



Energy Financial Services

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January 2, 2009

Connecticut Energy Advisory Board
c/o CERC
805 Brook Street, Bldg. 4
Rocky Hill, Connecticut 06067
Attention: Gretchen Deans

Re: Response to CEAB Request for Proposals Seeking Alternatives dated November 4, 2008

Ladies and Gentlemen:

GE Energy Financial Services (GE EFS), a division of General Electric Company, is pleased to submit the enclosed proposal in response to the Connecticut Energy Advisory Board's (CEAB) request for alternatives to Connecticut Light & Power's (CL&P) Greater Springfield Reliability Project (GSRP) and Manchester to Meekville Junction Circuit Separation Project (MMP; together with GSRP, the "Transmission Projects"). As described below, we believe that the Towantic Energy Center, a 500 MW dual-fueled combined cycle generation facility to be located in Oxford, Connecticut (the "Facility") operating under a long-term contract with the Connecticut utilities, represents a superior option for Connecticut ratepayers when compared to the Transmission Projects.¹

¹ GE EFS recently made a proposal regarding the Towantic Facility to Connecticut Light and Power and The United Illuminating Company in connection with the Notice of Interest and Market Survey dated August 4, 2008, which we understand may lead to a DPUC-issued Request for Proposals in the near future. The proposal, which was submitted under cover of a confidentiality agreement, included specific pricing for a long-term tolling agreement and included our detailed proposed terms for that agreement. For competitive reasons, we are unable to provide similar specific pricing

According to the application filed with the Connecticut Siting Council for approval of the Transmission Projects, Connecticut Light & Power ("CL&P") proposes over **\$700** million of upgrades to the New England transmission grid to (a) increase grid reliability outside Connecticut, in Springfield, Massachusetts, (b) permit lower-cost, out-of-state power to be imported into Connecticut, and (c) prepare for the possibility that renewable resources may sometime in the future, be built elsewhere in New England for dispatch into Connecticut. Independent electricity market simulations performed on our behalf indicate that:

- ✓ reliability concerns in Massachusetts do not affect deliverability of electricity to Connecticut ratepayers
- ✓ due to new capacity additions in Connecticut, interface congestion between Connecticut and the rest of ISO-New England will be sharply reduced, virtually eliminating the economic benefits of additional transmission transfer capacity, and
- ✓ the renewable resources referred to by CL&P do not currently exist and we have found no indication that there are any such projects awaiting construction, developed, planned or even contemplated that are material in size. Interconnection with these resources, even if they are ever developed, will likely require additional massive build-out of the New England transmission grid not now proposed, requiring action in numerous states and localities and costing hundreds of millions not currently budgeted.

The report therefore concludes that, contrary to CL&P's assertions, the Transmission Projects "will yield little or no benefit to Connecticut ratepayers and will serve mainly to address the reliability concerns of customers in Massachusetts."

On the other hand, the Towantic Facility, constructed in a strategic southwest Connecticut location in the Town of Oxford and operating under the long-term contract recently proposed jointly to Connecticut Light and Power and The United Illuminating Company (collectively, the Utilities) and further described below, will: (i) significantly reduce costs of electricity to Connecticut ratepayers; (ii) reduce Connecticut emissions by displacing older, dirtier and less efficient resources and (iii) may help mitigate reliability issues in the Springfield, Massachusetts area by further reducing the interface congestion between Connecticut and the rest of ISO-NE.

information to the CEAB without assurances that such information will be kept strictly confidential. We would be happy to discuss arrangements with the CEAB pursuant to which our proposal to Connecticut Light and Power and The United Illuminating Company could be shared with CEAB.

We believe building Towantic under a long-term tolling arrangement with the Utilities is a better deal for Connecticut ratepayers for these reasons:

The Towantic Facility is a Unique Resource

- ✓ **State-of-the-Art Baseload Plant with Favorable Environmental Impact** – The Facility is a highly-efficient natural gas fired combined cycle plant, with reliable, proven GE 7FA gas turbine equipment. The Facility is also fully permitted and designed to allow firing on ultralow sulfur diesel fuel oil to run during natural gas curtailment events. The Facility will be air-cooled, resulting in far less water use than conventional plants and incorporates selective catalytic reduction (“SCR”) technology for NOx emissions reduction and an oxidation catalyst to reduce CO emissions. The Facility is in the process of recertifying its BACT analysis to the DEP and its air permits will be among the most environmentally stringent in the country.

According to simulations conducted by a number of independent consultants to the project, the Facility is likely to be dispatched more than 70% of the time (close to 100% of the time during the summer peak period), and will therefore displace older, less efficient and dirtier oil and gas -fired generation. Our studies reveal that annual NOx, SO2 and CO2 emissions in Connecticut will be reduced by 80, 60 and 216,000 tons, respectively if Towantic is built and is dispatched to displace these other older and dirtier units. Oil consumption in Connecticut will be reduced by roughly 3 million gallons (6.5%) by decreasing energy production from older oil burning units in Connecticut.

- ✓ **Advantageous Location** – The Towantic site is in Oxford, Connecticut, planned as the centerpiece of Oxford’s Woodruff Hill Industrial Park, located approximately ½ mile from the Waterbury-Oxford Airport. The Facility will interconnect to the ISO-NE grid through a new on-site switchyard integrating three 115 kV transmission lines crossing the site. ISO-NE has completed the Facility’s System Impact Study, which has been approved by ISO-NE’s Reliability Committee with the finding of “no significant adverse effect” on the transmission grid. A new compressor station on the existing Algonquin natural gas pipeline directly abuts the site for interconnection to the Facility at a modest cost.

The site straddles the Utilities’ respective service territories and is considered by ISO-NE to be in “southwest Connecticut”. Locational marginal prices at the interconnection point closest to the site have historically been higher than at the ISO-NE hub, Southwest Connecticut prices and at times, in Stamford-Norwalk sub-region.

- ✓ **Towantic is Fully Developed** – the Facility has obtained all of its permits (including Connecticut Siting Council approvals and Connecticut air and water permits from the Connecticut Department of Environmental Protection) and

could be on line as early as 2012. Towantic has obtained a firm equipment supply offer from GE Energy and has both a completed design and an EPC consortium ready to go (likely led by Gemma Power Systems, Glastonbury, Connecticut). The Facility was approved by a Town vote and continues to have strong support of the Town.

Our Proposal

The Transmission Projects propose that, in return for over **\$700** million of estimated construction expense, years of permitting, hundreds of acres of disruption and permanent environmental damage to sensitive areas, the Connecticut ratepayers will receive the opportunity to interconnect with as-yet unplanned renewable resources which may someday be built in Maine or New Hampshire and to pay for upgrades primarily designed to solve reliability issues in Springfield, Massachusetts.

Instead, Towantic proposes to enter into a long-term tolling arrangement with the Utilities which will:

- ✓ Shift Development, Construction and Operating Risks from the Ratepayers to the Facility Owners – Rather than cost-of-service pricing prevailing for the Transmission Projects, Towantic is willing to lock in firm pricing for its power which will not increase even if construction or operating costs increase over the term of the proposed tolling arrangement.
- ✓ Allow Utilities to Procure Long-Term Power – instead of relying on short term and volatile standard service contracts with unstable financial counterparties, a long term agreement with the Facility will allow price stability based on a high quality, physical asset located in state, where the power is needed.
- ✓ **Most important, Towantic Provides Significant, Quantifiable Economic Benefit to Connecticut Ratepayers** – GE EFS engaged The Brattle Group, the consulting firm utilized by the Utilities in preparing their 2008 Integrated Resource Plan, to evaluate Towantic’s economic benefits to Connecticut ratepayers. (A summary of this study is provided with this proposal as Exhibit F- summary of Brattle Group report (redacted).) The study concluded that a long-term contract (15-30 years) with Towantic would provide significant rate, risk mitigation and other public policy benefits to the Utilities and their customers. For the period from 2012-2018, the study estimates that **building Towantic would reduce power costs to Connecticut ratepayers by approximately \$45-\$90 million per year, net of the contractual cost of Towantic.**

In addition, GE EFS also sponsored a study by GE Energy Applications and System Engineering which shows that *“the Towantic project will provide the following benefits to ratepayers in Connecticut:*

- *Average annual energy costs will be reduced by approximately \$40 million as the highly efficient, baseload Towantic unit will displace higher cost generation in the state and in ISO New England.*
- *Annual capacity price savings would average close to \$45 million dollars primarily due to the deferment of increased capacity prices when new capacity is needed.*
- ***A cumulative net benefit of \$420-600 million dollars for Connecticut ratepayers for the years 2012 through 2019 depending on the contractual option chosen by the State of Connecticut.”²***

The Sponsor

The Facility is being developed by GE EFS located in Stamford, Connecticut, an affiliate of the General Electric Company headquartered in Fairfield, Connecticut. GE EFS and its affiliates have a long history of developing and investing in independent power projects with an investment portfolio of \$20 billion, including power generation projects utilizing virtually all technologies and fuel types. GE EFS is not currently a major participant in the NEPOOL market and the Facility represents a new supply source in the region, without the market power arising from ownership of other generation resources.

Being a member of the GE family, GE EFS partakes of the unsurpassed financial performance and control processes that have allowed GE to maintain its AAA credit rating over the decades. This relationship and our experience can give the State of Connecticut comfort that we will be able to meet the commitments contained in our agreements. In addition, GE EFS has access to the background and experience of GE Energy, the world’s leading turbine manufacturer and electric facility operations and maintenance provider. As governments and utilities throughout the world seek increased efficiency and decreased emissions related to electricity generation, they turn for help to GE as a leader in innovative technology and reliability.

CEAB Preferential Criteria for Evaluation of Energy Proposals

As described above, GE EFS believes that building the Towantic Facility with a long-term utility tolling agreement is the best way to lower electricity costs to Connecticut ratepayers and stabilize prices and reduce risk of cost increases. We would also

² A copy of the study is included in this proposal as Exhibit G- GEASE study. The study was performed using a public version of the GE-MAPS database that was developed to study the impact of Green House Gas emissions on the Eastern Interconnection for unaffiliated customers of GE EA&SE. Further information regarding assumptions used in the simulations is included in the full study.

point out that Towantic scores highly when measured against the CEAB's own evaluation criteria.

- Meet Identified Energy Needs – As explained in the Connecticut Siting Council 2008-2017 Ten Year Forecast, NRG Energy Inc. recently testified that it is likely that a number of its Connecticut facilities (cumulative 1600 MW) will be retired in the 2008-2017 time period. The report goes on the state that “such retirements could create a material deficiency in generating capacity in the state, especially so in the early years of the forecast period.” As the CEAB is surely aware, the difficulty of permitting power plants in Connecticut and obtaining electric interconnection permission from ISO-NE means that any new project first planned today will likely take 5-10 years to achieve the development status of Towantic, which can come on line as early as April 2012. Failure to plan ahead for the retirement contingency will result in either soaring electric rates or supplemental payments to old, inefficient plants.
- Enhance System Reliability –

Fuel Self-Sufficiency. Towantic is dual-fueled to both provide the benefit of clean, efficient natural gas-fired generation and provide for operation through gas curtailment scenarios using ultralow sulfur diesel fuel oil. The Facility will be capable of on-line switching of fuel (from natural gas to diesel and back) and will have storage for over 1.6 million gallons of ultralow sulfur diesel fuel oil on site. Dual fuel capability allows the Facility to avoid expensive firm gas transportation contracts and, instead, acquire significantly less expensive interruptible gas transportation.

Proven Technology. The Facility's GE 7FA gas turbine technology is proven and an industry standard for reliability since its introduction in 1987. With over 1,000 units shipped and more than 20 million hours in operation, the turbines are relied upon in a variety of climates and elevations and in a wide range of applications.

Distributed Generation. The Facility is not, itself, a traditional distributed generation resource. GE EFS believes that there remains an important place in Connecticut for plants that “make a difference” both economically to significantly reduce electric costs to ratepayers and to provide economic stimuli to a region, such as New Haven County, which needs industrial operations to improve the quality of economic opportunity for its residents. In addition, GE EFS has initiated discussions with the Town of Oxford regarding the opportunity to assist the Town in developing an Energy Improvement District based in the Woodruff Hill Industrial Park, where the Facility's site is located and possibly encompassing the Waterbury-Oxford Airport and other properties currently in development in the Town. Such opportunities might include “combined heating and power” and additional peaking resources, possibly including a fuel cell application.

- Promote Diversity of Fuel Supply – see above.
- Use of Existing Infrastructure – The Facility is well-poised to utilize the existing transmission grid with virtually no upgrades necessary to deploy a clean, efficient unit to replace less efficient and dirtier gas and oil fired units which the State has desired to shut down for many years.
- Provide a Long-Term System Benefit – Towantic can provide a number of long-term benefits to the Connecticut electric system. First, it will be a baseload resource located in a load pocket. This will reduce Connecticut's reliance on payments to out-of-merit generators to assure resource adequacy. As indicated by the Brattle Group, Connecticut ratepayers will save \$4-\$7 million per year in such costs. In addition, a long-term tolling arrangement as we propose will shift procurement and operating risk from the Utilities (and therefore, through cost-of-service recovery available to the Utilities, from the Connecticut ratepayers), to the Facility and its owners and provide a stable cost for power.
- Favorable Economics – As described above, the Towantic Facility will significantly reduce electricity payments for Connecticut ratepayers. In addition, the project will provide much needed property tax revenues to an under-developed area of Connecticut as well as near term state sales tax revenues estimated at over \$20 million. This is a large infrastructure project generating almost 450 construction jobs over a 2-3 year construction period and over 20 permanent jobs.
- Environment – The Towantic project has gone through rigorous analysis over a period of 10 years to ensure that it maintains the smallest environmental footprint possible. In addition to air permits that are among the most stringent in the US, the Facility was required to make numerous modifications in the course of lengthy and sometimes contentious proceedings at the Connecticut Siting Council (including shifting its General Arrangement to a lower elevation to address community concerns). As described above, the Facility will lower Connecticut emissions of NOx, SO2 and CO2 by 80, 60 and 216,000 tons annually and reduce state-wide oil consumption by 6.5%. The project has also been funding the cost of operating two water-level gauging stations on the Pomperaug River. The gauging stations are operated by the US Geological Survey at the request of the Pomperaug River Watershed Coalition to confirm that the Facility will not have an adverse affect on the River during its useful life.

Finally, we reiterate that, unlike any other generation project in Connecticut, the Towantic project is **ready to go now**, to start generating tax revenues, job opportunities and cost savings to Connecticut ratepayers, but it cannot be

maintained in its current status forever. Unless this project is given State regulatory support through a tolling arrangement with the Utilities, it may need to be permanently abandoned. We urge that, in evaluating large-scale energy projects, the Towantic Facility be given due consideration as the better solution to strengthen Connecticut's energy future.

If you have any questions or would like further information regarding our proposal. Please contact the undersigned or Vimal Chauhan, Senior Vice- President, Risk at (203) 961 5223, vimal.chauhan@ge.com or Cindy Fitzgerald, Senior Vice- President, Risk at (203) 961 5312, cindy.fitzgerald@ge.com .

Very truly yours,

A handwritten signature in black ink, appearing to read 'Amy H. Fisher', with a long horizontal flourish extending to the right.

Amy H. Fisher
Managing Director