TAMA COUNTY UTILITY SCALE

SOLAR ENERGY ORDINANCE

WHEREAS, Tama County, Iowa desires to regulate all utility-scale solar energy systems within Tama County in areas zoned Agricultural, except as otherwise prohibited; and

WHEREAS, the Tama County Board of Supervisors desires to facilitate the construction, installation, and operation of utility-scale solar energy systems in a manner that promotes economic development, protects property values, and ensures the protection of the health, safety and welfare of all inhabitants of Tama County while also avoiding adverse and detrimental impacts to rural residents, their economies, unsightliness on agricultural lands, conservation lands and other sensitive lands; and

WHEREAS, the Tama County Board of Supervisors is empowered to regulate the orderly development and proper use of solar energy by establishing certain procedures for obtaining access to solar energy under certain of the provisions of Iowa Code Chapter 564A; and

WHEREAS, The Tama County Board of Supervisors has taken into consideration the thoughts, beliefs, suggestions and views of Tama County citizens and residents in the construct of this Ordinance.

NOW, THEREFORE, BE IT HEREBY ORDAINED by the Tama County Board of Supervisors:

Section 1. Utility Scale Solar Energy Systems.

a. The requirements of this Ordinance shall apply only to all Utility-Scale Solar Energy Systems proposed after the effective date of this Ordinance. This Ordinance shall apply only to Utility Scale Solar Energy Systems, intended and constructed to generate less than a total capacity of 25 megawatts. Systems with a total capacity of more than 25 megawatts are forbidden under this Ordinance as it presently requires approximately 10 acres of land to create a 1 megawatt output using current solar panel energy.

b. This Ordinance shall not be construed to apply to or displace the Tama County Solar Zoning Ordinance created in October, 2019 and now found in Chapter XIX of the Tama County Zoning Ordinances, as that Ordinance pertains only to allow "Residential and Non-Residential solar energy systems as an accessory use to permitted, conditional and special exception uses in any zoning district".

c. This Ordinance shall be construed to be consistent with the Tama County Land Use Plan adopted February 4, 1986 where in Paragraph one (1) it is stated: "We would discourage the use of prime agricultural land for anything other than agricultural production; generally this would be land with a corn suitability rating (CSR) of more than 60, reference the Iowa State University Publication PM 1168, October 1984. There is adequate land available in Tama County with a CSR of less than 60 for non-agricultural purposes."

Section 2. Definitions.

a. "'Solar Energy' means energy emitted from the sun and collected in the form of heat or light by a solar collector." Iowa Code Section 564A.2(7).

b. "'Solar collector' means a device or structural feature . . . that collects solar energy and that is part of a system for the collection, storage, and distribution of solar energy." Iowa Code Section 564A.2(6).

c. "'Solar access easement' means an easement recorded under section 564A.7, the purpose of which is to provide continued access to incident sunlight necessary to operate a solar collector." Iowa Code Section 564A.2(4). This easement shall express the limits of height and location for development of the solar farm's panels for the purpose of providing solar access to the dominant estate in keeping with Iowa Code Section 564A.1(b, e, and g) and Section 564A.7(2)(b). This easement shall be approved by Order of the Solar Access Regulatory Board, under Section 564A.5 prior to recording, and before installation and construction of any aspect of the solar farm. Iowa Code Section 564A.4(1).

d. "'Dominant estate' means that parcel of land to which the benefits of a solar access easement attach.", Iowa Code Section 564A.2(2), which is obtained from the owner of the real property under a solar access easement. The "dominant estate" includes every transferee and successor in interest of the original dominant owner, including but not limited to those who own the solar collectors and equipment constituting the solar farm.

e. "'Servient estate' means land burdened by a solar access easement, other than the dominant estate", Iowa Code Section 564A.2(3), which is left to the owner of the

real property after a dominant estate has been acquired under a solar access easement.

f. "'Solar access regulatory board' means that board designated by a . . . county board of supervisors under section 564A.3 to receive and act on applications for a solar access easement . . ." Iowa Code Section 564A.2(5).

g. 'Solar panel' means a composition of groups of individual solar cells (or solar collectors) used to convert solar energy into electrical current.

h. 'Solar array' means a group of panels connected together.

i. 'Solar glare' means the effect produced by sunlight reflecting from a solar panel with intensity sufficient to cause annoyance, discomfort or loss in visual performance in visibility in humans and farm animals.

j. "Solar Energy Utility-Scale Generation" means a group of interconnected solar panels/arrays that convert sunlight into electricity for the primary purpose of wholesale or retail sales of generated electricity in projects for 25 Megawatts and under. Projects of over 25 Megawatts, which are under the jurisdiction of the Iowa Utility Board by Iowa Code Section 476A.1(5) and 199 Iowa Administrative Code Chapter 24, shall not be granted in Tama County.

k. 'Solar Farm' means a commercial facility that converts sunlight into electricity, whether by photovoltaics, or other conversion technology, for the primary purpose of wholesale or retail sales of generated electricity. A solar farm, defined by any Decision of the Solar Access Regulatory Board, under Iowa Code Section 564A.5, is the principal land use for the parcel on which it is located.

l. 'Solar Access' means an unobstructed access to direct sunlight on a lot through the entire calendar year, including access across adjacent parcel air rights, for the purpose of capturing direct sunlight to operate a solar energy farm.

m. "Concentrating Solar Power" (CSP) systems, means systems that generate power by using mirrors or lenses to concentrate a large area of sunlight, or solar therapy energy, onto a small area. Electricity is generated when the concentrated light is converted to heat, which drives a heat engine (usually a steam turbine) connected to an electrical power generator or powers a thermochemical reaction. CSP systems are prohibited under this Ordinance.

n. "CSR" means corn suitability rating. A CSR shall be obtained by the proposed dominant owner for that parcel described in the solar access easement and distinctly stated in the Application for solar access easement, under Iowa Code Section 564A.4, showing the date of and the agronomist or other agricultural specialist making that calculation which shall be appended to the Application. A CSR of 60 or more shall disqualify the Application for consideration by the solar access regulatory board.

Section 3. Solar Access Regulatory Board.

A.(1) Pursuant to Iowa Code Section 564A.3, the Solar Access Regulatory Board is hereby designated to be the three (3) member Tama County Board of Supervisors.

(2) The Solar Access Regulatory Board shall consider Applications under Iowa Code Sections 564A.4, 564A.7(2) and the provisions of this Ordinance, only between owners of real property with a CSR of 59 or less who, under Section 564A.7(1), voluntarily wish to lease to a dominant owner the land legally described in the Application for a solar farm designed for less than 25 Megawatts. A proposed signed copy of the lease with all of its terms between the dominant and servient owners and the proposed easement agreement between the parties shall be submitted to and filed with the Solar Access Regulatory Board contemporaneously with all other required documents to support the Application under Section 564A.4 and this Ordinance.

(3). The Solar Access Regulatory Board shall not proceed to accept any Application brought to the Board by an erstwhile dominant owner who has failed to voluntarily negotiate a solar access easement and lease with an owner of property who does not desire to enter into such voluntary agreement.

To the extent that Iowa Code Sections 564A.4(1)(h), 564A.4(2) and Section 564A.5 imply or state that an owner's property may be adjudicated by the Solar Access Regulatory Board to involuntarily create a dominant easement and taking against the desires and wishes of the property owner even though compensation be ordered to the servient owner, the Solar Access Regulatory Board shall not entertain and is hereby forbidden to exercise such power of dubious constitutionality.

(4). Upon receipt and filing of the voluntary Application, the Solar Access Regulatory Board shall refer the Application and all supporting papers and documents to the Tama County Zoning Administrator, who shall undertake confirmation that the Application is complete and contains the information required under Sections 564A.4(1), 564A.7(2) and the provisions of this Ordinance.

Section 4.

Pursuant to the powers conferred by Iowa Code Section 564A.4(2), before the Solar Access Regulatory Board issues any decision and Order approving the Application and solar access easement, the following shall be submitted with the Application under Iowa Code Section 564A.4(1) and 564A.7(2).

1. Site Plan showing:

   a. Name, address, email address, and phone number of the property owner;

   b. Parcel lines;

   c. All existing structures, with heights clearly marked;

   d. Sanitary Infrastructure (e.g. septic fields);

   e. Presence of Wells, capped and otherwise functional;

f. Setback Measurements;

g. easements present on the designated solar farm, including those for existing utilities;

h. field title locations with mapping;

i. flood plain locations;

j. topography lines (with 2-foot contours);

k. location of all solar panels, solar collectors, solar arrays and associated equipment;

l. evidence that the site plan has been submitted to the local fire protection district;

m. a detailed electrical grid drawing, certified by an electrical engineer, showing all connection points in the Solar Farm and to a connecting electrical grid; and

n. a grading plan.

2. Height: Shall not exceed _____ ( ) feet at maximum tilt of the solar panels.

3. Setbacks:

a. The front yard setbacks shall be a minimum of _____ ( ) feet from the edge of the rights of way which form the outside perimeter of

the solar farm and _____ ( ) feet from a residence owned by owners of the servient estate.

b. All buildings, accessory buildings, and other infrastructure shall be located _____ ( ) feet from any residential dwelling or unit not within the area leased under easement to the dominant owner.

c. No setbacks are required where a property line is shared by two participating landowners subject to the identical lease and easement terms for each owner. Mandated setback distances may be waived with the consent of participating landowners and non-participating adjacent property owners.

d. No approved solar farm project shall be closer than one-half mile to another solar farm.

e. Solar panels shall be eighty (80) feet from state highway right of way and sixty (60) feet from county right of way.

4. Screening:

A landscape buffer shall be required, and installed and maintained, during the period of easement and lease. Determination of screening requirements will be made by the Solar Access Regulatory Board as part of the Application review process based upon the surroundings of the solar farm site, including adjacent or nearby surrounding land uses and topography.

5. Fencing/Security:

An NEC compliant security fence shall be installed along all exterior sides of the Solar Farm and be equipped with a minimum of one gate and locking mechanism on the primary access side. Security fences, gates and warning signs must be maintained in good condition during the period of easement and lease.

6. Signage:

Warning signs and signs disclosing the name, address, telephone number and email address of the site operator and electric utility provider shall be displayed at least once on all fenced sides of the Solar Farm. Such signs shall include a visible "High Voltage" warning and the Solar Farm's 911 address and GPS coordinates.

7. Utility Connections:

Reasonable efforts shall be made to place all utility connections from the solar installation underground, as dependent upon soil conditions, shape and topography of the site, distance to connection with other electrical grids. All components used for the collection, conversion, and storage of energy shall

be contained within the leased and fenced Solar Farm, excluding overhead underground transmission lines.

8. Floodplain/Floodway:

No portion of the Solar Farm site proposed for development may be located in a mapped 100-year or 500-year flood plain.

9. Habitat and Natural Resource Considerations:

The potential impact on any sensitive areas such as lakes, ponds, streams, rivers, wetlands, steep slopes, aquifers and recharge areas, natural wooded areas, prairie and other natural wildlife habitats shall be identified and considered for reasonable mitigation following a natural resource consultation with the Iowa Department of Natural Resources.

10. Solar Glare Minimization:

The Solar Farm site shall be designed and located in such a fashion so as to prevent solar glare toward any buildings inhabited by humans or farm animals on property adjacent to the Solar Farm and adjacent roadways where a safety hazard might be created.

11. Weed Control:

Applicant for the Solar Access Easement must present a weed/grass control plan for the Solar Farm site inside and outside the fenced area for the entire property. The dominant estate owner shall adhere to the weed control plan during the period of the easement and lease.

12. Grading Plan:

Applicant for the Solar Access Easement shall submit a grading plan for all aspects of the Solar Farm which shall include all proposed changes to the landscape of the site showing areas of clearing, grading, topographical changes, drainage, tree removal, etc.

13. Compliance with local state and federal laws:

Before approval of Applicant's Solar Access Easement, Applicant shall submit to the Solar Access Regulatory Board evidence of compliance with all applicable local, state and federal regulations governing Solar Energy Utility Scale Generation. Such evidence shall include but not be limited to certifications of those engineers as to all matters of electrical, ecological, architectural, topographical and surveying required by the provisions of

Iowa Code Section 564A.4(1), 564A.7(2) and the provisions of this Ordinance.

14. Access Required:

The Zoning official or any other designee of the Solar Access Regulatory Board may enter the property for which a Solar Access Easement has been granted under this Ordinance to conduct an inspection to determine that the conditions under which the Easement have been granted continue to be met as specified by statute, regulation and this Ordinance. Failure to provide such access shall be deemed a violation of this Ordinance.

15. Road Use Agreements:

All routes on county roads that will be used for the construction and maintenance purposes of this Solar Farm shall be identified on the site plan. All routes for either ingress or egress shall be shown. The Applicant must complete and provide a preconstruction baseline survey to determine existing road conditions for assessing potential future damage due to development related traffic. The Applicant shall provide a road repair plan to ameliorate any and all damage, repair or replacement of roads that might be required by the development. The Applicant shall provide a letter of credit or surety bond in an amount and form approved by the Solar Access Regulatory Board (sitting as the Board of Supervisors) when warranted.

The provisions of this subsection shall be subject to the approval of the Tama County Engineer.

Section 5. Decommission Plan:

Prior to the issuance of a Solar Energy Easement to the owner of the dominant estate by the Solar Access Regulatory Board, the Application shall contain a decommissioning plan. The Solar Access Regulatory Board (or its designee for the Board) shall review the plan for completeness and then refer it to the Board. The Plan shall include:

1. A description in the Plan to remove all Solar Farm equipment and restore the land to its previous use upon the end of the easement and lease, or by Order entered by the Solar Access Regulatory Board for the reasons stated in Iowa Code Section 564A.6 or arising under this Ordinance.

2. Provision for the removal of structures, debris and associated equipment on the surface and to a level of not less than ten (10) feet below the surface, and the timeline of sequential steps during which removal is expected to occur.

3. Provision for the regrading of the soil to its former state including restoration of the removal surface soil, vegetation and disturbed earth which shall be graded and reseeded with native seed mixes and plant species suitable to the area.

4. An estimate of the decommissioning costs certified by a licensed professional engineer in current dollars. The estimate shall be attached to the decommission plan submitted with the Application for Solar Access Easement. The costs associated with such estimate shall be borne and paid by the Applicant upon the end of the easement and lease or by further Order of the Solar Access Regulatory Board, under subsection one (1), above. The salvage value of structures, electrical wire and other equipment shall be disregarded in making these cost estimate calculations.

5. A written financial plan, approved prior to the Order granting the easement, shall ensure that funds will be available for decommissioning and land restoration and a provision acknowledged by the dominant easement owner that all the terms of the Plan shall be binding on the Applicant (as dominant owner) and of any and all future successors, assigns and heirs.

6. Before entry of the Order granting the Solar Access Easement, the Solar Access Energy Board shall set an amount to be held in a bond, escrow or another acceptable form of funding approved by the Board. The value of the bond, escrow or other accepted form of funds shall not be reduced on the basis of the salvage value of any materials or equipment. The Plan shall state that Tama County shall have access to the Solar Farm and to the funds to effect or complete decommissioning one (1) year after cessation.

7. Release of Financial Security. Financial security shall only be released when the Solar Access Regulatory Board, or its designee, determines, after inspection, that the conditions of the decommissioning plan have been met.

Section 6. Related Rules and Regulations and Effective Date:

1. Every Utility Scale Solar Energy system shall comply with all the applicable local, state and federal requirements.

2. Severability. The provisions of this Ordinance are severable, and the invalidity of any section, paragraph or provision of this Ordinance shall not affect the validity or effectiveness of the remainder of the Ordinance.

3. Fee Structure for issuance of Order. Upon issuance of an Order approving the Application by the Solar Access Regulatory Board under Iowa Code Section 564A.5, the Applicant shall pay to the Tama County Auditor the following amounts proportioned to the electrical capacity of the approved Solar Farm.

. . . .

. . . .

4. Effective Date. This Ordinance shall take effect upon its publication as required by law.

Passed and adopted by the Tama County Board of Supervisors on this ____ day of _____, 2023.

TAMA COUNTY BOARD OF SUPERVISORS

_____
William Faircloth, Chair

_____
Dan Anderson

_____
Curt Hilmer

ATTEST _____
Laura Kopsa, Auditor

_____, Approved 1st Consideration

_____, Approved 2nd Consideration

_____, Adopted