



City of Jacksonville Beach

Briefing Notice

City Council

11 North Third Street
Jacksonville Beach, Florida

Monday, August 14, 2023

5:30 PM

Council Chambers Conference Room

City Manager Mike Staffopoulos will conduct a Council Briefing to update the City Council about ongoing items in the City. The Briefing will include, but not be limited to, the following topics:

- A. PURPA Discussion
- B. Effluent Elimination Discussion
- C. Public communication efforts and expectations for construction projects
- D. Improvements and funding for 13th Ave S
- E. Special Event Policy
- F. Miscellaneous City Manager Items
- G. Committee Assignment Report
- H. Future Briefing Topics

Council Members in attendance may include:

Mayor:	Christine Hoffman		
Council Members:	Bill Horn	Sanding Golding	Dan Janson
	Fernando Meza	Cory Nichols	Greg Sutton

Please note: Council Members in attendance may vary according to their schedules.

In accordance with the Americans with Disabilities Act and Section 286.26, Florida Statutes, persons with disabilities needing special accommodations to participate in this meeting should contact the City Clerk's Office at (904) 247-6299, no later than one business day before the meeting or by sending an email to CityClerk@jaxbchfl.net.



CITY COUNCIL BRIEFING TOPIC	
TO:	Mayor and City Council
FROM:	Michael J. Staffopoulos, City Manager
DATE:	August 14, 2023
SUBJECT:	Consideration of Proposed PURPA Standards

BACKGROUND

The City of Jacksonville Beach, doing business as Beaches Energy Services, is required to consider standards as proposed by the Public Utility Regulatory Policies Act (PURPA). This past year, PURPA proposed two standards for consideration:

1. Electric Vehicle Charging Programs
2. Demand Response and Demand Flexibility

City Council held a public hearing on June 20, 2023 for these two proposed standards; no comments were received. BES Director Putnam has provided a synopsis of each proposed standard (attached), along with a recommendation not to adopt each of the standards. Formal action to either adopt or deny the standards, in the form of a resolution, will be required by City Council.

FINANCIAL IMPACT

N/A

COUNCIL DIRECTION REQUESTED

Should staff prepare a resolution not to adopt the PURPA standards for consideration by City Council?

ATTACHMENTS

1. Discussion and Recommendation_111(d)(20)_v1 - Demand Response and Demand Flexibility
2. Discussion and Recommendation_111(d)(21)_v1 - Electric Vehicle Charging Programs

Beaches Energy Services

Report and Recommendation

Council/Committee:	Jacksonville Beach City Council
Date:	June 5 th , 2023
Issue:	Consideration of PURPA Standard 111(d)(20) – Demand Response and Demand Flexibility
Recommendation:	To not adopt the standard

Summary

The Jacksonville Beach City Council met with staff to consider the Public Utility Regulatory Policies Act (PURPA) Standard Regarding Demand Response and Demand Flexibility. The following provides a discussion of the salient aspects of the standard that were considered and the Council's recommendation.

Definitions

- Sub-paragraph A of the 111(d)(20) standard states the following: "(A) IN GENERAL– Each electric utility shall promote the use of demand-response and demand flexibility practices by commercial, residential, and industrial consumers to reduce electricity consumption during periods of unusually high demand."
 - Beaches Energy Services staff interprets this consideration to include, by way of the notion of "demand flexibility", such concepts as increasingly sophisticated time of use rates, grid-interactive buildings, and controls on certain end use loads, such as water systems.
- Sub-paragraph B of the 111(d)(20) standard states the following: "(B) RATE RECOVERY–
 - (i) IN GENERAL–Each State regulatory authority shall consider establishing rate mechanisms allowing an electric utility with respect to which the State regulatory authority has ratemaking authority to timely recover the costs of promoting demand-response and demand flexibility practices in accordance with sub-paragraph (A).
 - (ii) NONREGULATED ELECTRIC UTILITIES–A non-regulated electric utility may establish rate mechanisms for the timely recovery of the costs of promoting demand-response and demand flexibility practices in accordance with subparagraph (A)."

Considerations and Discussion

- According to the EIA¹ and other sources, the ideas posited in 111(d)(20) fall within the general landscape of Demand-side management (DSM). DSM programs consist of the planning, implementing, and monitoring activities of electric utilities which are designed to encourage consumers to modify their level and pattern of electricity usage. Demand-side

¹ <https://www.eia.gov/electricity/data/eia861/dsm/>

management programs can benefit customers – both those who participate in the programs and those who do not. Participating customers benefit by spending less money on electricity bills. Non-participating customers can save money, too, because the programs shift electricity usage away from times where demand is highest².

- In general, DSM consists of the following core areas:
 - Demand Response – curtailing or abatement of consumption based on a time domain or associated time-based price signal.
 - Energy Efficiency – leveraging advanced technology as compared to baseline technology for end-uses (e.g., dishwashers, air conditioners) such that the same level of utility can be derived by the customer with less energy.
 - Conservation – using less energy than would otherwise be consumed through behavioral changes and practices.
- Beaches Energy Services participates in the Florida Municipal Power Agency (FMPA) All Requirements Project (ARP). As a Participant in this project, Beaches Energy Services funds the ARP Conservation Program. While nominally named the “Conservation” program, the funding and portfolio of incentives provided within this program empower Beaches Energy Services to provide incentives to retail customers that fall within the broader DSM domain. Measures adopted by Beaches Energy Services for incentives include AC heat pump rebates, duct leak repair, programmable thermostat rebates, and insulation upgrades, all of which intrinsically reduce energy and demand over the useful life of the measure.
- The ARP Conservation Program, since its inception, has invested over \$11.1 million in measures and incentives for ARP Participants. FMPA supports these efforts by developing engineering assumptions to track the savings associated with existing and new measures that are adopted and has developed a historical tracking model to integrate participation statistics and estimated energy and demand savings per year since the inception of the program.
- The nature and extent of the activities contemplated by 111(d)(20) are duplicative of the existing ARP Conservation Program.
- The ARP wholesale demand rate is predicated on the summer coincident peak over a three-year rolling average. As a result of the nature of the wholesale power supply project’s fixed costs, any coordinated load management would cost-shift fixed cost to other ARP Participants. Consequently, the ARP’s Executive Committee has agreed to avoid large-scale coordinated load management to prevent cost shifts. This does not include retail programs made available through the ARP Conservation Program portfolio.
- There are no other time-domain based components of the wholesale energy rate for the ARP other than the demand rate (which by extension includes load-based transmission charges). Therefore, there are no other avoided costs associated with consumption at this time that would translate into benefits for Beaches Energy Services. While it is plausible to consider reduced energy costs driven from changes in customer consumption patterns that avoid more expensive peaking resources, such adjustments would require cost-prohibitive customer incentives and would need to remain voluntary, which limits the net benefit of such incentives. As noted above, the ARP Conservation Program already intrinsically includes retail usage reduction incentives within the portfolio of measures endorsed by Beaches Energy Services.

² [https://cubminnesota.org/energy-demand-side-management/#:~:text=Demand%2Dside%20management%20\(DSM\),Energy%20efficiency%20investments](https://cubminnesota.org/energy-demand-side-management/#:~:text=Demand%2Dside%20management%20(DSM),Energy%20efficiency%20investments)

Recommendation

- Beaches Energy's recommendation is to not adopt the proposed Demand Response and Demand Flexibility standard.
- The components of the standard are duplicative with the existing ARP Conservation Program, of which Beaches Energy is a Participant.
- Coordinated load management is currently not allowed by the ARP Executive Committee as a result of cost-shifts between Participants for fixed costs.
- Beaches Energy Services will continue to monitor and evaluate further optionality in this program area if further analysis suggests that benefits exceed the costs.

Beaches Energy Services

Report and Recommendation

Council/Committee:	Jacksonville Beach City Council
Date:	June 5 th , 2023
Issue:	Consideration of PURPA Standard 111(d)(21) – Electric Vehicle Charging Programs
Recommendation:	To not adopt the standard

Summary

The Jacksonville Beach City Council met with staff to consider the Public Utility Regulatory Policies Act (PURPA) Standard Regarding Electric Vehicle Charging Programs. The following provides a discussion of the salient aspects of the standard that were considered and the Council's recommendation.

Definitions

The 111(d)(21) standard states the following: "Each State shall consider measures to promote greater electrification of the transportation sector, including the establishment of rates that --

- (A) promote affordable and equitable electric vehicle charging options for residential, commercial, and public electric vehicle charging infrastructure;
- (B) improve the customer experience associated with electric vehicle charging, including by reducing charging times for light-, medium-, and heavy-duty vehicles;
- (C) accelerate third-party investment in electric vehicle charging for light-, medium-, and heavy-duty vehicles; and
- (D) appropriately recover the marginal costs of delivering electricity to electric vehicles and electric vehicle charging infrastructure."

Considerations and Discussion

- This standard is directed to States, not to utilities. However, Beaches Energy Services will consider this standard.
- With respect to sub-part A, the Florida Department of Transportation, pursuant to Section 339.287 of Florida Statutes¹, has developed an Electric Vehicle Infrastructure Master Plan (EVMP)² as directed by the statute that has the primary goals and objectives of (i) supporting both short-range and long-range electric vehicle travel, (ii) encouraging the expansion of electric vehicle use in the state, and (iii) adequately serving evacuation routes in the state. Given this expansive focus at the state level, Beaches Energy Services has a targeted focus on ensuring a solvent transmission, power supply, and importantly,

¹ http://www.leg.state.fl.us/statutes/index.cfm?App_mode=Display_Statute&Search_String=&URL=0300-0399/0339/Sections/0339.287.html

² <https://www.fdot.gov/planning/policy/ev/default>

distribution system that can serve incremental EV load. Staff does not see a need to impose additional rates or measures beyond the FDOT EVMP at this time.

- With respect to sub-part B, Beaches Energy Services has no direct control over technological advancements in the area of reduced charge times or the overall customer product experience. This falls outside the role of Beaches Energy Services as a reliable provider of electric service.
- With respect to sub-part C, staff believes that the FDOT EVMP contains the same objective, and like with sub-part A, Beaches Energy Services' role in that effort is to plan adequately for continual reliable power delivery, which includes the following existing activities:
 - i) Forecasting EV Uptake Potential and associated energy and demand impacts. Working within the Florida Municipal Power Agency (FMPA) load forecast process, EV projections have been enhanced for the 2023 load forecast cycle and beyond. EV historical data regarding light duty vehicle totals and electric vehicles registered in each of the counties surrounding the FMPA All Requirements Project (ARP) Participants was obtained from the Florida Department of Motor Vehicles. Projections regarding EV adoption were developed from three sources, specifically the EIA AEO 2022 (Low Adoption Case), Wood Mackenzie (Base Adoption Case), and Bloomberg New Energy Finance (High Adoption Case). EV charging energy requirements and demand profiles were drawn generally from data produced in NREL's EVI-Pro Lite tool and reflect that a small portion of EVs will charge during off-peak periods. This enhanced approach allows FMPA and Beaches Energy Services to better understand the potential energy and demand impacts of future EV uptake.
 - ii) Transmission and distribution system planning. Beaches Energy Services conducts ongoing evaluations of the solvency of both the transmission systems to which it is interconnected and the ability of distribution level feeders to handle increased load, the latter of which is a risk to be monitored to the extent EV penetration is accelerated.
- With respect to sub-part D, Beaches Energy Services, as a municipal utility, recovers all power delivery costs from customers. Rate design specific to EVs could be embedded in future cost of service studies that reflect appropriate functionalization and allocation of costs to various customer classes, to the extent EV penetration reaches much higher levels that would support cost partitioning or other metering adjustments that would empower alternative rate design specific to EV customers. Penetration levels of EVs are currently too low to warrant such adjustments.

Recommendation

Staff recommends not adopting this standard for the reasons outlined by sub-part above. Beaches Energy Services will continue to support both the FDOT EVMP and our customers within the appropriate boundaries in our role as a provider of reliable power supply.