

**New England Clean Power Link Project
Preliminary Aesthetics Assessment for 45 Day Notice Letter
October 16, 2014**

T. J. Boyle Associates, LLC (TJB), a landscape architecture and planning firm specializing in visual resource planning, has been retained by TDI New England (TDI-NE) to conduct a visual analysis to evaluate potential impacts due to the New England Clean Power Link Project, a proposed high-voltage transmission line project from Alburgh, Vermont to Ludlow, Vermont (referred to as the “NECPL” or “Project”). TJB has reviewed conceptual design plans, conducted site visits, and completed a preliminary visual analysis of proposed Project upgrades. The following memo reviews the findings of the preliminary analysis.

The Vermont Public Service Board utilizes the so-called Quechee Lakes standard (set forth in the decision Quechee Lakes Corporation, #3EW0411-EB and #3O439-EB (1986)), to guide its consideration of visual and other aesthetic impacts from a project that is applying for a section 248 certificate of public good. Under the Quechee Lakes standard, it must first be determined whether a project will have an “adverse” impact on aesthetics and scenic and natural beauty. A project has an “adverse” impact if it is out of character with its surroundings. Specific factors that are considered in this evaluation include the nature of the project surroundings, the compatibility of the project design with those surroundings, the suitability of the project colors and materials with the immediate environment, the visibility of the project, and the impact of the project on open space.

If based upon these factors the project would have an “adverse” effect, the next step in the two-part test is to determine whether the adverse effect of the project is “undue.” The adverse effect is considered undue when any one of the following factors is affirmatively answered: (1) Does the project violate a clear, written community standard intended to preserve the aesthetics or scenic beauty of the area? (2) Have the applicants failed to take generally available mitigating steps which a reasonable person would take to improve the harmony of the project with its surroundings? (3) Does the project offend the sensibilities of the average person? Is it offensive or shocking because it is out of character with its surroundings or significantly diminishes the scenic qualities of the area? For transmission upgrades, the PSB’s aesthetic analysis, however, does not end with the results of the Quechee test. In addition, the PSB’s aesthetic assessment is “significantly informed by overall societal benefits of the project.” PSB Docket No. 6860, Order of 1/28/05 (footnotes omitted).

The NECPL will consist of two main components: a 154 mile HVDC transmission line that will run from Alburgh to Ludlow, Vermont; and a proposed converter station in Ludlow that will connect to Vermont Electric Power Company’s (“VELCO”) Coolidge Substation via a short AC transmission line. Unlike other high voltage transmission line projects within Vermont, the transmission cables for the entire NECPL will be installed underground or underwater. Approximately 98 miles will be buried under Lake Champlain and 56 miles will be buried within existing public right-of-ways.

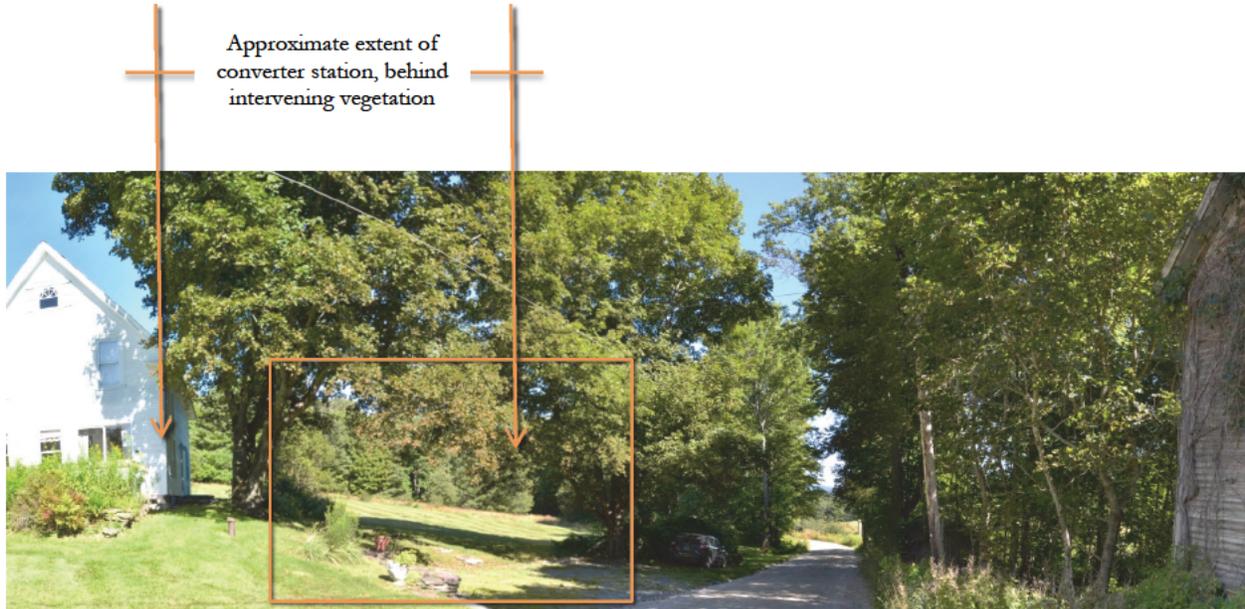
Manhole covers will be required at limited locations to access underground vaults along the transmission line. This includes where the line transitions between burial under land and water in Alburgh and Benson, Vermont, and possibly one or two other locations where the cables will be installed within pre-constructed underground utility ducts. The top of the manholes will be level with the existing grade. At two stream/river crossings, cables may be attached to the side of bridge/culvert structures within steel

pipings. It is not anticipated that the manholes or bridge attachments would be readily noticeable features within the landscape.

Other than the permanent project infrastructure noted above, construction of the Project will also require removal of vegetation along the route right-of-way, and maintenance of a 12-foot permanently cleared area on top of the cables. Planning and design of the Project will limit tree removal since the Project is primarily proposed along existing road right of ways within already cleared land.

The proposed converter station will have the greatest potential for public visibility. This facility is proposed within the Town of Ludlow, off of Nelson Road. T. J. Boyle Associates were part of a multi-discipline team, engaged early in the process to site and provide design input for the converter station. The following pages include several figures which provide an overview of the proposed converter station. Figure 1, shows the preliminary layout overlaid on aerial photos. Figure 2 includes photos taken from viewpoints A and B on Nelson Road during field investigation. Figure 3 includes two line of sight cross sections which help illustrate how surrounding vegetation will screen views to the converter station from Nelson Road. The location of the viewpoints and cross sections are identified on Figure 1. The proposed location and preliminary design significantly minimizes the aesthetic impacts of the facility. The converter station will be setback over 300 feet from Nelson Road, the closest public road, and will maintain a substantial vegetative buffer around the entire facility. After construction, a minimum of 200 feet of forest cover will be retained between the edge of clearing for the converter station and existing edge of clearing along Nelson Road. It is anticipated that landscape mitigation plantings will be proposed to further screen and soften the limited views that may be created by the facility.

Based upon the above, T. J. Boyle Associates anticipates minimal visibility of Project infrastructure for the NECPL. As design plans are refined, a specific assessment of vegetation removal along the transmission line will be conducted. The design and siting of the converter station will successfully avoid most public views of the facility. Our preliminary findings indicate that the Project will not result in Undue Adverse impacts to the aesthetics and scenic and natural beauty within the areas which the Project will be located. A detailed aesthetic analysis and report will be included with the petition for a CPG.

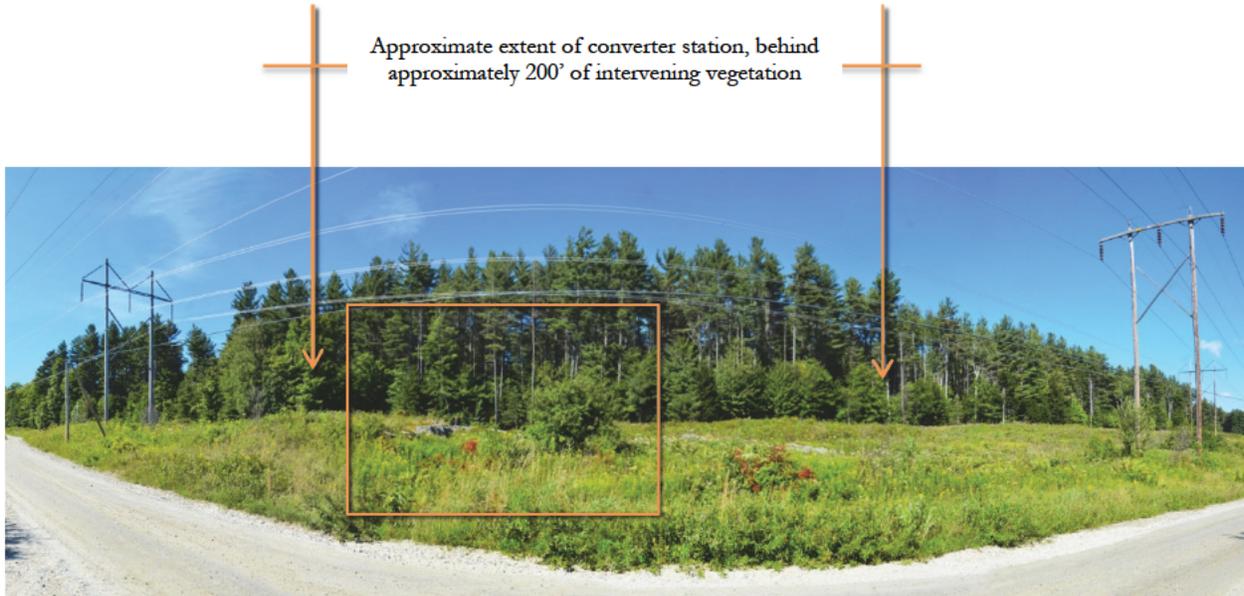


Viewpoint A: +/- 125° Panoramic view from Nelson Rd, west of the Project, panning east to south. The orange rectangle at the center of the photo represents the image below, which is captured with a 50mm normal lens, equivalent to the human 'field of view'. This panorama was digitally lightened.



Viewpoint B: View looking east from Nelson Road, directly towards the proposed Project, as represented by the orange rectangle in the panoramic view above. Vegetation at the back of the open lawn will screen views of the converter station, although a small corridor will be cleared for the DC line to connect with the facility.

New England Clean Power Link
Figure 2-2: Site Photos

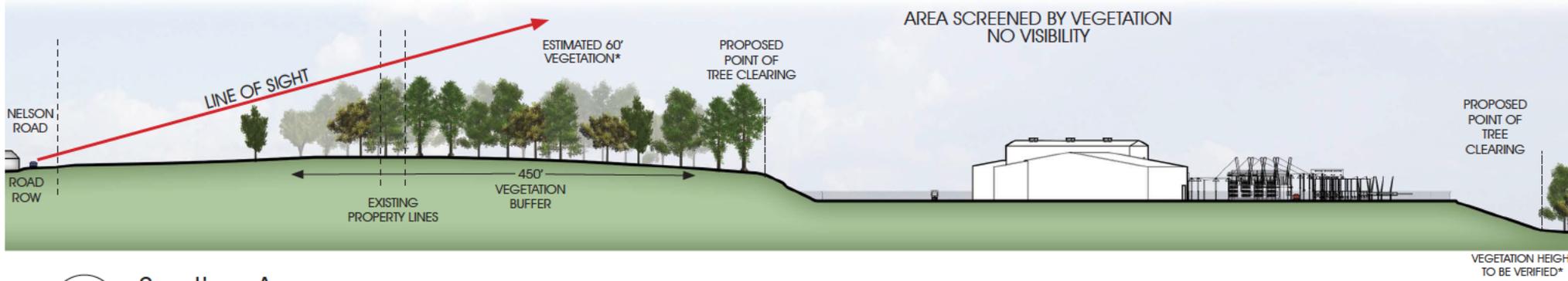


Viewpoint B: +/- 125° Panoramic view from Nelson Rd, within the transmission line right of way. Panning northwest to southeast. This view faces northeast toward the project. The orange rectangle at the center of the photo represents the image below, which is captured with a 50mm normal lens, equivalent to the human 'field of view'.



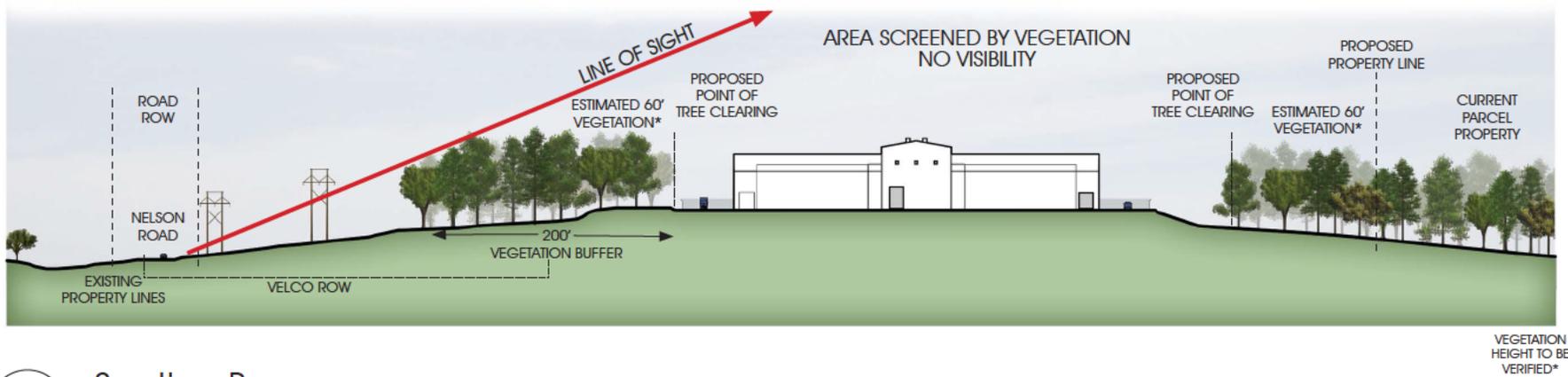
Viewpoint B: View looking northeast to the project, while on Nelson Road. Over 200 feet of existing forest cover will be retained prior from the visible edge of forest in this image to the start of clearing for the proposed converter station.

Figure 3: Line of Sight Sections



Section A

*TOPOGRAPHIC DATA IS PRELIMINARY AND BASED ON 20' CONTOURS



Section B

*TOPOGRAPHIC DATA IS PRELIMINARY AND BASED ON 20' CONTOURS