

VENTURA COUNTY AIR POLLUTION CONTROL DISTRICT

**RULE 74.8 - REFINERY VACUUM PRODUCING SYSTEMS, WASTEWATER SEPARATORS AND PROCESS TURNAROUNDS**

*(Adopted 6/19/79, Revised 7/5/83)*

A. Requirements for Refinery Vacuum Producing Systems

1. A person shall not use any vacuum producing system at a petroleum refinery for handling reactive organic compounds unless all reactive organic compounds are prevented from entering the atmosphere to the extent required by Section A.2.
2. Compliance with Section A.1 of this Rule shall be accomplished in part by:
  - a. Containing all uncondensed reactive organic compound vapors emitted from vacuum producing systems and piping those vapors to a firebox, a flare, or adding said vapors to refinery fuel gas or feedstocks; or
  - b. Controlling uncondensed reactive organic compound vapors emitted from vacuum producing systems by methods which the Air Pollution Control Officer has determined will not allow any such vapors to be emitted to the atmosphere.
3. A person shall enclose until introduced to a sewer all streams of water containing reactive organic compounds which have been condensed in a condenser associated with a vacuum device in a petroleum refinery. Any gaseous reactive organic compounds emitted from the enclosure shall be collected and disposed of in a manner required by Section A.2 of this Rule.

B. Requirements for Refinery Wastewater Separators

1. A person shall not use any inlet distribution header or compartment of a wastewater separator at a petroleum refinery unless said heater or compartment is equipped with:
  - a. A solid cover with all openings sealed totally enclosing the compartment liquid contents, except for such breathing vents as are structurally necessary; or
  - b. A floating cover which extends to within 0.125 inches of the wall of said compartment or header at all points on the perimeter of the cover except over a cumulative length of no more than three percent of the perimeter, the cover shall extend to within 0.5 inches of the wall; or
  - c. Controls which the Air Pollution Control Officer has determined will reduce reactive organic compound gas emissions from said compartment or header to or below the mass emission rate which would occur if controls described in B.1.a or B.1.b were applied.

2. All gauging and sampling devices in the compartment cover shall be equipped with a cover that is in a closed position at all times except when the devices are in actual use or when the compartment does not contain reactive organic compounds.

C. Requirements for Refinery Process Turnaround

1. A person shall not vent reactive organic compounds to the atmosphere during the process depressurization of the vessel purging steps of a refinery process turnaround.
2. Compliance with Section C.1 of this Rule shall be accomplished by venting all uncondensed reactive organic compound gases to a fuel gas system or to a flare, or by other methods which the Air Pollution Control Officer has determined will prevent said gases from being emitted to the atmosphere.
3. Upon receipt and validation of documentation of the infeasibility of using existing control facilities to control the purge gas stream from a process vessel, the Air Pollution Control Officer may exempt that process vessel from those requirements of Section C.2 which would otherwise require the control of such purge gases. The necessity to install valves or piping or to purge the process vessel at a lower rate than would otherwise be used shall not constitute grounds for exemption.

D. Definitions - For the purpose of this Rule, the following definitions apply:

1. "Vacuum Producing Systems" mean:
  - a. Steam ejectors with contact condensers, including hot wells;
  - b. Steam ejectors with surface condensers, including hot wells; and
  - c. Mechanical vacuum pumps.
2. "Wastewater Separators" means any device used for separating organic liquids from refinery wastewater.
3. "Process Turnaround" means the operation of unit (i.e., reactors, fractionators, etc.) shutdown.
4. "Reactive Organic Compound" means any compound of carbon excluding carbon monoxide, carbon dioxide, carbon acid, metallic carbides, carbonates, and methane.