## SKAGIT COUNTY GOVERNMENT SUGGESTED MITIGATION STRATEGIES AND PROJECTS

It should be noted that although the various mitigation strategies and/or projects listed on the following pages are contained in the Unincorporated Skagit County portion of this section of the <u>Skagit County Natural Hazards Mitigation Plan</u>, many of these mitigation strategies and/or projects would most likely benefit multiple jurisdictions and may ultimately be paid for from a variety of sources.

While these mitigation strategies and/or projects have been suggested by various county officials and staff throughout the plan development process; at this time, these strategies and/or projects have not been officially adopted by the Skagit County Board of Commissioners and funding for these strategies and/or projects has not been allocated. Funding for these mitigation strategies and/or projects is dependent upon Skagit County receiving future federal and/or state hazard mitigation grant funding.

## EARTHQUAKE:

 Implement a public education program within Skagit County to better inform citizens as to the earthquake hazard that exists locally and provide citizens with information to better prepare for and recover from a damaging earthquake.

LEAD AGENCY:	Skagit County Department of Emergency Management
FUNDING SOURCE:	Pre-Disaster Mitigation Program
TIME-LINE:	Short Term (less than 3 years from funding)

 Provide for the increased safety of employees and the public through the implementation of a non-structural earthquake mitigation program in all county-owned buildings.

LEAD AGENCY:	Skagit County Facility Management Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program
TIME-LINE:	Long Term (more than 3 years from funding)

 Re-locate all above-ground utilities underground within 300 feet of all county-owned buildings to facilitate egress of employees and citizens and ingress of emergency response personnel following a damaging earthquake.

LEAD AGENCY:	Skagit County Facility Management Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program
TIME-LINE:	Long Term (more than 3 years from funding)

 Evaluate, and prioritize all Skagit County transportation infrastructure systems for needed seismic retro-fitting.

LEAD AGENCY:	Skagit County Public Works Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program
TIME-LINE:	Short Term (less than 3 years from funding)

 Retro-fit and/or reconstruct county-owned transportation systems/facilities, and drainage structures to better withstand damage from a major earthquake.

LEAD AGENCY:	Skagit County Public Works Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program
TIME-LINE:	Long Term (more than 3 years from funding)

 Retro-fit and/or reconstruct county-owned buildings/facilities to better withstand damage from a major earthquake.

LEAD AGENCY:	Skagit County Facility Management Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program
TIME-LINE:	Long Term (more than 3 years from funding)

 Reconstruct, strengthen, and/or retro-fit local emergency communications structures, facilities, and equipment to better withstand the effects of a major earthquake and aid in post-disaster communication capabilities of first response agencies.

LEAD AGENCY:	Skagit 9-1-1
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant Program
TIME-LINE:	Long Term (more than 3 years from funding)

## FIRE:

 In cooperation with the Washington State Department of Natural Resources, implement a *FIRE WISE* public education program within Skagit County to better inform citizens as to the wildland-urban interface fire hazard that exists locally and provide citizens with information to better prepare for and survive a catastrophic wildland-urban interface fire.

LEAD AGENCY:	Skagit County Fire Marshal's Office
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program
TIME-LINE:	Short Term (less than 3 years from funding)

## FLOOD:

 In cooperation with various Community Rating System programs that currently exist in Skagit County, continue and expand the existing on-going public education program to inform the residents of Skagit County as to the flood risk in Skagit County and to provide citizens with the information they need to prepare for a catastrophic flood event.

LEAD AGENCY:	Skagit County Public Works Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program
TIME-LINE:	Current and On-Going

 In cooperation with various Community Rating System programs that currently exist in Skagit County, establish and conduct an on-going public education/awareness program to encourage those persons who live and/or own property within the 100-year floodplain to purchase flood insurance.

LEAD AGENCY:	Skagit County Public Works Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program
TIME-LINE:	Long Term (more than 3 years from funding)

 Re-locate the Skagit County Information Services Department facilities and equipment out of the floodplain of the Skagit River.

LEAD AGENCY:	Skagit County Information Services Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program
TIME-LINE:	Long Term (more than 3 years from funding)

 Enhance the capabilities and/or systems/programs of the Skagit County GIS Department to provide for increased services and information to aid the citizens of Skagit County during a natural disaster event.

LEAD AGENCY:	Skagit County GIS Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program
TIME-LINE:	Long Term (more than 3 years from funding)

 Provide for inter-operability of emergency communications systems to enhance postdisaster communications capabilities of first response agencies.

LEAD AGENCY:	Skagit 9-1-1
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program
TIME-LINE:	Long Term (more than 3 years from funding)

 Enact additional regulations at the local level that will serve to restrict future construction of residential structures and non-agricultural related development within the 100-year floodplain.

LEAD AGENCY:	Skagit County Planning Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program
TIME-LINE:	Long Term (more than 3 years from funding)

 Develop evacuation plans for the 100-year floodplain that may include signed flood evacuation routes as well as siren warning systems and/or telephone warning systems to alert residents of imminent danger.

LEAD AGENCY:	Skagit County Department of Emergency Management
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program
TIME-LINE:	Long Term (more than 3 years from funding)

Increase the storage capacity at various hydro-electric dams in the upper Skagit Valley.

LEAD AGENCY:	Skagit County Public Works Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program, Water Resources Development Act
TIME-LINE:	Short Term (less than 3 years from funding)

 Continue to conduct buy-out programs, elevation programs, and/or flood-proofing programs for repetitive loss properties within the 100-year floodplain.

LEAD AGENCY:	Skagit County Planning Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program
TIME-LINE:	Short Term (less than 3 years from funding)

 Develop and implement a variety of flood control projects designed to reduce peak flow rates of the Skagit River during flood events.

LEAD AGENCY:	Skagit County Public Works Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program, Water Resources Development Act
TIME-LINE:	Long Term (more than 3 years from funding)

 Develop and implement a variety of flood control projects designed to provide for 50year or greater flood protection for all areas of the 100-year floodplain downstream of the Sedro-Woolley Wastewater Treatment Facility.

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LEAD AGENCY:	Skagit County Public Works Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program, Water Resources Development Act
TIME-LINE:	Long Term (more than 3 years from funding)

 Reduce the current flood risk to both urban and rural populations by providing for the increase of the peak flow capacity of the Skagit River downstream of the Sterling Bend via the construction of one or more flood by-pass channel(s) and/or setting all existing levees back further from the river.

LEAD AGENCY:	Skagit County Public Works Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program, Water Resources Development Act
TIME-LINE:	Long Term (more than 3 years from funding)

 Provide for and implement a program to manage interior drainage; plan for drainage of floodwater out through sea dikes.

LEAD AGENCY:	Skagit County Public Works Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program, Water Resources Development Act, Washington State
	Department of Ecology Flood Control Assistance Account
	Program (FCAAP)
TIME-LINE:	Long Term (more than 3 years from funding)

 Provide for and implement a program to retro-fit the existing municipal, county, state, and railway transportation infrastructure and design newly constructed municipal, county, state and railway transportation infrastructure to allow for the passage of high flows of floodwaters presently impeded by the design and construction of this infrastructure.

LEAD AGENCY:	Skagit County Public Works Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program, Federal Highway Administration
TIME-LINE:	Long Term (more than 3 years from funding)

 Provide for and implement a program to provide 50-year or greater flood protection for the State Route #20 corridor between Interstate #5 and the Swinomish Channel.

LEAD AGENCY:	Skagit County Public Works Department
FUNDING SOURCE:	Pre-Disaster Mitigation Program; Hazard Mitigation Grant
	Program, Water Resources Development Act, Washington State
	Department of Ecology Flood Control Assistance Account
	Program (FCAAP)
TIME-LINE:	Long Term (more than 3 years from funding)

The photographs below show the segment of the Skagit River immediately upstream of the Avon Bend as the river exists today and how it would possibly look after construction of the Avon Bypass and associated levee set-back work.



The photo above is an aerial view of the Skagit River looking westerly (downstream) with the Avon Bend in the distance. The City of Burlington is located to the right and the City of Mount Vernon is located to the left.



The photo above is a conceptual view of the Skagit River looking westerly with the Avon Bend in the distance. In this view, levees have re-located to provide a wider river channel and the proposed Avon Bypass is shown in the distance.