9.28 TOWN OF SALINA

This section presents the jurisdictional annex for the Town of Salina.

A.) HAZARD MITIGATION PLAN POINT OF CONTACT

Primary Point of Contact	Alternate Point of Contact
Bernard D. English, Director of Planning & Development	Jason Perkins
201 School Rd, Liverpool, NY 13088	201 School Rd, Liverpool, NY 13088
(315) 451-0492	(315) 451-0492
benglish@salina.ny.us	jperkins@salina.ny.us

B.) TOWN PROFILE

Population

32,713 (estimated 2007 U.S. Census)

Location

The Town of Salina is located in Onondaga County, immediately north of the City of Syracuse. It is bordered by the Town of DeWitt on the east, the Town of Geddes on the west, the Town of Lysander on the northwest, and the Town of Clay on the north. The town is on the north shore of Onondaga Lake. Interstate 81 and Interstate 90 (New York State Thruway) intersect in Salina. New York State Route 370 borders Onondaga Lake. US Route 11 passes through the eastern part of the town. Salina consists of five small suburban communities which are known as Mattydale, Liverpool, Lyncourt, Galeville and a portion of North Syracuse.

According to the U.S. Census Bureau, the town has a total area of 15.1 square miles (39.1 km²), with 13.8 square miles (35.7 km²) of it land and 1.3 square miles (3.4 km²) of it (8.74-percent) water.

Climate

Onondaga County generally experiences seasonable weather patterns characteristic of the northeastern U.S. Cyclonic systems and cold air masses affect the County's weather, making winters cold with snow. During the summer and parts of spring and autumn, temperatures rise during the daytime and fall rapidly after sunset. Summer temperatures typically range from about 76°F to 81°F (Fahrenheit). Winter high temperatures are usually in the middle to upper 30°F, with minimum temperatures of 14°F expected. Overall, the average high temperature for the County is approximately 57°F and the average low temperature is approximately 37°F. Snow accumulates to an average depth of 121 inches each year.

Brief History

The Salina region was in the domain of the Onondaga tribe and later was within the Central New York Military Tract, although it was reserved for members of the Onondaga. Salina received its name in 1797, when the Surveyor General received authority to set aside a portion of the Salt Reservation for use in salt manufacture. The Salt Reservation had been created by a treaty with the Native Americans. It extended one mile around Onondaga Lake. In 1798, the Village of Salina was chartered. It was located in what is



now the Washington Square neighborhood or "First Ward" of the current City of Syracuse and contained sixteen blocks. Each block was divided into four house lots, selling according to law, for no less than forty dollars. The area now known as the Town of Salina was still part of the Townships of Manlius and Marcellus. In March 1809, the Town of Salina was organized. It included the areas now known as the Town of Geddes (formed 1848), part of Manlius and the City of Syracuse.

Salina's location on the Erie Canal stimulated its industrial development. The middle section of the canal, from Salina to Utica was the first to open in 1820. It was not until the late 1840s that Salina was reduced to its present size. The original Village of Salina stretched around Onondaga Lake, incorporating part of what is now the Town of Geddes and much of what today is the City of Syracuse. The early history of Salina is actually the history of the area around Onondaga Lake and the salt industry.

By 1846, it was apparent that Syracuse would soon become a city. The townspeople of Salina and Syracuse began discussing a proposed charter, which would unify the two villages. In December 1847, the act of incorporation was passed, which defined the area as "constituting a part of the Town of Salina and incorporation the Village of Salina and Syracuse." This act reduced the Town of Salina to its present boundaries.

Governing Body Format

The Town of Salina became a Suburban Town pursuant to New York State Town Law, Article 3-A, on November 3, 1987 after the proposition was approved by the town voters. The Town government consist of a supervisor and four town board members who act as the legislative members. The Supervisor also is the chief executive officer and head of the administrative branch of the town government.

Growth/Development Trends

There is only one project for residential development likely to occur within the next five years, this is along Oswego Road, north of the New York State Thruway. The projected impact is undetermined at this time because there are wetland and floodplain issues that must be factored in before a final plan can be developed.

	FEMA Disaster #		
Type of Event	(if applicable)	Date	Preliminary Damage Assessment
Snowstorm / Extreme Cold	Not applicable	February, 1961	\$80,000 (countywide)
Flood	Not applicable	May, 1966	\$90,000 (townwide)
Flood	Not applicable	July, 1970	\$250,000 (countywide)
Snowstorm	Not applicable	March, 1971	\$806,000 (countywide)
Snowstorm / Extreme cold	Not applicable	February, 1972	\$803,000 (countywide)
Flood (Tropical Storm Agnes)	DR-338	June, 1972	\$1,600,000 (countywide); \$150,000 (townwide)
Flood	Not applicable	March, 1973	\$200,000 (countywide)
Snowstorm	Not applicable	December, 1973	\$83,000 (countywide)
Severe Storms and Flooding	DR-447	July, 1974	\$7,200,000 (countywide)
Severe Storms, Heavy Rain, Landslides,	DR-487	September, 1975	\$6,300,000 (countywide)

C.) NATURAL HAZARD EVENT HISTORY SPECIFIC TO THE TOWN



	FEMA Disaster		
Type of Event	(if applicable)	Date	Preliminary Damage Assessment
Flooding			
Flood	Not applicable	April, 1976	\$313,000 (countywide)
Blizzard	Not applicable	January, 1977	\$2,100,000 (countywide)
Flood	Not applicable	October, 1981	\$833,000 (countywide)
Tornado (F3)	Not applicable	May, 1983	\$2,500,000 (countywide)
Snowstorm	Not applicable	February, 1984	\$156,000 (countywide)
Tornado (F1)	Not applicable	July, 1986	\$250,000 (countywide)
Blizzard and Extreme Cold	EM-3107	March, 1993	\$455,000 (countywide)
Snowstorm	Not applicable	April, 1993	\$100,000 (countywide)
Thunderstorm / Winds	Not applicable	August, 1993	\$600,000 (countywide)
Severe Storm and Flooding	DR-1095	January, 1996	\$7,600,000 (countywide)
Flood	Not applicable	November, 1996	\$100,000 (countywide)
Thunderstorm / Winds / Tornado	Not applicable	May, 1998	\$200,000 (countywide)
Thunderstorm / Winds	Not applicable	August, 1998	\$200,000 (countywide)
Severe Storm	DR-1244	September, 1998	\$90,000,000, 3 fatalities, 7 injuries (countywide)
Thunderstorm / Winds	Not applicable	July, 1999	\$750,000 (countywide)
Severe Storms	DR-1335	May/September, 2000	Not available
Snowstorms	Not applicable	December, 2002 / January, 2003	\$353,000 (countywide)
Flood	Not applicable	June, 2002	\$2,000,000 (countywide)
Snowstorm (President's Day Storm)	Not applicable	February, 2003	\$153,000 (countywide)
Ice Storm	DR-1467	April, 2003	\$2,900,000 (countywide)
Severe Storms and Flooding	DR-1564	August / September 2004	\$2,000,000 (countywide)
Severe Storm and Flooding	Not applicable	April, 2005	\$100,000 (countywide)
Flood	Not applicable	July, 2005	\$500,000 (countywide)
Severe Storms and Flooding	Not applicable	June/July, 2006	\$29,000 (countywide)
Lake Effect Snowstorm / Extreme Cold	Not applicable	February, 2007	\$3,000,000 (countywide)

Number of FEMA Identified Repetitive Flood Loss Properties:0Number of FEMA Identified Severe Repetitive Flood Loss Properties:0

Source: FEMA Region II, 2009 Note: Repetitive loss and severe repetitive loss data as of February 2009.



Rank #	Hazard type	Estimate of Potential Dollar Losses to Structures Vulnerable to the Hazard ^{a,c}	Probability of Occurrence	Risk Ranking Score (Probability x Impact)	Hazard Ranking ^b
3	Earthquake	\$104,017,785 ^{c,e}	Rare	16	Low
2	Flood	\$69,981,000 ^{c,e}	Frequent	33	Medium
4	Ground Failure	Not available ^f	Rare	6	Low
1	Severe Storm	\$0 ^{c,d,g}	Frequent	48	High
1	Severe Winter Storm	\$136,247,250 ^{c,d}	Frequent	48	High

D.) NATURAL HAZARD RISK/VULNERABILITY RISK RANKING

a. Building damage ratio estimates based on FEMA 386-2 (August 2001)

b. High = Total hazard priority risk ranking score of 40 and above Medium = Total hazard priority risk ranking of 20 - 39

Low = Total hazard risk ranking below 20

c. The valuation of general building stock and loss estimates determined in Onondaga County were based on the default general building stock database provided in HAZUS-MH MR3 (RSMeans 2006).

d. Severe storm and severe winter storm hazard 500-year MRP loss estimate is structural value only; does not include the value of contents. For severe winter storm, the loss estimate is 5% of total general building stock value.

e. Loss estimates for both structure and contents (500-year MRP for the flood hazard and 2,500-year MRP for the earthquake hazard).

f. Approximately 6% of the Town's general building stock is located within the landslide hazard area.

g. Potential losses for severe storm are underestimated by HAZUS.

E.) CAPABILITY ASSESSMENT

This section identifies the following capabilities of the local jurisdiction:

- Legal and regulatory capability
- Administrative and technical capability
- Fiscal capability
- Community classification.



E.1) Legal and Regulatory Capability

Regulatory Tools (Codes, Ordinances., Plans)	Local Authority (Y or N)	Prohibitions (State or Federal) (Y or N)	Higher Jurisdictional Authority (Y or N)	State Mandated (Y or N)	Code Citation (Section, Paragraph, Page Number, date of adoption)
1) Building Code	Y	N	Y	Y	Chapter 121, Adopted 11/27/2006
2) Zoning Ordinance	Y	Ν	Ν	Ν	Chapter 235, Adopted 7/7/1969
3) Subdivision Ordinance	Y	N	N	Ν	Chapter 210, Adopted 3/8/1999
4) NFIP Flood Damage Prevention Ordinance	Y	Y	Y	Y	Chapter 125, Adopted 5/18/1987, last amended 12/11/2006
5) Growth Management	N	N	N	N	
6) Floodplain Management / Basin Plan	N	Y	Y	N	
7) Stormwater Management Plan/Ordinance	Y	N	N	Y	Chapter 203, Adopted 5/29/2007
8) Comprehensive Plan / Master Plan/ General Plan	Y	N	N	Ν	Several Component Plans and Studies
9) Capital Improvements Plan	Y	N	N	N	On-going plan approved annually by Town Board
10) Site Plan Review Requirements	Y	Y	Y	Ν	Chapter 235, Adopted 7/7/1969
11) Open Space Plan	N	N	N	N	
12) Economic Development Plan	Y	N	N	Ν	In Progress
13) Emergency Response Plan	Y	N	N	Y	Last Revised 2007
14) Post Disaster Recovery Plan	Y	N	N	N	Last Revised 2007
15) Post Disaster Recovery Ordinance	N	Ν	N	N	
16) Real Estate Disclosure req.	N	N	Y	N	
17) Other [Special Purpose Ordinances (i.e., critical or sensitive areas)]	N	N	N	N	



E.2) Administrative and Technical Capability

Staff/ Personnel Resources	Available (Y or N)	Department/ Agency/Position
1) Planner(s) or Engineer(s) with knowledge of land development and land management practices	Y	Planning and Development
 Engineer(s) or Professional(s) trained in construction practices related to buildings and/or infrastructure 	Y	Town Engineer
 Planners or engineers with an understanding of natural hazards 	Y	Town Engineer
4) NFIP Floodplain Administrator	Y	Bernard D. English, Director of Planning and Development
5) Surveyor(s)	Y	Town Engineer
6) Personnel skilled or trained in "GIS" applications	Y	Planning and Development
7) Scientist familiar with natural hazards in the Town of Salina.	Ν	
8) Emergency Manager	Y	Director of Planning and Development
9) Grant Writer(s)	Y	Town Historian
10) Staff with expertise or training in benefit/cost analysis	Y	Town Clerk's Office

E.3) Fiscal Capability

Financial Resources	Accessible or Eligible to use (Yes/No/Don't know)
1) Community development Block Grants (CDBG)	Yes – Onondaga County
2) Capital Improvements Project Funding	Yes
3) Authority to Levy Taxes for specific purposes	Yes – Town Board
4) User fees for water, sewer, gas or electric service	Yes – Sewers
5) Impact Fees for homebuyers or developers of new development/homes	No
6) Incur debt through general obligation bonds	Yes – Town Board
7) Incur debt through special tax bonds	Yes – Town Board
8) Incur debt through private activity bonds	Don't Know
9) Withhold public expenditures in hazard-prone areas	Yes – Town Board
10) State mitigation grant programs (e.g. NYSDEC, NYCDEP)	Yes
11) Other	No



Program	Classification	Date Classified
Community Rating System (CRS)	NP	N/A
Building Code Effectiveness Grading Schedule (BCEGS)	4	2004
Public Protection	NP	N/A
Storm Ready	NP	N/A
Firewise	NP	N/A

E.4) Community Classifications

N/A = Not applicable. NP = Not participating. - = Unavailable.

The classifications listed above relate to the community's effectiveness in providing services that may impact it's vulnerability to the natural hazards identified. These classifications can be viewed as a gauge of the community's capabilities in all phases of emergency management (preparedness, response, recovery and mitigation) and are used as an underwriting parameter for determining the costs of various forms of insurance. The CRS class applies to flood insurance while the BCEGS and Public Protection classifications apply to standard property insurance. CRS classifications range on a scale of 1 to 10 with class one (1) being the best possible classification, and class 10 representing no classification benefit. Firewise classifications include a higher classification when the subject property is located beyond 1000 feet of a creditable fire hydrant and is within 5 road miles of a recognized Fire Station.

Criteria for classification credits are outlined in the following documents:

- The Community Rating System Coordinators Manual
- The Building Code Effectiveness Grading Schedule
- The ISO Mitigation online ISO's Public Protection website at http://www.isomitigation.com/ppc/0000/ppc0001.html
- The National Weather Service Storm Ready website at http://www.weather.gov/stormready/howto.htm
- The National Firewise Communities website at <u>http://firewise.org/</u>



F.) PROPOSED HAZARD MITIGATION INITIATIVES

Initiative #	Mitigation Initiative	Applies to New and/or Existing Structures*	Hazard(s) Mitigated	Goals / Objectives Met	Lead Agency	Estimated Cost	Sources of Funding	Time-line
TSA-1a	Where appropriate, support retrofitting of structures located in hazard-prone areas to protect structures from future damage, with repetitive loss and severe repetitive loss properties as priority. Identify facilities that are viable candidates for retrofitting based on cost- effectiveness versus relocation. Where retrofitting is determined to be a viable option, consider implementation of that action based on available funding.	Existing	Flood, Severe Storm	1-1, 1-2, 1-6; 2-5, 2-6; 3-2, 3-5, 6-1	Municipality (likely through NFIP Floodplain Administrator)	High	FEMA Mitigation Grant Programs and local match	Long-term
TSA-1b	Where appropriate, support purchase, or relocation of structures located in hazard-prone areas to protect structures from future damage, with repetitive loss and severe repetitive loss properties as priority. Identify facilities that are viable candidates for relocation based on cost- effectiveness versus retrofitting. Where relocation is determined to be a viable option, consider implementation of that action based on available funding.	Existing	Flood, Severe Storm	1-1, 1-2, 1-6; 2-5, 2-6; 3-2, 3-5; 6-1	Municipality (likely through NFIP Floodplain Administrator)	High	FEMA Mitigation Grant Programs and local match	Long-term
TSA-2	Conduct and facilitate community and promote and effect natural hazard ris Provide and maintain links to Onondaga County HMP web Prepare and distribute inform mitigation grant funding to m Use the village email notification	d public education k reduction: o the Onondaga (opages, national letters to nitigate their prop ation systems and	n and outreach fo County HMP web flood vulnerable erties, and instruct newsletters to b	r residents ar site, and regu property own cting them on etter educate	Ind businesses to in Ilarly post notices ers and neighbor how they can lea the public on floo	nclude, but no on the munici hood associati rn more and ir od insurance, t	t be limited to, the follow pal homepage referenci ons, explaining the avai nplement mitigation. he availability of mitigati	ring to ng the lability of on grant



Initiative #	Mitigation Initiative	Applies to New and/or Existing Structures*	Hazard(s) Mitigated	Goals / Objectives Met	Lead Agency	Estimated Cost	Sources of Funding	Time-line			
	 funding, and personal natural hazard risk reduction measures. Work with neighborhood associations, civic and business groups to disseminate information on flood insurance and the availability of mitigation grant funding. Municipal outreach activities to be supported by the County, as identified at County initiative OC-0. 										
	<mark>See above.</mark>	N/A	<mark>All Hazards</mark>	All Goals	Municipal officials and floodplain administrators supported by the County (through SOCPA and EM)	Low	County and Municipal Budgets; grant eligible for a defined outreach program	Short			
TSA-3	Continue to support the implementation, monitoring, maintenance, and updating of this Plan, as defined in Section 7.0	New & Existing	All Hazards	All Goals and Objectives	Municipality (through mitigation planning point of contacts)	Low	Local Budget, possibly FEMA Mitigation Grant Funding for 5-year update	Ongoing			
TSA-4	Maintain compliance with and good-standing in the NFIP including adoption and enforcement of floodplain management requirements (e.g. regulating all new and substantially improved construction in Special Hazard Flood Areas), floodplain identification and mapping, and flood insurance outreach to the community. Further meet and/or exceed the minimum NFIP standards and criteria through the following NFIP-related continued compliance actions identified as Initiatives TS-1a, 1b, 2, 8, and 10 through 22.	New & Existing	Flood	2-4; 3-5, 3-6	Municipality (likely through NFIP Floodplain Administrator)	Low	Local Budget	Ongoing			
TSA-5	Continue to develop, enhance, and	New &	All Hazards	1-4; 5-5;	Municipal	Low -	Local Budget	Ongoing			



Initiative #	Mitigation Initiative	Applies to New and/or Existing Structures*	Hazard(s) Mitigated	Goals / Objectives Met	Lead Agency	Estimated Cost	Sources of Funding	Time-line
	implement existing emergency plans.	Existing		Goal 6 – All Objectives	Emergency Manager with support from County OEM and SEMO	Medium		
TSA-6	Create/enhance/ maintain mutual aid agreements with neighboring communities.	New & Existing	All Hazards	3-3; 5-2, 5-3, 5-5, 5-6; 6-5, 6-6	Local Emergency Management, DPW and Roads	Low - Medium	Local Budget	Ongoing
TSA-7	Support County-wide initiatives identified in Section 9.1 of the County Annex.	New & Existing	All Hazards	All Goals and Objectives	Local departments (as applicable for specific initiative)	Low - Medium	Local Budget	Ongoing
TSA-8	Support/Participate in the Stream Team program offered by the Onondaga County SWCD, to assist in the removal of debris, log jams, etc. in flood vulnerable stream sections.	New & Existing	Flood, Severe Storms	1-3, 1-7; 2-3; 4-1,4- 4; 5-1, 5- 2, 5-3	County, OCSWCD (Mark Burger)	Low – Medium	Local Budget	TBD
TSA-9	Participate in and encourage multi- jurisdictional MS4 activities	N/A	Flood, Severe Storms	1-2, 1-6, 1-8; 3-2, 3-4; 5-3	TSA , NYSDEC	Low	Local Budget	Ongoing
TSA-10	Build new Town highway building in area outside of 100 year flood area	New	Flood	1-2, 1-4, 1-6; 3-2, 3-4, 3-5; 6-3, 6-5	TSA	High	Local Budget HMA Grant	TBD
TSA-11	Add additional and update existing storm water drainage.	New & Existing	Flood, Severe Storms	1-2, 1-6; 3-2, 3-4	TSA	Medium- High	Local, State Grants	Ongoing
TSA-12	Maintain existing Storm water drainage and Floodways	New & Existing	Flood & Severe Storms	1-2, 1-6; 3-2, 3-4; 4-1, 4-2	TSA	Low	Local Budget	Ongoing
TSA-13	Increase the ability of highway to	New &	Severe	1-4, 1-6;	TSA	Low-	Local Budget	Ongoing



Initiative #	Mitigation Initiative	Applies to New and/or Existing Structures*	Hazard(s) Mitigated	Goals / Objectives Met	Lead Agency	Estimated Cost	Sources of Funding	Time-line
	maintain the safe flow of traffic during severe storm event with such activities as updating or replacement of existing equipment and maintaining personnel during storms.	Existing	Storms and Severe Winter Storms	3-2, 3-4; 5-5; 6-3, 6-5, 6-6		Medium		
TSA-14	Implement a total GIS system for all applicable town operations to better identify where to limit future development or redevelopment and maintain a clearer picture impacts on existing town operations.	New and Existing	All hazards	3-1, 3-4; 4-3, 4-4; 5-1, 5-3, 5-5; 6-3, 6-5	Planning & Development and Highway	Medium – High	Local Budget	Ongoing
TSA-15	As identified in the 2006 Beartrap- Ley Creek Drainage District Study, the confluence of the Ley Creek North and South Branches, and the nearby Sanders Creek 'bottleneck' from Townline Road to the confluence with Ley Creek – North Branch and Ley Creek – North Branch. Support a detailed survey within the area to allow for a more precise determination of the limits of flooding impacts because the Beartrap-Ley Creek Drainage Study (2006) was based on 10-foot contours and the inundation mapping created may be conservative. The Ley Creek Main stem flows through the City of Syracuse and the Towns of Salina and Dewitt.	N/A	Flood, Severe Storms	1-3; 4-1, 4-2	OC Dept of Water Environment Protection; Beartrap-Ley Creek Drainage District	Medium	FEMA HMA; OC and/or local budget	DOF
TSA-16	As identified in the 2006 Beartrap- Ley Creek Drainage District Study, continue to support existing Beartrap-Ley Creek District channel maintenance and inspection	New & Existing	Flood, Severe Storms	1-2, 1-6; 4-1, 4-2	OC Dept of Water Environment Protection; Beartrap-Ley	Low to Medium	County/ District/ Local Budgets	Ongoing



Initiative #	Mitigation Initiative	Applies to New and/or Existing Structures*	Hazard(s) Mitigated	Goals / Objectives Met	Lead Agency	Estimated Cost	Sources of Funding	Time-line
	programs within Ley Creek – Main Stem to ensure that debris does not accumulate in the watercourse. The Ley Creek Main stem flows through the City of Syracuse and the Towns of Salina and Dewitt.				Creek Drainage District			
TSA-17	As identified in the 2006 Beartrap- Ley Creek Drainage District Study, continue to support existing maintenance and inspection activities of Beartrap Creek and its culverts to ensure they remain clear of debris, structurally sound and operable.	N/A	Flood, Severe Storms	1-2, 1-6; 4-1, 4-2; 5-1	OC Dept of Water Environment Protection; Beartrap-Ley Creek Drainage District; Town	Low - Medium	County/ District/ Local Budgets	Ongoing
TSA-18	As identified in the 2006 Beartrap- Ley Creek Drainage District Study, support the monitoring of future development within the overbanks of the Beartrap Creek to ensure preservation of these natural overbanks for flood storage and minimize flooding along this reach.	New & Existing	Flood, Severe Storms	4-1, 4-2, 4-3, 4-4; 5-1	OC Dept of Water Environment Protection; Beartrap-Ley Creek Drainage District; Town	Low	County/ District/ Local Budgets	Short
TSA-19	As identified in the 2006 Beartrap- Ley Creek Drainage District Study, along Teall Brook, widen channel and/or reroute just upstream of the underground piped section at East Hampton Place to increase conveyance capacity of the channel up to the underground section. Two alternatives are summarized in the Beartrap-Ley Creek Drainage District Study (2006) from a 2003 report: 1) Remove the bridge at the north end of the Norwood Park athletic fields near Eastridge Drive and widen the channel throughout	Existing	Flood, Severe Storms	1-2, 1-6; 5-1	OC Dept of Water Environment Protection; Beartrap-Ley Creek Drainage District; Town	Low - High	FEMA HMA; County/ District/ Local Budgets	DOF

Initiative #	Mitigation Initiative	Applies to New and/or Existing Structures*	Hazard(s) Mitigated	Goals / Objectives Met	Lead Agency	Estimated Cost	Sources of Funding	Time-line
	the length of Norwood Park area; 2) Reroute and cover the existing channel in the area of the Norwood Park athletic fields and widen the remainder of the channel within the Norwood Park area. The 2006 study indicates these improvements would result in limited reductions in water surface elevation upstream but would still be valid for small storm events (5- year or less) but will not provide adequate conveyance of the design event.							
TSA-20	The Beartrap-Ley Creek Drainage District is flat and heavily urbanized making the lowest areas extremely vulnerable to rain-event flooding that approach or exceed 5-year storms. Conduct /support a more detailed topographic study in the identified critical areas in the 2006 Beartrap-Ley Creek Drainage District Study to determine which individual properties are most at risk to assist with determining mitigation actions.	N/A	Flood, Severe Storms	1-2, 1-3; 5-1	OC Dept of Water Environment Protection; Beartrap-Ley Creek Drainage District; TOwn	Low- Medium	FEMA HMA; District/County/Local budgets	DOF
TSA-21	Determine if a Community Assistance Visit (CAV) or Community Assistance Contact (CAC) is needed, and schedule if needed.	NA	Flood, Severe Storms	All Goals	NFIP Floodplain Administrator, with support from NYSDEC, SOEM, FEMA	Low	Municipal Budget	<mark>Short</mark> (year 1)
TSA-22	Participate in regional, county and/or support enhanced risk assessment ei Comprehensive Data Management S	state level projec fforts. Such prog ystem (CDMS) w	ts and programs rams may include hich could be use	to develop im e developing a ed for various	proved structure a detailed invento planning and em	and facility inv ry of critical fa ergency mana	ventories and hazard dat cilities based upon FEM agement purposes includ	asets to A's ling:



Initiative #	Mitigation Initiative	Applies to New and/or Existing Structures*	Hazard(s) Mitigated	Goals / Objectives Met	Lead Agency	Estimated Cost	Sources of Funding	Time-line		
	 Support the performance of enhanced risk and vulnerability assessments for hazards including flooding, earthquake, wind, and land failure Support state, county and local planning efforts including mitigation (including updates to the State HMP), comprehensive emergency management, debris management, and land use. Improved structural and facility inventories could incorporate flood, wind and seismic-specific parameters (e.g. first floor elevations, roof types, structypes) based on FEMA-154 "Rapid Visual Screening of Buildings for Potential Seismic Hazards" methodologies, or "Rapid Observation of Vulnerabi and Estimation of Risk - ROVER. It is recognized that these programs will likely need to be initiated and supported at the Regional and/or State level and will likely require training. tools and funding provided at the regional state and/or federal level. 									
	<mark>See above.</mark>	Existing	<mark>All Hazards</mark>	1-2, 1-4, 1-6; 2-3; 3-2; 5-2, 5-3; 6-2, 6-3, 6-5	Local building code official and/or engineer working with OC EM	<mark>M-H</mark>	Regional funding; Mitigation grant programs (PDM or HMGP) with local match	Long		

Notes: DOF = Depending on Funding. FEMA = Federal Emergency Management Agency. Long = 5 years or greater. N/A = Not applicable. Short = 1 to 5 years. TBD = To be determined. TSA = Town of Salina.

*Does this mitigation initiative reduce the effects of hazards on new and/or existing buildings and/or infrastructure?



G.) ANALYSIS OF MITIGATION ACTIONS

This table summarizes the participant's mitigation actions by hazard of concern and the six mitigation types to illustrate that the Town has selected a comprehensive range of actions/projects.

	Mitigation Type							
Hazard of Concern	1. Prevention	2. Property Protection	3. Public Education and Awareness	4. Natural Resource Protection	5. Emergency Services	6. Structural Projects		
Earthquake	TSA-3, TSA-7, TSA- 14	TSA-3, TSA-7	<mark>TSA-2,</mark> TSA-3, TSA- 7 <mark>, TSA-22</mark>	TSA-3, TSA-7	TSA-3, TSA-5, TSA-6, TSA-7 <mark>, TSA-</mark> <mark>22</mark>	TSA-3, TSA-7		
Flooding (riverine, flash, coastal and urban flooding)	TSA-3, TSA-4, TSA-7, TSA- 8, TSA-9, TSA-14 – 17, TSA-20, <mark>TSA-21</mark>	TSA-1a and b, TSA- 3, TSA-4, TSA-7, TSA-10, TSA-11, TSA-12, TSA-19	TSA-1a and b, <mark>TSA- 2,</mark> TSA-3, TSA-4, TSA-7 <mark>, TSA-22</mark>	TSA-3, TSA-7, TSA- 8, TSA-16, TSA-19	TSA-3, TSA-5, TSA-6, TSA-7 <mark>, TSA-22</mark>	TSA-3, TSA-7		
Ground Failure	TSA-3, TSA-7, TSA- 14	TSA-3, TSA-7	<mark>TSA-2,</mark> TSA-3, TSA- 7 <mark>, TSA-22</mark>	TSA-3, TSA-7	TSA-3, TSA-5, TSA-6, TSA-7 <mark>, TSA-</mark> <mark>22</mark>	TSA-3, TSA-7		
Severe Storms (windstorms, thunderstorms, hail, lightning and tornados)	TSA-3, TSA-4, TSA-7, TSA- 8, TSA-9, TSA-14 - 17, TSA-20, <mark>TSA-21</mark>	TSA-1a and b, TSA- 3, TSA-4, TSA-7, TSA-11, TSA-12, TSA-19	TSA-1a and b, <mark>TSA-</mark> <mark>2,</mark> TSA-3, TSA-4, TSA-7 <mark>, TSA-22</mark>	TSA-3, TSA-7, TSA- 8, TSA-16, TSA-19	TSA-3, TSA-5, TSA-6, TSA-7, TSA-13 <mark>,</mark> <mark>TSA-22</mark>	TSA-3, TSA-7		
Severe Winter Storm (heavy snow, blizzards, ice storms)	TSA-3, TSA-7, TSA- 14	TSA-3, TSA-7	<mark>TSA-2,</mark> TSA-3, TSA- 7 <mark>, TSA-22</mark>	TSA-3, TSA-7	TSA-3, TSA-5, TSA-6, TSA-7, TSA- 13 <mark>, TSA-22</mark>	TSA-3, TSA-7		

Notes:

1. **Prevention:** Government, administrative or regulatory actions or processes that influence the way land and buildings are developed and built. These actions also include public activities to reduce hazard losses. Examples include planning and zoning, floodplain local laws, capital improvement programs, open space preservation, and storm water management regulations.

2. Property Protection: Actions that involve (1) modification of existing buildings or structures to protect them from a hazard or (2) removal of the structures from the hazard area. Examples include acquisition, elevation, relocation, structural retrofits, storm shutters, and shatter-resistant glass.

3. Public Education and Awareness: Actions to inform and educate citizens, elected officials, and property owners about hazards and potential ways to mitigate them. Such actions include outreach projects, real estate disclosure, hazard information centers, and school-age and adult education programs.

4. Natural Resource Protection: Actions that minimize hazard loss and also preserve or restore the functions of natural systems. These actions include sediment and erosion control, stream corridor restoration, watershed management, forest and vegetation management, and wetland restoration and preservation.

5. Emergency Services: Actions that protect people and property, during and immediately following, a disaster or hazard event. Services include warning systems, emergency response services, and the protection of essential facilities.

6. Structural Projects: Actions that involve the construction of structures to reduce the impact of a hazard. Such structures include dams, setback levees, floodwalls, retaining walls, and safe rooms.



H.) PRIORITIZATION OF MITIGATION INITIATIVES

Initiative #	# of Objectives met	Benefits	Costs	Do Benefits equal or exceed Costs? (Yes or No)	ls project Grant eligible? (Yes or No)	Can Project be funded under existing programs/budgets? (Yes or No)	Priority (High, Med., Low)
TSA-1a	8	н	Н	Y	Y	Ν	M-H*
TSA-1b	8	н	Н	Y	Y	Ν	M-H*
TSA-2	<mark>38</mark>	M	L	Y	Y (for defined outreach project)	Y	H
TSA-3	38	М	М	Y	N (Yes for 5 year update)	Υ	н
TSA-4	3	н	L	Y	N	Υ	н
TSA-5	8	м	L	Y	Ν	Y	Н
TSA-6	7	М	L	Y	N	Y	н
TSA-7	38	M-H	L-M	Y	Dependant on specific initiative	Dependant on specific initiative	M-H (dependant)
TSA-8	8	н	L-H	Y	Y	Dependant on specific initiative	М
TSA-9	6	М	L	Y	Ν	Υ	M-H
TSA-10	8	м	н	Y	Ν	Ν	L-M
TSA-11	4	М	М	Y	N	Y	M-H
TSA-12	6	M-H	L	Y	N	Y	М
TSA-13	8	M-H	L-M	Y	N	Y	L-M
TSA-14	9	M-H	M-H	Y	N	Y	M-H
TSA-15	3	М	L-M	Y	Y	Ν	М
TSA-16	4	М	М	Y	N	Y	н
TSA-17	5	М	L - M	Y	Ν	Y	Н
TSA-18	5	М	L	Y	Ν	?	М



TSA-19	3	Н	L-H	Y	Dependant on specific initiative	Y (local match?)	М
TSA-20	3	М	L-M	Y	Y	Local Match Dependant on specific initiative	М
TSA-21	<mark>38</mark>	L	L	Y	N	Y	M
TSA-22	<mark>8</mark>	<mark>M-H</mark>	M-H	Y	Y	N	M

Notes: H = High. L = Low. M = Medium. N = No. N/A = Not applicable. Y = Yes.

* This initiative has a "Medium" priority based on the prioritization scheme used in this planning process (implementation dependent on grant funding), however it is recognized that addressing repetitive and severe repetitive loss properties is considered a high priority by FEMA and SEMO (as expressed in the State HMP), and thus shall be considered a "High" priority for all participants in this planning process.

Explanation of Priorities

- *High Priority* A project that meets multiple objectives (i.e., multiple hazards), benefits exceeds cost, has funding secured or is an on-going project and project meets eligibility requirements for the Hazard Mitigation Grant Program (HMGP) or Pre-Disaster Mitigation Grant Program (PDM) programs. High priority projects can be completed in the short term (1 to 5 years).
- *Medium Priority* A project that meets goals and objectives, benefits exceeds costs, funding has not been secured but project is grant eligible under, HMGP, PDM or other grant programs. Project can be completed in the short term, once funding is completed. Medium priority projects will become high priority projects once funding is secured.
- *Low Priority* Any project that will mitigate the risk of a hazard, benefits do not exceed the costs or are difficult to quantify, funding has not been secured and project is not eligible for HMGP or PDM grant funding, and time line for completion is considered long term (1 to 10 years). Low priority projects may be eligible other sources of grant funding from other programs. A low priority project could become a high priority project once funding is secured as long as it could be completed in the short term.

Prioritization of initiatives was based on above definitions: Yes

Prioritization of initiatives was based on parameters other than stated above: Not applicable.

I.) FUTURE NEEDS TO BETTER UNDERSTAND RISK/VULNERABILITY

None at this time.

J.) HAZARD AREA EXTENT AND LOCATION

A hazard area extent and location map has been generated and is provided below for the Town of Salina to illustrate the probable areas impacted within the Town. This map is based on the best available data at the time of the preparation of this Plan, and is considered to be adequate for planning purposes. Maps have only been generated for those hazards that can be clearly identified using mapping techniques and technologies, and for which the Town of Salina has significant exposure. The County maps are provided in the hazard profiles within Section 5.4, Volume I of this Plan.



K.) ADDITIONAL COMMENTS

No additional comments at this time.





Sources: FEMA Q3; FEMA Region II, 2008; HAZUS-MH MR3; NYSDPC, 2008 Notes: Est. = Estimated; NFIP = National Flood Insurance Program

The entire municipality is vulnerable to the following hazards: earthquake, severe storm, and severe winter storm.

