Attachment C

Demonstration and Development Program Description

Pacific Power Transportation Electrification Demonstration and Development Pilot Program

Pacific Power proposes a pilot competitive grant funding process to enable creative, customerdriven electric transportation projects in its Washington service area. These grants will help nonresidential customers overcome upfront cost barriers associated with electric vehicle supply equipment (EVSE) projects and inspire more customers to develop innovative transportation electrification projects. Grant recipients will be required to share project cost information and EVSE utilization data, which will help Pacific Power better understand transportation electrification projects in different market segments and potential impacts to the electrical system to inform future planning.

Pacific Power has proposed comparable programs for its customers in both Oregon and California, which should allow for efficiencies in program delivery and economies of scale in implementation. While the Company will leverage economies of scale across the three states, programs differ by state to reflect customer needs and regulatory priorities.

PROGRAM OBJECTIVES

The Demonstration and Development Program will test the ability of grant funding for customerowned EVSE to overcome barriers to transportation electrification project development, particularly those related to upfront project cost. This program is designed with flexibility to remain inclusive across Pacific Power's Washington service area and keep pace with the rapidly changing electric transportation market. The program is designed to solicit applications from a diverse set of non-residential customers (e.g. local government agencies, non-profits, transit authorities, commercial businesses, schools) to better understand different use cases for EVSE infrastructure and is not limited to on-road transportation.

Additionally, the program will provide the company with a wide range of data, including information about customer and community barriers to project implementation, the types of solutions identified by customers to best meet their needs, the amount of funding required to make more projects possible, the timelines and milestones associated with various types of electric transportation projects, EVSE usage patterns in different market segments, the ability of these projects to serve low-income customers, and best practices to inform future program development.

The high upfront cost of EVSE projects can be a significant barrier to electric transportation adoption, particularly when low levels of plug-in electric vehicle (PEV) adoption in a given area make the project unlikely to generate a significant revenue stream. This program seeks to directly address this barrier by providing funding to offset part or all of the upfront cost of EVSE installation. In some cases, the availability of an additional funding stream may enable a project that would not have otherwise occurred. In other instances, it may enable a more robust project that further accelerates transportation electrification (e.g., more charging ports, additional vehicles, more advanced hardware or software).¹ To maximize the program's ability to improve access to EVSE, application evaluation criteria will consider whether projects increase access to public

¹ Applicants for grant funding will be expected to identify the impact of grant funding on the scope of the project.

EVSE by filling gaps and supporting underserved populations, such as low-income and multi-family housing.

Enabling additional EVSE projects through Demonstration and Development Pilot funding is expected to create further education and awareness-building opportunities, the objectives of which are described in detail in the Company's proposed Outreach and Education Pilot program. Applicants will be evaluated based on site and organizational visibility and required to explain how they will use the project to promote awareness of electric transportation, such as installing signage, hosting workshops, developing fact sheets and promoting the project in newsletters or other publications.

PROGRAM ELEMENTS

Pacific Power plans to solicit applications on a quarterly basis throughout the pilot period. Pacific Power grants will be available for upfront EVSE costs associated with a project. Applicants will own the projects and may request up to 100 percent of eligible expenses; however, applicants will be encouraged to explore additional funding opportunities to minimize the costs to the program. Financial support will be issued as a reimbursement upon completion of the project.

Project Design

Flexibility to adapt to this rapidly evolving market is a key component of the Company's transportation electrification strategy. To this end, the Demonstration and Development Pilot will make funding available for projects that meet certain criteria, without being overly prescriptive on the specifics of projects. The Company envisions a wide range of private, public, and non-profit applicants, proposing a mix of projects that may include fleet electrification, public charging, workplace charging, multi-family charging, Level 2 charging stations, and DC fast charging stations. While the Company does not currently know the breadth of projects that may receive funding, the following is an example of one type of project the program is designed to enable.

Hacienda CDC Oregon Low Income Car Sharing Pilot

In 2016, Pacific Power joined Hacienda Community Development Corporation (Hacienda CDC), ² the City of Portland, and Forth (formerly Drive Oregon) in a pilot project designed to test a model for low-income electric vehicle sharing. Through the pilot, low-income community members in an area underserved by existing public transit in Oregon have access to three PEVs through a vehicle-sharing platform. Hacienda CDC hosts the vehicles at their North Portland headquarters and has access to use the electric fleet for its operations. Pacific Power provided \$10,000 toward the cost of procuring and installing Level 2 charging stations to serve the vehicles. Other pilot project partners procured the vehicles and are responsible for implementing and managing the project. The project launched on March 24, 2017.

The pilot is testing electric vehicle-sharing's ability to address several barriers of transportation electrification in underserved communities. First, it is increasing

² Hacienda Community Development Corporation (CDC) provides well-rounded and culturally specific programming to carve out a path towards self-reliance for low-income families. Their programs serve the Latino community and others through affordable housing, after school programs, financial education, parenting support, small business development and homeownership support. More information about Hacienda CDC is available at http://www.haciendacdc.org/.

exposure to electric transportation technology and dispelling misconceptions about the affordability or the complexity of operating and charging electric vehicles. Second, it provides access to the benefits of electric transportation without the barrier presented by upfront vehicle purchase costs. In addition, the pilot will measure Hacienda CDC's potential cost savings from operating electric fleet vehicles.³

The project at Hacienda CDC is a prime example of the type of project envisioned for grant funding under the proposed program, as it tests new and innovative solutions to addressing market barriers, supports an underserved community, includes other community partners, leverages additional funding sources, and provides data and learnings that can be applied in Pacific Power's future planning efforts. The Demonstration and Development Program will provide a formalized process to identify and financially support EVSE projects that meet these criteria. In addition, the proposed funding model allows communities to identify their own barriers and solutions, which is a priority for Pacific Power in supporting underserved communities.

Application Evaluation and Selection

Following successful practices of Pacific Power's Blue Sky funding awards, the Company will engage an independent, third-party grant manager, selected through a competitive request for proposals process, to review and score projects based on established criteria outlined in Table 1.⁴ Pacific Power will work closely with the grant manager to ensure that applicant evaluation tools and practices align with program objectives.

To align with the Washington Utilities and Transportation Commission's (Commission's) Policy Statement,⁵ 25 percent of funds made available in each quarter will be reserved for projects with a focus on providing service to low-income customers. If such projects do not materialize in a given quarter, reserved funds will be re-allocated to the standard funding pool in that quarter. If funds remain unallocated through either pool in a given quarter, they will roll over to the funding pool for the next quarter and 25 percent of the total available funding for that quarter will be set aside for projects with a focus on service to low-income customers.

³ A case study on this project is available at:

 $https://forthmobility.org/storage/app/media/Documents/2018.07_cev_casestudy_FINAL.pdf$

⁴ Since 2006, the Blue Sky funding process has helped bring nearly 100 community-driven renewable energy projects online in over thirty Pacific Power communities, on behalf of participating Blue Sky program customers. A description of each project is available at <u>www.pacificpower.net/blueskyprojects</u>.

⁵ Policy and Interpretive Statement Concerning Commission Regulation of Electric Vehicle Charring Services, Docket UE-160799 (Jun 2017).

Criteria	Measures
Project Feasibility/ Utilization	 Readiness of the project team and reasonableness of the project plan and timeline. Feasibility study results, including compliance with national, state and local safety and accessibility requirements.⁶ Expectation that the EVSE will be sufficiently used, based on an assessment of applicant-provided utilization projections (e.g. community needs assessment data, electric vehicle ownership data, survey data, fleet electrification plans). Project life (as reported by the applicant) and robustness of the ongoing operations and maintenance plan. Plan to address interoperability with driver technologies. Expected driver payment pricing model, if applicable.
Use of Funds	 Customer and Company financial commitment and leveraging of funds from other sources. Alignment of project costs with industry standards. Reasonableness of the proposed budget (i.e., risk of exceeding budget). How the project is designed to avoid risk of stranded investments. Applicant and project need for funding support.
Innovation	 Incorporation of emerging technologies, such as renewable generation, energy storage or direct load control. Creative project design, partnerships and utilization of resources, particularly in serving underserved populations.
Data Availability	 Type(s) of data available through the project. Plan to collect and analyze data. Mechanism(s) to share data with Pacific Power. Ability to incorporate potential future electric grid services (e.g., demand response, vehicle-to-grid integration).
Community Benefits	 Physical and community visibility. Accessibility to the public. Education plan and awareness building opportunities. Benefits provided to underserved populations.* Exposure in communities currently underserved by EVSE, such as multi-family, low-income and remote areas of the state.^{7*} Proximity to areas with known air quality issues. Alignment with the applicant's broader environmental mission or goals. Impact of the applicant on the community. Use of local labor and/or materials. * Applicants for dedicated low-income project funds will be required to demonstrate service to low-income communities. All applicants will be evaluated based on service to underserved communities.

⁶ Customers may request a feasibility study under the proposed Outreach and Education Program or perform a

⁷ While PacifiCorp has identified examples of underserved populations, there are likely additional segments that will be identified through the Company's proposed transportation electrification pilots. Applicants will be expected to explain how proposed projects serve an underserved population, if applicable.

Eligible Expenses

Demonstration and Development grants are designed to offset the upfront cost of EVSE development and awareness-building. Given the limited implementation timeframe of the proposed program, funding is limited to upfront costs to avoid ongoing funding commitments beyond the period of the program. With the exception of projects directly benefitting low-income populations, funding is limited to expenses related to the EVSE, reflecting that vehicles may travel in and out of Pacific Power's service area, but that EVSE is stationary.

Eligible expenses include capital expenses directly associated with the installation of EVSE, such as hardware and installation costs, make-ready costs and upfront software license costs. **Ineligible** expenses include vehicle purchase or lease, ongoing operations and maintenance costs, energy costs, ongoing network subscription or other software costs and site and infrastructure improvements that would occur without the installation of EVSE (e.g., landscaping, information technology network enhancements). Costs associated with outreach and education (e.g., signage, educational workshops) may be considered for funding. Pacific Power will engage the grant manager to identify an appropriate cap for outreach and education expense funding. Eligible expenses will be detailed in funding solicitations and applications will be reviewed for compliance with these guidelines.

For organizations serving low-income customers, availability of staff and resources to manage the completion of these projects may be a barrier to participation. To address this, projects directly benefiting low-income populations will be eligible to receive funding for project management costs associated with bringing the project online. Applicants requesting this type of funding will be required to explain their need and include estimated costs in their funding request.

Applicants may request up to 100 percent of eligible expenses, but are encouraged to explore additional funding opportunities to maximize the value of Pacific Power's investment. Evaluation metrics will favor applicants providing a funding match and leveraging multiple partners and funding sources. Participants will be responsible for all project costs not explicitly included in the project funding agreement. Grant recipients will receive the full amount of the grant upon completion of the Project. Grantees will not receive reimbursement for incomplete projects.

The program will help Pacific Power understand costs for varying types of non-residential transportation electrification projects to assess whether future programs, if offered, should be expanded to fund additional components beyond upfront EVSE costs.

PROGRAM COSTS

Proposed costs to deploy this pilot program in Washington are \$1,100,000, as shown in Table 2. Pacific Power anticipates that over 80 percent of program funds will go directly to customers through funding awards, with other program funds dedicated to program administration and application and program evaluation. The grant funding budget has been sized to assure customers that funding will be available when requested during the pilot period, subject to application screening and competition. Actual funding levels will be driven by customer demand, project viability, and requested financial commitment from Pacific Power.

Application and program evaluation costs are informed by the Company's experience engaging consultants to perform these services for its Blue Sky and energy efficiency programs,

respectively. Actual costs for these services will be determined through consultant selection and contracting and will vary based on participation levels.

Cost Category	2018	2019	2020	2021	Total
Grant Funding		\$400,000	\$500,000		\$900,000
Program Administration and Evaluation ⁹	\$10,000	\$70,000	\$70,000	\$50,000	\$200,000
Total	\$10,000	\$470,000	\$570,000	\$50,000	\$1,100,000

Table 2. Estimated Program Costs⁸

IMPLEMENTATION TIMELINE

Milestones

Major program milestones are presented in Table 3 below. As shown, Pacific Power envisions a ramp-up period to engage customers and develop resources, followed by eight quarterly project funding cycles. Once grants are awarded, recipients will generally have one year to complete project installation. Exceptions to the one-year requirement may be granted if applicants can demonstrate a need for additional time based on the project proposed. The implementation schedule is indicative of quarterly milestones and subject to change as required by this program application approval timeline and additional factors, such as solicitation results.

The proposed program represents the first phase of Pacific Power's customer EVSE development efforts. During the implementation period, the Company will track the utilization and effectiveness of the proposed EVSE development tactic and the extent to which it increased access to EVSE that otherwise would not have been constructed. Pacific Power will submit annual reports to the Commission on program progress and results.

Major performance	2018	2019			2020			2021					
milestones	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4
Ramp-up period													
Grant manager selection													
and contracting													
Develop application and													
evaluation materials													
Implementation													
Application and selection													
Project completion and													
reimbursement													
Evaluation and reporting													
Data collection and													
program evaluation													
Annual report on program													
activities and evaluation													
results													

 Table 3. Demonstration and Development Program Implementation Schedule

⁸ Because grants will be paid after projects are complete, the years in this table represent the

⁹ Includes application evaluation, program evaluation, and program administration.

Quarterly cycle

As indicated above, the Company will make grant funding available through eight quarterly cycles. Pacific Power anticipates issuing the first funding solicitation by the first quarter of 2019,¹⁰ allowing time for approval of the proposed pilot program, grant manager selection, program material development, and initial outreach. An overview of the anticipated funding cycle is provided in Table 4.

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Ongoing Solicitation	 Host application materials and additional applicant resources online. Encourage interested parties to join the funding cycle notification list. Build awareness through industry groups, Pacific Power's Regional Business Manager (RBM) and Pacific Power's communication channels (e.g. media outreach, website, brochures, and newsletters).
Month 1: Application	Send notice of upcoming application deadline for funding cycle to notification list.Intensify outreach across communications channels.
Submission	• Close application period.
Month 2: Application Evaluation	 Pacific Power advances eligible applications to the independent evaluator. Independent evaluator interviews, scores, and ranks the applicants.
Month 3: Selection and Notification	 Review independent evaluation results and make final funding determinations. Notify applicants and execute funding agreements.

DATA COLLECTION AND REPORTING

Data Collection

This program is intended to collect EVSE project development and utilization data required to develop specific metrics, projections and best practices for future goal-setting and program development. At this stage, data collection will focus on developing a better understanding of:

- Utilization patterns for EVSE and if there are discernable factors that lead to differences in utilization levels between projects (e.g., location, market segment, project design)
- The demand for electric transportation project funding in Pacific Power's Washington service area and the extent to which Pacific Power funding is required to make an EVSE project possible.
- The solutions to overcome barriers to PEV adoption that Pacific Power customers identify
- Barriers to development of electric transportation projects that provide services to low-income customers and means of addressing these barriers.

The Company will engage a third-party evaluator to assess the effectiveness of the program at addressing identified market barriers to transportation electrification and to provide recommendations for future program continuation or expansion. Funding recipients will be required to participate in surveys and questionnaires and provide data on equipment utilization and

¹⁰ This schedule is subject to change as required by the program approval timeline and additional factors, such as third-party application evaluator solicitation results.

reliability to support program evaluation efforts. Funding recipients will additionally report on the reach of education and visibility measures such as workshop attendance, email or web content views, social media reach and traffic to areas in which EVSE, vehicles or signage as identified and reported by applicants.

Reporting

Pacific Power will update the Commission annually on program activities, including an overview of projects selected for funding. At the end of the pilot period, Pacific Power will submit a final report to the Commission, summarizing all projects funded, program evaluation results, and a recommendation for whether to extend the program. Program evaluation efforts will assess the accessibility of this program structure to Pacific Power's customers, EVSE usage patterns for different types of projects, the sustainability of these projects over the life of the equipment, and whether a more prescriptive offering for customers should be considered. Pacific Power expects to file this report by the end of 2021.

COST RECOVERY

Pacific Power will submit a petition for deferred accounting treatment of the costs associated with its electric vehicle supply equipment (EVSE) programs. The actual costs associated with the programs will be tracked for ratemaking treatment in a future filing.