California Regional Water Quality Control Board

Colorado River Basin Region

73-720 Fred Waring Drive, Suite 100, Palm Desert, CA 92260
Phone (760) 346-7491• Fax (760) 341-6820
http://www.waterboards.ca.gov/coloradoriver

ORDER NO. R7-2006-0020
NPDES NO. CA7000010

NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES) PERMIT AND WASTE DISCHARGE REQUIREMENTS FOR KENT SEATECH CORPORATION, OWNER/OPERATOR KENT SEATECH CORPORATION FISH FARM

The following Discharger is subject to waste discharge requirements as set forth in this Order:

Table 1 Discharger Information

Discharger	Kent SeaTech Corporation
Name of Facility	Kent SeaTech Corporation Fish Farm
Facility Address	70775 Buchanan Street
	Mecca, CA 92254
	Riverside County

The discharge by the Kent SeaTech Corporation Fish Farm from the discharge point identified below is subject to waste discharge requirements as set forth in this Order:

Table 2 Discharge Location

Discharge Point	Effluent Description	Discharge Point Latitude	Discharge Point Longitude	Receiving Water
001	Emergency Outfall – Aquaculture wastewater	32° 32' 16.8" N	116° 05' 60" W	Coachella Valley Storm Channel
002	Main Outfall - Aquaculture wastewater	33° 32' 13.2" N	116° 05' 60" W	Coachella Valley Storm Channel
003	Southern Outfall - Aquaculture wastewater	32° 31' 58.8" N	116° 05' 60" W	Coachella Valley Storm Channel and three Duck Hunting Clubs

Table 3 Administrative Information

This Order was adopted by the Regional Water Board on:	June 21, 2006
This Order shall become effective on:	June 21, 2006
This Order shall expire on:	June 21, 2011
The U.S. Environmental Protection Agency (USEPA) and the Regional Water Board have classified this discharge as a minor discharge.	
The Discharger shall file a Report of Waste Discharge in accordance with Title 23, California Code of Regulations, not later than 180 days in advance of the Order expiration date as application for issuance of new waste discharge requirements.	

IT IS HEREBY ORDERED, that Order No. 01-003 is rescinded upon the effective date of this Order except for enforcement purposes, and, in order to meet the provisions contained in Division 7 of the California Water Code (CWC) and regulations adopted thereunder, and the provisions of the federal Clean Water Act (CWA), and regulations and guidelines adopted thereunder, the Discharger shall comply with the requirements in this Order.

I, Robert Perdue, Executive Officer, do hereby certify that this Order, with all attachments, 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 21, 2006.

Robert Perdue, Executive Officer

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I. FACILITY INFORMATION

The following Discharger is subject to waste discharge requirements as set forth in this Order:

Table 4 Facility Information

Discharger	Kent SeaTech Corporation
Name of Facility	Kent SeaTech Corporation Fish Farm
Facility Address	70775 Buchanan Street
	Mecca, CA 92254
	Riverside County
Facility Contact, Title, and Phone	James M. Carlberg, President, (858) 452-5765 Mike Massingill, Vice President, (858) 452-5765
Mailing Address	PO BOX 757, Mecca, CA 92254
Type of Facility	Warm Water Concentrated Aquatic Animal Production Farm
Facility Design Flow	10.5 million gallons per day

II. FINDINGS

The California Regional Water Quality Control Board, Colorado River Basin Region (hereinafter Regional Water Board), finds:

A. **Background.** Kent SeaTech Corporation (hereinafter Discharger) is currently discharging under Order No. 01-003 and National Pollutant Discharge Elimination System (NPDES) Permit No. CA7000010. The Discharger submitted a Report of Waste Discharge, dated November 10, 2005**,** and applied for a NPDES permit renewal to discharge up to 10.5 million gallons per day (MGD) of aquaculture wastewater from the Kent SeaTech Corporation Fish Farm, hereinafter facility. The application was deemed complete on January 4, 2006.

B. **Facility Description.** The Discharger owns and operates a fish farm. The physical treatment system components described below are primarily for the production of fish and are not a required component of this Order. Best Management Practices (BMPs) required by 40 CFR 451 are required for compliance with this Order. The treatment system consists of a channel stocked with Tilapia and/or Carp to remove solids, mechanical microscreen drum filters for additional fine solids removal, "Suspended Media Ammonia Removal Technology" (SMART) system to remove ammonia and nitrites, and an earthen "constructed wetland" system that provides further nitrification, denitrification, fine solids polishing, alkalinity restoration, and temperature buffering. The wetland is bypassed from the treatment process during the colder winter months to maintain system-wide warm temperatures for the fish. Water that is not recirculated or land applied is discharged from either Discharge Points 001 or 002. A portion of the water routed to Discharge Point 002 is pumped to a "Pondway" system where additional fish are produced. Water flowing through the "Pondway" system is not re-routed through the treatment system described above previous to discharging from the facility. Water flowing through this system is discharged from Discharge Point 003. The "Pondway" system is a unique algal-based fish production and water treatment system developed by Kent SeaTech. It provides water quality treatment through the managed use of stabilized dense algal populations, the use of secondary fish species for solids removal, the management of algae and solids

detention time, and the use of vascular aquatic plants for complementary nitrification. (See the Table 2 on the cover page) All Discharge Points discharge to the Coachella Valley Storm Channel, a water of the United States and a tributary to the Salton Sea within the Salton Sea Watershed. Attachment B provides a map of the area around the facility. Attachment C provides a flow schematic of the facility.

C. **Legal Authorities.** This Order is issued pursuant to section 402 of the Federal Clean Water Act (CWA) and implementing regulations adopted by the U.S. Environmental Protection Agency (USEPA) and Chapter 5.5, Division 7 of the California Water Code (CWC). It shall serve as a NPDES permit for point source discharges from this facility to surface waters. This Order also serves as Waste Discharge Requirements (WDRs) pursuant to Article 4, Chapter 4 of the CWC.

D. **Background and Rationale for Requirements**. The Regional Water Board developed the requirements in this Order based on information submitted as part of the application, through monitoring and reporting programs, and other available information. Attachment F, which contains background information and rationale for Order requirements, is hereby incorporated into this Order and constitutes part of the Findings for this Order. Attachments A through E and G through I are also incorporated into this Order.

E. **California Environmental Quality Act (CEQA).** This action to adopt an NPDES permit is exempt from the provisions of the California Environmental Quality Act (Public Resources Code Section 21100, et seq.) in accordance with Section 13389 of the CWC.

F. **Technology-based Effluent Limitations.** The Code of Federal Regulations (CFR) at 40 CFR §122.44(a) requires that permits include applicable technology-based limitations and standards. This Order includes technology-based effluent limitations based on Effluent Limitations Guidelines, Standards for the Aquatic Animal Production Industry Category in 40 CFR Part 451, and Best Professional Judgment (BPJ) in accordance with 40 CFR §125.3. A detailed discussion of the technology-based effluent limitations development is included in the Fact Sheet (Attachment F).

G. **Water Quality-based Effluent Limitations.** Section 122.44(d) of 40 CFR requires that permits include water quality-based effluent limitations (WQBELs) to attain and maintain applicable numeric and narrative water quality criteria to protect the beneficial uses of the receiving water. Where numeric water quality objectives have not been established, 40 CFR §122.44(d) specifies that WQBELs may be established using USEPA criteria guidance under CWA section 304(a), proposed State criteria or a State policy interpreting narrative criteria supplemented with other relevant information, or an indicator parameter.

The immediate receiving water is the Coachella Valley Storm Channel. The 2002 USEPA 303(d) list of impaired waters (hereinafter 303(d) List) classifies the Coachella Valley Storm Channel as impaired by pathogens. No TMDLs have been developed to date. In addition, the 303(d) List classifies the Salton Sea as impaired by nutrients. Tributaries to the Salton Sea, including the Coachella Valley Storm Channel, may be affected by the future TMDLs. No TMDLs have been developed to date, although a nutrient TMDL is under development for the Salton Sea that may have adverse impacts on permitted discharges to tributaries to the Salton Sea (Coachella Valley Storm Channel). This TMDL is tentatively scheduled for completion in 2009.

H. **Water Quality Control Plans.** The Regional Water Board adopted a *Water Quality Control Plan for the Colorado River Basin* (hereinafter Basin Plan) that designates beneficial uses, establishes water quality objectives, and contains implementation programs and policies to achieve those objectives for all waters addressed through the plan (includes amendments adopted by the Regional Water Board through October 2005).

Beneficial uses applicable to Coachella Valley Storm Channel are as follows:

Table 5 Basin Plan Beneficial Uses

Discharge Point	Receiving Water Name	Beneficial Use(s)
001, 002, and 003	Coachella Valley Storm Channel	Existing: Freshwater Replenishment (FRSH), Water Contact Recreation (REC I)[1], Non-Contact Water Recreation (REC II)[1], Warm Freshwater Habitat (WARM), Wildlife Habitat (WILD), Preservation of Rare, Threatened, or Endangered Species (RARE)[2]

The State Water Board adopted a *Water Quality Control Plan for Control of Temperature in the Coastal* and *Interstate Water and Enclosed Bays and Estuaries of California* (Thermal Plan) on May 18, 1972, and amended this plan on September 18, 1975. The Thermal Plan does not apply to the Coachella Valley Storm Channel.

Requirements of this Order specifically implement the applicable Water Quality Control Plans.

I. **National Toxics Rule (NTR) and California Toxics Rule (CTR).** USEPA adopted the NTR on December 22, 1992, which was amended on May 4, 1995 and November 9, 1999, and the CTR on May 18, 2000, which was amended on February 13, 2001. These rules include water quality criteria for priority pollutants and are applicable to this discharge.

J. **State Implementation Policy.** On March 2, 2000, the State Water Board adopted the *Policy for Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California* (State Implementation Policy or SIP). The SIP became effective on April 28, 2000 with respect to the priority pollutant criteria promulgated for California by the USEPA through the NTR and to the priority pollutant objectives established by the Regional Water Board in the Basin Plan. The SIP became effective on May 18, 2000 with respect to the priority pollutant criteria promulgated by the USEPA through the California Toxics Rule. The State Water Board adopted amendments to the SIP on February 24, 2005 that became effective on July 13, 2005.

K. **Compliance Schedules and Interim Requirements.** Section 2.1 of the SIP provides that, based on a Discharger's request and demonstration that it is infeasible for an existing Discharger to achieve immediate compliance with an effluent limitation derived from a CTR criterion, compliance schedules may be allowed in an NPDES permit. Unless an exception has been granted under Section 5.3 of the SIP, a compliance schedule may not exceed 5 years

[1] Unauthorized use.
[2] Rare, endangered, or threatened wildlife exists in or utilized some of this water way. If the RARE beneficial use may be affected by a water quality control decision, responsibility for substantiation of the existence of rare, endangered, or threatened species on a case-by-case basis is upon the California Department of Fish and Game on its own initiative and/or at the request of the Regional Water Board; and such substantiation must be provided within a reasonable time frame as approved by the Regional Water Board.

from the date that the permit is issued or reissued, nor may it extend beyond 10 years from the effective date of the SIP (May 18, 2010) to establish and comply with CTR criterion-based effluent limitations. Where a compliance schedule for a final effluent limitation exceeds 1 year, the Order must include interim numeric limitations for that constituent or parameter. Where allowed by the Basin Plan, compliance schedules and interim effluent limitations or discharge specifications may also be granted to allow time to implement a new or revised water quality objective. This Order does not include compliance schedules and interim effluent limitations or discharge specifications**.**

L. **Alaska Rule.** On March 30,2000, USEPA revised its regulation that specifies when new and revised State and Tribal water quality standards (WQS) become effective for CWA purposes (40 CFR § 131.21, 65 FR 24641, April 27, 2000). Under USEPA's new regulation (also known as the Alaska rule), new and revised standards submitted to USEPA after May 30, 2000, must be approved before being used for CWA purposes. The final rule also provides that standards already in effect and submitted to USEPA by May 30, 2000, may be used for CWA purposes, whether or not approved by USEPA.

M. **Stringency of Requirements for Individual Pollutants.** This Order contains restrictions on individual pollutants that are no more stringent than required by the federal CWA. Individual pollutant restrictions consist of technology-based restrictions and water quality-based effluent limitations. The technology-based effluent limitations consist of restrictions on total suspended solids (TSS). Restrictions on TSS are specified in federal regulations as discussed in 40 CFR Part 451, and the permit's technology-based pollutant restrictions are no more stringent than required by the CWA. Water quality-based effluent limitations have been scientifically derived to implement water quality objectives that protect beneficial uses. Both the beneficial uses and the water quality objectives have been approved pursuant to federal law and are the applicable federal water quality standards. To the extent that toxic pollutant water quality-based effluent limitations were derived from the CTR, the CTR is the applicable standard pursuant to 40 CFR 131.38. The scientific procedures for calculating the individual water quality-based effluent limitations are based on the CTR-SIP, which was approved by USEPA on May 18, 2000. All beneficial uses and water quality objectives contained in the Basin Plan were approved under state law and submitted to and approved by USEPA prior to May 30, 2000. Any water quality objectives and beneficial uses submitted to USEPA prior to May 30, 2000, but not approved by USEPA before that date, are nonetheless "applicable water quality standards for purposes of the CWA" pursuant to 40 CFR 131.21(c)(1). Collectively, this Order's restrictions on individual pollutants are no more stringent than required to implement the technology-based requirements of the CWA and the applicable water quality standards for purposes of the CWA.

N. **Antidegradation Policy.** Section 131.12 of 40 CFR requires that State water quality standards include an antidegradation policy consistent with the federal policy. The State Water Board established California's antidegradation policy in State Water Board Resolution 68-16, which incorporates the requirements of the federal antidegradation policy. Resolution 68-16 requires that existing quality of waters be maintained unless degradation is justified based on specific findings. As discussed in detail in the Fact Sheet (Attachment F) the permitted discharge is consistent with the antidegradation provision of 40 CFR §131.12 and State Water Board Resolution 68-16.

O. **Anti-Backsliding Requirements.** Sections 402(o)(2) and 303(d)(4) of the CWA and federal regulations at 40 CFR § 122.44(l) prohibit backsliding in NPDES permits. These anti-backsliding provisions require effluent limitations in a reissued permit to be as stringent as those in the previous permit, with some exceptions where limitations may be relaxed. Some effluent limitations in this Order are less stringent that those in the previous Order. As discussed in

detail in the Fact Sheet (Attachment F) this relaxation of effluent limitations is consistent with the anti-backsliding requirements of the CWA and federal regulations.

P. **Monitoring and Reporting.** Section 122.48 of 40 CFR requires that all NPDES permits specify requirements for recording and reporting monitoring results. Sections 13267 and 13383 of the CWC authorize the Regional Water Boards to require technical and monitoring reports. The Monitoring and Reporting Program establishes monitoring and reporting requirements to implement federal and State requirements. This Monitoring and Reporting Program is provided in Attachment E.

Q. **Standard and Special Provisions.** Standard Provisions, which in accordance with 40 CFR §§122.41and 122.42, apply to all NPDES discharges and must be included in every NPDES permit, are provided in Attachment D. The Regional Water Board has also included in this Order special provisions applicable to the Discharger. A rationale for the special provisions contained in this Order is provided in the attached Fact Sheet (Attachment F).

R. **Notification of Interested Parties.** The Regional Water Board has notified the Discharger and interested agencies and persons of its intent to prescribe Waste Discharge Requirements for the discharge and has provided them with an opportunity to submit their written comments and recommendations. Details of notification are provided in the Fact Sheet (Attachment F) of this Order.

S. **Consideration of Public Comment.** The Regional Water Board, in a public meeting, heard and considered all comments pertaining to the discharge. Details of the Public Hearing are provided in the Fact Sheet (Attachment F) of this Order.

III. DISCHARGE PROHIBITIONS

A. Bypass, overflow, discharge or spill of untreated aquaculture wastewater off site is prohibited.

B. The discharge of untreated aquaculture wastewater to land not owned or controlled by the Discharger is prohibited.

C. Discharge of treated aquaculture wastewater at a location or in a manner different from that described in Finding No. II.B, above, and as further detailed in Facility Description II.A.1-2 of Attachment F (Fact Sheet), is prohibited.

D. The bypass or overflow of untreated aquaculture wastewater or wastes to Coachella Valley Storm Channel is prohibited, except as allowed in the Standard Provisions for National Pollutant Discharge Elimination System Permit (hereinafter Standard Provisions), included as Attachment D.

E. The discharge shall not cause degradation of any water supply.

F. The treatment or disposal of wastes from the Facility shall not cause pollution or nuisance as defined in Section 13050, subdivision (l) and (m) of the CWC.

IV. EFFLUENT LIMITATIONS AND DISCHARGE SPECIFICATIONS

A. Effluent Limitations – Discharge Point 001, 002, and 003

1. Final Effluent Limitations – Discharge Point 001, 002, and 003

a. The discharge of aquaculture wastewater shall maintain compliance with the following effluent limitations at Discharge Point 001, 002, and 003, with compliance measured at Monitoring Location EFF-001, EFF-002, and EFF-003 respectively, as described in the attached Monitoring and Reporting Program (Attachment E):

Table 6 Final Effluent Limitations

Parameter	Units	Effluent Limitations				
		Average Monthly	Average Weekly	Maximum Daily	Instantaneous Minimum	Instantaneous Maximum
Flow	Million Gallon Per Day (MGD)	10.5[1]	---	---	---	---
pH	standard units	---	---	---	6.0	9.0

[1]This 30-day average flow limitation is the sum of all discharge points and shall be measured by the difference in volume between new groundwater input and reuse flow. Reuse flow shall be the sum of all water being reused offsite.

b. **Toxicity:** There shall be no acute or chronic toxicity in the fish farm effluent nor shall the fish farm effluent cause any acute or chronic toxicity in the receiving water, as defined in Section V.E of the Monitoring and Reporting Program (Attachment E). All waters shall be maintained free of toxic substances in concentrations which are toxic to, or which produce detrimental physiological responses in human, plant, animal, or indigenous aquatic life. Compliance with this objective will be determined by use of indicator organisms, analyses of species diversity, population density, growth anomalies, or bioassays of appropriate duration or other appropriate methods specified by the Regional Water Board.

c. **Total Suspended Solids:** The Discharger shall minimize the discharge of total suspended solids and other pollutants associated with the operation and maintenance of a CAAP facility to the BAT/BCT through implementing best management practices established in Special Provision VI.C.3 of this Order.

d. **Total Dissolved Solids:** Discharges of wastes or wastewater shall not increase the total dissolved solids content of receiving waters, unless it can be demonstrated to the satisfaction of the Regional Water Board that such an increase in total dissolved solids does not adversely affect beneficial uses of receiving waters.

2. Interim Effluent Limitations – Not Applicable

B. Land Discharge Specifications – Not Applicable

C. Reclamation Specifications – Not Applicable

V. RECEIVING WATER LIMITATIONS

A. Surface Water Limitations

Receiving water limitations are based on water quality objectives contained in the Basin Plan and are a required part of this Order. The discharge shall not cause the following in Coachella Valley Storm Channel:

1. Depress the concentration of dissolved oxygen to fall below 5.0 mg/L. When dissolved oxygen in the receiving water is already below 5.0 mg/L, the discharge shall not cause any further depression.

2. The presence of oil, grease, floating material (liquids, solids, foam and scum) or suspended material in amounts that create a nuisance or adversely affect beneficial uses.

3. Result in the deposition of pesticides or combination of pesticides detectable in concentrations that adversely affect beneficial uses.

4. Aesthetically undesirable discoloration in the receiving water.

5. Waters shall not contain biostimulatory substances in concentrations that promote aquatic growths to the extent that such growths cause nuisance or adversely affect beneficial uses.

6. Increase turbidity that results in adversely affecting beneficial uses.

7. The normal ambient pH to fall below 6.0 or exceed 9.0 units.

8. The natural receiving water temperature of surface waters shall not be altered by discharges of wastewater unless it can be demonstrated to the satisfaction of the Regional Water Board that such alteration in temperature does not adversely affect beneficial uses.

9. Result in the deposition of material that causes nuisance or adversely affects beneficial uses.

10. No individual chemical or combination of chemicals shall be present in concentrations that adversely affect beneficial uses.

11. Toxic pollutants to be present in the water column, sediments or biota in concentrations that adversely affect beneficial uses or that produce detrimental physiological responses in human, plant, animal, or aquatic life.

12. Taste or odor-producing substances that adversely affect beneficial uses.

13. This discharge shall not cause a violation of any applicable water quality standard for receiving waters adopted by the Regional Water Board or the State Water Board as required by the Federal CWA and regulations adopted thereunder. If more stringent applicable water quality standards are promulgated or approved pursuant to Section 303 of the Federal CWA or amendments thereto, the Regional Water Board will revise and modify this Permit in accordance with such more stringent standards.

14. The concentration of total dissolved solids in the Coachella Valley Storm Channel to exceed an annual average concentration of 2,000 mg/L or an instantaneous maximum concentration of 2,500 mg/L.

B. Groundwater Limitations

1. The discharge shall not cause the underlying groundwater to be degraded, to exceed water quality objectives, unreasonably affect beneficial uses, or cause a condition of pollution or nuisance.

VI. PROVISIONS

A. Standard Provisions

1. **Federal Standard Provisions.** The Discharger shall comply with all Standard Provisions included in Attachment D of this Order.

2. **Regional Water Board Standard Provisions.** The Discharger shall comply with the following provisions:

   a. The Kent SeaTech Corporation Fish Farm shall be protected from any washout or erosion of wastes or covering material, and from any inundation, which could occur as a result of floods having a predicted frequency of once in 100 years.

   b. The Discharger shall comply with all conditions of this Order. Noncompliance constitutes a violation of the federal CWA and Porter-Cologne Water Quality Control Act, and is grounds for enforcement action; for Permit termination, revocation and reissuance, or modification of waste discharge requirements; or denial of a Permit renewal application.

   c. The Discharger shall ensure that all site-operating personnel are familiar with the content of this Order, and shall maintain a copy of this Order at the site.

   d. The Discharger shall immediately report orally information to the Regional Water Board office and the Office of Emergency Services any noncompliance that may endanger human health or the environment as soon as (1) the Discharger has knowledge of the discharge, (2) notification is possible, and (3) notification can be provided without substantially impeding cleanup or other emergency measures. During non-business hours, the Discharger shall leave a message on the Regional Water Board office voice recorder; the phone number is (760) 346-7491. A written report shall also be provided within five business days of the time the Discharger becomes aware of the incident. The written report shall contain a description of the noncompliance and its cause, the period of noncompliance, the anticipated time to achieve full compliance, and the steps taken or planned, to reduce, eliminate, and prevent recurrence of the noncompliance. The Discharger shall report all intentional or unintentional spills in excess of 1,000 gallons occurring within the facility or collection system to the Regional Water Board office in accordance with the above time limits.

   e. Prior to any change in ownership or management of this operation, the Discharger shall transmit a copy of this Order to the succeeding owner/operator, and forward a copy of the transmittal letter to the Regional Water Board.

f. 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 Water Board and obtain revised requirements before any modifications are implemented.

g. Adequate measures shall be taken to assure that flood or surface drainage waters do not erode or otherwise render portions of the discharge facilities inoperable.

h. This Order does not authorize violation of any federal, State, or local laws or regulations.

B. Monitoring and Reporting Program Requirements

The discharger shall comply with the Monitoring and Reporting Program, and future revisions thereto as specified by the Regional Water Board's Executive Officer, found in Attachment E of this Order.

C. Special Provisions

1. Reopener Provisions

a. The Discharger shall submit data sufficient to determine if a water quality–based effluent limitation is required in the discharge permit as required under the SIP. It is the Discharger's responsibility to provide all information requested by the Regional Water Board for use in the analysis. The Permit shall be reopened to establish water quality-based effluent limitations, if necessary.

b. This Order may be modified, rescinded and reissued, for cause. The filing of a request by the Discharger for an Order modification, rescission and reissuance, or a notification of planned changes or anticipated noncompliance does not stay any Order condition. Causes for modification include the promulgation of new regulations, modification of disposal practices of collected screenings or other solids removed from the liquid aquaculture wastewater, or adoption of new regulations by the State Water Board or the Regional Water Board, including revisions to the Basin Plan.

c. This Order may be reopened and the Whole Effluent Toxicity (WET) Testing Requirements, contained in the Monitoring and Reporting Program (Attachment E), Section V may be modified to address changes to USEPA or State Water Board policies or guidance regarding the testing or reporting requirements for WET testing.

d. The Discharger has submitted for approval to the Regional Water Board and USEPA a biological assessment of the Coachella Valley Storm Channel in the vicinity of their discharge. USEPA reviewed the biological assessment and approved the application of water quality criteria for the protection of freshwater aquatic life on April 14, 2006. This assessment has determined that the applicable reach of the Coachella Valley Storm Channel is characterized as freshwater; therefore, water quality criteria for the protection of freshwater aquatic life are applicable. USEPA will be responding to comments on the freshwater biological assessment. If the freshwater biological assessment is not adopted, this Order may be reopened and interim and final effluent limitations for SIP priority pollutants may be incorporated as necessary. In addition, the development of a Pollutant Minimization Program will be required.

e. TMDLs for pathogens for the Coachella Valley Storm Channel and nutrients for the Salton Sea are to be developed by the Regional Water Board. The permit may be reopened and modified in the future to include appropriate requirements necessary to fully implement the approved TMDLs if needed.

2. Special Studies, Technical Reports and Additional Monitoring Requirements

a. **Toxicity Identification Evaluations or Toxicity Reduction Evaluations.** The Discharger shall submit to the Regional Water Board a toxicity reduction evaluation (TRE) workplan (1-2 pages) **within 90 days of the effective date of this permit**. This plan shall describe the steps the Discharger intends to follow in the event that toxicity is detected, and should include at a minimum:

i. A description of the investigation and evaluation techniques that will be used to identify potential causes/sources of toxicity, effluent variability, and treatment system efficiency;

ii. A description of the facility's method of maximizing in-house treatment efficiency and good housekeeping practices, and a list of all chemicals used in operation of the facility;

iii. If a toxicity identification evaluation (TIE) is necessary, who will conduct it (i.e., in-house or outside consultant).

b. **Water Flow and Quantity Study. Within 180-days of adoption of this Order,** the Discharger shall submit a technical report to the Regional Water Board subject to the approval of the Executive Officer that provides a schematic of the flow regime fresh, recycled and waste water through the facility. The report is to provide a summary of the flow quantities of fresh, recycled and wastewater throughout its facilities based on actual flow measurements or calculated estimates of flows that are currently discharged and proposed to be discharged through Discharge Points 001, 002 and 003. The report is also to provide how the Discharger will measure and report flow for each discharge point to ensure compliance with this Order.

c. **Translator Study.** Should the Discharger request to use a translator for metals and selenium different than the USEPA conversion factor, it shall complete a translator study within two years from the date of the issuance of this permit as stated in the SIP. In the event a translator study is not completed within the specified time, the USEPA conversion factor-based effluent limitation as specified in the CTR shall be effective as a default limitation.

3. Best Management Practices and Pollution Prevention

a. **Best Management Plan. Within 60-days of adoption of this Order**, the Discharger shall submit to the Regional Water Board's Executive Officer for approval a Best Management Practices (BMP) plan. The BMP plan shall be developed in accordance with requirements established in 40 CFR §§451.10 through 451.13 as described below and shall include a narrative description of actions to be taken by the Discharger to comply with the numeric benchmarks for TSS and BOD, also described below. The Regional Water Board may direct the Discharger to modify the BMP Plan based on its exercise of Best Professional Judgment (BPJ) representing the application of BMP:

i. **Solids control.** The Discharger must:

(1) Employ efficient feed management and feeding strategies that limit feed input to the minimum amount reasonably necessary to achieve production goals and sustain targeted rates of aquatic animal growth in order to minimize potential discharges of uneaten feed and waste products to waters of the United States or waters of the State.

(2) In order to minimize the discharge of accumulated solids from settling ponds and basins and production systems, identify and implement procedures for routine cleaning of rearing units and off-line settling basins, and procedures to minimize any discharge of accumulated solids during the inventorying, grading and harvesting aquatic animals in the production system.

(3) Remove and dispose of aquatic animal mortalities properly on a regular basis to prevent discharge to waters of the United States or Waters of the State, except in cases where authorized by an NPDES permit or WDRs.

(4) Comply with the monitoring schedule outlined in the Monitoring and Reporting Program, Attachment E, of this Order to monitor compliance with the 30-day arithmetic mean benchmark of 95 mg/L for TSS. In the event that this benchmark is exceeded, the Discharger must comply with the accelerated monitoring requirements described in section IX.B.2 of the Monitoring and Reporting Program, Attachment E, of this Order.

ii. **BOD control.** The Discharger must:

(1) Provide sufficient detention time in the treatment units to allow for maximum removal of BOD prior to discharge.

(2) In order to minimize the discharge of oxygen demanding pollutants from settling ponds and basins and production systems, identify and implement procedures for routine cleaning of rearing units and off-line settling basins, and procedures to minimize any discharge of accumulated solids during the inventorying, grading and harvesting aquatic animals in the production system.

(3) Comply with the monitoring schedule outlined in the Monitoring and Reporting Program, Attachment E, of this Order to monitor compliance with the following benchmarks: 30-Day Arithmetic Mean – 45 mg/L; 7-Day Arithmetic Mean – 65 mg/L. In the event that either of these benchmarks are exceeded, the Discharger must comply with the accelerated monitoring requirements described in section IX.B.1. of the Monitoring and Reporting Program, Attachment E, of this Order.

iii. **Materials storage.** The Discharger must:

(1) Properly store drugs, pesticides, and feed in a manner designed to prevent spills that may result in the discharge of drugs, pesticides or feed to waters of the United States or waters of the State.

(2) Implement procedures to properly contain, clean, and dispose of any spilled material.

iv. **Operations and Structural maintenance**. The Discharger must:

(1) Inspect the production system and the wastewater treatment system on a routine basis in order to identify and promptly repair any damage.

(2) Conduct regular maintenance of the production system and the wastewater treatment system in order to ensure that they are properly functioning.

(3) Store and contain drugs, chemicals, fuel, waste oil, or other materials to prevent spillage or release into the aquatic animal production facility, waters of the United States or waters of the State.

v. **Recordkeeping**. The Discharger must:

(1) Maintain records for aquatic animal rearing units documenting the feed amounts and estimates of the numbers and weight of aquatic animals in order to calculate representative feed conversion ratios.

(2) Keep records documenting the frequency of cleaning, inspections, maintenance and repairs.

vi. **Training.** The Discharger must:

(1) Ensure adequately train all relevant facility personnel in spill prevention and how to respond in the event of a spill.

(2) Train staff on the proper operation and cleaning of production and wastewater treatment systems including training in feeding procedures and proper use of equipment.

b. **Storm Water**

i. In the event that there are storm water discharges associated with industrial activities, the Discharger shall submit a Notice of Intent to be covered under the General Storm Water Permit and/or maintain coverage under the General Storm Water Permit. Until then, all storm water discharges from the facility:

(1) Must comply with the lawful requirements of municipalities, counties, drainage districts, and other local agencies, regarding discharges of storm water to storm water drain systems or other courses under their jurisdiction;

(2) Shall not cause or threaten to cause pollution or contamination; and

(3) Shall not contain hazardous substances equal to or in excess of a reportable quantity listed in 40 CFR Part 117 and/or 40 CFR Part 302.

4. Spill Prevention, Control, and Countermeasure Plan

Within 180-days of adoption of this Order, the Discharger shall prepare and implement a Spill Prevention, Control, and Countermeasure (SPCC) Plan in accordance with all applicable state and federal laws and regulations. The Discharger shall certify completion of the SPCC plan in its annual summary report required in Section X.B.2 of MRP in Attachment E.

5. Construction, Operation and Maintenance Specifications – Not Applicable

6. Special Provisions for Municipal Facilities (POTWs Only) – Not Applicable

7. Other Special Provisions

a. **Notification of Completion**. The Discharger shall notify the Regional Water Board **within 15-days of completion** of changes to the flow regime at the facility to direct all waste discharges to Discharge Point 003 as the primary point of discharge, and to use Discharge Points 001 and 002 in the event of emergencies and/or maintenance activities. Prior to any additional modifications to the facility that result in material changes to the quality or quantity of the effluent, the Discharger shall notify the Regional Water Board in accordance with Standard Regional Water Board Provision, VI.A.2.g of this Order.

8. Compliance Schedules – Not Applicable

VII. COMPLIANCE DETERMINATION

Compliance with the effluent limitations contained in Section IV of this Order will be determined as specified below:

A. General.

Compliance with effluent limitations for priority pollutants shall be determined using sample reporting protocols defined in the Monitoring and Reporting Program (Attachment E) of this Order. Dischargers shall be deemed out of compliance with effluent limitations if the concentration of the monitoring sample is greater than the effluent limitation and greater than or equal to the reporting level (RL).

B. Multiple Sample Data Reduction.

When determining compliance with an Average Monthly Effluent Limitation (AMEL) for priority pollutants and more than one sample result is available in a month, the Discharger shall compute the arithmetic mean unless the data set contains one or more reported determinations of "Detected, but Not Quantified" (DNQ) or "Not Detected" (ND). In those cases, the Discharger shall compute the median in place of the arithmetic mean in accordance with the following procedure:

1. The data set shall be ranked from low to high, ranking the reported ND determinations lowest, DNQ determinations next, followed by quantified values (if any). The order of the individual ND or DNQ determinations is unimportant.

2. The median value of the data set shall be determined. If the data set has an odd number of data points, then the median is the middle value. If the data set has an even number of data points, then the median is the average of the two values around the middle unless one or both of the points are ND or DNQ, in which case the median value shall be the lower of the two data points where DNQ is lower than a value and ND is lower than DNQ.

C. Effect of Conducting a Pollutant Minimization Program (PMP) – Not Applicable

D. Average Monthly Effluent Limitation (AMEL).

If the average of daily discharges over a calendar month exceeds the AMEL for a given parameter, an alleged violation will be flagged and the Discharger will be considered out of compliance for each day of that month for that parameter (e.g., resulting in 31 days of non-compliance in a 31-day month). The average of daily discharges over the calendar month that exceeds the AMEL for a parameter will be considered out of compliance for that month only. If only a single sample is taken during the calendar month and the analytical result for that sample exceeds the AMEL, the discharger will be considered out of compliance for that calendar month. For any one calendar month during which no sample (daily discharge) is taken, no compliance determination can be made for that calendar month.

E. Average Weekly Effluent Limitation (AWEL).

If the average of daily discharges over a calendar week exceeds the AWEL for a given parameter, an alleged violation will be flagged and the Discharger will be considered out of compliance for each day of that week for that parameter, resulting in 7 days of non-compliance. The average of daily discharges over the calendar week that exceeds the AWEL for a parameter will be considered out of compliance for that week only. If only a single sample is taken during the calendar week and the analytical result for that sample exceeds the AWEL, the discharger will be considered out of compliance for that calendar week. For any one calendar week during which no sample (daily discharge) is taken, no compliance determination can be made for that calendar week.

F. Maximum Daily Effluent Limitation (MDEL).

If a daily discharge exceeds the MDEL for a given parameter, an alleged violation will be flagged and the discharger will be considered out of compliance for that parameter for that 1 day only within the reporting period. For any 1 day during which no sample is taken, no compliance determination can be made for that day.

G. Instantaneous Minimum Effluent Limitation.

If the analytical result of a single grab sample is lower than the instantaneous minimum effluent limitation for a parameter, a violation will be flagged and the discharger will be considered out of compliance for that parameter for that single sample. Non-compliance for each sample will be considered separately (e.g., the results of two grab samples taken within a calendar day that both are lower than the instantaneous minimum effluent limitation would result in two instances of non-compliance with the instantaneous minimum effluent limitation).

H. Instantaneous Maximum Effluent Limitation.

If the analytical result of a single grab sample is higher than the instantaneous maximum effluent limitation for a parameter, a violation will be flagged and the discharger will be considered out of compliance for that parameter for that single sample. Non-compliance for each sample will be considered separately (e.g., the results of two grab samples taken within a calendar day that both exceed the instantaneous maximum effluent limitation would result in two instances of non-compliance with the instantaneous maximum effluent limitation).

I. Water Quality-Based Effluent Limitations.

1. In accordance with Section 2.4.5 of the SIP, compliance with water quality-based effluent limitations shall be determined as follows:

   a. Dischargers shall be deemed out of compliance with an effluent limitation if the concentration of the priority pollutant in the monitoring sample is greater than the effluent limitation and greater than or equal to the reported Minimum Level (ML).

   b. When determining compliance with an average monthly effluent limitation and more than one sample result is available in a month, the Discharger shall compute the arithmetic mean unless the data set contains one or more reported determinations of DNQ or ND. In those cases, the Discharger shall compute the median in place of the arithmetic mean in accordance with the following procedure:

      i. The data set shall be ranked from low to high, reported ND determinations lowest, DNQ determinations next, and followed by quantified values (if any). The order of the individual ND or DNQ determinations is unimportant.

      ii. The median value of the data set shall be determined. If the data set has an odd number of data points, then the median is the middle value. If the data set has an even number of data points, then the median is the average of the two values around the middle unless one or both of the points are ND or DNQ, in which case the median value shall be the lower of the two data points where DNQ is lower than a value and ND is lower than DNQ.

   c. If a sample result, or the arithmetic mean or median of multiple sample results, is below the reported ML, and there is evidence that the priority pollutant is present in the effluent above an effluent limitation and the Discharger conducts a PMP, the Discharger shall not be deemed out of compliance.

J. Mass and Concentration Limitation.

Compliance with mass and concentration effluent limitations for the same parameter shall be determined separately with their respective limitations. When the concentration of a constituent in an effluent sample is determined to be “ND” or “DNQ”, the corresponding mass emission rate (MER) determined from that sample concentration shall also be reported as “ND” or “DNQ”

K. State Water Board Water Quality Enforcement Policy.

1. Acute and Chronic Narrative Effluent Limitations

   a. Compliance with whole effluent toxicity (WET) limitations established in the Order shall be determined in accordance with Section III.B of the State Water Board’s Water Quality Enforcement Policy.

ATTACHMENT A – DEFINITIONS

Acutely Toxic Conditions, as used in the context of mixing zones, refers to lethality that occurs to mobile aquatic organisms that move or drift through the mixing zone.

Arithmetic Mean (μ): also called the average, is the sum of measured values divided by the number of samples. For ambient water concentrations, the arithmetic mean is calculated as follows:
Arithmetic mean = $\mu = \Sigma x / n$ where: Σx is the sum of the measured ambient water concentrations, and n is the number of samples.

Average Monthly Effluent Limitation (AMEL): the highest allowable average of daily discharges over a calendar month, calculated as the sum of all daily discharges measured during a calendar month divided by the number of daily discharges measured during that month.

Average Weekly Effluent Limitation (AWEL): the highest allowable average of daily discharges over a calendar week (Sunday through Saturday), calculated as the sum of all daily discharges measured during a calendar week divided by the number of daily discharges measured during that week.

Best Management Practices (BMPs): BMPs are methods, measures, or practices designed and selected to reduce or eliminate the discharge of pollutants to surface waters from point and nonpoint source discharges including storm water. BMPs include structural and non-structural controls, and operation and maintenance procedures, which can be applied before, during, and/or after pollution producing activities.

Bioaccumulative Pollutants are those substances taken up by an organism from its surrounding medium through gill membranes, epithelial tissue, or from food and subsequently concentrated and retained in the body of the organism.

Biologically-Based Receiving Water Flow refers to the method for determining receiving water flows developed by the USEPA Office of Research and Development which directly uses the averaging periods and exceedance frequencies specified in the acute and chronic aquatic life criteria for individual pollutants (e.g., 1 day and 3 years for acute criteria, and 4 days and 3 years for the chronic criteria). Biologically-based flows can be calculated using the program DFLOW.

Carcinogenic Pollutants are substances that are known to cause cancer in living organisms.

Coefficient of Variation (*CV*): CV is a measure of the data variability and is calculated as the estimated standard deviation divided by the arithmetic mean of the observed values.

Completely-Mixed Discharge: A Completely-Mixed Discharge condition means not more than a 5 percent difference, accounting for analytical variability, in the concentration of a pollutant exists across a transect of the water body at a point within two stream/river widths from the discharge point.

Daily Discharge: Daily Discharge is defined as either: (1) the total mass of the constituent discharged over the calendar day (12:00 am through 11:59 pm) or any 24-hour period that reasonably represents a calendar day for purposes of sampling (as specified in the permit), for a constituent with limitations expressed in units of mass or; (2) the unweighted arithmetic mean measurement of the constituent over the day for a constituent with limitations expressed in other units of measurement (e.g., concentration).

The daily discharge may be determined by the analytical results of a composite sample taken over the course of one day (a calendar day or other 24-hour period defined as a day) or by the arithmetic mean of analytical results from one or more grab samples taken over the course of the day.

For composite sampling, if 1 day is defined as a 24-hour period other than a calendar day, the analytical result for the 24-hour period will be considered as the result for the calendar day in which the 24-hour period ends.

Dilution Ratio is the critical low flow of the upstream receiving water divided by the flow of the effluent discharged.

Discharger-Specific Water Effect Ratio (WER): A WER that is applied to individual pollutant limits in an NPDES permit issued to a particular permit holder. A discharger-specific WER applies only to the applicable limits in the discharger's permit. Discharger-specific WERs are distinguished from WERs that are developed on a waterbody or watershed basis as part of a water quality standards action resulting in adoption of a Site Specific Objective.

Dynamic Models used for calculating effluent limitations predict the effects of receiving water and effluent flow and of concentration variability. The outputs of dynamic models can be used to base effluent limitations on probability estimates of receiving water concentrations rather than critical conditions (which are used in the steady-state model). The three dynamic modeling techniques recommended by the USEPA for calculating effluent limitations are continuous simulation, Monte Carlo simulation, and lognormal probability modeling.

Effluent Concentration Allowance (ECA) is a value derived from the water quality criterion/objective, dilution credit, and ambient background concentration that is used, in conjunction with the coefficient of variation for the effluent monitoring data, to calculate a long-term average (LTA) discharge concentration. The ECA has the same meaning as waste load allocation (WLA) as used in USEPA guidance (Technical Support Document For Water Quality-based Toxics Control, March 1991, second printing, EPA/505/2-90-001).

Enclosed Bays means indentations along the coast that enclose an area of oceanic water within distinct headlands or harbor works. Enclosed bays include all bays where the narrowest distance between the headlands or outermost harbor works is less than 75 percent of the greatest dimension of the enclosed portion of the bay. Enclosed bays include, but are not limited to, Humboldt Bay, Bodega Harbor, Tomales Bay, Drake's Estero, San Francisco Bay, Morro Bay, Los Angeles-Long Beach Harbor, Upper and Lower Newport Bay, Mission Bay, and San Diego Bay. Enclosed bays do not include inland surface waters or ocean waters.

Estimated Chemical Concentration: The estimated chemical concentration that results from the confirmed detection of the substance by the analytical method below the ML value.

Estuaries: Estuaries means waters, including coastal lagoons, located at the mouths of streams that serve as areas of mixing for fresh and ocean waters. Coastal lagoons and mouths of streams that are temporarily separated from the ocean by sandbars shall be considered estuaries. Estuarine waters shall be considered to extend from a bay or the open ocean to a point upstream where there is no significant mixing of fresh water and seawater. Estuarine waters included, but are not limited to, the Sacramento-San Joaquin Delta, as defined in Water Code Section 12220, Suisun Bay, Carquinez Strait downstream to the Carquinez Bridge, and appropriate areas of the Smith, Mad, Eel, Noyo, Russian, Klamath, San Diego, and Otay rivers. Estuaries do not include inland surface waters or ocean waters.

Existing Discharger means any discharger that is not a new discharger. An existing discharger includes an "increasing discharger" (i.e., an existing facility with treatment systems in place for its current discharge that is or will be expanding, upgrading, or modifying its existing permitted discharge after the effective date of this Order).

Four-Day Average of Daily Maximum Flows is the average of daily maximums taken from the data set in four-day intervals.

Harmonic Mean flows are expressed as $Q_{hm} = (n)/(\Sigma^{n}_{i=1}\ 1/x_i)$, where x_i = specific data values and n = number of data values.

Incompletely-Mixed Discharge: An Incompletely-Mixed Discharge is a discharge that contributes to a condition that does not meet the meaning of a completely-mixed discharge condition.

Infeasible: Infeasible means not capable of being accomplished in a successful manner within a reasonable period of time, taking into account economic, environmental, legal, social, and technological factors.

Inland Surface Waters: Inland Surface Waters are all surface waters of the State that do not include the ocean, enclosed bays, or estuaries.

Instantaneous Maximum Effluent Limitation: the highest allowable value for any single grab sample or aliquot (i.e., each grab sample or aliquot is independently compared to the instantaneous maximum limitation).

Instantaneous Minimum Effluent Limitation: the lowest allowable value for any single grab sample or aliquot (i.e., each grab sample or aliquot is independently compared to the instantaneous minimum limitation).

Load Allocation (LA) is the portion of a receiving water's total maximum daily load that is allocated to one of its nonpoint sources of pollution and/or to natural background sources.

Long-Term Arithmetic Mean Flow is at least two years of flow data used in calculating an arithmetic mean as defined in Attachment A.

Maximum Daily Effluent Limitation (MDEL): the highest allowable daily discharge of a pollutant.

Maximum Daily Flow: the maximum flow value in a calendar day.

Median: the middle measurement in a set of data. The median of a set of data is found by first arranging the measurements in order of magnitude (either increasing or decreasing order). If the number of measurements (*n*) is odd, then the median = X(*n*+1)/2. If *n* is even, then the median = (Xn/2 + X(n/2)+1)/2 (i.e., the midpoint between the *n*/2 and *n*/2+1).

Method Detection Limit (MDL): The MDL is the minimum concentration of a substance that can be measured and reported with 99 percent confidence that the analyte concentration is greater than zero, as defined in 40 CFR 136, Appendix B, revised as of May 14, 1999.

Minimum Level (ML): The ML is the concentration at which the entire analytical system must give a recognizable signal and acceptable calibration point. The ML is the concentration in a sample that is equivalent to the concentration of the lowest calibration standard analyzed by a specific analytical procedure, assuming that all the method specified sample weights, volumes, and processing steps have been followed.

Minimum Level Usage: The ML value in Appendix 4 represents the lowest quantifiable concentration in a sample based on the proper application of all method-based analytical procedures and the absence of any matrix interferences. Assuming that all method-specific analytical steps are followed, the ML value will also represent, after the appropriate application of method-specific factors, the lowest

standard in the calibration curve for that specific analytical technique. Common analytical practices sometimes require different treatment of the sample relative to calibration standards.

Mixing Zone is a limited volume of receiving water that is allocated for mixing with a wastewater discharge where water quality criteria can be exceeded without causing adverse effects to the overall water body.

Mutagenic Pollutants are substances that are known to cause a mutation (i.e., change in a gene or chromosome) in living organisms.

Mutual Water Company is defined in the California Public Utilities Code, section 2725 as: "any private corporation or association organized for the purpose of delivering water to its stockholders and members at cost, including use of works for conserving, treating and reclaiming water".

New Discharger includes any building, structure, facility, or installation from which there is, or may be, a discharge of pollutants, the construction of which commenced after the effective date of this Order.

Objectionable Bottom Deposits are an accumulation of materials or substances on or near the bottom of a water body, which creates conditions that adversely impact aquatic life, human health, beneficial uses, or aesthetics. These conditions include, but are not limited to, the accumulation of pollutants in the sediments and other conditions that result in harm to benthic organisms, production of food chain organisms, or fish egg development. The Regional Water Board shall determine the presence of such deposits on a case-by-case basis.

Ocean Waters are the territorial marine waters of the State as defined by California law to the extent these waters are outside of enclosed bays, estuaries, and coastal lagoons. Discharges to ocean waters are regulated in accordance with the State Water Board's California Ocean Plan.

Persistent pollutants are substances for which degradation or decomposition in the environment is nonexistent or very slow.

Pollutant Minimization: Pollutant Minimization means waste minimization and pollution prevention actions that include, but are not limited to, product substitution, waste stream recycling, alternative waste management methods, and education of the public and businesses.

Pollution Prevention: Pollution Prevention means any action that causes a net reduction in the use or generation of a hazardous substance or other pollutant that is discharged into water and includes, but is not limited to, input change, operational improvement, production process change, and product reformulation (as defined in Water Code Section 13263.3). Pollution prevention does not include actions that merely shift a pollutant in wastewater from one environmental medium to another environmental medium, unless clear environmental benefits of such an approach are identified to the satisfaction of the SWRCB or RWQCB.

Process Optimization means minor changes to the existing facility and treatment plant operations that optimize the effectiveness of the existing treatment processes.

Public Entity includes the federal government or a state, county, city and county, city, district, public authority, or public agency.

Reportable Level (RL): The RL is selected from the MLs listed in Appendix 4 in accordance with Section 2.4.2 or established in accordance with Section 2.4.3 of the State Implementation Policy.

Reporting Level Selection: When there is more than one ML value for a given substance, the RWQCB shall include as RLs, in the permit, all ML values, and their associated analytical methods, listed in Appendix 4 of the State Implementation Policy that are below the calculated effluent limitation. The discharger may select any one of those cited analytical methods for compliance determination. If no ML value is below the effluent limitation, then the RWQCB shall select as the RL, the lowest ML value, and its associated analytical method, listed in Appendix 4 for inclusion in the permit.

Six-month Median Effluent Limitation: the highest allowable moving median of all daily discharges for any 180-day period.

Source of Drinking Water is any water designated as municipal or domestic supply (MUN) in a RWQCB basin plan.

Standard Deviation (σ) is a measure of variability that is calculated as follows:

$\sigma = (\sum[(x - \mu)2]/(n - 1))0.5$

where:
x is the observed value;
μ is the arithmetic mean of the observed values; and
n is the number of samples.

State Implementation Policy (SIP): The Policy for Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California.

Teratogenic Pollutants are substances that are known to cause structural abnormalities or birth defects in living organisms.

Toxicity Reduction Evaluation (TRE): The TRE is a study conducted in a step-wise process designed to identify the causative agents of effluent or ambient toxicity, isolate the sources of toxicity, evaluate the effectiveness of toxicity control options, and then confirm the reduction in toxicity. The first steps of the TRE consist of the collection of data relevant to the toxicity, including additional toxicity testing, and an evaluation of facility operations and maintenance practices, and best management practices. A Toxicity Identification Evaluation (TIE) may be required as part of the TRE, if appropriate. (A TIE is a set of procedures to identify the specific chemical(s) responsible for toxicity. These procedures are performed in three phases (characterization, identification, and confirmation) using aquatic organism toxicity tests.)

Use Attainability Analysis: A Use Attainability Analysis is a structured scientific assessment of the factors affecting the attainment of the use which may include physical, chemical, biological and economic factors as described in 40 CFR 131.10(g) (40 CFR 131.3, revised as of July 1, 1997).

Water Effect Ratio (WER): A WER is an appropriate measure of the toxicity of a material obtained in a site water divided by the same measure of the toxicity of the same material obtained simultaneously in a laboratory dilution water.

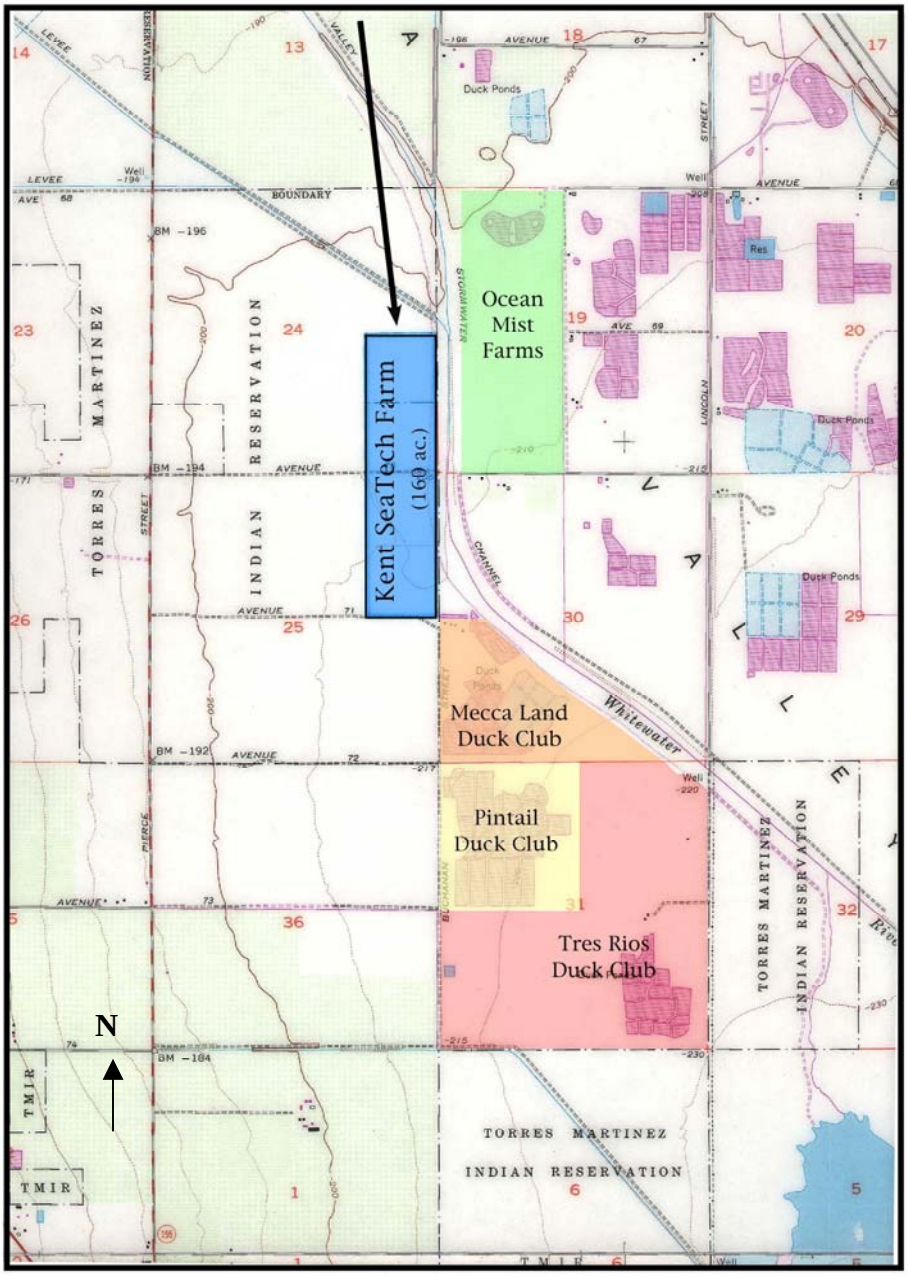
1Q10: is the lowest flow that occurs for one day with a statistical frequency of once every 10 years.

7Q10: is the average low flow that occurs for seven consecutive days with a statistical frequency of once every 10 years.

90th Percentile of observed data: the measurement in the ordered set of data (lowest to highest) where 90 percent of the reported measurements are less than or equal to that Value.

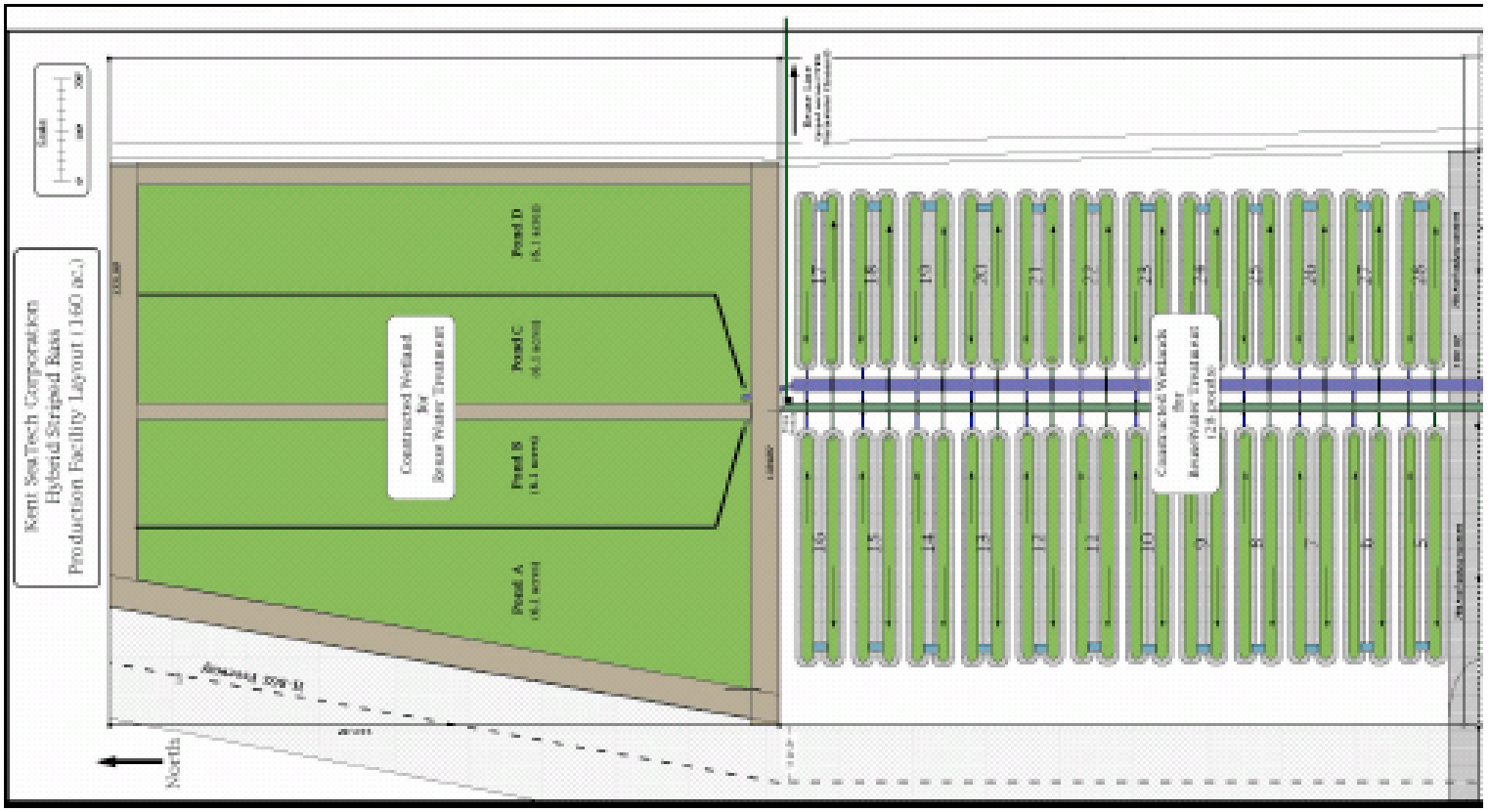
ATTACHMENT B – AREA MAP

Kent SeaTech Fish Farm
E1/2 of the SE1/4 of Section 24 & E1/2 of the NE1/4 of Section 25
T7S, R8E, San Bernadino Base and Meridian

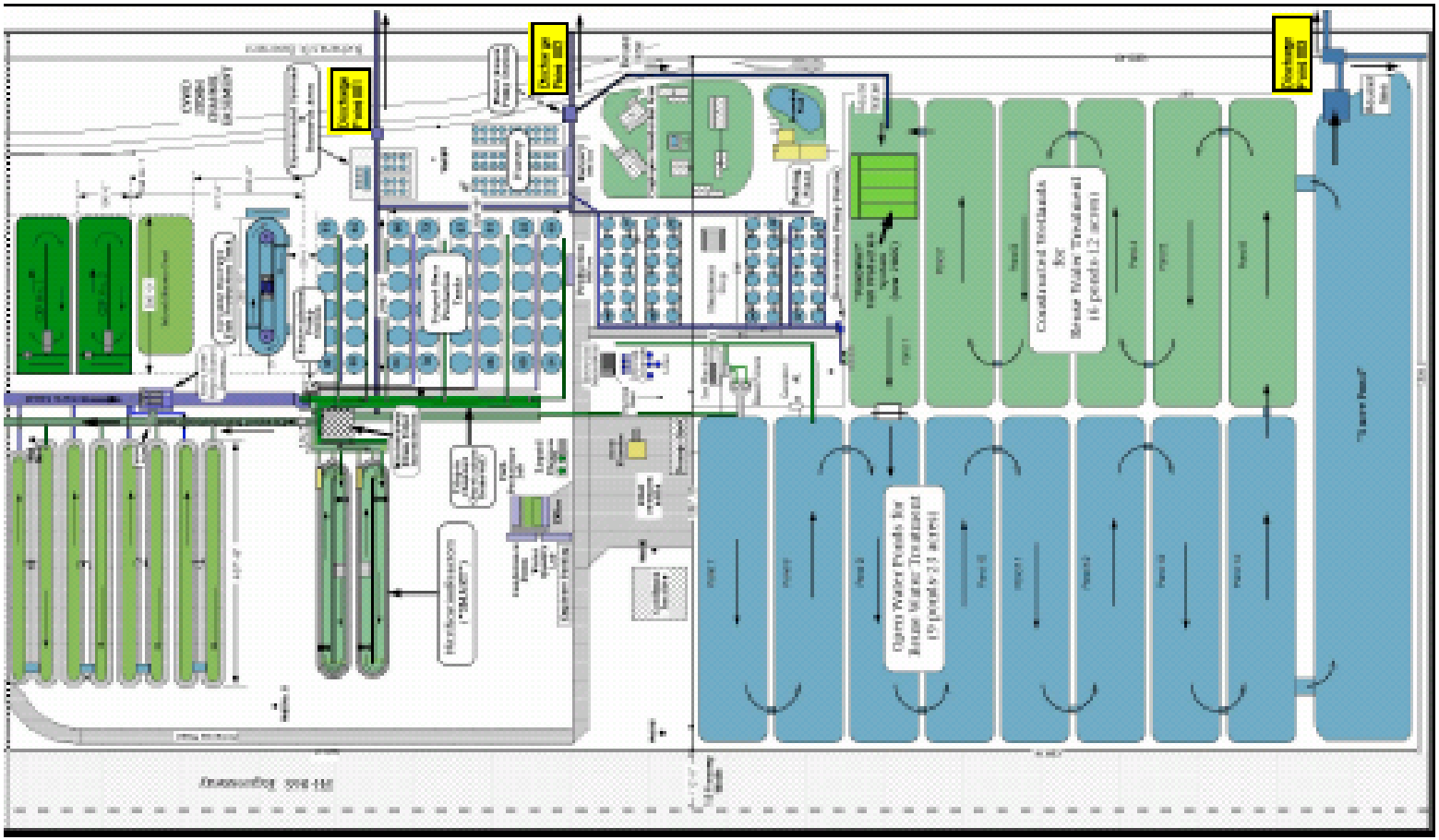


U.S.G.S Mecca Quadrangle, 7.5 Minute Series Map

ATTACHMENT C – FLOW SCHEMATIC



ATTACHMENT C – FLOW SCHEMATIC CONTINUED



ATTACHMENT D – FEDERAL STANDARD PROVISIONS

I. STANDARD PROVISIONS – PERMIT COMPLIANCE

A. Duty to Comply

1. The Discharger must comply with all of the conditions of this Order. Any noncompliance constitutes a violation of the Clean Water Act (CWA) and the California Water Code (CWC) and is grounds for enforcement action, for permit termination, revocation and reissuance, or denial of a permit renewal application [*40 CFR §122.41(a)*].

2. The Discharger shall comply with effluent standards or prohibitions established under Section 307(a) of the Clean Water Act for toxic pollutants and with standards for sewage sludge use or disposal established under Section 405(d) of the CWA within the time provided in the regulations that establish these standards or prohibitions, even if this Order has not been modified to incorporate the requirement [*40 CFR §122.41(a)(1)*].

B. Need to Halt or Reduce Activity Not a Defense

It shall not be a defense for a Discharger in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this Order [*40 CFR §122.41(c)*].

C. Duty to Mitigate

The Discharger shall take all reasonable steps to minimize or prevent any discharge or sludge use or disposal in violation of this Order that has a reasonable likelihood of adversely affecting human health or the environment [*40 CFR §122.41(d)*].

D. Proper Operation and Maintenance

The Discharger shall at all times properly operate and maintain all facilities and systems of treatment and control (and related appurtenances) which are installed or used by the Discharger to achieve compliance with the conditions of this Order. Proper operation and maintenance also includes adequate laboratory controls and appropriate quality assurance procedures. This provision requires the operation of backup or auxiliary facilities or similar systems that are installed by a Discharger only when necessary to achieve compliance with the conditions of this Order [*40 CFR §122.41(e)*].

E. Property Rights

1. This Order does not convey any property rights of any sort or any exclusive privileges [*40 CFR §122.41(g)*].

2. The issuance of this Order does not authorize any injury to persons or property or invasion of other private rights, or any infringement of State or local law or regulations [*40 CFR §122.5(c)*].

F. Inspection and Entry

The Discharger shall allow the Regional Water Quality Control Board (RWQCB), State Water Resources Control Board (SWRCB), United States Environmental Protection Agency (USEPA), and/or their authorized representatives (including an authorized contractor acting as their representative), upon the presentation of credentials and other documents, as may be required by law, to [*40 CFR §122.41(i)*] [*CWC 13383(c)*]:

1. Enter upon the Discharger's premises where a regulated facility or activity is located or conducted, or where records are kept under the conditions of this Order [*40 CFR §122.41(i)(1)*];

2. Have access to and copy, at reasonable times, any records that must be kept under the conditions of this Order [*40 CFR §122.41(i)(2)*];

3. Inspect and photograph, at reasonable times, any facilities, equipment (including monitoring and control equipment), practices, or operations regulated or required under this Order [*40 CFR §122.41(i)(3)*];

4. Sample or monitor, at reasonable times, for the purposes of assuring Order compliance or as otherwise authorized by the CWA or the CWC, any substances or parameters at any location [*40 CFR §122.41(i)(4)*].

G. Bypass

1. Definitions

   a. “Bypass” means the intentional diversion of waste streams from any portion of a treatment facility [*40 CFR §122.41(m)(1)(i)*].

   b. “Severe property damage” means substantial physical damage to property, damage to the treatment facilities, which causes them to become inoperable, or substantial and permanent loss of natural resources that can reasonably be expected to occur in the absence of a bypass. Severe property damage does not mean economic loss caused by delays in production [*40 CFR §122.41(m)(1)(ii)*].

2. Bypass not exceeding limitations – The Discharger may allow any bypass to occur which does not cause exceedances of effluent limitations, but only if it is for essential maintenance to assure efficient operation. These bypasses are not subject to the provisions listed in Standard Provisions – Permit Compliance I.G.3 and I.G.5 below [*40 CFR §122.41(m)(2)*].

3. Prohibition of bypass – Bypass is prohibited, and the Regional Water Board may take enforcement action against a Discharger for bypass, unless [*40 CFR §122.41(m)(4)(i)*]:

   a. Bypass was unavoidable to prevent loss of life, personal injury, or severe property damage [*40 CFR §122.41(m)(4)(A)*];

   b. There were no feasible alternatives to the bypass, such as the use of auxiliary treatment facilities, retention of untreated wastes, or maintenance during normal periods of equipment downtime. This condition is not satisfied if adequate back-up equipment should have been installed in the exercise of reasonable engineering judgment to

prevent a bypass that occurred during normal periods of equipment downtime or preventive maintenance [*40 CFR §122.41(m)(4)(B)*]; and

c. The Discharger submitted notice to the Regional Water Board as required under Standard Provision – Permit Compliance I.G.5 below [*40 CFR §122.41(m)(4)(C)*].

4. The Regional Water Board may approve an anticipated bypass, after considering its adverse effects, if the Regional Water Board determines that it will meet the three conditions listed in Standard Provisions – Permit Compliance I.G.3 above [*40 CFR §122.41(m)(4)(ii)*].

5. Notice

a. Anticipated bypass. If the Discharger knows in advance of the need for a bypass, it shall submit a notice, if possible at least 10 days before the date of the bypass [*40 CFR §122.41(m)(3)(i)*].

b. Unanticipated bypass. The Discharger shall submit notice of an unanticipated bypass as required in Standard Provisions - Reporting V.E below [*40 CFR §122.41(m)(3)(ii)*].

H. Upset

Upset means an exceptional incident in which there is unintentional and temporary noncompliance with technology based permit effluent limitations because of factors beyond the reasonable control of the permittee. An upset does not include noncompliance to the extent caused by operational error, improperly designed treatment facilities, inadequate treatment facilities, lack of preventive maintenance, or careless or improper operation [*40 CFR §122.41(n)(1)*].

1. Effect of an upset. An upset constitutes an affirmative defense to an action brought for noncompliance with such technology based permit effluent limitations if the requirements of paragraph H.2 of this section are met. No determination made during administrative review of claims that noncompliance was caused by upset, and before an action for noncompliance, is final administrative action subject to judicial review [*40 CFR §122.41(n)(2)*].

2. Conditions necessary for a demonstration of upset. A Discharger who wishes to establish the affirmative defense of upset shall demonstrate, through properly signed, contemporaneous operating logs or other relevant evidence that [*40 CFR §122.41(n)(3)*]:

a. An upset occurred and that the Discharger can identify the cause(s) of the upset [*40 CFR §122.41(n)(3)(i)*];

b. The permitted facility was, at the time, being properly operated [*40 CFR §122.41(n)(3)(i)*];

c. The Discharger submitted notice of the upset as required in Standard Provisions – Reporting V.E.2.b [*40 CFR §122.41(n)(3)(iii)*]; and

d. The Discharger complied with any remedial measures required under Standard Provisions – Permit Compliance I.C above [*40 CFR §122.41(n)(3)(iv)*].

3. Burden of proof. In any enforcement proceeding, the Discharger seeking to establish the occurrence of an upset has the burden of proof [*40 CFR §122.41(n)(4)*].

II. STANDARD PROVISIONS – PERMIT ACTION

A. General

This Order may be modified, revoked and reissued, or terminated for cause. The filing of a request by the Discharger for modification, revocation and reissuance, or termination, or a notification of planned changes or anticipated noncompliance does not stay any Order condition [*40 CFR §122.41(f)*].

B. Duty to Reapply

If the Discharger wishes to continue an activity regulated by this Order after the expiration date of this Order, the Discharger must apply for and obtain a new permit [*40 CFR §122.41(b)*].

C. Transfers

This Order is not transferable to any person except after notice to the Regional Water Board. The Regional Water Board may require modification or revocation and reissuance of the Order to change the name of the Discharger and incorporate such other requirements as may be necessary under the CWA and the CWC [*40 CFR §122.41(l)(3)*] [*40 CFR §122.61*].

III. STANDARD PROVISIONS – MONITORING

A. Samples and measurements taken for the purpose of monitoring shall be representative of the monitored activity [*40 CFR §122.41(j)(1)*].

B. Monitoring results must be conducted according to test procedures under 40 CFR Part 136 or, in the case of sludge use or disposal, approved under 40 CFR Part 136 unless otherwise specified in 40 CFR Part 503 unless other test procedures have been specified in this Order [*40 CFR §122.41(j)(4)*] [*40 CFR §122.44(i)(1)(iv)*].

IV. STANDARD PROVISIONS – RECORDS

A. Except for records of monitoring information required by this Order related to the Discharger's sewage sludge use and disposal activities, which shall be retained for a period of at least five years (or longer as required by 40 CFR Part 503), the Discharger shall retain records of all monitoring information, including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation, copies of all reports required by this Order, and records of all data used to complete the application for this Order, for a period of at least three (3) years from the date of the sample, measurement, report or application. This period may be extended by request of the Regional Water Board Executive Officer at any time [*40 CFR §122.41(j)(2)*].

B. Records of monitoring information shall include:

1. The date, exact place, and time of sampling or measurements [*40 CFR §122.41(j)(3)(i)*];

2. The individual(s) who performed the sampling or measurements [*40 CFR §122.41(j)(3)(ii)*];

3. The date(s) analyses were performed [*40 CFR §122.41(j)(3)(iii)*];

4. The individual(s) who performed the analyses [*40 CFR §122.41(j)(3)(iv)*];

5. The analytical techniques or methods used [*40 CFR §122.41(j)(3)(v)*]; and

6. The results of such analyses [*40 CFR §122.41(j)(3)(vi)*].

C. Claims of confidentiality for the following information will be denied [*40 CFR §122.7(b)*]:

1. The name and address of any permit applicant or Discharger [*40 CFR §122.7(b)(1)*]; and

2. Permit applications and attachments, permits and effluent data [*40 CFR §122.7(b)(2)*].

V. STANDARD PROVISIONS – REPORTING

A. Duty to Provide Information

The Discharger shall furnish to the Regional Water Board, SWRCB, or USEPA within a reasonable time, any information which the Regional Water Board, SWRCB, or USEPA may request to determine whether cause exists for modifying, revoking and reissuing, or terminating this Order or to determine compliance with this Order. Upon request, the Discharger shall also furnish to the Regional Water Board, SWRCB, or USEPA copies of records required to be kept by this Order [*40 CFR §122.41(h)*] [*CWC 13267*].

B. Signatory and Certification Requirements

1. All applications, reports, or information submitted to the Regional Water Board, SWRCB, and/or USEPA shall be signed and certified in accordance with paragraph (2.) and (3.) of this provision [*40 CFR §122.41(k)*].

2. All permit applications shall be signed as follows:

   a. For a corporation: By a responsible corporate officer. For the purpose of this section, a responsible corporate officer means: (i) A president, secretary, treasurer, or vice-president of the corporation in charge of a principal business function, or any other person who performs similar policy- or decision-making functions for the corporation, or (ii) the manager of one or more manufacturing, production, or operating facilities, provided, the manager is authorized to make management decisions which govern the operation of the regulated facility including having the explicit or implicit duty of making major capital investment recommendations, and initiating and directing other comprehensive measures to assure long term environmental compliance with environmental laws and regulations; the manager can ensure that the necessary systems are established or actions taken to gather complete and accurate information for permit application requirements; and where authority to sign documents has been assigned or delegated to the manager in accordance with corporate procedures [*40 CFR §122.22(a)(1)*];

   b. For a partnership or sole proprietorship: by a general partner or the proprietor, respectively [*40 CFR §122.22(a)(2)*]; or

c. For a municipality, State, federal, or other public agency: by either a principal executive officer or ranking elected official. For purposes of this provision, a principal executive officer of a federal agency includes: (i) the chief executive officer of the agency, or (ii) a senior executive officer having responsibility for the overall operations of a principal geographic unit of the agency (e.g., Regional Administrators of USEPA) [*40 CFR §122.22(a)(3)*].

3. All reports required by this Order and other information requested by the Regional Water Board, State Water Board, or USEPA shall be signed by a person described in paragraph (b) of this provision, or by a duly authorized representative of that person. A person is a duly authorized representative only if:

   a. The authorization is made in writing by a person described in paragraph (2.) of this provision [*40 CFR §122.22(b)(1)*];

   b. The authorization specified either an individual or a position having responsibility for the overall operation of the regulated facility or activity such as 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 (a duly authorized representative may thus be either a named individual or any individual occupying a named position) [*40 CFR §122.22(b)(2)*]; and

   c. The written authorization is submitted to the Regional Water Board, SWRCB, or USEPA [*40 CFR §122.22(b)(3)*].

4. If an authorization under paragraph (3.) of this provision is no longer accurate because a different individual or position has responsibility for the overall operation of the facility, a new authorization satisfying the requirements of paragraph (3.) of this provision must be submitted to the Regional Water Board, SWRCB or USEPA prior to or together with any reports, information, or applications, to be signed by an authorized representative [40 CFR §122.22(c)].

5. Any person signing a document under paragraph (2.) or (3.) of this provision shall make the following certification:

   "I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage 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" [*40 CFR §122.22(d)*].

C. Monitoring Reports

1. Monitoring results shall be reported at the intervals specified in the Monitoring and Reporting Program in this Order [*40 CFR §122.41(l)(4)*].

2. Monitoring results must be reported on a Discharge Monitoring Report (DMR) form or forms provided or specified by the Regional Water Board or SWRCB for reporting results of monitoring of sludge use or disposal practices [*40 CFR §122.41(l)(4)(i)*].

3. If the Discharger monitors any pollutant more frequently than required by this Order using test procedures approved under 40 CFR Part 136 or, in the case of sludge use or disposal, approved under 40 CFR Part 136 unless otherwise specified in 40 CFR Part 503, or as specified in this Order, the results of this monitoring shall be included in the calculation and reporting of the data submitted in the DMR or sludge reporting form specified by the Regional Water Board [*40 CFR §122.41(l)(4)(ii)*].

4. Calculations for all limitations, which require averaging of measurements, shall utilize an arithmetic mean unless otherwise specified in this Order [*40 CFR §122.41(l)(4)(iii)*].

D. Compliance Schedules

Reports of compliance or noncompliance with, or any progress reports on, interim and final requirements contained in any compliance schedule of this Order, shall be submitted no later than 14 days following each schedule date [*40 CFR §122.41(l)(5)*].

E. Twenty-Four Hour Reporting

1. The Discharger shall report any noncompliance that may endanger health or the environment. Any information shall be provided orally within 24 hours from the time the Discharger becomes aware of the circumstances. A written submission shall also be provided within five (5) days of the time the Discharger becomes aware of the circumstances. The written submission shall contain a description of the noncompliance and its cause; the period of noncompliance, including exact dates and times, and if the noncompliance has not been corrected, the anticipated time it is expected to continue; and steps taken or planned to reduce, eliminate, and prevent reoccurrence of the noncompliance [*40 CFR §122.41(l)(6)(i)*].

2. The following shall be included as information that must be reported within 24 hours under this paragraph [*40 CFR §122.41(l)(6)(ii)*]:

   a. Any unanticipated bypass that exceeds any effluent limitation in this Order [*40 CFR §122.41(l)(6)(ii)(A)*].

   b. Any upset that exceeds any effluent limitation in this Order [*40 CFR §122.41(l)(6)(ii)(B)*].

   c. Violation of a maximum daily discharge limitation for any of the pollutants listed in this Order to be reported within 24 hours [*40 CFR §122.41(l)(6)(ii)(C)*].

3. The Regional Water Board may waive the above-required written report under this provision on a case-by-case basis if an oral report has been received within 24 hours [*40 CFR §122.41(l)(6)(iii)*].

F. Planned Changes

The Discharger shall give notice to the Regional Water Board as soon as possible of any planned physical alterations or additions to the permitted facility. Notice is required under this provision only when [*40 CFR §122.41(l)(1)*]:

1. The alteration or addition to a permitted facility may meet one of the criteria for determining whether a facility is a new source in 40 CFR §122.29(b) [*40 CFR §122.41(l)(1)(i)*]; or

2. The alteration or addition could significantly change the nature or increase the quantity of pollutants discharged. This notification applies to pollutants which are subject neither to effluent limitations in this Order nor to notification requirements under 40 CFR Part 122.42(a)(1) (see Additional Provisions—Notification Levels VII.A.1) [*40 CFR §122.41(l)(1)(ii)*].

3. The alteration or addition results in a significant change in the Discharger's sludge use or disposal practices, and such alteration, addition, or change may justify the application of permit conditions that are different from or absent in the existing permit, including notification of additional use or disposal sites not reported during the permit application process or not reported pursuant to an approved land application plan [*40 CFR §122.41(l)(1)(iii)*].

G. Anticipated Noncompliance

The Discharger shall give advance notice to the Regional Water Board or SWRCB of any planned changes in the permitted facility or activity that may result in noncompliance with General Order requirements [*40 CFR §122.41(l)(2)].*

H. Other Noncompliance

The Discharger shall report all instances of noncompliance not reported under Standard Provisions – Reporting E.3, E.4, and E.5 at the time monitoring reports are submitted. The reports shall contain the information listed in Standard Provision – Reporting V.E [*40 CFR §122.41(l)(7)*].

I. Other Information

When the Discharger becomes aware that it failed to submit any relevant facts in a permit application, or submitted incorrect information in a permit application or in any report to the Regional Water Board, SWRCB, or USEPA, the Discharger shall promptly submit such facts or information [*40 CFR §122.41(l)(8)*].

VI. STANDARD PROVISIONS – ENFORCEMENT

A. The Regional Water Board is authorized to enforce the terms of this permit under several provisions of the CWC, including, but not limited to, sections 13385, 13386, and 13387.

VII. ADDITIONAL PROVISIONS – NOTIFICATION LEVELS

A. Non-Municipal Facilities

Existing manufacturing, commercial, mining, and silvicultural dischargers shall notify the Regional Water Board as soon as they know or have reason to believe [*40 CFR §122.42(a)*]:

1. That any activity has occurred or will occur that would result in the discharge, on a routine or frequent basis, of any toxic pollutant that is not limited in this Order, if that discharge will exceed the highest of the following "notification levels" [*40 CFR §122.42(a)(1)*]:

   a. 100 micrograms per liter (µg/L) [*40 CFR §122.42(a)(1)(i)*];

   b. 200 µg/L for acrolein and acrylonitrile; 500 µg/L for 2,4-dinitrophenol and 2-methyl-4,6-dinitrophenol; and 1 milligram per liter (mg/L) for antimony [*40 CFR §122.42(a)(1)(ii)*];

c. Five (5) times the maximum concentration value reported for that pollutant in the Report of Waste Discharge [*40 CFR §122.42(a)(1)(iii)*]; or

d. The level established by the Regional Water Board in accordance with 40 CFR §122.44(f) [*40 CFR §122.42(a)(1)(iv)*].

2. That any activity has occurred or will occur that would result in the discharge, on a non-routine or infrequent basis, of any toxic pollutant that is not limited in this Order, if that discharge will exceed the highest of the following "notification levels" [*40 CFR §122.42(a)(2)*]:

a. 500 micrograms per liter (µg/L) [*40 CFR §122.42(a)(2)(i)*];

b. 1 milligram per liter (mg/L) for antimony [*40 CFR §122.42(a)(2)(ii)*];

c. Ten (10) times the maximum concentration value reported for that pollutant in the Report of Waste Discharge [*40 CFR §122.42(a)(2)(iii)*]; or

d. The level established by the Regional Water Board in accordance with 40 CFR §122.44(f) [*40 CFR §122.42(a)(2)(iv)*].

B. Publicly-Owned Treatment Works (POTWs)

All POTWs shall provide adequate notice to the Regional Water Board of the following [*40 CFR §122.42(b)*]:

1. Any new introduction of pollutants into the POTW from an indirect discharger that would be subject to Sections 301 or 306 of the CWA if it were directly discharging those pollutants [*40 CFR §122.42(b)(1)*]; and

2. Any substantial change in the volume or character of pollutants being introduced into that POTW by a source introducing pollutants into the POTW at the time of adoption of the Order [*40 CFR §122.42(b)(2)*].

3. Adequate notice shall include information on the quality and quantity of effluent introduced into the POTW as well as any anticipated impact of the change on the quantity or quality of effluent to be discharged from the POTW [*40 CFR §122.42(b)(3)*].

ATTACHMENT E – MONITORING AND REPORTING PROGRAM / TABLE OF CONTENTS

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ATTACHMENT E – MONITORING AND REPORTING PROGRAM (MRP)

The Code of Federal Regulations (CFR) at 40 CFR §122.48 requires that all NPDES permits specify monitoring and reporting requirements. California Water Code (CWC) Sections 13267 and 13383 also authorize the Regional Water Quality Control Board (Regional Water Board) to require technical and monitoring reports. This MRP establishes monitoring and reporting requirements, which implement federal and California (State) regulations.

I. GENERAL MONITORING PROVISIONS

A. Samples and measurements taken as required herein shall be representative of the volume and nature of the monitored discharge. All samples shall be taken at the monitoring locations specified below and, unless otherwise specified, before the monitored flow joins or is diluted by any other waste stream, body of water, or substance. Monitoring locations shall not be changed without notification to and the approval of the Regional Water Board.

B. Appropriate flow measurement devices and methods consistent with accepted scientific practices shall be selected and used to ensure the accuracy and reliability of measurements of the volume of monitored discharges. The devices shall be installed, calibrated and maintained to ensure that the accuracy of the measurements is consistent with the accepted capability of that type of device. Devices selected shall be capable of measuring flows with a maximum deviation of less than ±10 percent from true discharge rates throughout the range of expected discharge volumes. Guidance in selection, installation, calibration and operation of acceptable flow measurement devices can be obtained from the following references:

1. "A Guide to Methods and Standards for the Measurement of Water Flow," U.S. Department of Commerce, National Bureau of Standards, NBS Special Publication 421, May 1975, 96 pp. (Available from the U.S. Government Printing Office, Washington, D.C. 20402. Order by SD Catalog No. C13.10:421.)

2. "Water Measurement Manual," U.S. Department of Interior, Bureau of Reclamation, Second Edition, Revised Reprint, 1974, 327 pp. (Available from the U.S. Government Printing Office, Washington D.C. 20402. Order by Catalog No. 172.19/2:W29/2, Stock No. S/N 24003-0027.)

3. "Flow Measurement in Open Channels and Closed Conduits," U.S. Department of Commerce, National Bureau of Standards, NBS Special Publication 484, October 1977, 982 pp. (Available in paper copy or microfiche from National Technical Information Services (NTIS) Springfield, VA 22151. Order by NTIS No. PB-273 535/5ST.)

4. "NPDES Compliance Sampling Manual," U.S. Environmental Protection Agency, Office of Water Enforcement, Publication MCD-51, 1977, 140 pp. (Available from the General Services Administration (8FFS), Centralized Mailing Lists Services, Building 41, Denver Federal Center, CO 80225.)

C. Unless otherwise approved by the Regional Water Board's Executive Officer, all other analyses shall be conducted at a laboratory certified for such analyses by the State Department of Health Services. All analyses shall be conducted in accordance with the latest edition of "Guidelines Establishing Test Procedures for Analysis of Pollutants", promulgated by the United States Environmental Protection Agency (USEPA).

D. All monitoring instruments and devices used by the discharger to fulfill the prescribed monitoring program shall be properly maintained and calibrated as necessary to ensure their continued accuracy. In the event flow measurement devices are used at the facility, they shall be calibrated at least once per year to ensure continued accuracy of the devices.

E. Monitoring results, including noncompliance, shall be reported at intervals and in a manner specified in this Monitoring and Reporting Program.

F. If the facility is not in operation, or there is no discharge during a required reporting period, the discharger shall forward a letter to the Regional Water Board indicating that there has been no activity during the required reporting period.

II. MONITORING LOCATIONS

The Discharger shall establish the following monitoring locations to demonstrate compliance with the effluent limitations, discharge specifications, and other requirements in this Order:

Table E-1 Monitoring Locations

Discharge Point Name	Monitoring Location Name	Monitoring Location Description
001	EFF-001	Representative sample of the aquaculture wastewater, after all treatment operations, flowing through the Emergency Outfall.
002	EFF -002	Representative sample of the wastewater aquaculture wastewater, after all treatment operations, flowing through the Main Outfall.
003	EFF -003	Representative sample of the aquaculture wastewater, after all potential pollutants and treatment operations and prior to diversion for reuse at the three duck hunting clubs, flowing through the Southern Outfall.
--	R-001	The representative upstream sample shall be obtained no further than 200 feet upstream from all points of discharge from the Facility.
--	R-002	The representative downstream sample shall be obtained no further than 200 feet downstream of all points of discharge.

III. INFLUENT MONITORING REQUIREMENTS – NOT APPLICABLE

IV. EFFLUENT MONITORING REQUIREMENTS

A. Monitoring Locations: EFF-001, EFF-002, and EFF-003

1. The Discharger shall monitor treated aquaculture wastewater at EFF-001, EFF -002, and EFF -003 as follows. If more than one analytical test method is listed for a given parameter, the discharger may select from the listed methods and associated Reporting Level:

Table E-2 Effluent Monitoring Requirements

Parameter	Units	Sample Type	Minimum Sampling Frequency	Required Analytical Test Method and (Reporting Level, units), respectively
Daily Effluent Discharge	MGD	Calculation[1]	1x/Day[2, 3]	See Footnote [4]
BOD 5-day 20°C	mg/L	24-Hr. Composite	1x/Month[3]	See Footnote [5]
Turbidity	NTU	Grab	1x/Month[3]	See Footnote [5]
Total Suspended Solids	mg/L	24-Hr. Composite	1x/Month[3]	See Footnote [5]
pH	pH Units	Field	1x/Month[3]	See Footnote [5]
Total Dissolved Solids	mg/L	24-Hr. Composite	1x/Month[3]	See Footnote [5]
Nitrates as Nitrogen (N)	mg/L	24-Hr. Composite	1x/Month[3]	See Footnote [5]
Ammonia Nitrogen as N	mg/L	24-Hr. Composite	1x/Month[3]	See Footnote [5]
Total Nitrogen as N	mg/L	24-Hr. Composite	1x/Month[3]	See Footnote [5]
Total Phosphate as Phosphorus (P)	mg/L	24-Hr. Composite	1x/Month[3]	See Footnote [5]
Sulfates	mg/L	24-Hr. Composite	1x/Month[3]	See Footnote [5]
Priority Pollutants[6]	µg/L	Grab	1x/permit term	See Footnote [5]

V. WHOLE EFFLUENT TOXICITY TESTING REQUIREMENTS

A. Monitoring Requirements: EFF-001, EFF-002, and EFF-003

1. Bioassays shall be performed to evaluate the toxicity of the discharged wastewater in accordance with the following procedures unless otherwise specified by the Regional Water Board's Executive Officer or his designee:

   a. Bioassays shall be conducted on a sensitive fish species and an invertebrate species as approved by the Regional Water Board's Executive Officer. *Pimephales promelas* (fathead minnow) and *Ceriodaphnia dubia* (water flea) are suggested test species that

[1] Difference in volume between new input water and reuse flow; reuse flow shall be the sum of all water being reused offsite, including that being land applied.
[2] A minimum of five daily samples per week shall be collected. Monitoring shall be performed at a location downstream from all reuse diversions.
[3] Sample collection shall begin immediately upon discharge to Coachella Valley Storm Channel and will continue until the facility ceases to discharge to Coachella Valley Storm Channel.
[4] Report Total Daily Flow
[5] Pollutants shall be analyzed using the analytical methods described in 40 CFR Part 136; for priority pollutants the methods must meet the lowest minimum levels (MLs) specified in Attachment 4 of the SIP, where no methods are specified for a given pollutant, by methods approved by this Regional Water Board or the State Water Board
[6] Priority pollutants as defined California Toxics Rule (CTR) defined in Finding II.I of the Limitations and Discharge Requirements of this Order, and included as Attachment G.

may be utilized. The bioassays shall be conducted in accordance with the protocol given in EPA/821-R-02-013 – Short Term Methods for Estimating the Chronic Toxicity of Effluent and Receiving Waters to Freshwater Organisms, 4th Edition, and EPA/821-R-02-012 – Methods for Measuring the Acute Toxicity of Effluents and Receiving Waters for Freshwater and Marine Organisms, 5th Edition, or subsequent editions.

2. The Discharger shall conduct chronic and acute toxicity testing on the final effluent discharged to the Coachella Valley Storm Channel at Monitoring Locations EFF-001, EFF-002, and EFF-003 as follows:

Table E-3 Whole Effluent Toxicity Testing

Test	Units	Sample Type	Minimum Sampling Frequency
Chronic Toxicity	TUc [7]	24-hr Composite	1x/Year
Acute Toxicity	TUa[8,9]	24-hr. composite	1x/Year

3. Both test species given below shall be used to measure chronic and acute toxicity:

Table E-4 Approved Test for Acute and Chronic Toxicity

Species	Effect	Test Duration (days)	Reference
Fathead Minnow (Pimephales promelas)	Larval Survival and Growth	7	EPA/821-R-02-013 (Chronic) EPA/821-R-02-012 [10](Acute)
Water Flea (Ceriodaphnia dubia)	Survival and Reproduction	7	EPA/821-R-02-013 (Chronic) EPA/821-R-02-012 (Acute)

4. Toxicity Test References for Conducing Toxicity Tests

   a. Methods for Measuring the Acute Toxicity of Effluents and Receiving Waters to Freshwater and Marine Organisms, Fifth Edition, EPA/821-R-02-012, October 2002 or subsequent editions.

   b. Short Term Methods for Estimating the Chronic Toxicity of Effluents and Receiving Water for Freshwater Organisms, Fourth Edition, EPA/821-R-02-013, October 2002 or subsequent editions.

B. Quality Assurance

1. Dilution and control waters may be obtained from an unaffected area of receiving waters. Synthetic (standard) dilution is an option and may be used if the above source is suspected to have toxicity greater than 1.0 TU_c

[7] Chronic Toxicity Units
[8] Acute Bioassay results can be calculated from chronic bioassay test for Pimephales promelas
[9] Discharger can provide Pass/Fail when using a t-test
[10] Acute Bioassay results can be calculated from chronic bioassay test for Pimephales promelas

2. A series of at least five dilutions and a control shall be tested for chronic toxicity testing and may be used for acute toxicity testing. The series shall include the following concentrations: 12.5, 25, 50, 75, and 100 percent effluent.

3. For the acute toxicity testing using a t-test, two dilutions shall be used, i.e., 100 percent effluent and a control (when a t-test is used instead of an LC50).

4. If organisms are not cultured in-house, concurrent testing with a referenced toxicant shall be conducted. Where organisms are cultured in-house, monthly reference toxicant testing is sufficient. Reference toxicant tests also shall be conducted using the same test conditions as the effluent toxicity tests (e.g., same test duration, etc.).

5. If either the reference toxicant test or effluent test does not meet all test acceptability criteria (TAC) as specified in the toxicity test references, then the permittee must re-sample and retest within 15 working days or as soon as possible. The retesting period begins when the Discharger collects the first sample required to complete the retest.

6. The reference toxicant and effluent tests must meet the upper and lower bounds on test sensitivity as determined by calculating the percent minimum significant difference (PMSD) for each test result. The test sensitivity bound is specified for each test method in the respective methods manuals.

C. Accelerated Monitoring Requirements

When the numeric toxicity trigger is exceeded during regular toxicity monitoring, and the testing meets all test acceptability criteria, the Discharger shall initiate accelerated monitoring to confirm the effluent toxicity.

The Discharger shall implement an accelerated monitoring frequency consisting of performing three (3) toxicity tests in a nine (9)-week period beginning from the date the Discharger receives an initial exceedance of the chronic or acute toxicity triggers described below:

Any chronic toxicity test that exceeds 2 chronic toxicity units (TU_c) or a three (3)-sample median[11] (consecutive samples) that exceeds 1 TU_c shall trigger an accelerated monitoring frequency. In addition, any acute toxicity test results showing high toxicity shall trigger an accelerated monitoring frequency. High acute toxicity is defined as follows:

a. Less than 80% survival when acute toxicity is calculated from results of the chronic toxicity test (only for *Pimephales promelas*), or

b. Less than 90% survival when acute toxicity is calculated from the results of the acute toxicity test, or

c. Results of acute toxicity t-test for 100 percent effluent concentration that is reported as failed.

The scope of accelerated monitoring shall be limited to the species and analytical method that failed the test.

[11] 3-Sample median is defined as follows: The Middle value of three (3) consecutive samples arranged from the low value to the high value.

The numeric toxicity triggers are not an effluent limitation, they are the toxicity threshold at which the Discharger is required to perform accelerated monitoring to confirm effluent toxicity, as well as, the threshold to initiate a Toxicity Reduction Evaluation (TRE) if toxicity is confirmed.

If implementation of the generic TRE workplan indicates the source of the exceedance of the toxicity trigger (for instance, a temporary plant upset), then only one additional test is necessary. If exceedance of the toxicity trigger is detected in this test, the Discharger will continue with accelerated monitoring requirements or implement the Toxicity Identification and Toxicity Reduction Evaluations.

If none of the three tests indicated exceedance of the toxicity trigger, then the permittee may return to the normal bioassay testing frequency.

D. Conducting Toxicity Identification Evaluations and Toxicity Reduction Evaluations

1. A Toxicity Identification Evaluation (TIE) shall be triggered if testing from the accelerated monitoring frequency indicates any of the following:

   a. Two of the three accelerated chronic toxicity tests are reported as failed tests meeting any of the conditions specified in Attachment E, Section V.C; or

   b. Two of the three acute toxicity tests are reported as failed tests meeting any of the conditions specified in Attachment E, Section V.C.

2. The TIE shall be initiated within 15 days following failure of the second accelerated monitoring test.

3. If a TIE is triggered prior to the completion of the accelerated testing, the accelerated testing schedule may be terminated, or used as necessary in performing the TIE.

4. The TIE shall be conducted to identify and evaluate toxicity in accordance with procedures recommended by the USEPA which include the following:

   a. Toxicity Identification Evaluation: Characterization of Chronically Toxic Effluents, Phase I, (USEPA, 1992a);

   b. Methods for Aquatic Toxicity Identification Evaluations: Phase I Toxicity Characterization Procedures, Second Edition (USEPA, 1991a);

   c. Methods for Aquatic Toxicity Identification Evaluations: Phase II Toxicity Identification Procedures for Sampling Exhibiting Acute and Chronic Toxicity (USEPA, 1993a); and

   d. Methods for Aquatic Toxicity Identification Evaluations: Phase III Toxicity Confirmation Procedures for Samples Exhibiting Acute and Chronic Toxicity (USEPA, 1993b).

5. As part of the TIE investigation, the Discharger shall be required to implement its TRE workplan. The Discharger shall take all reasonable steps to control toxicity once the source of the toxicity is identified. A failure to conduct required toxicity tests or a TRE within a designated period shall result in the establishment of numerical effluent limitations for chronic toxicity in a permit or appropriate enforcement action. Recommended guidance in conducting a TRE include the following:

a. Toxicity Reduction Evaluation Guidance for Municipal Wastewater Treatment Plants, August 1999, EPA/833B-99/002;

b. Clarifications Regarding Toxicity Reduction and Identification Evaluations in the NPDES Program dated March 27, 2001, USEPA Office of Wastewater Management, Office of Regulatory Enforcement.

E. Definition of Toxicity

1. Chronic toxicity measures sublethal effect (e.g., reduced growth, reproduction) to experimental test organisms exposed to an effluent or ambient waters compared to that of the control organisms.

2. Chronic toxicity shall be measured in TU_c, where TU_c = 100/NOEC. The no observed effect concentration (NOEC) is the highest concentration of toxicant to which organisms are exposed in a chronic test that causes no observable adverse effect on the test organisms (e.g., the highest concentration of toxicant to which the values for the observed responses are not statistically significantly different from the controls).

3. Acute toxicity is a measure of primarily lethal effects that occur over a ninety-six (96) hour period. Acute toxicity for *Pimephales promelas* can be calculated from the results of the chronic toxicity test for *Pimephales promelas* and reported along with the results of each chronic test. Acute toxicity for *Ceriodaphnia dubia* cannot be calculated from the results of the chronic toxicity test for *Ceriodaphnia dubia* because the test design is not amenable to calculation of a lethal concentration (LC50) value as needed for the acute requirement.

4. Acute toxicity shall be measured in Tu_a , where Tu_a = 100/LC50 or as pass/fail using a t-test. LC50 is the toxicant concentration that would cause death in 50 percent of the test organisms.

F. Reporting

1. The Discharger shall submit the analysis and results of the toxicity test, including any accelerated testing in toxicity units with the discharge monitoring reports for the month in which the last test is conducted.

2. If a TIE is conducted the Discharger shall submit the results of the TIE with the discharge monitoring reports for the month in which the final report is completed.

3. If the TRE Workplan has been initiated, the Discharger shall report on the progress of the actions being taken and include this information with each monthly monitoring report.

VI. LAND DISCHARGE MONITORING REQUIREMENTS – NOT APPLICABLE

VII. RECLAMATION MONITORING REQUIREMENTS – NOT APPLICABLE

VIII. RECEIVING WATER MONITORING REQUIREMENTS – SURFACE WATER

A. Monitoring Location R-001

1. The Discharger shall monitor Coachella Valley Storm Channel at R-001 as follows. In the event that no receiving water is present at station R-001, no receiving water monitoring data is required for station R-001:

Table E-5 Receiving Water Monitoring Requirements for Monitoring Location R-001

Constituent	Units	Sample Type	Minimum Sampling Frequency	Required Analytical Test Method and (Reporting Level, units), respectively
Temperature	°F	Field	1x/Month	See Footnote [12]
Total Suspended Solids	mg/L	Grab	1x/Month	See Footnote [12]
Total Dissolved Solids	mg/L	Grab	1x/Month	See Footnote [12]
Dissolved Oxygen	mg/L	Field	1x/Month	See Footnote [12]
Nitrates as Nitrogen (N)	mg/L	Grab	1x/Month	See Footnote [12]
Ammonia Nitrogen as N	mg/L	Grab	1x/Month	See Footnote [12]
Sulfates	mg/L	Grab	1x/Month	See Footnote [12]
Total Phosphate as Phosphorus (P)	mg/L	Grab	1x/Month	See Footnote [12]
pH	PH Units	Field	1x/Month	See Footnote [12]
Priority Pollutants[13]	µg/L	Grab	1x/Permit Term	See Footnote [12]

B. Monitoring Location R-002

1. The Discharger shall monitor Coachella Valley Storm Channel at R-002 as follows. In the event that no receiving water is present at station R-001, no receiving water monitoring data is required for station R-002:

Table E-6 Receiving Water Monitoring Requirements for Monitoring Location R-002

Constituent	Units	Sample Type	Minimum Sampling Frequency	Required Analytical Test Method and (Reporting Level, units), respectively
Temperature	°F	Field	1x/Month	See Footnote [12]
Total Suspended Solids	mg/L	Grab	1x/Month	See Footnote [12]
Total Dissolved Solids	mg/L	Grab	1x/Month	See Footnote [12]
Dissolved Oxygen	mg/L	Field	1x/Month	See Footnote [12]
Nitrates as Nitrogen (N)	mg/L	Grab	1x/Month	See Footnote [12]
Ammonia Nitrogen as N	mg/L	Grab	1x/Month	See Footnote [12]
Sulfates	mg/L	Grab	1x/Month	See Footnote [12]
Total Phosphate as Phosphorus (P)	mg/L	Grab	1x/Month	See Footnote [12]
pH	pH Units	Field	1x/Month	See Footnote [12]

C. Visual Monitoring Upstream and Downstream Receiving Water Sampling Points

[12] Pollutants shall be analyzed using the analytical methods described in 40 CFR Part 136; for priority pollutants the methods must meet the lowest minimum levels (MLs) specified in Attachment 4 of the SIP, where no methods are specified for a given pollutant, by methods approved by this Regional Water Board or the State Water Board.

[13] Priority pollutant as defined in the CTR defined in Finding II.I of this Limitations and Discharge Requirements of this Order and included as Attachment G.

1. In conducting the receiving water sampling, a log shall be kept of the receiving water conditions at stations R-001 and R-002. In the event that no receiving water is present at station R-001, no receiving water monitoring data is required for station R-002. Notes on receiving water conditions shall be summarized in the monitoring report. Attention shall be given to the presence or absence of:

   a. Floating or suspended matter,

   b. Discoloration,

   c. Aquatic life (including plants, fish, shellfish, birds),

   d. Visible film, sheen or coating,

   e. Fungi, slime, or objectionable growths, and

   f. Potential nuisance conditions.

D. Monitoring Location Groundwater - Not Applicable

IX. OTHER MONITORING REQUIREMENTS

A. BOD and TSS Monitoring Requirements

1. BOD and TSS shall be monitored as outlined in Table E-2 of this Monitoring and Reporting Program.

B. Accelerated Monitoring Requirements

1. When either of the numeric BOD benchmarks, as defined in the Best Management Plan, Special Provision VI.C.3.a.ii. of the Order, is exceeded during regular BOD monitoring, the Discharger shall initiate accelerated monitoring to confirm the elevated levels of BOD.

   a. The Discharger shall implement an accelerated monitoring frequency consisting of 1x/week for 4 weeks from the date the Discharger receives an initial exceedance of either BOD benchmark.

   b. The numeric BOD benchmarks are not effluent limitations; rather they are the BOD threshold at which the Discharger is required to perform accelerated monitoring to confirm elevated levels of BOD, as well as, the threshold to initiate an analysis of the effectiveness of deployed BMPs if elevated BOD concentrations are confirmed.

   c. In the event elevated BOD concentrations are confirmed, the Discharger shall initiate an analysis of the source of the exceedance. Within 30 days of the initiation of this analysis the Discharger shall submit to the Regional Water Board a plan describing the following:

      i. Cause of the BOD benchmark exceedance.

      ii. Actions to be taken by the Discharger to reduce BOD in the discharge.

      iii. Time line for completion of all tasks related to the reduction of BOD in the discharge.

d. As part of the BOD investigation, the Discharger shall be required to take all reasonable steps to control BOD in its discharge once the source is identified. A failure to conduct required accelerated monitoring or the analysis of BMPs within a designated period shall result in the establishment of numerical effluent limitations for BOD in this Order or appropriate enforcement action.

e. Reporting.

i. The Discharger shall submit the analysis and results of the BOD monitoring, including any accelerated testing in mg/L with the discharge monitoring reports for the month in which the last test is conducted.

ii. If accelerated monitoring is conducted the Discharger shall submit the results of the accelerated monitoring with the discharge monitoring reports for the month in which the final report is completed.

iii. If the analysis of BMPs has been initiated, the Discharger shall report on the progress of the actions being taken and include this information with each monthly monitoring report.

2. When the numeric TSS benchmark, as defined in the Best Management Plan, Special Provision VI.C.3.a.i. of the Order, is exceeded during regular TSS monitoring, the Discharger shall initiate accelerated monitoring to confirm the elevated levels of TSS.

a. The Discharger shall implement an accelerated monitoring frequency consisting of 1x/week for 4 weeks from the date the Discharger receives an initial exceedance of the TSS benchmark.

b. The numeric TSS benchmarks is not an effluent limitation, rather it is the TSS threshold at which the Discharger is required to perform accelerated monitoring to confirm elevated levels of TSS, as well as, the threshold to initiate an analysis of the effectiveness of deployed BMPs if elevated TSS concentrations are confirmed.

c. In the event elevated TSS concentrations are confirmed, the Discharger shall initiate an analysis of the source of the exceedance. Within 30 days of the initiation of this analysis the Discharger shall submit to the Regional Water Board a plan describing the following:

i. Cause of the TSS benchmark exceedance.

ii. Actions to be taken by the Discharger to reduce TSS in the discharge.

iii. Time line for completion of all tasks related to the reduction of TSS in the discharge.

d. As part of the TSS investigation, the Discharger shall be required to take all reasonable steps to control TSS in its discharge once the source is identified. A failure to conduct required accelerated monitoring or the analysis of BMPs within a designated period shall result in the establishment of numerical effluent limitations for TSS in this Order or appropriate enforcement action.

e. Reporting.

i. The Discharger shall submit the analysis and results of the TSS monitoring, including any accelerated testing in mg/L with the discharge monitoring reports for the month in which the last test is conducted.

ii. If accelerated monitoring is conducted the Discharger shall submit the results of the accelerated monitoring with the discharge monitoring reports for the month in which the final report is completed.

iii. If the analysis of BMPs has been initiated, the Discharger shall report on the progress of the actions being taken and include this information with each monthly monitoring report.

X. REPORTING REQUIREMENTS

A. General Monitoring and Reporting Requirements

1. The Discharger shall comply with all Standard Provisions (Attachment D) relating to monitoring, reporting and record keeping.

2. The Discharger shall report the results of acute and chronic toxicity testing, TRE and TIE as required in Section V, “Whole Effluent Toxicity Testing Requirements”.

3. The results of any analysis taken, more frequently than required using analytical methods, monitoring procedures and performed at the locations specified in this Monitoring and Reporting Program shall be reported to the Regional Water Board.

B. Self Monitoring Reports (SMRs)

1. At any time during the term of this permit, the State or Regional Water Board may notify the Discharger to electronically submit Self-Monitoring Reports (SMRs) using the State Water Board’s California Integrated Water Quality System (CIWQS) Program Web site (http://www.waterboards.ca.gov/ciwqs/index.html). Until such notification is given, the Discharger shall submit hard copy SMRs in accordance with the requirements described in subsection B.5 below. The CIWQS Web site will provide additional directions for SMR submittal in the event there will be service interruption for electronic submittal.

2. The Discharger shall report in the SMR the results for all monitoring specified in this MRP under sections III through IX. Additionally, the Discharger shall report in the SMR the results of any special studies, acute and chronic toxicity testing, TRE/TIE, PMP, Best Management Plan, and SPCC required by Special Provisions – VI.C of this Order. The Discharger shall submit monthly, quarterly, and annual SMRs including the results of all required monitoring using USEPA-approved test methods or other test methods specified in this Order. If the Discharger monitors any pollutant more frequently than required by this Order, the results of this monitoring shall be included in the calculations and reporting of the data submitted in the SMR.

3. Monitoring periods and reporting for all required monitoring shall be completed according to the following schedule:

Table E-7 Reporting Schedule

Sampling Frequency	Monitoring Period Begins On…	Monitoring Period	SMR Due Date
1x / Day	June 21, 2006	(Midnight through 11:59 PM) or any 24-hour period that reasonably represents a calendar day for purposes of sampling.	Submit with SMR
1x / Week	June 25, 2006	Sunday through Saturday	Submit with SMR
1x / Month	July 1, 2006	First day of the calendar month through last day of calendar month	31 days from the end of the monitoring period
1x / Quarter	July 1, 2006	January 1 through March 31 April 1 through June 30 July 1 through September 30 October 1 through December 31	31 days from the end of the monitoring period
1x / Year	January 1, 2007	January 1 through December 31	31 days from the end of the monitoring period
1x / Permit Term	No sooner than 4 years and no less than 4 years, 6 months from permit effective date	No more than 365 days and no less than 180 days prior to expiration of this Order	With permit renewal application

4. Reporting Protocols. The Discharger shall report with each sample result the applicable Reporting Level (RL) and the current Method Detection Limit (MDL), as determined by the procedure in 40 CFR Part 136.

   The Discharger shall report the results of analytical determinations for the presence of chemical constituents in a sample using the following reporting protocols:

   a. Sample results greater than or equal to the RL shall be reported as measured by the laboratory (i.e., the measured chemical concentration in the sample).

   b. Sample results less than the RL, but greater than or equal to the laboratory's MDL, shall be reported as "Detected, Not Quantified," or DNQ. The estimated chemical concentration of the sample shall also be reported.

      For the purposes of data collection, the laboratory shall write the estimated chemical concentration next to DNQ as well as the words "Estimated Concentration" (may be shortened to "Est. Conc."). The laboratory may, if such information is available, include numerical estimates of the data quality for the reported result. Numerical estimates of data quality may be percent accuracy (± a percentage of the reported value), numerical ranges (low to high), or any other means considered appropriate by the laboratory.

   c. Sample results less than the laboratory's MDL shall be reported as "Not Detected," or ND.

   d. Dischargers are to instruct laboratories to establish calibration standards so that the ML value (or its equivalent if there is differential treatment of samples relative to calibration

standards) is the lowest calibration standard. At no time is the Discharger to use analytical data derived from *extrapolation* beyond the lowest point of the calibration curve.

5. The Discharger shall submit hard copy SMRs (with an original signature) when required by Section X.B.1 above in accordance with the following requirements:

   a. The Discharger shall arrange all reported data in a tabular format. The data shall be summarized to clearly illustrate whether the facility is operating in compliance with interim and/or final effluent limitations.

   b. The Discharger shall attach a cover letter to the SMR. The information contained in the cover letter shall clearly identify violations of the WDRs; discuss corrective actions taken or planned; and the proposed time schedule for corrective actions. Identified violations must include a description of the requirement that was violated and a description of the violation.

   c. SMRs must be submitted to the Regional Water Board, signed and certified as required by the Standard Provisions (Attachment D), to the address listed below:

Submit monitoring reports to:
California Regional Water Quality Control Board Colorado River Basin Region 73-720 Fred Waring, Suite 100 Palm Desert, CA 92260

C. Discharge Monitoring Reports (DMRs)

1. As described in Section X.B.1 above, at any time during the term of this permit, the State or Regional Water Board may notify the Discharger to electronically submit SMRs that will satisfy federal requirements for submittal of Discharge Monitoring Reports (DMRs). Until such notification is given, the Discharger shall submit DMRs in accordance with the requirements described below.

2. DMRs must be signed and certified as required by the standard provisions (Attachment D) and submitted in accordance with SMR monitoring requirements described in the Monitoring and Reporting Program. The Discharge shall submit the original DMR and one copy of the DMR to the address listed below:

Submit monitoring reports to:
State Water Resources Control Board Discharge Monitoring Report Processing Center Post Office Box 671 Sacramento, CA 95812

3. All discharge monitoring results must be reported on the official USEPA pre-printed DMR forms (EPA Form 3320-1). Forms that are self-generated or modified cannot be accepted.

D. Other Reports

1. Operations and Maintenance Report.

The Discharger shall report the following:

Table E-8 Operations and Maintenance Report

Activity	Reporting Frequency
To inspect and document any operation/maintenance problems that may cause a material change in the quality or quantity of the effluent by inspecting each unit related to the treatment process.	1x/Year

2. Quarterly Drug Use Report.

The information listed below shall be submitted for any investigational new animal drug (INAD) or any extralabel drug used at the facility where such a use may lead to a discharge of the drug to waters of the U.S. However, such reporting is not required for an INAD or extralabel drug use that has been previously approved by the FDA for a different species or disease if the INAD or extralabel use is at or below the approved dosage and involves similar conditions of use. This information shall be reported at quarterly intervals and submitted with the quarterly self-monitoring reports using the drug usage report table found in Attachment I of this Order. At such time as the Discharger is required to begin submitting SMRs electronically, it shall continue to submit paper copies of the quarterly drug use reports to the Regional Water Board.

a. The name(s) and active ingredient(s) of the drug.

b. The date(s) of application.

c. The purpose(s) for the application.

d. The method of application (e.g., immersion bath, administered in feed), duration of treatment, whether the treatment was static or flush (for drugs applied directly to water), amount in gallons or pounds used, and treatment concentration(s).

e. For drugs applied directly to water (i.e., immersion bath, flush treatment) and for which effluent monitoring is not otherwise required, the estimated concentration in the effluent at the point of discharge.

ATTACHMENT F – FACT SHEET – TABLE OF CONTENTS

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ATTACHMENT F – FACT SHEET

As described in Section II of this Order, this Fact Sheet includes the legal requirements and technical rationale that serve as the basis for the requirements of this Order.

I. PERMIT INFORMATION

The following table summarizes administrative information related to the facility.

Table F-1 Facility Information

WDID	7A 33 5000 001
Discharger	Kent SeaTech Corporation
Name of Facility	Kent SeaTech Corporation Fish Farm
Facility Address	70775 Buchanan Street
	Mecca, CA 92254
	Riverside County
Facility Contact, Title and Phone	Mike Massingill, Vice President, (858) 452-5765
Authorized Person to Sign and Submit Reports	James M. Carlberg, President, (858) 452-5765 and/or Mike Massingill, Vice President, (858) 452-5765
Mailing Address	PO Box 757, Mecca, CA 92254
Billing Address	11125 Flintkote Avenue, Suite J, San Diego, CA 92121
Type of Facility	Concentrated Aquatic Animal Production Farm (SIC Code 0273)
Major or Minor Facility	Minor
Threat to Water Quality	3
Complexity	C
Pretreatment Program	N/A
Reclamation Requirements	N/A
Facility Permitted Flow	10.5 million gallons per day (Long Term Average 8.5 MGD)
Facility Design Flow	
Watershed	West Colorado River Basin
Receiving Water	Coachella Valley Storm Channel
Receiving Water Type	Surface Water

A. Kent SeaTech Corporation (hereinafter Discharger) is the owner and operator of the Kent SeaTech Corporation Fish Farm (hereinafter facility), a Concentrated Aquatic Animal Production (CAAP) facility**.**

B. The facility discharges wastewater to the Coachella Valley Storm Channel, a water of the United States and is currently regulated by Order 01-003 which was adopted on May 9, 2001 and expired on May 9, 2006. The terms of the existing Order automatically continued in effect after the permit expiration date.

C. The Discharger filed a Report of Waste Discharge and submitted an application for renewal of its Waste Discharge Requirements (WDRs) and National Pollutant Discharge Elimination System (NPDES) permit on September 28, 2005. Supplemental Information was requested on

November 22, 2005 and received on December 15, 2005. A site visit was conducted on December 7, 2005 to observe operations and collect additional data to develop permit limitations and conditions.

II. FACILITY DESCRIPTION

The facility is located on approximately 160-acres in Mecca, CA as shown in Attachment B. According to the Discharger's Report of Waste Discharge the facility raises hybrid striped bass, tilapia, carp, and other fishes listed on its California Aquaculture Registration by the California Department of Fish and Game. The total annual harvestable weights by fish type include 3,500,000 lbs. bass, 200,000 lbs. tilapia, and 100,000 lbs. carp. The Discharger reported monthly food usage varied by month with a maximum monthly use of 647,000 lbs. Under the NPDES program, the Facility is considered a concentrated aquatic animal production (CAAP) facility.

Wastewater from the facility includes unused/uneaten food, by-product feces, and ammonia excretions. Other pollutants may include metals present in food and deterioration of facility equipment and drugs and pesticides. According to the federal CAAP final ruling, feed is the most important source of pollutants associated with a CAAP facility.

A. Description of Wastewater and Flow

1. The facility consists of 50 ponds, 97 fish production tanks (one raceway, 48 circular fingerling tanks and 48 circular growout tanks), 60 hatchery tanks, one "Pondway" fish production system, and treatment and distribution systems. The facility is operated in a semi-closed environment where water is continuously recycled for reuse. Makeup water for the production tanks is currently supplied from up to 5 functional onsite groundwater wells. Each tank is supplied with oxygen. The hatchery and fingerling tank operations are fully closed loop systems and wastewater from these operations are routed to the facility treatment system and into the semi-closed environment. Overflow (wastewater) from the raceway and 48 growout production tanks consists of treated recycled water and makeup water from the groundwater wells. Overflow from the production tanks is either routed to the facility treatment system or to Discharge Points 001 or 002 that is controlled by an overflow weir system in the discharge channel from the tanks.

   Water that is diverted to the treatment system flows into an open channel that is referred to by the facility as the "Tilapia Channel". At this first stage of water treatment, about 20-40% of the particulate matter (VSS) is consumed by Tilapia and/or Carp whose specific purpose is for biological solids removal. At the end of the Tilapia Channel the water passes through mechanical microscreen drum filters for additional fine solids removal. After leaving the drum filters, the water flows into the "Suspended Media Ammonia Removal Technology" (SMART) system where water is biologically treated to remove ammonia and nitrites. The water is then either diverted to a third party for irrigation purposes or is distributed to an earthen "constructed wetland" system that provides further nitrification, denitrification, fine solids polishing, alkalinity restoration, and temperature buffering. The wetland is bypassed from the treatment process during the colder winter months to maintain system-wide warm temperatures for the fish. At the end of wetland system, approximately 15,000 to 18,000 gallons per minute (gpm) of treated water is continuously recirculated back to the production fish tanks for reuse.

   Wastewater from the production tanks that is diverted to Discharge Point 001 is discharged to the Coachella Valley Storm Channel. Wastewater that is diverted to Discharge Point 002 can be either discharged to the Coachella Valley Storm Channel or can be pumped to the facility's "Pondway" fish production system. Flow out of the "Pondway" system is to either

Discharge Point 003, which discharges to the Coachella Valley Storm Channel, or flows by gravity to third parties for reuse at duck hunting habitats. The "Pondway" system provides water quality treatment through the managed use of stabilized dense algal populations, the use of secondary fish species for solids removal, the management of algae and solids detention time, and the use of vascular aquatic plants for complementary nitrification.

A significant portion of wastewater from the system is distributed for reuse by third parties. Currently these include three duck hunting clubs located to the southwest of the facility and to the Desert Mist agricultural farm located along the north eastern boundary across the Coachella Valley Storm Channel (see Attachment B). The Discharger plans to expand its third party reclamation use of its wastewater.

Currently the Discharger does not measure its flow daily from each discharge point and provides estimated flows of water through the various discharge points. This Order directs the facility to conduct a water balance study for submittal to the Regional Water Board.

2. Water flowing through the fish production and treatment systems has the ability to overflow and pond on-site. This does not constitute a spill or bypass of the treatment systems. With regard to this fish farm, a bypass of the treatment systems is defined as a spill or flow of untreated aquatic wastewater offsite without the contribution of Best Management Practices (BMPs) required by this Order. The treatment systems described previously are in place at the facility to ensure that fish production is maximized; they are not in place as a technology-based requirement to provide treatment to meet the water quality objections and limitations of this Order. Therefore, it is worthy to distinguish the definition of bypass at this facility.

B. Discharge Points and Receiving Waters

1. As described above, overflow wastewater from the production tanks that is not recirculated through the Facility is discharged through either Discharge Points 001, 002 and 003. Latitude and longitude for a single discharge point was provided in the Report of Waste Discharge; however, the site visit, conducted on December 7, 2005, determined this single discharge point to not be an accurate location of discharge. Therefore, latitude and longitude readings were obtained for all discharge points during the site visit and are provided in this Order.

2. Based on the Facility site visit conducted on December 7, 2005 the following describes the current distribution of wastewater discharged to the Coachella Valley Storm Channel. Wastewater that is diverted to Discharge Points 001 and 002 from the production tanks flows by gravity into an underground PVC piping system that delivers the majority of the water to the Main Drain Sump (Discharge Point 002). Flows enter Discharge Point 001 through a PVC pipe that connects to the main PVC pipe carrying water to Discharge Point 002. Flows in the main PVC pipe will overflow in the pipe for to Discharge Point 001 once water levels in the pipe exceed a certain depth. Discharge Point 001 is intended to serve as an emergency discharge point; however under current conditions a continuous, low flow discharge occurs. The majority of the water entering the Main Drain Sump is pumped to the "Pondway" system. Water that overflows the "Pondway" system gravity flows to Effluent Drain Box No. 3. (Discharge Point 003) where it is either pumped to third parties as described above or flows by gravity into the Coachella Valley Storm Channel.

C. Summary of Existing Requirements and Self-Monitoring Report (SMR) Data

1. Effluent limitations contained in the existing Order for discharges from the Main Drain Sump Discharge Point 002 (Monitoring Location M-002) and representative monitoring data from the term of the previous Order are as follows:

Table F-2 Historic Effluent Limitations and Monitoring Data

Parameter (units)	Effluent Limitation			Monitoring Data (From May 2001 – To July 2005)		
	Average Monthly	Average Weekly	Maximum Daily	Highest Average Monthly Discharge	Highest Average Weekly Discharge	Highest Daily Discharge
Flow	10.5 MGD	--	--	9.6 MGD	--	--
Total Dissolved Solids	2,000 mg/L	2,500 mg/L	--	1,100 mg/L	1,100 mg/L	--
Total Suspended Solids	95 mg/L	--	--	84 mg/L	--	--

2. The Report of Waste Discharge described the existing discharge as follows:

   Annual Average Effluent Flow – 8.5 MGD
   Monthly Average Effluent Flow – 10.5 MGD
   Average Daily Effluent Flow – 10.5 MGD

3. The Report of Waste Discharge described the effluent characteristics as follows:

Table F-3 ROWD Effluent Characteristics

Constituent (units)	Maximum Daily	Average Daily
pH Highest Maximum Daily (pH Units)	7.6	--
pH Lowest Maximum Daily (pH Units)	6.5	--
Total Suspended Solids (mg/L)	84	32
Ammonia as Nitrogen (mg/L)	6.2	2.9
Total Nitrogen as Nitrogen (mg/L)	16	8.0
Total Phosphorus (mg/L)	3.7	1.5
Total Dissolved Solids (mg/L)	1,100	408
BOD_5 (mg/L)	32	11.7
Nitrate as Nitrogen (mg/L)	6.1	1.8
Turbidity (NTU)	34	9.7
Sulfate (mg/L)	110	43.3
Acute Toxicity (*Ceriodaphnia dubia*) (% Survival)	100	97.5
Chronic Toxicity (*Pimephales promelas*) (% Survival)	100	95.5

D. Compliance Summary

Based on a review of effluent monitoring data submitted by the Discharger for the period from May 2001 through July 2005, the Discharger has complied with effluent limitations established in Order No. 01-003.

E. Planned Changes

During the site visit that occurred on December 7, 2005, the Discharger indicated they are currently revising the wastewater flow process to direct all wastewater flows under normal operations to discharge from Discharge Point 003 and to maintain Discharge Points 001 and 002 for use as emergency overflow points. To achieve this, the Discharger is upgrading the current pump at the Main Drain Sump (Discharge Point 002) to a variable drive pump with increased pumping capacity and a water level detection system. All the water from the Main Drain Sump will be pumped to the "Pondway" system. All existing treatment systems will remain in service during system improvement. In addition, the Discharger plans to construct a ditch from Discharge Point 002 to Discharge Point 003 to direct overflow to Discharger Point 003 during times of pump maintenance and repair. The Discharger expects to complete the system improvement during the permit term. In accordance with Provision VI.C.7.a the Discharger shall notify the Regional Water Board upon completion of the improvements.

III. APPLICABLE PLANS, POLICIES, AND REGULATIONS

The requirements contained in the proposed Order are based on the requirements and authorities described in this section.

A. Legal Authorities

This Order is issued pursuant to section 402 of the federal Clean Water Act (CWA) and implementing regulations adopted by the U.S. Environmental Protection Agency (USEPA) and Chapter 5.5, Division 7 of the California Water Code (CWC). It shall serve as a NPDES permit for point source discharges from this facility to surface waters. This Order also serves as Waste Discharge Requirements (WDRs) pursuant to Article 4, Chapter 4 of the CWC for discharges that are not subject to regulation under CWA section 402.

B. California Environmental Quality Act (CEQA)

This action to adopt an NPDES permit is exempt from the provisions of the California Environmental Quality Act (Public Resources Code Section 21100, et seq.) in accordance with Section 13389 of the CWC.

C. State and Federal Regulations, Policies, and Plans

1. **Water Quality Control Plans.** The Regional Water Board adopted a Water Quality Control Plan for the Colorado River Basin Region (hereinafter Basin Plan) that designates beneficial uses, establishes water quality objectives, and contains implementation programs and policies to achieve those objectives for all waters addressed through the plan. In addition, State Water Board Resolution No. 88-63 requires that, with certain exceptions, the Regional Water Board assign the municipal and domestic supply use to water bodies that do not have beneficial uses listed in the Basin Plan. Beneficial uses applicable to Coachella Valley Storm Channel are as follows:

Table F-4 Basin Plan Beneficial Uses

Discharge Point	Receiving Water Name	Beneficial Use(s)
001, 002, and 003	Coachella Valley Storm Channel	Existing: Freshwater Replenishment (FRSH), Water Contact Recreation (REC I)[1], Non-Contact Water Recreation (REC II)[1], Warm Freshwater Habitat (WARM), Wildlife Habitat (WILD), Preservation of Rare, Threatened, or Endangered Species (RARE)[2]

2. **Thermal Plan –** The State Water Board adopted a *Water Quality Control Plan for Control of Temperature in the Coastal and Interstate Water and Enclosed Bays and Estuaries of California* (Thermal Plan) on May 18, 1972, and amended this plan on September 18, 1975. The Thermal Plan does not apply to the Coachella Valley Storm Channel.

3. **National Toxics Rule (NTR) and California Toxics Rule (CTR).** USEPA adopted the NTR on December 22, 1992, which was amended on May 4, 1995 and November 9, 1999, and the CTR on May 18, 2000, which was amended on February 13, 2001. These rules include water quality criteria for priority pollutants and are applicable to this discharge.

4. **State Implementation Policy.** On March 2, 2000, the State Water Board adopted the *Policy for Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California* (State Implementation Policy or SIP). The SIP became effective on April 28, 2000 with respect to the priority pollutant criteria promulgated for California by the USEPA through the NTR and to the priority pollutant objectives established by the Regional Water Board in the Basin Plan. The SIP became effective on May 18, 2000 with respect to the priority pollutant criteria promulgated by the USEPA through the California Toxics Rule. The State Water Board adopted amendments to the SIP on February 24, 2005 that became effective on July 13, 2005. The SIP includes procedures for determining the need for and calculating water quality-based effluent limitations (WQBELs), and requires Dischargers to submit data sufficient to do so.

5. **Alaska Rule.** On March 30, 2000, USEPA revised its regulation that specifies when new and revised State and Tribal water quality standards (WQS) become effective for CWA purposes (40 CFR 131.21, 65 FR 24641, April 27, 2000). Under the revised regulation (also known as the Alaska rule), new and revised standards submitted to USEPA after May 30, 2000, must be approved by USEPA before being used for CWA purposes. The final rule also provides that standards already in effect and submitted to USEPA by May 30, 2000, may be used for CWA purposes, whether or not approved by USEPA.

[1] Unauthorized use.
[2] Rare, endangered, or threatened wildlife exists in or utilized some of this water way. If the RARE beneficial use may be affected by a water quality control decision, responsibility for substantiation of the existence of rare, endangered, or threatened species on a case-by-case basis is upon the California Department of Fish and Game on its own initiative and/or at the request of the Regional Water Board; and such substantiation must be provided within a reasonable time frame as approved by the Regional Water Board.

6. **Stringency of Requirements for Individual Pollutants.** This Order contains restrictions on individual pollutants that are no more stringent than required by the federal CWA. Individual pollutant restrictions consist of technology-based restrictions and water quality-based effluent limitations. The technology-based effluent limitations consist of restrictions on total suspended solids (TSS). Restrictions on TSS are specified in federal regulations as discussed in 40 CFR Part 451, and the permit's technology-based pollutant restrictions are no more stringent than required by the CWA. Water quality-based effluent limitations have been scientifically derived to implement water quality objectives that protect beneficial uses. Both the beneficial uses and the water quality objectives have been approved pursuant to federal law and are the applicable federal water quality standards. To the extent that toxic pollutant water quality-based effluent limitations were derived from the CTR, the CTR is the applicable standard pursuant to 40 CFR 131.38. The scientific procedures for calculating the individual water quality-based effluent limitations are based on the CTR-SIP, which was approved by USEPA on May 18, 2000. All beneficial uses and water quality objectives contained in the Basin Plan were approved under state law and submitted to and approved by USEPA prior to May 30, 2000. Any water quality objectives and beneficial uses submitted to USEPA prior to May 30, 2000, but not approved by USEPA before that date, are nonetheless "applicable water quality standards for purposes of the CWA" pursuant to 40 CFR 131.21(c)(1). Collectively, this Order's restrictions on individual pollutants are no more stringent than required to implement the technology-based requirements of the CWA and the applicable water quality standards for purposes of the CWA.

7. **Antidegradation Policy.** Section 131.12 of 40 CFR requires that State water quality standards include an antidegradation policy consistent with the federal policy. The State Water Board established California's antidegradation policy in State Water Board Resolution 68-16, which incorporates the requirements of the federal antidegradation policy. Resolution 68-16 requires that existing quality of waters be maintained unless degradation is justified based on specific findings. As discussed in detail in the Fact Sheet (Attachment F) the permitted discharge is consistent with the antidegradation provision of 40 CFR §131.12 and State Water Board Resolution 68-16.

8. **Anti-Backsliding Requirements.** Sections 402(o)(2) and 303(d)(4) of the CWA and federal regulations at 40 CFR § 122.44(l) prohibit backsliding in NPDES permits. These anti-backsliding provisions require effluent limitations in a reissued permit to be as stringent as those in the previous permit, with some exceptions where limitations may be relaxed. BOD and TSS effluent limitations are as stringent as that those in the previous Order. The replacement of the existing numeric effluent limitation for TSS and BOD with numeric benchmarks and the requirement of a Best Management Plan is as stringent as the previous limitations on TSS and BOD. The replacement of the numeric effluent limitation for TDS with a narrative effluent limit and numeric receiving water limits is authorized under the CWQ Section 402(o)(2)(B)(ii) that provides an exception to its anti-backsliding prohibition when a mistake in application of the law caused limits to be inappropriately applied.

9. **Monitoring and Reporting Requirements.** 40 CFR 122.48 requires that all NPDES permits specify requirements for recording and reporting monitoring results. Sections 13267 and 13383 of the CWC authorize the Regional Water Boards to require technical and monitoring reports. The Monitoring and Reporting Program (MRP) establishes monitoring and reporting requirements to implement federal and State requirements. This MRP is provided in Attachment E.

10. Storm Water Requirements.

a. Federal regulations for storm water discharges require specific categories of facilities which discharge storm water associated with industrial activity (storm water) to obtain NPDES permits and to implement Best Conventional Pollutant Technology (BCT) and Best Available Technology Economically Achievable (BAT) to reduce or eliminate industrial storm water pollution.

b. The State Water Resources Control Board (State Water Board) adopted Order No. 97-03-DWQ (General Permit No. CAS000001), specifying waste discharge requirements for discharges of storm water associated with industrial activities, excluding construction activities, and requiring submittal of a Notice of Intent by industries to be covered under the Permit. Coverage under the General Permit is not required because industrial activities conducted at the site are not currently defined in the Federal Regulations 40 CFR 122.26 as industrial activities that must be regulated by an NPDES permit.

D. Impaired Water Bodies on CWA 303(d) List

The 2002 USEPA 303(d) list of impaired waters (hereinafter 303(d) List) classifies the Coachella Valley Storm Channel as impaired by pathogens. No TMDLs have been developed to date. In addition, the 303(d) List classifies the Salton Sea as impaired by nutrients. Tributaries to the Salton Sea, including the Coachella Valley Storm Channel, may be affected by future TMDLs. No TMDLs have been developed to date, although a nutrient TMDL is under development for the Salton Sea that may have adverse impacts on permitted discharges to tributaries to the Salton Sea (Coachella Valley Storm Channel). This TMDL is tentatively scheduled for completion in 2009.

E. Other Plans, Polices and Regulations – Not Applicable

IV. RATIONALE FOR EFFLUENT LIMITATIONS AND DISCHARGE SPECIFICATIONS

The CWA requires point source discharges to control the amount of conventional, non-conventional, and toxic pollutants that are discharged into the waters of the United States. The control of pollutants discharged is established through effluent limitations; and other requirements in NPDES permits. There are two principal bases for effluent limitations: 40 CFR §122.44(a) requires that permits include applicable technology-based limitations and standards; and 40 CFR §122.44(d) requires that permits include water quality-based effluent limitations to attain and maintain applicable numeric and narrative water quality criteria to protect the beneficial uses of the receiving water. Where numeric water quality objectives have not been established. Three options exist to protect water quality: (1) 40 CFR §122.44(d) specifies that WQBELs may be established using USEPA criteria guidance under CWA section 304(a); (2) proposed State criteria or a State policy interpreting narrative criteria supplemented with other relevant information may be used; or (3) an indicator parameter may be established.

Effluent and receiving water limitations in this Board Order are based on the Federal Clean Water Act, Basin Plan, State Water Resources Control Board's plans and policies, USEPA's guidance and regulations, and best practicable waste treatment technology. While developing effluent limitations and receiving water limitations, monitoring requirements, and special conditions for the draft permit, the following information sources were used:

- EPA NPDES Application Forms 1 and 2B dated November 10, 2005.
- State Water Resource Control Board Form 200 dated November 10, 2005.
- Code of Federal Regulations – Title 40.

- Water Quality Control Plan (Colorado River Basin – Region 7) as amended to date.
- Regional Water Board files related to Kent SeaTech Corporation Fish Farm NPDES permit CA7000010.
- Data collected during a facility site visit on December 7, 2005.

A. Discharge Prohibitions

The discharge prohibitions are based on the requirements of the Basin Plan, California Water Code, and previous permit provisions, and are consistent with the requirements set for other discharges regulated by NPDES permit to the Coachella Valley Storm Channel.

B. Technology-Based Effluent Limitations

1. Scope and Authority

The CWA requires that technology-based effluent limitations be established based on several levels of controls:

a. Best practicable treatment control technology (BPT) represents the average of the best performance by plants within an industrial category or subcategory. BPT standards apply to toxic, conventional, and nonconventional pollutants.

b. Best available technology economically achievable (BAT) represents the best existing performance of treatment technologies that are economically achievable within an industrial point source category. BAT standards apply to toxic and nonconventional pollutants.

c. Best conventional pollutant control technology (BCT) represents the control from existing industrial point sources of conventional pollutants including BOD, TSS, fecal coliform, pH, and oil and grease. The BCT standard is established after considering the "cost reasonableness" of the relationship between the cost of attaining a reduction in effluent discharge and the benefits that would result, and also the cost effectiveness of additional industrial treatment beyond BPT.

d. New source performance standards (NSPS) represent the best available demonstrated control technology standards. The intent of NSPS guidelines is to set limitations that represent state-of-the-art treatment technology for new sources.

The CWA requires USEPA to develop effluent limitations, guidelines and standards (ELGs) representing application of BPT, BAT, BCT, and NSPS. Section 402(a)(1) of the CWA and 40 CFR Section 125.3 of the NPDES regulations authorize the use of best professional judgment (BPJ) to derive technology-based effluent limitations on a case-by-case basis where ELGs are not available for certain industrial categories and/or pollutants of concern. Where BPJ is used, the permit writer must consider specific factors outlined in 40 CFR Section 125.3.

a. A warm-water concentrated aquatic animal production (CAAP) facility is defined in title 40 of the Code of Federal Regulations (40 CFR 122.24) as a fish hatchery, fish farm, or other facility that contains, grows, or holds warm-water fish species or other warm-water aquatic animals in ponds, raceways, or other similar structures. In addition, the facility must discharge at least 30 calendar days per year, produce at least 100,000 pounds (9,090 kilograms) harvest weight of aquatic animals per year, and feed at least 5,000 pounds (2,272 kilograms) of food during the calendar month of maximum feeding. A

facility that does not meet the above criteria may also be designated a warm-water CAAP facility upon a determination that the facility is a significant contributor of pollution to waters of the United States [40 CFR 122.24(c)]. Warm-water, recirculating and flow-through CAAP facilities are designed to minimize water requirements, which leads to small-volume, concentrated waste streams as well as makeup water overflow. Waste streams from recirculating systems are typically a small but continuous flowing effluent. Flows from CAAP facilities ultimately are discharged to waters of the United States and of the State. 40 CFR 122.24 specifies that CAAP facilities are point sources subject to the NPDES program. The Discharger's facility meets the NPDES definition of a warm-water, recirculating and flow-through CAAP facility.

b. The operation of CAAP facilities may introduce a variety of pollutants into receiving waters. USEPA identifies three classes of pollutants: (1) conventional pollutants (i.e., total suspended solids (TSS), oil and grease (O&G), biochemical oxygen demand (BOD), fecal coliform, and pH); (2) toxic pollutants (e.g., metals such as copper, lead, nickel, and zinc and other toxic pollutants; and (3) non-conventional pollutants (e.g., ammonia-N, Formalin, and phosphorus). Some of the most significant pollutants discharged from CAAP facilities are solids from uneaten feed and fish feces that settle to the bottom of the raceways. Both of these types of solids are primarily composed of organic matter including BOD, organic nitrogen, and organic phosphorus.

c. On August 23, 2004 USEPA published Effluent Limitation Guidelines and New Source Performance Standards for CAAP facilities (40 CFR 451). These ELGs became effective on September 22, 2004. The ELG regulation establishes national technology-based effluent discharge requirements for flow-through and recirculation systems and for net pens based on BPT, BCT, BAT and NSPS. In its proposed rule, published on September 12, 2002, USEPA proposed to establish numeric limitations for a single constituent –TSS – while controlling the discharge of other constituents through narrative requirements. In the final rule, however, USEPA determined that, for a nationally applicable regulation, it would be more appropriate to promulgate qualitative TSS limitations in the form of solids control best management practices (BMP) requirements. Furthermore, the final ELG does not include numeric effluent limitations for non-conventional and toxic constituents, such as aquaculture drugs, but also relies on narrative limitations to address these constituents. The final ELG applies to CAAP facilities that produce, hold or contain 100,000 pounds or more of aquatic animals per year (any 12 month period). The Discharger's facility is therefore subject to ELG requirements.

2. Applicable Technology-Based Effluent Limitations

a. **Total Suspended Solids (TSS) and BOD.** Previous Order 01-003 established 30-day average and 7-day average technology-based effluent limitations for BOD and a 30-day average for TSS. These limitations were developed prior to the promulgation of the CAAP rule, and were based on BPJ.

USEPA's final ELG for the aquaculture industry does not include numeric effluent limitations on any conventional, non-conventional, or toxic constituents. Rather, USEPA promulgated qualitative limitations in the form of BMP requirements. Technology-based requirements in this Order are based on 40 CFR 451. To comply with the ELG, this Order removes the existing technology based effluent limits established based on BPJ and replaces them with numeric benchmarks and a narrative effluent limitation that requires the Discharger to minimize the discharge of total suspended solids and BOD to

the BAT/BCT through implementing best management practices established in Special Provision VI.C.3 of this Order.

C. Water Quality-Based Effluent Limitations (WQBELs)

1. Scope and Authority

As specified in 40 CFR §122.44(d)(1)(i), permits are required to include WQBELs for pollutants (including toxicity) that are or may be discharged at levels that cause, have reasonable potential to cause, or contribute to an excursion above any state water quality standard. The process for determining reasonable potential and calculating WQBELs when necessary is intended to protect the designated uses of the receiving water as specified in the Basin Plan, and achieve applicable water quality objectives and criteria that are contained in other state plans and policies, or water quality criteria contained in the CTR and NTR.

a. Effluent discharged from this facility could contain pollutants in sufficient quantities to affect receiving water quality. Pursuant to Section 13263, Article 4, Chapter 4 of the Porter Cologne Water Quality Control Act, the Regional Water Boards are required to issue Waste Discharge Requirements for discharges that could affect the quality of the State's waters. Furthermore, Federal Regulation 40 CFR 122.1 requires the issuance of NPDES permits for pollutants discharged from a point source to the waters of the United States.

b. The USEPA published the adopted California Toxics Rule (CTR) (40 CFR §131.38). The CTR promulgates new criteria for both human health protection and protection of aquatic life. New numeric aquatic life criteria for 23 priority toxic pollutants and numeric human health criteria for 57 priority toxic pollutants are listed. In addition, the CTR contains a compliance schedule provision, which authorizes the State to issue schedules of compliance for new or revised NPDES permit limits based on the federal criteria when certain conditions are met. Compliance for new or revised NPDES permit limits based on the federal criteria when certain conditions are met.

2. Applicable Beneficial Uses and Water Quality Criteria and Objectives

Table F-5 summarizes the applicable water quality criteria/objective for priority pollutants reported in detectable concentrations in the effluent or receiving water. The hardness value used to conduct the Reasonable Potential Analysis was 360 mg/L, the lowest (most restrictive) hardness value recorded in the receiving water. These criteria were used in conducting the Reasonable Potential Analysis for this Order.

Table F-5 Applicable Beneficial Uses and Water Quality Criteria and Objectives

CTR No.	Constituent	Selected Criteria	CTR/NTR Water Quality Criteria				
			Freshwater		Saltwater		Human Health for Consumption of:
			Acute	Chronic	Acute	Chronic	Organisms only
		µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
2	Arsenic	150	340	150			

CTR No.	Constituent	Selected Criteria	CTR/NTR Water Quality Criteria				
			Freshwater		Saltwater		Human Health for Consumption of:
			Acute	Chronic	Acute	Chronic	Organisms only
		µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
6	Copper	27.87	46.80	27.87			
9	Nickel	154.17	1386.65	154.17			4,600
13	Zinc	354.71	354.71	354.71			
39	Toluene	20,0000					200,000

3. Determining the Need for WQBELs

In accordance with Section 1.3 of the SIP, the Regional Water Board conducted a reasonable potential analysis (RPA) for each priority pollutant with an applicable criterion or objective to determine if a WQBEL is required in the Order. The Regional Water Board analyzed effluent and receiving water data to determine if a pollutant in a discharge has the reasonable potential to cause or contribute to an excursion above a state water quality standard. For all parameters that have the reasonable potential to cause or contribute to an excursion above a water quality standard, numeric WQBELs are required. The RPA considers criteria from the CTR and NTR, and when applicable, water quality objectives specified in the Basin Plan. To conduct the RPA, the Regional Water Board identified the maximum observed effluent concentration (MEC) and maximum background concentration (B) in the receiving water for each constituent, based on data provided by the Discharger.

Section 1.3 of the SIP provides the procedures for determining reasonable potential to exceed applicable water quality criteria and objectives. The SIP specifies three triggers to complete a RPA:

1) Trigger 1 – If the MEC is greater than or equal to the CTR water quality criteria or applicable objective (C), a limit is needed.

2) Trigger 2 – If background water quality (B) > C and the pollutant is detected in the effluent, a limit is needed.

3) Trigger 3 – If other related information such as CWA 303(d) listing for a pollutant, discharge type, compliance history, etc. indicates that a WQBEL is required.

Sufficient effluent and ambient data are needed to conduct a complete RPA. If data are not sufficient, the Discharger will be required to gather the appropriate data for the Regional Water Board to conduct the RPA. Upon review of the data, and if the Regional Water Board determines that WQBELs are needed to protect the beneficial uses, the permit will be reopened for appropriate modification.

The RPA was performed for the priority pollutants for which effluent data were available. These data were used in the RPA and are summarized in Table F-6. The Regional Water Board evaluated monitoring data for arsenic, copper, nickel, zinc, and toluene and determined WQBELs were not required for these pollutants. The Discharger provided data collected in 1999 and 2005 to evaluate reasonable potential.

Table F-6 Summary of Reasonable Potential Analysis

CTR No.	Priority Pollutant	Applicable Water Quality Criteria	Max Effluent Conc.	Maximum Detected Receiving Water Conc. (B)	RPA Result - Need Limit?	Reason
		(C)	(MEC)	(B)		
		µg/L	µg/L	µg/L		
2	Arsenic	150	39	2.8	No	--
6	Copper	27.87	3	6.6	No	--
9	Nickel	154.17	1.2	3.6	No	--
13	Zinc	354.71	20	11	No	--
39	Toluene	200,000	1.3	ND	No	--

4. WQBEL Calculations – Not Applicable

5. WQBELs Based on Basin Plan Objectives

a. Previous Order No. 01-003 established WQBELs for flow based on WQO established in the Basin Plan for the beneficial use of groundwater and is carried forward in this Order.

b. Previous Order No. 01-003 established WQBELs for TDS. These WQBELs were based on receiving water quality objectives established in the Basin Plan that state any discharge to the Coachella Valley Storm Channel shall not cause concentration of TDS in the surface water to exceed a maximum daily of 2,500 mg/L and an annual average of 2,000 mg/L. The previous Order included an average monthly and maximum daily effluent limit for TDS. Due to the misapplication of the Basin Plan receiving water quality objectives for TDS as numeric effluent limits, this Order replaces the numeric effluent limitations for TDS of the previous permit with a narrative effluent limitation and establishes a receiving water limitation for TDS to accurately apply the WQO of the Basin Plan. The replacement of those numeric effluent limitations with a narrative effluent limitation and receiving water limitation for TDS does not constitute backsliding due to CWA exception 402(o)(2)(B)(ii) which states that if the Administrator determines that a technical mistake or mistake in interpretation of the law were made when establishing the limits, the appropriate application of those laws is justified. In addition, an RPA for TDS was conducted using the method in USEPA's *Technical Support Document for Water Quality-based Toxics Control (TSD)* (EPA/505/2-90-001, March 1991). Effluent monitoring data for the period from May 2001 through July 2005 was used in the analysis. The MEC for TDS is 1,100 mg/L; a multiplier of 1.52 was used to project a maximum receiving water concentration of 1,672 mg/L. Therefore, TDS does not demonstrate reasonable potential to exceed water quality objectives for the Coachella Valley Storm Channel.

c. Previous Order No. 01-003 established WQBELs for pH based on WQO established in the Basin Plan and are carried forward in this Order.

6. Final WQBELs

Summaries of the WQBELs required by this Order are described in Table F-7 below.

Table F-7 Summary of Water Quality-based Effluent Limitations: Monitoring Location EFF-001, EFF-002, and EFF-003

Constituent	Units	Effluent Limitations			
		Average Monthly	Maximum Daily	Instantaneous Minimum	Instantaneous Maximum
Flow	MGD	10.5	--	--	--
pH	s.u.	---	---	6.0	9.0

7. Whole Effluent Toxicity (WET)

Whole effluent toxicity (WET) protects the receiving water quality from the aggregate toxic effect of a mixture of pollutants in the effluent. WET tests measure the degree of response of exposed aquatic test organisms to an effluent. The WET approach allows for protection of the narrative "no toxics in toxic amounts" criterion while implementing numeric criteria for toxicity. There are two types of WET tests: acute and chronic. An acute toxicity test is conducted over a shorter time period and measures mortality. A chronic toxicity test is conducted over a longer period of time and may measure mortality, reproduction, and growth. The WQBELs for acute and chronic toxicity have been retained from the previous Order.

The Basin Plan specifies a narrative objective for toxicity, requiring that all waters be maintained free of toxic substances in concentrations that are lethal to or produce other detrimental response on aquatic organisms. Detrimental response includes but is not limited to decreased growth rate, decreased reproductive success of resident or indicator species, and/or significant alterations in population, community ecology, or receiving water biota.

In addition to the Basin Plan requirements, Section 4 of the SIP states that a chronic toxicity effluent limitation is required in permits for all discharges that will cause, have the reasonable potential to cause, or contribute to chronic toxicity in receiving waters. Therefore, in accordance with the SIP, this Order requires the Discharger to conduct chronic toxicity testing for discharges to the Coachella Valley Storm Channel. In addition, the Order establishes thresholds that when exceeded requires the Discharger to conduct accelerated toxicity testing and/or conduct toxicity identification evaluation (TIE) studies.

D. Final Effluent Limitations

Summaries of the final effluent limitations required by this Order are summarized in Table F-8 below. These effluent limitations are applicable to Discharge Points 001, 002, and 003.

Table F-8 Final Effluent Limitations

Parameter	Units	Effluent Limitations			
		Average Monthly	Maximum Daily	Instantaneous Minimum	Instantaneous Maximum
Flow	MGD	10.5	---	---	---
pH	standard units	---	---	6.0	9.0

E. Interim Effluent Limitations – Not Applicable

F. Land Discharge Specifications – Not Applicable

G. Reclamation Specifications – Not Applicable

V. RATIONALE FOR RECEIVING WATER LIMITATIONS

A. Surface Water

The surface water receiving water limitations in the proposed Order are based upon the water quality objectives contained in the Basin Plan and are carried forward from the previous Order. As such, they are a required part of the proposed Order.

Also, a new receiving water limitation was added for TDS based on the Regional Water Board's Basin Plan as follows:

The concentration of total dissolved solids in the Coachella Valley Storm Channel shall not exceed an annual average concentration of 2,000 mg/L or an instantaneous maximum concentration of 2,500 mg/L.

B. Groundwater

The groundwater receiving water limitations in the proposed Order are based upon the water quality objectives contained in the Basin Plan. As such, they are a required part of the proposed Order.

VI. RATIONALE FOR MONITORING AND REPORTING REQUIREMENTS

40 CFR 122.48 requires all NPDES permits to specify recording and reporting of monitoring results. Sections 13267 and 13383 of the California Water Code authorize the Water Boards to require technical and monitoring reports. The Monitoring and Reporting Program (MRP), Attachment E of this Order, establishes monitoring and reporting requirements to implement federal and state requirements. The following provides the rationale for the monitoring and reporting requirements contained in the Monitoring and Reporting Program for this facility.

A. Influent Monitoring – Not Applicable

B. Effluent Monitoring

Monitoring for those pollutants expected to be present in the discharge line immediately following treatment and before it joins or is diluted by any other waste stream, body of water, or substance will be required as shown on the proposed MRP (Attachment E) and as required in the SIP. Monitoring frequencies for all constituents carried forward from the previous Order have been retained.

The Discharger is required to conduct monitoring of the permitted discharges in order to evaluate compliance with permit conditions. Monitoring requirements are given in the MRP (Attachment E). This provision requires compliance with the MRP, and is based on 40 CFR 122.44 (i), 122.62, 122.63, and 124.5.

C. Whole Effluent Toxicity Testing Requirements

Whole effluent toxicity (WET) protects the receiving water quality from the aggregate toxic effect of a mixture of pollutants in the effluent. An acute toxicity test is conducted over a short time period and measures mortality. A chronic toxicity test is conducted over a longer period of time and may measure mortality, reproduction, and growth. This Order includes limitations for acute and chronic toxicity, and therefore, monitoring requirements are included in the MRP (Attachment E) to determine compliance with the effluent limitations established in Limitations and Discharge Requirements, Effluent Limitations, Section IV.A.1. Monitoring frequency has been reduced from two tests per year to one due to the Discharger's compliance history.

Section 4 of the SIP states that a chronic toxicity effluent limitation is required in permits for all discharges that will cause, have the reasonable potential to cause, or contribute to chronic toxicity in receiving waters. Therefore, in accordance with the SIP, the Discharger will be required to conduct chronic toxicity testing.

D. Receiving Water Monitoring

1. Surface Water

Surface water monitoring is required to determine compliance with receiving water limitations and to characterize the water quality of the receiving water pursuant to the SIP and Basin Plan. Monitoring frequencies for all constituents carried forward from the previous Order have been retained. The monitoring frequency of 1x/Month for temperature, total suspended solids, and total dissolved solids has been included in this Order. Temperature and total suspended solids have been included to evaluate compliance with applicable Basin Plan surface WQO; total suspended solids has been included to evaluate 303(d) List impairments and TMDLs, when applicable.

2. Groundwater – Not Applicable

E. Other Monitoring Requirements

1. BOD and TSS Monitoring

BOD and TSS monitoring is required to determine compliance with and effectiveness of BMPs implemented in accordance with 40 CFR §§ 451.3(d) and 451.11. Numeric effluent limitations for BOD and TSS have been replaced with numeric BOD benchmarks and narrative BMP requirements. The numeric BOD and TSS benchmarks stated in Sections VI.C.3.a.i and VI.C.2.a.ii of the Order serve as the threshold at which the Discharger is required to perform accelerated monitoring to confirm elevated levels of BOD and TSS, as well as, the threshold to initiate an analysis of the effectiveness of deployed BMPs if elevated BOD and TSS concentrations are confirmed.

VII. RATIONALE FOR PROVISIONS

A. Standard Provisions

Standard Provisions, which in accordance with 40 CFR Sections 122.41and 122.42, apply to all NPDES discharges and must be included in every NPDES permit, are provided in Attachment D to this Order.

40 CFR 122.41(a)(1) and (b) through (n) establish conditions that apply to all state-issued NPDES permits. These conditions must be incorporated into the permits either expressly or by reference. If incorporated by reference, a specific citation to the regulations must be included in the Order. 40 CFR 123.25(a)(12) allows the State to omit or modify conditions to impose more stringent requirements. In accordance with 40 CFR 123.25, this Order omits federal conditions that address enforcement authority specified in 40 CFR Sections 122.41(j)(5) and (k)(2) because the enforcement authority exists under the CWC. In lieu of these conditions, this Order incorporates by reference CWC section 13387(e).

B. Special Provisions

1. Reopener Provisions

This Order has included a number of reopener provisions in accordance with federal NPDES regulations and the California Water Code to allow this Order to be reopened to modify or add effluent limitations, provisions, monitoring and other requirements to address USEPA's approval of the biological assessment submitted by the Discharger, TMDLs, CTR monitoring, and new standards and policies.

2. Special Studies and Additional Monitoring Requirements

a. **Toxicity Identification Evaluations or Toxicity Reduction Evaluations.** This provision is based on the SIP, Section 4, Toxicity Control Provisions.

b. **Water Flow and Quantity Study.** The Discharger does not currently maintain adequate flow records at the facility and was unable to provide estimated flow through Discharge Points 001, 002, and 003. Adequate and accurate flow data is required to establish and enforce limitations and requirements of this Order. To ensure compliance with this Order, the Discharger is also to provide how they intend to measure and report flow for each discharge point. The technical report submitted by the Discharger is subject to the approval of the Executive Officer.

c. **Translator Study.** This provision is based on the SIP that allows the use of a translator for metals and selenium different than the USEPA conversion factor, provided the Discharger requests this action and completes a translator study within two years from the date of the issuance of this permit as stated in the SIP.

3. Best Management Practices and Pollution Prevention

This provision is based on the narrative ELG required for CAAP facilities in 40 CFR 451.3.d.

4. Spill Prevention, Control, and Countermeasure Plan

The facility stores greater than 1320 gallons of petroleum in above ground tanks and containers onsite and is required to develop and implement a Spill Prevention, Control and Countermeasure Plan in accordance with all applicable State and federal laws and regulations.

5. Construction, Operation, and Maintenance Specifications – Not Applicable

6. Special Provisions for Municipal Facilities (POTWs Only) – Not Applicable

7. Other Special Provisions – Not Applicable

8. Compliance Schedules – Not Applicable

VIII. PUBLIC PARTICIPATION

The California Regional Water Quality Control Board, Colorado River Basin Region (Regional Water Board) is considering the issuance of waste discharge requirements (WDRs) that will serve as a National Pollutant Discharge Elimination System (NPDES) permit for Kent SeaTech Corporation Fish Farm. As a step in the WDR adoption process, the Regional Water Board staff has developed tentative WDRs. The Regional Water Board encourages public participation in the WDR adoption process.

A. Notification of Interested Parties

The Regional Water Board has notified the Discharger and interested agencies and persons of its intent to prescribe waste discharge requirements for the discharge and has provided them with an opportunity to submit their written comments and recommendations. Notification was provided through the following newspapers: Desert Sun and Riverside Press Enterprise.

B. Written Comments

The staff determinations are tentative. Interested persons are invited to submit written comments concerning these tentative WDRs. Comments should be submitted either in person or by mail to the Executive Office at the Regional Water Board at the address above on the cover page of this Order.

To be fully responded to by staff and considered by the Regional Water Board, written comments should be received at the Regional Water Board offices by 5:00 p.m. on May 22, 2006.

C. Public Hearing

The Regional Water Board will hold a public hearing on the tentative WDRs during its regular Board meeting on the following date and time and at the following location:

Date: June 21, 2006
Time: 10:00 a.m.
Location: City of Council Chambers
City of La Quinta
78-495 Calle Tampico
La Quinta, CA 92253

Interested persons are invited to attend. At the public hearing, the Regional Water Board will hear testimony, if any, pertinent to the discharge, WDRs, and permit. Oral testimony will be heard; however, for accuracy of the record, important testimony should be in writing.

Please be aware that dates and venues may change. Our web address is http://www.waterboards.ca.gov/coloradoriver/ where you can access the current agenda for changes in dates and locations.

D. Waste Discharge Requirements Petitions

Any aggrieved person may petition the State Water Resources Control Board to review the decision of the Regional Water Board regarding the final WDRs. The petition must be submitted within 30 days of the Regional Water Board's action to the following address:

State Water Resources Control Board
Office of Chief Counsel
P.O. Box 100, 1001 I Street
Sacramento, CA 95812-0100

E. Information and Copying

The Report of Waste Discharge (ROWD), related documents, tentative effluent limitations and special provisions, comments received, and other information are on file and may be inspected at the address above at any time between 8:30 a.m. and 4:45 p.m., Monday through Friday. Copying of documents may be arranged through the Regional Water Board by calling (760) 346-7491.

F. Register of Interested Persons

Any person interested in being placed on the mailing list for information regarding the WDRs and NPDES permit should contact the Regional Water Board, reference this facility, and provide a name, address, and phone number.

G. Additional Information

Requests for additional information or questions regarding this order should be directed to Jose Cortez at (760) 776-8963.

ATTACHMENT G – LIST OF PRIORITY POLLUTANTS

Table G-1 List of Priority Pollutants

CTR Number	Parameter	CAS Number	Suggested Analytical Methods
1	Antimony	7440360	EPA 6020/200.8
2	Arsenic	7440382	EPA 1632
3	Beryllium	7440417	EPA 6020/200.8
4	Cadmium	7440439	EPA 1638/200.8
5a	Chromium (III)	16065831	EPA 6020/200.8
5a	Chromium (VI)	18540299	EPA 7199/1636
6	Copper	7440508	EPA 6020/200.8
7	Lead	7439921	EPA 1638
8	Mercury	7439976	EPA 1669/1631
9	Nickel	7440020	EPA 6020/200.8
10	Selenium	7782492	EPA 6020/200.8
11	Silver	7440224	EPA 6020/200.8
12	Thallium	7440280	EPA 6020/200.8
13	Zinc	7440666	EPA 6020/200.8
14	Cyanide	57125	EPA 9012A
15	Asbestos	1332214	EPA/600/R-93/116(PCM)
16	2,3,7,8-TCDD	1746016	EPA 8290 (HRGC) MS
17	Acrolein	107028	EPA 8260B
18	Acrylonitrile	107131	EPA 8260B
19	Benzene	71432	EPA 8260B
20	Bromoform	75252	EPA 8260B
21	Carbon Tetrachloride	56235	EPA 8260B
22	Chlorobenzene	108907	EPA 8260B
23	Chlorodibromomethane	124481	EPA 8260B
24	Chloroethane	75003	EPA 8260B
25	2-Chloroethylvinyl Ether	110758	EPA 8260B
26	Chloroform	67663	EPA 8260B
27	Dichlorobromomethane	75274	EPA 8260B
28	1,1-Dichloroethane	75343	EPA 8260B
29	1,2-Dichloroethane	107062	EPA 8260B
30	1,1-Dichloroethylene	75354	EPA 8260B
31	1,2-Dichloropropane	78875	EPA 8260B
32	1,3-Dichloropropylene	542756	EPA 8260B
33	Ethylbenzene	100414	EPA 8260B
34	Methyl Bromide	74839	EPA 8260B
35	Methyl Chloride	74873	EPA 8260B
36	Methylene Chloride	75092	EPA 8260B
37	1,1,2,2-Tetrachloroethane	79345	EPA 8260B
38	Tetrachloroethylene	127184	EPA 8260B
39	Toluene	108883	EPA 8260B
40	1,2-Trans-Dichloroethylene	156605	EPA 8260B
41	1,1,1-Trichloroethane	71556	EPA 8260B

CTR Number	Parameter	CAS Number	Suggested Analytical Methods
42	1,12-Trichloroethane	79005	EPA 8260B
43	Trichloroethylene	79016	EPA 8260B
44	Vinyl Chloride	75014	EPA 8260B
45	2-Chlorophenol	95578	EPA 8270C
46	2,4-Dichlorophenol	120832	EPA 8270C
47	2,4-Dimethylphenol	105679	EPA 8270C
48	2-Methyl-4,6-Dinitrophenol	534521	EPA 8270C
49	2,4-Dinitrophenol	51285	EPA 8270C
50	2-Nitrophenol	88755	EPA 8270C
51	4-Nitrophenol	100027	EPA 8270C
52	3-Methyl-4-Chlorophenol	59507	EPA 8270C
53	Pentachlorophenol	87865	EPA 8270C
54	Phenol	108952	EPA 8270C
55	2,4,6-Trichlorophenol	88062	EPA 8270C
56	Acenaphthene	83329	EPA 8270C
57	Acenaphthylene	208968	EPA 8270C
58	Anthracene	120127	EPA 8270C
59	Benzidine	92875	EPA 8270C
60	Benzo(a)Anthracene	56553	EPA 8270C
61	Benzo(a)Pyrene	50328	EPA 8270C
62	Benzo(b)Fluoranthene	205992	EPA 8270C
63	Benzo(ghi)Perylene	191242	EPA 8270C
64	Benzo(k)Fluoranthene	207089	EPA 8270C
65	Bis(2-Chloroethoxy)Methane	111911	EPA 8270C
66	Bis(2-Chloroethyl)Ether	111444	EPA 8270C
67	Bis(2-Chloroisopropyl)Ether	108601	EPA 8270C
68	Bis(2-Ethylhexyl)Phthalate	117817	EPA 8270C
69	4-Bromophenyl Phenyl Ether	101553	EPA 8270C
70	Butylbenzyl Phthalate	85687	EPA 8270C
71	2-Chloronaphthalene	91587	EPA 8270C
72	4-Chlorophenyl Phenyl Ether	7005723	EPA 8270C
73	Chrysene	218019	EPA 8270C
74	Dibenzo(a,h)Anthracene	53703	EPA 8270C
75	1,2-Dichlorobenzene	95501	EPA 8260B
76	1,3-Dichlorobenzene	541731	EPA 8260B
77	1,4-Dichlorobenzene	106467	EPA 8260B
78	3,3'-Dichlorobenzidine	91941	EPA 8270C
79	Diethyl Phthalate	84662	EPA 8270C
80	Dimethyl Phthalate	131113	EPA 8270C
81	Di-n-Butyl Phthalate	84742	EPA 8270C
82	2,4-Dinitrotoluene	121142	EPA 8270C
83	2,6-Dinitrotoluene	606202	EPA 8270C
84	Di-n-Octyl Phthalate	117840	EPA 8270C
85	1,2-Diphenylhydrazine	122667	EPA 8270C
86	Fluoranthene	206440	EPA 8270C
87	Fluorene	86737	EPA 8270C

CTR Number	Parameter	CAS Number	Suggested Analytical Methods
88	Hexachlorobenzene	118741	EPA 8260B
89	Hexachlorobutadiene	87863	EPA 8260B
90	Hexachlorocyclopentadiene	77474	EPA 8270C
91	Hexachloroethane	67721	EPA 8260B
92	Indeno(1,2,3-cd)Pyrene	193395	EPA 8270C
93	Isophorone	78591	EPA 8270C
94	Naphthalene	91203	EPA 8260B
95	Nitrobenzene	98953	EPA 8270C
96	N-Nitrosodimethylamine	62759	EPA 8270C
97	N-Nitrosodi-n-Propylamine	621647	EPA 8270C
98	N-Nitrosodiphenylamine	86306	EPA 8270C
99	Phenanthrene	85018	EPA 8270C
100	Pyrene	129000	EPA 8270C
101	1,2,4-Trichlorobenzene	120821	EPA 8260B
102	Aldrin	309002	EPA 8081A
103	alpha-BHC	319846	EPA 8081A
104	beta-BHC	319857	EPA 8081A
105	gamma-BHC	58899	EPA 8081A
106	delta-BHC	319868	EPA 8081A
107	Chlordane	57749	EPA 8081A
108	4,4'-DDT	50293	EPA 8081A
109	4,4'-DDE	72559	EPA 8081A
110	4,4'-DDD	72548	EPA 8081A
111	Dieldrin	60571	EPA 8081A
112	alpha-Endosulfan	959988	EPA 8081A
113	beta-Endosulfan	33213659	EPA 8081A
114	Endosulfan Sulfate	1031078	EPA 8081A
115	Endrin	72208	EPA 8081A
116	Endrin Aldehyde	7421934	EPA 8081A
117	Heptachlor	76448	EPA 8081A
118	Heptachlor Epoxide	1024573	EPA 8081A
119	PCB-1016	12674112	EPA 8082
120	PCB-1221	11104282	EPA 8082
121	PCB-1232	11141165	EPA 8082
122	PCB-1242	53469219	EPA 8082
123	PCB-1248	12672296	EPA 8082
124	PCB-1254	11097691	EPA 8082
125	PCB-1260	11096825	EPA 8082
126	Toxaphene	8001352	EPA 8081A

ATTACHMENT H – STATE WATER BOARD MINIMUM LEVELS

The Minimum Levels (MLs) in this appendix are for use in reporting and compliance determination purposes in accordance with section 2.4 of the State Implementation Policy. These MLs were derived from data for priority pollutants provided by State certified analytical laboratories in 1997 and 1998. These MLs shall be used until new values are adopted by the State Water Board and become effective. The following tables present MLs for four major chemical groupings: volatile substances, semi-volatile substances, inorganics, and pesticides and PCBs.

Table H-1 Volatile Substances

Table 2a - VOLATILE SUBSTANCES*	GC	GCMS
1,1 Dichloroethane	0.5	1
1,1 Dichloroethylene	0.5	2
1,1,1 Trichloroethane	0.5	2
1,1,2 Trichloroethane	0.5	2
1,1,2,2 Tetrachloroethane	0.5	1
1,2 Dichlorobenzene (volatile)	0.5	2
1,2 Dichloroethane	0.5	2
1,2 Dichloropropane	0.5	1
1,3 Dichlorobenzene (volatile)	0.5	2
1,3 Dichloropropene (volatile)	0.5	2
1,4 Dichlorobenzene (volatile)	0.5	2
Acrolein	2.0	5
Acrylonitrile	2.0	2
Benzene	0.5	2
Bromoform	0.5	2
Methyl Bromide	1.0	2
Carbon Tetrachloride	0.5	2
Chlorobenzene	0.5	2
Chlorodibromo-methane	0.5	2
Chloroethane	0.5	2
Chloroform	0.5	2
Chloromethane	0.5	2
Dichlorobromo-methane	0.5	2
Dichloromethane	0.5	2
Ethylbenzene	0.5	2
Tetrachloroethylene	0.5	2
Toluene	0.5	2
Trans-1,2 Dichloroethylene	0.5	1
Trichloroethene	0.5	2
Vinyl Chloride	0.5	2

* The normal method-specific factor for these substances is 1; therefore, the lowest standard concentration in the calibration curve is equal to the above ML value for each substance.

Table H-2 Semi-Volatile Substances

Table 2b - SEMI-VOLATILE SUBSTANCES*	GC	GCMS	LC	COLOR
Benzo(a)Anthracene	10	5		
1,2 Dichlorobenzene (semivolatile)	2	2		
1,2 Diphenylhydrazine		1		
1,2,4 Trichlorobenzene	1	5		
1,3 Dichlorobenzene (semivolatile)	2	1		
1,4 Dichlorobenzene (semivolatile)	2	1		
2 Chlorophenol	2	5		
2,4 Dichlorophenol	1	5		
2,4 Dimethylphenol	1	2		
2,4 Dinitrophenol	5	5		
2,4 Dinitrotoluene	10	5		
2,4,6 Trichlorophenol	10	10		
2,6 Dinitrotoluene		5		
2- Nitrophenol		10		
2-Chloroethyl vinyl ether	1	1		
2-Chloronaphthalene		10		
3,3' Dichlorobenzidine		5		
Benzo(b)Fluoranthene		10	10	
3-Methyl-Chlorophenol	5	1		
4,6 Dinitro-2-methylphenol	10	5		
4- Nitrophenol	5	10		
4-Bromophenyl phenyl ether	10	5		
4-Chlorophenyl phenyl ether		5		
Acenaphthene	1	1	0.5	
Acenaphthylene		10	0.2	
Anthracene		10	2	
Benzidine		5		
Benzo(a)pyrene		10	2	
Benzo(g,h,i)perylene		5	0.1	
Benzo(k)fluoranthene		10	2	
bis 2-(1-Chloroethoxyl) methane		5		
bis(2-chloroethyl) ether	10	1		
bis(2-Chloroisopropyl) ether	10	2		
bis(2-Ethylhexyl) phthalate	10	5		
Butyl benzyl phthalate	10	10		
Chrysene		10	5	
di-n-Butyl phthalate		10		
di-n-Octyl phthalate		10		
Dibenzo(a,h)-anthracene		10	0.1	
Diethyl phthalate	10	2		
Dimethyl phthalate	10	2		
Fluoranthene	10	1	0.05	
Fluorene		10	0.1	
Hexachloro-cyclopentadiene	5	5		
Hexachlorobenzene	5	1		
Hexachlorobutadiene	5	1		
Hexachloroethane	5	1		
Indeno(1,2,3,cd)-pyrene		10	0.05	

Table 2b - SEMI-VOLATILE SUBSTANCES*	GC	GCMS	LC	COLOR
Isophorone	10	1		
N-Nitroso diphenyl amine	10	1		
N-Nitroso-dimethyl amine	10	5		
N-Nitroso -di n-propyl amine	10	5		
Naphthalene	10	1	0.2	
Nitrobenzene	10	1		
Pentachlorophenol	1	5		
Phenanthrene		5	0.05	
Phenol **	1	1		50
Pyrene		10	0.05	

* With the exception of phenol by colorimetric technique, the normal method-specific factor for these substances is 1,000; therefore, the lowest standard concentration in the calibration curve is equal to the above ML value for each substance multiplied by 1,000.

** Phenol by colorimetric technique has a factor of 1.

Table H-3 Inorganics

Table 2c – INORGANICS*	FAA	GFAA	ICP	ICPMS	SPGFAA	HYDRIDE	CVAA	COLOR	DCP
Antimony	10	5	50	0.5	5	0.5			1,000
Arsenic		2	10	2	2	1		20	1,000
Beryllium	20	0.5	2	0.5	1				1,000
Cadmium	10	0.5	10	0.25	0.5				1,000
Chromium (total)	50	2	10	0.5	1				1,000
Chromium VI	5							10	
Copper	25	5	10	0.5	2				1,000
Cyanide								5	
Lead	20	5	5	0.5	2				10,000
Mercury				0.5			0.2		
Nickel	50	5	20	1	5				1,000
Selenium		5	10	2	5	1			1,000
Silver	10	1	10	0.25	2				1,000
Thallium	10	2	10	1	5				1,000
Zinc	20		20	1	10				1,000

* The normal method-specific factor for these substances is 1; therefore, the lowest standard concentration in the calibration curve is equal to the above ML value for each substance.

Table H-4 Pesticides and PCBs

Table 2d – PESTICIDES – PCBs*	GC
4,4'-DDD	0.05
4,4'-DDE	0.05
4,4'-DDT	0.01
a-Endosulfan	0.02
alpha-BHC	0.01
Aldrin	0.005
b-Endosulfan	0.01
Beta-BHC	0.005
Chlordane	0.1
Delta-BHC	0.005

Table 2d – PESTICIDES – PCBs*	GC
Dieldrin	0.01
Endosulfan Sulfate	0.05
Endrin	0.01
Endrin Aldehyde	0.01
Heptachlor	0.01
Heptachlor Epoxide	0.01
Gamma-BHC (Lindane)	0.02
PCB 1016	0.5
PCB 1221	0.5
PCB 1232	0.5
PCB 1242	0.5
PCB 1248	0.5
PCB 1254	0.5
PCB 1260	0.5
Toxaphene	0.5

* The normal method-specific factor for these substances is 100; therefore, the lowest standard concentration in the calibration curve is equal to the above ML value for each substance multiplied by 100.

Techniques:

GC - Gas Chromatography
GCMS - Gas Chromatography/Mass Spectrometry
HRGCMS - High Resolution Gas Chromatography/Mass Spectrometry (i.e., EPA 1613, 1624, or 1625)
LC - High Pressure Liquid Chromatography
FAA - Flame Atomic Absorption
GFAA - Graphite Furnace Atomic Absorption
HYDRIDE - Gaseous Hydride Atomic Absorption
CVAA - Cold Vapor Atomic Absorption
ICP - Inductively Coupled Plasma
ICPMS - Inductively Coupled Plasma/Mass Spectrometry
SPGFAA - Stabilized Platform Graphite Furnace Atomic Absorption (i.e., EPA 200.9)
DCP - Direct Current Plasma
COLOR - Colorimetric

ATTACHMENT I – DRUG USAGE REPORT TABLE

Name of Drug and Active Ingredient	Date(s) of Application	Location and Purpose of Application	Method of Application or Treatment	Duration of Treatment	Static or Flush Treatment	Total Amount Applied	Method of Disposal for Used Drug
EXAMPLE: Salt, active ingredient sodium chloride	9/1/05 to 9/4/05	Tank Nos. 1,2 Infection treatment	Added directly to water in tanks.	3 days	Flush	200 pounds per tank per day = 200 x 2 x 3 = 1200 pounds total	Discharged via Discharge Point 001.

Table I-1 Quarterly Drug Use Report