

Town of Morgan, Vermont

Siting Synopsis

1/20/2016

I am here today to request that serious thought and consideration be given to amending Act 248 or at least restructuring the mission of the PSB to reflect municipalities concerns on siting of wind tower and solar power. Our town's Planning Committee has a very complete plan addressing renewable energy such as wind, solar, and biomass (see enclosure). This plan was approved in 2012. Morgan fully supports renewable environmentally sound solar and wind energy production at the residential scale. We have defined the scale size in the plan.

The democratic process has been usurped by the all-powerful decisions of the PSB and the guidance of developers and their consultants. Deference to town policies and the will of the people has been replaced with "for the public good" as defined by developers and their cohorts.

The Town of Morgan hosted a special informational town meeting with over 90% of the resident voters in attendance voting against the solar project as presented by the developer.

Our governor has stated that Vermont's goals are to replace, by 90%, fossil fuel use to clean renewable energy by 2050. He also stated that no town should have renewable energy projects forced upon them. This spoken word has apparently not been sent to the powers that be or rendered a change in siting criteria.

Siting aesthetics and public will are not a one size fits all proposition. Our scenery, mountains, and bucolic setting are indeed worth preserving for future generations.

The state has spent large sums of money and human resource time to protect our pristine lake and its watershed area, via shoreland protection, better back roads grants, and land use regulations. Siting projects on a beautiful area of the NEK is only going to result in helping the developer and do nothing for the public good of Morgan. Seven hundred and forty nine residents do not justifiably need these projects, especially when the Renewable Energy Credits are sold out of state.

If we were in need of additional power, the power can be purchased from Quebec Hydro at a much lesser cost and it is clean renewable energy.

I would respectfully request that municipalities' participation in the siting of these projects be given credence prior to the issuance of a CPG and that a municipal ombudsman position be considered, as the PSB process is, at best, a daunting one for which no Select Boards are properly prepared or budgeted.

IX. ENERGY PLAN

A. Energy and renewable energy resources

Energy for the heating, lighting, and hot water needs are available from a variety of sources. Heating oil and LP Gas is available from several local distributors and dealers. Electricity is provided in Morgan by the Vermont Electric Cooperative. Finally, gasoline for moving automobiles is available in Morgan and some of the surrounding communities. There are no commercial energy generation facilities within the Town at present. The town supports the development of renewable energy resources in general, but the Town will only offer its support for individual projects that meet the needs of the community on a case by case basis.

B. Needs

The electric and heating needs of Morgan's residents for energy products are presently being met by fuel dealers and electric utilities in the local area.

C. Scarcities

At this time the Planning Commission does not know of any scarcities or reliability issues with energy products.

D. Costs

At one time, the electricity costs for Morgan residents were among the lowest in the State. This is no longer true as electricity prices have been on the increase.

E. Problems

While there does not seem to be any problem with regard to the supply of energy, rising energy costs could be a very real problem for some of Morgan's families. Therefore, the Morgan Planning Commission would like to encourage energy suppliers to do as much as is possible to either keep costs down or, to reduce the rate at which costs are increasing. Also, the Planning Commission encourages the Town, residents, and businesses to make energy efficiency investments to reduce the amount of energy that they consume, thereby reducing costs.

F. Conservation and energy efficiency

The Planning Commission strongly advocates the conservation of energy and energy efficiency. This plan recommends the use of energy saving products such as insulation, efficient appliances, and, when necessary the use of winter weatherization products such as weather stripping, window plastic, and water heater wraps. New construction and the replacement of old appliances, doors, and/or windows should always be done with energy efficient products. In addition, energy efficient behavior (shutting lights off when leaving the room, turning the thermostat down at night, etc.) should be taught and used, at school, home and in the workplace.

Both the Town Clerk's Office and the Community Center received thermal energy efficiency audits in 2011. The audit reports recommended efficiency improvements and provided estimated costs and payback periods for those improvements. The Planning Commission recommends that the necessary improvements should be made to these buildings to make them more energy efficient, thereby reducing costs and saving taxpayer dollars.

G. Renewable Energy Resources

The Planning Commission recommends the development of renewable energy resources. These would include the use of wood, solar, and wind energy. Wind energy conversion systems (WECS), are specifically addressed in the Morgan Zoning Bylaw to address safety and design requirements. It is the Town's goal that all WECS meet these recommendations. The Planning Commission supports the development of small-scale renewable energy technologies for residents, farms, and businesses.

The policy stated above defines the Town of Morgan's historical stance on this matter.

However, because the State of VT has taken away the rights of municipalities to control renewable energy resources within their boundaries, the citizens of Morgan feel compelled to add the following guidelines to which we expect the Public Service Board to adhere to in its decision making should any commercial venture in the area be considered.

ENERGY FACILITY SITING AND DEVELOPMENT

Energy generation and transmission systems that are linked to the electrical grid are preempted from local land use regulation. They are instead regulated by the Public Service Board (PSB) under 30 V.S.A. Section 248 (Section 248 review). These include net metered distributed energy installations, as well more commercial, utility-scale generation, transmission and distribution facilities. The PSB must consider project conformance with municipal and regional plans prior to issuing a Certificate of Public Good.

Municipal Participation. The town does not have statutory party status in PSB (Section 248) proceedings, but does receive notice of most applications (petitions) before the board. The town may participate informally by providing comments on a proposed project, or request more formal status as an intervener with rights to participate and appeal. Town participation in the state's review process, based on adopted community standards under this plan, is the best way to ensure that local conservation and development objectives are considered and weighed by the Public Service Board. The Planning Commission has developed specific community standards for energy facility siting and development in Morgan that are to be considered in the municipal review of applications before the Public Service Board, in crafting local regulations for off-grid facilities, and in the siting and development of municipal

and community-supported generation facilities.

MORGAN COMMUNITY STANDARDS: POWER GENERATION, TRANSMISSION, NET-METERED, AND OFF-GRID ENERGY FACILITIES

Purpose. The purpose of these municipal energy policies is to promote the development of renewable energy resources and energy facilities in the Town of Morgan, while limiting the adverse impacts of such development on public health, safety and welfare, the town's historic and planned pattern of development, environmentally sensitive areas, and our most highly-valued natural, cultural and scenic resources - consistent with related development, resource protection and land conservation policies included elsewhere in this plan. These policies are to be considered in undertaking municipal energy projects and programs, in updating the town's bylaws to address renewable energy development, and in the review of new or upgraded energy facilities and systems by the town and the Public Service Board under 30 V.S.A. § 248.

General Standards. The following forms of energy development will be considered for support by the Town of Morgan, in order of priority:

1. Improved/increased system capacity by utilizing state, utility and municipally-supported energy efficiency and conservation programs.
2. In-place upgrades of existing facilities, including existing transmission lines, distribution lines and substations as needed to serve the town and region. To the extent physically and functionally feasible, existing utility systems, including transmission lines, distribution lines and substations, shall be upgraded or expanded on site or within existing utility corridors before new facilities or corridors are considered.
3. Individual and group net-metered renewable energy projects, community-based projects, and other small-scale distributed renewable energy systems serving individual users, in appropriate, context-sensitive locations
4. New community-scale energy facilities, including new transmission and distribution lines, substations, hydro dams, wind and solar farms, co-generation facilities and biomass plants that are designed to meet the expected needs of the Town of Morgan and its adjacent communities.

5. A demonstrated public need that outweighs adverse impacts to town residents and resources must be documented for municipal support of proposed larger projects - including new transmission and distribution lines, and facilities with a generation capacity greater than 500kW - located in or which may otherwise affect the Town of Morgan. Energy facility development must benefit the Town of Morgan and its adjacent communities (residents and businesses) in direct relation and proportion to the documented impacts of the proposed development on community facilities, services, economy and resources. In this instance *benefit* means that such development must improve energy availability and distribution locally and lower costs locally before any energy is transmitted out of the area.
6. The Town of Morgan will endorse or permit the development and installation of energy facilities that conform to community energy facility development and siting standards through participation in Public Service Board (Section 248) proceedings or, where applicable, through local financing and incentive programs and regulations.

Public Health and Safety Standards:

Use Classification. A small net-metered or off-grid renewable energy facility, including a solar array, small wind facility or combined system intended solely to serve an individual residence or business, will be considered an accessory structure allowed in all zoning districts in which structures are allowed.

Height for these: Zoning district height limitations under local bylaws, where applicable, should be waived for renewable energy facilities, as enabled under 24 V.S.A. § 4414.

* The maximum tower height for net-metered, or similar off-grid wind energy facility shall not (a) exceed 120 feet in total height, as measured vertically from the ground to the rotor blade tip at its highest point, or (b) extend in total height more than 30 feet above the existing tree canopy or other obstructions within 300 feet of the tower, whichever is greater.

Setbacks for all: Except for transmission and distribution lines and utility connections, all energy facilities - including substations, commercial, utility and net-metered generation facilities and accessory structures - must meet minimum setback requirements for the zoning district(s) in which they are located. In addition:

All ground-mounted wind energy facilities must be setback at least 1.5 times the total facility height, as measured vertically from the ground to the rotor blade tip at its highest point, from all property lines, occupied buildings on

adjoining properties, overhead utility lines, public and private rights-of-way and established trail corridors, unless easements are secured from adjoining property owners.

* Guy wires used to support wind towers are exempt from minimum district setback requirements, but shall be set back at least 20 feet from all property lines.

* A building-mounted wind turbine or solar panel must meet minimum setback requirements for the building on which it is mounted. The installation of a net-metered or similar off-grid energy system on a nonconforming structure will not constitute an increase in the degree or amount of nonconformance under local regulations.

* Setback requirements for renewable energy facilities may be reduced in exceptional circumstances by the town, as allowed under 24 VSA § 4414 as necessary to access a renewable energy resource, if the reduction in the setback distance is functionally necessary for system operation, represents the minimum necessary to allow for facility siting, and adverse impacts to adjoining properties, structures, facilities, and uses can be avoided through structural design and orientation, landscaping and screening, the use of glare and noise reduction techniques, or other accepted mitigation measures, or an easement is secured from the adjoining property owner.

* Facility setback distances from property lines, or from occupied structures in existence at the time of application, should be increased as necessary to mitigate identified public health and safety hazards or nuisances to adjoining property owners (e.g., noise, vibration, glare, shadowing and shadow flicker, ice throw).

Ground Clearance. The blade tip of any wind turbine shall, at its lowest point, have a ground clearance of no less than 30 feet, as measured vertically from the ground to the tip of the rotor blade at its lowest point.

Access. New generation facilities shall be sited in a manner that avoids or, to the greatest extent physically feasible, minimizes the need for new and extended access roads and utility corridors.

* Facility access should be provided from existing access roads where physically feasible, and access roads and utility corridors should be shared, to minimize site disturbance, resource fragmentation, the creation of additional edge habitat, and the introduction and spread of invasive exotic species.

* Identified impacts to public highways from facility construction, operation and maintenance, including highway

improvements required to accommodate the facility, shall be mitigated by the developer.

* Public access to generation and transmission facilities, including substations, must be restricted as necessary to protect public health and safety.

Noise. Noise generated by any energy facility, including wind energy systems, shall not exceed the lesser of (a) 45dB(A) as measured at any property line, or (b) 5 dB(A) above the ambient sound level, except during a short-term event such as a utility outage or a severe wind storm.

Shadow Flicker. Wind energy facilities shall be sited or screened so that shadows cast by rotor blades will not result in shadow flicker on occupied buildings located in the vicinity of the project.

Burial. Utility controls and onsite line connections shall be wireless or buried, except at the point of connection with distribution lines.

Signs. Energy facilities and structures shall not be used for display or advertising purposes. Signs, except for owner and manufacturer identifications and safety warnings that do not exceed one square foot, are prohibited on all structures.

Lighting. Energy facilities, including wind and transmission towers, are not to be artificially lighted except as necessary to meet Federal Aviation Administration requirements.

* An Obstacle Collision Avoidance System (OCAR) as approved by the FAA shall be used to avoid visual lighting impacts. If an OCAR cannot be approved, the FAA lighting alternative that results in the least amount of visual disturbance, and minimizes project visibility from public roads and vantage points, shall be incorporated in system design.

* Substation lighting should be the minimum necessary for site monitoring and security, should be cast downward, and must not result in light trespass or glare on adjoining properties.

Codes. Energy facilities must comply with all manufacturer specifications, state or industry safety and electric codes, and utility connection requirements. Documentation of code compliance may be required for facilities subject to municipal review.

Interference. Facility operation shall not reduce or interfere with television, radio, telemetry, or other telecommunications signals, including public safety communications systems.

Decommissioning and Abandonment. Generation facility permits or certificates must include provisions for system abandonment, decommissioning and site restoration including, for larger systems (e.g., >100 kW), required sureties for facility removal and site restoration.

Facility Siting Standards:

Site Designation. Sites planned for or intended to accommodate planned energy facility development, including the location of existing and planned commercial and net-metered generation facilities and utility corridors, are to be shown on site development and subdivision plans reviewed by the town.

* Incentives (e.g., waivers, density bonuses) should be provided under local regulations for energy efficient development, and for the incorporation of net-metered renewable energy facilities in new development.

Upland Exclusion Areas. All new energy facilities - including wind towers, transmission and distribution lines, accessory structures and access roads - are specifically prohibited in town-owned lands, above 1,700 feet elevation, in conformance with longstanding town policies to limit all high elevation and ridgeline development due to its undue adverse scenic and environmental impacts. Any energy development over 1,500 feet in elevation shall not result in undue adverse impacts to surface waters, ground water and mapped source protection areas, core forest areas, inventoried wildlife habitat and travel corridors, and mapped scenic resources.

Hazard Areas. With the exception of transmission and distribution lines, new energy facilities that are not attached to existing or permitted structures shall not be located in:

* Special Flood Hazard Areas (SFHAs), including floodways and floodway fringes identified on Flood Insurance Rate Maps (FIRMs) for the town.

* Fluvial erosion hazard areas identified on Morgan FEHA maps. The town does not have FEH maps at present, but mapped flood hazard areas are on file in the Town Office..

* Very steep slopes, with natural (pre-development) grades in excess of 25%.

Conservation Areas. Energy facilities are to be sited to avoid where physically feasible, or to otherwise minimize encroachment and mitigate the adverse impacts of facility development on:

* Surface waters, wetlands and associated setback and buffer areas, as specified for all development under town

bylaws.

- * Primary agricultural soils as mapped by the USDA Natural Resource Conservation Service for the state.

- * Significant wildlife habitat, including core habitat areas, and travel and migratory corridors, as identified from state inventories and datasets, local inventories, and site investigations associated with facility development.

- * Onsite mitigation - e.g., through facility clustering, relocation, buffering and permanent conservation easements - is preferred. Off-site mitigation measures should be required where on-site mitigation is not physically feasible.

Agricultural Land and Open Space. Energy facilities, including solar arrays and other generation facilities, transmission and distribution lines, accessory structures and access roads are to be located on nonagricultural land or along field edges to avoid fragmentation of, and to minimize and mitigate adverse impacts to agricultural land and open fields.

Forestland. Energy facilities, including wind towers and other generation facilities, transmission and distribution lines, accessory structures and access roads are to be located along existing tree lines, or on otherwise disturbed forestland, as necessary to avoid the fragmentation of, and to minimize and mitigate adverse impacts to productive timber stands and critical forest habitat.

- * Forestland intended for commercial biomass production must be sustainably managed and harvested in a manner that preserves critical forest habitat and long-term forest health.

Visual Impacts. Applicants must demonstrate through site planning, facility siting and proposed mitigation that the visual impacts of new and upgraded energy facilities will be minimized as outlined in the standards set forth below:

- * All energy facilities and accessory structures are to be designed and constructed of materials, colors, and textures that blend into the surrounding natural or built environment. Wind towers, turbines and blades shall be of a neutral, non-reflective and unobtrusive color (e.g., white, off-white or gray).

- * Facilities are to be sited to outside of, or to the edge of scenic views or viewsheds so that they are not a prominent focal point.

- * The apparent scale or size of the facility should

