STATE OF ALABAMA
SURFACE MINING COMMISSION

Permit Number:P- 4003

License Number:L- 848

PERMIT TO ENGAGE IN SURFACE COAL MINING OPERATIONS

Pursuant to **The Alabama Surface Mining Control and Reclamation Act of 1981**, as amended, **ALA. Code** Section 9-16-70 et. seq. (1975) a permit to engage in Surface Coal Mining Operations in the State of Alabama is hereby granted to:

Warrior Met Coal BC, LLC
16243 Highway 216
Brookwood, AL 35444

Such operations are restricted to 14 acres as defined on the permit map and located in:

*See attachment for legal description

This permit is subject to suspension or revocation upon violation of any of the following conditions:

1. The permittee shall conduct Surface Coal Mining and Reclamation Operations in accordance with the plans, provisions and schedules in the permit application.

2. The permittee shall conduct operations in a manner to prevent damage or harm to the environment and public health and safetv and shall notify ASMC and the public in accordance with ASMC Rule 880-X-8K-.10 of any condition which threatens the environment or public health and safety.

Attachment
LEGAL DESCRIPTION
P-4003-32-28-S

LOCATED IN THE NW/NW AND NE/NW OF SECTION 14, TOWNSHIP 16 SOUTH, RANGE 10 WEST, FAYETTE COUNTY, ALABAMA.

CONDITIONS TO BE PLACED ON PERMIT P-4003-32-28-S.

3. Surface coal mining operations are restricted to those areas for which sufficient bond has been posted with ASMC. On the date of issuance of this permit, bond was posted only for increment(s) 1 consisting of 14 acres as defined on the permit map.

4. No mining disturbance is to occur on any part of the permit on which legal "right of entry" has not been obtained. When such rights are "pending" the applicant shall submit acceptable evidence to the Director, that such rights have been obtained according to ASMC Regulation 880-X-8D-.07.

5. No disturbance is to occur on any properties on which land use comments from legal owners of record are "pending" prior to the applicant providing acceptable comments.

6. No disturbance is to occur in the 300' setback area to any occupied dwelling prior to the applicant providing acceptable evidence to ASMC of its having secured a waiver of each subject area signed by the owner of the dwelling.

7. No mining disturbance shall occur within the 100' setback of any public road or the relocation of any public road prior to the applicant providing acceptable evidence, to the Director, of its having secured approval for a waiver from the appropriate jurisdictional authority and specific written waiver from ASMC.

8. The permittee shall notify the ASMC and seek consultation with the US Fish and Wildlife Service if:

   a. The permit is modified in any way that causes an effect on species or Critical Habitat listed under the Endangered Species Act of 1973.
   b. New information reveals the operation may affect Federally protected species or designated Critical Habitat in a manner or extent not previously considered or
   c. A new species is listed or Critical Habitat is designated under the Endangered Species Act that may be affected by the operation.

9. The permittee shall contact the ASMC and consult with the Alabama Historic Preservation Officer if the permit is modified or if previously unknown archaeological or historic resources are discovered on the permit area. Upon discovery of previously unknown artifacts or archaeological features the permittee shall cease operations until the Alabama Historic Preservation Officer approves resumption of operations.

10. The permittee may only conduct tree removal from October 15 through March 31.

11. If tree removal from the potential summer roosting habitat is necessary outside October 15 through March 31 timeframe an Indiana Bat and Northern Long-Eared Bat presence/absence survey must be conducted, and the U.S. Fish & Wildlife Service approval must be submitted to ASMC prior to tree removal.

DATE ISSUED: **December 19, 2023**

EFFECTIVE DATE: **December 19, 2023**

EXPIRATION DATE: **December 19, 2028**

SM 12/19/2023

Kathy H. Love

Kathy H. Love, Director

FINDINGS TO BE PLACED ON PERMIT NO.: P-4003-32-28-S PAGE 1

The ASMC, acting by and through its Director, hereby finds, on the basis of information set forth in the application or from information otherwise available, that --

1. The permit application is complete and accurate, and the applicant has complied with all requirements of the Act and the regulatory program.

2. The applicant has demonstrated that reclamation as required by the Act and the regulatory program can be accomplished under the reclamation plan contained in the permit application.

3. The proposed permit area is:

   (a) Not within an area under study or administrative proceedings under a petition, filed pursuant to Chapter 880-X-7 to have an area designated as unsuitable for surface coal mining operations.

   (b) Not within an area designated as unsuitable for mining pursuant to Chapter 880-X-7 or subject to the prohibitions or limitations of Section 880-X-7B.-06 and Section 880-X-7B-.07 of this chapter; or

4. For mining operations where the private mineral estate to be mined has been severed from the private surface estate, the applicant has submitted to the Regulatory Authority the documentation required under Section 880-X-8D.07 and Section 880-X-8G-.07 of this chapter.

5. The Regulatory Authority has made an assessment of the probable cumulative impacts of all anticipated coal mining on the hydrologic balance in the cumulative impact area and has determined that the proposed operation has been designed to prevent material damage to the hydrologic balance outside the permit area.

6. The applicant has demonstrated that any existing structure will comply with Section 880-X-2B-.01, and the applicable performance standards of Chapter 3 or 10.

7. The applicant has paid all reclamation fees from previous and existing operations as required by 30 C.F.R., Subchapter R.

8. The applicant has satisfied the applicable requirements of Subchapter 880-X-8J.

9. The applicant has, if applicable, satisfied the requirements for approval of a long-term, intensive agricultural, postmining land use, in accordance with the requirements of 880-X-l0C-.58(4) and 880-X-10D-.52(4).

10. The operation will not affect the continued existence of endangered or threatened species or result in destruction or adverse modification of their critical habitats, as determined under the Endangered Species Act of 1973 (16 U.S.C. 1531 et seq.).

11. The Regulatory Authority has taken into account the effect of the proposed permitting action on properties listed or eligible for listing on the National Register of Historic Places. This finding is supported in part by inclusion of appropriate permit conditions or changes in the operation plan protecting historic resources, or a documented decision that the Regulatory Authority has determined that no additional protection measures are necessary.

12. For a proposed remining operation where the applicant intends to reclaim in accordance with the requirements of Section 880-X-l0C-.56 or 880-X-10D.-49, the site of the operation is a previously mined area as defined in Section 880-X-2A-.06.

13. Surface coal mining and reclamation operations will not adversely affect a cemetery.

14. After application approval but prior to issue of permit, ASMC reconsidered its approval, based on the compliance review required by Section 880-X-8K-.10(2)(a) in light of any new information submitted under 880-X-8D-.05(8).

15. The applicant has submitted the performance bond or other equivalent guarantee required under Chapter 880-X-9 of the ASMC Rules prior to the issuance of the permit.

16. For mining operations where a waiver is granted from the 100' setback from a public road according to 880-X-7B-.07, the interests of the public and affected landowners have been protected.

17. The Regulatory Authority has taken into account the effect of the proposed permitting action on properties listed or eligible for listing on the National Register of Historic Places (NRHP). MRS Consultants, LLC conducted a Phase I Cultural Resource Survey on July 5-7, July 11-14 and July 17, 2023, for approximately 364 acres in Fayette County, Alabama. As a result of these investigations, no archaeological sites were recorded within the survey area. No cultural materials were identified during the field investigations. The architectural survey of the Area of Potential Effect (APE) did not identify any historic resources within the survey area or APE. Based on these findings, the proposed mining project will have no effect upon any significant historic properties. MRS recommends the project area be cleared regarding cultural resources. By a letter dated November 29, 2023, the Alabama Historic Commission (AHC), Re: AHC 23-1239, upon review of the cultural resource assessment conducted for the above referenced project, determined that the project activities will have no effect on cultural resources eligible for or listed on the NRHP. Therefore, AHC concurs with the proposed project activities. This finding is supported in part by inclusion of appropriate permit conditions or changes in the operation plan protecting historic resources or a documented decision that the Regulatory Authority has determined that no additional protection measures are necessary. Concerns for unknown resources, which might be discovered during mining, have been made conditions of the permit.

18. In a letter dated November 7, 2023, the Alabama Department of Conservation and Natural Resources (ADCNR) states that a biological survey be conducted by trained professionals to ensure that no sensitive species are jeopardized by the development activities. The closest sensitive species are recorded as occurring approximately 5.0 miles from the subject site. In a habitat assessment performed by McGehee Engineering Corp in April, May and June 2023, no habitat was found for the listed, threatened and endangered species and no evidence was found or observed for the presence or possible presence of the species with the exception of potential summer roosting habitat for the Indiana bat (*Myotis sodalis)* and Northern Long-eared (NLEB) bat (*Myotis septentrionalis)*. By comments dated August 31, 2023, the US Fish and Wildlife Service (FWS) acknowledges the permittee has stated that tree removal is only to occur between October 15 and March 31, therefore FWS concurs that no impacts to the Indiana bat and/or NLEB are anticipated as a result of your proposed project. No other federally listed species/critical habitat are known to occur in the project area. The Alabama Surface Mining Commission finds that the proposed operation will not jeopardize the continued existence of endangered or threatened species or critical habitat thereof.

19. 880-X-10G-.02 The State Regulatory Authority shall use the specifications set by the State Conservationist for prime farmland soil removal, storage, replacement and reconstruction to carry out its responsibilities under these rules.
880-X-10G-.03. Applicability. The requirements of this subchapter **shall not apply to**:
(1) Coal preparation plants, support facilities and roads of underground mines that are actively used over extended periods of time and where such uses affect a minimal amount of land. Such uses shall meet the requirements of subchapter 10C or 10D, whichever is applicable.

880-X-10D-.70, Other Transportation Facilities. Railroad loops, spurs, sidings, surface conveyor systems, chutes, aerial tramways, or other transportation facilities shall be designed, constructed or reconstructed and maintained, and the area restored to --
(a) Prevent, to the extent possible using the best technology currently available
1. Damage to fish, wildlife, and related environmental values.

20.. The proposed permit area is:

a. Not within an area under study or administrative proceedings under a petition, filed pursuant to Chapter 880-X-7 to have an area designated as unsuitable for surface coal mining operations.
b. Not within an area designated as unsuitable for mining pursuant to Chapter 880-X-7 or subject to the prohibitions or limitations of Section 880-X-7B-.06 and Section 880-X-7B.-07 of this chapter.

BASED ON THESE FINDINGS, I RECOMMEND THAT THIS PERMIT BE ISSUED.

DATE: December 19, 2023

Mark A. Woodley
Mark A. Woodley
Permit Manager

/mw
cc: I & E, Permit File

MEMORANDUM
TO:

Office of Surface Mining Reclamation and Enforcement

Alabama Department of Environmental Management

Alabama Historic Preservation Officer

The District Engineer
U.S. Corps of Engineers

Alabama Department of Labor
Division of Safety & Inspection

BLM - District Office

State of Alabama
Abandoned Mine Land Reclamation

Tuscaloosa County Commission

U.S. Fish & Wildlife Service

Mr. Keith Guyse, Fish & Game Division

FROM: **KATHY H. LOVE, DIRECTOR**

RE: **PERMANENT PROGRAM PERMIT FOR:**

Permit P-4003-32-28-S (Blue Creek Transportation) Warrior Met Coal BC, LLC

Pursuant to the Alabama Surface Mining Commission Regulation 880-X-8K-.12(2), we are hereby notifying you of the issuance of the above permit.

You may also view a copy of this permit at our web address of:

http://surface-mining.alabama.gov/PermitDecisions.html

Enclosed for your information and file is a copy of the permit which shows the legal description of the mine site.

/mw

CUMULATIVE HYDROLOGIC IMPACT ASSESSMENT

Warrior Met Coal BC, LLC
Blue Creek Transportation
ASMC P-4003

CUMULATIVE HYDROLOGIC IMPACT ASSESSMENT

Warrior Met Coal BC, LLC **HUC12: 03160112-0403**
Blue Creek Transportation **NPDES: ALR10C480**
ASMC: P-4003

As required under Federal Public Law 95-87, Section 510(b)(3), the Alabama Surface Mining Commission (ASMC) must find in writing the following proposed operation has been designed to prevent material damage to the hydrologic balance outside the permit area. The applicant must submit a determination of probable hydrologic consequences of mining and reclamation operations in Part II.H of the permit application for areas both on and off the mine site. This determination will allow the ASMC to assess probable cumulative impacts of all anticipated mining activities on the surface and ground water hydrology of the permit and adjacent areas as stated in Federal Public Law 95-87, Section 507(b)(11) and ASMC Rule 880-X-8E-.06(1)(g). The following assessment and findings are intended to fulfill the above.

I. GENERAL INFORMATION

The proposed Warrior Met Coal BC, LLC P-4003 is for a coal transportation facility for storage and loading of coal. This permit includes the construction of an office area, parking and equipment storage area, a rail loading facility, totally contained coal storage silos, ancillary roads, diversion ditches and sediment and erosion control facilities. It will be fourteen acres.

The proposed mine site is located in part of Section 14, Township 16 South, Range 10 West, Fayette County, Alabama as seen from the Berry USGS 7.5 minute Quadrangle.

This permit area is located east of Berry, Alabama and adjacent to the Norfolk Southern Railroad, north of Cedar Creek. See the P-4003 Blue Creek Transportation Map for the general area.

A. Geology of the Warrior Coal Basin

The Pottsville Formation of Early and Middle Pennsylvanian age in Alabama is divided into four fields: the Warrior, Cahaba, Coosa and Plateau fields. All fields were once connected by an unbroken area of coal measures, however separation occurred as a result of folding, faulting and erosion of uplifted areas.

The Warrior coal field is a gently folded or flat-lying area classified as the Cumberland Plateau. It lies in a large, gentle monoclinal structure that extends west into central Mississippi. The regional dip is towards the southwest. This regional southwest dip is interrupted by 2 anticlines (the Blue Creek anticline and the Sequatchie anticline) and three synclines or basins (the Blue Creek basin, Coalburg syncline and Warrior syncline).

The Warrior field has numerous normal faults that trend north and northwest up to 4 miles in length with up to 200 feet of displacement ("Geology of Coal Resources of the Coal-Bearing Rocks of Alabama, Alabama Geological Survey Bulletin 1182-B").

During the beginning of the Pennsylvanian age (approximately 320 million years ago), most of Alabama was still part of a shallow, warm ocean basin. The transgressions and regressions of the seas lead to the rhythmic cycle of sandstone, underclay, coal beds, and shale with zones of marine and brackish water fossils that rest on the basal resistant conglomerate orthoquarzite of the Boyles sandstone formation. This sequence immediately repeats itself with similar rocks (marine shale, sandstone or clay, coal seam, freshwater shale and sandstone). This appears to show the rise of sea level, depositing marine sediments, then the falling of sea level allowing the coal producing forests to grow. This was followed by an influx of river deposited sands and muds, which would rapidly accumulate plant material. Then, the sea would rise again repeating the process.

At the end of the Pennsylvanian, the uplift of the region left the coal bearing ecosystem behind. During this period of uplift, no new sediments could be deposited for at least 200 million years. The gap in time between the Pennsylvanian deposition and the Cretaceous deposition resulted in an unconformity that allows for surface coal mining to exist in the Alabama coal fields.

B. Historical and Active Coal Mines

Within the Cedar Creek – North River watershed is one active mine permit. The Alabama Land Resources, Inc. North River #1 Mine, ASMC P-3222 is southwest of the project area, downstream on Cedar Creek.

II. CUMULATIVE IMPACT AREA (CIA)

The Cumulative Impact Area (CIA) is that area, including the permit area, within which impacts resulting from the proposed operation may interact with the hydrologic impacts of all other past, current and anticipated coal mining on the surface and groundwater systems.

The CIA for surface water for Permit P-4003 has been defined as the area inside Cedar Creek – North River watershed that encompasses the P-4003 permit area. This operation is not a coal mining operation, therefor there is no cumulative effect on this site, or the Alabama Land Resources, Inc. North River #1 Mine.

There is no CIA for groundwater for this operation, as there will be no subsurface disturbance or mining activity.

Geologic/Hydrogeologic Information

i. Geology

The proposed P-4003 permit area is located in the Warrior Basin of the Appalachian Plateaus Physiographic Province. The area is underlain by the Coker and Pottsville Formation, and pre-Pennsylvanian rocks. The Pottsville Formation contains coal beds and is overlain by the Coker Formation. The Pottsville Formation consists of alternating beds of gray sandstone, conglomerate, siltstone, and shale with beds of coal and underclay. The formation is thick in this area, approximately 4,500 feet. Except for the conglomeritic sandstone at the base of the formation, few lithologic horizons can be correlated regionally.

(Hydrologic Assessment, Eastern Coal Province Area 23, Alabama USGS Water-Resources Investigations Open-File Report 80-683).

The Coker Formation unconformably overlies the Pottsville Formation in the area. The Coker consists of unconsolidated sand, gravel and clay with prominent sand and gravel beds at or near the base of the formation. Strata generally trend northwest and generally dip southwest 30 to 40 ft/mi. The maximum thickness of the Coker is 475 feet, however most surface coal mining that requires the removal of the Coker Formation has occurred where the thickness of the Coker is considerably less than 100 feet. (Hydrologic Assessment, Eastern Coal Province Area 23, Alabama).

This permit is for contained storage and loading of coal.

Potentially Acid- and Toxic-Forming Materials

No overburden will be exposed at this permit. Coal will be contained and stored in storage silos.

ii. Surface Water

The proposed permit area is located in the North River watershed of the Black Warrior River Basin and drains to an unnamed tributary to Cedar Creek. All surface water leaving the permit area is permitted under a general NPDES stormwater permit by the Alabama Department of Environmental Management (ADEM), permit number ALR10C480.

ADEM has classified Cedar Creek as "Fish and Wildlife." According to 335-6-11-.02, "use classifications apply water quality criteria adopted for particular uses based on existing utilizations, uses reasonably expected in the future, and those uses not now possible because of correctable pollution but which could be made if the effects of pollution were controlled or eliminated. Of necessity, the assignment of use classifications must take into consideration the physical capability of waters to meet certain uses." The Black Warrior River is classified as "Fish and Wildlife" and "Public Water Supply" through a large portion of the Black Water River, including where Brush Creek and Rocky Branch flow into it.

To characterize the existing quality and quantity of water within Cedar Creek, baseline data were obtained and submitted in the permit application. Surface water monitoring site BC-CC-SW1 on Cedar Creek was sampled in March, April, May and June of 2023, with metals being analyzed during the March sample. Table 1 and 1a. at the end of this assessment presents the baseline data.

iii. Ground Water

According to the "Geohydrology and Susceptibility of Major Aquifers to Surface Contamination in Alabama, Area 6" by the U.S. Geological Survey, Water-Resources Investigations Report 87-4113, "the Pottsville Formation consists chiefly of sandstone,

conglomerate, siltstone, and shale with beds of coal and underclay. Water in the Pottsville aquifer occurs under confined conditions due to sharp contrast in permeability within the aquifer. Groundwater usually occurs at depths of less than 200 feet in secondary features such as openings along fractures and bedding planes. Only small amounts of groundwater suitable for domestic use are available in the weathered deposits. The quantity of water available to wells throughout the aquifer depends on the size and extent of the water-bearing openings." Large water supplies are generally not available from the Pottsville Formation and no municipal wells tap the Pottsville Formation within the study area.

Rocks in the aquifer are tightly cemented and have little primary porosity and permeability. They contain water in secondary features and solutioning is not an effective agent for the enhancement of secondary features due to its silicic lithology (as compared to carbonate aquifers in the area). Due to the folded and faulted geologic structure, the Pottsville Formation is not continuous from one area to another. Groundwater movement between aquifers is restricted due to the confining beds, and movement within the aquifer generally is from hills and highland areas to streams and other areas of natural discharge.

The Coker Formation consists of a basal nonmarine zone of gravel, marine sand and clay. A clay zone is usually present at the top of the Coker. In areas where the Coker is less than 100 feet thick, only the basal beds remain. Also, the Coker is not used extensively downdip where shallower aquifers are available.

Ground water in the Pottsville occurs in sandstone beds and in fractures and bedding planes. The openings are small, and yield to wells range from less than 10 gal/min to as much as 50 gal/min. The depth to water is generally less than 30 feet in stream valleys and more than 50 feet in hills and ridges.

Domestic Wells

Minimum ground disturbance should occur with this permit, and no disturbance of groundwater should occur due to the shallow depth of topsoil removal and excavation of the subsoils to a level providing bearing capacity for any foundations. No disturbance to groundwater should occur.

Company Installed Wells

A groundwater waiver is approved for this permit due to the nature of the operation.

B. Coal Processing Waste

Coal processing waste (gob and slurry) will not be generated or disposed of at the site.

C. Material Damages

With respect to the CHIA, material damage to the hydrologic balance means the changes to the hydrologic balance caused by surface mining and reclamation operations to the

extent that these changes would significantly affect present and potential uses as designated by the regulatory authority. This includes the hydrologic impact that results from the cumulation of flows from all coal mining sites in a cumulative impact area. Examples of material damage are: permanent destruction of a major regional aquifer; temporary contamination of an aquifer in use that cannot be mitigated; and solute contributions to streams above receiving stream standards.

A CHIA is based on the best currently available data and is a prediction of mining-related impacts to the hydrologic balance. Permittees (and permit applicants) are required to monitor water quality and quantity. Exceeding material damage thresholds might also cause significant reduction of the capability of an area to support aquatic life, livestock and wildlife communities.

III. FINDINGS

Based on the information presented above, the following findings have been made relative to the proposed permit area.

A. Potentially Acid- and Toxic-Forming Materials

There is no overburden disturbance for this project.

B. Surface Water

Based on laboratory analysis of the samples collected at surface water site BC-CC-SW1 on Cedar Creek, the water contains low TSS, neutral pH, and low concentrations of iron, low (below method detection limit) concentrations of manganese and low specific conductivity.

Changes in the quantity and quality of the waters in the streams draining the site are expected to be negligible due to the proposed operation activities.

C. Ground Water

The proposed operations should have no impact on groundwater availability or quality within the area.

IV. CONCLUSION

The assessment of probable cumulative impacts of the Warrior Met Coal BC, LLC P-4003 Blue Creek Transportation finds the proposed operations have been designed to prevent material damage to the hydrologic balance outside the proposed permit area.

Table 1
P-4003 Blue Creek Transportation
Surface Water Baseline Data — BC-CC-SW1
Cedar Creek, Downstream — Drainage Area 5.73 mi^2

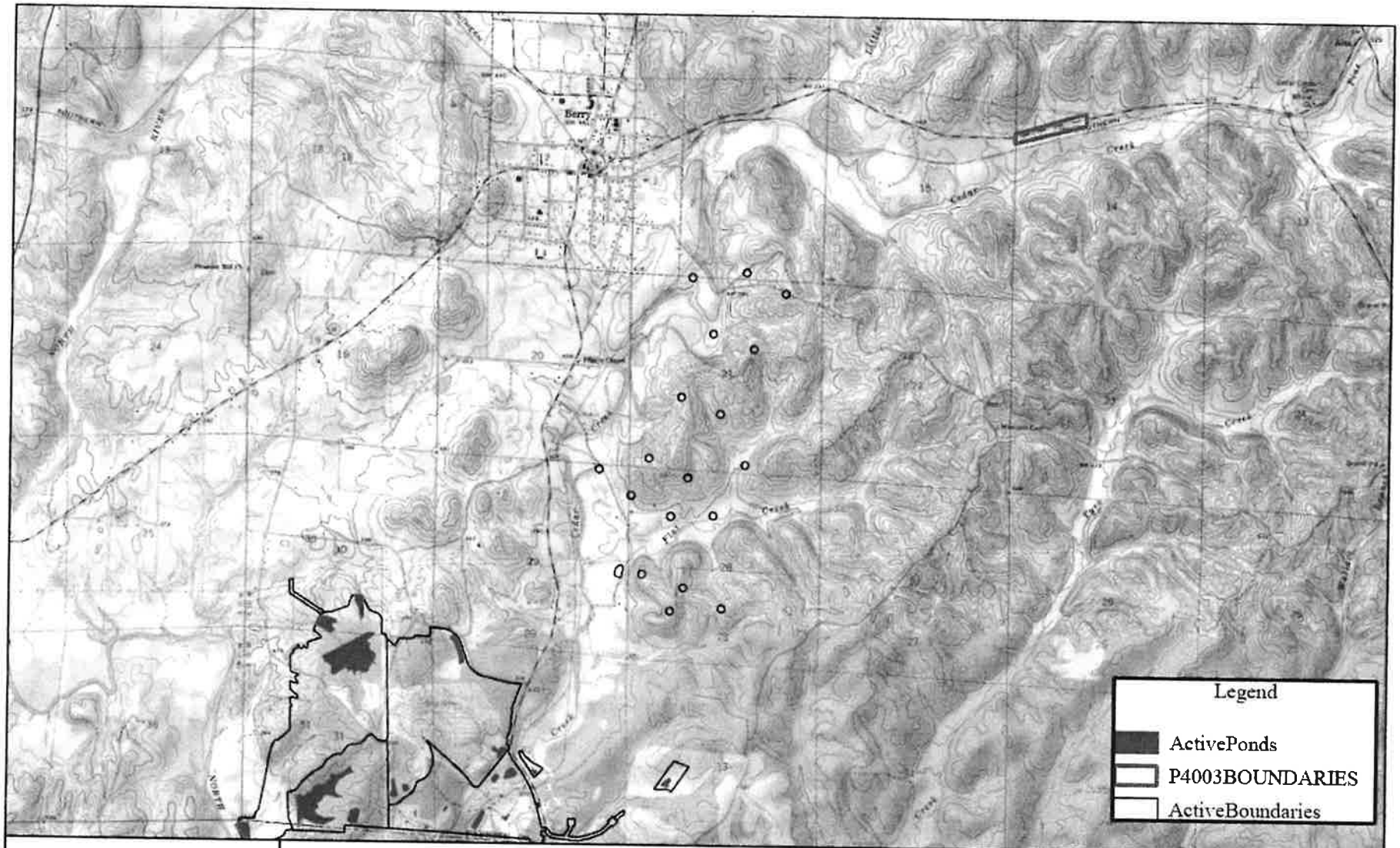
	Discharge	pH	SpC	TSS	Fe	Mn	SO_4	Acidity	Alkalinity
	cfs	s.u.	µmhos/cm	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
High	15.294	7.04	79.2	21	0.41	0.04	BML	60	32
Low	7.119	8.76	36.3	2	0.03	BML	BML	0	20
Average	9.86		58.98	7.75	0.35	0.01	BML	18.5	23

BML = Below Minimum Detection

Table 1a.
P-4003 Blue Creek Transportation
Surface Water Baseline Data — BC-CC-SW1 Metals Data
Cedar Creek, Downstream — Drainage Area 5.73 mi^2

Date	Sb	As,III	Be	Cd	Cr	Cu	Pb	Ni	Se	Ag	Tl	Zn
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
3/21/23	BML	BML	BML	BML	BML	BML	BML	BML	BML	BML	BML	BML

BML = Below Minimum Detection
All metals dissolved except Arsenic and Selenium (total)



Jasper

P-4003 Blue Creek Transportation

2023

Coordinate System: NAD 1927 UTM Zone 16N

N

0 0.5 1 Mi

0 0.75 1.5 Kilometers