

Assessment of Town Code Related to Elevation of Buildings in a Flood Hazard Area

The two attachments provide an assessment of current town requirements regarding elevation of buildings to meet FEMA requirements. Courtney prepared the first assessment, and Gary prepared a slightly expanded version, building on Courtney's analysis. The analysis classifies properties in flood hazard areas according to several criteria – conforming/non-conforming, pre-flood insurance rate maps (FIRM)/post-FIRM, and damaged/undamaged. The intent is to focus the discussion on each of the classifications to understand how the need, or an individual owner's desire, to meet FEMA standards should be reflected in the town code.

Currently, the question concerning the height to which a damaged building in a flood zone must or can be rebuilt in the Town is confusing. The same can be said regarding the height to which a building can be raised voluntarily in a flood zone.

The search for answers to these questions must concentrate on the provisions of six sections of the Town Code: Section 101-27, 185-46, 185-59(A)(1), 185(A)(3), 185 60(B), and 185 Table 2.

In my opinion the answer to the to the question about allowed building height for a building in a flood zone depends upon three binary factors related to the building: 1) is the building pre- or post- FIRM? 2)Is the building conforming or non-conforming with respect to current height, area, and bulk standards? And, 3) is the proposed raising of the building mandatory because it was substantially damaged and being rebuilt, or is the proposed raising voluntary?

Differences in these three binary factors lead to 8 classes of buildings for which the answer to the how high the building can or must be raised has to be found in the relevant 6 Sections of the Town Code.

The following is the result of my attempt at exegesis.

1. Pre-FIRM-Conforming-Damaged (Sections 185-46 and 185-59(A)(3) and 185 Table 2

Section 185-46 waives Section 185-Table 2 requirements. Building must be rebuilt to FEMA plus Freeboard and any additional height required by law. Not clear whether 35' height limitation of Section 185-59(A)(3) applies as it appears to be limited to nonconforming buildings. Based on my discussion with David King , I believe that the 35' limitation would be waived. Since the building is conforming I further believe that the owner can rebuild to a base elevation above the Section 185 Table 2 level so long as the new height is below 35' measured from the crown of the road.

2. Post-FIRM – Conforming- Damaged (185 Table 2 and Section 101-27)

Building must be rebuilt to the Section 185 Table 2 FEMA plus freeboard elevation and must meet 185-Table 2 height reqmnt. If such raising of the same size building would exceed the Town-wide 35' height limitation, the owner is eligible for relief provided by Section 101-27 from 185 Table 2 Relief includes appeal to BOA for height variance and if rejected by the BOA , the owner can request for waiver of the Section 185 Table 2 flood elevation required by the provisions of Section 100 of the Code.

3. Pre- FIRM -Conforming Voluntary

Must or (may?) raise to a limit of FEMA plus freeboard. Section 185-46 does not apply. Section 185-59 does not apply nor does Section 101-27. Subject to 35' height limitation? Section 185-59(A)(3) appears not to apply. Needs clarification on what applies if meeting Table 2 requirements would exceed 35'. Should the relief of Section 101-27 be extended to voluntary conforming structures?

4, Post- FIRM – Conforming Voluntary

Must be raised to a base elevation of FEMA plus freeboard to be in compliance according to Section 185 Table 2 But what is allowed or required if meeting Section 185 Table 2 requirement would end up with bldg. height greater than 35'. Should Section 101-27 relief be provided by changing code? What if owner just want to raise to a base elevation lower than FEMA plus freeboard? My understanding of the Code is that owner is allowed as long as new height is lower than the Section 185 Table 2 height limitation. Answers are lacking right now.

5. Pre-FIRM Nonconforming Damaged

Appears that Section 185-46 applies. Height limit would appear to be Table 2 plus any additional height reqd by law. Section 185-59(A)(3) limits to 35' ? Owner appears to be denied Section 101-27 relief by the provision of Section 101-27 (A)(3). Question whether this makes sense. Council simply needs to clarify.

6. Post-FIRM Nonconforming Damage

Section 185-46 does not apply. 185 Table 2 applies. Must be rebuilt to FEMA plus freeboard and height limited by 185 Table 2. Same question relating to the impact of Section 127(A)(3) on possible relief applies.

7. Pre-FIRM Nonconforming Voluntary

Must or may or may not raise to 185 Table 2 standard. Not eligible for Section 101-27 relief. Does the provision of Section 185 60(B) prohibit raising the building to the Section 185 Table 2 base level of FEMA plus freeboard? Should owner be able to apply for a variance under Section 101-27?

8. Post-FIRM Nonconforming Voluntary

Ditto as for Class 7 above.

Code Requirements for Structures in a Flood Plain

Type of Structure	Current Code	Possible Change
Conforming		
Pre-FIRM, less than Substantial Damage	May be rebuilt to any conforming configuration and elevated to FEMA minimum plus freeboard. Height limited to 32' from BFE plus freeboard (per Table 2)	
Post-FIRM, less than Substantial Damage	May be rebuilt to any conforming configuration and elevated to FEMA minimum plus freeboard. Height limited to 32' from BFE plus freeboard (per Table 2)	
Pre-FIRM, Substantially Damaged	Must elevate to FEMA minimum plus freeboard and can rebuild to any conforming configuration. Height limit of 32' from BFE plus freeboard is waived (per 185-46) if rebuilt to same configuration.	
Post-FIRM, Substantially Damaged	Must elevate to FEMA minimum and can rebuild to any conforming configuration. Height limited to 32' from BFE plus freeboard (per Table 2).	
Pre-FIRM, Undamaged, Voluntary	May elevate, or rebuild to any conforming configuration and elevate, to FEMA minimum plus freeboard. Height limited to 32' from BFE plus freeboard (per Table 2)	Clarify whether or not this interpretation is intended and correct.
Post-FIRM, Undamaged, Voluntary	May elevate, or rebuild to any conforming configuration and elevate, to FEMA minimum plus freeboard. Height limited to 32' from BFE plus freeboard (per Table 2)	Clarify whether or not this interpretation is intended and correct.
Non-Conforming		
Pre-FIRM, less than Substantial Damage	May be rebuilt to same configuration (per 185-59). <i>May be elevated to FEMA minimum plus freeboard (per 101-27 A(3) and 185-60 B).</i> Height limited to 32' from BFE plus freeboard (per Table 2)	Clarify interpretation. What is effect of 185-60B -- is elevation an extension or expansion?
Post-FIRM, less than Substantial Damage	May be rebuilt to same configuration (per 185-59). <i>May be elevated to FEMA minimum plus freeboard (per 101-27 A(3) and 185-60 B).</i> Height limited to 32' from BFE plus freeboard (per Table 2)	Clarify interpretation. What is effect of 185-60B -- is elevation an extension or expansion?

Amend 185-59 A as follows: Except that in the process of repairing or reconstructing a non-conforming residential-use structure located in a flood-prone area (e.g., a FEMA-designated VE, AE, or AO flood zone) that does not conform to the required setbacks in any respect and does not meet Town building elevation standards and that has suffered substantial damage, said structure shall be elevated to the relevant minimum building-elevation requirement as per § 185-60B subsection 2 of this chapter. Strike 185-59 A (3).

Clarify interpretation. What is effect of 185-60B -- is elevation an extension or expansion?

Clarify interpretation. What is effect of 185-60B -- is elevation an extension or expansion?

Must elevate to FEMA minimum plus freeboard and build to same configuration (per 185-59 A and 185-46). Height limit of 32' from BFE plus freeboard is waived (per 185-46)

Must elevate to FEMA minimum and build to same configuration. Height limited to 32' from BFE plus freeboard (per Table 2)

May elevate in same configuration to FEMA minimum plus freeboard (per 185-60 B). Height limited to 32' from BFE plus freeboard (per Table 2)

May elevate in same configuration to FEMA minimum plus freeboard (per 185-60 B). Height limited to 32' from BFE plus freeboard (per Table 2)

Pre-FIRM, Substantially Damaged

Post-FIRM Substantially Damaged

Pre-FIRM, Undamaged, Voluntary

Post-FIRM, Undamaged, Voluntary