State of California
AIR RESOURCES BOARD

Resolution 87-28

March 27, 1987

Agenda Item No.: 87-5-2

WHEREAS, on September 19, 1985, pursuant to Health and Safety Code Section 39662, the Air Resources Board ("ARB" or the "Board") identified ethylene dichloride as a toxic air contaminant for which there is not sufficient available scientific evidence to support the identification of a threshold exposure level below which no significant adverse health effects are anticipated (Title 17, California Administrative Code, Section 93000);

WHEREAS, following identification of ethylene dichloride as a toxic air contaminant, the staff prepared for the Board's review a report titled "Control Plan for Airborne Ethylene Dichloride" (the "Report") which addresses the present and future uses and emissions of ethylene dichloride, the exposure to and risk from ethylene dichloride, the persistence of ethylene dichloride in the ambient air, and the potential for reducing risk through application of control measures for ethylene dichloride;

WHEREAS, the people of California in general are, or will be by 1990, exposed to an annual average ambient concentration, based on a modelling analysis, of ethylene dichloride of less than .01 part per billion;

WHEREAS, current ethylene dichloride monitoring techniques are not sufficiently sensitive to report ambient concentrations and thus confirm the modelled exposures;

WHEREAS, the Department of Health Services ("DHS") concluded in its health effects evaluation that the added lifetime cancer risk from ethylene dichloride ranges from 53 to 88 excess cases per million people continuously exposed to one part per billion of ethylene dichloride;

WHEREAS, the Scientific Review Panel, established pursuant to Health and Safety Code Section 39670, concurred with DHS' estimates of risk from ethylene dichloride;

WHEREAS, recent federal regulations affecting the use of ethylene dichloride (restrictions on its use as a pesticide and restrictions on lead content in gasoline) are expected to reduce the 1983 emission rates by approximately 80 percent by 1990;

WHEREAS, in the absence of additional control measures, the general cancer risk from exposure to ambient concentrations of ethylene dichloride in California will decline, and by the year 1990 the estimated potential risk will be 0.5 lifetime case per million persons;

WHEREAS, the staff has concluded in the Report that control measures for ethylene dichloride should not be developed at this time for the following reasons: (1) the highest estimated basinwide ethylene dichloride risk in 1990 in the state is 0.5 case per million persons in the South Coast Air Basin; (2) this estimate is based entirely on modelling emission data and cannot be confirmed with monitoring until a more sensitive analytical method is developed, and (3) because of the uncertainty of the data it cannot be determined if application of controls on the large ethylene dichloride point sources in the South Coast Air Basin will result in a quantifiable reduction in the health risk;

WHEREAS, the staff of the Board made the Report available to the public and to the Technical Review Group consisting of representatives from the districts, the ARB, and the Environmental Protection Agency;

WHEREAS, at a duly noticed public meeting held March 27, 1987, the Board reviewed the Report and considered the written comments and public testimony it received; and

WHEREAS, the Board finds that the Report adequately discusses the public health risks from exposure to ethylene dichloride and the need for control measures for ethylene dichloride;

NOW, THEREFORE, BE IT RESOLVED that the Board hereby approves the staff report titled "Control Plan for Airborne Ethylene Dichloride" and concurs with the staff's conclusion that control measures for ethylene dichloride should not be developed at this time; that staff is to submit information to the South Coast Air Quality Management District staff on emissions, risks, and potential controls for the three large ethylene dichloride sources in the District and work with the District to further analyze the information; that the staff should continue development of a sensitive ambient monitoring technique to monitor ambient levels of ethylene dichloride; and that if the staff determines that ethylene dichloride ambient concentrations and the corresponding risks are quantifiable with a higher degree of certainty than estimated in this report, the staff will reassess control of the specific sources and report its findings to the Board.

I hereby certify that the above is a true and correct copy of Resolution 87-28, as adopted by the Air Resources Board.

Harold Holmes

Harold Holmes, Board Secretary