#### IEPA Log No.: C-0001-19 CoE appl. #: LRL-Indianapolis

Public Notice Beginning Date: March 1, 2019 Public Notice Ending Date: March 22, 2019

#### Section 401 of the Federal Water Pollution Control Act Amendments of 1972

### Section 401 Water Quality Certification for Discharge of Dredged or Fill Material

#### Public Notice/Fact Sheet Issued By:

Illinois Environmental Protection Agency Bureau of Water Permit Section 1021 North Grand Avenue East Post Office Box 19276 Springfield, Illinois 62794-9276 217/782-3362

Name and Address of Discharger: Eagle River Coal, LLC – 250 Cross Pointe Blvd, Evansville, IN 47715

**Discharge Location:** Near Mitchelsville in N 1/2 of Section 3 of Township 10-South, Range 6-East of the East 3rd P.M. in Saline County.

Name of Receiving Water: unnamed tributary to Brier Creek

**Project Description:** Proposed permanent impacts to two tributaries of Brier Creek resulting from the 195 acre expansion of an existing surface coal mine.

The Illinois Environmental Protection Agency (IEPA) has received an application for a Section 401 water quality certification to discharge dredged or fill material into the waters of the State associated with a Section 404 permit application received by the U.S. Army Corps of Engineers. The Public Notice period will begin and end on the dates indicated in the heading of this Public Notice. The last day comments will be received will be on the Public Notice period ending date unless a commenter demonstrating the need for additional time requests an extension to this comment period and the request is granted by the IEPA. Interested persons are invited to submit written comments on the project to the IEPA at the above address. Commenters shall provide their names and addresses along with comments on the certification application. Commenters may include a request for public hearing. The certification and notice number(s) must appear on each comment page.

The attached Fact Sheet provides a description of the project and the antidegradation assessment.

The application, Public Notice/Fact Sheet, comments received, and other documents are available for inspection and may be copied at the IEPA at the address shown above between 9:30 a.m. and 3:30 p.m. Monday through Friday when scheduled by the interested person.

If written comments or requests indicate a significant degree of public interest in the certification application, the IEPA may, at its discretion, hold a public hearing. Public notice will be given 30 days before any public hearing. If a Section 401 water quality certification is issued, response to relevant comments will be provided at the time of the certification. For further information, please contact Darren Gove at email <u>darren.gove@illinois.gov</u> or phone no. 217/782-3362.

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Fact Sheet for Antidegradation Assessment For Eagle River Coal, LLC IEPA Log No. C-0001-19 COE Log No. LRL-Indianapolis Contact: Brian Koch 217/558-2012 Public Notice Start Date: March 1, 2019

Eagle River Coal, LLC ("Applicant") has applied for a 401 Water Quality Certification for impacts associated with the expansion of surface mining operations into the Hathaway/Rock Creek properties located within the OMM Permit 459 area. The 195-acre expansion is north of the Syers tract and west of the northern portion of OMM Permit 440. The project area contains no jurisdictional wetlands or open water but contains four jurisdictional streams (3 intermittent, 1 ephemeral) totaling 5,442 linear feet. Two intermittent streams (identified as 1AS1 and 1AS1-1) totaling 2,805 linear feet would be eliminated by surface mining activities. A total of 188.7 acres of the permit area would be affected by mining operations, with the remaining 6.3 acres along the western permit boundary (which includes 2 jurisdictional streams) being unaffected.

Mitigation for the proposed impacts would be achieved through off-site stream and wetland mitigation. The mitigation site is within the floodplain of the South Fork Saline River, located approximately 1 mile downstream of the mine at the south terminus of Ewell Road. A straight line channelized ditch currently drains the property. A new stream channel is proposed which would utilize natural stream design methodology. The existing ditch would be backfilled from excess soils generated from construction of the new channel. The new channel would include features such as a floodplain, a riparian buffer, and in-stream features like riffles, pools, and current deflector features such as rootwads in triplicate. The entire 13-acre property would be planted in hydrophytic tree species to provide for a wooded flood plain with additional riparian buffer. The channel would be 1,660 feet long, with a bankfull width and bankfull depth of 3.6 feet and 0.8 feet, respectively, and a flood plain which would be 8.0 feet wide and 3.0 feet deep.

The Rapid Bioassessment Protocol (RBP) scores of the streams to be impacted by surface mining are low (65 for 1AS1, 69 for 1AS1-1) due to agricultural channelization and poor habitat development. The off-site mitigation stream would be expected to generate higher RBP scores. The mitigation channel would have an RPB score of 110 or higher. The design calls for an increase in sinuosity (1.2 compared to 1.0). Incorporation of habitat features such as pools and riffles would serve to improve epifaunal substrate scores. Bank stability should be enhanced by deflecting structures such as root wads, and maintenance during the critical vegetation establishment period. Riparian zone scores would be enhanced by tree plantings. The plan also provides for additional enhancement of the mitigation area by minor regrading of the areas north and south of the mitigation channel to enhance wetland hydrology, specifically by increasing shallow inundation and saturation. This regrading specifies enhancement of shallow inundation up to 3 inches by minor lowering of surface elevation in some areas, with minor raising in others. This area is 7.2 acres and would be used as out-of-kind wetland mitigation. Using an out-of-kind wetland to stream mitigation ratio of 1 acre of wetland to 500 feet of stream channel, the 7.2 acres of proposed wetlands would equate to 3,600 feet of stream mitigation. Based on the need for an additional 1,145 additional feet of stream mitigation, which equates to 2.3 acres of wetland mitigation, the 7.2 acres of proposed wetland would represent an excess of wetland acres of 4.9 acres.

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The information used in this review was obtained from the following materials: *Application for Section 401 WQC Permit, Hathaway/Miller Property*, received January 10, 2019; and *Narrative Explanation of the Economic Benefits of the Rock Creek/Hathaway Project*, received February 11, 2019.

# Identification and Characterization of the Affected Water Body.

The unnamed intermittent streams (no IL Segment ID code) are General Use waters that contains 0 cfs of flow during critical 7Q10 low-flow conditions. Given their small watershed sizes, neither water body has been assessed under the Agency's 305(b)/303(d) program, nor have they been given an integrity rating or been listed as biologically significant in the 2008 Illinois Department of Natural Resources publication *Integrating Multiple Taxa in a Biological Stream Rating System*. The waters are not designated as enhanced in regards to the dissolved oxygen water quality standard.

Given the absence of Agency assessment information for these streams, the Applicant conducted surveys to provide a physical, chemical, and biological characterization of the streams. The physical characterization was conducted using the USEPA RBP methodology. As evidenced by the photos that illustrate their channelized construction and lack of habitat, the streams were identified as possessing low RBP scores (65 for 1AS1, 69 for 1AS1-1) which are indicative of "poor" physical integrity. Water chemistry analysis and biological sampling took place on October 11, 2017. Sampling was intentionally conducted following a rain event to ensure that water would be present for sampling. However, both streams only had one small pool of standing water and had no flowing water. Consequently, water chemistry results obtained from the stagnated water were indicative of poor water quality with little dissolved oxygen present. Fish sampling efforts yielded no captured or observed fish. Macro-invertebrates were sampled using the "20 jab" method in various habitat types within the sampling reach (riffle, overhanging vegetation, under submerged logs, around submerged roots, etc.). Invertebrates were collected at both sites. The number of individuals and number of taxa were minimal with only 1 Physa snail collected at 1AS1, and 1 snail, 1 water strider, and 10 isopods collected at 1AS1-1. Use of the Agency's invertebrate indices confirmed these sites were of "poor" quality with respect to macro-invertebrate community development.

# Identification of Proposed Pollutant Load Increases or Potential Impacts on Uses.

Pollutant load increases that would be associated with this project are limited to a potential increase in suspended solids during construction activities. Impacts to the uses of downstream waters due to suspended solids are not anticipated. Construction of the project would permanently fill 2,805 linear feet of intermittent streams, which would remove the existing uses of these waters.

## Fate and Effect of Parameters Proposed for Increased Loading.

The increase in suspended solids would be local and temporary and would be minimized to the greatest extent possible. Use of erosion control measures and BMPs would aid in filtering and

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retention of suspended solids and would minimize transport to downstream waters. The permanent loss of streams would be offset with compensatory mitigation at a nearby site within the same watershed.

## Purpose and Social & Economic Benefits of the Proposed Activity.

The project would allow the Applicant to continue to extract the coal resources of the site for an additional 6 months, which would allow for continued employment of 95 Eagle River employees with an annual payroll of approximately \$9 million. Should the reserve not be mined, it would result in \$4.5 million in lost wages, \$500,000 in lost payroll taxes, and a loss of approximately \$400,000 in federal black lung and reclamation taxes. Additionally, there would be an approximate \$10 million decrease in revenue to the local economy due the loss of development and operational expenditures (e.g., goods, services) as well as contractual employment and other indirect jobs associated with the mine. The Applicant has already invested \$40 million in capital for infrastructure and equipment to mine, wash, and transport coal from this reserve. Shortening the life of this reserve would result in higher mine costs due to a shorter time frame to depreciate and amortize the investment.

# Assessments of Alternatives for Less Increase in Loading or Minimal Environmental Degradation.

The Applicant provided an assessment of alternatives in their application materials. Alternative mining methods were considered and were assessed using several factors including geography, geology, economics, surface rights, and mineral rights. While other methods such as underground mining and auger/highwall mining may be practical at other sites, they were determined to be impractical for this project. Specifically, underground mining is not a practical alternative for this site given the small amount of coal onsite and the cost of purchasing underground mining equipment. Likewise, highwall and auger mining were deemed impractical due to the small surface acreage and the sizeable amount of the coal reserve that would be left behind due to the setback areas that would be associated with this method. Surface mining was determined to be the most practical means of recovering the coal resources of the site while minimizing overburden removal. It is estimated that 90-95% of the coal seam would be removed at this site via surface mining methods. Use of other mining methods would either be more costly or less effective. The least intrusive alternative would be a "No Action" alternative, which was also considered by the Applicant. However, this alternative does not meet the purpose and need of the project, nor would it allow for the continued social and economic benefits that the project would provide.

# Summary Comments of the Illinois Department of Natural Resources, Regional Planning Commissions, Zoning Boards or Other Entities.

The IDNR EcoCAT system was consulted on October 24, 2018 in regards to the proposed activities. The Illinois Natural Heritage Database determined that no threatened or endangered species or protected natural areas are in the vicinity of the project location. Consultation was immediately terminated in the automated reply from IDNR.

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## **Agency Conclusion.**

This preliminary assessment was conducted pursuant to the Illinois Pollution Control Board regulation for Antidegradation found at 35 Ill. Adm. Code 302.105 and was based on the information available to the Agency at the time this assessment was written. We tentatively find that the proposed activity would result in the attainment of water quality standards; that the loss of the existing uses of intermittent streams would be appropriately mitigated for; that all technically and economically reasonable measures to avoid or minimize the extent of the proposed increase in pollutant loading have been incorporated into the proposed activity; and that this activity would benefit the local community by extending the life of the mine and allowing for continued employment and operation. Comments received during the 401 Water Quality Certification public notice period will be evaluated before a final decision is made by the Agency.