



City of Nolanville

Storm Water Management Plan – 2015 Update



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December 2015

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ACRONYMS

BMP	Best Management Practice
CWA	Clean Water Act
EPA	Environmental Protection Agency
MCM	Minimum Control Measure
MEP	Maximum Extent Practicable
MS4	Municipal Separate Storm Sewer System
NOI	Notice of Intent
NPDES	National Pollutant Discharge Elimination System
SWMP	Storm Water Management Program
SWP3, SWPPP	Storm Water Pollution Prevention Plan
TCEQ	Texas Commission on Environmental Quality
TPDES	Texas Pollutant Discharge Elimination System

DEFINITIONS

Best Management Practices (BMPs) - *Schedules of activities, prohibitions of practices, maintenance procedures, structural controls, local ordinances, and other management practices to prevent or reduce the discharge of pollutants. BMPs also include treatment requirements, operating procedures, and practices to control runoff, spills or leaks, waste disposal, or drainage from raw material storage areas.*

Construction Site Operator - *The person or persons associated with a small or large construction project that meets either of the following two criteria:*

- (a) *the person or persons that have operational control over construction plans and specifications (including approval of revisions) to the extent necessary to meet the requirements and conditions of this general permit; or*
- (b) *the person or persons that have day-to-day operational control of those activities at a construction site that are necessary to ensure compliance with a storm water pollution prevention plan for the site or other permit conditions (e.g. they are authorized to direct workers at a site to carry out activities required by the Storm Water Pollution Prevention Plan or comply with other permit conditions).*

Illicit Discharge - *Any discharge to a municipal separate storm sewer that is not entirely composed of storm water, except discharges pursuant to this general permit or a separate authorization and discharges resulting from emergency fire fighting activities.*

Maximum Extent Practicable (MEP) - *The technology-based discharge standard for municipal separate storm sewer systems to reduce pollutants in storm water discharges that was established by CWA.*

Redevelopment - *Alterations of a property that changed the footprint of a site or building in such a way that there is a disturbance of equal to or greater than one (1) acre of land. This term does not include such activities as exterior remodeling.*

Storm Water and Storm Water Runoff - *Rainfall runoff, snow melt runoff, and surface runoff and drainage.*

Storm Water Associated with Construction Activity - *Storm water runoff from an area where there is either a large construction activity or a small construction activity.*

Storm Water Management Program (SWMP) - *A comprehensive program to manage the quality of discharges from the municipal separate storm sewer system.*

Structural Control (or Practice) - *A pollution prevention practice that requires the construction of a device, or the use of a device, to capture or prevent pollution in storm water runoff. Structural controls and practices may include but are not limited to: wet ponds, bioretention, infiltration basins, storm water wetlands, silt fences, earthen dikes, drainage swales, vegetative lined ditches, vegetative*

filter strips, sediment traps, check dams, subsurface drains, storm drain inlet protection, rock outlet protection, reinforced soil retaining systems, gabions, and temporary or permanent sediment basins.

Surface Water in the State - *Lakes, bays, ponds, impounding reservoirs, springs, rivers, streams, creeks, estuaries, wetlands, marshes, inlets, canals, the Gulf of Mexico inside the territorial limits of the state (from the mean high water mark (MHWM) out 10.36 miles into the Gulf), and all other bodies of surface water, natural or artificial, inland or coastal, fresh or salt, navigable or nonnavigable, and including the beds and banks of all water-courses and bodies of surface water, that are wholly or partially inside or bordering the state or subject to the jurisdiction of the state; except that waters in treatment systems which are authorized by state or federal law, regulation, or permit, and which are created for the purpose of waste treatment are not considered to be water in the state.*

Watershed – *A region draining into a major river, creek or other body of waters.*

Waters of the United States - *Waters of the United States or waters of the U.S. means:*

- (a) *all waters which are currently used, were used in the past, or may be susceptible to use in interstate or foreign commerce, including all waters which are subject to the ebb and flow of the tide;*
- (b) *all interstate waters, including interstate wetlands;*
- (c) *all other waters such as intrastate lakes, rivers, streams (including intermittent streams), mudflats, sand flats, wetlands, sloughs, prairie potholes, wet meadows, playa lakes, or natural ponds that the use, degradation, or destruction of which would affect or could affect interstate or foreign commerce including any such waters:*
 - (1) *which are or could be used by interstate or foreign travelers for recreational or other purposes;*
 - (2) *from which fish or shellfish are or could be taken and sold in interstate or foreign commerce; or*
 - (3) *which are used or could be used for industrial purposes by industries in interstate commerce;*
- (d) *all impoundments of waters otherwise defined as waters of the United States under this definition;*
- (e) *tributaries of waters identified in paragraphs (a) through (d) of this definition;*
- (f) *the territorial sea; and*
- (g) *wetlands adjacent to waters (other than waters that are themselves wetlands) identified in paragraphs (a) through (f) of this definition.*

I. INTRODUCTION

1.01 Storm Water Regulatory Requirement

Growing public awareness and concern for controlling water pollution into the waters of the United States led to the enactment of the Federal Water Pollution Control Act Amendments of 1972, more commonly known as the Clean Water Act (CWA). The CWA became the catalyst for regulating the discharges of pollutants into the waters of United States. The 1972 amendment created the National Pollutant Discharge Elimination System (NPDES) permit program requiring permits to be submitted by point source water pollution entities such as municipal sewage and industrial process wastewater and was successful in improving the overall water quality and was administered by the Environmental Protection Agency (EPA). Although the NPDES program improved the overall water quality, it did not address other significant sources of water pollution such as agricultural and storm water runoff.

In 1987 Congress amended the CWA and required the EPA to establish NPDES requirements for storm water discharges. As a result of this amendment a two phase storm water pollution program was established and in 1990 the EPA published the Phase I Municipal Storm Water Program. The Phase I program uses the NPDES permit coverage to address storm water runoff from medium and large Municipal Separate Storm Sewer Systems (MS4's), serving a population of 100,000 or greater.

In 1999 the Phase II Municipal Storm Water Program rule was published by the EPA for MS4's with less than a population of 100,000 to address storm water runoff and in August 2007 this program was adopted requiring MS4's affected by Phase II to submit a Notice of Intent (NOI) and a Storm Water Management Plan (SWMP) by February 11, 2008. This program is being administered by the Texas Commission on Environmental Quality (TCEQ) and all NOI's and SWMP's are submitted to them. Phase II requires all small MS4's to implement programs and practices to control polluted storm water runoff through the Texas Pollution Discharge Elimination System (TPDES) permit program. This program requires that the City of Nolanville:

- Specify Best Management Practices (BMPs) for six (6) minimum control measures (MCMs) and implement them to the maximum extent practicable (MEP)
- Identify measurable goals for the BMP control measures
- Implement these BMPs over a period of five (5) years
- Manage storm water quality activities through a SWMP

1.02 Storm Water Management Plan

The City of Nolanville has developed a SWMP in accordance with the requirements set forth by the TPDES General Permit TXR040000 for discharging storm water directly into waters of the United States. The SWMP is the instrument the City of Nolanville will use in order to reduce the amount of pollutants in storm water to the maximum extent practicable as required by the TPDES General Permit.

The SWMP that was developed for the City of Nolanville describes specific activities that will be instituted over a five (5) year period in order reduce the amount of pollutants in storm water discharges to the maximum extent practicable. The activities listed in the SWMP are known as BMP. The SWMP must set measurable goals and provide a schedule for the implementation of each BMP. The BMP are specifically developed for six (6) minimum control measures (MCMs) that are required by the Phase II program. The six MCMs are as follows:

- ❖ *Public Education and Outreach – Develop and Implement a Public Education Program, or equivalent outreach activities, to distribute information to the community about impacts of storm water discharges on water bodies and steps the public can take to reduce pollutants in storm water runoff.*
- ❖ *Public Involvement and Participation – Comply with all State & Local notice requirements and is recommended to include the public in developing, implementing & reviewing the SWMP and engage all economic and ethnic groups.*
- ❖ *Illicit Discharge Detection and Elimination – Develop, implement and enforce a program to detect and eliminate illicit discharges. As part of this program a storm sewer system map with locations of all outfalls must be developed, an ordinance prohibiting illicit discharges must be established, establish enforcement procedures and actions, detect and address illicit discharges and inform employees, businesses and the general public of the program.*
- ❖ *Control of Construction Site Runoff – Develop, implement and enforce a program to reduce the pollutants in runoff from construction activities disturbing an area greater than or equal to one (1) acre in size. This includes sites smaller than one (1) acre that are part of a greater common plan of development, such as residential lots located in a development. Construction site operators will be required to implement erosion and sediment control BMP and to control waste products.*
- ❖ *Post-Construction Storm Water Management – Develop, implement and enforce a program for storm water runoff from new and redevelopment projects that disturb greater than or equal to one (1) acre in size with an ordinance, structural and non-structural BMP and adequate long-term operation and maintenance. This includes sites smaller than one (1) acre that are part of a greater common plan of development, such as residential lots located in a development.*
- ❖ *Pollution Prevention and Good Housekeeping – Develop and implement an operation and maintenance program that has the goal of preventing and reducing storm water pollutants from municipal operations; this includes employee training seminars on storm water management and BMP.*

II. CITY OF NOLANVILLE BACKGROUND

2.01 Background

The City of Nolanville is located in Central Texas and is situated between the City of Belton to the east and the City of Harker Heights to the west. Nolanville is situated on U.S. Highway 190 and covers approximately 2.5 square miles and had an estimated population of 2,361 in 2006. Nolanville is adjacent to Nolan Creek.

2.02 Watershed

The City of Nolanville has one (1) primary watershed. The sole watershed the City's storm water runoff contributes to is the Nolan Creek Watershed.

Nolan Creek is located to the south of US Highway 190 and the downtown area of Nolanville. The majority of the developed residential and commercial properties is to the north of Nolan Creek and US Highway 190. Nolan Creek is currently undeveloped along its banks through the City. The Nolan Creek Watershed consists largely of residential housing, but is also influenced by some commercial properties as well as U.S. Highway 190.

III. STORM WATER MANAGEMENT PLAN DEVELOPMENT

3.01 General

The specific hydrology and water quality concerns for the City of Nolanville were considered when preparing this Storm Water Management Plan. This plan was prepared under the guidance of the City Staff, TCEQ and the EPA. The BMP that have been identified will not only have a significant impact on the way the City currently operates, but will also impact industrial and commercial businesses, construction companies, developers, Nolanville Independent School District, Bell County and residents of the City of Nolanville. Some areas of operations where the City of Nolanville will be affected are as follows:

- Drainage Systems
- Street Services
- Equipment Maintenance
- City Inspections
- Code Enforcement
- Police Department
- Planning & Development

3.02 Minimum Control Measures

The minimum control measures (MCMs) required by the Phase II rule describes BMPs developed to address the storm water pollutants that were identified as problematic within the City of Nolanville watersheds. The six (6) required MCMs are listed below along with each BMP developed for the MCMs:

Public Education:

- *Education of Nolanville residents regarding the importance of water quality in storm water discharges.*
- *Educate visitors to the City of Nolanville on the importance of water quality in storm water discharges.*
- *Educate City of Nolanville Employees on best management practices in municipal work.*
- *Educate industrial, commercial and automotive businesses on the importance of water quality in storm water discharges.*
- *Educate local businesses on the importance of water quality in storm water discharges.*
- *Educate area developers and home builders on the importance of water quality in storm water discharges.*
- *Educate local school children on the importance of water quality in storm water discharges.*

Public Involvement & Participation:

- *Comply with all federal, state and local public notice requirements when implementing the SWMP.*
- *Develop a city-wide storm water ordinance.*
- *Setup an illegal dumping hotline.*
- *Promote an adopt-a-stream program.*

Illicit Discharge Detection & Elimination:

- *Develop a storm water ordinance specifically for illicit discharges.*
- *Develop a program that will allow the reporting of illicit discharges into the storm sewer system and put in place a plan for investigating the illicit discharge report.*
- *Distribute training materials that will educate municipal employees, county employees, businesses, school district, university and the general public on the hazards associated with illicit discharges and improper disposal of waste.*
- *Create a Storm Sewer System Map.*

Construction Site Storm Water Runoff Control:

- *Develop a storm water ordinance specifically for construction site runoff control.*
- *Require designers to include erosion control measures and approved BMP on plans and specifications in all projects and requiring compliance with the TPDES General Storm Water Permit as well as all other local and State regulations.*
- *Perform construction site inspection on erosion control measures.*
- *Educate Construction Site Operators on the importance of erosion control measures and BMP.*
- *Attend pre-construction conferences on private development projects within the City Limits.*

Post Construction Storm Water Management:

- *Develop a storm water ordinance for post-construction management.*
- *Perform plan review on proposed developments.*
- *Perform post-construction site inspections on erosion control measures.*
- *Encourage low impact designs on developments regarding storm water runoff.*

Pollution Prevention & Good Housekeeping for Municipal Operations:

- *Develop a storm sewer & drainage way maintenance program.*
- *Develop standard operating procedure for the disposal of waste.*
- *Provide employee training to prevent and reduce storm water pollution from municipal activities.*
- *Implement storm water pollution prevention guidelines to be used in everyday municipal activities.*
- *Provide an annual street sweeping program.*

The six (6) required MCMs along with each BMP and BMP goal is in Appendix A.

3.03 Public Review

The City of Nolanville's Storm Water Management Plan will be available for public review in accordance with the TPDES General Permit TXR040000 at City Hall located at 100 North Main Street; Nolanville, TX 76559.

3.04 Record Keeping

As required by the TPDES General Permit TXR040000 the City of Nolanville will retain a copy of all records, a copy of this TPDES general permit and records of all data used to complete the application (NOI) for this general permit and make this information available to the public if requested to do so in writing.

3.05 Reporting

The City of Nolanville will submit a concise annual report to TCEQ within 90 days of the end of each permit year. The first permit year for annual reporting will begin on the date of the permit issuance. The annual report will address the previous permit year and will include the following:

- Status of compliance with the permit conditions;
- Assessment of the appropriateness of the identified BMPs;
- Progress towards achieving the statutory goal of reducing the discharge of pollutants to the MEP;
- The measurable goals of the MCMs;
- Evaluation of the success of the implementation of the measurable goals;

Other areas the annual report will address are:

- Status of any additional control measures implemented by the City, if applicable;
- Any MCM activities initiated before the permit issuance may be included;
- Summary of the results of information, including monitoring data, collected and analyzed, if any;
- Summary of the storm water activities the City operator plans to undertake during the next reporting cycle;
- The number of municipal construction activities authorized under this general permit and the total number of acres disturbed;
- The number of non-municipal construction activities that occurred within the jurisdiction of the City;
- Notice that the City operator is relying on another government entity to satisfy some of its permit obligations, if applicable.

APPENDIX A

PUBLIC EDUCATION AND OUTREACH ON STORM WATER IMPACTS

BMP	BMP Description	Measurable Goals	Public/Private Partner's	Target Date
1.1: Educate Residents	Develop & distribute materials to City of Nolanville Residents on lawn and garden management, proper handling of household hazardous waste, pet waste, littering, waste management and other storm water quality issues. Include alternatives to more toxic household items as well as coordinate with the Central Texas Council of Government on their annual Hazardous Waste Collection Day.	<ol style="list-style-type: none"> 1. Distribute public education materials regarding residential impacts on water quality. 2. Coordinate Annual Hazardous Waste Collection Day with Central Texas Council of Government 	Central Texas Council of Governments	2018
1.2: Educate Visitors to the Belton Area	Develop & distribute materials to visitors to the City on the importance of water quality and efforts being made by the City of Nolanville to bring awareness to water quality.	1. Distribute public education materials to visitors of the area detailing the importance of water quality and what the City of Nolanville is doing to promote the importance of water quality in the community.		2018
1.3: Educate Municipal Employees	Develop & implement policies to be utilized by City of Nolanville Employees that will promote best management practices.	<ol style="list-style-type: none"> 1. Implement policies that will promote best management practices to be utilized by City of Nolanville Employees. 2. Hold a workshop for employees in order to educate the importance of best management practices and water quality. 		2018

PUBLIC EDUCATION AND OUTREACH ON STORM WATER IMPACTS

BMP	BMP Description	Measurable Goals	Public/Private Partner's	Target Date
1.4: Educate Commercial & Industrial Facilities	Develop & distribute BMP literature detailing the importance of water quality focusing primarily on industrial, commercial and automotive businesses. Develop recognition program to business that promote and implement BMPs.	1. Distribute literature to businesses that educate the importance of BMPs focusing on industrial, commercial and automotive business. 2. Develop of recognition program that rewards businesses who lead by example in water quality efforts.		2018
1.5: Educate Local Businesses	Develop & distribute BMP literature detailing the importance of water quality to local businesses.	1. Distribute literature to businesses emphasizing the importance of BMPs for local business'. 2. Develop a recognition program that rewards businesses who lead by example in water quality efforts.		2018
1.6: Educate New Developers/Home Builders	Develop & distribute BMP literature detailing the importance of water quality to area developers and home builders. Evaluate and modify design standards and construction notes to require stricter BMPs during construction of new developments, redevelopments, new homes and home improvements.	1. Distribute literature to developers and home builders through the Central Texas Home Builders Association Newsletter that educate the importance of BMPs on construction sites. 2. Evaluate and modify design standards and construction notes that promote better BMPs.		2017
1.7: Educate Future Leaders	Develop & distribute BMP literature detailing the importance of water quality for local elementary school students attending school within Nolanville City Limit's.	1. Distribute literature, pencils and other materials promoting the importance of water quality 2. Promote an Art Contest promoting BMPs and water quality among students.	Killeen Independent School District	2018

PUBLIC INVOLVEMENT AND PARTICIPATION

BMP	BMP Description	Measurable Goals	Public/Private Partner's	Target Date
2.1: Public Notice in Development of SWMP	Comply with all federal, state and local public notice requirements when implementing the SWMP	<ol style="list-style-type: none"> 1. Make the SWMP available for review and comments on the city website 2. Make presentation to city council 		2016
2.2: Storm Water Ordinance	Hold public hearings regarding the development of a Storm Water Ordinance. Public comments will be incorporated in the finalization of the ordinance if applicable.	<ol style="list-style-type: none"> 1. Develop a draft ordinance. 2. Hold public hearings on ordinance and incorporate public hearing comments into ordinance if applicable. 3. Implement ordinance. 		2018
2.3: Illegal Dumping Website Notification	Provide an illegal dumping notification link on the City of Nolanville's website where citizens can report illegal dumping.	<ol style="list-style-type: none"> 1. Develop an illegal dumping notification link. 		2018
2.4: Adopt-A-Stream Program	Promote an Adopt-A-Stream Program for area streams.	<ol style="list-style-type: none"> 1. Develop an Adopt-A-Stream program and promote community involvement. 	Killeen Independent School District	2020

ILLCIT DISCHARGE DETECTION AND ELIMINATION

BMP	BMP Description	Measurable Goals	Public/Private Partner's	Target Date
<p>3.1: Storm Water Ordinance for Illicit Discharges</p>	<p>Develop a storm water ordinance that prohibits non-storm water discharges into the storm sewer system and implement enforcement procedures and actions.</p>	<ol style="list-style-type: none"> 1. Develop a draft ordinance. 2. Hold public hearings on ordinance and incorporate public hearing comments into ordinance if applicable. 3. Implement ordinance. 		2019
<p>3.2: Illicit Discharge Awareness Campaign</p>	<p>Develop & distribute training materials in order to educate municipal employees, county employees, businesses, school district, university and the general public on the hazards associated with illicit discharges and improper disposal of waste.</p>	<ol style="list-style-type: none"> 1. Develop training materials that detail the hazards associated with illicit discharges and improper disposal of waste. 2. Hold a workshop for municipal employees and distribute training materials to other entities within the City, local businesses and the general public. 	<p>Central Texas Council of Government, Bell County, Central Texas Home Builders Association, Killeen Independent School District</p>	2018
<p>3.3: Illicit Discharge Detection Program</p>	<p>Develop a program that will allow the reporting of illicit discharges into the storm sewer system and put in place a plan for investigating the illicit discharge report.</p>	<ol style="list-style-type: none"> 1. Set up a website notification link for the public to report the possibility of an illicit discharge into the storm sewer system is occurring. 2. Implement a plan of action for responding to a complaint about illicit discharges. 		2018
<p>3.4: Storm Sewer Mapping</p>	<p>Create a map of the locations of all the outfalls of the existing storm sewer system and the names of the waters of the US receiving the storm water discharges.</p>	<ol style="list-style-type: none"> 1. Create a map and include the map in the City's GIS system. 2. Develop a plan for updating the map as new development occurs. 		2018-2020

CONSTRUCTION SITE STORM WATER RUNOFF CONTROL

BMP	BMP Description	Measurable Goals	Public/Private Partner's	Target Date
<p>4.1: Storm Water Ordinance for Construction Site Runoff Control</p>	<p>Develop a storm water ordinance that outlines the necessary requirements for Construction Site Operators to comply with permit requirements for Construction Site Storm Water Runoff Control</p>	<ol style="list-style-type: none"> 1. Develop a draft ordinance. 2. Hold public hearings on ordinance and incorporate public hearing comments into ordinance if applicable. 3. Implement ordinance. 	<p>Central Texas Home Builders Association</p>	<p>2018</p>
<p>4.2: Plan Review</p>	<p>Continue to require designers to include erosion control measures and approved BMPs on plans and specifications in all projects and requiring compliance with the TPDES General Storm Water Permit as well as all other local and State regulations.</p>	<ol style="list-style-type: none"> 1. Continue to require erosion control plans and BMP details on construction plan submittals. 		<p>2016-2020</p>
<p>4.3: Site Inspection</p>	<p>Develop procedures for construction site inspection and enforcement of non-compliant erosion control measures to be incorporated into the existing site inspection program.</p>	<ol style="list-style-type: none"> 1. Develop a workshop for applicable employees to attend detailing an inspection program for erosion control measures/BMPs. 2. Develop a erosion control checklist to be utilized by an Inspector & Construction Site Operator. 3. Document any violations and provide follow-up inspections of permit provisions. 	<p>Central Texas Home Builders Association</p>	<p>2018</p>
<p>4.4: Reporting Link on Website</p>	<p>Develop a reporting link on the City's Website for construction site erosion control and BMP violations.</p>	<ol style="list-style-type: none"> 1. Setup a website reporting link for reporting violations 2. Develop a plan of action for responding to violations. 	<p>Central Texas Home Builders Association</p>	<p>2018</p>

CONSTRUCTION SITE STORM WATER RUNOFF CONTROL

<p>4.5: Construction Site Operator Education</p>	<p>Develop educational materials and workshop that can be hosted by the City to educate the Construction Site Operator on the importance of erosion control measures and BMPs and the consequences for not complying with the regulations set forth by the permit.</p>	<p>1. Develop educational materials geared to Construction Site Operators 2. Coordinate and conduct workshop for Construction Site Operators</p>	<p>Central Texas Home Builders Association</p>	<p>2018</p>
<p>4.6: Pre-Construction Conference Attendance</p>	<p>Attend pre-construction conferences on development projects within the City Limits to educate what the City expects and will be inspecting regarding BMPs, Storm Water Pollution Prevention Plan and erosion control methods</p>	<p>1. Coordinate with local Developer's and other area entities to be included in the pre-construction conference 2. Develop a checklist to be distributed at the pre-construction conference detailing areas of inspection regarding BMPs and erosion control methods and what is expected on the SWPPP</p>	<p>Central Texas Home Builders Association</p>	<p>2018</p>

POST-CONSTRUCTION STORM WATER MANAGEMENT IN NEW DEVELOPMENT AND REDEVELOPMENT

BMP	BMP Description	Measurable Goals	Public/Private Partner's	Target Date
5.1: Storm Water Post-Construction Management Ordinance	Develop a storm water ordinance that outlines the necessary requirements for Post-Construction Management in new and redevelopment projects.	<ol style="list-style-type: none"> 1. Develop a draft ordinance. 2. Hold public hearings on ordinance and incorporate public hearing comments into ordinance if applicable. 	Central Texas Home Builders Association	2018
5.2: Development Plan Review	Continue to review all development plans for compliance with drainage design, floodplain requirements and use of detention ponds.	<ol style="list-style-type: none"> 1. Review all development plans for compliance. 		2016-2020
5.3: Post-Site Inspection	Develop procedures for post-construction site inspection and enforcement of controls of erosion control measures to be incorporated into the existing site inspection program.	<ol style="list-style-type: none"> 1. Develop a workshop for applicable employees to attend detailing an inspection program for erosion control measures/BMPs. 2. Develop a erosion control checklist to be utilized by an Inspector & Construction Site Operator. 3. Document any violations and provide follow-up inspections ensuring enforcement of permit provisions. 		2018
5.4: Encourage Low Impact/Green Designs	Promote low impact storm water designs.	<ol style="list-style-type: none"> 1. Review and modify existing design criteria to encourage low impact storm water designs. 	Central Texas Home Builders Association	2016-2020

POLLUTION PREVENTION/GOOD HOUSEKEEPING FOR MUNICIPAL OPERATIONS

BMP	BMP Description	Measurable Goals	Public/Private Partner's	Target Date
6.1: Storm Sewer & Drainage Way Maintenance Program	Conduct maintenance along inlets, ditches, pipes and drainage channels for structural and other improvements when noted through citizen complaints and through field observations.	1. Respond to citizen complaints and field observations. 2. Record storm sewer and drainage way maintenance.		2019
6.2: Disposal of Waste Removed from the MS4	Develop a standard operating procedure for the disposal of waste removed from the MS4, including dredged soil, accumulated sediments and floatable.	1. Develop and implement a standard operating procedure for waste disposal		2020
6.3: MS4 Employee Training	Develop and provide employee training to prevent and reduce storm water pollution from activities such as park maintenance, fleet and building maintenance, new construction, land disturbance and storm water system management.	1. Develop materials to promote the reduction and prevention of storm water pollution from municipal activities for employees. 2. Set up workshop to educate employees on the importance of storm water pollution prevention.		2018
6.4: Storm Water Pollution Prevention Guidelines for all MS4 Activities	Develop and implement storm water pollution prevention guidelines and operating procedures to be used in everyday MS4 activities such as waste disposal, fleet and building maintenance, vehicle and equipment washing, outdoor storage and other activities.	1. Develop SWPPP guidelines for each MS4 activity and implement BMPs for each. 1. Develop oversight procedures to ensure MS4 hired contractors adhere to the MS4's SWPPP guidelines and operating procedures.		2018

POLLUTION PREVENTION/GOOD HOUSEKEEPING FOR MUNICIPAL OPERATIONS

<p>6.5: Evaluation of O&M Activities at MS4 Owned Facilities</p>	<p>Develop an evaluation for the potential discharge of pollutants in stormwater as a result of operation and maintenance activities at MS4 owned facilities, such as, roadways, parking lots, bridges, right-of-way maintenance, etc...</p>	<p>1. MS4 identifies potential pollutants of concern that could be discharged from O&M activities. 2. MS4 develops and implements pollution prevention measures that will reduce discharge of pollutants from O&M activities. 3. MS4 inspects pollution prevention measures at MS4 facilities.</p>	<p>2019</p>
<p>6.6: Floodway Management</p>	<p>Promote the protection and preservation of buffer areas around natural floodways.</p>	<p>1. Identify buffer areas to promote vegetation and install signs that define the management area. 2. Identify future areas suitable for promotion of vegetation as the city continues to develop</p>	<p>2018</p>
<p>6.7: MS4 Facilities and Stormwater Controls</p>	<p>Develop and maintain an inventory of MS4 and stormwater facilities within the City of Nolanville.</p>	<p>1. Prepare a database or worksheet that identifies the location of MS4 and stormwater facilities. Identify the location by address and GPS Coordinates. 2. MS4 performs inspections, maintenance and repairs to existing structural controls.</p>	<p>2016</p>