PLASTIC INGENUITY GREEN TIER APPLICATION- TIER 1
ATTACHMENT 2

IV. Environmental Performance

Since both Plastic Ingenuity (PI) facilities in Cross Plains and Mazomanie are Tier 1 applicants, the environmental performance section covers the effects, whether regulated or unregulated, of the PI facilities on the air, water, land and natural resources surrounding the sites.

The regulated effect of the two PI facilities to air, water, land and natural resources surrounding the site is as follows:

Stormwater Permit- Both facilities operate under SIC code 3089 as a plastic manufacturing operation. This SIC code designation requires a stormwater discharge permit under the WPDES program. However, since almost all of the industrial materials and activities are protected by a storm resistant shelter to prevent exposure to rain, snow, snowmelt and/or runoff, a "No Exposure Certification" form (Form #3400-188) was submitted and approved by the WDNR in 2002 and 2005. The approval of this form verifies that a stormwater discharge permit is not needed at either site due to the lack of stormwater pollution.

Air Permit- Both the Cross Plains facility and the Mazomanie facility have been determined to be excluded from the need for a WDNR Air Quality Operating Permit. This was determined based both upon annual tracking of facility emissions and an August 28, 2006 verification from an outside consultant. Steven Klafka of Wingra Engineering completed the study. Copies of this report can be made available upon request. The Cross Plains location is a thermoforming-only facility. The Mazomanie facility both extrudes and thermoforms plastic.

Wastewater – The PI-Cross Plains facility does have a general WPDES permit (#WI-0044938-5) to discharge non contact cooling water or condensate and boiler water. However, the discharge of the non-contact cooling water has been directed to the sanitary sewer and the discharge of refrigerator condensate from their roof is pure drinking water and is not mixed with process emissions at exhaust points. Therefore, they have been advised that a WPDES permit is no longer needed and are submitting a letter to Richard Edwards of the WDNR requesting their permit be terminated. The PI-Mazomanie facility has never needed a WPDES permit.

The unregulated environmental performance of the two PI facilities follows:

PI-Cross Plains Facility

The PI facility in Cross Plains is located on 11 acres in the extreme western portion of the Village of Cross Plains consisting of a 4.8 acre manufacturing facility and a 1.5 acre parking lot. This facility is located on the banks of the Black Earth Creek which is designated a Class I trout stream. The site has two stormwater outfalls into the Black Earth Creek-one draining the north half of the building and one draining the south half.

Due to the location of the facility, PI has been environmentally pro-active for the past ten years, in implementing the following Best Management Practices on a voluntary basis:

1. Existing Stormwater Treatment Practices- PI has implemented practices which reduce discharge, remove pollutants and reduce the temperature of stormwater before it leaves the site and discharges to the creek. All of these practices were installed on a voluntary basis and funded privately by PI. These practices include the following:

- Stormwater filters installed in inlets on the south side parking lot to treat runoff,
- Stormwater filters installed for employee parking lot (northeast of Building) to treat runoff,
- Rock weeper dam for west roof discharge to reduce temperature and treat runoff,
- Rock rip-rap protection of ditch entering creek to protect banks and eliminate a pollution source,
- Two rain gardens installed on north side of building for roof discharge to reduce temperature and treat runoff,
- Grassed swale treatment of stormwater from both outfalls to the creek to treat runoff.

PI utilized the services of professional engineers and landscape architects to design and construct the rock weeper dam and rain gardens. PI staff inspects and maintains these practices on a monthly basis.

2. Future Stormwater Treatment Practices - Within the next two years, PI will continue implementing additional stormwater treatment and temperature control practices by:

- Providing funding and working with Park Elementary School to install additional rain gardens to control runoff from off-site areas,
- Installing additional rain gardens on the PI site in Cross Plains.
- Conduct temperature monitoring studies comparing the temperature of stormwater leaving their rooftop to that of stormwater leaving the rain garden.

3. Other Environmentally Sound Practices- Other environmental performance improvement projects in process or under consideration for Plastic Ingenuity's Cross Plains Facility include:

- Actively studying the use of photovoltaic power generation at the Cross Plains facility. Feasibility studies have been ordered from Wisconsin Focus on Energy and will be conducted in the very near future (2007).
- Replacing all T12 or metal halide lighting in Cross Plains Production and Warehouse with T8 lighting to reduce the energy consumption burden. This project was also completed in our Mazomanie facility. It is estimated that the total energy savings for this project is 1.5 million kilowatt hours.
- Hazardous waste generation has been reduced to the point where the facility has been reclassified as a Very Small Quantity Generator of hazardous wastes. In previous years, the facility was considered a Small Quantity Generator.
- While the facility is considered to be excluded from coverage of an air permit, a complete air emissions study was conducted by Wingra Engineering to verify that

the Cross Plains Facility is, is fact, operating within the parameters of applicable regulations. Emissions from the thermoforming process are filtered.

- Using "reject" heat from air compressor systems to heat the Cross Plains Facility's Warehouse. The estimated time for payback of this initiative is over the course of one winter season.
- In the Production process, scrap material is ground into small pieces (regrind) for reuse in the extrusion and thermoforming process. This practice is beneficial for both the potential environmental impacts and financially for Plastic Ingenuity. Rather than landfilling this waste plastic, the facility reuses over 99% of the scrap generated in our processes. The remaining less than 1% is typically sold to other businesses for use rather than being destined for landfilling.

Once again, these practices will be implemented on a voluntary basis and paid by PI.

PI-Mazomanie Facility

The PI facility in Mazomanie is located in the Mazomanie Business Park at 20 Industrial Drive on a 10.14 acre site consisting of an 8 acre manufacturing/storage building and a 1 acre parking lot. The site is approximately 960 feet south of the Black Earth Creek.

1. Existing Stormwater Practices - The site was constructed in 2000 to meet the Dane County Stormwater and Erosion Control requirements. All stormwater discharge from the site is conveyed via grassed swales to a large stormwater detention basin prior to leaving the site. Since the underlying soils are well-graded sands, stormwater runoff is infiltrated along the bottom of the grassed swales and the detention basin. The combined swale/infiltration basins/infiltration provides stormwater treatment and reduces the temperature of stormwater.

2. Other Environmentally Sound Practices - Other environmental performance improvement projects in process or under consideration for Plastic Ingenuity's Mazomanie Facility include:

    - Actively studying the use of photovoltaic power generation at the Mazomanie facility. Feasibility studies have been ordered and will be conducted in the very near future (2007).
    - Replacing all T12 or metal halide lighting in Mazomanie Facility with T8 lighting to reduce the energy consumption burden. It is estimated that the total energy savings between both plants for this project is 1.5 million kilowatt hours.
    - Hazardous waste generation has been reduced to the point where the facility is considered a Very Small Quantity Generator of hazardous wastes. In previous years, the facility was considered a Small Quantity Generator.
    - While the facility is considered to be excluded from coverage of an air permit, a complete air emissions study was conducted by Wingra Engineering to verify that the Mazomanie Facility is, is fact, operating within the parameters of applicable regulations. Emissions from both the thermoforming process and extrusion process are filtered.

- In the Production process, scrap material is ground into small pieces (regrind) for reuse in the extrusion and thermoforming process. This practice is beneficial for both Plastic Ingenuity and the environment. Rather than landfilling this waste plastic, the Mazomanie facility reuses more than 99% of the scrap generated in process. Residual scrap plastic may also be sold to other businesses for reuse rather than being landfilled.
- The Mazomanie facility has a heavy focus on extrusion of plastic sheet. The plastic sheet is extruded from small plastic pellets. These pellets can be lost to the environment during the transition points between railcar/semi trucks to facility silos. In the event of a "loss", site personnel are trained in proper clean-up techniques. The use of "dry" clean up techniques is encouraged to eliminate the possibility of compounding the environmental impacts. The goal for the facility is to have no plastic pellet exposed to the environment. The Plastic Ingenuity Pellet Loss Program is available for viewing upon request.
- The Mazomanie facility recently conducted a wind power feasibility study. While the facility's location is not a great candidate for a large turbine due to wind turbulence at certain heights, the facility is a potential candidate for use of a smaller power generating wind mill due to less turbulent winds at lower elevations. Research into the feasibility of installing a small power generating wind mill is continuing.

The past and future environmental practices at both PI facilities highlight the fact that PI has and continues to strive to achieve superior environmental performance as an important part of the culture of the company. The Green Tier program recognizes these efforts and rewards the companies that have achieved above normal environmental performance.