

SAN LUIS OBISPO COUNTY AIR POLLUTION CONTROL DISTRICT

RULE 413 - HEXAVALENT CHROMIUM IN COOLING TOWERS

(Adopted 9/4/90)

A. APPLICABILITY

This Rule is applicable to all cooling towers where circulating water is exposed to the atmosphere.

B. DEFINITIONS

For the purposes of this Rule, the following definitions shall apply:

1. "Chromium": Means hexavalent chromium.
2. "Cooling Tower": Means a device which evaporates circulating water to remove heat from a process, building or refrigerator and puts heat into the ambient air.

C. REQUIREMENTS - GENERAL

1. No person shall sell, offer for sale or specify the use of hexavalent chromium for cooling towers with circulating water exposed to the atmosphere after January 1, 1991.
2. No person shall add any hexavalent chromium containing compounds to the circulating water of any cooling tower after January 1, 1991.
3. No person shall operate any cooling tower if the circulating water contains a concentration of hexavalent chromium equal to or greater than 0.15 milligrams per liter after January 1, 1991.

D. REQUIREMENTS - TESTING

1. The owner or operator shall test the cooling water in every tower:
 - a. No later than December 31, 1990, for the concentration of hexavalent chromium in milligrams per liter.
 - b. Semiannually after January 1, 1991, for the concentration of hexavalent chromium in milligrams per liter.
2. If, after January 1, 1991, two consecutive semiannual tests show concentrations of hexavalent chromium less than 0.15 milligrams per liter of circulating water, then testing as specified under Section D.1.b will no longer be required. The APCO may require that testing be resumed at any time if there is reason to believe that the circulating water contains hexavalent chromium in concentrations greater than 0.15 milligrams per liter.
3. If hexavalent chromium has not been used in a cooling tower since January 1, 1990, or if hexavalent chromium has never been used in a cooling tower, the owner or operator of that cooling tower may petition the APCO for relief from the testing requirements of this Section. Testing of the circulating water at any time may be required, however, if the APCO has reason to believe that the circulating water contains hexavalent chromium.

E. TEST METHOD

1. Tests required under Section D will be conducted using the American Public Health Association Method 312B (See "Standard Methods for Examination of Water and Wastewater", Sixteenth Edition, published by the American Public Health Association).
2. All test samples will be taken when the cooling water has been circulating for at least two hours.

F. RECORDKEEPING

The results of all testing accomplished shall be maintained on site for a minimum of three years and shall be made available to the District on request.

G. REPORTING

1. The results of testing accomplished under Section D.1.a shall be submitted to the District not later than February 1, 1991.
2. The results of testing accomplished under Section D.1.b shall be submitted to the District, no later than March 1st of each calendar year.
3. If testing will be suspended under Section D.2, the last annual report shall contain a statement to that effect.

H. COMPLIANCE SCHEDULE

1. The owner or operator of any cooling tower constructed after September 30, 1990, shall comply with Section C.3 when first operated.
2. The owner or operator of any cooling tower using hexavalent chromium or which used hexavalent chromium after January 1, 1990, shall submit a compliance plan by January 1, 1991, subject to the APCO's approval, delineating actions to be taken to attain compliance.
3. The owner or operator of any cooling tower which has not used hexavalent chromium in the circulating water since January 1, 1990, may apply to the District for relief from testing in accordance with the provisions of Section D.3.