# Information on Potential Contaminant Source (PCS) Data Sets

## AST Incidents

This data set represents sites where there has been a discharge of petroleum to the soil and/or groundwater, from a source other than an Underground Storage Tank (UST) system, e.g., Aboveground Storage Tank (AST) system, spills, dumping, etc. The initial information regarding these releases is usually obtained from responsible parties or concerned citizens, who report a release to the Department of Environmental Quality. After an incident is reported, regional office staff investigate the reported incident and enter the results of their investigation into a statewide database. All included records have an incident number and have not been closed out.

The data set was downloaded from the *NC Department of Environmental Quality Online GIS* website at: http://data-ncdenr.opendata.arcgis.com/datasets/ast-incidents. It was dated June 13, 2019. For additional information about this data, contact the Division of Waste Management, Underground Storage Tank Section staff by phone at 919-707-8171 or visit their website at: https://deq.nc.gov/about/divisions/waste-management/ust/ast-program.

## CERCLA-Fed. Remediation

This data set was provided by the Federal Remediation Branch (FRB), which is part of the Superfund Section within the N.C. Division of Waste Management. It represents sites where the FRB is working with the US EPA, and in some cases the Department of Defense, to investigate, assess, remediate, or monitor hazardous waste contamination. These sites are regulated under the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA), which established authority for the government to respond to the release/threat of release of hazardous waste, including cleanup and enforcement actions. Some of these sites, which meet specific criteria set out in the US EPA's Hazard Ranking System (HRS), are included on the National Priorities List (NPL). The NPL identifies sites that appear to warrant cleanup measures. The NPL sites are eligible for remedial action financed by a federal trust fund with a state cost share or by potential responsible parties (PRP).

The data set was downloaded from the *NC Department of Environmental Quality Online GIS* website at: http://data-ncdenr.opendata.arcgis.com/datasets/federal-remediation-branch. It was dated May 23, 2019. For additional information about this data, contact the Division of Waste Management, Federal Remediation Branch by phone at 919-707-8213 or visit their website at: https://deq.nc.gov/about/divisions/waste-management/superfund-section/federal-remediation-branch.

## Dry-Cleaning Sites – Contaminated

This data set contains an inventory of reported incidents from sites contaminated with dry-cleaning solvents. Substances released into the environment include solvents used in the dry-cleaning process.

The initial information regarding these releases is usually obtained from concerned citizens or responsible parties, who report a release to the Department of Environmental Quality. After an incident is reported, regional office staff investigate the reported incident and enter the results of their investigation into a statewide database.

The data set was downloaded from the *NC Department of Environmental Quality Online GIS* website at: http://data-ncdenr.opendata.arcgis.com/datasets/dry-cleaning-sites-contaminated-1. It was dated May 23, 2019. For additional information contact the Division of Waste Management, Dry-Cleaning Solvent Cleanup Act Program staff by phone at 919-707-8365 or visit their website at: https://deq.nc.gov/about/divisions/waste-management/dry-cleaning-solvent-cleanup-act-program.

## Hazardous Waste Sites

This data set represents the location of sites within North Carolina that are regulated by the hazardous waste portions of the Resource Conservation and Recovery Act (RCRA). This includes large quantity generators, small quantity generators, transporters of hazardous waste, permitted treatment, storage or disposal (TSD) facilities and TSD facilities that are under an Order or a Consent Agreement. (Note: facilities that are conditionally exempt small quantity generators may also be included if they are also a transporter or TSD facility.) The data is extracted from the EPA RCRAInfo database.

The data set was downloaded from the *NC Department of Environmental Quality Online GIS* website at: http://data-ncdenr.opendata.arcgis.com/datasets/hazardous-waste-sites. It was dated March 19, 2019. For additional information about this data, contact the Division of Waste Management, Hazardous Waste Section staff by phone at 919-707-8202 or visit their website at: https://deq.nc.gov/about/divisions/waste-management/hw.

## Inactive Hazardous Sites

This data set represents hazardous substance spill and disposal sites and includes active and inactive facilities and a variety of property types. Some of the sites are regulated under the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) and are included because they do not fall under the responsibility of other environmental programs. The term “inactive” refers to the fact that cleanup was inactive at large numbers of sites at the time of program enactment. This data set includes closed remediation sites that have land use restrictions recorded as part of the remedy.

The data set was downloaded from the *NC Department of Environmental Quality Online GIS* website at: http://data-ncdenr.opendata.arcgis.com/datasets/inactive-hazardous-sites-1?geometry=-90.11%2C33.656%2C-69.379%2C36.796. It was dated November 26, 2019. For additional information about this data, contact the Division of Waste Management, Inactive Hazardous Sites Branch by phone at 919-707-8327 or visit their website at: https://deq.nc.gov/about/divisions/waste-management/superfund-section/inactive-hazardous-sites-program.

## Non-Discharge Permits

The non-discharge database identifies domestic, industrial, and municipal facilities that are permitted to apply treated wastewater effluent, reclaimed water, and residuals to the land surface.

Data was obtained from the Division of Water Resources (DWR), Water Quality Permitting Section, Non-Discharge Branch in April of 2019. For additional information about this data, contact the program staff by phone at 919-707-3654 or visit their website at: http://deq.nc.gov/about/divisions/water-resources/water-resources-permits/wastewater-branch/non-discharge-permitting.

## NPDES Stormwater Permits

This data set represents the location of facilities with active or expired National Pollutant Discharge Elimination System (NPDES) Stormwater Permits and facilities with No Exposure Certifications. Both individual and general permits are included.

Permitted facilities discharge their stormwater in accordance with the requirements of Section 402 of the Federal Water Pollution Control Act. The goal of the NPDES stormwater permitting program is to prevent stormwater runoff from washing harmful pollutants into surface waters.

Data was obtained from the Division of Energy, Mineral, and Land Resources, Stormwater Permitting Program in February of 2019. For additional information about this data, contact the program staff by phone at 919-707-3639 or visit their website at: https://deq.nc.gov/about/divisions/energy-mineral-land-resources/stormwater.

## NPDES Wastewater General Permits

This data set represents the location of active wastewater treatment facilities that are permitted under the National Pollutant Discharge Elimination System (NPDES) Permit Program. These facilities operate point source discharges to surface waters in accordance with the requirements of Section 402 of the Federal Water Pollution Control Act. Point sources are discrete conveyances such as pipes or man-made ditches. The NPDES Permit Program controls water pollution by regulating point sources that discharge pollutants into public waters. The listed facilities are covered by a general NPDES permit, which is written to cover multiple dischargers with similar operations and types of discharges.

Data was obtained from the DWR, Water Quality Permitting Section, NPDES Wastewater Permitting Program in February of 2019. For additional information about this data, contact the program staff by phone at 919-707-3601 or visit their website at: https://deq.nc.gov/about/divisions/water-resources/water-resources-permits/wastewater-branch/npdes-wastewater-permits.

## NPDES Wastewater Individual Permits

This data set represents the location of active wastewater treatment facilities that are permitted under the National Pollutant Discharge Elimination System (NPDES) Permit Program. These facilities operate point source discharges to surface waters in accordance with the requirements of Section 402 of the Federal Water Pollution Control Act. Point sources are discrete conveyances such as pipes or man-made ditches. The NPDES Permit Program controls water pollution by regulating point sources that discharge pollutants into public waters. Each listed facility is covered by an individual NPDES permit that is written to reflect the site-specific conditions of the facility based on submitted information. The individual NPDES permit is unique to the facility.

Data was obtained from the DWR, Water Quality Permitting Section, NPDES Wastewater Permitting Program in February of 2019. For additional information about this data, contact the program staff by phone at 919-707-3601 or visit their website at: https://deq.nc.gov/about/divisions/water-resources/water-resources-permits/wastewater-branch/npdes-wastewater-permits.

## PCB Sites

This data set identifies generators, transporters, commercial storers and/or brokers and disposers of Polychlorinated Biphenyls (PCBs). Concern over the toxicity and environmental persistence of PCBs resulted in the Toxic Substances Control Act (TSCA). This act prohibits the manufacture, processing, and distribution in commerce of PCBs. Thus, TSCA legislates true "cradle to grave" (from manufacture to disposal) management of PCBs in the United States. PCBs are mixtures of synthetic organic chemicals with the same basic chemical structure and similar physical properties ranging from oily liquids to waxy solids. Due to their non-flammability, chemical stability, high boiling point and electrical insulating properties, PCBs were used in hundreds of industrial and commercial applications. These included electrical applications, heat transfer materials, hydraulic equipment, plastics, rubber, and many others.

The data set was obtained from the US EPA, Office of Pollution Prevention and Toxics in February of 2019. For additional information about this data, contact the PCB staff at 404-562-8512 or visit their website at: https://www.epa.gov/pcbs/learn-about-polychlorinated-biphenyls-pcbs.

Each record that contained a physical address that could be address matched was included in the data set. Public Water Supply Section staff performed the address matching.

## Permitted Animal Facilities

This data set represents permitted animal facilities consisting of swine, cattle, poultry and horse farms that are required to have Certified Animal Waste Management Plans (CAWMP). Animal facilities are defined by General Statute 143-215.10B as feedlots involving 250 or more swine, 100 or more confined cattle, 75 or more horses, 1,000 or more sheep, or 30,000 or more confined poultry with a liquid waste management system.

The Division of Water Resources' rules mandated that all animal facilities in operation prior to January 1, 1994 register with the division. Since January 1, 1994, any new animal facilities were required to obtain a CAWMP before starting their animal operation. In addition, any animal facilities in operation prior to January 1, 1994 were required to obtain a CAWMP by December 31, 1997. As of January 1, 1997, all new animal facilities were required to obtain a permit from DWR prior to construction and be certified prior to startup, and all existing animal facilities were to be permitted by DWR over the next 5 years.

The data set was obtained from the DWR, Water Quality Regional Operations, Animal Feeding Operations Branch in February of 2019. For additional information about this data, contact the Animal Feeding Operations staff by phone at 919-707-9129 or visit their website at: https://deq.nc.gov/about/divisions/water-resources/water-quality-regional-operations/afo.

## Pre-regulatory Landfill Sites

This data set contains the locations of non-permitted landfills that closed prior to January 1, 1983, when waste disposal permitting regulations commenced. These sites are not currently in operation.

The data set was downloaded from the *NC Department of Environmental Quality Online GIS* website at: http://data-ncdenr.opendata.arcgis.com/datasets/pre-regulatory-landfill-sites-1. It was dated November 14, 2018. For additional information about this data, contact the Division of Waste Management, Pre-regulatory Landfill Program staff by phone at 919-707-8327 or visit their website at: https://deq.nc.gov/about/divisions/waste-management/superfund-section/pre-regulatory-landfill-program.

## Septage Disposal Sites

This data set represents all active and permitted Septage Land Application Site (SLAS) and Septage Detention and Treatment Facility (SDTF) sites in North Carolina. The Septage Management Program assures that septage (a fluid mixture of untreated and partially treated sewage solids, liquids, and sludge of human or domestic origin that is removed from a septic tank system) is managed in a responsible, safe and consistent manner across the state.

The data set was obtained from the Division of Waste Management, Solid Waste Section in May of 2019. For additional information about this data, contact the Septage Management Program staff by phone at 919-707-8283 or visit their website at: https://deq.nc.gov/about/divisions/waste-management/waste-management-rules/septage.

## Soil Remediation Sites

This data set represents sites that have received a permit from the NC Underground Storage Tank Section, under the Petroleum Contaminated Soil Remediation Permit Program. These sites are used to bioremediate soil that has been contaminated by leaking petroleum storage tanks. Bioremediation is a treatment process that uses naturally occurring microorganisms (yeast, fungi, or bacteria) to break

down, or degrade, hazardous substances. These microorganisms break down organic compounds, such as petroleum products that are hazardous to humans, into harmless products (mainly carbon dioxide and water). Sites that have been "closed out" were excluded.

The data set was obtained from the Division of Waste Management, Underground Storage Tank Section in February of 2019. For additional information about this data, contact the Underground Storage Tank Section staff by phone at 919-707-8171 or visit their website at: https://deq.nc.gov/about/divisions/waste-management/ust.

## Solid Waste Facilities

This data set represents all the permitted Municipal Solid Waste (MSW), Construction and Demolition (CDLF), Land-Clearing and Inert Debris (LCID) and Demolition (Older facilities) landfill facilities. Coal Ash landfills and Tire landfills are also included. The aforementioned facility types undergo inspections and groundwater monitoring as part of facility management. This data set also includes active solid waste facility types that are not designated as landfills, such as compost, household hazardous waste, incinerators, medical waste, tire processing and transfer stations.

The data set was obtained from the Division of Waste Management, Solid Waste Section in May of 2019. For additional information about this data, contact the Solid Waste Section staff by phone at 919-707-8247 or visit their website at: https://deq.nc.gov/about/divisions/waste-management/solid-waste-section.

## State Stormwater Permits

This data set contains the locations of facilities with active and expired State Stormwater Post-Construction Permits. The Post-Construction Permit Program requires subject new developments to install and maintain permanent stormwater management measures that are designed to protect surface waters from the impacts of the development's stormwater runoff after the construction process is complete.

Data was obtained from the Division of Energy, Mineral, and Land Resources, Stormwater Permitting Program in March of 2019. For additional information about this data, contact the program staff by phone at 919-707-3639 or visit their website at: https://deq.nc.gov/about/divisions/energy-mineral-land-resources/stormwater.

## Tier II Sites

This data set contains an inventory of facilities that store hazardous materials and are subject to the reporting requirements of the Emergency Planning and Community Right to Know Act (EPCRA). EPCRA was authorized by Title III of the Superfund Amendments and Reauthorization Act (SARA). Tier II forms require basic facility identification information, employee contact information for both emergencies and non-emergencies, and information about chemicals stored or used at the facility including:

- The chemical name or the common name as indicated on the Safety Data Sheet (SDS);
- an estimate of the maximum amount of the chemical present at any time during the preceding calendar year and the average daily amount;
- a brief description of the manner of storage of the chemical;
- the location of the chemical at the facility; and
- an indication of whether the owner of the facility elects to withhold location information from disclosure to the public.

Data, from the 2018 reporting year, was obtained from the Department of Public Safety, Division of Emergency Management. For additional information about this data contact the Division of Emergency Management staff at 919-436-2746 or visit their website at: http://www.ncdps.gov/Emergency-Management/Hazardous-Materials/EPCRA-Tier-2.

## UIC Permits

The Underground Injection Control (UIC) Program protects groundwater quality by preventing illegal waste disposal and by regulating the construction and operation of wells used for injecting approved substances, aquifer recharge, and other activities. The most common types of injection wells in North Carolina are used for:

- Aquifer Storage and Recovery (ASR)
- Geothermal Heating and Cooling
- In-Situ Groundwater Remediation
- Stormwater Infiltration - effective May 1, 2012

The data set was obtained from the DWR, Groundwater Protection Program in March of 2019. For additional information about this data, contact the UIC Program staff by phone at 919-807-6496 or visit their website at: https://deq.nc.gov/about/divisions/water-resources/water-resources-permits/wastewater-branch/ground-water-protection/injection-wells.

## UST Incidents

This data set represents sites where there has been a release of petroleum to the soil and/or groundwater, from an Underground Storage Tank (UST) system. The initial information regarding these releases is usually obtained from responsible parties or concerned citizens, who report a release to the Department of Environmental Quality. After an incident is reported, regional office staff investigate the reported incident and enter the results of their investigation into a statewide database. All included records have an incident number and have not been closed out.

The data set was downloaded from the *NC Department of Environmental Quality Online GIS* website at: http://data-ncdenr.opendata.arcgis.com/datasets/ust-incidents?geometry=-166.201%2C-29.535%2C168.311%2C29.229. It was dated June 13, 2019. For additional information about this data, contact the Division of Waste Management, Underground Storage Tank Section staff by phone at 919-707-8171 or visit their website at: https://deq.nc.gov/about/divisions/waste-management/ust.

## UST Permits

An underground storage tank system (UST) is a tank and any underground piping connected to the tank that has at least 10 percent of its combined volume underground. The federal UST regulations apply only to underground tanks and piping storing either petroleum or certain hazardous substances. These facilities are regulated under Subtitle I of RCRA and must be registered with the state and receive an operating permit annually. Until the mid-1980s, most USTs were made of bare steel, which is likely to corrode over time and allow UST contents to leak into the environment. Faulty installation or inadequate operating and maintenance procedures also can cause USTs to release their contents into the environment. The greatest potential hazard from a leaking UST is that the petroleum or other hazardous substance can seep into the soil and contaminate groundwater. A leaking UST can also present other health and environmental risks, including the potential for fire and explosion. The facilities included in this data set have active Underground Storage Tank systems registered with the UST Section.

Data was obtained from the Division of Waste Management, Underground Storage Tank Section in May of 2019. For additional information about this data, contact the Underground Storage Tank Section staff by phone at 919-707-8171 or visit their website at: https://deq.nc.gov/about/divisions/waste-management/ust.