

ARTICLE IV. - STORMWATER MANAGEMENT REGULATIONS^[4]

DIVISION 1. - GENERAL PROVISIONS

Sec. 42-221. - Stormwater management regulations.

This regulation shall be known and may be cited as the stormwater management (SM) regulations of Ordinance No. 2003-741 of the City of Orange Beach, Alabama.

(Ord. No. 2003-741, § 1.1, 4-1-2003)

Sec. 42-222. - Findings of fact.

The city, finds that uncontrolled stormwater runoff from developed land adversely affects the public health, safety, and welfare, as well as the health of natural resources, because:

- (1) Impervious surfaces increase the quantity and velocity of surface runoff, resulting in less percolation of water through soil and increased erosion and flooding conditions.
- (2) Improper collection and conveyance of stormwater adversely affects offsite property and increases the incidence and severity of flooding, which can endanger property and human life.
- (3) Increased erosion leads to sedimentation, or the build up of sediments, in stormwater management systems. This causes clogging and filling in with sediments which decreases the capacity of the stormwater systems to store or convey stormwater.
- (4) Alterations to surface water discharge patterns may interfere with optimum salinity conditions of coastal waters.
- (5) Stormwater runoff often contains nutrients, such as nitrogen and phosphorus, that adversely affect flora and fauna by accelerating the degradation of receiving waters.
- (6) Stormwater runoff often contains toxic and hazardous substances, such as pesticides, herbicides, metals, antifreeze, and oil that adversely affect flora and fauna in receiving waters and wetlands.

(Ord. No. 2003-741, § 1.2, 4-1-2003)

Sec. 42-223. - Objectives or intent.

It is the intent of this regulation to protect, maintain, and enhance the health, safety, and general welfare of the citizens and natural resources of the city, by:

- (1) Protecting and maintaining the physical, chemical, and biological integrity of

groundwater and surface waters.

- (2) Preventing activities that adversely affect groundwater and surface water resources.
- (3) Encouraging the use of stormwater management systems that approximate natural systems.
- (4) Ensuring that stormwater runoff peak rates, volumes, and pollutant loadings are no greater than natural conditions.
- (5) Preventing damage to wetlands and other natural resources.
- (6) Minimizing soil erosion and sedimentation.
- (7) Requiring surface and stormwater management practices that comply with the requirements of this regulation.
- (8) Promoting the development of stormwater retention and detention facilities that are aesthetically desirable.
- (9) Creating and implementing a dedicated source of funding for city stormwater management inspections and projects.

(Ord. No. 2003-741, § 1.3, 4-1-2003)

Sec. 42-224. - Interpretation.

The interpretation and application of this regulation shall consider all regulation provisions as follows:

- (1) Minimum requirements.
- (2) Liberally construed in favor of the objectives or intent of the city.
- (3) Deemed neither to limit nor repeal any lawful regulatory powers of the city.

(Ord. No. 2003-741, § 1.4, 4-1-2003)

Sec. 42-225. - Definitions.

Definitions of terminology used in this regulation shall be as follows:

ADEM shall mean the Alabama Department of Environmental Management.

Building footprint shall mean the percentage of the horizontal area measured from the exterior surface of the exterior walls of the ground floor of all principal buildings on a lot to the total lot area.

Building permit shall mean a permit issued by the city to an entity with the legal ability to construct a project and stormwater management system in accordance with the project and system design and permit conditions.

BMP shall mean best management practice.

City shall mean the City of Orange Beach, Alabama, including staff and elected officials.

City planner shall mean the Director of the Planning Department of the City of Orange Beach, Alabama, or his designee.

Conceptual stormwater management plan (SMP) shall mean an organized strategy prepared by the applicant or his representative indicating how stormwater runoff will be managed at the particular site of interest. Its purpose is to help developers devise a scheme to preserve runoff quantity and quality characteristics in accordance with pre-development criteria and comply with other stormwater regulations at local, state, and federal levels. The conceptual SMP shall be a well-conceived plan that incorporates the requirements and standards discussed in this article and other city requirements included in, but not limited to, building department ordinances, subdivision regulations, zoning ordinances, and the Flood Damage Prevention Ordinance. The applicant is also expected to comply with all applicable requirements in ADEM's coastal zone program.

Construction shall mean any onsite activity that will result in the creation of a new stormwater management system, including the building, assembling, expansion, modification, or alteration of the existing contours of the property; the erection of buildings or other structures, or any part thereof; or land clearing.

Control device shall mean the element of a discharge structure that allows the gradual release of water under controlled conditions, sometimes referred to as bleed-down.

Control elevation shall mean the lowest elevation at which water can be released through the control device.

Detention shall mean the collection and temporary storage of stormwater in such a manner as to limit the post-development peak discharge to pre-development peak discharge rates, with subsequent gradual release of the stormwater.

Development shall mean any of the following:

- (1) Construction, installation, alteration, demolition, or removal of a structure, impervious surface, or stormwater management system; or
- (2) Clearing, scraping, grubbing, or otherwise removing or killing the vegetation of a site; or
- (3) Adding, removing, exposing, excavating, leveling, grading, digging, dumping, or otherwise disturbing the soil or rock of a site in a manner that is contrary to the requirements of this regulation.

Director shall mean the building official or the director of the building department of the City of Orange Beach, Alabama, or his designee.

Discharge structure shall mean a structural device, usually constructed of a material such as concrete, metal, or timber, through which water from a stormwater management system is discharged to a receiving water.

Drainage area shall mean the watershed area contributing surface and stormwater runoff to the stormwater management system.

Elevation shall mean the height, in feet above mean sea level, according to the National Geodetic Vertical Datum.

Engineer shall mean a professional engineer registered in the State of Alabama, who is competent in the fields of hydraulics, hydrology and stormwater management.

Evapotranspiration shall mean the combination of water losses to the atmosphere from water and soil (evaporation) and from plants (transpiration).

Ex-filtration/infiltration shall mean the discharge of runoff into groundwaters by filtration through suitable fine textured granular media such as porous soil, uniformly graded sand and gravel, or other natural or artificial aggregate, which may be used in conjunction with filter fabric and/or underdrain pipe.

Filtration shall mean the selective removal of suspended matter from stormwater by passing the water through natural or artificial devices or through at least two feet of suitable fine textured granular media such as porous soil, uniformly graded sand and gravel, or other natural or artificial aggregate, which may be used in conjunction with filter fabric and/or underdrain pipe.

Impervious surface shall mean a surface that has been compacted or covered so that it is highly resistant to infiltration by water. For design purposes, all drives, parking, etc., shall be considered as impervious surfaces whether asphalt/concrete paved or crushed stone aggregate.

Overflow elevation shall mean the design elevation of a discharge structure at which, or below which, water is contained behind the structure, except for that which leaks out, or bleeds out, through a control device down to the control elevation.

Piers shall mean any structure or platform extending from a shore to and over water and supported by piles or pillars.

Pre-development discharge or volume shall mean the peak rate or volume at which stormwater runoff leaves a parcel of land in an undisturbed/natural site condition by gravity.

Project site shall mean the entire area of the parcel of land being developed, including areas that remain natural or undisturbed.

Retention shall mean the collection and temporary storage of stormwater in such a manner as to provide treatment through physical, chemical, or biological processes, with subsequent gradual release of the stormwater by percolation through soil, evaporation, or evapotranspiration.

Site shall mean any plot or parcel of land or combination of contiguous lots or parcels of land.

Site alteration shall mean any activity that changes any condition as defined as "alteration" in the city's zoning ordinance and building code.

Soil conservation plan shall mean a document prepared or approved by a local soil and water conservation district that outlines a system of management practices to control stormwater and soil erosion, reduce sediment loss, or protect receiving water quality on a specific parcel of property.

- (1) Stormwater shall mean the flow of water that results from and occurs during and immediately following a rainfall event.
- (2) Stormwater management plan (SMP) shall mean a plan for receiving, handling, and transporting storm- and surface waters. The stormwater management plan shall be developed from the conceptual SMP approved by the City of Orange Beach Planning Commission and include any and all construction and post-construction BMPs necessary and applicable to the altered site.
- (3) Stormwater management system shall include all natural and man-made elements used to convey stormwater from the first point of impact with the surface of the earth to a suitable outlet location internal or external to the boundaries of the City of Orange Beach, Alabama. The stormwater management system includes all pipes, channels, streams, ditches, wetlands, sinkholes, detention/retention basins, ex-filtration systems, ponds, and other stormwater conveyance and treatment facilities.
- (4) Surface water shall mean a body of water that is exposed to the atmosphere, such as a swale, ditch, pond, creek, river, bayou, waterway, and bay.
- (5) Swale shall mean a manmade trench that:
 - a. Has a top width-to-depth ratio of the cross section equal to or greater than 6:1, or side slopes equal to or greater than three feet horizontal to one-foot vertical; and
 - b. Contains contiguous areas of standing or flowing water only following a rainfall event; and
 - c. Is planted with or has stabilized vegetation suitable for soil stabilization, surface water treatment, and nutrient uptake; and
 - d. Is designed to take into account the soil erodibility, soil percolation, slope, slope length, and drainage area so as to prevent erosion and reduce pollutant concentration of any discharge.
 - e. If located in a right-of-way, is planted in solid sod.

(6) *USACOE* shall mean the United States Army Corps of Engineers.

(Ord. No. 2003-741, § 1.5(1), 4-1-2003; Ord. No. 2005-841, § 3, 12-7-2004)

Sec. 42-226. - Repealer.

Ordinance 2001-620 and any ordinance or ordinance provision of the city inconsistent with any of the provisions of this ordinance in relation to stormwater management plans submitted to the planning department is hereby repealed to the extent of the inconsistency only.

(Ord. No. 2003-741, § 1.5(2), 4-1-2003)

Sec. 42-227. - Severability.

Should any section or provision of this article be declared invalid by a court of competent jurisdiction, such decision shall not affect the validity of any of the remaining provisions of this article.

(Ord. No. 2003-741, § 1.6, 4-1-2003)

Sec. 42-228. - Compatibility with other ordinance requirements.

Approvals issued pursuant to this article do not relieve the applicant of the responsibility to secure required permits or approvals for activities regulated by any other applicable code, rule, act, or ordinance.

(Ord. No. 2003-741, § 1.7, 4-1-2003)

Secs. 42-229—42-245. - Reserved.

DIVISION 2. - PERMITTING

Sec. 42-246. - Applicability.

This regulation shall apply to all land within the city planning jurisdiction. No person may construct or reconstruct a structure, or change the size of a structure, except as hereinafter exempted, without first complying with the requirements of this stormwater ordinance, as well as obtaining an applicable building permit from the city. The building permit process involves an applicant receiving a recommendation and approval by the city planning commission of a conceptual stormwater management plan (SMP). The applicant must then submit a final SMP with the construction plans to the building department for issuance of a building permit.

(Ord. No. 2003-741, § 2.1, 4-1-2003)

Sec. 42-247. - Exemptions.

The following activities shall be exempt from the stormwater permitting requirements of this regulation:

- (1) Single-family or duplex homes built on individual lots that may or may not be part of a larger subdivision which has a stormwater master plan that has been inspected and approved by the city. Single-family and duplex homes are subject to section 42-292 "impact fees".
- (2) Approved action taken under emergency conditions to prevent imminent harm or danger to persons, or to protect property from imminent fire, violent storms, hurricanes, or other hazards.

(Ord. No. 2003-741, § 2.2, 4-1-2003)

Sec. 42-248. - Status of previous approvals.

Projects with unexpired building permits approved prior to the effective date of this regulation shall meet only the requirements in effect when the building permit was approved.

(Ord. No. 2003-741, § 2.3, 4-1-2003)

Sec. 42-249. - Nonconforming areas.

An existing development must be brought into full compliance with this regulation when any of the following activities occur:

- (1) *Floor area expansion*: The gross floor area of a structure is expanded by more than five percent or more than 400 square feet, whichever is less. Repeated expansions of a development, constructed over a period of time commencing with the effective date of this regulation, shall be combined in determining whether the threshold has been reached.
- (2) *Site alteration*: A site alteration activity requires the submission of a development plan or amended development plan and involves five percent or more of the site area.
- (3) *Reconstruction*: A structure is reconstructed following substantial destruction by fire or other calamity. A structure is considered substantially destroyed if the cost of reconstruction is 50 percent or more of the fair market value of the structure before the calamity.

(Ord. No. 2003-741, § 2.4, 4-1-2003)

Secs. 42-250—42-270. - Reserved.

DIVISION 3. - RETENTION/DETENTION PLANNING FOR PROPOSED STORMWATER DISCHARGES

Sec. 42-271. - Goals.

As part of the city's effort to minimize water quality problems in its adjacent and internal water bodies, the primary goal of its retention/detention planning is to eliminate any direct discharges to the Gulf of Mexico, Gulf beaches, coastal dunes, the Intercoastal Waterway and any contiguous surface waters thereof, or wetlands. In addition, no direct discharges originating from storms less than or equal to a 25-year, 24-hour event will be made to the Intercoastal Waterway or Wolf Bay. To achieve these goals, the city encourages the use of retention/detention areas in future developments. However, other acceptable engineering methods, such as exfiltration/infiltration devices, may be approved.

(Ord. No. 2003-741, § 3.1, 4-1-2003)

Sec. 42-272. - Methods of discharge disposal.

- (a) Runoff and other associated discharges resulting from a 25-year, 24-hour storm event (or less) should be handled through the design and maintenance of retention/detention areas or exfiltration/infiltration systems where approved. For those storm events greater than this magnitude, other options should be considered to detain runoff so no direct discharge to the aforementioned areas occurs.
- (b) Localized depressions should be evaluated to capture the direct runoff generated by storm events larger than the 25-year, 24-hour rainfall. These depressions, human-made or natural, could be localized wetland areas, but would not possess the characteristics (e.g. hydrologic, ecological, etc.) representative of state jurisdictional wetlands, as determined by ADEM, or federal jurisdictional wetlands, as determined by the USACOE. Thus, they must be non-contiguous with other water bodies. The plants, microorganisms, and soils found in these non-contiguous wetlands help cleanse some of the water quality contaminants associated with urban stormwater runoff.
- (c) Other BMPs that should be considered to manage runoff that exceeds detained volumes include exfiltration/infiltration ponds, grass swales, vegetated buffer strips, and other similar practices. Regardless of the BMP selected, when properly maintained, it must function to temporarily capture the stormwater discharge to allow natural ecological processes to break down some of the runoff contaminants and slow down the runoff velocities entering sensitive areas.

(Ord. No. 2003-741, § 3.2, 4-1-2003)

Secs. 42-273—42-290. - Reserved.

DIVISION 4. - CONCEPTUAL STORMWATER MANAGEMENT PLAN REQUIREMENTS

Sec. 42-291. - Submittals.

The submission of the site plan application to the city planning department shall include a section that outlines a conceptual SMP for the construction and post-construction phases of the proposed site work. The applicant must provide sufficient information to the city planning department to determine if the site plan meets the requirements specified in this regulation. The following items shall be included in the conceptual SMP:

- (1) *Application check list* that certifies that related items have been reviewed and considered in the preparation of the conceptual SMP.
- (2) *Land use plan* that identifies current land use, the percentage of land proposed to be impervious by rooftops, driveways, tennis courts, and parking, and any additional changes that would alter stormwater runoff characteristics (e.g. different soil types, vegetation, etc.). The land use plan may include a proposed site plan and a description of the pre- and post-development land use.
- (3) *Topographic maps* of the project area that identify the natural contours and drainage system upstream and downstream of the project site that influences its runoff. These maps must be dated not more than two years before the projected building permit application date, and should indicate direction of overland flow within and adjacent to the project site for pre- and post-development conditions. The city, at their discretion, may approve the use of U.S. Geological Survey 7.5 Minute Quadrangles for this purpose.
- (4) *Proposed drainage map* identifying stormwater conveyance and outfall points to waters of the state or the city's municipal separate storm sewer system. This map should include the drainage identification for construction and as proposed for post-construction.
- (5) *Conceptual layout* of grading, drainage, paving, and building plan.
- (6) *Compliance with the ADEM Coastal Area Management Program*, Chapter 335-8 of the ADEM Administrative Code. When applicable, the applicant shall comply with all requirements of the ADEM Coastal Area Management Program. For further information concerning the Coastal Program, contact ADEM at (334) 271-7700.

(Ord. No. 2003-741, § 4.1, 4-1-2003)

Sec. 42-292. - Impact fees.

A comprehensive stormwater management program is required to address various stormwater issues such as: street and neighborhood flooding; development impacts; infrastructure maintenance and improvements; water quality improvement; and other stormwater related activities. In order to implement a comprehensive stormwater management program, stormwater impact fees are required to provide the level of service desired by the city. The stormwater impact fees shall be used to finance drainage system infrastructure improvements created by new development.

- (a) "Nonresidential" stormwater impact fees are based on site impervious area and "residential" stormwater impact fees are based on building footprint area.
- (b) New residential construction with a valuation of equal to or greater than \$1,000.00 and nonresidential construction requiring site plan review shall be assessed a stormwater impact fee based on an equivalent residential unit (ERU). One ERU constitutes 2,000 square feet of impervious area. Substantial improvement shall be deemed all construction requiring a building permit.

(c) _____

The city has established two types of impact fees: "Residential" and "nonresidential", with the following fee structure:

Residential	<u>Building Footprint Area in square feet = _____</u> <u>ERUs</u>
	2,000 square feet
Nonresidential	<u>Site Impervious Area in square feet = _____</u> <u>ERUs</u>
	2,000 square feet

(d) _____

Each "residential" ERU will be billed a one-time fee of \$50.00 per ERU or fraction thereof. Each "nonresidential" ERU will be billed a one-time fee of \$100.00 per ERU or fraction thereof. All stormwater impact fees shall be paid before a building permit is issued.

- (e) For the purpose of this section, condominiums, apartments, town homes, and other such developments are considered "nonresidential" and require impact fees based on the amount of site impervious area. Only single-family homes, duplexes and mobile homes are

considered "residential".

- (f) New impervious area created by the construction of subdivisions shall be initially considered "nonresidential", and pay the nonresidential impact fee rate. Upon completion of the subdivision and final subdivision approval by the city planning commission, each home or duplex built in the subdivision shall be considered residential and pay the "residential" impact fee. Lots within commercial subdivisions shall be assessed impact fees based on the "nonresidential" rate.
- (g) R.V. parks and campgrounds shall be charged the "nonresidential" rate for all permanent impervious surfaces upon development of the site. Temporary structures or vehicles will not be counted as impervious surfaces, provided they are truly temporary and removed frequently.

(Ord. No. 2003-741, § 4.2, 4-1-2003)

Secs. 42-293—42-310. - Reserved.

DIVISION 5. - STORMWATER MANAGEMENT PLAN REQUIREMENTS

Sec. 42-311. - Submittals.

- (a) A building permit application shall be submitted to the building department using appropriate forms as provided by the city. A building permit application shall contain sufficient information to allow the director to determine whether the project complies with the requirements of this and other applicable regulations and codes. The following specific items are minimum submittal requirements for compliance with the stormwater management regulations of the building permit application:
 - (1) *Applicant information*, including the name, address, and telephone number of the applicant and proof of ownership for the property to be permitted.
 - (2) *Erosion and sediment control plan and construction BMPs* identifying the type, location, and schedule for implementing erosion and sediment control measures, including appropriate provisions for maintenance and disposition of temporary measures.
 - (3) *Land use map* showing both current and proposed conditions for the drainage area that contributes runoff.
 - (4) *Operation and maintenance plan*, prepared and sealed by an engineer, describing the activities and schedule required to operate and maintain the permitted facilities, and both construction and post-construction BMPs.
 - (5) *Post-construction BMPs* to manage stormwater discharges from the altered area such that it maintains pre-developed conditions equal to or less severe than the 25-year

storm event.

- (6) *Proposed grading, drainage, paving, and building plan* showing details of existing and proposed grading contours and spot elevations, finished floor elevations, drainage systems, paving, and buildings, including elevation information for each stormwater management system control device.
- (7) *Soils and vegetation map* displaying the most recent U.S. Soil Conservation Service information and encompassing both the project area and the drainage area that contributes runoff.
- (8) *Technical report*, prepared and sealed by an engineer, describing the assumptions, calculations, and procedures used for determining compliance with the performance criteria established by this regulation.
- (9) *Topographic map* of the project vicinity, dated not more than two years before the application date, covering the project area and adjacent lands that contribute runoff to the project site or that may be affected by runoff from the project site, the direction and quantity of runoff affecting the project site and adjacent sites, and showing the location and elevation of benchmarks.

(Ord. No. 2003-741, § 5.1, 4-1-2003)

Sec. 42-312. - Performance criteria.

Except as otherwise provided herein, a development must be designed, constructed, operated, and maintained to comply with the following performance criteria:

- (1) *Detention or retention systems*: Unless applicable local regulations are more restrictive, for purposes of public safety, permanently wet retention and detention basins shall either be fenced or otherwise restricted from public access or contain side slopes that are no steeper than 4: 1 (horizontal: vertical) out to a depth of two feet below the control elevation. All side slopes shall be stabilized by either vegetation or other materials to minimize erosion and subsequent sedimentation of the basins.
- (2) *Erosion and sediment control*: Erosion and sediment control best management practices shall be used as necessary during construction to retain sediment on-site. These management practices shall be designed by an engineer or other competent professional experienced in the fields of soil conservation or sediment control according to specific site conditions and shall be shown or noted on the plans of the stormwater management system. The engineer or designer shall furnish the contractor with information pertaining to the construction, operation and maintenance of the erosion and sediment control practices.
- (3) *Ex-filtration systems*: Ex-filtration systems shall be designed with a safety factor of at least two unless the engineer affirmatively demonstrates, based on plans, in-place field

test results, calculations, and other pertinent information, that a lower safety factor is appropriate for the specific site conditions. Examples of how to apply this factor include, but are not limited to, reducing the design percolation rate by half, doubling the length of underdrain, or designing for the required drawdown with 72 hours.

- (4) *Filtration and ex-filtration systems:* Shall be designed to have pore spaces large enough to provide sufficient flow capacity so that the permeability of the filter is equal to or greater than the surrounding soil. The design shall ensure that the particles within the filter do not move. When sand or other fine textured aggregate other than natural soil are used for filtration or ex-filtration media, the filter material should be of a quality sufficient to satisfy the following requirements:
- a. Washed (less than one percent silt, clay and organic matter) unless filter cloth is used which is suitable to retain the silt, clay and organic matter within the filter;
 - b. Uniformity coefficient of 1.5 or greater; and
 - c. Effective grain size of 0.20 to 0.55 millimeters in diameter. These criteria are not intended to preclude the use of multi-layered filters.
 - e. *Floating materials:* Stormwater management systems receiving runoff from areas containing a potential source of floating materials or contamination shall include a baffle, skimmer, or other suitable mechanism for collecting and for preventing the discharge of floating materials to receiving waters.
 - f. *Floodplain management:* Provisions for floodplain management criteria shall be consistent with those contained in Ordinance 287 of the City of Orange Beach, Alabama.
 - g. *Oil and grease separation:* Stormwater management systems receiving runoff from areas with greater than 50 percent impervious surface, or containing a potential source of oil and grease contamination, shall include a baffle, skimmer, grease trap, or other suitable oil and grease separation mechanism.
 - h. *Peak discharge:* The post-development peak rate of surface discharge must not exceed the pre-development peak discharge for the 25-year, 24-hour storm, unless more stringent peak discharge limits are applicable as determined by the city.
 - i. *Pretreatment volume:* Commercial or industrial project categories shall provide at least one inch of dry detention or retention pretreatment of site runoff in addition to the base treatment volume required for all sites. Indications are that one inch of stormwater retention retains an additional 20% of total suspended solids (TSS) and nutrients as compared to one-half inch retention.
 - j. *Retention system storage interval:* Retention systems, including ex-filtration systems, shall provide the storage capacity for the specified treatment volume of stormwater within 72 hours following a storm event. The additional retention

storage volume must be provided by percolation through soil, evaporation, or evapotranspiration, the combination of water losses to the atmosphere from water and soil (evaporation) and from plants (transpiration).

- k. *Retention volume*: Retention treatment volume in the stormwater management system shall be provided for the first one inch of runoff from the entire project site. Indications are that one inch of stormwater retention retains an additional 20 percent of total suspended solids (TSS) and nutrients as compared to one-half inch retention.
- l. *Swales*: Swales shall be designed to percolate 80 percent of the runoff from a three-year, one-hour design storm within 72 hours after a storm event, assuming average antecedent conditions.
- m. *Water quality*: All stormwater management systems shall be evaluated based on their ability to prevent degradation of receiving waters and adverse impacts on the site's, and the adjacent sites', natural systems; their efficiency in removing pollutants; and their ability to conform to state water quality standards as established in the State of Alabama Coastal Management Regulations.
- n. *Illicit stormwater and pool drains*: Illicit stormwater and pool drains that discharge to the beach or dune system, as established in the State of Alabama Coastal Management Regulations, shall be eliminated within two years of the adoption date of this ordinance.

(Ord. No. 2003-741, § 5.2, 4-1-2003)

Secs. 42-313—42-330. - Reserved.

DIVISION 6. - MAINTENANCE RESPONSIBILITY

Sec. 42-331. - Maintenance responsibility.

Maintenance of all stormwater management systems approved in compliance with this article shall be accomplished by the legal entity responsible for maintenance.

(Ord. No. 2003-741, § 6.1, 4-1-2003)

Sec. 42-332. - Easements.

All systems covered by this regulation shall have adequate easements to permit the city to conduct inspections and take corrective actions if necessary.

(Ord. No. 2003-741, § 6.2, 4-1-2003)

Sec. 42-333. - Inspections.

- (a) *Construction inspections:* As part of the building permit approval process, a construction inspection schedule shall be established to address the critical milestones of a project. Under the approved inspection schedule, no work shall proceed until the city inspects and authorizes work to proceed beyond each schedule milestone. Any portion of the work that does not comply with the permit conditions shall be specified in writing by the city and promptly corrected by the permittee. Periodic inspections by the city to ensure continued maintenance of the stormwater management system after construction is complete will be established as conditions to the operation permit.
- (b) *Post-construction annual inspections:* As part of the building permit approval process, a post-construction schedule shall be established to ensure long-term operations of the project. Any portion of the work that does not comply with the permit conditions shall be specified in writing by the city and promptly corrected by the permittee.

(Ord. No. 2003-741, § 6.3(6.3.1, 6.3.2), 4-1-2003)

Sec. 42-334. - Corrective action.

A person or entity found to be in violation of this regulation may be required to restore any alteration of the affected property to its undisturbed condition. In the event that restoration or maintenance of the stormwater management system is not undertaken within a reasonable time after notice, the city may take necessary corrective action pursuant to chapter 2, article 1, section 2-3 of the Code Violation Citation Process, of the city Code, as amended.

(Ord. No. 2003-741, § 6.4, 4-1-2003)

Sec. 42-335. - References for best management practices.

A sample of BMP references is provided below:

Alabama Department of Environmental Management (ADEM). *Alabama Nonpoint Source Management Program Document*. Developed by the Water Division - Mining and Nonpoint Source Section, Montgomery, AL.

Alabama Soil and Water Conservation Committee. *Alabama Handbook for Erosion Control, Sediment Control, and Stormwater Management on Construction Sites and Urban Areas*. Montgomery, AL., July 1993.

American Society of Civil Engineers and U.S. Environmental Protection Agency. *National Stormwater Best Management Practices (BMP) Database*. Internet address: <http://www.asce.org/peta/tech/nsbd01.html>. May 20, 1999.

Basin Pipeline Corporation. *Best Management Practices Plan - Magnolia Pipeline*. Birmingham, AL.

Regional Planning Commission. *Best Management Practices for Controlling Sediment and Erosion from Construction Activities*. Birmingham, AL., August 1980.

South Alabama Regional Planning Commission. *Best Management Practices for Nonpoint Source Runoff Control, Mobile & Baldwin Counties, Alabama*. January 1989.

U.S. Environmental Protection Agency (EPA). *EPA Stormwater Pollution Prevention for Construction Activities*. Developed by the Office of Wastewater Enforcement and Compliance, Washington, D.C.

U.S. EPA. *Guidance Specifying Management Measures for Sources of Nonpoint Pollution in Coastal Waters*. Report No. 840-B-92-002. Washington, D.C., January 1993.

(Ord. No. 2003-741, § 7.0, 4-1-2003)

Secs. 42-336—42-339. - Reserved.