# CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD SAN FRANCISCO BAY REGION

## **RESPONSE TO WRITTEN COMMENTS**

ON THE REISSUANCE OF WASTE DISCHARGE REQUIREMENTS FOR:

North San Mateo County Sanitation District (City of Daly City) 153 Lake Merced Boulevard Daly City, CA 94590 NPDES Permit No. CA0037699

I. North San Mateo County Sanitation District - September 18, 2006

# II. United States Environmental Protection Agency - September 18, 2006

#### III. Editorial Changes

Note: The format of this staff response begins with a brief introduction of the party's comments, followed with staff's response. Interested persons should refer to the original letters to ascertain the full substance and context of each comment. Text changes are shown using <u>underline</u> for added text and <del>strikethrough</del> for deleted text.

# I. North San Mateo County Sanitation District

# NSMCSD Comment 1.

NSMCSD requests several revisions of Section II.B, Facility Description, for technical accuracy and clarification, specifically addition of flow equalization to the Facility description, noting that it is operated when necessary, and changing the location of the discharge structure to Fort Funston instead of Ocean Beach.

#### Response 1.

The suggested revisions have been made in the Revised Tentative Order (TO).

## NSMCSD Comment 2.

NSMCSD comments that the sentence in Section II.F, Technology-Based Effluent Limitations, referring to Water Code section 13241 does not appear to be applicable to the permit and therefore should be deleted.

#### Response 2.

We have revised Section II.F as requested. Section II.F now reads as follows:

**F. Technology-based Effluent Limitations.** Title 40 of the Code of Federal Regulations, at section 122.44(a) requires that permits include applicable technology-based limitations and standards. This Order includes technology-based effluent limitations based on Secondary Treatment Standards at Part 133. The Regional Water Board has considered the factors listed in Water Code section 13241 in establishing these requirements. A detailed discussion of the technology-based effluent limitations development is included in the Fact Sheet (Attachment F).

#### NSMCSD Comment 3.

NSMCSD comments that State Drinking Water Policy does not apply to ocean receiving waters and is not applicable to their discharge. NSMCSD therefore requests deletion of the reference in Section II.H. Water Quality Control Plans to State Water Resources Control Board Resolution No. 88-63, consistent with recently adopted Bay Area Permits

## Response 3.

Because the Pacific Ocean in the vicinity of NSMCSD's discharge is not suitable for municipal or domestic water supply, and domestic and municipal water supply are not among the beneficial uses established by the Ocean Plan, we concur with this comment and have revised the TO as follows:

**H. Water Quality Control Plans.** The Regional Water Board adopted a Water Quality Control Plan for the San Francisco Bay Region (hereinafter Basin Plan) that designates beneficial uses, establishes water quality objectives, and contains implementation programs and policies to achieve those objectives for the Pacific Ocean and other receiving waters addressed through the plan. In addition, the Basin Plan implements State Water Resources Control Board (State Water Board) Resolution No. 88 63, which established state policy that all waters, with certain exceptions, should be considered suitable or potentially suitable for municipal or domestic supply. Beneficial uses applicable to the coast areas in the San Francisco Bay Region are as follows:

10010 01 20011 1 1011 20110110101 0 0 0						
Discharge Point	Receiving Water Name	Beneficial Use(s)				
001	Pacific Ocean	Water contact recreation, non-contact water recreation; industrial service supply; navigation; marine habitat; shellfish harvesting; ocean, commercial and sport fishing; and preservation of rare and endangered species.				

Table 5. Basin Plan Beneficial Uses

#### NSMCSD Comment 4.

NSMCSD requests that the statement in Section II.K, Stringency of Requirements for Individual Pollutants, that restrictions on individual pollutants are no more stringent than required by the federal Clean Water Act be deleted because limitations are included in Table A of the Ocean Plan that are more stringent than federal requirements. NSMCSD also notes that Total Chlorine Residual (TCR) and bacteria effluent limitations contained in the TO are water quality based limitations, not technology based limitations as is stated.

#### Response 4

We made some of the changes suggested: specifically, we deleted reference to TCR and total coliform as technology-based limitiations. The effluent limitations in Table A of the Ocean Plan, which are included in the TO, were developed pursuant to the federal Clean Water Act and are the minimum level of treatment acceptable for a POTW per the Ocean Plan.

NSMCSD is correct that TCR is a water quality based limitation, not a technology based limitation per the Ocean Plan. The total coliform bacteria effluent limitation in the expiring permit appears to be a performance-based limitation. The bacteria effluent limitation has been revised based on recommendations and comments from U.S. EPA, and is discussed in responses to comments below (see Comment 12).

#### NSMCSD Comment 5.

NSMCSD suggests minor edits to Section II.L, Antidegradation Policy, for clarity, consisting of noting that the Fact Sheet is Attachment F and that the reference to "section 131.12" is to 40 CFR Section 131.12

#### Response 5.

We revised the TO as suggested.

## NSMCSD Comment 6.

NSMCSD comments that the federal anti-backsliding provisions restrict issuance of permits containing effluent limitations that are less stringent then previous permit limitations, but do not prohibit backsliding. NSMCSD requests revisions to Section II.N, Anti-Backsliding Requirements, to state that backsliding is restricted rather than prohibited, and to remove the statement that all effluent limitations in the TO are at least as stringent as those in the expiring permit.

# Response 6.

We are denying this request. The federal anti-backsliding provisions prohibit backsliding, except under certain specific conditions. All effluent limitations in the TO are at least as stringent as in the previous permit. The enterococcus bacteria effluent limitation replaces the total coliform bacteria effluent limitation based on U.S. EPA's comments and U.S. EPA's recommendation that the enterococcus bacteria be used as an indicator of gastrointestinal illness for water contact in marine waters in lieu of total coliform.

## NSMCSD Comment 7.

NSMCSD Proposes language in Section II.M, Monitoring and Reporting, clarifying the conditions under which the Executive Officer may amend the Monitoring and Reporting Program (MRP). NSMCSD comments that the proposed language is consistent with recently adopted Bay Area permits.

## Response 7.

NSMCSD is correct that its proposed language is consistent with recently adopted Bay Area permits. We have therefore accepted the proposed language. Section III.N now reads as follows:

N. Monitoring and Reporting. Section 122.48 requires that all NPDES permits specify requirements for recording and reporting monitoring results. Water Code sections 13267 and 13383 of the CWC authorize the Regional Water Board 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. <u>The MRP may be amended by the Executive Officer pursuant to USEPA regulation 40 CFR 122.62, 122.63 and 124.5.</u>

#### NSMCSD Comment 8.

NSMCSD comments on Section II.P, Provisions and Requirements Implementing State Law, "With the exception of subsection IV.C, the other sections referred to in the tentative order are not applicable to the permitted discharge. The reference to section VI.C appears to be in error as this section contains re-opener provisions which should not be subject to any enforcement provisions pursuant to state or federal law."

## Response 8.

We are denying the request to delete the references to Sections IV.B, Land Discharge Specifications; V.B, Groundwater Limitations; and VI.C, Other Special Provisions, because these references are inconsequential. Sections IV.B and V.B are marked "Not applicable," and thus contain no provisions applicable to this discharge.

# NSMCSD Comment 9 and 10.

NSMCSD proposes minor edits for clarity similar to Comment 5 to Section II.Q, Notification of Interested Parties, and Section II.R, Consideration of Public Comment.

#### Response 9 and 10.

We have revised the TO as requested.

#### NSMCSD Comment 11.

NSMCSD comments on Section IV, Effluent Limitations and Discharge Specifications, Table 6, Effluent Limitations:

- a. Table 6, Footnote 1. NSMCSD requests detailed clarification of the application of mass limitations calculated based on maximum dry-weather flow to discharges during wet weather events. In the worst-case scenario, the mass limitation on TCR could be violated by a wet-weather discharge that complies with the concentration-based TCR effluent limitation. In addition, the footnote states the calculation of weekly and monthly limitations although the table shows 6-month median and maximum daily.
- b. Table 6, Footnote 2 NSMCSD requests a revision to ensure that the suspension of the TCR effluent limitation expires simultaneously with the enterococcus interim effluent limitation.
- c. Table 6, Footnote 2 –Remaining paragraph. NSMCSD requests a revision clarifying how compliance with the TCR effluent limitation is determined when on-line, continuous monitoring systems are used, consistent with other recently adopted Bay Area permits.

## Response 11.

Table 6 was mislabeled in the TO, and should have been titled Table 7, Effluent Limitations. This revision has been made to the TO, and the responses here are addressed to Table 7.

- a. The chlorine mass limitation applies only during dry-weather months. A note to this effect has been added to Table 7 in Footnote 1.
- b. The provision for a Beneficial Uses Survey/Dilution Study was based on the need to determine at what point to measure compliance with receiving water bacteriological standards, and what dilution factor would be appropriate. Based on discussions between the Regional Water Board, NSMCSD and U.S. EPA, the receiving water standards must be met at the discharge point (at the edge of the initial dilution zone), and the dilution factor will be the same as that for this discharge in general (70 to 1). Since no study is necessary, we have deleted the provision for a study from the permit, including the provision for suspension of the TCR limitation. However, NSMCSD was unable to produce the original study upon which the 70 to 1 was previously granted about 12 years ago. Moreover, because initial dilution is to be determined using worst case actual discharge flows, which may have increased since the initial study was conducted, we have included a provision (Section VI.C.5) requiring a report to verify the appropriateness of the "70 to 1" initial dilution.
- c. The remaining proposed clarifying language addressing compliance determination when on-line continuous monitoring systems are used is consistent with other recently adopted Bay Region permits. We have therefore revised Table 7, Footnote 2 as requested.

Table 7 now reads as follows:

**Table 7. Effluent Limitations** 

		Effluent	Effluent Limitations [1]				
Parameter	Units	Average Monthly	Average Weekly	Average Daily	6-month Median	Maximum Daily	Instantaneous Maximum
Carbonaceous Biochemical Oxygen Demand 5- day @ 20°C	mg/L	25	40	50	1		
Total Suspended Solids	mg/L	30	45	60	1		1
Oil and Grease	mg/L	25	40				75
Settleable Solids	ml/L	1.0	1.5				3.0
Total Chlorine	mg/L				0.14	0.57	4.3
Residual [2]	kg/day				4.2	17	_
Turbidity	NTU	75	100				225
Chronic Toxicity [3]	TUc					71	

				Effluent	Limitations [1	]	
Parameter	Units	Average	Average	Average	6-month	Maximum	Instantaneous
		Monthly	Weekly	Daily	Median	Daily	Maximum

- [1] Mass emission limitations are based on a peak dry weather capacity of 8 mgd, and apply only during dry-weather months. Weekly and monthly mass effluent limitations shall be calculated by averaging the reported daily values over the relevant number of days for the monitoring interval.
- [2] The Total Chlorine Residual effluent limitation is suspended for the duration of the Beneficial Uses Survey/Dilution

  Study Period described in Section VI.C.5 (Other Special Provisions). Requirement defined as below the limitation of detection in standard test methods defined in the latest edition of Standard Methods for the Examination of Water and Wastewater. The Discharger may elect to use a continuous on-line monitoring system(s) for measuring flows, chlorine residual and sodium bisulfite (or other dechlorinating chemical) dosage (including a safety factor) and concentration to prove that chlorine residual exceedances are false positives. If convincing evidence is provided, Regional Water Board staff may conclude that these false positive chlorine residual exceedances are not violations of this permit limitation.
- [3] Expressed as Chronic Toxicity Units (TU<sub>c</sub>)

 $TU_c = 100/NOEC$  where:

NOEC (No Observed Effect Concentration) is expressed as the maximum percent effluent or receiving water that causes no observable effect on the test organism as determined by the result of a critical life state toxicity test listed in Appendix III of the Ocean Plan (2005) adopted and effective February 14, 2006.

## NSMCSD Comment 12.

NSMCSD requests that the effluent limitation for this permit be calculated by using the California Ocean Plan equation for the calculation of effluent limitations (see Section III. C of Ocean Plan). Along with the most useful standards based on current information, enterococcus is the preferred and standard method used for ascertaining public health and safety. NSMCSD believes meeting the enterococcus standard contained in the Ocean Plan would also address the fecal and total standards as well. The modifications do not violate anti-backsliding provisions as the methodology used to calculate the limitations have changed. The calculation method now provides a basis for the limitations and is consistent with the 2005 California Ocean Plan (Section III.C).

#### Response 12.

Based on U.S. EPA's comments and recommendations (see U.S. EPA Comment 1), total coliform bacteria has been replaced by enterococcus bacteria as an indicator species. U.S. EPA recommends the use of enterococcus bacteria as an indicator species for water contact in marine waters. In addition, an enterococcus bacteria effluent limitation has been calculated based on the procedures for calculating water quality based effluent limitations (WQBELs) and the enterococcus bacteria receiving water standard in the Ocean Plan, based on U.S. EPA's comments. Section IV.A.1.d has been revised as follows:

**Total Coliform Enterococcus Bacteria:** The treated wastewater, prior to discharge, shall not exceed a geometric mean value of 2,4002,500 MPN/100 ml for any five consecutive samples. No single sample may exceed 24,0007,400 MPN/100 ml.

#### NSMCSD Comment 13.

NSMCSD proposes editorial revisions to Section IV.A.1.e, Interim Total Coliform Bacteria Limitation, replacing Total Coliform Bacteria with Enterococcus Bacteria, and deleting the reference to Section V.A.3 (shellfish harvesting receiving water total coliform bacteriological standards) for the purposes of the study.

## Response 13.

Because the Beneficial Uses Survey/Dilution Study provision has been deleted from the TO, Section IV.A.1.e has also been deleted. Section V.A.3 has been revised to reflect the Regional Water Board's finding that commercial shellfish harvesting does not occur in the vicinity of the NSMCSD outfall because we are not aware of evidence that points to the Fort Funston/Ocean Beach area as a recreational or commercial shellfish harvesting area (see Response 14).

# NSMCSD Comment 14.

NSMCSD proposes a minor editorial revision to Section V.A, Surface Water Limitations, and the addition of an enterococcus bacterial receiving water standard as Section V.A.3, consistent with the Ocean Plan.

## Response 14.

We are denying the requested editorial revision to Section V.A. NSMCSD proposes replacing the phrase "water contact sports" with "water contact standards" in Section V.A.1. The existing text is taken verbatim from Ocean Plan Section II.B.1.a.(1), which uses the term "water contact sports."

We have added an enterococcus bacteria receiving water limitation, consistent with the Ocean Plan, as Section V.A.1.c. Section V.A.1 now reads as follows:

- a. Samples of water from each sampling station shall have a concentration of total coliform organisms less than 1,000 per 100 ml (1,000 MPN) provided that not more than 20 percent of samples at any sampling station, in a 30 day period any calendar month, exceeds 1,000 MPN, and provided further that no single sample when verified by a repeat sample taken within 48 hours shall exceed 10,000 MPN.
- b. The fecal coliform concentration based on a minimum of not less than 5 samples for any 30-day period calendar month shall not exceed a geometric mean of 200 MPN nor shall more than 10 percent of the total samples during any 60-day two-month period exceed 400 MPN.
- c. The enterococcus concentration based on a minimum of not less than 5 samples for any calendar month shall not exceed a geometric mean of 35 MPN, nor shall more than 10 percent of the total samples during any two-month period exceed 104 MPN (Dilution notwithstanding).

Also, we have revised Section V.A.3 on shellfish harvesting standards to better reflect the Regional Water Board's determination that the area in the vicinity of NSMCSD's discharge is not a shellfish harvesting area. Section V.A.3 now reads as follows:

Shellfish harvesting receiving water quality objectives are determined not to apply in the vicinity of this Discharge outfall, as access to the shoreline is difficult, and there is no evidence to indicate that the shoreline in the Fort Funston / Ocean Beach area supports recreational shellfish harvesting. No commercial shellfish beds are in the vicinity of the discharge. At all areas where shellfish may be harvested for human consumption, as determined by the Regional Water Board, the following bacteriological objectives shall be maintained throughout the water column:

a. The median total coliform concentration shall not exceed 70 MPN, and not more than 10 percent of samples shall exceed 230 MPN.

#### NSMCSD Comment 15.

NSMCSD requests clarification of the reference to Chapter IV Table B of the Ocean Plan in Section V.A.11, as there is no Chapter IV in the Ocean Plan.

## Response 15.

The reference here was intended to be to Chapter II of the Ocean Plan and has been revised accordingly.

#### NSMCSD Comment 16.

NSMCSD proposes minor edits to clarify Regional Water Board Standard Provisions (Section VI.A.2) consistent with other recently adopted Bay Area permits.

## Response 16.

We have revised this section consistent with other recently adopted Bay Region permits as follows:

**2. Regional Water Board Standard Provisions.** The Discharger shall comply with all applicable items of the *Standard Provisions and Reporting Requirements for NPDES Surface Water Discharge Permits, August 1993* (Standard Provisions, Attachment G), including any amendments thereto. Where provisions or reporting requirements specified in this Order are different from equivalent or related provisions or reporting requirements given in the Standard Provisions, the specifications of this Order shall apply. <u>Duplicative requirements in the federal Standard Provisions in VI.A.1, above (Attachment D), and the regional Standard Provisions (Attachment G) are not separate requirements. A violation of a duplicative requirement does not constitute two separate violations.</u>

#### NSMCSD Comment 17.

NSMCSD suggests replacing the TO text in Section VI.B, Monitoring and Reporting Program Requirements, regarding the MRP with a reference to the Standard Provisions, consistent with other recently adopted Bay Area permits.

#### Response 17.

The suggested change is consistent with recently adopted Bay Region permits. We have revised Section VI.B accordingly, and it now reads as follows:

## B. Monitoring and Reporting Program Requirements

The Discharger shall comply with the MRP, and future revisions thereto, in Attachment E of this Order. The MRP includes monitoring for conventional, non-conventional, and toxic pollutants in influent, effluent, and receiving water, as well as requirements to record observations made on the site of the POTW and in the collection system. The Discharger shall also comply with the requirements contained in *Self-Monitoring Program, Part A, August 1993* (Attachment G).

#### NSMCSD Comment 18.

NSMCSD comments that permit provision VI.C, Special Provisions, states that the Water Board may consider amending this Order if supported by the results of the Beneficial Uses Survey/Dilution Study, and suggests that a new re-opener provision be added specifically stating so.

#### Response 18.

As no Beneficial Uses Survey/Dilution Study is included in the revised TO, the requested change is obviated.

## NSMCSD Comment 19.

NSMCSD requests a revision of Section VI.4.a (5) for clarity. This revision specifies that the annual report on sludge reuse be postmarked by February 15 of each year.

## Response 19.

We have no objection to the requested revision. The revised text reads as follows:

(5) The Discharger shall submit an annual report (<u>postmarked by February 15 of each year</u>, for the period covering the previous calendar year) to the USEPA and the Regional Water Board containing reuse information and other information pertaining to sludge, as required at 40 CFR Part 503.

#### NSMCSD Comment 20.

NSMCSD suggests revising Section VI.4.b, Sanitary Sewer Overflow and Sewer System Management Plan, for consistency with the recent East Bay Discharger's Authority (EBDA) permit.

## Response 20.

We have revised this section for consistency with the recent EBDA permit as follows:

#### b. Sanitary Sewer Overflows and Sewer System Management Plan

The Discharger's collection system is part of the facility that is subject to this Order. As such, the Discharge must properly operate and maintain its collection system (Attachment D, Standard Provisions - Permit Compliance, subsection I.D). The Discharger must report any noncompliance (Attachment D, Standard Provision - Reporting, subsections V.E.1 and V.E.2), and mitigate any discharge from the Discharger's collection system in

violation of this Order (Attachment D, Standard Provisions - Permit Compliance, subsection I.C). The General Waste Discharge Requirements for Collection System Agencies (Order No. 2006-0003 DWQ) has requirements for operation and maintenance of collection systems and for reporting and mitigating sanitary sewer overflows. While the Discharger must comply with both the General Waste Discharge Requirements for Collection System Agencies (General Collection System WDR) and this Order, the General Collection System WDR more clearly and specifically stipulates requirements for operation and maintenance and for reporting and mitigating sanitary sewer overflows. Implementation of the General Collection System WDR requirements for proper operation and maintenance and mitigation of spills will satisfy the corresponding federal NPDES requirements specified in this Order. Following reporting requirements in the General Collection System WDR will satisfy NPDES reporting requirements for sewage spills. Compliance with these requirements will also satisfy the federal NPDES requirements specified in this Order. Furthermore, the Discharger shall comply with the schedule for development of sewer system management plans (SSMPs) as indicated in the letter issued by the Regional Water Board on July 7, 2005, pursuant to Water Code Section 13267. Until the statewide on-line reporting system becomes operational, the Discharger shall report sanitary sewer overflows electronically according to the Regional Water Board's SSO reporting program.

#### NSMCSD Comment 21.

NSMCSD provided the following comments on Section VI.C.5, Other Special Provisions:

- a. Editorial. Small "a" not needed.
- b. First paragraph. The permit interim limitations contain references to the "study period" as the time period for which limitations are suspended. Thus, this study provision should clarify that the entire schedule is intended to be the study period. Defines receiving water objectives to be met.
- c. Schedule. The permit interim limitation provisions contain a final date of April 30, 2009. However, this schedule ends with the Final Report submittal on October 31, 2008. It appears that the Regional Board was building into the schedule time for review and action by the Regional Board prior to expiration of the interim/suspension of the final effluent enterococcus and TCR limitations. To ensure that time is allowed and that the District does not have to begin disinfection prior to the Board's review of the Study results, NSMCSD added Regional Board review times into the schedule.
- d. Last paragraph. As currently drafted, the Regional Board's action is limited to adopting new limitations. NSMCSD recommends revising the language to give the Regional Board maximum flexibility on future actions. In addition, clarifying language has been inserted describing circumstances should the study not proceed.

## Response 21.

As no Beneficial Uses Survey/Dilution Study is included in the revised TO, these comments are obviated. Section VI.C.5 has been revised to include a provision for the Discharger to verify and document the 70:1 dilution ratio, as noted in the response to NSMCSD Comment 11.

# NSMCSD Comment 22.

NSMCSD comments that the term "reportable pollutants" used in Section VII.A, General, does not accurately identify the pollutants that are subject to minimum levels (MLs) in the Ocean Plan, and requests revisions to this section to refer instead to "pollutants identified on Chapter II, Table B, of the California Ocean Plan."

## Response 22.

We have modified this section as requested, so it reads as follows:

#### A. General

Compliance with effluent limitations for reportable pollutants identified in Chapter II, Table B, of the California Ocean Plan shall be determined using sample reporting protocols defined in the MRP and Attachment A of this Order. For purposes of reporting and administrative enforcement by the Regional and State Water Boards, the Discharger shall be deemed out of compliance with effluent limitations if the concentration of the Table Breportable pollutant in the monitoring sample is greater than the effluent limitation and greater than or equal to the reported Minimum Level (ML).

## NSMCSD Comment 23.

NSMCSD requests that Section VII.I, Six Month Median Effluent Limitation, be revised to state that a violation of the Six Month Median Limitation over 180 days is considered a single violation, consistent with other recently adopted Bay Area permits.

#### Response 23.

More recent revisions to the standard permit language have resulted in the deletion of Sections VII.C through VII.I. We have therefore deleted these sections.

## NSMCSD Comment 24.

NSMCSD requests revision of Attachment E Monitoring and Reporting Program (MRP), Section II, Table 1, Monitoring Station Locations, for consistency with actual NSMCSD monitoring station locations.

#### Response 24.

The previous order identified a number of unnecessary receiving water monitoring locations. Receiving water monitoring should occur at locations where the receiving water is most affected by the discharge. Therefore, the monitoring locations should be as close as possible to the edge of the mixing zone. Therefore, for this Order, we have deleted most of the previous monitoring locations as shown below, and replaced them with four points: 100 feet north of the midpoint of the diffuser area; 100 feet south of the midpoint of the diffuser area; and 100 feet west of the west end of the diffuser area. The diffuser area is

located along the last 200 feet of the outfall pipe (i.e., from its 2,300<sup>th</sup> foot to its 2,500<sup>th</sup> foot going from east to west).

**Table 1. Monitoring Station Locations** 

	violitoring Statio	
Discharge	Monitoring	Monitoring Location Description (include Latitude and
Point Name	Location Name	Longitude when available)
Influent	A-001	At any point in the treatment facilities headworks at which all waste tributary to the system is present and preceding any phase of treatment, and exclusive of any return flows or process side streams.
Effluent	E-001	At any point in the treatment facilities between the point of discharge and the point at which all waste tributary to the outfall is present (may be the same as E-001D)
	E-001D	At any point in the treatment facilities at which point adequate contact with the disinfectant is assured.
	Fixed Sampling Locations	
	DCRSWO-001	37 43 32 -122 30 78.
	DCRSWO-002	37 42 48 -122 30 78
	DCRSWSL 003	1/4 MS
Receiving Waters [1]	DCRSWSL 004	1/2 MS
waters	DCRSWSL 5	1/4 MN
	DCRSWSL 6	1/2 MN
	R-003 <sup>[2]</sup>	100 feet north of midpoint of diffuser area
	R-004 [2]	100 feet south midpoint of diffuser area
	R-005 [2]	100 feet east of east end of diffuser area
	R-006 <sup>[2]</sup>	100 feet west of west end of diffuser area
Overflows And Bypasses	OV-1 through OV-n [3,4]	Points in the collection system including manholes, pump stations, or any location where overflows and bypasses occur.

- [1] Receiving water monitoring for DCRSWO-001 and DCRSWO-002 are conducted through a coordinated effort with the City of San Francisco at these locations. Sampling will be conducted annually in the fall during the period when sediments are least disturbed and may show the highest concentrations of contaminants.
- [2] The diffuser area occurs along the last 200 linear feet of the outfall pipe (i.e., from its 2,300<sup>th</sup> foot to its 2,500<sup>th</sup> foot going from east to west).
- [3] A map and description of each known overflow or bypass location shall accompany the annual report for each calendar year.
- [4] Each occurrence of an overflow or bypass shall be reported to the Regional Water Board in accordance with the reporting requirements specified in Section X.

#### NSMCSD Comment 25.

NSMCSD comments on MRP Section III, Influent Monitoring Requirements:

- a Table 2, kg/day references. It is not necessary to monitor these constituents in kg/day in the influent because there are no performance-based effluent limitations based on these units.
- b Table 2, Oil & Grease. According to Method 1664, samples must be collected as grab samples.
- *c* Footnote 1, kg/day not required for the constituents in the table.
- *d* Footnote 3, add this footnote for consistency with other tables.

# Response 25.

We agree with the comments (except, as discussed below, for oil and grease) and have revised Table 2 as follows:

**Table 2. Influent Monitoring** 

Tuble 20 Imitaent Montoling									
Parameter	Units <sup>[1]</sup>	Sample Type <sup>[2]</sup>	Minimum Sampling Frequency	Required Analytical Test Method <sup>[3]</sup>					
Flow	Mgd	Continuous							
CBOD <sub>5</sub> <sup>[4]</sup>	mg/L <del>kg/day</del>	C-24	1X / Week	405.1					
TSS <sup>[5]</sup>	mg/L <del>kg/day</del>	C-24	2X / Week	160.2					
Oil & Grease [6]	mg/L <del>kg/day</del>	C-24	1X / Quarter	1664					

[1] <u>Unit Abbreviations:</u>

mgd = million gallons per day mg/L = milligrams per liter kg/day = kilograms per day

[2] Sample Type Abbreviations:

C-24 = 24-hour composite

- [3] Or other equivalent test method as specified in 40 CFR 136
- [4] 5-Day Carbonaceous Biochemical Oxygen Demand at 20° C
- [5] Total Suspended Solids
- [6] Each oil & grease sampling event shall consist of a composite sample comprised of three grab samples taken at equal intervals during the sampling date, with each grab sample being collected in a glass container. Each glass container used for sample collection or mixing shall be thoroughly rinsed with solvent as soon as possible after use, and the solvent rinse shall be added to the composite sample for extraction and analysis.

For oil and grease, it is appropriate to monitor as composites made up of grabs. Though it is proper to collect oil and grease samples as grabs, 24-hour composites provide a more representative sample of the discharge for any particular day, as opposed to a single grab. A similar change has been made to the effluent monitoring requirements in Table 3.

#### NSMCSD Comment 26.

NSMCSD comments on MRP Section IV.A, Monitoring Location E-001, Table 3, Effluent Monitoring E-001:

- a. Table 3. Oil & Grease. Revision of sampling frequency for consistency with current sampling frequency and influent sampling requirements. Compliance has not been an issue.
- b. Table 3. Chronic Toxicity. Remove the reference to 96 hr as current chronic toxicity tests vary in length from 48 hrs to 7 days.
- c. Table 3. Delete 'Grab' sample type for All Applicable Standard Observations row.
- d. Table 3, Footnote 3. Minor edit.
- e. Table 3, Footnote 5. Current language references suspension of the limitation in other sections of the order and MRP; however, this section should also suspend the monitoring requirement.
- f. Table 3, Footnote 5. Add continuous monitoring language consistent with other recent Bay Area adopted permits.

## Response 26.

We agree with the comments except that, as no Beneficial Uses Survey/Dilution Study is included in the revised TO, text suspending the TCR monitoring requirement is not needed. We have revised Table 3 of the MRP as follows:

Table 3. Effluent Monitoring E-001

Parameter Parameter	Units <sup>[1]</sup>	Sample Type [2]	Minimum Sampling Frequency	Required Analytical Test Method <sup>[3]</sup>
Flow Rate	mgd	Continuous	Continuous	
CBOD <sub>5</sub>	mg/L	C-24	1X / Week	405.1
TSS	mg/L	C-24	2X / Week	160.2
Settleable Solids	mg/L	C-24	2X / Week	160.5
Oil & Grease [4]	mg/L	C-24	1X / <del>Month</del> Quarter	1664
Turbidity	NTU	C-24	1X / Day	180.1
Chronic Toxicity 96 hr. [5]	TUc	C-24	1X / Quarter	821-R-02-012
Ammonia Nitrogen	mg/L	Grab	2X / Month	350.3
PH	pH units	Grab	1X / Day	150.1 or 9040
Dissolved Oxygen	mg/L , % saturation	Grab	1X / Day	
Total Chlorine Residual [6]	mg/L	Grab	2X / Hour	
Temperature	°C	Grab	1X / Day	
Sulfides (if DO < 5.0 mg/L) Total and Dissolved mg/L		Grab	1X / Day	376.2
All Applicable Standard Observations [7]		Grab	1X / Day	
Heptachlor	μg/L	C-24	1X / Quarter [8]	608
Priority Pollutants [9]	μg/L	C-24	1X / Year	[10]

**Unit Abbreviations:** 

mg/L = milligrams per liter

#### Re-issuance of NPDES Permit

 $\mu g/L$  = micrograms per liter

NTU = Nephelometric Turbidity Units

% Saturation = percent saturation of dissolved oxygen in water MPN/100 ml = Most Probable Number per 100 milliliters

°C = degree Celsius

[2] Sample Type Abbreviations:

Continuous = Measured continuously, and recorded and reported daily

C-24 = 24-hour composite Grab = Grab sample

- [3]  $\Theta$ Or other equivalent test method as specified in 40 CFR 136.
- [4] Each oil & grease sampling event shall consist of a composite sample comprised of three grab samples taken at equal intervals during the sampling date, with each grab sample being collected in a glass container. Each glass container used for sample collection or mixing shall be thoroughly rinsed with solvent as soon as possible after use, and the solvent rinse shall be added to the composite sample for extraction and analysis.
- [5] TU<sub>c</sub> shall be measured using the critical life stage toxicity tests specified in Appendix III of the Ocean Plan.
- [6] The TCR effluent limitation will be suspended during the Beneficial Uses Survey/Dilution Study Period described in this Order, Section VI.C.5 (Other Special Provisions). When applicable, the Discharger may record discrete readings from the continuous monitoring every hour on the hour, and report, on a daily basis, the maximum concentration observed following dechlorination. Total chlorine dosage (mg/day) shall be recorded on a daily basis.
- [7] Discharger shall record standard observations of effluent, including color, presence of sheen or foam, etc.
- [8] If four consecutive effluent samples are non-detect (ND) for heptachlor, effluent monitoring for heptachlor shall be reduced to 1X / year, as for all other priority pollutants. If, at any time, monitoring detects the presence of heptachlor, the sampling frequency shall revert to 1X / quarter.
- [9] All pollutants listed in Table B of the Ocean Plan (2005), except chronic toxicity, TCR and heptachlor as noted above.
- [10] As specified in Appendix III of the Ocean Plan (2005).

#### NSMCSD Comment 27.

NSMCSD suggests revision of MRP Section IV.B, Monitoring Location E-001-D, Table 4, Effluent Monitoring E-001-D, for clarity, changing the Total Coliform Bacteria parameter to Enterococcus and changing suspension of TCR monitoring to suspension of TCR effluent limitations.

#### Response 27.

We have revised Table 4 to include the enterococcus bacteria parameter rather than total coliform bacteria. The change to the suspension of the TCR monitoring to TCR effluent limitations is no longer necessary as the Beneficial Uses Survey/Dilution Study is not included in the revised TO, and Footnote 4 has been deleted accordingly. Table 4 now reads as follows:

**Table 4. Effluent Monitoring E-001-D** 

<u> </u>	Table 4. Efficient Momentum E-001-D								
Parameter		$\begin{array}{c cccc} Parameter & Units^{[1]} & Sample & Minimum \\ Type^{[2]} & Sampling \\ Frequency & Frequency \\ \end{array}$		Sampling	Required Analytical Test Method [3]				
Total Colifor	<del>m</del> Enterococcus- <sup>[4]</sup>	MPN/100 ml	Grab	1X / Week	1600 Series				
Total C	Chlorine Residual [4]	mg/L	Grab	2X / Hour					
[2]	mg/L = milligrams per liter MPN/100 ml = Most Probable Number per 100 milliliters								
[3] or other equivalent test method as specified in 40 CFR 136									
[4]	The Total Coliform Bacteria and Total Chlorine Residual effluent monitoring will be suspended during the Beneficial Uses Survey/Dilution Study Period described in this Order,								

## NSMCSD Comment 28.

NSMCSD requests a minor editorial change to MRP Section V.A, Whole Effluent Toxicity Testing Requirements, to retain flexibility in test species and methods.

## Response 28.

We believe the existing language provides the requested flexibility, but have no objection to the revision. The revised text reads as follows:

#### A. Chronic Toxicity Effluent Monitoring Program

Section VI.C.5 (Other Special Provisions).

1. The Discharger shall conduct critical life stage chronic toxicity tests on 24-hour composite 100 percent effluent samples in accordance with Appendix III of the Ocean Plan; and using either EPA's Short Term Methods for Estimating the Chronic Toxicity of Effluents and Receiving Waters to Marine and Estuarine Organisms, Third Edition, October 2002 (EPA/821/R-02-014); and/or EPA's Short-Term Methods for Estimating Chronic Toxicity of Effluent and Receiving Waters to West Coast Marine and Estuarine Organisms, August, 1995 (EPA/600/R-95-136).

#### NSMCSD Comment 29.

NSMCSD requests a revision of MRP Section V.B, Quality Assurance, for consistency with the test methods called for in Section V.A.

## Response 29.

We agree with the comment and have replaced test method EPA/600/4-91/002 with EPA/600/R-95-136, as requested.

#### NSMCSD Comment 30.

NSMCSD comments on MRP Section VIII.A, Monitoring Locations, that receiving water monitoring stations should be revised to match NSMCSD monitoring locations and the locations

currently monitored as a coordinated effort with the City and County of San Francisco. NSMCSD also requests that receiving water monitoring for priority pollutants be removed on the grounds that it is especially onerous, and that priority pollutants are already monitored in the effluent; comments that the Pacific Ocean is not representative of NSMCSD's discharge; and comments that their understanding is that any results from receiving water monitoring are intended to obtain background data, and not for compliance purposes.

## Response 30.

We have changed the receiving water monitoring locations, as explained in response to NSMCSD comment 24. Receiving water monitoring is necessary to evaluate compliance with receiving water limitations. As shown in MRP Table 5, priority pollutants are not among the constituents that must be monitored in receiving water.

## NSMCSD Comment 31.

NSMCSD provides an editorial comment on Section IX.C, Beneficial Uses Survey/Dilution Study, of the MRP that the small "a" is not needed.

## Response 31.

As the Beneficial Uses Survey/Dilution Study is not included in the revised TO, this section has been deleted.

#### NSMCSD Comment 32.

NSMCSD comments that the second opening paragraph of the Fact Sheet (Attachment F) discusses the Order and does not apply to the Fact Sheet, and therefore should be deleted.

#### Response 32.

We are denying this request because the paragraph in question, though it does not refer directly to the Fact Sheet, is standard template language common to all NPDES permits.

#### NSMCSD Comment 33.

NSMCSD provides several minor edits to Fact Sheet Section II.A and B for technical accuracy, consistent with those provided for the corresponding section of the main body of the TO (NSMCSD Comment 1).

#### Response 33.

We have made the requested revisions to the TO. In addition, text relating to the Beneficial Uses Survey/Dilution Study has been deleted. Fact Sheet Sections II.A and B now read as follows:

## A. Description of Wastewater and Sludge Treatment or Controls

The Discharger owns and operates the North San Mateo County Sanitation District Wastewater Treatment Plant, which provides secondary treatment of domestic wastewater from the City of Daly City, portions of San Mateo County, the Town of Colma, San Francisco County Jail, and the Westborough Water District within the City of South San Francisco. A portion of the effluent receives tertiary treatment for water reclamation projects. The combined service population is approximately 120,000. Approximately

180 miles of sanitary sewer lines and seveneight lift stations convey domestic sewage to the facility. Treated wastewater is discharged to the Pacific Ocean through the Vista Grande Tunnel structure and a 27" force main located on Ocean Beach at Fort Funston in San Francisco County. Final discharge is through a submerged diffuser extending 2,500 feet from the shoreline and terminating at a depth of approximately 32 feet (-32 MLLW). An initial dilution ratio of 70:1 is achieved.

The treatment system includes bar screens, a micro screen and compactor, primary clarifiers, equalization basins, aeration tanks, secondary clarifiers, and a chlorine contact chamber. The treatment system may be operated using sodium hypochlorite for chlorination and sodium bisulfate for dechlorination. Disinfection by chlorination and dechlorination was suspended in 2001 to enable the facility to conduct a bacteriological assessment study as required by Order No. 00-017. Chlorination and dechlorination are suspended during the Beneficial Uses Survey/Dilution Study pursuant to the terms of this Order.—Tertiary treatment provides up to 2.77 MGD of recycled water for uses such as, but not limited to golf courses, median strips and parks. The tertiary treatment system includes alum injection followed by dual-mediasand filtration, disinfection, gypsum injection and a 1.4 million gallon (mg) storage basin. Solids are directed to a degritter, gravity and air floatation thickeners, and an anaerobic digester prior to being dewatered by centrifuge and hauled off site for disposal.

The treatment plant has a peak dry weather treatment capacity of 8 MGD and a peak wet weather capacity of 25 MGD. The facility discharges an annual average flow of 6.85 MGD.

#### **B. Discharge Points and Receiving Waters**

Treated wastewater is discharged to the Pacific Ocean through the Vista Grande Tunnel structure and a 27" force main located on Ocean Beach at Fort Funston in San Francisco County. Final discharge is through a submerged diffuser extending 2,500 feet from the shoreline and terminating at a depth of approximately 32 feet (-32 MLLW). An initial dilution ratio of 70:1 is achieved.

## NSMCSD Comment 34.

NSMCSD requests several revisions of Fact Sheet Sections III.C.5, 6, and 7, consistent with previous comments on the main body of the TO (NSMCSD Comments 4, 5 and 6).

## Response 34.

Please see Responses 4, 5 and 6.

#### NSMCSD Comment 35.

NSMCSD provides an edit for technical accuracy to Fact Sheet Section III.D, Impaired Water Bodies on CWA 303(d) List, changing the location of the discharge pipe from Ocean Beach to Fort Funston.

#### Response 35.

We have revised the TO as requested.

#### NSMCSD Comment 36.

NSMCSD comments on Fact Sheet Section IV.B.8, Total Coliform Bacteria, that the Ocean Plan receiving water standard for enterococcus bacteria should be used instead of total coliform to derive a bacteriological effluent limitation by the method specified by Section III.C of the Ocean Plan, consistent with U.S. EPA recommendations, and further comments that this change would not violate the anti-backsliding prohibition.

# Response 36.

We agree that the bacteriological effluent limitation should be based on enterococcus bacteria rather than total coliform, consistent with U.S. EPA recommendations. Further, we have deleted the reference to the Beneficial Uses Survey/Dilution Study in this section. Section IV.B.8 has been revised to read as follows:

8. Total Coliform Bacteria Effluent Limitations. In 2004, USEPA recommended that enterococcus bacteria be used in lieu of total coliform bacteria for bacteriological limitations in marine waters because it had been shown to be a good indicator of gastrointestinal illness in marine waters. In accordance with this recommendation, and with USEPA comments on this Order, limitations on total coliform bacteria from Order No. 00-017 are retained replaced by limitations on enterococcus bacteria. The new water quality based enterococcus limitation replaces the previous performance-based total coliform limitation. See section IV.C.7, below.

However, the total coliform bacteria effluent limitation is suspended during the Beneficial Uses Survey/Dilution Study Period described in this Order, Section VI.C.5 (Other Special Provisions).

Section IV.C.7 has been added as follows:

#### 7. Bacteria Effluent Limitations

The effluent limitations for bacteria are based on the Ocean Plan water quality objectives, specifically the 30-day geometric mean enterococcus density shall not exceed 35 per 100 ml and the single sample maximum shall not exceed 104 per 100 ml. Using the equation, Ce = Co + Dm (Cs - Cs), to account for dilution, effluent limitations for enterococcus are calculated as follows:

30-day geometric mean:	Ce = 35 + 70 (35 - 0.0) = 2,500  per  100  ml
Single sample maximum:	Ce = 104 + 70 (104 - 0.0) = 7,400  per  100  ml

Fact Sheet Section IV.B.5, Total Chlorine Residual, has been revised due to the removal of the Beneficial Uses Survey/Dilution Study provision from the Order and now reads as follows:

5. **Total Chlorine Residual.** An effluent limitation for chlorine was not included in Order No. 00-017. A limitation is included in this Order based on Ocean Plan implementing provisions in Section III. See section IV.C.6, below. However, the effluent limitation for chlorine is suspended during the Beneficial Uses

Survey/Dilution Study Period described in this Order, Section VI.C.5 (Other Special Provisions).

# NSMCSD Comment 37.

NSMCSD comments on Fact Sheet Table 6, Summary of Effluent Limitations, that because the TCR limitation is not included on the table, and there are no mass effluent limitations in the permit for any other pollutants, Footnote 1 is not needed. NSMCSD also reiterates their concern about the application of TCR mass limitations calculated based on peak dry-weather flow being applied to wet-weather events and requests specific clarification.

# Response 37.

The TCR limitation was intended to be included in Table 6 of the Fact Sheet. We have revised Table 6 of the Fact Sheet as follows:

**Table 6. Summary of Effluent Limitations** 

		Effluent Limitations					
Parameter	Units	Average Monthly	Average Weekly	Average Daily	6-month Median	Maximum Daily	Instantaneous Maximum
Carbonaceous Biochemical Oxygen Demand 5- day @ 20°C	mg/L	25	40	50			
Total Suspended Solids	mg/L	30	45	60		1	
Oil and Grease	mg/L	25	40				75
Settleable Solids	ml/L	1.0	1.5				3.0
Turbidity	NTU	75	100				225
Total Chlorine Residual [1]	mg/L				0.14	0.57	4.3
	kg/day				<u>4.2</u>	<u>17</u>	
Chronic Toxicity [2]	$TU_c$					71	

<sup>[1]</sup> Mass emission limitations are based on a peak dry weather capacity of 8 mgd, and apply only during dry-weather months. Weekly and monthly mass effluent limitations shall be calculated by averaging the reported daily values over the relevant number of days for the monitoring interval.

## [2] Expressed as Chronic Toxicity Units (TUc)

 $TU_c = 100/NOEC$  where:

NOEC (No Observed Effect Concentration) is expressed as the maximum percent effluent or receiving water that causes no observable effect on the test organism as determined by the result of a critical life state toxicity test listed in Appendix III of the Ocean Plan (2005) adopted and effective February 14, 2006.

As noted previously, the mass limitation for residual chlorine is applicable only during dryweather months. A note to this effect has been added in Footnote 1 above.

#### NSMCSD Comment 38.

NSMCSD requests revision of Fact Sheet Section IV.B.8.c, Total Coliform Bacteria, changing total coliform bacteria to enterococcus and specifying a water-quality based calculation of the bacteriological effluent limitation per U.S. EPA guidance, similar to Comment 12.

# Response 38.

We have revised the total coliform bacteria parameter to enterococcus bacteria. The paragraph discussing suspension of the effluent limitation has been deleted as no study is included in the Order. A water-quality based calculation of the enterococcus bacteria effluent limitation is added, consistent with U.S. EPA comments. We revised the text as described in the response to NSMCSD comment 35.

#### NSMCSD Comment 39.

NSMCSD requests revision of Fact Sheet Section IV.B.8.d, Interim Effluent Limitations, similar to Comment 13 on the corresponding section in the main body of the TO.

#### Response 39.

Please see Response 13.

# NSMCSD Comment 40.

NSMCSD requests removal of bold text from Fact Sheet Table 7, Reasonable Potential Analysis.

## Response 40.

We have accepted the revision.

#### NSMCSD Comment 41.

NSMCSD requests clarification of the applicability of the TCR mass limitation, calculated based on peak dry-weather flow, to discharges during wet-weather periods in Fact Sheet Section IV.C.4, WQBEL Calculations. NSMCSD also requests a revision to the last paragraph of Section IV.C.4 specifying that mass emission limitations are required for pollutants with water quality objectives in Table B of the Ocean Plan.

# Response 41.

As stated in previous responses, the TCR mass limitation now applies only during dry-weather months. We have made the revision to the last paragraph of Section IV.C.4 as follows:

A mass emission limitation, as required by the Ocean Plan for Table B Water Quality Objectives, is also calculated in this Order using a peak dry weather capacity of 8 mgd and a conversion factor of 3.78:

#### NSMCSD Comment 42.

NSMCSD requests revision of Fact Sheet Section IV.C.6, Total Chlorine Residual, as follows:

a. Correct the number used for the calculation for the instantaneous maximum Total Chlorine Residual limitation to 60 mg/L (end values do not change). The applicability of mass limitations to discharge during wet weather events is unclear. Based on the equation, and using a worst case scenario, any time the plant flow is above 8 mgd and a

chlorine residual occurred that was roughly at the limitation, the mass limitations would be exceeded.

- b. Edit for clarity.
- c. Because the chlorine limitation is suspended, the Fact Sheet needs to provide an appropriate justification.

# Response 42.

- a We have revised the TO as requested.
- b We have revised the TO as requested.
- c As the Beneficial Uses Survey/Dilution Study has been deleted from the TO, there is no need to suspend the TCR effluent limitation. Therefore, we have deleted the paragraph relating to the suspended TCR effluent limitation.

We have revised this section as follows:

#### 6. Total Chlorine Residual

The effluent limitations for TCR are based on the following Ocean Plan water quality objectives:

Pollutant	Units	6-month	Daily	Instantaneous
		Median	Maximum	Maximum
Total Chlorine Residual	μg/L	2	8	60

Using the equation, Ce = Co + Dm (Cs - Cs), effluent limitations for TCR are calculated:

6-month median:  $Ce = 2 + 70 \ (2 - 0.0) = 142 \ \mu g/L \ (0.14 \ mg/L)$  Daily maximum:  $Ce = 8 + 70 \ (8 - 0.0) = 568 \ \mu g/L \ (0.57 \ mg/L)$  Instantaneous maximum:  $Ce = 2\underline{60} + 70 \ (2\underline{60} - 0.0) = 4260 \ \mu g/L \ (4.3 \ mg/L)$ 

Mass emission limitations, as required by the Ocean Plan for Table B Water Quality Objectives, are also included in this Order, and are calculated using a peak dry weather capacity of 8 mgd and a conversion factor of 3.78:

6-month median: 0.14 mg/L \* 8.0 mgd \* 3.78 = 4.2 kg/dayDaily maximum: 0.57 mg/L \* 8.0 mgd \* 3.78 = 17 kg/day

The concentration and mass limitations for TCR are being suspended in the Order to allow the Discharger to conduct a Beneficial Uses Survey/Dilution Study. As part of the Beneficial Uses Survey and Dilution Study, the Discharger will not disinfect the effluent with chlorine. Because chlorine will not be used during this period, there is no need to maintain a chlorine residual effluent limitation.

# NSMCSD Comment 43.

NSMCSD comments on the Fact Sheet, Section V.A.1, Receiving Water Limitations, V.A.1 through V.A.15, that there are 18 receiving water limitations in the order rather than 15. The

title of Section V.A.1 of the Fact Sheet should therefore be revised to "Receiving Water Limitations V.A.1 through V.A.18".

## Response 43.

We have made the requested revision.

## NSMCSD Comment 44.

NSMCSD requests that Fact Sheet Section VI.B.1, Effluent Monitoring, be revised to state that total coliform bacteria monitoring has been replaced by enterococcus bacteria monitoring.

#### Response 44.

Fact Sheet Section VI.B.1 has been revised to read as follows:

6. Effluent monitoring requirements for the following pollutants are retained from the previous Order: flow, CBOD<sub>5</sub>, TSS, settleable solids, oil and grease, turbidity, ammonia nitrogen, and sulfides, and total coliform bacteria. Effluent monitoring for total coliform bacteria has been replaced by effluent monitoring for enterococcus bacteria, with the effluent limitation calculated by Ocean Plan procedures for waterquality based effluent limitations, and based on the Ocean Plan receiving water enterococcus bacteria limitation, per USEPA recommendations.

# NSMCSD Comment 45.

NSMCSD requests revision of the receiving water monitoring stations listed in Fact Sheet Section VI.D, Receiving Water Monitoring, to be consistent with the MRP (Comments 24 and 30).

#### Response 45.

See responses to NSMCSD comments 24 and 30.

#### NSMCSD Comment 46.

NSMCSD requests revision of Fact Sheet Section VII.B.5, Other Special Provisions, for editorial reasons and to maintain Regional Water Board flexibility to amend permit conditions based on the results of the Beneficial Uses/Dilution Study. NSMCSD believes the language currently used would allow the Regional Water Board to amend only the effluent limitations.

#### Response 46.

Section VII.B.5 has been revised, removing the Beneficial Uses Survey/Dilution Study text because one is not necessary to establish a point of compliance and dilution factor for bacteriological standards; and inserting a provision for the Discharger to verify and document the 70:1 dilution ration, as noted in the response to NSMCSD Comment 11.

#### NSMCSD Comment 47.

NSMCSD requests deletion of the August 6, 2001 Regional Water Board Staff Letter listed in Attachment G, Regional Board Attachments, from the list of documents incorporated in the TO on the grounds that it does not apply to ocean dischargers.

## Response 47.

We agree with the Discharger's comment and have deleted the August 6, 2001 letter from the list of Regional Water Board Attachments.

# II. United States Environmental Protection Agency (U.S. EPA)

Below are the responses to the three U.S. EPA comments on NSMCSD's TO. U.S. EPA's main concerns are related to bacteriological indicator limitations and compliance schedules.

#### U.S. EPA Comment 1.

<u>Bacteriological Indicator Limitations:</u> Because the Regional Board's Basin Plan designates REC-1 beneficial uses for the State waters of the Pacific Ocean, the Ocean Plan numeric objectives apply at the point of discharge for the North San Mateo County Sanitation District outfall. Therefore, U.S. EPA believes it is appropriate to calculate an effluent limitation based on the numeric objectives. We recommend the use of the enterococcus objective to derive limitations, as enterococcus has been shown to be a good indicator of gastrointestinal illness for marine waters.

The draft permit as written contains total coliform limitations (2,400 MPN/100 ml and 24,000 MPN/100 ml), but explains only that these numbers were carried over from the previous permit, and provides no information regarding the technical basis for the limitations. The draft permit then proposes to suspend this limitation for the duration of a study, and to put in place interim receiving water limitations. The proposed receiving water limitations are based on an out-dated version of the Ocean Plan, and as written, would not be enforceable because the monitoring and reporting program does not require data collection to determine compliance. For the above reasons, U.S. EPA does not support the permit limitations as proposed in the draft permit.

Response 1. We appreciate U.S. EPA's guidance on the appropriateness of calculating bacterial effluent limitations based on receiving water standards, and the use of the enterococcus receiving water standard to derive effluent limitations. The text of the TO at Section IV.A.1, Final Effluent Limitations – Discharge Point 001, and at Fact Sheet Section IV.B8, Bacteria Effluent Limitations, has been revised to replace the performance-based total coliform bacteria limitations with the following enterococcus bacteria effluent limitations: a geometric mean not greater than 2,500 MPN/100 ml and a single sample maximum of not greater than 7,400 MPN/100 ml. As stated in the responses to NSMCSD's comments, the previously proposed study has been deleted from the Order.

#### U.S. EPA Comment 2.

Compliance Schedule for Heptachlor: Page 23 of the fact sheet states "the Ocean Plan allows for the establishment of time schedules for compliance with its requirements, but because the Basin Plan's provisions for the establishment of compliance schedules are more prescriptive, those provisions are applied in this Order." U.S. EPA asks that we explain the basis for the statement that the Ocean Plan allows compliance schedules, as the Ocean Plan does not appear to contain a compliance schedule provision. Additionally, U.S. EPA asserts that the Basin Plan is not applicable to this discharge, and that a compliance schedule cannot be granted.

## Response to Comment 2.

The Ocean Plan, in Section III.F, Revision of Waste Discharge Requirements, item 1, states:

The Regional Board shall revise the waste discharge requirements for existing discharges as necessary to achieve compliance with this Plan and shall also establish a time schedule for such compliance.

This is the basis for the statement that the Ocean Plan allows time schedules for compliance. (U.S. EPA is correct to point out that specific guidance for establishing compliance schedules does not exist in the Ocean Plan.) Because the finding of Reasonable Potential for heptachlor results from the more stringent water quality objective established by the 2005 Ocean Plan, we believe this provision clearly applies and authorizes the establishment of a time schedule for compliance with the calculated effluent limitation for heptachlor.

The Basin Plan covers all the Region's waters, making specific reference to the Pacific Ocean and the Ocean Plan. In addition, the NSMCSD wastewater treatment plant is listed in Table 4-9 of the Basin Plan as a municipal wastewater treatment facility discharging directly to a surface water, and its discharge point in the Pacific Ocean is shown on Figure 4-1, along with those of two other municipal wastewater treatment facilities (Sewer Authority Mid-Coastside and San Francisco Oceanside). Therefore, the Basin Plan applies to this discharge, and it is reasonable to apply the Basin Plan's compliance provision to this discharge where specific direction is not found in the Ocean Plan.

#### U.S. EPA Comment 3.

<u>Sanitary Sewer Overflows Language:</u> Section VI.C.4.b, regarding the Sanitary Sewer Overflows and Sewer System Management Plan, should be amended to include the new standard language incorporated into the permits adopted by the Board in August.

## Response 3.

We have amended Section VI.C.4.b accordingly. See the response to NSMCSD Comment 20.

## **III Editorial Changes**

- E.1 We corrected the title of Table 6, Effluent Limitations, to Table 7, Effluent Limitations.
- E.2 Total coliform bacteria and enterococcus bacteria were inadvertently omitted from MRP Table 5, Receiving Water Monitoring Requirements. We have added total coliform bacteria and enterococcus bacteria.
- E.3 Total chlorine residual was inadvertently omitted from Fact Sheet Table 6, Summary of Effluent Limitations. We have added total chlorine residual added to table.