

# **LYNDON TOWN PLAN**

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Selectboard**

# ACKNOWLEDGMENTS

October, 2014

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October, 2014

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\*Appendices B and C and The Official Town Plan Maps are available for reference at the Lyndon Municipal Offices.

# INTRODUCTION AND DEMOGRAPHIC OVERVIEW

Located in the Northeast Kingdom of Vermont, the Town of Lyndon was founded by settlers from Rhode Island in 1791, the same year that Vermont was accepted as the fourteenth state in the Union. Lyndon developed as a regional center for farming, railroading, education, manufacturing, commerce and retail operations. In 1866, fire destroyed much of St. Johnsbury's railroad yard enabling Lyndon to evolve as a regional center for passenger and freight trains. The Village of Lyndon(ville) became the Town's population center, having the distinction of being Vermont's only railroad built community. Although farming and railroading remain an integral part of Lyndon's image, today's economy and identity are largely based in manufacturing, education, commercial and retail operations, recreation and tourism.

Lyndon is easily accessible, being served by two exits from Interstate 91, by Vermont routes 5, 114 and 122, by Caledonia County State Airport, and by Green Mountain Railroad. Lyndon is home to nearly 6,000 people, employing over 2,700.

As of the 2010 census, the average age of Lyndon's residents is 36.9. According to the most recent American Community Survey 5-Year averages (2007-2011), median adjusted income for Lyndon's nearly 1,400 families is \$50,781 per year. Over 88 % of its people aged 25 and older have completed their high school education and roughly 40% of the high school graduates also have college degrees. Close to 13% of Lyndon's workforce is employed in manufacturing, 16% in the retail trades and nearly 30% in the field of education, health care, and social services. A little over 1% of the workforce is employed in forestry or farming. Almost 30% of the workforce is employed as professionals or managers, nearly 30% in sales or office positions.

Approximately 1% of the Town's 23,061 acres are being used for agricultural purposes (which does not include orchards and sugar bush) and 16% are forested. Lyndon's citizens live in house sites which range in size from less than one acre to over 100 acres. From 2005 through 2014, 114 new single-family homes were built, a 5% increase in the number of residences. In the same period, there have been 104 new commercial developments. A large portion of the Town's population lives in one of its three villages: Lyndon Center, Lyndon Corner and Lyndonville. Lyndonville is the hub of activities for the area, serves as the home to most of the Town's churches, its municipal offices, most of its retail and commercial operations and some of its manufacturing businesses as well.

Lyndon's attractive surroundings, easy accessibility and well-trained population all suggest that Lyndon will grow. In fact, the more conservative of population estimates recently released by the State of Vermont projects that Lyndon's population will grow to 6,280 by 2030. While this projection is based on Census counts, the counts may not necessarily take into account Lyndon's student population. To preserve its heritage and maintain its appeal as a place to reside, earn a living, and raise a family, the Town must anticipate future needs and plan for meeting these needs in an orderly and well thought through manner.

## PURPOSE OF TOWN PLAN

The State of Vermont encourages municipalities to develop Town Plans and the legislature has further established a specific list of topics to cover. If a plan is implemented, the state requires those plans to be reviewed periodically in order to enable adjustments that may be necessary as communities change over time. The intent of a Town Plan is to develop a coordinated, comprehensive policy framework that relates to the public aspects of a community. Citizen participation is encouraged in all parts of the plan in an attempt to provide a balanced document that reflects the community's values. A plan that reflects the broad consensus of the community can be an effective guide for future decisions.

The basis of a Town Plan is an inventory of existing conditions. This is followed by a review of current concerns as expressed by residents. Suggested means of resolving community concerns follow with specific recommendations that may be explored for future action. A Town Plan serves as a general guide to governmental and non-governmental bodies; it does not by itself require a specific path forward or set

of actions. Upon further examination in the months and years following adoption of a Town Plan, some recommendations may prove unworkable or no longer viable and it is also likely that others will yield benefits. One of the functions of a Town Plan is to encourage collaboration over time and between various interest groups in order to develop the best solutions that meet the needs of the community.

## **TOWN PLAN PROCESS**

The Lyndon Town Planning Commission came into existence in 2006, when it and the Development Review Board were formed out of the old Zoning and Planning Commission. A Town Planning Commission oversees and periodically reviews and revises the Town Plan and Zoning By-Laws. These documents guide decisions of the Town Selectboard, Town Development Review Board and regional and state agencies and planners.

When the Town Plan was developed in 2008, a major issue expressed by the Selectboard, and endorsed by the Planning Commission, concerns our community's desire to maintain an appropriate balance between governmental regulation of community affairs and private property rights of individuals. We strive to ensure that bylaws and regulations we enact serve the public good while at the same time minimize the impact on individual rights. Freedom to utilize one's own property within the construct of a publicly approved broad community plan is important for all.

The Town Plan update process for 2014 involved the Planning Commission undertaking a page-by-page review of the 2008 version. Details that were no longer relevant were changed and/or removed and new items were added as deemed appropriate. Valuable information was collected from the public, Town officials, and NVDA. We are appreciative of their valuable contributions.

## **CONTINUING THEMES**

### **ADJUSTING TO CHANGING DEMOGRAPHICS**

Lyndon's population characteristics continue to evolve. First, the population continues to increase. Second, the population is getting older, with fewer families of school-aged children represented. Third, the population is becoming more diverse, with more foreign-born persons working and living in the area. Like the rest of the United States and world, Lyndon would be well advised to develop a more global perspective in order to keep its young citizens from moving away and to encourage others to settle here.

### **ADDRESSING DEVELOPMENT PRESSURES**

Lyndon, which sits between I-91 and Burke Mountain, is part of the relatively pristine Northeast Kingdom. More people are traveling to, and moving to this area and should current plans succeed in turning Burke Mountain into an all-season recreation attraction, we stand to experience considerable growth, in particular along the Route 5, Route 114 and Route 122 corridors.

### **PRESERVING COMMUNITY CHARACTER**

Lyndon is an old town by American standards and much of its attractiveness derives from its citizens' commitment to preserving that which is good in its social and physical environment. Many people hope that Lyndon maintains its community spirit and preserves its unique beauty for the benefit of many generations to come. There is concern about our ability to preserve our community character.

### **DEVELOPING A VIABLE ECONOMIC BASE**

Many citizens are concerned that stable, well-paying jobs and opportunities for technical and professional advancement are diminishing in this region. Fostering a business friendly environment is a priority.

### **PRESERVING THE LAND - ADDRESSING AESTHETIC & ENVIRONMENTAL CONCERNS**

Concern over the future of our relatively pristine rural landscape is widespread. Many citizens are attempting to use their land in ways that both preserve it and pay for it. We hope the Town will help its citizens keep large tracts of land open even as we work to attract business, residents and tourists, and to develop the 21<sup>st</sup> century infrastructure that can make it all happen.

### **CONTROLLING FLOODING**

Parts of Lyndon sit in a flat river valley surrounded by steep terrain. The Passumpsic River drops only a few feet from its northern most point to its southern most point in Town. In recent years, it has frequently flooded parts of Town, at least once to devastating effect. The floodplain both in Town and north of Town must be protected through management practices and bylaws that are in compliance with the National Flood Insurance Program.

## **PRIORITIES**

This plan recommends actions to be considered by the Selectboard, Trustees, Planning Commission, Development Review Board and/or other entities. Some of these recommendations call for immediate consideration or action; some suggest actions to be taken as future milestones in the Town's development are reached; still others relate to the overall enhancement of the Town with no specific time requirements. In almost every instance the recommendations involve some level of cost and this consideration will, necessarily, be a major determinant as to if and when the recommendations will be implemented.

1. Develop a Capital Budget Improvement Plan to address essential upgrades to the public infrastructure and other anticipated municipal projects.
2. Work with the federal government, state and neighboring communities to develop more coordinated and effective flood mitigation procedures.
3. Work with local property owners and developers to make affordable housing more widely available to persons and families of all ages and abilities.
4. Conduct an audit of existing available commercial and industrial properties and facilities.
5. Work with the Vermont Agency of Transportation to finalize and implement a redesign of Broad Street.
6. Further study downtown traffic circulation and parking in order to develop a workable plan.
7. Continue work with cell phone and broadband providers to determine coverage gaps and identify the best (and fewest) siting locations to improve service.
8. Expand and enhance the Town of Lyndon/Village of Lyndonville website to provide vital and timely information on activities, events, programs, services and emergency services to citizens and visitors. Publish in different languages where feasible.

## **CURRENT & FUTURE LAND USE**

Identifying how the land in Town is to be used in ways that respect individual and communal rights and protect the environment for future generations is fundamental to any Town Plan.

The current zoning by-law has ten districts (See the Existing Zoning Map). This fundamental model has been used since the inception of zoning in the early 1970's (A thorough review and revision by the Town Planning Commission is on-going).

### **OVERALL RECOMMENDATIONS**

- Continue revising the Zoning By-Laws so that they reflect the Town Plan and comply with VSA Title 24, Chapter 117.
- Study the creation of fewer, more distinct types of zones within the Town. Revise boundaries, if needed, to complement Town Plan.

- Clarify and specify “permitted” and “conditional” uses for each zone.
- Address issues of flooding and flood mitigation in all affected districts. Develop a “Flood Hazard Overlay District” that outlines flood and fluvial erosion hazard areas identified by the Federal Emergency Management Agency (FEMA) and the Vermont Agency of Natural Resources.

Italicized texts below are the district objectives as provided in the current zoning bylaws. The recommendations which follow each section represent the work of the Planning Commission with some modifications by the Selectboard after public hearings. If a change in the bylaws is required to implement any of these recommendations, a thorough public review will be held when the change is proposed.

## **RURAL RESIDENTIAL DISTRICTS**

*\*The Rural Residential District contains land that has and should retain a low density of use, and which should be primarily restricted to agricultural, forestry, outdoor recreational and residential use. The Rural Residential District is characterized by the lack of a network of improved roads, municipal services such as water supply and sewage treatment and disposal, and the remoteness of the district from commercial centers. This district encompasses all outlying areas of Town.*

### **RECOMMENDATIONS:**

- More precisely define the vague “other uses” designation so as to more specifically describe permitted and conditional uses.
- Utilize an Overlay model to assist in preserving the district’s rural character.

## **RESIDENTIAL NEIGHBORHOOD DISTRICTS**

*\*The Residential Neighborhood Districts consist of land presently developed primarily for single family dwellings, and the surrounding areas. Future residential development in the Town should be encouraged and can be expected to occur in the residential neighborhoods that presently exist. The maximum residential development in any one neighborhood should not exceed the capacities of sewage disposal and water systems as they exist from time to time, police protection services, fire department services, utilities, and present or planned municipal facilities.*

### **RECOMMENDATIONS:**

- Allow for smaller lot sizes and higher population densities in certain residential neighborhoods, while ensuring adequate parking exists for the intended use.
- Encourage development in areas with existing water and sewer service or the potential for easy expansion of these services.

## **VILLAGE COMMERCIAL DISTRICT**

*\*The Village Commercial District serves as the commercial center of the Town of Lyndon. It is presently characterized by retail stores, offices and apartments. Future growth in retail establishments and professional offices should be encouraged in the Village Commercial District. The Village Commercial District currently includes only downtown Lyndonville.*

### **RECOMMENDATIONS:**

- Development of housing for people with special needs, such as the infirm, elderly and others should take place in or near the Village Commercial District so that the commercial facilities will be available them.

## **PARK DISTRICT**

*\*The Park District is the area surrounding the Village Green and extending southerly on Park Avenue*

from Maple Street to Center Street. The Park District is of vital historical and architectural importance to the Town of Lyndon, and must be counted as one of the major assets of the Town and the Northeast Kingdom. The physical appearance of the Park District should be preserved. The present buildings in the Park District were originally constructed as single family dwellings, but these buildings have, with the passage of time, become inefficient and expensive to occupy and maintain. Other uses that will enable the owners of property in the Park District to earn income from these buildings, but are compatible with the present appearance of and uses in the Park District, should be allowed so that the Town will not cast an unfair economic burden on the owners of property in the Park District if those owners are going to be obligated to help preserve the Park District's present appearance.

#### **RECOMMENDATIONS:**

- When authorizing a use other than a single family dwelling in the Park District, the Board should give primary consideration to the preservation of the architectural features and the population density of the Park District in its present form. The Planning Commission recommends that all structures in the Park District have not less than two stories of living or other usable space at and above street level.

### **INDUSTRIAL DISTRICTS**

*\*The Industrial Districts are designed to provide locations for establishing new industry in the Town, and permitting the growth of existing industry in the Town in areas appropriate to such land use. Land in the Industrial Districts (a) must have good access to transportation facilities, (b) must not interfere with surrounding land uses, (c) must be near readily available utilities, and (d) have feasible access to municipal sewage disposal and water facilities.* Industrial districts currently include areas located between Pudding Hill and Route 5, areas along the railroad in Lyndonville, and the St. Johnsbury-Lyndon Industrial Park. The Town should maintain these districts for industrial uses in the future.

#### **RECOMMENDATIONS:**

- Encourage manufacturers and high volume distributors to locate in the Industrial Park.

### **COMMERCIAL DISTRICTS**

*\*The Commercial District contains land where commercial development should be encouraged in addition to the Village Commercial District, where commercial uses will not interfere with surrounding land uses. The Commercial District has access to good roads, sewage disposal and water supplies, utilities, parking and other facilities necessary to sustain commercial activity.* The current district spreads out in a linear fashion along Route 5.

#### **RECOMMENDATIONS:**

- Future commercial development should concentrate on areas along and adjacent to Route 5 south of downtown Lyndonville, Hill Street and along portions of Route 122.
- Increase density of commercial development on Broad Street, Hill Street, and Route 122; while improving the access management and walk-ability.

### **LYNDON CORNER INDUSTRIAL DISTRICT**

*\*The Lyndon Corner Industrial District is located at the west end of York Street in Lyndon Corner. It is occupied by a successful furniture manufacturing company providing substantial employment. It is bordered on the south and west by rural land, and on the north and east by a residential area. The purpose of the zone is to minimize the adverse effects of a furniture manufacturing facility in a residential and rural area, to protect the capital investment in the property and the employment opportunities it provides to the community, and to control the growth of the industrial use of the property.*

#### **RECOMMENDATIONS:**

- None at this time.

## MAIN STREET DISTRICT

\*U. S. Route # 5, known locally as Main Street, is the only means of access to and from the heart of the Village of Lyndonville from the north. All persons traveling through Lyndonville must travel on Main Street, and their impression of the Town of Lyndon will be affected by the land uses on and appearance of Main Street. It was the first section of Lyndonville to be developed, and contains many buildings having historical, architectural and social importance. It is characterized by a mixture of industrial, commercial and residential uses. It should be used for purposes that are compatible in a mixed use area, with an emphasis on providing incentives to the owners of land and buildings in the District to improve Main Street's appearance and to keep commercial activity concentrated in or near the Village Commercial District.

It is desirable that new buildings constructed in the Main Street District, whether on vacant land or to replace existing structures, have design features and be constructed with materials that are similar to and compatible with the design and construction materials of the majority of the existing structures in the district. All structures in the Main Street District shall have not less than two stories of living or other usable space at and above street level.

### RECOMMENDATIONS:

- Consider a mechanism for allowing the construction of single story buildings on lots in this district which are not encumbered by a deed restriction stipulating two story construction.

## INSTITUTIONAL CONTROL AREA

*\*The Institutional Control Area is the area tentatively identified in the document titled "Proposed Plan, Superfund Program, Parker Landfill Site, Lyndon, Vermont" dated June, 1994 prepared by the Environmental Protection Agency of the United States of America, as the former Municipal and Industrial Waste Landfill located on the southeastern side of Lily Pond Road. It is to be more particularly identified by the Environmental Protection Agency of the United States of America upon its completion of certain studies of the former Municipal and Industrial Waste Landfill it has undertaken. Upon receipt of information from the Environmental Protection Agency of the United States of America that will enable the Planning Commission to define the boundaries of the Institutional Control Area with specificity, the Planning Commission shall, after notice and hearing, recommend boundary lines for the Institutional Control Area to the Selectboard. If the Selectboard adopt boundary lines for an Institutional Control Area, land development in the Institutional Control Area shall be controlled by the District in which it is located, and also by the restrictions set forth in paragraph 3.9.1 through 3.9.4 (of the zoning bylaw). This district is intended solely to prohibit (a) land development in any Solid Waste Disposal Area, and (b) the use of ground water taken from the Institutional Control Area, pursuant to the recommendations made in the Proposed Plan identified in Section 3.9 (of the zoning bylaw).*

### RECOMMENDATIONS:

- Update description based on latest EPA information.

## INDUSTRIAL/COMMERCIAL DISTRICT

*\*The Industrial/Commercial District is one suitable for the location of industry and the development of commercial enterprises because this District satisfies the criteria set forth in Sections 3.5 and 3.6 (of the zoning bylaw). Lot size and setback requirements for land development in this District shall be the same as those for either the Industrial or Commercial Districts dependent on the category of development proposed. Currently this district resides along Route 122, just east of Interstate Exit 24.*

### RECOMMENDATIONS:

- Encourage commercial or industrial businesses in this district as there is adequate access to the interstate, an established history of these uses.
- Explore options for the Municipal Water service on Route 122 (Gilman Road).
- Explore options for expanding the sewer line as growth in the region demands.

*\*Italicized text includes the district objectives as provided in the current zoning bylaws*

# GOVERNMENT

## GOALS

- Continue to evaluate the government structure to ensure it is responsive to citizen concerns.
- Elect and appoint officers and committee members that have a broad interest in the community and are willing to learn from and cooperate with their fellow citizens.
- Continue to make information regarding actions of local government readily available.
- Carry out legitimate functions of municipal government while mindful of financial resources required.



Municipal Offices, Park Avenue

## TOWN OF LYNDON

Municipal affairs of the Town of Lyndon are entrusted principally to an elected Selectboard, an elected Town Clerk and an elected Town Treasurer. The Selectboard has three members, each serving three year terms with rotating expiration dates. The Town Clerk and the Town Treasurer are each elected for a term of three years. Other officers elected by Australian ballot at Town Meeting are Moderator, School District Treasurer, Grand Jurors (2), Constables (2), Listers (3), Town Agent, Collector of Delinquent Taxes and School Directors (5). Powers and duties of all these officers are outlined in Vermont statutes. Also at Town Meeting we elect Sanborn School Fund Trustees (3) and Cobleigh Library Trustees (5). Justices of the Peace (15) are elected at the General Election.

The Selectboard appoints persons to fill many functions, some of which are Municipal Administrator, Police Chief, Fire Chief, Road Foreman, Zoning Administrator, Animal Control Officer, Health Officer, Energy Coordinator, Cemetery Sexton, Planning Commission (7), Development Review Board (7), representatives to NVDA (2) and representatives to NEKWMD (3). In addition, advisory committees are appointed as seen necessary from time to time. The Town Clerk and the Town Treasurer appoint assistants to fulfill the functions of those offices.

The activities undertaken by all the individuals mentioned above, except the Road Foreman, apply to all the lands and citizens of the Town of Lyndon. The Road Foreman's activities apply only to those portions of the Town which are outside the Village of Lyndonville.

Financial resources needed to operate most municipal services in the Town of Lyndon (as approved by voters) are obtained by applying a tax to the Grand List of all taxable properties in the Town of Lyndon. The two services which are funded by user fees rather than property taxes are the wastewater system and the solid waste (sanitation) system. The financial resources needed to provide road services in the Town of Lyndon outside the Village of Lyndonville (as approved by voters) are obtained by applying a tax to the Grand List of all taxable properties in the Town of Lyndon minus the taxable properties in the Village of Lyndonville.

## **VILLAGE OF LYNDONVILLE**

The Village of Lyndonville is a separate, chartered municipality located totally within the Town of Lyndon. It has a small geographic area and can be described by what most people refer to as "downtown Lyndonville". Familiar boundary points at the north, east, south, and west are the car wash on Main Street, Skyline Drive on the east, Bob's Welding south on Broad Street and the Passumpsic River on the west. According to the 2010 census, the population of the Village of Lyndonville was 1207 (this number is included in the population of the Town of Lyndon of 5,981.)

The municipal affairs of the Village of Lyndonville are entrusted principally to an elected Board of Trustees, an elected Village Clerk and an elected Village Treasurer. The Board of Trustees has five members, each elected for five year terms on rotating expiration dates. The Village Clerk and Village Treasurer are elected for one year terms. Other elected officials of the Village are the Village Agent and the Delinquent Tax Collector. The Board of Trustees appoints persons to fill the following functions: Municipal Administrator, Public Works Supervisor, and Electric Department Manager. Occasionally, advisory committees of citizens are appointed for specific purposes.

The activities undertaken by the Village officials apply not only to lands and citizens within the Village, but also to certain assets owned by the Village which are beyond its geographic boundaries. The assets outside the Village relate to the water system and to Lyndonville Electric Department.

Financial resources needed to operate most municipal services in the Village of Lyndonville (as approved by voters) are obtained by applying a tax to the Grand List of all taxable properties in the Village of Lyndonville. The two services which are funded by user fees rather than property taxes are the water system and the Lyndonville Electric department.

## **COORDINATION BETWEEN VILLAGE AND TOWN GOVERNMENTS**

Currently, the Municipal Administrator for the Town is the same person who serves in that capacity for the Village. In a similar manner, the current Town Clerk is also the Village Clerk and the Town Treasurer is also the Village Treasurer. Further, the person holding the Clerk positions is the same person who holds the Treasurer positions. It must be noted, however, that there is no statutory basis for ensuring this type of coordination.

The Water department which is owned and operated by the Village of Lyndonville has lines that extend beyond the Village limits. The wastewater department which is owned by the Town parallels, in most cases, the water lines and thus serves Village residents and some, but not all, residents outside the Village. The Town and Village have a contracted operator for the wastewater and water treatment plants. The Public Works Supervisor is responsible for the collection and distribution systems.

In daily activities, the two governments often coordinate purchasing of office supplies or construction supplies. There has also been an effort to coordinate personnel policies.

A merger between the Town and Village has been discussed seriously on various occasions in recent years, most recently in 2006. At that time a complete merger was proposed in which the Village entity would be dissolved and merged into the Town. An elected governing board of five selectmen and an appointed Board of Lyndonville Electric of three trustees was proposed. All assets and liabilities would be merged. One single budget process would be involved to be funded by one single tax base. That proposal was approved by voters by Australian ballot 927 to 838 on November 7, 2006, but overturned by a revote of 695 to 435 on January 16, 2007.

## **MUNICIPAL SERVICES**

Most of our municipal services, whether undertaken by Town or Village are discussed in other parts of this plan (parks, roads, public parking, schools, electricity, water system, wastewater system, fire department and police department). There are relevant issues and concerns and strategies associated with each of these functions.

Two other important entities need to be mentioned separately and they are the Planning Commission and the Development Review Board. The duties, responsibilities and powers of both of these bodies are defined by Vermont statute. Each is made up of seven appointed members with rotating three year terms. Each can play an important part in assessing the needs of the community, facilitating open discussion regarding those needs and helping to come to a consensus regarding future development. The Planning Commission's role is to develop a basic town plan (this document is principally their work) and then to define which, if any, regulations or zoning bylaws would be advisable to help implement the general vision. The Development Review Board's role is to make decisions regarding certain (not all) development applications. Their decisions must be based on relevant zoning bylaws that are enacted by the Town.

## **ISSUES & CONCERNS**

- Many citizens are confused regarding our two part government.
- Many administrative activities of the Town and Village are duplicated (processes related to payroll, accounts payable, accounts receivable, reconciliation of bank accounts, etc.)
- The number of citizens attending public hearings on topics of municipal interest is low.
- Most officer elections continue to be uncontested and boards continue to struggle to find qualified citizens for appointed positions.
- The smaller tax base in the Village that supports Village municipal services requires a tax rate for Village residents that is higher than the tax rate for residents outside the Village. Some feel this is unfair because they believe Village residents are carrying the burden of services that also benefit residents outside the Village.

## **STRATEGIES**

1. Continue to investigate ways to coordinate Town and Village services while still maintaining separate governmental bodies.
2. Review possibilities for reducing redundancy in administrative functions.
3. Develop a mechanism for Trustees and Selectmen to jointly prioritize tasks required of the Municipal Administrator.
4. If public interest warrants, initiate study of merger again. Review past efforts in order to better understand the obstacles.

5. Elected and appointed municipal boards and advisory committees should annually review their internal organizational structure and standing policies and procedures in order to ensure that their activities comply with legislative requirements and are as effective and transparent as possible.
6. Utilize the Town website to publicize meetings of the Selectboard, ongoing programs, requests for volunteer assistance with Town initiatives, etc.
7. Announce openings in elected or appointed positions with sufficient time to give interested citizens a chance to consider application.
8. Investigate the feasibility of a joint maintenance facility to replace the aging facilities.

# COMMUNITY CHARACTER

## GOALS

- Protect and promote local arts, culture and events that advance the vision of Lyndon as the best place to live, work and play in northeastern Vermont.
- Uphold the Town qualities valued by our community and support Town characteristics that make Lyndon unique.
- Protect and promote historical resources and structures so that the very best of Lyndon's past becomes part of its future.
- Expand and promote walk-ability within the Town & Village.
- Promote the beautification of our gateways into Town.



A view along Park Avenue

## OVERVIEW

Since being chartered in 1780, Lyndon has enjoyed a lively mix of cultural activities that give the community a unique flavor and a history that generates pride of place among its citizens.

The characteristics that make Lyndon unique are cited frequently by its citizens, some of them include:

- It's a very walkable town and there is a culture of walking in the late afternoon/evening.
- There is a strongly-held sentiment that Lyndon's natural beauty should be preserved.
- Citizens value the 'small town charm' that Lyndon possesses and they want that charm to be preserved and to increase.

## LOCAL ARTS, CULTURE & EVENTS

A list of the many events and resources that add to Lyndon's community character are provided below along with some of the issues facing these resources. The locations of these events and resources are identified on the Lyndon Base Map (available at the Municipal Offices).

RESOURCE	DESCRIPTION	ISSUES
Bandstand Park	Concerts offered weekly during the summer in the Town center. Farmer's Market on Fridays in the summer.	Not as well-attended as in the past.
Burklyn Arts Council	Biannual Craft Fairs held as fundraising events for ongoing arts programs in schools and communities.	Programs not fully utilized.
Caledonia County Fairgrounds	Hosts the Caledonia County Fair, Auctions, Horse shows, & other events.	Fairgrounds are not used as often as they could be.
Cobleigh Library	Local public library	
Darling Inn	Hosts activities, social events and educational sessions for seniors.	
Events sponsored by Lyndon Institute and Lyndon State College	Events offered by two educational organizations bring national and international speakers and performers.	Local population often unaware of the high quality and availability of these events.
Fenton Chester Arena	Skating rink and venue for other events.	Underutilized.
Freighthouse	Train museum; showcases Lyndon's railroad heritage.	
Shonyo Park	Lyndon Outing Club a Municipal downhill skiing hill. Skateboard Park. Rented for weddings, reunions, graduation & birthday parties, and boy scout meetings.	Severely dwindling volunteers.
Powers Park	Main public park that host a number of recreational facilities.	Pool floor & tennis court surfaces are in need of repair. Eye wash station, and a new pool pump are needed. ADA requirements need to be addressed for the pool.
Stars & Stripes Festival	Parade, food and crafts held around Bandstand Park.	
Steven's Loop	A popular walking loop.	
Village Improvement Society	Management entity for Powers Park and other Village facilities.	
Shores Museum	Museum of historic local artifacts.	Does not have regular open hours
Fisher Field	Youth baseball & Softball Field	Parking
LTS Soccer Fields	Youth, high school, & college soccer. Practice space for youth baseball	

Some of the biggest community events include the Stars & Stripes festival, held every July, the Caledonia County Fair, which draws approximately 20,000 people from all over Caledonia County, the BurkLyn Arts Weekends and the summer events hosted by Lyndon State College, which last summer received over 10,000 attendees.

Local athletic events are also a particular draw for the community. In addition, youth and adult league sports provide free local entertainment on spring/summer evenings.

These events and activities give Lyndon residents many opportunities to come together in common interest, whether it is to support the same team, enjoy the same music or cheer at the same parade. They are the glue that binds the community together and deserve to be supported and sustained in a way that makes them available to all residents.

At the same time, there are more subtle community characteristics, many of which we need to preserve and retain and a few that citizens have identified as opportunities for change. Lyndon is a small town in a beautiful setting, but some express concern that parts of Routes 5, 114 and 122 detract from its appeal.

## **CHURCH COMMUNITY**

In Lyndon, spirituality is supported by numerous churches located all around Town. Local churches of many denominations have active congregations engaged in projects that benefit the whole community. Lyndon's churches include:

- Lyndon Full Gospel Assembly of God
- Lyndon Center Baptist Church
- Lyndon Bible Church
- Church of Jesus Christ of Latter-Day Saints
- Lyndonville First Congregational Church
- St. Peter's Episcopal Church
- Lyndonville United Methodist Church
- St. Elizabeth's Church
- Calvary Chapel Northeast Kingdom
- Lyndonville Kingdom Hall of Jehovah's Witnesses.

## **HISTORIC FEATURES**

Lyndon has a number of historic resources that also add to its local character. Some of the historic resources identified on the table below are registered on the National Register of Historic Places. It's important to note that Lyndon may have additional historically significant buildings and sites beyond this list that should be identified for future preservation, such as the Shores Museum and Bandstand Park.

Lyndon also has two historic markers. One, on Vail Drive near the bridge over Miller's Run marks the location of the first town meeting held in Lyndon on July 4, 1791. Another historic marker is on the Lyndon State College campus and marks the homestead of Theodore N. Vail who was a pioneer in creating the telephone industry

Most importantly, Lyndon and Lyndonville have neighborhoods that may be considered of historic importance. The stately homes surrounding Bandstand Park were developed by the railroad when Lyndonville was built and many were designed by the architect Lambert Packard. The Darling Hill area also has a number of potentially historic farms and estates that are important to the Town's past. These historic areas should be maintained to preserve the historic image of the Town and Village.

NAME	LOCATION DESCRIPTION	TOWN AREA	DATE REGISTERED
Millers Run (Bradley) Covered Bridge	On VT Route 122 over Millers Run River	Lyndon	6/13/1977
Burrington (Randall) Covered Bridge	Off VT Route 114 over the East Branch of the Passumpsic River.	Lyndon	6/13/1974
Center (Sanborn) Covered Bridge	Off U.S. Route 5 over the Passumpsic River.	Lyndon	6/20/1974
Chamberlain Mill Covered Bridge	West of VT Route 5 over Branch Brook of the Passumpsic River.	Lyndon	7/30/1974
District 6 School House	73 Cemetery Circle, Lyndon	Lyndon	2/1/2006
Mathewson Block	Junction of Main St. and Maple St., Lyndonville	Lyndonville	5/20/1999
Old Schoolhouse Bridge	On South Wheelock Rd. over the Branch Brook.	Lyndon	3/31/1971
Darling Inn	On Depot St.	Lyndonville	11/24/1980
Riverside	On Lily Pond Rd. South of Lyndonville	Lyndonville	6/17/1993
Bandstand Park	The "Village Green" located within the Streets of Main S, Maple, Park and Middle.	Lyndonville	Not Registered
Shores Museum	Center Street in Lyndon Center	Lyndon Center	Not Registered
Former Darling estates	Darling Hill Area located on Darling Hill Road.	Lyndon/Burke	Not Registered

## ISSUES & CONCERNS

- We need to protect Lyndon as a "walking" town and keep the Town safe for pedestrians. Areas where safety could be improved for pedestrians specifically included: Broad Street (RR Crossing to RR Crossing, College Road (college to sidewalk at Fenton Chester), and Steven Loop (Park 'N' Ride to the Lynburke Motel)
- We should strive to preserve the Town's beautiful views and scenic vistas.
- The Town has a rich history. Residents and visitors do not have easily available resources to learn about the Town.
- Some sections of Route 5 need visual improvement.
- We need to define, preserve and promote what makes our Town unique.
- As a small town, Lyndon cannot meet all of the cultural/entertainment needs of its citizens; our interdependence with surrounding towns and their cultural offerings should be acknowledged and supported.

## STRATEGIES

1. Continue to promote the development of a Farmer's Market in Bandstand Park. This strategy aligns with the agricultural heritage of the past, the current and future interest in healthy foods grown locally, supports the local economy and encourages the development of small businesses.
2. Expand the content of and capitalize on the Town of Lyndon website and visitor center to distribute information regarding local cultural events, historical information and volunteer opportunities.

3. Continue to improve the gateways to Lyndon through visual coherence and consistent decisions regarding traffic flow, appearance and signage.
4. Plans for development along Routes 5, 122, and 114 might include underground electric, phone, and other cabling for new construction and phase-in for existing buildings, enforcement for signage and adding trees.
5. Look for ways to keep the Shores museum open with posted hours, perhaps as a volunteer opportunity promoted on the website.
6. Look for ways to expand the use of underutilized resources discussed in this section.
7. Continue to address Town aesthetics through consideration of planned unit development, underground utilities, signage, lighting, landscaping, ingress & egress and green space.
8. Continue to support the commercial core of the Village by renewing the “Village Center” designation or by seeking “Downtown” designation from the State of Vermont as a vehicle for securing additional funding for needed improvements, and improving the vitality of the business district.
9. Research the need to create an overlay district to preserve historic neighborhoods, scenic views and vistas in Town.
10. Identify specific views and scenic vistas that the Town should preserve.
11. Develop strategies to make the Town walkable and safe for pedestrians.

# BUSINESS & ECONOMY

## GOALS

- Enhance telecommunications technology to improve broadband access and cell phone coverage.
- Improve the traffic flow on major routes including access and egress from parking areas and side roads.
- Preserve rail access and maintain commercial transportation access within the Town.
- Enhance the relationship among the Town, Village and the academic institutions.
- Support the development of retail offerings that are attractive and provide a diverse array of goods and services.
- Identify and support the infrastructure needed for economic growth.
- Identify and enhance a workforce development climate to support area business and encourage investment in the region.



Charles E. Carter Business Resource Center at the Industrial Park

The current status of the Lyndon economy is one of health and strong employment. The Town has a mix of light and heavy manufacturing, agriculture, forestry, extraction of earth resources, retail, hospitality, service businesses and education as its economic base. It serves as a retail center for the northern half of Caledonia County. Lyndon is located within 40 miles of the Canadian border and many businesses in the region enjoy patronage from our northern neighbors. Several organizations within the community do business internationally including Bag Balm, Lyndon Furniture, NSA, Lyndon Institute (LI) and Lyndon State College (LSC).

The beauty of the community can be seen from the center of town and Lyndon Center which are nestled in the Passumpsic River valley and surrounded by the many hills that comprise the Town. Lyndon enjoys the benefits of tourism associated with traffic to various regional destination attractions such as area

lakes, the inns and bed and breakfasts, the Burke Mountain Ski Resort and Kingdom Trails in East Burke. Lyndon State College brings thousands of visitors to the region, both during the academic year and the summer months, when as many as ten thousand visitors participate in a wide variety of programs at the college. Transportation to the region includes good connection to Interstates 91 and 93, which serve as a gateway to southern New England and Canada, as well as easy access to Route 2, the major east/west route across northern New England.

The Lyndon economic and business environment benefits from the attributes of the Town and the region. The St. Johnsbury-Lyndon Industrial Park has approximately 60 acres remaining on the Lyndon side, 30 acres of which are developable. Almost the entire portion of the St. Johnsbury side of the park is built out leaving the Lyndon side most poised for new industry in town. The infrastructure within the park includes water, sewer and electricity, Internet access, a 24 hour day-care, a UPS ground-shipping facility and convenient access to the interstate highway and rail systems. Other major industrial areas include sections of VT Route 122 and U.S. Route 5. Other transportation modes in town include air at the Caledonia County State Airport for small aircraft and rail. Additional areas capable of sustaining commercial and industrial development can be found along VT Routes 122, 114 and U.S. Route 5 North.

The Town's educational facilities provide employers with the ability to offer their employees good quality education from kindergarten through college. Healthcare facilities are within a reasonable commute for immediate care, with good access via Interstate highway or air for critical care. Arts in the community are available locally and regionally with world-class artists performing within an hour of the Town. The quality of life is enhanced with year round outdoor recreation including skiing, hiking, fishing, hunting, kayaking, skating, cycling, mountain biking, snowmobiling and other outdoor activities. The community has a strong network of volunteer organizations enhancing the social climate of the region with youth and adult recreation and volunteer services. Lyndon is a community that is welcoming and inclusive.

## **CENTRAL BUSINESS DISTRICT**

Lyndon's central business district acts as the major regional service center for northern Caledonia County. It is located along Route 5, locally designated as Memorial Drive from the Back Center Road to the railroad tracks at Agway, at which it becomes Broad St. and then joins Depot Street in downtown Lyndonville. This section of Route 5 features a mixture of commercial, retail, services, financial, manufacturing, restaurants and public uses. Businesses along Memorial Drive and Broad Street include stand-alone retail businesses as well as service and professional businesses. Parking is available in private lots for most businesses along Memorial Drive and Broad Street. Depot Street presents a typical downtown business district with a selection of retail and service business with on-street public parking. Parking in the Depot St. area is limited as many of the spaces are shared with apartment residents as well. Traffic along both routes has increased steadily over the years and now, at times, presents an ingress-egress problem to area businesses.

Residents have a good selection of reasonably priced goods in terms of food, pharmacy, technology, furniture and hardware as well as restaurants for a variety of tastes. There is also selection in terms of financial, legal, medical, personal appearance, real estate, vehicle maintenance, plumbing and electrical services. There remains an opportunity for a retailer or several retailers to offer a broader range of clothing, general household goods or dry goods. Consumers often leave the Town in order to satisfy these needs. This opportunity may become more viable if the price of fuel increases and traveling to reach national retail establishments becomes increasingly expensive.

## **EMPLOYMENT & WAGES**

The Total Labor Force (16 yrs+) for Town of Lyndon including Lyndonville is 3,317. According to the American Community Survey 5-Year Estimates, 88% in the county, 11% work outside of the county, and 1.6% work out of state. The educational attainment in Lyndon is broken down as follows: 6.2% less than 9<sup>th</sup> grade education; 5.6% 9-12<sup>th</sup> grade education, no diploma; 37.9% high school or equivalency; 14.2% some college, no degree; 9.4% associate's degree; 18.3% bachelor's degree; and 8.3% graduate or professional degree (based on total population 18 yrs and older). Lyndon's education attainment figures

suggest a very diverse population and that the Town can provide jobs for workers within all dimensions of the workforce.

### Unemployment Figures for Lyndon and Caledonia County 1990-2012

Year	Lyndon (includes Lyndonville)			Caledonia County		
	Labor Force	Unemployment	Rate	Labor Force	Unemployment	Rate
2012	3,040	230	7.5%	16,100	1,000	6.4%
2011	3,140	240	7.6%	16,600	1,100	6.5%
2010	3,140	250	8.0%	16,700	1,250	7.4%
2009	3,150	290	9.3%	16,800	1,350	8.1%
2008	3,120	140	4.4%	16,950	850	5.0%
2007	3,080	110	3.7%	16,800	750	4.4%
2006	3,100	80	2.7%	17,200	700	4.0%
2005	3,020	90	2.8%	16,600	650	3.8%
2004	2,970	90	3.1%	16,550	700	4.3%
2003	2,960	130	4.2%	16,450	850	5.2%
2002	2,880	120	4.1%	16,050	800	5.0%
2001	2,860	100	3.5%	15,850	600	3.9%
2000	2,810	90	3.1%	15,500	500	3.2%
1999	3,070	130	4.3%	15,200	600	3.9%
1998	3,040	140	4.7%	15,050	650	4.4%
1997	3,060	190	6.0%	15,300	800	5.4%
1996	3,010	210	6.9%	15,100	950	6.3%
1995	2,930	190	6.3%	14,800	900	6.1%
1994	3,070	210	7.0%	14,800	900	6.2%
1993	3,070	220	7.3%	14,850	1050	7.1%
1992	3,100	220	7.2%	15,200	1100	7.3%
1991	2,920	240	8.1%	14,600	1150	7.7%
1990	2,880	200	6.9%	14,450	850	6.0%

\*Not Seasonally Adjusted

Source: VT Dept. of Labor, Economic & Labor Market Information (U.S. Bureau of Labor Statistics)

The labor force in Caledonia County has grown by 10% over the past 22 years, roughly 10% of which has occurred within the Town of Lyndon.

In 2013, the leading industry sectors in Lyndon based on employment, organized by the North American Industry Classification System (NAICS), included construction, manufacturing, retail trade, education & health services, and leisure & hospitality. Total employment provided by these industry sectors in Lyndon was 2,309 jobs. Lyndon's businesses provide for a regional workforce, especially in the sectors of Manufacturing, Leisure & Hospitality and Education & Health Services. For example, almost 30% of the Manufacturing establishments in the County are located in Lyndon and these same establishments provide almost 40% of the county's total manufacturing jobs.

Covered Employment and Wages 2013*								
NAICS	Industry	Lyndon (includes Lyndonville)			Caledonia County			Vermont
		Total Establish.	# Jobs	Average Wage	Total Establish.	# Jobs	Average Wage	Average Wage
23	Construction	22	163	\$ 44,883	133	648	\$ 38,407	\$ 45,394
31-33	Manufacturing	18	548	\$ 41,676	62	1,398	\$ 42,079	\$ 54,671
44	Retail Trade	33	361	\$ 24,672	156	1,608	\$ 26,661	\$ 27,437
61-62	Education & Health Services	26	884	\$ 33,925	120	3,537	\$ 37,510	\$ 50,522
71-72	Leisure & Hospitality	25	353	\$ 12,156	82	978	\$ 16,161	\$ 19,665
TOTAL JOBS IN ABOVE SECTORS			2,309			8,169		

\* All figures are private ownership, except Education and Health Services which includes Government jobs  
Source: VT Dept. of Labor, UMLI – Covered Employment & Wages, 2013

Employment in the construction industry offers wages that are higher than the county average, although wages in other categories fall below the county and state averages. In general average wages in Northeast Kingdom Counties tend to be 10% lower than the State's average wages in key industry sectors, such as manufacturing.

The median adjusted gross income per Lyndon family according to the most recent American Community 5-Year Estimates was \$ 50,781.00, compared to the County's \$52,780.00 and the state's \$66,340.00 (American Community Survey). Lyndon's overall annual average wage in 2012 was \$32,595, lower than the County's \$35,709 (VT Dept. of Labor, Economic, and Labor Market Information).

## MAJOR EMPLOYERS

Major employers in the region include several manufacturers, the largest of which is NSA, followed by Vermont Aerospace and Lyndon Furniture (formerly Lyndon Woodworking). The first two companies are involved in machining and fabrication of metals. Lyndon Furniture designs and manufactures quality wood furniture for the home. The second largest employment sector is education, serving students from the Town, region and the country, from kindergarten through graduate school. In addition to local contractors, Lyndon also has two contracting firms experienced in large state and federal construction projects.

## MAJOR EMPLOYERS & EMPLOYMENT 2012

Employers	Employed
Lyndon Furniture, Inc.*	60
Calkins Sand & Gravel, Inc.	25
JBMS	14
Community National Bank (Total)	72
Lyndon Institute	130
Lyndon State College	182
Thaddeus Stevens School	14
Riverside School	Not available
NSA Industries, Inc.*	250
Municipal Government (Town & Village)	28
LED	17
JA MacDonald	40
VT Aerospace*	130
Precision Composites of Vermont, LLC.	12
Northeast Agricultural Sales, Inc	40
NE Home Crafters & Beans Mobile Homes, Inc.	25
Lyndon Town School	103
White's Market	84
The Pines Residential Care Center	82
Northern Gas Transport	44
Winterset, Inc.	85
Total	1437

\*Businesses physically located in St. Johnsbury but counted in Industry Information for Lyndon based on Zip Code

Source: Businesses & VT Business Directory 2012-2013

## **ECONOMIC OPPORTUNITIES**

- Lyndon has seen the most consistent growth of any town in the region over the past 10 years. The number of single-family housing permits granted has demonstrated a consistent willingness to invest in the Town. The increase in residences represents an increase in households requiring goods and services.
- Visitors to the region represent a significant opportunity to the Town. The Canadian dollar is currently close in value to the U.S. dollar, encouraging traffic from Quebec. Lyndon is close enough to the Province that appropriate development of retail offerings could result in Canadians traveling to the region for shopping.
- There are currently expansion plans at Burke Mountain, which will represent both an opportunity and a challenge to Lyndon.
- Students and conference attendees at Lyndon State College and LI represent a significant opportunity for Lyndon businesses. LSC enrolled students number is in excess of 1400 and conference attendees during the summer months in 2012 numbered 11,000. The student population and summer visitors to the college present a significant opportunity for area businesses.
- Providing students with a richer experience while here in Lyndon has the added benefit of increasing the number of students who choose to settle in the Town. The need for qualified workers to replace the aging workforce in the area is important.

## **ECONOMIC CHALLENGES**

Lyndon faces some challenges that, when resolved, will have a significant impact on the Town's ability to grow economically.

### **TECHNOLOGY**

In order to be competitive regionally, nationally and internationally, Lyndon needs to be able to offer high quality cell phone service and broadband access. Both technologies are critically important not only to existing businesses, but businesses seeking to relocate and to visitors choosing a location in which to recreate. The availability of sufficient cell phone signal availability cannot be underestimated. The lack of cell phone signals in the area has been a deterrent to businesses considering the region for their operations.

Broadband access within our Town is not only a means to attract new businesses to the region, but also enhances the ability of existing businesses to compete at a global level. The internet offers significant sales and exposure opportunity for businesses of all sizes. A slow internet speed hampers the ability of area businesses to operate as efficiently as their urban competitors.

### **TRANSPORTATION - TRAFFIC**

The consistent growth in the Town, region and business environment has resulted in an increase in traffic through the business district on U.S. Route 5. Access to and egress from businesses along the route has become difficult during peak travel times. Those times include drive time in the mornings and evenings during the week and Saturdays and Sundays from mid-morning to early afternoon. Heavy traffic may impede business as consumers avoid the business district rather than contend with the congestion. Route 5 is a state highway and as such requires remedy from the State of Vermont.

### **TRANSPORTATION - SHIPPING**

The region is served by both long haul shipping and rapid transport services. FedEx, UPS and DHL serve the region on a daily basis. Additionally, Burlington Land Air, Carpenter Freight, Ross

Trucking, and Yellow Freight are carriers that come in regularly to serve the manufacturing community.

#### **TRANSPORTATION - AIR**

Air travel for business is limited to small aircraft at the Caledonia County State Airport. Commercial air travel is available from the cities of Burlington, VT, Lebanon and Manchester, NH, the closest of which is within 75 minutes of Lyndon. Burlington and Manchester both offer daily flights at competitive prices to major metropolitan cities such as New York, Boston, Washington, D.C., Chicago, Miami and points west.

Businesses requiring express shipment of goods to or from the area can access the services of UPS, FedEx and DHL, all of which have air service from Barre, VT providing shipments within 24 hours.

#### **TRANSPORTATION - RAIL**

Rising energy costs have resulted in the growth of rail business throughout the state. The use of the existing rail line for business represents a significant benefit as the costs of fuel continue to rise. The use of rail for the shipment of goods has the potential of keeping Lyndon manufacturing competitive in the future. Recently, the State Agency of Transportation divested itself of portions of Lyndon's rail yard. Some sidings are still available for commercial traffic.

#### **LYNDON STATE COLLEGE & LYNDON INSTITUTE**

The college represents a significant opportunity for the economy of Lyndon that has not been fully realized. The student body has grown over the years, but there is not a significant commercial relationship between the students and the community. Lyndon Institute boarding students represent another opportunity for businesses in Lyndon. There are two obstacles to students patronizing Lyndon retail businesses. The first is poor pedestrian access from the LSC and LI campuses to the Town's commercial districts. The second obstacle is in the variety of products and services available in Lyndon. An analysis of the goods and services sought by the students could result in a product/service mix that more closely approximates the needs of the students.

Continuing education presents an additional area of opportunity between the Town and the two institutions. A stronger channel of communication between the business community and the schools would significantly enhance curriculum offerings to more closely align them with employment opportunities in the region.

#### **RETAIL**

Competition from surrounding shopping districts, which include nationally known chains has some impact on area businesses; however the continued success of several retail establishments that compete directly with the nationally recognized stores proves that there is a market for locally available products. In order to serve the region better, Lyndon needs to identify and encourage unique retail opportunities to meet the needs of our community as well as visitors.

#### **INFRASTRUCTURE**

As the region continues to grow, there is a need to plan effectively for the growth of the area's infrastructure. This includes continued improvements to water, sewer, electricity, transportation infrastructure and emergency services. Expansion plans at Burke Mountain pose a potential challenge to our community's services and infrastructure.

#### **WORKFORCE**

The ability of the region to grow in terms of new businesses will be strongly impacted by the availability of a stable, trained workforce. There are younger citizens who seek opportunities beyond the state's borders. Lyndon is no different in that those students who leave to attend college or pursue other opportunities out of the area are less likely to return, and while they may

not be leaving the state, they are moving to more urban areas such as Burlington where there are more opportunities and higher wages.

Whether recruiting high school and college graduates, or drawing workers from outside the region, Lyndon's ability to attract a high quality workforce will be impacted by the availability of affordable housing and competitive wages. While wages within the manufacturing sector are somewhat higher than the average for the county, they remain 23% lower than the statewide average. Wages in the hospitality sector are 19% below the average for the county and 28% below those for the state. Wages offered by the retail and transportation sectors of the economy are close to the statewide average and education wages are 23% below the average for the state. Bringing wages closer to the statewide averages may provide employers with a more qualified selection of workers from which to choose.

## **STRATEGIES**

1. Direct new industrial development in and around existing industrial areas, where supporting infrastructure is already located, such as the St. Johnsbury-Lyndon Industrial Park, portions of VT Route 122, U.S. Route 5 and Commercial Lane.
2. Encourage mixed use development in areas with existing infrastructure (such as Lyndonville, Lyndon Center and Lyndon Corner) by perhaps considering Planned Unit Development, adaptive reuse of existing structures and adequate public parking facilities.
3. Conduct an audit of the existing commercial and office space throughout town to determine if there is an appropriate amount of space to meet demand.
4. Support the ongoing maintenance of Lyndon's infrastructure.
5. Facilitate discussions with LSC on how to better involve college students in the community, with possible mentorships, business internships and student-led initiatives or community projects.
6. Encourage LSC's Ski Resort Management students to assist the Lyndon Outing Club.
7. Work with the Vermont Telecommunications Authority to identify appropriate siting areas to serve the portions of Town that are lacking high speed internet and cell service.
8. Involve local employers in communicating with local high school students on the key career skills that employers are looking for, the variety of local career options available and the possible career paths to get there.
9. Be a tourist friendly community by providing the tourist amenities, publicizing community events and attracting travel groups/organizations.
10. Encourage local businesses to work with LSC on providing special after hour events and local activities geared to summer conference/workshop attendees.
11. Facilitate traffic flow through downtown Lyndonville to allow downtown businesses to be seen, provide efficient ingress-egress and provide for pedestrian safety.
12. Continue to encourage the redevelopment of the former rail yard with a rail-supported use.
13. Improve access for LSC and LI students to downtown Lyndonville businesses and services.

# THE WORKING LANDSCAPE

## GOALS

- Increase public awareness of the values, both socially and economically, of Lyndon's agricultural and forestry industries while maintaining a responsible approach to growth and development.
- Preserve a viable agricultural land base that maintains Lyndon's agricultural industries.
- Encourage development in a manner that is sustainable and supportive of the natural environment and working landscape.
- Protect and manage Lyndon's natural resources and biodiversity for the benefit of current and future generations.



Steven and Leslie Brown Farm, Mt. Hunger Road

## LANDSCAPE

Open land and wooded land continue to be the largest portion of the land base in the Town of Lyndon. Lyndon contains 23,061 acres, most of which is under private ownership with the exception of about 330 acres under municipal ownership and 382 acres in State ownership (both excluding roads). Approximately 16 percent is forested and nearly 1 percent is used for agricultural purposes.

Lyndon is predominately rural in nature. Agricultural and forestland represent an important part of the heritage of the Town of Lyndon. They are also immeasurable resources for the future. They provide social and economic benefits for everyone. Traditional uses of land should be encouraged so farm and

forestland can remain viable and productive. While dairy farming continues to decline, many other types of agricultural enterprises are active. Other significant benefits that agricultural lands contribute to a community include tourism, health and recreational benefits to both residents and visitors

## AGRICULTURE

According to the Agricultural Census, Lyndon currently has 76 operating farms, 8 of which are dairy farms. The Department of Agriculture defines an 'operating farm' as an enterprise that receives 51% of the total family income from farming operations. Over the last few decades agricultural lands have been fragmented by development and are now scattered around Town. The largest concentrations of prime agricultural lands and working farms exist on Pudding Hill, Hubbard Hill, Mathewson Hill, Darling Hill, Vail Hill, along Route 122, and the Mount Hunger Road area.

County figures from the 2012 agricultural census show that the number of farms and average market value are actually increasing in Caledonia County, while the total acreages being farmed and the average farm size are decreasing. This can be attributed to the loss of large dairy farms and the increase in diversified production. Lyndon is experiencing the same trend.

### Farm Change Statistics: Caledonia County (2002-2012)

Topic	2002	2007	% Change	2012	% Change
# of Farms	505	531	-5.1%	560	5.5%
Land in Farm Use (in acres)	84,318	81,946	-2.8%	81,828	-0.1%
Average Farm Size (in acres)	167	154	-7.8%	146	-5.2%
Avg Market Value of Agricultural Products Sold	\$47,107	\$59,401	26.1%	\$66,509	12.0%

Source: USDA 2007 and 2012 Agricultural Census

USDA Agricultural Marketing Service reports that Lyndon has four certified organic farms. A growing number of farms are instituting organic farming practices. Other practices that support working farms include Community Supported Agriculture and farmers markets. Community Supported Agriculture (CSA) is a way for the public to create a relationship with a farm and to receive a weekly basket of produce. This enables a local financial commitment to a farm; essentially the people become "members" (or "shareholders," or "subscribers") to the farm, thus maintaining a locally grown food source and support for agricultural land use in the community. Farmer's markets also provide a better connection between the community and locally grown food. At this time, Lyndon has a CSA, and has a successful farmer's market.

In addition to traditional agricultural farms, Lyndon has productive forests that provide maple sugar and local wood resources. Lyndon currently has 10 working maple sugar farms and 48 wood lots (registered with management plans) that provide hardwoods, softwoods, bole wood chips and cord wood. According to Matt Langlais, the county forester, forest land is increasingly being subdivided and fragmented for residential development. Property under twelve acres in size is no longer profitable for loggers to harvest. Therefore, the subdivision of forestland into smaller residential parcels is also limiting the amount of productive forest land available in Lyndon. A majority of Lyndon's viable forest lands and sugar lots exist in the southwestern portion of Town and along the Town's outskirts and borders with Kirby, Sutton, Burke, St. Johnsbury and Wheelock.

## PROPERTY IN LAND TRUST & CURRENT USE

One strategy to maintain the natural landscape and restrict development on property is to utilize conservation easements or Vermont's Current Use Program. The Vermont Land Trust uses conservation easements as a way to preserve prime agricultural lands, protect natural areas and limit the amount of

subdivisions that can occur on a parcel. Conservation easements may be placed on a property title when the property owner requests to conserve an area or sells the development rights to a land trust. Conservation easements, once executed, are a permanent element within a property's title and are maintained through property transfer. They may only be removed through the permission of the land trust, which usually requires swapping for other land and a detailed case as to why the property now needs to allow development. The majority of Lyndon's conserved land is scattered throughout Town and makes up a small percentage of the Town's total acreage.

### LYNDON PROPERTIES IN CURRENT USE

Classification	Acres Enrolled	Total % of Lyndon
Agricultural	1,932	8.4%
Productive Forest	4,235	18.4%
Non-productive Forest	69	0.3%
<b>Total</b>	<b>6,236</b>	<b>27.0%</b>

Source: VT Tax Department, November 2013

Current use restrictions, unlike conservation easements, can be removed from a property at any time. Current Use restrictions allow property owners to reduce their property taxes by enrolling in the Vermont Current Use Program. The program allows property owners to pay property taxes based on a reduced per acre amount set by the state for agricultural or forestry use. The State reimburses the Town for a portion of the taxes not paid by participants. If the property is ever

taken out of current use or developed, then the property owner must pay a Land Use Change Tax. In most cases this is a hefty sum, which ultimately encourages land to maintain its current use.

### SOILS

Soils play a major role in ecology. The quality and the sustainability of our present standard of living can be attributed, in part, to the quality of our soil. The soil influences the quality of the water we drink for contaminated soil will contaminate ground water. The soil also has a direct effect on the nutritional value as well as the yield of food we gain from the land.

Lyndon contains a complex array of soils due to its location along the Passumpsic River basin. The Natural Resources Map shows patterns of these soil associations. This map can be used for a general idea of the soils which exist in a region or to compare different acres on large-scale basis. Large areas can be located on this map for a broad land use, but an accurate soil assessment for a small tract cannot be gleaned from this map.

### WATERSHED

Lyndon is part of the Connecticut River Watershed through the Passumpsic River sub-basin. The main stem of the Passumpsic River is fed in Lyndon by the East and West Branches of the Passumpsic River, Calendar Brook, and Millers Run. Lyndonville is located where several of the Passumpsic River tributaries meet, creating issues during the spring and during times of heavy rain. This collection of waterways accounts for Lyndonville's significant flood zone and numerous seasonal wetlands.

Almost all brooks, streams and rivers within Lyndon are classified by the state as Class B waterways, indicating that they are suitable for boating, swimming and drinking with treatment. These waters also consistently exhibit good aesthetic value and high quality habitat for aquatic biota, fish and wildlife. They can also be used for irrigation and other agricultural uses. There are three Class A2 designated reservoirs in Lyndon; these include the Mathewson, Copeland and Woodworth Reservoirs. Class A waterways have special protections placed upon them; in this case the Class A2 designation protects public drinking water supplies.

### WETLANDS

Wetlands have traditionally been viewed as wastelands - areas with no inherent value which require large amounts of work to become "valuable" land which can be used for development or agriculture. Ecological studies have shown that these wet meadows, marshes, swamps and bogs have important environmental functions for members of the communities which surround them. Wetlands have been found to be

significant in control of flooding, reduction of erosion, protection of public and private water supply, protection of ground water, pollution control, control of insect populations and protection of fisheries and wildlife. Utilization rather than destruction of wetlands appears to be their most beneficial use in the future.

The Town of Lyndon contains over 118 wetlands as mapped on the National Wetlands Inventory prepared by the United States Fish and Wildlife Survey. Many of these wetlands associated with the Passumpsic River and its tributaries are considered seasonal; meaning the level of water varies depending on the time of the year. The water level in wetlands helps define what plants and animals will be found in the area. The Vermont Significant Wetlands Inventory, developed by the VT Agency of Natural Resources, has mapped a significant number of Class II wetlands throughout the Town. Class II wetlands, including a 50-foot protective buffer, are protected under the Vermont Wetland Rules. Any intrusion into the identified wetland or its protective buffer requires a Conditional Use Determination from the Water Quality Division of the Dept. of Environmental Conservation.

## **GROUND WATER & WELL PROTECTION AREAS**

The only municipal water system in Lyndon is owned and operated by the Village of Lyndonville. The water system serves the Village plus areas adjacent to the Village. The Village water system and the Lyn Haven water system are protected by Ground Water Source Protection Areas and well head protection areas. These areas provide a designated buffer area that needs to remain free of adverse impacts and land uses that could potentially affect water quality. The protection areas are located around the well heads and, for the municipal system, along the East Branch of the Passumpsic River. Each of these wells has a three-zone source protection area delineated. Private wells are also now protected by Vermont Statute.

## **SPECIAL FLOOD HAZARD AREAS**

Lyndon and Lyndonville have a number of Special Flood Hazard Areas, flood prone highways and properties that repeatedly flood. Flooding is a major concern for the Village area, with the last major flood events occurring in 2011. The Town has had six FEMA disaster declarations in the past and has received a total of \$421,089.78 in public assistance damages for flood related and severe storm events. The 2002 & 2011 flooding raised water levels beyond the 100 year flood-plain in areas around the intersection of Routes 5, 114 and 122, and around the Village Sport Shop area of Broad Street. A map of Lyndon's flood hazard areas can be found at the Municipal Offices.

Lyndon's flood prone streets (as designated by FEMA) include portions of:

- Broad Street
- S. Wheelock Road
- Red Village Road
- Center Street
- Calendar Brook Road
- Severance Hill Road
- Mathewson Hill Road
- Back Center Road
- Fall Brook Road
- Hubbard Hill Road
- Vail Drive
- Urie Drive
- Lily Pond Road
- Burrington Bridge Road
- Sugar Maple Road
- Cold Hill Road
- York Street
- Elliott Street
- Boston Street
- Brown Farm Road
- New Boston Road
- Sheldon Brook Road

In November 2006, the Town completed a Flood Mitigation Study for the Passumpsic River and its tributaries within Lyndon. The study presented flood mitigation options and then evaluated their cost-benefit ratio in order to determine some of the best solutions to limit flooding incidents in the future. The most promising recommendations from the study include replacing the Main Street Bridge with a dry bridge, restoring river channels and 100-yr floodplain storage and by limiting encroachment into the floodplain with conservation easements. The study notes “without conservation of floodplains, over time flood conditions in Lyndon will only worsen.” (See also the Flood Resilience section of this Plan).

## **ISSUES & CONCERNS**

- Because of economic conditions in the agricultural industry, development pressures, escalating property values, and property taxes, fragmentation of agricultural land is occurring and probably will continue to occur.
- There is no documentation or data base which provides the criteria for objectively evaluating economic, social and environmental values of forest and agricultural lands in Lyndon.
- There is a need to find a way to help agricultural and forest landowners hold onto their land, as current use does not subsidize taxes enough to keep pace with rising land values and development pressures.
- Repeated flooding is a major issue for the Town, as Lyndon has had four or more “100-year” flooding events since 2000. “100-year” Special Flood Hazard Areas are meant to delineate severe flooding that has a 1% chance of happening in any given year.

## **STRATEGIES**

1. Work to establish documentation or a data base which provides the criteria for objectively evaluating economic, social, or environmental values of forest or agricultural land in Lyndon. This would contribute to improving the potential of forest and agricultural land and educating the public about these resources.
2. Owners of forest lands are encouraged to develop forest management plans to secure the best long term use of forest land.
3. In areas that have prime agricultural land, promote land uses that are not in direct conflict with existing agricultural uses.
4. The agricultural community should work to become proactive to prosper from foreseen development. i.e., this means that a larger population may equal a larger market for local agricultural products and support future farmer’s markets.
5. Encourage the development and support of agricultural processing facilities.
6. Educate and remind landowners about the added benefits of keeping their land open and undeveloped. These benefits include aesthetics, healthy local food supplies, ecosystems, erosion control, etc.
7. The Town should assist forest land owners in obtaining information about, and support for, proper management practices and use of renewable energy resources.
8. To aid planning efforts, Lyndon should encourage FEMA to update existing flood plain maps.
9. Maintain good water quality by evaluating development in and near ground water source protection areas for potential impacts to the drinking water supplies.
10. Maintain appropriate culvert sizes.

11. Encourage water quality and watershed health through the implementation of wooded vegetative buffers along rivers, brooks and streams.
12. Review conclusions of the 2006 Flood Mitigation Study to determine which, if any, suggestions are feasible and cost effective for near term implementation.
13. Explore and encourage a working partnership with upstream towns that addresses flood mitigation efforts.

# EDUCATION

## GOALS

- Support lifelong learning for Lyndon residents.
- Create a community for learning in our schools where staff, parents, teachers and students work together to achieve excellence for all.
- Help each child to succeed in ways that reflect his or her unique aptitudes and interests.
- Continue to support and encourage collaboration with Lyndon State College and Lyndon Institute.
- Enhance the ability of Lyndon learners to have access to technology.
- Make community facilities available for a greater array of learning and teaching opportunities.



Lyndon Institute, Lyndon Center

## BACKGROUND

One of Lyndon's strongest attributes is its long tradition of quality educational programming. A dynamic and healthy cycle leading to our high literacy rate begins with Pre-K and extends to K through Grade 8, to secondary, to post-secondary, to work and back to Pre-K as former students are involved with their own children in the school system. A strong public/private bond exists within the community beginning with available preschool and childcare services. Lyndon residents have long supported the inclusion of the Fine Arts programs found in both the Lyndon Town School's curriculum and Lyndon Institute's. There is an excellent and diverse teaching corps across the spectrum giving both student and adult learners opportunities beyond the scope of a traditional basic education.

<b>School Enrollment (2009- 2013)</b>	
<b>Total Population 3 years and over enrolled</b>	1,886
Preprimary School (preschool & kindergarten)	140
Elementary School (grades 1 – 8)	576
High School (grades 9 – 12)	255
College or Graduate School	915

The Caledonia North Supervisory Union has received a 2<sup>nd</sup> Safe Schools Healthy Student Grant with the following vision: "To promote a physically and emotionally safe school climate that provides all students, families, staff, and community members with the opportunity to work toward academic success through

healthy choices.” CNSU will realize the vision by addressing the individual student, the school as a whole, the family as a unit and the community as the foundation.

Alternative and additional support programs including those found at the Cobleigh Library are available in the community for lifelong learning beginning with our Pre-K population and extending through to our senior citizens.

## LYNDON TOWN SCHOOL

Lyndon Town School is a comprehensive, PK-8 school of 518 students, 73 of which are in the Caledonia North Supervisory Union sponsored preschool. The school building was built in 1991 with 40 classrooms and also features a gymnasium, cafetorium, library, computer labs, technology room, home education room, reading rooms, art room, tiered choral and band rooms, and special resource rooms. Overall the school has ample capacity to meet the needs of Lyndon’s student population, as the school was originally built to accommodate between 800 and 1,000 students. At the time of construction, the current enrollment was 780 however, over time Lyndon’s student population has decreased considerably.

The additional classroom space created from a decreasing school age population has proven to be a bonus for the school, as the additional space is being utilized to better accommodate children with special needs. In recent years, the school is seeing an increase in students diagnosed with special needs. An increasing number of students with special needs students are being diagnosed with autism spectrum disorders (currently at 12 students). Lyndon Town School serves this population through the district’s Autism Collaborative, located at the school. This population requires a lot of specialized assistance.

Lyndon also serves children with advanced abilities through a number of enrichment and accelerated programs, including programs that enable elementary students to enroll in high school courses and high school students to enroll in advanced placement (AP) courses and college courses.

Public and Independent Schools in Lyndon		
School	Grades	2013-2014 Enrollment
Lyndon Town School	PK-8	518
Lyndon Educational Alternative Resources Network, Inc. (LEARN)	7-12	23
Lyndon Institute	9-12	542
Riverside School	K-8	81
Thaddeus Stevens School	1-8	72

Lyndon Town School students currently work with over 60 faculty members in a wide array of programs. On average, the student-teacher ratio is about 10 students/teacher, which is rather low for a school of this size. However, low class sizes allow the additional student attention required for children with special needs.

To provide professional development for staff, the Lyndon School District works closely with Lyndon State College, the University of Vermont and the New England League of Middle Schools. The Northeast Kingdom Professional Development Center provides support for the professional development of the teachers in the district.

## LYNDON INSTITUTE

Lyndon Institute, a Vermont Approved Independent School that provides the primary high school education for Lyndon, offers a quality education that is appropriate, relevant for all, inclusive, stimulating, academically excellent, rigorous, with developing diversity. In recent years, Lyndon Institute (LI) has begun to accept boarding students. The school’s student body is approximately 75% local (in district) students and approximately 25% boarding and out-of-district students from the U.S. and several foreign countries.

The LI Faculty consists of 60+ educators that provide an extensive program list that includes basic and advanced study courses in the subjects of math, English, science and fine arts. In addition, students can

round out their education with foreign languages, business, computer science, culinary arts, family and consumer sciences, human services and a variety of technical skills.

Lyndon Institute is located in Lyndon Center, clustered around the intersections of Center Street, College Road, Matty House Road and King Drive. The LI campus is a major part of Lyndon Center's streetscape. The campus consists of 15 classroom buildings, four administration/office buildings and four dormitories on three campuses (the Darling Campus, Harris Campus and the Vail Campus). The campus also hosts an extensive Library and Media center, two gymnasiums, a 650 seat auditorium, performing arts space, a dining hall and numerous sports facilities.

## **OTHER INDEPENDENT & RECOGNIZED SCHOOLS**

Lyndon has a number of students who attend other independent and recognized schools in our Town such as The Riverside School, Thaddeus Stevens School, and Lyndon Educational Alternative Resources Network (LEARN).

The Riverside School is an independent day school serving grades K-8. "The mission of The Riverside School is to develop active learners, patient leaders, and engaged citizens who use information to solve problems and promote ideas."

The Thaddeus Stevens School is also an independent day school serving grades K-8. "The Thaddeus Stevens School believes that education must not only provide knowledge but also cultivate knowledgeable people who participate responsibly in a democratic society, citizens who use information to solve problems and promote ideas."

LEARN is an alternative 7-12 day school serving students with emotional, behavioral, and academic challenges.

Other independent schools in the immediate area available to Lyndon residents include Burke Mountain Academy, East Burke School, Good Shepherd School, Cornerstone School, and St. Johnsbury Academy. It should also be noted that a number of Lyndon children are home schooled.

## **LYNDON STATE COLLEGE**

Lyndon State College (LSC) is a four year college offering graduate and undergraduate degrees to day and resident students. It also provides advanced learning programs for qualified secondary students as well as educational, cultural and entertainment programs which are open to local residents as well as its students. LSC currently has 1,200 full-time undergraduates enrolled with approximately 60% in-state students. Fifty percent of the student population lives on campus. The college offers 24 undergraduate degree programs, 8 associate degree programs, with awarding A.A., A.S., B.S., B.A., M.Ed., and M.S.T programs. The most popular undergraduate programs include Business, Meteorology, Television Studies and Education.

In addition to degree programs, LSC is an NCAA Division III college with 12 intercollegiate sports and 30 intramural/club sports. There are over 20 student clubs and organizations, including academic organizations, service oriented clubs, a campus radio station, newspaper, and leadership opportunities.

The student body is supported by 59 full-time faculty members and approximately 95 part-time faculty members on the 175 acre campus. The campus, located on Vail Hill, also includes 10 residence halls, 14 computer labs, 6 science labs and a library boasting 110,000 volumes, 545 periodical subscriptions, 677 CD-ROM Titles and 4,500 audiovisual items. LSC's average class size is 13 students, creating an excellent student-teacher ratio.

The *Lyndon State College Strategic Plan 2008-2013* called for increasing enrollment to 1,600 students; increasing the student retention rate; effectively engaging students and building relationships; upgrading IT infrastructure; expanding athletic and recreation facilities; and increasing the college's presence as an

intellectual, cultural, economic and technological center for the Northeast Kingdom. Lyndon State College's strategic plan is in the process of being updated.

## AREA DAY CARE & PRE-SCHOOL PROGRAMS

There are currently 8 In-Home Registered day cares throughout the Town and Village. In-Home Registered facilities are allowed to care for up to 4 school age children (part-time) in addition to 6 children below school age. The definition "of school age" includes children from kindergarten up to the age of twelve, when typically they no longer require child care services. In the summer months, these facilities are allowed two additional school age children. In-Home registered facilities are also limited in the amount of infant care they can provide. Infant care includes children under the age of two and each facility can only have two children meeting this definition.

Lyndon also has a number of Licensed Providers, which can include day care, specialty care, pre-school, kindergarten, summer school, and after-school programs. The allowed maximum capacity for Licensed Providers is dependent upon the facility design (size, number of bathrooms, size of kitchen, etc.) and the amount of staff, plus their experience level. A breakdown of the Town's day care offerings is provided below:

Licensed Day Care Facility Capacity in Lyndon and Lyndonville			
Licensed Provider	Program Offerings	Capacity *	Infant Capacity
Gracelight Children's Garden	Family childcare, Mon. thru. Fri.	12	1
Lyndon Children's Center, Inc.	Early childhood program	30	
Lyndon Children's Center School-Age Summer Program	Summer only, Mon. thru. Fri.	30	
Kingdom Montessori School	Mon. thru. Fri. preschool	20	
Step by Step Children's Center	Early childhood program, Mon. thru Fri.	17	5
Caledonia North Supervisory Union	Early childhood program, Part-time, School-year only, Mon. thru. Fri.	15	
Stay & Play Daycare Center	Early childhood, full-time and afterschool	23	8
Play & Learn Daycare and Preschool Center	Early childhood through school age	39	4
Lyndonville Child and Family Development Program	Early childhood program	15	
Little Dipper Doodle Children's Center (St. Johnsbury-Lyndon Industrial Park)	Extended hour day care facility, Mon-Fri., 5:00 am to 8:00 pm	150	16

Source: Dept. for Children and Families, Child Development Division, Accessed December 2013

\*Actual capacity, as set by the provider, may be lower than the maximum number for which the facility is licensed.

There are only 50 infant day care spots available in town by Licensed Providers or In-Home Registered facilities. Births to Town residents in the most recently published vital records (2008 and 2009) were 50 and 60 respectively, which, in theory, could have put more than 100 kids in the infant category for care. Since Lyndon provides employment for neighboring towns, it's possible that the demand could actually be higher.

It is difficult to assess the number of children that do not require day care services because of parent, relative or guardian care and children that receive care in adjacent communities. However, we should recognize that there is a shortage of local day care services, especially infant care.

## **COBLEIGH LIBRARY**

The Cobleigh Library is an inviting community center which provides programs, services, books and materials, public space and information to all residents in the Lyndon area. The library connects people of all ages with opportunities to explore personal growth and develop a lifelong love of reading.

We recognize that all members of the community are lifelong learners. These facilities are widely available to all the people of Lyndon providing a wide array of learning and teaching opportunities.

Other communities have successfully expanded the local library's use as a welcome center and information technology access point for travelers. Lyndon should consider utilizing the library for this dual purpose in order to receive additional funds for the library and provide better amenities for area tourism.

## **ISSUES & CONCERNS**

- There is a need for continued outreach to the community in order to increase and strengthen parent and community involvement in schools. Community service and outreach programs in schools would build a greater sense of "School as Center of the Community." Community outreach programs provide enrichment for all students and all members of the community.
- Day Care supply is too close to demand. If some of the facilities should close, this would greatly affect the availability of daycare.
- There is a lack of available day care for infants in town.
- A large percentage of Lyndon Town School's additional space is being utilized for alternative classroom layouts to better accommodate children with special needs.
- Education funding is a major concern for the Town, from federal, state and local levels. The costs of educating children continue to climb and Lyndon needs to maintain a diversified tax base in order to offset these costs.
- While the Town will receive benefits from LSC's future plans, the increased student population may be a challenge for the Town, especially in the local rental market.
- The public and private school facilities may not be used to their full potential. Sports programs and other organizations fight for space at popular facilities that are considered more accessible while other facilities remain empty and unused.

## **STRATEGIES**

1. With the 2<sup>nd</sup> Safe Schools/Healthy Students Grant, continue to support the development of comfortable and confidential community meeting and resource rooms at LTS and CNSU. This will support the involvement of parents and community members in school settings.
2. Continue to support access to quality preschool programs as well as improved collaboration and support among childcare providers and other early educators. These efforts may improve transitions for all preschool children in their various settings to Kindergarten at the Lyndon Town School.
3. Continue to support increased access to needed resources such as mental health services, preschool programming and infant care.
4. The Cobleigh Library provides continuous programs and opportunities for all members of the community. We recognize the value of the library and the Bookmobile and encourage their continued support from the community to help with its strong and continuous growth.
5. Lyndon should work with the college to determine the best housing options for the additional student population, if additional student housing is not realistic on campus.

# SPECIAL POPULATIONS

## GOALS

- Continue to encourage tolerance, acceptance and inclusion of all citizens. Work for the fair and equitable treatment of all irrespective of age, race, ethnicity, culture, interests, gender or sexual orientation (cohesion through diversity).
- Continue to work to ensure accessibility to essential services and programs for all of Lyndon's citizens.
- Support a high quality of life and independent living for Lyndon's older adults, persons living in poverty, English language learners, and others who require special services or consideration.
- Help find ways for persons who are older adults or who have disabilities to be able to live in their own homes or with their families for as long as possible.
- Continue to support assisted living and nursing home options for those in need.
- Continue to support emergency/temporary housing and services for the homeless.



Riverside Life Enrichment Center, Route 114

## BACKGROUND

In the best small town tradition, the citizens of Lyndon look after their own; and as our population has grown and become more diverse, our concerns for those in need have also grown and changed. To our concerns for the elderly, persons with disabilities and the working poor, we now add concerns for persons who speak a language other than English (English language learners or ELL) and persons who are homeless.

## PERSONS WHO ARE OLDER ADULTS

Older adults are valuable members of any community. They are generous with their time and money, contributing countless hours to local organizations and projects; they tend to spend their incomes locally; and, they vote.

United States census data for 2010 indicated 890 persons living in Lyndon were 65 or older. This is approximately 14.9% of the total population and represents an increase of less than 1% from the previous Census. National trends show that older Americans comprise a rapidly expanding proportion of our population, so it is reasonable to assume that this percentage of the population will continue to expand.

Lyndon serves its senior citizens well and is considered a great place to live. In the downtown area, seniors have access to affordable housing, meal programs and social activities. The Darling Inn and the Mathewson Building are two of the most popular senior housing facilities in Lyndonville. Both are within walking distance to village amenities, such as the U.S. Post Office, Community National Bank, Union Bank, the Senior Action Center, the Retired Senior Volunteer Program (RSVP) and the Cobleigh Library. Village shops and services also include a pharmacy, beauty parlor, barbershop, and The White Market, a grocery store that provides free deliveries to the homebound.

Lyndon hosts a variety of housing options for seniors (see table below for details). Throughout Town there are currently 107 housing units reserved for seniors, a majority of which are subsidized apartments. The Darling Inn is the largest senior housing complex in the Lyndon Area. It houses 28 apartments in the historic building. The building is handicapped accessible with one-third of the apartments handicapped equipped. The building also houses the Senior Meal Site which provides nutritional meals Monday through Friday for a donation.

<b>Specialty Housing Availability, Lyndon</b>					
<b>Facility</b>	<b>Facility Type</b>	<b># of Apartments/ Beds</b>	<b>Wheelchair Accessible</b>	<b>Subsidized</b>	<b>Waiting List</b>
The Pines Health & Rehabilitation Center	Skilled & Intermediate Nursing Care	60	Yes	NA	Yes
The Pines Health & Rehabilitation Center	Level III Residential Care	10	Yes	NA	Yes
<b>Specialized Care Total</b>		<b>74</b>			
<i>The Darling Inn</i>	Elderly & Disabled Apartments	28	3	Yes	Yes
<i>Lyndon Terrace</i>	Elderly & Disabled Apartments	21	2	Yes	Yes
<i>Mathewson Building</i>	Elderly & Disabled Apartments	6	0	No	Yes
<i>Marigold Apartments</i>	Elderly & Disabled Apartments	6	0	Yes	NA
The Cardinal's Nest	Senior Apartments (62+ yrs.)	12	12	No	Yes
Tute Hill	Senior Housing (55+ yrs.)	34	NA	No	NA
<b>Elderly &amp; Disabled Total</b>		<b>107</b>	<b>17</b>		
<i>Lyndon Meadows</i>	Family Apartments (no age limits)	18	0	Yes	Yes
<i>Lyndon Housing Partnership</i>	Family Apartments (no age limits)	14	0	Yes	Yes
<i>599 Main Street</i>	Family Apartments (no age limits)	6	1	No	Yes
<i>Raymond Street</i>	Family Apartments (no age limits)	3	0	No	Yes
<i>Maple Ridge</i>	Family Trailer Park (no age limits)	41	n/a	No	
<b>Family Apartment Total</b>		<b>82</b>	<b>1</b>		

Source: Italicized information comes Vermont Housing Data Online (<http://www.housingdata.org>), retrieved on: October 31, 2013

From the research into the facilities noted above, it seems most need to maintain a waiting list, especially the most popular housing facilities (all of which are located in the Village). Even for private entities, like the Cardinal's Nest Apartments and the Tute Hill Trailer Park, there is considerable demand.

Representatives from Rural Edge commented that although the waiting list changes frequently, there is still a significant demand level that remains constant.

Beyond the immediate downtown district, Lyndon has the Pines Nursing Home and the Riverside Life Enrichment Center for adult day care. Meals on Wheels are distributed from the Darling Inn and Strong Living classes are scheduled at several sites. The Senior Action Center, located on Church Street in Lyndonville, provides entertainment and social activities for seniors. The facility hosts card games, senior exercise classes, bingo, parties and offers occasional dinners and refreshments. Other resources in town essential to successful aging include Corner Medical, Physical Therapy, Alcoholics Anonymous, a number of churches as well as educational and cultural opportunities at Lyndon Institute and Lyndon State College. A variety of good restaurants add to the Town's and area's attractiveness.

Regionally, Lyndon elders are served by the Northeastern Vermont Regional Hospital including the Norris Cotton Cancer Center, Caledonia Home Health, Hospice, Department of Mental Health and the Department of Vocational Rehabilitation in St. Johnsbury. The Northeast Kingdom Area Agency on Aging provides a wide range of services to all older people and their families including help with legal issues, home-based services, prescription drugs, nutrition, and tax assistance. Mature driving classes, Catamount Arts programs and Osher Life-long Learning lectures enrich the lives of seniors as do such organizations such as veterans' groups, AARP and Vermont Retired Teachers Association.

## PERSONS WITH DISABILITIES

The American Community Survey 5-year Estimates 2008-2012 indicated that Town-wide, 1,078 of our citizens have disabilities, representing 18.3% of the town population. Broken down into age groups, 9% of the population under age 18 has a disability, 16% of the population between the ages of 18 and 64 have a disability, and 45.2% of the population 65 years and older is disabled.

<b>Breakdown of Disabled Populations (numbers)</b>		
<b>Population with a disability</b>	<b>Lyndonville Village</b>	<b>Lyndon Town (includes Village)</b>
Under 18 years	22	118
18 – 64 years	144	610
65+ years	135	350
<b>Total</b>	<b>301</b>	<b>1078</b>
Source: ACS, 2008-2012		

It is safe to say that the Town addresses their needs comprehensively. The Caledonia North Supervisory Union conducts an annual "Child Find" screening that provides an array of educational and support services to children with disabilities and their families as soon as they are identified, often at birth. Services are provided as needed through age twenty-one beginning with the Family,

Infant and Toddler program, Early Essential Education for children aged three to five, and special education services at Lyndon Town School and Lyndon Institute. High school students with disabilities are assisted in making the transition to the world of work and life outside of school. In some instances of intense need, the Town pays schools and services outside of the area to serve students.

<b>Disability Characteristics Percentage of Town Population</b>						
<b>Population group</b>	<b>Hearing</b>	<b>Vision</b>	<b>Cognitive</b>	<b>Ambulatory</b>	<b>Self-care</b>	<b>Independent Living</b>
<b>Under 18</b>	1.2%	7.4%	7.5%	0	0	NA
<b>18-64</b>	4.8%	4.0%	6.7%	7.0%	4.0%	5.4%
<b>65+</b>	18.1%	14.1%	16.5%	29.9%	11.2%	22.6%
Source: ACS, 2008-2012						

Children with disabilities, their families and teachers have access to support services through the Northeastern Vermont Regional Hospital,

Hitchcock Medical Center in West Lebanon, New Hampshire and Fanny Allen Hospital at the University of Vermont. They also have access to specialty services such as those provided by the Stern Center for Language and Learning in Burlington, Vermont.

Adults with disabilities are served by the above-named hospitals as well as the Department of Mental Health, Department of Social Services and Department of Vocational Rehabilitation. The Riverside Life

Enrichment Center provides much needed day services for adults with severe or profound disabilities. In addition, area churches, Lyndon Food Shelf and Rural Community Transportation (RCT) provide ancillary services to this population.

## **ENGLISH LANGUAGE LEARNERS (ELL)**

Persons who speak a language other than English continue to comprise a growing population in Lyndon. Many are here to attend Lyndon Institute or Lyndon State College. Together, the high school and college serve ELL students from many countries

The largest identified ELL population attends Lyndon Institute, which actively recruits boarding students and plan to expand their numbers in the future. There are currently 73 boarding students at LI, fifty-nine who are residents of a variety of foreign countries. A few of the fifty out-of-district “day” students also attend specifically because it provides services for ELL students.

Lyndon State College has served foreign students but does not actively recruit in other countries. The number of ELL students is considerably smaller and fluctuates, so that there is no long term pattern in students’ country of origin. Also, the college doesn’t require ELL students to identify themselves as such. Students either “self identify,” or are referred for academic or social assistance by faculty or staff, because of their English language deficiencies. At present, between 10 and 20 ELL students are attending LSC. Lyndon Town School serves a small, but growing, number of ELL students.

Lyndon’s compact business area makes it easier for ELL students, in particular, to get what they need, as many do not own cars. And the numbers of ELL shoppers has caused some businesses to begin catering to them (i.e. specialty foods). The pedestrian bridge over the Passumpsic River provides easy access to the business area and is heavily used by LI students, including ELL students.

RCT is used by ELL residents, including students. The Burke Mountain Ski area is a real draw for ELL students. And most important, the LSC, LI and Cobleigh libraries provide access to information, including Internet language translation programs.

Lyndon should continue to encourage ELL persons to takes advantage of available education, medical, legal, and social services.

## **PERSONS WHO ARE LIVING IN POVERTY**

The U.S. Census and the Bureau of Labor Statistics provide some general information about the status of the poor and working poor, and by logical extension, their status in the Northeast Kingdom. A Census Dept. formula was used to determine that in 2011, 15.0% of the U.S. population lived at or below the poverty level and approximately 7.0% of all persons in the labor force qualified as “working poor.” Nationally, about 8.0% of women and 6.2% of men in the labor force are classified as working poor.

As the popularity of the Northeast Kingdom continues to grow as a tourist and vacation destination, Lyndon will likely experience an increase in the numbers of poor families and individuals who are drawn to the area by demand for low-skilled and semi-skilled workers in the construction and service industries. It is reasonable to assume that Lyndon’s municipal services, schools, social services and local charities should plan for increased demand for their services including the need for support for food and energy. Families should be encouraged to participate in voluntary programs, such as the Cobleigh Library’s Baby and Toddler sessions, which enhance children’s language development and literacy.

## **PERSONS WHO ARE HOMELESS**

The homeless are the least visible group of all, due in part to their apparent small numbers. Lyndon Institute often coordinates its work with Northeast Kingdom Community Action Youth Services to serve high school students who are without permanent homes. Area churches and social agencies do the best they can to serve individuals and families, but often must extend their efforts beyond the scope of their

“job description.” Overall, the Town has no coordinated and comprehensive approach to dealing with the homeless.

## **ISSUES & CONCERNS**

- The population of Lyndon is growing older, as the numbers of young adults and young families with children is decreasing.
- The Lyndon Municipal Building and CNSU Central Office are not fully accessible.
- More specialty housing is needed.
- Information on existing services that are available is incomplete and scattered.
- Traffic through the center of town presents unique challenges for persons who are elderly or who have disabilities.
- The lack of public transportation and extensive pedestrian walkways or bicycle routes adversely affects special populations.
- More non-English speaking persons are settling in Lyndon. Non-English speakers seek affordable opportunities to learn English.

## **STRATEGIES**

1. Continue to encourage activities that allow the English speaking community to learn more about their ELL neighbors and vice versa.
2. Continue to support the efforts of the Cobleigh Library and other services to expand cultural programs for Lyndon’s special populations.
3. Continue to support an oral history project that collects and preserves memories of the NEK’s elderly.
4. Continue to develop an information/resource clearinghouse as part of a Town website that promotes greater awareness of, and access to, the many services that exist. This information service should include a list of bilingual persons who can work as interpreters.
5. Continue to consider the unique aspects of neighborhoods and the needs of persons who are elderly or who have disabilities when addressing growth, road/street construction and zoning.
6. Continue to make accessible to the extent possible, recreational facilities and parks to all. This includes providing access to persons and families who cannot afford user fees.
7. Continue to consider what actions are necessary to make the Town Municipal Building more handicapped accessible.
8. Continue to work with the Cobleigh Library, Lyndon Institute and Lyndon State College to develop adult basic education opportunities for the small but growing ELL population who are not high school or college students
9. Continue to address the needs and capabilities of the persons who are elderly or who have disabilities when designing changes to traffic patterns through Town (i.e. one way streets, stop signs or “roundabouts”).
10. Continue to include to the extent possible the construction of a safe, handicapped accessible and expanded sidewalk system.
11. Continue to support the construction of safer crosswalks in the center of town.
12. Continue to encourage use of the Rural Community Transportation Program and other forms of public transportation.

13. Continue to encourage development of homes for persons who are older adults, who have a disability or who are homeless, in areas in where necessary services and access to transportation already exist.
14. Continue to work with existing agencies so that special populations have access to a range of affordable housing, including apartments and homes as well as specialty housing (i.e. independent assisted living units, housekeeping units and nursing homes).
15. Continue to consider the needs of persons who are older adults and persons with disabilities when addressing zoning issues such as setbacks, parking, etc.
16. Continue to encourage implementation of a plan to provide adequate and safe temporary shelter and services for those in need.
17. Continue to support access to healthy living programs for older adults and other populations for whom a need exists.
18. Continue to support continuance and expansion of existing programs that provide clothing, sports equipment and household goods to those in need.

# HOUSING

## GOALS

- When planning for new housing options, consider the existing rural small town character of the Village and Town.
- Increase options for housing where Town services, in particular water and waste water services, either exist or can be expanded cost effectively.
- Encourage housing development using practices that preserve open landscape and farms.
- Encourage housing development that conserves energy and natural resources.
- Support appropriate housing for Lyndon residents at all stages of their life span including affordable first homes, “move up” larger homes, apartments, duplexes, condominiums, independent living facilities and special care facilities (e.g. nursing homes).
- Encourage mixed use development of affordable housing and affordable rental properties.



A view along South Street, Lyndonville

## POPULATION

Over the last several decades the Town of Lyndon’s population has grown each decade. Lyndonville’s population, on the other hand, has decreased since 1980. This is attributed to village build-out, a decrease in the average household size and the turnover of housing units to commercial and office space in some areas of the Village.

Another potential factor is the conversion of single family homes into rental units, which often house college students who are not counted in the census data because they do not live here full time.

### POPULATIONS 1960 - 2010

	1960	1970	1980	1990	2000	2010
Lyndon	3,425	3,705	4,924	5,371	5,448	5,981
Lyndonville	na	na	1,401	1,255	1,227	1,207
Caledonia County	22,786	22,789	25,818	27,846	29,702	31,227
Vermont	389,881	444,731	511,466	562,758	608,827	625,741

Source: US Census Bureau

## PRESENT HOUSING STATUS

Lyndon hosts some of the most diverse housing stock in the county. There is a mixture of older Victorian homes, large old historic farm houses with accompanying barns, small New England style capes, village apartment houses with wraparound porches, brick apartment buildings, mobile homes, senior apartments, more modern ranches, and modular homes. Lyndon's housing stock can currently accommodate every stage of life.

### 2010 Housing Stock - Town of Lyndon & Village of Lyndonville

	Town of Lyndon		Village of Lyndonville	
	Owner occupied	Renter occupied	Owner occupied	Renter occupied
<b>Total</b>	<b>1503</b>	<b>707</b>	<b>209</b>	<b>347</b>
Buildings with 1 unit	84.6%	22.6%	84.9%	9.2%
Buildings with 2 units	2.8%	21.1%	8.7%	33.9%
Buildings with 3+ units	2.1%	45.3%	5.5%	56.9%
Mobile homes	10.5%	11.0%	0.9%	0.0%
Boats, RVs, vans or other	0.0%	0.0%	0.0%	0.0%

\*A housing unit is vacant if no one is living in it at the time of enumeration, unless its occupants are only temporarily absent. Units temporarily occupied at the time of enumeration entirely by people who have a usual residence elsewhere are also classified as vacant.  
 Source: Vermont Housing Data: Main Housing Data Profile Online at [www.housingdata.org](http://www.housingdata.org)

In 2010, Lyndon had a total of 2,406 housing units with 196 units identified as vacant (Census 2010). Of the 2,406 units, 68.0% were owner-occupied units and 32% were renter-occupied units. Lyndon traditionally has had a small number of seasonal or second homes and the Census 2010 figures may not have taken into account the student population (approximately 33% of the vacant units were considered "for rent" units in the 2010 Census).

It is also important to note that Lyndon's 2013 grand list shows 286 landed & unlanded mobile homes, which is roughly 12% of the overall housing stock. This is a low figure considering the amount of low-to-moderate income population in

Lyndon. Mobile homes are often the first home for low-to-moderate income populations.

## HOUSING CONDITIONS

On average, Lyndon's housing stock is in relatively good condition. Lyndon saw a considerable housing boom in the 1970's and 80's with over 810 homes built in this timeframe. Because of this, the Town has almost equal amounts of housing units built before 1969 to those built after 1970. Many of the homes that are considered "sub-standard" were renter occupied. This is likely a reflection of the Town's aging rental housing stock, since the median year of construction for renter occupied units is 1939 or earlier.

### Substandard Housing 2007-2011 American Community Survey Estimates

	Lyndon		Lyndonville	
	Owner Occupied	Renter Occupied	Owner Occupied	Renter Occupied
Housing units lacking complete plumbing facilities	0	6	0	0
Housing units lacking complete kitchen facilities	0	8	0	8

Source: VT Housing Data: Directory of Affordable Rental Housing - Special Needs Data Profile Online at [www.housingdata.org](http://www.housingdata.org)

Lyndon also has very few single-family homes that are over 4,000 sq. ft. A majority of Lyndon's homes have 3 bedrooms and most of the new homes are built in the 1,800 to 2,000 sq. ft. range.

## PRICE OF HOMES

A few years ago The Vermont Housing Council and the Vermont Housing Awareness Campaign's annual report began to focus on the upward spiral of housing costs in comparison to the average wages in Vermont. According to *Between a Rock and a Hard Place: Housing and Wages in Vermont 2011 Update*, Vermont's median purchase price for a new home rose to \$195,000 in 2010 (a 65 percent increase since 2000). By contrast, median incomes rose only 24% over the same period. The average Vermonter would need an annual income of \$58,000 as well as \$16,000 in cash (for closing costs and fees) to afford the median purchase price. The median purchase price for a newly constructed home was \$290,000 in 2010, which would require an income of \$86,000 and \$24,000 in down payment and closing costs. Vermont's average Fair Market Rent rate rose as well, to \$990 in 2011 for a modest two-bedroom apartment. A Vermonter would need to earn \$19.03 per hour or \$39,595 annually to afford that rent.

The same affordable housing issue is visible in Lyndon as well. The data presented below shows Lyndon's rising housing values from 1988 to 2012. Since 2008 the average price of single family and mobile homes in Lyndon declined and has since recovered and started to increase. On average, Lyndon has maintained a slightly lower average sale price of single-family homes than Caledonia County.

### Number of Primary Residence Sales and Average Price of Primary Residence Sold (1988-2012)

Year	Lyndon		Caledonia Co.		Vermont	
	# Sold		# Sold		# Sold	
1988	61	\$72,222	306	\$72,505	6,283	\$106,150
1989	52	\$77,678	246	\$80,962	5,201	\$116,045
1990	35	\$83,628	176	\$87,357	4,051	\$117,170
1991	30	\$82,820	152	\$83,099	3,796	\$114,107
1992	25	\$80,262	152	\$81,184	3,916	\$113,201
1993	33	\$78,433	195	\$85,088	5,026	\$113,465
1994	29	\$86,278	199	\$81,198	5,876	\$117,804
1995	34	\$75,756	196	\$81,841	7,403	\$119,747
1996	37	\$83,234	204	\$86,048	4,864	\$120,825
1997	15	\$75,994	138	\$85,739	4,281	\$128,940
1998	24	\$76,592	184	\$99,343	5,629	\$132,340
1999	49	\$158,308	295	\$102,518	6,647	\$135,741
2000	36	\$83,681	269	\$97,049	6,930	\$144,362
2001	44	\$87,970	307	\$104,252	6,799	\$154,131
2002	45	\$105,060	306	\$112,371	6,879	\$167,648
2003	47	\$109,901	315	\$115,007	7,432	\$183,313
2004	50	\$116,225	354	\$119,971	7,905	\$199,818
2005	53	\$137,889	349	\$145,118	7,414	\$231,678
2006	52	\$147,170	282	\$156,649	6,166	\$238,006
2007	31	\$183,318	219	\$178,947	5,157	\$243,866
2008	36	\$145,532	166	\$166,121	3,933	\$238,696
2009	26	\$122,279	175	\$144,439	3,731	\$221,598
2010	29	\$146,019	173	\$151,083	4,120	\$227,733
2011	38	\$140,521	198	\$151,288	4,036	\$229,038
2012	31	\$156,735	190	\$147,607	4,704	\$236,872

Source: Vermont Housing Data Online ([www.housingdata.org](http://www.housingdata.org)), retrieved on: October 30, 2013

Compared to Vermont's average sale price of single-family homes, the price gap between the State and Lyndon seems to be growing. In 1988, there was a \$34,000 difference between single family home sale prices in Lyndon and the rest of the State. In 2012, the difference had increased to \$80,000 difference.

The Vermont Housing Finance Agency also provides a methodology for calculation of the affordability index of each County in the state. This is calculated by determining the home price that is considered affordable for the median household income (housingdata.org's Home mortgage calculator), and comparing that figure to the median price of all primary residences sold during the most recent six-month period. An Affordability Index of 100% means the purchase price of the home estimated to be affordable for the median income household in an area is equal to the median purchase price in that area. Caledonia, Orleans and Essex Counties had Affordability Indexes of 103%,

**Number of Primary Residence Sales and Average Price of Primary Residence Sold (1988-2012)**

**Mobile Homes with Land**

Lyndon		Caledonia Co.		Vermont	
# Sold		# Sold		# Sold	
6	\$35,633	28	\$31,154	255	\$38,205
0	—	19	\$34,837	222	\$42,101
4	\$44,750	28	\$34,694	206	\$43,375
4	\$45,358	18	\$41,741	173	\$46,158
3	\$32,667	17	\$36,747	159	\$45,050
1	\$38,500	14	\$33,457	139	\$46,016
6	\$34,250	21	\$38,468	258	\$42,996
3	\$45,667	20	\$46,368	226	\$46,566
8	\$37,675	17	\$34,977	169	\$42,005
1	\$29,000	13	\$38,808	129	\$46,301
7	\$41,586	17	\$40,344	157	\$51,431
3	\$33,850	21	\$39,105	198	\$46,520
2	\$48,250	22	\$37,975	192	\$46,535
7	\$50,729	24	\$50,480	224	\$55,356
10	\$39,960	29	\$41,276	294	\$58,191
8	\$68,300	32	\$57,479	310	\$64,103
3	\$59,833	33	\$49,582	360	\$73,456
5	\$59,588	32	\$65,057	372	\$77,210
4	\$99,075	26	\$79,476	313	\$96,133
7	\$74,714	21	\$65,321	218	\$87,649
1	\$59,000	4	\$34,000	72	\$89,512
0	—	2	\$93,198	37	\$65,984
2	\$52,000	9	\$75,611	123	\$84,523
2	\$57,500	12	\$65,150	117	\$92,221
2	\$57,500	10	\$70,919	141	\$76,753

Source: Vermont Housing Data Online ([www.housingdata.org](http://www.housingdata.org)), retrieved on: October 30, 2013

120%, and 141% respectively.

**ADDRESSING AFFORDABLE HOUSING**

Affordable housing, as defined in Title 24 V.S.A. Chapter 117, §4303(1) is:

a) housing that is owned by its inhabitants whose gross household incomes does not exceed 80% of the county median income, as defined by the U.S. Department of Housing & Urban Development, and the total annual cost of the housing, including principal, interest, taxes, insurance, and condominium association fees is not more than 30% of the household's gross income; OR,

b) housing that is rented by its inhabitants whose gross annual household income does not exceed 80% of the county median income, as defined by the U.S. Department of Housing & Urban Development, and the total annual cost of the housing; including rent, utilities, and condominium association fees is not more than 30% of the household's gross annual income.

The following calculations detail one method for determining what would be considered "affordable housing" using the State of Vermont's definition for a family of four in Caledonia County.

**TOWN OF LYNDON FY 2013 INCOME LIMITS SUMMARY**

Median Income	FY 2013 Income Limit Category	Household Size							
		1	2	3	4	5	6	7	8
\$54,700	Very low (50% income limits)	\$22,050	\$25,200	\$28,350	<b>\$31,450</b>	\$34,000	\$36,500	\$39,000	\$41,550
	Extremely low (30% income limits)	\$13,200	\$15,100	\$17,000	<b>\$18,850</b>	\$20,400	\$21,900	\$23,400	\$24,900
	Low (80% income limits)	\$35,250	\$40,250	\$45,300	<b>\$50,300</b>	\$54,350	\$58,350	\$62,400	\$66,400

Source: HUD 2013 Income Limits ([www.huduser.org](http://www.huduser.org))

**AFFORDABLE CALCULATION (family of four):**

\$ 50,300.00	Low Income Limit (80%) for a 4 person household (2013)
<u>          /12</u>	
\$ 4,192.00	Monthly Income
<u>      x 30%</u>	
<b>\$ 1,258.00</b>	Amount Available for Monthly Housing Cost (no more than 30%)

Based on the calculations above, affordable rental housing for a family of four in Lyndon should require no more than **\$1,258.00** per month for rent, utilities and any association fees. For affordable homeownership, a Lyndon family of four should spend no more than **\$1,258.00** on their monthly utilities, taxes, insurance and mortgage payment, including principal and interest.

**Hourly Wage Necessary for "Affordable" Rental Unit\* (2013)**

	Lyndon & Lyndonville	Caledonia County	Vermont
0 bedroom unit	\$11.31	\$11.31	\$14.56
1 bedroom unit	\$11.96	\$11.96	\$15.92
2 bedroom unit	\$14.17	\$14.17	\$20.27
3 bedroom unit	\$17.65	\$17.65	\$25.73
4 bedroom unit	\$21.58	\$21.58	\$30.60

The hourly wage necessary in order for a householder to rent "affordably" in Caledonia County is depicted below. For instance, if a householder is renting a one bedroom unit, the unit would meet the state's definition of "affordable" (see above) if the householder earned \$11.96 per hour. The Vermont Minimum Wage is currently set at \$8.60 per hour, creating a substantial gap in affordability for households renting units with multiple bedrooms, for single parent households or for families with one primary earner.

\*Housing affordability is defined according to State Definition 24 V.S.A. Chapter 117 §4303(1)  
 Source: Vermont Housing Data: Main Housing Data Profile (www.housingdata.org)

From the most recent American Community Survey 5-Year averages (2007-2011), it appears that Lyndon has a significant number of renters that do not have "affordable" rents. In calculations on gross rent as a percentage of household income, it appears that 52% of Lyndon's renters spent more than 30% of their income on their housing costs.

Lyndon also has some areas, e.g., Lyn Haven on Calendar Brook Road and Maple Ridge, that provide "starter" homes that allow residents to improve over time, or to live in economically, build equity and "move up." The area is also conducive to the development of mobile/modular home development. Rural Edge also provides a "Revolving Loan Fund" for the rehabilitation of housing and Lyndon residents are the actual and potential recipients of such help.

**HOUSING FOR SPECIALTY POPULATIONS (also discussed in the Special Populations section)**

Lyndon has a variety of specialty housing geared towards the elderly, disabled and low-income populations. Combined, the facilities provide 189 housing units, 60 Nursing Care beds and 14 Level III Residential Care beds. For a breakdown of each facility, see the table below. Roughly 65% of the subsidized housing units available in Lyndon are reserved for either elderly and/or disabled persons.

The most popular housing facilities are located in downtown Lyndonville, within a close walking distance to village amenities. The managing entities for The Darling Inn and the Mathewson Building need to maintain waiting lists because of the popularity of the buildings. However, so do most of the other subsidized housing facilities located throughout the Town and Village. Even for non-subsidized private facilities, like the Cardinal's Nest Apartments and the Tute Hill Trailer Park there is a considerable amount of demand.

On top of the subsidized facilities, tenant-based assistance is also available through Vermont's Local and State Public Housing Authorities via Home Ownership Vouchers, Project-based Vouchers and Tenant-

based Vouchers. According to the HUD Resident Characteristics Report (June 2012 – September 2013) 163 persons were provided housing vouchers in Lyndon.

### Subsidized Housing Voucher Recipients (June 2012 - Sep. 2013)

Type	# Elderly and/or Disabled	Total
Home Ownership Voucher	5	5
Project-based Voucher	8	16
Tenant-based Voucher	117	142
<b>Total</b>	<b>130</b>	<b>163</b>
<b>% Elderly and/or Disabled</b>		<b>79.8%</b>

Source: HUD Resident Characteristics Report (June 1, 2012 through September 30, 2013)

Student housing is also something that Lyndon and Lyndonville need to think about for the future. Lyndon Institute is expanding its residence programs and has built a new dorm to accommodate the new students. Lyndon State College, on the other hand is seeing increasing enrollments, has a lack of dorm facilities on. The new demand for off-campus housing has tightened Lyndonville’s rental market considerably. LSC’s recently completed strategic plan envisions the construction of additional on-campus housing.

### DEVELOPMENT TRENDS

Lyndon, like most towns in the Northeast Kingdom finds that it develops mostly through the subdivision of a large parcel into 1-2 acre building lots, which are then bought and built on by the purchaser. Lyndon has seen very few subdivisions where the homes are built by the same entity subdividing the land. In the late 90’s Lyndon saw a lot of subdivision applications which explains the large amount of single-family building permits issued in the last several years. Today most of the 1-2 acre buildable lots have been purchased and Lyndon is again seeing more subdivision applications.

The entire Village has water service. The Wastewater Treatment plant has been upgraded and is continuing to be upgraded. It is currently operating at considerably less than half of its capacity (225,000 gallons per day with a 750,000 gallon capacity). This means that expansion into new neighborhoods is possible.

### ISSUES & CONCERNS

- Lyndon maintains just under 20% of Caledonia County’s Elderly & Disabled Subsidized Housing Units, approximately 102 units. However, compared to just the number of persons over 65 years of age (890, according to the 2010 Census), this amount of subsidized housing can only accommodate 11.5% of this population. Is this adequate for a growing aging population?
- A majority (65%) of the Subsidized Housing Units in Lyndon are only available for persons meeting Elderly or Disabled Criteria. This is good for the elderly or disabled, but not good for those that do not meet either criteria.
- Physical Disabilities are the largest disability type according to the 2000 Census. When compared to the number of physically disabled residents in Lyndon and Lyndonville, only 3.6% of the disabled population can currently be accommodated in specially retrofitted subsidized units. We do not have adequate income figures to substantiate the actual need for this type of housing.
- State Act 250 requirements and local bylaws do not necessarily coincide in land use regulations.
- On-site parking for rental housing in the Village is limited. This poses problems for the Village to provide enough public parking and for residents who can’t park on the street in the winter months.

## **STRATEGIES**

1. Revise the zoning bylaws to allow for more compact development in specified areas of Town (e.g. smaller lot size, multiple family dwellings, shared open space), especially where infrastructure is already available or can be easily extended.
2. Encourage development within and near existing residential and commercial areas to promote “walkable” communities.
3. Investigate construction of bike lanes and/or walking paths through and between new and existing neighborhood areas, especially through the Village.
4. Investigate a mechanism whereby developers could utilize smaller tracts of land than normally required near the Village in order to provide affordable housing and in return for the smaller lot size be required to contribute towards the financial expense of expansion of wastewater services to those projects.
5. Work with area land trusts, property owners and developers to encourage preservation of land for neighborhood open space, pocket parks and greenways (where needed).
6. Encourage “infill” in the Village and adjacent Town neighborhoods. These might include allowance for denser populations in housing that mixes small lots and houses with bigger lots and houses; denser populations in apartment and condominium complexes that allows for a mix of smaller and larger units; allowing for less expensive alternatives to roads and walkways in developments (e.g. wider streets with pedestrian walkways instead of requiring sidewalks).
7. Continue to work towards modifying local bylaws to better coordinate with state regulations.
8. Continue to support energy efficiency in renovations and new construction by guiding people through the requirements of State Residential Energy Building Standards, and promoting the resources provided by the State to builders.

## RECREATION

### GOALS

- Support recreation opportunities to meet present and future demands.
- Encourage maintenance and upgrading of recreational facilities, keeping ahead of health and safety issues.
- Maximize the impact of the rich variety of independently run recreational programs through coordination of times and locations.
- Continue promoting and expanding Lyndon as a walking community in areas such as, but not limited to, College Road, Steven's Loop, and Broad Street areas.
- Serve our current and projected demographics with an appropriate mix of recreational opportunities.
- Improve communications about and marketing of recreational opportunities.



Bandstand Park, Lyndonville

Lyndon is blessed with an impressive array of recreational activities and programs and many dedicated volunteers who provide leadership for these activities, particularly sports for children. Volunteers maintain the VAST network of snowmobile trails, assist with programs in Powers Park, assist with productions of the Vermont Children's Theater, operate the Lyndon Outing Club and play in the Lyndonville Military Band.

### PARKS & FACILITIES

Between the Town and Village there are six parks, several sports fields, seven gymnasiums, an ice arena, an outdoor swimming pool, skateboard park, a town forest, and a winter recreation area. The following table lists the major public and private spaces and the facilities located at each.

**PUBLIC SPACES****FACILITIES**

Powers Park	Outdoor swimming pool, lawn area, playground equipment, pavilion, outdoor basketball court, and tennis court.
Mattocks Park	Lawn area with playground equipment
Bandstand Park	Lawn area with trees for shade, benches, fountain, and gazebo.
Veterans Park	Lawn area with benches and Veterans Memorial.
(South & Center) Park	Lawn area with benches.
Lyndon Town Forest	Forest area
Shonyo Park	Winter recreation area for downhill skiing and snowboarding, which includes a rope tow, T-bar, a skateboard park, youth baseball field, outdoor volley ball court and occasionally an outdoor ice rink.
Lyndon Town School	Lawn area with playground equipment, outdoor basketball court, youth baseball field, soccer field, and gymnasium.
Lyndon Institute	Outdoor all weather track, football field, soccer fields/ultimate frisbee field, field hockey field, softball field, baseball field, practice football field, hiking trails and walking paths, & two gymnasiums.
Fisher Field	Softball field, baseball field and youth baseball field with bleachers and concessions.
Lyndon State College	Hiking and biking trails, Frisbee-golf course, sports fields, pool, skateboard park, tennis courts, racquetball courts, and two gymnasiums.
Norrie Park	Landscaped lawn area with a bench.

The Town facilities also include the Fenton Chester Arena, an indoor ice rink which provides indoor public ice skating, figure skating and ice hockey programs. Fenton Chester Arena is a regionally significant facility, in that its use extends to clubs that encompass all of Caledonia County, the Northeast Kingdom and Littleton, New Hampshire. The Arena also provides instructional skate programs and serves as the ice arena for Lyndon State College, St. Johnsbury Academy and Lyndon Institute.

The Fenton Chester Ice Arena is an underutilized facility, which in the past has been used to hold such events as the Home Show, a model train expo, a gun show, yard sales, and concerts. More recently the facility has been infrequently used in the “off season”. The building itself is in very good condition. In recent years many upgrades have taken place at the ice arena including new energy efficient lighting, a fresh coat of paint, energy efficient insulation, new bleachers, new flooring in the locker rooms. The most recent improvement was the addition of de-humidifiers which have removed moisture from the building and led to a better sheet of ice and less condensation/frost on the plexi-glass.

Most of the Town’s recreation facilities are in good condition, with the exception of some facilities at Powers Park. Powers Park hosts a tennis court, pool, baby’s pool, bath house, basketball half-court and pavilion. New playground equipment was recently added to the park which was made possible through donations and grant monies. The park also provides a number of summer programs including, swimming lessons, sports lessons and a children’s free lunch program. The Village Improvement Society maintains Powers Park and has identified a number of improvements that need to be made to the facilities. These include major repairs and changes to the pool and pool pump, as well as replacing worn-out items in the bath house. The pavilion floor and basketball court have been repaired and repainted respectively. Besides some major facility repairs, the Village Improvement Society has a problem with vandalism and some of the facilities continually require repairs due to this issue. The Society is now working to improve supervision at the park and to change the layout of some facilities to eliminate misuse.

Shonyo Park is home to Lyndon Outing Club and is the oldest all-volunteer community ski slope in the nation. It offers programs for youth and adults as snow conditions permit. Supporting services for the Club such as snack bar, lift operation, maintenance, and ski patrol are provided by local volunteers. In

addition to skiing, Shonyo Park provides a skateboard park and youth baseball field that are both used three seasons a year.

The Lyndon Town Forest is an underutilized local amenity at present. The forest is located off Severance Hill Road behind private property and requires passage along a right-of-way to get to it (See Town Plan Base Map). Unfortunately, it has no signage or trails, leaving residents to guess where it is.

## **SPORTS PROGRAMS & ACTIVITIES**

Many organized sports programs are available to youth in this area including, but not limited to, baseball, figure skating, basketball, football, hockey, skiing, soccer, softball, dance, tennis, and swimming. Most involve competitions arranged according to age of participant, however some are recreational only.

In addition to these more formally organized activities, the faculty, staff and students of Lyndon State College, Lyndon Institute and Lyndon Town School assist in various projects, programs and activities. We are fortunate that some residents generously allow recreational activities on their private land. Burke Mountain provides reduced price skiing to Lyndon Town School students in grades 3, 4 and 5, while the St. Johnsbury Country Club offers free golfing to the Lyndon Institute golf team and a low-cost summer youth program.

A majority of the sports programs and activities are run by non-profit volunteer organizations independent of the Town, while a few are organized by the area schools. While extremely popular, many of these programs experience a lack of volunteers, a lack of funding, and scheduling conflicts.

## **PATHS & TRAILS**

Local paths and trails provide movement, interaction, and a connection to the environment. The Path Around Lyndon (PAL) group which was originally composed of individuals with an interest in a common walking path has now expanded to include an organization of over 30 member agencies, businesses and individuals who support the development of safe pathways in Lyndon.

The main PAL route is called the Little Stevens Loop, which follows Center Street, Stevens Loop Road, and Main Street. Longer variations of this route include Memorial Drive and Back Center Road (See Lyndon Base Map). The Little Stevens Loop is relatively safe for pedestrians and bicyclists, as there is a mixture of sidewalks and large roadway shoulders. PAL is working on improving safety and design of Big and Little Stevens Loops with the proposed development of raised sidewalks, especially along Memorial Drive and Back Center Road. Sections of Memorial Drive and Back Center Road have no shoulders and no sidewalks, plus the numerous curb cuts along Broad Street create safety issues with the ingress and egress of cars.

PAL's phased plan for improving Lyndon's pathways also includes continuing to develop a river walk trail along the Passumpsic River; extending sidewalks up College Road to Lyndon State College; and connecting existing pathways to the college's walking trails, Lyndon Institute's walking trails, the Kingdom Trails network to the north (Burke) and the Three Rivers Trail network to the South (St. Johnsbury). PAL has been working with the Vermont Agency of Transportation and other granting entities to complete these tasks. Lyndon has added two accesses to the Passumpsic River for non-motorized water recreation at the Lily Pond Bridge and near the White Market Plaza.

Lyndon also hosts other major trail networks that provide for significant recreational tourism, such as the VAST network, Northeast Kingdom Cycling routes and the Kingdom Trails network. Kingdom Trails is an internationally acclaimed outdoor recreation network, with off-road mountain bike trails in Lyndon, Burke, and surrounding towns. The trails attract over 30,000 users annually and have a network of 20 trails in Lyndon. Future long range plans for Kingdom Trails includes expanding the trail network in Lyndon and improving connections to Lyndonville. Kingdom Trails also connects to Lyndon's on-road cycling routes as depicted on the Northeast Kingdom Cycling Map. All together there are approximately seven different

on-road cycling routes that come through Lyndon and utilize VT Route 114, U.S. Route 5, Red Village Road, Elliott Road, York Street, Stark Road, South Wheelock Road, VT Route 122 and Darling Hill Road.

## **ISSUES & CONCERNS**

- Viability of several sports programs is being questioned due to lack of volunteers. For example, the Lyndon Outing Club is being held together by a small group of people. Often youth sports programs rely on the same cadre of volunteers.
- Teens who do not participate in organized sports and the elderly are two groups who may be underserved.
- Some programs are costly and some families cannot participate for that reason.
- Lyndon's gyms, though numerous for a town this size, are overbooked for student use during fall, winter and spring. Non-student access to these facilities is difficult.
- The Municipal Center gym floor is old and may need to be replaced soon.
- The Powers Park Pool will need an overhaul in the next few years.
- Currently Lyndon has very limited shooting facilities, with the exception of the Coon & Cat Club which hosts occasional skeet shooting, there are no gun clubs, or indoor or outdoor shooting ranges.

## **STRATEGIES**

1. Continue to support Path Around Lyndon in their effort to develop safe, adequate and cost effective paths and trails in Lyndon. Efforts should be made to integrate PAL projects into planned highway or roadway funding projects as well.
2. Conduct a recreation audit and gap analysis of Lyndon's many programs. These will help to determine where season and scheduling problems exist and will also help to identify under- and over-served populations.
3. Develop a website that lists the many recreation and sports programs, activities and opportunities as well as important contact persons and relevant information.
4. Maintenance of public recreation facilities should be considered when developing the Municipal Capital Budget Improvement Plan.
5. Consider construction of an outdoor skating rink somewhere in town.
6. Encourage land owners to keep land available to others for hunting and other forms of recreation.
7. With better coordination we could open the facilities for family events, opportunities for inexpensive family fun, as well as opportunities for our elders.

# TRANSPORTATION

## GOALS

- Continue to encourage development of “rail friendly” businesses along the rail spur that the State owns between East Street and Church Street.
- Work to reduce traffic hazards and congestion through Lyndon.
- Provide for adequate parking in town.
- Improve pedestrian and bicyclist safety.
- Support air and train services appropriate to Lyndon’s development needs.



Millers Run Covered Bridge, Lyndon Center

## ROAD NETWORK

Lyndon hosts a significant regional interconnection of state routes, a U.S. Highway and Interstate 91. It is this hub of transportation routes and networks that bring people into Lyndon from all directions. Interstate 91, a north-south highway, has two exits in town and provides connections to Massachusetts, New Hampshire, and Canada. U.S. Route 5, also a north-south route, runs directly through downtown Lyndonville and is the main truck route through town (trucks between 80,000-99,000 lbs. are allowed on the interstate with a permit).

### Road Classification Breakdown (mi.)

Class	Town	Village	Total
State Hwy	14.033	0.463	14.496
Class 1	0.689	1.337	2.026
Class 2	16.43	0	16.43
Class 3	62.61	5.25	67.86
Class 4	8.81	0	8.81
<b>Total</b>	<b>102.572</b>	<b>7.05</b>	<b>109.622</b>

Source: Lyndon Official Highway Map, AOT, 2012

VT Route 114, VT Route 122, U.S. Route 5 and Red Village Road provide Lyndon with direct connections to all its surrounding towns. Because of these main roads, Lyndon has evolved into a regional center for more isolated towns in northern Caledonia County and Essex County.

The Town and the Village together have over 109 miles of roads. The Town receives

partial state funding to assist in the maintenance of Class 1, Class 2, and Class 3 roads. Although Class 1 town highways are essentially extensions of state highways, town portions are maintained by the municipality in which they are located. Class 2 town highways are identified as the most important highways that fall under local jurisdiction. In Lyndon these include Darling Hill Road, Red Village Road, Calendar Brook Road, Back Center Road, College Road, Severance Hill Road, Center Street, Lower Campus Drive, Lily Pond Road, and S. Wheelock Road (see Town Base map). A majority of the remaining roads are classified as Class 3 roads. Generally unpaved, Class 3 roads include all other roads the Town actively maintains. Class 4 roads receive little to no maintenance, as these roads are retained mostly as seasonal trails or private accesses to residences.

Lyndon’s road network has seen some improvements in the last few years. Two bridges located on Route 114 were replaced by the AOT in 2007, rail crossings were repaved by the Village in 2007, and a traffic light was added to the intersection of Routes 5, 114, and 122 in 2005. Pinehurst (from High St. to Rt. 114) recently underwent a complete reconstruction and repaving. Numerous improvements are still needed however, mostly to the state infrastructure. Broad Street has also been targeted for a major redesign project by VTrans. The state of Vermont will begin improvements to the infrastructure with two major projects in 2014 and 2015. U.S. Route 5, in Lyndon will be re-paved from the St. Johnsbury town line to the Lynburke Motel. In addition, the State will also be paving Center Street from Broad Street to the Miller’s Run Covered Bridge. Many of the other state projects are several years out.

The Town and Village have also completed several projects since 2008. The Tute Hill/Charles Street intersection was redesigned, allowing Charles Street to be restored to a two-way street. The South Wheelock Road was reconstructed from the “square corner” just beyond the McGoff Hill Road until the Cold Hill Road. The Lily Pond Road was reconstructed from the Red Village Road to Horseshoe Lane.

## TRAFFIC FLOW

For certain major routes, traffic has increased in the last 10 years (Broad Street), while other routes have seen steady volumes (VT Route 122). According to 2012 Average Annual Daily Traffic (AADT), US Route 5 (Broad Street segment) is the most heavily traveled road in Lyndon and commonly sees over 13,000 vehicles per day. Other heavily traveled routes include VT Routes 114 and 122.

Road	Segment	AADT
US Rt. 5	Red Village Rd. to Center St.	13,300
VT Rt. 122	US Rt. 5 to Center St.	3,000
VT Rt. 114	US Rt. 5 to Darling Hill Rd.	4,500
VT Rt. 114	Darling Hill Rd. to Brook Rd.	4,100
VT Rt. 114	Brook Rd. to Burke Town Line	3,300
I-91	Exiting from Exit 23	10,500

Source: Agency of Transportation, Policy and Planning Division

Poor traffic circulation is commonly attributed to a number of factors including roadway design, land use, increased thru traffic, access management and road conditions. From public input sessions, Lyndon residents commonly mentioned the need to plan their shopping trips carefully in order to avoid making a left on Broad Street during peak volume hours. In addition,

residents recognized an increase in traffic and at the same time, a lack of driver courtesy.

A majority of the issues mentioned are centered on the Broad Street area during peak volume times. The commercial makeup of the area has a diversity of parking lots, curb cuts, differing shoulder space, varying signage, railroad crossings and utility infrastructure. With the addition of pedestrians, bicyclists and truck traffic, consistent traffic flow is difficult. Many of the issues of Broad Street may be improved with a design that will improve visibility along the roadway. Some of these improvements may include:

- Continue to consolidate the ingress and egress points of several businesses or parking lots, especially where there isn’t safe sight distance. Encourage designation of turning lanes at ingress and egress points. .
- Consider moving utility infrastructure underground or to the rear of the property when upgrades, replacement or new development allows, as it will enhance visibility.

- Adding a center left-hand turning lane to improve traffic flow as described in VTrans Broad Street Project #STP 0113(57)SC.
- Developing clear visual edges of the roadway, such as curbs, green strips, or planters. Planters and green strips also provide a safety barrier for pedestrians and bicyclists.
- Continue to maintain setbacks consistent to surrounding buildings for new development or building additions.

Other problem areas for Lyndon and Lyndonville's transportation flow, as mentioned in the *Burke Mountain Area Transportation Infrastructure Study*, include the delays at the intersection of Red Village Road and Route 5; the delays at the intersection of Routes 5, 114 and 122; the general circulation of traffic in downtown Lyndonville (Main Street, Depot Street, Broad Street, Center Street), and poor or very poor pavement conditions on Route 114, 5, 122.

## **PUBLIC PARKING**

Lyndonville currently has a lack of public parking. The current public parking set-up accommodates approximately 160 cars along Main Street, Elm Street, Broad Street, Depot Street and Center Street. Spaces are meant to serve local merchants, their employees and upper floor residents. The current amount of parking may not be meeting these demands and business owners feel the lack of parking may be impacting their business. Parking usage, locations and availability should be studied further.

## **TRUCK TRAFFIC**

Lyndon's major truck routes are U.S. Route 5 and VT Routes 114 and 122. According to the *Burke Mountain Area Transportation Infrastructure Study*, portions of these routes (especially VT Route 114 and Broad Street) have a higher than average truck traffic percentages compared to similar routes around the state. This is most likely due to the traffic funneling that occurs from VT Routes 114 and 122 into U.S. Route 5. Once on U.S. Route 5 most truck traffic either heads south onto Interstate 91 or continues on U.S. 5.

VT Route 114 and U.S. Route 5 are very important trucking routes regionally. VT 114 is the fastest connection for shipping to and from northern Essex County. U.S. 5 is also the primary truck route for north-south goods, as the interstate has weight limits. It is important to keep these routes open for safe and efficient means of travel for the Town and region.

Lyndonville does see a considerable amount of truck traffic, especially since there is only one main truck route through the Village. This can add to Lyndonville's congestion, noise and pollution and complicate the access to on-street parking.

## **PEDESTRIAN & BICYCLE FACILITIES**

Lyndon is already a strong walking and biking community. Many people utilize the sidewalks and common walking loops for exercise, interaction, or to get to a specific place. Strategically placed sidewalks and trails can provide a completely separate transportation network, other than automobiles on roadways. Sidewalks and trails also provide important connections that improve the accessibility for area residents; this is especially true for children and the elderly. For these populations, being able to ride a bike to a park or walk to the drug store makes a big difference.

Currently, most of the pedestrian infrastructure, such as sidewalks and crosswalks, is concentrated in the Village of Lyndonville and Lyndon Center. There are some areas in town where new sidewalks or safe pathways would provide alternative connections back to the villages. For medium-density residential areas such as the neighborhood clusters around the Town School, Lyndon State College, Lyndon Corner, Back Center Road, and Broad Street developing sidewalks and bike safe shoulders makes sense.

## **AIR**

The Caledonia County State Airport is located on Pudding Hill in Lyndon. The airport serves mostly private pilots with small engine planes due to the limitations of the runway. A runway expansion and lighting upgrades may accommodate air freight delivery and private jets, but an expansion is considered unlikely due to the existing residential development surrounding the airport. The state will continue to maintain the airport with regards to airport safety. Recent safety improvements include the installation of automated weather equipment and upgraded runway lighting.

## **RAIL**

Lyndon has a north-south rail line that runs through downtown Lyndonville. Currently two trains per day use this section, one in each direction. Lyndonville's rail yard was closed a number of years ago, but a siding and right-of-way still exist. Rail shipping is anticipated to become more popular in the future and the former yard is expected to be targeted for redevelopment, as this is the last sizable Village property eligible for development (not in the floodplain). Noting the significance an operating rail connection will have on Lyndonville's future, and the historical importance of the railroad, the Planning Commission suggests redevelopment to utilize the railroad in some fashion.

## **PUBLIC TRANSPORTATION**

Rural Community Transport (RCT) is the public transportation provider for the Northeast Kingdom. RCT provides door-to-door and bus route transportation in and around the Lyndon area utilizing buses, cars, taxis, volunteer drivers, van pools and rideshares. Most of the transportation is provided with little or no cost to the passenger due to supplements from public programs or local organizations, such as Medicaid, the Area Agency on Aging and Northeast Kingdom Human Services. RCT's regular public bus route serving Lyndon is called the Jay-Lyn Jumper and currently runs every weekday between 6:30 AM and 5:30 PM. The Jay-Lyn Jumper route begins in downtown St. Johnsbury and runs north along Route 5 to downtown Lyndonville and Lyndon State College. Along Route 5 the bus also stops at major employers and essential services, such as Price Chopper, NVRH, the Green Mountain Mall, NSA, the St. Johnsbury-Lyndon Industrial Park & Health Clinic and the Darling Inn. The bus route is underutilized and can accommodate additional passengers.

## **ISSUES & CONCERNS**

- During morning and evening hours, traffic is congested from Exit 23 off I-91 to the junction of Rte. 5 and Rte. 114. Heavy traffic bound for Lyndon Institute and the college creates congestion between the intersection of Rte. 5 and Back Center Road and the Miller's Run Bridge in Lyndon Center.
- Truck traffic through town is exacerbated by the State's more restrictive weight limits on I-91. (Trucks over 99,000 lbs. are not allowed). This restriction forces many truckers onto Routes 5, 122 and 114 and adds to the congestion, noise and pollution in the downtown area.
- Expansion and improvements at the Caledonia County Airport are limited because it is surrounded by private property,
- As the Burke Mountain Resort grows, Lyndon and Lyndonville can expect to see additional traffic, more congested roadways and increased intersection delays. More traffic will heighten existing problem areas. The Town and Village need to review transportation infrastructure issues as development plans unfold.
- Pedestrian access throughout the community is limited.
- Access to and from businesses along Broad Street is poorly defined.

## STRATEGIES

1. Require that development projects meet Town standards for road construction. Encourage paved roads where common sense dictates paving them.
2. Encourage the development of Lyndon & Lyndonville public parking facilities.
3. Examine existing studies, such as the Burke Mountain Area Transportation Infrastructure Study and the Corridor Management Plan to determine their impact on the Town Plan and Capital Budget Improvement Plan.
4. Encourage use of more mass transportation (e.g. RCT). Support more usable (user friendly) schedules and routes.
5. Pursue support and funding for improvements that are consistent with other aspects of the Town Plan for Route 5 from I-91 to the intersections of Routes 114 and 122.
6. Pursue support and funding for improvements that are consistent with other aspects of the Town Plan for Routes 114 and 122.
7. Continue to support proposed safety improvements to the Caledonia County State Airport.
8. Continue to encourage the development of “rail friendly” businesses along the existing rail spur.
9. Petition the State to reassess the priority of the Broad Street improvements.

# ENERGY: RESOURCES AND CONSERVATION

## GOALS

- Maintain adequate energy at reasonable costs for the Town of Lyndon's residential and commercial customers.
- Continue to encourage residents and businesses to conserve energy resources and manage natural resources responsibly. Use of alternate, sustainable and renewable sources of energy could be considered where feasible.
- Encourage LED to develop a long term energy plan for future growth based on the principles of cost efficiency, sustainability and self sufficiency.



New Sub-Station, Lyndonville Electric Department

Lyndon's energy needs are currently supplied by the Lyndonville Electric Department (LED), a public utility owned by The Village of Lyndonville and several private dealers of fuel oil, propane, coal, gasoline, diesel fuel and wood.

## ELECTRICITY

The Lyndonville Electric Department currently services approximately 250 square miles, with 400 miles of transmission line and 5 substations. LED's service territory includes the Towns of Lyndon and Burke, plus portions of Newark, East Haven, Victory, Kirby, St. Johnsbury, Sheffield and Sutton. LED currently employs 17 people and operates on a \$10 million budget.

As a municipal utility, LED belongs to VPPSA (Vermont Public Power Supply Authority) which represents a network of public utilities when purchasing power on the ISO (Independent System Operator) -New England electricity market. LED currently produces 6% of the electrical needs of its customers. This power is currently being produced by the Great Falls hydro plant. LED's Vail Hydro Plant is in need of

repairs and is non-operational. The balance of the power supply is purchased (known as “market power”) through contracts with different power suppliers, such as Hydro-Quebec and other power-generating utilities. The chart below identifies where LED’s power currently comes from.

<b>LED Existing Energy Sources for 2013</b>		
<b>Source</b>	<b>Type of Fuel</b>	<b>% of Annual Usage</b>
Market Contract/ VPPSA	Gas/Wood/Methane	30.15
Hydro Quebec	Water	38.49
McNeil Wood Chip	Wood Chips	14.60
NYPA	Water	6.69
LED HYDRO	Water	2.88
Small Power/ VEPPI	Water/Wood Chips	6.36
Stonybrook/Wyman	Oil/Gas	.83

Hydro Quebec and market contracts currently provide the largest portion of the power that LED sells. LED’s current system load is 13.468 MW and the average sale price per/kWh is 15.2 cents. When compared to other utilities, LED’s residential rates are in the lower half of all the regional utilities.

Source: Village of Lyndonville Electric Department 2014

## **FUTURE GROWTH & TRENDS**

The largest users in LED’s service territory include the St. Johnsbury-Lyndon Industrial Park and the Burke Mountain Ski Resort. The industrial park currently consumes 3 MW of power and still has several undeveloped parcels in Lyndon. The Burke Mountain Ski Resort currently consumes 3 MW of power and future development plans estimate the power requirement will increase to 10-12 MW when fully built out, a process that may take 10 to 20 years.

To accommodate this additional consumption of power at Burke Mountain, LED has conducted engineering studies on how best to upgrade their current infrastructure. In the end the Burke Mountain Resort will be required to pay for the infrastructure upgrades that directly serve the resort.

To meet the new demand of Burke Mountain and other potential new loads LED and VELCO constructed a new 115 KV VELCO substation behind LED’s existing one on Hill Street. The substation was energized on December 16, 2010, and has a capacity of 30/40/50/56 MVA. This substation also acts as a backup for the 115 KV Higgins Hill substation in St. Johnsbury, providing increased reliability.

LED’s regular growth has easily been met with the purchase of market power, through the New England power grid. However, there is a new trend towards shorter contract terms for the purchase of electricity from other suppliers. This trend is expected to significantly affect the price/kWh for LED customers since the utility has a limited generation capacity and already relies heavily on market contracts. LED’s contract with Vermont Yankee has expired and a new 25 year contract with Hydro Quebec has been negotiated.

In addition to contract changes, Vermont may also see mandatory Renewable Energy Portfolio Standards which could affect the source of power for LED. Costs of in state renewable sources may increase due to the difficulty of selling Renewable Energy Credits to neighboring states.

## **HEATING**

Lyndon’s primary residential heating source is fuel oil. All of the municipally owned buildings, except the Village Maintenance Building and the Municipal Building, are heated with fuel oil. Wood fuel and liquefied natural gas/propane also seem to be strong heating resources in Lyndon.

The historic data shows that fuel oil has consistently been a strong resource, while wood heating usage decreased dramatically from 1990 to 2000 and has rebounded since then. Heating resource figures tend to fluctuate with the price point of their resources. Please note that methodologies for collecting this data

have changed. Census data from 1990 and 2000 were based on static random sampling. American Community Survey, however, now bases its estimates on random samplings over a period of years (in this case, five years). Nevertheless, this data can be used to demonstrate overall trends in heating sources.

### Lyndon Housing Units by Heat Source 1990, 2000, 2011

Heat Source	1990	2000	2011
Heated with Utility Gas	17	28	13
Heated with Bottled/Tank/LP Gas	340	265	342
Heated with Electricity	66	75	113
Heated with Fuel Oil/Kerosene	1,079	1,488	1,550
Heated with Coal/Coke	34	0	21
Heated with Wood	357	171	226
Heated with Solar Energy	0	0	0
Heated with Other Type of Fuel	0	4	4
That are not Heated	6	0	0

Source: U.S. Census Bureau - 1990 & 2000 Census, American Community Survey 5-Year Averages

In the past many homes in Lyndon utilized wood and may be able to do so again, or at least supplement another system to keep their heating costs down. There are some concerns for homes that shift back to wood heating. These include the health and safety effects of utilizing an older inefficient wood stove. Older systems may not meet new safety requirements or lead to house fires and poor air emissions. Newer systems should be encouraged to maximize health and safety, and minimize negative environmental effects.

### COMPARING THE COST OF HEATING FUELS (JAN 2001, 2008, 2013)

Type of Energy	BTU/Unit	Adj. Effic	January 2001		January 2008		January 2013		2001-2013 % Change*
			\$/Unit	\$/MMBtu	\$/Unit	\$/MMBtu	\$/Unit	\$/MMBtu	
Fuel Oil (gallon)	138,200	80%	\$1.49	\$13.54	\$3.30	\$29.85	\$3.83	\$34.60	93%
Kerosene (gallon)	136,600	80%	\$1.70	\$15.60	\$3.71	\$33.90	\$4.24	\$38.84	88%
Propane (gallon)	91,600	80%	\$1.69	\$23.10	\$2.96	\$40.42	\$3.07	\$41.87	37%
Natural Gas (therm)	100,000	80%	\$0.86	\$10.85	\$1.71	\$21.38	\$1.57	\$19.62	37%
Electricity (kWh)	3,412	100%	\$0.14	\$41.39	\$0.13	\$39.01	\$0.15	\$43.46	-21%
Wood (cord - green)	22,000,000	60%	\$125.00	\$9.47	\$180.00	\$13.64	\$190.00	\$14.39	15%
Coal (ton)	24,000,000	60%	\$182.00	\$12.64	\$285.00	\$19.79	n/a	n/a	n/a
Pellets (ton)	16,000,000	80%	\$181.00	\$15.08	\$257.00	\$19.59	\$247.00	\$18.83	-6%

(Source: Vermont Fuel Price Report, Jan. 2001, Jan. 2008, Jan. 2013, Department of Public Service)

\*Adjusted for inflation using Bureau of Labor Statistics CPI Inflation Calculator

## RENEWABLE RESOURCES

Lyndon has an opportunity to support renewable energy development through agricultural crops, low-grade wood harvesting, small-scale wind and solar or geothermal hot water heating systems. Lyndon's local farms have the potential to grow crops commonly used for biofuels, such as corn, rapeseed and soybeans. The development of biodiesel from rapeseed and soybeans is most beneficial, as biodiesel can be a replacement resource for local heating and transportation needs. Some local farms are experimenting with growing switch grass for use as a pellet heating fuel. None of Lyndon's operating farms are large enough to support cow power (at least 500 cows are required to economically fuel a manure-methane digester for electricity production).

As mentioned previously, the demand for wood fuel resources has increased as a less-expensive fuel. New and improved technology is making it feasible to use every part of a tree for heating and electricity generation. Low-grade wood, bole wood and tree limbs which were left to rot on the forest floor in the past

can now be turned into wood-chips for use in school heating systems or wood chip generation plants. The Vermont Department of Forests, Parks and Recreation encourages the harvesting of this low-grade wood for wood chips because its removal supports overall forest health. Lyndon's 3,672 acres of managed forest land may provide a significant source for low-grade wood fuel.

According to the Vermont Environmental Research Associates' Wind Resource Maps, there are no suitable areas for commercial-scale wind development in Lyndon, nor do we think it should be encouraged. Small-scale owner-consumption towers may still be a feasible source of wind energy in town. Currently Lyndon does not have any small-scale wind towers; however a few small scale wind systems have been successfully used as a supplemental electricity resource for farms, homesteads and schools in other areas of the county.

Lyndon currently has residential and commercial properties successfully employing solar technology for hot water and heating needs. Simply capturing passive solar through better building and site design is another method to reduce a building's energy footprint. With the increasing trend of rising heating oil and electric costs, solar power has a strong potential as a supplemental fuel source and should be considered viable as a renewable energy source for Lyndon.

Geothermal technology is also beginning to be employed in Lyndon. Geothermal technology utilizes existing well water temperatures as a pre-heater for household hot water needs. Unfortunately geothermal technology can be expensive to install and operate. Lyndon should encourage builders to consider this technology in the development of new housing.

Lyndon plans to encourage the use of more sustainable energy sources, such as the use of biofuels for the local transportation system, RCT (Rural Community Transportation, Inc.). This initiative will be mutually beneficial, as the local restaurants need to safely discard used cooking oils. Local supports for this endeavor may include the Vermont Sustainable Jobs Fund and the University of Vermont (specifically the UVM Center for Sustainable Agriculture).

## **NET-METERING**

Lyndonville Electric Department may be able to receive a minor amount of new power through the development of local net-metered systems. Net-metering allows customers to reduce their electric bills by generating their own power using small-scale renewable energy systems. Any excess power generated by net-metered systems can be fed back to the utility and the utility pays the customer in the form of credit on their bill.

Currently LED has less than 40 net-metered customers with a total output of approximately 172 KW. This represents 1.4% of LED's system peak. The limit, set by the state, for renewable KW received from net metered systems is 15% of system peak.

Systems that are net-metered (or connected to the grid) must go through the VT Department of Public Service permit process. Non net-metered systems (or owner consumption systems) may be regulated by local zoning bylaws (except for farms which are exempt from local zoning authority). According to the Public Service Board, allowable systems for net-metering include photovoltaic, wind, fuel cell and biogasification facilities that generate 15kW or less. Larger scale farm methane net-metered systems, which can generate up to 150 kW and multiple-farmer grouped systems are also allowed by the Public Service Board.

## **CONSERVATION**

There are an infinite number of ways to conserve our natural resources both locally and globally. Energy efficiency and conservation can significantly reduce the energy being used in local homes and businesses. Through the use of energy saving products, such as insulation, efficient appliances and winter weatherization products, energy consumption can be significantly reduced. In addition,

conservation can include shutting off lights when leaving the room, turning the thermostat down at night and utilizing low-flow water fixtures.

The place to start is with education. Any conservation effort should be approached with an educational aspect in mind and to demonstrate to the general public the personal, financial, local, global and perpetual benefits of such conservation practices.

Efficiency Vermont, the state's energy efficiency utility, offers technical assistance and financial incentives to help Vermonters identify and pay for cost-effective approaches to energy-efficient building design, construction, renovation, equipment, lighting and appliances. They also provide technical and financial assistance to dairy farmers. Efficiency Vermont also provides tactics to reduce monthly energy costs.

New construction and renovation are commonly the optimum times to upgrade facilities with designs that maximize energy usage. Green building design principles provide simple building designs that can both reduce energy needs and maximize usage.

## **ISSUES & CONCERNS**

- The current and future cost of energy resources might have a significant adverse affect on local citizens and businesses.
- The fact that transportation costs are increasing may provide an opportunity for Lyndon businesses to supply more goods and services locally.
- Lyndon should encourage the development of small-scale renewable systems for homes and businesses. Supporting small-scale renewable (off-the-grid) energy development will also require Lyndon to revise its zoning bylaws.
- LED could produce slightly more power if the Vail Hydro Station is repaired, which would be a renewable energy resource.

## **STRATEGIES**

1. New or remodeled construction (whether residential or commercial) should take advantage of energy efficiency standards which have been developed for building materials, insulation, heating/cooling, lighting, etc. When planning construction or building upgrade the Leadership in Energy and Environmental Design (LEED) Green Building Rating System should be incorporated into the construction/upgrade plan. The utilization of all available information on energy efficient construction and efficient energy use also should be encouraged. This information is available from building contractors, LED, Efficiency Vermont, building material dealers, heating/plumbing/cooling contractors, appliance dealers, Act 250 guidelines, etc. Additionally, on-site sustainable energy production such as solar, geothermal, etc. might be considered
2. As part of a management plan, a review of public buildings should be conducted with reference to energy efficiency. Where feasible, modifications should be made to improve energy efficiency and/or conservation. Additionally, a study should be done of time-of-day metering of electricity and initiation of usage if warranted.
3. Encourage area lending institutions to offer energy efficiency incentives in their construction loans.
4. Encourage public and private utilization of alternative, sustainable and renewable forms of energy including (but not limited to) hydro, solar, wood and co-generation. Consider the development of a multi-phase long-term sustainable energy plan.
5. An inspection should be conducted of all public lighting to determine if more efficient fixtures or systems would be feasible.

6. Encourage Lyndon residents to consider the efficiency of an appliance before purchasing one. This is especially important when choosing a home or industrial heating system.
7. Consider changes to infrastructure to allow the Town to provide power to public buildings should the grid go down for an extended period.
8. Continue to encourage conservation. Schools and public buildings should set examples of good conservation practices by using energy efficient building materials; minimizing heat/cooling loss through windows and doors; and shutting down small appliances or computers that do not need to be on all the time. Efficient transportation such as carpooling should also be encouraged.
9. The production, distribution and use of biomass should be encouraged, as well as the implementation and use of cogeneration, solar-electric panels, solar domestic hot water and radiant heat whenever possible. Additionally, if biomass is used it must be produced and used in conjunction with appropriate conservation practices. These practices should especially be encouraged and used in public buildings to help educate the public on the benefits of such practices.
10. Encourage LED to do a cost/benefit analysis for putting the Vail Hydro Station back on line and pursue repairs if shown to be cost effective.
11. Encourage LED to consider incentives for energy conservation at the consumer level.

# PUBLIC FACILITIES AND SERVICES

## GOALS

- Make all public facilities in the Town of Lyndon accessible for all people.
- Create a capital budget plan to support the maintenance of public facilities.
- Improve the service offered to the public by completing needed maintenance to our public buildings.
- The Town needs to promote the use of our recycling programs to reduce the waste stream.
- Evaluate the best way for the Town to comply with Act 148, the Universal Recycling and Composting Law.



Lyndon Public Safety Facility, Lyndonville

## MUNICIPAL BUILDING

The Municipal Building serves the offices of the Town Clerk, Municipal Administrator, Zoning Administrator/Planning Director and the Listers. The Lyndonville Electric Department and the Caledonia North Supervisory Union both lease office space within the building. The youth basketball league, Lyndon Institute cheerleaders, and Strong Living are among the groups that regularly use the gym space in the building. Use of the building /facility can be coordinated through the Town Clerk's Office. There are several maintenance issues with the Municipal building which need to be addressed. These include:

1. The roof drain on the lobby roof between the gym and the main building does not function properly and often results in a back-up of water on the roof.
2. The gym floor has begun to sink in the middle creating an unsafe situation for users of the gym. The cinderblock walls have started to separate in some locations and there is a leak in the southwest corner of the gym roof.
3. Although the Municipal Building meets all requirements of the current ADA regulations, not all rooms are accessible. Services, however, are made available to all.

## **ANIMAL CONTROL FACILITY**

The Animal Control Facility was built in 2006 and extensive use quickly ensued. Often the facility is filled to capacity. Current capacity for the facility is 8 dogs-10 cats. In 2008 hot water was made available to the hoses for washing and cleaning the animals and the facility. Currently the building is in very good condition. The only potential item that may need to be replaced is the hot water tank.

## **PUBLIC SAFETY FACILITY & EMERGENCY SERVICES**

Lyndon's emergency response organizations include the Lyndonville Fire Department, Lyndon Rescue and Lyndonville Police Department. The Fire Department and the Police Department are located in the Public Safety Facility, while Lyndon Rescue is housed at Lyndon State College. The Public Safety Facility was completed in 2005 and is currently providing adequate space for all of the operations and equipment needs of the Fire Department and the Police Department. The building includes office space, vehicle bays, kitchens, a jail cell and conference space. Overall, the facility is in very good condition.

Lyndonville's firefighters are all paid-on-call, which means they are paid an hourly rate by the Town for their time spent on fire department work. These costs are approved for the year at Town Meeting. The Department owns three fire engines, one aerial truck, a rescue truck and a support vehicle. The firefighters have "operations" level training to respond to Hazardous Materials incidents and have completed Incident Command Training and National Incident Management Training. The Fire Department also provides mutual aid to surrounding communities when requested by the Northeast Kingdom Firefighters mutual aid district. EMS services are provided by contract with Lyndon Rescue.

The police department currently employs three officers, who work a total of 136 hours per week, and one police dog. The police department offers coverage for the entire Town. The Vermont State Police offers coverage to the entire Town when the local department is not on duty. A third officer was added as a result of a C.O.P.S. grant, which expired at the end of December 2013. The Town and Village have picked up responsibility for the officer from when the grant expired.

## **VILLAGE GARAGE BUILDING**

The Village Garage serves as the office for the Public Works Supervisor. All of the Village's equipment and trucks are stored at the garage. The Village also stores salt and sand at this location. There are several maintenance issues with the Village Garage which need to be addressed.

1. The garage itself is too small to store all of the Village's equipment, with some of the equipment being stored outside.
2. There is only room on the property for limited expansion of the building.
3. The Village has reached its capacity for storing sand and salt in the structures currently designed for this purpose.
4. The foundation currently has a leak in the back.
5. There is little or no space for the Public Works Supervisor to hold a meeting at this location.

## **TOWN GARAGE BUILDING**

The Town Garage serves as the office for the Town Road Foreman. All of the Town's equipment and trucks are stored at the garage. The Town also stores salt at this location. There are several issues with the Town Garage which need to be addressed.

1. The size of the building and property is inadequate to store the Town's equipment and trucks, as well as its supplies.

2. Location adjacent to the river is a concern regarding the storage of materials on certain parts of the property.
3. The building itself is old and antiquated. It does not provide basic facilities such as a lunch room, floor drains or office space where the foreman can hold a meeting with more than a couple people.

The Town & Village are considering a joint maintenance facility to serve the two municipalities.

## **WASTEWATER TREATMENT PLANT & PUBLIC SEWER SYSTEM**

The wastewater treatment facility has been upgraded over the last two years. The facility is currently processing at about 33% of its capacity, so there is still significant room for growth. The Town is currently upgrading its pump stations to include a wireless communications system. At this time, the public sewer system piping network remains in relatively good condition.

## **PUBLIC WATER SYSTEM & WATER TREATMENT PLANT**

The Village of Lyndonville has adequate water available to serve the needs of the public. Lyndonville's public water system has a significant amount of permitted capacity remaining. Currently Lyndonville's Average Daily Usage is around 369,000 gallons/day, however with a fire event, they have peaked up to 500,000 gallons/day. Lyndonville accommodates a spike in water usage with a considerable amount of storage, approximately 2.5 million gallons. The Water Treatment Plant is operating well and no new upgrades are anticipated at this time. There are a few issues that relate to the water line infrastructure, such as Route 122 which need to be addressed.

## **STORM WATER:**

The Town completed a CSO project in the 1990s and it is in relatively good condition.

In March 2014, the *Passumpsic River Basin Stormwater Infrastructure Mapping Project* report was published. This report identifies projects to mitigate non-point source pollution, including the upgrading of existing detention basins to treat runoff before it enters the receiving waters. The full report includes evaluation of three other Northeast Kingdom towns besides Lyndon.

## **SANITATION AND RECYCLING:**

The Town of Lyndon offers both a monthly curbside recycling service as well as a twice-weekly, self-service recycling program where Lyndon Residents can take their recyclables directly to the Northeast Kingdom Waste Management District located on Church Street across from the Public Safety Building. Users of this service must sort the recyclables themselves. In addition the Town offers curbside trash removal once a week. The Town also provides a Spring and Fall Bulky week event each year through the Waste Management District. There is also an opportunity to dispose of hazardous materials and electronics for free. Disposal of tires require a fee.

## **STRATEGIES:**

1. Develop a Capital Budget Improvement Plan to prioritize major municipal projects and set up long term budgeting to pay for anticipated projects.
2. Look for grant opportunities to upgrade public facilities, especially for ADA accessibility projects.
3. Continue to investigate the need for additional Town owned land for possible future municipal facilities.
4. Study the effectiveness of the existing stormwater system. If it is found to be inefficient, an upgrade should be considered.

5. The Town should seek grant monies to install an elevator in the Municipal Building to improve the situation for persons with disabilities.
6. The Town and Village have completed many necessary renovation projects to the municipal building; including the addition of two new wood pellet boilers, a newly renovated conference room, and the re-shingling of the south and west facing roofs. The Town should continue looking into grant opportunities for fixing other necessary projects such as the gym floor, roof, and accessibility issues.
7. Investigate the best alternatives available from various trash haulers, recyclers, and the Northeast Kingdom Waste District.
8. Relocate the Town garage building to a location that is not at risk of damage from flooding or fluvial erosion.
9. The management of stormwater runoff, especially at the point of origin (i.e. new housing construction, etc.) is an issue that should be considered.

# HEALTH AND EMERGENCY SERVICES

## GOALS

- Include information regarding health resources on the Lyndon Town website
- Continue to support the MedQuest Summer program that introduces students to health-related careers and encourage local students to take advantage of it.
- Work in collaboration with NVRH and NCHC to secure funding to support local students seeking primary care medical degrees in exchange for a term of service for the region.
- Encourage establishment of community gardens for residents to encourage the consumption of locally grown produce and to furnish locally grown produce to Senior Meal Site, the food banks, the school lunch programs and a town farmers market.
- Continue to promote safe activities for youth in the Town that encourage wellness and recreation.



Corner Medical, Industrial Parkway

## OVERVIEW

Rural areas of the United States face many challenges in terms of health care. The residents of Lyndon are fortunate to have the level of health services available to them in the area of prevention, treatment, continuous and emergency care.

## PREVENTION

In terms of prevention, Lyndon's strengths can be found in many areas. Children have nutritional assistance through school breakfast and lunch programs and during the summer months at Powers Park. Seniors have access to meals through the Senior Meals Program which provides meals to those who are homebound and also at meal sites. The Department of Health, located in St. Johnsbury, supports eligible Lyndon families with young children with supplemental nutrition through the W.I.C. (Women, Infants and Children) Program, providing important dairy, protein and grains for family members. The local library provides citizens with access to health information through books and the Internet. There are food shelves in the area to help persons in need. Human services programs helps families with early childhood education which includes nutrition, fitness, inoculation and healthy choices. The Riverside Enrichment Center provides senior day care, insuring safety and social interaction. In addition, the area has a strong homecare system. Yearly influenza vaccines are available at local clinics, "at-risk" clinics, and local drug stores. In addition, the area has a strong home care system—Caledonia Home Health Care & Hospice—which offers a variety of services for all age groups. Residents can receive in-home medical care, for

infants to the elderly; hospice and palliative care services; long term care programs to assist with maintaining independence in preferred settings; assistance through Maternal-Child Health programs, such as the Nurse-Family Partnership (NFP) and Children's Integrated Services (CIS) nurses; as well as private duty with services to allow for optimal independence at home.

Caledonia Home Health Care & Hospice has recently been issued a grant by the March of Dimes to support a Vermont Home Health Maternal Child Health (MCH) Oral Health Initiative. With this money, Children's Integrated Services care providers have been providing oral health screening and education for families, encouragement and support for completing appropriate dental care, and will be sharing with providers the evidence-based research on the safety and efficacy of dental care during pregnancy. Dental access is available in town (at least four providers) and in the surrounding area (at least two providers in St. Johnsbury) for patients with Medicaid, and providers can be accessed by residents through the Vermont Dental Society.

Schools in the region are active participants in prevention programs. The health curriculums at Lyndon Town School and Lyndon Institute includes information regarding healthy choices in terms of nutrition, exercise and drug use. Fluoride is made available to LTS students on a weekly basis to strengthen their teeth. L.I. offers students courses to become L.N.A.'s and LSC houses a satellite nursing program for the Vermont Technical College. Healthy and safe activities are available to Lyndon's children in the After School program, which provides safe place for children while teaching them healthy recreational activities and providing healthy afternoon snacks.

Fitness is an excellent means of ensuring continued health. Fitness opportunities are readily available at Lyndon State College, which has a pool, tennis courts, a fitness center, racquetball courts and basketball courts. LI has an all-weather track that provides runners and walkers with a surface designed for low impact. Powers Park offers a pool, as well as tennis and basketball courts and the Green Mountain Mall provides a location for seniors to walk during the winter months. There are many commercial fitness alternatives in town. Organized sports provide Lyndon youth and adults with opportunities to remain physically fit and provide social interaction. Swimming lessons are available to all children in the region during the summer. The community has a strong tradition of walking as can be seen in the year round use of Stevens Loop.

## **HEALTH CARE**

In terms of health care, Lyndon residents are fortunate to have reasonable health care options available to them. Physicians in the area include primary care doctors as well as specialists including Cardiologists, Orthopedists, Urologists, Neurologists, Obstetricians, Gynecologists, Dermatologists and Ophthalmologists. There are a number of general practitioners and physicians specializing in gerontology and pediatrics. Physicians' offices are within a reasonable commute for most residents at Corner Medical, with additional offices in St. Johnsbury. The Concord Health Center offers care on a sliding scale basis for those without health insurance coverage. The Town has several qualified Physical Therapists and chiropractic care practitioners. Dentistry is also available within the Town. RCT is available to provide transportation for the disabled, those with Medicaid, and those without transportation to medical appointments

Health care facilities range from continuous to critical care. Northeastern Vermont Regional Hospital offers a full range of services and is equipped with a large variety of diagnostic equipment. Critical care is available within 75 miles of Lyndon, to the south at Dartmouth Hitchcock Hospital and to the west at University of Vermont Medical Center, both of which are teaching hospitals offering high quality care to the critically ill. Medical helicopter transport is available when weather permits. Dartmouth Hitchcock has located a satellite oncology service and dialysis center in St. Johnsbury to eliminate the need for long commutes to Hanover, significantly reducing the impact of treatment stress on patients. The Pines and St. Johnsbury Health and Rehabilitation Center offer long-term care for those requiring it.

## **MENTAL HEALTH**

Northeast Kingdom Human Services (NEKHS) offers a plethora of mental health services for area adults and children. In addition, Children's Integrated Services offers support to families through family support workers and family and early childhood mental health services. Nursing support is available to assist families with children with chronic mental health or other psychosocial problems, or to mothers facing postpartum depression issues. While NEKHS has mental health care providers on staff, there does not appear to be a clear way of finding other private providers in the area, which could create a burden for seekers of mental health care services and could hinder the utilization of care. Community Health Workers at Community Connections are a resource available to all residents, and they can assist with the provision of needed resources. Some health care organizations, such as Kingdom Internal Medicine, have behavioral health specialists on staff and Corner Medical states on their website to have the capability to care for clients with depression.

## **EMERGENCY**

Lyndon is served by a 911 emergency system. Emergency services include the Lyndon Rescue Squad which has paid professionals and a volunteer squad of EMT's, the Lyndon Volunteer Fire Department, the Lyndonville Police Department and Calex Ambulance Service in St. Johnsbury. The Town has formulated an Emergency Operations Plan, and Rapid Response Plan. An All-Hazards Mitigation Plan is still under development. These documents ensure timely coordinated response efforts and also mitigate natural disasters that affect Lyndon.

In addition, regional emergency operations efforts have now developed a system to identify those who may need special assistance in the event of an emergency. This Special Needs Emergency Response Program works with area agencies, such as Caledonia Home Health Care, Area Agency on Aging, Northeast Kingdom Human Services (NKHS), and Umbrella to check on persons who may need immediate assistance depending on the type of emergency. The service provider information is kept confidential by the agencies until an emergency is declared and the information is requested by the Emergency Response Incident Commander. The service providers will only provide information for persons who have given permission to be included the database and permission forms need to be updated annually.

## **ISSUES & CONCERNS**

While Lyndon has many assets in terms of health care, it also faces challenges in this area.

- Many health care providers are nearing retirement age. There are difficulties in recruiting replacements to fill the needed positions.
- Transportation to access medical treatment or prescriptions can be an issue despite the availability of RCT.
- Mental health care in the region is inadequate. Many individuals suffer from problems with depression and isolation. There are insufficient resources for mental health counseling and treatment; as well as insufficient drug and alcohol abuse programs.
- Social issues such as domestic violence, alcohol and drug abuse exist in every community and Lyndon is no exception.

## **STRATEGIES**

1. Create a plan to work with health care professionals and organizations to determine how the Town can support the recruitment of health care professionals.
2. Support educational programs that promote healthy behaviors and lifestyles.

3. Continue to be an active participant in the All Hazards Mitigation Plan.
4. Support farm to table to ensure access to fresh, locally grown foods.
5. Encourage participation in coordinated efforts to promote and support mental health and other counseling services.
6. Improve pedestrian access to health care and prescription services.

# FLOOD RESILIENCE

## INTRODUCTION

One of the State planning goals is to “encourage flood resilient communities.” Specifically, state statute directs:

(A) New development in identified flood hazard, fluvial erosion, and river corridor protection areas should be avoided. If new development is to be built in such areas, it should not exacerbate flooding and fluvial erosion.

(B) The protection and restoration of floodplains and upland forested areas that attenuate and moderate flooding and fluvial erosion should be encouraged.

(C) Flood emergency preparedness and response planning should be encouraged.

The Town of Lyndon concurs with the goal of flood resilience and the above policies that help achieve this goal.

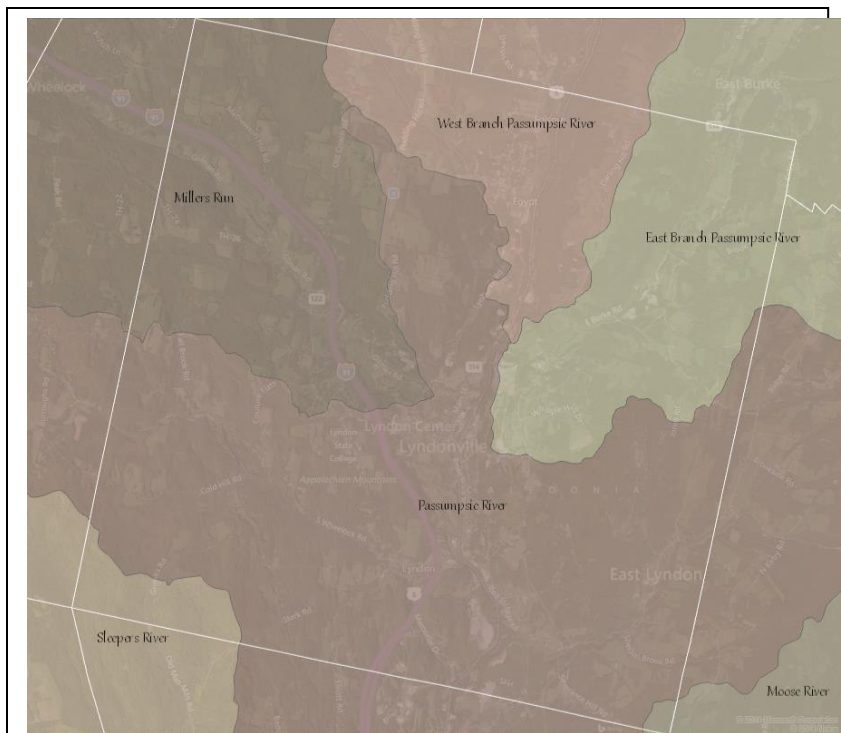
This section of the Town Plan provides information on Lyndon’s geographic setting, floodplains and fluvial erosion hazard areas, a summary of reports and data regarding past flooding events and continuing hazards, existing local regulations pertaining to flood hazards, and proposed future actions and strategies designed to mitigate and/or prevent future flood damage to the community.

## WATERSHED

Lyndon is located in the Passumpsic and Upper Connecticut River Tactical Basin, within the subwatersheds of Millers Run, West Branch Passumpsic River, East Branch Passumpsic River, Passumpsic River and the Sleepers River. Since Lyndonville is located in the flat valley floor adjacent to the Passumpsic River just downstream of where major tributaries empty into the mainstem, this area has been subject to severe flooding on a number of occasions.

## FLOOD HAZARD AND FLUVIAL EROSION HAZARD AREAS

Lyndon’s Flood Insurance Rate Map (FIRM) was prepared by the Federal Emergency Management Agency (FEMA) in 1977 and updated in 1988. The FIRM is based on a hydraulic model used to predict the water surface elevation at various



Source: VTANR *Natural Resources Atlas*

points along the Passumpsic River for various flood events, such as the “100-year flood,” the sections of town that FEMA has determined have a 1% chance of being flooded in any given year. Although map amendments have been made over the years in particular areas based on development projects, there has not been a comprehensive re-mapping of the flood hazard area by FEMA.

Areas within the FEMA-mapped Special Flood Hazard Areas include a large portion of Lyndonville Village, where the main stem of the Passumpsic flows. This includes most of the land between Route 5 on the east, Back Center and Center streets on the west and Route 122 on the north. Areas adjacent to Millers Run, the East and West Branches of the Passumpsic, Wheelock Brook, and Sheldon Brook/Hawkins Brook are also mapped as Special Flood Hazard Areas by FEMA.

Streets in the Town of Lyndon that are susceptible to flooding include portions of: Broad Street, S. Wheelock Road, Red Village Road, Center Street, Calendar Brook Road, Severance Hill Road, Mathewson Hill Road, Back Center Road, Fall Brook Road, Hubbard Hill Road, Vail Drive, Urie Drive, Lily Pond Road, Burrington Bridge Road, Sugar Maple Road, Cold Hill Road, York Street, Elliott Street, Boston Street, Brown Farm Road, New Boston Road, and Sheldon Brook Road.

The images at the right were taken in October 2010 by Heinz Fischer and depict flooding at the Village Sport Shop on Broad Street (top) and the LynBurke Motel on State Route 5 (below).



FEMA Public Assistance to Lyndon from 2002 to Present				
Disaster Declaration Date	Incident Type	Applicant Name	Number of Projects	Federal Share Obligated
7/12/2002	Severe Storm(s)	Lyndon (Town)	10	\$217,043.22
7/12/2002	Severe Storm(s)	Lyndonville (Village)	7	\$16,809.96
5/4/2007	Severe Storm(s)	Lyndon (Town)	1	\$10,340.96
5/4/2007	Severe Storm(s)	Lyndonville Electric Dept.	2	\$80,147.59
7/8/2011	Severe Storm(s)	Lyndon (Town)	13	\$62,785.22
9/1/2011	Hurricane	Lyndon (Town)	10	\$33,962.83

Source: FEMA, Applicant Summary data, downloaded August 4, 2014

Note: "FEMA and the Federal Government cannot vouch for the data or analyses derived from these data after the data have been retrieved from the Agency's website(s) and/or Data.gov."

In addition to the Public Assistance amounts to the municipalities and the electric utility shown in the chart above, the declared disasters in 2011 resulted in additional FEMA funds in excess of \$100,000 being distributed to individuals and households in Lyndon to repair flood damage and cover related expenses that were not covered by insurance.

In 2010, the River Corridor Management Program was created in the State of Vermont to address fluvial erosion hazards and to promote measures that support the natural stability of streams. Under this program, river scientists in the Vermont Agency of Natural Resources are creating "River Corridor" maps that delineate the area adjacent to a river or stream that provides space in which the stream can move in order to maintain equilibrium conditions over the long term. River Corridor mapping targets streams and rivers that have a drainage area of greater than 2 square miles. The minimum recommended setback for streams with a drainage area of less than 2 square miles is 50 feet.

While the FIRM maps identify inundation areas, the River Corridor maps identify fluvial erosion hazard areas. Land located in close proximity to streams and rivers is particularly exposed to damage not only by flash flooding, but by bank failure and stream channel dynamics.

## **UPLAND AND WETLAND AREAS**

The management of upland areas plays a role in flood hazard management. As these areas are cleared of natural vegetation and become developed, stormwater cannot easily infiltrate into the soil; instead, water quickly runs off hard surfaces picking up pollution and carrying it to waterways. Increased flows during storms can destabilize stream channels and adversely affect water quality.

Limiting the extent of disturbance and development of impervious surfaces on upland slopes helps to reduce the amount of stormwater runoff, and helps to avoid overwhelming existing infrastructure, including roadside ditches and culverts. Avoiding steep slopes greater than 20% when clearing and developing land, and requiring that stormwater runoff from new development be managed on-site will also help mitigate future flood hazards. These measures can be achieved through public education and through land use regulations (zoning and subdivision regulations).

Wetlands provide an important floodwater storage function, storing stormwater runoff and flood waters that overflow riverbanks. The wetlands act like a sponge, retaining the water and slowing the rate that floodwaters re-enter the stream channel, which mitigates downstream flooding.

The State of Vermont regulates activities in and adjacent to wetlands in accordance with the Vermont Wetland Rules. State permits are necessary for activities in or within 100 feet of Class I wetlands, and within 50 feet of Class II wetlands. A permit can only be issued if it is determined that the use will have no undue adverse impact on protected functions, unless such impacts are mitigated.

Protection of steep slopes and wetland areas can also be achieved through securing conservation easements in critical locations and by encouraging enrollment of managed forested areas in the current use program.

## **EXISTING PROGRAMS AND REGULATIONS**

Both Lyndon and Lyndonville are members of the National Flood Insurance Program (NFIP), which enables property owners in flood hazard areas to purchase flood insurance.

There are 87 structures in Lyndon Town and 26 structures within Lyndonville Village that are located within the FEMA-mapped Special Flood Hazard Area (see Flood Hazard Summary Report at [http://floodready.vermont.gov/assessment/community\\_reports#Flood Hazard Summary Report](http://floodready.vermont.gov/assessment/community_reports#Flood%20Hazard%20Summary%20Report))

A FEMA repetitive loss report shows that there have been 37 repetitive loss claims in the town of Lyndon, and 8 claims on properties in Lyndon located outside of the FEMA-mapped 100-year flood hazard area.

In July of 2012, a federal law took effect that made significant reforms to the NFIP. The law requires FEMA to eliminate a variety of existing flood insurance subsidies, and flood insurance premium rates on many properties in special flood hazard areas will increase as they will be revised over time to reflect full flood risks. Subsidies will be phased out for non-primary residences, severe repetitive loss properties, business properties, and properties that have incurred flood-related damages where claims payments exceed the fair market value of the property.

FEMA's Community Rating System (CRS) program can benefit communities like Lyndon and Lyndonville with a large number of structures already in the flood hazard zone. The CRS program provides a discount on premiums to flood insurance policy holders in towns that choose to participate. Points are earned for activities such as outreach events, stormwater maintenance, and other actions.

### ***Local Land Use Regulations***

One of the requirements of membership in the NFIP is that the Town administer flood hazard regulations. Flood hazard regulations contained in Article XI of the Town's bylaws regulate development within the special flood hazard areas identified on the Flood Insurance Rate Map (FIRM). While these regulations address the flood hazard areas identified by FEMA, they do not necessarily address fluvial erosion hazard areas associated with the movement of rivers and streams.

Lyndon's land use regulations also allow for Planned Unit Developments, which can be a way to allow more flexible requirements for developments that achieve environmental benefits, such as preservation of open space, and minimization of impervious surfaces.

### ***ERAF***

The Emergency Relief Assistance Fund (ERAF) helps Vermont municipalities repair damaged infrastructure after a presidentially-declared disaster. ERAF funding typically covers half the required 25% non-federal match for approved projects. (FEMA provides 75% of the total project costs).

After October 23, 2014 Towns must adopt four flood hazard mitigation measures in order to maintain level state funding in the event of such a disaster: 1) Flood Hazard Regulations that meet minimum standards for enrollment in the National Flood Insurance Program; 2) the most recent Agency of Transportation Road and Bridge Standards; 3) a Local Emergency Operations Plan (LEOP); and 4) a Local Hazard Mitigation Plan and submit to FEMA for approval.

Lyndon and Lyndonville currently have three of the four measures in place. The communities are the recipient of a grant to fund the preparation of an updated Local Hazard Mitigation Plan.

Local Flood Hazard Regulations that include protection of State River Corridors are afforded a greater share of State matching funds.

## **STUDIES AND REPORTS**

A number of reports provide useful background information on flood hazards in Lyndon and proposed mitigation measures. Studies completed since 2006 include the following:

### ***Passumpsic River Flood Mitigation Study***

This flood mitigation study was prepared by Gomez and Sullivan Engineers for the Town in November 2006. The study recounted previous reports including studies by federal agencies that evaluated the impact of removing the Vail Dam located on the Passumpsic River downstream of Lyndonville Village. Those previous studies, the latest of which was completed by the Army Corps in 2006, concluded that removal of the Vail dam would not reduce future flood damage enough to justify removal, and that ledge in the river bed upstream of the Vail Dam would act as a partial natural barrier even if the Vail Dam were removed.

The Gomez and Sullivan report looked at alternative measures that could be implemented within the Town of Lyndon to mitigate future flood damage, as well as factors occurring in the watershed above Lyndon, specifically along East Branch of the Passumpsic. The study notes that development activities, including the straightening of the river bed and building in the floodplain, have resulted in this branch of the river not having access to its floodplains. This lack of access results in stronger flows and sediment deposition downstream in the Village of Lyndonville. It also increases the likelihood of ice and debris jams in locations in Lyndon, as an incised and straightened channel more efficiently transports debris downstream. While the report did not study development trends upstream on the West Branch or Millers Run, the results would be similar if these tributaries have also been altered resulting in reduced access to their floodplains. The report notes that “if the East Branch were connected to its floodplain, it would increase the storage of flood flows and thus reduce flows in Lyndon.”

The study presented flood mitigation options and a cost-benefit analysis to identify the best options. Although dredging (removal of sediment from the river channel) was one of the alternative’s considered, the engineering report noted that any potential benefits would be temporary if unstable conditions upstream (as were noted on the East Branch) continued. The report recommended that before considering dredging as an option, an analysis be done to determine if this would cause channel instability in the project area and downstream.

The study recommended as the most feasible measures the replacement of the dry culverts under Main Street (State Route 5) with a dry bridge (which alternative was studied by VTrans); development of River Corridor protection plans for the East Branch, West Branch, Millers Run, and Passumpsic Rivers; and limits on further encroachment in the floodplain with conservation easements and/or acquisition.

### ***East Branch Passumpsic River Corridor Plan***

This plan was completed in January 2009 by the Caledonia County Natural Resource Conservation District, and included results of stream geomorphic assessment of reaches of the East Branch Passumpsic in Burke and Lyndon. Chapter 6 of this report contains recommendations for projects intended to reduce river corridor erosion and other flood related hazards. The plan notes that floodwater storage on the Upper Passumpsic tributaries is critical to mitigating floods on the Passumpsic River main stem. This report, as well as subsequent River Corridor Plans noted below, can be accessed from this webpage: <https://anrnode.anr.state.vt.us/SGA/finalReports.aspx>.

### ***Miller’s Run River Corridor Plan***

This Plan was completed in October 2009 by the Caledonia County Natural Resources Conservation District for reaches of the Millers Run that flow through Lyndon, Wheelock and Sheffield. Millers Run joins the Passumpsic mainstem in the Village of Lyndonville, downstream of the East Branch Passumpsic. Chapter 6 of this document contains recommendations for projects that will help attenuate

floodwaters, reducing flooding downstream. Proposed projects are also intended to improve water quality and enhance habitat. Recommendations include obtaining easements to expand floodplain access, replacing undersized bridges, and updating land use regulations to prevent filling in the floodplain.

#### ***West Branch Passumpsic River and Calendar Brook Corridor Plan***

This Plan was completed in August 2010 by Fitzgerald Environmental Associates under contract to the Caledonia County Natural Resources Conservation District. The document presents a River Corridor Plan for seven reaches of the West Branch Passumpsic and five reaches of Calendar Brook. Watershed-level approaches to flood mitigation include the river corridor (or fluvial erosion hazard area) zoning in the towns of Sutton, Lyndon and Burke to encourage long-term channel stability. Site-level projects are also proposed, including buffer plantings and bridge replacement. The corridor protection areas identified in the report focus on undeveloped areas in the river corridor that are a high priority because of their potential to reduce downstream flooding in developed areas, including Lyndonville Village. Potential projects are listed and prioritized in Chapter 5 of this report, on Table 5.2.

#### ***Town of Lyndon and Lyndonville All Hazards Pre-Disaster Mitigation Plan (draft)***

This plan was prepared in **2010**, and although it was not adopted or approved by FEMA, it provides information on flood hazards throughout town. The plan notes particular areas that are of strategic importance and pose particular hazards when inundated. One of these locations is U.S. 5 where it intersects with Routes 114 and 122 which, when inundated, prevents emergency responders from accessing flood hazard areas to the north and south. The Millers Run Covered Bridge area and sections of Broad Street were also identified as particular conflict areas. This plan mentions the proposed mitigation projects identified in the earlier Gomez and Sullivan study, and also notes the Town's consideration of removing and relocating the town garage, which is located adjacent to the Passumpsic River. Sections of the Lyndon Town Plan on "Health and Emergency Services" and "Public Facilities" include information on emergency service providers in Town, and recommendations regarding the moving of the Town garage operations away from the river. The plan was started by the Town and NVDA. In 2014 a grant was received to the completion of this document with the continued assistance of NVDA.

#### ***Alternatives Analysis for North Main Street Overflow Culverts*** (memo to Caledonia County Natural Resources Conservation District)

This brief report dated **April 6, 2012** was prepared by Milone & MacBroom, Inc. The analysis explored alternatives to the existing overflow culverts located under Route 5 that may decrease flooding. The study concluded that the flooding in the location of the Main Street Bridge was a function of both reduced local conveyance of floodwaters and backwatering from the Vail Dam. This analysis was based on the hydraulic model prepared by VTrans in 2004. The study noted the need for updated data.

#### ***Passumpsic and Upper Connecticut River Tactical Basin Plan***

The Watershed Management Division of the Vermont Agency of Natural Resources released this report in the summer of **2014**, which provides direction on actions to take to improve water quality and flood resilience within the tactical basin. One of the top ten actions identified in this plan is to improve river corridor and floodplain protections for the Passumpsic, Millers Run, East and West Branch Passumpsic River in town zoning bylaws to allow these streams to develop new floodplains and reduce flood damage. The report can be viewed here: [http://www.vtwaterquality.org/mapp/docs/mapp\\_b15-16tbp.pdf](http://www.vtwaterquality.org/mapp/docs/mapp_b15-16tbp.pdf)

The ***Lower Passumpsic River Tributaries River Corridor Plan***, released **May 1, 2014**, presents the results of Phase 2 Stream Geomorphic assessments, and provides a basis for understanding the overall causes of channel instability and habitat degradation along the river corridors in the watershed. The Plan provides in Table 13 a preliminary list of site-specific projects designed to mitigate flood and erosion

hazards. These include the resizing of bridges and culverts to adequately accommodate the floodprone width, the removal of berms that restrict access of the river to the floodplain, bank stabilization measures, removal of obstructions from the stream channel that trap large amounts of sediment and debris, and buffer plantings. Many of the recommended site-specific projects are located in Lyndon, and a number identify the municipality as a key potential partner.

### ***Passumpsic River Basin Stormwater Infrastructure Mapping Project***

This **March 2014** report primarily addresses projects to mitigate non-point source pollution, including the upgrading of existing detention basins to treat runoff before it enters the receiving waters. The maps of stormwater infrastructure, including the location of storm drains and catch basins, are also useful in assisting with emergency preparedness during events of heavy rains or spring snowmelt. The full report, which includes mapping and evaluation of three other Northeast Kingdom communities besides Lyndon, can be accessed at [http://www.vtwaterquality.org/erp/docs/erp\\_Basin\\_15\\_report.pdf](http://www.vtwaterquality.org/erp/docs/erp_Basin_15_report.pdf).

The **Natural Resources Atlas** at <http://anrmaps.vermont.gov/websites/anra/> contains a “road erosion risk” layer, which ranks the erosion risk of unpaved Class 2, 3 and 4 Town roads as well as driveways longer than 1,000 feet. Features considered in assessing risk include undersized culverts, elevation and slopes, soil types, and proximity to rivers, lakes, and wetlands. The result is an identification of road segments that have a “low”, “moderate” or “high” erosion risk. This is a useful tool for communities to identify potential road hazards during storm events. It can also be useful to the local road commissioner and public works supervisor as a starting point in prioritizing road infrastructure maintenance projects (see map in appendix).

## **ISSUES AND CONCERNS**

The risks posed to town residents by flood hazards, the effect of repetitive flood damage claims on flood insurance rates for residents, and the cumulative costs to the municipality for repair of flood damaged infrastructure, are significant issues for the town. Areas of particular concern, some of which have been identified in the reports and data sets noted above, include:

- The LynBurke/Sanborn Bridge, which poses a potential hazard for ice and debris jams
- The Bridge at the intersection of Lily Pond Road and Route 114, where the channel of the East Branch Passumpsic is constrained and ice jams and flooding has occurred.
- The area of the Millers Run near the covered bridge at the “park and ride” where the river is disconnected from its floodplain
- The poor design and ineffectiveness to transport flood flows of the series of culverts under Route 5 south of the intersection with Route 114.
- Flooding at the major intersection of Route 5, Route 114 and Route 122, which hampers emergency response during disasters
- The need to move the Town garage to a location outside of the fluvial erosion hazard area (river corridor).

## **STRATEGIES**

- Increase awareness of the most effective means of reducing future flood damage, as identified in past engineering studies and Stream Geomorphic Assessments, by holding local public outreach meetings.
  1. Coordinate with the Caledonia County Conservation District in hosting flood mitigation workshops for residential landowners and business owners, to educate them on measures to reduce flood risk and damage.

- Protect areas identified and designated as flood plains, river corridors and land adjacent to streams:
  1. Amend the Town's Flood Hazard Regulations to include restriction of development within River Corridors, as mapped by the Vermont Agency of Natural Resources.
  2. Amend the Town's zoning and subdivision regulations to include standards that minimize the amount of clearing and impervious coverage created from development, and that avoids impacts to wetlands and steep slopes (slopes greater than 20%).
  3. Engage in a working partnership with upstream towns that addresses control of stormwater runoff and actions that will allow rivers and streams to regain access to floodplains.
  4. Encourage property owners seeking to develop their land to utilize the existing Planned Unit Development provisions in the Town's bylaws as a means to minimize impervious coverage and clearing.
- Mitigate risks to public safety, critical infrastructure, historic structures, and municipal investments.
  1. Evaluate the recommendations contained in the 2006 Gomez and Sullivan Flood Mitigation Study, the 2012 Milone & MacBroom analysis, and the recommendations and site-specific projects listed in the River Corridor Plans to formulate a plan of action.
  2. Update the Local Hazard Mitigation Plan.
  3. Educate residents on high risk areas in Town so that they can be prepared in a flood event.
  4. Seek funding to implement hazard mitigation projects identified in plans, including the items of special concern noted above.

## **SURROUNDING COMMUNITIES & THE REGION**

Lyndon is bordered by six towns: these are the Towns of Burke, St. Johnsbury, Kirby, Sutton, Wheelock and Danville. Lyndon is the second largest town in Caledonia County and serves as a regional center for many of its surrounding communities. For these communities, Lyndon hosts many essential services, such as medical centers, supermarkets, drug stores, auto parts and service, hardware stores, child care, restaurants and motels. In addition, the residents of surrounding towns feel a connection to Lyndon through the youth sports programs, Lyndon Institute, emergency response assistance, employment in town or local events like the Caledonia County Fair.

There are several projects in the works and on the horizon in the Northeast Kingdom that could spur increased development in towns throughout the region. Directly adjacent to Lyndon on the northeast, the construction of a new, 116-unit hotel and conference center is planned for Burke Mountain, which will draw increased numbers of tourists and will employ a staff of 200. It is expected that this major expansion will spur increased commercial development catering to tourists and workers, and will place increased demands on services and facilities, including police/emergency services and child care facilities.

Other major projects further north that can indirectly affect growth in Lyndon are the addition of a 15,000 square-foot indoor recreation center at the Jay Peak ski resort, a proposed biotechnology facility in Newport that is projected to create between 300 and 500 jobs, many of them high-wage; and an \$8.8 million expansion to the Newport State Airport. Associated with the airport expansion are plans to construct a 50,000 square-foot airplane assembly plant at the airport, which is also expected to bring a number of skilled jobs to the region.

Increased demand for housing to serve both local residents with increased spending power and vacation homeowners is expected in the region, including Lyndon. In order to gain the maximum economic and community benefit to the Lyndon community and retain economically valuable agricultural and forestry lands, compact development should be incentivized in areas close to existing commercial and residential areas (but outside flood hazard areas). Expansion of public sewer and water facilities may be necessary to absorb new housing and commercial growth.

### **COMPATIBLE LAND USE & DEVELOPMENT**

For the adjacent communities, Lyndon anticipates maintaining its role as a regional service center. Some citizens believe that it is important to maintain compatible development patterns along bordering areas of town. A good example of this would include supporting land use and development policies that will maintain the agricultural base in the northwestern section of town, which extends into the Town of Wheelock. By supporting agriculture in this area, the towns would maintain a rather large agricultural corridor in the county, limit the fragmentation of prime agricultural lands and provide for more viable farms. The same strategy can be implemented in the bordering forest areas, such as near Danville, South Wheelock and Kirby. Striving for a balance between rural residential development and silviculture is important to many in these communities and may affect the regional economy.

### **FUNCTIONAL ROADS**

Lyndon also recognizes the need to maintain functional roadways as the primary connections to adjacent communities. Many people rely on roads such as Route 114, Route 122, S. Wheelock Road, US Route 5, Red Village Road, Darling Hill Road and Calendar Brook Road to get to Lyndon for work, shopping or for emergency services. Because of this, Lyndon should encourage development that will not hinder the functionality of these important roads.

## **ST. JOHNSBURY**

St. Johnsbury and Lyndon are defined by the *NVDA 2013 Regional Plan* as a joint “Regional Urban Center” serving the southern portion of the Northeast Kingdom. As such, St. Johnsbury and Lyndon provide the bulk of the regional employment opportunities and are classified as a Labor Market Area. The St. Johnsbury-Lyndon Industrial Park is also shared by each town, in terms of lots, infrastructure and services. The industrial park’s electric service is provided by the Village of Lyndonville, water is provided by St. Johnsbury, and the Town of Lyndon provides sewer service and maintains the roads by contract. Other major facilities located in this Regional Urban Center include the Northeastern Vermont Regional Hospital and Norris Cotton Cancer Center located in St. Johnsbury and the Caledonia County State Airport and National Guard Barracks, which are located in Lyndon.

Because of this joint role, Lyndon and St. Johnsbury need to maintain open communications. The population base and the leadership of these towns have an opportunity to work together to solve regional problems, provide a strong economic base, address affordability issues, and maintain a sense of community. Future growth plans should be coordinated, especially in regards to commercial development and the industrial park. Established areas with infrastructure should be reviewed as a first priority.

## **BURKE**

The Town of Burke, to the north of Lyndon, poses the greatest potential for future development pressure to Lyndon and Lyndonville. Burke Mountain is the center of a proposed major expansion of the Burke Mountain Ski Resort into a four season resort. Lyndon hosts a majority of the commercial development that would support second home owners and tourists. However neither Lyndon nor Burke has an excessive amount of unoccupied affordable housing which is seen as a necessity for new workers coming to the area. St. Johnsbury may be able to absorb some of the growth that will be attracted to the area, but Lyndon is expected to receive the most growth pressure due to it’s location between I-91 and the Burke Mountain Resort.

Lyndon expects the biggest pressures for new development will be along Route 114. There are many reasons why development along this roadway should be carefully considered. These include the following:

- VT Route 114 is a major route in our area and as such is used by a lot of trucks and commuters. It is also one of only two main roadways that connect northern Essex County with points south. Increased development will create additional curb cuts and frequent turning. Add in additional traffic headed to and from the resort area and the functionality of the roadway may diminish. To address this issue, new development in this area could utilize access management designs that funnel traffic off the main roadway.
- The East Branch of the Passumpsic River and its flood plain are major players in the storage of surface water. Their capacity to hold water is connected to Lyndonville’s stormwater management. The increased occurrence of “100-year” flooding events questions whether or not the current capacity of the floodplain is enough. FEMA also is planning to redefine the floodplain in the next few years. Building up property within and adjacent to the floodplain may worsen downstream flooding. To mitigate this, Lyndon should be concerned about filling in land to bring it out of the flood plain.
- Lyndonville’s public water system is protected by a Ground Water Source Protection Area that encompasses Route 114 and the entire length of the East Branch of the Passumpsic River in Lyndon. Excessive development or certain land uses have the potential to impact the municipal water supply.
- Lyndon’s concerns for development along Route 114 are reciprocal concerns for Burke, as development along this road will affect the quality of life for both communities. In addition, development that may affect stormwater runoff and the capacity of the floodplain in Burke will also affect everything downstream in Lyndon.

# APPENDIX A

## DEFINITIONS OF UNCOMMON TERMS

### Brownfield:

A term used by the Environmental Protection Agency (EPA), and defined by the EPA as “real property, the expansion, redevelopment, or reuse of which may be complicated by the presence or potential presence of a hazardous substance, pollutant, or contaminant.”

Generally these sites can be cleaned-up (or remediated) and redeveloped at two levels: industrial/commercial or residential. The future land use determines the level of remediation that needs to be completed prior to reuse. Remediation may include either the cleaning-up of the site contaminates and/or containing contaminants/limiting human exposure to the contaminants. Remediation costs and methods vary based on the extent of the original contamination and the end use of the site.

### Greenfield development:

A project located on semi-rural property that is undeveloped except for agricultural use, especially one considered as a site for expanding urban development.

### In-fill:

Use of vacant land and property within a built-up area for further construction or development, especially as part of an existing neighborhood.

### Overlay model:

A zoning model that regulates only certain aspects of development in a given area. A good example is a “forestry overlay,” the goal of which is to preserve working forests. This might be accomplished by limiting clear-cutting to the building site, or a certain percentage of the total property. Overlays are placed “on top of” of existing districts. In the forestry example, a town may place a forestry overlay on a portion of a rural residential district to protect important working forests.

### “Spaghetti strips”:

Jargon commonly used to describe a long thin strip of land with an absolute minimum of road frontage, which limits the future use of the back portion of the property.

### “Smart Growth Principles”:

A planning theory that includes the following principles to grow in an orderly manner: Create a Range of Housing Opportunities and Choices; Create Walkable Neighborhoods; Encourage Community and Stakeholder Collaboration; Foster Distinctive, Attractive Communities with a Strong Sense of Place; Make Development Decisions Predictable, Fair and Cost Effective; Mix Land Uses; Preserve Open Space, Farmland, Natural Beauty and Critical Environmental Areas; Provide a Variety of Transportation Choices; Strengthen and Direct Development Towards Existing Communities; and, Take Advantage of Compact Building Design.

### Rural Major Collector:

A road classification determined by the Vermont Agency of Transportation for Federal Highway Administration Aid. A Rural Major Collector generally links larger towns and cities together, links to higher classification routes (such as principle arterials), serves as an important intra-county travel corridor, and collects traffic from other lower service roads.

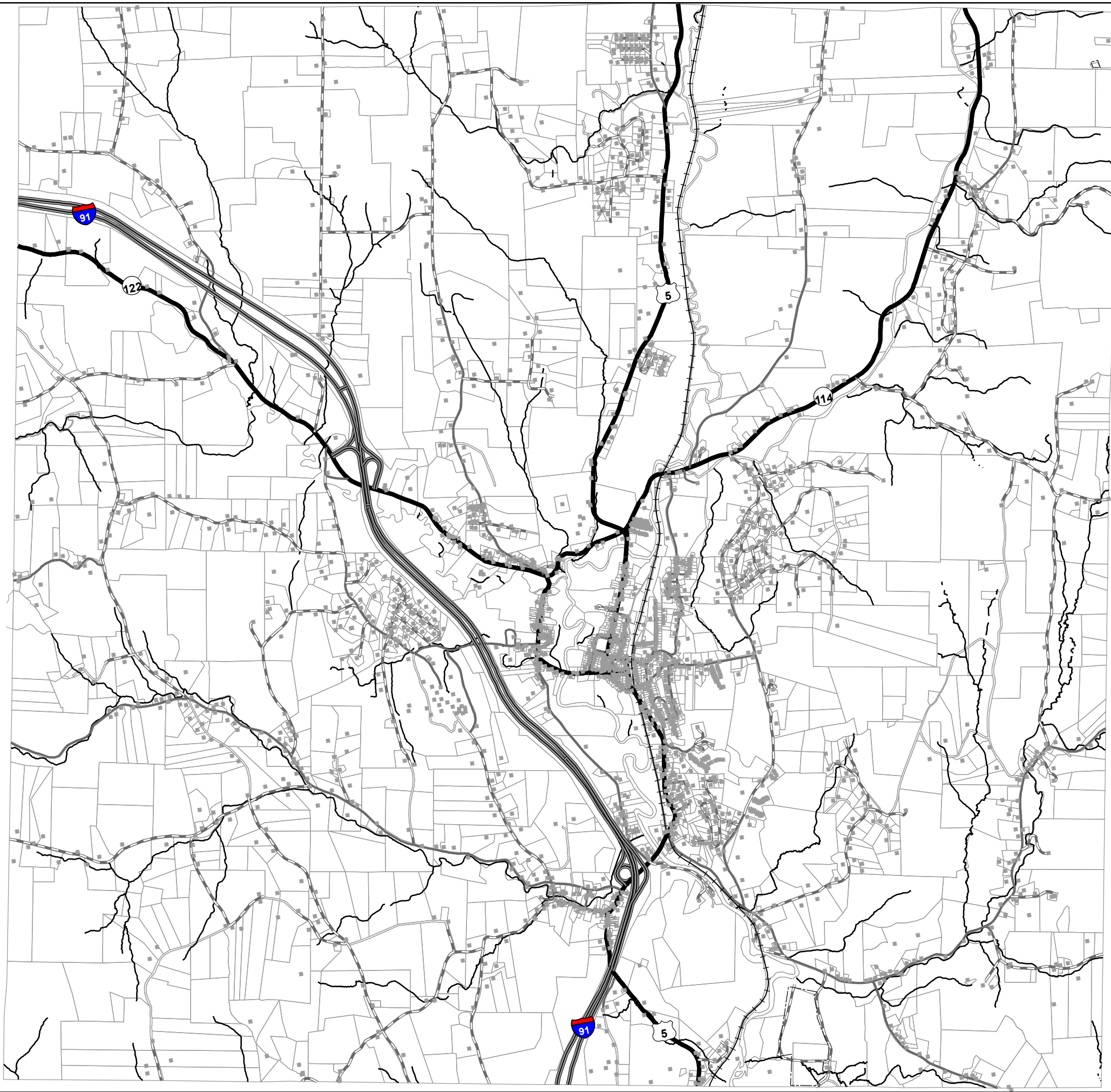
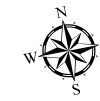
### Mixed-use:








Smart growth principle that allows for a mixture of different land uses within the same zoning district or even the same property.

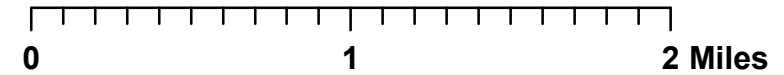
Planned Unit Development:

As defined by V.S.A. Title 24 Chapter 117 §4303 (18). "Planned Unit Development" means one or more lots, tracts, or parcels of land to be developed as a single entity, the plan for which may propose any authorized combination of density or intensity transfers or increases, as well as the mixing of land uses. This plan, as authorized, may deviate from bylaw requirements that are otherwise applicable to the area in which it is located with respect to lot size, bulk, or type of dwelling or building, use, density, intensity, lot coverage, parking, required common open space, or other standards.

# Town of Lyndon, Vermont Base Map

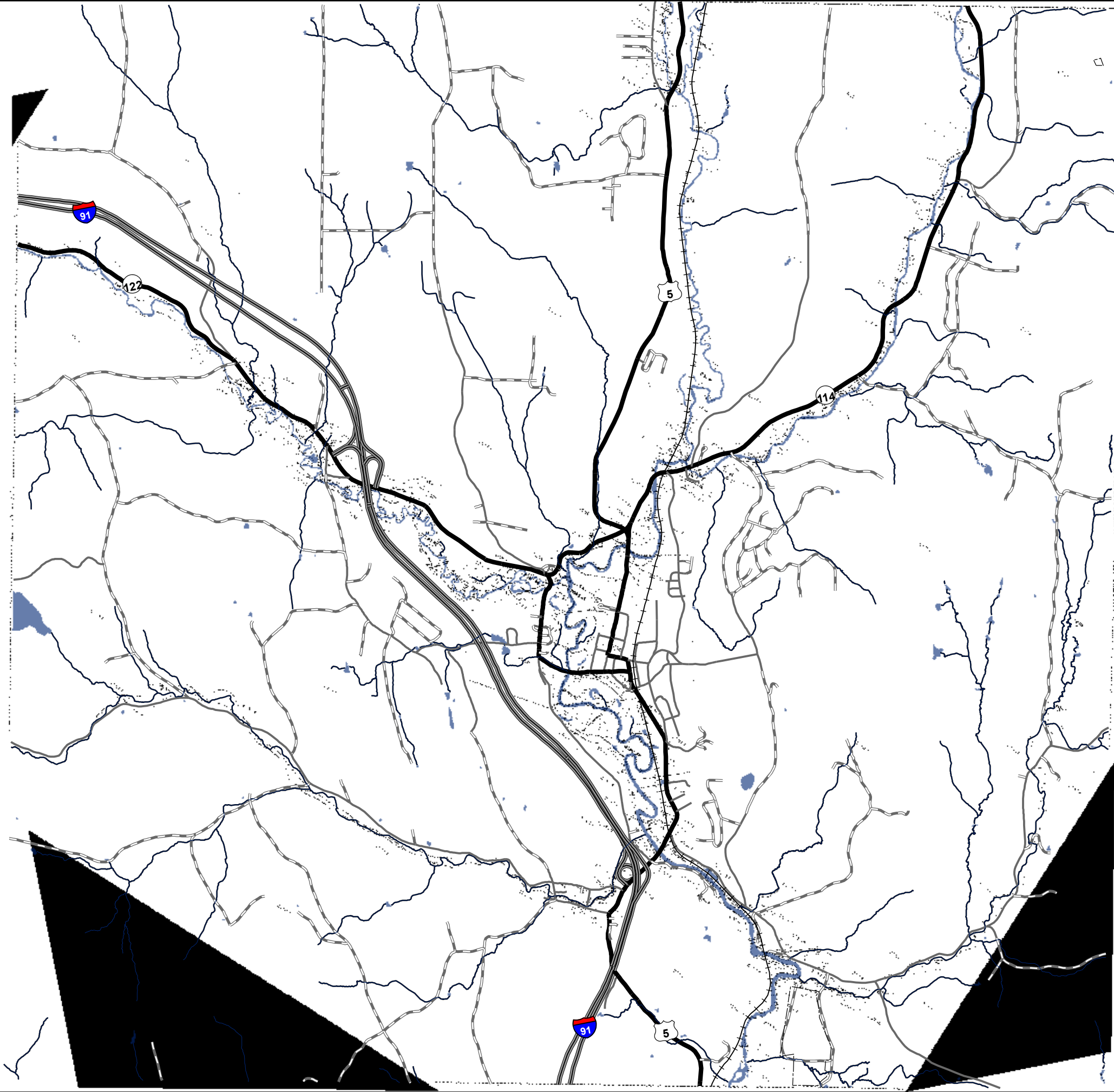
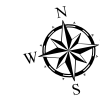


-  Interstate
-  US & State Highway
-  Paved Town Road
-  Unpaved Town Road
-  Railroad Tracks
-  Brooks
-  parcels



Warning- Because this map is developed from various scale sources, there may be some discrepancies between data layers.

# Town of Lyndon, Vermont Flood Hazards Map



**LEGEND**

**SPECIAL FLOOD HAZARD AREAS INUNDATED BY 100-YEAR FLOOD**

- ZONE A** No base flood elevations determined.
- ZONE AE** Base flood elevations determined.
- ZONE AH** Flood depths of 1 to 3 feet (usually areas of ponds); base flood elevations determined.
- ZONE AG** Flood depths of 1 to 3 feet (usually steep flow on sloping terrain); average depth determined. For areas of alluvial fan flooding, velocities also determined.
- ZONE A99** To be protected from 100-year flood by Federal flood protection system under construction; no base elevations determined.
- ZONE V** Coastal flood with velocity hazard (wave action); no base flood elevations determined.
- ZONE VE** Coastal flood with velocity hazard (wave action); base flood elevations determined.

**FLOODWAY AREAS IN ZONE AE**

**OTHER FLOOD AREAS**

- ZONE X** Areas of 500-year flood; areas of 100-year flood with average depths of less than 1 foot or with drainage areas less than 1 square mile; and areas protected by levees from 100-year flood.

**OTHER AREAS**

- ZONE X** Areas determined to be outside 500-year flood plain.
- ZONE D** Areas in which flood hazards are undetermined.

— Flood Boundary  
 - - - Floodway Boundary  
 - - - Zone D Boundary  
 - - - Boundary Dividing Special Flood Hazard Zones, and Boundary Dividing Areas of Different Coastal Base Flood Elevations Within Special Flood Hazard Zones.

— 513 — Base Flood Elevation Line: Elevation in Feet\*  
 (D) — Cross Section Line  
 (EL 987) — Base Flood Elevation in Feet Where Uniform Within Zone\*  
 RM 7.5 — Elevation Reference Mark  
 M1.5 — River Mile

\*Referenced to the National Geodetic Vertical Datum of 1929

**NOTES**

This map is for use in administering the National Flood Insurance Program; it does not necessarily identify all areas subject to flooding, particularly from local drainage sources of small size, or all planimetric features outside special flood hazard areas. The coastal flooding elevations shown may differ significantly from those developed by the National Weather Service for hurricane evacuation planning.

Certain areas not in Special Flood Hazard Areas may be protected by flood control structures.

Boundaries of the floodways were computed at cross sections and interpolated between cross sections. The floodways were based on hydraulic considerations with regard to requirements of the Federal Emergency Management Agency.

Floodway widths in some areas may be too narrow to show to scale. Floodway widths are provided in the Flood Insurance Study Report. Elevation reference marks are described in the Flood Insurance Study Report.

Coastal base flood elevations apply only landward of 0.0 NCVD. Coastal base flood elevations shown on this map include the effects of wave action.

For adjoining map panels see separately printed Map Index.

MAP REPOSITORY  
 Town Clerk's Office, P.O. Box 167, Lyndon, Vermont, 05851 (Maps available for reference only, not for distribution).

INITIAL IDENTIFICATION:  
 JUNE 18, 1980

FLOOD HAZARD BOUNDARY MAP REVISIONS:  
 NONE

FLOOD INSURANCE RATE MAP EFFECTIVE:  
 JUNE 18, 1980

FLOOD INSURANCE RATE MAP REVISIONS:  
 May 17, 1988 — to change base flood elevations, to change special flood hazard areas, to add roads and road names, to reflect updated topographic information.

To determine if flood insurance is available, contact an insurance agent or call the National Flood Insurance Program at (800) 638-6620.

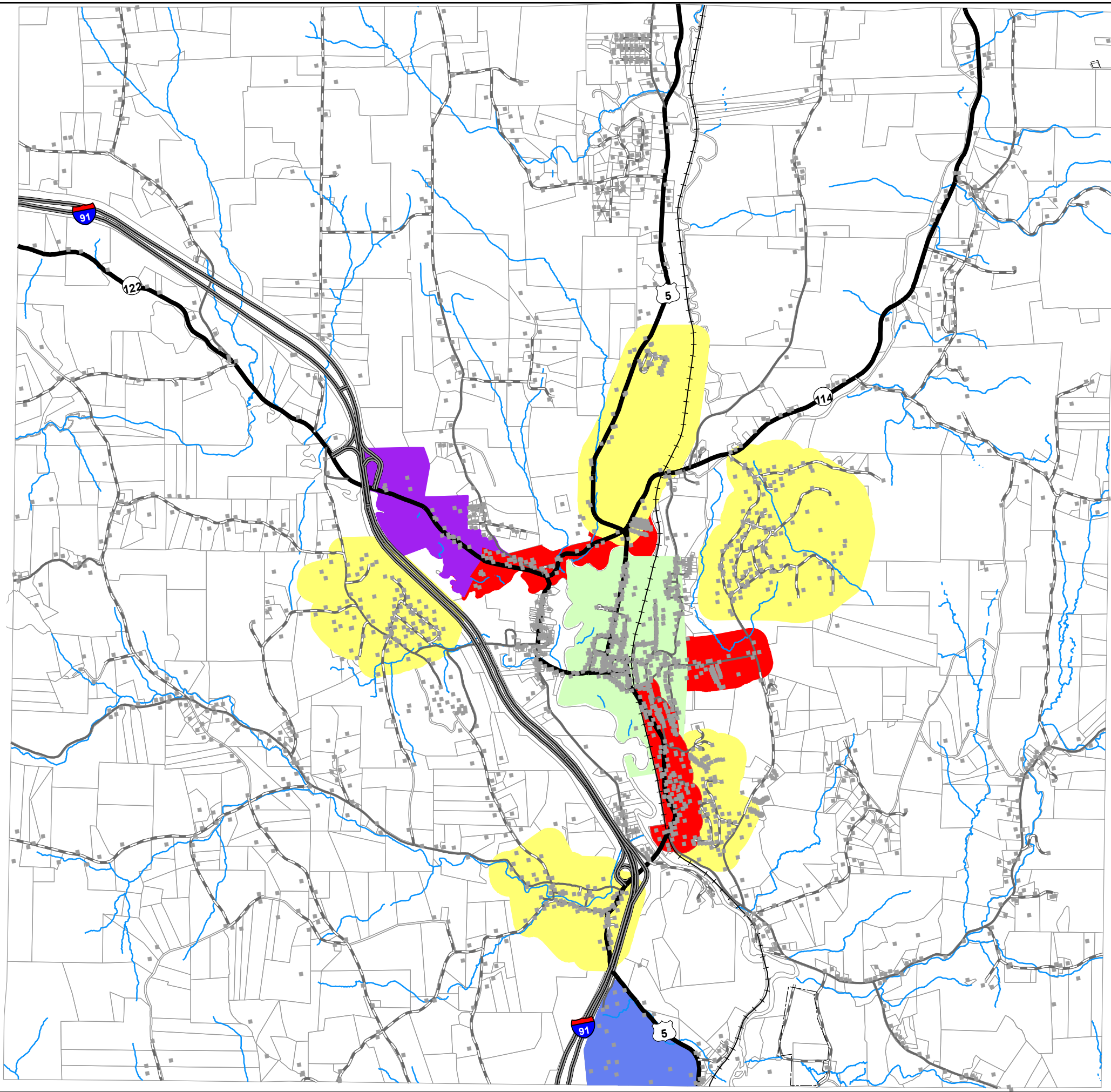
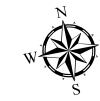
- Streams
- +— Railroad Tracks
- Interstate
- US & State Highway
- Paved Town Road
- Unpaved Town Road
- Streams
- Ponds & Rivers

**Flood information comes from scanned images of FEMA Flood Hazard Maps and geo-referenced for best fit to existing data. The resulting image contains many unavoidable distortions. This map should not be used to make any final decision of permits, loans and/or construction. It is intended for general planning purposes only. Any project should be reviewed by a qualified flood specialist.**

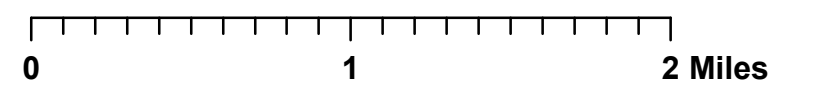
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# Town of Lyndon, Vermont Future Land Use Map

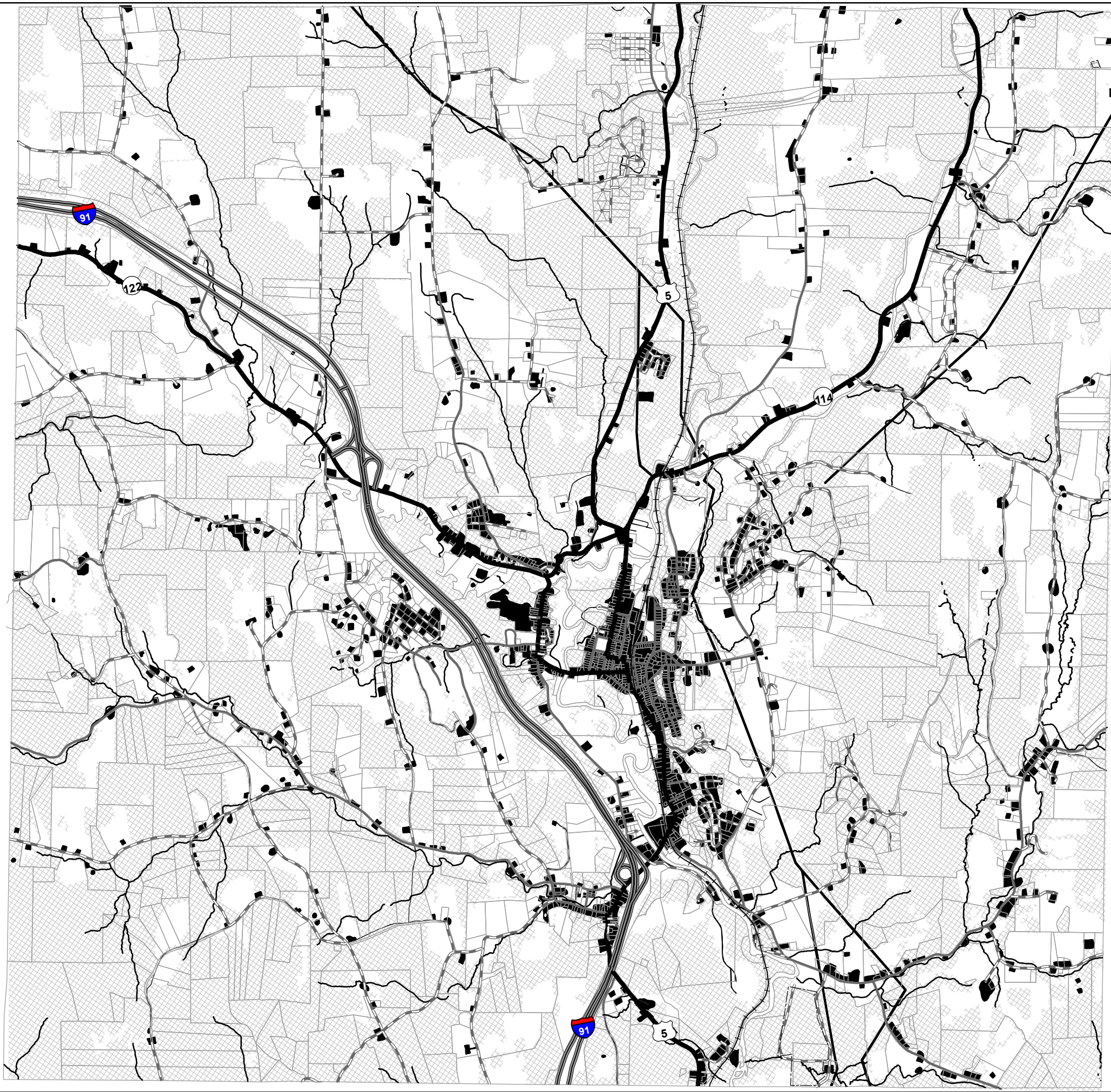
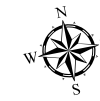


- Interstate
- US & State Highway
- Paved Town Road
- Unpaved Town Road
- Railroad Tracks
- Brooks
- Lakes, Ponds & Rivers
- parcels
- Future Land Use Types**
- Commercial
- Commercial - Industrial
- Industrial
- Village
- High Density Residential
- All Other Areas Are Low Density Residential

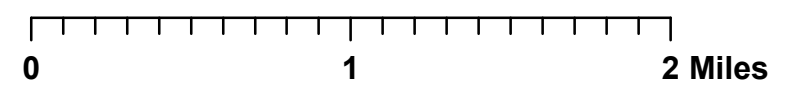


Warning- Because this map is developed from various scale sources, there may be some discrepancies between data layers.

# Town of Lyndon, Vermont Land Cover/Use Map

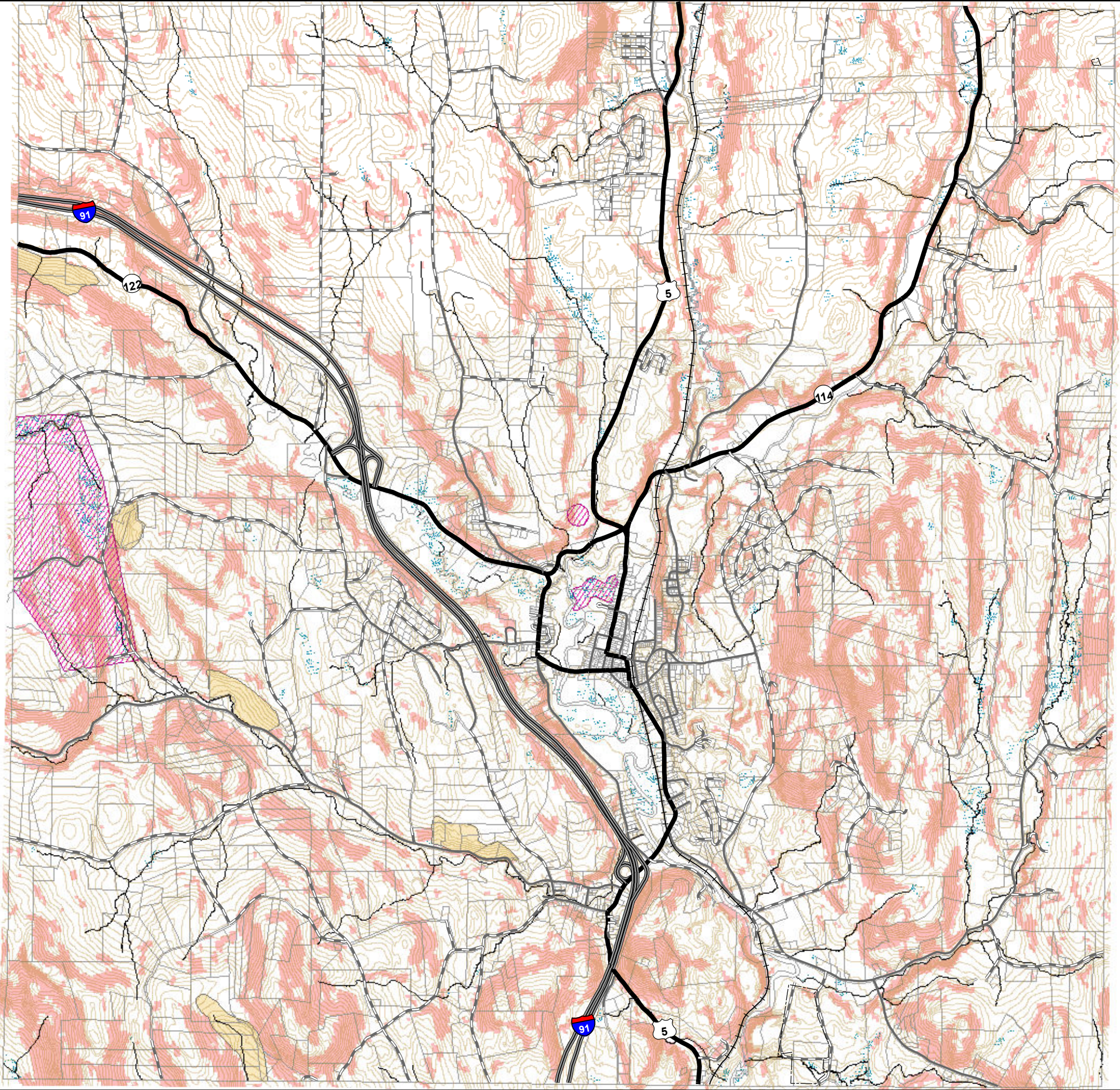


- +--- Railroad Tracks
- ==== Interstate
- ==== US & State Highway
- Paved Town Road
- Unpaved Town Road
- Brooks
- parcels
- Developed Areas
- Open Areas
- ▨ Forested Areas

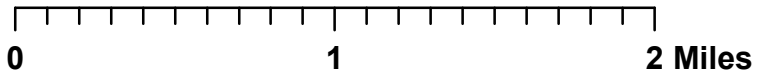


Warning- Because this map is developed from various scale sources, there may be some discrepancies between data layers.

# Town of Lyndon, Vermont Natural Resource Constraints Map



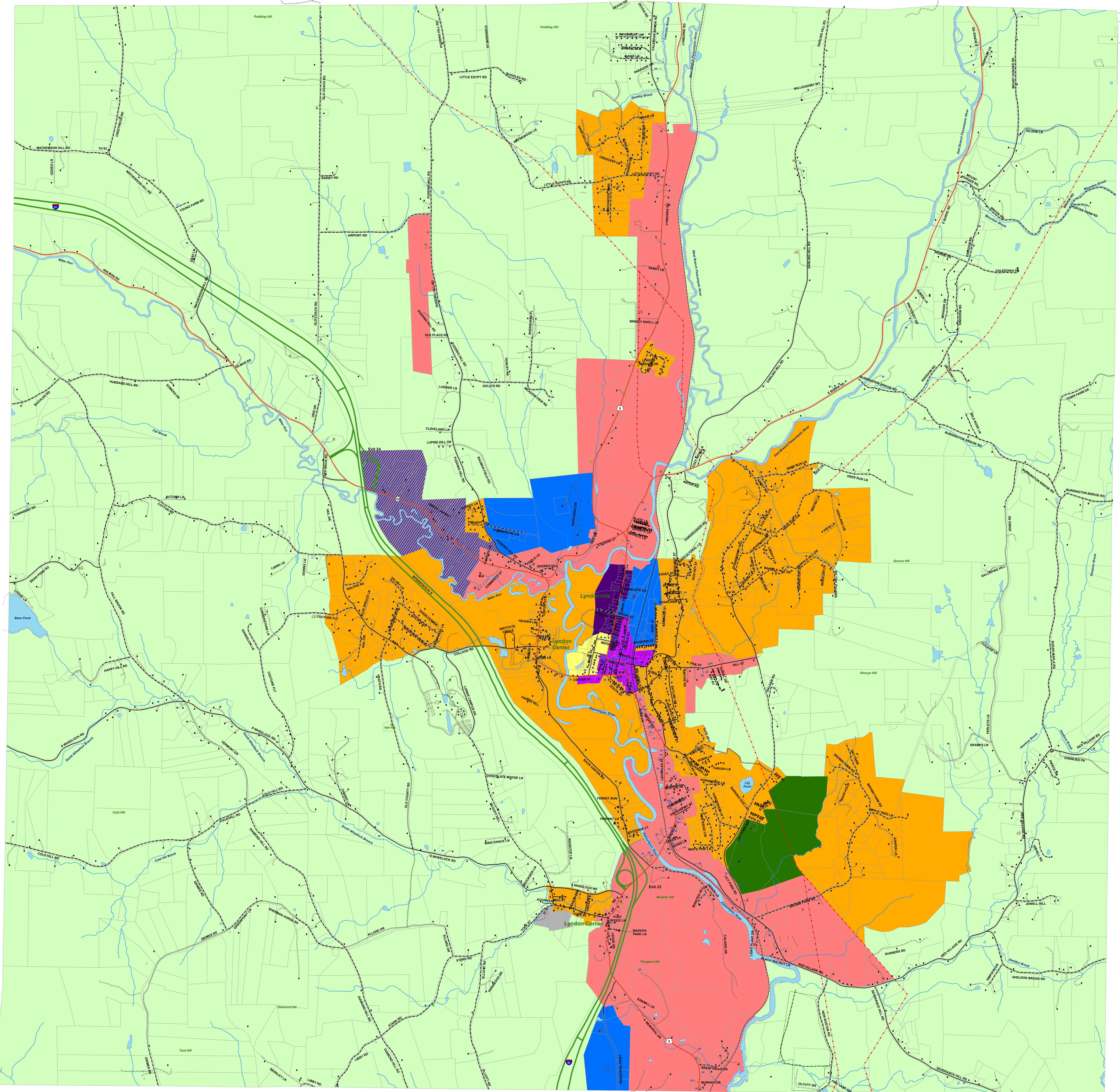
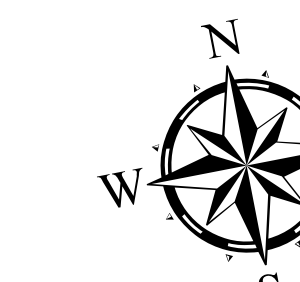
- Interstate
- US & State Highway
- Paved Town Road
- Unpaved Town Road
- Railroad Tracks
- 20' Interval Elevation Contours
- Brooks
- Brooks
- Lakes, Ponds & Rivers
- parcels
- National & State Identified Wetlands
- Protected Species and/or Habitat
- Deer Wintering Areas
- Areas over 20% Slope



Warning- Because this map is developed from various scale sources, there may be some discrepancies between data layers.

# Town of Lyndon, VT Zoning District Map

November 9, 2009



- Single Family Home
- Seasonal Home
- Multi-family building
- School
- Government
- Farm
- Emergency/Fire Services
- Industrial
- Health Facility
- Commercial
- Lodging
- Cultural
- Church
- State Land Boundaries
- Major Electric Transmission Line
- Railroad Tracks
- Interstate
- US & State Highway
- Paved Town Road
- State Forest Road
- Unpaved Town Road
- Class 4 Town Road
- Legal Trail
- Private Road
- Brooks
- parcels
- Zoning Districts**
- Rural Residential
- Residential Neighborhood
- Village Commercial
- Main
- Park
- Commercial
- Industrial
- Industrial-Commercial
- Lyndon Corner Industrial
- Institutional Center
- Lakes, Ponds & Rivers

Town Boundaries & State Land Boundaries- USGS 1:24,000 Scale Topographic Maps  
 Roads- VTrans Data from 1:5000 VT Orthophotos & E911 GPS  
 Buildings & Driveways- E911 data gathered from GPS & Orthophotos.  
 Surface Waters- ANR's hydrography data, 1:5000 VT Orthophoto  
 Zoning Districts- Identified by the town of Lyndon's Planning Commission and digitized by NVDA Staff.