Dam Safety & Emergency Preparedness

Rhode Island Emergency Management Agency in Collaboration with Rhode Island Department of Environmental Management
Dam Emergency Action Plans

Who Uses EAPs?

– Dam owners
– Emergency Management Directors
– Emergency responders
– State and Municipal Officials
– Downstream residents
– Businesses/Agriculture
– Schools/Hospitals/Nursing Homes
– Transportation/Utilities
What is a Dam EAP?

- A Dam Emergency Action Plan (EAP) is a plan of action to reduce potential property damage and loss of life in an area affected by a dam failure.
- An EAP may include, but is not limited to, the following:
  - Dam location and engineering data
  - Dam ownership information
  - Definitions of dam emergency situations and responses
  - A prioritized ‘call tree’ for notifications
  - A dam failure inundation map of potential affected areas
  - Other crucial information
How to Create an EAP

• Coordinate with your Local Emergency Management Director. They are the best source for emergency contacts and other pertinent information, and will generally be the lead on creating the plan

• It is recommended the plan lead utilize the RIEMA/RIDEM EAP template to generate the plan

• Attend training on EAPs, when available
The EAP Purpose

• Rhode Island had 180 high and significant hazard dams
• Identifies the areas, structures, facilities and roads that could be affected by dam failure
• Establishes a monitoring system which can activate the plan
• Identifies the corresponding official(s), organizations, and agencies along with their responsibilities in regards to implementing the plan
Why Does an EAP Matter?

• It is the law: RIGL § 46-19-9
  http://webserver.rilin.state.ri.us/Statutes/TITLE46/46-19/46-19-9.HTM

• EAPs save lives

• EAPs guide evacuation planning

• All high and significant hazard dams must have an EAP. An EAP is not considered complete until it is approved by both Rhode Island Emergency Management Agency (RIEMA) and Rhode Island Department of Environmental Management (RI DEM)
Rhode Island DEM’s 3-Tier Classification System

• The RI DEM uses a 3-tier system, which rates dams based upon the probable consequences of a failure

  – **High Hazard**: Failure or mis-operation of a dam will result in a probable loss of human life
  
  – **Significant Hazard**: Failure or mis-operation of a dam results in no probable loss of human life, but can cause major economic loss, disruption of lifeline facilities or impact to the public’s health, safety or welfare

  – **Low Hazard**: Failure or mis-operation of a dam results in no probable loss of human life and low economic losses
Rhode Island DEM’s 3-Tier Classification System Continued

• Any dam owner may be ordered to create an EAP regardless of hazard classification if deemed necessary by RI DEM

• EAPs shall be updated annually by the party or parties responsible and copies shall be given to RIEMA, RI DEM, local municipality or local emergency management agency and the local police department

• State agencies that own dams are responsible for creating dam EAPs for all high and significant dams in cooperation with the local municipality
Successes
Challenges
Ongoing Activities

• Continuing coordination efforts with RIDEM
• Obtained Inundation Map studies and data from RIDEM to include into the EAP template
• Coordinating dam safety activity with the local cities and towns to ensure planning needs are met
Future Activities

• Continue to coordinate with RIDEM and the local communities pertaining to dam safety planning
• Discuss and exchange information among agency partners to ensure collaboration before, during, and after a potential dam incident
Discussion & Questions