Stormwater Pollution Prevention Plan

Plan Overview

• Pollution Prevention Team
• Description of Potential Pollutants and Sources
  » Inventory of Exposed Materials
  » Drainage Area Site Map
• Pollution Prevention Measures and Controls
  » BMPs
  » Good Housekeeping, Erosion Control, etc.
  » Employee Training
• Inspections and Monitoring
Why Conduct Inspections?

- Identify changes
- Evaluate pollution control measures
  - Best management practices (BMPs)
  - Housekeeping
  - Structural controls
- Improve practices
  - New BMPs
  - Train personnel
Permit-Required Inspections and Monitoring

- Non-Stormwater Discharge Inspections
- Routine Facility Inspections
- Quarterly Visual Monitoring
- Water Quality Monitoring
  - Pollutant(s) of Concern to Impaired Water Bodies
  - Numeric Effluent Limitations
  - Benchmark Monitoring
- Annual Comprehensive Site Compliance Inspection
Non-Stormwater Discharges

• Allowable Non-SW Discharges
  » Water other than storm water that is okay to discharge to the ground surface
  » Identify and list in the SWP3
    – Fire hydrant flushings, emergency fire water
    – Lawn watering and irrigation
    – Uncontaminated dust suppression water
    – Uncontaminated groundwater
    – Potable water, etc.

• Non-permitted, Non-SW Discharges are not allowed
  » Illicit connections
Water Discharges – Allowed or Not?
Non-Stormwater Discharge Inspections

- Survey the plant to identify Non-SW sources
- Evaluate storm sewer system, outfalls, conveyances
- Identify any Non-SW sources
  - Determine if allowable or non-permitted
  - Eliminate sources that are non-permitted
- Complete inspection within 180 days of filing NOI
Documentation and Certification of Non-SW Discharges

- **Document inspection**
  - Date of evaluation
  - Outfalls or discharge points observed
  - Types of Non-SW discharges observed and sources
  - Results of testing, if done, on storm sewers
  - Portions of storm sewer observed

- **Certify inspection**
  - Signatory must sign inspection form
ATTACHMENT 2
NON-STORMWATER DISCHARGE CERTIFICATION

An inspection of the facility for non-stormwater discharges must be made within 180 days following submittal of the NOI in accordance with the procedures described in Section 3 of the SWP3. The investigation must include visual inspection of the facility stormwater drainage areas for indications of dry weather flow(s) and include the inspection of all facility stormwater drain inlets, drainage ditches and swales, building roof drain outlets, outdoor surfaces, and all stormwater outfalls at the property line. This table documents and certifies the findings of that inspection.

<table>
<thead>
<tr>
<th>Date of Assessment:</th>
<th>Person(s) Performing Assessment:</th>
</tr>
</thead>
</table>

<table>
<thead>
<tr>
<th>Outfalls and Discharge Points Directly Observed During the Test</th>
<th>Method Used to Test or Evaluate Discharge</th>
<th>Describe Results from Test for the Presence of Non-Stormwater Discharge</th>
<th>Identify Potential Sources</th>
</tr>
</thead>
<tbody>
<tr>
<td>Outfall 001</td>
<td>Visual Observation</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Outfall 002</td>
<td>Visual Observation</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

(complete the appropriate certification statement below)

CERTIFICATION OF NO NON-ALLOWABLE DISCHARGES

I, certify that the facility’s stormwater system has been evaluated for the presence of non-stormwater discharges and that the discharge of non-permitted, non-stormwater does not occur.

Name & Official Title (type or print)  Telephone No.
______________________________________  ___________________________

Signature  Date Signed
______________________________________  ________________

[Permitted discharges are those that consist solely of stormwater or allowable non-stormwater discharges (see Section 3.1.1). All other water discharges would be considered non-permitted, non-stormwater.]
Periodic Inspections

Conduct periodic inspections to determine effectiveness of:

» Best management practices (BMPs);
» Good housekeeping;
» Erosion and sediment controls;
» Structural controls;
» Spill prevention and response; and
» Employee training.

- Perform at least quarterly
- One inspection conducted when discharge is occurring
- Inspector(s) must be on Pollution Prevention Team (PPT) and familiar with facility activities
Common Inspection Items

Site Walk Observations

• Exposed materials/pollution sources
  » Materials covered or contained
  » New drums or materials outside the building
  » New waste storage containers (dumpsters) or areas
  » New pollutants

• BMPs
  » Dumpsters covered and plugged
  » Compactor hydraulics intact and not leaking
  » Secondary containment valves closed, with no signs of staining
  » Drip pans in place and empty
  » Drums/totes securely closed and clean
Common Inspection Issues

Site Walk Observations

• Good Housekeeping
  » Debris cleaned up and not collecting on fences, drains, etc.
  » Drums/totes neatly stacked, on pallets or containment

• Spill Prevention and Control
  » Spill kits present and stocked
  » Signs of spills or leaks, staining on pavement, grassy areas

• Erosion and Sediment Controls
  » Signs of erosion at outfalls, ponds
Periodic Inspections Documentation

• Checklist that includes each control and measure to be evaluated:
  » Date and time
  » Inspector’s name
  » Weather information, description of discharges occurring
  » Previously unidentified discharge of pollutants from the site
  » Control measures – identify those needing repair or replacement
  » Incidents of non-compliance
  » BMPs not properly or completely implemented
  » Additional control measures needed
Periodic Inspections Documentation

- Checklist must be signed
- Summarize of proposed changes/corrective actions
  - Include time frames for changes
  - Maintain with inspection checklist
- Maintain documentation with the SWP3
**Example Checklist**

<table>
<thead>
<tr>
<th>Inspection Date</th>
<th>Time</th>
<th>Inspector’s Name</th>
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<tbody>
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</table>

**Areas of Industrial Activity**

<table>
<thead>
<tr>
<th>Area Inspected</th>
<th>Inspection Items</th>
<th>Corrective Action Needed?</th>
<th>Problem Description</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Yes</td>
<td>No</td>
</tr>
</tbody>
</table>

1. **Trash and Debris:**
   - Trash and debris needs to be removed from inlet grate over dock storm water trench drain.

2. **Oil Staining:**
   - Oil staining present at used oil drum. Clean oil stain using dry methods and provide better funnel to prevent future spills.

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- **Oil drum:**
  - Clean oil stain using dry methods and provide better funnel to prevent future spills.
<table>
<thead>
<tr>
<th>Area Inspected</th>
<th>Inspection Items</th>
<th>Corrective Action Needed?</th>
<th>Yes</th>
<th>No</th>
<th>Problem Description</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Storm Water Structural Controls</strong></td>
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<tr>
<td>Concrete Curbing and Drainage Swales</td>
<td>• Confirm that curbing is in good condition.</td>
<td>□ □</td>
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<tr>
<td>Trench Drain at McBride Lane</td>
<td>• Confirm that no erosion is occurring at ends or low spots of curb.</td>
<td>□ □</td>
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<tr>
<td><strong>Storm Water Outfalls</strong></td>
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<tr>
<td>Outfall 001</td>
<td>• Confirm that no signs of material from the site that could be transported offsite by storm water are present.</td>
<td>□ □</td>
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<tr>
<td>Outfall 002</td>
<td>• Confirm that no materials from the site are present in the driveway or at City storm sewer inlet.</td>
<td>□ □</td>
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<tr>
<td>Outfall 005</td>
<td>• Confirm that no signs of material from the site that could be transported offsite by storm water are present.</td>
<td>□ □</td>
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<tr>
<td>Outfall 006</td>
<td>• Confirm that the area immediately downstream of the trench drain outlet isn’t eroded and there are no materials from the site.</td>
<td>□ □</td>
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<tr>
<td>Outfall 007</td>
<td>• Confirm that no signs of material from the site that could be transported offsite by storm water are present.</td>
<td>□ □</td>
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<tr>
<td>Outfall 008</td>
<td>• Confirm that no materials from the site are present in storm sewer at final driveway inlet.</td>
<td>□ □</td>
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<tr>
<td>Outfall 009</td>
<td>• Confirm that no signs of material from the site that could be transported offsite by storm water are present.</td>
<td>□ □</td>
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<tr>
<td>Outfall 010</td>
<td>• Confirm that no materials from the site are present in the roadway curb and gutter.</td>
<td>□ □</td>
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</tbody>
</table>
Trash and debris needs to be removed from inlet grate over dock storm water trench drain at Bakery. Oil staining present at used oil drum in Bakery. Clean oil stain using dry methods and provide better funnel to prevent future spills.

Corrective actions needed

Signatory Note: This must be an authorized representative of the company as defined in the regulations.
# Corrective Action, Maintenance, and Repair Log

<table>
<thead>
<tr>
<th>Inspection Item #</th>
<th>Type</th>
<th>Date Need Identified</th>
<th>Performed as Part of Normal Maintenance Schedule?</th>
<th>Description of Maintenance or Repair</th>
<th>Completion Date</th>
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</tbody>
</table>

1. Enter “C” if a corrective action is required, “M” for maintenance, “R” for repair.
2. If an extended schedule is required to complete, number and provide justification for extended schedule below.

<table>
<thead>
<tr>
<th>Inspection Item #</th>
<th>Justification for Extended Schedule Items</th>
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</thead>
<tbody>
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</tbody>
</table>

Are revisions or additions to the SWP3 recommended as a result of the inspection? Yes ☐ No ☐
If Yes, describe below and provide time frame for completion.

<table>
<thead>
<tr>
<th>Recommended Revision or Addition</th>
<th>Completion Date</th>
</tr>
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<tbody>
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</tbody>
</table>
Best Management Practices
Housekeeping Issues
Housekeeping Issues

Good Housekeeping

Not-So-Good
Sediment and Erosion Control
Structural Controls
Annual Comprehensive Site Compliance Inspection Overview

Assessment of the Effectiveness of the SWP3

- Conducted annually
- Qualified employee(s), one must be on PPT
  » Best to use a team approach
- May replace one of the periodic inspections
- Prepare a report
- Revise the SWP3
Annual Comprehensive Site Compliance Inspection Requirements

• Examine and assess areas of the plant:
  » All areas identified in the Inventory of Exposed Materials;
  » All structural controls, including maintenance and effectiveness;
  » All BMPs, housekeeping, erosion controls;
  » Areas where spills and leaks have occurred, including from industrial equipment, drums, tanks, etc.;
  » Areas downstream of outfalls;
  » Off-site tracking of materials or sediment

• Review analytical monitoring and employee training
• Review site map
• Verify PPT members are current
Annual Comprehensive Site Compliance Inspection Report

• Prepare report within 30 days of performing the inspection

• Document:
  » Name and title of inspector
  » Date of inspection
  » Findings from inspection and observations of control measures
  » Revisions to the SWP3 as a result of the inspection
  » Incidents of non-compliance

• Sign and certify report
ATTACHMENT 10

ANNUAL COMPREHENSIVE SITE COMPLIANCE INSPECTION REPORT

This Annual Comprehensive Site Compliance Inspection is an inspection of the entire facility and is an overall assessment of the effectiveness of the current SWP3. The names of the qualified personnel participating in this inspection are listed below (at least one person on the inspection team must be a member of the PPT). An asterisk denotes the individual(s) responsible for completing the Annual Comprehensive Site Compliance Inspection Report.

Date of Inspection: __________________________

<table>
<thead>
<tr>
<th>Inspector's Name</th>
<th>Inspectors Department/Affiliation</th>
<th>PPT Member? (Y/N)</th>
</tr>
</thead>
<tbody>
<tr>
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</tbody>
</table>

1. Inspect all areas identified in the Inventory of Exposed Materials listed in the SWP3. A narrative discussion regarding any incidences of non-compliance is provided below. (Provide attachments if additional space is necessary.)

2. Inspect all non-structural controls including BMP effectiveness, and whether good housekeeping measures and scheduling were performed. A narrative discussion regarding any incidences of non-compliance is provided below. (Provide attachments if additional space is necessary.)

3. Inspect all areas where spills and leaks have occurred in the past 3 years for evidence of staining or improper cleanup. A narrative discussion regarding any incidences of non-compliance is provided below. (Provide attachments if additional space is necessary.)

4. Inspect all reasonably accessible areas immediately downstream of each stormwater outfall authorized under the MS4P. A narrative discussion regarding any incidences of non-compliance is provided below. (Provide attachments if additional space is necessary.)

5. Inspect all areas where industrial materials, residue, or trash may have or could come into contact with stormwater. A narrative discussion regarding any incidences of non-compliance is provided below. (Provide attachments if additional space is necessary.)
Incidents of Non-Compliance

Any instance where an element of the SWP3 is either not implemented, or where specific conditions of the permit are not met

- If none noted, provide certification
- If yes, complete corrective actions to bring the facility into compliance within 12 weeks following the date of the inspection.

WERE INCIDENCES OF NON-COMPLIANCE IDENTIFIED?  No □  Yes □

Note: For the purposes of this inspection, the MSGP defines an incident of non-compliance as any instance where an element of the SWP3 is either not implemented, or where specific conditions of the permit are not met.

If “No”, then provide a certification that the facility is in compliance with the SWP3.

If “Yes”, then necessary actions to bring the facility into compliance must be taken as soon as practicable, but no later than 12 weeks following the date of the inspection. When compliance is achieved, complete the certification provided below.

<table>
<thead>
<tr>
<th>Inspection Item #</th>
<th>Non-Compliance</th>
<th>Description of Necessary Corrective Action</th>
<th>Completion Date</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Compliance Certification:

I hereby certify under penalty of law that I have examined the Stormwater Pollution Prevention Plan (SWP3) Annual Comprehensive Site Compliance Inspection Report and being familiar with the requirements of the Texas Pollution Discharge Elimination System (TPDES) general stormwater permit, do attest that System’s Implementation Plan is in compliance with the SWP3 and the TPDES General Permit. Based upon my inquiry of the person or persons preparing the report, conducting the inspections, and gathering the information, the information included in the report 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.

Signature 1

Name

Official Title

Date

1. Must be signed in accordance with signatory requirements of 30 TAC 305.128 (see Appendix D).
Revise the SWP3

• Within 12 weeks following the completion of the report
• Include and address the findings of the report
• Include all changes resulting from inspection and other updates:
  » Controls, structural or BMPs, to be added or modified
  » Site map
  » Inventory of exposed materials
  » Description of good housekeeping measures
• Markup or edit the SWP3
SWP3 AMENDMENT LOG

A summary of SWP3 amendments is recorded on the table provided below.

<table>
<thead>
<tr>
<th>Revision Made</th>
<th>Page/Section Number</th>
<th>Date</th>
<th>Revised By</th>
</tr>
</thead>
<tbody>
<tr>
<td>Plan Preparation to meet requirements of 2001 MSGP</td>
<td>All</td>
<td>November 2001</td>
<td>Zephyr Environmental Corp.</td>
</tr>
<tr>
<td>Plan update to meet requirements of 2006 MSGP</td>
<td>All</td>
<td>2006</td>
<td>Zephyr Environmental Corp.</td>
</tr>
<tr>
<td>Plan update to meet current facility conditions</td>
<td>Various</td>
<td>December 2000</td>
<td>Zephyr Environmental Corp.</td>
</tr>
<tr>
<td>Plan update to meet requirements of 2011 MSGP</td>
<td>All</td>
<td>November 2011</td>
<td>Zephyr Environmental Corp.</td>
</tr>
<tr>
<td>Plan update to reflect 2010 Texas 303(d) list information</td>
<td>Section 5.9.4</td>
<td>February 2012</td>
<td>Zephyr Environmental Corp.</td>
</tr>
<tr>
<td>Updated to make minor corrections and revisions to Outfall descriptions</td>
<td>Sections 5-9, 5-10, Attachment 1, Figure 2, Attachment 8 for Outfall 002, 003, 004, 005, 006, 008, 009</td>
<td>July 2012</td>
<td>Zephyr Environmental Corp.</td>
</tr>
</tbody>
</table>

Record amendments to the SWP3 using the Amendment Log provided at the front of the SWP3.
Recordkeeping

- Retain inspection documentation for at least 3 years
- Maintain with SWP3 or Env. Files
- Procedures for performing inspections must be documented with SWP3
  » Identify person responsible for inspection
  » Schedule
  » Specific items to be covered
Inspection Tips and Tricks

• Use your Pollution Prevention Team
  » You should not be the only person conducting inspections
  » Different name/handwriting
  » Departmental people – they know who to contact

• Train as you go
  » What do you see?
  » Does it normally look this way?
  » Is it something to worry about?
Inspection Tips and Tricks

• Think before you write
  » Can this be handled with a phone call?
  » More complex? Contractor? PO? → Corrective Action
  » Regulators want to see there are items wrong that are fixed

• Take your signatory with you
  » Responsible for certifying all the reports
Inspection Tips and Tricks

• SWP3 is a living document
  » Mark it up
  » Use dates and initials

• Permit allows you to be flexible
  » Protect SW
  » Prove it’s working

• Don’t overthink it!
Frequent Findings

• Plans and reports aren’t signed
• No issues are noted on inspection reports
• Issues are noted and not corrected
  » No system for implementing corrective actions
• Plans are not current
  » Pollution prevention team
  » Site map
• Sector-specific requirements are not implemented
Thank You

Laura Huff
Laura.huff@powereng.com

Visit us at www.powereng.com