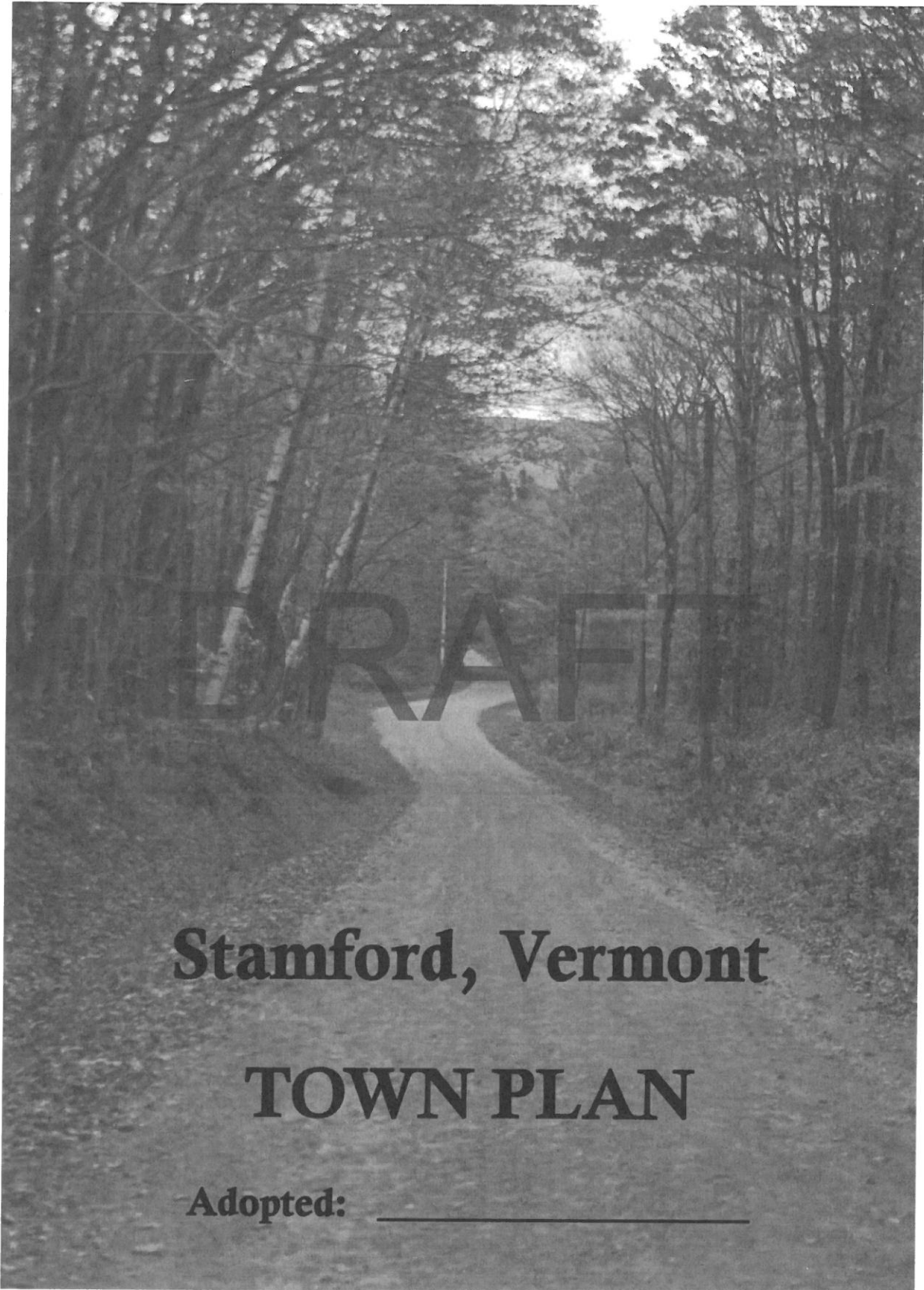


Revised draft submitted by
Planning Commission to Selectboard
on August 3, 2017



Stamford, Vermont

TOWN PLAN

Adopted: _____

TOWN PLAN

Stamford, Vermont

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The Town Plan for Stamford, Vermont was prepared by the Stamford Planning Commission, with assistance from the Bennington County Regional Commission. Partial funding for the project was provided through a planning grant awarded by the Vermont Department of Economic, Housing, and Community Development.

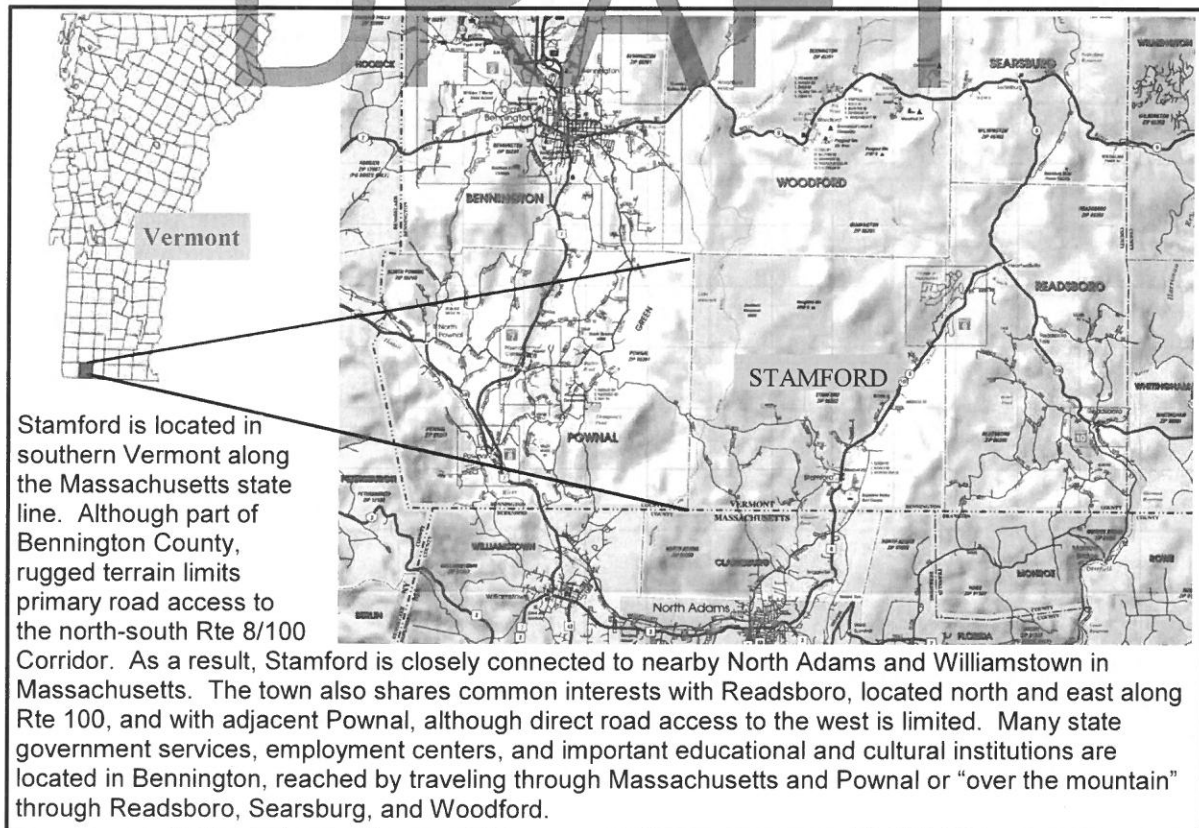
Chapter 1 - INTRODUCTION

Overview

The Town Plan provides a framework for decisions that will guide future growth and development in Stamford. Its statements, policies, and recommendations will help ensure that the town retains its unique attributes while promoting actions that enhance the town's character, prosperity, and the quality of life for residents.

The Vermont Municipal and Regional Planning and Development Act - Title 24 V.S.A. Chapter 117 - provides the statutory basis for the Town Plan. All of the elements required of a municipal plan are found in this document and it is consistent with all of the goals enumerated in the statute. While development of the Town Plan was guided by the needs and desires of residents and property owners of Stamford, care was taken to ensure that it is compatible with the Bennington Regional Plan and with the plans of neighboring towns.

Beginning in the spring of 2016, the Stamford Planning Commission gathered data and held public meetings to update the Town Plan with the support of a Municipal Planning Grant (MPG) from the Agency of Commerce and Community Development. Particular attention was given to incorporating a flood resiliency component consistent with Town bylaw revisions completed in 2015 as well as enhancing descriptions of natural resources in the Town. A revised Town Plan was developed based on this planning process and public hearings were held to assess the acceptance of the ideas presented in the document. After final revisions were made, the Town Plan was forwarded to the Select Board

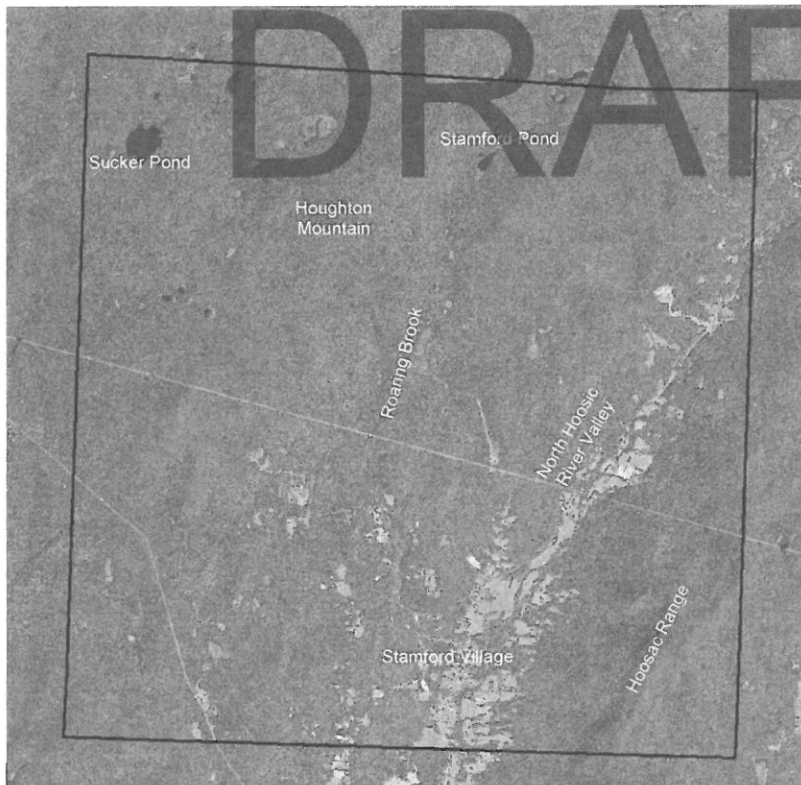


for final hearings and adoption. The Town Plan remains in effect for eight years, at which point it will need to be updated once again.

Effective implementation is critical to the success of the Town Plan. It is important, therefore, that the Town Plan be referred to by local, regional, and state officials and organizations when undertaking actions that will affect the town. The Planning Commission and Select Board must consider the Town Plan when preparing amendments to municipal bylaws and ordinances, and when considering significant municipal expenditures and pursuing grant opportunities. Because the Town Plan provides the basis for many town regulations, it should be consulted by developers interested in investing in the Town and by local and state regulatory boards when reviewing land use applications. The Town also can ask that state and federal agencies refer to the Town Plan when advancing plans or projects in the community.

Physical Geography

Stamford occupies a very mountainous forested landscape in southern Vermont; the lowest elevation, approximately 1,000 feet above sea level, is found along the north branch of the Hoosic River near the Massachusetts state line. Route 8/100 follows the Hoosic River Valley from the state line northeast, gaining elevation gradually at first, and then climbing more steeply to the Readsboro town line. The portion of the valley in Stamford is



Stamford is mountainous and heavily forested. The only sizeable open and developed areas lie along the Hoosic River Valley. Also prominent in this aerial view are the electric transmission lines that traverse the town.

approximately five miles long and quite narrow. It extends southward into North Adams where the river meets the south branch of the Hoosic and turns to the west. The Hoosac Range rises steeply to the east, reaching an elevation of 3,000 feet, while the main range of the Green Mountains occupies much of the north and west of the town, with a high point of over 3,000 feet at Houghton Mountain.

The Hoosic River is a fairly narrow stream in Stamford, but it lies at the heart of the relatively level and open land in the valley that defines much of the developed area of the Town. A number of secondary roads begin along the highway and follow tributary

streams into hollows and to some developed areas at higher elevations. Roaring Brook, rising near Stamford Pond in the north-central part of the town, is the most prominent of these tributaries. Sucker Pond, also known as Lake Hancock, is a relatively large body of water far from any roadway in the remote northwest corner of the town.

Approximately one fifth of the town's 26,084 acres occur at elevations in excess of 2,500 feet and an even greater percentage of the town's land is characterized by slopes in excess of twenty percent. It is not surprising, therefore, that permanent development and roadways are found only in a small portion of the town. Deciduous and mixed coniferous forests dominate most of the terrain, although open fields, agriculture cropland, and residential development are concentrated, and therefore much in evidence to travelers, along the town's main roadways.

History

Stamford is one of the oldest towns in Vermont, having originally been created as a New Hampshire grant in 1753. The French and Indian Wars prevented settlement in the area until 1764, but by 1791, 48 families - a total of 279 people - lived in Stamford. Many of these people moved from eastern Massachusetts and Connecticut, following the river valleys and eventually settling along the North Branch of the Hoosic. The first framed house was built off East Road in 1782. Two of the earliest settlers were Polly and Silas Blood, who moved to Stamford in 1799. The original plot of land and home built by the



One of many historic buildings near Stamford's village center.

Bloods has remained in the Blood-Lawrence family and has become what is today the Stamford Valley Golf Course.

The first residents cleared land, began farming, and constructed a number of mills to process saw logs and grain along the waterways. The Beers Atlas from the mid-19th century shows a small iron ore mine in town as well as five district schools, a "chemical works," two churches, two stores, a post office, a blacksmith, a tanner, two lumber dealers, a physician/surgeon, and manufacturers of shoes and boots, wooden ware, and chairs. At that time, homes were located along the full length of County Road between "Stamford Hollow" and Pownal.

The town's extensive forests and water power from the North Branch of the Hoosic River provided the basis for much of the community's early industry and development. Numerous sawmills were operating and large charcoal-producing kilns dotted the hillsides. The charcoal was used at iron smelters in North Adams and other industrial centers. The town's first major industry, established in 1865, was the A.C. Houghton Company, later known as the Stamford Chemical Works, which produced charcoal, wood alcohol, wood tar, and acetate of lime.

Churches were important early public buildings and centers of activity. The Union Church, built in 1821, was shared by Baptists, Methodists, and Universalists. Eventually, the Baptist and Methodist congregations each built their own churches in the center of the village along Main Road; the former Methodist Church is now privately owned and the former Baptist Church is now the Community Church.

The first school in Stamford was a log structure built in 1784; in 1880 there were seven school districts in the town with 145 students and eight teachers. By the late 1800s, travel had become easier and a building containing a central school, town office, public meeting room, and a jail—located directly in front of the present school and municipal building—was built. The present structure was constructed in 1960.

Many people from the area began moving away after the Civil War to occupy the more fertile farmland in the Midwest. Like many towns in Vermont, Stamford saw its population steadily decline through the early part of the 20th century, when rapid industry growth drew residents from rural areas to urban cores such as nearby North Adams.

In recent years, Stamford has been a quiet residential area, preferred by many people who work in larger communities nearby and by some who operate small businesses in town, work in local farming or forestry, or from their homes. The town maintains its historic village center along the Main Road. An elementary/middle school, town office, and a network of roads and bridges are important public assets.

Demographic and Economic Characteristics

Stamford's current population, estimated at 824 (2010 U.S. Census), is near its historic high, but has stabilized over the past ten years (Figure 1-1). The median age of the population at the 2010 Census, 47.5 years, is slightly older than the statewide median, but similar to the county median. The population is quite ethnically homogenous, as well over ninety percent report themselves to be of white racial background. A large percentage of the town's current residents are not native to Stamford, and many have moved to the community in recent years from a different state.

The number of housing units in Stamford showed steady growth for the past several decades, in keeping with the observed increase in the resident population. Most of the housing units existing in town as of 2010 were owner-occupied; just over ten percent are rental units and fifteen percent are seasonal or vacation units. The total number of housing units in Stamford at the 2010 Census was 410. This is a 6% increase from the 2000 Census, which was 387. This continued, but low rate of housing growth reflects the leveling-off of growth in population in Stamford. According to 2011-2015 ACS 5-Year Estimates, median value of owner-occupied homes in Stamford is \$215,000. There are an estimated 34 mobile home units in Stamford, representing about 7.2 percent of all housing stock, and the median value in the Town for mobile home is \$97,500.

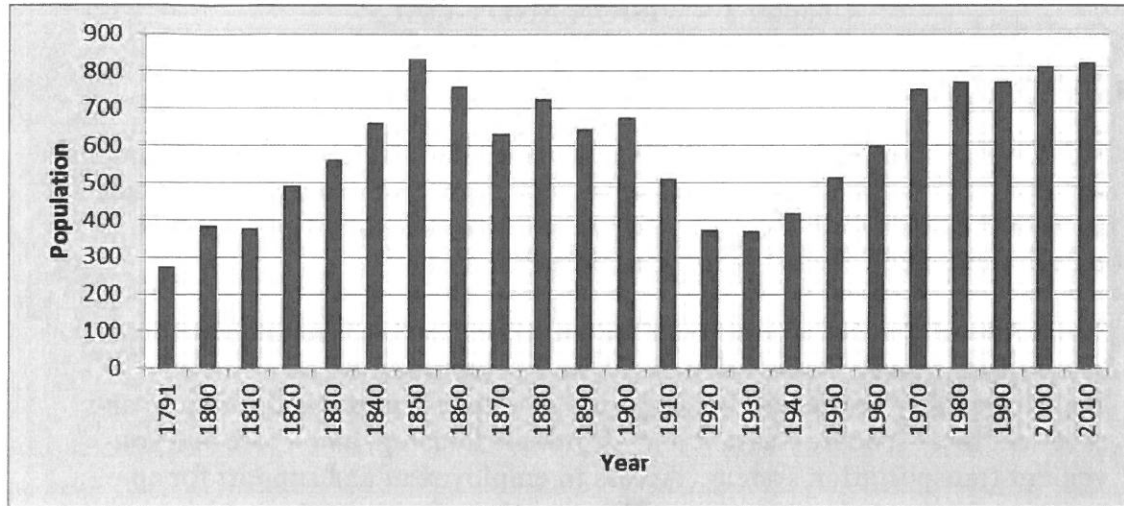


Figure 1-1. Stamford's population has risen and fallen over the years; it is currently quite stable at over 800 residents.

Approximately 483 of Stamford's residents are employed and the median adjusted gross family income (as of 2014) was \$66,813, three percent lower than the statewide median and eight percent higher than the median for Bennington County. Those living below poverty level in Stamford represent 6.6% of the total population, which is much lower than the county level of 14.2% or the state level of 12.0% (2011-2015 American Community Survey 5-Year Estimates). The vast majority of Stamford workers are employed at jobs outside of the town, and three out of four work outside the state. The average commute time for residents is nearly half an hour, suggesting that many people work in North Adams, Williamstown, Pittsfield, and Bennington.

Stamford maintains a local school for students through grade eight. Secondary students attend high school outside the town. Most adults in town have at least a high school education and a relatively high percentage have a college or advanced graduate degree.

The extent of federal and state owned lands in Stamford has a significant affect on the character of the town. Over 45% of the town is in public ownership, mostly conserved forest land in the mountainous parts of the Town. These lands, which total almost 12,000 acres, are part of the Green Mountain National Forest.



Chapter 2 - VISION AND GOALS

Vision Statement

The Town Plan is part of a process that is intended to help define the community's future direction. For that process to be effective, it is imperative that a clearly articulated vision for its future be set forth and accepted by the town. The following statement is based on aspirations and values that are central to Stamford.

Stamford will remain a rural town with a strong sense of community that is based on its unique historical, natural, and cultural resources. An outstanding quality of life will be supported by efficient municipal services, an excellent local school, pleasant and affordable housing, and a safe and convenient transportation system. Access to employment and support for appropriate business development will ensure that all citizens have an opportunity to participate in a diverse and sustainable economy.

Goals

1. **Support efforts to strengthen economic prosperity for Stamford residents and businesses.** Local economic development should be based on businesses that provide satisfying and rewarding employment while maintaining high social and environmental standards. Public policies and investments should foster development of appropriate business opportunities.

Promote the use of local products and resources in a manner that supports development of a sustainable local economy.

Recognize the importance of a variety of economic enterprises, including those based on new technology as well as traditional manufacturing, agriculture, and forestry-based businesses.

Ensure that educational programs provide the skills needed to support local businesses, and that convenient and affordable transportation to employment centers in nearby towns and cities is available to residents of Stamford.

2. **Plan development to maintain the town's historic development pattern** of a defined village area with a diversity of land uses surrounded by rural countryside. Support efforts to strengthen and revitalize the village center and ensure that new development is consistent with that area's historic character.

Development in rural areas should respect the need to protect the town's natural resources and scenic landscapes. The remote forest lands in the mountainous countryside east and west of the North Hoosic River Valley should be reserved for forest and recreational uses and, potentially, development of renewable energy resources, as deemed appropriate by the town.

3. **Protect significant natural, scenic, and historic resources.** Use public investment, regulation, and creative development techniques to protect open spaces, natural and fragile areas, scenic views, and historic sites, structures, and districts that are significant to the community.

Support appropriate utilization of local natural resources for economic and renewable energy development while ensuring that such use is accomplished in an environmentally sensitive manner.

4. Support policies, public investments, and projects undertaken by both private and non-profit developers that help **ensure the availability of an adequate supply of housing that is affordable and desirable for all of the town's residents.** Single-family, multi-family, rental, and ownership opportunities all should be available in sufficient quantity in the community.

Most new housing should be located near existing public roads and infrastructure. Housing development in outlying areas should be carefully planned to protect the town's rural character and to avoid placing excessive demands on public services.

Rehabilitation of existing buildings for housing and residential infill development on vacant land near the center of the community should be supported.

5. **Provide a safe, convenient, and efficient transportation system** that includes roads and bridges as well as facilities that encourage and accommodate other modes of travel including bicycling, walking, and public transportation. Ensure that highways outside of the town providing vital connections between Stamford and nearby employment and business centers are well-maintained.

Support establishment of public transportation services that provide convenient and affordable connections between Stamford and those employment and business centers.

6. **Ensure that community facilities and services are sufficient to meet the needs of the community.**

High quality and affordable educational, vocational, and child care opportunities should be available to meet the needs of residents and local businesses.

Regulatory standards for safe water supply and wastewater disposal must be enforced and consideration should be given to development of a small public water system and/or district wastewater treatment system to serve the center of town.

Emergency and public safety services should be adequate to provide for the needs of the community.

The recreational facilities at the school should be maintained for the use of local residents and efforts should be made to maintain or provide public access to outdoor

recreational opportunities - forests, trails, streams, and safe bicycling routes - that are important to the community.

Continue efforts to minimize solid waste generation and ensure that safe and cost-effective disposal methods are available.

7. **Promote the safe and efficient use of energy and utilization of renewable energy resources.** Pursue efforts to reduce overall energy use and minimize the energy required to operate municipal buildings, vehicles, and other facilities and equipment. Support efforts to develop sustainable sources of renewable energy, a smart grid, and other technologies that will help the area meet a significant share of its energy needs.



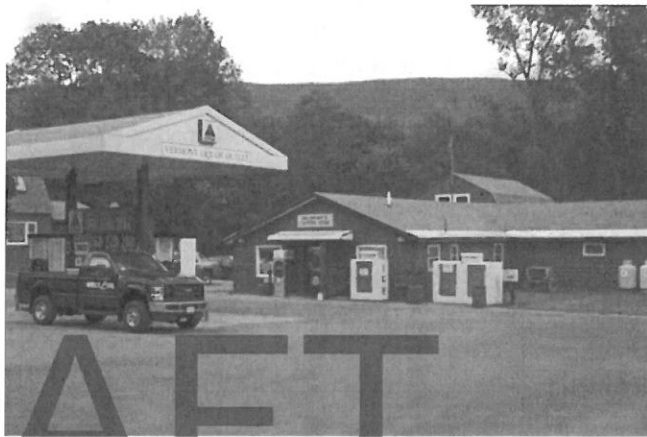
Chapter 3 - ECONOMIC DEVELOPMENT

Economic Profile

Stamford is a rural community with a number of small local businesses that offer employment to approximately 80 local residents (Vermont Department of Labor). Those businesses include three construction businesses, a wood products manufacturer, a retail store, a recreational facility (the golf course), three professional service businesses, farming and forestry related businesses, and the public school and municipal government. Although complete data for all of the businesses is not available, it appears that the elementary school is the largest local employer. Many of the businesses are sole proprietorships and/or home occupations with just one or two employees.

The majority of the 439 person resident workforce commutes to jobs in other towns; the average commute time is from 10 to 24 minutes suggesting that many residents work in employment centers of Adams, North Adams, and Williamstown.

The town's relative remoteness, lack of extensive infrastructure, and the rural character that most town residents seek to maintain indicate that large new businesses are unlikely to locate in Stamford. The quality of life available, a skilled workforce, and abundant natural resources do provide some real opportunities for economic growth, however.



Small businesses, such as this general store, will continue to be the mainstay of the town's local economy.

Economic Needs and Opportunities

According to a survey of residents completed in 2010, most support the establishment of new commercial or light industrial uses near the town's center, provided the impacts on residential properties and natural resources are minimal. A critical need to support such development is high quality telecommunication infrastructure throughout the Town. High speed internet and cell phone coverage enables more people to establish home-based businesses or to telecommute to more distant central offices.

Broadband service in Stamford currently is provided by the not-for-profit Southern Vermont Broadband Cooperative that operates four transmitters covering the center of the town. Fairpoint Communications also offers broadband access in parts of town, and a grant awarded to Sovernet Communications and the Vermont Telecommunications Authority by the National Telecommunications and Information Administration's Broadband Technology Program funded installation of high speed fiber line to connect numerous "community anchor institutions" such as schools, libraries, and governmental offices in recent years. This project has been a success, and high speed internet access is expanding throughout the Town.

The town's zoning bylaws allow for a variety of commercial and light industrial uses, as well as home-based businesses, throughout the residential and rural land use Districts (covering most of the valley areas of town). Those bylaws should periodically be reviewed to ensure that they support desirable business opportunities and that regulatory standards meet statutory requirements and mitigate against any impacts that could reduce business viability or adversely affect adjacent properties. In particular, the Town's land use regulations should reflect state policy protecting and supporting agriculture and forestry related businesses.

Sustainable Local Economy

Agricultural and forest lands once formed the basis for the town's economic prosperity, and it is possible that those resources, together with locally available renewable energy resources, will become critical economic assets once again. As pointed out in the chapter of this plan dealing specifically with energy, the long-term cost and availability of energy is a serious issue that needs to be confronted when planning for the local economy. As abundant and relatively inexpensive nonrenewable energy sources are depleted, local, regional, and national economies will have to adjust to new models that do not rely on continued broad-based growth requiring expanded energy inputs. This realization has led to a focus on "sustainable local economies," centering on the idea that economic systems must be developed that can function with less total energy. Such systems orient toward local production and markets, fueled by locally produced energy, and served by transportation modes that do not rely on gas and diesel fueled cars and trucks.

Existing local and regional businesses will remain important to residents of Stamford in years to come, but will need to adapt to take advantage of opportunities offered by things such as local renewable energy resources, production and distribution of local foods, manufacturing of goods using locally available resources, and industries that support economic sectors that function with lower energy requirements.

Stamford would like to continue to support local agriculture and promote sustainable farming. Community Supported Agriculture programs, or CSA's, represent an area of strong interest. The community would like to retain and attract more farmers to the area to develop a strong agricultural sector. Evaluating the demand for local products among people living in and around Stamford will be a necessary step to attract successful agricultural endeavors and potential CSA's. Another strategy to promote agricultural activities in the Town is to make gardening and fresh food more visible in the village center. One such effort is underway at the elementary school, where raised bed gardens were planted in July of 2017.



A sustainable economy will require increased awareness and appreciation of local resources.

Key points in the development of a sustainable local economy include:

- Conserving agricultural and forest land and supporting farm and forest product businesses. An emphasis on production of food for local markets significantly reduces energy use and keeps local money from being exported.
- When the community is faced with a particular need, the first methods considered for meeting that need should be those involving use of local resources.
- Produce as much of the community's energy demand as possible using local resources (while working to significantly reduce total energy use through conservation measures).
- Ensure there are opportunities and incentives for money paid into the local economy to circulate within the community.
- Develop markets for local goods and manufactured products in nearby communities.
- Support alternative transportation modes and public transportation options.
- Retain and develop local human resources.

Economic Development Policies and Recommendations

1. Maintain and enhance the infrastructure needed to support economic development activities in Stamford. In addition to public roads, water supply, and electricity, the town should support the expansion of broadband telecommunication infrastructure systems.
2. Protect the natural, historic, cultural, and recreational resources that provide an outstanding quality of life for residents, and which attract new residents and business to the area.
3. Review and expand the town's bylaws regarding home-based businesses to ensure that appropriate businesses are adequately encouraged and regulated.
4. Preserve the most productive agricultural and forest soils to support future growth in these economic sectors and support programs that benefit the working landscape.
5. Identify opportunities for development of the town's renewable energy resources, including use of biomass (wood) for heating homes and businesses, solar energy for heating water and generating electricity, small-scale hydroelectric generation, and properly sited wind turbines.
6. Participate in efforts to develop a sustainable local economy.
7. Identify local product demands to attract and support local agriculture and potential CSA businesses; support development of school garden programs.

Chapter 4 - LAND USE

Existing Land Use

Most of the town's land is undeveloped, the vast majority being remote forest land not served by year-round roads—and much of that is in public ownership (Map 4-1). Residential uses are concentrated along Vermont Route 8/100, intersecting town highways, and East Road. A number of houses also can be found along and near Mill Road and County Road, in the Lesure Road and Klondike Road areas in the southern part of town, and in the Alpenwald development in the northeastern part of town.

The few commercial uses in Stamford are found along the state highway and near the center of the village, with the exception of some home-based businesses, agricultural uses, commercial forest and earth extraction businesses, and forest product based manufacturing facilities.

In a 2010 survey, town residents indicated that they are supportive of maintaining the existing general pattern of land development; the importance of protecting rural open spaces and the value of allowing properly planned new commercial uses were ideas also advocated by many residents.

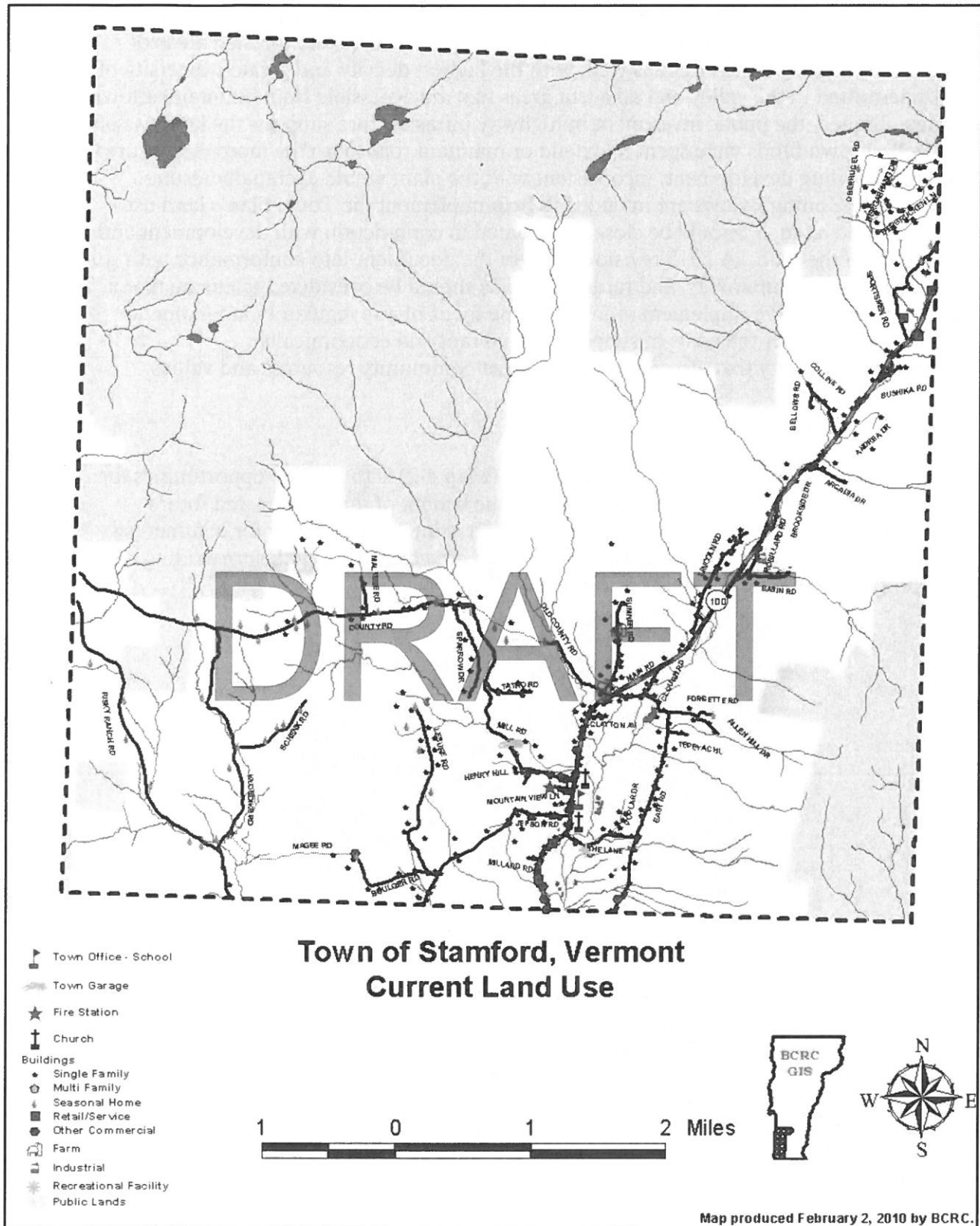
The Zoning Bylaws currently divide the town into three land use districts, with a separate Flood Hazard Area Bylaw creating Regulated Flood Hazard Areas that overlay some of those three primary planning areas. The Residential District occupies the most heavily developed areas along the valley floor and the Alpenwald neighborhood; the Rural District includes less developed areas that are accessible along town maintained roads that emanate from the valley, and the Forest District includes most of the remote and relatively undeveloped backcountry forest and mountain lands.

The Rural and Residential Districts permit a similar range of residential and commercial land uses, most requiring a minimum lot size of two acres, with most commercial uses being subject to a somewhat more rigorous “conditional use” regulatory review process. The Forest District allows more limited uses, most subject to conditional use review and a five acre minimum lot size requirement. Development in the Flood Hazard District must meet certain minimum standards to protect public safety and limit the potential for costly property damage.

The Town intends to apply for a Village Center Designation from the Agency of Commerce and Community Development. This initiative supports the revitalization of historic Vermont villages with existing public and commercial buildings and uses. Through a combination of financial incentives, specialized trainings, and enhanced eligibility for state grants, the program fosters revitalization efforts in participating towns. Identification of a compact village center for the purposes of this designation will help incentivize dense, infill development and walkability in Stamford's historic village center.

Land Use Plan

The town's plan for its development is consistent with the goal, stated in Vermont's Municipal and Regional Planning and Development Act, of encouraging compact settlements that contain a variety of uses and which are separated from other such areas by open rural countryside. The existing development of the Town reflects this vision as well, with the highest density of development, and the greatest variety of uses, located near the



Map 4-1. Most current development is concentrated near the village center and along existing public highways.

center of the village. The Zoning Bylaws in conjunction with the pattern of public land ownership (i.e., the extensive conserved land that lies in the upland forested areas of Stamford) support the concept as well, with the highest density and greatest diversity of uses permitted in the valley and adjacent areas that are accessible from maintained town roads. Indeed, the public investment in highway infrastructure supports the land use plan as well; if town funds were spent to extend or maintain roads into the more remote areas of town, sprawling development, inconsistent with the plan, would eventually result.

The Zoning Bylaws are intended to help implement the Town Plan's land use policies, and as such, should be closely evaluated in conjunction with development and adoption of the Plan. A 2015 revision brought the document into conformance with some new statutory requirements, and future revisions should be considered to ensure that it serves as an effective implementation tool. The focus of any regulatory amendments should be to further the goals of supporting a vibrant and economically efficient community that also protects important community resources and values.

Residential District

The purpose of the Residential District (Map 4-2) is to provide opportunities for development of a variety of housing types for the benefit of the existing and future population of the Town. The Residential District is intended to allow for commercial, light industrial, public, and institutional uses that are compatible with surrounding residential properties and the natural environment.



Single family homes on relatively large lots are common throughout much of the Residential District.

According to the Zoning Bylaws, the minimum lot size for a one-family dwelling in the Residential District is two acres, and for a two or multi-family dwelling, or a conditionally permitted use (including most commercial, industrial, public, and institutional uses), three acres. Because the Residential District is the area that contains the village center and the most accessible town and state highways, it is the area where land use policies should support and encourage the greatest density and diversity of land uses. Consideration should be given to whether the following concepts would advance the purpose of the Residential District and the overall land use goal of the Town Plan.

- Reduction of the minimum lot size requirement from two acres to one acre,

provided that water supply and waste water disposal permits are obtained. This revision could be effected throughout the Residential District, or a smaller “Village Residential” District could be established that covers an area around the historical village center entirely within the existing Residential District. If a public water supply system were to be developed at some future time, its service area could be defined to be consistent with this Village Residential area, and could allow for slightly greater development densities in this discrete area. Application for a Village Center Designation will help define this target area for future infill development.

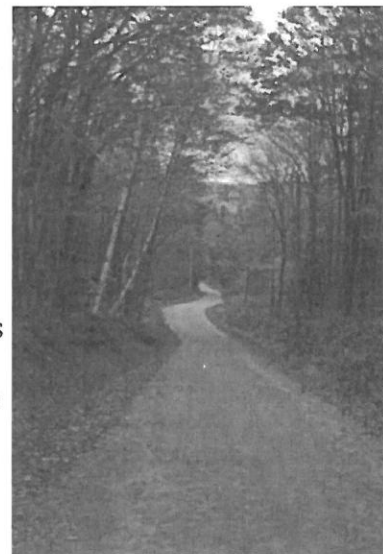
- Higher lot coverage limitations for community-oriented buildings (current maximum lot coverage is ten percent) and commercial buildings (currently limited to twenty percent). Additional lot coverage would allow all of these uses to be located efficiently in the center of the town and would contribute to a more “village scale” streetscape.
- The provision that allows for home-based businesses should be reviewed to ensure that it allows a reasonable opportunity for residents to carry on an occupation from their home in a manner that does not change the residential character of the neighborhood.
- The type of commercial and industrial uses that are acceptable could be more specifically defined to avoid potential confusion and appeals. Additional performance standards for these uses also would lead to greater certainty for a property owner or developer seeking to establish or expand such a use in the Residential District.

Rural District

The purpose of the Rural District (Map 4-2) is to provide opportunities for residential development in the countryside outside of the areas of town having the highest density of development, but in areas with relatively easy access from the existing network of town and state highways. Protection of important natural resources, including open space and agricultural land, is another important objective of the Rural District. The Rural District also is intended to allow opportunities for non-residential uses, particularly those that directly or indirectly support rural economic development and the town’s historical working landscape.

The Rural District allows for essentially all of the same uses permitted or conditionally permitted in the Residential District, but with a few items subject to more stringent conditional use review, and seasonal camps (permitted) and mobile home parks (conditionally permitted) also allowed.

The Planning Commission should consider whether to limit the type of commercial, industrial, and public and institutional uses permitted in the Rural District—not to reduce the ability of people to make economic use of their property—but



County Road is one of a number of local roads that provide access to homes, businesses, and open land in the Rural District.

to assure that uses that rely on frequent access by the public or commercial vehicles are located in a place where adequate infrastructure exists to ensure economic viability while limiting the demand for inefficient and costly new or upgraded facilities. Consideration also should be given to adopting regulations that provide incentives for residential developments that preserve open space and scenic views by carefully planning the location of buildings, roads, and other structures. Additionally, more detailed standards for the regulation of home-based businesses should be developed for the Residential District.

Forest District

The purpose of the Forest District (Map 4-2) is to protect valuable forest and other natural resources, support forest-based industries and recreation, and to provide areas for limited development.

Residential and certain other limited uses are allowed in the Forest District, although most permanent development is subject to conditional use review and a five acre minimum lot size requirement; structures are not allowed above 2,500 feet elevation or on slopes in excess of 25 percent. The Zoning Bylaws also allows the Planning Commission to restrict development if it is determined that the use would adversely affect a public water supply or an aquifer recharge area.

The restrictions related to elevation and slope, together with the prevalence of public conservation land and the lack of maintained public roads or other infrastructure, will mitigate significant levels of new development in the Forest District. Indeed, significant amounts of development in these remote areas, in addition to being potentially incompatible with resource protection, would demand costly and inefficient extensions of roads, electricity, and other public services.

The review of home-based business provisions also should be conducted for the Forest District. Because it may be difficult and costly for the Planning Commission to evaluate the impact of development on an aquifer recharge area, consideration should be given to replacing that regulatory language with a requirement that accepted guidelines for erosion control are followed and that all required state permits pertaining to wastewater disposal are obtained and copies submitted to the Commission prior to issuance of a local zoning permit.

Regulated Flood Hazard Areas

The purpose of the areas designated as Flood Hazard zones (shown in Map 6-1 in Chapter 6) is to prevent the loss of life and reduce property damage resulting from flooding and fluvial erosion, and to protect the important values provided by flood storage areas and associated riparian habitats.

Stamford recently updated the Flood Hazard Area Regulations to comply with Federal Emergency Management Agency (FEMA) standards and to maintain participation in the National Flood Insurance Program. The Flood Hazard Area Regulations were updated to:

- Implement the goals, policies, and recommendations in this Municipal Plan;
- Avoid and minimize the loss of life and property, the disruption of commerce, the impairment of the tax base, and the extraordinary public expenditures and

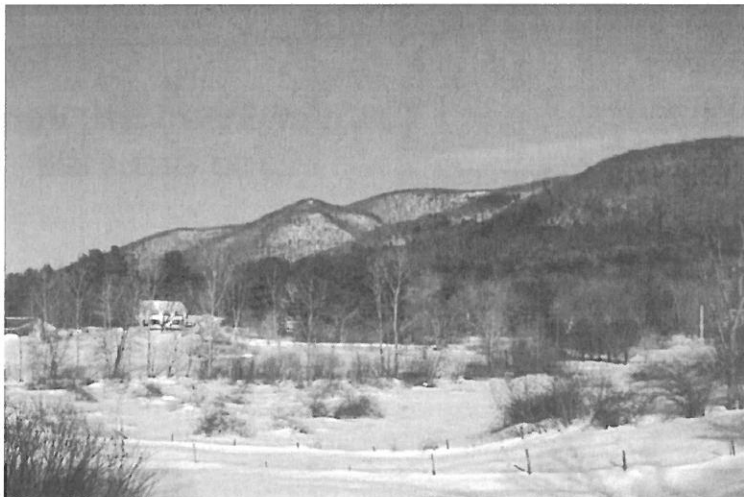
demands on public services that result from flooding related inundation and erosion;

- Ensure that the selection, design, creation, and use of development in hazard areas is reasonably safe and accomplished in a manner that is consistent with public wellbeing, does not impair stream equilibrium, flood plain services, or the stream corridor;
- Manage all flood hazard areas designated pursuant to 10 V.S.A. Chapter 32 § 753, the hazard mitigation plan, and make the Town, and its citizens and businesses, eligible for federal flood insurance, federal disaster recovery funds, and hazard mitigation funds.

New Digital Flood Insurance Rate Maps (DFIRM) for Bennington County became effective on December 2, 2015. The Town should widely publicize the new maps and standards to ensure that all affected property owners are aware of them. Flood hazards and flood resilience is further discussed in Chapter 6.

Land Use Policies and Recommendations

1. The Planning Commission should complete a comprehensive review of the Zoning Bylaw, considering amendments that advance the town's stated goal of supporting an efficient land use pattern characterized by compact development served by existing roads and infrastructure, and surrounded by rural countryside.
2. Encourage a relatively high density of development, and a diversity of land uses, in the Residential District, while ensuring that residential properties and important resources are protected.
3. Provide opportunities for properly scaled development in the Rural District that limits the need for new public infrastructure and preserves important open spaces, agricultural, and forest resources.
4. Development in the Forest District should emphasize protection of the economic and recreational aspects of forest resources, while minimizing costly scattered development.
5. Development in flood hazard and fluvial erosion hazard areas must meet local, state, and federal requirements to protect public safety and minimize property damage.





Town of Stamford, Vermont Land Use Plan



Map produced February 2, 2010 by BCRC.

Map 4-2. Most development is planned for the Residential and Rural Districts, with potential for a higher density mixed use area near the village center.

Chapter 5 - NATURAL, SCENIC, AND HISTORIC RESOURCES

Overview

Stamford's location and history have combined to create a community that is rich in a variety of resources. The town's natural resources have always played an important part in the life of the Town. Early settlers in the area farmed the agricultural soils in the valleys and harvested trees from the mountainsides. Streams provided power for early industry and abundant wildlife roamed through the forests and fields. These same natural resources provide economic benefits today, while also supporting important recreational activities for residents and visitors to the area. The scenic quality of the landscape, including both its natural and built features, is another important community resource. Views of rural fields, waterways, and mountains, often interspersed with winding country roads, stone walls, and attractive buildings, enhance the quality of life for residents and draw people to the area. The historic character of Stamford is represented in the many buildings and sites that recall earlier days and contribute to the community's important and unique sense of place.

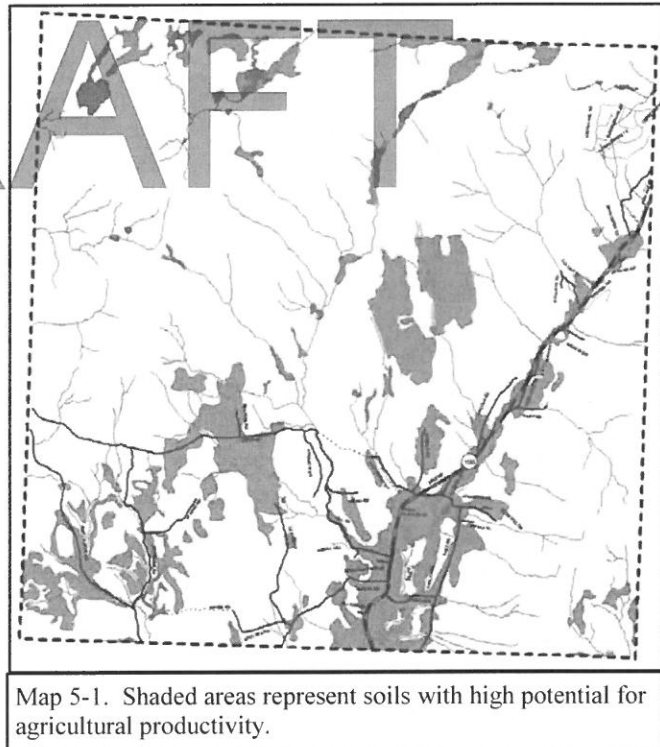
Agricultural Land

Stamford contains a significant quantity of good agricultural soil that historically supported a variety of farming operations (Map 5-1). Because prime agricultural soils are often the same soils that are best suited for home construction, and are often located on relatively level land and along stream valleys, these areas are commonly found along roadways and near existing development. The relatively sparse development in Stamford, however, has left the vast majority of these lands open and available for current or future agricultural use.

Conservation of agricultural land benefits the community in a number of ways, including:

- Support for an important local industry while ensuring the future viability of local food production;
- Maintenance of the town's rural character and agricultural heritage;
- Preservation of open space, scenic vistas, and ecological resources.

Although the number of active farms in Bennington County has been in decline in recent decades, this trend has recently reversed. The 2012 U.S. Census of Agriculture reports 79



more farms in Bennington County than in 2007, with an estimated market values of farmland on the rise. Diversification in the type of farming practices in the region and increases in the value of products sold suggests that farming is again beginning to grow in importance. The Bennington Regional Energy Plan points out that farming and food production in the county will become increasingly important as energy constraints affect the supply and transport of food. This trend will support expansion and diversification of local agriculture to include traditional dairy and crop farming, plus expanded growing and processing of grains, fruits, poultry and other livestock.



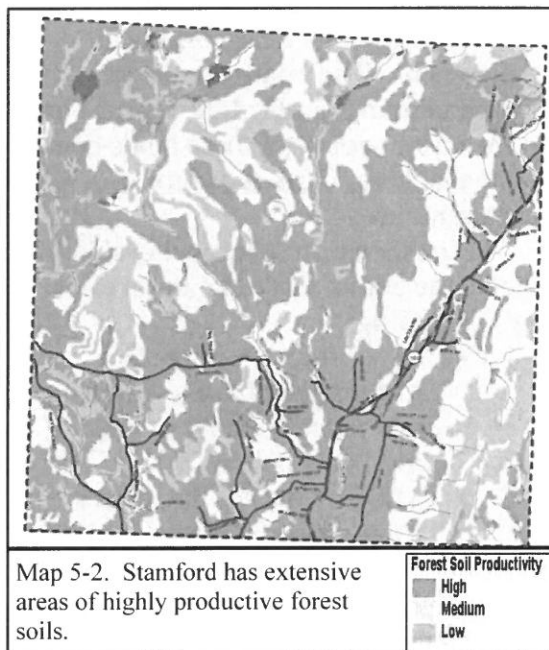
A greater variety of agricultural uses will support the local farm economy in the future.

Townspeople can support local farmers and agricultural potential by participating in farmer's markets and other efforts to expand use of local food. Agricultural land conservation is supported by the Town's current land use policies and can be further enhanced by encouraging new development to be planned to minimize consumption of productive land and by limiting potential conflicts with adjacent uses. Owners of agricultural land also can participate in state programs that reduce property taxes on open lands and further incentives for conservation are available through organizations such as the Vermont Land Trust.

Forest Land

Most of Stamford is covered in forests and much of the land in the Town is well-suited for growing trees (Map 5-2), with large unbroken tracts of woodland found throughout the high elevation lands in the north and west of town and covering the rugged Hoosac mountain range in the southeastern part of town. Numerous smaller woodlots are found throughout the more open valley lands. All of these forested areas help to prevent soil erosion and flooding, contribute to air and water quality, and support valuable timber, wildlife habitat, recreational, and aesthetic resources.

The extensive forests covering the remote and mountainous areas of the town have remained largely free of permanent development. Development in these areas will continue to be limited because of topographical conditions, high costs, extensive public land ownership (for conservation), and local land use regulations. Public forest lands—Green Moun-



tain National Forest and Vermont Department of Forests, Parks, and Recreation—are managed for multiple uses and should allow for a mix of timber harvesting, recreation, and protection of diverse habitats. The Town should participate in federal and state forest planning activities and should coordinate input with other nearby towns.

Private forest owners should consider tax incentives, conservation easements, and other programs that may prevent fragmentation of forests and make economic forest land management more feasible.

Water Resources

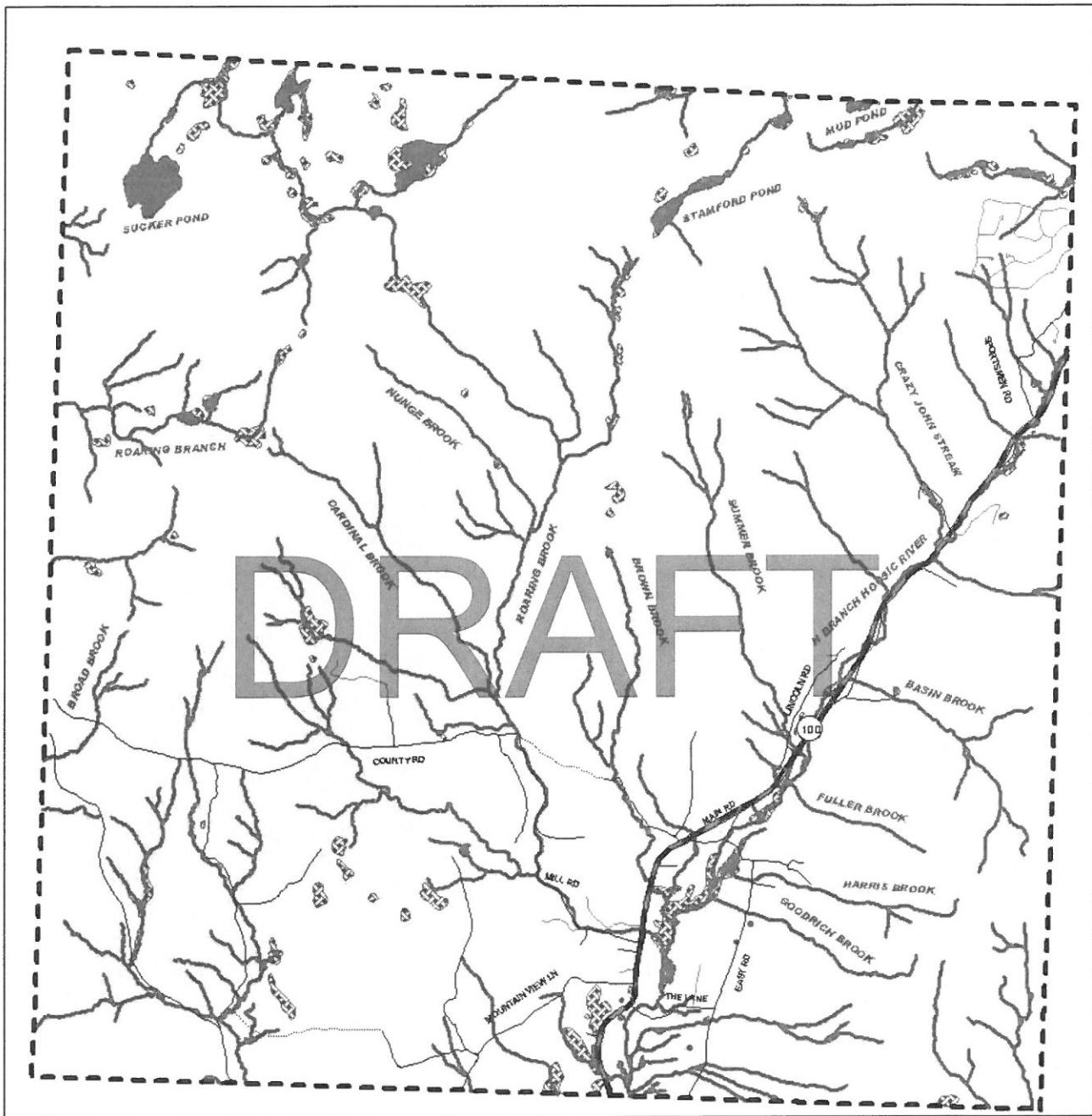
Stamford contains an abundance of water resources including ponds, wetlands, streams, and groundwater (Map 5-3). Effective planning for water resource protection requires consideration of activities that occur throughout a watershed. Soil disturbance during construction, stormwater runoff, road building and maintenance, and agricultural and logging activities all can increase the flow of sediments, nutrients, or other pollution into waterways. Appropriate land use and environmental regulations (including the new Vermont state stormwater regulations), adherence to accepted best management practices and erosion control procedures, and public education contribute to the protection of these vital resources.

Sucker Pond is a remote, 51-acre body of water surrounded by the Green Mountain National Forest, and not far from the Appalachian Trail/Long Trail. The natural beauty of the pond attracts campers, hikers, fishermen, snowmobilers, and all-terrain vehicle (ATV) users. Years of unmonitored use had taken a toll on the pond's shoreline and soil was eroding into the water, causing degradation of the pond's vegetation and fish habitat. The Bennington County Conservation District, the Green Mountain National Forest, and the Vermont Department of Environmental Conservation planned a restoration that also involved students from the Southwest Vermont Career Development Center's forestry and heavy equipment program and members of a local ATV club. Large boulders were placed along the shoreline to designate day use areas and a boat launch, native trees and shrubs were planted that will keep the soil on land instead of letting heavy rains wash sediment into the pond, and signs were installed to remind pond users to recreate responsibly.

A number of smaller ponds, particularly in the northern part of town (one of the largest being Stamford Pond), provide important benefits as do the many wetlands, mostly located along the North Branch of the Hoosic, along the shorelines of ponds and slow-flowing sections of streams, and at scattered locations in the Town's forests. Wetlands are particularly important because they provide critical flood and storm water control, maintain surface and ground water quality through sediment and nutrient absorption, and are



Recent work at the shore of Sucker Pond reduced erosion and improved water quality and public access (US Forest Service photo).



Map 5-3 Numerous streams flow from the mountains to the central valley of the North Branch of the Hoosic River, the largest tributary being Roaring Brook. Wetlands are located along the valley floor, near upland ponds, and in scattered locations in the forest. The largest bodies of standing water are in the remote northern part of town.



key habitat elements for many fish and wildlife species. The Vermont Wetlands Rules and federal regulations administered by the Environmental Protection Agency and Army Corps of Engineers add a measure of protection to high quality wetlands.

Numerous streams drain from the mountainsides and upland valleys, all flowing into the North Branch of the Hoosic River. The largest tributary of the North Branch is Roaring Brook; its drainage area covers most of the center of town. These waterways always have been important to the Town, first serving as a focus for settlement and development in both urban and rural areas and now providing important recreational and aesthetic benefits, and their preservation is of great concern to the community.

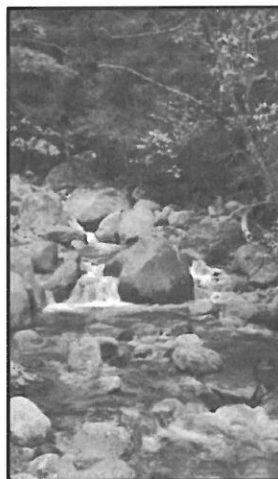
Biological sampling to assess the health of macroinvertebrate and fish communities of Roaring Brook and one of its tributaries, Cardinal Brook, in 2012 and 2013 showed these surface waters to be in excellent condition, and they are considered Class A streams (Vermont DEC, *Hoosic River Watershed Assessment*, 2014). The exceptional health of these streams is representative of other tributaries throughout Stamford, many of which offer excellent opportunities for fishing, with the North Branch of the Hoosic being particularly well-regarded as a cold water fishery. Waterfalls and cascades along the Town's streams, notably the Roaring Brook Cascade, are important scenic resources, and several streams also are sites of popular local swimming holes.

Environmental regulations that control discharges to streams help maintain the quality, function, and value of the resources. State regulations administered by the Department of Environmental Conservation control disturbances to stream channels, and local governments can implement zoning standards that provide guidelines for development and vegetation clearing within buffer zones along stream banks. Special care must be taken to protect streams located at high elevations (above 2,500 feet) because they support especially fragile ecosystems that thrive only in a narrow range of water quality conditions.

Most of the Town's drinking water supplies are derived from groundwater sources, and of course, streams and ponds are fed by groundwater as well. A sufficient supply of clean groundwater is therefore crucial to residents and to future development. State regulations require minimum isolation distances between private wells and springs and buildings, septic systems, and roads, and those standards should be strictly enforced. If the Town were to pursue a public water supply to serve the village area at a future time, a geologic assessment of groundwater supply and the recharge area needing protection would have to be completed.

Earth Resources

Mineral, sand, gravel, and other earth resources have been used in Stamford since colonial times. Iron ore was mined in the area and other materials were extracted or processed in Stamford or nearby towns. The only significant earth resource currently being



Streams are an important natural and scenic resources that support a significant cold water fishery, including brown and brook

extracted from the area is sand and gravel, used in road and building site work. Important earth resources should be identified and land development planned so that these deposits remain available for future use. Any new or expanded quarrying and extraction should be reviewed to ensure that environmental impacts are minimized and that site restoration occurs once the operation is completed.

Air Quality

The quality of the air in Stamford is generally excellent and efforts should be made to ensure that it remains clear and clean. Threats to air quality may come from a number of sources. A serious local environmental health issue involves the illegal burning of domestic refuse, so called “backyard burning.” Such activities discharge dangerous amounts of airborne particulate and toxic and carcinogenic products of combustion. Local and state regulations that prohibit such practices should be strictly enforced.

New businesses that may locate in Stamford should not produce unhealthy amounts of air pollution, and the town should remain aware of proposals beyond its borders for projects that might emit airborne pollutants that could affect the community. The Town also should encourage any new building or development to be as energy-efficient as possible to reduce the amount of combustible fuel used for heating as well as the demand for electricity.

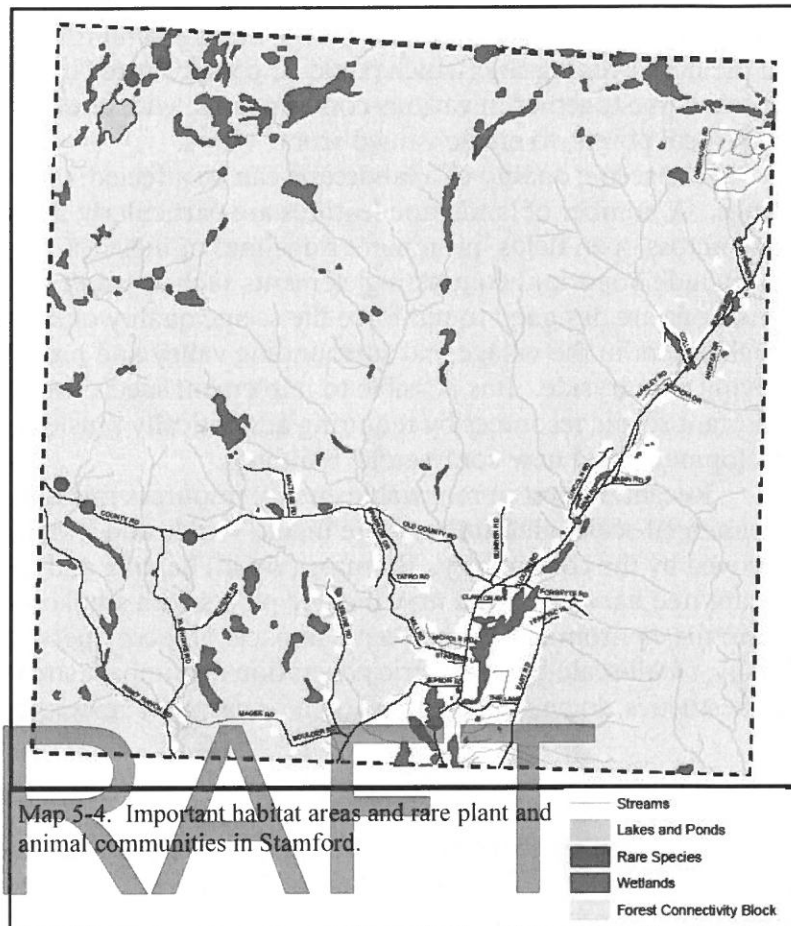
Fish and Wildlife

As noted in earlier sections of this chapter, the diverse natural environments of the Town provide habitat for a wide range of fish and wildlife species. Streams, ponds, and wetlands support popular sport fish as well as the invertebrate species they rely on for food. These water bodies also serve as critical habitat elements for waterfowl, amphibians, and many mammals (e.g., otter, beaver, bear, moose, and deer) that feed and travel along the shorelines. It is important to maintain natural vegetative cover along streambanks and to prevent the introduction into water bodies of sediments and harmful nutrients that promote growth of algae.



Whitetail deer and wild turkey are abundant throughout Stamford.

Large mammals such as whitetail deer and the black bear are a distinctive part of the local ecosystem and require specific habitat elements to survive. For residents of Stamford as well as visiting sportsmen, deer are a popular game animal. Efforts to protect these animals' habitats should focus on preserving large tracts of unfragmented forest land, such as those identified recently by the VT Agency of Natural Resources (ANR) as Forest Connectivity Blocks (Map 5-4). The vast majority of Stamford falls into these connectivity blocks since much of the Town is covered with forest. Other critical natural areas associated with rare species, special ecological communities, and wetlands have been identified in remote parts of the Town and



should be protected through the Town's land use regulations and planning goals. Additional vulnerable habitats can be viewed online through ANR's interactive Natural Resources Atlas.

One threat to local natural environments is the proliferation of invasive species, which are outlined and discussed in detail in the Town's Hazard Mitigation Plan. Invasive species are organisms that are not native to a geographic area and which could or do cause economic or environmental harm. Invasive organisms include both plant and animal species, and affect both aquatic and terrestrial habitats. The Town and its residents should take advantage of any future opportunities to better understand or remediate the presence of invasive species in the area.

Scenic Resources

Stamford is characterized by a well-defined valley that has contained a rich variety of rural and village development surrounded by forested mountains and remote hollows reached by winding country lanes and trails. While there are some vistas widely recognized for their scenic splendor, it can be difficult to identify the specific factors that come together to create Stamford's special visual appeal. The following features, however, contribute to the town's scenic values and should be recognized when development is

planned or preservation of visual assets considered: open fields, forested mountains, water (streams and ponds), distant views, narrow rural roads, public places, historic sites, and the dark evening sky (which could be compromised by excessive lighting). These features come together in various combinations, with contrasting elements and specific visual focal points, to create valued scenic views.

The scenic quality of a landscape can be affected, positively or negatively, by change. A number of landscape features are particularly sensitive to change, among them: views across open fields, prominent ridgelines or hillsides, historic buildings, and scenes that include important contrasting elements such as water. The Town's land use plan and regulations are designed to reinforce the scenic quality of the landscape by focusing development in the village and surrounding valley and preserving the rural character of the outlying countryside. It is possible to implement special regulations to protect particularly important scenic resources by requiring aesthetically sensitive design of residential developments and new commercial buildings.

Recent interest in renewable energy resources raises a number of important issues. Commercial-scale wind turbines are highly visible and should be located only in locations approved by the community. Biomass (wood) heating and electric generation involves significant tree harvesting and may include plants with smokestacks and visible plumes of steam; the environmental and scenic impacts of these operations must be considered. Finally, small-scale hydroelectric generation can impact stream water quality, fish habitat, and aesthetics, so new dam sites should be carefully reviewed.

Historic Resources

Stamford's historic sites and structures are important resources that provide residents with a sense of their heritage and a link with the past, promoting a sense of community identity and pride. A combination of regulatory controls, public funding for site and building improvements, and incentives for adaptive re-use of historic structures can help a town preserve its most important historic resources. The principal objectives of historic preservation in Stamford are to:

- Maintain the community's special historic and cultural heritage and preserve a sense of place and pride for the Town's residents;
- Maintain those historic and aesthetic qualities that are economic assets to the community and promote the economically viable reuse of historic structures;
- Ensure that renovations of historically important buildings preserve the character of the structures and are sensitive to adjacent historic buildings and sites whenever possible;
- Save historic structures whenever possible.

The Town intends to apply for Village Center Designation from the Agency of Commerce and Community Development. This program's benefits, which include historic tax credits and priority consideration for state grants, can directly support historic preservation efforts in the Town.

Policies and Recommendations - Natural, Scenic, and Historic Resources

1. Support efforts, through land trusts or similar means, to conserve productive agricultural soils and support economically viable farming operations. Land development in rural areas should be designed to preserve as much prime agricultural soil as possible.
2. Development in remote forest areas should emphasize forestry, recreation, and protection of important habitats and other natural resources. The Town should work with the US Forest Service and Vermont Department of Forests, Parks, and Recreation to conserve important forest lands and plan for appropriate mixed-use of the resource.
3. Surface waters should be protected through comprehensive watershed planning that includes erosion and stormwater control and by maintaining undisturbed buffers between development and stream banks and shorelines.
4. The quality and quantity of groundwater resources should be protected through strict adherence to state and local environmental and health regulations.
5. Development planning should consider the need for future extraction of important deposits of earth resources. Extraction operations should be conducted in a manner that does not harm the environment, the value of nearby properties, or future development of the site.
6. Air quality should be maintained by prohibiting discharges of unhealthy pollutants from industrial, commercial, or residential sources.
7. Critical fish and wildlife habitat areas and unique natural areas should not be damaged by incompatible development.
8. Development of renewable energy resources should consider both the need for locally produced energy and the need to protect natural and scenic resources.
9. New development should be sensitive to scenic resources and planned in a manner that preserves the visual integrity of critical scenic elements. The Town should work with conservation organizations to protect important viewsheds through purchases of land or scenic easements, and should support state and local scenic roads programs.
10. The Town should encourage preservation of historic buildings and structures; adaptive reuse of historic buildings, rather than demolition and replacement, should be pursued whenever practical and appropriate.

Chapter 6 - FLOOD RESILIENCE

Overview

With changing climate conditions and more extreme weather events, flooding is likely to occur with much greater frequency. It is imperative that communities properly prepare to minimize future flood damage and to develop the capacity for post-flood resilience. The State of Vermont maintains a Flood Ready Website that provides comprehensive information for municipalities (<http://floodready.vermont.gov>). Effective flood resilience requires several steps, including: assessing hazards, avoiding and reducing risks, preparing for an emergency, and insuring residual risk.

Once damage from a flood has occurred, it is important that communities have the capacity to effectively rebuild and recover. Following through on risk reduction strategies is critical at this stage, as is the ability to effectively access financial and other support from federal and state government agencies.

Assessing Community Hazards

Special Flood Hazard Areas include areas that have been determined to have a one percent or greater chance of inundation from flooding in any given year. These areas are shown in the Digital Flood Insurance Rate Maps (DFIRM) that became effective on December 2, 2015, and can also be seen in Map 6-1. As a participating municipality in the National Flood Insurance Program (NFIP) since 1978, the Town of Stamford maintains land use regulations that control the type of development that occurs in these areas. In addition, the Town does not have any repetitive loss structures.

Through the NFIP, Stamford residents and building owners have access to flood insurance including structures within the flood hazard areas. This insurance helps to protect owners from financial loss, as private insurers mostly do not provide coverage for damage due to overland flow.

River corridors require special attention because of the potential for flood-related damage to buildings and critical infrastructure resulting from the erosive force of floodwaters. River corridors include the meander belt of the channel and a fifty-foot buffer to allow for stable bank conditions adjacent to structures, in order to maintain dynamic equilibrium over time. River corridor maps have been developed based on scientific, location-specific assessment of the geomorphic condition of a river developed by the Vermont Rivers Program. The Vermont Agency of Natural Resources has recently completed the mapping of river corridors for all streams draining more than two square miles. The maps show corridors within which the rivers are likely to meander over time to find their most stable path while efficiently moving and storing sediment loads. The orientation and width of these meander belts varies with valley shape, surficial geology, and the natural channel length, slope, and width. River corridors can also be seen in Map 6-1.

Currently, the Town of Stamford has an ordinance in place to protect the river corridors. River corridor protection is in alignment with other state and community goals such as clean water, wildlife habitat, and public recreation. River corridors and the new DFIRM with Special Flood Hazard Areas can be viewed at tinyurl.com/floodreadyatlas. Historic Flood Insurance Rate Maps can be found at www.msc.fema.gov.

As noted above, most flood-related damage in Vermont results from the erosive

power of water causing damage to buildings and critical public infrastructure such as roads, bridges, and culverts. Public water and sewer systems, parks, and important historic sites also have been damaged by flooding-related erosion. Where stream meanders are confined by human activity, the waterways lose their equilibrium and become steeper, straighter, and more powerful, significantly increasing the risk for damage.

There are 14 structures located in the Special Flood Hazard Area, and 26 structures located in the river corridor (see Table 6-1 below). Of the 13 structures in the Special Flood Hazard Area, only one has flood insurance policies. This indicates that there are buildings vulnerable to flooding that are not currently protected through the NFIP.

Table 6-1. Structures in the Special Flood Hazard Area (SFHA) and River Corridor in Stamford. Sources: BCRC GIS analyses and Flood Ready Vermont Expanded Community Report		
Type	SFHA	FEH
Single family	13	23
Commercial	0	1
Government	1	1
Mobile Home	0	1
Total	14	26

Limiting Risk from Flooding

Elements of the natural environment play an important role in minimizing the extent of the risk from flooding. Upland forests help to retain water during storms and minimize the erosive forces that would add sediment and debris to river channels. Wetlands, particularly those in floodplain areas, retain stormwater and protect water quality during and after heavy rains.

Stamford's Flood Hazard Area Regulations control development in areas prone to flood inundation, enables the town to participate in the National Flood Insurance Program and, through that program, for property owners to have access to flood insurance. The regulations required by the insurance program set development standards that minimize adverse impacts on structures that would be caused by high water. The Town also has adopted regulations to protect mapped river corridors. The most important reason to protect these areas is to allow the river to adjust to changing levels of water, sediment, and energy, thereby dissipating destructive potential prior to impacting concentrations of residential or commercial development or critical public infrastructure. New municipal and state infrastructure should be located outside of hazard areas, or when that is impossible (as with the case of some bridge and water treatment facilities) that it be properly designed and constructed.

Roads and stream crossing structures (culverts and bridges) are particularly vulnerable to damage from flooding. Many existing culverts are too small to carry flood waters and too narrow to accommodate the stream channel, causing a back-up of sediments and creating plunge pools that damage roads and imperil nearby properties. The roadway design standards in the Town of Stamford should remain consistent with the most current “

VTrans Orange Book” Town Road and Bridge Standards to correctly size replacement structures.

The Emergency Relief and Assistance Fund (ERAF) Standards took effect in 2014. This program provides state funds to communities after a declared disaster to cover a portion of the cost of repair and restoration work not covered by federal funds. Communities receive additional state funding if they have taken specific steps to reduce the current risk (an extra five percent for steps 1-4 below, and another five percent for implementing step 5):

1. Participate in the National Flood Insurance Program;
2. Annually certify that Town Road and Bridge Standards meet or exceed the standards in the current *VTrans Orange Book: Handbook for Local Officials*;
3. Annually update and adopt a Local Emergency Operations Plan;
4. Adopt a FEMA-approved local Hazard Mitigation Plan (or, a draft plan has been submitted to FEMA Region 1 for review);
5. Protect River corridors from new encroachment; or, protect flood hazard areas from new encroachment and participate in the FEMA Community Rating System.

Local Hazard Mitigation Plans involve identification of local hazards while prioritizing the steps needed to mitigate risk and providing access to a funding source through the FEMA Flood Mitigation Assistance Program. To be effective, the local Hazard Mitigation Plan must clearly identify and prioritize specific projects. Funding to implement mitigation projects may be available through the Hazard Mitigation Grant Program (HMGP) in Vermont or through other FEMA Flood Hazard Mitigation Assistance programs. Stamford has a current Hazard Mitigation Plan that was adopted in 2015. The plan should be reviewed periodically and will need to be updated in 2020.

Preparing for an Emergency

Once a flood or other emergency situation occurs, it is imperative that municipalities have a consistent and reliable system for coordinating response. A Local Emergency Operations Plan (LEOP) is an effective way to coordinate local response and facilitate contact with other towns and agencies. The LEOP provides a list of local names, numbers and assigned roles, resources available, contact information, and provides a framework for coordination with support services available at the state and federal level. The LEOP should be updated annually and a copy submitted to the Vermont Division of Emergency Management and Homeland Security.

During large events multiple towns may collaborate, sharing staff, equipment, and other resources to achieve the most rapid and cost-effective response. Bennington County’s Local Emergency Planning Committee (LEPC 7) provides an ongoing forum for intermunicipal communication and preparedness planning. Municipalities also can execute formal intermunicipal mutual aid agreements that specify how support services are requested, cost sharing, and other issues. Having formal agreements in place will not only assist in the response phase of an emergency, but also can help recover reimbursable costs through FEMA in the event of a federal declaration.

Insuring Residential Risk

As mentioned above, most homeowner's insurance policies do not cover damage from flooding. The National Flood Insurance Program (NFIP) offers flood insurance for properties anywhere in communities that participate in the program – including the high risk special flood hazard area. While lenders must assure that mortgages for structures in special flood hazard areas are insured for flood risk, many existing structures in these areas either do not carry flood insurance or are not fully insured to receive "replacement value" after a disaster.

Flood insurance information is available for consumers at www.floodsmart.gov. That site helps to identify properties in areas of defined flood risk, explains the FEMA map products, and outlines insurance options. Recent federal changes to the NFIP have resulted in an increased costs, but insurance for affected properties remains available through that program.

If a structure is not insured the owner assumes the entire risk of property loss. In the event of a flood disaster the owner may be eligible for FEMA's Individual and Households Program Assistance, but this funding will not cover any losses that could have been insured. At the time of Tropical Storm Irene, the maximum Individual Assistance grant was \$30,200 and the average grant in Vermont was \$6,752, while the average NFIP claim was \$43,078.

Participation in the FEMA Community Rating System can decrease the cost of flood insurance for town residents. By taking extra steps to reduce flood damage, flood insurance policies are discounted from 5% to 40%. Additional information about the Community Rating System and other flood hazard initiatives is available from the Watershed Management Division of the Agency of Natural Resources.

Recovery After a Flood

Following the immediate response to a flood, communities often are faced with significant costs. Repairs to bridges, removal of debris, and armoring banks can cost a municipality several million dollars. After a federally-declared disaster qualified losses may be reimbursed through federal public assistance programs and Vermont ERAF. It may take a considerable dedication of municipal resources to navigate the federal bureaucracy after a disaster, a process made somewhat easier when complete and accurate records of damage and repair are maintained by the municipality.

Working to minimize risk and future damage, maintaining a current emergency operations plan, and insuring residual risk to the extent possible are the best ways to support recovery and ensure that the community is as resilient as possible.

Town Preparedness

The Town of Stamford is part of the NFIP, has adopted the Town Road and Bridge Standards, maintains a current LEOP, has a current Hazard Mitigation Plan, and has protected river corridors. These steps make the town eligible for the largest amount of state funding available through ERAF after a declared disaster. The town should continue to maintain up to date plans and to fulfil the requirements of ERAF.

Flood Resilience Policies and Recommendations

1. The Town and organizations including the Vermont Agency of Natural Resources, BCRC, the Bennington County Conservation District and others should work together to maintain and enhance the ecological integrity of rivers, streams, wetlands and upland forests.
2. An undisturbed buffer of natural vegetation should be established between rivers, streams and other waterbodies to reduce nutrient input and attenuate overland flow. This buffer should be at least 50 feet for streams such as Cardinal Brook with minimal potential for lateral or vertical adjustment or 100 feet for streams such as The Hoosic River with significant potential for such adjustment.
3. Developments or activities that would adversely affect the quality of the Town's surface waters shall be prohibited.
4. The Town should maintain flood hazard regulations to guide development toward safer locations and to incrementally achieve safer building stocks where they already exist in flood hazard areas. These regulations are designed to protect property and the health and safety of the population against the hazards of flood water inundation, and to protect the community against the costs which may be incurred when unsuitable development occurs in areas prone to flooding.
5. Stamford should prioritize bridge and culvert repairs and replacements to address condition, geomorphic compatibility and ability to provide functional passage for aquatic organisms. Bridges and culverts that impede flow during flooding events should be reconstructed or replaced.
6. Owners of property in flood hazard areas should be encouraged to secure propane tanks, firewood, boats and other items that could float away in a flood.
7. New development in Special Flood Hazard Areas and the River Corridors should be avoided where possible. Any new development that does occur should be designed and sited so as to avoid any increase in flooding or erosion and have no adverse impact.
8. Support acquisition by public entities or conservation organizations of buffers and River Corridors, especially those identified in hazard mitigation and river corridor plans.
9. Forested lands should be protected to assure that precipitation can be absorbed by forest soils and litter and the peak flow attenuated. Acquisition of land or easements or Current Use assessment should be used to protect these areas, especially along the tributaries.

10. The Town should collaborate with other municipalities, the BCRC, and the State of Vermont in planning for the use and protection of regional water resources such as the Hoosic River. This could involve an inter-municipal agreement between these towns for the long-term protection of these resources and to address flood hazards.
11. The Town should reach out to property owners within the flood areas to support elevation or acquisition of structures subject to repeated flooding and eligible for funding under the FEMA Hazard Mitigation Grant Program.
12. Remain current with the most recent Town Road and Bridge Standards.
13. The Town should consider participation in the FEMA Community Rating System program by implementing projects that would ultimately lead to rate reductions in flood insurance premiums for residents and businesses.
14. Maintain an up-to-date Local Emergency Operations Plan.
15. Maintain a current Hazard Mitigation Plan that meets FEMA requirements and provides access to grant funds that will reduce current risks.



Preventative actions and emergency response preparedness can help mitigate the impact of flood events such as the one pictured above, which compromised a transportation corridor in Bennington (photo from cbsnews.com).

Chapter 7 - HOUSING

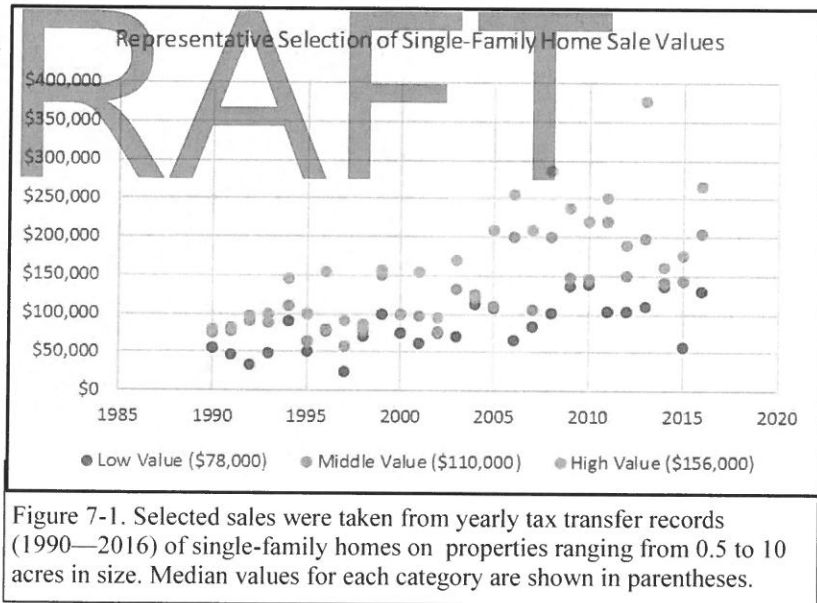
Overview and Housing Affordability

The majority of Stamford's residents live in detached single family homes, with most of those being located in the Residential land use district in the village and along Route 8/100 and adjacent town highways. The Town's land use plan, as implemented through the Zoning Bylaws, provides for development of an adequate supply of housing to meet demand for the foreseeable future. Relatively high housing densities and mixed uses are planned for the Residential district, and the land use chapter of this plan recommends consideration of higher densities in this centrally-located area. A large amount of land in the Rural and Forest districts also is available for carefully planned residential development. Multifamily housing, accessory dwelling units, and residential care homes for special needs populations are permitted as required by state law.

Housing affordability is an issue for Stamford residents from two different perspectives. A large majority of respondents to a 2010 citizen survey indicated that the greatest housing challenge they face is their annual property tax liability. Although further discussion of taxes will be presented in Chapter 8 (community facilities and services, and the public moneys required to pay for them), it is worth noting here that most residents surveyed stated clearly that they are not able to pay much more to fund public education and municipal services.

The second concern deals with the ability to afford a home in Stamford. The median annual family income in Stamford is approximately \$67,000 (Vermont Housing Data), higher than the county median but slightly lower than the state's median family income. The estimated median value of a single family home in Stamford is \$215,000 (American Community Survey 2011-2015). Using standard measures of affordability, a family earning approximately \$63,000 could purchase this "average" priced house in Stamford. Because actual median family income in Stamford exceeds this amount, it may appear that housing affordability is not a major concern. However, this assessment fails to consider the fact that some long-time residents may have had to leave the Town because they could not afford a home and other people who may want to move to town cannot do so because of the cost of housing. Their non-resident incomes are not effectively captured when attempting to assess the demand for housing in town.

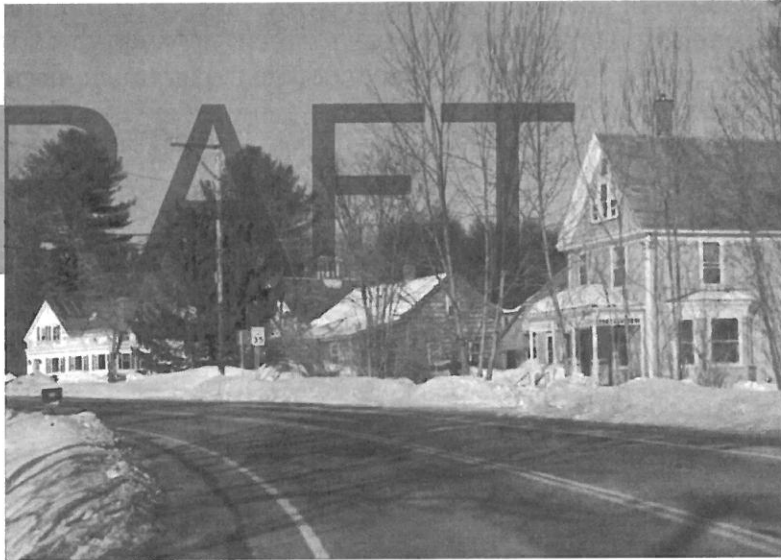
The sale price of houses in town has varied widely in recent decades, from under



\$100,000 to over \$200,000. Figure 7-1 shows a selection of single-family house sales from 1990 to 2016, identified by the Planning Commission to be representative of overall home sales each year. This representative sample suggests that while prices of higher value homes have risen significantly since the 1990s, the price of lower value homes have stayed relatively flat during the same time period. Though it appears from the data that low-cost homes are available in the Town, it is possible that depressed real estate values are tied to problems of low home upkeep and, therefore, quality. The Town may wish to further investigate real estate trends to see if promotion of existing programs that provide technical assistance and low-interest loans to property owners for home improvements could help improve real estate values over time.

Organizations such as the Regional Affordable Housing Corporation (RAHC) develop and maintain affordable housing in the region, although RAHC has never undertaken a project in Stamford. The Town's principal concern in addressing the need for affordable housing is to ensure that elderly residents of the community have options available to them. These residents may want to move to housing that is nearer public services, with fewer obstacles to personal mobility (such as stairs), or which offers some type of assisted living arrangement. Any public or nonprofit based effort to develop affordable housing in Stamford should first focus on this demonstrated need. Accessory apartments also can be a good housing option for older members of a family.

Although there currently are relatively few rental housing units in Stamford (approximately 35 in total, split almost evenly among rented single family homes, apartments in two-family structures, and mobile homes), there are opportunities for growth in this area as the Town permits duplex and multifamily (3-unit) housing. It may be possible to realize savings in construction and ongoing operating costs (heat, utilities, maintenance) in two and three-family units. In addition, "accessory apartments" can be an affordable option and are allowed as part of any single family home, subject to size restrictions and water supply and wastewater disposal permits.



A concentration of housing is found along Main Road near the historic center of the village.

Housing Design and Characteristics

Ideally, a range of housing types (ownership, rental, single family, and some two or three-family units) should be available at a range of price levels to service differing

segments of the population. Any new residential developments (subdivisions or other multi-unit projects) should be planned to include as many of the following “smart growth” features as possible:

- Locating buildings to minimize impacts on important natural resources and open spaces.
- Relatively narrow streets that discourage high vehicle speeds and which form good connections to the existing road network.
- Pathways or sidewalks to provide safe and convenient routes for people to walk within the development and to adjacent neighborhoods or other destinations.
- Building location and designs that encourage human interaction along the street and which provide parking for vehicles that are not overly prominent.
- Carefully planned landscaping along streets and in any community open space areas.

The Town also should encourage any new or rehabilitated housing to be made as energy efficient as possible. Any new housing that is considered “affordable” should consider ongoing energy costs as well as initial construction cost. Adequate insulation, minimizing air infiltration, proper ventilation, efficient furnaces, appliances, and other structural features should be incorporated in new construction and substantial renovations to existing homes. All homeowners and builders should be made aware of the state Residential Building Energy Standards, that are mandatory for all new home construction and additions in excess of 500 square feet. The Town should help publicize state and federal programs that provide incentives for weatherization of homes and installation of various renewable energy systems, such as rebate and incentive programs available through Efficiency Vermont and energy audits and financing options through NeighborWorks of Western Vermont.

Housing Policies and Recommendations

1. Opportunities should exist for people to buy (or rent) a dwelling in one, two, or three-family buildings in appropriate locations—as defined in the zoning regulations—at a range of costs to meet the needs of people of a variety of income levels.
2. Recognize and address the housing needs of elderly residents by working with regional and state housing agencies and private developers. Support development of additional housing that meets the needs of this population in or near the village center.
3. Residential developments should be designed to be compatible with the character of the Town, provide safe, comfortable, and attractive neighborhoods for residents, and include amenities such as pedestrian walkways and landscaped public spaces.
4. Energy conservation and efficiency should be an important consideration in new and renovated housing. Incentives for investment in conservation and renewable energy systems should be supported.

Chapter 8 - TRANSPORTATION

Overview

A safe, convenient, and efficient transportation system is essential to Stamford's residents and to support the economic progress and quality of life goals identified in this plan. The transportation "modes" that form this system include local and state highways and bridges, facilities for bicycles and pedestrians, public transportation, and access to air and rail facilities outside the Town. Because the state highway and the network of local roads that reach out from it are the most widely used part of the transportation system, much of this chapter will focus on those resources. However, the other modes are important, and may become increasingly important over time. In addition, the plan must consider the relationship between land use and transportation to ensure that the infrastructure continues to function well and that the need for costly upgrades and repairs are minimized.

Roads and Bridges

The first settlers to the area constructed roads that served as a framework for the Town's future development. Ever since that time, roads, whether traveled by horse and wagon, car, truck, bus, or bicycle, have been the most prominent element of Stamford's transportation system. These roads provide access to homes, the local school and municipal offices, recreational sites, the local store, and most other local destinations, while also connecting Stamford to jobs, schools, shopping, cultural and governmental sites, and other transportation modes outside of the Town. It also is important to remember that these same roads are the most visited public places in Stamford, by residents and visitors alike, and as such their design and relationship with surrounding land uses contributes greatly to the Town's sense of place.

Although the highway network is used primarily by cars and trucks, it is important to recognize that bicycles, pedestrians, and buses must be accommodated on many of these roadways and bridges. Moreover, within the next few decades, gasoline and diesel powered vehicles will no longer be the most common users of the highway system, and consideration must be given to the eventual increased use by public transit vehicles, bicycles, and vehicles powered by alternative fuels such as electricity. Roadway design and infrastructure must begin to consider this inevitable transformation in the use of our roads.



The Town's network of state and local roads (East Road is pictured here) provide access to adjacent land uses and are themselves important public spaces.



The Vermont state highway system begins and ends at the state line in Stamford.

Stamford contains over 30 miles of public roadways (Map 8-1). VT Route 8/100 is the only state highway in town; it functions as both a local collector highway (collecting traffic from local roads and providing direct access to adjacent properties) and as a minor arterial highway accommodating through traffic between other towns and destinations). The Bennington Regional Transportation Plan identifies several needs for this section of highway: ensuring safe vehicle speeds (which may include traffic calming, enforcement, and village “gateway” treatments) especially in the village area, improvements to provide

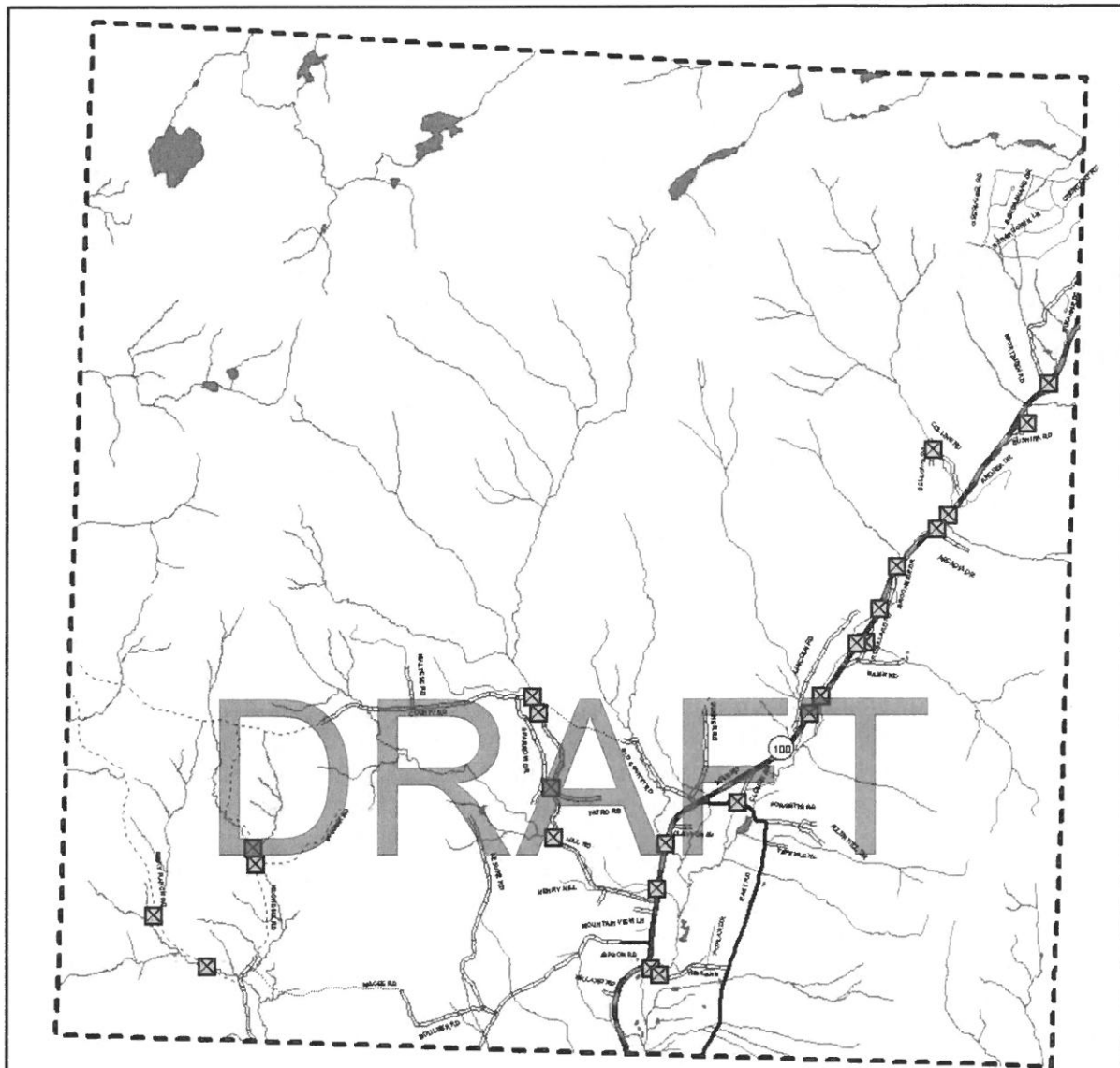
better mobility and safety for pedestrians and bicycles, an improved village streetscape. The portion of Route 100 in Stamford is the southernmost section of this renowned scenic roadway that runs north-south for over 200 miles through the center of Vermont, making Stamford a “gateway to the Green Mountains.”

The network of local roads provides access to houses, camps, businesses, land, and to the state highway system. Over half of the municipal budget is devoted to highway-related expenditures (\$430,973 out of the \$673,760 total 2016 annual budget). Consequently, it is extremely important that the Town be diligent in maintaining and repairing this infrastructure to avoid the potential for unexpected and costly repairs in the future. The Town also should be cautious about approving extensions of roadways to remote parts of town, as maintenance in these areas would be very costly. There are no major road projects planned at this time, but the highway department will continue with routine maintenance and culvert repair (ten culverts per year with priorities established annually).

Several sections of the Town’s local roadway network are characterized by steep grades, unstable banks, and proximity to fast-rushing streams. Special construction and maintenance measures are needed in these areas to avoid damage to the highways from erosion and to minimize siltation in streams that would degrade water quality.



Two scenes along Mill Road illustrate the challenges of maintaining a rural road network in Vermont; a large retaining wall and a row of mailboxes—suggesting that the Postal Service prefers not to make the trip all the way up the hill.



Stamford Transportation Infrastructure

- ☒ Bridges
- Class 2 Town Road
- Class 3 Town Road
- - - Class 4 Town Road
- State Highway
- - - Private Road
- - - Discontinued Road

Map 8-1. Public roads and bridges provide access to land along the town's main valley (State Route 8/100 and adjacent town highways) and to developed areas, primarily in the southern part of town. The state highway extends 5.75 miles from Clarksburg to Readsboro; East Road (2.03 miles) and Jepson Road (1.47 miles) are Class 2 town roads, while the majority of town roads (14.1 miles) are Class 3. The Town is not responsible for maintenance of Class 4 town roads (of which there are 7.03 miles) or town trails (another 1.1 miles).

Town and state bridges are critical links in the highway system. The Vermont Agency of Transportation conducts regular safety inspections of bridges and establishes priorities for funding and necessary improvements. Special funding assistance is available for required repairs to town bridges and culverts. Whenever a new bridge is constructed or an existing bridge is repaired or reconstructed, every effort should be made to maximize safety for motorists as well as bicycles and pedestrians.

Access Management and Traffic Calming

Access management deals with the relationship between the roadway network and adjacent land uses. The highway system needs to provide for safe and efficient through traffic movement as well as access to residences, businesses, and other uses located along the roadways. Those two functions often come into conflict and access management is a set of principles and tools that can be used to minimize those conflicts.

The Town should consider access management when planning for highway system improvements and when reviewing land use developments. A wide range of tools are available to a town to maintain or improve access management conditions. The most basic methods involve zoning controls over the location, type, and intensity of development. Site plans for new developments or redevelopment of existing properties should include features such as: limiting the number, width, spacing, and alignment of curb cuts; requiring connections between adjacent commercial properties for both vehicles and pedestrians; restricting parking to the side or rear of buildings; constructing sidewalks from the public right-of-way to commercial or public buildings; and requiring access drives to intersect side roads when possible.

Traffic calming involves the use of physical changes in the roadway and enforcement to reduce vehicle speeds. In village areas, these techniques can safely balance the needs of motorists, bicyclists, and pedestrians. Traffic-calming promotes safety while creating opportunities to enhance the aesthetic elements of a roadway by reducing pavement width and increasing landscaping.

A wide range of traffic calming tools are available. Some of the most common techniques are:

- Improvements at “gateways” to village areas; these changes could include landscaping, pavement markings or center islands, or modifying intersection geometry to force vehicles to slow down.
- Reduction of motor vehicle travel lane width in village centers.
- Bulb-outs or “neck-downs” at crosswalks.
- Providing space for on-street parking.
- Enforcement, especially a visible enforcement presence.

The Vermont Agency of Transportation has developed a series of standard drawings for traffic calming devices. The Town should consider utilization of one or more of these techniques wherever vehicle speeds might compromise safety and especially in the village center area.

One way to determine where traffic flow issues may be occurring is to undertake a traffic study. 2006 was the last year a study was completed in Stamford, so the Town should pursue another study with support from BCRC staff. Even without a study, two

sites requiring traffic interventions are apparent at this time:

- Along Route 8/100, from just south of Billmonts Country Store to just north of the Nichols road intersection. Radar speed limit signs placed at each end of this central corridor of town would deter speeding more than the existing speed limit signs do.
- On The Lane road an existing speed limit sign should be moved to be more visible to motorists.

Pedestrian and Bicycle Transportation

Everyone spends at least part of their day as a pedestrian, even if that involves simply walking from a car to a house, workplace, or store. Many people walk much further, of course, using roadways, and where there is considerable vehicle traffic, benefiting from the presence of sidewalks, pathways, or wide road shoulders. Bicycling is a very efficient transportation option that also is a popular recreational activity for many people. Many of Stamford's roads are ideally suited for bicycling, and a bicycle commute into North Adams is possible. Any type of human-powered transportation has the added benefits of promoting good health and reducing vehicle emissions.

There is little traffic volume on most of the town highways in Stamford so pedestrian travel along these roads is generally safe, as is bicycle travel (depending, of course, on the absence of ice or mud and use of proper bicycle tires). Route 8/100, however, is characterized by higher vehicle speeds and concentrations of residential and public land uses—including the school, recreational facilities, and town hall—and road shoulders are narrow and sidewalks lacking. The Town has long sought improvements along this route; specifically, wider and better maintained shoulders in rural areas and a sidewalk in the village center. The Town should urge the state to include shoulder improvements when new paving or other roadway rehabilitation work is planned. Grant funds were obtained to construct a sidewalk in the village center along Route 8/100 from the Stamford Community Church to the Stamford Elementary School and town offices. The new sidewalk, completed in 2015, is appreciated by visitors to the school and town offices, and future expansion should be pursued to increase pedestrian access to the village center.

Horseback Riding

Stamford's roads and backcountry trails are popular with horseback riders, and horse-drawn vehicles are an efficient and green transportation option. The Town should ensure that its traveled ways continue to accommodate horses.

Town Trails and Other Rights of Way

The Town concluded in 2012 a review of historic travel corridors as part of statewide 'Ancient Roads' legislation, which enabled towns to formally retain, discontinue, or reclassify travel corridors that had fallen out of use or were otherwise not formally recorded at the state level. Following an investigation, the Stamford Ancient Roads Committee recommended the discontinuance of most 'ancient roads' in the Town. Some residents consider the abandonment of these corridors a loss to the community, seeing these rights-of

-way as having potentially provided valuable hiking, biking, or riding routes. The Planning Commission recommends that the Town seek future opportunities to improve and expand trail networks throughout the community, and make it a priority to preserve and develop these community resources. Additional information on existing and proposed trails is provided in the following chapter on community facilities and services.

Bus, Rail, and Air Transportation

There currently is no public transit bus service to Stamford, although human service agencies provide some demand-response service to residents with transportation needs. The Town should investigate opportunities to extend any local bus routes that run northward from North Adams, to provide a transportation alternative to the nearest commercial and job center as well as connections to intercity bus routes.

The nearest passenger rail stations are in Brattleboro and Rensselaer, New York. The Amtrak service through Brattleboro provides connections northward along the Connecticut River corridor to White River Junction and then across the state to Essex Junction, and southward through Massachusetts and Connecticut to New York City. Amtrak service from Rensselaer is much more direct to New York City and also offers options north and west.

A thruway bus service between the Albany/Rensselaer Amtrak Station and Bennington was recently approved and is scheduled to begin operation by the fall of 2017. Two or more round trip shuttles will be made daily, making timed connections with Amtrak train service to Penn Station in New York City. The service will greatly expand access to the Southwestern Vermont area for both vacationers and potential residents who could live in Vermont while maintaining a business connection in nearby metro areas. Vermont residents will also benefit from improved access to passenger rail service.

The Harriman and West Airport in North Adams is a general aviation airport available for public use. Stamford residents use a variety of regional airports for passenger service: Albany, New York; Hartford, Connecticut; and Manchester, New Hampshire being the most accessible from the Town. Regional airports include Bennington's William H. Morse State Airport, the Pittsfield Municipal Airport, and Rutland Southern Vermont Regional Airport. William H. Morse is home to the Bennington Civil Air Patrol wing, which serves the Southern Vermont region. There is no commercial passenger or freight operator based at William H. Morse, but it is a general aviation center used frequently by business travelers, as is the Pittsfield Municipal Airport. Rutland Southern Vermont Regional Airport operates direct flights, serviced by Cape Air, to and from Boston Logan International Airport several times a day.

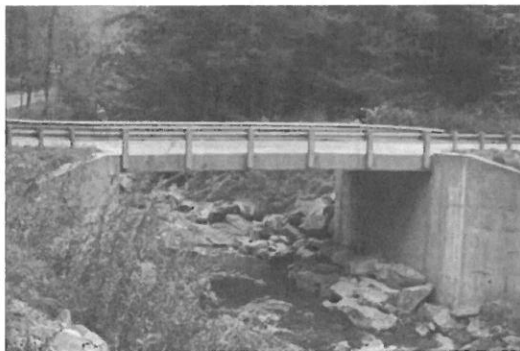
Electric Vehicles

The State Comprehensive Energy Plan emphasizes the importance of planning for new technologies to help reach the goal of meeting 90% of the state's energy needs through renewable energy sources by 2050. Supporting the growth of electric vehicles is one way to help Vermont meet this goal. The use of electric vehicles will continue to increase by more than 15% by 2025. to attract those traveling in electric vehicles, municipalities need to provide electric vehicle charging stations. With the installation of charging stations, the Town

will be able to attract electric vehicle travelers by accommodating their vehicle of choice.

Transportation Policies and Recommendations

1. The safety and convenience of all users of the transportation system, including car and truck drivers, pedestrians, and bicyclists should be accommodated and balanced in all transportation and development projects so that each can efficiently use these travel ways.
2. Continue to provide adequate funding for town roadway maintenance and equipment needs to ensure that roads and bridges do not deteriorate to the extent that costly and/or unexpected repairs or reconstruction are necessary.
3. Maintain traffic carrying capacity and safety on local and state highways through implementation of planned improvements and application of access management and traffic calming techniques.
4. Require that new public and private roads and driveways be designed according to town standards. Such construction also should avoid adverse impacts to natural or scenic resources.
5. Plans for paving or significant rehabilitation of VT Route 8/100 should include shoulder improvements to safely accommodate bicycles.
6. Consider support for eventual extension of a public bus connection to Stamford from North Adams.
7. When feasible, provide road, driveway, and pedestrian connections between adjacent developments.
8. The Town supports the use of alternative fuels in transportation, such as electric-powered vehicle use, and should consider them in planning when feasible.
9. The Town can pursue a traffic study with support from BCRC, as well as specific interventions on a central portion of Route 8/100 and The Lane road to deter speeding.



Chapter 9 - COMMUNITY FACILITIES AND SERVICES

Overview

A variety of facilities and services essential to residents' quality of life and the vitality of the Town are provided by the municipal government and other public agencies or public service organizations. As the community changes over time, and as new economic and social challenges emerge, the type and quantity of services provided must change as well. Changing technologies also present challenges and opportunities that must be addressed by the Town. Because considerable public and private investment is required to ensure that important services are provided, it is important that existing conditions are well-documented and that planning for future improvements occurs on a regular basis.

Water Supply and Wastewater Disposal

Residences and businesses in Stamford all obtain their water from private sources, primarily on-site wells, and dispose of wastewater into private wastewater systems, generally consisting of a septic tank and an infiltration field. Some level of contamination has periodically been observed in several wells in town, and strict conformance with all local and state environmental regulations pertaining to water supply and wastewater disposal is necessary to ensure that additional problems do not develop with either existing or future wells.

The lack of any centralized system for water supply or wastewater disposal limits the ability of the town to concentrate development at high densities in the village center because lot sizes need to be large enough to protect ground water quality. If additional water quality concerns become more prevalent, or if the Town decides that providing additional housing opportunities at higher density levels in the center of town is a priority, consideration should be given to developing a public water supply to serve the area. A study to determine an appropriate groundwater recharge area, a service area, construction costs, and financing options would be required. A public wastewater disposal system would be a more expensive option, but less costly alternatives such as small "package treatment" facilities could be physically and economically viable solutions to replace a limited number of failed septic systems.

Solid Waste and Recycling

Stamford operates a solid waste transfer station at a location adjacent to the municipal highway garage (Map 9-1). A landfill located off Old County Road was closed in 1972 and replaced by a municipal incinerator; it failed to meet new state environmental regulations and was closed in 1998.

Solid waste disposal costs are significant, amounting to almost \$46,000 in



The highway garage also is the site of the Town's transfer station.

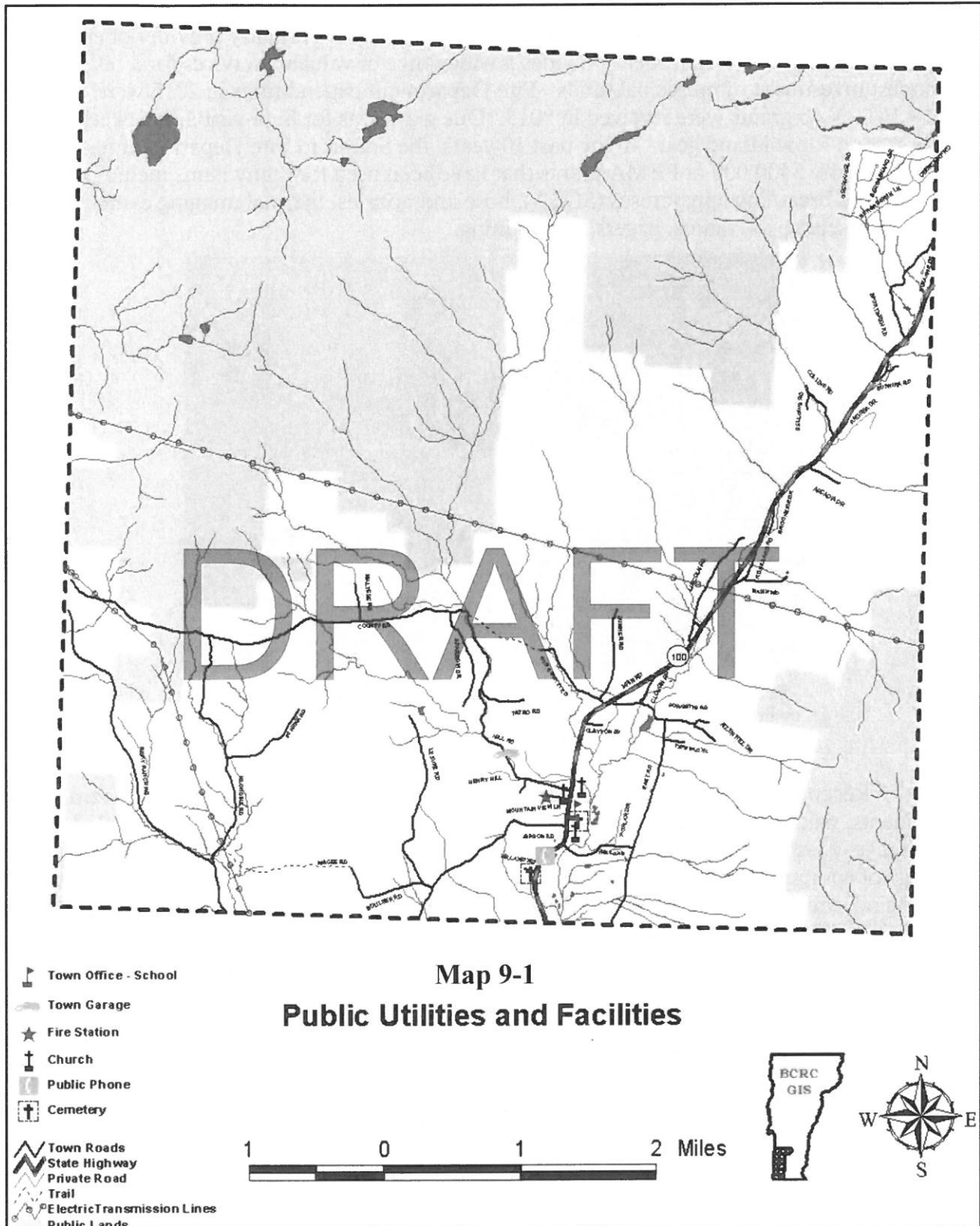
2015. The most effective way to limit the cost of solid waste disposal is to reduce the amount of waste generated. Beyond that, an aggressive recycling program can be very effective. The recycling center at the municipal transfer station is open on Saturday mornings and, from April through October, on Wednesday afternoons. Teaching and demonstrating the concept of “reduce, reuse, and recycle” is extremely important and should be reinforced by improved efforts at the local school and municipal offices.

The Vermont Legislature passed the Universal Recycling Law, or Act 148, in 2012, to significantly reduce the amount of material going into landfills. To abide by this law, the Bennington County Solid Waste Alliance (BCSWA) was formed. The Town of Stamford is part of the BCSWA. The mission of the BCSWA is to reduce the amount of waste disposed in landfills, by incineration, or other similar means by reducing the amount of waste generated, conserving resources and promoting recycling and reuse. To accomplish this, the Alliance has adopted the following goals:

1. Reduce the disposal rate or the amount of municipal solid waste disposed by 25% by 2020 from the 2015 amount.
2. Increase the diversion rate, or the amount of material diverted from landfills to 50%.

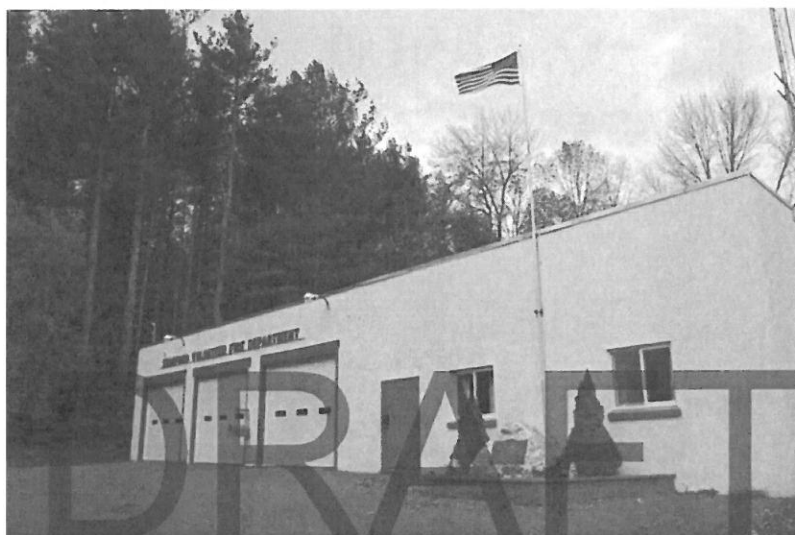
In June of 2014, the Vermont Agency of Natural Resources adopted a Materials Management Plan, as required under the Universal Recycling Law. The Towns of Arlington, Bennington, Dorset, Glastenbury, Manchester, Pownal, Rupert, Sandgate, Searsburg, Shaftsbury, Stamford, Sunderland, and Woodford are responsible for implementing state materials management policies and the requirements of the Universal Recycling Law. These towns cooperated to develop a Solid Waste Implementation Plan (SWIP) in conformance with the Vermont Agency of Natural Resources Materials Management Plan. The plan discusses solid waste facilities and services offered in the area, and includes how solid waste will be managed and reduced. An action under the SWIP is the collection and proper disposal of household hazardous waste (HHW) from residents and conditionally exempt generator waste (CEG) generated from small businesses. Proper collection and disposal of these materials protects the environment and public health and safety. Two collection events are held each year, once in the spring and once in the fall, to allow residents to dispose of their HHW and CEG. These events allow residents to save money, remove dangerous chemicals from their homes, and avoid introducing potentially toxic materials into the environment.

The Vermont E-Cycles program, initiated in 2011, allows for free disposal of electronic devices, at sites approved by the Vermont Agency of Natural Resources, so these are no longer accepted at HHW collection events. The Vermont E-Cycling program provides for the collection of computers, monitors, printers, computer peripherals, and televisions, regardless of brand, age or condition, for consumers, charities, school districts, and small businesses. Free collection locations exist throughout the state and operate year-round. In Bennington County, sites include the Bennington, Northshire (Dorset), Pownal, and Sunderland Transfer Stations. Other electronic devices are also accepted at these locations, though there may be a fee to dispose of those items.



Emergency Services and Public Safety

The Stamford Volunteer Fire Department is the town's primary provider of emergency services. The Department provides a wide range of valuable services for a relatively modest investment of municipal funds. Fire Department expenditures in 2015 were \$59,101. Two grants were received in 2015. One grant was for high-visibility jackets and the second for wildland gear. In the past 10 years, the Stamford Fire Department has received nearly \$400,000 in FEMA grants that have been used for many items including: self-contained breathing apparatuses (SCBA), hose and nozzles, thermal imaging cameras, AEDs, rescue tools, radios, pagers, and training.



The Stamford Volunteer Fire Department provides a full range of emergency fire, medical, and natural disaster services to the community, operating out of this centrally located facility on Mountain View Lane.

Recent emergency responses have included: structure fires, car accidents, hazmat incidents, wildland fires, downed power lines, weather-related emergencies, mutual aid coverage, equipment malfunctions, and a large number of medical assistance calls. The range of equipment and expertise available is unusual for a small community such as Stamford since the Department is able to deploy emergency medical technicians, utilize specialized firefighting procedures and equipment, and employ advanced search and rescue capabilities, all supplemented by effective communication technologies. Although currently well-staffed with volunteers, the Department always is looking for new members, especially people who can help maintain full daytime coverage.

The Town has developed a Local Emergency Operations Plan that provides communication information and operational procedures to be followed in the event of an emergency. That plan should be reviewed and updated annually.

The Bennington County Sheriff provides public safety service to the Town on a contracted basis—\$28,128 expenditure in 2015. Additional support is available from the Vermont State Police, which maintains barracks in Brattleboro and Shaftsbury.

Education

Stamford students in grades kindergarten through eight attend school at the Stamford Elementary School, located in the same building as the town offices and library in the center of the village. Enrollment at the school has declined significantly over the past 20 years, but increased slightly in 2010 to the current level of 79 students. With the number of students at each grade level varying from five to twelve, annual adjustments in staff roles and responsibilities are necessary to ensure maintenance of strong educational programs.

Secondary students attend school outside of Stamford, primarily in Adams and North Adams. With no local high school, the school district pays a set amount of tuition to each school based on Vermont state guidelines. For a small town like Stamford, this situation can lead to significant fluctuations in spending for secondary education as annual expenditures vary directly with enrollment.

Another interesting aspect of education in Stamford is the significant increase in the number of home schooled children over the past several years, rising from just 3 in 2004-2005 to 16 in 2008-2009.

The education budget in Stamford is almost three times as large as the municipal government budget, totaling over

\$1,500,000 in 2010. It is very important, therefore, to find ways to carefully plan spending while ensuring that students receive the best possible educational services. As noted above, one complicating factor that is difficult to control is the annual variability in the number of secondary school students for which the district must pay tuition. A second key concern is the fact that state educational funds returned to the district are based on enrollment levels, so declining enrollments have meant that revenues are automatically reduced—while most local school costs

are fixed (primarily contracted salaries, physical plant, and mandated programs). Furthermore, when costs fall proportionately more slowly than enrollment, the result is an increase in per student spending, leading to higher local taxes under Vermont's education funding system.

Maintaining and operating the school building itself represents another substantial educational cost, and with an aging building in need of various repairs and long overdue upgrades, those costs could result in a large annual budget increase should some part of the building or infrastructure be in imminent danger of failure. A well planned capital budget for the school, that identifies improvements and spreads the cost out over time, will be an important part of future school financial planning.

With property taxes being identified as a leading concern for most local residents, and school spending representing the majority of the local property tax burden, various ideas and studies have been advanced in an attempt to address the issue. The Town is cur-



The Stamford School is an important community resource.

rently under pressure from the state under Act 46 to consider a school merger of Stamford's school with those of Readsboro and Halifax. While recognizing the long-standing financial and logistical struggles that have led to this proposal for a school merger, Town residents are seeking to identify an alternative solution. Even if some savings could be realized through some type of elementary school consolidation, the loss of a community school and a reduction in local control over that school is a concern for many in town. Nonetheless, because of the ongoing financial stresses and concerns over a potential for reduced educational quality if additional cost-cutting is necessary at the elementary school, a portion of residents are open to considering school merger options for providing primary educational services for the Town.

Despite the fiscal and operational challenges facing the local school, educational performance remains high, with students scoring well on standardized tests, competing with great success in regional academic competitions, and graduating with the skills needed to thrive in their subsequent endeavors. The Town must remain actively engaged in planning for educational services to ensure that the needs of students are met and that costs are maintained at reasonable levels.

Library

The Stamford Community Library provides services to both the elementary school and the community at large. The library consistently meets the standards for public libraries set by the Vermont Department of Libraries. It offers a diverse range of services, continually adapting to new interests and technologies; among them:

- Inter-library loan services free of charge to Stamford residents.
- Public computers with internet access and wireless internet connectivity.
- Daily newspapers including The Transcript, Berkshire Eagle and Bennington Banner.
- Summer Reading program for children.
- Audiobooks –on cassette and CD.
- Classic and current DVD and VHS movies.
- Vermont local history collection.
- Periodicals for children and adults.
- Free and discounted passes to local cultural attractions.

All of these facilities and services are provided at a cost of under \$30,000 per year to the community. This funding is subject to approval of an annual appropriation by the voters; the town should continue to support the library.

Childcare

Childcare centers and family childcare homes provide care and early education for the town's children and contribute to the local and regional economy by enabling parents to participate in the workforce. Currently there are two registered home child care provider and one licensed preschool program in Stamford. Additional opportunities are available in larger towns and employment centers and residents who work in those places may choose to utilize services in those areas rather than in Stamford.

Health Care

The closest healthcare services facility to Stamford is Berkshire Health Systems, which offers 24-hour emergency center care and a skilled home nursing care through the Visiting Nurse Association and Hospice of North Berkshire. Since many specialized treatments are not available through Berkshire Health Systems, Stamford residents use hospitals in Bennington and Pittsfield to meet most of their healthcare needs. The Southwestern Vermont Medical Center (SVMC) in Bennington and the Berkshire Medical Center in Pittsfield are both relatively close to Stamford. There are numerous medical professional and technical offices located at, or in close proximity to, each of these health care centers. Many Stamford residents receive medical and physical therapy treatments at the Deerfield Valley Medical Center in Wilmington (a unit of the SVMC) and at Williamstown Medical Associates (offices in North Adams and Williamstown). Mental health, substance abuse, and services for disabled residents are available through the United Counseling Service of Bennington County.

Electricity and Telecommunications

Electricity and telecommunications (including land and wireless telephone, cable tv/internet, and wireless internet) are fundamentally important to local residents and provide opportunities for local jobs and economic development.

Electric service is provided through Green Mountain Power, the state's largest electric utility company. Existing electric service to the community is adequate. Siting of new overhead power lines, switching boxes, and maintenance of existing power lines should recognize the scenic and historic values of the community, and new service connections should be routed underground when feasible.

Future electricity supply constraints are a concern because of expiring contracts with Vermont Yankee and Hydro Quebec and concerns over the long-term viability of regional fossil-fuel-based generating plants. Resolving these problems will require implementation of a "smart grid" where supply can be more closely matched with demand as well as through development of a large number of small renewable-energy-based generating facilities distributed throughout the region.

High speed cable internet services—delivered to much of the area by fiber optic cable—are available in much of Stamford and the Town should play an active role in planning for extensions of these state-of-the-art communication technologies.

Telephone and internet service is increasingly being conducted by wireless providers. The Town should work with wireless companies to maintain and enhance these services, while remaining sensitive to scenic and environmental concerns. A visual proliferation of towers and antennas can be avoided through careful siting and co-location on single tower structures.

Governmental Services

Stamford has a small municipal government that nonetheless provides an array of important services to the community. In addition to maintaining the network of local roads and bridges, solid waste and recycling services, town officials oversee property as-

assessment, financial management, planning and land use regulations, and the many record-keeping and licensing functions overseen by the Town Clerk's office. These functions all rely on significant support by elected and appointed volunteers. Town boards and commissions include:

- Select Board: the town's elected legislative body—develops budgets, manages staff, hears and responds to citizen concerns, votes to adopt ordinances and by-laws;
- Board of Adjustment: rules on specific types of zoning applications and appeals;
- Planning Commission: prepares the Town Plan, land use regulations, and reviews certain site plans for conformance with regulations;
- Conservation Commission: advances efforts to conserve important land and natural resources;
- Cemetery Commissioners: oversee the maintenance of the local cemetery;
- Library Trustees: manage the community library;
- Justices of the Peace: among other duties, hears appeals of property assessments;
- School Directors: responsible for management of the local elementary school and educational budget;
- Listers: determine property values for the purpose of local taxation;
- Bennington County Regional Commission: Stamford has two representatives to this county-side organization that provides technical planning assistance to towns in a number of areas.

Recreation

Numerous opportunities for recreation exist in and around Stamford. Most obvious is the fact that the Town is set in a rural landscape where public lands provide opportunities for hiking, hunting, snowmobiling, cross country skiing, snowshoeing, and other active pursuits. Many of the Town's roads and trails also are ideally suited for running, horse-back riding, and road or mountain biking. Access points to clear mountain streams provide access to outstanding fishing. Federal and state forest lands include resources such as the Appalachian/Long Trail and the recently restored access area at Sucker Pond in the Town's remote northwestern corner.



A soccer game at the field behind the elementary school.

It is particularly important to maintain public access to identified recreational resources such as trails and streams. The Town should complete an inventory of public trails and stream access points and determine whether additional protection of access is needed. Close cooperation with the Green Mountain National Forest will ensure that important trails and natural areas remain accessible and that these public lands are managed to accommodate a variety of types of recreational use.

A new walking trail, following the North Branch of the Hoosic River between The Lane and East Road, would be an exceptional recreational asset for the Town. The right-of-way and environmental approvals that would have to be secured to develop the path should be investigated.

The playing fields and playground at the Stamford Elementary School also are important community recreational assets. A variety of youth sports teams use the playing fields regularly and they should be maintained in good condition. The fields and playground facilities also are important to families and children who gather there to enjoy them throughout the year.

Community Center

Many small towns like Stamford benefit from some type of facility that serves as a community center; a place where people can informally gather to visit with their friends and neighbors and catch up on local events. In some places this may be a publicly owned building that functions as a community center, with a meeting room and regularly scheduled events. In other places it may be a privately owned store or diner where people meet while getting a sandwich or a cup of coffee. A town green or park in the center of a community can serve a similar function in the warmer months of the year.

Stamford has designated a gym at the elementary school as a 'Community Room' to accommodate communal gatherings and events. One example of an activity hosted in the space is an elderly lunches program. Although Stamford has several similar places where people gather for specific reasons (the churches and schools, for example), the development of more central gathering places, such as a coffee shop or garden park, would be a welcome addition to the Town. The Town acknowledges the value of such common spaces and should be supportive of ideas and efforts to create them in the center of the Town.

Policies and Recommendations—Community Facilities and Services

1. Require strict conformance with local and state regulations designed to protect water quality and the supply of drinking water.
2. If well contamination becomes a severe problem in the village center area, or to support higher densities of development in that area, consider undertaking a study of a potential small public water supply system.
3. Continue efforts to reduce the generation of solid waste through educational efforts, initiatives to reduce the use of wasteful packaging, and through recycling programs.

4. Maintain close communication with the Fire Department and other emergency service providers to ensure that their staffing and equipment needs are met through careful and coordinated planning.
5. High quality education must be available for residents at the local elementary school and at area high schools. The potential for cost savings and improvements in educational programming through cooperation, coordination, or some form of consolidation with other local schools should be periodically reviewed and studied.
6. Support the services offered through the Stamford Community Library.
7. The Town should work with electricity and telecommunication providers to ensure that the best available services are provided to residents, the school and municipal office building, and businesses at reasonable cost. Continuing efforts should be made to establish the best possible infrastructure, including fiber optic and broadband technologies, to serve the new information-based economy. New facilities, such as telecommunication towers, should be provided as necessary, but must be sited with sensitivity to environmental, scenic, and neighborhood concerns.
8. Maintain and expand public access to forests, streams, lakes, and other important recreational resources.
9. Develop a map of important recreational trails in Stamford. Study the feasibility of developing a walking path along the North Branch of the Hoosic River near the center of town.
10. Support programs and improvements that encourage bicycling, hiking, horseback riding, and other outdoor recreational activities.
11. Provide the resources necessary to maintain the recreational facilities and playing fields at the Stamford Elementary School.



Chapter 10 - ENERGY

Overview

Energy is a basic need of our society, but with most of it derived from scarce resources, effective planning for energy use and conservation is extremely important. Our transportation system relies on energy to propel the cars, trucks, buses, airplanes, and trains that transport people and goods to, from, and throughout the community. Homes and businesses require energy to power appliances and machinery and to provide heat in the winter and cooling in the summer. Stamford has an energy coordinator and has taken some steps to promote conservation in municipal and school buildings, but much more can be done.

Act 174 and Enhanced Municipal Energy Planning

In 2016, the Vermont legislature approved Act 174 to enhance regional- and town-level energy planning and to create a way for municipalities to have input on the siting of electric generation facilities through land use planning. The Act established standards, which if met by a regional or municipal plan give their contents 'substantial deference' in proceedings of the Public Service Board regarding the siting of electric generation facilities. The standards require that plans include three broad components:

1. Analysis of current energy use and targets for future energy consumption;
2. Pathways, or implementation actions, to achieve future energy consumption targets; and
3. A mapping component with renewable energy resource maps and siting guidelines for renewable electric generation facilities.

Requirements for regional and local plans are based on statewide policies and goals outlined in the Vermont Comprehensive Energy Plan (CEP), updated in 2016. Two central goals of the CEP are reduction of total energy consumption in the state by a third by the year 2050, and the sourcing of 90% of remaining energy from renewable sources by 2050. Though the scope of these goals may seem ambitious, the inevitable and disruptive future price fluctuation in hydrocarbon-based fuels combined with the need to reduce energy costs of all Vermonters are powerful motivators to pursue these goals.

The Stamford Planning Commission will pursue development of an enhanced energy plan element in conjunction with the Bennington County Regional Commission (BCRC) in the next year. The BCRC has just adopted a comprehensive regional energy plan and submitted it to the Public Service Department to receive a determination of compliance with state energy policy. Once the regional plan has achieved this determination, then the BCRC will be eligible to review municipal plans for compliance. The information provided in the following sections is based on findings of the Bennington County Regional Energy Plan (2017), and may serve as the basis for Stamford's municipal-level energy analysis.

Current and Future Energy Use

To generate estimates of energy use across various sectors (transportation, heating, and electric) today and into the future, BCRC collaborated with the Department of Public Service and the Vermont Energy Investment Corporation (VEIC). A computer modeling system called the Long-Range Alternative Energy Planning (LEAP) model was used to explore various scenarios for achieving 90% renewables by 2050. The chart below (Figure 10-1) shows that across Bennington County, energy consumption will have to decrease by 50% of current levels by 2050 to achieve the state renewables target, a portion of which will be accomplished through expansion of existing conservation programs. Electricity use will increase over time as electric heating and transportation technologies replace fossil fuel-based systems. Despite the rise in electricity use, overall energy use will decline since electricity-based technologies such as heat pumps and electric vehicles (EVs) are much more efficient than their fossil fuel counterparts.

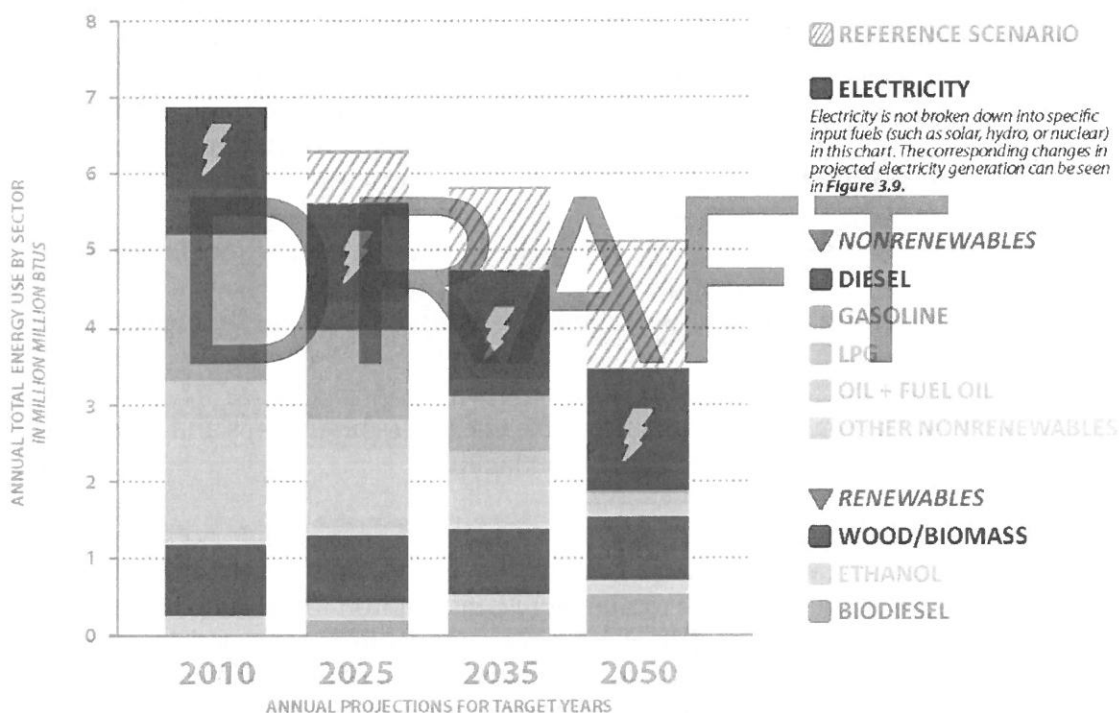


Figure 10-1. Bennington Region, Energy Use By Fuel Type, 2010-2050: LEAP model projections suggest that the Bennington region will have to decrease energy usage to about half of current levels by 2050 in order to achieve the 90X50 goal—an even greater rate of reduction than Vermont at large.

The state currently receives approximately two-thirds of its electricity supply from hydroelectric sources in Quebec, and will continue to rely on this source of renewable energy into the future. However, Vermont towns will need to supplement this reliance on foreign electricity with local renewable generation in order to reach the state's energy targets and enhance energy self-reliance over time. Table 10-1 shows estimated current energy consumption levels for the Town of Stamford and target consumption levels for years 2025, 2035, and 2050 that will get the Town to 90% renewables by 2050.

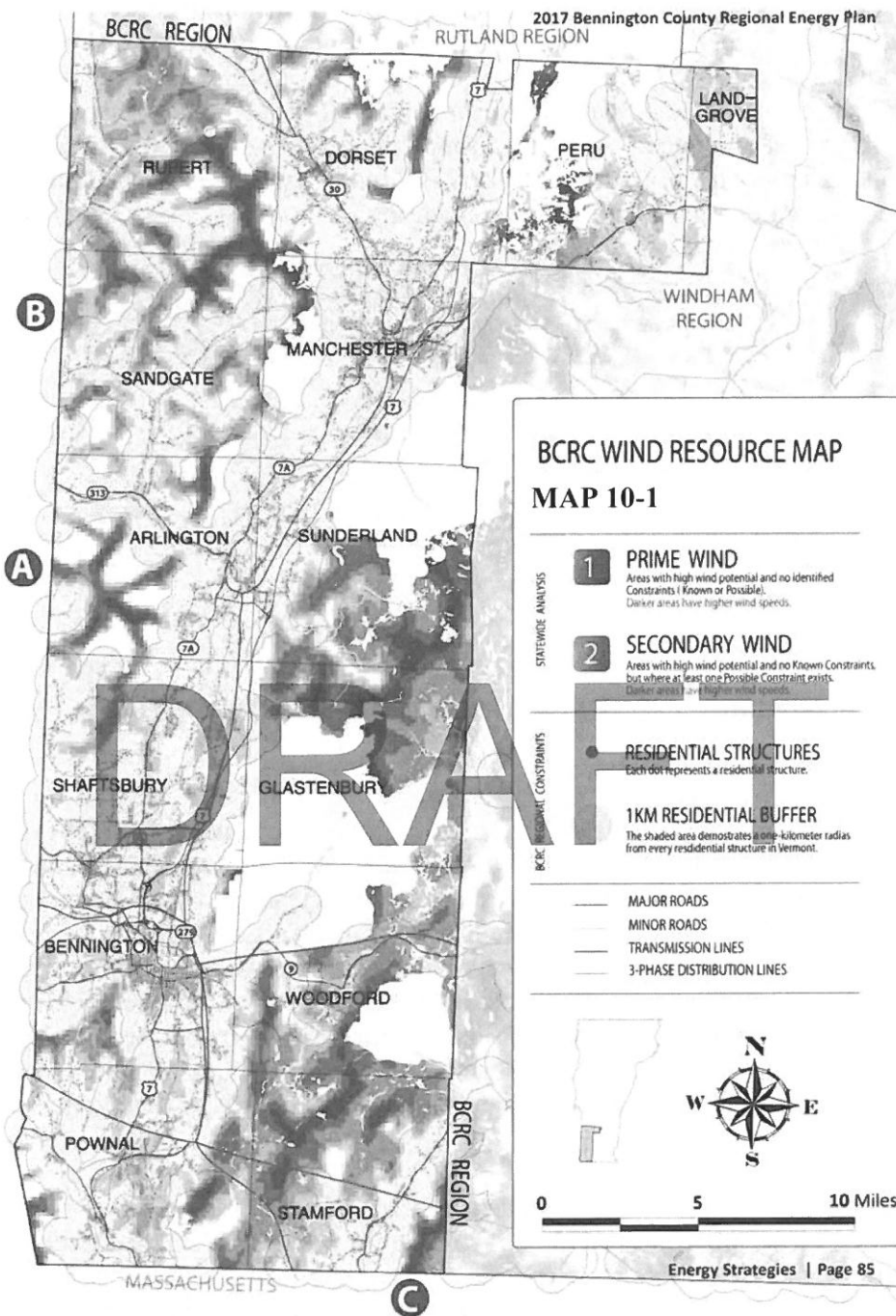
The greatest fuel transformation will occur in the transportation sector, where gasoline and diesel use will reduce to less than 1.5% of current levels, replaced over time by EVs and biodiesel fuel use. Home heating oil and gas consumption will decrease significantly as high efficiency, cold climate heat pumps are adopted to meet most residential and commercial space heating needs. Wood heating will continue to play a significant role in heating, and fortunately locally available wood is already used widely in Stamford as a renewable and efficient energy source for home heating.

Table 10-1 Total Energy Demand by Fuel - Town of Stamford (Based on 2.5% of Region Population) Standard Fuel Measurement Units				
Fuels	2015	2025	2035	2050
Electricity (kWH)	7,722,743	9,298,066	10,294,549	11,591,442
Gasoline (gallons)	395,959	241,686	147,836	5,814
Kerosene (gallons)	13,519	9,259	5,556	-
Diesel (gallons)	108,489	66,693	40,525	1,272
Residual Fuel Oil (gallons)	72,817	53,277	39,916	19,707
LPG (gallons)	143,088	112,110	84,673	47,499
Oil (gallons)	193,355	129,388	77,051	4,725
Wood (tons)	144	138	133	129
Ethanol (gallons)	76,434	65,219	59,907	51,644
Solar Thermal (Th MMBtu)	-	0	0	0
Coal (short tons)	90	56	33	-
CNG (pounds)	16,121	17,361	17,361	18,601
Biodiesel (gallons)	1,176	39,970	66,029	105,999

Renewable Energy Mapping

To accommodate growing electric demand, towns are required by Act 174 compliance standards to develop maps showing where renewable energy generation facilities such as solar panels and wind turbines will be best sited. BCRC has provided base maps for the Town to adapt with the addition of their own local constraints and preferences. Maps 10-1 and 10-2 in the following pages show available solar and wind resources in the Town and region with certain environmental constraints highlighted or removed. This mapping analysis has highlighted areas of varying suitability for developing renewable electric generation sites for towns to consider when choosing preferred and unsuitable areas for future development. Terms used in the Act 174 determination standards to denote these areas are explained here:

- ◆ **Prime Resource** – Areas with renewable resource potential and no Known or Possible Constraints. These areas may be most favorable for renewable energy development due to the presence of renewable resource and a lack of environmental constraints.
- ◆ **Secondary Resource** – Areas with renewable resource potential and no Known Constraints, but at least one Possible Constraint. These areas may be developed for renewable energy generation, but at least one environmental constraint could impact or prevent development.
- ◆ **Known Constraints** – Ecological and physical conditions that would very likely preclude development of renewable energy infrastructure.
- ◆ **Possible Constraints** – Environmental and physical conditions that might impact or prevent the development of renewable energy infrastructure.



Map 10-1. BCRC Wind Resource Map from the Bennington County Regional Energy Plan (2017). The regional energy plan has highlighted the northern edge of the Hoosac Mountain ridge that runs into southern Stamford as a strategic area for large-scale wind development in the future. Since there are already several utility-scale wind turbines on the same ridge beginning on the border into Massachusetts, an extension of the existing wind generation site could have a lower visual and environmental impact than in other areas of the region. Stamford will consider the potential advantages and limitations of this option as it develops its enhanced energy planning element.

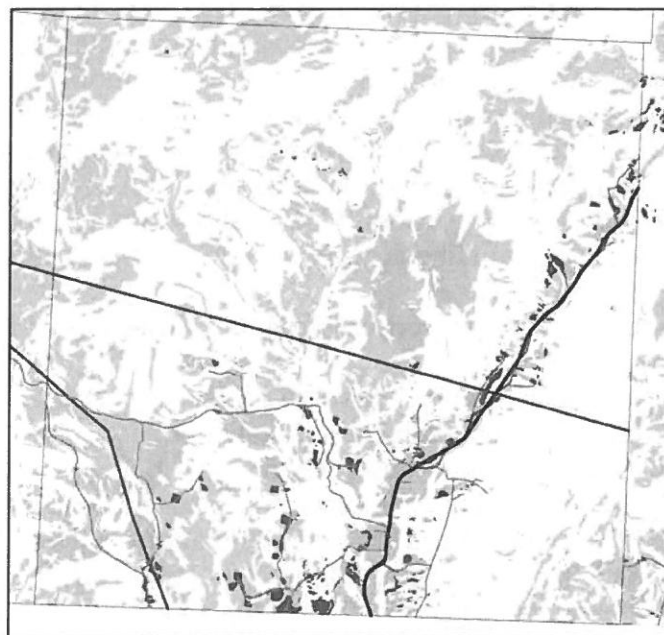
Known Constraints include:

- Vernal Pools with 50 ft. buffer
- River Corridors
- DFIRM Floodways
- Rare, Threatened, and Endangered Species and State-significant Natural Communities
- National Wilderness Areas
- Class 1 and 2 Wetlands

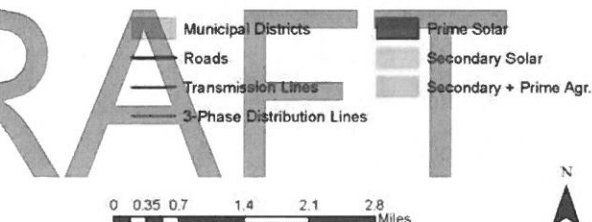
Possible Constraints include:

- VT Agriculturally Important Soils
- DFIRM Special Flood Hazard Areas
- Protected or Conserved Lands
- Deer Wintering Areas
- ANR VT Conservation Design Highest Priority Forest Blocks
- Hydric Soils

Stamford Solar Resource Map



The regional wind resource map (Map 10-1) highlights a few areas in the region, including Stamford, where conditions may allow for mid-to-large scale wind development. The potential benefits and environmental impacts of such a siting decision will be weighed by the Town as it develops its enhanced energy element in the coming year. In addition to solar and wind resource development, Stamford will consider development of other renewable resources such as hydroelectric power and geothermal for heating. Considerable environmental regulations largely preclude the establishment of new hydro sites in the state, but re-use of existing dam sites such as the one in northwest Stamford has been shown to be a viable way to generate some electricity locally.



Map 10-2. According to the Bennington County Regional Energy Plan (2017), Stamford should plan for at least 1.9 MW of new solar generation capacity by 2050. Renewable resource mapping exercises required by the Act 174 determination standards are intended to help the Town identify preferred and unsuitable sites for future renewable electric generation sites. The Town will incorporate local preferences and constraints into the map above as it works to develop an enhanced energy element compliant with state and regional energy goals.

While the scope of the transition to renewables and more efficient energy consumption is considerable, the need for a drastic shift in current energy trends is undeniable. In addition to the negative environmental impacts associated with burning oil, gas, coal, and similar fuels, the finite and dwindling supply of those fuels will fail to keep pace with demand in the coming years (for further details, see Bennington County Regional Energy

Plan, 2017). Escalating prices and physical shortages of energy products will begin to cause severe problems if we have not reduced our reliance on those fuels.

Fortunately, there are many measures that can be taken to promote energy conservation and efficiency now, and completion of an Act 174-compliant energy element will help the Town further define pathways to a more resilient energy future. In the meantime, topics covered in this chapter will provide an overview of existing strategies to reduce the Town's energy costs and carbon footprint, including weatherization of existing buildings, use of renewable energy resources, provision of a transportation system that encourages reduced energy use, support for locally produced goods and services, and utilization of energy efficient building designs, vehicles, and appliances.

Improving Energy Conservation and Efficiency in Stamford

The development pattern of the Town as a whole, and of individual development projects, can contribute to energy conservation. Development that is concentrated near a town's center reduces the need for lengthy travel between destinations and allows for an energy and cost-efficient means of providing infrastructure. Compact planned unit developments, building orientation to take advantage of solar gain for heating and natural lighting, proper use of vegetation, and energy-saving insulation and appliances will enhance conservation efforts.

Many opportunities exist for reducing the amount of energy used in the town's residential buildings. The Town should make all applicants for zoning permits aware of the state's energy efficiency standards, which require that new buildings meet Residential Building Energy Standards. To encourage homeowners to invest in energy efficiency improvements, the Town could make use of the recently enacted "Clean Energy Assessment District" or other programs that reduce the upfront cost of such improvements.

Owners of existing homes can benefit from an energy audit, where potential weatherization improvements are identified together with the cost and expected energy (and dollar) savings of each. There are a number of businesses in the region that offer energy audit services, and organizations such as the Bennington Rutland Opportunity Council (BROC) provide weatherization services to income eligible homeowners and renters. Low-cost energy audits and financing options can be coordinated with NeighborWorks of Western Vermont, which recently opened a new office in Bennington to expand their services in the southern part of Bennington County.

New technologies and state and federal financial incentives also provide opportunities for homeowners to add renewable energy systems to their houses. Solar panels, evacuated tubes, and other devices can provide significant hot water and space heating while solar photovoltaics and wind turbines can generate electricity. Rebate and incentive pro-



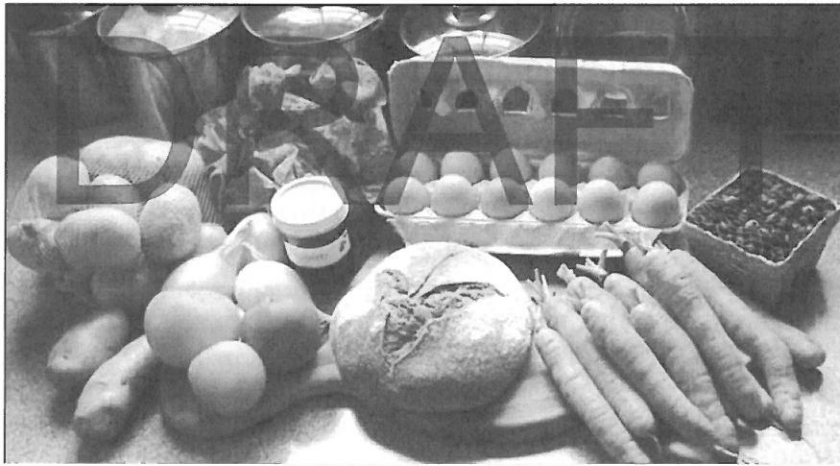
Residential-scale turbines can provide electricity for homes located on windy sites.

grams are currently available through Efficiency Vermont to support homeowners wishing to make these investments. Small geothermal systems can also be used to increase space heating efficiency in many homes.

Energy conservation can help businesses and public and nonprofit organizations by reducing costs and increasing operational efficiency. The Town should encourage these organizations to conduct energy audits, make energy improvements, and install renewable energy systems. New commercial and industrial construction should conform to the Vermont Guidelines for Energy Efficient Commercial Construction.

Businesses, institutions, and other organizations (whether or not in Stamford) also should consider changes to their procedures and operations to conserve energy. Support for employee ride-share, public transportation use, and telecommuting should be considered. Whenever possible, local raw materials should be used and local markets identified for products. The Town and economic development organizations such as the Bennington County Industrial Corporation should support business growth in areas focusing on energy conservation and development of renewable energy resources.

A tremendous amount of energy is used (and local dollars exported) to produce and transport food to the area. Significant energy savings can be realized through production of local food: in backyard gardens, community supported agriculture (CSA) operations, and at area farms that sell their produce at local stores and farmer's markets.



One of the easiest and most effective ways to save energy is to produce and consume food from local sources (photo from BenningtonLocal.org).

Efficiency Vermont, the State's energy efficiency utility, reduces energy use and costs by offering technical assistance and financial incentives to help Vermont residents and businesses identify and pay for cost-effective approaches to energy-efficient building design, construction, renovation, equipment, lighting and appliances. The Town should coordinate with Efficiency Vermont to ensure that their services are utilized to the maximum extent possible. The local school should take advantage of services offered by the Energy Smart Schools program of Rebuild America. That organization provides guidance in making energy saving improvements to school buildings and by supporting energy education.

With the heavy energy use in the transportation sector, fuel efficiency should be a major consideration in every vehicle purchase when the town is replacing existing cars, trucks, and highway equipment. Consideration should be given to use of biodiesel fuels, when available, in the Town's diesel powered vehicles, changes that also would benefit air quality.

The design of the local transportation system can contribute significantly to energy conservation. Stamford can be a very bicycle and pedestrian friendly community and efforts to promote such human-powered transportation should be strongly supported. The village center sidewalk project and extensions to residential neighborhoods should be expanded over time, and safe and well-maintained road lanes and shoulders should be provided for horseback riding and bicycling. Safe roadway crossings, bicycle route signs, bicycle racks, and other amenities also will encourage non-motorized travel around the town.

Gasoline prices will continue to rise over time, and as they do, the attractiveness and energy saving measures various forms of public transportation will become more evident. The Town should periodically assess the demand for new public transportation, including new bus routes to North Adams and other employment and educational centers.

Generation of energy from renewable energy resources supports conservation of non-renewable energy resources while helping to maintain a clean environment. Potential renewable energy resources in Stamford include:

- Hydroelectric energy from streams; the potential at locations along Roaring Brook is particularly strong. Any existing dams should be the first investigated for establishment of small hydro facilities.
- Small and commercial scale wind turbines to generate electricity at suitable sites.
- Use of cordwood to heat homes; an adequate supply of this fuel exists locally to meet all of the Town's residential space heating needs.
- Solar energy to heat buildings, water, and to power photovoltaic cells.
- Biomass (usually wood chip) space heating for schools and other large buildings; these systems can sometimes be configured to use excess heat to generate electricity in "combined heat and power" (CHP) systems.
- Methane-based energy systems using waste from livestock operations.
- Liquid biofuels such as vegetable oils and biodiesel from crops such as canola and sunflowers;
- Geothermal energy to supplement space heating systems.

Much of the Town's energy is used in the form of electricity and it is critical to assure an adequate supply from both generating sources and the capacity of transmission and distribution systems. Approximately two-thirds of the Town's electricity is supplied through state contracts with Hydro Quebec. It will be important to maintain reliable sources of supply while additional generating capacity is developed. Ultimately, a "smart grid" will be needed to much more efficiently manage the generation, transmission, and use of electricity. It is likely that the smart grid will rely on many distributed small generators located closer to the points where the electricity is used; consequently, the Town should support economically and environmentally sound development of local electricity generating capacity, improvements to the "Southern Loop" transmission system, and de-

should support economically and environmentally sound development of local electricity generating capacity, improvements to the “Southern Loop” transmission system, and development of smart grid technology.

Educational efforts can contribute a great deal to energy conservation by making residents and businesses aware of the value of using energy efficient appliances, construction techniques, and other practices. Home weatherization and energy efficiency workshops can be used to provide information and conservation tools directly to homeowners.

Energy Policies and Recommendations

1. Actively promote the energy-related benefits of town policies that:
 - Lead to consideration of energy use, including short and long-term energy costs, in municipal decision-making;
 - Focus development near existing public roads and infrastructure;
 - Require efficient residential and commercial subdivision design and construction;
 - Support development of renewable energy resources;
 - Provide dedicated facilities for bicycles and pedestrians and improvements to roadways to encourage walking and biking;
 - Require pedestrian linkages between adjacent residential developments and between adjacent commercial developments;
 - Support public transportation services, ride-sharing programs, and improved freight and passenger rail service to the region.
2. Create and support programs and facilities that provide stable, affordable, and clean renewable sources of energy, including wood (and other biomass), wind, water (hydroelectric), solar, and geothermal. Give strong consideration to the energy needs of the community when evaluating the environmental and economic effects of such programs and facilities.
3. The Town should make an effort to reduce fossil fuel use in its municipal facilities and operations:
 - Consider replacing streetlights and other outdoor lighting with LED fixtures.
 - Fuel efficiency should be an important consideration when the town replaces vehicles and heavy equipment.
 - Opportunities for employing renewable energy resources in municipal buildings and facilities should be pursued.
4. The Town should consider conducting a comprehensive municipal energy audit.
5. New construction should meet or exceed state residential and commercial energy efficiency standards. Awareness of LEED and Energy Star construction techniques should be improved and projects designed to achieve certification under those programs supported.

6. The Town should encourage participation in energy conservation incentive and educational programs.
7. The Town should consider innovative programs such as the Clean Energy Assessment District to provide incentives and support financing of energy conservation and efficiency improvements.
8. The Town should work with other organizations to promote energy conservation through regular educational programs and initiatives.
9. Completion of an Act 174-compliant enhanced energy plan element will help the Town understand its current energy profile and plan for future energy conservation, fuel conversion, and lifestyle adaptation strategies. As part of this process, the Town will identify preferred sites for renewable energy generation facilities and general siting guidelines to be given substantial deference at Public Service Board proceedings.

DRAFT

Chapter 11 - CONSISTENCY WITH STATE PLANNING GOALS AND RELATIONSHIP TO TOWN AND REGIONAL PLANS

Statutory Requirements

The Vermont Municipal and Regional Planning and Development Act encourages towns to develop plans that are compatible with the plans of adjacent municipalities and with the regional plan, and which are consistent with the goals that are contained in 24 V.S.A. Section 4302. This chapter will detail the plan's consistency with those goals and will include a brief discussion of the Stamford Town Plan in the context of the Bennington County Region and nearby municipalities. The statute also requires that the plan include a recommended program for implementing the objectives of the plan. That requirement is met through the specific policies and recommendations that accompany each individual element of the plan.

Consistency with State Goals

The Planning and Development Act contains one set of goals that deals with the planning process—24 V.S.A. Section 4302(b):

- To establish a coordinated, comprehensive planning process and policy framework;
- To encourage citizen participation;
- To consider the use of resources and the consequences of growth and development;
- To work with other municipalities to develop and implement plans.

Stamford has a long-established planning process, implemented through municipal boards and commissions, town staff (town and zoning administrators, highway department staff), the Town Plan and implementing land use regulations, and through active participation in the Bennington County Regional Commission. Citizen participation is actively encouraged at all stages of the planning process; Planning Commission and Select Board meetings are open to the public and an effort is made to encourage attendance by citizens with an interest in topics being discussed. Results of a comprehensive survey mailed to all Stamford residents and property owners in 2010 underpin the findings and policies laid out in this plan. A guiding principle of the Town's planning effort is to manage growth so that it is directed to achieve the greatest benefit to residents while avoiding wasteful consumption of land and other resources. Stamford works on a regular basis with other towns through its active role in the BCRC and cooperation with other municipalities in a variety of areas such as transportation, education, public safety, and solid waste planning.

Fourteen specific goals (24 V.S.A. Section 4302(c)) should be reflected in the Town Plan. Those goals are presented below with a discussion of how each is addressed in the Town Plan.

1. **To plan development so as to maintain the historic settlement pattern of compact village and urban centers separated by rural countryside.**

The Town Plan directs most future growth in the valley near the historic town center and in close proximity to the existing network of state and town highways. Future investment in community facilities and services are to be directed to reinforce this development pattern. Agriculture, forestry, low-density residential, and open-space oriented uses are encouraged in outlying rural valley and upland mountainous areas. Provision is made for carefully planned commercial development in residential and rural residential areas, but commercial sprawl into the countryside is not allowed. Land conservation measures for rural areas are described and promoted. Transportation and telecommunication facilities will allow residents to live among Stamford's predominantly rural landscape while accessing jobs, services, and other opportunities in larger nearby population centers. These goals are embodied in the Town's intention to apply for a Village Center Designation.

2. **To provide a strong and diverse economy that provides satisfying and rewarding job opportunities and that maintains high environmental standards, and to expand economic opportunities in areas with high unemployment or low per capita incomes.**

The Town Plan includes a chapter dealing with economic development and includes information and recommendations throughout that address the need to support economic progress and the quality of life of residents. The importance of local natural resources and strengthening locally oriented economic sectors, such as agriculture, is given particular emphasis. The ability of residents to open small businesses or home occupations is discussed as is the significance of telecommunications infrastructure to support such local opportunities. The plan also notes the importance of providing a quality education for residents and to support the workforce development needs of area businesses.

3. **To broaden access to educational and vocational training opportunities sufficient to ensure the realization of the abilities of all Vermonters.**

The local elementary school and its importance to the community, as well as challenges with educational funding, are described in detail in the Town Plan. Other educational resources mentioned include internet-based learning, the resources available through the Stamford Library, and secondary schools, vocational schools, and colleges in North Adams, Williamstown, and Bennington.

4. **To provide for safe, convenient, economic, and energy efficient transportation systems that respect the integrity of the natural environment, including public transit options and paths for pedestrians and bicycles.**

The transportation chapter of the Town Plan includes a comprehensive discussion of the local and state road network, including the importance and challenges associated with maintaining the roads and bridges. Safety and mobility are supported by policies and recommendations dealing with access management and traffic calming techniques along specific corridors. Pedestrian and bicycle needs are identified and sidewalk expansion in

the village center is encouraged; additional trail and pathway connections are described as well. The potential for future public transportation connections from Stamford to North Adams and for enhanced access to regional rail service are also considered.

5. To identify, protect, and preserve important natural and historic features of the Vermont landscape.

A chapter dealing specifically with natural, scenic, and historic resources identifies important local resources and discusses regulatory and non-regulatory approaches to their preservation. Particular attention is given to prime agricultural and forest land, water resources, scenic rural landscapes, and historic resources. Competing objectives—such as the need for renewable energy generation and the desire to protect scenic ridgelines and water courses—are discussed and policies and strategies for responsible development and preservation are advanced.

6. To maintain and improve the quality of air, water, wildlife, and land resources.

The Town Plan contains sections dealing specifically with the protection of air quality, surface and subsurface water resources, fish and wildlife habitat, and land conservation. Threats to local and regional air quality are identified and protective measures discussed. Rivers, streams, wetlands, ponds, and ground water resources are mapped and described with recommendations for regulatory and non-regulatory approaches to protection. A map showing the revised flood hazard areas is included along with a discussion of new FEMA requirements. Critical wildlife habitat areas are described and mapped and protection from incompatible development is required. The Town's land use plan supports land conservation efforts by encouraging development near existing infrastructure and limiting development in remote mountains areas. A large amount of land in Stamford also is in federal and state ownership and thus protected and available for public use.

7. To encourage the efficient use of energy and the development of renewable energy resources.

The Energy chapter contains an extensive discussion of the importance of energy and its wise use in all aspects of community life. Recommendations to encourage energy conservation—at the individual and municipal level—are included in several sections of the Town Plan. Opportunities for development of renewable energy resources are discussed, again at both individual (e.g., passive solar heating, solar hot water or photovoltaics) and commercial scale (e.g., small hydroelectric and commercial wind turbines). Deployment of “smart grid” technology, an efficient land use plan, transportation alternatives, and greater reliance on local food production and distribution all support municipal and state energy goals. Specific programs that guide homeowners through upgrading their home's energy efficiency are recommended. The Town will develop an enhanced energy planning element as an amendment to this plan in the coming year to better understand current and future energy use in the Town and to receive ‘substantial deference’ at Public Service Board proceedings.

8. To maintain and enhance recreational opportunities for Vermont residents and visitors.

The plan discusses both natural resource based recreational activities that are abundantly available thanks to the Town's location among the mountains, forests, streams, and ponds of the Green Mountains and the recreational facilities and activities available, and potentially available, in and around the town center and school. The importance of maintaining public access to important recreational resources is covered as well, and formal documentation of the Town's trail networks is recommended to ensure their maintenance and public use.

9. To encourage and strengthen agricultural and forest industries.

The Town Plan identifies the area's agricultural and forest resources as some of its most important assets. Strong support is given to efforts to develop and sustain the local working landscape. The land use plan and land ownership patterns protect much of the most important forest land and agricultural land conservation programs are identified. The growing importance of local food systems is expected to support efforts to maintain and expand farming operations.

10. To provide for the wise and efficient use of Vermont's natural resources and to facilitate the appropriate extraction of earth resources and the proper restoration and preservation of the aesthetic qualities of the area.

Natural resource based industries are encouraged and policies are established which protect the future availability of important earth resources. At the same time, requirements for environmental protection during extraction and processing of those resources and restoration of disturbed sites are included.

11. To ensure the availability of safe and affordable housing for all Vermonters.

The Town Plan recognizes the need to provide a variety of housing options for all segments of the local population. The lack of public water and sewer systems limits the ability to develop extremely affordable high-density housing in Stamford, but opportunities for two and three family units and accessory apartments exist. A particular need for convenient and safe housing for elderly residents was identified; possible cooperation with regional and state nonprofit housing developers was discussed as a way to create housing to meet this need.

12. To plan for, finance, and provide an efficient system of public facilities and services to meet future needs.

A comprehensive inventory of community facilities and services is included in the Town Plan, together with a review of related financial issues and constraints. Coordinating financing between municipal and school related funding obligations is discussed as are potential assets such as a small public water supply and some type of community center.

13. To ensure the availability of safe and affordable child care.

The need for quality child care—as both a necessity for residents and for economic development—is identified in the Plan. Child care facilities are allowed in the town’s residential land use districts, although only two are currently providing services in the community.

14. To encourage flood resilient communities.

The Flood Resilience chapter provides an overview of preventative, mitigative, and recovery measures the Town is taking to manage potential flood events and their damaging effects. To protect its residents, the Town participates in the National Flood Insurance Program (NFIP), adheres to Town Road and Bridge Standards, and maintains Local Emergency Operations and Hazard Mitigation Plans. Maps showing the Special Flood Hazard Areas and state-designated River Corridors are presented for the regulation of new and existing development. Broad regional collaboration and possible participation in the FEMA Community Rating System will continue to improve Stamford’s resilience in the face of future flood events.

Relationship to Town and Regional Plans

Stamford has been a member of the Bennington County Regional Commission (BCRC) for many years and has developed a working relationship with the BCRC that has assured that local and regional planning efforts are compatible. The Bennington County Regional Plan recognizes Stamford as a rural community with an important village area and an abundance of natural resources. Regional land uses districts—primarily Upland Forest and Rural—are consistent with the town’s land use map and plan.

The Bennington Regional Plan emphasizes the need to protect natural, scenic and historic resources in very much the same way as the Stamford Town Plan. Infrastructure improvements advanced in the Town Plan are supported by the Regional Plan as well, particularly the need to maintain existing highways and to ensure access to modern telecommunications. Stamford has worked with the BCRC on various local initiatives, including sidewalk and roadway projects, solid waste plans, and planning for energy projects.

Stamford adjoins three towns in Vermont: Pownal to the west, Woodford to the north, and Readsboro to the east. Direct access on maintained roads exists only between Stamford and Readsboro. Remote forest land, much of it publicly owned, and private land with significant regulatory and physical limitations to development predominates to the west and north. The town should consult and coordinate with adjacent towns when dealing with issues associated with national forest plans and projects as well as other areas of mutual concern. The use and condition of the old County Road between Stamford and Pownal and the use of the many trails connecting the northern part of Stamford with Woodford and Bennington are issues where continued intermunicipal cooperation is important. Readsboro is reached from Stamford along Route 100; its land use plan (and that of the Windham Regional Commission) is consistent with Stamford’s land use plan, with low-density and forest uses contemplated along the entire boarder except in a rural residential corridor along the state highway.

The most direct access to employment, service, and educational centers from Stamford is south along the North Hoosic River valley to Clarksburg and North Adams, Massachusetts. Many town residents work, attend school, shop, and obtain critical services in North Adams, Adams, Williamstown, and Pittsfield, Massachusetts, and many people travel along Route 2 in Massachusetts to get to jobs and services in Bennington. The town should, therefore, maintain contacts with those communities and consider working with the BCRC to coordinate certain interstate planning efforts with the Berkshire Regional Planning Commission.

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