



STATE WATER RESOURCES CONTROL BOARD

ORDER WQ 2019-0001-DWQ

**GENERAL WASTE DISCHARGE REQUIREMENTS AND
WAIVER OF WASTE DISCHARGE REQUIREMENTS
FOR DISCHARGES OF WASTE ASSOCIATED WITH
CANNABIS CULTIVATION ACTIVITIES**



STATE WATER RESOURCES CONTROL BOARD
REGIONAL WATER QUALITY CONTROL BOARDS

THIS PAGE INTENTIONALLY LEFT BLANK

STATE WATER RESOURCES CONTROL BOARD
 ORDER WQ 2019-0001-DWQ
 GENERAL WASTE DISCHARGE REQUIREMENTS AND
 WAIVER OF WASTE DISCHARGE REQUIREMENTS FOR DISCHARGES OF WASTE
 ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

TABLE OF CONTENTS

ORDER WQ 2019-0001-DWQ

ACRONYMS AND ABBREVIATIONS..... i

FINDINGS 1

 BACKGROUND..... 1

 APPLICABILITY, TIER DESIGNATION, AND THREAT TO WATER QUALITY... 2

 EXEMPTIONS FOR CERTAIN CULTIVATION ACTIVITIES..... 6

 WATER CODE CONSIDERATIONS 9

 REGULATORY CONSIDERATIONS..... 10

 TITLE 27 EXEMPTION..... 11

 MONITORING AND REPORTING 12

 BASIN PLANS AND BENEFICIAL USES 13

 NORTH COAST REGIONAL WATER BOARD BASIN PLAN, POLICIES, AND
 TMDLS 13

 LAHONTAN REGIONAL WATER BOARD BASIN PLAN 15

 SAN DIEGO REGIONAL WATER BOARD TMDL..... 16

 NON-POINT SOURCE POLICY 17

 APPLICATION/TERMINATION PROCESS AND FEES..... 18

 CEQA CONSIDERATIONS 22

 OTHER REGULATORY CONCERNS..... 22

IT IS HEREBY ORDERED 23

 A. CANNABIS POLICY REQUIREMENTS 23

 B. APPLICATION PROCEDURE..... 23

 C. PROVISIONS..... 24

CERTIFICATION 35

 (A) ATTACHMENT A: CANNABIS POLICY ATTACHMENT AA-1

 (B) ATTACHMENT B: MONITORING AND REPORTING PROGRAMB-1

 FACILITY STATUS.....B-3

 SITE MAINTENANCE STATUSB-4

 STORM WATER RUNOFF MONITORING.....B-5

 REPORTINGB-5

 REGIONAL WATER BOARD CONTACT INFORMATIONB-7

 (C) ATTACHMENT C: NOTICE OF TERMINATION C-1

 SECTION I. DISCHARGER INFORMATION..... C-1

 SECTION II. CANNABIS CULTIVATION SITE INFORMATION..... C-2

 SECTION III. CERTIFICATION C-3

 (D) ATTACHMENT D: TECHNICAL REPORT GUIDANCE D-1

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WASTE DISCHARGE REQUIREMENTS AND
WAIVER OF WASTE DISCHARGE REQUIREMENTS FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

SITE MANAGEMENT PLAN.....	D-1
SITE EROSION AND SEDIMENT CONTROL PLAN	D-5
NITROGEN MANAGEMENT PLAN.....	D-8
EXAMPLE NITROGEN REPORTING WORKSHEET	D-9
EXAMPLE NITROGEN REPORTING FORM.....	D-10
DISTURBED AREA STABILIZATION PLAN	D-13
SITE CLOSURE REPORT	D-15

ACRONYMS AND ABBREVIATIONS

Abbreviation	Expanded Form
Antidegradation Policy	State Water Board Resolution 68-16, the Statement of Policy with Respect to Maintaining High Quality of Waters in California
Army Corps	United States Army Corps of Engineers
AUMA	Adult Use of Marijuana Act of 2016
Basin Plan	Water Quality Control Plan
BOF	Board of Forestry
BPTC	Best Practicable Treatment or Control
CAL FIRE	California Department of Forestry and Fire Protection
CDFAs	California Department of Food and Agriculture
Cannabis Policy	Cannabis Cultivation Policy, Principles and Guidelines for Cannabis Cultivation
CDFW	California Department of Fish and Wildlife
CIWQS	California Integrated Water Quality System
CUA	Compassionate Use Act of 1996
CEQA	California Environmental Quality Act
CDFW	California Department of Fish and Wildlife
DPR	Department of Pesticides Regulation
e.g.	Latin <i>exempli gratia</i> (for example)
FPR	Forest Practice Rules
ILRP	Irrigated Lands Regulatory Program
MCRSA	Medical Cannabis Regulation and Safety Act
MMRSA	Medical Marijuana Regulation and Safety Act
NOA	Notice of Applicability
NOT	Notice of Termination
NPDES	National Pollutant Discharge Elimination System
NPS	Nonpoint Source Pollution Control Program
NTU	Nephelometric Turbidity Units
OWTS	Onsite Wastewater Treatment System
Regional Water Board	Regional Water Quality Control Board
Road Handbook	Handbook for Forest, Ranch, and Rural Roads
RWD	Report of Waste Discharge
State Water Board	State Water Resources Control Board
SB	Senate Bill
SIC	Standard Industrial Code
SW-CGP	Storm Water Construction General Permit
SW-IGP	Storm Water Industrial General Permit
THP	Timber Harvest Plan
TMDL	Total Maximum Daily Load
U.S. EPA	United States Environmental Protection Agency
Water Boards	State Water Board and Regional Water Boards
WDRs	Waste Discharge Requirements

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

**STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WASTE DISCHARGE REQUIREMENTS AND
WAIVER OF WASTE DISCHARGE REQUIREMENTS FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES**

FINDINGS

The State Water Resources Control Board (State Water Board) finds that:

BACKGROUND

1. Cannabis cultivation in California has grown exponentially in recent years and is often located in sensitive environmental areas where the activities create significant impacts to water quality. Waste discharges from cultivation sites include sediment, irrigation runoff, fertilizers, pesticides/herbicides, petroleum, agricultural related chemicals, cultivation related waste, refuse, and human waste. Construction of access roads has resulted in significant erosion and sediment discharges to water bodies.
2. Water Code section 13149 required the State Water Board to adopt principles and guidelines for diversion and use of water for cannabis cultivation in areas where cannabis cultivation may have the potential to substantially affect instream flows. The principles and guidelines may include, but are not limited to, instream flow objectives, limits on diversions, and requirements for screening of diversions and elimination of barriers to fish passage. The principles and guidelines may also include requirements that apply to groundwater extractions where the board determines those requirements are reasonably necessary. The principles and guidelines were developed as part of state policy for water quality control adopted pursuant to Article 3 (commencing with Section 13140) of Chapter 3 of Division 7 and include measures to protect springs, wetlands, and aquatic habitats from negative impacts of cannabis cultivation. The principles and guidelines are included in the *Cannabis Cultivation Policy – Principles and Guidelines for Cannabis Cultivation* (Cannabis Policy). The Cannabis Policy describes the overarching water diversion and waste discharge requirements (WDRs) associated with cannabis cultivation activities. The State Water Board does not, in any way authorize, endorse, sanction, permit or approve the cultivation, use, sale or other activities associated with cannabis. Individuals engaging in cannabis cultivation and other activities risk prosecution under federal law.
3. Section 19332 (d) of the Business and Professions Code directs the State Water Board, in consultation with the California Department of Fish and Wildlife (CDFW) and the California Department of Food and Agriculture (CDFA), to ensure, pursuant to Section 13149 of the Water Code, that individual and cumulative effects of water diversions and discharges associated with cannabis cultivation do not affect the

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

instream flows needed for fish spawning, migration, rearing, and the flows needed to maintain natural flow variability.

4. This General Order implements the Cannabis Policy requirements, specifically those requirements that address waste discharges associated with cannabis cultivation activities. Dischargers covered under this General Order are subject to the requirements of the Cannabis Policy in its entirety. Administrative requirements, such as how to apply for coverage, terminate coverage, applicable fees, and monitoring and reporting requirements are contained within this General Order.
 - a. The Cannabis Policy describes the water quality control policy structure, requirements for cannabis cultivation activities to protect water quality and instream flows, implementation, means of compliance, and enforcement.
 - b. Attachment A of the Cannabis Policy, which is attached hereto as Attachment A of the General Order and is made part of this Order by reference, contains non-flow related requirements (Section 1 and Section 2) and flow requirements (Section 3, Section 4). Section 5 contains planning and reporting requirements. Section 6 contains guidance documents referenced in Attachment A.
 - c. The Cannabis Policy and staff report contains rationale for the requirements contained in the Cannabis Policy.
5. Two Regional Water Quality Control Boards (Regional Water Boards) have adopted orders related to cannabis cultivation.
 - a. On August 13, 2015, the North Coast Regional Water Quality Control Board adopted a *Waiver of Waste Discharge Requirements and General Water Quality Certification for Discharges of Waste Resulting from Cannabis Cultivation and Associated Activities or Operations with Similar Environmental Effects in the North Coast Region* (Order No. R1-2015-0023).
 - b. On October 2, 2015, the Central Valley Regional Water Quality Control Board adopted a *General Waste Discharge Requirements Order for Discharges of Waste Associated with Medical Cannabis Cultivation Activities* (Order No. R5-2015-0113).

APPLICABILITY, TIER DESIGNATION, AND THREAT TO WATER QUALITY

6. It is the intent of the State Water Board that Regional Water Boards enroll all eligible dischargers developing land for, or engaging in, cannabis cultivation activities under this General Order consistent with the exemptions and conditional exemptions described herein. This General Order does not limit the State Water Board or

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

Regional Water Board authority to inspect and/or evaluate the regulatory status, water quality impacts, or water right regulatory requirements of cannabis cultivation activities. If a Regional Water Board determines that due to site-specific conditions, coverage under this General Order will not be protective of water quality, the Regional Water Board may issue site-specific WDRs for discharges from a cannabis cultivation site.

- a. For dredge and fill activities covered by this General Order, a Regional Water Board may issue a site-specific Clean Water Act section 401 water quality certification or enroll the Discharger in a general section 401 water quality certification if the Regional Water Board determines that the general water quality certification in this General Order is not protective of water quality due to site-specific or region-specific conditions.
 - b. The Regional Water Boards may also regulate discharges from cannabis cultivation activities using individual or general Irrigated Lands Regulatory Program (ILRP) WDRs if the Regional Water Board Executive Officer determines that the ILRP WDRs or ILRP conditional waiver of WDRs adequately describe discharges from the cannabis cultivation activity, are protective of water quality, the Discharger possesses valid water rights after consulting with State Water Board Division of Water Rights, the Discharger complies with the water diversion reporting requirements contained in Water Code sections 1840 and 1841, and the ILRP WDRs or ILRP conditional waiver of WDRs require compliance with the State Water Board's Cannabis Policy.
7. The Cannabis Policy provides a statewide tiered approach for permitting discharges and threatened discharges of waste from cannabis cultivation and associated activities, establishes a personal use exemption standard, and provides conditional exemption criteria for low threat to water quality activities. Tiers are defined by the amount of disturbed area. The criteria consist of:
- a. Personal use exempt Dischargers are very small non-commercial cultivators that are exempt from this General Order. (Refer to the Exemptions for Certain Cultivation Activities section of this General Order for more information.)
 - b. Indoor commercial cultivation activities are conditionally exempt under this General Order. (Refer to the Exemptions for Certain Cultivation Activities section of this General Order for more information.)
 - c. Outdoor commercial cultivation activities that disturb less than 2,000 square feet may be conditionally exempt under this General Order. (Refer to the

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

Exemptions for Certain Cultivation Activities section of this General Order for more information.)

- d. Tier 1 Dischargers cultivate cannabis commercially outdoors, and have a disturbed area equal to or greater than 2,000 square feet and less than 1 acre (43,560 square feet).
 - e. Tier 2 Dischargers cultivate cannabis commercially outdoors, and have a disturbed area equal to or greater than 1 acre.
8. The Cannabis Policy provides criteria to evaluate the threat to water quality based on site conditions. The threat is risk-based as described below:
- a. Disturbed area: The disturbed area indicates the threat to water quality because level of threat is proportional to the area of disturbed soil, the amount of irrigation water used, the potential for storm water runoff, and the potential impacts to groundwater (e.g., the use of fertilizers or soil amendments, the possible number of employees on site, etc.).
 - b. Slope of disturbed area: Increased slopes may be associated with decreased soil stability, especially when associated with vegetation removal. Storm water and excess irrigation water are more likely to runoff and discharge off-site from sloped surfaces.
 - c. Proximity to a surface water body: The Cannabis Policy provides setbacks from surface water bodies to reduce water quality impacts. Disturbed areas within the setbacks are more likely to discharge waste constituents to surface water and/or result in removal of riparian vegetation.
9. Dischargers must characterize their cultivation activities as described below and implement all applicable best practicable treatment or control (BPTC) measures described in Attachment A.
- a. Dischargers that cultivate in multiple areas within a parcel or contiguous parcels shall add all the disturbed areas together to calculate the total disturbed area. (For example, a Discharger that operates two cultivation areas that each disturbs 1,100 square feet must report a disturbance of 2,200 square feet and does not qualify for a conditional exemption under this General Order.)
 - b. Risk determination based on the site conditions shall be based on the greatest threat to water quality. (For example, if one of the 1,100 square feet

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

cultivation areas is located on a slope greater than 30 percent, all the cultivation areas will be classified as moderate risk).

- c. Dischargers that cultivate cannabis on non-contiguous parcels must evaluate each parcel for regulatory coverage separately.

10. Personal use exempt dischargers meeting the criteria described in this General Order (see Exemptions for Certain Cultivation Activities) do not need to apply for coverage under the General Order. Dischargers that qualify for conditional exemption (either indoor or outdoor activities) will be covered under the Waiver of WDRs (Waiver) contained in this General Order. Tier 1 or Tier 2 dischargers must enroll under the General Order (refer to Finding 7 for tier designation). Outdoor conditionally exempt and Tier 1 and Tier 2 enrollees shall characterize the risk designation based on the slope of disturbed areas and the proximity to a water body. Characterization shall be based on the risk designation summarized as follows:

- a. Low risk

- i. No portion of the disturbed area is located on a slope greater than 30 percent, and
- ii. All of the disturbed area complies with the setback requirements.

- b. Moderate risk

- i. Any portion of the disturbed area is located on a slope greater than 30 percent and less than 50 percent, and
- ii. All of the disturbed area complies with the setback requirements.

- c. High risk

- i. Any portion of the disturbed area is located within the setback requirements.

11. Site development and/or access road building and maintenance activities associated with cannabis cultivation are subject to this General Order. The *Handbook for Forest, Ranch & Rural Roads* (Road Handbook) provides a guide for planning, designing, constructing, reconstructing, upgrading, maintaining, and closing wildland roads. Development of the Road Handbook was funded in part by State Water Board, United States Environmental Protection Agency (U.S. EPA), and California Department of Forestry and Fire Protection (CAL FIRE). The [Road Handbook](http://www.pacificwatershed.com/sites/default/files/RoadsEnglishBOOKapril2015b.p) is available at:

<<http://www.pacificwatershed.com/sites/default/files/RoadsEnglishBOOKapril2015b.p>

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

df>

Construction of new access roads, and development of cultivation sites may be subject to the Regional Water Board's forestry program permitting requirements, statewide construction storm water program permitting requirements the Lahontan Regional Water Board's construction storm water program permitting requirements for the Lake Tahoe Hydrologic Unit, CAL FIRE permitting requirements, Clean Water Act section 404 permitting requirements issued by the United States Army Corps of Engineers (Army Corps), and Clean Water Act section 401 water quality certification issued by a Regional Water Board. In some cases, the Army Corps may not issue a section 404 permit because the activity is associated with cannabis cultivation; in those situations, the Regional Water Board will not issue a section 401 water quality certification but will regulate that activity under this General Order or issue individual WDRs consistent with the Water Code.

EXEMPTIONS FOR CERTAIN CULTIVATION ACTIVITIES

12. Cultivation activities that qualify for the personal use exemption disturb less than 1,000 square feet (in aggregate) and present the lowest threat to water quality; therefore, discharges from the operations are exempt from enrolling in the General Order if they comply with the conditions specified in this order. Personal use cultivation activities are exempt from requirements to obtain a CDFA cultivation license because they are not a commercial activity. Activities that are consistent with Health and Safety Code sections 11362.77 (medical marijuana) or 11362.2 (non-medical marijuana) and subsequent revisions of the statutes, disturb an area (in aggregate) less than 1,000 square feet, and comply with the additional conditions below, are not required to submit any application information to obtain coverage under this General Order. The 1,000 square feet personal use exemption criteria provide sufficient area for outdoor cultivation of six mature plants for non-medical use, or 500 square feet of cannabis plant canopy as allowed for medical cultivation purposes.
 - a. The exemptions apply per parcel or contiguous parcels; no coalitions, cooperatives, or other combination of cultivation activities can claim the personal use exemption for activities on the same parcel. The personal use exemption shall not apply if the Cannabis Cultivator fails to comply with all applicable conditions, including the non-commercial activity requirement.
 - b. If the personal use exemption does not apply, the Discharger shall contact the Regional Water Board to determine if the activity qualifies for coverage as conditionally exempt, or Tier 1 or Tier 2 enrollment. To qualify for the personal use exemption, a Discharger must comply with all of the following conditions:
 - i. The cultivation area shall be contiguous (all located in one area).

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

- ii. The disturbed area complies with the setback requirements contained in this General Order (refer to Attachment A) and occupies less than 1,000 square feet.
 - iii. No part of the disturbed area is located on land with a slope greater than 20 percent.
 - iv. The Discharger implements all applicable BPTC measures listed in Attachment A.
 - c. The personal use exemption does not alter any other legal requirement (e.g., limitations on sales, distribution, or donations of cannabis). Noncommercial cultivation activities require a valid basis of right for the diversion and use of water and therefore may need to apply for a water right. The personal use exemption does not affect the requirement to obtain authorization for water diversion.
13. Outdoor cannabis cultivation activities that disturb an area (in aggregate) less than 2,000 square feet on any one parcel or on contiguous parcels managed as a single operation and that comply with all of the additional cultivation area criteria listed below are conditionally exempt and are required to obtain coverage under the Waiver. The 2,000 square feet conditional exemption criterion provides sufficient area for outdoor cultivation for small commercial activities. Facilities with larger disturbed areas are inherently a higher threat to water quality and are subject to additional regulatory oversight. The conditional exemption applies per parcel or contiguous parcels; no coalitions, cooperatives, or other combination of cultivation activities can claim the conditional exemption for activities on the same parcel. To be conditionally exempt, a Discharger must comply with all of the following:
- a. The cultivation area shall be contiguous (all located in one area).
 - b. The disturbed area complies with the setback requirements contained in this General Order (refer to Attachment A) and occupies less than 2,000 square feet.
 - c. No part of the disturbed area is located on land with a slope greater than 20 percent.
 - d. The Discharger implements all applicable BPTC measures listed in Attachment A.
14. The Conditional exemption does not alter any other legal requirement (e.g., limitations on sales, distribution, or donations of cannabis). Refer to the Application/Termination

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

Process and Fees section for information on application requirements. Cultivation activities that are conditionally exempt under this General Order still require a valid basis of right for the diversion and use of water and therefore may still need to apply for a water right. Indoor commercial cannabis cultivation may be performed using hydroponic growing systems, soil, or other growth media. To maintain suitable growing conditions, wastewater is discharged from hydroponic systems when the irrigation water contains excessive salinity or nutrients. Irrigation tail water is generated when excess water drains from the growth media. Irrigation tail water or hydroponic wastewater may contain nutrients (e.g., phosphate or nitrate), salinity constituents (e.g., sodium, chloride, potassium, calcium, sulfate, magnesium), and other constituents (e.g., iron, manganese, zinc, molybdenum, boron, and silver).¹ Other sanitation based wastewaters may also be generated at indoor commercial cannabis cultivation sites. These miscellaneous industrial wastewaters may contain biocides, bleach mixtures, or other chemical waste streams.

- a. Commercial cannabis cultivation activities are classified as conditionally exempt if they occur within a structure with a permanent roof, a permanent relatively impermeable floor (e.g., concrete or asphalt paved), and comply with the Cannabis Policy and all applicable Requirements in Attachment A, and either: 1) discharge all industrial wastewaters generated to a permitted wastewater treatment collection system and facility that accepts cannabis cultivation wastewater; or 2) collect all industrial wastewater in an appropriate storage container to be stored and properly disposed of by a permitted wastewater hauler at a permitted wastewater treatment facility that accepts cannabis cultivation wastewater. To obtain documentation of the conditionally exempt status to obtain a CDFA commercial cannabis cultivation license, conditionally exempt Dischargers are required to obtain coverage under the Waiver included in this General Order. Refer to the Application/Termination Process and Fees section for information on application requirements.
- b. Discharges of irrigation tailwater, hydroponic wastewater, or other miscellaneous industrial wastewaters from indoor cannabis cultivation activities to an on-site wastewater treatment system (such as a septic tank and leach field), to land, or to surface water must obtain separate regulatory authorization (e.g., WDRs, conditional waiver of WDRs, or other permit mechanism) to discharge the wastewater. Such Dischargers are classified as conditionally exempt. To obtain documentation of the conditionally exempt status and obtain a CDFA cultivation license, conditionally exempt Dischargers are required to obtain coverage under the Waiver included in this General Order. Refer to the Application/Termination Process and Fees section for information on application requirements.

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

- c. Indoor commercial cultivation activities that are conditionally exempt under this General Order still require a valid basis of right for the diversion and use of water and therefore may still need to apply for a water right. The exemption for enrolling under this General Order does not affect the Requirement to obtain authorization for water diversion.

WATER CODE CONSIDERATIONS

15. Water Code section 13260(a) requires that any person, citizen, or domiciliary discharging waste or proposing to discharge waste within any region, other than to a community sewer system, that could affect the quality of the waters of the state, file a report of waste discharge (RWD) to obtain coverage under WDRs or a waiver or WDRs. Waste, person, citizen, and domiciliary are defined in Water Code section 13050.
16. Water Code section 13146 requires that WDRs must implement the Regional Water Board's Water Quality Control Plan (Basin Plan) for the basin in which the discharge occurs. This General Order requires Dischargers to comply with all applicable Basin Plan requirements, including prohibitions and/or water quality objectives governing the discharge. In the event of a conflict between the requirements of this General Order and the Basin Plan, the more protective requirement prevails.
17. The State Water Board's authority to regulate discharges associated with cannabis cultivation and associated activities are subject to the following regulatory measures:
 - a. Water Code section 13263(i) states the State Water Board or a Regional Water Board may prescribe general WDRs for a category of discharges if the State Water Board or a Regional Water Board finds or determines that all of the following criteria apply to the discharges in that category:
 - i. The discharges are produced by the same or similar operations.
 - ii. The discharges involve the same or similar type of waste.
 - iii. The discharges require the same or similar treatment standards.
 - iv. The discharges are more appropriately regulated under general WDRs than individual WDRs.
 - b. Discharges associated with cannabis cultivation and associated activities that will be regulated under this General Order are consistent with the criteria listed above and therefore a general order is appropriate. All discharges regulated under this order will be from similar operations and/or activities related to cannabis cultivation, which pose similar types of threat to water quality. The

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

discharges will use similar treatment methods (e.g., filtration, settling, setbacks, application to land, etc.). Individual WDRs are not necessary because the discharges are similar and discharge requirements would be similar if individual WDRs were issued.

- c. Water Code section 13269 states that the State Water Board or the Regional Water Board may conditionally waive the requirements to file an RWD under Water Code section 13260(a)(1) and/or the requirement to prescribe WDRs under Water Code section 13263(a) for a specific discharge or specific type of discharge where such a waiver is consistent with the applicable Regional Water Board Basin Plans, in the public interest, and the following conditions are met:
 - i. The waiver is conditional.
 - ii. The discharge complies with the waiver conditions.
 - iii. A public hearing is held.
 - d. Discharges that meet the criteria for conditional exemption under this General Order are considered to be a limited threat to water quality provided the Discharger complies with the conditions contained in this General Order; therefore, coverage under a conditional waiver is appropriate. A Discharger covered under the conditional waiver that no longer complies with the conditions is required to consult with the Regional Water Board to determine if a compliance schedule is appropriate, if enrollment in Tier 1 or Tier 2 is possible, or if the Discharger must cease the discharge. Violators are guilty of misdemeanor and may be liable civilly pursuant to Water Code section 13265.
18. Pursuant to Water Code section 13263(g), no discharge of waste into waters of the state, whether or not the 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.
19. In compliance with Water Code section 106.3, it is the policy of the State of California that every human being has the right to safe, clean, affordable, and accessible water adequate for human consumption, cooking, and sanitary purposes. This order promotes that policy by requiring discharges to comply with requirements established to protect municipal and domestic water supplies.

REGULATORY CONSIDERATIONS

20. The Cannabis Policy includes instream flow objectives, limits on diversions, requirements for screening of diversions and elimination of barriers to fish passage,

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

and requirements that apply to groundwater extraction. Cannabis cultivation activities statewide are required to comply with the requirements of the Cannabis Policy.

21. Health and Safety Code Section 11362.2 states that local municipalities (e.g., city, county, or city and county) have land use authority related to cannabis cultivation and associated activities. Coverage under this General Order does not supersede any requirements, ordinances, or regulations of other regulatory agencies or local municipalities.
22. Those requirements, ordinances, or regulations may change over time. Authorization to discharge waste from cannabis cultivation activities under this General Order may be revoked based on those conditions.
23. The Regional Water Board Executive Officer may terminate permit coverage under the General Order for cause when such termination is needed to protect water quality.
24. Industrial hemp, as defined in Health and Safety Code section 9.1, is exempt from regulation under this General Order. Industrial hemp is regulated by the CDFA, commencing with section 81000 of the Food and Agricultural Code. Cultivation of industrial hemp shall be performed consistent with the Regional Water Board's ILRP.
25. The California Forest Practice Rules (FPR) designate watercourse (stream) and lake protection zones, protective measures based on the beneficial use, and whether the watercourse is natural or manmade. Activities performed in areas subject to the FPR shall be implemented consistent with the permitting, licensing, and performance standards of the FPR, and the requirements of the Cannabis Policy and this General Order, whichever is more protective.
26. Diversion of water or any other alteration of a lake or streambed (including alterations that result from construction or modification of culverts, etc.) requires CDFW notification and permitting. CDFW manages California's fish and wildlife resources and habitats for their ecological value and enjoyment by the public. CDFW may issue Lake or Streambed Alteration Agreements (also known as "1600 Agreements") that may limit water diversions to ensure that public resources are protected or impose additional conditions.

TITLE 27 EXEMPTION

27. Discharges from cannabis cultivation activities eligible for coverage under this General Order are exempt from the requirements of Consolidated Regulations for Treatment, Storage, Processing, or Disposal of Solid Waste in California Code of Regulations, title 27, division 2, subdivision 1, section 20005, et seq. The activities are exempt

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

from the requirements of title 27 so long as the activity meets and continues to meet all preconditions listed below. (Cal. Code Regs., tit. 27, §20090).

- a. Wastewater – Discharges of wastewater to land, including but not limited to evaporation ponds, percolation ponds, or subsurface leach fields if all of the following conditions are met:
 - i. The applicable Regional Water Board has issued WDRs, reclamation requirements, or waived such issuance.
 - ii. The discharge complies with the applicable water quality control plan.
 - iii. The wastewater does not need to be managed according to California code of Regulations, title 22, division 4.5, chapter 11, as a hazardous waste. (Cal. Code Regs., tit. 27, §20090(b).)
- b. Soil Amendments – Use of nonhazardous decomposable waste as a soil amendment pursuant to applicable BPTC measures, provided that Regional Water Boards may issue waste discharge or reclamation requirements for such use. (Cal. Code Regs., tit. 27, §20090(f).)

MONITORING AND REPORTING

28. Water Code section 13267 states, in relevant part:

- a. (b)(1) In conducting an investigation ..., the regional board may require that any person who has discharged, discharges, or is suspected of having discharged or, discharging, or who proposes to discharge waste within its region ... shall furnish, under penalty of perjury, technical or monitoring program reports which the regional board requires. The burden, including costs, of these reports shall bear a reasonable relationship to the need for the report and the benefits to be obtained from the reports. In requiring those reports, the regional board shall provide the person with a written explanation with regard to the need for the reports, and shall identify the evidence that supports requiring that person to provide the reports.
- b. Tier 1 and Tier 2 enrollees are required to submit technical and monitoring reports. The reports include certifying completion of winterization measures, certification of the facility tier status, and for higher risk tiers, nitrogen management status. The technical reports and monitoring reports are necessary to assure compliance with this General Order. The burden and cost of preparing the reports is reasonable and consistent with the interest of the state in maintaining water quality.

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

BASIN PLANS AND BENEFICIAL USES

29. Beneficial uses of groundwater are determined by each Regional Water Board and are listed in their respective Basin Plans.
- a. Beneficial uses of groundwater include municipal and domestic supply, industrial service supply, industrial process supply, fresh water replenishment, aquaculture, wildlife habitat, water contact recreation, agricultural supply, and groundwater recharge. Some beneficial uses only apply to certain geographical areas within regions.
 - b. Beneficial uses of surface waters include agricultural supply; cold freshwater habitat; estuarine habitat; flood peak attenuation or flood water storage; freshwater replenishment; groundwater recharge; inland saline water habitat; municipal and domestic supply; warm freshwater habitat; water quality enhancement; wetland habitat; wildlife habitat; aquaculture; commercial and sport fishing; industrial process supply; industrial service supply; migration of aquatic organisms; Native American culture; navigation; non-contact water recreation; rare, threatened, or endangered species; spawning, reproduction, and/or early development; subsistence fishing; and water contact recreation.

NORTH COAST REGIONAL WATER BOARD BASIN PLAN, POLICIES, AND TMDLS

30. The North Coast Regional Water Board adopted the *Support of Restoration in the North Coast Region Resolution Number R1-2015-0001* (Restoration Policy) to support the implementation of restoration projects for the purpose of eliminating, reducing, or ameliorating a variety of conditions that can negatively impact aquatic ecosystems, including but not limited to: water pollution, eutrophication, desiccation, habitat simplification, species displacement, migration barriers, erosion from diverted streams, riparian zone disturbance, effects of climate change, or other impairments to the beneficial uses of waters of the state. In many watersheds, the impact of past land use activities or so-called “legacy” problems may require decades to recover to their historic, natural, or functioning conditions. Some aquatic ecosystems have been so significantly altered that it is no longer reasonable or feasible to achieve historic conditions; but rather, restoration efforts must focus on establishing best achievable structure, function, and biodiversity.
31. The North Coast Regional Water Board Basin Plan includes the policy for the Implementation of the Water Quality Objectives for Temperature (Temperature Implementation Policy), which specifies that activities resulting in water temperature increases shall be addressed on a case-by-case basis to reduce impairments and prevent further impairment. The Temperature Implementation Policy directs staff to examine and address temperature when developing permits. At a minimum, any

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

program or permit should implement temperature shade load allocations in areas subject to existing temperature total maximum daily loads (TMDLs), including EPA-established temperature TMDLs. To attain and maintain the water quality objectives for temperature, the Regional Water Board and its staff will implement programs and collaborate with others in such a manner as to prevent, minimize, and mitigate temperature alterations associated with sediment discharges and controllable water quality factors. Controllable water quality factors affecting water temperature include any anthropogenic activity which results in the removal of riparian vegetation, sediment discharges, impoundments and other channel alterations, reduction of instream summer flows, and the reduction of cold water sources. The Temperature Policy requires program implementation through adoption of WDRs.

32. The North Coast Region is home to numerous threatened and endangered species that are sensitive to excessive sediment, temperature fluctuations, and reduction of suitable habitat. The migration, spawning, reproduction, and early development of cold-water fish such as salmon and trout species are impacted in the North Coast Region due to water quality impairments and other conditions. The National Marine Fisheries Service has listed southern Oregon/northern California coast Coho salmon, California coastal Chinook salmon, and northern California steelhead as threatened under the federal Endangered Species Act. The CDFW listed Coho salmon as threatened in 2005.
33. Approximately 61-percent of the North Coast Region drains to sediment impaired rivers and streams (2006 Clean Water Act Section 303(d) list). Sediment TMDLs have been established by the U.S. EPA for the Albion River, Big River, Middle Fork Eel River, North Fork Eel River, South Fork Eel River, Garcia River, Gualala River, Mattole River, Navarro River, Noyo River, Redwood Creek, Ten Mile River, Trinity River, South Fork Trinity River, and Van Duzen River. The establishment of TMDLs by the U.S. EPA was conducted under the authority of the Clean Water Act and is equivalent to adoption of a TMDL as described in California Code of Regulations, title 14, section 916.9(a)(l).
34. The North Coast Regional Board adopted the *TMDL Implementation Policy Statement for Sediment Impaired Receiving Waters in the North Coast Region*, (Sediment TMDL Implementation Policy) on November 29, 2004. The Sediment TMDL Implementation Policy directs the Executive Officer to use all available authority in pursuing sediment related compliance.
35. This General Order is consistent with the Basin Plan for the North Coast Region, the Temperature Implementation Policy and the Sediment TMDL Implementation Policy by requiring all Dischargers that are landowners of the cultivation site in the North Coast Region to develop *Site Management Plans* identifying compliance with BPTC

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

measures property-wide, including discharges from legacy activities (e.g., former timber harvest, road building, mining, etc.) at the site.

LAHONTAN REGIONAL WATER BOARD BASIN PLAN

36. The Lahontan Regional Water Board Basin Plan contains control measures for construction activities. To minimize the risk of erosion and storm water threatening sensitive watersheds, the Basin Plan requires the following:

- a. Disturbed areas located at elevations above 6,000 feet must be stabilized from October 15th through May 1st of each year, and all work performed during this period must be conducted so that the site can be winterized within 48 hours.
- b. “Winterized” for the Lahontan region means implementing erosion and/or sediment controls that will prevent the discharge of earthen materials from the site and the controls will remain effective throughout the rainy/snow season without requiring maintenance. The winter season may be shortened in desert areas of the region.

37. The Lahontan Regional Water Board adopted the *General Waste Discharge Requirements and National Pollutant Discharge Elimination System General Permit for Storm Water Discharges Associated with Construction Activity in the Lake Tahoe Hydrologic Unit, Counties of Alpine, El Dorado, and Placer* (Order No. R6T-2016-0010) which includes a specific anticipated precipitation event criteria. An anticipated precipitation event is defined as a 30 percent or greater chance producing 0.1 inch of precipitation as rainfall in the project area, or if the chance of thunderstorms becomes 30 percent or greater, or when visual observations indicate imminent precipitation.

38. The Lahontan Regional Water Board adopted Resolution Number R6T-2008-0019, *Approval of Amendments to the Water Quality Control Plan for the Lahontan Region to Incorporate a Total Maximum Daily Load (TMDL) and TMDL Implementation Plan for Sediment in the Middle Truckee River Watershed, Placer, Nevada, and Sierra Counties, and Certification of a Substitute Environmental Document* (Middle Truckee River TMDL) on May 14, 2008. The Middle Truckee River TMDL was approved by the State Water Board on March 17, 2009; and the U.S. EPA on September 16, 2009. The implementation of the Middle Truckee River TMDL includes identification of legacy sites and restoration, or implementation of storm water best management practices to prevent erosion and sedimentation of surface waters. The BPTC measures included in this General Order includes requirements to control sediment discharges from construction and maintenance activities related to cannabis cultivation.

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

SAN DIEGO REGIONAL WATER BOARD TMDL

39. The San Diego Regional Water Board adopted Resolution Number R9-2005-0036, *A Resolution Adopting an Amendment to the Water Quality Control Plan for the San Diego Region (9) to Incorporate Total Maximum Daily Loads (TMDLs) for Total Nitrogen and Total Phosphorus in the Rainbow Creek Watershed, San Diego County* (Rainbow Creek TMDL) on February 9, 2005. The Rainbow Creek TMDL was approved by the State Water Board on November 16, 2005; the Office of Administrative Law (OAL) on February 1, 2006; and the U.S. EPA on March 22, 2006. The Rainbow Creek TMDL became effective on February 1, 2006.
- a. Nitrate and phosphorus concentrations in the Rainbow Creek Watershed exceed the water quality objective for some municipal supply beneficial uses and threaten several additional beneficial uses. Runoff from agriculture, nursery, and residential land uses contribute to increased nitrate and phosphorus in Rainbow Creek as a result of storm water runoff, irrigation return flows, and groundwater contributions to the creek.
 - b. The objectives of the Rainbow Creek TMDL Implementation Plan requires the use of effective management practices and best management practices to reduce the loading of nitrogen and phosphorus to attain numeric targets for total nitrogen (1.0 mg/L) and total phosphorus of (0.1 mg/L). The BPTC measures included in this General Order represent effective management practices limiting nitrogen and phosphorus discharges.
40. The San Diego Regional Water Board adopted Resolution Number R9-2010-0001, *A Resolution Amending the Water Quality Control Plan for the San Diego Basin (9) to Incorporate Revised Total Maximum Daily Loads for Indicator Bacteria, Project I – Twenty Beaches and Creeks in the San Diego Region (including Tecolote Creek)* (Bacteria TMDL) on February 10, 2010. The Bacteria TMDL was approved by the State Water Board on December 14, 2010; OAL on April 4, 2011; and U.S. EPA on June 22, 2011. The Bacteria TMDL became effective on April 4, 2011.
- a. Bacteria in the waters of the beaches and creeks addressed by this TMDL have exceeded numeric water quality objective for total, fecal, and/or enterococci bacteria (collectively referred to as indicator bacteria). Beaches have been posted with health advisories and/or closed threatening and impairing beneficial uses.
 - b. Watersheds with agricultural operations (Lower San Juan hydrologic sub area, San Luis Rey hydrologic unit, San Marcos hydrologic area, and San Dieguito hydrologic unit) are required to reduce their wet weather and dry weather bacteria loading. The objectives of the Bacteria TMDL Implementation Plan

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

requires the use of effective management practices and best management practices to reduce the loading of bacteria containing discharges to achieve the load allocations and waste loads specified in the Bacteria TMDL. The BPTC measures included in this General Order represent effective management practices limiting bacteria-containing discharges.

NON-POINT SOURCE POLICY

41. In May 2004, the State Water Board adopted the *Policy for Implementation and Enforcement of the Nonpoint Source Pollution Control Program* (NPS Policy). The purpose of the NPS Policy is to improve the state's ability to effectively manage nonpoint source pollution, conform to the requirements of the Clean Water Act, and comply with the Federal Coastal Zone Act Reauthorization Amendments of 1990. Polluted runoff from nonpoint sources accounts for more than 76 percent of the water bodies where TMDLs are required.
- a. The NPS Policy requires the Water Boards to regulate all nonpoint sources of pollution, using the administrative permitting authorities provided by the Porter-Cologne Water Quality Control Act. This General Order implements the NPS Policy by requiring BPTC measures for site development, cannabis cultivation, associated activities (e.g., site grading, road building, surface water diversion, etc.) that can contribute to nonpoint source pollution.
 - b. NPS pollution control implementation programs are a mechanism to achieve compliance with Basin Plan requirements. Pollution control implementation programs may be imposed upon a subbasin by the State or Regional Water Board, an individual Discharger, or a coalition of Dischargers. Alternatively, a pollution control implementation program may be developed by an individual Discharger, group of Dischargers, or landowners to address a water quality issue.
 - c. Implementation of the applicable BPTC measures contained in Attachment A will be protective of water quality for most cannabis cultivation activities. However, adherence to the BPTC measures does not assure compliance. The ultimate compliance evaluation is comparison of the effectiveness of BPTC measure implementation to the appropriate Basin Plan requirements. In some cases, the Discharger will have to implement multiple BPTC measures, or increase the density of BPTC measures to achieve water quality protection. In some cases, the activity cannot be performed without unacceptable water quality degradation. In those cases, the Regional Water Board may revoke the authorization under the General Order, require authorization under a site-specific order, or prohibit the activity from occurring.

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

APPLICATION/TERMINATION PROCESS AND FEES

42. The North Coast Regional Water Board and the Central Valley Regional Water Board have authorized discharges related to cannabis cultivation under Orders R1-2015-0023 and R5-2015-0113. The State Water Board intends that regulatory coverage under an existing Regional Water Board general order will be terminated by the applicable Regional Water Board by **July 1, 2019**. All existing Dischargers must apply for coverage under this General Order. (Some existing Dischargers may qualify for conditional exemption from the General Order; some previously exempted activities may need to obtain coverage under the Waiver or enroll under this General Order.) All cannabis cultivation activity that requires discharge authorization as described herein, shall be authorized by this General Order, an appropriate ILRP WDR, a waiver of ILRP WDRs, or by a site-specific order if deemed necessary by the Regional Water Board Executive Officer. All Dischargers enrolled under Orders R1-2015-0023 or R5-2015-0113 as of October 17, 2017 may continue to operate their facility with their existing order's setbacks (grandfathered status) unless the Regional Water Board's Executive Officer determines that the reduced setbacks applicable under those orders are not protective of water quality. Such Dischargers are not required to modify their facilities to comply with this General Order's setback limits. New disturbed areas or expansions to the existing facilities shall comply with the setbacks provided in this General Order.
43. Applicants must comply with the setback and slope limits. A cultivation site is classified as moderate risk if any part of the disturbed area is located on a slope greater than 30 percent. Such Dischargers shall enroll as moderate risk and submit a *Site Erosion and Sediment Control Plan*. (See the plan description in the Provisions section of this General Order.) A cultivation site is classified as high risk if any part of the disturbed area exists within the setback limits. Such Dischargers shall enroll as high risk, submit a *Disturbed Area Stabilization Plan*, and shall address the setback compliance issue as described below. (See the plan description in the Provisions section of this General Order.) Because such Dischargers pose a higher risk to water quality and will require a higher level of Regional Water Board oversight, they are subject to a higher application and annual fee. When the site is reconfigured to comply with the setbacks, the Discharger can request the Regional Water Board to reclassify the site to a lower risk level and allow a lower annual fee to be assessed.
44. Applicants seeking coverage under the Waiver or that are required to enroll are required to pay an application fee as described below. Water Code sections 13260(d)(1)(A) and 13269(a)(4)(A) requires persons subject to waste discharge requirements or a waiver of waste discharge requirements to pay an annual fee according to a fee schedule established by the State Water Board. The application

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

and annual fee schedule is presented in California Code of Regulations, title 23, section 2200 et seq.

- a. Commercial indoor cannabis cultivation activities that occur within a structure with a permanent roof, a permanent relatively impermeable floor (e.g., concrete or asphalt paved), and comply with the Cannabis Policy and all applicable Requirements in Attachment A, and either: 1) discharge all industrial wastewaters generated to a permitted wastewater treatment collection system and facility that accepts cannabis cultivation wastewater; or 2) collect all industrial wastewater in an appropriate storage container to be stored and properly disposed of by a permitted wastewater hauler at a permitted wastewater treatment facility that accepts cannabis cultivation wastewater are required to apply for coverage under the Waiver on-line and pay an application fee.
- b. Indoor cannabis cultivation activities that occur within a structure with a permanent roof, a permanent relatively impermeable floor (e.g., concrete or asphalt paved), but discharge irrigation tailwater or hydroponic wastewater, to an on-site wastewater treatment system (such as a septic tank and leach field or to land) must obtain separate regulatory authorization for the wastewater discharge (e.g., WDRs, conditional waiver of WDRs, or other permit mechanism). Indoor cannabis cultivation with an onsite treatment system are required to apply for coverage under the Waiver on-line and pay an application fee.
- c. Outdoor cannabis cultivation activities that comply with the conditionally exempt conditions described in the Exemptions for Certain Cultivation Activities section of this General Order are required to apply for coverage under the Waiver on-line and pay an application fee. Existing Dischargers (under Orders R1-2015-0023, R5-2015-0113) are required to transition coverage (enroll) under the General Order. Dischargers enrolled under Order R1-2015-0023 or Order R5-2015-0113 are subject to all applicable Attachment A Requirements related to water diversion and instream flow². Transitioning Dischargers are required to apply on-line. They do not pay an application fee; they continue to pay their annual fee as appropriate from the general order fee schedule (the fee may change based on site conditions). Some Dischargers may qualify for, or be required to obtain coverage under an ILRP WDR, ILRP conditional waiver of WDRs, or a site-specific WDRs order. Enrollees directed to those orders shall contact the appropriate Regional Water Board for instructions on application procedures. Such Dischargers shall also comply

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

with the applicable water rights registration process described herein as applicable.

- d. New facilities that are classified as either Tier 1 or Tier 2 are required to enroll under the General Order. New facilities are required to apply on-line and pay an application fee. The application fee serves as the first year's annual fee; Dischargers will be billed on an annual basis. Some existing Dischargers (under Orders R1-2015-0023, R5-2015-0113) may be classified as a Tier 1 or Tier 2 facility.
- e. Tier 1 and 2 sites shall be characterized for risk based on site conditions. Risk is defined as low, moderate, or high. Because moderate and high risk sites will require greater level of regulatory oversight, the fees for those risk levels are higher, reflecting the additional cost to achieve water quality protection. A site can be located on a slope greater than 30 percent and not comply with the setback requirement. In that case, the Discharger shall pay the highest applicable fee.
 - i. Low Risk – Comply with the slope requirements and setbacks. Low risk sites are deemed to be a lower threat to water quality.
 - ii. Moderate Risk – Comply with the setback requirements but exist on slopes greater than 30 percent and less than 50 percent. The higher slopes will require implementation of more BPTC measures, more monitoring of their effectiveness, and more maintenance activities to ensure the BPTC measures are effective.
 - iii. High Risk – Are facilities that have any portion of their disturbed area located within the setback requirements, with the exception of activities authorized under a Clean Water Act section 404 permit, a CDFW LSA Agreement, coverage under the General Order Water Quality Certification, or site-specific WDRs issued by the Regional Water Board, are classified as high risk and will be assessed the high-risk fee until the activities comply with the setback requirements. It is the Discharger's responsibility to notify the Regional Water Board of compliance with the setback requirements to reassess the annual fee.

45. To apply for coverage under this General Order, the Discharger shall submit an application through the Internet as described in the Application Procedure section of this General Order.

- a. The application requires the Discharger to self-certify that all applicable BPTC measures are being implemented, or will be implemented by **the onset of the**

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

winter period, following the enrollment date. Upon submittal of the application, the Discharger will obtain a Notice of Receipt. Applicants that cannot implement all applicable BPTC measures by the onset of the winter period, following their enrollment date, shall submit to the Regional Water Board Executive Officer a *Site Management Plan* that includes a time schedule and scope of work for use by the Regional Water Board in developing a compliance schedule as described in Attachment A. Refer to the definition of winter period in Attachment A for specific dates. The notice of receipt will expire within **30 days** of issuance if the Discharger fails to complete the application by submitting the application fee to the State Water Board. (Dischargers that are currently enrolled in the North Coast Regional Water Board or the Central Valley Regional Water Board orders do not pay an additional fee as described in the Application/Termination Process and Fees section of this General Order.)

- b. Technical reports shall be submitted to the appropriate Regional Water Board via e-mail as described in the notice of receipt and Attachment B monitoring and reporting program (MRP). The MRP is attached hereto and is made part of this General Order by reference. Enrollees may be directed to upload reports via the Internet in the future. See the Provisions section of this General Order for guidance on the report(s) contents.
- c. Upon receipt of an application, fee, and required documentation (e.g., a tribal authorization letter may be required for some applicants). Dischargers will receive documentation for use in obtaining a CDFA cultivation license.
 - i. Conditionally exempt Dischargers will receive a Conditional Waiver of WDRs.
 - ii. Tier 1 or Tier 2 Dischargers will obtain a Notice of Applicability.
 - iii. Enrollees transitioning from an existing Regional Water Board order will receive either a Conditional Waiver of WDRs or a Notice of Applicability depending upon the site characteristics.

46. Dischargers that want to terminate coverage under this General Order shall submit a Notice of Termination (NOT), provided in Attachment C, which is attached hereto and is made part of this General Order by reference. The NOT shall include a *Site Closure Report* (see the plan description in the Provisions section of this General Order) and a final monitoring report. The Regional Water Board reserves the right to inspect the site before approving an NOT.

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

CEQA CONSIDERATIONS

47. This General Order imposes regulatory requirements on existing cannabis cultivation sites and regulates the water related impacts associated with the development of new cannabis cultivation sites.
- a. The adoption of this General Order for existing cannabis cultivation sites is categorically exempt from CEQA pursuant to California Code of Regulations, title 14, section 15301 (ongoing or existing projects).
 - b. Water Code section 13149 required the State Water Board to adopt principles and guidelines addressing water diversion and water quality issues associated with cannabis cultivation. The principles and guidelines contain substantive criteria for enrollment, water quality protection, and protective measures addressing biological and cultural resources. Water Code section 13149 (b)(1) provides that these actions of the State Water Board are deemed to be within California Code of Regulations, title 14, section 15308 (regulatory actions for environmental protection) if stream flow standards are not relaxed. The principles and guidelines described in the Cannabis Policy and as implemented in this General Order do not relax stream flow standards and are therefore exempt from further CEQA evaluation. Adoption of this General Order is a ministerial action under CEQA because it is a requirement of the Cannabis Policy. The General Order contains no substantive requirements that are not already required by the Policy, so there is no possibility that the General Order itself will have any significant effects on the environment.
 - c. Activities performed in aquatic environments require Lake or Streambed Alteration Agreements from the CDFW. Potential impacts to aquatic biological resources are addressed by the CDFW permitting process.
 - d. Activities related to site development in timberland require permits from CAL FIRE. Potential impacts to biological resources and cultural resources are addressed in the CAL FIRE permitting process.

OTHER REGULATORY CONCERNS

48. This Order does not authorize any act that results in the taking of a threatened or endangered species or any act that is now prohibited, or becomes prohibited in the future, under either the California Endangered Species Act (Fish and Game Code sections 2050 to 2097) or the Federal Endangered Species Act (16 U.S.C.A. sections 1531 to 1544). If a take will result from any action authorized under this General Order, the Discharger shall obtain authorization for an incidental take prior to

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

construction or operation of the project. The Discharger shall be responsible for meeting all applicable requirements of the Endangered Species Act.

49. The State Water Board has notified interested agencies and persons of its intent to adopt this General Order for discharges of waste from cannabis cultivation activities within the state and has provided them with an opportunity for a public hearing and an opportunity to submit comments.

50. The State Water Board in a public meeting, heard and considered all comments pertaining to this General Order.

IT IS HEREBY ORDERED that, (1) this General Order shall not take effect unless and until the Cannabis Policy is approved by the Office of Administrative Law (Effective Date), (2) pursuant to Water Code section 13269, the State Water Board waives the requirement to submit a report of waste discharge and obtain waste discharge requirements for indoor commercial cannabis cultivators and outdoor cannabis cultivators that meet all requirements for conditional exemptions described in this General Order. This Waiver shall expire five years after the Effective Date of this General Order, unless terminated or renewed by the State Water Board, and (3) pursuant to Water Code sections 13263 and 13267, the Discharger, its agents, successors, and assigns, in order to meet the provisions contained in Division 7 of the Water Code and regulations adopted hereunder, shall comply with the requirements of this General Order:

A. CANNABIS POLICY REQUIREMENTS

The Discharger shall comply with, and implement, all requirements described in Attachment A of the Cannabis Policy, which is included as Attachment A of this General Order.

B. APPLICATION PROCEDURE

1. All Dischargers, except those that qualify for the personal use exemption and that do not need a water rights registration, shall provide the information requested on-line as described below.
2. To obtain coverage under the Waiver or enroll under this General Order, the Discharger shall:
 - a. Provide the information required in the [on-line application process](https://www.waterboards.ca.gov/cannabis) located at <<https://www.waterboards.ca.gov/cannabis>>.
 - b. Submit the application fee within **30 days** of submitting the on-line application. Failure to submit the application fee within 30 days will result in the application being voided and authorization terminated. Payments shall be identified using the Fee Payment Application Number (found on the Notice of Receipt). All

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

checks or money orders shall be made payable to: "State Water Resources Control Board," and shall be delivered to:

- i. By U.S. Mail:
Accounting Office
Attn: Water Quality Fees – Cannabis General Order
P.O. Box 1888
Sacramento, CA 95812-1888
- ii. In person or by courier delivery:
Accounting Office
Attn: Water Quality Fees – Cannabis General Order
1001 I Street
Sacramento, CA 95814

- c. Provide the technical reports listed in Table 1 on page 34. *Site Management Plan* is due **90 calendar days** after the application is submitted and the Notice of Receipt is issued; the *Site Closure Report* is due **90 days** prior to ending cannabis cultivation activities. When required, the *Site Erosion Sediment Control Plan*, and the *Disturbed Area Stabilization Plan* must be submitted and approved by the Regional Water Board Executive Officer before the Dischargers can initiate activities at the site. See the Provisions section of this General Order for descriptions of the technical report contents.
3. The primary authority for issuing Notices of Applicability (NOAs) is the Regional Water Board Executive Officer. However, NOAs may also be issued by the State Water Board Division of Water Quality Deputy Director or the State Water Board Chief Deputy Director.
 4. Dischargers that want to terminate coverage under this General Order shall submit a Notice of Termination (NOT), provided in Attachment C. The NOT shall include a *Site Closure Report* (see the plan description in the Provisions section of this General Order) and a final monitoring report. The Regional Water Board may inspect the site before approving an NOT.

C. PROVISIONS

1. Technical Report Preparation Requirements. All technical reports shall be submitted to the appropriate Regional Water Board by transmitting the report in portable document format (PDF) to the e-mail address provided in the notice of receipt. Refer to the General Order attachments for guidance on the contents of the reports.

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

- a. **Within 90 days** of the issuance of a Notice of Receipt, all Tier 1 and Tier 2 Dischargers shall submit and implement a *Site Management Plan* that describes how the Discharger is complying with the BPTC measures listed in Attachment A. The description shall describe how the BPTC measure is implemented (e.g., for petroleum fuel storage, specify the specific product or means of compliance). Dischargers that are landowners of the cultivation site in North Coast Regional Water Board jurisdiction are required to submit and implement *Site Management Plans* that describes how the BPTC measures are implemented property-wide, including BPTC measures implemented to address discharges from legacy activities. The *Site Management Plan* may include a schedule to achieve compliance, but all work must be completed by **the onset of winter period each year**. (The due date does not relieve a Discharger from implementing the interim soil stabilization BPTC measures described in Attachment A. Interim measures are those that are implemented immediately upon site development.) Attachment D, which is attached hereto and is made part of this General Order by reference, provides guidance on the contents of the *Site Management Plan*.
- b. Tier 1 or Tier 2 Dischargers classified as moderate risk (any portion of the disturbed area is located on a slope greater than 30 percent, or conditionally exempt Dischargers that do not comply with the conditions that must enroll as Tier 1 or 2, and have any portion of the disturbed area on a slope greater than 30 percent) shall submit a *Site Erosion and Sediment Control Plan* that describes how the Discharger will implement the BPTC measures listed in Attachment A. (Refer to Attachment A, Section 5 Planning and Reporting for a listing of professional registrations or certifications that are qualified to prepare the plan.) Because moderate risk sites are located on steeper slopes, additional BPTC measures, or a higher density of BPTC measures may be appropriate to achieve the goal of minimizing the discharge of sediment off-site. The report shall include an analysis of slope stability. Attachment D of the General Order provides guidance on the contents of the *Site Erosion and Sediment Control Plan*. The Report shall be approved by the Regional Water Board Executive Officer prior to implementation.
- c. Tier 1 or Tier 2 Dischargers classified as high risk (any portion of the disturbed area exists within the setbacks specified in this General Order except as authorized by a CDFW Lake or Streambed Alteration permit, shall submit a *Disturbed Area Stabilization Plan* that shall describe how compliance with the setbacks will be achieved. (Refer to Attachment A, Section 5 Planning and Reporting for a listing of professional registrations or certifications that are qualified to prepare the Plan.) If the Discharger will not be able to achieve

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

compliance by the onset of the next winter period (stabilization work will continue into the winter period or will continue the following year), the Discharger must include a time schedule and scope of work for approval by the Regional Water Board Executive Officer and use in preparing an enforcement order. Attachment D of the General Order provides guidance on the contents of the *Disturbed Area Stabilization Plan*. The Report shall be approved by the Regional Water Board Executive Officer prior to implementation.

- d. **Within 90 days** of the issuance of a notice of receipt, all Tier 2 Dischargers with a cannabis cultivation area, or aggregate of cultivation areas, greater than one acre shall submit a *Nitrogen Management Plan* (NMP) for the facility. The NMP shall calculate all the nitrogen applied to the cannabis cultivation area (dissolved in irrigation water, originating in soil amendments, and applied fertilizers) and describe procedures to limit excessive fertilizer application. Attachment D of the General Order provides guidance on the contents of a *Nitrogen Management Plan*.
- e. At least **90 days prior to ending cannabis cultivation** at a site, a conditionally exempt, Tier 1, or Tier 2 Discharger shall submit a *Site Closure Report* that describes how the site will be decommissioned to prevent waste constituents, sediment, and/or turbidity discharges that degrade water quality. If construction activities are proposed in the *Site Closure Report*, a project implementation schedule shall be included in the report. The *Site Closure Report* shall also include a final MRP report. Attachment D of the General Order provides guidance on the contents of the *Site Closure Report*.

2. Standard Provisions for All Dischargers

- a. The requirements prescribed herein do not authorize the commission of any act causing damage to the property of another, or protect the Discharger from liabilities under federal, state, or local laws. This General Order does not convey any property rights or exclusive privileges and does not create a vested right to continue cannabis cultivation or discharge of wastewater.
- b. This General Order does not relieve the Discharger from responsibility to obtain other necessary local, state, or federal permits, nor does the General Order prevent imposition of additional standards, requirements, or conditions by any other agency.

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

- c. The requirements of this General Order are severable. If any provision of this General Order is held invalid, the remainder of this General Order shall not be affected.
- d. The Discharger shall ensure that all site operating personnel are familiar with the contents of the General Order. A copy of this General Order and technical reports required by this General Order shall be kept at the cultivation site. Maintenance of electronic copies of the documents, that can immediately be viewed, is acceptable.
- e. Consistent with the Business and Professions Code, the Forest Practice Act, and other state laws, certain technical report preparation, design calculations, and report preparation must be prepared under the supervision of a California licensed civil engineer, professional forester, or professional geologist. This General Order also contains requirements related to storm water documents. (Refer to the Planning and Reporting section of Attachment A for a listing of professional registrations or certifications that are qualified to prepare the plan.) In addition, contractors employed to implement the BPTC measures must comply with the specific requirements contained in the Forest Practice Act and the general requirements requiring licensing by the California Contractors' State License Board.
- f. The Discharger shall comply with all of the terms and conditions of this General Order. Any noncompliance with this General Order constitutes a violation of the Porter-Cologne Water Quality Control Act and/or applicable Regional Water Board's Basin Plan and may be grounds for an enforcement action.
- g. The State Water Board will review this General Order periodically and will revise requirements when necessary.
- h. The Regional Water Board Executive Officer or State Water Board Division of Water Quality Deputy Director or the State Water Board Chief Deputy Director may terminate a Discharger's coverage under this General Order for cause including, but not limited to, any of the following:
 - i. Violation of any of the terms or conditions contained in this General Order.
 - ii. Obtaining this General Order by misrepresentation, or failure to disclose fully all relevant facts.

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

- iii. A change in any condition that results in either a temporary or permanent need to reduce or eliminate the authorized discharge activities.
 - iv. A material change in the activity, character, location, or volume of discharge.
 - v. Adoption of a TMDL amendment, new TMDL, or TMDL alternative.
- i. Before making a material change in the activity, character, location, or volume of discharge, the Discharger shall notify the Regional Water Board Executive Officer. The Regional Water Board Executive Officer may require resubmittal of application information, technical reports, or certifications. If the authorization was issued by the State Water Board Division of Water Quality Deputy Director or the State Water Board Chief Deputy Director, those individuals may also require that actions described in this standard provision. A material change includes, but is not limited to, any of the following:
- i. An increase in cultivation area (indoor or outdoor) beyond that specified in the application.
 - ii. A significant change in the operational activities that have the potential to increase or create a discharge to waters of the state (e.g., new greenhouses, change in wastewater disposal method, or new activity such as cannabis manufacturing).
- j. Except for material determined to be confidential in accordance with California law, all reports prepared in accordance with terms of this General Order shall be available for public inspection at the offices of the Regional Water Board. Data on waste discharges, water quality, geology, and hydrogeology are not confidential.
- k. The Discharger shall take all reasonable steps to minimize any adverse impact to waters of the state resulting from noncompliance with this General Order. Such steps may include accelerated or additional monitoring as necessary to determine the nature and impact of the noncompliance.
- l. The Discharger shall maintain in good working order and operate as efficiently as possible any facility, control system, water storage, or monitoring device installed to achieve compliance with this General Order.
- m. The Discharger shall permit representatives of the Regional Water Board and/or the State Water Board, upon presentation of credentials, to:

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

- i. Enter premises where cannabis is cultivated or processed, wastes are treated, or disposed of, and facilities in which any records are kept.
 - ii. Copy any records required under terms and conditions of this General Order.
 - iii. Inspect at reasonable hours, monitoring equipment required by this General Order.
 - iv. Sample, photograph, and/or video record any cultivation activity, discharge, waste material, waste treatment system, or monitoring device.
- n. For any electrically operated equipment at the site, the failure of which would cause loss of control or containment of waste materials or violation of this General Order, the Discharger shall employ safeguards to prevent loss of control over wastes. Such safeguards may include alternate power sources, standby generators, retention capacity, operating procedures, or other means.
- o. The fact that it would have been necessary to halt or reduce the permitted discharge activity to maintain compliance with this General Order shall not be a defense for the Discharger's violations of the General Order.
- p. Any of the following changes must immediately be reported to the Regional Water Board Executive Officer:
- i. A change in ownership of the parcel where the cultivation activities take place. The Discharger or owner must notify the succeeding owner of the existence of this General Order by letter, a copy of which shall immediately be forwarded to the Regional Water Board's Executive Officer.
 - ii. A change of the permitted facility operator. The Discharger must notify the succeeding operator of the existence of this General Order by letter, a copy of which shall immediately be forwarded to the Regional Water Board's Executive Officer.
 - iii. A change in a third-party representative. The Discharger shall notify the owner of the change by letter, a copy of which shall immediately be forwarded to the Regional Water Board's Executive Officer.
- q. Dischargers that are covered by the Waiver or enrolled under this General Order shall pay an application fee and an annual fee to the State Water Board in accordance with the fee schedule for each fiscal year. (Cal. Code Regs.

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

tit. 23, §2200.) Fees are based on tier and risk designations and are subject to revision by the State Water Board. Annual invoices are issued by the State Water Board for the state fiscal year (July 1 to June 30).

3. General Reporting Requirements

- a. If the Discharger cannot comply with the General Order, or will be unable to implement an applicable BPTC measure contained in Attachment A by **the onset of winter period each year**, the Discharger shall notify the Regional Water Board staff by telephone so that a site-specific compliance schedule can be developed. Notification shall occur as soon as the Discharger or its agents have knowledge of such noncompliance or potential for noncompliance. The written notification shall state the date, time, nature, cause of noncompliance, immediate response action, and a schedule for corrective actions. Current phone numbers for [Regional Water Board Offices](#) may be found on the Internet at:
<http://www.waterboards.ca.gov/about_us/contact_us/rwqcbcs_directory.shtml>.
- b. All reports submitted in response to this General Order, including monitoring reports, shall be signed by a person identified below:
 - i. For individuals at a private residence: by the property owner of the residence.
 - ii. For a corporation: by a principal executive officer of at least the level of senior vice-president.
 - iii. For a partnership or sole proprietorship: by a general partner or the proprietor.
 - iv. For a municipality, state, federal, or other public agency: by either a principal executive officer or ranking elected or appointed official.
 - v. A duly authorized representative of a person described above if all of the following are completed:
 1. The authorization is made in writing by a person describe above.
 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 site manager, superintendent, or position of equivalent responsibility. (A duly

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

authorized representative may thus be either a named individual or any individual occupying a named position).

3. The written authorization is submitted to the Regional Water Board.
- c. Any person signing a document under this section shall make the following certification:
 - i. "I certify under penalty of law that I have personally examined and am familiar with the information submitted in this document and all attachments and that, based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment."
 - d. The Discharger shall mail a copy of each monitoring report and any other reports required by this General Order to the appropriate Regional Water Board or provide electronic submittals of reports or data as specified by the Regional Water Board. [Contact and mail address](http://www.waterboards.ca.gov/about_us/contact_us/rwqcbcs_directory.shtml) information is available at: <http://www.waterboards.ca.gov/about_us/contact_us/rwqcbcs_directory.shtml>.
 - e. When the Discharger becomes aware that it failed to submit any relevant facts in an application or technical report to the Regional Water Board, it shall promptly submit such facts or information.

4. Monitoring Requirements

- a. Dischargers enrolled under Tier 1 or Tier 2 classifications shall comply with the attached MRP and any future revisions as specified by the appropriate Regional Water Board Executive Officer or State Water Board's Executive Director. An Executive Officer, State Water Board Division of Water Quality Deputy Director, or the State Water Board Chief Deputy Director may modify or replace the MRP for site specific conditions when deemed necessary.
- b. Unless otherwise approved by the Regional Water Board Executive Officer, all analyses shall be conducted at a laboratory certified for the analyses by the State Water Board's Division of Drinking Water Environmental Laboratory Accreditation Program. Field tests, such as tests for color, odor, turbidity, pH, temperature, dissolved oxygen, conductivity, and disinfectant residual are not subject to this requirement and will be accepted provided an acceptable

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

Quality Assurance/ Quality Control Program is instituted by the laboratory. A manual containing the steps followed in the program must be available in the laboratory and shall be available for inspection by Regional Water Board or State Water Board staff. The Quality Assurance/ Quality Control Program must conform to U.S. EPA guidelines or to procedures approved by the Regional Water Board or State Water Board.

- c. The results of any monitoring done more frequently than required in the MRP shall be reported in the next regularly scheduled monitoring report. Values obtained through additional monitoring shall be used in calculations as appropriate.
 - d. The Discharger shall furnish within a reasonable time any information the Regional Water Board or State Water Board staff may request to determine whether cause exists for modifying, revoking, reissuing, or terminating the Discharger's coverage under this General Order. The Discharger shall also furnish copies of records required to be kept by this General Order upon request. Providing electronic copies of the documents is acceptable.
 - e. The Discharger shall retain records of all monitoring information, including copies of all reports required by this General Order and records of all data used to complete the application for this General Order. Records shall be maintained for a minimum of **three years** from the date of the report or application. Records may be maintained electronically. This period may be extended during the course of any unresolved litigation regarding this discharge or when requested by the Regional Water Board Executive Officer.
 - f. All monitoring and analysis instruments and devices used by the Discharger to fulfill the prescribed MRP shall be properly maintained and calibrated as recommended by the manufacturer to ensure their continued accuracy.
 - g. Monitoring and measurements taken for the purpose of monitoring shall be representative of the monitored activity.
5. Notice of Termination (NOT)
- a. If a Discharger wishes to terminate coverage, the Discharger shall submit a Notice of Termination (NOT) form (Attachment C) to the appropriate Regional Water Board. A new landowner and/or Discharger must obtain authorization under this General Order or the activity is subject to enforcement activity.
 - b. The General Order coverage is not terminated until the NOT is approved by the Regional Water Board. Until the NOT is approved, the Discharger is

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

responsible for any permit fees associated with General Order enrollment. Regional Water Boards may elect to conduct an inspection of the facilities prior to terminating coverage.

- c. Dischargers and/or landowners remain responsible for any water quality degradation that results from cultivation related activities whether coverage under this General Order has been terminated or not.

Note the following information relating to Table 1 on page 34:

1. Refer to the Provisions section of this General Order for the technical report content requirements.
2. Some conditionally exempt facilities (including personal use exemption) may have to enroll as a Tier 1 or Tier 2 site if it no longer meets the exemption criteria. If so, the (formerly) conditionally exempt facilities shall submit the technical reports and monitoring reports associated with their tier status.
3. A *Site Closure Report* is required prior to ending cannabis cultivation at a site. Also refer to the Notice of Termination (Attachment C.)
4. A *Site Erosion Sediment Control Plan* is required when any portion of the disturbed area is located on a slope greater than 30 percent.
5. A *Disturbed Area Stabilization Plan* is required when any portion of the disturbed area, including areas disturbed upon initial site development, are located within the Disturbed Area Setbacks presented in Attachment A. Access roads and water crossings designed, constructed, and maintained consistent with the Road Handbook and Attachment A, are not considered disturbed areas.
6. A *Nitrogen Management Plan* is required when the cultivation area, or aggregate of cultivation areas, exceeds one acre.

STATE WATER RESOURCES CONTROL BOARD
 ORDER WQ 2019-0001-DWQ
 GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
 ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

Table 1: Technical Report Requirements by Tier

Tier	Risk Level	Technical Reports
Conditionally Exempt	N/A	Site Closure Report
Tier 1	All	Site Management Plan
Tier 1	Moderate	Site Erosion Sediment Control Plan
Tier 1	High	Disturbed Area Stabilization Plan
Tier 1	All	Site Closure Report
Tier 2	All	Site Management Plan
Tier 2	Moderate	Site Erosion Sediment Control Plan
Tier 2	High	Disturbed Area Stabilization Plan
Tier 2	All	Nitrogen Management Plan
Tier 2	All	Site Closure Report

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

CERTIFICATION

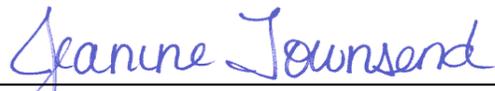
I, Jeanine Townsend, Clerk to the Board, do hereby certify that this General Order with all attachments is a full, true, and correct copy of a General Order adopted by the State Water Board, on February 5, 2019.

AYE: Chair Felicia Marcus
Board Member Dorene D'Adamo
Board Member E. Joaquin Esquivel
Board Member Sean Maguire

NAY: None

ABSENT: Board Member Tam M. Doduc

ABSTAIN: None



Jeanine Townsend
Clerk to the Board

Attachments:

- Attachment A. Cannabis Policy Attachment A: Requirements for Cannabis Cultivation
- Attachment B. Monitoring and Reporting Program
- Attachment C. Notice of Termination
- Attachment D. Technical Report Guidance

STATE WATER RESOURCES CONTROL BOARD
ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

¹ City of Littleton – City of Englewood Pretreatment Pipeline. Third Quarter 2011. “Medical Marijuana – an Exploding New Industry.” <<http://www.lewwtp.org/home/showdocument?id=5674>>. Accessed 17 January 2017.

² At a minimum, applicable Attachment A Requirements include: Section 1 – General Requirements and Prohibitions (Numbers 4, 15, 17, 24, 26, and 36); Section 2 – Requirements Related to Water Diversions and Waste Discharge for Cannabis Cultivation (Numbers 23, 63, 64, 66, 69 through 92, 94, and 96 through 101); Section 3 – Numeric and Narrative Instream Flow Requirements (Including Gaging) (Narrative Instream Flow Requirements 1 – 7 and Gage Installation, Maintenance, and Operation Requirements); and Section 4 – Watershed Compliance Gage Assignments (All).

State Water Resources Control Board

Cannabis Cultivation Policy

ATTACHMENT A

Definitions and Requirements for Cannabis Cultivation

**As Adopted by the State Water Board on
February 5, 2019**

**As Approved by Office of Administrative Law on
April 16, 2019**

Table of Contents

OVERVIEW	3
Definitions	3
SECTION 1 – GENERAL REQUIREMENTS AND PROHIBITIONS	16
General Requirements and Prohibitions	16
Cannabis General Water Quality Certification.....	31
SECTION 2 – REQUIREMENTS RELATED TO WATER DIVERSIONS AND WASTE DISCHARGE FOR CANNABIS CULTIVATION.....	33
Land Development and Maintenance, Erosion Control, and Drainage Features	33
Limitations on Earthmoving.....	33
Construction Equipment Use and Limitations.....	34
Erosion Control	34
Access Road/Land Development and Drainage.....	36
Drainage Culverts (See also Watercourse Crossings).....	38
Cleanup, Restoration, and Mitigation.....	38
Stream Crossing Installation and Maintenance.....	39
Limitations on Work in Watercourses and Permanently Poned Areas	39
Temporary Watercourse Diversion and Dewatering: All Live Watercourses	40
Watercourse Crossings.....	41
Soil Disposal and Spoils Management.....	42
Riparian and Wetland Protection and Management.....	43
Water Storage and Use	43
Water Supply, Diversion, and Storage	43
Water Conservation and Use	51
Irrigation Runoff	51
Fertilizers, Pesticides, and Petroleum Products.....	52
Fertilizers and Soils.....	53
Pesticides and Herbicides.....	54
Petroleum Products and Other Chemicals	54
Cultivation-Related Waste	55
Refuse and Domestic Waste	56
Winterization.....	56
SECTION 3 – NUMERIC AND NARRATIVE INSTREAM FLOW REQUIREMENTS (INCLUDING GAGING)	58
Narrative Instream Flow Requirements.....	58
Instream Flow Requirements for Surface Water Diversions	58

Requirements for Groundwater Diversions and Springs Qualifying for an Exemption under Narrative Instream Flow Requirement 3 (Exempt Springs).....	61
Gage Installation, Maintenance, and Operation Requirements	61
SECTION 4 – WATERSHED COMPLIANCE GAGE ASSIGNMENTS	63
Watershed Compliance Gage Assignments	63
SECTION 5 – PLANNING AND REPORTING.....	64
Technical Report Preparation Requirements for Cannabis Cultivation General Order	64
Site Management Plan.....	65
Site Erosion and Sediment Control Plan	65
Disturbed Area Stabilization Plan.....	66
Nitrogen Management Plan	66
Site Closure Report.....	67
SECTION 6 – USEFUL GUIDANCE DOCUMENTS.....	68

OVERVIEW

This Attachment A contains diversion and discharge Requirements for cannabis cultivation activities. The cannabis cultivator shall comply with all Requirements in this Policy, and applicable federal, state, and local laws, regulations, and permitting requirements. In the event of duplicate or conflicting requirements, the most stringent requirements shall apply. There are five main categories of cannabis cultivation Requirements to protect water quality and instream flows, which are organized in the first five sections of Attachment A. Attachment A is organized in the following sections:

- Section 1. General Requirements and Prohibitions, and General Water Quality Certification for Cannabis Cultivation Activities
- Section 2. Requirements Related to Water Diversions and Waste Discharge for Cannabis Cultivation
- Section 3. Numeric and Narrative Instream Flow Requirements (including Gaging)
- Section 4. Watershed Compliance Gage Assignments
- Section 5. Planning and Reporting
- Section 6. Useful Guidance Documents

Definitions

The following are definitions of terms used in the Policy, Attachment A, Staff Report, and Cannabis Cultivation General Order.

No.	DEFINITION
1.	Access Road – A road, other than a completely paved road regularly maintained by a governmental entity, that provides access to one or more cannabis cultivation areas.
2.	Agronomic Rate – The rate of application of irrigation water and nutrients to plants necessary to satisfy the plants' evapotranspiration requirements and growth needs and minimize the movement of nutrients below the plants root zone. The agronomic rate considers allowances for supplemental water (e.g., effective precipitation), irrigation distribution uniformity, nutrients present in irrigation water, leaching requirement, and plant available nitrogen.
3.	Anadromy (adj. form: anadromous) — Migration of fish, as adults or subadults, from salt water to fresh.
4.	Aquatic Base Flow — The set of chemical, physical, and biological instream flow conditions that represent limiting conditions for aquatic life in stream environments. The aquatic base flow is determined using defined scientific methodology that equates the aquatic ecosystem health with the flow in the stream, calculated by applying the New England Aquatic Base Flow Standard.

No.	DEFINITION
6.	Aquatic non-fish vertebrate — Include, but are not limited to: aquatic mammals, such as beavers, river otters, and muskrats; amphibians, such as frogs and salamanders; and aquatic reptiles, such as snakes and turtles.
7.	Average, also called mean — The sum of measured values divided by the number of samples.
8.	California Native American tribe – As defined in section 21073 of the Public Resources Code: a Native American tribe located in California that is on the contact list maintained by the Native American Heritage Commission for the purposes of Chapter 905 of the Statutes of 2004.
9.	Cannabis Cultivation – Any activity involving or necessary for the planting, growing, pruning, harvesting, drying, curing, or trimming of cannabis. This term includes, but is not limited to: (1) water diversions for cannabis cultivation, and (2) activities that prepare or develop a cannabis cultivation site or otherwise support cannabis cultivation and which discharge or threaten to discharge waste to waters of the state.
10.	<p>Cannabis Cultivation Area – is defined by the following:</p> <ul style="list-style-type: none"> a) For in-ground plants, the cultivation area is defined by the perimeter of the area planted, including any immediately adjacent surrounding access pathways. b) For plants grown outdoors in containers (e.g., pots, grow bags, etc.) the cultivation area is defined by the perimeter of the area that contains the containers, including any immediately adjacent surrounding access pathways. The area is not limited to the sum of the area of each individual container. c) For plants grown indoors, that do not qualify for the conditional exemption under the Cannabis Cultivation General Order, the cultivation area is defined by the entire area contained in the structure where cultivation occurs, excluding any area used solely for activities that are not cultivation activities (e.g., office space). Areas used for storage of materials, equipment, or items related to cannabis cultivation shall be included in the cultivation area calculation.
11.	Cannabis Cultivation Site – A location where cannabis is planted, grown, pruned, harvested, dried, cured, graded, or trimmed, or where any combination of these activities occurs.

No.	DEFINITION
12.	Cannabis Cultivator – Any person or entity engaged in cultivating cannabis who diverts water (i.e., diverter) or discharges or threatens to discharge waste (i.e., discharger). This term includes business entities; employees; contractors; landowners; cultivators; lessees; and tenants of private land where cannabis is cultivated and of lands that are modified or maintained to facilitate cannabis cultivation.
13.	Cannabis Canopy Area (Canopy Area) – The anticipated canopy acreage at plant maturity.
14.	Cesspool — An excavation in the ground receiving domestic wastewater, designed to retain organic matter and solids, while allowing the liquids to seep into the soil. Cesspools do not have a septic tank providing primary treatment of wastewater prior to discharge. A cesspool is distinguished from an outhouse, pit-privy, or pit-toilet because liquid wastewater (e.g., from toilet flushing, shower, or kitchen sources) is discharged to a cesspool.
15.	Channel maintenance flows — Peak streamflows needed for maintaining stream channel geometry, gravel and woody debris movement, and the natural flow variability needed for protection of various habitat needs of anadromous salmonids.
16.	Channel thalweg — The line connecting the lowest or deepest points along a stream channel.
17.	Coarse sediment — Particle sizes of ¼ inch or larger, including particles derived from debris flows, that either contribute directly to spawning gravel, or that reduce to a smaller usable size, or influence stream channel morphology by forming a substrate framework.
18.	Construction Storm Water Program – Refers to implementation of Water Quality Order 2009-0009-DWQ and National Pollutant Discharge Elimination System No. CAS000002, as amended by Order No. 2010-0014-DWQ, Order No. 2012-0006-DWQ, and amendments thereto. Activities located in the Lake Tahoe Hydrologic Unit shall comply with the National Pollutant Discharge Elimination System No. CAG616002, Order No. R6T-2016-0010 and amendments thereto. Cannabis cultivators whose activities disturb one or more acres of soil or whose projects disturb less than one acre, but are part of a larger common plan of development that in total disturbs one or more acres may need to obtain coverage under the Construction Storm Water Program. Contact the appropriate Regional Water Board Storm Water Program for a determination of the need for storm water permitting.
19.	Day – is the mean solar day of 24 hours beginning at midnight (12:00 am). All references to day in this Policy and the Cannabis Cultivation General Order are calendar days.
20.	Deep percolation — Infiltration of water through soil when storm water or excess irrigation water is applied and percolates below the plant root zone.

No.	DEFINITION
21.	Discharger – any person or entity engaged in developing land for cannabis cultivation, providing access to adjacent properties for cultivation activities, or engaged in the legal cultivation of cannabis that discharges or threatens to discharge waste.
22.	Disturbed Area – see Land Disturbance
23.	Disturbed Land – see Land Disturbance
24.	Diversion — Taking water, by gravity or pumping, from a surface stream or groundwater, into a canal, pipeline, or other conduit, including impoundment of water in a reservoir.
25.	Diverter – Any person or entity that diverts water from waters of the state, including surface waterbodies and groundwater.
26.	Dredged material — Any material that is excavated or dredged from a waterbody. This includes but is not limited to “dredged material” as defined at title 33, section 323.2, subdivision (c) of the Code of Federal Regulations.
27.	Ecological functions and values (of riparian habitat) — Functions are onsite and offsite natural riparian habitat processes. Values are the importance of the riparian habitat to society in terms of health and safety; historical or cultural significance; ecological characteristics, education, research, or scientific significance; aesthetic significance; economic significance; or other reasons.
28.	Ephemeral watercourse — See <i>Watercourse</i> definitions.
29.	Exceedance probability — The probability that a specified streamflow magnitude will be exceeded. The exceedance probability is equal to one divided by the recurrence interval.
30.	Face value —The maximum amount of water that is authorized to be diverted under a water right permit, license, registration, or livestock stockpond certificate, and the maximum amount of water claimed under a statement of water diversion and use.
31.	Face value demand — The sum of the face values of all water rights above an identified location in a stream channel.
32.	Fill material — Material placed into a waterbody that has the effect of either replacing any portion of the water with dry land or changing the bottom elevation of the waterbody. This includes, but is not limited to “fill material” as defined at title 33, section 323.2, subdivision (e) of the Code of Federal Regulations.
33.	Fish – Wild fish, mollusks, crustaceans, invertebrates, or amphibians, including any part, spawn, or ova thereof (California Fish and Code section 45). For the purposes of stream classification, fish are defined as finfish.

No.	DEFINITION
34.	Flow frequency analysis — A statistical technique used by hydrologists for estimating the average rate at which floods, droughts, storms, rainfall events, etc., of a specified magnitude recur.
35.	Flow path — The direction water flows along its stream course from the point of diversion to the Pacific Ocean. If a project will have a <i>de minimis</i> effect on flows in a flow-regulated mainstem river, then the flow path may terminate at the flow-regulated mainstem river.
36.	Flow-regulated mainstem river — A river or stream in which scheduled releases from storage are made to meet minimum instream flow requirements established by a State Water Board Order or Decision.
37.	Forbearance Period —The calendar days or otherwise defined conditions during which no water may be diverted. See also <i>Surface Water Diversion Period</i> .
38.	Habitat suitability criteria — Structural and hydraulic characteristics of a stream that are indicators of habitat suitability for different fish species and life stages.
39.	Hazardous material — Any item or agent (biological, chemical, radiological, and/or physical), which has the potential to cause harm to humans, animals, or the environment, either by itself or through interaction with other factors.
40.	Heavy equipment — Large pieces of machinery or vehicles, especially those used in the building and construction industry (e.g., bulldozers, excavators, backhoes, bobcats, or tractors).
41.	Hydraulic conductivity — The capacity of a porous medium to transmit water. The rate at which fluid can move through a permeable medium depends on the properties of the fluid (viscosity and specific weight) and properties of the medium (intrinsic permeability). Hydraulic conductivity is generally measured in units of feet/day or centimeters/second.
42.	Hydrograph — A graph showing the rate of flow versus time past a specific point in a river, or other channel or conduit carrying flow; generally measured in units of cubic meters or cubic feet/second.
43.	Hyporheic — Denoting an area or ecosystem beneath the bed of a river or stream that is saturated with water and that supports invertebrate fauna which play a role in the larger ecosystem.
44.	Impervious surface — A permanent improvement affixed to the earth which does not allow water or liquid to pass through it or permeate into the earth. Impervious surface includes a house or primary structure, driveway, parking lot, walkways, sidewalks, patios, decks, green houses, accessory structure(s), and other hardscape.

No.	DEFINITION
45.	<p>Industrial wastewater — Any non-domestic liquid from any producing, manufacturing, processing, or operation of a commercial, industrial, or institutional establishment of whatever nature. Industrial wastewater differs from domestic wastewater or municipal wastewater (also called sewage). Industrial wastewater is a by-product of industrial or commercial activities.</p>
46.	<p>Instream cover — Areas of shelter in a stream channel that provide aquatic organisms protection from predators or competitors and/or a place in which to rest and conserve energy due to a reduction in the force of the current.</p>
47.	<p>Integrated Pest Management (IPM) — An ecosystem-based strategy that focuses on long-term prevention of pests or their damage through a combination of techniques such as biological control, habitat manipulation, modification of cultural practices, and use of resistant varieties. Pesticides are used only after monitoring indicates they are needed according to established guidelines, and treatments are made with the goal of removing only the target organism. Pest control materials are selected and applied in a manner that minimizes risks to human health, beneficial and non-target organisms, and the environment.</p>
48.	<p>Intermittent watercourse — see <i>Watercourse</i> definitions.</p>
49.	<p>Invasive Species — Organisms (plants, animals, or microbes) that are not native to an environment and that, once introduced, establish, quickly reproduce and spread, and cause harm to the environment, economy, or human health. For guidance on decontamination methods and species of concern, see CDFW’s invasive species webpage: https://www.wildlife.ca.gov/Conservation/Invasives.</p>
50.	<p>Lake and Streambed Alteration Agreement — Fish and Game Code section 1602 requires an entity to notify CDFW prior to commencing any activity that may do one or more of the following:</p> <ul style="list-style-type: none"> • Substantially divert or obstruct the natural flow of any river, stream or lake; • Substantially change or use any material from the bed, channel or bank of any river, stream, or lake; or • Deposit debris, waste or other materials that could pass into any river, stream or lake. <p>“Any river, stream or lake” includes those that are episodic (they are dry for periods of time) as well as those that are perennial (they flow year-round). This includes ephemeral streams, desert washes, and watercourses with a subsurface flow. It may also apply to work undertaken within the flood plain of a body of water.</p>

No.	DEFINITION
51.	<p>Land Disturbance – Land areas where natural conditions have been modified in a way that may result in an increase in turbidity in water discharged from the site. Disturbed land includes areas where natural plant growth has been removed whether by physical, animal, or chemical means, or natural grade has been modified for any purpose. Land disturbance includes all activities whatsoever associated with developing or modifying land for cannabis cultivation related activities or access. Land disturbance activities include, but are not limited to, construction of roads, buildings, water storage areas; excavation, grading, and site clearing. Disturbed land includes cultivation areas, storage areas where soil or soil amendments (e.g., potting soil, compost, or biosolids) are located.</p> <p>Access roads that are designed, constructed, and maintained, or are reconstructed consistent with the Handbook for Forest, Ranch, and Rural Roads (Road Handbook), and that implement the interim and long-term erosion prevention and soil stabilization measures contained in Attachment A, are not considered disturbed areas for the purpose of tier determination under the Cannabis Cultivation General Order.</p>
52.	<p>Landowner – Any person or entity who owns, in whole or in part, the parcel of land on which cannabis cultivation is occurring or will occur. A landowner need not be a cannabis cultivator.</p>
53.	<p>Laterals (in the context of irrigation water lines) — Pipes between the control valve and the sprinkler heads or irrigation emitters.</p>
54.	<p>Legacy conditions – are sites of historical activity, which may not be related to cannabis cultivation activities that may discharge sediment or other waste constituents to waters of the state. Legacy conditions are caused or affected by human activity. Implementation of corrective actions can reduce or eliminate the waste discharge.</p>
55.	<p>Licensed Contractor - In California, anyone who contracts to perform work that is valued at \$500 or more in combined labor and material costs must hold a current, valid license from the California Contractors' State License Board. Licensed contractors are classified as general engineering, general building, or specialty contractors.</p> <ul style="list-style-type: none"> • General engineering ("A" contractors) principally work with fixed works that require specialized engineering knowledge and skill. A general engineering contractor may perform the work or hire specialty contractors for specific tasks. • General building ("B" contractors) work on existing or new structures that require at least two unrelated types of work. In some cases, a general building contractor can perform the work, but often must hire subcontractors with specialty licenses. • Specialty contractors ("C" contractors) are those who specialize in a particular skill or trade. Specialty or subcontractors usually are hired to perform a single task. <p>Because there is significant overlap between specialty contractor skills, more than one specialty contractor may be licensed to contract for a project.</p>

No.	DEFINITION
56.	Licensed Timber Operators (LTOs) — Persons who have been licensed under the Forest Practice Act and are authorized to conduct forest tree cutting and removal operations.
57.	Local Environmental Health Department — The local environmental health department, as determined by entering the address of a cannabis cultivation site into the following website directory: http://cersapps.calepa.ca.gov/public/directory .
58.	Mainlines (in the context of irrigation water lines) — Pipes that run from the water source to the control valves.
59.	Maximum cumulative diversion rate — The sum of the rates of diversion of all diversions upstream of a specific location in the watershed.
60.	Mean, also called average — The sum of measured values divided by the number of samples.
61.	Minimum bypass flow — In the context of a diversion Requirement, it is the minimum instantaneous flow rate of water that must be moving past the point of diversion before water may be diverted.
62.	Natural monthly streamflows — Modeled monthly streamflows that are unaffected by land use or water management.
63.	Offset well — A well drilled at an offset distance from a river or stream that is considered pumping from the underflow of the river or stream.
64.	Perennial watercourse — See <i>Watercourse</i> definitions.
65.	Period of record — The time period for which flow measurements have been recorded. The period of record may be continuous or interrupted by intervals during which no data were collected.
66.	Permeability — The property of a porous rock or soil for transmitting a fluid. It measures the relative ease of flow under unequal pressure. See <i>hydraulic conductivity</i> .
67.	<p>Pesticide — Pesticide is defined as follows:</p> <ul style="list-style-type: none"> - Per California Code of Regulations Title 3. Division 6. Section 6000: <ul style="list-style-type: none"> (a) Any substance or mixture of substances that is a pesticide as defined in the Food and Agricultural Code and includes mixtures and dilutions of pesticides; (b) As the term is used in Section 12995 of the California Food and Agricultural Code, includes any substance or product that the user intends to be used for the pesticidal purposes specified in Sections 12753 and 12758 of the Food and Agricultural Code.

No.	DEFINITION
	<p>- Per California Food and Agricultural Code section 12753(b), the term “Pesticide” includes any of the following: Any substance, or mixture of substances, which is intended to be used for defoliating plants, regulating plant growth, or for preventing, destroying, repelling, or mitigating any pest, as defined in Section 12754.5, which may infest or be detrimental to vegetation, man, animals, or households, or be present in any agricultural or nonagricultural environment whatsoever.</p> <p>- In laymen’s terms, “pesticide” includes: rodenticides, herbicides, insecticides, fungicides, and disinfectants.</p>
68.	<p>Point of Diversion — A location at which water is withdrawn from a surface waterbody.</p>
69.	<p>Pool — A deeper area of water in a stream channel; usually quiet and often with no visible flow.</p>
70.	<p>Professional Archeologist — An archeologist that is qualified by the Secretary of Interior, Register of Professional Archaeologists, or Society for California Archaeology.</p>
71.	<p>Qualified Biologist – an individual who possesses, at a minimum, a bachelor’s or advanced degree, from an accredited university, with a major in biology, zoology, wildlife biology, natural resources science, or a closely related scientific discipline, at least two years of field experience in the biology and natural history of local plant, fish, and wildlife resources present at the cannabis cultivation site, and knowledge of state and federal laws regarding the protection of sensitive and endangered species.</p>
72.	<p>Qualified Professional – Qualified Professional means:</p> <ol style="list-style-type: none"> 1. individuals licensed in California under the Professional Engineer Act (e.g., Professional Engineer), Geologist and Geophysicist Act (e.g., Professional Geologist, Certified Engineering Geologist, or Certified Hydrogeologist), and Professional Land Surveyors’ Act (e.g., Professional Land Surveyor)¹, 2. a California Registered Professional Forester (RPF), and 3. a Qualified Storm Water Pollution Prevention Plan (SWPPP) Developer (QSD). Qualified QSDs are California licensed civil engineers; professional geologists; landscape architects; professional hydrologists; certified professionals in erosion and sediment control; certified inspectors of sediment and erosion control; and certified erosion, sediment, and storm water inspectors. <p>A Qualified Professional shall only perform work he/she is qualified to complete, consistent with applicable licensing and registration restrictions, and shall certify any work completed. Cannabis cultivation land development in timberland may be designed by a qualified California RPF.</p>

¹ See Business and Professions Code sections 6700-6799, 7800-7887, and 8700-8805, respectively.

No.	DEFINITION
73.	Range of anadromy — Length of stream reach between the Pacific Ocean and the upper limit of anadromy (see definition of <i>Anadromy</i>), where migration, spawning and rearing of salmonids occur.
74.	Recurrence interval — The average time between occurrences of streamflows of a given or greater magnitude, sometimes referred to as the return period. The recurrence interval is equal to one divided by the exceedance probability.
75.	Redd — Spawning areas or nests made by a salmon or trout
76.	Requirements - Principles and guidelines established in accordance with Water Code section 13149 for the diversion and use of water for cannabis cultivation. Principles and guidelines include: (i) measures to protect springs, wetlands, and aquatic habitats from negative impacts of cannabis cultivation; and (ii) requirements that apply to groundwater diversions where the State Water Board determines those requirements are reasonably necessary.
77.	Residual pool depth — The difference between the depth of a pool at its deepest point and at its outlet.
78.	Restricted materials — Restricted materials are defined in California Code of Regulations, title 3, section 6400. Restricted materials include all “restricted use pesticides,” as defined in the Federal Insecticide, Fungicide, and Rodenticide Act section 3(d)(1)(C). Information on restricted materials is available at: http://www.cdpr.ca.gov/docs/enforce/compend/vol_3/chap2.pdf .
79.	Riffle — A shallow area in which water flows rapidly over a rocky or gravelly streambed.
80.	Riffle crest — The highest point along the channel thalweg at a riffle.
81.	Riparian habitat — Vegetation growing close to a stream, lake, swamp, or spring that is generally critical for wildlife cover, fish food organisms, stream nutrients and large organic debris, and for streambank stability.
82.	Riparian Setback – setbacks from a watercourse or waterbody established to protect water quality and/or aquatic life. For the purposes of this document, riparian setbacks also apply to wetlands and surface water bodies such as lakes or reservoirs. Please refer to the Minimum Riparian Setback table (Section 1, Requirement 37)
83.	Road Handbook - The Handbook for Forest, Ranch, and Rural Roads, available at: < http://www.pacificwatershed.com/PWA-publications-library >.
84.	Salmonid — Of, belonging to, or characteristic of the family Salmonidae, which includes salmon, trout, and whitefish.
85.	Sheet flow length — The length that shallow, low velocity flow travels across a site.

No.	DEFINITION
86.	Site Mitigation – Efforts to mitigate the impacts of Legacy conditions or cannabis cultivation activities on the cannabis cultivation site or its surroundings.
87.	Site Remediation – Efforts to restore the cannabis cultivation site and its surroundings to its pre-legacy conditions or condition before cannabis cultivation activities began, or to restore the cannabis cultivation site and its surroundings to its natural condition.
88.	<p>Slope – shall be determined across the natural topography (preconstruction) of the land to be disturbed. Measure the highest and lowest elevations of the land to be disturbed, then measure the horizontal distance separating the highest and lowest elevations. Determine the slope using the formula below. (Multiple the ratio by 100 to find the percent value.) There may be more than one slope value if the low elevation has higher elevations in different directions. The highest slope value calculated (highest percentage numerically) is the value to be reported.</p> $\text{Slope} = \frac{\text{elevation difference}}{\text{horizontal distance}} \times 100$ <p>Slope – Value of slope expressed as a percentage. Elevation difference – Report in feet to an accuracy of one inch or one tenth of a foot. Horizontal distance – Report in feet to an accuracy of one inch or one tenth of a foot.</p>
89.	Soil Materials – Include soil, aggregate (rock, sand, or soil), potting soil, compost, manure, or biosolids.
90.	Spring — See <i>Watercourse</i> definitions.
91.	Stabilized Areas – Consist of areas previously disturbed that have been successfully reclaimed to minimize the increase in sediment or turbidity in water discharged from the site. Areas where vehicles may travel or be parked may not be considered stabilized.
92.	Substrate —The material (e.g., sand, gravel, cobbles, boulders, bedrock, and combinations thereof) that forms the bed of a stream.
93.	Surface Water Diversion Period — The calendar period during which water may be diverted. See also <i>Forbearance Period</i> .
94.	Thalweg — See <i>channel thalweg</i> .
95.	Timberland – Pursuant to Public Resources Code section 4526, means land, other than land owned by the federal government and land designated by the Board of Forestry as experimental forest land, which is available for, and capable of, growing a crop of trees of a commercial species used to produce lumber and other forest products, including Christmas trees. Commercial species, on a district basis, are defined in California Code of Regulations, title 14, section 895.1.
96.	Tribal lands – lands recognized as “Indian country” within the meaning of title 18, United States Code, section 1151.

No.	DEFINITION
97.	Turbidity – a measure of water clarity: how much the material suspended in water decreases the passage of light through the water. Suspended materials include soil particles (clay, silt, and sand), algae, plankton, and other substances. The turbidity test is reported in Nephelometric Turbidity Units (NTUs).
98.	Upper limit of anadromy — The upstream end of the range of anadromous fish that currently are or have been historically present year-round or seasonally, whichever extends the furthest upstream.
99.	Waterbody – any significant accumulation of water above the ground surface, such as: lakes, ponds, rivers, streams, creeks, springs, artesian wells, wetlands, and canals.
100.	<p>Watercourse – a natural or artificial channel through which water flows.</p> <p>Perennial watercourse (Class I*): In the absence of diversions, water is flowing for more than nine months during a typical year, Fish always or seasonally present onsite or includes habitat to sustain fish migration and spawning, and/or Spring: an area where there is concentrated discharge of ground water that flows at the ground surface. A spring may flow any part of the year. For the purpose of this Policy, a spring does not have a defined bed and banks.</p> <p>Intermittent watercourse (Class II*): In the absence of diversions, water is flowing for three to nine months during a typical year, Provides aquatic habitat for non-fish aquatic species, Fish always or seasonally present within 1,000 feet downstream, and/or Water is flowing less than three months during a typical year and the stream supports riparian vegetation.</p> <p>Ephemeral watercourse (Class III*): In the absence of diversion, water is flowing less than three months during a typical year and the stream does not support riparian vegetation or aquatic life. Ephemeral watercourses typically have water flowing for a short duration after precipitation events or snowmelt and show evidence of being capable of sediment transport.</p> <p>Other watercourses (Class IV*): Class IV watercourses do not support native aquatic species and are man-made, provide established domestic, agricultural, hydroelectric supply, or other beneficial use.</p> <p>*Except where more restrictive, stream class designations are equivalent to the Forest Practice Rules Water Course and Lake Protection Zone definitions (California Code of Regulations, title 14, Chapter 4. Forest Practice Rules, Subchapters 4, 5, and 6 Forest District Rules, Article 6 Water Course and Lake Protection).</p>
101.	Waterbody Canopy Area — The overhead branches and leaves of streamside woody vegetation.

No.	DEFINITION
102.	Watershed — The land area that drains into a stream. An area of land that contributes runoff to one specific delivery point; large watersheds may be composed of several smaller "subsheds", each of which contributes runoff to different locations that ultimately combine at a common delivery point. Often considered synonymous with a drainage basin or catchment. Watershed (drainage basin) boundaries follow topographic highs. The term watershed is also defined as the divide separating one drainage basin from another.
103.	Watershed drainage area — The land area that comprises a watershed.
104.	Water hauler — Any person who hauls water in bulk by any means of transportation.
105.	Waters of the State – any surface water or groundwater, including saline waters, within the boundaries of the state (Water Code section 13050(e)). Includes all waters within the state’s boundaries, whether private or public, including waters in both natural and artificial channels. Waters of the state includes waters of the United States.
106.	Weed-free mulch — A certified weed-free protective covering (e.g. bark chips, straw, etc.) placed on the ground around plants to suppress weed growth, retain soil moisture, or prevent freezing of roots.
107.	Wetland – an area is a wetland if, under normal circumstances: <p style="padding-left: 40px;">the area has continuous or recurrent saturation of the upper substrate caused by groundwater, or shallow surface water, or both;</p> <p style="padding-left: 40px;">the duration of such saturation is sufficient to cause anaerobic conditions in the upper substrate; and</p> <p style="padding-left: 40px;">the area’s vegetation is dominated by hydrophytes or the area lacks vegetation.</p>
108.	Winter Period – calendar dates from November 15 to April 1, except as noted under special County Rules in California Code of Regulations, title 14, sections 925.1, 926.18, 927.1, and 965.5. A Regional Water Board Executive Officer may impose a more restrictive winter period to protect water quality based on special county rules or as specified in a Basin Plan. The following special rules or basin plan requirements apply: <ul style="list-style-type: none"> i. Santa Clara County, Santa Cruz County, and Monterey County: October 15 to April 15; ii. Marin County: October 1 to April 15; and iii. Lahontan Regional Water Board: October 15 to May 1 (for elevations above 6,000 feet).

SECTION 1 – GENERAL REQUIREMENTS AND PROHIBITIONS

The following general requirements and prohibitions apply to any cannabis cultivator.

General Requirements and Prohibitions

No.	TERM
1.	<p>Prior to commencing any cannabis cultivation activities, including cannabis cultivation land development or alteration, the cannabis cultivator shall comply with all applicable federal, state, and local laws, regulations, and permitting requirements, as applicable, including but not limited to the following:</p> <ul style="list-style-type: none"> • The Clean Water Act (CWA) as implemented through permits, enforcement orders, and self-implementing requirements. When needed per the requirements of the CWA, the cannabis cultivator shall obtain a CWA section 404 (33 U.S.C. § 1344) permit from the United States Army Corps of Engineers (Army Corps) and a CWA section 401 (33 U.S.C. § 1341) water quality certification from the State Water Board or the Regional Water Board with jurisdiction. If the CWA permit cannot be obtained, the cannabis cultivator shall contact the appropriate Regional Water Board or State Water Board prior to commencing any cultivation activities. The Regional Water Board or State Water Board will determine if the cannabis cultivation activity and discharge is covered by the <i>Requirements in the Policy and Cannabis General Waste Discharge Requirements and Waiver of Waste Discharge Requirements for Discharges of Waste Associated with Cannabis Cultivation Activities</i> (Cannabis Cultivation General Order). • The California Water Code as implemented through applicable water quality control plans (often referred to as Basin Plans), waste discharge requirements (WDRs) or waivers of WDRs, enforcement orders, and self-implementing requirements issued by the State Water Resources Control Board (State Water Board) or Regional Water Quality Control Boards (Regional Water Boards). • All applicable state, city, county, or local regulations, ordinances, or license requirements including, but not limited to those for cannabis cultivation, grading, construction, and building. • All applicable requirements of the California Department of Fish and Wildlife (CDFW). • All applicable requirements of the California Department of Forestry and Fire Protection (CAL FIRE), including the Board of Forestry. • California Environmental Quality Act and the National Environmental Policy Act.

No.	TERM
2.	<p>If applicable, cannabis cultivators shall obtain coverage under all of the following:</p> <ul style="list-style-type: none"> a) The State Water Board's Construction Storm Water Program and any successors, amendments, or revisions thereto when applicable. b) Activities performed in areas subject to California Code of Regulations title 14, Chapter 4. Forest Practices (Forest Practice Rules) shall be implemented consistent with the permitting, licensing, and performance standards of the Forest Practice Rules, and the Requirements of this Policy, whichever is more stringent.
3.	<p>The cannabis cultivator shall apply for a Lake and Streambed Alteration Agreement (LSA Agreement) or consult with CDFW to determine if a LSA Agreement is needed prior to commencing any activity that may substantially:</p> <ul style="list-style-type: none"> • divert or obstruct the natural flow of any river, stream, or lake; • change or use any material from the bed, channel, or bank of any river, stream, or lake; or • deposit debris, waste, or other materials that could pass into any river stream or lake. <p>"Any river, stream or lake," as defined by CDFW, includes those that are episodic (they are dry for periods of time) as well as those that are perennial (they flow year-round). This includes ephemeral streams, desert washes, and watercourses with a subsurface flow. It may also apply to work undertaken within the flood plain of a body of water.</p>
4.	<p>Cannabis cultivators shall not take any action which results in the taking of Special-Status Plants (state listed and California Native Plant Society 1B.1 and 1B.2), Fully Protected species (Fish and Game Code sections 3511, 4700, 5050, and 5515), or a threatened, endangered, or candidate species under either the California Endangered Species Act (ESA) (Fish & Game Code §§ 2050 et seq.) or the federal ESA (16 U.S.C. § 1531 et seq.). If a "take," as defined by the California ESA (Fish and Game Code section 86) or the federal ESA (16 U.S.C. § 1532(21)), may result from any act authorized under this Policy, the cannabis cultivator must obtain authorization from CDFW, National Marine Fisheries Service, and United States Fish and Wildlife Service, as applicable, to incidentally take such species prior to land disturbance or operation associated with the cannabis cultivation activities. The cannabis cultivator is responsible for meeting all requirements under the California ESA and the federal ESA.</p>
5.	<p>A Regional Water Board may adopt site-specific WDRs or an enforcement order for a cannabis cultivation facility that does not include requirements consistent with the following if the site-specific WDRs or enforcement order contains sufficient requirements to be protective of water quality:</p> <ul style="list-style-type: none"> • The maximum slope limit of 50 percent in disturbed areas. • The minimum riparian setbacks described herein. • The prohibition against land disturbance activities during the winter period.

No.	TERM
6.	To avoid water quality degradation from erosion and sedimentation, land disturbance activities shall not occur during the winter period unless authorized by a Regional Water Board Executive Officer. Cannabis cultivators shall ensure land disturbing activities are completed and site stabilization measures are in place prior to the onset of the winter period. All land disturbing activities during the winter period shall be supervised by a Qualified Professional. ²
7.	A California Licensed Timber Operator (LTO) ³ shall be used if any commercial tree species are to be removed from the cannabis cultivation site. All timberland conversions shall be permitted and compliant with the Forest Practice Rules and CAL FIRE permitting requirements.
8.	Site improvements and limited repairs may be performed by the cannabis cultivator or contractors as allowed by the Business and Professions Code (Bus. & Prof. Code, section 7044 and/or section 7048). All contracts to perform work that is valued at \$500 or more in combined labor and material costs shall be performed by an appropriately qualified and licensed contractor as required by the California Contractors' State License Board.
9.	<p>During land disturbance activities, the cannabis cultivator shall review and evaluate the applicable daily weather forecast and any applicable 24 hour forecast⁴ at least once per 24 hour period and maintain records of the weather forecast for each day land disturbance activities are conducted. The cannabis cultivator shall cease land disturbance activities and shall implement erosion control Requirements described in this Policy during any 24 hour period in which the applicable daily weather forecast or any 24 hour forecast reports a 50 percent or greater chance of precipitation greater than 0.5 inch per 24 hours.</p> <p>Consistent with Lahontan Regional Water Board Order No R6T-2016-0010, an anticipated precipitation event within the Lake Tahoe Hydrologic Unit (Department of Water Resources Hydrologic Unit No.634.00) is any weather pattern that is forecast to have a 30 percent or greater chance of producing 0.1 inch of precipitation as rainfall in the project area. Cannabis cultivators located in the Lake Tahoe Hydrologic Unit shall cease land disturbance activities and shall implement erosion control Requirements described in this Policy during any 24 hour period in which the applicable daily weather forecast or any 24 hour forecast reports a 30 percent or greater chance of precipitation greater than 0.1 inch per 24 hours. This requirement may be updated based on amendments to the Lahontan Regional Water Board construction storm water general order.</p>

² Although emergency mitigation measures may not require obtaining coverage under the Construction Storm Water Program, the elevated threat to water quality caused by emergency mitigation or remediation work performed during the winter period requires planning and supervision by an appropriately Qualified Professional to protect water quality, such as an appropriately certified or registered Storm Water Pollution Prevention Plan Developer.

³ Licensed Timber Operators or "LTOs" are persons who have been licensed under the Forest Practice Act law and are authorized to conduct forest tree cutting and removal operations.

⁴ If available, the cannabis cultivator shall refer to the weather forecast developed by the National Oceanic and Atmospheric Administration (NOAA) for the local National Weather Service Office (<http://www.weather.gov>). If the NOAA forecast is not available, a forecast by a local television news or radio broadcast shall be used.

No.	TERM
10.	Prior to commencing any cannabis land development or site expansion activities, the cannabis cultivator shall retain a Qualified Biologist to identify sensitive plant, wildlife species, or communities at the proposed development site. If sensitive plant, wildlife species, or communities are identified, the cannabis cultivator and Qualified Biologist shall consult with CDFW and CAL FIRE to designate a no-disturbance buffer to protect identified sensitive plant, wildlife species, and communities. A copy of the report shall be submitted to the appropriate Regional Water Board.
11.	To prevent transfer of invasive species, ⁵ all equipment used at the cannabis cultivation site, including excavators, graders, etc., shall be cleaned before arriving and before leaving the site.
12.	The cannabis cultivator shall comply with all applicable requirements of the State Water Board and Regional Water Boards' (collectively Water Boards) water quality control plans and policies.
13.	The cannabis cultivator shall immediately report any significant hazardous material release or spill that causes a film or sheen on the water's surface, leaves a sludge or emulsion beneath the water's surface, or a release or threatened release of a hazardous material that may potentially discharge to waters of the state, to the California Office of Emergency Services at (800) 852-7550 and the local Unified Program Agency. ⁶ The cannabis cultivator shall also immediately notify the appropriate Regional Water Board and CDFW of the release.
14.	The cannabis cultivator shall comply with all water quality objectives/standards, policies, and implementation plans adopted or approved pursuant to the Porter-Cologne Water Quality Control Act (California Water Code section 13000, et seq.) or CWA section 303 (33 U.S.C. § 1313).

⁵ CDFW defines invasive species as organisms (plants, animals, or microbes) that are not native to an environment, and once introduced, they establish, quickly reproduce and spread, and cause harm to the environment, economy, or human health. Cannabis cultivators may refer to CDFW Internet webpage for guidance on decontamination methods and species of concern. See CDFW's invasive species webpage at: <https://www.wildlife.ca.gov/Conservation/Invasives>.

⁶ Visit the Unified Program Agency website at <http://cersapps.calepa.ca.gov/public/directory> for local contact information. If internet service is not available call 911 to report the hazardous material release.

No.	TERM
15.	<p>During reasonable hours, the cannabis cultivator shall allow the Water Boards, CDFW, CAL FIRE, and any other authorized representatives of the Water Boards, CDFW, or CAL FIRE upon presentation of a badge, employee identification card, or similar credentials, to:</p> <ul style="list-style-type: none"> a) enter premises and facilities where cannabis is cultivated; where water is diverted, stored, or used; where wastes are treated, stored, or disposed of; or in which any records are kept; b) access and copy, any records required to be kept under the terms and conditions of this Policy; c) inspect, photograph, and record audio and video, any cannabis cultivation sites, and associated premises, facilities, monitoring equipment or device, practices, or operations regulated or required by this Policy; and d) sample, monitor, photograph, and record audio and video of site conditions, any discharge, waste material substances, or water quality parameters at any location for the purposes of assuring compliance with this Policy.
16.	<p>The State Water Board may modify this Policy to implement new or revised water quality standards, policies, or water quality control plans; total maximum daily loads (TMDLs), TMDL implementation plans, or revisions to the California Water Code or CWA.</p>
17.	<p>The State Water Board may modify this Policy and the terms and conditions of water right registrations if monitoring results indicate that cannabis cultivation activities could violate instream flow requirements, water quality objectives, or impair the beneficial uses of a waterbody or its tributaries.</p>
18.	<p>Cannabis cultivators shall not commit trespass. Nothing in this Policy or any program implementing this Policy shall be construed to authorize cannabis cultivation: (a) on land not owned by the cannabis cultivator without the express written permission of the landowner; or (b) inconsistent with a conservation easement, open space easement, or greenway easement. This includes, but is not limited to, land owned by the United States or any department thereof, the State of California or any department thereof, any local agency, or any other person who is not the cannabis cultivator. This includes, but is not limited to, any land owned by a California Native American tribe, as defined in section 21073 of the Public Resources Code, whether or not the land meets the definition of tribal lands and includes lands owned for the purposes of preserving or protecting Native American cultural resources of the kinds listed in Public Resources Code section 5097.9 and 5097.993. This includes, but is not limited to, conservation easements held by a qualifying California Native American tribe pursuant to Civil Code section 815.3 and greenway easements held by a qualifying California Native American tribe pursuant to Civil Code section 816.56.</p>

No.	TERM
19.	<p>Prior to acting on a cannabis cultivator’s request to cultivate cannabis on tribal lands⁷ or within 600 feet of tribal lands, the Water Boards will notify the governing body of any affected California Native American tribe or the governing body’s authorized representative, as applicable. A 45-day review period will commence upon receipt of the notice by the affected tribe.</p> <p>During the 45-day review period, the affected tribe may, at its discretion, accept, reject, or not act regarding the cannabis cultivation proposal. If the tribe rejects the proposed cultivation, the cannabis cultivator is prohibited from cultivating cannabis on or within 600 feet of the affected tribe’s tribal lands. If the affected tribe accepts the cannabis cultivation proposal or does not act during the 45-day review period, the Water Boards may proceed with a decision on the cannabis cultivation request as though the affected tribe accepted the cannabis cultivation proposal. The Water Boards will consider requests to extend the 45-day review period on a case by case basis.</p> <p>The governing bodies of California Native American tribes may, at their discretion, notify the State Water Board’s Executive Director in writing that they: a) reject all proposed cannabis cultivation; or b) waive the 45-day review period for all current and future proposed cannabis cultivation on their tribal lands, on portions of their tribal lands, or within 600 feet of their tribal lands. Upon the Executive Director’s receipt of written notice, the Water Boards will, based on the nature of the request, either:</p> <ol style="list-style-type: none"> a. Not approve cannabis cultivation proposals on or within 600 feet of the affected tribe’s tribal lands, as applicable; or b. Abide by the waiver and, at the Water Boards discretion, act on cannabis cultivation requests on or within 600 feet of tribal lands, as applicable, as though the affected tribe accepted the proposal. <p>The governing bodies of California Native American tribes may, at their discretion, withdraw a previously issued decision regarding cannabis cultivation on or within 600 feet of their tribal lands. In such instances, the governing body of the affected tribe should notify the State Water Board’s Executive Director in writing. The Water Boards will abide by the withdrawal of the affected tribe’s decision for any new cannabis cultivation proposals received after the date the State Water Board Executive Director has notified the governing body of the affected tribe that its decision was received. The Water Boards will coordinate with the affected tribe to address existing permitted cannabis cultivation sites on the affected tribe’s lands, as necessary.</p> <p>Nothing in this provision shall be construed to modify or interpret tribal law or tribal jurisdiction in any way.</p>

⁷ “Tribal lands” means lands recognized as “Indian country” within the meaning of title 18, United States Code, section 1151.

No.	TERM
20.	<p>No cannabis cultivation activities shall occur within 600 feet of an identified tribal cultural resource site. The State Water Board may modify this requirement for specific identified tribal cultural resource sites at the request of an affected California Native American tribe(s) after consultation with the affected tribe(s). The cannabis cultivator is solely responsible for identifying any tribal cultural resource sites⁸ within the cannabis cultivation area.</p>
21.	<p>Prior to land disturbance activities for new or expanded cannabis cultivation activities, the cannabis cultivator shall either conduct or request a records search of potential Native American archeological or cultural resources at a California Historical Resources Information System (CHRIS) information center and document the results. Any person who meets qualification requirements for access to the CHRIS may conduct or request the initial CHRIS records search and document the results. The requirement to conduct or request a CHRIS records search may be satisfied by using the results of a previous CHRIS records search completed within the previous 10 years for the specific parcel or parcels where new or expanded cannabis cultivation activities are proposed to occur.</p> <p>Prior to land disturbance activities for new or expanded cannabis cultivation activities, the cannabis cultivator shall also request a search of the Sacred Lands Inventory that is maintained by the Native American Heritage Commission pursuant to Public Resources Code sections 5097.94, subdivision (a), and 5097.96 (Sacred Lands Inventory). If the Sacred Lands Inventory search reveals the presence or potential presence of Native American places of special or social significance to Native Americans, Native American known graves or cemeteries, or Native American sacred places, the cannabis cultivator shall consult with the tribe or tribes that are culturally affiliated with the area in which these Native American cultural resources exist or potentially exist prior to conducting any land disturbance activities. The information provided by tribes through consultation with the cannabis cultivator shall be maintained as confidential by the cannabis cultivator and its agents. A new Sacred Lands Inventory search is always required prior to ground disturbing activities for new or expanded cannabis cultivation.</p> <p>The cannabis cultivator shall notify the Appropriate Person within seven days of receiving a CHRIS positive result or Sacred Lands Inventory positive result. The Appropriate Person is the Deputy Director for Water Rights (Deputy Director) if the cannabis cultivator is operating under the Cannabis Small Irrigation Use Registration (SIUR), the Executive Officer of the applicable Regional Water Board (Executive Officer) if the cannabis cultivator is operating under the Cannabis Cultivation General Order or Cannabis General Water Quality Certification, or both if the cannabis cultivator is operating under both programs.</p> <p>In the event that prehistoric archeological materials or indicators are identified in a CHRIS positive result, the cannabis cultivator shall also notify the Native American Heritage Commission within seven days of receiving the CHRIS positive result and request a list of any California Native American tribes that are</p>

⁸ "Identified tribal cultural resource site" means a tribal cultural resource that meets the requirements of section 21074, subdivision (a)(1) of the Public Resources Code.

No.	TERM
	<p>potentially culturally affiliated with the positive result. The cannabis cultivator shall notify any potentially culturally affiliated California Native American tribes of the CHRIS positive result within 48 hours of receiving a list from the Native American Heritage Commission.</p> <p>The cannabis cultivator shall promptly retain a Professional Archeologist⁹ to evaluate the CHRIS positive result and recommend appropriate conservation measures. In the event of a Sacred Lands Inventory positive result, the cannabis cultivator shall develop appropriate mitigation and conservation measures in consultation with the affected California Native American tribe, and shall promptly retain a Professional Archeologist to assist in this task in the event of a Sacred Lands Inventory positive result related to human remains or archeological resources. The cannabis cultivator shall submit proposed mitigation and conservation measures to the Appropriate Person(s) (Deputy Director for the Cannabis SIUR and Executive Officer for the Cannabis Cultivation General Order or Cannabis General Water Quality Certification) for written approval. The Appropriate Person may require all appropriate measures necessary to conserve archeological resources and tribal cultural resources, including but not limited to Native American monitoring, preservation in place, and archeological data recovery.</p> <p>In the event that prehistoric archeological materials or indicators are identified in a CHRIS positive result, or in the event of a Sacred Lands Inventory positive result, the cannabis cultivator shall also provide a copy of the final proposed mitigation and conservation measures to any culturally affiliated California Native American tribes identified by the Native American Heritage Commission. The Appropriate Person will carefully consider any comments or mitigation measure recommendations submitted by culturally affiliated California Native American tribes with the goal of conserving tribal cultural resources and prehistoric archeological resources with appropriate dignity.</p> <p>Ground-disturbing activities shall not commence until all approved measures have been completed to the satisfaction of the Deputy Director and/or Executive Officer, as applicable.</p>
22.	<p>If any buried archeological materials or indicators¹⁰ are uncovered or discovered during any cannabis cultivation activities, all ground-disturbing activities shall immediately cease within 100 feet of the find.</p>

⁹ A professional archeologist is one that is qualified by the Secretary of Interior, Register of Professional Archaeologists, or Society for California Archaeology.

¹⁰ Prehistoric archeological indicators include, but are not limited to: obsidian and chert flakes and chipped stone tools; bedrock outcrops and boulders with mortar cups; ground stone implements (grinding slabs, mortars, and pestles) and locally darkened midden soils containing some of the previously listed items plus fragments of bone, fire affected stones, shellfish, or other dietary refuse.

Historic period site indicators generally include, but are not limited to: fragments of glass, ceramic and metal objects; milled and split lumber; and structure and feature remains such as building foundations, privy pits, wells and dumps; and old trails.

No.	TERM
	<p>The cannabis cultivator shall notify the Appropriate Person within 48 hours of any discovery. The Appropriate Person is the Deputy Director if the cannabis cultivator is operating under the Cannabis SIUR, the Regional Water Board Executive Officer if the cannabis cultivator is operating under the Cannabis Cultivation General Order or Cannabis General Water Quality Certification, or both if the cannabis cultivator is operating under both programs.</p> <p>In the event that prehistoric archeological materials or indicators are discovered, the cannabis cultivator shall also notify the Native American Heritage Commission within 48 hours of any discovery and request a list of any California Native American tribes that are potentially culturally affiliated with the discovery. The cannabis cultivator shall notify any potentially culturally affiliated California Native American tribes of the discovery within 48 hours of receiving a list from the Native American Heritage Commission.</p> <p>The cannabis cultivator shall promptly retain a Professional Archeologist¹¹ to evaluate the discovery. The cannabis cultivator shall submit proposed mitigation and conservation measures to the Appropriate Person(s) (Deputy Director for the Cannabis SIUR and Regional Water Board Executive Officer for the Cannabis Cultivation General Order or Cannabis General Water Quality Certification) for written approval. The Appropriate Person may require all appropriate measures necessary to conserve archeological resources and tribal cultural resources, including but not limited to Native American monitoring, preservation in place, and archeological data recovery.</p> <p>In the event of a discovery of prehistoric archeological materials or indicators are discovered, the cannabis cultivator shall also provide a copy of the final proposed mitigation and conservation measures to any culturally affiliated California Native American tribes identified by the Native American Heritage Commission. The Appropriate Person will carefully consider any comments or mitigation measure recommendations submitted by culturally affiliated California Native American tribes with the goal of conserving prehistoric archeological resources and tribal cultural resources with appropriate dignity.</p> <p>Ground-disturbing activities shall not resume within 100 feet of the discovery until all approved measures have been completed to the satisfaction of the Deputy Director and/or Executive Officer, as applicable.</p>
23.	<p>Upon discovery of any human remains, cannabis cultivators shall immediately comply with Health and Safety Code section 7050.5 and, if applicable, Public Resources Code section 5097.98. The following actions shall be taken immediately upon the discovery of human remains:</p> <p>All ground-disturbing activities in the vicinity of the discovery shall stop immediately. The cannabis cultivator shall immediately notify the county coroner. Ground disturbing activities shall not resume until the requirements of Health and Safety Code section 7050.5 and, if applicable, Public Resources Code section</p>

¹¹ A professional archeologist is one that is qualified by the Secretary of Interior, Register of Professional Archaeologists, or Society for California Archaeology.

No.	TERM
	<p>5097.98 have been met. The cannabis cultivator shall ensure that the human remains are treated with appropriate dignity.</p> <p>Per Health and Safety Code section 7050.5, the coroner has two working days to examine human remains after being notified by the person responsible for the excavation, or by their authorized representative. If the remains are Native American, the coroner has 24 hours to notify the Native American Heritage Commission.</p> <p>Per Public Resources Code section 5097.98, the Native American Heritage Commission will immediately notify the persons it believes to be the most likely descended from the deceased Native American. The most likely descendent has 48 hours to make recommendations to the landowner or representative for the treatment or disposition, with proper appropriate dignity, of the human remains and any associated grave goods. If the Native American Heritage Commission is unable to identify a descendant; the mediation provided for pursuant to subdivision (k) of Public Resources Code section 5097.94, if invoked, fails to provide measures acceptable to the landowner; or the most likely descendent does not make recommendations within 48 hours; and the most likely descendants and the landowner have not mutually agreed to extend discussions regarding treatment and disposition pursuant to subdivision (b)(2) of Public Resources Code section 5097.98, the landowner or their authorized representative shall reinter the human remains and items associated with the Native American human remains with appropriate dignity on the property in a location not subject to further and future disturbance consistent with subdivision (e) of Public Resources Code section 5097.98. If the landowner does not accept the descendant's recommendations, the landowner or the descendants may request mediation by the Native American Heritage Commission pursuant to Public Resources Code section 5097.94, subdivision (k).</p>
24.	<p>Pursuant to Water Code sections 100 and 275 and the common law public trust doctrine, all rights and privileges, including method of diversion, method of use, and quantity of water diverted, are subject to the continuing authority of the State Water Board in accordance with law and in the interest of the public welfare to protect public trust uses and to prevent waste, unreasonable use, unreasonable method of use, or unreasonable method of diversion of said water.</p>
25.	<p>Cannabis cultivators shall not discharge waste in a manner that creates or threatens to create a condition of pollution or nuisance, as defined by Water Code section 13050.</p>

No.	TERM
26.	<p>Except as allowed and authorized in this Policy, cannabis cultivators shall not discharge:</p> <ul style="list-style-type: none"> • irrigation runoff, tailwater, sediment, plant waste, or chemicals to surface water or via surface runoff; • waste classified as hazardous (California Code of Regulations, title 23, section 2521(a)) or defined as a designated waste (Water Code section 13173); or • waste in violation of, or in a manner inconsistent with, the appropriate Water Quality Control Plan(s).
27.	<p>Unless authorized by separate waste discharge requirements, the Cannabis Cultivation General Order, or a CWA section 404/401 permit, the following discharges are prohibited:</p> <ul style="list-style-type: none"> • any waste that could affect the quality of the waters of the state; or • wastewater from cannabis manufacturing activities defined in Business and Professions Code section 26100, indoor grow operations, or other industrial wastewater to an onsite wastewater treatment system (e.g., septic tank and associated disposal facilities), to surface water, or to land.
28.	<p>Unless authorized by a Regional Water Board site-specific WDR, cannabis cultivators shall not cultivate cannabis or have cannabis cultivation related land disturbance on slopes greater than 50 percent.</p>
29.	<p>Cannabis cultivators shall not use a cesspool for domestic or industrial wastewater disposal. Cannabis cultivators shall not install or continue use of an outhouse, pit-privy, pit-toilet, or similar device without approval from the Regional Water Board Executive Officer of the applicable Regional Water Board.</p>
30.	<p>In timberland areas, cannabis cultivators shall not remove commercial tree species or other vegetation within 150 feet of fish bearing water bodies or 100 feet of aquatic habitat for non-fish aquatic species (e.g., aquatic insects) prior to obtaining all applicable permits required from CAL FIRE, CDFW (i.e., LSA Agreement), and/or the Regional Water Board Executive Officer.</p>
31.	<p>Tier 1 or 2 cannabis cultivators located on slopes greater than 30% and less than 50% must submit a Site Erosion and Sediment Control Plan to the Regional Water Board Executive Officer for any cannabis-related land development or alteration. The Site Erosion and Sediment Control Plan shall be approved by the applicable Regional Water Board Executive Officer prior to the cannabis cultivator initiating or expanding any land disturbance. The Regional Water Board Executive Officer may deny the request to conduct new land disturbance activities for cannabis cultivation if local conditions (e.g., soil type, site instability, proximity to a waterbody, etc.) do not allow for adequate erosion and sediment control measures to ensure discharges to waters of the state will not occur.</p>

No.	TERM
32.	Tier 1 or 2 cannabis cultivators with any portion of the disturbed areas existing within the setbacks shall submit a Disturbed Area Stabilization Plan to the Regional Water Board Executive Officer. The Disturbed Area Stabilization Plan shall be approved by the applicable Regional Water Board Executive Officer prior to the cannabis cultivator initiating any land stabilization activities. This requirement does not apply to disturbed areas resulting from activities authorized under 404/401 CWA permits, a CDFW LSA Agreement, coverage under the Cannabis Cultivation General Order water quality certification, or site-specific WDRs issued by the Regional Water Board.
33.	Cannabis cultivators under any Cannabis Cultivation General Order or individual WDRs implementing this Policy shall self-certify that they have complied with or will comply with all applicable Requirements in this Policy no later than the onset of the winter period of the same year as the application date and each year thereafter. If application occurs after the onset of the winter period, cannabis cultivators shall self-certify that all applicable Requirements in this Policy will be implemented by the onset of the winter period of the next calendar year, and each year thereafter. Those cannabis cultivators that cannot implement all applicable Requirements by the onset of the winter period shall, within 90 days of application submittal, submit to the Executive Officer of the applicable Regional Water Board a time schedule and scope of work for use by the Regional Water Board in developing a compliance schedule.
34.	Cannabis cultivators shall implement interim Requirements immediately following land disturbance, to minimize discharges of waste constituents. Interim Requirements are those that are implemented immediately upon site development. Cannabis cultivators shall complete all winterization Requirements prior to the onset of the winter period to prevent waste discharges that may result in water quality degradation.
35.	Cannabis cultivators shall not cause downstream exceedance of applicable water quality objectives identified in the applicable water quality control plan(s).
36.	The landowner is ultimately responsible for any water quality degradation that occurs on or emanates from its property and for water diversions that are not in compliance with this Policy. Landowners will be named as responsible parties and will be notified if a Cannabis Cultivation General Order Notice of Applicability or conditional exemption has been issued for cannabis activities on their property. The cannabis cultivator and the landowner will be held responsible for correcting non-compliance.
37.	Cannabis cultivators shall comply with the minimum riparian setbacks described below for all land disturbance, cannabis cultivation activities, and facilities (e.g., material or vehicle storage, petroleum powered pump locations, off-stream water storage areas, and chemical toilet placement). The riparian setbacks shall be measured from the waterbody's bankfull stage (high flow water levels that occur every 1.5 to 2 years) or from the top edge of the waterbody bank in incised

No.	TERM																		
	<p>channels, whichever is more conservative. Riparian setbacks for springheads shall be measured from the springhead in all directions (circular buffer). Riparian setbacks for wetlands shall be measured from the edge of wetland as delineated by a Qualified Professional with experience implementing the Corps of Engineers Wetlands Delineation Manual (with regional supplements). The Regional Water Board Executive Officer may require additional riparian setbacks or additional requirements, as needed, to meet the performance requirement of protecting surface water from discharges that threaten water quality. If the cannabis cultivation site cannot be managed to protect water quality, the Executive Officer of the applicable Regional Water Board may revoke authorization for cannabis cultivation activities at the cannabis cultivation site.</p> <p>Minimum Riparian Setbacks^{1,2}</p> <table border="1" data-bbox="365 693 1409 1323"> <thead> <tr> <th data-bbox="365 693 966 793">Common Name</th> <th data-bbox="966 693 1198 793">Watercourse Class³</th> <th data-bbox="1198 693 1409 793">Distance</th> </tr> </thead> <tbody> <tr> <td data-bbox="365 793 966 894">Perennial watercourses, waterbodies (e.g. lakes, ponds), or springs⁴</td> <td data-bbox="966 793 1198 894">I</td> <td data-bbox="1198 793 1409 894">150 ft.</td> </tr> <tr> <td data-bbox="365 894 966 961">Intermittent watercourses or wetlands</td> <td data-bbox="966 894 1198 961">II</td> <td data-bbox="1198 894 1409 961">100 ft.</td> </tr> <tr> <td data-bbox="365 961 966 1056">Ephemeral watercourses</td> <td data-bbox="966 961 1198 1056">III</td> <td data-bbox="1198 961 1409 1056">50 ft.</td> </tr> <tr> <td data-bbox="365 1056 966 1224">Man-made irrigation canals, water supply reservoirs, or hydroelectric canals that support native aquatic species</td> <td data-bbox="966 1056 1198 1224">IV</td> <td data-bbox="1198 1056 1409 1224">Established Riparian Vegetation Zone</td> </tr> <tr> <td data-bbox="365 1224 966 1323">All other man-made irrigation canals, water supply reservoirs, or hydroelectric canals</td> <td data-bbox="966 1224 1198 1323">IV</td> <td data-bbox="1198 1224 1409 1323">N/A</td> </tr> </tbody> </table> <p data-bbox="365 1354 1409 1480">¹ A Regional Water Board may adopt site-specific WDRs or an enforcement order for a cannabis cultivator with requirements that are inconsistent with the setbacks in this table if the Executive Officer determines that the site-specific WDRs or enforcement order contains sufficient requirements to be protective of water quality.</p> <p data-bbox="365 1480 1409 1627">² Cannabis cultivators enrolled in a Regional Water Board order adopting WDRs or a waiver of WDRs for cannabis cultivation activities prior to October 17, 2017, may retain reduced setbacks applicable under that Regional Water Board order unless the Regional Water Board's Executive Officer determines that the reduced setbacks applicable under that order are not protective of water quality.</p> <p data-bbox="365 1627 1409 1753">³ Except where more restrictive, the stream class designations are equivalent to the Forest Practice Rules Water Course and Lake Protection Zone definitions (California Code of Regulations, title 14, Chapter 4. Forest Practice Rules, Subchapters 4, 5, and 6 Forest District Rules, Article 6 Water Course and Lake Protection).</p> <p data-bbox="365 1753 1409 1869">⁴ Spring riparian setbacks default to the applicable watercourse riparian setback 150 feet downstream and/or upstream of the spring's confluence with the watercourse or 150 feet downstream of the point where the spring forms a watercourse with defined bed and banks.</p>	Common Name	Watercourse Class ³	Distance	Perennial watercourses, waterbodies (e.g. lakes, ponds), or springs ⁴	I	150 ft.	Intermittent watercourses or wetlands	II	100 ft.	Ephemeral watercourses	III	50 ft.	Man-made irrigation canals, water supply reservoirs, or hydroelectric canals that support native aquatic species	IV	Established Riparian Vegetation Zone	All other man-made irrigation canals, water supply reservoirs, or hydroelectric canals	IV	N/A
Common Name	Watercourse Class ³	Distance																	
Perennial watercourses, waterbodies (e.g. lakes, ponds), or springs ⁴	I	150 ft.																	
Intermittent watercourses or wetlands	II	100 ft.																	
Ephemeral watercourses	III	50 ft.																	
Man-made irrigation canals, water supply reservoirs, or hydroelectric canals that support native aquatic species	IV	Established Riparian Vegetation Zone																	
All other man-made irrigation canals, water supply reservoirs, or hydroelectric canals	IV	N/A																	

No.	TERM
38.	<p>Indoor cannabis cultivation¹² structures are exempt from the riparian setback (Requirement 37) and tribal buffer (Requirement 19) if either of the following conditions are met:</p> <ul style="list-style-type: none"> a) The indoor cannabis cultivation structure: <ul style="list-style-type: none"> i. has a building permit or other similar authorization issued by a federally recognized Indian tribe on file with the county, city, local jurisdiction, or federally recognized Indian tribe, as applicable, and started construction prior to October 1, 2018; ii. has a valid certificate of occupancy or amended certificate of occupancy for indoor cannabis cultivation; and iii. either (A) is connected to and discharges any industrial wastewater to a permitted wastewater treatment collection system and facility that accepts cannabis cultivation wastewater, or (B) discharges any industrial wastewater directly to an appropriately designed and connected storage tank located outside of the riparian setback, and the discharge is properly disposed of by a permitted wastewater hauler at a permitted wastewater treatment facility that accepts cannabis cultivation wastewater. <p>OR</p> <ul style="list-style-type: none"> b) The indoor cannabis cultivation structure: <ul style="list-style-type: none"> i. has a building permit or other similar authorization issued by a federally recognized Indian tribe on file with the county, city, local jurisdiction, or federally recognized Indian tribe, as applicable, and construction started on or after October 1, 2018; ii. has a valid certificate of occupancy or amended certificate of occupancy for indoor cannabis cultivation; and iii. is connected to and discharges any industrial wastewater to a permitted wastewater treatment collection system and facility that accepts cannabis cultivation wastewater. If the permitted wastewater treatment collection system and facility that the structure is connected to does not accept cannabis cultivation wastewater, the structure may still qualify for the riparian setback and tribal buffer exemptions if the structure discharges any industrial wastewater directly to an appropriately designed and connected storage tank located outside of the riparian setback, and the discharge is properly disposed of by a permitted wastewater hauler at a permitted wastewater treatment facility that accepts cannabis cultivation wastewater.

¹² Indoor cannabis cultivation is cannabis cultivation that occurs within a structure with a permanent roof, a permanent relatively impermeable floor (e.g., concrete or asphalt paved), and either 1) discharges all industrial wastewaters generated to a permitted wastewater treatment collection system and facility that accepts cannabis cultivation wastewater; or 2) collects all industrial wastewater in an appropriate storage container to be collected and properly disposed of by a permitted wastewater hauler at a permitted wastewater treatment facility that accepts cannabis cultivation wastewater.

No.	TERM
	<p>The riparian setback exemption shall not apply if the Regional Water Board's Executive Officer determines that an exemption from the riparian setbacks is not protective of water quality.</p> <p>All other applicable Requirements apply to any cannabis cultivation activities, including setbacks for cannabis cultivation activities that occur outside of the permitted indoor cannabis cultivation structure.</p>

Cannabis General Water Quality Certification

For the purposes of section 401 of the Clean Water Act, the State Water Board certifies that cannabis cultivation activities in compliance with the conditions of the Policy and Cannabis Cultivation General Order will comply with sections 301, 302, 303, 306, and 307 of the Clean Water Act, and with applicable provisions of State law, subject to the following additional terms and conditions:

No.	TERM
1.	This certification action is subject to modification or revocation upon administrative or judicial review; including review and amendment pursuant to Water Code section 13330 and California Code of Regulations, title 23, section 3867.
2.	This certification action is not intended and shall not be construed to apply to any discharge from any activity involving a hydroelectric facility requiring a Federal Energy Regulatory Commission (FERC) license or an amendment to a FERC license unless the pertinent certification application was filed pursuant to California Code of Regulations, title 23, section 3855, subdivision (b), and the application specifically identified that a FERC license or amendment to a FERC license for a hydroelectric facility was being sought.
3.	This certification is conditioned upon total payment of any fee required under California Code of Regulations, title 23, division 3, chapter 28.
4.	A cannabis cultivator seeking water quality certification coverage for activities in surface waters shall notify the Executive Officer of the Regional Water Board or State Water Board Executive Director at least 60 days prior to commencement of the activity and submit information regarding the construction schedule and other relevant information. Work may not commence until the cannabis cultivator is provided authorization by the appropriate Executive Officer of the Regional Water Board or Executive Director of the State Water Board. The Executive Officer of the Regional Water Board or Executive Director of the State Water Board may include specific monitoring requirements for turbidity and other constituents that may be associated with the activity to ensure applicable state water quality standards are met.
5.	The authorization of this certification for any coverage under this Cannabis General Water Quality Certification for dredge and fill activities expires five years from the date this Policy, and any subsequent amendment to the Policy, is approved by the Office of Administrative Law.
6.	Upon completion of the discharges of dredged or fill material, the cannabis cultivator shall submit a Notice of Completion certifying that all the conditions and monitoring and reporting requirements of this General Water Quality Certification, including the Policy, Cannabis Cultivation General Order (if applicable), and conditions imposed by the Regional Water Board Executive Officer or State Water Board Executive Director, have been met.
7.	All Policy and Cannabis Cultivation General Order Requirements, standard conditions, general terms and provisions, and prohibitions are enforceable conditions of this General Water Quality Certification.

No.	TERM
8.	In the event of any violation or threatened violation of the conditions of this General Water Quality Certification, the violation or threatened violation shall be subject to any remedies, penalties, processes, or sanctions as provided for under state law. For purposes of section 401(d) of the Clean Water Act, the applicability of any state law authorizing remedies, penalties, process, or sanctions for the violation or threatened violation constitutes a limitation necessary to assure compliance with the water quality standards and other pertinent requirements incorporated into this certification.
9.	This General Water Quality Certification may be modified as needed by the Executive Director of the State Water Board.

SECTION 2 – REQUIREMENTS RELATED TO WATER DIVERSIONS AND WASTE DISCHARGE FOR CANNABIS CULTIVATION

The following Requirements apply to any water diversion or waste discharge related to cannabis cultivation.

No.	TERM
Land Development and Maintenance, Erosion Control, and Drainage Features	
Limitations on Earthmoving	
1.	<p>Cannabis cultivators shall not conduct grading activities for cannabis cultivation land development or alteration on slopes exceeding 50 percent grade, or as restricted by local county or city permits, ordinances, or regulations for grading, agriculture, or cannabis cultivation; whichever is more stringent shall apply.</p> <p>The grading prohibition on slopes exceeding 50 percent does not apply to site mitigation or remediation if the cannabis cultivator is issued separate WDRs or an enforcement order for the activity by the Regional Water Board Executive Officer.</p>
2.	<p>Finished cut and fill slopes, including side slopes between terraces, shall not exceed slopes of 50 percent and should conform to the natural pre-grade slope whenever possible.</p>
3.	<p>Cannabis cultivators shall not drive or operate vehicles or equipment within the riparian setbacks or within waters of the state unless authorized under 404/401 CWA permits, a CDFW LSA Agreement, coverage under the Cannabis Cultivation General Order water quality certification, or site-specific WDRs issued by the Regional Water Board. This requirement does not prohibit driving on established, maintained access roads that are in compliance with this Policy.</p>
4.	<p>Cannabis cultivation land development and access road construction shall be designed by Qualified Professionals. Cannabis cultivators shall conduct all construction or land development activities to minimize grading, soil disturbance, and disturbance to aquatic and terrestrial habitat.</p>
5.	<p>The cannabis cultivator shall control all dust related to cannabis cultivation activities to ensure dust does not produce sediment-laden runoff. The cannabis cultivator shall implement dust control measures, including, but not limited to, pre-watering of excavation or grading sites, use of water trucks, track-out prevention, washing down vehicles or equipment before leaving a site, and prohibiting land disturbance activities when instantaneous wind speeds (gusts) exceed 25 miles per hour. Cannabis cultivators shall grade access roads in dry weather while moisture is still present in soil to minimize dust and to achieve design soil compaction, or when needed use a water truck to control dust and soil moisture.</p>

Construction Equipment Use and Limitations	
6.	Cannabis cultivators shall employ spill control and containment practices to prevent the discharge of fuels, oils, solvents and other chemicals to soils and waters of the state.
7.	<p>Cannabis cultivators shall stage and store equipment, materials, fuels, lubricants, solvents, or hazardous or toxic materials in locations that minimize the potential for discharge to waters of the state. At a minimum, the following measures shall be implemented:</p> <ul style="list-style-type: none"> a) Designate an area outside the riparian setback for equipment storage, short-term maintenance, and refueling. Cannabis cultivator shall not conduct any maintenance activity or refuel equipment in any location where the petroleum products or other pollutants may enter waters of the state as per Fish and Game Code section 5650 (a)(1). b) Frequently inspect equipment and vehicles for leaks. c) Immediately clean up leaks, drips, and spills. Except for emergency repairs that are necessary for the safe transport of equipment or vehicles to an appropriate repair facility; performing equipment or vehicle repairs, maintenance, and washing onsite is prohibited. d) If emergency repairs generate waste fluids, ensure they are contained and properly disposed or recycled off-site. e) Properly dispose of all construction debris off-site. f) Use dry cleanup methods (e.g., absorbent materials, cat litter, and/or rags) whenever possible. Sweep up, contain, and properly dispose of spilled dry materials.
Erosion Control	
8.	The cannabis cultivator shall use appropriate erosion control measures to minimize erosion of disturbed areas, potting soil, or bulk soil amendments to prevent discharges of waste. Fill soil shall not be placed where it may discharge into surface water. If used, weed-free straw mulch shall be applied at a rate of two tons per acre of exposed soils and, if warranted by site conditions, shall be secured to the ground.
9.	The cannabis cultivator shall not plant or seed noxious weeds. Prohibited plant species include those identified in the California Invasive Pest Plant Council's database, available at: www.cal-ipc.org/paf/ . Locally native, non-invasive, and non-persistent grass species may be used for temporary erosion control benefits to stabilize disturbed land and prevent exposure of disturbed land to rainfall. Nothing in this term may be construed as a ban on cannabis cultivation that complies with the terms of this Policy.
10.	Cannabis cultivators shall incorporate erosion control and sediment detention devices and materials into the design, work schedule, and implementation of the

	<p>cannabis cultivation activities. The erosion prevention and sediment capture measures shall be effective in protecting water quality.</p> <ul style="list-style-type: none"> • Interim erosion prevention and sediment capture measures shall be implemented within seven days of completion of grading and land disturbance activities, and shall consist of erosion prevention measures and sediment capture measures including: <ul style="list-style-type: none"> ○ Erosion prevention measures are required for any earthwork that uses heavy equipment (e.g., bulldozer, compactor, excavator, etc.). Erosion prevention measures may include surface contouring, slope roughening, and upslope storm water diversion. Other types of erosion prevention measures may include mulching, hydroseeding, tarp placement, revegetation, and rock slope protection. ○ Sediment capture measures include the implementation of measures such as gravel bag berms, fiber rolls, straw bale barriers, properly installed silt fences, and sediment settling basins. • Long-term erosion prevention and sediment capture measures shall be implemented as soon as possible and prior to the onset of fall and winter precipitation. Long-term measures may include the use of heavy equipment to reconfigure access roads or improve access road drainage, installation of properly-sized culverts, gravel placement on steeper grades, and stabilization of previously disturbed land. • Maintenance of all erosion protection and sediment capture measures is required year-round. Early monitoring allows for identification of problem areas or underperforming erosion or sediment control measures. Verification of the effectiveness of all erosion prevention and sediment capture measures is required as part of winterization activities.
<p>11.</p>	<p>Cannabis cultivators shall only use geotextiles, fiber rolls, and other erosion control measures made of loose-weave mesh (e.g., jute, coconut (coir) fiber, or from other products without welded weaves). To minimize the risk of ensnaring and strangling wildlife, cannabis cultivators shall not use synthetic (e.g., plastic or nylon) monofilament netting materials for erosion control for any cannabis cultivation activities. This prohibition includes photo- or bio-degradable plastic netting.</p>
<p>12.</p>	<p>Cultivation sites constructed on or near slopes with a slope greater than or equal to 30 percent shall be inspected for indications of instability. Indications of instability include the occurrence of slope failures at nearby similar sites, weak soil layers, geologic bedding parallel to slope surface, hillside creep (trees, fence posts, etc. leaning downslope), tension cracks in the slope surface, bulging soil at the base of the slope, and groundwater discharge from the slope. If indicators of instability are present, the cannabis cultivator shall consult with a Qualified Professional to design measures to stabilize the slope to prevent sediment discharge to surface waters.</p>
<p>13.</p>	<p>For areas outside of riparian setbacks or for upland areas, cannabis cultivators shall ensure that rock placed for slope protection is the minimum amount necessary and is part of a design that provides for native plant revegetation. If retaining walls or other structures are required to provide slope stability, they shall be designed by a Qualified Professional.</p>

14.	Cannabis cultivators shall monitor erosion control measures during and after each storm event that produces at least 0.5 in/day or 1.0 inch/7 days of precipitation, and repair or replace, as needed, ineffective erosion control measures immediately.
Access Road/Land Development and Drainage	
15.	Access roads shall be constructed consistent with the requirements of California Code of Regulations Title 14, Chapter 4. The Road Handbook describes how to implement the regulations and is available at http://www.pacificwatershed.com/PWA-publications-library . Existing access roads shall be upgraded to comply with the Road Handbook.
16.	Cannabis cultivators shall obtain all required permits and approvals prior to the construction of any access road constructed for cannabis cultivation activities. Permits may include section 404/401 CWA permits, Regional Water Board WDRs (when applicable), CDFW LSA Agreement, and county or local agency permits.
17.	Cannabis cultivators shall ensure that all access roads are hydrologically disconnected to receiving waters to the extent possible by installing disconnecting drainage features, increasing the frequency of (inside) ditch drain relief as needed, constructing out-sloped roads, constructing energy dissipating structures, avoiding concentrating flows in unstable areas, and performing inspection and maintenance as needed to optimize the access road performance.
18.	New access road alignments should be constructed with grades (slopes) of 3- to 8-percent, or less, wherever possible. Forest access roads should generally be kept below 12-percent except for short pitches of 500 feet or less where road slopes may go up to 20-percent. These steeper access road slopes should be paved or rock surfaced and equipped with adequate drainage. Existing access roads that do not comply with these limits shall be inspected by a Qualified Professional to determine if improvements are needed.
19.	Cannabis cultivators shall decommission or relocate existing roads away from riparian setbacks whenever possible. Roads that are proposed for decommissioning shall be abandoned and left in a condition that provides for long-term, maintenance-free function of drainage and erosion controls. Abandoned roads shall be blocked to prevent unauthorized vehicle traffic.
20.	If site conditions prohibit drainage structures (including rolling dips and ditch-relief culverts) at adequate intervals to avoid erosion, the cannabis cultivator shall use bioengineering techniques ¹³ as the preferred measure to minimize erosion (e.g., live fascines). If bioengineering cannot be used, then engineering fixes such as armoring (e.g., rock of adequate size and depth to remain in place under traffic and flow conditions) and velocity dissipaters (e.g., gravel-filled “pillows” in an inside ditch

¹³ A Primer on Stream and River Protection for the Regulator and Program Manager: Technical Reference Circular W.D. 02-#1, San Francisco Bay Region, California Regional Water Board (April 2003) http://www.waterboards.ca.gov/sanfranciscobay/water_issues/programs/stream_wetland/streamprotectio ncircular.pdf.

	to trap sediment) may be used for problem sites. The maximum distance between water breaks shall not exceed those defined in the Road Handbook.
21.	Cannabis cultivators shall have a Qualified Professional design the optimal access road alignment, surfacing, drainage, maintenance requirements, and spoils handling procedures.
22.	Cannabis cultivators shall ensure that access road surfacing, especially within a segment leading to a waterbody, is sufficient to minimize sediment delivery to the wetland or waterbody and maximize access road integrity. Road surfacing may include pavement, chip-seal, lignin, rock, or other material appropriate for timing and nature of use. All access roads that will be used for winter or wet weather hauling/traffic shall be surfaced. Steeper access road grades require higher quality rock (e.g., crushed angular versus river-run) to remain in place. The use of asphalt grindings is prohibited.
23.	Cannabis cultivators shall install erosion control measures on all access road approaches to surface water diversion sites to reduce the generation and transport of sediment to streams.
24.	Cannabis cultivators shall ensure that access roads are out-sloped whenever possible to promote even drainage of the access road surface, prevent the concentration of storm water flow within an inboard or inside ditch, and to minimize disruption of the natural sheet flow pattern off a hill slope to a stream.
25.	If unable to eliminate inboard or inside ditches, the cannabis cultivator shall ensure adequate ditch relief culverts to prevent down-cutting of the ditch and to reduce water runoff concentration, velocity, and erosion. Ditches shall be designed and maintained as recommended by a Qualified Professional. To avoid point-source discharges, inboard ditches and ditch relief culverts shall be discharged onto vegetated or armored slopes that are designed to dissipate and prevent runoff channelization. Inboard ditches and ditch relief culverts shall be designed to ensure discharges into natural stream channels or watercourses are prevented.
26.	Cannabis cultivators shall ensure that access roads are not allowed to develop or show evidence of significant surface rutting or gulying. Cannabis cultivators shall use water bars and rolling dips as designed by a Qualified Professional to minimize access road surface erosion and dissipate runoff.
27.	Cannabis cultivators shall only grade ditches when necessary to prevent erosion of the ditch, undermining of the banks, or exposure of the toe of the cut slope to erosion. Cannabis cultivators shall not remove more vegetation than necessary to keep water moving, as vegetation prevents scour and filters out sediment.
28.	Access road storm water drainage structures shall not discharge onto unstable slopes, earthen fills, or directly to a waterbody. Drainage structures shall discharge onto stable areas with straw bales, slash, vegetation, and/or rock riprap.
29.	Sediment control devices (e.g., check dams, sand/gravel bag barriers, etc.) shall be used when it is not practical to disperse storm water before discharge to a waterbody. Where potential discharge to a wetland or waterbody exists (e.g., within 200 feet of a waterbody) access road surface drainage shall be filtered through vegetation, slash, other appropriate material, or settled into a depression with an

	outlet with adequate drainage. Sediment basins shall be engineered and properly sized to allow sediment settling, spillway stability, and maintenance activities.
Drainage Culverts (See also Watercourse Crossings)	
30.	Cannabis cultivators shall regularly inspect ditch-relief culverts and clear them of any debris or sediment. To reduce ditch-relief culvert plugging by debris, cannabis cultivators shall use 15- to 24-inch diameter pipes, at minimum. In forested areas with a potential for woody debris, a minimum 18-inch diameter pipe shall be used to reduce clogging. Ditch relief culverts shall be designed by a Qualified Professional based on site-specific conditions.
31.	Cannabis cultivators shall ensure that all permanent watercourse crossings that are constructed or reconstructed are capable of accommodating the estimated 100-year flood flow, including debris and sediment loads. Watercourse crossings shall be designed and sized by a Qualified Professional.
Cleanup, Restoration, and Mitigation	
32.	Cannabis cultivators shall limit disturbance to existing grades and vegetation to the actual site of the cleanup or remediation and any necessary access routes.
33.	<p>Cannabis cultivators shall avoid damage to native riparian vegetation. All exposed or disturbed land and access points within the stream and riparian setback with damaged vegetation shall be restored with regional native vegetation of similar native species. Riparian trees over four inches diameter at breast height shall be replaced by similar native species at a ratio of three to one (3:1). Restored areas must be mulched, using at least 2 to 4 inches of weed-free, clean straw or similar biodegradable mulch over the seeded area. Mulching shall be completed within 30 days after land disturbance activities in the areas cease. Revegetation planting shall occur at a seasonally appropriate time until vegetation is restored to pre-cannabis or pre-legacy condition or better.</p> <p>Cannabis cultivators shall stabilize and restore any temporary work areas with native vegetation to pre-cannabis cultivation or pre-legacy conditions or better. Vegetation shall be planted at an adequate density and variety to control surface erosion and re-generate a diverse composition of regional native vegetation of similar native species.</p>
34.	Cannabis cultivators shall avoid damage to oak woodlands. Cannabis cultivator shall plant three oak trees for every one oak tree damaged or removed. Trees may be planted in groves in order to maximize wildlife benefits and shall be native to the local county.
35.	<p>Cannabis cultivators shall develop a revegetation plan for:</p> <ul style="list-style-type: none"> • All exposed or disturbed riparian vegetation areas, • any oak trees that are damaged or removed, and • temporary work areas. <p>Cannabis cultivators shall develop a monitoring plan that evaluates the revegetation plan for five years. Cannabis cultivators shall maintain annual inspections for the</p>

	<p>purpose of assessing an 85 percent survival and growth of revegetated areas within a five-year period. The presence of exposed soil shall be documented for three years following revegetation work. If the revegetation results in less than an 85 percent success rate, the unsuccessful vegetation areas shall be replanted. Cannabis cultivators shall identify the location and extent of exposed soil associated with the site; pre- and post-revegetation work photos; diagram of all areas revegetated, the planting methods, and plants used; and an assessment of the success of the revegetation program. Cannabis cultivators shall maintain a copy of the revegetation plan and monitoring results onsite and make them available, upon request, to Water Boards staff or authorized representatives. An electronic copy of monitoring results is acceptable in Portable Document Format (PDF).</p>
36.	<p>Cannabis cultivators shall revegetate soil exposed as a result of cannabis cultivation activities with native vegetation by live planting, seed casting, or hydroseeding within seven days of exposure.</p>
37.	<p>Cannabis cultivators shall prevent the spread or introduction of exotic plant species to the maximum extent possible by cleaning equipment before delivery to the cannabis cultivation site and before removal, restoring land disturbance with appropriate native species, and post-cannabis cultivation activities monitoring and control of exotic species. Nothing in this term may be construed as a ban on cannabis cultivation that complies with the terms of this Policy.</p>
<p>Stream Crossing Installation and Maintenance</p>	
<p>Limitations on Work in Watercourses and Permanently Poned Areas</p>	
38.	<p>Cannabis cultivators shall obtain all applicable permits and approvals prior to doing any work in or around waterbodies or within the riparian setbacks. Permits may include section 404/401 CWA permits, Regional Water Board WDRs (when applicable), and a CDFW LSA Agreement.</p>
39.	<p>Cannabis cultivators shall avoid or minimize temporary stream crossings. When necessary, temporary stream crossings shall be located in areas where erosion potential and damage to the existing habitat is low. Cannabis cultivators shall avoid areas where runoff from access roadway side slopes and natural hillsides will drain and flow into the temporary crossing. Temporary stream crossings that impede fish passage are strictly prohibited on permanent or seasonal fish-bearing streams.</p>
40.	<p>Cannabis cultivators shall avoid or minimize use of heavy equipment¹⁴ in a watercourse. If use is unavoidable, heavy equipment may only travel or work in a waterbody with a rocky or cobbled channel. Wood, rubber, or clean native rock temporary work pads shall be used on the channel bottom prior to use of heavy equipment to protect channel bed and preserve channel morphology. Temporary work pads and other channel protection shall be removed as soon as possible once the use of heavy equipment is complete.</p>

¹⁴ Heavy equipment is defined as machinery or vehicles, typically used in the building and construction industry (e.g., bulldozers, excavators, backhoes, bobcats, tractors, etc.).

41.	Cannabis cultivators shall avoid or minimize work in or near a stream, creek, river, lake, pond, or other waterbody. If work in a waterbody cannot be avoided, activities and associated workspace shall be isolated from flowing water by directing the water around the work site. If water is present, then the cannabis cultivator shall develop a site-specific plan prepared by a Qualified Professional. The plan shall consider partial or full stream diversion and dewatering. The plan shall consider the use of coffer dams upstream and downstream of the work site and the diversion of all flow from upstream of the upstream dam to downstream of the downstream dam, through a suitably sized pipe with intake screens that protect and prevent impacts to fish and wildlife. Cannabis cultivation activities and associated work shall be performed outside the waterbody from the top of the bank to the maximum extent possible.
Temporary Watercourse Diversion and Dewatering: All Live Watercourses	
42.	Cannabis cultivators shall ensure that coffer dams are constructed prior to commencing work and as close as practicable upstream and downstream of the work area. Cofferdam construction using offsite materials, such as clean gravel bags or inflatable dams, is preferred. Thick plastic may be used to minimize leakage, but shall be completely removed and properly disposed of upon work completion. If the coffer dams or stream diversion fail, the cannabis cultivator shall repair them immediately.
43.	When any dam or other artificial obstruction is being constructed, maintained, or placed in operation, the cannabis cultivator shall allow sufficient water at all times to pass downstream to maintain aquatic life below the dam pursuant to Fish and Game Code section 5937.
44.	Gravity flow is the preferred method of temporarily dewatering or diverting water. If a pump is used, the cannabis cultivator shall ensure that the pump is operated at the rate of flow that passes through the cannabis cultivation site. Pumping rates shall not dewater or impound water on the upstream side of the coffer dam. When a diversion pipe is used, it shall be protected from cannabis cultivation activities and maintained to prevent debris blockage.
45.	Cannabis cultivators shall only divert water such that water does not scour the channel bed or banks at the downstream end. Cannabis cultivators shall divert flow in a manner that prevents turbidity, siltation, and pollution and provides flows to downstream reaches. Cannabis cultivators shall provide flows to downstream reaches during all times that the natural flow would have supported aquatic life. Flows shall be of sufficient quality and quantity, and of appropriate temperature to support fish and other aquatic life both above and below the diversion. Block netting and intake screens shall be sized to protect and prevent impacts to fish and wildlife.
46.	Once water has been diverted around the work area, cannabis cultivators may dewater the site to provide an adequately dry work area. Any muddy or otherwise contaminated water shall be pumped to a settling tank, dewatering filter bag, or upland area, or to another location approved by CDFW or the appropriate Regional Water Board Executive Officer prior to re-entering the watercourse.

47.	Upon completion of work, cannabis cultivators shall immediately remove the flow diversion structure in a manner that allows flow to resume with a minimum of disturbance to the channel substrate and that minimizes the generation of turbidity.
Watercourse Crossings	
48.	Cannabis cultivators shall ensure that watercourse crossings are designed by a Qualified Professional.
49.	Cannabis cultivators shall ensure that all access road watercourse crossing structures allow for the unrestricted passage of water and shall be designed to accommodate the estimated 100-year flood flow and associated debris (based upon an assessment of the streams potential to generate debris during high flow events). Watercourse crossings shall be designed and sized by a Qualified Professional. Consult CAL FIRE 100 year Watercourse Crossings document for examples and design calculations, available at: http://calfire.ca.gov/resource_mgt/downloads/100%20yr%20revised%208-08-17%20(final-a).pdf .
50.	Cannabis cultivators shall ensure that watercourse crossings allow migration of aquatic life during all life stages supported or potentially supported by that stream reach. Design measures shall be incorporated to ensure water depth and velocity does not inhibit migration of aquatic life. Any access road crossing structure on watercourses that support fish shall be constructed for the unrestricted passage of fish at all life stages, and should use the following design guidelines: <ul style="list-style-type: none"> • CDFW's <i>Culvert Criteria for Fish Passage</i>; • CDFW's <i>Salmonid Stream Habitat Restoration Manual, Volume 2, Part IX: Fish Passage Evaluation at Stream Crossings</i>; and • National Marine Fisheries Service, Southwest Region <i>Guidelines for Salmonid Passage at Stream Crossings</i>.
51.	Cannabis cultivators shall conduct regular inspection and maintenance of stream crossings to ensure crossings are not blocked by debris. Refer to California Board of Forestry Technical Rule No. 5 available at: http://www.calforests.org/wp-content/uploads/2013/10/Adopted-TRA5.pdf .
52.	Cannabis cultivators shall only use rock fords for temporary seasonal crossings on small watercourses where aquatic life passage is not required during the time period of use. Rock fords shall be oriented perpendicular to the flow of the watercourse and designed to maintain the range of surface flows that occur in the watercourse. When constructed, rock shall be sized to withstand the range of flow events that occur at the crossing and rock shall be maintained at the rock ford to completely cover the channel bed and bank surfaces to minimize soil compaction, rutting, and erosion. Rock must extend on either side of the ford up to the break in slope. The use of rock fords as watercourse crossings for all-weather access roads is prohibited.

53.	Cannabis cultivators shall ensure that culverts used at watercourse crossings are designed to direct flow and debris toward the inlet (e.g., use of wing-walls, pipe beveling, rock armoring, etc.) to prevent erosion of road fill, debris blocking the culvert, and watercourses from eroding a new channel.
54.	<p>Cannabis cultivators shall regularly inspect and maintain the condition of access roads, access road drainage features, and watercourse crossings. At a minimum, cannabis cultivators shall perform inspections prior to the onset of fall and winter precipitation and following storm events that produce at least 0.5 in/day or 1.0 inch/7 days of precipitation. Cannabis cultivators are required to perform all of the following maintenance upon discovery:</p> <ul style="list-style-type: none"> • Remove any wood debris that may restrict flow in a culvert. • Remove sediment that impacts access road or drainage feature performance. Place any removed sediment in a location outside the riparian setbacks and stabilize the sediment. • Maintain records of access road and drainage feature maintenance and consider redesigning the access road to improve performance and reduce maintenance needs.
55.	Cannabis cultivators shall compact access road crossing approaches and fill slopes during installation and shall stabilize them with rock or other appropriate surface protection to minimize surface erosion. When possible, cannabis cultivators shall ensure that access roads over culverts are equipped with a critical dip to ensure that, if the culvert becomes blocked or plugged, water can flow over the access road surface without washing away the fill prism. Access road crossings where specific conditions do not allow for a critical dip or in areas with potential for significant debris accumulation, shall include additional measures such as emergency overflow culverts or oversized culverts that are designed by a Qualified Professional.
56.	Cannabis cultivators shall ensure that culverts used at watercourse crossings are: 1) installed parallel to the watercourse alignment to the extent possible, 2) of sufficient length to extend beyond stabilized fill/sidecast material, and 3) embedded or installed at the same level and gradient of the streambed in which they are being placed to prevent erosion.
Soil Disposal and Spoils Management	
57.	Cannabis cultivators shall store soil, construction, and waste materials outside the riparian setback except as needed for immediate construction needs. Such materials shall not be stored in locations of known slope instability or where the storage of construction or waste material could reduce slope stability.
58.	Cannabis cultivators shall separate large organic material (e.g., roots, woody debris, etc.) from soil materials. Cannabis cultivators shall either place the large organic material in long-term, upland storage sites, or properly dispose of these materials offsite.

59.	Cannabis cultivators shall store erodible soil, soil amendments, and spoil piles to prevent sediment discharges in storm water. Storage practices may include use of tarps, upslope land contouring to divert surface flow around the material, or use of sediment control devices (e.g., silt fences, straw wattles, etc.).
60.	Cannabis cultivators shall contour and stabilize stored spoils to mimic natural slope contours and drainage patterns (as appropriate) to reduce the potential for fill saturation and slope failure.
61.	<p>For soil disposal sites cannabis cultivators shall:</p> <ul style="list-style-type: none"> • revegetate soil disposal sites with a mix of native plant species, • cover the seeded and planted areas with mulched straw at a rate of two tons per acre, and • apply non-synthetic netting or similar erosion control fabric (e.g., jute) on slopes greater than 2:1 if the site is erodible.
62.	Cannabis cultivators shall haul away and properly dispose of excess soil and other debris as needed to prevent discharge to waters of the state.
Riparian and Wetland Protection and Management	
63.	Cannabis cultivators shall not disturb aquatic or riparian habitat, such as pools, spawning sites, large wood, or shading vegetation unless authorized under a CWA section 404 permit, CWA section 401 certification, Regional Water Board WDRs (when applicable), or a CDFW LSA Agreement.
64.	Cannabis cultivators shall maintain existing, naturally occurring, riparian vegetative cover (e.g., trees, shrubs, and grasses) in aquatic habitat areas to the maximum extent possible to maintain riparian areas for streambank stabilization, erosion control, stream shading and temperature control, sediment and chemical filtration, aquatic life support, wildlife support, and to minimize waste discharge.
Water Storage and Use	
Water Supply, Diversion, and Storage	
65.	Cannabis cultivators shall only install, maintain, and destroy wells in compliance with county, city, and local ordinances and with California Well Standards as stipulated in California Department of Water Resources Bulletins 74-90 and 74-81 ¹⁵ .
66.	All water diversions for cannabis cultivation from a surface stream, subterranean stream flowing through a known and definite channel (e.g., groundwater well diversions from subsurface stream flows), or other surface waterbody are subject to the surface water Numeric and Narrative Instream Flow Requirements. This includes lakes, ponds, and springs (unless the spring is deemed exempt by the Deputy Director). See Section 3, Numeric and Narrative Instream Flow Requirements of this Attachment A for more information.

¹⁵ California Well Standards are available at: <http://wdl.water.ca.gov/groundwater/wells/standards.cfm>

67.	Groundwater diversions may be subject to additional requirements, such as a forbearance period, if the State Water Board determines those requirements are reasonably necessary to implement the purposes of this Policy.
68.	Cannabis cultivators are encouraged to use appropriate rainwater catchment systems to collect from impermeable surfaces (e.g., roof tops, etc.) during the wet season and store storm water in tanks, bladders, or off-stream engineered reservoirs to reduce the need for surface water or groundwater diversions.
69.	Cannabis cultivators shall not divert surface water unless it is diverted in accordance with an existing water right that specifies, as appropriate, the source, location of the point of diversion, purpose of use, place of use, and quantity and season of diversion. Cannabis cultivators shall maintain documentation of the water right at the cannabis cultivation site. Documentation of the water right shall be available for review and inspection by the Water Boards, CDFW, and any other authorized representatives of the Water Boards or CDFW.
70.	Cannabis cultivators shall ensure that all water diversion facilities are designed, constructed, and maintained so they do not prevent, impede, or tend to prevent the passing of fish, as defined by Fish and Game Code section 45, upstream or downstream, as required by Fish and Game Code section 5901. This includes but is not limited to the supply of water at an appropriate depth, temperature, and velocity to facilitate upstream and downstream aquatic life movement and migration. Cannabis cultivators shall allow sufficient water at all times to flow past the point of diversion to keep in good condition any fish that may be planted or exist below the point of diversion as defined by Fish and Game Code section 5937. Cannabis cultivators shall not divert water in a manner contrary to or inconsistent with these Requirements.
71.	Cannabis cultivators issued a Cannabis SIUR by the State Water Board shall not divert surface water unless in compliance with all additional Cannabis SIUR conditions required by CDFW.
72.	Water diversion facilities shall include satisfactory means for bypassing water to satisfy downstream prior rights and any requirements of policies for water quality control, water quality control plans, water quality certifications, waste discharge requirements, or other local, state or federal instream flow requirements. Cannabis cultivators shall not divert in a manner that results in injury to holders of legal downstream senior rights. Cannabis cultivators may be required to curtail diversions should diversion result in injury to holders of legal downstream senior water rights or interfere with maintenance of downstream instream flow requirements.

<p>73.</p>	<p>Fuel powered (e.g., gas, diesel, etc.) diversion pumps shall be located in a stable and secure location outside of the riparian setbacks unless authorized under a 404/401 CWA permit, a CDFW LSA Agreement, coverage under the Cannabis Cultivation General Order water quality certification, or site-specific WDRs issued by the Regional Water Board. Use of non-fuel powered diversion pumps (solar, electric, gravity, etc.) is encouraged.</p> <p>In all cases, all pumps shall:</p> <ul style="list-style-type: none"> a) be properly maintained, b) have suitable containment to ensure any spills or leaks do not enter surface waterbodies or groundwater, and c) have sufficient overhead cover to prevent exposure of equipment to precipitation.
<p>74.</p>	<p>No water shall be diverted unless the cannabis cultivator is operating the water diversion facility with a CDFW-approved water-intake screen (e.g., fish screen). The water intake screen shall be designed and maintained in accordance with screening criteria approved by CDFW. The screen shall prevent wildlife from entering the diversion intake and becoming entrapped. The cannabis cultivator shall contact the regional CDFW Office, LSA Program for information on screening criteria for diversion(s)¹⁶. The cannabis cultivator shall provide evidence that demonstrates that the water intake screen is in good condition whenever requested by the Water Boards or CDFW. Points of re-diversion from off-stream storage facilities that are open to the environment shall have a water intake screen, as required by CDFW.</p>
<p>75.</p>	<p>Cannabis cultivators shall inspect, maintain, and clean water intake screens and bypass appurtenances as directed by CDFW to ensure proper operation for the protection of fish and wildlife.</p>
<p>76.</p>	<p>Cannabis cultivators shall not obstruct, alter, dam, or divert any portion of a natural watercourse prior to obtaining all applicable permits and approvals. Permits may include a valid water right, 404/401 CWA permits, a CDFW LSA Agreement, coverage under the Cannabis Cultivation General Order water quality certification, or site-specific WDRs issued by the Regional Water Board.</p>
<p>77.</p>	<p>Cannabis cultivators shall plug, block, cap, disconnect, or remove the diversion intake or otherwise bypass flow or render the diversion intake incapable of diverting water for cannabis cultivation activities during the surface water forbearance period, unless the diversion intake is used for other beneficial uses, to ensure no water is diverted during that time.</p>
<p>78.</p>	<p>Cannabis cultivators shall not divert from a surface water or from a subterranean stream for cannabis cultivation at a rate more than a maximum instantaneous diversion rate of 10 gallons per minute, unless authorized under an existing appropriate water right.</p>

¹⁶ CDFW's Lake and Streambed program information is available at: <https://www.wildlife.ca.gov/Conservation/LSA> .

79.	<p>Onstream storage reservoirs are prohibited except in the following instances:</p> <ul style="list-style-type: none"> a) The cannabis cultivator has an existing water right with irrigation as a designated use, issued prior to October 31, 2017, that authorizes the onstream storage reservoir. b) The cannabis cultivator obtains an appropriative water right permit with irrigation as a designated use prior to diverting water into an onstream storage reservoir for cannabis cultivation. Cannabis cultivators with a pending application or an unpermitted onstream storage reservoir shall not divert for cannabis cultivation until the cannabis cultivator has obtained a valid water right. c) Cannabis cultivators with an unpermitted onstream reservoir that existed prior to October 1, 2016 may file for a Cannabis SIUR¹⁷. As part of filing for a Cannabis SIUR, the registrant shall agree to do the following: <ul style="list-style-type: none"> i. Request a determination from the Deputy Director (or designee) and CDFW to determine whether removal of the reservoir or installation of off-stream storage would cause more environmental damage than continuing to use the existing onstream reservoir for diversion and storage. ii. Accept any conditions imposed by the Deputy Director (or designee) and CDFW before or after issuance of the Cannabis SIUR as part of the determinations to ensure any modifications and ongoing operation of the onstream reservoir are protective of water quality and aquatic resources. If the Deputy Director (or designee) or CDFW determine the existing onstream reservoir does not meet this condition: <ul style="list-style-type: none"> (1) the reservoir and associated facilities shall be removed or otherwise modified such that the reservoir is incapable of storing water; and (2) the cannabis cultivator shall either install off-stream storage or obtain an alternative source of water or water right. iii. Operate or modify the onstream reservoir to: <ul style="list-style-type: none"> (1) bypass all inflow to the reservoir during the surface water diversion forbearance period (Section 3, Requirement 4). This requirement may be modified by the Deputy Director (or designee) or CDFW as part of the determinations and Cannabis SIUR; (2) comply with the diversion rate and diversion season bypass conditions (pursuant to Section 3, Requirements 5, 6, and 7). This requirement may be modified by the Deputy Director (or designee) or CDFW as part of the determinations and Cannabis SIUR; and (3) operate consistent with the other Requirements of this Policy. This requirement may be modified by the Deputy Director (or designee) as part of the determinations and Cannabis SIUR.
------------	---

¹⁷ Cannabis cultivators can apply for a Cannabis SIUR through the Water Boards online Cannabis Cultivation Program Application Portal available at: <https://public2.waterboards.ca.gov/cgo> .

	<ul style="list-style-type: none"> iv. Within six months of the determinations, the cannabis cultivator shall submit a draft compliance plan for review and approval by the Deputy Director (or designee). The compliance plan shall clearly identify the scope of work and schedule for completion of modifications necessary to operate the onstream reservoir in compliance with the determinations and Cannabis SIUR. The schedule for completion must comply with the timeline established by the Deputy Director (or designee) and shall not exceed the renewal date of the Cannabis SIUR Certificate¹⁸. The Deputy Director (or designee) may require modifications prior to approving the draft compliance plan. v. Withdrawal of water from the onstream reservoir for cannabis cultivation activities is only allowed during the surface water diversion forbearance period. d) Onstream reservoirs with an existing valid water right registration for onstream storage that does not identify commercial irrigation as a purpose of use (i.e., Livestock Stockpond Use Registrations, Small Domestic Use Registrations) may file for a Cannabis SIUR, thereby requesting Deputy Director (or designee) and CDFW to make determinations and condition the Cannabis SIUR after issuance with appropriate conditions as outlined in (c)(i), (c)(ii), (c)(iii), (c)(iv), and (c)(v) above, with the exception of (c)(ii)(1) which does not apply.
<p>80.</p>	<p>The State Water Board may impose conditions for each individual SIUR for an onstream reservoir for cannabis cultivation to:</p> <ul style="list-style-type: none"> a) Ensure that individual and cumulative effects of water diversion and discharge associated with cultivation do not affect the instream flows needed for fish spawning, migration, and rearing, and the flows needed to maintain natural flow variability; b) Ensure that cultivation does not negatively impact springs, riparian habitat, wetlands, or aquatic habitat; and c) Otherwise protect fish, wildlife, fish and wildlife habitat, and water quality. <p>Each SIUR filing for an onstream reservoir for cannabis cultivation shall include self-certification that the registrant has agreed to comply with all lawful conditions required by the State Water Board pursuant to this term. The SIUR Certificate shall include a copy of any conditions required by the State Water Board pursuant to this term.</p>
<p>81.</p>	<p>Cannabis cultivators are encouraged to install separate storage systems for water diverted for cannabis irrigation and water diverted for any other beneficial uses¹⁹, or otherwise shall install separate measuring devices to quantify diversion to and from each storage facility, including the quantity of water diverted and the quantity, place, and purpose of use (e.g., cannabis irrigation, other crop irrigation, domestic, etc.) for the stored water.</p>

¹⁸ SIURs are subject to renewal every five years.

¹⁹ Other beneficial uses of water include: domestic, irrigation, power, municipal, mining, industrial, fish and wildlife preservation and enhancement, aquaculture, recreational, stockwatering, water quality, frost protection, and heat control. (California Code of Regulations, Title 23 sections 659-672).

82.	<p>The cannabis cultivator shall install and maintain a measuring device(s) for surface water or subterranean stream diversions. The measuring device shall be, at a minimum equivalent to the requirements for direct diversions greater than 10 acre-feet per year in California Code of Regulations, Title 23, Division 3, Chapter 2.7 and Chapter 2.8²⁰. The measuring device(s) shall be located as close to the point of diversion as reasonable. Cannabis cultivators shall maintain daily diversion records for water diverted for cannabis cultivation. Cannabis cultivators shall maintain separate records that document the amount of water used for cannabis cultivation separated out from the amount of water used for other irrigation purposes and other beneficial uses of water (e.g., domestic, fire protection, etc.). Cannabis cultivators shall maintain daily diversion records at the cultivation site and shall make the records available for review or by request by the Water Boards, CDFW, or any other authorized representatives of the Water Boards or CDFW. Daily diversion records shall be retained for a minimum of five years. Compliance with this term is required for any surface water diversion for cannabis cultivation, even those under 10 acre-feet per year.</p>
83.	<p>Cannabis cultivators with onstream reservoirs shall install and maintain a measuring device capable of meeting the requirements below to monitor and record the rate of diversion, the rate of collection to storage, the rate of withdrawal or release from storage, and the total volume of water collected in the onstream reservoir.</p> <ol style="list-style-type: none"> a) The measurement device (e.g., water level sensor and area-capacity curve) shall be certified to measure the total volume of water diverted or stored accurate to within ± 10 percent by volume based on periodic testing of the installed device. b) The measurement device shall be capable of recording the date, time, and volume of water diverted at an hourly or more frequent basis, year-round. c) The measurement device shall be installed and calibrated by a Qualified Professional. This includes the development of any area-capacity curve used to convert water elevation to volume. Cannabis cultivators shall submit a description of the type of measurement device, evidence of proper installation and operation of the device, and the area-capacity curve to the Deputy Director (or designee) for review and approval within two years of the date the Cannabis SIUR is issued. d) To assess continued accuracy of depth readings recorded by the measurement device, a staff gage shall also be installed in the same pond or reservoir as the measurement device and manual depth readings from the staff gage and the date and time of the depth readings shall be recorded monthly, at a minimum. The area-capacity curve shall be reassessed if requested by the Deputy Director (or designee). e) Cannabis cultivators shall maintain hourly depth and volume records from the measurement device and area-capacity curves at the cultivation site and shall make the records available for review upon request by staff from the Water Boards or CDFW. f) Depth and volume records and area-capacity curves shall be retained for a minimum of five years.

²⁰ Additional information on measuring devices may be found at: https://www.waterboards.ca.gov/waterrights/water_issues/programs/diversion_use/water_use.shtml#measurement

<p>84.</p>	<p>The State Water Board intends to develop and implement a basin-wide program for real-time electronic monitoring and reporting of diversions, withdrawals, releases and streamflow in a standardized format if and when resources become available. Such real-time reporting will be required upon a showing by the State Water Board that the program and the infrastructure are in place to accept real-time electronic reports. Implementation of the reporting requirements shall not necessitate amendment to this requirement.</p>
<p>85.</p>	<p>Cannabis cultivators shall not use reservoirs and ponds to store water for cannabis cultivation unless they are sited and designed or approved by a Qualified Professional in compliance with Division of Safety of Dams (DSOD), county, and/or city requirements, as applicable. If the DSOD, county, and/or city do not have established requirements, they shall be designed consistent with the Natural Resource Conservation Service National Engineering Manual. Reservoirs shall be designed with an adequate overflow outlet that is protected and promotes the dispersal and infiltration of flow and prevents channelization.</p> <p>All off-stream storage reservoirs and ponds shall be designed, managed, and maintained to accommodate average annual winter period precipitation and storm water inputs to reduce the potential for overflow.</p> <p>Cannabis cultivators shall plant native vegetation along the perimeter of the reservoir in locations where it does not impact the structural integrity of the reservoir berm or spillway. The cannabis cultivator shall control vegetation around the reservoir berm and spillway to allow for visual inspection of berm and spillway condition and control burrowing animals as necessary.</p>
<p>86.</p>	<p>Cannabis cultivators shall implement an invasive species management plan prepared by a Qualified Biologist for any existing or proposed water storage facilities that are open to the environment. The plan shall include, at a minimum, an annual survey for bullfrogs and other invasive aquatic species. If bullfrogs or other invasive aquatic species are identified, eradication measures shall be implemented under the direction of a Qualified Biologist, if appropriate, after consultation with CDFW (pursuant to Fish and Game Code section 6400). Eradication methods can be direct or indirect. Direct methods may include hand-held dip net, hook and line, lights, spears, gigs, or fish tackle under a fishing license (pursuant to Fish and Game Code section 6855). An indirect method may involve seasonally timed complete dewatering and a drying period of the off-stream storage facility under a Permit to Destroy Harmful Species (pursuant to Fish and Game Code section 5501) issued by CDFW.</p>
<p>87.</p>	<p>Water storage bladders are not encouraged for long-term use. If bladders are used, the cannabis cultivator shall ensure that the bladder is designed and properly installed to store water and that the bladder is sited to minimize the potential for water to flow into a watercourse in the event of a catastrophic failure. If a storage bladder has been previously used, the cannabis cultivator shall carefully inspect the bladder to confirm its integrity and confirm the absence of any interior residual chemicals prior to resuming use. Cannabis cultivators shall periodically inspect water storage bladders and containment features to ensure integrity. Water storage bladders shall be properly disposed of or recycled and not resold when assurance of structural integrity is no longer guaranteed.</p>

88.	Cannabis cultivators shall not use water storage bladders unless the bladder is safely contained within a secondary containment system with sufficient capacity to capture 110 percent of a bladder's maximum possible contents in the event of bladder failure (i.e., 110 percent of bladder's capacity). Secondary containment systems shall be of sufficient strength and stability to withstand the forces of released contents in the event of catastrophic bladder failure. In addition, secondary containment systems that are open to the environment shall be designed and maintained with sufficient capacity to accommodate precipitation and storm water inputs from a 25-year, 24-hour storm event.
89.	Cannabis cultivators shall not cause or allow any overflow from off-stream water storage facilities that are closed to the environment (e.g., tanks and bladders) if the off-stream facilities are served by a diversion from surface water or groundwater. Cannabis cultivators shall on a monthly basis, at a minimum, inspect for and repair all leaks of the diversion and storage system. Written records describing the date, time, and nature of such inspections and repairs shall be kept on-site for a period of at least two years. Such written records shall be made available for review by Water Boards or CDFW, and any other authorized representatives of the Water Boards or CDFW.
90.	Water storage tanks, bladders, and other off-stream water storage facilities that are closed to the environment shall not be located in a riparian setback or next to equipment that generates heat. Cannabis cultivators shall place water storage tanks, bladders, and other off-stream water storage facilities that are closed to the environment in areas that allow for ease of installation, access, maintenance, and minimize road development.
91.	Cannabis cultivators shall install storage tanks according to manufacturer's specifications and shall place tanks on properly compacted soil that is free of rocks and sharp objects and capable of bearing the weight of the tank and its maximum contents with minimal settlement. Cannabis cultivators shall maintain a written or electronic copy of the manufacturer's specifications for each storage tank installed and used for cannabis cultivation activities, if available from the manufacturer in hardcopy or on the internet. Tanks shall not be located in areas of slope instability. Cannabis cultivators shall install water storage tanks capable of containing more than 8,000 gallons only on a reinforced concrete pad providing adequate support and enough space to attach a tank restraint system (anchor using the molded-in tie down lugs with moderate tension, being careful not to over-tighten) per the recommendations of a Qualified Professional. Nothing in this requirement supersedes other applicable state, county, or local requirements for the installation of water storage tanks, whichever is more stringent shall apply.
92.	To prevent rupture or overflow and runoff, cannabis cultivators shall only use water storage tanks and bladders equipped with a float valve, or equivalent device, to shut off diversion when storage systems are full. Cannabis cultivators shall install any other measures necessary to prevent overflow of storage systems to prevent runoff and the diversion of more water than can be used and/or stored.
93.	Cannabis cultivators shall ensure that all vents and other openings on water storage tanks are designed to prevent the entry and/or entrapment of wildlife.

<p>94.</p>	<p>Cannabis cultivators shall retain, for a minimum of five years, appropriate documentation for any hauled water²¹ used for cannabis cultivation. Documentation for hauled water shall include, for each delivery, the following:</p> <ul style="list-style-type: none"> a) A receipt that shows the date of delivery and the name, address, license plate number, and license plate issuing state for the water hauler, b) A copy of the Water Hauler’s License, if applicable (California Health and Safety Code section 111120), c) A copy of proof of the Water Hauler’s water right, groundwater well, or other authorization to take water, and the location of the water source, and d) The quantity of water delivered or picked up from a water source, in gallons. <p>Documentation shall be made available, upon request, to Water Boards or CDFW staff and any other authorized representatives of the Water Boards or CDFW.</p>
<p style="text-align: center;">Water Conservation and Use</p>	
<p>95.</p>	<p>Cannabis cultivators shall on a monthly basis, at a minimum, inspect their entire water delivery system for leaks and immediately repair any leaky faucets, pipes, connectors, or other leaks.</p>
<p>96.</p>	<p>Cannabis cultivators shall use weed-free mulch in cultivation areas that do not have ground cover to conserve soil moisture and minimize evaporative loss.</p>
<p>97.</p>	<p>Cannabis cultivators shall implement water conserving irrigation methods (e.g., drip or trickle irrigation, micro-spray, or hydroponics).</p>
<p>98.</p>	<p>Cannabis cultivators shall maintain daily records of all water used for irrigation of cannabis. Daily records may be calculated by the use of a measuring device or, if known, by calculating the irrigation system rates and duration of time watered (e.g., irrigating for one hour twice per day using 50 half-gallon irrigation emitters equates to 50 gallons per day (1 hour x 2 times per day x 50 irrigation emitters x 0.5 gallons per irrigation emitter per hour) of water used for irrigation). Cannabis cultivators shall retain, for a minimum of five years, irrigation records at the cannabis cultivation site and shall make all irrigation records available for review by the Water Boards, CDFW, and any other authorized representatives of the Water Boards or CDFW.</p>
<p style="text-align: center;">Irrigation Runoff</p>	
<p>99.</p>	<p>Cannabis cultivators shall on a weekly basis, at a minimum, during period of use inspect for leaks in mainlines²², laterals²³, in irrigation connections, sprinkler heads, irrigation emitters, or at the ends of drip tape and feeder lines and immediately repair any leaks found upon detection.</p>

²¹ Water hauler means any person who hauls water in bulk by any means of transportation.

²² Mainlines are pipes that go from the water source to the control valves.

²³ Laterals are the pipes between the control valves and the sprinkler heads or irrigation emitters.

100.	The irrigation system shall be designed to include redundancy (e.g., safety valves) in the event that leaks occur, so that waste of water and runoff is prevented and minimized.
101.	Cannabis cultivators shall regularly replace worn, outdated, or inefficient irrigation system components and equipment to ensure a properly functioning, leak-free, and efficient irrigation system at all times.
102.	Cannabis cultivators shall minimize irrigation deep percolation ²⁴ by applying irrigation water at agronomic rates.
Fertilizers, Pesticides, and Petroleum Products	
103.	Cannabis cultivators shall not mix, prepare, over apply, or dispose of agricultural chemicals/products (e.g., fertilizers, pesticides ²⁵ , and other chemicals as defined in the applicable water quality control plan) in any location where they could enter the riparian setback or waters of the state. The use of agricultural chemicals inconsistently with product labeling, storage instructions, or DPR requirements for pesticide applications ²⁶ is prohibited. Disposal of unused product and containers shall be consistent with labels.
104.	Cannabis cultivators shall keep and use absorbent materials designated for spill containment and spill cleanup equipment on-site for use in an accidental spill of fertilizers, petroleum products, hazardous materials, and other substances which may degrade waters of the state. The cannabis cultivator shall immediately notify the California Office of Emergency Services at 1-800-852-7550 and immediately initiate cleanup activities for all spills that could enter a waterbody or degrade groundwater.

²⁴ Deep percolation occurs when excess irrigation water is applied and percolates below the plant root zone.

²⁵ Pesticide is defined as follows:

- Per California Code of Regulations Title 3. Division 6. Section 6000:
 - (a) Any substance or mixture of substances that is a pesticide as defined in the Food and Agricultural Code and includes mixtures and dilutions of pesticides;
 - (b) As the term is used in Section 12995 of the California Food and Agricultural Code, includes any substance or product that the user intends to be used for the pesticidal purposes specified in Sections 12753 and 12758 of the Food and Agricultural Code.
- Per California Food and Agricultural Code section 12753(b), the term “Pesticide” includes any of the following: Any substance, or mixture of substances which is intended to be used for defoliating plants, regulating plant growth, or for preventing, destroying, repelling, or mitigating any pest, as defined in Section 12754.5, which may infest or be detrimental to vegetation, man, animals, or households, or be present in any agricultural or nonagricultural environment whatsoever.
- In laymen’s terms: “pesticide” includes: rodenticides, herbicides, insecticides, fungicides, and disinfectants.

²⁶ More information on DPR requirements is available at: http://www.cdpr.ca.gov/docs/legbills/laws_regulations.htm, <http://www.cdpr.ca.gov/docs/county/cacltrs/penfltrs/penf2017/2017atch/attach0301.pdf>, and <http://www.cdpr.ca.gov/docs/cannabis/index.htm>

105.	Cannabis cultivators shall establish and use a separate storage area for pesticides, and fertilizers, and another storage area for petroleum or other liquid chemicals (including diesel, gasoline, oils, etc.). All such storage areas shall comply with the riparian setback Requirements, be in a secured location in compliance with label instructions, outside of areas of known slope instability, and be protected from accidental ignition, weather, and wildlife. All storage areas shall have appropriate secondary containment structures, as necessary, to protect water quality and prevent spillage, mixing, discharge, or seepage. Storage tanks and containers must be of suitable material and construction to be compatible with the substances stored and conditions of storage, such as pressure and temperature.
106.	Throughout the wet season, cannabis cultivators shall ensure that any temporary storage areas have a permanent cover and side-wind protection or be covered during non-working days and prior to and during rain events.
107.	Cannabis cultivators shall only use hazardous materials ²⁷ in a manner consistent with the product's label.
108.	Cannabis cultivators shall only keep hazardous materials in their original containers with labels intact, and shall store hazardous materials to prevent exposure to sunlight, excessive heat, and precipitation. Cannabis cultivators shall provide secondary containment for hazardous materials to prevent possible exposure to the environment. Disposal of unused hazardous materials and containers shall be consistent with the label.
109.	Cannabis cultivators shall only mix, prepare, apply, or load hazardous materials outside of the riparian setbacks.
110.	Cannabis cultivators shall not apply agricultural chemicals within 48 hours of any weather pattern that is forecast to have a 50 percent or greater chance of precipitation of 0.25 inches or greater per 24 hours. In the Lake Tahoe Hydrologic Unit, cannabis cultivators shall not apply agricultural chemicals within 48 hours of any weather pattern that is forecast to have a 30 percent or greater chance of precipitation greater than 0.1 inch per 24 hours. This requirement may be updated based on amendments to the Lahontan Regional Water Board construction storm water general order.
Fertilizers and Soils	
111.	To minimize infiltration and water quality degradation, cannabis cultivators shall irrigate and apply fertilizer consistent with the crop need (i.e., agronomic rate).

²⁷ A hazardous material is any item or agent (biological, chemical, radiological, and/or physical), which has the potential to cause harm to humans, animals, or the environment, either by itself or through interaction with other factors.

112.	When used, cannabis cultivators shall apply nitrogen to cannabis cultivation areas consistent with crop need (i.e., agronomic rate). Cannabis cultivators shall not apply nitrogen at a rate that may result in a discharge to surface water or groundwater that causes or contributes to exceedance of water quality objectives, and no greater than 319 pounds/acre/year unless plant tissue analysis performed by a qualified individual demonstrates the need for additional nitrogen application. The analysis shall be performed by an agricultural laboratory certified by the State Water Board's Environmental Laboratory Accreditation Program.
113.	Cannabis cultivators shall ensure that potting soil or soil amendments, when not in use, are placed and stored with covers, when needed, to protect from rainfall and erosion, to prevent discharge to waters of the state, and to minimize leaching of waste constituents into groundwater.
Pesticides and Herbicides	
114.	Cannabis cultivators shall not apply restricted materials, including restricted pesticides, or allow restricted materials to be stored at the cannabis cultivation site.
115.	Cannabis cultivators shall implement integrated pest management strategies where possible to reduce the need and use of pesticides and the potential for discharges to waters of the state ²⁸ .
Petroleum Products and Other Chemicals	
116.	Cannabis cultivators shall only refuel vehicles or equipment outside of riparian setbacks. Cannabis cultivators shall inspect all equipment using oil, hydraulic fluid, or petroleum products for leaks prior to use and shall monitor equipment for leakage. Stationary equipment (e.g., motors, pumps, generators, etc.) and vehicles not in use shall be located outside of riparian setbacks. Spill and containment equipment appropriate for the conditions at and near the site (e.g., oil spill booms if surface water could be impacted by a spill, sorbent pads, etc.) shall be stored onsite at all locations where equipment is used or staged.
117.	Cannabis cultivators shall store petroleum, petroleum products, and similar fluids in a manner that provides chemical compatibility, provides secondary containment, and protection from accidental ignition, the sun, wind, and rain.
118.	Use of an underground storage tank(s) for the storage of petroleum products is allowed if compliant with all applicable federal, state, and local laws; regulations; and permitting requirements.

²⁸ <https://www.epa.gov/safepestcontrol/integrated-pest-management-ipm-principles>

Cultivation-Related Waste

119.	<p>Cannabis cultivators shall contain and regularly remove all debris and trash associated with cannabis cultivation activities from the cannabis cultivation site. Cannabis cultivators shall only dispose of debris and trash at an authorized landfill or other disposal site in compliance with state and local laws, ordinances, and regulations. Cannabis cultivators shall not allow litter, plastic, or similar debris to enter the riparian setback or waters of the state. Cannabis plant material may be disposed of onsite in compliance with any applicable CDFA license conditions.</p>
120.	<p>Cannabis cultivators shall only dispose or reuse spent growth medium (e.g., soil and other organic media) in a manner that prevents discharge of soil and residual nutrients and chemicals to the riparian setback or waters of the state. Spent growth medium shall be covered with plastic sheeting or stored in water tight dumpsters prior to proper disposal or reuse. Spent growth medium should be disposed of at an authorized landfill or other disposal site in compliance with state and local laws, ordinances, and regulations. Proper reuse of spent growth medium may include incorporation into garden beds or spreading on a stable surface and revegetating the surface with native plants. Cannabis cultivators shall use erosion control techniques, as needed, for any reused or stored spent growth medium to prevent polluted runoff.</p>
121.	<p>Wastewater tanks or storage containers must be rigid, enclosed to the environment, and appropriately designed to hold wastewater. They shall not be located within the riparian setback. Cannabis cultivators shall place wastewater storage tanks in areas that allow for ease of installation, access, maintenance, and minimize road development.</p> <p>Cannabis cultivators shall install tanks according to manufacturer's specifications and shall place tanks on properly compacted soil or other surface (e.g., concrete) that is free of rocks and sharp objects and capable of bearing the weight of the tank and its maximum contents with minimal settlement. Cannabis cultivators shall maintain a written or electronic copy of the manufacturer's specifications for each tank installed and used for cannabis cultivation activities, if available from the manufacturer in hardcopy or on the internet.</p> <p>Tanks shall not be located in areas of slope instability or next to equipment that generates heat. Cannabis cultivators shall install wastewater storage tanks capable of containing more than 8,000 gallons only on a reinforced concrete pad providing adequate support and enough space to attach a tank restraint system (anchor using the molded-in tie down lugs with moderate tension, being careful not to over-tighten) per the recommendations of a Qualified Professional.</p> <p>To prevent rupture or overflow and runoff, cannabis cultivators shall only use wastewater storage tanks equipped with a float valve, or equivalent device, to shut off inflow when storage systems are full. Cannabis cultivators shall install any other measures necessary to prevent overflow of storage systems and prevent spills or leaks. Cannabis cultivators shall regularly inspect for and repair all leaks of the storage system.</p> <p>Nothing in this requirement supersedes other applicable state, county, or local requirements for the installation of wastewater tanks or storage containers, whichever is more stringent shall apply.</p>

122.	<p>Cannabis cultivators shall retain, for a minimum of five years, appropriate documentation for any industrial wastewater collected to a storage tank for disposal at a permitted wastewater facility that accepts cannabis cultivation wastewater. Documentation for hauled industrial wastewater shall include, for each delivery, the following:</p> <ul style="list-style-type: none"> a) A receipt that shows the date of pickup and the name, address, license plate number, and license plate issuing state for the industrial wastewater hauler; b) A copy of the wastewater hauler's permit; and c) The quantity of industrial wastewater picked up, in gallons. <p>Documentation shall be made available, upon request, to Water Boards or CDFW staff and any other authorized representatives of the Water Boards or CDFW.</p>
Refuse and Domestic Waste	
123.	<p>Cannabis cultivators shall ensure that debris, soil, silt, bark, slash, sawdust, rubbish, creosote-treated wood, raw cement and concrete or washings thereof, asphalt, paint or other coating material, oil or other petroleum products, or any other substances which could be hazardous to any life stage of fish and wildlife or their habitat (including food sources) does not contaminate soil or enter the riparian setback or waters of the state.</p>
124.	<p>Cannabis cultivators shall not dispose of domestic wastewater unless it meets applicable local agency and/or Regional Water Board requirements. Cannabis cultivators shall ensure that human or animal waste is disposed of properly. Cannabis cultivators shall ensure onsite wastewater treatment systems (e.g., septic system) are permitted by the local agency or applicable Regional Water Board.</p>
125.	<p>If used, chemical toilets or holding tanks shall be maintained in a manner appropriate for the frequency and conditions of usage, sited in stable locations, and comply with the riparian setback Requirements.</p>
Winterization	
126.	<p>Cannabis cultivators shall implement all applicable Erosion Control and Soil Disposal and Spoils Management Requirements in addition to the Winterization Requirements below by the onset of the winter period.</p>
127.	<p>Cannabis cultivators shall block or otherwise close any temporary access roads to all motorized vehicles no later than the onset of the winter period each year.</p>
128.	<p>Cannabis cultivators shall not operate heavy equipment of any kind at the cannabis cultivation site during the winter period, unless authorized (1) in a site management plan as described below, or (2) for emergency repairs contained in an enforcement order issued by the State Water Board, Regional Water Board, or other agency having jurisdiction. Use of heavy equipment (e.g. agricultural equipment) for routine cannabis cultivation soil preparation or planting may be authorized in a site</p>

	<p>management plan approved by the applicable Regional Water Board Executive Officer or designee if both of the following conditions are met:</p> <ul style="list-style-type: none"> a) all soil preparation and planting activities occur outside of the riparian setbacks; and b) all soil preparation and planting activities are located on an average slope equal to or less than five percent (5%) (e.g., valley floor). 								
129.	<p>Cannabis cultivators shall apply linear sediment controls (e.g., silt fences, wattles, etc.) along the toe of the slope, face of the slope, and at the grade breaks of exposed slopes to comply with sheet flow length²⁹ at the frequency specified below or as authorized in a site management plan approved by the applicable Regional Water Board Executive Officer or designee.</p> <table border="1" style="margin-left: auto; margin-right: auto;"> <thead> <tr> <th style="text-align: center;">Slope (percent)</th> <th style="text-align: center;">Sheet Flow Length Not to Exceed (feet)</th> </tr> </thead> <tbody> <tr> <td style="text-align: center;">0 – 25</td> <td style="text-align: center;">20</td> </tr> <tr> <td style="text-align: center;">25 – 50</td> <td style="text-align: center;">15</td> </tr> <tr> <td style="text-align: center;">>50</td> <td style="text-align: center;">10</td> </tr> </tbody> </table>	Slope (percent)	Sheet Flow Length Not to Exceed (feet)	0 – 25	20	25 – 50	15	>50	10
Slope (percent)	Sheet Flow Length Not to Exceed (feet)								
0 – 25	20								
25 – 50	15								
>50	10								
130.	<p>Cannabis cultivators shall maintain all culverts, drop inlets, trash racks and similar devices to ensure they are not blocked by debris or sediment. The outflow of culverts shall be inspected to ensure erosion is not undermining the culvert. Culverts shall be inspected prior to the onset of fall and winter precipitation and following precipitation events that produce at least 0.5 in/day or 1.0 inch/7 days of precipitation to determine if maintenance or cleaning is required.</p>								
131.	<p>Cannabis cultivators shall stabilize all disturbed areas and construction entrances and exits to control erosion and sediment discharges from land disturbance.</p>								
132.	<p>Cannabis cultivators shall cover and berm all loose stockpiled construction materials (e.g., soil, spoils, aggregate, etc.) that are not actively (scheduled for use within 48 hours) being used as needed to prevent erosion by storm water. The cannabis cultivator shall have adequate cover and berm materials available onsite if the weather forecast indicates a probability of precipitation.</p>								
133.	<p>Cannabis cultivators shall apply erosion repair and control measures to the bare ground (e.g., cultivation area, access paths, etc.) to prevent discharge of sediment to waters of the state.</p>								
134.	<p>As part of the winterization plan approval process, the Regional Water Board may require cannabis cultivators to implement additional site-specific erosion and sediment control requirements if the implementation of the Requirements in this section do not adequately protect water quality.</p>								

²⁹ Sheet flow length is the length that shallow, low velocity flow travels across a site.

SECTION 3 – NUMERIC AND NARRATIVE INSTREAM FLOW REQUIREMENTS (INCLUDING GAGING)

This section outlines the Numeric and Narrative Instream Flow Requirements established in this Policy.

Narrative Instream Flow Requirements apply to all diversions of surface water and groundwater for cannabis cultivation throughout California. Numeric Instream Flow Requirements are developed at compliance gages throughout California.

Narrative Instream Flow Requirements

Instream Flow Requirements for Surface Water Diversions

1. **Applicability:** Surface water instream flow Requirements apply to anyone diverting water for cannabis cultivation from a waterbody. A waterbody is defined as any significant accumulation of water, such as: lakes, ponds, rivers, streams, creeks, springs³⁰, artesian wells, wetlands, and canals. Surface water instream flow Requirements also apply to water diverted from a subterranean stream flowing through a known and definite channel.
2. **Retail Water Suppliers**³¹: The instream flow Requirements and forbearance period listed in this section shall not apply to retail water suppliers, as defined in Section 13575 of the Water Code³², whose primary beneficial use is municipal or domestic, unless any of the following circumstances are present:
 - a. the retail water supplier has 10 or fewer customers and delivers water that is used for cannabis cultivation;
 - b. the retail water supplier delivers 10 percent or more of the diverted water to one or more cannabis cultivator(s) or cannabis cultivation site(s), as established by an assessor's parcel number;
 - c. 25 percent or more of the water delivered by the retail water supplier is used for cannabis cultivation; or
 - d. a cannabis cultivator and the retail water supplier are affiliates, as defined in California Code of Regulations, title 23, section 2814.20.
3. **Exempt Springs:** Cannabis cultivators claiming, pursuant to Business and Professions Code section 26060.1(a)(2)(A)(iv) or section 26060.1(a)(2)(B)(iii), that a spring or artesian well does not flow off their property by surface or subterranean (subsurface) means in the absence of diversion, may request an exemption from the Policy's Narrative Instream Flow Requirements 4 (Surface Water Dry Season Forbearance Period) and 5 (Surface Water Wet Season Diversion Period). All requests for fully contained spring exemptions must be submitted online through the Water Boards

³⁰ A spring is an area where there is concentrated discharge of groundwater that flows at the ground surface. A spring may flow any part of the year. For the purpose of this Policy, a spring does not have a defined bed and banks. Surface water instream flow Requirements apply to both natural springs and springs that are modified to improve production such as, installing piping and spring boxes/wells.

³¹ Business and Professions Code section 26060.1(a)(1)(B).

³² Under Water Code section 13575(b)(5), "Retail water supplier" means any local entity, including a public agency, city, county, or private water company that provides retail water service.

Cannabis Cultivation Program Application Portal³³. Cannabis cultivators requesting an exemption must obtain a Cannabis Small Irrigation Use Registration (Cannabis SIUR), and provide substantial evidence to support the fully contained spring exemption request. The substantial evidence shall demonstrate that, in the absence of diversions, the spring or artesian well does not have surface or subsurface hydrologic connectivity to a surface water at any time of year during all water year types³⁴. The substantial evidence must be documented by a Qualified Professional. For purposes of this requirement, Qualified Professionals include California-registered Professional Geologists or other classifications of professions approved by the Deputy Director for Water Rights (Deputy Director). A list of Qualified Professionals that may document the substantial evidence required per this requirement will be maintained on the Water Rights section of the State Water Board's Cannabis Cultivation Fully Contained Springs webpage³⁵. The Deputy Director may require additional information from the cannabis cultivator to support the request. If, after reviewing the submitted evidence and analysis, the Deputy Director concurs that the cannabis cultivator has made the required showing, the cannabis cultivator may be exempted from the Policy's Narrative Instream Flow Requirements 4 and 5 and may request to revoke the associated Cannabis SIUR. Springs or artesian wells that are deemed exempt shall comply with the Policy's 50 percent visual bypass requirement (Narrative Instream Flow Requirement 6) to support aquatic and riparian habitat. In addition, springs or artesian wells that are deemed exempt shall be subject to the Requirements for Groundwater Diversions (Narrative Instream Flow Requirement 8) to address the potential cumulative impacts of groundwater diversions, to which diversions from the spring or artesian well may contribute. Notwithstanding such exemptions, all other applicable Requirements of this Policy remain in force.

4. **Surface Water Dry Season Forbearance Period:** Cannabis cultivators shall not divert surface water for cannabis cultivation activities at any time from April 1 through October 31 of each calendar year, unless the water diverted is delivered from storage in compliance with Narrative Flow Requirement 4.
 - a. From April 1, 2018 through October 31, 2018, cannabis cultivators diverting under a valid water right or claim of right and without authorized storage are not subject to a dry season forbearance period if the following Requirements are met:
 - i. Cannabis cultivators subject to Requirement 4.a. may only divert during this period in a manner consistent with their permit/license or claim of right. All other applicable requirements of the Policy shall remain in force.
 - ii. Prior to diverting water for cannabis cultivation during April 1, 2018 through October 31, 2018 cannabis cultivators subject to Requirement 4.a shall file for a Cannabis SIUR or submit an application for an appropriate water right permit to obtain storage sufficient to support their cannabis cultivation during future forbearance periods.
 - iii. As soon as possible after storage has been authorized, following the conclusion of the winter period, cannabis cultivators subject to Requirement 4.a shall begin installing and diverting to off-stream storage to prepare for a potential curtailment during the dry season of 2018

³³ Water Boards Cannabis Cultivation Program Application Portal: <https://public2.waterboards.ca.gov/cgo>

³⁴ Including during any precipitation and runoff events.

³⁵ State Water Board's Cannabis Cultivation Fully Contained Springs webpage: https://www.waterboards.ca.gov/water_issues/programs/cannabis/fully_contained_springs.html

(triggered by the Aquatic Base Flow Numeric Instream Flow Requirement).

- iv. Requirement 4 shall apply with full force to cannabis cultivators described in Requirement 4.a who fail to comply with Requirement 4.a.ii and/or 4.a.iii.
5. **Surface Water Wet Season Diversion Period:** The authorized surface water diversion period is November 1 through March 31. During this diversion period, cannabis cultivators may only divert surface water for cannabis cultivation when water is available for diversion under the cannabis cultivator's priority of right and the applicable Numeric Flow Requirement (Section 4) is met at the assigned compliance gage. This includes direct diversion and diversion to storage.

From November 1 through December 14 of each year, the surface water diversion period shall not begin until after seven consecutive days in which the surface waterbody's real-time daily average flow is greater than the Numeric Flow Requirement (applicable minimum monthly instream flow Requirement in Section 4). The first day of the seven consecutive days must occur on or after October 25. After the seventh consecutive day with average flow greater than the Numeric Flow Requirement, surface water diversions may occur on any subsequent days in which the real-time daily average flow is greater than the Numeric Instream Flow Requirement (applicable minimum monthly instream flow Requirement in Section 4)³⁶.

Numeric Instream Flow Requirements (minimum instream flows) are established throughout the State and are calculated for the majority of USGS National Hydrography Dataset Plus Version 2 stream reaches where the USGS flow modeling data are available. Cannabis cultivators that divert water from a waterbody are required to ensure that the prior day's average flow, as published on the State Water Board's online mapping tool (see Section 4, Watershed Compliance Gage Assignments for more information), exceeds the minimum monthly instream flow Requirement at the cannabis cultivator's assigned compliance gage. Cannabis cultivators shall verify and document compliance with the applicable minimum instream flows on a daily basis for each day of surface water diversion.

6. **Surface Water Flow Bypass:** In addition to Narrative Flow Requirement 5, cannabis cultivators shall bypass a minimum of 50 percent of the surface water flow past their point of diversion at all times, as estimated based on visually observing surface water flow at least daily. The surface water flow bypass requirement applies to cannabis cultivators diverting under a riparian or a pre-1914 appropriative claim of right and without authorized storage even if they qualify for the 2018 Surface Water Dry Season Forbearance Period waiver (Requirement 4.a.)

³⁶ For example, if the daily average flows on each day from October 27 through November 2 of a given year are greater than the Numeric Instream Flow Requirement for November (applicable November monthly minimum flow Requirement), diversion may begin on November 3 if the daily average flow on November 3 is also greater than the November Numeric Instream Flow Requirement. From December 15 through March 31 of each surface water diversion period, surface water diversions may occur on any day in which the surface waterbody's real-time daily average flow is greater than the Numeric Instream Flow Requirement (applicable minimum monthly instream flow Requirement).

7. **Numeric Instream Flow Requirements:** The State Water Board has developed Numeric Instream Flow Requirements (minimum instream flows) at compliance gages, to ensure that individual and cumulative effects of water diversion and discharge associated with cannabis cultivation do not affect the instream flows needed for fish spawning, migration, and rearing, and the flows needed to maintain natural flow variability. The current list of active compliance gages and associated minimum instream flows are available at: https://www.waterboards.ca.gov/water_issues/programs/cannabis/tessmann_instream_flow_requirements.html. If the individual and cumulative effects of diversions result in unanticipated impacts, however, the State Water Board may revise the narrative and/or minimum instream flow Requirements to better protect instream resources, habitat, and natural flow variability.

Requirements for Groundwater Diversions and Springs Qualifying for an Exemption under Narrative Instream Flow Requirement 3 (Exempt Springs)

8. **Aquatic Base Flow:** This Policy establishes an Aquatic Base Flow, calculated by applying the New England Aquatic Base Flow Standard, as one mechanism to help monitor whether groundwater diverters and diverters from exempt springs are having a cumulative negative impact on surface flows. The State Water Board may develop additional requirements for groundwater diversions and diversions from exempt springs for cannabis cultivation in locations where there are a significant number of groundwater diversions and/or diversions from exempt springs or locations where significant numbers of surface water diverters are switching to groundwater diversions and those diversions have the potential to have negative localized impact on surface flows.
9. **Retail Water Suppliers**³⁷: The instream flow Requirements listed in Narrative Flow Requirement 8 (Aquatic Base Flow) shall not apply to retail water suppliers, as defined in Section 13575 of the Water Code³⁸, whose primary beneficial use is municipal or domestic, unless any of the following circumstances are present:
- the retail water supplier has 10 or fewer customers and delivers water that is used for cannabis cultivation;
 - the retail water supplier delivers 10 percent or more of the diverted water to one or more cannabis cultivator(s) or cannabis cultivation site(s), as established by an assessor's parcel number;
 - 25 percent or more of the water delivered by the retail water supplier is used for cannabis cultivation; or
 - a cannabis cultivator and the retail water supplier are affiliates, as defined in California Code of Regulations, title 23, section 2814.20.

Gage Installation, Maintenance, and Operation Requirements

The Deputy Director for Water Rights (Deputy Director) may assign a new compliance gage or require cannabis cultivators to install and operate a local telemetry gage in ungaged watersheds or localized watershed areas if the Deputy Director determines that use of the assigned

³⁷ Business and Professions Code section 26060.1(a)(1)(B).

³⁸ Water Code Chapter 7.5. Water Recycling Act of 1991, Section 13575(b)(5) "Retail water supplier" means any local entity, including a public agency, city, county, or private water company that provides retail water service.

compliance gage does not adequately protect instream flows or does not adequately represent the localized water demand.

Cannabis cultivators shall ensure that gages required by the Deputy Director are installed, maintained, and operated by a Qualified Professional. For purposes of this requirement, Qualified Professionals include California-registered Professional Civil Engineers, or other classifications of professions approved by the Deputy Director. A list of Qualified Professionals that may document compliance with this requirement will be maintained in the Water Rights section of the State Water Board's Cannabis Cultivation webpage³⁹. Gage equipment shall meet the applicable technical specifications for telemetered measuring devices in California Code of Regulations, title 23, section 933, that apply to diversions of over 10,000 acre-feet per year or more. Gages shall record data at a minimum of 15-minute intervals and report the recorded real-time data hourly, at a minimum, via a public website designated by the State Water Board's Division of Water Rights (Division of Water Rights).

Cannabis cultivators, or an entity acting on behalf of cannabis cultivators, shall submit a gage operation and maintenance (O&M) plan prepared by a Qualified Professional, as defined in the preceding paragraph, to the Deputy Director or the Deputy Director's designee for approval. At a minimum, the gage O&M plan shall include qualifications and names of entities responsible for gage installation, maintenance, and operation; gage specifications and accuracy; gage location; gage installation procedures that ensure accurate operation during the wet season and stability during high flow events; stream flow measurement procedures for development of rating curves that represent wet season flows; telemetry equipment; and an O&M schedule and procedures. The Deputy Director may require additional information from the cannabis cultivator to support the request. The Deputy Director may include additional requirements as part of any approval of a gage O&M plan.

Prior to October 31, during each water year of gage operation, an annual maintenance and operation summary report prepared by a Qualified Professional, as defined above in this requirement, shall be submitted to the Division of Water Rights that includes, at a minimum: qualifications and names of entities responsible for maintenance and operation; maintenance activities or operational issues for the prior water year of operation; quality assured gage stage and flow data collected and analyzed for prior water year; rating curves for prior and upcoming water year of operation; data collected to establish rating curves for prior and upcoming water year of operation; and any anticipated maintenance plans or operational issues for the upcoming water year. The gage data shall be provided to the Division of Water Rights in a format retrievable and viewable using Microsoft Excel, Microsoft Access, or other software program authorized by the Deputy Director.

³⁹ State Water Board's cannabis cultivation webpage:
http://www.waterboards.ca.gov/water_issues/programs/cannabis/index.shtml

SECTION 4 – WATERSHED COMPLIANCE GAGE ASSIGNMENTS

Watershed Compliance Gage Assignments

The State Water Board has developed an online mapping tool to assist cannabis cultivators with determining which compliance gage applies to them and whether they may divert water. The online mapping tool is available at:

https://www.waterboards.ca.gov/water_issues/programs/cannabis/online_mapping_tool.html.

The online mapping tool allows cannabis cultivators to enter their address or otherwise locate their point of diversion to identify their assigned watershed compliance gage. The online mapping tool identifies existing flow requirements⁴⁰ and provides information on whether the existing flow requirement or the Cannabis Policy Numeric Instream Flow Requirement (minimum instream flows) is required to be met prior to diverting. Stakeholders may request the State Water Board update an existing flow requirement in the mapping tool to clarify: an existing flow requirement's conditions, as applicable; clarify the geographic scope of an existing flow requirement; or add an existing flow requirement that is not identified. The State Water Board may update the existing flow requirements in the online mapping tool, as needed. The compliance gage assignments may change as more information becomes available. The current list of active compliance gages and associated minimum instream flows are available at: https://www.waterboards.ca.gov/water_issues/programs/cannabis/tessmann_instream_flow_requirements.html.

To ensure cannabis cultivators are reporting in accordance with the appropriate gage, the cannabis cultivator is required to check the online mapping tool website for their compliance gage assignment daily and prior to diverting water to ensure water is available to divert at that gage (i.e., the prior day's average flow is greater than the Numeric Instream Flow Requirement [minimum instream flow] at the assigned compliance gage).

⁴⁰ Examples of existing flow requirements are minimum instream flows for Federal Energy Regulatory Commission licensed hydropower projects or minimum instream flows prescribed in Biological Opinions issued by the United States Fish and Wildlife Service or National Marine Fisheries Service.

SECTION 5 – PLANNING AND REPORTING

Technical Report Preparation Requirements for Cannabis Cultivation General Order

Enrollees under the Cannabis Cultivation General Order are required to submit technical reports to the appropriate Regional Water Board. The report(s) shall be transmitted in portable document format (PDF) to the e-mail address provided in the notice of receipt provided to the Cannabis Cultivation General Order Enrollee as proof of enrollment. A description of each report and deadline for its submittal is provided below. The table below summarizes report submittal requirements, by tier and risk level, and Cannabis Cultivation General Order Attachment D contains guidance regarding contents of required reports.

Summary of Technical Reports Required by Tier and Risk Level

Tier	Risk Level	Technical Reports
Conditionally Exempt	Not Applicable	Site Closure Report
Tier 1	All	Site Management Plan
Tier 1	Moderate	Site Erosion and Sediment Control Plan
Tier 1	High	Disturbed Area Stabilization Plan
Tier 1	All	Site Closure Report
Tier 2	All	Site Management Plan
Tier 2	Moderate	Site Erosion and Sediment Control Plan
Tier 2	High	Disturbed Area Stabilization Plan
Tier 2	All	Nitrogen Management Plan
Tier 2	All	Site Closure Report

Conditionally exempt cannabis cultivators that can no longer meet the requirements to qualify for conditional exemptions may have to enroll as a Tier 1 or Tier 2 site. If so, cannabis cultivators that no longer qualify for the conditionally exempt cannabis cultivation site status shall submit the technical and monitoring reports associated with their tier status and risk level.

Applicants or current cannabis cultivators that do not comply with the conditional exemptions (enrolled as Tier 1 or Tier 2) must comply with the riparian setback and slope limits and are classified as low, moderate or high risk, as described below:

- **Low Risk:** A cannabis cultivation site is classified as low risk if no part of the disturbed area is located on a slope of 30% or greater. Such cannabis cultivators shall register as low risk and submit a *Site Management Plan*.
- **Moderate Risk:** A cannabis cultivation site is classified as moderate risk if any part of the disturbed area is located on a slope greater than 30 percent and less than 50 percent. Such cannabis cultivators shall register as moderate risk and submit a *Site Erosion and Sediment Control Plan*.

- High Risk: A cannabis cultivation site is classified as high risk if any part of the disturbed area exists within the riparian setback limits. Such cannabis cultivators shall register as high risk, submit a *Disturbed Area Stabilization Plan*, and shall address the compliance issue as described below. Because such cannabis cultivators pose a higher risk to water quality and will require a higher level of Regional Water Board oversight, they are subject to a higher application and annual fee. When the cannabis cultivation site is reconfigured to comply with the riparian setbacks, the cannabis cultivator can request the Regional Water Board to reclassify the site to a lower risk level and allow a lower annual fee to be assessed.

Site Management Plan

Within 90 days of the issuance of a notice of receipt, Tier 1 and Tier 2 cannabis cultivators shall submit and implement a *Site Management Plan* that describes how the cannabis cultivator is complying with the Requirements listed in Attachment A. The plan shall describe how the Best Practicable Treatment or Control (BPTC) measures are implemented (e.g., for petroleum fuel storage, specify the specific product or means of compliance). Cannabis cultivators that are landowners of cannabis cultivation sites in North Coast Regional Water Board jurisdiction are required to submit and implement *Site Management Plans* that describe how the Requirements are implemented property-wide, including Requirements implemented to address discharges from legacy activities. The *Site Management Plan* may include a schedule to achieve compliance, but all work must be completed by **the onset of the winter period each year**. (The winter period start date does not relieve a cannabis cultivator from implementing the interim soil stabilization Requirements described in Attachment A of this Policy. Interim measures are those that are implemented immediately upon site development.) Attachment D of the Cannabis Cultivation General Order provides guidance on the contents of the *Site Management Plan*.

Site Erosion and Sediment Control Plan

Tier 1 or Tier 2 cannabis cultivators classified as moderate risk (any portion of the disturbed area is located on a slope greater than 30 percent and less than 50 percent), shall submit a *Site Erosion and Sediment Control Plan* that describes how the cannabis cultivator will implement the Requirements listed in Attachment A of this Policy. Because moderate risk sites are located on steeper slopes, additional Requirements, or a higher density of Requirements may be appropriate to achieve the goal of minimizing the discharge of sediment off-site. The report shall include an analysis of slope stability. The report shall be approved by the Regional Water Board Executive Officer prior to implementation

Consistent with the Business and Professions Code, the Forest Practice Act, and other state laws, certain technical report preparation, design calculations, and report preparation must be prepared under the supervision of a California licensed civil engineer, professional forester, or professional geologist. When required, the *Site Erosion and Sediment Control Plan* shall be prepared by an individual qualified as described below:

- i. A California Registered Professional Civil Engineer.
- ii. A California Registered Professional Geologist.
- iii. A California Certified Engineering Geologist.
- iv. A California Registered Landscape Architect.
- v. A Professional Hydrologist registered through the American Institute of Hydrology.

- vi. A Certified Professional in Erosion and Sediment Control (CPESC)TM registered through EnviroCert International, Inc.
- vii. A Certified Professional in Storm Water Quality (CPSWQ)TM registered through EnviroCert International, Inc.
- viii. A Professional in Erosion and Sediment Control registered through the National Institute for Certification in Engineering Technologies (NICET).

Attachment D of the Cannabis Cultivation General Order provides guidance on the contents of the *Site Erosion and Sediment Control Plan*.

Disturbed Area Stabilization Plan

Tier 1 or Tier 2 cannabis cultivators classified as high risk (any portion of the disturbed area exists within the riparian setbacks Requirements specified in Section 1 of this Policy except as authorized under 404/401 CWA permits, a CDFW LSA Agreement, coverage under the Cannabis Cultivation General Order water quality certification, or site-specific WDRs issued by the Regional Water Board), shall submit a *Disturbed Area Stabilization Plan* that describes how compliance with the riparian setbacks will be achieved. The report shall be approved by the Regional Water Board Executive Officer prior to implementation.

Areas disturbed upon initial site development that are located within the riparian setback specified in the Policy are considered disturbed area and will place the cannabis cultivation site under the high-risk level. Access roads and watercourse crossings designed, constructed, and maintained consistent with the Road Handbook are not considered disturbed areas.

Consistent with the Business and Professions Code, the Forest Practice Act, and other state laws, certain technical report preparation, design calculations, and report preparation must be prepared under the supervision of a California licensed civil engineer, professional forester, or professional geologist.

When required, the *Disturbed Area Stabilization Plan* shall be prepared by a Qualified Professional as described in this attachment (Attachment A).

If the cannabis cultivator cannot achieve compliance by the next onset of the winter period (stabilization work will continue into the winter period or will continue the following year), the Cannabis Cultivator must include a time schedule and scope of work for approval by the Regional Water Board Executive Officer and use in preparing an enforcement order. Attachment D of the Cannabis Cultivation General Order provides guidance on the contents of the *Disturbed Area Stabilization Plan*.

Nitrogen Management Plan

Within 90 days of the issuance of a notice of receipt, all Tier 2 cannabis cultivators with a cannabis cultivation area, or aggregate of cultivation areas, greater than one acre shall submit a *Nitrogen Management Plan* (NMP) for the cannabis cultivation site. The NMP shall calculate all the nitrogen applied to the cannabis cultivation site (dissolved in irrigation water, originating in soil amendments, and applied fertilizers) and describe procedures to limit excessive fertilizer application. Attachment D of the Cannabis Cultivation General Order provides guidance on the contents of a *Nitrogen Management Plan*.

Site Closure Report

At least 90 days prior to ending cannabis cultivation at a site, a registered (conditionally exempt) or enrolled (Tier 1 or Tier 2) cannabis cultivator shall submit a *Site Closure Report* that describes how the site will be decommissioned to prevent sediment and turbidity discharges that degrade water quality. If construction activities are proposed in the *Site Closure Report*, a project implementation schedule shall be included in the report. Attachment D of the Cannabis Cultivation General Order provides guidance on the contents of the *Site Closure Report*. A Notice of Termination must be submitted (Attachment C of the Cannabis Cultivation General Order) with the *Site Closure Report*.

SECTION 6 – USEFUL GUIDANCE DOCUMENTS

1. Handbook for Forest, Ranch, & Rural Roads: A Guide for Planning, Designing, Constructing, Reconstructing, Upgrading, Maintaining, and Closing Wildland Roads
<http://www.pacificwatershed.com/sites/default/files/RoadsEnglishBOOKApril2015b.pdf>
2. A Water Quality and Stream Habitat Protection Manual for County Road Maintenance in Northwestern California Watersheds
<http://www.5counties.org/roadmanual.htm>
3. Construction Site BMP Fact Sheets
<http://www.dot.ca.gov/hq/construc/stormwater/factsheets.htm>
4. United States Environmental Protection Agency Riparian/Forested Buffer
<https://nepis.epa.gov/Exe/ZyPDF.cgi/2000W45Y.PDF?Dockey=2000W45Y.PDF>
5. Creating Effective Local Riparian Buffer Ordinances
http://www.ohioenvironmentallawblog.com/uploads/file/UGA%20riparian_buffer_guidebook.pdf
6. How to Install Residential Scale Best Management Practices (BMPs) in the Lake Tahoe Basin
<http://www.tahoebmp.org/Documents/Contractors%20BMP%20Manual.pdf>
7. Spoil Pile BMPs
http://michigan.gov/documents/deq/deq-wb-nps-sp_250905_7.pdf
8. Sanctuary Forest Water Storage Guide
https://greywateraction.org/wp-content/uploads/2014/11/SanctuaryForrest_Water_Storage_Guide.pdf
9. Natural Resources Conservation Service-USDA, “Ponds – Planning, Design, Construction”, Agriculture Handbook
http://www.nrcs.usda.gov/Internet/FSE_DOCUMENTS/nrcs144p2_030362.pdf
10. Division of Safety of Dams Size Requirements
<https://water.ca.gov/Programs/All-Programs/Division-of-Safety-of-Dams/Jurisdictional-Sized-Dams>
11. Water Tanks: Guidelines for Installation and Use
http://www.waterandseptictanks.com/Portals/0/files/GUIDELINES-FOR-INSTALLATION-OF-WATER-TANKS-_rev1_-03-20-08-_2_.pdf
12. Guidelines for Use and Installation of Above Ground Water Tanks
http://www.waterandseptictanks.com/Portals/0/files/GUIDELINES-FOR-INSTALLATION-OF-WATER-TANKS-_rev1_-03-20-08-_2_.pdf
13. BEST MANAGEMENT PRACTICES (BMP’s) University of California Cooperative Extension

http://www.waterboards.ca.gov/sandiego/water_issues/programs/wine_country/docs/updates081910/ucce_bmps.pdf

14. California Storm Water Quality Association, Section 4: Source Control BMPs
<https://www.casqa.org/resources/bmp-handbooks>
15. CA DOT Solid Waste Management Plan
<http://www.dot.ca.gov/hq/construc/stormwater/WM-05.pdf>
16. State Water Resources Control Board Onsite Wastewater Treatment System (OWTS) policy
http://www.waterboards.ca.gov/water_issues/programs/owts/docs/owts_policy.pdf
17. California Riparian Habitat Restoration Handbook
https://water.ca.gov/LegacyFiles/urbanstreams/docs/ca_riparian_handbook.pdf
18. The Practical Streambank Bioengineering Guide
http://www.nrcs.usda.gov/Internet/FSE_PLANTMATERIALS/publications/idpmcpu116.pdf
19. Watershed Best Management Practices for Cannabis Growers and other Rural Gardeners
<http://mcrccd.org/resources/publications>
20. Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Arid West Region
<https://usace.contentdm.oclc.org/utils/getfile/collection/p266001coll1/id/7627>
21. Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Western Mountains, Valleys, and Coast Region
<https://usace.contentdm.oclc.org/utils/getfile/collection/p266001coll1/id/7646>

(A) ATTACHMENT A: CANNABIS POLICY ATTACHMENT A
REQUIREMENTS FOR CANNABIS CULTIVATION
ORDER WQ 2019-0001-DWQ
GENERAL WASTE DISCHARGE REQUIREMENTS FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

The *Cannabis Policy Attachment A Requirements for Cannabis Cultivation* contains surface water diversion and waste discharge requirements for cannabis cultivation related activities. The Discharger shall comply with all requirements in the Cannabis Policy and applicable federal, state, and local laws, regulations, and permitting requirements. If requirements conflict, the most protective requirements shall apply. There are five main categories of cannabis cultivation requirements to protect water quality and instream flows, which are located in the following sections:

- Section 1. General Requirements and Prohibitions
- Section 2. Requirements Related to Diversion of Water and Discharge of Waste for Cannabis Cultivation
- Section 3. Numeric and Narrative Flow Requirements (including Gaging)
- Section 4. Watershed Compliance Gage Assignments
- Section 5. Planning and Reporting

As referenced in this General Order, best practicable treatment or control (BPTC) measures associated with diversion of water and discharge of waste are contained within Attachment A.

(B) ATTACHMENT B: MONITORING AND REPORTING PROGRAM

ORDER WQ 2019-0001-DWQ GENERAL WASTE DISCHARGE REQUIREMENTS AND WAIVER OF WASTE DISCHARGE REQUIREMENTS FOR DISCHARGES OF WASTE ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

This monitoring and reporting program (MRP) describes requirements for monitoring a cannabis cultivation site and its associated facilities. This MRP is issued pursuant to Water Code section 13267. The Discharger shall not implement any changes to this MRP unless and until a revised MRP is issued by the Regional Water Quality Control Board (Regional Water Board) Executive Officer, State Water Resources Control Board (State Water Board) Division of Water Quality Deputy Director, or the State Water Board Chief Deputy Director.

The State Water Resources Control Board and Regional Water Boards are transitioning to the paperless office system. In some regions, Dischargers will be directed to submit reports (both technical and monitoring reports) to the State Water Board's GeoTracker database over the Internet in portable document format (pdf). If so directed, analytical data shall be uploaded to the GeoTracker database under a site-specific global identification number. Information on the [GeoTracker database](http://www.waterboards.ca.gov/ust/electronic_submittal/index.shtml) is provided on the Internet at:

<http://www.waterboards.ca.gov/ust/electronic_submittal/index.shtml>.

Water Code section 13267 states, in part:

“In conducting an investigation specified in subdivision (a), the regional board may require that any person who has discharged, discharges, or is suspected of having discharged or discharging, or who proposes to discharge waste within its region, or any citizen or domiciliary, or political agency or entity of this state who has discharged, discharges, or is suspected of having discharged or discharging, or who proposes to discharge, waste outside of its region that could affect the quality of waters within its region shall furnish under penalty of perjury, technical or monitoring program reports which the regional board requires. The burden, including costs, of these reports shall bear a reasonable relationship to the need for the report and the benefits to be obtained from the reports. In requiring those reports, the regional board shall provide the person with a written explanation with regard to the need for the reports, and shall identify the evidence that supports requiring that person to provide the reports.”

Water Code section 13268 states, in part:

“(a) Any person failing or refusing to furnish technical or monitoring program reports as required by subdivision (b) of section 13267, or failing or refusing to furnish a statement of compliance as required by subdivision (b) of section 13399.2, or falsifying any information provided therein, is guilty of a misdemeanor and may be liable civilly in accordance with subdivision (b).

ATTACHMENT B: MONITORING AND REPORTING PROGRAM

ORDER WQ 2019-0001-DWQ GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

(b)(1) Civil liability may be administratively imposed by a regional board in accordance with article 2.5 (commencing with section 13323) of chapter 5 for a violation of subdivision (a) in an amount which shall not exceed one thousand dollars (\$1,000) for each day in which the violation occurs.”

The Discharger owns or engages in cannabis cultivation activities that are subject to the Notice of Applicability (NOA) of Water Quality Order 2019-0001-DWQ. The reports are necessary to ensure that the discharger complies with the NOA and General Order. Pursuant to California Water Code section 13267, the discharger shall implement this MRP and shall submit the monitoring reports described herein.

All samples shall be representative of the volume and nature of the discharge or matrix of material sampled. The name of the sampler, sample type (grab or composite), time, date, location, bottle type, and any preservative used for each sample shall be recorded on the sample chain of custody form. The chain of custody form must contain all custody information including date, time, and to whom samples were relinquished. If composite samples are collected, the basis for sampling (time or flow weighted) shall be approved by Regional Water Board staff.

Field test instruments (such as those used to test pH, dissolved oxygen, and electrical conductivity) may be used provided that they are used by a California Environmental Laboratory Program certified laboratory or:

1. The user is trained in proper use and maintenance of the instruments;
2. The instruments are field calibrated prior to monitoring events at the frequency recommended by the manufacturer;
3. Instruments are serviced by the manufacturer or authorized representative at the recommended frequency; and
4. Field calibration reports are maintained and available for at least three years.

ATTACHMENT B: MONITORING AND REPORTING PROGRAM

ORDER WQ 2019-0001-DWQ GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

FACILITY STATUS

Dischargers that are classified as Tier 1 or Tier 2 facilities shall report the following as shown in Table B1:

Table B1: Monitoring Requirements

Monitoring Requirement	Description
Winterization Measures Implemented	Report winterization procedures implemented, any outstanding measures, and the schedule for completion.
Tier Status Confirmation	Report any change in the tier status. (Stabilization of disturbed areas may change the tier status of a facility. Contact the Regional Water Board if a change in status is appropriate.)
Third Party Identification	Report any change in third party status as appropriate.
Nitrogen Application (if cultivation area or aggregate of cultivation areas exceeds one acre)	Report monthly and annual total nitrogen use for bulk, solid, and liquid forms of nitrogen. Provide the data as pounds per canopy acre per time (month or year) as described in Attachment D, <i>Nitrogen Management Plan</i> . If plant tissue was collected to determine limited nitrogen availability, the results shall be submitted.

ATTACHMENT B: MONITORING AND REPORTING PROGRAM

ORDER WQ 2019-0001-DWQ

GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

SITE MAINTENANCE STATUS

Dischargers that are classified as Tier 1 or Tier 2, and are characterized as a moderate or high risk, shall perform the following additional monitoring as shown in Table B2.

Table B2: Moderate or High-Risk Monitoring Requirements

Observations	Description	Monitoring Frequency
Surface Water Runoff	Report any conditions of surface water runoff, including location, duration, source of runoff (irrigation water, storm water, etc.).	Monthly
Soil Erosion Control	Report any indications of soil erosion (e.g., gullyng, turbid water discharge, landslide, etc.).	Monthly
Sediment Capture	Report the status of sediment capture measures (e.g., silt fence, fiber rolls, settling basin, etc.).	Monthly
Erosion/Sediment Capture Maintenance	Report maintenance activities to maintain the effectiveness of erosion control and sediment capture measures (e.g., reinstallation of straw mulch, hydroseeding, tarp placement, removal or stabilization of sediment captured, removal of settled sediment in a basin, etc.).	Monthly
Stabilization of Disturbed Areas	Dischargers characterized as high risk (with any portion of the disturbed area within the setbacks), shall provide a status report describing activities performed to stabilize the disturbed area within the setback.	Monthly
Material(s) Storage Erosion/Spills Prevention	Report materials delivered or stored at the site that could degrade water quality if discharged off-site (e.g., potting soil, manure, chemical fertilizer, gasoline, herbicides, pesticides, etc.).	Monthly
Holding Tank, Septic Tank, or Chemical Toilet Servicing	Report the dates, activity, and name of the servicing company for servicing holding tanks or chemical toilets.	Monthly

ATTACHMENT B: MONITORING AND REPORTING PROGRAM

ORDER WQ 2019-0001-DWQ

GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

STORM WATER RUNOFF MONITORING

Dischargers that are classified as Tier 1 or Tier 2, and are characterized as a moderate or high risk, shall perform the following monitoring as described in Table B3. Note the following information relating to Table B3:

1. Constituents shall be monitored with a calibrated instrument.
2. Samples shall be representative of storm water discharging from the disturbed area. Additional samples may be required to adequately characterize the discharge from all areas.
3. Monitoring shall be performed during all months in which activity is occurring at the site until winterization is complete. Monitoring is not required after winterization is complete for unoccupied sites during winter months.

Table B3: Stormwater Runoff Monitoring Requirements

Constituent	Frequency	Monitoring Frequency
Turbidity	Once per calendar month when precipitation exceeds 0.25 inch per day or when storm water runoff from the site is generated.	All months until winterization procedures are completed.
pH	Once per calendar month when precipitation amount is forecast to exceed 0.25 inch per day.	All months until winterization procedures are completed.

REPORTING

In reporting monitoring data, the Discharger shall arrange the data in tabular form so that the date, monitoring parameter, and reported results are readily discernible. The data shall be summarized to clearly illustrate compliance status as applicable. The results of any monitoring done more frequently than required at the locations specified in the MRP shall be reported in the next regularly scheduled monitoring report and shall be included in calculations as appropriate.

The State Water Board or Regional Water Board may require the Discharger to electronically submit monitoring reports using the State Water Board's California Integrated Water Quality System (CIWQS) program Internet web site or alternative database. Electronic submittal procedures will be provided when directed to begin electronic

ATTACHMENT B: MONITORING AND REPORTING PROGRAM

ORDER WQ 2019-0001-DWQ GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

submittals. Until directed to electronically submit monitoring reports, the Discharger shall submit hard copy monitoring reports.

Annual Report

Annual Reports shall be submitted to the Regional Water Board by **March 1 following the year being monitored**. For example, the monitoring report for activities conducted in the year 2018 is due on March 1, 2019. The Annual Report shall include the following:

1. Facility Status, Site Maintenance Status, and Storm Water Runoff Monitoring.
2. The name and contact information for the person responsible for operation, maintenance, and monitoring.

A letter transmitting the annual report shall accompany each report. The letter shall summarize the numbers and severity of violations found during the reporting period, and actions taken or planned to correct the violations and prevent future violations. The transmittal letter shall contain the following penalty of perjury statement and shall be signed by the Discharger or the Discharger's authorized agent:

"I certify under penalty of law that I have personally examined and am familiar with the information submitted in this document and all attachments and that, based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment."

The Discharger shall implement the above monitoring program.

ATTACHMENT B: MONITORING AND REPORTING PROGRAM

ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

REGIONAL WATER BOARD CONTACT INFORMATION

The Discharger shall submit notices, technical reports, and annual reports to appropriate Regional Water Board where the permitted activity is taking place. The appropriate Regional Water Board office and e-mail information is provided on the application receipt (e.g., notice of exemption, Notice of Receipt, Notice of Applicability, etc.). The information in Table B4 is also available by entering the location address in the [web tool](http://www.waterboards.ca.gov/web_tool) located at: <http://www.waterboards.ca.gov/waterboards_map.shtml>.

Table B4: Regional Water Board Cannabis Office Contact Information

Regional Water Board	Mailing Address	Cannabis Program Mailbox Email Address
North Coast	5550 Skylane Blvd., Suite A Santa Rosa, CA 95403	Northcoast.cannabis@waterboards.ca.gov
San Francisco Bay	1515 Clay Street, Suite 1400 Oakland, CA 94612	Sanfranciscobay.cannabis@waterboards.ca.gov
Central Coast	895 Aerovista Place, Suite 101 San Luis Obispo, CA 93401	Centralcoast.cannabis@waterboards.ca.gov
Los Angeles	320 W. 4th Street, Suite 200 Los Angeles, CA 90013	Losangeles.cannabis@waterboards.ca.gov
Central Valley Redding Office	364 Knollcrest Dr., Suite 205 Redding, CA 96002	Centralvalleyredding@waterboards.ca.gov
Central Valley Sacramento Office	11020 Sun Center Dr., Suite 200 Rancho Cordova, CA 95670	Centralvalleysacramento@waterboards.ca.gov

ATTACHMENT B: MONITORING AND REPORTING PROGRAM

ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

Regional Water Board	Mailing Address	Cannabis Program Mailbox Email Address
Central Valley Fresno Office	1685 E Street Fresno, CA 93706	Centralvalleysacramento@waterboards.ca.gov
Lahontan South Lake Tahoe Office	2501 Lake Tahoe Blvd. South Lake Tahoe, CA 96150	Lahontan.cannabis@waterboards.ca.gov
Lahontan Victorville Office	15095 Amargosa Road Bldg 2, Suite 210 Victorville, CA 92394	Lahontan.cannabis@waterboards.ca.gov
Colorado River Basin	73-720 Fred Waring Dr., Suite 100 Palm Desert, CA 92260	Lahontan.cannabis@waterboards.ca.gov
Santa Ana	3737 Main Street, Suite 500 Riverside, CA 92501	Santaana.cannabis@waterboards.ca.gov
San Diego	2375 Northside Dr., Suite 100 San Diego, CA 92108	Sandiego.cannabis@waterboards.ca.gov

(C) ATTACHMENT C: NOTICE OF TERMINATION

ORDER WQ 2019-0001-DWQ
GENERAL WASTE DISCHARGE REQUIREMENTS AND
WAIVER OF WASTE DISCHARGE REQUIREMENTS FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

Submittal of this Notice of Termination (NOT) to the Regional Water Quality Control Board (Regional Water Board) constitutes notice that a Discharger, identified in Section I of this form, requests termination of coverage under *General Waste Discharge Requirements and Waiver of Waste Discharge Requirements for Discharges of Waste Associated with Cannabis Cultivation Activities* (Order WQ 2019-0001-DWQ). Completed forms must be signed and post mailed or emailed to the Regional Water Board, attention: Cannabis Regulatory Program, 2019-0001-DWQ Notice of Termination. Refer to the monitoring and reporting program attached to the General Order for the email/ mailing address or contact the Regional Water Board. The Discharger shall attach a *Site Closure Report* and a final monitoring and reporting program report with the NOT.

Submittal of this NOT does not relieve the Discharger and/or the property owner of responsibility to control waste discharges related to the cultivation or related activities. The Regional Water Board may inspect the condition of the site or determine that the final monitoring report is incomplete prior to terminating coverage under the General Order.

SECTION I. DISCHARGER INFORMATION

Role (check all applicable)	<input type="checkbox"/> Cultivator
<input type="checkbox"/> Land/Property Owner	<input type="checkbox"/> Third Party Representative
Name	Contact person (leave blank if same as above)
Address where legal notice may be served (cannot be a P.O. Box)	City
State	ZIP Code
Email	Phone

ATTACHMENT C: NOTICE OF TERMINATION

ORDER WQ 2019-0001-DWQ GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

Note the following regarding SECTION II. CANNABIS CULTIVATION SITE INFORMATION:

1. Waste Discharge Identification (WDID) number is a number assigned to each Discharger enrolled under Tier 1 or Tier 2. Dischargers covered under the “Conditionally Exempt” tier should leave this field blank. WDID number can also be obtained from an annual invoice mailed by the State Water Board. If a Discharger does not know his/her WDID number, please contact the Regional Water Board and request the information prior to submittal of the Notice of Termination.
2. Dischargers covered under “Conditionally Exempt” tier should leave the risk fields blank.

SECTION II. CANNABIS CULTIVATION SITE INFORMATION

Assessor Parcel Number(s)	WDID (if applicable)
Address	County
City	State
ZIP Code	Contact Person (Leave blank if same as Section I)
Latitude (if address is not available)	Longitude (if address is not available)
Cultivation Site Enrollment Classification	(Check all Tier and Risk boxes applicable)
<input type="checkbox"/> Conditionally Exempt	<input type="checkbox"/> Tier 1
<input type="checkbox"/> Tier 2	<input type="checkbox"/> Low risk
<input type="checkbox"/> Moderate Risk	<input type="checkbox"/> High Risk
Email (Leave blank if same as Section I)	Phone (Leave blank if same as Section I)

ATTACHMENT C: NOTICE OF TERMINATION

ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

SECTION III. CERTIFICATION

I certify that:

- 1) I am a Discharger listed under Section I **or** a duly authorized representative of the Discharger listed in Section I of this form,
- 2) cultivation activities are ceased,
- 3) the cultivation site is stabilized,
- 4) there is no potential for waste discharges from the disturbed area in violation of Regional Water Board's Basin Plan or the General Order,
- 5) the *Site Closure Report* is attached to this NOT, and
- 6) earthen material and waste have been consolidated at the site and stabilized or disposed of properly.

"I certify under penalty of law that I have personally examined and am familiar with the information submitted in this document and all attachments and that, based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment."

Printed Name of Discharger/Duly Authorized Representative

Signature

Date

(D) ATTACHMENT D: TECHNICAL REPORT GUIDANCE

ORDER WQ 2019-0001-DWQ GENERAL WASTE DISCHARGE REQUIREMENTS AND WAIVER OF WASTE DISCHARGE REQUIREMENTS FOR DISCHARGES OF WASTE ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

This Technical Report Guidance provides guidance for preparation of the technical reports described in the Provisions section under this General Order. All technical reports shall be submitted to the appropriate Regional Water Quality Control Board (Regional Water Board) by transmitting the report in portable document format (PDF) to the e-mail address provided in the notice of receipt. Refer to Provisions section for technical report requirements.

SITE MANAGEMENT PLAN

Tier 1 and Tier 2 Dischargers shall submit and implement a *Site Management Plan* (Plan) that describes how the Discharger is implementing the best practical treatment or control (BPTC) measures listed in Attachment A. The Plan may include a schedule to achieve compliance, but all work must be completed by the onsets of winter period each year. (The due date does not relieve a Discharger from implementing the interim soil stabilization BPTC measures described in Attachment A.)

The Plan outline presented below is intended to provide general guidance for the Discharger and consultants. This sample format will help the Discharger include information needed to demonstrate that all applicable BPTC measures are implemented and properly maintained. In addition, Dischargers in the North Coast Regional Water Board's jurisdiction (Region 1) are required to address legacy waste discharge issues, including those that are not related to cannabis cultivation.

1. Sediment Discharge BPTC Measures

1.1. Site Characteristics

- 1.1.1. Provide a map showing access roads, vehicle parking areas, streams, stream crossings, cultivation site(s), disturbed areas, buildings, and other relevant site features.
- 1.1.2. Describe the access road conditions including estimating vehicle traffic, road surface (e.g., paved, rocked, or bare ground), and maintenance activities. Describe how storm water is drained from the access road (e.g., crowned, out slope, armored ditch, culverts, rolling dips, etc.).
- 1.1.3. Describe any vehicle stream crossing including the type of crossing (e.g., bridge, culvert, low water, etc.).
 - 1.1.3.1. For Region 1 Dischargers, identify, discuss, and locate on the site map any legacy waste discharge issues that exist on the property.

ATTACHMENT D: TECHNICAL REPORT GUIDANCE

ORDER WQ 2019-0001-DWQ GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

1.2. Sediment Erosion Prevention and Sediment Capture (Moderate risk Tier 1 or Tier 2 Dischargers are required to submit a *Site Erosion and Sediment Control Plan*. Those Dischargers may refer to that plan rather than repeat it here).

1.2.1. Erosion Prevention BPTC Measures

1.2.1.1. Describe the BPTC measures that have been, or will be implemented to prevent or limit erosion. Provide an implementation schedule for BPTC measures that have not yet been implemented. Identify the erosion prevention BPTC measures on a site map.

1.2.1.1.1. The description shall address physical BPTC measures, (e.g., placement of straw mulch, plastic covers, slope stabilization, soil binders, culvert outfall armoring, etc.) and biological BPTC measures (vegetation preservation/replacement, hydro seeding, etc.).

1.2.2. Sediment Control BPTC Measures

1.2.2.1. Describe the BPTC measures that have been, or will be implemented to capture sediment that has been eroded. Provide an implementation schedule for BPTC measures that have not yet been implemented. Identify the sediment control BPTC measures on a site map.

1.2.2.1.1. The description shall address physical BPTC measures, (e.g., placement of silt fences, fiber rolls, or settling ponds/areas, etc.) and biological BPTC measures (vegetated outfalls, hydro seeding, etc.).

1.2.3. Maintenance Activities - Erosion Prevention and Sediment Control

1.2.3.1. Describe how the erosion prevention and sediment control BPTC measures will be monitored and maintained to protect water quality.

1.2.3.2. Describe how any captured sediment will be either stabilized in place, excavated and stabilized on-site, or removed from the site.

1.2.4. Erosion control BPTC measures: Describe the interim soil stabilization, if applicable and long-term BPTC measures implemented to prevent sediment transport at each identified disturbed area(s) and improperly constructed features.

2. Fertilizer, Pesticide, Herbicide, and Rodenticide BPTC Measures

ATTACHMENT D: TECHNICAL REPORT GUIDANCE

ORDER WQ 2019-0001-DWQ

GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

2.1. Provide a summary table that identifies the products used at the site, when they are delivered to the site, how they are stored, and used at the site. If products are not consumed during the growing season, describe how they are removed from the site or stored to prevent discharge over the winter season.

2.2. Provide a site map that locates storage locations.

2.3. Describe how bulk fertilizers and chemical concentrates are stored, mixed, applied, and how empty containers are disposed.

2.4. Describe procedures for spill prevention and cleanup.

3. Petroleum Product BPTC Measures

3.1. Provide a summary table that identifies the products used at the site, when they are delivered to the site, how they are stored, and used at the site. If products are not consumed during the growing season, describe how they are removed from the site or stored to prevent discharge over the winter season.

3.2. Provide a site map that locates storage locations.

3.3. Describe how fuels, lubricants, and other petroleum products are stored, mixed, applied, and empty containers are disposed.

3.4. Describe procedures for spill prevention and cleanup.

4. Trash/Refuse, and Domestic Wastewater BPTC Measures

4.1. Describe the types of trash/refuse that will be generated at the site. Describe how the material is contained and properly disposed of.

4.1.1. Provide a site map that locates the trash/refuse storage locations.

4.2. Describe the number of employees, visitors, or residents at the site.

4.2.1. Describe the types of domestic wastewater generated at the site (e.g., household generated wastewater or chemical toilet).

4.2.2. Describe how the domestic wastewater is disposed.

4.2.2.1. Permitted onsite wastewater treatment system (e.g., septic tank and leach lines).

ATTACHMENT D: TECHNICAL REPORT GUIDANCE

ORDER WQ 2019-0001-DWQ GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

- 4.2.2.2. Chemical toilets or holding tank. If so, provide the name of the servicing company and the frequency of service.
 - 4.2.2.3. Outhouse, pit privy, or similar. Use of this alternative requires approval from the Regional Water Board Executive Officer; include the approval from the Executive Officer and any conditions imposed for use of this alternative.
 - 4.2.2.3.1. Provide a site map that locates any domestic wastewater treatment, storage, or disposal area.
5. Winterization BPTC Measures
 - 5.1. Describe activities that will be performed to winterize the site and prevent discharges of waste. The description should address all the issues listed above.
 - 5.2. Describe maintenance of all drainage or sediment capture features (e.g., drainage culverts, drainage trenches, settling ponds, etc.) to remove debris, soil blockages, and ensure adequate capacity exists.
 - 5.3. Describe any revegetation activities that will occur either at the beginning or end of the precipitation season.
 - 5.4. If any BPTC measure cannot be completed before the onset of winter period, contact the Regional Water Board to establish a compliance schedule.
 - 5.5. For Region 1 Dischargers, describe any activities that will be performed to address legacy waste discharge issues. Region 6 Dischargers should consult with Regional Water Board staff to confirm if any other activities in addition to BPTCs are necessary to address legacy waste discharge issues.

ATTACHMENT D: TECHNICAL REPORT GUIDANCE

ORDER WQ 2019-0001-DWQ GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

SITE EROSION AND SEDIMENT CONTROL PLAN

Tier 1 or Tier 2 Dischargers classified as moderate risk shall submit and implement a *Site Erosion and Sediment Control Plan* (Plan). The Plan shall be prepared under the supervision of a qualified professional as described in the Provisions section of the General Order. The report shall be approved by the Regional Water Board Executive Officer prior to implementation.

The Plan shall describe how best practical treatment or control (BPTC) measures listed in Attachment A will be implemented to achieve the goal of minimizing the discharge of sediment off-site. Site specific factors (e.g., percent slope, precipitation amounts, soil type, vegetation status, etc.) shall be considered in determining the appropriate level of water quality protection. The Plan shall include an analysis of slope stability and an implementation schedule; if the work cannot be completed by the onset of winter period each year, the Discharger shall contact the Regional Water Board to establish a compliance schedule. Indications of instability include the occurrence of slope failures at nearby similar sites, weak soil layers, geologic bedding parallel to slope surface, hillside creep (trees, fence posts, etc. leaning downslope), tension cracks in the slope surface, bulging soil at the base of the slope, and groundwater discharge from the slope. Interim soil stabilization BPTC measures shall be performed as soon as practicable. Interim measures are those that can be implemented immediately following site development.

At a minimum, the Plan shall address the following:

1. Site Description

- 1.1. Describe the site (e.g., topography, vegetation, elevation, historic precipitation patterns, soil types, surface waterbodies, etc.).
- 1.2. Site Disturbances – Provide a site map that shows the location of all of the applicable following items. For each mapped item, provide a description of the item.
 - 1.2.1. Historic (Existing) Disturbances (e.g., access/site roads, buildings, stream crossings, disturbed areas, graded areas, cultivation areas, vehicle parking areas, disturbed vegetation areas, etc.).
 - 1.2.2. Recent or Planned Disturbances (e.g., access/site roads, buildings, disturbed areas, graded areas, cultivation areas, vehicle parking areas, vegetation removal areas, etc.).
 - 1.2.3. Areas of Special Concern (e.g., describe any existing or planned stream or wetland crossing, any culverts, any slope that shows evidence of past failure, or

ATTACHMENT D: TECHNICAL REPORT GUIDANCE

ORDER WQ 2019-0001-DWQ GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

evidence of instability (e.g., cracks in retaining walls, surface cracks in soil, bulging soil, groundwater discharge areas, sunken road beds, downslope leaning trees or utility poles, etc.).

1.2.4. Describe and show on the site map, the storm water runoff sampling locations.

1.3. Erosion Prevention BPTC Measures

1.3.1. Describe the BPTC measures that have been, or will be implemented to prevent or limit erosion. Provide an implementation schedule for BPTC measures that have not yet been implemented. Identify the erosion prevention BPTC measures on a site map.

1.3.1.1. The description shall address physical BPTC measures, (e.g., placement of straw mulch, plastic covers, slope stabilization, soil binders, culvert outfall armoring, etc.) and biological BPTC measures (vegetation preservation/replacement, hydro seeding, etc.).

1.4. Sediment Control BPTC Measures

1.4.1. Describe the BPTC measures that have been, or will be implemented to capture sediment that has been eroded. Provide an implementation schedule for BPTC measures that have not yet been implemented. Identify the sediment control BPTC measures on a site map.

1.4.1.1. The description shall address physical BPTC measures, (e.g., placement of silt fences, fiber rolls, or settling ponds/areas, etc.) and biological BPTC measures (vegetated outfalls, hydro seeding, etc.).

1.5. Maintenance Activities - Erosion Prevention and Sediment Control

1.5.1. Describe how the erosion prevention and sediment control BPTC measures will be monitored and maintained to protect water quality.

1.5.2. Describe how any captured sediment will be either stabilized in place, excavated and stabilized on-site, or removed from the site.

2. Winterization

2.1. Prevention

ATTACHMENT D: TECHNICAL REPORT GUIDANCE

ORDER WQ 2019-0001-DWQ

GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

- 2.1.1. Describe the BPTC measures that will be implemented before winter precipitation occurs to prevent erosion of disturbed areas, including the cultivation area.
- 2.1.2. Describe maintenance of all drainage or sediment capture features (e.g., drainage culverts, drainage trenches, settling ponds, etc.) to remove debris, soil blockages, and ensure adequate capacity exists.
- 2.1.3. Describe any revegetation activities that will occur either at the beginning or end of the precipitation season.

ATTACHMENT D: TECHNICAL REPORT GUIDANCE

ORDER WQ 2019-0001-DWQ GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

NITROGEN MANAGEMENT PLAN

Tier 2 Dischargers with a cannabis cultivation area, or aggregate of cultivation areas, greater than one acre are required to submit a *Nitrogen Management Plan* (NMP). The NMP shall describe how nitrogen is stored, used, and applied to crops in a way that is protective of water quality. At a minimum, an NMP shall address the following:

1. Facility Description

1.1. Location and Configuration

1.1.1. Provide a description of the site, the method of growing cannabis (e.g., in ground, raised beds, grow bags, etc.).

1.1.2. Describe the canopy area acreage (at plant maturity).

1.1.3. Site Location Map (Provide a United States Geological Survey topographic map or similar map that shows the location, nearby water bodies, public and access roads, etc.).

1.1.4. Facility Plan (Provide a scaled drawing that shows the facility, disturbed areas, cultivation areas, buildings, access roads, greenhouses, material storage areas, source of irrigation water, water storage, etc.).

2. Sources of Nitrogen

2.1. Bulk Materials (Materials either used as growing medium or as amendments to the growing medium (e.g., potting soil, manure, biosolids, etc.)).

2.2. Dry Fertilizers (Materials added to a growing medium or mixed with irrigation water that provide nitrogen to the crop (e.g., bone meal, feather meal, pelletized manure or biosolids, pelletized chemical fertilizer, etc.)).

2.3. Liquid Fertilizers (Materials added to irrigation water, or that are applied directly to the crop (e.g., fish emulsion, chemical fertilizers, etc.)).

3. Nitrogen Storage, Use, and Disposal Practices

3.1. Describe when nitrogen containing materials will be delivered to the site (e.g., as needed or at the beginning of growing season).

3.2. Describe how bulk, dry, and liquid fertilizers will be stored.

3.3. Describe any mixing or processing area(s) of nitrogen containing materials.

ATTACHMENT D: TECHNICAL REPORT GUIDANCE

ORDER WQ 2019-0001-DWQ

GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

- 3.4. If applicable, describe how “spent” growing medium is either removed from the site or incorporated into site soils.
 - 3.5. If “spent” growing medium is not removed from the site, describe how amendments are added to the existing medium to improve the nitrogen content. Describe when that process occurs.
4. Nitrogen Application Rate
- 4.1. Monthly Applied Nitrogen – Provide a nitrogen management worksheet that calculates the nitrogen applied per canopy acre (see attached). Note that monthly nitrogen uptake rates generally are consistent with the evapotranspiration rate.
 - 4.2. Limited Nitrogen Availability – Due to natural processes, some crops may be nitrogen limited despite applying 1.4 times the crop uptake rate. (See the *Fertilizers, Pesticides, Petroleum Products and Other Chemicals* section of the Cannabis Policy Staff Report.) Additional nitrogen may be applied if the need is demonstrated based on a plant tissue sample analysis as described in the General Order. Provide the name of the analytical or agricultural laboratory that will provide plant tissue analysis.

EXAMPLE NITROGEN REPORTING WORKSHEET

The General Order monitoring and reporting program (MRP) requires annual submittal of nitrogen data when a Discharger is required to submit an NMP. The application rate shall be reported as pounds of nitrogen applied per canopy acre. (Typically the cultivation area acreage will be larger than the canopy acreage. Use the anticipated canopy acreage at plant maturity for calculation purposes.) Methods to calculate the pounds of nitrogen applied from bulk, dry, or liquid fertilizer are presented below.

Note that the nitrogen applied shall only be calculated for the month in which it is applied, and all the nitrogen applied shall be calculated. For example, use of slow release fertilizers or materials in chemical forms that are not immediately available for plant uptake shall be included in the calculation for the month applied rather than spreading the value over two or more months. Use of potting soil is likely to show an over application of nitrogen compared to crop uptake in early months, the application rate will approximate the crop uptake over the growing season.

Fertilizer Labeling

Fertilizer labels always list three nutrients: nitrogen (N), phosphorus (P), and potassium (K). The three numbers represent the percentage of each nutrient in the fertilizer source.

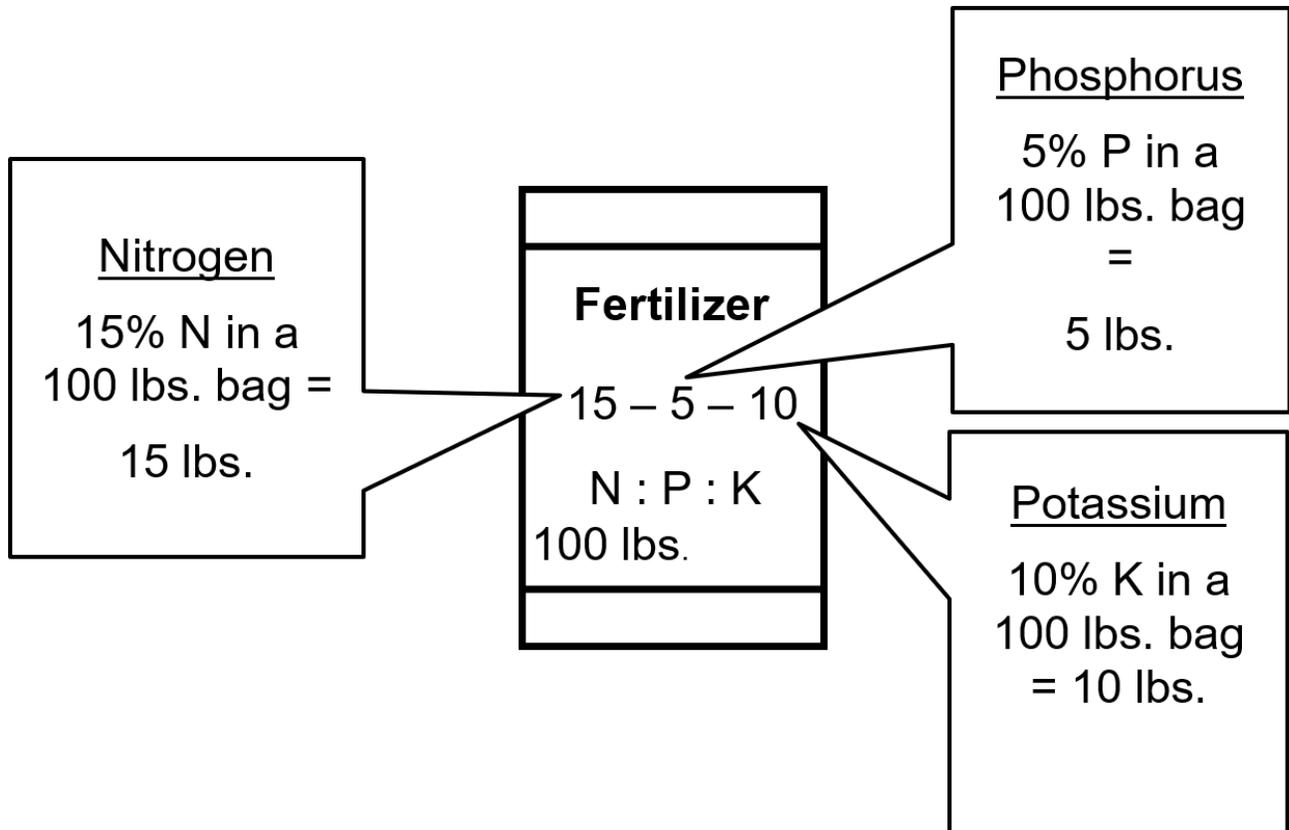
ATTACHMENT D: TECHNICAL REPORT GUIDANCE

ORDER WQ 2019-0001-DWQ

GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

For bulk materials such as potting soil, the seller can provide a list of the nutrient content. To calculate the nitrogen contained in liquid fertilizers, the density is needed. Liquid fertilizers list the volume and weight of the product, which can be used to calculate the density of the liquid fertilizer (if density is not listed on the product information label).

EXAMPLE NITROGEN REPORTING FORM



Bulk Materials

$$\text{Nitrogen (lbs.)} = \frac{\%N}{100} \times \text{fertilizer weight applied (lbs.)}$$

Dry Fertilizers

$$\text{Nitrogen (lbs.)} = \frac{\%N}{100} \times \text{fertilizer weight applied (lbs.)}$$

Liquid Fertilizers

ATTACHMENT D: TECHNICAL REPORT GUIDANCE

ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

$$\text{Nitrogen (lbs.)} = \frac{\%N}{100} \times \text{density} \left(\frac{\text{lbs.}}{\text{gal.}} \right) \times \text{gallons of product}$$

Or,

$$\text{Nitrogen (lbs.)} = \frac{\%N}{100} \times \text{density} \left(\frac{\text{lbs.}}{\text{oz.}} \right) \times \text{ounces of product}$$

$$\text{Density} = \frac{\text{weight of product (lbs.)}}{\text{volume of product (gal. or oz.)}}$$

Report monthly bulk, dry, liquid fertilizers individually

$$\text{Rate Applied} = \frac{\text{Nitrogen Applied (lbs.)}}{\text{canopy acre}}$$

The nitrogen reporting form below shows the monthly and annual nitrogen application rates in pounds of nitrogen per canopy acre.

In April two bags of bulk fertilizer weight 100 pounds each were used at a 0.50 acre cultivation site. The quantity of nitrogen from the bulk soil applied in April is 30 pounds.

$$\frac{15\%}{100} \times 200 \text{ lbs.} = 30 \text{ lbs. of Nitrogen}$$

The amount of nitrogen applied per canopy acre is then calculated as:

$$(30 \text{ lbs. N}) / (0.50 \text{ canopy acre}) = (60 \text{ lbs. N}) / (\text{canopy acre})$$

ATTACHMENT D: TECHNICAL REPORT GUIDANCE

ORDER WQ 2019-0001-DWQ
GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE
ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

Table D1: Nitrogen Reporting Example, Pounds per Canopy Acre

Month	Bulk	Dry	Liquid	Rate Applied
January	0	0	0	0
February	0	0	0	0
March	0	0	0	0
April	60	20	8	88
May	0	0	24	24
June	0	0	24	24
July	0	8	24	32
August	0	10	30	40
September	0	20	40	60
October	0	0	0	0
November	0	0	0	0
December	0	0	0	0
Total nitrogen applied (pounds per canopy acre)	60	58	150	268

ATTACHMENT D: TECHNICAL REPORT GUIDANCE

ORDER WQ 2019-0001-DWQ GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

DISTURBED AREA STABILIZATION PLAN

Tier 1 or Tier 2 Dischargers classified as high risk shall submit and implement a *Disturbed Area Stabilization Plan* (Plan). (Note that high risk site classification is a temporary condition that exists until the Discharger stabilizes the disturbed area located within the setbacks. Once the area is stabilized and the Regional Water Board approves the work, the Discharger can petition the Regional Water Board to reclassify the site as either low or moderate risk, depending upon the site conditions.) The Plan shall be prepared under the supervision of a qualified professional as described in the Provisions section of the General Order. The report shall be approved by the Regional Water Board Executive Officer prior to implementation.

The Plan shall describe how best practical treatment and control (BPTC) measures listed in Attachment A will be implemented to achieve the goal of stabilizing the disturbed area to minimize the discharge of sediment off-site and complying with the setback requirements. Site specific factors (e.g., percent slope, precipitation amounts, soil type, vegetation status, etc.) shall be considered in determining the appropriate level of water quality protection. The Plan shall include an implementation schedule; if the work cannot be completed by the onset of winter period (refer to Attachment A for definition of “winter period”), the Discharger shall contact the Regional Water Board to establish a compliance schedule. Interim soil stabilization BPTC measures shall be performed as soon as practicable. Interim measures are those that can be implemented immediately following site development.

Certain activities within the setbacks that are authorized by a California Department of Fish and Wildlife Lake or Streambed Alteration Agreement, a United States Army Corps section 404 permit, a Regional Water Board section 401 water quality certification, or waste discharge requirements issued by a Regional Water Board or the State Water Board may be performed within the setbacks contained in the General Order and do not trigger a high risk Discharger classification.

At a minimum, the Plan shall address the following:

1. Site Description

- 1.1. Describe the site (e.g., topography, vegetation, elevation, historic precipitation patterns, soil types, surface waterbodies, etc.).
- 1.2. Provide a site map that shows the location of all water bodies, the applicable setback(s), all disturbed areas within the setback(s), and the storm water runoff sampling locations.

ATTACHMENT D: TECHNICAL REPORT GUIDANCE

ORDER WQ 2019-0001-DWQ

GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

1.3. Describe how the area was disturbed (e.g., previously existing condition, timber harvest, grading activities, etc.) and the level of disturbance.

1.4. Describe the native vegetation that typically exists in the disturbed area.

2. Erosion Prevention BPTC Measures

2.1. Describe the BPTC measures that have been, or will be implemented to prevent or limit erosion. Provide an implementation schedule for BPTC measures that have not yet been implemented. Identify the erosion prevention BPTC measures on a site map.

2.1.1. The description shall address physical BPTC measures, (e.g., placement of straw mulch, plastic covers, slope stabilization, soil binders, culvert outfall armoring, etc.) and biological BPTC measures (vegetation preservation/replacement, hydro seeding, etc.).

3. Sediment Control BPTC Measures

3.1. Describe the BPTC measures that have been, or will be, implemented to capture sediment that has been eroded. Provide an implementation schedule for BPTC measures that have not yet been implemented. Identify the sediment control BPTC measures on a site map.

3.1.1. The description shall address physical BPTC measures, (e.g., placement of silt fences, fiber rolls, or settling ponds/areas, etc.) and biological BPTC measures (vegetated outfalls, hydro seeding, etc.).

4. Maintenance Activities - Erosion Prevention and Sediment Control

4.1. Describe how the erosion prevention and sediment control BPTC measures will be monitored and maintained to protect water quality.

4.2. Describe how any captured sediment will be either stabilized in place, excavated and stabilized on-site, or removed from the site.

5. Long Term Stabilization Measures

5.1. Describe any revegetation activities designed to provide long term stabilization, that will occur either at the beginning or end of the precipitation season

6. Compliance with General Order Schedule Limits

ATTACHMENT D: TECHNICAL REPORT GUIDANCE

ORDER WQ 2019-0001-DWQ

GENERAL WDRs AND WAIVER OF WDRs FOR DISCHARGES OF WASTE ASSOCIATED WITH CANNABIS CULTIVATION ACTIVITIES

- 6.1. If the Discharger will not be able to achieve compliance by the onset of the next winter period (e.g., stabilization work will continue into the winter period or will continue the following year), the Discharger shall include a compliance schedule and scope of work for approval by the Regional Water Quality Control Board Executive Officer and for use in preparing an enforcement order.

SITE CLOSURE REPORT

A *Site Closure Report* (SCR) is required when cultivation activities at the site cease. The SCR shall be submitted in accordance with Provision C.1.e and is required for Dischargers that are covered by the Waiver (conditionally exempt) or enrolled as Tier 1 or Tier 2 Dischargers. The SCR shall be submitted with a completed Notice of Termination form (Attachment C) and shall, at a minimum, include the following components:

1. The date cultivation activities at the site will cease.
2. A description of measures that will be implemented at the cannabis cultivation site, including all areas associated with cannabis cultivation activities, to prevent sediment discharges to surface water bodies that will result in water quality degradation.
3. If construction activities are proposed as part of the closure activities, the SCR shall include a project implementation schedule.
 - 3.1. Construction and grading activities shall comply with Attachment A: Best Practices and Treatment Control Manual of the General Order.
4. For Dischargers that are classified as Tier 1 or Tier 2, a final Monitoring and Reporting Program report that includes monitoring conducted year-to-date.
5. Certification of the following items: (1) the cultivation activities will cease by the date noted in the SCR; (2) disturbed areas have or will be stabilized and the potential for waste discharges from the disturbed areas are minimized and (2) earthen material and waste have been consolidated at the site and stabilized or disposed of properly.