

**GOVERNMENT OF PUERTO RICO
PUERTO RICO PUBLIC SERVICE REGULATORY BOARD
PUERTO RICO ENERGY BUREAU**

NEPR Received: Oct 27, 2023 8:01 PM
--

IN RE:

IN RE: REVIEW OF THE PUERTO RICO
ELECTRIC POWER AUTHORITY'S 10-
YEAR INFRASTRUCTURE PLAN-
DECEMBER 2020

CASE NO. NEPR-MI-2021-0002

SUBJECT: Motion Submitting Three FEMA Approvals of Projects, Request for Confidential Treatment, and Supporting Memorandum of Law

**MOTION SUBMITTING THREE FEMA APPROVALS OF PROJECTS,
REQUEST FOR CONFIDENTIAL TREATMENT AND
SUPPORTING MEMORANDUM OF LAW**

TO THE PUERTO RICO ENERGY BUREAU:

COME NOW LUMA Energy, LLC¹, and LUMA Energy ServCo, LLC², (jointly referred to as "LUMA"), through the undersigned legal counsel and, respectfully submits the following:

I. Submittal of Three FEMA Approvals and Request for Confidentiality

1. On March 26, 2021, this Honorable Puerto Rico Energy Bureau ("Energy Bureau") issued a Resolution and Order in the instant proceeding, ordering, in pertinent part, that the Puerto Rico Electric Power Authority ("PREPA") submit to the Energy Bureau the specific transmission and distribution projects ("T&D Projects" or "Projects") to be funded with Federal Emergency Management Agency ("FEMA") funds or any other federal funds at least thirty (30) calendar days prior to submitting these Projects to the Puerto Rico Central Office for Recovery, Reconstruction and Resiliency ("COR3"), FEMA or any other federal agency ("March 26th Order"). It also directed PREPA to continue reporting to the Energy Bureau and FEMA, within the next five years,

¹ Register No. 439372.

² Register No. 439373.

the progress of all ongoing efforts related to the approval of the submitted Projects not yet approved by the Energy Bureau. This Energy Bureau thereafter determined that this directive applied to PREPA and LUMA. *See* Resolution and Order of August 20, 2021.

2. On August 30, 2021, LUMA filed a *Motion Requesting Clarification of a Portion of the Energy Bureau’s Resolution and Order Entered on August 20, 2021, and Submitting Updated List of Transmission and Distribution Projects and Twenty-Nine Scope of Work* (“August 30th Motion”). In the August 30th Motion, LUMA submitted twenty-nine (29) Scopes of Work (“SOWs”) for T&D Projects for the Energy Bureau’s review and approval prior to submitting them to COR3 and FEMA. The SOWs submitted by LUMA included “FAASt Streetlight Florida Distribution,” “FAASt- [Distribution Pole and Conductor Repair – Ponce Group 16,17, 18 & 19] (Distribution),” and “FAASt [Distribution Pole and Conductor Repair – Bayamon Group 2 – Phase 2] (Distribution)” T&D Projects.³

3. On September 22, 2021, the Energy Bureau issued a Resolution and Order that determined that most of the SOWs for T&D projects submitted by LUMA were necessary to improve the system’s reliability (“September 22nd Order”). Therefore, it approved most of the projects presented in the August 30th Motion, including the “FAASt Streetlight Florida Distribution,” “FAASt- [Distribution Pole and Conductor Repair – Ponce Group 16,17, 18 & 19] (Distribution),” and “FAASt [Distribution Pole and Conductor Repair – Bayamon Group 2 – Phase 2] (Distribution)” T&D Project SOW. The Energy Bureau also ordered LUMA to submit a copy

³ The “FAASt Streetlight Florida Distribution” T&D Project was submitted initially to the Energy Bureau as the “Distribution Streetlighting,” while the “FAASt- [Distribution Pole and Conductor Repair – Ponce Group 16,17, 18 & 19] (Distribution),” and “FAASt [Distribution Pole and Conductor Repair – Bayamon Group 2 – Phase 2] (Distribution)” T&D Projects were submitted as “Distribution Pole & Conductor Replacement,” but were later divided into individual projects per region.

of the approval by COR3 and/or FEMA of the Project, which shall contain the costs obligated for each project within ten (10) days of receiving such approval.

4. In compliance with the September 22nd Order, LUMA hereby submits copies of three (3) approvals by FEMA of the Projects issued on October 23, 2023.⁴ *See Exhibit 1* to this Motion. The document contains FEMA’s approvals and includes the cost obligated for each Project.

5. LUMA is submitting herein a redacted public version of the FEMA approvals (**Exhibit 1**) protecting confidential information associated with Critical Energy Infrastructure Information (“CEII”). The FEMA approvals of the “FAASt Streetlight Florida Distribution,” “FAASt- [Distribution Pole and Conductor Repair – Ponce Group 16,17, 18 & 19] (Distribution),” and “FAASt [Distribution Pole and Conductor Repair – Bayamon Group 2 – Phase 2] (Distribution)” T&D Projects are protected from disclosure as CEII, *see, e.g.*, 6 U.S.C. §§ 671-674; 18 C.F.R. §388.113 (2020), and pursuant to the Energy Bureau’s Policy on Management of Confidential Information. *See* Energy Bureau’s Policy on Management of Confidential Information, CEPR-MI-2016-0009, issued on August 31, 2016, as amended by Resolution dated September 20, 2016.

II. Memorandum of Law in Support of Request for Confidentiality

A. Applicable Laws and Regulations to Submit Information Confidentially Before the Energy Bureau

6. The bedrock provision on the management of confidential information filed before this Energy Bureau, is Section 6.15 of Act 57-2014, known as the “Puerto Rico Energy

⁴ It is important to note that LUMA acquires knowledge of any FEMA approval for a T&D Project once FEMA makes the information available via its grant portal.

Transformation and Relief Act.” It provides, in pertinent part, that: “[i]f any person who is required to submit information to the [Energy Bureau] believes that the information to be submitted has any confidentiality privilege, such person may request the [Energy Bureau] to treat such information as such [...]” 22 LPRA §1054n. If the Energy Bureau determines, after appropriate evaluation, that the information should be protected, “it shall grant such protection in a manner that least affects the public interest, transparency, and the rights of the parties involved in the administrative procedure in which the allegedly confidential document is submitted.” *Id.* §1054n(a).

7. Access to confidential information shall be provided “only to the lawyers and external consultants involved in the administrative process after the execution of a confidentiality agreement.” *Id.* §1054n(b). Finally, Act 57-2014 provides that this Energy Bureau “shall keep the documents submitted for its consideration out of public reach only in exceptional cases. In these cases, the information shall be duly safeguarded and delivered exclusively to the personnel of the [Energy Bureau] who needs to know such information under nondisclosure agreements. However, the [Energy Bureau] shall direct that a non-confidential copy be furnished for public review.” *Id.* §1054n(c).

8. Relatedly, in connection with the duties of electric power service companies, Section 1.10 (i) of Act 17-2019 provides that electric power service companies shall provide the information requested by customers, except for confidential information in accordance with the Rules of Evidence of Puerto Rico.

9. Moreover, the Energy Bureau’s Policy on Management of Confidential Information details the procedures a party should follow to request that a document or portion thereof be afforded confidential treatment. In essence, the referenced Policy requires identifying confidential

information and filing a memorandum of law explaining the legal basis and support for a request to file information confidentially. *See* CEPR-MI-2016-0009, Section A, as amended by the Resolution of September 20, 2016, CEPR-MI-2016-0009. The memorandum should also include a table that identifies the confidential information, a summary of the legal basis for the confidential designation, and why each claim or designation conforms to the applicable legal basis of confidentiality. *Id.* at ¶ 3. The party who seeks confidential treatment of information filed with the Energy Bureau must also file both a “redacted” or “public version” and an “unredacted” or “confidential” version of the document that contains confidential information. *Id.* at ¶ 6.

10. The Energy Bureau’s Policy on Management of Confidential Information states the following with regard to access to validated Trade Secret Information and CEII:

1. Trade Secret Information
Any document designated by the [Energy Bureau] as Validated Confidential Information because it is a trade secret under Act 80-2011 may only be accessed by the Producing Party and the [Energy Bureau], unless otherwise set forth by the [Energy Bureau] or any competent court.
2. Critical Energy Infrastructure Information (“CEII”)
The information designated by the [Energy Bureau] as Validated Confidential Information on the grounds of being CEII may be accessed by the parties’ authorized representatives only after they have executed and delivered the Nondisclosure Agreement.

Those authorized representatives who have signed the Non-Disclosure Agreement may only review the documents validated as CEII at the [Energy Bureau] or the Producing Party’s offices. During the review, the authorized representatives may not copy or disseminate the reviewed information and may bring no recording device to the viewing room.

Id. at § D (on Access to Validated Confidential Information).

11. Regulation No. 8543, *Regulation on Adjudicative, Notice of Noncompliance, Rate Review, and Investigation Proceedings*, also includes a provision for filing confidential information in proceedings before this Energy Bureau. To wit, Section 1.15 provides that “a person has the duty to disclose information to the [Energy Bureau] considered to be privileged pursuant to the Rules of Evidence, said person shall identify the allegedly privileged information, request the [Energy Bureau] the protection of said information, and provide supportive arguments, in writing, for a claim of information of privileged nature. The [Energy Bureau] shall evaluate the petition and, if it understands [that] the material merits protection, proceed according to [...] Article 6.15 of Act No. 57-2015, as amended.” *See also* Energy Bureau Regulation No. 9137 on *Performance Incentive Mechanisms*, § 1.13 (addressing disclosure before the Energy Bureau of Confidential Information and directing compliance with Resolution CEPR-MI-2016-0009).

B. Request for Confidentiality

12. The FEMA approvals with CEII included in **Exhibit 1** contain portions of CEII that, under relevant federal law and regulations, are protected from public disclosure. LUMA stresses that the FEMA approvals with CEII warrant confidential treatment to protect critical infrastructure from threats that could undermine the system and negatively affect electric power services to the detriment of the interests of the public, customers, and citizens of Puerto Rico. In several proceedings, this Energy Bureau has considered and granted requests by PREPA to submit CEII under seal of confidentiality.⁵ In at least two Data Security and Physical Security

⁵ *See e.g., In re Review of LUMA's System Operation Principles*, NEPR-MI-2021-0001 (Resolution and Order of May 3, 2021); *In re Review of the Puerto Rico Power Authority's System Remediation Plan*, NEPR-MI-2020-0019 (order of April 23, 2021); *In re Review of LUMA's Initial Budgets*, NEPR-MI-2021-0004 (order of April 21, 2021); *In re Implementation of Puerto Rico Electric Power Authority Integrated Resource Plan and Modified Action Plan*, NEPR MI 2020-0012 (Resolution of January 7, 2021, granting partial confidential designation of information submitted by PREPA as CEII); *In re Optimization Proceeding of Minigrid Transmission and Distribution Investments*, NEPR-MI

proceedings,⁶ this Energy Bureau, *motu proprio*, has conducted proceedings confidentially, thereby recognizing the need to protect CEII from public disclosure.

13. Additionally, this Energy Bureau has granted requests by LUMA to protect CEII in connection with LUMA's System Operation Principles. *See* Resolution and Order of May 3, 2021, table 2 on page 4, Case No. NEPR-MI-2021-0001 (granting protection to CEII included in LUMA's Responses to Requests for Information). Similarly, in the proceedings on LUMA's proposed Initial Budgets and System Remediation Plan, this Energy Bureau granted confidential designation to several portions of LUMA's Initial Budgets and Responses to Requests for Information. *See* Resolution and Order of April 22, 2021, on Initial Budgets, Table 2 on pages 3-4, and Resolution and Order of April 22, 2021, on Responses to Requests for Information, table 2 on pages 8-10, Case No. NEPR-MI-2021-0004; Resolution and Order of April 23, 2021, on Confidential Designation of Portions of LUMA's System Remediation Plan, table 2 on page 5, and Resolution and Order of May 6, 2021, on Confidential Designation of Portions of LUMA's Responses to Requests for Information on System Remediation Plan, table 2 at pages 7-9, Case No. NEPR-MI-2020-0019.

14. Similarly, the Energy Bureau has granted LUMA's requests for confidential treatment of portions of SOWs submitted for approval in the present case. Notably, the Energy Bureau designated portions of SOWs as confidential CEII in its Resolution and Order of February

2020-0016 (where PREPA filed documents under seal of confidentiality invoking, among others, that a filing included confidential information and CEII); *In re Review of the Puerto Rico Electric Power Authority Integrated Resource Plan*, CEPR-AP-2018-0001 (Resolution and Order of July 3, 2019 granting confidential designated and request made by PREPA that included trade secrets and CEII. However, *see* Resolution and Order of February 12, 2021, reversing in part, grant of confidential designation).

⁶ *In re Review of the Puerto Rico Electric Power Authority Physical Security Plan*, NEPR-MI-2020-0018.

22, 2023, *see* Table 1 on page 3, Resolution and Order of April 5, 2023, *see* Table 1 on page 4, and Resolution and Order of May 5, 2023, *see* table 1 at page 3, and Resolution and Order of August 30, 2023, *see* table 1 at page 3. Likewise, the Energy Bureau has granted LUMA’s request for confidential treatment of portions of FEMA Approvals of Projects submitted for consideration and authorization. Recently, the Energy Bureau designated portions of submitted FEMA Approvals of Projects as confidential CEII in its Resolution and Order of March 20, 2023; *see* Table 1 on pages 1-2.

15. As mentioned above, the Energy Bureau’s Policy on Management of Confidential Information provides for the management of CEII. It directs that the parties’ authorized representatives access information validated as CEII only after executing and delivering a Non-Disclosure Agreement.

16. CEII or critical infrastructure information is generally exempted from public disclosure because it involves assets and information that pose public security, economic, health, and safety risks. Federal Regulations on CEII, particularly, 18 C.F.R. § 388.113, state that:

Critical energy infrastructure information means specific engineering, vulnerability, or detailed design information about proposed or existing critical infrastructure that:

- (i) Relates details about the production, generation, transportation, transmission, or distribution of energy;
- (ii) Could be useful to a person in planning an attack on critical infrastructure;
- (iii) Is exempt from mandatory disclosure under the Freedom of Information Act, 5 U.S.C. 552; and
- (iv) Does not simply give the general location of the critical infrastructure.

Id.

17. Additionally, “[c]ritical electric infrastructure means a system or asset of the bulk-power system, whether physical or virtual, the incapacity or destruction of which would negatively

affect national security, economic security, public health or safety, or any combination of such matters. *Id.* Finally, “[c]ritical infrastructure means existing and proposed systems and assets, whether physical or virtual, the incapacity or destruction of which would negatively affect security, economic security, public health or safety, or any combination of those matters.” *Id.*

18. The Critical Infrastructure Information Act of 2002, 6 U.S.C. §§ 671-674 (2020), part of the Homeland Security Act of 2002, protects critical infrastructure information (“CII”).⁷

⁷ Regarding protection of voluntary disclosures of critical infrastructure information, 6 U.S.C. § 673, provides in pertinent part, that CII:

- (A) shall be exempt from disclosure under the Freedom of Information Act;
- (B) shall not be subject to any agency rules or judicial doctrine regarding *ex parte* communications with a decision-making official;
- (C) shall not, without the written consent of the person or entity submitting such information, be used directly by such agency, any other Federal, State, or local authority, or any third party, in any civil action arising under Federal or State law if such information is submitted in good faith;
- (D) shall not, without the written consent of the person or entity submitting such information, be used or disclosed by any officer or employee of the United States for purposes other than the purposes of this part, except—
 - (i) in furtherance of an investigation or the prosecution of a criminal act; or
 - (ii) when disclosure of the information would be--
 - (I) to either House of Congress, or to the extent of matter within its jurisdiction, any committee or subcommittee thereof, any joint committee thereof or subcommittee of any such joint committee; or
 - (II) to the Comptroller General, or any authorized representative of the Comptroller General, in the course of the performance of the duties of the Government Accountability Office
- (E) shall not, be provided to a State or local government or government agency; of information or records;
 - (i) be made available pursuant to any State or local law requiring disclosure of information or records;
 - (ii) otherwise be disclosed or distributed to any party by said State or local government or government agency without the written consent of the person or entity submitting such information; or
 - (iii) be used other than for the purpose of protecting critical Infrastructure or protected systems, or in furtherance of an investigation or the prosecution of a criminal act.
- (F) does not constitute a waiver of any applicable privilege or protection provided under law, such as trade secret protection.

CII is defined as “information not customarily in the public domain and related to the security of critical infrastructure or protected systems [...]” 6 U.S.C. § 671 (3).⁸

19. The FEMA approvals with CEII in **Exhibit 1** qualify as CEII because each of these documents contains the express coordinates to power transmission and distribution facilities (18 C.F.R. § 388.113(iv)), and these specific coordinates could potentially be helpful to a person planning an attack on the energy facilities listed as part of this FEMA approval. The information identified as confidential in this paragraph is not common knowledge and is not made publicly available. Therefore, it is respectfully submitted that, on balance, the public interest in protecting CEII weighs in favor of protecting the relevant portions of the FEMA approvals with CEII in **Exhibit 1** from disclosure, given the nature and scope of the details included in those portions of the Exhibit.

20. Based on the above, LUMA respectfully submits that the FEMA approvals with CEII should be designated as CEII. This designation is a reasonable and necessary measure to protect the specific location of the energy facilities listed or discussed in the FEMA approvals in **Exhibit 1**. Given the importance of ensuring the safe and efficient operation of the generation

⁸ CII includes the following types of information:

(A) actual, potential, or threatened interference with, attack on, compromise of, or incapacitation of critical infrastructure or protected systems by either physical or computer-based attack or other similar conduct (including the misuse of or unauthorized access to all types of communications and data transmission systems) that violates Federal, State, or local law, harms interstate commerce of the United States, or threatens public health or safety;

(B) the ability of any critical infrastructure or protected system to resist such interference, compromise, or incapacitation, including any planned or past assessment, projection, or estimate of the vulnerability of critical infrastructure or a protected system, including security testing, risk evaluation thereto, risk management planning, or risk audit; or

(C) any planned or past operational problem or solution regarding critical infrastructure or protected systems, including repair, recovery, construction, insurance, or continuity, to the extent it is related to such interference, compromise, or incapacitation.

assets and the T&D System, LUMA respectfully submits that these materials constitute CEII that should be maintained confidentially to safeguard their integrity and protect them from external threats.

C. Identification of Confidential Information

21. In compliance with the Energy Bureau’s Policy on Management of Confidential Information (CEPR-MI-2016-0009) below, find a table summarizing the portions of the FEMA approvals for which we present this request for confidential treatment.

Document	Name	Pages in which Confidential Information is Found, if applicable	Summary of Legal Basis for Confidentiality Protection, if applicable	Date Filed
Exhibit 1	FAASt Streetlight Florida Distribution	Pages 1, 3, 5, and 10.	Critical Energy Infrastructure Information, 18 C.F.R. § 388.113; 6 U.S.C. §§ 671-674.	October 27, 2023
Exhibit 1	FAASt- [Distribution Pole and Conductor Repair – Ponce Group 16,17, 18 & 19] (Distribution)	Pages 1, 2, 3, 11, and 19.	Critical Energy Infrastructure Information, 18 C.F.R. § 388.113; 6 U.S.C. §§ 671-674.	October 27, 2023
Exhibit 1	FAASt [Distribution Pole and Conductor Repair – Bayamon Group 2 – Phase 2] (Distribution)	Pages 1, 2, 4, and 10.	Critical Energy Infrastructure Information, 18 C.F.R. § 388.113; 6 U.S.C. §§ 671-674.	October 27, 2023

WHEREFORE, LUMA respectfully requests that the Energy Bureau **take notice** of the aforementioned; **accept** the copies of the three (3) FEMA approvals attached herein as **Exhibit 1**; and **grant** the request for confidential treatment of **Exhibit 1**.

RESPECTFULLY SUBMITTED.

We hereby certify that we filed this motion using the electronic filing system of this Energy Bureau. We will send an electronic copy of this motion to PREPA's General Counsel, Lionel Santa, lionel.santa@prepa.pr.gov.

In San Juan, Puerto Rico, on this 27th day of October 2023.



DLA Piper (Puerto Rico) LLC
500 Calle de la Tanca, Suite 401
San Juan, PR 00901-1969
Tel. 787-945-9132
Fax 939-697-6102

/s/ Yahaira De la Rosa Algarín
Yahaira De la Rosa Algarín
RUA NÚM. 18,061
yahaira.delarosa@us.dlapiper.com

/s/ Julián R. Anglada Pagán
Julián R. Anglada Pagán
RUA NÚM. 22,142
julian.angladapagan@us.dlapiper.com

Exhibit 1

Three (3) FEMA Approvals

Department of Homeland Security Federal Emergency Management Agency

General Info

Project #	698424	PW#	11344	Project Type	Specialized	
Project Category	F - Utilities	Applicant	PR Electric Power Authority (000-UA2QU-00)			
Project Title	FAASt Streetlight Florida Distribution				Event	4339DR-PR (4339DR)
Project Size	Large	Declaration Date	9/20/2017			
Activity Completion Date	9/20/2027	Incident Start Date	9/17/2017			
Process Step	Obligated	Incident End Date	11/15/2017			

Damage Description and Dimensions

The Disaster # 4339DR, which occurred between **09/17/2017** and **11/15/2017**, caused:

Damage #1277422; FAASt Distribution Streetlight Florida.

DDD for this facility codified in the 136271 - MEPA078 Puerto Rico Electrical Power Authority Island Wide FAASt Project.

General Facility Information:

- **Facility Type:** Power generation, transmission, and distribution facilities
- **Facility:** Distribution Streetlight Florida
- **Facility Description:** Additional descriptions of typical components of a streetlight system are described below:
 - Pole – This can be either a standalone structure intended to house a streetlight, or a utility pole shared with other overhead utilities
 - Arm – A piece of hardware affixed to a pole to which a luminaire is mounted. The arm serves to position the streetlight over the street for optimal lighting
 - Luminaire/Light Bulb – The light emitting part of a streetlight
 - Light controller (e.g., photocell) – A hardware device affixed to the luminaire which controls the operating mode
 - Communication network – A wired or wireless system that allows the smart streetlight to communicate with other devices and the control system
 - Technology control system – A software platform that allows a remote operator to set the operating parameters for the smart streetlight or manually override the parameter if needed.
- **Approx. Year Built:** 1980
- **GPS Latitude/Longitude:** [REDACTED]

General Damage Information:

- **Date Damaged:** 9/20/2017
- **Cause of Damage:** High winds & wind driven rain, caused by Cat 4 Hurricane Maria

Final Scope

1277422 **FAASt Distribution Streetlight Florida.**

Introduction

The purpose of this document is to submit for approval the Detailed Scope of Work (SOW) to COR3 and FEMA for the Distribution Streetlighting Florida project (Florida municipality) under DR-4339-PR Public Assistance. The document provides a description of the project including scope, schedule, and cost estimates as well as Environmental & Historical Preservation ("EHP") requirements and proposed 406 hazard mitigation work. LUMA Energy is seeking approval from COR3 and FEMA for project funding to repair, replace, and upgrade the eligible facilities in the municipality of Florida.

LUMA submits this Detailed SOW pursuant to the T&D O&M Agreement between Puerto Rico, Puerto Rico Electric Power Authority ("PREPA"), the Puerto Rico Public-Private Partnerships Authority ("P3A") and LUMA Energy, and in accordance with the Consent to Federal Funding Letter issued by PREPA and P3A and provided herein as Appendix E which collectively provides the necessary consent for LUMA Energy, as agent of PREPA, to undertake work in connection with any Federal Funding requests related to the T&D System submitted to FEMA.

Facilities

This project is part of the breakdown division for the Distribution Streetlighting Program which will be impacting each of the municipalities. Characteristics were previously defined to serve the municipality of Florida according to the priorities and findings after conducting the assessments.

Physical Address Florida, Puerto Rico

Coordinates Please refer to Appendix F for Coordinates

Project Scope of Work Streetlight Repairs:

Proposed 428 Public Assistance Scope of Work:

Lighting Components Replacement

- Remove existing lighting components, including photo controls, luminaires, arms, and associated hardware, and install new lighting components in the same location. No ground disturbance will be required as part of this scope of work.
- Brushing will be required in locations as identified in Appendix K ("Brushing/Clearing Req'd" column) to enable construction. Brushing refers to the removal and clearing of vegetation solely to the extent that it allows crews to conduct work. The brushing of vegetation will be limited to a 10 ft radius surrounding the surface of the pole but not to exceed the width of the right-of-way for the exclusive purpose of gaining access to the pole to conduct repairs. No tree removal will be completed as part of this scope.
- All work for this program will be performed within the current electrical right-of-way for each of the municipalities.

Pole Replacement

- Remove existing streetlight poles, including lighting components and install new streetlight poles, including lighting components, in the same location. If unable to install the replacement in the same location, the pole will be installed within 3 feet. All pole installations are to replace existing poles locations; no new locations are included in this scope of work. Refer to Appendix K column D (Soil area and depth impact) for the depths of the poles to be installed.
- Remove the existing foundations as specified in Appendix G- Cost Estimate and replace them with a new concrete foundation in the same location. Refer to Appendix J for design criteria. 1
- Brushing will be required in locations as identified in Appendix K ("Brushing/Clearing Req'd" column) to enable construction. Brushing refers to the removal and clearing of vegetation solely to the extent that it allows crews to conduct work. The brushing of vegetation will be limited to a 10 ft radius surrounding the surface of the pole but not to exceed the width of the right-of-way for the exclusive purpose of gaining access to the pole to conduct repairs. No tree removal will be completed as part of this scope.
- Poles are in close proximity to the roads and are site accessible. The construction of access roads is not required for this scope of work. (Refer to Appendix K in "Site Accessible" column)
- All work for this program will be performed within the current electrical right-of-way for each of the municipalities.
- Coordinates for streetlight poles where ground disturbance is anticipated can be found in Appendix G2 and Appendix K3 .
- This scope of work will not affect water or sewer utility services.

Trenching/Underground (Replacing Underground Circuit)

- Remove existing trenching and install new trenching within our existing 5' electrical Right of Way as specified in Appendix K. The trench's dimensions are described by LUMA Trench Standard STL-16 (Appendix I), which states that the typical trench width is 1 foot, and the typical trench depth is 3.5 feet. For this project, the typical trench was defined to have an average length of 100 feet and follow a straight line between the streetlight pole and its power connection. This activity does not require any vegetation clearance and/or access clearance.
- Coordinates for streetlight poles where ground disturbance is anticipated can be found in Appendix G2 and Appendix K3 .
- This scope of work will not affect water or sewer utility services.

Material Disposal

- Photocells are considered hazardous waste and will be disposed of by the contractor in approved facilities in compliance with applicable federal and local laws and regulations. Material amounts will be provided by a certified management contractor performing a site evaluation calculation for asbestos, lead paint, roof material.
- No transformer will be removed or disposed of during the Program.
- The type of debris that may be found in the process of removal are luminaires, pole arms, photocells, metal scrap, wiring, concrete, steel, and wood poles, etc. The debris will be separated and taken to an approved waste disposal facility in compliance with applicable federal and local laws and regulations.

Staging Area

- All materials are stored and dispatched from the assigned LUMA's Regional Warehouse. The warehouse assigned is the Arecibo Warehouse, [REDACTED]. Refer to Appendix M for Warehouse location.

Specific List of Permits Required:

- DTOP Endorsements & Municipality Notifications.
- Excavation and Demolition Notification in Department of Transportation and Public Works Agency - (DTOP).
- LUMA will provide proof of all permits as a Condition of FEMA Record of Environmental Considerations.

Fill, gravel, sand, etc.:

- Fill, Gravel, and Sand materials will be obtained from an approved supplier as referenced in Appendix A Preferred Vendors list.

List of Equipment to be used:

- Skid Steer, Excavator, Dump trucks, Manlifts, 120-Ton Motor Crane, Boom Trucks 45-ton Crane, Zoom Boom, Air compressor, Truck Digger, Water truck, Pump Truck, Concrete Vibrator, Oil Tanker, Filtering Machine and Flatbed platform.

Project Estimate

The estimated costs (Class 3 Accuracy +/-30%) to complete the project are captured in the below table. The cost estimate was developed utilizing preliminary Architectural and Engineering design information and may be subject to change. LUMA has identified risks and allowances (10% of project cost) for the mitigation of potential known risks.

Project Cost Estimate	428 Estimate
Planning, Permits and Applications (FAASt 335168)	\$114,624.82
Environmental Management (FAASt 335168)	\$440,306.02
Project Management (FAASt 335168)	\$397,736.45
Engineering (FAASt 335168)	\$752,429.19
Construction	\$8,591,107.27
Contingency	\$720,734.26
SUBTOTAL	\$11,016,938.00
428 FAASt Project 698424	\$9,311,841.53
FAASt Project A&E 335168	\$1,705,096.47

428 Work To Be Completed (WTBC): \$11,016,938.00

428 A&E Deduction (Global A&E FAASt 335168) -\$1,705,096.47

428 Project Total Cost: \$9,311,841.53

For detailed cost estimate, please refer to document labeled: Appendix G - Cost Estimate Florida Municipality .xlsx

Project Notes:

1. Refer to detailed SOW provided in document 698424-DR4339PR-Detailed SOW Florida Rev0 - signed - DSOW.pdf
2. For reference documents Appendix A thru M, see file labeled:
Appendix A – Approved Supplier List
Appendix B – Work Zones Map
Appendix C - LUMA Waste Management Plan
Appendix D – LUMA Wildlife Avian and Historical Protection Procedure #335
Appendix E – Consent to Federal Funding Letter- FEMA/COR3
Appendix F – FID Coordinates Appendix G – Cost Estimate
Appendix H – Intentionally Left In Blank
Appendix I – LUMA Streetlighting Construction Standards
Appendix J – LUMA Distribution Design Manual
Appendix K – EHP Checklist
Appendix L – EHP Maps Florida
Appendix M – Warehouse Location
3. For EHP Requirements, refer to pages 5 to 7 of the detailed SOW and reference documents: Appendix K & L.
4. Architectural and Engineering (A&E) costs are deducted given previously obligated Global A&E Project for the subject FAASt PREPA work (see project: 335168 - FAASt A&E PREPA).
5. All streetlight trench rebuilds will be performed in the same location and with the same dimensions as the existing damaged one.
6. No new trenches are considered under the project.
7. The trenches are described by LUMA Trench Standard STL-16 (attached in the project), which states that the typical trench width is 1 foot, and the typical trench depth is 3.5 feet. For this project, the typical trench was defined to have an average length of 100 feet and following a straight line between the streetlight poles.
8. This project is part of FAASt project, please reference project 136271 – MEPA078 Puerto Rico Electrical Power Authority (PREPA) Island Wide FAASt Project.

406 HMP Scope

Project number: 698424; FAASt Streetlight Florida Distribution

Damage # 1277422; FAASt Distribution Streetlighting Florida

Applicant: PR Electric Power Authority (000-UA2QU-00)

Location: Florida, Puerto Rico

GPS Latitude/Longitude: [REDACTED]

Hazard Mitigation Narrative

During the incident period from September 17, 2017, to November 15, 2017, the Commonwealth of Puerto Rico experienced hurricane-force winds, heavy rain, flooding and power outage from Hurricane Maria. The incident caused damage to the electrical system, such as the power generation plants, transmission and distribution lines, substations, communication systems, buildings, among other damages to the infrastructures owned, operated, and maintained by the Puerto Rico Electric Power Authority (PREPA).

In the Florida Municipality, PREPA has a total of 1,169 ea. streetlights luminaries. The Method of Repair (MOR) include the replacement of the damage lighting components including photocells, luminaires, arms, and associated hardware. Also include the replacement of the damage distribution and streetlight poles (wood, concrete, galvanized & aluminum), the replacement of the aerial secondary wiring connections, the construction of new concrete base for the aluminum streetlight poles and new trenches for the streetlighting secondary underground circuits. According to the information provided by the Applicant, due to the high velocity hurricane winds, wind-blown debris, and prolonged heavy rain, were the main cause of the damages of the facilities.

In order to minimize the damages in a future event, the Applicant is proposing as a mitigation measure, increase the strength of the poles, arms, aluminum poles breakaway bases, and foundations (concrete bases) by increasing the wind tolerance of all materials to 160mph. Note: The FEMA Accelerated Award Strategy (FAASt) MOR included the PREPA distribution standards and specifications that were based on a 90mph sustained winds for all materials. Although in PREPA Technical Communication #13-02 (August 22, 2013) a design-criteria of 145mph winds were published, the specifications for streetlighting material were never revised, and in the specification documents, the 90mph winds stayed as the requirement for procurement purposes of all streetlighting materials. The 160mph wind tolerance mitigation measure, will protect and make the affected infrastructure more resistant, stronger, and resilient to similar hazards.

Hazard Mitigation Proposal (HMP) Scope of Work:

In order to prevent or reduce future damages from similar events, the applicant proposed the following mitigation measures:

Mitigation Measures (Replacement)

1. To avoid damage in a future event, the Applicant is proposing as a mitigation measure, increase the strength of the poles, arms, aluminum poles breakaway bases, and foundations (concrete bases) by increasing the wind tolerance of all materials to 160mph. The FAASt MOR used PREPA distribution standards and specifications that were based on a 90mph sustained winds for all materials. Although in PREPA Technical Communication #13-02 (August 22, 2013) a design-criteria of 145mph winds were published, the specifications for streetlighting material were never revised, and in the specification documents, the 90mph winds stayed as the requirement for procurement purposes of all streetlighting materials. The above mitigation measures will protect and make the affected infrastructure more resistant, stronger, and resilient to similar hazards. Refer to Appendix J: Section VI.D.1 of the PAPPG V3.1.

406 Mitigation Scope of Work:

- Replace (1,169 ea.) 4ft galv. steel arms (90mph by 160mph winds resistant) for (steel/concrete/wood) poles.
- Replace (89 ea.) 8ft galv. steel arms (90mph by 160mph winds resistant) for (steel/concrete/wood) poles.
- Replace (74 ea.) 4ft galv. steel arms (90mph by 160mph winds resistant) for (octagonal concrete) poles.
- Replace (2 ea.) 8ft galv. steel arms (90mph by 160mph winds resistant) for (octagonal concrete) poles.
- Replace (14 ea.) 12ft aluminum arm (90mph by 160mph winds resistant) for (aluminum) poles.
- Replace (25 ea.) 15ft aluminum arm (90mph by 160mph winds resistant) for (aluminum) poles.
- Replace (15 ea.) 33ft octagonal concrete poles by (15 ea.) 39ft octagonal concrete poles.
- Replace (546 ea.) 35ft galvanized poles by (546 ea.) 35ft S3.5 galvanized poles.
- Replace (36 ea.) 30ft aluminum poles by (36 ea.) 40ft aluminum poles.
- Replace (34 ea.) 30ft aluminum poles breakaway bases by (34 ea.) 40ft aluminum poles breakaway bases.
- Replace (36 ea.) 30ft aluminum poles concrete bases [2.5ft(D) x 5.5ft(H)] by (36 ea.) 40ft aluminum poles concrete bases [3ft(D) x 10ft(H)].

Hazard Mitigation Proposal (HMP) Cost:

Total Net Hazard Mitigation Cost (Base Cost) =	\$720,017.00
+ HM (Applicant A&E, Management & General Conditions) =	<u>\$277,173.00</u>
Hazard Mitigation Total Cost =	\$997,190.00

HMP Cost-Effectiveness Calculations:

FEMA's Benefit-Cost Analysis (BCA), methodology evaluates expected risk reduction benefits of a hazard mitigation project and compares those benefits to the cost of the mitigation project. FEMA Public Assistance Program and Policy Guide (PAPPG) Chapter 2, Section VII, C. defines cost effective mitigation as: The Hazard Mitigation Measure is cost effective through an acceptable Benefit Cost Analysis (BCA) with a resulting Benefit Cost Ratio equal to or greater than (1).

The Island Wide Benefit Cost Analysis (IWBCA) created for the PREPA infrastructure defines a maximum potential benefit using the incurred costs of the PREPA FEMA Accelerated Award Strategy (FAAST) fixed cost estimate, the mission assignments utilized for the reconnection effort, and the costs associated with loss of service. This maximum benefit has been developed to fund all mitigation projects from both Public Assistance Hazard Mitigation and the Hazard Mitigation Grant program.

It is the applicant's responsibility to maintain a record of approved IWBCA related projects to avoid running out of funds for their Mitigation portion projects." Please see attached IWBCA Package

The cost of the Hazard Mitigation Proposal (HMP) described herein is \$997,190.00 (Hazard Mitigation Total Cost). The cost of this HMP combined with all other proposals (both PA and HMGP) does not exceed the maximum potential benefit and is therefore deemed cost effective per FEMA Public Assistance Program and Policy Guide (PAPPG) V3.1 April 2018, Chapter 2, VII., Section C, BCA Rule. This Hazard Mitigation Proposal meets eligible repair and restoration cost-effective requirements.

****See Mitigation Profile Documents Tab in Grants Manager for complete version of this HMP and supporting documents (HMP, HMP cost estimate, Supporting documents file).**

Cost

Code	Quantity	Unit	Total Cost	Section
3510 (Engineering And Design Services - PREPA FAASt Global A&E 335168)	1.00	Lump Sum	(\$1,705,096.47)	Uncompleted
9201 (PAAP Fixed Estimate (No Value - Tracking Purposes Only))	1.00	Lump Sum	\$0.00	Completed
9001 (Contract - PREPA FAASt Project 136271)	1.00	Lump Sum	\$11,016,938.00	Uncompleted

CRC Gross Cost	\$9,311,841.53
Total 406 HMP Cost	\$997,190.00
Total Insurance Reductions	\$0.00
<hr/>	
CRC Net Cost	\$10,309,031.53
Federal Share (90.00%)	\$9,278,128.38
Non-Federal Share (10.00%)	\$1,030,903.15

Award Information

Version Information

Version #	Eligibility Status	Current Location	Bundle Number	Project Amount	Cost Share	Federal Share Obligated	Date Obligated
0	Eligible	Awarded	PA-02-PR-4339-PW-11344(14335)	\$10,309,031.53	90 %	\$9,278,128.38	10/20/2023

Drawdown History

EMMIE Drawdown Status As of Date	IFMIS Obligation #	Expenditure Number	Expended Date	Expended Amount
No Records				

Obligation History

Version #	Date Obligated	Obligated Cost	Cost Share	IFMIS Status	IFMIS Obligation #
-----------	----------------	----------------	------------	--------------	--------------------

Subgrant Conditions

- As described in Title 2 Code of Federal Regulations (C.F.R.) § 200.333, financial records, supporting documents, statistical records and all other non-Federal entity records pertinent to a Federal award must be retained for a period of three (3) years from the date of submission of the final expenditure report or, for Federal awards that are renewed quarterly or annually, from the date of the submission of the quarterly or annual financial report, respectively, as reported to the Federal awarding agency or pass-through entity in the case of a subrecipient. Federal awarding agencies and pass-through entities must not impose any other record retention requirements upon non-Federal entities. Exceptions are stated in 2 C.F.R. §200.333(a) – (f)(1) and (2). All records relative to this project are subject to examination and audit by the State, FEMA and the Comptroller General of the United States and must reflect work related to disaster-specific costs.
- In the seeking of proposals and letting of contracts for eligible work, the Applicant/Subrecipient must comply with its Local, State (provided that the procurements conform to applicable Federal law) and Federal procurement laws, regulations, and procedures as required by FEMA Policy 2 CFR Part 200, Procurement Standards, §§ 317-326.
- The Recipient must submit its certification of the subrecipient's completion of this project, the final claim for payment, and supporting documentation within 180 days from the date that the applicant completes the scope of work, or the project deadline, whichever occurs first. FEMA reimburses Large Projects (those with costs above the large project threshold) based on the actual eligible final project costs. Therefore, during the final project reconciliation (closeout), the project may be amended to reflect the reconciliation of actual eligible costs.
- When any individual item of equipment purchased with PA funding is no longer needed, or a residual inventory of unused supplies exceeding \$5,000 remains, the subrecipient must follow the disposition requirements in Title 2 Code of Federal Regulations (C.F.R.) § 200.313-314.
- The terms of the FEMA-State Agreement are incorporated by reference into this project under the Public Assistance award and the applicant must comply with all applicable laws, regulations, policy, and guidance. This includes, among others, the Robert T. Stafford Disaster Relief and Emergency Assistance Act; Title 44 of the Code of Federal Regulations; FEMA Policy No. 104-009-2, Public Assistance Program and Policy Guide; and other applicable FEMA policy and guidance.
- The DHS Standard Terms and Conditions in effect as of the declaration date of this emergency declarations or major disaster, as applicable, are incorporated by reference into this project under the Public Assistance grant, which flow down from the Recipient to subrecipients unless a particular term or condition indicates otherwise.
- The Uniform Administrative Requirements, Cost Principles, and Audit Requirements set forth at Title 2 Code of Federal Regulations (C.F.R.) Part 200 apply to this project award under the Public Assistance grant, which flow down from the Recipient to all subrecipients unless a particular section of 2 C.F.R. Part 200, the FEMA-State Agreement, or the terms and conditions of this project award indicate otherwise. See 2 C.F.R. §§ 200.101 and 110.
- The subrecipient must submit a written request through the Recipient to FEMA before it makes a change to the approved scope of work in this project. If the subrecipient commences work associated with a change before FEMA approves the change, it will jeopardize financial assistance for this project. See FEMA Policy No. 104-009-2, Public Assistance Program and Policy Guide.
- The Subrecipient provided the estimate for this PW. FEMA validated the estimate and found it to be reasonable for the work to be performed.
- Pursuant to section 312 of the Stafford Act, 42 U.S.C. 5155, FEMA is prohibited from providing financial assistance to any entity that receives assistance from another program, insurance, or any other source for the same work. The subrecipient agrees to repay all duplicated assistance to FEMA if they receive assistance for the same work from another Federal agency, insurance, or any other source. If an subrecipient receives funding from another federal program for the same purpose, it must notify FEMA through the Recipient and return any duplicated funding.

Insurance

Additional Information

4/10/2023

GENERAL INFORMATION

Event: DR4339-PR

Project: SP 698424

Category of Work: Cat F - Utilities

Applicant: PR Electric Power Authority

Event Type: Hurricane / Hurricane Maria

Cause of Loss: Wind / Wind Driven Rain

Incident Period: 9/17/2017 to 11/15/2017

Total Public Assistance Amount: \$10,309,031.53(CRC Gross Cost \$9,311,841.53 + Mitigation Amount \$997,190.00)

COMMERCIAL INSURANCE INFORMATION

Does the applicant have a Commercial Policy that extends coverage for this facility: Yes

Policies Issued by: Willis Towers Watson, Multinational Insurance Company and Mapfre

Policy Numbers: Willis Towers Watson (B0804Q1966F17, B0804Q14312F17, B0804Q19673F17, B0804Q19672F17, B0804Q18529F17, B0804Q14312F17, B0804Q19674F17, B0804Q18411F17, B0804Q14310F17, B0804Q11038F17, B0804Q14507F17, B0804Q14312F17

Mapfre Praico Insurance Company (1398178000644)

Multinational Insurance Company (88-CP-000307831-2, 88-CP-000318673-0, 88-CP000318674-0, 88-CP-000318675-0, 88-CP-000318676-0, 88-CP-000318677-0)

Policy Period: From: 5/15/2017 To: 5/15/2018

Policy Limits: \$300,000,000.00

RCV or ACV: Replacement Cost Value

Deductible Amount \$25,000,000.00 each and every occurrence property damage and 30 days each and every occurrence business interruption in respect of Named Windstorm.

Does the Applicant's Commercial Policy extend coverage for the damage described in this project: No

NUMBER OF DAMAGED LOCATIONS INCLUDED IN THIS PROJECT: (1)

Damaged Inventory (DI) #1277422:

FAAST Distribution Streetlight Florida

Location: Distribution Streetlight Florida

GPS Coordinates: XXXXXXXXXX

Cause of Loss: Wind / Wind Driven Rain

SOV / Schedule #: Not insured

SOV / Schedule Amount: Not insured

Applicable Deductible Amount: N/A

Damage Inventory Amount: \$10,309,031.53(CRC Gross Cost \$9,311,841.53 + Mitigation Amount \$997,190.00)

-

Prior Obtain and Maintain Requirement:

No prior insurance requirements were found for this facility.

-

Reduction(s):

No insurance reduction will be applied to this project as coverage is not anticipated. An anticipated insurance reduction of \$193,746,436.00 was applied to FAAST project # 136271 for anticipated insurance proceeds for Hurricane Maria losses. For ease of reference, please see table of insurance allocations: "PREPA Allocation Plan – All Disasters" file.

-

Obtain and Maintain Requirement:

No Obtain & Maintain Requirement is being mandated for theFAAST Distribution Streetlight Florida because the facility does not meet the definition of building, equipment, contents, or vehicle.

Insurance Proceeds Statement:

FEMA acknowledges that the Applicant is in negotiations with their insurance carrier at the time of the FEMA insurance review and might have received partial settlements. In accordance with 44 CFR §206.250-253, in the absence of an actual settlement, anticipated insurance recoveries will be deducted from this project based on Applicant's insurance policy limits. FEMA subsequently adjusts the eligible costs based on the actual amount of insurance proceeds the Applicant receives after a final settlement.

FEMA's Recovery Policy FP 206-086-1, Public Assistance Policy on Insurance (June 29, 2015), requires applicants to take reasonable efforts to recover insurance proceeds that it is entitled to receive from its insurers. FEMA will consider final insurance settlements that may be less than the insurance policy limits when an applicant demonstrates that it has taken reasonable efforts to recover insurance proceeds that it is entitled to on a case-by-case basis.

Standard Insurance Comments

FEMA Policy 206-086-1

PART 2: Other Insurance-Related Provisions. (Sections 312 and 406(d) of the Stafford Act)

A. Duplication of Benefits. FEMA cannot provide assistance for disaster-related losses that duplicate benefits available to an applicant from another source, including insurance.

1. Before FEMA approves assistance for a property, an applicant must provide FEMA with information about any actual or anticipated insurance settlement or recovery it is entitled to for that property.
2. FEMA will reduce assistance to an applicant by the amount of its actual or anticipated insurance proceeds.
3. Applicants must take reasonable efforts to recover insurance proceeds that they are entitled to receive from their insurer(s).

Olga Renta, PA Insurance Specialist, CRC Atlantic, Guaynabo, PR

O&M Requirements

There are no Obtain and Maintain Requirements on **FAAST Streetlight Florida Distribution** .

406 Mitigation

There is no additional mitigation information on **FAAST Streetlight Florida Distribution** .

Environmental Historical Preservation

Is this project compliant with EHP laws, regulations, and executive orders?

Yes

EHP Conditions

- Any change to the approved scope of work will require re-evaluation for compliance with NEPA and other Laws and Executive Orders.
- This review does not address all federal, state and local requirements. Acceptance of federal funding requires recipient to comply with all federal, state and local laws. Failure to obtain all appropriate federal, state and local environmental permits and clearances may jeopardize funding.
- If ground disturbing activities occur during construction, applicant will monitor ground disturbance and if any potential archaeological resources are discovered, will immediately cease construction in that area and notify the State and FEMA.
- Endangered Species Act (ESA) - The Applicant must provide documentation at close-out that proves completion of required Conservation Measures.
- Endangered Species Act (ESA) - Arthropods The USFWS has developed conservation measures that would avoid and minimize potential detrimental effects on the Puerto Rican harlequin butterfly and its designated critical habitat. 1. The contractor shall inform all personnel about the potential presence of the Puerto Rican harlequin butterfly (*Atlantea tulita*) or its occupied host plant "prickly bush" (*Oplonia spinosa*) in the project areas. A pre-work meeting should inform all project personnel about the need to avoid harming this butterfly and its occupied host plant. An educational material (e.g., posters, flyers or signs with photos or illustrations of all the life stages of the Puerto Rican harlequin butterfly (i.e., eggs, caterpillar, chrysalids and adult, and its host plant) should be available to all personnel for reference. 2. Prior to starting any project activity, including removal of vegetation and earth movement, the boundaries of the working area must be clearly delineated in the field to avoid unnecessary habitat impacts. Once the project areas are clearly marked, and prior to any work activity, including site preparation, personnel with knowledge and able to identify the Puerto Rican harlequin butterfly (all life stages) and the "prickly bush" (*Oplonia spinosa*) must survey the areas where the work will be performed to ensure that the species and its host plant are not present within the work area. It is important to note that all life stages of the Puerto Rican harlequin butterfly can be observed year-round, thus, oviposition (egg-laying) may occur at any time during the year. 3. If the Puerto Rican harlequin butterfly and any life stage of the butterfly are found on the project site, any work activities should stop in the area where the species is present. If the host plant is occupied by any life stage of the Puerto Rican harlequin butterfly, the host plant should be clearly marked with a flagging tape and a 2-meter (6.56 feet) buffer zone around the plant should be established and clearly marked for its protection. Also, avoid cutting off the host plant even if no eggs or caterpillars are present. Eggs are mostly found only on the newly grown and more tender branches of the prickly bush and the caterpillars feed only on prickly bush. 4. For all Puerto Rican harlequin butterfly sightings (all life stages), the time and date of the sighting and the specific location where the butterfly was found must be recorded. Data should also include a photo of the butterfly (if possible) and the habitat where it was observed, site GPS coordinates, and comments on how the butterfly was detected and its behavior. All Puerto Rican harlequin butterfly sighting reports should be sent to the to the USFWS Caribbean Ecological Service Field Office to José Cruz-Burgos – Endangered Species Program Coordinator at Caribbean_es@fws.gov.
- Endangered Species Act (ESA) - Reptiles Conditions for the Puerto Rican Boa apply for damage# 1277422 1. Inform all personnel about the potential presence of the PR boa and the VI boa in areas where the proposed work will be conducted. Photographs of the PR and VI Boa are to be prominently displayed at the site. The recipient must ensure that project

personnel is able to correctly identify a PR or VI boa. For information on PR boa, please visit:

<https://ecos.fws.gov/ecp/species/6628>. 2. Prior to any construction activity, including removal of vegetation and earth movement, the boundaries of the project area must be delineated, buffer zones, and areas to be excluded and protected, should be clearly marked in the project plan and in the field to avoid further habitat degradation into forested areas. Once areas are clearly marked, and prior to any construction activity, including site preparation, project personnel able to correctly identify a PR or VI boa must survey the areas to be cleared to ensure that no boas are present within the work area. Vehicle and equipment operation must remain on designated access roads/paths and within rights-of way. 3. If a PR boa is found within any of the working or construction areas, activities should stop in the area where the boa was found. Do not capture the boa. If boas need to be moved out of harm's way, project personnel designated by the recipient shall immediately contact the Puerto Rico Department of Natural and Environmental Resources (PRDNER) Rangers for safe capture and relocation of the animal (PRDNER phone #: 787-724-5700, 787-230-5550, 787-771-1124). If immediate relocation is not an option, project-related activities at this area must stop until the boa moves out of harm's way on its own. Activities at other work sites, where no boas have been found after surveying the area, may continue. 4. Measures should be taken to avoid and minimize PR boa casualties by heavy machinery or motor vehicles being used on site. Any heavy machinery left on site (staging) or near potential PR boa habitat (within 50 meters of potential boa habitat), needs to be thoroughly inspected each morning before work starts to ensure that no boas have sheltered within engine compartments or other areas of the equipment. If PR boas are found within vehicles or equipment, do not capture the animal and let it move on its own or call PRDNER Rangers for safe capture and relocation of the boa (PRDNER phone #: 787-724-5700, 787-230-5550, 787-771-1124). If not possible, the animal should be left alone until it leaves the vehicle on its own. 5. PR boas may seek shelter in debris piles. Measures should be taken to avoid and minimize boa casualties associated with sheltering in debris piles as a result of project activities. Debris piles should be placed far away from forested areas. Prior to moving, disposing or shredding, debris piles should be carefully inspected for the presence of boas. If PR boas are, found within debris piles, do not capture the animal and let it move on its own or call PRDNER Rangers for safe capture and relocation of the animal. If debris piles will be left on site, we recommend they be placed in areas that will not be disturbed in the future. 6. For all boa sightings (dead or alive), personnel designated by the recipient must record the time and date of the sighting and the specific location where the boa was found. Data should also include a photo of the animal dead or alive, and site GPS coordinates, and comments on how the animal was detected and its behavior. If the PR boa was accidentally killed as part of the project actions, please include information on what conservation measures had been implemented and what actions will be taken to avoid further killings. All boa sighting reports should be sent to the USFWS Caribbean Ecological Services Field Office, Marelisa Rivera - Deputy Field Supervisor, 787- 851-7297 extension 206, 787-510-5207, marelisa_rivera@fws.gov.

- Endangered Species Act (ESA) - Birds The below conservation measures apply damage#1277422 to the following species: Puerto Rican broad-winged hawk. 8. During breeding seasons (see below), nest surveys shall be conducted if a project occurs in a species' range. Nest searches must be conducted by qualified personnel with the appropriate DNER permits prior to start of work. If nesting activity is detected, all construction activities or human disturbance must be avoided within a 200-meter buffer to the closest nest. This avoidance strategy must be kept until fledglings successfully leave the nest permanently. Outside the nesting season, if a nest is encountered, work shall not interfere with the species until they have left the site. If nesting activity is detected, all construction activities or human disturbance must be avoided within a 200-meter buffer to the closest nest. This avoidance strategy must be kept until juvenile birds fledge the nest and are permanently gone. Nesting season: Puerto Rican broad-winged hawk (*Buteo platypterus*): December-June. For all nest sightings, the Applicant must record the time and date of the sighting and the specific location where it was found. Data should also include a photo of the nest and eggs, relocation site GPS coordinates, and the time and date of the relocation. All sightings and incidental lethal take reports should be sent to the USFWS Caribbean Ecological Services Field Office, Marelisa Rivera - Deputy Field Supervisor, 787-851-7297 extension 206, 787-510-5207, marelisa_rivera@fws.gov.
- Resource Conservation and Recovery Act, aka Solid Waste Disposal Act (RCRA) - The Applicant shall handle, manage, and dispose of all types of hazardous waste in accordance with requirements of local, state, and federal laws, regulations, and ordinances. In addition, the Applicant shall ensure that all debris is separated and disposed of in a manner consistent with the PR DNER guidelines at a permitted site or landfill. The contractor/applicant will be responsible for the proper disposition of construction debris in authorized landfills providing the name, location, coordinates and permits of the facility to the corresponding authorities. Unusable equipment, debris, white goods, scrap metal any other material shall be disposed in approved manner and location. In the event significant items are discovered during the implementation or development of the project the Applicant shall handle, manage and dispose petroleum products, hazardous materials and toxic waste in accordance to the requirements of the local and federal agencies. Noncompliance with these requirements may jeopardize receipt of federal funds.
- National Historic Preservation Act (NHPA) - a. The Subrecipient and/or Subrecipient's contractor must follow the Low Impact Debris Removal Stipulations (LIDRS) outlined in Appendix E of the Project-Specific Programmatic Agreement Among FEMA, the SHPO, ACHP, COR3, and PREPA (PSPA), executed on August 2, 2022. b. Pursuant to Stipulation III.B of the PSPA, if, in the course of implementing this Individual Undertaking(s), previously unidentified structures, sites, buildings, objects, districts, or archaeological deposits, that may be eligible for listing in the National Register, or human remains are uncovered, or if it appears that an Individual Undertaking has affected or will affect a previously identified

historic property in an unanticipated manner, the contractor must notify Subrecipient who will immediately notify the Recipient. Work must stop in the vicinity of the discovery and measures must be taken to protect the discovery and avoid additional harm. c. Additional staging areas and/or work pads within work site area haven't been identified yet. The Subrecipient and/or private operator must provide the information of any additional staging areas or work pads for EHP evaluation as soon as available especially if any construction activity will be necessary to prepare the site(s). Information for staging areas and/or work pads confined to previously disturbed or hardened surfaces can be provided at close-out. d. FEMA will require that an archaeologist, who meets the Secretary of the Interior (SOI) Qualification Standards (36 CFR Part 61) for archaeology, be present to monitor all trenching activities within Sector Las Tosas, near the Hacienda Cardona archaeological site (FA0100001); (See Appendix C for complete Archeological Monitoring Plan). e. Archaeological monitoring of the activities will be documented by the SOI-qualified archaeologist in a report that must be submitted to FEMA's EHP Section for review. The level of description and documentation in the report submitted to FEMA for review shall be consistent with The Secretary of the Interior's Standards and Guidelines for Archaeological Documentation (http://www.nps.gov/history/local-law/arch_stnds_7.htm). After approval, FEMA EHP will submit the report to PRSHPO for comments and concurrence. f. If there are any further changes to the SOW, including any increase in the extent of ground disturbance, the applicant must notify FEMA beforehand, prior to engaging in further activities not within the current SOW.

EHP Additional Info

There is no additional environmental historical preservation on **FAASt Streetlight Florida Distribution** .

Final Reviews

Final Review

Reviewed By Amaro, Luis N.

Reviewed On 09/01/2023 11:38 AM PDT

Review Comments

LNA 09/01/23. This project has been reviewed, found eligible and cost reasonable, and it is ready to continue the award process.

Recipient Review

Reviewed By Salgado, Gabriel

Reviewed On 09/07/2023 8:02 AM PDT

Review Comments

Recipient review completed. Project is ready for applicant review.

Fixed Cost Offer

As a Public Assistance (PA) Subrecipient PR Electric Power Authority (000-UA2QU-00), in accordance with Section 428 of the Robert T. Stafford Disaster Relief and Emergency Assistance Act, the Applicant agrees to accept a permanent work subaward based on a Fixed Cost Offer in the amount of \$10,309,031.53 for subaward number 11344 under Disaster # 4339. The Applicant accepts responsibility for all costs above the Fixed Cost Offer.

The Applicant understands that by participating in this pilot program they will be reimbursed for allowable costs in accordance with 2 CFR Part 200, and the reimbursement will not exceed the Fixed Cost Offer. The Applicant also understands that by agreeing to this Fixed Cost Offer, they will not receive additional funding related to the facilities or sites

included in the subaward. The Applicant also acknowledges that failure to comply with the requirements of applicable laws and regulations governing assistance provided by FEMA and the PA Alternative Procedures Pilot Program Guidance (such as procurement and contracting; environmental and historic preservation compliance; and audit and financial accountability) may lead to loss of federal funding.

Project Signatures

Signed By Miller, Thomas

Signed On 09/08/2023

Department of Homeland Security Federal Emergency Management Agency

General Info

Project #	708579	P/W #	11508	Project Type	Specialized
Project Category	F - Utilities			Applicant	PR Electric Power Authority (000-UA2QU-00)
Project Title	FAASt [Distribution Pole and Conductor Repair - Ponce Group 16, 17, 18 & 19] (Distribution)			Event	4339DR-PR (4339DR)
Project Size	Large			Declaration Date	9/20/2017
Activity Completion Date	9/20/2027			Incident Start Date	9/17/2017
Process Step	Obligated			Incident End Date	11/15/2017

Damage Description and Dimensions

The Disaster # 4339DR, which occurred between *09/17/2017* and *11/15/2017*, caused:

Damage #1305583; FAASt Distribution Pole and Conductor Repair - Ponce Group 16,17,18 & 19

DDD for this facility codified in the 136271-MEPA078 Puerto Rico Electrical Power Authority Island Wide FAASt Project.

General Facility Information:

- **Facility Type:** Power generation, transmission, and distribution facilities
- **Facility:** Distribution Pole and Conductor Repair - Ponce Group 16,17,18 & 19
- **Facility Description:** The specific facilities included in this project are poles and structures (including their foundations), framing and insulators, load break switches (manual and automated), capacitor banks, voltage regulators, transformers (including lightning arresters and fuse cut-outs), conductors, guy wires, anchoring, grounding assemblies, underground cable, underground cable systems, fault interrupting equipment (fuses, reclosers, and sectionalizers), and any other associated components.
- **Approx. Year Built:** 1970
- **GPS Latitude/Longitude:** [REDACTED]

General Damage Information:

- **Date Damaged:** 9/20/2017
- **Cause of Damage:** High winds & wind driven rain, caused by Cat 4 Hurricane Maria

Final Scope

1305583 **FAASt Distribution Pole and Conductor Repair - Ponce Group 16,17,18 & 19**

INTRODUCTION

The purpose of this document is to submit for approval the detailed Scope of Work ("SOW") to COR3 and FEMA for the Distributor Pole and Conductor Repair – Ponce Group 16-17-18-19 Project under DR-4339-PR Public Assistance. The document provides a description of the project including scope, schedule, and cost estimates as well as Environmental & Historical Preservation ("EHP")

requirements and proposed 406 hazard mitigation work. LUMA Energy is seeking approval from COR3 and FEMA for project funding to repair, restore, or replace the eligible facilities.

LUMA submits this detailed SOW pursuant to the Transmission and Distribution Operations & Maintenance Agreement between Puerto Rico Electric Power Authority ("PREPA"), the Puerto Rico Public-Private Partnerships Authority ("P3A") and LUMA Energy and in accordance with the Consent to Federal Funding Letter issued by PREPA and P3A and provided herein as Appendix F which collectively provides the necessary consent for LUMA Energy, as agent of PREPA, to undertake work in connection with any Federal Funding requests related to the Transmission and Distribution System submitted to FEMA.

FACILITIES

The facilities listed below are part of the feeder systems in the Ponce Region. These interconnected and inter-functional distribution feeders (sites) are part of the electrical distribution system. All the feeders originate from a substation (start) and serve customers along the route to various locations (end). The coordinates shown below as "GPS End" represent the end of the mainline backbone of each feeder.

Ponce Group 16							
Name	Feeder Number	# Of Poles to Replace	GPS Start	GPS End	Phase	Voltage Level (kV)	Constructed Date
AGUIRRE POBLADO	4503-01	9	██████████ ██████████	██████████ ██████████	3 Phase	4.16	More than 20 Years
LAPAS (ALBERGUE)	4504-02	9	██████████ ██████████	██████████ ██████████	3 Phase	4.16	More than 20 Years
USERAS	4601-02	3	██████████ ██████████	██████████ ██████████	3 Phase	4.16	More than 20 Years
COAMO	4602-02	4	██████████ ██████████	██████████ ██████████	3 Phase	4.16	More than 20 Years
PONCE HOSTOS	5001-02	3	██████████ ██████████	██████████ ██████████	3 Phase	4.16	More than 20 Years
CANAS	5002-01	7	██████████ ██████████	██████████ ██████████	3 Phase	4.16	More than 20 Years
Ponce Group 17							
Name	Feeder Number	# Of Poles to Replace	GPS Start	GPS End	Phase	Voltage Level (kV)	Constructed Date
LA RAMBLA	5003-02	5	██████████ ██████████	██████████ ██████████	3 Phase	4.16	More than 20 Years
PONCE HOSTOS	5010-03	9	██████████ ██████████	██████████ ██████████	3 Phase	4.16	More than 20 Years
PONCE HOSPITAL DISTRITO	5012-04	4	██████████ ██████████	██████████ ██████████	3 Phase	4.16	More than 20 Years
VILLAS DEL CARMEN	5016-02	1	██████████ ██████████	██████████ ██████████	3 Phase	13.2	More than 20 Years

Ponce Group 18							
Name	Feeder Number	# Of Poles to Replace	GPS Start	GPS End	Phase	Voltage Level (kV)	Constructed Date
CANAS	5018-01	3	██████ ██████	██████ ██████	3 Phase	13.2	More than 20 Years
HOLIDAY INN	5019-01	7	██████ ██████	██████ ██████	3 Phase	4.16	More than 20 Years
YAUCO PUEBLO 1	5302-02	5	██████ ██████	██████ ██████	3 Phase	4.16	More than 20 Years
YAUCO PUEBLO 1	5302-03	1	██████ ██████	██████ ██████	3 Phase	4.16	More than 20 Years
Ponce Group 19							
Name	Feeder Number	# Of Poles to Replace	GPS Start	GPS End	Phase	Voltage Level (kV)	Constructed Date
JUANA DIAZ	5802-04	3	██████ ██████	██████ ██████	3 Phase	4.16	More than 20 Years

MAGAS COLLORES	5805-01	6	██████ ██████	██████ ██████	3 Phase	4.16	More than 20 Years
TOA VACA	5902-03	3	██████ ██████	██████ ██████	3 Phase	4.16	More than 20 Years

PROJECT SCOPE OF WORK

Below includes a breakdown of pole replacement by feeder for "Proposed 428 Public Assistance Scope of Work" and "Proposed 406 Hazard Mitigation Grant Program Scope of Work", followed by descriptions of each work type specific to the Scope of Work for this group.

Proposed 428 Public Assistance Scope of Work:

Feeder 4503-01 Scope:

Remove	Quantity	Install	Quantity
35ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1
35ft Wood Pole(s)	5	45ft H4 Concrete Pole(s)	5
40ft Concrete Pole(s)	2	45ft H4 Concrete Pole(s)	2
40ft Concrete Pole(s)	1	50ft Galvanized Steel S8 pole(s)	1

Feeder 4504-02 Scope:

Remove	Quantity	Install	Quantity
33ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1
35ft Wood Pole(s)	1	50ft Galvanized Steel S8 pole(s)	1
35ft Wood Pole(s)	4	45ft H4 Concrete Pole(s)	4
40ft Wood Pole(s)	2	45ft H4 Concrete Pole(s)	2
40ft Concrete Pole(s)	1	45ft H4 Concrete Pole(s)	1

Feeder 4601-02 Scope:

Remove	Quantity	Install	Quantity
35ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1
35ft Wood Pole(s)	1	45ft H6 Concrete Pole(s)	1
40ft Wood Pole(s)	1	45ft H6 Concrete Pole(s)	1

Feeder 4602-02 Scope:

Remove	Quantity	Install	Quantity
40ft Concrete Pole(s)	3	45ft H4 Concrete Pole(s)	3

40ft Concrete Pole(s)	1	45ft H6 Concrete Pole(s)	1
-----------------------	---	--------------------------	---

Feeder 5001-02 Scope:

Remove	Quantity	Install	Quantity
45ft Wood Pole(s)	2	45ft H4 Concrete Pole(s)	2
45ft Wood Pole(s)	1	45ft H6 Concrete Pole(s)	1

Feeder 5002-01 Scope:

Remove	Quantity	Install	Quantity
35ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1
35ft Wood Pole(s)	2	45ft H4 Concrete Pole(s)	2
35ft Wood Pole(s)	3	45ft H6 Concrete Pole(s)	3
40ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1

Feeder 5003-02 Scope:

Remove	Quantity	Install	Quantity
35ft Wood Pole(s)	1	50ft Galvanized Steel S8 pole(s)	1
35ft Wood Pole(s)	2	45ft H4 Concrete Pole(s)	2
40ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1
45ft Steel Pole(s)	1	45ft H4 Concrete Pole(s)	1

Feeder 5010-03 Scope:

Remove	Quantity	Install	Quantity
--------	----------	---------	----------

35ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1
40ft Wood Pole(s)	3	45ft H4 Concrete Pole(s)	3
40ft Concrete Pole(s)	1	45ft H4 Concrete Pole(s)	1
40ft Concrete Pole(s)	1	45ft H6 Concrete Pole(s)	1
45ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1
45ft Wood Pole(s)	1	45ft H6 Concrete Pole(s)	1
45ft Wood Pole(s)	1	45ft H6 Concrete Pole(s)	1

Feeder 5012-04 Scope:

Remove	Quantity	Install	Quantity
35ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1
35ft Wood Pole(s)	1	45ft H6 Concrete Pole(s)	1
40ft Concrete Pole(s)	1	45ft H4 Concrete Pole(s)	1
40ft Wood Pole(s)	1	45ft H6 Concrete Pole(s)	1

Feeder 5016-02 Scope:

Remove	Quantity	Install	Quantity
45ft Concrete Pole(s)	1	45ft H6 Concrete Pole(s)	1

Feeder 5018-01 Scope:

Remove	Quantity	Install	Quantity
35ft Wood Pole(s)	2	45ft H4 Concrete Pole(s)	2
40ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1

Feeder 5019-01 Scope:

Remove	Quantity	Install	Quantity
35ft Wood Pole(s)	4	45ft H4 Concrete Pole(s)	4
35ft Wood Pole(s)	3	45ft H4 Concrete Pole(s)	3

Feeder 5302-02 Scope:

Remove	Quantity	Install	Quantity
35ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1
35ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1
35ft Wood Pole(s)	2	45ft H6 Concrete Pole(s)	2
40ft Wood Pole(s)	1	45ft H6 Concrete Pole(s)	1

Feeder 5302-03 Scope:

Remove	Quantity	Install	Quantity
40ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1

Feeder 5802-04 Scope:

Remove	Quantity	Install	Quantity
35ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1
35ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1
35ft Wood Pole(s)	1	45ft H6 Concrete Pole(s)	1

Feeder 5805-01 Scope:

Remove	Quantity	Install	Quantity
30ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1
35ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1
35ft Wood Pole(s)	2	45ft H6 Concrete Pole(s)	2
40ft Wood Pole(s)	1	45ft H4 Concrete Pole(s)	1
45ft Steel Pole(s)	1	45ft H4 Concrete Pole(s)	1

Feeder 5902-03 Scope:

Remove	Quantity	Install	Quantity
35ft Wood Pole(s)	2	50ft H6 Concrete Pole(s)	2
45ft Steel Pole(s)	1	50ft H6 Concrete Pole(s)	1

Detail Descriptions for Planned Field Work:

Pole Replacement

- Remove existing poles, including hardware and install new poles, including hardware, in the same location. If unable to install the replacement in the same location, the pole will be installed within 3 feet.
- All pole installations are to replace existing pole locations; no new locations are included in this scope of work. Refer to *Appendix J- EHP Checklist*, column C (Soil area and depth impact) for the depths of the poles to be installed.
- Remove the existing foundations as specified in Appendix J- EHP Checklist column I (Concrete Foundation) and replace them with a new concrete foundation bases as per Appendix D- Distribution Construction Standards (Concrete Base Standard). The maximum auger width used is 42" and the maximum depth drilled is 15ft.
- New guy wire/ anchors are to be installed in compliance with Appendix D- Distribution Construction Standards within 3ft from the existing anchor. The maximum distance an anchor will be installed for a 50ft pole is 25ft from the base of the pole, within the right-of-way.
- Brushing will be required in locations to gain access to the pole for replacement. Brushing refers to the removal and clearing of vegetation solely to the extent that it allows crews to conduct work. The brushing of vegetation will be limited to a 15 ft radius surrounding the surface of the pole but not to exceed the width of the right-of-way for the exclusive purpose of gaining access to the pole to conduct repairs. Please see Appendix J- EHP Checklist column H (Brushing/Clearing), Refer to Appendix B- Maps

and Pictures for pictures of the vegetation.

- All work for this program will be performed within the current electrical right-of-way.
- This scope of work will not affect water or sewer utility services.

Material Disposal

- PCBs, oil from the transformer and breakers, sealants, and other chemical wastes typical of a construction site are considered hazardous waste and will be disposed of by the contractor in approved facilities as per applicable local regulations. Refer to Appendix C - Waste Management Plan.
- The type of debris that may be found in the process of removal are luminaires, pole arms, photocells, metal scrap, wiring, concrete, steel, and wood poles, etc. The debris will be separated and taken to an approved waste disposal facility in compliance with applicable local regulations. Refer to Appendix C- Waste Management Plan.
- Transformers will be contained and returned to LUMA in compliance with applicable local regulations. The removal of the transformer will require testing of the existing oil for PCB levels, drain oil, and delivery to the approved waste disposal site as per Environmental Regulations. Refer to Appendix C- Waste Management Plan.

Access Roads

- Poles are in close proximity to the roads and are site accessible. The construction of access roads is not required for this scope of work. Refer to Appendix J- EHP Checklist in column G "Site Accessible"

Staging Area

- All materials are stored and dispatched from the Ponce Regional Warehouse. Refer to Appendix L- Warehouse locations. No additional or temporary staging areas are required.

Fill, gravel, sand, etc.:

- Fill, Gravel, and Sand materials will be obtained from an approved supplier as referenced in Appendix A- Approved Supplier List.

List of Equipment to be used:

- Skid Steer, Excavator, Dump trucks, Manlifts, 120-Ton Motor Crane, Boom Trucks 45-ton Crane, Zoom Boom, Air compressor, Truck Digger, Water truck, Pump Truck, Concrete Vibrator, Oil Tanker, Filtering Machine and Flatbed platform.
- Vegetation will be removed utilizing machete, chainsaw, electric pruner, telescopic pole pruner, bucket truck, and/or chipper

Specific List of Permits Required:

- DTOP Endorsements & Municipality Notifications.
- Excavation and Demolition Notification in Department of Transportation and Public Works Agency - (DTOP).
- LUMA will provide proof of all permits.

Proposed 406 Hazard Mitigation Grant Program Scope of Work (Please refer to 406 Mitigation Profile)

PROJECT ESTIMATE

The estimated costs (Class 3 Accuracy +/-30%) to complete the project are captured in the table below. The cost estimate was developed utilizing preliminary Architectural and Engineering design information and may be subject to change. LUMA has allocated 10% of the project cost for the mitigation of potential known risks.

Project Cost Estimate	Total	428 Public Assistance	406 Hazard Mitigation
Planning, Permits and Applications(FAASt 335168)	\$44,116.00	\$44,116.00	\$0.00
Environmental Management (FAASt 335168)	\$63,058.00	\$63,058.00	\$0.00
Engineering (FAASt 335168)	\$188,081.70	\$157,296.10	\$30,785.60
Project Management (FAASt 335168)	\$94,040.85	\$78,648.05	\$15,392.80
Distribution Line	\$1,880,817.00	\$1,572,961.00	\$307,856.00
Contingency	\$227,011.36	\$191,607.92	\$35,403.44
Total Project Cost Estimate:	\$2,497,124.91	\$2,107,687.07	\$389,437.84
FAASt Project # 708579 (428) Total		\$1,764,568.92	
FAASt Project # 708579 (406) Total		\$389,437.84	
FAASt A&E #335168 Total		\$343,118.15	
Total Cost		\$2,497,124.91	

Please refer to Appendix H for Cost Estimate Details.

PROJECT 708579 COST SUMMARY:

Work To Be Completed (WTBC): \$2,107,687.07

A&E Deduction (Global A&E FAASt 335168): **-\$343,118.15**

Project Total Cost: \$1,764,568.92

Project Notes:

1. Refer to detailed SOW provided in document 708579-DR4339PR-Detailed SOW Ponce Group 16-17-18-19 Rev1.pdf.

2. For reference, refer to attachments listed below:

- APPENDIX A - Approved Supplier List
- APPENDIX B - Maps and Pictures
- APPENDIX C - Waste Management Plan
- APPENDIX D - Distribution Construction Standards
- APPENDIX E - LUMA Wildlife Avian and Historical Protection Procedure #335

- APPENDIX F - Consent to Federal Funding Letter - FEMA/COR3
- APPENDIX G - Structure Coordinates
- APPENDIX H - Detail Cost Estimate
- APPENDIX I - PAPPG Appendix J - Cost-Effective Hazard Mitigation Measures
- APPENDIX J - EHP Checklist
- APPENDIX K - EHP Maps
- APPENDIX L - Warehouse Locations

3. All streetlight trench rebuilds will be performed in the same location and with the same dimensions as the existing damaged one.
4. No new trenches are considered under the project.
5. The trenches are described by LUMA Trench Standard STL-16 (attached in the project), which states that the typical trench width is 1 foot, and the typical trench depth is 3.5 feet. For this project, the typical trench was defined to have an average length of 100 feet and following a straight line between the streetlight poles.
6. This project is part of 136271 – MEPA078 Puerto Rico Electrical Power Authority (PREPA) Island Wide FAAS Project.
7. Architectural and Engineering (A&E) Costs are deducted given previously obligated for project 335168 – PREPA Island Wide FAAS A&E.

406 HMP Scope

Project #708579 FAAS Distribution Pole and Conductor Repair - Ponce Group 16-17-18-19.

Damage # 1305583 (250081); FAAS Ponce Group 16 (Aguirre 4503-01, Lapas 4504-02, Useras 4601-02, Coamo 4602-02, PonceHostos 5001-02, Canas 5002-01), **Ponce Group 17** (La Rambla 5003-02, PonceHostos 5010-03, Ponce Hospital Distrito 5012-04, Villas Del Carmen 5016-02), **Ponce Group 18** (Canas 5018-01, Holiday INN 5019-01, Yauco Pueblo I 5302-02, Yauco Pueblo I 5302-03) and **Ponce Group 19** (Juana Diaz 5802-04, Magas Collores 5805-01, Toa Vaca 5902-03).

Applicant: PR Electric Power Authority (000-UA2QU-00)

Location: Ponce, Puerto Rico

GPS Latitude/Longitude: (Start: [REDACTED], End: [REDACTED])

Hazard Mitigation Narrative

During the incident period from September 17, 2017, to November 15, 2017, the Commonwealth of Puerto Rico experienced hurricane-force winds, heavy rain, flooding, and power outage “loss of power” from Hurricane Maria. The incident caused damage to the electrical system, such as the power generation plants, transmission and distribution lines, substations, communication systems, buildings, among other damages to the infrastructures owned, operated, and maintained by the Puerto Rico Electric Power Authority (PREPA).

Project #708579 FAAS Distribution Pole and Conductor Repair - Ponce Group 16-17-18-19.

The Distribution Pole and Conductor Repair – Ponce Group 16-17-18-19 consists of 17 interconnected and inter-functional distribution feeders (sites) establish the electrical distribution system as follow: **Ponce Group 16** (Aguirre 4503-01, Lapas 4504-02, Useras 4601-02, Coamo 4602-02, PonceHostos 5001-02, Canas 5002-01), **Ponce Group 17** (La Rambla 5003-02, PonceHostos 5010-03, Ponce Hospital Distrito 5012-04, Villas Del Carmen 5016-02), **Ponce Group 18** (Canas 5018-01, Holiday INN 5019-01, Yauco Pueblo I 5302-02, Yauco Pueblo I 5302-03) and **Ponce Group 19** (Juana Diaz 5802-04, Magas Collores 5805-01, Toa Vaca 5902-03).

The Method of Repair (MOR) included the replacement of the damaged critical distribution poles (wood, concrete or galvanized), cross-arms, insulators, and all associated hardware needed for the new structure. According to the information provided by the Applicant, due to the high velocity hurricane winds, wind-blown debris, and prolonged heavy rain, were the main cause of the damages of the facilities.

In order to minimize the damages in a future event, the Applicant is proposing as a mitigation measure, increase the strength of the poles by increasing the wind tolerance to +160mph. Note: The FEMA Accelerated Award Strategy (FAAS) MOR included the PREPA distribution standards and specifications that were based on a

145mph sustained winds. However, the new PREPA Standard 2021 updates the design-criteria to a 160mph sustained winds resistant. The +160mph wind tolerance mitigation measure, will protect and make the affected infrastructure more resistant, stronger, and resilient to similar hazards.

-

Hazard Mitigation Proposal (HMP) Scope of Work:

In order to prevent or reduce future damages from similar events, the applicant proposed the following mitigation measures:

Mitigation Measures (Replacement)

1. To avoid damage in a future event, the Applicant is proposing as a mitigation measure, increase the strength of the poles by increasing the wind tolerance of all materials to +160mph. The FAASt MOR included the PREPA distribution standards and specifications that were based on a 145mph sustained winds. However, the new PREPA Standard 2021 updates the design-criteria to a 160mph sustained winds resistant. The above mitigation measures will protect and make the affected infrastructure more resistant, stronger, and resilient to similar hazards. Refer to Appendix J: Section VI.D.1 of the PAPPG V3.1.

➤ [Distribution Critical Poles Replacement] 406 Mitigation Scope of Work:

1. Feeder 4503-01 Scope: 9EA Poles

- Replace one (1) 45' H4 Concrete pole by one (1) 45' S-05.7 Galvanized Steel pole.
- Replace five (5) 45' H4 Concrete poles by five (5) 50' S8 Galvanized Steel poles.
- Replace two (2) 45' H4 Concrete poles by two (2) 50' S8 Galvanized Steel poles.
- No 406 Hazard Mitigation work identified to replace one (1) 40' Concrete pole. In these cases, the Mitigation is accomplished by 428 PA method of repair (MOR).

-

2. Feeder 4504-02 Scope: 9EA Poles

- Replace one (1) 45' H4 Concrete pole by one (1) 50' S8 Galvanized Steel pole.
- No 406 Hazard Mitigation work identified to replace one (1) 35' Wood pole. Note: In these cases, the Mitigation is accomplished by 428 PA method of repair (MOR).
- Replace four (4) 45' H4 Concrete poles by four (4) 50' S8 Galvanized Steel poles.
- Replace two (2) 45' H4 Concrete poles by two (2) 50' S8 Galvanized Steel poles.
- Replace one (1) 45' H4 Concrete poles by one (1) 50' S8 Galvanized Steel pole

-

3. Feeder 4601-02 Scope: 3EA Poles

- Replace one (1) 45' H4 Concrete poles by one (1) 50' S8 Galvanized Steel pole.
- Replace one (1) 45' H6 Concrete poles by one (1) 50' S8 Galvanized Steel pole.
- Replace one (1) 45' H6 Concrete poles by one (1) 50' S8 Galvanized Steel pole.

-

4. Feeder 4602-02 Scope: 4EA Poles

- Replace three (3) 45' H4 Concrete poles by three (3) 50' S8 Galvanized Steel poles.
- Replace one (1) 45' H6 Concrete poles by one (1) 50' S8 Galvanized Steel poles.

-

5. Feeder 5001-02 Scope: 3EA Poles

- Replace two (2) 45' H4 Concrete poles by two (2) 45' S-05.7 Galvanized Steel poles.

- Replace one (1) 45' H6 Concrete poles by one (1) 50' S8 Galvanized Steel pole.

-

6. Feeder 5002-01 Scope: 7EA Poles

- Replace one (1) 45' H4 Concrete pole by one (1) 45' S-05.7 Galvanized Steel pole.
- Replace Three (3) 45' H6 Concrete poles by Three (3) 50' S8 Galvanized Steel poles.
- Replace Three (3) 45' H4 Concrete poles by Three (3) 50' S8 Galvanized Steel poles.

-

7. Feeder 5003-02 Scope: 5EA Poles

- No 406 Hazard Mitigation work identified to replace one (1) 50ft Galvanized Steel S8 pole(s). Note: In these cases, the Mitigation is accomplished by 428 PA method of repair (MOR).
- Replace four (4) 45' H4 Concrete poles by four (4) 50' S8 Galvanized Steel poles.

-

8. Feeder 5010-03 Scope: 9EA Poles

- Replace one (1) 45' H4 Concrete pole by one (1) 50' S8 Galvanized Steel pole.
- Replace three (3) 45' H4 Concrete poles by three (3) 50' S8 Galvanized Steel poles.
- Replace one (1) 45' H4 Concrete pole by one (1) 45' S5.7 Galvanized Steel pole.
- Replace one (1) 45' H6 Concrete pole by one (1) 50' S8 Galvanized Steel pole.
- Replace one (1) 45' H4 Concrete pole by one (1) 45' S5.7 Galvanized Steel pole.
- Replace one (1) 45' H6 Concrete pole by one (1) 45' S5.7 Galvanized Steel pole.
- Replace one (1) 45' H6 Concrete pole by one (1) by one (1) 50' S8 Galvanized Steel pole.

-

9. Feeder 5012-04 Scope: 4EA Poles

- Replace one (1) 45' H4 Concrete pole by one (1) 50' S8 Galvanized Steel pole.
- Replace one (1) 45' H6 Concrete pole by one (1) 50' S8 Galvanized Steel poles.
- Replace one (1) 45' H4 Concrete pole by one (1) 50' S8 Galvanized Steel pole.
- Replace one (1) 45' H6 Concrete pole by one (1) 50' S8 Galvanized Steel pole.

-

10. Feeder 5016-02 Scope: 1EA Pole

- Replace one (1) 45' H6 Concrete pole by one (1) 50' S8 Galvanized Steel pole.

-

11. Feeder 5018-01 Scope: 3EA Poles

- Replace two (2) 45' H4 Concrete poles by two (2) 50' S8 Galvanized Steel poles.
- Replace one (1) 45' H4 Concrete by one (1) 50' S8 Galvanized Steel pole.

-

12. Feeder 5019-01 Scope: 7EA Poles

- Replace four (4) 45' H4 Concrete poles by four (4) 45' S5.7 Galvanized Steel poles.
- Replace three (3) 45' H6 Concrete poles by three (3) 50' S8 Galvanized Steel poles.

-

13. Feeder 5302-02 Scope: 5EA Poles

- Replace one (1) 45' H4 Concrete pole by one (1) 45' S5.7 Galvanized Steel Pole.
- Replace one (1) 45' H4 Concrete pole by one (1) 50' S8 Galvanized Steel pole.
- Replace two (2) 45' H6 Concrete poles by two (2) 50' S8 Galvanized Steel poles.
- Replace one (1) 45' H6 Concrete pole by one (1) 50' S8 Galvanized Steel pole.

-

14. Feeder 5302-03 Scope: 1EA Pole

- Replace one (1) 45' H4 Concrete pole by one (1) 45' S5.7 Galvanized Steel pole.

-

15. Feeder 5802-04 Scope: 3EA Poles

- Replace one (1) 45' H4 Concrete pole by one (1) 45' S5.7 Galvanized Steel pole.
- Replace one (1) 45' H4 Concrete pole by one (1) 50' S8 Galvanized Steel pole.
- Replace one (1) 45' H6 Concrete pole by one (1) 50' S8 Galvanized Steel pole.

-

16. Feeder 5805-01 Scope: 6EA Poles

- Replace one (1) 45' H4 Concrete pole by one (1) 50' S8 Galvanized Steel pole.
- Replace one (1) 45' H4 Concrete pole by one (1) 50' S8 Galvanized Steel pole.
- Replace one (2) 45' H6 Concrete poles by one (2) 50' S8 Galvanized Steel poles.
- Replace one (1) 45' H4 Concrete pole by one (1) 50' S8 Galvanized Steel pole.
- Replace one (1) 45' H4 Concrete pole by one (1) 50' S8 Galvanized Steel pole.
- -

17. Feeder 5902-03 Scope: 3EA Poles

- Replace two (2) 50' H6 Concrete poles by two (2) 50' S8 Galvanized Steel poles.
- Replace one (1) 50' H6 Concrete pole by one (1) 50' S8 Galvanized Steel Pole.
- -

Hazard Mitigation Proposal (HMP) Cost

Total Net Hazard Mitigation Cost (Base Cost) =	\$ 307,856.00
+ HM (Applicant A&E, Management & General Conditions) =	\$ 81,581.80
Hazard Mitigation Total Cost =	\$ 389,437.80

HMP Cost-Effectiveness Calculations

-

FEMA's Benefit-Cost Analysis (BCA), methodology evaluates expected risk reduction benefits of a hazard mitigation project and compares those benefits to the cost of the mitigation project. FEMA Public Assistance Program and Policy Guide (PAPPG) Chapter 2, Section VII, C, defines cost effective mitigation as: The Hazard Mitigation Measure is cost effective through an acceptable Benefit Cost Analysis (BCA) with a resulting Benefit Cost Ratio equal to or greater than (1).

The Island Wide Benefit Cost Analysis (IWBCA) created for the PREPA infrastructure defines a maximum potential benefit using the incurred costs of the PREPA FEMA Accelerated Award Strategy (FAAST) fixed cost estimate, the mission assignments utilized for the reconnection effort, and the costs associated with loss of service. This maximum benefit has been developed to fund all mitigation projects from both Public Assistance Hazard Mitigation and the Hazard Mitigation Grant program.

It is the applicant's responsibility to maintain a record of approved IWBCA related projects to avoid running out of funds for their Mitigation portion projects." Please see attached IWBCA Package

The cost of the Hazard Mitigation Proposal (HMP) described herein is \$389,437.84 (Hazard Mitigation Total Cost). The cost of this HMP combined with all other proposals (both PA and HMGP) does not exceed the maximum potential benefit and is therefore deemed cost effective per FEMA Public Assistance Program and Policy Guide (PAPPG) V3.1 April 2018, Chapter 2, VII., Section C, BCA Rule. This Hazard Mitigation Proposal meets eligible repair and restoration cost-effective requirements.

**See Mitigation Profile Documents Tab in Grants Manager for complete version of this HMP and supporting documents (HMP, HMP cost estimate, Supporting documents file).

Cost

Code	Quantity	Unit	Total Cost	Section
3510 (v0 Engineering and Design Services - PREPA FASSt A&E 335168)	1.00	Lump Sum	(\$343,118.15)	Uncompleted
9201 (PAAP Fixed Estimate (No Value - Tracking Purposes Only))	1.00	Lump Sum	\$0.00	Completed
9001 (v0 Contract - PREPA FAASSt Project 136271)	1.00	Lump Sum	\$2,107,687.07	Uncompleted

CRC Gross Cost \$1,764,568.92

Total 406 HMP Cost \$389,437.84

Total Insurance Reductions \$0.00

CRC Net Cost \$2,154,006.76

Federal Share (90.00%) \$1,938,606.09

Non-Federal Share (10.00%) \$215,400.67

Award Information

Version Information

Version #	Eligibility Status	Current Location	Bundle Number	Project Amount	Cost Share	Federal Share Obligated	Date Obligated
0	Eligible	Awarded	PA-02-PR-4339-PW-11508(14334)	\$2,154,006.76	90 %	\$1,938,606.08	10/20/2023

Drawdown History

EMMIE Drawdown Status As of Date	IFMIS Obligation #	Expenditure Number	Expended Date	Expended Amount
No Records				

Obligation History

Version #	Date Obligated	Obligated Cost	Cost Share	IFMIS Status	IFMIS Obligation #
-----------	----------------	----------------	------------	--------------	--------------------

Subgrant Conditions

- As described in Title 2 Code of Federal Regulations (C.F.R.) § 200.333, financial records, supporting documents, statistical records and all other non-Federal entity records pertinent to a Federal award must be retained for a period of three (3) years from the date of submission of the final expenditure report or, for Federal awards that are renewed quarterly or annually, from the date of the submission of the quarterly or annual financial report, respectively, as reported to the Federal awarding agency or pass-through entity in the case of a subrecipient. Federal awarding agencies and pass-through entities must not impose any other record retention requirements upon non-Federal entities. Exceptions are stated in 2 C.F.R. §200.333(a) – (f)(1) and (2). All records relative to this project are subject to examination and audit by the State, FEMA and the Comptroller General of the United States and must reflect work related to disaster-specific costs.
- In the seeking of proposals and letting of contracts for eligible work, the Applicant/Subrecipient must comply with its Local, State (provided that the procurements conform to applicable Federal law) and Federal procurement laws, regulations, and procedures as required by FEMA Policy 2 CFR Part 200, Procurement Standards, §§ 317-326.
- The Recipient must submit its certification of the subrecipient's completion of this project, the final claim for payment, and supporting documentation within 180 days from the date that the applicant completes the scope of work, or the project deadline, whichever occurs first. FEMA reimburses Large Projects (those with costs above the large project threshold) based on the actual eligible final project costs. Therefore, during the final project reconciliation (closeout), the project may be amended to reflect the reconciliation of actual eligible costs.
- When any individual item of equipment purchased with PA funding is no longer needed, or a residual inventory of unused supplies exceeding \$5,000 remains, the subrecipient must follow the disposition requirements in Title 2 Code of Federal Regulations (C.F.R.) § 200.313-314.
- The terms of the FEMA-State Agreement are incorporated by reference into this project under the Public Assistance award and the applicant must comply with all applicable laws, regulations, policy, and guidance. This includes, among others, the Robert T. Stafford Disaster Relief and Emergency Assistance Act; Title 44 of the Code of Federal Regulations; FEMA Policy No. 104-009-2, Public Assistance Program and Policy Guide; and other applicable FEMA policy and guidance.
- The DHS Standard Terms and Conditions in effect as of the declaration date of this emergency declarations or major disaster, as applicable, are incorporated by reference into this project under the Public Assistance grant, which flow down from the Recipient to subrecipients unless a particular term or condition indicates otherwise.
- The Uniform Administrative Requirements, Cost Principles, and Audit Requirements set forth at Title 2 Code of Federal Regulations (C.F.R.) Part 200 apply to this project award under the Public Assistance grant, which flow down from the Recipient to all subrecipients unless a particular section of 2 C.F.R. Part 200, the FEMA-State Agreement, or the terms and conditions of this project award indicate otherwise. See 2 C.F.R. §§ 200.101 and 110.
- The subrecipient must submit a written request through the Recipient to FEMA before it makes a change to the approved scope of work in this project. If the subrecipient commences work associated with a change before FEMA approves the change, it will jeopardize financial assistance for this project. See FEMA Policy No. 104-009-2, Public Assistance Program and Policy Guide.
- Pursuant to section 312 of the Stafford Act, 42 U.S.C. 5155, FEMA is prohibited from providing financial assistance to any entity that receives assistance from another program, insurance, or any other source for the same work. The subrecipient agrees to repay all duplicated assistance to FEMA if they receive assistance for the same work from another Federal agency, insurance, or any other source. If an subrecipient receives funding from another federal program for the same purpose, it must notify FEMA through the Recipient and return any duplicated funding.

Insurance

Additional Information

8/1/2023

GENERAL INFORMATION

Event: DR4339-PR

Project: SP 708579

Category of Work: Cat F - Utilities

Applicant: PR Electric Power Authority

Event Type: Hurricane / Hurricane Maria

Cause of Loss: Wind / Wind Driven Rain

Incident Period: 9/17/2017 to 11/15/2017

Total Public Assistance Amount: \$2,154,006.76 (CRC Gross Cost \$1,764,568.92 + Mitigation Amount \$389,437.84)

COMMERCIAL INSURANCE INFORMATION

Does the applicant have a Commercial Policy that extends coverage for this facility: Yes

Policies Issued by: Willis Towers Watson, Multinational Insurance Company and Mapfre

Policy Numbers: Willis Towers Watson (B0804Q1966F17, B0804Q14312F17, B0804Q19673F17, B0804Q19672F17, B0804Q18529F17, B0804Q14312F17, B0804Q19674F17, B0804Q18411F17, B0804Q14310F17, B0804Q11038F17, B0804Q14507F17, B0804Q14312F17)

Mapfre Praico Insurance Company (1398178000644)

Multinational Insurance Company (88-CP-000307831-2, 88-CP-000318673-0, 88-CP000318674-0, 88-CP-000318675-0, 88-CP-000318676-0, 88-CP-000318677-0)

Policy Period: From: 5/15/2017 To: 5/15/2018

Policy Limits: \$300,000,000.00

RCV or ACV: Replacement Cost Value

Deductible Amount \$25,000,000.00 each and every occurrence property damage and 30 days each and every occurrence business interruption in respect of Named Windstorm.

Does the Applicant's Commercial Policy extend coverage for the damage described in this project: No

NUMBER OF DAMAGED LOCATIONS INCLUDED IN THIS PROJECT: (1)

Damaged Inventory (DI) #1305583:

FAASt Distribution Pole and Conductor Repair - Ponce Group 16,17,18 & 19

Location: Distribution Pole and Conductor Repair - Ponce Group 16,17,18 & 19

GPS Coordinates: XXXXXXXXXX

Cause of Loss: Wind / Wind Driven Rain

SOV / Schedule #: Not insured

SOV / Schedule Amount: Not insured

Applicable Deductible Amount: N/A

Damage Inventory Amount: \$2,154,006.76 (CRC Gross Cost \$1,764,568.92 + Mitigation Amount \$389,437.84)

-

Prior Obtain and Maintain Requirement:

No prior insurance requirements were found for this facility.

-

Reduction(s):

No insurance reduction will be applied to this project as coverage is not anticipated. An anticipated insurance reduction of \$193,746,436.00 was applied to FFAST project # 136271 for anticipated insurance proceeds for Hurricane Maria losses. For ease of reference, please see table of insurance allocations: "PREPA Allocation Plan – All Disasters" file._

-

Obtain and Maintain Requirement:

No Obtain & Maintain Requirement is being mandated for the FFAST Distribution Pole and Conductor Repair - Ponce Group 16,17,18 & 19 because the facility does not meet the definition of building, equipment, contents, or vehicle.

Insurance Proceeds Statement:

FEMA acknowledges that the Applicant is in negotiations with their insurance carrier at the time of the FEMA insurance review and might have received partial settlements. In accordance with 44 CFR §206.250-253, in the absence of an actual settlement, anticipated insurance recoveries will be deducted from this project based on Applicant's insurance policy limits. FEMA subsequently adjusts the eligible costs based on the actual amount of insurance proceeds the Applicant receives after a final settlement.

FEMA's Recovery Policy FP 206-086-1, Public Assistance Policy on Insurance (June 29, 2015), requires applicants to take reasonable efforts to recover insurance proceeds that it is entitled to receive from its insurers. FEMA will consider final insurance settlements that may be less than the insurance policy limits when an applicant demonstrates that it has taken reasonable efforts to recover insurance proceeds that it is entitled to on a case-by-case basis.

Standard Insurance Comments

FEMA Policy 206-086-1

PART 2: Other Insurance-Related Provisions. (Sections 312 and 406(d) of the Stafford Act)

A. Duplication of Benefits. FEMA cannot provide assistance for disaster-related losses that duplicate benefits available to an applicant from another source, including insurance.

1. Before FEMA approves assistance for a property, an applicant must provide FEMA with information about any actual or anticipated insurance settlement or recovery it is entitled to for that property.
2. FEMA will reduce assistance to an applicant by the amount of its actual or anticipated insurance proceeds.
3. Applicants must take reasonable efforts to recover insurance proceeds that they are entitled to receive from their insurer(s).
- ...
5. If an applicant has an insurance requirement from a previous event:
 - a. FEMA will reduce assistance by the actual or anticipated insurance proceeds, or the amount of insurance required in the previous disaster, whichever is greater.
 - b. FEMA will only consider insolvent insurers, legal fees, or apportionment of proceeds as described in Section VII, Part 2(A)(3) and (4) when the applicant's anticipated or actual insurance proceeds are higher than the amount of insurance required in the previous disaster.

Jean-Carlo Echevarria, PA Insurance Specialist, CRC Atlantic, Guaynabo, PR

O&M Requirements

There are no Obtain and Maintain Requirements on **FAAST [Distribution Pole and Conductor Repair - Ponce Group 16, 17, 18 & 19] (Distribution)**.

406 Mitigation

There is no additional mitigation information on **FAAST [Distribution Pole and Conductor Repair - Ponce Group 16, 17, 18 & 19] (Distribution)**.

Environmental Historical Preservation

Is this project compliant with EHP laws, regulations, and executive orders?

Yes

EHP Conditions

- Any change to the approved scope of work will require re-evaluation for compliance with NEPA and other Laws and Executive Orders.
- This review does not address all federal, state and local requirements. Acceptance of federal funding requires recipient to comply with all federal, state and local laws. Failure to obtain all appropriate federal, state and local environmental permits and clearances may jeopardize funding.
- If ground disturbing activities occur during construction, applicant will monitor ground disturbance and if any potential archaeological resources are discovered, will immediately cease construction in that area and notify the State and FEMA.
- Executive Order 11988 - Floodplains - The Applicant must obtain any required permits from the Planning Board prior to initiating work and comply with any conditions of the permit. All coordination (emails, letters, documented phone calls) pertaining to these activities and compliance must be provided and maintained in the Applicant's permanent files.
- Endangered Species Act (ESA) - The below conservation measures apply to the following species: [Feeder 5805-01: Puerto Rican parrot, Puerto Rican broad-winged hawk and Puerto Rican sharp-shinned hawk]. [Feeders 4601-02, 5002-01, 5019-01: Puerto Rican nightjar]. 8. During breeding seasons (see below), nest surveys shall be conducted if a project occurs in a species' range. Nest searches must be conducted by qualified personnel with the appropriate DNER permits prior to start of work. If nesting activity is detected, all construction activities or human disturbance must be avoided within a 200-meter buffer to the closest nest. This avoidance strategy must be kept until fledglings successfully leave the nest permanently. Outside the nesting season, if a nest is encountered, work shall not interfere with the species until they have left the site. If nesting activity is detected, all construction activities or human disturbance must be avoided within a 200-meter buffer to the closest nest. This avoidance strategy must be kept until juvenile birds fledge the nest and are permanently gone. Nesting season: Puerto Rican parrot (*Amazona vittata*): February to June; April-September; Puerto Rican broad-winged hawk (*Buteo platypterus*): December-June; Puerto Rican sharp-shinned hawk (*Accipiter striatus venator*): December-June; Puerto Rican nightjar (*Antrostomus noctitherus*): February-August. For all nest sightings, the Applicant must record the time and date of the sighting and the specific location where it was found. Data should also include a photo of the nest and eggs, relocation site GPS coordinates, and the time and date of the relocation. All sightings and incidental lethal take reports should be sent to the USFWS Caribbean Ecological Services Field Office, Marelisa Rivera - Deputy Field Supervisor, 787-851-7297 extension 206, 787-510-5207, marelisa_rivera@fws.gov.
- Endangered Species Act (ESA) - The Applicant must provide documentation at close-out that proves completion of required Conservation Measures.
- Endangered Species Act (ESA) - Reptiles Conditions for the Puerto Rican Boa (*Epicrates inornatus*) are applicable for feeders 4503-01, 4504-02, 4601-02, 5002-01, 5016-02, 5302-02, 5805-01 and 5902-03. 1. Inform all personnel about the potential presence of the PR boa and the VI boa in areas where the proposed work will be conducted. Photographs of the PR

and VI Boa are to be prominently displayed at the site. The recipient must ensure that project personnel is able to correctly identify a PR or VI boa. For information on PR boa, please visit: <https://ecos.fws.gov/ecp/species/6628>. 2. Prior to any construction activity, including removal of vegetation and earth movement, the boundaries of the project area must be delineated, buffer zones, and areas to be excluded and protected, should be clearly marked in the project plan and in the field to avoid further habitat degradation into forested areas. Once areas are clearly marked, and prior to any construction activity, including site preparation, project personnel able to correctly identify a PR or VI boa must survey the areas to be cleared to ensure that no boas are present within the work area. Vehicle and equipment operation must remain on designated access roads/paths and within rights-of way. 3. If a PR boa is found within any of the working or construction areas, activities should stop in the area where the boa was found. Do not capture the boa. If boas need to be moved out of harm's way, project personnel designated by the recipient shall immediately contact the Puerto Rico Department of Natural and Environmental Resources (PRDNER) Rangers for safe capture and relocation of the animal (PRDNER phone #: 787-724-5700, 787-230-5550, 787-771-1124). If immediate relocation is not an option, project-related activities at this area must stop until the boa moves out of harm's way on its own. Activities at other work sites, where no boas have been found after surveying the area, may continue. 4. Measures should be taken to avoid and minimize PR boa casualties by heavy machinery or motor vehicles being used on site. Any heavy machinery left on site (staging) or near potential PR boa habitat (within 50 meters of potential boa habitat), needs to be thoroughly inspected each morning before work starts to ensure that no boas have sheltered within engine compartments or other areas of the equipment. If PR boas are found within vehicles or equipment, do not capture the animal and let it move on its own or call PRDNER Rangers for safe capture and relocation of the boa (PRDNER phone #: 787-724-5700, 787-230-5550, 787-771-1124). If not possible, the animal should be left alone until it leaves the vehicle on its own. 5. PR boas may seek shelter in debris piles. Measures should be taken to avoid and minimize boa casualties associated with sheltering in debris piles as a result of project activities. Debris piles should be placed far away from forested areas. Prior to moving, disposing or shredding, debris piles should be carefully inspected for the presence of boas. If PR boas are, found within debris piles, do not capture the animal and let it move on its own or call PRDNER Rangers for safe capture and relocation of the animal. If debris piles will be left on site, we recommend they be placed in areas that will not be disturbed in the future. 6. For all boa sightings (dead or alive), personnel designated by the recipient must record the time and date of the sighting and the specific location where the boa was found. Data should also include a photo of the animal dead or alive, and site GPS coordinates, and comments on how the animal was detected and its behavior. If the PR boa was accidentally killed as part of the project actions, please include information on what conservation measures had been implemented and what actions will be taken to avoid further killings. All boa sighting reports should be sent to the USFWS Caribbean Ecological Services Field Office, Marelisa Rivera - Deputy Field Supervisor, 787- 851-7297 extension 206, 787-510-5207, marelisa_rivera@fws.gov.

- National Historic Preservation Act (NHPA) - Condition #1 The Subrecipient and/or Subrecipient's contractor shall follow the Low Impact Debris Removal Stipulations (LIDRS) as stated in Appendix E of the Project-Specific Programmatic Agreement Among FEMA, the SHPO, ACHP, COR3, and PREPA (PSPA), executed on August 2, 2022. Condition #2 Unexpected Discoveries: Pursuant to Stipulation III.B of the PSPA, if, in the course of implementing this Individual Undertaking(s), previously unidentified structures, sites, buildings, objects, districts, or archaeological deposits, that may be eligible for listing in the National Register, or human remains are uncovered, or if it appears that an Individual Undertaking has affected or will affect a previously identified historic property in an unanticipated manner, the contractor must notify Subrecipient who will immediately notify the Recipient. Work must stop in the vicinity of the discovery and measures must be taken to protect the discovery and avoid additional harm. Condition # 3 Additional staging areas and/or work pads within work site area haven't been identified yet. The Recipient/Subrecipient and/or private operator must provide the information of any additional staging areas or work pads for EHP evaluation as soon as available specially if any construction activity will be necessary to prepare the site(s). Information for staging areas and/or work pads confined to previously disturbed or hardened surfaces can be provided at close-out.
- Resource Conservation and Recovery Act, aka Solid Waste Disposal Act (RCRA) - 1. The Applicant shall handle, manage, and dispose of all types of hazardous waste in accordance with requirements of local, state, and federal laws, regulations, and ordinances. In addition, the Applicant shall ensure that all debris is separated and disposed of in a manner consistent with the PR DNER guidelines at a permitted site or landfill. The contractor/applicant will be responsible for the proper disposition of construction debris in authorized landfills providing the name, location, coordinates and permits of the facility to the corresponding authorities. 2. The applicant is responsible to ensure damaged transformers are handled, managed and disposed of in accordance with all federal and state laws and requirements. Downed electrical equipment may contain toxic and hazardous materials, such as polychlorinated biphenyls (PCBs), and may spill these materials if a rupture occurs. Applicant is responsible for screening transformers that do or may contain PCBs and the area where any related spill occurred. The applicant is then responsible to handle, manage, dispose of, or recycle damaged equipment and contaminated soil as appropriate. Where possible, temporary measures should be implemented to prevent, treat, or contain further releases or mitigate the migration of PCBs into the environment. If damaged equipment or material storage containers must be stored temporarily, containers should be placed on hardened surface areas, such as a concrete or an asphalt for no more than 90 days. Excavated contaminated material should be disposed of in accordance with federal and state laws and requirements. 3. Unusable equipment, debris, white goods, scrap metal any other material shall be disposed in approved manner and location. In the event significant items are discovered during the implementation or development of the project the Applicant shall handle, manage and dispose petroleum products, hazardous materials and toxic waste in accordance to the requirements of the local and federal agencies. Noncompliance with these requirements may jeopardize receipt of federal funds.

- NEPA Determination - 1. Additional staging areas and/or work pads within work site area haven't been identified yet. The Recipient/Subrecipient and/or private operator must provide the information of any additional staging areas or work pads for EHP evaluation as soon as available specially if any construction activity will be necessary to prepare the site(s). Information for staging areas and/or work pads confined to previously disturbed or hardened surfaces can be provided at close-out. 2. All borrow or fill material must come from pre-existing stockpiles, material reclaimed from maintained roadside ditches (provided the designed width or depth of the ditch is not increased), or commercially procured material from a source existing prior to the event. For any FEMA-funded project requiring the use of a non-commercial source or a commercial source that was not permitted to operate prior to the event (e.g., a new pit, agricultural fields, road ROWs, etc.) in whole or in part, regardless of cost, the Applicant must notify FEMA and the Recipient prior to extracting material. FEMA must review the source for compliance with all applicable federal environmental planning and historic preservation laws and executive orders prior to a Sub-recipient or their contractor beginning borrow extraction. Consultation and regulatory permitting may be required. Non-compliance with this requirement may jeopardize receipt of federal funding. Documentation of borrow sources utilized is required at close-out and must include fill type (private, commercial, etc.), name, fill site GPS coordinates (not of the company/governmental office), address, and type of material

EHP Additional Info

There is no additional environmental historical preservation on **FAASt [Distribution Pole and Conductor Repair - Ponce Group 16, 17, 18 & 19] (Distribution)**.

Final Reviews

Final Review

Reviewed By Amaro, Luis N.

Reviewed On 08/28/2023 11:18 AM PDT

Review Comments

LNA 08/28/23. This project has been reviewed, found eligible and cost reasonable, and it is ready to continue the award process.

Recipient Review

Reviewed By Salgado, Gabriel

Reviewed On 09/01/2023 5:50 AM PDT

Review Comments

Recipient review completed. Project is ready for applicant review.

Fixed Cost Offer

As a Public Assistance (PA) Subrecipient PR Electric Power Authority (000-UA2QU-00), in accordance with Section 428 of the Robert T. Stafford Disaster Relief and Emergency Assistance Act, the Applicant agrees to accept a permanent work subaward based on a Fixed Cost Offer in the amount of \$2,154,006.76 for subaward number 11508 under Disaster # 4339. The Applicant accepts responsibility for all costs above the Fixed Cost Offer.

The Applicant understands that by participating in this pilot program they will be reimbursed for allowable costs in accordance with 2 CFR Part 200, and the reimbursement will not exceed the Fixed Cost Offer. The Applicant also understands that by agreeing to this Fixed Cost Offer, they will not receive additional funding related to the facilities or sites included in the subaward. The Applicant also acknowledges that failure to comply with the requirements of applicable laws and regulations governing assistance provided by FEMA and the PA Alternative Procedures Pilot Program Guidance (such as procurement

and contracting; environmental and historic preservation compliance; and audit and financial accountability) may lead to loss of federal funding.

Project Signatures

Signed By Miller, Thomas

Signed On 09/01/2023

Department of Homeland Security Federal Emergency Management Agency

General Info

Project #	710110	PW #	11534	Project Type	Specialized
Project Category	F - Utilities			Applicant	PR Electric Power Authority (000-UA2QU-00)
Project Title	FAASt [Distribution Pole and Conductor Repair - Bayamon Group 2 - Phase 2] (Distribution)			Event	4339DR-PR (4339DR)
Project Size	Small			Declaration Date	9/20/2017
Activity Completion Date	9/20/2027			Incident Start Date	9/17/2017
Process Step	Obligated			Incident End Date	11/15/2017

Damage Description and Dimensions

The Disaster # 4339DR, which occurred between *09/17/2017* and *11/15/2017*, caused:

Damage #1309848; FAASt [Distribution Pole and Conductor Repair - Bayamon Group 2 - Phase 2]

DDD for this facility codified in the 136271 - MEPA078 Puerto Rico Electrical Power Authority Island Wide FAASt Project.

General Facility Information:

- **Facility Type:** Power generation, transmission, and distribution facilities
- **Facility:** Distribution Pole and Conductor Repair - Bayamon Group 2 - Phase 2
- **Facility Description:** The specific facilities included in this project are: poles and structures (including their foundations), framing and insulators, load break switches (manual and automated), capacitor banks, voltage regulators, transformers (including lightning arresters and fuse cut-outs), conductors, guy wires, anchoring, grounding assemblies, underground cable, underground cable systems, fault interrupting equipment (fuses, reclosers, and sectionalizers), and any other associated components.
- **Approx. Year Built:** 1980
- **GPS Latitude/Longitude:** [REDACTED]

General Damage Information:

- **Date Damaged:** 9/20/2017
- **Cause of Damage:** High winds & wind driven rain, caused by Cat 4 Hurricane Maria

Final Scope

1309848 **FAASt [Distribution Pole and Conductor Repair - Bayamon Group 2 - Phase 2]**

?

INTRODUCTION

The purpose of this document is to submit for approval the detailed Scope of Work ("SOW") to COR3 and FEMA for the Distribution Pole and Conductor Repair – Bayamon Group 2 – Phase 2 Project under DR- 4339 PR Public Assistance. The document provides a description of the project including scope, schedule, and cost estimates as well as Environmental & Historical Preservation ("EHP") requirements and proposed 406 hazard mitigation work. LUMA Energy is seeking approval from COR3 and FEMA for project funding to repair, restore, or replace the eligible facilities.

LUMA submits this detailed SOW pursuant to the Transmission and Distribution Operations & Maintenance Agreement between Puerto Rico Electric Power Authority ("PREPA"), the Puerto Rico Public-Private Partnerships Authority ("P3A") and LUMA Energy, and in accordance with the Consent to Federal Funding Letter issued by PREPA and P3A and provided herein as Appendix F which collectively provides the necessary consent for LUMA Energy, as agent of PREPA, to undertake work in connection with any Federal Funding requests related to the Transmission and Distribution System submitted to FEMA.

FACILITIES

The facilities listed below are part of the feeder systems in the Bayamon Region. These interconnected and inter-functional distribution feeders (sites) are part of the electrical distribution system. All the feeders originate from a substation (start) and serve customers along the route to various locations (end). The coordinates shown below as "GPS End" represent the end of the mainline backbone of each feeder.

Name	Feeder Number	# Of Poles to Replace	GPS Start	GPS End	Phase	Voltage Level (kV)	Constructed Date
CATAÑO, SUB. 1801	1801-03	4	██████████ ██████████	██████████ ██████████	1 Phase	4.16	More than 20 Years

PROJECT SCOPE OF WORK

Below includes a breakdown of pole replacement by feeder for "Proposed 428 Public Assistance Scope of Work" and "Proposed 406 Hazard Mitigation Grant Program Scope of Work", followed by descriptions of each work type specific to the Scope of Work for this group.

Proposed 428 Public Assistance Scope of Work:

Feeder 1801-03 Scope:

Remove	Quantity	Install	Quantity
33ft Concrete Pole(s)	4	45ft S3 Steel Pole	

Detail Descriptions for Planned Field Work:

Pole Replacement

- Remove existing poles, including hardware and install new poles, including hardware, in the same location. If unable to install the replacement in the same location, the pole will be installed within 3 feet.
- All pole installations are to replace existing pole locations; no new locations are included in this scope of work. Refer to *Appendix J- EHP Checklist*, column C (Soil area and depth impact) for the depths of the poles to be installed.
- Remove the existing foundations as specified in *Appendix J- EHP Checklist* column I (Concrete Foundation) and replace them with a new concrete foundation bases as per *Appendix D- Distribution Construction Standards (Concrete Base Standard)*. The maximum auger width used is 42" and the maximum depth drilled is 15ft.
- New guy wire/ anchors are to be installed in compliance with *Appendix D- Distribution Construction Standards* within 3ft from the existing anchor. The maximum distance an anchor will be installed for a 50ft pole is 25ft from the base of the pole, within the right-of-way.
- Brushing will be required in locations to gain access to the pole for replacement. Brushing refers to the removal and clearing of vegetation solely to the extent that it allows crews to conduct work. The brushing of vegetation will be limited to a 15 ft radius surrounding the surface of the pole but not to exceed the width of the right-of-way for the exclusive purpose of gaining access to the pole to conduct repairs. Please see *Appendix J- EHP Checklist* column H (Brushing/Clearing), Refer to *Appendix B- Maps and Pictures* for pictures of the vegetation.
- All work for this program will be performed within the current electrical right-of-way.

- This scope of work will not affect water or sewer utility services.

Material Disposal

- PCBs, oil from the transformer and breakers, sealants, and other chemical wastes typical of a construction site are considered hazardous waste and will be disposed of by the contractor in approved facilities as per applicable local regulations. Refer to *Appendix C - Waste Management Plan*.
- The type of debris that may be found in the process of removal are luminaires, pole arms, photocells, metal scrap, wiring, concrete, steel, and wood poles, etc. The debris will be separated and taken to an approved waste disposal facility in compliance with applicable local regulations. Refer to *Appendix C- Waste Management Plan*.
- Transformers will be contained and returned to LUMA in compliance with applicable local regulations. The removal of the transformer will require testing of the existing oil for PCB levels, drain oil, and delivery to the approved waste disposal site as per Environmental Regulations. Refer to *Appendix C- Waste Management Plan*.

Access Roads

- Poles are in close proximity to the roads and are site accessible. The construction of access roads is not required for this scope of work. Refer to *Appendix J- EHP Checklist* in column G "Site Accessible"

Staging Area

All materials are stored and dispatched from the Bayamon Regional Warehouse. Refer to *Appendix L- Warehouse locations*. No additional or temporary staging areas are required.

Fill, gravel, sand, etc.

- Fill, Gravel, and Sand materials will be obtained from an approved supplier as referenced in *Appendix A- Approved Supplier List*.

List of Equipment to be used:

- Skid Steer, Excavator, Dump trucks, Manlifts, 120-Ton Motor Crane, Boom Trucks 45-ton Crane, Zoom Boom, Air compressor, Truck Digger, Water truck, Pump Truck, Concrete Vibrator, Oil Tanker, Filtering Machine and Flatbed platform.
- Vegetation will be removed utilizing machete, chainsaw, electric pruner, telescopic pole pruner, bucket truck, and/or chipper.

Specific List of Permits Required:

- DTOP Endorsements & Municipality Notifications.
- Excavation and Demolition Notification in Department of Transportation and Public Works Agency - (DTOP).
- LUMA will provide proof of all permits.

PROJECT ESTIMATE

The estimated costs (Class 3 Accuracy +/-30%) to complete the project are captured in the table below. The cost estimate was developed utilizing preliminary Architectural and Engineering design information and may be subject to change. LUMA has allocated 10% of the project cost for the mitigation of potential known risks.

Cost Estimate		428
Cost Element		
PLANNING		\$5
	Permitting and Assessments	\$
	Environmental Documentation & Management	\$
	Engineering Services & Design	\$3
MANAGEMENT		\$9
	Project Management	\$3
	Construction Management	\$3
	Contracting, Procurement & Contract Administration	\$
	Projects Controls (Scheduling, Estimating, Support Cost Control, Risk, Document Control & Reporting)	\$2
	Legal	\$
	Finance & Accounting	\$
Bayamon Group 2 - Phase 2 ID: 14F016550000		\$76
	material, labor and equipment	\$76

CONTINGENCY		\$8,
	Contingency	\$6,
	Escalation	\$2
	Overhead	\$
COST TOTALS		\$100,
FAAST ALLOCATIONS		\$14,7
	FAAST A&E # 335168 TOTAL	

Work To Be Completed (WTBC): \$100,052.86

A&E Deduction (Global A&E FAAS 335168): -\$14,756.12

Project Total Cost: \$85,296.74

Project Notes and Attachments

1. For detailed cost estimate, please refers to document labeled: *710110-DR4339PR-Appendix H - Detail Cost Estimate - Bayamon Group 2 - Phase 2Rev0.xlsx*
2. Refer to detailed SOW provided in document *710110-DR4339PR-Detailed SOW Bayamon Group 2 - phase 2 Rev0.pdf*
3. For reference documents Appendix A thru L, see file labeled:

APPENDIX A - Approved Supplier List

APPENDIX B - Maps and Pictures

APPENDIX C - Waste Management Plan

APPENDIX D - Distribution Construction Standards

APPENDIX E - LUMA Wildlife Avian and Historical Protection Procedure #335

APPENDIX F - Consent to Federal Funding Letter - FEMA/COR3

APPENDIX G - Structure Coordinates

APPENDIX H - Detail Cost Estimate

APPENDIX I - PAPPG

Appendix J - Cost-Effective Hazard Mitigation Measures

APPENDIX J - EHP Checklist

APPENDIX K - EHP Maps

APPENDIX L - Warehouse Locations

4. For EHP Requirements, refer to pages 5 to 6 of the detailed SOW and reference documents: Appendix J & K.
5. Architectural and Engineering (A&E) costs are deducted given previously obligated Global A&E Project for the subject FAAS PREPA work (see project: 335168 - FAAS A&E PREPA).

406 HMP Scope

Project number: [710110] FAAS [Distribution Pole and Conductor Repair - Bayamon Group 2 - Phase 2] (Distribution)

Damage # 1309848; FAAS [Distribution Pole and Conductor Repair - Bayamon Group 2 - Phase 2]

Applicant: PR Electric Power Authority (000-UA2QU-00)

Location: Bayamon, Puerto Rico

GPS Latitude/Longitude: [REDACTED]

Hazard Mitigation Narrative

During the incident period from September 17, 2017, to November 15, 2017, the Commonwealth of Puerto Rico experienced hurricane-force winds, heavy rain, flooding, and power outage "loss of power" from Hurricane Maria. The incident caused damage to the electrical system, such as the power generation plants, transmission and distribution lines, substations, communication systems, buildings, among other damages to the infrastructures owned, operated, and maintained by the Puerto Rico Electric Power Authority (PREPA).

Project #710110 (Distribution Poles & Conductors Repair/Replacement).

The Distribution Pole and Conductor Repair - Bayamon Group 2 consists of 1 interconnected and inter-functional distribution feeders (sites) establish the electrical distribution system as follow: CATAÑO, SUB. 1801 (1801-03).

The Method of Repair (MOR) included the replacement of the damaged critical distribution poles (wood, concrete or galvanized), cross-arms, insulators, and all associated hardware needed for the new structure. According to the information provided by the Applicant, due to the high velocity hurricane winds, wind-blown debris, and prolonged heavy rain, were the main cause of the damages of the facilities.

In order to minimize the damages in a future event, the Applicant is proposing as a mitigation measure, increase the strength of the poles by increasing the wind tolerance to +160mph. Note: The FEMA Accelerated Award Strategy (FAAST) MOR included the PREPA distribution standards and specifications that were based on a 145mph sustained winds. However, the new PREPA Standard 2021 updates the design-criteria to a 160mph sustained winds resistant. The +160mph wind tolerance mitigation measure, will protect and make the affected infrastructure more resistant, stronger, and resilient to similar hazards.

Hazard Mitigation Proposal (HMP) Scope of Work:

In order to prevent or reduce future damages from similar events, the applicant proposed the following mitigation measures:

Mitigation Measures *(Replacement)*

➤ To avoid damage in a future event, the Applicant is proposing as a mitigation measure, increase the strength of the poles by increasing the wind tolerance of all materials to +160mph. The FAASt MOR included the PREPA distribution standards and specifications that were based on a 145mph sustained winds. However, the new PREPA Standard 2021 updates the design-criteria to a 160mph sustained winds resistant. The above mitigation measures will protect and make the affected infrastructure more resistant, stronger, and resilient to similar hazards. Refer to Appendix J: Section VI.D.1 of the PAPPG V3.1.

➤ [Distribution Critical Poles Replacement] 406 Mitigation Scope of Work:

1. Feeder 1801-03 Scope (4ea):

- Replace four (4) 45' Steel Poles S3 by four (4) 45' S5.7 Galvanized Steel Poles.

Note: As indicated by the sub-applicant (LUMA) in the response "FEMA RFI - 45FT S-5.7 Galvanized Steel Pole", the shape factor for wind pressure will be different between concrete and steel poles. The shape factor of the concrete pole is 1.6 when having a square section and the shape factor of the steel pole is 1.0 when having a circular or dodecagonal section (12-sided). For example, the 45ft H4 concrete pole identified as equivalent to the 45ft S5.7 metal pole does not pass the Pole Loading Analysis (PLA) as the shape factor is 1.6 vs 1.0. For this purpose, we will be using circular or dodecagonal (12-sided) poles as a mitigation measure to meet with the new +160 mph factor.

Hazard Mitigation Proposal (HMP) Cost:

Total Net Hazard Mitigation Cost (Base Cost) =	\$ 2,000.00
+ HM (Applicant A&E, Management & General Conditions) =	\$ <u>478.06</u>
Hazard Mitigation Total Cost =	\$ 2,478.06

HMP Cost-Effectiveness Calculations:

FEMA's Benefit-Cost Analysis (BCA), methodology evaluates expected risk reduction benefits of a hazard mitigation project and compares those benefits to the cost of the mitigation project. FEMA Public Assistance Program and Policy Guide (PAPPG) Chapter 2. Section VII. C. defines cost effective mitigation as: The Hazard Mitigation Measure is cost effective through an acceptable Benefit Cost Analysis (BCA) with a resulting Benefit Cost Ratio equal to or greater than (1).

The Island Wide Benefit Cost Analysis (IWBCA) created for the PREPA infrastructure defines a maximum potential benefit using the incurred costs of the PREPA FEMA Accelerated Award Strategy (FAAST) fixed cost estimate, the mission assignments utilized for the reconnection effort, and the costs associated with loss of service. This maximum benefit has been developed to fund all mitigation projects from both Public Assistance Hazard Mitigation and the Hazard Mitigation Grant program.

It is the applicant's responsibility to maintain a record of approved IWBCA related projects to avoid running out of funds for their Mitigation portion projects.". Please see attached IWBCA Package

The cost of the Hazard Mitigation Proposal (HMP) described herein is \$2,478.06 (Hazard Mitigation Total Cost). The cost of this HMP combined with all other proposals (both PA and HMGP) does not exceed the maximum potential benefit and is therefore deemed cost effective per FEMA Public Assistance Program and Policy Guide (PAPPG) V3.1 April 2018, Chapter 2, VII., Section C, BCA Rule. This Hazard Mitigation Proposal meets eligible repair and restoration cost-effective requirements.

**See Mitigation Profile Documents Tab in Grants Manager for complete version of this HMP and supporting documents (HMP, HMP cost estimate, Supporting documents file).

Cost

Code	Quantity	Unit	Total Cost	Section
3510 (v0 Engineering and Design Services - PREPA FAASSt A&E 335168)	1.00	Lump Sum	(\$14,756.12)	Uncompleted
9001 (v0 Contract - PREPA FAASSt Project 136271)	1.00	Lump Sum	\$100,052.86	Uncompleted

CRC Gross Cost	\$85,296.74
Total 406 HMP Cost	\$2,478.06
Total Insurance Reductions	\$0.00
<hr/>	
CRC Net Cost	\$87,774.80
Federal Share (90.00%)	\$78,997.32
Non-Federal Share (10.00%)	\$8,777.48

Award Information

Version Information

Version #	Eligibility Status	Current Location	Bundle Number	Project Amount	Cost Share	Federal Share Obligated	Date Obligated
0	Eligible	Awarded	PA-02-PR-4339-PW-11534(14333)	\$87,774.80	90 %	\$78,997.32	10/20/2023

Drawdown History

EMMIE Drawdown Status As of Date	IFMIS Obligation #	Expenditure Number	Expended Date	Expended Amount
No Records				

Obligation History

Version #	Date Obligated	Obligated Cost	Cost Share	IFMIS Status	IFMIS Obligation #
-----------	----------------	----------------	------------	--------------	--------------------

Subgrant Conditions

- As described in Title 2 Code of Federal Regulations (C.F.R.) § 200.333, financial records, supporting documents, statistical records and all other non-Federal entity records pertinent to a Federal award must be retained for a period of three (3) years from the date of submission of the final expenditure report or, for Federal awards that are renewed quarterly or annually, from the date of the submission of the quarterly or annual financial report, respectively, as reported to the Federal awarding agency or pass-through entity in the case of a subrecipient. Federal awarding agencies and pass-through entities must not impose any other record retention requirements upon non-Federal entities. Exceptions are stated in 2 C.F.R. §200.333(a) – (f)(1) and (2). All records relative to this project are subject to examination and audit by the State, FEMA and the Comptroller General of the United States and must reflect work related to disaster-specific costs.
- In the seeking of proposals and letting of contracts for eligible work, the Applicant/Subrecipient must comply with its Local, State (provided that the procurements conform to applicable Federal law) and Federal procurement laws, regulations, and procedures as required by FEMA Policy 2 CFR Part 200, Procurement Standards, §§ 317-326.
- The Recipient must submit its certification of the subrecipient's completion of all of its small projects and compliance with all environmental and historic preservation requirements within 180 days of the applicant's completion of its last small project, or the latest approved deadline, whichever is sooner.
- When any individual item of equipment purchased with PA funding is no longer needed, or a residual inventory of unused supplies exceeding \$5,000 remains, the subrecipient must follow the disposition requirements in Title 2 Code of Federal Regulations (C.F.R.) § 200.313-314.
- The terms of the FEMA-State Agreement are incorporated by reference into this project under the Public Assistance award and the applicant must comply with all applicable laws, regulations, policy, and guidance. This includes, among others, the Robert T. Stafford Disaster Relief and Emergency Assistance Act; Title 44 of the Code of Federal Regulations; FEMA Policy No. 104-009-2, Public Assistance Program and Policy Guide; and other applicable FEMA policy and guidance.
- The DHS Standard Terms and Conditions in effect as of the declaration date of this emergency declarations or major disaster, as applicable, are incorporated by reference into this project under the Public Assistance grant, which flow down from the Recipient to subrecipients unless a particular term or condition indicates otherwise.
- The Uniform Administrative Requirements, Cost Principles, and Audit Requirements set forth at Title 2 Code of Federal Regulations (C.F.R.) Part 200 apply to this project award under the Public Assistance grant, which flow down from the Recipient to all subrecipients unless a particular section of 2 C.F.R. Part 200, the FEMA-State Agreement, or the terms and conditions of this project award indicate otherwise. See 2 C.F.R. §§ 200.101 and 110.
- The subrecipient must submit a written request through the Recipient to FEMA before it makes a change to the approved scope of work in this project. If the subrecipient commences work associated with a change before FEMA approves the change, it will jeopardize financial assistance for this project. See FEMA Policy No. 104-009-2, Public Assistance Program and Policy Guide.
- The Subrecipient provided the estimate for this PW. FEMA validated the estimate and found it to be reasonable for the work to be performed.
- Pursuant to section 312 of the Stafford Act, 42 U.S.C. 5155, FEMA is prohibited from providing financial assistance to any entity that receives assistance from another program, insurance, or any other source for the same work. The subrecipient agrees to repay all duplicated assistance to FEMA if they receive assistance for the same work from another Federal agency, insurance, or any other source. If an subrecipient receives funding from another federal program for the same purpose, it must notify FEMA through the Recipient and return any duplicated funding.

Insurance

Additional Information

8/28/2023

GENERAL INFORMATION

Event: DR4339-PR

Project: SP 710110

Category of Work: Cat F - Utilities

Applicant: PR Electric Power Authority

Event Type: Hurricane / Hurricane Maria

Cause of Loss: Wind / Wind Driven Rain

Incident Period: 9/17/2017 to 11/15/2017

Total Public Assistance Amount: \$87,774.80 (CRC Gross Cost \$85,296.74 + Mitigation Amount \$2,478.06)

COMMERCIAL INSURANCE INFORMATION

Does the applicant have a Commercial Policy that extends coverage for this facility: Yes

Policies Issued by: Willis Towers Watson, Multinational Insurance Company and Mapfre

Policy Numbers: Willis Towers Watson (B0804Q1966F17, B0804Q14312F17, B0804Q19673F17, B0804Q19672F17, B0804Q18529F17, B0804Q14312F17, B0804Q19674F17, B0804Q18411F17, B0804Q14310F17, B0804Q11038F17, B0804Q14507F17, B0804Q14312F17)

Mapfre Praico Insurance Company (1398178000644)

Multinational Insurance Company (88-CP-000307831-2, 88-CP-000318673-0, 88-CP000318674-0, 88-CP-000318675-0, 88-CP-000318676-0, 88-CP-000318677-0)

Policy Period: From: 5/15/2017 To: 5/15/2018

Policy Limits: \$300,000,000.00

RCV or ACV: Replacement Cost Value

Deductible Amount \$25,000,000.00 each and every occurrence property damage and 30 days each and every occurrence business interruption in respect of Named Windstorm.

Does the Applicant's Commercial Policy extend coverage for the damage described in this project: No

NUMBER OF DAMAGED LOCATIONS INCLUDED IN THIS PROJECT: (1)

Damaged Inventory (DI) #1309848:

FAASt [Distribution Pole and Conductor Repair - Bayamon Group 2 - Phase 2]

Location: Distribution Pole and Conductor Repair - Bayamon Group 2 - Phase 2

GPS Coordinates: [REDACTED]

Cause of Loss: Wind / Wind Driven Rain

Damage Inventory Amount: \$87,774.80 (CRC Gross Cost \$85,296.74 + Mitigation Amount \$2,478.06)

-

Prior Obtain and Maintain Requirement:

No prior insurance requirements were found for this facility.

-

Reduction(s):

No insurance reduction will be applied to this project as coverage is not anticipated. An anticipated insurance reduction of \$193,746,436.00 was applied

to FAAST project # 136271 for anticipated insurance proceeds for Hurricane Maria losses. For ease of reference, please see table of insurance allocations: "PREPA Allocation Plan – All Disasters" file.

Obtain and Maintain Requirement:

No Obtain & Maintain Requirement is being mandated for FAAsT [Distribution Pole and Conductor Repair - Bayamon Group 2 - Phase 2] because the facility does not meet the definition of building, equipment, contents, or vehicle.

Insurance Proceeds Statement:

FEMA acknowledges that the Applicant is in negotiations with their insurance carrier at the time of the FEMA insurance review and might have received partial settlements. In accordance with 44 CFR §206.250-253, in the absence of an actual settlement, anticipated insurance recoveries will be deducted from this project based on Applicant's insurance policy limits. FEMA subsequently adjusts the eligible costs based on the actual amount of insurance proceeds the Applicant receives after a final settlement.

FEMA's Recovery Policy FP 206-086-1, Public Assistance Policy on Insurance (June 29, 2015), requires applicants to take reasonable efforts to recover insurance proceeds that it is entitled to receive from its insurers. FEMA will consider final insurance settlements that may be less than the insurance policy limits when an applicant demonstrates that it has taken reasonable efforts to recover insurance proceeds that it is entitled to on a case-by-case basis.

Standard Insurance Comments

FEMA Policy 206-086-1

PART 2: Other Insurance-Related Provisions. (Sections 312 and 406(d) of the Stafford Act)

A. Duplication of Benefits. FEMA cannot provide assistance for disaster-related losses that duplicate benefits available to an applicant from another source, including insurance.

1. Before FEMA approves assistance for a property, an applicant must provide FEMA with information about any actual or anticipated insurance settlement or recovery it is entitled to for that property.
2. FEMA will reduce assistance to an applicant by the amount of its actual or anticipated insurance proceeds.
3. Applicants must take reasonable efforts to recover insurance proceeds that they are entitled to receive from their insurer(s).
- ...
5. If an applicant has an insurance requirement from a previous event:
 - a. FEMA will reduce assistance by the actual or anticipated insurance proceeds, or the amount of insurance required in the previous disaster, whichever is greater.
 - b. FEMA will only consider insolvent insurers, legal fees, or apportionment of proceeds as described in Section VII, Part 2(A)(3) and (4) when the applicant's anticipated or actual insurance proceeds are higher than the amount of insurance required in the previous disaster.

Jean-Carlo Echevarria, PA Insurance Specialist, CRC Atlantic, Guaynabo, PR

O&M Requirements

There are no Obtain and Maintain Requirements on **FAAsT [Distribution Pole and Conductor Repair - Bayamon Group 2 - Phase 2] (Distribution)**.

406 Mitigation

There is no additional mitigation information on **FAAsT [Distribution Pole and Conductor Repair - Bayamon Group 2 - Phase 2]**

Environmental Historical Preservation

Is this project compliant with EHP laws, regulations, and executive orders?

Yes

EHP Conditions

- Any change to the approved scope of work will require re-evaluation for compliance with NEPA and other Laws and Executive Orders.
- This review does not address all federal, state and local requirements. Acceptance of federal funding requires recipient to comply with all federal, state and local laws. Failure to obtain all appropriate federal, state and local environmental permits and clearances may jeopardize funding.
- If ground disturbing activities occur during construction, applicant will monitor ground disturbance and if any potential archaeological resources are discovered, will immediately cease construction in that area and notify the State and FEMA.
- Executive Order 11988 - Floodplains - Applicant must obtain any required permits from the Puerto Rico Permits Management Office (OGPe) prior to initiating work and comply with any conditions of the permit established by the Planning Board (JP) for constructions in floodplains. All coordination (emails, letters, documented phone calls) pertaining to these activities and compliance must be provided and maintained in the Applicant's permanent files.
- National Historic Preservation Act (NHPA) - Condition #1 The Subrecipient and/or Subrecipient's contractor shall follow the Low Impact Debris Removal Stipulations (LIDRS) as stated in Appendix E of the Project-Specific Programmatic Agreement Among FEMA, the SHPO, ACHP, COR3, and PREPA (PSPA), executed on August 2, 2022. Condition #2 Unexpected Discoveries: Pursuant to Stipulation III.B of the PSPA, if, in the course of implementing this Individual Undertaking(s), previously unidentified structures, sites, buildings, objects, districts, or archaeological deposits, that may be eligible for listing in the National Register, or human remains are uncovered, or if it appears that an Individual Undertaking has affected or will affect a previously identified historic property in an unanticipated manner, the contractor must notify Subrecipient who will immediately notify the Recipient. Work must stop in the vicinity of the discovery and measures must be taken to protect the discovery and avoid additional harm. Condition #3 Additional staging areas and/or work pads within work site area haven't been identified yet. The Recipient/Subrecipient and/or private operator must provide the information of any additional staging areas or work pads for EHP evaluation as soon as available specially if any construction activity will be necessary to prepare the site(s). Information for staging areas and/or work pads confined to previously disturbed or hardened surfaces can be provided at close-out.
- Resource Conservation and Recovery Act, aka Solid Waste Disposal Act (RCRA)- 1. The Applicant shall handle, manage, and dispose of all types of hazardous waste in accordance with requirements of local, state, and federal laws, regulations, and ordinances. In addition, the Applicant shall ensure that all debris is separated and disposed of in a manner consistent with the PR DNER guidelines at a permitted site or landfill. The contractor/applicant will be responsible for the proper disposition of construction debris in authorized landfills providing the name, location, coordinates and permits of the facility to the corresponding authorities. 2. Unusable equipment, debris, white goods, scrap metal any other material shall be disposed in approved manner and location. In the event significant items are discovered during the implementation or development of the project the Applicant shall handle, manage, and dispose petroleum products, hazardous materials, and toxic waste in accordance with the requirements of the local and federal agencies. Noncompliance with these requirements may jeopardize receipt of federal funds. 3. The applicant is responsible to ensure damaged transformers are handled, managed, and disposed of in accordance with all federal and state laws and requirements. Downed electrical equipment may contain toxic and hazardous materials, such as polychlorinated biphenyls (PCBs), and may spill these materials if a rupture occurs. Applicant is responsible for screening transformers that do or may contain PCBs and the area where any related spill occurred. The applicant is then responsible to handle, manage, dispose of, or recycle damaged equipment and contaminated soil as appropriate. Where possible, temporary measures should be implemented to prevent, treat, or contain further releases or mitigate the migration of PCBs into the environment. If damaged equipment or material storage containers must be stored temporarily, containers should be placed on hardened surface areas, such as a concrete or an asphalt for no more than 90 days. Excavated contaminated material should be disposed of in accordance with federal and state laws and requirements.
- NEPA Determination - 1. Additional staging areas and/or work pads within work site area haven't been identified yet. The Recipient/Subrecipient and/or private operator must provide the information of any additional staging areas or work pads for EHP evaluation as soon as available specially if any construction activity will be necessary to prepare the site(s). Information for staging areas and/or work pads confined to hardened surfaces can be provided at close-out". 2. All borrow or fill material must come from pre-existing stockpiles, material reclaimed from maintained roadside ditches (provided the designed width or depth of the ditch is not increased), or commercially procured material from a source existing prior to the event. For any FEMA-funded project requiring the use of a non-commercial source or a commercial source that was not permitted to operate prior to the event (e.g. a new pit, agricultural fields, road ROWs, etc.) in whole or in part, regardless of cost, the Applicant must notify FEMA and the Recipient prior to extracting material. FEMA must review the source for compliance with all applicable federal environmental planning and historic preservation laws and executive orders prior to a subrecipient or their contractor commencing borrow extraction. Consultation and regulatory permitting may be required. Non-compliance with this requirement may jeopardize receipt of federal funding. Documentation of borrow sources utilized is required at closeout.
- EO11988 - Wetlands - The Applicant shall ensure best management practices are implemented to prevent erosion and sedimentation

to surrounding, nearby or adjacent wetlands. To ensure that wetlands are not adversely impacted, per the Clean Water Act and Executive Order 11990, equipment storage and staging of construction materials and machinery must be in a location that would prevent erosion and sedimentation.

EHP Additional Info

There is no additional environmental historical preservation on **FAASt [Distribution Pole and Conductor Repair - Bayamon Group 2 - Phase 2] (Distribution)**.

Final Reviews

Final Review

Reviewed By Amaro, Luis N.

Reviewed On 09/14/2023 10:09 AM PDT

Review Comments

LNA 09/14/23. This project has been reviewed, found eligible and cost reasonable, and it is ready to continue the award process.

Recipient Review

Reviewed By Salgado, Gabriel

Reviewed On 09/18/2023 8:27 PM PDT

Review Comments

Recipient review completed. Project is ready for applicant review.

Project Signatures

Signed By Miller, Thomas

Signed On 09/19/2023