



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION 5
77 WEST JACKSON BOULEVARD
CHICAGO, IL 60604-3590

REPLY TO THE ATTENTION OF:
DE-9J

March 23, 2006

Via Facsimile and
Certified Mail (7001 0320 0006 1448 2918)

Mr. Richard Menozzi
Director, Environmental Legacy/Remediation
U.S. Steel
600 Grant Street
Pittsburgh, PA 15219-2800

Re: Corrective Action Management Unit
Corrective Action Waste Use Procedures
U.S. Steel - Gary Works
IND 005 444 062

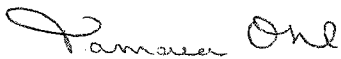
Dear Mr. Menozzi:

By letter dated January 18, 2005, U.S. Steel (USS) requested the U.S. Environmental Protection Agency (EPA) to modify the Toxic Substances and Control Act (Permit) to allow for additional remediation waste, managed as part of the Gary Works corrective action program, to be disposed at the Corrective Action Management Unit (CAMU). A modification was necessary because the original Permit allowed only remediation wastes managed as part of the Grand Calumet River Sediment Remediation Project to be disposed into Unit 1. The CAMU Designation issued in February, 1999, pursuant to the Resource Conservation and Recovery Act, does not require modification because that approval anticipated the use of the CAMU for additional remediation waste, subject to EPA approval. The January 18, 2005, letter also proposes the procedures USS will follow to request approval to use the CAMU to dispose of additional remediation waste as part of the corrective action program at Gary Works. The purpose of this letter is to approve those procedures.

A notice of the draft Permit modification and "Use Procedures" was published in the Post Tribune on June 15th, 18th, 20th and July 11, 2005. A public meeting was held on June 21, 2005, to discuss the "Use Procedures" and permit modification. At that meeting, and from June 21, 2005, to August 19, 2005, EPA received public comment on the proposal. Comments were received by representatives from Save the Dunes Council, the City of Gary, a citizen of Gary, and USS. A response to the comments received is included with this letter.

A final determination regarding the modifications to the Permit will be finalized by the Toxic Substances and Control Act program under separate cover. The purpose of this letter is to approve, in accordance with Section X of the Order, the Use Procedures proposed by USS on January 18, 2005. Attachment I lists the minimum components to be addressed in the request to place corrective action wastes into the CAMU; as well as daily documentation requirements for the CAMU's operation. This approval also requires USS to update the Air Monitoring Plan and Operations and Maintenance Plan within 90 days of this approval, per Attachment II to this approval. The use of the CAMU also requires ongoing public notification and participation. Attachment III to this approval outlines the minimum required actions. Therefore, in accordance with Section X of the Order, your request is hereby approved. Should you have any questions regarding this approval, I may be reached at (312) 886-0991.

Sincerely,

A handwritten signature in cursive script, appearing to read "Tamara Ohl".

Tamara Ohl
Project Manager
Enforcement and Compliance Assurance Branch
Region 5, U.S. EPA

Cc: Thomas Anderson, Save the Dunes Council
Dorreen Carey, City of Gary
Lynn Katz-Cherry
Mark Rupnow, USS
Michael Aylesworth, IDEM
Alex daSilva, IDEM
Steve West, IDEM

Attachment I

Required Components for Request for Approval for Placement of Remediation Wastes
into CAMU and Daily Documentation Requirements

- I. Project Description
 - A. Remediation Waste Description
 - 1. Waste location relative to CAMU
 - 2. Waste source (e.g., stockpiled area, or in-situ location requiring excavation)
 - 3. Waste volume
 - a. In-situ or ex-situ volume
 - b. Expansion factor used
 - c. Factor of safety applied for volume estimate
 - B. Rationale for waste placement into CAMU
- II. Similarity of Remediation Waste to Grand Calumet River Sediments
 - A. Physical and Chemical Description
 - 1. Comparison to non-native river sediments
 - 2. Assessment to long term settlement projections
 - a. Impacts to projected settlement amounts
 - b. Impacts on differential settlement
 - c. Impacts on equipment
 - 3. Chemical analysis similarity
 - 4. Solubility discussion
 - B. Compatibility with CAMU features
 - 1. Non-native sediments
 - 2. Liner and ancillary equipment
 - 3. Wastewater treatment system
- III. Operational Requirements
 - A. Waste transportation
 - B. Waste disposal/placement procedures
 - C. Decontamination procedures
- IV. Personal and Environmental Monitoring/Safety
 - A. Estimate of total mass of each contaminant contained in waste
 - B. Monitoring program description
 - 1. Personal monitoring
 - 2. Air monitoring
 - 3. Groundwater/Leak Detection
 - C. Demonstration that monitoring programs are adequate for combination of contaminants and proposed activities.
- V. Daily Documentation Requirements
 - A. Number of trucks/quantity of wastes
 - B. Personnel involved
 - C. Dates and times of operation.
 - D. Weather conditions
 - E. Dust suppression techniques used (if any)
 - F. Total mass of constituents of concern in wastes brought to CAMU
 - G. Approximate location where each remediation waste is disposed into the CAMU (to be recorded on a map)

Attachment II
Schedule for Document Submittal

Document	Submittal Date
Air Monitoring Plan, revised	90 days after TSCA Permit modification
Operation and Maintenance Plan, revised	90 days after TSCA Permit modification

Attachment III

Public Notification

At a minimum, the following will be completed to provide information to the public regarding the use of the CAMU for remediation wastes:

- A. The City of Gary will receive a copy of a request to EPA from USS to dispose remediation waste into the CAMU.
 - B. The CITE meetings and newsletters will be used to convey information about the CAMU's use.
 - C. Monthly Progress Reports will include a section identifying when application has been made to EPA and when approval has been received for disposal of new remediation waste.
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RESPONSE TO COMMENTS
TSCA PERMIT MODIFICATION AND CAMU USE PROCEDURES
U.S. STEEL – GARY WORKS
IND 005 444 062

Introduction: In January, 2005, U.S. Steel proposed procedures that it would follow when requesting approval from EPA to use the existing Corrective Action Management Unit (CAMU) to dispose of remediation wastes generated from the cleanup of Gary Works or of contamination that has migrated from Gary Works. Before additional remediation wastes can be disposed into the CAMU, the permit issued pursuant to the Toxic Substances and Control Act (TSCA) must be modified. Public notice of the procedures and draft permit modification was published and comment received from June 21st to August 19, 2005. After consideration of public comment received on the proposal, EPA is today approving the procedures as well as modifying the Permit to allow additional remediation waste to be disposed into the CAMU. The final modification of the permit will take into consideration comments received during the comment period, as explained more fully below.

CAMU USE PROCEDURES

In 1999, EPA approved USS' request to build a CAMU on a 40 acre parcel of land at Gary Works. The CAMU was designated to receive remediation wastes managed as part of the Resource Conservation and Recovery Act (RCRA) corrective action program at Gary Works (see attached chronology). The purpose of the corrective action program is to investigate and remediate chemical releases at Gary Works, or that have migrated from Gary Works, which pose a risk to people or the environment. This program is required by an Order signed by EPA and USS pursuant to the Resource Conservation and Recovery Act. In 1999, EPA approved the CAMU's use for disposal of sediments from the Grand Calumet River Sediment Remediation Project. That approval required USS to obtain approval from EPA before disposing any additional remediation waste into the CAMU.

In 2003, USS implemented the Grand Calumet River Sediment Remediation Project, disposing of about 780,000 cubic yards of contaminated sediments into the CAMU. While the dredging project was underway, corrective action Phase I investigations throughout Gary Works were begun, and have been recently completed. EPA and USS will use this data to determine and support a final remedy or interim cleanup measures. Under the terms of the 1999 CAMU approval, USS may request to use the CAMU's

additional capacity to dispose of additional cleanup wastes managed as part of an interim measure or final remedy at Gary Works.

In January 2005, USS also proposed the procedures it would follow when requesting approval from the EPA to dispose of new remediation waste into the CAMU. The procedures that were proposed by USS, and are approved by EPA today, require that USS provide a description of:

- * the remediation wastes to be disposed, including its source, location and volume;
- * how the remediation waste will be disposed, including waste transportation, waste placement, and decontamination;
- * the similarity to, and compatibility with, wastes previously disposed in the CAMU, the design and construction of the CAMU, and waste water treatment plant; and
- * the evaluation of the adequacy of personal and environmental monitoring systems

EPA will review the information provided in each request from USS and approve, modify, or deny the request.

For remediation wastes that are approved for disposal into the CAMU, the approved procedures require that USS keep the following daily records during disposal operations at the CAMU:

- * Volume of waste disposed
- * Times of operation
- * Weather conditions
- * Dust suppression techniques used (if any)
- * Total mass of chemicals of concern disposed into the CAMU
- * Approximate location on a map of the CAMU where each remediation waste is disposed

TSCA PERMIT MODIFICATION

The TSCA permit was issued in 2000 for the disposal of river sediments in Unit 1 of the CAMU. As written, the permit requires modification before any additional remediation wastes can be disposed into Unit 1. Therefore, USS also requested to modify the TSCA permit in its January, 2005 request letter. USS requested to modify the permit to use both Units 1 *and* 2 to dispose of remediation wastes that could contain concentrations of 50 parts per million (or greater) of polychlorinated biphenyls (PCBs).

After considering USS' request, EPA issued a draft permit modification on June 9, 2005, incorporating the revisions requested by USS. The permit modification also updates text to incorporate the CAMU's final design specifications as well as modifications to the CAMU's monitoring programs. After consideration of the comments received by the

public expressing concern with using both Units 1 and 2 for TSCA remediation waste, USS amended its original request. On September 19, 2005, USS requested that the TSCA modification be limited to Unit 1, such that only Unit 1 would receive TSCA remediation waste.

PUBLIC COMMENT AND PARTICIPATION

On June 10, 2005, EPA placed a copy of USS' request to modify the TSCA permit, the original permit and draft modification, fact sheet, CAMU approval, and newsletter, in the Information Repository of the Main Branch of the Gary Public Library. At that time, newsletters announcing the draft permit modification, CAMU use procedures, public comment period, and public meeting, were sent to over 2,000 people in the community. A notice of the permit modification and public meeting appeared in the Post Tribune and Northwest Indiana Times on June 15th, 18th, and 20th.

On June 21, 2005, a public meeting was held at the Main Branch of the Gary Public Library to discuss the proposed permit modification and use procedures, answer questions, and receive public comment. The public comment period started on June 21st and was originally scheduled to end on August 5, 2005. At the request of commenters, the period was extended to August 19th. EPA received comments from the following groups:

- * Save the Dunes Council
- * City of Gary
- * Citizen of Gary
- * U.S. Steel

Key comments are summarized as follows along with EPA responses:

1. More public participation is needed.
Commenters requested that an additional advertisement be placed in the newspaper announcing the permit modification. Meeting attendees also suggested that the public comment period be extended to allow additional time to provide comment on the proposal.

Following these recommendations, EPA placed a 4.5 x 6 inch advertisement in the Post Tribune newspaper on July 11, 2005. The ad announced the proposed modification and extended the public comment until August 19, 2005.

EPA understands the importance of public communication and participation and will continue to work to involve the public in important decisions regarding the corrective action program at Gary Works. At a minimum, the following will be done to further public involvement:

- * The City of Gary will be notified by USS when a request to use the CAMU is submitted to EPA.
- * The monthly progress report will have a new section that identifies when an application has been made, and approval received from EPA, to dispose of remediation waste into the CAMU. A copy of the progress report will be placed in the repository at the Main Branch of the Gary Public Library.
- * EPA and USS will continue to use the newsletter and public meetings to keep the public informed.
- * Public comment will be requested when the CAMU is used as part of a proposed final remedy.

2. PCB remediation waste disposal should be limited to Unit 1 of the CAMU.
Commenters expressed concern about USS' request to use Units 1 and 2 for disposal of remediation waste containing PCBs at concentrations greater than 50 ppm. After consideration of these comments, USS notified EPA that it wanted to revise its request so that *only* Unit 1 could be used for TSCA remediation waste. EPA will revise the permit language to limit disposal of TSCA remediation waste into Unit 1. If USS determines at a later date that the additional capacity in Unit 2 is needed for TSCA remediation waste, USS would be required to request another permit modification. In accordance with the permit, the request would be considered a major modification and EPA would take public comment.
3. Unit 1 should be closed, not receive any additional remediation wastes.
One commenter opposed modifying the permit to allow additional remediation waste to be disposed into Unit 1. The commenter further expressed a preference for continued segregation of TSCA remediation waste into Unit 1 if the unit remains operational.

EPA shares this commenter's desire for a timely closure of Unit 1. EPA will continue to work with USS to expedite the corrective action program so that the cleanup of Gary Works will be complete as soon as possible. In fact, Phase I investigations have recently been completed and EPA is using this information to identify areas at which interim measures would be appropriate. For example, USS' modification request referenced an area in the Sheet and Tin Mill that is contaminated with PCBs. This is an area that, where appropriate and practicable, the CAMU can greatly expedite the cleanup. Therefore, the CAMU must remain operational in its full capacity. Regarding the commenter's preference for continued segregation, the final permit will allow TSCA wastes to be disposed of only in Unit 1 of the CAMU.

4. Particulate monitoring should be added to the air monitoring program.
EPA agrees that the revisions to the air monitoring program are appropriate as operations change at the CAMU. USS has proposed to conduct particulate monitoring and will submit a revised air monitoring plan for EPA review within 90 days of today's approval of the Use Procedures. A background study will be completed as part of this plan. As with the previous air monitoring program, EPA and USS will discuss the details of this plan with the community at the regularly-scheduled CITE (Community Involvement Team Effort) meetings.
5. Groundwater should continue to be monitored for PCBs on a quarterly basis.
Groundwater monitoring results indicate that PCBs have not been detected in the groundwater at the CAMU. Therefore the annual monitoring is appropriate. However, should either groundwater or leak detection monitoring results indicate that PCBs may be of concern; the frequency of PCB monitoring will be increased.
6. Questions regarding the CAMU Design and Waste Water Treatment Facility
One commenter had several questions regarding the CAMU's design and closure, and requested to be provided the design and closure information or a location where it could be reviewed. If the commenter would like to obtain information in addition to that recently supplied by USS, it is available at the project information repository in the Main Branch at the Gary Public Library, or in the EPA Region 5 Record Center located at 77 West Jackson Boulevard, in Chicago, IL.

The commenter also questioned the ability of the waste water treatment plant to effectively handle leachate from the additional wastes. USS is currently working with the Indiana Department of Environmental Management to modify the National Pollutant Discharge Elimination System permit, and/or receive additional limits, as appropriate, and will ensure that the treatment plant can meet the discharge limits. In addition, as required by the 1999 CAMU approval, USS must present a review of the waste water treatment system effectiveness will when requesting approval to dispose additional remediation waste.

7. Manifests of remediation wastes disposed into the CAMU should be kept.
EPA agrees that it is important to maintain careful records of the remediation wastes USS disposes of in the CAMU. As has been discussed previously, USS must provide detailed information to EPA prior to disposal of any additional remediation waste into the CAMU. In addition, USS will keep detailed records during disposal operations. At a minimum, USS will record and retain the following information:
 - * Volume of waste disposed
 - * Times of operation
 - * Weather conditions

- * Dust suppression techniques used (if any)
- * Total mass of chemicals of concern disposed into the CAMU
- * Approximate location on a map of the CAMU where each remediation waste is disposed

8. The maximum elevation for the CAMU should be specified in the TSCA permit.

As specified in the CAMU Closure Plan, the maximum elevation of the CAMU at closure will be approximately 648 feet based on U.S.G.S Datum. The final permit will be revised to incorporate this design detail.

CHRONOLOGY OF EVENTS

- 1998 U.S. Environmental Protection Agency (EPA) and U.S. Steel (USS) sign an order pursuant to the Resource Conservation and Recovery Act. Under this order, USS agrees to complete a corrective action program for its Gary Works facility in Gary, Indiana. The corrective action program requires USS to investigate chemical releases at Gary Works, or that have migrated from Gary Works. Further, the order requires USS to clean up contamination that may pose a risk to people or the environment. The first cleanup action specified in the order is the Grand Calumet River Sediment Remediation Project.
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- 1999 EPA approves USS' request to build a Corrective Action Management Unit (CAMU) on an approximately 40 acre parcel of land at Gary Works. The CAMU will be used to manage wastes from the corrective action program at Gary Works. The CAMU will first be used to dispose of sediments removed from the river as part of the sediment remediation project. USS will need to obtain additional approval from EPA prior to disposing new remediation waste into the CAMU.
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- 2000 EPA issues USS a permit under the Toxic Substances and Control Act (TSCA). The permit is issued for Unit 1 of the CAMU which will receive sediments contaminated with polychlorinated biphenyls at concentrations greater than 50 parts per million.
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- 2002 USS finishes constructing the CAMU and begins dredging the river. The CAMU is constructed of two cells, Unit 1 and Unit 2. Unit 1 will receive sediments from specific areas of the river which are more contaminated. Unit 2 is larger and will receive sediments from the remaining portions of the river.
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- 2003 By the end of 2003, about 780,000 cubic yards of sediments have been removed and placed into the CAMU. At the same time, plans for collecting environmental samples of soil, sediment, groundwater, and surface water at Gary Works are being prepared by USS for EPA review and, as necessary, modification. Following EPA approval of the final plans, USS initiates sampling.
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- January, 2005 USS requests approval from EPA to modify the TSCA permit to use Units 1 and 2 for disposing remediation wastes which contain 50 parts per million of PCBs or greater. USS also proposes procedures that it will follow to when requesting approval from EPA to dispose new remediation waste into the CAMU.
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- June, 2005 Over 2,000 newsletters are sent to the community and other interested parties describing the proposed modification and CAMU use procedures. The newsletters and notices in newspapers announce a public meeting that will be held on June 21st. The public comment is scheduled for June 21st to August 5th.
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- July, 2005 At the request of some participants at the public meeting, on July 11th an additional public notice is placed in the newspaper and the public comment period extended until August 19, 2005.
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- September, 2005 USS requests to limit their original modification request so that *only* Unit 1 could be used for PCB remediation waste. This announcement is discussed at the public meeting on June 21st.
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