

# SAN FRANCISCO REGIONAL WATER AGENCY PARTNERS

June 23, 2014

Mr. Bruce Wolfe  
Executive Officer  
California Regional Water Quality Control Board  
San Francisco Bay Region  
1515 Clay Street, Suite 1400  
Oakland, CA 94612

Attention: Ms. Susan Glendening

Via E-mail: [SGlendening@waterboards.ca.gov](mailto:SGlendening@waterboards.ca.gov)

SUBJECT: Comment Submittal – San Francisco Regional Water Quality Control Board’s General Waste Discharge Requirements for Discharges of Water from Drinking Water Supply Distribution, Transmission and Groundwater Systems

Dear Mr. Wolfe:

On behalf of the San Francisco Regional Water Agency Partners (Agencies) comprised of the East Bay Municipal Utility District (EBMUD), Alameda County Water District (ACWD), California Water Service Company (Cal Water), Contra Costa Water District (CCWD), Marin Municipal Water District (MMWD), San Francisco Public Utilities Commission (SFPUC), San Jose Water Company (SJWC), and Zone 7 Water Agency (Zone 7) we respectfully submit these comments for your consideration on the San Francisco Regional Water Quality Control Board’s (SFRWQCB) General Waste Discharge Requirements for Discharges of Water from Drinking Water Supply Distribution, Transmission and Groundwater Systems (Tentative Order).

The Agencies support a practical permit that is protective of water quality and that provides regulatory clarity and the standardization of compliance practices across the San Francisco Bay Region for these de minimis low threat discharges. As you are aware, the Agencies have been actively engaged in obtaining a clear regulatory framework for de minimis drinking water discharges and have supported this effort both technically and financially for the last two plus years. The Agencies appreciate the efforts of SFRWQCB staff to work collaboratively on the framework. The Agencies believe that these comments and recommendations will improve the Tentative Order by reducing costs of compliance while maintaining protection of water quality in the region (consistent with the intent of State Water Board Resolution No. 2013-0029) and will help to facilitate consistent and implementable industry standard best management practices for water utilities.

The Agencies also look forward to continuing to work collaboratively with the SFRWQCB as the State Water Resources Control Board (SWRCB) Draft Permit for Drinking Water System Discharges to Surface Waters moves forward. The Agencies support this statewide effort and understand that the SFRWQB Tentative Order will be placed on hold upon conclusion of the comment period. The Agencies request that if this Tentative Order is calendared for adoption by the SFRWQB at a later date, the SFRWQB will allow for another public comment period to capture new recommendations that emerge during the development of the statewide permit.

## **COMMENTS AND RECOMMENDATIONS**

### **1.DE MINIMIS DISCHARGES**

Drinking water system releases are critical and essential public service activities that must be performed in order to maintain and meet drinking water quality standards and system reliability requirements. As you are likely aware, potable water system discharges have already been defined by the SWRCB as “de minimis” and “not likely to cause or have a reasonable potential to cause or contribute to an adverse impact on the beneficial uses of receiving waters.” This definition is codified in the California Code of Regulations (CCR Title 23 Division 3 Chapter 9 Article 1 Section 2200 Subdivision (b) (9) Category 3 footnote 18).

*18. De minimis discharge activities include, but are not limited to, the following: ... discharges from fire hydrant testing or flushing; discharges resulting from construction dewatering; discharges associated with supply well installation, development, test pumping, and purging; discharges resulting from the maintenance of uncontaminated water supply wells, pipelines, tanks, etc.; discharges resulting from hydrostatic testing of water supply vessels, pipelines, tanks, etc.; discharges resulting from the disinfection of water supply pipelines, tanks, reservoirs, etc.; discharges from water supply systems resulting from system failures, pressure releases, etc.; and other similar types of wastes that have low pollutant concentrations and are not likely to cause or have a reasonable potential to cause or contribute to an adverse impact on the beneficial uses of receiving waters yet technically must be regulated under an NPDES permit.*

The Agencies believe that the Tentative Order should acknowledge the very low threat nature of these discharges from drinking water systems and that the requirements contained therein should be commensurate with the relative risk associated with these discharges. The magnitude and frequency of monitoring and reporting in general far exceeds what is necessary to be protective of receiving water bodies. In fact, the requirements exceed those established for raw sewage discharges in the state, which pose a more significant threat than drinking water. Further, today it is impractical and economically infeasible to provide treatment methods for drinking water system discharges from drinking water treatment, conveyance, and distribution systems beyond the existing industry standard Best Management Practices (BMPs) and control measures. This letter contains specific recommendations on how the Tentative Order can be modified to reflect the de minimis characteristics of drinking water discharges.

### **2. EMERGENCY DISCHARGES**

Emergency discharges require immediate action and swift response to prevent or mitigate disasters that could affect public health, safety, or welfare. The type of response required and the

potential threat to human health and safety differentiates emergency discharges from planned and unplanned discharges. The Agencies recommend the following revisions to Section I.A. on page 3 of the Tentative Order:

Planned Discharges. Drinking water releases resulting from routine operations and maintenance that can be scheduled in advance such as:

- a. Dewatering flushing for maintenance;
- b. Disinfection of water supply pipelines, tanks, and reservoirs;
- c. Hydrostatic testing of water supply vessels, pipelines, and tanks;
- d. Maintenance of fire hydrants and fire flow testing when conducted by a water purveyor (not a fire department);
- e. Maintenance of other drinking water system assets; and
- f. Installation, development, testing pumping, purging, and sampling of wells in an unpolluted drinking water aquifer.

Unplanned Discharge. Drinking water releases caused by non-routine events such as:

- a. System failures;
- b. Accidents, such as fire hydrant shearing in an auto collision;
- c. System purges resulting from water system monitoring data that exceed the primary or secondary drinking water standards pursuant to the California Code of Regulations title 22, for parameters such as bacteria, metals, color, and taste.
- d. Seepage from underdrains of water storage reservoirs that are not treated with copper-based herbicides.

Emergency Discharges. Drinking water releases caused by a sudden, unexpected occurrence, involving a clear and imminent danger, demanding immediate action to prevent or mitigate loss of, or damage to life, health, property, or essential public services such as:

- a. Discharges caused by fire, flood, earthquake, or other soil or geologic movements, as well as such occurrences as riot, accident, or sabotage.

The definitions of planned and unplanned discharges provided here are consistent with what is in the SFPUC Drinking Water Transmission System Permit, R2-2008-0102. The definition of emergency discharges appears in Section 15359 of the CEQA Guidelines since these types of discharges fit under the definition of “Emergency” within this section of CEQA.

### 3. 15,000 GALLON VOLUME THRESHOLD

The State, in its recently published draft permit for drinking water system discharges to surface waters, released in June 2014, includes a threshold of 325,850 gallons (1 acre foot). These larger volumes are commensurate with the widely acknowledged de minimis nature of these discharges. The agencies recommend that R2 amend the 15,000 gallon threshold in the Tentative Order to be consistent with the SWRCB draft permit volume threshold for monitoring and reporting.

#### 4. 2,200 HOURS PER YEAR EXCEPTION FOR UNDERDRAIN SEEPAGE

The Tentative Order currently provides coverage for discharges or combinations of discharges, occurring continuously or intermittently, for more than 2,200 hours per year only for seepage from underdrains of water storage reservoirs that are not treated with copper-based herbicides. As the rationale is stated in the fact sheet, coverage is provided because underdrains seepages do not have reasonable potential to exceed applicable water quality objectives. The Agencies agree that these discharges do not have reasonable potential to exceed water quality objectives and are indeed de minimis. Further, the Agencies believe that there are additional necessary drinking water system discharges, such as reservoir filling, that exceed the 2,200 hours per year duration that should be regulated similarly and should also be provided coverage.

Lastly, the Agencies recommend that the SFRWQCB reconsider its arbitrary 2,200 hours or less definition of “short-term and seasonal” and utilize the same rationale employed by the SWRCB in their draft permit and draft Resolution adopting the Categorical Exemptions to the State Implementation Plan/California Toxics Rule (SIP/CTR) and Ocean Plan and associated Initial Study/Mitigated Negative Declaration. The SWRCB analyses did not determine it to be necessary to include time limitations on these discharges.

The Tentative Order does not currently define specific monitoring or reporting requirements for these covered underdrain discharges. It is not feasible to comply with the MRP requirements in table E-2 for these types of discharges as they may run intermittently. The Agencies recommend that a footnote be added to table E-2 that states that the monitoring in table E-2 is not applicable to these discharges.

#### 5. OCEAN DISCHARGES

The Tentative Order currently excludes from coverage potable water discharges to ocean waters. The rationale cited (Fact Sheet p. F-15) simply states that these discharges are not covered since this Order does not consider the water quality objectives and requirements of the Ocean Plan. This is a concern, since unless and until the SWRCB state-wide permit is adopted, these agencies would remain without NPDES coverage, unless they were to pursue coverage under an individual NPDES permit. This would be a time and resource consuming process on behalf of both the Agencies and the SFRWQCB staff, particularly if such individual permits were to be adopted and then “terminated” as is currently proposed following adoption of the SWRCB permit.

We understand this rationale in the Tentative Order to be based on the fact that the Categorical Exemption (CE) adopted by the SFRWQCB in 2008 (Resolution No. 2008-0101), the basis for the CE for this Order, only addressed limited exemptions from the SIP/CTR, not the Ocean Plan. The Agencies recommend that the Regional Board reconsider this exclusion of Ocean Discharges and instead utilize the same rationale employed by the SWRCB in their draft permit and draft Resolution adopting the Categorical Exemptions to the SIP/CTR and Ocean Plan and associated Initial Study/Mitigated Negative Declaration. The proposed SWRCB approach provides for coverage of Ocean Plan discharges (except for those to Areas of Special Biological Significance). This would avoid the necessity of Region 2 ocean dischargers having to pursue individual NPDES permit coverage.

## 6. EFFLUENT LIMITATIONS

The Agencies recommend modification of Provision VII.C.3. Post-Discharge Notification and Reporting and Provision VII.C.3.a.ii Notification to limit notification and reporting to noncompliance with chlorinated water effluent limitations (Provision V.B) as shown below and in similar references elsewhere throughout the permit:

*“The Discharger shall notify the Regional Water Board as soon as possible and no later than 24 hours after becoming aware of a discharge resulting in noncompliance with the Effluent Limitations in Provision V.**B.** or Receiving Water Limitations in Provision VI of this Order.”*

Effluent Limitations Provision V contains two items: A. Best Management Practices and B. Chlorinated Water. The Agencies believe it will be challenging to uniformly determine if and when BMPs are either not being adequately implemented or are being implemented in noncompliance with the permit and therefore request that the 24-hour notification not be applicable to this specific section.

## 7. BMP PLANS

The Agencies recognize the value of comprehensive BMP plans in that they facilitate compliance with Tentative Order requirements. However there are some elements of the proposed BMP Plans that are over reaching and not relevant to regulation of these de minimis permitted discharges. The Agencies recommend removing *section ii.* and *section iii.* of b. Contingency and Emergency Planning (page 11 of the Tentative Order) as alternate water supplies are not relevant to actually controlling the quality and quantity of discharges to surface water bodies and are already a part of any water purveyors water distribution program; this is the same for traffic and crowd control. Lastly, the Agencies recommend that the parenthetical reference about emergency response “(In emergencies, Dischargers will first protect human health, safety and property.)” be placed after the title of ***b. Contingency and Emergency Response Planning*** due to the importance of this statement.

## 8. TURBIDITY

For a number of reasons, the Agencies believe implementation of the numeric action level for turbidity is not feasible or appropriate. Due to high variability in the flow rate, duration, and sediment load in these de minimis low threat to water quality discharges, individual site constraints, and limited data make it difficult with any certainty to determine a reasonable action level that can be achieved using industry-standard BMP technology. The agencies believe it would be more effective to adopt an iterative, adaptive approach, whereby permittees implement mechanisms to evaluate the performance of BMPs, formally document their use and make adjustments as necessary to protect water quality.

As you are aware, the Tentative Order covers a wide range of discharges. Turbidity prior to BMPs can range widely from single digits for a discharge from a potable water reservoir draining operation to several thousand during trench dewatering.

Further, it is not appropriate to apply action levels from construction stormwater permits to potable water discharges as these are completely different scenarios. A construction site is

typically a controlled environment, fenced off from the public domain, larger than an acre in size, and where engineering controls can be implemented proactively to properly manage stormwater induced discharges in a planned fashion. Time and space to accomplish construction site work are generally not limiting factors in the implementation of the BMPs. The most closely applicable section of the SWRCB Construction General Permit (CGP) are requirements for Linear Underground Projects (LUP) disturbing greater than one acre. Greater than one acre low threat to water quality LUPs are only subject to visual monitoring requirements. Furthermore, in the CGP, LUPs conducted for routine maintenance purposes, defined as including repairing leaks and updating existing facilities, the same activities frequently conducted by water agencies, are **exempt** from obtaining CGP coverage. Similar repair and updating activities by water agencies should similarly only be subject to visual monitoring requirements.

Nearly all potable water main breaks are unplanned and require retroactive emergency response. They also make up the majority of potable discharges and occur in public streets with traffic and pedestrian concerns, as well as public health and commerce concerns, affording limited work space and limited time to accomplish the repairs. The repair crew needs to maintain positive pressure in the water pipe, and hence, a continuous flow from the leak in order to locate the break as well as to minimize the chance of contaminating the public drinking water system by allowing trench water to enter the pipe.

Through field tests the Agencies have found the most effective method to manage turbid discharges in urban environments where the surfaces are completely impervious, is to use check dams filled with pea gravel. Instead of filtration, the check dams slow the flow to allow the sediment in the discharge water to settle out. Considering the limited space in the roadway and variability of individual sites (e.g., road slopes, distance to drop inlet, curb and gutter dimensions), the effectiveness of this method varies from site to site similar to any other BMP.

Consequently, the Agencies believe that to require a discharger to reduce pollutants to levels consistently below a numeric action level using BMPs is to require the implementation of technology based practices that are not available to the industry.

At this time the water agencies recommend that the Tentative Order be amended to remove the turbidity Numeric Action Limit (NAL) and require appropriate BMP deployment to the maximum extent practicable (MEP), documentation of such deployment and retention of all pertinent records of deployment that can be made available upon request for regulatory review.

## 9. BIOLOGIST CERTIFICATION

The Agencies recommend using the same rationale provided by the SWRCB in the draft statewide permit for potable water discharges in regards to the requirement for a biologist certification. The SWRCB has determined that the biologist certification is a mitigation measure required “upon completion of the project.” The SWRCB concluded that discharges from water purveyors are mandatory system-development and system-maintenance activities and are essential operations to comply with the Federal Safe Drinking Water Act and the California Health and Safety Code for providing reliable and safe drinking water. The R2 Tentative Order treats every discharge as individual “projects” requiring a biologist certification that beneficial uses are no longer being actively impacted for each discharge resulting in adverse water quality

impacts. In contrast, the SWRCB has determined that potable water system operations and related discharges are ongoing “projects” and not considered complete unless the water purveyor ceases discharges from its system or when the State and/or Regional Water Board terminates NPDES permit coverage for the discharge(s), whichever is sooner.

Thus, according to the SWRCB, certification by a qualified biologist must be submitted after a water purveyor completely and permanently stops discharging from a drinking water system. The SWRCB stated that the discharges from these systems are existing discharges that will continue to take place, and serve as the baseline for determining the significance of any impacts that could result from the project. The SWRCB then concluded that “As compared to existing conditions, there is not significant impact on the environment due to routinely occurring planned discharges.”

#### 10. NOTICE OF INTENT (NOI) RECOMMENDATIONS

Section G on page B-2 of the Tentative Order requires that NOI applicants provide a list and the anticipated schedule of foreseeable planned discharge with a flow rate of at least 250,000 gallons per day or 500,000 gallons or more through December of the next calendar year. This same information is required on page 8 of the Tentative Order in Section VII.2.a as part of the notification process to the Regional Water Board. The Agencies recommend removing Section G from the NOI as this information is required elsewhere in the Tentative Order and the Agencies do not necessarily know one year in advance all the large discharges that will be planned for the following year.

#### 11. MONITORING & REPORTING PROGRAM RECOMMENDATIONS

The Agencies have multiple recommendations for improvements to the Monitoring and Reporting Program included in the Tentative Order including:

##### 11.a. Emergency Discharges Language in D

Emergency discharges require immediate deployment of BMPs after protection of public health, safety, and property is established. Monitoring of these types of discharges should therefore focus on BMP implementation, and effluent monitoring should not be a requirement.

The Agencies recommend the following revision to Section III.D. on page E-3 of the Tentative Order:

D. A Discharger is not required to conduct effluent monitoring when it would be unsafe, such as at night, when visibility is low (e.g. fog), during severe weather, or when terrain conditions are unstable or steep. Sampling is also not required when it is infeasible to collect a representative sample. **For emergency discharges, effluent monitoring is not required and BMPs shall be implemented as soon as feasible following assurance that public safety, property, and infrastructure are protected ...etc.**

##### 11.b. Table E-2 and Footnotes Recommendations

The Agencies recommend multiple amendments to table E-2 as follows:

- Add a distance threshold for super chlorinated discharges of 300 feet. This threshold is consistent with the other large volume categories and to have no threshold would be unnecessarily burdensome and have no value. For example a discharge of a

dechlorinated but formerly super chlorinated water that takes place 1 mile from a receiving water body and does not have any potential to reach surface waters, poses a minimal to non-existent threat to water quality and therefore does not justify the proposed level of monitoring.

- Modify the inline dechlorination sampling procedure in columns 1 and 2 to be consistent with the State's draft permit frequencies noted in their table E-1 which includes sampling within the first 10 minutes of the discharge, the last 10 minutes of the discharge and if the discharge runs greater than 60 minutes then a sample should also be taken 50 minutes after the initial sample. The current requirements in the Tentative Order are overly burdensome and will not provide any useful information.
- Remove the turbidity requirements in all columns.
- Update all footnote references; the numbering is off.
- Add footnote #3: Reservoir seepage does not require monitoring because there is not reasonable potential for impacts.
- Add footnote #4: Effluent monitoring is not required to be conducted in an emergency discharge event.

#### 11.c. Annual Report Recommendations

Section VII.C.5.b.iii on page 14 of the Tentative Order states, "Turbidity monitoring data shall be kept on file and made available to the Executive Officer upon request." However, Section V.B.3. - Report Contents of the MRP requires a summary of performance and compliance which includes, "each parameter for which the Order specifies a limit or action level, the number of samples taken during the monitoring period, and the number of samples that exceed a limit or action level."

The Agencies request that the MRP clearly state that turbidity monitoring data is not included in the Annual Self Monitoring Report (SMR) and instead is kept on file and made available upon request (consistent with Section VII.C.5.b.iii).

Section V.B.3.g on page E-6 of the MRP needs to be revised to be consistent with Table E-2. There are three columns that appear in Table E-2 that specify the sampling frequency for three distinct discharge types. The tabular summaries in the Annual SMR should mirror the discharge types present in Table E-2. The Agencies therefore recommend deleting Section V.B.3.g.iii- "Discharges from trench dewatering operations, and well operations in unpolluted drinking water aquifers."

#### 11.d. Table E-4 Recommendations

The proposed monitoring frequency in Table E-4 is excessive. When utilizing industry-standard BMPs on large-volume discharges, initial and periodic monitoring may be helpful in verifying the effectiveness of the BMPs, but once the effectiveness has been demonstrated, additional monitoring is unnecessary. In fact, extensive unnecessary monitoring can actually hinder the goal of minimizing the discharge by otherwise occupying limited resources on site. The priority should be placed on the most important engineering control which is to reduce and cease the de minimis discharge.

The Agencies recommend replacing Table E-4 (on page E-7 of the MRP) with the more appropriate and practical Table E-1 from the State’s MRP:

<b>Duration of Discharge</b>	<b>Sampling Requirements</b>
Less than 20 minutes	One sample is required during the first 10 minutes of the discharge
20 minutes to 60 minutes	One sample is required during the first 10 minutes of the discharge, plus a second sample is required within the last 10 minutes of the discharge.
Greater than 60 minutes	One sample is required within the first 10 minutes, a second sample is required within the next 50 minutes, and a third sample is required approximately within the last 10 minutes of the discharge.

**12. DETECTED BUT NOT QUANTIFIED (DNQ) RESULTS RECOMMENDATIONS**

The Agencies believe that reporting of qualified DNQ chlorine data below the minimum level (ML) to the Regional Board would not be meaningful because these data are not quantifiable. Data below the ML, as established per 68 FR 11790, are by definition inaccurate and cannot be used to quantitatively characterize the concentrations of discharges reported below the ML. The purpose of the ML is to ensure that the reported concentrations at or above the ML are of known accuracy and can be used for compliance and to inform scientifically based policy decisions. The Agencies therefore propose that concentrations below the ML be recorded on field log sheets or electronic recorders uncensored but that the data transmitted to the Regional Board be reported as less than the ML. The Agencies would retain all field log sheets and electronic data per the Records provision in Attachment D of the Tentative Order and would make these records available upon request to the SFRWQCB. This proposed reporting protocol would not be considered a variance from SIP reporting protocol because chlorine is not a priority pollutant and therefore is not subject to this protocol. The reporting of censored data below the ML would ensure that these data are not interpreted to be useable concentrations for policy and compliance purposes.

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The Agencies appreciate the opportunity to provide comments on the Region 2 General Waste Discharge Requirements for Discharges of Water from Drinking Water Supply Distribution, Transmission and Groundwater Systems and we look forward to continuing to work with you to implement a meaningful program that will minimize the cost of compliance while protecting water quality. If you have any comments or questions regarding the content of this letter, please feel free to contact me at 510-287-1256 or via email at [mambrose@ebmud.com](mailto:mambrose@ebmud.com).

Sincerely,



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Chair of Regional Water Agencies Stakeholder Group  
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East Bay Municipal Utility District

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