CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD
SAN FRANCISCO BAY REGION

TENTATIVE ORDER NO. 93-161

AMENDMENT OF SITE CLEANUP REQUIREMENTS, 89-115 FOR:

LYNCH CIRCUITS, INC.
AND
SILICONIX, INC.
1140 WEST EVELYN AVENUE FACILITY
SUNNYVALE
SANTA CLARA COUNTY

The California Regional Water Quality Control Board, San Francisco Bay Region (hereinafter called the Board) finds that:

Site Description

1. Lynch Circuits, Inc., the current owner, operated from 1977 to 1987 the facility located at 1140 West Evelyn Avenue, Sunnyvale, California (hereinafter called Site). Siliconix, Inc., a former occupant, operated the Site from 1962 to 1970. Lynch Circuits, Inc. and Siliconix, Inc. shall hereinafter be referred to as the Dischargers.

Site History

2. Reported chemical handling facilities at the Site include a former aboveground chemical treatment system, a former waste chemical storage area and an acid and trichloroethene (TCE) sump location. Soil and groundwater pollution existing near or under these handling facilities include TCE up to 610 μg/l in the soil and up to 7100 μg/l in the groundwater. Another pollutant found onsite in the groundwater was cis-1,2-dichloroethene at 1800 μg/l.

Soil and Groundwater Contamination

3. Priority pollutant metals in groundwater have only been detected at low or non-detectable concentrations at or below the Board's Basin Plan for discharge to surface waters. Data are sufficient to conclude that metal concentrations are background, and to establish baseline levels for these metals, and that previous activities at the Site have not significantly impacted groundwater quality with respect to priority metals. The VOC sampling has established baseline levels.

Basin Plan Requirements

4. The Board adopted a revised Water Quality Control Plan for the San Francisco Bay Region (Basin Plan) on December 17, 1986 and amended it on August 19, 1987, July 18, 1989, October 21, 1992 and December 11, 1992. This Order implements the water quality objectives for the Basin Plan.

5. The existing and potential beneficial uses of the ground water in the area are:

   A. Municipal Supply;
   B. Industrial Process and Service Supply; and,
   C. Agricultural Supply.

CEQA

6. This action is an Order to enforce the laws and regulations administered by the Board. This action is categorically exempt from the provisions of the CEQA pursuant to Section 15321, Title 14, CCR.

Notifications

7. The Board has notified the Discharger and interested agencies and persons of its intent under California Water Code Section 13304 to prescribe amendments to the Site Cleanup Requirements for the discharge and has provided them with an opportunity for a public hearing and an opportunity to submit their written views and recommendations.

8. The Board, in a public meeting, heard and considered all comments pertaining to the discharge.

IT IS HEREBY ORDERED, pursuant to Section 13304 of the California Water Code, that the dischargers shall cleanup and abate the effects described in the above findings in compliance with Board Order No 89-115, as amended by order No. 90-090, 91-018 and this order as follows:

Add the following provisions to Order 89-115 as amended:

1. Provision 16 is added as follows:

   Pursuant to Section 13304 of the Water Code, the discharger is hereby notified that the Regional Board is entitled to, and may seek reimbursement for, all reasonable costs actually incurred by the Regional Board to investigate unauthorized discharges of waste and to oversee cleanup of such waste, abatement of the effects thereof, or other remedial action, required by this order. Upon receipt of a billing statement for such costs, the discharger shall reimburse the Regional Board.

2. Provision 17 is added as follows:

   The Discharger shall maintain a copy of this order at the Site so as to be available at all times to project personnel.

3. Provision 18 is added as follows:

   The Discharger's technical reports shall include a projection of the cost, effectiveness, benefits, and impact on public health, welfare, and environment of each alternative measure. The reports shall consider the guidance provided by the State Water Resources Control Board's Resolution No. 68-16, "Statement of Policy with Respect to Maintaining High Quality

of Waters in California".

4. Provision 19 is added as follows:

Technical reports, submitted by the Discharger, in compliance with the Prohibitions, Specifications, and Provisions of this Order shall be submitted to the Board on the schedule specified herein. These reports shall consist of a letter report that includes the following:

a. A summary of work completed since submittal of the previous report and work projected to be completed by the time of the next report;

b. Identification of any obstacles which may threaten compliance with the schedule of this Order and what actions are being taken to overcome these obstacles;

c. In the event of non-compliance with any Prohibition, Specification or Provision of this Order, written notification which clarifies the reasons for non-compliance and which proposes specific measures and a schedule to achieve compliance. This written notification shall identify work not completed that was projected for completion, and shall identify the impact of non-compliance on achieving compliance with the remaining requirements of this Order; and,

d. In the first self-monitoring report, an evaluation of the current ground water monitoring system and a proposal for modifications as appropriate.

5. Provision 20 is added as follows:

The Board considers the property owner and site operator to have a continuing responsibility for correcting any problems within their reasonable control which arise in the future as a result of this waste discharge or water applied to this property during subsequent use of the land for other purposes.

6. Provision 21 is added as follows:

These requirements do not authorize the commission of any act causing injury to the property of another or of the public, do not convey any property rights, do not remove liability under federal, state or local laws, and do not authorize the discharge of waste without the appropriate federal, state or local permits, authorizations, or determinations.

7. Provision 22 is added as follows:

If the Discharger is delayed, interrupted or prevented from meeting one or more of the completion dates specified in this Order, the Discharger shall promptly notify the Executive Officer and the Board may consider revision to this Order.

8. Provision 14 shall be replaced as follows:

If any hazardous substance is discharged in or on any waters of the state, or discharged and

deposited, or probably will be discharged in or on any waters of the state, the Discharger shall:

(1) Report such discharge to the following:

(a) This Regional Board at (510) 286-1255 on weekdays during office hours from 8 a.m. to 5 p.m.; and,
(b) The Office of Emergency Services at (800) 852-7550.

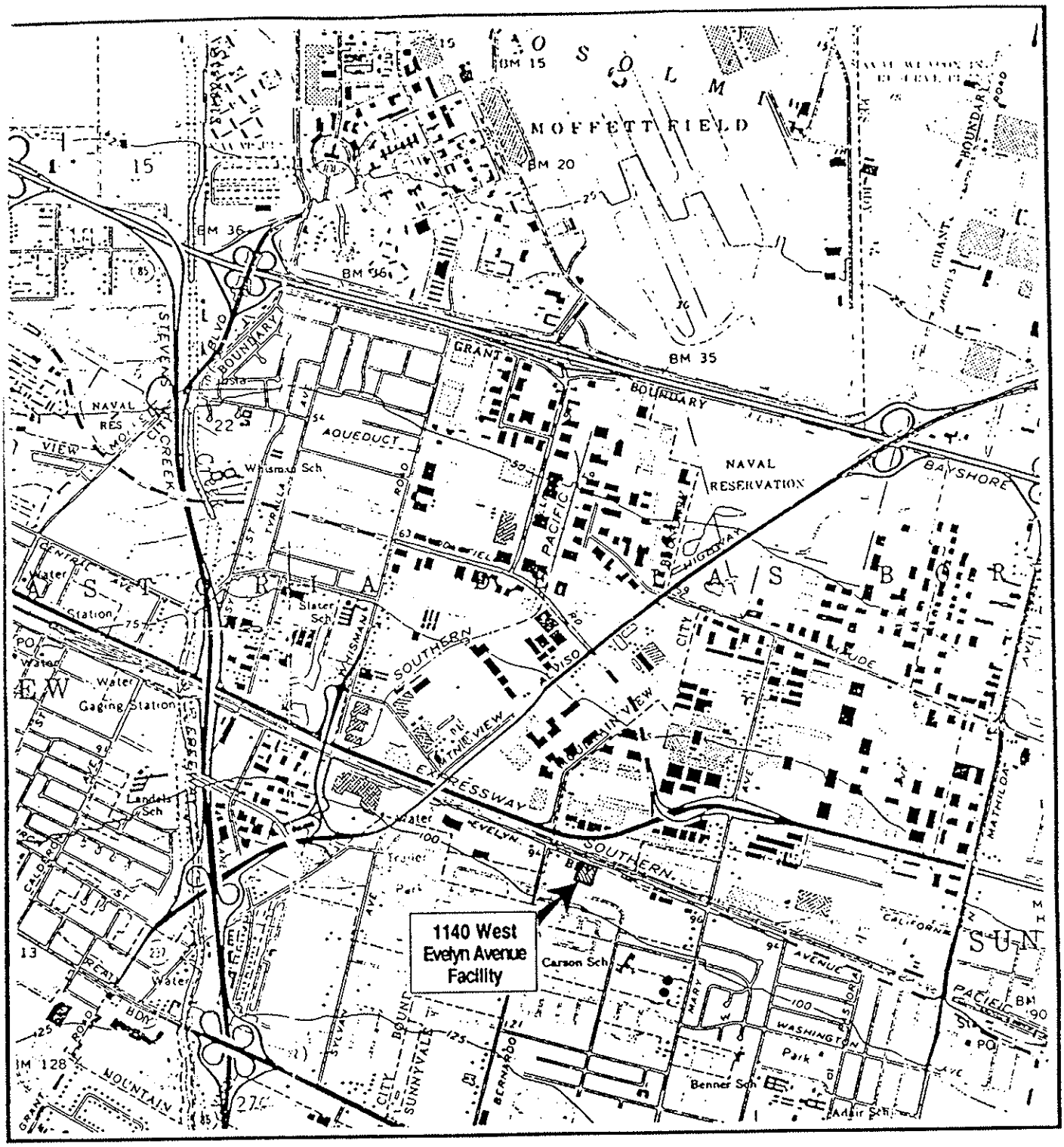
(2) A written report shall be filed with the Regional Board within five working days and shall contain information relative to the following:

(a) The nature of waste or pollutant;
(b) The quantity involved and the duration of incident;
(c) The cause of spill;
(d) The estimated size of affected area;
(e) The corrective measures that have been taken or planned, and a schedule of these measures; and,
(f) The persons/agencies notified.

I, Steven R. Ritchie, Executive Officer, do hereby certify the foregoing is a full, true, and correct copy of an Order adopted by the California Regional Water Quality Control Board, San Francisco Bay Region on December 15, 1993.

Steven R. Ritchie
Executive Officer

Attachments:
Figure 1: Site Location Map
Figure 2: Site Plan, Well Location Map



0 1/2 1 MILE

MAP SOURCE:
U.S.G.S. Mountain View, California
15' Quadrangle

Figure 1 : REGIONAL MAP

Project No. 1552.01

LEVINE • FRICKE
CONSULTING ENGINEERS AND HYDROGEOLOGISTS

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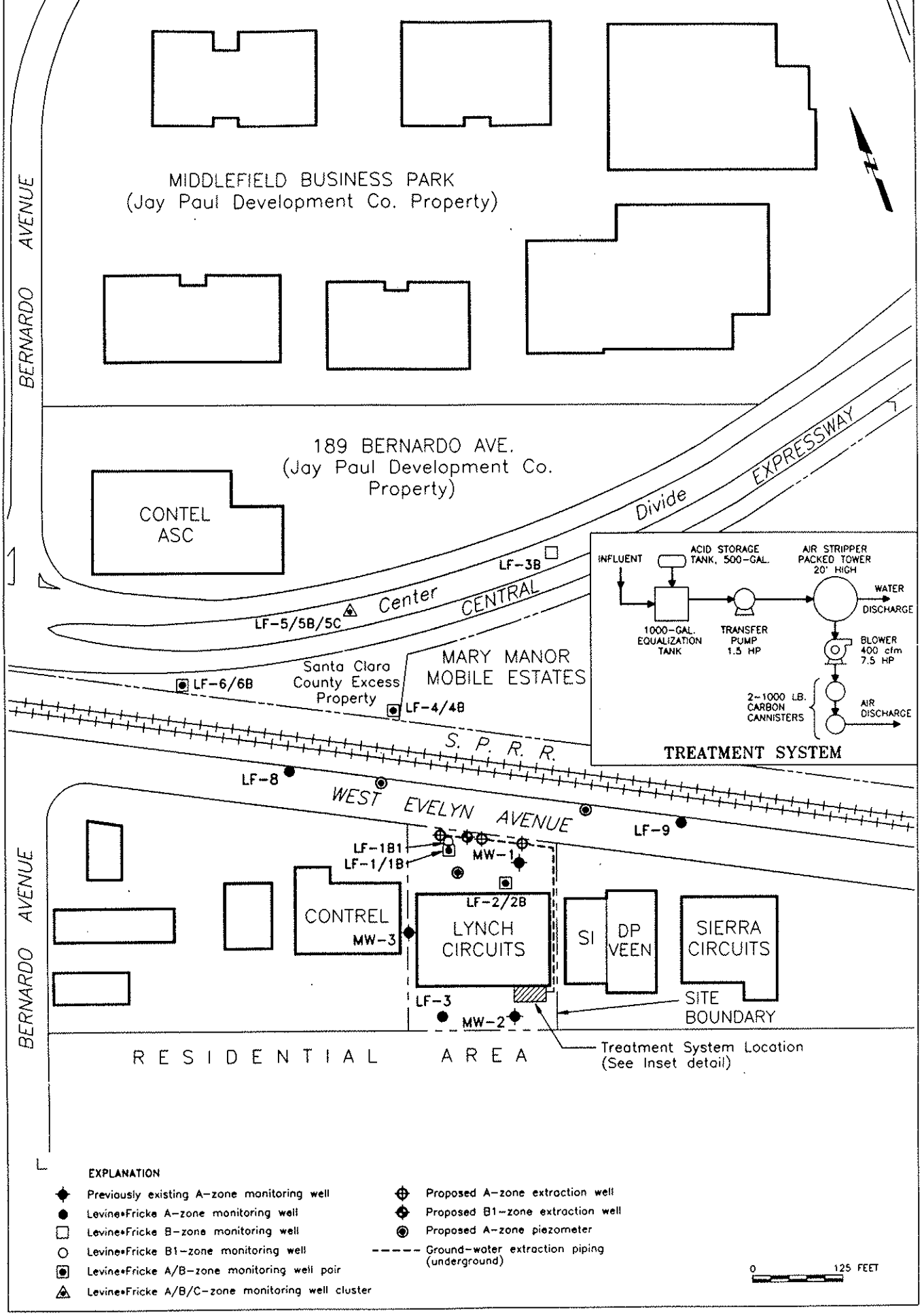

Figure 2 : PROPOSED GROUND-WATER EXTRACTION AND TREATMENT SYSTEM LOCATION

CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD
SAN FRANCISCO BAY REGION

SELF-MONITORING PROGRAM

FOR

LYNCH CIRCUITS, INC. AND SILICONIX,INC.
1140 WEST EVELYN AVENUE FACILITY, SUNNYVALE, SANTA CLARA COUNTY

SITE CLEANUP REQUIREMENTS

ORDER NO. 93-161

CONSISTS OF

PART A

AND

PART B

PART A

A. General

1. Reporting responsibilities of waste Dischargers are specified in Sections 13225(a), 13267(b), 13383, and 13387(b) of the California Water Code and this Regional Board's Resolution No.73-16.

2. The principal purposes of a self-monitoring program by a waste Discharger are the following:

   a. To document compliance with Site Cleanup Requirements and prohibitions established by the Board;

   b. To facilitate self-policing by the waste Discharger in the prevention and abatement of pollution arising from waste discharge;

   c. To develop or assist in the development of standards of performance, toxicity standards and other standards; and,

   d. To prepare water and wastewater quality inventories.

B. Sampling And Analytical Methods

1. Sample collection, storage, and analyses shall be performed according to the most recent version of Standard Methods for the Analysis of Wastewater, and Test Methods for Evaluating Solid Waste EPA Document SW-846, or other EPA approved methods and in accordance with an approved sampling and analysis plan.

2. Water and waste analysis (except total suspended solids) shall be performed by a laboratory approved for these analyses by the State Department of Health. The director of the laboratory whose name appears on the certification shall supervise all analytical work in his/her laboratory and shall sign all reports of such work submitted to the Regional Board.

3. All monitoring instruments and equipment shall be properly calibrated and maintained to ensure accuracy of measurements.

C. Definition Of Terms

1. A grab sample is a discrete sample collected at any time.

2. Duly authorized representative is a duly authorized representative may thus be either a named individual or any individual occupying a named position such as the following:

   a. Authorization is made in writing by a principal executive officer; or,

b. Authorization specifies either an individual or a position having responsibility for the overall operation of the regulated facility or activity, such as general partner in a partnership, sole proprietor in a sole proprietorship, the position of plant manager, operator of a well or a well field, superintendent, position of equivalent responsibility, or an individual or position having overall responsibility for environmental matters for the company.

D. Schedule Of Sampling, Analysis, And Observations

The Discharger is required to perform sampling, analysis, and observations according to the schedule specified in Part B.

E. Records To Be Maintained By The Discharger

1. Written reports shall be maintained by the Discharger for ground water monitoring and wastewater sampling, and shall be retained for a minimum of three years. This period of retention shall be extended during the course of any unresolved litigation regarding this discharge or when requested by the Board. Such records shall show the following for each sample:

   a. Identity of sample and sample station number;
   b. Date and time of sampling;
   c. Method of composite sampling (See Section C-Definition of Terms);
   d. Date and time that analyses are started and completed, and name of the personnel performing the analyses;
   e. Complete procedure used, including method of preserving the sample, and the identity and volumes of reagents used. A reference to a specific section of a reference required in Part A Section B is satisfactory;
   f. Calculation of results;
   g. Results of analyses, and detection limits for each analyses; and,
   h. Chain of custody forms for each sample.

F. Reports To Be Filed With The Board

1. Ground water monitoring results shall be issued in an annual report. Written self-monitoring reports shall be filed no later than January 15, 1994. The annual report shall be filed as indicated. The reports shall be comprised of the following:

   a. Letter of Transmittal - A letter transmitting the essential points in each self-monitoring report should accompany each report. Such a letter shall include a discussion of any requirement violations found during the last report period, and actions taken or planned for correcting the violations, such as, operation and/or facilities modifications. If the Discharger has previously submitted a detailed time schedule for correcting requirement violations, a reference to the correspondence transmitting such schedule will be satisfactory. If no violations have occurred in the last report period this shall be stated in the letter of transmittal. Monitoring reports and the letter transmitting the

monitoring reports shall be signed by a principal executive officer at the level of vice president or his duly authorized representative, if such representative is responsible for the overall operation of the facility from which the discharge originates. The letter shall contain a statement by the official, under penalty of perjury, that to the best of the signer's knowledge the report is true, complete, and correct. The letter shall contain the following certification:

"I certify under penalty of law that this document and all attachments are prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the person or persons who managed the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations."

b. Each monitoring report shall include a compliance evaluation summary sheet. Until the Order's amended to specify ground water protection standards, the following shall apply and the compliance sheet shall contain:

   i. The method and time of water level measurement, the type of pump used for purging, pump placement in the well, method of purging, pumping rate, equipment and methods used to monitor field Ph, temperature, and conductivity during purging, calibration of the field equipment, results of the Ph, temperature conductivity and turbidity testing, well recovery time, and method of disposing of the purge water; and,

   ii. Type of pump used, pump placement for sampling, a detailed description of the sampling procedure; number and description of equipment, field and travel blanks; number and description of duplicate samples; type of sample containers and preservatives used, the date and time of sampling, the name and qualifications of the person actually taking the samples, and any other observations; the chain of custody record.

c. A summary of the status of any remediation work performed during the reporting period. This shall be a brief and concise summary of the work initiated and completed as follows:

   i. As interim corrective action measures; and,

   ii. To define the extent and rate of migrations of waste constituents in the soil and ground water at the site.

d. The Discharger shall describe, in the annual report, the reasons for significant increases in a pollutant concentration at a well on-site. The description shall include the following:

i. The source of the increase;

ii. How the Discharger determined or will investigate the source of the increase; and,

iii. What source removal measures have been completed or will be proposed.

e. A map or aerial photograph showing observation and monitoring station locations, and plume contours for each chemical in each aquifer shall be included as part of the Self-Monitoring Report.

f. Laboratory statements of results of analyses specified in Part B must be included in each report. The director of the laboratory whose name appears on the laboratory certification shall supervise all analytical work in his/her laboratory and shall sign all reports of such work submitted to the Board. The following information shall be provided:

i. The methods of analyses and detection limits must be appropriate for the expected concentrations. Specific methods of analyses must be identified. If methods other than EPA approved methods or Standard Methods are used, the exact methodology must be submitted for review; and,

ii. In addition to the results of the analyses, laboratory quality control/quality assurance (QA/QC) information must be included in the monitoring report. The laboratory QA/QC information should include the method, equipment and analytical detection limits; the recovery rates; an explanation for any recovery rate that is less than 80%; the results of equipment and method blanks; the results of spiked and surrogate samples; the frequency of quality control analysis; and the name and qualifications of the person(s) performing the analyses.

g. Commencing with the report due by January 15, 1994, the Discharger shall submit a semiannual report to the Board covering the previous quarter sampling results taken between October and December. For the sampling done between April and June, the semiannual report shall be due July 15. The reports shall contain:

i. Tabular and graphical summaries of the monitoring data obtained during the previous years;

ii. A comprehensive discussion of the compliance record, and the corrective actions taken or planned which may be needed to bring the Discharger into full compliance with the Site Cleanup Requirements; and,

iii. A written summary of the ground water analyses indicating any change in the quality of the ground water.

iv. Progress on implementation of the extraction system shall be included in the

semiannual report submitted to the Board. Each report containing implementation progress shall contain at least the following:

1) Summary of the six months work completed since submittal of the previous report, and work projected to be completed before submittal of next report.

2) Identification of any obstacles which may threaten compliance with the schedule and what actions are being taken to overcome these obstacles.

3) Written notification which clarifies the reasons for noncompliance with any requirement of the schedule, and which proposes specific measures and a schedule to achieve compliance. This written notification shall identify work not completed that was projected for completion, and shall identify the impact of noncompliance on achieving compliance with the remaining portion of the schedule.

G. In the event the Discharger violates or threatens to violate the conditions of the Site Cleanup Requirements and prohibitions or intends to experience a plant bypass or treatment unit bypass due to:

1. Maintenance work, power failures, or breakdown of waste treatment equipment, or;
2. Accidents caused by human error or negligence, or;
3. Other causes, such as acts of nature.

The Discharger shall notify the Regional Board office by telephone as soon as he or his agents have knowledge of the incident and confirm this notification in writing within 7 working days of the telephone notification. The written report shall include time and date, duration and estimated volume of waste bypassed, method used in estimating volume and person notified of the incident. The report shall include pertinent information explaining reasons for the noncompliance and shall indicate what steps were taken to prevent the problem from recurring.

In addition, the waste Discharger shall promptly accelerate his monitoring program to analyze the discharge at least once every day. Such daily analyses shall continue until such time as the effluent limits have been attained, until bypassing stops or until such time as the Executive Officer determines to be appropriate. The results of such monitoring shall be included in the regular Self-Monitoring Report.

Part B

VOC sampling schedule shall be semiannually.

A. Monitoring wells to be sampled in May for a report due July 15 using EPA Method 8240: MW-1, MW-2, MW-3, LF-1, LF-2, LF-3, LF-4, LF-5, LF-6, LF-8, LF-9, LF-1B, LF-2B, LF-3B, LF-4B, LF-5B, LF-6B, LF-5C, and LF-1B1.

B. Monitoring wells to be sampled in November for a report due January 15 using EPA Method 8010: MW-1, MW-2, LF-1, LF-3, LF-5, LF-6, LF-8, F-9, LF-2B, LF-3B, LF-5B, LF-6B, and LF-5C

C. Further pollutant migration onto adjacent property shall not occur.

I, Steven R. Ritchie, Executive Officer, hereby certify that the foregoing Self-Monitoring Program is as follows:

1. Developed in accordance with the procedures set forth in this Board's Resolution No. 73-16;

2. Effective on the date shown below; and,

3. May be reviewed or modified at any time subsequent to the effective date, upon written notice from the Executive Officer, or request from the Discharger.

Steven R. Ritchie
Executive Officer

December 15, 1993
Date Ordered