STATE WATER RESOURCES CONTROL BOARD

RESOLUTION NO. 81-73

REVIEW BY THE STATE WATER RESOURCES CONTROL BOARD OF AMENDMENTS TO THE WATER QUALITY CONTROL PLANS FOR THE NORTH COASTAL AND KLAMATH RIVER BASINS ADOPTED BY THE NORTH COAST REGIONAL WATER QUALITY CONTROL BOARD RELATING TO THE CONTROL OF DISCHARGES OF 2,4,5-T; 2,4,5-TP; AND 2,4-D

WHEREAS:

- The State and Regional Boards are the agencies created by the Legislature to exercise the adjudicatory and regulatory functions of the State in the field of water resources.
- One of these statutory functions is to regulate dischargers of waste which may affect the quality of the waters of the State.
- 3. Each Regional Board is required to formulate, adopt and periodically review Water Quality Control Plans for all areas within the region.
- 4. Water Quality Control Plans establish (1) beneficial uses of water to be protected, (2) water quality necessary to protect such beneficial uses, and (3) a program of implementation needed for achieving water quality objectives.
- 5. Water Quality Control Plans may specify certain conditions or areas where the discharge of waste, or certain types of waste will not be permitted.
- 6. Herbicides, when discharged to the waters of the State incidental to their intended purposes, are construed to be wastes.
- 7. The State and Regional Boards have a statutory duty and obligation to regulate the discharge of pesticide, including herbicide, wastes which may affect the waters of the State.
- 8. Pursuant to this authority, the North Coast Regional Water Quality Control Board adopted amendments to the Water Quality Control Plans for North Coastal and Klamath River Basins on January 22, 1981.
- 9. The amendments adopted by the Regional Board are for the control of 2,4,5-T; 2,4,5-TP; and 2,4-D herbicide waste discharges from timber production operations.
- 10. Water Quality Control Plan amendments do not become effective until approved by the State Board. The State Board may approve the amendments or return them to the Regional Board for reconsideration.
- 11. The State Board held a public meeting on April 10, 1981, and a public hearing on May 19, 1981 where testimony and comments were received regarding the Water Quality Control Plan amendments.

- 12. In reviewing the prohibitions against the discharge of 2,4,5-T and 2,4,5-TP, notice has been taken of the fact that the use of these herbicides has been suspended by the federal Environmental Protection Agency (EPA).
- 13. In reviewing the prohibition against the discharge of 2,4-D, notice has been taken of the methodology published by EPA in the November 28, 1980 Federal Register.
- 14. This methodology has been developed by EPA as a means to determine pollutant concentrations in receiving waters that will, when not exceeded, reasonably protect human health and aquatic life.
- 15. The methodology consists of a systematic approach for assessing valid and appropriate data concerning acute and chronic adverse effects of pollutants on aquatic organisms.
- 16. The EPA methodology provides that numerical limits developed through this process should be modified only when sound scientific evidence indicates that such values significantly over protect or under protect beneficial uses.
- 17. 2,4-D propylene glycol butyl ether ester (PGBEE) is the predominant form of 2,4-D used in the North Coast. Other ester forms have been used in the past and could be used in the future.
- 18. 2,4-D PGBEE is one of the more toxic ester forms of 2,4-D to aquatic life and is used in aerial spray operations for timber production operations.
- 19. State Board staff has completed a report based on its application of the EPA methodology to aquatic toxicity data regarding 2,4-D PGBEE. The staff report concludes that use of EPA methodology for this substance results in a receiving water limit of 40 parts per billion acid equivalent instantaneous maximum and 2 parts per billion acid equivalent 24-hour average for the protection of aquatic life.
- 20. Based on available information, the timber industry can and has voluntarily complied with such limits.
- 21. Regionwide information should be developed to ensure that the 40 ppb and 2 ppb limitations are appropriate for ester forms of 2,4-D used in aerial spray operations for timber production purposes in the North Coast Region.
- 22. An effective monitoring and sampling program is essential to determine that the 24-hour average (based on a composite sample) and instantaneous concentrations are being met.
- 23. The Regional Board should work closely with the timber agency in the development of the monitoring program and field studies.

- 24. The State Board has reviewed and carefully considered all testimony and comments received on this matter.
- 25. Based on such review, the following changes should be made to the Water Quality Control Plan amendments:
 - a. Add the following language after the first paragraph of the section entitled, "Action Plan for Control of Discharges of Herbicide Waste from Silvicultural Applications,":

"It is not the intent of the Board to require the discharger to furnish information that has already been furnished to other agencies. Accordingly, the Executive Officer shall obtain the needed information from other governmental agencies to the maximum extent possible."

b. The following text should be substituted for the second discharge prohibition contained in the amendments:

"There shall be no discharge of 2,4-D (ester forms) to waters of the State that would cause the concentration of that substance in the receiving waters to exceed an instantaneous maximum of 40 ppb acid equivalent or a 24-hour average of 2 ppb acid equivalent."

26. The remaining amendments to the Water Quality Control Plan are appropriate and proper.

THEREFORE BE IT RESOLVED:

- 1. That those amendments to the Water Quality Control Plans listed under Item 25 above are returned to the Regional Board for the purpose of making the revisions indicated.
- 2. That the remaining amendments are approved.
- 3. That the Regional Board is directed to immediately reconsider the prohibition of 2,4,5-T and 2,4,5-TP should EPA lift its suspension of the use of these substances for timber production purposes.
- 4. That such revisions must be made and the revised amendments returned to the State Board no later than August 31, 1981. Failure to do so by that date will be considered a resubmission of the original amendments.
- 5. That the 40 ppb instantaneous maximum acid equivalent and 2 ppb 24-hour average acid equivalent values for the 2,4-D ester forms are limits which shall be used until region-specific field and laboratory studies are completed in December 1983. The prohibition for 2,4-D shall be re-examined by the Regional Board after region-specific field and laboratory data are obtained.

- 6. That the State and Regional Boards, in cooperation with the State Departments of Food and Agriculture and Fish and Game, County Agricultural Commissioners, and the timber industry, shall develop and conduct the necessary regional field and laboratory studies. These studies shall give consideration to the 2,4-D ester forms that will be used in aerial spray operations for timber production purposes.
- 7. That the Regional Board, in cooperation with the State Board, the State Department of Food and Agriculture, County Agricultural Commissioners, and the timber industry, shall develop guidelines for compliance monitoring including sampling methods and equipment and sampling site locations.

DATED: July 16, 1981

Carla M. Bard, Chairwoman

S. L. Hitchell

L. L. Mitchell, Vice Chairman

11 B. Dunlap, Member

VOTED NO

F. K. Aljibury, Member