ATTACHMENT B – NOI SAMPLING REQUIREMENTS AND SCREENING LEVELS

I. INSTRUCTIONS

This Attachment contains listings of the parameters Dischargers are to analyze as part of their application for coverage under this General Board Order. The sampling requirements that are applicable to all low threat discharges are presented in section II below, in Tables B-2 through B-4. The sampling requirements applicable to low threat discharges from water system-related activities and other low threat discharge activities are presented in section III below, in Table B-5 though B-6. The sampling requirements applicable to low threat discharges to specific waterbodies follow in section IV, in Tables B-7 through B-10.

The Discharger shall compare the results of all analyses to the corresponding screening levels in Tables B-2 to B-10, and submit them with the completed Notice of Intent (NOI). Any analyses performed for parameters without screening levels shall also be submitted to the Regional Water Quality Control Board (Regional Water Board) with the completed NOI.

The rationale for the screening levels in Tables B-2 through B-10 is provided in section IV.C.3.c. of the Fact Sheet (Attachment F) of this General Board Order. Table B-1 below provides an overview of the parameters to be analyzed as part of the application package.

Table B-1. Overview of Sampling Requirements

Attachment B Table	Parameter(s) Covered[1]	Sampling Location[2]	Screening Levels Included in Table?
Table B-2	Priority Pollutants	EFF-001	Yes
Table B-3	Hardness-dependent Priority Pollutant Metals	EFF-001[3]	Yes
Table B-4	TSS, Oil and Grease, pH, Total Dissolved Solids, Total Petroleum Hydrocarbons and Hardness	EFF-001 and RSW-001[3]	Yes
Table B-5	Total Residual Chlorine	EFF-001	Yes
Table B-6	Hydrostatic Test Water	EFF-001	Yes
Table B-7	Any 303(d) Listed Parameters[4]	EFF-001	No
Tables B-8 & B-9	*Eschericia coli* (E. coli)	EFF-001	Yes
Table-B-10	E. coli, enterococci, fecal coliform organisms, and total suspended solids	EFF-001	Yes

Attachment B Table	Parameter(s) Covered[1]	Sampling Location[2]	Screening Levels Included in Table?

[1] The sampling requirements in terms of the parameters covered apply to all designated beneficial uses unless otherwise specified. MUN designated waters pertain to those receiving waters designated for municipal and domestic water supply, and Non-MUN designated waters pertain to those receiving waters designated for one or more of the other use categories. *Consult section III.H of the General Board Order for further information concerning designated use categories.*

[2] EFF-001 = A location where a representative sample of the effluent can be collected prior to joining the receiving water.
RSW-001 = Immediately upstream of the discharge point to obtain a representative sample of the background conditions of the upstream flow.
RSW-002 = Downstream of the discharge point to obtain a representative sample of the combined flow.

[3] Several of the priority pollutant metals are hardness dependent and require that a sample of the receiving water be analyzed for hardness.

[4] If the proposed receiving water is listed as impaired by any parameter on the state's latest Clean Water Act section 303(d) List, then the Discharger shall analyze for the offending parameter(s). Consult the following Web site for the latest section 303(d) list:
http://www.swrcb.ca.gov/water_issues/programs/tmdl/303d_lists2006_epa.shtml.

Dischargers shall analyze all applicable pollutants in this Attachment in accordance with the analytical methods and other requirements specified in Part 136 of Title 40 of the *Code of Federal Regulations (CFR)* and in accordance with section I of the Monitoring and Reporting Program (Attachment E) of this General Board Order.

For priority pollutant constituents with applicable water quality criteria, detection limits shall be below the screening level. If the lowest minimum level (ML) published in Appendix 4 of the *Policy for Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California* (State Implementation Plan or SIP) is not below the screening level, the detection limit shall be the lowest ML.

Detection for the purposes of the priority pollutants with applicable water quality criteria means a sample result that is greater than or equal to the detection limit. Sample results less than the ML, but greater than or equal to the detection limit, shall be reported as "Detected, but Not Quantified," or DNQ. The estimated chemical concentration of the sample shall also be reported, and shall be used to compare to the applicable screening level for purposes of determining whether effluent limitations are necessary.

II. ANALYSES REQUIRED OF ALL DISCHARGERS

A. Priority Pollutants. All Dischargers seeking authorization to discharge under this General Board Order shall sample and analyze the proposed effluent for the priority pollutants contained in Tables B-2 and B-3, except those dischargers approved for a categorical exception as authorized by section 5.3 of the SIP. The results of the analyses shall be compared to the corresponding screening levels and shall be submitted as part of the NOI. Dischargers of wastewater from water system-related activities may submit the summary results of monitoring for applicable parameters reported in their annual Consumer Confidence Report as required by Title 22, Division 4, Chapter 15, Article 20 of the California Code of Regulations to satisfy the sampling requirements contained in Tables B-2 and/or B-3. Dischargers of wastewater from water system-related activities

that have been granted a waiver for the monitoring requirements contained in Title 22, Division 4, Chapter 15 of the California Code of Regulations from the California Department of Public Health, Division of Drinking Water and Environmental Management are exempt from the sampling requirements for the applicable parameter(s) or test methods contained in Tables B-2 and/or B-3. A copy of the waiver must be submitted with the NOI.

Table B-2. Screening Levels for Priority Pollutants

Parameter	Screening Levels[1,2]	
	MUN Designated Waters (µg/L)[3]	Non-MUN Designated Waters (µg/L)[3]
Metals and Other Compounds		
Antimony, Total Recoverable	14	4,300
Arsenic, Total Recoverable	150	150
Beryllium, Total Recoverable	[4]	[4]
Cadmium, Total Recoverable	*See Table B-3*	
Chromium (III)	*See Table B-3*	
Chromium (VI)	11	11
Copper, Total Recoverable	*See Table B-3*	
Lead, Total Recoverable	*See Table B-3*	
Mercury, Total Recoverable	0.050	0.051
Nickel, Total Recoverable	*See Table B-3*	
Selenium, Total Recoverable	5.0	5.0
Silver, Total Recoverable	*See Table B-3*	
Thallium, Total Recoverable	1.7	6.3
Zinc, Total Recoverable	*See Table B-3*	
Cyanide, Free (as CN)	5.2	5.2
Asbestos	7 MFL [5]	[4]
2,3,7,8-TCDD	1.3×10^{-8}	1.4×10^{-8}
Volatile Organic Compounds		
Acrolein	320	780
Acrylonitrile	0.059	0.66
Benzene	1.2	71
Bromoform	4.3	360
Carbon Tetrachloride	0.25	4.4
Chlorobenzene	680	21,000
Chlorodibromomethane	0.41	34
Chloroethane	[4]	[4]
2-Chloroethylvinyl ether	[4]	[4]

Parameter	Screening Levels[1,2]	
	MUN Designated Waters (µg/L)[3]	Non-MUN Designated Waters (µg/L)[3]
Chloroform	[4]	[4]
Dichlorobromomethane	0.56	46
1,1-Dichloroethane	[4]	[4]
1,2-Dichloroethane	0.38	99
1,1-Dichloroethylene	0.057	3.2
1,2-Trans-Dichloroethylene	700	140,000
1,2-Dichloropropane	0.52	39
1,3-Dichloropropylene	10	1,700
Ethylbenzene	3,100	29,000
Methyl Bromide	48	4,000
Methyl Chloride	[4]	[4]
Methylene Chloride	4.7	1,600
1,1,2,2-Tetrachloroethane	0.17	11
Tetrachloroethylene	0.8	8.85
Toluene	6,800	200,000
1,1,1-Trichloroethane	[4]	[4]
1,1,2-Trichloroethane	0.6	42
Trichloroethylene	2.7	81
Vinyl Chloride	2	525
Acid Extractible Compounds		
3-Methyl-4-Chlorophenol	[4]	[4]
2-Chlorophenol	120	400
2,4-Dichlorophenol	93	790
2,4-Dimethylphenol	540	2,300
2-Methyl-4,6-Dinitrophenol	13.4	765
2,4-Dinitrophenol	70	14,000
2-Nitrophenol	[4]	[4]
4-Nitrophenol	[4]	[4]
Pentachlorophenol	0.28	8.2
Phenol	21,000	4,600,000
2,4,6-Trichlorophenol	2.1	6.5
Base Neutral Compounds		
Acenaphthene	1,200	2,700
Acenaphthylene	[4]	[4]
Anthracene	9,600	110,000

Parameter	Screening Levels[1,2]	
	MUN Designated Waters (µg/L)[3]	Non-MUN Designated Waters (µg/L)[3]
Benzidine	0.00012	0.00054
Benzo(a)Anthracene	0.0044	0.049
Benzo(a)Pyrene	0.0044	0.049
Benzo(b)Fluoranthene	0.0044	0.049
Benzo(ghi)Perylene	[4]	[4]
Benzo(k)Fluoranthene	0.0044	0.049
Bis(2-chloroethoxyl)Methane	[4]	[4]
Bis(2-Chloroethyl)Ether	0.031	1.4
Bis(2-Chloroisopropyl)Ether	1,400	170,000
Bis(2-Ethylhexyl)Phthalate	1.8	5.9
4-Bromophenyl Phenyl Ether	[4]	[4]
Butylbenzyl Phthalate	3,000	5,200
2-Chloronaphthalene	1,700	4,300
4-Chlorophenyl Phenyl Ether	[4]	[4]
Chrysene	0.0044	0.049
Dibenzo(a,h)Anthracene	0.0044	0.049
1,2-Dichlorobenzene	2,700	17,000
1,3-Dichlorobenzene	400	2,600
1,4-Dichlorobenzene	400	2,600
3,3'-Dichlorobenzene	0.04	0.077
Diethyl Phthalate	23,000	120,000
Dimethyl Phthalate	313,000	2,900,000
di-n-Butyl Phthalate	2,700	12,000
2,4-Dinitrotoluene	0.11	9.1
2,6-Dinitrotoluene	[4]	[4]
1,2-Diphenylhydrazine	0.040	0.54
Di-n-Octyl Phthalate	[4]	[4]
Fluoranthene	300	370
Fluorene	1,300	14,000
Hexachlorobenzene	0.00075	0.00077
Hexachlorobutadiene	0.44	50
Hexachlorocyclopentadiene	240	17,000
Hexachloroethane	1.9	8.9
Indeno(1,2,3-cd)Pyrene	0.0044	0.049
Isophorone	8.4	600
Naphthalene	[4]	[4]

Parameter	Screening Levels[1,2]	
	MUN Designated Waters (µg/L)[3]	Non-MUN Designated Waters (µg/L)[3]
Nitrobenzene	17	1,900
N-Nitrosodimethylamine	0.00069	8.1
N-Nitrosodi-n-propylamine	0.005	1.4
N-Nitrosodiphenylamine	5.0	16
Phenanthrene	[4]	[4]
Pyrene	960	11,000
1,2,4-Trichlorobenzene	[4]	[4]
Pesticides		
Aldrin	0.00013	0.00014
alpha-BHC	0.0039	0.013
beta-BHC	0.014	0.046
delta-BHC	[4]	[4]
gamma-BHC	0.019	0.063
Chlordane	0.00057	0.00059
4,4'-DDT	0.00059	0.00059
4,4'-DDE	0.00059	0.00059
4,4'-DDD	0.00083	0.00084
Dieldrin	0.00014	0.00014
alpha-Endosulfan	0.056	0.056
beta-Endosulfan	0.056	0.056
Endosulfan Sulfate	110	240
Endrin	0.036	0.036
Endrin Aldehyde	0.76	0.81
Heptachlor	0.00021	0.00021
Heptachlor Epoxide	0.00010	0.00011
PCBs, sum of [6]	0.00017	0.00017
Toxaphene	0.0002	0.0002

Parameter	Screening Levels[1,2]	
	MUN Designated Waters (µg/L)[3]	Non-MUN Designated Waters (µg/L)[3]

[1] Dischargers approved for a categorical exception for meeting the priority pollutant criteria/objectives as authorized by section 5.3 of the SIP are not required to perform wastewater sampling for priority pollutants contained in Table B-2 and B-3.

[2] The screening levels for MUN designated waters were established based on the California Toxics Rule (CTR) criteria for the protection of freshwater aquatic life or for the protection of human health for consumption of water and organisms, whichever was the most stringent. The screening levels for Non-MUN designated waters were established based on CTR criteria for the protection of freshwater aquatic life or CTR criteria for the protection of human health for the consumption of organisms only, whichever was the most stringent.

[3] µg/L = micrograms per liter

[4] Priority pollutants for which no applicable CTR criteria for the protection of human health or aquatic life exist include asbestos (non-MUN only), beryllium, chloroethane, 2-chloroethylvinyl ether, chloroform, 1,1-dichloroethane, methyl chloride, 1,1,1-trichloroethane, 2-nitrophenol, 4-nitrophenol, 3-methyl-4-chlorophenol, acenaphthylene, benzo(ghi)perylene, bis(2-chloroethoxy)methane, 4-bromophenyl phenyl ether, 4-chlorophenyl phenyl ether, 2,6-dinitrotoluene, di-n-octyl phthalate, naphthalene, phenanthrene, 1,2,4-trichlorobenzene, delta-BHC, and asbestos (non-MUN only). Therefore, screening levels for those parameters have not been established and analysis for these parameters is not required.

[5] MFL = million fibers per liter

[6] The screening level applies to the sum of Aroclors 1242, 1254, 1221, 1232, 1248, 1280, and 1016.

Table B-3. Screening Levels for Hardness-Dependent Priority Pollutant Metals

Parameter	Units	Hardness in mg/L (H)[3]			
		H < 200	200 ≤ H < 300	300 ≤ H < 400	400 ≤ H
		Screening Level[1,2]	Screening Level[1,2]	Screening Level[1,2]	Screening Level[1,2]
Cadmium, Total Recoverable	µg/L	2.5	5.1	6.6	7.3
Chromium (III)	µg/L	207	438	577	644
Copper, Total Recoverable	µg/L	9.3	20	27	31
Lead, Total Recoverable	µg/L	3.2	10	16	19
Nickel, Total Recoverable	µg/L	52	113	151	169
Silver, Total Recoverable	µg/L	4.1	20	35	44
Zinc, Total Recoverable	µg/L	120	260	346	388

[1] Dischargers approved for a categorical exception for meeting the priority pollutant criteria/objectives as authorized by section 5.3 of the SIP are not required to perform wastewater sampling for priority pollutants and hardness contained in Table B-2 and B-3.

[2] The screening levels apply to discharges to both MUN and non-MUN waters and were established based on the CTR criteria for the protection of freshwater aquatic life, which are more stringent than CTR criteria for both the protection of human health for consumption of water and organisms and protection of human health for the consumption of organisms only.

[3] Dischargers shall also analyze the effluent and the receiving water for hardness.

B. TSS, Oil and Grease, pH, Total Dissolved Solids, Total Petroleum Hydrocarbons and Hardness. All Dischargers seeking authorization to discharge under this General Board Order shall sample and analyze a representative effluent sample for the constituents identified in Table B-4. The results of the analyses shall be submitted with the completed NOI.

Table B-4. Screening Levels for TSS, Oil and Grease, pH, and Total Petroleum Hydrocarbons

Parameter	Units	Screening Level
Total Suspended Solids (TSS)[1]	mg/L	95
Oil and Grease[1]	mg/L	25
pH[1]	standard units	Range 6 -9
Total Petroleum Hydrocarbons[1,2]	mg/L	0.1

[1] Not applicable to discharges from established water supply systems where parameter is not expected to exceed screening level.

[2] Applies only to dewatering/discharge operations near suspected petroleum hydrocarbon contaminated sites or when diesel or gasoline powered generator is used in dewatering/discharge operations.

III. ANALYSES REQUIRED FOR DISCHARGES FROM WATER SYSTEM-RELATED ACTIVITIES AND OTHER LOW THREAT DISCHARGE ACTIVITIES

A. Total Residual Chlorine. All Dischargers of wastewater from water system-related activities and other low threat discharge activities seeking authorization to discharge under this General Board Order shall sample and analyze a representative effluent sample for total residual chlorine or dechlorinating agent and compare the result to the screening level contained in Table B-5 below. Dischargers of wastewater from dewatering activities and groundwater extraction activities that do not add or use chlorine in the discharge are not required to sample for total residual chlorine.

Table B-5 Screening Level for Total Residual Chlorine

Parameter	Units	Screening Level
Chlorine, Total Residual	mg/L	0.011[1]

[1] Total residual chlorine shall be analyzed with a method sensitive to and accurate at a reporting level of 0.08 mg/L, or any more stringent reporting level included in a final statewide policy or standard for total residual chlorine. Any excursion above the screening level and greater than or equal to a reporting level of 0.08 mg/L or a future reporting level included in a statewide policy adopted by the State Water Board shall be considered an exceedance of the screening level.

IV. ANALYSES REQUIRED FOR HYDROSTATIC TEST WATER DISCHARGES

A. Hydrostatic Water Discharges. All Dischargers of wastewater from hydrostatic test water discharges shall sample and analyze a representative effluent sample and compare the results to the screening level contained in Table B-6 below. Dischargers of

wastewater that do not add or have chlorine in the discharge are not required to sample for total residual chlorine.

Table B-6 Screening Level for Hydrostatic Test Water Discharges

Parameter	Units	Screening Level
Suspended Solids, Total	mg/L	95
BOD_5 @ 20˚ C or $CBOD_5$ @ 20˚ C	mg/L	55 for BOD_5 or 50 for $CBOD_5$
Oil and Grease	mg/L	25
Turbidity	NTU	75
Settleable Solids	ml/L	0.2
Chlorine, Total Residual	mg/L	0.011[1]

[1] Total residual chlorine shall be analyzed with a method sensitive to and accurate at a reporting level of 0.08 mg/L, or any more stringent reporting level included in a final statewide policy or standard for total residual chlorine. Any excursion above the screening level and greater than or equal to a reporting level of 0.08 mg/L or a future reporting level included in a statewide policy adopted by the State Water Board shall be considered an exceedance of the screening level.

V. ANALYSES REQUIRED FOR DISCHARGES TO SPECIFIC WATERBODIES AND WATERBODIES WITH SPECIFIC DESIGNATED USES

A. Section 303(d) Parameters. If the proposed receiving water is listed as impaired on the latest Clean Water Act section 303(d) List, the Discharger shall analyze a representative sample of the discharge for the parameter(s) causing the impairment and submit the results with the completed NOI. The latest section 303(d) List may be found at http://www.swrcb.ca.gov/water_issues/programs/tmdl/303d_lists2006_epa.shtml. The 2006 section 303(d) List for the Colorado River Basin includes the following impaired waters:

Table B-7. 2006 Section 303(d) Parameters

Impaired Waterbody	Parameter
Alamo River	Chlorpyrifos, DDT, dieldrin, polychlorinated biphenyls (PCBs), selenium, and toxaphene
Coachella Valley Storm Water Channel (CVSWC)[1]	Pathogens, toxaphene
Colorado River (Imperial Reservoir to California-Mexico Border)	Selenium
Imperial Valley Drains	DDT, dieldrin, endosulfan, PCBs, selenium, toxaphene
New River (Imperial County)	1,2,4-Trimethylbenzene, chlordane, chloroform, chlorpyrifos, copper, DDT, diazinon, dieldrin, mercury, meta-para xylenes, nutrients, organic enrichment/low dissolved oxygen, o-xylenes, PCBs, p-cymene, p-dichlorobenzene/DCB, pesticides, selenium, toluene, toxaphene, toxicity, and trash

[1] See Region 7 Basin Plan for applicable segments of the CVSWC.

Impaired Waterbody	Parameter
Palo Verde Outfall Drain and Lagoon	DDT and pathogens
Salton Sea	Nutrients, salinity, and selenium

B. Waterbody or Designated Use-Specific Analyses. The *Water Quality Control Plan, Colorado River Basin* (the Basin Plan) establishes receiving water limitations for the discharge of certain pollutants to specific waterbodies. Dischargers proposing to discharge low threat wastewater under this General Board Order to waterbodies designated as REC-I or REC-II, segments of the Colorado River designated as REC-I or REC-II, or the New River shall analyze a representative sample of the effluent for the parameters indicated in Tables B-8 through B-10 below, as applicable, and compare the results to the screening levels noted. The Discharger shall submit the results of all analyses performed with the completed NOI.

Table B-8. Screening Level for E. coli for Discharges to Waterbodies Designated as REC-I and Segments of the Colorado River Designated as REC-I

Parameter	Units	Screening Level
Escherichia coli (E. coli)	MPN/100 mL	126

Table B-9. Screening Level for E. coli for Discharges to Waterbodies Designated as REC-II and Segments of the Colorado River Designated as REC-II

Parameter	Units	Screening Level
E. coli	MPN/100 mL	630

Table B-10. Screening Level for E. coli, Enterococci, Fecal Coliform Organisms, and Total Suspended Solids for Discharges to the New River

Parameter	Units	Screening Level
E. coli	MPN/100 mL	126
Enterococci	MPN/100 mL	33
Fecal Coliform Organisms	MPN/100 mL	200
Total Suspended Solids	mg/L	95[1]

[1] The TSS effluent limitation of 95 mg/L for TSS from hydrostatic test water discharges is more stringent and shall be in effect