

Draft Stormwater Pollution Prevention Plan

for:

Town of Stony Point
74 East Main Street
Stony Point, NY 10980
Phone: (845)786-2716
Fax: (845)786-5138

SWPPP Contact(s):

Kevin P. Maher, P.E., M.ASCE
Town Engineer
74 East Main Street
Stony Point, NY 10980
Phone: (845)786-2716, x-105
Fax: (845)786-5138
Email: kmaher@townofstonypoint.org

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SECTION 1: SITE EVALUATION, ASSESSMENT, AND PLANNING

1.1 Project/Site Information

The Town of Stony Point is located in east-central Rockland Count, along the Hudson River approximately 35 miles north of New York City. Incorporated in 1865, the Town is a mix of small industrial, minor strip malls and residential development. A large portion of the Town's northwest sector is comprised of parkland and privately owned land that has remained undeveloped primarily due to its zoned use and the cost of providing essential utilities and wastewater disposal.

1.2 Contact Information/Responsible Parties

Operator(s):

Insert Company or Organization Name: Town of Stony Point Highway Department
Insert Name: Larry S. Brissing, Superintendent of Highways Town of Stony Point
Insert Address: Rose Street
Insert City, State, Zip Code: Stony Point, NY 10980
Insert Telephone Number: (845)786-2300, (845)786-2716
Insert Fax/Email: (845)429-7693; lbrissing@townofstonypoint.org
Insert area of control (if more than one operator at site): Entire Town

SWPPP Contact(s):

Insert Company or Organization Name: Town of Stony Point
Insert Name: Kevin P. Maher, P.E., M.ASCE Town Engineer
Insert Address: 74 East Main Street
Insert City, State, Zip Code: Stony Point, NY 10980
Insert Telephone Number: (845)786-2716, x-105
Insert Fax/Email: (845)786-5138; kmaher@townofstonypoint.org
Insert area of control (if more than one operator at site) : Entire Town

This SWPPP was Prepared by:

Insert Company or Organization Name: Engineering Department
Insert Name: Kevin P. Maher, P.E., M.ASCE Town Engineer
Insert Address: 74 East Main Street
Insert City, State, Zip Code: Stony Point, NY 10980
Insert Telephone Number: (845)786-2716, x-105
Insert Fax/Email: (845)786-5138; kmaher@townofstonypoint.org

Emergency 24-Hour Contact:

Insert Company or Organization Name:

Insert Name:

Insert Telephone Number:

1.3 Soils, Slopes, Vegetation, and Current Drainage Patterns

Soil Type(s):

The dominant soil types in the Town of Stony Point, per the USDA Soil Survey of Rockland County, are Charlton sand/sandy loam/rock outcrop, which comprises approximately 65% of the surface area of the Town. While there are other types of soil in the area, including those soils found in the wetlands areas and within the beds of the numerous streams and drainage channels, it is obvious from the soil survey and Rockland County Aerial Survey that the predominant soil matrices are the Charlton sandy loam (in the valleys and flatland areas) and rock outcrop (hillsides).

Since there is a significant amount of sandy loam in the Town of Stony Point, recharge to groundwater is fairly good. But that also means that at the toe of slope in hilly areas, groundwater can easily emerge onto the surface (Artesian Well Effect). If we assume that a fairly thick layer of the Charlton sandy loam overlies a dense layer of shale or, at least, a poorly drained soil matrix, the perched water will more than likely rise to the surface and provide the base flow for many of the streams in the area.

Slopes:

There are five major drainage channels that were formed from natural ravines in the Town that have, after long periods of time, eroded into streams and brooks with the boundaries of the municipality. Since the Town is located within the northern reaches of what are commonly called the Palisades portion of New York, a majority of the Town is situated on slopes greater than 5% and in some instances far greater than that.

The Palisades form a rather well defined line running in a southwesterly to northeasterly line through the Town of Stony Point. Since the vast majority of the land to the west of this line belongs to the Palisade Park Commission there is very little chance for any significant development that could radically alter the watershed characteristics beyond what they are today. Depending on future population and employment trends, the Palisades Parkway may need to be improved with the construction of additional lanes and or new or improved interchanges. At this time the Commission has not put forward any proposals for capital improvements to the Parkway.

Because of terrain considerations (and land ownership) the developed portions of the Town have been limited generally to the southeastern corner of the municipality and along the shoreline of the Hudson River. Depending on the zoning characteristics for a

given area, some additional residential subdivisions may still occur, but will probably be limited to two to three lot minor subdivisions. These will be more in line with in-fill developments rather than extensions of existing residential areas. Therefore, the impacts to slope areas should be limited at most.

Commercial and industrial development has occurred primarily in the southeastern quadrant of the Town, more so in the strip of land between the Hudson River and U.S. Highway Route 9W/202. This area is well-suited to that kind of development due to its relatively flat terrain and direct access to the main thoroughfares and the river. While there are still a few vacant parcels left to be developed, most of the area has been improved for quite some time. Future development of the area will be limited to building conversions and additions, so watershed modifications will probably be minimal.

Drainage Patterns:

As previously noted, the Township has five major natural drainage features. Wherever possible, storm drains and storm sewers were constructed in such a fashion as to take advantage of these to minimize construction costs. This method of stormwater dispersal is commonplace in the area and has been practiced for centuries both here and in Europe.

With the natural topography of the Town running in a general west to east progression, exclusive of marginal areas where surface runoff is contained and directed to tributary streams of the major drainage ways in the Town, the general watershed flow patterns are readily visible on overall aerial contour maps of the area. Most of the natural large-scale drainage ditches and streams can be seen on the aforementioned maps, and the topography provides the basis for the limits of the individual watersheds and subwatersheds.

Vegetation:

The northwestern portion of the Town is still relatively undeveloped due to the fact that most of the land is currently parkland or owned by single individuals/entities. The costs associated with providing utilities and appropriate sewage disposal facilities in these areas for normal development have kept the area in a nearly natural state. The Palisades Parkway provides a rather clear delineation of this area as a view of an aerial picture of the Town shows little or no development immediately along or to the west of the Parkway in the northwestern portion of the Town.

The remainder of the Town is characterized by development that has occurred primarily over the past twenty to thirty years, with larger subdivisions being created on the western portion of the Town that have more open space areas than the original developments that were built in what can be called the Town center. The newer developments unfortunately were built in a clear-cut method, whereby most of the vegetation was removed. Some areas were retained in their natural state, primarily in those areas considered to be environmentally sensitive, or to provide some degree of

buffering from neighboring activities or from those items that could be considered a nuisance (i.e., heavily trafficked areas such as the Palisades Parkway).

The eastern portion of the Town resembles a typical urban/suburban development akin to most developed suburbs of major cities. Roadways are clearly defined with street trees and occasional shade trees on individual properties. Wherever possible, property owners have been encouraged during their building permit review and construction phases to retain as much landscaping as possible. There are isolated areas where significant portions of the previously existing forests have been retained, mostly due to property geometrics and zoning bulk requirements. These would be steep slope provisions, significant woodlands, and wetland areas, for example.

1.4 Receiving Waters

Description of Receiving Waters:

There are several natural drainage features in the Town of Stony Point which convey stormwater runoff from portions of the municipal separate storm sewer system toward the Hudson River, which is the ultimate discharge point for stormwater runoff from the Town. Most of these features are nameless tributaries of the major streams crossing through the Town, or occasional natural ravines and swales that direct surface runoff towards these streams. These features can best be described as intermittent streams as they convey water only as the result of runoff generated by rainfall or by snowmelt.

The dominant natural drainage features in the Town are the Lake Tiorati Brook, the Cedar Pond Brook, the Minisceongo Creek, the Doodletown Brook and the Timp Brook. All of these watercourses ultimately discharge directly to the Hudson River. The Lake Tiorati Brook merges with the Cedar Pond Brook in the south-central portion of the Town. The Cedar Pond Brook and the Minisceongo Creek are located along the southern portion of the Town, which can be delineated by Main Street and Gate Hill Drive. The Doodletown Brook and the Timp Brook converge and flow together through Palisades Park Commission lands toward the Iona Island Bird Sanctuary, where they discharge into the Hudson River. These watercourses have a baseline flow, which results from flows contributed by natural springs and groundwater seepage from upland areas.

Description of Municipal Storm Sewer System:

The Town's storm sewer system consists of drainage systems that were constructed and expanded over the last century to provide for the drainage of Federal, State, County and Municipal Right-of-Ways in addition to public and private lands. As the Town's population increased and development regulations were enacted, stormwater management systems such as detention basins began to be incorporated into the Town's system to control the rate of runoff being generated by developed areas in the municipality in response to concerns about flooding in low-lying areas.

Certain portions of existing storm sewer systems were replaced with new and larger sewer pipes, or redirected to another discharge point, when drainage issues mandated that this type of work be done.

Whenever possible, new or replacement storm sewer lines are constructed using either Ribbed PVC pipe or smooth-bore HDPE pipe. With either alternative, smaller pipes and flatter slopes can be used so that the system can be extended even further in the future. The use of HDPE pipe also allows the project to be classified as a "green" project as most of the pipe manufactured today contains recycled HDPE.

At the present time, NYSDEC or any other governmental agency has no records indicating that any of the surface waters in the Town are impaired or subject to TMDLs. However, future laws from the State Legislature or rules from NYSDEC may create changes that need to be addressed.

1.5 Site Features and Sensitive Areas to be Protected

There are obviously wetlands along the Hudson River waterfront that need to be protected from the effects of excessive runoff as well as the potential for pollution that could degrade the area. Excessive amounts of sediment deposited in the Hudson River will also impact recreational swimming and fishing activities in the waterfront area. By controlling erosion in upstream areas, these features can be preserved for everyone to enjoy.

There are mapped and unmapped wetland areas contiguous to or attached via a drainage feature to the main drainage channels in the Town. These areas are protected by various Federal and State laws and regulations. When submitting plans for development, these areas must be located in the field (delineated) and accepted by NYSDEC and ACOE (depending on jurisdiction).

The Town also has a steep slope ordinance which places restrictions on properties that contain slopes in excess of 25%. This ordinance prevents construction and/or land activities in these areas which are prone to severe erosion if the land is disturbed. A variance may be granted at the discretion of the Town Board reviewing the application. Even though such an approval may be granted, there must be compelling economic and engineering reasons for the waiver to be granted.

In regard to preserving specimen trees and landscaping in general, each application is treated on an individual basis. If there are significant stands of trees on a property that may have some intrinsic value to the Town, the reviewing board will direct the developer to protect these features in the final development of the site. General development bulk requirements also help to preserve natural vegetation on the property (i.e., building and total impervious area coverage percentages).

At the northern end of the Town is the Iona Island Bird Sanctuary. As the name implies, this area in the Town is a resting place for migratory birds (mostly waterfowl). There

may also be several different breeds of raptors (i.e., eagles, falcons, hawks) that may be at the site during different times of the year. This area falls under the jurisdiction of NYSDEC.

1.6 Potential Sources of Pollution

Potential sources of sediment to stormwater runoff:

Besides the typical sediment wash-off that occurs from the roadways during normal storm events and springtime thawing, there is the grit and sand that is used during the winter months for road deicing operations. Wind-blown dirt and debris also accumulate on pavement surfaces. Street litter is also a source of stormwater contamination.

Although not a frequent occurrence, at times soils from construction sites are tracked out onto the municipal roadways. These are more of a visual nuisance than a true stormwater pollution source as they are not an every day happening. The Town has an ordinance in place controlling erosion and sediment control practices within the confines of the municipality.

A more insidious form of sediment pollution is the least recognized one – washing of vehicles in the streets. Besides the chemical deposition into the storm sewer system, there are the sediments that are washed off the cars.

Landscaping and other associated land activities may also contribute to the level of sediment in the runoff, but their impact is far less than the others due to the infrequency and variability of the activities.

Potential pollutants and sources, other than sediment, to stormwater runoff:

Developed areas have additional sources of stormwater pollution besides sediment. Roadway runoff usually contains chemicals such as VOC's (gasoline, etc.), heavy metals (chromium, iron oxide, lead, etc.) in addition to caustic chemicals (battery acid, cleaning solvents, etc.). Animal waste is frequently found in the runoff, as well as high levels of phosphorus (generally from lawn fertilizing).

General waste products, such as cigarette butts, candy wrappers and papers routinely find their way into the storm sewer system and then out into the bay. Items called "floatables" (plastic bottles, styrofoam cups, coffee cup lids, etc.) are also washed into the drain lines. This type of pollution is generally seen more as a visual pollution than a bacteriological form of pollution.

Failing septic systems can also discharge to the surface, where the leachate can be carried by the runoff into the storm sewer system, adding to the level of BOD in the runoff. Sump pumps in the basement of buildings can also pump stagnant or even tainted water directly into the storm sewer system, or through a surface discharge to the gutter area of the street.

While it is common to find illegal roof leader connections to the sanitary sewer system, it is harder to find illegal sanitary connections to the storm sewer system. An obvious indicator would be odors or the presence of fecal matter or other common sanitary sewage debris in the storm sewer line or manholes, or at points where the storm sewer system discharges to surface waters or natural drainage systems.

Due to the overall age of the entire sewerage system in the Town, there is a possibility that there are sanitary sewers that may be exfiltrating sewage into the ground that is then intercepted by the storm sewer system through infiltration.

Isolated overflows from the sanitary sewer system to the storm sewer system or outfalls are a possibility, but are extremely rare. There are also no records of any such incidents in the Town's files.

There are commercial/industrial sites in Town that may have the potential for discharges to the storm sewer system. These sites will be visited to determine the level of containment necessary, with the eventual outcome being that these firms will comply with NYSDEC's SPCC/DPCC requirements.

The Town also has properties, such as the Highway Department yard and the Parks Department yard, where vehicles are stored and/or worked on by Town employees. The Highway Department Yard is where the Town's supply of road salt is maintained. At both sites, the Town vehicles are either washed in the open in the confines of the property or, as with the Highway Department garage, inside of one of the bays. At the present time, the road salt is contained in a roofed structure near the bottom of the entrance driveway to the Highway Department yard. There are no current plans to construct a vehicle washing facility for Township vehicles, but it may be considered as a part of a more encompassing strategy to reduce the potential of stormwater pollution from municipal properties.

Frequently, large commercial vehicles are seen traveling through the Town. These vehicles have the potential of discharging their cargo, whether liquid or solid, onto the roadways as a result of a vehicular accident. This material will find its way into the storm sewer system as a result of Fire Department activities which generally call for the accident site to be hosed down. This will always happen if there is a fuel spill, in order to prevent the material from igniting and causing more serious problems.

Most vehicles from time to time will drip small quantities of fluids, either as a result of overfilling or failed seals/gaskets. After a while, this material will collect on the pavement surface where it can be easily washed into the storm sewer catch basins during a normal storm event.

The commercial freight line that runs along the eastern side of the Town of Stony Point

is also a source of potential pollution of the nearby streams and wetland areas. A previous derailment of a train containing tank cars with chemicals is ample proof that there are potential sources well beyond the control of the Town that can have a significant impact on the local ecosystem.

In the past, there have been isolated incidents where Town residents and businesses have dumped illegal substances into the storm sewer system. For the most part, it has been relatively harmless substances such as used cooking oil or other inert substances. But they can still congeal and collect inside the sewer system and either reduce the carrying capacity of the pipes or even block them completely. Blockages in the sanitary sewer system can cause raw sewage to build up and overflow onto the public roadways and Right-of-Ways, leading to fouling of the storm sewer or pollution in the river system.

1.7 *Endangered Species Certification*

The Iona Island Bird Sanctuary is located at the northeast corner of the Town, near the Bear Mountain Bridge. It is surrounded by wetlands and the Hudson River, so it has no direct contact with any public roadways. The site is a resting (and possibly nesting) area for local and migratory waterfowl as well as raptors such as eagles, falcons and hawks. In addition, there are deer and other mammals in the area.

The property is not owned by the Town of Stony Point. It is owned by the Palisades Park Commission and is under the jurisdiction of NYSDEC.

There are other wetland areas scattered throughout the Town. Most of them lie along the major drainage channels, while others are isolated pockets that have developed as a result of low-lying areas that have runoff continuously trapped in them.

1.8 *Historic Preservation*

The New York State Office of Parks, Recreation and Historic Preservation maintains a map called the "New York State Archeological Sensitivity Map". This map purports to show areas in New York State where there are known sites of archeological significance. This map also shows areas where there are potential significant findings due to "multiple site sensitivity".

Native American Indian tribes are known to have lived in and about the environs of Stony Point. Many tended to encamp along streams and near wetland areas since they provided sources of drinking water and food (game animals) were normally in abundance. The area was also well-suited to the growth of maize (corn).

There are also Colonial American sites in Town (Stony Point Battlefield, for example) that are on the lists both on the Federal and State levels for protection from development. That does not mean that these areas will not be disturbed for improvements to create greater accessibility for the general public.

Each project will be required through a SEQRA review to assess any potential impact to known historic places and those areas where archeological remains may be found.

1.9 Maps

Attached to this report are a series of maps of different features in the Town. Most of these maps are used during the review of development plans as presented to the Planning Board and Zoning Board of Appeals.

SECTION 2: EROSION AND SEDIMENT CONTROL BMPs

2.1 Minimize Disturbed Area and Protect Natural Features and Soil

Generally speaking, the Town does not routinely engage itself with general construction activities within the confines of the municipality with the exception of minor street resurfacing programs and small storm sewer projects. Any large-scale infrastructure projects are performed by independent contractor hired by the Town on a competitive bid contract process. While erosion control measures would be the responsibility of the Contractor, the Town would still provide oversight to ensure that proper methods and materials are being used.

In regard to the development of private property, the Town has in place several procedures and regulations aimed at controlling the activities for the benefit of the Town and its residents. Individual house plans go through a review procedure to ensure that the site construction follows all municipal ordinances and design standards.

For larger developments (i.e., residential subdivisions and commercial/industrial development), the Planning Board and Zoning Board of Appeals provide another level of review and scrutinization to the process that enables even tighter control of site development and disturbance. These types of projects also fall under the State mandated soil erosion and sediment control statutes which are enforced with the SPDES permit issued for the project.

During the construction phase of the project, periodic site visits are made by Town officials, such as the Building Department Inspectors and the Town Engineer, to ascertain the status of the project, especially the construction of the infrastructure such as the project storm sewers. In addition, the Town will respond to complaints from area residents regarding the construction work.

If in the progress of making a site visit it is determined that the approved plans are not being followed or erosion is not being controlled on the site, ordinances in place give Town officials the authority to issue stop work orders and violation notices. These items must be addressed and corrected before work can resume or final approvals granted.

Generally speaking, a developer will be required to install all perimeter erosion control measures before any site disturbance activity can commence. This should provide a measureable degree of protection to off-site areas and features (assuming that the items are properly installed and maintained). As the construction progresses, additional control measures will be installed (such as inlet filters and sediment basins) to minimize construction related impacts off-site.

If any natural drainage features exist on the property and are identified to remain after construction, they will be protected by installing silt fences along the top of the embankment and rip-rap pads at all new storm sewer outfalls as per NYSDEC Soil Erosion Control Standards.

All areas identified on the development plans as areas where no disturbance will occur will be delineated in the field by orange construction fencing so that the project contractor and his employees will know to stay out of those areas.

2.2 Phased Construction Activity

During the review of development projects submitted to the Town for approval, one of the major items of concern is the implementation of proper soil erosion and sediment control items. In particular is the sequence of how these items are installed and how they are utilized during the progress of the work.

Generally speaking, it is anticipated that the main stormwater management devices (detention/and infiltration basins and outfall lines) will be the first items installed on the site (at least those associated with a given phase of the project). By controlling the flow of runoff from the site (because it will more than likely contain soils washed off the site), the receiving sewers and waters can be protected from sedimentation and flooding.

As the project progresses, additional stormwater basins and infiltration devices will be added to keep the site's runoff under control. The soil erosion control measures will also be expanded upon (i.e., silt fences, basin filters, diversion berms) as the need arises on the site.

The Town will monitor all construction sites to ascertain compliance with approved plans. This will involve limited on-site inspection, with an emphasis on observing the downstream sewers and surrounding properties for excessive site runoff and failed erosion control measures. Where necessary, violation notices will be issued and appropriate legal action will be instituted.

2.3 Control Stormwater Flowing Onto and Through the Project

Control of upland stormwater flow onto and through a development site shall be the responsibility of the land developer. He/she will have the option of allowing the drainage to pass through or around the site during construction unheeded or with minimal control while controlling site runoff, or controlling the entire site and upland watershed at the same time.

The first method can be easily undertaken by construction of a diversion berm or berms together with a by-pass drainage channel or system so that the upland areas will continue to free drain as they had prior to the start of the project. However, this method may not work on sites where there is very little change in grade. If the soil has poor recharge capability (low permeability), a potential mosquito breeding condition could develop. In addition, the storm sewers for the site may also have difficulty discharging off-site, leading to possible on-site flooding.

As far as controlling all of the flow leaving the site en masse, it will make the stormwater management basins large and cumbersome to maintain. There may also be the problem that by restricting the entire flow as it leaves the site, the upstream properties may drain slower than previously and possibly flood during heavy storm events. That would leave the developer open to litigation for damage to upstream properties since it could possibly interfere with the free flow of water off of the upland sites. That is a violation of the Common Drainage Law.

2.4 Stabilize Soils

Stabilizing the soils on a site is important in preventing soil wash-off to local storm drains, and eventual degradation of water quality. It will also lessen the need to import soil to the site.

Temporary seeding with native vegetation will provide anchorage for exposed soils. This may also develop into final landscaping as it is generally accepted that native vegetation is far more desirable to use than vegetation that might be intrusive and tend to dominate an area and supplant all native plant life.

If the vegetation is truly temporary in nature (i.e., to be removed for additional construction activity), then seeding with suitable grass mixtures would be more appropriate in that it will mature quickly and need minimal care and maintenance. Hydroseeding is an effective means to establish a temporary lawn surface in a short period of time.

Calcium chloride can be used to keep the level of dust down at a site. It will cause the soil to remain damp enough so that it will not become airborne. Other commercially available "tackifiers" can be used as well. They serve to keep moisture in the ground by not allowing it to evaporate rapidly.

2.5 Protect Slopes

The Town has a slope protection ordinance that prevents building construction or any associated activity in areas with an existing slope greater than or equal to 25%. Variances may be granted at the discretion of the appropriate Town agency (i.e., Planning Board or Zoning Board of Appeals). In addition, the plan review process will also provide adequate control of the final site design and ensure that appropriate protections will be put in place during construction. Enforcement by Town officials will also provide another level of protection.

The choice of slope control measures will be left to the discretion of the site designer, but it will be expected that the methods and means chosen will be industry accepted and commonly used. They will also be methods approved by NYSDEC and listed in the New York State Standards and Specifications for Erosion and Sediment Control (latest edition).

If geotextiles are proposed for slope stabilization, they shall be used in a manner stipulated in the above-referenced standard and shall be installed in full conformance with the manufacturer's specifications and recommendations.

Property slopes are altered to make the site usable from a development perspective. If cuts or fills result in unstable or undesirable slopes, retaining walls are generally installed. The Town's development ordinances require that any such retaining walls proposed for a project must be designed by a competent Professional Engineer licensed to practice in the State of New York. Aesthetics of the wall are as important as the practicality and need for the structure, since public safety and quality of life issues are always considered during development reviews.

Keeping the soil relatively moist on the site will significantly reduce the possibility of wind-blown sediments. If the soils on the site readily absorb water, then a watering system should provide enough dampness to keep fine soils in place. For those soils that are not readily soluble in water, a tackifier would have to be added in order to increase the ability of the soil molecules to bond together and create "larger" clumps of soil that would not be able to become airborne.

2.6 Protect Storm Drain Inlets

Existing and constructed storm drain inlets on a construction site are a prime source for the intake of erodible materials into a storm sewer system. Existing inlets in the remaining portions of the municipal storm sewer system are also points where floatable materials and surface debris can migrate into the lines following storm events.

Currently, the Town has a limited street sweeping program in place which will hopefully sweep the selected streets of the Town clean of enough debris to keep the effluent conditions under those mandated by State regulations. Additional measures to be undertaken in the future will be the installation of screens in the throats of curbed catch

basins and the eventual elimination of curbed catch basins in a manner similar to New York City. If the sweeping program proves to be successful, an additional sweeping machine and personnel will be considered.

The “Streeter” mathematical model clearly shows the effectiveness of street sweeping activities on pollution loading of street stormwater runoff. Although it is not a favored method for controlling pollution loading, it is nonetheless a proven methodology especially in those communities where natural methods such as roadside swales and biofilter mats cannot be installed.

Attached to this report are tabulated results of the Town’s Street Sweeping efforts. The average daily quantity of material collected in the street sweeping program is approximately 10 cubic yards. Based on this data, it is estimated that approximately 316 tons of roadway pollutants have been removed from the local streets, and, therefore, the Hudson River.

2.7 Establish Perimeter Controls and Sediment Barriers

Developers are required during the application process to present plans outlining the proposed soil erosion and sediment control measures that they will employ at their sites. These measures shall conform to the methods and materials as stipulated in the New York State Standards and Specifications for Erosion and Sediment Control (latest edition).

Generally speaking, the perimeter of the site, especially along the bottom of slopes if they occur at the same spot, is ringed with filter fabric fence or a berm to stop and let eroded soils settle out and be trapped on the site instead of washing onto neighboring properties or the municipal storm sewer system. A Temporary Sediment Basin (usually a future detention basin) is another BMP that can be installed near the edge of the development that will trap eroded soils before they leave the property. Eventually, the stormwater management basins installed on the project site will provide the same protection.

A properly sized and constructed stone tracking pad at the entrance and exit to a construction site will help to remove any soil that has become trapped on the tires of construction vehicles that visit and or work at the site. This will have a significant impact on the level of sediment found in the immediate downstream segments of the municipal storm sewer system.

Crushed stone

2.8 Retain Sediment On-Site

Besides the obvious environmental benefits, retaining soil on the site makes good business sense as it would lessen the amount of soil one would need to import to the

site for finished grading. The sediments would also be suitable for the planting of native vegetation, requiring minimal soil amendments. Retaining the sediments on the site through proper site maintenance will also lessen the probability that those materials would wind up either in the storm sewers downstream of the site or in the natural watercourses in the area. Sediments transported off-site either through wind or water erosion also tend to carry nutrients and other pollutants that can be deposited in surrounding watercourses.

By using selective plantings supplemented by carefully sited silt fences, haybale filters and stone check dams in diversion swales, site developers can keep excavated soils within the confines of their property.

2.9 Establish Stabilized Construction Exits

As mentioned previously, a stabilized construction entrance/exit for a site is essential in reducing sediment transport off-site. Soil that clings to the surface of the tires or is embedded into the tire treads can easily come loose and get deposited on the municipal or private roadways that surround the site. The stones in the tracking pads will provide a rough enough surface to shake loose most of the soil from the tires. For the majority of the sites in the Town, this will be suitable to control sediment from being tracked off a site.

The contractor/developer will be encouraged to also provide for routine street sweeping of the entrance/exit onto the local street network to minimize any soil that may fall off the construction vehicles after they leave the site.

Another methodology for those sites that may contain contaminated soils or those soils with extremely high or low pH, or the potential of exposing contaminated soils, is the use of a wash rack system. By using a wash rack system, the soils that adhere to the surface or tires of the site construction vehicles can be washed off before they are deposited onto the adjoining roadways.

2.10 Additional BMPs

Properly designed rip-rap pads at all discharge points into the streams in the Town will reduce the potential for localized erosion at the point discharge and the deposition of eroded soils either at points of quiescent flow downstream of the confluence or even in the Hudson River itself. These sediments can also cause water levels to rise in lower segments of the streams, thereby increasing the potential for flooding of low-lying areas of the Town.

Alternate deicing compounds can be used by the Town depending on their effectiveness as well as the economics of using them. For example, liquid deicing materials will probably yield better results, but will require a new fleet of trucks to apply it. Alternate forms of solid deicing compounds may be available, as well as new spreading equipment that could reduce the amount of waste and overspreading.

SECTION 3: GOOD HOUSEKEEPING BMPs

3.1 Material Handling and Waste Management

The Town has a comprehensive program in place with the County of Rockland regarding the collection of solid waste and recyclable materials. The Town does not collect trash (performed by private trash haulers), but does provide an area alongside its Highway Department garage on Rose Street for Town residents to bring large bulk materials for disposal and recycling, such as appliances and furniture, for example.

All materials collected from street sweeping activities and storm drain cleaning are brought to Veterans Park and dumped in an area that is not used by the public.

3.2 Designate Washout Areas

At the present time, the Town utilizes one of the bays in the Highway Department garage at the end of Rose Street to wash the trucks and larger Town owned vehicles. Other vehicles are washed at the Recreation Department facilities near the Town ball fields. At this location, the vehicles are washed out in the open.

Future capital improvement projects for the Town may include the installation of vehicle wash equipment that will recycle wash water in order to reduce water usage by Town personnel and discharges to the municipal sanitary sewer system.

The Town is also studying the possibility of relocating the Rose Street Highway Department facilities to the waterfront area. Besides the benefits of having a new facility that will be designed better for the use of the employees, it will move the facility from the middle of a residential area (though it has been there for a long time). The new building could also be more energy efficient, and the salt storage facilities and loading area would be better able to contain and protect the Town's road deicing supplies.

At the present time, there are no public car washes in Town. Should a developer propose to construct one, the Town will ask the developer to consider using equipment that will recycle the wash water. The same benefits will be derived with this system as with the wash equipment that may be installed at the Highway Garage.

With such a facility in place, the Town could pass and enforce an ordinance that would prevent Town residents from washing their vehicles in the street or their driveways. The Town would see an additional decrease in pollutants in the storm sewers as Town residents would be less likely to wash their cars in front of their houses, which would cause the wash water to drain into nearby storm sewer catch basins and inlets. The wash water could also re-emulsify any sediments and oils that have become deposited in the gutter areas.

3.3 *Establish Proper Equipment/Vehicle Fueling and Maintenance Practices*

The Town has a vehicle fueling station located along the westerly side of the Highway Department garage at the end of Rose Street. The fuel tanks are located in an above-ground containment facility that is sized to contain any spills from the tanks per EPA and NYSDEC SPCC regulations. Appropriate spill containment pads and absorbent materials are stored nearby to contain any spills that might result from accidents.

In regard to vehicle maintenance, all Town vehicles are serviced at the Highway Department garage, unless major repair work is necessary. There is sufficient room on the site for vehicles to be parked for extended periods of time while awaiting routine maintenance. Those vehicles will be checked periodically to see if there are any materials leaking out. Any vehicle that is leaking a fluid will be given priority status for repair work and will be brought into the garage as soon as possible. Appropriate spill containment measures will be undertaken until the vehicle is brought into the bays for inspection and repair.

3.4 *Control Equipment/Vehicle Washing*

By employing the use of water recycling equipment, the Town can accomplish two goals at the same time; namely, the reduction in water usage and prevention of vehicle wash water, with its inherent pollutants, from entering the storm sewer system.

The Town is currently reviewing the legal format of a local ordinance prohibiting Town residents from washing their vehicles either in the public Right-of-Ways or in their driveways. If they were to wash their vehicles on their front lawns or any other grassed areas on their property, the wash water would at least get some form of natural cleansing, albeit only for sediments and other settleable solids, before it would reach the storm sewer system.

3.6 *Spill Prevention and Control Plan*

The Town currently has an SPCC plan in place for its fueling facility at the Highway Garage, and the personnel at the garage, as well as Town fire department personnel, are adequately trained in spill response. Should this facility be closed and relocated to another site in the Town, suitable plans will be prepared and permits applied for to cover the new facility.

As the process continues for the Town's evaluation of its storm sewer system and its attendant pollution loadings, the area businesses will be evaluated to see where changes can be made to their sites to reduce the levels of pollutants in their individual site's runoff. If there are any government sponsored grant or low-interest programs available, the Town will help the property owners apply for this type of funding.

As with the Town's responsibility to maintain its facilities' spill response teams and programs, so must the individual businesses in the Town. These will be controlled through NYSDEC and the individual SPCC and DPCC permits for the facilities in question.

3.7 Any Additional BMPs

At the present time, the only structural BMPs that Town personnel maintain are stormwater detention basins that have been dedicated to the Town after completion of the particular project associated with it.

NYS DOT is the process of replacing the Farley Bridge (U.S. Routes 202 and 9W) over the Cedar Pond Brook. As a part of this project, a new storm sewer line and outfall discharging to the Cedar Pond Brook will be constructed. This storm sewer will be equipped with a structural cleaning device (i.e., hydrodynamic separator). This system has been reviewed and approved by NYSDEC. An appropriate maintenance and inspection schedule will be prepared and given to the Town after the system has been constructed, inspected and approved.

3.8 Allowable Non-Stormwater Discharge Management

Instructions:

- Identify all allowable sources of non-stormwater discharges that are not identified. The allowable non-stormwater discharges identified might include the following (see your permit for an exact list):
 - ✓ Routine external building wash down that does not use detergents
 - ✓ Foundation or footing drains where flows are not contaminated with process materials such as solvents
- Identify measures used to eliminate or reduce these discharges and the BMPs used to prevent them from becoming contaminated.
- For more information, see *SWPPP Guide*, Chapter 3.A.

There are few non-stormwater discharges that can be managed. Water main flushings and hydrant flow tests can be performed in a manner so as not to churn up any soil in the area that could be washed downhill into any nearby storm sewers or drainage

swales/ditches. The flow can either be directed onto a hard paved surface so that it will not stir up nearby soils. Specialized nozzles can also be used that will dissipate the flow.

When using water to control dust at a construction site, a fine mist is preferable to a hose stream in that it will provide a more uniform application of the water, and provide optimal moisture content to the surface by applying the water in a thin film. This should prevent the water from eroding the surface soil and creating a sediment problem downstream. These methods are not used in travelled areas of a site.

If a vehicle is being washed with just water (no soap or detergent being used), the water coming off the vehicle will have only soil mixed in with it, and that soil will have trace amounts of pollutants that have managed to bond with the individual soil grains. By washing a vehicle in a carwash or on a grassed area, the likelihood of sediment being carried to a local storm drain is lessened.

Springs can be found in various areas of the Town, and they provide for the base flow levels in all of the streams in the area. Since these are existing, natural flows, no controls as to their chemical makeup are warranted.

Non-contact cooling water and air conditioning condensate should be allowed to percolate into the ground (assuming that appropriate surface and subsurface conditions exist). Otherwise, this material should be allowed to be discharged directly to the storm sewer system. Generally speaking, it is a seasonal flow at best, and quantity wise is not as significant as the spring water flows. Therefore, quantity controls should not be required (only if the receiving storm sewer is attached to a stormwater management device; i.e., detention basin).

Since irrigation water is supplied from the municipal water mains in the Town, there is no concern regarding water quality. Systems are generally not in use during rains (unless they are on a time-actuated system), so the amount of water used is not significant enough to present a problem with erosion. However, responsible water usage will benefit the environment by decreasing the amount of water wasted. Generally speaking, about 30% of the water used in a sprinkler system actually winds up reaching the root structure of the plants. The remaining 70% is either lost to evapotranspiration or is absorbed by the outlying materials, such as the concrete sidewalks. Moisture on the surfaces of the plants is also lost to insects and other animals, and some may actually go past the root systems of the plants and go deeper into the soil. To reduce water usage (and waste), irrigation systems should be equipped with moisture sensors so that they are used only when the soil needs it. Likewise, a drip irrigation system should be used instead of spray irrigation to lessen the loss of water to air.

When deep excavations are made to install utilities such as sewer mains and pump stations, groundwater will be encountered. By using well-points and stone-filled sumps with dewatering pumps, a contractor can temporarily lower the groundwater elevation in

an area so that the work can be performed safely. A properly installed system can remove the water with minimal silt content so that it can be discharged into a local storm sewer.

The Town does not have any street washer trucks in its fleet, nor are there any plans to acquire one. The street sweeper truck has been performing well and has removed a significant amount of surface pollutants from the Town's roadway system since it was purchased. If additional funds can be appropriated, an additional sweeper and operator/driver will be considered.

SECTION 4: SELECTING POST-CONSTRUCTION BMPs

Instructions:

- Describe all post-construction stormwater management measures that will be installed during the construction process to control pollutants in stormwater discharges after construction operations have been completed. Examples of post-construction BMPs include the following:
 - ✓ Other proprietary permanent structural BMPs
 - ✓ Vegetated strips and/or swales
- Identify any applicable federal, state, local, or tribal requirements for design or installation.
- Describe how low-impact designs or smart growth considerations have been incorporated into the design.
- For any structural BMPs, you should have design specifications and details and refer to them. Attach them as appendices to the SWPPP or within the text of the SWPPP.
- For more information on this topic, see your state's stormwater manual.
- You might also want to consult one of the references listed in Appendix D of the *SWPPP Guide*.
- Visit the post-construction section of EPA's Menu of BMPs at: www.epa.gov/npes/menuofbmps

Each site development submitted for approval is treated on an individual basis by either the Town's Planning Board or Zoning Board of Appeals. The size of a particular project also establishes the need for certain kinds of stormwater management techniques versus others.

For example, a small residential subdivision (less than five homes) could probably address all of their stormwater requirements using porous pavements, vegetated strips and recharge swales. Larger subdivisions would require a mixture of stormwater management basins, infiltration basins and probably some type of proprietary structural BMP to adequately address all of the stormwater management issues.

Commercial developments like shopping malls tend to rely predominantly on underground detention and recharge systems combined with structural BMP devices since most of the site would be needed for the buildings and parking areas to make the project economically feasible.

Industrial sites require more intensive study since there are several factors that must be taken into consideration when designing or reviewing the appropriate stormwater management system for the site. Factors such as the type of business and the types of operations proposed for the site are critical when addressing not only quantity control but also quality control. Oil refineries, for example, would have a more involved system than a warehouse and distribution center.

Biofilters should be adequate for small development projects such as an individual office building or an individual house. If the soils can support it, multiple biofilters can be installed for larger projects, but maintenance becomes a problem.

Detention/retention facilities, whether constructed below grade or at grade, will be considered as a part of an overall stormwater management system for a site. While their primary function is to control the release of accumulated runoff from the property, they can be combined with structural BMP devices to control water quality as well.

“Wet Basins”, so-called because there is always a level of water remaining inside of them, are very commonplace in the tri-state area. When properly designed, they can provide for water quality treatment as well as runoff quantity control. The major drawback for this type of stormwater management basin is that it can become a mosquito breeding pit.

Constructed wetlands also are used regularly to provide for stormwater quality treatment. They can also be used, to a degree, as a means to control the rate of stormwater release for a particular site. When used in that manner, most constructed wetlands tend to become the dominant feature on the site, since the only means of slowing down the flow rate is dense vegetation, which would mean that the shallow area would have to be made larger than usual to contain and manage the different storm runoff volumes.

There are numerous non-structural means that will be encouraged during the plan review phase, depending on site characteristics. For example, dikes, berms and swales will be accepted for diverting upland runoff around a site so as not to impact its stormwater basins. The swales can also be converted into infiltration devices since the runoff can be contained within the swale and allowed to percolate into the ground. The swale would then be able to filter out any contaminants. Maintenance on these items is fairly easy since there will not be any roadway debris and pollutants in the runoff.

Vegetated strips can be an effective means to provide both water quantity control and water quality treatment. They are ideally suited for parking lots in malls, for example, where the pavement runoff can be directed into them. The trees and other landscaping items used will be able to absorb the water and any nutrients contained in the runoff, providing for water quality treatment.

If a large enough area of the site that has highly permeable soils can be set aside, an infiltration basin can be designed that will discharge large quantities of runoff to groundwater, thereby reducing post-construction discharge off-site. With the proper

selection of materials in the bottom of the basin, significant cleansing of the runoff can be accomplished. By connecting biofilters and swales to the infiltration basin, water quality issues can be addressed, with the infiltrated water recharging the groundwater.

Porous pavement, constructed from concrete paving blocks or open-graded asphaltic concrete, can be used in limited applications due to the fact that the ability of these materials to pass water through to the groundwater is effected by the surface condition of the pavement. It is critical that these pavements remain clean at all times, because the openings in the pavement allow the runoff to percolate into the ground. Deicing compounds and snow removal techniques also need to be taken into account when proposing to use pavers as the snow plows could easily pick up paving blocks. Paving stones and blocks should be limited to residential driveways and overflow parking in parking lots.

Conduit outlet protection is also important in controlling erosion. Each outfall pipe into a stream or other watercourse must have an adequately sized stone rip-rap pad in front of the outlet in order to slow down the velocity of the water leaving the pipe/conduit. This will prevent the discharge from stirring up the bottom of the watercourse and sending sediment and debris downstream. Sediment transport in the water will cause turbidity to increase, which is a major concern for water quality.

The Town has an effective slope protection ordinance in place. Variances or waivers from the requirements may be granted, but they will be handled on a case by case basis and must have significant engineering and planning reasons for the variance/waiver requested. By protecting the steep slopes in Town, the likelihood of these areas eroding is reduced.

The “soup du jour” of stormwater quality treatment today is the rain garden. While it has the potential to be an effective means of treating stormwater runoff, the reality is that they require an enormous amount of maintenance to keep them working properly. They have been used almost exclusively in residential developments, but they are gaining popularity in office parks as a part of the overall site landscaping. In the residential application, they are generally positioned at the end of driveways that slope down and away from the roadway. Therefore, runoff from the driveway, which would contain materials that would have come off of the cars parked there, would drain into the planted area. Since these “devices” require a lot of maintenance, most homeowners remove them after they have lived there for a while. In a residential application, they are only effective if they are installed in common areas and are the responsibility of the Homeowners’ Association to maintain. Typically speaking, most office parks have a landscaping company that maintains the site, so it would not be difficult for them to maintain any of the rain gardens installed there.

For the individual homeowner, there are several products on the market today that can help him/her to meet the spirit of the regulations. “Rain Barrels”, as the name implies, are large containers that can be installed at the bottom of the roof leader drains to catch and hold roof runoff for beneficial reuse (i.e., irrigation). They do have an impact on water usage, since the water retained in the “barrels” will be used to water lawns and

other landscaping. However, they really have minimal impact on flood control and stormwater quality management due to the fact that they can only retain a small portion of the storm runoff. But they can be a fairly inexpensive addition to an existing stormwater management system in a residential development, where adding them to each house in a subdivision could have an impact both on water usage and on stormwater runoff.

There are also underground detention/recharge products, manufactured from high density polyethylene, that can be used as a retrofit to an existing home or as a means to address runoff from later improvements at a site. They are fairly inexpensive and easy for even a homeowner to install.

Sometimes flooding and its associated erosion is not caused just by overdevelopment in an area, but by the simple fact that the existing storm sewers do not have the carrying capacity to handle the runoff tributary to them. Where detention facilities are not required, downstream sewers may be incapable of handling the extra runoff associated with the proposed development. Depending on the type of pipe encountered and its size and slope, lining of the pipe may be a viable alternative to replacement or construction of a relief sewer. Products such as “Insituform” or “Nuliner” can coat the inside of the existing pipe and in essence convert it from a corrugated metal (CMP) or reinforced concrete pipe (RCP) into a polyvinylchloride pipe (PVC), gaining a minimum of 20% additional flow capacity (RCP vs PVC).

SECTION 5: INSPECTIONS

5.1 Inspections

Instructions:

- Identify the individual(s) responsible for conducting inspections and describe their qualifications. Reference or attach the inspection form that will be used.
- Describe the frequency that inspections will occur at your site including any correlations to storm frequency and intensity.
- Note that inspection details for particular BMPs should be included in Sections 2 and 3.
- You should also document the repairs and maintenance that you undertake as a result of your inspections. These actions can be documented in the corrective action log described in Part 5.3 below.
- For more on this topic, see *SWPPP Guide*, Chapters 6 and 8.
- Also, see suggested inspection form in Appendix B of the *SWPPP Guide*.

1. Inspection Personnel:

Kevin P. Maher, P.E., M.ASCE - Town Engineer, Town of Stony Point
Larry Brissing - Superintendent of Highways, Town of Stony Point
William Sheehan - Chief Building Inspector, Town of Stony Point

2. Inspection Schedule and Procedures:

The storm sewer system in Town is generally not inspected on a regular basis, except for catch basins. Highway Department personnel respond to all inquiries and complaints arising from flooding incidents.

The stormwater management basins that are the responsibility of the Town are checked at the beginning of the spring and end of the fall to ensure that the outlet control structures are in proper working condition. If repair or cleaning is necessary, the work is scheduled immediately since the basins are an integral part of the municipal storm sewer system. Their proper functioning will minimize downstream flooding and prevent the upstream segments connected to it from overflowing as well. Since these basins are also functioning as water quality basins, the removal of collected sediments and debris will keep the basins functioning as designed.

Before a new stormwater management basin or device is accepted by the Town as a part of its storm sewer system, it should be inspected for defects and any repairs noted. Part of the requirement for approval of the site plan for a development is the submission of an Operation and Maintenance Manual that highlights the system for the site and establishes a protocol for inspections. Generally speaking, all stormwater management systems should be inspected at least twice a year, preferably at the end of the Fall (late November) to remove any accumulated leaf debris from the outlet control structure, and at the end of the Winter (late February) to observe the operation of the basin during the snowmelt and early Spring rainfall season. Structural BMP devices (manufactured devices) usually have an inspection schedule that is recommended by the manufacturer, which should be adhered to so that the equipment operates properly. Most manufacturers stipulate that their devices should be inspected after every rainstorm in excess of ½ " during the first year of operation, at which time an actual yearly schedule can be developed, as each site has its own pollutant loading.

Spot inspections may uncover that a device is being compromised as a result of pollutant loading or other conditions not anticipated by the site engineer during the design and approval phase of the project. If the first year's inspection reports do not yield any significant conditions that would warrant more frequent inspections in the future, there would be no economic reason to do spot inspections. If the use of the site were to change, then spot inspections would be advisable to see what impacts, if any, have occurred.

For those stormwater management systems that are the responsibility of the Town to maintain will be inspected by personnel from the Highway Department. If only routine cleaning is required, the work will be scheduled by the Highway Superintendent. If repair work is necessary, the Town Engineer will be responsible

to inspect the device(s) and determine the level of repair work needed. If it is a manufactured device, the Town Engineer will more than likely contact the company that constructed it for advice.

5.2 Delegation of Authority

Instructions:

- Identify the individual(s) or specifically describe the position where the construction site operator has delegated authority for the purposes of signing inspection reports, certifications, or other information.
- Attach the delegation of authority form that will be used.
- For more on this topic, see *SWPPP Guide*, Chapter 7.

Duly Authorized Representative(s) or Position(s):

Insert Company or Organization Name: Engineering Department

Insert Name: Kevin P. Maher, P.E., M.ASCE

Insert Position: Town Engineer

Insert Address: 74 East Main Street

Insert City, State, Zip Code: Stony Point, NY 10980

Insert Telephone Number: (845)786-2716, x-105

Insert Fax/Email: (845)786-5138; kmaher@townofstonypoint.org

5.3 Corrective Action Log

Instructions:

- Create here, or as an attachment, a corrective action log. This log should describe repair, replacement, and maintenance of BMPs undertaken as a result of the inspections and maintenance procedures described above. Actions related to the findings of inspections should reference the specific inspection report.
- This log should describe actions taken, date completed, and note the person that completed the work.

Corrective Action Log:

INSERT LOG HERE or REFERENCE ATTACHMENT

SECTION 6: RECORDKEEPING AND TRAINING

6.1 Recordkeeping

Instructions:

- The following is a list of records you should keep at your project site available for inspectors to review:
- Dates of grading, construction activity, and stabilization (which is covered in Sections 2 and 3)
- A copy of the construction general permit (attach)
- The signed and certified NOI form or permit application form (attach)
- A copy of the letter from EPA or/the state notifying you of their receipt of your complete NOI/application (attach)
- Inspection reports (attach)
- Records relating to endangered species and historic preservation (attach)
- Check your permit for additional details
- For more on this subject, see *SWPPP Guide*, Chapter 6.C.

Records will be retained for a minimum period of at least 3 years after the permit is terminated.

Date(s) when major grading activities occur:

[INSERT LOG HERE](#) or [REFERENCE ATTACHMENT](#)

Date(s) when construction activities temporarily or permanently cease on a portion of the site:

[INSERT LOG HERE](#) or [REFERENCE ATTACHMENT](#)

Date(s) when an area is either temporarily or permanently stabilized:

[INSERT LOG HERE](#) or [REFERENCE ATTACHMENT](#)

6.2 Log of Changes to the SWPPP

Instructions:

- Create a log here, or as an attachment, of changes and updates to the SWPPP. You should include additions of new BMPs, replacement of failed BMPs, significant changes in the activities or their timing on the project, changes in personnel, changes in inspection and maintenance procedures, updates to site maps, and so on.

Log of changes and updates to the SWPPP

[INSERT LOG HERE](#) or [REFERENCE ATTACHMENT](#)

6.3 Training

Instructions:

- Training your staff and subcontractors is an effective BMP. As with the other steps you take to prevent stormwater problems at your site, you should document the training that you conduct for your staff, for those with specific stormwater responsibilities (e.g. installing, inspecting, and maintaining BMPs), and for subcontractors.
- Include dates, number of attendees, subjects covered, and length of training.
- For more on this subject, see *SWPPP Guide*, Chapter 8.

Training for stormwater system maintenance is an ongoing activity as newer equipment is developed on a yearly basis.

New regulations promulgated by USEPA and NYSDEC will also require that all personnel responsible for the storm sewer system in the Town be informed of the new requirements. Attendance at NYSDEC sponsored

Individual(s) Responsible for Training:

Larry Brissing, Superintendent of Highways
Les Casscles, Foreman, Highway Department

Describe Training Conducted:

- General stormwater and BMP awareness training for staff and subcontractors:
- Detailed training for staff and subcontractors with specific stormwater responsibilities:

SECTION 7: FINAL STABILIZATION

Instructions:

- Describe procedures for final stabilization. If you complete major construction activities on part of your site, you can document your final stabilization efforts for that portion of the site. Many permits will allow you to then discontinue inspection activities in these areas (be sure to check your permit for exact requirements). You can amend or add to this section as areas of your project are finally stabilized.
- Update your site plans to indicate areas that have achieved final stabilization.
- Note that dates for areas that have achieved final stabilization should be included in Section 6, Part 6.1 of this SWPPP.
- For more on this topic, see *SWPPP Guide*, Chapter 9.

BMP Description:

<i>Installation Schedule:</i>	
<i>Maintenance and Inspection:</i>	
<i>Responsible Staff:</i>	
<i>BMP Description:</i>	
<i>Installation Schedule:</i>	
<i>Maintenance and Inspection:</i>	
<i>Responsible Staff:</i>	

Repeat as needed

SECTION 8: CERTIFICATION AND NOTIFICATION

Instructions:

- The SWPPP should be signed and certified by the construction operator(s). Attach a copy of the NOI and permit authorization letter received from EPA or the state in Appendix D.

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Name: _____ Title: _____

Signature: _____ Date: _____

Repeat as needed for multiple construction operators at the site

SWPPP APPENDICES

Attach the following documentation to the SWPPP:

Appendix A – General Location Map

Appendix B – Site Maps

Appendix C – Construction General Permit

Appendix D – NOI and Acknowledgement Letter from EPA/State

Appendix E – Inspection Reports

Appendix F – Corrective Action Log (or in Part 5.3)

Appendix G – SWPPP Amendment Log (or in Part 6.2)

Appendix H – Grading and Stabilization Activities Log (or in Part 6.1)

Appendix I – Training Log

Appendix J – Delegation of Authority

Appendix K – Additional Information (i.e., Endangered Species and Historic Preservation Documentation)

