

ORDINANCE 7-2006
As Amended
CITY OF VINCENNES STORMWATER ORDINANCE

WHEREAS, the Common Council of the City of Vincennes did on the 12th day of April 1999, adopt a Stormwater Drainage Policy, in order to govern the control of runoff of stormwater and to protect, conserve and promote orderly development of land in the City of Vincennes;

WHEREAS, the Common Council of the City of Vincennes desires to amend the stormwater policy to address erosion and sediment control, prohibited discharges, stormwater quality management in addition to stormwater discharge quantity;


NOW THEREFORE, BE IT ORDAINED, by the Common Council of the City of Vincennes, Indiana that the Vincennes Municipal Ordinance be amended to repeal the Storm Drainage Policy and add a new City of Vincennes Stormwater Ordinance in the form attached hereto and by reference made a part hereof and marked "Exhibit A".

The Ordinance shall be in full force and effect from and after its passage and all necessary approval by the Common Council of the City of Vincennes and any necessary publication.

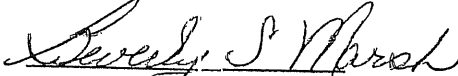
PASSED by the Common Council of the City of Vincennes, Indiana by a vote of all members present and voting, this 12th day of June, 2006.


Presiding Officer
Honorable Terry Mooney, Mayor

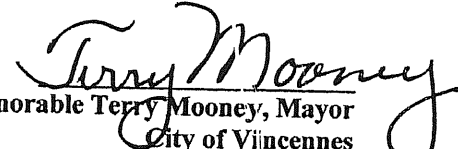
ATTEST:


Beverly Marsh, City Clerk Treasurer

PRESENTED to the Mayor for his approval and signature at 6:55 o'clock, P. M., this 12th day of June, 2006.


Beverly Marsh
City Clerk Treasurer

APPROVED AND SIGNED by me this 12th day of June , 2006.


Honorable Terry Mooney, Mayor
City of Vincennes

CITY OF VINCENNES STORMWATER ORDINANCE

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SECTION 1. GENERAL INFORMATION

1.1 AUTHORITY AND TITLE

This ordinance is adopted in accordance with statutory authority granted under Indiana Ordinance 36-9-28 and Indiana Ordinance 36-9-28.5, and further is required by Phase II of the National Pollution Discharge Elimination System program (FR Doc. 99-29181) authorized by the 1972 amendments to the Clean Water Act, the Indiana Department of Environmental Management's Rule 13 (327 IAC 15-13), and the Indiana Department of Environmental Management's Rule 5 (327 IAC 15-5). Based on this authority and these requirements, this Ordinance regulates:

- A. Discharges of prohibited non-stormwater flows into the storm drain system.
- B. Stormwater drainage improvements related to development of lands located within City of Vincennes, Indiana
- C. Drainage control systems installed during new construction and grading of lots and other parcels of land.
- D. Erosion and sediment control systems installed during new construction and grading of lots and other parcels of land.
- E. The design, construction, and maintenance of stormwater drainage facilities and systems.
- F. The design, construction, and maintenance of stormwater quality facilities and systems.

This Ordinance shall be known and may be cited as the City of Vincennes Stormwater Ordinance.

1.2 BACKGROUND

The Common Council of City of Vincennes State of Indiana, on April 12, 1999, adopted Resolution No. 1-99, which established "Stormwater Drainage Policy", in order to govern the control of runoff of stormwater and to protect, conserve and promote the orderly development of the land in City of Vincennes and its water resources. This ordinance was primarily targeted at stormwater discharge quantity.

On December 8, 1999, Phase II of the National Pollutant Discharge Elimination System (NPDES) permit program was published in the Federal Register. The NPDES program, as authorized by the 1972 amendments to the Clean Water Act, controls water pollution by regulating point sources that discharge pollutants into waters of the United States. Phase II of NPDES requires permit coverage for stormwater discharges from regulated small municipal separate storm sewer systems (MS4s) and for small construction activity that results in the disturbance of equal to or greater than one acre. This federal regulation went into affect March 10, 2003. In response to Phase II of NPDES, the Indiana Department of Environmental Management enacted Rule 13 (327 IAC 15-13) and revised Rule 5 (327 IAC 15-5).

Under these new State and Federal regulations, City of Vincennes is required to establish a regulatory mechanism for regulating stormwater quality management. Therefore, the Stormwater Policy was expanded to include stormwater quality in addition to quantity.

1.3 FINDINGS

The City of Vincennes finds that:

- A. Water bodies, roadways, structures, and other property within, and downstream of the City of Vincennes are at times subjected to flooding;
- B. Flooding is a danger to the lives and property of the public and is also a danger to the natural resources of the region;
- C. Land development alters the hydrologic response of watersheds, resulting in increased stormwater runoff rates and volumes, increased flooding, increased stream channel erosion, and increased sediment transport and deposition;

- D. Soil erosion resulting from land-disturbing activities causes a significant amount of sediment and other pollutants to be transported off-site and deposited in ditches, streams, wetlands, lakes, and reservoirs;
- E. Increases of stormwater runoff rates, soil erosion, and non-point source pollution have occurred as a result of land development, and have resulted in a deterioration of the water resources of the City of Vincennes;
- F. Increased stormwater runoff rates and volumes, and the sediments and pollutants associated with stormwater runoff from future development projects within the City of Vincennes will, absent reasonable regulation and control, adversely affect the City of Vincennes's water bodies and water resources;
- G. Illicit discharges have occurred as a result of illegal dumping and direct connections of non-stormwater flows, and have resulted in a deterioration of the water resources of the City of Vincennes;
- H. Continued pollutant contributions from illicit discharges within the City of Vincennes will, absent reasonable regulation, monitoring, and enforcement, adversely affect the City of Vincennes's water bodies and water resources;
- I. Stormwater runoff, soil erosion, non-point source pollution, and illicit sources of pollution can be controlled and minimized by the regulation of stormwater management;
- J. Adopting the standards, criteria, and procedures contained and referenced in this Ordinance and implementing the same will address many of the deleterious effects of stormwater runoff and illicit discharges;
- K. Adopting this Ordinance is necessary for the preservation of the public health, safety, and welfare, and for the conservation of our natural resources.

1.4 PURPOSE

The purpose of this Ordinance is to provide for the health, safety, and general welfare of the citizens of the City of Vincennes through the regulation of stormwater and non-stormwater discharges to the storm drainage system; and to protect, conserve and promote the orderly development of land and water resources within City of Vincennes. This Ordinance establishes methods for managing the quantity and quality of stormwater entering into the storm drain system in order to comply with State and Federal requirements. The objectives of this Ordinance are:

- A. To reduce the hazard to public health and safety caused by excessive stormwater runoff.
- B. To regulate the contribution of pollutants to the storm drain system from active construction site runoff.
- C. To regulate the contribution of pollutants to the storm drain system from runoff from new development and re-development.
- D. To prohibit illicit discharges into the storm drain system.
- E. To establish legal authority to carry out all inspection, monitoring, and enforcement procedures necessary to ensure compliance with this Ordinance.
- F. To establish requirements for stormwater discharges from municipal separate storm sewer system (MS4) conveyances so that public health, existing water uses, and aquatic biota are protected.

1.5 ABBREVIATIONS AND DEFINITIONS

For the purpose of this Ordinance, the following abbreviations shall apply:

ABBREVIATIONS

BMP	Best Management Practice
USACE	United States Army Corps of Engineers
CWA	Clean Water Act
USEPA	Environmental Protection Agency
GIS	Geographical Information System

IDEM	Indiana Department of Environmental Management
MS4	Municipal Separate Storm Sewers
NRCS	USDA-Natural Resources Conservation Service
NPDES	National Pollution Discharge Elimination System
POTW	Publicly Owned Treatment Works
SWCD	Soil and Water Conservation District
SWPPP	Stormwater Pollution Prevention Plan
USDA	United States Department of Agriculture

For the purpose of this Ordinance, the following definitions shall apply:

DEFINITIONS

Best Management Practices. Design, construction, and maintenance practices and criteria for stormwater facilities that minimize the impact of stormwater runoff rates and volumes, prevent erosion, and capture pollutants.

Board. The City of Vincennes Utility Services Board, if it has the authority to operate the stormwater system. The Board of Works, if there is no Utility Service Board or if the Utility Service Board does not have the authority to operate the stormwater system.

Buffer Strip. An existing, variable width strip of vegetated land intended to protect water quality and habitat.

Capacity Of A Storm Drainage Facility. The maximum flow that can be conveyed or stored by a storm drainage facility without causing damage to public or private property.

Catch Basin. A chamber usually built at the curb line of a street for the admission of surface water to a storm drain or subdrain, having at its base a sediment sump designed to retain grit and detritus below the point of overflow.

Channel. A natural or artificial watercourse which periodically or continuously contains moving/standing water or which forms a connecting link between two bodies of water. It has a defined bed and banks, which serve to confine the water.

Compensatory Storage. An artificial volume of storage within a floodplain used to offset loss of natural flood storage capacity when artificial fill or structures are placed within the floodplain.

Conduit. A device to convey water runoff or drainage flow.

Contiguous. Adjoining or, in actual contact with.

Constructed Wetland. A manmade shallow pool that creates growing conditions suitable for wetland vegetation and is designed to maximize pollutant removal.

Construction Activity. Land disturbing activities, and land disturbing activities associated with the construction of infrastructure and structures. This term does not include routine ditch or road maintenance or minor landscaping projects.

Construction Site Access. A stabilized stone surface at all points of ingress or egress to a project site, for the purpose of capturing and detaining sediment carried by tires of vehicles or other equipment entering or exiting the project site.

Contour. An imaginary line on the surface of the earth connecting points of the same elevation.

Contractor or Subcontractor. An individual or company hired by the project site or individual lot owner, their agent, or the individual lot operator to perform services on the project site.

Conveyance. Any structural method for transferring stormwater between at least two points. The term includes piping, ditches, swales, curbs, gutters, catch basins, channels, storm drains, and roadways.

Cross Section. A graph or plot of ground elevation across a stream valley or a portion of it, usually along a line perpendicular to the stream or direction of flow.

Culvert. A closed conduit used for the conveyance of surface drainage water under a roadway, railroad, canal or other impediment.

De-chlorinated swimming pool discharge. Chlorinated water that has either sat idle for seven (7) days following chlorination prior to discharge to the MS4 conveyance, or, by analysis, does not contain detectable concentrations (less than five-hundredths (0.05) milligram per liter) of chlorinated residual.

Detention. Managing stormwater runoff by temporary holding and controlled release.

Detention Basin. A stormwater control facility constructed or modified to restrict the flow of stormwater to a prescribed maximum rate, and to concurrently detain the excess waters resulting from development. This facility has no permanent water pool during inter-storm periods.

Detention Storage. The temporary detaining or storage of stormwater in storage basins, underground chambers, in streets, parking lots, school yards, parks, open spaces, or other areas under predetermined and controlled conditions, with the rate of drainage released therefrom regulated by appropriately installed devices.

Detritus. Dead or decaying organic matter; generally contributed to stormwater as fallen leaves and sticks or as dead aquatic organisms.

Developer. Any person financially responsible for construction activity, or an owner of property who sells or leases, or offers for sale or lease, any lots in a subdivision.

Discharge. Usually the rate of water flow. A volume of fluid passing a point per unit time commonly expressed as cubic feet per second, cubic meters per second, gallons per minute, or millions of gallons per day.

Development Or Developed Lands. The activities that result in a change of land use or an area where a change to a more intensive land use has occurred or migration from a less intense to more intense land use. This activity commonly results in increased runoff and peak discharge.

Disposal. The discharge, deposit, injection, spilling, leaking, or placing of any solid waste or hazardous waste into or on any land or water so that the solid waste or hazardous waste, or any constituent of the waste, may enter the environment, be emitted into the air, or be discharged into any waters, including ground waters.

Ditch. A man-made, open drainageway in or into which excess surface water or groundwater drained from land, stormwater runoff, or floodwaters flow either continuously or intermittently.

Drain. A buried slotted or perforated pipe or other conduit (subsurface drain) or a ditch (open drain) for carrying off surplus groundwater or surface water.

Drainage. The removal of excess surface water or groundwater from land by means of ditches or subsurface drains. Also see Natural drainage.

Drainage Area. The area that contributes runoff to a point of interest, or design point, during a rainfall event; i.e. a watershed or catchment area.

Drainageway. A natural or artificial stream, closed conduit, or depression that carries surface water. This term is used as a neutral term applying to all types of drains and watercourses, whether man-made or natural.

Duration. The time period of a rainfall event.

Environment. The sum total of all the external conditions that may act upon a living organism or community to influence its development or existence.

Erosion. The Wearing away of the land by running water, waves, weather cycles, ice or wind. The following terms are used to describe different types of water erosion:

- *Accelerated erosion*--Erosion much more rapid than normal or geologic erosion, primarily as a result of the activities of man.
- *Channel erosion* --An erosion process whereby the volume and velocity of flow wears away the bed and/or banks of a well-defined channel.
- *Gully erosion* --An erosion process whereby runoff water accumulates in narrow channels and, over relatively short periods, removes the soil to considerable depths, ranging from 1-2 ft. to as much as 75-100 ft.
- *Rill erosion*--An erosion process in which numerous small channels only several inches deep are formed; occurs mainly on recently disturbed and exposed soils (see Rill).
- *Splash erosion*--The spattering of small soil particles caused by the impact of raindrops on wet soils; the loosened and spattered particles may or may not be subsequently removed by surface runoff.
- *Sheet erosion*--The gradual removal of a fairly uniform layer of soil from the land surface by runoff water.

Erosion and sediment control. A practice, or a combination of practices, to minimize sedimentation by first reducing or eliminating erosion at the source and then as necessary, trapping sediment to prevent it from being discharged from or within a project site.

Filter Strip. Usually a long, relatively narrow area (usually, 20-75 feet wide) of undisturbed or planted vegetation used near disturbed or impervious surfaces to filter stormwater pollutants for the protection of watercourses, reservoirs, or adjacent properties.

Flood (or Flood Waters). A general and temporary condition of partial or complete inundation of normally dry land areas from the overflow, the unusual and rapid accumulation, or the runoff of surface waters from any source.

Flood Elevation. The elevation delineating the maximum level of high waters for a flood of given return period and rainfall duration.

Floodplain. The channel proper and the areas adjoining the channel which have been or hereafter may be covered by the regulatory or 100-year flood. Any normally dry land area that is susceptible to being inundated by water from any natural source. The floodplain includes both the floodway and the floodway fringe districts.

Floodway. The channel of a river or stream and those portions of the floodplains adjoining the channel which are reasonably required to efficiently carry and discharge the peak flow of the regulatory flood of any river or stream.

Floodway Fringe. That portion of the flood plain lying outside the floodway, which is inundated by the regulatory flood.

Footing Drain. A drain pipe installed around the exterior of a basement wall foundation to relieve water pressure caused by high groundwater elevation.

Garbage. All putrescible animal solid, vegetable solid, and semisolid wastes resulting from the processing, handling, preparation, cooking, serving, or consumption of food or food materials.

Gasoline outlet. An operating gasoline or diesel fueling facility whose primary function is the resale of fuels. The term applies to facilities that create five thousand (5,000) or more square feet of impervious surfaces, or generate an average daily traffic count of one hundred (100) vehicles per one thousand (1,000) square feet of land area.

Grade. (1) The inclination or slope of a channel, canal, conduit, etc., or natural ground surface usually expressed in terms of the percentage the vertical rise (or fall) bears to the corresponding horizontal distance. (2) The finished surface of a canal bed, roadbed, top of embankment, or bottom of excavation; any surface prepared to a design elevation for the support of construction, such as paving or the laying of a conduit. (3) To finish the surface of a canal bed, roadbed, top of embankment, or bottom of excavation, or other land area to a smooth, even condition.

Grading. The cutting and filling of the land surface to a desired slope or elevation.

Grass. A member of the botanical family Graminae, characterized by blade-like leaves that originate as a sheath wrapped around the stem.

Groundwater. Accumulation of underground water, natural or artificial. The term does not include manmade underground storage or conveyance structures.

Habitat. The environment in which the life needs of a plant or animal are supplied.

Hydrologic Unit Code. A numeric United States Geologic Survey code that corresponds to a watershed area. Each area also has a text description associated with the numeric ordinance.

Hydrology. The science of the behavior of water in the atmosphere, on the surface of the earth, and underground. A typical hydrologic study is undertaken to compute flow rates associated with specified flood events.

Illicit Discharge. Any discharge to a conveyance that is not composed entirely of stormwater except naturally occurring floatables, such as leaves or tree limbs.

Impact Areas. Areas defined, listed and/or mapped by the Board which are unlikely to be easily drained because of one or more factors including but not limited to any of the following: soil type, topography, land with no adequate drainage outlet, a floodway or flood plain, land within 75 feet of the top of each bank of any regulated drain or within 75 feet from the centerline of any regulated storm sewer or tile drain.

Impaired Waters. Waters that do not or are not expected to meet applicable water quality standards, as included on IDEM's CWA Section 303(d) List of Impaired Waters.

Impervious surface. Surfaces, such as pavement and rooftops, which prevent the infiltration of stormwater into the soil.

Individual building lot. A single parcel of land within a multi-parcel development.

Individual lot operator. A contractor or subcontractor working on an individual lot.

Individual lot owner. A person who has financial control of construction activities for an individual lot.

Infiltration. Passage or movement of water into the soil. Infiltration practices include any structural BMP designed to facilitate the percolation of run-off through the soil to groundwater. Examples include infiltration basins or trenches, dry wells, and porous pavement.

Inlet. An opening into a storm drain system for the entrance of surface storm water runoff, more completely described as a storm drain inlet.

Land Surveyor. A person licensed under the laws of the State of Indiana to practice land surveying.

Larger common plan of development or sale. A plan, undertaken by a single project site owner or a group of project site owners acting in concert, to offer lots for sale or lease; where such land is contiguous, or is known, designated, purchased or advertised as a common unit or by a common name, such land shall be presumed as being offered for sale or lease as part of a larger common plan. The term also includes phased or other construction activity by a single entity for its own use.

Lateral Storm Sewer. A sewer that has inlets connected to it but has no other upstream storm sewer connected. Lateral storm sewers connect to a main storm sewer outlet.

Manhole. Storm sewer junction and maintenance structure through which a person or equipment may enter to gain access to an underground storm sewer or enclosed structure.

Measurable storm event. A precipitation event that results in a total measured precipitation accumulation equal to, or greater than, one-half (0.5) inch of rainfall.

MS4 Operator. The person tasked with managing the MS4 area activities covered by 327 IAC 15-13.

Mulch. A natural or artificial layer of plant residue or other materials covering the land surface which conserves moisture, holds soil in place, aids in establishing plant cover, and minimizes temperature fluctuations.

Municipal Separate Storm Sewer System (MS4). An MS4 meets all the following criteria: (1) is a conveyance or system of conveyances owned by the state, county, city, town, or other public entity; (2) discharges to waters of the U.S.; (3) is designed or used for collecting or conveying stormwater; (4) is not a combined sewer; and, (5) is not part of a Publicly Owned Treatment Works (POTW).

National Pollution Discharge Elimination System. A permit developed by the USEPA through the Clean Water Act. In Indiana, the permitting process has been delegated to IDEM. This permit covers aspects of municipal stormwater quality.

Natural Drainage. The flow patterns of stormwater run-off over the land in its pre-development state.

Nutrient(s). (1) A substance necessary for the growth and reproduction of organisms. (2) In water, those substances (chiefly nitrates and phosphates) that promote growth of algae and bacteria.

Off-Site. Considered to be not on-site. Typically not under the direct control or influence of the developer.

On-Site. Located within the controlled area of development.

Open Drain. A natural watercourse or constructed open channel that conveys drainage water.

Open Space. Any land area devoid of any disturbed or impervious surfaces created by industrial, commercial, residential, agricultural, or other manmade activities.

Outfall. The point or location where storm runoff discharges from a storm sewer or drain; also applies to the outfall sewer or channel which carries the storm runoff to its point of outfall.

Outlet. The point of water disposal from a stream, river, lake, tidewater, or artificial drain.

Peak Flow. The maximum rate of flow of stormwater at a given point in a channel or conduit resulting from a particular storm or flood, commonly recorded in cubic feet per second.

Permanent stabilization. The establishment, at a uniform density of seventy percent (70%) across the disturbed area, of vegetative cover or permanent non-erosive material that will ensure the resistance of the soil to erosion, sliding, or other movement.

Pervious. Allowing movement of water.

Point Source. Any discernible, confined, and discrete conveyance including but not limited to any pipe, ditch, channel, tunnel, conduit, well, discrete fissure, or container from which pollutants are or maybe discharged (P.L. 92-500, Section 502[14]).

Professional Engineer. A person licensed under the laws of the State of Indiana to practice professional engineering.

Project site. The entire area on which construction activity is to be performed.

Project site owner. The person required to submit a stormwater permit application, and required to comply with the terms of this Ordinance, including a developer or a person who has financial and operational control of construction activities, and project plans and specifications, including the ability to make modifications to those plans and specifications.

Radius Of Curvature. Length of radius of circle used to define a curve.

Rainfall Intensity. The cumulative depth of rainfall occurring over a given time period, normally expressed in inches per hour.

Reach. Any selected length of river, channel or storm sewer.

Recreational Waters. Most recreational activities within the MS4 area revolve around the Wabash River.

Redevelopment. Alterations of a property that change a site or building in such a way that there is disturbances of one (1) acre or more of land. The term does not include such activities as exterior remodeling.

Refueling area. An operating gasoline or diesel fueling area whose primary function is to provide fuel to equipment or vehicles.

Regulatory Flood. The discharge or elevation associated with the 100-year flood as calculated by a method and procedure which is acceptable to and approved by the Indiana Department of Natural Resources and the Federal Emergency Management Agency. The "regulatory flood" is also known as the "base flood".

Regulatory Floodway. See Floodway.

Release Rate. The amount of stormwater released from a stormwater control facility (typically a detention basin or retention pond) per unit of time. This term is normally expressed in cubic feet per second.

Reservoir. A natural or artificially created pond, lake or other space used for storage, regulation or control of water. May be either permanent or temporary. The term is also used in the hydrologic modeling of storage facilities.

Retention. The storage of stormwater to prevent it from leaving the development site. May be temporary or permanent.

Retention Basin or Pond. A stormwater control facility designed to retain a permanent pool of water after having provided its planned detention of runoff during a storm event, or one that has no outlet and discharges into the soil with time.

Return Period. The average interval of time within which a given rainfall event will be equaled or exceeded once. A flood having a return period of 100 years has a one percent probability of being equaled or exceeded in any one year.

Riparian zone. Areas on and adjacent to the banks of a stream, river, or pond, through which surface and subsurface hydrology connect waterbodies with their adjacent uplands.

Riparian habitat. A land area adjacent to a waterbody that supports animal and plant life associated with that waterbody.

Runoff. That portion of precipitation that flows from a drainage area on the land surface, in open channels, or in stormwater conveyance systems.

Runoff Co-Efficient - A decimal fraction relating the amount of rain which appears as runoff and reaches the storm drain system to the total amount of rain falling. A Co-Efficient of 0.5 implies that 50 percent of the rain falling on a given surface appears as storm water runoff.

Sediment. Solid material (both mineral and organic) that is in suspension, is being transported, or has been moved from its site of origin by air, water, gravity, or ice and has come to rest on the earth's surface. Material of soil and rock origin, transported, carried and deposited by water.

Sedimentation. The process that deposits soils, debris and other unconsolidated materials either on the ground surfaces or in bodies of water or watercourses.

Site. The entire area included in the legal description of the land on which land disturbing activity is to be performed.

Slope. Degree of deviation of a surface from the horizontal, measured as a numerical ratio or percent. Expressed as a ratio, the first number is commonly the horizontal distance (run) and the second is the vertical distance (rise)--e.g., 2:1. However, the preferred method for designation of slopes is to clearly identify the horizontal (H) and vertical (V) components (length (L) and Width (W) components for horizontal angles). Also note that according to international standards (Metric), the slopes are presented as the vertical or width component shown on the numerator--e.g., 1V:2H. Slope expressions in this Ordinance follow the common presentation of slopes--e.g., 2:1 with the metric presentation shown in parenthesis--e.g., (1V:2H). Slopes can also be expressed in "percents". Slopes given in percents are always expressed as $(100 * V/H)$ --e.g., a 2:1 (1V:2H) slope is a 50% slope.

Soil. The unconsolidated mineral and organic material on the immediate surface of the earth that serves as a natural medium for the growth of land plants.

Soil and Water Conservation District. A public organization created under state law as a special-purpose district to develop and carry out a program of soil, water, and related resource conservation, use, and development within its boundaries. A subdivision of state government with a local governing body, established under IC 14-32.

Solid Waste. Any garbage, refuse, debris, or other discarded material.

Spill. The unexpected, unintended, abnormal, or unapproved dumping, leakage, drainage, seepage, discharge, or other loss of petroleum, hazardous substances, extremely hazardous substances, or objectionable substances. The term does not include releases to impervious surfaces when the substance does not migrate off the surface or penetrate the surface and enter the soil.

Spillway. A waterway in or about a hydraulic structure, for the passage or flow of water. A portion of a stormwater control facility designed for the passage or flow of water.

Stilling Basin. A water-filled basin used to dissipate energy of flowing water.

Storage Duration. The length of time that water may be stored in any stormwater control facility, computed from the time water first begins to be stored.

Storm Event. An estimate of the expected amount of precipitation within a given period of time. For example, a 10-yr. frequency, 24-hr. duration storm event is a storm that has a 10% probability of occurring in any one year. Precipitation is measured over a 24-hr. period.

Storm Sewer. A closed conduit for conveying collected storm water, while excluding sewage and industrial wastes. Also called a storm drain.

Stormwater. Water resulting from rain, melting or melted snow, hail, or sleet.

Stormwater Pollution Prevention Plan. A plan developed to minimize the impact of storm water pollutants resulting from construction activities.

Stormwater Runoff. The water derived from rains falling within a tributary basin, flowing over the surface of the ground or collected in channels or conduits.

Stormwater Quality Management Plan. A comprehensive written document that addresses stormwater runoff quality.

Stormwater Quality Measure. A practice, or a combination of practices, to control or minimize pollutants associated with storm water runoff.

Stormwater Drainage System - All means, natural or man-made, used for conducting storm water to, through or from a drainage area to any of the following: conduits and appurtenant features, canals, channels, ditches, storage facilities, swales, streams, culverts, streets and pumping stations.

Strip development. A multi-lot project where building lots front on an existing road.

Subdivision. The division of a parcel of land into two (2) or more lots, parcels, tracts, sites, units, plats, or interests for the purpose of offer, sale, lease, transfer or development; either on an installment plan or upon any and all other plans, terms, and conditions, including re-subdivision. Subdivision includes the division of land in any zoning district, whether by deed, metes and bounds description, devise, intestate, lease, map, plat, survey or other recorded instrument.

Subsurface Drain. A pervious backfield trench, usually containing stone and perforated pipe, for intercepting groundwater or seepage.

Surface Runoff. Precipitation that flows onto the surfaces of roofs, streets, the ground, etc., and is not absorbed or retained by that surface but collects and runs off.

Swale. An elongated depression in the land surface that is at least seasonally wet, is usually heavily vegetated, and is normally without flowing water. Swales conduct stormwater into primary drainage channels and may provide some groundwater recharge.

Temporary Stabilization. The covering of soil to ensure its resistance to erosion, sliding, or other movement. The term includes vegetative cover, anchored mulch, or other non-erosive material applied at a uniform density of seventy percent (70%) across the disturbed area.

Topographic Map. Graphical portrayal of the topographic features of a land area, showing both the horizontal distances between the features and their elevations above a given datum.

Topography. The representation of a portion of the earth's surface showing natural and man-made features of a give locality such as rivers, streams, ditches, lakes, roads, buildings and most importantly, variations in ground elevations for the terrain of the area.

Tributary. Contributing stormwater from upstream land areas.

Urbanization. The development, re-development, change or improvement of any parcel of land consisting of one or more lots for residential, commercial, industrial, institutional, recreational, municipal, or public utility purposes.

Water Quality. A term used to describe the chemical, physical, and biological characteristics of water, usually in respect to its suitability for a particular purpose.

Water Resources. The supply of groundwater and surface water in a given area.

Waterbody. Any accumulation of water, surface, or underground, natural or artificial, excluding water features designed and designated as water pollution control facilities.

Watercourse. Any river, stream, creek, brook, branch, natural or man-made drainageway in or into which stormwater runoff or floodwaters flow either regularly or intermittently.

Watershed. The region drained by or contributing water to a specific point that could be along a stream, lake or other stormwater facilities. Watersheds are often broken down into subareas for the purpose of hydrologic modeling.

Watershed Area. All land and water within the confines of a drainage divide. See also Watershed and Drainage Area.

Wetlands. Areas that are inundated or saturated by surface water or groundwater at a frequency and duration sufficient to support, and that under normal circumstances do support, a prevalence of vegetation typically adapted for life in saturated soil conditions.

1.6 RESPONSIBILITY FOR ADMINISTRATION

The Board shall administer, implement, and enforce the provisions of this Ordinance. Any powers granted or duties imposed upon the authorized enforcement agency may be delegated in writing by the Board to qualified persons or entities acting in the beneficial interest of or in the employ of the City of Vincennes.

1.7 CONFLICTING ORDINANCES

The provisions of this Ordinance shall be deemed as additional requirements to minimum standards required by other City of Vincennes ordinances, and as supplemental requirements to Indiana's Rule 5 regarding Stormwater Discharge Associated with Construction Activity, (327 IAC 15-5), and Indiana's Rule 13 regarding Stormwater Runoff Associated with Municipal Separate Storm Sewer System Conveyances (327 IAC 15-13). In case of conflicting requirements, the most restrictive shall apply.

The provisions of this Ordinance shall be deemed as additional requirements to minimum standards required by other local ordinances including, but not limited to the Knox County Flood Damage Prevention Ordinance, the Knox County Zoning Ordinance and the Knox County Subdivision Control Ordinance. If the provisions of this Ordinance are inconsistent with one another, or if they conflict with provisions found in other local ordinances or regulations, the more restrictive provision will control.

The provisions of this Ordinance shall be deemed as additional requirements to any state or federal regulations that may apply to a given development site. If the provisions of this Ordinance are inconsistent with regulations of the state or federal government, the more restrictive provision shall control, to the extent permitted by law.

This Ordinance is not intended to abrogate, annul, or otherwise interfere with any private easement, agreement, covenant, restriction or other legal private relationship. The Board is responsible for enforcing this Ordinance; it does not enforce private agreements, easements, covenants or restrictions.

1.8 INTERPRETATION

Words and phrases in this Ordinance shall be construed according to their common and accepted meanings, except that words and phrases defined in Section 1.5, shall be construed according to the respective definitions given in that section. Technical words and technical phrases that are not defined in this Ordinance but which have acquired particular meanings in law or in technical usage shall be construed according to such meanings.

1.9 SEVERABILITY

The provisions of this Ordinance are hereby declared severable, and if any court of competent jurisdiction should declare any part or provision of this Ordinance invalid or unenforceable, such invalidity or unenforceability shall not affect any other part or provision of the Ordinance.

1.10 DISCLAIMER OF LIABILITY

The degree of protection required by this Ordinance is considered reasonable for regulatory purposes and is based on historical records, engineering, and scientific methods of study. Larger storms may occur or stormwater runoff amounts may be increased by man-made or natural causes. This Ordinance does not imply that land uses permitted will be free from stormwater damage. This Ordinance shall not create liability on the part of City of Vincennes or any officer, representative, or employee thereof, for any damage which may result from reliance on this Ordinance or on any administrative decision lawfully made there under.

SECTION 2. PROHIBITED DISCHARGES AND CONNECTIONS

2.1 APPLICABILITY AND EXEMPTIONS

This Section shall apply to all discharges, including illegal dumping, entering the storm drain system under the control of City of Vincennes, regardless of whether the discharge originates from developed or undeveloped lands, and regardless of whether the discharge is generated from an active construction site or a stabilized site. These discharges include flows from direct connections to the storm drain system, illegal dumping, and contaminated runoff.

Stormwater runoff from agricultural, timber harvesting, and mining activities is exempted from the requirements of this Section unless determined to contain pollutants not associated with such activities or in excess of standard practices. Farm residences are not included in this exemption.

Any non-stormwater discharge permitted under an NPDES permit, waiver, or waste discharge order issued to the discharger and administered under the authority of the Federal Environmental Protection Agency, provided that the discharger is in full compliance with all requirements of the permit, waiver, or order and other applicable laws and regulations, and provided that written approval has been granted for the subject discharge to the storm drain system, is also exempted from this Section.

2.2 PROHIBITED DISCHARGES AND CONNECTIONS

No person shall discharge to a MS4 conveyance, waterbody, directly or indirectly, any substance other than stormwater or an exempted discharge. Any person discharging stormwater shall effectively prevent pollutants from also being discharged with the stormwater, through the use of best management practices (BMPs).

The City of Vincennes is authorized to require dischargers to implement pollution prevention measures, utilizing BMPs, necessary to prevent or reduce the discharge of pollutants into the City of Vincennes's stormwater drainage system.

This prohibition expressly includes, without limitation, illicit connections made in the past, regardless whether the connection was permissible under law or practices applicable or prevailing at the time of the connection.

2.3 EXEMPTED DISCHARGES AND CONNECTIONS

The following categories of non-stormwater discharges or flows are exempted from the requirements of this Section:

- A. Drinking water line flushing;
- B. Landscape irrigation;
- C. Diverted streamflows;
- D. Rising ground waters;
- E. Uncontaminated groundwater infiltration;
- F. Uncontaminated pumped ground water;
- G. Discharges from potable water sources;
- H. Foundation drains;
- I. Air conditioning condensation;
- J. Uncontaminated Irrigation water;
- K. Springs;
- L. Water from crawl space pumps;
- M. Footing drains;
- N. Residential and commercial lawn watering;
- O. Individual residential car washing;
- P. Flows from riparian habitats and wetlands;

- Q. Dechlorinated swimming pool discharges;
- R. Street wash water;
- S. Discharges from firefighting activities;
- T. Naturally introduced detritus (e.g. leaves and twigs).

It shall be unlawful for any Person to improperly dispose of any contaminant into the MS4. Contaminants include, but are not limited to the following:

- A. Trash or debris;
- B. Petroleum products, including but not limited to oil, gasoline, grease, fuel oil or hydraulic fluids;
- C. Antifreeze and other automotive products;
- D. Metals in either particulate or dissolved form;
- E. Flammable or explosive materials;
- F. Batteries of any kind;
- G. Paints, stains, resins, lacquers or varnishes;
- H. Pesticides, herbicides, or fertilizers;
- I. Steam cleaning wastes;
- J. Soaps, detergents or wastewater containing the like;
- K. Heated water;
- L. Animal waste, from domestic animals or from feeding lot operations;
- M. Leaking sanitary sewers and connections that have remained uncorrected for more than 7 days;
- N. Recreational vehicle waste;
- O. Animal carcasses;
- P. Medical wastes;
- Q. Collected lawn clippings, leaves or branches;
- R. Silt, sediment or gravel;
- S. Dyes;
- T. Washing of fresh concrete;
- U. Junk motor vehicles;
- V. Wastewater to storm drain system from the cleaning of gas stations, auto repair garages or other types of auto repair facilities;
- W. Wastewater to the storm drain system from mobile auto washing, steam cleaning, mobile carpet cleaning, and other mobile commercial and industrial operations;
- X. Discharge from the washing or rinsing of restaurant mats, roof vents, grease traps, garbage bins or cans in such a manner that causes non-stormwater to enter the storm drain system;
- Y. Any hazardous material or waste not listed above.

2.4 STORAGE OF HAZARDOUS OR TOXIC MATERIAL

Storage or stockpiling of hazardous or toxic material within any drainageway, or in its associated floodway or floodplain, is strictly prohibited. Storage or stockpiling of hazardous or toxic material on active construction sites must include adequate protection and/or containment so as to prevent any such materials from entering any temporary or permanent stormwater conveyance or drainageway.

2.5 PRIVATE PROPERTY MAINTENANCE DUTIES

Every person owning property through which a drainageway passes, or such person's lessee, shall keep and maintain that part of the drainageway located within their property boundaries, free of trash, debris, excessive vegetation, and other obstacles that would pollute, contaminate, or significantly retard the flow of water through the watercourse. In addition, the owner or lessee shall maintain existing privately owned structures within or adjacent to a watercourse, so that such structures will not become a hazard to the use, function, or physical integrity of the watercourse.

2.6 SPILL REPORTING

Any discharger who accidentally discharges into a water body any substance other than stormwater or an exempted discharge shall immediately inform the Vincennes Fire Department and Knox County Emergency Management concerning the discharge. A written report concerning the discharge shall be filed with the MS4 Operator by the discharger(s), within five (5) days. The MS4 Operator is located at 301 Perdue Road, Vincennes, Indiana 47591. The written report shall specify:

- A. The composition of the discharge and the cause thereof;
- B. The exact date, time, and estimated volume of the discharge;
- C. All measures taken to clean up the accidental discharge, and all measures proposed to be taken to prevent any recurrence;
- D. The name and telephone number of the person making the report, and the name of a person who may be contacted for additional information on the matter.

A properly reported accidental discharge shall be an affirmative defense to a civil infraction proceeding brought under this Ordinance against a discharger for such discharge. It shall not, however, be a defense to a legal action brought to obtain an injunction, to obtain recovery of costs or to obtain other relief because of or arising out of the discharge. A discharge shall be considered properly reported only if the discharger complies with all the requirements of this section. This requirement does not relieve discharger from notifying other entities as required by state or federal regulations.

2.7 INSPECTIONS AND MONITORING

A. Storm Drainage System

The City of Vincennes's duly authorized representative(s) will periodically inspect the portion of the storm drainage system under the City of Vincennes's control, in an effort to detect and eliminate illicit connections and discharges into the system. This inspection will include a screening of discharges from outfalls connected to the system in order to determine if prohibited flows are being conveyed into the storm drainage system. It could also include spot testing of waters contained in the storm drainage system itself to detect the introduction of pollutants into the system by means other than a defined outfall, such as dumping or contaminated sheet runoff.

B. Potential Polluters

If, as a result of the storm drainage system inspection, a discharger is suspected of an illicit discharge, the City of Vincennes may inspect and/or obtain stormwater samples from stormwater runoff facilities of the subject discharger, to determine compliance with the requirements of this Ordinance. Upon request, the discharger shall allow the City of Vincennes's duly authorized representative(s) bearing proper credentials and identification to enter upon the premises of the discharger at all hours necessary for the purposes of such inspection or sampling. The City of Vincennes's duly authorized representative(s) may place on the discharger's property, the equipment or devices used for such sampling or inspection. Identified illicit connections or discharges shall be subject to enforcement action as described in Section 7 of this Ordinance.

C. New Development and Re-Development

Following approval of final stormwater plans and following the final completion of construction and the receipt of as-built drawings by the City of Vincennes, new development and re-development sites shall be inspected by the City of Vincennes's duly authorized representative(s). This inspection will be to verify all on-site stormwater conveyances and connections to the storm drainage system are in compliance with this Section.

SECTION 3. STORMWATER POLLUTION PREVENTION FOR CONSTRUCTION SITES

3.1 APPLICABILITY AND EXEMPTIONS

The City of Vincennes will require a Stormwater Pollution Prevention Plan (SWPPP), which includes erosion and sediment control measures and materials handling procedures, to be submitted as part of the construction plans and specifications. Any project located within City of Vincennes that includes clearing, grading, excavation, and other land disturbing activities, resulting in the disturbance of 1 acre or more of total land area, is subject to the requirements of this Section. This includes both new development and re-development. This Section also applies to disturbances of less than one 1 acre of land that are part of a larger common plan of development or sale if the larger common plan will ultimately disturb one (1) or more acres of land, within the MS4 area. Section 3.3 provides guidelines for calculating land disturbance.

The requirements under this Section do not apply to the following activities:

- A. Agricultural land disturbing activities; or
- B. Forest harvesting activities.

The requirements under this Section do not apply to the following activities, provided other applicable state permits contain provisions requiring immediate implementation of soil erosion control measures:

- A. Landfills that have been issued a certification of closure under 329 IAC 10.
- B. Coal mining activities permitted under IC 14-34.
- C. Municipal solid waste landfills that are accepting waste pursuant to a permit issued by the Indiana Department of Environmental Management under 329 IAC 10 that contains equivalent stormwater requirements, including the expansion of landfill boundaries and construction of new cells either within or outside the original solid waste permit boundary.

For an individual lot where land disturbance is expected to be one (1) acre or more, the individual lot owner must complete their own notice of intent letter, apply for a stormwater permit from the City of Vincennes, and ensure that a sufficient construction and stormwater pollution prevention plan is completed and submitted; regardless of whether the individual lot is part of a larger permitted project site.

An individual lot with land disturbance less than one (1) acre, located within a larger permitted project site, is considered part of the larger permitted project site, and the individual lot operator must comply with the terms and conditions of the stormwater permit approved for the larger project site. The stormwater permit application for the larger project site must include detailed erosion and sediment control measures for individual lots. These individual lots are not required to submit their own stormwater permit application, but must obtain a stormwater review approval prior to receiving a building permit.

It will be the responsibility of the project site owner to complete a stormwater permit application and ensure that a sufficient construction plan is completed and submitted to the City of Vincennes. It will be the responsibility of the project site owner to ensure compliance with this Ordinance during the construction activity and implementation of the construction plan, and to notify the City of Vincennes with a sufficient notice of termination letter upon completion of the project and stabilization of the site. However, all persons engaging in construction and land disturbing activities on a permitted project site meeting the applicability requirements must comply with the requirements of this Section and this Ordinance.

Finally, any construction project which has had its drainage plan approved by the City of Vincennes prior to the effective date of this Ordinance shall be exempt from all requirements of this Ordinance that are in excess of the requirements of Ordinances in effect at the time of approval.

3.2 POLICY ON STORMWATER POLLUTION PREVENTION

Effective stormwater pollution prevention on construction sites is dependent on a combination of preventing movement of soil from its original position (erosion control), intercepting displaced soil prior to entering a waterbody (sediment control), and proper on-site materials handling. The developer must submit a SWPPP with detailed erosion and sediment control plans to the City of Vincennes, as well as a narrative describing materials handling and storage, and construction sequencing. The following principles apply to all land-disturbing activities and should be considered in the preparation of a Stormwater Pollution Prevention Plan within City of Vincennes.

- A. Minimize the potential for soil erosion by designing a development that fits the topography and soils of the site. Deep cuts and fills in areas with steep slopes should be avoided wherever possible, and natural contours should be followed as closely as possible.
- B. Existing natural vegetation should be retained and protected wherever possible. Areas immediately adjacent (within 35 feet of top of bank) to watercourses and lakes also should be left undisturbed wherever possible. Unvegetated areas or vegetated areas with less than 70% cover that are scheduled or likely to be left inactive for 15 days or more must be temporarily or permanently stabilized with measures appropriate for the season to reduce erosion potential. Alternative measures to site stabilization may be acceptable if the project site owner or their representative can demonstrate they have implemented and maintained erosion and sediment control measures adequate to prevent sediment discharge from the inactive area.
- C. All activities on a site should be conducted in a logical sequence so that the smallest practical area of land will be exposed for the shortest practical period of time during development.
- D. The length and steepness of designed slopes should be minimized to reduce erosion potential. Drainage channels and swales must be designed and adequately protected so that their final gradients and resultant velocities will not cause erosion in the receiving channel or at the outlet.
- E. Sediment-laden water which otherwise would flow from the project site shall be treated by erosion and sediment control measures appropriate to minimize sedimentation. A stable construction site access shall be provided at all points of construction traffic ingress and egress to the project site.
- F. Appropriate measures shall be implemented to prevent wastes or unused building materials, including, garbage, debris, packaging material, fuels and petroleum products, hazardous materials or wastes, cleaning wastes, wastewater, concrete truck washout, and other substances from being carried from a project site by runoff or wind. Identification of areas where concrete truck washout is permissible must be clearly posted at appropriate areas of the site. Wastes and unused building materials shall be managed and disposed of in accordance with all applicable State statutes and regulations. Proper storage and handling of materials such as fuels or hazardous wastes, and spill prevention and cleanup measures shall be implemented to minimize the potential for pollutants to contaminate surface or ground water or degrade soil quality.
- G. Public or private roadways shall be kept cleared of accumulated sediment that is a result of runoff or tracking. Bulk clearing of accumulated sediment shall not include flushing the area with water. Cleared sediment shall be redistributed or disposed of in a manner that is in accordance with all applicable statutes and regulations.
- H. Collected runoff leaving a project site must be either discharged directly into a well-defined, stable receiving channel, or diffused and released to adjacent property with out causing an erosion or pollutant problem to the adjacent property owner.
- I. Natural features, including wetlands, shall be protected from pollutants associated with stormwater runoff.

3.3 CALCULATIONS AND DESIGN STANDARDS AND SPECIFICATIONS

In calculating the total area of land disturbance, for the purposes of determining applicability of this Section to the project, the following guidelines should be used:

- A. Off-site construction activities that provide services (for example, road extensions, sewer, water, and other utilities) to a land disturbing project site, must be considered as a part of the total land disturbance calculation for the project site, when the activity is under the control of the project site owner.
- B. Strip developments will be considered as one (1) project site and must comply with this Section unless the total combined disturbance on all individual lots is less than one (1) acre and is not part of a larger common plan of development or sale.
- C. To determine if multi-lot project sites are regulated by this ordinance, the area of land disturbance shall be calculated by adding the total area of land disturbance for improvements, such as, roads, utilities, or common areas, and the expected total disturbance on each individual lot, as determined by the following:
 - i. For a single-family residential project site where the lots are one-half (0.5) acre or more, one-half (0.5) acre of land disturbance must be used as the expected lot disturbance.
 - ii. For a single-family residential project site where the lots are less than one half (0.5) acre in size, the total lot must be calculated as being disturbed.
 - iii. To calculate lot disturbance on all other types of projects sites, such as industrial and commercial projects, a minimum of one (1) acre of land disturbance must be used as the expected lot disturbance, unless the lots are less than one (1) acre in size, in which case the total lot must be calculated as being disturbed.

The calculation methods as well as the type, sizing, and placement of all stormwater pollution prevention measures for construction sites shall meet the design criteria, standards, and specifications outlined in the *Indiana Stormwater Quality Manual* or the Technical Standards. The methods and procedures included in these two references are in keeping with the above stated policy and meet the requirements of IDEM's Rule 5.

3.4 INSPECTION, MAINTENANCE, RECORD KEEPING, AND REPORTING

Following approval of the stormwater management permit by the City of Vincennes and commencement of construction activities, the City of Vincennes's duly authorized representative(s) has the authority to conduct inspections of the site to insure full compliance with the provisions of this Section, the *Indiana Stormwater Quality Manual* or the Technical Standards, and the terms and conditions of the approved permit.

A self-monitoring program must be implemented by the project site owner to insure the stormwater pollution prevention plan is working effectively. An inspector, approved by the Board, shall perform a written evaluation of the project site by the end of the next business day following each measurable storm event. If there are no measurable storm events within a given week, the site should be monitored at least once in that week. Weekly inspections shall continue until the entire site has been stabilized and a Notice of Termination has been issued. The inspector should look at the maintenance of existing stormwater pollution prevention measures, including erosion and sediment control measures, drainage structures, and construction materials storage/containment facilities, to ensure they are functioning properly. The inspector should also identify additional measures, beyond those originally identified in the stormwater pollution prevention plan, necessary to remain in compliance with all applicable statutes and regulations.

The resulting evaluation reports must include the name of the individual performing the evaluation, the date of the evaluation, problems identified at the project site, and details of maintenance, additional measures, and corrective actions recommended and completed.

The stormwater pollution prevention plan shall serve as a guideline for stormwater quality, but should not be interpreted to be the only basis for implementation of stormwater quality measures for a project site. The project site

owner is responsible for implementing, in accordance with this Section, all measures necessary to adequately prevent polluted stormwater runoff. Recommendations by the inspector for modified stormwater quality measures should be implemented and may be required if concurred by the Board.

Although self-monitoring reports do not need to be submitted to City of Vincennes, the City has the right to request complete records of maintenance and monitoring activities involving stormwater pollution prevention measures. All evaluation reports for the project site must be made available to City of Vincennes, in an organized fashion, within forty-eight (48) hours of a request.

SECTION 4. STORMWATER QUALITY MANAGEMENT FOR POST-CONSTRUCTION

4.1 APPLICABILITY AND EXEMPTIONS

In addition to the requirements of Section 3, the stormwater pollution prevention plan, which is to be submitted to the City of Vincennes as part of the stormwater management permit application, must also include post-construction stormwater quality measures. These measures are incorporated as a permanent feature into the site plan and are left in place following completion of construction activities to continuously filter stormwater runoff from the stabilized site. Any project located within the City of Vincennes that includes clearing, grading, excavation, and other land disturbing activities, resulting in the disturbance of 1 acre or more of total land area, is subject to the requirements of this Section. This includes both new development and re-development, and disturbances of less than one (1) acre of land that are part of a larger common plan of development or sale if the larger common plan will ultimately disturb one (1) or more acres of land, within the MS4 area.

The requirements under this Section do not apply to the following activities:

- A. agricultural land disturbing activities; or
- B. forest harvesting activities; or
- C. construction activities associated with a single family residential dwelling disturbing less than 5 acres, when the dwelling is not part of a larger common plan of development or sale; or
- D. single family residential developments consisting of four or less lots; or
- E. a single-family residential strip development where the developer offers for sale or lease without land improvements and the project is not part of a larger common plan of development of sale; or
- F. individual building lots within a larger permitted project.

The requirements under this Section do not apply to the following activities, provided other applicable state permits contain provisions requiring immediate implementation of soil erosion control measures:

- A. Landfills that have been issued a certification of closure under 329 IAC 10.
- B. Coal mining activities permitted under IC 14-34.
- C. Municipal solid waste landfills that are accepting waste pursuant to a permit issued by the Indiana Department of Environmental Management under 329 IAC 10 that contains equivalent stormwater requirements, including the expansion of landfill boundaries and construction of new cells either within or outside the original solid waste permit boundary.

It will be the responsibility of the project site owner to complete a stormwater permit application and ensure that a sufficient construction plan is completed and submitted to the City of Vincennes. It will be the responsibility of the project site owner to ensure proper construction and installation of all stormwater BMPs in compliance with this Ordinance and with the approved stormwater management permit, and to notify the City of Vincennes with a sufficient Notice of Termination letter upon completion of the project and stabilization of the site. However, all eventual property owners of stormwater quality facilities meeting the applicability requirements must comply with the requirements of this Section and this Ordinance.

4.2 POLICY ON STORMWATER QUALITY MANAGEMENT

It is recognized that developed areas, as compared to undeveloped areas, generally have increased imperviousness, decreased infiltration rates, increased runoff rates, and increased concentrations of pollutants such as fertilizers, herbicides, greases, oil, salts and other pollutants. As new development and re-development continues in the City of Vincennes measures must be taken to intercept and filter pollutants from stormwater runoff prior to reaching regional creeks, streams, and rivers. in order to preserve fishable and swimmable conditions. Through the use of Best Management Practices (BMPs), stormwater runoff will be filtered and harmful amounts of sediment, nutrients and contaminants will be removed. The City of Vincennes has adopted a policy that the control of stormwater quality will be based on the management of Total Suspended Solids (TSS).

The project site owner must submit to the City of Vincennes, a Stormwater Pollution Prevention Plan (SWPPP) that would show placement of appropriate BMP(s) from a pre-approved list of BMPs specified in the City of Vincennes's Stormwater Technical Standards Manual or the *Indiana Stormwater Quality Manual*. The noted BMPs must be designed, constructed, and maintained according to guidelines provided or referenced in the City of Vincennes's Stormwater Technical Standards Manual or the *Indiana Stormwater Quality Manual*. Practices other than those specified in the pre-approved list may be utilized. However, the burden of proof, as to whether the performance (minimum 80% TSS removal) and ease of maintenance of such practices will be according to guidelines provided in the City of Vincennes's Stormwater Technical Standards Manual or the *Indiana Stormwater Quality Manual*, would be placed with the applicant.

Gasoline outlets and refueling areas must install appropriate practices to reduce lead, copper, zinc, and polyaromatic hydrocarbons in stormwater runoff. These requirements will apply to all new facilities and existing facilities that replace their tanks.

4.3 CALCULATIONS AND DESIGN STANDARDS AND SPECIFICATIONS

Calculation of land disturbance should follow the guidelines discussed in Section 3.3.

The calculation methods as well as the type, sizing, and placement of all stormwater quality management measures, or BMPs shall meet the design criteria, standards, and specifications outlined in the *Indiana Stormwater Quality Manual* or the Technical Standards. The methods and procedures included in these two references are in keeping with the above stated policy and meet the requirements of IDEM's Rule 13.

4.4 EASEMENT REQUIREMENTS

All stormwater quality management systems, including detention or retention basins, filter strips, pocket wetlands, in-line filters, infiltration systems, conveyance systems, structures and appurtenances located outside of the right-of-way shall be incorporated into permanent easements.

4.5 INSPECTION, MAINTENANCE, RECORD KEEPING, AND REPORTING

After the approval of the stormwater management permit by the City of Vincennes and the commencement of construction activities, the City of Vincennes's duly authorized representative(s) has the authority to conduct inspections of the work being done to ensure full compliance with the provisions of this Section, the *Indiana Stormwater Quality Manual* or the Technical Standards, and the terms and conditions of the approved permit.

Stormwater quality facilities shall be maintained in good condition, in accordance with the Operation and Maintenance procedures submitted as part of the stormwater permit application. These procedures shall not be subsequently altered, revised or replaced except in accordance with the approved stormwater permit, or in accordance with approved amendments or revisions in the permit. Following construction completion, inspection of stormwater quality facilities shall be the responsibility of City of Vincennes. The maintenance of the stormwater quality facilities shall remain the responsibility of the facility owner unless specifically accepted by the City of Vincennes.

All public and privately owned stormwater quality facilities will be inspected by representatives of the project site owner until the project is complete and a Notice of Termination has been issued. Inspection frequency shall follow specifications included in the Operation and Maintenance submitted as part of the permit application. Optional inspection checklists for some of the more common BMPs can be found in Appendix B of the Technical Standards. Following project completion, City of Vincennes assumes responsibility for having annual inspections of the stormwater quality facilities completed. The inspections will follow the Operation and Maintenance procedures included in the permit application for each specific BMP. The inspection will cover physical conditions, available water quality volume capacity and the operational condition of key facility elements. Noted deficiencies and recommended corrective action will be included in an inspection report. If deficiencies are found during the

inspection, the owner of the stormwater quality facility will be notified by City of Vincennes and will be required to take all necessary measures to correct such deficiencies. If the owner fails to correct the deficiencies within the allowed time period, as specified in the notification letter, the City of Vincennes will undertake the work and collect from the owner using lien rights if necessary.

SECTION 5. STORMWATER QUANTITY MANAGEMENT

5.1 APPLICABILITY AND EXEMPTIONS

It is recognized that smaller streams, storm sewers, culverts, and drainage channels serving City of Vincennes may not have sufficient capacity to receive and convey stormwater runoff, resulting when land use changes from open or agricultural use to a more urbanized use, or when redeveloped to a more dense land use. It is further recognized that deposits of sediment from developments during and after construction can reduce capacities of storm sewers, culverts and drainage systems and result in damages to receiving lakes and streams.

Therefore, it shall be the policy of the City of Vincennes that the storage and controlled release of stormwater runoff shall be generally required of all new development, any re-development and other new construction in the City of Vincennes. The release rate of stormwater from developed lands shall not exceed the release rate from the land area in its present land use.

The Board is authorized, but is not required, to classify certain geographical areas as Impact Drainage Areas and to enact and promulgate regulations, which are generally applied thereto. In determining Impact Drainage Areas, the Board shall consider such factors as topography, soil type, and capacity of existing regulated drains and distance from adequate drainage facility. The following areas shall be designated as Impact Drainage Areas, unless good reason for not including them is presented to and approved by the Board:

- A. A floodway or floodplain as designated by the Indiana Department of Natural Resources.
- B. Land within 75 feet of each bank of any regulated drain.
- C. Land within 75 feet of the centerline of any regulated drain tile.
- D. City Ditch (both open and enclosed pipe sections)
- E. Kelso Creek
- F. Mantle Ditch

Land where there is not an adequate outlet (taking into consideration the capacity and depth of the outlet) may be designated as an Impact Drainage Area by resolution of the Board. Special requirements for development within any Impact Drainage Area shall be included in the resolution.

Any development for agricultural use, or residential use of two units or less, or other minor developments as determined by the City of Vincennes, may be waived or exempted from the provisions of this Ordinance, but must comply with the requirements and standards outlined in all other local ordinances and applicable laws. The Board shall also be authorized to grant exemptions from any and all requirements of this Ordinance at its discretion.

5.2 STORMWATER CONTROL POLICY

The City of Vincennes understands that many streams and drainage channels serving City may not have sufficient capacity to receive and convey stormwater runoff resulting from existing and continued urbanization. Accordingly, the storage and controlled release rate of excess stormwater runoff shall be generally required for any development, redevelopment and new construction located within City of Vincennes.

The release rate of stormwater from development, redevelopment, and new construction shall not exceed the stormwater runoff rate from the land area in its pre-developed condition. The developer must submit to the City of Vincennes, detailed computations of runoff before and after development, redevelopment or new construction that demonstrate that the runoff rate will not be increased.

These computations must show that the peak runoff release rate after development for the 100-year return period storm must not exceed the 10-year return period pre-development peak runoff rate. Furthermore, the peak runoff rate after development for the 10-year return period storm of critical duration must not exceed the 2-year return period pre-development peak runoff rate.

Special cases may exist where the detention of runoff from a development would be detrimental to the overall watershed and drainage outfall. The Board, after thorough investigation and evaluation, may waive or reduce the requirement of controlled runoff for a specific development site if hydrologic modeling of the watershed and receiving stream prove that controlled runoff is not needed. It shall be the responsibility of the developer to have such modeling prepared and submitted to the City of Vincennes for approval.

Special cases may also exist where the downstream drainage capacity may be limited in such a way that strict adherence to this policy may result in undue property damage. In these cases, the Board may further restrict the peak runoff release rate for storms up to and including the 100-year return period storm.

SECTION 6. FEES AND ASSURANCES

6.1 FEES

The City of Vincennes shall have the authority to collect fees to cover costs incurred by the City of Vincennes with respect to the review and site inspections of all drainage submittals, plans, and/or construction plans and accompanying information and data associated with this Ordinance.

6.2 ASSURANCES

As a condition of approval and issuance of a stormwater permit, the City of Vincennes shall require the applicant to provide assurance in form of a performance bond, certified check, irrevocable letters of credit, or certificate of deposit before construction begins. If posting an assurance in accordance with the Knox County Subdivision Control Ordinance, Section 4.3, the amount of the assurance must be made out to the Area Plan Commission, and must include 100% of the estimated cost of implementing measures required by Sections 3, 4, and 5 of this Ordinance. If no assurance is required under the Knox County Subdivision Control Ordinance, Section 4.3, this Ordinance still requires an assurance, made out to the City of Vincennes, for an amount equal to 100% of the total costs of implementing measures required by Sections 3, 4, and 5 of this Ordinance. If, following assurance made to the City of Vincennes, the Area Plan Commission determines assurance is required by the Subdivision Ordinance, the assurance is transferable.

Said assurance will guarantee a good faith execution of the stormwater drainage plan, the stormwater pollution prevention plan, the stormwater quality management plan, and any permit conditions. Said costs shall be for the installation and continuous monitoring and maintenance of erosion control measures and the construction and continuous monitoring and maintenance of storm drainage infrastructure, detention/retention facilities, and stormwater quality BMPs, as regulated under this Ordinance.

The property owner, developer, or contractor shall be required to file a three-year maintenance bond or other acceptable guarantee with the City of Vincennes, prior to acceptance, in an amount not to exceed ten percent (10%) of the cost of the stormwater drainage system located outside the public road right-of-ways, and in a form satisfactory to the City of Vincennes's attorney in order to assure that such stormwater system installation was done according to standards of good workmanship, that the materials used in the construction and installation were of good quality and construction, and that such project was done in accordance with the approved plans, and this Ordinance. The bond or other acceptable guarantee shall be in effect for a period of three years after the date of the final project approval by the City of Vincennes.

SECTION 7. ENFORCEMENT

7.1 COMPLIANCE WITH THIS ORDINANCE

In addition to the requirements of this Ordinance, compliance with the requirements set forth in the City of Vincennes and Knox County Zoning Ordinance(s) is also necessary. Compliance with all applicable ordinances of City of Vincennes and Knox County, as well as with applicable State of Indiana statutes and regulations shall also be required. The Board shall be responsible for enforcement of the provisions of this Ordinance. Violations of the requirements of this Ordinance are subject to the penalties listed below.

7.2 PENALTIES FOR VIOLATIONS

Any person found in violation of any provision of this Ordinance shall be responsible for a civil infraction and subject to a fine of not less than \$100 for a first offense, and not less than \$100 for a subsequent offense, plus damages, expenses, and costs as may be imposed in the discretion of the court. Each day such violation occurs or continues shall be deemed a separate offense and shall make the violator liable for the imposition of a fine for each day. The rights and remedies provided for in this section are cumulative and in addition to any other remedies provided by law. An admission or determination of responsibility shall not exempt the offender from compliance with the requirements of this Ordinance.

Any person who aids or abets a person in a violation of this Ordinance shall be subject to the penalties provided in this section.

For purposes of this section, "subsequent offense" means a violation of the provisions of this Ordinance committed by the same person within 12 months of a previous violation of the same provision of this Ordinance for which said person admitted responsibility or was adjudicated to be responsible.

7.3 STOP WORK ORDER

In addition to the penalties listed in Section 7.2 above, if construction activities are conducted contrary to the provisions of this Ordinance or approved final stormwater management plans, the City of Vincennes may order the work stopped, by notice, in writing, served on any person engaged in the doing or causing of such work to be done. Any such persons shall forthwith stop such work until authorized by the City of Vincennes to proceed with the work. The City of Vincennes may also undertake or cause to be undertaken, any necessary or advisable protective measures to prevent violations of this Ordinance or to avoid or reduce the effects of noncompliance herewith. The cost of any such protective measures shall be the responsibility of the owner of the property upon which the work is being done, and the responsibility of any person carrying out or participating in the work.

Any person who neglects or fails to comply with a stop work order shall, upon conviction, be responsible for a civil infraction and subject to a fine of not less than \$100 for a first offense, and not less than \$500 for a subsequent offense, plus damages, expenses, and costs. Each day such violation occurs or continues shall be deemed a separate offense and shall make the violator liable for the imposition of a fine for each day.

7.4 FAILURE TO COMPLY OR COMPLETE

In addition to any other remedies, should any person fail to comply with the provisions of this Ordinance, the City of Vincennes may, after the giving of reasonable notice and opportunity for compliance, have the necessary work done, and the owner shall be obligated to promptly reimburse the City of Vincennes for all costs of such work.

7.5 SUSPENSION OF ACCESS TO THE STORM DRAIN SYSTEM

A. Suspension due to Emergency Situations

The City of Vincennes's duly authorized representative(s) may, without prior notice, suspend storm drain system discharge access to a person when such suspension is necessary to stop an actual or threatened discharge which presents or may present imminent and substantial danger to the environment, or to the health or welfare of persons, or to the storm drain system, or to Waters of the United States. If the violator fails to comply with a suspension order issued in an emergency, the authorized enforcement agency may take such steps as deemed necessary to prevent or minimize damage to the storm drain system or Waters of the United States, or to minimize danger to persons.

B. Suspension due to the Detection of Illicit Discharge

Any person discharging to the storm drain system in violation of this Ordinance may have their storm drain system access terminated if such termination would abate or reduce an illicit discharge. The City of Vincennes's duly authorized representative(s) will notify a violator of the proposed termination of its MS4 access. The violator may petition the Board for a reconsideration and hearing.

7.6 CORRECTIVE ACTION

Nothing herein contained shall prevent the City of Vincennes from taking such other lawful action as may be necessary to prevent or remedy any violation. All costs connected therewith shall accrue to the person or persons responsible. Costs include, but are not limited to, repairs to the storm drain system made necessary by the violation, as well as those penalties levied by the USEPA or IDEM for violation of the City of Vincennes's NPDES permit, attorney fees, and other costs and expenses.

7.7 APPEALS

Any person to whom any provision of this Ordinance has been applied may appeal in writing, not later than 30 days after the action or decision being appealed from, to the Board the action or decision whereby any such provision was so applied. Such appeal shall identify the matter being appealed, and the basis for the appeal. The Board shall consider the appeal and make a decision whereby it affirms, rejects or modifies the action being appealed. In considering any such appeal, the Board may consider the recommendations of the MS4 Operator, the City Engineer, or other persons having knowledge of the matter. In considering any such appeal, the Board may grant a variance from the terms of this Ordinance to provide relief, in whole or in part, from the action being appealed, but only upon finding that the following requirements are satisfied:

- A. The application of the Ordinance provisions being appealed will present or cause practical difficulties for a development or development site; provided, however, that practical difficulties shall not include the need for the developer to incur additional reasonable expenses in order to comply with the Ordinance; and
- B. The granting of the relief requested will not prevent the goals and purposes of this Ordinance, nor result in less effective management of stormwater runoff.