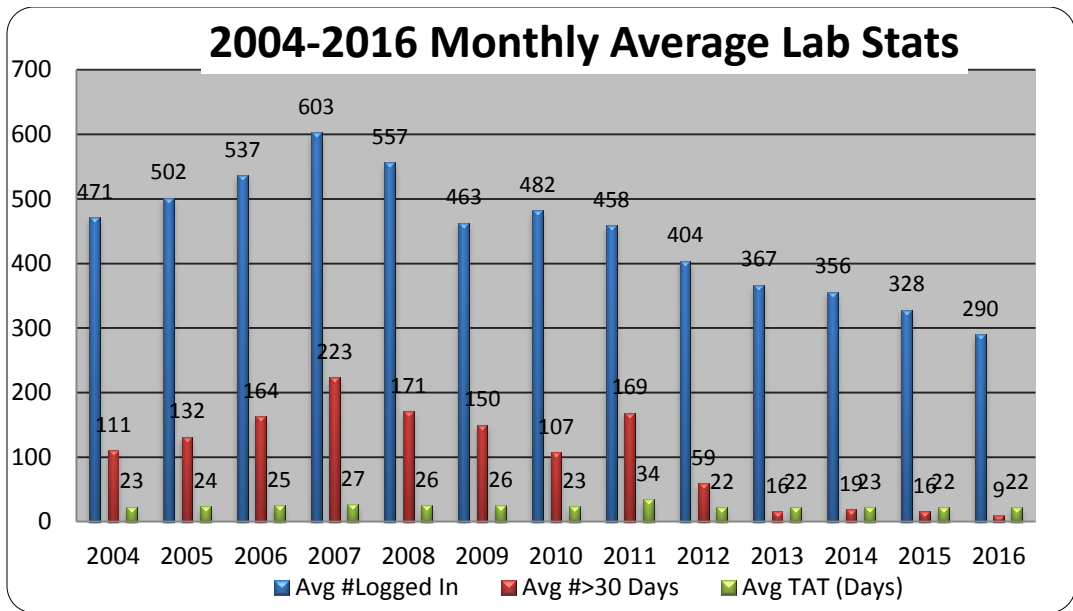
A19 - Ambient	29.21%
A02 - 106 Grant	9.05%
P01 - CHIA	8.72%
E01 - ERT	6.89%
D02 - Internal Lab QC (IDC, MDL)	5.51%
A44 - TMDL	5.14%
A39 - Groundwater Monitoring	4.58%
A29 - Intensive Survey	4.32%
A25 - Reference Reach	3.80%
A18 - Drinking Water	3.61%

Environmental Services Branch – Samples Received from 1/01/03 to 8/31/16
 *2016 total samples are expected to reach and possibly exceed 2015 numbers





Water = 1860, Waste 127, ERT = 185, DNR = 253, ESB = 259
 Total = 2684
 As of August 31, 2016



Environmental Response Branch – Activities and Accomplishments

The Energy and Environment Cabinet (EEC) is mandated to protect human health and to provide for efficient, coordinated, and effective action to minimize damage to the air, land, and waters of the Commonwealth from toxic or hazardous releases of pollutants and contaminants. To achieve this goal, the Department for Environmental Protection formed the Environmental Response Team (ERT) in 1980.

The language in KRS 224.1-400 mandates the Cabinet to have a 24-hour environmental response line and designates the Cabinet as the lead agency for emergency spill responses. In addition, KRS 224.46-580 mandates the Cabinet to respond effectively and timely to emergencies created by releases per 224.1-400.

ERT is a departmental function composed of staff with various environmental discipline backgrounds from DOW, DAQ, DWM, and DEPS with the majority of the staff from the regional offices. The Environmental Response Branch is composed of three full time staff, 30 part-time responders (365 days per year, 24 hours a day), and 2 alternates. ERT is operationally based in the Division of Environmental Program Support in Frankfort.

ERT responsibilities include:

- Maintain a 24-hour emergency report/notification phone line for spills and releases.
- Coordinate and transfer non-emergency and post emergency incidents to appropriate DEP staff.
- Serve as On-Scene Coordinator for releases of toxic and hazardous substances, pollutants, and contaminants that threaten the environment.

- Coordinate with local and state agencies, US EPA, other federal agencies, and neighboring state's agencies related to environmental releases.
- Provide staffing and coordination of EEC efforts for KY Emergency Operations Center (EOC) during activation of EOC due to natural disasters such as flooding and tornadoes.
- Assist in training and planning activities of other local and state agencies.

**EEC/DEP ENVIRONMENTAL RESPONSE TEAM
KY EMERGENCY OPERATIONS PLAN RESPONSIBILITIES
ERT SUPPORT ROLES FOR KY EOC**

During an emergency event in Kentucky, the KY Emergency Operations Plan (coordinated by the KY Division of Emergency Management) is activated, which places requirements on the EEC/DEP and the Environmental Response Team to work within a framework with other state, local, and federal agencies to coordinate efforts to mitigate the emergency.

Beyond the routine response activities by ERT, the KY EOP places specific duties on the EEC to provide the following:

- Provide an on-scene coordinator.
- Provide staffing to State Emergency Operations Center.
- Provide technical assistance and initial evaluation of pollution hazards.
- Assist in early assessment and extent of hazard by dispatching staff to spill/release site when required.
- Approve and direct on-site operations plan for cleanup, treatment, or containment and mitigation of environmental damage.
- Assure proper disposal of resulting waste materials.
- Establish environmental sampling, testing, and analysis programs to measure environmental effects.
- Determine environmentally safe concentrations for water quality and ensure safe public drinking water supplies affected by releases.
- Coordinate with US Environmental Protection Agency, Federal Region IV Regional Response Team, US Army Corps of Engineers, US Coast Guard, and other federal agencies.

KRS 224.1-400 mandates coordination by requiring “consultation with other federal, state, and local agencies, and private organizations.” It must occur at all stages and in all elements of emergency response activities. This coordination is managed by use of the Incident Command System (ICS) as set forth in the KY Emergency Operations Plan and the OSHA safety standards.

The Incident Command System is a standardized system of incident management based upon a chain of command and common terminology for all responding agencies. ICS incorporates the concept of a unified command system, which are employed at large incidents where multiple agencies have jurisdictional concerns.

ERT has daily coordination/communication activity with the KYEM's Emergency Operations Center duty officers who receive the initial calls on the ERT 24-hour phone after normal work hours. The duty officers receive and log the calls and forward the information to the ERT coordinator on call at that time. The duty officers also perform the same services for several other state agencies including the State Fire Marshal, Department of Agriculture, and Department for Health Services (Radiation Control Branch). They are also in communication with several other agencies such as Kentucky State Police, Kentucky Transportation Cabinet, Fish and Wildlife, Kentucky Vehicle Enforcement, Kentucky National Guard, and the regional and local KYEM emergency managers.

COORDINATION/COMMUNICATION

The present notification/communication structure is as follows:

- ERT receives and evaluates incidents
- ERT makes decision on response and severity of incident
- ERT notifies appropriate Branch Managers and Director of appropriate Division if situation warrants
- ERT notifies Commissioner and EEC Secretary if necessary

Some emergencies due to unknown or unresponsive responsible parties may require the Cabinet to act to control and cleanup releases. The procedure for these situations is:

- ERT determines that an emergency exists requiring immediate response to prevent/limit environmental damage due to the situation.
- ERT determines that a responsible party is either unknown or unresponsive.
- ERT notifies the Commissioner and asks for approval to authorize and acquire necessary contractors to deal with the emergency.
- Commissioner gives verbal approval to ERT to proceed under spending guidelines.
- Commissioner notifies EEC Secretary and gains upward approvals for emergency declaration.
- ERT processes documentation for contractor and emergency declaration.

There are three cost recovery procedures.

- For non-enforcement actions, expenditures are calculated and a letter is sent to the responsible party requesting payment. Failure to pay results in formal enforcement action.
- Cost recovery associated with formal enforcement action is included in an overall settlement calculation.
- If the preceding two procedures fail to recover ERT costs, reimbursement from the Federal OPA fund is sought.

ERT Coverage Areas and Responders

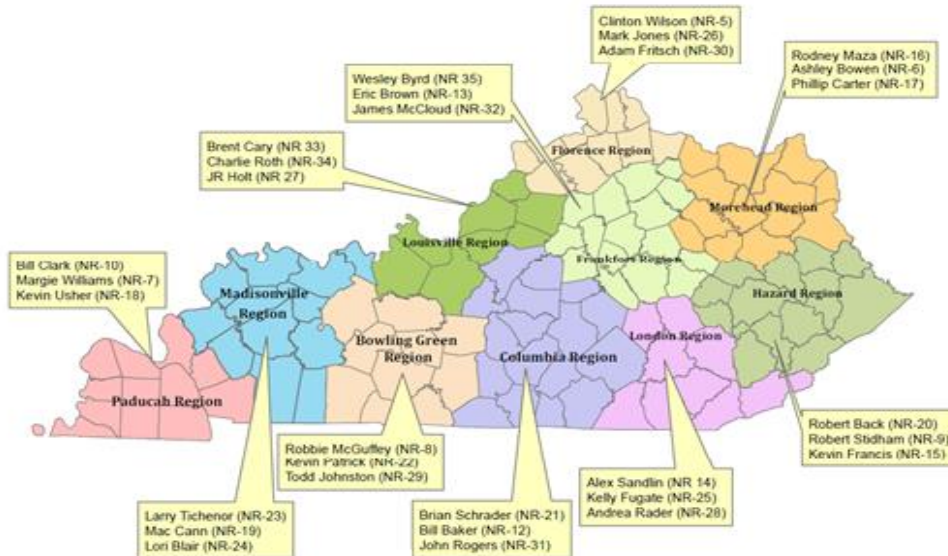
The Environmental Response Team is composed of employees from the Department for Environmental Protection selected from interested applicants based on areas of expertise and work area to assure

statewide coverage and specialized training and experience. ERT members assume the additional responsibilities of ERT responder in addition to their regular work duties.

ERT responders are assigned to eight geographic coverage areas with 3 responders in each region being on call in a three-week rotation (one per week) plus an alternate to fill in as needed.

Kentucky Department for Environmental Protection
 Environmental Response Team
 300 Sower Blvd
 Frankfort, KY 40601
 24 hr Spill Reporting Hotline 1-800-928-2380

Robert Francis, Manager (NR-1)
 David Leo, Response Coordinator (NR-2)
 Kevin Strohmeier, Response Coordinator (NR-3)
 Brittany Wells, Administrative Support



ERT Responders by Area

- Bowling Green Robbie McGuffey (DWM -Bowling Green)
 Todd Johnston (DWM -Bowling Green)
 Kevin Patrick (DWM -Bowling Green)
- Columbia John Rogers (DWM -Columbia)
 Bill Baker (DOW -Bowling Green)
 Brian Schrader (DWM -Columbia)
- Frankfort: Eric Brown (DWM -Frankfort)
 Wes Byrd (DOW -Frankfort)
 James McCloud (DOW -London)
- Hazard: Robert Back (DOW -Hazard)
 Robert Stidham (DWM – Hazard)
 Kevin Francis (DWM – Hazard)
- Florence: Clinton Wilson (DWW -Florence)
 Mark Jones (DOW -Florence)
 Adam Fritch (DWM -Florence)
- Louisville: JR Holt (DWM -Louisville)

Madisonville: Charlie Roth (DOW -Louisville)
Brent Cary (DWM –Louisville)
Lori Blair (DAQ-Owensboro)
Larry Tichenor (DWM -Madisonville)
Mac Cann (DAQ-Owensboro)

Morehead: Rodney Maze (DWM -Morehead)
Philip Carter (DWM -Morehead)
Ashley Markwell (DOW-Ashland)
James Bevins (DOW – Morehead) - Alternate

London: Kelly Fugate (DOW -Hazard)
Alex Sandlin (DWM –London)
Andrea Rader (DWM -London)

Paducah: Kevin Usher (DAQ -Paducah)
Bill Clark (DWM -Paducah)
Margie Williams (DWM -Paducah)



Photo's: ERT conducting training for local Fire Department

ENVIRONMENTAL INCIDENT NOTIFICATIONS

All incidents and notifications received through the ERT section are evaluated and responded to according to the established DEP business rules as follows:

- **Emergency** - on site response within 2 hours of notification
- **High Priority** - DEP staff will make site visit for follow-up within 2 working days of notification
- **Routine**- DEP staff will make site visit or contact notifier within 5 working days of notification



- Photo on left- ERT responds to a train derailment that resulted in fuel releasing to the KY River. (Breathitt Co)
- Photo on right- ERT responds to a barge collision on the Mississippi River. (Hickman Co.)

Several major incidents with severe or potentially catastrophic impacts to human health or the environment occurred in the last two fiscal years. A summary of events follows.

DATE	INCIDENT	COUNTY	IMPACTS
12/4/2016	A leaking product line caused a release of several hundred gallons of gasoline. Contaminated ground water entered the basement level of an adjoining business causing an issue with petroleum vapors.	Carter	Water, Soil & Air
01/26/2016	A train struck a landslide, derailing 2 locomotives and 11 empty coal cars. Unknown quantity of diesel fuel spilled, later estimated at 5000 gallons+. It is seeping into the North Fork Kentucky River. Jackson Water intake is ~ 21 miles downstream.	Breathitt	Water & Soil
01/30/2016	Fire at Bluegrass Stockyards. The fire jumped Lisle Industrial Ave. and burned several businesses nearby, including a salvage/impound yard with an estimated 50 vehicles. The fire caused a large plume that was seen for several miles and caused a concern for nearby citizens.	Fayette	Air & Soil

02/04/2016	A leaking product line caused a release of several hundred gallons of gasoline to the subsurface. Petroleum vapors migrated through utility trenches and entered the indoor Air of the facility.	Laurel	Water, Soil & Air
02/16/2016	50,000 gallons of coal slurry spilled and entered an unnamed tributary to Williams Creek. It is contained ~ 5000 feet below the source and 3 stream miles from the Green River.	Ohio	Water & Soil