conoco

Interoffice Communication

To : R. A. Frohreich

From : Dave Mahler

Date : August 13, 1982

Subject : PVC REACTOR STRIPPING PROCEDURE

Attached is a PVC reactor stripping procedure which I am recommending for use in the plant. Some of the panel operators have been stripping by head space temperature recently, however, the procedure needs to be implemented across the board. The following generalizations summarize the justification for the implementation of this procedure:

(1) The attached procedure should use less steam and cooling water during recovery.

(2) The attached procedure specifies a 195^{o}F dump temperature; we currently dump between 160^{o} - 200^{o}F.

(3) The attached procedure should not increase recovery time.

(4) The attached procedure should not be any more complex than the current standard procedure.

(5) Oklahoma City uses a similiar stripping procedure, and their slurry residuals are significantly better than ours on the average.

(6) The current standard recovery procedure as written was determined to be inadequate on reactors D-700 and D-745. The general procedure which we used during the emission tests should be used on these reactors, if not all reactors.

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Environmental Engineer

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c: JF, CRM, PEM, VEM

PVC REACTOR STRIPPING PROCEDURE

1. Kill the reactor at the conditions prescribed on the product formula sheet.

2. Start the compressors and begin recovery.

3. Set the temperature setpoint at 180°F and start injecting steam into the reactor through the steam nozzle.

4. After the vacuum pumps have come on, reset the temperature setpoint accordingly:

   5385, 5425 and 5465 resins - 220°F
   5305 and 5265 resins - 210°F

5. Switch from the steam nozzle to the steam sparger.

6. When the slurry begins to boil, the reactor head space temperature will rise rapidly and approach the slurry temperature. Boil the slurry for ten minutes without cooling.

7. After ten minutes of boiling, turn the emergency cooling water on the condenser. When stripping 5425 and 5465 grade resins, turn off the steam.

8. Recover the reactor dump manifold.

9. When the slurry cools to 195°F, turn off the steam and cooling water.

10. Dump the reactor.