

The Florida Senate
BILL ANALYSIS AND FISCAL IMPACT STATEMENT

(This document is based on the provisions contained in the legislation as of the latest date listed below.)

Prepared By: The Professional Staff of the Committee on Communications, Energy, and Public Utilities

BILL: SB 1888

INTRODUCER: Senator Garcia

SUBJECT: Energy Security and Disaster Resilience Pilot Program

DATE: February 5, 2018

REVISED: _____

	ANALYST	STAFF DIRECTOR	REFERENCE	ACTION
1.	Wiehle	Caldwell	CU	Pre-meeting
2.			AEN	
3.			AP	

I. Summary:

SB 1888 creates an energy security and disaster resilience pilot program within the Department of Agriculture and Consumer Services (DACS or the department) to: demonstrate the effectiveness of distributed energy generation and energy storage technologies to provide for the energy needs of critical disaster resilience facilities located in areas of critical state concern during a natural disaster or declared state of emergency; and study and assess the benefits of grants for such technologies.

DACS must establish and issue grants to offset costs for the purchase or lease and installation of onsite solar energy storage systems placed into service after January 1, 2018, to serve critical disaster resilience facilities located in areas of critical state concern. (It appears that the grants are to offset the full costs of these systems.) Grants are to be issued to eligible applicants on a first-come, first-served basis. DACS must adopt necessary rules by December 31, 2018.

Subject to legislative appropriation and allocation of funds by DACS, the Florida Solar Energy Center (FSEC) is to conduct a study on the benefits of using solar energy storage technologies and other renewable energy generation and storage technologies. The study is to include an assessment of the benefits provided by solar energy storage technologies pursuant to the pilot program. It also must include specified findings and recommendations. The FSEC must publish the results of the study and submit copies to the Governor, the President, the Speaker, and the Commissioner of Agriculture by October 1, 2019.

The section and the pilot project expire on July 1, 2020.

The bill appropriates, for the 2018-2019 fiscal year, \$10 million in nonrecurring funds from the General Revenue Fund to DACS for the purpose of funding the energy security and disaster resilience pilot program.

This bill takes effect July 1, 2018.

II. Present Situation:

Section 570.67, F.S., creates the Office of Energy within the department. The duties of the office include, but are not limited to, administering and enforcing parts II and III of chapter 377, the rules adopted under those parts. This office previously has administered grant and rebate programs relating to renewable energy.

Section 377.705, F.S., provides for the FSEC, which is to: develop and adopt standards for solar energy systems manufactured or sold in this state; establish criteria for testing performance of solar energy systems and shall maintain the necessary capability for testing or evaluating performance of solar energy systems; and test all solar energy systems manufactured or sold in the state.

According to information provided by DACS, the department utilized American Recovery and Reinvestment Act of 2009 funds to implement the SunSmart Schools Emergency Shelter (E-Shelter) program. The E-Shelter program installed more than one megawatt of solar power across Florida. These systems provide power to critical loads during emergencies, while offsetting electrical costs during normal operation. With additional funds from utilities, the program expanded to a total of 118 solar systems at schools, in 46 of Florida's 67 counties. The program ended in 2013. The Florida Solar Energy Center and the department are compiling an after-action report to assess the performance of these systems during Hurricane Irma. The preliminary data indicates that the systems performed as intended.

III. Effect of Proposed Changes:

The bill creates an energy security and disaster resilience pilot program within DACS to:

- Encourage use of and demonstrate the effectiveness of distributed energy generation and energy storage technologies to provide for the energy needs of critical disaster resilience facilities located in areas of critical state concern during a natural disaster or declared state of emergency; and
- Study and assess the benefits of grants for distributed energy generation and energy storage technologies throughout the state to improve the security of the state's energy resources and enhance preparedness and resilience for a natural disaster or declared state of emergency.

The bill provides the following definitions:

- The term "critical disaster resilience facility" includes:
 - Any emergency operations center or other building owned by a state, county, or municipal government agency that is designated as an emergency shelter;
 - Hospitals, assisted living facilities, and other public health facilities needed to provide health services following a natural disaster or declared state of emergency;

- Airports, ports, and other transportation facilities needed for evacuation and critical transportation needs in preparation for and in response to a natural disaster or declared state of emergency;
- Facilities needed for personnel and services related to emergency management, law enforcement, public safety, fire and rescue, and first responders; and
- Buildings housing state, county, or municipal government agencies providing any services relating to disaster preparedness or response.
- The term “area of critical state concern” means an area designated pursuant to s. 380.05, F.S., which states that an area of critical state concern may be designated only for:
 - An area containing, or having a significant impact upon, environmental or natural resources of regional or statewide importance;
 - An area containing, or having a significant impact upon, historical or archaeological resources, sites, or statutorily defined historical or archaeological districts, the private or public development of which would cause substantial deterioration or complete loss of such resources, sites, or districts; and
 - An area having a significant impact upon, or being significantly impacted by, an existing or proposed major public facility or other area of major public investment including, but not limited to, highways, ports, airports, energy facilities, and water management projects.
- The term “onsite solar energy storage system” means a solar photovoltaic generation device or system that is paired with an electricity storage device or system that:
 - Is located on a critical disaster resilience facility’s premises and is used primarily to offset all or part of the facility’s onsite electrical load, or to provide backup power in the event of a utility electrical outage;
 - Is capable of isolating from the electric grid and operating independently during a utility electrical outage; and
 - Has sufficient battery storage capacity to supply at least 24 hours of backup power for the critical disaster resilience facility’s onsite electrical load or at least 5 hours of the facility’s average daily usage.

The bill requires DACS to establish and issue grants to offset costs for the purchase or lease and installation of onsite solar energy storage systems placed into service after January 1, 2018, to serve critical disaster resilience facilities located in areas of critical state concern. It appears that the grants are to offset the full costs of these systems.

The bill creates an application process, requires DACS to determine eligibility, limits the total amount of grants to the amount appropriated for the pilot program, and provides that grants are to be issued to eligible applicants on a first-come, first-served basis. DACS is required to adopt rules by December 31, 2018.

Subject to legislative appropriation and allocation of funds by DACS, the Florida Solar Energy Center is to conduct a study on the benefits of using solar energy storage technologies and other renewable energy generation and storage technologies. The study is to include an assessment of the benefits provided by solar energy storage technologies pursuant to the pilot program, based on factors that may include, but are not limited to, public health and safety, disaster preparedness and resilience, capital investment, net customer savings, net utility savings or deferred

investments, net job creation, impact on utility service rates and service quality, and any other factors related to the use of such technologies.

The study must include, but is not limited to:

- Identification of existing policies relating to the use of solar energy storage technologies and other renewable energy generation and storage technologies;
- Recommendations for expanding the pilot program as a statewide energy security and disaster resilience policy; and
- Recommendations for statewide utility planning and procurement policies that will provide net benefits from the use of solar energy storage technologies and other renewable energy generation and storage technologies.

The FSEC must publish the results of the study and submit copied to the Governor, the President of the Senate, the Speaker of the House of Representatives, and the Commissioner of Agriculture by October 1, 2019.

The section and the pilot project expire on July 1, 2020.

The bill appropriates, for the 2018-2019 fiscal year, \$10 million in nonrecurring funds from the General Revenue Fund to DACS for the purpose of funding the energy security and disaster resilience pilot program.

The bill takes effect July 1, 2018.

IV. Constitutional Issues:

A. Municipality/County Mandates Restrictions:

The mandate restrictions do not apply because the bill does not require counties and municipalities to spend funds, reduce counties' or municipalities' ability to raise revenue, or reduce the percentage of state tax shared with counties and municipalities.

B. Public Records/Open Meetings Issues:

None.

C. Trust Funds Restrictions:

None.

V. Fiscal Impact Statement:

A. Tax/Fee Issues:

None.

B. Private Sector Impact:

Installers of onsite solar energy storage systems placed into service after January 1, 2018, to serve critical disaster resilience facilities located in areas of critical state concern whose installations and applications are determined by DACS to be eligible for issuance of a grant while sufficient funds remain available will receive a grant to cover the full costs of the installation.

C. Government Sector Impact:

The department provided the following information.

- The bill will require additional staffing costing \$100,000 in FY 18-19 and FY 19-20. Additionally, it will necessitate a onetime salary expense of \$150,000 in FY 19-20 to pay for the study.
- The grants are payable retroactively for equipment installed as early as January 1, 2018. This would be before the rules are adopted [the deadline is December 31, 2018], which may lead to legal challenges.
- The bill is not clear on whether the funding for the required FSEC research and DACS program administrative costs will be deducted from the \$10 million appropriation.
- From a fiscal perspective, it would be helpful to roll back the expiration date, July 1, 2020, by one day to the close of business June 30, 2020, to align with the last day of the fiscal year.

VI. Technical Deficiencies:

None.

VII. Related Issues:**Purposes of the pilot project**

The stated purposes of the “energy security and disaster resilience pilot program” are to:

- Demonstrate the effectiveness of distributed energy generation and energy storage technologies to provide for the energy needs of critical disaster resilience facilities located in areas of critical state concern *during a natural disaster or declared state of emergency*; and
- Analyze and study the benefits of grants for distributed energy generation and energy storage technologies throughout the state *to improve the security of the state’s energy resources and enhance preparedness and resilience for a natural disaster or declared state of emergency* (Lines 28-39).

However, neither the apparent timeline for the grant process nor the specified elements of the study appear to be aimed at assessing benefits relating to preparedness and resilience for a natural disaster or declared state of emergency.

The timeline elements contained in the bill are as follows.

- The bill takes effect July 1, 2018.

- DACS has until December 31, 2018, to adopt rules to administer the grants (lines 78-82), including a provision specifying a date on which grant applications may be submitted to the department (line 87) and one setting forth the criteria for determining grant eligibility (lines 93-95).
- Grants are to be issued to applicants on a first-come, first-served basis, determined by the date the application is received (lines 97-99), for as long as funds remain.
- However, grants can be issued for “systems placed into service after January 1, 2018” (lines 78-82).
- The FSEC must conduct its study and publish the report by October 1, 2019 (lines 131-135).
- The section and the program expire on July 1, 2020 (lines 136-137).

Based on these timeline elements, there is significant uncertainty as to when installers may begin their projects.

- Grants can be paid for systems placed into service basically six months before the bill takes effect and a year before rules must be adopted. Some installers may opt to complete their installations and place their systems into service very early in this period.
- However, the rules determine the criteria or standards for grant eligibility and the date upon which an application may be filed (with the date of filing an application determining the applicant’s priority in line for receiving a grant). Anyone who installs a system prior to the determination of eligibility standards runs a significant risk of incurring costs for an ineligible system. So many installers may wait until after the requisite rules are adopted, which could be as late as December 31, 2018 (plus however much time is required to complete the prescribed application form and file it on the designated date). Anyone who waits too long to put in place crucial elements of an installation project necessary to have a complete application, potentially including procurement of a site, risks not being able to file a complete application and missing out on funding.

It appears reasonable to assume most applicants will wait to make any commitments on installations until rules are completed and adopted, but will try to act as soon as possible thereafter. Assuming the majority of installation work begins shortly after December 31, 2018, and assuming it takes 4-6 months to complete the installation, these systems will be placed into service between approximately May 1, 2019 – July 1, 2019.

The FSEC’s report deadline is October 1, 2019. Assuming that there is a significant amount of data, an amount sufficient to provide for meaningful analysis and conclusions, the gathering and analysis of this data during the study and the drafting of the report may take 3-6 months, which would require that the study begin between approximately April 1, 2019 – July 1, 2019.

Although this analysis is based on significant assumptions, it illustrates how small the likelihood is that there will be actual pilot program experience involving the use of distributed energy generation and energy storage technology systems to provide for the energy needs of critical disaster resilience facilities located in areas of critical state concern during a natural disaster or declared state of emergency to provide any sufficient level of data for a study and report on the effectiveness of these systems.

Additionally, the bill states that the FSEC study is to:

- Be “on the benefits of using solar energy storage technologies and other renewable energy generation and storage technologies,”
- Include an assessment of the benefits provided by solar energy storage technologies pursuant to the pilot program, based on factors that may include “public health and safety, disaster preparedness and resilience, capital investment, net customer savings, net utility savings or deferred investments, net job creation, impact on utility service rates and service quality, and any other factors related to the use of such technologies,” and
- Include: identification of existing policies relating to the use of solar energy storage technologies and other renewable energy generation and storage technologies; recommendations for expanding the pilot program as a statewide energy security and disaster resilience policy; and recommendations for statewide utility planning and procurement policies that will provide net benefits from the use of solar energy storage technologies and other renewable energy generation and storage technologies (lines 108-130).

Very little of the criteria has any express relevance to the stated purposes of preparedness and resilience for a natural disaster or declared state of emergency.

An additional factor, noted by the department, is that the bill provides that grants for acquisition and installation of these systems will be solely on a first-come-first-served basis, which does not provide for any geographic dispersion of facilities throughout the state to increase the chances that one or more of them may experience emergency operating conditions during the relatively short demonstration period.

The department also states concerns about the timing of the FSEC study and report, noting that delaying the report until after the completion of the pilot program on July 1, 2020, may allow the FSEC to provide more comprehensive information on the benefits of the program.

Retroactivity

It is unclear why the bill provides for issuance of grants to offset costs for the purchase or lease and installation of onsite solar energy storage systems placed into service after January 1, 2018, a considerable length of time before the adoption of rules that will determine and set forth the basis for establishing grant eligibility, the forms required to obtain a grant, the required documentation, and procedures and guidelines for obtaining a grant. As noted by DACS, this may lead to litigation. It also may create circumstances where some would-be applicants do significant work and incur significant expense only to find that their systems do not comply with the eligibility standards.

VIII. Statutes Affected:

The bill creates section 377.817 of the Florida Statutes.

IX. Additional Information:

- A. **Committee Substitute – Statement of Changes:**
(Summarizing differences between the Committee Substitute and the prior version of the bill.)

None.

- B. **Amendments:**

None.

This Senate Bill Analysis does not reflect the intent or official position of the bill's introducer or the Florida Senate.
