ENVIRONMENTAL CONDITION OF PROPERTY REPORT

30 MEGAWATT SOLAR PHOTOVOLTAIC ARRAY

FORT BENNING, GEORGIA

Prepared for:

Georgia Power Company

and

U.S. Army Garrison, Fort Benning
Directorate of Public Works
Environmental Management Division

Prepared by:

Tetra Tech, Inc.
Aiken, South Carolina
September 2014

This page intentionally left blank.

ENVIRONMENTAL CONDITION OF PROPERTY REPORT

30 MEGAWATT SOLAR PHOTOVOLTAIC ARRAY

FORT BENNING, GEORGIA

PREPARED BY: _____ DATE: September 19, 2014

KRISTI HAGOOD
Environmental Scientist
Tetra Tech, Inc.

PREPARED BY: _____ DATE: September 19, 2014

DERRICK HALTIWANGER
Environmental Scientist
Tetra Tech, Inc.

REVIEWED BY: _____ DATE: 24 October 2014

CRAIG TAYLOR
Director
Fort Benning Directorate of Public Works

APPROVED BY: _____ DATE: 29 October 2014

MICHAIL S. HUERTER
Colonel, Infantry
Fort Benning Garrison Commander

This page intentionally left blank.

EXECUTIVE SUMMARY

This Environmental Condition of Property (ECP) report has been prepared for a proposed utility easement of Army land on Fort Benning for the purpose of generating renewable energy through a 30 megawatt photovoltaic array facility that will be designed, built, owned and operated by the Georgia Power Company. The utility easement includes a 223.43-acre parcel referred to as the Dove Field Site (Subject Property, hereafter). Only the Subject Property that is proposed for easement is being evaluated in this ECP report.

U.S. Department of Defense (DoD) policy and Army Regulation 200-1, *Environmental Protection and Enhancement*, requires that an ECP report be prepared before any real property may be sold, leased, transferred, or acquired. The ECP report establishes a baseline that the Army can use in making decisions about future real property transactions. The ECP report is also intended to help the Army meet its obligations under the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA), section 120(h), as amended through Title 42 of the United States Code Section 9620. The report provides the Army with a basis for identifying those areas of real property that may be classified as uncontaminated under CERCLA section 120(h)(3) and DoD policy.

This ECP report documents the physical and environmental condition of the Subject Property and any impacts resulting from the past storage, use, release, and disposal of hazardous substances and petroleum products. The environmental condition of the Subject Property documented in this ECP report has been based on the history of the property and surrounding properties; the findings of the visual site inspection; the results of past environmental sampling conducted in and around the Subject Property; and any other environmentally related surveys, reports, and investigation results that were available at the time of document preparation. Should the size of the proposed generating facility parcel and interconnection easement decrease during project planning, further evaluation will not be required as long as the project remains within the boundaries of the Subject Property evaluated within this ECP. DoD guidance and the ASTM International (ASTM) 2013 standard practice for conducting an Environmental Baseline Survey and a Phase I Environmental Site Assessment (ASTM D6008-96 [2014] and E1527-13) were used to prepare this ECP report (ASTM 2014, 2013).

On the basis of the findings within this ECP report, the Subject Property was given an ECP Classification of 1/WHITE, which indicates areas where no release or disposal of hazardous substances or petroleum products has occurred (including no migration of these substances from

adjacent areas). However, the area might have been used to store hazardous substances or petroleum products. Table ES-1 is a summary of the environmental condition of the Subject Property.

Table ES-1
Summary of Environmental Condition of Subject Property

Subject Property	Environmental Condition of Property
223.43-Acre Dove Field Site	100% 1/WHITE

The ECP definitions are derived from the Community Environmental Response Facilitation Act Guidance (Public Law 102-426, 1992), the Base Development and Realignment Manual (DoD 2006), Office of Solid Waste and Emergency Response Directive 9345.0-09 (USEPA 1994), and ASTM D5746 (ASTM 2010).

DoD Environmental Condition of Property Classification Codes:

- Category 1 (WHITE)*:* Areas where no release or disposal of hazardous substances or petroleum products has occurred (including no migration of these substances from adjacent areas). However, the area might have been used to store hazardous substances or petroleum products.
- Category 2 (BLUE): Areas where only a release or disposal of petroleum products and/or their derivatives has occurred (including migration of petroleum products from adjacent areas).
- Category 3 (LIGHT GREEN): Areas where a release, disposal, and/or migration of hazardous substances has occurred, but at concentrations that do not require a removal or remedial action.
- Category 4 (DARK GREEN): Areas where a release, disposal, and/or migration of hazardous substances has occurred and all remedial actions necessary to protect human health and the environment have been taken.
- Category 5 (YELLOW): Areas where a release, disposal, and/or migration of hazardous substances has occurred and removal or remedial actions are under way, but all required remedial actions have not yet taken place.
- Category 6 (RED): Areas where a release, disposal, and/or migration of hazardous substances has occurred, but required actions have not yet been implemented.
- Category 7 (GRAY): Areas that are not evaluated or require additional evaluation.

TABLE OF CONTENTS

EXECUTIVE SUMMARY ES-1

SECTION 1.0 INTRODUCTION 1–1

1.1 INTRODUCTION AND BACKGROUND 1–1
1.2 PROPERTY DESCRIPTION 1–1
1.3 LIMITATIONS 1–4

SECTION 2.0 SURVEY METHOD 2–1

2.1 APPROACH AND RATIONALE 2–1
2.2 RECORD REVIEW 2–2
2.3 VISUAL SITE INSPECTION 2–2
2.4 INTERVIEWS 2–2
2.5 RECONNAISSANCE OF ADJACENT PROPERTIES 2–3
2.6 PROPERTY CLASSIFICATIONS 2–3

SECTION 3.0 SUMMARY OF DATA FOR SUBJECT PROPERTY 3–1

3.1 ENVIRONMENTAL SETTING 3–1
3.1.1 Location, Description, and Setting 3–1
3.1.2 Topography 3–1
3.1.3 Geology 3–2
3.1.4 Surface Water 3–2
3.1.5 Hydrogeology and Groundwater 3–2
3.1.6 Wetlands 3–3
3.1.7 Cultural Resources 3–3
3.1.8 Title Search 3–3
3.2 SUMMARY OF ENVIRONMENTAL MANAGEMENT INTERVIEWS 3–3
3.2.1 Stormwater Runoff 3–4
3.2.2 Floodplains 3–4
3.2.3 Wetlands 3–4
3.2.4 Threatened or Endangered Species 3–4
3.2.5 Tree Management 3–5
3.2.6 Permits and Other Requirements 3–5
3.2.7 Historical and Cultural Resources 3–6
3.2.8 Installation Restoration Program 3–6
3.2.9 Waste Management 3–6
3.2.11 Oil/Water Separators 3–7
3.2.12 Asbestos-containing Material 3–7
3.2.13 Lead-based Paint 3–7
3.2.14 Air Emissions 3–7
3.2.15 Polychlorinated Biphenyls 3–7
3.2.16 Pesticides 3–8
3.2.17 Munitions and Explosives of Concern (MEC) 3–8
3.2.18 Medical/Biohazardous Waste and Silver Recovery 3–9
3.2.19 Radioactive Materials 3–9
3.2.20 Radon 3–9
3.2.21 Mold 3–9

3.2.22 Vapor Intrusion 3–9
3.2.23 Other 3–9
3.3 RECORDS REVIEW 3–11
3.4 VISUAL SITE INSPECTION 3–11
3.5 ADDITIONAL INTERVIEWS 3–12

SECTION 4.0 SUMMARY OF DATA FOR ADJACENT PROPERTIES 4–1

4.1 RECORDS REVIEW AND INTERVIEW RESULTS 4–1
4.2 DATABASE SEARCH FINDINGS 4–2
4.2.1 Federal Records 4–4
4.2.2 State and Local Records 4–4
4.2.3 Tribal Records 4–5
4.2.4 EDR Proprietary Records 4–5
4.2.5 Orphan Sites 4–5
4.3 WATER WELL SEARCH 4–5
4.4 HISTORICAL AERIAL PHOTOGRAPH REVIEW 4–6

SECTION 5.0 CONCLUSIONS 5–1

5.1 ENVIRONMENTAL CONDITION OF PROPERTY 5–1
5.1.1 Environmental Remediation Sites 5–1
5.1.2 Storage, Release, or Disposal of Hazardous Substances 5–1
5.1.3 Petroleum and Petroleum Products 5–1
5.1.4 Polychlorinated Biphenyls 5–1
5.1.5 Asbestos-Containing Materials 5–1
5.1.6 Lead-Based Paint 5–4
5.1.7 Radiological Materials 5–4
5.1.8 Radon 5–4
5.1.9 Munitions and Explosives of Concern (MEC) 5–4
5.1.10 Other Property Conditions 5–4
5.2 ADJACENT PROPERTY CONDITIONS 5–4
5.3 ENVIRONMENTAL REMEDIATION AGREEMENTS 5–5

SECTION 6.0 REFERENCES 6–1

SECTION 7.0 PERSONS CONSULTED 7–1

SECTION 8.0 ACRONYMS AND ABBREVIATIONS 8–1

SECTION 9.0 SIGNATURE OF ENVIRONMENTAL PROFESSIONAL 9–1

FIGURES

Figure 1-1 Site Map 1–3
Figure 3-1 Environmental Constraints 3–10
Figure 5-1 Environmental Condition of Property 5–3

TABLES

Table ES-1 Summary of Environmental Condition of Subject Property ES-2
Table 4-1 Government Environmental Databases Available for the Subject Property 4–2
Table 4-2 Water Well Search Results 4–6
Table 5-1 Environmental Condition of Property 5–2

APPENDICES

A Environmental Protection Provisions Recommended for the Outgrant and Agreements
B Visual Site Inspection Photographs
C Environmental Data Resources Database Search Report
D Historic Aerial Photographs and Topographical Maps
E Soil and Groundwater Sampling Report for the Cow Dipping Site

This page intentionally left blank.

SECTION 1.0
INTRODUCTION

1.1 INTRODUCTION AND BACKGROUND

This Environmental Condition of Property (ECP) report has been prepared for a proposed utility easement of Army land on Fort Benning for the purpose of generating renewable energy through a 30 megawatt (MW) solar photovoltaic (PV) facility that will be designed, built, owned and operated by the Georgia Power Company (GPC), an operating utility of Southern Company.

The utility easement includes a 223.43-acre parcel referred to as the Dove Field Site (Subject Property, hereafter). Only the Subject Property that is proposed for easement is being evaluated in this ECP report.

Should the size of the proposed generating facility parcel and interconnection easement decrease during project planning, further evaluation will not be required as long as the project remains within the boundaries of the Subject Property evaluated within this ECP. In addition to this ECP report, an Environmental Assessment is being prepared that will evaluate the potential environmental effects associated with the proposed project.

The proposed project is to design, construct and operate a 30MW Solar PV facility within the boundaries of Fort Benning to achieve renewable energy production on Army land in accordance with 10 United States Code (U.S.C.) 2911(e), as amended; contribute to the Army's goal of generating one gigawatt of renewable electrical energy on Army land by 2025; and contribute to the Energy Policy Act of 2005 requiring the Army's consumption of not less than 7.5% of the total quantity of facility electrical energy it consumes within its facilities during fiscal year 2013 and each fiscal year thereafter from renewable energy sources (AEC 2014).

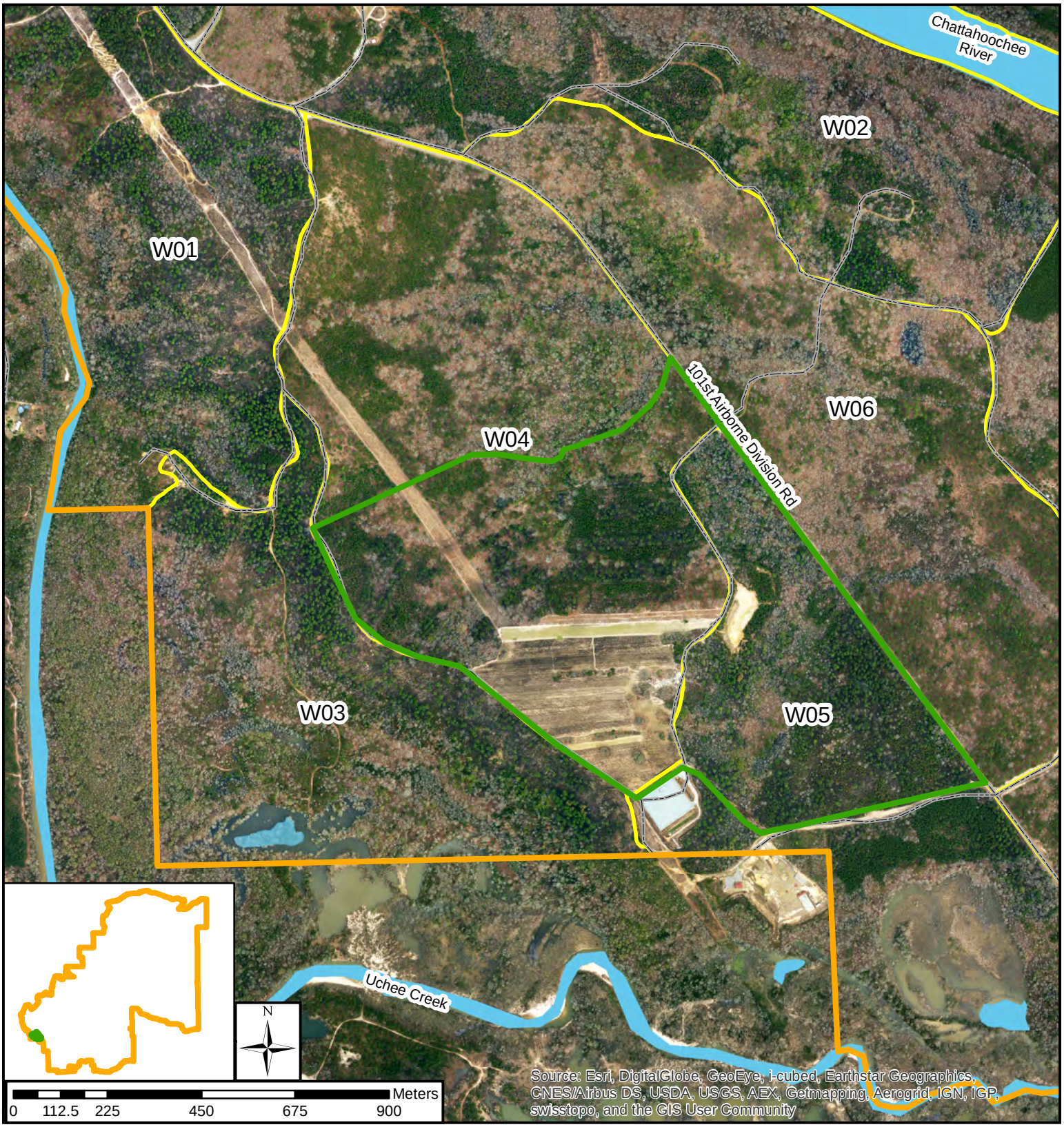
1.2 PROPERTY DESCRIPTION

The Subject Property consists of a 223.43-acre parcel on Fort Benning located in Russell County, Alabama. The Subject Property is a contiguous parcel of land located immediately to the north of the GPC Fort Benning #2 substation within Fort Benning Training Compartments W04 and W05.

The Subject Property consists of mostly mixed pine and hardwood and is on a 3-year prescribed burning cycle. Numerous ravines and dry drainage ditches are found along the eastern portion of the Subject Property. A GPC right-of-way (ROW) transects the western portion of the Subject Property running south to north. An area totaling 38-acres located adjacent to GPC's substation is

utilized as a dove field. The field is currently planted annually for attracting doves and used for hunting and is currently a grassy area with a minimal amount of timber on it.

Access to the Subject Property from the east is via an unnamed access road off of 101st Airborne Division Road. 101st Airborne Division Road is the eastern boundary of the Subject Property. It is bound to the north and east by undeveloped land used for military training exercises and the Chattahoochee River beyond. The land south and west of the Subject Property is also undeveloped land used for training and Uchee Creek is located beyond. See Figure 1-1 for the Subject Property Site Map.



Source: Fort Benning GIS 2014

Coordinate System: WGS 1984 UTM Zone 16N
Projection: Transverse Mercator
Units: Meter
Scale: 1:12,500

Legend

- Fort Benning Boundary
- Training Areas
- Surface Water
- Roads
- Subject Property

Site Map
Figure 1-1

1.3 LIMITATIONS

This ECP report documents the current physical and environmental conditions of the Subject Property at Fort Benning. To develop the ECP report, the preparers obtained and reviewed relevant information concerning the Subject Property from record searches, interviews, and inspections performed within a reasonable and practical time frame. Intrusive investigations, such as those involving the collection and analysis of soil or groundwater samples, were not conducted during this ECP process. Adjacent properties were observed from the ROW. Interviewees were limited to those listed in Section 7.

It is possible that unavailable or undisclosed information might indicate environmental concerns on the Subject Property that were not apparent to the ECP report preparers. Although every effort was made to collect and analyze accessible information, additional information that might affect the conclusions presented in this ECP report could become available over time. When they could not obtain original documents, the preparers relied on their interpretation of previous reports provided by Fort Benning.

Section 3.2 describes specific environmental management issues. Section 6 provides a reference list of documentation used to make the conclusions presented herein.

SECTION 2.0
SURVEY METHOD

2.1 APPROACH AND RATIONALE

The ECP report was prepared using technical guidance presented in ASTM International (ASTM) E1527-013, *Standard Practice for Conducting Environmental Site Assessments: Phase I Environmental Site Assessment Process* (ASTM 2013); ASTM D6008-96, *Standard Practice for Conducting Environmental Baseline Surveys* (ASTM 2014); Army Regulation 200-1, *Environmental Protection and Enhancement*, and U.S. Department of Defense (DoD) policy. These guidance documents provide a systematic framework for identifying recognized environmental concerns for real property by using an environmental records review process, visual site inspections, and interviews with persons knowledgeable of present and past uses of the Subject Property.

The following readily available sources of information concerning environmentally significant current and historic uses of the Subject Property were considered while developing this ECP report:

- Review of available information and records in the Army's possession or records made available by the regulatory agencies or other involved agencies.
- Review of reasonably obtainable federal, state, and local government records for each adjacent facility where there has been a release of any hazardous substance or any petroleum product, and that is likely to cause or contribute to a release or threatened release of any hazardous substance or any petroleum product on the Subject Property.
- Interviews with employees involved in operations on the Subject Property.
- A visual site inspection (VSI) of the Subject Property, including any structures, equipment, utilities, pipelines, or other improvements on the Subject Property and on adjacent properties, noting runoff patterns, evidence of environmental impacts (e.g., stained soil, stressed vegetation, dead or ailing wildlife), and other observations that indicate actual or potential releases of hazardous substances or petroleum products.
- A VSI of properties adjacent to the Subject Property, as appropriate and to the extent permitted by owners or operators of such properties.

Intrusive investigations, such as those involving the collection and analysis of soil or groundwater samples, were not conducted during this ECP process. Existing data on contaminants affecting

the following media were considered in the evaluation: air, soil, groundwater, surface water, soil gas and vapor, leachate, sludge, and sediment. Common sources of contaminants in these media are hazardous materials and wastes, lead (including lead-based paint [LBP] and lead in drinking water), solid waste, polychlorinated biphenyls (PCBs), leakage from aboveground storage tanks (ASTs) and underground storage tanks (USTs), asbestos, petroleum spills, wastewater treatment and discharge, pesticides, radon, explosive ordnance disposal waste, biomedical waste, stationary air sources, radioactive waste, photochemical waste, oil, paints, solvents, and lubricants.

2.2 RECORD REVIEW

In addition to reviewing the sources of information detailed above, current federal, state, local, and tribal environmental databases were also searched. A database report was prepared for the 223.43-acre Subject Property, as identified in Section 1, and does not represent a survey of Fort Benning as a whole.

The corresponding records review for this ECP report focused on activities conducted within the Subject Property boundaries. Specific types of records reviewed include internal memoranda or documentation concerning environmental conditions of the installation with respect to long-range planning and design, installation action plans, and other environmental assessments and remedial actions. See Section 6 for a list of references used to prepare this ECP report.

2.3 VISUAL SITE INSPECTION

The Subject Property was visually inspected as part of this evaluation on June 17-18, 2014. The visual inspection included a site walk of the 223.43-acre Subject Property. Photographs were taken during the VSI to document site conditions observed during the VSI. These are presented in Appendix B. The purpose of the VSI was to determine whether any readily apparent environmental conditions warranting concern are within the Subject Property. Potential concerns that can be readily apparent include historical dumping and landfilling on the property; any unusual and visible discoloration of surface soils; odors; distressed vegetation; and other characteristics that might indicate a previous spill, accident, or release of potentially hazardous materials or petroleum products.

2.4 INTERVIEWS

The preparers interviewed personnel from Fort Benning with knowledge of the current and historical environmental conditions of the Subject Property and the locations and nature of environmental activities on adjacent properties. Section 3.2 provides a summary of these interviews and Section 7 provides a list of persons contacted.

2.5 RECONNAISSANCE OF ADJACENT PROPERTIES

Report preparers inspected the vicinity on foot and by car to determine if any activities taking place on adjacent properties pose an environmental threat to the Subject Property. Subjects of observation included types of businesses in the area, indications of aboveground or underground storage of chemicals or petroleum products, stressed vegetation, and land use practices that might directly affect the Subject Property. Observations were made from the right-of-way and did not include going inside buildings. Photographs were taken during the field reconnaissance to document environmental conditions at the adjacent sites (Appendix B).

2.6 PROPERTY CLASSIFICATIONS

Representatives from the Office of the Secretary of Defense, the Military Services, and the U.S. Environmental Protection Agency (USEPA) jointly developed environmental categories to describe the environmental condition of DoD property. DoD requires that these classifications be used during property transfer and lease activities, and mandates the use of maps with specific colors for each of seven environmental condition categories. After an analysis of the available data, parcels can be classified into one of these categories (ASTM 2010).

- *Category 1 (WHITE)*—Areas where no release or disposal of hazardous substances or petroleum products has occurred (including no migration of these substances from adjacent areas). The area might have been used to store hazardous substances or petroleum products.
- *Category 2 (BLUE)*—Areas where only a release or disposal of petroleum products and/or their derivatives has occurred (including migration of petroleum products from adjacent areas).
- *Category 3 (LIGHT GREEN)*—Areas where a release, disposal, and/or migration of hazardous substances has occurred, but at concentrations that do not require a removal or remedial action.
- *Category 4 (DARK GREEN)*—Areas where a release, disposal, and/or migration of hazardous substances has occurred and all remedial actions necessary to protect human health and the environment have been taken.
- *Category 5 (YELLOW)*—Areas where a release, disposal, and/or migration of hazardous substances has occurred and removal or remedial actions are under way, but all required remedial actions have not yet taken place.
- *Category 6 (RED)*—Areas where a release, disposal, and/or migration of hazardous substances has occurred, but required actions have not yet been implemented.
- *Category 7 (GRAY)*—Areas that are not evaluated or require additional evaluation.

This page intentionally left blank.

SECTION 3.0
SUMMARY OF DATA FOR SUBJECT PROPERTY

3.1 ENVIRONMENTAL SETTING

3.1.1 Location, Description, and Setting

Fort Benning consists of approximately 182,000 acres of federally-owned land that is south and east of Columbus, Georgia; south of Phenix City, Alabama; and on the banks of the Chattahoochee River. Virtually all of the training facilities and 93 percent of the total land area are located in Georgia, within Chattahoochee and Muscogee Counties. The remaining southwestern corner of the installation, approximately 12,000 acres, is located in Russell County, Alabama (Fort Benning 2012).

The Subject Property consists of a 223.43-acre parcel on Fort Benning located in Russell County, Alabama. The Subject Property is a contiguous parcel of land located immediately to the north of the GPC Alabama side substation within Fort Benning Training Compartments W04 and W05.

The Subject Property consists of mostly mixed pine and hardwood and is on a 3-year prescribed burning cycle. Numerous ravines and dry drainage ditches are found along the eastern portion of the Subject Property. A GPC electrical transmission ROW transects the western portion of the Subject Property running south to north. An area totaling 38-acres located adjacent to GPC's Fort Benning #2 substation is utilized as a dove field. The field is currently planted annually for attracting doves and used for hunting and is currently a grassy area with a minimal amount of timber on it.

Access to the Subject Property from the east is via an unnamed access road off of 101st Airborne Division Road. 101st Airborne Division Road is the eastern boundary of the Subject Property. It is bound to the north and east by undeveloped land used for military training exercises and the Chattahoochee River beyond. The land south and west of the Subject Property is also undeveloped land used for training and Uchee Creek is located beyond. See Figure 1-1 for the Subject Property Site Map.

3.1.2 Topography

The Subject Property, located in Russell County, Alabama, has a general topographic gradient of east-southeast. Variations in elevation across the Subject Property range from 361-ft above mean sea level (MSL) to 231-ft MSL (EDR 2014a). The areas to the south and west have surface drainage patterns to the southwest to the Uchee Creek basin. The areas to the north have surface drainage patterns to the north and northeast to the Chattahoochee River basin.

3.1.3 Geology

Most of Fort Benning is located south of the Piedmont Province, however small inclusions of Piedmont geology, soils and vegetation occur in the northern portions of the installation. Fort Benning is located where Coastal Plain strata overlaps on top of Piedmont rocks, a zone defined as the Fall Line. This is also the area where the piedmont basement rocks are first exposed in streams flowing to the Atlantic Ocean and the Gulf of Mexico. The predominately rolling terrain is highest in the east, rising approximately 740 ft. above MSL, and lowest in the southwest along the Chattahoochee River, about 190 ft. above MSL (USACE, 2007).

3.1.4 Surface Water

Most streams found within Fort Benning are tributaries to the Chattahoochee River through Upatoi Creek on the Georgia side and Uchee Creek on the Alabama side. The southernmost portion of Fort Benning drains directly into the Chattahoochee River and the northwestern portion of the installation drains into Bull Creek. A very small area in the southeastern corner drains into the Flint River basin to the east. The streams at Fort Benning are either Piedmont or Coastal Plain in origin (USACE, 2007).

The Chattahoochee River flows through approximately 15 miles of Fort Benning, separating it into its Alabama and Georgia portions. Several dams have been built on the Chattahoochee River upstream and downstream of Fort Benning to regulate river flow and produce hydro-electric power. The northern portion of Lake Walter F. George extends into the southwestern portion of Fort Benning. Numerous oxbows, old meander channels, isolated ponds and wetland areas are found along the Chattahoochee River (Fort Benning 2012).

There are fourteen man-made ponds that range in size from 1 to 72 acres on Fort Benning. Numerous beaver ponds are also present (Fort Benning 2012).

3.1.5 Hydrogeology and Groundwater

Fort Benning is located within the Coastal Plain hydrogeologic province. The principal groundwater source for Fort Benning is the Cretaceous aquifer system. The recharge area for this aquifer is the Sand Hill cantonment area. The regional direction of ground-water flow in the Coastal Plain is from the north to south. Aquifers in the Coastal Plain consist of porous sands and carbonates, and include alternating units of sand, clay, sandstone, dolomite, and limestone that dip gently and thicken to the southeast. Several of these are prolific producers of ground water (USACE, 2009).

3.1.6 Wetlands

Fort Benning has approximately 16,926 acres of wetlands (Fort Benning 2014a). A wetlands delineation of the Subject Property was completed and four small wetlands areas were identified within the Subject Property (Fort Benning GIS 2014). These wetlands sites have been forwarded to the U.S. Army Corps of Engineers (USACE) Mobile District Regulatory Office for jurisdictional wetlands determination. Appropriate avoidance by design and/or wetland mitigation, as well as any required wetland permitting, will be incorporated into the project.

3.1.7 Cultural Resources

Over 120 archaeological surveys encompassing over 170,000 acres have been completed at Fort Benning. As of 2003, all of the areas of Fort Benning, except those that pose threats to human health and safety (e.g. impact/dud areas), have been inventoried for archaeological resources. As a result of these surveys, 3,982 archaeological sites have been recorded. Of the sites recorded, 3,062 have been determined ineligible for inclusion in the National Register of Historic Places (NRHP); 156 sites have been determined eligible for the NRHP; and the remaining 764 sites have not yet been evaluated for NRHP eligibility (USACE 2009). Archaeological surveys were completed for the Subject Property. No sites were identified within the Subject Property; however, four sites classified as eligible sites for the NRHP are adjacent to the Subject Property (Panamerican 2012). These cultural resource sites are at least 35 meters from the Subject Property, and the project is not expected to impact those sites.

3.1.8 Title Search

The Subject Property has been continuously owned by the federal government and in use by the Army since 1941; therefore, a title search was not performed.

3.2 SUMMARY OF ENVIRONMENTAL MANAGEMENT INTERVIEWS

The responses to the following questions were provided in June 2014, by staff from the Fort Benning Environmental Management Division (EMD), Master Planning Division, and Range Control. Tetra Tech, Inc. clarified, validated and expanded some responses using available installation resources, but the editing did not affect the accuracy of the responses. Interview answers are in boldface text.

3.2.1 Stormwater Runoff

Does the installation Storm Water Management Plan require the preparation of a Storm Water Pollution Prevention Plan (SWP3) for proposed construction activities? If yes what are the requirements?

[yes] *[no]* Construction on the site will require an Alabama Construction Best Management Practices Plan (CBMPP) and a Notice of Intent (NOI) for coverage under Alabama Construction General Permit ALR100000. The stormwater management system must be designed to meet the requirements of Sec 438 of the Energy Independence and Sustainability Act of 2007.

3.2.2 Floodplains

Will any construction or renovation associated with the proposed action take place in a floodplain?

[yes] ***[no]*** Review of Geographic Information System (GIS) files provided by Fort Benning did not indicate that the Subject Property is within the 100-year floodplain (Fort Benning GIS 2014).

3.2.3 Wetlands

Will any construction or renovation associated with the proposed action take place in wetlands?

[yes]*[no]* A wetlands delineation of the Subject Property was completed and four small wetlands areas were identified within the Subject Property (Fort Benning GIS 2014). These wetlands sites have been forwarded to the USACE Mobile District Regulatory Office for jurisdictional wetlands determination. Appropriate avoidance by design and/or wetland mitigation, as well as any required wetland permitting, will be incorporated into the project.

3.2.4 Threatened or Endangered Species

Will the proposed action affect federally listed threatened or endangered species or their designated critical habitats, or a federal candidate species, or, a species proposed for federal listing or critical habitat?

[yes] ***[no]*** The United States Fish and Wildlife Service (USFWS) prepared a Biological Opinion for Fort Benning in May 2009 that encompassed the entire installation (USFWS 2009). Endangered species habitat has been accounted for on the installation and management guidelines are implemented by the Integrated Natural Resources Management Plan. For the Subject Property, surveys for the red cockaded woodpecker (*Picoides borealis*) were completed in March 2014 and surveys for relict trillium (*Trillium reliquum*) were completed in April 2014 . Based on survey results, no ***known*** federally listed threatened or endangered species are present on the Subject Property.

Uchee Creek, however, is designated as critical habitat for the endangered Shinyrayed pocketbook mussel (*Lampsilis subangulata*). The last planning level survey for pocketbook mussels was in 1996. The addition of solar panels on the Subject Property could have effects on the watershed for the Uchee Creek. If a large area is converted to non-permeable surfaces this could result in an increase in water flow into the creek and have a potential to increase sediment flow in the creek. The project will minimize the amount of nonpermeable surfaces as feasible to reduce any potential negative impacts in the critical habitat for the mussel. Fort Benning is informally consulting with USFWS on this project to address any federally listed species or critical habitat issues.

3.2.5 Tree Management

Does the subject property have trees that are protected under an installation tree management policy or subject to installation tree sales policies?

[yes]*[no]* A significant quantity of trees will be removed and a tree harvest will be required. Coordination with the Fort Benning EMD will ensure all requirements are met.

3.2.6 Permits and Other Requirements

Does the installation operate under any environmental permits and other environmental regulations that will/may affect the actions of the developer?

[yes]*[no]*

Fort Benning Form-144R: As part of the National Environmental Policy Act (NEPA) analysis, any proposed construction activity, maintenance, and improvements would require submission to the EMD using the Fort Benning Form-144R environmental review process prior to proposed implementation (Fort Benning 2012). Adhering to this process ensures that significant adverse impacts to environmental resources are avoided. According to Fort Benning EMD staff, GPC has initiated the Form-144R process by providing site approval and soil borings. GPC should continue the Form-144R process by providing the final design once complete.

Erosion and Sedimentation (E&S): Construction on the site will require an Alabama CBMPP and an NOI for coverage under Alabama Construction General Permit ALR100000.

Wetlands (E&S): The wetlands delineation of the Subject Property has been forwarded to the USACE Mobile District Regulatory Office for jurisdictional wetlands determination. Any required wetland permitting, will be incorporated into the project.

3.2.7 Historical and Cultural Resources

Are structures on the property 50 years of age or older or constructed in 1965 or earlier?
*[yes]**[no]***

Have cultural resources surveys been conducted for the subject areas?

[yes]*[no]*

The project area has been surveyed for archaeological sites. Phase II investigations were performed in 2012. During the surveys, four sites adjacent to the Subject Property were determined eligible for the NRHP (Panamerican 2012). Each eligible archaeological site identified is located at least 35 meters northeast of the Subject Property, west of 101st Airborne Division Road. The sites are identified below:

- 1RU420 (3.45919 acres)
- 1RU422 (15.68204 acres)
- 1RU423 (1.1604 acres)
- 1RU424 (0.19069 acres)

Any activity at or near the eligible archaeological sites must be coordinated through Fort Benning EMD.

3.2.8 Installation Restoration Program

Are there any Installation Restoration Program (IRP) sites located on or near the subject areas?
*[yes]**[no]***
Are there any environmental remediation agreements/orders that involve the subject areas?
*[yes]**[no]***
Are there restrictions on use of any of the properties due to the presence of hazardous waste, materials, unexploded ordnance or ongoing site remediation activities?

*[yes]**[no]***

3.2.9 Waste Management

Does the installation have a plan describing procedures for the proper handling, storage, use, disposal, and cleanup of hazardous and/or toxic materials?

[yes]*[no]* Hazardous wastes and solid wastes generated at Fort Benning are managed in accordance with the Fort Benning Hazardous Waste Management Plan (Fort Benning 2010). No records of hazardous waste generation, storage or spills were identified for the Subject Property.

3.2.10 Storage Tanks

Are there or have there been any USTs and/or ASTs on or adjacent to any of the subject properties?

*[yes]**[no]*** There are no USTs or ASTs on the Subject Property.

3.2.11 Oil/Water Separators

Are there or has there been any oil/water separators on or adjacent to any of the subject properties?

*[yes]**[no]***

3.2.12 Asbestos-containing Material

Is there any known asbestos-containing material (ACM) presently or historically located on the subject properties?

*[yes]**[no]*** There are no structures on the Subject Property.

Has asbestos been identified in soils within the subject properties?

*[yes]**[no]*** There is no indication that asbestos is in soils within the Subject Property.

3.2.13 Lead-based Paint

Is there any known LBP presently or historically on or within the subject properties?

*[yes]**[no]*** There are no structures on the Subject Property.

Have paint chips been noted on the ground around any of the pre-1978 improvements and have any soil lead studies been conducted on any of the subject properties?

*[yes]**[no]*** There are no structures on the Subject Property.

3.2.14 Air Emissions

Is the installation in a non-attainment area?

*[yes]**[no]***

3.2.15 Polychlorinated Biphenyls

Is there any PCB containing equipment located on any of the subject properties?

*[yes]**[no]***

Have PCBs been released onto any of the subject properties?

*[yes]**[no]*** There is no record of PCB release to the environment on the Subject Property.

3.2.16 Pesticides

Have chlorinated pesticides (i.e., chlordane, dieldrin, heptachlor, etc.) been used on the subject properties?

*[yes]**[no]*** Pesticide use must be in accordance with the manufacturer's label and the Fort Benning Integrated Pest Management Plan. No records for the Subject Property were identified; however, pesticides have historically been applied at Fort Benning to control weeds, insects, and other pests. It is possible that mosquito abatement products may have been applied directly to, or may have drifted onto the Subject Property footprint. Historically, the pesticide Malathion was most commonly used for mosquito abatement (Fort Benning 2012).

3.2.17 Munitions and Explosives of Concern (MEC)

Do any of the subject properties contain any known ammunition, explosives, or chemical weapons?

*[yes]**[no]***

Have any of the subject properties been used as training or impact ranges?

[yes]*[no]* The term "MEC" means military munitions that may pose unique explosives safety risks, including: (A) unexploded ordinance (UXO), as defined in 10 U.S.C. §101(e)(5); (B) discarded military munitions (DMM), as defined in 10 U.S.C. §2710(e)(2); or (C) munitions constituents (e.g., TNT, RDX), as defined in 10 U.S.C. §2710(e)(3), present in high enough concentrations to pose an explosive hazard. Training activities for the Subject Property were identified by Fort Benning Range Control personnel using the Range Facility Management Support System (RFMSS). Training activities identified within the Subject Property were field training exercises (FTX) and situational training exercises (STX) (Fort Benning RFMMS 2014). According to Range Control personnel, no live fire has occurred within the Subject Property boundaries; however, there is the potential that munitions have been used within the Subject Property in the past. The likelihood of uncovering UXO is low, but could be possible. In the event that a person should encounter or suspect they have encountered MEC on the Subject Property, they shall not attempt to disturb, remove or destroy it, but shall cease any intrusive or ground disturbing activities being conducted at the project and immediately notify the Fort Benning Range Control Explosive Ordnance Disposal (EOD) at 706-544-6271. The Army/Fort Benning would be responsible for the handling and removal of any discovered UXOs.

3.2.18 Medical/Biohazardous Waste and Silver Recovery

Do any of the subject properties contain any known medical/biohazard and/or silver recovery waste?

*[yes]**[no]***

3.2.19 Radioactive Materials

Do any of the subject properties contain any known radioactive materials or have they been used to store radioactive materials?

*[yes]**[no]***

3.2.20 Radon

Do any of the subject properties have any recorded instances of radon exceeding 4 picocuries per liter (pCi/L)?

*[yes]**[no]***

3.2.21 Mold

Is there any evidence of mold existing within the improvements to be transferred?

*[yes]**[no]***

3.2.22 Vapor Intrusion

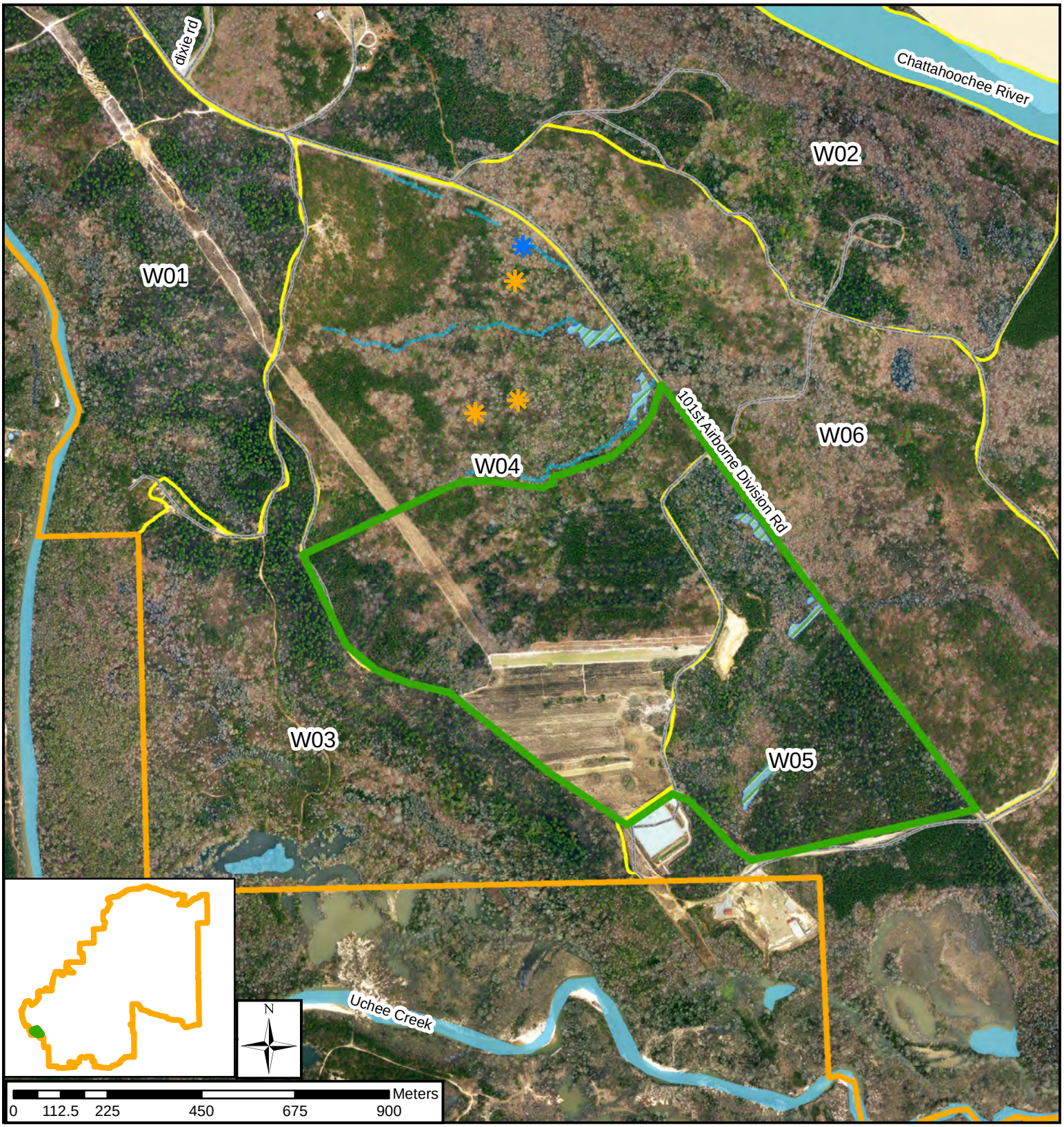
Is there a presence or likely presence of hazardous substances or petroleum products on the Subject Property due to a release based on consideration of pathways and how contamination is likely to migrate onto the Subject Property?

*[yes]**[no]*** Interviews with Fort Benning staff and records searches of federal and state regulatory agencies did not identify releases of hazardous substances or petroleum products on, in or at the Subject Property.

3.2.23 Other

Are there any other known environmental conditions within any of the subject properties that may affect the environmental condition of property category?

*[yes]**[no]*** Based on the interviews with the Fort Benning EMD, there are no other known environmental issues that could impact the Subject Property.



Source: Fort Benning GIS 2014

Coordinate System: WGS 1984 UTM Zone 16N
Projection: Transverse Mercator
Units: Meter
Scale: 1:12,500

Legend

- Fort Benning Boundary
- Roads
- Training Areas
- Subject Property
- Cattle Dipping Vat
- Old Water Wells
- Wetland Delineation
- Surface Water

Environmental Constraints
Figure 3-1

3.3 RECORDS REVIEW

The ASTM D6008-96 (2014) and E1527-13 requirements include a search of available government databases. Section 4 provides a summary of the database report. Appendix C presents a full copy of the report. The standard environmental databases did not reveal any information related to releases or facilities in the footprint of the Subject Property that is not addressed in other sections of this report.

3.4 VISUAL SITE INSPECTION

A VSI of the Subject Property was conducted on June 17-18, 2014. The land was inspected for indications of the storage, use, or release of potentially hazardous materials. The VSI of the 223.43-acre Dove Field Site and adjacent properties is summarized below. Appendix B provides photographs.

During the VSI of the Subject Property, three hand-dug, masonry-walled water wells were observed on adjacent property, approximately 150 meters north of the Subject Property. Two of the water wells were located within an NRHP eligible archaeological site and the third was immediately adjacent to an eligible site. Each well was visibly marked with caution tape and covered with either a wood or fiberglass cap. In total, four archaeological sites eligible for the NRHP were identified on adjacent property. Each site was visibly bound by stakes and proper signage was installed to identify each site.

A cattle dipping vat was observed on adjacent property, approximately 500 meters north of the Subject Property, near 101st Airborne Division Road. During the early 1900's, the best and cheapest method of treating large heads of cattle for southern tick eradication was to regularly dip the cattle in a vat. Within the vat, arsenical solutions and crude petroleum solutions were typically used (Pasquill 2012). It is unknown if the vat identified during the VSI was ever used and if so, which solution was present when in use. In addition, the interior of the cattle dipping vat was painted at some point in time. There is a possibility the paint is LBP depending on when it was painted though there was no evidence of paint on the surrounding soil.

A former borrow pit was identified in the southeastern portion of the Subject Property. The borrow pit is approximately one acre in size. Some erosion controls were in place at the eastern edge of the borrow pit to prevent erosion to the east; however, moderate offsite sedimentation was identified.

Solid wastes identified throughout the Subject Property included spent blank-fire casings, mattresses, metal debris and Meals Ready-to-Eat (MRE) packages including used Flameless

Ration Heaters (FRH). Flameless ration heaters are commonly used to heat MREs by Soldiers in the field. Fort Benning considers used FRHs as a solid waste and directs each unit to properly dispose of any solid wastes generated during training activities. The USEPA Office of Solid Waste has determined that an unused FRH is a D003 reactive waste (See 40 CFR 261.23(a)(2)) and should be disposed of as a hazardous waste. The USEPA has also issued guidance for handling and disposal of unused FRH's on Army installations (USEPA 1999). No unused FRH were identified during the VSI.

Burn barrels were identified in numerous locations throughout the Subject Property. Fort Benning staff indicated that the burn barrels were typically used for warming fires by units training in the area. No hazardous materials/wastes were identified within the barrels. A firing device was identified near the cattle dipping vat on adjacent property. Fort Benning Range Control was notified and retrieved the device. Numerous deer stands were identified on the Subject Property. Photos of the barrels and other solid waste identified are included in Appendix B.

Numerous foxholes and navigation boxes were identified throughout the Subject Property and adjacent property. The foxholes and navigation boxes are used by units conducting STX and FTX within Training Compartments W04 and W05.

Approximately one acre of standing water was identified within the southeastern portion of the Subject Property.

A transmission line ROW owned by GPC transects the entire Subject Property from south to north. An electrical substation owned and operated by GPC is located within the southwestern portion of the Subject Property.

3.5 ADDITIONAL INTERVIEWS

Persons interviewed in connection with this report did not identify any environmental concerns other than those discussed in the relevant sections of this report. Section 7 provides a complete list of interviewed personnel.

SECTION 4.0
SUMMARY OF DATA FOR ADJACENT PROPERTIES

4.1 RECORDS REVIEW AND INTERVIEW RESULTS

Records review for adjacent properties revealed a sampling report for the cattle dipping site which is located on adjacent property approximately 500 meters north of the Subject Property. Soil and groundwater sampling was performed at this site. Six subsurface soil samples and two groundwater samples were collected. All samples were analyzed for Organophosphorous Pesticides, Semi-Volatile Organic Compounds (SVOCs) and arsenic. The sampling report is included in Appendix E and results of the sampling are included below (USACE 2014).

- Arsenic was the only analyte detected in the soil samples.
- The arsenic detections in the soil samples from this site are consistent with the range of naturally occurring arsenic concentrations found in soils in the Eastern and Southeast United States.
- There were six detections of SVOCs in the downgradient groundwater sample. All of these detections were estimated values below the laboratory reporting limits, but were above the minimum detection limits. All analytes detected were plasticizers and alcohols that were most likely related to the sampling equipment and/or laboratory processes.
- One pesticide was detected, gamma-Chlordane, which was used historically as an insecticide. The detection was well below the USEPA Maximum Contaminant Level (MCL) for drinking water and was also an order of magnitude below the USEPA Regional Screening Level that equates to the USEPA acceptable risk level for tap water.
- Arsenic was detected in both groundwater samples. Arsenic concentrations detected in the groundwater are consistent with other detections of arsenic in groundwater samples from across Fort Benning.
- Based on the analytical results from the samples collected, the previous activities at the cow dipping trough do not appear to have not adversely affected the groundwater beneath the trough or downgradient from the trough.

Based on the results of the soil and groundwater sampling at the cattle dipping site, past activities at this site have not impacted the condition of the Subject Property.

Records review and interviews did not reveal any other relevant adjacent property conditions that are not discussed in other sections of this report.

4.2 DATABASE SEARCH FINDINGS

Environmental Data Resources, Inc. (EDR) prepared a radius map report for the Subject Property in June 2014. The report consists of a computerized search of federal, state, local, and tribal environmental databases at standard search distances for areas up to a mile from the Subject Property for the purpose of identifying documented potential sources of contamination. Appendix C provides a copy of the database search report. Table 4-1 is a list of the available environmental records searched by EDR.

Table 4-1
Government Environmental Databases Available for the Subject Property

Federal Records	
NPL	National Priorities List sites
Proposed NPL	Proposed NPL sites
NPL Liens	Federal NPL lien sites
NPL Delisted	EPA database of delisted NPL sites
CERCLIS	Comprehensive Environmental Response, Compensation, and Liability Information System
CERCLIS-NFRAP	CERCLIS–No Further Remedial Action Planned
FEDERAL FACILITY	Federal Facility Site Information
CORRACTS	RCRA Corrective Action Reports
RCRA-TSDF	RCRA–Treatment, Storage, and Disposal Facilities
RCRA-LQG	RCRA–Large Quantity Generators
RCRA-SQG	RCRA–Small Quantity Generators
RCRA-CESQG	RCRA–Conditionally Exempt Small Quantity Generators
RCRA-NonGen	RCRA–Nongenerator
FEMA UST	Federal Emergency Management Agency UST Listing
US ENG CONTROLS	Engineering Controls sites
US INST CONTROL	Institutional Controls sites
ERNS	Emergency Response Notification System–emergency response actions
US BROWNFIELDS	Brownfields Sites
ODI	Open Dump Inventory
US CDL	Clandestine Drug Labs
US HIST CDL	Historical Clandestine Drug Labs
CDL	Clandestine Drug Labs
LIENS 2	Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) Lien Information
LUCIS	Land Use Control Information System
HMIRS	Hazardous Materials Information Reporting System
DOT OPS	Incident and Accident Data
DoD	Department of Defense Sites
FUDS	Formerly Used Defense Sites
CONSENT	Superfund (CERCLA) Consent Decrees
ROD	Records of Decision

Table 4-1
Government Environmental Databases Available for the Subject Property

UMTRA	Uranium Mill Tailings Sites
MINES	Mines Master Index File
TRIS	Toxic Chemical Release Inventory System
TSCA	Toxic Substances Control Act
FTTS	Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA)/Toxic Substances Control Act (TSCA) Tracking System
HIST FTTS	FIFRA/TSCA Tracking System Administrative Case Listing
SSTS	Section 7 Tracking Systems
ICIS	Integrated Compliance Information System
PADS	PCB Activity Database System
MLTS	Material Licensing Tracking System
RADINFO	Radiation Information Database
FINDS	Facility Index System/Facility Registry System
RAATS	RCRA Administrative Action Tracking System
UIC	Underground Injection Control Wells Listing
COAL ASH EPA	Coal Combustion Residues Surface Impoundments List
PCB TRANSFORMER	PCB Transformer Registration Database
State and Local Records	
SHWS	Contaminated Sites Database
SWF/LF	Solid Waste Facilities and State Landfills
LUST	Leaking UST Database
UST	UST Database
ENG CONTROLS	Contaminated Sites with Engineering Controls
INST CONTROLS	Contaminated Sites with Institutional Controls
VCP	Voluntary Cleanup Program Sites
SPILLS	Releases of hazardous substances reported to the Hawaii Office of Hazard Evaluation and Emergency Response
DRYCLEANERS	Drycleaner Facility Listing
SCRD DRYCLEANERS	State Coalition for Remediation of Drycleaners Listings
BROWNFIELDS	Identified Brownfields Sites
AIRS	Aerometric Information Retrieval System Facility Listing
Tribal Records	
INDIAN RESERV	Native American Reservations
INDIAN LUST	Leaking USTs on Native American Land
INDIAN UST	USTs on Native American Land
INDIAN VCP	Voluntary Cleanup Program sites on Native American Land
INDIAN ODI	Open Dump Inventory on Native American Land
EDR Proprietary Records	
Manufactured Gas Plants	Manufactured Gas Plant Sites
US Historical Auto Stat	Historic Gas Stations
US Historical Cleaners	Historic Dry Cleaners

Source: EDR 2014a

4.2.1 Federal Records

NPL. Also known as Superfund, the NPL database is a subset of CERCLIS and identifies over 1,200 sites for priority cleanup under the Superfund program. EPA is the source of this database. No sites were identified in the database search for the Subject Property.

CERCLIS. This database maintains records of Superfund sites currently or previously under investigation. The NPL database is a subset of the CERCLIS database. No sites were identified in the database search for the Subject Property.

RCRA-TSD. This database maintains records of facilities licensed to treat, store, and dispose of hazardous materials. No sites were identified in the database search for the Subject Property.

RCRA-LQG. This database maintains records of facilities that generates or transports hazardous waste, or that meet other RCRA large-quantity generator requirements. No sites were identified in the database search for the Subject Property.

RCRA-CESQG. This database includes selective information on sites which generate, transport, store, treat, and dispose of hazardous waste as defined by RCRA. Conditionally exempt small-quantity generators generate less than 100 kilograms of hazardous waste, or less than 1 kilogram of acutely hazardous waste per month. No sites were identified in the database search for the Subject Property.

U.S. Engineering Controls. This database provides a listing of sites with engineering controls in place. No sites were identified in the database search for the Subject Property.

U.S. Institutional Controls. This database provides a listing of sites with institutional controls in place. Institutional controls include administrative measures, such as groundwater use restrictions, construction restrictions, property use restrictions, and post-remediation care requirements intended to prevent exposure to contaminants remaining on-site. Deed restrictions are generally required as part of the institutional controls. No sites were identified in the database search for the Subject Property.

4.2.2 State and Local Records

SHWS. The State Hazardous Waste Sites records are the states' equivalent to CERCLIS. These sites may or may not already be listed on the federal CERCLIS list. Priority sites planned for cleanup using state funds (state equivalent of Superfund) are identified along with sites where

cleanup will be paid for by potentially responsible parties. No sites were identified in the database search for the Subject Property.

LUST database maintains a record of petroleum storage systems that have been reported to be leaking. No sites were identified in the database search for the Subject Property.

UST database maintains records of registered petroleum USTs regulated under Subtitle 1 of RCRA to identify the potential for environmental problems. No sites were identified in the database search for the Subject Property.

Engineering Controls and Institutional Controls. Is a listing of sites with engineering and institutional controls. No sites were identified in the database search for the Subject Property.

Spills. This database identifies releases of hazardous substances since 1988. No sites were identified in the database search for the Subject Property.

4.2.3 Tribal Records

The EDR report did not identify any sites in tribal databases within the standard search distances of the Subject Property.

4.2.4 EDR Proprietary Records

The EDR report did not identify any sites in their proprietary database of manufactured gas plants within 1.6 miles of the Subject Property.

4.2.5 Orphan Sites

The above databases were also reviewed to identify "orphan sites," or records that do not have accurate, site-specific location information and are therefore identified only by their zip code. Tetra Tech reviewed the list provided by EDR and by using installation building numbers and road names identified no orphan sites with the apparent potential to affect the Subject Property.

4.3 WATER WELL SEARCH

Tetra Tech searched records for any U.S. Geological Survey (USGS) wells, state wells, and Federal Reporting Data System public water supply wells within a one mile radius of the Subject Property. Two USGS wells were identified in the search. Table 4-2 summarizes these USGS wells.

Table 4-2
Well Search Results

Database Search ID	Location	Well ID and Name	Army Well ID	Install date	Well depth	Owner
1	Northwest of Subject Property	USGS-321858085010601	NA	1930	160 feet	USGS
2	West of Subject Property	USGS-321804085003101	NA	1931	220 feet	USGS

Source: EDR 2014a

During the VSI of the Subject Property, three hand-dug, masonry-walled water wells were observed on adjacent property, 150 meters north of the Subject Property. These wells were not identified in the records search. Two of the water wells were located within an NRHP eligible archaeological site and the third was immediately adjacent to an eligible site. Each well was visibly marked with caution tape and covered with either a wood or fiberglass cap. Representative photos of each well can be found in Appendix B.

4.4 HISTORICAL AERIAL PHOTOGRAPH REVIEW

Historical aerial photographs, installation maps, and topographical maps were obtained from EDR, and the Google Earth Internet application (EDR 2014b, 2014c). The available photographs were examined for evidence of obvious land use practices that could influence the environmental condition of the Subject Property. The findings from these aerial photographs are detailed below. Appendix D provides a copy of each available aerial photograph or topographical map.

1949 Aerial Photograph. The Subject Property is undeveloped and mostly clear-cut with exception of trees along the east central portion of the parcel. 101st Airborne Division Road to the east is visible along with the unnamed access road to the current dove field. The unnamed access road that currently bounds the Subject Property to the west is also present.

1962 Aerial Photograph. The Subject Property remains relatively unchanged compared to the previous aerial.

1968 Aerial Photograph. Reforestation within the northern portion of the Subject Property is evident. The borrow pit along the eastern boundary is present. The current electrical transmission ROW is present.

1988 Aerial Photograph. The current dove field, borrow pit and transmission ROW are the only areas that remain clear within the Subject Property. The remaining areas are reforested at this point.

1992/1993/1997Aerial Photographs. The Subject Property remains unchanged as compared to the 1988 aerial.

2005 Aerial Photograph. A timber harvest occurred east of the transmission ROW within the northeastern portion of the Subject Property. No other changes were identified compared to the previous aerials.

2006/2007/2009/2010/2011. No changes to the Subject Property identified as compared to the 2005 aerial.

This page intentionally left blank..

SECTION 5.0
CONCLUSIONS

5.1 ENVIRONMENTAL CONDITION OF PROPERTY

On the basis of the findings within this ECP report, the Subject Property was given an ECP Classification of 1/WHITE, which indicates areas where no release or disposal of hazardous substances or petroleum products has occurred (including no migration of these substances from adjacent areas). However, the area might have been used to store hazardous substances or petroleum products.

The ECP rating is summarized in Table 5-1. Figure 5-1 depicts the ECP Classification on the Subject Property proposed for a utilities easement.

5.1.1 Environmental Remediation Sites

There are no environmental remediation sites on the Subject Property.

5.1.2 Storage, Release, or Disposal of Hazardous Substances

There is no evidence that hazardous substances were stored, released, or disposed of on the Subject Property in excess of the reportable quantities specified at Title 40 of the Code of Federal Regulations (CFR) Part 373.

5.1.3 Petroleum and Petroleum Products

UNDERGROUND AND ABOVE-GROUND STORAGE TANKS (UST/ASTS)

There is no evidence that petroleum products were stored in underground or above-ground storage tanks on the Subject Property.

NON-UST/AST STORAGE, RELEASE, OR DISPOSAL OF PETROLEUM PRODUCTS

No non-UST/AST storage, releases, or disposal of petroleum products were identified on the Subject Property.

5.1.4 Polychlorinated Biphenyls

There is no evidence that PCB-containing equipment is located or was previously located on the Subject Property.

5.1.5 Asbestos-Containing Materials

There are no structures on the Subject Property, so there is no indication that ACM is a concern.

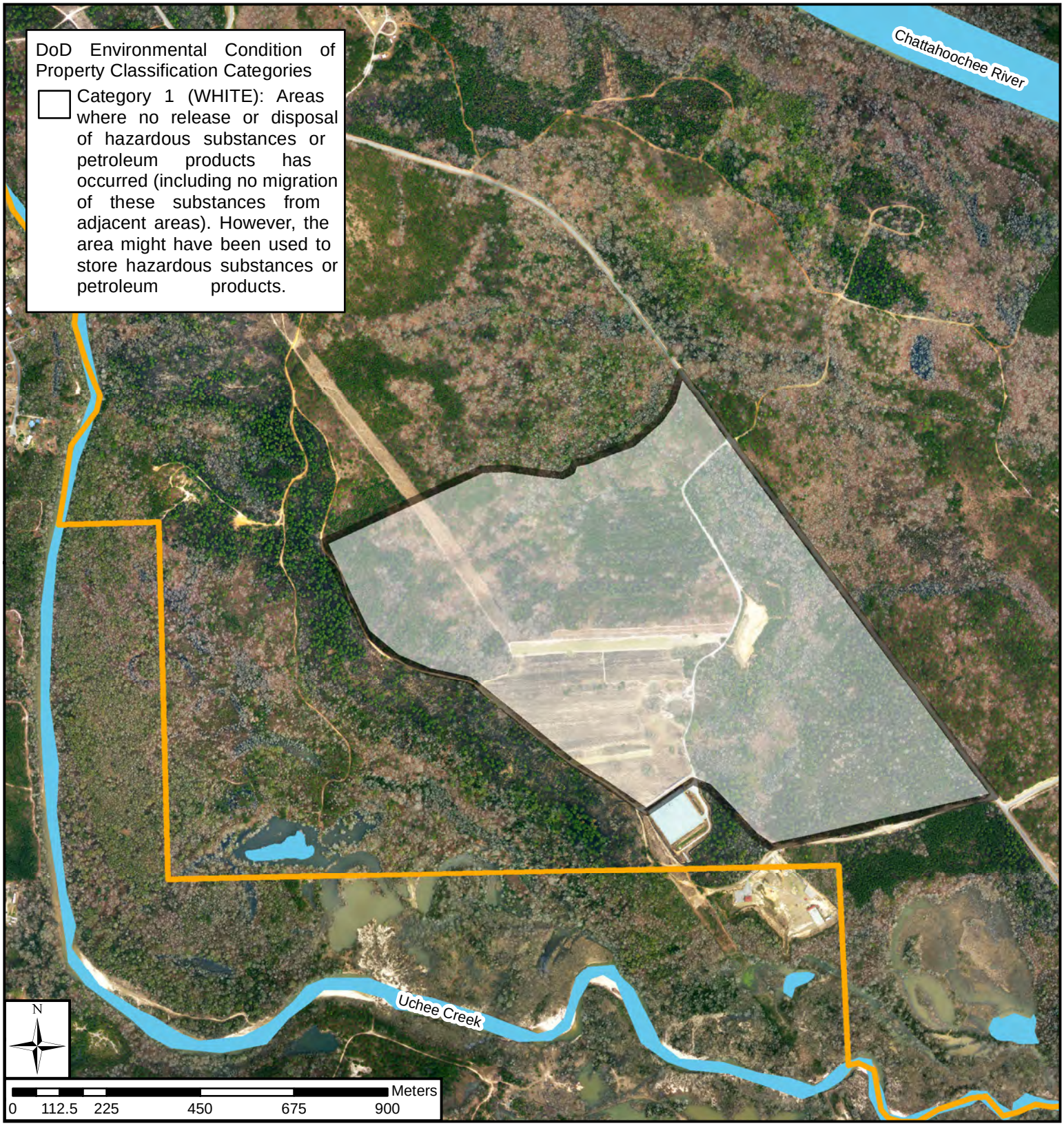
Table 5-1
Environmental Condition of Property

Subject Property	Proposed Environmental Condition of Improvement or Building	Proposed Environmental Condition of Land	Environmental Condition of Property, Remedial Action, and Remarks
Dove Field Site (223.43-acre parcel)	Not applicable	100% 1/WHITE	The ECP Classification of 1/WHITE indicates that no release or disposal of hazardous substances or petroleum products have occurred (including no migration of these substances from adjacent areas).

The ECP definitions are derived from the Community Environmental Response Facilitation Act Guidance (Public Law 102-426, 1992), the DoD *Base Realignment and Closure Cleanup Plan Guidebook* (DoD 1994), and Office of Solid Waste and Emergency Response Directive 9345.0-09 (USEPA 1994) and ASTM D5746 (ASTM 2010).

DoD Environmental Condition of Property Classification Codes:

- Category 1 (WHITE)*:* Areas where no release or disposal of hazardous substances or petroleum products has occurred (including no migration of these substances from adjacent areas). However, the area may have been used to store hazardous substances or petroleum products.
- Category 2 (BLUE): Areas where only a release or disposal of petroleum products and/or their derivatives has occurred (including migration of petroleum products from adjacent areas).
- Category 3 (LIGHT GREEN): Areas where a release, disposal, and/or migration of hazardous substances has occurred, but at concentrations that do not require a removal or remedial action.
- Category 4 (DARK GREEN): Areas where a release, disposal, and/or migration of hazardous substances has occurred and all remedial actions necessary to protect human health and the environment have been taken.
- Category 5 (YELLOW): Areas where a release, disposal, and/or migration of hazardous substances has occurred and removal or remedial actions are under way, but all required remedial actions have not yet taken place.
- Category 6 (RED): Areas where a release, disposal, and/or migration of hazardous substances has occurred, but required actions have not yet been implemented.
- Category 7 (GRAY): Areas that are not evaluated or require additional evaluation.



Source: Fort Benning GIS 2014

Coordinate System: WGS 1984 UTM Zone 16N
Projection: Transverse Mercator
Units: Meter
Scale: 1:12,500

Legend

- Category 1 Area
- Fort Benning Boundary
- Roads
- Waterbody

Environmental Condition of Property

Figure 5-1

5.1.6 *Lead-Based Paint*

There are no structures on the Subject Property, so there is no indication that LBP is a concern.

5.1.7 *Radiological Materials*

There is no evidence that radioactive material or sources were stored or used on the Subject Property.

5.1.8 *Radon*

There are no structures on the Subject Property, so there is no indication that radon is a concern.

5.1.9 *Munitions and Explosives of Concern (MEC)*

Based on a review of existing records and available information, the likelihood of uncovering Munitions and Explosives of Concern (MEC) is possible. Records of field training exercises and interviews with range control personnel indicate that no live-fire has occurred within the Subject Property; however, there is the potential that training and munitions have been used on or near the subject property in the past. The term "MEC" means military munitions that may pose unique explosives safety risks, including: (A) unexploded ordinance (UXO), as defined in 10 U.S.C. §101(e)(5); (B) discarded military munitions (DMM), as defined in 10 U.S.C. §2710(e)(2); or (C) munitions constituents (e.g., TNT, RDX), as defined in 10 U.S.C. §2710(e)(3), present in high enough concentrations to pose an explosive hazard.

Given this project is located on a military installation; there is a potential for MEC to be encountered. In the event that a person should encounter or suspect they have encountered MEC on the Subject Property, they shall not attempt to disturb, remove or destroy it, but shall cease any intrusive or ground disturbing activities being conducted at the project and immediately notify the Fort Benning Range Control EOD at 706-544-6271. The Army/Fort Benning would be responsible for the handling and removal of any discovered UXO's. (See http://www.denix.osd.mil/uxo/index.cfm)

5.1.10 *Other Property Conditions*

No other property conditions were observed or reported within the Subject Property that would impact the ECP rating.

5.2 *ADJACENT PROPERTY CONDITIONS*

Records review for adjacent properties revealed a sampling report for the cattle dipping site which is located on adjacent property approximately 500 meters north of the Subject Property. Soil and groundwater sampling was performed at this site. Six subsurface soil samples and two groundwater samples were collected. All samples were analyzed for Organophosphorous

Pesticides, Semi-Volatile Organic Compounds (SVOCs) and arsenic. The sampling report is included in Appendix E. Based on the results of the soil and groundwater sampling at the cattle dipping site, past activities at this site have not impacted the condition of the Subject Property.

The interior of the cattle dipping vat was painted at some point in time. There is a possibility the paint is LBP depending on when it was painted though there was no evidence of paint on the surrounding soil.

Therefore, no adjacent property conditions were observed or reported that would impact the Subject Property ECP rating.

5.3 ENVIRONMENTAL REMEDIATION AGREEMENTS

There are no environmental remediation orders or agreements applicable to the Subject Property included in the easement. The easement will include provisions reserving the Army's right to conduct remediation activities if necessary in the future (Appendix A).

This page intentionally left blank.

SECTION 6.0
REFERENCES

AEC (U.S. Army Environmental Command) 2014. Final Environmental Assessment for Implementation of 30MW PV Solar Facility at Fort Benning, Georgia. July 2014.

ASTM (ASTM International) 2010. Standard Classification of Environmental Condition of Property Area Types for Defense Base Closure and Realignment Facilities. Designation D5746-98 (Reapproved 2010).

ASTM 2013. *Standard Practice for Conducting Environmental Site Assessments: Phase I Environmental Site Assessment Process*. Designation E1527-13.

ASTM 2014. *Standard Practice for Conducting Environmental Baseline Surveys.* Designation D6008-96 (Reapproved 2014).

DoD (Department of Defense). 2006. Base Redevelopment and Realignment Manual. March 2006.

EDR (Environmental Data Resources) 2014a. The EDR Radius Map Report with GeoCheck. Fort Benning, Georgia. Inquiry Number: 3969636.2s. June 11, 2014.

EDR 2014b. Historical Topographic Map Report. Fort Benning, Georgia. Inquiry Number: 3969636.4. June 11, 2014.

EDR 2014c. The EDR Aerial Photo Decade Package. Fort Benning, Georgia. Inquiry Number: 3969636.9. June 13, 2014.

Fort Benning 2010. Installation Hazardous Waste Management Plan. Directorate of Public Works, Environmental Management Division, Fort Benning, Georgia. December 2010.

Fort Benning 2012. Final Environmental Condition of Property for Camp Butler, Warrior Training Center Expansion, Fort Benning, GA. Prepared by Directorate of Public Works, Environmental Management Division, Fort Benning, GA. December 2012.

Fort Benning 2014a. Integrated Natural Resources Management Plan 2014 Revision. Fort Benning, GA. 2014.

Fort Benning GIS 2014. GIS files for Fort Benning, GA Provided by Fort Benning Directorate of Public Works, Environmental Management Division. June 2014.

Fort Benning RFMSS 2014. Information for Training Compartments W04 and W05 for 2013 and 2014. Range Division, Fort Benning, Georgia. June 2014.

Panamerican 2012. Final Report - 63 Phase II Investigations At Fort Benning: Volume III – Phase II Investigation of 17 Sites (1RU64, 1RU119, 1RU230, 1RU376, 1RU381, 1RU382, 1RU384, 1RU396, 1RU420, 1RU422, 1RU423, 1RU427, 1RU443, 1RU450, 1RU454, 1RU456, AND 1RU499) for Fort Benning Military Reservation, Russell County, Alabama. Panamerican Consultants, Inc. November 2012.

Pasquill 2012. Robert G. Pasquill. *Arsenic and Old Bovine Lace - History of the Cattle Tick Eradication Program in the South*. September 2012.

U.S. Army Corps of Engineers (USACE) 2007. *Final Environmental Impact Statement, BRAC 2005 and Transformation Actions at Fort Benning, Georgia*. September 2007.

USACE 2009. *Fort Benning Maneuver Center of Excellence Final Environmental Impact Statement*. Mobile District. June 2009.

USACE 2014. *Soil and Groundwater Sampling Report for the Cow Dipping Site; Fort Benning Military Installation; Russell County, Alabama*. Savannah District. September 2014.

USEPA (US Environmental Protection Agency). 1994. OSWER Directive 9345.0-09. US EPA 24 540/F-94/32, PB94-963249. April 1994.

USEPA 1999. Memo concerning disposal of unused Flameless Ration Heaters. Headquarters, U.S. Army Soldier Systems Command. May 1999.

USFWS 2009. Biological Opinion on the U.S. Army Maneuver Center of Excellence at Fort Benning, Georgia. United States Fish and Wildlife Service. May 2009.

SECTION 7.0
PERSONS CONSULTED

John Brown, National Environmental Policy Act Program Manager. Directorate of Public Works, Environmental Management Division, Fort Benning, Georgia.

Britt Horton, National Environmental Policy Act Analyst. Directorate of Public Works, Environmental Management Division, Fort Benning, Georgia.

Tannis Danley, Air Quality. Directorate of Public Works, Environmental Management Division, Fort Benning, Georgia.

Ted Roever, Integrated Pest Management Coordinator. Directorate of Public Works, Environmental Management Division, Fort Benning, Georgia.

Mark Thorton, Threatened and Endangered Species Program. Directorate of Public Works, Environmental Management Division, Fort Benning, Georgia.

Graeme Wright, Archeologist. Directorate of Public Works, Environmental Management Division, Fort Benning, Georgia.

Michael Ecks, Archeologist. Directorate of Public Works, Environmental Management Division, Fort Benning, Georgia.

Theodore Williams, Hazardous Waste Program Manager. Directorate of Public Works, Environmental Management Division, Fort Benning, Georgia.

Gregory Brooks, NEPA Mitigation Monitor. Directorate of Public Works, Environmental Management Division, Fort Benning, Georgia.

Theresa Hamilton, Environmental Technician. Directorate of Public Works, Environmental Management Division, Fort Benning, Georgia.

Robert Thomas, Geospatial Program Manager. Directorate of Public Works, Environmental Management Division, Fort Benning, Georgia.

Roderick Thornton, Endangered Species Biologist. Directorate of Public Works, Environmental Management Division – Conservation Branch, Fort Benning, Georgia.

Neil A. Pearce, RPG, REM, Ft. Benning Restoration Program Manager. Directorate of Public Works, Fort Benning, Georgia.

Douglas Greenway, Chief. Range Division, Fort Benning, Georgia.

This page intentionally left blank.

SECTION 8.0
ACRONYMS AND ABBREVIATIONS

ACM	asbestos-containing materials
AST	aboveground storage tank
ASTM	ASTM International
CBMPP	Alabama Construction Best Management Practices Plan
CERCLA	Comprehensive Environmental Response, Compensation, and Liability Act
CFR	Code of Federal Regulations
DMM	Discarded Military Munitions
DoD	Department of Defense
ECP	Environmental Condition of Property
EDR	Environmental Data Resources, Inc.
EMD	Environmental Management Division
EOD	Explosive Ordnance Disposal
FRH	flameless ration heaters
FTX	field training exercise
GIS	Geographical Information System
GPC	Georgia Power Company
IRP	Installation Restoration Program
LBP	lead-based paint
MCL	Maximum Contaminant Level
MEC	munitions and explosives of concern
MRE	Meals Ready-to-Eat
msl	mean sea level
MW	megawatt
NEPA	National Environmental Policy Act
NOI	Notice of Intent
NPL	National Priorities List
NRHP	National Register of Historic Places
PCB	polychlorinated biphenyl
pCi/L	picocuries per liter
PV	photovoltaic
RCRA	Resource Conservation and Recovery Act
RFMSS	Range Facility Management Support System
ROW	Right-of-Way
STX	situational training exercises
SVOCs	Semi-Volatile Organic Compounds
SWP3	Storm Water Pollution Prevention Plan
USACE	U.S. Army Corps of Engineers
USEPA	U.S. Environmental Protection Agency
U.S.C.	*United States Code*
USFWS	U.S. Fish and Wildlife Service
USGS	U.S. Geological Survey
UST	underground storage tank
UXO	Unexploded Ordnance
VSI	visual site inspection

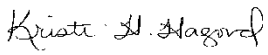
This page intentionally left blank.

SECTION 9.0 SIGNATURE OF ENVIRONMENTAL PROFESSIONAL

This document was prepared under my supervision.

I declare that, to the best of my professional knowledge and belief, I meet the definition of Environmental Professional, as defined in 40 CFR, Part 312.10.

I have the specific qualifications based on education, training, and experience to assess a property of the nature, history, and setting of the Subject Property. I have developed and performed the All Appropriate Inquiries Rule, in conformance with the standards and practices set forth in 40 CFR, Part 312.



Kristi Hagood
Environmental Scientist

This page intentionally left blank.

APPENDIX A
ENVIRONMENTAL PROTECTION PROVISIONS RECOMMENDED FOR THE OUTGRANT AND AGREEMENTS

This page intentionally left blank.

APPENDIX A

ENVIRONMENTAL PROTECTION PROVISIONS RECOMMENDED FOR THE OUTGRANT AND AGREEMENTS

The appropriate environmental protection provisions necessary for continued human health and environmental protection will be specified in the Report of Availability for this EITF project. Those provisions will be incorporated by reference into this appendix.

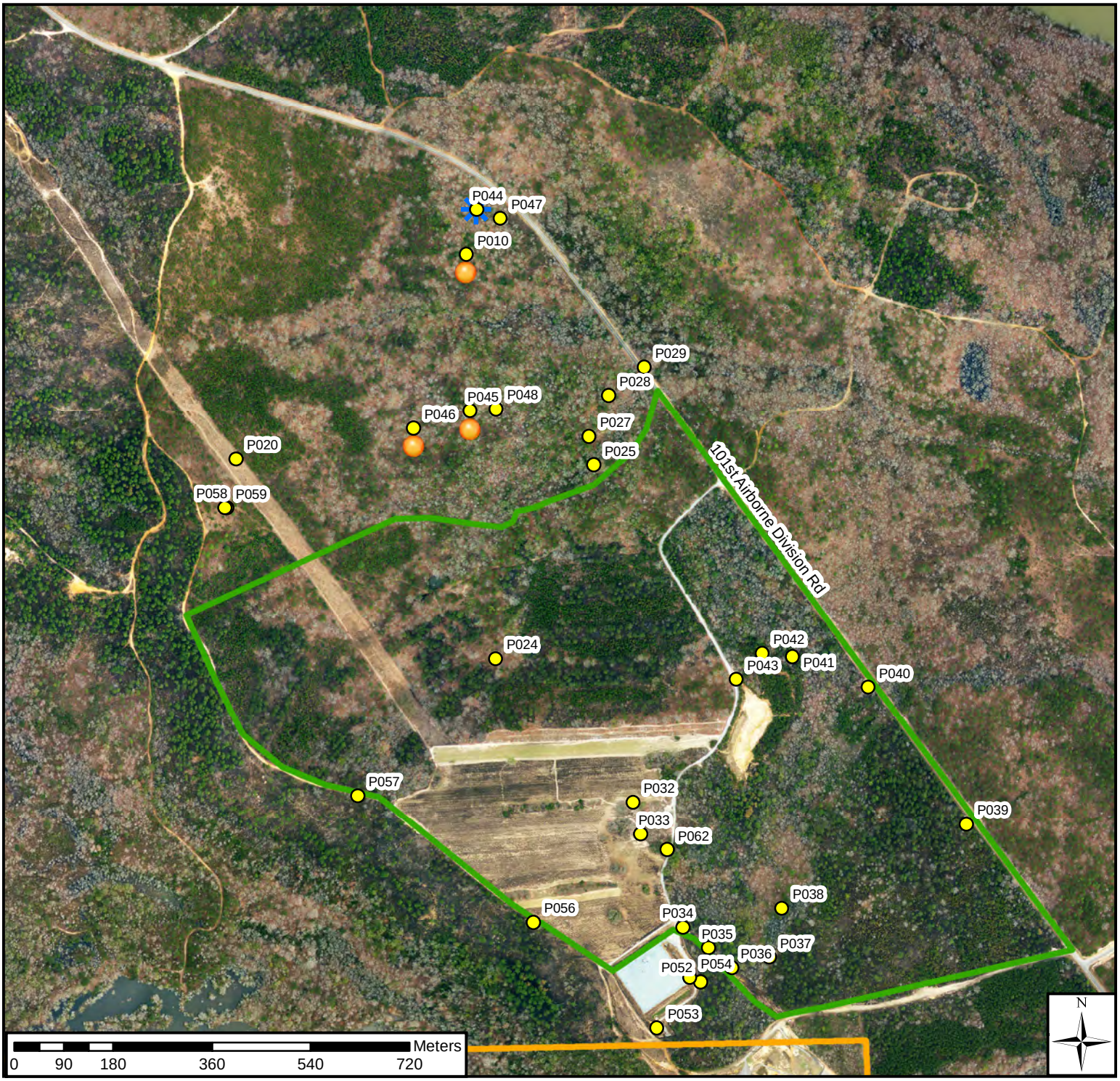
This page intentionally left blank.

APPENDIX B
VISUAL SITE INSPECTION PHOTOGRAPHS

This page intentionally left blank.

APPENDIX B
Photographic Documentation
Environmental Condition of Property Report
30MW Solar PV Array
Fort Benning, GA

VSI PHOTO POINT LEGEND



Legend

- Photo Points
- Cattle Dipping Vat
- Old Water Wells
- Subject Property
- Fort Benning Boundary
- Roads

Source: Fort Benning GIS 2014

Coordinate System: WGS 1984 UTM Zone 16N
Projection: Transverse Mercator
Units: Meter
Scale: 1:10,000

APPENDIX B
Photographic Documentation
Environmental Condition of Property Report
30MW Solar PV Array
Fort Benning, GA

Photo: 1 **Description:** Map Point 010 - Old Water Well on Adjacent Property	

Photo: 2 **Description:** Map Point 010 - Old Water Well on Adjacent Property	

Photo: 3 **Description:** Map Point 020 - Transmission Line ROW on Adjacent Property	

Photo: 4 **Description:** Map Point 020 - Transmission Line ROW on Adjacent Property	

Photo: 5 **Description:** Map Point 024 – Subject Property	

Photo: 6 **Description:** Map Point 024 – Subject Property	

Photo: 7 **Description:** Map Point 024 – Subject Property	

Photo: 8 **Description:** Map Point 024 – Subject Property	

Photo: 9 **Description:** Map Point 024 - Field Training Debris/MRE Debris on Subject Property	

Photo: 10 **Description:** Map Point 025 – Wet Area on Adjacent Property	

Photo: 11 **Description:** Map Point 025 – Wet Area on Adjacent Property	

Photo: 12 **Description:** Map Point 025 – Wet Area on Adjacent Property	

Photo: 13 **Description:** Map Point 025 – Wet Area on Adjacent Property	

Photo: 14 **Description:** Map Point 027 - Caution Area on Adjacent Property	

Photo: 15 **Description:** Map Point 027 - Adjacent Property	

Photo: 16 **Description:** Map Point 028 - Adjacent Property	

Photo: 17 **Description:** Map Point 028 - Adjacent Property	

Photo: 18 **Description:** Map Point 029 - Adjacent Property	

Photo: 19 **Description:** Map Point 029 - Adjacent Property	

Photo: 20 **Description:** Map Point 029 - Adjacent Property	

Photo: 21 **Description:** Map Point 029 - Adjacent Property	

Photo: 22 **Description:** Map Point 0032- Dove Field on Subject Property	

Photo: 23 **Description:** Map Point 0032- Dove Field on Subject Property	

Photo: 24 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 25 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 26 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 27 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 28 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 29 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 30 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 31 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 32 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 33 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 34 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 35 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 36 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 37 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 38 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 39 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 40 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 41 **Description:** Map Point 032 – Dove Field on Subject Property	

Photo: 42 **Description:** Map Point 033 – Burn Barrel at the Dove Field on Subject Property	

Photo: 43 **Description:** Map Point 034 – Transmission Line ROW on Subject Property	

Photo: 44 **Description:** Map Point 034 – Substation/Transmission Line ROW on Subject Property	

Photo: 45 **Description:** Map Point 035 –Subject Property	

Photo: 46 **Description:** Map Point 035 –Subject Property	

Photo: 47 **Description:** Map Point 035 –Subject Property	

Photo: 48 **Description:** Map Point 035 –Subject Property	

Photo: 49 **Description:** Map Point 036 – Transmission Line ROW on Subject Property	

Photo: 50 **Description:** Map Point 037 – Old Deer Stand on Subject Property	

Photo: 51 **Description:** Map Point 038 – Wet Area on Subject Property	

Photo: 52 **Description:** Map Point 038 – Wet Area on Subject Property	

Photo: 53 **Description:** Map Point 038 – Wet Area on Subject Property	

Photo: 54 **Description:** Map Point 038 – Wet Area on Subject Property	

Photo: 55 **Description:** Map Point 038 – Wet Area on Subject Property	

Photo: 56 **Description:** Map Point 039 – Adjacent Property	

Photo: 57 **Description:** Map Point 039 – Subject Property and Adjacent Property	

Photo: 58 **Description:** Map Point 039 – Subject Property	

Photo: 59 **Description:** Map Point 039 – Subject Property and Adjacent Property	

Photo: 60 **Description:** Map Point 040 - Drain Running Under the Road on Subject Property	

Photo: 61 **Description:** Map Point 041- Subject Property	

Photo: 62 **Description:** Map Point 041- Subject Property	

Photo: 63 **Description:** Map Point 041- Subject Property	

Photo: 64 **Description:** Map Point 042- Old Barrel on Subject Property	

Photo: 65 **Description:** Map Point 042- Metal Debris on Subject Property	

Photo: 66 **Description:** Map Point 042- Metal Debris on Subject Property	

Photo: 67 **Description:** Map Point 042- Old Barrel on Subject Property	

Photo: 68 **Description:** Map Point 042- Metal Debris on Subject Property	

Photo: 69 **Description:** Map Point 043 – Borrow Pit on Subject Property	

Photo: 70 **Description:** Map Point 043 – Borrow Pit on Subject Property	

Photo: 71 **Description:** Map Point 043 – Borrow Pit on Subject Property	

Photo: 72 **Description:** Map Point 043 – Borrow Pit on Subject Property	

Photo: 73 **Description:** Map Point 043 – Borrow Pit on Subject Property	

Photo: 74 **Description:** Map Point 043 – Borrow Pit Area on Subject Property	

Photo: 75 **Description:** Map Point 043 – Borrow Pit Area on Subject Property	

Photo: 76 **Description:** Map Point 043 – Borrow Pit Area on Subject Property	

Photo: 77 **Description:** Map Point 043 – Borrow Pit Area on Subject Property	

Photo: 78 **Description:** Map Point 043 – Borrow Pit on Subject Property	

Photo: 79 **Description:** Map Point 043 – Borrow Pit on Adjacent Property	

Photo: 80 **Description:** Map Point 044 - Cattle Dipping Vat on Adjacent Property	

Photo: 81 **Description:** Map Point 044 - Cattle Dipping Vat on Adjacent Property	

Photo: 82 **Description:** Map Point 044 - Cattle Dipping Vat on Adjacent Property	

Photo: 83 **Description:** Map Point 044 - Cattle Dipping Vat on Adjacent Property	

Photo: 84 **Description:** Map Point 044 - Firing Device found near the Cattle Dipping Vat on Adjacent Property	

Photo: 85 **Description:** Map Point 045 –Old Water Well on Adjacent Property	

Photo: 86 **Description:** Map Point 046 –Old Water Well on Adjacent Property	

Photo: 87 **Description:** Map Point 047 – Adjacent Property	

Photo: 88 **Description:** Map Point 047 – Adjacent Property	

Photo: 89 **Description:** Map Point 048 – Ammunition that is Representative of what is seen Throughout the Adjacent Property	

Photo: 90 **Description:** Map Point 052 –Substation on Adjacent Property	

Photo: 91 **Description:** Map Point 052 –Storm Water Drainage and Substation on Adjacent Property	

Photo: 92 **Description:** Map Point 052 – Adjacent Property	

Photo: 93 **Description:** Map Point 052 – Adjacent Property	

Photo: 94 **Description:** Map Point 053 – Storm Water Outfall near Boundary of Adjacent Property	

Photo: 95 **Description:** Map Point 054 – Storm Water Drainage near Substation on Adjacent Property	

Photo: 96 **Description:** Map Point 056 - Adjacent Property	

Photo: 97 **Description:** Map Point 056 - Adjacent Property	

Photo: 98 **Description:** Map Point 056 - Subject Property and Adjacent Property	

Photo: 99 **Description:** Map Point 056 - Subject Property	

Photo: 100 **Description:** Map Point 056 - Subject Property and Adjacent Property	

Photo: 101 **Description:** Map Point 057 - Adjacent Property	

Photo: 102 **Description:** Map Point 057 - Adjacent Property	

Photo: 103 **Description:** Map Point 058 - Fighting Position on Adjacent Property	

Photo: 104 **Description:** Map Point 058 - Fighting Position on Adjacent Property	

Photo: 105 **Description:** Map Point 059 - Fighting Position on Adjacent Property	

Photo: 106 **Description:** Map Point 062 - Old Mattresses on Subject Property	

APPENDIX C
ENVIRONMENTAL DATA RESOURCES DATABASE SEARCH REPORT

This page intentionally left blank.

Fort Benning
See Coordinates
Fort Mitchell, AL 36856

Inquiry Number: 3969636.2s
June 11, 2014

The EDR Radius Map™ Report with GeoCheck®

EDR® Environmental Data Resources Inc

6 Armstrong Road, 4th floor
Shelton, CT 06484
Toll Free: 800.352.0050
www.edrnet.com

TABLE OF CONTENTS

SECTION	PAGE
Executive Summary	ES1
Overview Map	2
Detail Map	3
Map Findings Summary	4
Map Findings	8
Orphan Summary	9
Government Records Searched/Data Currency Tracking	GR-1

GEOCHECK ADDENDUM

Physical Setting Source Addendum	A-1
Physical Setting Source Summary	A-2
Physical Setting SSURGO Soil Map	A-5
Physical Setting Source Map	A-9
Physical Setting Source Map Findings	A-11
Physical Setting Source Records Searched	PSGR-1

Thank you for your business.
Please contact EDR at 1-800-352-0050
with any questions or comments.

EXECUTIVE SUMMARY

A search of available environmental records was conducted by Environmental Data Resources, Inc (EDR). The report was designed to assist parties seeking to meet the search requirements of EPA's Standards and Practices for All Appropriate Inquiries (40 CFR Part 312), the ASTM Standard Practice for Environmental Site Assessments (E 1527-13) or custom requirements developed for the evaluation of environmental risk associated with a parcel of real estate.

TARGET PROPERTY INFORMATION

ADDRESS

SEE COORDINATES
FORT MITCHELL, AL 36856

COORDINATES

Latitude (North):	32.3074000 - 32° 18' 26.64''
Longitude (West):	84.9933000 - 84° 59' 35.88''
Universal Tranverse Mercator:	Zone 16
UTM X (Meters):	688929.2
UTM Y (Meters):	3576089.5
Elevation:	334 ft. above sea level

USGS TOPOGRAPHIC MAP ASSOCIATED WITH TARGET PROPERTY

Target Property Map:	32084-C8 FORT BENNING, GA AL
Most Recent Revision:	1993
West Map:	32085-C1 FORT MITCHELL, AL GA
Most Recent Revision:	1984

AERIAL PHOTOGRAPHY IN THIS REPORT

Portions of Photo from:	2010, 2011
Source:	USDA

TARGET PROPERTY SEARCH RESULTS

The target property was not listed in any of the databases searched by EDR.

DATABASES WITH NO MAPPED SITES

No mapped sites were found in EDR's search of available ("reasonably ascertainable ") government records either on the target property or within the search radius around the target property for the following databases:

STANDARD ENVIRONMENTAL RECORDS

Federal NPL site list

NPL---------- National Priority List

EXECUTIVE SUMMARY

Proposed NPL ---------- Proposed National Priority List Sites
NPL LIENS ---------- Federal Superfund Liens

Federal Delisted NPL site list

Delisted NPL ---------- National Priority List Deletions

Federal CERCLIS list

CERCLIS ---------- Comprehensive Environmental Response, Compensation, and Liability Information System
FEDERAL FACILITY ---------- Federal Facility Site Information listing

Federal CERCLIS NFRAP site List

CERC-NFRAP ---------- CERCLIS No Further Remedial Action Planned

Federal RCRA CORRACTS facilities list

CORRACTS ---------- Corrective Action Report

Federal RCRA non-CORRACTS TSD facilities list

RCRA-TSDF ---------- RCRA - Treatment, Storage and Disposal

Federal RCRA generators list

RCRA-LQG ---------- RCRA - Large Quantity Generators
RCRA-SQG ---------- RCRA - Small Quantity Generators
RCRA-CESQG ---------- RCRA - Conditionally Exempt Small Quantity Generator

Federal institutional controls / engineering controls registries

US ENG CONTROLS ---------- Engineering Controls Sites List
US INST CONTROL ---------- Sites with Institutional Controls
LUCIS ---------- Land Use Control Information System

Federal ERNS list

ERNS ---------- Emergency Response Notification System

State- and tribal - equivalent CERCLIS

AL SHWS ---------- Hazardous Substance Cleanup Fund
GA SHWS ---------- Hazardous Site Inventory

State and tribal landfill and/or solid waste disposal site lists

AL SWF/LF ---------- Permitted Landfills
GA SWF/LF ---------- Solid Waste Disposal Facilities

State and tribal leaking storage tank lists

AL LUST ---------- Leaking Underground Storage Tank Listing
GA LUST ---------- List of Leaking Underground Storage Tanks
AL LAST ---------- List of AST Release Incidents

INDIAN LUST ---- Leaking Underground Storage Tanks on Indian Land

State and tribal registered storage tank lists

AL UST ---- Underground Storage Tank Information
GA UST ---- Underground Storage Tank Database
AL AST ---- Aboveground Storage Tank Sites
GA AST ---- Above Ground Storage Tanks
INDIAN UST ---- Underground Storage Tanks on Indian Land
FEMA UST ---- Underground Storage Tank Listing

State and tribal institutional control / engineering control registries

AL ENG CONTROLS ---- Engineering Controls Site Listing
AL AUL ---- Environmental Covenants
AL INST CONTROL ---- Land Division Brownfields 128(a) Program Site Listing
GA AUL ---- Uniform Environmental Covenants
GA INST CONTROL ---- Public Record List

State and tribal voluntary cleanup sites

AL VCP ---- Cleanup Program Inventory
GA VCP ---- Voluntary Cleanup Program site
INDIAN VCP ---- Voluntary Cleanup Priority Listing

State and tribal Brownfields sites

AL BROWNFIELDS ---- Land Division Brownfields 128(a) Program Site Listing
GA BROWNFIELDS ---- Brownfields Public Record List

ADDITIONAL ENVIRONMENTAL RECORDS

Local Brownfield lists

US BROWNFIELDS ---- A Listing of Brownfields Sites

Local Lists of Landfill / Solid Waste Disposal Sites

ODI ---- Open Dump Inventory
DEBRIS REGION 9 ---- Torres Martinez Reservation Illegal Dump Site Locations
AL SWRCY ---- Recycling/Recovered Materials Processors Directory
GA SWRCY ---- Recycling Center Listing
INDIAN ODI ---- Report on the Status of Open Dumps on Indian Lands

Local Lists of Hazardous waste / Contaminated Sites

US CDL ---- Clandestine Drug Labs
AL AOCONCERN ---- Area of Concern
AL CDL ---- Clandestine Methamphetamine Lab Sites
US HIST CDL ---- National Clandestine Laboratory Register

Local Land Records

LIENS 2 ---- CERCLA Lien Information

EXECUTIVE SUMMARY

Records of Emergency Release Reports

HMIRS	Hazardous Materials Information Reporting System
AL SPILLS	Emergency Response Data
GA SPILLS	Spills Information

Other Ascertainable Records

RCRA NonGen / NLR	RCRA - Non Generators / No Longer Regulated
DOT OPS	Incident and Accident Data
FUDS	Formerly Used Defense Sites
CONSENT	Superfund (CERCLA) Consent Decrees
ROD	Records Of Decision
UMTRA	Uranium Mill Tailings Sites
US MINES	Mines Master Index File
TRIS	Toxic Chemical Release Inventory System
TSCA	Toxic Substances Control Act
FTTS	FIFRA/ TSCA Tracking System - FIFRA (Federal Insecticide, Fungicide, & Rodenticide Act)/TSCA (Toxic Substances Control Act)
HIST FTTS	FIFRA/TSCA Tracking System Administrative Case Listing
SSTS	Section 7 Tracking Systems
ICIS	Integrated Compliance Information System
PADS	PCB Activity Database System
MLTS	Material Licensing Tracking System
RADINFO	Radiation Information Database
FINDS	Facility Index System/Facility Registry System
RAATS	RCRA Administrative Action Tracking System
RMP	Risk Management Plans
AL NPDES	NPDES Permit Listing
AL UIC	UIC Listing
GA NPDES	NPDES Wastewater Permit List
AL DRYCLEANERS	Drycleaner Facility Listing
GA DRYCLEANERS	Drycleaner Database
AL TIER 2	Tier 2 Data Listing
GA TIER 2	Tier 2 Data Listing
INDIAN RESERV	Indian Reservations
SCRD DRYCLEANERS	State Coalition for Remediation of Drycleaners Listing
AL COAL ASH	Coal Ash Disposal Sites
AL Financial Assurance	Financial Assurance Information Listing
2020 COR ACTION	2020 Corrective Action Program List
LEAD SMELTERS	Lead Smelter Sites
PRP	Potentially Responsible Parties
US AIRS	Aerometric Information Retrieval System Facility Subsystem
US FIN ASSUR	Financial Assurance Information
COAL ASH DOE	Steam-Electric Plant Operation Data
EPA WATCH LIST	EPA WATCH LIST
GA COAL ASH	Coal Ash Disposal Site Listing
COAL ASH EPA	Coal Combustion Residues Surface Impoundments List
GA Financial Assurance	Financial Assurance Information Listing
PCB TRANSFORMER	PCB Transformer Registration Database

EDR HIGH RISK HISTORICAL RECORDS

EDR Exclusive Records

EDR MGP	EDR Proprietary Manufactured Gas Plants

EDR US Hist Auto Stat ..... EDR Exclusive Historic Gas Stations
EDR US Hist Cleaners ..... EDR Exclusive Historic Dry Cleaners

EDR RECOVERED GOVERNMENT ARCHIVES

Exclusive Recovered Govt. Archives

AL RGA LUST ..... Recovered Government Archive Leaking Underground Storage Tank
AL RGA HWS ..... Recovered Government Archive State Hazardous Waste Facilities List
GA RGA HWS ..... Recovered Government Archive State Hazardous Waste Facilities List
GA RGA LUST ..... Recovered Government Archive Leaking Underground Storage Tank

SURROUNDING SITES: SEARCH RESULTS

Surrounding sites were identified in the following databases.

Elevations have been determined from the USGS Digital Elevation Model and should be evaluated on a relative (not an absolute) basis. Relative elevation information between sites of close proximity should be field verified. Sites with an elevation equal to or higher than the target property have been differentiated below from sites with an elevation lower than the target property.
Page numbers and map identification numbers refer to the EDR Radius Map report where detailed data on individual sites can be reviewed.

Sites listed in ***bold italics*** are in multiple databases.

Unmappable (orphan) sites are not considered in the foregoing analysis.

ADDITIONAL ENVIRONMENTAL RECORDS

Other Ascertainable Records

DOD: Consists of federally owned or administered lands, administered by the Department of Defense, that have any area equal to or greater than 640 acres of the United States, Puerto Rico, and the U.S. Virgin Islands.

A review of the DOD list, as provided by EDR, and dated 12/31/2005 has revealed that there is 1 DOD site within approximately 1 mile of the target property.

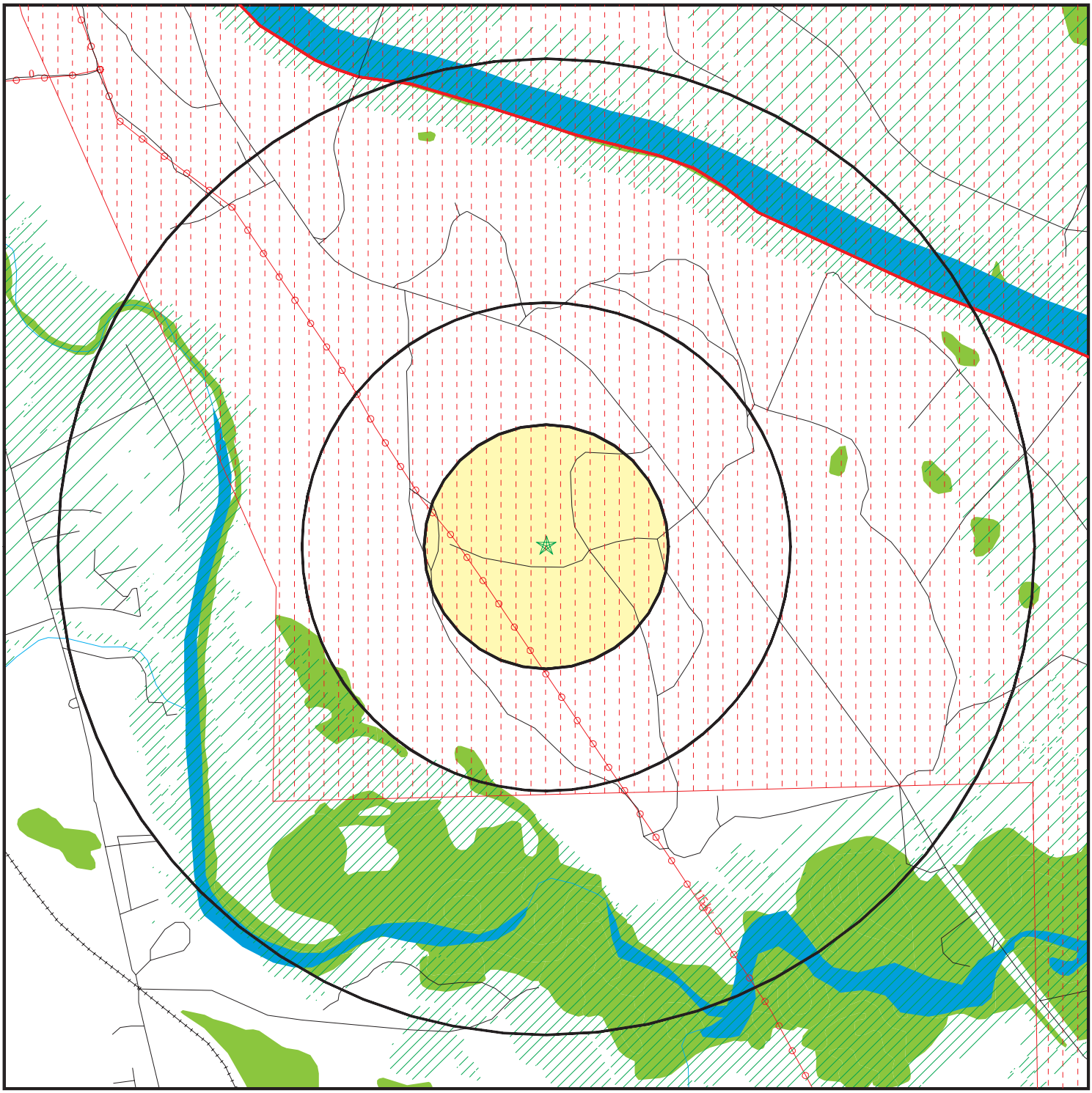
Equal/Higher Elevation	Address	Direction / Distance	Map ID	Page
FORT BENNING MILITARY RESERVAT		0 - 1/8 (0.000 mi.)	0	8

EXECUTIVE SUMMARY

Due to poor or inadequate address information, the following sites were not mapped. Count: 20 records.

Site Name	Database(s)
U.S. ARMY - FORT BENNING (FBSB-86)	GA SHWS
USA FORT BENNING	CERC-NFRAP
FT BENNING/LAWSON AAF	FINDS, GA LUST
FT BENNING/OPERATIONS/MAIN POST	FINDS, GA LUST
FT BENNING/TRANSPORT MOTOR POOL	FINDS, GA LUST
FT BENNING/3RD BDE	FINDS, GA LUST
FT BENNING/MOTOR POOL WASH RACK	FINDS, GA LUST
FT BENNING/1ST & 15TH INF MOTOR	FINDS, GA LUST
FT BENNING/ENLISTED BARRACKS	FINDS, GA LUST
FT BENNING/BRADLEY TRNG CTR	FINDS, GA LUST
FT BENNING/DOL	FINDS, GA LUST
FT BENNING/2-69TH ARMOR REG	FINDS, GA LUST
FT BENNING/NAT RES BRCH SVC STA	FINDS, GA LUST
BLDG 5086	GA LUST, GA UST, GA Financial Assurance
TALLAP. RIVER ELECTRIC COOPERATIVE	AL LUST
TALLAPOOSA RIVER ELECTRIC COOPERAT	AL UST, AL Financial Assurance
BI RITE FOODS INC	AL UST, AL Financial Assurance
FT MITCHELL SAND PLANT	AL AST
FEMC/FORT BENNING	PADS
FORT MITCHELL 12 TRANSMISSION WAT	FINDS

OVERVIEW MAP - 3969636.2s

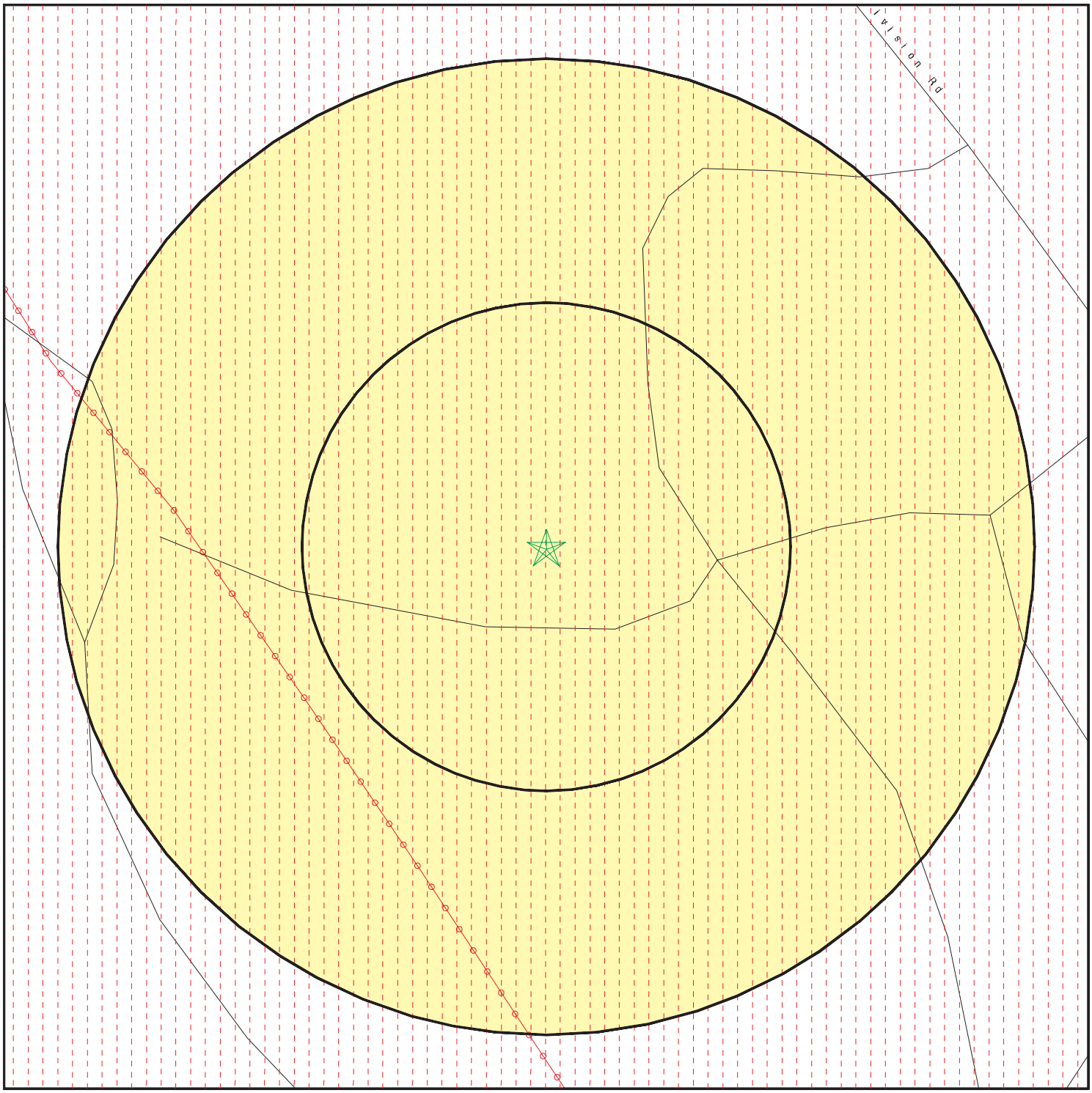


- Target Property
- Sites at elevations higher than or equal to the target property
- Sites at elevations lower than the target property
- Manufactured Gas Plants
- National Priority List Sites
- Dept. Defense Sites
- Indian Reservations BIA
- County Boundary
- Power transmission lines
- Oil & Gas pipelines from USGS
- 100-year flood zone
- 500-year flood zone
- National Wetland Inventory
- Areas of Concern

This report includes Interactive Map Layers to display and/or hide map information. The legend includes only those icons for the default map view.

SITE NAME: Fort Benning	CLIENT: Tetra Tech Inc.
ADDRESS: See Coordinates Fort Mitchell AL 36856	CONTACT: Derrick Haltiwanger
LAT/LONG: 32.3074 / 84.9933	INQUIRY #: 3969636.2s DATE: June 11, 2014 12:33 pm

DETAIL MAP - 3969636.2s



- Target Property
- Sites at elevations higher than or equal to the target property
- Sites at elevations lower than the target property
- Manufactured Gas Plants
- Sensitive Receptors
- National Priority List Sites
- Dept. Defense Sites
- Indian Reservations BIA
- Power transmission lines
- Oil & Gas pipelines from USGS
- 100-year flood zone
- 500-year flood zone
- Areas of Concern

This report includes Interactive Map Layers to display and/or hide map information. The legend includes only those icons for the default map view.

SITE NAME: Fort Benning	CLIENT: Tetra Tech Inc.
ADDRESS: See Coordinates Fort Mitchell AL 36856	CONTACT: Derrick Haltiwanger
LAT/LONG: 32.3074 / 84.9933	INQUIRY #: 3969636.2s DATE: June 11, 2014 12:42 pm

MAP FINDINGS SUMMARY

Database	Search Distance (Miles)	Target Property	< 1/8	1/8 - 1/4	1/4 - 1/2	1/2 - 1	> 1	Total Plotted
STANDARD ENVIRONMENTAL RECORDS								
Federal NPL site list								
NPL	1.000		0	0	0	0	NR	0
Proposed NPL	1.000		0	0	0	0	NR	0
NPL LIENS	TP		NR	NR	NR	NR	NR	0
Federal Delisted NPL site list								
Delisted NPL	1.000		0	0	0	0	NR	0
Federal CERCLIS list								
CERCLIS	0.500		0	0	0	NR	NR	0
FEDERAL FACILITY	0.500		0	0	0	NR	NR	0
Federal CERCLIS NFRAP site List								
CERC-NFRAP	0.500		0	0	0	NR	NR	0
Federal RCRA CORRACTS facilities list								
CORRACTS	1.000		0	0	0	0	NR	0
Federal RCRA non-CORRACTS TSD facilities list								
RCRA-TSDF	0.500		0	0	0	NR	NR	0
Federal RCRA generators list								
RCRA-LQG	0.250		0	0	NR	NR	NR	0
RCRA-SQG	0.250		0	0	NR	NR	NR	0
RCRA-CESQG	0.250		0	0	NR	NR	NR	0
Federal institutional controls / engineering controls registries								
US ENG CONTROLS	0.500		0	0	0	NR	NR	0
US INST CONTROL	0.500		0	0	0	NR	NR	0
LUCIS	0.500		0	0	0	NR	NR	0
Federal ERNS list								
ERNS	TP		NR	NR	NR	NR	NR	0
State- and tribal - equivalent CERCLIS								
AL SHWS	1.000		0	0	0	0	NR	0
GA SHWS	1.000		0	0	0	0	NR	0
State and tribal landfill and/or solid waste disposal site lists								
AL SWF/LF	0.500		0	0	0	NR	NR	0
GA SWF/LF	0.500		0	0	0	NR	NR	0
State and tribal leaking storage tank lists								
AL LUST	0.500		0	0	0	NR	NR	0
GA LUST	0.500		0	0	0	NR	NR	0

MAP FINDINGS SUMMARY

Database	Search Distance (Miles)	Target Property	< 1/8	1/8 - 1/4	1/4 - 1/2	1/2 - 1	> 1	Total Plotted
AL LAST	0.500		0	0	0	NR	NR	0
INDIAN LUST	0.500		0	0	0	NR	NR	0
State and tribal registered storage tank lists								
AL UST	0.250		0	0	NR	NR	NR	0
GA UST	0.250		0	0	NR	NR	NR	0
AL AST	0.250		0	0	NR	NR	NR	0
GA AST	0.250		0	0	NR	NR	NR	0
INDIAN UST	0.250		0	0	NR	NR	NR	0
FEMA UST	0.250		0	0	NR	NR	NR	0
State and tribal institutional control / engineering control registries								
AL ENG CONTROLS	0.500		0	0	0	NR	NR	0
AL AUL	0.500		0	0	0	NR	NR	0
AL INST CONTROL	0.500		0	0	0	NR	NR	0
GA AUL	0.500		0	0	0	NR	NR	0
GA INST CONTROL	0.500		0	0	0	NR	NR	0
State and tribal voluntary cleanup sites								
AL VCP	0.500		0	0	0	NR	NR	0
GA VCP	0.500		0	0	0	NR	NR	0
INDIAN VCP	0.500		0	0	0	NR	NR	0
State and tribal Brownfields sites								
AL BROWNFIELDS	0.500		0	0	0	NR	NR	0
GA BROWNFIELDS	0.500		0	0	0	NR	NR	0
ADDITIONAL ENVIRONMENTAL RECORDS								
Local Brownfield lists								
US BROWNFIELDS	0.500		0	0	0	NR	NR	0
Local Lists of Landfill / Solid Waste Disposal Sites								
ODI	0.500		0	0	0	NR	NR	0
DEBRIS REGION 9	0.500		0	0	0	NR	NR	0
AL SWRCY	0.500		0	0	0	NR	NR	0
GA SWRCY	0.500		0	0	0	NR	NR	0
INDIAN ODI	0.500		0	0	0	NR	NR	0
Local Lists of Hazardous waste / Contaminated Sites								
US CDL	TP		NR	NR	NR	NR	NR	0
AL AOCONCERN	1.000		0	0	0	0	NR	0
AL CDL	TP		NR	NR	NR	NR	NR	0
US HIST CDL	TP		NR	NR	NR	NR	NR	0
Local Land Records								
LIENS 2	TP		NR	NR	NR	NR	NR	0

MAP FINDINGS SUMMARY

Database	Search Distance (Miles)	Target Property	< 1/8	1/8 - 1/4	1/4 - 1/2	1/2 - 1	> 1	Total Plotted
Records of Emergency Release Reports								
HMIRS	TP		NR	NR	NR	NR	NR	0
AL SPILLS	TP		NR	NR	NR	NR	NR	0
GA SPILLS	TP		NR	NR	NR	NR	NR	0
Other Ascertainable Records								
RCRA NonGen / NLR	0.250		0	0	NR	NR	NR	0
DOT OPS	TP		NR	NR	NR	NR	NR	0
DOD	1.000		1	0	0	0	NR	1
FUDS	1.000		0	0	0	0	NR	0
CONSENT	1.000		0	0	0	0	NR	0
ROD	1.000		0	0	0	0	NR	0
UMTRA	0.500		0	0	0	NR	NR	0
US MINES	0.250		0	0	NR	NR	NR	0
TRIS	TP		NR	NR	NR	NR	NR	0
TSCA	TP		NR	NR	NR	NR	NR	0
FTTS	TP		NR	NR	NR	NR	NR	0
HIST FTTS	TP		NR	NR	NR	NR	NR	0
SSTS	TP		NR	NR	NR	NR	NR	0
ICIS	TP		NR	NR	NR	NR	NR	0
PADS	TP		NR	NR	NR	NR	NR	0
MLTS	TP		NR	NR	NR	NR	NR	0
RADINFO	TP		NR	NR	NR	NR	NR	0
FINDS	TP		NR	NR	NR	NR	NR	0
RAATS	TP		NR	NR	NR	NR	NR	0
RMP	TP		NR	NR	NR	NR	NR	0
AL NPDES	TP		NR	NR	NR	NR	NR	0
AL UIC	TP		NR	NR	NR	NR	NR	0
GA NPDES	TP		NR	NR	NR	NR	NR	0
AL DRYCLEANERS	0.250		0	0	NR	NR	NR	0
GA DRYCLEANERS	0.250		0	0	NR	NR	NR	0
AL TIER 2	TP		NR	NR	NR	NR	NR	0
GA TIER 2	TP		NR	NR	NR	NR	NR	0
INDIAN RESERV	1.000		0	0	0	0	NR	0
SCRD DRYCLEANERS	0.500		0	0	0	NR	NR	0
AL COAL ASH	0.500		0	0	0	NR	NR	0
AL Financial Assurance	TP		NR	NR	NR	NR	NR	0
2020 COR ACTION	0.250		0	0	NR	NR	NR	0
LEAD SMELTERS	TP		NR	NR	NR	NR	NR	0
PRP	TP		NR	NR	NR	NR	NR	0
US AIRS	TP		NR	NR	NR	NR	NR	0
US FIN ASSUR	TP		NR	NR	NR	NR	NR	0
COAL ASH DOE	TP		NR	NR	NR	NR	NR	0
EPA WATCH LIST	TP		NR	NR	NR	NR	NR	0
GA COAL ASH	0.500		0	0	0	NR	NR	0
COAL ASH EPA	0.500		0	0	0	NR	NR	0
GA Financial Assurance	TP		NR	NR	NR	NR	NR	0
PCB TRANSFORMER	TP		NR	NR	NR	NR	NR	0
EDR HIGH RISK HISTORICAL RECORDS								
EDR Exclusive Records								
EDR MGP	1.000		0	0	0	0	NR	0

MAP FINDINGS SUMMARY

Database	Search Distance (Miles)	Target Property	< 1/8	1/8 - 1/4	1/4 - 1/2	1/2 - 1	> 1	Total Plotted
EDR US Hist Auto Stat	0.250		0	0	NR	NR	NR	0
EDR US Hist Cleaners	0.250		0	0	NR	NR	NR	0
EDR RECOVERED GOVERNMENT ARCHIVES								
Exclusive Recovered Govt. Archives								
AL RGA LUST	TP		NR	NR	NR	NR	NR	0
AL RGA HWS	TP		NR	NR	NR	NR	NR	0
GA RGA HWS	TP		NR	NR	NR	NR	NR	0
GA RGA LUST	TP		NR	NR	NR	NR	NR	0

NOTES:

TP = Target Property

NR = Not Requested at this Search Distance

Sites may be listed in more than one database

DOD **FORT BENNING MILITARY RESERVATION** **DOD** **CUSA145946**
Region **N/A**

FORT BENNING MILITARY RES (County), AL

< 1/8
1 ft.

DOD:

Feature 1:	Army DOD
Feature 2:	Not reported
Feature 3:	Not reported
URL:	Not reported
Name 1:	Fort Benning Military Reservation
Name 2:	Not reported
Name 3:	Not reported
State:	AL-GA
DOD Site:	Yes
Tile name:	GACHATTAHOOCHEE

Count: 20 records. ORPHAN SUMMARY

City	EDR ID	Site Name	Site Address	Zip	Database(s)
FORT BENNING	1005481557	FEMC/FORT BENNING	2054 BELKO STREET	31905	PADS
FORT BENNING	1006784002	FT BENNING/LAWSON AAF	BLDG 2498		FINDS, GA LUST
FORT BENNING	1006776841	FT BENNING/OPERATIONS/MAIN POST	BLDG 2485		FINDS, GA LUST
FORT BENNING	1006776738	FT BENNING/TRANSPORT MOTOR POOL	BLDG 1260/1260/HARMONY CH		FINDS, GA LUST
FORT BENNING	1006776727	FT BENNING/3RD BDE	BLDG 9060		FINDS, GA LUST
FORT BENNING	1006776725	FT BENNING/MOTOR POOL WASH RACK	BLDG 9064		FINDS, GA LUST
FORT BENNING	1006776723	FT BENNING/1ST & 15TH INF MOTOR	BLDG 9086		FINDS, GA LUST
FORT BENNING	1006776623	FT BENNING/ENLISTED BARRACKS	BLDG 9114		FINDS, GA LUST
FORT BENNING	1006776413	FT BENNING/BRADLEY TRNG CTR	BLDG 5503/HARMONY CH		FINDS, GA LUST
FORT BENNING	1006771897	FT BENNING/DOL	BLDG 2390		FINDS, GA LUST
FORT BENNING	1006771724	FT BENNING/2-69TH ARMOR REG	BLDG 9099		FINDS, GA LUST
FORT BENNING	1006771720	FT BENNING/NAT RES BRCH SVC STA	BLDG 5881		FINDS, GA LUST
FORT BENNING	S103224217	U.S. ARMY - FORT BENNING (FBSB-86)	GA HWY 1 & U.S. 27	31905	GA SHWS
FORT BENNING	1015733240	USA FORT BENNING	GA HWY 1 & US 27	31905	CERC-NFRAP
FORT BENNING	U003295878	BLDG 5086	OLD CUSSETA HWY	31905	GA LUST, GA UST, GA Financial Assurance
FORT MITCHELL	U001718881	TALLAPOOSA RIVER ELECTRIC COOPERAT	HWY 165 S	36856	AL UST, AL Financial Assurance
FORT MITCHELL	S102232068	TALLAP. RIVER ELECTRIC COOPERATIVE	HWY 165 SOUTH		AL LUST
FORT MITCHELL	1015905010	FORT MITCHELL 12 TRANSMISSION WAT	ALONG HWY 165		FINDS
FT MITCHELL	U001865578	BI RITE FOODS INC	HWY 165	36856	AL UST, AL Financial Assurance
FT MITCHELL	1000723334	FT MITCHELL SAND PLANT	HWY 165 S	36856	AL AST

GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

To maintain currency of the following federal and state databases, EDR contacts the appropriate governmental agency on a monthly or quarterly basis, as required.

Number of Days to Update: Provides confirmation that EDR is reporting records that have been updated within 90 days from the date the government agency made the information available to the public.

STANDARD ENVIRONMENTAL RECORDS

Federal NPL site list

NPL: National Priority List

National Priorities List (Superfund). The NPL is a subset of CERCLIS and identifies over 1,200 sites for priority cleanup under the Superfund Program. NPL sites may encompass relatively large areas. As such, EDR provides polygon coverage for over 1,000 NPL site boundaries produced by EPA's Environmental Photographic Interpretation Center (EPIC) and regional EPA offices.

Date of Government Version: 10/25/2013
Date Data Arrived at EDR: 11/11/2013
Date Made Active in Reports: 01/28/2014
Number of Days to Update: 78

Source: EPA
Telephone: N/A
Last EDR Contact: 06/10/2014
Next Scheduled EDR Contact: 07/21/2014
Data Release Frequency: Quarterly

NPL Site Boundaries

Sources:

EPA's Environmental Photographic Interpretation Center (EPIC)
Telephone: 202-564-7333

EPA Region 1
Telephone 617-918-1143

EPA Region 6
Telephone: 214-655-6659

EPA Region 3
Telephone 215-814-5418

EPA Region 7
Telephone: 913-551-7247

EPA Region 4
Telephone 404-562-8033

EPA Region 8
Telephone: 303-312-6774

EPA Region 5
Telephone 312-886-6686

EPA Region 9
Telephone: 415-947-4246

EPA Region 10
Telephone 206-553-8665

Proposed NPL: Proposed National Priority List Sites

A site that has been proposed for listing on the National Priorities List through the issuance of a proposed rule in the Federal Register. EPA then accepts public comments on the site, responds to the comments, and places on the NPL those sites that continue to meet the requirements for listing.

Date of Government Version: 10/25/2013
Date Data Arrived at EDR: 11/11/2013
Date Made Active in Reports: 01/28/2014
Number of Days to Update: 78

Source: EPA
Telephone: N/A
Last EDR Contact: 06/10/2014
Next Scheduled EDR Contact: 07/21/2014
Data Release Frequency: Quarterly

NPL LIENS: Federal Superfund Liens

Federal Superfund Liens. Under the authority granted the USEPA by CERCLA of 1980, the USEPA has the authority to file liens against real property in order to recover remedial action expenditures or when the property owner received notification of potential liability. USEPA compiles a listing of filed notices of Superfund Liens.

Date of Government Version: 10/15/1991
Date Data Arrived at EDR: 02/02/1994
Date Made Active in Reports: 03/30/1994
Number of Days to Update: 56

Source: EPA
Telephone: 202-564-4267
Last EDR Contact: 08/15/2011
Next Scheduled EDR Contact: 11/28/2011
Data Release Frequency: No Update Planned

GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

Federal Delisted NPL site list

DELISTED NPL: National Priority List Deletions

The National Oil and Hazardous Substances Pollution Contingency Plan (NCP) establishes the criteria that the EPA uses to delete sites from the NPL. In accordance with 40 CFR 300.425.(e), sites may be deleted from the NPL where no further response is appropriate.

Date of Government Version: 10/25/2013
Date Data Arrived at EDR: 11/11/2013
Date Made Active in Reports: 01/28/2014
Number of Days to Update: 78

Source: EPA
Telephone: N/A
Last EDR Contact: 06/10/2014
Next Scheduled EDR Contact: 07/21/2014
Data Release Frequency: Quarterly

Federal CERCLIS list

CERCLIS: Comprehensive Environmental Response, Compensation, and Liability Information System

CERCLIS contains data on potentially hazardous waste sites that have been reported to the USEPA by states, municipalities, private companies and private persons, pursuant to Section 103 of the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA). CERCLIS contains sites which are either proposed to or on the National Priorities List (NPL) and sites which are in the screening and assessment phase for possible inclusion on the NPL.

Date of Government Version: 10/25/2013
Date Data Arrived at EDR: 11/11/2013
Date Made Active in Reports: 02/13/2014
Number of Days to Update: 94

Source: EPA
Telephone: 703-412-9810
Last EDR Contact: 05/29/2014
Next Scheduled EDR Contact: 09/08/2014
Data Release Frequency: Quarterly

FEDERAL FACILITY: Federal Facility Site Information listing

A listing of National Priority List (NPL) and Base Realignment and Closure (BRAC) sites found in the Comprehensive Environmental Response, Compensation and Liability Information System (CERCLIS) Database where EPA Federal Facilities Restoration and Reuse Office is involved in cleanup activities.

Date of Government Version: 05/31/2013
Date Data Arrived at EDR: 07/08/2013
Date Made Active in Reports: 12/06/2013
Number of Days to Update: 151

Source: Environmental Protection Agency
Telephone: 703-603-8704
Last EDR Contact: 04/11/2014
Next Scheduled EDR Contact: 07/21/2014
Data Release Frequency: Varies

Federal CERCLIS NFRAP site List

CERCLIS-NFRAP: CERCLIS No Further Remedial Action Planned

Archived sites are sites that have been removed and archived from the inventory of CERCLIS sites. Archived status indicates that, to the best of EPA's knowledge, assessment at a site has been completed and that EPA has determined no further steps will be taken to list this site on the National Priorities List (NPL), unless information indicates this decision was not appropriate or other considerations require a recommendation for listing at a later time. This decision does not necessarily mean that there is no hazard associated with a given site; it only means that, based upon available information, the location is not judged to be a potential NPL site.

Date of Government Version: 10/25/2013
Date Data Arrived at EDR: 11/11/2013
Date Made Active in Reports: 02/13/2014
Number of Days to Update: 94

Source: EPA
Telephone: 703-412-9810
Last EDR Contact: 05/29/2014
Next Scheduled EDR Contact: 09/08/2014
Data Release Frequency: Quarterly

Federal RCRA CORRACTS facilities list

CORRACTS: Corrective Action Report

CORRACTS identifies hazardous waste handlers with RCRA corrective action activity.

Date of Government Version: 03/11/2014
Date Data Arrived at EDR: 03/13/2014
Date Made Active in Reports: 04/09/2014
Number of Days to Update: 27

Source: EPA
Telephone: 800-424-9346
Last EDR Contact: 03/13/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Quarterly

Federal RCRA non-CORRACTS TSD facilities list

RCRA-TSDF: RCRA - Treatment, Storage and Disposal

RCRAInfo is EPA's comprehensive information system, providing access to data supporting the Resource Conservation and Recovery Act (RCRA) of 1976 and the Hazardous and Solid Waste Amendments (HSWA) of 1984. The database includes selective information on sites which generate, transport, store, treat and/or dispose of hazardous waste as defined by the Resource Conservation and Recovery Act (RCRA). Transporters are individuals or entities that move hazardous waste from the generator offsite to a facility that can recycle, treat, store, or dispose of the waste. TSDFs treat, store, or dispose of the waste.

Date of Government Version: 03/11/2014
Date Data Arrived at EDR: 03/13/2014
Date Made Active in Reports: 04/09/2014
Number of Days to Update: 27

Source: Environmental Protection Agency
Telephone: (404) 562-8651
Last EDR Contact: 03/13/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Quarterly

Federal RCRA generators list

RCRA-LQG: RCRA - Large Quantity Generators

RCRAInfo is EPA's comprehensive information system, providing access to data supporting the Resource Conservation and Recovery Act (RCRA) of 1976 and the Hazardous and Solid Waste Amendments (HSWA) of 1984. The database includes selective information on sites which generate, transport, store, treat and/or dispose of hazardous waste as defined by the Resource Conservation and Recovery Act (RCRA). Large quantity generators (LQGs) generate over 1,000 kilograms (kg) of hazardous waste, or over 1 kg of acutely hazardous waste per month.

Date of Government Version: 03/11/2014
Date Data Arrived at EDR: 03/13/2014
Date Made Active in Reports: 04/09/2014
Number of Days to Update: 27

Source: Environmental Protection Agency
Telephone: (404) 562-8651
Last EDR Contact: 03/13/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Quarterly

RCRA-SQG: RCRA - Small Quantity Generators

RCRAInfo is EPA's comprehensive information system, providing access to data supporting the Resource Conservation and Recovery Act (RCRA) of 1976 and the Hazardous and Solid Waste Amendments (HSWA) of 1984. The database includes selective information on sites which generate, transport, store, treat and/or dispose of hazardous waste as defined by the Resource Conservation and Recovery Act (RCRA). Small quantity generators (SQGs) generate between 100 kg and 1,000 kg of hazardous waste per month.

Date of Government Version: 03/11/2014
Date Data Arrived at EDR: 03/13/2014
Date Made Active in Reports: 04/09/2014
Number of Days to Update: 27

Source: Environmental Protection Agency
Telephone: (404) 562-8651
Last EDR Contact: 03/13/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Quarterly

RCRA-CESQG: RCRA - Conditionally Exempt Small Quantity Generators

RCRAInfo is EPA's comprehensive information system, providing access to data supporting the Resource Conservation and Recovery Act (RCRA) of 1976 and the Hazardous and Solid Waste Amendments (HSWA) of 1984. The database includes selective information on sites which generate, transport, store, treat and/or dispose of hazardous waste as defined by the Resource Conservation and Recovery Act (RCRA). Conditionally exempt small quantity generators (CESQGs) generate less than 100 kg of hazardous waste, or less than 1 kg of acutely hazardous waste per month.

Date of Government Version: 03/11/2014
Date Data Arrived at EDR: 03/13/2014
Date Made Active in Reports: 04/09/2014
Number of Days to Update: 27

Source: Environmental Protection Agency
Telephone: (404) 562-8651
Last EDR Contact: 03/13/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Varies

GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

Federal institutional controls / engineering controls registries

US ENG CONTROLS: Engineering Controls Sites List

A listing of sites with engineering controls in place. Engineering controls include various forms of caps, building foundations, liners, and treatment methods to create pathway elimination for regulated substances to enter environmental media or effect human health.

Date of Government Version: 12/17/2013
Date Data Arrived at EDR: 01/14/2014
Date Made Active in Reports: 01/28/2014
Number of Days to Update: 14

Source: Environmental Protection Agency
Telephone: 703-603-0695
Last EDR Contact: 06/05/2014
Next Scheduled EDR Contact: 09/22/2014
Data Release Frequency: Varies

US INST CONTROL: Sites with Institutional Controls

A listing of sites with institutional controls in place. Institutional controls include administrative measures, such as groundwater use restrictions, construction restrictions, property use restrictions, and post remediation care requirements intended to prevent exposure to contaminants remaining on site. Deed restrictions are generally required as part of the institutional controls.

Date of Government Version: 12/17/2013
Date Data Arrived at EDR: 01/14/2014
Date Made Active in Reports: 01/28/2014
Number of Days to Update: 14

Source: Environmental Protection Agency
Telephone: 703-603-0695
Last EDR Contact: 06/05/2014
Next Scheduled EDR Contact: 09/22/2014
Data Release Frequency: Varies

LUCIS: Land Use Control Information System

LUCIS contains records of land use control information pertaining to the former Navy Base Realignment and Closure properties.

Date of Government Version: 02/26/2014
Date Data Arrived at EDR: 02/28/2014
Date Made Active in Reports: 04/24/2014
Number of Days to Update: 55

Source: Department of the Navy
Telephone: 843-820-7326
Last EDR Contact: 05/19/2014
Next Scheduled EDR Contact: 09/01/2014
Data Release Frequency: Varies

Federal ERNS list

ERNS: Emergency Response Notification System

Emergency Response Notification System. ERNS records and stores information on reported releases of oil and hazardous substances.

Date of Government Version: 09/30/2013
Date Data Arrived at EDR: 10/01/2013
Date Made Active in Reports: 12/06/2013
Number of Days to Update: 66

Source: National Response Center, United States Coast Guard
Telephone: 202-267-2180
Last EDR Contact: 06/06/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Annually

State- and tribal - equivalent CERCLIS

AL HWS DETAIL: Alabama Hazardous Substance Cleanup Fund Annual Report

The Alabama Hazardous Substance Cleanup Fund (AHSCF) was established in 1989 by act of the Alabama Legislature (Code of Alabama 1975, ?22-30A) to provide a mechanism for ADEM to investigate, remediate, and monitor hazardous substance sites. These sites may potentially endanger human health and the environment, but may not qualify to be addressed by other federal or state cleanup programs.

Date of Government Version: 12/31/2013
Date Data Arrived at EDR: 03/21/2014
Date Made Active in Reports: 04/15/2014
Number of Days to Update: 25

Source: Department of Environmental Management
Telephone: 334-271-7730
Last EDR Contact: 03/17/2014
Next Scheduled EDR Contact: 06/30/2014
Data Release Frequency: Annually

AL SHWS: Hazardous Substance Cleanup Fund

Hazardous substance sites, which pose a threat to public health and the environment, which will be cleaned up utilizing the Hazardous Substance Cleanup Fund.

Date of Government Version: 03/19/2014
Date Data Arrived at EDR: 04/03/2014
Date Made Active in Reports: 04/15/2014
Number of Days to Update: 12

Source: Department of Environmental Management
Telephone: 334-271-7984
Last EDR Contact: 03/17/2014
Next Scheduled EDR Contact: 06/30/2014
Data Release Frequency: Semi-Annually

GA SHWS: Hazardous Site Inventory

State Hazardous Waste Sites. State hazardous waste site records are the states' equivalent to CERCLIS. These sites may or may not already be listed on the federal CERCLIS list. Priority sites planned for cleanup using state funds (state equivalent of Superfund) are identified along with sites where cleanup will be paid for by potentially responsible parties. Available information varies by state.

Date of Government Version: 07/01/2013
Date Data Arrived at EDR: 07/01/2013
Date Made Active in Reports: 08/19/2013
Number of Days to Update: 49

Source: Department of Environmental Protection
Telephone: 404-657-8600
Last EDR Contact: 03/31/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Annually

State and tribal landfill and/or solid waste disposal site lists

AL SWF/LF: Permitted Landfills

Solid Waste Facilities/Landfill Sites. SWF/LF type records typically contain an inventory of solid waste disposal facilities or landfills in a particular state. Depending on the state, these may be active or inactive facilities or open dumps that failed to meet RCRA Subtitle D Section 4004 criteria for solid waste landfills or disposal sites.

Date of Government Version: 06/29/2011
Date Data Arrived at EDR: 10/25/2011
Date Made Active in Reports: 11/09/2011
Number of Days to Update: 15

Source: Department of Environmental Management
Telephone: 334-271-7730
Source: Department of Environmental Management, GIS Section
Telephone: 334-271-7700
Last EDR Contact: 04/18/2014
Next Scheduled EDR Contact: 07/28/2014
Data Release Frequency: Annually

GA SWF/LF: Solid Waste Disposal Facilities

Solid Waste Facilities/Landfill Sites. SWF/LF type records typically contain an inventory of solid waste disposal facilities or landfills in a particular state. Depending on the state, these may be active or inactive facilities or open dumps that failed to meet RCRA Subtitle D Section 4004 criteria for solid waste landfills or disposal sites.

Date of Government Version: 01/28/2014
Date Data Arrived at EDR: 04/03/2014
Date Made Active in Reports: 04/08/2014
Number of Days to Update: 5

Source: Department of Natural Resources
Telephone: 404-362-2696
Source: Center for GIS, Georgia Institute of Technology
Telephone: 404-385-0900
Last EDR Contact: 05/09/2014
Next Scheduled EDR Contact: 08/18/2014
Data Release Frequency: Semi-Annually

State and tribal leaking storage tank lists

AL LUST: Leaking Underground Storage Tank Listing

Leaking Underground Storage Tank Incident Reports. LUST records contain an inventory of reported leaking underground storage tank incidents. Not all states maintain these records, and the information stored varies by state.

Date of Government Version: 03/03/2014
Date Data Arrived at EDR: 04/01/2014
Date Made Active in Reports: 04/15/2014
Number of Days to Update: 14

Source: Department of Environmental Management
Telephone: 334-270-5655
Last EDR Contact: 04/01/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Quarterly

GA LUST: List of Leaking Underground Storage Tanks

Leaking Underground Storage Tank Incident Reports. LUST records contain an inventory of reported leaking underground storage tank incidents. Not all states maintain these records, and the information stored varies by state.

Date of Government Version: 11/30/2013
Date Data Arrived at EDR: 12/17/2013
Date Made Active in Reports: 01/15/2014
Number of Days to Update: 29

Source: Environmental Protection Division
Telephone: 404-362-2687
Last EDR Contact: 04/22/2014
Next Scheduled EDR Contact: 06/30/2014
Data Release Frequency: Quarterly

AL LAST: List of AST Release Incidents

A listing of aboveground storage tank releases that have been reported to ADEM. These are primarily smaller retail ASTs and smaller bulk plant ASTs.

Date of Government Version: 03/03/2014
Date Data Arrived at EDR: 04/01/2014
Date Made Active in Reports: 04/15/2014
Number of Days to Update: 14

Source: Department of Environmental Management
Telephone: 334-271-7712
Last EDR Contact: 03/31/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Varies

INDIAN LUST R5: Leaking Underground Storage Tanks on Indian Land

Leaking underground storage tanks located on Indian Land in Michigan, Minnesota and Wisconsin.

Date of Government Version: 02/13/2014
Date Data Arrived at EDR: 02/14/2014
Date Made Active in Reports: 02/24/2014
Number of Days to Update: 10

Source: EPA, Region 5
Telephone: 312-886-7439
Last EDR Contact: 04/28/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Varies

INDIAN LUST R10: Leaking Underground Storage Tanks on Indian Land

LUSTs on Indian land in Alaska, Idaho, Oregon and Washington.

Date of Government Version: 11/06/2013
Date Data Arrived at EDR: 11/07/2013
Date Made Active in Reports: 12/06/2013
Number of Days to Update: 29

Source: EPA Region 10
Telephone: 206-553-2857
Last EDR Contact: 04/28/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Quarterly

INDIAN LUST R9: Leaking Underground Storage Tanks on Indian Land

LUSTs on Indian land in Arizona, California, New Mexico and Nevada

Date of Government Version: 03/01/2013
Date Data Arrived at EDR: 03/01/2013
Date Made Active in Reports: 04/12/2013
Number of Days to Update: 42

Source: Environmental Protection Agency
Telephone: 415-972-3372
Last EDR Contact: 04/28/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Quarterly

INDIAN LUST R8: Leaking Underground Storage Tanks on Indian Land

LUSTs on Indian land in Colorado, Montana, North Dakota, South Dakota, Utah and Wyoming.

Date of Government Version: 08/27/2012
Date Data Arrived at EDR: 08/28/2012
Date Made Active in Reports: 10/16/2012
Number of Days to Update: 49

Source: EPA Region 8
Telephone: 303-312-6271
Last EDR Contact: 04/28/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Quarterly

INDIAN LUST R7: Leaking Underground Storage Tanks on Indian Land

LUSTs on Indian land in Iowa, Kansas, and Nebraska

Date of Government Version: 02/20/2014
Date Data Arrived at EDR: 02/21/2014
Date Made Active in Reports: 04/24/2014
Number of Days to Update: 62

Source: EPA Region 7
Telephone: 913-551-7003
Last EDR Contact: 04/28/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Varies

INDIAN LUST R6: Leaking Underground Storage Tanks on Indian Land
LUSTs on Indian land in New Mexico and Oklahoma.

Date of Government Version: 09/12/2011
Date Data Arrived at EDR: 09/13/2011
Date Made Active in Reports: 11/11/2011
Number of Days to Update: 59
Source: EPA Region 6
Telephone: 214-665-6597
Last EDR Contact: 02/21/2014
Next Scheduled EDR Contact: 05/12/2014
Data Release Frequency: Varies

INDIAN LUST R4: Leaking Underground Storage Tanks on Indian Land
LUSTs on Indian land in Florida, Mississippi and North Carolina.

Date of Government Version: 11/21/2013
Date Data Arrived at EDR: 11/26/2013
Date Made Active in Reports: 02/24/2014
Number of Days to Update: 90
Source: EPA Region 4
Telephone: 404-562-8677
Last EDR Contact: 04/22/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Semi-Annually

INDIAN LUST R1: Leaking Underground Storage Tanks on Indian Land
A listing of leaking underground storage tank locations on Indian Land.

Date of Government Version: 02/01/2013
Date Data Arrived at EDR: 05/01/2013
Date Made Active in Reports: 11/01/2013
Number of Days to Update: 184
Source: EPA Region 1
Telephone: 617-918-1313
Last EDR Contact: 05/02/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Varies

State and tribal registered storage tank lists

AL UST: Underground Storage Tank Information
Registered Underground Storage Tanks. UST's are regulated under Subtitle I of the Resource Conservation and Recovery Act (RCRA) and must be registered with the state department responsible for administering the UST program. Available information varies by state program.

Date of Government Version: 11/25/2013
Date Data Arrived at EDR: 12/31/2013
Date Made Active in Reports: 01/27/2014
Number of Days to Update: 27
Source: Department of Environmental Management
Telephone: 334-270-5655
Last EDR Contact: 04/04/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Quarterly

GA UST: Underground Storage Tank Database
Registered Underground Storage Tanks. UST's are regulated under Subtitle I of the Resource Conservation and Recovery Act (RCRA) and must be registered with the state department responsible for administering the UST program. Available information varies by state program.

Date of Government Version: 07/01/2013
Date Data Arrived at EDR: 09/13/2013
Date Made Active in Reports: 10/03/2013
Number of Days to Update: 20
Source: Environmental Protection Division
Telephone: 404-362-2687
Last EDR Contact: 03/21/2014
Next Scheduled EDR Contact: 06/30/2014
Data Release Frequency: Annually

AL AST: Aboveground Storage Tank Sites
Aboveground storage tank locations.

Date of Government Version: 11/25/2013
Date Data Arrived at EDR: 12/31/2013
Date Made Active in Reports: 01/27/2014
Number of Days to Update: 27
Source: Department of Environmental Management
Telephone: 334-271-7926
Last EDR Contact: 04/04/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Quarterly

GA AST: Above Ground Storage Tanks
A listing of LP gas tank site locations.

Date of Government Version: 06/04/2012
Date Data Arrived at EDR: 06/05/2012
Date Made Active in Reports: 06/14/2012
Number of Days to Update: 9

Source: Office of Insurance & Safety Fire Commissioner
Telephone: 404-656-5875
Last EDR Contact: 05/27/2014
Next Scheduled EDR Contact: 09/08/2014
Data Release Frequency: Varies

INDIAN UST R8: Underground Storage Tanks on Indian Land
The Indian Underground Storage Tank (UST) database provides information about underground storage tanks on Indian land in EPA Region 8 (Colorado, Montana, North Dakota, South Dakota, Utah, Wyoming and 27 Tribal Nations).

Date of Government Version: 07/29/2013
Date Data Arrived at EDR: 08/01/2013
Date Made Active in Reports: 11/01/2013
Number of Days to Update: 92

Source: EPA Region 8
Telephone: 303-312-6137
Last EDR Contact: 04/28/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Quarterly

INDIAN UST R7: Underground Storage Tanks on Indian Land
The Indian Underground Storage Tank (UST) database provides information about underground storage tanks on Indian land in EPA Region 7 (Iowa, Kansas, Missouri, Nebraska, and 9 Tribal Nations).

Date of Government Version: 02/20/2014
Date Data Arrived at EDR: 02/21/2014
Date Made Active in Reports: 04/24/2014
Number of Days to Update: 62

Source: EPA Region 7
Telephone: 913-551-7003
Last EDR Contact: 04/28/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Varies

INDIAN UST R6: Underground Storage Tanks on Indian Land
The Indian Underground Storage Tank (UST) database provides information about underground storage tanks on Indian land in EPA Region 6 (Louisiana, Arkansas, Oklahoma, New Mexico, Texas and 65 Tribes).

Date of Government Version: 01/29/2014
Date Data Arrived at EDR: 01/29/2014
Date Made Active in Reports: 03/12/2014
Number of Days to Update: 42

Source: EPA Region 6
Telephone: 214-665-7591
Last EDR Contact: 01/27/2014
Next Scheduled EDR Contact: 05/12/2014
Data Release Frequency: Semi-Annually

INDIAN UST R4: Underground Storage Tanks on Indian Land
The Indian Underground Storage Tank (UST) database provides information about underground storage tanks on Indian land in EPA Region 4 (Alabama, Florida, Georgia, Kentucky, Mississippi, North Carolina, South Carolina, Tennessee and Tribal Nations)

Date of Government Version: 11/21/2013
Date Data Arrived at EDR: 11/26/2013
Date Made Active in Reports: 02/24/2014
Number of Days to Update: 90

Source: EPA Region 4
Telephone: 404-562-9424
Last EDR Contact: 04/22/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Semi-Annually

INDIAN UST R5: Underground Storage Tanks on Indian Land
The Indian Underground Storage Tank (UST) database provides information about underground storage tanks on Indian land in EPA Region 5 (Michigan, Minnesota and Wisconsin and Tribal Nations).

Date of Government Version: 02/13/2014
Date Data Arrived at EDR: 02/14/2014
Date Made Active in Reports: 02/24/2014
Number of Days to Update: 10

Source: EPA Region 5
Telephone: 312-886-6136
Last EDR Contact: 04/28/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Varies

INDIAN UST R1: Underground Storage Tanks on Indian Land

The Indian Underground Storage Tank (UST) database provides information about underground storage tanks on Indian land in EPA Region 1 (Connecticut, Maine, Massachusetts, New Hampshire, Rhode Island, Vermont and ten Tribal Nations).

Date of Government Version: 02/01/2013
Date Data Arrived at EDR: 05/01/2013
Date Made Active in Reports: 01/27/2014
Number of Days to Update: 271

Source: EPA, Region 1
Telephone: 617-918-1313
Last EDR Contact: 05/02/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Varies

INDIAN UST R10: Underground Storage Tanks on Indian Land

The Indian Underground Storage Tank (UST) database provides information about underground storage tanks on Indian land in EPA Region 10 (Alaska, Idaho, Oregon, Washington, and Tribal Nations).

Date of Government Version: 02/05/2013
Date Data Arrived at EDR: 02/06/2013
Date Made Active in Reports: 04/12/2013
Number of Days to Update: 65

Source: EPA Region 10
Telephone: 206-553-2857
Last EDR Contact: 04/28/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Quarterly

INDIAN UST R9: Underground Storage Tanks on Indian Land

The Indian Underground Storage Tank (UST) database provides information about underground storage tanks on Indian land in EPA Region 9 (Arizona, California, Hawaii, Nevada, the Pacific Islands, and Tribal Nations).

Date of Government Version: 07/29/2013
Date Data Arrived at EDR: 07/30/2013
Date Made Active in Reports: 12/06/2013
Number of Days to Update: 129

Source: EPA Region 9
Telephone: 415-972-3368
Last EDR Contact: 04/28/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Quarterly

FEMA UST: Underground Storage Tank Listing

A listing of all FEMA owned underground storage tanks.

Date of Government Version: 01/01/2010
Date Data Arrived at EDR: 02/16/2010
Date Made Active in Reports: 04/12/2010
Number of Days to Update: 55

Source: FEMA
Telephone: 202-646-5797
Last EDR Contact: 04/15/2014
Next Scheduled EDR Contact: 07/28/2014
Data Release Frequency: Varies

State and tribal institutional control / engineering control registries

AL ENG CONTROLS: Engineering Controls Site Listing

A listing of sites with engineering controls included in the Land Division Cleanup Program Inventory listing.

Date of Government Version: 08/24/2009
Date Data Arrived at EDR: 08/26/2009
Date Made Active in Reports: 09/11/2009
Number of Days to Update: 16

Source: Department of Environmental Management
Telephone: 334-271-7735
Last EDR Contact: 12/12/2013
Next Scheduled EDR Contact: 03/31/2014
Data Release Frequency: Varies

AL INST CONTROL: Land Division Brownfields 128(a) Program Site Listing

Institutional Controls (ICs) are non-engineered instruments, such as administrative and/or legal controls, that help minimize the potential for human exposure to contamination and/or protect the integrity of a remedy by limiting land or resource use. There are five different types of controls. These are governmental, proprietary, enforcement tools with IC components, informational devices and unrestricted. Unrestricted- No institutional controls (unrestricted for industrial and residential use). Governmental- controls implemented and enforced by state and local governments. (zoning restrictions, ordinances, building permits, etc.). Proprietary- controls which have their basis in real property law (easements, covenants). Enforcement and Permit Tools with IC components- these controls are issued to compel land owners to limit certain site activities on both federal and private sites. Informational devices- informational tools with provide information or notification that residual or capped contamination may remain on site (deed or hazard notices).

Date of Government Version: 08/24/2009
Date Data Arrived at EDR: 08/26/2009
Date Made Active in Reports: 09/11/2009
Number of Days to Update: 16

Source: Department of Environmental Management
Telephone: 334-271-7735
Last EDR Contact: 06/17/2012
Next Scheduled EDR Contact: 10/01/2012
Data Release Frequency: Varies

AL AUL: Environmental Covenants

An environmental covenant is required for a site if the approved environmental response project plan places a land use control on the site because it is not being remediated to unrestricted use.

Date of Government Version: 03/24/2014
Date Data Arrived at EDR: 03/28/2014
Date Made Active in Reports: 04/15/2014
Number of Days to Update: 18

Source: Department of Environmental Management
Telephone: 334-279-3053
Last EDR Contact: 03/17/2014
Next Scheduled EDR Contact: 06/30/2014
Data Release Frequency: Varies

GA INST CONTROL: Public Record List

Sites on the Public Record Listing that have institutional controls or limitations on use are sites with Risk Reduction Standards of 3, 4, and 5.

Date of Government Version: 02/04/2014
Date Data Arrived at EDR: 02/11/2014
Date Made Active in Reports: 02/17/2014
Number of Days to Update: 6

Source: Department of Natural Resources
Telephone: 404-657-8600
Last EDR Contact: 05/13/2014
Next Scheduled EDR Contact: 08/25/2014
Data Release Frequency: Varies

GA AUL: Uniform Environmental Covenants

A list of environmental covenants

Date of Government Version: 02/07/2014
Date Data Arrived at EDR: 02/11/2014
Date Made Active in Reports: 02/17/2014
Number of Days to Update: 6

Source: Department of Natural Resources
Telephone: 404-657-8600
Last EDR Contact: 05/16/2014
Next Scheduled EDR Contact: 08/25/2014
Data Release Frequency: Varies

State and tribal voluntary cleanup sites

AL VCP: Cleanup Program Inventory

Currently the Cleanup Inventory List contains information about sites undergoing assessment and possible cleanup under Alabama's Brownfield Redevelopment and Voluntary Cleanup Program. It also includes sites that have exited the program but were remediated to less than unrestricted levels.

Date of Government Version: 03/24/2014
Date Data Arrived at EDR: 03/28/2014
Date Made Active in Reports: 04/15/2014
Number of Days to Update: 18

Source: Department of Environmental Management
Telephone: 334-271-7700
Last EDR Contact: 03/17/2014
Next Scheduled EDR Contact: 06/30/2014
Data Release Frequency: Semi-Annually

GA VCP: Voluntary Cleanup Program site

Georgia's Voluntary Remediation Program Act was created to encourage voluntary investigation and remediation of contaminated properties.

Date of Government Version: 02/07/2014
Date Data Arrived at EDR: 03/04/2014
Date Made Active in Reports: 03/26/2014
Number of Days to Update: 22

Source: DNR
Telephone: 404-657-8600
Last EDR Contact: 06/06/2014
Next Scheduled EDR Contact: 09/15/2014
Data Release Frequency: Varies

INDIAN VCP R1: Voluntary Cleanup Priority Listing

A listing of voluntary cleanup priority sites located on Indian Land located in Region 1.

Date of Government Version: 09/17/2013
Date Data Arrived at EDR: 10/01/2013
Date Made Active in Reports: 12/06/2013
Number of Days to Update: 66

Source: EPA, Region 1
Telephone: 617-918-1102
Last EDR Contact: 04/01/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Varies

INDIAN VCP R7: Voluntary Cleanup Priority Lisitng

A listing of voluntary cleanup priority sites located on Indian Land located in Region 7.

Date of Government Version: 03/20/2008
Date Data Arrived at EDR: 04/22/2008
Date Made Active in Reports: 05/19/2008
Number of Days to Update: 27

Source: EPA, Region 7
Telephone: 913-551-7365
Last EDR Contact: 04/20/2009
Next Scheduled EDR Contact: 07/20/2009
Data Release Frequency: Varies

State and tribal Brownfields sites

AL BROWNFIELDS: Land Division Brownfields 128(a) Program Site Listing

A listing of Brownfields activities performed by ADEM.

Date of Government Version: 03/24/2014
Date Data Arrived at EDR: 03/28/2014
Date Made Active in Reports: 04/15/2014
Number of Days to Update: 18

Source: Department of Environmental Management
Telephone: 334-271-7735
Last EDR Contact: 03/17/2014
Next Scheduled EDR Contact: 06/30/2014
Data Release Frequency: Varies

AL BROWNFIELDS 2: Directory of Brownfields Sites

The directory provides a brief look at sites being marketed as brownfields.

Date of Government Version: 04/01/2011
Date Data Arrived at EDR: 06/16/2011
Date Made Active in Reports: 07/26/2011
Number of Days to Update: 40

Source: Department of Environmental Management
Telephone: 334-271-7735
Last EDR Contact: 03/17/2014
Next Scheduled EDR Contact: 06/30/2014
Data Release Frequency: Varies

GA BROWNFIELDS: Brownfields Public Record List

The Brownfields Public Record lists properties where response actions under the Georgia Hazardous Site Reuse and Redevelopment Act are planned, ongoing or completed.

Date of Government Version: 02/04/2014
Date Data Arrived at EDR: 02/11/2014
Date Made Active in Reports: 02/17/2014
Number of Days to Update: 6

Source: Department of Natural Resources
Telephone: 404-657-8600
Last EDR Contact: 05/13/2014
Next Scheduled EDR Contact: 08/25/2014
Data Release Frequency: Varies

GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

ADDITIONAL ENVIRONMENTAL RECORDS

Local Brownfield lists

US BROWNFIELDS: A Listing of Brownfields Sites

Brownfields are real property, the expansion, redevelopment, or reuse of which may be complicated by the presence or potential presence of a hazardous substance, pollutant, or contaminant. Cleaning up and reinvesting in these properties takes development pressures off of undeveloped, open land, and both improves and protects the environment. Assessment, Cleanup and Redevelopment Exchange System (ACRES) stores information reported by EPA Brownfields grant recipients on brownfields properties assessed or cleaned up with grant funding as well as information on Targeted Brownfields Assessments performed by EPA Regions. A listing of ACRES Brownfield sites is obtained from Cleanups in My Community. Cleanups in My Community provides information on Brownfields properties for which information is reported back to EPA, as well as areas served by Brownfields grant programs.

Date of Government Version: 03/20/2014
Date Data Arrived at EDR: 03/20/2014
Date Made Active in Reports: 04/09/2014
Number of Days to Update: 20

Source: Environmental Protection Agency
Telephone: 202-566-2777
Last EDR Contact: 03/20/2014
Next Scheduled EDR Contact: 07/07/2014
Data Release Frequency: Semi-Annually

Local Lists of Landfill / Solid Waste Disposal Sites

DEBRIS REGION 9: Torres Martinez Reservation Illegal Dump Site Locations

A listing of illegal dump sites location on the Torres Martinez Indian Reservation located in eastern Riverside County and northern Imperial County, California.

Date of Government Version: 01/12/2009
Date Data Arrived at EDR: 05/07/2009
Date Made Active in Reports: 09/21/2009
Number of Days to Update: 137

Source: EPA, Region 9
Telephone: 415-947-4219
Last EDR Contact: 04/28/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: No Update Planned

ODI: Open Dump Inventory

An open dump is defined as a disposal facility that does not comply with one or more of the Part 257 or Part 258 Subtitle D Criteria.

Date of Government Version: 06/30/1985
Date Data Arrived at EDR: 08/09/2004
Date Made Active in Reports: 09/17/2004
Number of Days to Update: 39

Source: Environmental Protection Agency
Telephone: 800-424-9346
Last EDR Contact: 06/09/2004
Next Scheduled EDR Contact: N/A
Data Release Frequency: No Update Planned

AL SWRCY: Recycling/Recovered Materials Processors Directory

A listing of recycling facilities.

Date of Government Version: 09/01/2009
Date Data Arrived at EDR: 01/22/2010
Date Made Active in Reports: 02/05/2010
Number of Days to Update: 14

Source: Department of Economic & Community Affairs
Telephone: 334-242-5336
Last EDR Contact: 04/14/2014
Next Scheduled EDR Contact: 07/28/2014
Data Release Frequency: Varies

GA SWRCY: Recycling Center Listing

A listing of recycling facility locations.

Date of Government Version: 04/16/2014
Date Data Arrived at EDR: 04/17/2014
Date Made Active in Reports: 05/01/2014
Number of Days to Update: 14

Source: Department of Community Affairs
Telephone: 404-679-1598
Last EDR Contact: 04/14/2014
Next Scheduled EDR Contact: 07/28/2014
Data Release Frequency: Varies

INDIAN ODI: Report on the Status of Open Dumps on Indian Lands
Location of open dumps on Indian land.

Date of Government Version: 12/31/1998
Date Data Arrived at EDR: 12/03/2007
Date Made Active in Reports: 01/24/2008
Number of Days to Update: 52
Source: Environmental Protection Agency
Telephone: 703-308-8245
Last EDR Contact: 05/02/2014
Next Scheduled EDR Contact: 08/18/2014
Data Release Frequency: Varies

Local Lists of Hazardous waste / Contaminated Sites

US CDL: Clandestine Drug Labs
A listing of clandestine drug lab locations. The U.S. Department of Justice ("the Department") provides this web site as a public service. It contains addresses of some locations where law enforcement agencies reported they found chemicals or other items that indicated the presence of either clandestine drug laboratories or dumpsites. In most cases, the source of the entries is not the Department, and the Department has not verified the entry and does not guarantee its accuracy. Members of the public must verify the accuracy of all entries by, for example, contacting local law enforcement and local health departments.

Date of Government Version: 12/04/2013
Date Data Arrived at EDR: 12/10/2013
Date Made Active in Reports: 02/13/2014
Number of Days to Update: 65
Source: Drug Enforcement Administration
Telephone: 202-307-1000
Last EDR Contact: 06/04/2014
Next Scheduled EDR Contact: 09/15/2014
Data Release Frequency: Quarterly

AL AOCONCERN: Area of Concern
Property boundary of the Redstone Arsenal facility.

Date of Government Version: 09/01/2008
Date Data Arrived at EDR: 09/24/2008
Date Made Active in Reports: 10/23/2009
Number of Days to Update: 394
Source: Department of the Army
Telephone: 256-313-3255
Last EDR Contact: 05/02/2014
Next Scheduled EDR Contact: 08/18/2014
Data Release Frequency: No Update Planned

AL CDL: Clandestine Methamphetamine Lab Sites
Clandestine methamphetamine lab locations seized by law enforcement agencies.

Date of Government Version: 12/09/2010
Date Data Arrived at EDR: 02/08/2011
Date Made Active in Reports: 02/28/2011
Number of Days to Update: 20
Source: Department of Environmental Management.
Telephone: 334-271-7700
Last EDR Contact: 05/05/2014
Next Scheduled EDR Contact: 08/18/2014
Data Release Frequency: Varies

US HIST CDL: National Clandestine Laboratory Register
A listing of clandestine drug lab locations. The U.S. Department of Justice ("the Department") provides this web site as a public service. It contains addresses of some locations where law enforcement agencies reported they found chemicals or other items that indicated the presence of either clandestine drug laboratories or dumpsites. In most cases, the source of the entries is not the Department, and the Department has not verified the entry and does not guarantee its accuracy. Members of the public must verify the accuracy of all entries by, for example, contacting local law enforcement and local health departments.

Date of Government Version: 09/01/2007
Date Data Arrived at EDR: 11/19/2008
Date Made Active in Reports: 03/30/2009
Number of Days to Update: 131
Source: Drug Enforcement Administration
Telephone: 202-307-1000
Last EDR Contact: 06/04/2014
Next Scheduled EDR Contact: 09/15/2014
Data Release Frequency: No Update Planned

Local Land Records

LIENS 2: CERCLA Lien Information

A Federal CERCLA ('Superfund') lien can exist by operation of law at any site or property at which EPA has spent Superfund monies. These monies are spent to investigate and address releases and threatened releases of contamination. CERCLIS provides information as to the identity of these sites and properties.

Date of Government Version: 02/18/2014
Date Data Arrived at EDR: 03/18/2014
Date Made Active in Reports: 04/24/2014
Number of Days to Update: 37

Source: Environmental Protection Agency
Telephone: 202-564-6023
Last EDR Contact: 04/28/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Varies

Records of Emergency Release Reports

HMIRS: Hazardous Materials Information Reporting System

Hazardous Materials Incident Report System. HMIRS contains hazardous material spill incidents reported to DOT.

Date of Government Version: 12/31/2013
Date Data Arrived at EDR: 01/03/2014
Date Made Active in Reports: 02/24/2014
Number of Days to Update: 52

Source: U.S. Department of Transportation
Telephone: 202-366-4555
Last EDR Contact: 04/01/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Annually

AL SPILLS: Emergency Response Data

Incidents involving spills of oil and hazardous materials.

Date of Government Version: 03/31/2014
Date Data Arrived at EDR: 04/01/2014
Date Made Active in Reports: 04/15/2014
Number of Days to Update: 14

Source: Department of Environmental Management
Telephone: 334-394-4382
Last EDR Contact: 03/31/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Varies

GA SPILLS: Spills Information

Oil or Hazardous Material Spills or Releases.

Date of Government Version: 03/31/2014
Date Data Arrived at EDR: 04/01/2014
Date Made Active in Reports: 04/16/2014
Number of Days to Update: 15

Source: Department of Natural Resources
Telephone: 706-792-7744
Last EDR Contact: 03/31/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Quarterly

Other Ascertainable Records

RCRA NonGen / NLR: RCRA - Non Generators

RCRAInfo is EPA's comprehensive information system, providing access to data supporting the Resource Conservation and Recovery Act (RCRA) of 1976 and the Hazardous and Solid Waste Amendments (HSWA) of 1984. The database includes selective information on sites which generate, transport, store, treat and/or dispose of hazardous waste as defined by the Resource Conservation and Recovery Act (RCRA). Non-Generators do not presently generate hazardous waste.

Date of Government Version: 03/11/2014
Date Data Arrived at EDR: 03/13/2014
Date Made Active in Reports: 04/09/2014
Number of Days to Update: 27

Source: Environmental Protection Agency
Telephone: (404) 562-8651
Last EDR Contact: 03/13/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Varies

DOT OPS: Incident and Accident Data

Department of Transporation, Office of Pipeline Safety Incident and Accident data.

Date of Government Version: 07/31/2012
Date Data Arrived at EDR: 08/07/2012
Date Made Active in Reports: 09/18/2012
Number of Days to Update: 42

Source: Department of Transporation, Office of Pipeline Safety
Telephone: 202-366-4595
Last EDR Contact: 05/06/2014
Next Scheduled EDR Contact: 08/18/2014
Data Release Frequency: Varies

DOD: Department of Defense Sites

This data set consists of federally owned or administered lands, administered by the Department of Defense, that have any area equal to or greater than 640 acres of the United States, Puerto Rico, and the U.S. Virgin Islands.

Date of Government Version: 12/31/2005
Date Data Arrived at EDR: 11/10/2006
Date Made Active in Reports: 01/11/2007
Number of Days to Update: 62

Source: USGS
Telephone: 888-275-8747
Last EDR Contact: 04/18/2014
Next Scheduled EDR Contact: 07/28/2014
Data Release Frequency: Semi-Annually

FUDS: Formerly Used Defense Sites

The listing includes locations of Formerly Used Defense Sites properties where the US Army Corps of Engineers is actively working or will take necessary cleanup actions.

Date of Government Version: 12/31/2012
Date Data Arrived at EDR: 02/28/2014
Date Made Active in Reports: 04/24/2014
Number of Days to Update: 55

Source: U.S. Army Corps of Engineers
Telephone: 202-528-4285
Last EDR Contact: 06/04/2014
Next Scheduled EDR Contact: 09/22/2014
Data Release Frequency: Varies

CONSENT: Superfund (CERCLA) Consent Decrees

Major legal settlements that establish responsibility and standards for cleanup at NPL (Superfund) sites. Released periodically by United States District Courts after settlement by parties to litigation matters.

Date of Government Version: 12/31/2013
Date Data Arrived at EDR: 01/24/2014
Date Made Active in Reports: 02/24/2014
Number of Days to Update: 31

Source: Department of Justice, Consent Decree Library
Telephone: Varies
Last EDR Contact: 03/27/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Varies

ROD: Records Of Decision

Record of Decision. ROD documents mandate a permanent remedy at an NPL (Superfund) site containing technical and health information to aid in the cleanup.

Date of Government Version: 11/25/2013
Date Data Arrived at EDR: 12/12/2013
Date Made Active in Reports: 02/24/2014
Number of Days to Update: 74

Source: EPA
Telephone: 703-416-0223
Last EDR Contact: 06/10/2014
Next Scheduled EDR Contact: 09/22/2014
Data Release Frequency: Annually

UMTRA: Uranium Mill Tailings Sites

Uranium ore was mined by private companies for federal government use in national defense programs. When the mills shut down, large piles of the sand-like material (mill tailings) remain after uranium has been extracted from the ore. Levels of human exposure to radioactive materials from the piles are low; however, in some cases tailings were used as construction materials before the potential health hazards of the tailings were recognized.

Date of Government Version: 09/14/2010
Date Data Arrived at EDR: 10/07/2011
Date Made Active in Reports: 03/01/2012
Number of Days to Update: 146

Source: Department of Energy
Telephone: 505-845-0011
Last EDR Contact: 02/25/2014
Next Scheduled EDR Contact: 06/09/2014
Data Release Frequency: Varies

US MINES: Mines Master Index File

Contains all mine identification numbers issued for mines active or opened since 1971. The data also includes violation information.

Date of Government Version: 08/01/2013
Date Data Arrived at EDR: 09/05/2013
Date Made Active in Reports: 10/03/2013
Number of Days to Update: 28

Source: Department of Labor, Mine Safety and Health Administration
Telephone: 303-231-5959
Last EDR Contact: 06/06/2014
Next Scheduled EDR Contact: 09/15/2014
Data Release Frequency: Semi-Annually

GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

TRIS: Toxic Chemical Release Inventory System

Toxic Release Inventory System. TRIS identifies facilities which release toxic chemicals to the air, water and land in reportable quantities under SARA Title III Section 313.

Date of Government Version: 12/31/2011
Date Data Arrived at EDR: 07/31/2013
Date Made Active in Reports: 09/13/2013
Number of Days to Update: 44

Source: EPA
Telephone: 202-566-0250
Last EDR Contact: 05/30/2014
Next Scheduled EDR Contact: 09/08/2014
Data Release Frequency: Annually

TSCA: Toxic Substances Control Act

Toxic Substances Control Act. TSCA identifies manufacturers and importers of chemical substances included on the TSCA Chemical Substance Inventory list. It includes data on the production volume of these substances by plant site.

Date of Government Version: 12/31/2006
Date Data Arrived at EDR: 09/29/2010
Date Made Active in Reports: 12/02/2010
Number of Days to Update: 64

Source: EPA
Telephone: 202-260-5521
Last EDR Contact: 03/28/2014
Next Scheduled EDR Contact: 07/07/2014
Data Release Frequency: Every 4 Years

FTTS: FIFRA/ TSCA Tracking System - FIFRA (Federal Insecticide, Fungicide, & Rodenticide Act)/TSCA (Toxic Substances Control Act)

FTTS tracks administrative cases and pesticide enforcement actions and compliance activities related to FIFRA, TSCA and EPCRA (Emergency Planning and Community Right-to-Know Act). To maintain currency, EDR contacts the Agency on a quarterly basis.

Date of Government Version: 04/09/2009
Date Data Arrived at EDR: 04/16/2009
Date Made Active in Reports: 05/11/2009
Number of Days to Update: 25

Source: EPA/Office of Prevention, Pesticides and Toxic Substances
Telephone: 202-566-1667
Last EDR Contact: 05/22/2014
Next Scheduled EDR Contact: 09/08/2014
Data Release Frequency: Quarterly

FTTS INSP: FIFRA/ TSCA Tracking System - FIFRA (Federal Insecticide, Fungicide, & Rodenticide Act)/TSCA (Toxic Substances Control Act)

A listing of FIFRA/TSCA Tracking System (FTTS) inspections and enforcements.

Date of Government Version: 04/09/2009
Date Data Arrived at EDR: 04/16/2009
Date Made Active in Reports: 05/11/2009
Number of Days to Update: 25

Source: EPA
Telephone: 202-566-1667
Last EDR Contact: 05/22/2014
Next Scheduled EDR Contact: 09/08/2014
Data Release Frequency: Quarterly

HIST FTTS: FIFRA/TSCA Tracking System Administrative Case Listing

A complete administrative case listing from the FIFRA/TSCA Tracking System (FTTS) for all ten EPA regions. The information was obtained from the National Compliance Database (NCDB). NCDB supports the implementation of FIFRA (Federal Insecticide, Fungicide, and Rodenticide Act) and TSCA (Toxic Substances Control Act). Some EPA regions are now closing out records. Because of that, and the fact that some EPA regions are not providing EPA Headquarters with updated records, it was decided to create a HIST FTTS database. It included records that may not be included in the newer FTTS database updates. This database is no longer updated.

Date of Government Version: 10/19/2006
Date Data Arrived at EDR: 03/01/2007
Date Made Active in Reports: 04/10/2007
Number of Days to Update: 40

Source: Environmental Protection Agency
Telephone: 202-564-2501
Last EDR Contact: 12/17/2007
Next Scheduled EDR Contact: 03/17/2008
Data Release Frequency: No Update Planned

HIST FTTS INSP: FIFRA/TSCA Tracking System Inspection & Enforcement Case Listing

A complete inspection and enforcement case listing from the FIFRA/TSCA Tracking System (FTTS) for all ten EPA regions. The information was obtained from the National Compliance Database (NCDB). NCDB supports the implementation of FIFRA (Federal Insecticide, Fungicide, and Rodenticide Act) and TSCA (Toxic Substances Control Act). Some EPA regions are now closing out records. Because of that, and the fact that some EPA regions are not providing EPA Headquarters with updated records, it was decided to create a HIST FTTS database. It included records that may not be included in the newer FTTS database updates. This database is no longer updated.

Date of Government Version: 10/19/2006
Date Data Arrived at EDR: 03/01/2007
Date Made Active in Reports: 04/10/2007
Number of Days to Update: 40
Source: Environmental Protection Agency
Telephone: 202-564-2501
Last EDR Contact: 12/17/2008
Next Scheduled EDR Contact: 03/17/2008
Data Release Frequency: No Update Planned

SSTS: Section 7 Tracking Systems

Section 7 of the Federal Insecticide, Fungicide and Rodenticide Act, as amended (92 Stat. 829) requires all registered pesticide-producing establishments to submit a report to the Environmental Protection Agency by March 1st each year. Each establishment must report the types and amounts of pesticides, active ingredients and devices being produced, and those having been produced and sold or distributed in the past year.

Date of Government Version: 12/31/2009
Date Data Arrived at EDR: 12/10/2010
Date Made Active in Reports: 02/25/2011
Number of Days to Update: 77
Source: EPA
Telephone: 202-564-4203
Last EDR Contact: 04/29/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Annually

ICIS: Integrated Compliance Information System

The Integrated Compliance Information System (ICIS) supports the information needs of the national enforcement and compliance program as well as the unique needs of the National Pollutant Discharge Elimination System (NPDES) program.

Date of Government Version: 07/20/2011
Date Data Arrived at EDR: 11/10/2011
Date Made Active in Reports: 01/10/2012
Number of Days to Update: 61
Source: Environmental Protection Agency
Telephone: 202-564-5088
Last EDR Contact: 10/09/2014
Next Scheduled EDR Contact: 07/21/2014
Data Release Frequency: Quarterly

PADS: PCB Activity Database System

PCB Activity Database. PADS Identifies generators, transporters, commercial storers and/or brokers and disposers of PCB's who are required to notify the EPA of such activities.

Date of Government Version: 06/01/2013
Date Data Arrived at EDR: 07/17/2013
Date Made Active in Reports: 11/01/2013
Number of Days to Update: 107
Source: EPA
Telephone: 202-566-0500
Last EDR Contact: 04/18/2014
Next Scheduled EDR Contact: 07/28/2014
Data Release Frequency: Annually

MLTS: Material Licensing Tracking System

MLTS is maintained by the Nuclear Regulatory Commission and contains a list of approximately 8,100 sites which possess or use radioactive materials and which are subject to NRC licensing requirements. To maintain currency, EDR contacts the Agency on a quarterly basis.

Date of Government Version: 07/22/2013
Date Data Arrived at EDR: 08/02/2013
Date Made Active in Reports: 11/01/2013
Number of Days to Update: 91
Source: Nuclear Regulatory Commission
Telephone: 301-415-7169
Last EDR Contact: 06/05/2014
Next Scheduled EDR Contact: 09/22/2014
Data Release Frequency: Quarterly

RADINFO: Radiation Information Database

The Radiation Information Database (RADINFO) contains information about facilities that are regulated by U.S. Environmental Protection Agency (EPA) regulations for radiation and radioactivity.

Date of Government Version: 01/09/2014
Date Data Arrived at EDR: 01/10/2014
Date Made Active in Reports: 03/12/2014
Number of Days to Update: 61
Source: Environmental Protection Agency
Telephone: 202-343-9775
Last EDR Contact: 04/09/2014
Next Scheduled EDR Contact: 07/21/2014
Data Release Frequency: Quarterly

GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

FINDS: Facility Index System/Facility Registry System

Facility Index System. FINDS contains both facility information and 'pointers' to other sources that contain more detail. EDR includes the following FINDS databases in this report: PCS (Permit Compliance System), AIRS (Aerometric Information Retrieval System), DOCKET (Enforcement Docket used to manage and track information on civil judicial enforcement cases for all environmental statutes), FURS (Federal Underground Injection Control), C-DOCKET (Criminal Docket System used to track criminal enforcement actions for all environmental statutes), FFIS (Federal Facilities Information System), STATE (State Environmental Laws and Statutes), and PADS (PCB Activity Data System).

Date of Government Version: 11/18/2013
Date Data Arrived at EDR: 02/27/2014
Date Made Active in Reports: 03/12/2014
Number of Days to Update: 13

Source: EPA
Telephone: (404) 562-9900
Last EDR Contact: 03/14/2014
Next Scheduled EDR Contact: 06/23/2014
Data Release Frequency: Quarterly

RAATS: RCRA Administrative Action Tracking System

RCRA Administration Action Tracking System. RAATS contains records based on enforcement actions issued under RCRA pertaining to major violators and includes administrative and civil actions brought by the EPA. For administration actions after September 30, 1995, data entry in the RAATS database was discontinued. EPA will retain a copy of the database for historical records. It was necessary to terminate RAATS because a decrease in agency resources made it impossible to continue to update the information contained in the database.

Date of Government Version: 04/17/1995
Date Data Arrived at EDR: 07/03/1995
Date Made Active in Reports: 08/07/1995
Number of Days to Update: 35

Source: EPA
Telephone: 202-564-4104
Last EDR Contact: 06/02/2008
Next Scheduled EDR Contact: 09/01/2008
Data Release Frequency: No Update Planned

RMP: Risk Management Plans

When Congress passed the Clean Air Act Amendments of 1990, it required EPA to publish regulations and guidance for chemical accident prevention at facilities using extremely hazardous substances. The Risk Management Program Rule (RMP Rule) was written to implement Section 112(r) of these amendments. The rule, which built upon existing industry codes and standards, requires companies of all sizes that use certain flammable and toxic substances to develop a Risk Management Program, which includes a(n): Hazard assessment that details the potential effects of an accidental release, an accident history of the last five years, and an evaluation of worst-case and alternative accidental releases; Prevention program that includes safety precautions and maintenance, monitoring, and employee training measures; and Emergency response program that spells out emergency health care, employee training measures and procedures for informing the public and response agencies (e.g the fire department) should an accident occur.

Date of Government Version: 11/01/2013
Date Data Arrived at EDR: 12/12/2013
Date Made Active in Reports: 02/13/2014
Number of Days to Update: 63

Source: Environmental Protection Agency
Telephone: 202-564-8600
Last EDR Contact: 04/28/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Varies

BRS: Biennial Reporting System

The Biennial Reporting System is a national system administered by the EPA that collects data on the generation and management of hazardous waste. BRS captures detailed data from two groups: Large Quantity Generators (LQG) and Treatment, Storage, and Disposal Facilities.

Date of Government Version: 12/31/2011
Date Data Arrived at EDR: 02/26/2013
Date Made Active in Reports: 04/19/2013
Number of Days to Update: 52

Source: EPA/NTIS
Telephone: 800-424-9346
Last EDR Contact: 05/30/2014
Next Scheduled EDR Contact: 09/08/2014
Data Release Frequency: Biennially

AL NPDES: NPDES Permit Listing

A listing of municipal and industrial permits issued by the Department of Environmental Management.

Date of Government Version: 04/05/2012
Date Data Arrived at EDR: 04/06/2012
Date Made Active in Reports: 04/25/2012
Number of Days to Update: 19

Source: Department of Environmental Management
Telephone: 334-271-7712
Last EDR Contact: 03/31/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Varies

GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

AL UIC: UIC Listing
A listing of underground injection control wells.

Date of Government Version: 08/08/2013
Date Data Arrived at EDR: 08/14/2013
Date Made Active in Reports: 08/16/2013
Number of Days to Update: 2

Source: Geological Survey of Alabama
Telephone: 205-247-3661
Last EDR Contact: 05/16/2014
Next Scheduled EDR Contact: 08/25/2014
Data Release Frequency: Quarterly

GA NPDES: NPDES Wastewater Permit List
A listing of NPDES wastewater permits issued by the Watershed Protection Branch.

Date of Government Version: 01/27/2011
Date Data Arrived at EDR: 02/15/2011
Date Made Active in Reports: 02/23/2011
Number of Days to Update: 8

Source: Department of Natural Resoruces
Telephone: 404-362-2680
Last EDR Contact: 05/16/2014
Next Scheduled EDR Contact: 08/25/2014
Data Release Frequency: Varies

AL DRYCLEANERS: Drycleaner Facility Listing
A listing of drycleaner sites in the voluntary DERTF.

Date of Government Version: 03/07/2014
Date Data Arrived at EDR: 03/11/2014
Date Made Active in Reports: 04/23/2014
Number of Days to Update: 43

Source: Department of Environmental Management
Telephone: 334-271-7703
Last EDR Contact: 05/19/2014
Next Scheduled EDR Contact: 09/01/2014
Data Release Frequency: Varies

GA DRYCLEANERS: Drycleaner Database
A list of drycleaners in the state. The listing includes drycleaner facilities, that use perchloroethylene, that responded to the Notification of Compliance Status forms. It also includes those businesses that are pick-up stores only and do not conduct dry cleaning on site.

Date of Government Version: 02/14/2014
Date Data Arrived at EDR: 02/14/2014
Date Made Active in Reports: 05/22/2014
Number of Days to Update: 97

Source: Department of Natural Resources
Telephone: 404-363-7000
Last EDR Contact: 05/27/2014
Next Scheduled EDR Contact: 08/25/2014
Data Release Frequency: Varies

AL TIER 2: Tier 2 Data Listing
A listing of facilities which store or manufacture hazardous materials and submit a chemical inventory report.

Date of Government Version: 12/31/2012
Date Data Arrived at EDR: 06/17/2013
Date Made Active in Reports: 07/29/2013
Number of Days to Update: 42

Source: Department of Environmental Management
Telephone: 334-260-2714
Last EDR Contact: 03/17/2014
Next Scheduled EDR Contact: 06/30/2014
Data Release Frequency: Varies

GA TIER 2: Tier 2 Data Listing
A listing of facilities which store or manufacture hazardous materials and submit a chemical inventory report.

Date of Government Version: 12/31/2012
Date Data Arrived at EDR: 10/03/2013
Date Made Active in Reports: 11/06/2013
Number of Days to Update: 34

Source: Department of Natural Resources
Telephone: 404-656-4852
Last EDR Contact: 06/02/2014
Next Scheduled EDR Contact: 09/15/2014
Data Release Frequency: Varies

INDIAN RESERV: Indian Reservations
This map layer portrays Indian administered lands of the United States that have any area equal to or greater than 640 acres.

Date of Government Version: 12/31/2005
Date Data Arrived at EDR: 12/08/2006
Date Made Active in Reports: 01/11/2007
Number of Days to Update: 34

Source: USGS
Telephone: 202-208-3710
Last EDR Contact: 04/18/2014
Next Scheduled EDR Contact: 07/28/2014
Data Release Frequency: Semi-Annually

SCRD DRYCLEANERS: State Coalition for Remediation of Drycleaners Listing

The State Coalition for Remediation of Drycleaners was established in 1998, with support from the U.S. EPA Office of Superfund Remediation and Technology Innovation. It is comprised of representatives of states with established drycleaner remediation programs. Currently the member states are Alabama, Connecticut, Florida, Illinois, Kansas, Minnesota, Missouri, North Carolina, Oregon, South Carolina, Tennessee, Texas, and Wisconsin.

Date of Government Version: 03/07/2011
Date Data Arrived at EDR: 03/09/2011
Date Made Active in Reports: 05/02/2011
Number of Days to Update: 54

Source: Environmental Protection Agency
Telephone: 615-532-8599
Last EDR Contact: 04/21/2014
Next Scheduled EDR Contact: 08/04/2014
Data Release Frequency: Varies

AL COAL ASH: Coal Ash Disposal Sites

A listing of coal ash disposal site locations.

Date of Government Version: 02/02/2009
Date Data Arrived at EDR: 06/25/2009
Date Made Active in Reports: 07/17/2009
Number of Days to Update: 22

Source: Department of Environmental Management
Telephone: 334-271-7718
Last EDR Contact: 04/14/2014
Next Scheduled EDR Contact: 07/28/2014
Data Release Frequency: Varies

AL Financial Assurance: Financial Assurance Information Listing

Financial assurance information for underground storage tank facilities. Financial assurance is intended to ensure that resources are available to pay for the cost of closure, post-closure care, and corrective measures if the owner or operator of a regulated facility is unable or unwilling to pay.

Date of Government Version: 11/25/2013
Date Data Arrived at EDR: 12/31/2013
Date Made Active in Reports: 01/27/2014
Number of Days to Update: 27

Source: Department of Environmental Management
Telephone: 334-271-7759
Last EDR Contact: 04/04/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Quarterly

FEDLAND: Federal and Indian Lands

Federally and Indian administrated lands of the United States. Lands included are administrated by: Army Corps of Engineers, Bureau of Reclamation, National Wild and Scenic River, National Wildlife Refuge, Public Domain Land, Wilderness, Wilderness Study Area, Wildlife Management Area, Bureau of Indian Affairs, Bureau of Land Management, Department of Justice, Forest Service, Fish and Wildlife Service, National Park Service.

Date of Government Version: 12/31/2005
Date Data Arrived at EDR: 02/06/2006
Date Made Active in Reports: 01/11/2007
Number of Days to Update: 339

Source: U.S. Geological Survey
Telephone: 888-275-8747
Last EDR Contact: 04/18/2014
Next Scheduled EDR Contact: 07/28/2014
Data Release Frequency: N/A

PRP: Potentially Responsible Parties

A listing of verified Potentially Responsible Parties

Date of Government Version: 04/15/2013
Date Data Arrived at EDR: 07/03/2013
Date Made Active in Reports: 09/13/2013
Number of Days to Update: 72

Source: EPA
Telephone: 202-564-6023
Last EDR Contact: 04/04/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Quarterly

GA Financial Assurance 2: Financial Assurance Information Listing
Financial assurance information listing for solid waste facilities.

Date of Government Version: 01/10/2014
Date Data Arrived at EDR: 01/10/2014
Date Made Active in Reports: 02/24/2014
Number of Days to Update: 45
Source: Department of Natural Resources
Telephone: 404-362-2537
Last EDR Contact: 06/09/2014
Next Scheduled EDR Contact: 09/08/2014
Data Release Frequency: Varies

LEAD SMELTER 2: Lead Smelter Sites
A list of several hundred sites in the U.S. where secondary lead smelting was done from 1931and 1964. These sites may pose a threat to public health through ingestion or inhalation of contaminated soil or dust

Date of Government Version: 04/05/2001
Date Data Arrived at EDR: 10/27/2010
Date Made Active in Reports: 12/02/2010
Number of Days to Update: 36
Source: American Journal of Public Health
Telephone: 703-305-6451
Last EDR Contact: 12/02/2009
Next Scheduled EDR Contact: N/A
Data Release Frequency: No Update Planned

LEAD SMELTER 1: Lead Smelter Sites
A listing of former lead smelter site locations.

Date of Government Version: 01/29/2013
Date Data Arrived at EDR: 02/14/2013
Date Made Active in Reports: 02/27/2013
Number of Days to Update: 13
Source: Environmental Protection Agency
Telephone: 703-603-8787
Last EDR Contact: 04/04/2014
Next Scheduled EDR Contact: 07/21/2014
Data Release Frequency: Varies

2020 COR ACTION: 2020 Corrective Action Program List
The EPA has set ambitious goals for the RCRA Corrective Action program by creating the 2020 Corrective Action Universe. This RCRA cleanup baseline includes facilities expected to need corrective action. The 2020 universe contains a wide variety of sites. Some properties are heavily contaminated while others were contaminated but have since been cleaned up. Still others have not been fully investigated yet, and may require little or no remediation. Inclusion in the 2020 Universe does not necessarily imply failure on the part of a facility to meet its RCRA obligations.

Date of Government Version: 11/11/2011
Date Data Arrived at EDR: 05/18/2012
Date Made Active in Reports: 05/25/2012
Number of Days to Update: 7
Source: Environmental Protection Agency
Telephone: 703-308-4044
Last EDR Contact: 05/16/2014
Next Scheduled EDR Contact: 08/25/2014
Data Release Frequency: Varies

GA Financial Assurance 1: Financial Assurance Information Listing
A listing of financial assurance information for underground storage tank facilities.

Date of Government Version: 07/01/2013
Date Data Arrived at EDR: 09/13/2013
Date Made Active in Reports: 10/03/2013
Number of Days to Update: 20
Source: Department of Natural Resources
Telephone: 404-362-4892
Last EDR Contact: 03/21/2014
Next Scheduled EDR Contact: 06/30/2014
Data Release Frequency: Annually

PCB TRANSFORMER: PCB Transformer Registration Database
The database of PCB transformer registrations that includes all PCB registration submittals.

Date of Government Version: 02/01/2011
Date Data Arrived at EDR: 10/19/2011
Date Made Active in Reports: 01/10/2012
Number of Days to Update: 83
Source: Environmental Protection Agency
Telephone: 202-566-0517
Last EDR Contact: 05/02/2014
Next Scheduled EDR Contact: 08/11/2014
Data Release Frequency: Varies

GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

COAL ASH EPA: Coal Combustion Residues Surface Impoundments List
A listing of coal combustion residues surface impoundments with high hazard potential ratings.

Date of Government Version: 08/17/2010
Date Data Arrived at EDR: 01/03/2011
Date Made Active in Reports: 03/21/2011
Number of Days to Update: 77

Source: Environmental Protection Agency
Telephone: N/A
Last EDR Contact: 03/11/2014
Next Scheduled EDR Contact: 06/23/2014
Data Release Frequency: Varies

GA COAL ASH: Coal Ash Disposal Site Listing
A listing of coal ash landfills.

Date of Government Version: 11/06/2012
Date Data Arrived at EDR: 11/08/2012
Date Made Active in Reports: 12/07/2012
Number of Days to Update: 29

Source: Department of Natural Resources
Telephone: 404-362-2537
Last EDR Contact: 05/05/2014
Next Scheduled EDR Contact: 08/18/2014
Data Release Frequency: Varies

EPA WATCH LIST: EPA WATCH LIST
EPA maintains a "Watch List" to facilitate dialogue between EPA, state and local environmental agencies on enforcement matters relating to facilities with alleged violations identified as either significant or high priority. Being on the Watch List does not mean that the facility has actually violated the law only that an investigation by EPA or a state or local environmental agency has led those organizations to allege that an unproven violation has in fact occurred. Being on the Watch List does not represent a higher level of concern regarding the alleged violations that were detected, but instead indicates cases requiring additional dialogue between EPA, state and local agencies - primarily because of the length of time the alleged violation has gone unaddressed or unresolved.

Date of Government Version: 06/30/2013
Date Data Arrived at EDR: 08/13/2013
Date Made Active in Reports: 09/13/2013
Number of Days to Update: 31

Source: Environmental Protection Agency
Telephone: 617-520-3000
Last EDR Contact: 05/16/2014
Next Scheduled EDR Contact: 08/25/2014
Data Release Frequency: Quarterly

US AIRS MINOR: Air Facility System Data
A listing of minor source facilities.

Date of Government Version: 10/23/2013
Date Data Arrived at EDR: 11/06/2013
Date Made Active in Reports: 12/06/2013
Number of Days to Update: 30

Source: EPA
Telephone: 202-564-5962
Last EDR Contact: 03/31/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Annually

US AIRS (AFS): Aerometric Information Retrieval System Facility Subsystem (AFS)
The database is a sub-system of Aerometric Information Retrieval System (AIRS). AFS contains compliance data on air pollution point sources regulated by the U.S. EPA and/or state and local air regulatory agencies. This information comes from source reports by various stationary sources of air pollution, such as electric power plants, steel mills, factories, and universities, and provides information about the air pollutants they produce. Action, air program, air program pollutant, and general level plant data. It is used to track emissions and compliance data from industrial plants.

Date of Government Version: 10/23/2013
Date Data Arrived at EDR: 11/06/2013
Date Made Active in Reports: 12/06/2013
Number of Days to Update: 30

Source: EPA
Telephone: 202-564-5962
Last EDR Contact: 03/31/2014
Next Scheduled EDR Contact: 07/14/2014
Data Release Frequency: Annually

COAL ASH DOE: Sleam-Electric Plan Operation Data
A listing of power plants that store ash in surface ponds.

Date of Government Version: 12/31/2005
Date Data Arrived at EDR: 08/07/2009
Date Made Active in Reports: 10/22/2009
Number of Days to Update: 76

Source: Department of Energy
Telephone: 202-586-8719
Last EDR Contact: 04/18/2014
Next Scheduled EDR Contact: 07/28/2014
Data Release Frequency: Varies

US FIN ASSUR: Financial Assurance Information

All owners and operators of facilities that treat, store, or dispose of hazardous waste are required to provide proof that they will have sufficient funds to pay for the clean up, closure, and post-closure care of their facilities.

Date of Government Version: 02/25/2014
Date Data Arrived at EDR: 02/27/2014
Date Made Active in Reports: 04/09/2014
Number of Days to Update: 41

Source: Environmental Protection Agency
Telephone: 202-566-1917
Last EDR Contact: 05/16/2014
Next Scheduled EDR Contact: 09/01/2014
Data Release Frequency: Quarterly

EDR HIGH RISK HISTORICAL RECORDS

EDR Exclusive Records

EDR MGP: EDR Proprietary Manufactured Gas Plants

The EDR Proprietary Manufactured Gas Plant Database includes records of coal gas plants (manufactured gas plants) compiled by EDR's researchers. Manufactured gas sites were used in the United States from the 1800's to 1950's to produce a gas that could be distributed and used as fuel. These plants used whale oil, rosin, coal, or a mixture of coal, oil, and water that also produced a significant amount of waste. Many of the byproducts of the gas production, such as coal tar (oily waste containing volatile and non-volatile chemicals), sludges, oils and other compounds are potentially hazardous to human health and the environment. The byproduct from this process was frequently disposed of directly at the plant site and can remain or spread slowly, serving as a continuous source of soil and groundwater contamination.

Date of Government Version: N/A
Date Data Arrived at EDR: N/A
Date Made Active in Reports: N/A
Number of Days to Update: N/A

Source: EDR, Inc.
Telephone: N/A
Last EDR Contact: N/A
Next Scheduled EDR Contact: N/A
Data Release Frequency: No Update Planned

EDR US Hist Auto Stat: EDR Exclusive Historic Gas Stations

EDR has searched selected national collections of business directories and has collected listings of potential gas station/filling station/service station sites that were available to EDR researchers. EDR's review was limited to those categories of sources that might, in EDR's opinion, include gas station/filling station/service station establishments. The categories reviewed included, but were not limited to gas, gas station, gasoline station, filling station, auto, automobile repair, auto service station, service station, etc. This database falls within a category of information EDR classifies as "High Risk Historical Records", or HRHR. EDR's HRHR effort presents unique and sometimes proprietary data about past sites and operations that typically create environmental concerns, but may not show up in current government records searches.

Date of Government Version: N/A
Date Data Arrived at EDR: N/A
Date Made Active in Reports: N/A
Number of Days to Update: N/A

Source: EDR, Inc.
Telephone: N/A
Last EDR Contact: N/A
Next Scheduled EDR Contact: N/A
Data Release Frequency: Varies

EDR US Hist Cleaners: EDR Exclusive Historic Dry Cleaners

EDR has searched selected national collections of business directories and has collected listings of potential dry cleaner sites that were available to EDR researchers. EDR's review was limited to those categories of sources that might, in EDR's opinion, include dry cleaning establishments. The categories reviewed included, but were not limited to dry cleaners, cleaners, laundry, laundromat, cleaning/laundry, wash & dry etc. This database falls within a category of information EDR classifies as "High Risk Historical Records", or HRHR. EDR's HRHR effort presents unique and sometimes proprietary data about past sites and operations that typically create environmental concerns, but may not show up in current government records searches.

Date of Government Version: N/A
Date Data Arrived at EDR: N/A
Date Made Active in Reports: N/A
Number of Days to Update: N/A

Source: EDR, Inc.
Telephone: N/A
Last EDR Contact: N/A
Next Scheduled EDR Contact: N/A
Data Release Frequency: Varies

EDR US Hist Auto Stat: EDR Proprietary Historic Gas Stations - Cole

Date of Government Version: N/A
Date Data Arrived at EDR: N/A
Date Made Active in Reports: N/A
Number of Days to Update: N/A

Source: N/A
Telephone: N/A
Last EDR Contact: N/A
Next Scheduled EDR Contact: N/A
Data Release Frequency: Varies

EDR US Hist Cleaners: EDR Proprietary Historic Dry Cleaners - Cole

Date of Government Version: N/A
Date Data Arrived at EDR: N/A
Date Made Active in Reports: N/A
Number of Days to Update: N/A

Source: N/A
Telephone: N/A
Last EDR Contact: N/A
Next Scheduled EDR Contact: N/A
Data Release Frequency: Varies

EDR RECOVERED GOVERNMENT ARCHIVES

Exclusive Recovered Govt. Archives

AL RGA LUST: Recovered Government Archive Leaking Underground Storage Tank

The EDR Recovered Government Archive Leaking Underground Storage Tank database provides a list of LUST incidents derived from historical databases and includes many records that no longer appear in current government lists. Compiled from Records formerly available from Department of Environmental Management in Alabama.

Date of Government Version: N/A
Date Data Arrived at EDR: 07/01/2013
Date Made Active in Reports: 12/26/2013
Number of Days to Update: 178

Source: Department of Environmental Management
Telephone: N/A
Last EDR Contact: 06/01/2012
Next Scheduled EDR Contact: N/A
Data Release Frequency: Varies

AL RGA HWS: Recovered Government Archive State Hazardous Waste Facilities List

The EDR Recovered Government Archive State Hazardous Waste database provides a list of SHWS incidents derived from historical databases and includes many records that no longer appear in current government lists. Compiled from Records formerly available from the Department of Environmental Management in Alabama.

Date of Government Version: N/A
Date Data Arrived at EDR: 07/01/2013
Date Made Active in Reports: 12/26/2013
Number of Days to Update: 178

Source: Department of Environmental Management
Telephone: N/A
Last EDR Contact: 06/01/2012
Next Scheduled EDR Contact: N/A
Data Release Frequency: Varies

GA RGA LUST: Recovered Government Archive Leaking Underground Storage Tank

The EDR Recovered Government Archive Leaking Underground Storage Tank database provides a list of LUST incidents derived from historical databases and includes many records that no longer appear in current government lists. Compiled from Records formerly available from the Environmental Protection Division in Georgia.

Date of Government Version: N/A
Date Data Arrived at EDR: 07/01/2013
Date Made Active in Reports: 12/24/2013
Number of Days to Update: 176

Source: Environmental Protection Division
Telephone: N/A
Last EDR Contact: 06/01/2012
Next Scheduled EDR Contact: N/A
Data Release Frequency: Varies

GA RGA HWS: Recovered Government Archive State Hazardous Waste Facilities List

The EDR Recovered Government Archive State Hazardous Waste database provides a list of SHWS incidents derived from historical databases and includes many records that no longer appear in current government lists. Compiled from Records formerly available from the Department of Environmental Protection in Georgia.

Date of Government Version: N/A
Date Data Arrived at EDR: 07/01/2013
Date Made Active in Reports: 12/24/2013
Number of Days to Update: 176

Source: Department of Environmental Protection
Telephone: N/A
Last EDR Contact: 06/01/2012
Next Scheduled EDR Contact: N/A
Data Release Frequency: Varies

OTHER DATABASE(S)

Depending on the geographic area covered by this report, the data provided in these specialty databases may or may not be complete. For example, the existence of wetlands information data in a specific report does not mean that all wetlands in the area covered by the report are included. Moreover, the absence of any reported wetlands information does not necessarily mean that wetlands do not exist in the area covered by the report.

CT MANIFEST: Hazardous Waste Manifest Data
Facility and manifest data. Manifest is a document that lists and tracks hazardous waste from the generator through transporters to a tsd facility.

Date of Government Version: 07/30/2013
Date Data Arrived at EDR: 08/19/2013
Date Made Active in Reports: 10/03/2013
Number of Days to Update: 45

Source: Department of Energy & Environmental Protection
Telephone: 860-424-3375
Last EDR Contact: 05/23/2014
Next Scheduled EDR Contact: 09/01/2014
Data Release Frequency: Annually

NJ MANIFEST: Manifest Information
Hazardous waste manifest information.

Date of Government Version: 12/31/2011
Date Data Arrived at EDR: 07/19/2012
Date Made Active in Reports: 08/28/2012
Number of Days to Update: 40

Source: Department of Environmental Protection
Telephone: N/A
Last EDR Contact: 04/18/2014
Next Scheduled EDR Contact: 07/28/2014
Data Release Frequency: Annually

NY MANIFEST: Facility and Manifest Data
Manifest is a document that lists and tracks hazardous waste from the generator through transporters to a TSD facility.

Date of Government Version: 05/01/2014
Date Data Arrived at EDR: 05/07/2014
Date Made Active in Reports: 06/10/2014
Number of Days to Update: 34

Source: Department of Environmental Conservation
Telephone: 518-402-8651
Last EDR Contact: 05/07/2014
Next Scheduled EDR Contact: 08/18/2014
Data Release Frequency: Annually

PA MANIFEST: Manifest Information
Hazardous waste manifest information.

Date of Government Version: 12/31/2012
Date Data Arrived at EDR: 07/24/2013
Date Made Active in Reports: 08/19/2013
Number of Days to Update: 26

Source: Department of Environmental Protection
Telephone: 717-783-8990
Last EDR Contact: 04/21/2014
Next Scheduled EDR Contact: 08/04/2014
Data Release Frequency: Annually

RI MANIFEST: Manifest information
Hazardous waste manifest information

Date of Government Version: 12/31/2012
Date Data Arrived at EDR: 06/21/2013
Date Made Active in Reports: 08/05/2013
Number of Days to Update: 45

Source: Department of Environmental Management
Telephone: 401-222-2797
Last EDR Contact: 05/27/2014
Next Scheduled EDR Contact: 09/08/2014
Data Release Frequency: Annually

WI MANIFEST: Manifest Information
Hazardous waste manifest information.

Date of Government Version: 12/31/2012
Date Data Arrived at EDR: 08/09/2013
Date Made Active in Reports: 09/27/2013
Number of Days to Update: 49

Source: Department of Natural Resources
Telephone: N/A
Last EDR Contact: 03/17/2014
Next Scheduled EDR Contact: 06/30/2014
Data Release Frequency: Annually

Oil/Gas Pipelines: This data was obtained by EDR from the USGS in 1994. It is referred to by USGS as GeoData Digital Line Graphs from 1:100,000-Scale Maps. It was extracted from the transportation category including some oil, but primarily gas pipelines.

Electric Power Transmission Line Data
Source: Rextag Strategies Corp.
Telephone: (281) 769-2247
U.S. Electric Transmission and Power Plants Systems Digital GIS Data

Sensitive Receptors: There are individuals deemed sensitive receptors due to their fragile immune systems and special sensitivity to environmental discharges. These sensitive receptors typically include the elderly, the sick, and children. While the location of all sensitive receptors cannot be determined, EDR indicates those buildings and facilities - schools, daycares, hospitals, medical centers, and nursing homes - where individuals who are sensitive receptors are likely to be located.

AHA Hospitals:
Source: American Hospital Association, Inc.
Telephone: 312-280-5991
The database includes a listing of hospitals based on the American Hospital Association's annual survey of hospitals.

Medical Centers: Provider of Services Listing
Source: Centers for Medicare & Medicaid Services
Telephone: 410-786-3000
A listing of hospitals with Medicare provider number, produced by Centers of Medicare & Medicaid Services, a federal agency within the U.S. Department of Health and Human Services.

Nursing Homes
Source: National Institutes of Health
Telephone: 301-594-6248
Information on Medicare and Medicaid certified nursing homes in the United States.

Public Schools
Source: National Center for Education Statistics
Telephone: 202-502-7300
The National Center for Education Statistics' primary database on elementary and secondary public education in the United States. It is a comprehensive, annual, national statistical database of all public elementary and secondary schools and school districts, which contains data that are comparable across all states.

Private Schools
Source: National Center for Education Statistics
Telephone: 202-502-7300
The National Center for Education Statistics' primary database on private school locations in the United States.

Daycare Centers: Licensed Centers
Source: Department of Human Resources
Telephone: 334-242-1425

Flood Zone Data: This data, available in select counties across the country, was obtained by EDR in 2003 & 2011 from the Federal Emergency Management Agency (FEMA). Data depicts 100-year and 500-year flood zones as defined by FEMA.

NWI: National Wetlands Inventory. This data, available in select counties across the country, was obtained by EDR in 2002, 2005 and 2010 from the U.S. Fish and Wildlife Service.

Scanned Digital USGS 7.5' Topographic Map (DRG)
Source: United States Geologic Survey
A digital raster graphic (DRG) is a scanned image of a U.S. Geological Survey topographic map. The map images are made by scanning published paper maps on high-resolution scanners. The raster image is georeferenced and fit to the Universal Transverse Mercator (UTM) projection.

GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

STREET AND ADDRESS INFORMATION

GEOCHECK ®- PHYSICAL SETTING SOURCE ADDENDUM

TARGET PROPERTY ADDRESS

FORT BENNING
SEE COORDINATES
FORT MITCHELL, AL 36856

TARGET PROPERTY COORDINATES

Latitude (North):	32.3074 - 32° 18' 26.64''
Longitude (West):	84.9933 - 84° 59' 35.88''
Universal Tranverse Mercator:	Zone 16
UTM X (Meters):	688929.2
UTM Y (Meters):	3576089.5
Elevation:	334 ft. above sea level

USGS TOPOGRAPHIC MAP

Target Property Map:	32084-C8 FORT BENNING, GA AL
Most Recent Revision:	1993
West Map:	32085-C1 FORT MITCHELL, AL GA
Most Recent Revision:	1984

EDR's GeoCheck Physical Setting Source Addendum is provided to assist the environmental professional in forming an opinion about the impact of potential contaminant migration.

Assessment of the impact of contaminant migration generally has two principal investigative components:

1. Groundwater flow direction, and
2. Groundwater flow velocity.

Groundwater flow direction may be impacted by surface topography, hydrology, hydrogeology, characteristics of the soil, and nearby wells. Groundwater flow velocity is generally impacted by the nature of the geologic strata.

GEOCHECK® - PHYSICAL SETTING SOURCE SUMMARY

GROUNDWATER FLOW DIRECTION INFORMATION

Groundwater flow direction for a particular site is best determined by a qualified environmental professional using site-specific well data. If such data is not reasonably ascertainable, it may be necessary to rely on other sources of information, such as surface topographic information, hydrologic information, hydrogeologic data collected on nearby properties, and regional groundwater flow information (from deep aquifers).

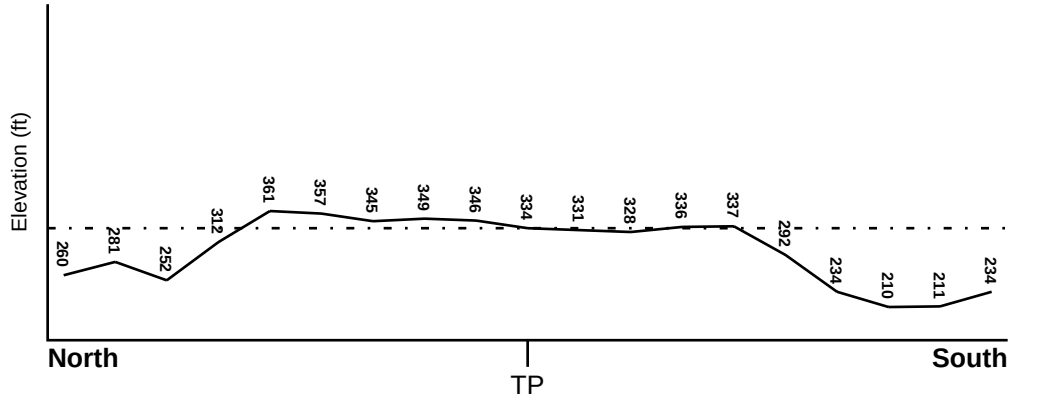
TOPOGRAPHIC INFORMATION

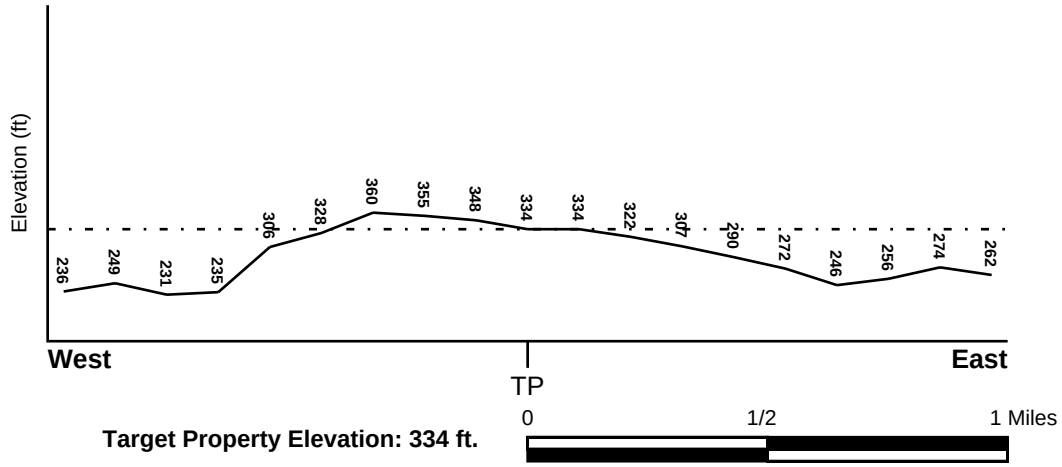
Surface topography may be indicative of the direction of surficial groundwater flow. This information can be used to assist the environmental professional in forming an opinion about the impact of nearby contaminated properties or, should contamination exist on the target property, what downgradient sites might be impacted.

TARGET PROPERTY TOPOGRAPHY

General Topographic Gradient: General ESE

SURROUNDING TOPOGRAPHY: ELEVATION PROFILES





Target Property Elevation: 334 ft.

0 1/2 1 Miles

Source: Topography has been determined from the USGS 7.5' Digital Elevation Model and should be evaluated on a relative (not an absolute) basis. Relative elevation information between sites of close proximity should be field verified.

GEOCHECK® - PHYSICAL SETTING SOURCE SUMMARY

HYDROLOGIC INFORMATION

Surface water can act as a hydrologic barrier to groundwater flow. Such hydrologic information can be used to assist the environmental professional in forming an opinion about the impact of nearby contaminated properties or, should contamination exist on the target property, what downgradient sites might be impacted.

Refer to the Physical Setting Source Map following this summary for hydrologic information (major waterways and bodies of water).

FEMA FLOOD ZONE

Target Property County	FEMA Flood Electronic Data
RUSSELL, AL	YES - refer to the Overview Map and Detail Map

Flood Plain Panel at Target Property: 01113C - FEMA DFIRM Flood data

Additional Panels in search area: 13053C - FEMA DFIRM Flood data

NATIONAL WETLAND INVENTORY

NWI Quad at Target Property	NWI Electronic Data Coverage
FORT BENNING	YES - refer to the Overview Map and Detail Map

HYDROGEOLOGIC INFORMATION

Hydrogeologic information obtained by installation of wells on a specific site can often be an indicator of groundwater flow direction in the immediate area. Such hydrogeologic information can be used to assist the environmental professional in forming an opinion about the impact of nearby contaminated properties or, should contamination exist on the target property, what downgradient sites might be impacted.

AQUIFLOW®

Search Radius: 1.000 Mile.

EDR has developed the AQUIFLOW Information System to provide data on the general direction of groundwater flow at specific points. EDR has reviewed reports submitted by environmental professionals to regulatory authorities at select sites and has extracted the date of the report, groundwater flow direction as determined hydrogeologically, and the depth to water table.

MAP ID	LOCATION FROM TP	GENERAL DIRECTION GROUNDWATER FLOW
Not Reported		

GEOCHECK® - PHYSICAL SETTING SOURCE SUMMARY

GROUNDWATER FLOW VELOCITY INFORMATION

Groundwater flow velocity information for a particular site is best determined by a qualified environmental professional using site specific geologic and soil strata data. If such data are not reasonably ascertainable, it may be necessary to rely on other sources of information, including geologic age identification, rock stratigraphic unit and soil characteristics data collected on nearby properties and regional soil information. In general, contaminant plumes move more quickly through sandy-gravelly types of soils than silty-clayey types of soils.

GEOLOGIC INFORMATION IN GENERAL AREA OF TARGET PROPERTY

Geologic information can be used by the environmental professional in forming an opinion about the relative speed at which contaminant migration may be occurring.

ROCK STRATIGRAPHIC UNIT

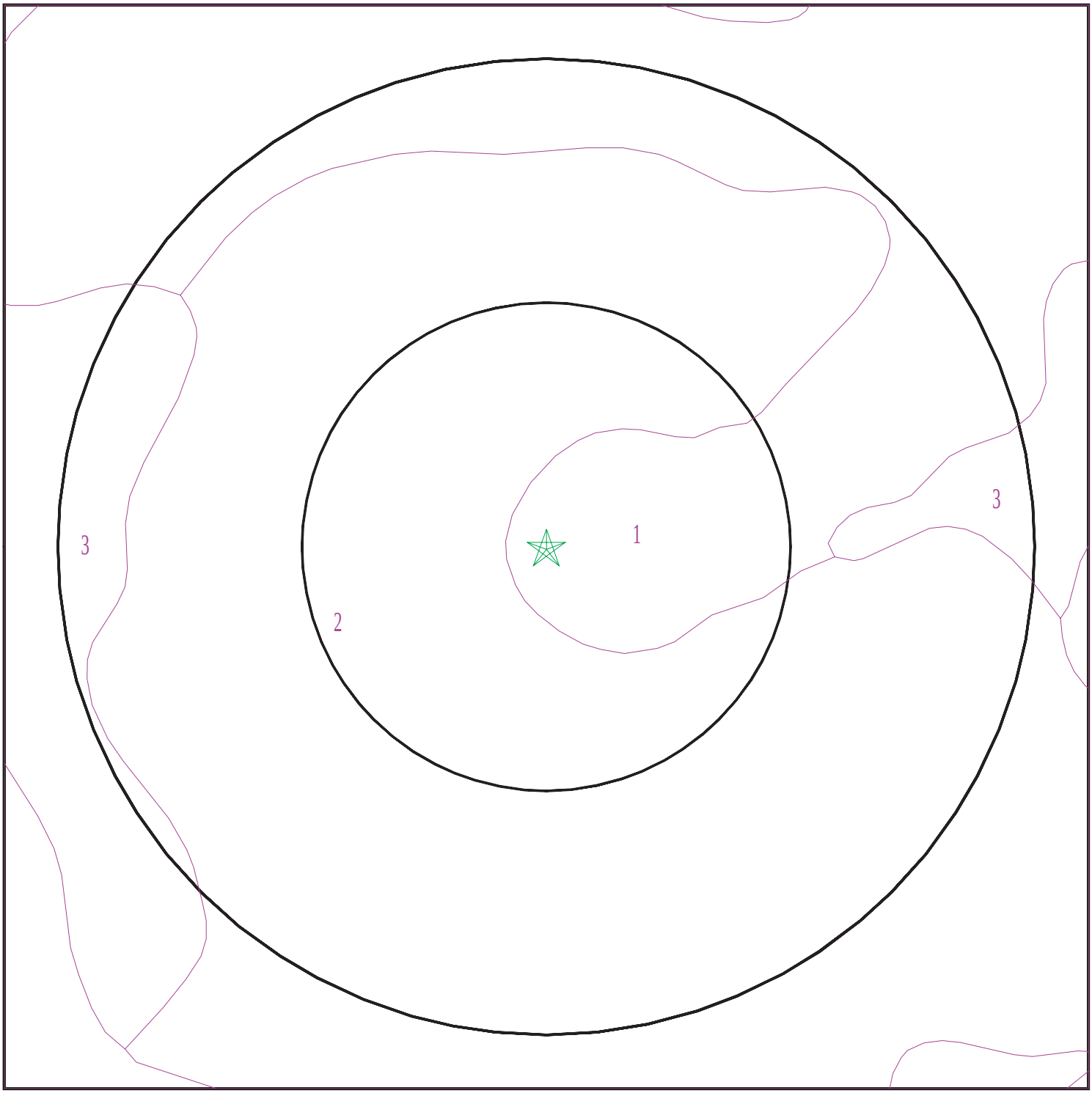
Era:	Mesozoic
System:	Cretaceous
Series:	Austin and Eagle Ford Groups
Code:	uK2 *(decoded above as Era, System & Series)*

GEOLOGIC AGE IDENTIFICATION

Category: Stratified Sequence

Geologic Age and Rock Stratigraphic Unit Source: P.G. Schruben, R.E. Arndt and W.J. Bawiec, Geology of the Conterminous U.S. at 1:2,500,000 Scale - a digital representation of the 1974 P.B. King and H.M. Beikman Map, USGS Digital Data Series DDS - 11 (1994).

SSURGO SOIL MAP - 3969636.2s



Target Property
SSURGO Soil
Water

0 1/16 1/8 1/4 Miles

N

SITE NAME:	Fort Benning	CLIENT:	Tetra Tech Inc.
ADDRESS:	See Coordinates Fort Mitchell AL 36856	CONTACT:	Derrick Haltiwanger
LAT/LONG:	32.3074 / 84.9933	INQUIRY #:	3969636.2s
		DATE:	June 11, 2014 12:42 pm

GEOCHECK® - PHYSICAL SETTING SOURCE SUMMARY

DOMINANT SOIL COMPOSITION IN GENERAL AREA OF TARGET PROPERTY

The U.S. Department of Agriculture's (USDA) Soil Conservation Service (SCS) leads the National Cooperative Soil Survey (NCSS) and is responsible for collecting, storing, maintaining and distributing soil survey information for privately owned lands in the United States. A soil map in a soil survey is a representation of soil patterns in a landscape. The following information is based on Soil Conservation Service SSURGO data.

Soil Map ID: 1

Soil Component Name: Troup

Soil Surface Texture: loamy sand

Hydrologic Group: Class A - High infiltration rates. Soils are deep, well drained to excessively drained sands and gravels.

Soil Drainage Class: Well drained

Hydric Status: Partially hydric

Corrosion Potential - Uncoated Steel: Low

Depth to Bedrock Min: > 0 inches

Depth to Watertable Min: > 0 inches

Soil Layer Information							
	Boundary			Classification		Saturated hydraulic conductivity micro m/sec	Soil Reaction (pH)
Layer	Upper	Lower	Soil Texture Class	AASHTO Group	Unified Soil		
1	0 inches	50 inches	loamy sand	Granular materials (35 pct. or less passing No. 200), Silty, or Clayey Gravel and Sand.	COARSE-GRAINED SOILS, Sands, Sands with fines, Silty Sand.	Max: 141 Min: 42	Max: 6 Min: 4.5
2	50 inches	64 inches	sandy loam	Granular materials (35 pct. or less passing No. 200), Silty, or Clayey Gravel and Sand.	COARSE-GRAINED SOILS, Sands, Sands with fines, Silty Sand.	Max: 14 Min: 4	Max: 5.5 Min: 4.5

Soil Map ID: 2

Soil Component Name: Blanton

Soil Surface Texture: loamy sand

Hydrologic Group: Class A - High infiltration rates. Soils are deep, well drained to excessively drained sands and gravels.

Soil Drainage Class: Moderately well drained

GEOCHECK® - PHYSICAL SETTING SOURCE SUMMARY

Hydric Status: Not hydric

Corrosion Potential - Uncoated Steel: High

Depth to Bedrock Min: > 0 inches

Depth to Watertable Min: > 122 inches

Soil Layer Information							
	Boundary			Classification		Saturated hydraulic conductivity micro m/sec	Soil Reaction (pH)
Layer	Upper	Lower	Soil Texture Class	AASHTO Group	Unified Soil		
1	0 inches	42 inches	loamy sand	Granular materials (35 pct. or less passing No. 200), Silty, or Clayey Gravel and Sand.	COARSE-GRAINED SOILS, Sands, Sands with fines, Silty Sand.	Max: 141 Min: 42	Max: 6 Min: 4.5
2	42 inches	51 inches	sandy loam	Granular materials (35 pct. or less passing No. 200), Silty, or Clayey Gravel and Sand.	COARSE-GRAINED SOILS, Sands, Sands with fines, Silty Sand.	Max: 42 Min: 14	Max: 5.5 Min: 4.5
3	51 inches	64 inches	sandy clay loam	Silt-Clay Materials (more than 35 pct. passing No. 200), Clayey Soils.	COARSE-GRAINED SOILS, Sands, Sands with fines, Clayey sand.	Max: 14 Min: 1.4	Max: 5.5 Min: 4.5

Soil Map ID: 3

Soil Component Name: Springhill

Soil Surface Texture: sandy loam

Hydrologic Group: Class B - Moderate infiltration rates. Deep and moderately deep, moderately well and well drained soils with moderately coarse textures.

Soil Drainage Class: Well drained

Hydric Status: Partially hydric

Corrosion Potential - Uncoated Steel: Moderate

Depth to Bedrock Min: > 0 inches

Depth to Watertable Min: > 0 inches

GEOCHECK® - PHYSICAL SETTING SOURCE SUMMARY

Soil Layer Information							
	Boundary			Classification		Saturated hydraulic conductivity micro m/sec	Soil Reaction (pH)
Layer	Upper	Lower	Soil Texture Class	AASHTO Group	Unified Soil		
1	0 inches	7 inches	sandy loam	Granular materials (35 pct. or less passing No. 200), Silty, or Clayey Gravel and Sand.	COARSE-GRAINED SOILS, Sands, Sands with fines, Silty Sand.	Max: 42 Min: 14	Max: 5.5 Min: 4.5
2	7 inches	42 inches	sandy clay loam	Silt-Clay Materials (more than 35 pct. passing No. 200), Clayey Soils.	COARSE-GRAINED SOILS, Sands, Sands with fines, Clayey sand.	Max: 14 Min: 4	Max: 5.5 Min: 4.5
3	42 inches	64 inches	sandy loam	Granular materials (35 pct. or less passing No. 200), Silty, or Clayey Gravel and Sand.	COARSE-GRAINED SOILS, Sands, Sands with fines, Silty Sand.	Max: 42 Min: 14	Max: 5.5 Min: 4.5

LOCAL / REGIONAL WATER AGENCY RECORDS

EDR Local/Regional Water Agency records provide water well information to assist the environmental professional in assessing sources that may impact ground water flow direction, and in forming an opinion about the impact of contaminant migration on nearby drinking water wells.

WELL SEARCH DISTANCE INFORMATION

DATABASE	SEARCH DISTANCE (miles)
Federal USGS	1.000
Federal FRDS PWS	Nearest PWS within 1 mile
State Database	1.000

FEDERAL USGS WELL INFORMATION

MAP ID	WELL ID	LOCATION FROM TP
1	USGS40000004040	1/2 - 1 Mile WNW
2	USGS40000004010	1/2 - 1 Mile WSW

GEOCHECK® - PHYSICAL SETTING SOURCE SUMMARY

FEDERAL FRDS PUBLIC WATER SUPPLY SYSTEM INFORMATION

MAP ID	WELL ID	LOCATION FROM TP

No PWS System Found

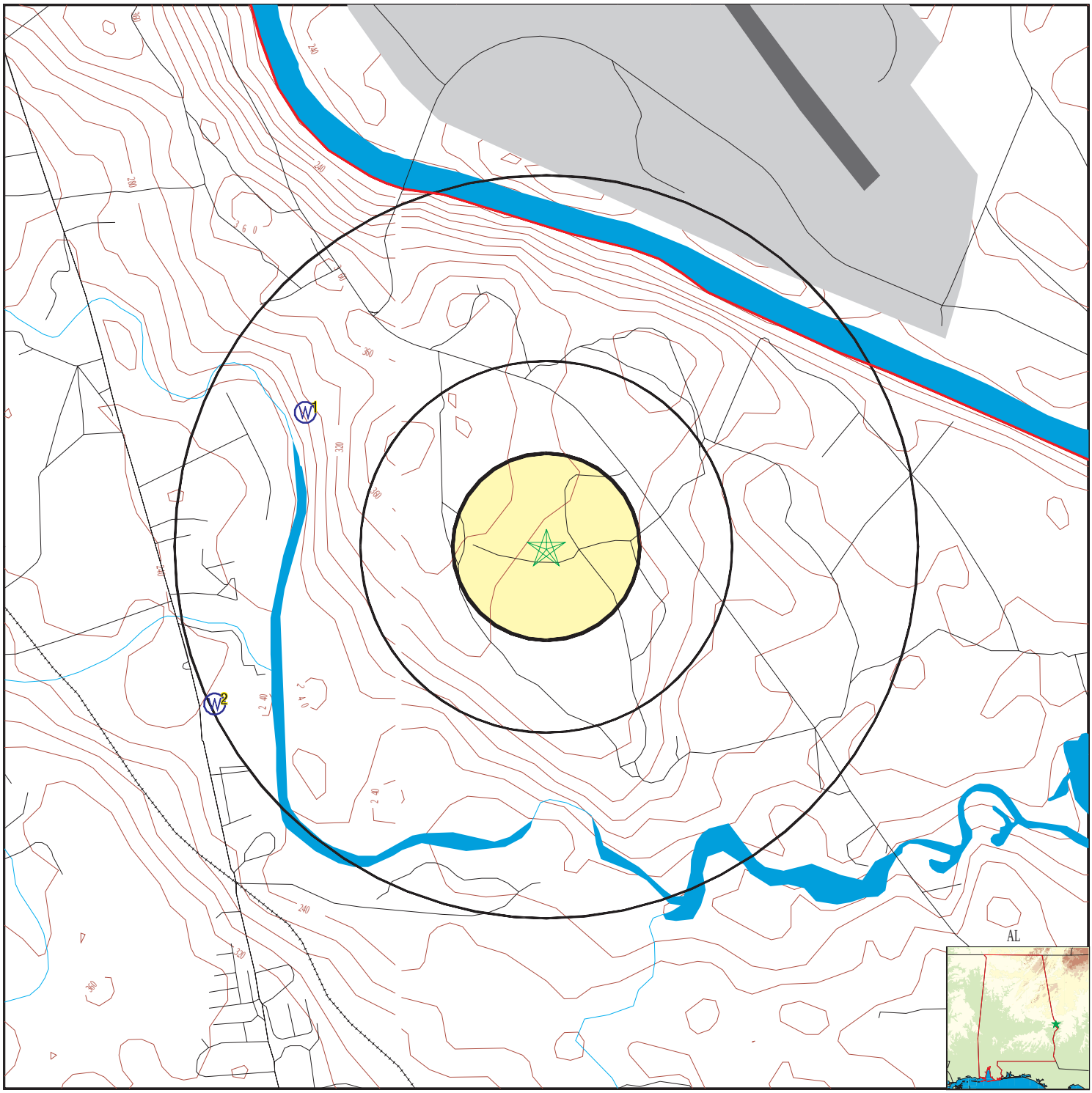
Note: PWS System location is not always the same as well location.

STATE DATABASE WELL INFORMATION

MAP ID	WELL ID	LOCATION FROM TP

No Wells Found

PHYSICAL SETTING SOURCE MAP - 3969636.2s



- County Boundary
- Major Roads
- Contour Lines
- Airports
- Earthquake epicenter, Richter 5 or greater
- Water Wells
- Public Water Supply Wells
- Cluster of Multiple Icons
- Groundwater Flow Direction
- GI Indeterminate Groundwater Flow at Location
- GV Groundwater Flow Varies at Location
- Oil, gas or related wells

SITE NAME:	Fort Benning	CLIENT:	Tetra Tech Inc.
ADDRESS:	See Coordinates Fort Mitchell AL 36856	CONTACT:	Derrick Haltiwanger
LAT/LONG:	32.3074 / 84.9933	INQUIRY #:	3969636.2s
		DATE:	June 11, 2014 12:42 pm

GEOCHECK® - PHYSICAL SETTING SOURCE MAP FINDINGS

Map ID
Direction
Distance
Elevation | Database | EDR ID Number

1
WNW **FED USGS** **USGS40000004040**
1/2 - 1 Mile
Lower

Org. Identifier:	USGS-AL		
Formal name:	USGS Alabama Water Science Center		
Monloc Identifier:	USGS-321858085010601		
Monloc name:	K 3-USGS 321858085010601		
Monloc type:	Well		
Monloc desc:	FLOWS WHEN DEMAND IS LIGHT IN 1961.		
Huc code:	03130003	Drainagearea value:	Not Reported
Drainagearea Units:	Not Reported	Contrib drainagearea:	Not Reported
Contrib drainagearea units:	Not Reported	Latitude:	32.3126482
Longitude:	-85.0043751	Sourcemap scale:	24000
Horiz Acc measure:	5	Horiz Acc measure units:	seconds
Horiz Collection method:	Interpolated from map		
Horiz coord refsys:	NAD83	Vert measure val:	233
Vert measure units:	feet	Vertacc measure val:	5
Vert accmeasure units:	feet		
Vertcollection method:	Altimeter		
Vert coord refsys:	NGVD29	Countrycode:	US
Aquifername:	Southeastern Coastal Plain aquifer system		
Formation type:	Eutaw Formation		
Aquifer type:	Confined single aquifer		
Construction date:	19300100	Welldepth:	160
Welldepth units:	ft	Wellholedepth:	160
Wellholedepth units:	ft		

Ground-water levels, Number of Measurements: 0

2
WSW **FED USGS** **USGS40000004010**
1/2 - 1 Mile
Lower

Org. Identifier:	USGS-AL		
Formal name:	USGS Alabama Water Science Center		
Monloc Identifier:	USGS-321804085003101		
Monloc name:	K 7-USGS 321804085003101		
Monloc type:	Well		
Monloc desc:	Not Reported		
Huc code:	03130003	Drainagearea value:	Not Reported
Drainagearea Units:	Not Reported	Contrib drainagearea:	Not Reported
Contrib drainagearea units:	Not Reported	Latitude:	32.3012597
Longitude:	-85.0085418	Sourcemap scale:	24000
Horiz Acc measure:	5	Horiz Acc measure units:	seconds
Horiz Collection method:	Interpolated from map		
Horiz coord refsys:	NAD83	Vert measure val:	224
Vert measure units:	feet	Vertacc measure val:	5
Vert accmeasure units:	feet		
Vertcollection method:	Altimeter		
Vert coord refsys:	NGVD29	Countrycode:	US
Aquifername:	Southeastern Coastal Plain aquifer system		
Formation type:	Eutaw Formation		

GEOCHECK® - PHYSICAL SETTING SOURCE MAP FINDINGS

Aquifer type:	Confined single aquifer		
Construction date:	19310100	Welldepth:	220
Welldepth units:	ft	Wellholedepth:	220
Wellholedepth units:	ft		

Ground-water levels, Number of Measurements: 1

Date	Feet below Surface	Feet to Sealevel
1961-07-25	-10	

GEOCHECK® - PHYSICAL SETTING SOURCE MAP FINDINGS
RADON

AREA RADON INFORMATION

State Database: AL Radon

Radon Test Results

Num Tested	< 4 pCi/L	> 4 pCi/L	% > 4 pCi/L	Avg Level	Highest
0	-	-	-	-	-

Federal EPA Radon Zone for RUSSELL County: 2

Note: Zone 1 indoor average level > 4 pCi/L.
: Zone 2 indoor average level >= 2 pCi/L and <= 4 pCi/L.
: Zone 3 indoor average level < 2 pCi/L.

Federal Area Radon Information for RUSSELL COUNTY, AL

Number of sites tested: 8

Area	Average Activity	% <4 pCi/L	% 4-20 pCi/L	% >20 pCi/L
Living Area - 1st Floor	0.638 pCi/L	100%	0%	0%
Living Area - 2nd Floor	Not Reported	Not Reported	Not Reported	Not Reported
Basement	Not Reported	Not Reported	Not Reported	Not Reported

PHYSICAL SETTING SOURCE RECORDS SEARCHED

TOPOGRAPHIC INFORMATION

USGS 7.5' Digital Elevation Model (DEM)
Source: United States Geologic Survey
EDR acquired the USGS 7.5' Digital Elevation Model in 2002 and updated it in 2006. The 7.5 minute DEM corresponds to the USGS 1:24,000- and 1:25,000-scale topographic quadrangle maps. The DEM provides elevation data with consistent elevation units and projection.

Scanned Digital USGS 7.5' Topographic Map (DRG)
Source: United States Geologic Survey
A digital raster graphic (DRG) is a scanned image of a U.S. Geological Survey topographic map. The map images are made by scanning published paper maps on high-resolution scanners. The raster image is georeferenced and fit to the Universal Transverse Mercator (UTM) projection.

HYDROLOGIC INFORMATION

Flood Zone Data: This data, available in select counties across the country, was obtained by EDR in 2003 & 2011 from the Federal Emergency Management Agency (FEMA). Data depicts 100-year and 500-year flood zones as defined by FEMA.

NWI: National Wetlands Inventory. This data, available in select counties across the country, was obtained by EDR in 2002, 2005 and 2010 from the U.S. Fish and Wildlife Service.

HYDROGEOLOGIC INFORMATION

AQUIFLOW^{R} Information System
Source: EDR proprietary database of groundwater flow information
EDR has developed the AQUIFLOW Information System (AIS) to provide data on the general direction of groundwater flow at specific points. EDR has reviewed reports submitted to regulatory authorities at select sites and has extracted the date of the report, hydrogeologically determined groundwater flow direction and depth to water table information.

GEOLOGIC INFORMATION

Geologic Age and Rock Stratigraphic Unit
Source: P.G. Schruben, R.E. Arndt and W.J. Bawiec, Geology of the Conterminous U.S. at 1:2,500,000 Scale - A digital representation of the 1974 P.B. King and H.M. Beikman Map, USGS Digital Data Series DDS - 11 (1994).

STATSGO: State Soil Geographic Database
Source: Department of Agriculture, Natural Resources Conservation Services
The U.S. Department of Agriculture's (USDA) Natural Resources Conservation Service (NRCS) leads the national Conservation Soil Survey (NCSS) and is responsible for collecting, storing, maintaining and distributing soil survey information for privately owned lands in the United States. A soil map in a soil survey is a representation of soil patterns in a landscape. Soil maps for STATSGO are compiled by generalizing more detailed (SSURGO) soil survey maps.

SSURGO: Soil Survey Geographic Database
Source: Department of Agriculture, Natural Resources Conservation Services (NRCS)
Telephone: 800-672-5559
SSURGO is the most detailed level of mapping done by the Natural Resources Conservation Services, mapping scales generally range from 1:12,000 to 1:63,360. Field mapping methods using national standards are used to construct the soil maps in the Soil Survey Geographic (SSURGO) database. SSURGO digitizing duplicates the original soil survey maps. This level of mapping is designed for use by landowners, townships and county natural resource planning and management.

PHYSICAL SETTING SOURCE RECORDS SEARCHED

LOCAL / REGIONAL WATER AGENCY RECORDS

FEDERAL WATER WELLS

PWS: Public Water Systems
Source: EPA/Office of Drinking Water
Telephone: 202-564-3750
Public Water System data from the Federal Reporting Data System. A PWS is any water system which provides water to at least 25 people for at least 60 days annually. PWSs provide water from wells, rivers and other sources.

PWS ENF: Public Water Systems Violation and Enforcement Data
Source: EPA/Office of Drinking Water
Telephone: 202-564-3750
Violation and Enforcement data for Public Water Systems from the Safe Drinking Water Information System (SDWIS) after August 1995. Prior to August 1995, the data came from the Federal Reporting Data System (FRDS).

USGS Water Wells: USGS National Water Inventory System (NWIS)
This database contains descriptive information on sites where the USGS collects or has collected data on surface water and/or groundwater. The groundwater data includes information on wells, springs, and other sources of groundwater.

STATE RECORDS

Alabama Wells Data
Source: Department of Environmental Management
Telephone: 334-271-7985

OTHER STATE DATABASE INFORMATION

Well Surface Locations
Source: Geological Survey of Alabama, State Oil and Gas Board
Telephone: 205-247-3661
A listing of oil and gas well locations in the state

RADON

State Database: AL Radon
Source: Department of Public Health
Telephone: 334-206-5391
Short-Term Test Results for Alabama Counties

Area Radon Information
Source: USGS
Telephone: 703-356-4020
The National Radon Database has been developed by the U.S. Environmental Protection Agency (USEPA) and is a compilation of the EPA/State Residential Radon Survey and the National Residential Radon Survey. The study covers the years 1986 - 1992. Where necessary data has been supplemented by information collected at private sources such as universities and research institutions.

EPA Radon Zones
Source: EPA
Telephone: 703-356-4020
Sections 307 & 309 of IRAA directed EPA to list and identify areas of U.S. with the potential for elevated indoor radon levels.

OTHER

Airport Landing Facilities: Private and public use landing facilities
Source: Federal Aviation Administration, 800-457-6656

Epicenters: World earthquake epicenters, Richter 5 or greater
Source: Department of Commerce, National Oceanic and Atmospheric Administration

Earthquake Fault Lines: The fault lines displayed on EDR's Topographic map are digitized quaternary faultlines, prepared in 1975 by the United State Geological Survey

PHYSICAL SETTING SOURCE RECORDS SEARCHED

STREET AND ADDRESS INFORMATION

Fort Benning
See Coordinates
Fort Mitchell, AL 36856

Inquiry Number: 3969636.3
June 11, 2014

Certified Sanborn® Map Report

6 Armstrong Road, 4th Floor
Shelton, Connecticut 06484
Toll Free: 800.352.0050
www.edrnet.com

Certified Sanborn® Map Report

6/11/14

Site Name:
Fort Benning
See Coordinates
Fort Mitchell, AL 36856

Client Name:
Tetra Tech Inc.
900 Trail Ridge Road
Aiken, SC 29803

EDR Inquiry # 3969636.3

Contact: Derrick Haltiwanger

The Sanborn Library has been searched by EDR and maps covering the target property location as provided by Tetra Tech Inc. were identified for the years listed below. The Sanborn Library is the largest, most complete collection of fire insurance maps. The collection includes maps from Sanborn, Bromley, Perris & Browne, Hopkins, Barlow, and others. Only Environmental Data Resources Inc. (EDR) is authorized to grant rights for commercial reproduction of maps by the Sanborn Library LLC, the copyright holder for the collection. Results can be authenticated by visiting www.edrnet.com/sanborn.

The Sanborn Library is continually enhanced with newly identified map archives. This report accesses all maps in the collection as of the day this report was generated.

Certified Sanborn Results:

Site Name: Fort Benning
Address: See Coordinates
City, State, Zip: Fort Mitchell, AL 36856
Cross Street:
P.O. # 194-5049
Project: Fort Benning EITF Project
Certification # 7054-4FC8-8FF7

UNMAPPED PROPERTY

This report certifies that the complete holdings of the Sanborn Library, LLC collection have been searched based on client supplied target property information, and fire insurance maps covering the target property were not found.

Sanborn® Library search results
Certification # 7054-4FC8-8FF7

The Sanborn Library includes more than 1.2 million fire insurance maps from Sanborn, Bromley, Perris & Browne, Hopkins, Barlow and others which track historical property usage in approximately 12,000 American cities and towns. Collections searched:

- ✓ Library of Congress
- ✓ University Publications of America
- ✓ EDR Private Collection

The Sanborn Library LLC Since 1866™

Limited Permission To Make Copies

Tetra Tech Inc. (the client) is permitted to make up to FIVE photocopies of this Sanborn Map transmittal and each fire insurance map accompanying this report solely for the limited use of its customer. No one other than the client is authorized to make copies. Upon request made directly to an EDR Account Executive, the client may be permitted to make a limited number of additional photocopies. This permission is conditioned upon compliance by the client, its customer and their agents with EDR's copyright policy; a copy of which is available upon request.

Fort Benning
See Coordinates
Fort Mitchell, AL 36856

Inquiry Number: 3969636.5
June 12, 2014

The EDR-City Directory Image Report

Environmental Data Resources Inc

6 Armstrong Road
Shelton, CT 06484
800.352.0050
www.edrnet.com

TABLE OF CONTENTS

SECTION

Executive Summary

Findings

City Directory Images

Thank you for your business.
Please contact EDR at 1-800-352-0050
with any questions or comments.

EXECUTIVE SUMMARY

DESCRIPTION

Environmental Data Resources, Inc.'s (EDR) City Directory Report is a screening tool designed to assist environmental professionals in evaluating potential liability on a target property resulting from past activities. EDR's City Directory Report includes a search of available city directory data at 5 year intervals.

RESEARCH SUMMARY

The following research sources were consulted in the preparation of this report. A check mark indicates where information was identified in the source and provided in this report.

Year	*Target Street*	*Cross Street*	*Source*
2013	☐	☑	Cole Information Services
2008	☐	☑	Cole Information Services
2003	☐	☑	Cole Information Services
1999	☐	☑	Cole Information Services

RECORD SOURCES

EDR is licensed to reproduce certain City Directory works by the copyright holders of those works. The purchaser of this EDR City Directory Report may include it in report(s) delivered to a customer. Reproduction of City Directories without permission of the publisher or licensed vendor may be a violation of copyright.

FINDINGS

TARGET PROPERTY STREET

See Coordinates
Fort Mitchell, AL 36856

Year	*CD Image*	*Source*	

101ST AIRBORNE DIVISION RD

2013	-	Cole Information Services	Street not listed in Source
2008	-	Cole Information Services	Street not listed in Source
2003	-	Cole Information Services	Street not listed in Source
1999	-	Cole Information Services	Street not listed in Source

FINDINGS

CROSS STREETS

Year	*CD Image*	*Source*
CANDI LN		
2013	pg. A1	Cole Information Services
2008	pg. A2	Cole Information Services
2003	pg. A3	Cole Information Services
1999	pg. A4	Cole Information Services

City Directory Images

Target Street	Cross Street	Source
-	✓	Cole Information Services

CANDI LN 2013

1	JERRY MONEY
2	HEIDE CUNNINGHAM
4	GERALD BEBEAU
6	JOHN HOLMBERG
7	GLORIA STUMP
13	RICKEY SMITH
15	OCCUPANT UNKNOWN
20	DOYLE GILLEY
23	OCCUPANT UNKNOWN
24	GLENDA VINYARD
26	RONNIE HENSON
30	S DANGELO
32	OCCUPANT UNKNOWN
35	DUSTIN GELNER
36	JOHN ELLIS
37	GEORGE CAPPS
38	DAVY JAMIESON

Target Street	Cross Street	Source
-	✓	Cole Information Services

CANDI LN 2008

1	GREGORY JONES
2	HEIDE CUNNINGHAM
4	BEBEAU GERALD
6	JOHN HOLMBERG
7	ERNEST STUMP
13	RICKEY SMITH
15	GEORGE TAYLOR
17	HARRY SWIENCKI
20	DOYLE GILLEY
23	GERALD BEBEAU
24	GLENDA VINYARD
30	S DANGELO
32	LEONARD CHAPMAN
35	BETTY MCALPIN
36	JOHN ELLIS
37	GEORGE CAPPS

Target Street	Cross Street	Source
-	✓	Cole Information Services

CANDI LN 2003

2	JONATHAN BEASLEY
7	ERNEST STUMP
13	KEVIN SMITH
17	HARRY SWIENCKI
20	DOYLE GILLEY
21	JAMES PAIGE
24	GLENDA VINYARD
26	ERNA GREENE
32	TERRY ZELLAR
35	BETTY MCALPIN
36	BLANCA COLEMAN
38	ILONA WEAVER

Target Street	Cross Street	Source
-	✓	Cole Information Services

CANDI LN 1999

2	HEIDE CUNNINGHAM
24	GLENDA NETHERLAND

APPENDIX D
HISTORIC AERIAL PHOTOGRAPHS AND TOPOGRAPHICAL MAPS

This page intentionally left blank.

Fort Benning
See Coordinates
Fort Mitchell, AL 36856

Inquiry Number: 3969636.9
June 13, 2014

The EDR Aerial Photo Decade Package

6 Armstrong Road, 4th Floor
Shelton, Connecticut 06484
Toll Free: 800.352.0050
www.edrnet.com

EDR Aerial Photo Decade Package

Environmental Data Resources, Inc. (EDR) Aerial Photo Decade Package is a screening tool designed to assist environmental professionals in evaluating potential liability on a target property resulting from past activities. EDR's professional researchers provide digitally reproduced historical aerial photographs, and when available, provide one photo per decade.

When delivered electronically by EDR, the aerial photo images included with this report are for ONE TIME USE ONLY. Further reproduction of these aerial photo images is prohibited without permission from EDR. For more information contact your EDR Account Executive.

Thank you for your business.
Please contact EDR at 1-800-352-0050
with any questions or comments.

Date EDR Searched Historical Sources:

Aerial Photography June 13, 2014

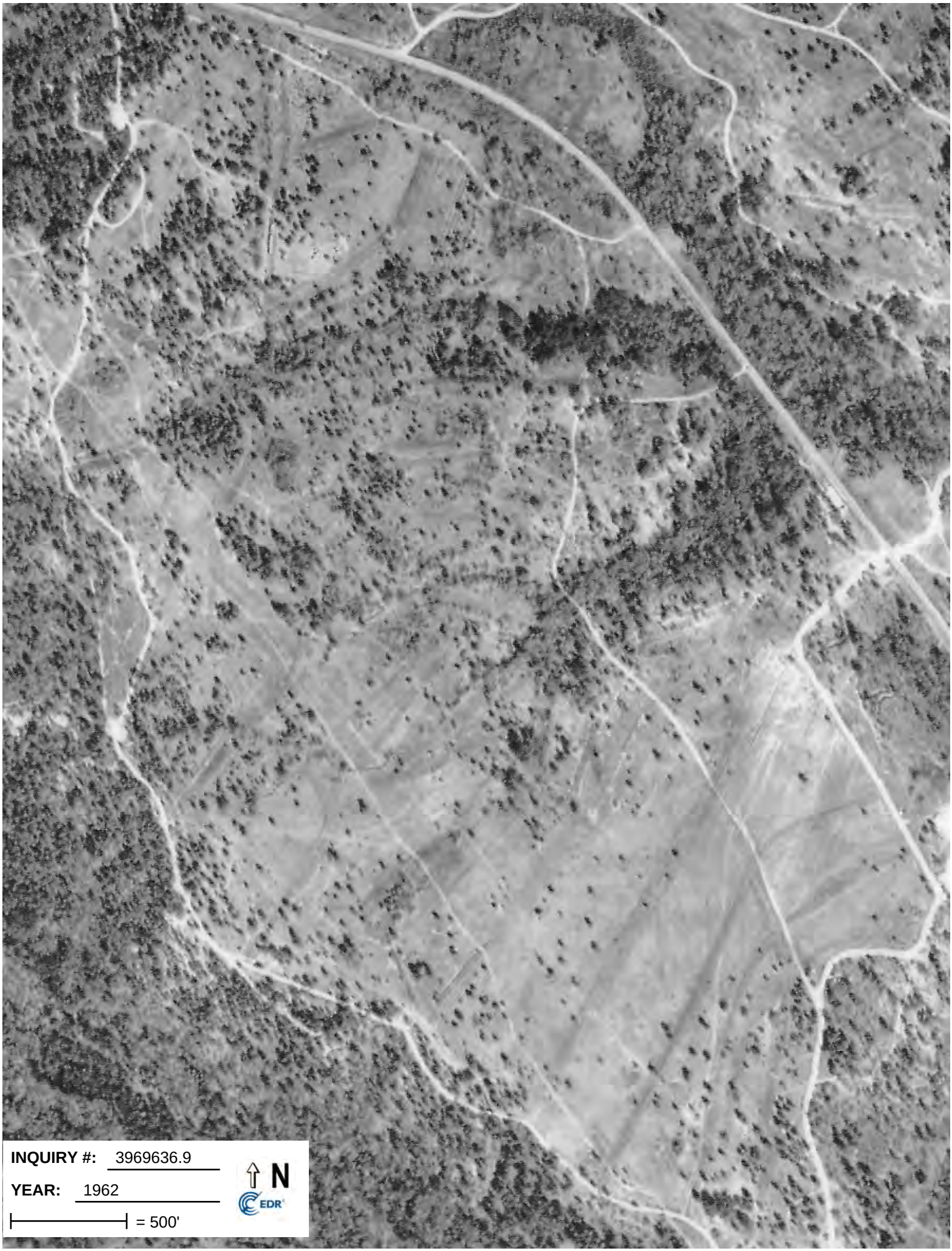
Target Property:

See Coordinates

Fort Mitchell, AL 36856

Year	Scale	Details	Source
1949	Aerial Photograph. Scale: 1"=500'	Panel #: 32084-C8, Fort Benning, GA;/Flight Date: January 01, 1949	EDR
1962	Aerial Photograph. Scale: 1"=500'	Panel #: 32084-C8, Fort Benning, GA;/Flight Date: January 01, 1962	EDR
1968	Aerial Photograph. Scale: 1"=500'	Panel #: 32084-C8, Fort Benning, GA;/Flight Date: December 08, 1968	EDR
1988	Aerial Photograph. Scale: 1"=750'	Panel #: 32084-C8, Fort Benning, GA;/Flight Date: March 21, 1988	EDR
1992	Aerial Photograph. Scale: 1"=750'	Panel #: 32084-C8, Fort Benning, GA;/Flight Date: January 21, 1992	EDR
1993	Aerial Photograph. Scale: 1"=500'	Panel #: 32084-C8, Fort Benning, GA;/DOQQ - acquisition dates: February 08, 1993	EDR
1997	Aerial Photograph. Scale: 1"=750'	Panel #: 32084-C8, Fort Benning, GA;/Flight Date: March 07, 1997	EDR
2005	Aerial Photograph. Scale: 1"=500'	Panel #: 32084-C8, Fort Benning, GA;/Flight Year: 2005	EDR
2006	Aerial Photograph. Scale: 1"=500'	Panel #: 32084-C8, Fort Benning, GA;/Flight Year: 2006	EDR
2007	Aerial Photograph. Scale: 1"=500'	Panel #: 32084-C8, Fort Benning, GA;/Flight Year: 2007	EDR
2009	Aerial Photograph. Scale: 1"=500'	Panel #: 32084-C8, Fort Benning, GA;/Flight Year: 2009	EDR
2010	Aerial Photograph. Scale: 1"=500'	Panel #: 32084-C8, Fort Benning, GA;/Flight Year: 2010	EDR
2011	Aerial Photograph. Scale: 1"=500'	Panel #: 32084-C8, Fort Benning, GA;/Flight Year: 2011	EDR


INQUIRY #: 3969636.9
YEAR: 1949
= 500'
N
EDR


INQUIRY #: 3969636.9
YEAR: 1962
= 500'
N
EDR


INQUIRY #: 3969636.9
YEAR: 1968
= 500'
N
EDR


INQUIRY #: 3969636.9
YEAR: 1988
= 750'
N
EDR


INQUIRY #: 3969636.9
YEAR: 1992
= 750'
N
EDR


INQUIRY #: 3969636.9
YEAR: 1993
= 500'
N
EDR


INQUIRY #: 3969636.9
YEAR: 1997
= 750'
N
EDR


INQUIRY #: 3969636.9
YEAR: 2005
= 500'
N
EDR


INQUIRY #: 3969636.9
YEAR: 2006
= 500'
N
EDR


INQUIRY #: 3969636.9
YEAR: 2007
= 500'
N
EDR


INQUIRY #: 3969636.9
YEAR: 2009
= 500'
N
EDR


INQUIRY #: 3969636.9
YEAR: 2010
= 500'
N
EDR


INQUIRY #: 3969636.9
YEAR: 2011
= 500'
N
EDR

Fort Benning
See Coordinates
Fort Mitchell, AL 36856

Inquiry Number: 3969636.4
June 11, 2014

EDR Historical Topographic Map Report

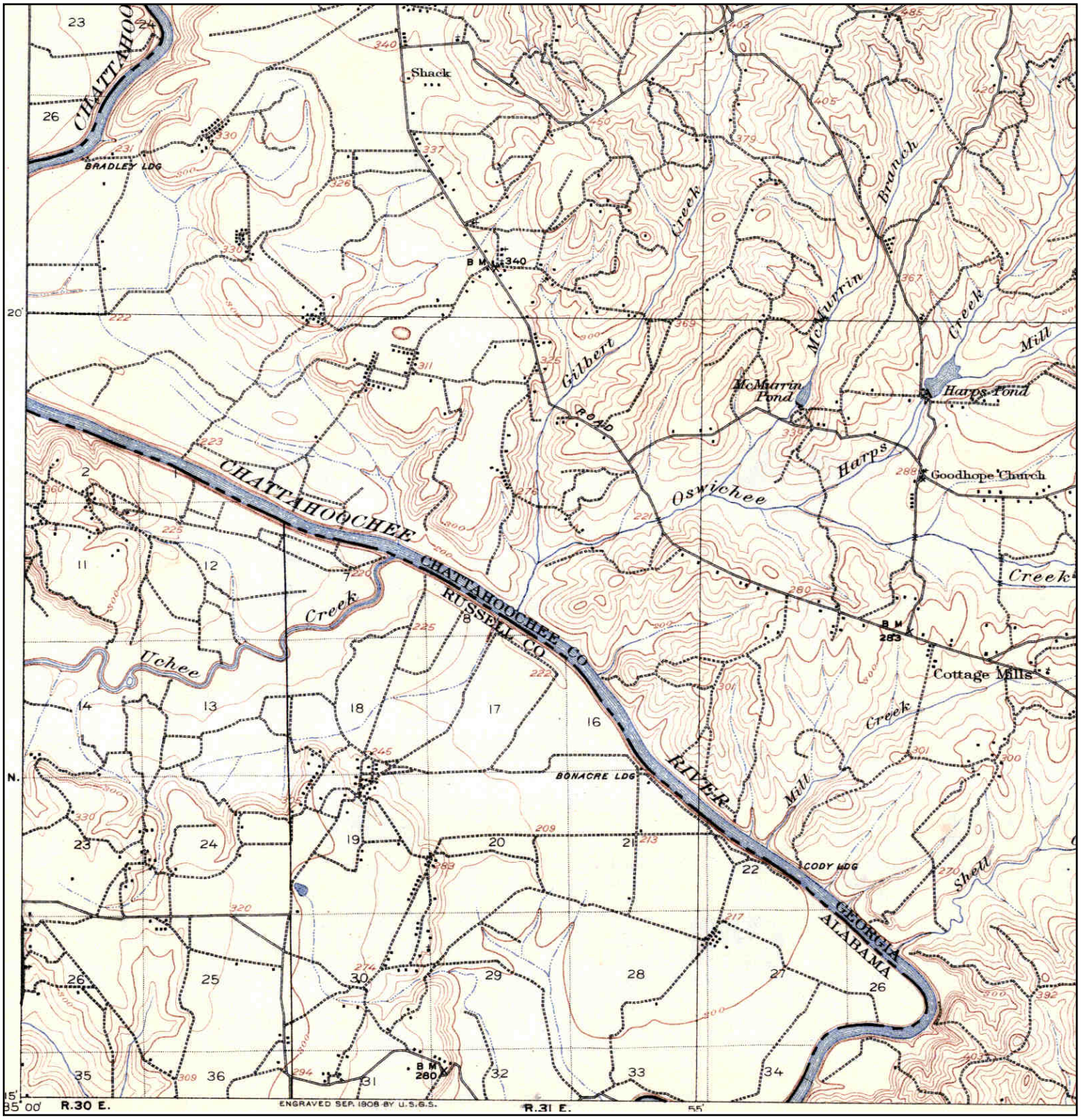
6 Armstrong Road, 4th Floor
Shelton, Connecticut 06484
Toll Free: 800.352.0050
www.edrnet.com

EDR Historical Topographic Map Report

Environmental Data Resources, Inc.s (EDR) Historical Topographic Map Report is designed to assist professionals in evaluating potential liability on a target property resulting from past activities. EDRs Historical Topographic Map Report includes a search of a collection of public and private color historical topographic maps, dating back to the early 1900s.

Thank you for your business.
Please contact EDR at 1-800-352-0050
with any questions or comments.

Historical Topographic Map

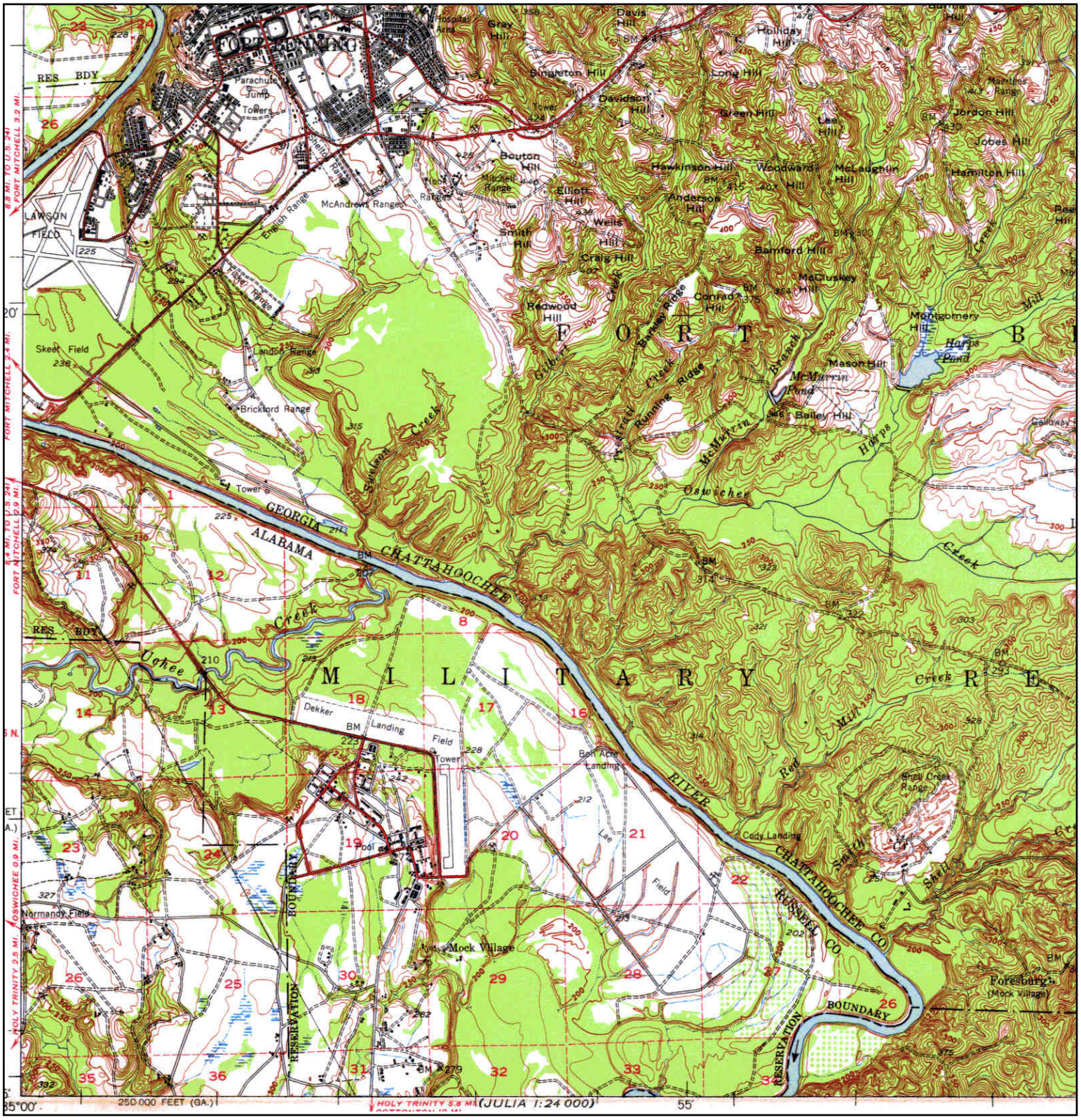


N	TARGET QUAD NAME: COLUMBUS MAP YEAR: 1908 SERIES: 15 SCALE: 1:62500	SITE NAME: Fort Benning ADDRESS: See Coordinates Fort Mitchell, AL 36856 LAT/LONG: 32.3074 / -84.9933	CLIENT: Tetra Tech Inc. CONTACT: Derrick Haltiwanger INQUIRY#: 3969636.4 RESEARCH DATE: 06/11/2014

Historical Topographic Map

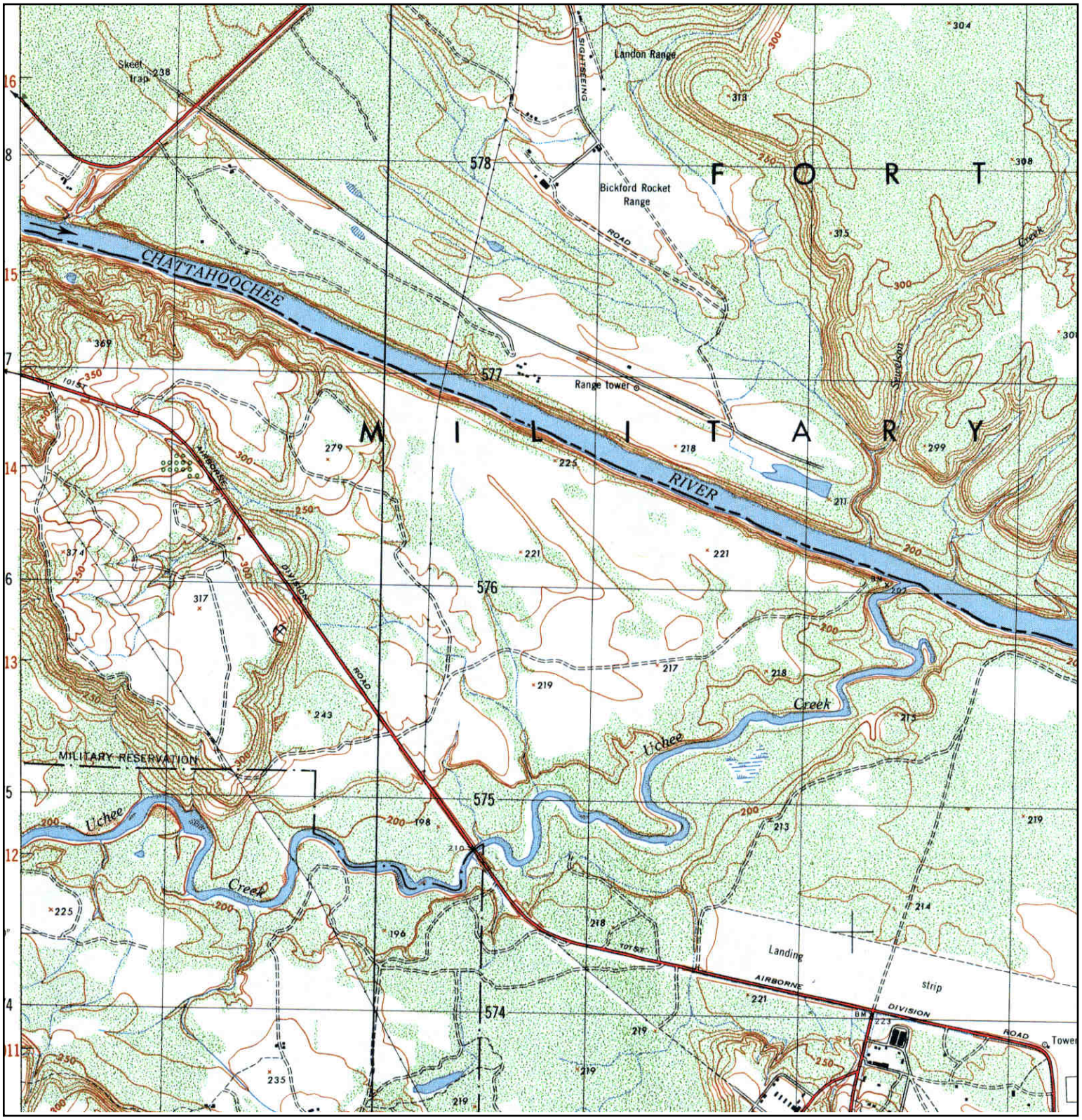
N	TARGET QUAD NAME: COLUMBUS MAP YEAR: 1929 SERIES: 15 SCALE: 1:48000	SITE NAME: Fort Benning ADDRESS: See Coordinates Fort Mitchell, AL 36856 LAT/LONG: 32.3074 / -84.9933	CLIENT: Tetra Tech Inc. CONTACT: Derrick Haltiwanger INQUIRY#: 3969636.4 RESEARCH DATE: 06/11/2014

Historical Topographic Map



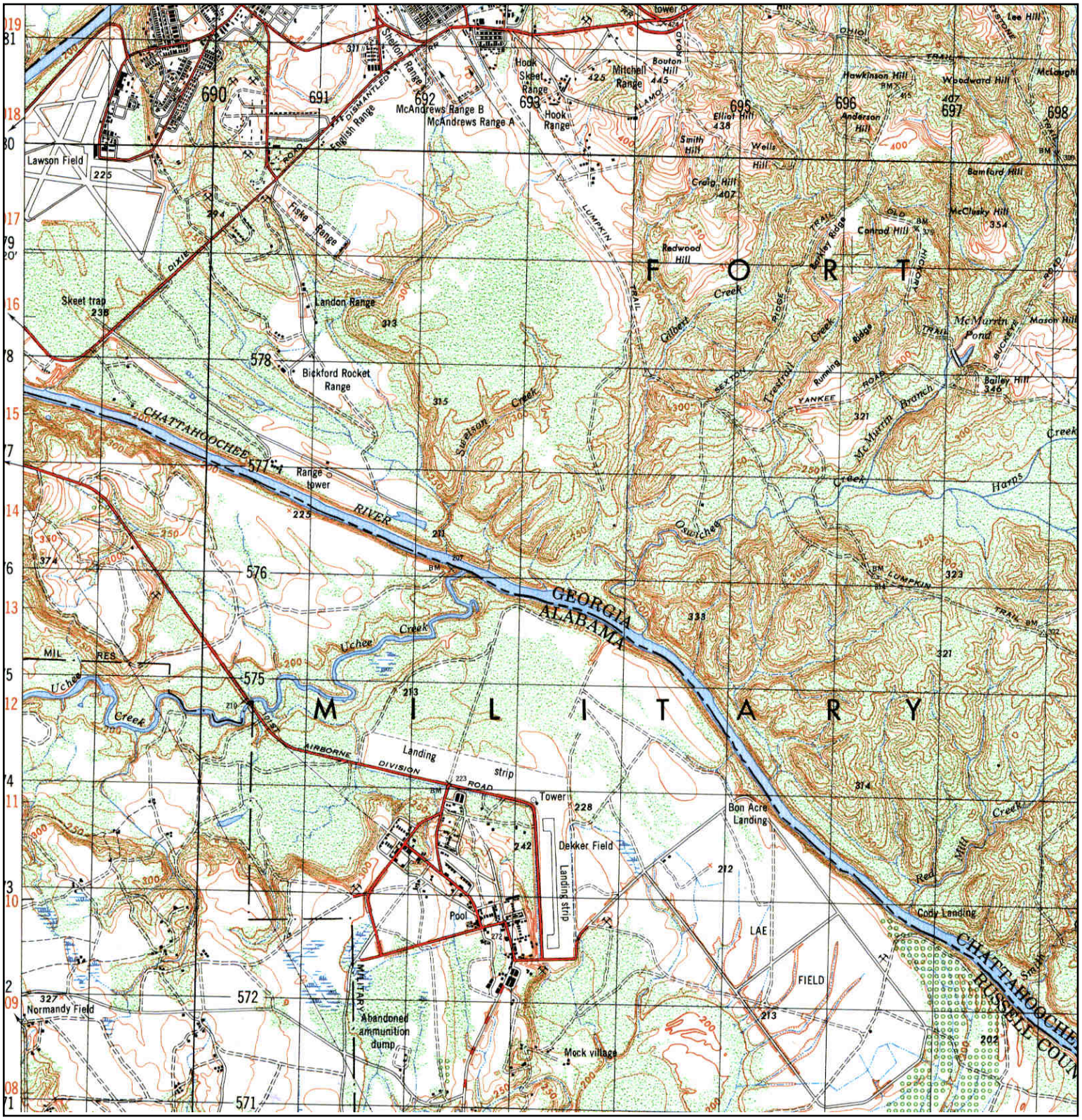
N	TARGET QUAD NAME: COLUMBUS MAP YEAR: 1947 SERIES: 15 SCALE: 1:62500	SITE NAME: Fort Benning ADDRESS: See Coordinates Fort Mitchell, AL 36856 LAT/LONG: 32.3074 / -84.9933	CLIENT: Tetra Tech Inc. CONTACT: Derrick Haltiwanger INQUIRY#: 3969636.4 RESEARCH DATE: 06/11/2014

Historical Topographic Map



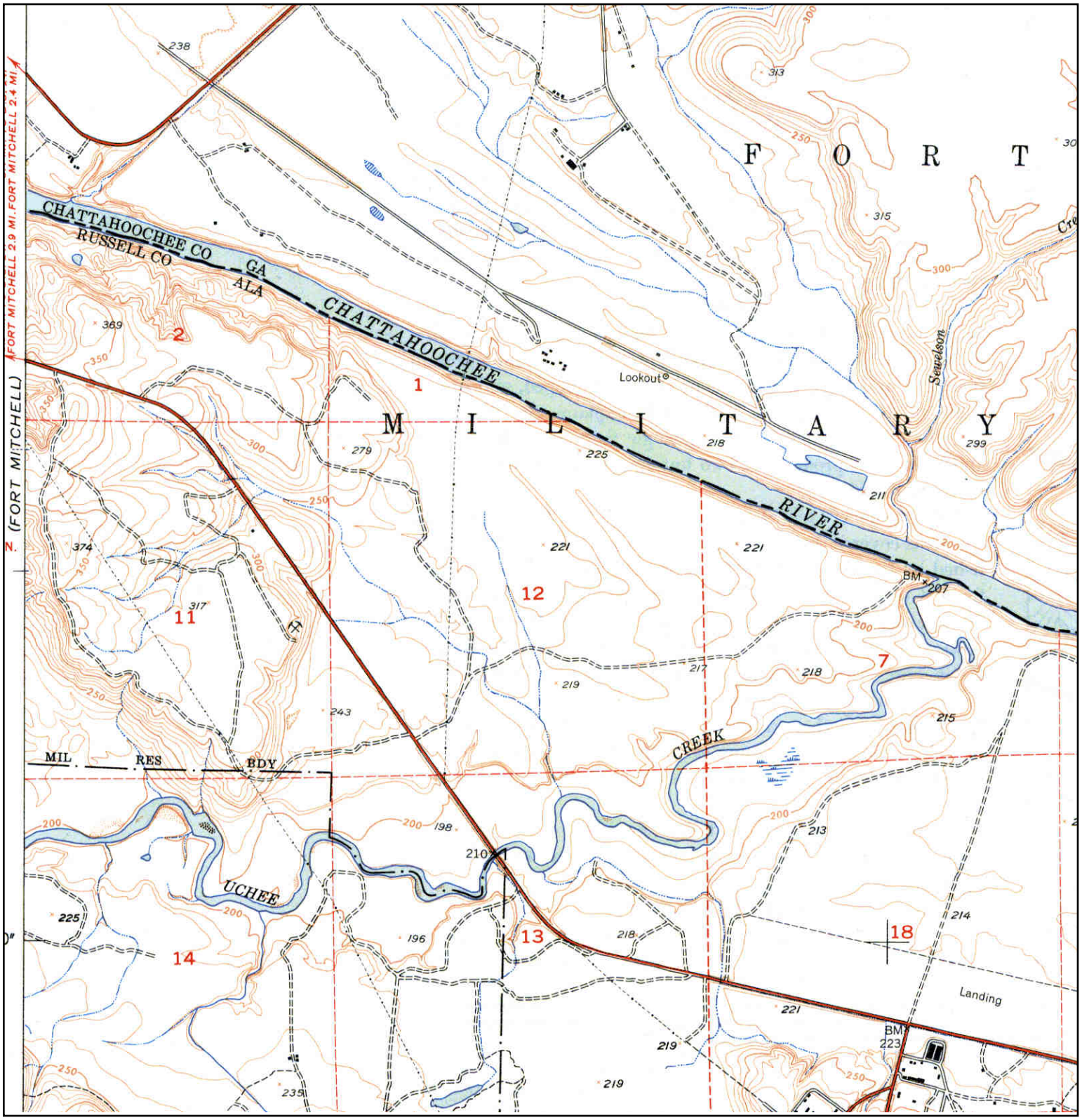
N	TARGET QUAD NAME: FORT BENNING MAP YEAR: 1948 SERIES: 7.5 SCALE: 1:25000	SITE NAME: Fort Benning ADDRESS: See Coordinates Fort Mitchell, AL 36856 LAT/LONG: 32.3074 / -84.9933	CLIENT: Tetra Tech Inc. CONTACT: Derrick Haltiwanger INQUIRY#: 3969636.4 RESEARCH DATE: 06/11/2014

Historical Topographic Map



N	TARGET QUAD NAME: COLUMBUS MAP YEAR: 1948 SERIES: 15 SCALE: 1:50000	SITE NAME: Fort Benning ADDRESS: See Coordinates Fort Mitchell, AL 36856 LAT/LONG: 32.3074 / -84.9933	CLIENT: Tetra Tech Inc. CONTACT: Derrick Haltiwanger INQUIRY#: 3969636.4 RESEARCH DATE: 06/11/2014

Historical Topographic Map

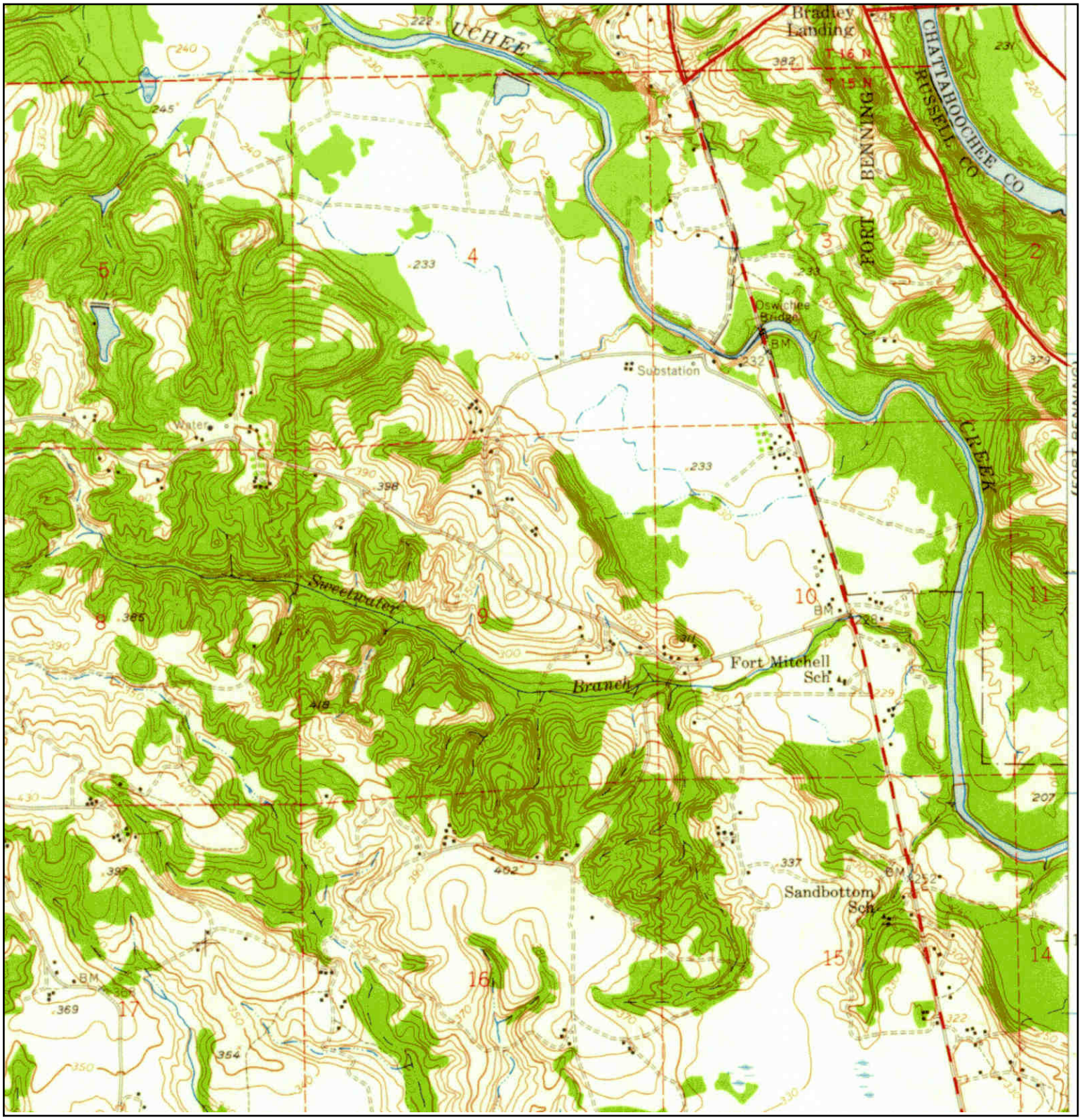


N	TARGET QUAD NAME: FORT BENNING MAP YEAR: 1950 SERIES: 7.5 SCALE: 1:24000	SITE NAME: Fort Benning ADDRESS: See Coordinates Fort Mitchell, AL 36856 LAT/LONG: 32.3074 / -84.9933	CLIENT: Tetra Tech Inc. CONTACT: Derrick Haltiwanger INQUIRY#: 3969636.4 RESEARCH DATE: 06/11/2014

Historical Topographic Map

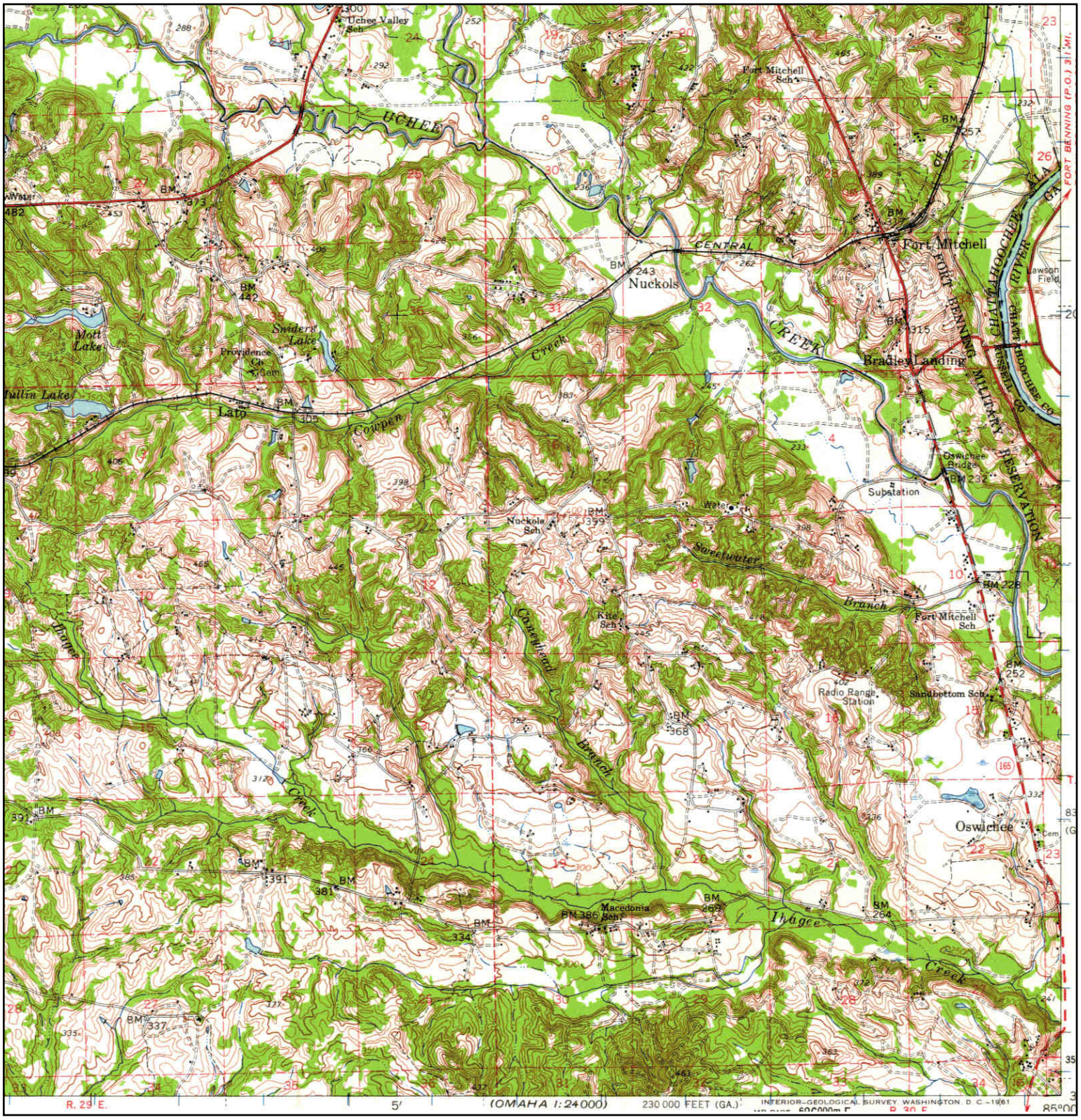
N	ADJOINING QUAD NAME: SEALE MAP YEAR: 1950 SERIES: 15 SCALE: 1:62500	SITE NAME: Fort Benning ADDRESS: See Coordinates Fort Mitchell, AL 36856 LAT/LONG: 32.3074 / -84.9933	CLIENT: Tetra Tech Inc. CONTACT: Derrick Haltiwanger INQUIRY#: 3969636.4 RESEARCH DATE: 06/11/2014

Historical Topographic Map



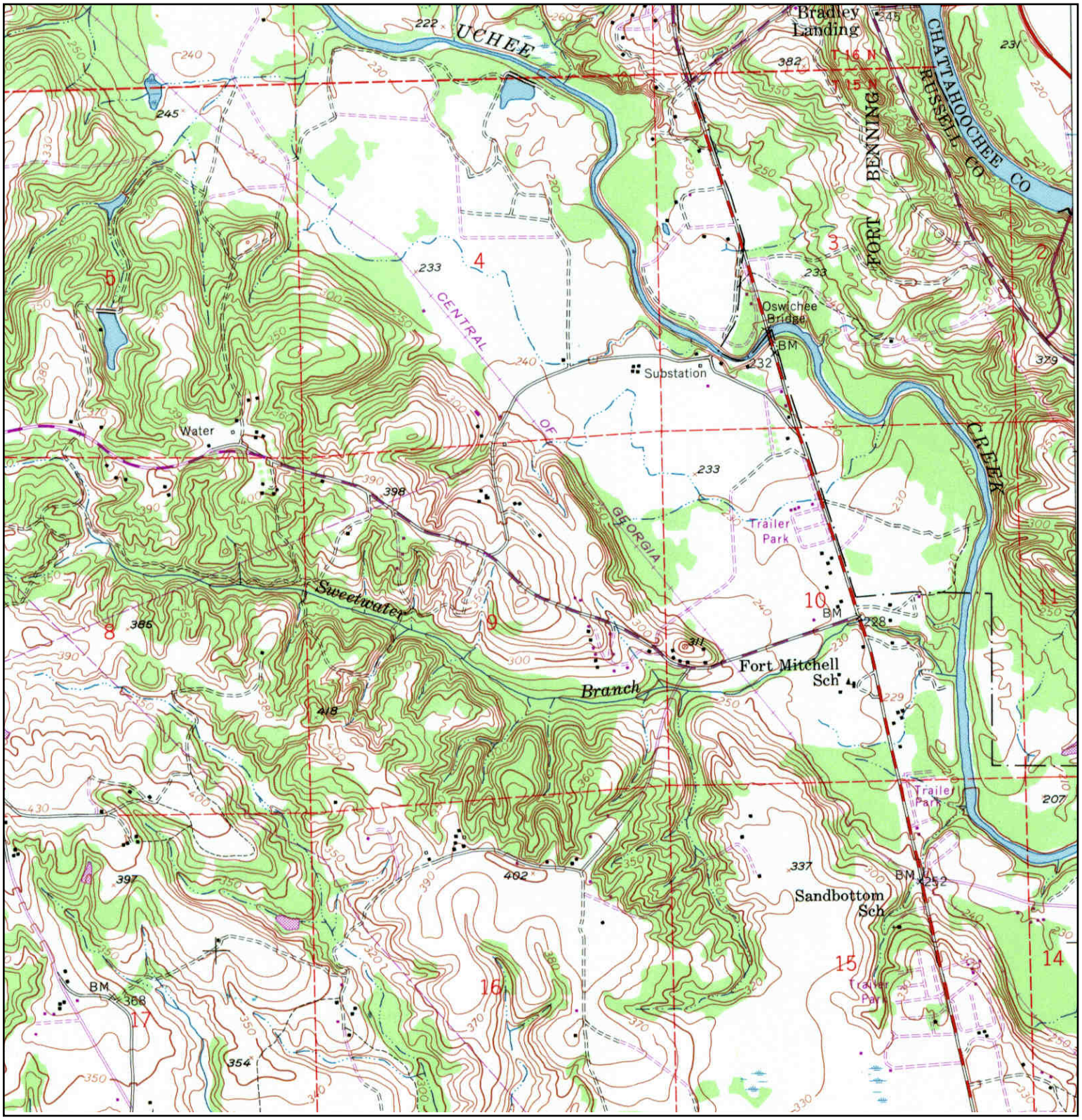
N	ADJOINING QUAD					
	NAME:	FORT MITCHELL	SITE NAME:	Fort Benning	CLIENT:	Tetra Tech Inc.
	MAP YEAR:	1955	ADDRESS:	See Coordinates	CONTACT:	Derrick Haltiwanger
				Fort Mitchell, AL 36856	INQUIRY#:	3969636.4
	SERIES:	7.5	LAT/LONG:	32.3074 / -84.9933	RESEARCH DATE:	06/11/2014
	SCALE:	1:24000				

Historical Topographic Map



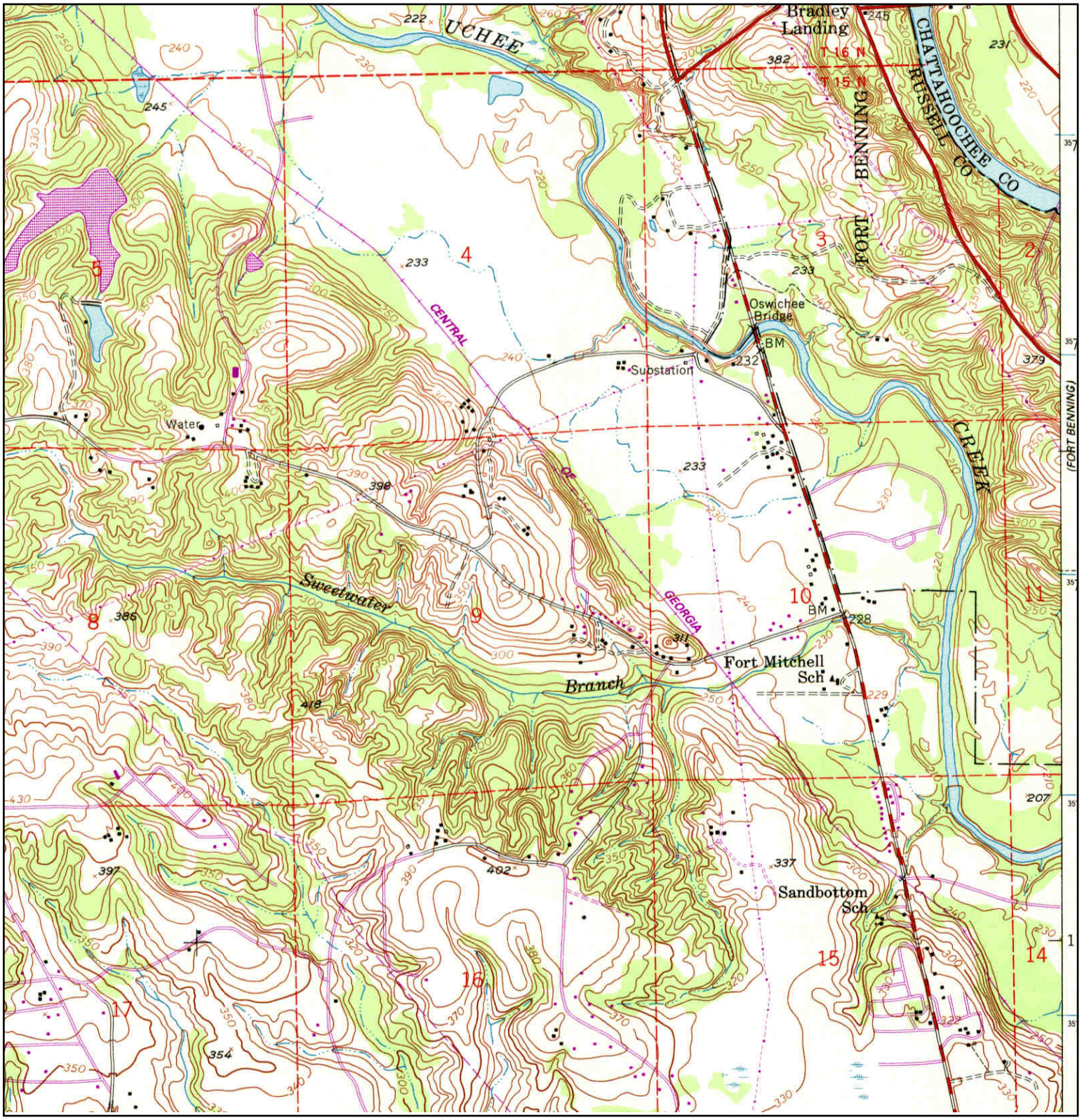
N	ADJOINING QUAD NAME: SEALE MAP YEAR: 1955 SERIES: 15 SCALE: 1:62500	SITE NAME: Fort Benning ADDRESS: See Coordinates Fort Mitchell, AL 36856 LAT/LONG: 32.3074 / -84.9933	CLIENT: Tetra Tech Inc. CONTACT: Derrick Haltiwanger INQUIRY#: 3969636.4 RESEARCH DATE: 06/11/2014

Historical Topographic Map



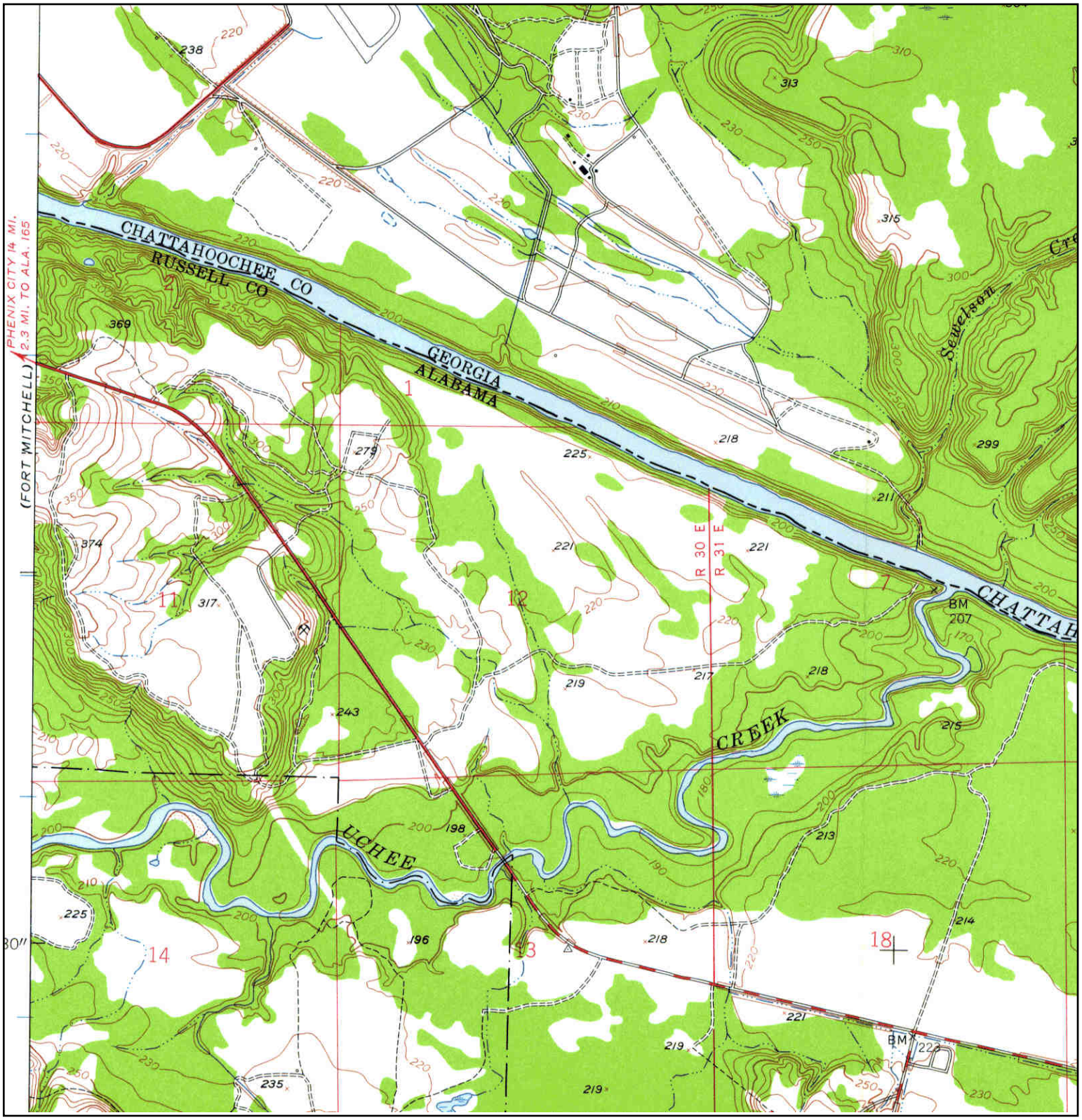
N	ADJOINING QUAD NAME: FORT MITCHELL MAP YEAR: 1968 PHOTOREVISED FROM :1955 SERIES: 7.5 SCALE: 1:24000	SITE NAME: Fort Benning ADDRESS: See Coordinates Fort Mitchell, AL 36856 LAT/LONG: 32.3074 / -84.9933	CLIENT: Tetra Tech Inc. CONTACT: Derrick Haltiwanger INQUIRY#: 3969636.4 RESEARCH DATE: 06/11/2014

Historical Topographic Map



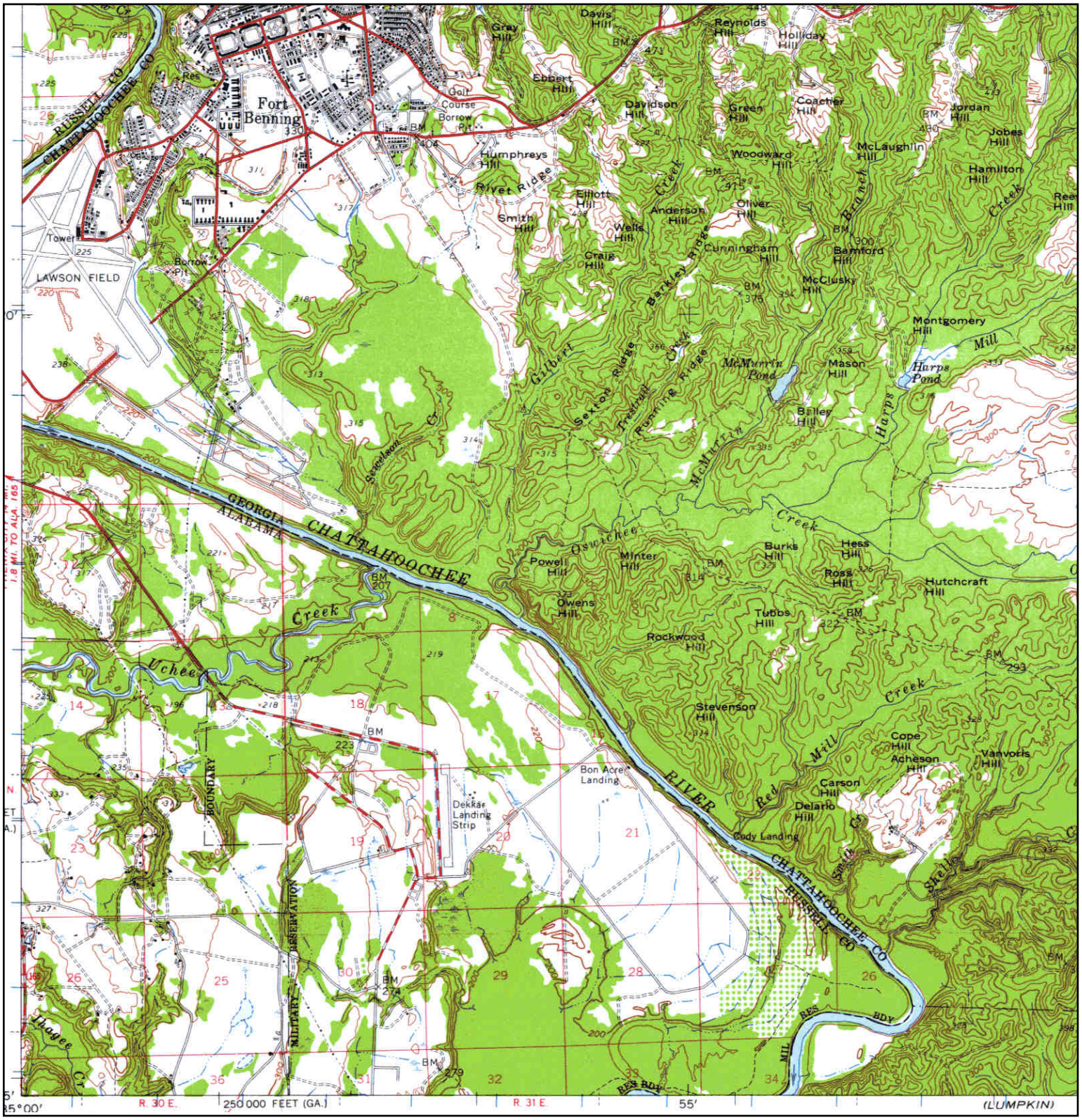
N	ADJOINING QUAD		
	NAME: FORT MITCHELL	SITE NAME: Fort Benning	CLIENT: Tetra Tech Inc.
	MAP YEAR: 1984	ADDRESS: See Coordinates	CONTACT: Derrick Haltiwanger
	PHOTOREVISED FROM :1955	Fort Mitchell, AL 36856	INQUIRY#: 3969636.4
	SERIES: 7.5	LAT/LONG: 32.3074 / -84.9933	RESEARCH DATE: 06/11/2014
	SCALE: 1:24000		

Historical Topographic Map



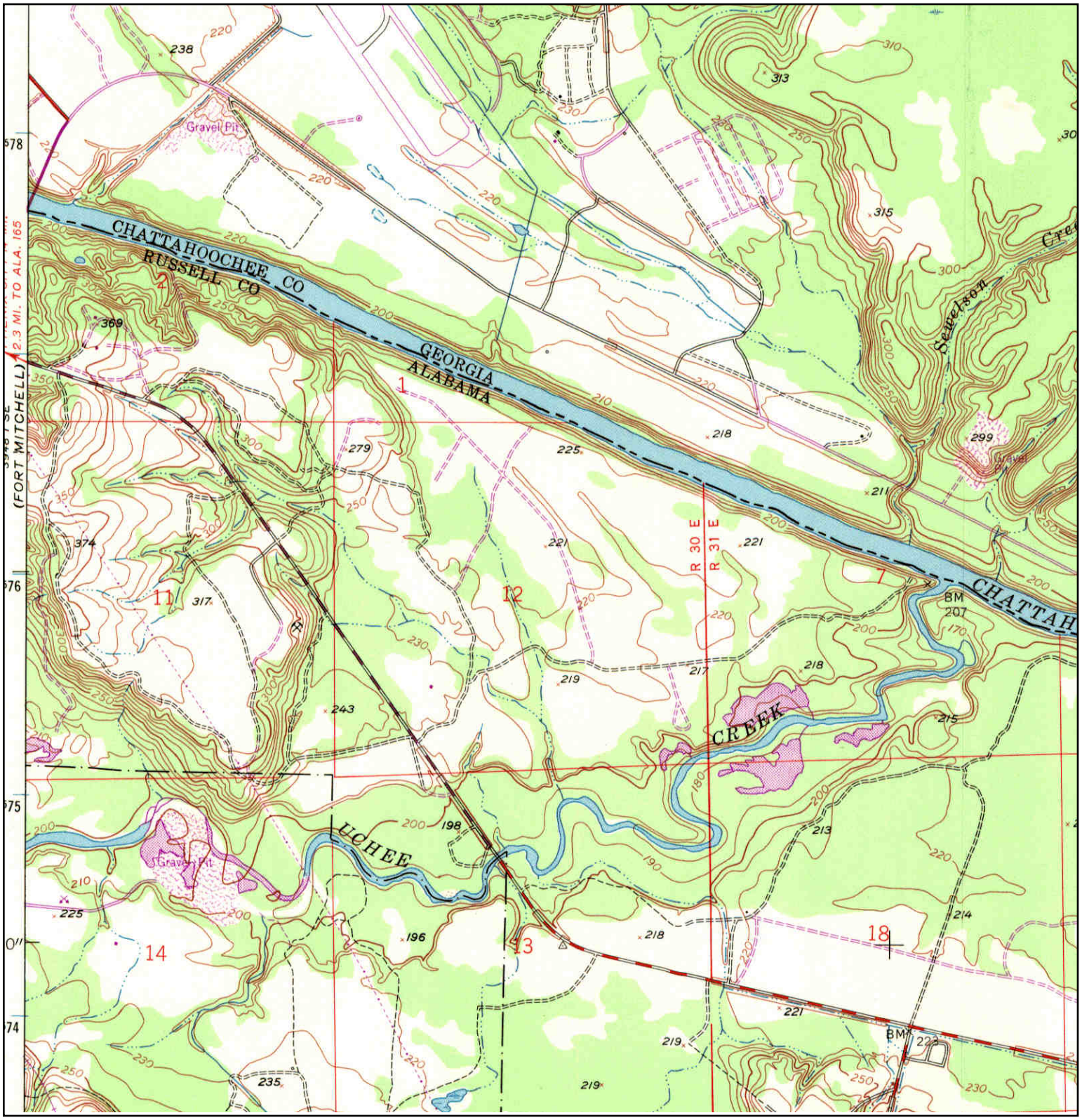
N	TARGET QUAD NAME: FORT BENNING MAP YEAR: 1955 SERIES: 7.5 SCALE: 1:24000	SITE NAME: Fort Benning ADDRESS: See Coordinates Fort Mitchell, AL 36856 LAT/LONG: 32.3074 / -84.9933	CLIENT: Tetra Tech Inc. CONTACT: Derrick Haltiwanger INQUIRY#: 3969636.4 RESEARCH DATE: 06/11/2014

Historical Topographic Map



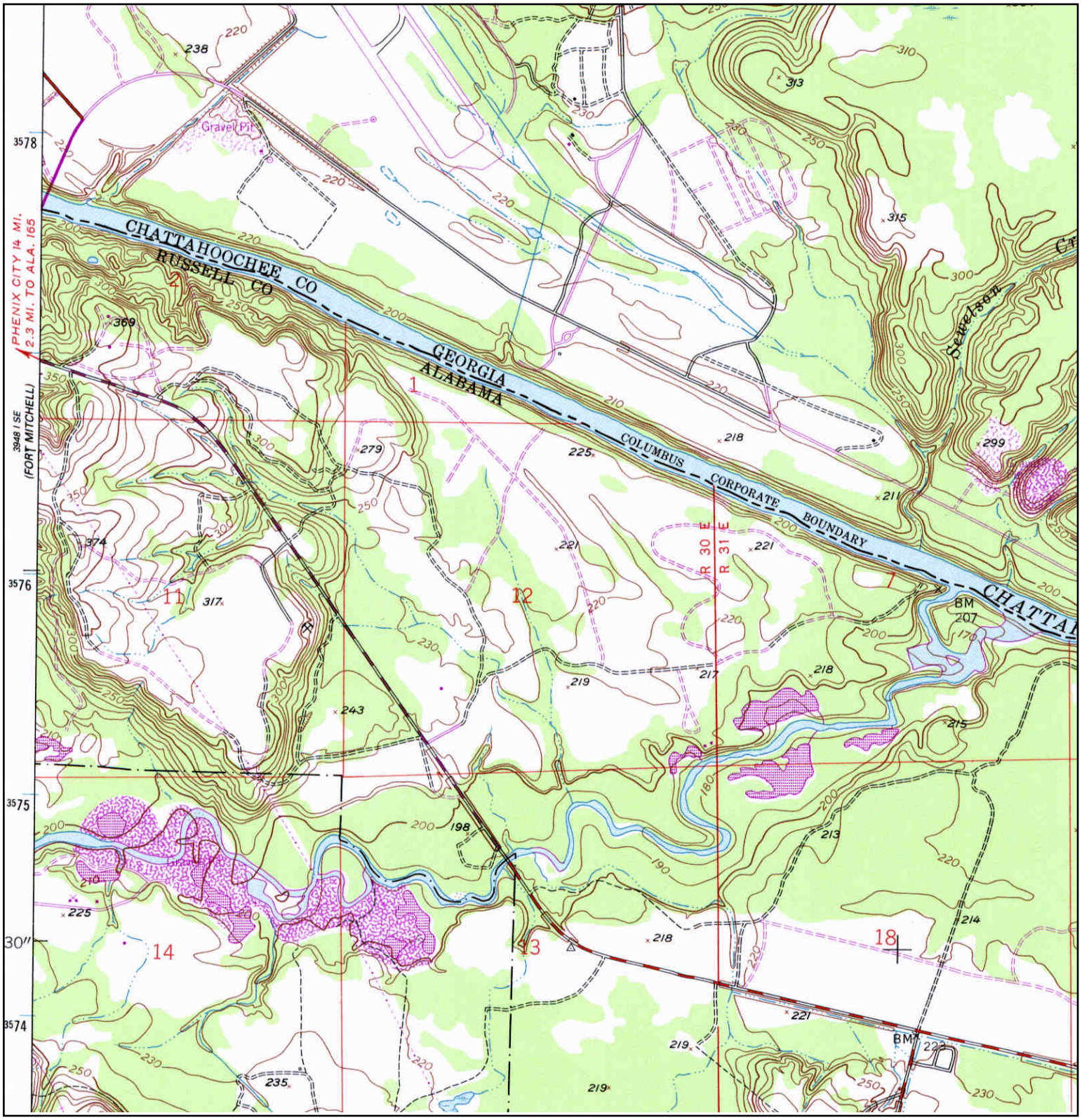
N	TARGET QUAD NAME: COLUMBUS MAP YEAR: 1955 SERIES: 15 SCALE: 1:62500	SITE NAME: Fort Benning ADDRESS: See Coordinates Fort Mitchell, AL 36856 LAT/LONG: 32.3074 / -84.9933	CLIENT: Tetra Tech Inc. CONTACT: Derrick Haltiwanger INQUIRY#: 3969636.4 RESEARCH DATE: 06/11/2014

Historical Topographic Map



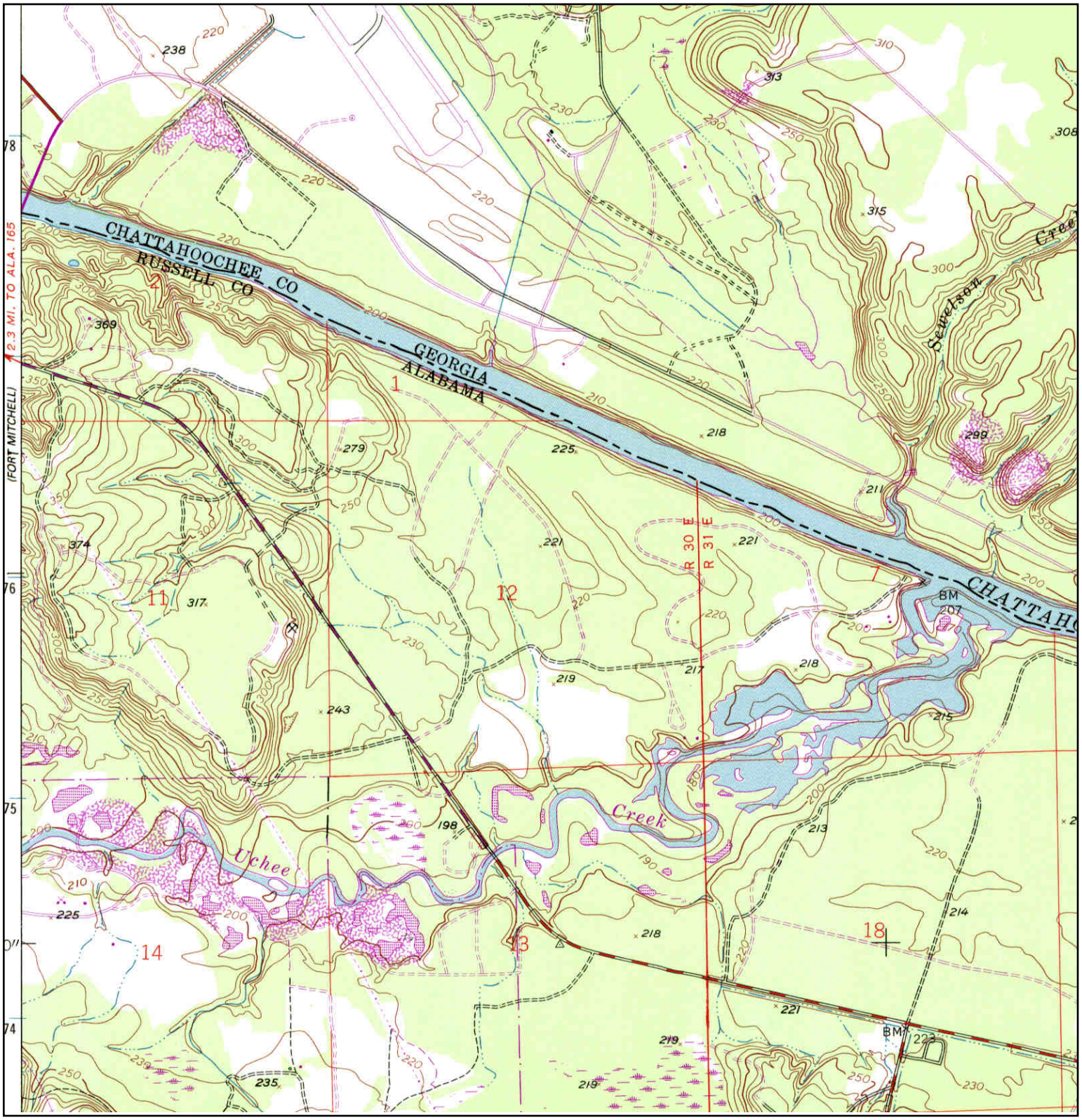
N	TARGET QUAD			
	NAME:	FORT BENNING	SITE NAME: Fort Benning	CLIENT: Tetra Tech Inc.
	MAP YEAR:	1968	ADDRESS: See Coordinates	CONTACT: Derrick Haltiwanger
	PHOTOREVISED FROM :	1955	Fort Mitchell, AL 36856	INQUIRY#: 3969636.4
	SERIES:	7.5	LAT/LONG: 32.3074 / -84.9933	RESEARCH DATE: 06/11/2014
	SCALE:	1:24000		

Historical Topographic Map



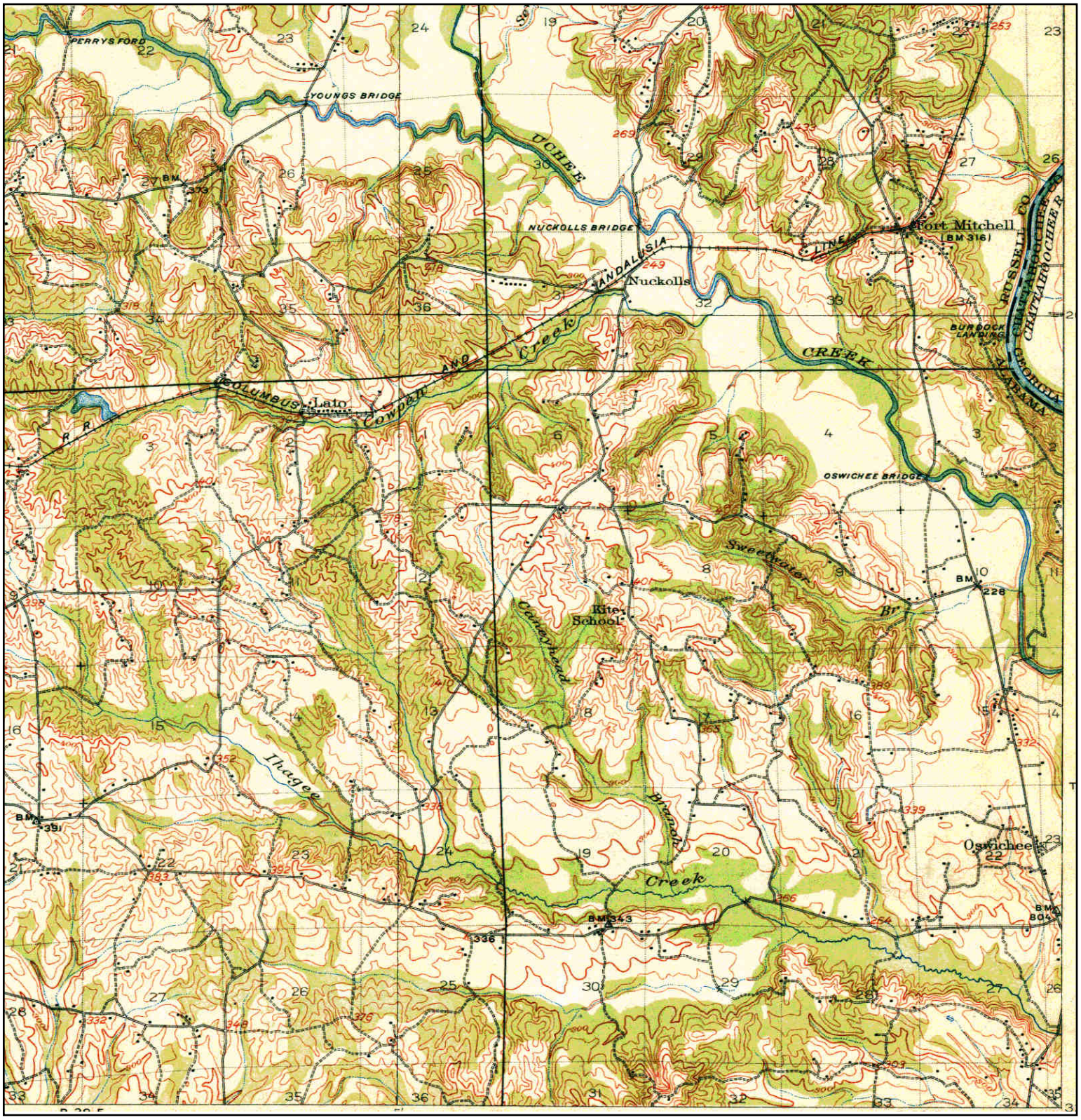
N	TARGET QUAD NAME: FORT BENNING MAP YEAR: 1985 PHOTOREVISED FROM :1955 SERIES: 7.5 SCALE: 1:24000	SITE NAME: Fort Benning ADDRESS: See Coordinates Fort Mitchell, AL 36856 LAT/LONG: 32.3074 / -84.9933	CLIENT: Tetra Tech Inc. CONTACT: Derrick Haltiwanger INQUIRY#: 3969636.4 RESEARCH DATE: 06/11/2014

Historical Topographic Map



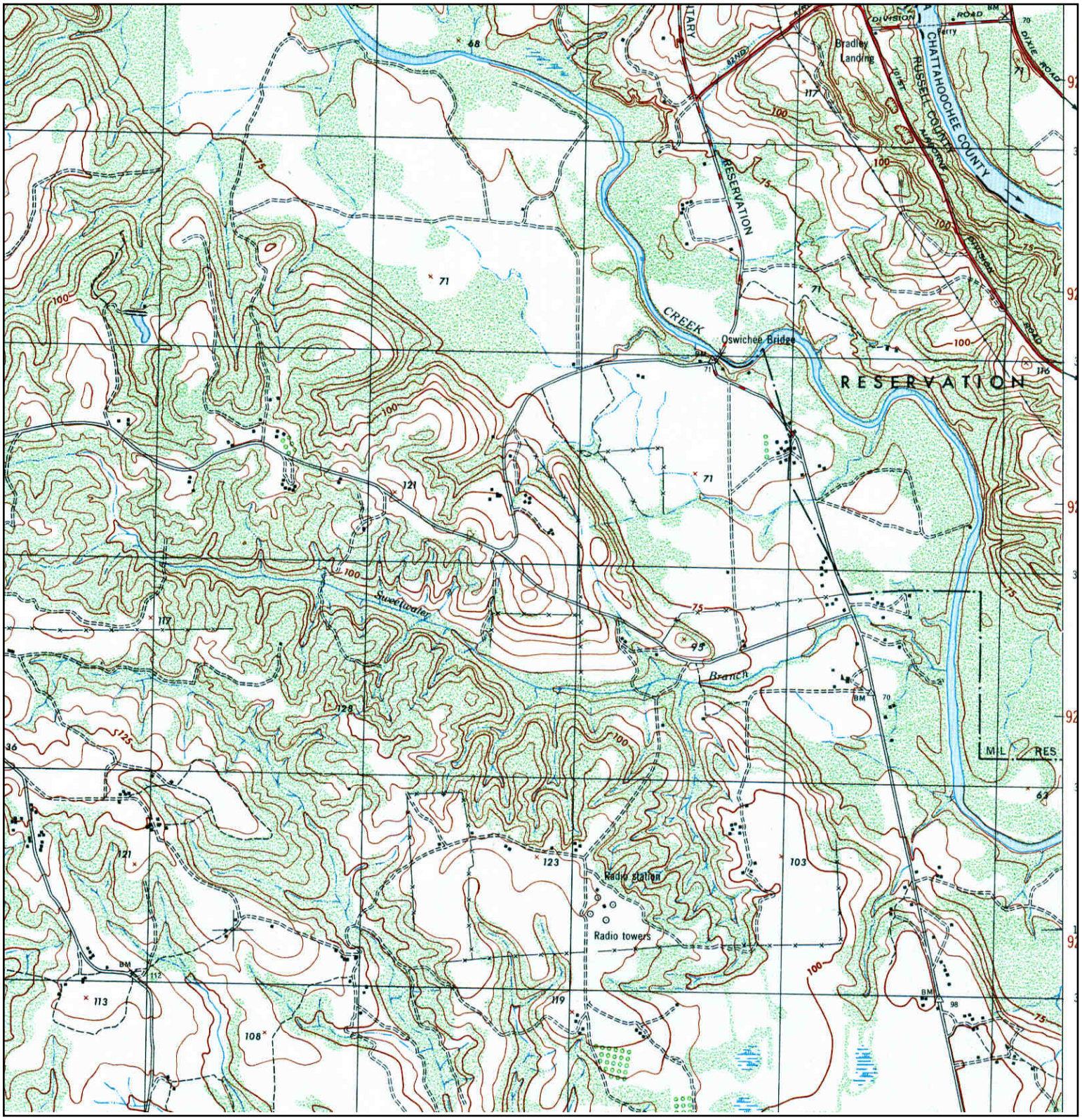
N	TARGET QUAD					
	NAME:	FORT BENNING	SITE NAME:	Fort Benning	CLIENT:	Tetra Tech Inc.
	MAP YEAR:	1993	ADDRESS:	See Coordinates	CONTACT:	Derrick Haltiwanger
	PHOTOREVISED FROM :	1955		Fort Mitchell, AL 36856	INQUIRY#:	3969636.4
	SERIES:	7.5	LAT/LONG:	32.3074 / -84.9933	RESEARCH DATE:	06/11/2014
	SCALE:	1:24000				

Historical Topographic Map



N	ADJOINING QUAD		SITE NAME:	Fort Benning	CLIENT: Tetra Tech Inc.
	NAME:	SEALE	ADDRESS:	See Coordinates	CONTACT: Derrick Haltiwanger
	MAP YEAR:	1914		Fort Mitchell, AL 36856	INQUIRY#: 3969636.4
	SERIES:	15	LAT/LONG:	32.3074 / -84.9933	RESEARCH DATE: 06/11/2014
	SCALE:	1:62500			

Historical Topographic Map



N	ADJOINING QUAD		
	NAME: FORT MITCHELL	SITE NAME: Fort Benning	CLIENT: Tetra Tech Inc.
	MAP YEAR: 1947	ADDRESS: See Coordinates	CONTACT: Derrick Haltiwanger
		Fort Mitchell, AL 36856	INQUIRY#: 3969636.4
	SERIES: 7.5	LAT/LONG: 32.3074 / -84.9933	RESEARCH DATE: 06/11/2014
	SCALE: 1:25000		

APPENDIX E
SOIL AND GROUNDWATER SAMPLING REPORT FOR THE COW DIPPING SITE

This page intentionally left blank.

US Army Corps of Engineers
Savannah District

US Army Maneuver Center of Excellence and Fort Benning
Environmental Protection Division

Soil and Groundwater Sampling Report
for the
Cow Dipping Site;
Fort Benning Military Installation;
Russell County, Alabama

September 2014

Prepared for:
US Army Maneuver Center of Excellence and
Fort Benning Environmental Protection Division
ATTN: ATZB-PWN-P
Fort Benning, Georgia 31905-5122

Prepared by:
US Army Corps of Engineers:
Savannah District
100 W. Oglethorpe Ave
Savannah, Georgia 31401-3640

Soil and Groundwater Sampling Report
for the
Cow Dipping Site;
Fort Benning Military Installation;
Russell County, Alabama

Table of Contents

1.0 INTRODUCTION.....1

2.0 BACKGROUND 1

2.1 SITE LOCATION AND HISTORY 1
2.2 PREVIOUS INVESTIGATIONS 1

3.0 SITE DESCRIPTION 2

3.1 SITE GEOLOGY AND HYDROGEOLOGY 2

4.0 DESCRIPTION OF FIELDWORK 3

5.0 SUMMARY OF ANALYTICAL RESULTS 4

5.1 SUBSURFACE SOIL 4
5.2 GROUNDWATER 4

6.0 DISCUSSION AND CONCLUSIONS.....5

List of Figures

Figure 1: Cow Dipping Area Site Location
Figure 2: Soil and Groundwater Sample Locations
Figure 3: Overview of Cow Dip Trough
Figure 4: View of Exit Ramp and Dripping Area
Figure 5: View of Entrance Ramp

List of Tables

Table 1: Sample Numbers and Analyses
Table 2: Summary of Lab Results for Cow Dipping Sites

List of Appendices

Appendix A: Figures
Appendix B: Tables
Appendix C: Lab Data

REGISTERED PROFESSIONAL GEOLOGIST CERTIFICATION

I certify that I am a qualified groundwater scientist who has received a baccalaureate or postgraduate degree in the natural sciences or engineering fields and have sufficient training and experience in groundwater hydrology and related fields as demonstrated by state registration and completion of accredited university courses that enable me to make sound, professional judgments regarding groundwater monitoring and contaminant fate and transport. I further certify that this report was prepared by me or by a subordinate working under my direction.

Prepared by:

Anna H. Butler, P.G.
Georgia Registration No. 1227
Expiration Date: Dec. 31, 2015

Reviewed by:

Jason Lennane, P.G.
Georgia Registration No. 1819
Expiration Date: Dec. 31, 2015

William O. McIntosh, P.G.
Chief, Geology/ Hydrogeology
and HTRW Design Section

Soil and Groundwater Sampling Report
for the
Cow Dipping Site,
Fort Benning Military Installation;
Russell County, Ala

1.0 INTRODUCTION

The Fort Benning Installation acquired property in Russell County, Alabama during the early 1990s for use as a training area. The property was previously used for grazing cattle and farming. Located within the acquired property, is a concrete trough that was used for "dipping" cattle for the purposes of insect (ticks) control.

Due to the history of the trough and the nature of the solutions used in the past for tick and insect control on cattle, the Fort Benning Installation requested that six soil and two groundwater samples be collected to determine if the area has had a release to the environment from the previous site activities. This report presents the results of these soil and groundwater samples.

2.0 BACKGROUND

2.1 Site Location and History

The Site is located on the west side of the Chattahoochee River in Alabama approximately 80 feet west of 101st Division Road. Figure 1 depicts the location of this site in the Alabama portion of Fort Benning.

While there is no specific data available concerning the operation of this particular trough and the materials used, based on the general history and knowledge of cow dipping activities, all soil and groundwater samples were analyzed for arsenic, semi-volatile organic compounds (SVOCs) and organochlorine pesticides.

2.2 Previous Investigations

No previous investigations are known to have occurred at this site.

3.0 SITE DESCRIPTION

The Fort Benning Cow Dipping Site is a small concrete trough approximately 30 feet long and 6 feet wide. The area is heavily wooded; what appears to be an overgrown dirt road is located to the west of the site.

3.1 Site Geology and Hydrogeology

The site is located near the contact between the Blufftown Formation and the High Alluvial Terrace Formation where they outcrop at Fort Benning in Russell Co., Alabama. The Blufftown Formation is described as alternating beds of sand and sandy carbonaceous highly micaceous fossiliferous clay about 260 feet thick overlying a lower unit of crossbedded coarse sand at its base. The lower unit is about 150 feet thick. The basal sand forms conspicuous ridges and ledges of this basal sand, cemented by iron oxide, forming landmarks in the area. The clay members of the Blufftown are described as laminated, dark-gray marine clays (some carbonaceous) containing abundant soft, thin fossil shells. Interbedded with the clays are white to gray sands ranging from 10 to 20 feet in thickness.

The High Alluvial Terrace Formation sediments are Pleistocene Epoch river terrace deposits and occur in the upland (higher elevation) areas adjacent to the Chattahoochee River. Along the western portion of the main post area, the Chattahoochee River has eroded much of the underlying Blufftown and some of the Eutaw formations. With time, the eroded material was replaced with the more recent river sediments known as "terrace deposits."

Some of these High Alluvial Terrace Deposits are 'reworked' sediments of the Eutaw and Blufftown Formations, but the bulk of these sediments have been transported from a source area upstream. The source areas for the Chattahoochee River are the many igneous and metamorphic rocks that compose the crystalline piedmont province in Georgia. The variety of minerals and rock types that exist in the piedmont yield a very heterogeneous assortment of rocks and sediments in the river (alluvial) deposits downstream.

These terrace deposits underlie the entire area of Fort Benning known as the "Main Post Cantonment Area" as well as the majority of Russell County that is located to the west of the Mainpost Area. These two areas are separated by the Chattahoochee River and the Chattahoochee River Floodplain areas. They consist of light to medium yellowish orange sand, gravel, clay, and silt. Thick deposits of coarse quartz and quartzite gravel/cobbles are found throughout the area. The clay is compact and mottled; the quartz gravel clasts are iron stained. The High Alluvial Terrace Deposits are generally less than 66 feet thick.

The depth to groundwater was unknown at this site, but was suspected to be between 25 and 45 feet below ground surface (bgs) based on knowledge of the depth to groundwater in the main post area of Fort Benning.

4.0 DESCRIPTION OF FIELDWORK

A total of 6 subsurface soil samples were collected along all four sides of the trough. Sample locations were equally divided between the east and west sides, with two locations on each side of the trough, plus one location at the northern and southern ends. Sample locations were located to provide sufficient coverage to be representative of the entire trough in order to determine if the site had been impacted by the previous cow dipping activities.

All soil samples were collected by direct push technology using a Geoprobe® DT-66 track mounted rig. Soil samples were collected as the push rods advanced downhole using a Macro-core® piston rod sampler. The Macro-core® sampler consists of a 2-inch diameter, 65-inch long steel tube with a piston-style tip. The tip is released and pushed up inside the sampling tube as the sampler is advanced to depth. Soil was collected in disposable thin-walled, acetate, open-ended liners placed inside the sampler.

Continuous soil samples were collected from six boring locations and screened with a photo ionization detector (PID). If there was a response, soil samples for laboratory analysis were collected from elevations where the PID indicated some response. If there was no response, one sample was collected from areas with significant amounts of clay, as the pesticides and SVOCs would adhere to the clays if a release had occurred.

All small sampling equipment and geoprobe rods were decontaminated between each use by washing with a phosphate-free detergent, rinsing with de-ionized water, rinsing with isopropyl alcohol, and undergoing final rinsing using de-ionized water. Equipment was allowed to air dry. New acetate liners were used for each soil sample collected.

Six subsurface soil samples were collected. The depth of subsurface soil samples varied from 1.5 to 8 feet below ground surface (bgs). All of the subsurface soil samples were analyzed for Organophosphorous Pesticides (EPA Method 8081B) and Semi-Volatile Organic Compounds (SVOCs, EPA Method 8270D) and arsenic (EPA Method 6020A).

Two groundwater samples were collected from two temporary monitoring wells. One well was installed at an upgradient location adjacent to the trough and the second well was installed at a downgradient location adjacent to the trough in order to determine if the cow dipping activities had impacted the groundwater.

The temporary groundwater wells were installed also using a Geoprobe® DT-66 track mounted rig, with 1.5 inch schedule 40 PVC riser and screen. There was no sand pack installed, nor were the wells developed, as the intent was to collect immediate grab samples from the temporary wells. The groundwater samples were collected immediately after installation with low flow methods using a Geoprobe® stainless steel check valve with polyethylene tubing. Groundwater was found to be at 30 feet bgs.

New tubing was used for each groundwater sample. The check-valve sampling equipment was decontaminated between each use by washing with a phosphate-free detergent, rinsing with de-ionized water, rinsing with isopropyl alcohol, and undergoing final rinsing using de-ionized water.

Both groundwater samples were analyzed for Organophosphorous Pesticides, SVOCs, and Arsenic. Table 1, below, lists the sample identification numbers collected for this site and the analyses for each.

Table 1: Sample Numbers and Analyses for the Fort Benning Cow Dipping Site.

Sample ID No.	Medium	Analysis/ Methods	Depth BGS (ft.)
CW-SB-1	Subsurface Soil	EPA 8081C (Organophosphorous Pesticides) EPA 8270D (SVOCs) EPA 6020A (Arsenic)	1.5-3
CW-SB-2	Subsurface Soil		6.6-8
CW-SB-3	Subsurface Soil		6-8
CW-SB-4	Subsurface Soil		6-8
CW-SB-5	Subsurface Soil		6-8
CW-SB-6	Subsurface Soil		1.5-3
CW-GW-1	Groundwater		30
CW-GW-2	Groundwater		28

BGS: Below Ground Surface.

Figure 2 (Appendix A) shows the locations of the groundwater and soil samples and Table 2 (Appendix B) is a summary of the analytical detections for each sample.

5.0 SUMMARY OF ANALYTICAL RESULTS

5.1 Subsurface Soil

Arsenic was detected in all 6 soil samples ranging from 3.2 mg/kg to 180 mg/kg. There were no detections of any SVOCs or pesticides in the soil samples collected.

5.2 Groundwater

Arsenic was also detected in both groundwater samples at 1.1 ug/L in the upgradient well and 0.85 ug/L in the downgradient well.

There were six detections of SVOCs in the downgradient groundwater sample. All these detections were estimated values below the laboratory reporting limits, but above the minimum detection limits. All SVOCs detected are plasticizers and alcohols that are most likely related to the sampling equipment and/or laboratory processes.

One pesticide was detected (gamma-Chlordane @ 0.016J ug/L) in the downgradient well, also at an estimated level below the laboratory reporting levels, but above the detection limit.

Table 2, located in Appendix B, is a summary of the analytes detected at levels above laboratory reporting limits for each sample. The complete set of laboratory data is attached in Appendix C.

6.0 DISCUSSION AND CONCLUSIONS

Soil

Arsenic was the only analyte detected in the soil samples. Arsenic is a naturally occurring trace element and is found throughout the environment in both organic and inorganic forms. Trace element distributions in soils tend to be spotty, have very large ranges that can span two or three orders of magnitude, and are heavily skewed to the right in a lognormal distribution.

Naturally occurring arsenic concentrations have been documented within the Fort Benning Installation during ongoing work under the Fort Benning RCRA Part B Permit. 138 background samples were collected and analyzed for 23 inorganic constituents, including arsenic. The arsenic concentrations reported in the background samples ranged from less than 0.47 mg/kg to 22 mg/kg. Following EPA Region 4 guidance, statistical screening levels were developed based on the 6 major geologic formations that occur within the Fort Benning Installation. These levels (95% Upper Tolerance Limit) are a form of descriptive statistics constructed to extrapolate the data to contain 95% of the suspected population with a 95% confidence level. That means a small amount of samples (5%) will exceed these levels. The UTLs for the background data sent for arsenic for the Blufftown Formation is 56 mg/kg and 4.64 mg/kg for the High Alluvial Terrace Formation.

All but two (63 and 180 mg/kg) of the arsenic detections in the soils from the Cow Dipping Site are within the range of Fort Benning background arsenic detections. These samples were located near the concrete pad located at the exiting area of the trough. Both samples were collected from 1.5 to 3 feet below the ground surface.

Arsenic is twentieth in percent abundance within the earth's crust of all the elements and is found as a major constituent in up to 245 minerals (National Research Council, 1977). Arsenic also occurs in most common rock-forming minerals, especially the sulfide minerals: pyrite, chalcopyrite, and galena. These are all common accessory minerals in granites and metamorphic gneiss, schists, and phyllites that form the Southern Piedmont region of Georgia, through which the Chattahoochee River flows before entering the Coastal Plain region just north of Columbus and Fort Benning. Arsenic concentrations in pyrite have been found to range from 100 to 77,000 mg/kg, in galena from 5 to 10,000 mg/kg, and in chalcopyrite from 10 to 5,000 mg/kg (WHO, undated). Arsenic has also been found to be associated with glauconitic marine deposits in the Atlantic Coastal Plain sediments in Delaware, and Virginia. These same coastal plain sediments extend down to Alabama, through Georgia and Fort Benning.

Arsenic can also be found associated with iron oxides, a common mineral coating, especially in shallow surficial soils. Arsenic minerals are absorbed by iron oxides, especially under oxidizing and slightly acidic conditions. Under these same conditions, pyrite (iron sulfide) is unstable and will disassociate to form iron oxides while releasing sulfate and other trace constituents such as arsenic. Iron staining on sand particles is commonly observed in the sediments and soils within the Fort Benning Installation.

The United States Geologic Service (USGS) has also documented naturally-occurring arsenic levels for soils and sediments within the Eastern United States. These arsenic concentrations ranged from 0.1 to 73 mg/kg in these samples with an average of 7.4 mg/kg (Shacklette, 1984). The USEPA has documented a range of naturally occurring arsenic levels (0.1 to 30 mg/kg) for sandy soil; however, this USEPA study used far fewer samples than the USGS report (USEPA, 1995).

Arsenic has also been documented within the State of South Carolina, which shares a similar geology to Georgia and Eastern Alabama. Arsenic concentrations in soils ranged from non-detect to 210 mg/kg (Canova, 1999).

The Cow Dipping site is actually located near the contact of the Blufftown Formation and the High Alluvial Terrace Formation in Alabama. The Blufftown sediments are marine sediments in origin, which contain naturally occurring levels of arsenic that have bonded to the sediments during deposition. The High Alluvial Terrace sediments are actually river sediments that were deposited during ancient flood stages. In these events, the older exiting formations would have been scoured and eroded to some extent and mixed in with some of the river flood sediments near the edges of these terrace deposits. These river sediments would contain fragments of igneous and metamorphic rocks from upstream, which are known to contain much higher arsenic concentrations then the coastal sediments that occur south of Columbus. Concentrations of arsenic in the High Alluvial Terrace Formations would be less consistent then the Blufftown Formations, but would have the potential to contain much higher naturally occurring concentrations of arsenic. Some uncertainty will exist as well concerning the exact nature of the soils at this site and the source of the arsenic detections.

The arsenic detections at this site are consistent with the range of naturally occurring arsenic concentrations found in soils in the Eastern and Southeast United States. The two samples (CW-SB-1 and CW-SB-6) with elevated arsenic detections when compared to other samples collected at the site are from a shallower horizon (1.5 - 3.0 feet bgs) that contained more silt and sand sized particles; while samples collected from 6 - 8 feet bgs, with lower relative arsenic concentrations, contained a higher percentage of stiff clay. The detections in these two shallower samples could show possible evidence of elevated arsenic from the past cow dipping activities, or could be naturally occurring levels of arsenic. Sediments that contain more silt and sand would be associated with source rocks from upstream in the Piedmont Region, while sediments with more clay would be associated with the reworked coastal sediments from the Blufftown Formation.

GROUNDWATER

Arsenic was also detected in both groundwater samples at 1.1 ug/L in the upgradient well and 0.85 ug/L in the downgradient well. There was no arsenic detections reported for groundwater background samples above the laboratory reporting limits of 9 ug/L. Both arsenic detections at this site are well below the United States Environmental Protection Agency (USEPA) Maximum Contaminant Level (MCL) of 10 ug/L and below the reporting limits for the background samples. Arsenic concentrations detected in the groundwater are consistent with other detections of arsenic in groundwater samples from across Fort Benning.

There were six detections of SVOCs in the downgradient groundwater sample. All of these detections were estimated values below the laboratory reporting limits, but were above the minimum detection limits. All analytes detected are plasticizers and alcohols that are most likely related to the sampling equipment and/or laboratory processes.

The pesticide that was detected, gamma-Chlordane, was used historically as an insecticide. The detection of 0.016 J ug/L is well below the USEPA MCL of 2 ug/L for drinking water is also an order of magnitude below the USEPA Regional Screening Level of 0.19 ug/L that equates to the USEPA acceptable risk level for tap water.

Based on the analytical results from the samples collected, the previous activities at the cow dipping trough do not appear have not adversely affected the groundwater beneath the trough or downgradient from the trough.

APPENDIX A

FIGURES

Legend

- Cow Dip Trough Location
- Topographic Contours

Note:
Contour Interval = 10 feet

1 inch = 500 feet

0 250 500 1,000'

N

U.S. ARMY ENGINEER DISTRICT
CORPS OF ENGINEERS
SAVANNAH, GEORGIA

FORT BENNING, GEORGIA

FORMER
COW DIPPING TROUGH
SITE LOCATION

DATE: Aug 2014 | FIGURE 1

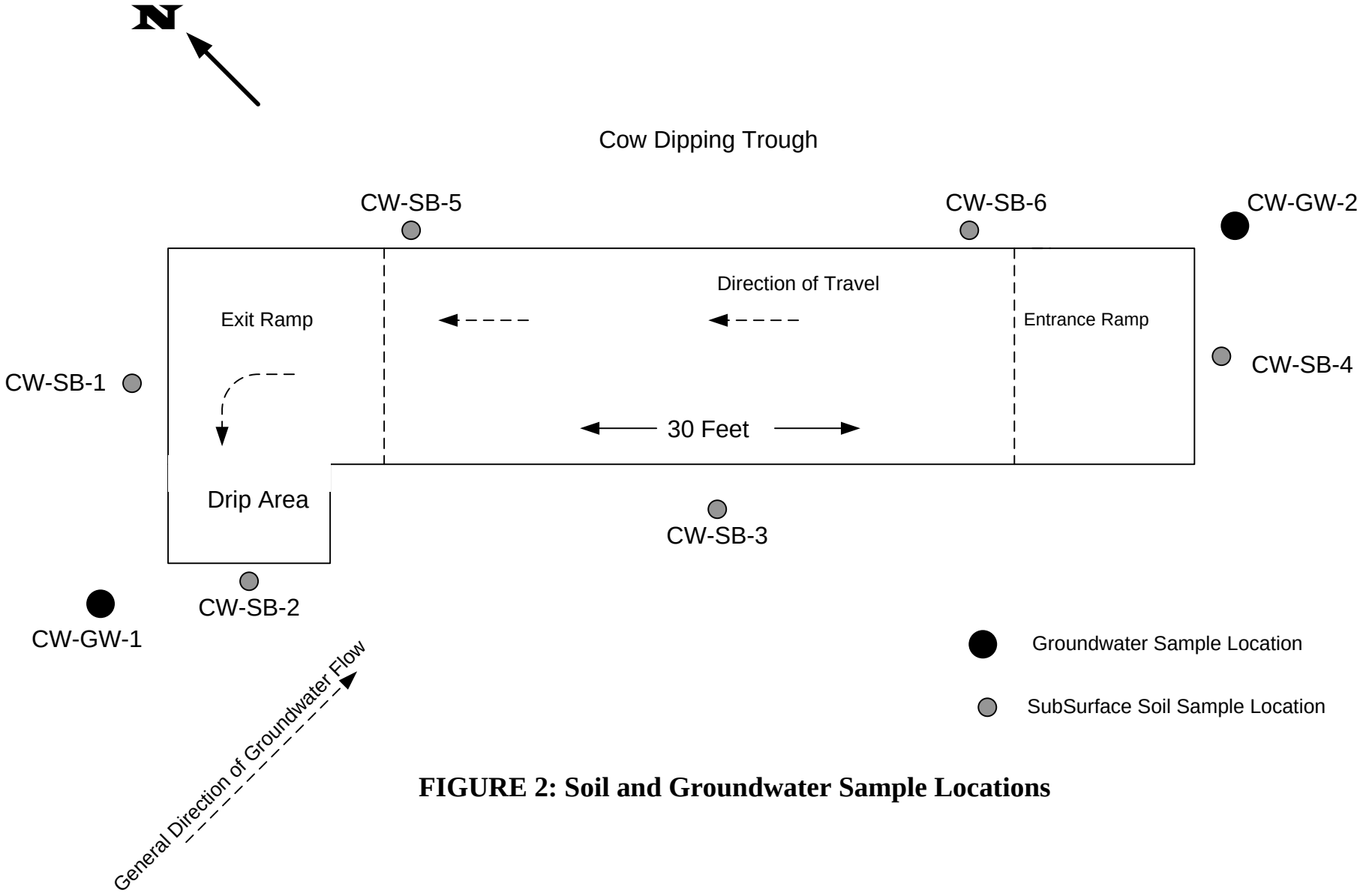


FIGURE 2: Soil and Groundwater Sample Locations

FIGURE 3: Overview of Cow Dip Trough

FIGURE 4: View of Exit Ramp and Dripping Area

FIGURE 5: View of Entrance Ramp

APPENDIX B

TABLES

Table 2:
Summary of Lab Results for Cow Dipping Site
Subsurface Soils

Location:		Cow Dipping Site	Cow Dipping Site	Cow Dipping Site	Cow Dipping Site	Cow Dipping Site	Cow Dipping Site
Sample No. Prefix:		CW-SB-1	CW-SB-2	CW-SB-3	CW-SB-4	CW-SB-5	CW-SB-6
Sampling Date:		7/15/2014	7/15/2014	7/15/2014	7/15/2014	7/15/2014	7/15/2014
Depth (ft.,bgs):		1.5 - 3.0	17-17.5	6.0 - 8.0	6.0 - 6.5	6.0 - 8.0	1.5 - 3.0
Organophosphorous Pesticides *(8081C)*							
All	µg/Kg	No Detections					
SVOCs *(8270D)*							
All	µg/Kg	No Detections					
ARSENIC *(6020A)*							
Arsenic	mg/Kg	63	0.9 J	3.2	3.9	7.5	180

DATA QUALIFIER CODES:
J = Analyte positively identified; numerical value is approximate (below quantitation limit, but above method detection limit).
U = Analyzed for, but not detected above quantitation limit.

Table 2:
Summary of Lab Results for Cow Dipping Site
Groundwater

Location:		Cow Dipping Site	Cow Dipping Site	Cow Dipping Site
Sample No. Prefix:		CW-1-GW	CW-2-GW	GW-Duplicate
Sampling Date:		7/15/2014	7/15/2014	7/15/2014
Organophosphorous Pesticides *(8081B)*				
gamma-Chlordane	µg/L	0.020 U	0.016 J	0.020 U
SVOCs *(8270D)*				
Benzyl Alcohol	µg/L	0.73 J	2.5 J	0.62 J
Bis(2-ethylhexyl) phthalate	µg/L	1.1 U	4.5 J	1.1 U
Diethyl Phthalate	µg/L	1.1 U	0.80 J	1.1 U
Dimethyl phthalate	µg/L	1.1 U	0.22 J	1.1 U
Di-n-butyl Phthalate	µg/L	4.2 U	1.5 J	4.2 U
3 & 4 Methylphenol	µg/L	1.1 U	0.25 J	1.1 U
Arsenic *(6020A)*				
Arsenic	µg/L	1.1	0.85 J	1.0 U

DATA QUALIFIER CODES:

J = Analyte positively identified; numerical value is approximate (below quantitation limit, but above method detection limit).

U = Analyzed for, but not detected above quantitation limit.

APPENDIX C

LAB DATA

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

ANALYTICAL REPORT

TestAmerica Laboratories, Inc.
TestAmerica Savannah
5102 LaRoche Avenue
Savannah, GA 31404
Tel: (912)354-7858

TestAmerica Job ID: 680-103315-1
Client Project/Site: Fort Benning

For:
U.S. Army Corps of Engineers
100 West Oglethorpe Ave
Savannah, Georgia 31401

Attn: Ms. Anna Butler

Linda A. Wolfe

Authorized for release by:
7/24/2014 5:23:49 PM

Linda Wolfe, Project Manager II
(912)354-7858 e.3005
linda.wolfe@testamericainc.com

Table of Contents

Cover Page 1
Table of Contents 2
Case Narrative 3
Sample Summary 5
Method Summary 6
Definitions 7
Detection Summary 8
Client Sample Results 9
Surrogate Summary 36
QC Sample Results 38
QC Association 59
Chronicle 62
Chain of Custody 65
Receipt Checklists 68
Certification Summary 70

Job ID: 680-103315-1

Laboratory: TestAmerica Savannah

Narrative

CASE NARRATIVE

Client: U.S. Army Corps of Engineers

Project: Fort Benning

Report Number: 680-103315-1

With the exceptions noted as flags or footnotes, standard analytical protocols were followed in the analysis of the samples and no problems were encountered or anomalies observed. In addition all laboratory quality control samples were within established control limits, with any exceptions noted below. Each sample was analyzed to achieve the lowest possible reporting limit within the constraints of the method. In the event of interference or analytes present at high concentrations, samples may be diluted. For diluted samples, the reporting limits are adjusted relative to the dilution required.

RECEIPT

The samples were received on 7/16/2014 9:00 AM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperatures of the 2 coolers at receipt time were 2.3º C and 4.6º C.

Except:

A collection time discrepancy was noted between the information listed on the chain-of-custody and the sample container labels for samples CW-SB-3 and CW-SB-2. The collection time on the chain-of-custody read 10:00 for sample CW-SB-3 and 10:30 for sample CW-SB-2. The collection time on the associated container labels read 10:30 for sample CW-SB-3 and 10:00 for sample CW-SB-2.
7/16/14 The client confirmed the collection times as being correct on the chain of custody, the labels are incorrect.
Sample CW-SB-3 was collected at 10:00am and CW-SB-2 was collected at 10:30am per Anna Butler.

SEMIVOLATILE ORGANIC COMPOUNDS (AQUEOUS)

Samples CW-SB-4 (680-103315-3), CW-SB-3 (680-103315-4), CW-SB-2 (680-103315-5), CW-SB-1 (680-103315-6), CW-SB-6 (680-103315-7) and CW-SB-5 (680-103315-8) were analyzed for Semivolatile Organic Compounds (Aqueous) in accordance with 8270D. The samples were prepared on 07/16/2014 and analyzed on 07/18/2014.

Samples CW-1-GW (680-103315-1), CW-2-GW (680-103315-2) and CW-DUP (680-103315-9) were analyzed for Semivolatile Organic Compounds (Aqueous) in accordance with 8270D. The samples were prepared on 07/16/2014 and 07/18/2014 and analyzed on 07/22/2014 and 07/24/2014.

The following sample: CW-1-GW (680-103315-1) was decanted prior to extraction due to the large amount of sediment present. Batch 234982 method 8270D_DOD.

The following samples are bright orange and contain a large amount of sediment: CW-1-GW (680-103315-1), CW-2-GW (680-103315-2), CW-DUP (680-103315-9). Batch 234608 method 8270D_DOD.

Benzyl alcohol and Bis(2-ethylhexyl) phthalate were detected in method blank MB 280-234608/1-A at levels that were above the method detection limit but below the reporting limit. The values should be considered estimates, and have been flagged. If the associated sample reported a result above the MDL and/or RL, the result has been flagged. Benzyl alcohol was detected in method blank MB 280-234982/1-A at a level that was above the method detection limit but below the reporting limit. The value should be considered an estimate, and has been flagged. If the associated sample reported a result above the MDL and/or RL, the result has been flagged. Refer to the QC report for details.

Terphenyl-d14 failed the surrogate recovery criteria low for CW-DUP (680-103315-9). Refer to the QC report for details.

Job ID: 680-103315-1 (Continued)

Laboratory: TestAmerica Savannah (Continued)

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

PESTICIDES

Samples CW-SB-4 (680-103315-3), CW-SB-3 (680-103315-4), CW-SB-2 (680-103315-5), CW-SB-1 (680-103315-6), CW-SB-6 (680-103315-7) and CW-SB-5 (680-103315-8) were analyzed for Pesticides in accordance with EPA SW-846 Method 8081B. The samples were prepared on 07/18/2014 and analyzed on 07/22/2014 and 07/23/2014.

Samples CW-1-GW (680-103315-1), CW-2-GW (680-103315-2) and CW-DUP (680-103315-9) were analyzed for Pesticides in accordance with EPA SW-846 Method 8081B. The samples were prepared on 07/16/2014 and analyzed on 07/22/2014.

The following sample(s) required a Florisil clean-up, via3620C, to reduce matrix interferences: CW-SB-6 (680-103315-7).

The following samples in prep batch 234650 and analytical batch 235264 required a mercury clean-up for method 8081, via EPA Method 3660A, to reduce matrix interferences caused by sulfur: (LCS 280-234650/2-A), (LCSD 280-234650/3-A), (MB 280-234650/1-A). The reagent lot number used was: SLBC7076V.

The continuing calibration verification (CCV) associated with analytical batch 235264 recovered above the upper control limit for delta-BHC and gamma-Chlordane. The samples associated with this CCV were non-detects for the affected analytes; therefore, the data have been reported.

gamma-Chlordane failed the recovery criteria high for the MSD of sample CW-SB-3MSD (680-103315-4) in batch 280-235264.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

PERCENT SOLIDS/MOISTURE

Samples CW-SB-4 (680-103315-3), CW-SB-3 (680-103315-4), CW-SB-2 (680-103315-5), CW-SB-1 (680-103315-6), CW-SB-6 (680-103315-7) and CW-SB-5 (680-103315-8) were analyzed for Percent Solids/Moisture in accordance with TestAmerica SOP. The samples were analyzed on 07/18/2014.

No analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

Sample Summary

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
680-103315-1	CW-1-GW	Water	07/14/14 18:00	07/16/14 09:00
680-103315-2	CW-2-GW	Water	07/15/14 11:45	07/16/14 09:00
680-103315-3	CW-SB-4	Solid	07/15/14 09:30	07/16/14 09:00
680-103315-4	CW-SB-3	Solid	07/15/14 10:00	07/16/14 09:00
680-103315-5	CW-SB-2	Solid	07/15/14 10:30	07/16/14 09:00
680-103315-6	CW-SB-1	Solid	07/15/14 10:45	07/16/14 09:00
680-103315-7	CW-SB-6	Solid	07/15/14 11:00	07/16/14 09:00
680-103315-8	CW-SB-5	Solid	07/15/14 11:15	07/16/14 09:00
680-103315-9	CW-DUP	Water	07/15/14 12:00	07/16/14 09:00

Method Summary

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Method	Method Description	Protocol	Laboratory
8270D	Semivolatile Organic Compounds (GC/MS)	SW846	TAL DEN
8081B	Organochlorine Pesticides (GC)	SW846	TAL DEN
Moisture	Percent Moisture	EPA	TAL DEN

Protocol References:

EPA = US Environmental Protection Agency

SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates.

Laboratory References:

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100

Qualifiers

GC/MS Semi VOA

Qualifier	Qualifier Description
U	Undetected at the Limit of Detection.
J	Estimated: The analyte was positively identified; the quantitation is an estimation
M	Manual integrated compound.
Q	One or more quality control criteria failed.

GC Semi VOA

Qualifier	Qualifier Description
Q	One or more quality control criteria failed.
U	Undetected at the Limit of Detection.
J	Estimated: The analyte was positively identified; the quantitation is an estimation
J	Estimated: The quantitation is an estimation due to discrepancies in meeting certain analyte-specific quality control criteria.

Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
¤	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CNF	Contains no Free Liquid
DER	Duplicate error ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision level concentration
MDA	Minimum detectable activity
EDL	Estimated Detection Limit
MDC	Minimum detectable concentration
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
NC	Not Calculated
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RER	Relative error ratio
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

Detection Summary

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-1-GW — Lab Sample ID: 680-103315-1

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	Dil Fac	D	Method	Prep Type
Benzyl alcohol	0.73	J	26	1.1	0.24	ug/L	1		8270D	Total/NA

Client Sample ID: CW-2-GW — Lab Sample ID: 680-103315-2

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	Dil Fac	D	Method	Prep Type
Benzyl alcohol	2.5	J	24	0.95	0.22	ug/L	1		8270D	Total/NA
Bis(2-ethylhexyl) phthalate	4.5	J	9.5	0.95	0.53	ug/L	1		8270D	Total/NA
Diethyl phthalate	0.80	J	19	0.95	0.36	ug/L	1		8270D	Total/NA
Dimethyl phthalate	0.22	J	19	0.95	0.20	ug/L	1		8270D	Total/NA
Di-n-butyl phthalate	1.5	J	19	3.8	1.1	ug/L	1		8270D	Total/NA
3 & 4 Methylphenol	0.25	J	19	0.95	0.24	ug/L	1		8270D	Total/NA
gamma-Chlordane	0.016	J	0.049	0.019	0.0088	ug/L	1		8081B	Total/NA

Client Sample ID: CW-SB-4 — Lab Sample ID: 680-103315-3

No Detections.

Client Sample ID: CW-SB-3 — Lab Sample ID: 680-103315-4

No Detections.

Client Sample ID: CW-SB-2 — Lab Sample ID: 680-103315-5

No Detections.

Client Sample ID: CW-SB-1 — Lab Sample ID: 680-103315-6

No Detections.

Client Sample ID: CW-SB-6 — Lab Sample ID: 680-103315-7

No Detections.

Client Sample ID: CW-SB-5 — Lab Sample ID: 680-103315-8

No Detections.

Client Sample ID: CW-DUP — Lab Sample ID: 680-103315-9

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	Dil Fac	D	Method	Prep Type
Benzyl alcohol	0.62	J	24	0.95	0.22	ug/L	1		8270D	Total/NA

This Detection Summary does not include radiochemical test results.

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-1-GW
Date Collected: 07/14/14 18:00
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-1
Matrix: Water

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Acenaphthene	1.1	U	11	1.1	0.30	ug/L		07/22/14 20:39	1
Acenaphthylene	1.1	U	11	1.1	0.52	ug/L		07/22/14 20:39	1
Anthracene	1.1	U	11	1.1	0.44	ug/L		07/22/14 20:39	1
Benzo[a]anthracene	1.1	U	11	1.1	0.37	ug/L		07/22/14 20:39	1
Benzo[a]pyrene	1.1	U	11	1.1	0.33	ug/L		07/22/14 20:39	1
Benzo[b]fluoranthene	1.1	U	11	1.1	0.56	ug/L		07/22/14 20:39	1
Benzo[g,h,i]perylene	1.1	U	11	1.1	0.53	ug/L		07/22/14 20:39	1
Benzoic acid	53	U	84	53	11	ug/L		07/22/14 20:39	1
Benzo[k]fluoranthene	1.1	U	11	1.1	0.49	ug/L		07/22/14 20:39	1
Benzyl alcohol	**0.73**	**J**	26	1.1	0.24	ug/L		07/22/14 20:39	1
Bis(2-chloroethoxy)methane	4.2	U	11	4.2	1.0	ug/L		07/22/14 20:39	1
Bis(2-chloroethyl)ether	1.1	U	21	1.1	0.43	ug/L		07/22/14 20:39	1
bis(chloroisopropyl) ether	1.1	U	11	1.1	0.30	ug/L		07/22/14 20:39	1
Bis(2-ethylhexyl) phthalate	1.1	U	11	1.1	0.59	ug/L		07/22/14 20:39	1
4-Bromophenyl phenyl ether	1.1	U	11	1.1	0.45	ug/L		07/22/14 20:39	1
Butyl benzyl phthalate	4.2	U	21	4.2	1.1	ug/L		07/22/14 20:39	1
4-Chloroaniline	5.3	U	26	5.3	2.3	ug/L		07/22/14 20:39	1
4-Chloro-3-methylphenol	5.3	U	21	5.3	2.5	ug/L		07/22/14 20:39	1
2-Chloronaphthalene	1.1	U	11	1.1	0.27	ug/L		07/22/14 20:39	1
2-Chlorophenol	4.2	U	11	4.2	2.1	ug/L		07/22/14 20:39	1
4-Chlorophenyl phenyl ether	4.2	U	11	4.2	1.8	ug/L		07/22/14 20:39	1
Chrysene	1.1	U	11	1.1	0.57	ug/L		07/22/14 20:39	1
Dibenz(a,h)anthracene	1.1	U	11	1.1	0.54	ug/L		07/22/14 20:39	1
Dibenzofuran	1.1	U	11	1.1	0.31	ug/L		07/22/14 20:39	1
1,2-Dichlorobenzene	1.1	U	11	1.1	0.24	ug/L		07/22/14 20:39	1
1,3-Dichlorobenzene	1.1	U	11	1.1	0.32	ug/L		07/22/14 20:39	1
1,4-Dichlorobenzene	1.1	U	11	1.1	0.34	ug/L		07/22/14 20:39	1
3,3'-Dichlorobenzidine	11	U	53	11	2.1	ug/L		07/22/14 20:39	1
2,4-Dichlorophenol	2.1	U	11	2.1	0.68	ug/L		07/22/14 20:39	1
Diethyl phthalate	1.1	U	21	1.1	0.40	ug/L		07/22/14 20:39	1
2,4-Dimethylphenol	4.2	U	11	4.2	0.61	ug/L		07/22/14 20:39	1
Dimethyl phthalate	1.1	U	21	1.1	0.22	ug/L		07/22/14 20:39	1
Di-n-butyl phthalate	4.2	U	21	4.2	1.2	ug/L		07/22/14 20:39	1
4,6-Dinitro-2-methylphenol	11	U	84	11	4.2	ug/L		07/22/14 20:39	1
2,4-Dinitrophenol	21	U	84	21	11	ug/L		07/22/14 20:39	1
2,4-Dinitrotoluene	4.2	U	21	4.2	1.8	ug/L		07/22/14 20:39	1
2,6-Dinitrotoluene	4.2	U	21	4.2	2.0	ug/L		07/22/14 20:39	1
Di-n-octyl phthalate	1.1	U	21	1.1	0.37	ug/L		07/22/14 20:39	1
Fluoranthene	1.1	U	21	1.1	0.21	ug/L		07/22/14 20:39	1
Fluorene	1.1	U	11	1.1	0.33	ug/L		07/22/14 20:39	1
Hexachlorobenzene	1.1	U	11	1.1	0.70	ug/L		07/22/14 20:39	1
Hexachlorobutadiene	11	U	32	11	3.5	ug/L		07/22/14 20:39	1
Hexachloroethane	4.2	U	11	4.2	2.2	ug/L		07/22/14 20:39	1
Indeno[1,2,3-cd]pyrene	1.1	U	11	1.1	0.69	ug/L		07/22/14 20:39	1
Isophorone	1.1	U	11	1.1	0.22	ug/L		07/22/14 20:39	1
2-Methylnaphthalene	1.1	U	11	1.1	0.31	ug/L		07/22/14 20:39	1
2-Methylphenol	4.2	U	11	4.2	1.0	ug/L		07/22/14 20:39	1
3 & 4 Methylphenol	1.1	U	21	1.1	0.26	ug/L		07/22/14 20:39	1
Naphthalene	1.1	U	11	1.1	0.31	ug/L		07/22/14 20:39	1

Client Sample ID: CW-1-GW
Date Collected: 07/14/14 18:00
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-1
Matrix: Water

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
2-Nitroaniline	4.2	U	53	4.2	1.8	ug/L		07/22/14 20:39	1
3-Nitroaniline	2.1	U	53	2.1	2.1	ug/L		07/22/14 20:39	1
4-Nitroaniline	4.2	U	53	4.2	2.1	ug/L		07/22/14 20:39	1
Nitrobenzene	2.1	U	21	2.1	0.86	ug/L		07/22/14 20:39	1
2-Nitrophenol	1.1	U	21	1.1	0.41	ug/L		07/22/14 20:39	1
4-Nitrophenol	11	U	53	11	1.3	ug/L		07/22/14 20:39	1
N-Nitrosodi-n-propylamine	1.1	U	21	1.1	0.37	ug/L		07/22/14 20:39	1
N-Nitrosodiphenylamine	1.1	U	11	1.1	0.46	ug/L		07/22/14 20:39	1
Pentachlorophenol	42	U	84	42	21	ug/L		07/22/14 20:39	1
Phenanthrene	1.1	U	11	1.1	0.27	ug/L		07/22/14 20:39	1
Phenol	5.3	U	11	5.3	2.1	ug/L		07/22/14 20:39	1
Pyrene	1.1	U	11	1.1	0.39	ug/L		07/22/14 20:39	1
1,2,4-Trichlorobenzene	1.1	U	11	1.1	0.30	ug/L		07/22/14 20:39	1
2,4,5-Trichlorophenol	1.1	U	21	1.1	0.48	ug/L		07/22/14 20:39	1
2,4,6-Trichlorophenol	1.1	U	21	1.1	0.31	ug/L		07/22/14 20:39	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*81*		*50 - 110*	*07/18/14 13:50*	*07/22/14 20:39*	*1*
2-Fluorophenol	*85*		*20 - 110*	*07/18/14 13:50*	*07/22/14 20:39*	*1*
Nitrobenzene-d5	*84*		*40 - 110*	*07/18/14 13:50*	*07/22/14 20:39*	*1*
Phenol-d5	*87*		*10 - 115*	*07/18/14 13:50*	*07/22/14 20:39*	*1*
Terphenyl-d14	*92*		*50 - 135*	*07/18/14 13:50*	*07/22/14 20:39*	*1*
2,4,6-Tribromophenol	*80*		*40 - 125*	*07/18/14 13:50*	*07/22/14 20:39*	*1*

Method: 8081B - Organochlorine Pesticides (GC)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Aldrin	0.020	U	0.049	0.020	0.0058	ug/L		07/22/14 18:49	1
alpha-BHC	0.020	U	0.049	0.020	0.0052	ug/L		07/22/14 18:49	1
alpha-Chlordane	0.020	U	0.049	0.020	0.0052	ug/L		07/22/14 18:49	1
beta-BHC	0.020	U	0.049	0.020	0.0085	ug/L		07/22/14 18:49	1
4,4'-DDD	0.020	U	0.049	0.020	0.0076	ug/L		07/22/14 18:49	1
4,4'-DDE	0.020	U	0.049	0.020	0.0074	ug/L		07/22/14 18:49	1
4,4'-DDT	0.020	U	0.049	0.020	0.015	ug/L		07/22/14 18:49	1
delta-BHC	0.020	U Q	0.049	0.020	0.0057	ug/L		07/22/14 18:49	1
Dieldrin	0.020	U	0.049	0.020	0.0062	ug/L		07/22/14 18:49	1
Endosulfan I	0.020	U	0.049	0.020	0.0057	ug/L		07/22/14 18:49	1
Endosulfan II	0.020	U	0.049	0.020	0.0069	ug/L		07/22/14 18:49	1
Endosulfan sulfate	0.020	U	0.049	0.020	0.0056	ug/L		07/22/14 18:49	1
Endrin	0.020	U	0.049	0.020	0.0078	ug/L		07/22/14 18:49	1
Endrin aldehyde	0.020	U	0.049	0.020	0.0086	ug/L		07/22/14 18:49	1
Endrin ketone	0.020	U	0.049	0.020	0.0069	ug/L		07/22/14 18:49	1
gamma-BHC (Lindane)	0.020	U	0.049	0.020	0.0068	ug/L		07/22/14 18:49	1
gamma-Chlordane	0.020	U	0.049	0.020	0.0089	ug/L		07/22/14 18:49	1
Heptachlor	0.020	U	0.049	0.020	0.0076	ug/L		07/22/14 18:49	1
Heptachlor epoxide	0.020	U	0.049	0.020	0.0074	ug/L		07/22/14 18:49	1
Methoxychlor	0.020	U	0.049	0.020	0.013	ug/L		07/22/14 18:49	1
Toxaphene	0.79	U	4.9	0.79	0.36	ug/L		07/22/14 18:49	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
DCB Decachlorobiphenyl	*51*		*30 - 135*	*07/16/14 20:48*	*07/22/14 18:49*	*1*

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-1-GW
Date Collected: 07/14/14 18:00
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-1
Matrix: Water

Method: 8081B - Organochlorine Pesticides (GC) (Continued)

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Tetrachloro-m-xylene	85		25 - 140	07/16/14 20:48	07/22/14 18:49	1

Client Sample ID: CW-2-GW
Date Collected: 07/15/14 11:45
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-2
Matrix: Water

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Acenaphthene	0.95	U	9.5	0.95	0.27	ug/L		07/24/14 00:29	1
Acenaphthylene	0.95	U	9.5	0.95	0.47	ug/L		07/24/14 00:29	1
Anthracene	0.95	U	9.5	0.95	0.40	ug/L		07/24/14 00:29	1
Benzo[a]anthracene	0.95	U	9.5	0.95	0.33	ug/L		07/24/14 00:29	1
Benzo[a]pyrene	0.95	U	9.5	0.95	0.29	ug/L		07/24/14 00:29	1
Benzo[b]fluoranthene	0.95	U	9.5	0.95	0.50	ug/L		07/24/14 00:29	1
Benzo[g,h,i]perylene	0.95	U	9.5	0.95	0.48	ug/L		07/24/14 00:29	1
Benzoic acid	48	U	76	48	9.5	ug/L		07/24/14 00:29	1
Benzo[k]fluoranthene	0.95	U	9.5	0.95	0.44	ug/L		07/24/14 00:29	1
Benzyl alcohol	**2.5**	**J**	24	0.95	0.22	ug/L		07/24/14 00:29	1
Bis(2-chloroethoxy)methane	3.8	U	9.5	3.8	0.92	ug/L		07/24/14 00:29	1
Bis(2-chloroethyl)ether	0.95	U	19	0.95	0.39	ug/L		07/24/14 00:29	1
bis(chloroisopropyl) ether	0.95	U	9.5	0.95	0.27	ug/L		07/24/14 00:29	1
Bis(2-ethylhexyl) phthalate	**4.5**	**J**	9.5	0.95	0.53	ug/L		07/24/14 00:29	1
4-Bromophenyl phenyl ether	0.95	U	9.5	0.95	0.41	ug/L		07/24/14 00:29	1
Butyl benzyl phthalate	3.8	U	19	3.8	0.95	ug/L		07/24/14 00:29	1
4-Chloroaniline	4.8	U	24	4.8	2.0	ug/L		07/24/14 00:29	1
4-Chloro-3-methylphenol	4.8	U	19	4.8	2.3	ug/L		07/24/14 00:29	1
2-Chloronaphthalene	0.95	U	9.5	0.95	0.25	ug/L		07/24/14 00:29	1
2-Chlorophenol	3.8	U	9.5	3.8	1.9	ug/L		07/24/14 00:29	1
4-Chlorophenyl phenyl ether	3.8	U	9.5	3.8	1.6	ug/L		07/24/14 00:29	1
Chrysene	0.95	U	9.5	0.95	0.51	ug/L		07/24/14 00:29	1
Dibenz(a,h)anthracene	0.95	U	9.5	0.95	0.48	ug/L		07/24/14 00:29	1
Dibenzofuran	0.95	U	9.5	0.95	0.28	ug/L		07/24/14 00:29	1
1,2-Dichlorobenzene	0.95	U	9.5	0.95	0.22	ug/L		07/24/14 00:29	1
1,3-Dichlorobenzene	0.95	U	9.5	0.95	0.29	ug/L		07/24/14 00:29	1
1,4-Dichlorobenzene	0.95	U	9.5	0.95	0.30	ug/L		07/24/14 00:29	1
3,3'-Dichlorobenzidine	9.5	U	48	9.5	1.9	ug/L		07/24/14 00:29	1
2,4-Dichlorophenol	1.9	U	9.5	1.9	0.61	ug/L		07/24/14 00:29	1
Diethyl phthalate	**0.80**	**J**	19	0.95	0.36	ug/L		07/24/14 00:29	1
2,4-Dimethylphenol	3.8	U	9.5	3.8	0.55	ug/L		07/24/14 00:29	1
Dimethyl phthalate	**0.22**	**J**	19	0.95	0.20	ug/L		07/24/14 00:29	1
Di-n-butyl phthalate	**1.5**	**J**	19	3.8	1.1	ug/L		07/24/14 00:29	1
4,6-Dinitro-2-methylphenol	9.5	U	76	9.5	3.8	ug/L		07/24/14 00:29	1
2,4-Dinitrophenol	19	U	76	19	9.5	ug/L		07/24/14 00:29	1
2,4-Dinitrotoluene	3.8	U	19	3.8	1.6	ug/L		07/24/14 00:29	1
2,6-Dinitrotoluene	3.8	U	19	3.8	1.8	ug/L		07/24/14 00:29	1
Di-n-octyl phthalate	0.95	U	19	0.95	0.33	ug/L		07/24/14 00:29	1
Fluoranthene	0.95	U	19	0.95	0.19	ug/L		07/24/14 00:29	1
Fluorene	0.95	U	9.5	0.95	0.29	ug/L		07/24/14 00:29	1
Hexachlorobenzene	0.95	U	9.5	0.95	0.63	ug/L		07/24/14 00:29	1
Hexachlorobutadiene	9.5	U	29	9.5	3.1	ug/L		07/24/14 00:29	1
Hexachloroethane	3.8	U	9.5	3.8	2.0	ug/L		07/24/14 00:29	1
Indeno[1,2,3-cd]pyrene	0.95	U	9.5	0.95	0.62	ug/L		07/24/14 00:29	1
Isophorone	0.95	U	9.5	0.95	0.20	ug/L		07/24/14 00:29	1
2-Methylnaphthalene	0.95	U	9.5	0.95	0.28	ug/L		07/24/14 00:29	1
2-Methylphenol	3.8	U	9.5	3.8	0.93	ug/L		07/24/14 00:29	1
3 & 4 Methylphenol	**0.25**	**J**	19	0.95	0.24	ug/L		07/24/14 00:29	1
Naphthalene	0.95	U	9.5	0.95	0.28	ug/L		07/24/14 00:29	1

Client Sample ID: CW-2-GW
Date Collected: 07/15/14 11:45
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-2
Matrix: Water

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
2-Nitroaniline	3.8	U	48	3.8	1.6	ug/L		07/24/14 00:29	1
3-Nitroaniline	1.9	U	48	1.9	1.9	ug/L		07/24/14 00:29	1
4-Nitroaniline	3.8	U	48	3.8	1.9	ug/L		07/24/14 00:29	1
Nitrobenzene	1.9	U	19	1.9	0.77	ug/L		07/24/14 00:29	1
2-Nitrophenol	0.95	U	19	0.95	0.37	ug/L		07/24/14 00:29	1
4-Nitrophenol	9.5	U	48	9.5	1.2	ug/L		07/24/14 00:29	1
N-Nitrosodi-n-propylamine	0.95	U	19	0.95	0.33	ug/L		07/24/14 00:29	1
N-Nitrosodiphenylamine	0.95	U	9.5	0.95	0.42	ug/L		07/24/14 00:29	1
Pentachlorophenol	38	U	76	38	19	ug/L		07/24/14 00:29	1
Phenanthrene	0.95	U	9.5	0.95	0.25	ug/L		07/24/14 00:29	1
Phenol	4.8	U	9.5	4.8	1.9	ug/L		07/24/14 00:29	1
Pyrene	0.95	U	9.5	0.95	0.35	ug/L		07/24/14 00:29	1
1,2,4-Trichlorobenzene	0.95	U	9.5	0.95	0.27	ug/L		07/24/14 00:29	1
2,4,5-Trichlorophenol	0.95	U	19	0.95	0.43	ug/L		07/24/14 00:29	1
2,4,6-Trichlorophenol	0.95	U	19	0.95	0.28	ug/L		07/24/14 00:29	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*85*		*50 - 110*	*07/16/14 15:49*	*07/24/14 00:29*	*1*
2-Fluorophenol	*90*		*20 - 110*	*07/16/14 15:49*	*07/24/14 00:29*	*1*
Nitrobenzene-d5	*88*		*40 - 110*	*07/16/14 15:49*	*07/24/14 00:29*	*1*
Phenol-d5	*93*		*10 - 115*	*07/16/14 15:49*	*07/24/14 00:29*	*1*
Terphenyl-d14	*52*		*50 - 135*	*07/16/14 15:49*	*07/24/14 00:29*	*1*
2,4,6-Tribromophenol	*94*		*40 - 125*	*07/16/14 15:49*	*07/24/14 00:29*	*1*

Method: 8081B - Organochlorine Pesticides (GC)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Aldrin	0.019	U	0.049	0.019	0.0057	ug/L		07/22/14 19:06	1
alpha-BHC	0.019	U	0.049	0.019	0.0051	ug/L		07/22/14 19:06	1
alpha-Chlordane	0.019	U	0.049	0.019	0.0051	ug/L		07/22/14 19:06	1
beta-BHC	0.019	U	0.049	0.019	0.0085	ug/L		07/22/14 19:06	1
4,4'-DDD	0.019	U	0.049	0.019	0.0075	ug/L		07/22/14 19:06	1
4,4'-DDE	0.019	U	0.049	0.019	0.0073	ug/L		07/22/14 19:06	1
4,4'-DDT	0.019	U	0.049	0.019	0.014	ug/L		07/22/14 19:06	1
delta-BHC	0.019	U Q	0.049	0.019	0.0056	ug/L		07/22/14 19:06	1
Dieldrin	0.019	U	0.049	0.019	0.0061	ug/L		07/22/14 19:06	1
Endosulfan I	0.019	U	0.049	0.019	0.0056	ug/L		07/22/14 19:06	1
Endosulfan II	0.019	U	0.049	0.019	0.0068	ug/L		07/22/14 19:06	1
Endosulfan sulfate	0.019	U	0.049	0.019	0.0055	ug/L		07/22/14 19:06	1
Endrin	0.019	U	0.049	0.019	0.0077	ug/L		07/22/14 19:06	1
Endrin aldehyde	0.019	U	0.049	0.019	0.0086	ug/L		07/22/14 19:06	1
Endrin ketone	0.019	U	0.049	0.019	0.0068	ug/L		07/22/14 19:06	1
gamma-BHC (Lindane)	0.019	U	0.049	0.019	0.0067	ug/L		07/22/14 19:06	1
gamma-Chlordane	**0.016**	**J**	0.049	0.019	0.0088	ug/L		07/22/14 19:06	1
Heptachlor	0.019	U	0.049	0.019	0.0075	ug/L		07/22/14 19:06	1
Heptachlor epoxide	0.019	U	0.049	0.019	0.0073	ug/L		07/22/14 19:06	1
Methoxychlor	0.019	U	0.049	0.019	0.013	ug/L		07/22/14 19:06	1
Toxaphene	0.78	U	4.9	0.78	0.36	ug/L		07/22/14 19:06	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
DCB Decachlorobiphenyl	*51*		*30 - 135*	*07/16/14 20:48*	*07/22/14 19:06*	*1*

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-2-GW
Date Collected: 07/15/14 11:45
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-2
Matrix: Water

Method: 8081B - Organochlorine Pesticides (GC) (Continued)

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Tetrachloro-m-xylene	84		25 - 140	07/16/14 20:48	07/22/14 19:06	1

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-SB-4
Date Collected: 07/15/14 09:30
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-3
Matrix: Solid
Percent Solids: 89.4

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Acenaphthene	18	U	350	18	11	ug/Kg	☼	07/18/14 15:16	1
Acenaphthylene	35	U	350	35	18	ug/Kg	☼	07/18/14 15:16	1
Anthracene	35	U	350	35	18	ug/Kg	☼	07/18/14 15:16	1
Benzo[a]anthracene	35	U	350	35	21	ug/Kg	☼	07/18/14 15:16	1
Benzo[a]pyrene	35	U	350	35	21	ug/Kg	☼	07/18/14 15:16	1
Benzo[b]fluoranthene	35	U	350	35	27	ug/Kg	☼	07/18/14 15:16	1
Benzo[g,h,i]perylene	35	U	350	35	17	ug/Kg	☼	07/18/14 15:16	1
Benzoic acid	690	U	1700	690	350	ug/Kg	☼	07/18/14 15:16	1
Benzo[k]fluoranthene	69	U	350	69	42	ug/Kg	☼	07/18/14 15:16	1
Benzyl alcohol	35	U	350	35	10	ug/Kg	☼	07/18/14 15:16	1
Bis(2-chloroethoxy)methane	69	U	350	69	24	ug/Kg	☼	07/18/14 15:16	1
Bis(2-chloroethyl)ether	35	U	350	35	17	ug/Kg	☼	07/18/14 15:16	1
bis(chloroisopropyl) ether	35	U	350	35	24	ug/Kg	☼	07/18/14 15:16	1
Bis(2-ethylhexyl) phthalate	69	U	350	69	48	ug/Kg	☼	07/18/14 15:16	1
4-Bromophenyl phenyl ether	35	U	350	35	20	ug/Kg	☼	07/18/14 15:16	1
Butyl benzyl phthalate	69	U	350	69	45	ug/Kg	☼	07/18/14 15:16	1
4-Chloroaniline	140	U	350	140	86	ug/Kg	☼	07/18/14 15:16	1
4-Chloro-3-methylphenol	140	U	350	140	69	ug/Kg	☼	07/18/14 15:16	1
2-Chloronaphthalene	35	U	350	35	10	ug/Kg	☼	07/18/14 15:16	1
2-Chlorophenol	35	U	350	35	22	ug/Kg	☼	07/18/14 15:16	1
4-Chlorophenyl phenyl ether	69	U	350	69	22	ug/Kg	☼	07/18/14 15:16	1
Chrysene	35	U	350	35	28	ug/Kg	☼	07/18/14 15:16	1
Dibenz(a,h)anthracene	35	U	350	35	20	ug/Kg	☼	07/18/14 15:16	1
Dibenzofuran	35	U	350	35	21	ug/Kg	☼	07/18/14 15:16	1
1,2-Dichlorobenzene	35	U	350	35	23	ug/Kg	☼	07/18/14 15:16	1
1,3-Dichlorobenzene	35	U	350	35	13	ug/Kg	☼	07/18/14 15:16	1
1,4-Dichlorobenzene	35	U	350	35	14	ug/Kg	☼	07/18/14 15:16	1
3,3'-Dichlorobenzidine	350	U	1700	350	94	ug/Kg	☼	07/18/14 15:16	1
2,4-Dichlorophenol	69	U	350	69	10	ug/Kg	☼	07/18/14 15:16	1
Diethyl phthalate	35	U	690	35	27	ug/Kg	☼	07/18/14 15:16	1
2,4-Dimethylphenol	140	U	350	140	69	ug/Kg	☼	07/18/14 15:16	1
Dimethyl phthalate	35	U	350	35	24	ug/Kg	☼	07/18/14 15:16	1
Di-n-butyl phthalate	35	U	350	35	30	ug/Kg	☼	07/18/14 15:16	1
4,6-Dinitro-2-methylphenol	690	U	1700	690	350	ug/Kg	☼	07/18/14 15:16	1
2,4-Dinitrophenol	700	U	1700	700	350	ug/Kg	☼	07/18/14 15:16	1
2,4-Dinitrotoluene	140	U	350	140	69	ug/Kg	☼	07/18/14 15:16	1
2,6-Dinitrotoluene	69	U	350	69	29	ug/Kg	☼	07/18/14 15:16	1
Di-n-octyl phthalate	69	U	350	69	15	ug/Kg	☼	07/18/14 15:16	1
Fluoranthene	69	U	350	69	38	ug/Kg	☼	07/18/14 15:16	1
Fluorene	35	U	350	35	19	ug/Kg	☼	07/18/14 15:16	1
Hexachlorobenzene	69	U	350	69	30	ug/Kg	☼	07/18/14 15:16	1
Hexachlorobutadiene	69	U	350	69	10	ug/Kg	☼	07/18/14 15:16	1
Hexachloroethane	35	U	350	35	22	ug/Kg	☼	07/18/14 15:16	1
Indeno[1,2,3-cd]pyrene	35	U	350	35	23	ug/Kg	☼	07/18/14 15:16	1
Isophorone	35	U	350	35	18	ug/Kg	☼	07/18/14 15:16	1
2-Methylnaphthalene	35	U	350	35	20	ug/Kg	☼	07/18/14 15:16	1
2-Methylphenol	35	U	350	35	14	ug/Kg	☼	07/18/14 15:16	1
3 & 4 Methylphenol	69	U	350	69	35	ug/Kg	☼	07/18/14 15:16	1
Naphthalene	69	U	350	69	33	ug/Kg	☼	07/18/14 15:16	1

Client Sample ID: CW-SB-4
Date Collected: 07/15/14 09:30
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-3
Matrix: Solid
Percent Solids: 89.4

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
2-Nitroaniline	69	U	1700	69	52	ug/Kg	☼	07/18/14 15:16	1
3-Nitroaniline	140	U	1700	140	77	ug/Kg	☼	07/18/14 15:16	1
4-Nitroaniline	140	U	1700	140	76	ug/Kg	☼	07/18/14 15:16	1
Nitrobenzene	35	U	350	35	23	ug/Kg	☼	07/18/14 15:16	1
2-Nitrophenol	69	U	350	69	10	ug/Kg	☼	07/18/14 15:16	1
4-Nitrophenol	350	U	1700	350	100	ug/Kg	☼	07/18/14 15:16	1
N-Nitrosodi-n-propylamine	69	U	350	69	33	ug/Kg	☼	07/18/14 15:16	1
N-Nitrosodiphenylamine	35	U	350	35	22	ug/Kg	☼	07/18/14 15:16	1
Pentachlorophenol	700	U	1700	700	350	ug/Kg	☼	07/18/14 15:16	1
Phenanthrene	35	U	350	35	18	ug/Kg	☼	07/18/14 15:16	1
Phenol	35	U	350	35	19	ug/Kg	☼	07/18/14 15:16	1
Pyrene	35	U	420	35	13	ug/Kg	☼	07/18/14 15:16	1
1,2,4-Trichlorobenzene	35	U	350	35	29	ug/Kg	☼	07/18/14 15:16	1
2,4,5-Trichlorophenol	140	U	350	140	10	ug/Kg	☼	07/18/14 15:16	1
2,4,6-Trichlorophenol	69	U	350	69	10	ug/Kg	☼	07/18/14 15:16	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*75*		*45 - 105*	*07/16/14 16:24*	*07/18/14 15:16*	*1*
2-Fluorophenol	*73*		*35 - 105*	*07/16/14 16:24*	*07/18/14 15:16*	*1*
Nitrobenzene-d5	*69*		*35 - 100*	*07/16/14 16:24*	*07/18/14 15:16*	*1*
Phenol-d5	*74*		*40 - 100*	*07/16/14 16:24*	*07/18/14 15:16*	*1*
Terphenyl-d14	*90*		*30 - 125*	*07/16/14 16:24*	*07/18/14 15:16*	*1*
2,4,6-Tribromophenol	*74*		*35 - 125*	*07/16/14 16:24*	*07/18/14 15:16*	*1*

Method: 8081B - Organochlorine Pesticides (GC)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Aldrin	0.50	U	1.9	0.50	0.27	ug/Kg	☼	07/22/14 22:02	1
alpha-BHC	0.50	U	1.9	0.50	0.23	ug/Kg	☼	07/22/14 22:02	1
alpha-Chlordane	0.50	U	1.9	0.50	0.35	ug/Kg	☼	07/22/14 22:02	1
beta-BHC	0.75	U	1.9	0.75	0.73	ug/Kg	☼	07/22/14 22:02	1
4,4'-DDD	0.75	U	1.9	0.75	0.60	ug/Kg	☼	07/22/14 22:02	1
4,4'-DDE	0.50	U	1.9	0.50	0.26	ug/Kg	☼	07/22/14 22:02	1
4,4'-DDT	0.75	U	2.2	0.75	0.65	ug/Kg	☼	07/22/14 22:02	1
delta-BHC	0.75	U	1.9	0.75	0.44	ug/Kg	☼	07/22/14 22:02	1
Dieldrin	0.50	U	1.9	0.50	0.23	ug/Kg	☼	07/22/14 22:02	1
Endosulfan I	0.50	U	1.9	0.50	0.19	ug/Kg	☼	07/22/14 22:02	1
Endosulfan II	0.50	U	1.9	0.50	0.31	ug/Kg	☼	07/22/14 22:02	1
Endosulfan sulfate	0.50	U	1.9	0.50	0.30	ug/Kg	☼	07/22/14 22:02	1
Endrin	0.50	U	1.9	0.50	0.33	ug/Kg	☼	07/22/14 22:02	1
Endrin aldehyde	0.50	U	1.9	0.50	0.19	ug/Kg	☼	07/22/14 22:02	1
Endrin ketone	0.75	U	1.9	0.75	0.53	ug/Kg	☼	07/22/14 22:02	1
gamma-BHC (Lindane)	0.75	U	1.9	0.75	0.51	ug/Kg	☼	07/22/14 22:02	1
gamma-Chlordane	0.75	U	1.9	0.75	0.29	ug/Kg	☼	07/22/14 22:02	1
Heptachlor	0.50	U	1.9	0.50	0.23	ug/Kg	☼	07/22/14 22:02	1
Heptachlor epoxide	0.75	U	1.9	0.75	0.47	ug/Kg	☼	07/22/14 22:02	1
Methoxychlor	0.75	U	3.6	0.75	0.49	ug/Kg	☼	07/22/14 22:02	1
Toxaphene	30	U	190	30	17	ug/Kg	☼	07/22/14 22:02	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
DCB Decachlorobiphenyl	*99*		*55 - 130*	*07/18/14 09:23*	*07/22/14 22:02*	*1*

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-SB-4
Date Collected: 07/15/14 09:30
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-3
Matrix: Solid
Percent Solids: 89.4

Method: 8081B - Organochlorine Pesticides (GC) (Continued)

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Tetrachloro-m-xylene	100		70 - 125	07/18/14 09:23	07/22/14 22:02	1

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-SB-3
Date Collected: 07/15/14 10:00
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-4
Matrix: Solid
Percent Solids: 89.8

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Acenaphthene	17	U	340	17	11	ug/Kg	☼	07/18/14 16:37	1
Acenaphthylene	34	U	340	34	17	ug/Kg	☼	07/18/14 16:37	1
Anthracene	34	U	340	34	17	ug/Kg	☼	07/18/14 16:37	1
Benzo[a]anthracene	34	U	340	34	20	ug/Kg	☼	07/18/14 16:37	1
Benzo[a]pyrene	34	U	340	34	20	ug/Kg	☼	07/18/14 16:37	1
Benzo[b]fluoranthene	34	U	340	34	27	ug/Kg	☼	07/18/14 16:37	1
Benzo[g,h,i]perylene	34	U	340	34	16	ug/Kg	☼	07/18/14 16:37	1
Benzoic acid	680	U	1600	680	340	ug/Kg	☼	07/18/14 16:37	1
Benzo[k]fluoranthene	68	U	340	68	41	ug/Kg	☼	07/18/14 16:37	1
Benzyl alcohol	34	U	340	34	10	ug/Kg	☼	07/18/14 16:37	1
Bis(2-chloroethoxy)methane	68	U	340	68	24	ug/Kg	☼	07/18/14 16:37	1
Bis(2-chloroethyl)ether	34	U	340	34	17	ug/Kg	☼	07/18/14 16:37	1
bis(chloroisopropyl) ether	34	U	340	34	24	ug/Kg	☼	07/18/14 16:37	1
Bis(2-ethylhexyl) phthalate	68	U	340	68	47	ug/Kg	☼	07/18/14 16:37	1
4-Bromophenyl phenyl ether	34	U	340	34	19	ug/Kg	☼	07/18/14 16:37	1
Butyl benzyl phthalate	68	U	340	68	44	ug/Kg	☼	07/18/14 16:37	1
4-Chloroaniline	130	U	340	130	84	ug/Kg	☼	07/18/14 16:37	1
4-Chloro-3-methylphenol	130	U	340	130	68	ug/Kg	☼	07/18/14 16:37	1
2-Chloronaphthalene	34	U	340	34	10	ug/Kg	☼	07/18/14 16:37	1
2-Chlorophenol	34	U	340	34	22	ug/Kg	☼	07/18/14 16:37	1
4-Chlorophenyl phenyl ether	68	U	340	68	22	ug/Kg	☼	07/18/14 16:37	1
Chrysene	34	U	340	34	28	ug/Kg	☼	07/18/14 16:37	1
Dibenz(a,h)anthracene	34	U	340	34	19	ug/Kg	☼	07/18/14 16:37	1
Dibenzofuran	34	U	340	34	20	ug/Kg	☼	07/18/14 16:37	1
1,2-Dichlorobenzene	34	U	340	34	23	ug/Kg	☼	07/18/14 16:37	1
1,3-Dichlorobenzene	34	U	340	34	12	ug/Kg	☼	07/18/14 16:37	1
1,4-Dichlorobenzene	34	U	340	34	14	ug/Kg	☼	07/18/14 16:37	1
3,3'-Dichlorobenzidine	340	U	1600	340	92	ug/Kg	☼	07/18/14 16:37	1
2,4-Dichlorophenol	68	U	340	68	10	ug/Kg	☼	07/18/14 16:37	1
Diethyl phthalate	34	U	680	34	27	ug/Kg	☼	07/18/14 16:37	1
2,4-Dimethylphenol	130	U	340	130	68	ug/Kg	☼	07/18/14 16:37	1
Dimethyl phthalate	34	U	340	34	24	ug/Kg	☼	07/18/14 16:37	1
Di-n-butyl phthalate	34	U	340	34	30	ug/Kg	☼	07/18/14 16:37	1
4,6-Dinitro-2-methylphenol	680	U	1600	680	340	ug/Kg	☼	07/18/14 16:37	1
2,4-Dinitrophenol	690	U	1600	690	340	ug/Kg	☼	07/18/14 16:37	1
2,4-Dinitrotoluene	130	U	340	130	68	ug/Kg	☼	07/18/14 16:37	1
2,6-Dinitrotoluene	68	U	340	68	29	ug/Kg	☼	07/18/14 16:37	1
Di-n-octyl phthalate	68	U	340	68	15	ug/Kg	☼	07/18/14 16:37	1
Fluoranthene	68	U	340	68	37	ug/Kg	☼	07/18/14 16:37	1
Fluorene	34	U	340	34	18	ug/Kg	☼	07/18/14 16:37	1
Hexachlorobenzene	68	U	340	68	30	ug/Kg	☼	07/18/14 16:37	1
Hexachlorobutadiene	68	U	340	68	10	ug/Kg	☼	07/18/14 16:37	1
Hexachloroethane	34	U	340	34	22	ug/Kg	☼	07/18/14 16:37	1
Indeno[1,2,3-cd]pyrene	34	U	340	34	23	ug/Kg	☼	07/18/14 16:37	1
Isophorone	34	U	340	34	17	ug/Kg	☼	07/18/14 16:37	1
2-Methylnaphthalene	34	U	340	34	19	ug/Kg	☼	07/18/14 16:37	1
2-Methylphenol	34	U	340	34	13	ug/Kg	☼	07/18/14 16:37	1
3 & 4 Methylphenol	68	U	340	68	34	ug/Kg	☼	07/18/14 16:37	1
Naphthalene	68	U	340	68	32	ug/Kg	☼	07/18/14 16:37	1

Client Sample ID: CW-SB-3
Date Collected: 07/15/14 10:00
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-4
Matrix: Solid
Percent Solids: 89.8

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
2-Nitroaniline	68	U	1600	68	51	ug/Kg	☼	07/18/14 16:37	1
3-Nitroaniline	140	U	1600	140	75	ug/Kg	☼	07/18/14 16:37	1
4-Nitroaniline	130	U	1600	130	74	ug/Kg	☼	07/18/14 16:37	1
Nitrobenzene	34	U	340	34	23	ug/Kg	☼	07/18/14 16:37	1
2-Nitrophenol	68	U	340	68	10	ug/Kg	☼	07/18/14 16:37	1
4-Nitrophenol	340	U	1600	340	99	ug/Kg	☼	07/18/14 16:37	1
N-Nitrosodi-n-propylamine	68	U	340	68	32	ug/Kg	☼	07/18/14 16:37	1
N-Nitrosodiphenylamine	34	U	340	34	22	ug/Kg	☼	07/18/14 16:37	1
Pentachlorophenol	690	U	1600	690	340	ug/Kg	☼	07/18/14 16:37	1
Phenanthrene	34	U	340	34	17	ug/Kg	☼	07/18/14 16:37	1
Phenol	34	U	340	34	18	ug/Kg	☼	07/18/14 16:37	1
Pyrene	34	U	410	34	12	ug/Kg	☼	07/18/14 16:37	1
1,2,4-Trichlorobenzene	34	U	340	34	29	ug/Kg	☼	07/18/14 16:37	1
2,4,5-Trichlorophenol	130	U	340	130	10	ug/Kg	☼	07/18/14 16:37	1
2,4,6-Trichlorophenol	68	U	340	68	10	ug/Kg	☼	07/18/14 16:37	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*78*		*45 - 105*	*07/16/14 16:24*	*07/18/14 16:37*	*1*
2-Fluorophenol	*74*		*35 - 105*	*07/16/14 16:24*	*07/18/14 16:37*	*1*
Nitrobenzene-d5	*71*		*35 - 100*	*07/16/14 16:24*	*07/18/14 16:37*	*1*
Phenol-d5	*75*		*40 - 100*	*07/16/14 16:24*	*07/18/14 16:37*	*1*
Terphenyl-d14	*91*		*30 - 125*	*07/16/14 16:24*	*07/18/14 16:37*	*1*
2,4,6-Tribromophenol	*76*		*35 - 125*	*07/16/14 16:24*	*07/18/14 16:37*	*1*

Method: 8081B - Organochlorine Pesticides (GC)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Aldrin	0.48	U	1.8	0.48	0.26	ug/Kg	☼	07/22/14 22:19	1
alpha-BHC	0.48	U	1.8	0.48	0.23	ug/Kg	☼	07/22/14 22:19	1
alpha-Chlordane	0.48	U	1.8	0.48	0.34	ug/Kg	☼	07/22/14 22:19	1
beta-BHC	0.73	U	1.8	0.73	0.70	ug/Kg	☼	07/22/14 22:19	1
4,4'-DDD	0.73	U	1.8	0.73	0.58	ug/Kg	☼	07/22/14 22:19	1
4,4'-DDE	0.48	U	1.8	0.48	0.25	ug/Kg	☼	07/22/14 22:19	1
4,4'-DDT	0.73	U	2.1	0.73	0.62	ug/Kg	☼	07/22/14 22:19	1
delta-BHC	0.73	U	1.8	0.73	0.42	ug/Kg	☼	07/22/14 22:19	1
Dieldrin	0.48	U	1.8	0.48	0.22	ug/Kg	☼	07/22/14 22:19	1
Endosulfan I	0.48	U	1.8	0.48	0.19	ug/Kg	☼	07/22/14 22:19	1
Endosulfan II	0.48	U	1.8	0.48	0.30	ug/Kg	☼	07/22/14 22:19	1
Endosulfan sulfate	0.48	U	1.8	0.48	0.29	ug/Kg	☼	07/22/14 22:19	1
Endrin	0.48	U	1.8	0.48	0.32	ug/Kg	☼	07/22/14 22:19	1
Endrin aldehyde	0.48	U	1.8	0.48	0.18	ug/Kg	☼	07/22/14 22:19	1
Endrin ketone	0.73	U	1.8	0.73	0.52	ug/Kg	☼	07/22/14 22:19	1
gamma-BHC (Lindane)	0.73	U	1.8	0.73	0.49	ug/Kg	☼	07/22/14 22:19	1
gamma-Chlordane	0.73	U J	1.8	0.73	0.28	ug/Kg	☼	07/22/14 22:19	1
Heptachlor	0.48	U	1.8	0.48	0.23	ug/Kg	☼	07/22/14 22:19	1
Heptachlor epoxide	0.73	U	1.8	0.73	0.45	ug/Kg	☼	07/22/14 22:19	1
Methoxychlor	0.73	U	3.5	0.73	0.47	ug/Kg	☼	07/22/14 22:19	1
Toxaphene	28	U	180	28	17	ug/Kg	☼	07/22/14 22:19	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
DCB Decachlorobiphenyl	*93*		*55 - 130*	*07/18/14 09:23*	*07/22/14 22:19*	*1*

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-SB-3
Date Collected: 07/15/14 10:00
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-4
Matrix: Solid
Percent Solids: 89.8

Method: 8081B - Organochlorine Pesticides (GC) (Continued)

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Tetrachloro-m-xylene	90		70 - 125	07/18/14 09:23	07/22/14 22:19	1

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-SB-2
Date Collected: 07/15/14 10:30
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-5
Matrix: Solid
Percent Solids: 82.1

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Acenaphthene	19	U	370	19	12	ug/Kg	☼	07/18/14 17:04	1
Acenaphthylene	37	U	370	37	19	ug/Kg	☼	07/18/14 17:04	1
Anthracene	37	U	370	37	19	ug/Kg	☼	07/18/14 17:04	1
Benzo[a]anthracene	37	U	370	37	22	ug/Kg	☼	07/18/14 17:04	1
Benzo[a]pyrene	37	U	370	37	22	ug/Kg	☼	07/18/14 17:04	1
Benzo[b]fluoranthene	37	U	370	37	29	ug/Kg	☼	07/18/14 17:04	1
Benzo[g,h,i]perylene	37	U	370	37	18	ug/Kg	☼	07/18/14 17:04	1
Benzoic acid	740	U	1800	740	370	ug/Kg	☼	07/18/14 17:04	1
Benzo[k]fluoranthene	74	U	370	74	45	ug/Kg	☼	07/18/14 17:04	1
Benzyl alcohol	37	U	370	37	11	ug/Kg	☼	07/18/14 17:04	1
Bis(2-chloroethoxy)methane	74	U	370	74	26	ug/Kg	☼	07/18/14 17:04	1
Bis(2-chloroethyl)ether	37	U	370	37	19	ug/Kg	☼	07/18/14 17:04	1
bis(chloroisopropyl) ether	37	U	370	37	26	ug/Kg	☼	07/18/14 17:04	1
Bis(2-ethylhexyl) phthalate	74	U	370	74	52	ug/Kg	☼	07/18/14 17:04	1
4-Bromophenyl phenyl ether	37	U	370	37	21	ug/Kg	☼	07/18/14 17:04	1
Butyl benzyl phthalate	74	U	370	74	48	ug/Kg	☼	07/18/14 17:04	1
4-Chloroaniline	150	U	370	150	92	ug/Kg	☼	07/18/14 17:04	1
4-Chloro-3-methylphenol	150	U	370	150	74	ug/Kg	☼	07/18/14 17:04	1
2-Chloronaphthalene	37	U	370	37	11	ug/Kg	☼	07/18/14 17:04	1
2-Chlorophenol	37	U	370	37	24	ug/Kg	☼	07/18/14 17:04	1
4-Chlorophenyl phenyl ether	74	U	370	74	24	ug/Kg	☼	07/18/14 17:04	1
Chrysene	37	U	370	37	30	ug/Kg	☼	07/18/14 17:04	1
Dibenz(a,h)anthracene	37	U	370	37	21	ug/Kg	☼	07/18/14 17:04	1
Dibenzofuran	37	U	370	37	22	ug/Kg	☼	07/18/14 17:04	1
1,2-Dichlorobenzene	37	U	370	37	25	ug/Kg	☼	07/18/14 17:04	1
1,3-Dichlorobenzene	37	U	370	37	13	ug/Kg	☼	07/18/14 17:04	1
1,4-Dichlorobenzene	37	U	370	37	15	ug/Kg	☼	07/18/14 17:04	1
3,3'-Dichlorobenzidine	370	U	1800	370	100	ug/Kg	☼	07/18/14 17:04	1
2,4-Dichlorophenol	74	U	370	74	11	ug/Kg	☼	07/18/14 17:04	1
Diethyl phthalate	37	U	740	37	29	ug/Kg	☼	07/18/14 17:04	1
2,4-Dimethylphenol	150	U	370	150	74	ug/Kg	☼	07/18/14 17:04	1
Dimethyl phthalate	37	U	370	37	26	ug/Kg	☼	07/18/14 17:04	1
Di-n-butyl phthalate	37	U	370	37	33	ug/Kg	☼	07/18/14 17:04	1
4,6-Dinitro-2-methylphenol	740	U	1800	740	370	ug/Kg	☼	07/18/14 17:04	1
2,4-Dinitrophenol	750	U	1800	750	370	ug/Kg	☼	07/18/14 17:04	1
2,4-Dinitrotoluene	150	U	370	150	74	ug/Kg	☼	07/18/14 17:04	1
2,6-Dinitrotoluene	74	U	370	74	31	ug/Kg	☼	07/18/14 17:04	1
Di-n-octyl phthalate	74	U	370	74	16	ug/Kg	☼	07/18/14 17:04	1
Fluoranthene	74	U	370	74	40	ug/Kg	☼	07/18/14 17:04	1
Fluorene	37	U	370	37	20	ug/Kg	☼	07/18/14 17:04	1
Hexachlorobenzene	74	U	370	74	33	ug/Kg	☼	07/18/14 17:04	1
Hexachlorobutadiene	74	U	370	74	11	ug/Kg	☼	07/18/14 17:04	1
Hexachloroethane	37	U	370	37	24	ug/Kg	☼	07/18/14 17:04	1
Indeno[1,2,3-cd]pyrene	37	U	370	37	25	ug/Kg	☼	07/18/14 17:04	1
Isophorone	37	U	370	37	19	ug/Kg	☼	07/18/14 17:04	1
2-Methylnaphthalene	37	U	370	37	21	ug/Kg	☼	07/18/14 17:04	1
2-Methylphenol	37	U	370	37	15	ug/Kg	☼	07/18/14 17:04	1
3 & 4 Methylphenol	74	U	370	74	37	ug/Kg	☼	07/18/14 17:04	1
Naphthalene	74	U	370	74	35	ug/Kg	☼	07/18/14 17:04	1

Client Sample ID: CW-SB-2
Date Collected: 07/15/14 10:30
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-5
Matrix: Solid
Percent Solids: 82.1

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
2-Nitroaniline	74	U	1800	74	56	ug/Kg	☼	07/18/14 17:04	1
3-Nitroaniline	150	U	1800	150	82	ug/Kg	☼	07/18/14 17:04	1
4-Nitroaniline	150	U	1800	150	81	ug/Kg	☼	07/18/14 17:04	1
Nitrobenzene	37	U	370	37	25	ug/Kg	☼	07/18/14 17:04	1
2-Nitrophenol	74	U	370	74	11	ug/Kg	☼	07/18/14 17:04	1
4-Nitrophenol	370	U	1800	370	110	ug/Kg	☼	07/18/14 17:04	1
N-Nitrosodi-n-propylamine	74	U	370	74	35	ug/Kg	☼	07/18/14 17:04	1
N-Nitrosodiphenylamine	37	U	370	37	24	ug/Kg	☼	07/18/14 17:04	1
Pentachlorophenol	750	U	1800	750	370	ug/Kg	☼	07/18/14 17:04	1
Phenanthrene	37	U	370	37	19	ug/Kg	☼	07/18/14 17:04	1
Phenol	37	U	370	37	20	ug/Kg	☼	07/18/14 17:04	1
Pyrene	37	U	450	37	14	ug/Kg	☼	07/18/14 17:04	1
1,2,4-Trichlorobenzene	37	U	370	37	31	ug/Kg	☼	07/18/14 17:04	1
2,4,5-Trichlorophenol	150	U	370	150	11	ug/Kg	☼	07/18/14 17:04	1
2,4,6-Trichlorophenol	74	U	370	74	11	ug/Kg	☼	07/18/14 17:04	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*74*		*45 - 105*	*07/16/14 16:24*	*07/18/14 17:04*	*1*
2-Fluorophenol	*71*		*35 - 105*	*07/16/14 16:24*	*07/18/14 17:04*	*1*
Nitrobenzene-d5	*70*		*35 - 100*	*07/16/14 16:24*	*07/18/14 17:04*	*1*
Phenol-d5	*71*		*40 - 100*	*07/16/14 16:24*	*07/18/14 17:04*	*1*
Terphenyl-d14	*89*		*30 - 125*	*07/16/14 16:24*	*07/18/14 17:04*	*1*
2,4,6-Tribromophenol	*71*		*35 - 125*	*07/16/14 16:24*	*07/18/14 17:04*	*1*

Method: 8081B - Organochlorine Pesticides (GC)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Aldrin	0.53	U	2.0	0.53	0.29	ug/Kg	☼	07/22/14 23:11	1
alpha-BHC	0.53	U	2.0	0.53	0.25	ug/Kg	☼	07/22/14 23:11	1
alpha-Chlordane	0.53	U	2.0	0.53	0.37	ug/Kg	☼	07/22/14 23:11	1
beta-BHC	0.79	U	2.0	0.79	0.76	ug/Kg	☼	07/22/14 23:11	1
4,4'-DDD	0.79	U	2.0	0.79	0.63	ug/Kg	☼	07/22/14 23:11	1
4,4'-DDE	0.53	U	2.0	0.53	0.27	ug/Kg	☼	07/22/14 23:11	1
4,4'-DDT	0.79	U	2.3	0.79	0.68	ug/Kg	☼	07/22/14 23:11	1
delta-BHC	0.79	U	2.0	0.79	0.46	ug/Kg	☼	07/22/14 23:11	1
Dieldrin	0.53	U	2.0	0.53	0.24	ug/Kg	☼	07/22/14 23:11	1
Endosulfan I	0.53	U	2.0	0.53	0.20	ug/Kg	☼	07/22/14 23:11	1
Endosulfan II	0.53	U	2.0	0.53	0.33	ug/Kg	☼	07/22/14 23:11	1
Endosulfan sulfate	0.53	U	2.0	0.53	0.32	ug/Kg	☼	07/22/14 23:11	1
Endrin	0.53	U	2.0	0.53	0.35	ug/Kg	☼	07/22/14 23:11	1
Endrin aldehyde	0.53	U	2.0	0.53	0.20	ug/Kg	☼	07/22/14 23:11	1
Endrin ketone	0.79	U	2.0	0.79	0.56	ug/Kg	☼	07/22/14 23:11	1
gamma-BHC (Lindane)	0.79	U	2.0	0.79	0.53	ug/Kg	☼	07/22/14 23:11	1
gamma-Chlordane	0.79	U	2.0	0.79	0.31	ug/Kg	☼	07/22/14 23:11	1
Heptachlor	0.53	U	2.0	0.53	0.25	ug/Kg	☼	07/22/14 23:11	1
Heptachlor epoxide	0.79	U	2.0	0.79	0.49	ug/Kg	☼	07/22/14 23:11	1
Methoxychlor	0.79	U	3.8	0.79	0.52	ug/Kg	☼	07/22/14 23:11	1
Toxaphene	31	U	200	31	18	ug/Kg	☼	07/22/14 23:11	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
DCB Decachlorobiphenyl	*99*		*55 - 130*	*07/18/14 09:23*	*07/22/14 23:11*	*1*

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-SB-2
Date Collected: 07/15/14 10:30
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-5
Matrix: Solid
Percent Solids: 82.1

Method: 8081B - Organochlorine Pesticides (GC) (Continued)

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Tetrachloro-m-xylene	98		70 - 125	07/18/14 09:23	07/22/14 23:11	1

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-SB-1
Date Collected: 07/15/14 10:45
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-6
Matrix: Solid
Percent Solids: 92.3

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Acenaphthene	18	U	350	18	11	ug/Kg	☼	07/18/14 17:31	1
Acenaphthylene	35	U	350	35	18	ug/Kg	☼	07/18/14 17:31	1
Anthracene	35	U	350	35	18	ug/Kg	☼	07/18/14 17:31	1
Benzo[a]anthracene	35	U	350	35	21	ug/Kg	☼	07/18/14 17:31	1
Benzo[a]pyrene	35	U	350	35	21	ug/Kg	☼	07/18/14 17:31	1
Benzo[b]fluoranthene	35	U	350	35	28	ug/Kg	☼	07/18/14 17:31	1
Benzo[g,h,i]perylene	35	U	350	35	17	ug/Kg	☼	07/18/14 17:31	1
Benzoic acid	710	U	1700	710	350	ug/Kg	☼	07/18/14 17:31	1
Benzo[k]fluoranthene	71	U	350	71	43	ug/Kg	☼	07/18/14 17:31	1
Benzyl alcohol	35	U	350	35	11	ug/Kg	☼	07/18/14 17:31	1
Bis(2-chloroethoxy)methane	71	U	350	71	25	ug/Kg	☼	07/18/14 17:31	1
Bis(2-chloroethyl)ether	35	U	350	35	18	ug/Kg	☼	07/18/14 17:31	1
bis(chloroisopropyl) ether	35	U	350	35	25	ug/Kg	☼	07/18/14 17:31	1
Bis(2-ethylhexyl) phthalate	71	U	350	71	49	ug/Kg	☼	07/18/14 17:31	1
4-Bromophenyl phenyl ether	35	U	350	35	20	ug/Kg	☼	07/18/14 17:31	1
Butyl benzyl phthalate	71	U	350	71	46	ug/Kg	☼	07/18/14 17:31	1
4-Chloroaniline	140	U	350	140	88	ug/Kg	☼	07/18/14 17:31	1
4-Chloro-3-methylphenol	140	U	350	140	71	ug/Kg	☼	07/18/14 17:31	1
2-Chloronaphthalene	35	U	350	35	11	ug/Kg	☼	07/18/14 17:31	1
2-Chlorophenol	35	U	350	35	22	ug/Kg	☼	07/18/14 17:31	1
4-Chlorophenyl phenyl ether	71	U	350	71	22	ug/Kg	☼	07/18/14 17:31	1
Chrysene	35	U	350	35	29	ug/Kg	☼	07/18/14 17:31	1
Dibenz(a,h)anthracene	35	U	350	35	20	ug/Kg	☼	07/18/14 17:31	1
Dibenzofuran	35	U	350	35	21	ug/Kg	☼	07/18/14 17:31	1
1,2-Dichlorobenzene	35	U	350	35	24	ug/Kg	☼	07/18/14 17:31	1
1,3-Dichlorobenzene	35	U	350	35	13	ug/Kg	☼	07/18/14 17:31	1
1,4-Dichlorobenzene	35	U	350	35	15	ug/Kg	☼	07/18/14 17:31	1
3,3'-Dichlorobenzidine	350	U	1700	350	96	ug/Kg	☼	07/18/14 17:31	1
2,4-Dichlorophenol	71	U	350	71	11	ug/Kg	☼	07/18/14 17:31	1
Diethyl phthalate	35	U	710	35	28	ug/Kg	☼	07/18/14 17:31	1
2,4-Dimethylphenol	140	U	350	140	71	ug/Kg	☼	07/18/14 17:31	1
Dimethyl phthalate	35	U	350	35	25	ug/Kg	☼	07/18/14 17:31	1
Di-n-butyl phthalate	35	U	350	35	31	ug/Kg	☼	07/18/14 17:31	1
4,6-Dinitro-2-methylphenol	710	U	1700	710	350	ug/Kg	☼	07/18/14 17:31	1
2,4-Dinitrophenol	720	U	1700	720	360	ug/Kg	☼	07/18/14 17:31	1
2,4-Dinitrotoluene	140	U	350	140	71	ug/Kg	☼	07/18/14 17:31	1
2,6-Dinitrotoluene	71	U	350	71	30	ug/Kg	☼	07/18/14 17:31	1
Di-n-octyl phthalate	71	U	350	71	15	ug/Kg	☼	07/18/14 17:31	1
Fluoranthene	71	U	350	71	38	ug/Kg	☼	07/18/14 17:31	1
Fluorene	35	U	350	35	19	ug/Kg	☼	07/18/14 17:31	1
Hexachlorobenzene	71	U	350	71	31	ug/Kg	☼	07/18/14 17:31	1
Hexachlorobutadiene	71	U	350	71	11	ug/Kg	☼	07/18/14 17:31	1
Hexachloroethane	35	U	350	35	23	ug/Kg	☼	07/18/14 17:31	1
Indeno[1,2,3-cd]pyrene	35	U	350	35	24	ug/Kg	☼	07/18/14 17:31	1
Isophorone	35	U	350	35	18	ug/Kg	☼	07/18/14 17:31	1
2-Methylnaphthalene	35	U	350	35	20	ug/Kg	☼	07/18/14 17:31	1
2-Methylphenol	35	U	350	35	14	ug/Kg	☼	07/18/14 17:31	1
3 & 4 Methylphenol	71	U	350	71	35	ug/Kg	☼	07/18/14 17:31	1
Naphthalene	71	U	350	71	33	ug/Kg	☼	07/18/14 17:31	1

Client Sample ID: CW-SB-1
Date Collected: 07/15/14 10:45
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-6
Matrix: Solid
Percent Solids: 92.3

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
2-Nitroaniline	71	U	1700	71	53	ug/Kg	☼	07/18/14 17:31	1
3-Nitroaniline	140	U	1700	140	78	ug/Kg	☼	07/18/14 17:31	1
4-Nitroaniline	140	U	1700	140	78	ug/Kg	☼	07/18/14 17:31	1
Nitrobenzene	35	U	350	35	24	ug/Kg	☼	07/18/14 17:31	1
2-Nitrophenol	71	U	350	71	11	ug/Kg	☼	07/18/14 17:31	1
4-Nitrophenol	350	U	1700	350	100	ug/Kg	☼	07/18/14 17:31	1
N-Nitrosodi-n-propylamine	71	U	350	71	33	ug/Kg	☼	07/18/14 17:31	1
N-Nitrosodiphenylamine	35	U	350	35	22	ug/Kg	☼	07/18/14 17:31	1
Pentachlorophenol	720	U	1700	720	350	ug/Kg	☼	07/18/14 17:31	1
Phenanthrene	35	U	350	35	18	ug/Kg	☼	07/18/14 17:31	1
Phenol	35	U	350	35	19	ug/Kg	☼	07/18/14 17:31	1
Pyrene	35	U	430	35	13	ug/Kg	☼	07/18/14 17:31	1
1,2,4-Trichlorobenzene	35	U	350	35	30	ug/Kg	☼	07/18/14 17:31	1
2,4,5-Trichlorophenol	140	U	350	140	11	ug/Kg	☼	07/18/14 17:31	1
2,4,6-Trichlorophenol	71	U	350	71	11	ug/Kg	☼	07/18/14 17:31	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*80*		*45 - 105*	*07/16/14 16:24*	*07/18/14 17:31*	*1*
2-Fluorophenol	*76*		*35 - 105*	*07/16/14 16:24*	*07/18/14 17:31*	*1*
Nitrobenzene-d5	*72*		*35 - 100*	*07/16/14 16:24*	*07/18/14 17:31*	*1*
Phenol-d5	*76*		*40 - 100*	*07/16/14 16:24*	*07/18/14 17:31*	*1*
Terphenyl-d14	*89*		*30 - 125*	*07/16/14 16:24*	*07/18/14 17:31*	*1*
2,4,6-Tribromophenol	*72*		*35 - 125*	*07/16/14 16:24*	*07/18/14 17:31*	*1*

Method: 8081B - Organochlorine Pesticides (GC)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Aldrin	0.48	U	1.8	0.48	0.26	ug/Kg	☼	07/22/14 23:28	1
alpha-BHC	0.48	U	1.8	0.48	0.22	ug/Kg	☼	07/22/14 23:28	1
alpha-Chlordane	0.48	U	1.8	0.48	0.33	ug/Kg	☼	07/22/14 23:28	1
beta-BHC	0.71	U	1.8	0.71	0.69	ug/Kg	☼	07/22/14 23:28	1
4,4'-DDD	0.71	U	1.8	0.71	0.57	ug/Kg	☼	07/22/14 23:28	1
4,4'-DDE	0.48	U	1.8	0.48	0.25	ug/Kg	☼	07/22/14 23:28	1
4,4'-DDT	0.71	U	2.1	0.71	0.61	ug/Kg	☼	07/22/14 23:28	1
delta-BHC	0.71	U	1.8	0.71	0.42	ug/Kg	☼	07/22/14 23:28	1
Dieldrin	0.48	U	1.8	0.48	0.22	ug/Kg	☼	07/22/14 23:28	1
Endosulfan I	0.48	U	1.8	0.48	0.18	ug/Kg	☼	07/22/14 23:28	1
Endosulfan II	0.48	U	1.8	0.48	0.30	ug/Kg	☼	07/22/14 23:28	1
Endosulfan sulfate	0.48	U	1.8	0.48	0.29	ug/Kg	☼	07/22/14 23:28	1
Endrin	0.48	U	1.8	0.48	0.32	ug/Kg	☼	07/22/14 23:28	1
Endrin aldehyde	0.48	U	1.8	0.48	0.18	ug/Kg	☼	07/22/14 23:28	1
Endrin ketone	0.71	U	1.8	0.71	0.51	ug/Kg	☼	07/22/14 23:28	1
gamma-BHC (Lindane)	0.71	U	1.8	0.71	0.48	ug/Kg	☼	07/22/14 23:28	1
gamma-Chlordane	0.71	U	1.8	0.71	0.28	ug/Kg	☼	07/22/14 23:28	1
Heptachlor	0.48	U	1.8	0.48	0.22	ug/Kg	☼	07/22/14 23:28	1
Heptachlor epoxide	0.71	U	1.8	0.71	0.44	ug/Kg	☼	07/22/14 23:28	1
Methoxychlor	0.71	U	3.4	0.71	0.47	ug/Kg	☼	07/22/14 23:28	1
Toxaphene	28	U	180	28	16	ug/Kg	☼	07/22/14 23:28	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
DCB Decachlorobiphenyl	*88*		*55 - 130*	*07/18/14 09:23*	*07/22/14 23:28*	*1*

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-SB-1
Date Collected: 07/15/14 10:45
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-6
Matrix: Solid
Percent Solids: 92.3

Method: 8081B - Organochlorine Pesticides (GC) (Continued)

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Tetrachloro-m-xylene	90		70 - 125	07/18/14 09:23	07/22/14 23:28	1

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-SB-6
Date Collected: 07/15/14 11:00
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-7
Matrix: Solid
Percent Solids: 78.3

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Acenaphthene	21	U	410	21	13	ug/Kg	☼	07/18/14 17:57	1
Acenaphthylene	41	U	410	41	21	ug/Kg	☼	07/18/14 17:57	1
Anthracene	41	U	410	41	21	ug/Kg	☼	07/18/14 17:57	1
Benzo[a]anthracene	41	U	410	41	25	ug/Kg	☼	07/18/14 17:57	1
Benzo[a]pyrene	41	U	410	41	25	ug/Kg	☼	07/18/14 17:57	1
Benzo[b]fluoranthene	41	U	410	41	32	ug/Kg	☼	07/18/14 17:57	1
Benzo[g,h,i]perylene	41	U	410	41	20	ug/Kg	☼	07/18/14 17:57	1
Benzoic acid	820	U	2000	820	410	ug/Kg	☼	07/18/14 17:57	1
Benzo[k]fluoranthene	82	U	410	82	49	ug/Kg	☼	07/18/14 17:57	1
Benzyl alcohol	41	U	410	41	12	ug/Kg	☼	07/18/14 17:57	1
Bis(2-chloroethoxy)methane	82	U	410	82	28	ug/Kg	☼	07/18/14 17:57	1
Bis(2-chloroethyl)ether	41	U	410	41	21	ug/Kg	☼	07/18/14 17:57	1
bis(chloroisopropyl) ether	41	U	410	41	28	ug/Kg	☼	07/18/14 17:57	1
Bis(2-ethylhexyl) phthalate	82	U	410	82	57	ug/Kg	☼	07/18/14 17:57	1
4-Bromophenyl phenyl ether	41	U	410	41	23	ug/Kg	☼	07/18/14 17:57	1
Butyl benzyl phthalate	82	U	410	82	53	ug/Kg	☼	07/18/14 17:57	1
4-Chloroaniline	160	U	410	160	100	ug/Kg	☼	07/18/14 17:57	1
4-Chloro-3-methylphenol	160	U	410	160	82	ug/Kg	☼	07/18/14 17:57	1
2-Chloronaphthalene	41	U	410	41	12	ug/Kg	☼	07/18/14 17:57	1
2-Chlorophenol	41	U	410	41	26	ug/Kg	☼	07/18/14 17:57	1
4-Chlorophenyl phenyl ether	82	U	410	82	26	ug/Kg	☼	07/18/14 17:57	1
Chrysene	41	U	410	41	33	ug/Kg	☼	07/18/14 17:57	1
Dibenz(a,h)anthracene	41	U	410	41	23	ug/Kg	☼	07/18/14 17:57	1
Dibenzofuran	41	U	410	41	25	ug/Kg	☼	07/18/14 17:57	1
1,2-Dichlorobenzene	41	U	410	41	27	ug/Kg	☼	07/18/14 17:57	1
1,3-Dichlorobenzene	41	U	410	41	15	ug/Kg	☼	07/18/14 17:57	1
1,4-Dichlorobenzene	41	U	410	41	17	ug/Kg	☼	07/18/14 17:57	1
3,3'-Dichlorobenzidine	410	U	2000	410	110	ug/Kg	☼	07/18/14 17:57	1
2,4-Dichlorophenol	82	U	410	82	12	ug/Kg	☼	07/18/14 17:57	1
Diethyl phthalate	41	U	820	41	32	ug/Kg	☼	07/18/14 17:57	1
2,4-Dimethylphenol	160	U	410	160	82	ug/Kg	☼	07/18/14 17:57	1
Dimethyl phthalate	41	U	410	41	28	ug/Kg	☼	07/18/14 17:57	1
Di-n-butyl phthalate	41	U	410	41	36	ug/Kg	☼	07/18/14 17:57	1
4,6-Dinitro-2-methylphenol	820	U	2000	820	410	ug/Kg	☼	07/18/14 17:57	1
2,4-Dinitrophenol	830	U	2000	830	410	ug/Kg	☼	07/18/14 17:57	1
2,4-Dinitrotoluene	160	U	410	160	82	ug/Kg	☼	07/18/14 17:57	1
2,6-Dinitrotoluene	82	U	410	82	35	ug/Kg	☼	07/18/14 17:57	1
Di-n-octyl phthalate	82	U	410	82	18	ug/Kg	☼	07/18/14 17:57	1
Fluoranthene	82	U	410	82	44	ug/Kg	☼	07/18/14 17:57	1
Fluorene	41	U	410	41	22	ug/Kg	☼	07/18/14 17:57	1
Hexachlorobenzene	82	U	410	82	36	ug/Kg	☼	07/18/14 17:57	1
Hexachlorobutadiene	82	U	410	82	12	ug/Kg	☼	07/18/14 17:57	1
Hexachloroethane	41	U	410	41	26	ug/Kg	☼	07/18/14 17:57	1
Indeno[1,2,3-cd]pyrene	41	U	410	41	27	ug/Kg	☼	07/18/14 17:57	1
Isophorone	41	U	410	41	21	ug/Kg	☼	07/18/14 17:57	1
2-Methylnaphthalene	41	U	410	41	23	ug/Kg	☼	07/18/14 17:57	1
2-Methylphenol	41	U	410	41	16	ug/Kg	☼	07/18/14 17:57	1
3 & 4 Methylphenol	82	U	410	82	41	ug/Kg	☼	07/18/14 17:57	1
Naphthalene	82	U	410	82	38	ug/Kg	☼	07/18/14 17:57	1

Client Sample ID: CW-SB-6
Date Collected: 07/15/14 11:00
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-7
Matrix: Solid
Percent Solids: 78.3

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
2-Nitroaniline	82	U	2000	82	62	ug/Kg	☼	07/18/14 17:57	1
3-Nitroaniline	160	U	2000	160	90	ug/Kg	☼	07/18/14 17:57	1
4-Nitroaniline	160	U	2000	160	90	ug/Kg	☼	07/18/14 17:57	1
Nitrobenzene	41	U	410	41	27	ug/Kg	☼	07/18/14 17:57	1
2-Nitrophenol	82	U	410	82	12	ug/Kg	☼	07/18/14 17:57	1
4-Nitrophenol	410	U	2000	410	120	ug/Kg	☼	07/18/14 17:57	1
N-Nitrosodi-n-propylamine	82	U	410	82	38	ug/Kg	☼	07/18/14 17:57	1
N-Nitrosodiphenylamine	41	U	410	41	26	ug/Kg	☼	07/18/14 17:57	1
Pentachlorophenol	830	U	2000	830	410	ug/Kg	☼	07/18/14 17:57	1
Phenanthrene	41	U	410	41	21	ug/Kg	☼	07/18/14 17:57	1
Phenol	41	U	410	41	22	ug/Kg	☼	07/18/14 17:57	1
Pyrene	41	U	490	41	15	ug/Kg	☼	07/18/14 17:57	1
1,2,4-Trichlorobenzene	41	U	410	41	35	ug/Kg	☼	07/18/14 17:57	1
2,4,5-Trichlorophenol	160	U	410	160	12	ug/Kg	☼	07/18/14 17:57	1
2,4,6-Trichlorophenol	82	U	410	82	12	ug/Kg	☼	07/18/14 17:57	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*83*		*45 - 105*	*07/16/14 16:24*	*07/18/14 17:57*	*1*
2-Fluorophenol	*74*		*35 - 105*	*07/16/14 16:24*	*07/18/14 17:57*	*1*
Nitrobenzene-d5	*71*		*35 - 100*	*07/16/14 16:24*	*07/18/14 17:57*	*1*
Phenol-d5	*77*		*40 - 100*	*07/16/14 16:24*	*07/18/14 17:57*	*1*
Terphenyl-d14	*93*		*30 - 125*	*07/16/14 16:24*	*07/18/14 17:57*	*1*
2,4,6-Tribromophenol	*79*		*35 - 125*	*07/16/14 16:24*	*07/18/14 17:57*	*1*

Method: 8081B - Organochlorine Pesticides (GC)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Aldrin	0.55	U	2.0	0.55	0.30	ug/Kg	☼	07/23/14 00:20	1
alpha-BHC	0.55	U	2.0	0.55	0.26	ug/Kg	☼	07/23/14 00:20	1
alpha-Chlordane	0.55	U	2.0	0.55	0.39	ug/Kg	☼	07/23/14 00:20	1
beta-BHC	0.83	U	2.0	0.83	0.80	ug/Kg	☼	07/23/14 00:20	1
4,4'-DDD	0.83	U	2.0	0.83	0.66	ug/Kg	☼	07/23/14 00:20	1
4,4'-DDE	0.55	U	2.0	0.55	0.29	ug/Kg	☼	07/23/14 00:20	1
4,4'-DDT	0.83	U	2.4	0.83	0.71	ug/Kg	☼	07/23/14 00:20	1
delta-BHC	0.83	U	2.0	0.83	0.48	ug/Kg	☼	07/23/14 00:20	1
Dieldrin	0.55	U	2.0	0.55	0.25	ug/Kg	☼	07/23/14 00:20	1
Endosulfan I	0.55	U	2.0	0.55	0.21	ug/Kg	☼	07/23/14 00:20	1
Endosulfan II	0.55	U	2.0	0.55	0.34	ug/Kg	☼	07/23/14 00:20	1
Endosulfan sulfate	0.55	U	2.0	0.55	0.33	ug/Kg	☼	07/23/14 00:20	1
Endrin	0.55	U	2.0	0.55	0.37	ug/Kg	☼	07/23/14 00:20	1
Endrin aldehyde	0.55	U	2.0	0.55	0.21	ug/Kg	☼	07/23/14 00:20	1
Endrin ketone	0.83	U	2.0	0.83	0.59	ug/Kg	☼	07/23/14 00:20	1
gamma-BHC (Lindane)	0.83	U	2.0	0.83	0.56	ug/Kg	☼	07/23/14 00:20	1
gamma-Chlordane	0.83	U	2.0	0.83	0.32	ug/Kg	☼	07/23/14 00:20	1
Heptachlor	0.55	U	2.0	0.55	0.26	ug/Kg	☼	07/23/14 00:20	1
Heptachlor epoxide	0.83	U	2.0	0.83	0.51	ug/Kg	☼	07/23/14 00:20	1
Methoxychlor	0.83	U	4.0	0.83	0.54	ug/Kg	☼	07/23/14 00:20	1
Toxaphene	32	U	200	32	19	ug/Kg	☼	07/23/14 00:20	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
DCB Decachlorobiphenyl	*115*		*55 - 130*	*07/18/14 09:23*	*07/23/14 00:20*	*1*

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-SB-6
Date Collected: 07/15/14 11:00
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-7
Matrix: Solid
Percent Solids: 78.3

Method: 8081B - Organochlorine Pesticides (GC) (Continued)

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Tetrachloro-m-xylene	78		70 - 125	07/18/14 09:23	07/23/14 00:20	1

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-SB-5
Date Collected: 07/15/14 11:15
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-8
Matrix: Solid
Percent Solids: 87.0

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Acenaphthene	19	U	380	19	12	ug/Kg	☼	07/18/14 18:24	1
Acenaphthylene	38	U	380	38	19	ug/Kg	☼	07/18/14 18:24	1
Anthracene	38	U	380	38	19	ug/Kg	☼	07/18/14 18:24	1
Benzo[a]anthracene	38	U	380	38	23	ug/Kg	☼	07/18/14 18:24	1
Benzo[a]pyrene	38	U	380	38	23	ug/Kg	☼	07/18/14 18:24	1
Benzo[b]fluoranthene	38	U	380	38	30	ug/Kg	☼	07/18/14 18:24	1
Benzo[g,h,i]perylene	38	U	380	38	18	ug/Kg	☼	07/18/14 18:24	1
Benzoic acid	750	U	1800	750	380	ug/Kg	☼	07/18/14 18:24	1
Benzo[k]fluoranthene	75	U	380	75	46	ug/Kg	☼	07/18/14 18:24	1
Benzyl alcohol	38	U	380	38	11	ug/Kg	☼	07/18/14 18:24	1
Bis(2-chloroethoxy)methane	75	U	380	75	26	ug/Kg	☼	07/18/14 18:24	1
Bis(2-chloroethyl)ether	38	U	380	38	19	ug/Kg	☼	07/18/14 18:24	1
bis(chloroisopropyl) ether	38	U	380	38	26	ug/Kg	☼	07/18/14 18:24	1
Bis(2-ethylhexyl) phthalate	75	U	380	75	53	ug/Kg	☼	07/18/14 18:24	1
4-Bromophenyl phenyl ether	38	U	380	38	22	ug/Kg	☼	07/18/14 18:24	1
Butyl benzyl phthalate	75	U	380	75	49	ug/Kg	☼	07/18/14 18:24	1
4-Chloroaniline	150	U	380	150	94	ug/Kg	☼	07/18/14 18:24	1
4-Chloro-3-methylphenol	150	U	380	150	75	ug/Kg	☼	07/18/14 18:24	1
2-Chloronaphthalene	38	U	380	38	11	ug/Kg	☼	07/18/14 18:24	1
2-Chlorophenol	38	U	380	38	24	ug/Kg	☼	07/18/14 18:24	1
4-Chlorophenyl phenyl ether	75	U	380	75	24	ug/Kg	☼	07/18/14 18:24	1
Chrysene	38	U	380	38	31	ug/Kg	☼	07/18/14 18:24	1
Dibenz(a,h)anthracene	38	U	380	38	22	ug/Kg	☼	07/18/14 18:24	1
Dibenzofuran	38	U	380	38	23	ug/Kg	☼	07/18/14 18:24	1
1,2-Dichlorobenzene	38	U	380	38	25	ug/Kg	☼	07/18/14 18:24	1
1,3-Dichlorobenzene	38	U	380	38	14	ug/Kg	☼	07/18/14 18:24	1
1,4-Dichlorobenzene	38	U	380	38	16	ug/Kg	☼	07/18/14 18:24	1
3,3'-Dichlorobenzidine	380	U	1800	380	100	ug/Kg	☼	07/18/14 18:24	1
2,4-Dichlorophenol	75	U	380	75	11	ug/Kg	☼	07/18/14 18:24	1
Diethyl phthalate	38	U	750	38	30	ug/Kg	☼	07/18/14 18:24	1
2,4-Dimethylphenol	150	U	380	150	75	ug/Kg	☼	07/18/14 18:24	1
Dimethyl phthalate	38	U	380	38	26	ug/Kg	☼	07/18/14 18:24	1
Di-n-butyl phthalate	38	U	380	38	33	ug/Kg	☼	07/18/14 18:24	1
4,6-Dinitro-2-methylphenol	750	U	1800	750	380	ug/Kg	☼	07/18/14 18:24	1
2,4-Dinitrophenol	770	U	1800	770	380	ug/Kg	☼	07/18/14 18:24	1
2,4-Dinitrotoluene	150	U	380	150	75	ug/Kg	☼	07/18/14 18:24	1
2,6-Dinitrotoluene	75	U	380	75	32	ug/Kg	☼	07/18/14 18:24	1
Di-n-octyl phthalate	75	U	380	75	16	ug/Kg	☼	07/18/14 18:24	1
Fluoranthene	75	U	380	75	41	ug/Kg	☼	07/18/14 18:24	1
Fluorene	38	U	380	38	21	ug/Kg	☼	07/18/14 18:24	1
Hexachlorobenzene	75	U	380	75	33	ug/Kg	☼	07/18/14 18:24	1
Hexachlorobutadiene	75	U	380	75	11	ug/Kg	☼	07/18/14 18:24	1
Hexachloroethane	38	U	380	38	24	ug/Kg	☼	07/18/14 18:24	1
Indeno[1,2,3-cd]pyrene	38	U	380	38	25	ug/Kg	☼	07/18/14 18:24	1
Isophorone	38	U	380	38	19	ug/Kg	☼	07/18/14 18:24	1
2-Methylnaphthalene	38	U	380	38	22	ug/Kg	☼	07/18/14 18:24	1
2-Methylphenol	38	U	380	38	15	ug/Kg	☼	07/18/14 18:24	1
3 & 4 Methylphenol	75	U	380	75	38	ug/Kg	☼	07/18/14 18:24	1
Naphthalene	75	U	380	75	35	ug/Kg	☼	07/18/14 18:24	1

Client Sample ID: CW-SB-5
Date Collected: 07/15/14 11:15
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-8
Matrix: Solid
Percent Solids: 87.0

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
2-Nitroaniline	75	U	1800	75	57	ug/Kg	☼	07/18/14 18:24	1
3-Nitroaniline	150	U	1800	150	83	ug/Kg	☼	07/18/14 18:24	1
4-Nitroaniline	150	U	1800	150	83	ug/Kg	☼	07/18/14 18:24	1
Nitrobenzene	38	U	380	38	25	ug/Kg	☼	07/18/14 18:24	1
2-Nitrophenol	75	U	380	75	11	ug/Kg	☼	07/18/14 18:24	1
4-Nitrophenol	380	U	1800	380	110	ug/Kg	☼	07/18/14 18:24	1
N-Nitrosodi-n-propylamine	75	U	380	75	35	ug/Kg	☼	07/18/14 18:24	1
N-Nitrosodiphenylamine	38	U	380	38	24	ug/Kg	☼	07/18/14 18:24	1
Pentachlorophenol	770	U	1800	770	380	ug/Kg	☼	07/18/14 18:24	1
Phenanthrene	38	U	380	38	19	ug/Kg	☼	07/18/14 18:24	1
Phenol	38	U	380	38	21	ug/Kg	☼	07/18/14 18:24	1
Pyrene	38	U	460	38	14	ug/Kg	☼	07/18/14 18:24	1
1,2,4-Trichlorobenzene	38	U	380	38	32	ug/Kg	☼	07/18/14 18:24	1
2,4,5-Trichlorophenol	150	U	380	150	11	ug/Kg	☼	07/18/14 18:24	1
2,4,6-Trichlorophenol	75	U	380	75	11	ug/Kg	☼	07/18/14 18:24	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*73*		*45 - 105*	*07/16/14 16:24*	*07/18/14 18:24*	*1*
2-Fluorophenol	*71*		*35 - 105*	*07/16/14 16:24*	*07/18/14 18:24*	*1*
Nitrobenzene-d5	*67*		*35 - 100*	*07/16/14 16:24*	*07/18/14 18:24*	*1*
Phenol-d5	*72*		*40 - 100*	*07/16/14 16:24*	*07/18/14 18:24*	*1*
Terphenyl-d14	*90*		*30 - 125*	*07/16/14 16:24*	*07/18/14 18:24*	*1*
2,4,6-Tribromophenol	*72*		*35 - 125*	*07/16/14 16:24*	*07/18/14 18:24*	*1*

Method: 8081B - Organochlorine Pesticides (GC)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Aldrin	0.51	U	1.9	0.51	0.28	ug/Kg	☼	07/23/14 00:37	1
alpha-BHC	0.51	U	1.9	0.51	0.24	ug/Kg	☼	07/23/14 00:37	1
alpha-Chlordane	0.51	U	1.9	0.51	0.36	ug/Kg	☼	07/23/14 00:37	1
beta-BHC	0.77	U	1.9	0.77	0.74	ug/Kg	☼	07/23/14 00:37	1
4,4'-DDD	0.77	U	1.9	0.77	0.61	ug/Kg	☼	07/23/14 00:37	1
4,4'-DDE	0.51	U	1.9	0.51	0.26	ug/Kg	☼	07/23/14 00:37	1
4,4'-DDT	0.77	U	2.2	0.77	0.66	ug/Kg	☼	07/23/14 00:37	1
delta-BHC	0.77	U	1.9	0.77	0.45	ug/Kg	☼	07/23/14 00:37	1
Dieldrin	0.51	U	1.9	0.51	0.23	ug/Kg	☼	07/23/14 00:37	1
Endosulfan I	0.51	U	1.9	0.51	0.20	ug/Kg	☼	07/23/14 00:37	1
Endosulfan II	0.51	U	1.9	0.51	0.32	ug/Kg	☼	07/23/14 00:37	1
Endosulfan sulfate	0.51	U	1.9	0.51	0.31	ug/Kg	☼	07/23/14 00:37	1
Endrin	0.51	U	1.9	0.51	0.34	ug/Kg	☼	07/23/14 00:37	1
Endrin aldehyde	0.51	U	1.9	0.51	0.19	ug/Kg	☼	07/23/14 00:37	1
Endrin ketone	0.77	U	1.9	0.77	0.54	ug/Kg	☼	07/23/14 00:37	1
gamma-BHC (Lindane)	0.77	U	1.9	0.77	0.52	ug/Kg	☼	07/23/14 00:37	1
gamma-Chlordane	0.77	U	1.9	0.77	0.30	ug/Kg	☼	07/23/14 00:37	1
Heptachlor	0.51	U	1.9	0.51	0.24	ug/Kg	☼	07/23/14 00:37	1
Heptachlor epoxide	0.77	U	1.9	0.77	0.47	ug/Kg	☼	07/23/14 00:37	1
Methoxychlor	0.77	U	3.7	0.77	0.50	ug/Kg	☼	07/23/14 00:37	1
Toxaphene	30	U	190	30	18	ug/Kg	☼	07/23/14 00:37	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
DCB Decachlorobiphenyl	*87*		*55 - 130*	*07/18/14 09:23*	*07/23/14 00:37*	*1*

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-SB-5
Date Collected: 07/15/14 11:15
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-8
Matrix: Solid
Percent Solids: 87.0

Method: 8081B - Organochlorine Pesticides (GC) (Continued)

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Tetrachloro-m-xylene	90		70 - 125	07/18/14 09:23	07/23/14 00:37	1

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-DUP
Date Collected: 07/15/14 12:00
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-9
Matrix: Water

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Acenaphthene	0.95	U Q	9.5	0.95	0.27	ug/L		07/24/14 00:59	1
Acenaphthylene	0.95	U Q	9.5	0.95	0.47	ug/L		07/24/14 00:59	1
Anthracene	0.95	U Q	9.5	0.95	0.40	ug/L		07/24/14 00:59	1
Benzo[a]anthracene	0.95	U Q	9.5	0.95	0.33	ug/L		07/24/14 00:59	1
Benzo[a]pyrene	0.95	U Q	9.5	0.95	0.30	ug/L		07/24/14 00:59	1
Benzo[b]fluoranthene	0.95	U Q	9.5	0.95	0.51	ug/L		07/24/14 00:59	1
Benzo[g,h,i]perylene	0.95	U Q	9.5	0.95	0.48	ug/L		07/24/14 00:59	1
Benzoic acid	48	U	76	48	9.5	ug/L		07/24/14 00:59	1
Benzo[k]fluoranthene	0.95	U Q	9.5	0.95	0.44	ug/L		07/24/14 00:59	1
Benzyl alcohol	**0.62**	**J**	24	0.95	0.22	ug/L		07/24/14 00:59	1
Bis(2-chloroethoxy)methane	3.8	U	9.5	3.8	0.93	ug/L		07/24/14 00:59	1
Bis(2-chloroethyl)ether	0.95	U	19	0.95	0.39	ug/L		07/24/14 00:59	1
bis(chloroisopropyl) ether	0.95	U	9.5	0.95	0.27	ug/L		07/24/14 00:59	1
Bis(2-ethylhexyl) phthalate	0.95	U	9.5	0.95	0.53	ug/L		07/24/14 00:59	1
4-Bromophenyl phenyl ether	0.95	U	9.5	0.95	0.41	ug/L		07/24/14 00:59	1
Butyl benzyl phthalate	3.8	U	19	3.8	0.95	ug/L		07/24/14 00:59	1
4-Chloroaniline	4.8	U	24	4.8	2.0	ug/L		07/24/14 00:59	1
4-Chloro-3-methylphenol	4.8	U	19	4.8	2.3	ug/L		07/24/14 00:59	1
2-Chloronaphthalene	0.95	U	9.5	0.95	0.25	ug/L		07/24/14 00:59	1
2-Chlorophenol	3.8	U	9.5	3.8	1.9	ug/L		07/24/14 00:59	1
4-Chlorophenyl phenyl ether	3.8	U	9.5	3.8	1.6	ug/L		07/24/14 00:59	1
Chrysene	0.95	U Q	9.5	0.95	0.52	ug/L		07/24/14 00:59	1
Dibenz(a,h)anthracene	0.95	U	9.5	0.95	0.49	ug/L		07/24/14 00:59	1
Dibenzofuran	0.95	U	9.5	0.95	0.28	ug/L		07/24/14 00:59	1
1,2-Dichlorobenzene	0.95	U	9.5	0.95	0.22	ug/L		07/24/14 00:59	1
1,3-Dichlorobenzene	0.95	U	9.5	0.95	0.29	ug/L		07/24/14 00:59	1
1,4-Dichlorobenzene	0.95	U	9.5	0.95	0.31	ug/L		07/24/14 00:59	1
3,3'-Dichlorobenzidine	9.5	U	48	9.5	1.9	ug/L		07/24/14 00:59	1
2,4-Dichlorophenol	1.9	U	9.5	1.9	0.61	ug/L		07/24/14 00:59	1
Diethyl phthalate	0.95	U	19	0.95	0.36	ug/L		07/24/14 00:59	1
2,4-Dimethylphenol	3.8	U	9.5	3.8	0.55	ug/L		07/24/14 00:59	1
Dimethyl phthalate	0.95	U	19	0.95	0.20	ug/L		07/24/14 00:59	1
Di-n-butyl phthalate	3.8	U	19	3.8	1.1	ug/L		07/24/14 00:59	1
4,6-Dinitro-2-methylphenol	9.5	U	76	9.5	3.8	ug/L		07/24/14 00:59	1
2,4-Dinitrophenol	19	U	76	19	9.5	ug/L		07/24/14 00:59	1
2,4-Dinitrotoluene	3.8	U	19	3.8	1.6	ug/L		07/24/14 00:59	1
2,6-Dinitrotoluene	3.8	U	19	3.8	1.8	ug/L		07/24/14 00:59	1
Di-n-octyl phthalate	0.95	U	19	0.95	0.33	ug/L		07/24/14 00:59	1
Fluoranthene	0.95	U Q	19	0.95	0.19	ug/L		07/24/14 00:59	1
Fluorene	0.95	U Q	9.5	0.95	0.30	ug/L		07/24/14 00:59	1
Hexachlorobenzene	0.95	U	9.5	0.95	0.63	ug/L		07/24/14 00:59	1
Hexachlorobutadiene	9.5	U	29	9.5	3.2	ug/L		07/24/14 00:59	1
Hexachloroethane	3.8	U	9.5	3.8	2.0	ug/L		07/24/14 00:59	1
Indeno[1,2,3-cd]pyrene	0.95	U Q	9.5	0.95	0.62	ug/L		07/24/14 00:59	1
Isophorone	0.95	U	9.5	0.95	0.20	ug/L		07/24/14 00:59	1
2-Methylnaphthalene	0.95	U	9.5	0.95	0.28	ug/L		07/24/14 00:59	1
2-Methylphenol	3.8	U	9.5	3.8	0.94	ug/L		07/24/14 00:59	1
3 & 4 Methylphenol	0.95	U	19	0.95	0.24	ug/L		07/24/14 00:59	1
Naphthalene	0.95	U Q	9.5	0.95	0.28	ug/L		07/24/14 00:59	1

Client Sample ID: CW-DUP
Date Collected: 07/15/14 12:00
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-9
Matrix: Water

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
2-Nitroaniline	3.8	U	48	3.8	1.7	ug/L		07/24/14 00:59	1
3-Nitroaniline	1.9	U	48	1.9	1.9	ug/L		07/24/14 00:59	1
4-Nitroaniline	3.8	U	48	3.8	1.9	ug/L		07/24/14 00:59	1
Nitrobenzene	1.9	U	19	1.9	0.77	ug/L		07/24/14 00:59	1
2-Nitrophenol	0.95	U	19	0.95	0.37	ug/L		07/24/14 00:59	1
4-Nitrophenol	9.5	U	48	9.5	1.2	ug/L		07/24/14 00:59	1
N-Nitrosodi-n-propylamine	0.95	U	19	0.95	0.33	ug/L		07/24/14 00:59	1
N-Nitrosodiphenylamine	0.95	U	9.5	0.95	0.42	ug/L		07/24/14 00:59	1
Pentachlorophenol	38	U	76	38	19	ug/L		07/24/14 00:59	1
Phenanthrene	0.95	U Q	9.5	0.95	0.25	ug/L		07/24/14 00:59	1
Phenol	4.8	U	9.5	4.8	1.9	ug/L		07/24/14 00:59	1
Pyrene	0.95	U Q	9.5	0.95	0.35	ug/L		07/24/14 00:59	1
1,2,4-Trichlorobenzene	0.95	U	9.5	0.95	0.27	ug/L		07/24/14 00:59	1
2,4,5-Trichlorophenol	0.95	U	19	0.95	0.43	ug/L		07/24/14 00:59	1
2,4,6-Trichlorophenol	0.95	U	19	0.95	0.28	ug/L		07/24/14 00:59	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*87*		*50 - 110*	*07/16/14 15:49*	*07/24/14 00:59*	*1*
2-Fluorophenol	*93*		*20 - 110*	*07/16/14 15:49*	*07/24/14 00:59*	*1*
Nitrobenzene-d5	*94*		*40 - 110*	*07/16/14 15:49*	*07/24/14 00:59*	*1*
Phenol-d5	*97*		*10 - 115*	*07/16/14 15:49*	*07/24/14 00:59*	*1*
Terphenyl-d14	*49*	*Q*	*50 - 135*	*07/16/14 15:49*	*07/24/14 00:59*	*1*
2,4,6-Tribromophenol	*96*		*40 - 125*	*07/16/14 15:49*	*07/24/14 00:59*	*1*

Method: 8081B - Organochlorine Pesticides (GC)

Analyte	Result	Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Aldrin	0.019	U	0.048	0.019	0.0057	ug/L		07/22/14 19:24	1
alpha-BHC	0.019	U	0.048	0.019	0.0051	ug/L		07/22/14 19:24	1
alpha-Chlordane	0.019	U	0.048	0.019	0.0051	ug/L		07/22/14 19:24	1
beta-BHC	0.019	U	0.048	0.019	0.0084	ug/L		07/22/14 19:24	1
4,4'-DDD	0.019	U	0.048	0.019	0.0074	ug/L		07/22/14 19:24	1
4,4'-DDE	0.019	U	0.048	0.019	0.0072	ug/L		07/22/14 19:24	1
4,4'-DDT	0.019	U	0.048	0.019	0.014	ug/L		07/22/14 19:24	1
delta-BHC	0.019	U Q	0.048	0.019	0.0056	ug/L		07/22/14 19:24	1
Dieldrin	0.019	U	0.048	0.019	0.0061	ug/L		07/22/14 19:24	1
Endosulfan I	0.019	U	0.048	0.019	0.0056	ug/L		07/22/14 19:24	1
Endosulfan II	0.019	U	0.048	0.019	0.0068	ug/L		07/22/14 19:24	1
Endosulfan sulfate	0.019	U	0.048	0.019	0.0055	ug/L		07/22/14 19:24	1
Endrin	0.019	U	0.048	0.019	0.0076	ug/L		07/22/14 19:24	1
Endrin aldehyde	0.019	U	0.048	0.019	0.0085	ug/L		07/22/14 19:24	1
Endrin ketone	0.019	U	0.048	0.019	0.0068	ug/L		07/22/14 19:24	1
gamma-BHC (Lindane)	0.019	U	0.048	0.019	0.0067	ug/L		07/22/14 19:24	1
gamma-Chlordane	0.019	U Q	0.048	0.019	0.0088	ug/L		07/22/14 19:24	1
Heptachlor	0.019	U	0.048	0.019	0.0074	ug/L		07/22/14 19:24	1
Heptachlor epoxide	0.019	U	0.048	0.019	0.0072	ug/L		07/22/14 19:24	1
Methoxychlor	0.019	U	0.048	0.019	0.013	ug/L		07/22/14 19:24	1
Toxaphene	0.77	U	4.8	0.77	0.35	ug/L		07/22/14 19:24	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
DCB Decachlorobiphenyl	*46*		*30 - 135*	*07/16/14 20:48*	*07/22/14 19:24*	*1*

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-DUP
Date Collected: 07/15/14 12:00
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-9
Matrix: Water

Method: 8081B - Organochlorine Pesticides (GC) (Continued)

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Tetrachloro-m-xylene	82		25 - 140	07/16/14 20:48	07/22/14 19:24	1

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Matrix: Solid — **Prep Type: Total/NA**

		Percent Surrogate Recovery (Acceptance Limits)					
		FBP	2FP	NBZ	PHL	TPH	TBP
Lab Sample ID	Client Sample ID	(45-105)	(35-105)	(35-100)	(40-100)	(30-125)	(35-125)
680-103315-3	CW-SB-4	75	73	69	74	90	74
680-103315-3 MS	CW-SB-4	79	73	73	73	86	76
680-103315-3 MSD	CW-SB-4	74	70	68	70	86	75
680-103315-4	CW-SB-3	78	74	71	75	91	76
680-103315-5	CW-SB-2	74	71	70	71	89	71
680-103315-6	CW-SB-1	80	76	72	76	89	72
680-103315-7	CW-SB-6	83	74	71	77	93	79
680-103315-8	CW-SB-5	73	71	67	72	90	72
LCS 280-234633/2-A	Lab Control Sample	85	79	78	77	97	86
MB 280-234633/1-A	Method Blank	79	76	74	75	93	74

Surrogate Legend

FBP = 2-Fluorobiphenyl
2FP = 2-Fluorophenol
NBZ = Nitrobenzene-d5
PHL = Phenol-d5
TPH = Terphenyl-d14
TBP = 2,4,6-Tribromophenol

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Matrix: Water — **Prep Type: Total/NA**

		Percent Surrogate Recovery (Acceptance Limits)					
		FBP	2FP	NBZ	PHL	TPH	TBP
Lab Sample ID	Client Sample ID	(50-110)	(20-110)	(40-110)	(10-115)	(50-135)	(40-125)
680-103315-1	CW-1-GW	81	85	84	87	92	80
680-103315-2	CW-2-GW	85	90	88	93	52	94
680-103315-9	CW-DUP	87	93	94	97	49 Q	96
LCS 280-234608/2-A	Lab Control Sample	85	83	83	86	89	92
LCS 280-234982/2-A	Lab Control Sample	84	86	87	87	89	92
LCSD 280-234608/3-A	Lab Control Sample Dup	86	85	87	88	91	94
LCSD 280-234982/3-A	Lab Control Sample Dup	83	87	87	88	89	91
MB 280-234608/1-A	Method Blank	88	89	87	90	97	87
MB 280-234982/1-A	Method Blank	84	90	89	89	94	82

Surrogate Legend

FBP = 2-Fluorobiphenyl
2FP = 2-Fluorophenol
NBZ = Nitrobenzene-d5
PHL = Phenol-d5
TPH = Terphenyl-d14
TBP = 2,4,6-Tribromophenol

Method: 8081B - Organochlorine Pesticides (GC)

Matrix: Solid — **Prep Type: Total/NA**

		Percent Surrogate Recovery (Acceptance Limits)	
		DCB2	TCX2
Lab Sample ID	Client Sample ID	(55-130)	(70-125)
680-103315-3	CW-SB-4	99	100

Method: 8081B - Organochlorine Pesticides (GC) (Continued)

Matrix: Solid **Prep Type: Total/NA**

		Percent Surrogate Recovery (Acceptance Limits)											
		DCB2	TCX2										
Lab Sample ID	Client Sample ID	(55-130)	(70-125)										
680-103315-4	CW-SB-3	93	90										
680-103315-4 MS	CW-SB-3	94	92										
680-103315-4 MSD	CW-SB-3	101	101										
680-103315-5	CW-SB-2	99	98										
680-103315-6	CW-SB-1	88	90										
680-103315-7	CW-SB-6	115	78										
680-103315-8	CW-SB-5	87	90										
LCS 280-234907/2-A	Lab Control Sample	100	81										
MB 280-234907/1-A	Method Blank	101	80										

Surrogate Legend

DCB = DCB Decachlorobiphenyl

TCX = Tetrachloro-m-xylene

Method: 8081B - Organochlorine Pesticides (GC)

Matrix: Water **Prep Type: Total/NA**

		Percent Surrogate Recovery (Acceptance Limits)											
		DCB2	TCX2										
Lab Sample ID	Client Sample ID	(30-135)	(25-140)										
680-103315-1	CW-1-GW	51	85										
680-103315-2	CW-2-GW	51	84										
680-103315-9	CW-DUP	46	82										
LCS 280-234650/2-A	Lab Control Sample	90	70										
LCSD 280-234650/3-A	Lab Control Sample Dup	102	79										
MB 280-234650/1-A	Method Blank	103	81										

Surrogate Legend

DCB = DCB Decachlorobiphenyl

TCX = Tetrachloro-m-xylene

Method: 8270D - Semivolatile Organic Compounds (GC/MS)

Lab Sample ID: MB 280-234608/1-A
Matrix: Water
Analysis Batch: 235633

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 234608

Analyte	MB Result	MB Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Acenaphthene	1.0	U	10	1.0	0.28	ug/L		07/23/14 16:49	1
Acenaphthylene	1.0	U	10	1.0	0.49	ug/L		07/23/14 16:49	1
Anthracene	1.0	U	10	1.0	0.42	ug/L		07/23/14 16:49	1
Benzo[a]anthracene	1.0	U	10	1.0	0.35	ug/L		07/23/14 16:49	1
Benzo[a]pyrene	1.0	U	10	1.0	0.31	ug/L		07/23/14 16:49	1
Benzo[b]fluoranthene	1.0	U	10	1.0	0.53	ug/L		07/23/14 16:49	1
Benzo[g,h,i]perylene	1.0	U	10	1.0	0.50	ug/L		07/23/14 16:49	1
Benzoic acid	50	U	80	50	10	ug/L		07/23/14 16:49	1
Benzo[k]fluoranthene	1.0	U	10	1.0	0.46	ug/L		07/23/14 16:49	1
Benzyl alcohol	0.534	J	25	1.0	0.23	ug/L		07/23/14 16:49	1
Bis(2-chloroethoxy)methane	4.0	U	10	4.0	0.97	ug/L		07/23/14 16:49	1
Bis(2-chloroethyl)ether	1.0	U	20	1.0	0.41	ug/L		07/23/14 16:49	1
bis(chloroisopropyl) ether	1.0	U	10	1.0	0.28	ug/L		07/23/14 16:49	1
Bis(2-ethylhexyl) phthalate	4.18	J	10	1.0	0.56	ug/L		07/23/14 16:49	1
4-Bromophenyl phenyl ether	1.0	U	10	1.0	0.43	ug/L		07/23/14 16:49	1
Butyl benzyl phthalate	4.0	U	20	4.0	1.0	ug/L		07/23/14 16:49	1
4-Chloroaniline	5.0	U	25	5.0	2.1	ug/L		07/23/14 16:49	1
4-Chloro-3-methylphenol	5.0	U	20	5.0	2.4	ug/L		07/23/14 16:49	1
2-Chloronaphthalene	1.0	U	10	1.0	0.26	ug/L		07/23/14 16:49	1
2-Chlorophenol	4.0	U	10	4.0	2.0	ug/L		07/23/14 16:49	1
4-Chlorophenyl phenyl ether	4.0	U	10	4.0	1.7	ug/L		07/23/14 16:49	1
Chrysene	1.0	U	10	1.0	0.54	ug/L		07/23/14 16:49	1
Dibenz(a,h)anthracene	1.0	U	10	1.0	0.51	ug/L		07/23/14 16:49	1
Dibenzofuran	1.0	U	10	1.0	0.29	ug/L		07/23/14 16:49	1
1,2-Dichlorobenzene	1.0	U	10	1.0	0.23	ug/L		07/23/14 16:49	1
1,3-Dichlorobenzene	1.0	U	10	1.0	0.30	ug/L		07/23/14 16:49	1
1,4-Dichlorobenzene	1.0	U	10	1.0	0.32	ug/L		07/23/14 16:49	1
3,3'-Dichlorobenzidine	10	U	50	10	2.0	ug/L		07/23/14 16:49	1
2,4-Dichlorophenol	2.0	U	10	2.0	0.64	ug/L		07/23/14 16:49	1
Diethyl phthalate	1.0	U	20	1.0	0.38	ug/L		07/23/14 16:49	1
2,4-Dimethylphenol	4.0	U	10	4.0	0.58	ug/L		07/23/14 16:49	1
Dimethyl phthalate	1.0	U	20	1.0	0.21	ug/L		07/23/14 16:49	1
Di-n-butyl phthalate	4.0	U	20	4.0	1.2	ug/L		07/23/14 16:49	1
4,6-Dinitro-2-methylphenol	10	U	80	10	4.0	ug/L		07/23/14 16:49	1
2,4-Dinitrophenol	20	U	80	20	10	ug/L		07/23/14 16:49	1
2,4-Dinitrotoluene	4.0	U	20	4.0	1.7	ug/L		07/23/14 16:49	1
2,6-Dinitrotoluene	4.0	U	20	4.0	1.9	ug/L		07/23/14 16:49	1
Di-n-octyl phthalate	1.0	U	20	1.0	0.35	ug/L		07/23/14 16:49	1
Fluoranthene	1.0	U	20	1.0	0.20	ug/L		07/23/14 16:49	1
Fluorene	1.0	U	10	1.0	0.31	ug/L		07/23/14 16:49	1
Hexachlorobenzene	1.0	U	10	1.0	0.66	ug/L		07/23/14 16:49	1
Hexachlorobutadiene	10	U	30	10	3.3	ug/L		07/23/14 16:49	1
Hexachloroethane	4.0	U	10	4.0	2.1	ug/L		07/23/14 16:49	1
Indeno[1,2,3-cd]pyrene	1.0	U	10	1.0	0.65	ug/L		07/23/14 16:49	1
Isophorone	1.0	U	10	1.0	0.21	ug/L		07/23/14 16:49	1
2-Methylnaphthalene	1.0	U	10	1.0	0.29	ug/L		07/23/14 16:49	1
2-Methylphenol	4.0	U	10	4.0	0.98	ug/L		07/23/14 16:49	1
3 & 4 Methylphenol	1.0	U	20	1.0	0.25	ug/L		07/23/14 16:49	1

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 280-234608/1-A
Matrix: Water
Analysis Batch: 235633

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 234608

Analyte	MB Result	MB Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Naphthalene	1.0	U	10	1.0	0.29	ug/L		07/23/14 16:49	1
2-Nitroaniline	4.0	U	50	4.0	1.7	ug/L		07/23/14 16:49	1
3-Nitroaniline	2.0	U	50	2.0	2.0	ug/L		07/23/14 16:49	1
4-Nitroaniline	4.0	U	50	4.0	2.0	ug/L		07/23/14 16:49	1
Nitrobenzene	2.0	U	20	2.0	0.81	ug/L		07/23/14 16:49	1
2-Nitrophenol	1.0	U	20	1.0	0.39	ug/L		07/23/14 16:49	1
4-Nitrophenol	10	U	50	10	1.2	ug/L		07/23/14 16:49	1
N-Nitrosodi-n-propylamine	1.0	U	20	1.0	0.35	ug/L		07/23/14 16:49	1
N-Nitrosodiphenylamine	1.0	U	10	1.0	0.44	ug/L		07/23/14 16:49	1
Pentachlorophenol	40	U	80	40	20	ug/L		07/23/14 16:49	1
Phenanthrene	1.0	U	10	1.0	0.26	ug/L		07/23/14 16:49	1
Phenol	5.0	U	10	5.0	2.0	ug/L		07/23/14 16:49	1
Pyrene	1.0	U	10	1.0	0.37	ug/L		07/23/14 16:49	1
1,2,4-Trichlorobenzene	1.0	U	10	1.0	0.28	ug/L		07/23/14 16:49	1
2,4,5-Trichlorophenol	1.0	U	20	1.0	0.45	ug/L		07/23/14 16:49	1
2,4,6-Trichlorophenol	1.0	U	20	1.0	0.29	ug/L		07/23/14 16:49	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*88*		*50 - 110*	*07/16/14 15:49*	*07/23/14 16:49*	*1*
2-Fluorophenol	*89*		*20 - 110*	*07/16/14 15:49*	*07/23/14 16:49*	*1*
Nitrobenzene-d5	*87*		*40 - 110*	*07/16/14 15:49*	*07/23/14 16:49*	*1*
Phenol-d5	*90*		*10 - 115*	*07/16/14 15:49*	*07/23/14 16:49*	*1*
Terphenyl-d14	*97*		*50 - 135*	*07/16/14 15:49*	*07/23/14 16:49*	*1*
2,4,6-Tribromophenol	*87*		*40 - 125*	*07/16/14 15:49*	*07/23/14 16:49*	*1*

Lab Sample ID: LCS 280-234608/2-A
Matrix: Water
Analysis Batch: 235633

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 234608

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Acenaphthene	80.0	67.1		ug/L		84	45 - 110
Acenaphthylene	80.0	65.4		ug/L		82	50 - 105
Anthracene	80.0	68.8		ug/L		86	55 - 110
Benzo[a]anthracene	80.0	69.8		ug/L		87	55 - 110
Benzo[a]pyrene	80.0	71.4		ug/L		89	55 - 110
Benzo[b]fluoranthene	80.0	72.3		ug/L		90	45 - 120
Benzo[g,h,i]perylene	80.0	73.4		ug/L		92	40 - 125
Benzoic acid	80.0	62.4	J	ug/L		78	10 - 125
Benzo[k]fluoranthene	80.0	76.4		ug/L		95	45 - 125
Benzyl alcohol	80.0	69.3		ug/L		87	30 - 110
Bis(2-chloroethoxy)methane	80.0	68.2		ug/L		85	45 - 105
Bis(2-chloroethyl)ether	80.0	68.7		ug/L		86	35 - 110
bis(chloroisopropyl) ether	80.0	62.7		ug/L		78	25 - 130
Bis(2-ethylhexyl) phthalate	80.0	70.6		ug/L		88	40 - 125
4-Bromophenyl phenyl ether	80.0	70.9		ug/L		89	50 - 115
Butyl benzyl phthalate	80.0	67.3		ug/L		84	45 - 115
4-Chloroaniline	80.0	58.4		ug/L		73	15 - 110
4-Chloro-3-methylphenol	80.0	70.2		ug/L		88	45 - 110

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 280-234608/2-A
Matrix: Water
Analysis Batch: 235633

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 234608

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
2-Chloronaphthalene	80.0	64.1		ug/L		80	50 - 105
2-Chlorophenol	80.0	70.1		ug/L		88	35 - 105
4-Chlorophenyl phenyl ether	80.0	70.8		ug/L		89	50 - 110
Chrysene	80.0	71.4		ug/L		89	55 - 110
Dibenz(a,h)anthracene	80.0	73.0		ug/L		91	40 - 125
Dibenzofuran	80.0	68.8		ug/L		86	55 - 105
1,2-Dichlorobenzene	80.0	50.9		ug/L		64	35 - 100
1,3-Dichlorobenzene	80.0	49.0		ug/L		61	30 - 100
1,4-Dichlorobenzene	80.0	50.1		ug/L		63	30 - 100
3,3'-Dichlorobenzidine	80.0	44.0	J	ug/L		55	20 - 110
2,4-Dichlorophenol	80.0	71.2		ug/L		89	50 - 105
Diethyl phthalate	80.0	71.5		ug/L		89	40 - 120
2,4-Dimethylphenol	80.0	57.7		ug/L		72	30 - 110
Dimethyl phthalate	80.0	72.3		ug/L		90	25 - 125
Di-n-butyl phthalate	80.0	70.4		ug/L		88	55 - 115
4,6-Dinitro-2-methylphenol	160	140		ug/L		88	40 - 130
2,4-Dinitrophenol	160	123		ug/L		77	15 - 140
2,4-Dinitrotoluene	80.0	75.3		ug/L		94	50 - 120
2,6-Dinitrotoluene	80.0	74.2		ug/L		93	50 - 115
Di-n-octyl phthalate	80.0	64.4		ug/L		81	35 - 135
Fluoranthene	80.0	71.9		ug/L		90	55 - 115
Fluorene	80.0	69.6		ug/L		87	50 - 110
Hexachlorobenzene	80.0	71.8		ug/L		90	50 - 110
Hexachlorobutadiene	80.0	50.0		ug/L		63	25 - 105
Hexachloroethane	80.0	45.9		ug/L		57	30 - 95
Indeno[1,2,3-cd]pyrene	80.0	66.4	M	ug/L		83	45 - 125
Isophorone	80.0	65.2		ug/L		82	50 - 110
2-Methylnaphthalene	80.0	62.8		ug/L		79	45 - 105
2-Methylphenol	80.0	68.3		ug/L		85	40 - 110
3 & 4 Methylphenol	80.0	68.4		ug/L		86	30 - 110
Naphthalene	80.0	60.0		ug/L		75	40 - 100
2-Nitroaniline	80.0	68.4		ug/L		85	50 - 115
3-Nitroaniline	80.0	60.2		ug/L		75	20 - 125
4-Nitroaniline	80.0	69.3		ug/L		87	35 - 120
Nitrobenzene	80.0	68.4		ug/L		86	45 - 110
2-Nitrophenol	80.0	69.5		ug/L		87	40 - 115
4-Nitrophenol	160	153		ug/L		96	10 - 125
N-Nitrosodi-n-propylamine	80.0	66.3		ug/L		83	35 - 130
N-Nitrosodiphenylamine	80.0	65.7		ug/L		82	50 - 110
Pentachlorophenol	160	139		ug/L		87	40 - 115
Phenanthrene	80.0	70.4		ug/L		88	50 - 115
Phenol	80.0	69.3		ug/L		87	10 - 115
Pyrene	80.0	69.3		ug/L		87	50 - 130
1,2,4-Trichlorobenzene	80.0	54.3		ug/L		68	35 - 105
2,4,5-Trichlorophenol	80.0	70.9		ug/L		89	50 - 110
2,4,6-Trichlorophenol	80.0	71.7		ug/L		90	50 - 115

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 280-234608/2-A
Matrix: Water
Analysis Batch: 235633

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 234608

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
2-Fluorobiphenyl	*85*		*50 - 110*
2-Fluorophenol	*83*		*20 - 110*
Nitrobenzene-d5	*83*		*40 - 110*
Phenol-d5	*86*		*10 - 115*
Terphenyl-d14	*89*		*50 - 135*
2,4,6-Tribromophenol	*92*		*40 - 125*

Lab Sample ID: LCSD 280-234608/3-A
Matrix: Water
Analysis Batch: 235633

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 234608

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Acenaphthene	80.0	69.5		ug/L		87	45 - 110	3	30
Acenaphthylene	80.0	67.7		ug/L		85	50 - 105	3	30
Anthracene	80.0	69.7		ug/L		87	55 - 110	1	30
Benzo[a]anthracene	80.0	71.3		ug/L		89	55 - 110	2	30
Benzo[a]pyrene	80.0	72.2		ug/L		90	55 - 110	1	30
Benzo[b]fluoranthene	80.0	73.2		ug/L		92	45 - 120	1	30
Benzo[g,h,i]perylene	80.0	73.3		ug/L		92	40 - 125	0	30
Benzoic acid	80.0	65.8	J	ug/L		82	10 - 125	5	30
Benzo[k]fluoranthene	80.0	76.9		ug/L		96	45 - 125	1	30
Benzyl alcohol	80.0	72.7		ug/L		91	30 - 110	5	30
Bis(2-chloroethoxy)methane	80.0	71.4		ug/L		89	45 - 105	5	30
Bis(2-chloroethyl)ether	80.0	71.8		ug/L		90	35 - 110	4	30
bis(chloroisopropyl) ether	80.0	66.2		ug/L		83	25 - 130	5	30
Bis(2-ethylhexyl) phthalate	80.0	69.6		ug/L		87	40 - 125	1	30
4-Bromophenyl phenyl ether	80.0	72.2		ug/L		90	50 - 115	2	30
Butyl benzyl phthalate	80.0	69.2		ug/L		86	45 - 115	3	30
4-Chloroaniline	80.0	57.7		ug/L		72	15 - 110	1	30
4-Chloro-3-methylphenol	80.0	73.2		ug/L		92	45 - 110	4	30
2-Chloronaphthalene	80.0	65.0		ug/L		81	50 - 105	1	30
2-Chlorophenol	80.0	72.0		ug/L		90	35 - 105	3	30
4-Chlorophenyl phenyl ether	80.0	72.5		ug/L		91	50 - 110	2	30
Chrysene	80.0	72.6		ug/L		91	55 - 110	2	30
Dibenz(a,h)anthracene	80.0	71.6		ug/L		89	40 - 125	2	30
Dibenzofuran	80.0	70.6		ug/L		88	55 - 105	3	30
1,2-Dichlorobenzene	80.0	57.8		ug/L		72	35 - 100	13	30
1,3-Dichlorobenzene	80.0	55.8		ug/L		70	30 - 100	13	30
1,4-Dichlorobenzene	80.0	56.8		ug/L		71	30 - 100	12	30
3,3'-Dichlorobenzidine	80.0	41.5	J	ug/L		52	20 - 110	6	30
2,4-Dichlorophenol	80.0	73.4		ug/L		92	50 - 105	3	30
Diethyl phthalate	80.0	75.0		ug/L		94	40 - 120	5	30
2,4-Dimethylphenol	80.0	60.4		ug/L		75	30 - 110	4	30
Dimethyl phthalate	80.0	73.9		ug/L		92	25 - 125	2	30
Di-n-butyl phthalate	80.0	72.5		ug/L		91	55 - 115	3	30
4,6-Dinitro-2-methylphenol	160	145		ug/L		91	40 - 130	4	30
2,4-Dinitrophenol	160	131		ug/L		82	15 - 140	7	30
2,4-Dinitrotoluene	80.0	78.3		ug/L		98	50 - 120	4	30

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCSD 280-234608/3-A
Matrix: Water
Analysis Batch: 235633

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 234608

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
2,6-Dinitrotoluene			80.0	76.5		ug/L		96	50 - 115	3	30
Di-n-octyl phthalate			80.0	66.2		ug/L		83	35 - 135	3	30
Fluoranthene			80.0	73.2		ug/L		92	55 - 115	2	30
Fluorene			80.0	71.9		ug/L		90	50 - 110	3	30
Hexachlorobenzene			80.0	72.8		ug/L		91	50 - 110	1	30
Hexachlorobutadiene			80.0	56.7		ug/L		71	25 - 105	13	30
Hexachloroethane			80.0	53.7		ug/L		67	30 - 95	16	30
Indeno[1,2,3-cd]pyrene			80.0	67.6	M	ug/L		85	45 - 125	2	30
Isophorone			80.0	67.4		ug/L		84	50 - 110	3	30
2-Methylnaphthalene			80.0	64.0		ug/L		80	45 - 105	2	30
2-Methylphenol			80.0	70.4		ug/L		88	40 - 110	3	30
3 & 4 Methylphenol			80.0	71.2		ug/L		89	30 - 110	4	30
Naphthalene			80.0	63.9		ug/L		80	40 - 100	6	30
2-Nitroaniline			80.0	72.0		ug/L		90	50 - 115	5	30
3-Nitroaniline			80.0	60.6		ug/L		76	20 - 125	1	30
4-Nitroaniline			80.0	70.8		ug/L		88	35 - 120	2	30
Nitrobenzene			80.0	71.3		ug/L		89	45 - 110	4	30
2-Nitrophenol			80.0	73.0		ug/L		91	40 - 115	5	30
4-Nitrophenol			160	157		ug/L		98	10 - 125	2	30
N-Nitrosodi-n-propylamine			80.0	70.6		ug/L		88	35 - 130	6	30
N-Nitrosodiphenylamine			80.0	67.1		ug/L		84	50 - 110	2	30
Pentachlorophenol			160	145		ug/L		91	40 - 115	4	30
Phenanthrene			80.0	72.1		ug/L		90	50 - 115	2	30
Phenol			80.0	71.1		ug/L		89	10 - 115	2	30
Pyrene			80.0	71.3		ug/L		89	50 - 130	3	30
1,2,4-Trichlorobenzene			80.0	59.5		ug/L		74	35 - 105	9	30
2,4,5-Trichlorophenol			80.0	73.5		ug/L		92	50 - 110	4	30
2,4,6-Trichlorophenol			80.0	74.6		ug/L		93	50 - 115	4	30

Surrogate	*LCSD %Recovery*	*LCSD Qualifier*	*Limits*
2-Fluorobiphenyl	*86*		*50 - 110*
2-Fluorophenol	*85*		*20 - 110*
Nitrobenzene-d5	*87*		*40 - 110*
Phenol-d5	*88*		*10 - 115*
Terphenyl-d14	*91*		*50 - 135*
2,4,6-Tribromophenol	*94*		*40 - 125*

Lab Sample ID: MB 280-234633/1-A
Matrix: Solid
Analysis Batch: 234935

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 234633

Analyte	MB Result	MB Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Acenaphthene	16	U	310	16	9.7	ug/Kg		07/18/14 11:14	1
Acenaphthylene	31	U	310	31	16	ug/Kg		07/18/14 11:14	1
Anthracene	31	U	310	31	16	ug/Kg		07/18/14 11:14	1
Benzo[a]anthracene	31	U	310	31	19	ug/Kg		07/18/14 11:14	1
Benzo[a]pyrene	31	U	310	31	19	ug/Kg		07/18/14 11:14	1
Benzo[b]fluoranthene	31	U	310	31	25	ug/Kg		07/18/14 11:14	1

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 280-234633/1-A
Matrix: Solid
Analysis Batch: 234935

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 234633

Analyte	MB Result	MB Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Benzo[g,h,i]perylene	31	U	310	31	15	ug/Kg		07/18/14 11:14	1
Benzoic acid	620	U	1500	620	310	ug/Kg		07/18/14 11:14	1
Benzo[k]fluoranthene	62	U	310	62	38	ug/Kg		07/18/14 11:14	1
Benzyl alcohol	31	U	310	31	9.4	ug/Kg		07/18/14 11:14	1
Bis(2-chloroethoxy)methane	62	U	310	62	22	ug/Kg		07/18/14 11:14	1
Bis(2-chloroethyl)ether	31	U	310	31	16	ug/Kg		07/18/14 11:14	1
bis(chloroisopropyl) ether	31	U	310	31	22	ug/Kg		07/18/14 11:14	1
Bis(2-ethylhexyl) phthalate	62	U	310	62	43	ug/Kg		07/18/14 11:14	1
4-Bromophenyl phenyl ether	31	U	310	31	18	ug/Kg		07/18/14 11:14	1
Butyl benzyl phthalate	62	U	310	62	40	ug/Kg		07/18/14 11:14	1
4-Chloroaniline	120	U	310	120	77	ug/Kg		07/18/14 11:14	1
4-Chloro-3-methylphenol	120	U	310	120	62	ug/Kg		07/18/14 11:14	1
2-Chloronaphthalene	31	U	310	31	9.4	ug/Kg		07/18/14 11:14	1
2-Chlorophenol	31	U	310	31	20	ug/Kg		07/18/14 11:14	1
4-Chlorophenyl phenyl ether	62	U	310	62	20	ug/Kg		07/18/14 11:14	1
Chrysene	31	U	310	31	25	ug/Kg		07/18/14 11:14	1
Dibenz(a,h)anthracene	31	U	310	31	18	ug/Kg		07/18/14 11:14	1
Dibenzofuran	31	U	310	31	19	ug/Kg		07/18/14 11:14	1
1,2-Dichlorobenzene	31	U	310	31	21	ug/Kg		07/18/14 11:14	1
1,3-Dichlorobenzene	31	U	310	31	11	ug/Kg		07/18/14 11:14	1
1,4-Dichlorobenzene	31	U	310	31	13	ug/Kg		07/18/14 11:14	1
3,3'-Dichlorobenzidine	310	U	1500	310	84	ug/Kg		07/18/14 11:14	1
2,4-Dichlorophenol	62	U	310	62	9.4	ug/Kg		07/18/14 11:14	1
Diethyl phthalate	31	U	620	31	24	ug/Kg		07/18/14 11:14	1
2,4-Dimethylphenol	120	U	310	120	62	ug/Kg		07/18/14 11:14	1
Dimethyl phthalate	31	U	310	31	22	ug/Kg		07/18/14 11:14	1
Di-n-butyl phthalate	31	U	310	31	27	ug/Kg		07/18/14 11:14	1
4,6-Dinitro-2-methylphenol	620	U	1500	620	310	ug/Kg		07/18/14 11:14	1
2,4-Dinitrophenol	630	U	1500	630	310	ug/Kg		07/18/14 11:14	1
2,4-Dinitrotoluene	120	U	310	120	62	ug/Kg		07/18/14 11:14	1
2,6-Dinitrotoluene	62	U	310	62	26	ug/Kg		07/18/14 11:14	1
Di-n-octyl phthalate	62	U	310	62	14	ug/Kg		07/18/14 11:14	1
Fluoranthene	62	U	310	62	34	ug/Kg		07/18/14 11:14	1
Fluorene	31	U	310	31	17	ug/Kg		07/18/14 11:14	1
Hexachlorobenzene	62	U	310	62	27	ug/Kg		07/18/14 11:14	1
Hexachlorobutadiene	62	U	310	62	9.4	ug/Kg		07/18/14 11:14	1
Hexachloroethane	31	U	310	31	20	ug/Kg		07/18/14 11:14	1
Indeno[1,2,3-cd]pyrene	31	U	310	31	21	ug/Kg		07/18/14 11:14	1
Isophorone	31	U	310	31	16	ug/Kg		07/18/14 11:14	1
2-Methylnaphthalene	31	U	310	31	18	ug/Kg		07/18/14 11:14	1
2-Methylphenol	31	U	310	31	12	ug/Kg		07/18/14 11:14	1
3 & 4 Methylphenol	62	U	310	62	31	ug/Kg		07/18/14 11:14	1
Naphthalene	62	U	310	62	29	ug/Kg		07/18/14 11:14	1
2-Nitroaniline	62	U	1500	62	47	ug/Kg		07/18/14 11:14	1
3-Nitroaniline	120	U	1500	120	68	ug/Kg		07/18/14 11:14	1
4-Nitroaniline	120	U	1500	120	68	ug/Kg		07/18/14 11:14	1
Nitrobenzene	31	U	310	31	21	ug/Kg		07/18/14 11:14	1
2-Nitrophenol	62	U	310	62	9.4	ug/Kg		07/18/14 11:14	1

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 280-234633/1-A
Matrix: Solid
Analysis Batch: 234935

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 234633

Analyte	MB Result	MB Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
4-Nitrophenol	310	U	1500	310	91	ug/Kg		07/18/14 11:14	1
N-Nitrosodi-n-propylamine	62	U	310	62	29	ug/Kg		07/18/14 11:14	1
N-Nitrosodiphenylamine	31	U	310	31	20	ug/Kg		07/18/14 11:14	1
Pentachlorophenol	630	U	1500	630	310	ug/Kg		07/18/14 11:14	1
Phenanthrene	31	U	310	31	16	ug/Kg		07/18/14 11:14	1
Phenol	31	U	310	31	17	ug/Kg		07/18/14 11:14	1
Pyrene	31	U	380	31	11	ug/Kg		07/18/14 11:14	1
1,2,4-Trichlorobenzene	31	U	310	31	26	ug/Kg		07/18/14 11:14	1
2,4,5-Trichlorophenol	120	U	310	120	9.4	ug/Kg		07/18/14 11:14	1
2,4,6-Trichlorophenol	62	U	310	62	9.4	ug/Kg		07/18/14 11:14	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*79*		*45 - 105*	*07/16/14 16:24*	*07/18/14 11:14*	*1*
2-Fluorophenol	*76*		*35 - 105*	*07/16/14 16:24*	*07/18/14 11:14*	*1*
Nitrobenzene-d5	*74*		*35 - 100*	*07/16/14 16:24*	*07/18/14 11:14*	*1*
Phenol-d5	*75*		*40 - 100*	*07/16/14 16:24*	*07/18/14 11:14*	*1*
Terphenyl-d14	*93*		*30 - 125*	*07/16/14 16:24*	*07/18/14 11:14*	*1*
2,4,6-Tribromophenol	*74*		*35 - 125*	*07/16/14 16:24*	*07/18/14 11:14*	*1*

Lab Sample ID: LCS 280-234633/2-A
Matrix: Solid
Analysis Batch: 234935

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 234633

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Acenaphthene	2560	2290		ug/Kg		89	45 - 110
Acenaphthylene	2560	2270		ug/Kg		89	45 - 105
Anthracene	2560	2460		ug/Kg		96	55 - 105
Benzo[a]anthracene	2560	2520		ug/Kg		98	50 - 110
Benzo[a]pyrene	2560	2520		ug/Kg		98	50 - 110
Benzo[b]fluoranthene	2560	2700		ug/Kg		105	45 - 115
Benzo[g,h,i]perylene	2560	2590		ug/Kg		101	40 - 125
Benzoic acid	2560	2210		ug/Kg		86	10 - 110
Benzo[k]fluoranthene	2560	2640		ug/Kg		103	45 - 125
Benzyl alcohol	2560	1980		ug/Kg		77	20 - 125
Bis(2-chloroethoxy)methane	2560	2100		ug/Kg		82	45 - 110
Bis(2-chloroethyl)ether	2560	2260		ug/Kg		88	40 - 105
bis(chloroisopropyl) ether	2560	1820		ug/Kg		71	20 - 115
Bis(2-ethylhexyl) phthalate	2560	2700		ug/Kg		105	45 - 125
4-Bromophenyl phenyl ether	2560	2370		ug/Kg		92	45 - 115
Butyl benzyl phthalate	2560	2690		ug/Kg		105	50 - 125
4-Chloroaniline	2560	1500		ug/Kg		58	10 - 95
4-Chloro-3-methylphenol	2560	2180		ug/Kg		85	45 - 115
2-Chloronaphthalene	2560	2260		ug/Kg		88	45 - 105
2-Chlorophenol	2560	2150		ug/Kg		84	45 - 105
4-Chlorophenyl phenyl ether	2560	2320		ug/Kg		90	45 - 110
Chrysene	2560	2550		ug/Kg		99	55 - 110
Dibenz(a,h)anthracene	2560	2610		ug/Kg		102	40 - 125
Dibenzofuran	2560	2320		ug/Kg		90	50 - 105

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 280-234633/2-A
Matrix: Solid
Analysis Batch: 234935

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 234633

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
1,2-Dichlorobenzene	2560	2090		ug/Kg		82	45 - 95
1,3-Dichlorobenzene	2560	2050		ug/Kg		80	40 - 100
1,4-Dichlorobenzene	2560	2060		ug/Kg		80	35 - 105
3,3'-Dichlorobenzidine	2560	1510		ug/Kg		59	10 - 130
2,4-Dichlorophenol	2560	2240		ug/Kg		87	45 - 110
Diethyl phthalate	2560	2460		ug/Kg		96	50 - 115
2,4-Dimethylphenol	2560	2060		ug/Kg		80	30 - 105
Dimethyl phthalate	2560	2360		ug/Kg		92	50 - 110
Di-n-butyl phthalate	2560	2560		ug/Kg		100	55 - 110
4,6-Dinitro-2-methylphenol	5130	5140		ug/Kg		100	30 - 135
2,4-Dinitrophenol	5130	4630		ug/Kg		90	15 - 130
2,4-Dinitrotoluene	2560	2510		ug/Kg		98	50 - 115
2,6-Dinitrotoluene	2560	2480		ug/Kg		97	50 - 110
Di-n-octyl phthalate	2560	2530		ug/Kg		99	40 - 130
Fluoranthene	2560	2480		ug/Kg		97	55 - 115
Fluorene	2560	2390		ug/Kg		93	50 - 110
Hexachlorobenzene	2560	2240		ug/Kg		87	45 - 120
Hexachlorobutadiene	2560	2050		ug/Kg		80	40 - 115
Hexachloroethane	2560	2080		ug/Kg		81	35 - 110
Indeno[1,2,3-cd]pyrene	2560	2490	M	ug/Kg		97	40 - 120
Isophorone	2560	1860		ug/Kg		73	45 - 110
2-Methylnaphthalene	2560	2150		ug/Kg		84	45 - 105
2-Methylphenol	2560	1920		ug/Kg		75	40 - 105
3 & 4 Methylphenol	2560	2040		ug/Kg		80	40 - 105
Naphthalene	2560	2060		ug/Kg		80	40 - 105
2-Nitroaniline	2560	2270		ug/Kg		88	45 - 120
3-Nitroaniline	2560	1870		ug/Kg		73	25 - 110
4-Nitroaniline	2560	2260		ug/Kg		88	35 - 115
Nitrobenzene	2560	2000		ug/Kg		78	40 - 115
2-Nitrophenol	2560	2200		ug/Kg		86	40 - 110
4-Nitrophenol	5130	4970		ug/Kg		97	15 - 140
N-Nitrosodi-n-propylamine	2560	2000		ug/Kg		78	40 - 115
N-Nitrosodiphenylamine	2560	2380		ug/Kg		93	50 - 115
Pentachlorophenol	5130	5330		ug/Kg		104	25 - 120
Phenanthrene	2560	2500		ug/Kg		97	50 - 110
Phenol	2560	2010		ug/Kg		79	40 - 100
Pyrene	2560	2590		ug/Kg		101	45 - 125
1,2,4-Trichlorobenzene	2560	2160		ug/Kg		84	45 - 110
2,4,5-Trichlorophenol	2560	2490		ug/Kg		97	50 - 110
2,4,6-Trichlorophenol	2560	2510		ug/Kg		98	45 - 110

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
2-Fluorobiphenyl	*85*		*45 - 105*
2-Fluorophenol	*79*		*35 - 105*
Nitrobenzene-d5	*78*		*35 - 100*
Phenol-d5	*77*		*40 - 100*
Terphenyl-d14	*97*		*30 - 125*
2,4,6-Tribromophenol	*86*		*35 - 125*

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: 680-103315-3 MS
Matrix: Solid
Analysis Batch: 234935

Client Sample ID: CW-SB-4
Prep Type: Total/NA
Prep Batch: 234633

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Acenaphthene	18	U	2770	2300		ug/Kg	☼	83	45 - 110
Acenaphthylene	35	U	2770	2260		ug/Kg	☼	82	45 - 105
Anthracene	35	U	2770	2400		ug/Kg	☼	87	55 - 105
Benzo[a]anthracene	35	U	2770	2450		ug/Kg	☼	88	50 - 110
Benzo[a]pyrene	35	U	2770	2470		ug/Kg	☼	89	50 - 110
Benzo[b]fluoranthene	35	U	2770	2640		ug/Kg	☼	95	45 - 115
Benzo[g,h,i]perylene	35	U	2770	2510		ug/Kg	☼	91	40 - 125
Benzoic acid	690	U	2770	2020		ug/Kg	☼	73	10 - 110
Benzo[k]fluoranthene	69	U	2770	2580		ug/Kg	☼	93	45 - 125
Benzyl alcohol	35	U	2770	2020		ug/Kg	☼	73	20 - 125
Bis(2-chloroethoxy)methane	69	U	2770	2170		ug/Kg	☼	78	45 - 110
Bis(2-chloroethyl)ether	35	U	2770	2310		ug/Kg	☼	83	40 - 105
bis(chloroisopropyl) ether	35	U	2770	1890		ug/Kg	☼	68	20 - 115
Bis(2-ethylhexyl) phthalate	69	U	2770	2630		ug/Kg	☼	95	45 - 125
4-Bromophenyl phenyl ether	35	U	2770	2300		ug/Kg	☼	83	45 - 115
Butyl benzyl phthalate	69	U	2770	2600		ug/Kg	☼	94	50 - 125
4-Chloroaniline	140	U	2770	1700		ug/Kg	☼	61	10 - 95
4-Chloro-3-methylphenol	140	U	2770	2230		ug/Kg	☼	80	45 - 115
2-Chloronaphthalene	35	U	2770	2310		ug/Kg	☼	83	45 - 105
2-Chlorophenol	35	U	2770	2180		ug/Kg	☼	79	45 - 105
4-Chlorophenyl phenyl ether	69	U	2770	2290		ug/Kg	☼	82	45 - 110
Chrysene	35	U	2770	2430		ug/Kg	☼	88	55 - 110
Dibenz(a,h)anthracene	35	U	2770	2530		ug/Kg	☼	91	40 - 125
Dibenzofuran	35	U	2770	2350		ug/Kg	☼	85	50 - 105
1,2-Dichlorobenzene	35	U	2770	2080		ug/Kg	☼	75	45 - 95
1,3-Dichlorobenzene	35	U	2770	2040		ug/Kg	☼	74	40 - 100
1,4-Dichlorobenzene	35	U	2770	2060		ug/Kg	☼	74	35 - 105
3,3'-Dichlorobenzidine	350	U	2770	1630	J	ug/Kg	☼	59	10 - 130
2,4-Dichlorophenol	69	U	2770	2350		ug/Kg	☼	85	45 - 110
Diethyl phthalate	35	U	2770	2440		ug/Kg	☼	88	50 - 115
2,4-Dimethylphenol	140	U	2770	2140		ug/Kg	☼	77	30 - 105
Dimethyl phthalate	35	U	2770	2360		ug/Kg	☼	85	50 - 110
Di-n-butyl phthalate	35	U	2770	2500		ug/Kg	☼	90	55 - 110
4,6-Dinitro-2-methylphenol	690	U	5540	5250		ug/Kg	☼	95	30 - 135
2,4-Dinitrophenol	700	U	5540	4700		ug/Kg	☼	85	15 - 130
2,4-Dinitrotoluene	140	U	2770	2500		ug/Kg	☼	90	50 - 115
2,6-Dinitrotoluene	69	U	2770	2430		ug/Kg	☼	88	50 - 110
Di-n-octyl phthalate	69	U	2770	2450		ug/Kg	☼	88	40 - 130
Fluoranthene	69	U	2770	2420		ug/Kg	☼	87	55 - 115
Fluorene	35	U	2770	2340		ug/Kg	☼	85	50 - 110
Hexachlorobenzene	69	U	2770	2180		ug/Kg	☼	79	45 - 120
Hexachlorobutadiene	69	U	2770	2060		ug/Kg	☼	74	40 - 115
Hexachloroethane	35	U	2770	2080		ug/Kg	☼	75	35 - 110
Indeno[1,2,3-cd]pyrene	35	U	2770	2300	M	ug/Kg	☼	83	40 - 120
Isophorone	35	U	2770	1900		ug/Kg	☼	69	45 - 110
2-Methylnaphthalene	35	U	2770	2200		ug/Kg	☼	80	45 - 105
2-Methylphenol	35	U	2770	2020		ug/Kg	☼	73	40 - 105
3 & 4 Methylphenol	69	U	2770	2100		ug/Kg	☼	76	40 - 105

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: 680-103315-3 MS
Matrix: Solid
Analysis Batch: 234935

Client Sample ID: CW-SB-4
Prep Type: Total/NA
Prep Batch: 234633

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Naphthalene	69	U	2770	2090		ug/Kg	☼	75	40 - 105
2-Nitroaniline	69	U	2770	2250		ug/Kg	☼	81	45 - 120
3-Nitroaniline	140	U	2770	2090		ug/Kg	☼	76	25 - 110
4-Nitroaniline	140	U	2770	2250		ug/Kg	☼	81	35 - 115
Nitrobenzene	35	U	2770	2030		ug/Kg	☼	73	40 - 115
2-Nitrophenol	69	U	2770	2250		ug/Kg	☼	81	40 - 110
4-Nitrophenol	350	U	5540	4890		ug/Kg	☼	88	15 - 140
N-Nitrosodi-n-propylamine	69	U	2770	2080		ug/Kg	☼	75	40 - 115
N-Nitrosodiphenylamine	35	U	2770	2340		ug/Kg	☼	85	50 - 115
Pentachlorophenol	700	U	5540	4970		ug/Kg	☼	90	25 - 120
Phenanthrene	35	U	2770	2430		ug/Kg	☼	88	50 - 110
Phenol	35	U	2770	2050		ug/Kg	☼	74	40 - 100
Pyrene	35	U	2770	2520		ug/Kg	☼	91	45 - 125
1,2,4-Trichlorobenzene	35	U	2770	2120		ug/Kg	☼	77	45 - 110
2,4,5-Trichlorophenol	140	U	2770	2450		ug/Kg	☼	88	50 - 110
2,4,6-Trichlorophenol	69	U	2770	2490		ug/Kg	☼	90	45 - 110

Surrogate	*MS %Recovery*	*MS Qualifier*	*Limits*
2-Fluorobiphenyl	*79*		*45 - 105*
2-Fluorophenol	*73*		*35 - 105*
Nitrobenzene-d5	*73*		*35 - 100*
Phenol-d5	*73*		*40 - 100*
Terphenyl-d14	*86*		*30 - 125*
2,4,6-Tribromophenol	*76*		*35 - 125*

Lab Sample ID: 680-103315-3 MSD
Matrix: Solid
Analysis Batch: 234935

Client Sample ID: CW-SB-4
Prep Type: Total/NA
Prep Batch: 234633

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Acenaphthene	18	U	2750	2250		ug/Kg	☼	81	45 - 110	2	30
Acenaphthylene	35	U	2750	2200		ug/Kg	☼	80	45 - 105	3	30
Anthracene	35	U	2750	2330		ug/Kg	☼	85	55 - 105	3	30
Benzo[a]anthracene	35	U	2750	2440		ug/Kg	☼	89	50 - 110	0	30
Benzo[a]pyrene	35	U	2750	2470		ug/Kg	☼	90	50 - 110	0	30
Benzo[b]fluoranthene	35	U	2750	2670		ug/Kg	☼	97	45 - 115	1	30
Benzo[g,h,i]perylene	35	U	2750	2510		ug/Kg	☼	91	40 - 125	0	30
Benzoic acid	690	U	2750	2060		ug/Kg	☼	75	10 - 110	2	30
Benzo[k]fluoranthene	69	U	2750	2580		ug/Kg	☼	94	45 - 125	0	30
Benzyl alcohol	35	U	2750	1990		ug/Kg	☼	72	20 - 125	1	30
Bis(2-chloroethoxy)methane	69	U	2750	2070		ug/Kg	☼	75	45 - 110	5	30
Bis(2-chloroethyl)ether	35	U	2750	2140		ug/Kg	☼	78	40 - 105	7	30
bis(chloroisopropyl) ether	35	U	2750	1830		ug/Kg	☼	66	20 - 115	3	30
Bis(2-ethylhexyl) phthalate	69	U	2750	2630		ug/Kg	☼	95	45 - 125	0	30
4-Bromophenyl phenyl ether	35	U	2750	2280		ug/Kg	☼	83	45 - 115	1	30
Butyl benzyl phthalate	69	U	2750	2620		ug/Kg	☼	95	50 - 125	1	30
4-Chloroaniline	140	U	2750	1770		ug/Kg	☼	64	10 - 95	4	30
4-Chloro-3-methylphenol	140	U	2750	2160		ug/Kg	☼	78	45 - 115	3	30

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: 680-103315-3 MSD
Matrix: Solid
Analysis Batch: 234935

Client Sample ID: CW-SB-4
Prep Type: Total/NA
Prep Batch: 234633

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
2-Chloronaphthalene	35	U	2750	2180		ug/Kg	☼	79	45 - 105	6	30
2-Chlorophenol	35	U	2750	2080		ug/Kg	☼	75	45 - 105	5	30
4-Chlorophenyl phenyl ether	69	U	2750	2230		ug/Kg	☼	81	45 - 110	3	30
Chrysene	35	U	2750	2470		ug/Kg	☼	90	55 - 110	2	30
Dibenz(a,h)anthracene	35	U	2750	2600		ug/Kg	☼	94	40 - 125	3	30
Dibenzofuran	35	U	2750	2260		ug/Kg	☼	82	50 - 105	4	30
1,2-Dichlorobenzene	35	U	2750	2000		ug/Kg	☼	73	45 - 95	4	30
1,3-Dichlorobenzene	35	U	2750	1950		ug/Kg	☼	71	40 - 100	5	30
1,4-Dichlorobenzene	35	U	2750	1960		ug/Kg	☼	71	35 - 105	5	30
3,3'-Dichlorobenzidine	350	U	2750	1700		ug/Kg	☼	62	10 - 130	4	30
2,4-Dichlorophenol	69	U	2750	2240		ug/Kg	☼	81	45 - 110	5	30
Diethyl phthalate	35	U	2750	2390		ug/Kg	☼	87	50 - 115	2	30
2,4-Dimethylphenol	140	U	2750	2050		ug/Kg	☼	74	30 - 105	4	30
Dimethyl phthalate	35	U	2750	2290		ug/Kg	☼	83	50 - 110	3	30
Di-n-butyl phthalate	35	U	2750	2480		ug/Kg	☼	90	55 - 110	1	30
4,6-Dinitro-2-methylphenol	690	U	5510	5250		ug/Kg	☼	95	30 - 135	0	30
2,4-Dinitrophenol	700	U	5510	4620		ug/Kg	☼	84	15 - 130	2	30
2,4-Dinitrotoluene	140	U	2750	2440		ug/Kg	☼	89	50 - 115	2	30
2,6-Dinitrotoluene	69	U	2750	2390		ug/Kg	☼	87	50 - 110	2	30
Di-n-octyl phthalate	69	U	2750	2450		ug/Kg	☼	89	40 - 130	0	30
Fluoranthene	69	U	2750	2380		ug/Kg	☼	86	55 - 115	2	30
Fluorene	35	U	2750	2300		ug/Kg	☼	84	50 - 110	2	30
Hexachlorobenzene	69	U	2750	2190		ug/Kg	☼	80	45 - 120	0	30
Hexachlorobutadiene	69	U	2750	1960		ug/Kg	☼	71	40 - 115	5	30
Hexachloroethane	35	U	2750	2010		ug/Kg	☼	73	35 - 110	4	30
Indeno[1,2,3-cd]pyrene	35	U	2750	2330	M	ug/Kg	☼	84	40 - 120	1	30
Isophorone	35	U	2750	1820		ug/Kg	☼	66	45 - 110	4	30
2-Methylnaphthalene	35	U	2750	2090		ug/Kg	☼	76	45 - 105	5	30
2-Methylphenol	35	U	2750	1960		ug/Kg	☼	71	40 - 105	3	30
3 & 4 Methylphenol	69	U	2750	2080		ug/Kg	☼	75	40 - 105	1	30
Naphthalene	69	U	2750	1980		ug/Kg	☼	72	40 - 105	6	30
2-Nitroaniline	69	U	2750	2220		ug/Kg	☼	80	45 - 120	2	30
3-Nitroaniline	140	U	2750	2110		ug/Kg	☼	77	25 - 110	1	30
4-Nitroaniline	140	U	2750	2250		ug/Kg	☼	82	35 - 115	0	30
Nitrobenzene	35	U	2750	1930		ug/Kg	☼	70	40 - 115	5	30
2-Nitrophenol	69	U	2750	2120		ug/Kg	☼	77	40 - 110	6	30
4-Nitrophenol	350	U	5510	4750		ug/Kg	☼	86	15 - 140	3	30
N-Nitrosodi-n-propylamine	69	U	2750	1990		ug/Kg	☼	72	40 - 115	4	30
N-Nitrosodiphenylamine	35	U	2750	2320		ug/Kg	☼	84	50 - 115	1	30
Pentachlorophenol	700	U	5510	5010		ug/Kg	☼	91	25 - 120	1	30
Phenanthrene	35	U	2750	2410		ug/Kg	☼	87	50 - 110	1	30
Phenol	35	U	2750	2000		ug/Kg	☼	72	40 - 100	2	30
Pyrene	35	U	2750	2540		ug/Kg	☼	92	45 - 125	1	30
1,2,4-Trichlorobenzene	35	U	2750	2010		ug/Kg	☼	73	45 - 110	6	30
2,4,5-Trichlorophenol	140	U	2750	2410		ug/Kg	☼	88	50 - 110	2	30
2,4,6-Trichlorophenol	69	U	2750	2400		ug/Kg	☼	87	45 - 110	4	30

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: 680-103315-3 MSD
Matrix: Solid
Analysis Batch: 234935

Client Sample ID: CW-SB-4
Prep Type: Total/NA
Prep Batch: 234633

Surrogate	*MSD %Recovery*	*MSD Qualifier*	*Limits*
2-Fluorobiphenyl	*74*		*45 - 105*
2-Fluorophenol	*70*		*35 - 105*
Nitrobenzene-d5	*68*		*35 - 100*
Phenol-d5	*70*		*40 - 100*
Terphenyl-d14	*86*		*30 - 125*
2,4,6-Tribromophenol	*75*		*35 - 125*

Lab Sample ID: MB 280-234982/1-A
Matrix: Water
Analysis Batch: 235441

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 234982

Analyte	MB Result	MB Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Acenaphthene	1.0	U	10	1.0	0.28	ug/L		07/22/14 17:32	1
Acenaphthylene	1.0	U	10	1.0	0.49	ug/L		07/22/14 17:32	1
Anthracene	1.0	U	10	1.0	0.42	ug/L		07/22/14 17:32	1
Benzo[a]anthracene	1.0	U	10	1.0	0.35	ug/L		07/22/14 17:32	1
Benzo[a]pyrene	1.0	U	10	1.0	0.31	ug/L		07/22/14 17:32	1
Benzo[b]fluoranthene	1.0	U	10	1.0	0.53	ug/L		07/22/14 17:32	1
Benzo[g,h,i]perylene	1.0	U	10	1.0	0.50	ug/L		07/22/14 17:32	1
Benzoic acid	50	U	80	50	10	ug/L		07/22/14 17:32	1
Benzo[k]fluoranthene	1.0	U	10	1.0	0.46	ug/L		07/22/14 17:32	1
Benzyl alcohol	0.641	J	25	1.0	0.23	ug/L		07/22/14 17:32	1
Bis(2-chloroethoxy)methane	4.0	U	10	4.0	0.97	ug/L		07/22/14 17:32	1
Bis(2-chloroethyl)ether	1.0	U	20	1.0	0.41	ug/L		07/22/14 17:32	1
bis(chloroisopropyl) ether	1.0	U	10	1.0	0.28	ug/L		07/22/14 17:32	1
Bis(2-ethylhexyl) phthalate	1.0	U	10	1.0	0.56	ug/L		07/22/14 17:32	1
4-Bromophenyl phenyl ether	1.0	U	10	1.0	0.43	ug/L		07/22/14 17:32	1
Butyl benzyl phthalate	4.0	U	20	4.0	1.0	ug/L		07/22/14 17:32	1
4-Chloroaniline	5.0	U	25	5.0	2.1	ug/L		07/22/14 17:32	1
4-Chloro-3-methylphenol	5.0	U	20	5.0	2.4	ug/L		07/22/14 17:32	1
2-Chloronaphthalene	1.0	U	10	1.0	0.26	ug/L		07/22/14 17:32	1
2-Chlorophenol	4.0	U	10	4.0	2.0	ug/L		07/22/14 17:32	1
4-Chlorophenyl phenyl ether	4.0	U	10	4.0	1.7	ug/L		07/22/14 17:32	1
Chrysene	1.0	U	10	1.0	0.54	ug/L		07/22/14 17:32	1
Dibenz(a,h)anthracene	1.0	U	10	1.0	0.51	ug/L		07/22/14 17:32	1
Dibenzofuran	1.0	U	10	1.0	0.29	ug/L		07/22/14 17:32	1
1,2-Dichlorobenzene	1.0	U	10	1.0	0.23	ug/L		07/22/14 17:32	1
1,3-Dichlorobenzene	1.0	U	10	1.0	0.30	ug/L		07/22/14 17:32	1
1,4-Dichlorobenzene	1.0	U	10	1.0	0.32	ug/L		07/22/14 17:32	1
3,3'-Dichlorobenzidine	10	U	50	10	2.0	ug/L		07/22/14 17:32	1
2,4-Dichlorophenol	2.0	U	10	2.0	0.64	ug/L		07/22/14 17:32	1
Diethyl phthalate	1.0	U	20	1.0	0.38	ug/L		07/22/14 17:32	1
2,4-Dimethylphenol	4.0	U	10	4.0	0.58	ug/L		07/22/14 17:32	1
Dimethyl phthalate	1.0	U	20	1.0	0.21	ug/L		07/22/14 17:32	1
Di-n-butyl phthalate	4.0	U	20	4.0	1.2	ug/L		07/22/14 17:32	1
4,6-Dinitro-2-methylphenol	10	U	80	10	4.0	ug/L		07/22/14 17:32	1
2,4-Dinitrophenol	20	U	80	20	10	ug/L		07/22/14 17:32	1
2,4-Dinitrotoluene	4.0	U	20	4.0	1.7	ug/L		07/22/14 17:32	1

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 280-234982/1-A
Matrix: Water
Analysis Batch: 235441

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 234982

Analyte	MB Result	MB Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
2,6-Dinitrotoluene	4.0	U	20	4.0	1.9	ug/L		07/22/14 17:32	1
Di-n-octyl phthalate	1.0	U	20	1.0	0.35	ug/L		07/22/14 17:32	1
Fluoranthene	1.0	U	20	1.0	0.20	ug/L		07/22/14 17:32	1
Fluorene	1.0	U	10	1.0	0.31	ug/L		07/22/14 17:32	1
Hexachlorobenzene	1.0	U	10	1.0	0.66	ug/L		07/22/14 17:32	1
Hexachlorobutadiene	10	U	30	10	3.3	ug/L		07/22/14 17:32	1
Hexachloroethane	4.0	U	10	4.0	2.1	ug/L		07/22/14 17:32	1
Indeno[1,2,3-cd]pyrene	1.0	U	10	1.0	0.65	ug/L		07/22/14 17:32	1
Isophorone	1.0	U	10	1.0	0.21	ug/L		07/22/14 17:32	1
2-Methylnaphthalene	1.0	U	10	1.0	0.29	ug/L		07/22/14 17:32	1
2-Methylphenol	4.0	U	10	4.0	0.98	ug/L		07/22/14 17:32	1
3 & 4 Methylphenol	1.0	U	20	1.0	0.25	ug/L		07/22/14 17:32	1
Naphthalene	1.0	U	10	1.0	0.29	ug/L		07/22/14 17:32	1
2-Nitroaniline	4.0	U	50	4.0	1.7	ug/L		07/22/14 17:32	1
3-Nitroaniline	2.0	U	50	2.0	2.0	ug/L		07/22/14 17:32	1
4-Nitroaniline	4.0	U	50	4.0	2.0	ug/L		07/22/14 17:32	1
Nitrobenzene	2.0	U	20	2.0	0.81	ug/L		07/22/14 17:32	1
2-Nitrophenol	1.0	U	20	1.0	0.39	ug/L		07/22/14 17:32	1
4-Nitrophenol	10	U	50	10	1.2	ug/L		07/22/14 17:32	1
N-Nitrosodi-n-propylamine	1.0	U	20	1.0	0.35	ug/L		07/22/14 17:32	1
N-Nitrosodiphenylamine	1.0	U	10	1.0	0.44	ug/L		07/22/14 17:32	1
Pentachlorophenol	40	U	80	40	20	ug/L		07/22/14 17:32	1
Phenanthrene	1.0	U	10	1.0	0.26	ug/L		07/22/14 17:32	1
Phenol	5.0	U	10	5.0	2.0	ug/L		07/22/14 17:32	1
Pyrene	1.0	U	10	1.0	0.37	ug/L		07/22/14 17:32	1
1,2,4-Trichlorobenzene	1.0	U	10	1.0	0.28	ug/L		07/22/14 17:32	1
2,4,5-Trichlorophenol	1.0	U	20	1.0	0.45	ug/L		07/22/14 17:32	1
2,4,6-Trichlorophenol	1.0	U	20	1.0	0.29	ug/L		07/22/14 17:32	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*84*		*50 - 110*	*07/18/14 13:50*	*07/22/14 17:32*	*1*
2-Fluorophenol	*90*		*20 - 110*	*07/18/14 13:50*	*07/22/14 17:32*	*1*
Nitrobenzene-d5	*89*		*40 - 110*	*07/18/14 13:50*	*07/22/14 17:32*	*1*
Phenol-d5	*89*		*10 - 115*	*07/18/14 13:50*	*07/22/14 17:32*	*1*
Terphenyl-d14	*94*		*50 - 135*	*07/18/14 13:50*	*07/22/14 17:32*	*1*
2,4,6-Tribromophenol	*82*		*40 - 125*	*07/18/14 13:50*	*07/22/14 17:32*	*1*

Lab Sample ID: LCS 280-234982/2-A
Matrix: Water
Analysis Batch: 235441

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 234982

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Acenaphthene	80.0	69.3		ug/L		87	45 - 110
Acenaphthylene	80.0	67.5		ug/L		84	50 - 105
Anthracene	80.0	68.6		ug/L		86	55 - 110
Benzo[a]anthracene	80.0	69.6		ug/L		87	55 - 110
Benzo[a]pyrene	80.0	67.4		ug/L		84	55 - 110
Benzo[b]fluoranthene	80.0	70.7		ug/L		88	45 - 120

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 280-234982/2-A
Matrix: Water
Analysis Batch: 235441

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 234982

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Benzo[g,h,i]perylene	80.0	71.8		ug/L		90	40 - 125
Benzoic acid	80.0	59.3	J	ug/L		74	10 - 125
Benzo[k]fluoranthene	80.0	73.9		ug/L		92	45 - 125
Benzyl alcohol	80.0	71.4		ug/L		89	30 - 110
Bis(2-chloroethoxy)methane	80.0	69.6		ug/L		87	45 - 105
Bis(2-chloroethyl)ether	80.0	72.1		ug/L		90	35 - 110
bis(chloroisopropyl) ether	80.0	66.9		ug/L		84	25 - 130
Bis(2-ethylhexyl) phthalate	80.0	69.1		ug/L		86	40 - 125
4-Bromophenyl phenyl ether	80.0	71.1		ug/L		89	50 - 115
Butyl benzyl phthalate	80.0	68.8		ug/L		86	45 - 115
4-Chloroaniline	80.0	57.0		ug/L		71	15 - 110
4-Chloro-3-methylphenol	80.0	70.6		ug/L		88	45 - 110
2-Chloronaphthalene	80.0	66.3		ug/L		83	50 - 105
2-Chlorophenol	80.0	70.4		ug/L		88	35 - 105
4-Chlorophenyl phenyl ether	80.0	70.7		ug/L		88	50 - 110
Chrysene	80.0	70.5		ug/L		88	55 - 110
Dibenz(a,h)anthracene	80.0	71.1		ug/L		89	40 - 125
Dibenzofuran	80.0	69.3		ug/L		87	55 - 105
1,2-Dichlorobenzene	80.0	57.9		ug/L		72	35 - 100
1,3-Dichlorobenzene	80.0	55.2		ug/L		69	30 - 100
1,4-Dichlorobenzene	80.0	55.9		ug/L		70	30 - 100
3,3'-Dichlorobenzidine	80.0	38.9	J	ug/L		49	20 - 110
2,4-Dichlorophenol	80.0	71.4		ug/L		89	50 - 105
Diethyl phthalate	80.0	71.4		ug/L		89	40 - 120
2,4-Dimethylphenol	80.0	52.2		ug/L		65	30 - 110
Dimethyl phthalate	80.0	71.6		ug/L		90	25 - 125
Di-n-butyl phthalate	80.0	71.4		ug/L		89	55 - 115
4,6-Dinitro-2-methylphenol	160	140		ug/L		88	40 - 130
2,4-Dinitrophenol	160	124		ug/L		77	15 - 140
2,4-Dinitrotoluene	80.0	74.3		ug/L		93	50 - 120
2,6-Dinitrotoluene	80.0	74.9		ug/L		94	50 - 115
Di-n-octyl phthalate	80.0	68.0		ug/L		85	35 - 135
Fluoranthene	80.0	72.0		ug/L		90	55 - 115
Fluorene	80.0	69.9		ug/L		87	50 - 110
Hexachlorobenzene	80.0	71.7		ug/L		90	50 - 110
Hexachlorobutadiene	80.0	55.2		ug/L		69	25 - 105
Hexachloroethane	80.0	50.8		ug/L		64	30 - 95
Indeno[1,2,3-cd]pyrene	80.0	67.7	M	ug/L		85	45 - 125
Isophorone	80.0	66.1		ug/L		83	50 - 110
2-Methylnaphthalene	80.0	65.8		ug/L		82	45 - 105
2-Methylphenol	80.0	68.2		ug/L		85	40 - 110
3 & 4 Methylphenol	80.0	70.0		ug/L		88	30 - 110
Naphthalene	80.0	65.6		ug/L		82	40 - 100
2-Nitroaniline	80.0	69.5		ug/L		87	50 - 115
3-Nitroaniline	80.0	57.3		ug/L		72	20 - 125
4-Nitroaniline	80.0	68.0		ug/L		85	35 - 120
Nitrobenzene	80.0	70.8		ug/L		88	45 - 110
2-Nitrophenol	80.0	71.6		ug/L		89	40 - 115

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 280-234982/2-A
Matrix: Water
Analysis Batch: 235441

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 234982

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
4-Nitrophenol	160	146		ug/L		92	10 - 125
N-Nitrosodi-n-propylamine	80.0	69.7		ug/L		87	35 - 130
N-Nitrosodiphenylamine	80.0	65.6		ug/L		82	50 - 110
Pentachlorophenol	160	139		ug/L		87	40 - 115
Phenanthrene	80.0	70.6		ug/L		88	50 - 115
Phenol	80.0	71.0		ug/L		89	10 - 115
Pyrene	80.0	70.1		ug/L		88	50 - 130
1,2,4-Trichlorobenzene	80.0	60.0		ug/L		75	35 - 105
2,4,5-Trichlorophenol	80.0	72.8		ug/L		91	50 - 110
2,4,6-Trichlorophenol	80.0	71.3		ug/L		89	50 - 115

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
2-Fluorobiphenyl	*84*		*50 - 110*
2-Fluorophenol	*86*		*20 - 110*
Nitrobenzene-d5	*87*		*40 - 110*
Phenol-d5	*87*		*10 - 115*
Terphenyl-d14	*89*		*50 - 135*
2,4,6-Tribromophenol	*92*		*40 - 125*

Lab Sample ID: LCSD 280-234982/3-A
Matrix: Water
Analysis Batch: 235441

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 234982

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Acenaphthene	80.0	68.6		ug/L		86	45 - 110	1	30
Acenaphthylene	80.0	66.6		ug/L		83	50 - 105	1	30
Anthracene	80.0	68.4		ug/L		85	55 - 110	0	30
Benzo[a]anthracene	80.0	69.8		ug/L		87	55 - 110	0	30
Benzo[a]pyrene	80.0	67.9		ug/L		85	55 - 110	1	30
Benzo[b]fluoranthene	80.0	71.0		ug/L		89	45 - 120	0	30
Benzo[g,h,i]perylene	80.0	71.5		ug/L		89	40 - 125	0	30
Benzoic acid	80.0	68.8	J	ug/L		86	10 - 125	15	30
Benzo[k]fluoranthene	80.0	73.7		ug/L		92	45 - 125	0	30
Benzyl alcohol	80.0	71.4		ug/L		89	30 - 110	0	30
Bis(2-chloroethoxy)methane	80.0	70.2		ug/L		88	45 - 105	1	30
Bis(2-chloroethyl)ether	80.0	71.8		ug/L		90	35 - 110	0	30
bis(chloroisopropyl) ether	80.0	66.9		ug/L		84	25 - 130	0	30
Bis(2-ethylhexyl) phthalate	80.0	69.0		ug/L		86	40 - 125	0	30
4-Bromophenyl phenyl ether	80.0	70.6		ug/L		88	50 - 115	1	30
Butyl benzyl phthalate	80.0	69.2		ug/L		86	45 - 115	1	30
4-Chloroaniline	80.0	48.6		ug/L		61	15 - 110	16	30
4-Chloro-3-methylphenol	80.0	71.3		ug/L		89	45 - 110	1	30
2-Chloronaphthalene	80.0	65.8		ug/L		82	50 - 105	1	30
2-Chlorophenol	80.0	70.6		ug/L		88	35 - 105	0	30
4-Chlorophenyl phenyl ether	80.0	71.2		ug/L		89	50 - 110	1	30
Chrysene	80.0	70.7		ug/L		88	55 - 110	0	30
Dibenz(a,h)anthracene	80.0	72.2		ug/L		90	40 - 125	2	30
Dibenzofuran	80.0	69.1		ug/L		86	55 - 105	0	30

Method: 8270D - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCSD 280-234982/3-A
Matrix: Water
Analysis Batch: 235441

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 234982

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
1,2-Dichlorobenzene	80.0	57.5		ug/L		72	35 - 100	1	30
1,3-Dichlorobenzene	80.0	54.5		ug/L		68	30 - 100	1	30
1,4-Dichlorobenzene	80.0	55.3		ug/L		69	30 - 100	1	30
3,3'-Dichlorobenzidine	80.0	34.3	J	ug/L		43	20 - 110	13	30
2,4-Dichlorophenol	80.0	73.2		ug/L		92	50 - 105	3	30
Diethyl phthalate	80.0	71.3		ug/L		89	40 - 120	0	30
2,4-Dimethylphenol	80.0	52.7		ug/L		66	30 - 110	1	30
Dimethyl phthalate	80.0	71.2		ug/L		89	25 - 125	0	30
Di-n-butyl phthalate	80.0	71.1		ug/L		89	55 - 115	0	30
4,6-Dinitro-2-methylphenol	160	143		ug/L		89	40 - 130	2	30
2,4-Dinitrophenol	160	132		ug/L		82	15 - 140	6	30
2,4-Dinitrotoluene	80.0	76.1		ug/L		95	50 - 120	2	30
2,6-Dinitrotoluene	80.0	74.8		ug/L		93	50 - 115	0	30
Di-n-octyl phthalate	80.0	68.5		ug/L		86	35 - 135	1	30
Fluoranthene	80.0	71.4		ug/L		89	55 - 115	1	30
Fluorene	80.0	70.3		ug/L		88	50 - 110	1	30
Hexachlorobenzene	80.0	70.9		ug/L		89	50 - 110	1	30
Hexachlorobutadiene	80.0	55.0		ug/L		69	25 - 105	0	30
Hexachloroethane	80.0	50.7		ug/L		63	30 - 95	0	30
Indeno[1,2,3-cd]pyrene	80.0	68.2	M	ug/L		85	45 - 125	1	30
Isophorone	80.0	66.3		ug/L		83	50 - 110	0	30
2-Methylnaphthalene	80.0	65.1		ug/L		81	45 - 105	1	30
2-Methylphenol	80.0	68.8		ug/L		86	40 - 110	1	30
3 & 4 Methylphenol	80.0	69.8		ug/L		87	30 - 110	0	30
Naphthalene	80.0	64.8		ug/L		81	40 - 100	1	30
2-Nitroaniline	80.0	70.7		ug/L		88	50 - 115	2	30
3-Nitroaniline	80.0	50.3		ug/L		63	20 - 125	13	30
4-Nitroaniline	80.0	66.2		ug/L		83	35 - 120	3	30
Nitrobenzene	80.0	73.4		ug/L		92	45 - 110	4	30
2-Nitrophenol	80.0	73.3		ug/L		92	40 - 115	2	30
4-Nitrophenol	160	153		ug/L		95	10 - 125	4	30
N-Nitrosodi-n-propylamine	80.0	69.2		ug/L		86	35 - 130	1	30
N-Nitrosodiphenylamine	80.0	65.3		ug/L		82	50 - 110	0	30
Pentachlorophenol	160	141		ug/L		88	40 - 115	1	30
Phenanthrene	80.0	70.6		ug/L		88	50 - 115	0	30
Phenol	80.0	71.6		ug/L		90	10 - 115	1	30
Pyrene	80.0	69.9		ug/L		87	50 - 130	0	30
1,2,4-Trichlorobenzene	80.0	59.2		ug/L		74	35 - 105	1	30
2,4,5-Trichlorophenol	80.0	72.6		ug/L		91	50 - 110	0	30
2,4,6-Trichlorophenol	80.0	72.0		ug/L		90	50 - 115	1	30

Surrogate	*LCSD %Recovery*	*LCSD Qualifier*	*Limits*
2-Fluorobiphenyl	*83*		*50 - 110*
2-Fluorophenol	*87*		*20 - 110*
Nitrobenzene-d5	*87*		*40 - 110*
Phenol-d5	*88*		*10 - 115*
Terphenyl-d14	*89*		*50 - 135*
2,4,6-Tribromophenol	*91*		*40 - 125*

Method: 8081B - Organochlorine Pesticides (GC)

Lab Sample ID: MB 280-234650/1-A
Matrix: Water
Analysis Batch: 235264

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 234650

Analyte	MB Result	MB Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Aldrin	0.020	U	0.050	0.020	0.0059	ug/L		07/22/14 20:34	1
alpha-BHC	0.020	U	0.050	0.020	0.0053	ug/L		07/22/14 20:34	1
alpha-Chlordane	0.020	U	0.050	0.020	0.0053	ug/L		07/22/14 20:34	1
beta-BHC	0.020	U	0.050	0.020	0.0087	ug/L		07/22/14 20:34	1
4,4'-DDD	0.020	U	0.050	0.020	0.0077	ug/L		07/22/14 20:34	1
4,4'-DDE	0.020	U	0.050	0.020	0.0075	ug/L		07/22/14 20:34	1
4,4'-DDT	0.020	U	0.050	0.020	0.015	ug/L		07/22/14 20:34	1
delta-BHC	0.020	U	0.050	0.020	0.0058	ug/L		07/22/14 20:34	1
Dieldrin	0.020	U	0.050	0.020	0.0063	ug/L		07/22/14 20:34	1
Endosulfan I	0.020	U	0.050	0.020	0.0058	ug/L		07/22/14 20:34	1
Endosulfan II	0.020	U	0.050	0.020	0.0070	ug/L		07/22/14 20:34	1
Endosulfan sulfate	0.020	U	0.050	0.020	0.0057	ug/L		07/22/14 20:34	1
Endrin	0.020	U	0.050	0.020	0.0079	ug/L		07/22/14 20:34	1
Endrin aldehyde	0.020	U	0.050	0.020	0.0088	ug/L		07/22/14 20:34	1
Endrin ketone	0.020	U	0.050	0.020	0.0070	ug/L		07/22/14 20:34	1
gamma-BHC (Lindane)	0.020	U	0.050	0.020	0.0069	ug/L		07/22/14 20:34	1
gamma-Chlordane	0.020	U	0.050	0.020	0.0091	ug/L		07/22/14 20:34	1
Heptachlor	0.020	U	0.050	0.020	0.0077	ug/L		07/22/14 20:34	1
Heptachlor epoxide	0.020	U	0.050	0.020	0.0075	ug/L		07/22/14 20:34	1
Methoxychlor	0.020	U	0.050	0.020	0.013	ug/L		07/22/14 20:34	1
Toxaphene	0.80	U	5.0	0.80	0.37	ug/L		07/22/14 20:34	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
DCB Decachlorobiphenyl	*103*		*30 - 135*	*07/16/14 20:48*	*07/22/14 20:34*	*1*
Tetrachloro-m-xylene	*81*		*25 - 140*	*07/16/14 20:48*	*07/22/14 20:34*	*1*

Lab Sample ID: LCS 280-234650/2-A
Matrix: Water
Analysis Batch: 235264

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 234650

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Aldrin	0.500	0.395		ug/L		79	25 - 140
alpha-BHC	0.500	0.420		ug/L		84	60 - 130
alpha-Chlordane	0.500	0.419		ug/L		84	65 - 125
beta-BHC	0.500	0.374		ug/L		75	65 - 125
4,4'-DDD	0.500	0.439		ug/L		88	25 - 150
4,4'-DDE	0.500	0.424		ug/L		85	35 - 140
4,4'-DDT	0.500	0.422		ug/L		84	45 - 140
delta-BHC	0.500	0.425		ug/L		85	45 - 135
Dieldrin	0.500	0.425		ug/L		85	60 - 130
Endosulfan I	0.500	0.365		ug/L		73	50 - 110
Endosulfan II	0.500	0.391		ug/L		78	30 - 130
Endosulfan sulfate	0.500	0.431		ug/L		86	55 - 135
Endrin	0.500	0.424		ug/L		85	55 - 135
Endrin aldehyde	0.500	0.428		ug/L		86	55 - 135
Endrin ketone	0.500	0.433		ug/L		87	75 - 125
gamma-BHC (Lindane)	0.500	0.422		ug/L		84	25 - 135
gamma-Chlordane	0.500	0.418		ug/L		84	60 - 125

Method: 8081B - Organochlorine Pesticides (GC) (Continued)

Lab Sample ID: LCS 280-234650/2-A
Matrix: Water
Analysis Batch: 235264

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 234650

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
Heptachlor			0.500	0.403		ug/L		81	40 - 130		
Heptachlor epoxide			0.500	0.424		ug/L		85	60 - 130		

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
DCB Decachlorobiphenyl	*90*		*30 - 135*
Tetrachloro-m-xylene	*70*		*25 - 140*

Lab Sample ID: LCSD 280-234650/3-A
Matrix: Water
Analysis Batch: 235264

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 234650

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Aldrin			0.500	0.441		ug/L		88	25 - 140	11	30
alpha-BHC			0.500	0.482		ug/L		96	60 - 130	14	30
alpha-Chlordane			0.500	0.484		ug/L		97	65 - 125	14	30
beta-BHC			0.500	0.429		ug/L		86	65 - 125	14	30
4,4'-DDD			0.500	0.513		ug/L		103	25 - 150	16	30
4,4'-DDE			0.500	0.487		ug/L		97	35 - 140	14	30
4,4'-DDT			0.500	0.492		ug/L		98	45 - 140	15	30
delta-BHC			0.500	0.491		ug/L		98	45 - 135	14	30
Dieldrin			0.500	0.492		ug/L		98	60 - 130	15	30
Endosulfan I			0.500	0.420		ug/L		84	50 - 110	14	30
Endosulfan II			0.500	0.455		ug/L		91	30 - 130	15	30
Endosulfan sulfate			0.500	0.502		ug/L		100	55 - 135	15	30
Endrin			0.500	0.487		ug/L		97	55 - 135	14	30
Endrin aldehyde			0.500	0.494		ug/L		99	55 - 135	14	30
Endrin ketone			0.500	0.506		ug/L		101	75 - 125	16	30
gamma-BHC (Lindane)			0.500	0.485		ug/L		97	25 - 135	14	30
gamma-Chlordane			0.500	0.484		ug/L		97	60 - 125	15	30
Heptachlor			0.500	0.458		ug/L		92	40 - 130	13	30
Heptachlor epoxide			0.500	0.488		ug/L		98	60 - 130	14	30

Surrogate	*LCSD %Recovery*	*LCSD Qualifier*	*Limits*
DCB Decachlorobiphenyl	*102*		*30 - 135*
Tetrachloro-m-xylene	*79*		*25 - 140*

Lab Sample ID: MB 280-234907/1-A
Matrix: Solid
Analysis Batch: 235264

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 234907

Analyte	MB Result	MB Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
Aldrin	0.42	U	1.6	0.42	0.23	ug/Kg		07/23/14 00:55	1
alpha-BHC	0.42	U	1.6	0.42	0.20	ug/Kg		07/23/14 00:55	1
alpha-Chlordane	0.42	U	1.6	0.42	0.30	ug/Kg		07/23/14 00:55	1
beta-BHC	0.63	U	1.6	0.63	0.61	ug/Kg		07/23/14 00:55	1
4,4'-DDD	0.63	U	1.6	0.63	0.50	ug/Kg		07/23/14 00:55	1
4,4'-DDE	0.42	U	1.6	0.42	0.22	ug/Kg		07/23/14 00:55	1
4,4'-DDT	0.63	U	1.8	0.63	0.54	ug/Kg		07/23/14 00:55	1

Method: 8081B - Organochlorine Pesticides (GC) (Continued)

Lab Sample ID: MB 280-234907/1-A
Matrix: Solid
Analysis Batch: 235264

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 234907

Analyte	MB Result	MB Qualifier	LOQ	LOD	DL	Unit	D	Analyzed	Dil Fac
delta-BHC	0.63	U	1.6	0.63	0.37	ug/Kg		07/23/14 00:55	1
Dieldrin	0.42	U	1.6	0.42	0.19	ug/Kg		07/23/14 00:55	1
Endosulfan I	0.42	U	1.6	0.42	0.16	ug/Kg		07/23/14 00:55	1
Endosulfan II	0.42	U	1.6	0.42	0.26	ug/Kg		07/23/14 00:55	1
Endosulfan sulfate	0.42	U	1.6	0.42	0.25	ug/Kg		07/23/14 00:55	1
Endrin	0.42	U	1.6	0.42	0.28	ug/Kg		07/23/14 00:55	1
Endrin aldehyde	0.42	U	1.6	0.42	0.16	ug/Kg		07/23/14 00:55	1
Endrin ketone	0.63	U	1.6	0.63	0.45	ug/Kg		07/23/14 00:55	1
gamma-BHC (Lindane)	0.63	U	1.6	0.63	0.42	ug/Kg		07/23/14 00:55	1
gamma-Chlordane	0.63	U	1.6	0.63	0.24	ug/Kg		07/23/14 00:55	1
Heptachlor	0.42	U	1.6	0.42	0.20	ug/Kg		07/23/14 00:55	1
Heptachlor epoxide	0.63	U	1.6	0.63	0.39	ug/Kg		07/23/14 00:55	1
Methoxychlor	0.63	U	3.0	0.63	0.41	ug/Kg		07/23/14 00:55	1
Toxaphene	25	U	160	25	14	ug/Kg		07/23/14 00:55	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
DCB Decachlorobiphenyl	*101*		*55 - 130*	*07/18/14 09:23*	*07/23/14 00:55*	*1*
Tetrachloro-m-xylene	*80*		*70 - 125*	*07/18/14 09:23*	*07/23/14 00:55*	*1*

Lab Sample ID: LCS 280-234907/2-A
Matrix: Solid
Analysis Batch: 235264

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 234907

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Aldrin	16.6	13.0		ug/Kg		79	45 - 140
alpha-BHC	16.6	13.7		ug/Kg		83	60 - 125
alpha-Chlordane	16.6	13.6		ug/Kg		82	65 - 120
beta-BHC	16.6	11.3		ug/Kg		68	60 - 125
4,4'-DDD	16.6	15.1		ug/Kg		91	30 - 135
4,4'-DDE	16.6	13.7		ug/Kg		83	70 - 125
4,4'-DDT	16.6	14.4		ug/Kg		87	45 - 140
delta-BHC	16.6	13.6		ug/Kg		82	55 - 130
Dieldrin	16.6	13.8		ug/Kg		83	65 - 125
Endosulfan I	16.6	13.7		ug/Kg		83	15 - 135
Endosulfan II	16.6	14.5		ug/Kg		88	35 - 140
Endosulfan sulfate	16.6	14.6		ug/Kg		88	60 - 135
Endrin	16.6	13.9		ug/Kg		84	60 - 135
Endrin aldehyde	16.6	13.5		ug/Kg		82	35 - 145
Endrin ketone	16.6	14.9		ug/Kg		90	65 - 135
gamma-BHC (Lindane)	16.6	13.4		ug/Kg		81	60 - 125
gamma-Chlordane	16.6	14.8		ug/Kg		90	65 - 125
Heptachlor	16.6	13.0		ug/Kg		78	50 - 140
Heptachlor epoxide	16.6	13.5		ug/Kg		82	65 - 130

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
DCB Decachlorobiphenyl	*100*		*55 - 130*
Tetrachloro-m-xylene	*81*		*70 - 125*

Method: 8081B - Organochlorine Pesticides (GC) (Continued)

Lab Sample ID: 680-103315-4 MS
Matrix: Solid
Analysis Batch: 235264

Client Sample ID: CW-SB-3
Prep Type: Total/NA
Prep Batch: 234907

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Aldrin	0.48	U	17.3	16.0		ug/Kg	☼	92	45 - 140
alpha-BHC	0.48	U	17.3	16.2		ug/Kg	☼	93	60 - 125
alpha-Chlordane	0.48	U	17.3	16.0		ug/Kg	☼	92	65 - 120
beta-BHC	0.73	U	17.3	13.7		ug/Kg	☼	79	60 - 125
4,4'-DDD	0.73	U	17.3	16.3		ug/Kg	☼	94	30 - 135
4,4'-DDE	0.48	U	17.3	16.3		ug/Kg	☼	94	70 - 125
4,4'-DDT	0.73	U	17.3	15.0		ug/Kg	☼	87	45 - 140
delta-BHC	0.73	U	17.3	16.1		ug/Kg	☼	93	55 - 130
Dieldrin	0.48	U	17.3	16.2		ug/Kg	☼	93	65 - 125
Endosulfan I	0.48	U	17.3	16.2		ug/Kg	☼	93	15 - 135
Endosulfan II	0.48	U	17.3	16.5		ug/Kg	☼	95	35 - 140
Endosulfan sulfate	0.48	U	17.3	16.1		ug/Kg	☼	93	60 - 135
Endrin	0.48	U	17.3	15.8		ug/Kg	☼	91	60 - 135
Endrin aldehyde	0.48	U	17.3	16.0		ug/Kg	☼	92	35 - 145
Endrin ketone	0.73	U	17.3	15.6		ug/Kg	☼	90	65 - 135
gamma-BHC (Lindane)	0.73	U	17.3	16.1		ug/Kg	☼	93	60 - 125
gamma-Chlordane	0.73	U J	17.3	19.3		ug/Kg	☼	112	65 - 125
Heptachlor	0.48	U	17.3	15.0		ug/Kg	☼	86	50 - 140
Heptachlor epoxide	0.73	U	17.3	16.0		ug/Kg	☼	92	65 - 130

Surrogate	*MS %Recovery*	*MS Qualifier*	*Limits*
DCB Decachlorobiphenyl	*94*		*55 - 130*
Tetrachloro-m-xylene	*92*		*70 - 125*

Lab Sample ID: 680-103315-4 MSD
Matrix: Solid
Analysis Batch: 235264

Client Sample ID: CW-SB-3
Prep Type: Total/NA
Prep Batch: 234907

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Aldrin	0.48	U	18.4	18.8		ug/Kg	☼	103	45 - 140	16	30
alpha-BHC	0.48	U	18.4	18.9		ug/Kg	☼	103	60 - 125	15	30
alpha-Chlordane	0.48	U	18.4	18.9		ug/Kg	☼	103	65 - 120	16	30
beta-BHC	0.73	U	18.4	16.0		ug/Kg	☼	87	60 - 125	15	30
4,4'-DDD	0.73	U	18.4	19.1		ug/Kg	☼	104	30 - 135	16	30
4,4'-DDE	0.48	U	18.4	19.2		ug/Kg	☼	105	70 - 125	16	30
4,4'-DDT	0.73	U	18.4	17.5		ug/Kg	☼	95	45 - 140	15	30
delta-BHC	0.73	U	18.4	18.7		ug/Kg	☼	102	55 - 130	15	30
Dieldrin	0.48	U	18.4	19.0		ug/Kg	☼	104	65 - 125	16	30
Endosulfan I	0.48	U	18.4	19.0		ug/Kg	☼	103	15 - 135	16	30
Endosulfan II	0.48	U	18.4	19.3		ug/Kg	☼	105	35 - 140	16	30
Endosulfan sulfate	0.48	U	18.4	18.7		ug/Kg	☼	102	60 - 135	15	30
Endrin	0.48	U	18.4	18.5		ug/Kg	☼	101	60 - 135	16	30
Endrin aldehyde	0.48	U	18.4	18.6		ug/Kg	☼	101	35 - 145	15	30
Endrin ketone	0.73	U	18.4	18.0		ug/Kg	☼	98	65 - 135	15	30
gamma-BHC (Lindane)	0.73	U	18.4	18.7		ug/Kg	☼	102	60 - 125	15	30
gamma-Chlordane	0.73	U J	18.4	23.1	J	ug/Kg	☼	126	65 - 125	18	30
Heptachlor	0.48	U	18.4	17.6		ug/Kg	☼	96	50 - 140	16	30
Heptachlor epoxide	0.73	U	18.4	18.9		ug/Kg	☼	103	65 - 130	16	30

Method: 8081B - Organochlorine Pesticides (GC) (Continued)

Lab Sample ID: 680-103315-4 MSD
Matrix: Solid
Analysis Batch: 235264

Client Sample ID: CW-SB-3
Prep Type: Total/NA
Prep Batch: 234907

Surrogate	MSD %Recovery	MSD Qualifier	Limits
DCB Decachlorobiphenyl	*101*		*55 - 130*
Tetrachloro-m-xylene	*101*		*70 - 125*

GC/MS Semi VOA

Prep Batch: 234608

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
680-103315-2	CW-2-GW	Total/NA	Water	3520C	
680-103315-9	CW-DUP	Total/NA	Water	3520C	
LCS 280-234608/2-A	Lab Control Sample	Total/NA	Water	3520C	
LCSD 280-234608/3-A	Lab Control Sample Dup	Total/NA	Water	3520C	
MB 280-234608/1-A	Method Blank	Total/NA	Water	3520C	

Prep Batch: 234633

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
680-103315-3	CW-SB-4	Total/NA	Solid	3550C	
680-103315-3 MS	CW-SB-4	Total/NA	Solid	3550C	
680-103315-3 MSD	CW-SB-4	Total/NA	Solid	3550C	
680-103315-4	CW-SB-3	Total/NA	Solid	3550C	
680-103315-5	CW-SB-2	Total/NA	Solid	3550C	
680-103315-6	CW-SB-1	Total/NA	Solid	3550C	
680-103315-7	CW-SB-6	Total/NA	Solid	3550C	
680-103315-8	CW-SB-5	Total/NA	Solid	3550C	
LCS 280-234633/2-A	Lab Control Sample	Total/NA	Solid	3550C	
MB 280-234633/1-A	Method Blank	Total/NA	Solid	3550C	

Analysis Batch: 234935

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
680-103315-3	CW-SB-4	Total/NA	Solid	8270D	234633
680-103315-3 MS	CW-SB-4	Total/NA	Solid	8270D	234633
680-103315-3 MSD	CW-SB-4	Total/NA	Solid	8270D	234633
680-103315-4	CW-SB-3	Total/NA	Solid	8270D	234633
680-103315-5	CW-SB-2	Total/NA	Solid	8270D	234633
680-103315-6	CW-SB-1	Total/NA	Solid	8270D	234633
680-103315-7	CW-SB-6	Total/NA	Solid	8270D	234633
680-103315-8	CW-SB-5	Total/NA	Solid	8270D	234633
LCS 280-234633/2-A	Lab Control Sample	Total/NA	Solid	8270D	234633
MB 280-234633/1-A	Method Blank	Total/NA	Solid	8270D	234633

Prep Batch: 234982

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
680-103315-1	CW-1-GW	Total/NA	Water	3520C	
LCS 280-234982/2-A	Lab Control Sample	Total/NA	Water	3520C	
LCSD 280-234982/3-A	Lab Control Sample Dup	Total/NA	Water	3520C	
MB 280-234982/1-A	Method Blank	Total/NA	Water	3520C	

Analysis Batch: 235441

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
680-103315-1	CW-1-GW	Total/NA	Water	8270D	234982
LCS 280-234982/2-A	Lab Control Sample	Total/NA	Water	8270D	234982
LCSD 280-234982/3-A	Lab Control Sample Dup	Total/NA	Water	8270D	234982
MB 280-234982/1-A	Method Blank	Total/NA	Water	8270D	234982

Analysis Batch: 235633

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
680-103315-2	CW-2-GW	Total/NA	Water	8270D	234608
680-103315-9	CW-DUP	Total/NA	Water	8270D	234608
LCS 280-234608/2-A	Lab Control Sample	Total/NA	Water	8270D	234608

GC/MS Semi VOA (Continued)

Analysis Batch: 235633 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
LCSD 280-234608/3-A	Lab Control Sample Dup	Total/NA	Water	8270D	234608
MB 280-234608/1-A	Method Blank	Total/NA	Water	8270D	234608

GC Semi VOA

Prep Batch: 234650

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
680-103315-1	CW-1-GW	Total/NA	Water	3510C	
680-103315-2	CW-2-GW	Total/NA	Water	3510C	
680-103315-9	CW-DUP	Total/NA	Water	3510C	
LCS 280-234650/2-A	Lab Control Sample	Total/NA	Water	3510C	
LCSD 280-234650/3-A	Lab Control Sample Dup	Total/NA	Water	3510C	
MB 280-234650/1-A	Method Blank	Total/NA	Water	3510C	

Prep Batch: 234907

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
680-103315-3	CW-SB-4	Total/NA	Solid	3546	
680-103315-4	CW-SB-3	Total/NA	Solid	3546	
680-103315-4 MS	CW-SB-3	Total/NA	Solid	3546	
680-103315-4 MSD	CW-SB-3	Total/NA	Solid	3546	
680-103315-5	CW-SB-2	Total/NA	Solid	3546	
680-103315-6	CW-SB-1	Total/NA	Solid	3546	
680-103315-7	CW-SB-6	Total/NA	Solid	3546	
680-103315-8	CW-SB-5	Total/NA	Solid	3546	
LCS 280-234907/2-A	Lab Control Sample	Total/NA	Solid	3546	
MB 280-234907/1-A	Method Blank	Total/NA	Solid	3546	

Analysis Batch: 235264

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
680-103315-1	CW-1-GW	Total/NA	Water	8081B	234650
680-103315-2	CW-2-GW	Total/NA	Water	8081B	234650
680-103315-3	CW-SB-4	Total/NA	Solid	8081B	234907
680-103315-4	CW-SB-3	Total/NA	Solid	8081B	234907
680-103315-4 MS	CW-SB-3	Total/NA	Solid	8081B	234907
680-103315-4 MSD	CW-SB-3	Total/NA	Solid	8081B	234907
680-103315-5	CW-SB-2	Total/NA	Solid	8081B	234907
680-103315-6	CW-SB-1	Total/NA	Solid	8081B	234907
680-103315-7	CW-SB-6	Total/NA	Solid	8081B	234907
680-103315-8	CW-SB-5	Total/NA	Solid	8081B	234907
680-103315-9	CW-DUP	Total/NA	Water	8081B	234650
LCS 280-234650/2-A	Lab Control Sample	Total/NA	Water	8081B	234650
LCS 280-234907/2-A	Lab Control Sample	Total/NA	Solid	8081B	234907
LCSD 280-234650/3-A	Lab Control Sample Dup	Total/NA	Water	8081B	234650
MB 280-234650/1-A	Method Blank	Total/NA	Water	8081B	234650
MB 280-234907/1-A	Method Blank	Total/NA	Solid	8081B	234907

QC Association Summary

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

General Chemistry

Analysis Batch: 234959

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
680-103315-3	CW-SB-4	Total/NA	Solid	Moisture	
680-103315-4	CW-SB-3	Total/NA	Solid	Moisture	
680-103315-5	CW-SB-2	Total/NA	Solid	Moisture	
680-103315-6	CW-SB-1	Total/NA	Solid	Moisture	
680-103315-7	CW-SB-6	Total/NA	Solid	Moisture	
680-103315-8	CW-SB-5	Total/NA	Solid	Moisture	

Lab Chronicle

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-1-GW

Lab Sample ID: 680-103315-1

Date Collected: 07/14/14 18:00

Matrix: Water

Date Received: 07/16/14 09:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3520C			234982	07/18/14 13:50	JJW	TAL DEN
Total/NA	Analysis	8270D		1	235441	07/22/14 20:39	DCK	TAL DEN
Total/NA	Prep	3510C			234650	07/16/14 20:48	AH1	TAL DEN
Total/NA	Analysis	8081B		1	235264	07/22/14 18:49	DAW	TAL DEN

Client Sample ID: CW-2-GW

Lab Sample ID: 680-103315-2

Date Collected: 07/15/14 11:45

Matrix: Water

Date Received: 07/16/14 09:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3520C			234608	07/16/14 15:49	JJW	TAL DEN
Total/NA	Analysis	8270D		1	235633	07/24/14 00:29	DCK	TAL DEN
Total/NA	Prep	3510C			234650	07/16/14 20:48	AH1	TAL DEN
Total/NA	Analysis	8081B		1	235264	07/22/14 19:06	DAW	TAL DEN

Client Sample ID: CW-SB-4

Lab Sample ID: 680-103315-3

Date Collected: 07/15/14 09:30

Matrix: Solid

Date Received: 07/16/14 09:00

Percent Solids: 89.4

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3550C			234633	07/16/14 16:24	EJP	TAL DEN
Total/NA	Analysis	8270D		1	234935	07/18/14 15:16	DCK	TAL DEN
Total/NA	Prep	3546			234907	07/18/14 09:23	SHO	TAL DEN
Total/NA	Analysis	8081B		1	235264	07/22/14 22:02	DAW	TAL DEN
Total/NA	Analysis	Moisture		1	234959	07/18/14 11:17	AJS	TAL DEN

Client Sample ID: CW-SB-3

Lab Sample ID: 680-103315-4

Date Collected: 07/15/14 10:00

Matrix: Solid

Date Received: 07/16/14 09:00

Percent Solids: 89.8

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3550C			234633	07/16/14 16:24	EJP	TAL DEN
Total/NA	Analysis	8270D		1	234935	07/18/14 16:37	DCK	TAL DEN
Total/NA	Prep	3546			234907	07/18/14 09:23	SHO	TAL DEN
Total/NA	Analysis	8081B		1	235264	07/22/14 22:19	DAW	TAL DEN
Total/NA	Analysis	Moisture		1	234959	07/18/14 11:17	AJS	TAL DEN

Client Sample ID: CW-SB-2

Lab Sample ID: 680-103315-5

Date Collected: 07/15/14 10:30
Matrix: Solid
Date Received: 07/16/14 09:00
Percent Solids: 82.1

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3550C			234633	07/16/14 16:24	EJP	TAL DEN
Total/NA	Analysis	8270D		1	234935	07/18/14 17:04	DCK	TAL DEN
Total/NA	Prep	3546			234907	07/18/14 09:23	SHO	TAL DEN
Total/NA	Analysis	8081B		1	235264	07/22/14 23:11	DAW	TAL DEN
Total/NA	Analysis	Moisture		1	234959	07/18/14 11:17	AJS	TAL DEN

Client Sample ID: CW-SB-1

Lab Sample ID: 680-103315-6

Date Collected: 07/15/14 10:45
Matrix: Solid
Date Received: 07/16/14 09:00
Percent Solids: 92.3

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3550C			234633	07/16/14 16:24	EJP	TAL DEN
Total/NA	Analysis	8270D		1	234935	07/18/14 17:31	DCK	TAL DEN
Total/NA	Prep	3546			234907	07/18/14 09:23	SHO	TAL DEN
Total/NA	Analysis	8081B		1	235264	07/22/14 23:28	DAW	TAL DEN
Total/NA	Analysis	Moisture		1	234959	07/18/14 11:17	AJS	TAL DEN

Client Sample ID: CW-SB-6

Lab Sample ID: 680-103315-7

Date Collected: 07/15/14 11:00
Matrix: Solid
Date Received: 07/16/14 09:00
Percent Solids: 78.3

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3550C			234633	07/16/14 16:24	EJP	TAL DEN
Total/NA	Analysis	8270D		1	234935	07/18/14 17:57	DCK	TAL DEN
Total/NA	Prep	3546			234907	07/18/14 09:23	SHO	TAL DEN
Total/NA	Analysis	8081B		1	235264	07/23/14 00:20	DAW	TAL DEN
Total/NA	Analysis	Moisture		1	234959	07/18/14 11:17	AJS	TAL DEN

Client Sample ID: CW-SB-5

Lab Sample ID: 680-103315-8

Date Collected: 07/15/14 11:15
Matrix: Solid
Date Received: 07/16/14 09:00
Percent Solids: 87.0

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3550C			234633	07/16/14 16:24	EJP	TAL DEN
Total/NA	Analysis	8270D		1	234935	07/18/14 18:24	DCK	TAL DEN
Total/NA	Prep	3546			234907	07/18/14 09:23	SHO	TAL DEN
Total/NA	Analysis	8081B		1	235264	07/23/14 00:37	DAW	TAL DEN
Total/NA	Analysis	Moisture		1	234959	07/18/14 11:17	AJS	TAL DEN

Lab Chronicle

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Client Sample ID: CW-DUP
Date Collected: 07/15/14 12:00
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-9
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3520C			234608	07/16/14 15:49	JJW	TAL DEN
Total/NA	Analysis	8270D		1	235633	07/24/14 00:59	DCK	TAL DEN
Total/NA	Prep	3510C			234650	07/16/14 20:48	AH1	TAL DEN
Total/NA	Analysis	8081B		1	235264	07/22/14 19:24	DAW	TAL DEN

Laboratory References:

TAL DEN = TestAmerica Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100

Ragnaldsen, Amy

From: Butler, Anna H SAS [Anna.H.Butler@usace.army.mil]
Sent: Wednesday, July 16, 2014 6:38 PM
To: Ragnaldsen, Amy
Subject: RE: RE: Inquiry Regarding Sample Discrepancy and Sample Confirmation Files from 680-103315-1 Fort Benning, GA

Sample SB-3 was collected at 1000 am and sample SB-2 was collected at 1030 am

Thanks

Anna

-----Original Message-----
From: Ragnaldsen, Amy [mailto:Amy.Ragnaldsen@testamericainc.com]
Sent: Wednesday, July 16, 2014 4:44 PM
To: Butler, Anna H SAS
Subject: [EXTERNAL] RE: Inquiry Regarding Sample Discrepancy and Sample Confirmation Files from 680-103315-1 Fort Benning, GA

Anna,

TestAmerica in Denver has informed us that there is a discrepancy in the sample collection time for two samples received today.

The sample collection time on the chain-of-custody reads 10:00am for sample CW-SB-3, the label with this ID has a collection time of 10:30am

The sample collection time on the chain-of-custody reads 10:30am for sample CW-SB-2, the label with this ID has a collection time of 10:00am

I have attached the COC for your reference.

Please confirm the accurate collection times for the two samples above.

Thank you,

Amy

AMY RAGNALDSEN

Project Management Assistant

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

5102 LaRoche Avenue

Savannah, GA 31404

Tel 912.354.7858 Ext. 3225

_____

From: Ragnaldsen, Amy [mailto:amy.ragnaldsen@testamericainc.com]
Sent: Wednesday, July 16, 2014 3:36 PM
To: Ms. Anna Butler
Subject: Sample Confirmation Files from 680-103315-1 Fort Benning, GA

Samples were received by TA Denver today 7/16/14 intact and in temp.

Thank you,
Amy

Please let us know if we met your expectations by rating the service you received from TestAmerica on this project by visiting our website at: Project Feedback <http://secure.testamericainc.com/snaponline/s.asp?k=140312408469>

AMY E RAGNALDSEN
Project Management Assistant I

TestAmerica Savannah
THE LEADER IN ENVIRONMENTAL TESTING

Tel: 912.354,7858
www.testamericainc.com

Reference: [211244]
Attachments: 2

1.8 4.1 IR4405 3K 7/16/14

Serial Number 81205

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

ANALYSIS REQUEST AND CHAIN OF CUSTODY RECORD

○ **TestAmerica Savannah**
5102 LaRoche Avenue
Savannah, GA 31404

Website: www.testamericainc.com
Phone: (912) 354-7858
Fax: (912) 352-0165

○ Alternate Laboratory Name/Location

Phone:
Fax:

PROJECT REFERENCE: Ft Benning	PROJECT NO.: 68UD6587	PROJECT LOCATION (STATE): GA
TAL (LAB) PROJECT MANAGER: Linda Wolfe	P.O. NUMBER:	CONTRACT NO.: 652-5515
CLIENT (SITE) PM:	CLIENT PHONE: 912-652-5515	CLIENT FAX:
CLIENT NAME: Anna Butler	CLIENT E-MAIL:	
CLIENT ADDRESS: 100 W. Oglethorpe Ave Savannah GA 31401		
COMPANY CONTRACTING THIS WORK (if applicable): USACE		

PAGE 1 OF 1

STANDARD REPORT DELIVERY ○ DATE DUE

EXPEDITED REPORT DELIVERY (SURCHARGE) ○ DATE DUE

NUMBER OF COOLERS SUBMITTED PER SHIPMENT: 2 coolers

REQUIRED ANALYSIS: 8081 | 8270 | ~~6020 As~~

PRESERVATIVE: 1 | 1

SAMPLE DATE	SAMPLE TIME	SAMPLE IDENTIFICATION	COMPOSITE (C) OR GRAB (G) INDICATE	AQUEOUS (WATER)	SOLID OR SEMISOLID	AIR	NONAQUEOUS LIQUID (OIL, SOLVENT, ...)	8081 (NUMBER OF CONTAINERS SUBMITTED)	8270 (NUMBER OF CONTAINERS SUBMITTED)	REMARKS
~~8~~-14	1800	CW - 1 - GW		✓				2	2	
7-15	1145	CW - 2 - GW		✓				2	2	water
7-15	0930	CW - SB - 4	✓					1	1	turbid
7-15	1000	CW - SB - 3	✓					1	1	screen
7-15	1030	CW - SB - 2	✓					1	1	pt
7-15	1045	CW - SB - 1	✓					1	1	samples
7-15	1100	CW - SB - 6	✓					1	1	with
7-15	1115	CW - SB - 5	✓					1	1	geoprobe
7-15	1200	CW - DUP		✓				2	2	

RELINQUISHED BY: (SIGNATURE)	DATE	TIME	RELINQUISHED BY: (SIGNATURE)	DATE	TIME	RELINQUISHED BY: (SIGNATURE)	DATE	TIME
Anna Butler	7-15	1700						
RECEIVED BY: (SIGNATURE)	**DATE**	**TIME**	**RECEIVED BY: (SIGNATURE)**	**DATE**	**TIME**	**RECEIVED BY: (SIGNATURE)**	**DATE**	**TIME**
[signature]	7/16/14	900						

LABORATORY USE ONLY

RECEIVED FOR LABORATORY BY: (SIGNATURE)	DATE	TIME	CUSTODY INTACT	CUSTODY SEAL NO.	SAVANNAH LOG NO.	LABORATORY REMARKS
			YES ○ NO ○		680-103315	

TAL8240-680 (1008)

Login Sample Receipt Checklist

Client: U.S. Army Corps of Engineers

Job Number: 680-103315-1

Login Number: 103315

List Source: TestAmerica Savannah

List Number: 1

Creator: Ragnaldsen, Amy E

Question	Answer	Comment
Radioactivity wasn't checked or is </= background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	False	confirmed sample collection times with client
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	N/A	
Residual Chlorine Checked.	N/A	

Login Sample Receipt Checklist

Client: U.S. Army Corps of Engineers

Job Number: 680-103315-1

Login Number: 103315

List Source: TestAmerica Savannah

List Number: 1

Creator: Ragnaldsen, Amy E

Question	Answer	Comment
Radioactivity wasn't checked or is </= background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	False	confirmed sample collection times with client
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	N/A	
Residual Chlorine Checked.	N/A	

Certification Summary

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-1

Laboratory: TestAmerica Savannah

The certifications listed below are applicable to this report.

Authority	Program	EPA Region	Certification ID	Expiration Date
A2LA	DoD ELAP		399.01	02-28-15

Laboratory: TestAmerica Denver

The certifications listed below are applicable to this report.

Authority	Program	EPA Region	Certification ID	Expiration Date
A2LA	DoD ELAP		2907.01	10-31-15

TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

ANALYTICAL REPORT

TestAmerica Laboratories, Inc.
TestAmerica Savannah
5102 LaRoche Avenue
Savannah, GA 31404
Tel: (912)354-7858

TestAmerica Job ID: 680-103315-2
Client Project/Site: Fort Benning

For:
U.S. Army Corps of Engineers
100 West Oglethorpe Ave
Savannah, Georgia 31401

Attn: Ms. Anna Butler

Linda A. Wolfe

Authorized for release by:
7/23/2014 5:45:21 PM

Linda Wolfe, Project Manager II
(912)354-7858 e.3005
linda.wolfe@testamericainc.com

Table of Contents

Cover Page 1
Table of Contents 2
Case Narrative 3
Sample Summary 4
Method Summary 5
Definitions 6
Detection Summary 7
Client Sample Results 8
QC Sample Results 17
QC Association 18
Chronicle 20
Chain of Custody 22
Certification Summary 23

Job ID: 680-103315-2

Laboratory: TestAmerica Savannah

Narrative

CASE NARRATIVE

Client: U.S. Army Corps of Engineers

Project: Fort Benning

Report Number: 680-103315-2

With the exceptions noted as flags or footnotes, standard analytical protocols were followed in the analysis of the samples and no problems were encountered or anomalies observed. In addition all laboratory quality control samples were within established control limits, with any exceptions noted below. Each sample was analyzed to achieve the lowest possible reporting limit within the constraints of the method. In the event of interference or analytes present at high concentrations, samples may be diluted. For diluted samples, the reporting limits are adjusted relative to the dilution required.

RECEIPT

The samples were received on 07/16/2014; the samples arrived in good condition, properly preserved and on ice. The temperatures of the 2 coolers at receipt time were 2.3º C and 4.6º C.

METALS (ICPMS)

Samples CW-SB-4 (680-103315-3), CW-SB-3 (680-103315-4), CW-SB-2 (680-103315-5), CW-SB-1 (680-103315-6), CW-SB-6 (680-103315-7) and CW-SB-5 (680-103315-8) were analyzed for metals (ICPMS) in accordance with EPA SW-846 Methods 6020A. The samples were prepared on 07/17/2014 and analyzed on 07/20/2014.

Samples CW-1-GW (680-103315-1), CW-2-GW (680-103315-2) and CW-DUP (680-103315-9) were analyzed for Metals (ICPMS) in accordance with EPA SW-846 Method 6020A. The samples were prepared on 07/18/2014 and analyzed on 07/22/2014.

Samples CW-SB-4 (680-103315-3)[10X], CW-SB-3 (680-103315-4)[10X], CW-SB-2 (680-103315-5)[10X], CW-SB-1 (680-103315-6)[10X], CW-SB-6 (680-103315-7)[10X] and CW-SB-5 (680-103315-8)[10X] required dilution prior to analysis. The reporting limits have been adjusted accordingly.

No analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

PERCENT SOLIDS/MOISTURE

Samples CW-SB-4 (680-103315-3), CW-SB-3 (680-103315-4), CW-SB-2 (680-103315-5), CW-SB-1 (680-103315-6), CW-SB-6 (680-103315-7) and CW-SB-5 (680-103315-8) were analyzed for Percent Solids/Moisture in accordance with TestAmerica SOP. The samples were analyzed on 07/17/2014.

No analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

Sample Summary

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-2

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
680-103315-1	CW-1-GW	Water	07/14/14 18:00	07/16/14 09:00
680-103315-2	CW-2-GW	Water	07/15/14 11:45	07/16/14 09:00
680-103315-3	CW-SB-4	Solid	07/15/14 09:30	07/16/14 09:00
680-103315-4	CW-SB-3	Solid	07/15/14 10:00	07/16/14 09:00
680-103315-5	CW-SB-2	Solid	07/15/14 10:30	07/16/14 09:00
680-103315-6	CW-SB-1	Solid	07/15/14 10:45	07/16/14 09:00
680-103315-7	CW-SB-6	Solid	07/15/14 11:00	07/16/14 09:00
680-103315-8	CW-SB-5	Solid	07/15/14 11:15	07/16/14 09:00
680-103315-9	CW-DUP	Water	07/15/14 12:00	07/16/14 09:00

Method Summary

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-2

Method	Method Description	Protocol	Laboratory
6020A	Metals (ICP/MS)	SW846	TAL PIT
2540G	SM 2540G	SM22	TAL PIT

Protocol References:

SM22 = SM22

SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates.

Laboratory References:

TAL PIT = TestAmerica Pittsburgh, 301 Alpha Drive, RIDC Park, Pittsburgh, PA 15238, TEL (412)963-7058

Qualifiers

Metals

Qualifier	Qualifier Description
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
U	Indicates the analyte was analyzed for but not detected.

Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
¤	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CNF	Contains no Free Liquid
DER	Duplicate error ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision level concentration
MDA	Minimum detectable activity
EDL	Estimated Detection Limit
MDC	Minimum detectable concentration
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
NC	Not Calculated
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RER	Relative error ratio
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

Detection Summary

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-2

Client Sample ID: CW-1-GW — Lab Sample ID: 680-103315-1

Analyte	Result	Qualifier	LOQ	DL	Unit	Dil Fac	D	Method	Prep Type
Arsenic	1.1		1.0	0.29	ug/L	1		6020A	Total/NA

Client Sample ID: CW-2-GW — Lab Sample ID: 680-103315-2

Analyte	Result	Qualifier	LOQ	DL	Unit	Dil Fac	D	Method	Prep Type
Arsenic	0.85	J	1.0	0.29	ug/L	1		6020A	Total/NA

Client Sample ID: CW-SB-4 — Lab Sample ID: 680-103315-3

Analyte	Result	Qualifier	LOQ	DL	Unit	Dil Fac	D	Method	Prep Type
Arsenic	3.9		1.1	0.19	mg/Kg	10	☼	6020A	Total/NA

Client Sample ID: CW-SB-3 — Lab Sample ID: 680-103315-4

Analyte	Result	Qualifier	LOQ	DL	Unit	Dil Fac	D	Method	Prep Type
Arsenic	3.2		1.1	0.20	mg/Kg	10	☼	6020A	Total/NA

Client Sample ID: CW-SB-2 — Lab Sample ID: 680-103315-5

Analyte	Result	Qualifier	LOQ	DL	Unit	Dil Fac	D	Method	Prep Type
Arsenic	4.0		1.1	0.20	mg/Kg	10	☼	6020A	Total/NA

Client Sample ID: CW-SB-1 — Lab Sample ID: 680-103315-6

Analyte	Result	Qualifier	LOQ	DL	Unit	Dil Fac	D	Method	Prep Type
Arsenic	63		1.0	0.19	mg/Kg	10	☼	6020A	Total/NA

Client Sample ID: CW-SB-6 — Lab Sample ID: 680-103315-7

Analyte	Result	Qualifier	LOQ	DL	Unit	Dil Fac	D	Method	Prep Type
Arsenic	180		0.98	0.18	mg/Kg	10	☼	6020A	Total/NA

Client Sample ID: CW-SB-5 — Lab Sample ID: 680-103315-8

Analyte	Result	Qualifier	LOQ	DL	Unit	Dil Fac	D	Method	Prep Type
Arsenic	7.5		1.2	0.21	mg/Kg	10	☼	6020A	Total/NA

Client Sample ID: CW-DUP — Lab Sample ID: 680-103315-9

No Detections.

This Detection Summary does not include radiochemical test results.

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-2

Client Sample ID: CW-1-GW
Date Collected: 07/14/14 18:00
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-1
Matrix: Water

Method: 6020A - Metals (ICP/MS)

Analyte	Result	Qualifier	LOQ	DL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	1.1		1.0	0.29	ug/L		07/18/14 09:03	07/22/14 21:10	1

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-2

Client Sample ID: CW-2-GW
Date Collected: 07/15/14 11:45
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-2
Matrix: Water

Method: 6020A - Metals (ICP/MS)

Analyte	Result	Qualifier	LOQ	DL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	0.85	J	1.0	0.29	ug/L		07/18/14 09:03	07/22/14 22:06	1

Client Sample Results

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-2

Client Sample ID: CW-SB-4
Date Collected: 07/15/14 09:30
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-3
Matrix: Solid
Percent Solids: 89.5

Method: 6020A - Metals (ICP/MS)

Analyte	Result	Qualifier	LOQ	DL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	3.9		1.1	0.19	mg/Kg	☼	07/17/14 11:53	07/20/14 18:01	10

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-2

Client Sample ID: CW-SB-3
Date Collected: 07/15/14 10:00
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-4
Matrix: Solid
Percent Solids: 90.1

Method: 6020A - Metals (ICP/MS)

Analyte	Result	Qualifier	LOQ	DL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	3.2		1.1	0.20	mg/Kg	☼	07/17/14 11:53	07/20/14 18:20	10

Client Sample Results

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-2

Client Sample ID: CW-SB-2
Date Collected: 07/15/14 10:30
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-5
Matrix: Solid
Percent Solids: 87.1

Method: 6020A - Metals (ICP/MS)

Analyte	Result	Qualifier	LOQ	DL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	4.0		1.1	0.20	mg/Kg	☼	07/17/14 11:53	07/20/14 18:25	10

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-2

Client Sample ID: CW-SB-1
Date Collected: 07/15/14 10:45
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-6
Matrix: Solid
Percent Solids: 94.0

Method: 6020A - Metals (ICP/MS)

Analyte	Result	Qualifier	LOQ	DL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	63		1.0	0.19	mg/Kg	☼	07/17/14 11:53	07/20/14 18:30	10

Client Sample Results

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-2

Client Sample ID: CW-SB-6
Date Collected: 07/15/14 11:00
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-7
Matrix: Solid
Percent Solids: 91.7

Method: 6020A - Metals (ICP/MS)

Analyte	Result	Qualifier	LOQ	DL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	180		0.98	0.18	mg/Kg	☼	07/17/14 12:16	07/20/14 18:35	10

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-2

Client Sample ID: CW-SB-5
Date Collected: 07/15/14 11:15
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-8
Matrix: Solid
Percent Solids: 87.1

Method: 6020A - Metals (ICP/MS)

Analyte	Result	Qualifier	LOQ	DL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	7.5		1.2	0.21	mg/Kg	☼	07/17/14 12:16	07/20/14 18:40	10

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-2

Client Sample ID: CW-DUP
Date Collected: 07/15/14 12:00
Date Received: 07/16/14 09:00

Lab Sample ID: 680-103315-9
Matrix: Water

Method: 6020A - Metals (ICP/MS)

Analyte	Result	Qualifier	LOQ	DL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	1.0	U	1.0	0.29	ug/L		07/18/14 09:03	07/22/14 22:10	1

Method: 6020A - Metals (ICP/MS)

Lab Sample ID: MB 180-111791/1-A
Matrix: Solid
Analysis Batch: 112031

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 111791

Analyte	MB Result	MB Qualifier	LOQ	DL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	0.10	U	0.10	0.018	mg/Kg		07/17/14 11:53	07/20/14 17:13	1

Lab Sample ID: LCS 180-111791/2-A
Matrix: Solid
Analysis Batch: 112031

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 111791

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Arsenic	3.96	3.22		mg/Kg		81	80 - 120

Lab Sample ID: LCSD 180-111791/3-A
Matrix: Solid
Analysis Batch: 112031

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 111791

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Arsenic	3.96	3.24		mg/Kg		82	80 - 120	1	20

Lab Sample ID: MB 180-111868/1-A
Matrix: Water
Analysis Batch: 112346

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 111868

Analyte	MB Result	MB Qualifier	LOQ	DL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	1.0	U	1.0	0.29	ug/L		07/18/14 09:03	07/22/14 21:39	1

Lab Sample ID: LCS 180-111868/2-A
Matrix: Water
Analysis Batch: 112346

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 111868

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Arsenic	40.0	34.1		ug/L		85	80 - 120

Lab Sample ID: LCSD 180-111868/3-A
Matrix: Water
Analysis Batch: 112346

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 111868

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Arsenic	40.0	34.2		ug/L		86	80 - 120	0	20

Metals

Prep Batch: 111791

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
680-103315-3	CW-SB-4	Total/NA	Solid	3050B	
680-103315-4	CW-SB-3	Total/NA	Solid	3050B	
680-103315-5	CW-SB-2	Total/NA	Solid	3050B	
680-103315-6	CW-SB-1	Total/NA	Solid	3050B	
680-103315-7	CW-SB-6	Total/NA	Solid	3050B	
680-103315-8	CW-SB-5	Total/NA	Solid	3050B	
LCS 180-111791/2-A	Lab Control Sample	Total/NA	Solid	3050B	
LCSD 180-111791/3-A	Lab Control Sample Dup	Total/NA	Solid	3050B	
MB 180-111791/1-A	Method Blank	Total/NA	Solid	3050B	

Prep Batch: 111868

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
680-103315-1	CW-1-GW	Total/NA	Water	3010A	
680-103315-2	CW-2-GW	Total/NA	Water	3010A	
680-103315-9	CW-DUP	Total/NA	Water	3010A	
LCS 180-111868/2-A	Lab Control Sample	Total/NA	Water	3010A	
LCSD 180-111868/3-A	Lab Control Sample Dup	Total/NA	Water	3010A	
MB 180-111868/1-A	Method Blank	Total/NA	Water	3010A	

Analysis Batch: 112031

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
680-103315-3	CW-SB-4	Total/NA	Solid	6020A	111791
680-103315-4	CW-SB-3	Total/NA	Solid	6020A	111791
680-103315-5	CW-SB-2	Total/NA	Solid	6020A	111791
680-103315-6	CW-SB-1	Total/NA	Solid	6020A	111791
680-103315-7	CW-SB-6	Total/NA	Solid	6020A	111791
680-103315-8	CW-SB-5	Total/NA	Solid	6020A	111791
LCS 180-111791/2-A	Lab Control Sample	Total/NA	Solid	6020A	111791
LCSD 180-111791/3-A	Lab Control Sample Dup	Total/NA	Solid	6020A	111791
MB 180-111791/1-A	Method Blank	Total/NA	Solid	6020A	111791

Analysis Batch: 112346

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
680-103315-1	CW-1-GW	Total/NA	Water	6020A	111868
680-103315-2	CW-2-GW	Total/NA	Water	6020A	111868
680-103315-9	CW-DUP	Total/NA	Water	6020A	111868
LCS 180-111868/2-A	Lab Control Sample	Total/NA	Water	6020A	111868
LCSD 180-111868/3-A	Lab Control Sample Dup	Total/NA	Water	6020A	111868
MB 180-111868/1-A	Method Blank	Total/NA	Water	6020A	111868

General Chemistry

Analysis Batch: 111788

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
680-103315-3	CW-SB-4	Total/NA	Solid	2540G	
680-103315-4	CW-SB-3	Total/NA	Solid	2540G	
680-103315-5	CW-SB-2	Total/NA	Solid	2540G	

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-2

General Chemistry (Continued)

Analysis Batch: 111789

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
680-103315-6	CW-SB-1	Total/NA	Solid	2540G	
680-103315-6 DU	CW-SB-1	Total/NA	Solid	2540G	
680-103315-7	CW-SB-6	Total/NA	Solid	2540G	
680-103315-8	CW-SB-5	Total/NA	Solid	2540G	

Lab Chronicle

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-2

Client Sample ID: CW-1-GW

Lab Sample ID: 680-103315-1
Matrix: Water
Date Collected: 07/14/14 18:00
Date Received: 07/16/14 09:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3010A			111868	07/18/14 09:03	SLB	TAL PIT
Total/NA	Analysis	6020A		1	112346	07/22/14 21:10	CNS	TAL PIT

Client Sample ID: CW-2-GW

Lab Sample ID: 680-103315-2
Matrix: Water
Date Collected: 07/15/14 11:45
Date Received: 07/16/14 09:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3010A			111868	07/18/14 09:03	SLB	TAL PIT
Total/NA	Analysis	6020A		1	112346	07/22/14 22:06	CNS	TAL PIT

Client Sample ID: CW-SB-4

Lab Sample ID: 680-103315-3
Matrix: Solid
Date Collected: 07/15/14 09:30
Date Received: 07/16/14 09:00
Percent Solids: 89.5

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3050B			111791	07/17/14 11:53	RJR	TAL PIT
Total/NA	Analysis	6020A		10	112031	07/20/14 18:01	CNS	TAL PIT
Total/NA	Analysis	2540G		1	111788	07/17/14 11:24	AJB	TAL PIT

Client Sample ID: CW-SB-3

Lab Sample ID: 680-103315-4
Matrix: Solid
Date Collected: 07/15/14 10:00
Date Received: 07/16/14 09:00
Percent Solids: 90.1

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3050B			111791	07/17/14 11:53	RJR	TAL PIT
Total/NA	Analysis	6020A		10	112031	07/20/14 18:20	CNS	TAL PIT
Total/NA	Analysis	2540G		1	111788	07/17/14 11:24	AJB	TAL PIT

Client Sample ID: CW-SB-2

Lab Sample ID: 680-103315-5
Matrix: Solid
Date Collected: 07/15/14 10:30
Date Received: 07/16/14 09:00
Percent Solids: 87.1

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3050B			111791	07/17/14 11:53	RJR	TAL PIT
Total/NA	Analysis	6020A		10	112031	07/20/14 18:25	CNS	TAL PIT
Total/NA	Analysis	2540G		1	111788	07/17/14 11:24	AJB	TAL PIT

Lab Chronicle

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-2

Client Sample ID: CW-SB-1

Lab Sample ID: 680-103315-6

Date Collected: 07/15/14 10:45
Date Received: 07/16/14 09:00

Matrix: Solid
Percent Solids: 94.0

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3050B			111791	07/17/14 11:53	RJR	TAL PIT
Total/NA	Analysis	6020A		10	112031	07/20/14 18:30	CNS	TAL PIT
Total/NA	Analysis	2540G		1	111789	07/17/14 11:26	AJB	TAL PIT

Client Sample ID: CW-SB-6

Lab Sample ID: 680-103315-7

Date Collected: 07/15/14 11:00
Date Received: 07/16/14 09:00

Matrix: Solid
Percent Solids: 91.7

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3050B			111791	07/17/14 12:16	RJR	TAL PIT
Total/NA	Analysis	6020A		10	112031	07/20/14 18:35	CNS	TAL PIT
Total/NA	Analysis	2540G		1	111789	07/17/14 11:26	AJB	TAL PIT

Client Sample ID: CW-SB-5

Lab Sample ID: 680-103315-8

Date Collected: 07/15/14 11:15
Date Received: 07/16/14 09:00

Matrix: Solid
Percent Solids: 87.1

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3050B			111791	07/17/14 12:16	RJR	TAL PIT
Total/NA	Analysis	6020A		10	112031	07/20/14 18:40	CNS	TAL PIT
Total/NA	Analysis	2540G		1	111789	07/17/14 11:26	AJB	TAL PIT

Client Sample ID: CW-DUP

Lab Sample ID: 680-103315-9

Date Collected: 07/15/14 12:00
Date Received: 07/16/14 09:00

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3010A			111868	07/18/14 09:03	SLB	TAL PIT
Total/NA	Analysis	6020A		1	112346	07/22/14 22:10	CNS	TAL PIT

Laboratory References:

TAL PIT = TestAmerica Pittsburgh, 301 Alpha Drive, RIDC Park, Pittsburgh, PA 15238, TEL (412)963-7058

Serial Number 81160

ANALYSIS REQUEST AND CHAIN OF CUSTODY RECORD

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

TestAmerica Savannah
5102 LaRoche Avenue
Savannah, GA 31404
Website: www.testamericainc.com
Phone: (912) 354-7858
Fax: (912) 352-0165

Alternate Laboratory Name/Location
Phone:
Fax:

PROJECT REFERENCE: Ft Benning	PROJECT NO.: 6300658 7	PROJECT LOCATION (STATE): GA	PAGE: 1 OF: 1
TAL (LAB) PROJECT MANAGER: Lynda Wolfe	P.O. NUMBER:	CONTRACT NO.:	STANDARD REPORT DELIVERY ○ DATE DUE:
CLIENT (SITE) PM: Anna Butler	CLIENT PHONE: 912-652-5515	CLIENT FAX:	EXPEDITED REPORT DELIVERY (SURCHARGE) ○ DATE DUE:
CLIENT NAME: USACE	CLIENT E-MAIL:		
CLIENT ADDRESS: 100 W Oglethorpe Ave Savannah Ga 30141			
COMPANY CONTRACTING THIS WORK (if applicable):			

SAMPLE DATE	SAMPLE TIME	SAMPLE IDENTIFICATION	COMPOSITE (C) OR GRAB (G) INDICATE	MATRIX TYPE: AQUEOUS (WATER)	MATRIX TYPE: SOLID OR SEMISOLID	MATRIX TYPE: AIR	MATRIX TYPE: NONAQUEOUS LIQUID (OIL, SOLVENT,...)	REQUIRED ANALYSIS: 6020 - As	REQUIRED ANALYSIS: Nitric Acid PRESERVATIVE	NUMBER OF CONTAINERS SUBMITTED	REMARKS
7-14	1800	CW-1-GW		✓						1	
7-15	1145	CW-2-GW		✓						1	
7-15	0930	CW-SB-4	✓							1	
7-15	1000	CW-SB-3	✓							1	
7-15	1030	CW-SB-2	✓							1	
7-15	1045	CW-SB-1	✓							1	
7-15	1100	CW-SB-6	✓							1	
7-15	1115	CW-SB-5	✓							1	
7-15	1200	CW-DUP		✓						1	

RELINQUISHED BY: (SIGNATURE)	DATE	TIME	RELINQUISHED BY: (SIGNATURE)	DATE	TIME	RELINQUISHED BY: (SIGNATURE)	DATE	TIME
Anna Butler	7-15	1700						
RECEIVED BY: (SIGNATURE)	DATE	TIME	RECEIVED BY: (SIGNATURE)	DATE	TIME	RECEIVED BY: (SIGNATURE)	DATE	TIME
	7/16/14	0850						

LABORATORY USE ONLY

RECEIVED FOR LABORATORY BY: (SIGNATURE)	DATE	TIME	CUSTODY INTACT YES / NO	CUSTODY SEAL NO.	SAVANNAH LOG NO.	LABORATORY REMARKS
			NO 6	814324	680-103315	

TAL 8240-680 (1008)

Certification Summary

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-2

Laboratory: TestAmerica Savannah

All certifications held by this laboratory are listed. Not all certifications are applicable to this report.

Authority	Program	EPA Region	Certification ID	Expiration Date
	AFCEE		SAVLAB	
A2LA	DoD ELAP		399.01	02-28-15
A2LA	ISO/IEC 17025		399.01	02-28-15
Alabama	State Program	4	41450	06-30-15
Arkansas DEQ	State Program	6	88-0692	01-31-15
California	NELAP	9	3217CA	07-31-14 *
Colorado	State Program	8	N/A	12-31-14
Connecticut	State Program	1	PH-0161	03-31-15
Florida	NELAP	4	E87052	06-30-15
GA Dept. of Agriculture	State Program	4	N/A	06-30-14 *
Georgia	State Program	4	N/A	06-30-15
Georgia	State Program	4	803	06-30-15
Guam	State Program	9	09-005r	04-16-15
Hawaii	State Program	9	N/A	06-30-15
Illinois	NELAP	5	200022	11-30-14
Indiana	State Program	5	N/A	06-30-15
Iowa	State Program	7	353	07-01-15
Kentucky (DW)	State Program	4	90084	12-31-14
Kentucky (UST)	State Program	4	18	06-30-15
Louisiana	NELAP	6	30690	06-30-14 *
Louisiana (DW)	NELAP	6	LA140023	12-31-14
Maine	State Program	1	GA00006	08-16-14 *
Maryland	State Program	3	250	12-31-14
Massachusetts	State Program	1	M-GA006	06-30-15
Michigan	State Program	5	9925	06-30-14 *
Mississippi	State Program	4	N/A	06-30-14 *
Montana	State Program	8	CERT0081	01-01-15
Nebraska	State Program	7	TestAmerica-Savannah	06-30-14 *
New Jersey	NELAP	2	GA769	06-30-15
New Mexico	State Program	6	N/A	06-30-14 *
New York	NELAP	2	10842	03-31-15
North Carolina (DW)	State Program	4	13701	07-31-15
North Carolina (WW/SW)	State Program	4	269	12-31-14
Oklahoma	State Program	6	9984	08-31-14
Pennsylvania	NELAP	3	68-00474	06-30-15
Puerto Rico	State Program	2	GA00006	12-31-14
South Carolina	State Program	4	98001	06-30-14 *
Tennessee	State Program	4	TN02961	06-30-15
Texas	NELAP	6	T104704185-08-TX	11-30-14
USDA	Federal		SAV 3-04	06-11-17
Virginia	NELAP	3	460161	06-14-15
Washington	State Program	10	C805	06-10-15
West Virginia (DW)	State Program	3	9950C	12-31-14
West Virginia DEP	State Program	3	94	06-30-14 *
Wisconsin	State Program	5	999819810	08-31-14
Wyoming	State Program	8	8TMS-L	06-30-14 *

Laboratory: TestAmerica Pittsburgh

Unless otherwise noted, all analytes for this laboratory were covered under each certification below.

* Certification renewal pending - certification considered valid.

Client: U.S. Army Corps of Engineers
Project/Site: Fort Benning

TestAmerica Job ID: 680-103315-2

Laboratory: TestAmerica Pittsburgh (Continued)

Unless otherwise noted, all analytes for this laboratory were covered under each certification below.

Authority	Program	EPA Region	Certification ID	Expiration Date
Florida	NELAP	4	E871008	06-30-15

The following analytes are included in this report, but certification is not offered by the governing authority:

Analysis Method	Prep Method	Matrix	Analyte
2540G		Solid	Percent Moisture