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TREATMENT OF METAL-LADEN HAZARDOUS WASTES WITH ADVANCED CLEAN COAL TECHNOLOGY BY-PRODUCTS

QUARTERLY TECHNICAL PROGRESS REPORT

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EXECUTIVE SUMMARY

During the fourteenth quarter of Phase 2, work continued on preparing for field work and making an additional outside contact.

Preparation for Field Work

The Mill Service Yukon Plant (MSYP) is awaiting a response from the Pennsylvania Department of Environmental Protection on MSYP's applications (1) for a minor permit modification for the installation of a new silo and new storage pads and (2) for a revision to the air permit to operate the baghouse on the new silo.

Outside Contact

In early March the principal investigator a copy of the current draft of the proposed ASTM Standard Guide for Use of Coal Combustion Products for Stabilization of Inorganic Wastes. The project team is examining the draft and will provide comments and enter into discussion with members of Subcommittee E50.03 of ASTM Committee E-50 during the next quarter.

Plans for the Next Quarter

During the quarter from March 30 through June 30, 1999, work on Task 1 of Phase 2 will continue. The principal investigator will maintain contact with MAX Environmental Technologies, Inc., as it plans the installation of equipment at the Mill Service Yukon Plant to conduct Phase 2 of the project.

INTRODUCTION

This eighteenth quarterly report describes work done during the eighteenth three-month period of the University of Pittsburgh's project on the "Treatment of Metal-Laden Hazardous Wastes with Advanced Clean Coal Technology By-Products."

This report describes the activities of the project team during the reporting period. The principal work has focussed upon the field work of Phase 2 and responding to one outside contact.

LABORATORY AND FIELD WORK

Scholarly Activity

Work in this area has been suspended.

Preparation for Field Work

The Mill Service Yukon Plant (MSYP) is awaiting a response from the Pennsylvania Department of Environmental Protection on MSYP's applications (1) for a minor permit modification for the installation of a new silo and new storage pads and (2) for a revision to the air permit to operate the baghouse on the new silo.

REPORTS AND PRESENTATIONS

There were no reports or presentations, or work on any, during this quarter.

OUTSIDE CONTACTS

American Society for Testing and Materials (ASTM)

In early March the principal investigator received from Joel Beeghly of Dravo Lime Company a copy of the current draft of the proposed ASTM Standard Guide for Use of Coal Combustion Products for Stabilization of Inorganic Wastes. The project team is examining the draft and will comment on it and enter into discussion of it with members of Subcommittee E50.03 of ASTM Committee E-50 during the next quarter. The draft cannot be included as an appendix in this quarterly report, because it cannot be "reproduced or circulated or quoted, in whole or in part, outside of ASTM committee activities except with the approval of the chairman of the committee having jurisdiction and the president of the society."

ADMINISTRATIVE ASPECTS

This section provides the monthly highlights and closes by comparing progress with the milestone chart.

Special Actions

There were no special actions during this quarter.

Monthly Highlights

Here are the highlights of the fourteenth three-month period of the second phase of the project.

December 30, 1998 - January 30, 1999

NONE

January 30 - February 28, 1999

NONE

February 28 - March 30, 1999

- The project team receives a copy of the current draft of the proposed ASTM Standard Guide for Use of Coal Combustion Products for Stabilization of Inorganic Wastes.

Comparison of Progress with Milestone Chart

The following task for Phase 2 had been scheduled for completion during the first quarter of Phase 2:

- Task 1 - Test Plan for Phase 2

Task 1 still was not completed during the fourteenth period of this phase. The decision in early April 1996 by METC that an environmental assessment of the Phase 2 project at the Yukon plant of Mill Service, Inc. (MSI), would have to be conducted and the subsequent withdrawal in late April 1996 by MSI from Phase 2 necessitated a search for a new subcontractor to host and participate in the commercial test of Phase 2. MAX Environmental Technologies, Inc., has

rejoined the project team and is designing modifications at the Mill Service Yukon Plant (MSYP) to enable it to enter this business area and carry out the field work on this project. The test plan for Phase 2 will be prepared shortly before the permits are in place for the installation of the equipment at MSYP for carrying out the demonstration.

Work has been suspended on two tasks from Phase 1:

- Task 4 - Treatment of Metal-Laden Waste with CCT Solid By-Product
- Task 5 - Data Analysis

The fourth by-product and the final three residues are no longer being actively sought. When the Phase 2 testing program is initiated, consideration will be given to reestablishing this activity.

PLAN FOR THE NEXT QUARTER

During the quarter from March 30 through June 30, 1999, work on Task 1 of Phase 2 will continue. The principal investigator will maintain contact with MAX Environmental Technologies, Inc., as it plans the installation of equipment at the Mill Service Yukon Plant to conduct Phase 2 of the project.