

**A LOCAL LAW # 2 FOR THE YEAR 2019
AMENDING THE LAND DEVELOPMENT CODE OF THE VILLAGE OF CHAUMONT, NEW YORK
TO REGULATE SOLAR ENERGY SYSTEMS**

NOW THEREFORE, be it enacted by the Village Board of the Village of Chaumont as follows:

Article II of the Village of Chaumont Development Code is hereby amended to include the following definitions.

BUILDING-INTEGRATED SOLAR ENERGY SYSTEM: A combination of photovoltaic building components integrated into any building envelope system such as vertical facades including glass and other façade material, semi-transparent skylight systems, roofing materials, and shading over windows.

GROUND-MOUNTED SOLAR ENERGY SYSTEM: A Solar Energy System that is directly anchored to the ground and attached to a pole or other mounting system, not attached or affixed to an existing structure, and detached from any other structure.

LARGE-SCALE SOLAR ENERGY SYSTEM: A solar energy system that produces energy primarily for supplying more than 200 kW of electrical energy into a utility grid for wholesale or retail offsite sale or consumption whether generated by photovoltaics, solar thermal devices or other solar technologies, and whether ground-mounted or building-mounted. A large-scale solar energy system may also be referred to as a “solar plant”, “solar energy system”, “commercial solar energy system” or “solar power plant”.

LOT COVERAGE, SOLAR ENERGY SYSTEM: the area measured from the outer edges of ground mounted arrays, batteries, storage cells, and all other mechanical equipment use to create solar energy, exclusive of fencing and unpaved roadways.

MEDIUM-SCALE SOLAR ENERGY SYSTEM: A ground mounted solar energy system or solar thermal system and produces between 25kW and 200 kW of electricity.

SMALL-SCALE SOLAR ENERGY SYSTEM: A roof-mounted or building-integrated solar energy system or solar thermal system servicing primarily the building or buildings on the parcel on which it is located for onsite consumption for either residential or business use, and limited to those rooftop and building-integrated, roof-mounted, and ground-mounted solar collectors that produce 25 kW or less electricity.

ROOF-MOUNTED SOLAR ENERGY SYSTEM: A solar panel system located on the roof of any legally permitted building or structure for the purpose of producing electricity or solar thermal power generation for onsite consumption.

SOLAR ENERGY EQUIPMENT: Electrical energy storage devices, material, hardware, inverters, or any other electrical equipment and conduit of photovoltaic devices associated with the production of electrical energy.

SOLAR ENERGY SYSTEM (SES): A photovoltaic (PV) electrical generating system composed of a combination of both Solar panels and Solar Energy Equipment.

SOLAR PANEL: A Photovoltaic device capable of collecting and converting solar energy into electrical energy.

Section 325 of the Village of Chaumont Land Development Code is hereby amended by adding the following use by site plan review in the Business Residential (BR) and Residential B (RB) Districts.

- (f) Large-Scale Solar Energy System
- (g) Medium-Scale Solar Energy System

Delete Section 330 – Unclassified Uses

Be it further enacted that Section 650 in Article VI of the Land Development Code of the Village of Chaumont shall be added as follows:

SECTION 650 – SOLAR ENERGY SYSTEMS

I. Purpose

The Village of Chaumont has determined that comprehensive regulations regarding the development of solar energy systems are necessary to protect the interests of the Village, its residents, and its businesses by advancing and protecting the public health, safety, and welfare of the Village of Chaumont by:

1. Taking advantage of a safe, abundant, renewable, and non-polluting energy resource;
2. Decreasing the cost of energy to the owners of commercial and residential properties, including single-family homes;
3. Accommodating solar energy systems while balancing the potential impact on neighbors and preserving the rights of property owners to install solar energy system; and
4. Promoting the effective and efficient use of solar energy resources, set provisions for the placement, design, construction and operation of such systems to be consistent with the Village of Chaumont Comprehensive Plan to ensure that such systems will not have a significant adverse impact on the environment, aesthetic qualities, and character of the Village.

II. Applicability

The requirements of this section shall apply to all Solar Energy Systems excluding Building-Integrated Solar Energy Systems. All Solar Energy Systems shall be designed, erected, installed, maintained, and repaired in accordance with all applicable codes, regulations and industry standards as referenced in the New York State Uniform Fire and Building Code, as well as may be required by the Public Service Commission regulations.

III. Small Solar Energy Systems

A. Roof-Mounted Small SES

- 1) Zoning permit. Roof-Mounted Solar Energy Systems that use the electricity onsite are permitted when attached to any lawfully permitted building or structure.
- 2) Height. Roof-Mounted Solar Energy Systems shall not exceed the maximum height restrictions of the zoning district within which they are located.
- 3) Aesthetics. Roof-Mounted Solar Energy System installations shall incorporate, when feasible, the following design requirements:
 - a. Panels facing the front yard must be mounted at the same angle as the roof's surface with a maximum distance of eighteen inches (18") between the roof and highest edge of the system.
 - b. Roof mounted structures shall be color-coordinated to harmonize with roof material and other dominant colors of the structure.
 - c. All solar collectors shall be installed so as to prevent any glare and heat that is perceptible beyond applicant property's lot lines.
- 4) Roof-Mounted Solar Energy Systems that use the energy onsite shall be exempt from Site Plan Review under the land development code or other land use regulations, unless such Roof-Mounted system increases the overall height of the structure by more than eighteen (18) inches, in which case a site plan review by the Planning Board shall be required.

B. Ground-Mounted Small SES

- 1) Zoning permit. Ground-Mounted Solar Energy Systems that use the electricity onsite are permitted as accessory structures. A valid zoning permit shall be obtained through the Village of Chaumont Zoning Enforcement Officer, prior to installation.
- 2) Height and Setback. Ground-Mounted Solar Energy Systems shall not exceed sixteen (16) feet in height when oriented at maximum tilt. They shall be setback at least twenty (20) feet from side and rear lot lines. All solar collectors must be located in compliance with NYS Department of Environmental Conservation (DEC) and Federal Flood Plain regulations and specifications as they pertain to waterways, waterbodies, and designated wetlands.
- 3) Lot Coverage. Systems are limited to a maximum coverage of forty (40) percent.
- 4) All such Systems shall be installed in the side or rear yards only.
- 5) Glare. All solar collectors shall be installed so as to prevent any glare and heat that is perceptible beyond subject property's lot lines. Particular attention shall be paid to panel orientation with regard to airport runway locations, airplane flyover/approach patterns, and emergency helicopter landing areas to minimize potential glare impacts on pilots.

IV. Medium-Scale Solar Energy Systems

A. Medium-Scale Solar Energy Systems are permitted through Site Plan Review subject to the requirements set forth in this Section. Applications for the installation of a Medium-Scale Solar Energy System shall be reviewed by the Enforcement Officer and then referred to the Planning Board for its review and recommendation to the Village Board of Trustees.

- 1) All Medium-Scale Solar Energy System shall be designed by a NYS licensed architect or licensed engineer and installed in conformance with the applicable International Building Code, International Fire Prevention Code and National Fire Protection Association (NFPA) 70 Standards.
- 2) All solar collectors must be located in compliance with NYS DEC and Federal Flood Plain regulations and specifications as they pertain to waterways, waterbodies, and designated wetlands.
- 3) **Application requirements for Medium-Scale Solar Energy System.** The following items are required as well as those set forth in Section 415:
 - a. If the property of the proposed project is to be leased, legal consent between all parties, specifying the use(s) of the land for the duration of the project, including easements and other agreements, shall be submitted.
 - b. Blueprints signed by a Professional Engineer or Registered Architect showing the layout of the Solar Energy System shall be required. Plans shall show the proposed layout of the entire Solar Energy System along with a description of all components, whether on site or off site, including existing vegetation, existing or proposed access, gates, parking areas, mounting systems, inverters, panels, fencing, proposed clearing and grading of all sites involved, as well as proposed buffering and screening.
 - c. The equipment specification sheets shall be documented and submitted for all proposed photovoltaic panels, significant components, mounting systems, and inverters to be installed. Photo simulations shall be included showing the proposed Medium-Scale Solar Energy System in relation to the building/site along with elevation views and dimensions, and manufacturer's specifications and photos of the proposed Medium-Scale Solar Energy System, solar collectors, and all other components must also be submitted. The Planning Board may require photo simulations to be provided from specific roads or other public areas that may be impacted.
 - d. A clearing and grading plan that shall also include methods to stockpile, reduce erosion of, and reuse all top soil from the site. If one acre or more of land is to be disturbed, the applicant shall also submit a Stormwater Pollution Prevention Plan consistent with NYS DEC requirements. Clearing and/or grading activities are subject to review by the Planning Board and shall not commence until the issuance of site plan approval.
 - e. A Property Operation and Maintenance Plan. It shall be submitted and shall include at a minimum: schedule for maintenance of the photovoltaic panels and equipment,

frequency of visits of maintenance personnel, schedule of maintenance of vegetative screening and process for replacement of dead vegetation, and schedule of mowing.

- f. Applicants shall produce evidence of a consultations with Wheeler-Sack Army Airfield and the Watertown International Airport regarding potential negative impacts of the project on their facilities and air traffic patterns. At a minimum, a letter shall be provided from each facility stating they have reviewed the project and any comments.

4) **Review Standards for Medium-Scale Solar Systems.**

- a. **Height and Setback.** Medium-Scale Solar Energy Systems shall not exceed sixteen (16) feet in height when oriented at maximum tilt. Solar structures and equipment shall be setback a minimum of fifty (50) feet from lot lines in the BR district and 100' in the RB district unless located adjacent to a lot containing a single or multi-family residence then a minimum setback of 200 feet is required. Solar structures that are adjacent
- b. **Lot Coverage.** A Medium-Scale Solar Energy System that is ground-mounted shall not exceed 50 percent of the total size of the lot or parcel on which it is installed.
- c. **Roadways.** In accordance with National Fire Protection Association, all access roads shall be a minimum of twenty (20) feet wide to assure adequate emergency and service access. Dead end roads that are at least 150 feet in length shall be provided with approved provisions for the turning around of fire apparatus. Maximum use of existing roads, public or private, shall be made. Minimal access points shall be allowed by the Planning Board. A turnaround shall be provided at the gate.
- a. **Fences.** All Medium-Scale Solar Energy Systems shall be enclosed by seven (7) foot high fencing to prevent unauthorized access. The type of fencing and placement of the gate shall be determined by the Planning Board. The fencing and the system may be further screened by any landscaping needed to avoid adverse aesthetic impacts.
- d. **Screening.** All Medium-Scale Solar Energy Systems shall have the least visual effect practical, as determined by the Planning Board. Based on site specific conditions, including topography, adjacent structures and roadways, reasonable efforts shall be made to minimize visual impacts by preserving natural vegetation, and providing berms or landscape screening consisting of native species to abutting residential properties, public roads, public sites, and known areas of important views or vistas, but screening should minimize the shading of solar collectors. No more than fifteen (15) percent of the total existing brush, trees, and other perimeter screening vegetation on a parcel of property may be removed in order to accommodate a solar energy system. Appurtenant structures such as inverters, batteries, equipment shelters, storage facilities, transformers, shall also be screened as above.
- e. **Vegetation.** Appropriate landscaping and/or site design features, including both the maintenance of existing natural vegetation and the introduction of new plantings consisting of a naturally appearing blend of deciduous and coniferous species, shall be required to help screen the facility and accessory structures from roads,

neighboring residences, and other uses. Any existing tree or group of trees which stands within or near a required planting area may be used to satisfy the screening and tree planting requirements. The protection of tree stands, rather than individual trees, is strongly encouraged.

Landscaping to attain 80% screening shall be some combination of the following, to encourage a more natural landscape:

- i. 1 canopy tree per 50'
 - ii. 10 understory trees per 50'
 - iii. 15 shrubs per 50'
- f. Signage. The manufacturers or installer's identification, contact information, and appropriate warning signage shall be posted at the site and clearly visible. Solar equipment shall not be used for displaying any advertising. All signs, flags, streamers or similar items, both temporary and permanent, are prohibited on solar equipment except: (a) manufacturer's or installer's identification; (b) appropriate warning signs and placards; (c) signs that may be required by a federal agency; and (d) signs that provide a 24-hours emergency contact phone number and warn of any danger.
- g. Glare. Solar panels shall be placed and arranged such that reflected solar radiation or glare shall not be directed onto adjacent buildings, properties, or roadways. Exterior surfaces of all collectors and related equipment shall have a non-reflective finish. Particular attention shall be paid to panel orientation with regard to airport runway locations, airplane flyover/approach patterns, and emergency helicopter landing areas to minimize potential glare impacts on pilots.
- h. Noise. Noise producing equipment such as substations and inverters shall be located to minimize noise impacts on adjacent properties. Their setback from property lines should achieve no discernable difference from existing noise levels at the property line.
- i. Safety. The owner/operator shall provide a letter from the Fire Chiefs of the Chaumont Fire Department and the Three Mile Bay Fire Department verifying their review of the application and site plan and providing any comments. All means of shutting down the photovoltaic solar energy system shall be clearly marked on the site plan and building permit applications.
- j. Stormwater Management. The Solar Energy System shall be designed with the ground cover as pervious to the maximum extent practicable so that stormwater infiltrates as sheet flow across the system. If solar panels are constructed in such a manner as to promote effective infiltration of rainfall the Solar Energy System may be considered pervious for stormwater pollution prevention purposes. Other structures such as but not limited to transformers, buildings, or paved entrance roads shall still be considered impervious. The following criteria must be met in order to establish a Solar Energy System as pervious cover:

- a. Panels must be positioned to allow water to run off their surfaces.
 - b. Soil with adequate vegetative cover must be maintained under and around the panels.
 - c. The area around each panel must be adequate to ensure proper vegetative growth under and between the panels.
- k. The Planning Board may impose conditions on its approval of any Site plan review under this Section in order to enforce the standards referred to in this Section or in order to discharge its obligations under the State Environmental Quality Review Act (SEQRA).

V. Large Scale Solar Energy Systems

B. Large-Scale Solar Energy Systems are permitted through Site Plan Review subject to the requirements set forth in this Section. Applications for the installation of a Large-Scale Solar Energy System shall be reviewed by the Enforcement Officer and then referred to the Planning Board for its review and recommendation to the Village Board of Trustees.

- 4) All Large-Scale Solar Energy System shall be designed by a NYS licensed architect or licensed engineer and installed in conformance with the applicable International Building Code, International Fire Prevention Code and National Fire Protection Association (NFPA) 70 Standards.
- 5) All solar collectors must be located in compliance with NYS DEC and Federal Flood Plain regulations and specifications as they pertain to waterways, waterbodies, and designated wetlands.
- 6) Application requirements for Large-Scale Solar Energy System. The following items are required as well as those set forth in Section 415:
 - g. If the property of the proposed project is to be leased, legal consent between all parties, specifying the use(s) of the land for the duration of the project, including easements and other agreements, shall be submitted.
 - h. Blueprints signed by a Professional Engineer or Registered Architect showing the layout of the Solar Energy System shall be required. Plans shall show the proposed layout of the entire Solar Energy System along with a description of all components, whether on site or off site, including existing vegetation, existing or proposed access, gates, parking areas, mounting systems, inverters, panels, fencing, proposed clearing and grading of all sites involved, as well as proposed buffering and screening.
 - i. The equipment specification sheets shall be documented and submitted for all proposed photovoltaic panels, significant components, mounting systems, and inverters to be installed. Photo simulations shall be included showing the proposed Large-Scale Solar Energy System in relation to the building/site along with elevation views and dimensions, and manufacturer's specifications and photos of the proposed Large-Scale Solar Energy System, solar collectors, and all other components must also be submitted. The Planning Board may require photo

simulations to be provided from specific roads or other public areas that may be impacted.

- j. A clearing and grading plan that shall also include methods to stockpile, reduce erosion of, and reuse all top soil from the site. If one acre or more of land is to be disturbed, the applicant shall also submit a Stormwater Pollution Prevention Plan consistent with NYS DEC requirements. Clearing and/or grading activities are subject to review by the Planning Board and shall not commence until the issuance of site plan approval.
- a. Property Operation and Maintenance Plan. Such Plan shall include at a minimum: schedule for maintenance of the photovoltaic panels and equipment; frequency of visits of maintenance personnel; schedule of maintenance of vegetative screening and process for replacement of dead vegetation; schedule of mowing.
- b. Glint and Glare Analysis Report shall be required to determine potential impacts to the Watertown International Airport and Wheeler-Sack Army Airfield. The Report shall take into consideration takeoff, approach, flight patterns, training operations in the area, and emergency helicopter landing sites.
- c. Screening Plan. Such plan shall describe and show the location of proposed features that will mitigate the view from public areas, streets, roads, and residential properties.
- d. Decommissioning.
 - a. Solar Energy Systems that have been abandoned or have not produced electricity for a period of [1] year shall be removed at the Owner and/or Operators expense, the cost of which may come from any security made with the Village of Chaumont as set forth in Section 10(b) herein.
 - b. A Decommissioning Plan signed by the owner and/or operator of the Solar Energy System shall be submitted by the applicant, addressing the following:
 - i. The cost of removing the Solar Energy System.
 - ii. The time required to decommission and remove the Solar Energy System and ancillary structures.
 - iii. The time required to repair any damage caused to the property by the installation and removal of the Solar Energy System.
- e. Security.
 - a. The deposit, executions, or filing with the Village Clerk of cash, bond, or other form of security reasonably acceptable to the Village attorney and/or engineer, shall be in an amount sufficient to ensure the good faith performance of the terms and conditions of the permit issued pursuant hereto and to provide for the removal and restorations of the site subsequent to removal. The amount of the bond or security shall be 125 % of the cost of removal of the Large or Medium Solar Energy System

and restoration of the property with an escalator of 2 % annually for the life of the Solar Energy System. The decommissioning amount shall be reduced by the amount of any estimated salvage value of the Solar Energy System.

b. In the event of default upon performance of such conditions, after proper notice and expiration of any cure periods, the cash deposit, bond, or security shall be forfeited to the Village, which shall be entitled to maintain an action thereon. The cash deposit, bond, or security shall remain in full force and effect until restoration of the property as set forth in the decommissioning plan is completed.

c. Upon cessation of electricity generation of a Solar Energy System on a continuous basis for 12 months, the Village may notify and instruct the owner and/or operator of the Solar Energy System to implement the decommissioning plan. The decommissioning plan must be completed within 360 days of notification.

d. If the owner and/or operator fails to comply with decommissioning upon any abandonment, the Village may, at its discretion, utilize the bond and/or security for the removal of the Solar Energy System and restoration of the site in accordance with the decommissioning plan.

4) Review Standards for Large-Scale Solar Systems.

b. Height and Setback. Large-Scale Solar Energy Systems shall not exceed sixteen (16) feet in height when oriented at maximum tilt.

c. Solar structures and equipment shall be setback a minimum of fifty (50) feet from lot lines unless such structures or equipment are located adjacent to a residential district or residence then a minimum setback of 200 feet is required.

d. Lot Coverage. A Large-Scale Solar Energy System that is ground-mounted shall not exceed 50 percent of the total size of the lot or parcel on which it is installed. The surface area covered by Solar Panels shall be included in total lot coverage.

e. Fences. All Large-Scale Solar Energy Systems shall be enclosed by seven (7) foot high fencing to prevent unauthorized access. The type of fencing and placement of gate shall be determined by the Planning Board. The fencing and the system may be further screened by any landscaping needed to avoid adverse aesthetic impacts.

f. Screening. All Large-Scale Solar Energy Systems shall have the least visual effect practical, as determined by the Planning Board. Based on site specific conditions, including topography, adjacent structures, and roadways, reasonable efforts shall be made to minimize visual impacts by preserving natural vegetation, and providing berms or landscape screening consisting of native species to abutting residential properties, public roads, public sites, and known areas of important views or vistas, but screening should minimize the shading of solar collectors. No more than fifteen (15) percent of the total existing brush, trees, and other perimeter screening vegetation on a parcel of property may be removed in order to accommodate a solar energy system. Appurtenant structures such as inverters, batteries, equipment shelters, storage facilities, transformers, shall be screened from off-site.

- g. Vegetation. All large-scale Solar Energy Systems shall be completely screened with a vegetative buffer or landscaping from all streets and adjacent residential uses. Appropriate landscaping and/or site design features, including both the maintenance of existing natural vegetation and the introduction of new plantings consisting of a naturally appearing blend of deciduous and coniferous species, shall be required to help screen the facility and accessory structures from roads, neighboring residences, and other uses. Any existing tree or group of trees which stands within or near a required planting area may be used to satisfy the screening and tree planting requirements. The protection of tree stands, rather than individual trees, is strongly encouraged.

Landscaping to attain 80% screening shall be some combination of the following, to encourage a more natural landscape:

- i. 1 canopy tree per 50'
 - ii. 10 understory trees per 50'
 - iii. 15 shrubs per 50'
- h. Signage. Warning signs with the owner's contact information shall be placed on the entrance and perimeter of the fencing. Solar equipment shall not be used for displaying any advertising. All signs, flags, streamers or similar items, both temporary and permanent, are prohibited on solar equipment except: (a) manufacturer's or installer's identification; (b) appropriate warning signs and placards; (c) signs that may be required by a federal agency; and (d) signs that provide a 24-hours emergency contact phone number and warn of any danger.
 - i. Glare. Solar panels shall be placed and arranged such that reflected solar radiation or glare shall not be directed onto adjacent buildings, properties, or roadways. Exterior surfaces of all collectors and related equipment shall have a non-reflective finish. Particular attention shall be paid to panel orientation with regard to airport runway locations, airplane flyover/approach patterns, and emergency helicopter landing areas to minimize potential glare impacts on pilots.
 - j. Noise. Noise producing equipment such as substations and inverters shall be located to minimize noise impacts on adjacent properties. Their setback from property lines should achieve no discernable difference from existing noise levels at the property line.
 - k. Access Roads. In accordance with National Fire Protection Association, all access roads shall be a minimum of twenty (20) feet wide to assure adequate emergency and service access. Dead end roads that are at least 150 feet in length shall be provided with approved provisions for the turning around of fire apparatus. Maximum use of existing roads, public or private, shall be made. Minimal access points shall be allowed by the Planning Board. A turnaround shall be provided at the gate.

- I. Safety. The owner/operator shall provide a letter from the Fire Chief of the Chaumont Fire Department and the Three Mile Bay Fire Department that the Departments have reviewed the application and site plan and provided any comments. All means of shutting down the photovoltaic solar energy system shall be clearly marked on the site plan and building permit applications.

- m. The Planning Board may impose conditions on its approval of any Site plan review under this Section in order to enforce the standards referred to in this Section or in order to discharge its obligations under the State Environmental Quality Review Act (SEQRA).

VI. Solar Rights

- A. Pursuant to Chapter 7-704 of New York Village Law, all parcels within the Village of Chaumont shall be permitted to enjoy access to direct sunlight.

- B. No structure shall be constructed or vegetation installed that limits direct solar access greater than 50 percent of the ground surface of adjoining lots to less than six hours (per day) on any day of the year.

BE IT FURTHER RESOLVED THAT, this local law shall supersede all prior inconsistent local laws, ordinances or regulations.

BE IT FURTHER RESOLVED THAT, this local law shall take effect immediately upon filing with the Secretary of State of the State of New York.