August 18, 2014

Via electronic mail

Mr. Sam Unger
Executive Officer and Members of the Board
California Regional Water Quality Control Board, Los Angeles Region
320 West 4th Street, Suite 200
Los Angeles, CA 90013
Email: losangeles@waterboards.ca.gov

Re: Comments on Watershed Management Plans and Monitoring Plans Pursuant to Requirements under the Los Angeles County Municipal Separate Storm Sewer System Permit, NPDES Permit No. CAS004001, Order No. R4-2012-0175

Dear Mr. Unger:

On behalf of the Natural Resources Defense Council ("NRDC"), Los Angeles Waterkeeper ("Waterkeeper"), and Heal the Bay (collectively, "Environmental Groups"), we are writing with regard to the Watershed Management Programs ("WMPs") and Monitoring Plans associated with the WMPs submitted by the permittees pursuant to requirements under the Los Angeles County Municipal Separate Storm Sewer System ("MS4") Permit, NPDES Permit No. CAS004001, Order No. R4-2012-0175 ("2012 Permit"). This comment letter addresses, in general, WMPs for the following watershed groups: The Lower Los Angeles River;[1] Los Angeles River, Upper Reach 2;[2] Los Cerritos Channel;[3] Lower San Gabriel River;[4] and Santa Monica Bay Watershed Jurisdiction 7.[5] Due to stylistic and technical differences of plans, we have submitted a separate comment letter on individual WMPs and associated Monitoring Plans for seven

[1] Permittees include Downey, Lakewood, Long Beach, Lynwood, Paramount, Pico Rivera, Signal Hill, South Gate, and the Los Angeles County Flood Control District.
[2] Permittees include Bell, Bell Gardens, Commerce, Cudahy, Huntington Park, Maywood, Vernon, and the Los Angeles County Flood Control District.
[3] Permittees include Bellflower, Cerritos, Downey, Lakewood, Long Beach, Paramount, Signal Hill, and the Los Angeles County Flood Control District.
[4] Permittees include Artesia, Bellflower, Cerritos, Diamond Bar, Downey, Hawaiian Gardens, La Mirada, Lakewood, Long Beach, Norwalk, Pico Rivera, Santa Fe Springs, Whittier, and the Los Angeles County Flood Control District.
[5] Permittees include the City of Los Angeles and the Los Angeles County Flood Control District.

permittees (Carson, Compton, Gardena, Irwindale, Lawndale, South El Monte and West Covina).

We appreciate the opportunity to submit these comments to the Los Angeles Regional Water Quality Control Board ("Regional Board"). Where we do not address any specific WMP or particular issue within a WMP, that should not be taken as indication of our agreement with the sufficiency or legality of those WMPs or terms, and we urge the Regional Board to review all the submitted management plans in light of our comments here.

I. Introduction

While we submit the following substantive comments on the WMPs and Monitoring Plans submitted by the permittees, Environmental Groups maintain that several provisions of the 2012 Permit fail to meet the requirements of the federal Clean Water Act and California Porter Cologne Act, and are otherwise inconsistent with both state and federal law. Environmental Groups filed a petition[6] to the State Water Resources Control Board ("State Board") which demonstrates the ways in which the 2012 Permit violates these legal requirements. The State Board has yet to make a determination on our petition.

Because of the deficiencies in the submitted draft WMPs, many of which are detailed below, the plans do not ensure that discharges from the permittees' MS4 systems do not cause or contribute to exceedances of Receiving Water Limitations, including applicable water quality standards, or TMDL limitations in the 2012 Permit, and otherwise fail to meet Permit requirements. This letter and the attached exhibits are not intended to exhaust the reasons why the submitted WMPs fail to meet permit requirements and why the WMPs will not ensure compliance with receiving water limitations.

II. Summary of Comments

Several of the WMPs reflect significant effort on the part of the permittees. However, the submitted WMPs and Monitoring Plans in numerous aspects fail to meet the requirements of the 2012 Permit or are otherwise inadequate to control pollution and protect the

[6] For a full explanation of how the permit violates the law, see Memorandum of Points and Authorities in Support of Petition of NRDC, Los Angeles Waterkeeper and Heal the Bay for Review of Action by the California Regional Water Quality Control Board, Los Angeles Region, in Adopting the Los Angeles County Municipal Separate Stormwater National Pollutant Discharge Elimination System (NPDES) Permit; Order No. R4-2012-0175; NPDES Permit No. CAS004001 (Dec, 10, 2012) ("Environmental Groups' Petition"), SWRCB/OCC File No. A-2236(m).

region's waters. The Regional Board may not approve these plans until such deficiencies are addressed. Common issues with the submitted WMPs and Monitoring Plans include:

1. In several WMPs, permittees use non-site specific data as the basis for watershed characterization efforts, yet fail to acknowledge any discrepancies or differences between the selected watershed area and the areas where the data were collected, rendering the watershed characterizations and source analyses inadequate;

2. Water body-pollutant classifications and prioritization in the WMPs are insufficient in some cases, and several of the watershed management groups' permittees fail to adequately characterize non-stormwater discharges or pollution reduction strategies;

3. Permittees make improper and unsubstantiated assumptions in compliance analyses and fail to include adequate calibration or validation of models:

    a. Permittees make assumptions about the effectiveness of proposed pollution reduction strategies without providing requisite justification;
    b. Permittees inappropriately rely on uncertain future legislation/policy changes (e.g. trash policy, legislation related to copper brakes and zinc in tires) to address current violations of RWLs and water quality based effluent limitations ("WQBELs");
    c. Permittees place inappropriate weight on future adaptive management as a means of ensuring compliance instead of employing necessary measures to demonstrate current compliance with permit requirements;
    d. Permittees fail to include calibration and/or validation of models as part of Reasonable Assurance Analyses ("RAAs");

4. Permittees inappropriately lessen their responsibility for reducing pollutant loads based on assumed regulation or action of non-MS4 entities;

5. Proposed projects to address runoff and comply with Permit terms lack specificity, and several WMPs fail to consider use of established practices and/or private land opportunities, and do not place sufficient emphasis on identifying and implementing multi-benefit solutions in general;

6. In several instances, proposed compliance deadlines are unreasonably long and extend well beyond the permit term;

7. Several WMPs do not provide certainty of compliance with the permit's Low Impact Development and Green Streets requirements;

8. Some monitoring plans are insufficient because they fail to include required information, they propose to sample less than the required number of wet weather events, and/or fail to include monitoring locations representative of land uses.

III. Common Deficiencies Identified in Draft WMPs

The 2012 Permit allows for permittees to "develop Watershed Management Programs to implement the requirements of [the Permit] on a watershed scale through customized strategies, control measures, and BMPs." (2012 Permit, at VI.C.1.a.) Permittees, in a WMP, must "ensure that discharges from the Permittee's MS4 . . . do not cause or contribute to exceedances of receiving water limitations" or applicable TMDL provisions. (*Id*. at VI.C.1.d.) WMPs are additionally required, among other provisions, to:

- identify water quality priorities through conducting a water quality characterization of the watershed, classifying water body-pollutant combinations, conducting a pollutant source assessment, and prioritizing pollution issues to be addressed (2012 Permit, at VI.C.5.a.);
- select watershed controls, including identifying specific "strategies, control measures, and BMPs to implement through their individual storm water management programs, and collectively on a watershed scale" (*Id*. at VI.C.5.b.);
- establish compliance schedules and interim milestones for achieving pollutant reduction goals (*Id.* at VI.C.5.c.); and
- conduct a Reasonable Assurance Analysis ("RAA") for each water body-pollutant combination addressed by the WMP. (VI.C.5.b.iv.(5).)

In numerous regards, and as detailed further below, the permittees fail to meet these or other legal requirements.

A. Watershed Characterizations And Source Analyses Lack Site-Specific Information

Permittees must evaluate existing water quality conditions and characterize the current stormwater and non-stormwater discharges in their watersheds. (Permit at VI.C.5.a). This step is critical to efforts to prioritize pollutants and management actions. Several permittees fail, however, to meet permit requirements where they apply data and observations from outside of their own sub-watersheds to characterize pollutant loading and assess sources of pollutants, without making necessary adjustments to account for the source data. In circumstances where data collected outside of the study area must be used, for whatever reason, the WMP and RAA must at least make adjustments, quantitative or qualitative, to account for the difference.

For example, the Lower San Gabriel River permittees' characterization of current pollutant loading is in general based on data and analysis of conditions observed in the main stem San Gabriel River, which is almost entirely upstream of the Lower San

Gabriel River sub-watershed.[7] While there may be a limited data set to draw from (and a failure to collect additional data), the permittees nevertheless fail to discuss how the external data and analysis are (or are not) relevant to the lower portion of the river. Considering the difference in land uses and potential runoff volumes in the heavily developed Lower San Gabriel River watershed as compared with upstream drainage areas, the permittees must adjust their assumptions and watershed planning accordingly.

Similarly, almost all of the data used in the Los Angeles River, Upper Reach 2 ("Upper Reach 2") assessment and planning come from outside of the Upper Reach 2 area.[8] In addition, the Upper Reach 2 WMP lacks analysis of data on illicit discharges, illicit connections, the number and types of industrial facilities, and areas with active construction – information that is all currently available and would help determine sources of key pollutants. (*See* 2012 Permit at VI.C.5.a.iii). Permittees in the Upper Reach 2 WMP claim that data collected under their Coordinated Integrated Monitoring Program will help properly characterize the watershed in the future, but this approach both violates the permit, which requires characterization of current conditions as part of the WMP submission, and, given the lack of current data presented, calls into question the basis of the submitted WMP and RAA.[9] This is especially problematic in a highly impervious and industrial sub-watershed, like Upper Reach 2, which can be expected to produce higher runoff volumes and pollutant concentrations than the county as a whole. In sum, where any permittee or WMP group uses data from outside their subject watershed, they must acknowledge that reality and make appropriate adjustments.

B. Water Body-Pollutant Classifications and Prioritization are Insufficient in Some Cases

In addition to evaluating existing water quality conditions, permittees are required to classify and prioritize pollutants in each sub-watershed. (2012 Permit, at VI.C.5.a.ii.) Permittees are required to prioritize pollutants into three categories: (1) TMDL pollutants (highest priority), (2) 303(d) listed but no applicable TMDL (high priority), (3) insufficient data to determine impairment, but exceeds RWLs (medium priority). Category (1) must also include non-TMDL pollutants that have similar fate and transport mechanisms as TMDL pollutants. (*Id*. at VI.C.2.a.i.)

Many permittees fail to comply with this prioritization scheme. For example, the Lower Los Angeles River WMP improperly classifies trash in the Los Angeles River Estuary as

[7] See, John L. Hunter and Associates (June 27, 2014) Lower San Gabriel Watershed Management Program, at 2-14, et seq. ("Lower San Gabriel WMP")
[8] CWE (June 26, 2014) Los Angeles River Upper Reach 2 Watershed Management Area Watershed Management Program (WMP) Plan, at 21, et seq.("Upper Reach 2 WMP").
[9] Upper Reach 2 WMP, at 30.

Category 2A.[10] However, trash is clearly a TMDL pollutant; the Los Angeles River Trash TMDL specifically "includes Waste Load Allocations that would ensure attainment of standards in the Estuary," and thus trash must be classified as Category 1.[11] Similarly, pH (which is addressed in the Los Angeles River Nitrogen Compounds and Related Effects TMDL)[12] should be classified in Category 1 instead of Category 2. The Lower Los Angeles River WMP is also deficient in its prioritization discussion. The highest Water Quality Priorities are reserved for, among other things, "Pollutants that are in the same class as a TMDL pollutant." For example, all pesticides (similar to DDT and PCBs regulated under the Dominguez Channel and Greater Los Angeles and Long Beach Harbor Waters Toxic Pollutants TMDL) should be prioritized as the highest level.[13]

Similarly, neither the Los Cerritos Channel WMP[14] nor Lower San Gabriel River WMP include aluminum as a Category 1 target despite that it is in the same "class" as other metals and has a similar fate and transport mechanism. Data demonstrate that aluminum has long exceeded RWLs in the Los Cerritos Channel and is on the 303(d) list.[15] Permittees must re-prioritize and ensure that selected control measures designed to control metals under the Metals TMDL will also address aluminum.

C. Many Permittees Make Inappropriate Assumptions With Regard To Predicted Pollution Reduction

1. The permittees fail to provide justification for assumptions made about the effectiveness or scale of implementation of proposed pollution reduction strategies.

Multiple WMP groups make assumptions regarding the efficacy or expected degree of implementation for various pollutant reduction methods to conclude that TMDL requirements and RWLs will eventually be met for receiving waters within their jurisdictions without providing any requisite justification. For example, the RAA for the

[10] John L. Hunter and Associates (June 27, 2014) Lower Los Angeles River Watershed Management Plan, at 2-3 ("Lower Los Angeles River WMP").
[11] *See*, Regional Board, Res. No. 07-012, August 9, 2007.
[12] *See*, Regional Board, Res. No. 12-010, December 6, 2012.
[13] *See*, Lower Los Angeles River WMP at 2-13, 2-44, and 2-45.
[14] Richard Watson and Associates (June 28, 2014) Los Cerritos Channel Watershed Management Program (Los Cerritos Channel WMP").
[15] *Id.* at 2-5; *see also*, Lower San Gabriel River Watershed Management Program, at Appendix B, (2009-10) 11, 14; (2010-11) 14, 18; (2001-12) 14, 18.

Lower San Gabriel River, Lower Los Angeles River, and Los Cerritos Channel WMP groups[16] states that:

> a 10 percent load reduction was *assumed* to result from implementation of all nonstructural control measures outlined in the WMPs, setting the foundation of WMP implementation, and structural control measures provide additional load reduction.[17]

Non-structural controls are described generally by the RAA as including improvements to municipal ordinances and regulations, public outreach, street sweeping, and inspection and enforcement, among other practices. Additional "targeted" non-structural BMPs include programs to reduce sediment from construction sites and poorly stabilized areas, improved or increased street sweeping, and "encouraging" downspout disconnection programs.[18]

Similarly, the Upper Reach 2 WMP states that:

> Load reductions derived from non-modeled, non-structural BMPs were *assumed* to be 5 percent of baseline loads for all pollutants following discussions with the Regional Board. These non-structural BMPs will include the following program enhancements (i.e., beyond the Permit minimum), with an emphasis on those BMPs that most effectively target urban stormwater bacteria sources: enhanced street sweeping, enhanced catch basin and stormdrain cleaning, enhanced commercial and food outlet inspection, enhanced pet waste controls, enhanced education and outreach, enhanced homeless waste control efforts, and enhanced IDDE efforts (including microbial source tracking to identify inputs of human fecal contamination into the MS4).[19]

Except for some quantification of reductions that may be possible due to the sediment reduction-based elements of the strategies presented by the Lower San Gabriel River, Lower Los Angeles River, and Los Cerritos Channel WMP groups, the RAA or WMPs for these watersheds provide no evidence or analysis to substantiate the claim that these practices will actually achieve a 5% or 10% reduction in pollutant loads. In fact, the RAAs flatly admit that they "assume" the benefit will accrue, rather than that any benefit

[16] Tetra Tech and Paradigm Environmental (June 6, 2014) Reasonable Assurance Analysis for Lower Los Angeles River, Los Cerritos Creek, and Lower San Gabriel River ("Lower Rivers/Channel RAA").
[17] Lower Rivers/Channel RAA, at 46 (emphasis added).
[18] (See, e.g., Lower San Gabriel River WMP, at 3-8 – 3-11; Lower Los Angeles River WMP, at 3-30, Table 3-11; Los Cerritos Channel WMP, at 3-9.)
[19] Upper Reach 2 WMP, at 82 (emphasis added).

has been demonstrated by modeling or other analytical means.[20] Moreover, as the identified non-structural programs or actions to be undertaken are not fully defined in either the RAA or WMPs for these groups, the groups provide no guarantee that these programs will be implemented in an effective or comprehensive manner. No specificity is provided on how these practices will differ from baseline programs or where and when they will be implemented. For example, the WMP for the Upper Reach 2 group states that for most identified practices, the proposed implementation approach will be to "consider" additional practices.[21] Many of these programs undoubtedly have the potential to achieve critically needed, and required, pollution reduction for these watersheds. However, regardless of whether the pollution strategies have potential to achieve some amount of reduction, claims of a 5% or 10% pollutant reduction to demonstrate compliance with permit requirements is unjustified here absent further information.[22]

The RAA for the Lower San Gabriel River, Lower Los Angeles River, and Los Cerritos Channel WMP groups additionally claims that for dry weather discharges or non-stormwater:

> Similar to wet weather, a 10% load reduction is *assumed* to result from the cumulative effect of nonstructural BMPs. Also, the effects of a 25% reduction in irrigation of urban grass was explicitly simulated in the model to estimate the resulting associated reduction of dry weather flows at the RAA Assessment Points. Irrigation was modeled as artificial rainfall within the LSPC model as a function of the potential evapotranspiration of urban grass. Once irrigation was reduced 25%, this directly impacted a large portion of the non-stormwater discharges drivin [sic] primarily from over irrigation and impacts on dry weather flows were significant.[23]

[20] Lower Rivers/Channel RAA, at 46; Upper Reach 2 WMP, at 82.
[21] Upper Reach 2 WMP, at 68.
[22] The Upper Reach 2 RAA additionally states that 25 percent of commercial and residential land uses not treated or served by proposed regional BMPs on the Los Angeles River side of Upper Reach 2 WMA would be treated using distributed "LID Streets." (Upper Reach 2 WMP, at 83.) This amounts to nearly 18 percent of the total catchment, and no analysis is given to support whether this coverage can be attained (or alternately, whether it could be implemented at a higher level). (See also p. 67 – "The proposed structural control measures include both distributed and regional BMPS. Distributed BMPs will be implemented throughout the watershed in accordance with the Planning and Land Development Program specified by the MS4 Permit. The types and sizes of these BMPs are not identified, but assumptions are provided to support the quantities incorporated into the RAA.")
[23] Lower Rivers/Channel RAA, at 51 (emphasis added).

As with the wet weather pollutant load reduction claim, no analytical justification is given for the 10% cumulative reduction from non-structural BMPs. Neither is any analytical or other justification given for the RAA's supposition that targeted irrigation reductions will decrease the quantity of irrigation water applied by 25% throughout the watershed. Of greater concern, the RAA further claims, in a footnote, that the alleged 25% irrigation reduction will result in an approximately 60% reduction in overall dry weather pollutant loadings.[24] These claims are particularly troubling; first, no defined strategy for attaining the initial 25% irrigation water reduction is articulated, calling into question the accuracy of this claim. Second and compounding the potential for error in actual outcome, no justification is given for the large 60% reduction claim, which given its greater claimed potential effect, has a correspondingly greater potential for negative impact on the WMPs' ability to achieve water quality goals if proven wrong. The RAA must provide quantitative justification for the above claims related to irrigation volume and pollutant load reduction controls or the Regional Board must reject these claims as unsupported.

2. Permittees inappropriately rely on future legislative and policy changes to address current water quality violations

Many permittees disproportionately rely on future legislative or policy changes to reduce current pollutant loads and to justify proposed management actions. For example, many permittees rely on SB 346, the copper brakes bill, to reduce copper loading and comply with copper limits in the Metals TMDLs.[25] This is particularly concerning given that the Lower Rivers/Channel RAA identifies zinc as the limiting pollutant for each Watershed Management Program area because "[a]lthough copper was calculated to have a higher required reduction than zinc, the effect of Senate Bill 346 is expected to reduce those

[24] Lower Rivers/Channel RAA, at 51.

[25] *See, e.g.,* Los Cerritos Channel WMP at 5-1; Upper Reach 2 WMP, at 82; Lower Los Angeles River WMP, at 3-1; Lower San Gabriel River WMP, at 3-2, 3-29. Several permittees estimate a 45-60% reduction in copper runoff as a result of SB 346 implementation, but fail to provide site-specific analyses to substantiate those claims or to demonstrate how the bill will allow permittees to meet interim or final WQBELs or RWLs. (*See* Lower Los Angeles River WMP, at XX; Lower San Gabriel River WMP, at 3-2). The Los Cerritos Channel Watershed Group commissioned a study, "Estimate of Urban Runoff Copper Reduction in Los Angeles County," but it was not attached to the WMP and is therefore difficult to evaluate further. (Los Cerritos Channel WMP, at 3-4). Further, this figure would appear to contradict with figures claimed by the groups' RAA, which states, "the Brake Pad Partnership commissioned several technical studies to better quantify the fate and transport of copper to San Francisco Bay including a detailed source assessment. Overall findings of the study estimated that of the anthropogenic sources of copper, approximately 35 percent are attributed to brake pad releases." (Lower Rivers/Channel RAA at 38.)

reductions without any implementation of structural control measures."[26] While Environmental Groups also anticipate copper reduction over the next decade as SB 346 is implemented, the permittees must demonstrate through modeling or some other mechanism the extent of the legislation's predicted impact in the relevant sub-watersheds so that they can determine what further action is necessary.

Even more speculative, several permittees mention *potential* legislation, which has yet to be drafted or passed, to regulate zinc and/or lead in tires as a means of pollutant reduction.[27]

With regard to trash control, several permittees in watersheds subject to trash TMDLs rely on past actions for compliance, but it is still unclear if controls are achieving required reductions. Permittees must assess current controls and associated operation and maintenance activities to determine what further action is needed to meet TMDL limits. Moreover, in watersheds that are not subject to a trash TMDL, some permittees fail to propose trash controls at all despite current impairments. Instead, permittees delay compliance until the statewide trash policy is approved by the State Board.[28] Of note, the State Board is contemplating "grand-fathering" all Region 4 trash TMDLs in its current draft. This delay and reliance on future policy is unacceptable. Permittees must address 303(d) pollutants in their WMPs as a high priority. (2012 Permit, at VI.C.2.a.ii).

There are several other instances where permittees cite Regional Board or State Board proceedings that are either proposed or underway as justification for either not addressing a pollutant or assuming that compliance will be achieved. For example, permittees cite the Regional Board's Site Specific Objective Study for metals in the LA River as justification for proposed actions even though the study has not been officially approved or adopted as a Basin Plan Amendment.[29] The Upper Reach 2 WMP also relies on implementation of the nutrient TMDL at wastewater recovery plants but offers no details that allow verification.[30] Also, Los Cerritos Channel permittees fail to address ammonia because it has been proposed for de-listing and pH because they would "like to work with Regional Board staff… to delist pH," despite the lack of resolution or public process on the issue.[31]

[26] Lower Rivers/Channel RAA, at 38.
[27] *See*, Los Cerritos Channel WMP, at 3-5, 5-2; Lower Los Angeles River WMP, at 3-2.
[28] *See*, Los Cerritos Channel WMP, at 5-3.
[29] *See*, Upper Reach 2 WMP, at 20 and 78.
[30] *Id.* at vii.
[31] Los Cerritos Channel WMP, at 5-3.

3. Permittees place an inappropriate amount of reliance on future adaptive management instead of employing necessary measures immediately to comply with permit requirements

The WMP submission is required to demonstrate how permittees will meet RWLs or TMDL limits in the Permit. However, several permittees state they will delay addressing priority pollutants until they undergo the adaptive management process. Los Cerritos Channel permittees, for example, indicate that rather than addressing bacteria directly, they will wait and evaluate how controls targeting other pollutants impact *E. coli* levels in receiving waters.[32] This is unacceptable. Permittees must evaluate existing BMPs for effectiveness and determine what additional controls are now necessary to achieve receiving water limitations. This is especially true for high priority 303(d) pollutants such as bacteria.

4. At least one watershed group fails to demonstrate model calibration as part of its RAA.

The 2012 Permit requires that the Reasonable Assurance Analysis "be quantitative and performed using a peer-reviewed model." (2012 Permit, at VI.C.5.b.iv.(5).) As part of the modeling requirements, the Guidelines for development of an RAA state that "to demonstrate the ability to predict the effect of watershed processes and management on land, soil, and receiving water body, model calibration and validation are necessary and critical steps in model application."[33] This is done in order to "ensure the calibrated model properly assesses all the model parameters and modeling conditions that can affect model results," and that "the calibrated model properly assesses all the variables and conditions in a watershed system."[34]

The Upper Reach 2 WMP and associated RAA fails entirely to demonstrate model calibration or validation. The report merely states:

> …the LAR UR2 WMA Reasonable Assurance Analysis (RAA) demonstrates, through a calibrated model, that Water Quality Objectives (WQOs) will be met through implementation of the actions in this Plan.[35]

The WMP and RAA further state:

[32] *See, e.g.*, Los Cerritos Channel WMP, at 5-3.
[33] Los Angeles Regional Water Quality Control Board (March 25, 2014) Guidelines for Conducting Reasonable Assurance Analysis in a Watershed Management Program, Including an Enhanced Watershed Management Program, at 12.
[34] *Id*.
[35] Upper Reach 2 WMP, at 1.

> Target load reductions were established using the calibrated LSPC watershed model for the TMDL pollutants total nitrogen, total copper, total lead, total zinc, and fecal coliform.[36]

As a result, the results of the RAA are potentially invalid, and cannot be relied upon to accurately reflect conditions in the watershed.

D. The Permittees Inappropriately Rely on Other Entities to Reduce Pollutant Loadings in Calculating Their Own Required Reductions

The 2012 Permit states in part that, "Watershed Management Programs shall ensure that discharges from the Permittee's MS4: (i) achieve applicable water quality-based effluent limitations in Part VI.E and Attachments L through R pursuant to the corresponding compliance schedules, (ii) do not cause or contribute to exceedances of receiving water limitations in Parts V.A and VI.E and Attachments L through R. . . ." (2012 Permit, at VI.C.1.d.) Permittees are, as a result, required to demonstrate that their discharges, as controlled by the WMP, will not "cause or contribute" to an exceedance of RWLs, including applicable water quality standards. However, the RAA for the Lower San Gabriel River, Lower Los Angeles River, and Los Cerritos Channel WMPs states that, in developing target runoff and pollutant reduction targets for the watershed permittees:

> Each jurisdiction in the Group's WMP area is subject to stormwater runoff from non-MS4 facilities. In particular, Caltrans roads and facilities regulated by nontraditional or general industrial permits contribute to the runoff volume for each subwatershed. It will be important for these entities to retain their runoff and/or eliminate their cause/contribution to receiving water exceedances. <u>The runoff from these non-MS4 facilities was therefore estimated and subtracted from the cumulative volume reduction goal (Section 7) to establish the MS4 responsible targets.</u>[37]

While we fully support measures to reduce stormwater runoff and pollutant loading sourced from non-MS4 facilities, because the permittees are prohibited, through implementation of a WMP or otherwise, from causing *or contributing* to an exceedance of the Permit's RWLs, their reliance on, or assumption that non-MS4 sources will, in fact, eliminate their cause/contribution to receiving water exceedances, is improper. For example, in the event that these non-MS4 sources continue to add pollutant load to area receiving waters, the WMP groups' contributions may result in an exceedance even if permittees achieved their targeted pollution reduction. Further, once pollution enters a permittee's MS4 system, it is the MS4 permittee's responsibility to address the loading. Permittees may not simply "pass the buck" to claim compliance with the Permit or

[36] *Id*. at 72.
[37] Lower Rivers/Channel RAA, at 52.

broader Clean Water Act terms. The WMPs must establish their targeted reductions based on existing or known conditions, rather than hoped-for future circumstances.

E. The Permittees' Proposed Projects to Address Runoff and Meet Compliance Lack Specificity, Fail to Incorporate Well-Established Practices, and Should Place Greater Emphasis on Identifying and Implementing Multi-Benefit Solutions Overall

The 2012 Permit requires that, "[e]ach plan shall include…[f]or each structural control and non-structural best management practice, the number, type, and location(s) and/or frequency of implementation." (2012 Permit, at VI.C.5.b.iv(4).) Permittees must also specify interim milestones and dates for achievement for each structural and non-structural BMP. (*Id.*) However, several WMPs fail to provide required specificity on the types, sizes, and locations of proposed BMPs and thus prove difficult to adequately evaluate.

For example, though broadly purporting to incorporate use of distributed "LID Streets" on 25 percent of commercial and residential land uses not served by proposed regional BMPs,[38] the Upper Reach 2 WMP does not include specific types or locations for proposed distributed street right-of-way BMPs. Similarly, although hundreds of *potential* BMP sites for regional or street right-of-way sites were identified in the Lower San Gabriel River WMP, the Lower San Gabriel River permittees do not provide any specifics on BMP type, location, or size. While the RAA for the Lower San Gabriel River, Lower Los Angeles River, and Los Cerritos Channel groups does present an allocation of BMPs or BMP treatment capacity within subwatersheds for each municipal permittee, it does not give further information as to proposed location or other required details.

In addition to failing to provide specificity regarding BMP selection, the WMP for the Upper Reach 2 watershed eschews numerous potential project siting opportunities that could strongly contribute to pollutant reduction in the watershed. The WMP establishes criteria for identifying regional BMP sites as:

1) at least 0.5 acres are available;
2) maximum distance to a storm drain is 100 feet; and
3) the site is publicly owned.[39]

As a result, no consideration appears to have been given to either opportunities for new public land acquisition or for public-private partnerships, significantly reducing overall

[38] Upper Reach 2 WMP, at 83.
[39] Upper Reach 2 WMP, at 56 ("Parcels not meeting these criteria were not considered viable regional BMP locations").

opportunities to achieve volume or pollutant load reduction objectives. Use of a well-balanced portfolio of public and private lands for stormwater management practices can actually result in a reduced cost of BMPs per unit area, as well as achieve additional benefits for both public entities and private landowners.[40]

Moreover, the Upper Reach 2 WMP has identified bacteria as the driver for BMP type selection, which the WMP generally limits to infiltration or subsurface wetland projects.[41] While both are appropriate treatment approaches for addressing bacteria pollution, we question why the WMP gives no consideration of more active treatment methods, such as ultraviolet or ozone disinfection.[42] Or, of greater concern, we question why the WMP identifies opportunities for distributed, structural BMPs including rainwater harvesting and use of vegetated or green roofs,[43] but appears to dismiss their use because their "model favored infiltration BMPs near subwatershed outfalls, which accept runoff from smaller events and allow larger events to be addressed as allowable exceedance days, over large numbers of distributed BMPs sized to rare larger events. . . ."[44] It is unclear why the utility of one BMP approach would inversely decrease the utility of another, when both could be used in tandem to result in less contaminated runoff occurring in the first instance.

Finally, we note that, while not an explicit requirement for WMPs, the 2012 Permit places substantial emphasis on identifying, developing, and implementing green infrastructure or other multi-benefit projects that will provide additional benefits or resources for the Los Angeles region. For example, under the Permit's Minimum Control Measure ("MCM") requirements, development and redevelopment projects may "utilize alternative compliance measures to replenish ground water at an offsite location,"

[40] See, e.g., NRDC, EKO Asset Management Partners and the Nature Conservancy (January 2013) Creating Clean Water Cash Flows: Developing Private Markets for Green Stormwater Infrastructure in Philadelphia, accessed at http://www.nrdc.org/water/stormwater/files/green-infrastructure-pa-report.pdf; NRDC (December 2013) The Green Edge: How Commercial Property Investment in Green Infrastructure Creates Value, accessed at http://www.nrdc.org/water/commercial-value-green-infrastructure.asp.

[41] Upper Reach 2 WMP, at 56.

[42] We also note that the analysis may be conservative in estimating infiltration potential for the region—the analysis considered infiltration rates to be between 0.17 to 0.36 inches/hour, more typically found for clay loams which may not be present in the LAR UR2Upper Reach 2 area. (See http://www.fao.org/docrep/s8684e/s8684e0a.htm.) Even if there should be somewhat restricted infiltration in a native soil like clay loam, compost amendments can be used to increase soil storage and boost the opportunity for infiltration.

[43] Upper Reach 2 WMP, at 42.

[44] *Id.* at 19.

provided that, among other parameters, "that ground water can be used for beneficial purposes at the offsite location." (2012 Permit, at VI.D.7.c.iii .) Similarly, "Permittees may propose, in their Watershed Management Program or EWMP, regional projects to replenish regional ground water supplies at offsite locations, provided the groundwater supply has a designated beneficial use in the Basin Plan." (*Id.* at VI.D.7.c.iii(3).) Further, permittees developing an Enhanced Watershed Management Program ("EWMP") are tasked with "comprehensively evaluat[ing] opportunities, within the participating Permittees' collective jurisdictional area . . . for collaboration among Permittees and other partners on multi-benefit regional projects. . . ." (*Id.* at VI.C.1.g.)

These requirements represent a strong overall trend for stormwater management toward use of multi-benefit, often green infrastructure-based, projects and practices, which may include, at both site and regional scales, use of rainwater harvesting or stormwater infiltration, green roofs, rain gardens, street trees, and green streets or increased green space. By retaining stormwater runoff, these practices or types of projects not only reduce all categories of pollutants in stormwater, but can reduce flooding, increase local water supplies (particularly critical for Southern California given conditions of drought and over-allocation of existing water sources), reduce energy use, improve air quality, increase property values and beautify cityscapes.[45] The implementation of multi-benefit projects can often help to leverage funding dollars.

While many of the BMPs identified in the various WMPs have the potential to result in multiple benefits for their corresponding communities, there is little emphasis placed on use of multi-benefit strategies in the WMPs, of specific additional benefits that could be

[45] *See*, American Planning Association (2010) Rebuilding America: APA National Infrastructure Investment Task Force Report, accessed at http://www.planning.org/policy/infrastructure/pdf/finalreport.pdf; California Department of Water Resources (2010) California Water Plan Update 2009, Volume 2: Resource Management Strategies, Chapter 19, Urban Runoff Management, accessed at http://www.waterplan.water.ca.gov/cwpu2009/index.cfm; U.S. EPA (2007) Reducing Stormwater Costs through Low Impact Development (LID) Strategies and Practices, at iii, accessed at http://www.epa.gov/owow/NPS/lid/costs07/documents/reducingstormwatercosts.pdf; NRDC (2011) Rooftop to Rivers II http://www.nrdc.org/water/pollution/rooftopsii/files/rooftopstoriversII.pdf; NRDC, The Green Edge; NRDC and The Pacific Institute (June 2014) Stormwater Capture Potential in Urban and Suburban California, accessed at http://www.nrdc.org/water/files/ca-water-supply-solutions-stormwater-IB.pdf; and, NRDC and Emmett Center on Climate Change and the Environment at UCLA School of Law (2012) Looking Up: How Green Roofs and Cool Roofs Can Reduce Energy Use, Address Climate Change, and Protect Water Resources in Southern California, accessed at http://www.nrdc.org/water/pollution/files/GreenRoofsReport.pdf.

achieved (e.g., increased water supply), or of partnerships outside of the MS4 community that could be brokered to increase utility of land area used for stormwater management.[46] We strongly urge the permittees, in revising their respective WMPs, to place additional focus on potential to achieve multiple environmental or community benefits through implementation of their WMPs.

F. Many Proposed Compliance Deadlines Are Illegal Or Otherwise Unreasonably Long And Beyond The Permit Term, And Many Permittees Still Fail To Meet Compliance Deadlines

The Permit requires each WMP to include both interim and final deadlines for achieving WQBELs and RWLs. For TMDL pollutants, permittees must identify interim milestones and dates for their achievement "to ensure adequate progress toward achieving interim and final [WQBELs] and/or [RWLs]." (2012 Permit, at VI.C.5.b.iv(5)). For pollutants not addressed by TMDLs, permittees shall demonstrate that control measures identified "will achieve applicable receiving water limitations *as soon as possible.*" (*Id.* (emphasis added).) And federal regulations provide the guideposts for setting compliance schedules under NPDES Permits. Compliance schedules must lead to compliance "as soon as possible," (40 C.F.R. § 122.47(a)(1)), and must comply with specific requirements including: (1) if the compliance schedule exceeds one year, it must include interim compliance deadlines; (2) interim deadlines must be no more than one year apart; and (3) if the time necessary for completion of any interim requirement is more than one year and is not readily divisible into stages for completion, the permit shall specify interim dates for the submission of reports of progress toward completion of the interim requirements and indicate a projected completion date. (40 C.F.R. § 122.47(a)(3).) Despite this clear language, several WMPs fail to both set interim milestones and set ultimate compliance within a reasonable timeframe.

For example, Upper Reach 2 permittees propose to *begin* Regional BMP construction in 2028 in the main stem and sometime before 2024 in the Rio Hondo segment; completion is set for 2037 and 2028 respectively.[47] It is unreasonable for permittees to *begin* construction on BMPs 12 to 16 years after the adoption of the Permit, especially where permittees are inappropriately relying on future legislative and or policy actions for the first several years of the permit term. Further, permittees set ultimate compliance with RWLs for 2037 in the Upper Reach 2 WMP and 2040 in the Los Cerritos Channel WMP.[48] In the Los Cerritos Channel WMP, the proposed 2040 deadline applies to coliform bacteria, among other pollutants, which is a 303(d) listed and high priority pollutant under the permit. Similarly, Los Cerritos Channel permittees set the final

[46] *See, e.g.,* Upper Reach 2 WMP, at 56, 105 (discussing use of utility transmission and freeway corridors).
[47] *See* Upper Reach 2 WMP, at 73, 98.
[48] *See* Upper Reach 2 WMP, at Table 1-6; Los Cerritos Channel WMP, at 6-1.

compliance date for trash as 2025 while Trash TMDLs for nearby watersheds have final compliance deadlines of 2015 and 2016.[49] The majority of deadlines are set arbitrarily and WMPs fail to include adequate explanation of such long compliance periods or the failure to prioritize 303(d) pollutants such as trash and bacteria. Permittees must set reasonable deadlines that occur "as soon as possible" and in no event longer than existing deadlines.

Moreover, in several instances, permittees incorrectly set interim limits for TMDL compliance for TMDLs that are past due and subject to final compliance limitations currently. For example, the Lower San Gabriel River WMP establishes an interim limit for pollutants subject to the San Gabriel River metals and selenium TMDL.[50] However, this TMDL, which has been in effect since 2007, sets numeric WLAs based on the California Toxics Rule ("CTR") (40 C.F.R. 131.36(d)(10)) criteria. Compliance schedules for CTR-based limits are authorized through the Inland Surface Water Plan ("ISWP"), which only authorizes compliance schedules for a maximum of 10 years from the time CTR criteria were first promulgated and states that no discharger can be given a compliance schedule to meet CTR criteria after May 18, 2010.[51] The interim limits for TMDL compliance in the WMP are therefore not authorized, and the Lower San Gabriel River WMP, or other WMPs implementing similar CTR based criteria must be revised to demonstrate immediate compliance for these pollutants.

Finally, despite the unreasonably long compliance deadlines the permittees have given themselves, many nevertheless fail to meet even these generous timelines. For example, compliance deadlines have been exceeded for the following local TMDLs, which are currently not in compliance: Santa Monica Bay Beaches Bacteria (both summer dry weather and winter dry weather); Malibu Creek and Lagoon Bacteria (both summer dry weather and winter dry weather); Ballona Creek, Ballona Estuary, and Sepulveda Channel Bacteria (dry weather); Los Angeles River Nitrogen Compounds and Related Effects.

[49] See Regional Board, Res No. 2004-023, March 4, 2004 (Ballona Creek Trash TMDL); Regional Board, Res. No. 2007-012, Aug. 9, 2007 (Los Angeles River Trash TMDL).
[50] Lower San Gabriel River WMP, at 2-1.
[51] State Board Resolution No. 2000-15, Policy for the Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California, at 19; see also October 23, 2006 EPA Letter re: California SIP, Compliance Schedule Provisions; State Board Memo dated September 15, 2006 Re: CTR Compliance Schedules; State Board Resolution No. 2008-0025 at 4; Final Staff Report, State Board Resolution No. 2008-0025 at 10; Final Response to Written Comments, State Board Resolution No. 2008-0025 at 6, 9, 10, 18-19, 26.

G. Modifications to previously noted deficiencies in the Low Impact Development and Green Streets requirements should be discussed

The 2012 Permit provides permittees additional time to submit draft WMPs if permittees demonstrate that final LID ordinances and green street policies are in place and if permittees continue to implement their existing storm water management programs in the interim (2012 Permit, at VI.C.4.c.) All of the MS4 permittees submitted notices of their intent to develop these policies and take the additional time allotted in June 2013. Heal the Bay reviewed draft LID and Green Streets requirements that were submitted to the Regional Board by the permittees' in their Notices of Intent and submitted a letter to the Regional Board on November 4, 2013 describing deficiencies with many of the drafts.[52] In response, the Regional Board issued memoranda to the permittees on January 24, 2014 and April 16, 2014 articulating concerns about some areas not meeting the 2012 Permit's requirements in Part VI.D.7-Planning and Land Development Program.[53]

The memos asked the permittees to make modifications to their LID and green streets submissions such as to include reference documents in WMPs that address technical specifications such as BMP design and maintenance; removing proposals for permittees to grant "waivers" for certain projects without any BMP implementation; and clarifying alternative compliance options to ensure permittees comply with 2012 permit requirements. Most of the WMPs do not discuss how, if at all, permittees have responded to the concerns outlined in the Regional Board memoranda. These elements need to be addressed to ensure compliance with the 2012 Order and to demonstrate that the time extension for permittees to submit their WMPs was, in fact, warranted.

Although not addressed in the Regional Board's memoranda, we remain concerned that meaningful green street projects may not be implemented during the permit cycle. This is particularly relevant in light of permittees raising budgetary constraints as an excuse for not implementing green streets projects and the presence of only vague implementation triggers. We believe that these off-ramps do not meet the intent of the Order's requirements.

[52] Heal the Bay letter to Mr. Sam Unger, Executive Officer, Los Angeles Regional Water Quality Control Board. November 4, 2013.

[53] Memorandum from Mr. Samuel Unger, Executive Officer, Los Angeles Regional Water Quality Control Board to Los Angeles County MS4 Permittees. "Los Angeles County MS4 Permit Early Action Requirements for Permittees Pursuing an Enhanced Watershed Management Program or 18-month Watershed Management Program – Low Impact Development Ordinances and Green Streets Policies." January 24, 2014; Memorandum from Mr. Samuel Unger, Executive Officer, Los Angeles Regional Water Quality Control Board, to Los Angeles County MS4 Permittees. "Comments on Low Impact Development Ordinances and Green Street Policies." April 16, 2014.

Further, we are in general concerned that permittees are not proposing to go beyond the minimum requirements to take full advantage of these types of policies. Implementing policies that expand threshold triggers for projects or increase the performance standard, for example, would increase the policies' impact on pollution reduction. This is a missed opportunity for many permittees.

H. Common Deficiencies Identified in Monitoring Plans

Environmental Groups have also identified several areas in which permittees have failed to include required elements in their draft monitoring plans, particularly with respect to supplying necessary information and proposing sufficient monitoring for outfalls.

1. Lack of Appropriate Maps

Under the Permit, a Coordinated Integrated Monitoring Program ("CIMP") is required to provide a map (preferably in GIS) with relevant information about the monitoring plan including receiving waters, catchment drainages and outfalls, subwatershed boundaries (i.e., HUC 12), land uses, and the proposed receiving water monitoring stations for both dry weather and wet weather receiving water monitoring. (2012 Permit, at E-14.) Well-drawn maps may be helpful in assessing a CIMP's value, as well as a monitoring program's effectiveness or lack thereof. An absence of useful maps may impede the ability of regulators and the public to identify exceedances, TMDL noncompliance and the sources of contaminants.

Many of the submitted CIMPs include very few maps (*see*, e.g., the Lower San Gabriel River CIMP, which includes only two maps), and the vast majority of the maps that were included fail to meet a large number of the Permit's requirements. In contravention of the requirements, most of the included maps are illegible or barely legible, poorly labeled, and generally lack the required information and detail necessary to assess a monitoring program's adequacy with respect to Permit objectives. The included maps also fail to identify much of the information required by the 2012 Permit, including land uses, receiving waters, and HUC 12 units. For example, the Los Cerritos Channel CIMP contains four small maps, none of which identifies any of the aforementioned required information. Similarly, the Lower San Gabriel River and Lower Los Angeles River CIMPs' maps fail to identify land uses or HUC 12 units (and therefore whether the number of monitored outfalls meets the requirements), and are not fully legible.

2. Inadequate and Unrepresentative Monitoring

The Permit requires monitoring of at least one major outfall per subwatershed (HUC 12) drainage area on a set schedule, a requirement with which some CIMPs fail to comply. (2012 Permit, at E-21.) For example, in the Lower Los Angeles River CIMP, stormwater outfall monitoring will expressly fail to comply with MS4 outfall requirements for at least the next three years. Only two of the four required monitoring sites currently exist,

and the additional two additional sites will not be added for two years.[54] It should also be noted that a number of the CIMPs fail to identify applicable TMDL monitoring requirements as required under the 2012 Permit.[55] (2012 Permit, at E-4.)

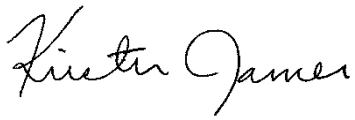
Additionally, under the 2012 Permit, outfalls selected for monitoring "shall be representative of the land uses within the Permittee's jurisdiction." (2012 Permit, at E-21.) However, compliance with this requirement is not at all clear from the figures and language of many of the CIMPs. For example, while the Los Cerritos Channel CIMP does lay out the watershed acreage under various uses (i.e., low-density residential, high-density residential, commercial, industrial) and claims to have completed a land-use overlay for mapping, it fails to provide maps or measurements indicating the land uses of the drainages to outfalls, and whether they are representative of the land uses within the jurisdiction.[56]

IV. Conclusion

In addition to the general comments above, comments specific to selected WMPs and monitoring plans are attached as Exhibits A-E. Environmental Groups appreciate this opportunity to comment on documents submitted under the LA MS4 Permit. Please feel free to contact us with any questions or concerns you may have.

Sincerely,

Johanna Dyer
Staff Attorney
Natural Resources Defense Council



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[54] Lower Los Angeles River CIMP, at 9.
[55] See, e.g., the Los Cerritos Channel CIMP (failing to identify TMDL compliance requirements).
[56] Los Cerritos Channel CIMP, at 10, 51.

Exhibit A: Lower San Gabriel River Watershed

I. Draft Watershed Management Program

In reviewing the Lower San Gabriel River Watershed Draft Watershed Management Program, we identified several issues of concern or noncompliance with permit requirements. We discuss a number of those concerns below, although this discussion is not intended as an exhaustive analysis of the WMP's deficiencies.

A. **Watershed Characterization**

The WMP's characterization of current pollutant loading in the Lower San Gabriel River watershed is, in general, based on data and analysis of conditions in the main stem San Gabriel River, which is almost entirely upstream of the LSGR watershed and therefore may vary in pollutant composition and concentration from lower areas of the watershed.[1] Differences in land use, and potential runoff volumes in the heavily developed LSGR watershed must thus be addressed, quantitatively or qualitatively, in the WMP to account for differences from the areas where data were collected.

B. **Water Body Pollutant Characterization and Compliance Deadlines**

Permittees incorrectly identify pollutants subject to the San Gabriel River Metals and Selenium TMDL as "Category 1B" pollutants subject to "Interim deadlines within permit term."[2] This TMDL, which has been in effect since 2007, sets numeric WLAs based on the California Toxics Rule ("CTR") (40 C.F.R. 131.36(d)(10)) criteria. Compliance schedules for CTR-based limits are authorized through the Inland Surface Water Plan ("ISWP"), which only authorizes compliance schedules for a maximum of 10 years from the time CTR criteria were first promulgated, and states that no discharger can be given a compliance schedule to meet CTR criteria after May 18, 2010.[3] The interim limits for TMDL compliance in the WMP are therefore not authorized, and these pollutants should be categorized as "Category 1F" pollutants which are "Past final deadlines."[4]

It is also unclear how the WMP's classification of sub-categories were created. For example, past final TMDL deadlines are a lower category than final deadlines that fall within the Permit term.[5] Non-compliance with TMDL past final deadlines should be the highest priority in WMPs. A discussion of the relevant sub-categories should be included in the LSGR WMP.

[1] John L. Hunter and Associates (June 27, 2014) Lower San Gabriel Watershed Management Program, at 2-14 et seq.("Lower San Gabriel River WMP").
[2] *Id*. at 2-1.
[3] State Board Resolution No. 2000-15, Policy for the Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California, at 19; see also October 23, 2006 EPA Letter re: California SIP, Compliance Schedule Provisions; State Board Memo dated September 15, 2006 Re: CTR Compliance Schedules; State Board Resolution No. 2008-0025 at 4; Final Staff Report, State Board Resolution No. 2008-0025 at 10; Final Response to Written Comments, State Board Resolution No. 2008-0025 at 6, 9, 10, 18-19, 26.
[4] *See*, Lower San Gabriel WMP, at 2-1.
[5] *Id*.

C. Assumptions Regarding Pollutant Reduction

The Reasonable Assurance Analysis ("RAA") for the LSGR[6] states that "a 10 percent load reduction was assumed to result from implementation of all nonstructural control measures outlined in the WMPs."[7] The RAA provides no evidence or justification to support this claim**,** and in general, the programs identified to meet this reduction are not fully defined.

Similarly, the Lower Rivers/Channel RAA states that "a 10% load reduction is *assumed* to result from the cumulative effect of nonstructural BMPs. Also, the effects of a 25 percent reduction in irrigation of urban grass was explicitly simulated in the model to estimate the resulting associated reduction of dry weather flows at the RAA Assessment Points."[8] The RAA claims that a 25 percent reduction in irrigation water will result in a roughly 60 percent reduction in overall dry weather pollutant loadings.[9] No justification or evidence is provided to support these claims, which given their large claimed potential effect, have a correspondingly large potential for negative impact if proven wrong. The RAA must provide quantitative justification for its non-structural/irrigation related pollutant reduction claims, including greater detail regarding non-structural control practices and implementation plans, or the Regional Board must reject them as unsupported.

D. Reliance on Other Processes for Pollution Reduction

Lower San Gabriel River permittees disproportionately rely on future legislative or policy changes to reduce current pollutant loads and to justify proposed management actions. For example, they rely on SB 346, legislation related to copper brakes, to reduce copper loading and comply with RWLs or copper limits in Metals TMDLs.[10] While Environmental Groups also anticipate copper reduction over the next decade as SB 346 is implemented, the permittees must demonstrate through modeling or some other mechanism the extent of the legislation's predicted

[6] Tetra Tech and Paradigm Environmental (June 6, 2014) Reasonable Assurance Analysis for Lower Los Angeles River, Los Cerritos Creek, and Lower San Gabriel River ("Lower Rivers/Channel RAA").
[7] *Id*. at 46.
[8] *Id*. at 51.
[9] *Id*.
[10] *See e.g.* Lower San Gabriel River WMP at 3-2, 3-29. The permittees estimate a 45-60 percent reduction in copper runoff as a result of SB 346 implementation, but fail to provide site-specific analyses to substantiate those claims or to demonstrate how the legislation will enable permittees to meet interim or final WQBELs or RWLs. (Lower San Gabriel River WMP, at 3-2). The Los Cerritos Channel Watershed Group commissioned a study, "Estimate of Urban Runoff Copper Reduction in Los Angeles County," but failed to attach it to the WMP, making the group's claims difficult to evaluate further. (Los Cerritos Channel WMP, at 3-4). Further, this figure would appear to contradict figures claimed by the group's RAA, which states, "the Brake Pad Partnership commissioned several technical studies to better quantify the fate and transport of copper to San Francisco Bay including a detailed source assessment. Overall findings of the study estimated that of the anthropogenic sources of copper, approximately 35 percent are attributed to brake pad releases." (Lower Rivers/Channel RAA at 38.)

impact in the relevant sub-watersheds so that they can determine what further action may be necessary.

Even more speculatively, permittees mention the regulation of zinc in tires through potential legislation, which has yet to be drafted or passed.[11] Referring to such potential measures as part of a pollution control program is inappropriate, as there is no guarantee that the legislation will ever be adopted.

E. Reliance on Other Parties for Pollution Reduction

The Lower Rivers/Channel RAA states that, in developing target runoff and pollutant reduction targets for the watershed permittees:

> Each jurisdiction in the Group's WMP area is subject to stormwater runoff from non-MS4 facilities. . . . It will be important for these entities to retain their runoff and/or eliminate their cause/contribution to receiving water exceedances. The runoff from these non-MS4 facilities was therefore estimated and subtracted from the cumulative volume reduction goal (Section 7) to establish the MS4 responsible targets.[12]

However, the permittees are prohibited, through implementation of a WMP, from causing *or contributing* to an exceedance of the Permit's RWLs. In the event that these non-MS4 sources continue to add pollutant load to area receiving waters, the WMP groups' contributions based on their adjusted targeted reduction may nevertheless result in an exceedance, and their assumption that non-MS4 sources will actually eliminate their contribution to receiving water exceedances is improper.

F. Lack of Specificity for Proposed Projects

The 2012 Permit requires that, "[e]ach plan shall include…[f]or each structural control and non-structural best management practice, the number, type, and location(s) and/or frequency of implementation." (2012 Permit, at VI.C.5.b.iv(4).) Permittees must also specify interim milestones and dates for achievement for each structural and non-structural BMP. (*Id.*) Although hundreds of *potential* BMP sites for regional or street right-of-way sites were identified in the LSGR WMP, the LSGR permittees do not provide any specifics on BMP type, location, or size. While the Lower Rivers/Channel RAA does present an allocation of BMPs or BMP treatment capacity within subwatersheds for each municipal permittee, it does not give further information as to proposed location or other required details.

[11] *See*, Lower San Gabriel River WMP, at 3-35.
[12] Lower Rivers/Channel RAA, at 52.

II. Draft Coordinated Integrated Monitoring Plan

A. Lack of Appropriate Maps

Maps provided in the draft coordinated integrated monitoring plan ("CIMP") for the Lower San Gabriel River watershed[13] are insufficient for evaluating the monitoring plan. The Monitoring and Reporting Program requires specific spatial information to be included with submitted CIMPs. (2012 Permit, at E-20). Although Table 10-3 of the CIMP points to maps and database information included with the draft CIMP, many of these elements (*e.g.* land use overlay) are missing from plan submission.[14] CIMP submittal without these necessary elements does not allow for adequate analysis of proposed monitoring locations and does not comply with MS4 Permit requirements.

B. Receiving Water Monitoring

The Lower San Gabriel River CIMP states that "Stormwater outfall sites are intended to ensure representative data by monitoring at least one outfall per major subwatershed (HUC 12) drainage area and assuring that drainage areas for each selected outfall are representative of the land uses within the Permitee's jurisdiction. The drainage areas of the outfall monitoring sites are representative of a wide variety of land uses within the LLSG including residential, commercial and industrial."[15] However, compliance with this requirement is not at all clear from the figures and language of the CIMP, and must be substantially enhanced to ensure compliance with Permit requirements.

[13] Kinetic Laboratories, Incorporated (June 28, 2014) Coordinated Integrated Monitoring Program for Lower San Gabriel Watershed Group ("Lower San Gabriel River CIMP")
[14] *See*, Lower San Gabriel River CIMP, at 68.
[15] *Id.* at 14.

Exhibit B: Lower Los Angeles River (LLAR)

I. Draft Watershed Management Program

In reviewing the Lower Los Angeles River Draft Watershed Management Program, we identified several issues of concern or noncompliance with permit requirements. We discuss a number of those concerns below, although this discussion is not intended as an exhaustive analysis of the WMP's deficiencies.

A. **Water Body-Pollutant Classification**

It is unclear how the WMP's classification sub-categories were created. For example, past final TMDL deadlines are determined to be a lower category than final deadlines that fall within the Permit term[1]. According to the 2012 Permit, non-compliance with past TMDL final deadlines should be the highest priority in WMPs. A discussion of sub-categories must be included in LLAR's WMP.

E. coli is classified as a Category 1C pollutant for the LAR Reaches 1 and for Compton Creek.[2] However, *E.coli* bacteria are classified as Category 1E for these waterbodies.[3] These conflicting statements create confusion, and the LLAR WMP needs to be adjusted to clarify this discrepancy.

The classification of trash for the LAR Estuary (wet and dry) is incorrect as listed in the WMP, where trash in the LAR Estuary is classified as category 2A, which is reserved for 303(d) listed non-legacy pollutants with no applicable TMDL[4]. However, the LAR Trash TMDL specifically addresses trash in the estuary. The LAR Trash TMDL Basin Plan Amendment Resolution explicitly states the TMDL "includes Waste Load Allocations that would ensure attainment of standards in the Estuary"[5]. Therefore the trash impairment for the LAR Estuary should also be classified as 1C.

pH should also be classified as Category 1 instead of 2D for the LAR Reach 1, Compton Creek and the Rio Hondo. Category 2D is reserved for 303(d) listed indicators with no applicable

[1] John L. Hunter and Associates (June 27, 2014) Lower Los Angeles River Watershed Management Program at 2-1 ("LLAR WMP").
[2] LAR WMP, at 2-3.
[3] *Id.* At 2-7.
[4] *See,* LLAR WMP, at 2-1.
[5] State Board Resolution No. 07-012, Amendment to the Water Quality Control Plan for the Los Angeles Region to Incorporate a Total Maximum Daily Load for Trash in the Los Angeles River Watershed, August 9, 2007.

TMDL; however the 303(d) list states that the LAR Nitrogen Compounds and Related Effects TMDL addresses pH, therefore it should be a Category 1 pollutant.[6]

B. **Water Body-Pollutant Prioritization**

WMPs are required to contain pollutant classifications and prioritization. The draft Lower LAR WMP is deficient in its prioritization discussion. The draft WMP states that the highest Water Quality Priorities ("WQPs") are reserved for, among other things, "Pollutants that are in the same class as a TMDL pollutant".[7] DDT and PCBs impairments are regulated under the Dominguez Channel and Greater Los Angeles and Long Beach Harbor Waters Toxic Pollutants TMDL (*See* 2012 MS4 Permit at Attachment N) and are pesticides; TMDL regulated pollutants have the highest WQP in the Draft WMP[8]. Therefore, since DDT and PCBs are TMDL pollutants and classified as pesticides, it follows that all other classified pesticides should be prioritized at the highest level. However, the draft LLAR WMP categorizes chlordane, diazinon, and chlorpyrifos as only having high WQP.[9] Chlordane, diazinon, and chlorpyrifos need to be classified as highest priority in the WMP. Furthermore, along the same line of argument, PAHs are classified as SVOCs and are regulated under the same TMDL as DDT and PCBs. Therefore, all other classified SVOCs should be classified at the same WQP, which is the highest WQP. However, bis(2-ethylhexyl)phthalate, another classified SVOC, is only classified at the high WQP.[10]

C. **Reliance on Other Processes for Pollution Reduction**

The LLAR permittees disproportionately rely on future legislative or policy changes to reduce current pollutants loading to comply with water quality standards. For example, they rely heavily on SB 346, the copper brake pad bill, to reduce copper loading by 45 to 60 percent and comply with copper limits in the Metals TMDL.[11][12] While Environmental Groups also anticipate copper load reduction over the next decade as SB 346 is implemented, the permittees must demonstrate through modeling or some other mechanism the extent of the legislation's predicted impact in the relevant sub-watersheds so that they can determine what further action is necessary. Even more

[6] *See*, http://www.waterboards.ca.gov/water_issues/programs/tmdl/2010state_ir_reports/01096.shtml#4238.
[7] LLAR WMP at 2-43.
[8] LLAR WMP, Table 2-21 at 2-44 and 2-45.
[9] *Id.* at 2-13.
[10] *Id.* at 2-45.
[11] Based on the Los Cerritos Channel Watershed Group commissioned study, "Estimate of Urban Runoff Reduction in Los Angeles County from the Brake Pad Copper Reductions Mandated by SB 236", but it was not attached to the WMP and is therefore difficult to evaluate (LLAR WMP at 3-2).
[12] *See*, LLAR WMP, at 3-2.

speculative, permittees repeatedly mention potential legislation, which has yet to be drafted or passed, to regulate zinc in tires.[13]

D. **Watershed Control Measures**

Initial source control through nonstructural BMPs is assumed to result in a 10% load reduction. What data is there to support this 10% load reduction?[14]

It is unclear where trash nets and full capture devices are located within Long Beach's jurisdiction, as details are not provided in Table 3-5 of the Draft WMP.[15] More clarification and a map of their location should be provided, as these control measures are necessary for compliance with the Los Angeles River Trash TMDL.[16]

The proposed LAR Estuary bacteria load reduction strategy implementation schedule is inappropriately long for compliance with the Los Angeles River Estuary Bacteria TMDL. Permittees propose, "Submit[ting] Load Reduction Strategy (LRS) to Regional Board" by March 23, 2023 for TMDL compliance. The WMP should justify the 2023 deadline for submittal of the implementation plan. Other permittees and their associated LAR segments under the adopted Bacteria TMDL are required to submit LRS between 2014 and 2018.[17]The proposed LRD needs to be consistent with other LAR segments as well as follow LAR Bacteria TMDL interim and final deadlines.

II. Draft Coordinated Integrated Monitoring Program (CIMP)

A. **Stormwater Outfall Monitoring**

The permittees propose outfall monitoring at four monitoring sites in the WMA that are representative of land use, however there is no map with proposed storm drain outfall monitoring sites overlaid with land use . How can we be certain that chosen outfall locations are truly representative of land uses if necessary information and/or evaluation is not included in submitted draft monitoring plans? Additionally, although the unlabeled table on page 10 indicates current land uses within selected outfalls drainage areas, it does not address how these outfalls relate to overall land use in the watershed management area.[18] A discussion comparing outfall drainage area land use with watershed management area land uses is necessary to comply with stormwater outfall based monitoring requirements of the Monitoring and Reporting Program.[19]

[13] *Id.* at 3-2, 3-37, 3-42.
[14] *See*, LLAR WMP, at 3-3, 5-1.
[15] *Id.* at 3-24.
[16] *Id.*at 3-24.
[17] *Id.* at 3-28.
[18] Kinetic Laboratories, Incorporated (June 28, 2014) Coordinated Integrated Monitoring Program for Lower Los Angeles River ("LLAR CIMP") at 9-10.
[19] LLAR WMP, at E-21.

B. **Deficiency of Included Maps for CIMP Evaluation**

Maps provided in the draft CIMP are insufficient for evaluating the monitoring plan. For example, Figure 3-1: Monitoring Locations in the Lower Los Angeles River Watershed is difficult to interpret.[20] It is unclear exactly what this map is representing. Furthermore, outfall catchment areas must be included in Figure 3-1 to identify drainage areas for monitoring locations.

The CIMP should be amended to clearly state that stormwater outfalls will be monitored during the *first* qualifying storm event of each wet season as outlined in the 2012 MS4 Permit.[21] Further description of how the remaining two storm events sampled each year will be determined should also be included in the final CIMP.[22]

C. **Non-Stormwater Outfall Monitoring Constituent Elimination**

The draft CIMP states that "if monitoring demonstrates that discharges do not exceed any WQBELs, non-stormwater action levels, or water quality standards for pollutants identified on the 303(d) list after the first year, monitoring of the pollutants meeting all receiving water limitation will be no longer necessary"[23].This statement contradicts 2012 Permit requirements on pg. E-28 of the Monitoring and Reporting Program. Before eliminating non-stormwater pollutant monitoring, the 2012 MS4 Permit requires Permittees to submit a request to the Regional Board for approval. Language denoting Regional Board approval of constituent monitoring reduction following first year monitoring data must be included in the CIMP.

D. **Non-Stormwater Outfall Monitoring Frequency**

The 2012 MS4 Permit specifies that non-stormwater outfall monitoring shall occur at least four times per year. The draft CIMP states that dry weather TMDL receiving water monitoring will be conducted quarterly in the first year, and since receiving water monitoring requires two dry weather monitoring events per year, in all subsequent years outfall monitoring will also only take place twice a year. It is unclear what connection receiving water monitoring frequencies have to outfall monitoring, and regardless, the proposed outfall monitoring frequency is inconsistent with the 2012 MS4 Permit.[24]

[20] *See,* LLAR CIMP, at 12.
[21] 2012 Permit, at E-22.
[22] LLAR CIMP at 16.
[23] *Id.* at 81.
[24] *Id.* at 82.

Exhibit C: Los Angeles River Upper Reach 2 (LAR UR2)

I. Draft Watershed Management Program

In reviewing the Los Angeles River Upper Reach 2 Draft Watershed Management Program, we identified several issues of concern or noncompliance with permit requirements. We discuss a number of those concerns below, although this discussion is not intended as an exhaustive analysis of the WMP's deficiencies.

A. Water Quality Characterization and Source Assessment

The Los Angeles River Upper Reach 2 ("LAR UR2") draft WMP's source assessment is insufficient. Almost all data used in the assessment and planning come from outside the LAR UR2 Watershed Management Area ("WMA"), yet permittees fail to acknowledge the differences between the project area and the area from which the data were collected. The LAR UR2 WMA is one of the most heavily developed and industrialized areas in the watershed and greater Southern California and would be expected to generate higher runoff volumes and pollutant concentrations than the county as a whole. The draft WMP contains no acknowledgement or adjustment, quantitative or qualitative, for this consideration.

The 2012 Permit specifically requires that pollutant sources be identified using information from findings of illicit connections, illicit discharge elimination programs, industrial/commercial facilities programs, and development construction programs. (2012 Permit, at section VI.C.5.a.iii.1.a). However, the draft WMP fails to include this information.

Further, in addition to the TMDL source investigations, compliance monitoring and special studies discussed in the draft WMP, permittees should include the number of facilities covered under the Industrial General Permit and the annual average number of construction permits within each city jurisdiction. In addition, acknowledgement of the aging condition of the sanitary sewer system ("SSO") and the number of SSOs recorded in the watershed area, as well as their volume over at least the last 10 years should be included in the sources assessment. Review of other potential pollutant sources such as homeless encampments and illegal dumping should be evaluated and discussed.

The pollutant source assessment included in the WMP, as required by the permit and RAA guidance, is rudimentary and not at all specific to the LAR UR2 watershed. The WMP quotes various literature references relative to bacteria, metals, nitrogen, phosphorus, and pH but does not apply the findings to the watershed and includes no conclusions that could guide formulation of strategies and selection of BMPs. For oil, the analysis fails to rise to even that basic level. At a minimum, the assessment should have reached all corners of the watershed to see if particular hot spots should receive greater attention.

The LAR UR2 WMP states that according to the Los Angeles River Trash TMDL, "The amount and type of trash that is washed into the storm drain system appears to be a function of the

surrounding land use"[1]. The draft WMP should go on to describe the land use within the LAR UR2 WMA and associated trash generation rates. No modeling or discussion of hotspots or further investigation is provided in the draft WMP. The source assessment lacks specificity and does not meet the 2012 Permit requirements "to include known and suspected sources of pollutants" (2012 Permit, at section VI.C.5.a.iii.1.c.).

B. Water Body-Pollutant Classification/Prioritization

The LAR UR2 WMP is deficient and inconsistent in that it fails to discuss Category 3 classifications on the basis that "all available water quality data was obtained downstream of LAR UR2 WMA, therefore its applicability is unknown"[2]. However, the LAR UR2 WMP later lists various pollutants as Category 3 in Table 2-7.[3] Furthermore, the WMP lists a number of pollutants applicable to the LAR UR2 WMA but that are not 303(d) listed or associated with a TMDL.[4] All of these documented exceedances not regulated under a TMDL or 303(d) should, by the permittees' own admission, be classified as Category 3 pollutants. Following a complete and accurate classification of Category 1-3 pollutants, there must be accurate and complete prioritization thereof.

C. Watershed Control Measures

LAR UR2 WMP states that enhanced, non-modeled non-structural BMPs (such as enhanced street sweeping, enhanced catch basin and storm drain cleaning, enhanced commercial and food outlet inspections, enhanced pet waste controls, enhanced homeless waste controls, and enhanced illicit discharge detection elimination efforts) can be "assumed" to lead to a five percent reduction from baseline loads for all pollutants, based on input from the Regional Board.[5] The WMP, however, must justify how the five percent reduction figure was determined. It is also not clear what cities in the watershed management area will implement which enhanced BMPs and when. It is possible that many of these control measures may have already been implemented during the last MS4 permit cycle, but the WMP does not clarify which measures have been carried out. The WMP should also discuss how enhanced non-modeled non-structural BMPs differ from already implemented control measures, to ensure that modifications to the current MCM program will be implemented in a timely fashion, and during the permit cycle.

1. Structural Controls

Permittees identify six potential regional structural projects in the LAR UR2 draft WMP, but actual project designs have not been developed. Only conceptual design attributes (with potential timelines far in the future) were used for RAA modeling, and[6] the load reductions attributed to

[1] California Watershed Engineering (June 26, 2014) Los Angeles River Upper Reach 2 Watershed Management Program (WMP) Plan, at 33 ("LAR UR2 WMP").
[2] LAR UR2 WMP, at 30.
[3] *Id.*at 34.
[4] *Id.* at 26.
[5] *See,* LAR UR2 WMP, at 67 and 82.
[6] LAR UR2 WMP, at 82.

these six structural BMPS are therefore speculative. It cannot be relied on that the conceptual BMPs will or can be implemented to achieve the design attributes necessary to meet target load reductions.

Given that the six regional structural BMPs proposed are infiltration systems (two infiltration trenches and four subsurface infiltration systems), the soil class and depth to ground water are important considerations.

II. Reasonable Assurance Analysis

A. Reliance on Other Processes for Pollution Reduction

The draft WMP emphasizes that the nutrient TMDL was primarily directed at wastewater recovery plants and has been implemented. However, the permittees are responsible parties under the TMDL, yet provide no further detail on this point or any actions they have undertaken or plan to undertake.

LAR UR2 permittees rely too heavily on a Site Specific Objective study to address metals TMDL listings for copper and lead, which has yet to be adopted by the Regional Board.[7] RAA model iterations should include scenarios without Site-Specific Objective study inclusion to identify necessary control measures in the event that the study is not adopted by the Regional Board.

B. Selection of Regional BMPs

In the draft WMP, the main criteria for identifying regional BMPs sites were: (1) at least 0.5 acres available, (2) a maximum distance to a storm drain of 100 feet and (3) public ownership.[8] In identifying regional BMP sites, there was no consideration of new public land acquisition or public-private partnerships to increase siting opportunities. Thus, this is an incomplete analysis.

C. Model Calibration

The LAR UR2 draft WMP and RAA report fails to demonstrate model calibration. The RAA guidelines specifically highlight "model calibration and validation [as] necessary and critical steps in model application."[9] The RAA merely makes two statements regarding model calibration, stating that:

"…the LAR UR2 WMA Reasonable Assurance Analysis (RAA) demonstrates, through a calibrated model, that Water Quality Objectives (WQOs) will be met through implementation of

[7] *Id.* at 20 and 78.
[8] *Id.* at 56.
[9] Tetra Tech and Paradigm Environmental (June 6, 2014) Reasonable Assurance Analysis for Lower Los Angeles River, Los Cerritos Creek, and Lower San Gabriel River, at 12 ("Lower Rivers/Channel RAA").

the action in this Plan"[10] and, "target load reductions were established using the calibrated LSPC watershed model for the TMDL pollutants total nitrogen, total copper, total lead, total zinc, and fecal coliform."[11]

The brief discussion leaves many details unexplained, such as how RAA models were calibrated and what data was used to calibrate the model. The final WMP must include a more robust discussion of model calibration.

II. Draft Coordinated Integrated Monitoring Plan

A. Receiving Water Monitoring

No receiving water sampling location was selected for the Rio Hondo watershed. At least one receiving water monitoring location for the Rio Hondo Reach 1 within the WMA should be included and should be located downstream of the Ford Park outfall monitoring location. Instead, permittees selected a major outfall to be monitored that drains 70 percent of the WMA of the Rio Hondo Reach 1. However, during wet weather monitoring, a receiving water sample of the Rio Hondo will be necessary in order to determine compliance with Rio Hondo specific wet TMDLs and receiving water limitations in wet weather. The 2012 MS4 Permit requires that receiving water be monitored a minimum of three times per year during wet weather conditions and at minimum two times per year during dry weather conditions[12]. If the Rio Hondo Reach 1 happens to run dry during the driest months, then the monitoring reports and data may reflect that, but establishing a receiving water monitoring site is required and necessary to assess whether water quality objectives are being achieved.

B. Outfall Monitoring – Stormwater

Figure 1-5 of the WMP identifies only the MS4 drainage system and LCFCD outfalls. The map does not include the catchment areas of each outfall as required[13]. Outfall catchment area is used to evaluate: (1) CIMP effectiveness to identify pollutant loading sources; (2) whether outfall locations are representative of land use; and (3) whether the appropriate number of outfall locations are included in monitoring program. The exclusion of outfall catchment area delineations hinders essential monitoring review and assessment.

Seven wet-weather outfall monitoring sites are selected: one Rio Hondo location, to be monitored three events a year, and six sites in the Los Angeles River watershed area, to be monitored on a rotating basis so that only two sites will be monitored during any given wet

[10] *See*, LAR UR2 WMP, at 1.
[11] *Id.* at 72.
[12] 2012 Permit, Attachment E-MRP, at E-15, E-16.
[13] California Watershed Engineering (June 26, 2014) Los Angeles River Upper Reach 2 Watershed Management Area Coordinated Integrated Monitoring Program (CIMP), at 7 ("LAR UR2 CIMP").

weather event. While the MS4 Permit allows for an alternative approach to increase the cost efficiency and effectiveness of the monitoring program, the proposed monitoring scheme does not meet the minimum requirements. The monitoring scheme description fails to discuss the justification for rotating monitoring sites, as well as whether all sites are representative of the same land uses. Each Permittee is required to monitor at least one major outfall per subwatershed (HUC12) drainage area at minimum three times per year, including the first rain event of the year. Therefore each of the seven monitoring sites should be monitored three times per year, as the permit specifies.[14]

The most prevalent land use in LAR UR2 WMA is industrial (42.41% industrial, with the next most prevalent land use being multi-family residential at 16.98%[15]), however no monitoring location representative of primarily industrial land use was selected in the CIMP. As noted in the permit, outfall monitoring must be representative of land uses.[16] LAR U2 is one of the most heavily developed and industrialized areas in the watershed. Therefore, monitoring outfall location(s) representative of industrial land use need to be included in the CIMP.

Table 4-7 of the WMP must include suspended-sediment concentration as it is required to be monitored if receiving water is listed on the CWA section 303(d) list for sedimentation/siltation/turbidity, hardness, pH, dissolved oxygen, temperature and specific conductivity.[17]

C. Maps and Database

Drainage patterns and catchment areas of major outfalls are absent from Figure 1-5 of the WMP.[18] This information is used for assessment of the outfall locations in the CIMP. The land use map Figure 1-3 is not legible and thus makes it difficult to interpret the watershed spatially.[19]

The CIMP is also missing several required documents: the Effective Impervious Area (EIA) overlay, the notation of outfalls with significant NSW discharges (to be updated annually), and linking each mapped MS4 outfall to a database containing descriptive and monitoring data associated with the outfall."[20]

[14] *See*, 2012 Permit, Attachment E-MRP at E-21.
[15] LAR UR2 CIMP, table 1-1 at 1.
[16] 2012 Permit, Attachment E-MRP, at E-21.
[17] *Id.* at 42.
[18] *Id.* at 7.
[19] *Id.* at 4.
[20] *Id.* at 26.

Exhibit D: Los Cerritos Channel Watershed

Draft Watershed Management Program

In reviewing the Los Cerritos Channel Draft Watershed Management Program, we identified several issues of concern or noncompliance with permit requirements. We discuss a number of those concerns below, although this discussion is not intended as an exhaustive analysis of the WMP's deficiencies.

I.

A. Water Quality Priorities, Water Body Pollutant Characterization

Some of the water body-pollutant classifications and prioritizations included in the Los Cerritos Channel Watershed ("LCC") WMP are inadequate. For example, the LCC WMP does not include aluminum as a Category (1) target despite that it is in the same "class" as other metals and has a similar fate and transport mechanism. Data demonstrate that aluminum has long exceeded RWLs in the LCC, and the Channel is on the 303(d) list of impaired waters.[1] Permittees should therefore re-prioritize and ensure that selected control measures designed to control metals under the Metals TMDL will also address aluminum.

Furthermore, LCC permittees fail to prioritize ammonia as a pollutant because it has been proposed for de-listing, and fail to prioritize pH because permittees would "like to work with Regional Board staff… to delist pH…," despite a lack of resolution or public process on the issue.[2] Regardless of permittees' hopes for future delisting, both ammonia and pH are 303(d) listed pollutants that warrant prioritization in LCC's WMP.

B. Minimum Control Measures

Pollutant Reduction Loading: The RAA states that non-structural controls were assumed to result in 10% load reductions.[3] However, it is unclear from the draft WMP where these assumptions originate, or whether data exist to support them.

Industrial/Commercial Facilities: This section must be more specific on how "high" and "low" priority facilities will be categorized.[4] Although the WMP does go into some detail, the adequacy and accuracy of this analysis is uncertain. Notably, citations to particular tables are incorrect for the purposes of determining high and low priority facilities. For example, the WMP states that Table 3-3 should be used to make the prioritization,[5] when in fact Table 3-3 references a street sweeping survey, not facilities and inspections prioritization.[6] The correct reference could possibly be to Table 4-4 although, critical information in Table 4-4 is completely absent;

[1] Richard Watson & Associates, Inc. (June 28,2014) Los Cerritos Channel Watershed Management Program ("Los Cerritos Channel WMP"), at 2-5.
[2] *Id.* at 5-3.
[3] Tetra Tech and Paradigm Environmental (June 6, 2014) Reasonable Assurance Analysis for Lower Los Angeles River, Los Cerritos Creek, and Lower San Gabriel River, at 46 ("Lower Rivers/Channel RAA").
[4] Los Cerritos Channel WMP, at 4-3.
[5] *Id.* at 4-12.
[6] *See,* Los Cerritos Channel WMP, at 3-15 for Table 3-3.

figure ICF-1, the "Industrial/Commercial Facility Prioritization Scheme[,]" is blank.[7] This figure is central to prioritization as it establishes "a method for each City to prioritize all industrial/commercial facilities into three tiers – High, Medium and Low."[8] Lastly, the prioritization method included in the WMP allows for too much flexibility in prioritization, as it allows cities to "follow an alternative prioritization method provided it results in a similar three-tiered scheme." (WMP at 4-13) We are concerned this flexibility may result in inadequate inspections and water quality protection.

C. Deadlines for Compliance

Although permittees are responsible parties under the Harbor Toxics TMDL, the WMPs do not include a schedule or interim deadlines for achieving compliance.

Under the WMP, the ultimate deadline for compliance with receiving water limitations is 2040. This time period is unconscionably long and the WMP provides no justification for this length of time.

D. Reliance on Other Processes for Pollution Reduction

LCC permittees indicate that, rather than addressing bacteria directly, they will wait and evaluate how controls targeting *other* pollutants impact *E. coli* levels in receiving waters.[9] Such an evaluation method is unacceptable; permittees should evaluate existing BMPs for effectiveness and determine what additional controls are necessary now to achieve receiving water limitations. This is especially true for high priority 303(d) pollutants such as bacteria.

LCC permittees disproportionately rely on future legislative or policy changes to reduce current pollutant loads and to justify proposed management actions. For example, they rely on SB 346, relating to copper brakes, to reduce copper loading and comply with copper limits in the Metals TMDLs.[10][11] While Environmental Groups also anticipate copper reduction over the next decade as SB 346 is implemented, permittees must demonstrate, through modeling or some other mechanism, the extent of the legislation's predicted impact in the relevant sub-watersheds in order to determine whether further action may be necessary. Even more speculatively, permittees mention the regulation of zinc in tires through potential legislation, which has yet to be drafted or passed.[12]. Referring to such potential measures as part of a pollution control program is inappropriate, as there is no guarantee that such legislation will ever be adopted.

[7] Los Cerritos Channel WMP, at 4-13.
[8] Los Cerritos Channel WMP, at 4-13.
[9] *See, e.g.* Los Cerritos Channel WMP, at 5-3.
[10] *Id.*at 3-4, 5-1.
[11]The Los Cerritos Channel Watershed Group commissioned a study, "Estimate of Urban Runoff Copper Reduction in Los Angeles County," but failed to attach it to the WMP, making the group's claims difficult to evaluate further. (Los Cerritos Channel WMP, at 3-4).
[12] *See*, Los Cerritos Channel WMP, at 3-5, 5-2.

Although the LCC watershed is not subject to a Trash TMDL, permittees fail to propose trash controls despite current impairments and the 303(d) listing of trash. Instead, permittees delay action until the statewide trash policy is approved by the State Board. This delay and reliance on future policy is unacceptable. Permittees must address 303(d) pollutants in their WMPs as a high priority.[13]

Non-Stormwater Discharge Measures

This section relies almost entirely on water conservation measures without providing adequate justification for the reliance. Permittees do not include specific measures that will be employed to eliminate non-stormwater discharges and do not include milestones or deadlines.

Specific Plan Components

LCC's WMP states that member cities "will endeavor to incorporate" green infrastructure into redevelopment, green streets, retrofit LID, and stormwater capture and reuse; however little detail is given on plans for implementation.[14] How will these control measures be prioritized? What is the proposed implementation schedule?

II. Draft Coordinated Integrated Monitoring Plan

A. Receiving Water Monitoring

Permittees propose to sample at LCC1 during two dry weather and three wet weather events each year. This is insufficient because the LCC Metals TMDL requires wet weather monitoring during four storm events.[15]

Sampling must include the constituents listed in Table E-2 in the first year and first storm event. If the E-2 constituents are not detected, permittees will no longer be required to monitor for that constituent. However, the CIMP incorrectly states that sampling will cease for constituents that are not detected "or if the results are below the lowest applicable water quality objective."[16] This statement must be amended as only "non-detect" results release the permittees from future monitoring for a particular constituent. In addition, permittees should add that all minimum parameters must continue to be sampled, including: flow, TMDL pollutants with WLAs, 303(d) List pollutants for receiving waters or downstream receiving waters, Total Suspended Solids (TSS) and Suspended-Sediment Concentration (SSC) if the receiving water is listed on the CWA section 303(d) list for sedimentation/siltation/turbidity, hardness, pH, dissolved oxygen, temperature, and specific conductivity (inland water bodies), Aquatic Toxicity (twice per year, one during the first storm of year).

B. Outfall Monitoring - stormwater

[13] 2012 MS4 Permit at VI.C.a.ii.
[14] *See*, Los Cerritos Channel, at 3-7.
[15] Kinetic Laboratories, Incorporated (June 27, 2014) Los Cerritos Channel Coordinated Integrated Monitoring Program, at 12 ("Los Cerritos CIMP").
[16] Los Cerritos Channel CIMP, at 12,

Permittees identify four primary outfall monitoring locations. This number of monitoring locations is insufficient because each permittee is required to include outfall monitoring in at least one major outfall per subwatershed (HUC 12) drainage area.

Exhibit E: Santa Monica Bay Watershed; the City of Los Angeles Area within Jurisdiction Group 7

I. Draft Watershed Management Program

In reviewing the Santa Monica Bay Watershed, Jurisdiction 7 Draft Watershed Management Program, we identified several issues of concern or noncompliance with permit requirements. We discuss a number of those concerns below, although this discussion is not intended as an exhaustive analysis of the WMP's deficiencies.

A. Watershed Management Program

The City of Los Angeles Area within Jurisdiction Group 7 for the Santa Monica Bay Watershed is pursuing a Watershed Management Program ("WMP") to fulfill its MS4 Permit obligations. Due to its relatively small footprint, geographical constraints, and zero required load allocations, the group did not propose new structural BMPs in its draft WMP submittal. In addition, the group did not conduct a quantitative Reasonable Assurance Analysis ("RAA") within its WMP to ensure receiving water limitation compliance in the future. In essence, the only watershed control measures being proposed in the draft plan are Minimum Control Measures, which are primarily requirements of the previous MS4 Permit ("These MCMs are similar to the programs required under the previous MS4 Permit (Order NO. 01-182)").[1] Since the watershed group did not conduct a RAA and is not proposing to implement new structural watershed control measures or specific customized strategies, it is unclear why they are pursuing a Watershed Management Plan instead of meeting strict receiving water limitations pursuant to Part V.A. and with applicable interim water quality-based effluent limitations in Part VI.E pursuant to subparts VI.E.2.d.i.(1)-(3). Based on the watershed assessment in the draft WMP, the numeric approach is a more appropriate mechanism for compliance with the MS4 Permit.

B. Water Quality Priorities, Water Body Pollutant Characterization

In the WMP, water quality data were compared to water quality based effluent limits and/or water quality standards to determine if exceedances occurred within the last five (5) years for Category 3 pollutants.[2] It is unclear why only five years of data was reviewed for classification of Category 3 pollutants when a more robust dataset (over 5 years) was available, and when 10 years of data should likely be reviewed to determine Category 3 pollutants. Also, clarification is needed as to the source of the data and whether it was all from the 2008 Bight survey.

C. Minimum Control Measures Pollutant Load Reduction

The draft WMP notes that institutional BMPs or Minimum Control Measures are anticipated to cumulatively result in pollutant load reductions between 5 percent and 8 percent. However, the

[1] City of Los Angeles, Los Angeles County Flood Control District. (June 27, 2014). Watershed Management Program for Santa Monica Bay Jurisdictional Group 7 with the City of Los Angeles ("Santa Monica Bay J7 WMP"), at 19.
[2] *Id.* at 13.

scientific justification for these expected reduction values is unclear and is not presented in the WMP.

II. Draft Coordinated Integrated Monitoring Program

A. Receiving Water Monitoring for Bacteria TMDL

The draft Coordinated Integrated Monitoring Program ("CIMP") references bacteria monitoring frequency included in the Santa Monica Bay Beaches Bacteria TMDL Coordinated Shoreline Monitoring Plan; however, it does not mention specifics about weekly frequency of sampling. We ask that language from the Bacteria TMDL and/or MRP relating to bacteria shoreline monitoring station sampling frequency be discussed in the final CIMP.

B. Santa Monica Bay Nearshore and Offshore Debris TMDL

The City of Los Angeles conducted a preliminary investigation of industries engaged in manufacturing or using plastic pellets and found no such industries in the watershed management area. We ask this investigation be conducted on a bi-decadal basis or during permit renewal, whichever is sooner, to ensure that a new industry using plastic pellets has not moved into the management area.

The draft WMP discusses implementation of full capture devices in the watershed. In addition, the final CIMP should include a related discussion of operations and maintenance procedures for the devices, as this is a requirement for final TMDL compliance.

C. Wet Weather Receiving Water Monitoring

1) Outfall Monitoring

The Monitoring and Reporting Program (MRP) requires Permittees to monitor Table E-2 pollutants during the first predicted 0.25 inch or greater storm event of the storm year from receiving water monitoring locations. (2012 Permit, at E-16). Also, it requires Table E-2 parameters identified as exceeding the lowest applicable water quality objectives in the nearest downstream receiving water monitoring station per Part VI.C.1.e of the Permit to be monitored during the first storm event. (2012 Permit, at E-23). However, the draft monitoring program does not include these requirements, so they must be specifically discussed in the final program.

2) Dry Weather Receiving Water Monitoring

Dry weather receiving water monitoring is not proposed in the draft CIMP because of the group's small footprint. However, this proposal would not comply with the Santa Monica Bay Bacteria TMDL in Dry Weather. This section must be expanded to address the TMDL waste load.

D. Outfall Monitoring Locations

The group proposes one outfall monitoring site in its Watershed Management Area. It is unclear why the site, SMBJ7-O-6, was chosen instead of another site, known as SMBJ7-O-3. In reviewing drainage maps of both outfalls, it appears that SMBJ7-O-3 is more representative of land uses in the WMA when compared to SMBJ7-O-6; SMBJ7-O-3 includes runoff from commercial land use, while SMBJ7-O-6 does not include commercial runoff.[3] The final CIMP must address all land uses by either including two outfall monitoring locations or by providing the justification for choosing SMBJ7-O-6 over SMBJ7-O-3.

E. Non-Stormwater Outfall Screening and Monitoring, Significant Discharges

According to the draft CIMP, based on review of available information, identification of significant non-stormwater discharges is not available at this time.[4] However, it is unclear how the draft CIMP defines "significant discharges," as several methods could be used to determine significance under the MRP. Furthermore, the watershed group identified *E. coli* and flow as the primary characteristics for screening and determining significant non-stormwater discharges.[5] We are concerned that *E. coli* was selected as the representative pollutant, as it is not representative of all constituents found in runoff (i.e. metals, organics, nutrients, etc.). This decision requires further scientific justification.

F. Non-Stormwater Outfall Screening and Monitoring, Identify Source and Monitoring

The MS4 Permit specifies that non-stormwater outfall monitoring shall occur at least four times per year. (2012 Permit, at E-28). The draft CIMP states that dry weather TMDL receiving water monitoring is only required twice a year, therefore non-stormwater outfall monitoring will only be conducted twice per year. It is unclear which TMDL the draft CIMP is referencing as well as how outfall monitoring and receiving water monitoring frequencies relate to one another. The final CIMP should address this discrepancy.

Furthermore, the draft CIMP states that "if monitoring demonstrates that discharges do not exceed any WQBELs, action levels or water quality standards for pollutants identified on the 303(d) List, monitoring will cease at the outfall(s) after the first year."[6] This proposal is inconsistent with the MS4 Permit MRP, as Permittees are required to submit a request to the Regional Board for constituent elimination following first year monitoring data.

[3] City of Los Angeles, Los Angeles County Flood Control District. (June 27, 2014) Monica Bay JG7 Watershed Management Plan Group ("Santa Monica Bay J7 CIMP"), at 17.
[4] Santa Monica Bay J7 CIMP, at 25.
[5] *Id.* at 26.
[6] *Id.* at 29.

G. Toxicity Methodology

The MS4 Permit requires permittees to conduct sensitivity screening for a vertebrate, an invertebrate, and a plant species to identify the most sensitive species for toxicity testing. If there is prior knowledge of potential toxicants and a test species is sensitive to such toxicants, then monitoring shall be conducted using that species. (2012 Permit, at E-32). The CMIP states that *Macrocystis pyrifera* (giant kelp) collection challenges during wet weather and *Atherinops affinis* (topsmelt) survival and growth test duration limitations (7 days) necessitates the removal of these species from initial sensitivity screenings.[7] This reasoning for not conducting toxicity testing for giant kelp and topsmelt is unjustified. The MS4 Permit does not allow for screening challenges or limitations to lead to exclusion from sensitivity screening. These species should be included in the monitoring program's sensitive species screening and selection.

The CIMP does not include wet weather freshwater chronic toxicity testing because "[u]tilization of chronic tests to assess wet weather samples generates results that are not representative of receiving water conditions."[8] This statement is unsubstantiated; receiving water pollutant loading can last up to seven days during and following rain events. In addition, both acute and chronic toxicity testing must be conducted to identify stormwater impacts on aquatic species. Thus, freshwater chronic testing must be included in the CIMP. Furthermore, we suggest considering *Hyalella azteca* for acute freshwater testing.

[7] *Id.* at B-19.
[8] *Id.* at B-20

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August 18, 2014

Mr. Sam Unger
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California Regional Water Quality Control Board, Los Angeles Region
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Re: Comments on the Draft Individual Watershed Management Plan for the City of El Monte and its associated Integrated Monitoring Program

Dear Mr. Unger:

On behalf of Heal the Bay, we are writing with regard to the Draft Individual Watershed Management Plan ("WMP") and its associated Integrated Monitoring Program ("IMP") for the City of El Monte ("permittee") submitted in accordance with the National Pollutant Discharge Elimination System ("NPDES") Permit for Municipal Separate Storm Sewer System ("MS4") Discharges Within the Los Angeles County Flood Control District, Including the County of Los Angeles, and the Incorporated Cities Therein, Except the City of Long Beach, R4-2012-0175, NPDES Permit No. CAS004001 ("2012 Permit").

In reviewing the City of El Monte's WMP and IMP submittal, we identified several issues of concern or noncompliance with permit requirements. We discuss a number of those concerns below, although this discussion is not intended as an exhaustive analysis of the WMP's deficiencies.

General WMP Comments

There is little to no evaluative data provided on the implementation of past MS4 requirements. For example, SUSMP, IC/ID, public education, and other elements have all been MS4 requirements for at least the last 13 years; yet there is no data or descriptive analysis provided by the City in its WMP or IMP on implementation efforts or effectiveness. If cities are not evaluating past practices, nor implementing an iterative process on any of the existing tools, then it is extremely difficult for stakeholders to evaluate programs, policies, or projects proposed to address water quality or watershed issues. Past practices are often the best indicator of future success or failure.

There is no integrated water resource planning and little watershed based management planning in the draft WMP. Despite the fact that California is in a drought, there is little discussion on flow/volume reductions, reuse opportunities, or landscaping ordinances to name a few elements.

Heal the Bay

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Specific WMP Comments

Section 1.3 Discharge Water Quality Characterization (p. 1-9): Without a statistical or analytical assessment of the 38 drainage outlets and their respective land-uses, the reasoning behind the selection of the two drainage outlets for the entire city is unclear. The selected drainage outlets account for only 15% of the City's entire land area. Further, sub-watershed, land-use, major outfall, catch basin and drain line maps (Figures 1.2, 1.4, 1.5, and 1.6, respectively) included in the WMP should be combined into one map to allow for a proper spatial analysis. The current mapping approach in the WMP is confusing and hard to interpret. Combining maps will allow for baseline assessment needed for statistical and analytical analyses of land-use and associated flow generation and pollutant loadings.

Hardness was not included as one of the sample analytes. Any time metals are sampled, hardness data should be collected. Simply relying on a default number, does not accurately depict the availability of the metal to the aquatic life in the specific waterbody.

Several of the water quality sampling results are questionable and necessitated additional sampling. For instance, a "non-detect" value for total suspended solids during a wet weather event does not make sense. Also, finding a lower nutrient concentration in wet weather than in dry weather is unusual. Both of these findings should have led to re-sampling, yet it does not appear that this occurred. Thus, the use of these data points is questionable.

Section 1.4 Watershed Characterization (p.1-13): The City provides no information on the biological or habitat functions for the waterbodies in its watersheds (Rio Hondo, San Gabriel River, Legg Lake, Peck Road Park Lake). This is a necessary analysis, as the receiving waterbodies have biological beneficial use designations.

Also, there is no literature review of past water quality, watershed, or habitat data collected by the City or other stakeholders to help inform the Reasonable Assurance Analysis ("RAA"), particularly as they pertain to biological beneficial uses and the associated water quality objectives. This could lead to an incomplete analysis.

Section 1.7 Prioritization (p. 1-19): Without any analysis of land-uses associated with drainage areas and only using one dry-weather and one wet-weather sample to populate the RAA, RAA model outputs are questionable. There is no confidence interval or power analysis completed in the RAA, as it relates to limited sampling, to provide any statistical certainty regarding the values generated. Yet, the WMP states that "Based on finding of the source assessment, the water quality issues will be prioritized…"[1] Without any statistical or analytical criteria to measure power, validity, calibration, or confidence, the City's approach is subject to great error in their characterization of pollutant loading, BMP implementation, and any evaluative metrics for determining compliance.

[1] Draft Watershed Management Program City of El Monte, California, at 1-19.

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Section 1.9 RAA (p. 1-26): Using only one water quality sample per sub-watershed per weather condition to populate the Watershed Management Modeling System (WMMS) model for the RAA is unjustified, as it does not provide any level of statistical certainty or power needed for any model-run or confidence interval model output without a large standard deviation. In addition, there is no description of either dry or wet weather sampling events, such as antecedent rain events, size of the storm monitored, type of sample collected—grab or flow weighted. Without this information, the samples used for the RAA modeling may be biased or not representative of actually pollutant loading.

> **Section 1.9.1 Modeling Requirements (p. 1-27):** There is no sound reasoning to use total suspended solids as a surrogate for nutrients when developing a loading estimate. Without any citations to confirm that total suspended solids is an appropriate surrogate for nutrients, or a peer-reviewed methodology for determining a conversion factor, the data produced for the nutrient values should be rejected by the Regional Board.

Specific IMP Comments

1.3.1 Receiving Water Monitoring Program (p.1-2): The IMP states that "The proposed monitoring locations will provide representative measurement of the effects of the City's MS4 discharges on receiving waters because the land-use in the areas of discharging upstream of the monitoring sites are representative of the City's land use." However, without a statistical or analytical assessment of the 38 drainage outlets and their respective land-uses, it is scientifically unsound and without merit to select two drainage outlets to be representative of the pollutant loading for the entire city. In addition, without any data provided on the regional watersheds' land-uses, it is impossible to substantiate the City's claim that the two sites are in fact similar to region-wide land-use.

1.3.2 Storm Drains, Channels, and Outfall Maps and / or Database (p.1-4): The City did not provide adequate drainage maps in the IMP to fulfill permit requirements. This is particularly concerning, as this information is critical to evaluate if monitoring locations are representative of land use; how can appropriate review of the IMP occur when permit requirements have not been met? Additionally, only a third of the drainage outlets (13 of 38 outlets) were analyzed in the IMP. With two-thirds of the analysis incomplete, how can the City know with any certainty that the two sampled drainage outlets are representative of all 38 drainage outlets and their associated land-uses? Without such analysis, how can the City determine appropriate BMP implementation, education, projects or policy objectives?

1.3.4 Non-Storm Water Outfall Based Screening and Monitoring: The 2012 Permit defines significant outfalls on pg. E-24 of the Monitoring and Reporting Program. How is "significant" defined in the submitted IMP? There appears to be some discrepancy between approaches. Additionally, of the 12 outfalls initially screened that were visible, nine (75%) appeared to have some level of water draining from them with vegetated growth. While not a "significant" volume was observed, as defined by the permittee, there was still a discharge present.

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Given that illicit connections/ illicit discharges ("IC/ID") removal has been a requirement of past MS4 permits, screening for non-storm water outfall screening should have been already completed. Thus, the City should already have a significant understanding of non-stormwater discharges and IC/ID. Further, IC/ID should not be treated as if it were a new element, which could possibly justify training and a slow roll-out. The City should be implementing an integrated water resource planning program to capture and reuse permitted anthropogenic non-stormwater discharges so they do not reach receiving waterbodies.

1.3.4.1 Inventory of Outfalls: GIS maps of the sewage conveyance system and pumps should be part of this analysis.

1.3.4.3 No Further Assessment: What is the definition of "non-significant flow"? Small volumes of water can have significant concentrations of pollutants. Simply relying on flow as the only marker for problem drainage outlets may insufficiently characterize the problem.

1.3.4.9 Sampling Methods: What is the justification for only sampling subsequent storm events of greater than one-inch after the first storm has been sampled? Subsequent storm events that are less than one-inch after the "first flush" can have pollutant loadings or wet weather contributions on-par with the "first flush" if enough dry weather days have occurred between storm events. Furthermore, this approach is not consistent with 2012 Permit requirements. How will flow be estimated where flow measuring equipment is not in place?

Thank you for this opportunity to provide comments and if you have any questions please contact us at (310) 451-1500.

Sincerely,

Kirsten James, MESM
Science and Policy Director, Water Quality

James Alamillo
Urban Programs Manager

Ventura Countywide Stormwater Quality Management Program

Participating Agencies

Camarillo

County of Ventura

Fillmore

Moorpark

Ojai

Oxnard

Port Hueneme

San Buenaventura

Santa Paula

Simi Valley

Thousand Oaks

Ventura County Watershed Protection District

August 18, 2014

Los Angeles Regional Water Quality Control Board
320 W. Fourth Street, Suite 200
Los Angeles, CA 90013

SUBJECT: SUPPORT FOR COORDINATED INTEGRATED MONITORING PLANS OF LOS ANGELES RIVER UPPER REACH 2, LOWER LOS ANGELES RIVER, EAST SAN GABRIEL VALLEY, LOWER SAN GABRIEL RIVER, LOS CERRITOS CHANNEL, SANTA MONICA BAY, AND ALAMITOS BAY/LOS CERRITOS CHANNEL

Dear Ms. Purdy:

The Ventura Countywide Stormwater Quality Management Program (Program) supports the submitted Coordinated Integrated Monitoring Plans (CIMPs) designed with the flexibility to meet the water quality priority needs of the Watershed Management Areas (WMA).

The Program's partner agencies include the Ventura County Watershed Protection District, the County of Ventura and the cities of Camarillo, Fillmore, Moorpark, Ojai, Oxnard, Port Hueneme, Ventura, Santa Paula, Simi Valley, and Thousand Oaks. These organizations operate municipal storm drain systems and discharge stormwater and urban runoff pursuant to the Ventura Countywide 2010 NPDES Stormwater Permit. The Program is committed to working cooperatively to improve water quality, and have been monitoring water quality in receiving waters since 2001 and outfalls since 2009. Our MS4 outfall monitoring program was among the first in the state.

Adaptive management is essential for an effective stormwater program, and monitoring programs require flexibility to provide useful information to guide management decisions. Flexibility in monitoring locations, frequencies, parameters and methods is vital to appropriately addressing and answering monitoring questions. WMAs should be allowed to focus resources on water quality priorities in a cost effective manner, this includes the design and implementation of the monitoring program. The CIMPs submitted reflect a degree of flexibility necessary for adaptive management.

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It is the mission of the Ventura Countywide Stormwater Quality Management Program to enhance, protect and preserve water quality in Ventura County using proactive and innovative ideas for preservation of biodiversity, ecological viability and human health. The Program recognizes and supports the crucial role an effective and adaptable coordinated integrated monitoring program plays in the continued efforts towards our goal of enhanced water quality.

Sincerely,

Gerhardt Hubner
Chair

Construction Industry Coalition on Water Quality

August 18, 2014

Mr. Ivar Ridgeway, Chief, Storm Water Permitting
Los Angeles Regional Water Quality Control Board
320 West 4th Street, Suite 200
Los Angeles, CA 90013

Via Email: losangeles@waterboards.ca.gov

RE: LA County MS4 Permit—Comments on XXXXX EWMP/WMP

Dear Mr. Ridgeway:

The Construction Industry Coalition on Water Quality (CICWQ) is submitting comments concerning the preparation of Watershed Management Program Plans for seven watershed management groups and ten individual cities in Los Angeles County (Watershed Management Plans or Plans). These plans are also accompanied by Coordinated Integrated Monitoring Program Plans. We are submitting this letter on behalf of the CICWQ membership, which is described below.

CICWQ is an advocacy, education, and research 501(c)(6) non-profit group of trade associations representing builders and trade contractors, home builders, labor unions, landowners, and project developers. CICWQ membership is comprised of members of four construction and building industry trade associations in southern California: The Associated General Contractors of California, Building Industry Association of Southern California, Engineering Contractors Association, and Southern California Contractors Association, as well as the United Contractors located in San Ramon. Collectively, members of these associations build a significant portion of the transportation, public and private infrastructure, and commercial and residential land development projects in California.

In preparing this comment letter, we have reviewed seven watershed group and ten individual city Watershed Management Plans and their thousands of pages of combined content. Our comments are informed by our membership's collective experience and through CICWQ's years of involvement in the development of regulatory requirements for managing municipal stormwater discharges in the Los Angeles region.

Our intent here, rather than to comment on each group or individual city Plan specifically, is to provide input based on some common themes and elements contained in the Plans, or to provide suggestions for additional considerations in Plan content. While the Notice of Opportunity for Public Comment memo (dated July 3, 2014) from the Regional Board notes that "Late submittal of written comments will not be allowed,"

we respectfully submit to the Regional Board that this statement is in complete opposition to the very nature of the Watershed Management Plan implementation principle of "Adaptive Management." We hope the Regional Board will take note of this contradiction, and continue to allow dischargers and other stakeholder to continually submit, as necessary, for Regional Board consideration, suggestions for Watershed Management Plan improvements as implementation proceeds.

Comments from CICWQ concern four primary areas: (1) Compliance Approach for the Construction Industry Contained within Group and Individual Watershed Management Plans; (2) Regulatory Basis for Compliance; (3) Aggregation of Watershed Management Plan Data is Necessary to Understand the Entirety of the Compliance Obligation; (4) The Timing of Monitoring and Capital Expenditures for Monitoring Should Be Commensurate with Installation of Appropriate Best Practices.

I. Compliance Approach for the Construction Industry Contained within Group and Individual Watershed Management Plans.

After review of the seven watershed group and ten individual Plans, CICWQ appreciates the application of the General Permit for Storm Water Discharges Associated with Construction and Land Disturbance Activities, Order No. 2012-XXXX-DWQ; NPDES No. CAS000002 (CGP) as the means for construction industry water quality regulatory compliance. The use of the CGP approach throughout Los Angeles County allows for consistent application of appropriate best management practices for the construction industry.

II. Regulatory Basis for Compliance

We note that only two of the seven group Plans reference the Maximum Extent Practicable (MEP) standard, using the iterative approach, as the basis for Clean Water Act water quality regulatory compliance. A majority of the ten individual city plans address the appropriateness of citing the underlying MEP compliance standard, which we appreciate and support. We respectfully suggest that all Watershed Management Plans make the MEP standard clear.

III. Aggregation of Watershed Management Plan Data is Necessary to Understand the Entirety of the Compliance Obligation

After a review of the 17 different group and individual Watershed Management Plans, it is our recommendation that Regional Board staff provide aggregation of important physical, hydrological, demographic, best practices implementation, and cost data, and place the data collected in context with the entirety of the MS4 permit compliance obligation that is theoretically being addressed through the preparation of Watershed and Enhanced Watershed Management Plans. At the current time, there is no clear comprehensive picture of what is being proposed, and what the proposal will cost. There are 17 different plans prepared, with no understanding of their interconnections.

IV. The Timing of Monitoring and Capital Expenditures for Monitoring Should Be Commensurate with Installation of Appropriate Best Practices

Reviewed collectively, the group and individual Plans all appear to place a heavy emphasis and requirement to monitor stormwater discharges during wet weather events at hundreds and perhaps even thousands of locations throughout Los Angeles County. However, the Plans all generally either state that existing TMDLs and/or other water quality impairments within three priority pollutant control areas are being effectively addressed at the current time through the implementation of structural or institutional/operational control best practices, or require some additional installation of optimized and focused networks of regional and distributed BMPs to achieve water quality compliance requirements (defined through the RAA process).

Requiring extensive and costly stormwater discharge monitoring at the outset of watershed plan implementation is counter intuitive and, in our opinion, a waste of financial resources and should be performed in opposite order. Only after the planned networks of regional and distributed best practices are implemented over the years should additional monitoring be required, as this would then inform the Regional Board and stakeholders of effectiveness at an appropriate time. Requiring more and expensive monitoring at this time is both unnecessary and unhelpful to achieving compliance. Current monitoring programs have demonstrated where impairments or problem areas exist very clearly, and the RAA done for all the Plans acknowledges this fact and lays out a modeled approach for meeting water quality objectives through implementation of existing structural and operational controls and planned structural best practices for installation at a future date. Monitoring is needed when additional best practices are in place, not vice versa. We urge the Regional Board to re-think and change its approach to monitoring.

CICWQ's membership is in the forefront of water quality regulation, providing to water quality regulators practical ideas and solutions that are implementable and that have as their goal clean water outcomes. If you have any questions or want to discuss the content of our comment letter, please feel free to contact me at (951) 781-7310, ext. 210, (909) 525-0623, cell phone, or mgrey@biasc.org.

Respectfully submitted,

Mark Grey, Ph.D.
Technical Director
Construction Industry Coalition on Water Quality

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From:	Joyce Dillard
To:	WB-RB4-losangeles
Subject:	LA County MS4 Permit -Comments on WMP Watershed Management Programs and Monitoring Programs due 8.18.2014
Date:	Monday, August 18, 2014 4:25:41 PM

AMBIENT WATER QUALITY STANDARDS

City of Carson IMP states:

> *Though the SWAMP should be responsible for performing ambient monitoring, it is not known when, if ever, it intends to conduct ambient monitoring in these reaches. In the meantime, the City recognizes that the ambient monitoring approach will yield accurate data needed to evaluate the beneficial uses and facilitate compliance with ambient TMDL WLAs and other water quality standards.*

City of Gardena IWMP states:

> *It should be noted that there are no outfall data to demonstrate at this point in time that any municipal Permittee is currently not meeting a TMDL waste load allocation (WLA) or, for that matter, any other water quality standard. In fact, it may take several years of monitoring at the outfall and ambient (dry weather) data collected from receiving waters before additional BMPs can be prescribed.*

We agree and question why this permit is ignoring that aspect of the Clean Water Act that protects Public Health and Safety. The initial Ambient Water Quality Standard is the baseline for reaching compliance on behalf of the public. First it is the identity of beneficial uses and then the setting of water quality standards to those uses for each water body.

Antidegradation is an issue after compliance.

OUTFALLS & RECEVING WATERS

City of El Monte IRP states:

> *The City is in the process of developing and maintaining an electronic inventory of MS4 outfalls and identifying those with known, significant non-storm water discharges and those requiring no further assessment.*

And

City of Carson IMP states:

> *It should be noted that the 9th Circuit Court of Appeal in NRDC v. LACFCD*

made it very clear that the compliance determinant for MS4 discharges is at the outfall – not the receiving water. The 9th Circuit agreed with a lower federal court ruling that held violations cannot be determined in the receiving water because of evidentiary challenges -- how can one prove that a Permittee caused exceedances in receiving waters which also receive stormwater discharges from other sources? The 9th Circuit also said if a violation is to be determined it must be based on discharges from the outfall.

We applaud that this El Monte has gone so far as to inventory, but we question whether all the cities have the capability to electronically inventory their assets. The outfall point is the federal definition and this permit should follow federal law. We listened to the Supreme Court arguments and this agency should recognize they are responsible for a "good permit" as the courts will not write one for them, but kick back the issue to be satisfied with the law.

NON STORMWATER DISCHARGES

City of Irwindale IWMP states:

The City's most serious concern with the non-stormwater compliance with TMDLs and other water quality standards is that compliance must be absolute. If a non-stormwater WLA is not met it will be in violation. There is no iterative process that is applied to nonstormwater discharges, a point that was established in State Board order 2009-0008.

This mitigation for non stormwater discharges can be in the billions of dollars with no proven effect on water quality. We do not believe the intent of this permit should be for water supply, but for water quality under the Clean Water Act.

LACK OF SCIENCE

City of Lawndale IWMP states:

The City notes that the California Water Board's Regional Bio-assessment Monitoring conducted under its Surface Ambient Water Quality Monitoring Program (SWAMP) for the period 2009 – 2013 is a more accurate assessment of the condition of the receiving waters in Southern California than TMDLs. The Regional Bio-assessment determines stream condition using multiple lines of evidence including the California Rapid Assessment Method (CRAM), benthic algae, and benthic macro invertebrate community. TMDLs on the other hand are single numerical values that are computed using hydrologic and water quality models, with very little consideration given to their inherent assumptions and uncertainties. It is also significant that the Water Board has not provided error bounds for its TMDLs and water quality criteria that are being used for compliance purposes. The single value TMDLs and water quality criteria in the Order thus do not take into account variations in methodologies and assumptions, which can lead to wide variability in value prediction.7 The science of storm water modeling is not sufficiently advanced to sufficiently predict the water quality and environmental impacts of pollutants

and stressors and the physical, chemical, and biological responses of the receiving water.

Science was supposed to exist as a factor back in 2004 when the City of Los Angeles proposed and the voters passed Measure O Clean Water, Ocean, River, Beach, Bay Stormwater Cleanup aka Prop O. That is not the case ten years later. Extreme amounts of taxpayer dollars has been wasted in non-measurable projects with no ties to clean water. In other words, there is no accountability. This experiment in water quality is not one the citizens can afford.

LID ORDINANCES & GREEN STREETS

City of Lawndale IWMP states:

PLDP changes from Development Planning Program necessitate revisions to developer hand-outs and other informational materials required to facilitate a clear understanding of the new requirements as they relate to: (1) the emphasis on LID; (2) green streets; (3) revised sizing requirements for infiltration controls; (4) source controls; (5) use specific controls; and (6) activity-specific controls. This will require a revision to the existing SUSMP and general guidelines for completing SUSMP requirements.

City of Lawndale may not have old oil fields, but a good portion of this region does. With LID, oil mitigation is forgiven. This presents a clear present danger to the Public Health and Safety. Oil field gas emissions are a problem, as records were not kept on all the oil fields drilled before regulations. South Coast Air Quality Management District is aware of new camera equipment that shows the emissions. LID ordinance would be contrary to the de-watering needed to maintain safety.

SUSMP, in the case of the City of Los Angeles, is the process being abolished and replaced with an ordinance to conform with this permit, not the law.

Green Streets may not be the future for streets as the technology industry is advancing Google-car models with need for electronics under the road surface with steady information being streamed.

This one-sided approach shows no attempt to satisfy identification of outfall violations.

ECOSYSTEM RESTORATION

Los Angeles River Upper Reach 2 Watershed Management Group fails to mention the proposed US Army Corps Ecosystem Feasibility Study and the daylighting of the reaches in the Upper LA River and the change of ambient water quality by the return to a natural bottom.

HOMELESSNESS

Alamitos Bay/Los Cerritos Channel Watershed Management Group CIMP fails to mention any mitigation of homeless encampments. Each permittees cannot solve the problems associated with the presence of human habitants without solutions of housing.

This permit should not be an excuse for a Rain Tax assessment to cover compliance.

MONITORING

Los Cerritos Channel Watershed Management Group CIMP states:

> *Monitoring of storm water runoff and dry weather flows at the Los Cerritos Channel Stearns Street mass emission site over the past 13 years has resulted in the identification of a relatively small list of constituents of concern. Elevated concentrations of total recoverable aluminum, copper, lead and zinc are commonly associated with storm water discharges due to increased sediment loads. Concentrations of these metals are typically associated with elevated sediment concentrations during storm events. Aluminum is expected to be elevated during storm events simply due to the natural abundance of this metal in soils. Although aluminum temporarily exceeds drinking water quality criteria during storm events, it is not considered to be a major constituent of concern. Concentrations of total recoverable lead are also elevated during storm events but concentrations of dissolved lead consistently meet existing water quality objectives.*

With monitoring that does not show a problem, how are forest fire runoff to be addressed. Will the permittees be expected to be financially responsible, as the measure is not at outfalls but at receiving waters?

SOUTHERN CALIFORNIA BIGHT

Santa Monica Bay Watershed Los Angeles Area in Jurisdiction Group 7 has natural coastline conditions such as the Southern California Bight which would make compliance impossible.

US ARMY CORPS OF ENGINEERS

Lower San Gabriel River Watershed Management Group CIMP states:

> *Two long-term receiving water monitoring sites will be monitoring in the LSGR WG. Receiving water quality monitoring at the Coyote Creek ME site, S13, (Figure 3-1) will continue to be conducted by the LACFCD. The LSGR WG will coordinate with the LACFCD for additional TMDL monitoring to also to be conducted at S13. Additional monitoring will be conducted by the LSGR WG at both the San Gabriel River LTA site, GR1.*

Where is the role of the USACE.

Joyce Dillard
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