

**Town of Rochester Local Law # 3 of 2016
Amendment of Chapter 140, Zoning**

A Local Law amending Chapter 140 of the Code of the Town of Rochester with regard to Solar Energy

Section 1

This Zoning for Solar Energy Law is adopted pursuant to sections 261-263 of the Town Law which authorize the Town of Rochester to adopt zoning provisions that advance and protect the health, safety, and welfare of the community, and to make provision for, so far as conditions may permit, the accommodation of solar energy systems and equipment and access to sunlight necessary therefore.

Section 2 Subsection § 140-11 Height Restrictions shall be amended as follows

No building or structure shall exceed in building height or maximum stories the number of feet permitted as a maximum on the Schedule of District Regulations for the district where such building or structure is located. These standards shall not apply to agricultural structures, communications towers, elevator shafts, similar unoccupied mechanical spaces and energy generation equipment connected with another otherwise permitted use. Such height exceptions shall be subject to all specific regulations that may apply to such uses.

Section 3 Subsection § 140-13 (G) Accessory Structures and Uses shall be amended as follows:

G. Solar Energy Structures. See § 140-37 Solar Energy

Section 4 A new subsection § 140-37 Solar Energy shall be added as follows:

§ 140-37 Solar Energy

A. Purpose. The Town of Rochester recognizes that solar energy is a clean, readily available, and renewable energy source. Development of solar energy systems for residential, agricultural, and non-residential parcels use of solar energy provides an excellent opportunity for the reuse of land throughout the Town and offers an energy resource that can act to attract and promote green business development. The Town of Rochester has determined that comprehensive regulations regarding the development of solar energy systems is necessary to protect the interests of the Town, its residents, and its businesses. This article is intended to promote the effective and efficient use of solar energy resources; set provisions for the placement, design, construction, and operation of such systems to uphold the public health, safety, and welfare; and to ensure that such systems will not have a significant adverse impact on the aesthetic qualities and character of the Town. To the extent practicable, and in accordance with Town of Rochester law, the accommodation of

solar energy systems and equipment and the protection of access to sunlight for such equipment shall be encouraged in the application of the various review and approval provisions of the Town of Rochester Code. It is therefore the intent of this section to provide adequate safeguards for the location, siting and operation of solar energy facilities.

- B. Definitions. The following definitions shall apply specifically to this subsection. Any words defined in § 140-3 of this code shall retain such definition. Usage of these words in other sections of this code shall utilize such definition as well.

Alternative Energy Systems - Structures, equipment, devices or construction techniques used for the production of heat, light, cooling, electricity or other forms of energy on site and may be attached to or separate from the principal structure.

Area of Use - The area within the parcel measured from the outer edge(s) of the arrays, inverters, batteries, storage cells and all other mechanical equipment used to create solar energy, exclusive of fencing and access roadways.

Building-Integrated Photovoltaic (BIPV) Systems - A combination of photovoltaic building components integrated into any building envelope system such as vertical facades including glass and other facade material, semitransparent skylight systems, roofing materials, and shading over windows.

Collective Solar - Solar installations owned collectively through subdivision homeowner associations, college student groups, "adopt-a-solar-panel" programs, or other similar arrangements.

Community Net Metering --- As provided for by the NY State Public Service Commission.

Flush-Mounted Solar Panel - Photovoltaic panels and tiles or other solar collectors that are installed flush to the surface of a building roof and which cannot be angled or raised.

Ground-Mounted, Freestanding, or Pole Mounted Solar Energy System - A Solar Energy System that is anchored to the ground and attached to a frame, pole or other mounting system, detached from any other structure for the purpose of producing electricity for onsite or offsite consumption.

Kilowatt (kW) - Equal to 1000 Watts; a measure of the use of electrical power.

Megawatt (MW) - Equal to 1000 Kilowatts; a measure of the use of electrical power.

Net-Metering - A billing arrangement that allows solar customers to get credit for excess electricity that they generate and deliver back to the grid so that they only pay for their net electricity usage .

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Offsite Use – A solar energy system designed to be used primarily for export of solar energy to be used primarily by parcels other than the parcel it is located on.

Onsite Use – A solar energy system designed to be used primarily by the building and/or parcel on which it is located.

Photovoltaic (PV) Systems - A solar energy system that produces electricity by the use of semiconductor devices, called photovoltaic cells that generate electricity whenever light strikes them.

Qualified Solar Installer - A person who has skills and knowledge related to the construction and operation of solar electrical equipment and installations and has received safety training on the hazards involved. Persons who are on the list of eligible photovoltaic installers maintained by the New York State Energy Research and Development Authority (NYSERDA), or who are certified as a solar installer by the North American Board of Certified Energy Practitioners (NABCEP), shall be deemed to be qualified solar installers for the purposes of this definition. Persons who are not on NYSEDA's list of eligible installers or NABCEP's list of certified installers may be deemed to be qualified solar installers if the Town determines such persons have had adequate training to determine the degree and extent of the hazard and the personal protective equipment and job planning necessary to perform the installation safely. Such training shall include the proper use of special precautionary techniques and personal protective equipment, as well as the skills and techniques necessary to distinguish exposed energized parts from other parts of electrical equipment and to determine the nominal voltage of exposed live parts.

Remote Net Metering – As provided for by the NY State Public Service Commission.

Rooftop Or Building-Mounted Solar System - A solar panel system located on the roof of any legally permitted and/or constructed building or structure for the purpose of producing electricity for onsite or offsite use.

Solar Access - Space open to the sun and clear of overhangs or shade including the orientation of streets and lots to the sun so as to permit the use of active and/or passive solar energy systems on individual properties.

Solar Collector - A solar photovoltaic cell, panel, or array, or solar hot air or water collector device, which relies upon solar radiation as an energy source for the generation of electricity or transfer of stored heat.

Solar Easement - An easement recorded pursuant to NY Real Property Law § 335-b.

Solar Electric Generating Equipment – Electrical energy storage devices, material, hardware, inverters, or other electrical equipment and conduit of photovoltaic devices associated with the production of electrical energy.

Solar Energy Facility/System - An electrical generating system composed of a combination of both Solar Panels and Solar Energy Equipment.

Solar Energy System, Large Scale – A Solar Energy System that is ground-mounted and produces energy primarily for the purpose of offsite use, sale, or consumption.

Solar Energy System, Small Scale - Solar photovoltaic systems which generate power exclusively for onsite use and consumption by the owners, lessees, tenants, residents, or other occupants of the premises of the building or lot to which they are attached and do not provide energy for any other lots, except as may be allowable under NY State or federal regulation.

Solar Energy System, Subdivision Use – A collective solar energy system occupying less than or equal to two (2) acres area of use consisting of ground-mounted solar arrays or roof panels, and associated control or conversion electronics and that will be used to produce utility power to provide energy only for the onsite use and consumption of the specific lots associated with a particular major or minor subdivision.

Solar Garden: - Groupings of solar photovoltaic solar panels connected to an electric circuit served by an electric utility company. Multiple users may subscribe to receive the output from one or more panels, receive the benefits of PV technology and the efficiencies associated with a larger-scale project without having to own, host or maintain the equipment on their own property.

Solar Inverter - Converts the variable direct current (DC) output of a photovoltaic (PV) solar panel into a utility frequency alternating current (AC) that can be fed into a commercial electrical grid or used by a local, off-grid electrical network

Solar Panel - A photovoltaic device capable of collecting and converting solar energy into electrical energy.

Solar Storage Battery - A device that stores energy from the sun and makes it available in an electrical form.

Solar-Thermal Systems - Solar thermal systems directly heat water or other liquid using sunlight. The heated liquid is used for such purposes as space heating and cooling, domestic hot water, and heating pool water.

Tilt - The angle of the solar panels and/or solar collector relative to their latitude. The optimal tilt to maximize solar production is perpendicular, or 90 degrees, to the sun's rays at true solar noon.

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True Solar Noon - When the sun is at its highest during its daily east-west path across the sky.

C. Applicability

The requirements of this law shall apply to all Solar Energy Systems installed or modified after its effective date, excluding general maintenance and repair. Solar-thermal systems and Building-Integrated Photovoltaic (BIPV) Systems are permitted outright in all zoning districts, subject to building permits if determined required.

D. Permit Requirements

- (1) All solar energy system installations shall be performed by a qualified solar installer.
- (2) A solar energy system connected to the utility grid shall provide written proof from the local utility company acknowledging the solar energy facility will be interconnected to the utility grid. Any connection to the public utility grid must be inspected by the appropriate public utility.
- (3) Solar energy systems shall meet New York's Uniform Fire Prevention and Building Code and National Electrical Code standards.
- (4) A plan showing location of major components of solar system and other equipment on roof or legal accessory structure. This plan should represent relative location of components at site, including, but not limited to, location of array, existing electrical service location, utility meter, inverter location, system orientation and tilt angle shall be provided. This plan shall show access and pathways that are compliant with New York State Fire Code, if applicable.
- (5) Specification Sheets for all manufactured components.
- (6) All diagrams and plans must include the following: (a) Project address, section, block and lot number of the property; (b) Owner's name, address and phone number; (c) Name, address and phone number of the person preparing the plans; and (d) System capacity in kW-DC.
- (7) Prior to operation proof of electrical connections being inspected and approved by an appropriate electrical inspection person or agency, as determined by the Town of Rochester must be provided.

E. Safety

- (1) Solar energy systems shall be maintained in good working order.

- (2) All solar energy systems shall be designed and located in order to prevent reflective glare from impacting roadways and contiguous properties to the maximum extent practicable.
- (3) If solar storage batteries are included as part of the solar collector system, they must be placed in a secure container or enclosure meeting the requirements of the New York State Building Code when in use and when no longer used shall be disposed of in accordance with the laws and regulations of the Town of Rochester and other applicable laws and regulations.
- (4) Information required in Sections D(4) and D(6) must be provided to the fire department that is obligated to respond to a call from that location.

F. Exceptions.

- (1) The Planning Board, in conjunction with the review of a specific subdivision, site plan, or special use application may also appropriately modify other development standards, including but not limited to building height, to accommodate solar and other energy efficient systems.
- (2) No homeowner or property owner association shall prohibit solar energy systems, Covenants and restrictions connected with projects requiring special use permits, site plan review or subdivision approval shall be reviewed for purposes of ensuring there are no such prohibitions.

G. Small Scale Solar Energy System as an Accessory Use or Structure

(1) Applicability

- a) For purposes of this local law, the term Small Scale Solar refers to solar photovoltaic systems which generate power exclusively for onsite use by the building or lot to which they are attached, and do not provide energy for any other lots. The use and/or structure shall be accessory to the main use and/or structure and shall be incidental, related, appropriate and clearly subordinate.
- b) Solar energy collectors shall be permitted only to provide power for use by owners, lessees, tenants, residents, or other occupants of the lot on which they are erected, but nothing contained in this provision shall be construed to prohibit collective solar installations or the sale of excess power through a net billing or net-metering arrangement in accordance with New York Public Service Law § 66-j or similar state or federal statute.
- c) No Small Scale solar energy system or device shall be installed or operated in the Town of Rochester except in compliance with this article.

(2) Roof-Mounted Solar Energy Systems.

- a) Roof-Mounted Solar Energy Systems that use the electricity onsite or offsite are permitted as an accessory use in all zoning districts when attached to any lawfully permitted and constructed building or structure, subject to building permits.
- b) Height. Solar Energy Systems shall not exceed maximum height restrictions within the zoning district it is located in, as illustrated in the Schedule of District regulations of this code, and are provided the same height exemptions granted to building-mounted mechanical devices or equipment. See also § 140-11 Height Restrictions.
- c) Aesthetics. Roof-Mounted Solar Energy System installations shall incorporate, when feasible, the following design requirements: Panels facing the front yard must be mounted at the same angle as the roof's surface with a maximum distance of 18 inches between the roof and highest edge of the system.
- d) Roof-Mounted Solar Energy Systems that use the energy onsite or offsite shall be exempt from site plan review under the local zoning code or other land use regulations.

(3) Ground-Mounted Solar Energy Systems.

- a) Ground-Mounted Solar Energy Systems that use the electricity primarily onsite are permitted as accessory structures in all zoning districts, subject to building permits.
- b) Height and Setback. The height of the Solar Energy System shall not exceed fifteen (15) feet when oriented at maximum tilt. Setback requirements shall be as stated for accessory uses for the underlying zoning district.
- c) System Capacity. Ground-Mounted Solar Energy Systems designed for onsite use shall not be sized greater than the energy usage necessary to serve the parcel. Documentation of energy use or energy use expansion necessity may be required.
- d) Lot Coverage. Ground-Mounted Solar Energy System shall be granted an additional ten percent (10%) bonus lot coverage of the lot on which it is to be installed for a specific zoning district as listed from the Schedule of District regulations. The surface area covered by Solar Panels shall be included in total lot coverage.
- e) Small-scale Ground-Mounted Solar Energy Systems in the R-1, R-2, or H zoning districts shall be installed in the side or rear yards or be located greater than 100 feet from the front lot line.

- f) Ground-Mounted Solar Energy Systems that use the electricity primarily onsite shall be exempt from site plan review under the local zoning code or other land use regulations.

H. Standards for Solar Energy System, Subdivision Use

- (1) When an application for Subdivision is presented to the Planning Board, which plans include incorporation of a solar energy system as a community energy source, the following criteria for the review and use shall be considered.
 - a) Solar energy systems shall be permitted only to provide power for use by owners, lessees, tenants, residents, or other occupants of the subdivision on which they are erected, but nothing contained in this provision shall be construed to prohibit collective solar installations or the sale of excess power through a net billing or net-metering arrangement in accordance with New York Public Service Law § 66-j or similar state or federal statute.
 - b) Solar energy systems shall be permitted under the Schedule of District Regulations when authorized by Site Plan approval from the Planning Board in conjunction with Minor or Major Subdivision review subject to the following terms and conditions in the AR-3, R-1, R-2, R-5, and H zoning districts so long as the solar energy system meets the criteria set forth in this subsection and Chapter 140, subject to obtaining all other necessary approvals.
 - c) The solar energy system shall be located on one or more lots of the subdivision.
 - d) All solar energy systems shall be designed, erected and installed in accordance with all applicable codes, regulations and standards.
 - e) A Homeowner's Association shall be established for the operation and maintenance of the solar energy system.
- (2) Site Plan requirements. A solar energy system designed for use in conjunction with a specific subdivision use shall comply with all the site plan requirements of Chapter 140 in addition to the subdivision requirements of Chapter 125. Additional requirements for the use shall include but not be limited to the following:
 - a) Maximum area. The maximum area of use for a solar energy system designed for a specific subdivision use shall occupy less than or equal to two (2) acres of land area of use.
 - b) Height and Setback. The height of the Solar Energy System shall not exceed fifteen (15) feet when oriented at maximum tilt. Setback requirements shall be as stated for the underlying zoning district.

- c) Lot Coverage. A Subdivision Solar Energy System shall be granted an additional ten percent (10%) bonus lot coverage of the lot on which it is to be installed for a specific zoning district as listed from the Schedule of District regulations. The surface area covered by Solar Panels shall be included in total lot coverage.
- d) The solar energy system shall be preferably located on an interior lot of the subdivision and placed away from contiguous residential use. Where a solar energy system designed for a specific subdivision use will abut other residential uses outside the boundaries of the subdivision, there shall be increased consideration for mitigating visual impact to the residential use. For example, increased setbacks, visual screening that does not impair solar access, or sound buffering may be required by the Planning Board.
- e) All solar energy production facilities shall be designed and located in order to prevent reflective glare onto roadways or adjacent structures.
- f) A minimum twenty-five (25) foot perimeter buffer; except for the area of roadway access; which may be partially or totally within the subdivision perimeter lot line setback, consisting of natural and undisturbed vegetation, supplemented with evergreen plantings in accordance with Town of Rochester zoning code standards, as may be required by the Planning Board, shall be provided around all mechanical equipment and solar panel arrays to provide screening from adjacent properties and Town, county and state roads. Landscape screening shall be provided in accordance with the landscaping provisions of this chapter. Existing on-site vegetation designated to be utilized as screening shall be preserved to the maximum extent possible and shall be diligently maintained to protect its vitality.
- g) Site plans shall be developed that provide for the preservation of natural vegetation in large unbroken blocks that also allow contiguous open spaces to be established when adjacent parcels are developed.
- h) A land grading and vegetation clearing plan shall be prepared. Clear-cutting of all trees in a single contiguous area shall be limited to the area of the equipment compound plus the area of an emergency access roadway and the area required for solar access.
- i) Debris, materials and/or mulch generated by site clearing or construction shall not be stockpiled onsite.
- j) Non-invasive ground cover under and between the rows of solar panels shall be low-maintenance, drought-resistant, and non-fertilizer-dependent.

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- k) All local stormwater regulations shall be complied with. The applicant shall comply with the State Pollutant Discharge Elimination System guidelines. If determined to be required, a SWPPP (Stormwater Pollution Prevention Plan) shall be prepared and a stormwater, erosion, and slope analysis of the land shall be required to be assessed by a New York State licensed professional engineer for the site and any road used to access the site.
- l) Conveyance of Energy to Subdivision Lots. The Site Plan shall show the pathways of utility service lines which will be put into place to convey energy to each lot of the subdivision. Necessary utilities to serve the site shall preferably be underground and in compliance with all local, State, and Federal laws, rules, and regulations, including specifically, but not limited to, the National Electrical Safety Code and the National Electrical Code where appropriate. Overhead lines shall follow access roads and/or existing tree lines to minimize visual impact upon surrounding properties.
- m) The applicant shall provide the means of restricting access by the public to the solar collector and indicate such on the site plan
- n) Signs. A sign no greater than two square feet indicating the name of the facility owner(s) and a 24-hour emergency telephone number shall be posted. In addition, "No Trespassing" or other warning signs may be posted. All signage shall be maintained in legible condition and contain accurate information. A clearly visible warning sign concerning voltage shall be placed at the base of all pad-mounted transformers and substations. No signage of any kind shall be allowed to be attached to solar panels or support structures, except any required safety warnings.
- o) Property Operation and Maintenance Plan. Such plan shall describe continuing photovoltaic maintenance and property upkeep, such as mowing and trimming.
- p) Proposed covenants and restrictions and a management plan for the proposed Homeowners Association (HOA).
- q) A decommissioning plan, as detailed in 140-37 (K), shall be prepared. Compliance with this plan shall be made a condition of the issuance of site plan approval under this Section.

I. Standards for Large-Scale Solar Systems as a Special Use

- (1) Large-Scale Solar Energy Systems are permitted through the issuance of a special use permit within AR-3, AB-3, R-5, NR, I, and H zoning districts, subject to the requirements set forth in this Section, including site plan approval. ~~Large-Scale Solar Energy Systems shall not be permitted to be constructed on areas of prime agricultural land classified as soil groups 1-3 as defined under the NYS Soil Classification System.~~

farm land + farmland statewide importance as classified by the US Department of Agriculture.