



Commission to Study the Feasibility of Establishing Energy Infrastructure Corridors
within the Existing Transportation Rights-of-Way (the SB 361 Commission)

(SB 361, Chapter 220, Laws of 2012, RSA 362-G)

Comments on the Commission's Charge

October 11, 2012

As Chair of the SB 361 Commission, The Honorable Senator Jeanie Forrester requested that each Commission member prepare a response as to whether or not the charge of the SB 361 Commission has been met relative to the duties assigned by the New Hampshire General Court, as presented below from (a) through (i). The following responses are provided for discussion by the New Hampshire Department of Environmental Services (DES).

(Note: The format used below is divided into the comments by DES as a State agency and the comments of DES as a member of the SB 361 Commission.)

CHAPTER 362-G:2, IV

The commission shall identify the feasibility of using state-owned transportation corridors for energy infrastructure and, if the commission finds the use of transportation corridors feasible for such use, shall specify which corridors are most appropriate for specific utility infrastructures. The commission's assessment of feasibility shall consider, but shall not be limited to the following issues:

(a) Whether such corridor or corridors materially enhance the delivery of electricity or other utilities, or both, to New Hampshire consumers and increase the reliability and security of the electricity distribution system in the state.

DES comment: In terms of environmental impacts, the use of existing corridors should reduce the creation of adverse conditions related to environmental alterations and natural resource damage. Such use of pre-existing corridors for multiple uses (rather than creating new corridors

for each new utility) is also consistent with the policies and principles of “smart growth,” as described by RSA 9-B (State Economic Growth, Resource Protection, and Planning Policy) (<http://www.gencourt.state.nh.us/rsa/html/NHTOC/NHTOC-I-9-B.htm>).

Commission member comment: Determinations of utility capacity, reliability and security typically lie within the jurisdiction of the Public Utilities Commission. The SB 361 Commission has more work to do regarding an assessment of whether the use of existing corridors would “enhance the delivery of electricity or other utilities.” Until such time as multiple use corridors are in operation and can be evaluated, it will be difficult to definitively respond to this item. It may be useful to look to other states that have such corridors in place to gain some insight into their enhancement capacity. In terms of added security, a common energy corridor could enhance the ability of the owners and / or State government officials to monitor and maintain these corridors. However, the common location could also create an opportunity for harm to be exacted against these co-located utilities (and their customers) as a consequence of either anthropogenic or natural interference with their operation. The SB 361 Commission should prepare a recommendation that recognizes and addresses these issues in its final report.

(b) The identification of the corridors.

DES comment: The prior designation of routes that may be conducive to energy corridors will serve to simplify environmental issues for both the applicant and DES. It will also add to the efficiency of processing any permit applications that are submitted, since the general environment along the corridor would already be known and been previously impacted. This upfront information relative to such features as preferred stream crossing locations, the presence and extent of jurisdictional wetlands, early identification of any source waters used for municipal drinking water, critical habitats or endangered species, cultural resources, seismic setting, existing infrastructure status and permitting needs will allow for more timely and targeted evaluation of preferred routes by DES programs. This early designation should reduce or eliminate the need to significantly move the centerline of proposed longitudinal projects, a key factor that can adversely affect DES permit application processing time.

Commission member comment: The SB 361 Commission, through its members (particularly the New Hampshire Department of Transportation) and others who have testified before it, has successfully identified the most likely routes to establish these energy corridors in New Hampshire (*i.e.*, Interstates 89, 93, 95 and NH Route 101). The presentation by Mr. Ken Fletcher from the State of Maine was also instructive concerning this designation process. Barriers and limits to those plans were also discussed by the witnesses who came before the SB 361 Commission. The SB 361 Commission should develop (through its members) a set of criteria to evaluate the feasibility of establishing energy corridors that is reflective of the members’ disciplines and limitations described by witnesses and documents received to date.

(c) The identification of available technologies.

DES comment: The technologies presented by those who testified before the SB 361 Commission involve similar types of environmental consequences, but differ in scope and impact. For example, the use of directional drilling under a stream or river should reduce, if not eliminate, jurisdictional wetland impacts. Should one or more of these pre-determined

technologies be selected, it will provide DES with ample time and opportunity to evaluate the likely environmental impacts of such technologies before they are deployed.

Commission member comment: Technologies to be employed by potential applicants such as underground cable systems, the equipment needed to install them, required configuration or reconfiguration of aboveground facilities, etc. has been provided to the SB 361 Commission by ABB, Public Service of New Hampshire and others. The SB 361 Commission should resist being prescriptive in its recommendations, but should note examples of technologies (based on testimony) that hold promise for deployment within these common rights-of-way. Technologies evolve and improve over time, as demonstrated by underground cable advances, and each project will be unique in its application.

(d) The identification of the costs of available technologies.

DES comment: Such cost determinations lie beyond the jurisdiction of DES, although they will certainly play a role with other parties as to which technology is judged to be feasible for a particular co-location project. Environmental compatibility will likely be a factor in that determination.

Commission member comment: The SB 361 Commission has not focused in depth on determining the costs of various types of facilities (e.g., dollars per mile, etc.), although selected documents submitted to the record do discuss estimated costs for such projects (e.g., NEI Electric Power Engineering). Perhaps future work should be pursued relative to this factor. For example, conducting a cost / benefit analysis for evaluating aboveground vs. below ground utilities specific to designated New Hampshire energy corridors (noted in "b," above) might be a prudent exercise for future consideration by the SB 361 Commission (i.e., See document titled *The Power to Change the Face of America...Converting Overhead Utilities to Underground*, 2009).

(e) Whether there would be long-term economic benefits for the state, including, but not limited to, direct financial benefits from leasing rights of ways; employment opportunities; and private sector economic development.

DES comment: These economic impacts lie beyond the jurisdiction of DES programs.

Commission member comment: More data is needed by the SB 361 Commission to definitively describe the impacts of these interactions, as stated by the New Hampshire Department of Revenue Administration, Department of Administrative Services and Department of Resources and Economic Development in written and oral testimony submitted to the SB 361 Commission.

(f) What the effects of such corridor or corridors are on the retail price of electricity or other utilities, or both, to businesses and residential ratepayers.

DES comment: The degree of natural resource impact in co-locating a utility along an existing right-of-way will reflect, at least indirectly, the costs associated with environmental protection, permitting and long-term monitoring.

Commission member comment: The impact of other pricing impacts should be left with the Public Utilities Commission and its forecasting procedures. It may be premature for the SB 361 Commission to address this issue, since no such dedicated energy corridors yet exist in New Hampshire.

(g) A process design to assure the efficient development of such corridor or corridors by energy distribution companies serving the state.

DES comment: Standardization of the development process for such corridors will enhance the efficiency with which companies can propose a new utility. From an environmental perspective, it will provide upfront guidance on what is allowed in New Hampshire and what is not. This should save time, money and effort by applicants when preparing and submitting successful applications to DES.

Commission member comment: A process design has not yet been developed by the SB 361 Commission, but DES views that as a very important outcome of the discussions and future planning efforts by the State of New Hampshire.

(h) What actions need to be taken to assure that conflict with the public purposes for which such rights of way are already owned is minimized.

DES comment: Critical infrastructure such as municipal water and sewer lines must be protected from harm and adverse interactions (both during and after construction) with new or reconfigured utilities installed within common rights-of-way. DES employs engineers in design and plan review, as well as field inspectors to ensure that that conflict does not occur.

Commission member comment: As noted by the New Hampshire Department of Transportation in its testimony before the SB 361 Commission, there exists varying degrees of ownership for some of the highways and turnpikes across the state (other than those mentioned in response "b," above). The terms and conditions of the many easements need to be studied in detail as a precursor to determining what other rights-of-way could be suitable for energy corridor designation. Public safety is also a factor that must be included with any change to a public right-of-way to accommodate a new, co-located utility. That aspect of the SB 361 Commission's work has been addressed, but has yet to be fully developed.

(i) Circumstances where eminent domain might be used to complete an otherwise incomplete energy infrastructure corridor.

DES comment: Eminent domain has not been used by DES since the early 1980s for some of its dam and flood control projects. Decisions relative to when and where to institute the process of eminent domain lie beyond the scope of current DES programs.

Commission member comment: The SB 361 Commission should address this issue in its final report.