

**Pure Energy Infrastructure, LLC Response to
New York Power Authority
New York Energy Highway Request For Information
May 30, 2012**

PROPOSAL # 1



Introduction

Pure Energy Infrastructure, LLC (“PEI”) is pleased to submit this Proposal to the New York Power Authority (“NYPA”) in response to the New York Energy Highway Request For Information.

PEI proposes to form a Public – Private Partnership (“Partnership”) with NYPA for the purpose of repowering NYPA’s New York City LM-6000 In-City Peakers (“In-City Peakers”) to combined cycle gas-fired power generating facilities.

PEI has formed an experienced Project Team that would work in concert to assess the repowering potential for each of NYPA’s six (6) In-City Peakers that consist of four (4) sites with 2x0 simple cycle configurations and two (2) sites with 1x0 simple cycle configurations representing a total generating capacity of approximately 490 megawatts (MW).

PEI believes that based on its prior experience siting, developing, permitting, financing, and constructing the 1x1 LM-6000 Bethpage III project (Long Island) that there is significant potential to repower some or all of the In-City Peakers. The Bethpage III project was completed in a land area of approximately 2.3 acres.

In summary, PEI’s proposal is to perform an assessment of each In-City Peaker site to determine the permitting, technical, financial, and community acceptance of repowering these sites into combined cycle plant configurations and operation. Under this Partnership, PEI and its Equity Partner(s) would fund all the development and equity capital to assess, permit and reconfigure the feasible sites. NYPA would continue to own the base asset and PEI and its Equity Partners would own the incremental capacity and would negotiate an arm’s length Power Purchase Agreement with NYPA for the new incremental MWs added as a result of the repowering. Under the Partnership, NYPA would continue to operate each reconfigured site and have direct and contractual ownership of all power output and related products. Major maintenance costs would be paid by the Party owning the discrete asset (combustion turbines, steam turbines, etc.).

Based on PEI’s analysis, reconfiguring the In-City Peakers to combined cycle mode under the proposed Partnership would produce the following benefits:

1. NYPA does not have to use any of its ratepayer’s funds, cash, lines of credit or encumber its balance sheet to undertake this effort;
2. Combined cycle operation would reduce In-City Peakers’ heat rate from ~10,100 to ~7,900 HHV (unfired) and 8,700 HHV (fired) , representing a 21.8% and a 13.9% improvement in overall fuel efficiency, respectively;
3. Long-term fuel cost savings for NYPA and its ratepayers, pertaining to the 490 existing base MW, would represent multiple millions of dollars in fuel savings.
4. Per kWh emission rates would be significantly reduced producing a positive environmental impact;
5. Assuming all six sites could be reconfigured, 305 MW of new, clean, efficient In-City generation capacity would be added at existing sites, eliminating the need for new generation sites;

6. New 302 MW of additional In-City generating capacity would be achieved at a per unit cost that is a fraction of Zone J cost of new entry or “CONE” and far more economical than other new alternative transmission or generation options;
7. NYPA’s base megawatts’ (~490 MW) capacity factor would significantly increase;
8. This undertaking would result in 200 – 300 new construction jobs for an extended period;
9. Reconfiguration of each site would be phased to minimize system impacts due to construction related downtime; and
10. Additional capital investment could result in additional property taxes for New York City, depending upon final asset ownership structuring.

This proposal is discussed in more depth throughout our response.

Finally, the reader should take note that the Principals in PEI have been directly responsible for adding three (3) high efficiency, clean, new generating facilities in the Zones J and K markets, over the last ten years, and have been very successful in understanding and managing power-related infrastructure additions in New York’s urban markets.

We look forward to discussing this proposal in greater depth.

Section One – Respondent Information

The principal respondent to the New York Energy Highway RFI is:

Pure Energy Infrastructure, LLC (“PEI”)
197 8th Street, Suite 525
Charlestown, MA 02129

Primary Contact: Paul A. Barnett, CEO
Direct: 1-508-380-3958
Primary Email: pabbarnett@gmail.com

Principal Members are:

Paul A. Barnett, Founder & Chief Executive Officer
John Niland, Member (Chief Development Officer)
Timothy Leary, Member (Chief Commercial Officer)

Principal Member’s bios are attached in the Section Seven.

PEI has assembled a very experienced Project Team to manage all phases of this project. This Project Team includes the following participants:

Participant	Area of Focus	Principal Location
PEI	Lead Developer & Project Team Lead	Charlestown, MA (Boston)
Private Equity Partner(s)	Equity Investor	To be determined – discussions underway
ESS Group	Permitting & Outreach	Waltham, MA
Morgan Lewis	Legal – General Commercial	Boston, MA & NYC, NY
Beveridge & Diamond	Legal - Permitting	NYC, NY
Pterra, LLC	Transmission & Interconnection Studies	Albany, NY
EJG Strategic Partners	Communication & Outreach	Merrick, NY
General Electric	OEM	Schenectady, NY
EIG Engineers	Interconnection Design & ISO/TO Interface	Sutton, MA (Union City , NJ)
Power Engineers	Engineering & Design	Colorado Springs, CO

PEI sees this Public – Private Partnership (“Partnership”) as being one where PEI’s Project Team and NYPA are working together to bring about the most successful outcome possible. Specific roles and primary responsibilities will be discussed and determined in concert with NYPA.

PEI’s Principals have previously worked with NYPA representatives during the addition of two generating facilities on Long Island while employed at Calpine Corporation.

Section Two -- Project Description

PEI's proposed project is to form a "public – private" partnership with NYPA for the expressed purpose of redeveloping the In-City Peakers into combined cycle power generation resources.

PEI has in-depth knowledge of developing power resources in New York State, particularly in urban settings. PEI's staff have successfully developed, financed, and brought to commercial operation two projects in Zone K (Long Island) and one project in Zone J (NYC).

Project	Location	Technology/Configuration	Size (MW)/ Year COD
Bethpage Peaker	Hicksville, NY	1x0 General Electric LM-6000	49.0 / 2001
Bethpage III	Hicksville, NY	1x1 General Electric LM-6000	79.9 / 2004
Bayonne Energy Center	Bayonne, NJ	8x0 Rolls Royce Trent 60	512.0 / 2012
Total MW Installed			640.9

PEI believes there is an opportunity to use the existing NYPA In-City Peaker site(s) to add up to 302 megawatts of new high efficiency In-City combined cycle generation while also converting NYPA's 490 MW of existing capacity into combined cycle gas-fired generation.

Based on PEI's cost estimates to date, PEI strongly believes that this new 302 MW capacity addition could be achieved at a capital cost significantly below NY ISO's Zone J cost of new entry (CONE), which would result in significant ratepayer savings for NYPA's customers, including the Port Authority, City of New York, and the MTA. PEI would be pleased to discuss its cost estimate with NYPA at the appropriate time.

Once the Public-Private Partnership is agreed to between PEI and NYPA, the Project would be broken into the following phases:

1. Site, infrastructure, and regulatory feasibility assessment – the purpose is to determine which sites are physically, technically, economically and regulatory feasible;
 - a. Preliminary transmission and interconnection studies would be performed in this phase;
 - b. An overall schedule will be developed including the Article X permitting and licensing requirements
2. Correlate detailed design of redevelopment work and associated equipment to project pro-forma to refine economic assessment;
3. PEI secures long lead time equipment production slots to ensure in service date schedule; and
4. Secure and close construction financing and give full notice to proceed with construction, based on the site redevelopment prioritization developed by the Partnership.

The Table below outlines the six sites currently used for NYPA’s In-City Peakers and shows the existing and incremental MW for each site. The Partnership’s site feasibility assessment would determine the feasibility of converting these sites to combined cycle configuration and operation.

Site Location	Configuration	Operating MWs	Redeveloped MWs
Pouch Terminal - Staten Island	1x0	49	80
North 1st & Grand - Brooklyn	1x0	49	80
3 rd Ave & 23rd St - Brooklyn	2x0	98	158
Vernon Blvd - Queens	2x0	98	158
Harlem River Yard – Bronx	2x0	98	158
Hells Gate - Bronx	2x0	98	158
Total		490	792
Heat Rate (HHV)		10,100	~7,900 ~8,700 (a 13.9% to 21.8% improvement)

Redeveloping these sites has the potential to add 302 MW of In –City Generation on a very cost-effective basis while improving fuel efficiency and environmental performance.

Section Three – Project Justification

Repowering the In-City Peakers to combined cycle resources through the Partnership makes eminent sense for NYPA, NYC, and other stakeholders. The reasons are many but here are some of the most pressing reasons:

1. Preservation of Natural Resources – repowering to combined cycle will improve the fuel efficiency by close to 25%, representing millions of dollars in savings to NYPA and its ratepayers over the long-term
2. No Financial Risk to NYPA -- Use of private equity and a proven Project Team will ensure the success of this undertaking without exposing NYPA or its ratepayers to cost overruns;
3. Emissions Reductions and Environmental Improvement -- Converting to combined cycle operation will significantly reduce the emissions associated with the energy produced on a pounds per MWh basis, including SOx, NOx, and CO2;
4. Stimulating In-City Construction Jobs – PEI estimates that between 200 and 300 high value construction jobs, across multiple Unions, will be created by the undertaking of this repowering effort.
5. Low Cost Power Resource –converting these In-City Peakers to combined cycle operation represents the lowest cost new power resource addition available in the New York City market.

Section Four – Financial

PROPOSED FINANCING PLAN:

PEI and its Private Equity Partner(s) will be responsible for providing all the development and long-term equity required to complete these repowerings to combined cycle operation. In addition, PEI will secure all the debt financing needed to provide adequate leverage associated with financing this Project.

PEI's seasoned staff has years of experience in financing over \$2 billion of power projects in both the United States and internationally. Members of the finance staff have worked at major New York City based project finance banks and independent power companies. PEI can utilize its experienced finance team and call on its relationships with the leading project debt providers to source, structure, and close the optimal financing for the Project. PEI will access the lowest possible cost of debt and equity capital and pass the cost benefit through to the projects and to NYPA's ratepayers.

PEI recently closed the financing for the 512 MW Bayonne Energy Center located in Bayonne, NJ. This approximately \$400 million non-recourse project finance loan was very well received in the debt markets and won several industry awards including:

- North American Power Deal of the Year for 2010; and
- Power Deal of the Year 2010 for The Americas, awarded by Project Finance International.

The financial viability of this proposed Project would be extremely robust as a result of the following factors:

- Involvement of NYPA in the Partnership and as Project Offtaker
- Involvement of PEI, an experienced Developer, Financing Party, and Asset Manager with years of experience in the New York Market
- Involvement of Top Tier Private Equity Partner Focused on the Energy Sector
- Proven high efficiency design and technology manufactured by General Electric
- Availability of low cost project debt in a favorable interest rate environment
- Project location in New York City which is a high demand load pocket
- Low cost new, clean power generation resource addition

PEI's financing plan for the project includes three phases: Development Financing, Long-Term Financing, and Permanent Equity. The three phases are described below.

Development Financing:

From the early development stage right up until the closing and funding of construction financing all project development costs, including permitting, legal, design, engineering and equipment costs required prior to the commencement of construction, will be provided as equity contributions by PEI and its Equity Partner(s). Closing of construction financing is expected to occur on a schedule required to support the construction start date and planned COD.

Long-Term Financing Arrangements:

Long-Term financing arrangements for the Project will be managed and sourced by PEI. PEI has strong relationships with the major international project finance lending institutions and has recently worked with the following banks: Credit Agricole, WestLB, GE Finance, Societe Generale, Investec, Intessa San Paolo, LBBW, and US Bank. Other project financing banks that PEI has relationships with are ING, BOT-Mitsubishi, Natixis, Sumitomo, John Hancock, Prudential, Mizuho, Morgan Stanley, Citibank, and Goldman-Sachs.

In the current project finance debt market there are a limited number of transactions coming to market. Natural gas project development is very slow due primarily to low electric energy and capacity prices. New coal projects are virtually non-existent due to shrinking dark spreads (difference between cost of coal as fuel and electric prices) and environmental concerns. The renewable sector is the only sector with any significant activity. However, financing renewable projects is complex due to the necessity to monetize tax credits and the reliance on SREC's in many markets as a project's primary revenue stream. A project with a long-term PPA from a credit worthy entity, without reliance on monetization of tax credits or government subsidies, will be strongly received in the project finance market

The Project's long-term financing will be structured as a non-recourse project financing that will consist of a construction loan converting to a term loan at project completion. In addition, a working capital debt facility and a letter of credit facility may be included. The debt-to-equity ratio will be determined based on the length of the PPA and debt market conditions. Loan pricing and fees will be subject to market conditions at the time of financial close. Based on current market conditions we anticipate interest rates in the six to eight percent range and upfront fees of between two and three percent.

Permanent Equity:

After financial closing PEI's Private Equity Partner(s) shall provide permanent equity as required under the financing documents in order to meet the project's agreed upon debt / equity levels. Permanent equity may either be contributed pro-rata with debt at the time of each construction draw or in total at the end of the construction period.

Section Five – Permits & Approval Process

PEI has been successful permitting complex power projects in New York State and has permitted three power projects in the last ten years. Bayonne Energy Center, a 512 MW NY ISO Zone J resource conceived and developed by PEI Principals, was the latest and required permits and approvals from the following:

- NYC DOT
- NYC DEC
- NYS DEC
- USEPA
- NY PSC
- US Army Corp of Engineers
- City of Bayonne
- NJ DEP

PEI and its Project Team has a current set of relationships with various City and State Agency staff members and has an established reputation for creating positive solutions to difficult problems in a positive manner.

Through the Partnership, the permitting strategy for the repowerings will be developed and the lead member responsible for various permits and approvals will be assigned. PEI has specifically sought out and secured two Project Team Members to support the permitting requirements associated with this proposal.

Legal support will be provided by Beveridge & Diamond and PEI Principals have a successful track record permitting power projects in concert with Beveridge & Diamond.

PEI's Lead Permitting Consulting Engineering firm will be ESS Group of Waltham Massachusetts. ESS Group has a proven track record in permitting power generation assets and recently worked with PEI Principals in securing the NYS PSC issued Article VII Certificate required for the Submarine Transmission System that interconnected the Bayonne Energy Center's power generating facility to Con Edison's newly constructed 345 KV 8 Breaker Ring Bus in South Brooklyn, NY.

The Power Act of 2011 resurrected and updated the old New York Public Service Law Article X process. Any repowering or modification of the existing NYPA simple cycle electric generating facilities that would exceed the 25MW threshold will need to secure a Certificate of Environmental Compatibility and Public Need under the new Article X process. The new Article X requires a three phase process including; Pre-Application, Application and Hearings before the Siting Board can certify the construction and operation of the proposed projects. Under the new Article X process, each of NYPA facilities that will be proposed for modification will likely require a separate Article X application increasing the effort of permitting the re-power projects.

The New Article X process requires and encourages public participation.

PEI has significant experience in the use of "open house" style communication forums to communicate project benefits, address community members' questions and listen to concerns raised, if any. Additionally, PEI would envision briefing Community Leaders and NYC Borough Presidents on the benefits associated with this repowering. Detailed environmental performance would be discussed as well as the broad array of benefits accruing to NYC from this repowering effort.

PEI has prepared a draft permitting schedule inclusive of the new Article X process and this schedule will be presented and discussed in depth at the appropriate time.

Section Six – Other Considerations

PEI's proposal for repowering the In-City Peakers represents the most effective power resource addition that can be made to NYC. As such, we believe NYPA and its Stakeholders should give serious consideration to the proposed Partnership as this project is **100% New York State project**.

100% of the benefits will be garnered within New York State and New York City and the benefits include:

- Very substantial long-term fuel savings to NYPA and its customers, including the City of New York;

- Significant environmental improvement as a result of significant improvement in fuel efficiency and emissions controls;
- Addition of a very significant number of long-term, high value construction jobs and positive economic spin off effects of direct and indirect economic activity;
- Zero capital risk to NYPA and its customers/ratepayers; and
- Low-cost clean power resource addition to New York City that will create energy cost savings for New York City, Port Authority, MTA, and the residents of NYC.

Section Seven – Additional Information

1. PEI Member Bios

In order to complete the project development PEI has the capability to assemble and manage a world class team consisting of environmental, technical, engineering, public relations, lobbying, legal and other specialists necessary for successful project development. PEI has formed a highly experienced Project Team to cover all of the pertinent aspects necessary for developing, permitting, financing and constructing the proposed repowering projects.

- PEI's staff and supporting contractors experience is with both large scale power project development (500 MW or greater) and smaller scale (LM 6000) projects and have over 5,500 MW of successful Project Development
- PEI has a proven track record of successful development of greenfield and brownfield projects in both rural and urban settings, including the 512 MW Bayonne Energy Center, currently in operation in the greater New York City area (New York ISO Zone J).
- Successful project financing track record, including new project construction financing, long-term project financings as well as financing of acquisitions and restructurings such as sale-leaseback transactions.
- Extensive construction management experience, including EPC proposal solicitation, evaluation, and contract negotiations.
- Major equipment procurement expertise, including the recent negotiation and procurement of major equipment in conjunction with the above referenced Bayonne Energy Center.
- Several of PEI's Principals and select Management have extensive experience performing asset management responsibilities for over 20 of Calpine's developed and operating projects, while employed by Calpine.
- PEI has strong relationships with leading experts in the power sector in the fields of power engineering, specialty engineering, (water, wastewater, geotechnical, marine geophysical and geotechnical, etc.), transmission, infrastructure, fuel supply, permitting feasibility and permitting, environmental remediation, public relations and outreach, lobbying and legal services.
- PEI has relationships with several large Private Equity firms that specialize in investing in the Energy Sector. PEI has discussed this proposal with several and once the scale is better understood the appropriate Private Equity participants will be selected and secured.

Bios of PEI's Principals are provided below.

Paul A. Barnett

Founder, Member & Chief Executive Officer

Mr. Barnett is founder of Pure Energy Infrastructure LLC. Prior to PEI, Mr. Barnett was a co-founder of Pure Energy Resources, LLC (PER) where he led the development of the Bayonne Energy Center (BEC). Prior to founding PER Mr. Barnett was a member of Calpine Corporation's Boston-based Senior Management Team that initiated Calpine's East Coast business operations, including the management and expansion of Calpine's initial portfolio from 700 MW to in excess of 7,000 MW. He directly led the development effort to site and license the Osprey Project, a 660 MW CCGT facility located in Auburndale, FL, adjacent to the Auburndale Cogen plant. He also developed a 50 MW peaker project and 79.9 MW CCGT project, both located at Calpine's Bethpage, Long Island site and under contract to the Long Island Power Authority, (LIPA).

In addition, Mr. Barnett led Calpine's successful acquisition of Statoil's interests in two Long Island, NY assets (KIAC, Stony Brook), and Edison Mission Energy's interest in the Auburndale Power Partner's project. Mr. Barnett also led the divestiture of Calpine's interests in the Bayonne Cogen and Lockport projects, and led the successful PPA monetization of the Newark and Parlin, NJ projects. Mr. Barnett's experience includes responsibility for Calpine's Eastern asset optimization efforts where he had direct P&L responsibility for managing and improving over 20 operating and late stage development projects. Mr. Barnett participated as a Partnership Committee Member in all of Calpine's Eastern Region's project partnerships.

Mr. Barnett's 29 years of experience in the energy sector also includes management responsibilities at Green Mountain Power, Unitil Service Corp. and Fitchburg Gas & Electric where he held a variety of positions, including responsibility for development and implementation of these organizations' energy services programs.

Mr. Barnett earned a BS in Business Administration from Siena College, and a MBA in Business Administration from the Whittemore School of Business and Economics at the University of New Hampshire.

John E. Niland PE

Member, Chief Development Officer

Mr. Niland has over 30 years of power industry experience. Mr. Niland's responsibilities as Vice President of Business Development at PER include analyzing, evaluating and managing both greenfield and brownfield development and acquisition opportunities in the energy infrastructure sector and ensuring that the development effort is supported by financially viable long term contracts.

Mr. Niland was a Vice President Business Development; for Pure Energy Resources LLC (PER), responsible for pursuing development opportunities with strategic partners including developers, private equity firms and energy companies. This included identifying the specific development, M&A or RFP opportunities, management of the overall development process (design, siting, budgeting and contracting for the development opportunities), as well as interfacing with government and regulatory agencies involved in the permitting and contracting for the facilities. Development technologies included natural gas peaking and combined cycle, wind, solar and large scale energy storage using compressed air. Market development opportunities included Ontario, (OPA), NY ISO (NYPA, LIPA), and NE ISO (MA DOER, and CT DPUC).

Mr. Niland was a Vice President Development for NRG Energy responsible for the overall development and project management of development projects being proposed on existing NRG sites in Connecticut.

Prior to NRG, Mr. Niland held various positions at Calpine Corporation, including Director of Project Development. As Director of Project Development, Mr. Niland's responsibilities included overall development and project management for several projects in multiple states simultaneously. The combined cycle projects he was in charge of included, Greenfield Energy, (1,005 MW), Hillabee Energy Center (605 MW), located in Alexander City, AL, Bethpage Energy (79 MW), Columbia Energy (705 MW) and Ontelaunee Energy Center (560MW).

Prior to joining Calpine, Mr. Niland held several positions at Stone & Webster Engineering Corporation that included engineering, project management and business development and was the project engineer on two combined cycle projects; Tiverton and Rumford, both are 1x1 combined cycle projects with 265 MW of output located in RI and ME respectively.

Mr. Niland brings a unique combination of technical expertise, project development execution (construction) and operational experience, as well as an understanding of the energy markets and the strategic value various types of energy projects can add to the business. Over his career, Mr. Niland's experience has included the successful development, execution and operation of projects involving multi-party joint ventures and projects that involve the use of complex technologies. Mr. Niland has a proven history of successful project development, project management, joint venture and partnership agreements. His project experience includes both domestic and international power projects covering the full range of steam/electric power technologies including coal, oil and nuclear facilities.

Mr. Niland graduated with High Honors from Northeastern University in Boston with a BS in Mechanical Engineering.

Timothy Leary

Member, Chief Commercial Officer

Mr. Leary has over 19 years of experience in the Independent Power Industry primarily in the finance, development, and asset management areas. His responsibilities at PER include management of the economic analysis of potential project developments and acquisitions, project and corporate financing, treasury and contract negotiation and execution. Prior to joining PER, Mr. Leary was a Director of Commercial Management in Calpine Corporation's Eastern Regional Office located in Boston, Massachusetts.

As one of the original members of the Commercial Management Team, Mr. Leary's responsibilities included asset management of Calpine's operating assets in the Northeast United States, acquisitions, divestitures, development support, financing and contract monetizations. His other industry experience includes his role as Director of Finance for Wheelabrator Technologies, the leading company in the waste to energy sector. His responsibilities at Wheelabrator included both domestic and international financial support for project development and project financing.

Mr. Leary has over five years of experience in Commercial Banking specializing in Project Finance. He was an Assistant Vice President in the Project Finance Group at Sumitomo Bank in New York City, and began his career in the Energy Sector as a Loan Officer in the Utility and Project Finance Group at Shawmut Bank in Boston.

Mr. Leary earned a BA from the University of Massachusetts at Amherst, and a MBA from Bentley College.

2. Project Team Profiles

a. Beveridge & Diamond:

Beveridge & Diamond is a national full-service environmental law firm. As part of B&D's general environmental practice, Stephen L. Gordon has established a strong practice in New York State in the electric power generation and transmission industry, on behalf of independent power companies. This practice area has spanned the entire range of environmental law and power siting authorities, including the Clean Air Act, the Clean Water Act, wetlands, environmental impact review, site remediation issues, and hazardous substance storage, as well as land use, zoning, lease preparation and related real estate issues. Specifically, these efforts have involved:

- Assistance with permit applications, including representation before regulatory agencies in both informal sessions and formal hearings;
- Legal support for construction and project financing;
- Due diligence reviews of existing facilities on behalf of potential purchasers or investors;
- Assistance to facility owners and operators in ensuring compliance with environmental permits and
- regulations;

- Supporting defense in judicial review of administrative determinations related to power siting and issuance of environmental permits; and
- Defense of enforcement actions brought by State agencies for alleged violations of air and wastewater discharge permits.

Additional information can be found at [http://www. bdlaw.com/](http://www.bdlaw.com/)

b. ESS Group:

The ESS team of scientists, engineers, and regulatory specialists provides a comprehensive range of services related to energy facility development, land and waterfront development, water resource management and ecology, and industrial permitting and compliance. The integration of a wide array of technical disciplines within a single firm makes ESS a convenient "one-stop shopping" resource for both core services and added value specialties. ESS also has environmental monitoring, construction management, and operation and maintenance capabilities to provide full project life-cycle client services after project permitting. More information on Power can be found on their website, <http://www.essgroup.com/>

Over the past 15 years, ESS has provided energy consulting services for more than 10,000 MW of proposed power generation and more than 500 miles of proposed electric transmission. Many ESS power generation projects are now under construction or in operation. These provide added generation capacity, improved reliability, and/or enhanced environmental performance. Many provide power at reduced costs thanks to more diverse fuel supplies and/or more efficient operating technologies.

ESS staff have permitted and assisted in the development of dozens of traditional baseload generation and co-generation projects. These have ranged from small inside-the-fence units added to industrial sites to ensure reliability to 1,000+ MW new generation or repowered units. ESS also supports projects proposing first-of-its-kind technology, like offshore carbon sequestration, and assists energy clients who seek opportunities through regulatory-like procurement of Emission Reduction Credits (ERC) and Greenhouse Gas (GHG) emission calculations/reporting.

c. Energy Initiatives Group, LLC:

Energy Initiatives Group, LLC (EIG) is a specialized group of experienced professionals that provide project development, planning, strategy, execution, management, engineering, and operations consulting in the areas of electric transmission, generation, distribution, transportation, and renewable energy services.

EIG provides these services to traditional utility companies, project developers, regulatory bodies, energy companies, financial organizations, transportation companies, government agencies, and other organizations in the energy industry.

EIG's staff collectively possesses many years of experience in the electric energy and utility industry, and have successfully conceived, developed, and executed many real-world projects involving real-world challenges. Some of these projects have included:

- Planning, developing, constructing, and operating a 700 mile 2,000 MW +/- 450kV DC transmission system linking the US and Canada;
- Developing the reference plant electrical design for a modern 280 MW combined cycle single-shaft power train;
- Planning, managing, constructing, and commissioning a 490 MW combined cycle repowering of a 1920s-era generating plant;
- Coordinating, engineering, and designing portions of a 150 mile mainline railroad electrification system and its utility supply interconnections;
- Planning, developing, managing, constructing, and operating a 26 mile submarine cable system and interconnections between an island community and the mainland;
- Negotiating and executing power supply agreements for over 2,000 MW of large combined cycle capacity and energy, and over 600 MW of wind resources along with supply of associated renewable energy credits.

EIG have worked on projects and assignments in practically every region in the US, and have interfaced with over 35 utility companies and over a dozen reliability councils and ISOs/RTOs.

d. EJG STRATEGIC PARTNERS LTD:

EJG is a newly formed consulting company headquartered in New York that serves a variety of customers in the energy space, including developers, engineering firms, material suppliers, renewable companies and generators. The firm is headed by experienced energy executive Edward J, Grilli who has extensive experience and demonstrated capabilities in strategic planning, management, project development and cost containment. Highly effective in leading people, new initiatives and business development. In addition, strong networking, negotiation, managerial and interpersonal skills.

The firm specializes in strategic planning and business development for clients. With more than three decades at senior levels in high profile organizations, EJG has had numerous commercial dealings that have led to successful projects, new alliances and a healthier bottom line. EJG is also actively involved in brokering the sale and/or financing for numerous energy projects in North America.

e. Power Engineers:

POWER provided engineering for a new, clean-burning combined cycle plant in Long Island. The 80 MW Bethpage III combined cycle plant has an LM6000 Gas Turbine and a once-through heat recovery boiler. The plant will supply power to the Long Island Power Authority (LIPA) under a long-term supply agreement.

POWER's services include EPC bid development support to Calpine, full detailed design. POWER also completed the engineering and design work for the installation of a new 48 MW gas-fired aeroderivative turbine-generator at Calpine's Bethpage Energy Center, a power generation and cogeneration site located next to an existing Northrop/Grumman plant on Long Island. Calpine is one of the world's leading independent generating companies.

The new peaking unit, fueled by natural gas, provides critically needed seasonal peaking capacity to the Long Island Power Authority. With the new turbine in operation, the whole Bethpage complex can generate more than 100 MW of power (54 MW of baseload and 48 MW of peaking power) for Long Island electricity customers. POWER services included EPC bid development support to Calpine, full detailed design, procurement and expediting for Balance of Plant Materials, field engineering during construction and acceptance and start-up support.

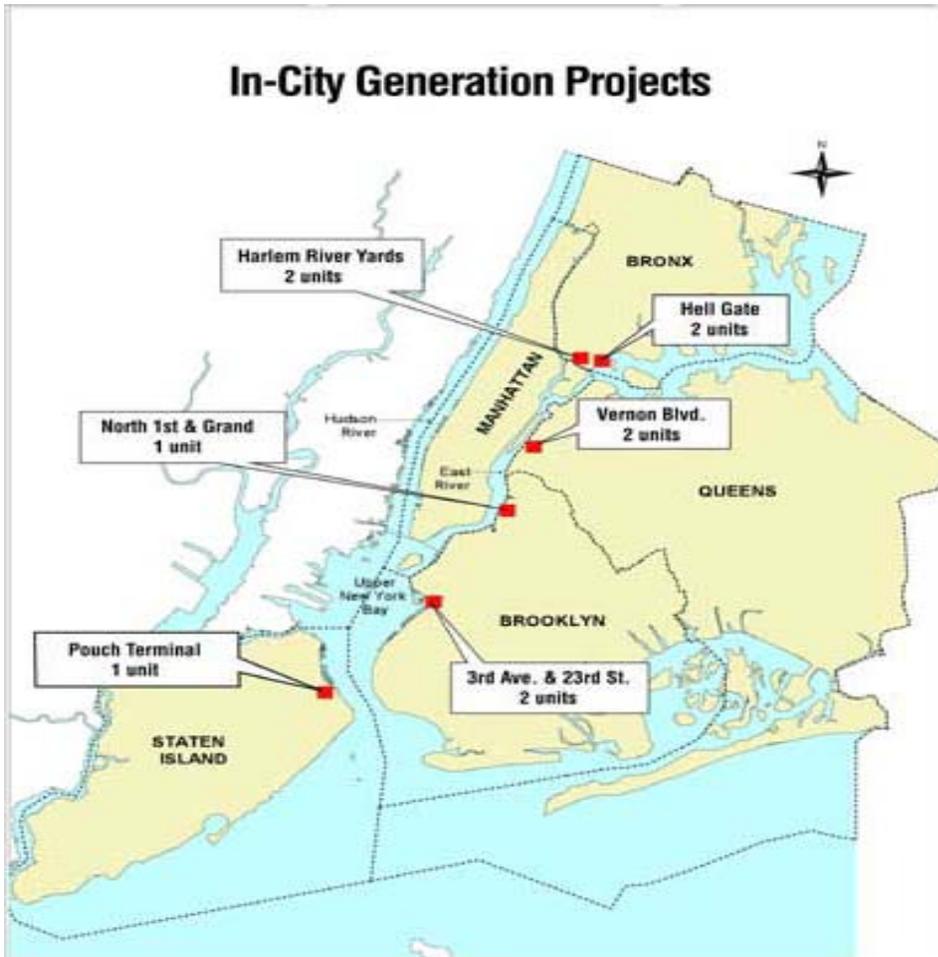
Calpine, POWER and the constructor worked hard to meet a critical schedule and were given the 2002 Award of Merit by New York Construction News. More information on Power can be found on their website, <http://www.powereng.com/>

f. Pterra:

Pterra's Principals have over 100 years of cumulative industry experience to find creative and innovative transmission solutions and resolutions. Their Principals come from diverse backgrounds in power system operations, transmission planning, electrical design, industrial analysis, software development and equipment manufacturing.

More information on Pterra can be found on their website <http://www.pterra.com/>

3. Property



The schematic above shows the location of each of the six In-City Peaker sites. Since NYPA controls these sites, the Partnership would have the access necessary to perform site assessments and related geotechnical studies to determine the site conditions, space constraints, and the suitability for the proposed repowering.

4. Projected In-Service Date & Project Schedule

The Purpose of this section is to outline the Development activities needed to be accomplished in order to determine the suitability of the projects to be repowered, prepare a detailed development plan and schedule for those assets that can be repowered and then fully develop, permit and secure financing that will allow construction of the project facilities. In general the schedule for a repowered project is as shown in the below table, the details of each Phase are outlined below:

Event	Completion Date
Establish NYPA Partnership	Jan 2013
Initial Site Evaluation Phase I and Feasibility	June 2013
Submit Interconnection request to NYISO	July 2013
Prepare Article X/Permits and development plan	July 2013
Phase II Development Stage	Sept 2013
Major Permits Applications	Oct 2013
Article X Site Certificate-PPA Executed	Jan 2014
Permits Issued	Nov 2014
Phase III Financial Close / Construction FNTF	Feb 2015
Commercial Operation	May 2016

The purpose of the plan is assure the activities have been identified and is sufficient to support the overall project timeline. These activities include identifying site specific issues that may influence scope and project design, capital and operating costs, identifying permit activities that must be completed and the overall project schedule.

Based on our recent experience with permitting in New York, the development plan has been subdivided into three major phases:

- Phase I: Review Phase development; includes project evaluation and identification of the necessary items whose schedule could be critical to achieving the overall project schedule.
- Phase II: Detailed environmental assessment and permitting studies to support the Article X process and other permit applications, including public consultation, preliminary engineering and project design for cost basis and scheduling purposes.
- Phase III: Article X Site Certificate process. Includes securing a Site Certificate and balance of project permits, including public consultation, detailed engineering and design, contracting (EPC) and securing project financing.

The goal is to have a development and permit plan and schedule which identifies the near and long term activities required to be performed, which includes interfaces between project(s) and

other counterparties such as government authorities (NYPA, PSC etc.) permitting agencies, local communities, and local utilities. The specific steps carried out in each of the phases are:

Phase I (Most tasks are conducted in parallel)

- Site / project evaluation - **3 Months**
- Preliminary Project general arrangement- **1 Month**
- Environmental / permitting feasibility including identification and assessment of environmental effects – **2 Months**
- Initial infrastructure assessment; gas supply, transmission interconnect – **3 Months**
- Electrical Interconnect study including the thermal impacts and deliverability– **3 Months**
- Continue on a confidential basis public outreach program, conduct polling survey– **3 Months**
- Local Government Agency consultations - **3 Months**
- A Project description and preliminary equipment list – **3 Months**
- Initial Project cost estimate – **3 Months**
- Prepare and submit NY ISO Interconnection application for the project – **3 Months**
- Perform Environmental / permitting analysis including identification and assessment of negative environmental effects– **3 Months**
 - Visual impact study
 - Soil and Groundwater
 - Noise evaluation
 - Terrestrial Ecological Resources
 - Visual and Aesthetic Resources
 - Human Health & Safety
 - Environmental Justice
- Continue on a confidential basis public outreach program, utilize polling survey results to develop detailed outreach plan - **As Necessary**

Preliminary Engineering

Preliminary engineering is being performed by a qualified Owner Engineer Power Engineers to support the Project's preliminary conceptual design to support the project schedule. In addition, if the project is selected, an Owner Engineer will be selected to perform tasks necessary to support applicable permit applications and filings. In addition to direct owner engineer support, and where necessary, engineering services from specialized contractors (i.e., geotechnical, acoustical, land surveyors, etc) are performed as well in order to assist in the development of the Project as well as the preparation of the permit applications and associated filings.

Phase II (After determination of repowering feasibility)

- Continue with NY ISO electrical interconnect study including transmission interconnect, Feasibility study, SRIS) – **As Necessary**
- Finalize Electrical Interconnection Studies (SRIS) agreement
- EPC Bid Specification preparation
 - Obtain EPC bids
- Environmental / permitting analysis including identification and assessment of negative environmental effects
 - Visual impact study
 - Soil and Groundwater
 - Emissions Modeling
 - Noise evaluation
 - Terrestrial Ecological Resources
 - Socio-Economic and Archaeological Resources
 - Visual and Aesthetic Resources
 - Human Health & Safety
 - Environmental Justice
- Article X Site Certificate process including Article VII if required.

EPC Bid Specification Support Engineering

Owner Engineer and other engineering and technical services will also be used to support the EPC Bid Specification and associated Request for Proposals “RFP” generation as well as the subsequent bid evaluation support effort. The power plant related EPC Bid Specifications will be issued as part of an RFP to selected power plant EPC Contractors that are interested and pre-qualified for bidding into the Project’s EPC Contract. It is anticipated that the Project’s Owner Engineer will perform approximately 10% to 15% of detailed engineering on the project in support of the RFP for the EPC Bid Specification effort. This level of “up-front” support allows for a better certainty of design and avoids the effect of increasing bid prices or later creating change orders based on built in contingencies. These early critical design elements will be jointly identified by the Project technical team and the Owner Engineer.

Phase III (After determination of feasibility and acceptance by NYPA to move forward)

- Execute Long term PPA with NYPA

- Finalize Electrical Interconnection Agreement
- Finalize gas interconnection agreement
- Finalize project construction plan
 - Execute EPC contract
 - Procure Major Equipment
- Commence detail engineering
- Obtain Project Financing
- Commence construction

Detailed Engineering

The Project detailed engineering will be performed by the Engineering, Procurement, and Construction (EPC) contractor who will be selected for the Project through a competitive bidding process. This detailed engineering is expected to be released approximately six (6) months prior to the close of construction financing and will be done through a limited notice to proceed (LNTP). This early engineering effort will be instrumental in supporting the procurement of equipment and materials effort as well as the release of specific work packages by the EPC Contractor for competitive bid by select subcontractors. These work packages will be coordinated with the overall construction schedule to ensure that prerequisite work is completed on a timely basis while achieving the result within budget. It is estimated that approximately 30% to 40% of detailed engineering would be completed prior to the start of the construction phase of the Project.

Owner supplied equipment is anticipated to include the major power island equipment as well as other critical and identified long lead time items. This list could include, but not limited to, the following:

- a) Steam Turbine Generator package (STG), Heat Recovery Steam Generator (HRSG), and other related balance of plant equipment
- b) Generator Step-Up Transformer (GSU) and other High Voltage equipment possibly including transmission cable

It is anticipated that the steam turbine will be procured from General Electric (GE). The Project would move towards the execution of a contract based on the pricing and the terms and conditions as previously agreed to in a binding term sheet. Required deposits will then be made to hold schedule, etc. Future payments will then be governed by the contract's payment schedule. In addition the project will contract an EPC contractor responsible for onsite related balance of plant (BOP). Any remaining Owner supplied equipment will be procured through a competitive process on a timeframe that is required to support key delivery schedules.

5. Transmission and Interconnection

PEI's Project Team consists of two specifically chosen firms that perform a variety of transmission and interconnection related studies and services.

Pterra, LLC of Albany, NY will be performing the preliminary transmission studies to determine the impacts of injecting the incremental MW into the system at the point of interconnection. Additionally, a deliverability study will be performed to understand the need for deliverability upgrades.

Energy Initiatives Group of Sutton, MA and Union City, NJ will be assisting PEI in the area of NY ISO and Transmission Owner interface as pertains either to NY ISO required transmission studies and/or Three Party Interconnection Agreement(s).

PEI has worked with both firms and they have proved to be invaluable.

6. Technical

The original configuration for these projects included ten 45MW simple cycle power plants utilizing GE LM6000 sprint units with SCR, gas compression and Millennium turbine control system. These units are located at 6 locations throughout New York City and were installed in the summer of 2001.

The 1x0 repowered project will be a 1x1 nominal 80 MW combined cycle facility utilizing one General Electric (GE) LM 6000 combustion turbine (CTG), one heat recovery steam generator, (HRSG) or should available area constraints require a once through steam generator (OTSG), and one steam turbine (STG) with a condenser.

The existing GE LM6000PC gas turbine engine includes Spray Intercooling (SPRINT) and water injection for NOx control, connected to an air-cooled, alternating-current (AC) electrical generator. The CTG produces a nominal net power output of 45 MW at 13.8kV, 3 ph; 60 Hz stepped up through a single, main step-up transformer to the required transmission voltage. The CTG contains the necessary control and auxiliary systems required for manual or automatic operation.

The natural gas (only) fired CTG will feed exhaust gas to its duct-fired HRSG or OTSG. Steam from the HRSG/OTSG will feed the STG. Power will be generated at 13.8 kV in the CTG's and the STG and stepped up through a main transformer to the utility grid.

Operation in combined cycle could improve the unit's efficiency and reduce its emissions on a per MWhr basis. Expected NOx emissions will be controlled within the combustion turbine at 25 ppmvd at 15 percent oxygen by use of demineralized water injection. An SCR system will be included for the HRSG/OTSG to reduce the NOx level to 2.5 ppmvd at 15 percent O2 at the exhaust stack. Catalytic converters will be included to reduce CO levels to 5 ppmvd at 15 percent O2

The New York City generators—at two sites in the Bronx, two in Brooklyn, one in Queens and one on Staten Island—are the cleanest, simple-cycle plants in the city. The Long Island unit is located in Brentwood, in the Town of Islip.

7. Construction

The Project's EPC contract scope will include the EPC Contractor supplied equipment, the detailed engineering, and the construction, commissioning and testing of the Project. It is envisioned that the contract will be structured as a fixed price type contract. The EPC contract will have firm completion dates and liquidated damage provisions for COD schedule slip. Additionally, GE and the EPC Contractor will be providing equipment performance guarantees on the GE supplied scope and related balance of plant (BOP) equipment and the Project's overall equipment performance, respectively.

In addition, the Project's Owner Engineer is anticipated as having a direct support role during the Construction phase of the Project which is anticipated to consist of a team of multi-discipline staff that will support the Project's Construction management team with oversight and support relating to the detailed engineering and construction progress requirements as dictated. The Construction Lender is also anticipated to have an Owner's Representative overseeing the EPC Contractor's progress, payments and deliverables.

Detailed engineering, procurement, and construction, including commissioning and testing, is expected to occur within a 14 month schedule. Under this scenario, Limited Notice to Proceed will be given to the EPC Contractor to advance detailed power plant engineering approximately 6 months prior to Construction Financing Close and the coinciding "Full Notice to Proceed" date

8. Operational

Under the Partnership, NYPA will continue to be the Plant Operator. Since our proposal envisions the Project Company entering into a Power Purchase Agreement with NYPA, NYPA will in effect be controlling the full output of the repowered plants. MWs produced from the STG would be the property of the Project Company but contractually transferred to NYPA under a long-term PPA.

Major maintenance costs would be assigned to the Owner of the combustion turbines or the steam turbines. Shared systems would be cost shared for maintenance cost allocations.

9. Financial

PEI's current estimate for the repowering of the In-City Peakers shows that this Project is extremely cost effective and PEI believes it represents the lowest cost new power resource addition available to New York City market.

PEI and its Equity Partner(s) will supply all the equity capital required for the planned repowering deemed feasible by the Partnership and PEI will spearhead the non-recourse project financing to secure the debt financing as needed.

PEI's proposal represents zero capital risk for NYPA and its customers/ratepayers.

10. Environmental Benefits to Region

The proposed conversion of the existing NYPA simple cycle units into energy efficient combined cycle power plants incorporating modern emission controls will provide significant environmental benefits to the region. Repowering existing generation facilities at existing sites is always preferable to the siting of new power plants on Greenfield sites. The existing NYPA sites are already serviced by the required infrastructure (water/sewer/electric transmission/fuel supply), and have a history of having been used as electric generation sites making them more acceptable for expansion and more acceptable to the public and community. These repowered facilities in each case will provide an increase in needed energy for New York City while not requiring the siting of new generation in these highly developed urban areas. This coupled with the overall reduction in energy production costs results in concept that provide real benefits with the least impacts to the region. Given that the existing NYPA sites are already serviced by the required infrastructure to support the existing electric generation facilities will minimize off-site construction related impacts. Since NYISO dispatches the electric generating fleet based on economic dispatch, the newly modified and repowered NYPA units will be called into operation before less efficient and older less emissions controlled simple cycle electric generation units. Thus, the Region benefits by better utilization of existing infrastructure investment, growing needed low-cost generation resources, and reducing dependency on less efficient and less environmentally efficient older generation.

11. Project Contract / Request For Proposal Status

PEI proposed Partnership is not part of any current Request for Proposals. PEI and its Equity Partners would seek to enter into a long-term PPA with NYPA for the incremental MWs funded by PEI and its Equity Partner(s). However, this resource addition will represent a very cost effective resource addition to NYPA and its customers' portfolio.

12. Public Outreach

PEI members have conducted numerous public relations and community outreach action plans in the State of NY as a result of prior projects. As a result of this effort, PEI has the capability to meet with local civic groups, elected officials, interested stakeholders and other interested members of the public to provide the opportunity to gain knowledge about the Project(s) and to provide input to the environmental studies on their interests and concerns. The public outreach required by the new Article X requires a Pre-Application process during which PEI Principals would conduct "open house" style information forums that allows residential Stakeholders to learn about the planned Project, its benefits, and provide a forum for having questions answered and concerns heard and addressed. Additionally, PEI would hold meetings with Community Leaders and elected Officials including affected NYC Borough Presidents.

To assist in this effort, PEI has added to its Project Team EJM Strategic Partners of Merrick, NY to assist us with our communication strategy, campaign, and outreach plan.

PEI has learned that the best way to reduce Community concerns is by anticipating concerns and mitigating them in advance through the design and equipment selection or specification selection. To this end, PEI will be proactive in managing potential issues in advance.