

CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD
COLORADO RIVER BASIN REGION

ORDER NO. 93-026

WASTE DISCHARGE REQUIREMENTS
FOR
VENTURA COASTAL CORPORATION
INDIO PROCESSING PLANT
North of Indio - Riverside County

The California Regional Water Quality Control Board, Colorado River Basin Region, finds that:

1. Ventura Coastal Corporation (hereinafter referred to as the discharger), 39-485 Dillon Road, P.O. Box L, Indio, CA 92202-2511, owns and operates a citrus processing plant receiving cleaned fruit from packing houses. The site occupies about 700 acres of the W $\frac{1}{2}$ of Section 31, T4S, R8E and the W $\frac{1}{2}$ of Section 5, T5S, R8E, SBB&M. A site plan of Section 31 is shown in Attachment "A" appended hereto as part of this Board Order.
2. The discharger submitted updated Reports of Waste Discharge, dated November 29, 1990 and February 11, 1992, proposing a change in the volume and location of discharge.
3. The discharger is presently operating under Board Order No. 86-025 and reports discharging a maximum of 200,000 gallons-per-day of cooling water, floor and equipment washwater and peel washwater into a plastic-lined holding basin (wastewater pond) and then to 50 acres of soil via a spray system.
4. The discharger has requested that the maximum wastewater discharge be raised from 200,000 gallons-per-operating day to 500,000 gallons-per-operating day.
5. Use of the existing holding pond will cease 180 days after the adoption of this Board Order, unless authorization to continue the use of the pond is obtained from the Regional Board's Executive Officer.
6. The discharger will implement a plan for containment of wastewater prior to distribution to irrigated areas. The discharger will study options for the reconstruction of the existing pond, including a system of above ground tanks. Any containment plan selected is subject to approval of the Regional Board's Executive Officer.
7. Prior to discharge to the field, the wastewater is screened, removing all but two percent of the settleable solids. The screened out material is oven dried and marketed for different usage.
8. This processing plant normally operates seasonally from November through July.

SUPERSEDED BY
BOARD ORDER NO. 01-193

9. The discharger is receiving fruit only from packing houses which are operating under approval of the United States Department of Agriculture for handling of pesticides and other foreign materials.
10. The discharger submitted a "Site and Waste Characterization Study" (SWCS) dated April 8, 1991, analyzing the geology, hydrology, site and wastewater characteristics which indicated the pH for the native soil to be about 8.1.
11. This study showed that background ground water had a total dissolved solids (TDS) concentration of 1,173 mg/L in 1991 at Well No. 31R1 during one sampling before the plant was in operation. After the plant was in operation the background ground water TDS analyses have ranged from 635 to 1,244 mg/L.
12. The discharged wastewater was analyzed by the Regional Board's laboratory staff in 1991 and showed a pH of 3.8 and TDS of 2,724 mg/L with an inorganic (i.e.: phosphate, fluoride) TDS of 1,564 mg/L.
13. The shallowest depth to ground water at the facility was reported in Well No. 5P1 and was 66.1 feet below the ground surface (bgs) on December 29, 1990. The greatest depth to water at the facility was found in Well No. 5F2 at 147 feet bgs.
14. There are no municipal or domestic wells, only monitoring wells, within 500 feet of the proposed drip irrigation discharge area.
15. Soil underlying the facility is predominantly composed of alluvial fan and stream wash deposits of sand, gravel, and cobbles. Some clay layers were found between 100 and 600 feet.
16. The Coachella Valley Storm Water Channel courses approximately 3.5 miles south of the facility.
17. The discharger proposes to eliminate in phases the present method of piping the filtered wastewater to the existing 50-acre soil spray treatment area.
18. Five hundred acres of citrus trees are currently planted on the discharger's property surrounding the citrus processing facility.
19. The discharger proposes to irrigate the citrus trees with the wastewater, combined with ground water pumped from beneath the property which will serve as make-up water to meet the total irrigation demand by the citrus groves.
20. According to data provided by the University of California Agricultural Extension Services and the Soil Conservation Service, the citrus trees planted at a density of 150 trees per acre have an average current irrigation demand of 25 gallons-per-day per tree.
21. The discharger proposes to initially irrigate 80 acres of existing citrus tree fields with wastewater. In order to discharge a maximum of 500,000 gallons-per-day of wastewater allowed by this Board Order, the acreage undergoing irrigation must increase to 135 acres.

22. The wastewater will be delivered by pipelines from the existing pond (Finding No. 5, above) to 20 acre citrus grove segments. Irrigation will be applied to one 20-acre grove at a time and switching between groves will be computer controlled.
23. The discharger intends to retain the existing 50-acre spray disposal field to ensure adequate capacity is in place to control the hydraulic loading of the proposed system until all 130 acres are brought under irrigation.
24. The discharger reports that the following steps will be taken to ensure absence of ponding or excessive penetration by the wetting front:
 - a. All acreage planted to citrus ripped to a 6-ft. depth to provide for uniform utilization of irrigation water.
 - b. Pressure regulators installed at lateral lines in order to maintain at least 85 percent uniformity of distribution.
 - c. Discharge water is filtered twice (40 mesh, 80 mesh) and lines are flushed with fresh water after each irrigation cycle in order to prevent blockage of the system. In addition, it has been found that double filtration/line flushing will eliminate the surface buildup of insoluble solids which characterizes the spray disposal method.
 - d. An alarm system will be installed which will ring when pressure drops occur. The personnel will take required action to correct the problem.
 - e. The berms will be hydroseeded with native plants seeds, or gravel, rock or nontoxic soil binders to harden the surfaces.
25. The discharger reports that additional safeguards to the proposed system include: a differential pressure switch to shut off the wastewater pump, if a distribution pipeline breaks; and sets of paired tensiometers to be installed to detect moisture in soil at 4 foot and 6 foot intervals. The 4-foot depth tensiometer is intended to enable early corrective action to ensure no adverse impact at the 6-foot depth. The discharger also reports that prolonged saturation of soil in the root zone (4 to 5 feet in depth for citrus) will quickly result in the death of irrigated trees.
26. The discharger has constructed, and will maintain, an approximately 8-foot high dike down slope of the existing 50-acre spray field along both sides of the field and has installed a pump system to redistribute excess collected wastewater in the event of pipe breakage. A site plan of the existing berm is shown in Attachment "B" appended hereto as part of this Board Order.
27. The Water Quality Control Plan for the Colorado River Basin Region of California (Basin Plan) was adopted on May 15, 1991, and designates the beneficial uses of ground and surface waters in this Region.

28. The beneficial uses of ground waters in the Coachella Hydrologic Subunit are:
 - a. Municipal supply (MUN)
 - b. Industrial supply (IND)
 - c. Agricultural supply (AGR)
29. The beneficial uses of waters in the Coachella Valley Storm Water Channel are:
 - a. Fresh Water Replenishment of Salton Sea (FRSH)
 - b. Water Contact Recreation (REC I)
 - c. Noncontact Water Recreation (REC II)
 - d. Warm Water Habitat (WARM)
 - e. Wildlife Habitat (WILD)
 - f. Preservation of Rare, Endangered or Threatened Species (RARE)
30. This discharge is exempt from the provisions of Chapter 15, Division 3, Title 23 of the California Code of Regulations, in accordance with Section 2511(b) of this Chapter.
31. The Regional Board has notified the discharger and all interested agencies and persons of its intent to update requirements for this discharge.
32. The Regional Board in a public meeting heard and considered all comments pertaining to this discharge.
33. In accordance with California Environmental Quality Act (CEQA), the Regional Board, acting as the lead agency, processed and approved Negative Declaration SCH No. 93012093 on June 30, 1993.
34. A mitigation monitoring and reporting program containing several mitigation measures (identified in the Initial Study) was approved on June 30, 1993. This mitigation monitoring and reporting program is part of the Ventura Coastal Corporation, Indio processing plant file.
35. The Regional Board considers the property owner to have a continuing responsibility for correcting any problems which may arise in the future as a result of this waste discharge.

IT IS HEREBY ORDERED, that Board Order No. 86-025 is rescinded and in order to meet the provisions contained in Division 7 of the California Water Code and regulations adopted thereunder, the discharger shall comply with the following:

A. Discharge Prohibitions

1. The discharge of any wastewater to any surface waters or surface drainage courses is prohibited.
2. The discharge of wastewater other than from the citrus processing plant (as described in Finding No. 1 of this Board Order), is prohibited.

B. Discharge Specifications

1. The treatment or disposal of waste at this facility shall not cause pollution or a nuisance as defined in Sections 13050(1) and 13050(m) of Division 7 of the California Water Code.
2. The discharge shall not exceed a 30-day maximum average of 500,000 gallons-per-day of wastewater disposal.
3. Wastewater discharged to the disposal area shall not contain a total inorganic dissolved solids content in excess of 2,100 mg/L ("Total fixed solids": Standards Methods 2540C/254QE).
4. Wastewater with inorganic TDS in excess of 2,100 mg/L shall be retained in leakproof above ground tanks with ultimate discharge at a location approved by the Regional Board's Executive Officer.
5. Wastewater discharged to the citrus tree field shall have a pH level between 3.2 and the natural background level of the original native soil (Finding No. 10, above) in the discharge area.
6. Moisture determinations shall be performed frequently at different points in the waste discharge area to evaluate greatest depth of penetration of the wetting-front in accordance with the following procedures:
 - a. Sets of paired tensiometers shall be installed at four-foot and six-foot intervals to detect moisture in the soil. One set shall be installed on each five-acre block of citrus grove irrigated with plant wastewater within 1/2 foot from the greatest point of wastewater discharge.
 - b. Tensiometers shall be kept calibrated, maintained and replaced according to manufacturer's recommendations.
 - c. Field capacity shall not be exceeded at the six foot level.
 - d. Exceeding the six foot field capacity is a direct violation of this Board Order.
 - e. The discharger shall notify the Regional Board promptly if the tensiometers indicate that local field capacity has been exceeded at the six-foot level.
 - f. All tensiometer readings shall be done within a single 48 hour interval.
 - g. The spacing of tensiometer monitoring set forth in 6(a) shall be reviewed quarterly and may be amended at the discretion of the Regional Board's Executive Officer.
7. The Regional Board shall be notified if a substantial rise of 30 feet of ground water occurs as indicated by monitoring wells.
8. The existing 8 foot berm shall be maintained to prevent upgradient surface water run-on into the discharge area. Construction of other engineered berming and/or grading to prevent downgradient run-off will be in place prior to discharge.

9. Berming and/or grading shall be used around the discharge area to prevent water flowing from the discharge areas into natural or man-made water course during any rain. The excessive water will be pumped to a containment system.
10. The discharger shall comply with the conditions of these Waste Discharge Requirements to continue exemption from Chapter 15, Division 3, Title 23 of the California Code of Regulations.

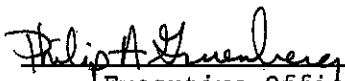
C. Provisions

1. The discharger shall comply with the following time schedule:

<u>TASK</u>	<u>COMPLIANCE DATE</u>
a. Submit plans of existing berms dikes and grading as described in Discharge Specification No. 9, and a hydrological report of adequacy, signed by a registered civil engineer or certified engineering geologist, for approval by the Regional Board's Executive Officer	30 days prior to discharge to new orchard areas
b. Install tensiometers as described in Discharge Specifications No.6(a)	Prior to discharge
c. Calibrate, maintain, and replace tensiometers	As specified by manufacturer
d. Submit results and proposal for soil test as described in Provision No. 4	Six months after initiating discharge
2. All tests of soil and water quality shall be done by a laboratory certified to do such tests by the California Department of Health Services.	
3. A monitoring proposal signed by a registered civil engineer or certified engineering geologist indicating the level of TDS in soil and irrigated water, shall be submitted to the Regional Board's Executive Officer for his approval.	
4. The discharger shall conduct soil tests of percolated wastewater from one part soil and 10 parts de-ionized water (or another index of soluble solids approved by the Regional Board's Executive Officer) and keep records to verify that the field capacity has not been exceeded for the soil at the six foot depth.	
5. Any variation of soil testing and monitoring frequency should be submitted to the Regional Board's Executive Officer in writing for review and approval before implementation.	
6. Prior to any modifications in this facility which would result in material change in the quality or quantity of wastewater treated or discharged, or any material change in the location of discharge, the discharger shall report all pertinent information in writing to the Regional Board; and obtain revised requirements before any modifications are implemented.	

7. The discharger shall immediately notify the Regional Board of any flooding, slope, pipe, berm, or dike failure; or any emergency situation which could impair the integrity of wastewater containment facilities or other precipitation and drainage control structures.
8. All discharge locations shall be protected from any washout or erosion and from any inundation which could occur as a result of floods having a predicted frequency of once in 100 years.
9. The discharger shall maintain in good working order, and operate as efficiently as possible any facility or control system installed by the discharger to achieve compliance with these waste discharge requirements.
10. The discharger shall comply with the attached "Monitoring and Reporting Program No. 93-026", and future revisions thereto, as specified by the Regional Board's Executive Officer.
11. Prior to any change in ownership or management of this operation, the discharger shall transmit a copy of this Board Order to the succeeding owner/operator, and forward a copy of the transmittal letter to the Regional Board.
12. The discharger shall ensure that all site-operating personnel are familiar with the content of this Board Order.
13. All wastewater disposal to the existing 50 acres of spray disposal system shall cease 180 days after the adoption of these Waste Discharge Requirement unless authorization is obtained from the Regional Board's Executive Officer.

I, Philip A. Gruenberg, 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, Colorado River Basin Region, on June 30, 1993.



Executive Officer

CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD
COLORADO RIVER BASIN REGION

MONITORING AND REPORTING PROGRAM NO. 93-026
FOR

VENTURA COASTAL CORPORATION
INDIO PROCESSING PLANT
North of Indio - Riverside County

Location of Discharge: W 1/2 of Section 31, T4S, R8E and W 1/2 of Section 5, T5S,
R8E, SBB&M

MONITORING

A. The discharger shall monitor the following items and report these items to the Regional Board.

<u>Item</u>	<u>Unit</u>	<u>Sampling Frequency</u>
1. Estimated volume of wastewater discharged	GPD ¹	Monthly
2. Total dissolved solids (including inorganic TDS)	mg/L ²	Monthly
3. pH	----	Monthly
4. Moisture content of soil at 4 and 6 ft below ground surface from all tensiometers	Percent of field capacity	Monthly
5. Ground water quality (TDS and pH) (3 wells: 5L1, 5P1, Q1)	mg/L	Monthly

REPORTING

A. Six months after initiating discharge, reports shall be submitted to the Regional Board reporting soil testing results and proposals described in Provision No. 3 of Board Order No. 93-026.

B. All monitoring data collected for Items 1, 2, 3, 4 and 5 of this Monitoring and Reporting Program No. 93-026 shall be submitted monthly to the Regional Board by the 15th day of the following month.

¹GPD = Gallons-per-Day

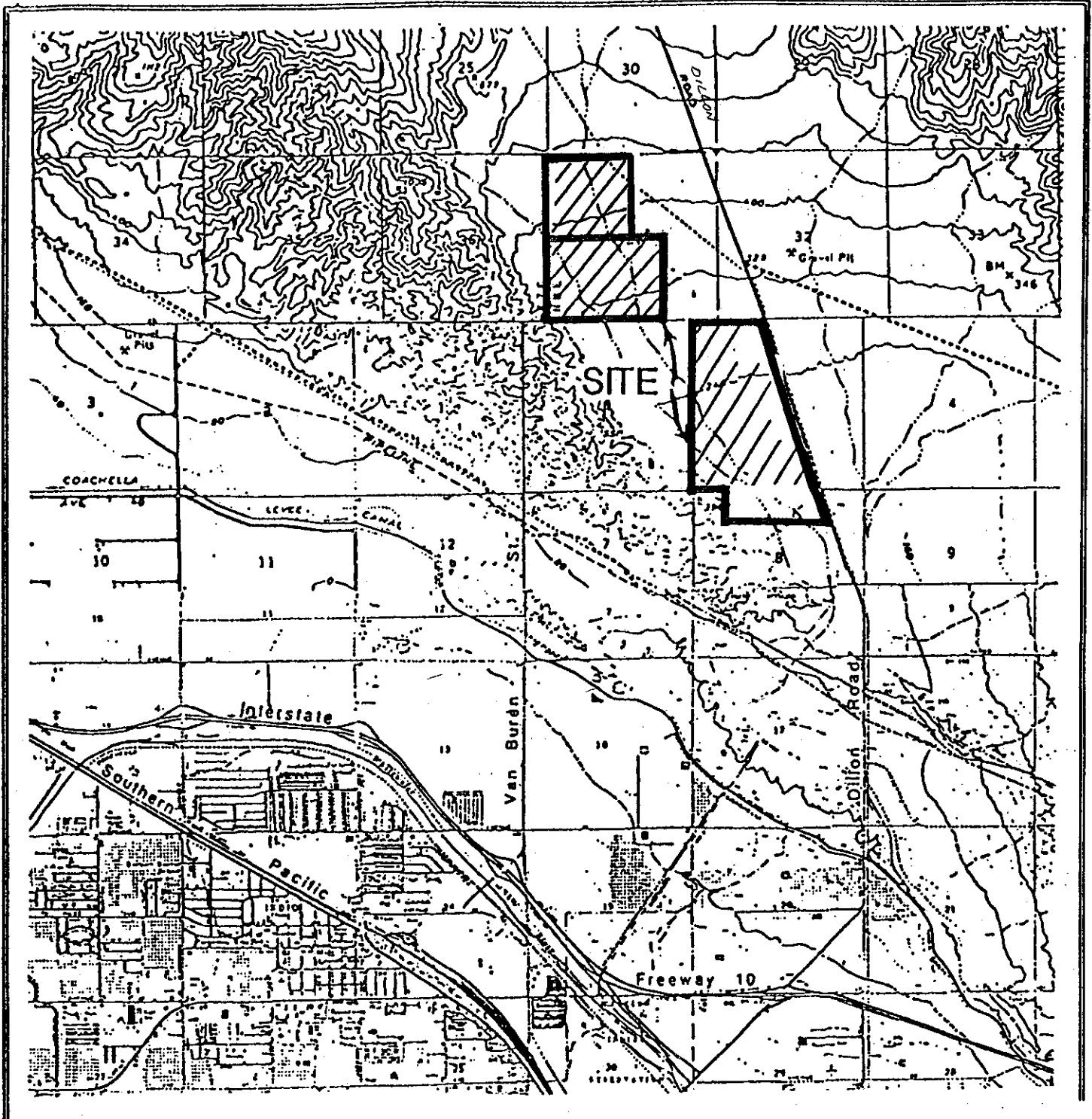
²mg/L - milligrams-per-liter

C. Submit monitoring reports to:

California Regional Water Quality Control Board
Colorado River Basin Region
73-720 Fred Waring Drive, Suite 100
Palm Desert, CA 92260

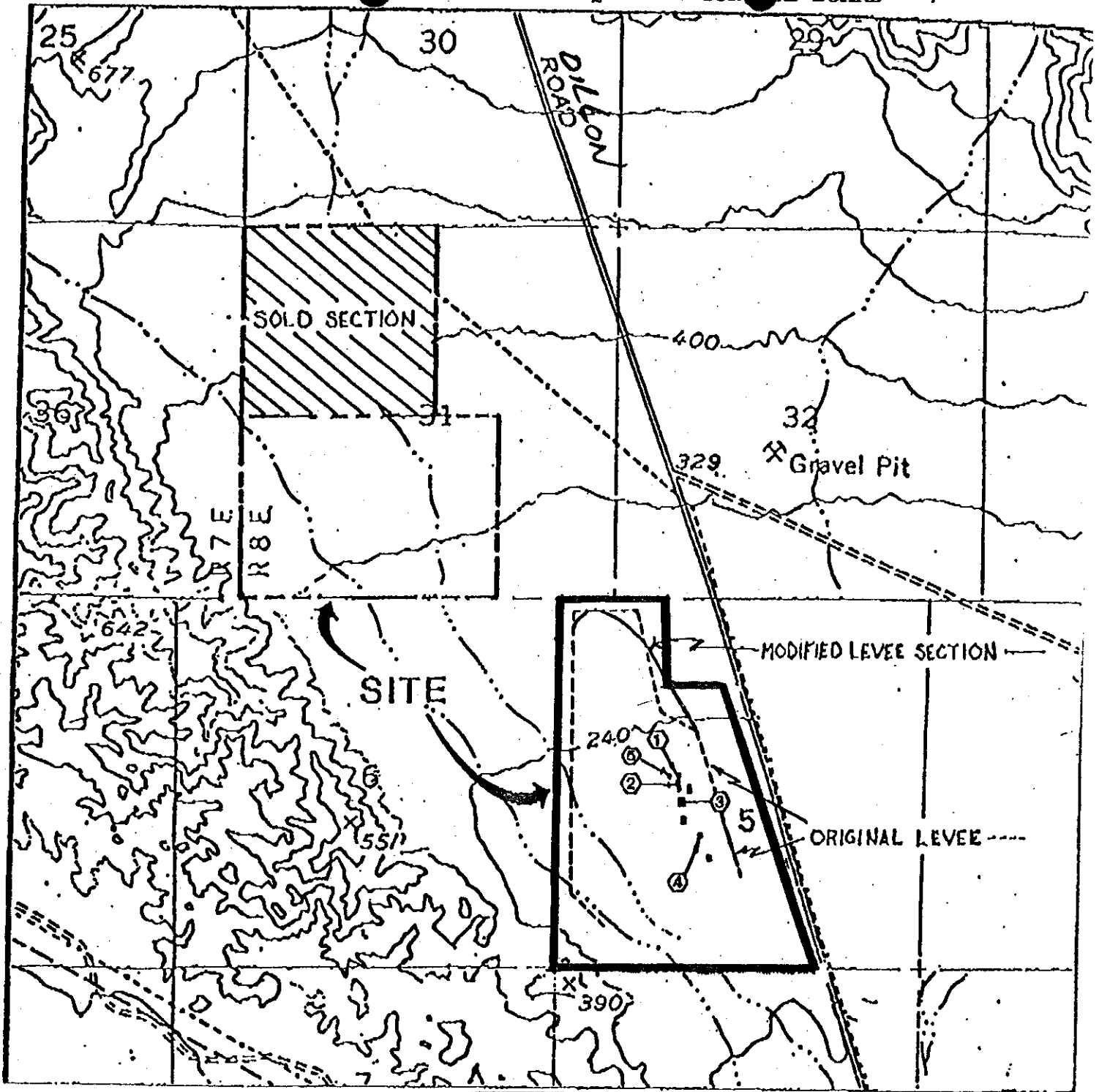
ORDERED BY: Philip A. Greenberg
June 30, 1993
Date

CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD - 7



ATTACHMENT "A"

VENTURA COASTAL CORPORATION
North of Indio - Riverside County
W 1/2 of Section 31 T4S, R8E, and W 1/2 of Section 5, T5S, R8E, SBB&M
Base Map from USGS 7.5 min. Indio 1972
and
15 min. Lost Horse Mtn. 1958 Topographic Quadrangles



SITE LOCATION MAP

ATTACHMENT "B"

VENTURA COASTAL CORPORATION
 INDIO PROCESSING PLANT
 North of Indio - Riverside County

LEGEND

- 1 WATER TANK, 100,000 GAL.
- 2 PEEL DRYING FACILITY
- 3 FRUIT EXTRACTION PLANT
- 4 ADMINISTRATION OFFICE
- BOUNDARY OF THE IRRIGATION FIELDS

