A bill for an act

relating to energy; exempting certain wind and solar projects from the requirement to obtain a certificate of need; amending the definition of "solar energy generating system"; adding factors the commission must consider in approving sites and routes for electric generating plants; requiring the installation of lighting systems for certain wind turbines; amending Minnesota Statutes 2020, sections 216B.243, subdivision 8; 216E.01, subdivision 9a; 216E.03, subdivision 7; 216E.04, subdivision 2; proposing coding for new law in Minnesota Statutes, chapter 216F.

BE IT ENACTED BY THE LEGISLATURE OF THE STATE OF MINNESOTA:

Section 1. Minnesota Statutes 2020, section 216B.243, subdivision 8, is amended to read:

Subd. 8. **Exemptions.** (a) This section does not apply to:

(1) cogeneration or small power production facilities as defined in the Federal Power Act, United States Code, title 16, section 796, paragraph (17), subparagraph (A), and paragraph (18), subparagraph (A), and having a combined capacity at a single site of less than 80,000 kilowatts; plants or facilities for the production of ethanol or fuel alcohol; or any case where the commission has determined after being advised by the attorney general that its application has been preempted by federal law;

(2) a high-voltage transmission line proposed primarily to distribute electricity to serve the demand of a single customer at a single location, unless the applicant opts to request that the commission determine need under this section or section 216B.2425;

(3) the upgrade to a higher voltage of an existing transmission line that serves the demand of a single customer that primarily uses existing rights-of-way, unless the applicant opts to request that the commission determine need under this section or section 216B.2425;

(4) a high-voltage transmission line of one mile or less required to connect a new or upgraded substation to an existing, new, or upgraded high-voltage transmission line;

(5) conversion of the fuel source of an existing electric generating plant to using natural gas;

(6) the modification of an existing electric generating plant to increase efficiency, as long as the capacity of the plant is not increased more than ten percent or more than 100 megawatts, whichever is greater;

(7) a large wind energy conversion system, as defined in section 216F.01, subdivision 2, or a solar ~~electric generation facility if the system or facility is owned and operated by an independent power producer and the electric output of the system or facility is not sold to an entity that provides retail service in Minnesota or wholesale electric service to another entity in Minnesota other than an entity that is a federally recognized regional transmission organization or independent system operator~~ energy generating system, as defined in section 216E.01, subdivision 9a; or

(8) a large wind energy conversion system, as defined in section 216F.01, subdivision 2, or a solar energy generating system that is a large energy facility, as defined in section 216B.2421, subdivision 2, engaging in a repowering project that:

(i) will not result in the ~~facility~~ system exceeding the nameplate capacity under its most recent interconnection agreement; or

(ii) will result in the ~~facility~~ system exceeding the nameplate capacity under its most recent interconnection agreement, provided that the Midcontinent Independent System Operator has provided a signed generator interconnection agreement that reflects the expected net power increase.

(b) For the purpose of this subdivision, "repowering project" means:

(1) modifying a large wind energy conversion system or a solar energy generating system that is a large energy facility to increase its efficiency without increasing its nameplate capacity;

(2) replacing turbines in a large wind energy conversion system without increasing the nameplate capacity of the system; or

(3) increasing the nameplate capacity of a large wind energy conversion system.

EFFECTIVE DATE. This section is effective the day following final enactment.

Sec. 2. Minnesota Statutes 2020, section 216E.01, subdivision 9a, is amended to read:

Subd. 9a. **Solar energy generating system.** "Solar energy generating system" means a set of devices whose primary purpose is to produce electricity by means of any combination of collecting, transferring, or converting solar-generated energy, and may include transmission lines designed for and capable of operating at 100 kilovolts or less that interconnect a solar energy generating system with a high voltage transmission line.

EFFECTIVE DATE. This section is effective the day following final enactment.

Sec. 3. Minnesota Statutes 2020, section 216E.03, subdivision 7, is amended to read:

Subd. 7. **Considerations in designating sites and routes.** (a) The commission's site and route permit determinations must be guided by the state's goals to conserve resources, minimize environmental impacts, minimize human settlement and other land use conflicts, and ensure the state's electric energy security through efficient, cost-effective power supply and electric transmission infrastructure.

(b) To facilitate the study, research, evaluation, and designation of sites and routes, the commission shall be guided by, but not limited to, the following considerations:

(1) evaluation of research and investigations relating to the effects on land, water and air resources of large electric power generating plants and high-voltage transmission lines and the effects of water and air discharges and electric and magnetic fields resulting from such facilities on public health and welfare, vegetation, animals, materials and aesthetic values, including baseline studies, predictive modeling, and evaluation of new or improved methods for minimizing adverse impacts of water and air discharges and other matters pertaining to the effects of power plants on the water and air environment;

(2) environmental evaluation of sites and routes proposed for future development and expansion and their relationship to the land, water, air and human resources of the state;

(3) evaluation of the effects of new electric power generation and transmission technologies and systems related to power plants designed to minimize adverse environmental effects;

(4) evaluation of the potential for beneficial uses of waste energy from proposed large electric power generating plants;

(5) analysis of the direct and indirect economic impact of proposed sites and routes including, but not limited to, productive agricultural land lost or impaired;

(6) evaluation of adverse direct and indirect environmental effects that cannot be avoided should the proposed site and route be accepted;

(7) evaluation of alternatives to the applicant's proposed site or route proposed pursuant to subdivisions 1 and 2;

(8) evaluation of potential routes that would use or parallel existing railroad and highway rights-of-way;

(9) evaluation of governmental survey lines and other natural division lines of agricultural land so as to minimize interference with agricultural operations;

(10) evaluation of the future needs for additional high-voltage transmission lines in the same general area as any proposed route, and the advisability of ordering the construction of structures capable of expansion in transmission capacity through multiple circuiting or design modifications;

(11) evaluation of irreversible and irretrievable commitments of resources should the proposed site or route be approved; ~~and~~

(12) when appropriate, consideration of problems raised by other state and federal agencies and local entities;

(13) evaluation of the benefits of the proposed facility with respect to the protection and enhancement of environmental quality, and to the reliability of state and regional energy supplies; and

(14) evaluation of the impact of the proposed project on socioeconomic factors.

(c) If the commission's rules are substantially similar to existing regulations of a federal agency to which the utility in the state is subject, the federal regulations must be applied by the commission.

(d) No site or route shall be designated which violates state agency rules.

(e) The commission must make specific findings that it has considered locating a route for a high-voltage transmission line on an existing high-voltage transmission route and the use of parallel existing highway right-of-way and, to the extent those are not used for the route, the commission must state the reasons.

EFFECTIVE DATE. This section is effective the day following final enactment.

Sec. 4. Minnesota Statutes 2020, section 216E.04, subdivision 2, is amended to read:

Subd. 2. **Applicable projects.** The requirements and procedures in this section apply to the following projects:

(1) large electric power generating plants with a capacity of less than 80 megawatts;

(2) large electric power generating plants that are fueled by natural gas;

(3) high-voltage transmission lines of between 100 and 200 kilovolts;

(4) high-voltage transmission lines in excess of 200 kilovolts and less than five miles in length in Minnesota;

(5) high-voltage transmission lines in excess of 200 kilovolts if at least 80 percent of the distance of the line in Minnesota will be located along existing high-voltage transmission line right-of-way;

(6) a high-voltage transmission line service extension to a single customer between 200 and 300 kilovolts and less than ten miles in length;

(7) a high-voltage transmission line rerouting to serve the demand of a single customer when the rerouted line will be located at least 80 percent on property owned or controlled by the customer or the owner of the transmission line; ~~and~~

(8) large electric power generating plants that are powered by solar energy; and

(9) a high voltage transmission line in excess of 200 kilovolts for which the applicant has demonstrated to the satisfaction of the commission that voluntary easements or other agreements allowing construction to proceed have been secured from all landowners within the proposed right-of-way.

EFFECTIVE DATE. This section is effective the day following final enactment.

Sec. 5. **[216F.084] WIND TURBINE LIGHTING SYSTEMS.**

Subdivision 1. **Definitions.** (a) For the purposes of this section, the following terms have the meanings given.

(b) "Duration" means the length of time during which the lights of a wind turbine lighting system are lit.

(c) "Intensity" means the brightness of a wind turbine lighting system's lights.

(d) "Light-mitigating technology" means a sensor-based system that reduces the duration or intensity of wind turbine lighting systems by:

(1) using radio frequency or other sensors to detect aircraft approaching one or more wind turbines, or detecting visibility conditions at turbine sites; and

(2) automatically activating appropriate obstruction lights until the lights are no longer needed by the aircraft and are turned off or dimmed.

A light-mitigating technology may include an audio feature that transmits an audible warning message to provide a pilot additional information regarding a wind turbine the aircraft is approaching.

(e) "Repowering project" has the meaning given in section 216B.243, subdivision 8, paragraph (b).

(f) "Wind turbine lighting system" means a system of lights installed on an LWECS that meets the applicable Federal Aviation Administration requirements.

Subd. 2. **Application.** This section applies to an LWECS issued a site permit or site permit amendment, including a site permit amendment for an LWECS repowering project, by the commission under section 216F.04 or by a county under section 216F.08, provided that the application for a site permit or permit amendment is filed after July 1, 2021.

Subd. 3. **Required lighting system.** (a) An LWECS subject to this section must be equipped with a light-mitigating technology that meets the requirements established in Chapter 14 of the Federal Aviation Administration's Advisory Circular 70/760-1, Obstruction Marking and Lighting, as updated, unless the Federal Aviation Administration, after reviewing the LWECS site plan, rejects the use of the light-mitigating technology for the LWECS. A light-mitigating technology installed on a wind turbine in Minnesota must be purchased from a vendor approved by the Federal Aviation Administration.

(b) If the Federal Aviation Administration, after reviewing the LWECS site plan, rejects the use of a light-mitigating technology for the LWECS under paragraph (a), the LWECS must be equipped with a wind turbine lighting system that minimizes the duration or intensity of the lighting system while maintaining full compliance with the lighting standards established in Chapter 13 of the Federal Aviation Administration's Advisory Circular 70/760-1, Obstruction Marking and Lighting, as updated.

Subd. 4. **Exemptions.** (a) The Public Utilities Commission or a county that has assumed permitting authority under section 216F.08 must grant an owner of an LWECS an exemption from the provisions of subdivision 3, paragraph (a), if the Federal Aviation Administration denies the owner's application to equip an LWECS with a light-mitigating technology.

(b) The Public Utilities Commission or a county that has assumed permitting authority under section 216F.08 must grant an owner of an LWECS an exemption from or an extension of time to comply with the provisions of subdivision 3, paragraph (a), if, after notice and public hearing, the owner of the LWECS demonstrates to the satisfaction of the commission or county that:

(1) equipping an LWECS with a light-mitigating technology is technically infeasible;

(2) equipping an LWECS with a light-mitigating technology imposes a significant financial burden on the permittee; or

(3) a vendor approved by the Federal Aviation Administration cannot deliver a light-mitigating technology to the LWECS owner in a reasonable amount of time.

EFFECTIVE DATE. This section is effective the day following final enactment.