

**REQUEST FOR PROPOSALS
EPA BROWNFIELD CLEANUP GRANT IMPLEMENTATION PROJECT
CITY OF SANDERSVILLE, GA**

The City of Sandersville is seeking Request for Proposals (RFP) from qualified firms to prepare contract documents and specifications for and to oversee a Brownfield Cleanup Project at a former petroleum property located in Sandersville, Georgia. These activities will be funded by an EPA Brownfield Cleanup Grant awarded to the City of Sandersville.

An RFP further explaining the project and its requirements are located at:

<https://csrarc.ga.gov/current-bid-opportunities> or

<http://www.sandersville.net/bidops.cfm?lid=1407>

All questions regarding the RFP should be directed to:

Linda D. Grijalva, Director of Community Development

CSRA Regional Commission

3626 Walton Way Extension, Suite 300

Augusta, GA 30909

Phone: 706-650-5694

Email: lgrijalva@csrarc.ga.gov

All questions regarding this RFP should be directed to Linda D. Grijalva, at

lgrijalva@csrarc.ga.gov. The deadline for receiving questions is November 20, 2017.

Responses to this RFP must be submitted to the above address:

Dave Larson, Building Official and Zoning Administrator

City of Sandersville

141 W. Haynes Street

P. O. Box 71

Sandersville, Georgia 31082

dlarson@sandersville.net

Proposals are due on or before 4:00 p.m. local time, November 27, 2017. Packages should be clearly marked, "Brownfield Project RFP." Any proposals received later than the submission deadline will not be accepted or considered.

All RFPs will be evaluated in terms of project approach, timing, experience, quality of work, and capacity of performance. Previous experiences with EPA Brownfield Cleanup Grants are desired. Past performances on similar projects will be assessed in terms of timeliness, completing work within budget, quality of work and other factors. After careful review and consideration, the City of Sandersville will select the best-suited firm(s) for the services described in this RFP package.

The City of Sandersville reserves the right to reject any or all proposals and waive formalities. The City of Sandersville is an Equal Opportunity Employer. Local, minority, female owned, and small businesses are encouraged to submit an RFP.



BACKGROUND

The goal of this Brownfield Cleanup Project is to address the abandoned Downtown Café property that is currently vacant. The property is a significant impediment to efforts being undertaken to revitalize and improve the area as it lies in the footprint of the Harris Street Master Plan. This plan includes developing a park, trailhead, and a landscaped parking area in the heart of downtown.

The City contacted EPA's Targeted Brownfields Assessment Program and a Phase I Environmental Site Assessment (ESA) and a Phase II ESA were completed by a contractor for EPA Region 4. On November 24, 2014, the Brownfields Program of the Georgia Department of Natural Resources, Environmental Protection Division accepted the Brownfields Prospective Purchaser Corrective Action Plan for cleanup of the property, and the City of Sandersville subsequently acquired the property. The property has several specific environmental concerns that need to be addressed, including removal of the underground storage tank system (including the tanks and product piping); removing approximately 550 cubic yards (cyd) of soils contaminated with petroleum hydrocarbons, PAHs, and metals; and demolition and removal of the existing site building (including asbestos abatement and disposal).

In December 2015, a draft ABCA was prepared to address cleanup of the Downtown Café property. Based on the geophysical survey and fill port observations, there are four 3,000-gallon USTs present that will require removal. Additionally, ACM was reported in four materials present in the former restaurant building, and LBP is assumed present in the building.

In addition to soil impacts, the Phase II ESA identified limited impacts to groundwater that may or may not be related to historical activities conducted at this site. However, as a result of these limited impacts and the terms of the Bona fide Prospective Purchaser Corrective Action Plan, this ABCA makes the base assumption that all alternatives will include a deed restriction prohibiting use of groundwater beneath the property for drinking or irrigation purposes. The selected remedial alternative is anticipated to be the "Excavation and Off-Site Disposal" option. Contaminated groundwater will not be addressed during the cleanup, instead institutional controls in the form of a restrictive covenant will be placed on the property to prevent use of groundwater.

Through the EPA's Targeted Brownfields Assessment Program the following reports were completed on the property.

- ASTM-compliant Phase I Environmental Site Assessment
- A Phase II Environmental Site Assessment
- A Corrective Action Plan

Summary documents along with pictures of the site are attached as Exhibit A.

SOURCE OF FUNDS

The project will be conducted with grant funds awarded to the city of Sandersville through the U.S. EPA Brownfield Cleanup Grant Program. The budget for the entire Brownfield Cleanup project is limited to the funds provided through the U.S. EPA grant together with the funds provided by the City of Sandersville (a total of \$180,125). All requirements with respect to this project are set forth in the Co-operative Agreement between the city of Sandersville and the U.S. EPA and attached as Exhibit B. All regulations, rules and guidelines referenced in the Co-operative Agreement must be carefully followed by the selected consultant. The selected consultant will also be required to document compliance with these requirements and to ensure the compliance of all of its subcontractors. In addition, the consultant and all contractors must comply with any and all applicable federal state and local requirements applicable to cleanup and demolition projects.

BROWNFIELD CLEANUP PROJECT SCOPE OF WORK

The general scope of work for the overall project is as follows. Further delineation of the scope of work for this phase of the project will be the task of the selected consultant. Cleanup will be completed in accordance with the approved CAP and state program requirements. Planned cleanup activities include:

- Removal of the four underground storage tanks and product lines.
- Building demolition including asbestos abatement.
- Excavation, removal, disposal, and backfilling of 550 cubic yards of contaminated soils to Georgia EPD Risk Reduction Standards.
- Confirmation sampling will be conducted following excavation activities to ensure impacted soils have been removed from the subject site.
- Prepare proper permit applications and notifications, oversight and reporting.

The current 4,200 square foot building will need to be demolished due to proximity of the building to two of the three underground storage tanks. Asbestos will be properly removed before demolition proceeds. In the case of ground water contamination underlying the site, a deed restriction to restrict the use of ground water will likely be required as an institutional control.

CONSULTANT'S SCOPE OF WORK

The following outlines the scope of services required by the City of Sandersville for this project. The scope of services, as outlined in the RFP, is preliminary. The final scope of services will be negotiated with the selected firm and modified as needed, depending on the site conditions. The scope of the project includes the following:

- Provide both environmental and civil engineering services such as, but not necessarily limited to these activities: Prepare Analysis of Brownfields Cleanup Alternatives (ABCA), Quality Assurance Project Plan, Community Involvement Plan, ACRES Database Updates, Prepare Remedial Design and Engineering/Bidding Documents, Construction/Project Oversight.

- Be the City's representative in dealing with contractors and applicable governmental agencies.
- Meet the requirements of the EPA Grant and the Cooperative Agreement Work Plan, plus the National Emissions Standards for Hazardous Air Pollutants (NESHAP) requirements of the Georgia Department of Natural Resources Environmental Protection Division (EPD), and any reporting requirements required.
- Assist the City in its effort to provide updates to and interface with the City Council; other applicable city, county, state, and federal governmental entities; and related interest groups/citizens.
- Public Involvement: The consultant will assist the City in preparing and disseminating information concerning cleanup options, engaging the public in meaningful dialog about redevelopment activities, and managing records. These activities may include developing a Community Action Plan, holding public meetings, conducting public option surveys, and establishing an information repository.
- Response Action: The consultant will implement the corrective action plan to the requirements of the US EPA Brownfield Cleanup Grant and the GA EPD.

CONSULTANT SELECTION PROCESS

A Selection Committee will be formed by the Project Manager and may include the following:

Mayor of Sandersville

Member(s) of Sandersville City Council

City Administrator

Chamber of Commerce

Planning and Zoning

Sandersville/Washington County Development Authority

Public Works

The selection committee shall be the sole judge of the best proposal and the resulting negotiated agreement. The committee reserves the right to investigate the reputation, integrity, skill, business experience, and quality of performance under similar operations before making a final decision and will be based on both an objective and subjective comparison of proposal and consultant. The selection committee reserves the right to require written questionnaire responses, telephone interviews, and/or conduct selection interviews with prospective consultant. Committee members shall not be contacted by any submitting firm during the proposal preparation and selection process.

REQUEST FOR PROPOSALS

General Conditions

1. The City reserves the right to accept or reject any and all RFPs and waive formalities in the best interest of the City of Sandersville. The City reserves the right to reject any RFP

that does not represent a complete response. The City reserves the right to reject all RFPs and to solicit and readvertise for other proposals. The City also reserves the right to reject any RFP of any consultant in arrears or in default upon any debt or contract to the city of Sandersville or who have failed, in the opinion of this body, to faithfully perform any previous contract with this body.

2. No questions may be directed to, or contacts made with the Mayor, members of City Council, the City Manager, or City staff members. Violation of this prohibition may result in the disqualification of the consultant from further consideration.
3. All questions with respect to the RFP must be submitted by email to Linda D. Grijalva, at lgrijalva@csrarc.ga.gov. The deadline for receiving questions is November 20, 2017.
4. Interested consultants are encouraged to submit their email address to Linda D. Grijalva lgrijalva@csrarc.ga.gov to ease in distribution of responses to questions.
5. RFPs must be submitted before the deadline and in the attached RFP FORMAT with all items included in order for the proposal to be considered.
6. The submitting firm is solely responsible to ensure timely delivery of its RFP package. The City will not be responsible for failure of service on the part of the U.S. Postal Service, commercial courier company or other delivery method.
7. Facsimile submission of the RFP package will not be accepted.
8. A Notice to Proceed will be issued once the agreement has been signed by both parties and all required paperwork herein described is received by the City.
9. The consultant will obtain all permits needed to complete the work.
10. No proposal may be withdrawn within 60 days after the submission date.
11. The RFP shall include understanding of the Project Goals and Scope of Work, Consultant Proposals and experience, references, list of key personnel, organizational profile, schedule of fees, and complete contact information.
12. Consultant will make presentations to the Sandersville City Council if requested.
13. A RFP does not constitute an agreement or a contract with the City of Sandersville.
14. The City is not liable for any expenses incurred in connection with the preparation of a response to this RFP.
15. Once opened, the RFP becomes the property of the City and will not be returned to the consultant. Upon opening, the proposal becomes public record and shall be subject to public disclosure in accordance with Georgia Open Records Act O.C.G.A. 50-18-70 et

seq., or other applicable laws.

16. Once the consultant deemed to be the best applicant is selected, a contract will be negotiated. The contract shall be deemed as having been awarded upon approval of the City Council during a regularly scheduled meeting and formal notice of acceptance of its proposal has been duly served upon the intended awarded by an agent of city of Sandersville authorized to give such notice.

INSTRUCTIONS FOR STATEMENT OF PROPOSALS

The RFP information shall be provided as specified below. Applicants who do not follow the guidelines listed below or do not provide comprehensive responses for all requested information will not be considered. Beyond the required minimum Proposals, the Primary Criteria for evaluating the Statement of Proposals are:

I. Firm Identification and Background Information

- A. Firm's name, email address, business postal address, contact name, telephone and fax numbers
- B. The firm's legal formation (e.g. corporation, sole proprietor, etc.) and state of incorporation, if applicable.

II. Proposals and Experience of the Firm

- A. Provide a concise history of the firm, its main partners/officers and largest shareholder.
- B. Provide a summary of previous U.S. EPA brownfield grant experience of the firm, including cleanup grants with similar work products as will be required by the City of Sandersville.
- C. Provide a detailed description of brownfield cleanup experience of the firm. Include project dates, project titles, community located, employees involved and original and estimated final costs.
- D. Include a description of the firm's resources, including staff, equipment and capital available for project use and deployment. Detail efforts made on previous projects to control costs.
- E. Demonstrate experience in preparing Analysis of Brownfield Cleanup Alternatives / Quality Assurance Project Plans (QAPPs) as required under federally funded environmental assessment activities.
- F. Provide any additional information that the service provider feels would support selection.

- G. Company brochure and promotional materials, if available. Please include these materials at the end of your submission.

III. Personnel

- A. Identify the Certified Professional and Project Manager (if different) who will be assigned to the contract.
- B. Provide a description of the firm's personnel with the Proposals necessary to complete the work in the contract program. Include personnel name, title, years of experience, education, billable rate and the number and title of projects assigned to the individual in the last three years.
- C. Supply resumes of personnel including the Certified Professional, who will be key to the success of the project. Please provide no more than eight (8) resumes.

IV. References

- A. Include five (5) clients for whom the firm has provided cleanup activities in the past three years. Provide the name, telephone number, and e-mail address of a contact for each client and a brief description of the services provided.

V. Required Attachments

- A. Certified Professional's name and certificate number.
- B. Copy of firm's standard contract.
- C. Standard billable rates for project personnel.
- D. Current certificate of professional liability, malpractice and errors and omissions insurance.
- E. Current certificate of general liability insurance
- F. Workers Compensation Certificate

Form for Statement of Proposals

Each RFP should be submitted on letter size (8.5"× 11") paper, with typing on one side only.

Cover Page:

Environmental Assessment Work to be Conducted Under the City's Cooperative Agreement
with the U.S. Environmental Protection Agency RFP

Request for Proposals for:
(Name of individual or firm submitting the RFP,
address, telephone, facsimile and e-mail information)

Date documents are being submitted.

Body: Statement of Proposals

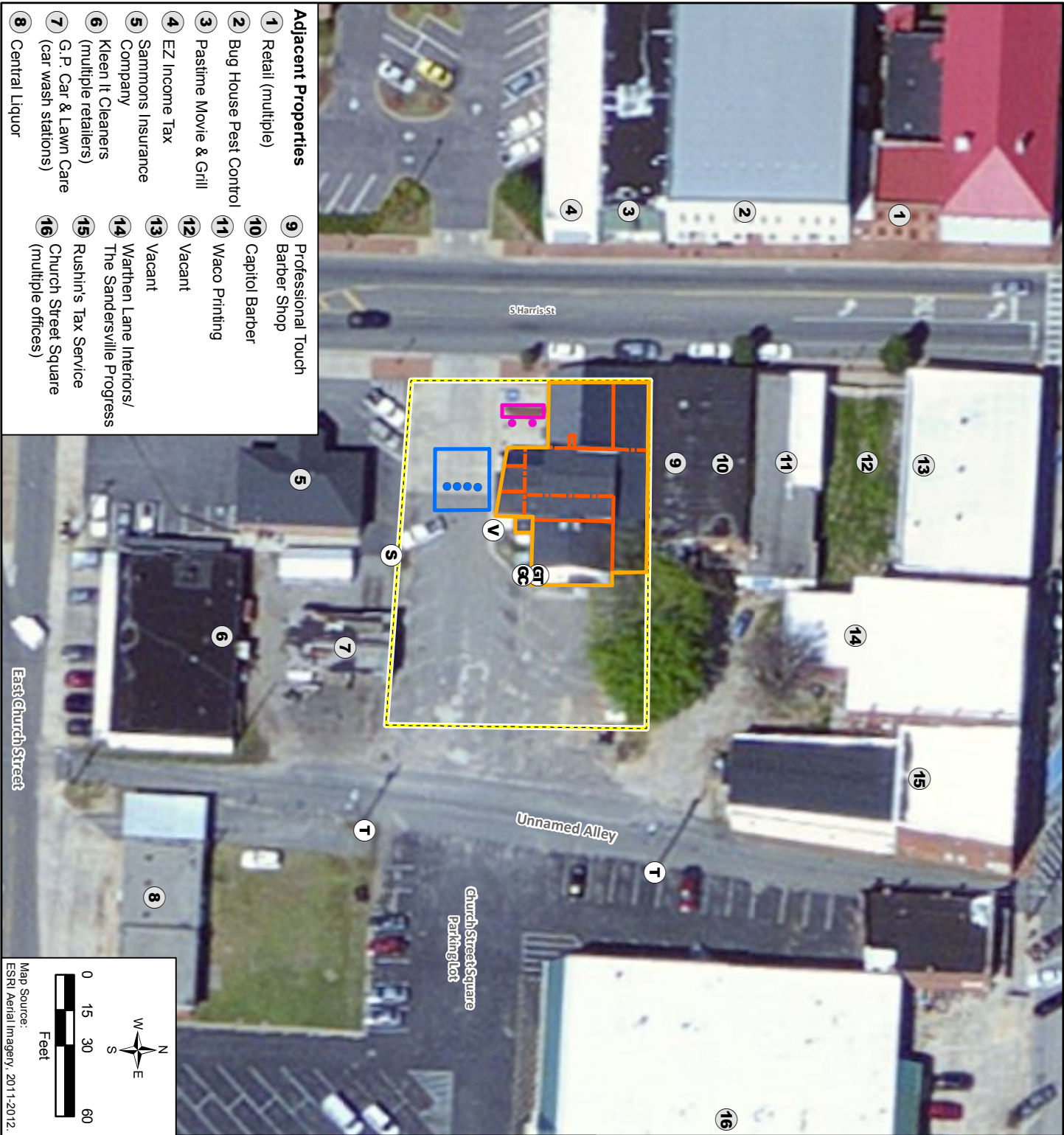
- I. Firm Identification and Background
- II. Proposals and Experience of Firm
- III. Personnel
- IV. References
- V. Required Attachments

RFP Submission Deadline

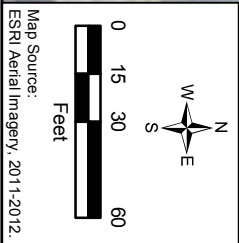
In order to be considered for this contract, prospective firms or individuals must submit four (4) copies of the RFP to:

Dave Larson, Building Official and Zoning Administrator
City of Sandersville
141 W. Haynes Street
P. O. Box 71
Sandersville, Georgia 31082
dlarson@sandersville.net

Proposals are due on or before 4:00 p.m. local time, November 27, 2017. Packages should be clearly marked, "Brownfield Project RFP." Any proposals received later than the submission deadline will not be accepted or considered. The interested firm is solely responsible to ensure timely delivery of its RFP package. The City will not be responsible for failure of service on the part of the U.S. Postal Service, commercial courier company or other delivery method. Any proposals received later than the submission deadline will not be accepted or considered. The consultant may withdraw their proposal by notifying Linda D. Grijalva in writing prior to the deadline. Consultant must disclose their identity and provide a signed receipt for the returned proposal.



- Adjacent Properties**
- | | |
|--|--|
| ① Retail (multiple) | ⑨ Professional Touch Barber Shop |
| ② Bug House Pest Control | ⑩ Capitol Barber |
| ③ Pastime Movie & Grill | ⑪ Waco Printing |
| ④ EZ Income Tax | ⑫ Vacant |
| ⑤ Sammons Insurance Company | ⑬ Vacant |
| ⑥ Kleen It Cleaners (multiple retailers) | ⑭ Warthen Lane Interiors/The Sandersville Progress |
| ⑦ G.P. Car & Lawn Care (car wash stations) | ⑮ Rushin's Tax Service |
| ⑧ Central Liquor | ⑯ Church Street Square (multiple offices) |



- Legend**
- Property Features**
- Valve Cover
 - Fill Ports
 - Ⓒ Former Grease Collection Box
 - Ⓖ Former Grease Trap
 - Ⓕ Storm Drain
 - Ⓗ Pole-Mounted Transformer
 - Ⓥ Possible UST Vent Pipes
 - Interior Wall
 - Division of Interior Area
 - ▭ Building Footprint
 - ▭ Former Fuel Dispenser Island
 - ▭ UST Area
 - ▭ Property Boundary
- Notes:
 TBA Targeted Brownfields Assessment
 UST Underground storage tank



United States Environmental Protection Agency
Region 4

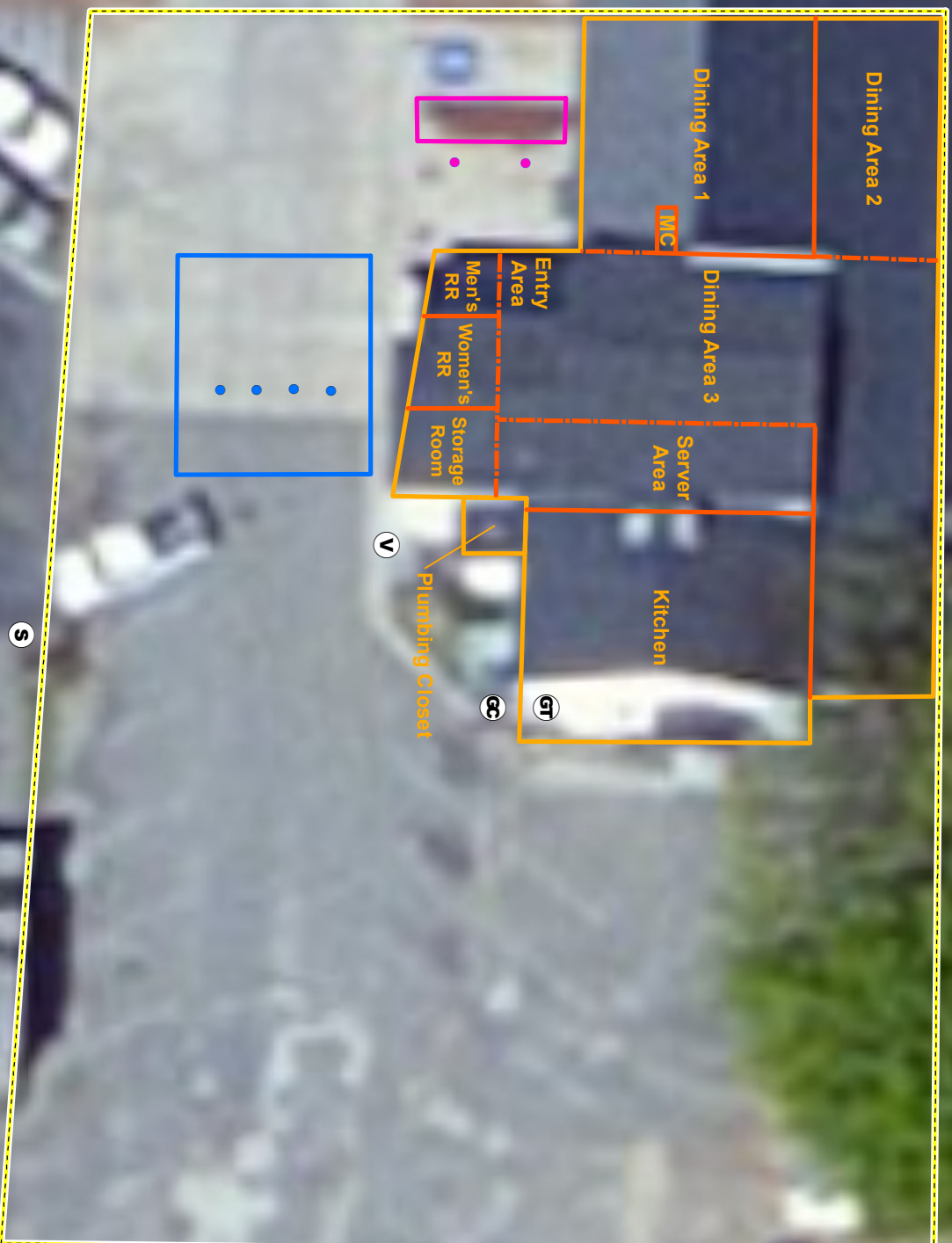
FIGURE 2

Site Vicinity

TDD Name: Downtown Café
TDD No.: TTEM1-05-003-0169
City: Sandersville **County:** Washington **State:** Georgia

Date: 3/4/2014
Analyst: Helen Mayoral

TETRA TECH



EXECUTIVE SUMMARY

This report presents the findings of a Phase II environmental site assessment (ESA) at the Downtown Café Petroleum Targeted Brownfields Assessment (TBA) site. This Phase II ESA was conducted by the Tetra Tech (Tetra Tech) Superfund Technical Assessment and Response Team (START) on behalf of the U.S. Environmental Protection Agency (EPA) under Contract Number (No.) EP-W-05-054, Technical Direction Document (TDD) No. TTEMI-05-003-0169.

The Downtown Café Petroleum TBA site (the site) is a former gasoline station located at 123 South Harris Street in a commercial area of Sandersville, Washington County, Georgia. The site covers about 0.4 acre of land in downtown Sandersville. Geographic coordinates of the approximate center of the site are latitude 32.982115 degrees north and longitude 82.810644 degrees west. The site is bordered to the north by Professional Touch Barber Shop, Capital Barber, Waco Printing, Warthen Lane Interiors, and the Sandersville Progress with vacant and commercial properties beyond, to the east by an unnamed alley and the Church Street Square parking lot with commercial properties beyond, to the south by car wash stations for G.P. Car and Lawn Care, Sammons Insurance Company, and Kleen It Cleaners with East Church Street and commercial properties beyond, and to the west by South Harris Street, EZ Income Tax, Pastime Movie and Grill, and Bug House Pest Control with commercial properties beyond.

A gasoline station operated on the site in the 1950s. By the mid-1960s, the site was being used as a restaurant. According to the Washington County Tax Assessor's Office, the former restaurant building was constructed in 1982. However, historical Sanborn maps, historical city directories, and interviews with local city officials indicate that the building was used as a convenience store associated with the gasoline station. The Georgia Environmental Protection Division (GAEPD) UST Management Program (USTMP) has no records for the site.

At present, all fuel dispensers have been removed. The area surrounding the former fuel dispenser island and the suspected underground storage tank (UST) area is covered by concrete. The remainder of the site is covered by asphalt. A grease trap, located in the former restaurant, was previously connected to an exterior in-ground grease collection box; the grease collection box was previously connected to the municipal sewer system. The site is not fenced. Local residents frequently use the parking lot as a cut-through between South Harris Street and the unnamed alley.

In November 2013, Tetra Tech conducted a Phase I ESA to evaluate the site history and site conditions and to identify recognized environmental conditions (RECs) or potential RECs, if any, present on site. Four fill ports are present in the center of the site. One of the fill ports was opened, and a gasoline odor was noted. A weighted string was lowered into the port, and the string hit the bottom of the suspected UST approximately 7 feet below ground surface (bgs). No product or sludge was observed on the string. Four vent pipes are located near the southeastern corner of the building. Based on historical Sanborn maps, historical city directories, and interviews with local city officials, a former fuel dispenser island lies just south of the building. Two metal covers stamped “water meter” are located near the former fuel dispenser island. Two valves are located under each “water meter” cover. Tetra Tech procured GEL Geophysics, LLC, to conduct a geophysical survey in preparation for the Phase II ESA sampling event. Several suspected utility lines were identified throughout the site. An area encompassing the four fill ports was identified as potentially containing buried objects, such as USTs. A suspected product line was detected leading from the valves at the former fuel dispenser island to the suspected UST area. Therefore, the valves may be fuel-related instead of water-related, as implied by the metal covers. Based on on-site observations and the geophysical survey, Tetra Tech determined that the UST system (USTs and product line piping) has not been removed.

A limited visual inspection of suspected asbestos-containing material (ACM) was conducted for the interior, exterior, and roof of the former restaurant. Numerous suspected ACMs were identified throughout the building.

Based on the site visit and a review of the available historical and environmental records, the following RECs were identified as associated with the property:

- The site was used as a railroad depot from 1908 to 1938. Spills could have occurred and contaminated the surrounding soils and groundwater. The potential for contamination associated with this past use constitutes a REC.
- By 1954, the site was developed with a gasoline station. USTs are suspected at the site based on the findings of the geophysical survey and the observation of fill ports and vent pipes. Gasoline could have spilled or leaked from the USTs into the surrounding soils and groundwater. The potential for contamination from the UST system constitutes a REC.

Other potential environmental hazards identified on the site include:

- Twenty-three homogenous areas suspected to contain ACM were identified at the site.

- According to the Washington County Assessor's Office, the building was constructed in 1982; however, the building was historically used as a convenience store associated with a gasoline station in the 1950s. It is likely that lead-based paint (LBP) was used in its construction.
- Evidence of water damage was observed in the interior of the building, indicating the potential for mold growth to be present. However, a mold assessment was outside the scope of the Phase I ESA.

A review of federal and state database information identified 24 facilities within the ASTM International-recommended search distances from the site. Eight of these facilities, such as drycleaners, historic gas stations, and UST sites, present RECs to the site based on the proximity to the site, presumed groundwater flow to the west-southwest, and potential releases from historical operations.

During the week of January 20, 2014, Tetra Tech conducted the Phase II ESA field work, including collection of 15 soil samples, four groundwater samples (including one duplicate), and 59 suspected ACM samples.

Two surface soil samples collected in the vicinity of the UST system contained total petroleum hydrocarbons (TPH)-diesel range organics (DRO) and TPH-gasoline range organics (GRO) at concentrations that exceed the GAEPD UST Soil Threshold Levels (STLs). One surface soil sample collected in the southeastern portion of the site also contained arsenic at a concentration that exceeds the EPA Regional Screening Level (RSL) for industrial soil.

One subsurface soil samples collected in the northeastern portion of the site contained arsenic at a concentration that exceeds the EPA RSL for industrial soil. No analyte was detected in the subsurface soil above the GAEPD STLs.

Groundwater samples contained benzene and benzo(a)pyrene at concentrations that exceed their respective EPA maximum contaminant levels (MCL).

Three suspected ACM samples contained asbestos at greater than 1 percent.

TABLE 3
DOWNTOWN CAFÉ PETROLEUM TBA
ANALYTICAL RESULTS FOR SURFACE SOIL SAMPLES

Analyte	GAEPD UST STL	DCP-SF01-02	DCP-SF02-02	DCP-SF03-02
BTEX (µg/kg)				
Benzene	5	5.6 U	2.8 U	5.93 U
Ethylbenzene	500	5.6 U	2.8 U	5.93 U
Toluene	400	5.6 U	2.8 U	5.93 U
Xylene (total)	27,000	11.2 U	5.59 U	11.9 U
PAHs (µg/kg)				
1-Methylnaphthalene	NL	4.49 U	3.95 U	3.99 U
2-Methylnaphthalene	NL	4.49 U	3.95 U	3.99 U
Acenaphthene	NL	4.49 U	3.95 U	3.99 U
Acenaphthylene	NL	4.49 U	3.95 U	3.99 U
Anthracene	NL	4.49 U	3.95 U	3.99 U
Benzo(a)anthracene	NL	4.49 U	3.95 U	3.99 U
Benzo(a)pyrene	NL	4.49 U	3.95 U	3.99 U
Benzo(b)fluoranthene	NL	4.49 U	3.95 U	3.99 U
Benzo(g,h,i)perylene	NL	4.49 U	3.95 U	3.99 U
Benzo(k)fluoranthene	NL	4.49 U	3.95 U	3.99 U
Chrysene	NL	4.49 U	3.95 U	3.99 U
Dibenz(a,h)anthracene	NL	4.49 U	3.95 U	3.99 U
Fluoranthene	NL	4.49 U	3.95 U	3.99 U
Fluorene	NL	4.49 U	3.95 U	3.99 U
Indeno(1,2,3-cd)pyrene	660	4.49 U	3.95 U	3.99 U
Naphthalene	NL	4.49 U	3.95 U	3.99 U
Phenanthrene	NL	4.49 U	3.95 U	3.99 U
Pyrene	NL	4.49 U	3.95 U	3.99 U
Total Petroleum Hydrocarbons (µg/kg)				
Diesel Range Organics	10,000	9,910	2,360 J-	4,840 U
Gasoline Range Organics	10,000	4,750 U	5,490 U	5,270 U
Metals (µg/kg)	EPA RSL Industrial Soil			
Arsenic	2,400	1,460	553	500
Barium	19,000,000	11,800	6,510	22,200
Cadmium	80,000	544 U	475 U	484 U
Chromium ¹	150,000,000	31,400	20,800	36,700
Lead ²	800,000	12,600	8,780	8,330
Mercury ³	4,300	33	22	16
Silver	510,000	544 U	475 U	484 U

TABLE 3
DOWNTOWN CAFÉ PETROLEUM TBA
ANALYTICAL RESULTS FOR SURFACE SOIL SAMPLES

Analyte	GAEPD UST STL	DCP-SF04-02	DCP-SF05-02	DCP-UST-SF01-02
BTEX (µg/kg)				
Benzene	5	4.53 U	6.72 U	225 U
Ethylbenzene	500	4.53 U	6.72 U	394
Toluene	400	4.53 U	6.72 U	25.2 J
Xylene (total)	27,000	9.07 U	13.4 U	680
PAHs (µg/kg)				
1-Methylnaphthalene	NL	3.73 U	19.4	558
2-Methylnaphthalene	NL	3.73 U	25	1,250
Acenaphthene	NL	3.73 U	3.67 U	17.1
Acenaphthylene	NL	3.73 U	3.67 U	11.6
Anthracene	NL	3.73 U	3.67 U	6.07
Benzo(a)anthracene	NL	3.73 U	3.67 U	9.56
Benzo(a)pyrene	NL	3.73 U	3.67 U	5.01
Benzo(b)fluoranthene	NL	3.73 U	3.67 U	59
Benzo(g,h,i)perylene	NL	3.73 U	3.67 U	10.2
Benzo(k)fluoranthene	NL	3.73 U	3.67 U	5.06
Chrysene	NL	3.73 U	3.67 U	8.12
Dibenz(a,h)anthracene	NL	3.73 U	3.67 U	6.76
Fluoranthene	NL	3.73 U	3.67 U	9.39
Fluorene	NL	3.73 U	3.67 U	13.3
Indeno(1,2,3-cd)pyrene	660	3.73 U	3.67 U	54.7
Naphthalene	NL	3.73 U	17.9	568
Phenanthrene	NL	3.73 U	3.67 U	15.7
Pyrene	NL	3.73 U	3.67 U	7.99
Total Petroleum Hydrocarbons (µg/kg)				
Diesel Range Organics	10,000	4,520 U	4,450 UJ	3,010 J-
Gasoline Range Organics	10,000	4,770 U	5,670 U	212,000
Metals (µg/kg)	EPA RSL Industrial Soil			
Arsenic	2,400	1,140 J-	3,640	298 J
Barium	19,000,000	24,700	116,000	10,600
Cadmium	80,000	452 U	445 U	186 J
Chromium ¹	150,000,000	41,500	19,300	3,260
Lead ²	800,000	9,750	38,300	43,700
Mercury ³	4,300	31	270	12 U
Silver	510,000	452 U	445 U	421 U

TABLE 3
DOWNTOWN CAFÉ PETROLEUM TBA
ANALYTICAL RESULTS FOR SURFACE SOIL SAMPLES

Analyte	GAEPD UST STL	DCP-UST-SF02-02	DCP-UST-SF03-02	DCP-UST-SF04-02
BTEX (µg/kg)				
Benzene	5	5.18 U	4.4 U	0.313 J
Ethylbenzene	500	5.18 U	4.4 U	4.43 U
Toluene	400	5.18 U	4.4 U	0.65 J
Xylene (total)	27,000	10.4 U	8.79 U	8.85 U
PAHs (µg/kg)				
1-Methylnaphthalene	NL	5.1	4	21.8
2-Methylnaphthalene	NL	6.14	5.26	27.7
Acenaphthene	NL	3.61 U	3.86 U	3.64 U
Acenaphthylene	NL	3.61 U	3.86 U	37
Anthracene	NL	2.2 J	1.33 J	39.9
Benzo(a)anthracene	NL	10.2	6.68	141
Benzo(a)pyrene	NL	7.86	3.86 U	129
Benzo(b)fluoranthene	NL	65	3.86 U	221
Benzo(g,h,i)perylene	NL	5.48	3.86 U	127
Benzo(k)fluoranthene	NL	4.85	3.86 U	58.4
Chrysene	NL	9.42	5.53	133
Dibenz(a,h)anthracene	NL	3.61 U	3.86 U	15
Fluoranthene	NL	13.4	6.91	309
Fluorene	NL	3.61 U	3.86 U	3.64 U
Indeno(1,2,3-cd)pyrene	660	3.61 U	3.86 U	218
Naphthalene	NL	3.61 U	3.86 U	17.7
Phenanthrene	NL	8.35	6.62	135
Pyrene	NL	13.1	7.01	253
Total Petroleum Hydrocarbons (µg/kg)				
Diesel Range Organics	10,000	16,800 J-	2,510 J-	2,810 J-
Gasoline Range Organics	10,000	5,030 U	4,490 U	6,180
Metals (µg/kg)				
	EPA RSL Industrial Soil			
Arsenic	2,400	559	1,380	1,960
Barium	19,000,000	13,200	21,900	94,800
Cadmium	80,000	157 J	464 U	375 J
Chromium ¹	150,000,000	4,690	15,900	9,370
Lead ²	800,000	35,200	33,300	184,000
Mercury ³	4,300	13 U	73	200
Silver	510,000	438 U	464 U	171 J

TABLE 3
DOWNTOWN CAFÉ PETROLEUM TBA
ANALYTICAL RESULTS FOR SURFACE SOIL SAMPLES

Notes:

¹	Value listed is for Chromium III, insoluble salts.
²	Value listed is for Lead and compounds.
³	Value listed is for Mercury (elemental).
BTEX	Benzene, toluene, ethylbenzene, and xylenes
DCP	Downtown Café Petroleum TBA
EPA	U.S. Environmental Protection Agency
GAEPD	Georgia Environmental Protection Division
HQ	Hazard quotient
J	The analyte was positively identified; the associated value is the approximate concentration of the analyte in the sample.
J-	The analyte was positively identified; the associated value is the approximate concentration of the analyte in the sample and may be biased low.
µg/kg	Micrograms per kilogram
NL	Not listed
PAHs	Polycyclic aromatic hydrocarbons
RSL	Regional Screening Level, November 2013, HQ = 0.1
SF	Surface soil
STL	Soil Threshold Levels, Lower Groundwater Pollution Susceptibility Area, <500 feet to withdrawal point.
TBA	Targeted Brownfields Assessment
U	The analyte was not detected at or above the associated value (reporting limit [RL]).
UJ	The analyte was analyzed for, but was not detected at or above the associated value (RL), which is considered approximate due to deficiencies in one or more QC criteria.
UST	Underground storage tank
BOLD	Bolded values indicate a detection of the analyte above the laboratory RL.
	Shaded values equal or exceed the associated STL or RSL.

TABLE 4
DOWNTOWN CAFÉ PETROLEUM TBA
ANALYTICAL RESULTS FOR SUBSURFACE SOIL SAMPLES

Analyte	GAEPPD UST STL	DCP-SB01-10	DCP-SB02-10	DCP-SB03-10	DCP-SB04-10	DCP-SB05-10	DCP-UST-SB03-10
BTEX (µg/kg)							
Benzene	5	0.311 J	4.02 U	4.35 U	7.44 U	6.73 U	5.52 U
PAHs (µg/kg)							
Anthracene	NL	3.96 U	3.85 U	3.9 U	5.51	3.9 U	3.93 U
Benzo(a)anthracene	NL	3.96 U	3.85 U	3.9 U	8.25	3.9 U	3.93 U
Benzo(a)pyrene	NL	3.96 U	3.85 U	3.9 U	4.07 J	3.9 U	3.93 U
Benzo(b)fluoranthene	NL	3.96 U	3.85 U	3.9 U	72.1	3.9 U	3.93 U
Benzo(g,h,i)perylene	NL	3.96 U	3.85 U	3.9 U	10.4	3.9 U	3.93 U
Benzo(k)fluoranthene	NL	3.96 U	3.85 U	3.9 U	5.57	3.9 U	3.93 U
Chrysene	NL	3.96 U	3.85 U	3.9 U	7.38	3.9 U	3.93 U
Dibenz(a,h)anthracene	NL	3.96 U	3.85 U	3.9 U	9.17	3.9 U	3.93 U
Fluoranthene	NL	3.96 U	3.85 U	3.9 U	6.2	3.9 U	3.93 U
Fluorene	NL	3.96 U	3.85 U	3.9 U	6.39	3.9 U	3.93 U
Indeno(1,2,3-cd)pyrene	660	3.96 U	3.85 U	3.9 U	67.1	3.9 U	3.93 U
Phenanthrene	NL	3.96 U	3.85 U	3.9 U	5.84	3.9 U	3.93 U
Pyrene	NL	3.96 U	3.85 U	3.9 U	5.11	3.9 U	3.93 U
Total Petroleum Hydrocarbons (µg/kg)							
Diesel Range Organics	10,000	3,120 J-	2,970 J-	1,870 J-	5,360 U	4,140 J-	4,760 U
Metals (µg/kg)	EPA RSL Industrial Soil						
Arsenic	2,400	395 J	403 J	270 J	9,790	501	544
Barium	19,000,000	2,040	2,180	2,920	7,940	5,390	4,350
Chromium ¹	150,000,000	32,100	13,000	9,050	28,000	8,600	11,900
Lead ²	800,000	9,730	7,500	6,470	15,400	5,170	5,170
Mercury ³	4,300	22	14 U	14 U	15 J	14 U	11 J

TABLE 4
DOWNTOWN CAFÉ PETROLEUM TBA
ANALYTICAL RESULTS FOR SUBSURFACE SOIL SAMPLES

Notes:	
1	Value listed is for Chromium III, insoluble salts.
2	Value listed is for Lead and compounds.
3	Value listed is for Mercury (elemental).
BTEX	Benzene, toluene, ethylbenzene, and xylenes
DCP	Downtown Café Petroleum TBA
EPA	U.S. Environmental Protection Agency
GAEPD	Georgia Environmental Protection Division
HQ	Hazard quotient
J	The analyte was positively identified; the associated value is the approximate concentration of the analyte in the sample.
J-	The analyte was positively identified; the associated value is the approximate concentration of the analyte in the sample and may be biased low.
µg/kg	Micrograms per kilogram
NL	Not listed
PAHs	Polycyclic aromatic hydrocarbons
RSL	Regional Screening Level, November 2013, HQ = 0.1
SB	Subsurface soil
STL	Soil Threshold Levels, Lower Groundwater Pollution Susceptibility Area, <500 feet to withdrawal point.
TBA	Targeted Brownfields Assessment
U	The analyte was not detected at or above the associated value (reporting limit [RL]).
UST	Underground storage tank
BOLD	Bolded values indicate a detection of the analyte above the laboratory RL.
	Shaded values equal or exceed the associated STL or RSL.

TABLE 5
DOWNTOWN CAFÉ PETROLEUM TBA
ANALYTICAL RESULTS FOR GROUNDWATER SAMPLES

Analyte	EPA MCL	DCP-GW-UST01	DCP-GW-UST02	DCP-GW-UST04	DCP-GW-UST04-DUP
BTEX (µg/L)					
Benzene	5	127	8.11	0.911 J	0.841 J
Ethylbenzene	700	30.8	0.76 J	0.364 J	0.384 J
Xylene (total)	10,000	99.4	1.35 J	15 U	15 U
PAHs (µg/L)					
1-Methylnaphthalene	NL	9.63	0.454	0.692	0.959
2-Methylnaphthalene	NL	19.6	0.562	1.18	1.51
Acenaphthene	NL	0.1 U	0.1 U	0.151 J	0.234 J
Acenaphthylene	NL	0.1 U	0.1 U	0.1 UJ	0.478 J
Anthracene	NL	0.1 U	0.1 U	0.087 J	1.31 J
Benzo(a)anthracene	NL	0.1 U	0.1 U	0.1 UJ	1.34 J
Benzo(a)pyrene	0.2	0.1 U	0.1 U	0.1 UJ	0.82 J
Benzo(b)fluoranthene	NL	0.1 U	0.1 U	0.1 UJ	2.16 J
Benzo(g,h,i)perylene	NL	0.1 U	0.1 U	0.1 UJ	0.481 J
Benzo(k)fluoranthene	NL	0.1 U	0.1 U	0.1 UJ	0.255 J
Chrysene	NL	0.1 U	0.1 U	0.1 UJ	1.17 J
Fluoranthene	NL	0.1 U	0.1 U	0.1 UJ	2.13 J
Fluorene	NL	0.1 U	0.1 U	0.113 J	0.361 J
Indeno(1,2,3-cd)pyrene	NL	0.1 U	0.1 U	0.1 UJ	1.77 J
Naphthalene	NL	22.4	0.966	0.824	0.764
Phenanthrene	NL	0.1 U	0.1 U	0.23	3.59 J
Pyrene	NL	0.1 U	0.1 U	0.1 UJ	2.96 J

TABLE 5
DOWNTOWN CAFÉ PETROLEUM TBA
ANALYTICAL RESULTS FOR GROUNDWATER SAMPLES

Notes:	
BTEX	Benzene, toluene, ethylbenzene, and xylenes
DCP	Downtown Café Petroleum TBA
DUP	Duplicate
EPA	U.S. Environmental Protection Agency
GW	Groundwater
J	The analyte was positively identified; the associated value is the approximate concentration of the analyte in the sample.
MCL	Maximum Contaminant Level for drinking water, May 2009
µg/L	Micrograms per liter
NL	Not listed
PAHs	Polycyclic aromatic hydrocarbons
TBA	Targeted Brownfields Assessment
U	The analyte was not detected at or above the associated value (reporting limit [RL]).
UJ	The analyte was analyzed for, but was not detected at or above the associated value (RL), which is considered approximate due to deficiencies in one or more QC criteria.
UST	Underground storage tank
BOLD	Bolded values indicate a detection of the analyte above the laboratory RL.
	Shaded values equal or exceed the associated MCL.

TABLE 6
DOWNTOWN CAFÉ PETROLEUM TBA
ANALYTICAL RESULTS FOR IDW SAMPLES

Analyte	EPA TCLP Limits ¹	DCP-IDW-SOIL	DCP-IDW-WATER
TCLP Volatile Organic Compounds			
	NA	ND	ND
TCLP Semivolatile Organic Compounds			
	NA	ND	ND
TCLP Metals (mg/L)			
Barium	100	0.16 J+	0.5 U

Notes:

¹	EPA 40 CFR 261.24 regulatory limits
CFR	<i>Code of Federal Regulations</i>
DCP	Downtown Café Petroleum
EPA	U.S. Environmental Protection Agency
IDW	Investigation-derived Waste
J+	The analyte was positively identified; the associated value is the approximate concentration of the analyte in the sample and may be biased high.
mg/L	Milligrams per liter
NA	Not applicable
ND	Not detected at or above the Method Detection Limit
TBA	Targeted Brownfields Assessment
TCLP	Toxicity Characteristic Leaching Procedure
U	The analyte was not detected at or above the associated value (reporting limit [RL]).

6.0 CORRECTIVE ACTION PLAN

As described in Section 4.0, soil conditions that require remediation based on preliminary screening criteria have been identified. However, the primary intent of the applicant is to comply with residential (Type 1 or 2 [lead only]) soil risk reduction standards (RRSs), as appropriate for the planned use of the property, and to remove source material.

In order to obtain additional GAEPD approval in preparation for remedial action, this BFPPCAP: 1) provides the applicable RRSs calculations in Appendix C, 2) documents in more detail a basic approach for soil remediation, and 3) establishes a procedure to modify remedial actions for certain soil conditions at the Site where the basic approach is impractical through amendments to the BFPPCAP. Amendments will be submitted for approval only if conditions/changes are encountered during UST system removal and Site redevelopment activities.

6.1 SITE-SPECIFIC RISK REDUCTION STANDARDS

The proposed Type 1 and 2 RRSs, including toxicity values, exposure assumptions, and chemical-specific parameters, have been prepared in accordance with the GAEPD *Comparison of Existing Contamination to Risk Reduction Standards 391-3-19-.07* document.

- Type 1 RRSs for all detected constituents and a Type 2 RRS value for lead have been developed and are presented in Appendix C.
- Type 2 Soils – the only constituent that was identified with concentrations above the Type 1 soil concentration was lead; therefore, a Type 2 RRS was calculated for this constituent. Consistent with GAEPD guidance, two values were calculated: one was determined using USEPA (1996 and 2002) guidance to estimate the soil concentration that would be protective of groundwater assuming a dilution attenuation factor (DAF) of 1. Equation 4-10 was the basis of the calculation, and a partition coefficient for lead - $\text{Log } K_d = 4.2$ (USEPA 2005) was used in the calculation. The other value was determined using the Integrated Exposure Uptake Biokinetic (IEUBK) Model for Lead in Children (USEPA 2009b) consistent with the assumptions prescribed in the RRS guidance.

When the Phase II ESA sampling results were compared to the RRSs, lead at a concentration of 184,000 micrograms per kilogram ($\mu\text{g/kg}$) in surface soil sample DCP-UST-SF04-02, collected east of the USTs, exceeded the Type 1 RRS of 75,000 $\mu\text{g/kg}$. However, this concentration does not exceed the Type 2 RRS value of 237,738 $\mu\text{g/kg}$. No other constituent was detected in surface or subsurface soils above Type 1 or 2 RRS values.

In accordance with the GAEPD, liability protection for groundwater is limited to providing a baseline determination of contaminants detected in groundwater underlying the site. Analytical results of groundwater samples collected during the Phase II ESA indicate the presence of benzene, ethylbenzene, xylene, and PAHs.

Tables comparing the Phase II ESA soil analytical results to the site-specific RRSs and a presentation of the groundwater results are provided in Appendix D. The data validation report and laboratory results for the Phase II ESA soil and groundwater samples are provided in Appendix E.

6.2 REMEDIAL APPROACH

The remedial approach addresses cleanup options for the UST system, contaminated soil and groundwater, and ACM. Analytical results from confirmation soil and groundwater samples to be collected after cleanup activities are anticipated to meet the RRSs.

6.2.1 UST System Removal and Soil Excavation

Soil and groundwater contamination detected during the Phase II ESA at the Site is consistent with a leaking UST system (USTs, dispensers, product line piping). Furthermore, contamination detected in samples located along the Site perimeter suggests that there may be off-Site impacts. Based on a geophysical survey and fill port observation and gauging, it appears that the UST system is still in place, including an estimated four, 3,000-gallon USTs. Tetra Tech recommends a UST system removal and remediation plan be implemented.

Prior to any UST system removal, the USTs will need to be registered with GAEPD using form GUST-42 *State of Georgia Notification Data for Underground Storage Tank*, and GAEPD will need to be notified of the intent to remove the UST system using form GUST-29 *Georgia Underground Storage Tank Closure Activity Form*. These documents may be submitted concurrently.

All UST system removal activities will be conducted in accordance with the GAEPD USTMP. UST system removal will include the removal of the four USTs, dispenser island, all associated product piping, and contaminated soil around and beneath the UST system. All excavated soil will be placed in roll off boxes, transported to a disposal facility, and replaced with certified-clean backfill from off Site. In addition to soil around and beneath the UST system, contamination is likely beneath the on-site building that will be demolished as part of the redevelopment process.

To satisfy both the GAEPD USTMP and Brownfields Programs, following the removal of petroleum UST systems Tetra Tech will collect confirmation soil samples from the sidewalls and base of the excavation as follows: one soil sample for every 25 linear feet of sidewall and one soil sample per 500 to 1,000 square feet of base area from the excavation. If groundwater is encountered in the excavation, base samples will not be collected. Groundwater samples also will be collected from various locations surrounding the excavation area. The soil and groundwater samples will be analyzed for volatile organic compounds using EPA Method 8260B and lead using EPA Method 6020A. The depth of contamination (down to groundwater) is about 30 feet. A quick turnaround time of two days for laboratory results is recommended in order to evaluate soil and groundwater conditions immediately following removal of the UST system and prior to Site restoration. Soil samples will be compared to the RRSs presented in

Section 6.1 and Appendix C. The intent of the soil samples is to delineate the extent of contamination, if any, beneath the UST system components and determine if cleanup goals have been met. Groundwater samples will be collected to further characterize the baseline contaminants detected in groundwater underlying the Site, with the intent of providing the City of Sandersville liability protection for all VOCs.

UST system removal and soil excavation represents the quickest means of eliminating the source and reducing soil and groundwater contaminants. Following removal of the UST system, a UST closure report will be submitted to GAEPD USTMP.

Following the collection of groundwater samples for the full suite of VOCs using EPA Method 8260B, a determination will be made regarding the need to evaluate the potential impacts to adjacent properties from groundwater to indoor air via the vapor intrusion pathway.

6.2.2 Asbestos Abatement

Of the 59 suspected ACM samples collected, three samples contained asbestos at greater than 1 percent. These samples were collected from 12-inch by 12-inch beige ceramic tile with rock texture and grout/mastic and analyzed in multiple layers. This type of floor tile is non-friable, resilient floor covering material and is, therefore, not regulated asbestos-containing material (RACM) as long as it is not subjected to grinding, cutting, sanding, or abrading. This homogenous area may remain with the demolition debris as long as it remains in good condition; however, doing so could increase disposal costs.

Often the most economical means of addressing resilient floor covering classified as non-friable non-RACM is to remove and dispose of it separately, prior to demolition, thus preventing all demolition debris from being contaminated. Non-RACM removal and disposal should only be undertaken by a contractor familiar with state and federal asbestos regulations. A *Georgia Project Notification Form for Asbestos Renovation, Encapsulation, or Demolition* should be submitted to GAEPD at least 10 days prior to any removal or demolition.

7.0 SCHEDULE

Current plans include removal of ACM, demolition of the on-site building, removal of the UST system, excavation of contaminated soil, redevelopment, and other ground disturbing activities. Site acquisition is anticipated in December 2014 shortly after acceptance into the Georgia Brownfields Program. Subsequently, the City of Sandersville will apply for Brownfields cleanup grants to begin corrective action and site remediation. The demolition and redevelopment process will likely take about two to three months.

Corrective action in areas of known impact (the UST system) and previously unknown environmental conditions, if any, will most likely occur immediately following demolition of the on-site building. The CSR for the property is anticipated to be completed within three months of completion of corrective action at the site. Corrective action is anticipated to be completed by December 2015; therefore, the CSR is expected to be completed by the end of March 2016.