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**CITY OF CONCORD**  
*New Hampshire's Main Street™*  
**Community Development Department**

**REPORT TO THE MAYOR AND CITY COUNCIL**

**FROM:** City Planning Board  
**DATE:** December 27, 2018  
**SUBJECT:** Ordinance amending the Code of Ordinances, Title III, Building and Housing Codes; Chapter 26, Building Regulations; and Title IV, Zoning Code; Chapter 28, Zoning Ordinance, pertaining to the Flood Hazard Overlay (FH) District

**Recommendation**

Accept this report and set for public hearing the attached amendments to the Ordinance to change the regulatory standards for designating special flood hazard areas in the City from the Army Corps of Engineers maps to the most updated FEMA maps and adopt ordinance amendment updates to meet FEMA funding eligibility requirements.

**Background**

City staff proposes to revise the Ordinance with regard to the method of delineation for special flood hazard areas. The revised regulations will be more consistent with the standard procedures of other New Hampshire municipalities.

The current flood hazards areas, including the 100 and 500 year floodplains and the floodway, are delineated by a US Army Corps of Engineers study from August 1972. This study was based on 20-foot contour intervals, without access to the LIDAR (light imaging, detection and ranging) technology that is now used to gather this type of information. The Army Corps study and resulting maps are more restrictive than the alternative study and maps used by FEMA, which is based on 2-foot contours and was last updated in April 2010 using LIDAR. This change affects only land abutting the Merrimack River, which is what was covered in the Army Corps study.

**Discussion**

Since the Army Corps maps delineate a much wider area as the floodway, the change to the FEMA maps will allow development in previously restricted areas. According to the zoning

ordinance, very limited water-related development is permitted within areas designated as floodway (i.e. docks, boat launches). No other residential or non-residential development is permitted in the floodway. The 100-year floodplain areas allow any non-residential use permitted in the underlying district, with some use and construction related restrictions. The most significant impact of the proposed change is that more land will now be considered part of the 100-year floodplain instead of part of the floodway, and will now allow development.

According to previous staff reports, the designations defined in the Army Corps study are based on the 1938 flood, the second highest and most severe flood on record (the most severe being the 1936 flood), and as modified by the later construction of five flood control dams. The FEMA maps do not take the 1938 flood into consideration, noting that floods of this magnitude are less probable today because of the flood control structures.

The Army Corps maps are therefore more cautious in their assessment of flood risk. This has been the justification in the past for using the Army Corps maps to designate special flood hazard areas in the City. However, staff notes that the FEMA maps have been updated twice since that time, using more advanced LIDAR technology and more accurate 2-foot contours. Staff notes that all other municipalities in New Hampshire use the FEMA maps as their regulatory standard; changing the standard would be consistent with regulatory norms in the state.

Staff notes that most of the area affected by the proposed change is not likely to be developed even after updating the standard. Much of the area is either under conservation easement, consists of wetlands, is owned by the City or State, and/or is subject to the Shoreland Protection standards of the City and State. However, property off of Loudon Road, including Kiwanis Park and property associated with the development south of Loudon Road, along with properties off of Manchester Street and Black Hill Road would now be out of the floodway. These properties could be more intensely developed or redeveloped if the amendments are adopted.

Please note, in addition to the FEMA map reference changes, staff is proposing several “housekeeping” amendments. Staff asked the New Hampshire Office of Strategic Initiatives Floodplain Management Program Coordinator to review the proposed changes to ensure compliance with FEMA requirements for emergency funds eligibility. The changes recommended by the Program Coordinator pertain to criteria for variances, which is updated language required by FEMA to meet program funding eligibility requirements.

The Planning Board held a public hearing to review the proposed amendments during their December 19, 2018 meeting. The Board unanimously recommended approval of the amendments. A draft ordinance that implements the proposed amendments is attached.