



Status of Implementation Plans for Board Recommendations

February 24, 2021

SUMMARY STATUS OF RECOMMENDATIONS

Status of Project Implementation Plans for LIPA Board Recommendations

(as of February 2021)

Findings	Adopted	Total #	Complete & Under Review	In Progress	Plans Rejected and Outstanding			Deferred	Plans Due
					Dec.	Jan.	Feb.		
Isaias Task Force	11/18/20	80	16	27	15	6	7	9	37
Risk Management	12/16/20	8	2	6	-	-	-	-	-
Budgeting and Reporting	12/16/20	3	-	3	-	-	-	-	-
Real Estate Management	1/27/21	5	-	-	-	-	5	-	5
Asset Management	2/24/21	6	-	-	-	-	-	-	6
Inventory Management	2/24/21	25	-	-	-	-	-	-	25
Collections Management	2/24/21	3	-	-	-	-	-	-	3
Total		130	18	36	15	6	12	9	76

- The Board has adopted over **130 recommendations** to improve PSEG Island management, emergency management, information technology, risk management, real estate management, asset management, inventory controls, and collections
- PSEG Long Island has submitted **96 implementation plans**. Some project plans address multiple recommendations
 - 18 recommendations are complete** and pending LIPA review
 - the Board has **adopted 36 implementation plans** and **provided comments on 40 plans**
 - 76 plans to be considered** at the Board's March and May meetings
- The Board will receive **quarterly status updates** on the implementation of each plan, with independent verification and validation by LIPA staff



Isaias Task Force

CURRENT STATUS: TELEPHONE SYSTEM

Telephone lines for storm reporting still need to be fully tested

- PSEG Long Island has been making changes to the system and conducting partial system tests
- To date, PSEG Long Island has not completed the following tests requested by LIPA, which would be patterned against real-life scenarios:
 - **End-to-end stress test** for trouble call from customer to OMS system
 - **Daytime stress tests** that simulate calls originating from LIPA territory

CURRENT STATUS: OUTAGE MANAGEMENT SYSTEM

OMS is still failing when stress-tested under the “Isaias” scenario

- PSEG Long Island moved to an older version (v 5.5) of the OMS system after the storm. PSEG Long Island is now planning to pursue a “re-platform” strategy to return to the latest application version (v 6.7)
- LIPA is concerned that there is considerable residual risk to customers that has not been mitigated. The planned May 2021 implementation date for the re-platformed v 6.7 is very close to the start of next hurricane season, and PSEG Long Island has not conclusively demonstrated that re-platforming will resolve the issues
- Lack of strong internal capability have resulted in several false starts and over-reliance on vendor solutions
- Continued deficiencies in project management, vendor management, and problem resolution skills impeding progress

CURRENT STATUS: BUSINESS CONTINUITY PLANS

Comprehensive BCP in Development and Needs to be Tested

- 90-Day Report identified the lack of comprehensive Business Continuity Plans (BCP) as contributing to the inadequate Isaias storm response by PSEG Long Island
- 90-Day Report recommended the development of comprehensive BCPs for all mission critical systems to enable graceful recovery from technology failures
- In response, PSEG Long Island submitted a “Restoration Contingency Plan for Critical System Failures” and conducted a table-top review. The document is a start but focuses mainly on the particular OMS failure scenarios experienced during Isaias. It is not a comprehensive BCP for OMS and does not cover other mission critical systems
- PSEG Long Island still needs comprehensive BCPs for all mission critical systems and the BCP need to be exercised through real-time simulations. LIPA is continuing to meet with PSEG Long Island to ensure the expected outcomes from the recommendation

ISAIAS TASK FORCE RECOMMENDATIONS

- LIPA received **23 Project Implementation Plans (PIPs)** in February
 - **9 proposals: Accepted**
 - **12 proposals: Rejected (Resubmit in March)**
 - **2 proposals: Evaluation on hold pending completion of storm hardening evaluation**
- LIPA received **1 deliverable** for a project marked “complete” by PSEG
 - Pending independent verification and validation (IV&V) by LIPA

ISAIAS TASK FORCE RECOMMENDATIONS

- LIPA has been informed by **PSEG Long Island** that **7 recommendations will be addressed as part of OSA negotiations**, and PIPs will not be submitted.
- PIPs still outstanding
 - PSEG Long Island did not resubmit **14 revised PIPs for Tier 1 / Tier 2 recommendations with outstanding comments from past reviews**
 - **37 PIPs out of 80** are outstanding overall (including 2 deferred PIPs pending storm hardening review)

PROJECT IMPLEMENTATION PLAN REVIEW PROCESS

Expectations from the PIP were clearly communicated

- Recommendation text was supplemented by a description of the “expected end-state” and “key deliverables” (see Board Packet Appendix B)
- LIPA provided a structured template to PSEG Long Island
- When requested, LIPA met with the PSEG Long Island staff several times to provide explanations, assistance, and guidance on PIP requirements

Upon submission, a team of 4 experts reviewed the proposed PIPs. We looked for (a) understanding of the recommendation, (b) proposed technical approach, (c) timeliness of execution, and (d) responsiveness to prior comments

Based upon this review the PIP team recommended “accept,” “accept with comments,” or “reject, please resubmit in March”

KEY ISSUES WITH REJECTED PIPS

- Project objectives, deliverables or end state described in project plan inconsistent with Board recommendation or do not cover entire recommendation
- Inadequate or unrealistic work plan or insufficient articulation of the work plan
- Inadequate technical approach or insufficient articulation of the technical approach

EXAMPLE OF REJECTED PIP

Recommendation:

- 5.08: Institute a program to train National Grid Gas and Generation resources to support damage assessment and materials handling work during major storms.
- Plan submitted:

Deliverable	Delivery Date	Comments
Develop a training program for existing functions of Damage Assessment and Material Handling	03/01/21	Content, media, delivered by, overseen by, documentation of program, frequency, and schedule
Obtain list of future NG storm restoration roles	02/28/21	Current duties include damage assessment and material handling
Develop training program for future NG storm restoration roles	03/15/21	Content, media, delivered by, overseen by, documentation of program, frequency, and schedule

- The PIP needs to develop a **more granular breakdown of the steps needed to develop the training plan. Currently the entire project objective is subsumed in one step.** PIP needs to analyze and document the workplan needed to get to the desired end-state



Enterprise Risk Management

ENTERPRISE RISK MANAGEMENT RECOMMENDATIONS

Recommendation for PSEG Long Island <i>(Adopted 12/16/2020)</i>	Status
(1) Provide for LIPA Subject Matter Expert (SME) and ERM team participation in all risk discussions	Implemented as of January 2021*
(2) Create a culture of accountability by designating management-level owners for each risk mitigation strategy and related action plans	In progress; to be complete and included in annual report*
(3) Establish a joint SharePoint site so that risk information can be accessed in real-time by LIPA SMEs	Implemented as of January 2021*
(4) Produce a comprehensive annual risk report by June 1	In progress**
(5) Perform deep dive analysis on high-priority risks	In progress; calendar developed for 2021 risk discussions**
(6) Develop a risk correlation matrix to better understand end-to-end impacts and better inform needed mitigation strategies	In progress*
(7) Provide risk training to all SMEs participating in the annual risk assessment process	In progress; formal workshops to be held Q3-4*
(8) Develop a process so that if a high-risk event or condition is identified it will trigger a risk review that is elevated to senior management	In progress**



Budgeting and Reporting

BUDGET DEVELOPMENT PROCESS IMPROVEMENT RECOMMENDATIONS

- Previously LIPA identified the need to strengthen the budget development and oversight processes through increased transparency, accountability, documentation, and analytical capability
- The Board approved three recommendations designed to improve the budget development process at the December 2020 meeting:
 - A. Leverage New Technology (LIPA)
 - LIPA to initiate the development of a new budget system to provide for improved documentation, centralized budget calculations, data analytics, forecasting capabilities and budget control
 - B. More Detailed Budget Information (PSEG Long Island)
 - PSEG Long Island to develop Budget Briefing Books as part of the budget development process. The Budget Briefing Books will document and explain work plans and the proposed resource allocation at the department level
 - C. Reallocation Explanations (PSEG Long Island)
 - PSEG Long Island to provide explanations on the reallocation of funds within the Operations & Maintenance Budget
- LIPA Staff recommends Board approval of the Project Improvement Plans associated with each recommendation at the February meeting



Real Estate

REAL ESTATE RECOMMENDATIONS

Recommendations for PSEG Long Island (Adopted 1/27/21)	Status
(1) Long-term strategy for LIPA's real estate and facility assets, including a post-COVID space needs analysis	Resubmit in March with comments addressed
(2) Strategy for the development of a new Primary Transmission Control Center and Alternate Transmission Control Center	Resubmit in March with comments addressed
(3) Joint strategy with National Grid for separation of existing operations centers	Resubmit in March with comments addressed
(4) Hire an outside consultant to perform a comprehensive review of the existing real property records	Resubmit in March with comments addressed
(5) Develop a succession plan for current long-serving PSEG Long Island real estate professionals to ensure knowledge capture and transfer	Resubmit in March with comments addressed



Asset Management

ASSET MANAGEMENT RECOMMENDATIONS

Staff Recommends the Board Adopt the Recommendations. Implementation Plans due 4/9/21

1. Asset Management Framework
 - Three-year roadmap to ISO 55001 compliance – by 4/30/21
2. Reliability Assessment of Plant Asset Performance – by 9/30 of each year
3. Asset Management Plans – by June 2021
4. Computerized Maintenance Management System (CMMS)
 - Plan that includes all assets – by August 2021
 - Complete CMMS upgrade with 1/3 of assets by 12/30/21
 - Audit plant records by 12/30/21
5. Strategic Asset Management Plan (SAMP) – outline by 6/30/21
6. Procure Industry Standard Technology Platform
 - Replace CMMS and go live by 12/30/22



Inventory Management

INVENTORY MANAGEMENT RECOMMENDATIONS

Staff Recommends the Board adopt the Recommendations. Implementation Plans due 4/9/21

		Impact to Business			
		Low	Medium	High	Very High
Implementation Complexity	Low	<ul style="list-style-type: none"> • WM4 – Quality hold and returns • WM5 – SAP Bin locations • WM6 – Crew inventory errors 	<ul style="list-style-type: none"> • WM3 – Signage • IM5 – Demand forecast 		
	Medium	<ul style="list-style-type: none"> • IM10 – Stock rotation • SP2 – EDI / VMI 	<ul style="list-style-type: none"> • GMIT3 – Reporting • GMIT4 – Training • IM6 – Inventory policies • IM7 – Stocking levels • IM9 – Inventory policy reviews • IM11 – PPE, consumables, tools 	<ul style="list-style-type: none"> • WM1 – Bar coding • WM2 – Exception reporting • IM2 – Executive meetings • IM3 – Inventory metrics • IM4 – Work orders • IM8 – Storm clauses • SP1 – Vendor storm clauses 	<ul style="list-style-type: none"> • GMIT2 – Supply chain communication • GMIT6 – IT fail over plan • IM1 – Storm Inventory Strategy
	High				<ul style="list-style-type: none"> • GMIT1 – SAP systems

** One finding was left out of this matrix, as its impact to business and implementation complexity is unknown.*



Collections

COLLECTIONS PROCESS FOR NON-PRODUCT BILLING RECOMMENDATIONS

Staff Recommends the Board adopt the Recommendations. Implementation Plans due 4/9/21

1. Materially improve the Damage Tracking System billing and collections process, including delivering a report to LIPA that includes:
 - An analysis of the improvements realized by outsourcing to DebtNext and costs of such outsourcing, including programming costs
 - Comparison of DTS invoice collection rates prior to DebtNext and since its implementation
 - An analysis of the average lag time from the damage event to the date of the estimated bill
 - An analysis of DTS receivables in aging buckets based on invoice date
 - Evaluating the five largest causes of DTS write-offs and identifying improvements in the end-to-end process
 - Identifying how Key Performance Indicators are tracked and used to improve collection effectiveness for DTS
 - Benchmarking PSEG Long Island's end-to-end process and outcomes relative to other New York utilities, including DTS write-off rates
2. Provide access to the DebtNext platform to one (1) LIPA user, who should be able to view transactions and run all reports
3. Improve the billing and collections process for miscellaneous non-utility billings and reports to LIPA, including:
 - An analysis of such receivables in aging buckets
 - Identification of department/person responsible for resolution
 - Recommended action for collection of long-term outstanding receivables