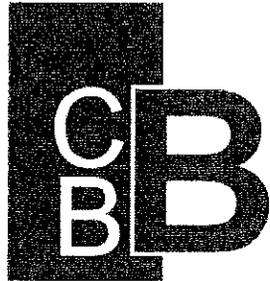


PART II - pg 76 to end



**MULTI-HAZARD MITIGATION
PLAN UPDATE**

Hancock County, Indiana

Prepared for:

Hancock County, Indiana
Town of Cumberland, Indiana
Town of Fortville
City of Greenfield, Indiana
Town of McCordsville, Indiana
Town of New Palestine, Indiana
Town of Spring Lake, Indiana

June 2016

Prepared by

Christopher B. Burke Engineering, LLC
115 West Washington Street, Suite 1368 South
Indianapolis, Indiana 46204

CBBEL Project No. 14-690

This page intentionally blank

Table 4-1 Proposed Mitigation Practices

MITIGATION PRACTICE	MITIGATION STRATEGY	HAZARD ADDRESSED	STATUS	PRIORITY	BENEFIT-COST RATIO	RESPONSIBLE ENTITY	FUNDING SOURCE
<p>Management of High Hazard Dams</p> <ol style="list-style-type: none"> 1. Complete IEAP and annual exercise for existing and new high hazard dams 2. Review regular inspection and maintenance records of high hazard dams 	<input checked="" type="checkbox"/> Emergency Services <input checked="" type="checkbox"/> Nat. Res. Protection <input checked="" type="checkbox"/> Prevention <input checked="" type="checkbox"/> Property Protection <input checked="" type="checkbox"/> Public Information <input checked="" type="checkbox"/> Structural Control	<input type="checkbox"/> Drought <input type="checkbox"/> Earthquake <input type="checkbox"/> Extreme Temperature <input type="checkbox"/> Flood <input type="checkbox"/> Hail/Thunder/Wind <input type="checkbox"/> Tornado <input type="checkbox"/> Winter Storm/Ice <input checked="" type="checkbox"/> Dam Failure <input type="checkbox"/> HazMat Incident	<p>Ongoing –</p> <ol style="list-style-type: none"> 2. IDNR receives inspection reports and IEAP updates <p>Proposed Enhancements –</p> <ol style="list-style-type: none"> 1. Complete IEAP and annual exercise for Sugar Hills Lake Dam 2. Ensure inspections are reported and required improvements and repairs are completed in a timely manner 	High	High	Dam Owner EMA IDNR	Existing budget
<p>Geographic Information Systems</p> <ol style="list-style-type: none"> 1. Update and coordinate GIS layers with location and attributes of critical infrastructure 2. Train GIS staff in HAZUS-MH to quantitatively estimate losses in “what if scenarios” and continue to use the most recent GIS data in land use planning efforts. 3. Update HAZUS-MH Earthquake model with local soil data for more accurate damage estimates 	<input checked="" type="checkbox"/> Emergency Services <input checked="" type="checkbox"/> Nat. Res. Protection <input type="checkbox"/> Prevention <input checked="" type="checkbox"/> Property Protection <input checked="" type="checkbox"/> Public Information <input type="checkbox"/> Structural Control	<input checked="" type="checkbox"/> Drought <input checked="" type="checkbox"/> Earthquake <input checked="" type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input checked="" type="checkbox"/> Hail/Thunder/Wind <input checked="" type="checkbox"/> Tornado <input checked="" type="checkbox"/> Winter Storm/Ice <input checked="" type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident	<p>Ongoing –</p> <ol style="list-style-type: none"> 1. GIS is used by several communities 2. Some staff are familiar with HAZUS-MH <p>Proposed Enhancement –</p> <ol style="list-style-type: none"> 1. Coordinate consistent layers county-wide 2. Additional training for GIS staff 3. Update with local information 	High (update layers)	High	GIS Departments (County, Greenfield, McCordsville)	Existing Budget

MITIGATION PRACTICE	MITIGATION STRATEGY	HAZARD ADDRESSED	STATUS	PRIORITY	BENEFIT COST RATIO	RESPONSIBLE ENTITY	FUNDING SOURCE
<p>Emergency Preparedness & Warning</p> <ol style="list-style-type: none"> 1. Improve planning and coordination among event coordinators, facility owners, and emergency response teams 2. Implement recommendations of outdoor warning siren study to continue to alert population of severe weather conditions 3. Evaluate and utilize flood forecasting capabilities including stream gages, flood forecast maps, and flood alerts 4. Require weather radios in all critical infrastructure and encourage use by residents and businesses. 5. Improve disaster preparedness and emergency response at the local level through the CERT program 6. Increase awareness and participation in the Everbridge/NIXEL or Blackboard Connect notification system 7. Coordinate with private business owners utilizing large dynamic message boards for business to provide messages during hazardous events and recovery efforts. 8. Purchase additional mobile electronic messaging boards and develop protocol to provide current hazard information. 9. Convey flood height warnings from the USGS river gages in terms the general public can understand 10. Investigate the potential to develop a siren fund through payments made during development of subdivisions or industrial/commercial areas 11. Install permanent dynamic message board in highly visible area to provide current hazard information 	<p>Emergency Services <input checked="" type="checkbox"/> Nat. Res. Protection <input checked="" type="checkbox"/> Prevention <input checked="" type="checkbox"/> Property Protection <input checked="" type="checkbox"/> Public Information <input type="checkbox"/> Structural Control</p>	<p><input checked="" type="checkbox"/> Drought <input checked="" type="checkbox"/> Earthquake <input checked="" type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input checked="" type="checkbox"/> Hail/Thunder/Wind <input checked="" type="checkbox"/> Tornado <input checked="" type="checkbox"/> Winter Storm/Ice <input checked="" type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat incident</p>	<p>Ongoing –</p> <ol style="list-style-type: none"> 1. Some coordination with event planners 2. Outdoor warning siren study completed 3. The County has 1 real-time AHPs Stream Gage 4. Weather radios are provided during community events 5. Some citizens are CERT certified 6. NIXEL and Blackboard Connect are utilized 8. There are few mobile message boards within the County <p>Proposed Enhancements –</p> <ol style="list-style-type: none"> 1. Improve coordination with additional events and large gatherings 2. Continue to implement recommendations as funding allows 3. Continue to enhance warning system 4. Continue to provide weather radios 5. Rebuild and enhance the CERT program to have a representative or team in each community 6. Increase participation in notification programs 7. Coordinate with private business owners and develop list of willing participants 8. Purchase additional message boards to increase number to two per community 9. Develop information for providing flood height warnings from the USGS to the general public 10. Research, propose and adopt an ordinance creating a siren fund 11. Coordinate with INDOT to investigate the feasibility of adding a permanent message board 	<p>High (Improved planning, sirens, forecasting, weather radios, CERT, notification system, private message boards, mobile message boards)</p> <p>Moderate (flood height warnings, additional stream gage)</p> <p>Low (siren fund, permanent message boards)</p>	<p>High</p>	<p>EMA Red Cross Floodplain Administrator (County, Cumberland, Fortville, Greenfield, McCordsville, New Palestine, Spring Lake) Large facility or event coordinators Hancock County Surveyor INDOT</p>	<p>Existing budgets Grants</p>

MITIGATION PRACTICE	MITIGATION STRATEGY	HAZARD-ADDRESSED	STATUS	PRIORITY	BENEFIT-COST RATIO	RESPONSIBLE ENTITY	FUNDING SOURCE
<p>Public Education & Outreach</p> <ol style="list-style-type: none"> 1. Post information/warning signs in local parks and other public gathering places explaining what to do in case of a hazard event. 2. Provide multi-lingual hazard preparedness literature (warning sirens, radio stations, go-kits, insurance protection, lightning rods, etc.) during Severe Weather Awareness Week, at public facilities and events and to populations within known hazard areas such as floodplains, downstream of a dam, near hazmat facilities, etc. (2007 Measure) 3. Develop an education and outreach campaign encouraging residents to keep in contact with their neighbors during hazard events. 	<input checked="" type="checkbox"/> Emergency Services <input checked="" type="checkbox"/> Nat. Res. Protection <input checked="" type="checkbox"/> Prevention <input checked="" type="checkbox"/> Property Protection <input checked="" type="checkbox"/> Public Information <input type="checkbox"/> Structural Control	<input checked="" type="checkbox"/> Drought <input checked="" type="checkbox"/> Earthquake <input checked="" type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input checked="" type="checkbox"/> Hail/Thunder/Wind <input checked="" type="checkbox"/> Tornado <input checked="" type="checkbox"/> Winter Storm/Ice <input checked="" type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident	<p>Ongoing –</p> <ol style="list-style-type: none"> 1. Literature is provided at several public facilities and office locations as well as large public events throughout the County. Populations within the special flood hazard areas are educated through required flood insurance purchases and various website and literature pieces. <p>Proposed Enhancement –</p> <ol style="list-style-type: none"> 1. Post information in parks and other gathering places to various cultural groups and neighborhoods; Educate landowners within the dam inundation areas of the potential dangers and what to do in an emergency situation. Such as encourage voluntary purchase of federally-subsidized flood insurance; 2. Encourage the enhancement of the messages provided to various cultural groups and neighborhoods; Educate landowners within the dam inundation areas of the potential dangers and what to do in an emergency situation. Such as encourage voluntary purchase of federally-subsidized flood insurance; 3. Formalize a neighborhood or local campaign where community representatives familiar with the culture and language provide residents with emergency information and protocols. 	<p>High <i>(post info, multi-lingual education materials)</i></p> <p>Low <i>(neighbor campaign)</i></p>	<p>High</p>	<p>EMA Red Cross Municipal Offices (County, Cumberland, Fortville, Greenfield, McCordsville, New Palestine, Spring Lake)</p> <p>Parks Departments (County, Cumberland, Fortville, Greenfield, McCordsville, New Palestine)</p>	<p>Existing budget Grant</p>
<p>Community Rating System</p> <ol style="list-style-type: none"> 1. Reduce flood insurance premiums through increased participation or advancement in the NFIP's CRS Program. (2007 Measure) <i>(Will assist with NFIP compliance)</i> 	<input checked="" type="checkbox"/> Emergency Services <input checked="" type="checkbox"/> Nat. Res. Protection <input checked="" type="checkbox"/> Prevention <input checked="" type="checkbox"/> Property Protection <input checked="" type="checkbox"/> Public Information <input checked="" type="checkbox"/> Structural Control	<input type="checkbox"/> Drought <input type="checkbox"/> Earthquake <input type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input type="checkbox"/> Hail/Thunder/Wind <input type="checkbox"/> Tornado <input type="checkbox"/> Winter Storm/Ice <input type="checkbox"/> Dam Failure <input type="checkbox"/> HazMat Incident	<p>Ongoing –</p> <ol style="list-style-type: none"> 1. Hancock County participates at a Class 8 <p>Proposed Enhancement –</p> <ol style="list-style-type: none"> 1. Increased participation from County and entry from other communities 	<p>High</p>	<p>Moderate</p>	<p>Event Liaisons Floodplain Administrator (County, Cumberland, Fortville, Greenfield, McCordsville, New Palestine, Spring Lake)</p>	<p>Existing budget Grant</p>
<p>Hazardous Materials Response Team</p> <ol style="list-style-type: none"> 1. Maintain LEPC reporting and training efforts as required through SARA Title III and ensure current facility maps and response plans are on file for Tier II facilities. 	<input checked="" type="checkbox"/> Emergency Services <input checked="" type="checkbox"/> Nat. Res. Protection <input checked="" type="checkbox"/> Prevention <input checked="" type="checkbox"/> Property Protection <input type="checkbox"/> Public Information <input checked="" type="checkbox"/> Structural Control	<input type="checkbox"/> Drought <input type="checkbox"/> Earthquake <input type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input type="checkbox"/> Hail/Thunder/Wind <input type="checkbox"/> Tornado <input type="checkbox"/> Winter Storm/Ice <input type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident	<p>Ongoing –</p> <ol style="list-style-type: none"> 1. Records are maintained for most Tier II facilities <p>Proposed Enhancement –</p> <ol style="list-style-type: none"> 1. Efforts should be strengthened to ensure requirements are met. 	<p>High</p>	<p>Moderate</p>	<p>LEPC EMA Tier II Facility Owners</p>	<p>Existing Budget</p>

MITIGATION PRACTICE	MITIGATION STRATEGY	HAZARD ADDRESSED	STATUS	PRIORITY	BENEFIT-COST RATIO	RESPONSIBLE ENTITY	FUNDING SOURCE
<p>Stormwater Management</p> <ol style="list-style-type: none"> 1. Minimize impacts of flooding by diverting or retaining stormwater onsite using green infrastructure practices 2. Maintain channels and regulated drains to prevent localized flooding 3. Address flooding in low lying and urban areas due to poor drainage 	<input checked="" type="checkbox"/> Emergency Services <input checked="" type="checkbox"/> Nat. Res. Protection <input checked="" type="checkbox"/> Prevention <input checked="" type="checkbox"/> Property Protection <input checked="" type="checkbox"/> Public Information <input type="checkbox"/> Structural Control	<input type="checkbox"/> Drought <input type="checkbox"/> Earthquake <input type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input type="checkbox"/> Hail/Thunder/Wind <input type="checkbox"/> Tornado <input type="checkbox"/> Winter Storm/Ice <input type="checkbox"/> Dam Failure <input type="checkbox"/> HazMat Incident	<p>Ongoing –</p> <ol style="list-style-type: none"> 1. Channels and regulated drains are maintained as funding and staffing allow <p>Proposed Enhancement –</p> <ol style="list-style-type: none"> 1. Increase use of green infrastructure as feasible 2. Continue to maintain channels and drains 3. Investigate causes of non-riverine flooding 	<p>High</p>	<p>Moderate</p>	<p>Stormwater Department (County, Greenfield, McCordsville)</p> <p>Hancock County Surveyor</p> <p>Floodplain Administrators (County, Cumberland, Fortville, Greenfield, McCordsville, New Palestine, Spring Lake)</p>	<p>Existing Budget</p> <p>Grant</p>
<p>Transportation</p> <ol style="list-style-type: none"> 1. Study designated hazardous materials transportation routes and determine if laws are followed 2. Investigate status and prioritize enhancements for warning (flashing lights, crossing arms, rumble strips, signage) at each intersection between rail and road to reduce the potential for train/vehicular crashes 	<input checked="" type="checkbox"/> Emergency Services <input type="checkbox"/> Nat. Res. Protection <input checked="" type="checkbox"/> Prevention <input type="checkbox"/> Property Protection <input type="checkbox"/> Public Information <input checked="" type="checkbox"/> Structural Control	<input type="checkbox"/> Drought <input type="checkbox"/> Earthquake <input type="checkbox"/> Extreme Temperature <input type="checkbox"/> Flood <input type="checkbox"/> Hail/Thunder/Wind <input type="checkbox"/> Tornado <input type="checkbox"/> Winter Storm/Ice <input type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident	<p>Ongoing –</p> <ol style="list-style-type: none"> 1. Routes are well known or marked 2. Many crossings have barriers or warnings <p>Proposed Enhancement –</p> <ol style="list-style-type: none"> 1. Improve enforcement 2. Increase number of crossings with barriers or warnings 	<p>High</p>	<p>Moderate</p>	<p>County Highway</p> <p>Municipal Street and/or Utility Departments (County, Cumberland, Fortville, Greenfield, McCordsville, New Palestine, Spring Lake)</p>	<p>Existing Budget</p> <p>Grant</p>

MITIGATION PRACTICE	MITIGATION STRATEGY	HAZARD ADDRESSED	STATUS	PRIORITY	BENEFIT-COST RATIO	RESPONSIBLE ENTITY	FUNDING SOURCE
<p>Tree Maintenance</p> <ol style="list-style-type: none"> Maintain trees on public property and right-of-ways and encourage maintenance on private property to reduce the risk of downed utility lines and falling limbs 	<input checked="" type="checkbox"/> Emergency Services <input checked="" type="checkbox"/> Nat. Res. Protection <input checked="" type="checkbox"/> Prevention <input checked="" type="checkbox"/> Property Protection <input checked="" type="checkbox"/> Public Information <input type="checkbox"/> Structural Control	<input checked="" type="checkbox"/> Drought <input checked="" type="checkbox"/> Earthquake <input checked="" type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input checked="" type="checkbox"/> Hail/Thunder/Wind <input checked="" type="checkbox"/> Tornado <input checked="" type="checkbox"/> Winter Storm/Ice <input type="checkbox"/> Dam Failure <input type="checkbox"/> HazMat Incident	<p>Ongoing –</p> <ol style="list-style-type: none"> Utility providers perform routine maintenance along ROW <p>Proposed Enhancements – Encourage private landowners to perform maintenance or avoid planting improper trees and shrubs</p>	<p>High</p>	<p>Moderate</p>	<p>County Highway Municipal Street and/or Utility Departments (County, Cumberland, Fortville, Greenfield, McCordsville, New Palestine, Spring Lake)</p>	<p>Existing Budget Power Suppliers</p>
<p>Building Protection</p> <ol style="list-style-type: none"> Prohibit the development of new critical infrastructure in 1% & 0.2% annual chance flood hazard and potential dam failure inundation areas. (2007 Measure) Develop reciprocal agreements for structural inspections following hazardous events Relocate, buyout, or floodproof (non-residential) existing non-critical facilities subject to flooding Enforce tie-down and anchoring requirements for roof-mounted HVAC units Protect existing critical facilities in floodplains Encourage new or retrofitted critical facilities to incorporate structural bracing, shutters, laminated/impact-resistant glass and/or interlocking roof coverings to minimize damage Develop an inventory and complete an inspection of public and commercial buildings that may be particularly vulnerable to earthquake damage <p>(Will assist with NFIP compliance)</p>	<input checked="" type="checkbox"/> Emergency Services <input checked="" type="checkbox"/> Nat. Res. Protection <input checked="" type="checkbox"/> Prevention <input checked="" type="checkbox"/> Property Protection <input checked="" type="checkbox"/> Public Information <input checked="" type="checkbox"/> Structural Control	<input type="checkbox"/> Drought <input checked="" type="checkbox"/> Earthquake <input checked="" type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input checked="" type="checkbox"/> Hail/Thunder/Wind <input checked="" type="checkbox"/> Tornado <input checked="" type="checkbox"/> Winter Storm/Ice <input checked="" type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident	<p>Ongoing –</p> <ol style="list-style-type: none"> Ordinances prohibit construction of new critical facilities within the 0.2% annual chance flood area. <p>Proposed Enhancements –</p> <ol style="list-style-type: none"> Continue to discourage development within floodplains, include potential dam inundation areas. Develop agreements for post-event inspections Inventory and prioritize non-residential facilities for buyout or floodproofing Develop inspection program for roof mounted HVAC units Protect the structures identified in Table 3-10 Encourage enhancements for new or retrofitted municipal critical facilities Create an inventory of vulnerable buildings 	<p>High (prohibit development, reciprocal agreements, relocate, tie-downs)</p> <p>Moderate (protect critical facilities, new or retrofitted bracing, building inventory)</p>	<p>Moderate</p>	<p>Building Departments (County, Greenfield) EMA Floodplain Administrator (County, Cumberland, Fortville, Greenfield, McCordsville, New Palestine, Spring Lake) County Surveyor / Drainage Board Facility Owners</p>	<p>Grant Existing budget</p>

MITIGATION PRACTICE	MITIGATION STRATEGY	HAZARD ADDRESSED	STATUS	PRIORITY	BENEFIT-COST RATIO	RESPONSIBLE ENTITY	FUNDING SOURCE
<p>Land Use Planning & Zoning</p> <ol style="list-style-type: none"> Incorporate hazard information, risk assessment, and hazard mitigation practices into the Comprehensive Land Use Plan and Development Review to better guide future growth and development Conduct a Safe Growth Audit of development plans and codes 	<input checked="" type="checkbox"/> Emergency Services <input checked="" type="checkbox"/> Nat. Res. Protection <input checked="" type="checkbox"/> Prevention <input checked="" type="checkbox"/> Property Protection <input checked="" type="checkbox"/> Public Information <input checked="" type="checkbox"/> Structural Control	<input checked="" type="checkbox"/> Drought <input checked="" type="checkbox"/> Earthquake <input checked="" type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input checked="" type="checkbox"/> Hail/Thunder/Wind <input checked="" type="checkbox"/> Tornado <input checked="" type="checkbox"/> Winter Storm/ice <input checked="" type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident	<p>Ongoing –</p> <ol style="list-style-type: none"> Hazard information has been incorporated into some areas of the Comprehensive Land Use Plan <p>Proposed Enhancement –</p> <ol style="list-style-type: none"> Increase the number of hazards considered, more definitively outline higher risk areas and those that should be avoided for future development Conduct the audit and implement recommendations 	<p>High (incorporate hazard information)</p> <p>Moderate (growth audit)</p>	Moderate	Planning Departments (County, Cumberland, Greenfield, McCordsville)	Existing Budget
<p>Emergency Response & Recovery</p> <ol style="list-style-type: none"> Add mobile data terminals to all emergency response vehicles Establish procedures to alert and evacuate the population in known hazard areas (Tier II buffers, dam inundation areas) Develop and implement a voluntary immunization program for all emergency responders, inspection staff, and families Increase number of full time paid positions for fire departments and emergency response teams for responding to HazMat incidents Coordinate communications, documentation, and record keeping between NFIP communities and agencies including a database of accurate and community specific information following each hazard event Establish procedures to alert and evacuate the populations in known hazard areas (routinely flooded areas) 	<input checked="" type="checkbox"/> Emergency Services <input checked="" type="checkbox"/> Nat. Res. Protection <input checked="" type="checkbox"/> Prevention <input checked="" type="checkbox"/> Property Protection <input checked="" type="checkbox"/> Public Information <input type="checkbox"/> Structural Control	<input checked="" type="checkbox"/> Drought <input checked="" type="checkbox"/> Earthquake <input checked="" type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input checked="" type="checkbox"/> Hail/Thunder/Wind <input checked="" type="checkbox"/> Tornado <input checked="" type="checkbox"/> Winter Storm/ice <input checked="" type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident	<p>Ongoing –</p> <ol style="list-style-type: none"> Many vehicles have terminals <p>Proposed Enhancement –</p> <ol style="list-style-type: none"> Inventory all response vehicles and purchase terminals as able Establish procedures to evacuate areas near Tier II and dams Develop a wide-based immunization program Increase number of HazMat trained staff Coordinate response efforts following each hazard event Establish procedures to evacuate routinely flooded areas 	<p>High (terminals, evacuations for Tier II and dams, immunizations, full-time positions)</p> <p>Moderate (coordinate communications)</p> <p>Low (evacuation for flood areas)</p>	Moderate	DHS Sheriff Department Police Department (Cumberland, Fortville, Greenfield, McCordsville, New Palestine) Fire Departments (County, Cumberland, Fortville, Greenfield, McCordsville, New Palestine, Townships, Volunteers) Health Department County Highway Street/ Utility Department (Cumberland, Fortville, Greenfield, McCordsville, New Palestine)	Existing budget Grant

MITIGATION PRACTICE	MITIGATION STRATEGY	HAZARD/ADDRESSED	STATUS	PRIORITY	BENEFIT COST RATIO	RESPONSIBLE ENTITY	FUNDING SOURCE
<p>Floodplain Management</p> <ol style="list-style-type: none"> Prioritize and conduct detailed hydraulic analyses of areas with repetitive flooding problems and unnumbered Zone A streams to determine floodplain boundaries. (2007 Measure) Support FEMA approved flood depth mapping (RISKMAP) to better show the flood risk potential Create fluvial erosion hazard mapping to identify critical infrastructure that may be impacted by natural stream movement <p>(Will assist with NFIP compliance)</p>	<input checked="" type="checkbox"/> Emergency Services <input checked="" type="checkbox"/> Nat. Res. Protection <input checked="" type="checkbox"/> Prevention <input checked="" type="checkbox"/> Property Protection <input checked="" type="checkbox"/> Public Information <input checked="" type="checkbox"/> Structural Control	<input type="checkbox"/> Drought <input type="checkbox"/> Earthquake <input type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input type="checkbox"/> Hail/Thunder/Wind <input type="checkbox"/> Tornado <input type="checkbox"/> Winter Storm/Ice <input type="checkbox"/> Dam Failure <input type="checkbox"/> HazMat Incident	<p>Ongoing –</p> <p>Proposed Enhancements –</p> <ol style="list-style-type: none"> Complete analyses as appropriate to determine floodplain boundaries and flood depth grid mapping to include all flood prone areas within the County. Implement flood protection study recommendations as feasible Support flood depth mapping for prioritized areas Create the fluvial erosion hazard mapping 	<p>High (hydraulic analyses, RiskMAP)</p> <p>Low (fluvial erosion)</p>	<p>Moderate</p>	<p>Floodplain Administrator (County, Cumberland, Fortville, Greenfield, McCordsville, New Palestine, Spring Lake)</p> <p>Planning (County, Crawfordsville)</p> <p>County Surveyor / Drainage Board</p>	<p>Existing budget</p> <p>Grant</p>
<p>Safe Rooms and Community Shelters</p> <ol style="list-style-type: none"> Inventories areas of need and work to establish safer rooms and community shelters in vulnerable locations (mobile home parks, critical facilities, development without basements) Develop temporary and/or long term shelter agreements within the County. Potential for tiered levels of shelters, domestic animal shelters, etc. Clearly advertise location of safer areas and community shelters for large gatherings of people 	<input checked="" type="checkbox"/> Emergency Services <input type="checkbox"/> Nat. Res. Protection <input type="checkbox"/> Prevention <input type="checkbox"/> Property Protection <input checked="" type="checkbox"/> Public Information <input type="checkbox"/> Structural Control	<input type="checkbox"/> Drought <input checked="" type="checkbox"/> Earthquake <input checked="" type="checkbox"/> Extreme Temperature <input type="checkbox"/> Flood <input checked="" type="checkbox"/> Hail/Thunder/Wind <input checked="" type="checkbox"/> Tornado <input checked="" type="checkbox"/> Winter Storm/Ice <input checked="" type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident	<p>Ongoing –</p> <ol style="list-style-type: none"> Many buildings have plans on where to go in the event of a hazard <p>Proposed Enhancement –</p> <ol style="list-style-type: none"> Inventories municipal/public buildings, large employers, and vulnerable areas to determine if safest places are being utilized Continue to develop and assess agreements Advertise location of safer areas during large gatherings 	<p>High</p>	<p>Low</p>	<p>EMA</p> <p>Large gathering liaisons</p> <p>Red Cross</p>	<p>Existing budget</p>

MITIGATION PRACTICE	MITIGATION STRATEGY	HAZARD ADDRESSED	STATUS	PRIORITY	BENEFIT-COST RATIO	RESPONSIBLE ENTITY	FUNDING SOURCE
<p>Power Back-Up Generators</p> <ol style="list-style-type: none"> Investigate and secure a fuel reserve to ensure critical infrastructure are able to operate on generators for extended periods of time Encourage power back-up generators in all municipal critical facilities Secure funding and purchase additional mobile generators to utilize during or following hazard events Investigate critical facilities to determine whether appropriate wiring exists for a back-up generator Encourage burial of electrical lines in new and redeveloped areas or require designed-failure mode that allows lines to fail or fail in small sections 	<p> <input checked="" type="checkbox"/> Emergency Services <input type="checkbox"/> Nat. Res. Protection <input checked="" type="checkbox"/> Prevention <input checked="" type="checkbox"/> Property Protection <input checked="" type="checkbox"/> Public Information <input type="checkbox"/> Structural Control </p>	<p> <input type="checkbox"/> Drought <input checked="" type="checkbox"/> Earthquake <input checked="" type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input checked="" type="checkbox"/> Hail/Thunder/Wind <input checked="" type="checkbox"/> Tornado <input checked="" type="checkbox"/> Winter Storm/Ice <input checked="" type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident </p>	<p>Ongoing –</p> <p>Proposed Enhancements –</p> <ol style="list-style-type: none"> Conduct inventory of generator and fuel capacity Purchase additional mobile generators Determine if appropriate wiring is available at each critical facility Encourage burial of lines for new and re-development 	<p>High (fuel reserve, generators, mobile generators)</p> <p>Low (wiring, burial of lines)</p>	<p>Low</p>	<p>EMA</p>	<p>Existing budget</p>

CHAPTER 5**IMPLEMENTATION PLAN**

The following is a proposed plan for implementing all high priority mitigation practices identified in this Plan. It should be noted that implementation of each of these proposed practices may involve several preparatory or intermediary steps. However, to maintain clarity, not all preparatory or intermediary steps are included.

5.1 BUILDING PROTECTION

Prohibit the development of new critical infrastructure in 1% and 0.2% annual chance flood hazard areas and potential dam failure inundation areas.

- Review current zoning code and determine if amendments need to be made to strengthen the review process for structures in these hazard areas.
- Make any amendments necessary.
- Evaluate proposed development on a case-by-case basis and determine risk for flood damages.
- Suggest flood protection measures for any development allowed in the flood risk areas.

Enforce tie-down and anchoring requirements for roof-mounted HVAC units.

- Review current installation inspection procedures.
- Enhance areas (as needed) to include minimum standards and checkpoints.
- Provide additional inspection procedures to include tie down and anchoring of units
- Provide education materials to facility owners, developers, installers

Develop reciprocal agreements for structural inspections following hazardous events.

- Review existing structural inspection procedures
- Determine staffing and knowledge levels of municipal inspectors
- Develop agreements allowing inspectors from one municipality to conduct structural inspections in another municipality following a hazardous event.

Relocate, buyout, or floodproof (non-residential) existing non-critical infrastructure that are subject to repetitive flooding.

- Prioritize structures subject to repetitive flooding.
- Secure necessary funding for additional acquisition or floodproofing of structures in known hazard areas.
- Partner with building owners to acquire, buyout, or floodproof prioritized structures.

5.2 COMMUNITY RATING SYSTEM

Reduce flood insurance premiums through increased participation and advancement in the NFIP's CRS Program.

- Review application and guidance materials and begin gathering supporting documentation.
- Complete application and calculate credits.
- Consult with ISO representative to review application prior to submission.
- Submit application for advancement within the CRS program.
- Maintain and record information as necessary for annual recertification.

5.3 EMERGENCY PREPAREDNESS & WARNING

Improve planning and coordination among event coordinators, facility owners, and emergency response teams

- Develop a template Event Response Plan for use by event planners and facility owners
- Coordinate and conduct a meeting with event/planning staff and response agencies to review the template and discuss the needs for communication between the two groups
- Conduct a table-top exercise to practice the implementation of the event response plan
- Adjust the template accordingly and present to additional event planners and facility owners

Implement recommendations of outdoor warning siren study to determine if adequate to alert population of severe weather conditions

- Assess areas not covered by outdoor warning siren audible ranges
- Prioritize areas in need (based on population, location of critical facilities, etc.)

- Secure or appropriate funding and install additional sirens

Evaluate and utilize flood forecasting capabilities including stream gages, flood forecast maps, and flood alerts

- Review existing capabilities and determine areas of need for increased warning time
- Prioritize areas and determine options for increased forecasting abilities
- Secure funding and implement recommendations
- Provide updated information to appropriate response agencies

Require weather radios in all critical infrastructure and encourage use by residents and businesses.

- Develop and propose ordinance language requiring municipally owned critical infrastructure to install and maintain a weather warning system
- Continue to stress the importance of weather radios in all literature, public events, and presentations provided
- Secure funding to purchase weather radios
- Provide weather radios to facilities in need

Improve disaster preparedness and emergency response at the local level through the CERT program

- Identify existing CERT trained residents and areas of coverage
- Determine and prioritize areas uncovered by a CERT representative
- Routinely offer CERT trainings and refreshers

Increase awareness and participation in the Everbridge/NIXEL or Blackboard Connect notification system

- Inform residents of the available system and how to register for participation.
- Develop consistent messages to utilize during various hazard events.
- Investigate multiple systems to allow residents to determine the most appropriate system for them to subscribe.

Coordinate with private business owners utilizing large dynamic message boards for business to provide messages during hazardous events and recovery efforts.

- Inventory private facilities with dynamic message boards in highly visible areas
- Coordinate with facility owners/operators to determine level of participation
- Develop messages and provide to facility contacts

Purchase additional mobile electronic messaging boards and develop protocol to provide current hazard information.

- Determine number of message boards needed to adequately convey messages for typical hazard events or large public gatherings
- Determine protocol for local emergency agencies to gain access to messaging systems for permanent message boards in the area.
- Distribute additional boards to key locations throughout the county dependent on areas of risk, planned gatherings, or availability of storage space

5.4 EMERGENCY RESPONSE AND RECOVERY

Purchase and install mobile data terminals in all emergency response vehicles

- Inventory emergency response vehicles and status of data terminals
- Prioritize vehicles without data terminals based on frequency of response efforts, existing coverage, etc.
- Secure grant funding or allocate existing funding to purchase additional data terminals

Establish procedures to alert and evacuate the population in known hazard areas (Tier II facility buffers and potential dam inundation areas)

- Determine areas affected by potential hazard events
- Prioritize critical infrastructure evacuation needs
- Develop evacuation routes for each facility within the hazard area
- Coordinate with facility liaison annually to review evacuation routes and procedures

Develop and implement a voluntary immunization program for all emergency responders, inspection staff, and families

- Determine what immunizations are currently offered within each municipality
- Develop a listing of additional immunizations to be offered for municipal employees and family members
- Designate an agency to oversee the program and administer the immunizations

Increase number of full-time paid positions for fire departments and emergency response teams for responding to HazMat incidents

- Assess current staffing of emergency response agencies
- Determine coverage needs and prioritize areas with inadequate coverage
- Secure funding to hire additional staff or train existing staff to better meet the needs

5.5 FLOODPLAIN MANAGEMENT

Prioritize and conduct detailed hydraulic analyses of areas with repetitive flooding problems and unnumbered Zone A streams to determine floodplain boundaries.

- Review listing of unstudied streams and floodprone areas.
- Secure funding, municipal bond, or funds from existing budgets to complete floodplain studies.
- Update the Floodplain Prioritization Study to direct future analyses.

Support FEMA approved flood depth mapping (RiskMAP) to better understand the flood risk potential.

- Prioritize areas of greatest potential impact from flooding.
- Review effective floodplain boundaries.
- Secure funding and prepare a depth map to indicate the flood risk potential as a depth of water in affected areas.
- Inform land and property owners of the potential risk to their property and structures.

5.6 GEOGRAPHIC INFORMATION SYSTEMS

Update and coordinate GIS layers with location and attributes of critical infrastructure.

- Review current GIS layers and attribute information
- Include additional data as obtained relative to each critical infrastructure
- Coordinate access to layers for each community within the County

5.7 HAZARDOUS MATERIALS RESPONSE TEAM

Maintain LEPC reporting and training efforts as required through SARA Title III and ensure current facility maps and response plans are on file for Tier II facilities.

- Ensure reports and training exercises are completed as required.
- Prepare listing of all Tier II facilities within Hancock County.
- Obtain facility maps and response plans

5.8 LAND USE PLANNING AND ZONING

Incorporate hazard information, risk assessment, and hazard mitigation practices into the Comprehensive Land Use Plans and development review to better guide future growth and development.

- Draft language and prepare exhibits to incorporate into the appropriate sections of the Hancock County Comprehensive Land Use Plan, individual cities' plans, neighborhood redevelopment plans, etc.
- Adopt amendments as appropriate

5.9 MANAGEMENT OF HIGH HAZARD DAMS

Complete an IEAP annual exercise for existing and new high hazard dams.

- Review the IEAP and inundation mapping to better understand the hazard and associated risk
- Prepare the exercise to provide training to appropriate planning and response agencies within the area.
- Partner with the dam owner and IDNR to provide outreach materials to property owners within the inundation area.

Review regular inspection reports and maintenance records of high hazard dams

- Coordinate with high hazard dam owners and IDNR to receive copies of regular inspection reports and maintenance records

- Continue coordination and collaboration to ensure inspections are completed, the dam and surrounding area is maintained, and risks are assessed accordingly

5.10 POWER BACK-UP GENERATORS

Inventory presence of generators at critical infrastructure (and fuel capacity)

- Utilize listing of critical infrastructure and coordinate with facility owners or operators
- Determine presence or absence of generator, fuel capacity, and fuel reserve
- Determine if additional needs are required to ensure compatibility with generator (wiring)
- Encourage facility owners to make necessary purchases or facility adjustments for generator

Inventory needs and secure a fuel reserve to ensure critical infrastructure are able to operate on generators for extended periods of time

- Utilize inventory and fuel capacity to determine overall fuel needs
- Coordinate with current municipal fuel providers
- Develop agreements for fuel provisions during and following hazard events

Secure funding and purchase additional mobile generators to utilize during or following hazard events

- Assess current inventory of mobile generators
- Determine needs to better serve the county and communities
- Secure grant funding or allocate budget to purchase needed generators

5.11 PUBLIC EDUCATION AND OUTREACH

Post information and/or warning signage in local parks and other public gathering locations explaining outdoor warning sirens and local radio stations that carry emergency information.

- Identify areas where large gatherings may occur
- Prioritize areas identified
- Post information or signage as appropriate for each location

Provide multi-lingual hazard preparedness literature (warning sirens, radio stations, insurance protection, etc.) during Severe Weather Awareness Week, at public facilities and events and to populations within known hazard areas.

- Distribute literature at large public events throughout Hancock County
- Provide literature at all municipal offices as appropriate
- Evaluate additional media outlets and utilize as appropriate (social media, print, billing inserts, etc.)
- Provide targeted materials and messages to at-risk populations

5.12 SAFE ROOMS AND COMMUNITY SHELTERS

Inventory areas of need and work to establish safer rooms and community shelters in vulnerable locations (mobile home parks, critical facilities, developments without basements)

- Inventory vulnerable locations or populations without access to a safe room, community shelter, or a safer location
- Prioritize findings based on factors such as number of people, location, or health concerns
- Collaborate with private property owners to establish safer areas in those facilities
- Secure or allocate funding to establish safer areas in public facilities

Develop temporary and/or long term shelter agreements within the County. Potential for tiered levels of shelters, domestic animal shelters, etc.

- Evaluate existing shelter locations
- Determine if additional locations are needed and in which areas
- Coordinate with property owners to develop written procedures for opening shelters

Clearly advertise/announce location of safe rooms and community shelters for large gatherings of people (Football games, 4H Fair, etc.)

- Collaborate with local entities responsible for large outdoor gatherings (sporting events, festivals, etc.)
- Determine location of nearest shelter area and personnel responsible for ensuring the shelter is available during the outdoor event
- Announce or advertise the location of shelter during the event

5.13 STORMWATER MANAGEMENT

Minimize the impacts of flooding by diverting or retaining stormwater onsite using green infrastructure practices

- Investigate and prioritize areas prone to flooding
- Determine the feasibility of incorporating green infrastructure practices on an individual site or regional scale
- Encourage landowners to install the practices or to allow a demonstration project on their property

Maintain channels and regulated drains to prevent localized flooding

- Review and assess information from the Surveyor's Office related to areas in need of maintenance
- Prioritize channels and drains based on flooding impacts or potential impacts
- Allocate funding and perform needed maintenance as feasible

Address flooding in low lying and urban areas due to poor drainage

- Assess areas experiencing routine flooding either due to low lying or poor drainage conditions
- Prioritize areas based on flooding impacts or potential impacts
- Allocate funding and implement recommendations as feasible

5.14 TRANSPORTATION

Study designated hazardous materials transportation routes and determine if laws are followed and/or enforced

- Review current designated hazmat routes
- Complete materials flow study for transportation of materials through the County
- Review enforcement procedures and policies
- Determine if changes need to be made for transportation efficiency or for increased penalties for not following established routes

Investigate status and prioritize enhancements for warning (flashing lights, crossing arms, rumble strips, signage) at each intersection between rail and road to reduce the potential for train/vehicular crashes

- Review current crossings and assess for feasibility of enhancing or altering the intersection

- Prioritize crossings and recommendations based on studies
- Collaborate with rail companies and municipal agencies
- Secure or allocate funding and implement recommendations as feasible

5.15 TREE MAINTENANCE

Maintain trees on public property and right-of-ways to encourage maintenance on private property to reduce the risk of downed utility lines and falling limbs

- Prioritize areas in need of maintenance (based on number of structures serviced, presence of larger trees, etc.)
- Perform routine preventative maintenance as funding and staffing allow
- Provide “Right Tree, Right Place” educational materials to landowners and residents in areas of above ground power lines

CHAPTER 6

PLAN MAINTENANCE PROCESS

6.1 MONITORING, EVALUATING, AND UPDATING THE PLAN**REQUIREMENT §201.6(c)(4)(i):**

[The plan maintenance process shall include a] section describing the method and schedule of monitoring, evaluating, and updating the mitigation plan within a five-year cycle.

To effectively reduce social, physical, and economic losses in Hancock County, it is important that implementation of this MHMP be monitored, evaluated, and updated. The EMA Director is ultimately responsible for the MHMP. As illustrated in Section 4.2 Mitigation Practices, this Plan contains mitigation program, projects, and policies from multiple departments within each NFIP community. Depending on grant opportunities and fiscal resources, mitigation practices may be implemented independently, by individual NFIP communities, or through local partnerships. Therefore the successful implementation of this MHMP will require the participation and cooperation of the entire Committee to successfully monitor, evaluate, and update the Hancock County MHMP.

The EMA Director will reconvene the MHMP Committee on an annual basis and follow a significant hazard incident to determine whether:

- the nature, magnitude, and/or type of risk have changed
- the current resources are appropriate for implementation
- there are implementation problems, such as technical, political, legal, or coordination issues with other agencies
- the outcomes have occurred as expected
- the agencies and other partners participated as originally proposed

During the annual meetings the Implementation Checklist provided in **Appendix 7** will be helpful to track any progress, successes, and problems experienced.

The data used to prepare this MHMP was based on “best available data” or data that was readily available during the development of this Plan. Because of this, there are limitations to the data. As more accurate data becomes available, updates should be made to the list of critical infrastructure, the risk assessment and vulnerability analysis.

DMA 2000 requires local jurisdictions to update and resubmit their MHMP within 5 years (from the date of FEMA approval) to continue to be eligible for mitigation project grant funding. In early 2021, the EMA Director will once again reconvene the MHMP Committee for a series of meetings designed to replicate the original planning process. Information gathered following individual hazard incidents and annual meetings will be utilized along with updated vulnerability assessments to assess the risks associated with each hazard common in Hancock County. These hazards, and associated mitigation goals and practices will be prioritized and detailed as in Section 3.0 this MHMP. Sections 4.0 and 5.0 will be updated to reflect any practices implemented within the interim as well as any additional practices discussed by the Committee during the update process.

Prior to submission of the updated MHMP, a public meeting will be held to present the information to residents of Hancock County and to provide them an opportunity for review and comment of the draft MHMP. A media release will be issued providing information related to the update, the planning process, and details of the public meeting.

6.2**INCORPORATION INTO EXISTING PLANNING MECHANISMS****REQUIREMENT §201.6(c)(4)(ii):**

[The plan shall include a] process by which local governments incorporate the requirements of the mitigation plan into other planning mechanisms such as the comprehensive or capital improvements, when

Many of the mitigation practices identified as part of this planning process are ongoing with some enhancement needed. Where needed, modifications will be proposed to be made to each NFIP communities' planning documents and ordinances during the regularly scheduled update. Among other things, local planning documents and ordinances may include comprehensive plans, floodplain management plans, zoning ordinances, building codes, site development regulations, or permits. Modifications include discussions related to hazardous material facility buffers, floodplain areas, and discouraging development of new critical infrastructure in known hazard areas.

Based on added language within each of the Comprehensive Plan updates the appropriate Zoning Ordinances and Floodplain Management Ordinances within each community would also need to be amended.

6.3 CONTINUED PUBLIC INVOLVEMENT**REQUIREMENT §201.6(c)(4)(iii):**

[The plan maintenance process shall include a] discussion on how the community will continue public participation in the plan maintenance

Continued public involvement is critical to the successful implementation of the Hancock County MHMP. Comments gathered from the public on the MHMP will be received by the EMA Director and forwarded to the MHMP Committee for discussion. Education efforts for hazard mitigation will be the focus of the annual Severe Weather Awareness Week as well as incorporated into existing stormwater planning, land use planning, and special projects/studies efforts. Once adopted, a copy of this Plan will be available for the public to review in the EMA Office and the Hancock County website.

Updates or modifications to the Hancock County MHMP will require a public notice and/or meeting prior to submitting revisions to the individual jurisdictions for approval.



The CRS program credits NFIP communities a maximum of 37 points for adopting the Plan; establishing a procedure for implementation, review, and updating the Plan; and submitting an annual evaluation report.

This page intentionally blank

REFERENCES

- Association of State Floodplain Managers (ASFPM). No Adverse Impact: A Toolkit for Common Sense Floodplain Management. 2003. www.floods.org
- Britt, Robert Roy. "New Data Confirms Strong Earthquake Risk to Central U.S.". Live Science. June 22, 2005. www.livescience.com/3871-data-confirms-strong-earthquake-risk-central.html
- Business Courier. "Ohio Winter Storm Losses Hit \$17.5 Million". March 11, 2003.
- Christopher B. Burke Engineering, Ltd. "Hancock County Multi-Hazard Mitigation Plan". 2007
- Environmental Protection Agency. Multi-Resolution Land Characteristics Consortium. www.mrlc.gov
- Federal Emergency Management Agency. "Community Ratings System". www.fema.gov/nfip/crs.shtm
- Federal Emergency Management Agency. 44 CFR Parts 201 and 206 Hazard Mitigation Planning and Hazard Mitigation Grant Program
- Federal Emergency Management Agency. Flood Insurance Rate Maps for Hancock County, Indiana.
- Federal Emergency Management Agency. "HAZUS-MH (v1.3) Earthquake Model". 2007
- Federal Emergency Management Agency. "Local Multi-Hazard Mitigation Planning Guidance". July, 2008
- Fowler, Kathleen K. "Description and Effects of 1988 Drought on Groundwater Flows, Streamflow, and Reservoir Levels in Indiana". USGS, Water Resource Investigations Report 91-4100. Pg 91. 1992
- Furlow, Steven. The Times of Noblesville, IN. "Quake Shakes Some in County". December 30, 2010.
- Hansen, Michael C. "Earthquakes in Ohio". Ohio Department of Natural Resources Division of Geological Survey. Educational Leaflet No. 9. 2005
- Indiana Department of Homeland Security. "Hazard Identification and Risk Assessment (HIRA) Tool" DRAFT.
- Indiana Department of Homeland Security. "Severe Weather Preparedness" www.in.gov/dhs/3163.htm
- Indiana Department of Environmental Management. Impaired Waters – Integrated Water Monitoring and Assessment Report. www.in.gov/idem/nps/2639.htm
- Indiana Geological Survey. "Earthquakes in Indiana" www.igs.indiana.edu/earthquakes/
- Institute for Business and Home Safety. www.disastersafety.org
- Kocin, Paul J. National Centers for Environmental Prediction. "Some Thoughts on the Societal and Economic Impact of Winter Storms." 1997

Midwestern Regional Climate Center. "Climate Summaries"

http://mcc.sws.uius.edu/climate_midwest/mwclimate_data_summaries.htm#

National Oceanic and Atmospheric Administration. National Climate Data Center. www.ncdc.noaa.gov

National Oceanic and Atmospheric Administration. National Weather Service Office of Climate, Water, and Weather Services. "Heat: A Major Killer". www.nws.noaa.gov/os/heat/index.shtml#wwa

National Oceanic and Atmospheric Administration. National Weather Service. "Wind Chill".

<http://www.crh.noaa.gov/ddc/?n=windchill>

National Oceanic and Atmospheric Administration. National Weather Service. Central Illinois Weather Forecast Office. "Earthquakes of April 18, 2008 and Aftershocks".

Purdue University. Purdue Agricultural News. "Indiana Crop Insurance Payouts Top \$1 billion". March 12, 2013

Runevitch, Jennie. WTHR-TV Channel 13. "Indiana Earthquake Strikes in Rare Location". December 30, 2010. www.wthr.com/story/13760207/indiana-earthquake-strikes-in-rare-location

STATS Indiana. "Hancock County, Indiana". <http://www.stats.indiana.edu/profiles>

Strauss, Gary; Carolyn Pesce, and Dan Vergano. USA Today. "East is all shook up after strong earthquake for region". August 25, 2011. www.usatoday.com/news/nation/story/2011-08-23/Easrthquake-rocks-East-Coast/50107542/1

Superfund Amendments and Reauthorization Act & Emergency Planning and Community Right to Know Act. 40 CFR 350-372

US Department of Agriculture. National Agricultural Statistics Service. "Indiana". www.nass.usda.gov/statistics_by_state/indiana/index.asp

US Drought Monitor. <http://drought.unl.edu/dm>

US Geological Survey. "Stream Gage Data". <http://waterdata.usgs.gov/nwis/si>

APPENDIX 1

List of Acronyms

This page intentionally blank

AHPS	Advanced Hydrologic Prediction Service
AICP	American Institute of Certified Planners
CBBEL	Christopher B. Burke Engineering, LLC
CERT	Community Emergency Response Team
CFM	Certified Floodplain Manager
CPRI	Calculated Priority Risk Index
CRS	Community Rating System
DFIRMs	Digital Flood Insurance Rate Maps
DHS	Department of Homeland Security (US)
DMA	Disaster Mitigation Act
EHS	Extremely Hazardous Substance
EMA	Emergency Management Agency
EPCRA	Emergency Planning and Community Right to Know Act
ERP	Emergency Response Plan
FEMA	Federal Emergency Management Agency
FIRM	Flood Insurance Rate Map
FMA	Flood Mitigation Act
GDP	Gross Domestic Product
GIS	Geographic Information System
HAZUS-MH	Hazard US – Multi-Hazard
HIRA	Hazard Identification and Risk Assessment
HMGP	Hazard Mitigation Grant Program
HMRT	Hazardous Materials Response Team
HUC	Hydrologic Unit Code
IDEM	Indiana Department of Environmental Management

IDHS	Indiana Department of Homeland Security
IDNR	Indiana Department of Natural Resources
INAFSM	Indiana Association of Floodplain and Stormwater Managers
LEPC	Local Emergency Planning Commission
MHMP	Multi-Hazard Mitigation Plan
MPH	Miles Per Hour
MRCC	Midwestern Regional Climate Center
MSDS	Material Safety Data Sheet
NCDC	National Climatic Data Center
NFIP	National Flood Insurance Program
NOAA	National Oceanic Atmospheric Administration
NRCS	National Resource Conservation Service
NWS	National Weather Service
OSHA	Occupational Safety and Health Administration
PDM	Pre-Disaster Mitigation
RFC	Repetitive Flood Claims
SARA	Superfund Amendment Reauthorization Act
SFHA	Special Flood Hazard Area
SRL	Severe Repetitive Loss
USDA	United States Department of Agriculture
USGS	United States Geological Service
WCT	Wind Chill Temperature

APPENDIX 2

**Committee
Summaries**

Meeting

Agendas

and

This page intentionally blank

Hancock County Multi-Hazard Mitigation Plan Update
Project Team Meeting

9 am Thursday, July 23, 2015
Hancock Regional Hospital Meeting Room
801 N State Street, Greenfield, IN 46140

AGENDA

1. Welcome and Introductions
2. Approach for the MHMP Update/Meeting Purpose
3. Hazard Risk Assessment:
 - a) Review Hazard Data
 - b) Discuss Vulnerability to Hazards
 - c) Determine Probability & Severity
4. Critical Infrastructure
5. Next Steps
6. Adjournment

Hancock County Multi-Hazard Mitigation Plan Update

Project Team Meeting

9 am Thursday, July 23, 2015
Hancock Regional Hospital Meeting Room
801 N State Street, Greenfield, IN 46140

SUMMARY

Project Team Members Present:

Dede Allender, Hancock County Solid Waste
Roy Ballard, Hancock County-Purdue University Extension
John Begovich, Sugar Creek Fire Department
Tracie Belongia, Hancock County Surveyor's Office
George Boaz, Hancock County EMA
Susan Bodkin, Hancock County Surveyor
Jeff Conley, Ninestar
Lori Cooley, Hancock Regional Hospital
Michael Crider, Indiana Senator
Ron Crider, Town of McCordsville Public Works
Mike Dale, Hancock County Planning Department
Martin Ebbert, Town of Shirley Maintenance
Ben Esterline, IDHS
Joannie Fitzwater, City of Greenfield Planning Department
Michael Fruth, City of Greenfield Utilities
Chelly Gracy, Hancock County GIS
Joe Hollis, Hancock County Transportation
Terry Hulen, Sugar Creek Fire Department
John Jester, City of Greenfield Police
Matt Kelly, Hancock County 911
Bill Knauer, Town of Fortville Police
John Milburn, Hancock County GIS
Misty Moore, Hancock County EMA
Christine Owens, Town of Cumberland
Jim Peters, Salvation Army
George Plinsinski, Ninestar
Joe Renner, Town of Fortville
Jimmy Roberts, City of Greenfield Fire Department
Mike Shepherd, Hancock County Sheriff
Dave Sutherin, Hancock County Mutual Aid
Scott Williams, Hancock County Building Department
Steve Yagelski, Town of Cumberland Utilities

Hancock County Multi-Hazard Mitigation Plan 5-Year Update



The 2016 Hancock County MHMP Update

**A Hard Copy has been
placed:**

**Hancock County
Surveyor's Office
111 S American Legion
Place, Suite 171
Greenfield IN 46140**

The Hancock County Multi-Hazard Mitigation Plan (MHMP) Update is a multi-jurisdictional planning effort led by the Hancock County Surveyor's Office. The original MHMP, adopted in 2007 was the necessary first step of a multi-step process to implement programs, policies, and projects to mitigate the effect of hazards in Hancock County. A Federal Emergency Management Agency (FEMA) approved MHMP is required to be eligible for disaster mitigation funds.

FEMA also requires communities to update and resubmit the MHMP every 5 years to continue to be eligible for mitigation project grant funding. The intent of this current planning effort is to replicate the process of identifying the hazards and the social, physical, and economic impact that they affect Hancock County as well as to discuss mitigation measures implemented within the last 5 years.

A copy of the draft MHMP Update is available at the Surveyor's Office and comments will be accepted through June 10, 2016.

Any comments or questions should be directed to Susan Bodkin at 317-477-1150 or sbodkin@hancockcoingov.org

Others Present:

Heather Buck, CBBEL

1. Welcome and Introductions

Heather and Susan thanked everyone for attending the meeting and asked those present to introduce themselves.

2. Approach for the MHMP Update/Meeting Purpose

Heather explained to the group that the MHMP Update is a requirement to be completed every 5 years. The overall approach, utilizing a larger Planning Committee similar to the previous approach was described. The meetings will follow steps to reach the end result of an updated MHMP for all NFIP Communities within Hancock County.

3. Hazard Risk Assessment:

a) Review Hazard Data

The Committee reviewed the hazards to be studied as determined by Hancock County Surveyor's Office and agreed that these are the hazards which most affect Hancock County. Heather shared data that CBBEL had gathered from the Nation Climatic Data Center (NCDC), local media outlets, and various agencies and offices since the 2007 MHMP was completed.

b) Discuss Vulnerability to Hazards

The Committee was engaged during the discussion regarding the hazards, specific events, and damages experienced. This information will be utilized to guide additional data collection for the MHMP Update, as well as enhance the discussion with the Planning Committee.

c) Determine Probability & Severity

The Committee, considering the data collected, their knowledge, and the prior discussions, determined the probability and severity of the hazards considered during this planning effort. This information will be utilized to determine the Calculated Priority Risk Index (CPRI) and will be reviewed by the Planning Committee.

4. Critical Infrastructure

Heather explained that the listing of Critical Infrastructure will be provided by the Hancock County GIS Department, categorized into sectors, and will be mapped and utilized to perform additional data analyses to prepare "what-if" scenarios.

5. Next Steps

The process was further explained to the Committee to include the next meeting, a Public Meeting, and submission of the draft report for all Committee members, the public, and FEMA's review and comment. It was also explained that it will be very important that all Committee members provide their information in a timely manner so that the draft MHMP Update can be prepared.

6. Adjournment

The Committee adjourned and plans to meet again following gathering of additional data and information. Announcements will be sent to all in attendance and those on the list provided by the Hancock County Surveyor's Office.

Hancock County Multi-Hazard Mitigation Plan Update

Project Team Meeting #2

9 am Thursday, November 19, 2015
Hancock Regional Hospital Meeting Room
801 N State Street, Greenfield, IN 46140

AGENDA

1. Welcome and Introductions
2. Review of the approach for the MHMP Update
3. Review the Hazard Risk Assessment/CPRI
4. Review and Prioritize Proposed Mitigation Measures
5. Next Steps
6. Adjournment

Hancock County Multi-Hazard Mitigation Plan Update

Project Team Meeting #2

9 am Thursday, November 19, 2015
Hancock Regional Hospital Meeting Room
801 N State Street, Greenfield, IN 46140

SUMMARY

Project Team Members Present:

Robert Allen, Sugar Creek Fire Department
Roy Ballard, Hancock County-Purdue University Extension
John Begovich, Sugar Creek Fire Department
Tracie Belongia, Hancock County Surveyor's Office
George Boaz, Hancock County EMA
Susan Bodkin, Hancock County Surveyor
Dennis Cutteridge, Keihin
Martin Ebbert, Town of Shirley Maintenance
Robert Ehle, Town of New Palestine
Joannie Fitzwater, City of Greenfield Planning Department
Michael Fruth, City of Greenfield Utilities
Chelly Gracy, Hancock County GIS
David Heiniger, Hancock Regional Hospital
Matt Kelly, Hancock County 911
Bill Knauer, Town of Fortville Police
Ben Lipps, Town of Cumberland
John Milburn, Hancock County GIS
Misty Moore, Hancock County EMA
Joe Munden, City of Greenfield Police Department
Rudy Nylund, Hancock County Coroner's Office
Joe Renner, Town of Fortville
Jimmy Roberts, City of Greenfield Fire Department
Dave Sutherin, Hancock County Mutual Aid
Teri Sweet, Hancock County Plan Commission
Karla Vincent, City of Greenfield Engineering
Brent Wakeland, Hancock County Health Department
Scott Williams, Hancock County Building Department

Others Present:

Heather Buck, CBBEL

1. Welcome and Introductions

Heather and Susan thanked everyone for attending the meeting. Introductions were made by those present.

2. Review of the Approach for the MHMP Update

A brief review was provided for those committee members not present at the first meeting.

3. Review the Hazard Risk Assessment/CPRI

The results of the completed CPRI were shared with those present. Utilizing the discussion from the previous Committee meeting, the "draft" CPRI was presented. Adjustments were made based on additional discussion with the Committee once they were able to see the final prioritizations.

4. Review and Prioritize Proposed Mitigation Practices

Utilizing the mitigation practices described in the 2007 MHMP and information gathered through the planning process, a list of proposed mitigation practices was presented to the Committee for review and comment. Due to time constraints, the Committee was unable to finish the exercise. An additional meeting will be scheduled to complete the ranking and discussion.

5. Next Steps & Future Meetings

It was explained that the next step in the process is to prepare the draft MHMP Update. Once this has been completed, a public meeting will be held and the draft will be submitted to FEMA and IDHS for review and comment.

6. Adjournment

The Committee adjourned

Hancock County Multi-Hazard Mitigation Plan Update

Town of Spring Lake: Andy Swain (Town Council President)

Through correspondence with the Hancock County Surveyor's Office, Mr. Swain indicated that the Spring Lake Town Council reviewed meeting announcements and the Draft MHMP Update as they were unable to attend the Planning Committee meetings. They further indicated that they had no additional suggestions to provide and were in agreement with the information provided.

At the request of FEMA, Heather Buck (CBBEL) contacted Mr. Swain to further discuss the Hancock County MHMP Update. During this discussion it was noted that Mr. Swain provided the draft Update to all Council members and the Town's Clerk-Treasurer for review. During the following Town Council meeting, Mr. Swain provided the Council the opportunity for questions or adjustments; the Council had none and were happy with the plan. In conversation with Heather Buck, Mr. Swain noted the Town does plow their own roads and maintains a community park but other services are primarily provided by the County Sheriff, County EMA, and Sugar Creek Township Fire Department. It was once again recognized that through the aforementioned agencies planning and implementation efforts, the Town of Spring Lake will benefit and preparation, mitigation, and recovery will be completed.

Appendix 3

Public Participation and Involvement of Other Interested Parties

This page intentionally blank

MEDIA RELEASE

For Immediate Release

Media Release Date: May 31, 2016

Contact: Susan Bodkin, Hancock County Surveyor's Office (317-477-1150)

Public Presentation of the Hancock County Multi-Hazard Mitigation Plan Update

Greenfield, IN (May 31, 2016) – Hancock County, in cooperation with the Town of Cumberland, the Town of Fortville, the City of Greenfield, the Town of McCordsville, the Town of New Palestine, and the Town of Spring Lake have prepared an update to the 2007 Multi-Hazard Mitigation Plan (MHMP) to address the risk and vulnerability of communities in the County which may be affected by known natural, technological, and political hazards.

The Disaster Mitigation Act of 2000 (DMA 2000) requires communities to update their MHMP every 5 years in order to be eligible for any future mitigation funding through the State Department of Homeland Security and the Federal Emergency Management Agency. The intent of the MHMP is to plan for a disaster before it occurs in order to reduce the physical, social and economical impact of that disaster.

The draft Hancock County MHMP Update has been placed in the Hancock County Surveyor's Office in the Hancock County Annex (111 S American Legion Place, Suite 171). Topics covered in the Update include: an overview of the planning requirements; a summary of the risk assessment and vulnerability analysis; and proposed mitigation projects for prevention, property protection, natural resource protection, emergency services, structural control projects, and public information.

Comments will be accepted through Friday, June 10, 2016. Please submit comments to Susan Bodkin at the Hancock County Surveyor's Office, (317) 477-1150 or sbodkin@hancockcoingov.org

---END---

[IN CASE OF EMERGENCY]

Officials seeking feedback on plans

FEMA requires report for federal aid assistance

By DANIEL MORSE | DAN FROSTEN
dmorse@greenfieldreport.com

GREENFIELD — Local officials recently completed a report outlining what natural disasters the county might be exposed to, and now they're turning to residents for input on potential dangers in their communities.

Hancock County was identified as high risk for drought, flooding, extreme temperatures and hail and windstorms, according to the newly released multi-hazard mitigation plan, which is required by the Federal Emergency Management Agency to be updated every few years.

A committee consisting of stakeholders from a variety of fields, including local utility companies as well as government planning and surveying offices, compiled the draft of the report and are asking residents to contribute their concerns before they send a finalized version to FEMA, which requires communities to examine the issues frequently and update response plans in order to remain eligible for federal disaster relief grants.

Mike Fruth, director of Greenfield utilities, who was among representatives on the board, said he depends on residents for input if they see any potential hazards, such as tree limbs that overhang power lines, which pose risks during thunderstorms.

Though the department regularly monitors for hazards, it's impossible to keep up to date with every property in the city, Fruth said.

The report is available for the public to read through June 10 at the Hancock County Courthouse Annex, 111 American Legion Way, inside the surveyor's office.

Residents are encouraged to leave feedback with county surveyor Susan Beckin, who coordinated the report.

To complete the plan, representatives from Hancock County, the city of Greenfield and all local towns identified which hazards their regions are susceptible to, including an array of weather events,

FEEDBACK

CONTINUED FROM PAGE A1

natural disasters and also likelihood of structural failures on dams or utilities.

The report, which took about 11 months to complete, acts as an inventory of potential emergencies, said Misty Moore, county director of emergency management, who serves as the go-between with local, state and federal government for emergency relief.

To measure the possibility

of any of the events occurring, members of the committee referenced local historical data, including rain and snowfall totals and the average response times of emergency vehicles. Members also examined building plans to see which facilities have generators and could sustain electricity during power outages.

The report also establishes which public safety services would handle emergencies in areas throughout the county, which ensures departments don't duplicate one another's efforts, Moore said.

The conclusion of the report outlines strategies to reduce long-term vulnerability. Efforts include training for employees in various local departments to identify and track potential hazards as they emerge.

One measure is to train county staff members in the surveyor's office to run through what-if scenarios to determine the potential impact of natural disasters.

Though the report is completed every five years, conditions at various regions throughout the county change constantly, Moore said.

APPENDIX 4

Critical Infrastructure by NFIP Community

This page intentionally blank

Map ID	Agriculture and Food	NFIP
AF01	Crop Production Services	Hancock County
AF02	Harvest Land Cooperative	Hancock County
AF03	Harvest Land Cooperative Inc	Hancock County
AF04	Harvest Land Cooperative Inc Buck Creek Agricultural Center	Hancock County
AF05	Harvest Land Cooperative Junction Ag Center & Petroleum	Hancock County
AF06	Hoosier Propane 11573	Hancock County
AF07	Kenneth Butler Memorial Soup Kitchen	Greenfield

Map ID	Banking and Finance	NFIP
BF01	Ameriana Savings Bank	Greenfield
BF02	Ameriana Savings Bank	McCordsville
BF03	Chase Bank	Greenfield
BF04	Family Horizon Credit Union	Greenfield
BF05	Fifth Third Bank	Hancock County
BF06	Greenfield Banking Company	Greenfield
BF07	Greenfield Banking Company	Fortville
BF08	Greenfield Banking Company	Cumberland
BF09	Greenfield Banking Company	Greenfield
BF10	Greenfield Banking Company	Greenfield
BF11	Greenfield Banking Company	Hancock County
BF12	Greenfield Banking Company	McCordsville
BF13	PNC Bank	Greenfield
BF14	PNC Bank	McCordsville
BF15	Star Financial Bank	Greenfield
BF16	Union Bank and Trust	Fortville
BF17	Union Savings and Loan	Greenfield

Map ID	Church	NFIP
CH01	Amity United Methodist Church	Hancock County
CH02	Apostolic Pentecostal Church	Greenfield
CH03	Bethel Baptist Church	Greenfield
CH04	Body Of Christ	Hancock County
CH05	Bradley United Methodist Church	Greenfield
CH06	Brandywine Community Church Inc	Greenfield
CH07	Bridge Church	Fortville
CH08	Bridge Church	Fortville
CH09	Broadway Baptist Church	Greenfield
CH10	Brookville Road Community Church	Hancock County
CH11	By His Grace Ministry Inc	Hancock County
CH12	Calvary Ch Of Bible Covenant,	Hancock County
CH13	Carrollton United Methodist Church Inc	Hancock County
CH14	Charlottesville United Methodist Church	Hancock County
CH15	Christ Presbyterian Church Of Indianapolis	McCordsville
CH16	Church Of God	Hancock County

Map ID	Church	NFIP
CH17	Community Christian Church	Hancock County
CH18	Cross Of Grace Lutheran Church	Hancock County
CH19	Curry'S Chapel U M Church	Hancock County
CH20	Eastern Indiana Holiness Association	Hancock County
CH21	Eastview Christian Fellowship	Hancock County
CH22	Eden United Methodist Church & Cemetery	Hancock County
CH23	Faith Apostolic Church	Greenfield
CH24	Faith Lutheran Church Of Greenfield Indiana	Greenfield
CH25	First Assembly Of God Of Greenfield	Hancock County
CH26	First Church Of God	Greenfield
CH27	First Church Of God	Greenfield
CH28	Fortville Christian Church Trustees	Hancock County
CH29	Fortville First United Methodist Church	Fortville
CH30	Friends Church	Hancock County
CH31	Friends Church	Hancock County
CH32	Grace Baptist Church	Hancock County
CH33	Grace, Baptist Church	Fortville
CH34	Greater Grace Of Central Indiana	Greenfield
CH35	Greenfield Christian Church	Greenfield
CH36	Greenfield Church Of Bible Covenant	Greenfield
CH37	Greenfield Church Of Christ	Greenfield
CH39	Greenfield Faith United Methodist Church	Greenfield
CH40	Greenfield Friends Church	Greenfield
CH41	Greenfield Indiana Congregation Of Jehovah'S Wittnesses	Hancock County
CH42	Greenfield Wesleyan Church	Greenfield
CH43	Hancock Baptist Temple	Hancock County
CH44	Highest Praise Worship Center Inc	Greenfield
CH45	Indiana Association of 7th Day Adventist	Hancock County
CH46	International Conservative Holiness Association Inc	Hancock County
CH47	Macedonia Missionry Baptist Church	Hancock County
CH48	Mccordsville United Methodist Church	McCordsville
CH49	Mohawk United Methodist Church	Hancock County
CH50	Mt Carmel Primitive Baptist Church	Hancock County
CH51	Mt Lebanon Church and Cemetery	Hancock County
CH52	Nameless Creek Christian Church	Hancock County
CH53	Nazarene Church	Hancock County
CH54	New Home Church	Hancock County
CH55	New Palestine Bible Church	New Palestine
CH56	New Palestine Christian Church	Hancock County
CH57	New Palestine Church Of Christ	Hancock County
CH58	New Palestine United Church	New Palestine
CH59	Northside Christian Church	Greenfield
CH60	Otterbein United Methodist	Hancock County
CH61	Park Chapel Christian Church	Greenfield

Map ID	Church	NFIP
CH62	Philadelphia U M Church	Hancock County
CH63	Presbyterian Church	Greenfield
CH64	Raymond Park Congregation Of Jehovah's Witness	Hancock County
CH65	Roman Catholic Archdiocese Of Indpls Properties	Greenfield
CH66	Roman Catholic Archdiocese Of Indpls Properties	Fortville
CH67	Shiloh Christian Church	Hancock County
CH68	Shirley Christian Church	Hancock County
CH69	Shirley United Methodist Church	Hancock County
CH70	St. James Evangelical Luthern Church Of Gfld	Greenfield
CH71	Stringtown Church Of Nazarene	Hancock County
CH72	Trinity Park United Methodist Church	Greenfield
CH73	Victory Independent Baptist Church	Hancock County
CH74	Warrington Com Free Will Baptist	Hancock County
CH75	Wilkinson Church Of Christ	Hancock County
CH76	Willow Branch United Methodist Church	Hancock County
CH77	Woodbury Community Church	Hancock County

Map ID	Commercial	NFIP
CL01	Act III Mobile Home Park	Hancock County
CL02	Apartments	Greenfield
CL03	Apartments	Greenfield
CL04	Arrowhead Mobile Home Park	Hancock County
CL05	Bluestone Apartments	Greenfield
CL06	Cedar Knoll Apartments	Greenfield
CL07	CLM Pallet	Fortville
CL08	Comfort Inn	Greenfield
CL09	Conservation Club	Hancock County
CL10	Country Inn and Suites	Greenfield
CL11	Countryside Apartments	Hancock County
CL12	Daily Reporter	Greenfield
CL13	East Forty Mobile Home Park	Hancock County
CL14	Eastway Court Apartments	Hancock County
CL15	Fortville-Vernon Library	Fortville
CL16	Fortville Boys and Girls Club	Fortville
CL17	Gateway Crossing Apartments	McCordsville
CL18	Good Shepard Community Apartments	Greenfield
CL19	Greenfield Boys and Girls Club	Greenfield
CL20	Greenfield Crossing Apartments	Greenfield
CL21	Greenfield Public Library	Greenfield
CL22	Greenfield Village Apartments	Greenfield
CL23	Hampton Inn	Greenfield
CL24	Heartland Campgrounds	Hancock County
CL25	Home Depot 2026	Greenfield
CL26	Jackson Oil And Solvents	Greenfield

Map ID	Commercial	NFIP
CL27	Jefferson Place Apartments	Fortville
CL28	KOA Campground	Hancock County
CL29	Mohawk Campgrounds	Hancock County
CL30	Paul Akers Incorporated	Hancock County
CL31	Quality Inn and Suites	Greenfield
CL32	Ridgeview Apartments	Fortville
CL33	S & H Campground	Hancock County
CL34	Sams Club Distribution Center	Greenfield
CL35	Stonecrest Apartments	Fortville
CL36	Sugar Creek Public Library	New Palestine
CL37	Sugar Creek Village Apartments	New Palestine
CL38	Super 8	Greenfield
CL39	Village Apartments of Fortville	Fortville
CL40	Walls Villa Apartments	Hancock County
CL41	Walmart Return Center Exel 9193	Hancock County
CL42	Washington Village Apartments	Hancock County

Map ID	Critical Manufacturing	NFIP
CM01	Avery Dennison	Greenfield
CM02	Caterpillar Logistics Services	Hancock County
CM03	Covance Laboratories Incorporated	Hancock County
CM04	CVS 86050	Hancock County
CM05	Elanco Animal Health Global Headquarters	Greenfield
CM06	Holloway House	Fortville
CM07	Indiana Automotive Fasteners Inc	Greenfield
CM08	Irving Materials Incorporated	Hancock County
CM09	Keihin LPT Manufacturing Inc	Greenfield
CM10	Rinker Materials	Hancock County
CM11	Roll Coater (Precoat Metals)	Greenfield
CM12	Stanley Black & Decker	Hancock County
CM13	Stanley Black & Decker	Greenfield
CM14	Vivolac Cultures Corporation	Hancock County

Map ID	Communications	NFIP
CN01	AT&T	Fortville
CN02	AT&T Indiana Telephone	Greenfield
CN03	AT&T Indiana Telephone	Greenfield
CN04	AT&T Indiana Telephone	New Palestine
CN05	Bill Applegate	Greenfield
CN06	Cell Tower	Hancock County
CN07	Cell Tower	Hancock County
CN08	Cell Tower	Hancock County
CN09	Cell Tower	Hancock County
CN10	Cell Tower	Hancock County

Map ID	Communications	NFIP
CN11	Cell Tower	Hancock County
CN12	Cell Tower	Hancock County
CN13	Cell Tower	Hancock County
CN14	Cell Tower	Hancock County
CN15	Cell Tower	Hancock County
CN16	Cell Tower	Hancock County
CN17	Cell Tower	Hancock County
CN18	Cell Tower	Hancock County
CN19	Cell Tower	Hancock County
CN20	Cell Tower	Hancock County
CN21	Cell Tower	New Palestine
CN22	Cell Tower	New Palestine
CN23	Cell Tower	Hancock County
CN24	Cell Tower	Greenfield
CN25	Cell Tower	Greenfield
CN26	Cell Tower	Hancock County
CN27	Cell Tower	Hancock County
CN28	Cell Tower	Hancock County
CN29	Cell Tower	Hancock County
CN30	Cell Tower	Hancock County
CN31	Cell Tower	Hancock County
CN32	Cell Tower	Hancock County
CN33	Communications	McCordsville
CN34	Communications	Hancock County
CN35	Communications	McCordsville
CN36	Communications	McCordsville
CN37	Communications	Hancock County
CN38	Communications	Hancock County
CN39	Communications	Hancock County
CN40	Communications	Hancock County
CN41	Communications	Hancock County
CN42	Global Tower	Hancock County
CN43	Hancock County EOC	Greenfield
CN44	Indianapolis Airport Authority	Hancock County
CN45	MCI PLVWIN	Hancock County
CN46	Mobilite Investments II	Hancock County
CN47	Mobilite Investments II	Hancock County
CN48	New Cingular Wireless PCS	Greenfield
CN49	New Cingular Wireless PCS	McCordsville
CN50	Spectrasite Comm Inc Through American Towers	Hancock County
CN51	Star Five	McCordsville
CN52	Stc Five	Hancock County
CN53	T-Mobile Central	Hancock County
CN54	T-Mobile Central (F/K/A Voicestream PCS I)	Hancock County

Map ID	Communications	NFIP
CN55	T-Mobile Central (F/K/A Voicestream PCS I)	Hancock County
CN56	Towerco Assests	Hancock County
CN57	Town Of Mt Comfort	Hancock County
CN58	United Telephone Company Indiana DBA Century Link Wilkinson Company	Hancock County
CN59	United Telephone Company Indiana Dba Centurylink	Fortville

Map ID	Dams	NFIP
DA01	Baker Dam	Hancock County
DA02	Hallenbaugh Lake Dam	Hancock County
DA03	Muegge Lake Dam	Hancock County
DA04	Spring Lake Dam	Spring Lake
DA05	Sugar Hills Lake Dam	Hancock County
DA06	Valley Brook Farms Lake Dam	Cumberland

Map ID	Defense Industrial Base	NFIP
DB01	Armory	Greenfield

Map ID	Daycare	NFIP
DC01	Active Tots Daycare	Greenfield
DC02	Angela Day Childcare	Hancock County
DC03	April's Daycare	Hancock County
DC04	Bailey Angels Daycare	Hancock County
DC05	Betty Mom's Home Daycare	Hancock County
DC06	Brighter Beginnings Childcare	Hancock County
DC07	Browns Chapel Church	Hancock County
DC08	Calvary Southern Baptist Church Of Gfld	Greenfield
DC09	Christina's Kids	Hancock County
DC10	Creative Child & Kids Care	Hancock County
DC11	Debra J Neice Daycare	Greenfield
DC12	Discovery House	Fortville
DC13	Eunice Austin Daycare	Greenfield
DC14	First Baptist Church	Greenfield
DC15	Geist Community Baptist Church	McCordsville
DC16	Ginger's Childcare	Fortville
DC17	Greenfield First Church Of The Nazarene	Greenfield
DC18	House Of Kids II	Greenfield
DC19	Jans Tykes And Trykes	Greenfield
DC20	Kids Clubhouse Childcare	Greenfield
DC21	Kids Corner Daycare	Hancock County
DC22	Lil Punkin Patch Daycare	Greenfield
DC23	Lila A Keen's Family Day Home	Hancock County
DC24	Little Bear Daycare	Hancock County

DC25	Lollipop Stop/Mount Comfort	Hancock County
DC26	Lucky's Daycare	Greenfield
DC27	Lucky's Daycare	Greenfield
DC28	Marva Brown Daycare	Hancock County
DC29	Mt Comfort Methodist Church	Hancock County
DC30	Nanny's Daycare	Greenfield
DC31	New Life Christian Fellowship	Hancock County
DC32	New Palestine United Methodist Church	New Palestine
DC33	No Place Like Home Learning Center	Greenfield
DC34	Oaklandon Christian Church	Hancock County
DC35	Pam's Daycare	Hancock County
DC36	Patrice Shannon Daycare	Hancock County
DC37	Promises And Possibilities II	McCordsville
DC38	Rainbow Daycare Inc	Greenfield
DC39	Sally Loutt Daycare	Hancock County
DC40	Shannon Jones Daycare	Greenfield
DC41	Sharon Moore Daycare	Hancock County
DC42	Shelley's Daycare	Greenfield
DC43	Shining Stars Child Care Academy	Greenfield
DC44	Sunrise Daycare	Fortville
DC45	Sweet Beginnings Daycare	McCordsville
DC46	Sylvia Austin	McCordsville
DC47	The Exploration Room	McCordsville
DC48	The Playroom	Hancock County
DC49	The Treehouse Family Childcare	McCordsville
DC50	TLC	Greenfield
DC51	Tonya's Daycare	Greenfield

Map ID	Energy	NFIP
EN01	Ag One Co Op	Greenfield
EN02	Casey's	Greenfield
EN03	Circle K	Greenfield
EN04	Crystal Flash	Greenfield
EN05	Electric	Fortville
EN06	Electric	Hancock County
EN07	Electric	Hancock County
EN08	Electric	Hancock County
EN09	Electric	Hancock County
EN10	Electric	Hancock County
EN11	Electric	New Palestine
EN12	Electric	Hancock County
EN13	Electric	Hancock County
EN14	Electric	Hancock County
EN15	Gas	New Palestine
EN16	Gas	Fortville

Map ID	Energy	NFIP
EN17	Gas	Fortville
EN18	Gas	Hancock County
EN19	Gas	Hancock County
EN20	Gas	Hancock County
EN21	Gas	Hancock County
EN22	Gas	Greenfield
EN23	Gas	Hancock County
EN24	Gas	Hancock County
EN25	Gas	Greenfield
EN26	Hucks	Fortville
EN27	Kocolene	Greenfield
EN28	Mac's Convenience Store	Hancock County
EN29	Murphy Oil	Greenfield
EN30	NineStar Connect	Greenfield
EN31	NineStar Connect	Hancock County
EN32	Pilot Travel Center 030	Hancock County
EN33	Pipeline	Hancock County
EN34	Speedway	Hancock County
EN35	Speedway	Hancock County
EN36	Speedway	Greenfield
EN37	Speedway 8042	Fortville
EN38	Speedway 8045	Greenfield
EN39	Speedway 8046	Greenfield
EN40	Speedway 8047	Greenfield
EN41	Speedway 8048	Hancock County
EN42	Speedway 8049	Greenfield
EN43	Speedway 8050	Hancock County
EN44	Speedway 8067	McCordsville
EN45	Speedway 8070	New Palestine
EN46	Spring Lake Community Center	Spring Lake
EN47	Swifty Oil Service Station 219	Greenfield
EN48	Village Pantry	McCordsville
EN49	Village Pantry	Greenfield

Map ID	Emergency Services	NFIP
ES01	Buck Creek Township FD Station 71	Hancock County
ES02	Buck Creek Township FD Station 72	Hancock County
ES03	Fortville FD Station 3	Fortville
ES04	Fortville Police Department	Fortville
ES05	Green Township FD Station 15	Hancock County
ES06	Greenfield FD Station 21	Greenfield
ES07	Greenfield FD Station 22	Greenfield
ES08	Greenfield Police Department	Greenfield
ES09	Hancock County Sheriffs Department	Greenfield

ES10	Jackson Township FD Station 6	Hancock County
ES11	Mccordsville FD Station 8	McCordsville
ES12	McCordsville Police Department	McCordsville
ES13	Shirley FD Station 11	Hancock County
ES14	Sugar Creek Township FD Station 42	Hancock County
ES15	Sugar Creek Township FD Station 45	Hancock County
ES16	Wilkinson Township FD Station 9	Hancock County

Map ID	Government	NFIP
GV01	City of Greenfield Government Center	Greenfield
GV02	Fortville Town Hall	Fortville
GV03	Hancock County Animal Control	Greenfield
GV04	Hancock County Courthouse	Greenfield
GV05	Hancock County Courthouse Annex	Greenfield
GV06	Hancock County Jail	Greenfield
GV07	Hancock Family and Child	Greenfield
GV08	INDOT Greenfield Sub District	Greenfield
GV09	McCordsville Government Offices	McCordsville
GV10	New Palestine Town Hall	New Palestine
GV11	Shirley Town Hall	Hancock County
GV12	Wilkinson Town Hall	Hancock County

Map ID	Healthcare and Public Health	NFIP
HC01	American Health Network	Greenfield
HC02	ATI Physical Therapy	Greenfield
HC03	Bardonner	Greenfield
HC04	Bell Professional Mortuary Service	Hancock County
HC05	Brandywine Animal Hospital	Greenfield
HC06	Condo Funeral Home	Hancock County
HC07	CVS Pharmacy	New Palestine
HC08	CVS Pharmacy	Greenfield
HC09	CVS Pharmacy	McCordsville
HC10	CVS Pharmacy	Fortville
HC11	Dentist	Cumberland
HC12	Erlewein Funeral Home	Fortville
HC13	Erlewein Funeral Home	Hancock County
HC14	Eye Surgeons of Indiana	Greenfield
HC15	Fletcher Dental	Greenfield
HC16	Fortville Family Dentistry	Fortville
HC17	Golden Living Center Brandywine	Greenfield
HC18	Greenfield Chiropractic Center	Greenfield
HC19	Greenfield Dental Arts	Greenfield
HC20	Greenfield First Care	Greenfield
HC21	Greenfield Veterinary Clinic	Greenfield
HC22	Hancock Eye Associates	Greenfield

HC23	Hancock Memorial Hospital	Greenfield
HC24	Hancock Regional Medical Center	McCordsville
HC25	Hendryx Mortuaries	New Palestine
HC26	Kaminski	Greenfield
HC27	Kirkwood	Greenfield
HC28	Kroger Pharmacy	Greenfield
HC29	Lesley & Georgia DDS	Greenfield
HC30	McCordsville Veterinary Hospital	McCordsville
HC31	Medicap Pharmacy	Greenfield
HC32	Mt Comfort Animal Hospital	Hancock County
HC33	New Palestine Chiropractic	Hancock County
HC34	New Palestine Family Medicine	Hancock County
HC35	New Palestine Gentle Dentist	Hancock County
HC36	New Palestine Veterinary Clinic	New Palestine
HC37	Pleasant View Lodge	Hancock County
HC38	Regency Place	Greenfield
HC39	Seals Funeral Home	Fortville
HC40	Springhurst	Greenfield
HC41	Stillinger Funeral Home	Greenfield
HC42	Sugar Creek Animal Hospital	Hancock County
HC43	Sugar Creek Chateau	Hancock County
HC44	Torok Family Chiropractic	Greenfield
HC45	Travis B Bunnell PC	Fortville
HC46	Walgreens Pharmacy	Greenfield
HC47	Walmart Pharmacy	Greenfield
HC48	Wilson	Greenfield

Map ID	Schools	NFIP
SC01	Brandywine Elementary	Hancock County
SC02	Brandywine Preschool	Greenfield
SC03	Central High School	Greenfield
SC04	Doe Creek Middle School	Hancock County
SC05	Eastern Hancock School	Hancock County
SC06	Eden Elementary	Hancock County
SC07	Fortville Church Of Nazarene	Fortville
SC08	Geist Orchard CO-Op Preschool	McCordsville
SC09	Greenfield Community School Corp Admin	Greenfield
SC10	Greenfield Middle School	Greenfield
SC11	Greenfield Middle School	Greenfield
SC12	Hancock-S Madison Srvs School	Greenfield
SC13	Harris Elementary	Greenfield
SC14	JB Stevens Elementary School	Greenfield
SC15	Maxwell Middle School	Hancock County
SC16	Maxwell Middle School	Hancock County
SC17	Mccordsville Elementary School	McCordsville

Map ID	Schools	NFIP
SC18	Mount Comfort Elementary	Hancock County
SC19	Mount Vernon Middle And High Schools	Fortville
SC20	Mt Vernon Elementary-YMCA Greater Indy	Fortville
SC21	New Palestine Elementary School	New Palestine
SC22	New Palestine Elementary School	New Palestine
SC23	New Palestine Elementary School	New Palestine
SC24	New Palestine High School	New Palestine
SC25	St Michael Elementary School	Greenfield
SC26	Sugar Creek Elementary School	Hancock County
SC27	Weston Elementary School	Greenfield
SC28	Zion Evangelical Lutheran Church	Hancock County
SC29	Zion Lutheran School	Hancock County

Map ID	Transportation Systems	NFIP
TS01	Boatland	Hancock County
TS02	Hepler Trucking	Hancock County
TS03	Indianapolis Regional Airport (storage)	Hancock County
TS04	Indianapolis Regional Airport (terminal)	Hancock County
TS05	Truck Terminal	Hancock County

Map ID	Water	NFIP
WA01	Doe Creek Sewer Utility	Hancock County
WA02	Fortville Waterworks	Fortville
WA03	Greenfield Utilities	Greenfield
WA04	Greenfield Utilities	Greenfield
WA05	Greenfield Wastewater Treatment	Greenfield
WA06	McCordsville Wastewater	McCordsville
WA07	New Palestine	New Palestine
WA08	Town of Fortville Park and Sewage	Fortville
WA09	Water Tower (Citizens)	McCordsville
WA10	Water Tower (Citizens)	Hancock County
WA11	Water Tower (Citizens)	McCordsville
WA12	Water Tower (Cumberland)	Hancock County
WA13	Water Tower (Fortville)	Fortville
WA14	Water Tower (Fortville)	Fortville
WA15	Water Tower (Greenfield)	Greenfield
WA16	Water Tower (Greenfield)	Greenfield
WA17	Water Tower (Greenfield)	Greenfield
WA18	Water Tower (Shirley)	Hancock County

APPENDIX 5

USGS Stream Gage Locations and Major Waterways

This page intentionally blank

Active Stream Gage Location	
Site Number	Site Name
03361650	SUGAR CREEK AT NEW PALESTINE, IN

Major Waterways		
Amity Branch	Harlan Run	Palestine Branch
Andis Ditch	Heinrich Ditch	Parker Ditch
Anthony Creek	Henry Ditch	Parker Eastes Ditch
Ashcraft Ditch	India Branch	Pee Dee Ditch
Barrett Ditch	Jackson Ditch	Perry Brook
Bee Camp Creek	Jackson Ditch Arm	Potts Ditch
Beeler Ditch	Jay Ditch	Powers Ditch
Big Blue River	Jones Ditch	Prairie Run
Bills Branch	Keck Ditch	Putter Ditch
Boots Ditch	Kirkhoff Ditch	Rash Ditch
Boyd Ditch	Kuhn Ditch	Redskin Brook
Brandywine Creek	Lead Creek	Richey Ditch
Brant Ditch	Leary Ditch	Shirley Drain
Breier Arm	Leary Weber Ditch	Sixmile Creek
Breier Creek	Little Brandywine Creek	Skaggs Creek
Brown Ditch	Little Sugar Creek	Small Branch
Buck Creek	MacDougall Ditch	Smith Ditch
Burris Ditch	Maize Run	Smith Johnson Ditch
Cahill Shore Ditch	March and Trees Ditch	Snider Branch
Corn Run	Maxwell Ditch	Stansbury Ditch
Cumberland Creek	McCray Run	Steele Ditch
Dilly Creek	McFadden Ditch	Sugar Creek
Doe Creek	Merlau Ditch	Sugar Run
Dry Branch	Middle Fork Dry Branch	Sweet Creek
Dunn Ditch	Million Brook	Thompson Ditch
Dunwoody Ditch	Mingle Ditch	Village Brook
Eastes Ditch	Morris Creek	Weber Ditch
Flatfork Creek	Nameless Creek	West Little Sugar Creek
Fuller Ditch	New Ditch	Wicker Ditch
Grain Creek	North Fork Dry Branch	Williamson Ditch
Hack Ditch	O'Hara Ditch	Willow Branch
Hall Ditch	Oats Run	Wilson Ditch
Ham Ditch	Ogle Ditch	

APPENDIX 6 NCDC Hazard Data

This page intentionally blank

The following data tables indicate those events that have impacted Hancock County and the communities within. Please note that these tables only provide the information for those incidents where deaths, injuries, or property and/or crop damages were reported through the NCDC. For complete tables listing all incidents impacting Hancock County, please visit:

<http://www.ncdc.noaa.gov/stormevents/choosedates.jsp?statefips=18%2CINDIANA>

Location	County/Zone	Date	Type	Dth	Inj	PrD	CrD
Totals:				0	0	3.057M	0.50K
<u>GREENFIELD</u>	HANCOCK CO.	06/04/2008	Flash Flood	0	0	5.00K	0.00K
<u>MOHAWK</u>	HANCOCK CO.	04/29/2009	Flood	0	0	3.00M	0.00K
<u>MOHAWK</u>	HANCOCK CO.	04/04/2011	Flood	0	0	0.50K	0.50K
<u>GREENFIELD</u>	HANCOCK CO.	05/01/2012	Flood	0	0	1.00K	0.00K
<u>GREENFIELD</u>	HANCOCK CO.	12/22/2013	Flash Flood	0	0	50.00K	0.00K
Totals:				0	0	3.057M	0.50K

Location	County/Zone	Date	Type	Mag	Dth	Inj	PrD	CrD
Totals:					0	2	\$329.15K	0.00K
<u>GREENFIELD</u>	HANCOCK CO.	05/30/2008	Thunderstorm Wind	60 kts. EG	0	0	15.00K	0.00K
<u>NEW PALESTINE</u>	HANCOCK CO.	06/26/2008	Thunderstorm Wind	65 kts. EG	0	0	2.00K	0.00K
<u>GREENFIELD</u>	HANCOCK CO.	05/13/2009	Thunderstorm Wind	52 kts. EG	0	0	1.00K	0.00K
<u>GREENFIELD</u>	HANCOCK CO.	07/25/2009	Thunderstorm Wind	56 kts. EG	0	0	35.00K	0.00K
<u>POPE ARPT</u>	HANCOCK CO.	08/04/2009	Thunderstorm Wind	52 kts. EG	0	0	1.00K	0.00K
<u>WOODBURY</u>	HANCOCK CO.	06/22/2010	Thunderstorm Wind	55 kts. EG	0	0	1.50K	0.00K
<u>FORTVILLE</u>	HANCOCK CO.	08/11/2010	Thunderstorm Wind	56 kts. EG	0	0	5.00K	0.00K
<u>GREENFIELD</u>	HANCOCK CO.	10/26/2010	Thunderstorm Wind	65 kts. EG	0	0	2.50K	0.00K
<u>POPE ARPT</u>	HANCOCK CO.	10/26/2010	Thunderstorm Wind	70 kts. EG	0	0	5.00K	0.00K
<u>GREENFIELD</u>	HANCOCK CO.	10/26/2010	Thunderstorm Wind	70 kts. EG	0	0	10.00K	0.00K
<u>GREENFIELD</u>	HANCOCK CO.	10/26/2010	Thunderstorm Wind	67 kts. MG	0	0	0.00K	0.00K
<u>WARRINGTON</u>	HANCOCK CO.	10/26/2010	Thunderstorm Wind	70 kts. EG	0	2	75.00K	0.00K
<u>FORTVILLE</u>	HANCOCK CO.	2/28/2011	Thunderstorm Wind	70 kts. EG	0	0	147.00K	0.00K
<u>FINLY</u>	HANCOCK CO.	3/30/2012	Thunderstorm Wind	52 kts. EG	0	0	1.00K	0.00K
<u>FORTVILLE</u>	HANCOCK CO.	7/17/2012	Thunderstorm Wind	52 kts. EG	0	0	2.00K	0.00K
<u>MC CORDSVILLE</u>	HANCOCK CO.	7/19/2012	Thunderstorm Wind	63 kts. MG	0	0	1.00K	0.00K

<u>MC CORDSVILLE</u>	HANCOCK CO.	7/19/2012	Thunderstorm Wind	52 kts. EG	0	0	0.15K	0.00K
<u>WILLOW BRANCH</u>	HANCOCK CO.	8/4/2012	Thunderstorm Wind	52 kts. EG	0	0	2.00K	0.00K
<u>GREENFIELD</u>	HANCOCK CO.	5/11/2014	Thunderstorm Wind	52 kts. EG	0	0	1.00K	0.00K
<u>MOHAWK</u>	HANCOCK CO.	9/4/2015	Thunderstorm Wind	56 kts. EG	0	0	10.00K	0.00K
<u>FORTVILLE</u>	HANCOCK CO.	12/23/2015	Thunderstorm Wind	61 kts. EG	0	0	12.00K	0.00K
Totals:					0	2	\$329.15K	0.00K

Location	County/Zone	Date	Type	Mag.	Dth	Inj	PrD	CrD
Totals:					0	0	825.0K	0.00K
<u>MT COMFORT</u>	HANCOCK CO.	5/30/2008	Tornado	EF1	0	0	250.0K	0.00K
<u>MC CORDSVILLE</u>	HANCOCK CO.	5/30/2008	Tornado	EF1	0	0	500.0K	0.00K
<u>WARRINGTON</u>	HANCOCK CO.	10/26/2010	Tornado	EF0	0	0	75.0K	0.00K
Totals:					0	0	825.0K	0.00K

Location	County/Zone	Date	Type	Dth	Inj	PrD	CrD
Totals:				0	0	15.00K	0.00K
<u>HANCOCK (ZONE)</u>	HANCOCK (ZONE)	03/04/2008	Winter Storm	0	0	11.000M	0.00K
Totals:				0	0	11.945M	50.00K

APPENDIX 7 Implementation Checklist

This page intentionally blank

MITIGATION PRACTICE	HAZARD ADDRESSED	PRIORITY	UPDATE STATUS	2021 STATUS
Management of High Hazard Dams 1. Complete IEAP and annual exercise for existing and new high hazard dams 2. Review regular inspection and maintenance records of high hazard dams	<input type="checkbox"/> Drought <input type="checkbox"/> Earthquake <input type="checkbox"/> Extreme Temperature <input type="checkbox"/> Flood <input type="checkbox"/> Hail/Thunder/Wind <input type="checkbox"/> Tornado <input type="checkbox"/> Winter Storm/Ice <input checked="" type="checkbox"/> Dam Failure <input type="checkbox"/> HazMat Incident	High	Ongoing – 2. IDNR receives inspection reports and IEAP updates Proposed Enhancements – 1. Complete IEAP and annual exercise for Sugar Hills Lake Dam 2. Ensure inspections are reported and required improvements and repairs are completed in a timely manner	
Geographic Information Systems 1. Update and coordinate GIS layers with location and attributes of critical infrastructure 2. Train GIS staff in HAZUS-MH to quantitatively estimate losses in “what if scenarios” and continue to use the most recent GIS data in land use planning efforts. 3. Update HAZUS-MH Earthquake model with local soil data for more accurate damage estimates	<input checked="" type="checkbox"/> Drought <input checked="" type="checkbox"/> Earthquake <input checked="" type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input checked="" type="checkbox"/> Hail/Thunder/Wind <input checked="" type="checkbox"/> Tornado <input checked="" type="checkbox"/> Winter Storm/Ice <input checked="" type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident	High <i>(update layers)</i> Moderate <i>(train, update earthquake model)</i>	Ongoing – 1. GIS is used by several communities 2. Some staff are familiar with HAZUS-MH Proposed Enhancement – 1. Coordinate consistent layers county-wide 2. Additional training for GIS staff 3. Update with local information	

MITIGATION PRACTICE	HAZARD ADDRESSED	PRIORITY	UPDATE STATUS	2021 STATUS
<p>Emergency Preparedness & Warning</p> <p>1. Improve planning and coordination among event coordinators, facility owners, and emergency response teams</p> <p>2. Implement recommendations of outdoor warning siren study to continue to alert population of severe weather conditions</p> <p>3. Evaluate and utilize flood forecasting capabilities including stream gages, flood forecast maps, and flood alerts</p> <p>4. Require weather radios in all critical infrastructure and encourage use by residents and businesses.</p> <p>5. Improve disaster preparedness and emergency response at the local level through the CERT program</p> <p>6. Increase awareness and participation in the Everbridge/NIXEL or Blackboard Connect notification system</p> <p>7. Coordinate with private business owners utilizing large dynamic message boards for business to provide messages during hazardous events and recovery efforts.</p> <p>8. Purchase additional mobile electronic messaging boards and develop protocol to provide current hazard information.</p> <p>9. Convey flood height warnings from the USGS river gages in terms the general public can understand</p> <p>10. Investigate the potential to develop a siren fund through payments made during development of subdivisions or industrial/commercial areas</p> <p>11. Install permanent dynamic message board in highly visible area to provide current hazard information</p>	<p><input checked="" type="checkbox"/> Drought</p> <p><input checked="" type="checkbox"/> Earthquake</p> <p><input checked="" type="checkbox"/> Extreme Temperature</p> <p><input checked="" type="checkbox"/> Flood</p> <p><input checked="" type="checkbox"/> Hail/Thunder/Wind</p> <p><input checked="" type="checkbox"/> Tornado</p> <p><input checked="" type="checkbox"/> Winter Storm/Ice</p> <p><input checked="" type="checkbox"/> Dam Failure</p> <p><input checked="" type="checkbox"/> HazMat Incident</p>	<p>High (<i>Improved planning, sirens, forecasting, weather radios, CERT, notification system, private message boards, mobile message boards</i>)</p>	<p>Ongoing –</p> <ol style="list-style-type: none"> Some coordination with event planners Outdoor warning siren study completed The County has 1 real-time AHPs Stream Gage Weather radios are provided during community events Some citizens are CERT certified NIXEL and Blackboard Connect are utilized There are few mobile message boards within the County <p>Proposed Enhancements –</p> <ol style="list-style-type: none"> Improve coordination with additional events and large gatherings Continue to implement recommendations as funding allows Continue to enhance warning system Continue to provide weather radios Rebuild and enhance the CERT program to have a representative or team in each community Increase participation in notification programs Coordinate with private business owners and develop list of willing participants Purchase additional message boards to increase number to two per community Develop information for providing flood height warnings from the USGS to the general public Research, propose and adopt an ordinance creating a siren fund Coordinate with INDOT to investigate the feasibility of adding a permanent message board 	

MITIGATION PRACTICE	HAZARD ADDRESSED	PRIORITY	UPDATE STATUS	2021 STATUS
Public Education & Outreach 1. Post information/warning signs in local parks and other public gathering places explaining what to do in case of a hazard event. 2. Provide multi-lingual hazard preparedness literature (warning sirens, radio stations, go-kits, insurance protection, lightning rods, etc.) during Severe Weather Awareness Week, at public facilities and events and to populations within known hazard areas such as floodplains, downstream of a dam, near hazmat facilities, etc. (2007 Measure) 3. Develop an education and outreach campaign encouraging residents to keep in contact with their neighbors during hazard events.	<input checked="" type="checkbox"/> Drought <input checked="" type="checkbox"/> Earthquake <input checked="" type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input checked="" type="checkbox"/> Hail/Thunder/Wind <input checked="" type="checkbox"/> Tornado <input checked="" type="checkbox"/> Winter Storm/Ice <input checked="" type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident	High <i>(post info, multi-lingual education materials)</i>	Ongoing – 2. Literature is provided at several public facilities and office locations as well as large public events throughout the County. Populations within the special flood hazard areas are educated through required flood insurance purchases and various website and literature pieces. Proposed Enhancement – 1. Post information in parks and other gathering places 2. Encourage the enhancement of the messages provided to various cultural groups and neighborhoods; Educate landowners within the dam inundation areas of the potential dangers and what to do in an emergency situation. Such as encourage voluntary purchase of federally-subsidized flood insurance; 3. Formalize a neighborhood or local campaign where community representatives familiar with the culture and language provide residents with emergency information and protocols.	
Community Rating System 1. Reduce flood insurance premiums through increased participation or advancement in the NFIP's CRS Program. (2007 Measure) <i>(Will assist with NFIP compliance)</i>	<input type="checkbox"/> Drought <input type="checkbox"/> Earthquake <input type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input type="checkbox"/> Hail/Thunder/Wind <input type="checkbox"/> Tornado <input type="checkbox"/> Winter Storm/Ice <input type="checkbox"/> Dam Failure <input type="checkbox"/> HazMat Incident	High	Ongoing – 1. Hancock County participates at a Class 8 Proposed Enhancement – 1. Increased participation from County and entry from other communities	
Hazardous Materials Response Team 1. Maintain LEPC reporting and training efforts as required through SARA Title III and ensure current facility maps and response plans are on file for Tier II facilities.	<input type="checkbox"/> Drought <input type="checkbox"/> Earthquake <input type="checkbox"/> Extreme Temperature <input type="checkbox"/> Flood <input type="checkbox"/> Hail/Thunder/Wind <input type="checkbox"/> Tornado <input type="checkbox"/> Winter Storm/Ice <input type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident	High	Ongoing – 1. Hancock County participates at a Class 8 Proposed Enhancement – 1. Increased participation from County and entry from other communities	

MITIGATION PRACTICE	HAZARD ADDRESSED	PRIORITY	UPDATE STATUS	2021 STATUS
Stormwater Management 1. Minimize impacts of flooding by diverting or retaining stormwater onsite using green infrastructure practices 2. Maintain channels and regulated drains to prevent localized flooding 3. Address flooding in low lying and urban areas due to poor drainage	<input type="checkbox"/> Drought <input type="checkbox"/> Earthquake <input type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input type="checkbox"/> Hail/Thunder/Wind <input type="checkbox"/> Tornado <input type="checkbox"/> Winter Storm/Ice <input type="checkbox"/> Dam Failure <input type="checkbox"/> HazMat Incident	High	Ongoing – 1. Channels and regulated drains are maintained as funding and staffing allow Proposed Enhancement – 1. Increase use of green infrastructure as feasible 2. Continue to maintain channels and drains 3. Investigate causes of non-riverine flooding	
Transportation 1. Study designated hazardous materials transportation routes and determine if laws are followed 2. Investigate status and prioritize enhancements for warning (flashing lights, crossing arms, rumble strips, signage) at each intersection between rail and road to reduce the potential for train/vehicular crashes	<input type="checkbox"/> Drought <input type="checkbox"/> Earthquake <input type="checkbox"/> Extreme Temperature <input type="checkbox"/> Flood <input type="checkbox"/> Hail/Thunder/Wind <input type="checkbox"/> Tornado <input type="checkbox"/> Winter Storm/Ice <input type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident	High	Ongoing – 1. Routes are well known or marked 2. Many crossings have barriers or warnings Proposed Enhancement – 1. Improve enforcement 2. Increase number of crossings with barriers or warnings	
Tree Maintenance 1. Maintain trees on public property and right-of-ways and encourage maintenance on private property to reduce the risk of downed utility lines and falling limbs	<input checked="" type="checkbox"/> Drought <input checked="" type="checkbox"/> Earthquake <input checked="" type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input checked="" type="checkbox"/> Hail/Thunder/Wind <input checked="" type="checkbox"/> Tornado <input checked="" type="checkbox"/> Winter Storm/Ice <input type="checkbox"/> Dam Failure <input type="checkbox"/> HazMat Incident	High	Ongoing – 1. Utility providers perform routine maintenance along ROW Proposed Enhancement – Encourage private landowners to perform maintenance or avoid planting improper trees and shrubs	

MITIGATION PRACTICES	HAZARD ADDRESSED	PRIORITY	UPDATE STATUS	2021 STATUS
Building Protection 1. Prohibit the development of new critical infrastructure in 1% & 0.2% annual chance flood hazard and potential dam failure inundation areas. (2007 Measure) 2. Develop reciprocal agreements for structural inspections following hazardous events 3. Relocate, buyout, or floodproof (non-residential) existing non-critical facilities subject to flooding 4. Enforce tie-down and anchoring requirements for roof-mounted HVAC units 5. Protect existing critical facilities in floodplains 6. Encourage new or retrofitted critical facilities to incorporate structural bracing, shutters, laminated/impact-resistant glass and/or interlocking roof coverings to minimize damage 7. Develop an inventory and complete an inspection of public and commercial buildings that may be particularly vulnerable to earthquake damage	<input type="checkbox"/> Drought <input checked="" type="checkbox"/> Earthquake <input checked="" type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input checked="" type="checkbox"/> Hail/Thunder/Wind <input checked="" type="checkbox"/> Tornado <input checked="" type="checkbox"/> Winter Storm/Ice <input checked="" type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident	High (prohibit development, reciprocal agreements, relocate, tie-downs) Moderate (protect critical facilities, new or retrofitted bracing, building inventory)	Ongoing – 1. Ordinances prohibit construction of new critical facilities within the 0.2% annual chance flood area. Proposed Enhancements – 1. Continue to discourage development within floodplains, include potential dam inundation areas. 2. Develop agreements for post-event inspections 3. Inventory and prioritize non-residential facilities for buyout or floodproofing 4. Develop inspection program for roof mounted HVAC units 5. Protect the structures identified in Table 3-10 6. Encourage enhancements for new or retrofitted municipal critical facilities 7. Create an inventory of vulnerable buildings	
<i>(Will assist with NFIP compliance)</i> Land Use Planning & Zoning 1. Incorporate hazard information, risk assessment, and hazard mitigation practices into the Comprehensive Land Use Plan and Development Review to better guide future growth and development 2. Conduct a Safe Growth Audit of development plans and codes	<input checked="" type="checkbox"/> Drought <input checked="" type="checkbox"/> Earthquake <input checked="" type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input checked="" type="checkbox"/> Hail/Thunder/Wind <input checked="" type="checkbox"/> Tornado <input checked="" type="checkbox"/> Winter Storm/Ice <input checked="" type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident	High (incorporate hazard information) Moderate (growth audit)	Ongoing – 1. Hazard information has been incorporated into some areas of the Comprehensive Land Use Plan Proposed Enhancement – 1. Increase the number of hazards considered, more definitively outline higher risk areas and those that should be avoided for future development 2. Conduct the audit and implement recommendations	

MITIGATION PRACTICE	HAZARD ADDRESSED	PRIORITY	UPDATE STATUS	2021 STATUS
Emergency Response & Recovery 1. Add mobile data terminals to all emergency response vehicles 2. Establish procedures to alert and evacuate the population in known hazard areas (Tier II buffers, dam inundation areas) 3. Develop and implement a voluntary immunization program for all emergency responders, inspection staff, and families 4. Increase number of full time paid positions for fire departments and emergency response teams for responding to HazMat incidents 5. Coordinate communications, documentation, and record keeping between NFIP communities and agencies including a database of accurate and community specific information following each hazard event 6. Establish procedures to alert and evacuate the populations in known hazard areas (routinely flooded areas)	<input checked="" type="checkbox"/> Drought <input checked="" type="checkbox"/> Earthquake <input checked="" type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input checked="" type="checkbox"/> Hail/Thunder/Wind <input checked="" type="checkbox"/> Tornado <input checked="" type="checkbox"/> Winter Storm/Ice <input checked="" type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident	High <i>(terminals, evacuations for Tier II and dams, immunizations, full-time positions)</i> Moderate <i>(coordinate communications)</i> Low <i>(evacuation for flood areas)</i>	Ongoing – 1. Many vehicles have terminals Proposed Enhancement – 1. Inventory all response vehicles and purchase terminals as able 2. Establish procedures to evacuate areas near Tier II and dams 3. Develop a wide-based immunization program 4. Increase number of HazMat trained staff 5. Coordinate response efforts following each hazard event 6. Establish procedures to evacuate routinely flooded areas	
Floodplain Management 1. Prioritize and conduct detailed hydraulic analyses of areas with repetitive flooding problems and unnumbered Zone A streams to determine floodplain boundaries. (2007 Measure) 2. Support FEMA approved flood depth mapping (RISKMAP) to better show the flood risk potential 3. Create fluvial erosion hazard mapping to identify critical infrastructure that may be impacted by natural stream movement <i>(Will assist with NFIP compliance)</i>	<input type="checkbox"/> Drought <input type="checkbox"/> Earthquake <input type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input type="checkbox"/> Hail/Thunder/Wind <input type="checkbox"/> Tornado <input type="checkbox"/> Winter Storm/Ice <input type="checkbox"/> Dam Failure <input type="checkbox"/> HazMat Incident	High <i>(hydraulic analyses, RiskMAP)</i> Low <i>(fluvial erosion)</i>	Ongoing – Proposed Enhancements – 1. Complete analyses as appropriate to determine floodplain boundaries and flood depth mapping to include all flood prone areas within the County. Implement flood protection study recommendations as feasible 2. Support flood depth mapping for prioritized areas 3. Create the fluvial erosion hazard mapping	

MITIGATION PRACTICE	HAZARD ADDRESSED	PRIORITY	UPDATE STATUS	2021 STATUS
<p>Safe Rooms and Community Shelters</p> <ol style="list-style-type: none"> Inventory areas of need and work to establish safer rooms and community shelters in vulnerable locations (mobile home parks, critical facilities, development without basements) Develop temporary and/or long-term shelter agreements within the County. Potential for tiered levels of shelters, domestic animal shelters, etc. Clearly advertise location of safer areas and community shelters for large gatherings of people 	<input type="checkbox"/> Drought <input checked="" type="checkbox"/> Earthquake <input checked="" type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input checked="" type="checkbox"/> Hail/Thunder/Wind <input checked="" type="checkbox"/> Tornado <input checked="" type="checkbox"/> Winter Storm/Ice <input checked="" type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident	High	<p>Ongoing –</p> <ol style="list-style-type: none"> Many buildings have plans on where to go in the event of a hazard <p>Proposed Enhancements –</p> <ol style="list-style-type: none"> Inventory municipals/public buildings, large employers, and vulnerable areas to determine if safest places are being utilized Continue to develop and assess agreements Advertise location of safer areas during large gatherings 	
<p>Power Back-Up Generators</p> <ol style="list-style-type: none"> Investigate and secure a fuel reserve to ensure critical infrastructure are able to operate on generators for extended periods of time Encourage power back-up generators in all municipal critical facilities Secure funding and purchase additional mobile generators to utilize during or following hazard events Investigate critical facilities to determine whether appropriate wiring exists for a back-up generator Encourage burial of electrical lines in new and redeveloped areas or require designed-failure mode that allows lines to fail or fail in small sections 	<input type="checkbox"/> Drought <input checked="" type="checkbox"/> Earthquake <input checked="" type="checkbox"/> Extreme Temperature <input checked="" type="checkbox"/> Flood <input checked="" type="checkbox"/> Hail/Thunder/Wind <input checked="" type="checkbox"/> Tornado <input checked="" type="checkbox"/> Winter Storm/Ice <input checked="" type="checkbox"/> Dam Failure <input checked="" type="checkbox"/> HazMat Incident	High <i>(fuel reserve, generators, mobile generators)</i> Low <i>(wiring, burial of lines)</i>	<p>Ongoing –</p> <p>Proposed Enhancements –</p> <ol style="list-style-type: none"> Conduct inventory of generator and fuel capacity Purchase additional mobile generators Determine if appropriate wiring is available at each critical facility Encourage burial of lines for new and re-development 	

APPENDIX 8 Potential Funding Sources

This page intentionally blank

AmeriCorps

The AmeriCorps*State works with Governor-appointed State Service Commissions to provide grants to non-government and government entities that sponsor service programs. These organizations use their grants to engage AmeriCorps members in service to help meet critical community needs in education, public safety, health, and the environment.

Previous Activities Funded: Assisting disaster victims, building homes, restoring parks and other community facilities while mobilizing community volunteers.

Ms. Paula Parker-Sawyers, Exec. Director
Office of Faith-Based & Community Initiative
302 W Washington St. Room E220
Indianapolis IN 46204-4701
317.233.4273 ~ Phone
317.233.5660 ~ Fax
www.state.in.us/iccsv

Assistance to Firefighters Grant

The Assistance to Firefighters Grant (AFG) is a competitive grant opportunity for local fire departments and Emergency Medical Service (EMS) organizations that are not affiliated with a hospital.

Previous Activities Funded: The AFG funds activities such as purchasing firefighting equipment, personal protection equipment, training, firefighting vehicles, and firefighter/first responder safety projects.

<http://www.firegrantsupport.com/>

Challenge 21, Floodplain

Challenge 21, the Army Corps' flood hazard mitigation and riverine ecosystem restoration initiative, will focus on more sustainable approaches. Through its focus on non-structural alternatives to flood protection, it will, where appropriate, move families and businesses out of harm's way and strive to return the floodplains of rivers and creeks to a condition where they can naturally moderate floods as well as provide other benefits to communities and the environment. Watershed by watershed, Challenge 21 builds on existing programs and initiates and expands partnerships with other Federal agencies and non-Federal national and local entities. Key Federal partners include the FEMA, the Department of Agriculture, the Department of Interior and the EPA.

Previous Activities Funded: A project might include the relocation of threatened homes or businesses, conservation or restoration of wetlands and natural floodwater storage areas and planning for responses and solutions to potential future floods

http://www.americanrivers.org/site/PageServer?pagename=AMR_content_d156

CHIEF Grants Service

CHIEF Grants is a free service from CHIEF supply company. Dedicated to helping public safety professionals meet today's funding challenges, CHIEF Grants is a one-stop shop for open grants, grant writing tips, seminars, and grant news.

Previous Activities Funded: Various types of grants are highlighted with numerous activities funded. This a grant service, not an individual grant opportunity.

<http://www.chiefsupply.com/grants/>

Clean Water State Revolving Loan Fund

Clean Water State Revolving Loan Fund (CWSRLF) programs operate much like environmental infrastructure banks that are capitalized with federal and state contributions. CWSRLF monies are loaned to communities and loan repayments are recycled back into the program to fund additional water quality protection projects. The revolving nature of these programs provides for an ongoing funding source that will last far into the future.

Previous Activities Funded: The CWSRF funds a broad range of projects—from wastewater systems and nonpoint source pollution control to estuary management and a range of projects focusing on water quality. Funding is typically directed to state-identified high priority projects based on several factors, including: public health protection; condition of impacted waters; and communities' regulatory compliance status.

<http://epa.gov/OW-OWM.html/cwfinance/cwsrf/basics.htm>

Community Development Block Grants

Communities receiving Community Development Block Grants (CDBG) funds from the State may use the funds for many kinds of community development activities including, but not limited to property acquisition, public services, planning activities, and community development activities.

Previous Activities Funded: Funds have been used in Indiana for purposes such as Public facility improvements, flood and drainage facilities, Fire stations and equipment, and various community related activities and facilities.

<http://www.in.gov/ihfa/comdev/comp/manuals/im/im.htm>

Ms. Deanna Oware, Director
State of Indiana
Department of Commerce/Community Development
One N. Capitol Ave.
Suite 600
Indianapolis, IN 46204-2027
Phone: 317-232-8911
Fax: 317-233-3597

Community Facilities Grants and Loans

The Rural Housing Service (RHS) of the Department of Agriculture offers loans and grants to construct, enlarge, extend, or otherwise improve community facilities providing essential services to rural residents.

Previous Activities Funded: Priority for funding will be given to those projects that will enhance public safety such as fire, police, rescue, and ambulance services, and projects for health care facilities. The fire service can use the funding for fire stations, fire trucks and rescue vehicles.

www.rurdev.usda.gov/rhs/ProgramBriefs/brief_cp_grant.htm

Community Rating System

The National Flood Insurance Program's (NFIP) Community Rating System (CRS) is a voluntary incentive program that recognizes and encourages community floodplain management activities that exceed the minimum NFIP requirements. As a result, flood insurance premium rates are discounted to reflect the reduced flood risk resulting from the community actions meeting the three goals of the CRS: (1) reduce flood losses; (2) facilitate accurate insurance rating; and (3) promote the awareness of flood insurance.

Previous Activities Funded: While the CRS does not provide direct funding, reductions in insurance premiums can be significant for participants.

<http://www.fema.gov/nfip/crs.shtm>

Conservation Reserve Program

The Conservation Reserve Program (CRP) is a voluntary program for agricultural landowners. Through CRP, landowners can receive annual rental payments and cost-share assistance to establish long-term, resource conserving covers on eligible farmland to reduce soil erosion, and potential flood loss and damage.

Previous Activities Funded: Filter Strip Establishment, Wetland Restoration, Riparian Buffer Establishment

<http://www.fsa.usda.gov/dafp/cepd/crp.htm>

The Cora Brown Fund

To provide for disaster-related needs that have not been, or will not be met by government agencies or any other organizations which have programs to address such needs; however, the fund is not intended to replace or supersede these programs. The fund may not be used in a way that is inconsistent with other federally mandated disaster assistance or insurance programs. Money from the fund will not duplicate assistance for which a person is eligible from other sources.

Previous Activities Funded: Disaster related home repair and rebuilding, services which alleviate human suffering due to disasters and disaster related unmet needs.

http://www.federalgrantswire.com/cora_brown_fund.html

Department of Interior Rural Fire Assistance Program

The Department of Interior (DOI) Rural Fire Assistance Program is aimed at enhancing the fire protection capabilities of rural fire districts in the wildland urban interface. The rural fire department must serve a community with a population of 10,000 or less and must have a statewide agreement with the state forester who maintains cooperative agreements with the rural fire departments or volunteer fire departments or a cooperative fire agreement with an agency in the DOI.

Previous Activities Funded: The program assists with training, equipment purchase, and prevention activities, on a 90/10 cost-share basis.

<http://www.nifc.gov/rfa/steps.html>

Direct Housing: Natural Disaster

Funds are only available to the extent that funds are not provided by the Federal Emergency Management Agency (FEMA). For the purpose of administering these funds, natural disaster will only include those areas identified by a Presidential declaration.

Previous Activities Funded: To assist qualified lower income rural families to meet emergency assistance needs resulting from natural disaster to buy, build, rehabilitate, or improve dwellings in rural areas.

http://www.federalgrantswire.com/direct_housingnatural_disaster.html

Disaster Reserve Assistance

To provide emergency assistance to eligible livestock owners, in a State, county, or area approved by the Secretary or designee, where because of disease, insect infestation, flood, drought, fire, hurricane, earthquake, hail storm, hot weather, cold weather, freeze, snow, ice, and winterkill, or other natural disaster, a livestock emergency has been determined to exist.

Previous Activities Funded: This assistance is in the form of a direct payment to affected eligible landowners and is administered through the Farm Service Agency.

http://www.federalgrantswire.com/disaster_reserve_assistance.html

Disposal of Federal Surplus Real Property for Parks, Recreation, and Historic Monuments

Surplus real property may be conveyed for public park and recreation use at discounts up to 100 percent of fair market value and for historic purposes without monetary consideration. Property conveyed for park and recreation use or historic purposes must be used for these purposes in perpetuity or be reverted to Federal ownership.

Previous Activities Funded: Property, either real or land, varies with time with items available for public sale, lease or extended use in perpetuity.

http://www.federalgrantswire.com/disposal_of_federal_surplus_real_property_for_parks_recreation_and_historic_monuments.html

Emergency Conservation Program

The United States Department of Agriculture (USDA) Farm Service Agency's (FSA) Emergency Conservation Program (ECP) provides emergency funding and technical assistance for farmers and ranchers to rehabilitate farmland damaged by natural disasters and for carrying out emergency water conservation measures in periods of severe drought.

Previous Activities Funded: This assistance is in the form of a direct payment to affected eligible landowners and is administered through the Farm Service Agency.

<http://disaster.fsa.usda.gov/ecp.htm>

Environmental Quality Incentive Program

The Environmental Quality Incentive Program (EQIP) offers contracts with a minimum term that ends one year after the implementation of the last scheduled practices and a maximum term of ten years. These contracts provide incentive payments and cost-shares to implement conservation practices. Persons who are engaged in livestock or agricultural production on eligible land may participate in the EQIP program. EQIP activities are carried out according to an environmental quality incentives program plan of operations developed in conjunction with the producer that identifies the appropriate conservation practice or practices to address the resource concerns. The practices are subject to Natural Resources Conservation Service (NRCS) technical standards adapted for local conditions. The local conservation district approves the plan.

Previous Activities Funded: Cost sharing may pay up to 75 percent of the costs of certain conservation practices, such as grassed waterways, filter strips, manure management facilities, capping abandoned wells, and other practices important to improving and maintaining the health of natural resources in the area.

<http://www.nrcs.usda.gov/programs/eqip/>

Emergency Rehabilitation of Flood Control Works

Assistance does not extend to major improvements of flood control or federally authorized coastal protection structures, nor to reimbursement of individuals or communities for funds expended in repair or rehabilitation efforts.

Previous Activities Funded: Authorized assistance includes emergency repair or rehabilitation of flood control works damaged by flood, and restoration of federally authorized coastal protection structures damaged by extraordinary wind, wave, or water action.

http://www.federalgrantswire.com/emergency_rehabilitation_of_flood_control_works_or_federally_authorized_coastal_protection_works.html

Emergency Watershed Protection Program

The Emergency Watershed Protection Program (EWPP) work is not limited to any one set of prescribed measures. A case by case investigation of the needed work is made by NRCS.

Previous Activities Funded: EWPP work can include: removing debris from stream channels, road culverts, and bridges; reshaping and protecting eroded banks; correcting damaged drainage facilities; repairing levees and structures; reseeding damaged areas; and purchasing floodplain easements.

<http://www.nrcs.usda.gov/programs/ewp/questions.html>

Farmland Protection Program

The Farmland Protection Program provides funds to help purchase development rights to keep productive farmland in agricultural uses. To qualify, farmland must: be part of a pending offer from a State, tribe, or local farmland protection program; be privately owned; have a conservation plan; be large enough to sustain agricultural production; be accessible to markets for what the land produces; have adequate infrastructure and agricultural support services; and have surrounding parcels of land that can support long-term agricultural production. Depending on funding availability, proposals must be submitted by the government entities to the appropriate NRCS State Office during the application window.

Previous Activities Funded: Working through existing programs, USDA joins with State, tribal, or local governments to acquire conservation easements or other interests from landowners. USDA provides up to 50 percent of the fair market easement value.

<http://www.info.usda.gov/nrcs/fpcp/fpp.htm>

Fire Prevention & Safety Grant

The purpose of these grants is to enhance the safety of the public and firefighters with respect to fire and fire-related hazards. The primary goal of the Assistance to Firefighters Grant (AFG) Program's Fire Prevention and Safety Grant (FP&S) is to reach high-risk target groups in order to mitigate the high incidences of death and injuries. Additionally for Fiscal Year (FY) 2005 Congress amended the authorization to include funding for Firefighter Safety Research and Development. This guidance provides details for applying for either of these financial assistance instruments. There is no cost share requirement for the FY 2005 Fire Prevention and Safety grants.

Previous Activities Funded: Grants have been awarded to assist with the costs associated with training, equipment, vehicles for fire departments and firefighter safety research.

http://www.firegrantsupport.com/fp_about.aspx

Flood Mitigation Assistance Program

The Flood Mitigation Assistance (FMA) program provides funding to assist States and communities in implementing measures to reduce or eliminate the long-term risk of flood damage to buildings, manufactured homes, and other structures insurable under the National Flood Insurance Program (NFIP). There are three types of grants available under FMA: Planning, Project, and Technical Assistance Grants. FMA Planning Grants are available to States and communities to prepare Flood Mitigation Plans. NFIP-participating communities with approved Flood Mitigation Plans can apply for FMA Project Grants. FMA Project Grants are available to States and NFIP participating communities to implement measures to reduce flood losses.

Previous Activities Funded: A few examples of eligible FMA projects include: the elevation, acquisition, and relocation of NFIP-insured structures.

<http://www.fema.gov/fima/mitgrant.shtm>

Hazards Mitigation Grant Program

Authorized under Section 404 of the Stafford Act, the Hazard Mitigation Grant Program (HMGP) provides grants to States and local governments to implement long-term hazard mitigation measures after a major disaster declaration. The purpose of the program is to reduce the loss of life and property due to natural disasters and to enable mitigation measures to be implemented during the immediate recovery from a disaster declaration. The purpose of the program is to reduce the loss of life and property due to natural disasters and to enable mitigation measures to be implemented during the immediate recovery from a disaster.

Previous Activities Funded: Acquisition of hazard-prone property; stormwater management, elevation of flood-prone structures, and infrastructure protection measures are all considered eligible projects and have been funded in the past.

<http://www.fema.gov/fima/mitgrant.shtm>

Hazardous Materials Emergency Preparedness Grant

The Hazardous Materials Emergency Preparedness (HMEP) grant program is intended to provide financial and technical assistance as well as national direction and guidance to enhance State, Territorial, Tribal, and local hazardous materials emergency planning and training. The HMEP Grant Program distributes fees collected from shippers and carriers of hazardous materials to emergency responders for hazmat training and to Local Emergency Planning Committees (LEPCs) for hazmat planning.

Previous Activities Funded: These grants have been used for developing, improving, and implementing emergency plans, and training public sector employees to respond safely and efficiently to accidents and incidents involving the transportation of hazardous materials.

<http://hazmat.dot.gov/training/state/hmep/hmep.htm>

Indiana Family and Social Services Administration

The Family and Social Services Administration provides services to help keep children healthy and safe and help families to self-sufficient.

Previous Activities Funded: The agency may provide programs related to heating/cooling of residential buildings, temporary housing, and other important contacts in the event of an emergency or disaster.

<http://www.in.gov/fssa/families/>

Indiana Resource Conservation & Development Districts

The purpose of the Resource Conservation and Development (RC&D) program is to accelerate the conservation, development and utilization of natural resources, improve the general level of economic activity, and to enhance the environment and standard of living in designated RC&D areas. It improves the capability of State, tribal and local units of government and local nonprofit organizations in rural areas to plan, develop and carry out programs for resource conservation and development. The program also establishes or improves coordination systems in rural areas.

Previous Activities Funded: Forestry projects, wetland development, Community training projects, and other projects related to community and natural resource enhancement and protection.

<http://www.in.nrcs.usda.gov/programs/RC&D/RC&Dhomepage.html>

Indiana Rural Development Council

The Indiana Rural Development Council (IRDC) is a partnership of local, state, federal, profit and not-for-profit stakeholders that serve Indiana communities. The IRDC's purpose is to coordinate efforts of citizens and governments to meet the economic and social needs of rural Indiana.

Previous Activities Funded: These funds will be utilized to address a variety of rural issues in the areas of economic/community development, planning, leadership, infrastructure, health, telecommunication/education, workforce development, agriculture, and rural regional development initiatives.

<http://www.in.gov/irdc/index.html>

Indiana State Revolving Loan Fund

The Indiana State Revolving Fund (SRF) Loan Program provides low-interest loans to Indiana communities for projects that improve wastewater and drinking water infrastructure. The Indiana Department of Environmental Management (IDEM) and the Indiana State Budget Agency work together

to administer this program and to protect public health and the environment. Recently, SRF has implemented a program to fund nonpoint source projects, as well.

Previous Activities Funded: Activities include Treatment plant improvements and upgrades, Riparian Buffers and Conservation Easements, and Wetland protection and restoration measures.

<http://www.in.gov/idem/srf/factsht0704.doc>

Indiana Transportation Enhancements Program

Transportation enhancements (TE) are transportation-related activities that are designed to strengthen the cultural, aesthetic, and environmental aspects of the Nation's inter-modal transportation system.

Previous Activities Funded: The transportation enhancements program provides for the implementation of a variety of non-traditional projects, with examples ranging from Acquisition of scenic easements, landscaping and scenic beautification, and to the mitigation of water pollution from highway runoff all of which could be utilized as measures to control or mitigate flood damage.

http://www.enhancements.org/statecontacts_TE.asp

Land and Water Conservation Fund

The Land and Water Conservation Fund (LWCF) program provides matching grants to States and local governments for the acquisition and development of public outdoor recreation areas and facilities. The program is intended to create and maintain a nationwide legacy of high quality recreation areas and facilities and to stimulate non-federal investments in the protection and maintenance of recreation resources across the United States.

Previous Activities Funded: Funds have been widely utilized for land acquisition, open space/greenspace development, which can include wetland development, critical seeding areas and other projects that can reduce the impacts of flooding.

<http://www.nps.gov/lwcf/>

Low Interest Loan Incentives

Loan amounts up to \$700,000 with interest rates of 2.5 percent to 3.0 percent are available to cities, towns and counties. The loan pays for the cost of remediation and/or demolition at identified brownfield sites.

Previous Activities Funded: Eligible activities include: soil and groundwater cleanup, demolition activities, asbestos/lead paint abatement, and additional investigations.

<http://www.idfabrownfields.com/assistance.aspx#LILI>

National Flood Insurance Program

The National Flood Insurance Program (NFIP) is a Federal program enabling property owners in participating communities to purchase insurance protection against losses from flooding. This insurance is designed to provide an insurance alternative to disaster assistance to meet the escalating costs of repairing damage to buildings and their contents caused by floods. Participation in the NFIP is based on an agreement between local communities and the Federal Government that states if a community will adopt and enforce a floodplain management ordinance to reduce future flood risks to new construction in Special Flood Hazard Areas, the Federal Government will make flood insurance available within the community as a financial protection against flood losses.

Previous Activities Funded: Flood insurance is made available within the community as a financial protection against flood losses.

<http://www.fema.gov/nfip/intnfip.shtm>

Office for Domestic Preparedness Terrorism Formula Grants

The Office for Domestic Preparedness (ODP) provides funding through the states awards to enhance the capacity of emergency responders to prevent, deter, or respond to terrorist incidents involving weapons of mass destruction. The funding is awarded to a point of contact in each state and then distributed within the state.

Previous Activities Funded: Activities have included training, technical assistance, equipment, planning and exercises related to domestic terrorism events.

<http://www.ojp.gov/state.htm>

Petroleum Remediation Grant Incentive

Grant amounts up to \$250,000 per applicant and per funding round are available to cities, towns and counties. The grant pays for the cost of petroleum remediation at identified brownfield sites.

Previous Activities Funded: Eligible activities include: underground storage tank removal, Corrective Action Plan preparation, IDEM approved remediation and monitoring.

<http://www.idfabrownfields.com/assistance.aspx#PRGI>

Pre-Disaster Mitigation Program

The Pre-Disaster Mitigation (PDM) program provides technical and financial assistance to States and local governments for cost-effective pre-disaster hazard mitigation activities that complement a comprehensive mitigation program, and reduce injuries, loss of life, and damage and destruction of property. FEMA provides grants to States and Federally recognized Indian tribal governments that, in turn, provide sub-grants to local governments (to include Indian Tribal governments) for mitigation activities such as planning and the implementation of projects identified through the evaluation of natural hazards.

Previous Activities Funded: Acquisition and/or relocation of flood-prone properties, Drainage/stormwater management projects, and hazard mitigation planning activities.

<http://www.fema.gov/fima/mitgrant.shtm>

Public Assistance Grant Program

FEMA's Public Assistance (PA) Grant Program allows State and Local governments and Non-Profit Organizations to respond to disasters, to recover from their impact and to mitigate impact from future disasters. The PA Program provides the basis for consistent training and credentialing of staff who administer the program; more accessible and understandable guidance and policy for participating in the grant program; improved customer service through a more efficient grant delivery process, applicant-centered management, and better information exchange; and continuing performance evaluations and program improvements.

Previous Activities Funded: Debris removal from public roads and rights-of-way, Emergency protective measures including search and rescue, warning of hazards, and demolition of unsafe structures, Utility

Distribution Systems, such as water treatment and delivery systems; and sewage collection and treatment facilities and public parks.

<http://www.fema.gov/rrr/pa/>

Purdue Cooperative Extension Service

Purdue Cooperative Extension Service provides valuable educational materials and training programs to assist in the event of a disaster or emergency

Steve Cain

Disaster Communication Specialist

615 W. State Street

Purdue University

West Lafayette, IN 47907

765-494-8410

Previous Activities Funded: Activities are educational in nature and not generally monetary offerings.

<http://www.ces.purdue.edu/eden/index.html>

Severe Repetitive Loss

This purpose of this FEMA program is to reduce or eliminate claims under the NFIP. This program applies to residential properties covered under an NFIP flood insurance policy and has at least 4 NFIP claim payments over \$5,000 each and a cumulative amount exceeds \$20,000 OR for which 2 separate claims payments have been made with the cumulative amount of the building portion exceeding the market value of the building.

Previous Activities Funded: Acquisition and demolition or relocation of at risk structures and conversion of the land to open space; elevation of existing structures to at least the Base Flood Elevation (BFE); minor physical localized flood reduction projects; and dry floodproofing for historic properties only.

<http://www.fema.gov/government/grant/srl/index.shtm>

Staffing for Adequate Fire and Emergency Response Grants

The purpose of the Staffing for Adequate Fire and Emergency Response (SAFER) grants is to award grants directly to volunteer, combination, and career fire departments to help the departments increase their cadre of firefighters. Ultimately, the goal is for SAFER grantees to enhance their ability to attain 24-hour staffing and thus assuring their communities have adequate protection from fire and fire-related hazards.

Previous Activities Funded: The SAFER grants have two activities that will help grantees attain this goal: 1) hiring of firefighters and 2) recruitment and retention of volunteer firefighters.

<http://www.firegrantsupport.com/safer/>

Volunteer Fire Assistance Program

The purpose of the Volunteer Fire Assistance (VFA) Program, formerly known as the Rural Community Fire Protection (RCFP) Program, is to provide Federal financial, technical, and other assistance to State foresters to train, and equip fire departments in rural areas and rural communities to prevent and suppress fires. A rural community is defined as having 10,000 or less population. This 10,000-population limit for participation in the VFA Program facilitates distribution of available VFA funding to the most

needy fire departments. The funding must be matched on a 50-50% basis by non-federal dollars or in-kind.

Previous Activities Funded: Purchase of Self Contained Breathing Apparatus, Protective clothing, installation of dry hydrants, and training for volunteer fire fighters.

www.fs.fed.us/fire/planning/vfa

Weatherization Assistance Program

Indiana's Weatherization Assistance Program provides residential energy conservation services to the low income citizens of Indiana. Funding comes from federal sources and is allocated to Community Action Agencies (CAA) to provide services in each of Indiana's 92 counties. The CAAs use their own crews or private contractors to provide comprehensive energy conservation services.

Previous Activities Funded: A thorough evaluation of the structures, including the safe and efficient operation of the furnace and water heater, is included in the treatment of each home.

<http://www.in.gov/fssa/families/housing/wap.html>

Wetland Reserve Program

The Wetlands Reserve Program (WRP) is a voluntary program offering landowners the opportunity to protect, restore, and enhance wetlands on their property. The NRCS goal is to achieve the greatest wetland functions and values, along with optimum wildlife habitat, on every acre enrolled in the program. This program offers landowners an opportunity to establish long-term conservation and wildlife practices and protection.

Previous Activities Funded: The USDA Natural Resources Conservation Service (NRCS) provides technical and financial support to help landowners with their wetland restoration efforts.

<http://www.nrcs.usda.gov/programs/wrp/>

Wildlife Habitat Incentive Program

The Wildlife Habitat Incentives Program (WHIP) is a voluntary program for people who want to develop and improve wildlife habitat primarily on private land. Through WHIP USDA's Natural Resources Conservation Service provides both technical assistance and up to 75 percent cost-share assistance to establish and improve fish and wildlife habitat. WHIP agreements between NRCS and the participant generally last from 5 to 10 years from the date the agreement is signed.

Previous Activities Funded: Development of areas primarily targeted for wildlife habitat also serve as beneficial areas for flood mitigation activities such as wetland construction/restoration, native grass plantings, and filter area establishment.

<http://www.nrcs.usda.gov/programs/whip/>

APPENDIX 9 CRS Checklist

This page intentionally blank

510 FLOODPLAIN MANAGEMENT PLANNING
 CRS Checklist - from Activity Worksheet 510-1 and CRS Coordinator's Manual

CRS 10-Step Planning Process	Max. Points	Est. Points	Comments
1. Organize and Prepare the Plan Supervision or direction of a professional planner Planning committee of department staff Process formally created by the community's governing board	10 2 6 2	8 2 6 0	Sheila McKinley, CBBEL Project Manager AICP #017260 Table 1-1 lists Planning Committee name, title, and department/agency represented
2. Involve the Public Planning process conducted through a planning committee Public meetings held at the beginning of the planning process Public meeting held on the draft plan	85 40 15 15	55 40 0 15	Appendix 2 contains Planning Committee meeting agendas and summaries; Planning Committee reviewed draft MHMP, attended public meeting, and assisted with local adoption Full draft presented to the public; draft plan made available for public review on webpage, EMA office, Planning Office
Questionnaires asks the public for information Recommendations are solicited from advisory groups, etc. Other public information activities to encourage input	5 5 5	0 0 0	
3. Coordinate With Other Agencies Review of existing studies and plans (required) Invited neighboring communities and other agencies (required) Contacted communities and NFIP and EM agencies	25 3 1 4	21 3 1 4	Conducted a Community Capability Assessment to better understand existing mitigation programs, policies, and projects Appendix 3 includes the invitation sent to the surrounding County EMA Directors; IDNR and IDHS involved in planning process NFIP Floodplain Administrators participated as Planning Committee members
NWS, ARC and others are asked how they can help community Meetings are held with agencies on mitigation strategies	4 10	0 10	IDHS Mitigation Officer participated in the Planning Committee meeting where Mitigation Practices were identified and implementation steps discussed
Draft action plan sent to agencies for comments	3	3	Draft MHMP made available for IDNR and IDHS to review and comment
4. Assess the Hazard Map of known flood hazards Description of known flood hazards	20 5 5	20 5 5	Exhibit illustrates FIRM floodplains as well as the location of critical facilities. Section 3 discusses areas with a known localized flooding issue as well as floodplains; Table shows potential losses of structures located within floodplains
Discussion of past floods Describes other natural hazards (required DMA)	5 5	5 5	Section provides an overview of the most recent floods of note as identified by the Planning Committee, local media sources, and NCDC data; Table shows Repetitive Loss numbers; Table shows flood insurance claims Section includes information related to Drought; Earthquake; Extreme Temperatures; Flood; Hailstorm, Thunderstorm, and Windstorm; Tornado ; Snow Storm and Ice; Dam Failure; Hazardous Materials
5. Assess the Problem Summary of hazard and impact on community (required) Procedures for warning and evacuation Impact on critical facilities and infrastructure	35 2 5 5	30 2 5 5	Section 3.0 includes Historic Data and Vulnerability Assessment for each hazard (Drought; Earthquake; Extreme Temperatures; Flood; Hailstorm, Thunderstorm, and Windstorm; Tornado ; Snow Storm and Ice; Dam Failure; Hazardous Materials) Section 4 "Emergency Services", "Public Information", and Table 4-1 "Emergency Warning Systems" and "Emergency Response & Recovery" identifies existing and proposed systems for early warning and detection Section 3.0 includes a Vulnerability Assessment for each hazard (Drought; Earthquake; Extreme Temperatures; Flood; Hailstorm, Thunderstorm, and Windstorm; Tornado ; Snow Storm and Ice; Dam Failure; Hazardous Materials) that specifies (where possible) the number of critical facilities that would be impacted

510 FLOODPLAIN MANAGEMENT PLANNING
 CRS Checklist - from Activity Worksheet 510-1 and CRS Coordinator's Manual

CRS 10-Step Planning Process	Max. Points	Est. Points	Comments
Impact on community's economy and tax base	5	0	
Number and types of buildings subject to the hazards	5	5	Section 3.0 includes a Vulnerability Assessment for each hazard (Drought; Earthquake; Extreme Temperatures; Flood; Hailstorm; Thunderstorm, and Windstorm; Tornado ; Snow Storm and Ice; Dam Failure; Hazardous Materials) that specifies (where possible) the number of critical facilities that would be impacted
Review of all flood insurance claims	4	4	Table list flood insurance claims
Natural and beneficial function of natural areas	4	4	Section 3 discusses the natural and beneficial function of floodplains for flood storage
Development, redevelopment, and population trends	5	5	Section 2 discusses population and demographics
6. Set Goals	2	2	Section 4.1 list goal for MHMP - to reduce total physical and economic losses from hazards
7. Review Possible Activities	30	30	
Preventive activities	5	5	Section 4.2.1 discusses existing Mitigation Practices; Table 4-1 lists proposed Mitigation Practices for Preventive
Property protection activities	5	5	Section 4.2.1 discusses existing Mitigation Practices; Table 4-1 lists proposed Mitigation Practices for Property Protection
Natural resource protection activities	5	5	Section 4.2.1 discusses existing Mitigation Practices; Table 4-1 lists proposed Mitigation Practices for Natural Resource Protection
Emergency services activities	5	5	Section 4.2.1 discusses existing Mitigation Practices; Table 4-1 lists proposed Mitigation Practices for Emergency Services
Structural projects	5	5	Section 4.2.1 discusses existing Mitigation Practices; Table 4-1 lists proposed Mitigation Practices for Structural Projects
Public information activities	5	5	Section 4.2.1 discusses existing Mitigation Practices; Table 4-1 lists proposed Mitigation Practices for Public Information
8. Draft Action Plan	70	60	
Recommendations for activities 2 of 6 categories from #7 (prioritized)	10	0	
Recommendations for activities 3 of 6 categories from #7 (prioritized)	20	0	
Recommendations for activities 4 of 6 categories from #7 (prioritized)	30	0	
Recommendations for activities 5 of 6 categories from #7s (prioritized)	45	45	Table 4-1 lists and prioritizes proposed Mitigation Practices for all 6 possible activities (Prevention, Property Protection, Natural Resource Protection, Emergency Services, Structural Projects, and Public Information); Section 5.0 includes an Implementation Plan for High Priority Mitigation Practices
Post-disaster mitigation policies and procedures	10	10	Section 6.1 recommends the County Surveyor reassemble the Planning Committee following a significant hazard incident to review the effectiveness of existing Mitigation Practices and make recommendations for improvement
Recommendations from Habitat Conservation Plan	10	0	
Action items for mitigation other hazards	5	5	Table 4-1 includes Mitigation Practices for Drought; Earthquake; Extreme Temperatures; Flood; Hailstorm, Thunderstorm, and Windstorm; Tornado ; Snow Storm and Ice; Dam Failure; Hazardous Materials; Section 5.0 includes an Implementation Plan for High Priority Mitigation Practices
9. Adopt the Plan	2	0	
10. Implement, Evaluate and Revise	15	15	
Procedures to monitor and recommend revisions (required)	5	5	Section 6.1 includes a process to monitor, evaluate, and update the MHMP; effort to be led by County Surveyor
Plan evaluated by same (or equally qualified) planning committee	10	10	Section 6.1 acknowledges that the successful implementation of the Mitigation Practices identified in this MHMP will require cooperation and participation of entire Planning Committee.
FLOODPLAIN MANAGEMENT PLAN	294	241	
REPETITIVE LOSS AREA ANALYSIS	50	0	
HABITAT CONSERVATION PLAN	15	0	
TOTAL	359	241	

