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September 28, 2020

E-PORTAL/

Mr. Adam Teitzman
Commission Clerk
Florida Public Service Commission
2540 Shumard Oak Boulevard
Tallahassee, FL 32399-0850

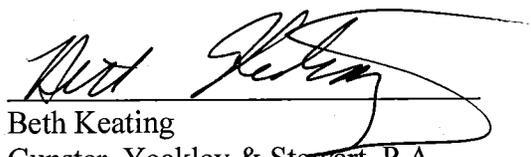
Re: Docket No. 20200060-EG - Petition for approval of demand-side management plan, by Florida Public Utilities Company.

Dear Ms. Stauffer:

Attached for filing, in accordance with Orders Nos. PSC-2020-0274-PAA-EG, Florida Public Utilities Company hereby submits its 2020 Demand-Side Management Plan ("DSM") Program Standards. The Company respectfully requests that the program standards be administratively approved by Commission Staff.

As always, please don't hesitate to let me know if you have any questions whatsoever.

Sincerely,



Beth Keating
Gunster, Yoakley & Stewart, P.A.
215 South Monroe St., Suite 601
Tallahassee, FL 32301
(850) 521-1706

Florida Public Utilities Company 2020
Demand-Side Management Plan
Program Standards

Residential Energy Survey

Program Description

The Residential Energy Survey program is provided in-home or on-line at no cost to the customer and provides participating customers with information they need to determine which energy saving measures are best suited to their individual needs and requirements.

During the in-home survey, FPUC will provide the customer with multiple LED bulbs if determined to be appropriate by the FPUC auditor. While the intent of the LEDs is to provide energy and demand savings, the main purpose of the kit is to empower customers to actively practice and replicate energy conservation behavioral habits.

The FPUC auditor will inspect accessible duct work and use forward looking infrared detectors. If leaks are obvious, the FPUC auditor will recommend repair. If a duct-blast test is needed to identify and quantify duct leakage, the auditor will provide the customer with a list of contractors that can perform the test. The customer is responsible for the cost of the testing.

The audit is conducted using an Energy Calculator from a third-party vendor. The results of the energy audit are summarized for the customer in an easy-to-read format to illustrate the potential energy efficiency and cost savings in the home.

During the online survey, customers also utilize an Energy Calculator from a third party vendor to identify similar types of energy efficiency measures that FPUC's auditors would identify in an in-home survey. The on-line survey collects information about customers' homes, appliances, and other information to determine the most appropriate measures that customers can implement themselves or have implemented in their homes by a contractor. Customers are responsible for any costs associated with repair or recommendations that are beyond the scope of the audit. On-line survey customers that complete the survey will be sent two LED bulbs.

The procedures used to make the installation cost and energy savings estimates produced in the audit report are consistent with Commission rules and good engineering practices. However, the actual installation costs incurred and energy savings realized from installing the measures may be different from the estimates contained in this audit report. The estimates are based on measurements of the customer's house and on assumptions which may not be entirely correct for the customer's household due to differing energy use patterns

Customer Eligibility Requirements

The program is available to all of FPUC's residential customers and is provided at no cost to the customer. However, the customer is responsible for the cost of any duct-blast testing. A customer may request an in-home energy audit once per calendar year. FPUC may authorize in-home audits more frequently than once per year due to high bill complaints by the customer. Customers can conduct on-line surveys as often as they like, but are limited to receiving two LED bulbs per calendar year.

Program Procedures

Interested customers must request the energy audit either by filling out the Residential Energy Audit Request form on-line, by contacting FPUC by phone or at FPUC conservation events, or by accessing the on-line audit through FPUC's website. In addition, FPUC encourages all customers otherwise meeting the audit qualification requirements that contact FPUC with high bill complaints to request an audit. FPUC will contact customers to schedule appointments after the requests have been formally received. Customers can request an in-home energy audit once per calendar year or can conduct an on-line audit at any time, but can only receive the two LED bulbs once per year. FPUC will follow-up with the customer to answer questions or provide a list of contractors to perform recommended services if necessary.

Savings Verification

FPUC conducts follow-up surveys after customers have implemented the specific recommendations. Data concerning these changes are accumulated so the impact of the energy surveys can be more accurately measured. The reporting requirements for this program will follow Rule 25-17.0021 (5), Florida Administrative Code. Additionally, program expenses will be identified in the ECCR True-up and Projection filings.

Residential Heating and Cooling Efficiency Upgrade Program

Program Description

The Residential Heating and Cooling Efficiency Upgrade Program is directed at reducing the rate of growth in peak demand and energy throughout FPUC's electric service territories. The program will do this by increasing the saturation of high-efficiency heat pumps and central air conditioning systems. The program requires that customer install a high-efficiency central air conditioning system or heat pump with a minimum 15 SEER.

The Residential Heating & Cooling Efficiency Upgrade Program focuses in two areas. The first is to incent customers with operating inefficient heat pumps and air conditioners to replace them with more efficient units. The program also incents customers with resistance heating to install a new heat pump. The second area of focus for the program is to incent customers that are replacing a heat pump or air conditioner that has reached the end of its life with a more efficient heat pump or air condition than is required by codes and standards. The incentive to install a more efficient heat pump or air conditioner also applies to heat pumps and air conditioners being installed in new construction. The Residential Heating & Cooling Efficiency Upgrade Program was approved as an update to a former program, which was done so to reflect current codes and standards as well as market conditions.

Residential Heating & Cooling Efficiency Upgrade Rebates		
	Customer Rebate	Dealer Incentive
Type 1	\$100.00	\$75.00
Type 2	\$100.00	\$25.00
Type 3	\$100.00	\$25.00
Type 4	\$100.00	\$25.00

Customer Eligibility Requirements

Single family, multifamily, and mobile home residential customers that meet the following requirements are eligible for the program.

- Replace existing equipment with, or install new, straight air conditioners or heat pump
- Install a heat pump (AHRI rating only) or central air conditioning system with a minimum rating of 15.0 SEER
- Must be the owner of the residence which must be located in FPUC's electric service area
- Mobile homes must be permanent or stationary. Mobile homes must have their wheels removed and set on a lot. (FPUC reserves the right to remotely verify the permanence of a dwelling via Google Maps to confirm eligibility.)

Concerning the installation of heat pumps:

When installing/replacing with a new heat pump, the maximum supplemental strip heating physically contained in the system shall not exceed 2 kW per nominal ton. On a system of less than 2.5 tons, a 5 kW heat strip will be allowed. For a heat pump using supplemental strip heating, a two-stage indoor thermostat is required.

Customer and/or contractor must attest that the heat pump or air conditioner installation meets all required codes and standards. FPUC does not warrant that installation meets all required codes and standards and accepts no liability whatsoever for the installation.

Concerning the installation of straight cooling systems:

The residence cannot have oil or electric resistance as the primary heat source.

Program Procedures

HVAC contractors or the customer will submit rebate request forms either by mail or through the FPUC online portal within 30 days after the work is completed. The purchase receipt and invoice verifying installation is required and can be uploaded or mailed with the application. No payments will be made until FPUC verifies and approves the rebate request conforms to program standards. Once FPUC approves the rebate request, FPUC's contractor for issuing rebates will issue an FPUC Visa gift card (or check when appropriate) via First-Class mail to the customer or contractor within 30-45 business days. The contractor will be paid by check within 30-45 business days for the dealer rebate when the rebate request is approved.

Savings Verification

FPUC will randomly perform verifications on 10 percent of the program installations. Verification will be conducted for all installations not conducted by an FPUC partner contractor. FPUC will conduct the verifications within 30 business days of receiving the complete rebate request. FPUC will calculate demand and energy savings based on the values presented in FPUC's 2015 DSM Plan. FPUC will maintain a data base of the size and SEER of air conditioners and heat pumps installed for use in updating the demand and energy savings during the next goals cycle.

Commercial Heating & Cooling Efficiency Upgrade Program

Program Description

The Commercial Heating & Cooling Efficiency Upgrade Program is directed at reducing the rate of growth in peak demand as well as reducing energy consumption throughout FPUC's commercial sector. The program will do this by increasing the saturation of high-efficiency heat pumps and central air conditioning systems. There are four Rebate Types available for this program. A description of the types and associated incentives/rebates are:

- Type 1 - Heat pump replacing resistance heat
- Type 2 - Heat pump replacing a heat pump
- Type 3 - Air conditioner replacement
- Type 4 - New heat pump or air conditioner installation

Commercial Heating & Cooling Efficiency Rebates		
	Customer Rebate	Dealer Incentive
Type 1	\$100.00	\$75.00
Type 2	\$100.00	\$25.00
Type 3	\$100.00	\$25.00
Type 4	\$100.00	\$25.00

Customer Eligibility Requirements

Eligible commercial customers must:

- Replace existing equipment with, or install new, straight air conditioners or heat pumps
- Install a heat pump (AHRI rating only) or central air conditioning system with a minimum rating of 15.0 SEER
- Must be the owner of the facility which must be located in FPUC's electric service area

Concerning the installation of heat pumps:

- When installing/replacing with a new heat pump, the maximum supplemental strip heating physically contained in the system shall not exceed 2 kW per nominal ton. On a system of less than 2.5 tons, a 5 kW heat strip will be allowed.
- For a heat pump using supplemental strip heating, a two-stage indoor thermostat is required.
- Customer and/or contractor must attest that the heat pump or air conditioner installation meets all required codes and standards. FPUC does not warrant that installation meets all required codes and standards and accepts no liability whatsoever for the installation.

Concerning the installation of straight cooling systems:

The business cannot have oil or electric resistance as the primary heat source.

Program Procedures

HVAC contractors or the customer will submit rebate request forms either by mail or through the FPUC online portal within 30 days after the work is completed. The purchase receipt and invoice verifying installation is required and can be uploaded or mailed with the application. No payments will be made until FPUC verifies and approves the rebate request conforms to program standards. Once FPUC approves the rebate request, FPUC's contractor for issuing rebates will issue an FPUC Visa gift card (or check when appropriate) via First-Class mail to the customer or contractor within 30-45 business days. The contractor will be paid by check within 30-45 business days for the dealer rebate when the rebate request is approved.

Savings Verification

FPUC will randomly perform verifications on 10 percent of the program installations. Verification will be conducted for all installations not conducted by an FPUC partner contractor. FPUC will conduct the verifications within 30 business days of receiving the complete rebate request. FPUC will calculate demand and energy savings based on the values presented in FPUC's 2015 DSM Plan. FPUC will maintain a data base of the size and SEER of air conditioners and heat pumps installed for use in updating the demand and energy savings during the next goals cycle.

Commercial Chiller Upgrade Program

Program Description

The Commercial Chiller Upgrade Program is directed at reducing the rate of growth in peak demand and energy throughout FPUC's commercial sector. To serve this purpose, this program requires that commercial customers replace existing chillers with a more efficient system. By doing so, they will qualify for an incentive of up to \$175 per kW of additional savings above the minimum efficiency levels.

Customer Eligibility Requirements

All of FPUC's non-residential customers are eligible for this program. The program covers only three types of new chillers: water-cooled centrifugal, water-cooled scroll or screw, and air-cooled. Each type has minimum qualifications of efficiency listed below:

- Water-Cooled Centrifugal Chillers:
 1. Under 150 tons = 0.65 kW/ton with a 5.4 COP
 2. 150 - 300 tons = 0.60 kW/ton with a 5.9 COP
 3. Over 300 tons = 0.56 kW/ton with a 6.3 COP
 - Water-Cooled Scroll or Screw Chillers:
 1. Under 150 tons = 0.72 kW/ton with a 4.9 COP
 2. 150 - 300 tons = 0.66 kW/ton with a 5.3 COP
 3. Over 300 tons = 0.59 kW/ton with a 5.9 COP
- Air-Cooled Electric Chillers (any size):
1. Any size = 1.17 kW/ton with a 3.0 COP

Program Procedures

Interested customers must send project proposals to FPUC and a representative will schedule an on-site visit for inspection prior to installation. After the project is completed, an FPUC representative will conduct an on-site inspection. The on-site inspection will be completed within 30 business days of the customer providing notification that the project is complete. The customer will sign the rebate form verifying that the equipment was installed and that the incentive recipient's name and mailing address are correct and submit the receipt for the installation. No payments

will be made until FPUC verifies and approves the rebate request. Once FPUC approves the rebate request, FPUC's contractor for issuing rebates will issue an FPUC Visa gift card (or check when appropriate) via First-Class mail to the customer or contractor within 30 business days.

Savings Verification

The demand and energy savings will be based on the values presented FPUC's 2020 DSM Plan. The FPUC inspector will note the efficiency ratings and size of the existing and replacement equipment.

Commercial Reflective Roof Program

Program Description

The Commercial Reflective Roof Program is directed at reducing demand and energy throughout FPUC's commercial sector through the installation of cool roofs. The program allows non-residential customers installing cool roofs to obtain rebates of \$0.15 per sq. ft. for new roofs on new or existing facilities and \$0.65 per sq. ft. for roofs converting to a cool roof. To be eligible for the rebates, the roofing material must be Energy Star certified.

Customer Eligibility Requirements

All of FPUC's non-residential customers are eligible to participate in the Commercial Reflective Roof Program. Eligible installations must:

- Have roofs covering air conditioned space.
- Roofing material must be ENERGYSTAR certified.

Program Procedures

Interested customers or their roofing contractor must contact FPUC to schedule a pre-installation inspection. FPUC will respond to the customer's request and will attempt to conduct the pre-installation inspection within 10 business days subject to the customer's availability. The pre-installation inspection will review the customer's roofing plans and the FPUC representative will determine which rebate applies and assure that the materials proposed to be used qualify. After the roof is completed, the customer or their roofing contractor will contact FPUC and request a post installation inspection. FPUC will respond to the customer's request and will attempt to conduct the post installation inspection within 10 business days subject to the customer's availability. The customer will sign the rebate form verifying that the equipment was installed and that the incentive recipient's name and mailing address are correct and submit the receipt for the installation. No payments will be made until FPUC verifies and approves the rebate request. Once FPUC approves the rebate request, FPUC's contractor for issuing rebates will issue an FPUC Visa gift card (or check when appropriate) via First-Class mail to the customer or contractor within 30 business days.

Savings Verification

FPUC will track the size and type of the installations. Savings will be calculated based on the demand and energy savings presented in FPUC's 2020 DSM plan.

Conservation Demonstration and Development (CDD) Program

Program Description

The primary purpose of the Conservation Demonstration and Development (CDD) program is to pursue research, development, and demonstration projects that are designed to promote energy efficiency and conservation. This program will supplement and complement the other demand-side management programs offered by FPUC.

The CDD program is meant to be an umbrella program for the identification, development, demonstration, and evaluation of promising new end-use technologies. The CDD program does not focus on any specific end-use technology but, instead, will address a wide variety of energy applications that will lead to the Next Generation of FPUC's DSM Programs.

Program Requirements

The projects that may be studied within this program will vary greatly and, therefore, need careful screening. The screening criteria will include the potential for peak demand and energy reductions, the technology's state-of-development, and an evaluation of the degree of potential customer acceptance and marketability. The activities that may take place under the auspices of this program include:

- Literature searches and reviews
- Engineering appraisals & feasibility analysis (Assessment of Commercial DR Options)
- Financial analyses of promising programs, projects or technologies
- Baseline data collection (Residential Energy Monitoring and DSM Savings Verification)

- Benchmark analysis(Distributed Generation/Community Solar DSM Programs)
- Field-testing with customers
- Technology demonstrations (Battery Storage)
- Pilot programs.

Field-testing will be limited to the demonstration of emerging end-use technologies that meet the guidelines described in the Program Description section above. Funding for the field-testing will be constrained by this program's expenditure limitations. If any field-testing or pilot projects require funding beyond these limitations and if FPUC believes them necessary, the FPUC will seek approval for continued Energy Conservation Cost Recovery.

Program Limitations

FPUC will limit the total CDD expenditures to a maximum of \$75,000 per year. FPUC will also notify the Florida Public Service Commission of any CDD project that exceeds \$15,000. Costs for CDD projects that meet the program's criteria for acceptance will be charged to the Energy Conservation Cost Recovery account.

The projects undertaken by this program are research and development projects. The levels of costs and benefits and the potential peak demand and energy reductions are not known with sufficient certainty. The major thrust of the activities performed under the CDD program will be to develop better estimates of these economic drivers.

Savings Verification

Any technology investigated as a CDD project will be investigated using well-accepted methods of measurement and evaluation. Before any project is approved for study, the project's justification will be clearly documented. The justification will include:

- Detailed project description (a-priori).
- Research design plan.
- Project potential.
- Project alignment with CDD program goals

- Project costs.

All expenditures allocated to this program will be properly accounted for and reported. All approved CDD projects that do not require field-testing will be fully documented. The documentation will include descriptions of the methodology, modeling, and engineering estimation procedures used to justify the study's results and conclusions.

Specific deliverables that will be provided from all CDD projects include:

- Detailed project description (a-posteriori)
- Conservation potential.
 - o Achieved.
 - o Projected.
- Technical evaluation.
- Cost-benefit considerations
- Customer acceptance
 - o Achieved with test subjects
 - o Projected

These findings will be reported and filed with the Florida Public Service Commission's staff for their review and consideration.

Standard cost-effectiveness analysis is not applicable for research and development activities. The purpose of these activities is to discover promising energy efficiency options and changes that customers may someday choose to implement. Customers, on average, will choose to implement the most cost-effective options. Programs like this one serves FPUC and its customers by garnering new, reliable information upon which to base future demand-side management programs and services.

Low Income Energy Outreach Program

Program Description

The Low Income Energy Outreach Program is an educational program designed to enhance the effectiveness of the existing weatherization programs for low-income households. These activities include Residential Energy Surveys scheduled by the Low Income Weatherization Program operators, weatherization contract training, distributing energy efficiency educational literature to participants, and hosting energy conservation events customized for low income households. The Low Income Energy Outreach Program consists of the following four major components:

Residential Energy Surveys:

The Low Income Weatherization Program operators will be responsible for scheduling Residential Energy Surveys to be conducted by FPUC with the low-income households. The Low Income Weatherization Program operators are in the best position to identify low-income households that would benefit from the Residential Energy Surveys. For instance households that have already received conservation audits from the Low Income Weatherization Program operators will not need to receive a Residential Energy Survey from FPUC. Each low-income household receiving a FPUC Residential Energy Survey will receive LED bulbs.

Contractor Training:

Training will be provided by FPUC to educate and inform weatherization contractors about thermal envelope improvement best practices, product procurement ideas, and emerging weatherization strategies. Training events will occur on an annual basis throughout each of the counties FPUC serves. These efforts will include coordination with the Weatherization Assistance Program Technical Assistance Center.

Demographic Targeted Energy Materials:

Energy Conservation materials that are specifically geared towards low income households will be compiled by FPUC and provided by the approved weatherization organization performing the energy improvements.

Community Conservation Events:

Annual Community Conservation events will be conducted in each of the territories that FPUC serves. These events will educate and inform low income households about the weatherization programs offered in their county and depending upon the event each participant will receive LED bulbs along with instructional information about reading electric bills and energy conservation tips.

Customer Eligibility Requirements

Eligibility requirements for the Low Income Energy Outreach Program apply to both the weatherization program operators as well as the FPUC residential customers.

Weatherization Organization Partnership Requirements:

Each low income weatherization organization partner must comply with the Florida Department of Economic Opportunity policy of using weatherization organizations that have been approved by the county within which they operate.

Residential Customer Participation Eligibility Requirements:

The low income household must have a residential electric service account with FPUC, must meet the income verification requirements specified by the local low income weatherization organization, the home must be older than three years old, and the customer must receive a FPUC Residential Energy Survey if deemed required by the low

Program Procedures

FPUC will identify the appropriate low income weatherization organization in each county that FPUC has electric service area. FPUC will contact each low income weatherization organization selected and schedule a meeting to introduce the program to the low income weatherization organization. FPUC will provide the low income weatherization organization with blocks of time that FPUC can conduct the Residential Energy Surveys. The low income weatherization organization will identify qualifying households that meet the income requirements and residence age requirements and schedule the Residential Energy Surveys. The low income weatherization organization will provide the schedule to FPUC. FPUC will verify that the household is a FPUC residential electric customer. FPUC will conduct the Residential Energy Survey and provide the results of the Residential Energy Survey to both the customer and the low income weatherization organization. The low income weatherization organization will work with the customer to implement the Residential Energy Survey recommendations through any means available to the low income weatherization organization. If the Residential Energy Survey recommends the installation or replacement of a heat pump or air conditioner under FPUC's Residential Heating & Cooling Efficiency Upgrade Program, the low income weatherization organization will attempt to facilitate the installation and ensure that customer conforms with the Residential Heating & Cooling Efficiency Upgrade Program and receives the associated rebate or that the rebate is applied to the installation costs.

FPUC will meet with the Weatherization Assistance Program Technical Assistance Center to plan and schedule annual training for contractors in each of the counties that FPUC provides electric service. FPUC will work with Weatherization Assistance Program Technical Assistance Center to identify, contact, and schedule the training. FPUC will prepare and present the training program.

FPUC will review existing energy conservation materials and make any modifications which make the materials more appropriate for low income households. FPUC will provide the materials to the low income weatherization organizations participating in the program.

FPUC will participate in annual community conservation events generally in connection with events organized by others such as county fairs. FPUC will provide information specifically targeted to low income customers at these events.

Savings Verification

Since the Low Income Energy Outreach Program is an educational and outreach program, no specific savings are identified. FPUC will track the number of customers participating in the Residential Energy Survey Program and the Residential Heating & Cooling Efficiency Upgrade Program as a result of the Low Income Energy Outreach Program. Energy and demand savings from participation in the Residential Energy Survey Program and the Residential Heating & Cooling Efficiency Upgrade Program will be recorded and verified as part of those specific programs.

Commercial Energy Consultation Program

Program Description

The FPUC Commercial Energy Conservation Program is designed to directly communicate the availability of the commercial DSM programs to commercial customers. This program allows FPUC energy conservation representatives to conduct commercial site visits to educate customers about FPUC's commercial DSM programs, assess the potential for applicable DSM programs, conduct an electric bill review, offer commercial energy savings suggestions, and inform the customer about FPUC's commercial online energy efficiency resources and tools.

Program Requirements

The Commercial Energy Consultation Program is open to all FPUC non-residential customers. Customers wishing to participate can call 800-427-7712 or contact any FPUC representative who will have them contacted by an FPUC energy conservation representative. The availability of the program will be announced through bill stuffers in non-residential customers' bills and may be announced through other FPUC media.

Savings Verification

As an educational program, no specific energy or demand savings are identified through the Commercial Energy Consultation Program. FPUC will compile a list of customers who participate in the program. Any participation in FPUC's commercial conservation programs will be recorded and the savings and verification for those specific programs will be part of those specific programs.