

INDIAN RIVER COUNTY, FLORIDA
M E M O R A N D U M

TO: Jason E. Brown; County Administrator

THROUGH: Stan Boling, AICP; Community Development Director

THROUGH: John W. McCoy, AICP; Chief, Current Development

FROM: Ryan Sweeney; Senior Planner, Current Development

DATE: March 6, 2017

SUBJECT: Florida Power & Light Company's Request for Special Exception Use Approval for a Private Heavy Utility (Solar Energy Center) [SP-SE-17-03-01 / 2016110089-78358]

It is requested that the data herein presented be given formal consideration by the Board of County Commissioners at its regular meeting of March 21, 2017.

DESCRIPTION & CONDITIONS

Culpepper & Terpening, Inc., on behalf of Florida Power & Light Company (FPL), has submitted an application for major site plan and special exception use approval to construct a new private heavy utility (solar energy center). The subject site is approximately 697 acres in size and is located on the east side of 122nd Avenue SW, immediately north of the Indian River County/St. Lucie County boundary (see attachment 3). The site is zoned A-2, Agricultural-2 (up to 1 unit per 10 acres), a zoning district in which special exception use approval is required for private heavy utilities (including solar energy centers). The proposed solar energy center will consist of approximately 350 acres of solar arrays, stabilized access pathways, and an on-site electrical substation. The remainder of the site (i.e. the southern half) is not proposed for development at this time (see attachment 6), and any future use will be subject to A-2 zoning district regulations.

It should be noted that the proposed project includes an on-site electrical substation. An electrical substation as a stand-alone use in the A-2 zoning district would be classified as a private limited utility, and would require administrative permit use approval by the Planning & Zoning Commission (PZC), but would not require approval by the Board of County Commissioners (BCC). The proposed solar energy center, which includes the on-site substation as an accessory use/improvement, must be reviewed through the special exception use approval process, and that process requires public hearings by the PZC and the BCC. If the subject solar energy center project is approved, then the on-site substation will also be approved as an accessory use/improvement.

In this case, the applicant has applied for concurrent major site plan and special exception use approval. Consistent with the County land development regulations (LDRs), staff has approved the major site plan application subject to BCC approval of the special exception use request.

The BCC now needs to consider the special exception use request for the proposed private heavy utility (solar energy center), conduct a public hearing, and approve, approve with conditions, or deny the request. Pursuant to Section 971.05 of the LDRs, the BCC is to consider the appropriateness of the requested use for the subject site and compatibility of the use with the surrounding area. The BCC may recommend reasonable conditions and safeguards necessary to mitigate impacts and to ensure compatibility of the use with the surrounding area.

PLANNING AND ZONING COMMISSION ACTION:

At its meeting of February 23, 2016, the PZC voted 5-0 to recommend that the BCC grant special exception use approval with the conditions recommended by staff (see attachment 2).

ANALYSIS

- 1. **Size of Development:** Overall site size: 697.07 acres
Area of development: 354.60 acres

Note: The site currently consists of 3 separate parcels that must be combined through a unity of title. The applicant must provide a recorded unity of title that combines the 3 separate parcels prior to site plan release.

- 2. **Zoning Classification:** A-2, Agricultural-2 (up to 1 unit per 10 acres)
- 3. **Land Use Designation:** AG-2, Agricultural-2 (up to 1 unit per 10 acres)
- 4. **Building Area:** Proposed: 540 square feet (prefabricated equipment vault)
- 5. **Impervious Area:** Proposed: 766,333 square feet or 17.59 acres

Note: The impervious area calculations include the on-site substation compound that will be entirely covered with a loose rock material, the equipment vault, and the proposed stabilized access pathways that will provide access to the solar panel arrays. Building area, parking area, and stabilized pathways are not counted as open space.

- 6. **Open Space:** Required: 80%
Proposed: 95%

Note: The solar arrays are post-mounted above the existing grade (i.e. the existing ground level), which will remain unaltered underneath the arrays. The open ground underneath the arrays is considered open space.

- 7. **Traffic Circulation:** Access to the proposed project will be provided via a gated, stabilized two-way driveway connection to 122nd Avenue SW, which is a semi-improved dirt road located within St. Johns Improvement District (SJID) right-of-way. The proposed site layout includes a modified grid network of 16' to 20' wide stabilized access pathways to allow maintenance vehicles access throughout the site, and to provide access to the on-site substation compound (see attachment 6).

In accordance with County LDRs, the applicant has submitted a project traffic study which has been reviewed and conditionally approved by Public Works. That conditional approval included an approval condition that all County culvert crossings along the project access route (for construction vehicles) shall be reinforced with 12 inches of asphalt millings installed over the culvert(s) for a distance of 50 feet each way from the centerline of each culvert crossing. Currently, there are no County culvert crossings along the proposed project access route, which is along 122nd Avenue, from SR 60 to the project site. However, an alternate project access route may be proposed, if necessary. Therefore, the applicant shall obtain approval of any alternate project access route from Public Works, and the applicant shall install the required improvements for any County culvert crossings, prior to those County culvert crossings being utilized for project (construction) traffic. The project's driveway location, design, internal circulation plan, and traffic study have all been approved by Traffic Engineering.

8. **Off-Street Parking:** The subject site will be an unmanned, restricted access solar energy center, and will be accessed only by authorized maintenance crews on an infrequent basis. The LDRs do not require permanent off-street parking spaces for such unmanned facilities. The proposed site layout provides adequate space for maintenance vehicles to maneuver and park within the site. Therefore, the project site plan provides sufficient parking area on-site.
9. **Landscape Plan:** The proposed landscape plan satisfies the requirements of LDR Chapter 926, including nonvehicular area landscaping and an adjacent properties buffer provided along the exterior perimeters of the on-site substation. All of the landscaping identified on the project landscape plan must be installed prior to the issuance of a project C.O.
10. **Stormwater Management:** The applicant submitted a preliminary stormwater management plan that has been reviewed and approved by Public Works. That plan proposes to utilize the existing grove furrows/ditches to convey and treat the minimal amount of stormwater runoff that will be generated by the project. Prior to site plan release, the applicant must obtain a County Type "B" Stormwater Permit pursuant to Chapter 930 of the County LDRs.
11. **Utilities:** The project will be an unmanned facility, and will not include any bathroom facilities. Therefore, no well or septic permits are required or proposed. The County Department of Utility Services and the Department of Health have acknowledged that the site will not include any utility provisions, and have approved the associated project site plan.
12. **Extended Roadway Grid Network:** Per Policy 3.8 of the Transportation Element of the County Comprehensive Plan, the County must consider protection of the extended roadway grid network during the site plan review and approval process (see attachment 4). The applicant has depicted on the project site plan the extended roadway grid network for all potential extended roads that may cross the site at some time in the future (17th Street SW, 21st Street SW, 114th Avenue SW, and 122nd Avenue SW). Please see attachment 6. Those potential extended road locations correspond with the proposed on-site stabilized access paths and are clear of proposed solar panel arrays. Consequently, staff has confirmed that the subject extended roadway grid network is properly protected with respect to the proposed project.
13. **Specific Land Use Criteria:** Pursuant to LDR section 971.44(2), the following criteria for private heavy utilities apply to this project:

1. *Per Chapter 901, the definition of utilities, public and private – heavy includes “all major electrical generation plants (generating fifty (50) megawatts or more), major sewage treatment and disposal facilities, and major water purification plants;”*

Note: The proposed use (solar energy center) meets the definition of a private heavy utility.

2. *Any power generation facility shall be consistent with the provisions of the Florida Electrical Power Plan Citing Act, Chapter 23, Section 23.09191 F.S.;*

Note: The proposed solar energy center will have a maximum gross capacity of 74.5 megawatts, and is therefore exempt from the Florida Electrical Power Plant Siting Act.

3. *All below-ground high voltage cables within a utility right-of-way shall be made known to the public through the use of signs posted therein;*

Note: There are no proposed below-ground high voltage cables within a utility right-of-way. Therefore, the above referenced signage criteria do not apply to the subject project. It should be noted that “high voltage” warning signs will be provide in English and Spanish along the perimeter security fence of the on-site substation compound.

4. *The disposal of all waste, gaseous, liquid or solid, shall comply with all federal, state and local laws;*

Note: It is anticipated that no hazardous or toxic waste will be generated by the proposed project. The applicant has acknowledged that if there is any disposal of waste, gaseous, liquid, or solid, such disposal will comply with all federal, state, and local laws.

5. *Between all above-ground facilities, (except distribution and collection facilities) and adjacent properties having a residential land use designation, a Type "A" buffer (reduce to "B" buffer where abutting a local roadway, reduce to "C" buffer where abutting a Thoroughfare Plan roadway) (with six-foot opaque screening) as specified in Chapter 926, Landscaping shall be provided;*

Note: All of the adjacent properties have an AG-2, Agricultural-2 (up to 1 unit per 10 acres) agricultural land use designation, and no adjacent property has a residential land use designation. Therefore, the above referenced landscape buffer requirements do not apply to the subject project.

6. *In all zoning districts except the industrial districts, all equipment, machinery, and facilities which cannot, by their size or nature, be located within an enclosed building shall be separated from adjacent properties having a residential land use designation by a Type "C" buffer (with six-foot opaque screening) as specified in Chapter 926, Landscaping;*

Note: As described in item 5 above, all of the adjacent properties have an AG-2, Agricultural-2 (up to 1 unit per 10 acres) agricultural land use designation, not a residential land use designation. Therefore, the above referenced landscape buffer requirements do not apply to the subject project.

7. *Driveways located in close proximity to adjacent properties having a residential land use designation shall provide a six-foot opaque screening between the driveway and adjacent property. An eight-foot opaque screen may be required if deemed necessary to mitigate noise and visual impacts.*

Note: As described in item 5 above, all of the adjacent properties have an AG-2, Agricultural-2 (up to 1 unit per 10 acres) agricultural land use designation, not a residential land use designation. Therefore, the above referenced driveway screening requirements do not apply to the subject project.

14. Surrounding Land Use and Zoning:

North: Citrus Groves / A-2

East: Citrus Groves / A-2

South: SJID Canal, St. Lucie County (Citrus Groves) / AG-5 (St. Lucie County Zoning)

West: 122nd Avenue SW, Citrus Groves / A-2

All conditions recommended by staff have been accepted by the applicant.

RECOMMENDATION

Based on the analysis above, staff recommends that the BCC grant special exception use approval for a private heavy utility facility (solar energy center with on-site substation) to be known as FPL Indian River Solar Energy Center with the following conditions:

1. Prior to site plan release, the applicant shall provide a recorded unity of title that combines the three separate parcels currently comprising the project site.
2. Prior to utilizing an alternative project access route, the applicant shall:
 - a. Obtain approval of any alternate project access route from Public Works.
 - b. Install the required improvements for any County culvert crossings.
3. Prior to issuance of a certificate of occupancy (C.O.), the applicant shall install all required landscape improvements as shown on the approved project landscape plan.

ATTACHMENTS

1. Application
2. Excerpt from Draft February 23, 2017 PZC Minutes
3. Location Map

4. Extended Roadway Grid Network Map
5. Aerial
6. Site Plan
7. Landscape Plan