

Mr. Todd Bianco Coordinator Energy Facility Siting Board 89 Jefferson Blvd. Warwick, RI 02888

August 25, 2016

RE: SB 2015-06 Invenergy Thermal Development LLC's Application to Construct the Clear River Energy Center Power Plant in Burrillville, RI.

Dear Mr. Bianco:

There is a proposal before the EFS Board relative to authorizing construction of a roughly 67-acre energy production facility off of Wallum Lake Road in Burrillville.

Blackstone Heritage Corridor, Inc. is writing to express its position that the project may have the potential for significant adverse impacts to the resources of the federally-designated John H. Chafee Blackstone River Valley National Heritage Corridor.

Authority:

The John H. Chafee Blackstone River Valley National Heritage Corridor was established by an Act of Congress in 1986. That U.S. Public Law, 99-647, in Section 9, obligated the Corridor to review and comment on a variety of projects by providing the following:

"Any federal entity conducting or supporting activities directly affecting the Corridor *shall*-

- 1) Consult with the Secretary and the Commission with respect to such activities,
- 2) Cooperate with the Secretary and the Commission in carrying out their duties under this Act and, to the maximum extent practicable, coordinate such activities with the carrying out of such duties; and
- 3) To the maximum extent practicable, *conduct or support* such activities in a manner which *the Commission* determines will not have an adverse effect on the Corridor."

(Emphasis added)

In 2014, U.S. Public Law 113-291 was adopted. The law established the Blackstone River Valley National Historical Park. In section 3052, it also provided that the BHC would perform the functions previously performed by the Commission.

"For purposes of (99-647 Section 9), a reference to the "Commission" shall be considered to be a reference to the local coordinating entity."

Blackstone Heritage Corridor, Inc. (BHC) is the designated local coordinating entity for the John H. Chafee Blackstone River Valley National Heritage Corridor.

Scope of Review:

The property is located in Burrillville, RI. Therefore, the project site is located within the John H. Chafee Blackstone River Valley National Heritage Corridor.

BHC works with community partners to preserve and promote the Valley's historic, cultural, natural and recreational resources for current and future generations.

The BHC Strategic Plan identifies a number of elements related to this project. While not exhaustive, our plan describes several objectives which relate to this application and which are identified in no particular order below:

Environmental Stewardship

 Promote stewardship, including a culture and ethic of long term care for our natural resources.

Land Use

- Promote new development that is compatible with the traditions and character of the region, does not adversely impact natural and cultural resources, avoids fragmentation of resource and animal corridors, provides a variety of residential housing options, and minimizes sprawl.
- Identify and protect important natural and cultural resources from adverse development impacts
- Promote and facilitate open space planning and implementation to preserve important natural and cultural resources, working lands, and recreational opportunities.
- Promote the designation and enhancement of scenic roads and views, greenways and blueways.
- Promote conservation and development techniques and policies that protect water quality and supply.
- Encourage regional planning to protect shared natural and cultural resources and promote intercommunity cooperation.

<u>Air</u>

 Protect forest resources, which absorb and filter air pollutants, generate oxygen, store great quantities of carbon, and help maintain the necessary balance of air components.

- Encourage land use planning and design that will lower harmful emissions and prevent air quality degradation.
- Protect fish and wildlife habitats from air pollutants.
- Encourage the development and use of renewable energy.

Water

- Reduce and eliminate point and non-point source pollution to preserve and enhance the quality of the region's surface and ground waters.
- Facilitate informed decisions regarding alterations of the natural flow of water across the landscape to safeguard surface water flows and ground-water recharge.
- Support opportunities to remediate legacy sediment contamination within the watershed.
- Support resiliency efforts to protect against the effects of climate change.
- Promote watershed-wide low impact development practices, appropriate revision of bylaws and regulations, and enforcement of regulatory tools for improved storm water management and water quality protection
- Ensure adequate supplies of water that will balance the needs of human, wildlife and plant life populations.
- Encourage residents to understand the interrelationships of human activities and water quality and quantity through education and outreach.

Wildlife

- Protect wildlife habitats, including unfragmented forest, grasslands, successional habitats, freshwater wetlands, streams, ponds, lakes, rivers and estuarine habitats, capable of supporting native wildlife species.
- Protect and promote corridors that link critical habitats and minimize habitat fragmentation.
- Improve and restore degraded aquatic and terrestrial habitats.
- Protect large blocks of unfragmented forestland and implement appropriate forest management.
- Promote safe and convenient water access and water trails for boating, paddling, fishing, swimming, skating, and simply enjoying the natural beauty of the region's lakes, streams, and rivers.
- Foster economic development activities that promote outdoor, nature-based recreation.

Discussion:

The site is located in perhaps the most natural and forested area of Rhode Island, and is just a mile or so from two additional states (Connecticut, Massachusetts).

Located in the Town of Burrillville, RI, it is situated within the John H. Chafee Blackstone River Valley National Heritage Corridor. Topographically, it lies near the western boundary of the Blackstone River Watershed. The site drains to the Clear River which in turn flows to the Branch River, a primary tributary of the Blackstone River.

Areas to the north, south and west of the property include large tracts of permanently protected open space.

The current proposal is part of a collection of proposals including expansion of the existing compressor and utility corridor work, and indicates that collectively as much as 121 acres of land to be cleared for the primary activity. While this particular project involves a (significant) portion of the impacts, the 3 projects are interrelated and their impacts should be evaluated in the collective.

The project expects to require up to 925,000 gallons of water per day (gpd) for its operations. Discharge is planned to the municipal wastewater treatment system. The water would be drawn from as-yet-unidentified sources and removed from the ecosystem for treatment.

After construction, which will certainly be accomplished by moving goods and equipment on minor rural roads, delivery of fuels, chemicals and other supplies will be made via large tanker style trucks to the site.

1. Environmental Stewardship

Blackstone Heritage Corridor, Inc. embraces and encourages stewardship of the Valley's resources. It is through such thoughtful effort to protect natural resources that those resources remain available to support the region's environmental health for future generations. The extensive elimination of forest and impact to water sources will permanently impact the ability of the land to benefit the Town of Burrillville, the "Quiet Corner" of northeastern Connecticut, the nearby region of Massachusetts, and the Blackstone River Valley National Heritage Corridor.

BHC requests information be provided indicating that these resources will be protected and stewarded for current and future generations.

2. Land Use

According to maps available from the USDA, the project site is nearly entirely compromised of (>80%) hardwood deciduous forests and areas of softwood and mixed forests, as is much of the land in this portion of the watershed and National Heritage Corridor. The soils are predominantly hydric, with seasonal high water tables, and there are areas with slope and/or bedrock constraints.

As noted elsewhere in this letter, there has been no material provided to BHC that indicates the project will conserve or protect water quality and supply, provide open space and recreational opportunities or protect natural resources from adverse development impacts.

Where the project is located in the very northwestern portion of Rhode Island, there has been no information provided to demonstrate coordinated review with nearby Massachusetts and Connecticut; such review should include discussion of existing and anticipated development projects and assessment of various natural and economic resources. These evaluations should also demonstrate inter-municipal and inter-state coordination and, as noted previously, should consider the various projects in a coordinated and cumulative fashion.

Existing forest resources have extraordinary value relative to intercepting stormwater and thereby attenuating stormwater impacts. Given the expanse of anticipated forest removal for this project as well as the acres of filling and alteration of wetlands and areas of hydric soils, we can expect millions of gallons of additional stormwater will be introduced to the wetlands and water systems associated with the Clear River. Clearing additional land in order to construct stormwater basins addresses only a portion of the issue and typically creates additional issues such as time and duration of flows, as well as appropriate recharge. The consequences of such significant additional stormwater flow cannot be overstated.

Trucking delivery is by way of State Route 100, classified as a Minor Arterial roadway, and a portion of Wallum Lake Road that is classified as a Major Collector roadway. Other nearby roads which may ultimately receive such traffic include two Minor Collector roadways; Buck Hill Road and Jackson Schoolhouse Road. According to Google Maps, Buck Hill Road is the suggested route between the site and Interstate 395. Providence is best accessed, also according to Google Maps, through small villages and towns. Both the volume of trucking and the material being transported present risk on a number of levels. It is unclear what if any measures are proposed to ensure the integrity of the resources of the Blackstone River Valley and the National Heritage Corridor.

BHC understands that an archaeological survey and an archaeological site examination have been performed. However, BHC has not had the benefit of review of those materials. Given the vast area of anticipated disturbance, such a survey will be helpful to BHC's effort to determine whether the project will have a significant adverse impact on those resources.

BHC requests information to demonstrate that there will be no significant impact upon the resources of the National Heritage Corridor with respect to trucking/traffic/roadway impacts, stormwater, loss of forest canopy, alteration of soils, floodplains, and the surface water systems leading to the Blackstone River.

3. <u>Air</u>

Carbon dioxide is naturally captured from the atmosphere through biological, chemical, or physical processes. One acre of forest can store more than 35 megatons of carbon, and can filter more than 2.5 megatons of carbon dioxide. Given the extensive removal of forest vegetation required for the collective projects as described above, BHC has concerns about the adverse impact of the proposal with regard to air quality and carbon sequestration.

BHC requests further information to demonstrate provision for carbon sequestration sufficient to reflect the loss of forest resources performing natural carbon sequestration.

4. Water

The project indicates up to 925,000 gpd may be needed at the facility. It is important that projects maintain a balance of water resources. Removing large quantities of water from the ecosystem is a concern; discharging large quantities of water to a wastewater treatment facility is also a concern since it results in

increased and mechanical discharges into other sub-basins, leaving the original sub-basin from which the water came still without that quantity.

Concerns related to management of stormwater are identified above. Significantly altering the natural balance of water in aquifers or ponds can result in atypical movement of contaminants. Maintaining adequate hydrology is essential to ensure that new channels do not open for historic contamination to shift or even for naturally-occurring elements to surface.

Given the region's reliance on groundwater and surface water systems, this project constitutes an extraordinary tax upon the region's resources. We note that the current year has seen very little rainfall compared with about 52 inches/year typical (USClimateData.com), so natural water systems are challenged. Withdrawing an additional 925,000 gpd from groundwater even over a short period of time poses significant threats to the drinking water systems, soil health, vegetative health and community health. Removing the water from the area further compromises the recharge opportunities, exacerbating drought conditions. This in turn also raises wild fire risk, and increases the threats in a forested area not well-served by municipal water supplies.

BHC requests that information be provided to ensure that the impact to groundand surface- water resources will not permanently impact the region and threaten the health of the National Heritage Corridor ecosystems.

5. Wildlife

As previously described, more than 100 acres of existing forest is expected to be cleared for this project and those appurtenant with it, and existing rainwater flows will be inextricably altered. Even providing culverts for wildlife passage, the concern is that entire habitat regions will be severely restricted or even eliminated.

In addition to the disruption of stormwater management, carbon management, and water recharge, it is unclear what the impact will be on the natural existence of and migration patterns for local wildlife. The site is located in a predominant north / south wildlife corridor between, generally, the Douglas (MA) State Forest, protected lands in the northeastern portion of Connecticut and the protected and managed lands of the Scituate Reservoir. This miles-long corridor is a regional critical habitat and ecosystem.

Preserving largescale land areas that are currently not protected and which would create corridors appropriate for wildlife travel and habitat could be an opportunity to offset the obvious first-tier impacts of the proposed development. Because the project is located at the edge of the watershed, this of course presents additional challenges.

BHC requests additional information to demonstrate that there will be no significant adverse impacts upon the wildlife corridor resources of the National Heritage Corridor.

Summary:

The project proponent has indicated that a number of these items could be further analyzed in later permit review stages, after EFSB approval is attained. However, these items and their impacts are integral to whether this project (as well as the appurtenant elements whose potential impacts have thus far been omitted from review) is being appropriately sited. Significant additional information demonstrating the long-term integrity of the region is required. Blackstone Heritage Corridor, Inc. is unable at this time to indicate that the project will not have significant adverse impacts upon the resources of the Congressionally-designated and nationally-significant John H. Chafee Blackstone River Valley National Heritage Corridor.

These comments are provided pursuant to responsibilities as described by Public Law 99-647 as amended most recently by Public Law 113-291. Please feel free to contact BHC's deputy director and community planner with any additional questions.

Yours truly,

Megan T. DiPrete, AICP Deputy Director

Certificate of Service

I hereby certify that on August 26, 2016, I sent a true copy of the preceding to the Energy Facilities Siting Board via hand delivery and electronic mail, and to the parties on the attached service list via electronic mail.

Megan T. DiPrete