



PPG Industries, Inc. Chemicals P.O. Box 1000 Lake Charles, Louisiana 70602

June 14, 1991

Mr. Gus Von Bodungen
Department of Environmental Quality
Air Quality Division
Office of Environmental Affairs
P O Box 44096
Baton Rouge, LA 70804-4096

Dear Mr. Von Bodungen:

Re: LESHAP VCM Quarterly Report

In accordance with LESHAP requirements contained in LAC 33:III. 2561, PPG Industries' Lake Charles Complex submits the attached Quarterly Report for the period March 1, 1991 through May 31, 1991.

Emissions in excess of 10 ppm (averaged on an hourly basis) in the stacks exiting the incinerators are listed in Exhibit I. There was one (1) such incident this quarter.

Exhibit II is a record of emissions in excess of 10 ppm which resulted from a temporary by-pass of incineration. There was one (1) incident this quarter resulting in an estimated total release of 0.03 pounds of vinyl chloride.

Exhibit III is a record of sudden discharges of vinyl chloride during the quarter. There were two (2) such incidents this quarter resulting in an estimated total release of 1140.31 pounds of vinyl chloride.

Respectfully,

Esther S. Liggio

Esther S. Liggio
Environmental Engineer

SL 026583

EXHIBIT I

CONTINUOUS STACK EMISSION RESULTS > 10 PPM VCM

<u>DATE</u>	<u>STACK NO.</u>	<u>HOUR ENDING</u>	<u>HOURLY AVG PPM</u>	<u>3-HOUR* AVG PPM</u>	<u>COMMENTS</u>
4/5/91	#1 Incinerator	12 MN	26.3	8.8	See Below

During startup of an ethylene dichloride (EDC) reactor, incinerator vents became too hot to control forcing the shutdown of No. 1 Incinerator. The Tri-Ethane II unit vents were also lined up to this incinerator. The standard operating procedure has been changed to align the EDC reactor vents alone in an incinerator during reactor startups if possible. This will give the operator more control and reduce the risk of an incinerator shutdown.

EXHIBIT II

NON-INCINERATION OF VCM VENTS

<u>DATE</u>	<u>TIME</u>	<u>SOURCES NOT INCINERATED</u>	<u>EST. QUANTITY VCM VENTED, LBS.</u>	<u>COMMENTS</u>
5/21/91	806	LP-EDC Reactor, VC-II	0.03	See Below

The VCM II Liquid Phase EDC Reactor experienced operational problems and finally shutdown as a result of a power failure in the chlorine Liquefaction unit. The power failure caused the chlorine line pressure at VCM II to drop, in turn the Liquid Phase EDC Reactor vent became extremely hot due to the excess ethylene. This situation caused a high temperature alarm on the No. 4 Incinerator. To prevent an incinerator shutdown resulting in all the VCM II vents being tripped from the incinerator, the Liquid Phase EDC Reactor vents were sent to a scrubber for five minutes.

The standard operating procedure will be modified to instruct a reactor shutdown when experiencing prolonged chlorine supply pressure problems.

EXHIBIT III

SUDDEN DISCHARGES OF VCM

<u>DATE</u>	<u>TIME/DURATION</u>	<u>ESTIMATED QUANTITY VCM RELEASED, LBS.</u>	<u>COMMENTS</u>
4/25	0.17 minutes	0.31	See Below

Comments - 4/25 incident:

During loading of a ship, the personnel on the ship started a vent compressor prematurely causing the VCM vapor vent header to over-pressurize. A block valve leaked by into the emergency vent blower system, causing the safety relief valve on a dockside vessel to relieve. (Written notification made on May 1, 1991.)

5/13	0.25 minutes	1140	See Below
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Comments - 5/13 incident:

Vinyl chloride was being transferred from Tank B-2 (a horizontal production tank) to S-3 (a spherical storage tank). S-1 and S-2 spherical storage tanks can also be filled from B-2. The valves to S-1 and S-2 were relieved to be in the closed position. As the transfer was proceeding a high level alarm was received from S-1 tank. The storage operator went to the tank to investigate the alarm. The level indicator and the tank pressure appeared to be within expected limits leading the operator to think that he had received a false alarm¹. Subsequently it appears that the level indicator had hung up and was not indicating the true level at the tank or in the control room. Shortly thereafter a second high level alarm on S-1 was recorded in the control room but received no response.

About one-half hour later the low level alarm on Tank B-2 was received in the control room indicating the transfer from B-2 to S-3 was near completion. The storage operator went to the B-2 tank area to shut down the transfer to S-3. While there he was informed that a S-1 high level alarm had again activated and the sphere pressure was high. Before he could take corrective action, the safety relief valve on S-1 spherical tank lifted.

The storage operator went to S-1 and observed that the level indicator showed a high level in the tank. He then saw the valve partially open on the product transfer header leading into S-1. He corrected the situation by pumping S-1 down to a safe level by transferring from S-1 to S-2. It is not known how the valve at S-1 was left open. (Written notification made on May 17, 1991.)

¹It should be noted that false alarms are not uncommon in warm weather. The vinyl chloride boils overhead in the spherical tank and collects in the line on which part of the liquid level sensing instrumentation is mounted and sometimes triggers false alarms indicating higher levels than actually exist.