

Article XXIII. Solar Energy Regulations

This article is intended to guide the development of solar energy in Sussex County while protecting the public health, safety and general welfare of the community. All regulations and procedures set forth in the zoning ordinance shall apply unless modified in this article.

Sec. 16-390. Definitions

Applicant – means the person or entity who submits an application to the county for a permit to construct or operate a solar farm pursuant to this article.

Solar collector means a device, structure or part of a device or structure (i.e. array, panel, etc.) installed for the purpose of transforming solar energy into thermal, mechanical, chemical or electrical energy.

Solar energy means radiant energy received from the sun that is collected in the form of heat or light by a solar collector.

Solar farm means a use of land where a series of solar collectors are placed in an area for the purpose of converting solar energy into electrical power for interconnection with the power grid primarily for off-site energy consumption. The term includes any associated cabling, devices, equipment, and structures located on site that are associated with the operation of a solar farm. The use of solar collectors for residential or business consumption that occurs on-site is not considered a solar farm.

Sec. 16-391. Allowable Zoning Districts

- A. Upon issuance of a conditional use permit by the governing body and in accordance with the standards set forth in this article, solar farms shall be permitted in the A-1 (General Agricultural), I-1 (Limited Industrial) and I-2 (General Industrial) zoning districts.
- B. Solar collectors not associated with a solar farm shall be permitted in any zoning district, provided they conform to the standards outlined in Section 16-392(B).

Sec. 16-392. Development Standards for Solar Energy Uses

- A. Solar farms shall conform to the following development standards:

1. Height

- No aspect of a solar farm shall exceed 25 feet in height, as measured from grade at the base of the structure to its highest point. Such height restriction shall not apply to transmission lines.

2. Setbacks

- All aspects and components of a solar farm shall meet the minimum zoning setbacks for the zoning district in which it is located.

3. Transmission Lines

- Any new electrical transmission lines associated with a solar farm may be located either above or below ground.

4. Screening

- Solar collectors that are located more than one hundred fifty (150) feet from an adjacent public street right-of-way, residentially zoned property, or residential use shall not require screening;

- Solar collectors that are located less than one hundred fifty (150) feet from an adjacent public right-of-way, residentially zoned property, or residential use shall be screened from view of such adjacent public right-of-way, residentially zoned property or residential use utilizing natural vegetation as approved by the Department of Community Development. Such vegetative buffers shall be appropriate to the location of the site, the adjacent land use, and the area topography.

5. Site Plan Requirements – Solar farms shall be developed in accordance with an approved site plan. Site plans must adhere to the standards outlined in Article XII, Sections 204 and 205 of the Zoning Ordinance.

6. Approved Solar Components

- Electric solar farm components must have a UL listing or equivalent and must be designed with anti-reflective coating(s).

- Building and electrical plans for the solar farm shall be submitted to the Building Official for review and approval to ensure compliance with all applicable building and electrical codes.

7. Utility Notification

Unless the applicant is a public service corporation or is an affiliate of a public service corporation, no solar farm shall be approved until evidence has been given to the Department of Community Development that the applicant has entered into a power purchase agreement or an asset purchase agreement with a public service corporation.

8. Decommissioning

- The owner or operator of a solar farm shall completely decommission the solar farm within twelve (12) months if the solar farm ceases to generate electricity for a continuous period of twelve (12) months. This period may be extended by the Planning Commission if the owner or operator provides evidence that the failure to generate electricity is due to circumstances beyond the owner's or operator's reasonable control and the solar farm has not been abandoned.

-Decommissioning shall include the removal of all solar collectors, cabling, electrical components, fencing, and any other associated equipment, facilities and structures to a depth of at least 36 inches.

-Disturbed earth shall be graded and re-seeded.

-To ensure the full completion of decommissioning requirements, and/or to facilitate the mitigation and abatement of public nuisances or health hazards caused by debris or hazardous materials occurring in the event of partial or complete destruction of any solar farm by natural or man-made causes, Sussex County requires the placement of a surety/performance bond or certified check meeting certain terms and in certain amounts as determined by the Sussex County Community Development Department to ensure that such decommissioning or removal is completed expeditiously, and at no cost to the landowner.

9. Miscellaneous Provisions for Solar Farms

- The perimeter of a solar farm shall be secured through the use of security fencing of a least six (6) feet in height.

- The owner or operator of a solar farm shall provide for and maintain reasonable means of access for emergency services.

B. Solar collectors not associated with solar farms

- Roof-mounted or ground-mounted solar collectors shall not exceed the square footage of the principal structure or use and shall meet the following requirements:

- Solar collectors shall be configured to avoid glare and heat transference to adjacent properties.
- Ground-mounted solar collectors shall not be located within ten (10) feet of any side or rear lot line.
- Ground-mounted solar collectors located within a front yard shall meet the minimum setback required for the principal structure or use in the applicable zoning district where located and shall be sited as far back as the principal structure or use.
- The maximum height of a ground-mounted solar collector shall be 15 feet as measured from the grade or base of the collector to its highest point and shall not exceed the height of the principal structure or use.
- Roof-mounted solar collectors shall not extend beyond the exterior perimeter of the building or structure on which mounted or built and shall not exceed the maximum height for the applicable zoning district where the building or structure is located.