STATE OF CALIFORNIA

CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD
LAHONTAN REGION

ORDER NO. R6T-2022-TENTATIVE
NPDES NO. CAG616001

RENEWED WASTE DISCHARGE REQUIREMENTS AND NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES) PERMIT FOR STORM WATER/URBAN RUNOFF DISCHARGES FROM EL DORADO COUNTY, PLACER COUNTY, AND THE CITY OF SOUTH LAKE TAHOE WITHIN THE LAKE TAHOE HYDROLOGIC UNIT

FINDINGS

The California Regional Water Quality Control Board, Lahontan Region (hereinafter referred to as the Water Board) finds that:

A. Discharger Information and Permit History

1. The City of South Lake Tahoe (City), El Dorado County, and Placer County discharge storm water/urban runoff to surface waters of the Lake Tahoe Hydrologic Unit (LTHU). These discharges occur within various hydrologic sub-areas (watersheds) throughout the LTHU. The City, El Dorado County, and Placer County are considered Co-Permittees under this National Pollutant Discharge Elimination System (NPDES) Permit and are referred to collectively as "Permittees." References to the "discharger," "permittee," "co-permittee," or "municipality" in applicable federal and state laws, regulations, plans, or policy are held to be equivalent to references to the Permittees herein.

2. These Renewed Waste Discharge Requirements and NPDES Permit for Storm Water/Urban Runoff Discharges from El Dorado County, Placer County, and the City of South Lake Tahoe will be referred to throughout this Order as the "Permit."

3. Prior to issuance of this permit, storm water discharges from the Permit Area were covered under Order No. R6T-2017-0010, adopted by the Water Board on March 9, 2017.

4. Previously, storm water discharges from the Permit Area were covered under Order No. R6T-2011-0101A1, originally adopted by the Water Board on December 6, 2011, and amended on October 10, 2012.

5. Previously, the discharges were regulated by Order No. R6T-2005-0026, adopted by the Water Board in 2005 which replaced Order No. 6-00-82, adopted by the Water Board in 2000.

6. The Permittees submitted Reports of Waste Discharge and preliminary Pollutant Load Reduction Plans in October 2021, requesting renewal of waste discharge requirements under the NPDES program to permit storm water discharges from municipal storm collection, conveyance, and treatment facilities within their jurisdictions.

B. Permit Area

1. The jurisdictional areas of the City, El Dorado County, and Placer County that fall within the LTHU are considered the "Permit Area." The Permittees are responsible for all storm water/urban runoff discharges in the Lake Tahoe watershed within the LTHU of their respective City and Counties except for runoff generated and conveyed through facilities owned, operated, and maintained by federal, state, regional, or local entities where Permittees lack legal jurisdiction. The Water Board recognizes the permittees should not be held responsible for such facilities and/or discharges.

2. The Water Board will coordinate with the entities not named in this Permit that operate storm drain facilities and/ or discharge storm water to storm drains and receiving waters covered by this NPDES Permit to implement programs that are consistent with the requirements of this Permit.

3. Permittees should work cooperatively to control the contribution from pollutants from one jurisdiction to an adjacent jurisdiction through inter-agency agreements or other formal arrangements.

C. Nature of Discharge

1. Municipal point source runoff discharges from urbanized areas remain a leading cause of impairment of California surface waters. Urban runoff contains wastes, as defined in the California Water Code, and pollutants, as defined in the federal Clean Water Act, and adversely affects the waters of the State and their designated beneficial uses. The most common pollutant categories in urban runoff within the LTHU include total suspended solids, sediment (due to anthropogenic activities); pathogens (e.g., bacteria, viruses, protozoa); nutrients (e.g., nitrogen and phosphorus); oxygen demanding substances (decaying vegetation, animal waste); oil, grease, and other petroleum hydrocarbons; and trash. In general, the pollutants found in municipal storm water runoff can harm human health and aquatic ecosystems.

2. In addition, the high volumes and high velocities of storm water discharged from municipal separate storm sewer systems (MS4s) into receiving waters can adversely impact aquatic ecosystems and stream habitat and cause stream bank

erosion and physical modifications. These changes are collectively termed "hydromodification."

3. Lake Tahoe's deep-water transparency, as measured by the Secchi disk, has been declining since transparency measurement began in the late 1960's. The Lake Tahoe TMDL Report (November 2010) identified elevated levels of very fine sediment (particles less than 16 microns) and increased algal growth rates as the causes of transparency loss. Consequently, the primary pollutants of concern for storm water treatment in the LTHU are the number of fine sediment particles (less than 16 microns) and the mass of nutrients that support algal growth (total nitrogen and total phosphorus).

4. One of the leading sources of very fine sediment particles is roadways. To enhance the safety of motorists in the winter months, the Permittees' winter roadway operations include the application of traction abrasive and deicing materials. If not properly applied and recovered, traction abrasives can be a significant source of the pollutants of concern.

5. Storm water runoff within the Permittees jurisdiction generally flows into pipes and open channels and often passes through pretreatment vaults, treatment basins, and other treatment structures before being discharged to surface waters or land. This Permit describes all storm water management infrastructure maintained by the Permittees as "collection, conveyance, and treatment facilities." For purposes of this Permit, collection, conveyance, and treatment facilities are synonymous with "municipal separate storm sewer systems" or MS4s.

D. Federal, State and Regional Regulations

1. The Water Quality Act of 1987 added § 402(p) to the Clean Water Act (CWA) (33U.S.C. § 1251-1387). This section requires the United States Environmental Protection Agency (U.S. EPA) to establish regulations setting forth NPDES requirements for storm water discharges in two phases.

2. U.S. EPA Phase I storm water regulations were directed at MS4s serving a population of 100,000 or more, and storm water discharges associated with ten categories of industrial activities, including construction activities disturbing more than five acres. In addition, municipalities whose storm water discharges contribute to violations of water quality standards or is a signification contributor of pollutants to waters of the United States may also be issued a NPDES permit under Phase I. Consequently, some MS4s that serve a population below 100,000, such as the Permittees, were brought into the Phase I program by NPDES permitting authorities. The Phase 1 regulations were published on November 16, 1990 (55 Fed. Reg. 47990).

3. U.S. EPA Phase II storm water regulations are directed at storm water discharges not covered in Phase I, including small MS4s (population of less than

100,000) in urbanized areas, small construction projects (less than five acres, but greater than one acre), municipal facilities with delayed coverage under the Intermodal Surface Transportation Efficiency Act of 1991, and other discharges for which the U.S. EPA Administrator or the State determines that the storm water discharge contributes to a violation of a water quality standard, or is a significant contributor of pollutants to waters of the U.S. The Phase II Final Rule was published on December 8, 1999 (64 Fed. Reg. 68722).

4. The CWA allows the U.S. EPA to authorize states with an approved environmental regulatory program to administer the NPDES program in lieu of the U.S. EPA. The State of California is an authorized State. The Porter-Cologne Water Quality Control Act (California Water Code) authorizes the State Water Resources Control Board (State Water Board), through the Regional Water Boards, to regulate and control the discharge of wastes that could affect the quality of waters of the State, including waters of the United States, and tributaries thereto.

5. Under CWA § 303(d), States are required to identify a list of impaired water bodies and develop and implement Total Maximum Daily Loads (TMDLs) for these waterbodies (33 USC § 1313(d)(1)). Lake Tahoe is listed on the CWA § 303(d) impaired water bodies list. On November 16, 2010, the Water Board adopted an amendment to its Water Quality Control Plan to incorporate a TMDL for Lake Tahoe. The amendment was approved by the State Water Board on April 19, 2011, and the TMDL was approved by the U.S. EPA on August 17, 2011. The Basin Plan amendment established pollutant load reduction requirements for urban storm water discharges for fine sediment particles, total nitrogen, and total phosphorus. Permit Section IV incorporates approved load reduction requirements as effluent limits for municipal storm water discharges in the LTHU and requires the preparation of Pollutant Load Reduction Plans to meet established waste load reduction requirements.

6. This Permit does not constitute an unfunded local government mandate subject to subvention under Article XIIIB, Section (6) of the California Constitution as described in Attachment A Fact Sheet.

7. The Water Board adopted a Water Quality Control Plan (Basin Plan) for the Lahontan Region on March 31, 1995. The Basin Plan specifies the beneficial uses of water bodies within the LTHU and contains both narrative and numerical water quality objectives for these waters. The following beneficial uses identified in the Basin Plan apply to all watersheds covered by this Permit:

    a. Municipal and domestic supply,
    b. Agricultural supply,
    c. Water contact recreation,
    d. Non-contact water recreation,
    e. Ground water recharge,
    f. Freshwater replenishment,

g. Navigation,
h. Commercial and sport fishing,
i. Cold freshwater habitat,
j. Wildlife habitat,
k. Preservation of biological habitats of special significance,
l. Rare, threatened, or endangered species,
m. Migration of aquatic organisms,
n. Spawning, reproduction, and development,
o. Water quality enhancement, and
p. Flood peak attenuation/flood water storage.

8. This Permit complies with the federal Antidegradation Policy described in 40 Code of Federal Regulations section 131.12, and State Water Board Resolution No. 68-16, Statement of Policy with Respect to Maintaining High Quality Waters in California. State Water Board Resolution No. 68-16 contains the state Antidegradation Policy, titled "Statement of Policy with Respect to Maintaining High Quality Waters in California" (Resolution 68-16). Resolution No. 68-16 is considered to incorporate the federal Antidegradation Policy (40 CFR131.12) where the federal policy applies, (State Water Board Order WQO 86-17). The Permit requirements are consistent with both state and federal antidegradation policies as set out in Attachment A Fact Sheet.

9. Anti-Backsliding Requirements – Section 402(o)(2) of the Clean Water Act and federal regulations at 40 Code of Federal Regulations section 122.44(l) prohibit backsliding in NPDES permits. Where the requirement applies, a reissued permit's effluent limitations must be at least as stringent as those in the previous permit. All effluent limitations in this Order are at least as stringent as the effluent limitations in the Permittee's previous permit. This Order's Fact Sheet (Attachment A) contains further discussion regarding anti-backsliding.

10. The requirements in this Permit may be more specific or detailed than those enumerated in federal regulations under 40 CFR122.26 or in U.S. EPA guidance. However, the requirements have been designed to implement and be consistent with the federal statutory mandates described in CWA § 402(p)(3)(B)(ii) and (iii) and the related federal regulations and to implement the TMDL for Lake Tahoe through the implementation of the pollutant load reduction requirements for urban storm water discharges for fine sediment particles, total nitrogen, and total phosphorus. Consistent with federal law, all of the conditions in this permit could have been included in a permit adopted by U.S. EPA in the absence of the in-lieu authority of California to issue NPDES permits.

11. On April 7, 2015, the State Water Board adopted an Amendment to the Water Quality Control Plan for Inland Surface Waters, Enclosed Bays, and Estuaries that added "Final Part 1 Trash Provisions" (Trash Amendments). The Trash Amendments require the Water Board to implement these new provisions through NPDES permits issued pursuant to Federal Clean Water Act section 402(p), including this Permit. The water quality objective established by the Trash

Provisions serves as a water quality standard federally mandated under Clean Water Act section 303(c) and the federal regulations. (33 United States Code section 1312, 40 Code of Federal Regulations section 131.) This water quality standard was specifically approved by USEPA following adoption by the State Water Board and approval by the Office of Administrative Law. Further, the water quality standard expected to be achieved pursuant to the Trash Provisions may allow each waterbody subsequently determined to be impaired by trash to not be placed on the Clean Water Act section 303(d) list, obviating the need for the development of a TMDL for trash for each of those waterbodies. (33 United States Code section 1313(c); 40 Code of Federal Regulations section 130.7.). In those cases, the specific actions that will be carried out by the Permittee substitute for some or all of the actions that would otherwise be required consistent with a wasteload allocation in a trash TMDL. (40 Code of Federal Regulations section 122.44, subdivision (d)(1)(vii)(B).

12. California Environmental Quality Act – The issuance of waste discharge requirements and NPDES permit coverage for the discharge of runoff from MS4s to waters of the United States is exempt from the requirement for preparation of environmental documents under the California Environmental Quality Act (CEQA) (Public Resources Code (PRC), Division 13, Chapter 3, section 21000 et seq.) in accordance with Water Code section 13389.

E. Storm Water Management Programs

1. Previous Permits required the Permittees to develop and implement comprehensive, activity-based storm water management programs that include construction, commercial, industrial, and residential site controls coupled with a facilities inspection program and thorough public outreach and education plans.

2. Previously submitted Storm Water Management Plans adequately describe Permittees' programs and associated control measures. Although there is no current need to revise the previously submitted plans, Permittees may need to make programmatic adjustments to reflect future conditions.

F. Total Maximum Daily Loads – Lake Tahoe

1. On November 16, 2010, the Water Board adopted Resolution R6T-2010-0058, amending the Basin Plan to incorporate the Total Maximum Daily Load (TMDL) for sediment and nutrients for Lake Tahoe to restore Lake Tahoe to meet the lake's deep water transparency water quality objective. The TMDL identified pollutant loads by source category, set load allocations at a basin-wide scale, and identified an implementation plan for achieving needed sediment and nutrient load reductions.

2. The approved Basin Plan amendment requires the Permittees and the California Department of Transportation (Caltrans) to meet pollutant load reduction requirements specified by the Lake Tahoe TMDL. Pollutant load allocation tables

are included in Attachment B of this Permit. The Basin Plan acknowledges that these agencies will likely consider a variety of alternative treatment options, roadway operations practices, and local ordinances to reduce average annual pollutant loads to meet load reduction requirements.

3. The Permit incorporates numeric and narrative effluent limitations consistent with 40 CFR 122.44(d) that implement Lake Tahoe TMDL pollutant load reduction requirements. The approved Basin Plan amendment replaced some of the concentration-based storm water effluent limits with effluent limits expressed as annual average pollutant load reduction requirements for the primary pollutants of concern.

4. The Basin Plan amendment and the Lake Tahoe TMDL require Lake Tahoe basin municipalities and Caltrans to develop and implement comprehensive Pollutant Load Reduction Plans (PLRPs) to describe how proposed operations and maintenance activities, capital improvements, facilities retrofit projects, ordinance enforcement, and other actions are expected to meet required pollutant load reduction requirements. PLRPs provide the Permittees the opportunity to prioritize pollutant load reduction efforts and target sub-watersheds that generate the highest annual average pollutant loads.

5. Permittees have primarily relied upon state and federal grant sources to fund water quality improvement infrastructure programs and generally use in-house resources for water quality operations and maintenance practices. Permittees need to (1) effectively prioritize future infrastructure and operations and maintenance actions to maximize pollutant load reductions that can be achieved with available funding; and (2) work to establish dedicated storm water program revenue sources.

6. The Water Board developed the Lake Clarity Crediting Program (see Attachment D) to establish protocols for accounting and tracking pollutant load reductions within the urban environment.

7. The Lake Tahoe TMDL baseline pollutant loading and load reduction requirements are provided as average annual estimates. For consistency with the TMDL requirements, the Lake Clarity Crediting Program uses average annual pollutant load estimates generated by numeric models. Verification of field conditions and water quality monitoring are needed to ensure that on-the-ground, measured variables are in line with model input parameters and that measured pollutant loading is consistent with modeled estimates.

8. Prior to the 2011 Permit adoption, the Permittees developed jurisdiction-specific baseline load estimates for the Lake Tahoe TMDL pollutants of concern. The submitted baseline pollutant load estimates provided the basis for translating percentage-based pollutant load reduction requirements defined by the TMDL into jurisdiction-specific, particle and mass-based pollutant load reduction requirements.

9. The modeling tool used to initially estimate baseline pollutant loads was refined as part of a stakeholder driven TMDL tool improvement process. A revised model was released in May 2015. The Permittees have used the revised model (Pollutant Load Reduction Model Version 2.1) to update the previously developed jurisdiction-specific fine sediment particle, total nitrogen, and total phosphorus baseline load estimates.

10. The Lake Tahoe TMDL requires new development and re-development project proponents and private property retrofit efforts to first consider opportunities to infiltrate storm water runoff from impervious surfaces. At a minimum, permanent storm water infiltration facilities must be designed and constructed to infiltrate runoff generated by the 20 year, 1-hour storm, which equates to approximately one inch of runoff over all impervious surfaces during a 1-hour period. Infiltrating runoff volumes generated by the 20 year, 1-hour storm may not be possible in some locations due to shallow depth to seasonal groundwater levels, unfavorable soil conditions, or other site constraints such as existing infrastructure or rock outcroppings. In the event that site constraints prohibit opportunities to infiltrate the runoff volume generated by a 20 year, 1-hour storm, project proponents must either (1) meet the numeric effluent limits contained in Basin Plan Table 5.6-1, or (2) document coordination with one of the Permittees or Caltrans to demonstrate that storm water treatment facilities treating private property discharges and public right-of-way storm water are sufficient to meet the Permittees' or Caltrans'; average annual fine sediment and nutrient load reduction requirements.

11. The Basin Plan amendment and the Lake Tahoe TMDL require municipalities to demonstrate on a catchment (i.e., sub-watershed) basis that no increased loading in fine sediment particle, total nitrogen, and total phosphorus will result from any land-disturbing activity permitted in the catchment. The permit includes a narrative effluent limitation to implement this provision.

12. The Basin Plan amendment recognizes the need for a comprehensive program to adaptively manage the Lake Tahoe TMDL program. Future research and monitoring findings, coupled with implementation experience and fiscal realities, may cause the Water Board to revisit the Lake Tahoe TMDL and associated regulatory activities. The Lake Tahoe TMDL Management System provides the framework for synthesizing and reporting new information and for identifying the need for policy changes.

13. The Basin Plan amendment further acknowledges the need for adaptive management of the Lake Tahoe TMDL program by explicitly stating "should funding and implementation constraints impact the ability to meet the load reduction milestones, the Regional Board will consider amending the implementation plan and load reduction schedules."

G. Public Notification

1. The Water Board has notified the Permittees and interested agencies and persons of its intent to issue waste discharge requirements for the discharges authorized by this Permit and has provided them with an opportunity to make statements and submit their comments.

2. The Water Board, in a public meeting, heard and considered all oral and written comments pertaining to the discharges authorized by this Order and the requirements contained herein.

3. Any person aggrieved by this action of the Water Board may petition the State Water Board to review the action in accordance with Water Code section 13320 and California Code of Regulations, Title 23, sections 2050, et seq. The State Water Board must receive the petition by 5:00 p.m., thirty (30) days after the Water Board action, except that if the thirtieth day following the action falls on a Saturday, Sunday or State holiday, the petition must be received by the State Water Board by 5:00 p.m. on the next business day. Copies of the law and regulations applicable to filing petitions may be found on the State Water Board's website or will be provided upon request.

4. This Permit may be modified or alternatively revoked or reissued prior to its expiration date or any administrative extension thereto, in accordance with 40 CFR122.41(f) and 122.62.

IT IS HEREBY ORDERED that Order No. R6T-2017-0010 is rescinded, except for enforcement purposes, and to meet the provisions contained in Division 7 of the Cal. Water Code and regulations adopted thereunder, and the provisions of the CWA and regulations adopted thereunder, the Permittees shall comply with the following requirements in this Permit:

I. Prohibitions – Non-Storm Water Discharges

A. The Permittees shall, within their respective jurisdictions, effectively prohibit non-storm water discharges into its collection, conveyance, and treatment facilities and receiving waters, except where such discharges:

1. Originate from a State, Federal, or other source for which they are pre-empted from regulating by State or Federal law; or

2. Are covered by a separate individual or general NPDES permit, or conditional waivers; or

3. Flows from firefighting activities.

B. Pursuant to 40 CFR 122.26(d)(2)(iv)(B)(1) the following categories of non-storm water discharges need only be prohibited from entering the Permittees storm water collection, conveyance, and treatment facilities and receiving waters if such

categories of discharges are identified by the Permittee (in its SWMP) as a source of pollutants to waters of the United States and the State of California

1. Waterline flushing
2. Landscape irrigation
3. Diverted stream flows
4. Rising groundwater
5. Uncontaminated groundwater infiltration [as defined by 40 CFR 35.2005(20)]
6. Uncontaminated pumped groundwater
7. Discharges from potable water sources
8. Fountain drains
9. Air conditioning condensation
10. Irrigation water
11. Springs
12. Water from crawl space pumps
13. Footing drains
14. Individual residential car washing
15. Flows from riparian habitats and wetlands
16. Dechlorinated swimming pool and spa discharges

C. When a non-storm water discharge category listed in Section I.B is identified as a source of pollutants to waters of the State, Permittees shall either:

1. Prohibit the discharge category from entering its storm water collection, conveyance, and treatment system; or

2. Authorize the discharge category and require implementation of appropriate or additional Best Management Practices to ensure that the discharge will not be a source of pollutants; or

3. Require or obtain coverage under separate Regional or State Water Board permit for the discharge.

II. Other Prohibitions

A. Unless specifically granted, authorization pursuant to this Permit does not constitute an exemption to applicable discharge prohibitions prescribed in the Basin Plan.

B. Discharges from the Permittees' collection, conveyance, and treatment facilities that cause or contribute to a violation of narrative or numeric water quality standards or objectives, as listed in Attachment E and F, are prohibited.

C. Discharges from the Permittees' collection, conveyance, and treatment facilities shall not cause or contribute to a condition of nuisance.

D. Storm water discharges regulated by this Permit shall not contain a hazardous substance equal to or in excess of a reportable quantity listed in 40 CFR Part 117 and/or 40 CFR Part 302.

E. The removal of vegetation or disturbance of ground surface conditions between October 15 of any year and May 1 of the following year is prohibited. Where it can be shown that granting a variance would not cause or contribute to the degradation of water quality, a variance to the dates stated above may be granted in writing by the Executive Officer.

F. The discharge attributable to human activities of any waste or deleterious material to surface waters of the LTHU is prohibited.

G. The discharge attributable to human activities of any waste or deleterious material to lands below the high-water rim of Lake Tahoe or within the 100-year floodplain of any tributary to Lake Tahoe is prohibited.

H. The discharge attributable to human activities of any waste or deleterious material to Stream Environment Zones (SEZs) in the LTHU is prohibited.

I. Waste discharge prohibitions in this Section do not apply to discharges of storm water when wastes in the discharge are controlled through the application of management practices, or other means, and the discharge does not cause a violation of water quality objectives.

III. Storm Water Program Implementation

A. Technology Based Effluent Limitations – Maximum Extent Practicable

1. Permittees shall reduce pollutants in stormwater discharges from the Permittee's MS4 to the maximum extent practicable. For the purposes of this Order, implementation of a stormwater management program, in a manner consistent with this section satisfies the requirement to control pollutants in stormwater discharges to the maximum extent practicable.

B. Legal Authority

1. Permittees shall maintain adequate legal authority to:

    a. Prohibit illicit connections and illicit discharges to its collection, conveyance, and treatment facilities.
    b. Prohibit the discharge of non-storm water to the Permittees' storm water collection, conveyance, and treatment facilities.
    c. Control through interagency agreement, the contribution of pollutants from one municipal jurisdiction to another.
    d. Require persons within their jurisdiction to comply with conditions in the Permittees' ordinances, permits, or orders (i.e., hold dischargers to its collection, conveyance, and treatment facilities accountable for their contributions of pollutants and flows).
    e. Remove illicit connections to public storm water collection, conveyance, and treatment facilities.
    f. Control the discharge of spills, dumping, or material disposal other than storm water to public storm water collection, conveyance, and treatment facilities.

g. Utilize enforcement measures (e.g., stop work orders, notice of violations, fines, referral to City, County, and/ or District Attorneys, etc.) by ordinances, permits, contracts, orders, administrative authority, and civil and criminal prosecution to enforce Permit requirements.
h. Control the quality of storm water runoff from industrial and construction sites.
i. Carry out all inspections, surveillance and monitoring procedures necessary to determine compliance and non-compliance with permit conditions including the prohibition on illicit discharges.
j. Require the use of control measures to prevent or reduce the discharge of pollutants to the maximum extent practicable.

2. No later than **September 15, 2023,** each Permittee shall submit a statement certified by its legal counsel confirming the Permittee possesses all necessary legal authority to comply with this Permit. The statement shall include:

   a. Identification of all departments within the jurisdiction that conduct urban runoff related activities and their roles and responsibilities under this Order.
   b. Citation of urban runoff related ordinances and the reasons they are enforceable.
   c. Identification of the local administrative and legal procedures available to mandate compliance with urban runoff related ordinances.
   d. Description of how these ordinances or other legal mechanisms are implemented and actions taken can be appealed.
   e. Description of how the municipality can issue administrative orders and injunctions, or if it must go through the court system for enforcement actions.

C. Storm Water Management Program

Federal Regulations (40 CFR 122.26(d)(2)(iv)) require the Permittees to develop and implement a Storm Water Management Program (SWMP) during the term of this Order. Each Permittee shall maintain and implement a SWMP to include components 1-9 below.

1. Construction Component
   Each Permittee shall implement a Construction Component of its SWMP to reduce pollutants in runoff from construction sites that involve more than three cubic yards of soil disturbance during all construction phases. The SWMP shall include a description of procedures for identifying inspection priorities and enforcing control measures. At a minimum the construction component shall address the following:

   a. Construction Site Inventory

      Permittees shall develop and update, at least annually, a complete inventory of construction sites within its jurisdiction that involve more than three cubic yards of soil disturbance. This requirement is applicable to all construction sites regardless of whether the construction site is subject to the Water

Board's General Construction Permit (Order R6T-2016-0010). The use of a Geographical Information System (GIS) database is highly recommended, but not required.

b. Construction Site Outreach

Permittees shall conduct construction site outreach efforts that include, at a minimum, measures to educate construction site operators about local ordinance and other regulatory requirements and applicable enforcement mechanisms prior to construction commencement.

c. Construction Site Prioritization and Inspection

Permittees shall develop a prioritization process for its watershed-based inventory (developed pursuant to III.B.1.a above) by threat to water quality. Each construction site shall be classified as a high, medium, or low threat to water quality. In evaluating threat to water quality each Permittee shall consider (1) the magnitude of fine sediment particle discharge potential; (2) site slope; (3) project size and type; (4) stage of construction; (5) proximity and connectivity to receiving water bodies; and (6) any other factors the Permittee deems relevant.

Each Permittee shall conduct construction site inspections for compliance with its ordinances (grading, storm water, etc.), permits (construction, grading, etc.), and discharge prohibitions contained in this Permit in accordance with Section II.B of the Monitoring and Reporting Program (Attachment C). Inspections shall include review of site erosion control and BMP implementation plans. Inspection frequencies and priorities shall be determined by the threat to water quality prioritization.

d. Construction Site Enforcement

Permittees shall enforce their storm water ordinances and other regulatory mechanisms for all construction sites to maintain compliance with local ordinances and discharge prohibitions contained in this Permit. Permittees shall document any non-compliance with Permit or ordinance requirements and report identified compliance issues as part of their Annual Report as described under Section IV.C of the Monitoring and Reporting Program (Attachment C).

Each Permittee shall follow up on identified compliance issues and take actions necessary for construction sites to comply with Permit requirements.

e. Oversight by Others

Permittees may make use of construction site outreach, inspection, and enforcement actions taken by other responsible agencies (such as the Tahoe Regional Planning Agency or the Water Board). If a Permittee chooses to use the efforts of other agencies to meet Permit requirements, Permittees must provide detailed documentation of the outreach, inspection, and/or enforcement action taken by others.

2. Commercial, Industrial, Municipal and Residential Component

Each Permittee shall implement SWMP elements to reduce, to the maximum extent practicable, pollutants in runoff from commercial, industrial, municipal, and residential properties within its jurisdiction. The purpose of this component is to identify potential pollutant sources, prioritize existing or potential water quality threats associated with different land uses, and provide outreach, education, and enforcement measures to reduce and/or eliminate storm water pollution from these sources.

a. Commercial, Industrial, and Municipal Site Inventory and Prioritization

Each Permittee shall develop and annually update an inventory of high priority commercial, industrial, and municipal activities and pollutant sources. The high priority commercial, industrial, and municipal site inventory shall consider including the following business types and activities:

(1) Automobile mechanical repair, maintenance, or cleaning;
(2) Automobile and other vehicle body repair or painting;
(3) Retail or wholesale fueling;
(4) Eating or drinking establishments;
(5) Mobile carpet, drape or furniture cleaning;
(6) Concrete mixing or cutting;
(7) Painting and coating;
(8) Mobile pool and spa cleaning;
(9) Snow removal and storage activities;
(10) Parking areas with more than 30 parking spaces;
(11) Off-pavement parking and storage yards;
(12) Municipal maintenance yards.

The use of a Geographical Information System (GIS) database is highly recommended, but not required.

b. Commercial, Industrial, and Municipal Site Outreach

Permittee outreach efforts shall include, at a minimum, educating commercial, industrial, and municipal site operators about local ordinances and other regulatory measure and associated tiered enforcement mechanisms applicable to commercial, industrial, or municipal site runoff problems.

c. Commercial, Industrial, and Municipal Site Inspections

Each Permittee shall implement a program to inspect high priority commercial, industrial, and municipal sites at least once per year in accordance with Section II.C of the Monitoring and Reporting Program (Attachment C).

d. Commercial, Industrial, and Municipal Site Enforcement

Permittees shall enforce their storm water ordinances and other regulatory mechanisms for all commercial, industrial, and municipal sites to maintain compliance with applicable local ordinances and discharge prohibitions contained in this Permit. Permittees shall document any non-compliance with ordinance and/or Permit requirements and report inspection findings as part of their Annual Report as described under Section IV.D of the Monitoring and Reporting Program (Attachment C).

Each Permittee shall follow up on inspection findings and take actions necessary for commercial, industrial, and municipal sites to comply with Permit and local ordinance requirements.

e. Oversight by Others

Permittees may make use of commercial and industrial site outreach, inspection, and enforcement actions taken by other responsible agencies (such as the Tahoe Regional Planning Agency or the Water Board). If a Permittee chooses to use the efforts of other agencies to meet Permit requirements, Permittees must provide detailed documentation of the outreach, inspection, and/or enforcement action taken by others.

f. Residential Property – Outreach and Education

Each Permittee shall identify high priority residential areas and activities for targeted outreach and education. These areas/activities should include:

(1) Automobile repair and maintenance;
(2) Off-pavement automobile parking;
(3) Home and garden care activities and product use (pesticides, herbicides and fertilizers;
(4) Disposal of household hazardous waste (e.g., paints, cleaning products);
(5) Snow removal activities.

Outreach program should include coordination with other Lake Tahoe Basin agencies involved with BMP implementation, including but not limited to the

Tahoe Resource Conservation District and the Tahoe Regional Planning Agency Erosion Control Team.

3. Storm Water Facilities Inspection Component

   Each Permittee shall develop and implement an inspection program to assess the condition of its storm water collection, conveyance and treatment facilities and identify maintenance needs on a catchment, or sub-watershed basis in accordance with the following requirements, and Section II.A of the Monitoring and Reporting Program (Attachment C).

   a. Each Permittee shall inspect its storm water collection, conveyance, and treatment systems at least once annually and maintain a database of inspection findings.
   b. As part of its storm water collection, conveyance, and treatment system inspections, each Permittee shall evaluate and identify potential pollutant sources including but not limited to private property/residential runoff, commercial site runoff, eroding cut slopes, eroding road shoulders, intercepted groundwater discharges, excessive traction abrasive application, and construction site tracking.
   c. Each Permittee shall document and prioritize identified maintenance needs and perform needed maintenance to ensure storm water systems effectively collect, convey, and treat urban runoff as designed.

4. Illicit Discharge Detection and Elimination Component

   Permittees shall implement an Illicit Discharge Detection and Elimination Component containing measures to actively seek and eliminate illicit discharges and connections. At a minimum the Illicit Discharge Detection and Elimination Component shall include the following elements:

   a. Each Permittee shall visually inspect all storm water collection, conveyance, and treatment systems at least once annually as described in Section II.A of the Monitoring and Reporting Program (Attachment C) for evidence of illicit discharges, illicit connections, or other sources of non-storm water discharges.
   b. Each Permittee shall establish and implement a program to investigate and inspect any portion of the storm water collection and conveyance system that indicates a reasonable potential for illicit discharges, illicit connections, or other sources of non-storm water. Each Permittee shall establish criteria to identify portions of the system where follow-up investigations are needed to determine whether illicit discharges, illicit connections, or other sources of non-storm water have occurred or are likely to occur.
   c. Each Permittee shall implement and enforce its ordinances, orders, or other legal authority or regulatory mechanism to prevent and eliminate illicit discharges and connections to its storm water collection and conveyance system.

d. Each Permittee shall promote, publicize, and facilitate public reporting of illicit discharges or water quality impacts associated with discharges into or from its storm water collection and conveyance system. Each Permittee shall facilitate public reporting through development and operation of a public hotline. Public hotlines can be Permittee-specific or shared by Permittees. All storm water hotlines should be capable of receiving reports in both English and Spanish 24 hours per day, seven days per week. Permittees shall respond to and resolve each reported incident. Each Permittee shall keep a record of all reported incidents and how each was resolved.

5. New Development and Redevelopment Component

For new development and redevelopment projects, Permittees shall require project proponents to incorporate permanent storm water treatment facilities that are designed to infiltrate, at a minimum, runoff generated by the 20 year, 1-hour storm, or approximately one inch of runoff over all impervious surfaces during a 1-hour period.

If infiltrating the entire volume of the 20 year, 1-hour storm is not possible at a given new development or redevelopment site, the Permittee shall require project proponents to infiltrate as much runoff as possible and either:

a. Document how the project proponent will treat runoff to meet the numeric effluent limits described in Table III.B.1 below; or
b. Document coordination with the project proponent to demonstrate that shared storm water treatment facilities treating private property discharges and public right-of-way storm water are sufficient to meet the municipality's average annual fine sediment and nutrient load reduction requirements described in Section IV.B of this Permit.

Table III.B.1 – Numeric effluent limits for runoff discharges

Constituent	Units	Land Treatment/ Infiltration Systems	Surface Waters
Total Nitrogen	mg/L as N	5.0	0.5
Total Phosphorus	mg/L as P	1.0	0.1
Turbidity	NTU	200	20
Oil and Grease	mg/L	40	2.0
Total Iron	mg/L	4.0	0.5

6. Public Education Component

Permittees shall implement a public education program using any appropriate media to increase the community's knowledge of the effect of urban runoff on

surface waters and the measures the public can take to help control storm water pollution and encourage behavior to reduce pollutant discharges.

7. Municipal Personnel Training and Education Component

   Permittees shall ensure that all municipal personnel and contractors responsible for implementing Permit requirements, for operating municipal facilities covered under Section III.B.2 of this Permit, and for conducting inspections required under Section III.B1-5 of this Permit are adequately trained and educated to perform such tasks.

8. Fiscal Analysis

   Each Permittee shall conduct a fiscal analysis of its urban runoff management program in its entirety, including development and implementation of both SWMP and Pollutant Load Reduction Plans (IV.C below), along with operations and maintenances costs. Such analysis shall include a description of the source(s) of funds that are proposed to meet the necessary expenditures, including legal restrictions on the use of such funds.

IV. Lake Tahoe Total Maximum Daily Load Implementation – Pollutant Load Reduction Requirements

A. Baseline Pollutant Loads

The Lake Tahoe TMDL expresses waste load allocations for the urban upland source, including discharges from the Permittee's municipal storm water collection, conveyance, and treatment facilities, as percent reductions from a basin-wide baseline load. The baseline basin-wide pollutant loads for the TMDL reflect conditions as of water year 2003/2004 (October 1, 2003 – September 30, 2004), hereafter referred to as "baseline."

To translate basin-wide urban runoff load reduction requirements into jurisdiction-specific load reduction requirements, the Permittees have conducted jurisdiction-scale baseline load analyses using the most up-to-date version of the Pollutant Load Reduction Model (Version 2.1). The submitted baseline pollutant load estimates are the basis for the particle number- and mass-based effluent limits in this Permit (Table IV.B.1).

Permittees may gather additional information in the future to enhance the accuracy of the baseline load analysis. Similarly, numeric models used to estimate pollutant loads may be improved over time. Should a Permittee determine that updated load estimation tools or other information are expected to change its baseline pollutant load estimate, they may request the Water Board amend its baseline load estimate. Requests for baseline load estimate amendment must include a description of any new information informing the estimate, the magnitude of the proposed adjustment,

and a discussion of how the baseline load estimate adjustment will (or will not) change the Permittees Pollutant Load Reduction Plan.

B. Pollutant Load Reduction Requirements and Water Quality-Based Effluent Limits

For the third five-year TMDL milestone, jurisdiction-specific waste load reduction requirements, incorporated into this Permit as average annual particle number- and mass-based effluent limits (Table IV.B.1), are calculated by multiplying the percent reduction specified for the urban uplands source category for each pollutant by each jurisdiction's individual baseline load.

Each jurisdiction must reduce fine sediment particle (FSP), total nitrogen (TN), total phosphorus (TP) loads by 34%, 19%, and 21%, respectively, by **September 30, 2026.**

Table IV.B.1 – Maximum average annual particle number- and mass-based effluent limits for Fine Sediment Particles (FSP), Total Nitrogen (TN) and Total Phosphorus (TP) to meet the third five-year TMDL milestone

Jurisdiction	Baseline FSP (# of particles)	FSP Allowable Load	Baseline TN (lbs/yr)	TN Allowable Load	Baseline TP (lbs/yr)	TP Allowable Load
El Dorado County	1.63E19	1.08E19	4,170	3,375	1,170	924
Placer County	2.64E19	1.74E19	8,860	7,177	2,280	1,801
City of South Lake Tahoe	2.38E19	1.57E19	8,034	6,508	2,020	1,596

Pollutant load reductions shall be measured in accordance with the processes outlined in the Lake Clarity Crediting Program Handbook (Attachment D). To demonstrate compliance with the average annual fine sediment particle pollutant load reduction requirements outlined in Table IV.B.1, each Permittee must earn and maintain Lake Clarity Credits in accordance with Table IV.B.2 for the 2026 water year (October 1, 2025 - September 30, 2026), and for subsequent water years.

To demonstrate interim progress at achieving required pollutant load reductions, each Permittee shall earn and maintain enough Lake Clarity Credits to demonstrate a 28.8%, three fifths of the FSP reduction as specified in Table IV.B.2 below by **September 30, 2024,** and for subsequent water years.

Table IV.B.2 – Minimum Lake Clarity Credit Requirements

Jurisdiction	Interim Lake Clarity Credit* Requirement (Sept. 30, 2024)	Third 5-year Lake Clarity Credit* Requirement (Sept. 30, 2026)
El Dorado County	470	556
Placer County	760	898
City of South Lake Tahoe	688	800

*The Lake Clarity Crediting Program Handbook defines one (1) Lake Clarity Credit as equal to 1.0 x 10^{16} fine sediment particles with a diameter less than 16 micrometers

To ultimately achieve the deep-water transparency standard, Permittees shall reduce FSP, TN, and TP loading according to the requirements in the Lake Tahoe TMDL outlined for the "Urban Upland" pollutant source (Attachment B). In accordance with the TMDL, incremental pollutant load reductions will result in attaining the deep-water transparency standard by the year 2076. Compliance with this provision constitutes compliance with the receiving water limitations for the waterbody-pollutant combination addressed by the TMDL.

C. Pollutant Load Reduction Plans

Each Permittee has submitted preliminary Pollutant Load Reduction Plans (PLRPs) by the Water Board's extended deadline of October 19, 2021. Each Permittee shall update the previously submitted PLRP to describe how it expects to meet the pollutant load reduction requirements described in Section IV.B above. Permittees should submit an updated plan no later than **September 15, 2023,** that shall include, at a minimum, the following elements:

1. Catchment registration schedule

   Each PLRP shall include a list of catchments and/or roadway areas the Permittee plans to register pursuant to the Lake Clarity Crediting Program (see Attachment D) to meet load reduction requirements.

2. Proposed pollutant control measures

   For each proposed registered area, the Permittees shall describe storm water program activities to reduce fine sediment particles, total phosphorus, and total nitrogen loading.

3. Pollutant load reduction estimates

   For each proposed registered area, Permittees shall provide estimates of both baseline pollutant loading and expected pollutant loading to demonstrate that

proposed actions will, over the course of this Permit term, reduce the Permittee's jurisdiction-wide pollutant load by the amounts specified in Section IV.B above.

4. Annual adaptive management

   The PLRP shall include a description of the internal process and procedures to annually assess storm water management activities and associated load reduction progress. The adaptive management discussion shall describe how the Permittee will use information from the previous years' monitoring and implementation efforts to make needed adjustments to ensure compliance with the load reduction requirements specified in Section IV.B.

D. Land Use Changes and Management Practices

If either land use changes or management practices associated with development or re-development result in a reduction of pollutant loads from the estimated baseline, then this reduction can be counted toward meeting pollutant load reduction requirements. Conversely, actions to eliminate any pollutant load increase from these changes will not be counted towards the annual load reduction requirements.

In accordance with the Basin Plan, Permittees must ensure that changes in land use, impervious coverage, or operations and maintenance practices do not increase a catchment's average annual baseline pollutant load.

F. Storm Water Facility Operations and Maintenance

Permittees shall operate and maintain storm water collection, conveyance, and treatment facilities to ensure, at a minimum, the baseline pollutant loading specified in Table IV.B.1 does not increase.

G. Pollutant Load Reduction Monitoring Requirements

Permittees shall comply with all monitoring and reporting requirements specified in Section I of the attached Monitoring and Reporting Program (Attachment C).

V. Trash Management

The Permittees must comply with the trash-related prohibitions and requirements in Attachment H. Compliance with the trash-related prohibitions shall be achieved by the permittees as specified in Attachment H.

VI. Receiving Water Limitations

The Permittees shall comply with discharge prohibitions specified in Sections I and II of this Permit through timely implementation of control measures and other actions to reduce pollutants in the discharges in accordance with the Permittees' SWMPs and other requirements of this Permit, including any modifications. The Permittees' SWMPs shall be designed to achieve compliance with the requirements of Sections I

and II of this Permit. If exceedances of water quality objectives or water quality standards (collectively, WQS) persist notwithstanding implementation of the SWMPs and other requirements of this Permit, the Permittees shall assure compliance with discharge prohibitions and receiving water limitations in Sections I and II of this Permit by complying with the following procedure:

1. Upon a determination by either the Permittee or the Water Board that discharges are causing or contributing to an exceedance of an applicable WQS, the Permittee shall notify and thereafter submit a report to the Water Board that describes Best Management Practices (BMPs) that are currently being implemented and additional BMPs that will be implemented to prevent or reduce any pollutants that are causing or contributing to the exceedance of WQSs. The report may be incorporated into the annual report required under Section IV of the Monitoring and Reporting Program (Attachment C) unless the Water Board directs an earlier submittal. The report shall include an implementation schedule. The Water Board may require modifications to the report.

2. If program modifications are needed to incorporate new or revised BMPs, adjust implementation schedules, or add additional monitoring, the Permittee will make such changes and notify the Water Board of any programmatic adjustments made.

3. If changes have been made, implement the revised SWMP and monitoring program in accordance with the approved schedule.

So long as the Permittee has complied with the procedures set forth above and is implementing its revised SWMP, the Permittee does not have to repeat the same procedure for continuing or recurring exceedances of the same receiving water limitations unless directed by the Water Board to develop additional BMPs.

VII. Administrative Provisions

A. The Water Board reserves the right to revise any portion of this Order upon legal notice to, and after opportunity to be heard is given to, all concerned parties.

B. Permittees may request the Water Board consider Permit revisions if new information arises that would influence Permittees ability to comply with pollutant load reduction requirements. Such a request must include and be supported by information consistent with that developed pursuant to Permit Sections III.B.8 and IV.C.

C. All terms of the attached Monitoring and Reporting Program (Attachment C) are hereby incorporated by reference as requirements under this Permit.

D. Each Permittee shall comply with the Standard Provisions, Reporting Requirements, and Notifications contained in Attachment G of this Order. This includes 24 hours/5-

day reporting requirements for any instance of non-compliance with this Order as described in section B.6 of Attachment G.

E. All plans, reports, and subsequent amendments submitted in compliance with this Order shall be implemented immediately (or as otherwise specified) and shall be an enforceable part of this Order upon submission to the Regional Board. All Permittee submittals must be responsive to, and consistent with the requirements of this Order.

F. This Order expires on September 14, 2027. The Permittees must file a report of waste discharge in accordance with Title 23, California Code of Regulations, no later than 180 days in advance of such date as application for an updated Municipal NPDES Permit.

G. The report of waste discharge must include a preliminary Pollutant Load Reduction Plan as outlined in Permit Sections IV.C.2 and IV.C.3. The preliminary Pollutant Load Reduction Plan shall describe how each Permittee could meet the pollutant load reduction requirements for the third five-year TMDL implementation period, defined as the ten-year load reduction milestone in Attachment B. Specifically, the preliminary Pollutant Load Reduction Plans shall demonstrate how each Permittee could reduce baseline fine sediment particle, total nitrogen, and total phosphorus loads by 34 percent, 19 percent, and 21 percent, respectively, by the end of the next permit term.

H. Table of Required Submittals

Permit Submittal	**Permit Section**	**Submittal/Required Completion Date**
Statement of Legal Authority	III.A.4	September 15, 2023
Updated Pollutant Load Reduction Plan	IV.C	September 15, 2023
Report of Waste Discharge and preliminary Pollutant Load Reduction Plan	VI.D	March 15, 2026
Monitoring and Reporting Program Submittal	**Attach. C Section**	**Submittal/Required Completion Date**
Annual Report	IV	March 31, 2023, and annually thereafter

I, Michael R. Plaziak, Executive Officer, do hereby certify that the foregoing is a full, true, and correct copy of an Order adopted by the California Regional Water Quality Control Board, Lahontan Region, on **September 14, 2022.**

MICHAEL R. PLAZIAK, PG
EXECUTIVE OFFICER

Attachments:

A. Fact Sheet
B. Pollutant Load Allocation Tables
C. Monitoring and Reporting Program
D. Lake Clarity Crediting Program Handbook
E. Water Quality Objectives
F. Compliance with Water Quality Objectives
G. Standard Provisions, Reporting Requirements, and Notifications
H. Trash Implementation Requirements

ATTACHMENT A

FACT SHEET
FOR

RENEWED WASTE DISCHARGE REQUIREMENTS AND NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES) PERMIT FOR STORM WATER/URBAN RUNOFF DISCHARGES FROM EL DORADO COUNTY, PLACER COUNTY, AND THE CITY OF SOUTH LAKE TAHOE

ORDER NO. R6T-2022-TENT
NPDES NO. CAG616001

Pursuant to the requirements of section 124.8 and 124.56 of title 40 the Code of Federal Regulations (CFR), this Fact Sheet briefly sets forth the principal facts and the significant factual, legal, methodological and policy questions considered in preparing the draft permit

A.1. Background

Portions of El Dorado County, Placer County, and the entire jurisdiction of the City of South Lake Tahoe (hereafter referred to as “municipalities,” “urban jurisdictions” or “Permittees”) lie within the Lake Tahoe Hydrologic Unit. Because Lake Tahoe is an Outstanding National Resource Water (ONRW) negatively impacted by urban runoff discharged from these municipalities, the Lahontan Regional Water Quality Control Board (Water Board) adopted Order 6-92-02 in January 1992 as part of the Phase I NPDES program to regulate MS4s on the California side of the Lake Tahoe watershed. The NPDES Storm Water Permit provided the Water Board a mechanism to work with the local municipalities to improve storm water management practices in the Tahoe area. Other previous NPDES Storm Water Permits (R6T-2005-0026, R6T-2011-0101A, and R6T-2017-0010) required the Permittees to develop and implement comprehensive storm water management programs.

A.2. Legal Authority

The CWA authorized the USEPA to permit a state to serve as the NPDES permitting authority in lieu of the USEPA. The State of California has in-lieu authority for the NPDES program. The Porter-Cologne Water Quality Control Act authorized the State Water Resources Control Board (State Board), through the Water Boards, to regulate and control the discharge of pollutants into waters of the State. The State Board entered into a Memorandum of Agreement with the

USEPA on September 22, 1989, to administer the NPDES Program governing discharges to waters of the United States.

In 1972, the federal Water Pollution Control Act (also referred to as the Clean Water Act [CWA]) was amended to provide that the discharge of pollutants to waters from any point source is unlawful unless the discharge is in compliance with a NPDES permit. The 1987 amendments to the Clean Water Act added section 402(p), which established a framework for regulating stormwater discharges under the NPDES Program. Subsequently, in 1990, the United States Environmental Protection Agency (USEPA) promulgated regulations for permitting stormwater discharges from industrial sites (including construction sites that disturb five acres or more) and from municipal separate storm sewer systems (MS4s) serving a population of 100,000 people or more. (40 Code of Federal Regulations section 122.26.) These regulations, known as the Phase I regulations, require operators of medium and large MS4s to obtain stormwater permits. On December 8, 1999, USEPA promulgated regulations, known as Phase II, requiring permits for stormwater discharges from Small MS4s and from construction sites disturbing between one and five acres of land. (40 Code of Federal Regulations sections 122.30 - 122.37.) The Phase I regulations provide that States, such as California, with approved NPDES permit programs, may require any discharger who contributes "to a violation of water quality standards or is a significant contributor of pollutants to waters of the United States" to obtain stormwater permits regardless of population size. (40 Code of Federal Regulations section 122.26(a)(v).)

The terms of this permit solely implement the federal requirements under the CWA sections 402(p) and 303(d), and the associated regulations.

A.3. Discharge Prohibitions

Consistent with federal law, the Order contains a prohibition on non-stormwater discharges to the MS4, where such discharges are not conditionally authorized. On November 16, 1990, USEPA promulgated regulations to implement the 1987 amendments to the Clean Water Act. (55 Federal Register 47990 (Nov. 16, 1990)). The regulations establish minimum requirements for MS4 permits. The regulations address both stormwater and non-stormwater discharges from MS4s; however, the minimum requirements for each are significantly different. This is evident from USEPA's preamble to the stormwater regulations, which states that "Section 402(p)(B)(3) [of the Clean Water Act] requires that permits for discharges from municipal separate storm sewers require the municipality to 'effectively prohibit' non-stormwater discharges from the municipal storm sewer. Ultimately, such non-stormwater discharges through a MS4 must either be removed from the system or become subject to an NPDES permit." (55 Fed Reg. 47990, 47995). USEPA explained that illicit discharge detection and elimination program requirements were intended to begin to implement the Clean Water Act's provision requiring permits to "effectively prohibit non-storm water discharges." (55 FR 47990, 47995). Specifically, the statutory mandate is

implemented as MS4 permit application requirements to (1) conduct a screening analysis of the MS4 to provide information to develop priorities for a program to detect and remove illicit discharges, and (2) provide a proposed management program that includes a program to detect and remove illicit discharges, or ensure they are covered by a separate NPDES permit, and to control improper disposal into the storm sewer. (40 Code of Federal Regulations section 122.26(d)(1)(iv)(D), (d)(2)(iv)(B)). These non-storm water discharges therefore are not subject to the maximum extent practicable (MEP) standard.

“Illicit discharges” defined in the regulations is the most closely applicable definition of “non-storm water” contained in federal law, and the terms are often used interchangeably. In fact, “illicit discharge” is defined by USEPA in its 1990 rulemaking as “any discharge through a municipal separate storm sewer that is not composed entirely of storm water and that is not covered by an NPDES permit (other than the permit for the discharge from the MS4).” (55 Federal Register 47990, 47995). Non-stormwater discharges from the MS4 that are not authorized by separate NPDES permits, nor specifically exempted, are subject to requirements under the NPDES program, including discharge prohibitions, technology-based effluent limitations and water quality-based effluent limitations (40 Code of Federal Regulations section 122.44). As discussed above, USEPA’s preamble to the storm water regulations also supports the interpretation that regulation of non-storm water discharges through an MS4 is not limited to the MEP standard in Clean Water Act section 402(p)(3)(B)(iii).

Additionally, this Order requires the Permittees to comply with the prohibition on the discharge of trash to waters of the state established in Chapter IV of the Part 1 Trash Provisions of the Water Quality Control Plan for Inland Surface Waters, Enclosed Bays, and Estuaries of California (Trash Provisions). This Order requires the Permittees to comply with prohibitions for the Lake Tahoe hydrologic unit established in the Basin Plan.

A.4. Maximum Extent Practicable (MEP) Standard:

The Clean Water Act mandates that the Order “require controls to reduce the discharge of pollutants to the maximum extent practicable.” (33 U.S.C. § 1342(p)(3)(B)(iii)). For the purposes of this Order, implementation of a stormwater management program, in a manner consistent with this Order, satisfies the requirement to control pollutants in stormwater discharges to the maximum extent practicable.

Clean Water Act section 303(d)(1)(A) and 40 Code of Federal Regulations section 122.44(a) require that NPDES permits include technology-based effluent limitations. A technology-based effluent limitation is based on the capability of a model treatment method to reduce a pollutant to a certain concentration (USEPA NPDES Permit Writers’ Manual, Appendix A). Technology represents the minimum level of control that must be imposed in a permit issued under Clean Water Act Section 402. In 1987, the Clean Water Act was amended to require

that municipal storm water discharges “reduce the discharge of pollutants to the maximum extent practicable” (Clean Water Act Section 402(p)(3)(B)(iii)). The “maximum extent practicable” (MEP) standard is the applicable federal technology-based standard that MS4 owners and operators must attain to comply with their NPDES permits. The MEP standard only applies to stormwater discharges from the MS4. Non-stormwater discharges are subject to a different standard – specifically, non-stormwater discharges through the MS4 must be effectively prohibited. The corresponding regulatory provisions that pertain to the MEP standard can be found in 40 Code of Federal Regulations sections 122.26(d)(2)(iv) and 122.44(k)(2). “EPA has intentionally not provided a precise definition of MEP to allow maximum flexibility in MS4 permitting. MS4s need the flexibility to optimize reductions in storm water pollutants on a location by-location basis.” (Phase II Stormwater Regulations, Final Rule, 66 Federal Register 68722, 68754.).

A.5. Lake Tahoe Total Maximum Daily Load

Lake Tahoe is designated an Outstanding National Resource Water (ONRW) by the State Board and the USEPA due to its extraordinary deep water transparency. However, the lake’s deep-water transparency has been impaired over the past four decades by increased fine sediment particle inputs and stimulated algal growth caused by elevated nitrogen and phosphorus loading.

The Water Board, and the Nevada Division of Environmental Protection (NDEP) developed the bi-state Lake Tahoe Total Maximum Daily Load (TMDL) to identify the pollutants responsible for deep water transparency decline; quantify the major pollutant sources; assess the lake’s assimilative capacity; and develop a plan to reduce pollutant loads and restore Lake Tahoe’s deep water transparency, as measured by the Secchi depth, to the annual average levels recorded in 1967-1971.

The ongoing decline in Lake Tahoe’s water quality is a result of light scatter from fine sediment particles (primarily particles less than 16 micrometers in diameter) and light absorption by phytoplankton. The addition of nitrogen and phosphorus to Lake Tahoe contributes to phytoplankton growth. Fine sediment particles are the most dominant pollutant contributing to the impairment of lake waters, accounting for roughly two thirds of the lake’s impairment. Consequently, fine sediment particles, total nitrogen, and total phosphorus are the pollutants of concern at Lake Tahoe.

To achieve the transparency standard, estimated fine sediment particle, phosphorus, and nitrogen loads must be reduced by 65 percent, 35 percent, and 10 percent, respectively. Given the magnitude of the needed load reductions and the current available understanding of load reduction options, achieving the load reductions needed to meet the transparency standard is expected to take 65 years. A 20-year interim transparency goal, known as the Clarity Challenge, requires basin-wide pollutant load reductions to be achieved within 15 years,

followed by five years of monitoring to confirm that 24 meters of Secchi depth transparency has been reached. Implementation efforts must reduce basin-wide fine sediment particle, phosphorus, and nitrogen loads by 32 percent, 14 percent, and 4 percent, respectively, to achieve this goal.

The TMDL pollutant source analysis identified runoff from urban land uses as the primary source of fine sediment particle loading to Lake Tahoe, and the pollutant load allocations establish needed pollutant load reductions as a percent reduction from baseline pollutant load levels. The most significant and currently quantifiable load reduction opportunities are within the urban land uses. Because urbanized areas discharge the overwhelming bulk of the average annual fine sediment particle load reaching Lake Tahoe, much of the load reductions must be accomplished from this urban upland source. Even if it were feasible to completely eliminate the fine sediment particle load from the other three sources, (forest upland, atmospheric deposition, and stream channel erosion), the transparency standard would not be met.

Consequently, the Lake Tahoe TMDL implementation plan emphasizes actions to reduce fine sediment particle and associated nutrient loading from urban storm water runoff. Due to the magnitude of both the pollutant source and related control opportunities, the Water Board has devoted time and resources to develop detailed tools and protocols to quantify, track, and account for pollutant loads associated with urban runoff.

This NPDES Storm Water Permit is an important implementation tool that holds the municipal jurisdictions on the California side of the Lake Tahoe Basin accountable for achieving water quality improvements required by the Lake Tahoe TMDL. The Permit is also critical for maintaining consistency with the implementation tracking effort on the Nevada side of Lake Tahoe.

The renewed NPDES Storm Water Permit implements the third five-year pollutant load reduction milestone established by the Lake Tahoe TMDL. To ensure progress at achieving water quality improvement goals, the renewed Permit includes an interim compliance point at the third year of the permit term.

A.5.1. Baseline Load Estimates

The Lake Tahoe TMDL expresses waste load allocations for the urban upland source as percent reductions from a basin-wide baseline pollutant load. The basin-wide baseline pollutant load reflects conditions as of water year 2003/2004 (October 1, 2003 – September 30, 2004). To translate basin-wide waste load allocations for urban runoff into jurisdiction-specific waste load allocations for each of the municipalities, the Water Board required each of the municipalities to conduct a jurisdiction-scale baseline load analysis as the first step in the TMDL implementation process. To ensure comparability between the basin-wide baseline pollutant load estimates and the jurisdiction-scale baseline pollutant load estimates, municipalities have used a set of standardized baseline condition

values consistent with those used to estimate the 2003/2004 basin-wide pollutant loads. Specifically, baseline pollutant load estimate calculations reflect infrastructure, land development conditions, and operations and maintenance practices that were in effect in October 2004. Due to the differences in analyzing hydrology at basin-wide and jurisdiction-specific scales, different modeling tools were needed to estimate average annual baseline pollutant loads.

The Pollutant Load Reduction Model (PLRM) provides pollutant load estimates at an appropriate scale for assessing jurisdiction-specific baseline fine sediment, total nitrogen, and total phosphorus loads. With guidance and support from the Permittees, the PLRM was revised during the first 5-year permit term to better align roadway assessment methods with model variables and to address identified user inefficiencies. The Permittees re-assessed previously developed jurisdiction-specific baseline pollutant load estimates using the updated model version and provided revised values to the Water Board for inclusion in the renewed permit. The updated baseline load numbers were used to re-calculate needed pollutant load reduction using percentages specified by the Lake Tahoe TMDL. In most instances the overall adjustment was minor. For this third 5-year permit term the City of South Lake Tahoe revised their baseline for the Heavenly Catchment. This catchment includes areas from the Heavenly Valley Ski Area California base (Heavenly) including the parking lot and lodge on private property outside the City limits, as well as public roads and lands within the City limits. Loads from the Heavenly base area have been removed from the baseline because these discharges are regulated under a different permit and fall outside the City's jurisdiction.

Table IV.B.1 of the permit identifies the most recent baseline pollutant load estimates for each municipality and sets out the allowable load.

A.5.2. Lake Clarity Crediting Program

The Lake Clarity Crediting Program provides a system of tools and methods to allow urban jurisdictions to link projects, programs, and operations and maintenance activities to estimated pollutant load reductions. In addition to providing a consistent method to track compliance with TMDL pollutant load reduction requirements, the Lake Clarity Crediting Program provides specific technical guidance for calculating jurisdiction-scale baseline load estimates. The Lake Clarity Crediting Program makes use of numeric modeling tools and field inspection methods to estimate water quality benefits and link modeled estimates to actual on-the-ground conditions. This program provides a robust method to hold municipalities responsible for required water quality improvements and offers transparent protocols for demonstrating progress.

This NPDES Storm Water Permit requires the municipalities to use the Lake Clarity Crediting Program Handbook (Attachment D) to assess compliance with load reduction requirements specified in the Lake Tahoe TMDL (Attachment B).

A.5.3. Pollutant Load Reduction Plans

The Lake Tahoe TMDL requires Lake Tahoe basin municipalities to develop and implement comprehensive Pollutant Load Reduction Plans (PLRPs) describing how proposed operations and maintenance activities, capital improvements, facilities retrofit projects, ordinance enforcement, and other actions will meet required pollutant load reduction requirements. PLRPs provide the Permittees the opportunity to prioritize pollutant load reduction efforts and target sub-watersheds, or catchments that generate the highest annual average pollutant loads in a cost effective manner.

By necessity, the PLRPs are expected to provide only a general implementation plan that identifies specific catchments targeted for implementation and expected load reduction measures. The Permit requires the municipalities to estimate the anticipated cumulative water quality benefit over a five year period and support those estimates with representative modeling results. As implementation progresses, these estimates will be refined as the municipalities declare credits pursuant to the Lake Clarity Crediting Program. Over time, the Permittees will likely need to adjust their individual PLRPs to reflect updated information regarding implementation progress and load reduction estimate refinement.

This NPDES Storm Water Permit implements the requirement to develop and submit PLRPs consistent with Lake Tahoe TMDL requirements. While the PLRPs do not alter pollutant load reduction requirements or other performance standards, they do describe the municipalities' proposed methods and plans to achieve compliance with pollutant load reduction requirements and associated mass- and particle-based effluent limits listed in Section IV.B of the Permit.

Section IV.A of the Monitoring and Reporting Program requires the Permittees to annually assess PLRP progress and, if necessary, propose changes.

A.5.4. Control of Pollutants of Concern

The CWA provides that storm water permits for MS4 discharges shall contain controls to reduce the discharge of pollutants to the "maximum extent practicable" including management practices, control techniques and system, design and engineering methods, and such other provisions as the Administrator or the State determines appropriate for the control of such pollutants." (CWA 402(p)(3)(B)(iii)). Under this provision, the Water Board has the authority to include requirements for reducing pollutants in storm water discharges as necessary for compliance with water quality standards. (*Defenders of Wildlife v. Browner*, 191 F.3d 1159, 1166 (9th Cir. 1999)).

Generally, permit requirements designed to achieve water quality standards are referred to as water quality-based effluent limitations (WQBELs). WQBELs are required for point source discharges that have the reasonable potential to cause or contribute to an excursion of water quality standards and technology-based

effluent limitations or standards are not sufficient to achieve water quality standards. (40 Code of Federal Regulations sections 122.44(d)(1)(i); 122.44(d)(1)(iii).). In MS4 permits, WQBELs may be expressed either in narrative form (e.g., as requirements to implement specified BMPs) or in numeric form (i.e., as numeric effluent limitations).[1]

Where MS4 discharges have the reasonable potential to cause or contribute to a water quality standard excursion, EPA recommends that MS4 permits "place a greater emphasis on clear, specific measurable permit requirements" and, where feasible, that MS4 permits include numeric effluent limitations." ("Revisions to the November 22, 2002, Memorandum 'Establishing Total Maximum Daily Load (TMDL) Waste Load Allocations (WLAs) for Storm Water Sources and NPDES Permit Requirements Based on Those WLAs'," November 26, 2014 (hereafter referred to as "US EPA 2014 Memorandum"), at pp. 2, 5.)) "'[N]umeric' effluent limitations refer to limitations with a quantifiable or measurable parameter related to a pollutant (or pollutants). Numeric WQBELs may include other types of numeric limits in addition to end-of-pipe limits. Numeric WQBELs may include, among others, limits on pollutant discharges by specifying parameters such as on-site storm water retention volume or percentage or amount of effective impervious cover, as well as the more traditional pollutant concentration limits and pollutant loads in the discharge" (US EPA 2014 Memorandum at p. 4, fn. 5.). The purpose of including numeric requirements is "to establish a more objective and accountable means for reducing pollutant discharges that contribute to water quality problems" (US EPA 2014 Memorandum at p. 5.). The numeric load reduction requirements in this NPDES Storm Water Permit provide the referenced "objective and accountable means" that effectively link Permittee actions to expected water quality benefit and track progress in restoring Lake Tahoe's historic transparency.

Where a State or EPA has established a TMDL for an impaired water that includes WLAs for storm water discharges, permits for MS4 discharges must contain effluent limits and conditions consistent with the requirements and assumptions of the WLAs in the TMDL (40 CFR 122.44(d)(1)(vii)(B)). U.S. EPA recommends that WLAs for NPDES-regulated storm water discharges should be disaggregated into specific categories, as was done for the Lake Tahoe TMDL

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[1] CWA § 402(p)(3)(B)(iii); 40 CFR § 122.44(k); U.S. EPA. Memorandum, Revisions to the November 22, 2002 Memorandum "Establishing Total Maximum Daily Load (TMDL) Wasteload Allocations (WLAs) for Storm Water Sources and NPDES Permit Requirements Based on Those WLAs," (Nov. 26, 2014), p. 6. (noting that WQBELs "could take the form of a numeric limit, or of a measurable, objective BMP-based limit that is projected to achieve the WLA"); see also Defenders of Wildlife v. Browner (9th Cir. 1999) 191 F.3d 1159, 1166 (noting that the permitting authority has discretion regarding the nature and timing of requirements that it includes as MS4 permit conditions to attain water quality standards, and that these requirements may include numeric effluent limitations).

(US EPA 2014 Memorandum at p. 7). WLAs were established for four source categories – urban uplands, forest uplands, atmospheric deposition, and stream channel erosion. This permit maintains particle- and mass-based effluent limits for fine sediment particles, total nitrogen, and total phosphorus based on requirements in the Lake Tahoe TMDL. By defining water quality improvement requirements in terms of average annual loading of the pollutants of concern, this renewed permit is consistent with recent US EPA guidance and provides a direct link to the transparency impairment, the Lake Tahoe TMDL, and all associated research and monitoring findings.

Heavy metals, pesticides, and pathogens are typically of concern in MS4 discharges. Extensive monitoring conducted as required by previous NPDES Storm Water Permits concluded these common storm water pollutants are not prevalent in Lake Tahoe urban runoff. Furthermore, the receiving waters in the Lake Tahoe Hydrologic Unit are in attainment with all applicable water quality standards and there is no evidence storm water discharges are causing or have reasonable potential to cause or contribute to beneficial use impairment other than transparency loss. The stringent control actions required to achieve pollutant load reductions for fine sediment particles, total nitrogen, and total phosphorus will prevent any unanticipated increase in the discharge of metals, pesticides, and pathogens.

Under State Water Board precedent, MS4 permits must include numeric receiving water limitations (Order WQ 99-05 (*Environmental Health Coalition*). Where dischargers need time to meet receiving water limitations, a permit can allow permittees to meet those limitations through an alternative compliance path that ensures an appropriate level of "rigor, transparency and accountability." (Order WQ 2015-0075 (*MS4 Discharges Within the Coastal Watersheds of Los Angeles County*), p. 33.). The alternative compliance path must be as short as possible (See *id.*, pp. 34-35, 60.). Order WQ 2015-0075 recognizes that the alternative compliance path approach in the Los Angeles permit is not appropriate for every situation.

This permit is unique in California as the only MS4 Permit that primarily regulates discharges to an ONRW. The TMDL load reduction effluent limitations and associated requirements already incorporate a compliance path toward meeting the water quality standards for lake clarity, total nitrogen and phosphorus. Dischargers in Nevada and California are implementing this program through a cooperative, bi-state process with U.S. EPA. The TMDL program requires compliance with interim load reduction requirements based on estimates of BMP performance developed through the Lake Clarity Crediting Program, and not on in-stream or end-of-pipe water quality measurements. These requirements are equivalent to the alternative compliance path the State Water Board upheld in Order WQ 2015-0075. So long as the Permittee meets the Pollutant Load Reduction Requirements in the Permit and the dates for achieving them, the Order states this will constitute as compliance with applicable receiving water limitations. This is consistent with Order WQ 2015-0075 which states "[I]f there is

an exceedance for a pollutant in a water body that has a TMDL addressing that pollutant, as long as the Permittee is complying with the requirements for the TMDL, the Permittee is deemed in compliance with the receiving water limitation. No petitioner has contested this provision and [State Water Board] finds that it constitutes an appropriate approach to compliance with receiving water limitations for water body-pollutant combinations that are addressed by a TMDL."

No alternative compliance path is necessary or appropriate for meeting receiving water limitations for non-TMDL constituents. The Permittees are already in compliance with those limitations and do not need time to implement new stormwater controls to avoid immediate non-compliance.

A.6. Trash Management

In 2015, the State Water Board adopted Resolution 2015-0019 amending the Water Quality Control Plan for Ocean Waters of California, and Part 1 of the Water Quality Control Plans for Inland Surface Waters, Enclosed Bays, and Estuaries of California to include statewide provisions for the control of trash, which are hereinafter referred to as the Trash Provisions. The Trash Provisions, which became effective December 2, 2015, include provisions to control trash statewide, and a statewide prohibition on the discharge or the deposition of trash to waters of the State.

This Order requires the Permittee to comply with the State Water Board's Inland Surface Waters, Enclosed Bays, and Estuaries of California (ISWEBE) Plan Trash Provisions, which address the impacts of trash to the surface waters of California through the establishment of a statewide narrative water quality objective, implementation requirements to control trash, and a prohibition against the discharge of trash. Chapter IV.A.5 of the Trash Provisions requires stormwater NPDES permits to contain provisions to prohibit the discharge of trash to waters of the State within ten (10) years of the implementing permit, or no "later than fifteen (15) years from the effective date" of the Trash Provisions, or no later than December 3, 2030. This Order is the implementing permit for the Permittee; therefore, the Permittee must obtain full compliance with the Trash Provisions by December 2, 2030. El Dorado County and the City of South Lake Tahoe in 2018 scored in category A. In Placer County 216 out of 234 sites scored in the A category, 18 in the B category and none in the C and D categories. Categories B through D require implementation of full capture or equivalency. Placer County has implemented a plan in these areas. The Lahontan Water Board has not approved the implementation plan.

This Order requires the permittees to select their Track 2 choice into SMARTS and to resubmit a trash implementation plan that is in accordance with Attachment H, as well as conduct annual monitoring/reporting. These requirements are described below:

A.6.1. Terminology

The phrase “Certified Full Capture Systems” is used throughout this Fact Sheet and Attachment H to refer to full capture systems that have been certified by the State Water Board Executive Director. Installation of Certified Full Capture Systems satisfies the requirements of the Trash Provisions. There are two types of Certified Full Capture Systems referred to together as “Certified Full Capture Systems” except where different requirements apply. They are:

- Certified Full Capture Trash Treatment Control Devices. These are proprietary devices that are generally installed within a storm drain system (e.g., storm vault/catch basin). These device’s primary function is to trap trash.
- Certified Multi-Benefit Trash Treatment Systems. These are non-proprietary systems that may be configured in a variety of ways to trap trash and infiltrate or reuse storm water.

A.6.2. Land Uses

The Trash Provisions require Permittees to address Priority Land Uses (or equivalent alternate land uses) through Compliance Track 1, or to achieve Full Capture System Equivalency by addressing locations or land uses of their choosing through Compliance Track 2. Priority Land Uses are “Those developed sites, facilities, or land uses (i.e., not simply zoned land uses) within the MS4 permittee’s jurisdiction from which discharges of trash are regulated by [the] Trash Provisions as follows:

- High-density residential: all land uses with at least ten (10) developed dwelling units/acre.
- Industrial: land uses where the primary activities on the developed parcels involve product manufacture, storage, or distribution (e.g., manufacturing businesses, warehouses, equipment storage lots, junkyards, wholesale businesses, distribution centers, or building material sales yards).
- Commercial: land uses where the primary activities on the developed parcels involve the sale or transfer of goods or services to consumers (e.g., business or professional buildings, shops, restaurants, theaters, vehicle repair shops, etc.)
- Mixed urban: land uses where high-density residential, industrial, and/or commercial land uses predominate collectively (i.e., are intermixed).
- Public transportation stations: facilities or sites where public transit agencies’ vehicles load or unload passengers or goods (e.g., bus stations and stops).”

Compliance Track 2 Permittees may determine the locations and land uses within their jurisdictions to implement Certified Full Capture Systems, Other Treatment Controls, and/or Institutional Controls. Permittees may have a broad range of alternate and determined locations and land uses. Examples of

alternate or determined locations and land uses include but are not limited to low-density residential housing, parks and recreation facilities, and government buildings.

1. On-Land Visual Trash Assessment or Equivalent Approaches

The State Water Board sponsored a study conducted by the Bay Area Stormwater Management Agencies Association to develop a systematic and cost-effective monitoring approach to establishing baseline trash generation, demonstrate Full Capture Equivalency, and measuring trash reduction over time. This study was not completed at the time the Trash Provisions were adopted. At the time of adoption, no such approach was available.

The Bay Area Stormwater Management Agencies Association final report, named "On-Land Visual Trash Assessment," emulates much of methodology for trash assessment already being successfully implemented in the San Francisco Regional Board's Phase I Municipal Stormwater permit. The Lahontan Water Board's 13383 Orders required Compliance Track 2 Permittees to conduct trash assessment in accordance with the On-Land Visual Trash Assessment Approach, though it did allow equivalent approaches. By default, this Order requires all Compliance Track 2 Permittees to use the On-Land Visual Trash Assessment Approach in the interest of obtaining comparable and reliable trash generation and trash reduction results statewide. The Executive Officer may approve an alternative trash assessment approach upon a Permittee's request. The request must include justification for not using the On-Land Visual Trash Assessment and a showing that the alternative trash assessment generates comparable results. To satisfy the requirement in the Trash Provisions, alternative trash assessment approaches shall:

- Demonstrate that such combination of Certified Full Capture Systems, Other Treatment Controls, and/or Institutional Controls achieve Full Capture System Equivalency;
- Estimate the trash generation in all Significant Trash Generating Areas based upon trash assessments;
- Demonstrate compliance with interim milestones, and
- Provide an assessment of the amount of annual trash reduction.

The On-Land Visual Trash Assessments Approach shall be implemented by Compliance Track 2 Permittees at all Priority Land uses, and alternative or determined locations and land uses. Trash assessment of adjacent streets will receive very high, high, moderate, or low generation rates as provided in the On-Land Visual Trash Assessment Approach. Each of these trash generation rates have a numeric value in gallons/acre/year. Permittees conduct a trash assessment of the adjacent streets and sidewalks of the land use and determine a trash generation rate. The number of acres of the land use times the trash generation rate provides the baseline trash generation for that land use. An overall baseline is calculated by adding the trash generation of each land use. As

Certified Full Capture Systems are installed, or Other Treatment Controls, and/or Institutional Controls implemented, trash reduction is achieved. Permittees are required to annually conduct trash assessment at the locations where Other Treatment Controls, and/or Institutional Controls are implemented to determine trash reduction. Permittees shall then use the formula in this Order to calculate the yearly decrease in trash from the baseline, demonstrate Full Capture Equivalency, and to demonstrate compliance with the interim milestones.

A.6.3. Certified Full Capture Systems

To satisfy the requirements of the Trash Provisions, either Certified Full Capture Systems must be adequately designed and installed, or Full Capture System Equivalency must be achieved. Only systems that are certified by the State Water Board Executive Director constitute Certified Full Capture Systems. Certified Full Capture Systems include both Certified Full Capture Trash Treatment Devices and Certified Multi-Benefit Trash Treatment Systems.

The Trash Provisions include specific design requirements that are included in this Order. This Order also requires that Certified Full Capture Trash Treatment Control Devices be sized and designed to maintain hydraulic capacity to trap trash for peak flow rates when 50 percent filled with trash and other debris. This requirement, in conjunction with the requirement that maintenance be conducted prior to Certified Full Capture Trash Treatment Control Devices becoming 50 percent full of trash, will significantly reduce incidences of inadvertent trash discharge.

Before installing Certified Full Capture Systems, Permittees should determine whether the Systems hydraulic capacity and trash treatment capacity are appropriate for the design peak flow rate and trash generation rate associated with the drainage area. A Full Capture Treatment Device, for example, may have adequate hydraulic capacity as required by this Order but too small a trash treatment capacity to maintain the hydraulic capacity prior to its next scheduled maintenance. This would result in the Permittee significantly increasing the maintenance frequency in order to ensure its hydraulic capacity. If the device can’t be maintained to ensure its hydraulic capacity because of too high a trash generation rate relative to its trash capture capacity, the device does not comply with the Trash Provisions.

Certified Full Capture Systems may be decertified for a variety of reasons. Once decertified, new installation of the decertified system will not satisfy the requirements of the Trash Provisions. Permittees that installed Certified Full Capture Systems prior to the date the Systems were decertified may continue to maintain the Systems if the Systems were designed to be consistent with the full capture requirements of the Trash Provisions and performed in accordance with those designs. If the decertified devices are found to not be consistent with the full capture requirements of the Trash Provisions (for example, if the device has failed to perform in accordance with the certified designs), such installed devices,

even if installed before decertification, will not satisfy the requirements of the Trash Provisions.

Permittees must apply to the State Water Board Executive Director to certify a new certified trash treatment control device, or a project-specific full capture system. Project-specific full capture systems are systems designed for a unique project that are not applicable to other projects.

A.6.4. Full Capture System Equivalency

The Trash Provisions define Full Capture System Equivalency as the trash load reduction equivalent to the performance of Certified Full Capture Systems that are properly installed, operated, and maintained for all storm drains that capture runoff from Priority Land Uses.

Permittees shall annually demonstrate that Other Treatment Controls, and/or Institutional Controls implemented achieve Full Capture System Equivalency.

Permittees shall use the methodology as discussed regarding the “On-Land Visual Trash Assessment” approach and equivalent approaches to demonstrate Full Capture Equivalency. Under that Approach, the locations and land uses where trash assessments result in “low” trash generation rates after implementing Other Treatment Controls, and/or Institutional Controls will have achieved Full Capture System Equivalency.

A.6.5. Trash Reduction Milestones

The Trash Provisions require permits to include interim milestones. The Interim Milestones in this Order were developed with the goal of providing Permittees with the maximum flexibility in planning their trash reduction activities while still achieving reasonable progress to attaining full compliance by December 2, 2030, as required by the Trash Provisions. Full compliance is attained when a Permittee achieves a 100 percent trash reduction from the baseline. Other Interim Milestones options were considered such as percent acreage reduction, percent trash location reduction, and annual interim milestones. These options are unnecessarily burdensome and limiting to Permittee trash implementation flexibility.

To provide Permittees some flexibility in complying with the Trash Provisions, the Interim Milestones are presented as percent trash reduction goals over three 2 to 3-year periods. The interim milestones specify the percent trash reduction that must be achieved by specific deadlines. The trash reduction is calculated with a formula that accounts for reduction in trash levels at the Priority Land Uses and/or selected locations and land uses where Certified Full Capture Systems, Other Treatment Controls, and/or Institutional Controls have been implemented. The formula accounts for the acreage of each land use and weighing factors of the trash generated from each trash level.

Permittees shall annually report their status towards compliance with the Interim Milestones in their Annual Trash Monitoring Reports. Permittees may develop alternative Trash Reduction Interim Milestones to replace either or both the first and second Interim Milestones described above with justification. The Permittee shall submit the alternative Trash Reduction Interim Milestones and justification to the Regional Water Board Executive Officer for approval.

If applicable, Permittees shall inspect and/or maintain Certified Full Capture Trash Treatment Control Devices at a frequency that ensures hydraulic capacity at 50 percent of its trash capture capacity. Since Certified Full Capture Trash Treatment Control Devices must be designed to trap trash for the peak flows generated by a 1-year, 1-hour storm event up to 50 percent of its trash capture capacity, adequate maintenance will assure trash is not discharged in violation of the Trash Provisions. Maintenance intervals are a function of both the trash capacity of the Certified Full Capture Trash Treatment Control Device and the trash generation of the drainage area. This order establishes minimum maintenance intervals for moderate generation rates, and for high and very high trash generation rates. However, Permittees must modify the maintenance intervals if any Certified Full Capture Trash Treatment Control Device is found to exceed 50 percent of its trash capacity during an inspection and/or maintenance event. This prevents or minimizes a reoccurrence of trash discharge prior to the next scheduled maintenance event.

If applicable, Permittees shall inspect and maintain Certified Multi-Benefit Trash Treatment Systems to prevent the accumulation of trash to a level which inhibits its hydraulic capacity to infiltrate or treat stormwater at the design peak flow rate to assure trash is not discharged in violation of the Trash Provisions. The minimum maintenance schedule is the same as for Certified Full Capture Trash Treatment Control Devices and must be modified when necessary.

Permittees shall inspect locations and areas where Other Treatment Controls, and/or Institutional Controls have been implemented with the same frequency as described above. Maintenance frequency shall be increased as necessary so that the Other Treatment Controls, and/or Institutional Controls achieve Full Capture System Equivalency.

A.6.6. Trash Generating Area Inventory and Map

This Order requires preparation and annual updating of a Trash Generating Inventory (Inventory) as part of the Monitoring and Reporting Program and as specified in Attachment H.

The Inventory includes all the information necessary to prepare and annually update the Trash Generating Area Map and Trash Implementation Plan. The Inventory requirements are divided by Permittee type and Compliance Track.

Development of the Inventory requires the identification of all existing Certified Full Capture Systems, Other Treatment Controls, and/or Institutional Controls. All remaining Certified Full Capture Systems, Other Treatment Controls, and/or Institutional Controls establish a baseline to which the Interim Milestones are applied. The Inventory must identify the Certified Full Capture Systems, Other Treatment Controls, and/or Institutional Controls that are planned for the following year. Compliance Track 2 Permittees are required to include the trash generation rates in gallons per acre, per year for each Priority Land Use and locations or land uses that generate substantial amounts of trash and perform a trash assessment, discussed below, to determine these trash generation rates. Development of the Trash Generating Area Map requires identification of Priority Land Uses or locations and land uses that generate substantial amounts of trash, as appropriate, as well as locations of implemented and upcoming (in the following 12 months) Certified Full Capture Systems, Other Treatment Controls, and/or Institutional Controls.

As included in the Trash Provisions, Regional Water Board Executive Officers may determine that specific land uses or locations (e.g., parks, stadia, schools, campuses, or roads leading to landfills) generate substantial amounts of trash. If a Regional Water Board Executive Officer makes that determination, Permittees shall include the areas in the Trash Generating Area Inventory and Map, and, for Compliance Track 2 Permittees, the trash assessment. The Executive Officer has discretion to determine the time schedule for full compliance for the specific land uses or locations but in no case may the final compliance date be later than December 2, 2030. As discussed above, the Executive Officer should not include areas outside the jurisdiction of a Permittee's storm sewer system.

A.6.7. Annual Trash Assessment

This Order requires Permittees to conduct an annual trash assessment of the effectiveness of their Certified Full Capture Systems, Other Treatment Controls, and/or Institutional Controls. Track 2 Permittees shall either:

Annually conduct a trash assessment to assess trash reduction at each location or land use where the Permittee has implemented Other Treatment Controls, and/or Institutional Controls; or

Annually conduct trash assessment to assess trash reduction at a statistically representative type of similar locations or land uses, of similar trash generation levels, and with similar implemented of Other Treatment Controls and/or Institutional Controls. The result of such an assessment will apply to all corresponding similar locations or land uses, Other Treatment Controls, and/or Institutional Controls.

Track 2 Permittees have already conducted trash assessments of all their Priority Land uses, and locations and land uses. Therefore, this Order does not require Permittees to additionally assess such areas where the Permittee

have implemented Certified Full Capture Systems since these systems inherently achieve Full Capture System Equivalency if designed and maintained properly. Annual trash assessment is only required to demonstrate Full Capture System Equivalency for areas where Other Treatment Controls and/or Institutional Controls have been implemented.

A.6.8. Annual Trash Monitoring Report

Permittees shall report via SMARTS an Annual Trash Monitoring Report (Report). Because the Permittee has elected to comply with Track 2 (Chapter IV.A.3.a.2 of the Trash Provisions), the Permittee must consider questions specified in Chapter IV.A.6.b of the Trash Provisions when developing its monitoring reports.

Permittees are required to report:

- The Certified Full Capture Systems, Other Treatment Controls, and Institutional Controls installed and implemented in the previous 12 months, their locations, and the corresponding individual and cumulative acreage;
- The Certified Full Capture Systems, Other Treatment Controls, and/or Institutional Controls that are planned to be installed and implemented in the next 12 months, their locations, and the corresponding individual and cumulative acreage;
- The decrease in the amount of Trash discharged from the areas where Certified Full capture Systems and Other Treatment Controls, and/or Institutional Controls have been installed and implemented from the previous year; and
- The effectiveness of the implemented Certified Full capture Systems, Other Treatment Controls, and/or Institutional Controls in meeting Full Capture System Equivalency.

This Order also asks Permittees to report the decrease in the amount of Trash in their receiving waters from the previous year, but only if such information is readily available. This Order does not mandate that Permittee assess receiving waters for decreases in trash. In most instances, there are other sources of trash in receiving waters over which the Permittees have no control and so such an assessment will not necessarily demonstrate a Permittee's compliance with this Order. In addition, there is not a reliable assessment tool for trash within a water column.

A.7. Storm Water Management Plans

To provide consistency with federal regulations (40 CFR 122.26(d)(2)(iv)) and address deficiencies noted by a United States Environmental Protection Agency audit of Order 6-00-82, the primary goal of the previous NPDES Storm Water Permits (R6T-2005-0026, R6T-2011-0101A, and R6T-2017-0010) was to require the Permittees to develop and implement comprehensive storm water

management programs. The previous permits required the jurisdictions to prepare and implement a Storm Water Management Plan to (1) continue erosion control and storm water treatment project implementation; (2) inspect and control runoff from construction, industrial, commercial, and residential sites; (3) develop a storm water education program for municipal staff and the public; (4) detect and eliminate illicit discharges; (5) provide for public participation; (6) assess program effectiveness; (6) inspect roadways and other municipal storm water facilities; (7) manage traction abrasive and deicing application and recovery; and (8) evaluate program funding needs and provide fiscal management plan.

Order R6T-2011-0101A required the Permittees to submit updated Storm Water Management Plans to align programmatic efforts with permit requirements. The three Permittees submitted plans by October 1, 2013, as required. Water Board staff reviewed the submitted material and found the plans compliant with permit requirements.

The 2013 Storm Water Management Plans provide the needed programmatic framework for implementing necessary storm water management activities, and Section III.B of this renewed permit requires the Permittees to continue implementing current programs and revisit and update their existing Storm Water Management Plans as needed.

A.8. Monitoring Requirements

The Lake Clarity Crediting Program relies on numeric modeling tools to provide estimates of average annual pollutant loading and of water quality benefit associated with various management strategies. A series of condition assessment methods have been developed to link on-the-ground field conditions to model input variables to determine whether actual treatment facility and roadway conditions are consistent with modeled assumptions. Monitoring and Reporting Section I.D requires Permittees to conduct condition assessments of all roadways and runoff treatment facilities consistent with established methods for all catchments registered under the Lake Clarity Crediting Program. By emphasizing field condition assessments, the Permit requires the Permittees to focus limited staff resources on gathering meaningful information to verify model estimate parameters. If field conditions are consistent with modeled variables, then it is more likely that actual pollutant loading is consistent with modeled pollutant load estimates.

Effective implementation and pollutant load reduction tracking requires a well-designed water quality monitoring program that can be applied with an adaptive management framework. The Lake Tahoe Regional Storm Water Monitoring Program (RSWMP) was developed to meet this purpose for urban storm water. In collaboration with Lake Tahoe basin stakeholders and agency representatives, the RSWMP established a series of goals and objectives to guide urban storm water monitoring, crafted a detailed Framework and Implementation Guidance

document, and prepared and implemented an effective monitoring program on behalf of the Permittees.

On August 19, 2014 (79 FR 49001), EPA promulgated new regulations related to ensuring that sufficiently sensitive test methods are used when performing laboratory analyses required by NPDES permits. For the consistency with the regulations at 40 CFR 122.44(i)(1)(iv), test methods with a “minimum level” (ML, as the term is used at 40 CFR 136) at or below permit effluent limits, or the method that has the lowest ML of the analytical methods approved under 40 CFR part 136.

The Permit requires Permittees to continue supporting the RSWMP effort to gather data at a catchment scale to help assess whether modeled water quality improvements are being realized and monitor the effectiveness of selected water quality improvement practices to inform model input parameters and improve treatment facility design and operations and maintenance efforts. Data collection conducted by RSWMP with Permittee support provides critical data to inform future TMDL and NPDES Storm Water Permit programmatic adjustment and evaluate long-term load reduction accomplishments.

A.9. Standard Provisions

Standard Provisions, which apply to all NPDES permits in accordance with 40 Code of Federal Regulations section 122.41, and additional conditions applicable to specified categories of permits in accordance with 40 Code of Federal Regulations section 122.42, are provided in Attachment G (Standard Provisions). The Permittee must comply with all standard provisions and with those additional conditions that are applicable under 40 Code of Federal Regulations section 122.42.

A.10. California Water Code Section 13241

California Water Code section 13241 requires the Lahontan Water Board to consider certain factors when establishing water quality objectives, including:

(a) Past, present, and probable future beneficial uses of water.
(b) Environmental characteristics of the hydrographic unit under consideration, including the quality of water available thereto.
(c) Water quality conditions that could reasonably be achieved through the coordinated control of all factors which affect water quality in the area
(d) Economic considerations.
(e) The need for developing housing within the region
(f) The need to develop and use recycled water.

The Lahontan Water Board is not establishing any water quality objectives in the Order. However, California Water Code section 13263 requires the Board to take into consideration the provisions of section 13241 in prescribing waste discharge

requirements, when such requirements are more stringent than what federal law requires.

In City of Burbank v. State Water Resources Control Board (2005) 35 Cal.4th 613, the California Supreme Court considered whether a regional water board must consider the provisions of section 13241 when issuing waste discharge requirements that serve as a NPDES permit by taking into account the costs a permittee will incur in complying with the permit requirements. The Court concluded that whether it is necessary to consider such cost information "depends on whether those restrictions meet or exceed the requirements of the federal Clean Water Act." (Id. at p. 627.) The Court ruled that regional water boards may not consider the factors in section 13241, including economics, to justify imposing pollutant restriction that are less stringent than the applicable federal law requires. (Id. at pp. 618, 626- 627 ["[Water Code s]ection 13377 specifies that discharge permits issued by California's regional boards must meet the federal standards set by federal law. In effect, section 13377 forbids a regional board's consideration of any economic hardship on the part of the permit holder if doing so would result in the dilution of the requirements set by Congress in the Clean Water Act…Because section 13263 cannot authorize what federal law forbids, it cannot authorize a regional board, when issuing a discharge permit, to use compliance costs to justify pollutant restrictions that do not comply with federal clean water standards"].) However, when the pollutant restrictions in an NPDES permit are more stringent than federal law requires, California Water Code section 13263 requires that the Water Boards consider the factors described in section 13241 as they apply to those specific restrictions.

The Lahontan Water Board finds that each of the requirements in the Order are not more stringent than what federal law requires for the control of MS4 discharges of pollutants in the Lahontan Region. Clean Water Act section 402(p)(3)(B) requires MS4 permits to include requirements to effectively prohibit non-stormwater discharges through the MS4 to receiving waters, as well as "controls to reduce the discharge of pollutants to the maximum extent practicable, including management practices, control techniques and system, design and engineering methods, and such other provisions as the Administrator or the State determines appropriate for the control of such pollutants." The permitting agency, be it the Lahontan Water Board or U.S. EPA, must therefore include provisions when it finds it is appropriate to do so and to exercise its discretion to determine what permit conditions are necessary to control pollutants in a specific geographic area.

The Lahontan Water Board finds that inclusion of all of the requirements in the Order are necessary and appropriate to control MS4 discharges in Lake Tahoe. To the extent the requirements in the Order may be more specific or detailed than those enumerated in federal regulations under 40 CFR § 122.26 or in U.S. EPA guidance, the requirements have been designed to be consistent with and within the federal statutory mandates described in Clean Water Act section

402(p)(3)(B) and the related federal regulations and guidance. Since the Board determines that each of the requirements in the Order are not more stringent than what federal law requires, there is no legal requirement for the Board to consider the factors of California Water Code section 13241.

The Lahontan Water Board has nevertheless considered the factors set forth in California Water Code section 13241 in issuing the Order. The Board's consideration of each of the factors is provided below.

It is important to note that neither California Water Code section 13241 or section 13263 specifies the type or level of consideration required. Neither do these sections dictate what, if anything, a regional water board must do upon consideration of the factors.

A.10.1. Past, Present, and Probable Future Beneficial Uses of Water

Chapter 5 of the Basin Plan identifies designated beneficial uses for surface waters in the Lahontan Region, including the Lake Tahoe hydrologic unit. The Basin Plan identifies whether the beneficial use is existing or a potential beneficial use (past beneficial uses are identified in the chapter as potential uses). The beneficial uses identified in the Basin Plan for the Lake Tahoe hydrologic unit include water contact and non-contact recreation (REC-1 and REC-2), commercial and sport fishing (COMM), Cold Freshwater Habitat (COLD), Wildlife Habitat (WILD), Ground Water Recharge (GWR), Drinking Water Supply (MUN), Agricultural Water Supply (AGR), Navigation (NAV), Preservation of Biological Habitat of Special significance (BIOL), Migration of Aquatic Organisms, (MGR), and Spawning, Reproduction and Development (SPWN). Under this permit, overall water quality is predicted to improve because fine sediment particle, total nitrogen and total phosphorus loads are being reduced and will continue to decline under further iterations of this permit. The requirements of the Order are necessary to protect the past, present, and probable future beneficial uses of surface waters in the Lake Tahoe hydrologic unit.

A.10.2. Environmental Characteristics of the Hydrographic Unit Under Consideration, Including the Quality of Water Available Thereto

The California – Nevada state line splits the Lake Tahoe basin, with about three quarters of the basin's area and about two-thirds of the lake's area lying in California. The geologic basin that cradles the lake is characterized by mountains reaching over 4,003 feet (1,220 meters) above lake level, steep slopes, and erosive granitic soils. Volcanic rocks and soils are also present in some areas. The Lake Tahoe basin has a Mediterranean-type climate characterized by wet winters and dry summers. Most precipitation in the basin falls between October and May as snow at higher elevations and as snow/rain at lake level. Over 75

percent of the precipitation is delivered by frontal weather systems from the Pacific Ocean between November and March. However, precipitation timing can vary significantly from year to year.

Lake Tahoe is renowned for its extraordinary clarity and purity, and deep blue color. The clarity and transparency of Lake Tahoe has been the subject of extensive research for many years. The clarity and transparency of water are influenced by many factors, including natural lighting (affected by sun angle, cloud cover, and waves), properties of water molecules, lake mixing, colored dissolved organic matter, and especially, in the case of Lake Tahoe, particulate material in the water. Material in the water can include inorganic particles (soil sediment) and organic particles (such as live suspended algae, suspended detritus or dead organic material) and a combination of these types of particulate matter in the form of aggregations that typically form around a biochemically 'sticky' organic matrix mediated by bacterial excretions. Transparency is most commonly measured as Secchi depth.

Land uses in the Lake Tahoe basin have an influence on lake clarity and other environmental attributes. The addition of nitrogen and phosphorus to Lake Tahoe contributes to phytoplankton growth. Fine sediment particles are the most dominant pollutant contributing to the impairment of the lake's deep water transparency, accounting for roughly two thirds of the lake's impairment. Because these three pollutants are responsible for Lake Tahoe's deep water transparency loss, Lake Tahoe is listed under Section 303(d) as impaired by input of nitrogen, phosphorus, and fine sediment particles. The goal of the Lake Tahoe TMDL is to set forth a plan to restore Lake Tahoe's historic deep water transparency to 29.7 meters annual average Secchi depth.

The entire permit area has been characterized using the Pollutant Load Reduction Model Software (PLRM). The land has been divided into distinct catchments where factors are used to calculate baseline loads of fine sediment particles. Actions permittees perform within each catchment result in load reductions specified in the Tahoe TMDL and this permit.

A.10.3. Water Quality Conditions that Could Reasonably be Achieved Through the Coordinated Control of All Factors Which Affect Water Quality in the Area

Water quality conditions can be reasonably achieved through this permit and other regulatory actions throughout the Lake Tahoe Watershed. This permit only covers three municipalities on the California side of Lake Tahoe. The Tahoe TMDL objectives are achieved through the Nevada Division of Environmental Protection on the Nevada side of Lake Tahoe. Caltrans is regulated by a California State Water Board statewide permit that requires the same load reductions as this permit. Areas outside the urban boundary, including mainly

forested public lands, are also regulated to reduce and track reductions of fine sediment particles.

A.10.4. Economic Considerations

This is the third 5-year term of essentially the same permit and conditions. All three permittees have committed to implementation of the Tahoe TMDL and have planned budgets around the requirements. Funding for water quality protection and improvement in the Tahoe Region includes municipal general funds and an abundance of grant programs.

The Lahontan Water Board recognizes that economic information, including cost information, is invaluable for informed decision-making and for the evaluation and improvement of policies and practices. Economic information is also critical for Permittees to manage their assets, implement cost-effective programs, and develop successful funding strategies to achieve overall improvements in water quality within the region. The Legislature did not define “economic considerations” in California Water Code section 13241. As noted in City of Arcadia I, there is no reported court decision analyzing the “economic considerations” phrase of the statute. In City of Burbank, the California Supreme Court, “without discussion, concluded that in adopting Water Code section 13241 the Legislature intended ‘that a regional board consider the cost of compliance [with numeric pollutant restrictions] when setting effluent limitations in a wastewater discharge permit.’ (Italics added.).” (135 Cal.App.4th at 1415.) While the California Supreme Court assumed “economic considerations” includes costs of compliance, it did indicate that this factor is broader. (City of Burbank, 35 Cal.4th at 618 [noting that when a regional board is considering whether to make pollutant restrictions in a permit more stringent than federal law requires, “California law allows the board to take into account economic factors, including the wastewater discharger's cost of compliance.” (emphasis added.)].) As discussed in the introduction to this Part XIII, in City of Duarte, the Court of Appeal held that “…the Water Control Boards are charged with taking into account economic considerations, not merely costs of compliance with a permit … economic considerations also include, among other things, the costs of not addressing the problems of contaminated water.” (City of Duarte, supra, 60 Cal.App.5th at 276.)

Since the Lahontan Water Board has broad discretion in how it considers this factor, the Board interprets this factor as not only requiring a consideration of the costs of compliance, but also other relevant economic factors such as the societal and environmental costs of not adequately controlling MS4 discharges. Many of the costs that will be incurred by permittees as a result of implementing the Order are not fundamentally new because this is the third 5-year permit period with essentially the same requirements. MS4 permits, and stormwater and urban runoff management programs to implement MS4 permit requirements, have been in place in the Lahontan Region since 1980s. Costs incurred by

Permittees to implement the Order will largely be related to continued efforts to meet these longstanding requirements. Furthermore, the two prior 5-year permits related to the Lake Tahoe TMDL included requirements to implement WQBELs consistent with the assumptions and requirements of applicable TMDL wasteload allocations. There is a limited number of new TMDL-related requirements mainly requiring a decrease in FSP load discharges. The Lahontan Water Board recognizes that these costs of compliance could be significant, and that Permittees may have limited resources to implement actions to address their MS4 discharges.

A.10.4.1 Funding

The Water Board and implementation of this Order is part of the Lake Tahoe Environmental Improvement Program (EIP). Lake Tahoe is one of the clearest, largest lakes in the world and is designated an outstanding national resource water. At the close of the 20th century, Lake Tahoe's spectacular environment was struggling. The Lake's famous clarity and fragile ecosystems were severely degraded by urbanization, complicated jurisdictional boundaries, and numerous land managers throughout the region adding an extra challenge to restoration goals. The partnership came together in 1997 to launch the Environmental Improvement Program to implement hundreds of projects to improve Lake Tahoe's water quality, make forests healthier, clean the air, and enhance all aspects of the environment and local communities.

Since 1997 over 700 projects have been completed at a cost of over 2.6 billion dollars. A large portion of these projects have gone towards implementation of the Tahoe TMDL through multiple funding sources. Permittees' source of funding to implement this permit include county and city general funds, Southern Nevada Public Lands Act funds, Lake Tahoe Restoration Act funds, Federal 319 Grant funds, and various proposition and bond acts funds.

The City of South Lake Tahoe (City) spent an average of 4.7 million dollars per year over the last ten years on stormwater related expenses as shown below:

Program Management (personnel)	$215,000
Operations and Maintenance	$391,000
Monitoring	$40,000
Equipment (5-year average)	$283,000
Infrastructure	$3,847,000
TOTAL	$4,776,000

The City's Funding Sources:

- Program Management/Monitoring: Local General Fund
- O&M: Local General Funds and TRPA Water and Air Quality Mitigation Fees

- Capital-Infrastructure: Local General Funds, TRPA Mitigation Fees, State and Federal Grants

Placer County spent an average of 5.1 million dollars per year over the last ten years as shown below:

Program Management (personnel)	$225,000
Operations and Maintenance	$550,000
Monitoring	$40,000
Equipment	$250,000
Infrastructure	$4,030,000
TOTAL	$5,095,000

Placer County's Funding Sources:

- Program Management/Monitoring: County General Fuand and Toad Fund
- O&M: Road Fund
- Capital-Infrastructure: Road Funds, TRPA Mitigation Funds, State and Federal Grants

El Dorado County spent an average of 3.4 million dollars per year over the last 10 years as shown below:

Program Management (personnel)	$275,000
Operations and Maintenance	$714,400
Monitoring	$42,000
Special Studies/Laboratory Costs	$30,000
Equipment	$313,000
EIP Infrastructure	$2,022,380
TOTAL	$3,400,380

El Dorado County's Funding Sources:

- Program Management/Monitoring: County General Fund and Road Fund
- O&M: Road Fund
- Capital-Infrastructure: State and Federal Grants, and TRPA Mitigation Funds

A.10.4.2 Future Challenges for the Permittees

Asset replacement and long-term maintenance will continue to be a funding challenge in the future. The recent federal infrastructure bill may provide future funding, and the near-term outlook for federal and state grants will continue to help fund new infrastructure projects. Material shortages will create short-term challenges for capital projects and housing prices, and labor availability will

continue to present staffing challenges in filling entry level maintenance worker vacancies required for critical O&M tasks.

A.10.4.3 Environmental and Societal Costs of Not Controlling MS4 Discharges

Lake Tahoe is famous for its clear, cobalt blue water and is a major tourist destination. The local economy relies on vacationing visitors to support recreation venues, lodging and outdoor activities. Protection of visual beauty of Lake Tahoe is important to maintain its attraction for visitors.

Many private property owners and public utilities have municipal water lake intakes that come directly from Lake Tahoe. It is important that this water source is of the highest quality.

A.10.5. The Need for Developing Housing Within the Region

Housing in the Tahoe Basin is limited by the Tahoe Regional Planning Agency. The urban boundary is fixed and cannot be expanded. All new housing is added as in-fill between existing development and few developable lots remain. Therefore, the increase in housing units in the future is not significant.

A.10.6. The Need to Develop and Use Recycled Water

There is not a need to develop the use of recycled water within the permit area.

A.11. Antidegradation Policy

Federal regulations at 40 CFR section 131.12 require that state water quality standards include an antidegradation policy consistent with federal requirements. The State Water Board established California's antidegradation policy in State Water Board Resolution No. 68-16 ("Statement of Policy with Respect to Maintaining High Quality of Waters in California"). Where the federal antidegradation policy is applicable, the State Water Board has interpreted Resolution No. 68-16 to incorporate the federal antidegradation policy. The Lahontan Water Board's Basin Plan implements, and incorporates by reference, both the State and federal antidegradation policies. The permitted discharge must be consistent with the antidegradation provision of 40 CFR section 131.12 and State Water Board Resolution No. 68-16. Resolution No. 68-16 and 40 CFR section 131.12 require that high quality waters be maintained unless degradation is justified based on specific findings. The Lahontan Water Board finds that the permitted discharges authorized by this Order are consistent with the antidegradation provision of 40 CFR section 131.12 and State Water Board Resolution No. 68-16, as set forth herein.

State antidegradation policy in State Water Board Resolution No. 68-16, "Statement of Policy With Respect to Maintaining High Quality of Waters in

California", specifies in substantial part that: “Whenever the existing quality of water is better than the quality established in policies… such existing high quality will be maintained until it has been demonstrated to the state that any change will be consistent with maximum benefit to the people of the state, will not unreasonably affect present and anticipated beneficial use of such water and will not result in water quality less than that prescribed in the policies. Any activity…which proposes to discharge to existing high quality waters will be required to meet waste discharge requirements which will result in the best practicable treatment or control of the discharge necessary to assure that (a) a pollution or nuisance will not occur and (b) the highest water quality consistent with maximum benefit to the people of the state will be maintained.”

Lake Tahoe is designated as an Outstanding National Resource Water (ONRW). 40 C.F.R. section 131.12(a)(3) specifies that: “Where high quality waters constitute an Outstanding National Resource, such as waters of National and State parks and wildlife refuges and waters of exceptional recreational or ecological significance, that water quality shall be maintained and protected.” Federal guidance on implementing federal antidegradation policy is contained in the U.S. EPA Water Quality Standards Handbook (EPA-823-B-12- 002, 2012). U.S EPA in Section 4.7 of the USEPA Water Quality Standards Handbook notes that the state can allow activities that result in temporary and short-term changes in the water quality of an ONRW (i.e., Tier III water) provided those changes do not permanently degrade water quality or result in water quality lower than that necessary to protect the existing uses in the ONRW. The term “temporary and short-term” is undefined and is dependent on the activity involved. However, the USEPA Water Quality Standards Handbook notes that in rather broad terms, “EPA’s view of temporary is weeks and months, not years. The intent of EPA's provision clearly is to limit water quality degradation to the shortest possible time.”

The Lahontan Water Board finds that it is not required to conduct a waterbody by waterbody and pollutant by pollutant antidegradation analysis for this Order. The Lahontan Water Board makes this finding for two reasons. First, the Administrative Procedures Update, Antidegradation Policy Implementation for NPDES Permitting, 90- 004 (APU 90-004), which specifies a waterbody by waterbody and pollutant by pollutant analysis for some permitting actions, does not address permitting for diffuse MS4 discharges. Second, APU 90-004 itself indicates that a waterbody by waterbody and pollutant by pollutant analysis is only required when conducting a “complete” antidegradation analysis; a complete analysis, in turn, is not required where any reduction in water quality is temporally limited and would not result in any long-term deleterious effects on water quality.” (APU 90-004, p. 2). Here, the Order requires compliance with requirements derived from a TMDL designed to bring MS4 discharges and receiving waters into compliance with water quality objectives. The Order continues the requirements of the previous permits or imposes equivalent or more protective requirements such that the water quality established under the prior permits is expected to be maintained and improved. Generally, the prior permits instituted

controls to help ensure that water quality will be maintained at the level it is now, or improve it, and this new Order institutes similar requirements. Therefore, any degradation permitted while controls are continuing to be developed will be temporally limited and will not result in any long-term deleterious effects on water quality. The below analysis is consistent with the generalized antidegradation analysis appropriate for this Order and complies with both the federal antidegradation regulations, and with the State antidegradation policy.

Lake Tahoe is currently impaired for transparency. This NPDES Storm Water Permit is intended to improve storm water quality and reduce the negative impacts associated with urban runoff. The requirements in this Permit are intended to result in improving the transparency of Lake Tahoe to a level consistent with the antidegradation policy. This Permit is no less stringent than prior permits and does not extend the coverage of the Permit beyond the Dischargers previously authorized to discharge under the prior permits.

A.12. Anti-backsliding

As in Order No. R6T-2017-0010, this Permit requires the Permittee to continue to control discharges to the maximum extent practical and to continue to comply with the receiving water limitations. This Order also requires the Permittee to comply with water quality-based effluent limitations (WQBELs) expressed as structural and non-structural controls, including for water body-pollutant combinations subject to the TMDLs. The compliance pathways for achieving WQBELs and receiving water limitations are not contrary to anti-backsliding requirements of federal and state law. The Pollutant Load Reduction requirements for achievement of water quality-based effluent requirements does not constitute backsliding from the receiving water limitations in Order No. R6T-2017-0010.

Sections 402(o)(2) and 303(d)(4) of the Clean Water Act and federal regulations at 40 Code of Federal Regulations section 122.44(l) prohibit backsliding in NPDES permits. These anti-backsliding provisions require effluent limitations in a reissued permit to be as stringent as those in the previous permit, with some exceptions where limitations may be relaxed.

All effluent limitations and other conditions in this Permit are at least as stringent as the effluent limitations in Order R6T-2017-0010. The Tahoe TMDL establishes jurisdiction-specific waste load reduction milestones for FSP, Nitrogen, and Phosphorus effluent limitations that increase every five-years for the 65-year term of the TMDL. For the third five-year TMDL milestone, jurisdiction-specific waste load reduction requirements are incorporated into this Permit as average annual particle number- and mass-based effluent limits. These effluent limitations are not less stringent than the effluent limitations in Order No. R6T-2017-0010. Discharge concentrations of other pollutants to surface or groundwater remains unchanged.

A.13. Tahoe Science Advisory Council

The Tahoe Science Advisory Council (Council) was established in 2015 by a memorandum of understanding between California and Nevada. The Council is an independent group of scientists who work collaboratively to advise policy makers to promote, enhance, and maintain the ecological integrity of Lake Tahoe and its watershed. The Water Board works closely in partnership with the Council to apply the latest science to state policy regarding the Lake Tahoe TMDL.

The Council has found that fine sediment particles and nutrients, which are regulated under the Lake Tahoe Municipal Stormwater Permit, remain as the major pollutants influencing lake transparency. However, the Council has also determined that other factors influence lake transparency. Other factors affecting lake clarity include climate change induced lake warming, altered lake mixing, increased lake stratification, changes in precipitation delivered to the lake, and in-lake ecological changes. To further explore the factors that influence lake transparency, Council projects are currently underway to organize available data, assess ecological drivers, explore new statistical approaches, and develop contemporary modeling tools.

A.14. State Mandates

Article XIII B, section 6(a) of the California Constitution provides that whenever "any state agency mandates a new program or higher level of service on any local government, the state shall provide a subvention of funds to reimburse that local government for the costs of the program or increased level of service." No provision of the Order constitutes an unfunded state mandate subject to subvention under Article XIII B, section (6)(a) of the California Constitution for several reasons:

1. Renewal of the Permits Is Not a New Program or Higher Level of Service

As a threshold matter, MS4 permitting is not a "program" as that term is used in Article XIII B, section (6). The California Supreme Court has defined a "program" for purposes of Article XIII B, section 6, as: (1) programs that carry out the governmental function of providing services to the public, or (2) laws which, to implement a state policy, impose unique requirements on local governments and do not apply generally to all residents and entities in the state. (San Diego Unified School Dist. v. Commission on State Mandates (2004) 33 Cal.4th 859, 874 (reaffirming the test set forth in County of Los Angeles v. State of California (1987) 43 Cal.3d 46, 56); Lucia Mar Unified School District v. Honig (1988) 44 Cal.3d 830, 835.) An NPDES permit for MS4 discharges arises from the Clean Water Act, which forbids everyone – individuals, businesses, state governments, tribal governments, local governments, etc. – from discharging pollutants from point sources to waters of the United States without an NPDES permit. (33 U.S.C. §§ 1311(a), 402, 502(5); see also 40 C.F.R. §§ 122.21, 122.22, 123.25.) The Clean Water Act requires permitting of private and governmental (federal,

state, and local) sources of stormwater and non-stormwater alike. (33 U.S.C. § 1342(p); 40 C.F.R. § 122.26.) The Permittees here must have a permit because they discharge pollutants, not because they operate an MS4. See, County of Los Angeles v. State of California (1987) 43 Cal.3d 46, 58 ([“Although local agencies must provide benefits to their employees either through insurance or direct payment, they are indistinguishable in this respect from private employers. In no sense can employers, public or private, be considered to be administrators of a program . . . .”].) All polluters, whether private or public, must get a permit. (See, e.g., City of Richmond v. Com. on State Mandates, (1998) 64 Cal.App.4th 1190, 1199 (new law made “the workers’ compensation death benefit requirements as applicable to local governments as they are to private employers,” and therefore did not impose a new program or higher level of service.) To be sure, the permit conditions provide a public benefit, but that is not the same thing as providing services to the public. There is a critical distinction between a law or executive order that requires local governments to provide a public service, and one that address the conduct and happens to cover local governments – and other entities such as private industry – because they engage in the conduct. This principle is best illustrated by County of Los Angeles v. Department of Industrial Relations (1989) 214 Cal.App.3d 1538. There, the Department of Industrial Relations enacted statewide safety regulations that governed all public and private elevators. (Id., at pp. 1540–1541.) The county argued that the regulations created a mandatory, reimbursable “program” because “all passenger elevators in all county buildings are necessary for the performance of peculiarly governmental functions . . . .” (Id., at pp. 1545–1546, italics omitted.) Rejecting that argument, the court explained that “the critical question is whether the mandated program carries out the governmental function of providing services to the public, not whether the elevators can be used to obtain these services.”

In other words, a state law providing that local governments have to comply with the same safety rules as everyone else does not constitute a state mandated “program.” The same is true here. The Permit does not require Permittees to operate an MS4. Rather, it implements a body of state law that provides that, if a local government operates an MS4, it must take steps to mitigate pollutant discharges, like all other polluters. The fact that the specific permit here is issued to local governments does not render the permit a program that carries out a “governmental function” particular to local government or a permit that imposes unique requirements on the local governments.

Even if an MS4 permit could be considered a “program,” the requirements of the Order do not constitute a new program, or a higher level of service as compared to the requirements contained in the previous permits issued by the Lahontan Water Board to the Permittees. The overarching requirement to impose controls to reduce the pollutants in discharges from MS4s is dictated by the Clean Water Act (33 U.S.C. § 1342(p)(3)(B)) and is not new to this permit cycle. The inclusion of new and advanced measures as the MS4 programs evolve and mature over time is specifically anticipated under the Clean Water Act (55 Fed. Reg. 47990, 48052 (Nov. 16, 1990); 61 Fed. Reg. 43761 (Aug. 26, 1996); USEPA “Interim

Permitting Approach for Water Quality Based Effluent Limitations in Storm Water Permits," EPA 833-D-96-001 (September 1996)) because the experience gained in implementation of existing permits and ongoing technological developments help direct appropriate adaptation of the programs to better address pollution. Such new and advanced measures refine existing measures to improve the effectiveness of the ongoing program and do not constitute a new program or higher level of service. And while the new or advanced measures may result in additional costs to the Permittees, resulting new costs is not the test for a higher level of service. "If the Legislature had intended to continue to equate 'increased level of service' with 'additional costs,' then the provision would be circular: 'costs mandated by the state' are defined as 'increased costs' due to 'an increased level of service,' which, in turn would be defined as 'additional costs.'" (County of Los Angeles v. Com. on State Mandates (2003) 110 Cal.App.4th 1176, 1191, quoting Workers' Compensation Mandates Decision, supra, 43 Cal.3d. at p. 55.)

2. The Permit Requirements Fall Under Several Exceptions to Mandates Rules

Even if some of the requirements imposed on the Permittees with this renewal could be considered a new program or higher level of service, the following exceptions to a finding of unfunded mandates preclude subvention here:

a. The permit provisions are required by the federal Clean Water Act and implementing regulations.

One of the exceptions to the subvention requirements is that, if the mandate imposes a requirement that is mandated by a federal law or regulation and results in costs mandated by the federal government, no subvention is required unless the statute or executive order mandates costs that exceed the mandate in that federal law or regulation. (Gov. Code, § 17556(c).) The Order implements federally mandated requirements under the federal Clean Water Act and implementing regulations and its requirements are therefore not subject to subvention of funds. This includes federal requirements to: (i) effectively prohibit non-stormwater discharges through the MS4 to receiving waters; (ii) reduce the discharge of pollutants in stormwater to the maximum extent practicable; (iii) include such other provisions as the permitting authority (here, the Lahontan Water Board) determines appropriate for the control of such pollutants; (iv) attain applicable TMDL wasteload allocations; and (v) conduct monitoring and reporting.

Non-stormwater discharge prohibition: Federal law requires that an MS4 permit effectively prohibit non-stormwater discharges through the MS4 to receiving waters. (33 U.S.C. § 1342(p)(3)(B)(ii).) The Order's requirements to achieve the effective prohibition of non-stormwater discharges are thus compelled by federal law.

TMDL requirements: The Clean Water Act requires TMDLs to be established for waterbodies that do not meet federal water quality standards. (33 U.S.C. § 1313(d).) The Clean Water Act also requires that MS4 permits include "such other provisions as the Administrator or the State determines appropriate for the control of [] pollutants." (33 U.S.C. § 1342(p)(3)(B)(iii).) U.S. EPA interprets this provision to mandate "controls to reduce the discharge of pollutants to the maximum extent practicable, and where necessary water quality-based controls." (Phase I Stormwater Regulations, Final Rule, 55 Fed. Reg. 47990, 47994 (Nov. 16, 1990) (emphasis added); see also Building Industry Ass'n of San Diego County v. State Water Resources Control Bd. (2004) 124 Cal.App.4th 866, 882-887; Phase II Stormwater Regulations, Final Rule, 64 Fed. Reg. 68722, 68737.)

Once U.S. EPA or a state establishes a TMDL, federal law requires that NPDES permits must contain water quality-based effluent limitations (WQBELs) consistent with the assumptions and requirements of any applicable wasteload allocation. (40 C.F.R. § 122.44(d)(1)(vii)(B).) Indeed, TMDLs are developed for the purpose of specifying requirements for the achievement of water quality standards in impaired waters (33 U.S.C. § 1313(d); 40 C.F.R. § 130.7) The Order's requirements for attainment of TMDL wasteload allocations are therefore compelled by federal law. Several generations of the MS4 permits issued in California have prohibited discharges that cause or contribute to exceedances of water quality standards in the receiving water. TMDL provisions, simply add a process for meeting this requirement, generally based on a compliance schedule.

Monitoring and reporting requirements: Federal law requires that NPDES permits incorporate monitoring and reporting provisions. (33 U.S.C. §§ 1318(a); 1342(a)(2); 40 C.F.R. §§ 122.26(d)(2)(i)(F); 122.41(h), (j)-(l); 122.42(c); 122.44(i); 122.48.) The Order's monitoring and reporting requirements are thus imposed pursuant to federal law.

Maximum Extent Practicable (MEP) standard: The Clean Water Act mandates that the Order "require controls to reduce the discharge of pollutants to the maximum extent practicable." (33 U.S.C. § 1342(p)(3)(B)(iii).) Department of Finance v. Commission on State Mandates (2016) 1 Cal.5th 749, as modified on denial of rehearing (Nov. 16, 2016) (Department of Finance) analyzed whether the Clean Water Act's MEP standard required four particular provisions concerning trash receptacles and inspections in a 2001 Los Angeles County MS4 permit were mandated by federal law. In concluding that the provisions were not required by federal law, the Supreme Court stated that, "[h]ad the Regional Board found when imposing the disputed permit conditions, that those conditions were the only means by which the maximum extent practicable standard could be implemented, deference to the board's expertise in reaching that finding would be appropriate." (Department of Finance, supra, 1 Cal.5th at p. 768.) The Supreme Court further stated that "[s]uch findings are "case specific, based among other things on factual circumstances." (Id., fn. 15.) To be entitled to deference, regional water boards must make an express finding that the particular set of permit conditions finally embodied in a given permit is required to

meet that federal standard and must support that finding with evidence. The Lahontan Water Board expressly finds that the Order specifies requirements necessary for the Permittees to reduce the discharge of pollutants in MS4 discharges to the MEP. Section III, V, VI establish program requirements for stormwater program implementation (including, but not limited to,

Illicit Discharge Detection and Elimination, Commercial and Industrial Site Management, Construction Components), and trash management. The requirements of these programs represent structural and non-structural water quality control measures that are effective, technically feasible, and generally accepted as appropriate. The program elements reflect the necessary pollutant reduction expected by the demanding federal MEP standard, but also represents a balancing of competing interests. To the extent there may be multiple means of achieving pollutant reductions and that there could be trade-offs between program areas with potentially higher costs and greater pollutant reductions, the permit programs are structured to provide the optimum reduction of pollutants necessary to reduce pollutants to the maximum extent practicable. This finding is the expert conclusion of the principal state agency charged with implementing the NPDES program in California and therefore entitled to deference under Department of Finance. Finally, the Supreme Court in Department of Finance suggested that the inclusion of equivalent or substantially similar provisions by the U.S. EPA in other permits may support a finding that the provisions are necessary to achieve MEP. (Dept. of Finance, supra, 1 Cal.5th at p. 772.) The Lahontan Water Board has examined the following U.S. EPA issued permits, among others, and concluded that they contain equivalent and/or substantially similar provisions: Massachusetts MS4 General Permit, Washington D.C. MS4 Permit, Albuquerque MS4 Watershed Permit, Boise/Garden City MS4 Permit, and Guam MS4 Permit.

3. Permittees have authority to fund the costs through service charges, fees, or assessments:

Even if any of the permit provisions could be considered unfunded state mandates, under Government Code section 17556, subdivision (d), a state mandate is not subject to reimbursement if the local agency has the authority to fund the costs through service charges, fees, or assessments. (Connell v. Superior Court (1997) 59 Cal.App.4th 382, 398.) The Permittees have the authority to levy service charges, fees, or assessments sufficient to pay for compliance with this Order subject to certain voting requirements contained in the California Constitution. (See Cal. Const. Art. XIII D, section 6, subdivision (c); see also Howard Jarvis Taxpayers Association v. City of Salinas (2002) 98 Cal. App. 4th 1351, 1358-1359.).

This Fact Sheet demonstrates that numerous activities contribute to the pollutant loading from the MS4. Local agencies can levy service charges, fees, or assessments on these activities, independent of real property ownership. (See, e.g., Apartment Ass'n of Los Angeles County, Inc. v. City of Los Angeles (2001)

24 Cal.4th 830, 842 (upholding inspection fees associated with renting property).) The authority of a local agency to defray the cost of a program without raising taxes indicates that a program does not entail a cost subject to subvention. (Clovis Unified School Dist. v. Chiang (2010) 188 Cal.App.4th 794, 812 ["To the extent a local agency or school district 'has the authority' to charge for the mandated program or increased level of service, that charge cannot be recovered as a state mandated cost."], quoting Connell v. Superior Court (1997) 59 Cal.App.4th 382, 401; County of Fresno v. State of California (1991) 53 Cal.3d 482, 487-488.) However, Proposition 218 is not an impediment to Permittees' fee authority.

The Constitution has an exception to the voter approval requirements of Proposition 218, "for fees or charges for sewer, water, and refuse collection services." (Cal. Const. Article XIII D, section 6, subd. (c).) In recent years, the Legislature enacted two important pieces of legislation confirming fee authority without the need for voter approval. In Assembly Bill 2043 (2014), effective January 1, 2015, the Legislature amended the definition of "water" for purposes of articles XIII C and XIII D to mean "water from any source." (Gov. Code, § 53750, subd. (n), amended by Assembly Bill 2043 (Stats. 2014, ch. 78, § 2.) In doing so, the Legislature stated that its act "is declaratory of existing law." (Stats. 2014, ch. 78, § 1(c).) With Senate Bill 231 (2017), effective January 1, 2018, the Legislature "reaffirm[ed] and reiterate[d]" that the definition of "sewer" for purposes of article XIII D includes: systems, all real estate, fixtures, and personal property owned, controlled, operated, or managed in connection with or to facilitate sewage collection, treatment, or disposition for sanitary or drainage purposes, including lateral and connecting sewers, interceptors, trunk and outfall lines, sanitary sewage treatment or disposal plants or works, drains, conduits, outlets for surface or storm waters, and any and all other works, property, or structures necessary or convenient for the collection or disposal of sewage, industrial waste, or surface or storm waters. (Government Code, section 53750, subdivision (f), and § 53751, subdivision (i), added by Senate Bill 231, Stats. 2017, chapter 536, section 2.).

In addition, Health and Safety Code section 5471, subdivision (a), gives dischargers fee authority for "services and facilities furnished…in connection with its water, sanitation, storm drainage, or sewerage system." (Health & Safety Code, § 5471, subd. (a) (emphasis added).)

A.15. Public Participation

The Lahontan Water Board encourages public participation in the Permit adoption process. This proposed Municipal NPDES Permit has been developed for review and comment by the public. As a step in the Water Board approval process, the Lahontan Water Board staff developed a "tentative" Permit for circulation and engaged directly with co-permittees and interested stakeholders during the 30-day comment period.

A.15.1. Notification of Interested Parties

On October 10, 2021, Water Board staff presented an information only item to the Board recommending a five-year extension with minor modifications to the 2017 permit. The Board and all three Permittees agreed with the proposed approach. On June 6, 2022, the Water Board notified dischargers, interested agencies, and other interested parties of its intent to renew the Municipal NPDES Permit for storm water discharges from the City of South Lake Tahoe and portions of El Dorado and Placer Counties within the Lake Tahoe Hydrologic Unit. The Water Board provided interested parties with the opportunity to submit written comments and recommendations on the draft tentative permit by July 8, 2022.

A.16. Public Hearing

The Lahontan Water Board has scheduled a public hearing to consider adopting the renewed permit. The Board meeting is scheduled as follows:

Date: September 14, 2022

Time: To Be Determined

Location: City of Bishop Council Chambers, 377 Line Street, Bishop, CA and Video/teleconference

Interested persons are invited to attend in person or via video or teleconference (to be determined). At the public meeting, the Lahontan Water Board will hear testimony, if any, pertinent to the discharge and the Permit. Oral testimony will be heard; however, for accuracy of the record, important testimony should be in writing.

Please be aware that dates and venues may change. The public can access the current agenda for changes in dates and locations at the Water Board website: www.waterboards.ca.gov/lahontan

A.16.1. Petitions

Any aggrieved person may petition the State Water Resources Control Board to review the decision of the Lahontan Water Board regarding the final Permit. The petition must be submitted within 30 days of the Lahontan Water Board's action to the following address:

State Water Resources Control Board
Office of Chief Counsel
P.O. Box 100, 1001 I Street
Sacramento, CA 95812-0100

A.16.2. Information and Copying

The proposed Permit, comments received, and other information are on file and may be inspected at the Lahontan Water Board at any time between 8:30 a.m. and 4:45 p.m., Monday through Friday, at 2501 Lake Tahoe Boulevard, South Lake Tahoe, CA 96150. Copying of documents may be arranged through the Lahontan Water Board by calling (530) 542-5400.

A.16.3. Register of Interested Persons

Any person interested in being placed on the mailing list for information regarding the WDRs and NPDES permit should contact the Lahontan Water Board, reference this Permit, and provide a name, email address, and phone number.

A.16.4. Additional Information

Requests for additional information or questions regarding this order should be directed to Brian Judge, Engineering Geologist, at 530-542-5426 or by email at Brian.Judge@waterboards.ca.gov.

ATTACHMENT B

Pollutant Load Allocation Tables

ATTACHMENT B

Fine Sediment Particle Load Allocations by Pollutant Source Category.

	Baseline Load		Milestone Load Reductions												Standard Attainment
	Basin-Wide Load (Particles/yr)	% of Basin-Wide Load	5 yrs	10 yrs	15 yrs	20 yrs	25 yrs	30 yrs	35 yrs	40 yrs	45 yrs	50 yrs	55 yrs	60 yrs	65 yrs
Forest Upland	4.1E+19	9%	6%	9%	12%	12%	13%	14%	15%	16%	17%	18%	19%	20%	20%
Urban Upland*	3.5E+20	72%	10%	21%	34%	38%	41%	45%	48%	52%	55%	59%	62%	66%	71%
Atmosphere	7.5E+19	16%	8%	15%	30%	32%	35%	37%	40%	42%	45%	47%	50%	52%	55%
Stream Channel	1.7E+19	3%	13%	26%	53%	56%	60%	63%	67%	70%	74%	77%	81%	85%	89%
Basin Wide Total	4.8E+20	100%	10%	19%	32%	35%	38%	42%	44%	47%	51%	55%	58%	61%	65%

Total Nitrogen Load Allocations by Pollutant Source Category.

Nitrogen	Baseline Load		Milestone Load Reductions												Standard Attainment
	Basin-Wide Nitrogen Load (MT/yr)	% of Basin-Wide Load	5 yrs	10 yrs	15 yrs	20 yrs	25 yrs	30 yrs	35 yrs	40 yrs	45 yrs	50 yrs	55 yrs	60 yrs	65 yrs
Forest Upland	62	18%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%
Urban Upland*	63	18%	8%	14%	19%	22%	25%	28%	31%	34%	37%	40%	43%	46%	50%
Atmosphere	218	63%	0%	0%	1%	1%	1%	1%	1%	1%	1%	1%	2%	2%	2%
Stream Channel	2	1%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%
Basin Wide Total	345	100%	2%	3%	4%	5%	6%	6%	7%	7%	8%	8%	9%	9%	10%

Total Phosphorus Load Allocations by Pollutant Source Category.

Phosphorus	Baseline Load		Milestone Load Reductions												Standard Attainment
	Basin-Wide Phosphorus Load (MT/yr)	% of Basin-Wide Load	5 yrs	10 yrs	15 yrs	20 yrs	25 yrs	30 yrs	35 yrs	40 yrs	45 yrs	50 yrs	55 yrs	60 yrs	65 yrs
Forest Upland	12	32%	1%	1%	1%	2%	1%	1%	2%	2%	2%	2%	2%	3%	3%
Urban Upland*	18	47%	7%	14%	21%	23%	26%	28%	31%	33%	36%	38%	41%	44%	46%
Atmosphere	7	18%	9%	17%	33%	36%	39%	42%	45%	48%	51%	53%	56%	58%	61%
Stream Channel	1	3%	8%	15%	30%	32%	34%	36%	38%	40%	42%	44%	46%	48%	51%
Basin Wide Total	38	100%	5%	10%	17%	19%	22%	24%	26%	28%	30%	32%	33%	34%	35%

* Urban upland load reduction requirements constitute waste load allocations for the City of South Lake Tahoe, El Dorado County, Placer County, and the California Department of Transportation.

ATTACHMENT C

STATE OF CALIFORNIA

CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD

LAHONTAN REGION

MONITORING AND REPORTING PROGRAM

ORDER NO. R6T-2022-xxxx

NPDES NO. CAG616001

WASTE DISCHARGE REQUIREMENTS AND NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES) PERMIT

FOR

STORM WATER/URBAN RUNOFF DISCHARGES FROM EL DORADO COUNTY, PLACER COUNTY, AND THE CITY OF SOUTH LAKE TAHOE

WITHIN THE LAKE TAHOE HYDROLOGIC UNIT

Section 308 of the federal Clean Water Act (CWA) and sections 122.41(h), (j)-(l), 122.44(i), and 122.48 of title 40 of the Code of Federal Regulations (40 C.F.R.) require that all NPDES permits specify monitoring and reporting requirements. Federal regulations applicable to large and medium MS4s also specify additional monitoring and reporting requirements. (40 C.F.R. §§ 122.26(d)(2)(i)(F) & (d)(2)(iii)(D), 122.42(c).) California Water Code section 13383 also authorizes the Lahontan Water Board to establish monitoring, inspection, entry, reporting, and recordkeeping requirements. This MRP establishes monitoring, reporting, and recordkeeping requirements that implement the federal and California laws and/or regulations.

C.1. Pollutant Load Reduction Monitoring Requirements

C.1.1. Lake Clarity Crediting Program

The Lake Tahoe Total Maximum Daily Load (TMDL) established average annual pollutant load estimates and load reduction targets for total nitrogen, total phosphorus, and fine sediment particles for the major pollutant source categories. The Lake Clarity Program (Crediting Program) defines a system to evaluate and track pollutant load reductions to demonstrate compliance with the load reduction requirements for pollutants generated in the urban uplands. The program provides methods for

consistently linking implementation of pollutant controls to average annual pollutant load reduction estimates using numeric modeling tools. It establishes Lake Clarity Credits (Credits) for actions taken to reduce pollutant loads as required by the Lake Tahoe TMDL.

Credits are used in this Monitoring and Reporting Program to provide a consistent metric for assessing compliance with average annual pollutant load reduction requirements. The Crediting Program guides interaction between the Water Board and Permittees regarding load reduction progress assessment.

Load reductions are defined as the difference between the estimated average annual amount of pollutants entering Lake Tahoe under standardized baseline conditions and the estimated average annual amount of pollutants entering the lake under expected conditions following management practice implementation.

Effective implementation of any pollutant control can generate credits, provided that the Permittees effectively demonstrate to the Water Board that the action (1) will reduce the load of the pollutants of concern to Lake Tahoe from urban land uses, (2) is supported by reasonable load reduction estimate, and (3) is implemented and maintained over time.

Effective implementation of pollutant controls results in actual conditions of treatment best management practices (BMPs) and/or roadways that are at or better-than the conditions used as the basis for modeled load reduction estimates, referred to as “expected” conditions. Actual conditions, as assessed during annual inspections outlined in Section I.E of this Monitoring and Reporting Program, are compared to the expected conditions to determine the appropriate amount of credit to award in a given year. When actual conditions are at or better-than expected conditions, the actual pollutant loading is considered to be the same or better than the expected pollutant loading and full Credit will be awarded. If actual conditions are worse than expected, the actual loading is considered to be higher than expected loading and the Credit award will be less than the full Credit potential amount.

The credit accounting period is a water year, October 1 through September 30. Each year is a unique accounting period – credits awarded in one year cannot be used to meet load reduction requirements in a subsequent or prior year.

The following sections briefly describe components of the Crediting Program protocols and establish phased Crediting Program implementation requirements.

C.1.2. Credit Definition and Credit Requirements

The Crediting Program Handbook (Attachment D) defines one (1) Lake Clarity Credit as equal to 1.0×10^{16} fine sediment particles with a diameter smaller than 16 micrometers (µm).

To demonstrate compliance with the pollutant load reduction requirements outlined in Permit Table IV.B.1, each Permittee must earn and maintain Lake Clarity Credits in accordance with Permit Table IV.B.2.

C.1.3. Crediting Program Handbook

The Lake Clarity Crediting Program Handbook (Crediting Program Handbook) defines the protocols for implementing the Crediting Program. The Crediting Program Handbook provides detailed technical guidance for estimating load reductions, preparing catchment credit schedules, reporting conditions and awarding credits.

The Crediting Program Handbook is incorporated into the Permit as Attachment D and all Lake Clarity Crediting Program procedures are incorporated as enforceable requirements under this Permit. Within the context of this Monitoring and Reporting Program, all Crediting Program Handbook references to “regulator” should be understood to mean the Water Board.

C.1.4. Condition Assessments

Credits are awarded by the Water Board for ongoing implementation of effective pollutant control measures that result in actual, observable conditions of treatment BMPs and roadways that are consistent with the expected conditions used to estimate pollutant load reductions. Actual conditions, as determined by field inspection findings, are compared to expected conditions to determine the appropriate credit award. In some instances, partial credit may be awarded when actual conditions are worse than expected.

Actual field conditions are evaluated and compared with expected conditions used to estimate pollutant load reductions. Each Permittee shall conduct treatment BMP and roadway condition assessments as described in the Crediting Program Handbook for all registered catchments.

The Crediting Program Handbook describes the process for defining inspection needs, performing facilities inspections, and recording results for registered catchments.

Permittees shall use the Best Management Practices Maintenance Rapid Assessment Methodology (BMP RAM) and the Road Rapid Assessment Methodology (Road RAM) or their equivalents (subject to Water Board acceptance) to annually assess, score, and document the actual condition of treatment BMPs and roadways.

C.1.5. Condition Assessment Method Alternatives

Should a Permittee consider using a treatment facility assessment method other than the BMP RAM, the Permittee must submit a proposal to the Water Board Executive Officer for approval. The submittal must describe how the Permittee will demonstrate

that the proposed equivalent method will effectively evaluate treatment facility condition based on treatment process (infiltration, particle settling, media filtration, or nutrient cycling), is capable of evaluating the condition of the BMP on a 0-5 scale, with 5 representing the highest functioning condition, and produces repeatable results that are consistent with the BMP RAM.

Should a Permittee consider using a roadway condition assessment method other than the established Road RAM, it must submit a detailed proposal to the Water Board Executive Officer. The submittal must demonstrate that any proposed equivalent method will effectively evaluate roadway condition based on field observations of sediment accumulation, can demonstrably extrapolate results to other roadway areas, is capable of evaluating the condition of representative roadway segments on a 0-5 scale, with 5 representing the cleanest condition, and produces repeatable results consistent with the Road RAM.

The initial submittal for alternative condition assessment methods need not contain all technical information of the proposed alternative methods but must establish a schedule for fully developing and submitting details for Water Board approval. Water Board staff and the Executive Officer will review any proposed alternatives and will bring the proposals before the Water Board for consideration.

C.1.6. Impacts Influencing Baseline Pollutant Loads

In accordance with the Basin Plan and Permit Section IV.D, Permittees must ensure that changes in land use, impervious coverage, or operations and maintenance practices do not increase a catchment's average annual baseline pollutant load.

If Permittees determine that changes in baseline loading have occurred, each Permittee shall identify the specific areas where pollutant loads have changes and ensure those areas have been registered under the Crediting Program.

C.2. Inspection Requirements

C.2.1. Storm Water System Inspections

Visual inspection of storm water collection, conveyance, and treatment facilities is the most efficient tool to assess facility function and evaluate maintenance needs.

For portions of a Permittee's jurisdiction not included in a Crediting Program registered area, Permittees shall inspect its storm water collection, conveyance, and treatment systems **annually.** Permittees shall conduct facilities inspections between the period of time following spring snow melt and before fall rain and snow storms each year to provide the opportunity to perform facilities maintenance as needed.

Storm water facilities shall be inspected for signs of needed maintenance, evidence of erosion, damage from snow removal equipment, and accumulated sediment and debris. During inspections, Permittees shall also consider potential storm water pollutant sources including but not limited to:

- Private property/residential runoff
- Commercial property runoff
- Eroding cut slopes
- Eroding road shoulders
- Traction abrasive application
- Dislodged sediment from snow removal activities
- Vehicles tracking sediment onto the roadway
- Parking related erosion

Permittees shall implement an inspection documentation and tracking system to record inspection findings and prioritize maintenance needs. At a minimum, the tracking system shall provide mechanisms to document the following:

- Inspector's name
- Date and time of inspection
- Mapped inspection location (i.e., catchment)
- Observed system condition at time of inspection
- An assessment of needed maintenance or other follow-up actions
- Prioritization of needed maintenance

C.2.2. Construction Site Inspections

Permittees shall establish construction site inspection frequencies based on the water quality prioritization described in Permit Section III.B.1. Permittees shall inspect each construction site at a frequency sufficient to ensure that sediment and other pollutants are properly controlled, and that unauthorized, non-storm water discharges are prevented.

Permittees shall implement a construction site inspection documentation and tracking system to record inspection findings. At a minimum, the tracking system shall provide mechanisms to document the following:

- Inspector's name
- Date and time of inspection
- Inspection location
- Observed facility conditions
- A summary of follow up and enforcement actions taken if violations are observed.

C.2.3. Commercial, Industrial, and Municipal Site Inspections

Permittees shall establish commercial, industrial, and municipal site inspection frequencies based on the water quality prioritization described in Permit Section III.B.2. Each Permittee shall inspect each high priority commercial, industrial, and municipal site at least once annually.

Permittees shall implement a commercial, industrial, and municipal site inspection documentation and tracking system to record inspection findings. At a minimum, the tracking system shall provide mechanisms to document the following:

- Inspector's name
- Date and time of inspection
- Inspection location
- Observed facility conditions
- A summary of follow up and enforcement actions taken if violations are observed.

C.2.4. Traction Abrasive and Deicing Material

The goal of traction abrasive monitoring program is to measure the quality and quantity of material applied and recovered. To meet that objective, Permittees shall implement a program that, at a minimum, includes the following:

1. Specifications for the amounts of fine sediment particles, total nitrogen, and total phosphorus allowable in material the Permittee applies as traction abrasives.

2. A program to sample supplied traction abrasive materials to determine whether materials meet the specifications defined according to II.D.1 above.

3. A system to track and record the total amount of abrasive and deicing material applied to its roads and parking areas per winter season. Materials applied to Permittee roads by other authorized entities shall be tracked and recorded along with Permittee applied material.

4. A system to track and record the location and amount that maintenance crews, Permittee contractors, or other authorized entities apply abrasive and deicing material (i.e. amount applied per “zone”).

5. A system to track and record the amount of sediment and other material recovered from sweeping and vacuum extraction operations. Permittees shall report separate sediment amounts recovered by sweeping and vacuum equipment, per “zone”.

C.3. Water Quality Monitoring Requirements

C.3.1. Catchment Scale Runoff Water Quality Monitoring

The Crediting Program and associated load estimation tools, including the Pollutant Load Reduction Model (PLRM), estimate the average annual pollutant load reductions as a result of pollutant control actions. Storm water monitoring is needed to verify that implementing cumulative pollutant control actions is resulting in measurable pollutant load reductions at the catchment scale. Documenting and reporting pollutant load reductions at select runoff outlets will help verify that the jurisdictions cumulative pollutant control actions are effective and confirm credit awards are warranted.

To assess the water quality at the urban catchment outfalls and provide load estimation tool comparison data, each Permittee shall, at a minimum:

1. Establish monitoring locations at storm water outfalls of no less than two (2) catchment areas that discharge directly to surface waters.

2. Obtain continuous flow data at the catchment outfall and report data as seasonal [Fall/Winter (October 1 – February 28) Snow melt (March 1 – May 31) and Summer (June 1 – September 30)] total outflow volumes (in cubic feet).

3. Collect six (6) to twelve (12) samples every 24 hours, per event.

4. Collect samples for each seasonal event type (rain-on-snow, snowmelt, summer thunderstorm, fall rain) spanning storm event hydrographs. Due to the large total volume of the spring snowmelt, collect supplemental samples periodically throughout the snow melt hydrograph. Use the range of samples collected to estimate the snowmelt event mean concentration (mg/L) for each year sampled.

5. Analyze all collected water samples for the Lake Tahoe TMDL pollutants of concern – fine sediment particles, total suspended sediment, total nitrogen, and total phosphorus. The priority pollutant is fine sediment particles (FSP) less than 16 micrometers (μm) in diameter, that should be reported as both concentration by mass (mg/L) and the number of particles per liter of water. Samples collected and analyzed for FSP shall span the range of expected FSP concentrations experienced at the selected outfall.

6. Total nitrogen, total phosphorus, and total suspended solids sample analyses may be conducted with lesser frequency than FSP analyses. Permittees must demonstrate the proposed approach will adequately reflect the range of nutrient and total suspended solid concentrations at the outfall. The sampling strategy shall include a range of event types that is proportional to their frequency of occurrence and total seasonal volume contributions.

7. Use collected data to estimate the average flow-weighted concentration of each pollutant for each season monitored.

8. Calculate the total load (mass in kilograms for total nitrogen, total phosphorus, and total suspended solids and number of particles for FSP) of each pollutant for each season monitored as the product of the total seasonal volume and the average seasonal concentration.

9. Use long-term regional meteorological data to identify whether the data were collected during dry, average, or wet seasons.

10. Follow quality assurance and sampling protocols established by the Regional Storm Water Monitoring Program (RSWMP) Quality Assurance Project Plan (May 2011) and Framework and Implementation Guidance Document (March 2015) for all sampling activities.

11. Maintain monitoring locations and collect samples for each water year (October 1 – September 30) of this Permit term.

C.3.2. Best Management Practice (BMP) Effectiveness Monitoring

The PLRM and other pollutant load estimation tools use the best available information to assess water quality benefits expected from implementing storm water treatment devices and other BMPs. Condition assessments are used to verify that the condition of a BMP or specific land use is being maintained at an acceptable condition. BMP effectiveness monitoring is needed to verify that each Permittee's BMP implementation and maintenance practices are resulting in actual measured pollutant load reductions. BMP effectiveness monitoring is also needed to improve installation and maintenance practices for various BMPs to optimize water quality benefits.

Each Permittee must, at a minimum:

1. Select at least one (1) storm water treatment device or other BMP and monitor effectiveness for at least three successive years.

2. If the selected BMP is a flow-through structure/device, obtain continuous flow at the inlet and outlet to support seasonal [Fall/Winter (October 1 – February 28) Snow melt (March 1 – May 31) and Summer (June 1 – September 30)] inflow and outflow volume reporting.

3. If the selected BMP is not a flow-through device, devise a reasonable method to obtain continuous flow at the inlet to support seasonal volume reporting of storm water treated/infiltrated/contained by the BMP.

4. If the selected BMP is a pollutant source control measure, the Permittee need not report hydrology and the monitoring plan shall describe methods to calculate the mass of pollutant controlled per land surface area.

5. Collect influent (or up gradient) and effluent (or down gradient) storm water samples to assess treatment device/activity performance.

6. Analyze all collected water samples for the Lake Tahoe TMDL pollutants of concern – fine sediment particles, total nitrogen, and total phosphorus. The priority pollutant is FSP reported as the number of particles per liter of water. Samples collected and analyzed for FSP shall span the range of expected FSP concentrations experienced at the inlet and outlet.

7. Total nitrogen, total phosphorus, and total suspended solids sample analyses may be conducted with lesser frequency than FSP analyses provided Permittees demonstrate the proposed approach will provide a representative sampling of the range of pollutant concentrations. The sampling strategy should include a range of event types that is proportional to their frequency of occurrence and total seasonal volume contributions.

8. Use collected data to estimate the average concentration of each pollutant for each season monitored.

9. If evaluating a pollutant or hydrologic source control BMP, describe a data collection approach and reasonable extrapolation method to estimate volume of runoff eliminated (hydrologic source control) or the mass of the pollutant, or number of particles eliminated per unit area of the land surface affected (pollutant source control). Describe how this value will be used to estimate pollutant loads controlled per season [Fall/Winter (October 1 – February 28) Snow melt (March 1 – May 31) and Summer (June 1 – September 30)].

10. Use long-term regional meteorological data to identify whether the data were collected during dry, average, or wet seasons.

11. Follow quality assurance and sampling protocols established by the RSWMP Quality Assurance Project Plan (May 2011) and Framework and Implementation Guidance Document (March 2015) for all sampling activities.

C.3.3. Monitoring Plan

By **March 31, 2023,** each Permittee shall prepare and submit to the Water Board a storm water monitoring plan to implement the requirements described in Sections III.A and III.B above.

For catchment outfall monitoring, the plan shall describe how the requirements in Section III.A above will be met, including which catchments the Permittee proposes to monitor, proposed monitoring instrumentation, proposed sampling frequency, data management and proposed analysis and reporting methods. The monitoring plan shall include a detailed discussion of the rationale for the chosen sampling sites, methods, and frequency and a discussion of how the proposed monitoring will support, enhance, or otherwise inform the Permittee's existing load estimation or condition assessment methods and the Permittee's pollutant load reduction program.

For the BMP effectiveness monitoring, the plan shall describe how the requirements in Section III.B above will be met, including a description of the selected storm water treatment device or BMP, a discussion of influent (or upstream) and effluent (downstream) monitoring locations, and a description of how the proposed monitoring will evaluate the effectiveness of the chosen BMP and provide information to improve the collective understanding of how the chosen BMP should be installed and maintained over time.

On August 19, 2014 (79 FR 49001), EPA promulgated new regulations related to ensuring that sufficiently sensitive test methods are used when performing laboratory analyses required by NPDES permits. For the consistency with the regulations at 40 CFR 122.44(i)(1)(iv), test methods with a "minimum level" (ML, as the term is used at 40 CFR 136) at or below permit effluent limits, or the method that has the lowest ML of the analytical methods approved under 40 CFR part 136.

The submitted monitoring plans must be reviewed and approved by the Water Board to ensure compliance with Permit and Monitoring and Reporting Program requirements.

C.3.4. D. Storm Water Monitoring Data Management

Electronic data shall be in a format compatible with the Surface Water Ambient Monitoring Program (SWAMP) database and the *California Environmental Data Exchange Network* (*CEDEN*) at www.ceden.org.

Permittees shall make all monitoring data and associated analytical reports available to managers of the RSWMP regional data center. Permittees shall notify stakeholders and members of the general public about the availability of electronic and paper monitoring reports through notices distributed through appropriate means, such as an electronic mailing list or posting on Permittee websites.

C.3.5. Storm Water Monitoring Compliance Options

To promote cost savings through economies of scale and avoid monitoring redundancy, Permittees may choose to comply with the storm water monitoring requirements by supporting the RSWMP effort to maintain no fewer than six (6) catchment monitoring sites and support ongoing monitoring to assess performance of no fewer than two (2) BMPs.

Should the Permittees choose to conduct monitoring described in Sections III.A and III.B above as part of the collaborative RSWMP effort, the group may submit a single storm water monitoring plan to fulfill the requirement contained in Section III.C above.

For each monitoring component that is conducted collaboratively, Permittees shall prepare a single report on behalf of all contributing Permittees; separate water quality monitoring reports are not required.

C.4. Annual Reporting Requirements

For each water year (October 1-September 30), Permittees shall develop and submit an Annual Report by **March 31, 2023,** and by **March 31** of each subsequent year of the permit term. Annual Reports shall include the following elements:

C.4.1. Pollutant Load Reduction Reporting

Each Permittee must describe actions taken to fulfill the requirements of Monitoring and Reporting Section I. Specifically, each Permittee's annual report must include a list of areas registered under this and previous Permits and a summary of applicable condition assessment results for all registered area pursuant to Section I.D above.

Each Permittee shall list its total credit award for the previous water year to demonstrate progress at meeting pollutant load reduction requirements.

Each Permittee shall describe load reduction progress in context of its Pollutant Load Reduction Plan (PLRP), including a discussion of whether Credit registration, load reduction estimates, and implementation actions are consistent with the submitted PLRP. Permittees shall discuss any deviations from submitted PLRPs, provide rationale for those deviations, and, if necessary, describe how the Permittee will compensate for any noted shortfalls in expected pollutant load reductions.

C.4.2. Storm Water Facilities Inspection Report

The annual report shall include a summary report of all storm water facility inspections performed pursuant to Section II.A of this Monitoring and Reporting Program. The report shall include a list of all areas inspected, a description of identified pollutant sources and/or problem areas, and a discussion of any planned or completed maintenance and/or enforcement follow up activities.

C.4.3. Construction Site Inspection Report

The annual report shall include a summary report of all construction inspections performed pursuant to Section II.B of this Monitoring and Reporting Program. The summary report shall include a list of all construction sites inspected, a description of identified problems, and a discussion of any planned or completed enforcement follow up activities.

C.4.4. Commercial, Industrial, and Municipal Site Inspection Report

The annual report shall include a summary of all commercial, industrial, and municipal site inspections performed pursuant to Section II.C of this Monitoring and Reporting Program. The summary shall include a list of all commercial, industrial, and municipal sites inspected, a description of identified problems, and a discussion of any planned or completed enforcement follow up activities.

C.4.5. Traction Abrasive and Deicing Material Report

The annual report shall include a summary report of the monitoring data collected pursuant to Section II.C of this Monitoring and Reporting Program.

C.4.6. Storm Water Monitoring Report

By March 31, 2023, and by **March 31** of each subsequent year of the Permit term, each Permittee shall submit a comprehensive electronic report that summarizes cumulative storm water monitoring results from the catchment load monitoring and BMP effectiveness evaluations conducted during the previous water year (October 1 – September 30). All reports required shall be uploaded via the Storm Water Multiple Application and Report Tracking System (SMARTS).

The storm water monitoring report shall include, at a minimum, the following:

1. A discussion of monitoring purpose and study design and the underlying rationale.

2. Details of the data collection methods, sampling protocols and analytical methods including detection limits.

3. Quality Assurance/Quality Control summaries.

4. Maps and descriptions of all monitoring locations including latitude and longitude coordinates and data obtained at each location.

5. Raw analytical data that includes sample identification, collection date, time and analytical reporting results for all collected samples.

6. Documentation of data management procedure.

7. Details of data analysis, calculations and assumptions used to obtain results and draw conclusions.

8. Catchment outlet monitoring - data tables and graphical data summaries that include seasonal total volume (cubic feet), seasonal average concentrations (milligrams/liter and number of particles/liter) and load (kilograms and number of particles) of each pollutant outlined in section III.A.4 of this Monitoring and Reporting Program.

9. Catchment outlet monitoring – provide interpretation of annually collected data relative to modeled average annual estimates and conduct an assessment of this data in the context of the water year type (wet, average, dry) using the regional meteorological analysis.

10. For long-term catchment monitoring, provide recent data in context with cumulative comparable results from previous years, noting trends. Consider the season type (wet, average, dry,) for each seasonal data point when evaluating trends and inter-annual variability in catchment results. Compare measured pollutant loads with modeled average annual variables and model outputs.

11. For flow-through BMPs - data tables and graphical data summaries of seasonal volume (cubic feet), average inlet and outlet pollutant concentrations (milligrams/liter and number of particles/liter) and pollutant loads (kilograms and number of particles) for each pollutant outlined in section III.B.4 of this Monitoring and Reporting Program. Permittees shall report the seasonal storm water volume (cubic feet) and pollutant load reduced (kilograms and number of particles) for each pollutant for each season of measure.

12. For hydrologic or pollutant source control BMPs - data tables and graphical summaries of seasonal storm water volumes (cubic feet) (hydrologic source control) as a result of the BMP implementation and maintenance or seasonal pollutant mass (kilograms and number of particles) reduced over the area of land surface subject to the chosen BMP for each pollutant described in Section III.B.4. For multi-year BMP evaluations, provide recent data in context with cumulative comparable results from previous years, noting trends.

13. For BMP monitoring – provide interpretation of annually collected data relative to applicable model parameters and conduct an assessment of this data in the context of the water year type (wet, average, dry) using the regional meteorological analysis.

14. A final monitoring summary including the following values for each monitored location.

Season	**Seasonal Volume (cf)**	**Pollutant**	**Seasonal Concentration (mg/L)**	**Seasonal Concentration (# particles/L)**	**Seasonal Load (kg)**
Fall Winter (Oct 1-Feb 28)	x	FSP	x	x	x
		TSS	x		x
		TP	x		x
		TN	x		x
Spring Melt (Mar 1-May 31)	x	FSP	x	x	x
		TSS	x		x
		TP	x		x
		TN	x		x
Summer (June 1-Sept 31)	x	FSP	x	x	x
		TSS	x		x
		TP	x		x
		TN	x		x
Water Year Totals: Total WY precipitation (in/yr) Water year type: very dry, dry, average, wet, very wet					
Water Year Total	x	FSP			x
		TSS			x
		TP			x
		TN			x

15. A discussion of lessons learned from storm water monitoring efforts including, but not limited to, catchment water quality improvement strategies, pollutant sources analyses, pollutant fate and transport within sampled catchments, BMP design and/or implementation improvements, and maintenance strategy effectiveness (including techniques or frequency)

16. A discussion of any proposed changes to the storm water monitoring program and the rationale for each proposed change.

17. If Permittees are working collaboratively to meet the requirements specified in Section III of this Monitoring and Reporting Program, a single report for participating Permittees will be accepted.

C.4.7. Illicit Discharge Report

To assess compliance with Permit Sections I.A and III.B.5 each Permittee's annual report shall describe actions taken to prevent unauthorized non-storm water discharges and report any identified illicit discharges to its collection, conveyance, and treatment facilities. The report shall include a description of any education, outreach, or inspection activities conducted pursuant to Permit Sections III.B.1, III.B.2, III.B.3 and III.B.4 that support the Permittee's program to prohibit unauthorized non-storm water discharges.

C.4.8. Education Component Report

Each Permittee's annual report shall summarize all training and education activities conducted during the previous year, including a list of all education materials distributed and training provided to the public, to municipal employees, and to construction, commercial, industrial, or municipal site operators.

C.4.9. Impacts Influencing Baseline Pollutant Loads Report

In the annual report for the 2022 water year, each Permittee shall summarize the assessment conducted pursuant to Monitoring and Reporting Program Section I.G to demonstrate compliance with Permit Order IV.D.

C.4.10. Provision

Permittees shall comply with the "Standard Provisions, Reporting Requirements, and Notifications for NPDES Permits" that is attached to and made part of this Monitoring and Reporting Program as Attachment G.

C.4.11. Trash

Monitoring and reporting requirements regarding trash are contained in Attachment H and are made part of this Monitoring and Reporting Program.

ATTACHMENT D

LAKE CLARITY CREDITING PROGRAM
HANDBOOK, Version 2.2, March 2021
Available on the Lake Tahoe TMDL Program Website:

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https://clarity.laketahoeinfo.org/FileResource/DisplayResource/6fa6e7fe-ad67-416b-aa5d-8113daec4992

ATTACHMENT E

WATER QUALITY OBJECTIVES LAKE TAHOE HYDROLOGIC UNIT

Bacteria, Coliform - Waters shall not contain concentrations of coliform organisms attributable to anthropogenic sources, including human and livestock wastes. The fecal coliform concentration during any 30-day period shall not exceed a log mean of 20/100 ml, nor shall more than 10 percent of all samples collected during any 30-day period exceed 40/100 ml. The log mean shall ideally be based on a minimum of not less than five samples collected as evenly spaced as practicable during any 30-day period. However, a log mean concentration exceeding 20/100 ml for any 30-day period shall indicate violation of this objective even if fewer than five samples were collected.

Biostimulatory Substances - Waters shall not contain biostimulatory substances in concentrations that promote aquatic growths to the extent that such growths cause nuisance or adversely affect the water for beneficial uses.

Chemical Constituents - Waters designated as MUN shall not contain concentrations of chemical constituents in excess of the maximum contaminant level (MCL) or secondary maximum contaminant level (SMCL) based upon drinking water standards specified in the following provisions of Title 22 of the California Code of Regulations which are incorporated by reference into the Basin Plan: Table 64431-A of Section 64431 (Inorganic Chemicals), Table 64431-B of Section 64431 (Fluoride), Table 64444-A of Section 64444 (Organic Chemicals), Table 64449-A of Section 64449 (Secondary Maximum Contaminant Levels Consumer Acceptance Limits), and Table 64449-B of Section 64449 (Secondary Maximum Contaminant Levels-Ranges). This incorporation-by-reference is prospective including future changes to the incorporated provisions as the changes take effect.

Waters designated as AGR shall not contain concentrations of chemical constituents in amounts that adversely affect the water for beneficial uses (i.e., agricultural purposes).

Waters shall not contain concentrations of chemical constituents in amounts that adversely affect the water for beneficial uses.

Chlorine, Total Residual - For the protection of aquatic life, total chlorine residual shall not exceed either a median value of 0.002 mg/L or a maximum value of 0.003 mg/L. Median values shall be based on daily measurements taken within any six-month period.

Color - Waters shall be free of coloration that causes nuisance or adversely affects the water for beneficial uses.

Dissolved Oxygen - The dissolved oxygen concentration, as percent saturation, shall

not be depressed by more than 10 percent, nor shall the minimum dissolved oxygen concentration be less than 80 percent of saturation.

For waters with the beneficial uses of COLD, COLD with SPWN, WARM, and WARM with SPWN, the minimum dissolved oxygen concentration shall not be less than that specified in Table 5.1-8.

Floating Materials - Waters shall not contain floating material, including solids, liquids, foams, and scum, in concentrations that cause nuisance or adversely affect the water for beneficial uses.

For natural high quality waters, the concentrations of floating material shall not be altered to the extent that such alterations are discernible at the 10 percent significance level.

Oil and Grease - Waters shall not contain oils, greases, waxes or other materials in concentrations that result in a visible film or coating on the surface of the water or on objects in the water, that cause nuisance, or that otherwise adversely affect the water for beneficial uses.

For natural high quality waters, the concentration of oils, greases, or other film or coat generating substances shall not be altered.

Nondegradation of Aquatic Communities and Populations - All wetlands shall be free from substances attributable to wastewater or other discharges that produce adverse physiological responses in humans, animals, or plants; or which lead to the presence of undesirable or nuisance aquatic life.

All wetlands shall be free from activities that would substantially impair the biological community as it naturally occurs due to physical, chemical and hydrologic processes.

Pesticides - For the purposes of this Basin Plan, pesticides are defined to include insecticides, herbicides, rodenticides, fungicides, piscicides and all other economic poisons. An economic poison is any substance intended to prevent, repel, destroy, or mitigate the damage from insects, rodents, predatory animals, bacteria, fungi or weeds capable of infesting or harming vegetation, humans, or animals (CA Agriculture Code § 12753).

Pesticide concentrations, individually or collectively, shall not exceed the lowest detectable levels, using the most recent detection procedures available.

There shall not be an increase in pesticide concentrations found in bottom sediments. There shall be no detectable increase in bioaccumulation of pesticides in aquatic life.

Waters designated as MUN shall not contain concentrations of pesticides or herbicides in excess of the limiting concentrations specified in Table 64444-A of

Section 64444 (Organic Chemicals) of Title 22 of the California Code of Regulations which is incorporated by reference into this plan. This incorporation-by-reference is prospective including future changes to the incorporated provisions as the changes take effect.

pH - In fresh waters with designated beneficial uses of COLD, changes in normal ambient pH levels shall not exceed 0.5 pH units. For all other waters, the pH shall not be depressed below 6.5 nor raised above 8.5.

The Regional Board recognizes that some waters of the Region may have natural pH levels outside of the 6.5 to 8.5 range. Compliance with the pH objective for these waters will be determined on a case-by-case basis.

In Lake Tahoe, the pH shall not be depressed below 7.0 nor raised above 8.4.

Radioactivity - Radionuclides shall not be present in concentrations which are deleterious to human, plant, animal, or aquatic life or which result in the accumulation of radionuclides in the food web to an extent which presents a hazard to human, plant, animal, or aquatic life.

Waters designated as MUN shall not contain concentrations of radionuclides in excess of the limits specified in Table 4 of Section 64443 (Radioactivity) of Title 22 of the California Code of Regulations which is incorporated by reference into this plan. This incorporation-by-reference is prospective including future changes to the incorporated provisions as the changes take effect.

Sediment - The suspended sediment load and suspended sediment discharge rate of surface waters shall not be altered in such a manner as to cause nuisance or adversely affect the water for beneficial uses.

Settleable Materials - Waters shall not contain substances in concentrations that result in deposition of material that causes nuisance or that adversely affects the water for beneficial uses. For natural high quality waters, the concentration of settleable materials shall not be raised by more than 0.1 milliliter per liter.

Suspended Materials - Waters shall not contain suspended materials in concentrations that cause nuisance or that adversely affects the water for beneficial uses.

For natural high-quality waters, the concentration of total suspended materials shall not be altered to the extent that such alterations are discernible at the 10 percent significance level.

Suspended Sediment - Suspended sediment concentrations in streams tributary to Lake Tahoe shall not exceed a 90^{th} percentile value of 60 mg/L. (This objective is equivalent to the Tahoe Regional Planning Agency's regional "environmental threshold carrying capacity" standard for suspended sediment in tributaries.) The Regional Board will consider revision of this objective in the future if it proves not

to be protective of beneficial uses or if review of monitoring data indicates that other numbers would be more appropriate for some or all streams tributary to Lake Tahoe.

Taste and Odor- Waters shall not contain taste or odor-producing substances in concentrations that impart undesirable tastes or odors to fish or other edible products of aquatic origin, that cause nuisance, or that adversely affect the water for beneficial uses. For naturally high quality waters, the taste and odor shall not be altered.

Temperature - The natural receiving water temperature of all waters shall not be altered unless it can be demonstrated to the satisfaction of the Regional Board that such an alteration in temperature does not adversely affect the water for beneficial uses.

For waters designated COLD, the temperature shall not be altered.

Temperature objectives for COLD interstate waters and WARM interstate waters are as specified in the "Water Quality Control Plan for Control of Temperature in The Coastal and Interstate Waters and Enclosed Bays and Estuaries of California" including any revisions. This plan is summarized in Basin Plan Chapter 6 (Plans and Policies) and included in Appendix B.

Toxicity - All waters shall be maintained free of toxic substances in concentrations that are toxic to, or that produce detrimental physiological responses in human, plant, animal, or aquatic life. Compliance with this objective will be determined by use of indicator organisms, analyses of species diversity, population density, growth anomalies, bioassays of appropriate duration and/or other appropriate methods as specified by the Regional Board. The survival of aquatic life in surface waters subjected to a waste discharge, or other controllable water quality factors, shall not be less than that for the same water body in areas unaffected by the waste discharge, or when necessary, for other control water that is consistent with the requirements for "experimental water" as defined in Standard Methods for the Examination of Water and Wastewater (American Public Health Association, et al. 1998).

Turbidity - Waters shall be free of changes in turbidity that cause nuisance or adversely affect the water for beneficial uses. Increases in turbidity shall not exceed natural levels by more than 10 percent.

Algal Growth Potential - For Lake Tahoe, the mean algal growth potential at any point in the Lake shall not be greater than twice the mean annual algal growth potential at the limnetic reference station. The limnetic reference station is located in the north central portion of Lake Tahoe. It is shown on maps in annual reports of the Lake Tahoe Interagency Monitoring Program. Exact coordinates can be obtained from the U.C. Davis Tahoe Research Group.

Biological Indicators - For Lake Tahoe, algal productivity and the biomass of phytoplankton, zooplankton, and periphyton shall not be increased beyond the levels recorded in 1967-71, based on statistical comparison of seasonal and annual means. The "1967-71 levels" are reported in the annual summary reports of the "California-Nevada-Federal Joint Water Quality Investigation of Lake Tahoe" published by the California Department of Water Resources.

Clarity - For Lake Tahoe, the vertical extinction coefficient shall be less than 0.08 per meter when measured below the first meter. When water is too shallow to determine a reliable extinction coefficient, the turbidity shall not exceed 3 Nephelometric Turbidity Units (NTU). In addition, turbidity shall not exceed 1 NTU in shallow waters not directly influenced by stream discharges. The Regional Board will determine when water is too shallow to determine a reliable vertical extinction coefficient based upon its review of standard limnological methods and on advice from the U.C. Davis Tahoe Research Group.

Conductivity, Electrical - In Lake Tahoe, the mean annual electrical conductivity shall not exceed 95 umhos/cm at 50°C at any location in the Lake.

Plankton Counts - For Lake Tahoe, the mean seasonal concentration of plankton organisms shall not be greater than 100 per ml and the maximum concentration shall not be greater than 500 per ml at any point in the Lake.

WATER QUALITY OBJECTIVES IN STATE WATER RESOURCE CONTROL BOARD PLANS AND POLICIES

Trash Provisions (summarized) - Trash shall not be present in inland surface waters, enclosed bays, estuaries, and along shorelines or adjacent areas in amounts that adversely affect beneficial uses or cause nuisance.

Bacteria Provisions (summarized) - The bacteria water quality objective for all waters where the salinity is equal to or less than 1 part per thousand (ppth) 95 percent or more of the time during the CALENDAR YEAR is: a six-week rolling GEOMETRIC MEAN of Escherichia coli (E. coli) not to exceed 100 colony forming units (cfu) per 100 milliliters (mL), calculated weekly, and a STATISTICAL THRESHOLD VALUE (STV) of 320 cfu/100 mL not to be exceeded by more than 10 percent of the samples collected in a CALENDAR MONTH, calculated in a static manner. United States Environmental Protection Agency (U.S. EPA) recommends using U.S. EPA Method 1603 or other equivalent method to measure culturable E. coli.

WATER QUALITY OBJECTIVES FOR CERTAIN WATER BODIES LAKE TAHOE HYDROLOGIC UNIT

	Surface Waters	Objective (mg/L except as noted) [1,2]						
		TDS	Cl	SO_4	B	N	P	Fe
1	Lake Tahoe	60 65	3.0 4.0	1.0 2.0	0.01 -	0.15 -	0.008 -	--
2	Fallen Leaf Lake	50 -	0.30 0.50	1.3 1.4	0.01 0.02	See Table 5.1-4 for additional objectives		
3	Griff Creek	80 -	0.40 -	--	--	0.19 -	0.010 -	0.03 -
4	Carnelian Bay Creek	80 -	0.40 -	--	--	0.19 -	0.015 -	0.03 -
5	Watson Creek	80 -	0.35 -	--	--	0.22 -	0.015 -	0.04 -
6	Dollar Creek	80 -	0.30 -	--	--	0.16 -	0.030 -	0.03 -
7	Burton Creek	90 -	0.30 -	--	--	0.16 -	0.015 -	0.03 -
8	Ward Creek	70 85	0.30 0.50	1.4 2.8	--	0.15 -	0.015 -	0.03 -
9	Blackwood Creek	70 90	0.30 -	--	--	0.19 -	0.015 -	0.03 -
10	Madden Creek	60 -	0.10 0.20	--	--	0.18 -	0.015 -	0.015 -
11	McKinney Creek	55 -	0.40 0.50	--	--	0.19 -	0.015 -	0.03 -
12	General Creek	50 90	1.0 1.5	0.4 0.5	--	0.15 -	0.015 -	0.03 -
13	Meeks Creek	45 -	0.40 -	--	--	0.23 -	0.010 -	0.07 -
14	Lonely Gulch Creek	45 -	0.30 -	--	--	0.19 -	0.015 -	0.03 -
	continued...							

WATER QUALITY OBJECTIVES FOR CERTAIN WATER BODIES LAKE TAHOE HYDROLOGIC UNIT (Cont.)

See Fig. 5.1-1	Surface Waters	Objective (mg/L except as noted) [1,2]						
		TDS	Cl	SO_4	B	N	P	Fe
15	Eagle Creek	35 -	0.30 -	--	--	0.20 -	0.010 -	0.03 -
16	Cascade Creek	30 -	0.40 -	--	--	0.21 -	0.005 -	0.01 -
17	Tallac Creek	60 -	0.40 -	--	--	0.19 -	0.015 -	0.03 -
18	Taylor Creek	35 -	0.40 0.50	--	--	0.17 -	0.010 -	0.02 -
19	Upper Truckee River	55 75	4.0 5.5	1.0 2.0		0.19 -	0.015 -	0.03 -
20	Trout Creek	50 60	0.15 0.20	--	--	0.19 -	0.015 -	0.03 -

[1] Annual average value/90th percentile value.
[2] Objectives are as mg/L and are defined as follows:
B Boron
ClChloride
SO_4 Sulfate
Fe Iron, Total
N Nitrogen, Total
P Phosphorus, Total
TDS Total Dissolved Solids (Total Filterable Residues)

ATTACHMENT F

Compliance with Water Quality Objectives

This section includes general direction on determining compliance with the nondegradation, narrative and numerical objectives described in this Chapter. (Specific direction on compliance with certain objectives is included, in italics, following the text of the objective.) It is not feasible to cover all circumstances and conditions which could be created by all discharges. Therefore, it is within the discretion of the Regional Board to establish other, or additional, direction on compliance with objectives of this Plan. Where more than one objective is applicable, the **stricter objective shall apply**. (The only exception is where a regionwide objective has been superseded by the adoption of a site-specific objective by the Regional Board.) Where objectives are not specifically designated, downstream objectives apply to upstream tributaries.

Narrative and Numerical Objectives

The sections below provide additional direction on determining compliance with the narrative and numerical objectives of this Basin Plan.

Pollution and/or Nuisance

In determining compliance with narrative objectives which include the terms "pollution" and or "nuisance," the Regional Board considers the following definitions from the Porter-Cologne Water Quality Control Act.

Pollution -- an alteration of the waters of the State by waste to the degree which unreasonably affects either of the following:

- such waters for beneficial uses.
- facilities which serve these beneficial uses.

"Pollution" may include "contamination." Contamination means an impairment of the quality of the waters of the State by waste to a degree which creates a hazard to the public health through poisoning or through the spread of disease. Contamination includes any equivalent effect resulting from the disposal of waste, whether or not waters of the State are affected.

Nuisance -- Anything which meets all of the following requirements:

- Is injurious to health, or is indecent or offensive to the senses, or an obstruction to the free use of property, so as to interfere with the comfortable enjoyment of life or property.
- Affects at the same time an entire community or neighborhood, or any considerable number of persons, although the extent of the annoyance or damage inflicted upon individuals may be unequal.
- Occurs during or as a result of the treatment or disposal of wastes.

References to Taste and Odor, Human Health and Toxicity (also see "acute toxicity" and "chronic toxicity," below):

In determining compliance with objectives including references to Taste and Odor, Human Health or Toxicity, the Regional Board will consider as evidence relevant and scientifically valid water quality goals from sources such as drinking water standards from the California Department of Health Services (State "Action Levels"), the

National Interim Drinking Water Standards, Proposition 65 Lawful Levels, National Ambient Water Quality Criteria (USEPA's "Quality Criteria for Water" for the years 1986, 1976 and 1972; "Ambient Water Quality Criteria," volumes 1980, 1984, 1986, 1987 and 1989), the National Academy of Sciences' Suggested No-Adverse- Response Levels (SNARL), USEPA's Health and Water Quality Advisories, as well as other relevant and scientifically valid evidence.

References to Agriculture or AGR designations:

In determining compliance with objectives including references to the AGR designated use, the Regional Board will refer to water quality goals and recommendations from sources such as the Food and Agriculture Organization of the United Nations, University of California Cooperative Extension, Committee of Experts, and McKee and Wolf's "Water Quality Criteria" (1963).

References to "Natural High-Quality Waters"

The Regional Board generally considers "natural high quality water(s)" to be those waters with ambient water quality equal to, or better than, current drinking water standards. However, the Regional Board also recognizes that some waters with poor chemical quality may support important ecosystems (e.g., Mono Lake).

References to "10 percent significance level"

A statistical hypothesis is a statement about a random variable's probability distribution, and a decision-making procedure about such a statement is a hypothesis test. In testing a hypothesis concerning the value of a population mean, the null hypothesis is often used. The null hypothesis is that there is no difference between the population means (e.g., the mean value of a water quality parameter after the discharge is no different than before the discharge.) First a level of significance to be used in the test is specified, and then the regions of acceptance and rejection for evaluating the obtained sample mean are determined.

At the **10 percent significance level**, assuming normal distribution, the acceptance region (where one would correctly accept the null hypothesis) is the interval which lies under 90 percent of the area of the standard normal curve. Thus, a level of **significance of 10 percent** signifies that when the population mean is correct as specified, the sample mean will fall in the areas of rejection only 10 percent of the time.

If the hypothesis is rejected when it should be accepted, a Type I error has been made. In choosing a **10 percent level of significance**, there are 10 chances in 100 that a Type I error was made, or the hypothesis was rejected when it should have been accepted (i.e., one is 90 percent confident that the right decision was made.)

The **10 percent significance level** is often incorrectly referred to as the 90 percent significance level. As explained above, the significance level of a test should be low, and the confidence level of a confidence interval should be high.

References to "Means" (e.g., annual mean, mean of monthly means), "Medians" and "90th percentile values

"**Mean**" is the arithmetic mean of all data. "**Annual mean**" is the arithmetic mean of all data collected in a one-year period. "**Mean of monthly mean**" is the arithmetic mean of 30-day averages (arithmetic means). The **median** is the value which half of the values of the population exceed and half do not. The **average value** is the arithmetic mean of all data. For a **90th percentile value**, only 10% of data exceed this value.

Compliance determinations shall be based on available analyses for the time interval associated with the discharge. If only one sample is collected during the time period associated with the water quality objective, (e.g., monthly mean), that sample shall serve to characterize the discharge for the entire interval. Compliance based upon multiple samples shall be determined through the application of appropriate statistical methods.

Standard Analytical Methods to Determine Compliance with Objectives

Analytical methods to be used are usually specified in the monitoring requirements of the waste discharge permits. Suitable analytical methods are:

- those specified in 40 CFR Part 136, and/or
- those methods determined by the Regional Board and approved by the USEPA to be equally or more sensitive than 40 CFR Part 136 methods and appropriate for the sample matrix, and/or
- where methods are not specified in 40 CFR Part 136, those methods determined by the Regional Board to be appropriate for the sample matrix

All analytical data shall be reported uncensored with method detection limits and either practical quantitation levels or limits of quantitation identified. Acceptance of data should be based on demonstrated laboratory performance.

For **bacterial analyses**, sample dilutions should be performed so the range of values extends from 2 to 16,000. The detection method used for each analysis shall be reported with the results of the analysis. Detection methods used for coliforms (total and fecal) shall be those presented in Standard Methods for the Examination of Water and Wastewater (American Public Health Association et al. 1992), or any alternative method determined by the Regional Board to be appropriate.

For **acute toxicity**, compliance shall be determined by short-term toxicity tests on undiluted effluent using an established protocol (e.g., American Society for Testing and Materials [ASTM], American Public Health Association, USEPA, State Board).

For **chronic toxicity**, compliance shall be determined using the critical life stage (CLS) toxicity tests. At least three approved species shall be used to measure compliance with the toxicity objective. If possible, test species shall include a vertebrate, an invertebrate, and an aquatic plant. After an initial screening period, monitoring may be reduced to the most sensitive species. Dilution and control waters should be obtained from an unaffected area of the receiving waters. For rivers and streams, dilution water should be obtained immediately upstream of the discharge. Standard dilution water can be used if the above sources exhibit toxicity greater than 1.0 Chronic Toxicity Units. All

test results shall be reported to the Regional Board in accordance with the "Standardized Reporting Requirements for Monitoring Chronic Toxicity" (State Board Publication No. 93-2 WQ).

Application of Narrative and Numerical Water Quality Objectives to Wetlands

Although not developed specifically for wetlands, many surface water **narrative objectives** are generally applicable to most wetland types. However, the Regional Board recognizes, as with other types of surface waters such as saline or alkaline lakes, that natural water quality characteristics of some wetlands may not be within the range for which the narrative objectives were developed. The Regional Board will consider site-specific adjustments to the objectives for wetlands (bacteria, pH, hardness, salinity, temperature, or other parameters) as necessary on a case-by-case basis.

The **numerical criteria** to protect one or more beneficial uses of surface waters, where appropriate, may directly apply to wetlands. For example, wetlands which actually are, or which recharge, municipal water supplies should meet human health criteria. The USEPA numeric criteria for protection of freshwater aquatic life, as listed in Quality Criteria for Water—1986, although not developed specifically for wetlands, are generally applicable to most wetland types. As with other types of surface waters, such as saline or alkaline lakes, natural water quality characteristics of some wetlands may not be within the range for which the criteria were developed. Adjustments for pH, hardness, salinity, temperature, or other parameters may be necessary. The Regional Board will consider developing site-specific objectives for wetlands on a case-by-case basis.

ATTACHMENT G

STANDARD PROVISIONS, REPORTING REQUIREMENTS, AND NOTIFICATIONS FOR NPDES PERMITS

A. Standard Permit Provisions

Code of Federal Regulations Title 40 section 122.41 (40 CFR 122.41) includes conditions, or provisions, that apply to all National Pollution Discharge Elimination System (NPDES) permits. Additional provisions applicable to NPDES permits are in 40 CFR 122.42. All applicable provisions in 40 CFR 122.41 and 40 CFR 122.42 shall be incorporated into this Order and NPDES permit. The applicable 40 CFR 122.41 and 40 CFR 122.42 provisions are as follows:

1. Duty to Comply [CFR 122.41(a)]

The Permittees shall comply with all of the provisions of this permit. Any permit noncompliance constitutes a violation of the Clean Water Act (CWA) and is grounds for enforcement action; for permit termination, revocation and reissuance, or modification; or denial of a permit renewal application.

a. The Permittees shall comply with effluent standards or prohibitions established under section 307(a) of the CWA for toxic pollutants and with standards for sewage sludge use or disposal established under Section 405(d) of the CWA within the time provided in the regulations that establish these standards or prohibitions or standards for sewage sludge use or disposal, even if the permit has not yet been modified to incorporate the requirement. [40 CFR 122.41(a)(1); California Water Code (Water Code) sections 13261, 13263, 13265, 13268, 13300, 13301, 13304, 13340, 13350, 13385)]

b. The CWA provides that any person who violates Section 301, 302, 306, 307, 308, 318 or 405 of the CWA, or any permit condition or limitation implementing any such sections in a permit issued under section 402, or any requirement imposed in a pretreatment program approved under Section 402(a)(3) or 402(b)(8) of the CWA, is subject to a civil penalty not to exceed $25,000 per day for each violation. The CWA provides that any person who negligently violates Section 301, 302, 306, 307, 308, 318, or 405 of the CWA, or any condition or limitation implementing any of such sections in a permit issued under Section 402 of the CWA, or any requirement imposed in a pretreatment program approved under Section 402(a)(3) or 402(b)(8) of the CWA, is subject to criminal penalties of $2,500 to $25,000 per day of violation, or imprisonment of not more than 1 (1) year, or both. In the case of a second or subsequent conviction for a negligent violation, a person shall be subject to criminal penalties of not more than $50,000 per day of violation, or by

imprisonment of not more than two (2) years, or both. Any person who knowingly violates such sections, or such conditions or limitations is subject to criminal penalties of $5,000 to $50,000 per day of violation, or imprisonment for not more than three (3) years, or both. In the case of a second or subsequent conviction for a knowing violation, a person shall be subject to criminal penalties of not more than $100,000 per day of violation, or imprisonment of not more than six (6) years, or both. Any person who knowingly violates Section 301, 302, 303, 306, 307, 308, 318 or 405 of the CWA, or any permit condition or limitation implementing any of such sections in a permit issued under of the CWA, and who knows at that time that he thereby places another person in imminent danger of death or serious bodily injury, shall, upon conviction, be subject to a fine of not more than $250,000 or imprisonment of not more than fifteen (15) years, or both. In the case of a second or subsequent conviction for a knowing endangerment violation, a person shall be subject to a fine of not more than $500,000 or by imprisonment of not more than thirty (30) years, or both. An organization, as defined in Section 309(c)(3)(B)(iii) of the CWA, shall, upon conviction of violating the imminent danger provision, be subject to a fine of not more than $1,000,000 and can be fined up to $2,000,000 for second or subsequent convictions. [40 CFR 122.41(a)(2)].

c. Any person may be assessed an administrative penalty by the Lahontan Regional Water Quality Control Board (Water Board), State Water Resources Control Board (State Water Board), or United States Environmental Protection Agency (USEPA) for violating Section 301, 302, 306, 307, 308, 318 or 405 of the CWA, or any permit condition or limitation implementing any of such sections in a permit issued under section 402 of this Act. Administrative penalties for Class I violations are not to exceed $10,000 per violation, with the maximum amount of any Class I penalty assessed not to exceed $25,000. Penalties for Class II violations are not to exceed $10,000 per day for each day during which the violation continues, with the maximum amount of any Class II penalty not to exceed $125,000. [40 CFR 122.41(a)(3)].

2. Duty to Reapply [40 CFR 122.41(b)]

If the Permittees wish to continue an activity regulated by this permit after the expiration date of this permit, the Permittee shall apply for and obtain a new permit.

3. Need to Halt or Reduce Activity Not A Defense [40 CFR 122.41(c)]

It shall not be a defense for a Permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit.

4. Duty to Mitigate [40 CFR 122.41(d)]

The Permittees shall take all reasonable steps to minimize or prevent any discharge or prevent any discharge or sludge use or disposal in violation of this permit that has a reasonable likelihood of adversely affecting human health or the environment.

5. Proper Operation and Maintenance [40 CFR 122.41(e)]

The Permittees shall at all times properly operate and maintain all facilities and systems of treatment and control (and related appurtenances) which are installed or used by the Permittee to achieve compliance with the conditions of this permit. Proper operation and maintenance also includes adequate laboratory controls and appropriate quality assurance procedures. This provision requires the operation of back-up or auxiliary facilities or similar systems that are installed by a Permittee only when the operation is necessary to achieve compliance with the conditions of this permit.

6. Permit Actions [40 CFR 122.41(f)]

This permit may be modified, revoked and reissued, or terminated for cause. The filing of a request by a Permittee for a permit modification, revocation and reissuance, or termination, or a notification of planned changes or anticipated noncompliance does not stay any permit condition.

7. Property Rights [40 CFR 122.41(g)]

This permit does not convey any property rights of any sort, or any exclusive privilege.

8. Duty to Provide Information [40 CFR 122.41(h)]

Permittees shall furnish to the Lahontan Water Board, State Water Board, or USEPA within a reasonable time, any information which the Lahontan Water Board, State Water Board, or USEPA may request to determine whether cause exists for modifying, revoking and reissuing, or terminating this permit or to determine compliance with this permit. The Permittee shall also furnish to the Lahontan Water Board, State Water Board, or USEPA upon request, copies of records required to be kept by this permit.

9. Inspection and Entry [40 CFR 122.41(i)]

The Permittees shall allow the Lahontan Water Board, State Water Board, USEPA, and/or their authorized representative (including an authorized contractor acting as their representative), upon presentation of credentials and other documents as may be required by law, to [33 United States Code section

1318(a)(4)(B); 40 CFR 122.41(i); California Water Code sections 13267 and 13383]:

a. Enter upon the Permittee's premises where a regulated facility or activity is located or conducted, or where records shall be kept under the conditions of this permit; [40 CFR 122.41(i)(1)]

b. Have access to and copy, at reasonable times, any records that shall be kept under the conditions of this permit; [40 CFR 122.41(i)(2)]

c. Inspect and photograph at reasonable times any facilities, equipment (including monitoring and control equipment), practices, or operations regulated or required under this permit; [40 CFR 122.41(i)(3)] and

d. Sample or monitor at reasonable times, for the purpose of assuring permit compliance or as otherwise authorized by the CWA, any substances or parameters at any location. [40 CFR 122.41(i)(4)]

10. Monitoring and Records [40 CFR 122.41(j); 40 CFR 122.44(i)]

a. Samples and measurements taken for the purpose of monitoring shall be representative of the monitored activity. [40 CFR 122.41(j)(1)]

b. The Permittees shall retain records of all monitoring information, including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation, copies of all reports required by this permit, and records of all data used to complete the application for this permit, for a period of at least three (3) years from the date of the sample, measurement, report or application. This period may be extended by request of the Lahontan Water Board at any time. [40 CFR 122.41(j)(2)]

c. Records for monitoring information shall include: [40 CFR 122.41(j)(3)]

   i. The date, exact place, and time of sampling or measurements; [40 CFR 122.41(j)(3)(i)] i

   ii. The individual(s) who performed the sampling or measurements; [40 CFR 122.41(j)(3)(ii)]

   iii. The date(s) analyses were performed; [40 CFR 122.41(j)(3)(iii)]

   iv. The individual(s) who performed the analyses; [40 CFR 122.41(j)(3)(iv)]

   v. The analytical techniques or methods used; [40 CFR 122.41(j)(3)(v)] and

vi. The results of such analyses. [40 CFR 122.41(j)(3)(vi)]

a. Monitoring shall be conducted according to test procedures under 40 CFR Part 136 unless another method is required under 40 CFR Subchapters N or O. [40 CFR 122.41(j)(4)] In the case of pollutants for which there are no approved methods under 40 CFR Part 136 or otherwise required under 40 CFR Subchapters N and O, monitoring shall be conducted according to a test procedure specified in the permit for such pollutants. [40 CFR 122.44(i)(1)(iv)]

b. The CWA provides that any person who falsifies, tampers with, or knowingly renders inaccurate any monitoring device or method required to be maintained under this permit shall, upon conviction, be punished by a fine of not more than $10,000, or by imprisonment for not more than two (2) years, or both. If a conviction of a person is for a violation committed after a first conviction of such person under this paragraph, punishment is a fine of not more than $20,000 per day of violation, or by imprisonment of not more than four (4) years, or both. [40 CFR 122.41(j)(5)]

11. Signatory Requirement [40 CFR 122.41(k); 40 CFR 122.22(a)-(d)]

a. All applications, reports, or information submitted to the Lahontan Board, State Water Board, or USEPA shall be signed and certified. (See 40 CFR 122.22) [40 CFR 122.41(k)(1)]

i. For a municipality, State, Federal, or other public agency. [All applications shall be signed] [b]y either a principal executive officer or ranking elected official. [40 CFR 122.22(a)(3)]

ii. All reports required by permits, and other information requested by the Lahontan Water Board, State Water Board, or USEPA shall be signed by a person described in paragraph (a) of this section, or by a duly authorized representative of that person. A person is a duly authorized representative only if: [40 CFR 122.22(b)]

(1) The authorization is made in writing by a person described in paragraph (a) of this section; [40 CFR 122.22(b)(1)]

(2) The authorization specifies either an individual or a position having responsibility for the overall operation of the regulated facility or activity such as the position of plant manager, operator of a well or a well field, superintendent, position of equivalent responsibility, or an individual or position having overall responsibility for environmental matters for the company, (A duly authorized representative may thus be either a named individual

or any individual occupying a named position.) [40 CFR 122.22(b)(2)] and,

(3) The written authorization is submitted to the Lahontan Water Board and State Water Board. [40 CFR 122.22(b)(3)].

iii. Changes to authorization. If an authorization under paragraph (b) of this section is no longer accurate because a different individual or position has responsibility for the overall operation of the facility, a new authorization satisfying the requirements of paragraph (b) of this section shall be submitted to the Lahontan Water Board prior to or together with any reports, information, or applications to be signed by an authorized representative. [40 CFR 122.22(c)]

iv. Certification. Any person signing a document under paragraph (a) or (b) of this section shall make the following certification:

v. "I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations." [40 CFR 122.22(d)]

b. The CWA provides that any person who knowingly makes any false statement, representation, or certification in any record or other document submitted or required to be maintained under this permit, including monitoring reports or reports of compliance or non-compliance shall, upon conviction, be punished by a fine of not more than $10,000 per violation, or by imprisonment for not more than six (6) months per violation, or by both. [40 CFR 122.41(k)(2)]

12. Reporting Requirements [40 CFR 122.41(l)]

a. Planned changes. The Permittee shall give notice to the Lahontan Water Board as soon as possible of any planned physical alterations or additions to the permitted facility. Notice is required only when: [40 CFR 122.41(l)(1)]

i. The alteration or addition to a permitted facility may meet one of the criteria for determining whether a facility is a new source in 40 CFR 122.29(b); [40 CFR 122.41(l)(1)(i)] or

ii. The alteration or addition could significantly change the nature or increase the quantity of pollutants discharged. This notification applies to pollutants which are subject neither to effluent limitations in the permit, nor to notification requirements under 40 CFR 122.42(a)(1). [40 CFR 122.41(l)(1)(ii)]

iii. The alteration or addition results in a significant change in the Permittee's sludge use or disposal practices, and such alteration, addition, or change may justify the application of permit conditions that are different from or absent in the existing permit, including notification of additional use or disposal sites not reported during the permit application process or not reported pursuant to an approved land application plan. [40 CFR 122.41(l)(1)(iii)]

b. Anticipated noncompliance. The Permittee shall give advance notice to the Lahontan Water Board of any planned changes in the permitted facility or activity which may result in noncompliance with permit requirements. [40 CFR 122.41(l)(2)]

c. Transfers. This permit is not transferable to any person except after notice to the Lahontan Water Board. The Lahontan Water Board may require modification or revocation and reissuance of the permit to change the name of the Permittee and incorporate such other requirements as may be necessary under the CWA. [40 CFR 122.41(l)(3)]

d. Monitoring reports. Monitoring results shall be reported at the intervals specified elsewhere in this permit. [40 CFR 122.41(l)(4)]

i. Monitoring results shall be reported as specified by the Lahontan Board or State Water Board for reporting results of monitoring of sludge use or disposal practices. [40 CFR 122.41(l)(4)(i)]

ii. If the Permittee monitors any pollutant more frequently than required by the permit using test procedures approved under 40 CFR Part 136 or another method required for an industry-specific waste stream under 40 CFR Subchapters N or O, the results of this monitoring shall be included in the calculation and reporting of the data submitted to the Lahontan Water Board or State Water Board.

iii. Calculations for all limitations which require averaging of measurements shall utilize an arithmetic mean unless otherwise specified in the permit. [40 CFR 122.41(l)(4)(iii)]

e. Compliance schedules. Reports of compliance or noncompliance with, or any progress reports on, interim and final requirements contained in any

compliance schedule of this permit shall be submitted no later than fourteen (14) days following each schedule date. [40 CFR 122.41(l)(5)]

f. Twenty-four hour reporting.

i. The Permittees shall report any noncompliance that may endanger health or the environment. Any information shall be provided orally within twenty-four (24) hours from the time the Permittee becomes aware of the circumstances. A written submission shall also be provided within five (5) days of the time the Permittee becomes aware of the circumstances. The written submission shall contain a description of the noncompliance and its cause; the period of noncompliance, including exact dates and times, and if the noncompliance has not been corrected, the anticipated time it is expected to continue; and steps taken or planned to reduce, eliminate, and prevent reoccurrence of the noncompliance. [40 CFR 122.41(l)(6)(i)]

ii. The Lahontan Water Board may waive the written report on a case-by-case basis if the oral report has been received within twenty-four (24) hours. [40 CFR 122.41(l)(6)(iii)]

g. Other noncompliance. The Permittees shall report all instances of noncompliance not reported in accordance with the standard provisions required under 40 CFR 122.41(l)(4), (5), and (6), at the time monitoring reports are submitted. The reports shall contain the information listed in the standard provisions required under 40 CFR 122.41(l)(6). [40 CFR 122.41(l)(7))]

h. Other information. When the Permittee becomes aware that it failed to submit any relevant facts in a permit application, or submitted incorrect information in a permit application or in any report to the Lahontan Water Board, State Water Board, or USEPA, the Permittee shall promptly submit such facts or information.

13. Bypass [40 CFR 122.41(m)]

a. Definitions.

i. *Bypass* means the intentional diversion of waste streams from any portion of a treatment facility. [40 CFR 122.41(m)(1)(i)] or

ii. Severe property damage means substantial physical damage to property, damage to the treatment facilities which causes them to become inoperable, or substantial and permanent loss of natural resources which can reasonably be expected to occur in the absence

of a bypass. Severe property damage does not mean economic loss caused by delays in production. [40 CFR 122.41(m)(1)(ii)]

b. Bypass not exceeding limitations. The Permittee may allow any bypass to occur which does not cause effluent limitations to be exceeded, but only if it also is for essential maintenance to assure efficient operation. These bypasses are not subject to the standard provisions required under 40 CFR 122.41(m)(3) and (4). [40 CFR 122.41(m)(2)]

c. Notice.

   i. Anticipated bypass. If the Permittee knows in advance of the need for a bypass, it shall submit a notice, if possible, at least ten (10) days before the date of the bypass. [40 CFR 122.41(m)(3)(i)] or

   ii. Unanticipated bypass. The Permittee shall submit notice of an unanticipated bypass in accordance with the standard provisions required under 40 CFR 122.41(l)(6) (24-hour notice). [40 CFR 122.41(m)(3)(ii)]

d. Prohibition of Bypass.

   i. Bypass is prohibited, and the Lahontan Water Board may take enforcement action against a Permittee for bypass, unless: [40 CFR 122.41(m)(4)(i)]

      (1) Bypass was unavoidable to prevent loss of life, personal injury, or severe property damage; [40 CFR 122.41(m)(4)(i)(A)]

      (2) There were no feasible alternatives to the bypass, such as the use of auxiliary treatment facilities, retention of untreated wastes, or maintenance during normal periods of equipment downtime. This condition is not satisfied if adequate back-up equipment should have been installed in the exercise of reasonable engineering judgment to prevent a bypass which occurred during normal periods of equipment downtime or preventive maintenance; [40 CFR 122.41(m)(4)(i)(B)] and,

      (3) The Permittee submitted notices in accordance with the standard provisions required under 40 CFR 122.41(m)(3). [40 CFR 122.41(m)(4)(i)(C)]

   ii. The Lahontan Water Board may approve an anticipated bypass, after considering its adverse effects, if the Lahontan Water Board determines that it will meet the three (3) conditions listed above. [40 CFR 122.41(m)(4)(ii)]

14. Upset [40 CFR 122.41(n)]

a. Definition. *Upset* means an exceptional incident in which there is unintentional and temporary noncompliance with technology-based permit effluent limitations because of factors beyond the reasonable control of the Permittee. An upset does not include noncompliance to the extent caused by operational error, improperly designed treatment facilities, inadequate treatment facilities, lack of preventive maintenance, or careless or improper operation. [40 CFR 122.41(n)(1)]

b. Effect of an upset. An upset constitutes an affirmative defense to an action brought for noncompliance with such technology-based permit effluent limitations if the standard provisions required under 40 CFR 122.41(n)(3) are met. No determination made during administrative review of claims that noncompliance was caused by upset, and before an action for noncompliance, is final administrative action subject to judicial review. [40 CFR 122.41(n)(2)]

c. Conditions necessary for a demonstration of upset. A Permittee who wishes to establish the affirmative defense of upset shall demonstrate, through properly signed, contemporaneous operating logs, or other relevant evidence that: [40 CFR 122.41(n)(3)]

   i. An upset occurred and that the Permittee can identify the cause(s) of the upset; [40 CFR 122.41(n)(3)(i)]

   ii. The permitted facility was at the time being properly operated; [40 CFR 122.41(n)(3)(ii)] and

   iii. The Permittee submitted notice of the upset in accordance with the standard provisions required under 40 CFR 122.41(l)(6)(ii)(B) (24-hour notice). [40 CFR 122.41(n)(3)(iii)]

   iv. The Permittee complied with any remedial measures pursuant to the standard provisions required under 40 CFR 122.41(d). [40 CFR 122.41(n)(3)(iii)]

d. Burden of proof. In any enforcement proceeding, the Permittee seeking to establish the occurrence of an upset has the burden of proof. [40 CFR 122.41(n)(4)]

15. Standard Permit Provisions for Municipal Separate Storm Sewer Systems [40 CFR 122.42(c)]

The operator of a small, medium, or large MS4 or a municipal separate storm sewer that has been designated by the Lahontan Water Board under 40 CFR

122.26(a)(1)(v) shall submit an annual report by the anniversary of the date of the issuance of the permit for such system. The report shall include:

a. The status of implementing the components of the Storm Water Management Program that are established as permit conditions; [40 CFR 122.42(c)(1)]

b. Proposed changes to the Storm Water Management Program that are established as permit conditions. Such proposed changes shall be consistent with 40 CFR 122.26(d)(2)(iii); [40 CFR 122.42(c)(2)] and

c. Revisions, if necessary, to the assessment of controls and the fiscal analysis reported in the permit application under 40 CFR 122.26(d)(2)(iv) and (v); [40 CFR 122.42(c)(3)]

d. A summary of data, including monitoring data, that is accumulated throughout the reporting year; [40 CFR 122.42(c)(4)]

e. Annual expenditures and budget for year following each annual report; [40 CFR 122.42(c)(5)]

f. A summary describing the number and nature of enforcement actions, inspections, and public education programs; [40 CFR 122.42(c)(6)]

g. Identification of water quality improvements or degradation. [40 CFR 122.42(c)(7)]

16. Standard Permit Provisions for Storm Water Discharges [40 CFR 122.42(d)]

The initial permits for discharges composed entirely of storm water issued pursuant to 40 CFR 122.26(e)(7) shall require compliance with the conditions of the permit as expeditiously as practicable, but in no event later than three (3) years after the date of issuance of the permit.

B. General Provisions

In addition to the standard provisions required to be incorporated into the Order and NPDES permit pursuant to 40 CFR 122.22, 122.41, 122.42, 122.44, and 40 CFR Part 136 several other general provisions apply to this Order. The general provisions applicable to this Order and NPDES permit are as follows:

1. Discharge of Waste Is a Privilege

No discharge of waste into the waters of the State, whether or not such discharge is made pursuant to waste discharge requirements, shall create a

vested right to continue the discharge. All discharges of waste into waters of the State are privileges, not rights. [Water Code section 13263(g)]

2. Duration of Order and NPDES Permit

a. Effective date. This Order and NPDES permit becomes effective on 100 days after its adoption provided the USEPA has no objection. If the USEPA objects to its issuance, this Order shall not become effective until such objection is withdrawn.

   As of the effective coverage date specified in the Permittee's application for coverage, this Order shall supersede the applicability of any preexisting order or permit regulating the operation of, and discharges from, the Permittee's MS4. The Lahontan Water Board retains continuing authority to take enforcement action for violations of such preexisting orders or permits that occurred prior to the Permittee's effective coverage date under this Order.

b. Expiration. This Order and NPDES permit expires five (5) years after its effective date. [40 CFR 122.46(a)]

c. Continuation of expired order. After this Order and NPDES permit expires, the terms and conditions of this Order and NPDES permit are automatically continued pending issuance of a new permit if all requirements of the federal NPDES regulations on the continuation of expired permits (40 CFR 122.6) are complied with.

3. Availability

A copy of this Order shall be kept at a readily accessible location and shall be available to on-site personnel at all times.

4. Confidentiality of Information

Except as provided for in 40 CFR 122.7, no information or documents submitted in accordance with or in application for this Order will be considered confidential and all such information and documents shall be available for review by the public at the Lahontan Water Board office. Claims of confidentiality for the following information will be denied: [40 CFR 122.7(b)]

a. The name and address of any permit applicant or Permittee; [40 CFR 122.7(b)(1)] and

b. Permit applications and attachments, permits, and effluent data. [40 CFR 122.7(b)(2)]

5. Effluent Limitations

a. Interim effluent limitations. The Permittee shall comply with any interim effluent limitations as established by addendum, enforcement action, or revised waste discharge requirements which have been, or may be, adopted by the Lahontan Water Board.

b. Other effluent limitations and standards of sections 301, 302, 303, 307, 318 and 405 of CWA. If any applicable toxic effluent standard or prohibition (including any schedule of compliance specified in such effluent standard or prohibition) is promulgated under Section 307(a) of the CWA for a toxic pollutant and that standard or prohibition is more stringent than any limitation on the pollutant in the permit, the Lahontan Water Board shall institute proceedings under these regulations to modify or revoke and reissue the permit to conform to the toxic effluent standard or prohibition. [40 CFR 122.44(b)(1)]

6. Permit Actions

The filing of a request by the Permittee for modification, revocation and reissuance, or termination of this Order, or a notification of planned change in or anticipated noncompliance with this Order does not stay any condition of this Order. (See 40 CFR 122.41(f)) In addition, the following provisions apply to this Order:

a. Upon application by any affected person, or on its own motion, the Lahontan Water Board may review and revise the requirements in this Order. All requirements shall be reviewed periodically. [Water Code section 13263(e)]

b. This Order may be terminated or modified for cause, including, but not limited to, all of the following: [Water Code section 13381]

   i. Violation of any condition contained in the requirements of this Order. [Water Code section 13381(a)]

   ii. Obtaining the requirements in this Order by misrepresentation, or failure to disclose fully all relevant facts. [Water Code section 13381(b)]

   iii. A change in any condition that requires either a temporary or permanent reduction or elimination of the permitted discharge. [Water Code section 13381(c)]

c. When this Order is transferred to a new owner or operator, such requirements as may be necessary under the Water Code can be incorporated into this Order.

7. Monitoring

In addition to the standard provisions required under 40 CFR 122.41(j) and (l)(4), the following general monitoring provisions apply to this Order:

a. Where procedures are not otherwise specified in Order, sampling, analysis and quality assurance/quality control shall be conducted in accordance with the Quality Assurance Management Plan (QAMP) for the State of California's Surface Water Ambient Monitoring Program (SWAMP), adopted by the State Water Resources Control Board.

b. Pursuant to 40 CFR 122.41(j)(2) and Water Code section 13383(a), the Permittees shall retain records of all monitoring information, including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation, copies of all reports required by this permit, and records of all data used to complete the application for this permit, for a period of at least five (5) years from the date of the sample, measurement, report or application. This period may be extended by request of the Lahontan Water Board at any time.

c. All chemical, bacteriological, and toxicity analyses shall be conducted at a laboratory certified for such analyses by the California Department of Public Health or a laboratory approved by Lahontan Water Board staff.

d. Each monitoring report submitted with an Annual Report to the Lahontan Water Board shall include flow measurements for each sampling event and a spreadsheet of water quality monitoring with the sampling event identifier, site code, sample type, date and time sampled, analyte and fraction, methods, results, including nondetections, reporting and minimum detection limits, units, laboratory names and locations, lowest water quality objective and source, and whether or not the result was an exceedance.

8. Enforcement

a. The Lahontan Water Board is authorized to enforce the terms of this Order under several provisions of the Water Code, including, but not limited to, Water Code sections 13385, 13386, and 13387.

b. Nothing in this Order shall be construed to protect the Permittee from its liabilities under federal, state, or local laws.

c. The Water Code provides for civil and criminal penalties comparable to, and in some cases greater than, those provided for under the CWA.

d. Except as provided in the standard conditions required under 40 CFR 122.41(m) and (n), nothing in this Order shall be construed to relieve the Permittee from civil or criminal penalties for noncompliance.

e. Nothing in this Order shall be construed to preclude the institution of any legal action or relieve the Permittee from any responsibilities, liabilities, or penalties to which the Permittee is or may be subject to under Section 311 of the CWA.

f. Nothing in this Order shall be construed to preclude institution of any legal action or relieve the Permittee from any responsibilities, liabilities, or penalties established pursuant to any applicable state law or regulation under authoring preserved by Section 510 of the CWA.

9. Severability

The provisions of this Order are severable, and if any provision of this Order, or the application of any provisions of this Order to any circumstance, is held invalid, the application of such provision to other circumstances and the remainder of this Order shall not be affected thereby.

10. Applications

Any application submitted by the Permittee for reissuance or modification of this Order shall satisfy all applicable requirements specified in federal regulations as well as any additional requirements for submittal of a Notice of Intent specified in the Water Code and the California Code of Regulations.

11. Implementation

All plans, reports and subsequent amendments submitted in compliance with this Order shall be implemented immediately (or as otherwise specified). All submittals by the Permittee shall be adequate to implement the requirements of this Order.

12. Modification of Order

This Order may be modified, revoked, and reissued, or terminated for cause due to promulgation of amended regulations, receipt of USEPA guidance concerning regulated activities, judicial decision, or in accordance with 40 CFR 122.62, 122.63, 122.64, and 124.5. The Lahontan Water Board may additionally reopen and modify this Order at any time prior to its expiration, after opportunity for public comment and a public hearing in accordance with the following circumstances:

a. If the Lahontan Water Board determines that revisions are warranted to those provisions of the Order (a) addressing compliance with water

quality objectives or water quality standards in the receiving water; and/or (b) those provisions of the Order establishing an iterative process for implementation of management practices to assure compliance with water quality standards in the receiving waters.

b. Minor modifications to the Order may be made by the Lahontan Water Board where the proposed modification complies with all the prohibitions and limitations, and other requirements of this Order.

c. Proposed modifications to the Order that are not minor require amendment of this Order in accordance with this Order's rules, policies, and procedures.

d. New or revised water quality objectives come into effect, or any TMDL is adopted or revised (i.e., TMDL-specific permit requirements) that is applicable to the Permittee. E

e. New programs, policies or plans come into effect that are applicable to the Permittee.

13. Report Submittals

a. All report submittals shall include an executive summary, introduction, conclusion, recommendations, and signed certified statement.

b. Each Permittee shall submit a signed certified statement covering its responsibilities for each applicable submittal.

c. The Permittee shall submit a signed certified statement covering its responsibilities for each applicable submittal and the sections of the submittals for which it is responsible.

d. Unless otherwise directed, the Permittee shall submit electronic copies via SMARTS of each report required under this Order to the Lahontan Water Board,

e. The Permittee shall submit reports and provide notifications as required by this Order to the following:

EXECUTIVE OFFICER
CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD LAHONTAN REGION
2501 LAKE TAHOE BOULEVARD
SOUTH LAKE TAHOE, CA 96150
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ATTACHMENT H

TRASH IMPLEMENTATION REQUIREMENTS FOR THE LAKE TAHOE MUNICIPAL STORMWATER PERMIT

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Attachment H

TRASH IMPLEMENTATION REQUIREMENTS FOR THE LAKE TAHOE MUNICIPAL STORMWATER PERMIT

The requirements in this attachment implement State Water Board Resolution 2015-0019, which amended the Water Quality Control Plan for Ocean Waters of California and the Water Quality Control Plan for Inland Surface Waters, Enclosed Bays, and Estuaries of California to include trash-related requirements, referred to in this order as the "Trash Provisions." The Trash Provisions are statewide prohibitions and requirements implemented in part through NPDES stormwater permits. This Attachment includes the trash-related prohibitions and requirements implemented through this Order. This attachment is specific to the Lake Tahoe Municipal Stormwater Permit for the City of South Lake Tahoe, Placer County and El Dorado County within the Tahoe Basin (Permit). This applies to the permittees under the Permit, which is a traditional MS4, Phase I Permit. All three jurisdictions have chosen Track 2 trash implementation plans, which they have been implementing since 2018 under requirements of Order No. 2017-0010, NPDES No. CAG 616001 in accordance with an Order issued pursuant to California Water Code section 13383, and in expectation that the Trash Provisions be incorporated into the Permit at the time of next reissuance of the Permit. There are two types of Certified Full Capture Systems: Certified Full Capture Trash Treatment Control Devices and Certified Multi-Benefit Trash Treatment Systems. They are referred to together as Full Capture Systems except where different requirements apply. All other trash treatment controls, including "[non-certified] Multi-Benefit Projects, Other Treatment Controls, and/or Institutional Controls" will be referred to collectively as "Other Controls" in this Attachment.

H.1. TRASH DISCHARGE PROHIBITION

The discharge of trash to surface waters of the state or the deposition of trash where it may be discharged into surface waters of the state is prohibited.

Permittees shall comply with the prohibition through compliance with the requirements of this Attachment.

H.2. TRASH REQUIREMENTS COMPLIANCE DEADLINE

By December 2, 2030, Permittees shall demonstrate full compliance with the requirements of this Attachment.

H.3. APPLICABILITY

Permittees shall comply with the requirements of this Attachment.

H.4. COMPLIANCE TRACKS

Permittees can choose either Track 1 or Track 2 compliance tracks. All three Permittees have selected Track 2, and therefore, Track 1 will not be addressed. Permittees may choose to change Tracks in the future. Within 60 days of the effective date of this Order

or new enrollment under this Order, whichever is later, the Permittees shall reselect/select via SMARTS Compliance Track 2 as described below:

Traditional Track 2 Permittees: Permittees shall install, operate, and maintain Certified Full Capture Systems and Other Controls within either the jurisdiction of the Permittees or the jurisdiction of the Permittees and contiguous Permittees. Permittees may determine the locations or land uses within its jurisdiction to implement Certified Full Capture Systems and Other Controls. Permittees shall demonstrate that such determined locations and land uses achieves Full Capture System Equivalency.

H.5. TRASH GENERATING AREA INVENTORY

Within 180 days of the Effective Date of this Order, whichever is later, Permittees shall update or develop and submit via SMARTS a Trash Generating Area Inventory that includes the following, as applicable:

1. Track 2 Permittees:

    a. List all subdrainage areas containing Priority Land Use areas using a unique identification number system, latitude and longitude coordinates, and representative street address. Track 2 Permittees shall additionally include any selected locations or land uses that generate a substantial amount of trash.

    b. For each subdrainage area identified above, include:

        i. The acreage of each subdrainage area;

        ii. The acreage addressed by or proposed to be addressed by Certified Full Capture Systems; and

        iii. The acreage addressed by or proposed to be addressed by Other Controls.

    c. For each subdrainage with Certified Full Capture Systems installed or proposed to be installed in the following 12 months, include:

        i. The peak flow rate in cubic feet per second resulting from a one-year, one-hour storm in the subdrainage area, or flow of the corresponding storm drain;

        ii. The trash treatment capacity and name of each Certified Full Capture System already installed or proposed to be installed in the following 12 months; and

        iii. Date of last maintenance and next scheduled maintenance for each Certified Full Capture System.

    d. Permittees shall include an inventory with the initial and baseline trash generation rates in gallons per acre per year for each Priority Land Use and selected or determined locations or land uses that generate substantial amounts

of trash. The inventory shall be updated with modified trash generation rates as Certified Full Capture Systems and/or Other Controls are implemented.

e. Initial trash generation rates are determined prior to implementation of Certified Full Capture Systems and/or Other Controls. Baseline trash generation rates are determined subsequent to implementation of Certified Full Capture Systems and/or Other Controls in place as of the Effective Date of this Order. Baseline trash generation rates are subject to the Interim Milestones described in Section H10. Modified trash generation rates are determined and updated subsequent to implementation of Certified Full Capture Systems and/or Other Controls after the Effective Date of this Order.

f. Permittees shall use the On-Land Visual Trash Assessment Approach or an alternate equivalent spatially explicit trash assessment approach approved by the Regional Board Executive Officer to determine initial, baseline, and modified trash generation rates. Alternative equivalent spatially explicit approaches shall be based on technically acceptable and defensible assumptions and methods. Permittees shall provide the Regional Board Executive Officer the following for approval:

   i. Justification for implementing an alternative trash assessment approach; and

   ii. The alternative trash assessment approach and technical rationale.

g. Alternative trash assessment approaches shall identify areas with Very High, High, Moderate, and Low trash generation rates. Very High, High, and Moderate trash generation areas are considered substantial trash generation areas.

h. Permittees shall include a description of and rationale for Other Controls selected to achieve Full Capture System Equivalency.

i. Track 2 Permittees must additionally demonstrate that the amount of trash to be addressed amounts to at least the amount of trash generated by the Permittees' Priority Land Uses.

H.6. TRASH GENERATING AREA MAPS

Within 180 days of the Effective Date of this Order or new enrollment under this Order, whichever is later, Permittees shall submit a Trash Generating Area Map and update the map annually thereafter to graphically document the following locations and subdrainage areas:

1. Track 2 Permittees:

   a. All Priority Land Use subdrainage areas discharging to the MS4, and the corresponding stormwater conveyance system including inputs, outlets and other components that collect and convey discharges from Priority Land Use areas;

b. Locations of Certified Full Capture Systems that have been installed and/or are proposed to be installed in the following 12 months; and

c. For Track 2 Permittees, locations and land uses where Certified Full Capture Systems and Other Controls have been implemented and/or will be implemented in the following 12 months that will achieve Full Capture System Equivalency.

2. Track 2 Permittees:

   a. Trash generation rates for all Priority Land Uses and locations and land uses where Certified Full Capture Systems will not be implemented.

H.7. TRASH IMPLEMENTATION PLAN

Within 180 days of the Effective Date of this Order under this Order, whichever is later, Permittees shall prepare and submit via SMARTS a Trash Implementation Plan. Permittees shall submit via SMARTS updates to the Trash Implementation Plan annually thereafter. The Trash Implementation Plan shall include the following:

1. A schedule for the installation or implementation of Certified Full Capture Systems and Other Controls in the following 12 months;

2. The locations of Certified Full Capture Systems proposed to be installed in the following 12 months, the drainage area served, design specifications and treatment capacity treated by each Certified Full Capture System, and rationale for each selected Certified Full Capture System;

3. The Trash Implementation Plan shall include an annual evaluation of:

   a. The progress toward attaining interim milestones; and

   b. The progress toward achieving the previous year's Trash Implementation Plan goals.

4. Track 2 Permittees: In addition to the requirements of H7.1 through 3 above, Track 2 Permittees shall include:

   a. Storm water discharge locations and acreage where Other Controls are planned to be implemented in the following 12 months;

   b. Types of Other Controls that are scheduled to be implemented in the following 12 months for each location;

   c. The calculated trash reduction resulting from the installation and implementation of Certified Full Capture Systems the Other Controls;

d. An evaluation of the effectiveness of the implemented Other Controls in achieving Full Capture System equivalency; and

e. If applicable, a plan to address any shortfall in trash reduction from previous years.

H.8. CERTIFIED FULL CAPTURE SYSTEMS

Use of Certified Full Capture Systems is subject to the following requirements:

1. Certified Full Capture Systems shall be designed to trap all particles 5-millimeters or greater, and have a design treatment capacity that is either:

   a. Not less than the peak flow rate, Q, resulting from a one-year, one-hour, storm in the subdrainage area, or

   b. Designed and sized to carry at least the same flows as the corresponding storm drain.

2. The rational equation is used to compute the peak flow rate, as shown in the formula below:

   $$Q = C \bullet I \bullet A$$

   Where Q is the design flow rate in cubic feet per second; C is the runoff coefficient (dimensionless); "I" is the design rainfall intensity in inches per hour and as determined by the rainfall isohyetal map specific to each region, and A is the subdrainage area in acres.

3. Certified Full Capture Trash Treatment Control Devices shall be designed to maintain hydraulic capacity to trap trash for peak flows when 50 percent filled with trash and other debris.

4. Permittees that installed Certified Full Capture Systems prior to the date the devices were decertified may continue to maintain the Systems if the Systems were designed to be consistent with the requirements of the Trash Provisions and perform in accordance with those designs.

5. Full capture systems that are decertified because they were not designed to be consistent with the requirements of the Trash Provisions will not be considered Certified Full Capture Systems for any purpose regardless of when the systems were installed.

6. The list of *Decertified Trash Full Capture Devices* are published on the State Water Board's Trash Program Implementation web page at: https://www.waterboards.ca.gov/water_issues/programs/stormwater/trash_implementation.html site.

7. Lists of *Certified Trash Full Capture Systems* Trash Treatment Control Devices and *Certified Multi-Benefit Trash Treatment Systems* are published on the State Water Board's Trash Program Implementation web page at: https://www.waterboards.ca.gov/water_issues/programs/stormwater/trash_implementation.html site.

8. Permittees may submit an application for certification of a new full capture system. To apply for certification of a new Device, the Device owner shall submit an application/fact sheet in accordance with the *Trash Treatment Control Device Certification and Fact Sheet Update Requirements*. The application requirements are published on the State Water Board's Trash Program Implementation web page at: https://www.waterboards.ca.gov/water_issues/programs/stormwater/trash_implementation.html site.

H.9. FULL CAPTURE SYSTEM EQUIVALENCY

1. Track 2 Permittees must demonstrate that the Certified Full Capture Systems and Other Controls achieve Full Capture System Equivalency.

    a. For Track 2 Permittees, Full Capture System Equivalency is a trash load reduction equivalent to the performance of Certified Full Capture Systems that are properly installed, operated, and maintained for all storm drains that capture runoff from Priority Land Uses.

2. Permittees shall demonstrate Full Capture System Equivalency in accordance with subsection H10.5 below.

H.10. TRASH REDUCTION MILESTONES

Permittees shall annually report their status towards compliance with the Trash Requirements of this Order in the Annual Trash Monitoring Report described in section H5 of this Attachment, per the following Trash Reduction Milestones:

1. First Milestone. By December 2, 2025, Permittees shall achieve the following milestones:

    a. For Track 2 Permittees, 35 percent baseline trash reduction of remaining locations and land uses that generate substantial amounts of trash addressed with new Certified Full Capture Systems and/or new or additional Other Controls to achieve Full Capture System Equivalency;

2. Second Milestone. By December 2, 2028, 70 percent baseline trash reduction or more based on the same metrics identified in H10.1. a.

3. Third Milestone. By December 2, 2030, 100 percent baseliner trash reduction based on the same metrics identified in H10.1. a. above.

4. Permittees may submit alternative Trash Reduction Milestones for the first and second milestones described above for Regional Water Board Executive Officer review and approval. If approved, the alternative Trash Reduction Milestones will supersede the above first and/or second milestones. With approval of the alternative Trash Reduction Milestones, Permittees shall comply with the alternative milestones.

5. Permittees shall also report on progress towards addressing areas that generate substantial amounts of trash identified by the Regional Board Executive Officer pursuant to H13 below.

6. Percent Trash Reduction can be calculated every year as trash generation rates are reduced until 100 percent trash reduction from the baseline is achieved. Baseline trash generation rates for each sub-drainage area very high, high, moderate, and low as of the Effective Date of this Order. As certified Full Capture Systems and Other Controls are installed or implemented, the trash generation rates are reduced to provide modified trash generation trash rates until the required total percent trash reduction is achieved. Annual percent Trash reduction shall be calculated based upon the following formula:

   Percent Reduction = 100 [(12AVH(2022) + 4AH(2022) + AM(2022)) - (12AVH + 4AH + AM)] / (12AVH(2022) + 4AH(2022) + AM(2022)) where:

   AVH(2022) = total acres of the baseline 2022 very high trash generation category

   AH(2022) = total acres of the baseline 2022 high trash generation category

   AM(2022) = total acres of the baseline 2022 moderate trash generation category

   AVH= total acres of very high trash generation category in the reporting year

   AH = total acres of high trash generation category in the reporting year

   AM = total acres of moderate trash generation category in the reporting year

   12 = Very High to Moderate weighing ratio

   4 = High to Moderate weighing ratio

   100 = fraction to percentage conversion factor

7. The same formula above is used to calculate cumulative trash reduction. The following three terms in the formula are changed from total acres of trash generation in the reporting to total acres of trash generation to date.

   AVH= total acres of very high trash generation category to date.

AH = total acres of high trash generation category to date AM = total acres of moderate trash generation category to date

H.11. MAINTENANCE REQUIREMENTS

Permittees shall maintain Certified Full Capture Systems at a frequency that ensures the Systems maintain hydraulic capacity to trap trash in accordance with the Trash Provisions. At a minimum:

1. Certified Full Capture Trash Treatment Control Devices

    a. All Certified Full Capture Trash Treatment Control Devices shall be inspected and maintained at least once per year. Certified Full Capture Trash Treatment Control Devices receiving runoff from areas of very high or high trash generation rates as determined by the Permittee's trash assessment methodology, shall be inspected at least twice per year during the rainy season, and with the inspections spaced at least three months apart. Permittees that have not assessed the trash generation rate of areas shall inspect their Certified Full Capture Trash Treatment Control Devices at least twice per year during the rainy season, with inspections spaced at least three months apart.

    b. If any Certified Full Capture Trash Treatment Control Device is found to exceed 50 percent of its trash capacity during an inspection or maintenance event, the maintenance frequency shall be increased so that the Certified Full Capture Trash Treatment Devices is maintained to not exceed 50 percent of its capacity at the next maintenance event.

2. Certified Multi-Benefit Trash Treatment Systems

In addition to the maintenance requirement for Certified Full Capture Trash Systems, above, Permittees shall prevent the accumulation of trash in Certified Multi-Benefit Trash Treatment Systems to a level which inhibits its hydraulic capacity to infiltrate or treat stormwater at the design peak flow rate.

3. Record Retention

Permittees shall retain device specific inspection and maintenance records that include at a minimum the following information:

a. Certified Full Capture System type,

b. Installation date,

c. Location,

d. Drainage area,

e. Maintenance dates,

f. Capacity condition at time of maintenance,

g. Other conditions that may have impaired Certified Full Capture System trash capture (e.g., broken parts, inadequate screen cleaning, etc.).

4. Coordination with Vector Control Districts

Permittees shall provide their local vector control agencies with the name and location of new and existing Certified Full Capture Systems.

H.12. ANNUAL TRASH ASSESSMENT

Permittees shall conduct an annual trash assessment of the effectiveness of their Full Capture Systems and Other Controls in achieving Full Capture System Equivalency. Permittees shall either:

5. Annually conduct a trash assessment at each location or land use where the Permittee has implemented Full Capture Systems and Other Controls to assess trash reduction, or

6. Annually conduct trash assessment at a statistically representative type of similar locations or land uses, of similar trash generation levels, and with similar implemented Full Capture Systems and Other Controls. The result of such an assessment will apply to all corresponding similar land uses, trash generation levels, and implemented Full Capture Systems and Other Controls.

H.13. REGIONAL BOARD DETERMINATIONS

The Regional Water Board Executive Officer may determine that specific land uses or locations (e.g., parks, stadia, schools, campuses, or roads leading to landfills) generate substantial amounts of trash. In the event that the Regional Water Board Executive Officer makes that determination, Permittees shall include the areas in the Trash Generating Area Inventory and Map and address these areas in the Trash Implementation Plan. The Regional Water Board Executive Officer has discretion to determine the time schedule for full compliance for the specific land uses or locations (e.g., parks, stadia, schools, campuses, or roads leading to landfills) that generate substantial amounts of trash, but in no case may the final compliance date be later than December 2, 2030.

H.14. RECORD RETENTION

Permittees shall retain device specific inspection and maintenance records that include at a minimum the following information:

a. Certified Full Capture System type,

b. Installation date,

c. Location,

d. Drainage area,

e. Maintenance dates,

f. Capacity condition at time of maintenance,

g. Other conditions that may have impaired Certified Full Capture System trash capture (e.g., broken parts, inadequate screen cleaning, etc.).

7. Coordination with Vector Control Districts

Permittees shall provide their local vector control agencies with the name and location of new and existing Certified Full Capture Systems.

H.15. ANNUAL TRASH MONITORING REPORT

Permittees shall report via SMARTS the following information in each Annual Trash Monitoring Report:

1. Track 2 Permittees:

   a. The results of the Permittee's annual evaluation as required in Section H7.3;

   b. The Certified Full Capture Systems installed in the previous 12 months, their locations, and the individual and cumulative acreage addressed; and

   c. The Certified Full Capture Systems to be installed in the next 12 months, their locations, and the individual and cumulative acreage to be addressed.

   d. Other Controls implemented in the previous 12 months, their locations, and the individual and cumulative acreage addressed

   e. Other Controls to be implemented in the following 12 months, their locations, and the individual and cumulative acreage addressed

   f. The effectiveness of the implemented Other Controls in meeting Full Capture System Equivalency

   g. The percent trash reduction discharged from the areas where Certified Full capture Systems and Other Controls have been implemented from the previous year, or an explanation for any lack of decrease; and

h. Only if information is readily available, the decrease in the amount of Trash in the Permittee's receiving waters from the previous year, or an explanation for any known lack of decrease.

H.16. REPORTING ITEMS

1. Within 60 days of the Effective Date of this Order or new enrollment under this Order, whichever is later, Permittees shall reselect/select Compliance Track 2.

2. Within 180 days of the Effective Date of this Order or new enrollment under this Order, whichever is later, Permittees shall develop or update, and submit via SMARTS a Trash Generating Area Inventory.

3. Within 180 days of the Effective Date of this Order or new enrollment under this Order, Permittees shall develop or update and submit via SMARTS a Trash Generating Area Map.

4. Within 180 days of the Effective Date of this Order or new enrollment under this Order, whichever is later, Permittees shall prepare and submit via Smarts a Trash Implementation Plan.

5. Permittees shall annually conduct and report via SMARTS their Annual Trash Monitoring Report.