TOWN OF BARNET

All-Hazards Mitigation Plan



Town of Barnet Selectboard P.O. Box 15 Barnet, VT 05821 (802) 633-2256

July 14, 2005

Table of Contents

PRERE	QUISITES	. 3
Certii	FICATE OF LOCAL ADOPTION	. 3
SECTIO	ON ONE - PLANNING PROCESS	. 4
1.1	Introduction and Purpose	
1.1	ABOUT BARNET	
SECTIO	ON TWO – RISK ASSESSMENT	
2.1	IDENTIFYING HAZARDS	_
2.2	le 2-A Hazard Inventory and Risk Assessment Profiling Hazards	
2.2.		
2.2.		
2.2.		
2.2.		
2.2.		
2.2.		
2.2.		
2.2.	8 2	
2.3	Vulnerability: Overview	
2.4	IDENTIFYING STRUCTURES.	
2.5	ESTIMATING POTENTIAL LOSSES	
2.6	ANALYZING DEVELOPMENT TRENDS	10
SECTIO	ON THREE - MITIGATION STRATEGY	11
TABLE	E 3-A DEVELOPMENT TOOLS	12
3.1	REGIONAL HAZARD MITIGATION GOALS	
3.2	COMMUNITY PREPAREDNESS GOALS.	
3.3	EXISTING HAZARD MITIGATION PROGRAMS	
3.3.	1 Emergency Management Planning	13
3.3	2 Codes and Standards	13
3.3	3 Local Planning and Zoning, NFIP	13
3.3.		
3.3	5 School Drills	13
3.4	Preparedness Tools	
3.5	ANALYSIS OF MITIGATION ACTIONS	
3.6	IMPLEMENTATION OF MITIGATION ACTIONS	15
SECTIO	ON FOUR - PLAN MAINTENANCE PROCESS	16
4.1	INITIAL APPROVAL PROCESS	16
4.2	ROUTINE PLAN MAINTENANCE.	
4.3	PROGRAMS, INITIATIVES AND PROJECT REVIEW.	
4.4	Post-Disaster Review Procedures.	
	ON FIVE – MAPS	
5.1	CRITICAL FACILITIES	18

Prerequisites

Certificate of Local Adoption

Town of Barnet

A Resolution Adopting the All-Hazards Mitigation Plan

WHEREAS, the Town of Barnet has worked with the Northeastern Vermont Development Association to identify hazards, analyze past and potential future losses due to natural and human-caused disasters, and identify strategies for mitigating future losses; and

WHEREAS, the Barnet All-Hazards Mitigation Plan contains recommendations, potential actions and future projects to mitigate damage from disasters in the Town of Barnet; and

WHEREAS, a meeting was held by the Barnet Selectboard to formally approve and adopt the Barnet All-Hazards Mitigation Plan as an annex to the Northeastern Vermont Development Association's (NVDA) All-Hazards Mitigation Plan.

NOW, THEREFORE BE IT RESOLVED that the Barnet Selectboard adopts The Barnet All-Hazards Mitigation Plan Annex as well as the associated NVDA All-Hazards Mitigation Plan.

Date	Selectboard Chair
	Selectboard Member
Attested to by Town Clerk	

Section One - Planning Process

1.1 Introduction and Purpose

This Annex, when used with the appropriate sections of the basic NVDA All-Hazards Plan, is an All-Hazards Mitigation Plan for the Town of Barnet. The purpose of this plan is to assist the Town of Barnet to identify all hazards facing the community and identify strategies to begin reducing risks from identified hazards. A Pre-Disaster Mitigation Planning Grant to the Northeastern Vermont Development Association (NVDA) assisted the Town of Barnet in preparing this plan.

The impact of expected, but unpredictable natural and human-causes events can be reduced through community planning. The goal of this plan is to provide all-hazards local mitigation strategies that make the communities in northeastern Vermont more disaster resistant.

Hazard Mitigation is any sustained action that reduces or eliminates long-term risk to people and property from natural and human-caused hazards and their effects. Based on the results of previous efforts, FEMA and state agencies have come to recognize that it is less expensive to prevent disasters than to get caught in a repetitive repair cycle after disaster have struck. This plan recognizes that communities have opportunities to identify mitigation strategies and measures during all of the other phases of Emergency Management – Preparedness, Response, and Recovery. Hazards cannot be eliminated, but it is possible to determine what they are, where they might be most severe and identify local actions that can be taken to reduce the severity of the hazards.

Hazard mitigation strategies and measures alter the hazard by <u>eliminating</u> or reducing the frequency of occurrence, <u>avert</u> the hazard by redirecting the impact by means of a structure or land treatment, <u>adapt</u> the hazard by modifying structures or standards or <u>avoid</u> the hazard by stopping or limiting development and could include projects such as:

- Flood proofing structures
- Tying down propane/fuel tanks in flood prone areas
- Elevating structures
- Identifying high accident locations
- Monitor and protect drinking water supplies
- Enlarge or upgrade culverts and road standards
- Proactive local planning
- Ensuring that critical facilities are safely located
- Providing public information

1.2 About Barnet

Population: 1,721

Median Housing Value: \$94,027

Caledonia County

Chartered: December 16, 1763 (New Hampshire Grant)

Area: 27,840 Acres / 43.5 Square Miles

Coordinates (Geographic Center): 72°03'W 44°17'N

Altitude ASL: 452 feet

Population Density (persons per square mile): 38.9

Tax Rate: \$2.057 ('03)

Equalized Value: \$157,045,981 ('03)

The Town of Barnet is a rural, beautiful, fertile township on the western slope of the Connecticut River Valley. Over the years since the founding of the town in 1763, the basic community structure has been made up of small villages and family farms, a combination that has preserved the pastoral beauty through the centuries.

Barnet lies along the shore of the Connecticut River, the eastern boundary of the State of Vermont. This section of the Connecticut, with its breathtaking scenery, is considered by some to be the best canoeing on the river. Barnet has several lakes and ponds, including Harvey's Lake (352 acres), which occupies a dramatic setting among open fields and wooded hills. Warden Pond and Jewett Pond are two other major water bodies in the town. Roy Mountain is the town's highest peak at 2,091 feet. It is surrounded by the state-owned, 1,327-acre Roy Mountain Wildlife Management Area.

The historic Bayley-Hazen Military Road passes through the town. Fifty-four miles long, it was designed as a means of entrance into Lower Canada at a time during the Revolutionary War when it was hoped to capture Canada as the fourteenth colony. Although it never served an important military purpose, the road helped to facilitate settlement of Barnet and other towns along the road when the war ended.

Five villages are located within the town: Barnet, East Barnet, West Barnet, Passumpsic at Barnet's north end and McIndoe Falls to the south. Exit 18 of Interstate 91 is located in the town, as is US Route 5, both of which pass through the entire length of Barnet.

Approximately 110 miles of roads are maintained in Barnet. Many of these are used by school buses, which makes it especially important that they be passable and safe. Many of the Class III roads are difficult to plow because of close banks and trees. The Town Highway Department continues to improve Class III and Class II roads as money becomes available.

Maintained by the State of Vermont, I-91 runs north-south for approximately ten miles within the Town, and Exit 18 is located on the edge of Barnet Village. The right-of-way acquisition of land to construct this highway removed approximately 380 acres from the Town's tax base.

A major north-south highway in the State, Route 5 links four of Barnet's villages and is maintained by the State of Vermont. I-91 and Route 5 parallel the Connecticut River.

Rail-freight services are available in St. Johnsbury on the Canadian Pacific Line's Lyndonville subdivision which runs from Newport to Wells River, passing through Barnet. A railroad siding serves Morrison Feeds and could serve other industries.

The Barnet School and the adjoining recreation field occupy a ninety-six acre site on the West Barnet Road.

Town-organized police protection and law enforcement is limited. Accordingly, strong -support should be given the State Police, the County Sheriff, and local constables. The Caledonia County Sheriff provides regular patrol services to the Town.

There are five fire districts within the Town of Barnet, however, all major firefighting equipment is stored and maintained in the Village of Barnet where a new fire house has just been built. There is also a fire house and rescue truck with some fire-fighting equipment located in West Barnet. The volunteer Barnet Fire & Rescue Service responds to emergency medical calls. In addition, Barnet is served by the Caledonia-Essex Area Ambulance Service (CALEX) which provides pre-hospital emergency care. Hospital care is located in St. Johnsbury, in Vermont or Woodsville, or Littleton (20 miles) hospitals in New Hampshire.

The Barnet School is the emergency shelter and does have a shelter pre-agreement with the Vermont Red Cross.

Barnet Village has a 68 hookup water system privately owned by the Barnet Water Company in Windsor, Vermont. McIndoe Falls water system is owned by the local fire district and has 56 hook-ups with 10 more available for expansion. Passumpsic Village is served by the St. Johnsbury water system with 45 hook-ups and expansion capacity to 55. West Barnet has a private water system serving 20-25 homes in the village area. The remaining households maintain private springs or wells. There are presently no public sewage treatment facilities in the town.

There are two large dams and three small dams in Barnet. Green Mountain Power and the Central Vermont Public Supply are the two electrical companies serving power to Barnet.

Section Two - Risk Assessment

2.1 Identifying Hazards

Meeting Date: 1/21/04

Meeting Attendees: Ronald Morse, Fire Chief and Local Emergency Management Coordinator,

William Hoar, Town Clerk, Theodore Faris, Selectboard Chair

Barnet local officials identified several hazards that are addressed in this annex. These were identified through interviewing the Town Clerk, Selectboard Chair and Fire Chief. These individuals have a thorough knowledge of the community through many years of work and working with the local elected officials and planning department. Reviewing past disasters was helpful in determining the greatest risks to the community. Reviewing the fire history with the Fire Chief was instrumental in determining the vulnerability of the community.

Table 2-A Hazard Inventory and Risk Assessment

Possible Hazard	Likelihood	Impact	Community Vulnerability	Most Vulnerable	
Tornado	Low	Medium	Low	Structures	
Flood	High	Medium/ High	High	Infrastructure	
Flash Flood	Low	Low	Low	Infrastructure	
Hazardous Materials	Medium	Medium	Medium	Interstate I-91, Railroad	
Radiological Incident	Medium	Medium	Low	Interstate	
Structure Fire	Low/Med.	Low/Med	Low/Medium	Residences	
Power Failure (CVPS)	Low	Low	Low	Residences, businesses	
Winter Storm/Ice	Medium	Medium	Medium	Residences, businesses	
High Wind	Low	Low	Low	Trees down, loss of power	
Aircrash	Low	Low	Low	Site specific	
Water Supply Contamination	Low	Medium	Medium	Public water supply	
Hurricane	Low	Medium	Low	Power lines, residences	
Earthquake	Low	Medium	Low	Site specific	
Dam Failures	Medium/ High	High	Medium/High	Residences, businesses, infrastructure	
Drought	Low	Medium	Low	Water supply. Farmers	
Chemical or Biological Incident	Low	High	Low	Site specific	
Highway Incidents	Medium	Medium	Medium	Site specific. No HAL, interstate, accidents	
Wildfire/ForestFire	Low	Low	Low	Farms, sugarbushes, residences	
Landslide	Low	Medium/ Low	Low	Site specific. Road closed likely. (2002 – Route 5)	
School Safety Issues	Low	Medium	Medium	Students, teachers, hostage issues. School not sprinkled	
Terrorism	Low	Medium	Low	Residents, businesses, local officials	

The highest risks to Barnet can be summarized as: flooding, hazardous materials, structure fire, winter storm/ice, water supply contamination, dam failures, highway incidents and school safety issues.

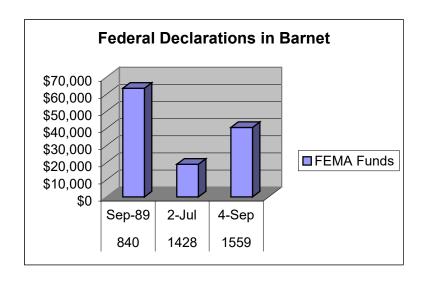
2.2 Profiling Hazards

2.2.1 Floods

Barnet experiences frequent flooding with the Passumpsic River flowing into the Connecticut River. Runoff from the more hilly sections of Barnet drains into the many wetland areas of the town. A road section on the Comeford Dam Road washed out in 1989 that was a significant expense. The Barnet Village wells supplying the public water supply get flooded from time to time. There is no history of repetitive damage to public or private investments. Farms occupy the valley areas in Barnet that are most prone to flood damage.

Past FEMA Declarations and Funding

I toot I Li	III Decimi	tions time.	- 4114					
Town	NFIP	840	1428		428 1559		To	tals by
		Sep-89	Jι	ıl-02	S	ep-04	-	Town
Barnet	YES	\$ 63,455	\$	19,051	\$	40.553	\$	123,059



2.2.2 Hazardous Materials

There are not many fixed hazardous sites in Barnet. The potential threat to Barnet comes from the hazardous materials traveling on the I-91, Route 5 and the railroad. There have not been any serious incidents to date, but there is a concern that one will occur that will affect the more populated village areas. The Barnet Volunteer Fire Department responds to incidents on I-91.

2.2.3 Structure Fire

There are usually 2-3 structure fires each year. Most calls are for chimney fires because many homes burn wood for a primary or secondary source of heat during the cold winter months. Barnet has two fire stations. A new fire station has just been substantially completed in 2004. The Emergency Operating Center (EOC) will be located at the new fire station. The fire department is run by volunteers. The fire chief has had HazMat training and nearby St. Johnsbury has a decon trailer for regional support. The potential for village fires is a concern as all buildings are connected or close. Most are older historic structures that are at high risk.

2.2.4 Winter Storm/Ice

Winter storms are frequent in northern Vermont, some more damaging than others. Barnet experienced no damage from the ice storm of 1998. The main concern for winter storms and ice is the loss of electrical power. Green Mountain Power and the Central Vermont Power Supply are the main electrical services for the area. When power does go out due to storms it is usually only at most for a few hours, never days.

2.2.5 <u>Water Supply Contamination</u>

Barnet Village has a 68 hookup water system privately owned by the Barnet Water Company in Windsor, Vermont. McIndoe Falls water system is owned by the local fire district and has 56 hook-ups with 10 more available for expansion. Passumpsic Village is served by the St. Johnsbury water system with 45 hook-ups and expansion capacity to 55. West Barnet has a private water system serving 20-25 homes in the village area. The remaining households maintain private springs or wells. There are presently no public sewage treatment facilities in the town.

The Barnet Village wells supplying the public water supply get flooded from time to time. The McIndoe Falls water system is a problem because it is near to the road with no guardrail. A concern exits for auto or hazardous material spills near the water source. This water also serves part of the Town of Ryegate.

2.2.6 Dams

There are five dams in Barnet and another large dam upstream on the Connecticut River.

- a. CVPS has a small dam near Silo Road and Comerford Rd.
- b. Harvey Lake has a small dam owned by Barnet. The town is in the process of rebuilding and designing the dam. The Lake Association is working on new dam. The tributary backs-up into lake with nutrients.
- c. McIndoe Falls on the Connecticut River is located at the southerly section of Barnet and does not pose a threat.
- d. The Comerford Dam at the north end of town near the Waterford town line would be the greatest potential threat to Barnet Village if a breach were to occur.
- e. The Passumpsic Dam

The Moore Dam upriver in Lower Waterford also poses a potential problem if that were to breach. It was built approximately 50 years ago. The Barnet, East Barnet and Passumpsic dams are non-issues as far as potential threats. The largest potential threat to Barnet is the Comerford dam. There are no early warning systems in place other that door-to-door and the media.

2.2.7 Highway Accidents

Highway incidents are likely to occur on I-91 and Route 5, parallel roads running north-south. A worst case scenario would involve a hazardous incident near Barnet Village or East Barnet.

July 14, 2005

Page 10 of 19

2.2.8 School Safety Issues

The Barnet School houses grades K-6. Most students in higher grades attend the St. Johnsbury Academy in nearby St. Johnsbury. The school is also the identified shelter for the community. The school is not sprinkled in the event of a fire and that is a concern of the fire department.

2.3 Vulnerability: Overview

In terms of vulnerability, Barnet rated these potential hazards below as the highest threats: Floods and Dam Failures. Hazardous materials, structure fire, winter storm/ice, water supply contamination, dam failures, highway incidents and school safety issues were considered medium threats to Barnet. Mitigation strategies are identified for the highest priority projects in Section Three. Only those hazards that were identified as medium to high risks to the town were profiled. While other types of hazards may cause smaller problems for the community, they pose a lower risk.

2.4 Identifying Structures

It is difficult to estimate the total number of structures in the 100-year limit of the FIRM identified floodplain as those maps do not accurately match up to the E911 maps that are based on the structures' geographical location (latitude and longitude). However, it can be estimated that there are approximately 30 structures in or near the flood areas depicted on the NFIP maps.

2.5 Estimating Potential Losses

Total FEMA damage assessed through the Disaster Recovery funds (DR) was \$123, 159 from just 3 different declared disasters from 1989 through 2004. Future losses should be lessened through mitigation of the repetitively flooded properties and road upgrades. The FIRM maps are not compatible with the GIS maps containing contour, rivers, roads and structures and it is not possible to estimate the amount of potential loss at this time. It is recommended that the NFIP maps be redone using the Vermont Geographic Information System standards based on orthophoto mapping. The Median Housing Value (MHV) for Barnet in 2003 was \$94,027. The Equalized Value for all properties in Barnet in 2003 was \$157,045,981. If one percent (1%) of all properties in Barnet were damaged, the value would be assessed at \$157,046.

2.6 Analyzing Development Trends

Barnet is a relatively slow growing community. There is a town plan and zoning regulations in place to guard against future development in inappropriate locations such as flood prone areas. All development strategies are carefully reviewed by the Planning Commission and Zoning Board of Adjustment. Many upgrades in commercial structures are being required to include fire safety features. All buildings being improved in or near frequently flooded areas are required to elevate or provide additional mitigation measures.

Population Increase 2000 to 2003
Town Estimated Census

Pop 2003 Pop 2000 Increase

Barnet 1721 1690 1.8%

The purpose of planning for orderly development is to encourage and promote that kind of community growth which will preserve the town's physical beauty, unique character, quality of life, and the economic welfare of its citizens. In recent years, much of Barnet's development has been residential, both year-round and seasonal. This trend will probably continue and can be compatible with a working agricultural and Silva cultural landscape when planning techniques are effectively applied. That growth is taking place now is evidenced by the increase in building permits issued.

Section Three - Mitigation Strategy

Hazard Mitigation Strategies and Measures **avoid** the hazard by stopping or limiting new exposures in known hazard areas, **alter** the hazard by eliminating or reducing the frequency of occurrence, **avert** the hazard by redirecting the impact by means of a structure or land treatment, **adapt** to the hazard by modifying structures or standards and could include tools or projects such as:

- **Town Plan** this document contains goals and objectives for community growth, health, safety and welfare for public and private interests.
- **Zoning Status** This is a snapshot of the current zoning tools in effect. Note the progress listed above for some communities.
- **NFIP** National Flood Hazard Insurance Program.
- C & S = Highway Codes and Standards Most all Vermont communities have adopted the Vermont Transportation Agencies recommended Highway Codes and Standards. This is perhaps the one most beneficial mitigation program in Vermont and the NVDA region. By adopting these codes, all maintenance and new construction on roads, highways, bridges and culverts must be enhanced to meet the new standards to withstand large flood events.
- VTRC Barnet does have a Vermont Red Cross Shelter Pre-Agreement. When a Pre-Agreement is in effect, local representatives are trained to open a shelter if needed. This will allow for a more efficient use of the VT Red Cross if and when needed.
- Emergency Operation Plan (EOP) Barnet is in the process of having its EOP updated to include all-hazards through a Homeland Security Grant to the NVDA. This plan will be substantially completed by July 2005 and will include this Plan as its risk assessment to all-hazards.
- Rapid Response Plan (RRP) Barnet has updated its RRP as of August 9, 2004.

• **Emergency Training** - Fire and rescue personnel continue to participate in training offered for its volunteers, particularly with the equipment upgrades through the Dept. of Homeland Security.

Table 3-A Development Tools

<mark>l own</mark>			Flood			Culvert		
Town	Plan	Zoning	NFIP	Regs	Codes&S	Inv.	VRC	
Barnet	YES	YES	YES	YES	YES	YES	YES	

The town has adopted the Highway Codes and Standards that require upgraded roads and culverts when being replaced. The town has adopted private driveways to have 18" culverts when installing new access points to public roads. A culvert inventory identifying undersized culverts for Barnet has been completed with an upgrade schedule for those needed upgrades.

3.1 Regional Hazard Mitigation Goals

- Reduce the loss of life and injury resulting from all hazards.
- Mitigate financial losses incurred by municipal, residential, industrial, agricultural and commercial establishments due to disasters.
- Reduce the damage to public infrastructure resulting from all hazards.
- Recognize the connections between land use, storm-water road design and maintenance and the effects from disasters.
- Ensure that mitigation measures are compatible with the natural features of community rivers, streams and other surface waters; historic resources; character of neighborhoods; and the capacity of the community to implement them.
- Encourage all-hazard mitigation planning as a part of the municipal planning process.

3.2 Community Preparedness Goals

Overall, Barnet is working to decrease its risk to flooding, water supply contamination and hazardous material incidents through proactive planning, policies and mitigation actions. Other lesser risks are being addressed through the same procedures and policies.

All of the plan's goals and recommended actions are based on five underlying goals of Barnet's stewardship.¹

They are:

1. The preservation of traditional land uses, particularly the remaining farms that dot our hillsides, the forest resource, and compact village centers.

- 2. The encouragement of residential development which ensures a variety of housing units for all income groups, while improving our quality of life and preserving our natural resources.
- 3. The conscientious utilization and protection of our abundant natural resources and recreational areas, and recognition of their potential economic value to the citizens of Barnet.

 $^{^{\}rm 1}$ Excerpts from the Barnet Town Plan 2000

- 4. The preservation of the quality of air, water, and all common properties beneficial to the quality of life in Barnet.
- 5. The recognition that preservation of traditional land uses, such as agriculture, may conflict with the preservation of common natural resource values in some instances, both short and long-term. Resolution of these conflicts will demand compromise solutions.

To assure the safety element of emergency planning, the Town of Barnet should:

- Review this All-Hazards Plan with essential town government.
- Review and study the need for additional capacity and capability in the Fire Department to minimize the impact of a HAZMAT incident.
- Ensure that all emergency response and management personnel receive HAZMAT Awareness training as a minimum.

3.3 Existing Hazard Mitigation Programs

Barnet has been proactive in planning its future as well as protecting its citizens from potential disasters. The fire department is well trained although there is a declining volunteer population. The shelter has been certified by the Vermont Red Cross. Barnet is located in such an area that is rural and not overly susceptible to severe hazards that could impact the community.

3.3.1 Emergency Management Planning

Barnet has recently updated their Rapid Response Plan. The fire department has actively sought funds for upgrading their response equipment through recent Homeland Security grants.

3.3.2 Codes and Standards

Barnet has adopted the recommended Highway Codes and Standards that require regular upgrades on bridges, highways, ditching and culverts to avoid flood damage. A number of culverts have already been upgraded.

3.3.3 Local Planning and Zoning, NFIP

Barnet has adopted a Town Plan and Zoning. They are a member of the National Flood Insurance Program. All development in or near the identified flood areas must conform to zoning standards.

3.3.4 Protection of Town Records

The Town office has a vault to protect public records from fire, damage or theft/vandalism.

3.3.5 School Drills

The K-6 Barnet School practices regular evacuation drills.

3.4 Preparedness Tools

Public Awareness, Training, Education

- Conduct Emergency Drills involving all elements of the community to practice procedures associated with a simulated varies incidents.
- Use this plan for Hazard Identification and Mapping.

Public Protection

- Designate shelters.
- Emergency communications and information systems (NOAA weather receivers, Emergency Alert System (EAS)) are at the Command Center.
- Update Hazard Vulnerability Assessments as needed.
- Review and modify evacuation and sheltering plans based on the results of drills and exercises or procedures implemented in an actual incident.
- American Red Cross chapter may be contacted to assist with community education programs.
- Maintain current Rapid Response Plans and the Emergency Management Operations Plans.
- Regularly scheduled maintenance programs are ongoing (culvert survey & replacement, ditching along roadways, cutting vegetation to allow visibility at intersections).
- The town is proactive in preparing for potential disasters.
- Emergency response and management staff attend professional training sessions.

Financial and Tax Incentives.

• Use State and Federal funding for mitigation projects and activities.

Hazard Control and Protective Works.

 Utilize regular maintenance programs (culvert survey & replacement, ditching along roadways, cutting vegetation to allow visibility at intersections).

Insurance Programs.

• Participate in NFIP.

Land Use Planning/Management: Flood.

 Barnet has a municipal plan and local zoning. They have established Flood Hazard Areas through the NFIP.

Protection/Retrofit of Infrastructure and Critical Facilities.

• A map of Critical Facilities is attached.

3.5 Analysis of Mitigation Actions

Priority Actions:

Local officials in Barnet have identified several mitigation actions to be included in the Hazard Mitigation Plan. Table 3-B, Implementation Strategy contains these actions, along with the responsible agency, the funding source, and implementation timeframe.

The Barnet local officials have prioritized the actions using the STAPLE+E criteria, a planning tool used to evaluate alternative actions. The following table explains the STAPLE+E criteria.

S – Social	Mitigation actions are acceptable to the community if they
	do not adversely affect a particular segment of the
	population, do not cause relocation of lower income people,
	and if they are compatible with the community's social and
	cultural views.
T – Technical	Mitigation actions are technically most effective if they
	provide long-term reduction of losses and have minimal
	secondary adverse impacts.
A – Administrative	Mitigation actions are easier to implement if the jurisdiction
	has the necessary staffing and funding.
P – Political	Mitigation actions can truly be successful if all stakeholders
	have been offered an opportunity to participate in the
	planning process and if there is public support for the
	action.
L – Legal	It is critical that the jurisdiction or implementing agency
	have the legal authority to implement and enforce a
	mitigation action.
E – Economic	Budget constraints can significantly deter the
	implementation of mitigation actions. Hence, it is important
	to evaluate whether an action is cost-effective, as
	determined by a cost benefit review, and possible to fund.
E – Environmental	Sustainable mitigation actions that do not have an adverse
	effect on the environment, that comply with Federal, State,
	and local environmental regulations, and that are consistent
	with the community's environmental goals, have mitigation
	benefits while being environmentally sound.

3.6 Implementation of Mitigation Actions

Flooding and the potential for a breached dam are the two main threats to Barnet. Local officials are proactive in preparing for the hazards for which they are most vulnerable. Their highest priority concern is the health safety and welfare of the local citizens and businesses. The fire department has several concerns that center around a flood event with the Connecticut River and the potential for a hazardous incident on Interstate 91. The mitigation action determined to have the highest priority was the most cost effective alternative to the community. Readiness and timeliness of project was also important.

The evaluating of the STAPLEE criteria is takes into consideration the best available information, any engineering evaluations, and best judgment. The action listed in Table 3-B is important to community, cost effective and feasibility to the community.

Table 3-B Mitigation Projects by Priority

Project/Priority	Mitigation	Who is	Time Frame	Initial
, ,	Action	Responsible	and Potential	Implemen-
			Funding	tation Steps
Early Warning	Will save lives in	The Selectboard and	2005/6	Seek appropriate
system for potential	the event of a large	Local emergency	HMGP, PDM-C,	grant source, obtain
flooding or dam	dam breach or	Management	FMA, Bridge and	cost estimate and
breach - HIGH	hazardous incident	Director	Culvert Program	apply for funding.
GIS mapping of	Identify flood areas	Northeastern	2006/7 – FEMA	Coordinated
NFIP areas - Medium	with vulnerable	Vermont	FMA funds, HMGP	statewide NFIP
	structures consistent	Development	or EMPG funds	mapping effort for
	with Vermont GIS	Association		all towns.
	mapping effort.			
Generator	To power critical	The Selectboard and	2005/6	Seek appropriate
	facilities when there	Local emergency	HMGP funds	grant source, obtain
	is a power outage.	Management		cost estimate and
		Director		apply for funding.
Prepare Evacuation	Will save lives in	The Selectboard and	Local	Begin to identify
Plan	the event of a large	Local emergency		possible scenarios
	flood or breached	Management		and evacuation
	dam event, or	Director		routes with public.
	hazardous incident.			

Section Four - Plan Maintenance Process

4.1 Initial Approval Process

In addition to public involvement in the initial development of the plan, opportunities for public comment will include a warned adoption to review the plan prior to final adoption. The fire chief has been instrumental in participating in the review of the document with the local officials.

After local review and comment, the draft local annex is presented to the State Hazard Mitigation Committee through the State Hazard Mitigation Officer (SHMO) for review and comment. The SHMO will issue a recommendation for forwarding the plan to the FEMA Region I. After receipt of comments from FEMA Region I staff, final changes will be made and the resulting document adopted by the Barnet Selectboard. The final plan will be returned to FEMA Region I for formal approval.

4.2 Routine Plan Maintenance

The Hazard Mitigation Plan is dynamic and changing. To ensure that the plan remains current it is important that it be updated periodically. The plan shall be updated every five years, pending ongoing financial resources, in accordance with the following procedure:

- 4.2.1 The Barnet Selectboard will either act as the review committee or appoint a review committee.
- 4.2.2 The committee will discuss the process to determine if the evaluation criteria is still appropriate or modifications or additions are needed to the mitigation strategies based on changing conditions since the last update occurred. Data needs will be reviewed, data sources identified and responsibility for collecting information will be assigned to members.
- 4.2.3 A draft report will be prepared based on the evaluation criteria and in conformance with the FEMA Region I Local Hazard Mitigation Plan Crosswalk document.
- 4.2.4 The Selectboard will have the opportunity to review the draft report. Consensus will be reached on changes to the draft.
- 4.2.5 Changes will be incorporated into the document.
- 4.2.6 The plan will be reviewed by Vermont Emergency Management (SHMO) staff and then FEMA Region I staff.
- 4.2.7 VEM and FEMA comments will be incorporated into the plan.
- 4.2.8 The Selectboard will warn the plan for approval at its regular meeting.
- 4.2.9 The Selectboard will incorporate any community comments into the plan.
- 4.2.10 The Selectboard will finalize and adopt the plan and distribute to interested persons.

4.3 Programs, Initiatives and Project Review

Although the plan will be reviewed, pending ongoing financial resources, in its entirety every five years the town may review and update its programs, initiatives and projects more often based on the above procedure as changing needs and priorities arise.

4.4 Post-Disaster Review Procedures

Should a declared disaster occur, a special review will occur in accordance with the following procedures:

- 1. Within six (6) months of a declared emergency event, the town will initiate a post-disaster review and assessment.
- 2. This post-disaster review and assessment will document the facts of the event and assess whether existing Hazard Modification Plans effectively addressed the hazard.
- 3. A draft report After Action Report of the assessment will be distributed to the Review/ Update Committee.
- 4. A meeting of the committee will be convened by the Selectboard to make a determination whether the plan needs to be amended. If the committee

- determines that NO modification of the plan is needed. Then the report is distributed to interested parties.
- 5. If the committee determines that modification of the plan IS needed, then the committee drafts an amended plan based on the recommendations and forwards it to the Selectboard for public input.
- 6. The Selectboard adopts the amended plan.

Section Five - Maps

5.1 Critical Facilities

