

National Grid - New York Local Transmission Plan Project List

09/02/09

Primary Driver	Primary Equipment Owner	Other Equipment Owner(s)	Projected In-Service Month/Year	Major Project	Project	Current Status	CSPP Status	NYISO System Impact Study Status	Comments
Western New York									
Reliability	National Grid, USA		12/09	Swann Rd Transformer	Replace 115-13.2 kV transformer	Concept	N/A	N/R	
Reliability	National Grid, USA		05/13	Correction of Mortimer - Elbridge overloads	Project to correct overloads on circuits between Mortimer and Elbridge	Concept	Too Early	N/R	
Reliability	National Grid, USA		05/14	Addition of fourth transformer at Elm	Addition of fourth 230:23 kV transformer at Elm St	Concept	Too Early	N/R	
Reliability	National Grid, USA		05/14	Addition of fourth transformer at Sawyer	Addition of fourth 230:23 kV transformer at Sawyer Ave	Concept	Too Early	N/R	
Load Growth	National Grid, USA		05/14	Addition of new Frankhauser 115:13.2 kV station	Addition of new Frankhauser 115:13.2 kV station	Concept	Too Early	N/R	
Reliability	National Grid, USA		05/14	Gardenville Cap Banks	Install 2-120 MVAR capacitor banks at Gardenville (115 kV)	Proposed	TO Update	Scoped	
Reliability	National Grid, USA		05/10	Andover Cap Bank	Install 1-15 MVAR capacitor bank at Andover (115 kV)	Proposed	TO Update	Scoped	
Reliability	National Grid, USA		05/12	Reconductoring #171	Reconductor Falconer - Warren 115 kV circuit #171	Proposed	TO Update	Scoped	
Reliability	National Grid, USA		05/13	Mortimer-Golah area 115 kV reinforcements	Conversion of line #109 from 69 kV to 115 kV	Proposed	TO Update	N/R	
Reliability	National Grid, USA		05/13		Split the Mortimer bus into three sections, rearrange line terminals	Proposed	TO Update	N/R	
Reliability	National Grid, USA		05/13		Split the Golah bus into two sections	Proposed	TO Update	N/R	
Reliability	National Grid, USA		05/13	Niagara-Packard #195 rebuild	Niagara-Packard #195 115 kV line rebuild	Proposed	TO Update	Scoped	
Reliability	National Grid, USA		06/12	Southwest Station	Construct a new 345:115 kV station in the southwest region with cap bank	Proposed	TO Update	Scoped	
Reliability	National Grid, USA		09/12	Replacement of Packard Transformers	Replace Packard 230:115 kV transformers	Proposed	TO Update	Scoped	
Reliability	National Grid, USA		05/13	Frontier Line Rebuilds	Reconductor 115 kV circuit between Packard, Paradise and Gardenville including upgrade of one circuit from 69 kV to 115 kV	Proposed	TO Update	Scoped	
Reliability	National Grid, USA		06/14	Replacement of Gardenville Transformers	Replace Gardenville 230:115 kV transformers TB#3 and TB#4	Proposed	TO Update	Scoped	
Reliability	National Grid, USA		05/12	Reconductoring #54	Reconductor part of Gardenville - Erie 115 kV circuit #54	Proposed	TO Update	Scoped	
Reliability	National Grid, USA		05/12	Batavia Cap Bank and Bus upgrade	Install 1-27 MVAR capacitor bank at Batavia and increase size of bus conductor (115 kV)	Proposed	TO Update	N/R	
Reliability	National Grid, USA		05/12	Homer Hill Cap Banks	Install 1-25 MVAR capacitor bank at Homer Hill (115 kV)	Proposed	TO Update	Scoped	

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Reliability	National Grid, USA		05/13	Gardenville - Dunkirk 141/142 rebuild	Rebuild Gardenville - Dunkirk 141/142	Proposed	TO Update	Scoped	
Reliability	National Grid, USA		05/13	Second Lockport Bus Tie Breaker	Add a second 115 kV bus tie in series with existing bus tie breaker	Proposed	TO Update	Scoped	
Reliability	National Grid, USA		05/13	Lockport - Mortimer #111 rebuild	rebuild Lockport - Mortimer 115 kV circuit #111	Proposed	TO Update	N/R	
Reliability	National Grid, USA		05/14	Gardenville Station rebuild	Rebuild Gardenville 115 kV station	Proposed	TO Update	Scoped	
Reliability	National Grid, USA		05/14	Second Dunkirk Bus Tie Breaker	Add a second 115 kV bus tie in series with existing bus tie breaker	Proposed	TO Update	Scoped	
Reliability	National Grid, USA		05/12	Addition of breakers to #2 and #4 circuits	Loop Mortimer - Elbridge #2 and Pannell - Geneva #4 into Farmington	Proposed	TO Update	N/R	
Reliability	National Grid, USA		05/12	Upgrade of #107	Replace limiting terminal equipment on Lockport - Batavia 115 kV circuit #107	Proposed	TO Update	N/R	
Reliability	National Grid, USA		05/12	Upgrade of #157	Replace limiting terminal equipment on Homer Hill - Bennett 115 kV circuit #157	Proposed	TO Update	Scoped	
Reliability	National Grid, USA		06/09	Sycway transformer	Add new 115-13.2 kV transformer	Proposed	N/A	N/R	
Reliability	National Grid, USA		09/09	Reynolds Rd Transformer	Add new 115-13.2 kV transformer	Proposed	N/A	N/R	
Reliability	National Grid, USA		06/12	Paradise Station	New 115 kV Paradise station to replace Huntley	Proposed	Base case	Approved	
Reliability	National Grid, USA		06/12		Replacement of 115 kV breakers at Packard to close normally open bus tie	Under Construction	Base case	Approved	
Reliability	National Grid, USA		12/08	Lockport Breakers	Replacement of Lockport 115 kV bus tie breaker	Under Construction	Base case	N/R	
Reliability	National Grid, USA		05/11	Gardenville - Homer Hill 151/152 rebuild	Rebuild Gardenville - Homer Hill 151/152	Planned	Base case	N/R	
Reliability	National Grid, USA		07/08	Dunkirk Breakers	Replacement of Dunkirk 115 kV breakers	In Service	Base case	N/R	
Central New York									
Reliability	National Grid, USA		12/09	Northern Area Projects	Replace three 115 kV circuit breakers at ALCOA substation	Concept	N/A	N/R	
Reliability	National Grid, USA		12/09		Purchase spare 115-15 kV transformer and Thyristor controlled reactor for Lake Colby SVC	Concept	N/A	N/R	
Reliability	National Grid, USA		12/09	East Watertown Mobile Tap	Install a new disconnect switch an tap on the East Watertown 115 kV bus to connect a mobile substation	Concept	N/A	N/R	
Reliability	National Grid, USA		12/09	Automate 115 kV Switches at Lowville	Installing two new 115 kV motor operated disconnect switches and two (2) Cuts to implement the automatic control scheme at Lowville.	Concept	N/A	N/R	
Reliability	National Grid, USA		12/12	Central Division Reconductoring	Reconductor Clay - Dewitt #3	Concept	Too Early	N/R	
					Reconductor Clay - Teall #10				
					Reconductor Oneida - Yahnundasis #3				
Reliability	National Grid, USA		12/12	North Syracuse Substation	Install new Distribution Substation in North Syracuse area	Concept	Too Early	Uncertain	

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Reliability	National Grid, USA		03/09	Replace 345 kV Breakers at Scriba and Volney Substations	Replace two 345 kV breakers at Volney and replace eight breakers at Scriba	Proposed	N/A	N/R	
Reliability	National Grid, USA		12/12/2009	Clay Station Bulk Power Upgrades	Clay 115 kV Substation Bulk Power Upgrades	Proposed	Too Early	Uncertain	
Reliability	National Grid, USA		12/13	Porter Station Bulk Power Upgrades	Porter 115 kV Substation Bulk Power Upgrades, includes reconfiguration of 115kV portion of the substation	Proposed	Too Early	Uncertain	
Reliability	National Grid, USA		08/12	345kV Breaker Addition at Dewitt	345kV Breaker addition at Dewitt	Planned	N/A	N/R	
Eastern New York									
Load growth	National Grid, USA		06/10	Inman Rd Substation load relief	Install second transformer bank and two new feeders.	Concept	N/A	N/R	
Load growth	National Grid, USA		06/11	Everett Rd Substation load relief	Upgrade transformer bank and install new feeders.	Concept	N/A	N/R	
Reliability	National Grid, USA		06/10	Hoag Substation reliability	Install new Alps site 115kV/13.2kV Substation and retire the Hoag Substation	Concept	N/A	N/R	
Reliability	National Grid, USA		06/14	Northeast Region Reinforcement Project	230-115kV station at Turner Road in Schaghticoke, supplied by the Rotterdam-Bear Swamp #E205 230kV.	Proposed	Too Early	Scoped	
Reliability	National Grid, USA		06/14		Add fourth Rotterdam 230-115kV Transformer.	Proposed	Too Early	Scoped	
Reliability	National Grid, USA		06/14		Spier-Rotterdam #1/#2 115kV Reconductoring, reconfiguration, and addition of new Spier-Rotterdam #3 115kV.	Proposed	Too Early	Scoped	
Reliability	National Grid, USA		06/14		Replace five 115kV Circuit Breakers at North Troy.	Proposed	Too Early	Scoped	
Reliability	National Grid, USA		2010-2011		Reconductor Ballston #2 115kV tap (Tap-Ballston; 3.9 miles) and Mohican-Battenkill #15 115kV (14.2 miles).	Proposed	Too Early	Scoped	
Reliability	National Grid, USA		2017-2019		Reconductor Turner Rd-Luther Forest #3 115kV (10.4 miles), Ballston #2 115kV Tap (Ballston-Malta; 5.1 miles), and Mohican-Butler # 18 (3.5 miles).	Proposed	Too Early	Scoped	
Reliability	National Grid, USA		2015-2019		Addition of 250MVAR of reactive compensation (capacitors) to Northeast Region T/D System.	Proposed	Too Early	Scoped	Amount and timing of necessary reactive compensation dependent on actual load growth.

Key to Status Fields in the Project List

KEY

Status	Description
Concept	Project is under consideration as possible solution to a need, but little or no analysis is available
Proposed	National Grid has internally determined that the project is an appropriate solution to a need, but has not yet obtained Proposed Plan Approval (PPA) from ISO-NE (1.3.9 ISO-NE approval)
Planned	PPA has been approved (if required) and has Strategy Paper approval.
Construction	Project has PPA approval and has Sanction Paper Approval.
In Service	Project is complete.
Cancelled	Project has been cancelled

National Grid - New England Local System Plan List

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Primary Driver	Primary Equipment Owner	Other Equipment Owner(s)	Projected In-Service Month/Year	Major Project	Project	Current Status	PPA Approval	TCA Approval	Comments
Massachusetts									
Area Reliability Assessment	National Grid, USA		2015	Marlboro Area Study	New 115 kV line (OH or UG) from Sudbury (NSTAR) sub to Hudson (Municipal) sub. or	Concept	No	No	
Area Reliability Assessment	National Grid, USA		2015		Convert W23W line 69 kV to 115 kV from Northboro Rd sub to Marlboro sub & upgrades substations	Concept	No	No	
Area Reliability Assessment	National Grid, USA		2014		Sandy Pond substation remove distribution load from tertiary windings of transformer and install 115-23 kV substation.	Concept	No	No	
Load Growth	National Grid, USA		2014		Tewksbury Substation - two new 115-13 kV #2 transformers.	Concept	No	NR	Improve reliability to load.
Load Growth	National Grid, USA		06/2013		Meadowbrook Substation - two new 115-13 kV transformers.	Concept	No	NR	Improve reliability to load.
Load Growth	National Grid, USA		TBD		Ayer substation relieve distribution load from tertiary windings of transformer and propose to install two 115/23 kV transformers at Devens proposed 115 kV substation.	Concept	No	NR	
Load Growth	National Grid, USA		2010		Everett#37 Transformer Replacement sub	Concept	no	NR	
Load Growth	National Grid, USA		2013		Union Loop Study	Concept	No	No	
Load Growth	National Grid, USA		2012		Mid Weymouth sub Add T1 40 MVA sub	Concept	No	NR	Accommodate load growth in area.
Load Growth	National Grid, USA		2012		Read St Sub Repl T4 with 40 MVA sub	Concept	No	NR	Accommodate load growth in area.
Load Growth	National Grid, USA		2013		Chartley Repl T1 with 55 MVA sub	Concept	No	NR	Accommodate load growth in area.
Load Growth	National Grid, USA		2013	Quincy Area Upgrade	Field Street/North Quincy Supply Upgrades	Concept	No	NR	
Load Growth	National Grid, USA		06/2013	Marlboro Area Study	2nd 115-13 kV tranansformer at E. Main St. sub in Westboro	Concept	No	No	Improve reliability to load.
Load Growth & Reliability Assessment	National Grid, USA		06/2011		Norwell Area C3 & S9 Line	Concept	No	NR	
Load Growth	National Grid, USA		9/2012	Greater Boston Study	L-164 Line Reconductoring	Proposed	No	No	
Load Growth	National Grid, USA		06/2012		Avon area - new 115 - 13.8 kV substation	Proposed	No	NR	Improve reliability to load.
Load Growth	National Grid, USA		06/2010		New Hopkinton 115-13 kV Substation	Proposed	No	NR	
Load Growth	National Grid, USA		06/2012		Dupont 115-13 kV Substation Transformer Addition	Proposed	No	No	

Primary Driver	Primary Equipment Owner	Other Equipment Owner(s)	Projected In-Service Month/Year	Major Project	Project	Current Status	PPA Approval	TCA Approval	Comments
Load Growth	National Grid, USA		06/2011		Norwell Sub replace 115-13 kV transformer	Proposed	No	NR	
Load Growth	National Grid, USA		06/2011	Merrimack Valley/North Shore Reliability Project	Re-conductor Meadowbrook - N. Chelmsford portion of I-161 and A-153 115 kV lines	Planned	07/2008	NR	
Load Growth	National Grid, USA		05/2011		Extend existing E-1 115 kV line to Mansfield Substation.	Planned	11/2003	NR	Improve reliability to load.
Area Reliability Assessment	National Grid, USA		Jan-10	West Amesbury	Merrimac, MA Municipal Install 23kV Loadbreak Transfer	Planned	NR	NR	Reliability need - increase capacity to supply load.
Dist/Load Growth	National Grid, USA		2011	Western MA Study	Palmer - install new 115/23 kV transformer and circuit switcher.	Planned	12/2007	NR	
Area Reliability Assessment	National Grid, USA	2012	Webster St. - add three 115 kV circuit switchers and new control house.		Planned	12/2007	NR		
Area Reliability Assessment	National Grid, USA	2015	Carpenter Hill - install 115-69 kV 56 MVA autotransformer and low side breaker.		Planned	12/2007	NR		
Area Reliability Assessment	National Grid, USA		2012	Bellows Falls Substation Revitalization	Replace the three existing, three-winding GSUs with two new two-winding 115-6.6 kV.	Planned	Jan-08	NR	
Area Reliability Assessment	National Grid, USA	2012	Install a new 115-69 kV, 33.6/44.8/56 MVA autotransformer (No. 4) and a new 115-46 kV, 30/40/50 MVA autotransformer (No. 5)		Planned	Jan-08	NR		
Area Reliability Assessment	National Grid, USA	2012	Remove the existing 69-46 kV, 8 MVA autotransformer (No. 3).		Planned	Jan-08	NR		
Area Reliability Assessment	National Grid, USA	2012	Install two new 115kV circuit switchers (4T-115 and 5T-115)		Planned	Jan-08	NR		
Area Reliability Assessment	National Grid, USA	2012	Install one new 69 kV GCB (G33).		Planned	Jan-08	NR		
Area Reliability Assessment	National Grid, USA	2009	Upgrade Line 4401 46 kV from Vilas bridgr to National grid/CVPS demarcation point		Planned	Jan-08	NR		
Area Reliability Assessment	National Grid, USA	2011			Planned	Jan-08	NR		
Load Growth	National Grid, USA		2009	Worcester Area Reinforcements	Vernon Hill - Replace 2 115-13 kV transformers	Construction	7/16/08	NR	

Primary Driver	Primary Equipment Owner	Other Equipment Owner(s)	Projected In-Service Month/Year	Major Project	Project	Current Status	PPA Approval	TCA Approval	Comments
Point of Delivery Request from Customer	National Grid, USA		12//2009	Merrimack Valley/North Shore Reliability Project	New W. Amesbury 115-23 kV and 115-13 kV substations tapped off of (394) line between Ward Hill and Seabrook - King St. relief.	Construction	11/2005	NR	Improve reliability in King Street area.
Load Growth	National Grid, USA		2010	Worcester Area Reinforcements	Cooks Pond Substation #23 - two new 69-13.8 kV transformers.	Construction	NR	NR	Part of Worcester Grid reinforcement.
Load Growth	National Grid, USA		05/2010		Install 115 kV taps to Lynn Substation from Q-169 & A-179.	Construction	04/2004	NR	
Rhode Island									
Load Growth	National Grid, USA		2011		Pascoag - 2nd 13.8 kV feeder	Concept	NR	NR	Existing supply line is approaching it's thermal limits.
Load Growth	National Grid, USA		11/2012	Newport Area Study	Newport Area Supply Reinforcements	Proposed	No	NR	
Load Growth	National Grid, USA		06/2011		W. Warwick 115 - 12.5 kV Sub	Proposed	No	No	
Load Growth	National Grid, USA		11/2010	Greater Rhode Island Transmission Reinforcements	Woonsocket substation 115-13 kV transformer addition	Planned	04/2008	NR	
Area Reliability Assessment	National Grid, USA		2012		Conversion of Jepson 69 kV substation to 115 kV substation	Planned	04/2008	NR	
Area Reliability Assessment	National Grid, USA		2012		Dexter Substation Changes	Planned	04/2008	NR	
Removed from LSP - Completed									
Point of Delivery Request from Customer	National Grid, USA		06/2009		Rutland area new 115-13 kV substaion.	Complete	06/2008	NR	Improve reliability to load.
Removed from LSP - Moved to RSP									
Load Growth	National Grid, USA		2011	Devens Area Study	New Devens 115 kV substation	See Comments	No	No	This is a PTF solution to a local load growth concern - Moved to RSP
Load Growth	National Grid, USA		2011		Ayer substation install in-line 115 kV breaker	See Comments	No	No	This is a PTF solution to a local load growth concern - Moved to RSP
Load Growth	National Grid, USA		2011		Convert 69 kV lines from Ayer to Devens to 115 kV (Portion of U-21E and V-22E lines)	See Comments	No	No	This is a PTF solution to a local load growth concern - Moved to RSP

Key to Status Fields in the Project List

Primary Driver

Load Growth	Increasing load served from the system, including new distribution substations or increasing load on existing substations.
Interconnection	Transmission interconnection with another transmission owner. Does not include generator interconnections (which are not listed for New York).
Economic	Project designed to reduce congestion, losses or other costs.
Reliability	Project is needed to ensure continued compliance with all NERC, NPCC, NYSRC and National Grid criteria. Also includes other reliability improvements beyond minimum criteria.

Current Status

Concept	Project is under consideration as possible solution to a need, but little or no analysis is available yet.
Proposed	National Grid has internally determined that the project is an appropriate solution to a need, but has not yet obtained SIS approval through the NYISO (if required).
Planned	SIS has been approved (if required) and National Grid has management commitment to proceed with the project.
Under Construction	Project has siting approval, as required, and is under construction.
In Service	Project is complete and in commercial operation.

CSPP Status

N/A	Not applicable. Project is not proposed or under consideration within the NYISO Comprehensive System Planning Process, and would have no impact.
Backstop	Project has been proposed as a regulated backstop solution for the NYISO CSPP cycle currently in progress.
Too early	Project is not sufficiently advanced to warrant consideration in the CSPP, but if it proceeds it will have to be included.
TO Update	Project has been designated by National Grid as a Transmission Owner Update project, will become base case in next CSPP cycle.
Base case	Project is in the base case for the current Reliability Needs Assessment (RNA) for the CRP cycle currently in progress.

NYISO System Impact Study Status

N/R	Not required. Project is not expected to require NYISO SIS submittal and approval.
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Uncertain	Not known yet whether the project will require NYISO SIS submittal and approval.
Required	Project is expected to require an approved SIS, but the process to develop the SIS has not yet begun.
Scoped	A scope for the SIS has been approved through the NYISO; SIS is under development.
Approved	An SIS has been approved through the NYISO process.