St. Mary’s Comprehensive Zoning Ordinance – Article 5 - Regulation of Uses

CHAPTER 51 USE REGULATIONS AND STANDARDS – Small Wind Energy Systems

93. Small Wind Energy System.

a. Accessory Standards:

(1) The purpose of these regulations is to allow a Small Wind Energy System used to generate electricity at a rated capacity (as defined by the manufacturer) of 100 kilowatts or less to be constructed and installed for on-site consumption only. The application submitted by the property owner or his designated representative to the Department of Land Use and Growth Management for a building permit to construct a Small Wind Energy System shall satisfactorily address the standards as set forth below:

(a) A building permit shall be obtained prior to installing a small wind energy system. The building permit application shall be accompanied by a site plan of the property, including all boundaries, drawn to scale, showing the following information. Approval of the building permit shall be subject to a determination by appropriate personnel affiliated with Patuxent River Naval Air Station as to noninterference with military activities.

1. The location of the proposed small wind energy system and the locations of all existing buildings, structures, overhead utility lines, and environmental features including woodland and other vegetation shall be shown on the site plan; and

2. The distance between the small wind energy system tower and structures on adjoining properties shall be shown on the site plan; and the distance between the small wind energy system tower and property lines shall be shown on the site plan.

(b) Compliance with Uniform Statewide Building Code: Building permit applications for small wind energy systems shall be accompanied by standard drawings of the wind turbine structure, including the tower, base, and footings. An engineering analysis of the tower showing compliance with the Uniform Statewide Building Code shall also be submitted. This analysis may be supplied in the form of documentation from the manufacturer or supplier. Submit the footing specifications developed by the tower supplier or manufacturer.

(c) A Small Wind Energy System must comply with regulations of the Federal Aviation Administration (FAA), if applicable, including any necessary approvals for installations close to airports.

(d) Compliance with National Electric Code: Building permit applications
for Small Wind Energy Systems shall be accompanied by a line drawing of the electrical components in sufficient detail to allow for a determination that the manner of installation conforms to the National Electrical Code. This information may be supplied by the manufacturer.

(e) Wind turbines shall be the default color of the manufacturer or painted a non-reflective, neutral color that conforms to the environment.

(f) A Small Wind Energy System shall not exceed the ambient noise levels as established by Schedule 61.4.1 of this Ordinance, Maximum Noise

(g) A Small Wind Energy System shall not be artificially lighted unless required by the Federal Aviation Administration (FAA) or other applicable authority.

(h) A Small Wind Energy System shall not be used for displaying any advertising. Appropriate warning signs and signs identifying the manufacturer, installer, or owner of the Small Wind Energy System may be attached.

(i) Electrical controls and control wiring and power-lines shall be wireless or underground.

(j) The tower of a Small Wind Energy System shall be designed so as to prohibit step bolts or a ladder readily accessible to the public for a minimum height of 10 feet above the ground.

(k) The height of a Small Wind Energy System shall not exceed a maximum height of 85 feet, if located on a lot or parcel less than one acre in size; or a maximum height of 150 feet, if located on a lot or parcel one acre in size or greater.

(l) The tower of a Small Wind Energy System shall be set back a distance equal to its total height, which is a one to one (1:1) ratio between height and setback, from all property lines and any overhead utility lines. A variance or an agreement in recordable form signed by the adjoining property owner(s) must be obtained in order to reduce this required setback from property lines. Total height means the vertical distance from ground level to the tip of a wind generator blade when the tip is at its highest point.

(m) The blade tip of any wind turbine shall, at its lowest point, have ground clearance of no less than fifteen (15) feet, as measured at the lowest point of the arc of the blades.

(n) One Small Wind Energy System shall be permitted on a site.

(o) Any small wind energy system found to be abandoned or unsafe by the
Building Code Official shall be repaired or removed by the landowner. A small wind energy system that fails to operate or is out of service for a 5 continuous 12-month period shall be deemed to be abandoned.