



Los Angeles Regional Water Quality Control Board

Date: August 7, 2019

Paul Alva Assistant Deputy Director County of Los Angeles Dept. of Public Works 900 South Fremont Avenue Alhambra, CA 91803 VIA EMAIL ONLY

APPROVAL OF ALTERNATIVE BIOFILTRATION SPECIFICATION PURSUANT TO PART VI.D.7.c.iii.(1)(b)(i) OF THE LOS ANGELES COUNTY MUNICIPAL SEPARATE STORM SEWER SYSTEM (MS4) PERMIT (NPDES PERMIT NO. CAS004001; ORDER NO. R4-2012-0175 AS AMENDED BY STATE WATER BOARD ORDER WQ 2015-0075 AND LOS ANGELES WATER BOARD ORDER R4-2012-0175-A01)

Dear Mr. Alva:

On June 5, 2019 the Los Angeles Regional Water Quality Control Board (Los Angeles Water Board) received a letter from the County of Los Angeles (County) requesting approval for the use of Bio Clean Modular Wetlands System (MWS Linear) manufactured by Bio Clean as an alternative biofiltration design specification.

The County's request includes an attachment, entitled "Equivalency Analysis and Design Criteria for Modular Wetlands Systems" (Equivalency Analysis), that details a proposed design approach and equivalency criteria for MWS Linear installations to achieve equivalent performance to the biofiltration design specifications defined in the Los Angeles County MS4 Permit.

Pursuant to Part VI.D.7.c.iii.(1)(b)(i) of the Los Angeles County MS4 Permit, projects using biofiltration as an alternative compliance measure may use alternative design specifications for on-site biofiltration systems if approved by the Los Angeles Water Board Executive Officer.

Background

Part VI.D.7 of the Los Angeles County MS4 Permit requires Permittees to implement a Planning and Land Development Program. As part of this program, Permittees shall require all New Development and Redevelopment projects identified in Part VI.D.7.b (hereinafter "new projects") to control pollutants, pollutant loads, and runoff volume emanating from the project site. Except as provided in Part VI.D.7.c.ii (Technical Infeasibility or Opportunity for Regional Ground Water Replenishment), Part VI.D.7.d.i (Local Ordinance Equivalence), or Part VI.D.7.c.v (Hydromodification), each Permittee shall require new projects to retain on-site the Stormwater Quality Design Volume (SWQDv).

IRMA MUÑOZ, CHAIR | RENEE PURDY, EXECUTIVE OFFICER

Pursuant to Part VI.D.7.c.iii.(1) of the Los Angeles County MS4 Permit, Permittees may allow new projects to use on-site biofiltration when the project applicant has demonstrated that it is technically infeasible to retain 100 percent of the Stormwater Quality Design Volume (SWQDv) on-site. If a Permittee conditions a project using biofiltration due to demonstrated technical infeasibility, then the new project must biofiltrate 1.5 times the portion of the SWQDv that is not reliably retained on-site, as calculated by the following equation:

$$Bv = 1.5 [SWQDv - Rv]$$

Where:

Bv = biofiltration volume

SWQDv = the stormwater runoff from a 0.75 inch, 24-hour storm or the 85^{th}

percentile storm, whichever is greater Rv = volume reliably retained on-site.

As a condition for on-site biofiltration, bioretention/biofiltration systems shall meet the design specifications provided in Attachment H of the Los Angeles County MS4 Permit unless otherwise approved by the Los Angeles Board Executive Officer.

Public Review

On June 20, 2019, the Los Angeles Water Board provided public notice and a 30-day period to allow for public review and written comment on the proposed use of the Bio Clean Modular Wetlands System alternative biofiltration design specification. No comments were received.

Alternative Biofiltration Specification Approval

I hereby approve the County's proposal for the use of the MWS Linear as an alternative on-site biofiltration design specification pursuant to Part VI.D.7.c.iii(1)(b)(i) of the Los Angeles County MS4 Permit, provided the following conditions are met:

- 1. **Vegetative Treatment**: Systems must include vegetation and must be designed such that there is effective treatment due to vegetation (e.g. uptake, chemical transformation, transpiration, treatment from associated microbial activity, etc.).
- 2. **Review**: The County shall ensure that the data relied upon and the conclusions presented in the Equivalency Analysis are appropriate.
- 3. **Sizing:** Systems must be designed and sized following the methodology in Section 4 of the July 2018 Equivalency Analysis document.
- O&M: Operation and maintenance of the MWS Linear must be conducted consistent with the recommendations in the maintenance manual provided by the manufacturer and any revisions thereto.
- 5. **Media**: MWS Linear proprietary media must be provided by the manufacturer. No substitution of these materials/media is allowed.

6. Hydromodification: There is no presumption by this approval that a Permittee's implementation of the abovementioned design parameters and use specifications of the MWS Linear system meet the separate hydromodification requirements of Part VI.D.7.c.iv of the Los Angeles County MS4 Permit. Hydromodification requirements apply regardless of the type of biofiltration system used.

This approval only applies to the use of MWS Linear as an alternative on-site biofiltration design in situations where a project applicant has demonstrated that it is technically infeasible to retain 100 percent of the SWQDv on-site. Furthermore, this approval does not constitute certification or verification of the performance of the MWS Linear since the Los Angeles Water Board does not have a testing and certification program for treatment control BMPs. This approval is given based on the supporting documentation provided in the request and relies on the County's review of the system.

The County shall comply with Maintenance Agreement and Transfer requirements outlined in Part VI.D.7.d.iii of the Los Angeles County MS4 Permit. These requirements include:

- Part VI.D.7.d.iii prior to issuing approval for final occupancy, the County shall require new
 development and redevelopment projects subject to post-construction BMP requirements to
 provide an operation and maintenance plan; monitoring plan, where required; and verification of
 ongoing maintenance provisions for LID practices, treatment control BMPs, and
 hydromodification control BMPs.
- 2. Part VI.D.7.d.iii.(1)(a) verification of post-construction BMP maintenance agreement shall include all the documents included in this provision.
- 3. Part VI.D.7.d.iii.(1)(b) the County shall ensure a plan is developed for the operation and maintenance of all structural and treatment controls. The County shall examine the plan for relevance to keeping the BMPs in proper working order. Furthermore, operation and maintenance plans for private BMPs shall be kept on-site for periodic review by County inspectors.
- 4. Part VI.D.7.d.iv.(c) the County shall verify proper maintenance and operation of post-construction BMPs operated by the County.
- 5. Part VI.D.7.d.iv.(d) for post-construction BMPs operated and maintained by parties other than the County, the County shall require the other parties to document proper maintenance and operations.
- 6. Part VI.D.7.d.iv.(e) the County shall undertake any enforcement as appropriate per the established progressive enforcement policy.

If you have any questions, please contact Ms. Susana Vargas of the Storm Water Permitting Unit at Susana.Vargas@waterboards.ca.gov or by phone at (213) 576-6688. Alternatively, you may also contact lvar Ridgeway, Chief of the Storm Water Permitting Unit, at lvar.Ridgeway@waterboards.ca.gov or by phone at (213) 620-2150.

Sincerely,

Renee Purdy

Executive Officer