

Flatrock River

Flood Impacts (see also Appendix E-6)

- River crossings at County Road 900 North, County Road 550 North, County Road 400 North, and Indianapolis Road are closed due to flooding. Crossings at US 31 and County Road 800 North are open.
- Indianapolis Road Area (Area 16) experiences flooding, including loss of access to several businesses and minor flooding of some homes.
- Washington Street neighborhoods (Area 17) experience very minor flooding, which is most likely contained to Noblitt Park and the alley west of Lawton Avenue.
- Flooding closes portions of Riverside Drive south (Area 19) and north (Area 45), with access potentially limited to some structures along the north segment.
- Mill Race Park is flooded.

Response Considerations*

- | | |
|---|---|
| <p>Priority 2:
Indianapolis Road homes and businesses (Area 16)</p> <p>Priority 3:
Lawton Avenue and other Washington Street neighborhoods (Area 17)
Riverside Drive neighborhoods (Area 19 and 45)</p> | <p>Travel:
Prepare for increased traffic on US 31, which will likely assume the Indianapolis Road traffic load due to its closure.</p> |
|---|---|

Driftwood River

Flood Impacts (see also Appendix E-4)

- Lowell Road bridge closed due to flooding.
- Structures in the Front Door East/Jonathan Moore Pike area (Area 10) closest to the Driftwood River may begin to experience minor lawn and parking lot flooding.
- Tellman Camp Road area (Area 15) is severely flooded.
- Mill Race Park is flooded.

Response Considerations*

- | |
|---|
| <p>Priority 1:
Tellman Camp area (Area 15)</p> <p>Priority 3:
Businesses on the north side of Jonathan Moore Pike (Area 10)</p> |
|---|

Haw Creek

Flood Impacts (see also Appendix E-7)

- Flooding occurs in the Iowa and Bernice Street neighborhood (Area 33). Severe street flooding and minor flooding of some homes is possible.
- Everroad Park East (Area 37) experiences low-land flooding along Haw Creek.
- Mariah Foods and the Reo Street Area (Area 30) experiences flooding at the Mariah facility and homes along Reo Street.
- Minor flooding may occur at Willowood Apartments and in the area of Ironwood Court in the Arrowood area (Area 42).
- Midway Street area (Area 36) experiences low-land flooding along Haw Creek.
- Access to Griffin Industries (Area 46) is cut-off and severe flooding of the facility itself is possible.
- County Road 450 North is closed due to flooding. Flood water may be present on Rocky Ford Road and 10th Street, east of Central Avenue.

Response Considerations*

- | | |
|---|--|
| <p>Priority 2:
Iowa/Bernice Street neighborhood (Area 33)
Griffin Industries (Area 46)
Mariah and Reo Street neighborhood (Area 30)</p> <p>Priority 3:
Everroad Park East (Area 37)
Sycamore Bend/Arrowood (Area 42)
Midway (Area 36)
Candelight Village/Northbrook (Area 41)</p> | <p>Travel:
Announce passable routes and monitor traffic conditions.</p> <p>Other Notes:
Haw Creek is subject to flash flooding - conditions may vary and can change quickly. Careful monitoring of up-stream gages and local conditions is necessary to determine if further action is needed.</p> |
|---|--|

Sloan Branch

Flood Impacts (see also Appendix E-9)

- Eastridge Manor (Area 27) experiences flooding involving approximately 10 structures.
- Madison and Grant Park neighborhoods (Area 26) experience street flooding that may result in minor flooding of a few structures. Minor flooding may also affect nearby homes along Talley Road.

Response Considerations*

- | |
|--|
| <p>Priority 2:
Affected areas of Eastridge Manor (Area 27)</p> <p>Priority 3:
Madison and Grant Park neighborhoods (Area 26) and nearby homes along Talley Road.</p> |
|--|

Clifty Creek

Flood Impacts (see also Appendix E-2)

- Gladstone Avenue is closed due to flooding.

Response Considerations*

- | |
|--|
| <p>Travel:
Gladstone Avenue is closed due to flooding which may increase traffic on State Road 11 (if not flooded), US 31, and State Road 46.</p> |
|--|

Denios Creek

Flood Impacts (see also Appendix E-3)

- Bethel Village (Area 4) has the potential to experience severe flooding. However, changes made to the regulated drain to the west likely limit water flow along Deaver Road and through the neighborhood.
- The Dawson Street and State Road 11 areas (Area 5) experience flooding that affects access and includes severe flooding of about 15 homes.
- Shadow Creek Farms (Area 6) may experience access limitations due to 150 West flooding.
- Access between the Tipton Lakes area and points to the south may be limited by closures of County Road 400 West, County Road 225 West, and Crossing Lane. In a community-wide flood event this could further isolate this portion of the City by cutting off access from these neighborhoods to the I-65/SR 58 interchange, SR 58, and other points to the south and west (Closure of Carr Hill Road west of Tipton Lakes is also possible).

Response Considerations*

- | | |
|---|--|
| <p>Priority 1:
Bethel Village (Area 4)</p> <p>Priority 2:
Dawson Street and State Road 11 affected areas (Area 5)</p> | <p>Travel:
Crossing Lane, County Road 400 West and County Road 225 West could close due to flooding. If the I-65/SR 46 interchange is flooded these roads provide the only access from the Tipton Lakes area to the I-65/SR 58 interchange - the only other possible connection with the rest of the City.</p> <p>Other Notes:
Review northwestern Columbus (Tipton Lakes area) accessibility and the availability of emergency medical resources, water rescue equipment, etc. to the area. Community-wide flooding could result in the isolation of these neighborhoods.</p> |
|---|--|

East Fork White River

Flood Impacts (see also Appendix E-5)

- Jonesville Road (SR 11), Gladstone Avenue, Southern Crossing, and County Road 800 South all closed due to flooding.
- Garden City area (Area 9) experiences moderate flooding affecting approximately 5 structures and the access to additional structures.
- Blessing Road (Area 5) will be flooded and structures on the east side of SR 11 in Area 5 may have access limitations.
- Huffman Drive area (Area 8), including the Columbus Waste Water Treatment Plant, may experience minor access limitations.
- Mariah/ Reo Street area (Area 30) may experience flooding at the Mariah facility and homes along Reo Street.
- Griffin Industries (Area 46) experiences access restrictions and potentially damaging flooding. (Water Street (Area 29) and Griffin access road closed due to flooding).

Response Considerations*

- | | |
|---|---|
| <p>Priority 1:
Griffin Industries (Area 46)</p> <p>Priority 2:
Garden City (Area 9)
Mariah/Reo Street (Area 30)</p> <p>Priority 3:
CR 450/SR 11 neighborhood (Area 2)
Huffman Drive neighborhood (Area 8)
Blessing Road (Area 5)</p> | <p>Travel:
Notify INDOT of State Road 11 flooding. Prepare for heavy traffic on available cross-town travel routes; Johnathon Moore Pike (SR 46) and I-65 between SR 46 and SR 58.</p> |
|---|---|

*** This map summarizes and analyzes likely flood events. Actual flood events and impacts will vary based on rainfall locations and amounts, ground saturation, etc. This map is to be used as a guide with specific responses to specific floods determined by the FREP coordinators on a case-by-case basis.**

Sources of Data:
1. Depth Gages and Flooding Extents created from 2011 and 2016 IndianaMap LIDAR
2. Critical Facilities adapted from 2016 Bartholomew County MHMP
3. US Bureau of the Census TIGER files, 2019

DISCLAIMER
Flood extents/depths shown on this map were determined based on Flood Insurance Study models (FIRM), hydrologic models (Sloan Branch, Airport Tributary, Haw Creek, and Driftwood River LIDAR), and USGS modeling (East Fork White River and Flatrock River Flood Map inundation libraries). These models assume that flow paths and bridge openings remain unobstructed and do not fail. Average or standardized rainfall amounts and distributions are also assumed. Because these models cannot take every localized feature and all possible rainfall distributions into account, estimated flood elevations may be slightly different than actual flood elevations. In addition, the flood extents and depths were based on available LIDAR data for topography. While this data is much more accurate than previous large scale mapping efforts, elevations may be up to a foot too high or too low with most locations' elevations being within a half of a foot. In addition, the topographic information does not show features, such as back flow prevention devices, that may keep areas shown as flooded on this map from flooding for this frequency flood.

Therefore, the information on this map provides a guide for flood light decisions but must be combined with actual observations for additional guidance.

Additional flood impacts and overtopped roads are not shown but may occur:
- in areas where flood depth mapping was not developed as part of this Plan, or
- on minor roads such as private drives or unnamed roads.

Potential Red Cross Shelter Site Status*

- Flood Safe
 - Questionable
 - Compromised
- Note:**
Mt. Healthy School is also a flood-safe shelter (not on map).

* The designated shelter sites for each specific flood shall be determined by the Red Cross and may vary based on the needs created by the event.

10-year Flood Stream Gage Readings

- 15.4 ft East Fork White River @ Columbus 2nd Street Bridge
- 15.7 ft Driftwood River @ Edinburgh
- 16.1 ft Flatrock River @ Columbus US 31 Bridge
- 15.0 ft Haw Creek @ East Columbus
- 13.5 ft Haw Creek @ Clifford
- 19.2 ft Clifty Creek @ Columbus SR 46 Bridge

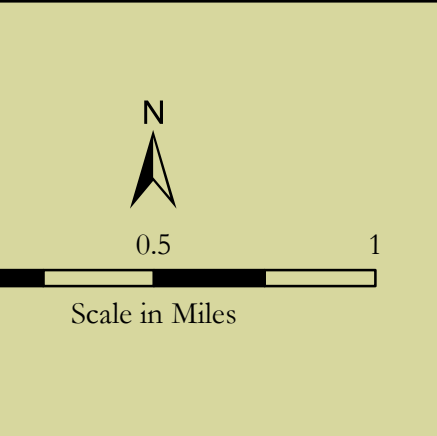
Likely Flood Response Priorities

- | | | | |
|---|---|--|---|
| <p>Priority 1 Areas</p> <p>Those that will likely be inundated by flood waters to the extent that structures will be flooded and human life and safety will be at risk. Based on flood-specific conditions, the FRP coordinator shall determine if the appropriate response is evacuation or shelter-in-place. During typical flood events, evacuation is likely needed. Refer to the flood depth maps for more information.</p> | <p>Priority 2 Areas</p> <p>Those that will likely be inundated by moderate or varying amounts of flood water. The extent of the flooding will range from minor street flooding to inundation of structures. Based on flood-specific conditions, FRP coordinators shall determine if the appropriate response is evacuation or shelter-in-place. If the flooding is expected to worsen, evacuation may be needed. Refer to the flood depth maps for more information.</p> | <p>Priority 3 Areas</p> <p>Those that will likely be affected by some amount of flooding, potentially limited to street flooding with minimal threat to structures. Based on flood-specific conditions, the FRP coordinator shall determine the appropriate response. These areas should be monitored and re-evaluated if flooding worsens. Refer to the flood depth maps for more information.</p> | <p>Areas of Potential Risk</p> <p>Those that will likely experience some degree of flooding if flooding becomes more severe. During this event, these areas will not likely experience flooding in streets or structures, but should be monitored if flood depths begin to increase. Refer to the flood depth maps for more information.</p> |
|---|---|--|---|

- Major Transportation Route (Closed)
- Secondary Transportation Route (Closed)
- Major Transportation Route (Open)
- Secondary Transportation Route (Open)
- Road Overtopped from 10-Year Flooding
- City of Columbus
- Planning Jurisdiction
- Neighborhood Reference Number

- Areas where flooding can occur by either the East Fork White River or its tributaries (highest depth is shown)
- Approximate Limits of 10-year Flood (based on depth maps)
- USGS Stream Gages
- Used for Forecasting and Depth of Flooding Purposes
- Used for Forecasting Purposes

- Critical Facilities**
- Airport
- Broadcast/Communication
- Dams
- Daycare Facility
- Fire Station
- Government Buildings
- Hazardous Material Handlers
- Jails
- Law Enforcement
- Medical Facility
- Military Installation
- Mobile Home Parks
- Potable Water
- Schools
- Shelters
- Wastewater Treatment Plants



Analysis By:

Christopher B. Burke Engineering, LLC
115 West Washington Street
Indianapolis, Indiana 46204
(317) 266-8000 | (317) 623-1306

PROJECT: City of Columbus
Flood Response Evacuation Plan
TITLE: Areas Impacted by the 10% Annual Chance (10-year) Flood

PROJECT NO.: 19-0132
APPROX. SCALE: as shown
DATE: 11/20/20
REVISION: 1

10-year Flood Impacts