

APPROVED FOR FINAL
May 30, 1978

State of California
AIR RESOURCES BOARD

May 24, 1978

Resolution 78-30 (A)

WHEREAS, Health and Safety Code Section 39606(b) requires the Air Resources Board to adopt standards of ambient air quality for the protection of the public health, safety, and welfare, including, but not limited to, health, illness, irritation to the senses, aesthetic value, interference with visibility, and effects on the economy;

WHEREAS, Health and Safety Code Section 41700 prohibits any person from discharging quantities of air contaminants which endanger the health and welfare of a considerable number of persons or the public;

WHEREAS, the Board has received and reviewed a substantial body of evidence and testimony, in both written and oral form, from its staff and expert members of the public at a meeting and hearings held on January 25, 1978, April 27, 1978, and May 24, 1978, relating to the adverse health effects including carcinogenic, mutagenic and teratogenic effects, of vinyl chloride (chloroethene, $\text{CH}_2=\text{CHCl}$);

WHEREAS, there is no agreement in the scientific community as to whether a threshold ("no-effect") level can be specified or even exists for chemical carcinogens such as vinyl chloride;

WHEREAS, Health and Safety Code Section 39606(b) requires standards relating to health effects to be based upon the recommendations of the State Department of Health;

WHEREAS, the Board has received a recommendation from the State Department of Health and its Air Quality Advisory Committee that the ambient levels for vinyl chloride averaged over 24 hours be controlled at the lowest feasible level;

WHEREAS, the Board finds that there is no known level of ambient concentration of vinyl chloride below which an endangerment of the public health and welfare does not occur;

WHEREAS, the National Emission Standard for Hazardous Air Pollutants (NESHAP) standard for vinyl chloride does not assure that community exposure to vinyl chloride will be limited to any specified level;

WHEREAS, the Board finds that the lowest concentration level at which reliable measurements can be made is 0.010 ppm; and

WHEREAS, the Board has held proceedings in conformance with the provisions of Chapter 4.5 (commencing with Section 11371), Part 1, Division 3, Title 2 of the Government Code;

NOW, THEREFORE, BE IT RESOLVED, that the Board adopts an ambient air quality standard for vinyl chloride, of 0.010 ppm, twenty-four hour average.

BE IT FURTHER RESOLVED, that the Board adopts this standard for vinyl chloride to implement and interpret Section 41700 of the Health and Safety Code and to establish a basis for immediate enforcement action if warranted.

BE IT FURTHER RESOLVED, that the Board specifies the measurement method developed by its staff and described in detail in Appendix 5 of Staff Report 78-8-3, or any method determined by the Executive Officer to be equivalent to this method with respect to accuracy, precision and specificity, as the method to be used in determining whether ambient concentrations of vinyl chloride exceed the standard.

BE IT FURTHER RESOLVED, that the Board amends its regulation in Title 17, California Administrative Code, by adding a new section 70200.5, to read as follows:

70200.5 Ambient Air Quality Standards for Hazardous Substances.

Substance	Concentration and Methods	Duration of Averaging Periods	Most Relevant Effects	Comments
Vinyl Chloride (Chloroethene CH ₂ =CHCl)	0.010 ppm ARB method specified in Staff Report 78-8-3	24 hours	Known human and animal carcinogen	Low-level effects are undefined, but are potentially serious. Level is not a threshold level and does not necessarily protect against harm. Level specified is lowest level at which violation can be reliably detected by the method specified. Ambient concentrations at or above the standard constitute an endangerment to the health of the public.