

STORM WATER POLLUTION PREVENTION PLAN

*Prepared for:
Jasper Gas and Water Department*

*Jasper, IN 47547
812-482-5252*

*Prepared by:
Chad D. Hurm
City Engineer*

May 20, 2010

Chad D. Hurm, P.E.
City Engineer

UNDERLYING ASSUMPTIONS AND CONTINGENT CONDITIONS

1. Employees who have signed this Pollution Prevention Plan, hereinafter referred to as Engineer, state that to the best of their knowledge and belief, the statements contained in this Pollution Prevention Plan, subject to the limiting conditions set forth below, are correct; also that this Pollution Prevention Plan has been made in conformity with accepted practices at the date this Pollution Prevention Plan was prepared.
2. This Pollution Prevention Plan is based on conditions and activities which existed at the subject facility at the time of the site visit. Any industrial or process activity changes after that time that do not correspond to this plan's operations are not the responsibility of Engineer.
3. This Pollution Prevention Plan is prepared only for the subject facility and applicable regulatory agencies, and no other. Nor may it be used for the purpose of anyone but the subject facility and applicable regulatory agencies, without the previous consent of Engineer, and in any event, only in its entirety.
4. Engineer assumes no responsibility for matters legal in character, and it assumes that the subject facility operations and property are under responsible management and in compliance with all local, state, and federal laws and regulations.
5. The plats, legal descriptions, maps, and other information furnished to us are assumed to be correct, as are the property line indicators found on the ground or pointed out by the owner or owner's representatives.
6. The maps or diagrams contained within this Pollution Prevention Plan are included to assist the reader in visualizing the facility and/or property. We have made no surveys and assume no responsibility in such matters.
7. Engineer believes to be correct and reliable the information identified in this Pollution Prevention Plan as being furnished by others, but we assume no responsibility for its accuracy.

TABLE OF CONTENTS

<u>SECTION</u>	<u>PAGE #</u>
1.0 SITE ASSESSMENT INSPECTION	1
1.1. EVALUATION OF SITE FOR POLLUTANTS	1
1.2. EXISTING MANAGEMENT PRACTICES	1
2.0. SUMMARY OF POTENTIAL POLLUTANT SOURCES	2
3.0. DESCRIPTION OF STORM WATER MANAGEMENT MEASURES TO BE IMPLEMENTED BASED ON SITE ASSESSMENT	2
4.0. STORM WATER TESTING	2
5.0. STATE REPORTING REQUIREMENTS	3
6.0. EMPLOYEE TRAINING PROGRAM	3
6.1. WHO	3
6.2. WHEN	3
6.3. TOPICS	4
7.0. WORKSHEETS	ATTACHED
WORKSHEET #1 POLLUTION PREVENTION TEAM	
WORKSHEET #2 DEVELOPING A SITE MAP	
WORKSHEET #3 MATERIAL INVENTORY	
WORKSHEET #3A DESCRIPTION OF EXPOSED SIGNIFICANT MATERIAL	
WORKSHEET #4 LIST OF SIGNIFICANT SPILLS AND LEAKS	
WORKSHEET #5 NON-STORM WATER DISCHARGE ASSESSMENT AND CERTIFICATION	
WORKSHEET #6 NON-STORM WATER DISCHARGE ASSESSMENT AND FAILURE TO CERTIFY NOTIFICATION	
WORKSHEET #7 POLLUTANT SOURCE IDENTIFICATION	
WORKSHEET #7A BMP IDENTIFICATION	
WORKSHEET #8 IMPLEMENTATION	
WORKSHEET #9 EMPLOYEE TRAINING	

JASPER GAS AND WATER DEPARTMENT

1.0 SITE ASSESSMENT INSPECTION

The site assessment inspection was performed by Chad D. Hurm, P.E., City Engineer, and Chad Mundy, Storm Water Coordinator for the City of Jasper, Indiana, on May 20, 2010.

1.1. Evaluation of Site for Pollutants:

There are very few areas on the site which could contribute to the pollution of storm water. Most of the industrial activities are inside the facility. There are aggregate storage bins, salt storage bins, fuel tanks, asphalt patching material, de-icing material, and scrap metal stored outside.

Chad D. Hurm, P.E., City Engineer and Chad Mundy, Storm Water Coordinator, for the City of Jasper, Indiana, conducted a visual site reconnaissance on May 20, 2010. The purpose of this site reconnaissance was to evaluate the surface runoff patterns, identify point source discharges as well as identify potential storm water pollutants. Four point source outfalls, as defined in 40 CFR 122.26, were identified. Outfall 001 is located on the northwest end of the site near the pump house, Outfall 002 is located on the west side of the site near the clearwell building, Outfall 003 is located at the southwest side of the property near the chemical building and Outfall 004 is located on the south side of the property. All four outfalls discharge into unnamed tributaries of the Patoka River. At the time of the site visit Outfall 001 was flowing, this was due to moving screen at the water intake.

During the site reconnaissance, the City of Jasper Stormwater Department evaluated the potentials for activities which were contributing to non-storm runoff. The only areas which could potentially contribute to non-storm water runoff would be the areas around the aggregate/sand bins and fuel tanks.

1.2. Existing Management Practices:

- Sand, Gravel, and Stone Piles – The sand, gravel and stone is kept in aggregate stockpiles, with concrete walls on three sides until it is needed.
- Storage Tanks and Barrels – The above ground diesel and gasoline tanks are kept in secondary containment tanks which would contain spills and leaks. Care is taken when using the tanks not to spill material in the ground.
- Waste Oil Tank - The waste oil tank is stored inside and the area around the tank is kept clean.

2.0 SUMMARY OF POTENTIAL POLLUTANT SOURCES

Based on the site assessment inspection, the following potential sources of pollutants were identified:

- Sand and Gravel Piles – Potential that deposition of sediments from these areas could disrupt drainage of storm water as well as impact storm water quality. Since these are natural material, their potential for contamination is limited to solids.
- Pipe and Pipe Fittings – Since these are solid material their potential for contamination is limited to corrosion.
- Fuel - Tanks may leak or fuel may be spilled and storm water could potentially pick up the fuel and discharge from the site.

3.0 DESCRIPTION OF STORM WATER MANAGEMENT MEASURES TO BE IMPLEMENTED BASED ON SITE ASSESSMENT

The facility is presently using Best Management Practices (BMPs) in addressing the majority of the potential pollution sources as was described in the existing management practices. The facility will continue to use these practices in the future. In addition, the facility will implement a training program to make sure the existing BMPs as well as the additional BMPs (added as part of this plan) are followed. Attendance sheets for these training sessions will be maintained as attachments at the end of this manual. The facility will hold monthly inspections of all areas that were listed as potential storm water pollutant sources. These inspection sheets will be kept as attachments at the end of this manual.

4.0 STORM WATER TESTING

This facility does not have to sample at this time. Changes to the plan will be made as deemed necessary.

5.0 STATE REPORTING REQUIREMENTS

The State is only requiring that visual inspections be made and these observations be included in the yearly report. The Storm Water Pollution Prevention Plan is to be kept up to date and located at the facility.

6.0 EMPLOYEE TRAINING PROGRAM

6.1 Who:

All employees

6.2. When:

At least one meeting a year will be held to discuss storm water pollution prevention. Additional meetings will be held if the Pollution Prevention Team deems necessary. These topics will be presented to all new employees when they begin work. Attendance sheets for these training sessions will be maintained as attachments located at the end of this manual.

6.3 Topics:

Good Housekeeping

- Review and demonstrate basic clean-up (sweeping and vacuuming) procedures.
- Clearly indicate proper disposal locations.
- Be sure employees know where routine clean-up equipment is located.

Spill Prevention and Response

- Discuss proper spill clean-up procedures.

Materials Handling and Storage

- Be sure employees are aware which materials are hazardous and where those materials are stored.
- Point out container labels.
- Go over proper handling of machinery and equipment.

Inspections

If any employee sees any of the following, it should be reported to the supervisor immediately:

- Clogged storm ditches, storm drains, or storm grates.
- Trash or clutter outside.
- Any equipment not functioning properly.

JASPER GAS AND WATER DEPARTMENT

**STORM WATER MANAGEMENT
MONTHLY INSPECTION**

Inspected by: _____

Date: _____

Time: _____

ROCK, SAND AND AGGREGATE STORAGE AREA

YES NO Does there appear to be any material or debris in the area?

PIPE STORAGE AREAS

YES NO Does there appear to be any debris leaving the concrete pad?

PIPE FITTINGS STORAGE AREAS

YES NO Does there appear to be any material leaving the area?

STORM DRAINS

YES NO Are there any blockages in the drains that could inhibit the flow of storm water?

GENERAL SITE CONDITION

YES NO Is there any trash or debris lying around?

YES NO Is there anything out of place?

COMMENTS:

If any problems were spotted in the inspection, discuss the measures used to correct them.

POLLUTION PREVENTION TEAM

Worksheet #1

Completed by: Chad D. Hurm

Title: City Engineer

Date: _____

MEMBER ROSTER

Leader: Mike Oeding

Title: Gas and Water Superintendent

Office Phone: 482-5252

Responsibilities: Coordinate plan development and implementation; coordinate employee training program; keep all records and ensure reports are submitted.

Members:

(1) Ernie Hinkle

Title: Gas and Water Distribution Foreman

Office Phone: 482-5252

Responsibilities: Note any process changes; help conduct inspections; oversee "good housekeeping" and preventive maintenance.

(2) Tim Dorsam

Title: Water Foreman

Office Phone: 482-2010

Responsibilities: Note any process changes; help conduct inspections; oversee "good housekeeping" and preventive maintenance.

(3) Brad Thomas

Title: Easement Locate Coordinator

Office Phone: 482-5252

Responsibilities: Note any process changes; help conduct inspections; oversee "good housekeeping" and preventive maintenance.

(4) _____

Title: _____

Office Phone: _____

Responsibilities: Note any process changes; help conduct inspections; oversee "good housekeeping" and preventive maintenance.

DEVELOPING A SITE MAP

Worksheet #2

Completed by: Chad D. Hurm

Title: City Engineer

Date:

Instructions: Draw a map of your site including a footprint of all buildings, structures, paved areas, and parking lots. Check off below that the additional items required by EPA's General Permit have been included.

All outfalls and storm water discharges

Drainage areas of each storm water outfall

Structural storm water pollution control measures, such as:

- Flow diversion structures
- Retention/detention ponds
- Sediment traps

Name of receiving waters

Locations of exposed significant materials

NONE Locations of past spills and leaks

Locations of high-risk, waste-generating areas and activities such as:

- Fueling stations
- Vehicle/equipment washing and maintenance areas
- Area for unloading/loading materials
- Above-ground tanks for liquid storage
- Industrial waste management areas (landfills, waste piles, disposal areas)
- Outside storage areas for raw materials, by-products, and finished products
- Other areas of concern (specify: _____)

MATERIAL INVENTORY

Worksheet #3

Completed by: Chad D. Hurm

Title: City Engineer

Date:

Instructions: List all materials used, stored, or produced onsite. Assess and evaluate these materials for their potential to contribute pollutants to storm water runoff. Also complete Worksheet 3A if the material has been exposed during the last three years.

Material	Purpose/Location	Quantity (units)			Quantity Exposed in Last 3 Years	Likelihood of contact with storm water. If yes, describe reason.	Past Significant Spill or Leak	
		Used	Produced	Stored			Yes	No
Sand	Subgrade/Backfill Storage Bins			23 Ton	75 tons	Yes, Stored in exposed, contained piles		X
#11 Limestone	Subgrade/Backfill Storage Bins			25 Ton	75 tons	Yes, Stored in exposed, contained piles		X
#83/73 Limestone	Subgrade/Backfill Storage Bins			25 Ton	75 tons	Yes, Stored in exposed, contained piles		X
Diesel Fuel	Vehicle Fuel Fuel Storage			500 gal	1500 gallons	No, Stored in fuel tanks within secondary containment		X
Gasoline	Vehicle Fuel Fuel Storage			500 gal	1500 gallons	No, Stored in fuel tanks within secondary containment		X
Misc. Fittings	Water and Gas line installation			100 pcs.	300 pcs	Yes, Stored in exposed areas		X
Pipe	Water and Gas line installation			200 lf	600 lf	Yes, Stored in exposed areas		X

DESCRIPTION OF EXPOSED SIGNIFICANT MATERIAL

Worksheet #3A

Completed by: Chad D. Hurm

Title: City Engineer

Date: _____

Instructions: Based on your material inventory, describe the significant materials that were exposed to storm water during the past three years and/or currently exposed.

Description of Exposed Significant Material	Period of Exposure	Quantity Exposed (units)	Location (as indicated on the site map)	Method of Storage or Disposal (e.g., pile, drum, tank)	Description of Material Management Practice (e.g., pile covered, drum sealed)
Sand	Always	23 ton	Sand Storage Bin	Contained pile	Pile is contained on three sides within a concrete bin
#11 Limestone	Always	25 ton	Stone Storage Bin	Contained pile	Pile is contained on three sides within a concrete bin
#83/73 Limestone	Always	25 ton	Stone Storage Bin	Contained pile	Pile is contained on three sides within a concrete bin
Diesel Fuel	Always	500 gal	Fuel Tank	Fuel Tank	Fuel is stored within a tank and has secondary containment
Gasoline	Always	500 gal	Fuel Tank	Fuel Tank	Fuel is stored within a tank and has secondary containment
Misc. Fittings	Always	100 pcs	Fittings	Pile	Fittings are stored on palletes on the ground
Pipe	Always	200 lf	Pipe Storage	Pile	Pipe is stored in piles located on the ground

**NON-STORM WATER DISCHARGE
ASSESSMENT AND CERTIFICATION**

Worksheet #5

Completed by: Chad D. Hurm

Title: City Engineer

Date:

Date of Test or Evaluation	Outfall Directly Observed During the Test (identify as indicated on the site map)	Method Used to Test or Evaluate Discharge	Describe Results from Test for the Presence of Non-Storm Water Discharge	Identify Potential Significant Sources	Name or Person Who Conducted the Test or Evaluation
5/20/2010	Outfall 001	Visual	Water present	Pump house	Chad Hurm
5/20/2010	Outfall 002	Visual	None	None	Chad Hurm
5/20/2010	Outfall 003	Visual	None	None	Chad Hurm

CERTIFICATION

I, Chad D. Hurm (responsible corporate official), 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 gather and evaluate 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.

A. Name & Official Title (type or print)

Chad D. Hurm - City Engineer

B. Area Code and Telephone Number

812-482-4255

C. Signature

D. Date Signed

**NON-STORM WATER DISCHARGE
ASSESSMENT AND CERTIFICATION**

Worksheet #5

Completed by: Chad D. Hurm

Title: City Engineer

Date:

Date of Test or Evaluation	Outfall Directly Observed During the Test (identify as indicated on the site map)	Method Used to Test or Evaluate Discharge	Describe Results from Test for the Presence of Non-Storm Water Discharge	Identify Potential Significant Sources	Name or Person Who Conducted the Test or Evaluation
5/20/2010	Outfall 004	Visual	None	None	Chad Hurm

CERTIFICATION

I, Chad D. Hurm (responsible corporate official), 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 gather and evaluate 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.

A. Name & Official Title (type or print)

Chad D. Hurm - City Engineer

B. Area Code and Telephone Number

812-482-4255

C. Signature

D. Date Signed

NON-STORM WATER DISCHARGE ASSESSMENT AND FAILURE TO CERTIFY NOTIFICATION

Worksheet #6

Completed by: Chad D. Hurm

Title: City Engineer

Date: _____

Directions: If you cannot feasibly test or evaluate an outfall due to one of the following reasons, fill in the table below with the appropriate information and sign this form to certify the accuracy of the included information.

List all outfalls not tested or evaluated, describe any potential sources of non-storm water pollution from listed outfalls, and state the reason(s) why certification is not possible. Use the key from your site map to identify each outfall.

Important Notice: A copy of this notification must be signed and submitted to the Director within 180 days of the effective date of this permit.

Identify Outfall Not Tested/Evaluated	Description of Why Certification Is Infeasible	Description of Potential Sources of Non-Storm Water Pollution
N/A - does not apply		

CERTIFICATION

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 gather and evaluate 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, and that such notification has been made to the Director within 180 days of _____ (date permit was issued), the effective date of this permit.

A. Name & Official Title (type or print)	B. Area Code and Telephone No.
C. Signature	D. Date Signed

POLLUTANT SOURCE IDENTIFICATION

Worksheet #7

Completed by: Chad D. Hurm

Title: City Engineer

Date: _____

Instructions: List all identified storm water pollutant sources and describe existing management practices that address those sources.
In the third column, list BMP options that can be incorporated into the plan to address remaining sources of pollutants.

Storm Water Pollutant Sources	Existing Management Practices	Description of New BMP Options
1 Sand	Stored in three sided concrete bins on a concrete pad	Continue Existing BMP
2 #11 Limestone	Stored in three sided concrete bins on a concrete pad	Continue Existing BMP
3 #83/73 Limestone	Stored in three sided concrete bins on a concrete pad	Continue Existing BMP
4 Diesel Fuel	Stored in a secondary containment tank	Continue Existing BMP
5 Gasoline	Stored in a secondary containment tank	Continue Existing BMP
6 Fittings	Stored in a three sided concrete bin or open pile located on a concrete pad	Continue Existing BMP
7 Pipe	Stored in a three sided concrete bin or open pile located on a concrete pad	Continue Existing BMP

BMP IDENTIFICATION

Worksheet #7a

Completed by: Chad D. Hurm

Title: City Engineer

Date: _____

Instructions: Describe the Best Management Practices that you have selected to include in your plan. For each of the baseline BMP's, describe actions that will be incorporated into facility operations. Also describe any additional BMP's (activity-specific and site-specific BMP's) that you selected. Attach additional sheets if necessary.

BMP's	Brief Description of Activities
Good Housekeeping	Regular trash pick up. Train staff in basic clean-up procedures.
Preventive Maintenance	Make sure tanks, vehicles, mixing equipment, and etc. are in proper working order.
Inspections	Monthly inspections of all areas of potential pollution sources on the site as well as drainage areas. These inspection sheets will be kept in the attachments at the end of this manual.
Spill Prevention Response	Employees will be trained to prevent spills as well as how to respond to a spill if one should happen.
Sediment and Erosion Control	Make sure grass is in good condition. Fertilize and/or reseed if necessary.
Management of Runoff	Make sure storm water ditches are clear and allow for proper runoff.
Additional BMP's (Activity-specific and Site-specific)	

IMPLEMENTATION

Worksheet #8

Completed by: Chad D. Hurm

Title: City Engineer

Date: _____

Instructions: Develop a schedule for implementing each BMP. Provide a brief description of each BMP, the steps necessary to implement the BMP (i.e., any construction or design), the schedule for completing those steps (list dates) and the person(s) responsible for implementation.

BMPs		Description of Action(s) Required for implementation	Scheduled Completion Date(s) for Req'd Action	Person Responsible for Action
Good Housekeeping	1	Develop training program.	5/18/2010	Pollution Prevention Team Leader
	2	Conduct training.	6/8/2010	Pollution Prevention Team Leader
	3			
Preventive Maintenance	1			
	2			
	3			
Inspections	1	Perform non-storm water discharge assessments.	5/20/2010	Pollution Prevention Team Leader
	2	Perform monthly inspections.	Starting	Pollution Prevention Team Members
	3		6/30/2010	
Spill Prevention Response	1	Covered in training program.		
	2			
	3			
Sediment and Erosion Control	1			
	2			
	3			
Management of Runoff	1			
	2			
	3			
Additional BMPs (Activity-specific and Site-specific)	1			
	2			
	3			

EMPLOYEE TRAINING

Worksheet #9

Completed by: Chad D. Hurm

Title: City Engineer

Date: _____

Instructions: Describe the employee training program for your facility below. The program should, at a minimum, address spill prevention and response, good housekeeping, and material management practices. Provide a schedule for the training program and list the employees who attend training sessions.

Training Topics	Brief Description of Training Program/Materials (e.g., film, newsletter course)	Schedule for Training (list dates)	Attendees
Spill Prevention and Response	Show proper response for spills. Discuss spill prevention.	First meeting by June 30, 2010 At least one meeting per year after that. Additional meetings will be added if the Pollution Prevention Team decides it is necessary. These topics will be discussed with all new employees when they begin work.	All employees. Attendance sheets for each meeting will be kept as an attachment at the end of this manual
Good Housekeeping	Stress importance of keeping a clean work area, keeping trash picked up, and sweeping when necessary.		
Material Management Practices	Show and discuss proper handling of equipment and materials.		
Other Topics	If any employee sees any of the following, it should be reported immediately:		
	* clogged storm pipes, ditches, or drains		
	* trash or clutter outside		
	* any equipment not functioning properly		

FIELD NOTES

For non-storm water discharge inspections

INSPECTION # Outfall #:

Completed by:

Date:

Time:

Time since last rain:

Quantity of last rain:

Flow observed:

If flow is observed, answer the following:

Description:

Comments:

NOTE: A separate inspection sheet should be filled out for each outfall.

FIELD NOTES

For non-storm water discharge inspections

INSPECTION # Outfall #:

Completed by:

Date:

Time:

Time since last rain:

Quantity of last rain:

Flow observed:

If flow is observed, answer the following:

Description:

Comments:

NOTE: A separate inspection sheet should be filled out for each outfall.

FIELD NOTES

For non-storm water discharge inspections

INSPECTION # Outfall #:

Completed by:

Date:

Time:

Time since last rain:

Quantity of last rain:

Flow observed:

If flow is observed, answer the following:

Description:

Comments:

NOTE: A separate inspection sheet should be filled out for each outfall.

FIELD NOTES

For non-storm water discharge inspections

INSPECTION # Outfall #:

Completed by:

Date:

Time:

Time since last rain:

Quantity of last rain:

Flow observed:

If flow is observed, answer the following:

Description:

Comments:

NOTE: A separate inspection sheet should be filled out for each outfall.

**STORM WATER POLLUTION PREVENTION PLAN
TRAINING ATTENDANCE SHEET**

INSTRUCTOR:

DATE:

	NAME (printed)	SIGNATURE
1		
2		
3		
4		
5		
6		
7		
8		
9		
10		
11		
12		
13		
14		
15		
16		
17		
18		
19		
20		
21		
22		
23		
24		
25		