

**FLOOD DAMAGE PREVENTION**

**Chapter 150**

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**[HISTORY: Adopted by the Mayor and Council of the Borough of Wood-Ridge 7-17-1995 as Ord. No. 95-9.<sup>1</sup> Amendments noted where applicable.]**

**GENERAL REFERENCES**

Uniform construction codes — See Ch. 126.

Subdivision of land — See Ch. 220.

Zoning — See Ch. 248.

**§ 150-1. Statutory authorization.**

The Legislature of the State of New Jersey has at N.J.S.A. 40:48-1 et seq. delegated the responsibility to local governmental units to adopt regulations designed to promote the public health, safety and general welfare of its citizenry. Therefore, the Borough of Wood-Ridge, of New Jersey, does ordain as follows.

**§ 150-2. Findings of fact.**

- A. The flood hazard areas of the borough are subject to periodic inundations which result in loss of life and property, health and safety hazards, disruption of commerce and governmental services, extraordinary public expenditures for flood protection and relief and impairment of the tax base, all of which adversely affect the public health, safety and general welfare.
- B. These flood losses are caused by the cumulative effect of obstructions in areas of special flood hazard which increase flood heights and velocities and by the occupancy in flood hazard areas by uses vulnerable to floods or hazardous to other lands which are inadequately anchored, floodproofed or elevated. Uses that are inadequately floodproofed, elevated or otherwise

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<sup>1</sup> Editor's Note: This ordinance also repealed former Ch. 150, Flood Damage Prevention, adopted 8-17-1977 as Ord. No. 726, as amended.

protected from flood damage also contribute to the flood loss.

**§ 150-3. Statement of purpose.**

It is the purpose of this chapter to promote the public health, safety and general welfare and to minimize public and private losses due to flood conditions in specific areas by provisions designed to:

- A. Protect human life and health.
- B. Minimize expenditure of public money for costly flood control projects.
- C. Minimize the need for rescue and relief efforts associated with flooding and generally undertaken at the expense of the general public.
- D. Minimize prolonged business interruptions.
- E. Minimize damage to public facilities and utilities, such as water and gas mains, electric, telephone and sewer lines, streets and bridges located in areas of special flood hazard.
- F. Help maintain a stable tax base by providing for the sound use and development of areas of special flood hazard so as to minimize future flood blight areas.
- G. Ensure that potential buyers are notified that property is in an area of special flood hazard.
- H. Ensure that those who occupy the areas of special flood hazard assume responsibility for their action.

**§ 150-4. Methods of reducing flood losses.**

In order to accomplish its purposes, this chapter includes methods and provisions for:

- A. Restricting or prohibiting uses which are dangerous to health, safety and property due to water or erosion

hazards or which result in damaging increases in erosion or in flood heights or velocities.

- B. Requiring that uses vulnerable to floods, including facilities which serve such uses, be protected against flood damage at the time of initial construction.
- C. Controlling the alteration of natural floodplains, stream channels and natural protective barriers which help accommodate or channel floodwaters.
- D. Controlling filling, grading, dredging and other development which may increase flood damage.
- E. Preventing or regulating the construction of flood barriers which will unnaturally divert floodwater or which may increase flood hazards in other areas.

**§ 150-5. Definitions.**

- A. Unless specifically defined below, words or phrases used in this chapter shall be interpreted so as to give them the meanings they have in common usage and to give this chapter its most reasonable application.
- B. As used in this chapter, the following terms shall have the meanings indicated:

**APPEAL** — A request of the local administrator's interpretation of any provision of this chapter or a request for a variance.

**AREA OF SHALLOW FLOODING** — A designated AO, AH or VO Zone on a community's Flood Insurance Rate Map (FIRM) with a one-percent or greater annual chance of flooding to an average depth of one (1) to three (3) feet, where a clearly defined channel does not exist, where the path of flooding is unpredictable and where velocity flow may be evident. Such flooding is characterized by ponding or sheet flow.

**AREA OF SPECIAL FLOOD HAZARD** — The land in the floodplain within a community subject to one-percent or greater chance of flooding in any given year.

**BASE FLOOD** — The flood having a one-percent chance of being equaled or exceeded in any given year.

**BASEMENT** — Any area of a building having its floor subgrade on all sides.

**BREAKAWAY WALL** — A wall that is part of the structural support of the building and is intended, through its design and construction, to collapse under specific lateral loading forces without causing damage to the elevated portion of the building or supporting foundation system.

**DEVELOPMENT** — Any man-made change to improved or unimproved real estate, including, but not limited to, buildings or other structures, mining, dredging, filling, grading, paving, excavation or drilling operations, or storage of equipment or materials located within the area of special flood hazard.

**ELEVATED BUILDING** — A nonbasement building built, in the case of a building in an area of special flood hazard, to have the top of the elevated floor or, in the case of a building in a coastal high hazard area, to have the bottom of the lowest horizontal structural member of the elevated floor above the ground level by means of piling, columns (post and piers) or shear walls parallel to the flow of the water and adequately anchored so as not to impair the structural integrity of the building during a flood up to the magnitude of the base flood. In an area of special flood hazard “elevated building” also includes a building elevated by means of fill or solid foundation perimeter wall with openings sufficient to facilitate the unimpeded movement of floodwaters.

**FLOOD INSURANCE RATE MAP (FIRM)** — The official map on which the Federal Insurance Administration has

delineated both the areas of special flood hazard and the risk premium zones applicable to the community.

**FLOOD INSURANCE STUDY (FIS)** — The official report provided in which the Federal Insurance Administration has provided flood profiles, as well as the Flood Boundary/Floodway Map and the water surface elevation of the base flood.

**FLOOD or FLOODING** — A general and temporary condition of partial or complete inundation of normally dry land areas from:

- (1) The overflow of inland or tidal waters; and/or
- (2) The unusual and rapid accumulation or runoff of surface waters from any source.

**FLOODPLAIN MANAGEMENT REGULATIONS** — Zoning ordinances, subdivision regulations, building codes, health regulations, special purpose ordinances (such as floodplain ordinance, grading ordinance and erosion control ordinance) and other applications of police power. The term describes such state or local regulations, in any combination thereof, which provide standards for the purpose of flood prevention and reduction.

**FLOODWAY** — The channel of a river or other watercourse and the adjacent land areas that must be reserved in order to discharge the base flood without cumulatively increasing the water surface elevation more than two-tenths (0.2) foot.

**HISTORIC STRUCTURE** — Any structure that is:

- (1) Listed individually in the National Register of Historic Places (a listing maintained by the Department of Interior) or preliminarily determined by the Secretary of the Interior as meeting the requirements for individual listing on the National Register;

- (2) Certified or preliminarily determined by the Secretary of the Interior as contributing to the historical significance of a registered historic district preliminarily determined by the Secretary to qualify as a registered historic district;
- (3) Individually listed on a state inventory of historic places in states with historic preservation programs which have been approved by the Secretary of the Interior; or
- (4) Individually listed on a local inventory of historic places in communities with historic preservation programs that have been certified either:
  - (a) By an approved state program as determined by the Secretary of the Interior; or
  - (b) Directly by the Secretary of the Interior in states without approved programs.

**LOWEST FLOOR** — The lowest floor of the lowest enclosed area (including basement). An unfinished or flood-resistant enclosure, usable solely for the parking of vehicles, building access or storage in an area other than a basement is not considered a building's "lowest floor," provided that such enclosure is not built so to render the structure in violation of other applicable nonelevation design requirements.

**MANUFACTURED HOME** — A structure, transportable in one (1) or more sections, which is built on a permanent chassis and is designed for use with or without a permanent foundation when attached to the required utilities. The term "manufactured home" does not include a recreational vehicle.

**MANUFACTURED HOME PARK or MANUFACTURED HOME SUBDIVISION** — A parcel (or contiguous parcels) of land divided into two (2) or more manufactured home lots for rent or sale.

**NEW CONSTRUCTION** — Structures for which the start of construction commenced on or after the effective date of a floodplain regulation adopted herein and includes any subsequent improvements to such structures.

**NEW MANUFACTURED HOME PARK OR SUBDIVISION** — A manufactured home park or subdivision for which the construction of facilities for servicing the lots on which the manufactured homes are to be affixed (including at a minimum, the installation of utilities, the construction of streets and either final site grading or the pouring of concrete pads) is completed on or after the effective date of the floodplain management regulations adopted herein.

**RECREATIONAL VEHICLE** — A vehicle which is built on a single chassis, four hundred (400) square feet or less when measured at the longest horizontal projections, designed to be self-propelled or permanently towable by a light-duty truck and designed primarily for use not as a permanent dwelling but as temporary living quarters for recreational, camping, travel or seasonal use.

**START OF CONSTRUCTION** [for other than new construction or substantial improvements under the Coastal Barrier Resources Act (P.L. No. 97-348)] — Includes substantial improvements and means the date the building permit was issued, provided that the actual start of construction, repair, reconstruction, rehabilitation, addition, placement or other improvement was within one hundred eighty (180) days of the permit date. The actual start means either the first placement of permanent construction of a structure on a site, such as the pouring of a slab or footings, the installation of piles, the construction of columns or any work beyond the stage of excavation or the placement of a manufactured home on a foundation. Permanent construction does not include land preparation, such as clearing, grading and filling, nor does it include the installation of streets and/or walkways, nor does it include excavation for a

basement, footings or piers or foundations or the erection of temporary forms, nor does it include the installation on the property of accessory buildings, such as garages or sheds not occupied as dwelling units or not part of the main structure. For a substantial improvement, the actual start of construction means the first alteration of any wall, ceiling, floor or other structural part of a building, whether or not the alteration affects the external dimensions of the building.

**STRUCTURE** — A walled and roofed building, a manufactured home or a gas or liquid storage tank that is principally above ground.

**SUBSTANTIAL DAMAGE** — Damage of any origin sustained by a structure whereby the cost of restoring the structure to its before-damaged condition would equal or exceed 50% of the market value of the structure before the damage occurred.

**SUBSTANTIAL IMPROVEMENT** — Any reconstruction, rehabilitation, addition or other improvement of a structure, the cost of which exceeds 50% of the market value of the structure before the start of construction of the improvement. This term includes structures which have incurred substantial damage, regardless of the actual repair work performed. The term does not, however, include either:

- (1) Any project for improvement of a structure to correct existing violations of state or local health, sanitary or safety code specifications which have been identified by the local code enforcement officer and which are the minimum necessary to assure safe living conditions; or
- (2) Any alteration of an historic structure, provided that the alteration will not preclude the structure's continued designation as an historic structure.

VARIANCE — A grant of relief from the requirements of this chapter which permits construction in a manner that would otherwise be prohibited by this chapter.

**§ 150-6. Applicability.**

This chapter shall apply to all areas of special flood hazard within the jurisdiction of the Borough of Wood-Ridge.

**§ 150-7. Basis for establishing areas of special flood hazard. [Amended 9-18-1995 by Ord. No. 95-13; 9-21-2005 by Ord. No. 2005-23]**

The areas of special flood hazard identified by the Federal Insurance Administration in a scientific and engineering report entitled "The Flood Insurance Study of Bergen County, New Jersey" with accompanying Flood Insurance Rate Map Panels 0251, 0252, 0254, dated September 30, 2005, is hereby adopted by reference and declared to be part of this chapter. The Flood Insurance Study is on file at the Wood-Ridge Borough Hall, 85 Humboldt Street, Wood-Ridge, New Jersey 07075.

**§ 150-8. Compliance required; violations and penalties.**

No structure or land shall hereafter be constructed, located, extended, converted or altered without full compliance with the terms of this chapter and other applicable regulations. Violation of the provisions of this chapter by failure to comply with any of its requirements (including violations of conditions and safeguards established in connection with conditions) shall constitute a misdemeanor. Any person who violates this chapter or fails to comply with any of its requirements shall, upon conviction thereof, be fined not more than \$1,000 or be imprisoned for not more than 180 days, or both, for each violation and, in addition, shall pay all costs and expenses involved in the case. Nothing herein contained shall prevent the Borough of Wood-Ridge from taking

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such other lawful action as is necessary to prevent or remedy any violation.

**§ 150-9. Intent; more stringent restrictions to prevail.**

This chapter is not intended to repeal, abrogate or impair any existing easements, covenants or deed restrictions. However, where this chapter and another ordinance, easement, covenant or deed restriction conflict or overlap, whichever imposes the more stringent restrictions shall prevail.

**§ 150-10. Interpretation.**

In the interpretation and application of this chapter, all provisions shall be:

- A. Considered as minimum requirements.
- B. Liberally construed in favor of the governing body.
- C. Deemed neither to limit nor repeal any other powers granted under state statutes.

**§ 150-11. Warning and disclaimer of liability.**

The degree of flood protection required by this chapter is considered reasonable for regulatory purposes and is based on scientific and engineering considerations. Larger floods can and will occur on rare occasions. Flood heights may be increased by man-made or natural causes. This chapter does not imply that land outside the areas of special flood hazard or uses permitted within such areas will be free from flooding or flood damages. This chapter shall not create liability on the part of the Borough of Wood-Ridge, any officer or employee thereof or the Federal Insurance Administration for any flood damages that result from reliance on this chapter or any administrative decision lawfully made thereunder.

**§ 150-12. Development permits.**

A development permit shall be obtained before construction or development begins within any area of special flood hazard established in § 150-7. Application for a development permit shall be made on forms furnished by the Construction Code Officer and may include, but not be limited to, plans in duplicate drawn to scale showing the nature, location, dimensions and elevations of the area in question; existing or proposed structures, fill, storage of materials, and drainage facilities; and the location of the foregoing. Specifically, the following information is required:

- A. Elevation, in relation to mean sea level, of the lowest floor (including basement) of all structures.
- B. Elevation, in relation to mean sea level, to which any structure has been floodproofed.
- C. Certification by a registered professional engineer or architect that the floodproofing methods for any nonresidential structure meet the floodproofing criteria in § 150-18B.
- D. Description of the extent to which any watercourse will be altered or relocated as a result of proposed development.

**§ 150-13. Designation of Construction Code Officer.**

The Borough Construction Code Officer is hereby appointed to administer and implement this chapter by granting or denying development permit applications in accordance with its provisions.

**§ 150-14. Duties and responsibilities of Construction Code Officer.**

Duties of the Borough Construction Code Officer shall include, but not be limited to:

- A. Permit review. The Construction Code Officer shall:
- (1) Review all development permits to determine that the permit requirements of this chapter have been satisfied.
  - (2) Review all development permits to determine that all necessary permits have been obtained from those federal, state or local governmental agencies from which prior approval is required.
  - (3) Review all development permits to determine if the proposed development is located in the floodway and assure that the encroachment provisions of § 150-19 are met.
- B. Use of other base flood and floodway data. When base flood elevation and floodway data have not been provided in accordance with § 150-7, Basis for establishing areas of special flood hazard, the borough shall obtain, review and reasonably utilize any base flood elevation and floodway data available from a federal, state or other source, in order to administer § 150-18A, Specific standards, residential construction, and § 150-18B, Specific standards, nonresidential construction.
- C. Information to be obtained and maintained. The Construction Code Officer shall:
- (1) Obtain and record the actual elevation (in relation to mean sea level) of the lowest floor (including basement) of all new or substantially improved structures, and whether or not the structure contains a basement.
  - (2) For all new or substantially improved floodproofed structures:
    - (a) Verify and record the actual elevation (in relation to the mean sea level).
    - (b) Maintain the floodproofing certifications required in § 150-12C.

- (3) Maintain for public inspection all records pertaining to the provisions of this chapter.

D. Alteration of watercourses. The Construction Code Officer shall:

- (1) Notify adjacent communities and the state coordinating agency prior to any alteration or relocation of a watercourse, and submit evidence of such notification to the Federal Insurance Administration.
- (2) Require that maintenance is provided within the altered or relocated portion of said watercourse so the flood-carrying capacity is not diminished.

E. Interpretation of FIRM boundaries. The Construction Code Officer shall make interpretations where needed, as to the exact location of the boundaries of the areas of special flood hazard (for example, where there appears to be a conflict between a mapped boundary and actual field conditions). The persons contesting the location of the boundary shall be given a reasonable opportunity to appeal the interpretation as provided in §§ 150-15 and 150-16.

#### **§ 150-15. Appeals Board.**

- A. The Board of Adjustment, hereinafter Board, as established by the borough, shall hear and decide appeals and requests for variances from the requirements of this chapter.
- B. The Board shall hear and decide appeals when it is alleged there is an error in any requirement, decision or determination made by the Construction Code Officer in the enforcement or administration of this chapter.
- C. Those aggrieved by the decision of the Board, or any taxpayer, may appeal such decision to the Superior Court of New Jersey, as provided by law.

D. In passing upon such applications, the Board shall consider all technical evaluations, all relevant factors, standards specified in other sections of this chapter and:

- (1) The danger that materials may be swept onto other lands to the injury of others.
- (2) The danger to life and property due to flooding or erosion damage.
- (3) The susceptibility of the proposed facility and its contents to flood damage and the effect of such damage on the individual owner.
- (4) The importance of the service provided by the proposed facility to the community.
- (5) The necessity to the facility of a waterfront location, where applicable.
- (6) The availability of alternative locations for the proposed use which are not subject to flooding or erosion damage.
- (7) The compatibility of proposed use with existing and anticipated development.
- (8) The relationship of the proposed use to the comprehensive plan and floodplain management program of that area.
- (9) The safety of access to the property in times of flood for ordinary and emergency vehicles.
- (10) The expected heights, velocity, duration, rate of rise and sediment transport of the floodwaters and the effects of wave action, if applicable, expected at the site.
- (11) The costs of providing governmental services during and after flood conditions, including maintenance and repair of public utilities and facilities, such as sewer, gas, electrical and water systems and streets and bridges.

- E. Upon consideration of the factors of Subsection D and the purpose of this chapter, the Board may attach such conditions to the granting of variances as it deems necessary to further the purposes of this chapter.
- F. The borough shall maintain the records of all appeal actions, including technical information, and report any variances to the Federal Insurance Administration upon request.

**§ 150-16. Conditions for variances.**

- A. Generally, variances may be issued for new construction and substantial improvements to be erected on a lot of one-half (1/2) acre or less in size contiguous to and surrounded by lots with existing structures constructed below the base flood level, provided that the items in § 150-15D have been fully considered. As the lot size increases beyond the one-half (1/2) acre, the technical justification required for issuing the variance increases.
- B. Variances may be issued for the repair or rehabilitation of historic structures upon a determination that the proposed repair or rehabilitation will not preclude the structure's continued designation as an historic structure and the variance is the minimum necessary to preserve the historic character and design of the structure.
- C. Variances shall not be issued within any designated floodway if any increase in flood levels during the base flood discharge would result.
- D. Variances shall only be issued upon a determination that the variance is the minimum necessary, considering the flood hazard, to afford relief.
- E. Variances shall only be issued upon:
  - (1) A showing of good and sufficient cause;

- (2) A determination that failure to grant the variance would result in exceptional hardship to the applicant; and
- (3) A determination that granting of a variance will not result in increased flood heights, additional threats to public safety, extraordinary public expense, create nuisances, cause fraud on or victimization of the public as identified in § 150-15D or conflict with existing local laws or ordinances.

F. Any applicant to whom a variance is granted shall be given written notice that the structure will be permitted to be built with a lowest floor elevation below the base flood elevation and that the cost of flood insurance will be commensurate with the increased risk resulting from the reduced lowest floor elevation.

**§ 150-17. General standards.**

In all areas of special flood hazard, the following provisions are required:

**A. Anchoring.**

- (1) All new construction and substantial improvements shall be anchored to prevent flotation, collapse or lateral movement of the structure.
- (2) All manufactured homes shall be anchored to resist flotation, collapse or lateral movement. Methods of anchoring may include, but are not to be limited to, use of over-the-top or frame ties to ground anchors. This requirement is in addition to applicable state and local anchoring requirements for resisting wind forces.

**B. Construction materials and methods.**

- (1) All new construction and substantial improvements shall be constructed with materials and utility equipment resistant to flood damage.

- (2) All new construction and substantial improvements shall be constructed using methods and practices that minimize flood damage. **[Added 9-18-1995 by Ord. No. 95-13]**

C. Utilities.

- (1) All new and replacement water supply systems shall be designed to minimize or eliminate infiltration of floodwaters into the system. **[Added 9-18-1995 by Ord. No. 95-13]**
- (2) New and replacement sanitary sewage systems shall be designed to minimize or eliminate infiltration of floodwaters into the system.
- (3) On-site waste disposal systems shall be located to avoid impairment to them or contamination from them during flooding.
- (4) Electrical, heating, ventilation, plumbing and air conditioning equipment and other service facilities shall be designed and/or located so as to prevent water from entering or accumulating within the components during conditions of flooding.

D. Subdivision proposals.

- (1) All subdivision proposals shall be consistent with the need to minimize flood damage.
- (2) All subdivision proposals shall have public utilities and facilities, such as sewer, gas, electrical and water systems, located and constructed to minimize flood damage.
- (3) All subdivision proposals shall have adequate drainage provided to reduce exposure to flood damages.
- (4) Base flood elevation data shall be provided for subdivision proposals and other proposed development which contain at least fifty (50) lots or five (5) acres (whichever is less).

E. **[Added 9-18-1995 by Ord. No. 95-13]** Enclosure openings. For all new construction and substantial improvements, fully enclosed areas below the lowest floor that are usable solely for parking of vehicles, building access or storage in an area other than a basement and which are subject to flooding shall be designed to automatically equalize hydrostatic flood forces on exterior walls by allowing for the entry and exit of floodwaters. Designs for meeting this requirement must either be certified by a registered professional engineer or architect or must meet or exceed the following minimum criteria:

- (1) A minimum of two (2) openings having a total net area of not less than one (1) square inch for every square foot of enclosed area subject to flooding shall be provided.
- (2) The bottom of all openings shall be no higher than one (1) foot above grade.
- (3) Openings may be equipped with screens, louvers or other covering or devices, provided that they permit the automatic entry and exit of floodwaters.

**§ 150-18. Specific standards. [Amended 9-18-1995 by Ord. No. 95-13]**

In all areas of special flood hazard where base flood elevation data have been provided as set forth in § 150-7, Basis for establishing areas of special flood hazard, or in § 150-14B, Use of other base flood data, the following standards are required:

- A. Residential construction. New construction and substantial improvement of any residential structure shall have the lowest floor, including basement, elevated to or above base flood elevation.
- B. Nonresidential construction. New construction or substantial improvement of any commercial, industrial or other nonresidential structure shall either have the

lowest floor, including basement, elevated to the level of the base flood elevation or, together with attendant utility and sanitary facilities, be floodproofed so that below flood level the structure is watertight with walls substantially impermeable to the passage of water and with structural components having the capability of resisting hydrostatic and hydrodynamic loads and effects of buoyancy. A registered professional engineer or architect shall certify that the standards of this subsection are satisfied, which certification shall be provided to the officials as referred to herein.

C. Manufactured homes.

- (1) Manufactured homes shall be anchored in accordance with § 150-17A(2).
- (2) All manufactured homes to be placed or substantially improved within an area of special flood hazard shall be elevated on a permanent foundation such that the top of the lowest floor is at or above the base flood elevation.

**§ 150-19. Encroachments.**

The cumulative effect of any proposed development, when combined with all other existing and anticipated development, shall not increase the water surface elevation of the base flood more than two-tenths (0.2) foot at any point.