

**THE STATE OF NEW HAMPSHIRE
BEFORE THE
SITE EVALUATION COMMITTEE
DOCKET NO. 2015-04**

PRE-FILED DIRECT TESTIMONY OF LYNN FARRINGTON

**APPLICATION OF PUBLIC SERVICE COMPANY OF NEW HAMPSHIRE
D/B/A EVERSOURCE ENERGY
FOR A CERTIFICATE OF SITE AND FACILITY FOR CONSTRUCTION OF A
NEW 115 kV TRANSMISSION LINE**

THE SEACOAST RELIABILITY PROJECT

April 12, 2016

1 route. By having two signed routes for drivers the volume of vehicles on any one route
2 was lessened. Traffic signal timing and phasing along both detour routes was adjusted to
3 better serve the change in traffic patterns.

4 As part of the bridge construction the local road passing under the bridge, Warren
5 Avenue, also needed to be closed for short periods of time. This process required a total
6 of three detour routes: one for the eastbound direction, one for the westbound direction
7 and a pedestrian route. In these instances police details were assigned to intersections to
8 keep traffic flowing.

9 A second, smaller scale traffic control plan that I recently completed was for the
10 construction of a downtown roadway in Newport, RI. This full depth and overlay
11 roadway repair was completed by shifting both lanes of traffic to north while constructing
12 to the south, and vice versa. This configuration pattern made up Phases 1 and 2 of the
13 traffic control plans. The client had also requested brick crosswalks with granite curbing
14 border throughout the downtown area. The construction of this requires a four day period
15 with no traffic driving over the brick for the mortar to dry. This was accomplished by
16 detouring traffic in the westbound direction, shifting traffic in the eastbound direction and
17 constructing the crosswalks in two stages.

18 **Q. Please summarize the process you used to analyze traffic impacts**
19 **during construction.**

20 A. The first step to analyze traffic impacts during construction was to
21 understand the construction methods and procedures required to install the transmission
22 line within the public roadway right-of-way (ROW) limits. Construction space and
23 duration requirements must be determined before the possible effects on traffic can be
24 evaluated.

25 The next step was to understand how traffic currently operates within the specific
26 highway or roadway corridor. This was accomplished by reviewing the available hourly
27 traffic volumes throughout the corridors within the Seacoast area.

28 Once the construction methods, duration and existing condition volumes were
29 determined the appropriate traffic control plan method was chosen. This was
30 accomplished by comparing the current volumes to construction scenario capacities in the
31 Highway Capacity Manual and choosing an appropriate layout.

1 Possible traffic control measures that are commonly evaluated for construction
2 scenarios include, but are not limited to:

- 3 1. Short term single lane closures on a two lane roadway utilizing a flagger
- 4 2. Long term single lane closures on a two lane roadway utilizing a
5 temporary signal
- 6 3. Single or multiple lane closures on a multiple lane or divided highway
- 7 4. Detour routes
- 8 5. Lane closures and/or turning movement restrictions at signalized
9 intersections

10 Generally the simplest appropriate method is chosen because it is most likely to
11 be what is expected by drivers. Complex or unusual traffic control plans do not meet the
12 expectations of users.

13 **Q. Please describe the process you used to develop an approach to**
14 **managing and mitigating traffic impacts during construction.**

15 A. For this Project, a number of alternate routes are generally available to
16 reach any given location. Due to this intricate road system in the Project area, a map was
17 created to allow the design team to choose appropriate roadways for transport, time of
18 day for transport and suitable routes for over-height and/or overweight deliveries. By
19 creating a well thought through plan for deliveries and construction vehicles traveling to
20 and from the loading zones traffic impacts can largely be avoided.

21 **Q. How will you ensure that the traffic management components of the**
22 **Certificate are being complied with at all times?**

23 A. Approved traffic control plans are a condition of NHDOT's permits. The
24 Traffic Control Plans created for the Project will be included as part of the contract
25 documents. These plans or an approved alternative plan meeting the requirements of the
26 Manual of Uniform Traffic Control Devices and approved by a certified traffic operations
27 engineer must be followed by the contractor during installation.

1 **Q. Please describe the NH Department of Transportation (“NHDOT”)**
2 **permits and other approvals that the Applicants are seeking that relate to**
3 **construction.**

4 A. The permits and approvals expected to be necessary for the completion of
5 this Project are:

6 1. A *Use and Occupancy Agreement* executed by NHDOT. This permit
7 allows the Contractor to install utilities within Limited Access State owned Right of Way
8 (LAROW), including Turnpike property. Once completed the permit serves as permission
9 for the approved elements to occupy an agreed upon area within the State LAROW.

10 2. An *Excavation (Trench) Permit* executed by NHDOT. This permit allows
11 the Contractor to excavate earth and/or roadway within the State ROW to install project
12 components. A key element of this permit is that any disturbed areas must be restored to
13 their original standards of design.

14 3. A *Turnpike Encroachment Permit* Application executed by NHDOT,
15 Bureau of Turnpikes. This permit controls and manages excavations within the LAROW.
16 It will allow the contractor to access the transmission line ROW across turnpike owned
17 property.

18 4. An *Application for Driveway Permit* executed by NDOT. If needed this
19 permit will be requested by the contractor to install a driveway from a NH State
20 maintained highway to access the transmission line ROW.

21 5. *Permission for Aerial Crossing*, granted by NHDOT. This permission is
22 obtained by petitioning the Department as outlined in the Utility Accommodations
23 Manual. Permission is granted after construction once the Department has completed a
24 field inspection to ensure that all poles and associated elements comply with all standards
25 stated in the Manual.

26 **Q. How will the Applicants ensure compliance with all of the**
27 **requirements of NHDOT permits and agreements when constructing the Project?**

28 A. Each NHDOT permit and agreement issued has a series of conditions
29 assigned that must be met by the Applicant. Upon issuance of the NHDOT permits and
30 agreements and the SEC Certificate of Site and Facility the Project will move forward
31 with selection of one or more Contractors to complete the work specified in the contract

1 documents (which include design plans and specifications). All conditions of the
2 NHDOT permits and agreements and the SEC Certificate of Site and Facility will be
3 included in the contract documents to be executed by the selected Contractor(s).

4 **Q. In your opinion, will the Project have a negative effect on public**
5 **safety with regard to public highways and local streets?**

6 A. As described above, it is anticipated that the traffic management
7 components of the Project will provide appropriate mitigation of the temporary impacts
8 to traffic to ensure that there will be no unreasonable adverse effects on public safety
9 along the public highways and local streets.

10 **Q. Does this conclude your testimony?**

11 A. Yes.