

CHAPTER 151: FLOOD DAMAGE PREVENTION

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GENERAL PROVISIONS**§ 151.01 STATUTORY AUTHORIZATION.**

The Legislature of the State of North Carolina has in G.S. §§ 143-21.6; 160A-19.3, 5 and 8; 160A-8, delegated the responsibility to local governmental units to adopt regulations designed to promote the public health, safety, and general welfare of its citizenry.

(Ord. passed 7-14-2003)

§ 151.02 FINDINGS OF FACT.

The Board of Commissioners of Cape Carteret, North Carolina, does ordain as follows:

(A) The flood prone areas within the jurisdiction of Cape Carteret are subject to periodic inundation which results in loss of life, property, health and safety hazards, disruption of commerce and governmental services, extraordinary public expenditures of 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 floodplains causing increases in flood heights and velocities, and by the occupancy in flood prone areas by uses vulnerable to floods or hazardous to other lands which are inadequately elevated, floodproofed, or otherwise unprotected from flood damages.

(Ord. passed 7-14-2003)

§ 151.03 STATEMENT OF PURPOSE.

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

(A) Restrict or prohibit uses which are dangerous to health, safety, and property due to water or erosion hazards, or which result in damaging increases in erosion, flood heights or velocities;

(B) Require that uses vulnerable to floods, including facilities which serve such uses, be protected against flood damage at the time of initial construction;

(C) Control the alteration of natural floodplains, stream channels, and natural protective barriers, which are involved in the accommodation of flood waters;

(D) Control filling, grading, dredging, and all other development which may increase erosion or flood damage; and

(E) Prevent or regulate the construction of flood barriers which will unnaturally divert floodwaters or which may increase flood hazards to other lands.

(Ord. passed 7-14-2003)

§ 151.04 OBJECTIVES.

The objectives of this chapter are:

(A) To protect human life and health;

(B) To minimize expenditure of public money for costly flood control projects;

(C) To minimize the need for rescue and relief efforts associated with flooding and generally undertaken at the expense of the general public;

(D) To minimize prolonged business losses and interruptions;

(E) To minimize damage to public facilities and utilities (i.e. water and gas mains, electric, telephone, cable and sewer lines, streets, and bridges) that are located in flood prone areas;

(F) To help maintain a stable tax base by providing for the sound use and development of flood prone areas in such a manner as to minimize flood blight areas; and

(G) To insure that potential home buyers are notified that property is in a Special Flood Hazard Area. (Ord. passed 7-14-2003)

§ 151.05 DEFINITIONS.

Unless specifically defined below, words or phrases used in this chapter shall be interpreted so as to give them the meaning they have in common usage and to give this chapter its most reasonable application.

ACCESSORY STRUCTURE or **APPURTENANT STRUCTURE**. A structure, which is, located on the same parcel of property as the principal structure and the use of which is incidental to the use of the principal structure. Garages, carports and storage sheds are common urban accessory structures. Pole barns, hay sheds and the like qualify as accessory structures on farms, and may or may not be located on the same parcel as the farm dwelling or shop building.

ADDITION TO AN EXISTING BUILDING. An extension or increase in the floor area or height of a building or structure.

APPEAL. A request for a review of the Floodplain Administrator's interpretation of any provision of this chapter.

AREA OF SHALLOW FLOODING. A designated AO Zone on a community's Flood Insurance Rate Map (FIRM) with base flood depths determined to be from 1 to 3 feet. These areas are located where a clearly defined channel does not exist, where the path of flooding is unpredictable and indeterminate, and where velocity flow may be evident.

AREA OF SPECIAL FLOOD HAZARD. See **SPECIAL FLOOD HAZARD AREA (SFHA)**.

BASEMENT. Any area of the building having its floor subgrade (below ground level) on all sides.

BASE FLOOD. The flood having a 1% chance of being equaled or exceeded in any given year.

BASE FLOOD ELEVATION (BFE). A determination as published in the Flood Insurance Study of the water surface elevations of the base flood.

BREAKAWAY WALL. A wall that is not 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 the supporting foundation system.

BUILDING. See **STRUCTURE**.

CAMA - NORTH CAROLINA'S COASTAL AREA MANAGEMENT ACT. This act, being G.S. Ch. 113A, Art. 7, along with the Dredge and Fill Law, being G.S. § 113-229, and the federal Coastal Zone Management Act, is managed through North Carolina Department of Environment and Natural Resources' (NCDENR's) Division of Coastal Management (DCM).

CHEMICAL STORAGE FACILITY. A building, portion of a building, or exterior area adjacent to a building used for the storage of any chemical or chemically reactive products.

COASTAL HIGH HAZARD AREA. A Special Flood Hazard Area extending from offshore to the inland limit of a primary frontal dune along an open coast and any other area subject to high velocity wave action from storms or seismic sources. The area is designated on a FIRM, or other adopted flood map as determined in § 151.07, as Zone VE or V1-30.

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.

DISPOSAL. Defined as in G.S. § 130A-290(a)(6).

ELEVATED BUILDING. A non-basement building, which has its reference level; raised above ground level by foundation walls, shear walls, posts, piers, pilings, or columns.

ENCROACHMENT. The advance or infringement of uses, fill, excavation, buildings, permanent structures or development into a floodplain, which may impede or alter the flow capacity of a floodplain.

EXISTING MANUFACTURED HOME PARK OR MANUFACTURED HOME 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 pre-FIRM.

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
- (2) The unusual and rapid accumulation of runoff of surface waters from any source.

FLOOD BOUNDARY AND FLOODWAY MAP (FBFM). An official map of a community, issued by the Federal Emergency Management Agency, on which the Special Flood Hazard Areas and the floodways are delineated. This official map is a supplement to and shall be used in conjunction with the Flood Insurance Rate Map (FIRM).

FLOOD HAZARD BOUNDARY MAP (FHBM). An official map of a community, issued by the Federal Emergency Management Agency, where the boundaries of the Special Flood Hazard Areas have been defined as Zone A.

FLOOD INSURANCE. The insurance coverage provided under the National Flood Insurance Program, being 42 U.S.C. §§ 4001 *et seq.*

FLOOD INSURANCE RATE MAP (FIRM). An official map of a community, issued by the Federal Emergency Management Agency, on which both the Special Flood Hazard Areas and the risk premium zones applicable to the community are delineated.

FLOOD INSURANCE STUDY (FIS). An examination, evaluation, and determination of flood hazard areas, corresponding water surface elevations, if appropriate, flood insurance risk zones, and other flood data in a community issued by FEMA. The Flood Insurance Study report includes Flood Insurance Rate Maps (FIRMs) and Flood Boundary and Floodway Maps (FBFMs), if published.

FLOODPLAIN or FLOOD PRONE AREA. Any land area susceptible to being inundated by water from any source.

FLOODPLAIN MANAGEMENT. The operation of an overall program of corrective and preventive measures for reducing flood damage and preserving and enhancing, where possible, natural resources in the floodplain, including but not limited to emergency preparedness plans, flood control works, floodplain management regulations, and open space plans.

FLOODPLAIN ADMINISTRATOR. The individual appointed to administer and enforce the floodplain management regulations.

FLOODPLAIN REGULATIONS. This chapter and other zoning ordinances, subdivision regulations, building codes, health regulations, special purpose ordinances, and other applications of police power which control development in flood-prone areas. This term describes federal, state or local regulations in any combination thereof, which provide standards for preventing and reducing flood loss and damage.

FLOODPROOFING. Any combination of structural and nonstructural additions, changes, or adjustments to structures, which reduce or eliminate risk of flood damage to real estate or improved real property, water and sanitation facilities, or structures with their contents.

FLOOD PRONE AREA. See **FLOODPLAIN**.

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 1 foot.

FLOOD ZONE. A geographical area shown on a Flood Hazard Boundary Map or Flood Insurance Rate Map that reflects the severity or type of flooding in the area.

FLOOR. See **LOWEST FLOOR.**

FREEBOARD. The additional amount of height added to the Base Flood Elevation (BFE) to account for uncertainties in the determination of flood elevations. See also **REGULATORY FLOOD PROTECTION ELEVATION.**

FUNCTIONALLY DEPENDENT FACILITY. A facility which cannot be used for its intended purpose unless it is located in close proximity to water, such as a docking or port facility necessary for the loading and unloading of cargo or passengers, shipbuilding, or ship repair. The term does not include long-term storage, manufacture, sales, or service facilities.

HAZARDOUS WASTE MANAGEMENT FACILITY. A facility for the collection, storage, processing, treatment, recycling, recovery, or disposal of hazardous waste as defined in G.S. § 130A-9.

HIGHEST ADJACENT GRADE (HAG). The highest natural elevation of the ground surface, prior to construction, next to the proposed walls of the structure.

HISTORIC STRUCTURE. Any structure that is:

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

(2) Certified or preliminarily determined by the Secretary of Interior as contributing to the historical significance of a registered historic district or a district preliminarily determined by the Secretary to qualify as a registered historic district;

(3) Individually listed on a state inventory of historic places; and

(4) Individually listed on a local inventory of historic places in communities with historic preservation programs that have been certified:

(a) By an approved state program as determined by the Secretary of Interior; or

(b) Directly by the Secretary of Interior in states without approved programs.

LOWEST ADJACENT GRADE (LAG). The elevation of the ground, sidewalk, patio slab, or deck support immediately next to the building after completion of the building. For Zone A and AO, use the natural grade elevation prior to construction.

LOWEST FLOOR. The subfloor, top of slab or grade of the lowest enclosed area (including basement). An unfinished or flood resistant enclosure, usable solely for parking of vehicles, building access, or limited storage in an area other than a basement area is not considered a building's lowest floor provided that an enclosure is not built so as to render the structure in violation of the applicable non-elevation design requirements of this chapter.

MANUFACTURED HOME. A structure, transportable in 1 or more sections, which is built on a permanent chassis and designed to be used with or without a permanent foundation when connected to the required utilities. The term **MANUFACTURED HOME** does not include a recreational vehicle.

MARKET VALUE. The building value, excluding the land (as agreed to between a willing buyer and seller), as established by what the local real estate market will bear. **MARKET VALUE** can be established by independent certified appraisal, replacement cost depreciated by age of building (actual cash value) or adjusted assessed values.

MEAN SEA LEVEL. For purposes of the NFIP, the National Geodetic Vertical Datum (NGVD) as corrected in 1929, the North American Vertical Datum (NAVD) as corrected in 1988 or other vertical control datum used as a reference for establishing varying elevations within the floodplain, to which Base Flood Elevations (BFEs) shown on a FIRM are referenced. Refer to each FIRM panel to determine datum used.

NEW CONSTRUCTION. Structures for which the start of construction commenced on or after the effective date of the original version of this chapter and includes any subsequent improvements to the structures.

NONCONFORMING BUILDING OR DEVELOPMENT. Any legally existing building or development, which fails to comply with the current provisions of this chapter.

NON-ENCROACHMENT AREA. 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 1 foot as designated in the Flood Insurance Study report.

OBSTRUCTION. Includes, but is not limited to, any dam, wall, wharf, embankment, levee, dike, pile, abutment, protection, excavation, channelization, bridge, conduit, culvert, building, wire, fence, rock, gravel, refuse, fill, structure, vegetation or other material in, along, across or projecting into any watercourse which may alter, impede, retard or change the direction and/or velocity of the flow of water, or due to its location, its propensity to snare or collect debris carried by the flow of water, or its likelihood of being carried downstream.

POST-FIRM. Construction or other development, which started on or after January 1, 1975 or on or after the effective date of the initial Flood Insurance Rate Map for the area, whichever is later.

PRE-FIRM. Construction or other development, which started before January 1, 1975 or before the effective date of the initial Flood Insurance Rate Map for the area, whichever is later.

PRIMARY FRONTAL DUNE. A continuous or nearly continuous mound or ridge of sand with relatively steep seaward and landward slopes immediately landward and adjacent to the beach and subject to erosion and over-topping from high tides and waves during major coastal storms. The inland limit of the primary frontal dune occurs at the point where there is a distinct change from a relatively steep slope to a relatively mild slope.

PUBLIC SAFETY and/or NUISANCE. Anything which is injurious to the safety or health of an entire community or neighborhood, or any considerable number of persons, or unlawfully obstructs the free passage or use, in the customary manner, of any navigable lake, or river, bay, stream, canal, or basin.

RECREATIONAL VEHICLE (RV). A vehicle, which is:

- (1) Built on a single chassis;
- (2) Four hundred square feet or less when measured at the largest horizontal projection;
- (3) Designed to be self-propelled or permanently towable by a light duty truck; and
- (4) Designed primarily not for use as a permanent dwelling, but as temporary living quarters for recreational, camping, travel, or seasonal use.

REFERENCE LEVEL. The portion of a structure or other development that must be compared to the regulatory flood protection elevation to determine regulatory compliance of the building:

- (1) Within Special Flood Hazard Areas designated as zones AI-A30, AE, A, A99, AO, or AH, the **REFERENCE LEVEL** is the top of the lowest floor; and
- (2) Within Special Flood Hazard Areas designated as zones VE or V 1-V30, the **REFERENCE LEVEL** is the bottom of the lowest horizontal structural member.

REGULATORY FLOOD PROTECTION ELEVATION. The elevation to which all structures and other development located within the Special Flood Hazard Areas must be elevated, or floodproofed if non-residential. Within areas where Base Flood Elevations (BFEs) have been determined, this elevation shall be the BFE plus 2 feet of freeboard. In areas where no BFE has been established, all structures and other development must be elevated or floodproofed, if non-residential, to 2 feet above the highest adjacent grade.

REMEDY A VIOLATION. To bring the structure or other development into compliance with state or community floodplain management regulations, or, if this is not possible, to reduce the impacts of its noncompliance. Ways that impacts may be reduced include protecting the structure or other affected development from flood damages, implementing the enforcement provisions of the chapter or otherwise deterring future similar violations, or reducing federal financial exposure with regard to the structure or other development.

REPETITIVE LOSS. Flood-related damages sustained by a structure on 2 separate occasions during any 10 year period for which the cost of repairs at the time of each flood event, on the average, equals or exceeds 25% of the market value of the structure before the damage occurred.

RETROFITTING. Measures, such as floodproofing, elevation, construction of small levees, and other modifications, taken on an existing building or its yard to protect it from flood damage.

RIVERINE. Relating to, formed by, or resembling a river (including tributaries), stream, brook, and the like.

SALVAGE YARD. Property used for the storage, collection, and/or recycling of any type of equipment whatsoever, whether industrial or noncommercial, and including but not limited to vehicles, appliances and related machinery.

SPECIAL FLOOD HAZARD AREA (SFHA). The land in the floodplain subject to a 1% or greater chance of being flooded in any given year as determined in § 151.07.

SOLID WASTE DISPOSAL FACILITY. Any facility involved in the disposal of solid waste, as defined in G.S. § 130A-290(a)(35).

SOLID WASTE DISPOSAL SITE. Defined as in G.S. § 130A-290(a)(36).

START OF CONSTRUCTION. Includes substantial improvement, and means the date the building permit was issued, provided the actual start of construction, repair, reconstruction, rehabilitation, addition placement, or other improvement was within 180 days of the permit date. The actual start means either the first placement of permanent construction of a structure (including a manufactured home) on a site, such as the pouring of slabs or footings, installation of piles, 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, 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 the building, whether or not that alteration affects the external dimensions of the building.

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

SUBSTANTIAL DAMAGE. Damage of any origin sustained by a structure during any 1-year period 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. See definition of **SUBSTANTIAL**

IMPROVEMENT. SUBSTANTIAL DAMAGE also means flood-related damage sustained by a structure on 2 separate occasions during a 10-year period for which the cost of repairs at the time of each flood event, on the average, equals or exceeds 25% of the market value of the structure before the damage occurred.

SUBSTANTIAL IMPROVEMENT. Any combination of repairs, reconstruction, rehabilitation, addition, or other improvement of a structure, taking place during any 1-year period whereby the cost of which equals or 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 correction of existing violations of state or community health, sanitary, or safety code specifications which have been identified by the Community Code Enforcement Official and which are the minimum necessary to assure safe living conditions; or

(2) Any alteration of a historic structure provided that the alteration will not preclude the structure's continued designation as a historic structure.

VARIANCE. A grant of relief from the requirements of this chapter.

VIOLATION. The failure of a structure or other development to be fully compliant with the community's floodplain management regulations. A structure or other development without the elevation certificate, other certifications, or other evidence of compliance required in §§ 151.25 through 151.47 is presumed to be in violation until the time as that documentation is provided.

WATERCOURSE. A lake, river, creek, stream, wash, channel or other topographic feature on or over which waters flow at least periodically. **WATERCOURSE** includes specifically designated areas in which substantial flood damage may occur.

WATER SURFACE ELEVATION (WSE). The height, in relation to mean sea level, of floods of various magnitudes and frequencies in the floodplains of coastal or riverine areas.
(Ord. passed 7-14-2003)

§ 151.06 LANDS TO WHICH THIS CHAPTER APPLIES.

This chapter shall apply to all Special Flood Hazard Areas within the jurisdiction, including Extraterritorial Jurisdictions (ETJ) if applicable, of Cape Carteret and within the jurisdiction of any other community whose governing body agrees, by resolution, to the applicability.
(Ord. passed 7-14-2003)

§ 151.07 BASIS FOR ESTABLISHING SPECIAL FLOOD HAZARD AREAS.

(A) The Special Flood Hazard Areas are those identified by the Federal Emergency Management Agency (FEMA) or produced under the Cooperating Technical State (CTS) agreement between the State of North Carolina and FEMA in its Flood Hazard Boundary Map (FHBM) or Flood Insurance Study (FIS) and its accompanying flood maps such as the Flood Insurance Rate Map(s) (FIRM) and/or the Flood Boundary Floodway Map(s) (FBFM), for Cape Carteret dated April 1, 1977, which with accompanying supporting data, and any revision thereto, including Letters of Map Amendment or Revision, are adopted by reference and declared to be a part of this chapter. The Special Flood Hazard Areas also include those defined through standard engineering analysis for private developments or by governmental agencies, but which have not yet been incorporated in the FIRM. This includes, but is not limited to, detailed flood data:

- (1) Generated as a requirement of § 151.27(K) and (L) of this chapter;
- (2) Preliminary FIRMs where more stringent than the effective FIRM; or
- (3) Post-disaster Flood Recovery Maps.

(B) In addition, upon annexation to Cape Carteret or inclusion in the Extraterritorial Jurisdiction (ETJ), the Special Flood Hazard Areas identified by the Federal Emergency Management Agency (FEMA) and/or produced under the Cooperating Technical State agreement between the State of North Carolina and FEMA as stated above for the Unincorporated Areas of Carteret County, with accompanying maps and other supporting data, and any revision thereto, are adopted by reference and declared to be a part of this chapter.

(Ord. passed 7-14-2003)

§ 151.08 ESTABLISHMENT OF FLOODPLAIN DEVELOPMENT PERMIT.

A floodplain development permit shall be required in conformance with the provisions of this chapter prior to the commencement of any development activities within Special Flood Hazard Areas as determined in § 151.07.

(Ord. passed 7-14-2003)

§ 151.09 COMPLIANCE.

No structure or land shall hereafter be located, extended, converted, altered, or developed in any way without full compliance with the terms of this chapter and other applicable regulations.

(Ord. passed 7-14-2003)

§ 151.10 ABROGATION AND GREATER RESTRICTIONS.

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

(Ord. passed 7-14-2003)

§ 151.11 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; and

(C) Deemed neither to limit nor repeal any other powers granted under state statutes.

(Ord. passed 7-14-2003)

§ 151.12 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 consideration. Larger floods can and will occur on rare occasions. Actual flood heights may be increased by man-made or natural causes. This chapter does not imply that land outside the Special Flood Hazard Areas or uses permitted within areas will be free from flooding or flood damages. This chapter shall not create liability on the part of Cape Carteret or by any officer or employee thereof for any flood damages that result from reliance on this chapter or any administrative decision lawfully made hereunder.

(Ord. passed 7-14-2003)

ADMINISTRATION

§ 151.25 DESIGNATION OF FLOODPLAIN ADMINISTRATOR.

The Carteret County Building Inspector, hereinafter referred to as the Floodplain Administrator, is hereby appointed to administer and implement the provisions of this chapter.

(Ord. passed 7-14-2003)

§ 151.26 FLOODPLAIN DEVELOPMENT PERMIT AND CERTIFICATE REQUIREMENTS.

(A) *Plans and application requirements.* Application for a floodplain development permit shall be made to the Floodplain Administrator on forms furnished by him or her prior to any development activities proposed to be located within flood prone areas. The following items/information shall be presented to the Floodplain Administrator to apply for a floodplain development permit.

(1) A plot plan drawn to scale which shall include, but shall not be limited to, the following specific details of the proposed floodplain development:

(a) The nature, location, dimensions, and elevations of the area of development/disturbance; existing and proposed structures, the location of utility systems, proposed grading/pavement areas, fill materials, storage areas, drainage facilities, and other proposed development;

(b) The boundary of the Special Flood Hazard Area as delineated on the FIRM or other flood map as determined in § 151.07 or a statement that the entire lot is within the Special Flood Hazard Area;

(c) Flood zone(s) designation of the proposed development area as determined on the FIRM or other flood map as determined in § 151.07;

(d) The boundary of the floodway(s) or non-encroachment area(s) as determined in § 151.07;

(e) The Base Flood Elevation (BFE) where provided as set forth in §§ 151.07; 151.27(K) and (L); or 151.42, 151.43, and 151.41(E);

(f) The old and new location of any watercourse that will be altered or relocated as a result of proposed development;

(g) The boundary and effective date of COBRA zone or OPA, if applicable; and

(h) Preparation of the plot plan by or under the direct supervision of a registered land surveyor or professional engineer and certified by same.

(2) Proposed elevation, and method thereof, of all development within a Special Flood Hazard Area including but not limited to:

(a) Elevation in relation to mean sea level of the proposed reference level (including basement) of all structures;

(b) Elevation in relation to mean sea level to which any non-residential structure will be flood-proofed; and

(c) Elevation in relation to mean sea level to which any proposed utility systems will be elevated or floodproofed.

(3) If floodproofing, a floodproofing certificate and back-up plans from a registered professional engineer or architect certifying that the non-residential flood-proofed development will meet the flood-proofing criteria in §§ 151.41(B) and 151.42(B).

(4) A foundation plan drawn to scale which shall include details of the proposed foundation system to ensure all provisions of this chapter are met. These details include but are not limited to:

(a) Proposed method of elevation, if applicable (i.e., fill, solid foundation perimeter wall, solid backfilled foundation, open foundation on columns/piers);

(b) Should solid foundation perimeter walls be used in floodplains other than coastal high hazard areas, details of sufficient openings to facilitate the unimpeded movements of floodwaters in accordance with § 151.41(D);

(c) In Coastal High Hazard Areas, the following must also be submitted prior to floodplain development permit issuance. Specific requirements are detailed in §§ 151.45 and 151.41(D)(2).

1. V-zone Certification form with accompanying plans and specifications verifying the engineered structure and breakaway wall designs as set forth in § 151.41(D)(2) of this chapter;

2. Plans for latticework or decorative screening, if applicable. Plans for any structures that will have lattice work or decorative screening must be submitted to the floodplain administrator for approval prior to floodplain development permit issuance;

3. Plans for non-structural fill, if applicable. Plans for placement of any non-structural fill must be submitted to the Floodplain Administrator for approval prior to floodplain development permit issuance. Requirements are detailed in § 151.46(B)(8) of this chapter.

(5) Usage details of any enclosed space below the regulatory flood protection elevation;

(6) Plans and/or details for the protection of public utilities and facilities such as sewer, gas, electrical, and water systems to be located and constructed to minimize flood damage;

(7) Copy of all other local, state and federal permits required prior to floodplain development permit issuance (i.e. Wetlands, Erosion and Sedimentation Control, CAMA, Riparian Buffers, Mining, and the like);

(8) If floodplain development permit is issued for placement of recreational vehicles and/or temporary structures, documentation to ensure § 151.41(F) and (G) of this chapter are met; and

(9) If a watercourse is proposed to be altered and/or relocated, a description of the extent of watercourse alteration or relocation; an engineering report on the effects of the proposed project on the flood-carrying capacity of the watercourse and the effects to properties located both upstream and downstream; and a map (if not shown on plot plan) showing the location of the proposed watercourse alteration or relocation.

(B) *Floodplain development permit data requirements.* The following information shall be provided at a minimum on the Floodplain Development Permit to ensure compliance with this chapter.

(1) A description of the development to be permitted under the floodplain development permit issuance;

(2) The Special Flood Hazard Area determination for the proposed development per available data specified in § 151.07;

(3) The regulatory flood protection elevation required for the reference level and all attendant utilities;

(4) The regulatory flood protection elevation required for the protection of all public utilities;

(5) All certification submittal requirements with timelines; and

(6) States that no fill material shall encroach into the floodway or non-encroachment area of any watercourse, if applicable.

(C) *Certification requirements.*

(1) An elevation certificate (FEMA Form 81-31) or floodproofing certificate (FEMA Form 81-65) is required after the reference level is completed. Within 21 calendar days of establishment of the reference level elevation, or floodproofing, by whatever construction means, whichever is applicable, it shall be the duty of the permit holder to submit to the Floodplain Administrator a certification of the elevation of the reference level, or floodproofed elevation, whichever is applicable in relation to mean sea level. The certification shall be prepared by or under the direct supervision of a registered land surveyor or professional engineer and certified by same. When floodproofing is utilized, the certification shall be prepared by or under the direct supervision of a professional engineer or architect and certified by same. Any work done within the 21-day calendar period and prior to submission of the certification shall be at the permit holder's risk. The Floodplain Administrator shall review the certificate data submitted. Deficiencies detected by the review shall be corrected by the permit holder immediately and prior to further progressive work being permitted to proceed. Failure to submit the certification or failure to make corrections required shall be cause to issue a stop-work order for the project.

(2) A final as-built elevation certificate (FEMA Form 81-31) or floodproofing certificate (FEMA Form 81-65) is required after construction is completed and prior to certificate of compliance/occupancy issuance. It shall be the duty of the permit holder to submit to the Floodplain Administrator a certification of final as-built construction of the elevation or floodproofed elevation of the reference level and all attendant utilities. The certification shall be prepared by or under the direct supervision of a registered land surveyor or professional engineer and certified by same. When floodproofing is utilized, certification shall be prepared by or under the direct supervision of a professional engineer or architect and certified by same. The Floodplain Administrator shall review the certificate data submitted. Deficiencies detected by the review shall be corrected by the permit holder immediately and prior to certificate of compliance/occupancy issuance. In some instances, another certification may be required to certify corrected as-built construction. Failure to submit the certification or failure to make corrections required shall be cause to withhold the issuance of a certificate of compliance/occupancy.

(3) A V-Zone/breakaway wall certification is required prior to issuance of a floodplain development permit within coastal high hazard areas. It shall be the duty of the permit applicant to submit to the Floodplain Administrator the certification to ensure the design standards of this chapter are met. A registered professional engineer or architect shall develop or review the structural design, plans, and specifications for construction and certify that the design and methods of construction to be used are in accordance with accepted standards of practice for meeting the provisions of this chapter. This certification is not a substitute for an elevation certificate.

(4) If a manufactured home is placed within an A, AO, AE, or A1-30 zone and the elevation of the chassis is above 36 inches in height, an engineered foundation certification is required per § 151.41(C).

(5) If a watercourse is to be altered or relocated, a description of the extent of watercourse alteration or relocation; an engineering report on the effects of the proposed project on the flood-carrying capacity of the watercourse and the effects to properties located both upstream and downstream; and a map showing the location of the proposed watercourse alteration or relocation shall all be submitted by the permit applicant prior to issuance of a floodplain development permit.

(D) *Certification exemptions.* The following structures, if located within A, AO, AE or A1-30 zones, are exempt from the elevation/floodproofing certification requirements specified in divisions (C) (1) and (2) above:

- (1) Recreational vehicles meeting requirements of § 151.41(F)(1);
- (2) Temporary structures meeting requirements of § 151.41(G); and

(3) Accessory structures less than 150 square feet meeting requirements of § 151.41(H).
(Ord. passed 7-14-2003)

§ 151.27 FLOODPLAIN ADMINISTRATOR; DUTIES AND RESPONSIBILITIES.

Duties of the Floodplain Administrator shall include, but not be limited to:

(A) Review all floodplain development applications and issue permits for all proposed development within flood prone areas to assure that the requirements of this chapter have been satisfied;

(B) Advise permittee that additional federal or state permits (i.e., Wetlands, Erosion and Sedimentation Control, CAMA, Riparian Buffers, Mining, and the like) may be required, and if specific federal or state permits are known, require that copies of the permits be provided and maintained on file with the floodplain development permit;

(C) Notify adjacent communities and the North Carolina Department of Crime Control and Public Safety, Division of Emergency Management, State Coordinator for the National Flood Insurance Program prior to any alteration or relocation of a watercourse, and submit evidence of the notification to the Federal Emergency Management Agency;

(D) Assure that maintenance is provided within the altered or relocated portion of the watercourse so that the floodcarrying capacity is not diminished;

(E) Prevent encroachments within floodways and non-encroachment areas unless the certification and flood hazard reduction provisions of § 151.44 are met;

(F) Obtain actual elevation (in relation to mean sea level) of the reference level (including basement) of all attendant utilities of all new or substantially improved structures, in accordance with § 151.26(C);

(G) Obtain the actual elevation (in relation to mean sea level) to which the new or substantially improved structures and all utilities have been floodproofed, in accordance with § 151.26(C);

(H) Obtain actual elevation (in relation to mean sea level) of all public utilities, in accordance with § 151.26(C);

(I) When floodproofing is utilized for a particular structure, obtain certifications from a registered professional engineer or architect in accordance with §§ 151.26(C) and 151.41(B);

(J) Where interpretation is needed as to the exact location of boundaries of the Special Flood Hazard Areas (for example, where there appears to be a conflict between a mapped boundary and actual field conditions), make the necessary interpretation. The person contesting the location of the boundary shall be given a reasonable opportunity to appeal the interpretation as provided in this chapter;

(K) When Base Flood Elevation (BFE) data has not been provided in accordance with § 151.07, obtain, review, and reasonably utilize any Base Flood Elevation (BFE) data, along with floodway data and/or non-encroachment area data available from a federal, state, or other source, including data developed pursuant to § 151.42(D), in order to administer the provisions of this chapter;

(L) When Base Flood Elevation (BFE) data is provided but no floodway nor non-encroachment area data has been provided in accordance with § 151.07, obtain, review, and reasonably utilize any floodway data, and/or nonencroachment area data available from a federal, state, or other source in order to administer the provisions of this chapter;

(M) When the exact location of boundaries of the Special Flood Hazard Areas conflict with the current, natural topography information at the site, the property owner may apply and be approved for a Letter of Map Amendment (LOMA) by FEMA. A copy of the Letter of Map Amendment issued from FEMA will be maintained by the Floodplain Administrator in the floodplain development permit file;

(N) Permanently maintain all records that pertain to the administration of this chapter and make these records available for public inspection;

(O) Make on-site inspections of work in progress. As the work pursuant to a floodplain development permit progresses, the Floodplain Administrator shall make as many inspections of the work as may be necessary to ensure that the work is being done according to the provisions of the local code and the terms of the permit. In exercising this power, the Floodplain Administrator has a right, upon presentation of proper credentials, to enter on any premises within the jurisdiction of the community at any reasonable hour for the purposes of inspection or other enforcement action;

(P) Issue stop-work orders as required. Whenever a building or part thereof is being constructed, reconstructed, altered, or repaired in violation of this chapter, the Floodplain Administrator may order the work to be immediately stopped. The stop-work order shall be in writing and directed to the person doing the work. The stop-work order shall state the specific work to be stopped, the specific reason(s) for the stoppage, and the condition(s) under which the work may be resumed. Violation of a stop-work order constitutes a misdemeanor;

(Q) Revocation of floodplain development permits as required. The Floodplain Administrator may revoke and require the return of the floodplain development permit by notifying the permit holder in writing stating the reason(s) for the revocation. Permits shall be revoked for any substantial departure from the approved application, plans, or specifications; for refusal or failure to comply with the requirements of state or local laws; or for false statements or misrepresentations made in securing the permit. Any floodplain development permit mistakenly issued in violation of an applicable state or local law may also be revoked;

(R) Make periodic inspections throughout all special flood hazard areas within the jurisdiction of the community. The Floodplain Administrator and each member of his or her inspections department shall have a right, upon presentation of proper credentials, to enter on any premises within the territorial jurisdiction of the department at any reasonable hour for the purposes of inspection or other enforcement action; and

(S) Follow through with corrective procedures of § 151.28.
(Ord. passed 7-14-2003)

§ 151.28 CORRECTIVE PROCEDURES.

(A) *Violations to be corrected.* When the Floodplain Administrator finds violations of applicable state and local laws, it shall be his or her duty to notify the owner or occupant of the building of the violation. The owner or occupant shall immediately remedy each of the violations of law pertaining to their property.

(B) *Actions in event of failure to take corrective action.* If the owner of a building or property shall fail to take prompt corrective action, the Floodplain Administrator shall give the owner written notice, by certified or registered mail to the owner's last known address or by personal service, stating:

(1) That the building or property is in violation of this chapter;

(2) That a hearing will be held before the Floodplain Administrator at a designated place and time, not later than 10 days after the date of the notice, at which time the owner shall be entitled to be heard in person or by counsel and to present arguments and evidence pertaining to the matter; and

(3) That following the hearing, the Floodplain Administrator may issue the order to alter, vacate, or demolish the building; or to remove fill as appears appropriate.

(C) *Order to take corrective action.* If, upon a hearing held pursuant to the notice prescribed above, the Floodplain Administrator shall find that the building or development is in violation of the Flood Damage Prevention chapter, he or she shall make an order in writing to the owner, requiring the owner to remedy the violation within a specified time period, not less than 60 days. Where the Floodplain Administrator finds that there is imminent danger to life or other property, he or she may order that corrective action be taken in the lesser period as may be feasible.

(D) *Appeal.* Any owner who has received an order to take corrective action may appeal the order to the local elected governing body by giving notice of appeal in writing to the Floodplain Administrator and the clerk within 10 days following issuance of the final order. In the absence of an appeal, the order of the Floodplain Administrator shall be final. The local governing body shall hear an appeal within a reasonable time and may affirm, modify and affirm, or revoke the order.

(E) *Failure to comply with order.* If the owner of a building or property fails to comply with an order to take corrective action from which no appeal has been taken, or fails to comply with an order of the governing body following an appeal, he or she shall be guilty of a misdemeanor and shall be punished in the discretion of the court.

(Ord. passed 7-14-2003)

§ 151.29 VARIANCE PROCEDURES.

(A) The Board of Adjustment as established by the Town of Cape Carteret, hereinafter referred to as the Appeal Board, shall hear and decide requests for variances from the requirements of this chapter.

(B) Any person aggrieved by the decision of the Appeal Board may appeal the decision to the court, as provided in G.S. Ch. 7A.

(C) Variances may be issued for the repair or rehabilitation of historic structures upon the determination that the proposed repair or rehabilitation will not preclude the structure's continued designation as a historic structure and the variance is the minimum necessary to preserve the historic character and design of the structure.

(D) In passing upon variances, the Appeal Board shall consider all technical evaluations, all relevant factors, all 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 the damage on the individual owner;
- (4) The importance of the services 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, not subject to flooding or erosion damage, for the proposed use;
- (7) The compatibility of the proposed use with existing and anticipated development;
- (8) The relationship of the proposed use to the comprehensive plan and floodplain management program for 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 flood waters and the effects of wave action, if applicable, expected at the site; and
- (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) A written report addressing each of the above factors shall be submitted with the application for a variance.

(F) Upon consideration of the factors listed above and the purposes of this chapter, the Appeal Board may attach the conditions to the granting of variances as it deems necessary to further the purposes of this chapter.

(G) Variances shall not be issued within any designated floodway or non-encroachment area if any increase in flood levels during the base flood discharge would result.

(H) (1) Variances may not be issued when the variance will make the structure in violation of other federal, state, or local laws, regulations, or ordinances.

(2) Variances shall only be issued upon a determination that the variance is the minimum necessary, considering the flood hazard, to afford relief.

(3) Variances shall only be issued upon:

(a) A showing of good and sufficient cause;

(b) A determination that failure to grant the variance would result in exceptional hardship;

and

(c) A determination that the granting of a variance will not result in increased flood heights, additional threats to public safety, or extraordinary public expense, create nuisance, cause fraud on or victimization of the public, or conflict with existing local laws or ordinances.

(4) Any applicant to whom a variance is granted shall be given written notice specifying the difference between the Base Flood Elevation (BFE) and the elevation to which the structure is to be built and a written statement that the cost of flood insurance will be commensurate with the increased risk resulting from the reduced reference level elevation. The notification shall be maintained with a record of all variance actions.

(5) The Floodplain Administrator shall maintain the records of all appeal actions and report any variances to the Federal Emergency Management Agency and the State of North Carolina upon request.

(I) A variance may be issued for solid waste disposal facilities, hazardous waste management facilities, salvage yards, and chemical storage facilities that are located in Special Flood Hazard Areas provided that all of the following conditions are met. A floodplain development permit may be issued for the development only if a variance is granted.

(1) The use serves a critical need in the community.

(2) No feasible location exists for the use outside the Special Flood Hazard Area.

(3) The reference level of any structure is elevated or floodproofed to at least the regulatory flood protection level.

(4) The use complies with all other applicable federal, state and local laws.

(5) Cape Carteret has notified the Secretary of the North Carolina Department of Crime Control and Public Safety of its intention to grant a variance at least 30 days prior to granting the variance. (Ord. passed 7-14-2003)

PROVISIONS FOR FLOOD HAZARD REDUCTION

§ 151.40 GENERAL STANDARDS.

In all Special Flood Hazard Areas the following provisions are required:

(A) All new construction and substantial improvements shall be anchored to prevent flotation, collapse, or lateral movement of the structure.

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

(C) All new construction or substantial improvements shall be constructed by methods and practices that minimize flood damages.

(D) Electrical, heating, ventilation, plumbing, 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. These include but are not limited to HVAC equipment, water softener units, bath/kitchen fixtures, ductwork, electric meter panels/boxes, utility/cable boxes, appliances (i.e., washers, dryers, refrigerator, and the like), hot water heaters, and electric outlets/switches.

(E) All new and replacement water supply systems shall be designed to minimize or eliminate infiltration of floodwaters into the system.

(F) New and replacement sanitary sewage systems shall be designed to minimize or eliminate infiltration of floodwaters into the systems and discharges from the systems into floodwaters.

(G) On-site waste disposal systems shall be located and constructed to avoid impairment to them or contamination from them during flooding.

(H) Any alteration, repair, reconstruction, or improvements to a structure, which is in compliance with the provisions of this chapter, shall meet the requirements of new construction as contained in this chapter.

(I) Non-conforming structures or other development may not be enlarged, replaced, or rebuilt unless the enlargement or reconstruction is accomplished in conformance with the provisions of this chapter. Provided, however, nothing in this chapter shall prevent the repair, reconstruction, or replacement of a building or structure existing on the effective date of this chapter and located totally or partially within the floodway, non-encroachment area, or stream setback, provided that the bulk of the building or structure below the regulatory flood protection elevation in the floodway, non-encroachment area, or stream setback is not increased and provided that the repair, reconstruction, or replacement meets all of the other requirements of this chapter.

(J) New solid waste disposal facilities, hazardous waste management facilities, salvage yards, and chemical storage facilities shall not be permitted in Special Flood Hazard Areas. A structure or tank for chemical or fuel storage incidental to an allowed use or to the operation of a water treatment plant or wastewater treatment facility may be located in a Special Flood Hazard Area only if the structure or tank is either elevated or floodproofed to at least the regulatory flood protection elevation and certified according to § 151.26(C) of this chapter.
(Ord. passed 7-14-2003)

§ 151.41 SPECIFIC STANDARDS.

In all Special Flood Hazard Areas where Base Flood Elevation (BFE) data has been provided, as set forth in § 151.07, or § 151.27(K) and (L), the following provisions are required:

(A) *Residential construction.* New construction or substantial improvement of any residential structure (including manufactured homes) shall have the reference level, including basement, elevated no lower than the regulatory flood protection elevation.

(B) *Non-residential construction.* New construction or substantial improvement of any commercial, industrial, or other non-residential structure shall have the reference level, including basement, elevated no lower than the regulatory flood protection elevation. Structures located in A, AO, AE and A1-30 zones may be floodproofed (to the regulatory flood protection elevation) in lieu of elevation provided that all areas of the structure below the required flood protection elevation are watertight with walls substantially impermeable to the passage of water, using structural components having the capability of resisting hydrostatic and hydrodynamic loads and the effect of buoyancy. A registered professional engineer or architect shall certify that the standards of this division are satisfied. The certification shall be provided to the official as set forth in § 151.26(C).

(C) *Manufactured homes.*

(1) New or replacement manufactured homes shall be elevated so that the reference level of the manufactured home is no lower than the regulatory flood protection elevation.

(2) Manufactured homes shall be securely anchored to an adequately anchored foundation to resist flotation, collapse, and lateral movement in accordance with the State of North Carolina Regulations for Manufactured/Mobile Homes, 1995 Edition, and any revision thereto adopted by the Commissioner of Insurance pursuant to G.S. § 143-1 through 143-15 or a certified engineered foundation. Additionally, when the elevation would be met by an elevation of the chassis 36 inches or less above the grade at the site, the chassis shall be supported by reinforced piers or other foundation elements of at least equivalent strength. When the elevation of the chassis is above 36 inches in height, an engineering certification is required.

(3) All foundation enclosures or skirting shall be in accordance with § 151.41(D).

(4) An evacuation plan must be developed for evacuation of all residents of all new, substantially improved or substantially damaged manufactured home parks or subdivisions located within flood prone areas. This plan shall be filed with and approved by the Floodplain Administrator and the local Emergency Management Coordinator.

(D) *Elevated buildings.* New construction or substantial improvements of elevated buildings that include fully enclosed areas that are below the regulatory flood protection elevation shall not be designed to be used for human habitation, but shall be designed to be used only for parking of vehicles, building access, or limited storage of maintenance equipment used in connection with the premises, be constructed entirely of flood resistant materials below the regulatory flood protection level and meet the following design criteria:

(1) In A, AO, AE, and A1-30 zones:

(a) Measures for complying with this requirement shall be designed to automatically equalize hydrostatic flood forces on exterior walls by allowing for the entry and exit of floodwaters. To meet this requirement, the foundation must either be certified by a professional engineer or architect or meet the following minimum design criteria:

1. Provide a minimum of 2 openings on different sides of each enclosed area subject to flooding;

2. The total net area of all openings must be at least 1 square inch for each square foot of each enclosed area subject to flooding;

3. If a building has more than 1 enclosed area, each area must have openings on exterior walls to allow floodwater to directly enter;

4. The bottom of all required openings shall be no higher than 1 foot above the adjacent grade;

5. Openings may be equipped with screens, louvers, or other opening coverings or devices provided they permit the automatic flow of floodwaters in both directions; and

6. Foundation enclosures:

a. Vinyl or sheet metal skirting is not considered an enclosure for regulatory and flood insurance rating purposes. Therefore the skirting does not require hydrostatic openings as outlined above.

b. Masonry or wood underpinning, regardless of structural status, is considered an enclosure and requires hydrostatic openings as outlined above to comply with this chapter.

(b) Access to the enclosed area shall be the minimum necessary to allow for parking of vehicles (garage door) or limited storage of maintenance equipment used in connection with the premises (standard exterior door) or entry to the living area (stairway or elevator). The interior portion of the enclosed area shall not be partitioned or finished into separate rooms, except to enclose storage areas.

(2) In Coastal High Hazard Areas (VE and V1-30 zones). Breakaway walls, lattice work or decorative screening shall be allowed below the regulatory flood protection elevation provided they are not part of the structural support of the building and are designed so as to breakaway, under abnormally high tides or wave action, without damage to the structural integrity of the building on which they are to be used and provided the following design specifications are met:

(a) Material shall consist of open wood lattice or mesh insect screening;

(b) Breakaway walls meeting the following design specifications:

1. Design safe loading resistance of each wall shall be not less than 10 nor more than 20 pounds per square foot; or

2. If more than 20 pounds per square foot, a registered professional engineer or architect shall certify that the design wall collapse would result from a water load less than that which would occur during the base flood event, and the elevated portion of the building and supporting foundation system shall not be subject to collapse, displacement, or other structural damage due to the effects of wind and water loads acting simultaneously on all building components (structural and non-structural). The water loading values used shall be those associated with the base flood. The wind loading values used shall be those required by the North Carolina State Building Code.

(E) *Additions/improvements.*

(1) Additions and/or improvements to pre-FIRM structures whereas the addition and/or improvements in combination with any interior modifications to the existing structure:

(a) Are not a substantial improvement, the addition and/or improvements must be designed to minimize flood damages and must not be any more non-conforming than the existing structure.

(b) Are a substantial improvement, both the existing structure and the addition and/or improvements must comply with the standards for new construction.

(2) Additions to post-FIRM structures with no modifications to the existing structure shall require only the addition to comply with the standards for new construction.

(3) Additions and/or improvements to post-FIRM structures whereas the addition and/or improvements in combination with any interior modifications to the existing structure:

(a) Are not a substantial improvement, the addition and/or improvements only must comply with the standards for new construction; and

(b) Are a substantial improvement, both the existing structure and the addition and/or improvements must comply with the standards for new construction.

(4) Where a fire wall or independent perimeter load-bearing wall is provided between the addition and the existing building, the addition(s) shall be considered a separate building and only the addition must comply with the standards for new construction.

(F) *Recreational vehicles.* Recreational vehicles placed on sites within a Special Flood Hazard Area shall either:

(1) Be on site for fewer than 180 consecutive days and be fully licensed and ready for highway use (a recreational vehicle is ready for highway use if it is on its wheels or jacking system, is attached to the site only by quick disconnect type utilities and has no permanently attached additions); or

(2) Meet all the requirements for new construction, including anchoring and elevation requirements of §§ 151.26, 151.41 and 151.42(C).

(G) *Temporary structures.* Prior to the issuance of a floodplain development permit for a temporary structure, the following requirements must be met:

(1) Applicants must submit to the Floodplain Administrator a plan for the removal of the structure(s) in the event of a hurricane or flash flood warning notification. The plan must include the following information:

- a. A specified time period for which the temporary use will be permitted;
- b. The name, address, and phone number of the individual responsible for the removal of the temporary structure;
- c. The time frame prior to the event at which a structure will be removed (i.e. minimum of 72 hours before landfall of a hurricane or immediately upon flood warning notification);
- d. A copy of the contract or other suitable instrument with a trucking company to insure the availability of removal equipment when needed; and
- e. Designation, accompanied by documentation, of a location outside the Special Flood Hazard Area to which the temporary structure will be moved.

(2) The above information shall be submitted in writing to the Floodplain Administrator for review and written approval.

(H) *Accessory structures.*

(1) When accessory structures (sheds, detached garages, and the like) are to be placed within a Special Flood Hazard Area, the following criteria shall be met:

- a. Accessory structures shall not be used for human habitation (including work, sleeping, living, cooking or restroom areas);
- b. Accessory structures shall be designed to have low flood damage potential;
- c. Accessory structures shall be constructed and placed on the building site so as to offer the minimum resistance to the flow of floodwaters;
- d. Accessory structures shall be firmly anchored in accordance with § 151.40(A);
- e. All service facilities such as electrical and heating equipment shall be installed in accordance with § 151.40(D); and
- f. Openings to relieve hydrostatic pressure during a flood shall be provided below regulatory flood protection elevation in conformance with § 151.41(D)(1).

(2) An accessory structure with a footprint less than 150 square feet does not require an elevation or floodproofing certificate. Elevation or floodproofing certifications are required for all other accessory structures in accordance with § 151.26(C).
(Ord. passed 7-14-2003)

§ 151.42 SUBDIVISIONS, MANUFACTURED HOME PARKS AND MAJOR DEVELOPMENTS.

All subdivision, manufactured home park and major development proposals located within Special Flood Hazard Areas shall:

(A) Be consistent with the need to minimize flood damage;

(B) Have public utilities and facilities such as sewer, gas, electrical, and water systems located and constructed to minimize flood damage;

(C) Have adequate drainage provided to reduce exposure to flood hazards; and

(D) Have Base Flood Elevation (BFE) data provided if development is greater than the lesser of 5 acres or 50 lots/manufactured home sites. The Base Flood Elevation (BFE) data shall be adopted by reference per § 151.07 to be utilized in implementing this chapter.
(Ord. passed 7-14-2003)

§ 151.43 STANDARDS FOR FLOODPLAINS WITHOUT ESTABLISHED BASE FLOOD ELEVATIONS.

Within the Special Flood Hazard Areas established in § 151.07, where no Base Flood Elevation (BFE) data has been provided, the following provisions shall apply:

(A) No encroachments, including fill, new construction, substantial improvements or new development shall be permitted within a distance of 20 feet each side from top of bank or 5 times the width of the stream whichever is greater, unless certification with supporting technical data by a registered professional engineer is provided demonstrating that the encroachments shall not result in any increase in flood levels during the occurrence of the base flood discharge.

(B) If § 151.42(A) is satisfied and Base Flood Elevation (BFE) data is available from other sources, all new construction and substantial improvements within the areas shall also comply with all applicable provisions of this chapter and shall be elevated or floodproofed in accordance with elevations established in accordance with § 151.27(K) and (L). When Base Flood Elevation (BFE) data is not available from a federal, state, or other source, the reference level, including basement, shall be elevated at least 2 feet above the highest adjacent grade.
(Ord. passed 7-14-2003)

§ 151.44 STANDARDS FOR FLOODPLAINS WITH BFE BUT WITHOUT ESTABLISHED FLOODWAYS OR NON-ENCROACHMENT AREAS.

Along rivers and streams where Base Flood Elevation (BFE) data is provided but neither floodway nor non-encroachment areas are identified for a Special Flood Hazard Area on the FIRM or in the FIS, no encroachments, including fill, new construction, substantial improvements, or other development, shall be permitted unless certification with supporting technical data by a registered professional engineer is provided demonstrating that the cumulative effect of the proposed development, when combined with all other existing and anticipated development, will not increase the water surface elevation of the base flood more than 1 foot at any point within the community.

(Ord. passed 7-14-2003)

§ 151.45 FLOODWAYS AND NON-ENCROACHMENT AREAS.

(A) Located within the Special Flood Hazard Areas established in § 151.07 are areas designated as floodways or nonencroachment areas.

(B) The floodways and non-encroachment areas are extremely hazardous areas due to the velocity of floodwaters that have erosion potential and carry debris and potential projectiles.

(C) The following provisions shall apply to all development within these areas:

(1) No encroachments, including fill, new construction, substantial improvements and other developments shall be permitted unless it has been demonstrated through hydrologic and hydraulic analyses performed in accordance with standard engineering practice that the proposed encroachment would not result in any increase in the flood levels during the occurrence of the base flood. The certification and technical data shall be presented to the Floodplain Administrator prior to issuance of a floodplain development permit.

(2) If division (A) above is satisfied, all development shall comply with all applicable flood hazard reduction provisions of this chapter.

(3) No manufactured homes shall be permitted, except replacement manufactured homes in an existing manufactured home park or subdivision provided the following provisions are met:

(a) The anchoring and the elevation standards of § 151.41(C); and

(b) The no encroachment standards of division (A) above are met.

(Ord. passed 7-14-2003)

§ 151.46 COASTAL HIGH HAZARD AREAS (VE AND V1-30 ZONES).

(A) Coastal High Hazard Areas are Special Flood Hazard Areas established in § 151.07, and designated as Zones VE or V 1-30.

(B) These areas have special flood hazards associated with high velocity waters from surges and, therefore, in addition to meeting all provisions in this chapter, the following provisions shall apply to all new construction, substantial improvements and all other development:

(1) All development shall:

- (a) Be located landward of the reach of mean high tide;
- (b) Be located landward of the first line of stable natural vegetation; and
- (c) Comply with all applicable CAMA setback requirements.

(2) All development shall be elevated so that the bottom of the lowest supporting horizontal member (excluding pilings or columns) is located no lower than the regulatory flood protection elevation. Floodproofing may not be utilized on any structures in Coastal High Hazard Areas to satisfy the regulatory flood protection elevation requirements.

(3) All space below the regulatory flood protection elevation shall be open so as not to impede the flow of water.

(4) Open wood lattice work or mesh insect screening may be permitted below the regulatory flood protection elevation for aesthetic purposes only and must be designed to wash away in the event of abnormal wave action and in accordance with § 151.41(D)(2). Design plans shall be submitted in accordance with § 151.26(A)(4)(c).

(5) All development shall be securely anchored on pilings or columns.

(6) All pilings and columns and the attached structures shall be anchored to resist flotation, collapse, and lateral movement due to the effect of wind and water loads acting simultaneously on all building components.

(7) A registered professional engineer or architect shall certify that the design, specifications and plans for construction are in compliance with the provisions contained in § 151.26 and divisions (B)(4), (6) and (8) of this section.

(8) There shall be no fill used as structural support. Non-compacted fill may be used around the perimeter of a building for landscaping/ aesthetic purposes provided the fill will wash out from storm surge, thereby rendering the building free of obstruction prior to generating excessive loading forces, ramping effects, or wave deflection. Design plans shall be submitted in accordance with § 151.26(A)(4)(c). The Floodplain Administrator may approve design plans for landscaping/aesthetic fill only after the applicant has provided an analysis by an engineer, architect, and/or soil scientist which demonstrates that the following factors have been fully considered:

(a) Particle composition of fill material does not have a tendency for excessive natural compaction;

(b) Volume and distribution of fill will not cause wave deflection to adjacent properties; and

(c) Slope of fill will not cause wave run-up or ramping.

(9) There shall be no alteration of sand dunes, which would increase potential flood damage.

(10) No manufactured homes shall be permitted except in an existing manufactured home park or subdivision. A replacement manufactured home may be placed on a lot in an existing manufactured home park or subdivision provided the anchoring and elevation standards are in compliance with this section.

(11) Recreational vehicles shall be permitted in Coastal High Hazard Areas provided that they meet the recreational vehicle criteria of § 151.41(F)(1) and the temporary structure provisions of § 151.41(G).

(Ord. passed 7-14-2003)

§ 151.47 STANDARDS FOR AREAS OF SHALLOW FLOODING (AO ZONES).

(A) Located within the Special Flood Hazard Areas established in § 151.07, are areas designated as shallow flooding areas.

(B) These areas have special flood hazards associated with base flood depths of 1 to 3 feet where a clearly defined channel does not exist and where the path of flooding is unpredictable and indeterminate.

(C) The following provisions shall apply within the areas:

(1) All new construction and substantial improvements of all structures shall have the lowest floor, including basement, elevated to the depth number specified on the Flood Insurance Rate Map (FIRM), in feet, above the highest adjacent grade. If no depth number is specified, the lowest floor, including basement, shall be elevated at least to the regulatory flood protection elevation as defined for the Special Flood Hazard Areas where no BFE has been established.

(2) All new construction and substantial improvements of non-residential structures shall have the option to, in lieu of elevation, be completely floodproofed together with attendant utilities and sanitary facilities to or above that level so that any space below that level 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. Certification is required as per §§ 151.26(C) and 151.41(B).

(Ord. passed 7-14-2003)

LEGAL STATUS PROVISIONS

§ 151.60 EFFECT ON RIGHTS AND LIABILITIES UNDER EXISTING FLOOD DAMAGE PROTECTION ORDINANCE.

This chapter in part comes forward by re-enactment of some of the provisions of the flood damage prevention ordinance enacted March 21, 1977 (original adoption date of this chapter) as amended, and it is not the intention to repeal but rather to re-enact and continue to enforce without interruption of the existing provisions, so that all rights and liabilities that have accrued there under are reserved and may be enforced. The enactment of this chapter shall not affect any action, suit or proceeding instituted or pending. All provisions of the flood damage prevention ordinance of Cape Carteret enacted on March 21, 1977, as amended, which are not reenacted herein are repealed.

(Ord. passed 7-14-2003)

§ 151.61 EFFECT UPON OUTSTANDING BUILDING PERMITS.

Nothing herein contained shall require any change in the plans, construction, size or designated use of any development or any part thereof for which a floodplain development permit has been granted by the Floodplain Administrator or his or her authorized agents before the time of passage of this chapter; provided, however, that when construction is not begun under the outstanding permit within a period of 6 months subsequent to passage of this chapter or any revision thereto, construction or use shall be in conformity with the provisions of this chapter.

(Ord. passed 7-14-2003)

§ 151.99 PENALTY.

(A) Violation of the provisions of this chapter or failure to comply with any of its requirements, including violation of conditions and safeguards established in connection with grants of variance or special exceptions, shall constitute a misdemeanor.

(B) Any person who violates this chapter or fails to comply with any of its requirements shall, upon conviction thereof, be fined not more than \$50 or imprisoned for not more than 30 days, or both.

(C) Each day the violation continues shall be considered a separate offense.

(D) Nothing herein contained shall prevent Cape Carteret from taking other lawful action as is necessary to prevent or remedy any violation.

(E) The Zoning Enforcement Officer is one designated by the Board of Commissioners.
(Ord. passed 7-14-2003)