Building-mounted Solar Energy System	A solar energy system that is structurally mounted to a building or structure. A Building-mounted SES can be mounted on the roof or façade of a building or structure.
Ground-mounted Solar Energy System	A solar energy system that is structurally mounted to the ground. Ground-mounted SES can be further classified as Small-scale SES and Large-scale SES.
Small-scale Solar Energy System	A Ground-mounted SES that is less than or equal to 40,000 square feet in panel area.
Large-scale Solar Energy System	A Ground-mounted SES that is greater than 40,000 square feet in panel area.
Municipal Utility Solar Energy System	A solar energy system constructed in partnership with a municipal electric utility and located within the corporate limits of the municipality.
Solar Panel	A photovoltaic device capable of collecting and converting solar energy into electrical energy.
Solar Energy System (SES)	An energy system, and all related solar energy equipment, that uses the power of the sun to capture, store, and transmit energy.
Solar Energy Equipment	Electrical energy storage devices, material, hardware, inverters, or other electrical equipment and conduit of photovoltaic devices associated with the production of electrical energy.

SECTION 10.0 UTILITIES: SOLAR ENERGY SYSTEMS (SES)

10.1 INTENT

It is the intent of this Section to protect the public health and safety of Henry County while accommodating alternative energy needs by establishing requirements and regulations for the placement, construction, modification, and removal of solar energy systems.

10.2 APPLICABILITY

The regulations of this Section shall apply to all lands and land uses and structures in the unincorporated areas of Henry County and in incorporated towns and cities that have designated the Planning Commission as their planning agency.

10.3 EXEMPTIONS

Any SES constructed prior to the effective date of this Section shall not be required to meet the terms and conditions of this Ordinance. Any physical modification to an existing SES whether or not existing prior to the effective date of this Section that materially alters the SES shall require approval under this Ordinance. Routine maintenance or like-kind replacements do not require a permit.

10.4 PROHIBITION

No Applicant, person or entity shall construct, operate, or locate within Henry County a Solar Energy System (SES) without having fully complied with the provisions of this Ordinance.

10.5 COMPLIANCE WITH OTHER LAWS AND ORDINANCES

All SES shall comply with all Federal, State and local laws and ordinances including, but not limited to building codes, fire codes, placement in floodplains, historic preservation districts, and applicable FAA regulations, including any necessary approvals for installations close to airports.

10.6 METHOD OF MEASUREMENT

Solar Energy Systems shall be measured in the following manner:

- A. Area The area of the SES shall be determined by the total surface area of all the panels located on a parcel.
- B. Height The height of the SES shall be calculated as the distance from grade or roof to the top of the solar panel at its greatest incline.
- C. Projection The projection of a facade-mounted SES is measured from the facade to the outside edge of the SES that is perpendicular to the ground.
- D. Setback Setbacks for Ground-mounted SES shall be measured from the property line to the edge of the nearest SES above ground equipment.

10.7 BUILDING-MOUNTED SOLAR ENERGY SYSTEMS REGULATIONS

A. Building-mounted SES are a permitted use in all zoning districts under the following requirements:

- 1. Building-mounted SES may exceed the maximum allowed building height of the building or structure on which it is located by five (5) feet in residential districts and ten (10) feet in all other districts.
- 2. Building-mounted SES may project off a building façade up to three(3) feet into the required setback.
- 3. Building-mounted SES may be installed on legally established nonconforming buildings as long as the installation of the SES does not increase the nonconformity, except for the allowances in height and projection as outlined above.
- 4. Building-mounted SES shall be located in such a manner as to ensure emergency access to the roof, provide pathways to specific areas of the roof, and provide for smoke ventilation opportunities. Buildingmounted SES shall be located in accordance with the Indiana Fire Code.

10.8 GROUND-MOUNTED SOLAR ENERGY SYSTEMS REGULATIONS

A. Small-scale Solar Energy Systems

Small-scale Solar Energy Sytems are ground-mounted SES that are less than or equal to 40,000 square feet in panel area.

Small-scale SES are a permitted use in all zoning districts under the following requirements:

- 1. Small-scale SES shall not be taller than twenty (20) feet above grade.
- 2. Small-scale SES shall meet the required setbacks of the district in which they are located. Setbacks shall be the same as what is required for accessory buildings. Setbacks shall be measured from the property line to the nearest piece of above ground solar energy equipment.
- 3. Small-scale SES shall not be located over a septic field, unless approval is granted from the Henry County Health Department.
- 4. Small-scale SES shall only be permitted in the rear and side yard, with the following exception:

The Zoning Administrator may authorize the installation of a ground mounted SES in front of the principal building, if the applicant demonstrates that, due to solar access limitations, no location exists on the property other than the front yard where the solar panel can perform effectively. In such cases the SES must meet the front yard setback of the zoning district in which it is to be located.

- 5. Small-scale SES shall not be placed within any legal easement or right-of-way location except if permission is granted in writing by the owner of right-of-way or easement. Nor should it be placed within the legal easment of any Henry County Drain except if permission is granted in writing by the Henry County Surveyor and/or the County Drainage Board.
- 6. Small-scale SES shall be exempt from all required landscaping.
- 7. Site Plans shall be submitted to the Zoning Administrator with the Application for an Improvement Location Permit and reviewed as described in Tile 1 Paragraph 14.8 of the Development Code.
- B. Large-Scale Solar Energy Systems

Large-scale Solar Energy Sytems are ground-mounted SES that are greater than 40,000 square feet in panel area.

Large-scale Solar Energy Sytems require a Commission Approved Use in R1, R2, and R3 Residential Districts, as well as Rural Residential (RR) Districts with less than 5 acres.

Site Plans shall be submitted to the Zoning Administrator with the Application for an Improvement Location Permit and reviewed as described in Tile 1 Paragraph 14.8 of the Development Code.

Plan schematics are to include a wiring diagram, where a separate shut off has been included for fire safety and made available to the appropriate fire department or district.

Large-scale SES are a permitted use in all other zoning districts under the following requirements:

- 1. Height and Setbacks
 - a. Large-scale SES shall not be taller than twenty (20) feet above grade.
 - Setbacks shall be measured from the property line to the nearest piece of above ground solar energy equipment.
 Setbacks do not apply to underground cabling, fencing, access roads/lanes or ingress/egress roads.

- c. Large-scale SES shall be set back a minimum of ninety (90) feet from the center of any adjoining public road.
- d. Large-scale SES shall be setback a minimum of fifty (50) feet from any nonparticipating adjoining parcel.
- e. Participating and non-participating parcel owners may waive setback requirments by filing written consent with the Zoning Administrator.
- 2. Landscaping and Screening
 - a. For security, a Large-scale SES shall be completely enclosed by a six (6) foot high fence with a locking gate.
 - b. A sign shall be securely posted on each gate entry point clearly displaying an emergency telephone number(s) and other contact information.
 - c. Pollinator-friendly seed mixes and native plants are required around the SES at a rate of two (2) square feet of plantings for every one (1) square foot of solar panels. (For reference, best practices, and maintenance information see *Technical Guide; Establishment and Maintenance of Pollinator-Friendly Solar Projects (2020) - Northern Indiana - Michiana Area Council of Governments, as amended,* or alternate pollinator guides that may be provided by the Zoning Administrator.)

Large-scale SES may claim that the site provides benefits to pollinators only if the site adheres to guidance set forth by the Purdue University Extension or an Indiana state government agency. If no such standard exists, the applicant can use following best management practices:

- i. Ground around and under solar panels and in project site buffer areas shall be planted, established, and maintained for the life of the solar project in perennial native vegetated ground cover to the maximum extent feasible and economical.
- ii. To the maximum extent feasible and economical, perennial vegetation ground cover shall be based on a diverse seed mix of native species, or in the alternative, based on guidance specific to the local area provided by the National Resources Conservation Service, Soil and Water Conservation District, or Conservation District.

- iii. The site shall be planted and maintained to be free of all invasive species, as listed by the Indiana Invasive Species Council.
- iv. No insecticide use is permitted on the site. This provision does not apply to insecticide use in on-site buildings, in and around electrical boxes, or as otherwise may be deemed necessary to protect public health and safety.
- d. Alternate ground cover landscaping plans that encourage the use of the property for agricultural proposes, such as grazing or under panel crops may be submitted for consideration. Such alternate agricultural based plans must fully detail the estimated yearly schedule for planting or grazing. The owner or operator of the Large-scale SES must submit and receive approval by the Zoning Administrator for any deviations or changes to the originally submitted agricultural based plans.
- e. Landscaping along right-of-ways is not required.
- f. Where a Large-scale SES abuts a nonparticipating adjoining pacel which has a legal dwelling within one hundred (100) feet of the SES parcel's property line, a landscaping buffer shall be installed along the entire length of where the two (2) parcels abut. The buffer must consist of either/or:
 - i. A six (6) foot tall earthen berm planted with grass and/or other appropriate vegetative ground cover.
 - ii. A row of evergreen trees, at least 3 feet tall at the time construction, planted at five (5) foot Intervals.
 - iii. An existing tree line may count as a sufficient barrier if the trees and vegetation are deemed to be of adequate size and health by the Zoning Administrator.
 - iv. Opaque fencing is not considered an acceptable landscaping buffer.
 - v. Nonparticipating parcel owners may waive landscaping requirments by filing written consent with the Zoning Administrator.

- g. The Zoning Administrator may approve any substitute landscape proposal that he/she deems to be equivalent to, or greater than, the options given.
- h. All landscaping materials shall be installed and maintained according to accepted nursery industry procedures. The owner of the SES shall be responsible for the continued property maintenance of all landscaping materials and shall keep them in a proper and orderly appearance free from refuse and debris at all times.
- i. Failure to follow or maintain the approved SES landscaping plan will result in the revoking of the Improvement Location Permit and the SES being deemed abandoned.
- 3. Drainage, Flood, and Erosion Control
 - a. A detailed drainage plan compliant with the requirements of the Henry County Stormwater Ordinance shall be submitted and approved of by the Henry County Drainage Board proir to reciving an Improvement Location Permit.
 - b. In instances where the project is required to comply with IDEM erosion control regulations, proper approvals shall be submitted indicating the plans have been approved.
 - c. Any project within a special flood hazard area shall comply with all standards required under the Henry County Flood Damage Prevention Ordinance.
 - d. All damages to waterways, drainage ditches, field tiles, or any other infrastructures caused by the construction or maintenance of a Large-scale SES, must be completely repaired to better than original condition, so as not to impede the natural flow of water. All repairs must be completed within a reasonable amount of time agreed upon by the Henry County Surveyor.
- 4. Abandonment and Removal
 - a. A Large-scale SES which has reached the end of its useful life or has been abandoned shall be removed by the owner or operator. The owner or operator shall physically remove the installation no more than 120 days after the date of discontinued operations, or by a timeframe determined by the Zoning

Administrator for extenuating circumstances. For large-scale SES, decommissioning shall consist of:

- i. Physical removal of all SES, structures, transmission lines, and equipment above and below ground from the site;
- Disposal of all solid and hazardous waste in accordance with local, state, and federal waste disposal regulations; and
- iii. The owner shall restore the site to its condition prior to location of the SES (excluding replanting of original vegetation and trees), and shall stabilize soils through use of ground cover. All concrete, asphalt, gravel and rebar must be removed from the soil.
- b. A Large-scale SES shall be considered abandoned when it fails to operate for more than one year without the written consent of the Zoning Administrator.
- c. If the owner or operator of the Large-scale SES fails to remove the installation in accordance with the requirements of this section within 90 days of abandonment or the proposed date of decommissioning, the County retains the right, after the receipt of an appropriate court order, to enter and remove an abandoned, hazardous, or decommissioned Ground-mounted SES. As a condition of issuance of an Improvement Location Permit, the applicant and landowner shall agree to allow entry to remove an abandoned, hazardous, or decommissioned installation.
- d. Prior to receiving an Improvement Location Permit, any owner of a Large-scale SES shall establish a cash security fund, bond, irrevocable letter of credit or other means as determined by the Henry County Board of Commissioners. This fund is meant to secure the payment of removing any abandoned SES. The removal shall include the solar panels and associated equipment and buildings that have been determined to be abandoned, or found to be in non-compliance with this chapter. The fund shall contain and be maintained at the amount of 125% of the cost of demolition and removal of the SES, up to a maximum of \$250,000, based upon a licensed engineer's estimate of the cost of demolition and removal. The established fund will be used by Henry County to deduct fines and penalties for non-compliance with this Chapter or other applicable laws.

Any reduction in the security fund provided, because of deductions of fines, penalties, or removal costs, shall be replenished to the total of the required amount within 30 days after notice from Henry County of the amount deducted and the deficiency created hereby. Within three months after the SES is removed, any remaining funds on deposit with Henry County pursuant to this Chapter, after application and above all expenses provided for herein, shall be refunded to the appropriate owner or provider who created the security fund. The requirement for a security fund shall not apply to a municipal corporation or a school corporation, as defined in IC 36-1-2-10 and 17 respectively.

- C. Municipal Utility Solar Energy Systems
 - 1. Any Municipal Electric Utility is exempt from the regulation in this Section if:
 - i. The SES is to be located entirely within the municipal corporate limits,
 - ii. The municipal governing body provides a signed resolution to the Planning Commission approving the construction of a SES within their corporate limits, and
 - iii. The municipal governing body provides a signed resolution to the Henry County Board of Commissioners holding the County harmless for any issues or financial responsibilities that may occur from the Municipal Utility SES.
 - 2. Municipal Utility SES are not exempt from obtaining, and paying fees for Building and Improvement Location Permits.
 - 3. Municipal residents are still subject to all the requirements of this Section related to Small-scale Solar Energy Systems.