

## SECTION 21: GLOSSARY

Some of the technical terms and acronyms are described in more detail in the sections noted. Note that the local flood damage prevention ordinance has its own definitions sections. The definitions in the legal ordinance take precedence over those in this section.

**404 Permit:** A permit required by Section 404 of the Clean Water Act to protect rivers and adjacent wetlands from being filled. This permit program is administered by the U.S. Army Corps of Engineers. Section 10.

### A

**A Zone:** See Zone A.

**Actual cash value:** The replacement cost for a building, minus a depreciation percentage based on age and condition. Section 16.

**Alluvial fan:** An area at the base of a valley where the slope flattens out, allowing the floodwater to decrease in speed and spread out, dropping sediment and rock over a fan-shaped area.

**Amendment:** A change to a FEMA floodplain map that removes an area that was inadvertently included in the Special Flood Hazard Area. Section 7.

**Anchoring:** Special connections made to ensure that a building will not float off or be pushed off its foundation during a flood. Section 12.

**Appeal:** A request to higher authority such as a Board of Appeals or a City Council to overrule a permit denial because the applicant claims that the ordinance has been incorrectly interpreted. Section 14.

**Approximate study:** Flood mapping that shows the approximate outline of the base floodplain. An approximate study does not produce a base flood elevation. Section 4.

### B

**B Zone:** See Zone B.

**Base flood:** The flood having a 1% chance of being equaled or exceeded in any given year. It also known as the 1% chance or 100-year flood. It has been adopted by the NFIP as the basis for mapping, insurance rating, and regulating new construction. Section 4.

**Base flood depth:** A measurement of the base flood in feet above ground, used for shallow flooding. Section 4.

Base flood elevation (BFE): The elevation (above sea level or other datum) of the crest of the base flood. Section 4.

Base floodplain: The area of water and land inundated during the crest of the base flood. Section 4.

Basement: Any area of a building having its floor subgrade (below ground level) on all sides. Section 12.

Basin: See watershed.

Benchmarks: Monuments on the ground that show the elevation of the spot above sea level. Section 4.

Best Available Data: The most recent, approved hydraulic and hydrologic information to show what the 1 00-year flood elevations and floodplain boundaries are for a particular area. Section 9.

BFE: See base flood elevation.

Building: A walled and roofed structure that is principally above ground. The term includes manufactured homes, mobile homes and gas or liquid storage tanks. In this course, the term is the same as the term “structure” in the federal regulations (44 CFR 59.1). Section 12.

Building condition survey: A windshield survey conducted to obtain a preliminary evaluation of the extent and severity of damage to buildings after a disaster. Section 19.

## **C**

C Zone: See Zone C.

CAC: See Community Assistance Contact.

CAP: See Community Assistance Program.

Catchment area: See watershed.

CAV: See Community Assistance Visit.

CFR: see Code of Federal Regulations.

cfs: Cubic feet per second, the unit by which discharges are measured (a cubic foot of water is about 7.5 gallons). Section 4.

Channel: Defined landforms that carry water. Section 4.

CLOMA: See Conditional Letter of Map Amendment.

CLOMR: See Conditional Letter of Map Revision.

**Closed basin lake:** A lake that has either no outlet or a relatively small one, where rainfall can cause the lake's level to rise faster than it can drain.

**Coastal high hazard area:** That part of the coastal floodplain where the wave heights during the base flood will be three feet or more.

**Code of Federal Regulations:** A master coding system to identify the federal agency regulations that have been published in the Federal Register. 44 CFR includes all the regulations published by the Federal Emergency Management Agency. Section 8.

**Community Assistance Contact:** A short visit or telephone contact with the community conducted by FEMA or IDNR/OWR to determine if the local floodplain management program would benefit from additional assistance. Section 3.

**Community Assistance Program:** A FEMA program that funds state activities that help communities in the NFIP. Section 3.

**Community Assistance Visit:** A visit to the community conducted by FEMA or IDNR to determine if the local floodplain management program would benefit from additional assistance. Section 3.

**Community Rating System:** A program that provides a flood insurance premium rate reduction based on a community's floodplain management activities. Section 18.

**Community:** A city, village, special town, or county with the statutory authority to enact floodplain regulations and participate in the National Flood Insurance Program. Section 3.

**Compensatory storage:** A practice that offset the loss of flood storage that results from filling by excavating an additional equivalent part of the floodplain. Section 13.

**Conditional Letter of Map Amendment:** A statement that if a project is constructed as planned, a Letter of Map Amendment can be issued later. Section 7.

**Conditional Letter of Map Revision:** A statement that if a project is constructed as planned, a Letter of Map Revision can be issued later. Section 7.

**Contour map:** A map that shows points with the same elevation as connected by a contour line. Section 4.

**Contour:** A line of equal elevation on a topographic (contour) map.

**Conveyance shadow:** An area upstream or downstream of an existing obstruction to flood flows. Section 11.

**Cooperating Technical Partner:** A FEMA program that seeks to combine Federal, State, and local resources to improve floodplain mapping. Section 4.

Cross section: Surveyed information that describes the stream and the floodplain at a particular point along the stream. Section 4.

CRS: See Community Rating System.

CTP: See Cooperating Technical Partner.

## **D**

Dam breach inundation area: The area flooded by a dam failure. Section 13.

Datum: A common vertical elevation reference point, usually in relation to sea level. Section 4.

Detailed study: Flood mapping that produces base flood elevations, floodways, and other pertinent flood data. Section 4.

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. Section 10.

DFIRM: Digital Flood Insurance Rate Map. Section

Discharge: The amount of water that passes a point in a given period of time. The rate of discharge is measured in cubic feet per second (cfs). Section 4.

DMA 2K or DMA 2000: The Disaster Mitigation Act of 2000. Section 20.

Dry floodproofing: Measures designed to keep water out of a building. Section 12.

## **E**

Elevation reference marks: See benchmarks.

Emergency Operations Center: A facility that houses communications equipment that is used to coordinate the response to a disaster or emergency. Section 19.

Eminent domain: Governmental power to acquire a property without the owner's consent. Section 8.

Enabling legislation: State laws that authorize communities to perform governmental activities, such as enacting and enforcing regulations. Section 8.

EO 11988: Executive Order 11988 Floodplain Management. A directive by the President that sets procedures Federal agencies must follow before they take or fund an action in the floodplain. Section 13.

EOC: See Emergency Operations Center.

Erosion: The gradual wearing away of land masses, as in riverine erosion Section 1.

## **F**

**FBFM:** See Flood Boundary Floodway Map.

**Federal Insurance Administration:** The original agency that administered the National Flood Insurance Program. Its duties have been assumed by the FEMA. Section 3.

**Federal Register:** A daily publication of the Federal government used to publicize Federal agencies' rules. See also Code of Federal Regulations. Section 8.

**FEMA:** The Department of Homeland Security's Federal Emergency Management Agency. Most of the National Flood Insurance Program field work and community coordination are done by FEMA's Region V Office.

**Fetch:** The distance along open water over which wind blows. Section 1.

**FHBM:** Flood Hazard Boundary Map. The map published by FEMA that delineates the approximate boundary of the floodplain. Section 5.

**FIA:** See Federal Insurance Administration.

**FIRM:** See Flood Insurance Rate Map.

**Flash flood:** A flood in hilly areas that may come scant minutes after a heavy rain. One can also occur in urban areas where pavements and drainage improvements speed runoff to a stream. Section 1.

**Flood:** The NFIP's definition is "a general and temporary condition of partial or complete inundation of normally dry land areas" Section 3.

**Flood Boundary Floodway Map.** An official map of a community, on which the Federal Insurance Administration has delineated the regulatory floodway. Section 5.

**Flood fringe:** The portion of the floodplain lying on either side of the floodway. Section 4.

**Flood hazard mitigation:** All actions that can be taken to reduce property damage and the threat to life and public health from flooding. Section 20.

**Flood Insurance Rate Map:** An official map of a community, on which FEMA has delineated both the Special Flood Hazard Areas and the flood zones applicable to the community. Section 5.

**Flood Insurance Study:** A report published by FEMA for a community in conjunction with the community's Flood Insurance Rate Map. The study contains such background data as the base flood discharges and water surface elevations that were used to prepare the FIRM. Section 4.

**Flood Mitigation Assistance:** A grant program funded by the National Flood Insurance Program. Section 20.

Flood of record: The highest known flood level for the area, as recorded in historical documents. Section 9.

Floodplain: Any land area susceptible to being inundated by flood waters from any source. Section 1.

Floodproofing: Protective measures added to or incorporated in a building that is not elevated above the base flood elevation to prevent or minimize flood damage. "Dry floodproofing" measures are designed to keep water from entering a building. "Wet floodproofing" measures minimize damage to a structure and its contents from water that is allowed into a building. Section 12.

Flood Protection Elevation (FPE): The elevation to which a building must be protected from flood damage through elevation or floodproofing. The FPE is usually the 100-year flood elevation plus a certain number of feet known as freeboard. Section 12.

Floodway: The stream channel and that portion of the adjacent floodplain which must remain open to permit passage of the base flood. Section 4.

Floodway Data Table: The table provided in the flood insurance study which provides detailed information for each cross section on streams studied in detail. Section 6.

FMA: See Flood Mitigation Assistance.

FPE: See Flood Protection Elevation.

Freeboard: A margin of safety added to the base flood elevation to account for waves, debris, miscalculations, or lack of data. Section 12.

Functionally dependent use: A use which cannot perform its intended purpose unless it is located or carried out in close proximity to water, such as a docking or port facility. Section 14.

## **G**

Geographic information system: Computer-based map systems that allow the user to keep a map updated easily and to correlate geographic information with other data, such as tax records on properties. Section 5.

GIS: See Geographic Information System

## **H**

Hazard mitigation: Actions that can be taken to reduce property damage and the threat to life and public health from flooding and other hazards. Section 20.

Hazard Mitigation Grant Program: A FEMA disaster assistance grant that funds mitigation projects. Section 20.

HEC-1: A computer model used to conduct a hydrologic study, which produces a flood discharge. Section 9.

HEC-2: A computer model used to conduct a hydraulic study, which produces flood elevations, velocities, and floodplain widths. Section 9.

HEC-RAS: A computer model used to conduct a hydraulic study, which produces flood elevations, velocities, and floodplain widths. Section 9.

Historic structure: A building or other structure that has been declared worthy of preservation by a recognized agency. Section 14.

HMGP: See Hazard Mitigation Grant Program.

Home rule: A community authorized to do anything that is not prohibited by statute. Section 8.

Human intervention: Actions that must be taken by one or more persons in order for a building to be floodproofed before floodwaters arrive. Section 12.

Hydraulics: The study of moving water. A hydraulic analysis in a flood insurance study calculates how high and how fast a flood discharge flows. Section 4.

Hydrodynamic force: The force of moving water, including the impact of debris and high velocities. Section 2.

Hydrologic cycle: The natural cycle that circulates water throughout the environment to maintain an overall balance between water in the air, on the surface, and in the ground. Section 1.

Hydrology: The science dealing with the waters of the earth. A flood discharge is developed by a hydrologic study. Section 4.

Hydrostatic pressure: The pressure put on a structure by the weight of standing water. The deeper the water, the more it weighs and the greater the hydrostatic pressure. Section 2.

## **I**

ICC: See Increased Cost of Compliance.

Ice floe: Large chunks of ice that can cause a great deal of damage when a frozen river or lake begins to melt and break up. Section 1.

Ice jam: Flooding that occurs when warm weather and rain break up frozen rivers and the broken ice floats downriver until it is blocked by an obstruction, creating an ice dam that blocks the channel and causes flooding. Section 1.

IDNR/OWR: Illinois Department of Natural Resources/Office of Water Resources.

IFG: See Individual and Family Grants.

ILCS: Illinois Compiled Statutes. Section 8.

Increased Cost of Compliance: An additional claim payment made to a flood insurance policy holder to help cover the cost of bringing a substantially damaged or repetitively damaged building into compliance with the NFIP construction standards for new buildings. Section 16.

Individual and Family Grants: A disaster assistance grant that helps people with their unmet needs (i.e., needs not helped by other disaster assistance programs). Section 20.

Insurance Services Office, Inc.: An insurance organization that administers the Community Rating System for FEMA. Section 18.

Inverse condemnation: See Taking.

ISO: See Insurance Services Office, Inc.

## **L**

LAG: See Lowest adjacent grade.

Lateral pressure: The amount of pressure imposed sideways by standing water. Deeper water exerts more lateral pressure than shallow water. Section 2.

Letter of Map Amendment: An official revision to a FEMA map done by describing the property affected. Section 7.

Letter of Map Change: A Letter of Map Amendment or a Letter of Map Revision. Section 7.

Letter of Map Revision based on Fill: An official revision to a FEMA map, based on the placement of new fill, done by describing the property affected. Section 7.

Letter of Map Revision: An official revision to a FEMA map done by describing the property affected. Section 7.

Licensed Professional Engineer: An engineer who has been tested and registered by the Illinois Department of Registration and Education.

LOMA: See Letter of Map Amendment.

LOMR: See Letter of Map Revision.

LOMR-F: See Letter of Map Revision based on fill.

Lowest adjacent grade: The lowest point where the ground touches the outside part of a structure. Section 7.

Lowest Floor: The lowest floor of the lowest enclosed area (including basement) of a building. Section 12.

## **M**

**Manufactured home:** A building that is transportable in one or more sections, built on a permanent chassis and designed for use with or without a permanent foundation when attached to utilities. The term includes mobile home and “double wides.” Section 12.

**Manufactured home park:** A parcel or contiguous parcels of land divided into two or more manufactured home lots for rent or sale. Section 12.

**Market value:** The price a willing buyer and seller agree upon. Section 16.

**Meander:** A curve in a river. Section 1.

**M-O-M:** See Multi-objective management.

**Multi-objective management:** An approach to planning and funding local programs that involves a variety of local interests and concerns. Section 20.

## **N**

**NAI:** See No Adverse Impact.

**National Geodetic Vertical Datum of 1929:** The national datum used by the National Flood Insurance Program. NGVD is based on mean sea level. It was known formerly as the "Mean Sea Level Datum of 1929 (MSL)." Section 4.

**NAVD:** See North American Vertical Datum.

**NGVD.** See National Geodetic Vertical Datum of 1929.

**NEPA:** The National Environmental Policy Act, a Federal law that requires agencies to evaluate the environmental impact of a proposed project. Section 13.

**NGVD:** See National Geodetic Vertical Datum of 1929.

**No Adverse Impact:** An approach to floodplain management which assures that the action of one property owner or a community does not adversely affect the properties and rights of other property owners. Sections 13 and 20.

**Non-structural flood protection measures:** Administrative tools for controlling flooding and flood damage, including regulations on development, building codes, property acquisition and structure relocation, and modification of existing buildings. Section 3.

**North American Vertical Datum:** The national elevation datum that is replacing NGVD. Section 4.

## **O**

**Ordinance:** The generic term for a law passed by a local government. Section 8.

Overbank flooding: Flooding that occurs when downstream channels receive more rain or snowmelt from their watershed than normal, or a channel is blocked by an ice jam or debris. Excess water overloads the channels and flows out onto the floodplain. Section 1.

## **P**

PDM: See Pre-Disaster Mitigation program.

Planned unit development. A regulatory approach that allows a developer to design the entire area while individual requirements are relaxed to allow for open space, mixed land uses, and other variances to traditional zoning rules. Section 13.

Ponding: Runoff that collects in depressions and cannot drain out, creating a temporary pond. Section 1.

Post-FIRM building: For insurance rating purposes, a post-FIRM building was constructed or substantially improved after December 31, 1974, or after the effective date of the initial Flood Insurance Rate Map of a community, whichever is later. A post-FIRM building is required to meet the National Flood Insurance Program's minimum Regular Program flood protection standards. Section 3.

Pre-Disaster Mitigation program: A FEMA grant program. Section 20.

Pre-FIRM building: For insurance rating purposes, a pre-FIRM building was constructed or substantially improved on or before December 31, 1974, or before the effective date of the initial Flood Insurance Rate Map of the community, whichever is later. Most pre-FIRM buildings were constructed without taking the flood hazard into account. Section 3.

Probability: A statistical term having to do with the size of a flood and the odds of that size of flood occurring in any year. Section 4.

Probation: An NFIP compliance tool that increases the cost of flood insurance in a community that has been found to not be properly managing floodplain development. Section 3.

Profile: A graph that shows elevations of various flood events. Section 4.

Public/Infrastructure Assistance: A disaster assistance grant that helps public agencies and nonprofit organizations finance repairs and reconstruction. Section 20.

PUD: See Planned Unit Development.

## **Q**

Q: An abbreviation used by engineers to stand for discharge. Section 4.

## **R**

**Recreational vehicle:** A vehicle which is (a) built on a single chassis, (b) 400 square feet or less when measured at the largest horizontal projection, (c) designed to be self-propelled or permanently towable by a light duty truck, and (d) designed primarily not for use as a permanent dwelling but as temporary living quarters for recreational, camping, travel, or seasonal use. Section 12.

**Reconstruction:** Building a new structure on the old foundation or slab of a structure that was destroyed, damaged, purposefully demolished or razed. The term also applies when an existing structure is moved to a new site. Section 16.

**Regular Program:** Also called the Regular Phase. The phase of community participation in the National Flood Insurance Program that begins on the date of the Flood Insurance Rate Map or when the community adopts an ordinance that meets the minimum requirements of the NFIP and adopts the technical data provided with the FIRM, whichever is later. Nearly all communities participating in the NFIP are in the Regular Program. Section 3.

**Rehabilitation:** An improvement made to an existing structure which does not affect its external dimensions. Section 16.

**Resolution:** A formal legal action taken by a community's governing board. Section

**Retrofitting:** Retrofitting techniques include floodproofing, elevation, construction of small levees, and other modifications made to an existing building or its yard to protect it from flood damage.

**Revision:** A change to a floodplain map based on new data submitted to FEMA. Section 7.

**Riverine:** Of or produced by a river. Riverine floodplains have readily identifiable channels. Floodway maps can only be prepared for riverine floodplains. Section 1.

**Roughness:** A measure related to ground surface conditions that reflects changes in floodwater velocity due to ground friction. Section 4.

**Runoff:** Rainfall and snowmelt that does not evaporate or percolate into the ground. Runoff is that portion of precipitation that reaches a channel or other body of surface water. Section 4.

## **S**

**Sanctions:** The insurance, lending, and financial assistance consequences that result when a community is not in the National Flood Insurance Program. Section 3

**Scour:** Erosion of soil around a structure caused by moving water. Section 2.

**Section 1316:** A section in the National Flood Insurance Act of 1968 that authorizes local officials to request that FEMA deny flood insurance coverage on a building built contrary to a local ordinance. Section 15.

Seiche: A rise in the level of a large body of water due to changes in air pressure. Section 1.

Setback: A required minimum distance that a structure must be positioned from a lot line, river channel, or other feature. Section 13.

SFHA: See Special Flood Hazard Area.

Sheet flow: Floodwater that spreads out over a large area that does not have defined channels at a somewhat uniform depth. Section 1.

SOMA: See Summary of Map Actions.

Special conversion: A process that converts a community from the Emergency Phase to the Regular Phase of the National Flood Insurance Program without a detailed Flood Insurance Study.

Special Flood Hazard Area: the base floodplain displayed on FEMA maps. It includes the A and V zones. Section 4.

Stafford Act: The Robert T. Stafford Disaster Relief and Emergency Assistance Act of 1988 which authorizes FEMA's current disaster assistance programs and the Hazard Mitigation Grant Program. Section 20.

Stationing: Determining the distance along a stream. Section 6.

Statutory authority: The powers granted to a local government by state law. Section 8.

Stormwater detention: Storing stormwater runoff for release at a restricted rate after the storm subsides. Section 13.

Stormwater management: Efforts to reduce the impact of increased runoff that results from new development. Section 13.

Stormwater retention: Storing stormwater runoff for later use in irrigation or groundwater recharge, or to reduce pollution. Section 13.

Structural flood control: Measures that control floodwaters by construction of barriers or storage areas or by modifying or redirecting channels. Section 3.

Structure: For floodplain management purposes, a walled and roofed building, including a gas or liquid storage tank, that is principally above ground, as well as a manufactured home. "Structure" for insurance coverage purposes, means a walled and roofed building, other than a gas or liquid storage tank which is principally above ground and affixed to a permanent site, as well as a manufactured home on a permanent foundation. For the latter purpose, the term includes a building while in the course of construction, alteration or repair, but does not include building materials or supplies intended for use in such construction, alteration or repair, unless such materials or supplies are within an enclosed building on the premises. Section 12.

Subdivision: The division of land into three or more parcels. Section 13.

Submit-for-rate: a process used when an insurance agent cannot complete the rate calculation for a flood insurance policy. Building and flood information must be sent to the insurance company or FEMA to calculate the premium. Section 17.

Substantial damage: Damage of any origin sustained by a structure whereby the cost of restoring the structure to its undamaged condition would equal or exceed 50 percent of the market value of the structure before the damage occurred. Section 16.

Substantial improvement: Any reconstruction, rehabilitation, addition or other improvement to a structure, the total cost of which equals or exceeds 50 percent of the market value of the structure before the start of construction of the improvement. The definition of “substantial improvement” includes buildings that have been repaired after suffering substantial damage. Section 16.

Summary of Map Actions: A report issued when a Flood Insurance Rate Map is revised that lists the status of previous map changes after the new map becomes effective. Section 7.

Suspension: Removal of a community from the National Flood Insurance Program because its floodplain management program does not meet the Program’s requirements. Section 3.

## **T**

Taking: Obtaining private property or without compensating the owner. The term also includes reducing the value of private property to such an extent that the owner is deprived of all economic interest. Section 8.

Thalweg: The bottom of a river channel. Section 1.

Topographic map: See contour map.

## **U**

Uplift: Hydrostatic pressure placed on a floor as water below the floor tries to rise. Section 2.

## **V**

Variance: A grant of relief by a community from the terms of a land use, zoning or building code regulation. Section 14.

Velocity: The speed of moving water, a force that is measured in feet per second. Section 1.

## **W**

Watershed: An area that drains into a lake, stream or other body of water. Section 1.

Wet floodproofing: Protecting a building from flood damage by using flood-resistant materials below the flood level and elevating things subject to flood damage above the flood level. Section 12.

Write Your Own (WYO): An insurance company that has agreed to sell flood insurance policies on behalf of the NFIP. Section 17.

## **X**

X Zone: See Zone X.

## **Z**

Zone A: The Special Flood Hazard Area (except coastal V Zones) shown on a community's Flood Insurance Rate Map. Section 5. There are seven types of A Zones:

A: SFHA where no base flood elevation is provided.

A1-A30: Numbered A Zones (e.g., A7 or A14), SFHA where the FIRM shows a base flood elevation in relation to NGVD.

AE: SFHA where base flood elevations are provided. AE Zone delineations are now used on new FIRMs instead of A# Zones.

AO: SFHA with sheet flow, ponding, or shallow flooding. Base flood depths (feet above grade) are provided.

AH: Shallow flooding SFHA. Base flood elevations in relation to NGVD are provided.

A99: An SFHA where a flood control project under construction will soon protect the area from the base flood.

AR: SFHA resulting from decertifying a previously accredited flood protection system that is in the process of being restored to provide protection from the base flood. An AR Zone is expected to be a temporary designation.

Zone B: Area of moderate flood hazard, usually depicted on Flood Insurance Rate Maps as between the limits of the base and 500-year floods. B Zones are also used to designate base floodplains of little hazard, such as those with average depths of less than 1 foot. Section 5.

Zone C: Area of minimal flood hazard, usually depicted on Flood Insurance Rate Maps as above the 500-year flood level. B and C Zones may have flooding that does not meet the criteria to be mapped as a Special Flood Hazard Area, especially ponding and local drainage problems. Section 5.

Zone D: Area of undetermined but possible flood hazard. Section 5.

Zone V: The Special Flood Hazard Area subject to coastal high hazard flooding. There are three types of V Zones: V, V#, and VE, and they correspond to the A Zone designations. Section 5.

Zone X: Newer Flood Insurance Rate Maps show Zones B and C (see above) as Zone X. Section 5.

Zoning: A regulatory program that sets and enforces development standards for different zones or districts of a community. Section 8.