

FIRST AMENDED
FACTOR CONSIDERATION AND LIABILITY METHODOLOGY
FOR
MARK WEST QUARRY

This document provides details to support the California Regional Water Quality Control Board, North Coast Region (Regional Water Board) Prosecution Team's recommendations for enforcement against Bo Dean Co., Inc. (Discharger) for failure to comply with the *National Pollutant Discharge Elimination System (NPDES) General Permit for Stormwater Discharges Associated with Industrial Activities*, Order 2014-0057-DWQ (Permit, or Industrial General Permit), amended 2018, at the Mark West Quarry. The Discharger is subject to administrative civil liability for the violations described below pursuant to California Water Code (Water Code) sections 13385 subdivisions (a)(1), (a)(2), and (a)(5) and 13268 subdivision (a).

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Discharger and Site Information

Mark West Quarry is an aggregate rock quarry located on three adjacent parcels of land¹ totaling approximately 120 acres at 4611 Porter Creek Road in eastern Sonoma County (Facility). The Facility is operated by the Discharger.

The Facility has maintained its enrollment in the Permit, including previous iterations, since 1993.²

The Facility discharges to Porter Creek, a perennial tributary to Mark West Creek, which in turn is a tributary to the Russian River. Thus, Porter Creek is a water of the United States. Porter Creek is within the Mark West Hydrologic Subarea of the North Coast Region.³

The Facility consists of steep slopes and exposed rock and soil surfaces with: an aggregate processing plant; an aggregate processing and maintenance area; an active mining area; a solar array; three water supply wells; a reclaimed area; a process reclamation area; and an office.⁴

The Facility is comprised of five separate drainage areas identified as Tributary Areas A through E. Tributary Area C is the focus for the discharge volume component of this enforcement action because the sediment-laden discharge that was observed being discharged to Porter Creek originated from Tributary Area C. Tributary Area C encompasses the lower northern area including a portion of the active mining area, the processing and maintenance area and road, and the processing plant. Tributary C is approximately 13.1 acres in size and discharges to Porter Creek from the east side of the Facility.⁵

¹ According to the 2013 Mining and Reclamation Plan for the Mark West Quarry Expansion Draft Environmental Impact (EIR) Report and the 2020 SWPPP prepared by the Discharger, the Facility consists of three parcels as follows: 120-210-048, 120-210-031 and 120-210-006

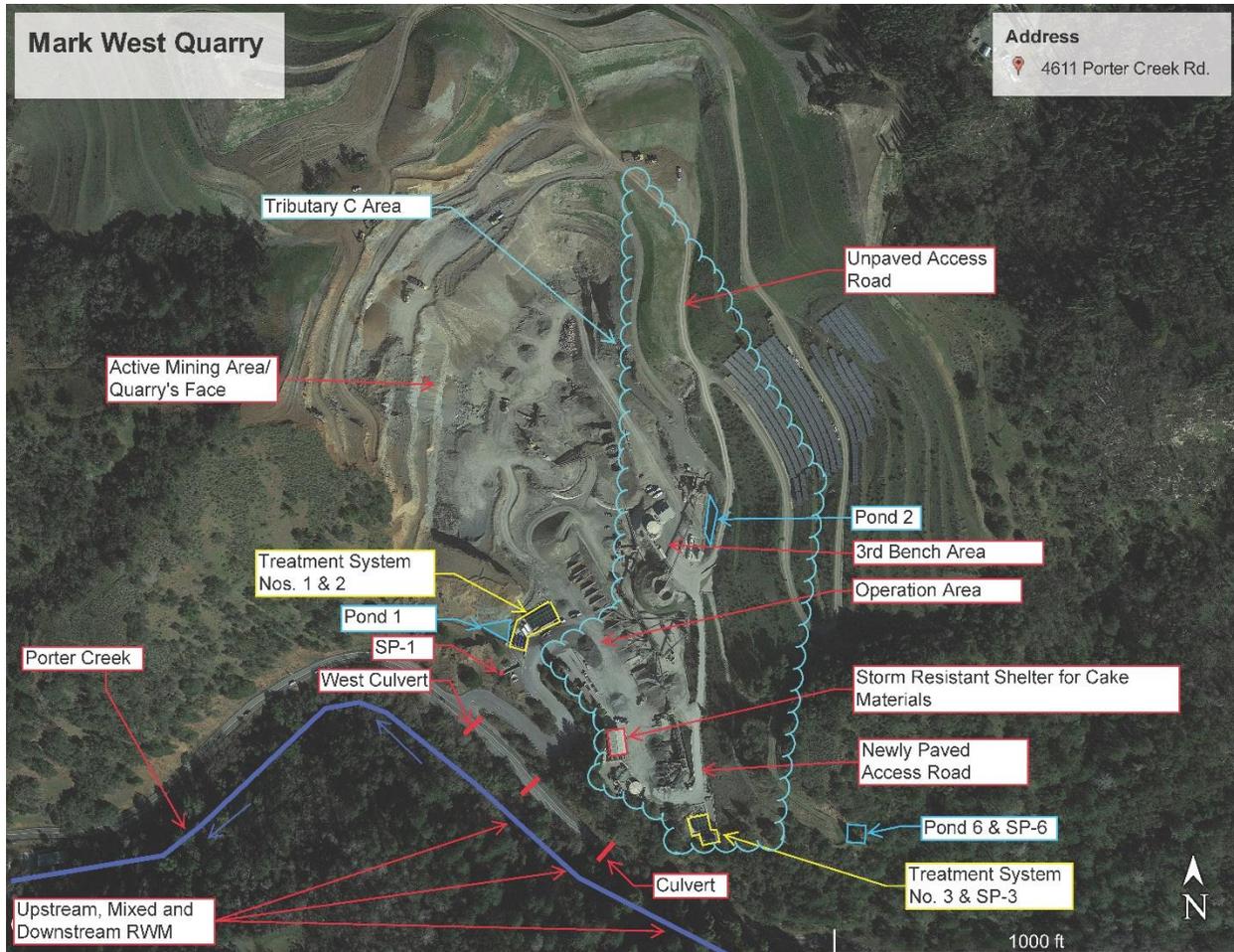
² Discharger's enrollment documents publicly available on Stormwater Multiple Application and Report Tracking System (SMARTS) at www.smarts.waterboards.ca.gov.

³ The Water Quality Control Plan for the North Coast Region (Basin Plan), page 2-11.

⁴ Discharger's enrollment documents publicly available on Stormwater Multiple Application and Report Tracking System (SMARTS) at www.smarts.waterboards.ca.gov.

⁵ "Technical Memorandum Storm Water Discharge Volumes - Watershed C Supplemental Calculations dated June 28, 2020. Updated August 24, 2020 & September 18, 2020" provided in response to Investigative Order No. R1-2019-0029 by the Discharger, prepared by EBA Engineering.

Figure 1: Site Map



Due to the nature of the Discharger's industrial activity, sediment is the pollutant which poses the highest risk to receiving waters. Sediment is "solid particulate matter, both mineral and organic, that is in suspension, is being transported, or has been moved from its origin by air, water, gravity, or ice and has come to rest on the earth's surface either above or below sea level."⁶

⁶ Industrial General Permit, Attachment C, Page 6.

Regional Water Board Oversight

On December 17, 2018, Regional Water Board staff traveling on Porter Creek Road observed a sediment plume in Porter Creek. Regional Water Board staff inspected the Facility on December 18, 2018, and determined that the Facility was a likely source of sediment contributing to the conditions observed in Porter Creek. Regional Water Board staff have inspected the Facility 21 times, issued 18 inspection memos, one Notice of Violation (NOV), two Investigative Orders, one Administrative Civil Liability Complaint (Complaint), and met with representatives of the Discharger numerous times.

On May 1, 2019, the Regional Water Board issued Water Code section 13267 Investigative Order No. R1-2019-0029 (Investigative Order) and an NOV. The Investigative Order required the Discharger to:

- Quantify the volume of discharge from the Facility from Tributary Area C for the 2018/2019 wet season,
- Conduct site assessment and identify sources of sediment,
- Evaluate if the BMPs implemented were sufficient to prevent sediment in the discharges,
- Determine if additional Advanced BMPs were necessary,
- Provide updated and corrected site maps, and
- Conduct receiving water and discharge sampling.

The Discharger's response to the Investigative Order forms the basis for the volume calculated in Violation 1 and the additional 13 days of discharge alleged in the First Amended Complaint.

On October 19, 2020, the Regional Water Board issued Water Code section 13267 and 13383 Investigative Order No. R1-2020-0026 requiring the Discharger to provide information regarding the three newly installed modular treatment systems (Treatment System 1, 2, and 3 or collectively "Treatment Systems") including its operation and maintenance plans and reports. In response, the Discharger uploaded a Spill Prevention and Response, Safety Plan, and Operation and Maintenance Manual to the Stormwater Multiple Application and Report Tracking System (SMARTS).

On September 10, 2021, the Assistant Executive Officer issued Complaint No. R1-2021-0047 alleging 45 days of discharge violations from December 2018 through May 2019, and four non-discharge violations from December 2018 through August 2020, for a total proposed administrative civil liability of \$4,500,000.

This First Amended Complaint adds 61 new days of violation to four of the five original violations and adds Violations 6 and 7, for a total of 67 additional days of violation. These changes are summarized as follows:

- Violation 1: Alleges 73 days of violation, as opposed to 45 days.
- Violation 2: Alleges 127 days of violation, as opposed to 125 days.
- Violation 3: Alleges 93 days of violation, as opposed to 92 days.
- Violation 4: Alleges 121 days of violation, as opposed to 125 days.
- Violation 5: Alleges 83 days of violation, as opposed to 53 days.
- Violation 6: Alleges three days of failing to submit within 30 days all sampling and analytical results.
- Violation 7: Alleges seven days of failing to conduct and document water monitoring and sampling, and failing to notify the Regional Water Board as required by the Investigative Order.

The days of violation for Violations 2 through 5 were evaluated independently based on evidence in the record. Therefore, while there were some dates on which multiple BMP violations were observed, the days of violations for Violations 2 through 5 are not identical.

Enforcement Policy

The State Water Resources Control Board's (State Water Board) *Water Quality Enforcement Policy* (Enforcement Policy) establishes a methodology for assessing administrative civil liability, including addressing the factors outlined in Water Code section 13385 subdivision (e) and Water Code section 13327.⁷ These two Water Code sections require the Regional Water Board to consider several factors when determining the amount of civil liability to impose, including "...the nature, circumstances, extent, and gravity of the violation or violations, whether the discharge is susceptible to cleanup or abatement, the degree of toxicity of the discharge, and, with respect to the violator, the ability to pay, the effect on its ability to continue its business, any voluntary cleanup efforts undertaken, any prior history of violations, the degree of culpability, economic benefit or savings, if any, resulting from the violation, and other matters that justice may require."

⁷ Enforcement Policy, available online:

[Water Quality Enforcement Policy](https://www.waterboards.ca.gov/water_issues/programs/enforcement/water_quality_enforcement.html)

(https://www.waterboards.ca.gov/water_issues/programs/enforcement/water_quality_enforcement.html).

Liability Methodology

Violation 1- Discharge Violation

For 73 days, the Discharger violated Industrial General Permit Discharge Prohibition III.A when it discharged polluted stormwater to waters of the United States, not otherwise specifically authorized by the Permit.

Basis of Violation

The Permit states: “All discharges of [stormwater] to waters of the United States are prohibited except as specifically authorized by this General Permit or another NPDES permit.”⁸ As described in more detail in Violations 2 through 5, the Discharger failed to implement the Permit during days alleged herein, because it did not install and maintain adequate Best Management Practices (BMPs)⁹ to control the runoff of sediment from its Facility. Therefore, between October 2018 and January 2023, the Discharger was not authorized by the Industrial General Permit to discharge its stormwater to Porter Creek.

Over the course of eight inspections, between October 2, 2018, and May 26, 2019, during which conditions at the Facility were consistently out of compliance with the minimum and Advanced BMP requirements of the Permit, Regional Water Board staff observed storm events that caused discharges of sediment-laden stormwater from Tributary Area C to Porter Creek.¹⁰

The Discharger reported in its response to Investigative Order No. R1-2019-0029, that from September 2018 through May 2019, the Facility discharged 10,519,608¹¹ gallons of stormwater polluted with sediment to waters of the United States. This total reflects

⁸ Industrial General Permit, Section III.A- Discharge Prohibition.

⁹ Best Management Practices are defined as “Scheduling of activities, prohibitions of practices, maintenance procedures, and other management practices to prevent or reduce the discharge of pollutants. BMPs also include treatment requirements, operating procedures, and practices to control site runoff, spillage or leaks, sludge or waste disposal, or drainage from raw material storage.” (Industrial General Permit, Attachment C, Glossary)

¹⁰ See Regional Water Board Inspection memos for inspections dated December 17, 2018; January 9 and 16, 2019; February 13, and 26, 2019; March 20, 2019; and May 16, 2019, December 2 and 6, 2020.

¹¹ Technical Memorandum Storm Water Discharge Volumes - Watershed C Supplemental Calculations dated June 28, 2020. Updated August 24, 2020 & September 18, 2020” provided in response to Investigative Order No. R1-2019-0029 by the Discharger, prepared by EBA Engineering.

the volume discharged from Tributary Area C, which is only a portion of the Facility. This stormwater ran throughout the Facility collecting sediment as it flowed from the top of the quarry, through poorly maintained, or non-existent BMPs, to the discharge location where it ultimately reached Porter Creek. In addition to the data collected and provided by the Discharger, Regional Water Board staff also collected water quality data which supports this violation.

Both a per day and per gallon liability are proposed for the unauthorized stormwater discharged. However, in an exercise of prosecutorial discretion, the per gallon liability is proposed for discharges initiated only from Tributary Area C, which is a limited portion of the Facility. The majority of the active mining, material storage and handling, and industrial activities occur in Tributary Areas B and C, both of which drain to Porter Creek. While Tributary Area B is the larger of the two, it was excluded from the calculation of gallons discharged as it relates to the calculation of liability as it was allegedly more difficult for the Discharger to quantify the volume of unauthorized stormwater discharged from this area. Furthermore, the Prosecution Team has utilized only the volume reported by the Discharger, which is based on Tributary C being 13.1 acres—whereas the “Mining and Reclamation Plan for the Mark West Quarry Expansion Draft Environmental Impact Report” (EIR) lists 17.1 acres as the size of that area, which would result in a significant increase in the liability amount associated with this violation.¹² Also, to the Discharger’s benefit, the liability amount based on alleged gallons discharged has been limited to the 2018/2019 rain season, as reported by the Discharger, as opposed to a calculation based on all rain events to date.

¹² Mining and Reclamation Plan for the Mark West Quarry Expansion Draft Environmental Impact Report, State Clearinghouse # 2005062093, Figure 4.2-1.

Discussion of Factors for Per Day Liability for Violation 1

Days of Violation

The Prosecution Team alleges a total of 73 days of violation. Between October 2, 2018, and May 26, 2019, the Prosecution Team alleges 60 days of unauthorized discharges based on admissions made in the Discharger's Technical Memorandum Storm Water Discharge Volumes provided in response to Investigative Order R1-2019-0029.¹³ Of these 60 days, Regional Water Board staff directly observed unauthorized sediment-laden discharges to Porter Creek, in violation of the Permit on seven days.¹⁴

Following the issuance of the Investigative Order that required the Discharger to collect receiving water samples, the Discharger reported many discharges to Porter Creek in violation of the Water Quality Control Plan for the North Coast Region (Basin Plan). The Prosecution Team is alleging an additional 13 days of violation where monitoring data shows that on those days there was a discharge in exceedance of the Basin Plan turbidity objective¹⁵. Of these 13 added days, on December 10, 2022, and January 14, 2023, the Regional Water Board staff directly observed the unauthorized discharges and collected samples that demonstrated that the discharge caused the exceedance of the Basin Plan turbidity objective. The remaining days are based on the data submitted to SMARTs by the Discharger.

In light of the already significantly large proposed liability amount, the Prosecution Team is alleging out of the many reported discharges only 13 days of violation, which are the days where data collected within Porter Creek demonstrated that the discharge from the Facility caused turbidity increases that exceeded the 20% increase limit set forth as a water quality objective in Section 3.3.17 of the Basin Plan¹⁶.

¹³ Technical Memorandum Storm Water Discharge Volumes - Watershed C Supplemental Calculations dated June 28, 2020. Updated August 24, 2020 & September 18, 2020, provided in response to Investigative Order No. R1-2019-0029 by the Discharger, prepared by EBA Engineering.

¹⁴ Dates include December 17, 2018; January 9, 2019; January 16, 2019; February 13, 2019; February 26, 2019; March 20, 2019; May 16, 2019.

¹⁵ Dates include: December 2, 2019; December 4, 2019; December 22, 2019; December 29, 2019; January 21, 2020; March 24, 2020; April 4, 2020; November 17, 2020; January 4, 2021; October 22, 2021; December 10, 2022; January 13, 2023; January 14, 2023.

¹⁶ December 2, 2019; December 4, 2019; December 22, 2019; December 29, 2019; January 21, 2020; March 24, 2020; April 4, 2020; November 17, 2020; January 4, 2021; October 22, 2021; December 10, 2022; January 13, 2023; January 14, 2023.

In addition, Regional Water Board staff collected samples within Porter Creek which demonstrated that the turbidity increases caused by their discharge exceeded the Basin Plan's 20% increase limit on two days.¹⁷ Therefore, the total days of violation alleged for the total per day liability for Violation 1 for unauthorized discharge is 73 days.

Degree of Toxicity of Discharge

The Enforcement Policy states that the degree of toxicity considers the physical, chemical, biological, and thermal characteristics of the discharge or material involved in the violation and the risk of damage the discharge could cause to the receptors or beneficial uses. Evaluation of the discharged material's toxicity should account for all the characteristics of the material prior to discharge, including whether it is partially treated, diluted, concentrated, or a mixture of different constituents. Toxicity analysis should include assessment of both lethal and sublethal effects such as effects on growth and reproduction. A score between 0 and 4 is assigned based on a determination of the risk and threat of the discharged material.

Here, large volumes of sediment-laden stormwater were discharged over an extended period of time, to a sediment impaired receiving water system. The discharged sediment included very fine silt and clay-size material likely produced by blasting at the Facility, and the "cake"¹⁸ material produced during crushing and washing in the recovery process. The "cake" material was stockpiled at the top of the Facility where it was left uncovered and allowed to contact stormwater and be transported to Porter Creek. This "cake" material is particularly deleterious to aquatic species because it does not readily settle in the water column and, therefore, has a long residence time in the environment, travels long distances, and results in elevated turbidity¹⁹ levels for extended periods of time.

Sediment that is discharged into receiving waters is problematic in many ways. When suspended in the water column it causes elevated turbidity levels in the water column; clouding receiving waters and reducing the amount of sunlight reaching aquatic plants. Sediment can clog fish gills, reduce visibility making it difficult for fish to locate food, find mates, and seek cover and avoid predators.

Even short periods of elevated turbidity, or minimal increases to turbidity, can have significant impacts on aquatic species such as juvenile salmonids. Studies show that reactive distances, the area in which fish can detect and capture prey, changed

¹⁷ December 10, 2022, and January 14, 2023

¹⁸ Waste material, consisting of fine-grained sediment, produced from filtering process water.

¹⁹ The cloudiness of water quantified by the degree to which light traveling through a water column is scattered by the suspended organic and inorganic particles it contains. The turbidity test is reported in Nephelometric Turbidity Units (NTU) or Jackson Turbidity Units (JTU). (Industrial General Permit, Attachment C, Glossary, page 8)

significantly in rainbow trout from 80 percent to 45 percent respectively in 15 nephelometric turbidity units (NTU) and 30 NTU.²⁰

As sediment settles out of the water column, it impairs aquatic life through deposition of fine grain particles into spawning, rearing, and interstitial niche habitats in a stream's substrate. The filling in of interstitial niches reduces habitat availability; reduced habitat availability in turn affects habitat complexity and biodiversity of species, which affects available food sources in terms of available grazing, shredding, and prey species types.²¹ The accumulation of sediment in the substrate also affects permeability and can result in less oxygen available in the substrate to support aquatic flora and fauna. Sediment deposition may also reduce the storage capacity of the stream and lead to shallower stream channels, causing flooding, stream bank scouring, and increases in stream temperature which in the short term can kill fish and other species and make the waterway unsuitable habitat to sensitive species in the long term.

Sediment can also mobilize and transport other pollutants such as, nutrients, metals, and oils and grease, that can be toxic to aquatic organisms.²²

Potential receptors in the Mark West Creek watershed and Porter Creek include: anadromous fish (steelhead trout, and Coho salmon), aquatic insects and plants, and domestic water users.²³ The discharged sediment from the Facility poses an above-moderate and direct threat to these potential receptors.

For all 73 days of violation, the Prosecution Team has assigned a Degree of Toxicity of Discharge score of **3**, as sediment-laden stormwater posed an above moderate risk or threat to potential receptors.

Actual or Potential for Harm to Beneficial Uses

The Enforcement Policy states that evaluation of the actual or potential for harm to beneficial uses considers the harm to beneficial uses in the affected receiving water body that may result from exposure to the pollutants or contaminants in the discharge. The Regional Water Board may consider actual harm or potential harm to human health and/or beneficial uses. The score evaluates direct or indirect actual harm or potential for harm from the violation. The harm or potential harm to beneficial uses ranges between 0 and 5 based on a determination of whether the harm or potential for harm to beneficial uses is negligible (0), minor (1), below moderate (2), moderate (3),

²⁰ Barrett, J. C., Grossman, G. D., Rosenfeld, J., Turbidity Induced Changes in Reactive Distances of Rainbow Trout, Transactions of the American Fisheries Society, 121:437- 443, 1992.

²¹ Bash, J., Berman, C., Bolton, S., Effects of Turbidity and Suspended Solids on Salmonids, Center of Streamside Studies, University of Washington, 22-23, 2001.

²² Industrial General Permit, Fact Sheet, Page 51.

²³ California Department of Fish and Wildlife Study Plan - Habitat and Instream Flow Evaluation for Anadromous Steelhead and Coho Salmon in Upper Mark West Creek, Sonoma County.

above moderate (4), or major (5). The Enforcement Policy defines moderate as impacts that are observed or reasonably expected potential impacts, but harm or potential harm to beneficial uses is moderate and likely to attenuate without appreciable medium or long term acute or chronic effects.

The Facility discharges to Porter Creek, which then discharges into the Laguna de Santa Rosa, and ultimately to the Russian River. The Russian River Watershed supports several aquatic species, including the Coho Salmon, Chinook Salmon, and Steelhead Trout (all of which are listed as Threatened under the Federal Endangered Species Act). The Basin Plan²⁴ for the North Coast Region contains water quality objectives that are necessary for reasonable protection of the beneficial uses. Protection of fishery-related beneficial uses (i.e., Cold Freshwater Habitat; Commercial and Sport Fishing; Spawning, Reproduction, and/or Early Development; Rare, Threatened, or Endangered Species; and Migration of Aquatic Organisms) is of particular importance, including from the following pollutants:

Sediment (Section 3.3.11) “The suspended sediment load and suspended sediment discharge rate of surface waters shall not be altered in such a manner as to cause nuisance or adversely affect beneficial uses.”

Suspended Material (Section 3.3.12) “Waters shall not contain suspended material in concentrations that cause nuisance or adversely affect beneficial uses.”

Turbidity (Section 3.3.17) “Turbidity shall not be increased more than 20 percent above naturally occurring background levels.

The discharge from the Facility had a significant amount of sediment when compared with the levels measured in Porter Creek upstream of the Facility’s discharge locations. For example, samples collected by Regional Water Board staff on January 9th, 2019, during a rain event that generated 0.59” that day show that the turbidity of the discharge from the Facility was measured to be greater than 2,000 NTU (Nephelometric Turbidity Units) while the background turbidity in Porter Creek upstream of the Facility’s discharge location was 61.7 NTUs.

These discharges from the Facility had a significant and measurable impact on the receiving water. The increase in turbidity from January 9th, 2019, show that the level at the mixed zone in Porter Creek was 1,684 NTUs while upstream was only 61.7 NTUs. This increase represents a 2,629% increase in turbidity over upstream background levels due to the discharge from the Facility.²⁵ As stated in the Basin Plan “Turbidity

²⁴ [North Coast Region Basin Plan](https://www.waterboards.ca.gov/northcoast/water_issues/programs/basin_plan/basin_plan_documents/)

(https://www.waterboards.ca.gov/northcoast/water_issues/programs/basin_plan/basin_plan_documents/)

²⁵ Inspection memo for inspection conducted on January 9, 2019.

shall not be increased more than 20 percent above naturally occurring background levels.”²⁶

The receiving water is listed on the Clean Water Act section 303(d) list as a sediment-impaired system²⁷ thus indicating that there is no assimilative capacity for the system to take on additional sediment without adversely impacting water quality.

The particular sensitivity of the affected water body impacted by discharges from this Facility led the County of Sonoma to take the additional protective step of imposing a more restrictive limit related to turbidity in the “Mining and Reclamation Plan for the Mark West Quarry Expansion Draft Environmental Impact Report” (EIR).²⁸ The EIR, which was adopted on June 20, 2013, by the County of Sonoma, states the following:

“The Basin Plan allows stormwater from a project site to increase turbidity in a receiving stream by no more than 20%. However, in the case of this project, because of the sensitivity of Porter Creek, the stormwater from the project would not be allowed to increase turbidity any more than the runoff from the existing quarry does for an overall no net increase as a result of quarry expansion. The RWQCB shall review the water quality monitoring data and determine the turbidity baseline to be used in the final Stormwater/Water Quality Protection Program.”²⁹

The Regional Water Board adopted the Total Maximum Daily Load Implementation Policy Statement for Sediment-Impaired Receiving Waters in the North Coast Region (Sediment TMDL Implementation Policy) by Resolution No. R1-2004-0087. The goals of the Sediment TMDL Implementation Policy are to control sediment waste discharges to impaired water bodies so that the TMDLs are met, sediment water quality objectives are attained, and beneficial uses are no longer adversely affected by sediment. The Sediment TMDL Implementation Policy states that the Executive Officer is directed to “rely on the use of all available authorities, including the existing regulatory standards, and permitting and enforcement tools to more effectively and efficaciously pursue compliance with sediment-related standards by all dischargers of sediment waste.

The discharge of sediment-laden water from the Facility into Porter Creek was a persistent condition that repeatedly caused impacted conditions over at least a year.

²⁶ The Water Quality Control Plan for the North Coast Region (Basin Plan), Page 3-6.

²⁷ The Russian River and its tributaries are listed as impaired for sediment under Clean Water Act Section 303(d) available online at: [Final 2014/2016 California Integrated Report \(https://www.waterboards.ca.gov/water_issues/programs/tmdl/integrated2014_2016.shtml\)](https://www.waterboards.ca.gov/water_issues/programs/tmdl/integrated2014_2016.shtml)

²⁸ Mining and Reclamation Plan for the Mark West Quarry Expansion Draft Environmental Impact Report, State Clearinghouse # 2005062093.

²⁹ Mitigation Measures, 4.2-B.1,7.

Discharges from the Facility resulted in significant deposits of fine sediment in the Porter Creek stream channel, impacting habitat while deposited, and available to become resuspended and transported farther downstream with each subsequent high flow event. Sediment discharges from the Facility are reasonably expected to have a negative impact on the beneficial uses for the Mark West Subarea and Porter Creek, especially those related to aquatic beneficial uses which are present and include: cold freshwater habitat (COLD); rare, threatened, or endangered species (RARE); migration of aquatic organisms (MIGR); spawning, reproduction, and/or early development (SPAWN).³⁰

Per California Department of Fish and Wildlife:

“Mark West Creek is one of five priority stream systems selected as part of the 2014 California Water Action Plan³¹ effort. The 59 square mile Mark West Creek HUC12 subwatershed, located within Sonoma County, is the second largest subwatershed in the Russian River basin. The creek supports several listed anadromous salmonid species including California Coastal Chinook Salmon, and Central California Coast Coho Salmon and steelhead trout. Salmonid populations within Mark West Creek and other Russian River tributaries have declined significantly. Coho Salmon, in particular, neared extirpation within the Russian River basin in the late 1990s, and their recovery is now supplemented by captive broodstock efforts that include juvenile releases into Mark West Creek.”³²

In response to the California Water Action Plan’s inclusion of Mark West Creek, the California Department of Fish and Wildlife conducted a number of studies in the Mark West Creek watershed to provide information to help support the recovery of anadromous species. One of those studies, states:

“The degradation and loss of freshwater habitat, caused by a decrease in water quality and insufficient water quantity, is one of the leading causes of salmonid decline (CDFG 2004; NMFS 2012). Water diversions, modifications to riparian vegetation, and sediment delivery to streams that provide critical habitat to salmonid species in the Russian River watershed have contributed to the degradation and loss of habitat (NMFS 2008; Sonoma RCD 2015).”³³

³⁰ The Water Quality Control Plan for the North Coast Region (Basin Plan), Page 2-11.

³¹ [California Water Action Plan](#)

³² [Mark West Creek Study \(Sonoma County\)](#)

<https://wildlife.ca.gov/Conservation/Watersheds/Instream-Flow/Studies/Mark-West-Creek-Study>

³³ [Mark West Creek Study Plan \(ca.gov\)](#)

<https://wildlife.ca.gov/Conservation/Watersheds/Instream-Flow/Studies/Mark-West-Creek-Study>

The presence of suspended sediment within receiving waters has direct impact on aquatic species. The study states that:

“Additionally, Reiser and Bjornn (1979) and Moyle (2002) note that high levels of suspended fine sediments can adversely impact rearing habitat and food availability, and can negatively impact survival by damaging the gills of juvenile fish.”

Therefore, the discharge of sediment associated with Violation 1 has the potential to significantly exacerbate the ongoing degradation of salmonid habitat and anadromous population decline. Later, the study establishes that the watershed is critical to sustaining the anadromous population:

“Collectively, CCC steelhead, CC Chinook Salmon, and CCC Coho Salmon utilize the Mark West Creek subwatershed year-round to carry out the freshwater stages of their life histories. CCC steelhead and CC Chinook Salmon are both listed as threatened under the federal ESA, while CCC Coho Salmon are listed as endangered under both the ESA and CESA. Bjorkstedt et al. (2005) and Moyle et al. (2008) concluded that CCC steelhead within Mark West Creek exist as an essential, potentially independent population within the steelhead DPS. CCC Coho Salmon in lower Russian River tributaries, including Mark West Creek, exist as part of a single, functionally independent population that is at high risk of extirpation (NMFS 2008).”³⁴

While continued impacts from the high turbidity discharges into Porter Creek likely caused harm to beneficial uses, it is also likely that the turbidity and sediment discharged from the Facility into receiving waters attenuated without appreciable medium or long term acute or chronic effects because exceedances were limited to storm events and subsequent high flow events.

For all 73 days of violation, the Actual or Potential Harm to Beneficial Uses was determined to be **moderate (3)**.

Susceptibility to Cleanup or Abatement

As described in the Enforcement Policy a score of 1 should be assigned when a discharger cleans up less than 50 percent of the discharge in a reasonable amount of time or when less than 50 percent of the discharge is susceptible to cleanup and abatement. Although it would have been possible for the Discharger to clean up some of the sediment deposited in the receiving water, there is no evidence in the record to suggest that the Discharger conducted any of this cleanup work. In addition, less than 50 percent of the sediment is susceptible to cleanup and abatement as the majority

³⁴ [Mark West Creek Study Plan \(ca.gov\), Section 4.1, page 15](#)

entrained in the stormwater discharged to Porter Creek has dispersed and dissipated in the watershed.

The Prosecution Team has therefore assigned a factor of **1**.

Deviation from Requirement

The requirement under Industrial General Permit Discharge Prohibition III.A is that any discharges of stormwater that are not specifically authorized are prohibited.

The Permit authorizes discharges only when all other provisions of the Permit are properly implemented at an industrial facility. The Discharger failed to meet the minimum and Advanced BMP requirements of the Permit, as alleged in Violations 2 through 5, during the entire time period alleged for Violation 1. Therefore, the ongoing discharge of polluted stormwater from the Facility was not authorized by the Permit.

The relevant discharge prohibition was rendered ineffective in its essential function because the Facility failed to implement adequate and effective minimum and advance BMPs.

For all 73 days of violation, the Deviation from Requirement was determined by the Prosecution Team to be **major**.

Discussion of Additional Factors for Per Gallon Liability for Violation 1

Gallons of Discharge

As stormwater flows through the Facility it picks up sediment generated by the industrial activities, and during the period of violation, was not adequately managed through other minimum and Advanced BMPs, resulting in the unauthorized discharge of sediment-laden stormwater to surface waters.³⁵

The gallons of discharge alleged in this violation are based on calculations provided by the Discharger in response to the Regional Water Board's 13267 Investigative Order No. R1-2019-0029, including revisions to that response to reflect onsite storage and reuse. The Discharger provided calculations for all stormwater discharged from Tributary Area C in the 2018-2019 rain season. While the Facility includes some storage capacity, and the Discharger's calculations reflect this, Regional Water Board staff observed that the stormwater runoff exceeded the capacity of storage volume in Tributary Area C.³⁶

Taking into account this storage volume, and the reuse of a portion of the collected stormwater as process water, the total volume of unauthorized discharge is 10,519,608 gallons. Per Water Code section 13385 subdivision (c)(2), per gallon liability is imposed for every gallon discharged over 1,000 gallons but not cleaned up. Therefore, 10,518,608 gallons is the volume used in the liability calculations.

Per Gallon Liability- High Volume Discharges

For discharge violations, Water Code section 13385 subdivision (c) states that civil liability may be imposed in an amount not to exceed the sum of both of the following:

- (1) Ten thousand dollars (\$10,000) for each day in which the violation occurs and;
- (2) Where there is a discharge, any portion of which is not susceptible to cleanup or is not cleaned up, over 1,000 gallons, up to ten dollars (\$10) per gallon.

³⁵ Technical Memorandum Storm Water Discharge Volumes - Watershed C Supplemental Calculations dated June 28, 2020. Updated August 24, 2020 & September 18, 2020, provided in response to Investigative Order No. R1-2019-0029 by the Discharger, prepared by EBA Engineering.

³⁶ See Regional Water Board Inspection memos for inspections dated December 17, 2018; January 9 and 16, 2019; February 13, 19, and 26, 2019; March 20, 2019; and May 16, 2019, December 2 and 6, 2020.

The Enforcement Policy notes that “[i]n most cases, the Water Boards shall apply the per gallon factor to the maximum per gallon amounts allowed under the Water Code.” However, the Enforcement Policy does allow the Regional Water Board to elect to use a value between \$2.00 and \$10.00 per gallon for discharges that are between 100,000 and 2,000,000 gallons, and that the Regional Water Board may elect to use a maximum of \$1.00 per gallon where the volume of waste discharged is more than 2,000,000 gallons.

While volumes of stormwater discharged during the several storm events covered within this time period may have been individually less than 2,000,000 gallons and, for some single storm events less than 100,000 gallons individually, the Prosecution Team has elected to apply a \$1.00 per gallon liability to the total volume of stormwater discharged during this period due to the extensive cumulative volume.

Discussion of Violator's Conduct Factors for Violation 1

Degree of Culpability

The Enforcement Policy directs that in order to determine the Discharger's culpability, the first step is to identify any performance standards (or, in their absence, prevailing industry practices) in the context of the violation. The test for whether a discharger is negligent is what a reasonable and prudent person would have done or not done under similar circumstances. Adjustment should result in a multiplier between 0.75 and 1.5, with a higher multiplier for intentional misconduct and gross negligence, and a lower multiplier for more simple negligence. A neutral assessment of 1.0 should be used when a discharger is determined to have acted as a reasonable and prudent person would have. A multiplier of less than 1.0 should only be used when a discharger demonstrates that it has exceeded the standard of care expected of a reasonably prudent person to prevent the violation.

The culpability for discharges that occurred during the 2018-2019 rainy season was analyzed separately from the culpability for the 13 days of discharge that followed. For the 2018-2019 rain season, the following was considered when determining the Degree of Culpability.

From December 2018 to May 2019, Regional Water Board staff conducted numerous inspections, including one inspection in February 2019 accompanied by the United States Environmental Protection Agency (USEPA) and County of Sonoma Permit and Resource Management Department (PRMD) staff. Throughout these inspections, Regional Water Board staff, and accompanying agencies, observed features or conditions at the Facility that did not comply with the Industrial General Permit. During inspections, and in follow-up correspondence, Regional Water Board staff documented and communicated these deficiencies to the Discharger.

In short, the Discharger's BMPs were inadequate or ineffective and/or were not maintained appropriately during the entire 2018/2019 rainy season.³⁷ During this time Regional Water Board staff observed little, or no, evidence of changes made to the Discharger's operations, and little or no improvement to the type or extent of BMP implementation until the 2019/2020 rainy season, which is more than a year after the alleged period of violation, despite notification to the Discharger.³⁸

Even before the Regional Water Board began more active oversight of the Facility in 2018, the Dischargers had received written notice that the Facility conditions were in violation of the Permit. In May 2016, the Regional Water Board issued a Notice of

³⁷ See Regional Water Board Inspection memos for inspections dated December 17, 2018; January 9, 2019; February 19, 2019; February 26, 2019; March 20, 2019; May 14, 2019; and May 16, 2019.

³⁸ See Regional Water Board Inspection memos for inspection dated August 13, 2020.

Violation (NOV) to the Discharger for its failure to comply with the Permit's discharge prohibitions and Numeric Action Levels (NALs).

During the 2016/2017 reporting year, the Discharger's samples exceeded the annual NALs for Total Suspended Solids (TSS) causing the Discharger to enter Level 2 status, the highest regulatory status under the Permit. Samples collected during the 2016/2017, 2017/2018, and 2018/2019 reporting years by the Discharger exceeded the annual NAL for TSS. Correspondingly, the Discharger's December 2017 "Exceedance Response Action Level 2 Action Plan (Level 2 Plan)" lists several "pollutant sources that are likely contributing to the NAL exceedance" including material storage and material tracking. Despite these indications that BMPs at the Facility were deficient, the Discharger did not implement any significant changes to BMP management or deploy additional BMPs during the period of alleged violation.

Additionally, during a Facility inspection in February 2019, the Discharger stated that it did not have a routine schedule to clean the settling tanks or assess accumulated sediment levels in the tanks. Having appropriate operations and maintenance schedules to ensure that settling tanks properly functioned is necessary to prevent unauthorized discharges and the failure to have them is not reasonable.

The Discharger has operated the Facility and been enrolled under the Permit since March 1993. The Permit identifies sediment as a core pollutant, requires monitoring of TSS, and requires both minimum and Advanced BMPs that are inspected regularly to ensure that they are properly installed, well maintained, and effective to prevent the discharge of pollutants. Additionally, the Discharger is regulated under the Surface Mining and Reclamation Act (SMARA) program and was issued a Conditional Use Permit (Use Permit) by the County of Sonoma in 2013 which specifically states: "Runoff containing sediment or other waste or by-products shall not be allowed to drain to the storm drain system, waterway(s), or adjacent lands."

The expansion of the Mark West Quarry mining operation in 2013 required, pursuant to CEQA, the development, notification, and adoption of a site-specific EIR.³⁹ This EIR identified numerous expected and anticipated sediment and hydraulic impacts from the expansion and operation of the Facility and required mitigation measures specifically to prevent those impacts from harming sensitive receiving waters.

The EIR states that:

"The proposed expansion would create newly disturbed areas and expose sediment and rock flour to weathering and transport processes. Once disturbed, soil particles can become entrained in stormwater runoff and, if not properly controlled, the sediment-laden runoff can be discharged into Porter Creek and Mark West Creek. Porter and Mark West Creeks are part of the Russian River

³⁹ Mining and Reclamation Plan for the Mark West Quarry Expansion Draft Environmental Impact Report, State Clearinghouse # 2005062093.

Mark West HSA and are listed as impaired waterways under Section 303(d) of the Clean Water Act due to sediment and temperature. High sediment loads can be detrimental to aquatic plants and animals by increasing water temperatures and limiting oxygen availability. The proposed project could increase the sediment delivery and exacerbate already impaired water quality conditions downstream in Porter and Mark West Creeks.”⁴⁰

Additionally, the EIR identified impacts due to increased flow from the Facility and the anticipated significant impacts to Porter Creek.⁴¹

Also, as a Mitigation Measure, the EIR required that the Discharger conduct frequent monitoring of all discharges and within the receiving water to ensure that the receiving water was not negatively impacted by the expanded mining operation at the Facility.⁴²

The Use Permit implements conditions required by both the SMARA regulations and the Facility’s specific EIR. These conditions include specific requirements related to the discharge, settling pond and BMP design, as well as the development of site-specific plans for submittal to both the County of Sonoma and the Regional Water Board. The Use Permit served as an additional basis for the contention that the Discharger knew of the Permit requirements, yet continued to violate them.

Despite the Discharger’s enrollment in the Permit, the Regional Water Board’s NOVs, multiple NAL exceedances, and numerous site inspections with verbal warnings and written inspection memos identifying deficiencies, the Discharger made only minimal improvements at the Facility to reduce or prevent the continued discharge of sediment-laden stormwater to Porter Creek over the course of the period of violation.

The Discharger knew or should have known, based on its own sampling data and Regional Water Board communications and inspections, that its BMP controls were inadequate. The Discharger knew or should have known that the settling tanks, ponds, and structures lacked the capacity and functionality to be effective in controlling the amount of sediment in stormwater generated on-site. Yet the Discharger allowed turbid, inadequately treated, stormwater discharges to continue throughout the period of violation. At the outset, as a permittee the Discharger should have known of the regulatory requirements to prevent sediment-laden dischargers—and following Regional Water Board staff’s many attempts with compliance assistance during this time frame, the Discharger knew or should have known of the regulatory requirements and, yet, continued to violate them. These actions are at best negligent and at worst intentional. The Discharger knew or should have known of the Permit requirements and elected not to take the necessary action to comply. A reasonably prudent person would have implemented the necessary actions to prevent the violation. As such, for the

⁴⁰ Sedimentation Impacts on Water Quality, Impact 4.2-B, Page 4.2-22.

⁴¹ Impact of Increased Flows on Porter Creek, Impact 4.2-A, Page 4.2-19.

⁴² Mitigation Measures, 4.2-B.1, 7, Page 4.2-27.

2018-2019 rain season, the Prosecution Team has assigned the Degree of Culpability Factor of **1.3**.

For the period of noncompliance following the 2019 rain season, the following facts were also considered in determining the Degree of Culpability.

By January 29, 2020, the Discharger had installed and began operating the three new modular Treatment Systems (Treatment Systems 1, 2, and 3) to further reduce sediment in its discharged stormwater through the use of chemical flocculent. The Treatment Systems are considered to be an Advanced BMP, as described in Permit Section X.H.2iii.⁴³ The Treatment Systems, in tandem with the improvements to minimum and other Advanced BMPs, discussed in more detail below, comply with the requirements of the Permit with regards to Section X.H. However, sampling data collected during the 2019/2020 rain season after the new treatment systems came online indicate that the Discharger was still discharging stormwater that exceeded the Basin Plan's turbidity objective.

On November 7, 2022, California Department of Fish and Wildlife (CDFW) staff observed a significant amount of sediment-laden stormwater run-off flowing down the Facility's driveway, bypassing the Former SP-2 and West Culvert settling tanks, and discharging into Porter Creek. CDFW staff also observed uncovered stockpiles of aggregate releasing sediment down the driveway.⁴⁴

On December 10, 2022, Regional Water Board staff observed fine sediment deposited in Porter Creek immediately downstream of the Culvert outfall from the quarry and collected samples that showed that the turbidity from the Culvert was 1,646 NTU. Facility staff stated that the Treatment System was backflushing⁴⁵, and they did not know how to correct it.⁴⁶ The instream turbidity measured by Regional Water Board staff on December 10, 2022, shows that the level downstream of the discharge from the Facility (Mixed) in Porter Creek was 1,366 NTUs while upstream was only 42 NTUs.⁴⁷ This increase represents a 3,152% increase in turbidity over upstream background levels and is attributable to the discharge from the Facility. Not only did the Discharger continue to violate the Permit Discharge Prohibition with the knowledge that the Treatment Systems were not operating properly, were backflushing, and causing discharge from the Facility to Porter Creek, but it also failed to notify Regional Water Board staff, which is a direct violation of both Investigative Orders and is discussed more fully in Violation 7.

⁴³ Discharger's SWPPP dated August 17, 2020, Appendix 5.

⁴⁴ Photos taken by Nick Bennett, CDFW, November 7, 2011.

⁴⁵ Reversing the flow in each of the pods to remove filtered sediment and debris from the media bed, Water Tectonics, Operation and Maintenance Manual, Pg. 12.

⁴⁶ Inspection memo for inspections conducted on December 9 and 10, 2022.

⁴⁷ Inspection memo for inspections conducted on December 9 and 10, 2022.

On January 13, 2023, Regional Water Board staff driving by the Facility on Porter Creek Road observed sediment discharging from the Facility into Porter Creek. In response, follow-up inspections were conducted on January 13 and 14, 2023, where Regional Water Board staff witnessed a significant amount of turbid water discharging from the Culvert and other discharge points into Porter Creek. Regional Water Board staff collected samples on January 14, 2023, from Porter Creek showing that the turbidity from the Culvert was 4,016 NTU. The increase in turbidity recorded by Regional Water Board staff on January 14, 2023, show that the level downstream of the discharge from the Facility (Mixed) in Porter Creek was 374 NTUs while upstream was only 47.3 NTUs⁴⁸. This increase represents a 691% increase in turbidity over upstream background levels due to the discharge from the Facility.

While the Discharger may argue that it is not culpable due to a car accident, which caused a loss of power at the Facility, such an argument is not supported. Once Regional Water Board staff completed collecting samples within Porter Creek on January 14, 2023, they went up to the Facility to speak with Facility staff. When asked if the Treatment Systems were currently operating, Facility staff stated that a car accident had occurred on Porter Creek Road and that the power was out at the Facility and therefore the Treatment Systems were offline and not operational yet, this is not reasonable because Facility staff were present, the quarry was open and selling product, and backup power generators were in use. When asked if they had back-up power generators, Facility staff stated that they only had generators to power the office and scales and not the Treatment Systems—this is not reasonable as compliance with the law must be prioritized over profit and the Discharger had been explicitly told, in writing, that backup power was necessary and must be provided for this type of treatment system. When asked if they had taken receiving water samples, Facility staff stated that they were not trained to take samples and that their consultant was unable to get to the Facility to take samples because the road was closed due to the car accident—this is not reasonable as the Facility was clearly accessible as demonstrated by the staff present on site and the sale of product and the Facility staff present should have been capable of collecting the required samples.⁴⁹ Additionally, Board staff was able to access the Facility to conduct sampling.

As discussed in the analysis above regarding the Discharger's culpability during the 2018-2019 rainy season, the Discharger knew or should have known based on its own sampling data that its BMP controls were inadequate. The Discharger knew or should have known that the settling tanks, ponds, structures, and Treatment Systems lacked the capacity and functionality to be effective in controlling the amount of sediment in stormwater generated on-site. Since the 2018-2019 rainy season, the Discharger should have understood its BMP controls were not working because of the continued discharges observed by CDFW, the County of Sonoma, and again by the Regional

⁴⁸ Inspection memo for inspections conducted on January 13 and 14, 2023.

⁴⁹ Facility staff, Ryan Gomer, stated to Regional Water Board staff Heaven Moore and Jeremiah Puget. Inspection memo for inspections conducted on January 13 and 14, 2023.

Water Board, which the Discharger knew or should have known of. In addition, the original Complaint was issued on September 10, 2021, which gave the Discharger additional notice of the violation and the regulatory requirements. Yet the Discharger continued to allow turbid, inadequately treated, stormwater discharges to continue.

Therefore, for the additional 13 days of violation since the 2018-2019 rain season the Prosecution Team has assigned Degree of Culpability Factor of **1.4**.

History of Violations

According to the Enforcement Policy, where the discharger has no prior history of violations, this factor should be neutral, or 1.0. The Enforcement Policy provides that where the discharger has prior violations within the last five years, the Water Boards should use a multiplier of 1.1 and that a factor of above 1.1 should be considered where the discharger has a history of similar or numerous dissimilar violations.

On August 19, 2021, the Regional Water Board adopted stipulated Cease and Desist Order No. R1-2021-0027 (CDO) requiring the Discharger to comply with the Industrial General Permit at another industrial facility. The CDO was based on violations of the Industrial General Permit identified at another facility. Because the Discharger has a history of adjudicated violations, the Prosecution Team has determined that a **1.1** is appropriate.

Cleanup and Cooperation

As stated in the Enforcement Policy, cleanup and cooperation takes into account voluntary efforts to cleanup and/or to cooperate with regulatory authorities in returning to compliance after the violation. Any adjustment results in a multiplier between 0.75 to 1.5, using the lower multiplier where there is exceptional cleanup and cooperation compared to what can reasonably be expected, and higher multiplier where there is not. A reasonable and prudent response to a discharge violation or timely response to a Water Board order should receive a neutral adjustment as it is assumed a reasonable amount of cooperation is the baseline.

Although it would have been possible for the Discharger to cleanup some of the sediment deposited in the receiving water, there is no evidence in the record to suggest that the Discharger conducted any cleanup work. Further, because the sediment that was discharged had been mobilized into the environment, cleanup is no longer feasible.

As with culpability, the cleanup and cooperation associated with the discharges during the 2018/2019 rainy season is analyzed separately from the cleanup and cooperation associated with the discharges that followed.

For the 2018-2019 rain season, the Discharger did not respond in a timely fashion to correct conditions of noncompliance at the Facility. Despite multiple NOVs, inspection memos, and written and oral communication by Regional Water Board staff, the Discharger failed to take significant action to achieve compliance with the Permit. Although staff of several agencies, including the Regional Water Board, USEPA, and the County of Sonoma identified and communicated to the Discharger specific deficiencies and concerns, the Discharger failed to cooperate with regulatory agencies to make the changes or improvements to its BMPs and pollution control efforts during the 2018-2019 wet weather discharge events.

A reasonable and prudent discharger would have responded in a timely manner. The Discharger's response fell below what is normally expected.

Therefore, for the 2018-2019 rain season a Cleanup and Cooperation Factor of 1.3 has been assigned.

Since the 2018-2019 rain season, the following additional facts were considered in determining the Cleanup and Cooperation Factor for the added 13 days of discharge.

By June 2019, the Discharger was making a good faith effort to improve Facility conditions including enhanced sweeping protocols, improved maintenance of rock lined ditches, reducing stockpiles on the active mining face, and paving of the access road and portions of the third bench area. Improvements to the Facility's BMPs are more specifically discussed in Violation 2 through 5.

While the Facility failed to install adequate and effective minimum and Advanced BMPs in a timely manner, the Discharger did begin evaluating the option of installing a chemical flocculent Treatment System to treat discharge from portions of the Facility during the 2018/2019 rain season. One Treatment System was installed to treat the discharge from Tributary Area C and two other systems were installed to treat Tributary Areas B and C. These Treatment Systems ultimately became operational on January 29, 2020.⁵⁰

In addition, since January 2020, the Discharger has added both underground and aboveground storage capacity to enhance its ability to capture and reuse stormwater resulting in a reduction of discharge from the Facility. It has also reconfigured the interconnection between existing tanks and Treatment Systems in order to maximize what is routed to the Treatment Systems for potential reuse prior to discharge.

While these improvements have been put in place, the Facility continues to struggle with proper operation of Advanced BMPs, lack of maintenance of both minimum and Advanced BMPs, degraded condition of their infrastructure including tanks and

⁵⁰ Email dated January 29, 2019, from Masele Poueu to Paul Nelson, Anthony Boyle, and Farzad Kasmaei.

culverts, lack of BMP installation and proper implementation, poor housekeeping, and lack of sediment and erosion control BMPs. The Discharger's unwillingness to stay diligent with its minimum and Advanced BMPs led to the thirteen additional days of violation following the 2018-2019 season.

Since the Facility continued to discharge stormwater to Porter Creek that caused exceedances of the Basin Plan's turbidity water quality objective even after the installation of the Treatment Systems, the Regional Water Board issued Investigative Order No. R1 2020-0026, described above, on October 19, 2020. The Discharger failed to notify the Regional Water Board of multiple discharges from the Facility which exhibits a lack of cooperation on their part. Since Regional Water Board staff were not made aware of the continual violations, they were prevented from helping the Discharger find a resolution. Regional Water Board staff only became aware of this condition by conducting an inspection, collecting samples, and directly interviewing Facility staff.

The Discharger failed to notify Regional Water Board staff of these discharges to Porter Creek, exceedances of Basin Plan objectives, as well as the bypass or malfunction of the Treatment System which is in direct violation of the issued Investigative Orders. Regional Water Board staff was made aware of these issues and discharges to Porter Creek through third party notification and direct incidental observation of the discharges occurring from the Facility. The continued failure to notify the Regional Water Board of discharges and other operational concerns adds to the Discharger's failure to cooperate with the permitting program.

For the additional 13 days of violation since the 2018-2019 rain season, the Prosecution Team has assigned Cleanup and Cooperation Factor of **1.4**.

Initial Per Day Liability for Violation 1

Initial Liability for the violation period covered by the original Complaint
= (Days) (Per Day Factor) (Statutory Max Per Day)
= (60 days) (0.41) (\$10,000 per day)
= \$246,000

Initial Liability following the time period covered by the original Complaint
= (Days) (Per Day Factor) (Statutory Max Per Day)
= (13 days) (0.41) (\$10,000 per day)
= \$53,300

Where:

Days = Days of Violation

Per Day Factor is determined based on the application of the following factors to "Table 2- Per Day Factor for Discharge" = 0.41

Actual or Potential for Harm = *Toxicity + Harm to Beneficial Uses + Cleanup*
= 3+3+1= 7

Where:

Toxicity = Degree of toxicity of discharge =Above Moderate= 3

Harm to Beneficial Use = Moderate= 3

Cleanup = Susceptibility to cleanup or abatement= 1

Deviation from Requirement = Major

Statutory Max Per Day= \$10,000 per day

Initial Per Gallon Liability for Violation 1

= (Gallons) (Per Gallon Factor) (Per Gallon Liability)
= (10,518,608) (0.41) (\$1 per gallon)
= \$4,312,629

Where:

Gallons = Gallons of Discharge = 10,519,608 gallons - 1,000 gallons
= 10,518,608 gallons

Per Gallon Factor is determined based on the application of the following factors to
"Table 1- Per Gallon Factor for Discharge" = 0.41

Actual or Potential for Harm = *Toxicity + Harm to Beneficial Uses + Cleanup*
= 3+3+1= 7

Where:

Toxicity = Degree of toxicity of discharge =Above Moderate= 3
Harm to Harm to Beneficial Use = Moderate= 3
Cleanup = Susceptibility to cleanup or abatement= 1

Deviation from Requirement = Major

Per Gallon Liability = \$1 per gallon = Water Code section 13385(c)(2) applies a per gallon liability to every gallon discharged, but not cleaned up, over 1,000 gallons. For discharges in excess of 2,000,000 gallons the Water Boards may elect to use \$1.00 per gallon.

Total Base Liability Amount for Violation 1

$$\begin{aligned} &= [(Initial\ per\ Day\ Liability\ Amount\ for\ period\ covered\ by\ the\ original\ Complaint \\ &+ Initial\ per\ Gallon\ Liability\ Amount\ for\ violation\ period\ covered\ by\ the\ original \\ &Complaint) \times (Culpability) (History) (Cleanup\ \&\ Cooperation)] + \\ &[(Initial\ Liability\ Amount\ following\ the\ time\ period\ covered\ by\ the\ original\ Complaint \\ &Days) \times (Culpability) (History) (Cleanup\ \&\ Cooperation)] \\ &= [(\$246,000 + \$4,312,629)(1.3)(1.1)(1.3)] + [(\$53,300)(1.4)(1.1)(1.4)] \\ &= \mathbf{\$8,589,406} \end{aligned}$$

Where:

For period covered by the original Complaint:

Culpability = 1.3

History = 1.1

Cleanup and Cooperation = 1.3

For the period following the time covered by the original Complaint:

Culpability = 1.4

History = 1.1

Cleanup and Cooperation = 1.4

Statutory Maximum for Violation 1

= (Day) (Statutory Max Per Day) + (Gallons) (Per Gallon Max)
= (73 days) (\$10,000 per day) + (10,518,608 gal) (\$10 per gal)
= (\$730,000) + (\$105,186,080)
= **\$105,916,080**

Final Proposed Liability for Violation 1

= Total Base Liability Amount, unless it exceeds the statutory maximum
= \$8,589,406 Total Base Liability Amount < \$105,916,080 statutory maximum
= **\$8,589,406**

Violations 2 -5: Non-Discharge Violations

Between December 17, 2018, and January 23, 2023, the Facility failed to install and implement effective minimum and Advanced BMPs as required by the Permit. During the days of violation alleged in Violations 2 through 5, Regional Water Board staff observed persistent and continued failure to meet these requirements. Minimum BMPs include: good housekeeping, material handling and waste management, and sediment and erosion control. Advanced BMPs include ponds, tanks, chemical treatment systems, and storm-resistant shelters. Minimum BMPs were mostly absent from the Facility—or when present, were incorrectly installed, in poor condition, or ineffective.

The Facility also includes Advanced BMPs consisting of a number of small ponds and tanks that are used to collect and hold stormwater and settle sediment out of stormwater, a portion of which is pumped back for reuse as process water and dust control.⁵¹ Regional Water Board staff observed persistent and continued deficiencies throughout the Facility in the use and maintenance of these Advanced BMPs to control and prevent the discharge of pollutants. According to Facility staff, the new Treatment Systems became operational on January 29, 2020, to treat runoff prior to the point of discharge through the use of chemical flocculation, filtering, and settling. While the new Treatment Systems provide a higher level of treatment, they only receive a portion of the runoff generated as they are not sized or designed to treat all discharge from the Facility. Additionally, the Discharger has struggled with their correct operation.

As of the most recent documentation in Regional Water Board files, the Discharger remains out of compliance with regards to Violations 2 through 5.

As explained below, the Actual or Potential for Harm, Degree of Culpability, and History of Violations factors are the same for Violations 2 through 5.

Days of Violation

These non-discharge violations are alleged in a manner that reduces the number of total violations by condensing separate violations into four groups of violation. Violations 2 through 5 cite to the Permit by section, and not by individual subpart as follows: (Violation 2) good housekeeping minimum BMPs; (Violation 3) material handling and waste management minimum BMPs; (Violation 4) erosion and sediment controls, and; (Violation 5) Advanced BMPs.

The Prosecution Team used two distinct methods to count days of violation for Violations 2 through 5, both of which reflect exercise in enforcement discretion to the

⁵¹ Technical Memorandum Storm Water Discharge Volumes - Watershed C Supplemental Calculations dated June 28, 2020. Updated August 24, 2020 & September 18, 2020, provided in response to Investigative Order No. R1-2019-0029 by the Discharger, prepared by EBA Engineering.

Dischargers benefit. The first method, which is described in the following paragraph, was used in the original complaint. All days of violation which occurred after the violation period covered in the original complaint are based on direct observation as described below.

In determining the days of violation for Violations 2 through 5, the Prosecution Team evaluated the window of time between the first date of inspection where failure to implement BMPs was observed (December 17, 2018), and the last date of inspection in the violation period covered by the original Complaint where significant BMP deficiencies were observed (August 13, 2020). Within this window of time the Prosecution Team identified those rain events which generated 0.1 inch or greater. All days within those rain events are alleged as days of violation regardless of the total rainfall on each discrete day. This approach is reasonable as Regional Water Board staff observed discharge from the Facility on days of very little rain, or even days of no rain, when those days were part of rain events of at least 0.1 inch.⁵²

This approach also reflects prosecutorial restraint as all intervening days could have been alleged as days of violation as the BMP deficiencies, which are non-discharge violations, were consistently present throughout this time. During this time period, Regional Water Board staff observed ongoing and persistent BMP deficiencies at the Facility which continually resulted in sediment-laden discharges. Over the course of this period, Regional Water Board staff did not observe improvements to deficient BMPs during its 13 inspections of the Facility. Considering the same violations were observed at each inspection, it is reasonable to conclude the BMPs were not implemented and maintained in a sufficient manner throughout the 2018-2019 rainy season. Moreover, the sorts of BMP deficiencies alleged herein could not be easily corrected on a day-to-day basis. Instead, significant time and resources would have had to be invested in bringing the Facility into compliance with these provisions.

For the days of violation which occurred after the violation period covered in the original complaint, violations are alleged for days where BMP deficiencies were observed by Regional Water Board, Sonoma County, or Fish and Wildlife staff. No intervening days are alleged, to the further benefit of the Discharger.

⁵² Mining and Reclamation Plan for the Mark West Quarry Expansion Draft Environmental Impact (EIR) Report, May 2013 (Hydrology Study)

Violation 2- Non-Discharge Violation

The Discharger violated Industrial General Permit Section X.H.1.a. by failing to implement and maintain good housekeeping minimum BMPs for 127 days.

The Industrial General Permit mandates that dischargers implement and maintain good housekeeping minimum BMPs to reduce or prevent pollutants in industrial stormwater discharges.⁵³ Good Housekeeping BMPs require dischargers to undertake a number of specified actions to ensure that their facility is generally clean and that there is not an undue risk of materials being exposed to stormwater.

For example, some minimum good housekeeping BMPs include: “Observe all outdoor areas associated with industrial activity; including stormwater discharge locations, drainage areas, conveyance systems, waste handling/disposal areas, and perimeter areas impacted by off-facility materials or stormwater run-on to determine housekeeping needs. Any identified debris, waste, spills, tracked materials, or leaked materials shall be cleaned and disposed of properly;” and “[c]over all stored industrial materials that can be readily mobilized by contact with stormwater;” and “[p]revent disposal of any rinse/wash waters or industrial materials into the stormwater conveyance system.”⁵⁴

Basis of Violation

The Facility lacked adequate good housekeeping minimum BMPs necessary to comply with the Permit and prevent the discharge of pollutants in the Facility’s stormwater. During the Regional Water Board’s inspections, large quantities of sediment were observed accumulated within the onsite drainage system (culverts, inlets, pipes, valley gutters, drainage ditches) and on paved surfaces that drain to these systems. Accumulated sediment was often observed to be so deep that erosional rills were evident even on paved surfaces. Large quantities of sediment were observed directly in the storm drain system which ultimately discharges to Porter Creek. Additionally, stored industrial materials, stockpiles, and wastes were uncovered and exposed to rainfall and often located directly in drainage flow paths. The BMPs located downstream of these areas were full of fine sediment as a result and therefore were also rendered ineffective.

⁵³ Industrial General Permit, Section X.H.1., Page 30.

⁵⁴ Industrial General Permit, Section X.H.1., Page 30.

Discussion of Factors for Per Day Liability for Violation 2

Days of Violation

Using the methods described in Violations 2-5: Non-Discharge Violation: Days of Violation, there are a total 127 violation days. Of this total, 121 days were within the time period covered by the original Complaint. Following that time period, an additional 6 days of violation are being alleged.

Regional Water Board staff specifically observed the Discharger's failure to comply with the good housekeeping BMP requirements of Section X.H.1.a.⁵⁵

Days of violation are additionally supported by observations by staff from the California Department of Fish and Wildlife and Sonoma County Permit Resource Management Department.

On November 7, 2022, CDFW observed and photographed uncovered stockpiles of aggregate within the Facility releasing sediment-laden stormwater down the driveway. This discharge bypassed both settling tanks within the driveway (Former SP-2 and West Culvert) and drained to the roadside ditch along the north side of Porter Creek Road which ultimately discharges to Porter Creek.⁵⁶

On December 8, 2022, County of Sonoma PRMD staff observed sediment-laden stormwater discharging down the driveway. This discharge bypassed both settling tanks within the driveway (Former SP-2 and West Culvert) and drained to the roadside ditch along the north side of Porter Creek Road. The runoff then crossed through a culvert under Porter Creek Road and discharged to Porter Creek at a location not identified in the Facility's Storm Water Pollution Prevention Plan, Bo Dean Co., Inc., Mark West Quarry (Facility SWPPP). A portion of the runoff discharging from the driveway flowed across Porter Creek Road and discharged down a rock lined ditch to Porter Creek.⁵⁷

⁵⁵ At inspections on December 17, 2018; January 9, 2019; February 19, 2019; February 26, 2019; March 20, 2019; May 14, 2019; May 16, 2019; December 2, 2019; December 6, 2019; August 13, 2020; November 17, 2020; October 25, 2021; December 10, 2022; January 14, 2023.

⁵⁶ Email provided to Heaven Moore on December 9, 2022, from Alisa Keenan with County of Sonoma, forwarding the email from Nick Bennett with CDFW which was sent to John Mack with County of Sonoma on November 7, 2022.

⁵⁷ Email provided to Heaven Moore on December 8, 2022, from Alisa Keenan with County of Sonoma.

Actual or Potential for Harm

The following analysis is also applicable to Violations 2 through 5.

According to the Enforcement Policy, an assignment of moderate for Actual or Potential for Harm is appropriate when: “The characteristics of the violation have substantially impaired the Water Boards’ ability to perform their statutory and regulatory functions, present a substantial threat to beneficial uses, and/or the circumstances of the violation indicate a substantial potential for harm.”

Failure to properly implement and maintain minimum and Advanced BMPs creates a moderate potential for harm because it creates conditions where pollutants, specifically sediment, are likely to be discharged into waters of the United States. The Discharger’s continued failure to implement adequate BMPs allowed sediment and other industrial materials⁵⁸ to be exposed to stormwater and ultimately transported to and discharged into Porter Creek.

As discussed in detail in Violation 1, sediment discharged into surface waters can cloud the receiving water, thereby reducing the amount of sunlight reaching aquatic plants, clog fish gills, and smother aquatic habitat and spawning areas and the receiving water is specifically impaired due to sediment. Sediment can also transport other materials such as nutrients, metals, and oils and grease which can cause toxicity to aquatic organisms. Therefore, the failure to adequately implement and maintain minimum and Advanced BMPs poses a threat to the following beneficial uses for Porter Creek:⁵⁹

- Commercial and sport fishing (COMM)
- Warm freshwater habitat (WARM)
- Cold freshwater habitat (COLD)
- Wildlife habitat (WILD)
- Rare, threatened, or endangered species (RARE)
- Migration of aquatic organisms (MIGR)
- Spawning, reproduction, and/or early development (SPAWN)

The Prosecution Team has assigned a **moderate** Actual or Potential for Harm score for Violations 2 through 5.

Deviation from Requirement

The requirement under Industrial General Permit Section X.H.1.a. is to implement and maintain good housekeeping minimum BMPs.

⁵⁸ Other industrial materials refer to “cake,” overburden, and process water from the “cake” storage area as described in Violation 1, above.

⁵⁹ The Water Quality Control Plan for the North Coast Region (Basin Plan), page 2-11.

Good housekeeping minimum BMPs, such as preventing the disposal of industrial materials into the stormwater conveyance system, observing outdoor areas and removing and disposing of waste and materials, and covering stored industrial materials, were not deployed at the Facility. The Permit's Good Housekeeping BMP requirements were thus rendered ineffective in their essential function.

The Prosecution Team has determined that a **major** Deviation from Requirement score is appropriate for this violation. Throughout the entire period of the alleged violation Regional Water Board staff observed that good housekeeping requirements were inadequate, ineffective, or absent thus rendering this requirement ineffective in its essential function.

Discussion of Violator's Conduct Factors for Violation 2

Degree of Culpability

The following analysis is relevant to Violations 2 through 5 for the violation period covered by the original Complaint.

The Discharger has been regulated under the Permit since 2015 and therefore should be familiar with all its requirements including those related to BMPs. The Discharger prepared and submitted a Storm Water Pollution Prevention Plan (SWPPP) which lays out a plan for meeting the requirements outlined in Section X.H. and establishes a schedule for implementation and maintenance of minimum and Advanced BMPs.

A reasonable industrial discharger would fully implement its SWPPP to reduce pollutants in its discharge. Especially after reviewing sampling data indicating that the TSS of its discharge was in exceedance of the Permit's NALs, the Discharger should have understood that its existing BMP practices were inadequate to meet the terms of the Permit. As contemplated by the Industrial General Permit, the Discharger should have improved its BMPs to ensure that the Facility did not pose an undue risk to water quality.

As discussed above, both Regional Water Board staff and the Discharger collected and analyzed grab samples from the receiving water upstream and downstream of the Facility's discharge location (SP-3).⁶⁰ The sample results demonstrate that the minimum and Advanced BMPs at the Facility were wholly inadequate and ineffective at preventing the discharge of sediment.

Despite this, the Discharger failed to conduct and implement minimum and Advanced BMPs at the Facility over a period spanning at least twenty months. The Discharger was repeatedly informed by Regional Water Board staff that it was failing to meet the requirements of Section X.H. during inspections, in inspection memos, and in other written correspondence. Regional Water Board staff participated in meetings with the Discharger to discuss improvements needed to bring housekeeping BMPs into compliance with the Permit. Despite this outreach, it took the Discharger a significant amount of time to improve conditions identified in Violations 2 through 5.

⁶⁰ See Regional Water Board inspection memos for inspections dated December 17, 2018; January 9 and 16, 2019; February 13 and 26, 2019; March 20, 2019; and May 16, 2019. Also see Discharger's monthly reports provided in response to Investigative Order No. R1-2019-0029.

The Discharger's initial BMP implementation and ongoing response to identified deficiencies falls below what is expected of a reasonable and prudent discharger in a similar circumstance.

Therefore, a factor of **1.3** Degree of Culpability is appropriate for the 121 days of violation covered by the original Complaint.

The following additional analysis is relevant to Violations 2 through 5 for the days of violation following the time period covered by the original Complaint.

The Degree of Culpability for this additional time-period of violations is increased because the Discharger knew or should have known by this time that discharges were continuing in violation of the Permit. The inspection memos and numerous communications from Regional Water Board staff describe in detail the Discharger's lack of minimum and Advanced BMPs.

Following the issuance of Investigative Order No. R1-2019-0029, issued in 2019, the Discharger was required to conduct monthly visual observations. The Discharger is required to conduct monthly visual observation of all drainage areas, identify both stormwater and non-stormwater discharges, and assess BMP effectiveness, and specifically observe "outdoor industrial equipment and storage areas, outdoor industrial activities areas, BMPs, and all other potential source of industrial pollutants" in accordance with Section XI.A.1.a.iii. Given that the Discharger was required to conduct frequent visual inspections, it knew, or should have known that the condition of their BMPs was inadequate at preventing sediment discharge from the Facility.

Within this timeframe both Regional Water Board staff and the Discharger continued to collect and analyze receiving water samples within Porter Creek upstream and downstream of the Facility's discharge that demonstrate that the minimum and Advanced BMPs at the Facility were inadequate and ineffective at preventing the discharge of sediment. Inspection memos issued by Regional Water Board staff and Sonoma County staff called out deficiencies with housekeeping BMPs and pictures taken by CDFW show highly turbid runoff discharging from the Facility.

The Discharger's continued failure to address deficient minimum and Advanced BMPs at the Facility was worse than inadequate and falls below what is expected of a reasonable and prudent discharger in a similar circumstance.

Therefore, a factor of **1.4** Degree of Culpability is appropriate for the additional 6 days of violation for the days of violation following the time period covered by the original Complaint.

History of Violations

For the reasons discussed in Violation 1, a score of **1.1** has been applied.

Cleanup and Cooperation

The following analysis is relevant for the violation period covered by the original Complaint.

The Discharger was informed of the deficiencies of its good housekeeping minimum BMPs by Regional Water Board inspectors during at least 10 inspections through verbal communication, written inspection memos, and a Notice of Violation. Additionally, the Facility was inspected by USEPA, who also identified deficiencies with minimum good housekeeping practices both verbally and in their written inspection memos.

The Facility was also inspected by the County of Sonoma, who oversees the Facility's compliance with SMARA and the issued Conditional Use Permit in 2013. The County of Sonoma PRMD issued a letter on March 20, 2019, summarizing their inspection findings, which included deficiencies in good housekeeping BMPs. County of Sonoma also issued a Notice of Correction on June 24, 2019, for failure to comply with the Conditional Use Permit. The Notice of Correction also called out specific non-compliance with minimum good housekeeping BMPs.

After this period of violation, the Discharger implemented additional good housekeeping BMPs including: enhanced sweeping protocols, improved maintenance of rock lined ditches, and increased dust control activities. It took far too long for the Discharger to respond and make corrections to the conditions of noncompliance.

A factor of **1.2** for Cleanup and Cooperation is appropriate for the 121 days of violation covered by the original Complaint.

The following additional analysis is relevant for the days of violation following the time period covered by the original Complaint.

The Discharger has consistently failed to cover any industrial materials that can be readily mobilized by contact with stormwater during rain events. No aggregate stockpiles and erodible materials had been observed as covered during any inspections conducted by the Regional Water Board, CDFW and Sonoma County staff. Regional Water Board staff discussed this issue multiple times with the Discharger on-site and documented these deficiencies in inspection memos. The photos and inspection memos indicate that such uncovered erodible materials that are stored on-site release turbid water that is not fully captured and or treated by the Treatment Systems.

Despite housekeeping BMP deficiencies being noted by multiple agencies in numerous inspection memos, photographs, and discussed on site directly with Facility staff, the Discharger continued to fail to adequately address these deficiencies.

A factor of **1.4** for Cleanup and Cooperation is appropriate for the additional 6 days of violation for the days of violation following the time period covered by the original Complaint.

Initial Liability for Violation 2

Initial Liability for the violation period covered by the original Complaint
= (Days) (Per Day Factor) (Statutory Max Per Day)
= (121 days) (0.55) (\$10,000 per day)
= \$665,500

Initial Liability following the time period covered by the original Complaint
= (Days) (Per Day Factor) (Statutory Max Per Day)
= (6 days) (0.55) (\$10,000 per day)
= \$33,000

Where:

Days = Days of Violation

Per Day Factor is determined based on the application of the following factors to “Table 3- Per Day Factor for Non-Discharge” = 0.55

Where:

Actual or Potential for Harm = Moderate
Deviation from Requirement = Major

Statutory Max Per Day = \$10,000 per day

Total Base Liability Amount for Violation 2

= [(Initial Liability Amount for period covered by the original Complaint Days)
x (Culpability) (History) (Cleanup & Cooperation)] +
[(Initial Liability Amount following the time period covered by the original Complaint
Days) x (Culpability) (History) (Cleanup & Cooperation)]
= [(\$665,500)(1.3)(1.1)(1.2)] + [(\$33,000)(1.4)(1.1)(1.4)] = \$1,141,998 + \$71,148
= **\$1,213,146**

Where:

For period covered by the original Complaint:

Culpability = 1.3
History = 1.1
Cleanup and Cooperation = 1.2

For the period following the time covered by the original Complaint:

Culpability = 1.4
History = 1.1
Cleanup and Cooperation = 1.4

Statutory Maximum for Violation 2

= (Days) (Statutory Max Per Day)
= (127 days)(\$10,000)
= **\$1,270,000**

Final Proposed Liability for Violation 2

= Total Base Liability Amount, unless it exceeds the statutory maximum
= \$1,213,146 Total Base Liability Amount < \$1,270,000 statutory maximum
= **\$1,213,146**

Violation 3- Non-Discharge Violation

The Discharger violated Industrial General Permit Section X.H.1.d. by failing to implement and maintain Material Handling and Waste Management minimum BMPs for 93 days.

The Industrial General Permit requires dischargers to implement and maintain material handling and waste management minimum BMPs to reduce or prevent pollutants in industrial stormwater discharges.⁶¹ Material handling and waste management minimum BMPs require dischargers to: “prevent or minimize handling of industrial materials or wastes that can be readily mobilized by contact with [stormwater] during a storm event;” and to “divert run-on and [stormwater] generated from within the facility away from all stockpiled material,” among other requirements.

Basis of Violation

The Facility had numerous material handling and waste management minimum BMP deficiencies which were observed by Regional Water Board staff.⁶² Large stockpiles of highly erodible materials and wastes, including “cake” that were left unprotected from rain and wind erosion. “Cake” is the waste material byproduct made up of the fines that have been washed out of aggregate product. This material is especially erodible, difficult to remove from runoff by filtering or settling due to the fine particle size, and highly deleterious to fish. In some locations, stockpiled materials were placed directly in runoff flow paths which poses an especially high risk to water quality. Material handling and waste management deficiencies were also observed by Sonoma County and CDFW staff during their inspections.⁶³

⁶¹ Industrial General Permit, Section X.H.1, Page 30.

⁶² February 19, 2019; February 26, 2019; March 20, 2019; May 16, 2019; August 13, 2020; November 17, 2020; October 25, 2021; January 14, 2023

⁶³ November 7, 2022; December 8, 2022

Discussion of Factors for Per Day Liability for Violation 3

Days of Violation

Using the methods described in Violations 2-5: Non-Discharge Violation: Days of Violation, there are a total 93 violation days. Of this total, 88 days were within the time period covered by the original Complaint. Following that time period, an additional 5 days of violation are being alleged.

Regional Water Board staff specifically observed the Discharger's failure to comply with the material handling and waste management BMP requirements of Section X.H.1.d.⁶⁴ Days of violation are additionally supported by observations by staff from the California Department of Fish and Wildlife and Sonoma County Permit Resource Management Department.^{65,66,67}

Actual or Potential for Harm

The Actual or Potential for Harm analysis described above in Violation 2 is applicable here.

For the same reasons discussed in Violation 2, the Prosecution Team has assigned a **moderate** score for Actual or Potential for Harm.

Deviation from Requirement

The requirement under Industrial General Permit Section X.H.1.d. is to implement and maintain material handling and waste management minimum BMPs.

Material handling and waste management minimum BMPs such as diverting stormwater away from stockpiled materials and limiting the handling of industrial materials and wastes that can be readily mobilized were not done. The Permit's BMPs were thus rendered ineffective in their essential function.

⁶⁴ At inspections on February 19, 2019; February 26, 2019; March 20, 2019; May 14, 2019; May 16, 2019; December 2, 2019; December 6, 2019; August 13, 2020; November 17, 2020; October 25, 2021; December 10, 2022; January 14, 2023.

⁶⁵ Evidence documented by these agencies on November 7, 2022, and December 8, 2022, which is discussed under *Violation 2, Days of Violation*, supports in part the additional 5 days of violation that are added in the First Amended Complaint.

⁶⁶ Email provided to Heaven Moore on December 9, 2022, from Alisa Keenan with County of Sonoma, forwarding the email from Nick Bennett with CDFW which was sent to John Mack with County of Sonoma on November 7, 2022.

⁶⁷ Email provided to Heaven Moore on December 8, 2022, from Alisa Keenan with County of Sonoma.

Violation 3- Minimum BMPs for Material Handling and Waste Management

The Prosecution Team has determined that a **major** Deviation from Requirement score is appropriate in this case as it relates to Section X.H.1.d. Throughout the entire time of alleged violation Regional Water Board staff observed that minimum material handling and waste management BMPs were inadequate, ineffective, or absent.

Discussion of Violator's Conduct Factors for Violation 3

Degree of Culpability

The Degree of Culpability discussion from Violation 2 applies here.

Therefore, a factor of **1.3** Degree of Culpability is appropriate for the 88 days of violation covered by the original Complaint.

A factor of **1.4** Degree of Culpability is appropriate for the additional 5 days of violation for the days of violation following the time period covered by the original Complaint.

History of Violations

For the reasons discussed in Violation 1, a score of **1.1** has been applied.

Cleanup and Cooperation

For the entire period alleged in Violation 3 the Discharger failed to fully implement effective material handling and waste management minimum BMPs.

The following analysis is relevant to the violation period covered by the original Complaint.

The Discharger was informed of the need to implement material handling and waste management BMPs by Regional Water Board inspectors during at least 5 inspections through verbal communication, written inspection memos, and a Notice of Violation. Additionally, the Facility was inspected by USEPA, who also identified significant deficiencies with material handling and waste management both verbally and in its written inspection report.

Since the Regional Water Board initially identified this violation, the Discharger reviewed the operational practice of storing large stockpiles of recently mined material on the "benches" cut into the active mining face. These stockpiles were a significant source of sediment because they were very large, were located directly in the flow path of runoff, and were unprotected and exposed to wind and rain. In order to comply with the Permit, the Discharger changed its operational practices in part and stopped locating stockpiles on the benches to reduce this significant sediment source. However, there are still significant stockpiles of industrial materials and wastes throughout the Facility that are not protected from stormwater runoff and continue to contribute to sediment-laden discharges.

A factor of **1.2** for Cleanup and Cooperation score is appropriate for the 88 days covered by the original Complaint.

Violation 3- Minimum BMPs for Material Handling and Waste Management

The following additional analysis is relevant for the days of violation following the time period covered by the original Complaint.

The Discharger has consistently failed to divert runoff away from stockpiled materials and wastes. Regional Water Board staff discussed this issue multiple times with the Discharger on site as well as documented these deficiencies in inspection memos. The photos and inspection memos indicate that runoff was not diverted causing turbid discharges that are not fully captured and or treated by the Treatment Systems. Additionally, the Facility continues to operate during rain events which exposes materials and wastes to stormwater.

Despite significant deficiencies in minimum BMPs for Material Handling and Waste Management being noted by multiple agencies in numerous inspection memos, photographs, and discussed on site directly with staff, the Discharger continued to fail to adequately address these deficiencies.

A factor of **1.4** for Cleanup and Cooperation score is appropriate for the additional five days of violation for the days of violation following the time period covered by the original Complaint.

Violation 3- Minimum BMPs for Material Handling and Waste Management

Initial Liability for Violation 3

Initial Liability for the violation period covered by the original Complaint
= (Days) (Per Day Factor) (Statutory Max Per Day)
= (88 days) (0.55) (\$10,000 per day)
= \$484,000

Initial Liability following the time period covered by the original Complaint
= (Days) (Per Day Factor) (Statutory Max Per Day)
= (5 days) (0.55) (\$10,000 per day)
= \$27,500

Where:

Days = Days of Violation

Per Day Factor is determined based on the application of the following factors to "Table 3- Per Day Factor for Non-Discharge" = 0.55

Where:

Actual or Potential for Harm = Moderate

Deviation from Requirement = Major

Statutory Max Per Day = \$10,000 per day

Violation 3- Minimum BMPs for Material Handling and Waste Management

Total Base Liability Amount for Violation 3

$$\begin{aligned} &= [(Initial Liability Amount for period covered by the original Complaint Days) \\ &x (Culpability) (History) (Cleanup \& Cooperation)] + \\ &[(Initial Liability Amount following the time period covered by the original Complaint \\ &Days) x (Culpability) (History) (Cleanup \& Cooperation)] \\ &= [(\$484,000)(1.3)(1.1)(1.2)] + [(\$27,500)(1.4)(1.1)(1.4)] \\ &= \$830,544 + \$59,290 \\ &= \mathbf{\$889,834} \end{aligned}$$

Where:

For period covered by the original Complaint:

Culpability = 1.3

History = 1.1

Cleanup and Cooperation = 1.2

For the period following the time covered by the original Complaint:

Culpability = 1.4

History = 1.1

Cleanup and Cooperation = 1.4

Violation 3- Minimum BMPs for Material Handling and Waste Management

Statutory Maximum for Violation 3

= (Days) (Statutory Max Per Day)

= (93 days) (\$10,000)

= **\$930,000**

Final Proposed Liability for Violation 3

= Total Base Liability Amount, unless it exceeds the statutory maximum

= \$889,834 Total Base Liability Amount < \$930,000 statutory maximum

= **\$889,834**

Violation 4 - Non-Discharge Violation

The Discharger violated Industrial General Permit Section X.H.1.e. by failing to implement and maintain erosion and sediment control minimum BMPs for 121 days.

The Industrial General Permit requires dischargers to implement and maintain minimum erosion and sediment control minimum BMPs.⁶⁸ Erosion and sediment control BMPs require the discharger to: “provide effective stabilization for inactive areas, finished slopes, and other erodible areas prior to a forecasted storm event;” and to “divert run-on and [stormwater] generated from within the facility away from all erodible materials.”⁶⁹

Basis of Violation

The Facility failed to implement the erosion and sediment control BMPs as required on multiple dates as observed by Regional Water Board staff.⁷⁰ The Facility failed to implement the erosion and sediment control minimum BMPs necessary to comply with the Permit and prevent the discharge of pollutants. Large portions of the Facility were observed to have no erosion or sediment controls. Those erosion and sediment BMPs that were in place during the alleged violation period, were improperly installed, inappropriately selected, overwhelmed, and inadequate such that they remained ineffective.

⁶⁸ Industrial General Permit, Section X.H.1, Page 32.

⁶⁹ Industrial General Permit, Section X.H.1.e.iv, Page 32

⁷⁰ December 17, 2018; January 9, 2019; February 19, 2019; February 26, 2019; May 14, 2019; May 16, 2019; December 2, 2019; December 6, 2019; August 13, 2020.

Discussion of Factors for Per Day Liability for Violation 4

Days of Violation

Using the methods described in Violations 2-5: Non-Discharge Violation: Days of Violation, there are a total 121 violation days.

Regional Water Board staff specifically observed the Discharger's failure to comply with the erosion and sediment control BMP requirements of Section X.H.1.e.⁷¹

Actual or Potential for Harm

The Actual or Potential for Harm analysis described above in Violation 2 is applicable here.

For the same reasons discussed in Violation 2, the Prosecution Team has assigned a **moderate** Actual or Potential for Harm score.

Deviation from Requirement

The requirement under Industrial General Permit Section X.H.1.e. is to implement and maintain erosion and sediment controls minimum BMPs.

Erosion and sediment control BMPs such as soil stabilization through the use of hydroseeding, geotextiles, track walking in straw, or control measures such as, but not limited to, straw wattles, gravel bags, check dams, and silt fencing were largely absent, or when present, were inadequate such that this Permit condition was rendered ineffective in its essential function.

The Prosecution Team has determined that a **major** Deviation from Requirement is appropriate in this case as it relates to Section X.H.1.e. Through the entire time of the alleged violation Regional Water Board staff observed that erosion and sediment controls were inadequate, ineffective, or absent.

⁷¹ At inspections conducted on December 17, 2018; January 9, 2019; February 19, 2019; February 26, 2019; May 14, 2019; May 16, 2019; December 2, 2019; December 6, 2019; August 13, 2020.

Discussion of Violator's Conduct Factors for Violation 4

Degree of Culpability

The discussion of Degree of Culpability from Violation 2 applies to this violation.

However, the Discharger's culpability for Violation 4 is enhanced because the Discharger has been regulated under the SMARA Conditional Use Permit issued by the County of Sonoma since 2013. The Discharger's Conditional Use Permit specifically requires that the Discharger "...develop and implement a Water Quality Protection Program (WQPP) to control sediment and pollutant runoff from the quarry..." The County Use Permit incorporates a requirement that: "In areas not being actively mined, bare soil shall be protected from erosion with the application of hydraulic mulch or hydroseeded..." and "...bare soil shall be protected by the application of straw mulch, wood mulch, or mats." These specific requirements which are above and beyond the Industrial General Permit requirements should have resulted in the Discharger implementing additional erosion and sediment control BMPs in order to comply both with the Discharger's Conditional Use Permit and the Industrial General Permit.

Therefore, a factor of **1.4** Degree of Culpability score is appropriate.

History of Violations

For the reasons discussed in Violation 1, a score of **1.1** has been applied.

Cleanup and Cooperation

For the entire period spanning the days alleged in Violation 4, the Discharger failed to install and/or implement effective erosion and sediment control BMPs at the Facility. BMPs in this category include soil stabilization through the use of hydroseeding, geotextiles, track walking in straw, or control measures such as, but not limited to, straw wattles, gravel bags, check dams, and silt fencing.

The Discharger was informed of the need to implement erosion and sediment control BMPs by Regional Water Board inspectors during at least nine inspections through verbal communication, written inspection memos, and an NOV. Additionally, the Facility was inspected by USEPA, who also identified significant deficiencies with erosion and sediment control BMPs both verbally and in their written inspection report. The Facility was also inspected on February 19 and February 26, 2019, by the County of Sonoma, who oversees the Facility's compliance with SMARA and the Conditional Use Permit for the mining operation.⁷²

⁷² Amended Mining and Reclamation Plan for Mark West Quarry, June 2013.

The Notice of Correction issued by the County of Sonoma on June 24, 2019, states that *“[t]he main focus of the violations identified at the site are the lack of structural and non-structural controls for sediment and stormwater management and water quality violations in Porter Creek.”* It goes on to say: *“Without a substantial, fully engineered storm water detention system, combined with intensive non-structural sediment controls, the current site configuration will have recurrent overflow to Porter Creek whenever it rains sufficiently to discharge water from the quarry.”*

The compliance schedule issued by the County required that, by October 15, 2019, the Discharger *“[r]eclaim or stabilize all disturbed areas (excluding active working, processing and storage areas on the quarry floor). Stabilizing measures including but not limited to hydraulic application of surface stabilizing compounds, hydroseeding, mulching or other measures to prevent erosion.”*

An overall lack of erosion and sediment control BMPs continued to be observed. Had the Discharger implemented the minimum erosion and sediment controls required by the 1993 Conditional Use Permit, and specifically identified as violations in the Notice of Correction issued by the County of Sonoma, the minimum requirements of the Industrial General Permit would have been met.

Ultimately, work was conducted by the Discharger to pave some key areas such as the main access road to the upper quarry, the driveway access to the Treatment System in Tributary Area C, and a portion of the upper processing area. This permanent stabilization reduced erosion from these areas, allowed for improved housekeeping measures such as sweeping, as well as provided an operational benefit to the Facility. The Discharger also installed BMPs such as straw wattles in front of drain inlets and gravel bags check dams in drainage ditches. While the Discharger made some improvements following the violation, and claimed to be in compliance, no documentation substantiating this claim has been provided to Regional Water Board staff despite requests.

A factor of **1.3** for Cleanup and Cooperation score is appropriate.

Initial Liability for Violation 4

Initial Liability for the violation period covered by the original Complaint
= (Days) (Per Day Factor) (Statutory Max Per Day)
= (121 days) (0.55) (\$10,000 per day)
= \$665,500

Where:

Days = Days of Violation

Per Day Factor is determined based on the application of the following factors to “Table 3- Per Day Factor for Non-Discharge” = 0.55

Where:

Actual or Potential for Harm = Moderate
Deviation from Requirement = Major

Statutory Max Per Day = \$10,000 per day

Total Base Liability Amount for Violation 4

= (Initial Liability Amount) (Culpability) (History) (Cleanup & Cooperation)
= (\$665,500)(1.4)(1.1)(1.3)
= **\$1,332,331**

Where:

For period covered by the original Complaint:

Culpability = 1.4

History = 1.1

Cleanup and Cooperation = 1.3

Statutory Maximum for Violation 4

= (Days) (Statutory Max Per Day)

= (121 days) (\$10,000)

= **\$1,210,000**

Final Proposed Liability for Violation 4

= Total Base Liability Amount, unless it exceeds the statutory maximum

= \$1,332,331 Total Base Liability Amount > \$1,210,000 statutory maximum

The Total Base Liability Amount for Violation 4 using the enforcement policy factors exceeds the statutory maximum. Therefore, the final proposed liability for Violation 4 has been adjusted to the statutory maximum.

= **\$1,210,000**

Violation 5- Non-Discharge Violation

The Discharger violated Industrial General Permit Section X.H.2. by failing to implement and maintain Advanced BMPs for 83 days.

The Permit requires dischargers, to the extent feasible, to implement and maintain any Advanced BMPs necessary to reduce or prevent discharges of pollutants in their stormwater discharge in a manner that reflects best industry practice considering technological availability, economic practicability, and achievability.⁷³ Advanced BMPs include exposure minimization, stormwater containment and discharge reduction, treatment and other Advanced BMPs.

Basis of Violation

The Facility includes a number of small ponds and tanks that are used to collect and hold runoff, a portion of which is pumped back for reuse as process water and dust control. These features are considered to be Advanced BMPs under the Permit, and are identified as such in the Facility's SWPPP.⁷⁴ During the time of the alleged violation Regional Water Board staff observed persistent and continued deficiencies throughout the Facility in the use and maintenance of these Advanced BMPs. Regional Water Board staff observed that ponds and tanks were not maintained to remove accumulated sediment, rendering them ineffective at reducing the sediment in runoff. Additionally, these tanks and ponds were repeatedly observed to be full of stormwater runoff prior to rain events with very little or no available storage capacity for additional runoff, rendering them ineffective. The discharge leaving these Advanced BMPs was highly turbid further indicating that they were inadequate.

Additionally, the Facility utilizes Advanced BMPs to provide exposure minimization that can "prevent the contact of stormwater with the identified material."⁷⁵ In this case permanent covered material-bays are used to cover and store filter cake material to prevent contact with stormwater. However, on multiple occasions cake material was observed to not be fully contained within the covered bays thus allowing the industrial waste material to be conveyed in the runoff.

By January 29, 2020, the Discharger had installed and began operating the three Treatment Systems to further reduce sediment in its discharges by treating runoff prior to the point of discharge through the use of chemical flocculation, filtering, and settling.

⁷³ Industrial General Permit, Section X.H.2., Page 33-34.

⁷⁴ Technical Memorandum Storm Water Discharge Volumes - Watershed C Supplemental Calculations dated June 28, 2020. Updated August 24, 2020 & September 18, 2020" provided by the Discharger, prepared by EBA Engineering in response to Investigative Order No. R1-2019-0029.

⁷⁵ Facility SWPPP dated October 2018, Appendix 3 - Advanced BMPs.

While this constitutes some improvement, the Facility continues to struggle with proper operation of Advanced BMPs, including the Treatment Systems, settling tanks, ponds, and pumps. There is persistent and ongoing lack of maintenance of these Advanced BMPs which is evidenced by significant sediment accumulation, broken or improperly installed pumps, and rusted out tanks. The Discharger failed to properly operate and maintain the Advanced BMPs at the Facility.

The Discharger's failure to implement and maintain appropriate Advanced BMPs at the Facility allowed sediment-laden stormwater discharge to enter receiving waters with little or no reduction to the sediment load.

Discussion of Factors for Per Day Liability for Violation 5

Days of Violation

Using the methods described in Violations 2-5: Non-Discharge Violation: Days of Violation, there are a total 83 violation days. Of this total, 79 days were within the time period covered by the original Complaint. Following that time period, an additional four days of violation are being alleged.

Regional Water Board staff specifically observed the Discharger's failure to comply with the advanced BMP requirements of Section X.H.2.⁷⁶ Days of violation are additionally supported by observations by staff from the Sonoma County Permit Resource Management Department.

On November 9, 2022, County of Sonoma PRMD staff conducted a surface mining inspection of the Facility. This inspection was conducted during dry weather. Pictures taken during this inspection show settling tanks in need of maintenance due to sediment accumulation.⁷⁷

Actual Potential for Harm

For the reasons discussed in Violation 2, the Prosecution Team has assigned a **moderate** Actual or Potential for Harm score.

Deviation from Requirement

The requirement under Industrial General Permit Section X.H.2 is to implement and maintain advanced BMPs.

The advanced BMPs, which include various tanks and ponds throughout the Facility, as well as permanent covered material-bays, were inadequate such that this Permit condition was rendered ineffective in its essential function.

The Prosecution Team has determined that a **major** Deviation from Requirement score is appropriate in this case as it relates to Section X.H.2. Through the entire time of alleged violation the advanced BMPs at the Facility were inadequate, ineffective, or absent.

⁷⁶ At inspections on December 17, 2018; January 9, 2019; January 16, 2019; February 19, 2019; February 26, 2019; March 20, 2019; May 14, 2019; May 16, 2019; November 26, 2019; December 2, 2019; December 6, 2019; November 17, 2020; August 24, 2021; January 23, 2023.

⁷⁷ Surface Mining Inspection Report for November 9, 2022, County of Sonoma staff Robert Pennington and Mark West 2022 Supplemental Photos. Email provided to Heaven Moore on December 9, 2022, from Alisa Keenen with County of Sonoma.

Discussion of Violator's Conduct Factors for Violation 5

Degree of Culpability

The Degree of Culpability discussion from Violation 2 applies here. Additionally, the Permit specifically identifies Advanced BMPs as a measure that must be used in addition to minimum BMPs. Minimum BMPs alone have been demonstrated to be inadequate to reduce or prevent the discharge of sediment from the Facility to receiving waters. The Discharger's SWPPP dated October 2018 calls for the use of "settling structures" located at several locations throughout the Facility that "divert/collect storm flows and serve as Structural Control Measures" and states that "the Facility uses numerous storm water containment structures for slowing flow, settling solids and facilitating reuse of water. There are also several areas where retained storm water runoff is slowed and infiltrated..."⁷⁸ The 2015 version of the Facility's SWPPP has almost identical language related to the use of Advanced BMPs.

The expansion of the Mark West Quarry mining operation in 2013 required through the CEQA process the development, notification, and adoption of a site specific EIR.⁷⁹ This EIR identified specifically that the ponds are inadequately sized to effectively remove sediment and anticipated the need for chemical flocculent treatment systems:

The EIR states that:

"The design of sediment retention facilities and capture efficiency is a key element of storm water design. Sediment retention ponds of insufficient size may not provide the residence time necessary to capture sediment before polluted storm water is discharged to Porter Creek."

"Recognizing that the available space would not allow for detention basins of a size to capture medium silt-sized particles, the applicant states that the final design will include the use of chemical treatment to cause the finer particles to settle or the use of filters to remove the particles from the water."⁸⁰

Additionally, the EIR specifically requires that all detention basins and other drainage features shall be maintained.⁸¹

Additionally, the Discharger has been regulated under the SMARA program and was issued a Conditional Use Permit by the County of Sonoma in 2013 that specifically

⁷⁸ Facility SWPPP, Dated October 2018, Appendix 3, Advanced BMPs.

⁷⁹ Mining and Reclamation Plan for the Mark West Quarry Expansion Draft Environmental Impact Report, State Clearinghouse # 2005062093.

⁸⁰ Sedimentation Impacts on Water Quality, Impact 4.2-B, Page 4.2-24. See also Mitigation Measures, 4.2-B.1,4, Page 4.2-26.

⁸¹ Mitigation Measures, 4.2-A.3, Page 4.2-22.

required the use of fully designed settling ponds and that the Discharger “...develop and implement a Water Quality Protection Program (WQPP) to control sediment and pollutant runoff from the quarry...”⁸² This WQPP requires that “All runoff from actively mined or reclaimed areas shall be directed through the sediment control basins.”⁸³ These sediment control basins must “As specified by SMARA, sediment retention ponds will be reconstructed or, if needed, new ones constructed so that particles of medium silt (0.32 mm) will be settled out for no less than the 20-year, 1-hour rainfall event before runoff leaves the site⁸⁴.” As mentioned previously, the specific use and design criteria set in the Conditional Use Permit for ponds are above and beyond Industrial General Permit minimum requirements for Advanced BMPs.

While the new Treatment Systems provide a higher level of treatment, they only receive a portion of the runoff generated as they are not sized or designed to treat all discharge from the Facility. On multiple occasions Regional Water Board staff, Sonoma County staff, and CDFW staff observed highly turbid discharge leaving the site and bypassing the Treatment Systems as well as the series of settling tanks used on site. These discharges indicate that the Advanced BMP at the Facility was ineffective at removing sediment prior to the discharge of stormwater.

The Facility continues to struggle with proper operation of these Treatment Systems. This resulted in the system going into a backflush condition and recirculating back into Pond 1, which is significantly undersized and heavily loaded with sediment.⁸⁵ Facility staff lacked the knowledge to manage this situation and prevent these conditions from occurring. Additionally, these Treatment Systems lack backup power. When the Facility experienced a power outage on January 14, 2023, the Treatment Systems went offline, resulting in the discharge of highly turbid runoff to Porter Creek.

Regional Water Board staff had specifically notified the discharger of the need to prepare for emergency conditions such as power outages, through the use of backup power generation, additional pumps, or other necessary redundancy through verbal communication and a written inspection memo⁸⁶. The Discharger still failed to prepare for a power outage that ultimately occurred, deserving a higher degree of culpability. The Discharger knew or should have known, based on its own sampling data, as well as the requirement under the County’s Conditional Use Permit, and notification by Regional Water Board staff, State Water Board staff, and USEPA staff that the settling tanks, ponds, Treatment Systems, and structures lacked the capacity, functionality, and redundancy to be effective and did not effectively or adequately reduce the amount of sediment entrained in its stormwater runoff prior to discharge to Porter Creek.

⁸² County Amended Use Permit, Appendix G, Exhibit B, Page 7, U/R 36.

⁸³ County Amended Use Permit, Appendix G, Exhibit B, Page 8.

⁸⁴ County Amended Use Permit, Appendix G, Exhibit B, Page 17, U/R 70.d.

⁸⁵ Regional Water Board Inspection Memo for inspections conducted on December 9, 2022, and December 10, 2022.

⁸⁶ Regional Water Board Inspection Memo for inspection conducted on December 6, 2019.

Therefore, the Prosecution Team has assigned a **1.4** for Degree of Culpability Factor.

History of Violations

For the reasons identified in Violation 1, a score of **1.1** has been applied.

Cleanup and Cooperation

For the entire period alleged in Violation 5 the Discharger failed to effectively implement Advanced BMPs such as settling ponds, tanks, and the three Treatment Systems.

The Discharger was informed of the need to implement effective Advanced BMPs by Regional Water Board inspectors during at least 14 inspections through verbal communication, written inspection memos, an NOV, two Investigative Orders, the original version of this Administrative Civil Liability Complaint and meeting with representatives of the Discharger numerous times.

The following analysis is relevant for the violation period covered by the original Complaint.

In addition, during an inspection in February 2019, Regional Water Board and USEPA staff specifically discussed tank cleaning with Discharger representatives and were advised that the Discharger did not have a routine schedule to clean the settling tanks or to assess sediment levels in the tanks.⁸⁷ Routine maintenance, such as periodically inspecting and cleaning the tanks, is an essential part of ensuring effectiveness of the Advanced BMPs in capturing and treating contaminated stormwater runoff. The Discharger was negligent in failing to implement reasonably expected efforts under the circumstances during the period of violation.

Additionally, the Facility was inspected by USEPA, who also identified significant issues with the Advanced BMPs both verbally and in their written inspection report. The Facility was also inspected by the County of Sonoma, who oversees the Facility's compliance with SMARA and the issued Conditional Use Permit in 2013, on February 19 and February 26, 2019.

In the Notice of Correction issued on June 24, 2019, the County states that “[t]he main focus of the violations identified at the site are the lack of structural and non-structural controls for sediment and stormwater management and water quality violations in Porter Creek.” It goes on to say: “Without a substantial, fully engineered storm water detention system, combined with intensive non-structural sediment controls, the current site configuration will have recurrent overflow to Porter Creek whenever it rains sufficiently to discharge water from the quarry.”

⁸⁷ USEPA Compliance Evaluation Inspection dated April 29, 2019.

Had the Discharger implemented the requirements for settling ponds that met the specific design requirements up to and including the use of chemical flocculants, as mandated by the 1993 Conditional Use Permit, requirements of the Industrial General Permit related to Advanced BMPs would have been met.

However, the Prosecution Team acknowledges that the Discharger has invested significant resources in installing a new Treatment System at the Facility designed to remove sediment from stormwater generated on-site, after the period of alleged violation. On November 17, 2020, Regional Water Board staff inspected the Facility and confirmed that all three Treatment Systems were operational. The Treatment Systems are intended to treat stormwater runoff, prior to it being discharged to Porter Creek, by removing sediment.

In addition to the installation and operation of the new Treatment Systems, the Discharger also improved the maintenance and implementation of existing Advanced BMPs by providing more frequent sediment removal and paving adjacent areas to reduce sediment loading.

While the Discharger made some improvements following this period of violation, violations continued as discussed below.

A Cleanup and Cooperation factor of **1.2** is assigned in light of the installation of the new Treatment Systems and other improvements in installation and maintenance of the existing Advanced BMPs.

A factor of **1.2** for Cleanup and Cooperation score is appropriate for the 79 days of violation covered by the original Complaint.

The following additional analysis is relevant for the days of violation following the time-period covered by the original Complaint.

Three to five years after initially being notified of Advanced BMP deficiencies, Facility staff continued to fail to implement necessary routine maintenance, operation, and use of Advanced BMPs. These deficiencies were identified in multiple inspection memos and discussed verbally with Facility staff on site.

Regional Water Board staff consistently observed during inspections that settling tanks and ponds that were significantly full of accumulated sediment and in need of maintenance. Sediment must be removed from tanks and ponds routinely to ensure capacity is available for the next rain event and to ensure that accumulated sediment is not reintroduced into the runoff prior to discharge.

Despite Advanced BMP deficiencies being noted by multiple agencies in numerous inspection memos, photographs, and discussed on site directly with Facility staff, the Discharger continued to fail to adequately address these deficiencies.

A factor of **1.4** for Cleanup and Cooperation score is appropriate for the additional four days of violation for the days of violation following the time period covered by the original Complaint.

Initial Liability for Violation 5

Initial Liability for the violation period covered by the original Complaint
 = (Days) (Per Day Factor) (Statutory Max Per Day)
 = (79 days) (0.55) (\$10,000 per day)
 = \$434,500

Initial Liability following the time period covered by the original Complaint
 = (Days) (Per Day Factor) (Statutory Max Per Day)
 = (4 days) (0.55) (\$10,000 per day)
 = \$22,000

Where:

Days = Days of Violation

Per Day Factor is determined based on the application of the following factors to “Table 3- Per Day Factor for Non-Discharge” = 0.55

Where:

Actual or Potential for Harm = Moderate
 Deviation from Requirement = Major
 Statutory Max Per Day = \$10,000 per day

Total Base Liability Amount for Violation 5

= [(Initial Liability Amount for period covered by the original Complaint Days)
 x (Culpability) (History) (Cleanup & Cooperation)] +
 [(Initial Liability Amount following the time period covered by the original Complaint
 Days) x (Culpability) (History) (Cleanup & Cooperation)]
 = [(\$434,500)(1.4)(1.1)(1.2)] + [(\$22,000)(1.4)(1.1)(1.4)]
 = \$802,956 + \$47,432
 = **\$850,388**

Where:

For period covered by the original Complaint:
 Culpability = 1.4
 History = 1.1
 Cleanup and Cooperation = 1.2

For the period following the time covered by the original Complaint:
 Culpability = 1.4
 History = 1.1
 Cleanup and Cooperation = 1.4

Statutory Maximum for Violation 5

= (Days) (Statutory Max Per Day)
= (83 days) (\$10,000)
= **\$830,000**

Final Proposed Liability for Violation 5

= Total Base Liability Amount, unless it exceeds the statutory maximum
= \$850,388 Total Base Liability Amount > \$830,000 statutory maximum

The Total Base Liability Amount for Violation 5 using the enforcement policy factors exceeds the statutory maximum. Therefore, the final proposed liability for Violation 5 has been adjusted to the statutory maximum.

= **\$830,000**

Violation 6 - Non-Discharge Violation

The Discharger violated Industrial General Permit Subsection XI.B.11.a by failing to submit all sampling and analytical results for all individual or Qualified Combined Samples via SMARTS within 30 days of obtaining all results for each sampling event for three days.

The Permit Subsection XI.B.2 requires that the Discharger sample four representative events, two in the first half of the rain season and two in the second half of the rain year. Per Permit Subsection XI.B.11.a, the Discharger is then required to submit all sampling and analytical results into SMARTS within 30 days of obtaining all results for each sampling event.

Basis of Violation

The Discharger failed to submit the sampling reports within 30 days for the following sampling events:

1. Sampling Event on March 10, 2021: On March 25, 2021, the lab provided results to the Discharger for the sampling event dated March 10, 2021,⁸⁸ which made the Discharger's report due to SMARTs on April 24, 2021. Per SMARTS, the samples were certified and submitted electronically by the Discharger on June 22, 2021—89 days after it received the results from the lab.
2. Sampling Event on March 18, 2021: On April 6, 2021, the lab provided results to the Discharger for the sampling event dated March 18, 2021,⁸⁹ which made the Discharger's report due to SMARTs on May 6, 2021. Per SMARTS, the samples were certified and submitted electronically by the Discharger on June 22, 2021—96 days after it received the results from the lab.
3. Sampling Event on December 10, 2022: On January 4, 2023, the lab provided results to the Discharger for the sampling event dated December 10, 2022,⁹⁰ which made the Discharger's report due to SMARTs on February 2, 2023. Per SMARTS, the samples were certified and submitted electronically by the Discharger on April 14, 2023—100 days after it received the results from the lab. For this sampling event, the Discharger also failed to have the samples analyzed for oil and grease, which is a mandatory basic parameter.

The tardiness associated with the three sampling events resulted in a total of 285 days in violation. In light of the already significant proposed liability amount, the Prosecution Team is exercising its discretion to only allege three days of violation, one day of

⁸⁸ SMARTS Event ID No. 1148970

⁸⁹ SMARTS Event ID No. 1148971

⁹⁰ SMARTS Event ID No. 1225642

violation for each report instead of 285 days. Therefore, the dates of violation would be the 31st day after the results were received by the Discharger.

Discussion of Factors for Per Day Liability for Violation 6

Days of Violation

Consistent with the discussion above, three days of violation are alleged.

Actual or Potential for Harm

Per the Enforcement Policy, an assignment of minor is assigned for Potential for Harm when: “The characteristics of the violation have little or no potential to impair the Water Boards’ ability to perform their statutory and regulatory functions, present only a minor threat to beneficial uses, and/or the circumstances of the violation indicate a minor potential for harm.”

Timely reporting to SMARTs allows Regional Water Board staff to prioritize inspections, provide compliance support, and coordinate with operators. This is especially important for facilities with ongoing violations. Timely reporting also provides information to facility operators that helps them to assess effectiveness of BMPs and helps inform required iterative site management. Sampling reports, in addition to the functions described above, also specifically assist Regional Water Board staff to evaluate whether the Treatment Systems operate properly. Failure to submit the sampling reports by the required deadline poses, however, a low threat of harm to beneficial uses because multiple mechanisms were in place at this Facility, which should have provided immediate information to the Discharger. As a result, the Prosecution Team has assigned a **minor** Actual or Potential for Harm.

Deviation from Requirement

The Permit program is designed to rely upon information dischargers submit to the SMARTS database. The Discharger did not meet the Industrial General Permit requirements by failing to certify the sampling reports within 30 days. Because the Discharger did eventually submit the required reports, albeit late, this violation only partially compromised the effectiveness of the regulatory requirement.

The Prosecution Team has determined that a **moderate** Deviation from Requirement score is appropriate in this case as it relates to Subsection XI.B.11.a of the Permit.

Discussion of Violator’s Conduct Factors for Violation 6

Degree of Culpability

The Discharger has operated the Facility and been enrolled under the Permit since March 1993. The Discharger knew or should have known the standard requirement that sampling reports must be reported prior to the deadline in accordance with the monitoring section of the Permit. The Regional Water Board has taken multiple formal and informal enforcement actions since 2018 directing and reminding the Discharger of its requirement to comply with the Permit, which includes timely reporting.

Timely reporting is a standard requirement of the Permit. The specific requirement to submit sampling reports within 30 days of receipt has been in place since at least 2015, with similar sampling and reporting requirements in earlier versions of the Permit. The reports were ultimately submitted approximately two months late. The repeated late submittal is less than what a reasonable and prudent discharger would be provided.

Therefore, the Prosecution Team has assigned a **1.3** for Degree of Culpability Factor.

History of Violations

For the reasons identified in Violation 1, a score of **1.1** has been applied.

Cleanup and Cooperation

For the first two sampling events, the Discharger did come into compliance, but did so approximately three months after the deadline. In regard to the last sampling event, on April 10, 2023, Regional Water Board staff notified the Discharger of the missing report submittal while on site. It was not until receiving this notification that the Discharger made efforts to submit the late reports to SMARTS.

A Cleanup and Cooperation factor of **1.2** is assigned for failure to meet the deadline for sampling result submittals via SMARTS.

Per Day Liability Calculations for Violation 6

$$\begin{aligned} &= (\text{Days}) (\text{Per Day Factor}) (\text{Statutory Max Per Day}) \\ &= (3 \text{ days}) (0.25) (\$10,000 \text{ per day}) \\ &= \mathbf{\$7,500} \end{aligned}$$

Where:

Days = Days of Violation

Per Day Factor is determined based on the application of the following factors to “Table 3- Per Day Factor for Non-Discharge” = 0.25

Where:

Actual or Potential for Harm = Minor

Deviation from Requirement = Moderate

Statutory Max Per Day= \$10,000 per day

Total Base Liability Amount for Violation 6

$$\begin{aligned} &= (\text{Initial Liability Amount}) (\text{Culpability}) (\text{History}) (\text{Cleanup \& Cooperation}) \\ &= (\$7,500)(1.3)(1.1)(1.2) \\ &= \mathbf{\$12,870} \end{aligned}$$

Where:

Initial Liability Amount = \$7,500

Culpability = 1.3

History = 1.1

Cleanup and Cooperation = 1.2

Statutory Maximum for Violation 6

= (Days) (Statutory Max Per Day)
= (3 days) (\$10,000)
= **\$30,000**

Final Proposed Liability for Violation 6

= Total Base Liability Amount, unless it exceeds the statutory maximum
= \$12,870 Total Base Liability Amount < \$30,000 statutory maximum
= **\$12,870**

Violation 7 - Non-Discharge Violation (Investigative Order No. R1-2019-0029)

The Discharger violated Investigative Order Number No. R1-2019-0029, Sections B.1 and B.2, by failing to conduct receiving water monitoring and sampling; failing to document the monitoring with photographs for seven days.

Basis of Violation

On May 1, 2019, Regional Water Board issued Investigative Order No. R1-2019-0029, which requires the Discharger to perform certain tasks, including but not limited to, collecting samples, uploading sampling reports and photographic documentation, and providing notifications.

Specifically, Section B.1 of the Investigative Order requires that receiving water samples be collected when 0.1 inch of rain occurs that produces stormwater discharge from at least one drainage area within the Facility. Additionally, Investigative Order Section B.2 requires the Discharger to upload field sampling reports associated with receiving water monitoring for turbidity and pH measurements, and photographic documentation as required under the site monitoring requirement to SMARTS within 24 hours of data collection.

The Discharger violated one or more of these Investigative Order provisions, as described, on the following dates:

1. April 4, 2020: Since a field sample was collected on this day, as required, the field sampling data and photo documentation was required to be uploaded within 24 hours. The report was not uploaded to SMARTS until April 6, 2020.⁹¹
2. November 17, 2020: Since a field sample was collected on this day, as required, the field sampling data and photo documentation was required to be uploaded within 24 hours. The report was not uploaded to SMARTS until November 20, 2020.⁹²
3. January 4, 2021: Since a field sample was collected on this day, as required, the field sampling data and photo documentation was required to be uploaded within 24 hours. The report was not uploaded to SMARTS until January 7, 2021.⁹³
4. March 18, 2021: More than 0.1 inch of rain occurred and the Discharger submitted discharge monitoring as required by the Permit, which indicates that a discharge occurred from the Facility, which would then have required receiving water sampling per the Investigative Order. No receiving water sampling results were uploaded into SMARTS. Additionally, no photos from

⁹¹ SMARTS Attachment ID 2620471

⁹² SMARTS Attachment ID 2779925

⁹³ SMARTS Attachment ID 2802105

- Porter Creek were provided.⁹⁴
5. October 22, 2021: Since a field sample was collected on this day, as required, the field sampling data and photo documentation was required to be uploaded within 24 hours. The report was not uploaded to SMARTS until October 26, 2021.⁹⁵
 6. December 13, 2021: More than 0.1 inch of rain occurred and the Discharger submitted discharge monitoring as required by the Permit, which indicates that a discharge occurred from the Facility, which would then have required receiving water sampling per the Investigative Order. No receiving water sampling results were uploaded into SMARTS. Additionally, no photos from Porter Creek were provided.⁹⁶
 7. December 10, 2022: Since a field sample was collected on this day, as required, the field sampling data and photo documentation was required to be uploaded within 24 hours. The report was uploaded to SMARTS on December 16, 2022, and no photos from Porter Creek were provided.⁹⁷

Instead of alleging each violated provision of the Investigative Order as a stand-alone violation or alleging each instance of violation as a separate day of violation, the Prosecution Team proposes to allege only seven days of violation, even when multiple violations occurred on some of those days. Additionally, while the Prosecution Team could have alleged each day a report was late as an additional day of violation, it exercised discretion in selecting to assess only on day for each late report.

⁹⁴ SMARTS Attachment ID 2850733

⁹⁵ SMARTS Attachment ID 2998121

⁹⁶ SMARTS Attachment ID 2850733

⁹⁷ SMARTS Attachment ID 3250016

Discussion of Factors for Per Day Liability for Violation 7

Days of Violation

Consistent with the discussion above, there are seven days of violation.

Actual or Potential for Harm

Per the Enforcement Policy, an assignment of major for Actual or Potential for Harm when: “The characteristics of the violation have wholly impaired the Water Boards’ ability to perform their statutory or regulatory functions, present a particularly egregious threat to beneficial uses, and/or the circumstances of the violation indicate a very high potential for harm. Non-discharge violations involving failure to comply with directives in cleanup and abatement orders, cease and desist orders, and investigative orders, involving reports relating to impaired water bodies and sensitive habitats, should be considered major.”

The Discharger failed to comply with the Investigative Order directives. Not only did the Discharger’s failure to upload collected data in a timely manner delay Regional Water Board staff’s ability to rapidly assess conditions at the Facility, but in multiple instances the Discharger’s failure to conduct sampling deprived Regional Water Board staff of the information altogether. The absence of receiving water data and photo documentation of conditions within Porter Creek also prevented Regional Water Board staff from being able to assess compliance with the Basin Plan for a 303(d) list sediment impaired waterway.

Therefore, the Prosecution Team has assigned a **major** Actual or Potential for Harm.

Deviation from Requirement

The Investigative Order’s directives were written to ensure that the Discharger closely monitor conditions at the Facility, assess impacts to Porter Creek by collecting water quality data, and documenting conditions. While some of the reports required pursuant to the Investigative Order were eventually submitted, other requirements, as described above, were never complied with. The absence of this data rendered the requirement ineffective in its essential functions.

The Prosecution Team has determined that a **major** Deviation from Requirement score is appropriate in this case.

Discussion of Violator’s Conduct Factors for Violation 7

Degree of Culpability

The Investigative Order explicitly required that the Discharger collect samples when rain a rain event produced 0.1 inch of rain or more and resulted in discharge from at least one drainage area within the Facility. Additionally, the Investigative Order explicitly required that field sampling reports associated with Receiving Water Monitoring be uploaded into SMARTS within 24 hours of collection. These requirements were discussed with the Discharger on multiple occasions.

The Discharger’s failure to notify the Regional Water Board staff of these discharges is in direct violation of Investigative Order No. R1-2019-0029.

On December 8, 2022, County of Sonoma PRMD staff observed sediment-laden stormwater discharging to Porter Creek from the Facility’s driveway into the roadside ditch and culverts. Turbid water flowed down the driveway bypassing the West Culvert settling tanks and drains into a roadside ditch which then discharges to Porter Creek.⁹⁸

After hearing from County of Sonoma PRMD staff, Regional Water Board staff visited the Facility on December 9 and 10. During these inspections, Regional Water Board staff observed turbid water discharging from the Facility to Porter Creek. The Discharger’s failure to notify the Regional Water Board staff of any of these four discharges is in direct violation of Investigative Order No. R1-2019-0029, and thus again defeats the Regional Water Board staff’s objective to resolve these sediment-laden discharges having already issued two investigative orders.

A reasonable and prudent discharger would have complied with all requirements of an issued Investigative Order. The failure of the Discharger to comply with multiple provisions of the issued Investigative Order, over more than two-year period, falls below what would be expected of a reasonable and prudent discharger.

The Discharger knew or should have known that that these specific requirements applied to them as described within the issued Investigative Order.

Therefore, the Prosecution Team has assigned a **1.3** for Degree of Culpability Factor.

History of Violations

For the reasons identified in Violation 1, a score of **1.1** has been applied.

⁹⁸ See County of Sonoma PRMD staff Inspection Report for inspection dated December 8, 2022.

Cleanup and Cooperation

Despite multiple communications, technical compliance support meetings, field visits, and discussions following the issuance of the Investigative Order, the Discharger continued to accrue violations. The Discharger's volunteer efforts to come back into compliance were inconsistent and fall below the normally expected response.

A factor of **1.2** for Cleanup and Cooperation is appropriate.

Per Day Liability Calculations for Violation 7

= (Days) (Per Day Factor) (Statutory Max Per Day)
= (7 days) (0.85) (\$1,000 per day)
= **\$5,950**

Where:

Days = Days of Violation

Per Day Factor is determined based on the application of the following factors to “Table 3- Per Day Factor for Non-Discharge” = 0.85

Where:

Actual or Potential for Harm = Major
Deviation from Requirement = Major

Statutory Max Per Day= \$1,000 per day

Total Base Liability Amount for Violation 7

= (Initial Liability Amount) (Culpability) (History) (Cleanup & Cooperation)
= (\$5,950)(1.3)(1.1)(1.2)
= **\$10,210**

Where:

Initial Liability Amount = \$5,950
Culpability = 1.3
History = 1.1
Cleanup and Cooperation = 1.2

Statutory Maximum for Violation 7

= (Days) (Statutory Max Per Day)

= (7 days) (\$1,000)

= **\$7,000**

Final Proposed Liability for Violation 7

= Total Base Liability Amount, unless it exceeds the statutory maximum

= \$10,210 Total Base Liability Amount > \$7,000 statutory maximum

The Total Base Liability Amount for Violation 7 using the enforcement policy factors exceeds the statutory maximum. Therefore, the final proposed liability for Violation 7 has been adjusted to the statutory maximum.

= **\$7,000**

Total Base Liability Amounts for All Violations

Total Base Liability for Discharge Violations (Violation 1)

= Violation 1
= **\$8,589,406**

Total Base Liability for Non-Discharge Violations (Violations 2 through 7)⁹⁹

= Violation 2 + Violation 3 + Violation 4* + Violation 5* + Violation 6 + Violation 7*
= \$1,213,146 + \$889,834 + \$1,210,000 + \$830,000 + \$12,870 + \$7,000
= **\$4,162,850**

Total Base Liability

= Total Proposed Liability for Discharge Violation + Total Proposed Liability for Non-Discharge Violations
= \$8,589,406 + \$4,162,850
= **\$12,752,256**

⁹⁹ Violations 4, 5, and 7, which are marked with an asterisk, have been adjusted to the statutory maximum as the amount calculated for those violations using the enforcement policy exceeds the statutory maximum.

Factors Applicable to All Violations

Ability to Pay and Ability to Continue in Business

The Enforcement Policy provides that if the Water Boards have sufficient financial information necessary to assess a violator's ability to pay the Total Base Liability Amount or to assess the effect of the Total Base Liability Amount on the violator's ability to continue in business, the Total Base Liability Amount may be adjusted to address the ability to pay or to continue in business. The ability of a discharger to pay an ACL is determined by its income (revenues minus expenses) and net worth (assets minus liabilities).

However, the Water Boards are not required to ensure that civil liabilities are set at levels that allow violators to continue in business. Rather, the Water Code only requires the Water Boards to consider this issue when imposing civil liabilities.

Based on review of public records, Bo Dean Co., Inc. continues to operate as a for-profit entity. In addition, Bo Dean Co., Inc. owns several substantial assets including businesses and real estate assets. Based on the currently available information, the Prosecution Team has determined the Discharger has the ability to pay the proposed liability amount and continue in business.

Despite publicly available information indicating the Discharger's ability to pay, Regional Water Board staff anticipates this issue being contested. A discharger's financial records may be private and/or in its exclusive possession, custody, and control. Accordingly, it can be difficult for the Water Boards to thoroughly evaluate a violator's ability to pay and continue in business without at least some level of cooperation. Per the Enforcement Policy, Regional Water Board staff conducted a preliminary financial investigation, which included the issuance of subpoenas seeking financial records. These subpoenas were issued concurrently with the original version of this Administrative Civil Liability Complaint. To date, the Discharger has refused to comply with the subpoenas.

The Enforcement Policy provides that, if a discharger fails to produce evidence about its finances to rebut the staff's prima facie evidence and/or fails to respond to a subpoena, the Water Boards should treat that failure as a waiver of the right to challenge its ability to pay or effect on its ability to continue in business at the hearing, or an admission that the discharger is able to pay the proposed liability and that proposed liability will not affect its ability to continue in business. Therefore, the Prosecution Team recommends treating the inability to pay the liability defense as waived.

Economic Benefit

The Enforcement Policy provides that the economic benefit of noncompliance should be calculated using the USEPA Economic Benefit Model (BEN)¹⁰⁰ penalty and financial modeling program unless it is demonstrated that an alternative method of calculating the economic benefit is more appropriate. For this case, BEN was determined to be the appropriate method. Using standard economic principles such as time-value of money and tax deductibility of compliance costs, BEN calculates a permittee's economic benefit¹⁰¹ derived from delaying or avoiding compliance with environmental statutes.

Staff evaluated the types of actions that the Discharger should have taken to avoid or mitigate the alleged violations and estimated the cost of these actions. The Discharger's failure to implement the necessary minimum and Advanced BMPs necessary comply with the Permit not only resulted in the discharge of large quantities of sediment-laden stormwater to Porter Creek, but also provided a significant cost savings to the Discharger.

The Discharger avoided the cost of purchasing, installing, and maintaining erosion and sediment control minimum BMPs throughout the Facility, including: hydroseeding, gravel check dams, and straw.

The Discharger also benefited economically by significantly delaying necessary BMPs in the form of facility improvements and necessary maintenance, including: rock lining ditches and drainages; cleaning out storm drains, culverts, and inlets; cleaning out settling ponds and tanks; rocking high use areas; paving access roads and driveways; and installing an operational Treatment System.

In total, Regional Water Board staff estimated the delayed and avoided costs totaled \$3,324,411. Based on this information, in addition to standard accounting assumptions, the BEN model calculated the economic benefit of the avoided and delayed expenditures of the alleged violations in this matter to be **\$287,038**.

¹⁰⁰ At the time this document was prepared, BEN was available for download at [Penalty and Financial Models | US EPA](http://www.epa.gov/enforcement/penalty-and-financial-models) (<http://www.epa.gov/enforcement/penalty-and-financial-models>).

¹⁰¹ State Water Board 2017 Enforcement Policy Section VI. A. Step 7 - Page 20: "Economic benefit is any savings or monetary gain derived from the act or omission that constitutes the violation. In cases where the violation occurred because the discharger postponed improvements to a treatment system, failed to implement adequate control measures (such as BMPs), or did not take other measures needed to prevent the violations, the economic benefit may be substantial."

Other Factors as Justice May Require

The Enforcement Policy provides that if the Water Board believes that the total base liability amount determined using the above factors is inappropriate, the amount may be adjusted under the provision for “other factors as justice may require,” but only if express findings are made to justify this adjustment. Examples of circumstances warranting an adjustment under this step include that the calculated amount is entirely disproportionate to assessments for similar conduct made in the recent past using the same Enforcement Policy.

The Regional Water Board Prosecution Team proposes adjusting the total base liability amount to **\$8,589,406**, which is the equivalent of the proposed liability for discharge Violation 1. This reduction results in a proposed liability amount that still establishes an appropriate deterrence given the seriousness of the violations, but is more consistent with other enforcement actions. Specifically, the Prosecution Team has reviewed other similar cases in industrial stormwater programs across the state and determined that the total base liability amount as calculated by the Enforcement Policy’s methodology results in a disproportionate liability in this instance.

The proposed liability will provide general deterrence to similarly situated dischargers to help prevent these types of violations from occurring at other sites. In addition, the liability of \$8,589,406, will serve to set a specific deterrent to prevent the Discharger from re-offending.

The Enforcement Policy allows for the recovery of staff costs incurred by the Regional Water Board. However, in light of the considerations discussed in the preceding paragraphs, the Prosecution Team does not propose that staff costs be recovered in addition to the proposed liability in this matter. Regardless, the time spent by staff in an attempt to resolve this matter in advance of the issuance of a formal complaint is not insignificant. Regional Water Board staff have estimated that they have spent at least 3,280 hours totaling over \$510,550 in investigation and enforcement costs since the alleged violations were initially identified.

Maximum Liability Amount

= **Sum of statutory maximum for Violations 1 through 7**
= \$105,916,080+\$1,270,000+\$930,000+\$1,210,000+\$830,000+\$30,000+\$7,000
= **\$110,193,080**

Minimum Liability Amount

= **Economic Benefit + 10%**
= \$287,038 + \$28,704
= **\$315,742**

Final Liability Amount for Violations 1 through 7

= *Total Base Liability Amount, with any allowed adjustments as discussed in this case under Other Factors as Justice May Require, provided the amount is within the statutory maximum and minimum amounts*

= \$8,589,406 Total Adjusted Base Liability Amount < \$110,193,080 statutory maximum and >\$315,742 minimum liability

Proposed Final Liability Amount = \$8,589,406