

**KISKIMINETAS TOWNSHIP
STORMWATER MANAGEMENT
ORDINANCE**

Ordinance No. 3 of 2019

Duly advertised and adopted by the
Kiskiminetas Township Board of Supervisor
on May 10, 2019

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ARTICLE 1 – GENERAL PROVISIONS

Section 101. Short Title

This ordinance shall be known and may be cited as the “Kiskiminetas Township Stormwater Manager Ordinance.”

Section 102. Statement of Findings

The governing body of Kiskiminetas Township finds that:

- A. Inadequate management of accelerated stormwater runoff resulting from development throughout a watershed increases flood flows and velocities, contributes to erosion and sedimentation, overtaxes the carrying capacity of existing stream and storm sewers, greatly increase the cost of public facilities to convey and manage stormwater undermines floodplain management and flood reduction efforts in upstream and downstream, communities, reduced groundwater recharge, threatens public health and safety, and increases non-point source pollution of water resources.
- B. A comprehensive program of stormwater management, including reasonable regulation of development and activities causing accelerated runoff, is fundamental to the public health, safety, welfare and the protection of the people of Kiskiminetas Township, their resources and the environment.
- C. Inadequate [planning and management of stormwater runoff resulting from land development and redevelopment throughout a watershed can also harm surface water resources by changing the natural hydrologic patterns; accelerating stream flows (which increase scour and erosion of streambeds and stream banks thereby elevating sedimentation), destroying aquatic habitat; and elevating aquatic pollutant concentrations and loadings such as sediments, nutrients, heavy metals, and pathogens. Groundwater resources are also impacted through loss of recharge.
- D. Stormwater is an important water resource which provides groundwater recharge for water supplies and base flow of streams, which also protects and maintains surface water quality.
- E. Public education on the control of pollution from stormwater is an essential component in successfully addressing stormwater issues.
- F. Federal and state regulations require certain municipalities to implement a program of stormwater controls. These municipalities are required to obtain a permit for stormwater discharges from their separate storm sewer systems under the National Pollutant Discharge Elimination System (NPDES).
- G. Non-stormwater discharges to municipal separate storm sewer systems can contribute to pollution of Waters of the Commonwealth.

Section 103. Purpose

The purpose of this Ordinance is to promote health, safety, and welfare within Kiskiminetas Township, by minimizing the harms and maximizing the benefits described in Section 102 of this Ordinance through provisions intended to:

- A. Meet legal water quality requirements under state law, including regulations at 25 PA Code Chapter 93 to protect, maintain, reclaim, and restore the existing and designated uses of the Waters of the Commonwealth.
- B. Manage accelerated runoff and erosion and sedimentation problems close to their source, by regulation activities that cause these problems.
- C. Preserve the natural drainage systems as much as possible.

- D. Maintain groundwater recharge, to prevent degradation of surface and groundwater quality, and to otherwise protect water resources.
- E. Maintain existing flows and quality of streams and watercourses.
- F. Preserve and restore the flood-carrying capacity of streams and prevent scour and erosion of streambanks and streambeds.
- G. Manage stormwater impacts close to the runoff source, with a minimum of structures and a maximum use of natural processes.
- H. Provide procedures, performance standards, and design criteria for stormwater planning and management.
- I. Provide proper operations and maintenance of all temporary and permanent stormwater management facilities and Best Management Practices (BMPs) that are constructed and implemented.

Section 104. Statutory Authority

- A. Primary Authority: Kiskiminetas Township is empowered to regulate these activities by the authority of the Act of October 4, 1978, 43 P.S., P.L. 864 (Act 167), 32 P.S. Section 68-.1 et. seq., as amended, the "Stormwater Management Act", and the "Second Class Township Code".
- B. Secondary Authority: Kiskiminetas Township also is empowered to regulate land use activities that affect runoff by the authority of the Act of July 31, 1968, P.L. 805, No. 247, The Pennsylvania Municipalities Planning Code, as amended.

Section 105. Applicability

This Ordinance shall apply to all areas of Kiskiminetas Township, and Regulated Activity within Kiskiminetas Township, and all stormwater runoff entering into any Kiskiminetas Township separate storm sewer system from lands within the boundaries of Kiskiminetas Township.

Earth disturbance activities and associated stormwater management controls are also regulated under existing state law and implementing regulations. This Ordinance shall operate in coordination with those parallel requirements.

"Regulated Activities" are any earth disturbance activities or any activities that involve the alteration or development of land in a manner that may affect stormwater runoff. "Regulated Activities" include, but are not limited to, the following listed items:

- A. Land Development including associated grading and earth disturbance(s)
- B. Subdivision
- C. Construction of new or additional impervious or semi-pervious surfaces
- D. Construction of new buildings or additions to existing buildings
- E. Diversion or piping of any natural or man-made stream channel
- F. Installation of stormwater management facilities or appurtenances thereto
- G. Installation of stormwater BMPS

See Section 302 of this Ordinance for Exemption/Modification Criteria

Section 106. Repealer

Any ordinance, ordinance provision(s), or regulation of Kiskiminetas Township inconsistent with any of the provision(s) of this Ordinance is hereby repealed to the extent of the inconsistency only.

Section 107. Severability

In the event that a court of competent jurisdiction declares any section(s) or provision(s) of this Ordinance invalid, such decision shall not affect the validity of any of the remaining section(s) or provision(s) of this Ordinance.

Section 108. Compatibility with Other Ordinance Requirements

Approvals issued and actions taken pursuant to this Ordinance do no relieve the Applicant of the responsibility to comply with or to secure required permits or approvals for activities regulated by any other applicable codes, laws, rules, statues, or ordinances. To the Extent that this Ordinance imposes more rigorous or stringent requirements for stormwater management, the specific requirements contained in this Ordinance shall be followed.

Section 109. Duty of Persons engaged in the Development of Land

Notwithstanding any provision(s) of this Ordinance, including exemptions, any landowner or any person engaged in the alteration or development of land which may affect stormwater runoff characteristics shall implement such measure as are reasonably necessary to prevent injury to health, safety, or property. Such measures also shall include actions as are required to manage the rate, volume, direction, and quality of resulting stormwater runoff in a manner which otherwise adequately protects health, property, and water quality.

Section 110. Kiskiminetas Township Liability Disclaimer

- A. Neither the granting of any approval under this Ordinance, nor the compliance with the provision of this Ordinance, or with any condition imposed by an agent of Kiskiminetas Township hereunder, shall relieve any person from any responsibility for damage to persons or property resulting therefrom, or as otherwise imposed by law no impose any liability upon Kiskiminetas Township for damages to persons or property.
- B. The granting of a permit which include any stormwater management facilities shall not constitute a representation, guarantee or warranty of any kind by the Township, or by an official or employee thereof of the practicability or safety of any structure, use or other plan proposed, and shall create no liability upon or cause of action against such public body, official or employee for any damage that may result pursuant thereto.

ARTICLE II - DEFINITIONS

For the purpose of this Ordinance, certain terms and words used herein shall be interpreted as follows:

- A. Words used in the present tense include the future tense; the singular number includes the plural; and the plural number includes the singular; words of masculine gender include feminine gender; and words of feminine gender include masculine gender.
- B. The word "includes" or "including" shall not limit the term to the specific example but is intended to extend its meaning to all other instances of like kind and character.
- C. The word "person" includes an individual, firm, association, organization, partnership, trust, company, corporation, or any other similar entity.
- D. The words "shall" and "must" are mandatory; the words "may" and "should" are permissive.
- E. The words "used or occupied" include the words "intended, designed, maintained, or arranged to be used, occupied or maintained".

Accelerated Erosion - The removal of the surface of the land through the combined action of human activity and natural processes at a rate greater than would occur because of the natural process alone.

Agricultural Activities - Activities associated with agriculture such as agricultural cultivation, agricultural operation, and animal heavy use areas. This includes the work of producing crops, tillage, land clearing, plowing, disking, harrowing, planting, harvesting crops, or pasturing and raising of livestock and installation of conservation measures. Construction of new buildings or impervious area is not considered an Agricultural Activity.

Alteration - As applied to land, a change in topography as a result of the moving of soil and rock from one location or position to another; changing of surface conditions by causing the surface to be more or less impervious; land disturbance.

Applicant - A landowner, developer, or other person who has filed an application for approval to engage in any Regulated Activities at a project site within the Township.

Best Management Practices (BMPs) - Activities, facilities, designs, measures or procedures used to manage stormwater impacts from Regulated Activities, to meet State Water Quality Requirements, to promote groundwater recharge and to otherwise meet the purposes of this Ordinance. Stormwater BMPs are commonly grouped into one of two broad categories or measures: "non-structural" or "structural". "Non-structural" BMPs are measures referred to as operational and/or behavior-related practices that attempt to minimize the contact of pollutants with stormwater runoff whereas "structural" BMPs are measures that consist of a physical device or practice that is installed to capture and treat stormwater runoff. "Structural" BMPs include, but are not limited to, a wide variety of practices and devices, from large-scale retention ponds and constructed wetlands, to small-scale underground treatment systems, infiltration facilities, filter strips, low impact design, bioretention, wet ponds, permeable paving, grassed swales, riparian or forested buffers, sand filters, detention basins, and manufactured devices. "Structural" stormwater BMPs are permanent appurtenances to the project site.

Channel Erosion - The widening, deepening, and headward cutting of small channels and waterways, due to erosion caused by moderate to large floods.

Cistern - An underground reservoir or tank used for storing rainwater.

Conservation District – The Armstrong Conservation District. The Armstrong Conservation District has the authority under a delegation agreement executed with the Department of Environmental Protection to administer and enforce all or a portion of the regulations promulgated under 25 PA Code Chapter 102.

County – The County of Armstrong, Pennsylvania.

Culvert – A structure with appurtenant works that carries a stream and/or stormwater runoff under or through an embankment or fill.

Dam – An artificial with appurtenant works that carries a stream and/or stormwater runoff under or through an embankment or fill.

Design Storm – The magnitude and temporal distribution of precipitation from a storm event measured in probability of occurrence (e.g., a 25-year storm) and duration (e.g., 24-hours), used in the design and evaluation of stormwater management systems, Also see Return Period.

Designee – The agent of Kiskiminetas Township and/or agent of the governing body involved with the administration, review or enforcement of any provisions of this Ordinance by contract or memorandum of understanding.

Detention Basin – An impoundment structure designed to manage stormwater runoff by temporarily storing the runoff and releasing it at a predetermined rate.

Detention Volume – The volume of runoff that is captured and released into Waters of the Commonwealth at a controlled rate.

Developer – A person, partnership, association corporation, or other entity, or any responsible person therein or agent thereof, that undertakes any Regulated Activity of this Ordinance.

Development Site – (Site) The specific tract of land for which a Regulated Activity is proposed, Also see Project Site.

Disturbed Area – An unstable land area where an Earth Disturbance Activity is occurring or has occurred.

Downslope Property Line – That portion of the property line of the lot, tract, or parcels of land being developed located such that all overland or pipe flow from the site would be directed toward it.

Drainage Conveyance Facility – A stormwater management facility designed to convey stormwater runoff and shall include streams, channels, swales, pipes, conduits, culverts, storm sewers, etc.

Drainage Easement – A right granted by a landowner to a grantee, allowing the use of private land for stormwater management, drainage, or conveyance purposes.

Drainageway – Any natural or artificial watercourse, trench, ditch, pipe, swale, channel, or similar depression into which surface water flows.

Earth Disturbance Activity – A construction or other human activity which disturbs the surface of the land, including, but not limited to, clearing and grubbing, grading, excavations, embankments, land development, agricultural plowing or tilling, timber harvesting activities, road maintenance activities, mineral extraction, and the moving, depositing, stockpiling, or storing of soil, rock or earth materials.

Erosion – The movement of soil particles by the action of water, wind, ice, or other natural forces.

Erosion and Sediment Pollution Control Plan - A plan which is designed to minimize accelerated erosion and sedimentation.

Exceptional Value Waters - Surface waters of high quality, which satisfies PA Code Title 25 Environmental Protection, Chapter 93 Water Quality Standards 93.4b(b) (relating to anti-degradation).

Existing Conditions - The initial condition of a project site prior to the proposed construction. If the initial condition of the site is undeveloped land and not forested, the land use shall be considered as "meadow" unless the natural land cover is documented to generate lower Curve Numbers.

FEMA - The Federal Emergency Management Agency.

Flood - A general but temporary condition of partial or complete inundation of normally dry land areas from the overflow of streams, rivers, and other Waters of the Commonwealth.

Flood Fringe - The remaining portions of the 100-year floodplain outside of the floodway boundary.

Floodplain - Any land area susceptible to inundation by water from any natural source or delineated by applicable Department of Housing and Urban Development, Federal Insurance Administration Flood Hazard Boundary - mapped as being a special flood hazard area. Included are lands adjoining a river or stream that have been or may be inundated by a 100-year flood. Also included are areas that comprise Group 13 Soils, as listed in Appendix A of the Pennsylvania Department of Environmental Protection (PADEP) Technical Manual for Sewage Enforcement Officers (as amended or replaced from time to time by PADEP).

Floodway - The channel of the watercourse and those portions of the adjoining floodplains that are reasonably required to carry and discharge the 100-year frequency flood. Unless otherwise specified, the boundary of the floodway is as indicated on maps and flood insurance studies provided by FEMA.

Forest Management/Timber Operations - Planning and activities necessary for the management of forestland. These include timber inventory and preparation of forest management plans, silvicultural treatment, cutting budgets, logging road design and construction, timber harvesting, site preparation and reforestation.

Freeboard - A vertical distance between the elevation of the design high water and the top of a dam, levee, tank, basin, or diversion ridge. The space is required as a safety margin in a tank, pond or basin.

Grade - A slope, usually of a road, channel or natural ground specified in percent and shown on plans as specified herein.

(To) Grade - To finish the surface of a roadbed, top of embankment or bottom of excavation.

Groundwater Recharge - Replenishment of existing natural underground water supplies.

High Quality Waters - Surface water having quality, which exceeds levels necessary to support propagation of fish, shellfish, and wildlife and recreation in and on the water by satisfying PA Code Title 25 Environmental Protection, Chapter 93 Water Quality Standards 93.4b(a).

Hydrologic Soil Group (HSG) - Infiltration rates of soils vary widely and are affected by subsurface permeability as well as surface intake rates. Soils are classified into one of four HSG (A, B, C, and D) according to their minimum Infiltration rate, which is obtained for bare soil after prolonged wetting. The Natural Resource Conservation Service (NRCS) of the US Department of Agriculture defines the four groups and provides a list of most of the soils in the United States and their group classification. The soils in the area of interest may be identified from a soil survey report from the local NRCS office or the Armstrong Conservation District.

Impervious Surface (Impervious Area) - A surface that prevents the infiltration of water into the ground. Impervious surface (or areas) include, but is not limited to: roofs, additional indoor living spaces, patios, garages, storage sheds and similar structures, paved parking or driveway areas, and any new paved streets and

sidewalks. Any proposed surface of gravel or crushed stone that may be subject to vehicle traffic shall be considered to be impervious.

Impoundment – A retention or detention basin designed to retain stormwater runoff and release at a controlled rate.

Infiltration Structures – A structure designed to direct runoff into the ground (e.g., French drains, seepage pits, seepage trench, etc.).

Inlet – A surface connection to a closed drain. A structure at the diversion end of a conduit. The upstream end of any structure through which water may flow.

Land Development (Development) – (i) The improvement of one lot or two or more contiguous lots, tracts, or parcels of land for any purpose involving (a) a group of two or more buildings, or (b) the division or allocation of land or space between or among two or more existing or prospective occupants by means of, or for the purpose of streets, common areas, leaseholds, condominiums, building groups, or other features; (ii) Any subdivision of land; (iii) Development in accordance with Section 503(1.1) of the PA Municipalities Planning Code.

Low Impact Development (LID) – An approach to land development that uses various land planning and design practices and technologies to simultaneously conserve and protect natural resource systems and reduce infrastructure costs. LID still allows land to be developed, but in a cost-effective manner that helps mitigate potential environmental impacts.

Manning's Equation (Manning's Formula) – A method for calculation of velocity of flow (e.g., feet per second) and flow rate (e.g. cubic feet per second) in open channels based upon channel shape, roughness, depth of flow and slope, "Open channels" may include closed conduits so long as the flow is not under pressure.

Municipal Engineer – The Registered Professional Engineer or Engineering Firm licensed to practice in the Commonwealth of Pennsylvania and retained by Kiskiminetas Township and authorized as the agent for the Township pursuant to this Ordinance.

National Pollutant Discharge Elimination System (NPDES) – The federal government's system for issuance of permits under the Clean Water Act, which is delegated to PADEP in Pennsylvania.

NOAA Atlas 14: Precipitation Frequency Atlas of the United States, Atlas 14, Volume 2m US Department of Commerce, National Oceanic and Atmospheric Administration, National Weather Service, Hydrometeorological Design Studies Center, Silver Spring Maryland (2004), NOAA's Atlas 14 can be accessed at Internet address <http://hdsc.nws.noaa.gov/hdsc/pfds/>.

Non-point Source Pollution – Pollution that enters a water body from diffuse origins in the watershed and does not result from discernible, confined, or discrete conveyances.

NRCS – Natural Resource Conservation Service (previously known as the Soil Conservation Services (SCS)).

Open Channel – A drainage element in which stormwater flows with an open surface. Open channels include, but shall not be limited to, natural and man-made drainage ways, swales, streams, ditches, canals, and pipes not under pressure.

Outfall – (i) Point where water flows from a conduit, stream, or drain; (ii) "Point Source" as described in 40 CFR §122.2 at the point where the Township's storm sewer system discharges to surface waters of the Commonwealth.

Outlet – Points of water disposal from a stream, river, lake, tidewater; or artificial drain.

- PADEP** - The Pennsylvania Department of Environmental Protection.
- Parking Lot Storage** - Involves the use of impervious parking areas as temporary impoundments with controlled release rates during rainstorms.
- Peak Discharge** - The maximum rate of stormwater runoff from a specific storm event.
- Person** - An individual, partnership, public or private association or corporation, or a governmental unit, public utility or any other legal entity whatsoever which is recognized by law as the subject of rights and duties.
- Pervious Area** - Any area not defined as impervious.
- Pipe** - A culvert, closed conduit, or similar structure (including appurtenances) that conveys stormwater.
- Planning Commission** - The Planning Commission of Armstrong County.
- Point Source** - Any discernible, confined, or discrete conveyance, including, but not limited to: any pipe, ditch, channel, tunnel, or conduit from which stormwater is or may be discharged, as defined in State regulations at 25 Pennsylvania Code § 92.1.
- Probable Maximum Flood (PMF)** - The flood that may be expected from the most severe combination of critical meteorological and hydrologic conditions that are reasonably possible in any area. The PMF is derived from the probable maximum precipitation (PMP) as determined on the basis of data obtained from the National Oceanographic and Atmospheric Administration (NOAA).
- Project Site** - The specific area of land where any Regulated Activities in the Township are planned, conducted, or maintained.
- Qualified Person** - Any person qualified to perform the work required by the Ordinance. Usually a registered professional licensed to perform work in the Commonwealth of Pa.
- Redevelopment** - Earth disturbance activities on land, which has previously been developed.
- Regulated Activities** - Any activities that involve the alteration or development of land in a manner that may affect stormwater runoff.
- Regulated Earth Disturbance Activity** - Activity involving Earth Disturbance subject to regulation under 25 PA Code Chapter 92, Chapter 102, or the Clean Streams Law.
- Release Rate** - The percentage of pre-development peak rate of runoff from a site or subwatershed area to which the post-development peak rate of runoff must be reduced to protect downstream areas.
- Retention Basin** - An impoundment in which stormwater is stored and not released during the storm event. Stored water may be released from the basin at some time after the end of the storm.
- Retention Volume/Removed Runoff** - The volume of runoff that is captured and not released directly into the surface Waters of this Commonwealth during or after a storm event.
- Return Period** - The average interval, in years, within which a storm event of a given magnitude can be expected to recur. For example, the 25-year return period rainfall would be expected to recur on the average once every twenty-five years; or stated in another way, the probability of a 25-year storm occurring in any one given year is 0.04 (i.e. a 4% chance).
- Riparian Buffer** - A vegetated area bordering perennial and intermittent streams and wetlands, that serves as a protective filter to help protect streams and wetlands from the impacts of adjacent land uses.

Riser - A vertical pipe extending from the bottom of a pond that is used to control the discharge rate from the pond for a specified design storm.

Road Maintenance - Road maintenance activities that do not disturb the subbase of a paved road (such as milling and overlays) are not considered earth disturbance activities.

Rooftop Detention - Temporary ponding and gradual release of stormwater falling directly onto flat roof surfaces by incorporating controlled-flow roof drains into building designs.

Runoff - Any part of precipitation that flows over the land surface.

Runoff Capture Volume - The volume of runoff that is captured (retained) and not released into surface Waters of the Commonwealth during or after a storm event.

Sediment - Soils or other materials transported by surface water as a product of erosion.

Sediment Basin - A barrier, dam, retention or detention basin located and designed to retain rock, sand, gravel, silt, or other material transported by stormwater runoff.

Sediment Pollution - The placement, discharge, or any other introduction of sediment into Waters of the Commonwealth occurring from the failure to properly design, construct, implement or maintain control measures and control facilities in accordance with the requirements of this Ordinance.

Sedimentation - The process by which mineral or organic matter is accumulated or deposited by the movement of water.

Seepage Pit/Seepage Trench - An area of excavated earth filled with loose stone or similar coarse material, into which surface water is directed for infiltration into the ground.

Separate Storm Sewer System - A conveyance or system of conveyances (including roads with drainage systems, Municipal streets, catch basins, curbs, gutters, ditches, man-made channels, or storm drains) primarily used for collecting and conveying stormwater runoff.

Sheet Flow - Runoff that flows over the ground surface as a thin, even layer, not concentrated in a channel.

Soil Cover Complex Method - A method of runoff computation developed by the NRCS that is based on relating soil type and land use/cover to a runoff parameter called Curve Number (CN).

Spillway (Emergency) - A depression in the embankment of a pond or basin, or other overflow structure, that is used to pass peak discharges greater than the maximum design storm controlled by the pond or basin.

State Water Quality Requirements - The regulatory requirements to protect, maintain, reclaim, and restore water quality under Title 25 of that Pennsylvania Code and the Clean Streams Law.

Storage Indication Method - A reservoir routing procedure based on solution of the continuity equation (inflow minus outflow equals the change in storage) with outflow defined as a function of storage volume and depth.

Storm Frequency - The number of times that a given storm "event" occurs or is exceeded on the average in a stated period of years. See also Return Period.

Storm Sewer - A system of pipes and/or open channels that convey intercepted runoff and stormwater from other sources, but excludes domestic sewage and industrial wastes.

Stormwater – Runoff from the surface of the land resulting from precipitation, snow, or ice melt.

Stormwater Hotspot – A land use or activity that generates higher concentrations of hydrocarbons, trace metals, or toxicants than are found in typical stormwater runoff.

Stormwater Management Facilities – Any structure natural or man-made that, due to its condition, design, or construction conveys, stores, or otherwise affects stormwater runoff. Typical stormwater management facilities include, but are not limited to detention and retention basins, open channels, storm sewers, pipes and infiltration facilities.

Stormwater Management Plan – The Kiskiminetas Township Stormwater Management Plan for managing stormwater runoff in Kiskiminetas Township as required by the Act of October 4, 1978, P.L. 864, (act 167) and known as the “ Storm Water Management Act”.

Stormwater Management Site Plan (SWM Site Plan) – The plan prepared by the Applicant or his representative indicating how stormwater runoff will be managed at the project site in accordance with this Ordinance.

Stream Enclosure – A bridge, culvert, or other structure in excess of 100 feet in length upstream to downstream which encloses a regulated Waters of the Commonwealth.

Subwatershed Area – The smallest drainage unit of a watershed for which stormwater management criteria has been established in the Stormwater Management Plan.

Subdivision – The division or redivision of a lot, tract, or parcel of land by any means into two or more lots, tracts, parcels or other division of land including changes in existing lot lines for the purpose, whether immediate or future, of lease, partition by the court for distribution to heirs or devisees, transfer of ownership or building or lot development provide, however, that the subdivision by lease of land for agricultural purpose into parcels of more than ten acres more involving any new street or easement of access or any residential dwelling, shall be exempted (Pennsylvania Municipalities Planning Code, Act of July, 1968, P.L. 805, No.247).

Swale – A low lying stretch of land that gathers or carries surface water runoff.

Timber Operations – See “Forest Management”.

Time of Concentration (T) – The time for surface runoff to travel from the hydraulically most distant point of the watershed to a point of interest within the watershed. This time is the combined total of overland flow time and flow time in pipes or channels, if any.

USDA - The United States Department of Agriculture.

Watercourse – A channel or conveyance of surface water, such as a stream or creek, having defined bed and banks, whether natural or artificial , with perennial or intermittent flow.

Waters of the Commonwealth – Rivers, streams, creeks, rivulets, impoundments, ditches, watercourse, storm sewers , lakes, dammed water, wetlands, ponds, springs and other bodies or channels of conveyance of surface and underground water, or parts thereof, whether natural or artificial, within or on the boundaries of the Commonwealth of Pennsylvania.

Watershed – Area drained by a river, watercourse, or other surface water, whether natural or artificial.

Wetland – Those areas that are inundated or saturated by surface 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 and have identified hydric soils, including swamps, marches, bogs

and similar areas. (The term includes but is not limited to wetland areas listed in the State Water Plan, the United States Forest Service Wetlands Inventory of Pennsylvania, the Pennsylvania Coastal Zone Management Plan and a wetland area designated by a river basin commission. This definition is used by the United States Environmental Protection Agency and the United States Army Corps of Engineers.)

ARTICLE III - STORMWATER MANAGEMENT STANDARDS

Section 301. General Requirements

- A. For all Regulated Activities, unless specifically exempted in Section 302:
1. Preparation and implementation of an approved SWM Site Plan is required.
 2. No Regulated Activities shall commence until the Township issues written approval of a SWM Site Plan, which demonstrates compliance with the requirements of this Ordinance.
 3. The SWM Site Plan shall demonstrate that adequate capacity will be provided to meet the Volume and Rate Control Requirements, as described under Sections 304 and 305 of this Ordinance.
 4. The SWM Site Plan approved by the Township, shall be on-site throughout the duration of the Regulated Activities.
- B. For all Regulated Earth Disturbance Activities, erosion and sediment control BMPs shall be designed, implemented, operated, and maintained during the Regulated Earth Disturbance Activities (e.g., during construction) to meet the purposes and requirements of this Ordinance and to meet all requirements under Title 25 of the Pennsylvania Code (including, but not limited to Chapter 102 Erosion and Sediment Control) and the Clean Streams Law. Various BMPs and their design standards are listed in the *Erosion and Sediment Pollution Control Program Manual* (E&S Manual), No. 363-2134-008 (April 15, 2000), as amended and updated.
- C. For all Regulated Activities, stormwater BMPs shall be designed, installed, implemented, operated, and maintained to meet the purposes and requirements of this Ordinance and to meet all requirements under Title 25 of the Pennsylvania Code and the Clean Streams Law.
- D. The Township may approve measures for meeting the State Water Quality Requirements other than those in this Ordinance, provided that they meet the minimum requirements of, and do not conflict with state law, including, but not limited to, the Clean Streams Law.
- E. All Regulated Activities shall include, to the maximum extent practicable, measures to:
1. Protect health, safety, and property.
 2. Meet the water quality goals of this Ordinance by implementing measures to:
 - a. Minimize disturbance to floodplains, wetlands, natural slopes, existing native vegetation and woodlands.
 - b. Create, maintain, or extend riparian buffers and protect existing forested buffers.
 - c. Provide trees and woodlands adjacent to impervious areas whenever feasible.
 - d. Minimize the creation of impervious surfaces and the degradation of Waters of the Commonwealth and promote groundwater recharge.
 - e. Protect natural systems and processes (drainageways, vegetation, soils, and sensitive areas) and maintain, as much as possible, the natural hydrologic regime.
 - f. Incorporate natural site elements (wetlands, stream corridors, mature forests) as design elements.
 - g. Avoid erosive flow conditions in natural flow pathways.
 - h. Minimize soil disturbance and soil compaction.
 - i. Minimize thermal impacts to Waters of the Commonwealth.
 - j. Disconnect impervious surfaces by directing runoff to pervious areas, wherever possible and decentralize and manage stormwater at its source.
- F. Impervious Areas:
1. The measurement of impervious areas shall include all of the impervious areas in the total proposed development, even if development is to take place in stages.

2. For developments taking place in stages, the entire development plan must be used in determining conformance with this Ordinance.
- G. If diffused flow is proposed to be concentrated and discharged onto adjacent property, the Applicant must document that adequate downstream conveyance facilities exist to safely transport the concentrated discharge, or otherwise prove that no erosion, sedimentation, flooding, or other harm will result from the concentrated discharge.
 1. Applicant must provide an easement for proposed concentrated flow across adjacent properties to a drainage way or public right-of-way.
 2. Such stormwater flows shall be subject to the requirements of this Ordinance.
 - H. Stormwater drainage systems shall be provided in order to permit unimpeded flow along natural watercourses, except as modified by stormwater management facilities or open channels consistent with this Ordinance.
 - I. Where watercourses traverse a development site, drainage easements (with a minimum width of 20 feet and include the 100-year water surface) shall be provided conforming to the line of such watercourses. The terms of the easement shall prohibit excavation, the placing of fill or structures, and any alterations that may adversely affect the flow of stormwater within any portion of the easement.
 - J. When it can be shown that, due to topographic conditions, natural drainageways on the site cannot adequately provide for drainage, open channels may be constructed conforming substantially to the line and grade of such natural drainageways. Work within natural drainage ways shall be subject to approval by PADEP under regulations at 25 PA Code Chapter 105 through the Joint Permit Application process, or, where deemed appropriate by PADEP, through the General Permit process.
 - K. Any stormwater management facilities or any facilities that constitute water obstructions (e.g., culverts, bridges, outfalls, or stream enclosures, etc.) that are regulated by this Ordinance, that will be located in or adjacent to Waters of the Commonwealth (including wetlands), shall be subject to approval by PADEP under regulations at 25 PA Code Chapter 105 through the Joint Permit Application process, or, where deemed appropriate by PADEP, the General Permit process. When there is a question whether wetlands may be involved, it is the responsibility of the Applicant or his agent to show that the land in question cannot be classified as wetlands; otherwise, approval to work in the area must be obtained from PADEP.
 - L. Should any stormwater management facility require a dam safety permit under PADEP Chapter 105, the facility shall be designed in accordance with Chapter 105 and meet the regulations of Chapter 105 concerning dam safety.
 - M. Any stormwater management facilities regulated by this Ordinance that will be located on, or discharged onto State highway rights-of-ways shall be subject to approval by the Pennsylvania Department of Transportation (PENNDOT).
 - N. Minimization of impervious surfaces and infiltration of runoff through seepage beds, infiltration trenches, etc., are encouraged, where soil conditions and geology permit, to reduce the size or eliminate the need for detention facilities.
 - O. Infiltration BMPs should be dispersed throughout the site, made as shallow as practicable, and located to maximize use of natural on-site infiltration features while still meeting the other requirements of this Ordinance.
 - P. The design of facilities over karst shall include an evaluation and implementation of measures to minimize adverse effects.

- Q. Roof drains shall not be connected to streets, sanitary or storm sewers, or roadside ditches in order to promote overland flow and infiltration/percolation of stormwater where it is advantageous to do so. When it is more advantageous to connect directly to streets or storm sewers, then the Township shall permit it on a case-by-case basis.
- R. Applicants are encouraged to use Low Impact Development Practices to reduce the costs of complying with the requirements of this Ordinance and the State Water Quality Requirements.
- S. When stormwater management facilities are proposed within 1,000 feet of a downstream Municipal Facility, the Developer shall notify the downstream Municipality and provide a copy of the SWM Plan, if requested, for review and comment.

Section 302. Exemptions

- A. Under no circumstance shall the Applicant be exempt from implementing such measures as necessary to:
 - 1. Meet State Water Quality Standards and Requirements.
 - 2. Protect health, safety, and property.
 - 3. Meet special requirements for High Quality (HQ) and Exceptional Value (EV) watersheds.
- B. The Applicant must demonstrate that the following BMPs are being utilized to the maximum extent practicable to receive consideration for the exemptions:
 - 1. Design around and limit disturbance of Floodplains, Wetlands, Natural Slopes over 15%, existing native vegetation, and other sensitive and special value features.
 - 2. Maintain riparian and forested buffers.
 - 3. Limit grading and maintain non-erosive flow conditions in natural flow paths.
 - 4. Maintain existing tree canopies near impervious areas.
 - 5. Minimize soil disturbance and reclaim disturbed areas with topsoil and vegetation.
 - 6. Direct runoff to pervious areas.
- C. The Applicant must demonstrate that the proposed development/additional impervious area will not adversely impact the following:
 - 1. Capacities of existing drainageways and storm sewer systems.
 - 2. Velocities and erosion.
 - 3. Quality of runoff if direct discharge is proposed.
 - 4. Existing known problem areas.
 - 5. Safe conveyance of the additional runoff.
 - 6. Downstream property owners.

- D. An Applicant proposing Regulated Activities, after demonstrating compliance with Sections 302.A, 302.B, and 302.C, may be exempted from various requirements of this Ordinance according to the following table:

New Impervious Area ^{1,2} (square footage)	Applicant Must Provide
2,500 – 5,000	Small Project SWM Application (Appendix B) ³
> 5,000	Rate Controls, Volume Controls & SWM Site Plan

NOTES:

¹New Impervious Area since the date of Adoption of this Ordinance.

²Gravel In existing condition may be considered pervious and gravel in proposed condition that is exposed to vehicle traffic shall be considered impervious. All municipal roadways are considered impervious.

³The Small Project Stormwater Management Application in Appendix B shall be submitted by the applicant to the Township as a condition of eligibility for the exemptions listed in the above table for projects above 2,500 sq. ft. and under 5,000 sq. ft. or for single family home construction. The Small Project SWM Application after approval by the Township satisfies the requirement for demonstrating compliance with Sections 302.A, 302.B, and 302.C and for documentation of new impervious surface.

- E. Construction of new Single Family Dwellings are exempt from the SWM Site Plan submission requirements of this ordinance provided the construction:
1. Complies with Sections 301.G, 302.A, 302.B, 302.C, and
 2. Have building setback 75 feet from downstream property lines, and
 3. Driveways:
 - a. Runoff must discharge onto a pervious surface with a gravel strip or other spreading device or provide other sheet flow to pervious areas.
 - b. No more than 2,500 square feet of paved surface may discharge to any one point.
 - c. The length of flow on the pervious must exceed the length of the paved surface flow.
 4. The Small Project Stormwater Management Application included in Appendix B must be provided to demonstrate eligibility for this exemption.
- F. The Township may require more information or require mitigation of certain impacts through installation of stormwater management BMP's if there is a threat to property, health, or safety.
- G. An Applicant proposing Regulated Activities, after demonstrating compliance with Sections 302.A, 302.B, and 302.C, may be exempted from various requirements of this Ordinance if documentation can be provided that a downstream man-made water body (i.e., reservoir, lake, or man-made wetlands) has been designed or modified to address the potential stormwater flooding impacts of the proposed development.
- H. The purpose this section is to ensure consistency of stormwater management planning between local ordinances and NPDES permitting (when required) and to ensure that the Applicant has a single and clear set of stormwater management standards to which the Applicant is subject. The Township may accept alternative stormwater management controls under this section provided that:
1. The Township determines that meeting the Volume Control requirements (See Section 304) is not possible or places an undue hardship on the Applicant.
 2. The alternative controls are documented to be acceptable for NPDES requirements pertaining to post construction stormwater management requirements.
 3. The alternative controls are in compliance with all other sections of this ordinance, including but not limited to Sections 301.D and 302.A-C.
- I. Agricultural activities are exempt from requirements of this Ordinance provided the activities are performed according to the requirements of 25 PA Code Chapter 102.

- J. Forest management and timber operation are exempt from the Rate and Volume Control requirement and SWM Site Plan preparation requirement of this Ordinance provided the activities are performed according to the requirements of 25 PA Code Chapter 102. It should be noted that temporary roadways are not exempt.
- K. The Township may deny or evoke any exemption or waiver pursuant to this Article at any time for any project that the Township believe may pose a threat to public health, safety, property or the environment.

Section 303. Waivers

- A. The provision of this Ordinance are the minimum standards for the protection of the public welfare.
- B. All waiver requests must meet the provision of Section 303.G and H. Waivers shall not be issued from implementing such measures as necessary to:
 - 1. Meet State Water Quality Standards and Requirements.
 - 2. Protect health, safety, and property.
 - 3. Meet special requirements of High Quality (HQ) and Exceptional Value (EV) watersheds.
- C. If an Applicant demonstrates to the satisfaction of the governing body of the Township that any mandatory provision of this Ordinance is unreasonable or causes unique or undue unreasonableness or hardship as it applies to the proposed Project, or that an alternate design may result in a superior result within the context of Section 102 and 103 of this Ordinance, the governing body of the Township upon obtaining the comments and recommendations of the Conservation District or the Municipal Engineer as applicable may grant a waiver or relief so that substantial justice may be done and the public interest is secured; provided that such waiver will not have the effect of nullifying the intent of this Ordinance.
- D. The Applicant shall submit all requests for waivers in writing and shall include such request as a part of the plan review and approval process. The Applicant shall state in full the facts of unreasonableness or hardship on which the request is based, the provision or provisions of the Ordinance that are involved, and the minimum waiver or relief that is necessary. The Applicant shall state how the requested waiver and how the Applicant's proposal shall result in an equal or better means of complying with the intent or purpose and general principles of this Ordinance.
- E. The Township shall keep a written record of all actions on waiver requests.
- F. The Township may charge a fee for each waiver request, which shall be used to offset the administrative costs of reviewing the waiver request. The Applicant shall also agree to reimburse the Township for reasonable and necessary fees that may be incurred in any review of a waiver request.
- G. In granting waivers, the Township may impose reasonable conditions at will, in its judgment, secure substantially the objectives of the standards or requirements that are to be modified.
- H. The Township may grant applicant for waivers when the following findings are made, as relevant:
 - 1. That the waiver shall result in an equal or better means of complying with the intent of this Ordinance.
 - 2. That the waiver is the minimum necessary to provide relief.
 - 3. That the Applicant is not requesting a waiver based on cost considerations.
 - 4. That existing down gradient stormwater problems will not be exacerbated.
 - 5. That increased flooding or ponding on off-site properties or roadways will not occur.

determinations. Industrial manufacturing site and hazardous material storage areas must provide NPDES SIC codes.

B. Performance Standards

1. The location of the boundaries of sensitive areas is set by drainage areas tributary to any public water supply. The exact location of these boundaries as they apply to a given development site, shall be determined using mapping at a scale which accurately defines the limits of the sensitive area. If the project site is within the sensitive area (in whole or in part), 2-foot contour interval mapping shall be provided to define the limits of the sensitive area. If the project site is adjacent to but within 500 linear feet of a defined Sensitive Area, a 5-foot contour interval map defining the limits of the Sensitive Area shall be included in the Stormwater Management Plan to document the site's location relative to the sensitive area.
2. Stormwater Hotspots may be required to prepare and implement a stormwater pollution prevention plan and file notice of Intent as required under the provision of the EPA Industrial Stormwater NPDES Permit Requirements.
3. Stormwater Hotspots must use an acceptable pre-treatment BMP prior to volume control and/or rate control BMPs. Acceptable pre-treatment BMPs for these developments include those based on filtering, settling, or chemical reaction processes such as coagulation.

ARTICLE V - DESIGN CRITERIA

Section 501. Design Criteria for Stormwater Management & Drainage Facilities

A. General Design Guidelines:

1. Stormwater shall not be transferred from one watershed to another, unless (1) the watersheds are sub-watersheds of a common watershed which join together within the perimeter of the property; (2) the effect of the transfer does not alter the peak rate discharge onto adjacent lands; or (3) easements from the affected landowner(s) are provided.
2. Consideration shall be given to the relationship of the subject property to the drainage pattern of the watershed. A concentrated discharge of stormwater to an adjacent property shall be within an existing watercourse or confined in an easement or returned to a pre-development flow type condition.
3. Innovative stormwater BMPs and recharge facilities are encouraged (e.g., rooftop storage, drywells, cisterns, recreation area ponding, diversion structures, porous pavements, holding tanks, infiltration systems, in-line storage in storm sewers, and grading patterns). They shall be located, designed, and constructed in accordance with the latest technical guidance published by PADEP, provided they are accompanied by detailed engineering plans and performance capabilities and supporting site specific soils, geology, runoff and groundwater and infiltration rate data to verify proposed designs. Additional guidance from other sources may be accepted at the discretion of the Conservation District or the Municipal Engineer as applicable (a pre-application meeting is suggested).
4. All existing and natural watercourses, channels, drainage systems and areas of surface water concentration shall be maintained in their existing condition unless an alteration is approved by the appropriate regulatory agency.
5. The design of all stormwater management facilities shall incorporate sound engineering principles and practices. The Township shall reserve the right to disapprove any design that would result in the continuation or exacerbation of a documented adverse hydrologic or hydraulic condition within the watershed, as identified in the Plan.
6. The design and construction of multiple use stormwater detention facilities are strongly encouraged. In addition to stormwater management, facilities should, where appropriate, allow for recreational uses including ball fields, play areas, picnic grounds, etc. Consultation with the Township and prior approval are required before design. Provision for permanent wet ponds with stormwater management capabilities may also be appropriate.
 - a. Multiple use basins should be constructed so that potentially dangerous conditions are not created.
 - b. Water quality basins or recharge basins that are designed for a slow release of water or other extended detention ponds are not permitted for recreational uses, unless the ponded areas are clearly separated and secure.
7. Should any stormwater management facility require a dam safety permit under PADEP Chapter 105, the facility shall be designed in accordance with Chapter 105 and meet the regulations of Chapter 105 concerning dam safety.

B. Stormwater runoff from all development sites shall be calculated using the NRCS Rainfall-Runoff Methodology. Other methods shall be selected by the designer based on the individual limitations and suitability of each method for a particular site and approved by the Conservation District or the Municipal engineer as applicable.

C. Rainfall Values:

1. NRCS Rainfall-Runoff Method – The Soil Conservation Service Type II, 24-hour rainfall distribution shall be used in conjunction with rainfall depths from NOAA Atlas 14 using the Lock and Dam at Kittanning, Pa. or be consistent with the following table:

Return Interval (Year)	24-hour Rainfall Total (Inches)
1	2.03
2	2.42
10	3.39
25	4.01
50	4.53
100	5.06

D. Runoff Volume:

1. Rational Method – Not to be used to calculate runoff volume.
2. NRCS Rainfall-Runoff Method – This method shall be used to estimate the change in volume due to Regulated Activities. Combining Curve Numbers for land areas proposed for development with Curve Numbers for areas unaffected by the proposed development into a single weighted curve number is NOT acceptable.

E. Peak Flow Rates:

1. NRCS Rainfall-Runoff Method – This method is recommended for design of stormwater management facilities and where stormwater runoff volume must be taken into consideration. The following provides guidance on the model applicability:
 - a. NRCS's TR-55 – limited to 100 acres in size
 - b. NRCS's TR-20 or HEC-HMS – no size limitations
 - c. Other models as pre-approved by the Conservation District or Municipal engineer as applicable.

The NRCS antecedent runoff condition II (ARC II, previously AMC II) must be used for all simulations. The use of continuous simulation models that vary the ARC are not permitted for stormwater management purposes.

2. For comparison of peak flow rates, flows shall be rounded to a tenth of a cubic foot per second (cfs).

F. Runoff Coefficients:

1. NRCS Rainfall-Runoff Method – Curve Numbers (CN) should be rounded to tenths for use in hydrologic models as they are a design tool with statistical variability. For large sites, CN's should realistically be rounded to the nearest whole number.

ARTICLE VI - SWM SITE PLAN & REPORT REQUIREMENTS

Section 601. General Requirements

For any of the activities regulated by this Ordinance and not eligible for the exemptions provided in Section 302, the final approval of subdivision and/or land development plans, the issuance of any building or occupancy permit, or the commencement of any land disturbance activity, may not proceed until the Applicant has received written approval of a SWM Site Plan from the Township.

Section 602. SWM Site Plan & Report Contents

The SWM Site Plan & SWM Site Report shall consist of all applicable calculations, maps, and plans. All SWM Site Plan materials shall be submitted to the Township in a format that is clear, concise, legible, neat and well organized; otherwise, the SWM Site Plan shall be rejected.

Appropriate sections from the Armstrong County Subdivision and Land Development Ordinance, and other applicable local ordinances, shall be followed in preparing the SWM Site Plan.

A. SWM Site Plan shall include, but not be limited to:

1. Plans shall be of one size and in a form that meets the requirements for recording in the Office of the Recorder of Deeds of Armstrong County.
 - a. Plans for tracts of less than 20 acres shall be drawn at a scale of one inch equals no more than 50 ft.;
 - b. Plans for tracts of 20 acres or more, plans shall be drawn at a scale of one inch equals no more than 100 ft.;
 - c. All lettering shall be drawn to a size to be legible if the plans are reduced to half size.
2. The name of the development; name, location address and tax map number/parcel identification number of the property site; name, address, and telephone number of the Applicant/Owner of the property; and name, address, telephone number, email address, and engineering seal of the individual preparing the SWM Site Plan.
3. The date of submission and dates of all revisions.
4. A graphical and written scale on all drawings and maps.
5. A north arrow on all drawings and maps.
6. A location map at a minimum scale of one (1) inch equals two-thousand (2,000) feet and illustrates the project relative to highways, municipalities or other identifiable landmarks.
7. Metes and bounds description of the entire tract perimeter.
8. Existing and final contours at intervals:
 - a. Slopes less than 5%: no greater than one (1) foot;
 - b. Slopes between 5 and 15%: no greater than two (2) feet;
 - c. Steep slopes (greater than 15%), 5-foot contour intervals may be used.
9. Perimeters of existing waterbodies within the project area including stream banks, lakes, ponds, springs, field delineated wetlands or other bodies of water, sinkholes, flood hazard boundaries (FEMA delineated floodplains and floodways), areas of natural vegetation to be preserved, the total extent of the upstream area draining through the site, and overland drainage paths. In

- e. The following signature block for the Municipal Engineer's review of the Stormwater Management Plan:

"I, _____, have reviewed this Stormwater Management Plan in accordance with the Design Standards and Criteria of the Township Stormwater Management Ordinance."

B. SWM Site Report shall include (but not limited to):

1. General data including:
 - a. Project Name;
 - b. Project location - address of the property site and tax map number/parcel identification number;
 - c. Name, address, and telephone number of the Applicant/Owner of the property;
 - d. Name, address, telephone number, and email address of the individual preparing the SWM Site Report;
 - e. Date of submission and revisions.
2. Project description narrative that clearly discusses the project and provides the following information, where applicable:
 - a. Narrative
 - Statement of the regulated activity describing what is being proposed. Overall stormwater management concept with description of permanent stormwater management techniques, including construction specifications and materials to be used for stormwater management facilities.
 - Expected project schedule
 - Location map showing the project site and its location relative to release rate districts.
 - Detailed description of the existing site conditions including a site evaluation completed for projects proposed in areas of carbonate geology or karst topography, and other environmentally sensitive areas such as brownfields.
 - Total site area - pre and post, which must be equal or have an explanation as to why it is not
 - Total site impervious area
 - Total off-site areas
 - Number and description of stormwater management facilities
 - Type of development
 - Pre-development land use
 - Whether site is a water quality sensitive (WQS) development
 - Whether site is in a defined sensitive area
 - Types of water quality and recharge systems used, if applicable
 - Complete hydrologic, hydraulic, and structural computations for all stormwater management facilities.
 - A written maintenance plan for all stormwater features including detention facilities and other stormwater management elements.
 - Identification of ownership and maintenance responsibility for all permanent stormwater management facilities.
 - Other pertinent information, as required
 - b. Summary Tables
 - Existing conditions runoff volume & peak rate of runoff
 - Post-development runoff volume & peak rate of runoff
 - Undetained areas, areas to ponds
 - Land use for each subarea

- B. Three (3) copies of the SWM Site Plan & Report shall be submitted to the Municipal Engineer or Conservation District as applicable accompanied by the requisite executed Review Fee Reimbursement Agreement, as specified in this Ordinance.
- C. Additional copies shall be submitted as requested by the Conservation District or the Municipal engineer as applicable.

Section 604. SWM Site Plan & Report Review

- A. The Township shall require receipt of a complete SWM Site Plan & Report as specified in this Ordinance. The Township shall review the SWM Site Plan & Report for consistency with the purposes, requirements, and intent of this Ordinance.
- B. The Township shall not approve any SWM Site Plan & Report that is deficient in meeting the requirements of this Ordinance. At its sole discretion and in accordance with this Article, when a SWM Site Plan & Report is found to be deficient, the Township may disapprove the submission and require a resubmission, or in the case of minor deficiencies, the Township may accept submission of modifications.
- C. The Township shall notify the Applicant in writing within forty-five (45) calendar days whether the SWM Site Plan & Report is approved or disapproved if the SWM Site Plan & Report is not part of a Subdivision or Land Development Plan. If the SWM Site Plan & Report involves a Subdivision or Land Development Plan, the timing shall follow the Subdivision and Land Development process according to the Municipalities Planning Code.
- D. A building permit shall not be issued for any Regulated Activity if the SWM Site Plan & Report has been found to be inconsistent with this Ordinance, as determined by the Township or its designee.

Section 605. Modification of Plans

- A. A modification to a submitted SWM Site Plan & Report for a development site that involves a change in stormwater management facilities or techniques, or that involves the relocation or re-design of stormwater management facilities, or that is necessary because soil or other conditions are not as stated on the SWM Site Plan as determined by the Township, shall require a resubmission of the modified SWM Site Plan in accordance with this Ordinance.

Section 606. Resubmission of Disapproved SWM Site Plan & Report

- A. A disapproved SWM Site Plan & Report may be resubmitted with the revisions addressing the Township's concerns documented in writing, to the Township in accordance with this Ordinance. The applicable Review Fee must accompany a resubmission of a disapproved SWM Site Plan & Report.

Section 607. Authorization to Construct and Term of Validity

- A. The Township's approval of a SWM Site Plan & Report authorizes the Regulated Activities contained in the SWM Site Plan for a maximum term of validity of five (5) years following the date of approval. The Township may specify a term of validity shorter than five (5) years in the approval for any specific SWM Site Plan. Terms of validity shall commence on the date the Township signs the approval for a SWM Site Plan. If stormwater management facilities included in the approved SWM Site Plan have not been constructed, or if a Record Drawing of these facilities has not been approved within this time, then the Township may consider the SWM Site Plan disapproved and may revoke any and all permits or approvals.

Section 608. Record Drawings, Completion Certificate and Final Inspection

- A. The Applicant shall be responsible for providing Record Drawings of all stormwater BMPs included in the approved SWM Site Plan. The Record Drawing and an explanation of any discrepancies with the

ARTICLE VII - EASEMENTS

Section 701. Easements

- A. Easements shall be established to accommodate the existence of drainageways.
- B. Where a tract is traversed by a watercourse, drainage-way, channel or stream, there shall be provided an easement paralleling the line of such watercourse, drainage-way, channel or stream with a width adequate to preserve the unimpeded flow of natural drainage in the 100-year floodplain.
- C. Easements shall be established for all on-site stormwater management or drainage facilities, including but not limited to: detention facilities (above or below ground), infiltration facilities, all stormwater BMPs, drainage swales, and drainage facilities (inlets, manholes, pipes, etc.).
- D. Easements are required for all areas used for off-site stormwater control.
- E. All easements shall be a minimum of 20 feet wide and shall encompass the 100-year surface elevation of the proposed stormwater facility.
- F. Easements shall provide ingress to, and egress from, a public right-of-way. In lieu of providing an easement to the public right-of-way, a note may be added to the plan granting the Township or its designees access to all easements via the nearest public right-of-way able for vehicle ingress and egress on grades of less than 10% for carrying out inspection or maintenance activities.
- G. Where possible, easements shall be centered on side and/or rear lot lines.
- H. Nothing shall be planted or placed within the easement which would adversely affect the function of the easement, or conflict with any conditions associated with such easement.
- I. All easement agreements shall be recorded with a reference to the recorded easement indicated on the site plan. The format and content of the easement agreement shall be reviewed and approved by the Township.

3. Facilities, areas, or structures used as stormwater BMPs shall be enumerated as permanent real estate appurtenances and recorded as deed restrictions or easements that run with the land.
 4. The SWM Site Plan & Report shall be recorded as a restrictive deed covenant that runs with the land.
 5. The Township or its designee may take enforcement actions against an Applicant for failure to satisfy and provision of this Ordinance.
- C. The Township shall make the final determination on the continuing maintenance responsibilities prior to final approval of the SWM Site Plan & Report. The Township may require a dedication of such facilities as part of the requirements for approval of the SWM Site Plan. Such a requirement is not an indication that the Kiskiminetas Township will accept the facilities. Kiskiminetas Township reserves the right to accept or reject the ownership and operating responsibility for any portion of the stormwater management controls.
- D. If Kiskiminetas Township accepts ownership of stormwater BMPS, then Kiskiminetas Township may, at its discretion, require a fee from the Applicant to the Township to offset the future cost of inspections, operations, and maintenance.
- E. It shall be unlawful to alter or remove any permanent stormwater BMP required by an approved SWM Site Plan, or to allow the property to remain in the condition which does not conform to an approved SWM Site Plan, unless the Township or its designee grants an exception in writing.

Section 803. Maintenance Agreement for Privately Owned Stormwater Facilities

- A. Prior to final approval for the SWM Site Plan & Report, the Applicant shall sign the Operation and Maintenance (O & M) Agreement (Appendix A) covering all stormwater control facilities that are to be private owned. The Operation and Maintenance Agreement shall be recorded with the SWEM Site Plan and made a part thereto.
- B. Other items may be included in the operation and Maintenance Agreement where determined necessary to guarantee the satisfactory operation and maintenance of all BMP facilities. The Operation and Maintenance agreement shall be subject to the review and approval of the Township and the Township Solicitor.
- C. The owner is responsible for operation and maintenance of the stormwater BMPS. If the owner fails to adhere to the operation and Maintenance Agreement, the Kiskiminetas Township may perform the services required and charge the owner appropriate fees. Nonpayment of fees may result in a lien being filed by the Township against the property.

reject the ownership and operating responsibility for any portion of the stormwater management controls.

- D If Kiskiminetas Township accepts ownership of stormwater BMPS, then Kiskiminetas Township may, at its discretion, require a fee from the Applicant to the Township to offset the future cost of inspections, operations, and maintenance.
- E If shall be unlawful to alter or remove any permanent stormwater BMP required by an approved SWM Site Plan, or to allow the property to remain in the condition which does not conform to an approved SWM Site Plan, unless the Township or its designee grants an exception in writing.

Section 803. Maintenance Agreement for Privately Owned Stormwater Facilities

- A. Prior to final approval for the SWM Site Plan & Report, the Applicant shall sign the Operation and Maintenance (O&M) Agreement (Appendix A) covering all stormwater control facilities that are to be private owed The Operation and Maintenance Agreement shall be recorded with the SWM Site Plan and made a part thereto.
- B. Other items may be included in the Operation and Maintenance Agreement where determined necessary to guarantee the satisfactory operation and maintenance of all BMP facilities. The Operation and Maintenance agreement shall be subject to the review and approval of the Township and the Township Solicitor.
- C. The owner is responsible for operation and maintenance of the stormwater BMPS. If the owner fails to adhere to the Operation and Maintenance Agreement, the Kiskiminetas Township may perform the services required and charge the owner appropriate fees. Nonpayment of fees may result in a lien being filed by the Township against the property.

ARTICLE X - ENFORCEMENT AND PENALTIES

Section 1001. Notification

- A. In the event that a person fails to comply with the requirements of this Ordinance, an approved SWM Site Plan, or fails to conform to the requirements of any permit or approval issued hereunder, the Township shall provide written notification of the violation. Such notification shall set forth the nature of the violation(s) and establish a time limit for correction of these violation(s).
- B. Failure to comply within the time specified shall subject such person to the Penalties Provisions of this Ordinance. All such penalties shall be deemed cumulative and shall not prevent the Township from pursuing any and all other remedies. It shall be the responsibility of the owner of the real property on which any Regulated Activity is proposed to occur, is occurring, or has occurred, to comply with the terms and conditions of this Ordinance.

Section 1002. Enforcement

- A. The Township is hereby authorized and directed to enforce all of the provisions of this Ordinance. The approved SWM Site Plan shall be on file at the project site throughout the duration of the construction activity. The Township or its designee may make periodic inspections during construction.
- B. Adherence to Approved SWM Site Plan
 1. It shall be unlawful for any person, firm, or corporation to undertake any Regulated Activity on any property except as provided for by an approved SWM Site Plan and pursuant to the requirements of this Ordinance.
 2. It shall be unlawful to alter or remove any control structure required by the SWM Site Plan pursuant to this Ordinance.
 3. It shall be unlawful to allow a property to remain in a condition that does not conform to an approved SWM Site Plan.

Section 1003. Public Nuisance

- A. A violation of any provision of this Ordinance is hereby deemed a Public Nuisance.
- B. Each day that a violation continues shall constitute a separate violation.

Section 1004. Suspension and Revocation

- A. Any approval or permit issued by the Township may be suspended or revoked for:
 1. Non-compliance with or failure to implement any provision of the approved SWM Site Plan or Operation & Maintenance (O&M) Agreement.
 2. A violation of any provision of this Ordinance or any other applicable law, Ordinance, rule or regulation relating to the Regulated Activity.
 3. The creation of any condition or the commission of any act, during the Regulated Activity which constitutes or creates a hazard or nuisance, pollution, or which endangers the life or property of others.

ARTICLE XI – PROHIBITIONS

Section 1101. Prohibited Discharges and Connections

- A. Any drain (including indoor drains and sinks), or conveyance whether on the surface or underground, that allows any non-stormwater discharge including sewage, process wastewater, and wash water to enter Kiskiminetas Township's separate storm sewer system or Waters of the Commonwealth is prohibited.
- B. Any drain or conveyance connected from a commercial or industrial land use to the Kiskiminetas Township's separate storm sewer system, which has not been documented in plans, maps, or equivalent records, and approved by the Township is prohibited.
- C. No person shall allow, or cause to allow, discharges into the Kiskiminetas Township's separate storm sewer system or into surface Waters of the Commonwealth, which are not composed entirely of stormwater, except: (1) as provided in subsection 1301.D below, and (2) discharges allowed under a state or federal permit.
- D. The following discharges are authorized unless they are determined to be significant contributors to pollution to the Waters of the Commonwealth:
- | | |
|---|---|
| - Discharges from firefighting activities | -Flows from riparian habitats and wetlands |
| Portable water sources including dechlorinated water line and fire hydrant flushings | -Uncontaminated water from foundations or from footing drains |
| - Irrigation drainage | -Lawn watering |
| - Air conditioning condensate | -Dechlorinated swimming pool discharges |
| - Springs | -Uncontaminated groundwater |
| - Water from crawl space pumps | -Water from individual residential car washing |
| - Routine external building wash down (which does not use detergents or other compounds | |
| - Pavement wash waters where spills or leaks of toxic or hazardous materials have not occurred (unless all spill material has been removed) and where detergents are not used | |
- E. In the event that the Township determines that any of the discharges identified in subsection 1301.D, significantly contribute to pollution of Waters of the Commonwealth, the Township will notify the responsible person(s) to cease the discharge.
- F. Upon notice provided by Kiskiminetas Township, the discharge will have a reasonable time, as determined by the township, to cease the discharge, consistent with the degree of pollution caused by the discharge.

ARTICLE XII – FEES AND EXPENSES

Section 1201. General

- A. The fee required by this Ordinance is the Review Fee. The Review Fee shall be established by the Township to defray review costs incurred by Kiskiminetas Township. The Township may change the Review Fee at any time by Resolution if the governing body. The Applicant shall pay all fees.

Section 1201. Expenses Covered by Fees

- A. The fees required by this Ordinance shall, at a minimum, cover:
 - 1. Administrative and Clerical Costs.
 - 2. Review of the SWM Site Plan & Report by the Municipal Engineer or the township's designee.
 - 3. Pre-construction meetings.
 - 4. Inspection of stormwater management facilities/BMPs and drainage improvements during construction.
 - 5. Final inspection upon completion of the stormwater management facilities/BMPs and drainage improvements presented in the SWM Site Plan.
 - 6. Any additional work required to enforce any permit provisions regulated by this Ordinance, correct violations, and assure proper completion of stipulated remedial actions.

Section 1203. Recording of Approved SWM Site Plan and Related Agreements

- A. The owner of any land upon which permanent BMPs will be placed, constructed, or implemented, as described in the SWM Site Plan, shall record the following documents in the Office of the Recorder of Deeds of Armstrong County, within ten(10) days of approval of the SWM Site Plan by the Township.
 - 1. The SWM Site Plan.
 - 2. Operations and Maintenance (O & M) Agreement (Appendix A).
 - 3. Easements under Section 901.
 - 4. Riparian buffers under Section 602.
- B. The Township may suspend or revoke any approvals granted for the project site upon discovery of the failure of the owner to comply with this Section.

APPENDIX A - OPERATION AND MAINTENANCE AGREEMENT

Kiskiminetas Township is under no obligation to maintain or repair said facilities, and in no event shall this Agreement be construed to impose any such obligation on the Township.

5. In the event the Municipality, pursuant to this Agreement, performs work of any nature, or expends any funds in performance of said work for labor, use of equipment, supplies, materials, and the like, the Landowner shall reimburse the Municipality for all expenses (direct and indirect) incurred within ten (10) day of receipt of invoice from the Municipality.
6. The intent and purpose of this Agreement is to ensure the proper maintenance of the on-site BMPS by the Landowner; provided, however, that this Agreement shall not be deemed to create or effect any additional liability of any party for damage alleged to result from or be caused by stormwater runoff.
7. The Landowner, its executors, administrators, assigns, and other successors in interests, shall release Kiskiminetas Township from all damages, accidents, casualties, occurrences, or claims which might arise or be asserted against said employees and representatives from the construction, presence, existence, or maintenance of the BMPS by the Landowner or Municipality.
8. Kiskiminetas Township may inspect the BMPS at a minimum of once every three years to ensure their continued functioning.

This Agreement shall be recorded at the Office of the Recorder of Deeds of Armstrong County, Pennsylvania and shall constitute a covenant running with the Property and/or equitable servitude, and shall be binding on the Landowner, his administrators, executors, assign, heirs and any other successors in interest, in perpetuity.

ATTEST

WITNESS the following signatures and seals:

(SEAL)

For the Municipality:

For the Landowner:

ATTEST:

_____ (City, Borough, Township)
County of Armstrong, Pennsylvania

I, _____, a Notary Public in and for the County and State aforesaid, whose commission expires on the ____ day of _____, 20 __, do hereby certify that _____ Whose name(s) is/are signed to the foregoing Agreement bearing date of the ____ day of _____, 20 __, has acknowledged the same before me in my said County and State.

GIVEN UNDER MY HAND THIS _____ day of _____, 20 __.

NOTARY PUBLIC

(SEAL)

**KISKIMINETAS TOWNSHIP
SMALL PROJECT
STORMWATER MANAGEMENT APPLICATION**

Per Kiskiminetas Township's Stormwater Management Ordinance, a stormwater management plan is required when more than 5,000 square feet of impervious surface is proposed. Impervious surfaces are areas that prevent the infiltration of water into the ground and shall include, but not be limited to, roofs, patios, garages, storage shed and similar structures, and any new driveways, streets, or sidewalks.

TO CALCULATE IMPERVIOUS SURFACES PLEASE COMPLETE THIS TABLE					
Surface Type	Length	X	Width	=	Proposed Impervious Area
Building					
Driveway					
Parking Areas					
Patios/Walks					
Other					
Total Impervious Surface Area to be managed (sum of all areas)					

Read, acknowledge and sign below. Submit this form along with the requisite fee to Kiskiminetas Township 1222A Old State Road, Apollo, PA 15613.

- Total Impervious Surface Area is less than 5000 sq. ft. – a Stormwater Management Plan is not required. However, Kiskiminetas Township may request additional reporting and/or management, should public health or safety be threatened, as well as should property or environment be threatened.
- Total Impervious Surface Area is greater than 5,000 sq. ft. but less than 43,500 sq. ft. - a Stormwater Management Plan is required. Plan review will be completed by the Armstrong Conservation District.
- Total Impervious Surface Area is 43,500 sq. ft. – A Stormwater Management Plan is required and the review will be completed by the Township's Engineer. The property owner is responsible for all associated review fees.

Property owner acknowledges that submission of inaccurate information may result in a stop work order or permit revocation. Acknowledgement of such is by signature below, I declare that I am the owner or owner's legal representative.

I further acknowledge that the information provided is accurate and employees or agents of Kiskiminetas Township are granted access to the above described property for review and inspection as may be required.

_____ Property Owner

_____ Date

**KISKIMINETAS TOWNSHIP
STORMWATER MANAGEMENT ORDINANCE
ORDINANCE NO. 3 - 2019**

NOW WHEREAS, the governing body of Kiskiminetas Township finds that inadequate management of accelerated stormwater runoff resulting from development throughout a watershed increases flood flows and velocities, contributes to erosion and sedimentation, overtaxes the carrying capacity of existing stream and storm sewers, greatly increase the cost of public facilities to convey and manage stormwater undermines floodplain management and flood reduction efforts in upstream and downstream, communities, reduced groundwater recharge, threatens public health and safety, and increases non-point source pollution of water resources; and

WHEREAS, a comprehensive program of stormwater management, including reasonable regulation of development and activities causing accelerated runoff, is fundamental to the public health, safety, welfare and the protection of the people of Kiskiminetas Township, their resources and the environment; and

WHEREAS, inadequate planning and management of stormwater runoff resulting from land development and redevelopment throughout a watershed can also harm surface water resources by changing the natural hydrologic patterns; accelerating stream flows (which increase scour and erosion of streambeds and stream banks thereby elevating sedimentation), destroying aquatic habitat; and elevating aquatic pollutant concentrations and loadings such as sediments, nutrients, heavy metals, and pathogens. Groundwater resources are also impacted through loss of recharge; and

WHEREAS, stormwater is an important water resource which provides groundwater recharge for water supplies and base flow of streams, which also protects and maintains surface water quality; and

WHEREAS, public education on the control of pollution from stormwater is an essential component in successfully addressing stormwater issues; and

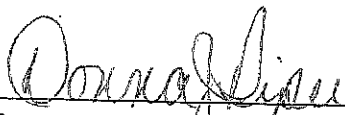
WHEREAS, Federal and State regulations require certain municipalities to implement a program of stormwater controls. These municipalities are required to obtain a permit for stormwater discharges from their separate storm sewer systems under the National Pollutant Discharge Elimination System (NPDES); and

WHEREAS, non-stormwater discharges to municipal separate storm sewer systems can contribute to pollution of Waters of the Commonwealth.

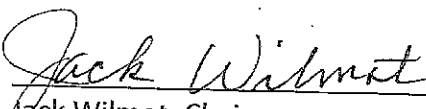
AND THEREFORE, ENACTED AND ORDAINED this 8th day of May, 2019, at a duly advertised meeting of the Kiskiminetas Township Board of Supervisors

ATTEST

TOWNSHIP BOARD OF SUPERVISORS



Dr. Donna J. Piper, Township Manager



Jack Wilmot, Chairman