

**CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD
LAHONTAN REGION**

**BOARD ORDER NO. R6V-2017-0005
WDID NO. 6B141511005**

**WASTE DISCHARGE REQUIREMENTS
FOR**

CRYSTAL GEYSER OLANCHA WATER BOTTLING FACILITY

Inyo County

The California Regional Water Quality Control Board, Lahontan Region (Water Board), finds:

1. Discharger

Crystal Geysers Roxane, LLC is the owner and operator of an existing spring water bottling facility near Olancha. The Facility has been in operation since 1990. For the purposes of this Order, Crystal Geysers Roxane, LLC is referred to as the "Discharger" and its Olancha water bottling operation is referred to as the "Facility."

2. Facility Location

The Facility is located on approximately 21 acres of the Discharger's 170-acre property at 1210 South Highway 395 (Assessor's Parcel Numbers 033-470-03 and 033-050-04). The Facility is sited between US Highway 395 and the southern playa shoreline of Owens Dry Lake, approximately one (1) mile south of the unincorporated town of Cartago in western Inyo County. The Facility's location is shown in Attachment A, which is made a part of this Order.

3. History of Previous Regulation by the Water Board

Waste discharge requirements have not previously been issued to the Facility. Pursuant to California Water Code section 13267, the Water Board issued an Investigative Order dated July 24, 2014 requiring the Discharger to submit technical reports including a Waste Generation Report, a Site Investigation Workplan, a Site Investigation Report, and Quarterly Groundwater Monitoring reports, to assess the water quality impacts associated past and ongoing waste discharges. The Discharger has completed Phase 1 and 2 Site Investigations, and a Phase 3 Site Investigation was completed in late summer of 2016. Based on the Waste Generation Report and early phase investigation results, on April 30, 2015 Water Board staff determined that the discharges from the Facility have the potential to impact waters of the state and therefore required the Discharger to submit a Report of Waste Discharge.

4. Investigative Order, Unauthorized Discharges

During a March 2013 facility inspection, Water Board staff noted that the Facility was discharging wastewater to a lined pond (the "Arsenic Pond") with a compromised

polyethylene liner. The Arsenic Pond received waste discharges from flushing and regeneration of the Facility's arsenic removal filters. Sampling results of the Arsenic Pond's wastewater indicated high pH (up to 11.5 standard units), arsenic at 46,300 parts per billion (ppb), and cadmium, vanadium and other metals exceeding maximum contaminant levels (MCLs). Results of the Phase I Investigation indicated elevated groundwater concentrations of constituents and potential degradation of groundwater quality in violation of the Water Board's *Water Quality Control Plan for the Lahontan Region* (Basin Plan). Subsequently, all discharges to the Arsenic Pond have ceased, and the pond has been temporarily covered with an HDPE liner pending submittal of a final closure plan. Wastewater containing arsenic greater than approximately 8 to 10 parts per billion (ppb) (at or less than the MCL of 10 ppb) generated from the arsenic filter flushing is now captured via vacuum truck and hauled off-site to a licensed disposal facility. Investigation and cleanup activities related to the Facility's previously unauthorized waste discharges are ongoing under separate Water Board Orders.

5. Reason For Action

This is a new Order prescribing waste discharge requirements for an existing facility. The Discharger filed a Report of Waste Discharge (RWD) on October 21, 2015, in response to the April 30, 2015 request from the Water Board. According to information provided by the Discharger, the Facility produces approximately 54,680 gallons per day (gpd) of industrial wastewater generated from bottled spring water production activities that are discharged to onsite percolation ponds. Storm water flows are also directed to the percolation ponds. This Order is needed to set effluent and receiving water limits for the industrial wastewater discharge, and prescribe monitoring and reporting to ensure water quality protection. This Order also contains time schedule orders to submit: 1) a proposal to install wastewater discharge pH and flowmeters; 2) a proposal to install percolation pond water level measurement devices; 3) construction specifications and other information prior to constructing a new percolation pond, and 4) an amendment to the Discharger's April 18, 2016 Storm Water Pollution Prevention Plan (Appendix E of its April 18, 2016 revised RWD) to include Best Management Practices to limit the discharge of pre-production plastics in storm water.

6. Facility Description

The Facility consists of two spring water bottling production and warehouse buildings located directly adjacent to US Highway 395. The two buildings and warehouse areas cover approximately 316,214 square feet and are referred to as Crystal Geyser Roxane (CGR) North and CGR South. The Facility also includes parking lots, truck loading docks and buildings used for oil/chemical storage, equipment maintenance and offices. Each bottled water production building contains three water bottling production lines. A total of twelve industrial cooling tower units are located outside the buildings in secondary containment structures. Water bottles are manufactured onsite from polyethylene terephthalate (PET) pellets shipped in from outside vendors, which are formed into drinking water bottles using a blow molding process. The bottling operations utilize spring water from two onsite production wells

(CGR-2 and CGR-7). Production wells CGR-3 and CGR-4 provide domestic potable water to supply restrooms and drinking water for the Facility's employees.

7. Authorized Disposal Sites

The authorized disposal sites for the Facility are the 5,225-square foot unlined East Pond, and the 7,125-square foot lined Fire Pond, and the planned (not yet constructed) 150-square foot unlined South Overflow shown in Attachment B, Site Layout, which is made a part of this Order.

8. Discharge Description

Based on information provided by the Discharger, the wastewater discharge is comprised of spring water which has been filtered through several processes and exposed to ozone, and cleaning, anti-scaling, and sanitizing agents of acidic and basic chemistry. Wastewater is generated through four processes: bottled water production, equipment cleaning/sanitation, cooling tower operations, and arsenic filter regeneration, described below. Due to high permeability soils and shallow depth to groundwater at the Facility, all wastewater from employee facilities is discharged to four underground alarmed septic holding tanks, which are pumped and the waste is disposed of off-site.

- a. Bottled Water Production. Spring water from onsite wells CGR-2 and CGR-7 are blended to provide source water for bottling operations. Sampling results from 2014 indicate that naturally occurring arsenic is present in CGR-2 at 10 parts per billion (ppb); in CGR-7 arsenic is present at 23 ppb. The MCL for arsenic is 10 ppb. Extracted groundwater is filtered through 5-micron bag filters to remove sediments, and injected with ozone. Ozonated water is then passed through manganese sand filters to remove arsenic to below the MCL of 10 ppb. Ceramic microfilters (0.1 microns) are used as final filtering step. These microfilters are equipped with a clean-in-place (CIP) system. The CIP system consists of three tanks: one 185-gallon tank containing acidic solution (2 percent phosphoric acid); one 185-gallon tank containing caustic solution (3 percent sodium hydroxide), and one tank containing ozonated rinse and purge water. Prior to discharge to the East Pond, CIP solutions are neutralized in place by mixing the acidic and caustic solutions until the pH reaches 6 to 9 standard units. CIP system tanks are drained up to six (6) times per year and discharged to the East Pond.
- b. Equipment Cleaning/Sanitizing. In addition to the CIP system, bottle filler lines are sanitized daily and cleaned weekly. Cleaning solutions contain chlorinated water, caustic soda, phosphoric acid, detergents and surfactants; sanitizing solution contains chlorinated water, ammonium compounds, and chlorides.
- c. Cooling Towers. Twelve cooling towers are used to circulate softened spring water in a closed loop to cool production equipment such as bottle-making and filling lines. The cooling tower water does not come into direct contact with the equipment it cools. Cooling tower water is treated with an anti-scalant containing phosphoric and sulfuric acids, and passed through an ion exchange resin to soften the water (i.e., replacing calcium with sodium ions). The ion exchange

resin is automatically regenerated with sodium chloride. The regeneration process utilizes a sea salt solution that is passed through the ion exchange resin to remove the retained calcium. Each cooling tower discharges approximately 2,000 gpd to the East Pond.

- d. Arsenic Filtration Regeneration. Three manganese sand filter arsenic removal units are installed in the bottled spring water production circuit. These arsenic removal units are regenerated approximately once every three to four months to remove captured arsenic and improve media treatment efficiency. Regeneration timing is based on monitoring results from an onsite arsenic analyzer. Wastewater with concentrations of arsenic above 8 ppb is captured by a vacuum truck and disposed of at an off-site waste disposal facility. Final-flush wastewater is disposed of to the East Pond, once arsenic concentrations reach 8 ppb or less.

9. Constituents of Concern

Constituents of concern (COCs) which may affect groundwater quality are naturally occurring arsenic, and the byproducts present in cleaning, sanitizing, and industrial solutions shown in Table 1, below. These byproducts may affect receiving waters by adding salts, total dissolved solids (TDS), disinfection byproducts, and pH-altering substances (acids and bases). PET pellets¹ used in water bottle manufacturing may be present in wastewater discharges if pellets are spilled and discharged to floor drains.

Table 1. Constituents of Concern.

| Product Use | Product Compounds | Byproducts |
|----------------------------------|--|---|
| Cleaning solutions/detergents | Sodium hydroxide (caustic soda) | Sodium |
| | Phosphoric acid | Phosphate |
| | Sodium xylene sulfonate | Sodium, sulfur oxides |
| Sanitizing solutions | Alkyl dimethyl benzyl ammonium chloride, octyl dethyl dimethyl ammonium chloride, diocyl | Chloride, nitrogen compounds, methylene blue active substances (MBAS, i.e., foaming agents) |
| | Peroxyactiec acid, acetic acid, hydrogen peroxide | Acetic acid (pH altering) |
| | Sodium hypochlorite | Sodium, chloride |
| Industrial materials | Hydraulic fluids, oils, diesel fuel, cleaning solvents | Oil and grease, volatile/semi-volatile organic compounds (VOCs/SVOCs) |
| Cooling tower anti-scalant | Phosphoric acid, sulfuric acid | Phosphate, sulfate compounds |
| Cooling tower ion exchange resin | Sodium solution, untreated groundwater | Sodium, TDS, arsenic |

¹ PET pellets, also known as "pre-production plastic" or "nurdles", are the raw plastic resin materials that are molded into finished plastic products (here, water bottles). They range from 1 to 5 millimeters in size.

| Product Use | Product Compounds | Byproducts |
|------------------------------------|-------------------------------------|---|
| regeneration | | |
| Arsenic filtration regeneration | Untreated groundwater | Arsenic |
| Chlorinated/ozonated water | Chlorinated/ozonated groundwater | Residual chlorine, trihalomethanes, formaldehyde, halocetic acids, bromate, chlorite |
| Pre-production plastic | Polyethylene terephthalate | Micro-debris |

10. Discharge Water Quality

In February and April 2016, the Discharger conducted sampling of 24-hour composite discharges to the East Pond and the Fire Pond. Table 2 shows the constituents of concern, detected concentrations, and associated maximum contaminant levels (MCLs), secondary maximum contaminant levels (SMCLs), or other water quality standards. Bold, shaded results exceed (are worse quality) than the applicable water quality standard. Other than arsenic and foaming agents, no COC was detected above applicable water quality standards.

Table 2. Composite Sampling Results of Discharge Water Quality for COCs.

| Constituent (units) | Discharge to East Pond | Discharge to Fire Pond | MCL, SMCL or Water Quality Standard |
|--------------------------------|---------------------------|------------------------------|---|
| Sodium (ppm) | 32, 43 | 24, 25 | 69 ² |
| Arsenic, dissolved (ppb) | 16.2 | <0.001, 4.2 | 10 |
| Total Dissolved Solids (ppm) | 155, 205 | 180, 195 | 500 |
| Chloride (ppm) | 80, 8.1 | 4.3, 3.1 | 250 |
| Ammonia as nitrogen (ppm) | <10 | <10 | 30 |
| pH (Standard units) | 7.19, 7.64 | 6.5, 7 | 6-9 |
| Sulfate (ppm) | 42, 35 | 35, 35 | 250 |
| Total Phosphorus (ppm) | 0.10, 0.34 | 0.32, 12 | n/e (not established) |
| Nitrate as Nitrate (ppm) | 0.27, 0.29 | 0.3, 3.6 | 10 |
| Total Phosphate (ppm) | 0.32, 1.0 | 0.98, 36 | n/e |
| Phenol (SVOC*) (ppb) | <9.8, <9.8 | 160, <9.8 | 2,000 ³ |
| MBAS (foaming agents) (ppm) | <0.10, 0.2 | 3.0 , 0.15 | 0.5 |

*Semi-volatile organic compound

11. Requirement for Additional Metals Effluent and Groundwater Sampling

Composite sampling of waste streams at the Facility indicates certain metals besides arsenic were detected at levels higher than present in source water. For example, antimony, barium, copper, molybdenum, and zinc were detected at levels three to six times higher in discharge sampling than in source water production well sampling (but not exceeding MCLs). The reason for these increases is unknown.

² UN Food and Agricultural Organization (UNFAO) Agricultural Water Quality Goal.

³ US EPA Health Advisory Level

To better characterize wastewater discharges for metals, this Order requires monthly effluent sampling for California Assessment Manual (CAM-17) total and dissolved metals⁴ for six (6) months. If CAM-17 metals do not exceed any applicable MCL in the 6-month sampling period, the effluent monitoring frequency for these metals (except for arsenic) will be reduced. Groundwater monitoring for CAM-17 will be required on a quarterly basis, and will be reduced (except for arsenic) if effluent monitoring indicates that MCLs are not exceeded.

12. Percolation Ponds, Capacities

Approximately 96 percent of the Facility's wastewater discharge is directed to the East Pond (52,220 gpd average), with the balance going to the Fire Pond and its overflow pond (2,460 gpd average). Storm water discharges from the 25-year, 24-hour storm event are also directed to the East and Fire Pond South Overflow.

- a. East Pond. The average daily wastewater flow discharged to the East Pond is estimated at 52,220 gpd (16-hour daily average of 57 gallons per minute [gpm]). This includes discharges from the production and sanitation processes, and cooling towers. Maximum gpm wastewater discharge rates occur during final flushing of the arsenic filters, when approximately 75 gallons per minute of wastewater is discharged for up to six (6) hours. During arsenic filter flushing, the production and sanitation circuits are stopped; therefore, no other wastewater discharges occur during filter flushing. Arsenic filter flushing occurs up to twelve times per year (three filters, each flushed up to four (4) times per year, one filter at a time). Storm water discharges from the 25-year, 24-hour storm event (3.15 inches of rain, or 738 gpm over a 24-hour period) are also directed to the East Pond, so the maximum gpm discharge to the East Pond is 813 gpm. Based on the calculations provided by the Discharger, the East Pond has capacity to infiltrate 3,257 gpm of water.
- b. Fire Pond and South Overflow. The Fire Pond is maintained at near-full levels for fire suppression purposes; however, the planned South Overflow pond is designed to store and infiltrate 20,420 gallons of water. Estimated flows to the South Overflow pond, including the 25-year, 24-hour storm event, are 12,720 gallons. This Order contains a time schedule to provide construction specifications, a best management practices plan, a soil disposal plan, and a wetland delineation prior to the South Overflow pond's construction.

13. Scope of Activities Covered and Excluded Under This Order

This Order covers wastewater discharges from the production, cleaning/regeneration and sanitizing activities related to spring water bottling, and storm water discharges from impervious surfaces. This Order does not authorize excavation/dredge and fill activities in waters of the United States or other surface waters. This Order does not authorize storm water discharges associated with construction activities that disturb one acre or more of land, or construction activities that disturb less than one acre of

⁴ Antimony, Arsenic, Barium, Beryllium, Cadmium, Chromium, Cobalt, Copper, Lead, Mercury, Nickel, Selenium, Silver, Thallium, Tin, Vanadium, Zinc.

land, but are part of a larger common plan of development. Such discharges are prohibited except in compliance with a National Pollutant Discharge Elimination System (NPDES) permit. This Order does not authorize discharges of domestic wastewater, including discharges from septic tanks, to land or receiving waters.

14. Site Storm Water Management

The Discharger submitted a Storm Water Pollution Prevention Plan (SWPPP) in its April 18, 2016 revised RWD. The SWPPP was prepared to meet the requirements of State Water Board's Industrial Storm Water General Permit (Order No. 2014-0057-DWQ). However, the Discharger is not obtaining coverage under the Industrial Storm Water General Permit (IGP) because the SIC code for the Facility's primary activity, *Bottling Spring and Mineral Water* (SIC Code 5149), is not a listed SIC code requiring coverage under the IGP, and because storm water discharges to waters of the United States will not occur. In lieu of coverage under the IGP, this Order requires the Discharger to submit an amended SWPPP to include control measures to limit pre-production plastics in storm water, and includes monitoring and reporting for storm water discharges, similar to the requirements of the IGP.

15. Site Geology

The Facility is located in the southern portion of the Owens Valley, near the southwestern shore of Owens Dry Lake. The eastern base of the Sierra Nevada Mountains is one (1) mile west of the site. The Owens Valley is formed by the Sierra Nevada Frontal Fault to the west and the White/Inyo Mountains to the east. The Sierra Nevada Mountains are generally composed of Cenozoic age igneous rocks of granodiorite-granite composition whereas the White/Inyo Mountains, to the east, consist of Pre-Cambrian to Triassic sedimentary rock locally intruded with Cenozoic granitic rocks. The site overlies a transition zone between alluvial deposits derived from erosion of the Sierra Nevada Mountains to the west and the lacustrine deposits from ancestral Owens Lake to the east. The alluvial deposits in the western portion of the site consist of boulders, gravels and sands with relatively little fine-grained sediment. Farther east, the alluvial deposits intermingle with the fine-grained lacustrine deposits and the overall nature of the sediments beneath the site become finer to the east.

16. Site Hydrology

Numerous springs are located on the Facility property, with the majority located east of the Facility along the "Spring Line Fault", which bisects the property in the north/south direction. The springs are thought to mark the line of contact between the water-bearing alluvial sediments and less permeable, finer-grained lakebed sediments to the east of the fault. Other than springs and wastewater percolation ponds, there are no surface water bodies present on the Facility.

17. Site Hydrogeology

The Facility is located in the Owens Valley Groundwater Basin (Department of Water Resources No. 6-12), within the Owens Hydrologic Unit (United States Geological Survey No. HU 603) and the Lower Owens Hydrologic Area (USGS No. HA 603.30). Groundwater beneath the Facility occurs in sand and gravel alluvium interbedded

with layers of fine-grained lacustrine deposits, known as the shallow zone. The spring water production wells (CGR-2 and CGR -7) are screened in the lower portion of the shallow zone aquifer at depths ranging from 86 to 104 feet below ground surface (bgs), and are located west of the Spring Line Fault. The shallow zone aquifer is separated from a deeper aquifer by lower permeability materials at approximately 80 feet bgs, creating an aquitard that restricts but does not prevent groundwater movement between the aquifer layers. Water level monitoring in well pairs screened in the shallow and deeper aquifers (OW-7U/OW-7M, OW-10U/OW-10M) show that the deeper aquifer is semi-confined and there is an upward vertical component to groundwater movement. Depth to groundwater at the Facility is shallow, ranging from ground surface (i.e., springs) to a depth of 22 feet bgs. Groundwater flow in the shallow aquifer zone is generally to the east/ northeast, at a groundwater gradient of 0.007, discharging to Owens Dry Lake, located approximately one-half mile east of the Facility. The primary source of groundwater recharge in the Owens Valley Groundwater Basin is from percolation of streamflow from the surrounding mountains.

18. Land Uses

The Facility is located in rural western Inyo County, adjacent to US Highway 395. Land uses in the area are undeveloped open space, low-density residential and commercial uses in the unincorporated town of Cartago to the north, and the newly constructed Crystal Geyser Cabin Bar Ranch spring water bottling plant located approximately 0.75 miles north of the Facility. The Facility is bordered on the east by the southern shoreline of Owens Dry Lake. The California Department of Fish and Wildlife owns a 218-acre parcel of land northeast of the Facility, and manages that land as the Cartago Wildlife Area.

19. Water Quality Control Plan for the Lahontan Region

The Water Board adopted the *Water Quality Control Plan for the Lahontan Region* (Basin Plan), which took effect on March 31, 1995. This Order implements the Basin Plan, as amended.

20. Groundwater Beneficial Uses

The beneficial uses of the groundwater of the Owens Valley Groundwater Basin, as set forth and defined by the Basin Plan, are:

- a. Municipal and Domestic Supply (MUN)
- b. Agricultural Supply (AGR)
- c. Freshwater Replenishment (FRSH)
- d. Industrial Service Supply (IND)
- e. Wildlife Habitat (WILD)

21. Groundwater Quality

- a. Production source water quality. Water quality in production wells CGR-2 and CGR-7, both located west of the Spring Line Fault, is excellent with the exception of arsenic detected at or above the MCL (also called drinking water standard) of

10 ppb. Laboratory data from sampling conducted in 2014 shows non-detectable levels of volatile organic compounds (VOCs), semi-volatile organic compounds (SVOCs), and pesticides. Concentrations of metals (except arsenic at 10 ppb in CGR-2 and 23 ppb in CGR-7), radiological materials, microbiological indicators, and secondary inorganics were not detected above primary or secondary maximum contaminant levels. Total dissolved solids ranged from 130 to 200 ppm. Total coliforms were not detected.

- b. Disposal sites background water quality. A total of fifteen monitoring wells have been installed on the property as a result of three phases of site investigations, conducted by the Discharger under Water Board Orders since 2014. It is important to note that no monitoring wells were installed prior to the Facility's discharges that began in 1990; therefore, determining accurate background⁵ water quality in the vicinity of authorized disposal sites is problematic, since existing groundwater sampling results reflect past discharges (the Facility has been operating since 1990). Table 3 lists the monitoring wells installed as of September 2016 and their general locations relative to past and current discharge areas. Averaged results from the two most recent sampling events (in February and July 2016) for arsenic and TDS for each well are also shown. Arsenic and TDS are constituents of concern most likely to be present in the discharge which may adversely affect water quality, according to discharge sampling results. Grey-shaded rows indicate monitoring wells (MWs-1, 3, and 8) which *may be* the least impacted by previous discharges due to their location and range of results; as such, they are the best available data to consider in setting limits for constituents of concern in this Order.

Table 3. Monitoring Wells, Locations, and 2016 Averaged Water Quality Results.

| MW # | General Monitoring Location | Arsenic (ppb) | TDS (ppm) |
|------|--|---------------|-----------|
| 1 | Up/cross gradient of Fire Pond | 12.8 | 170 |
| 2 | Down/cross gradient of Fire Pond | 6.6 | 169 |
| 3 | Upgradient of (former) Arsenic Pond | 4.5 | 208 |
| 4 | Immediately downgradient of Arsenic Pond | 131 | 870 |
| 5 | 500 feet downgradient of Arsenic Pond | 187 | 823 |
| 6 | Upgradient of East Pond/cross and downgradient of Arsenic Pond | 11.5 | 918 |
| 7 | Immediately downgradient of East Pond | 14.6 | 305 |
| 8 | North crossgradient of Arsenic Pond | 7.3 | 175 |
| 9 | South crossgradient of Arsenic Pond | 34.5 | 453 |
| 10 | Downgradient of Fire Pond, near former Fire Pond outlet | 11.3 | 105 |
| 11 | ~800 feet down/crossgradient of Arsenic Pond | 58.4 | 1,100 |
| 12 | ~1,200 feet downgradient of Arsenic Pond | 95.6 | 1,060 |

⁵ "Background" water quality refers to the quality of water unaffected by waste discharges.

| MW # | General Monitoring Location | Arsenic (ppb) | TDS (ppm) |
|------|--|---------------|-----------|
| 13 | Down/crossgradient of East Pond | 8.7 | 475 |
| 14 | Upgradient of East Pond, downgradient of former Fire Pond outlet | dry | dry |
| 15 | Next to MW-3, vertical delineation well | 29 | 180 |

- c. East Pond receiving water quality. Monitoring well MW-7 is located downgradient of the East Pond and has been sampled since 2015. Results from this MW reflect past and ongoing discharges. Groundwater analytical results from samples generally indicate low detections of dissolved metals, total metals, TDS, and other inorganic and organic constituents that did not exceed MCLs, with the exception of arsenic. Total arsenic concentrations ranged from 48.3 ppb in July 2015, decreasing to 14.9 ppb in June 2016. TDS ranges from 1,040 ppm in July 2015 to 305 ppm in June 2016.

22. Basis for Numeric Effluent Limits in this Order

This Order sets numeric effluent limits for constituents of concern that have the potential to degrade receiving groundwater quality to levels exceeding MCLs or potential background levels (challenges to estimating background levels are described in Finding 21.b, above). Data presented in Table 3, below, suggest that arsenic background levels near disposal sites could be above the MCL of 10 ppb. In some monitored areas, arsenic levels detected in groundwater are likely influenced by past and current waste discharges and do not accurately represent naturally occurring background levels. Additionally, data from groundwater investigations at the Facility indicate arsenic concentrations are highly variable (over an order of magnitude) both with depth and lateral distance. The Discharger has stated that arsenic levels in wastewater discharges typically do not exceed 8 ppb, and this level is achievable; therefore, the effluent limit for arsenic will be set at 10 ppb to account for uncertainty in background levels and the ability of the Discharger to control arsenic in wastewater.

For TDS, the effluent limit is set at 25 percent greater than the maximum concentration detected in wastewater discharges. This allows for uncertainty due to the limited dataset on discharge water quality, while maintaining existing high quality water (much lower [i.e., better quality] than SMCLs) for TDS near disposal sites. For disinfection byproducts and CAM-17 metals, wastewater discharges must not exceed applicable MCLs on an average monthly basis.

Note that the potential background levels cited, below, are not formally adopted background levels for setting cleanup goals or defining accepted background water quality. Rather, they are considered informational, preliminary levels for the purposes of setting realistic effluent limits to protect groundwater quality from degradation, and are derived from a small number of best available data.

Table 4. COCs, Water Quality Standards, and Monitoring Data.

| Constituent (units) | Water Quality Standard | Potential Background Levels (from Table 3) | 2016 Waste Discharge Sampling Results (from Table 2) |
|------------------------------|----------------------------|--|--|
| Arsenic, dissolved (ppb) | 10 (MCL) | 4.5 - 12.8 | 4.2 - 16.2 |
| Total Dissolved Solids (ppm) | 500 (SMCL) | 170 – 208 | 155 – 205 |
| pH (standard units) | 6-9 (Basin Plan objective) | 6 - 9 | 6.5 - 7.6 |

23. California Water Code Section 13172

Water Code section 13172 directed the State Water Resources Control Board (State Water Board) to write regulations for waste disposal sites, “except for sewage treatment plants...” to protect water quality. Those regulations are now incorporated in the California Code of Regulations (CCR), title 27. The statute exempts the wastewater treatment facilities from the regulation, but does not exempt the disposal of treated wastewater, except under specified conditions.

24. California Code of Regulations Title 27; Exemption

California Code of Regulations, title 27, division 2, (Title 27) specifies regulatory and design criteria for discharges of solid wastes and wastewater to land for treatment, storage, or disposal. Section 20090 of Title 27 specifies exemptions for discharges of wastewater to land if the following conditions are met:

- a. The applicable Water Board has issued WDRs, reclamation requirements, or waived such issuance;
- b. The discharge is in compliance with the applicable water quality control plan; and
- c. The wastewater does not need to be managed according to chapter 11, division 4.5, title 22 of this code as a hazardous waste.

Discharges authorized under this Order satisfy the conditions for exemption from Title 27 because 1) this Order constitutes WDRs; 2) this Order requires the discharges to be in compliance with the applicable water quality control plan; and 3) the wastewater does not need to be managed as a hazardous waste, as described in Findings 10 and 11.

25. California Water Code Section 13367

Water Code section 13367 directs the state and regional water boards to implement a program to control discharges of pre-production plastics from point and non-point source discharges. The program shall, at a minimum, require plastic manufacturing, handling, and transportation facilities to implement best management practices (BMPs) to minimize discharges of pre-production plastics. This Order carries out the requirements of Water Code section 13367 by requiring the Discharger to submit an

amended Storm Water Pollution Prevention Plan detailing BMPs applicable to pre-production plastics transfer, storage and handling, and requires implementation and monitoring to ensure such BMPs are effective in limiting the discharge of plastics to the environment.

26. Policy for Maintaining High Quality Waters

State Water Resources Control Board Resolution No. 68-16 requires that existing high quality waters will be maintained until it is demonstrated to the State that any change will be consistent with maximum benefit to the people of the State, will not unreasonably affect present and anticipated beneficial use of such water, and will not result in water quality less than that prescribed in the [State or Regional Water Board] policies; and requires that any activity which produces or may produce a waste or increased volume or concentration of waste and which discharges or proposes to discharge to existing high quality waters must meet waste discharge requirements that will result in the best practical treatment or control of the discharge necessary to assure that a pollution or nuisance will not occur and the highest water quality consistent with maximum benefit to the people of the State will be maintained.

This Order authorizes the discharge of ozonated spring water which contains minor amounts of breakdown products from cleaning, sanitizing, and equipment cooling, as described in Finding 10. Naturally occurring arsenic is present in the source water and has been detected in discharge water above its MCL. This Order sets effluent limitations that allow for natural variability in source water quality, requires reasonable control and treatment measures, and may result in limited degradation to ground water quality. However, the limits are set to maintain high quality water and protect all present and future beneficial uses. This Order also establishes monitoring requirements to verify the effectiveness of the effluent limitations in protecting water quality. Therefore, the requirements of Resolution No. 68-16 are met.

27. Water Code Section 13241 Considerations

Pursuant to California Water Code section 13241, the requirements of this Order take into consideration the following:

a. Past, present, and probable future beneficial uses of water.

The findings of this Order identify past, present and probable future beneficial uses of water, as described in the Basin Plan, that are potentially and currently affected by the discharge. This Order does not authorize activities which would adversely affect beneficial uses of water in the Owens Valley Groundwater Basin.

b. Environmental characteristics of the hydrographic unit under consideration, including the quality of water available thereto.

The findings of this Order concerning geology, hydrogeology, and hydrology provide general information on the hydrographic unit environmental characteristics. Finding Nos. 20 and 21, above, discuss information concerning the quality of available water and the potential uses of the groundwater.

- c. Water quality conditions that could reasonably be achieved through the coordinated control of all factors which affect water quality in the area.
Elevated levels of arsenic and TDS occur naturally in the aquifer sediments and receiving waters of the Owens Valley Groundwater Basin near the Facility. For example, data collected by the Great Basin Unified Air Pollution Control District from piezometers installed in the Owens Lakebed (S3[1] and Q4[9]) show arsenic ranging from <20 ppb up to 47,400 ppb, illustrating the variable nature of arsenic in the area. TDS in groundwater beneath the Owens Dry Lake ranges to 20,900 ppm; however, these values are from wells located four (4) to six (6) miles from the Facility's discharge point. Naturally occurring arsenic in the Facility's source groundwater exceeds the MCL of 10 ppb; the Facility utilizes a treatment system to filter the groundwater to remove arsenic prior to bottling. Past unauthorized discharges from the arsenic treatment system's regeneration back-flush water are the subject of an ongoing investigation. Impacts to soil and/or groundwater from those unauthorized discharges will be addressed under a separate action, such as a cleanup and abatement order issued to the Discharger. High-concentration arsenic discharges ceased in 2014, and water quality should be restored to background levels or established cleanup goals following any required remedial actions.
- d. Economic considerations.
This Order authorizes discharges for an existing water bottling facility which provides employment opportunities and tax revenue for Inyo County. The Discharger has not indicated any financial hardship in complying with the requirements of this Order.
- e. The need for developing housing within the region.
This Order does not involve developing housing.

28. The Right to Access to Clean Water

Water Code section 106.3 states in part "... every human being has the right to safe, clean, affordable, and accessible water adequate for human consumption, cooking, and sanitary purposes." This Order does not authorize the degradation of groundwater, and requires monitoring for potential degradation of water quality.

29. California Environmental Quality Act

This Order sets forth new waste discharge requirements for an existing facility. Therefore, the Water Board has determined this Order is categorically exempt from the provisions of the California Environmental Quality Act (CEQA), pursuant to the California Code of Regulations, title 14, section 15301, *Existing Facilities*. The Water Board will file a Notice of Exemption with the State Clearinghouse following adoption of this Order.

30. Notification and Consideration of Comments

Water Board staff solicited public comments by placing a copy of the Tentative WDRs on the Water Board's internet site on November 1, 2016, and distributing the

Tentative WDRs to the Discharger and known interested parties. A public information meeting was held in Olancha on December 2, 2016, to discuss the WDRs and accept comments from the public. The Water Board, in a public meeting on January 11, 2017, heard and considered all comments pertaining to the discharge.

IT IS HEREBY ORDERED that, pursuant to Water Code section 13263, the Discharger must comply with the following:

I. Discharge Specifications

A. Effluent Limitations

1. The total flow of wastewater and storm water to the authorized disposal sites (East Pond, and Fire Pond and its South Overflow percolation pond) must not exceed the infiltration capacity of the percolation ponds.
2. Wastewater discharged to authorized disposal sites must not contain trace elements, pollutants or contaminants, or combinations thereof, in concentrations that are toxic or harmful to humans or to aquatic or terrestrial plant or animal life.
3. The average monthly concentration of constituents detected in wastewater discharged to the authorized disposal sites must not exceed a maximum contaminant level specified for CAM-17 metals or disinfection byproducts.
4. Wastewater discharged to authorized disposal sites must not exceed the following effluent limits on an average monthly basis. As described in Finding 22, these limits are set based on composite sampling of wastewater to the authorized disposal sites, potential background concentrations, and applicable water quality standards.

Table 5. Effluent Limits.

| Constituent (units) | Effluent Limit, Average Monthly Values |
|------------------------------|---|
| Arsenic, dissolved (ppb) | 10 |
| Total Dissolved Solids (ppm) | 256 |
| pH (standard units) | 6.5-8.5 |

B. Receiving Water Limitations

The discharge of waste must not cause the presence of the following substances or conditions in the groundwater of the Owens Valley Groundwater Basin.

1. Bacteria, Coliform - In groundwater designated as MUN, the median concentration of fecal coliform organisms over any seven-day period shall be less than 1.1/100 milliliters.

2. Chemical Constituents - Groundwater designated as MUN shall not contain concentrations of chemical constituents, as a result of the discharge, in excess of the maximum contaminant level (MCL) or secondary maximum contaminant level (SMCL) based upon drinking water standards specified in the following provisions of title 22 of the CCR, which are incorporated by reference into this Order:
 - a. Table 64431-A of section 64431 (Inorganic Chemicals),
 - b. Table 64431-B of section 64431 (Fluoride),
 - c. Table 64444-A of section 64444 (Organic Chemicals),
 - d. Table 64449-A of section 64449 (Secondary Maximum Contaminant Levels-Consumer Acceptance Limits), and
 - e. Table 64449-B of section 64449 (Secondary Maximum Contaminant Levels-Ranges).
 - f. This incorporation-by reference is prospective includes future changes to the incorporated provisions as the changes take effect.
 - g. Waters designated as AGR shall not contain concentrations of chemical constituents in amounts that adversely affect the water for beneficial uses (i.e., agricultural purposes).
 - h. Where groundwaters contain naturally occurring chemical constituents in excess of MCLs or SMCLs, the discharge of waste shall not cause an increase in concentrations of such constituents. "Increase in concentration" shall be determined using a statistical method proposed by the Discharger and accepted by the Water Board as required in monitoring and reporting program (MRP) section IV. C.
3. Radioactivity - Groundwater designated as MUN shall not contain concentrations of radionuclides in excess of the limits specified in Table 4 of section 64443 (Radioactivity) of title 22 of the CCR, which is incorporated by reference into this Order. This incorporation-by-reference is prospective including future changes to the incorporated provisions as the changes take effect.
4. Taste and Odor - Groundwater shall not contain taste or odor-producing substances in concentrations that cause nuisance or that adversely affect the beneficial uses. For groundwater designated as MUN, at a minimum, concentrations shall not exceed adopted secondary maximum contaminant levels specified in
 - a. Table 64449-A of section 64449 (Secondary Maximum Contaminant Levels-Consumer Acceptance Limits), and
 - b. Table 64449-B of section 64449 (Secondary Maximum Contaminant Levels- Ranges) of title 22 of the CCR,

- c. The above sections are incorporated by reference into this Order. This incorporation-by-reference includes future changes to these provisions as the changes take effect.

C. General Requirements and Prohibitions

1. The discharge of waste that causes violation of any narrative or numeric water quality objective contained in the Basin Plan is prohibited.
2. Where any numeric or narrative water quality objective contained in the Basin Plan is already being violated, the discharge of waste that causes further degradation or pollution is prohibited.
3. The discharge of waste must not cause pollution as defined in section 13050 of the California Water Code.
4. The discharge of waste must not cause a nuisance as defined in section 13050 of the California Water Code.
5. Storm water discharges that contain pollutants that cause or threaten to cause pollution, contamination, or nuisance as defined in section 13050 of the Water Code, are prohibited.
6. Collected screenings, filtration residues, or other solids removed as a result of bottled water production processes must be disposed of in a manner that does not result in a condition of pollution or nuisance.
7. The discharge of wastewater except to the authorized disposal sites is prohibited.
8. A minimum of two feet of freeboard must be maintained in the authorized disposal sites (percolation ponds) at all times.
9. The discharge of cooling tower water to ground surface is prohibited.
10. The discharge of domestic wastewater, sewage, or sewage effluent to land or groundwater is prohibited.
11. The discharge of waste to surface waters other than authorized disposal sites, including domestic wastewater, sewage or sewage effluent, is prohibited.
12. Pre-production plastic materials (e.g., PET pellets) must be stored and handled in a manner such that they are not discharged to floor drains or storm water conveyances.
13. All industrial materials, cleaning, solvent, sanitizing, disinfectant, and anti-scalant solutions must be stored and handled such that they are not discharged to floor drains or storm water conveyances.
14. This Order does not authorize excavation/dredge and fill activities in waters of the United States.

15. This Order does not authorize storm water discharges associated with construction activities that disturb one acre or more of land, or construction activities that disturb less than one acre of land, but are part of a larger common plan of development. Such discharges are prohibited except in compliance with a National Pollutant Discharge Elimination System (NPDES) permit.

II. Provisions

A. Standard Provisions

The Discharger must comply with the "Standard Provisions for Waste Discharge Requirements," dated September 1, 1994, in Attachment C, which is made part of this Order.

B. Monitoring and Reporting

Pursuant to section 13267(b) of the California Water Code, the Discharger must comply with Monitoring and Reporting Program (MRP) No. R6V-2017-0005 as specified by the Executive Officer.

C. Material Change in Discharge Characteristics

Material changes to the waste stream must be reported via email to lahontan@waterboards.ca.gov **within 5 business days** of the Discharger becoming aware of such changes. Material change is defined as changes in the source, character, location, or volume of the discharge, including but not limited to, the following:

1. Addition of a new process or product resulting in a change in the character of the waste;
2. Significant change in disposal method; e.g., change from land disposal to direct discharge to water, or change to industrial practices which would significantly alter the characteristics of the waste;
3. Significant change in the disposal area, e.g., moving the discharge to another drainage area, or to a disposal area significantly removed from the original area potentially causing different water quality or nuisance problems; or
4. Increase in wastewater flow rates to percolation ponds that result in inadequate pond capacity.

D. Time Schedule Requirements

No later than 45 days of this Order being issued:

1. Submit a proposal to install automated continuous pH and flowmeters for each wastewater discharge point (i.e., points discharging to the East Pond and Fire Pond's South Overflow). The proposal shall include:
 - a. A description and specifications of the type of meters selected;
 - b. Locations where each meter will be installed;
 - c. A description of each wastewater stream monitored by each meter;
 - d. A schedule for installation of the meters, and
 - e. A discussion of the accuracy, frequency of measurement, and resolution (i.e., smallest measurable increment) of the selected meters.
2. Submit a proposal to install, in each percolation pond, a water level gauge, sensor or other device to measure the depth of water in each pond. The proposal shall include:
 - a. A description and specifications of the type of gauge selected;
 - b. A schedule for installation of the gauges, and
 - c. A discussion of the accuracy and resolution (i.e., smallest measurable increment) of the selected gauge.

No later than 60 days of this Order being issued:

3. Submit an amended Storm Water Pollution Prevention Plan (SWPPP) describing facility-specific Best Management Practices (BMPs) to limit the discharge of pre-production plastics in storm water. The following facility-specific BMPs or equivalent shall be described in the amended SWPPP:
 - a. The Facility shall use durable sealed containers designed not to rupture under typical loading and unloading activities at all points of plastic transfer and storage.
 - b. The Facility shall use capture devices as a form of secondary containment during transfers, loading, or unloading pre-production plastics. Examples of capture devices for secondary containment include, but are not limited to catch pans, tarps, berms or any other device that collects errant material.
 - c. The Facility shall have a sweeping or vacuum or vacuum-type system for quick cleanup of fugitive pre-production plastic material available for employees.
 - d. The SWPPP shall include a program to train employees handling pre-production plastic materials. Training shall include environmental hazards of plastic discharges, employee responsibility for corrective actions to prevent errant plastic materials, and standard procedures for containing, cleaning, and disposing of errant plastic materials.

At least 30 days prior to construction of the planned South Overflow Pond

4. Submit a plan containing the following information:

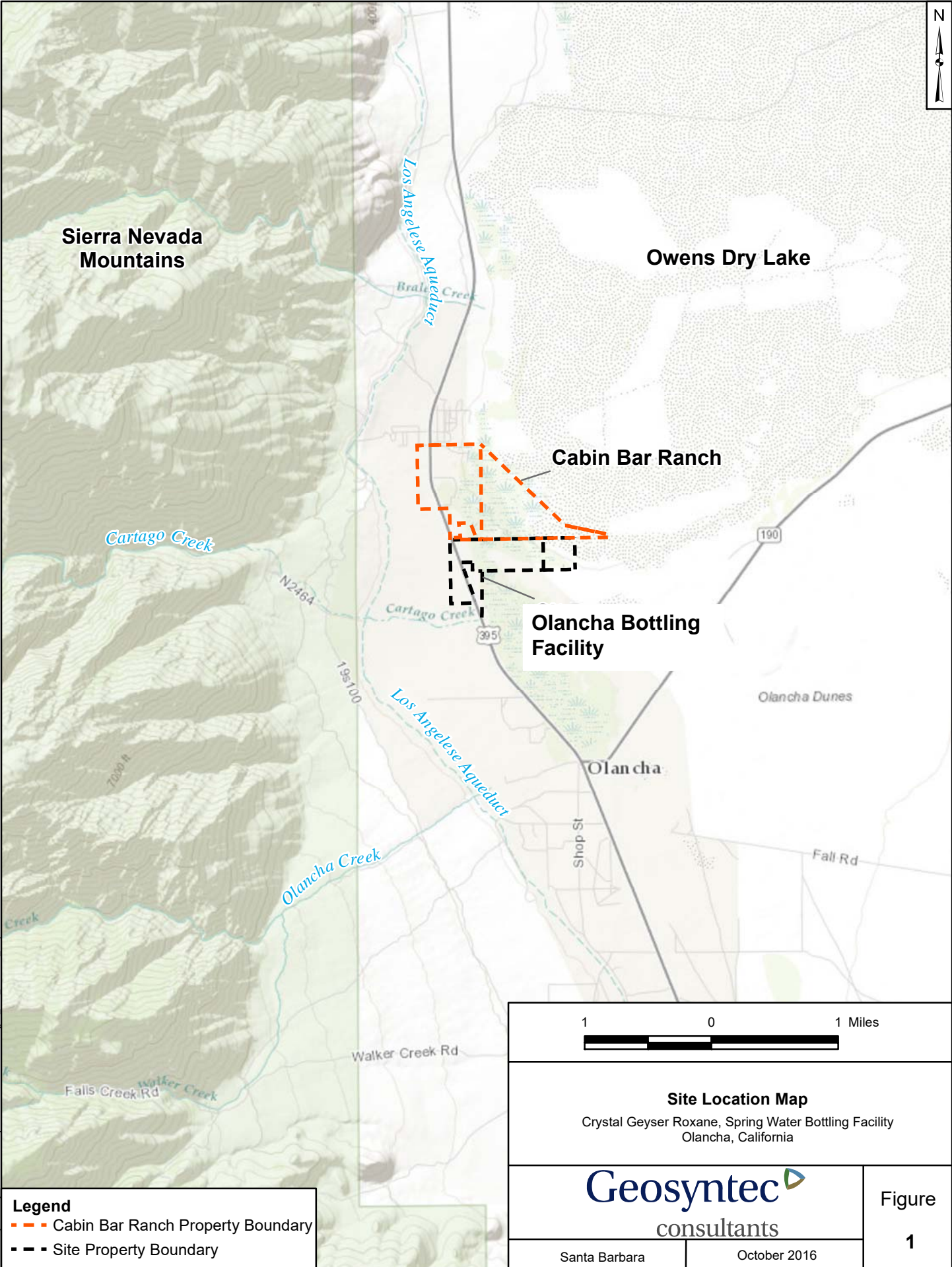
- a. A wetland delineation (or plan to conduct such) for the area proposed for pond construction;
- b. Construction specifications and engineering drawings, including depth to groundwater compared to the bottom elevation of the pond, and proposed pond dimensions including side slopes. Include calculations of the pond's design capacity compared to maximum expected flows;
- c. A best management practices plan to control erosion and sedimentation during construction, and
- d. Description of how excavated soils will be used or disposed of following construction.

I, Patty Z. Kouyoumdjian, Executive Officer, do hereby certify that the foregoing is a full, true, and correct copy of an Order adopted by the California Regional Water Quality Control Board, Lahontan Region, on January 11, 2017.



PATTY Z. KOUYOUMDJIAN
EXECUTIVE OFFICER

Attachments: A. Location Map
 B. Facility Layout
 C. Standard Provisions for Waste Discharge Requirements



P:\GIS\Crystal Geysers\SB0801\Projects\Arctic Evaluation\Fig01_Site_Location_Map.mxd STM 20161019

Legend

- - - Cabin Bar Ranch Property Boundary
- - - Site Property Boundary

1 0 1 Miles



Site Location Map

Crystal Geysers Roxane, Spring Water Bottling Facility
Olancha, California

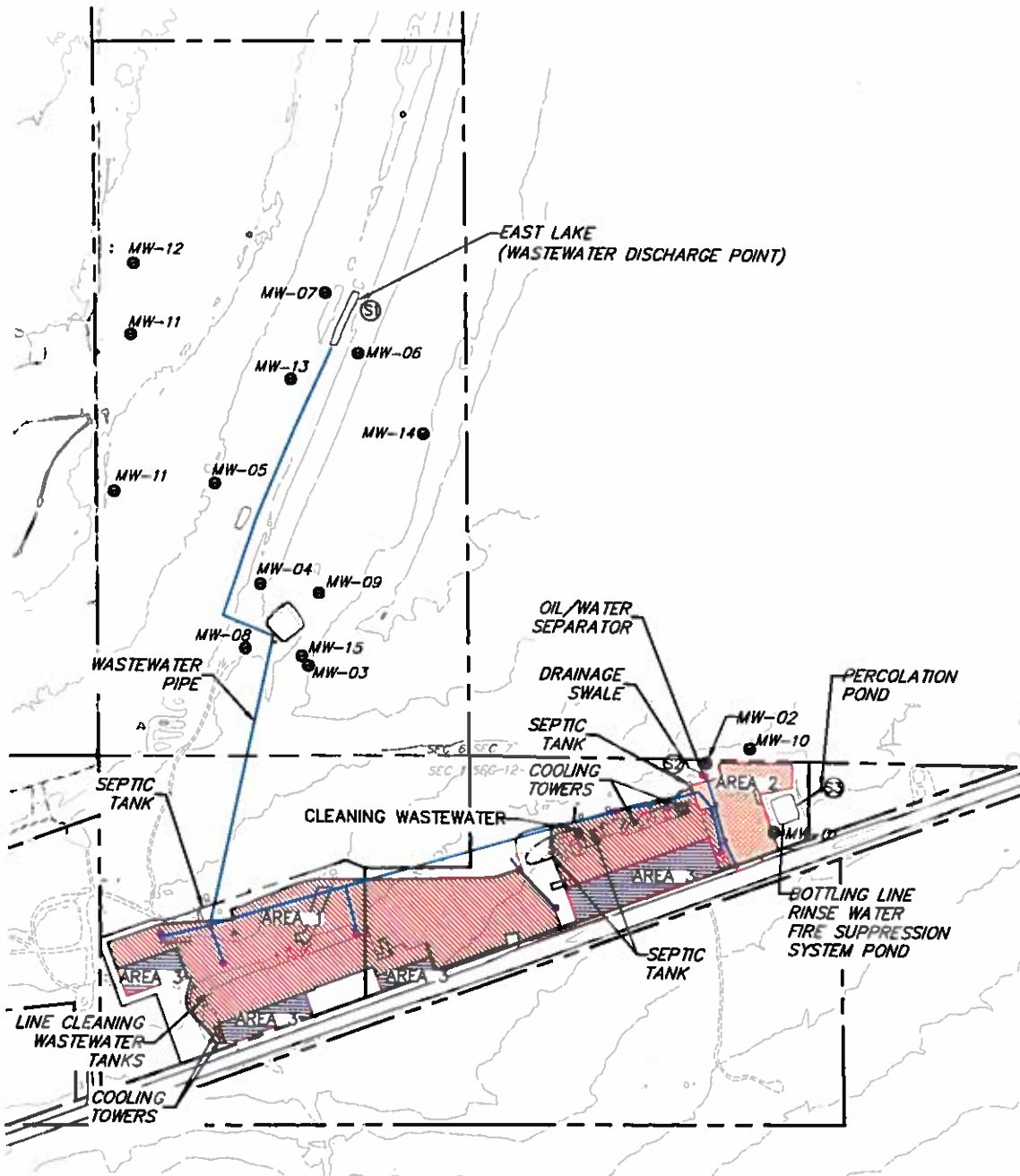
Geosyntec
consultants

Figure

1

Santa Barbara

October 2016



LEGEND

- MONITOR WELL
- ⊙ SAMPLING POINT
- SITE BOUNDARY
- STORM DRAIN INLET
- DRAINAGE PIPE
- ▨ AREA 1 TRIBUTARY TO EAST POND (13.1 AC)
- ▨ AREA 2 TRIBUTARY TO DRAINAGE SWALE (1.8 AC)
- ▨ AREA 3 TRIBUTARY WEST OF THE BUILDINGS (3.9 AC)



GRAPHIC SCALE



(IN FEET)
1 inch = 400 ft.

10/25/2018
MAP
01.0013.4

**CRYSTAL GEYSER BOTTLING PLANT
OLANCHA NORTH AND SOUTH WELL LOCATION MAP**

FIGURE 1



CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD
LAHONTAN REGION

STANDARD PROVISIONS
FOR WASTE DISCHARGE REQUIREMENTS

1. Inspection and Entry

The Discharger shall permit Regional Board staff:

- a. to enter upon premises in which an effluent source is located or in which any required records are kept;
- b. to copy any records relating to the discharge or relating to compliance with the Waste Discharge Requirements (WDRs);
- c. to inspect monitoring equipment or records; and
- d. to sample any discharge.

2. Reporting Requirements

- a. Pursuant to California Water Code 13267(b), the Discharger shall immediately notify the Regional Board by telephone whenever an adverse condition occurred as a result of this discharge; written confirmation shall follow within two weeks. An adverse condition includes, but is not limited to, spills of petroleum products or toxic chemicals, or damage to control facilities that could affect compliance.
- b. Pursuant to California Water Code Section 13260 (c), any proposed material change in the character of the waste, manner or method of treatment or disposal, increase of discharge, or location of discharge, shall be reported to the Regional Board at least 120 days in advance of implementation of any such proposal. This shall include, but not be limited to, all significant soil disturbances.
- c. The Owners/Discharger of property subject to WDRs shall be considered to have a continuing responsibility for ensuring compliance with applicable WDRs in the operations or use of the owned property. Pursuant to California Water Code Section 13260(c), any change in the ownership and/or operation of property subject to the WDRs shall be reported to the Regional Board. Notification of applicable WDRs shall be furnished in writing to the new owners and/or operators and a copy of such notification shall be sent to the Regional Board.
- d. If a Discharger becomes aware that any information submitted to the Regional Board is incorrect, the Discharger shall immediately notify the Regional Board, in writing, and correct that information.

- e. Reports required by the WDRs, and other information requested by the Regional Board, must be signed by a duly authorized representative of the Discharger. Under Section 13268 of the California Water Code, any person failing or refusing to furnish technical or monitoring reports, or falsifying any information provided therein, is guilty of a misdemeanor and may be liable civilly in an amount of up to one thousand dollars (\$1,000) for each day of violation.
- f. If the Discharger becomes aware that their WDRs (or permit) are no longer needed (because the project will not be built or the discharge will cease) the Discharger shall notify the Regional Board in writing and request that their WDRs (or permit) be rescinded.

3. Right to Revise WDRs

The Regional Board reserves the privilege of changing all or any portion of the WDRs upon legal notice to and after opportunity to be heard is given to all concerned parties.

4. Duty to Comply

Failure to comply with the WDRs may constitute a violation of the California Water Code and is grounds for enforcement action or for permit termination, revocation and re-issuance, or modification.

5. Duty to Mitigate

The Discharger shall take all reasonable steps to minimize or prevent any discharge in violation of the WDRs which has a reasonable likelihood of adversely affecting human health or the environment.

6. Proper Operation and Maintenance

The Discharger shall at all times properly operate and maintain all facilities and systems of treatment and control (and related appurtenances) that are installed or used by the Discharger to achieve compliance with the WDRs. Proper operation and maintenance includes adequate laboratory control, where appropriate, and appropriate quality assurance procedures. This provision requires the operation of backup or auxiliary facilities or similar systems that are installed by the Discharger, when necessary to achieve compliance with the conditions of the WDRs.

7. Waste Discharge Requirement Actions

The WDRs may be modified, revoked and reissued, or terminated for cause. The filing of a request by the Discharger for waste discharge requirement modification, revocation and re-issuance, termination, or a notification of planned changes or anticipated noncompliance, does not stay any of the WDRs conditions.

8. Property Rights

The WDRs do not convey any property rights of any sort, or any exclusive privileges, nor does it authorize any injury to private property or any invasion of personal rights, nor any infringement of federal, state or local laws or regulations.

9. Enforcement

The California Water Code provides for civil liability and criminal penalties for violations or threatened violations of the WDRs including imposition of civil liability or referral to the Attorney General.

10. Availability

A copy of the WDRs shall be kept and maintained by the Discharger and be available at all times to operating personnel.

11. Severability

Provisions of the WDRs are severable. If any provision of the requirements is found invalid, the remainder of the requirements shall not be affected.

12. Public Access

General public access shall be effectively excluded from treatment and disposal facilities.

13. Transfers

Providing there is no material change in the operation of the facility, this Order may be transferred to a new owner or operation. The owner/operator must request the transfer in writing and receive written approval from the Regional Board's Executive Officer.

14. Definitions

- a. "Surface waters" as used in this Order, include, but are not limited to, live streams, either perennial or ephemeral, which flow in natural or artificial water courses and natural lakes and artificial impoundments of waters. "Surface waters" does not include artificial water courses or impoundments used exclusively for wastewater disposal.
- b. "Ground waters" as used in this Order, include, but are not limited to, all subsurface waters being above atmospheric pressure and the capillary fringe of these waters.

15. Storm Protection

All facilities used for collection, transport, treatment, storage, or disposal of waste shall be adequately protected against overflow, washout, inundation, structural damage or a significant reduction in efficiency resulting from a storm or flood having a recurrence interval of once in 100 years.

**CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD
LAHONTAN REGION**

**MONITORING AND REPORTING PROGRAM NO. R6V-2017-0005
WDID NO. 6B141511005**

FOR

CRYSTAL GEYSER OLANCHA WATER BOTTLING FACILITY

Inyo County

I. GENERAL REQUIREMENTS

A. Implementation, Overview of Reports Required

This monitoring and reporting program (MRP) is required pursuant to California Water Code section 13267 and is effective on the date it is signed by the Water Board's Executive Officer. Requirements in this MRP may be modified by the Water Board's Executive Officer. Implementation will be according to the following schedule.

1. Groundwater monitoring shall be conducted quarterly (four times yearly) starting in the **first quarter monitoring period of 2017** (see MRP section IV for specific time frames).
2. Quarterly monitoring reports must include all parameters and information required by this MRP. The first quarterly report will be for the **January 1 – March 31, 2017** monitoring period, and is due by **May 15, 2017**. Quarterly reports are required after that date in accordance with the schedule in MRP section IV, below.
3. An annual storm water report must be submitted to the Water Board yearly, and is due on **February 15 of each year**. MRP section IV describes the information which shall be included in the annual storm water reports.
4. Two-year groundwater trend analyses are due every two years. The first two-year trend analyses will cover the period from January 2017 to January 2019, and is due on **February 15, 2019**, except as required in MRP section IV.C.3 for MW-6 and MW-7. MRP section IV.C describes the information which shall be included in two-year trend analyses.

B. Certified Cover Letter

The Discharger must use MRP Attachment 1 as a cover letter and certification, or a cover letter containing the same information, for all reports provided to the Water Board in connection with this MRP.

C. Paperless Submission of Reports and Written Communications

1. The Discharger must submit all written communication and monitoring reports via e-mail to the following address lahontan@waterboards.ca.gov. If the report or material is in excess of 50 MB, please submit that information on a disk (CD or DVD).
2. Reports or materials shall be in a searchable Portable Document Format (PDF) format and must include a hyperlinked Table of Contents or other electronic bookmarking linked to all report sections including figures, tables, and appendices.

D. General Provisions

The Discharger must comply with the "General Provisions for Monitoring and Reporting" dated September 1, 1994, which is made part of this MRP as Attachment 2.

E. Groundwater Data to be Uploaded to Geotracker Database

The groundwater sample data for the monitoring reports must be uploaded directly to the Geotracker database maintained by the Water Board. Contact the Water Board staff for uploading procedures and compliance assistance.

F. Sampling and Analysis Plan

By **February 15, 2017**, the Discharger shall provide to the Water Board a Sampling and Analysis Plan (SAP) pursuant to provision 1d. of the General Provisions for Monitoring and Reporting, Attachment 2 of this MRP. Additionally, a copy of the SAP must be maintained at the Facility and available for inspection. The SAP must include a detailed description of procedures and techniques for:

1. Sample collection, sampling locations, sampling equipment, and decontamination of sampling equipment.
2. Collection of composite effluent samples which are representative of discharges to each authorized disposal site. The composite sampling period and minimum number of aliquots shall be specified. The composite sampling approach should propose either flow proportional or time proportional composites, and shall be justified based on the variation in discharge flow rates and effluent concentrations over a 24-hour time period.

3. Groundwater well purging methods and sample collection methods consistent with either the methods specified in section II.D., below, or consistent with the *Guidance Manual for Groundwater Investigations, revised 2008*, by CalEPA Department of Toxic Substances Control, or consistent with USEPA's Groundwater Sampling Guidelines for Superfund and RCRA Project Managers of 2002, or subsequent revision, or the Discharger may propose a different purging method for acceptance by the Water Board's Executive Officer;
4. Sample preservation and shipment;
5. Analytical methods and procedures to be used;
6. Chain of custody and control of samples;
7. Quality assurance/quality control (QA/QC) for sample collection;
8. Frequency of calibration of any onsite equipment (e.g., pH meter, arsenic analyzer, electrical conductivity meter, flow meter), and
9. Description of how onsite measurements are done.

II. MONITORING REQUIREMENTS

A. Facility Visual Monitoring

The following shall be **inspected weekly**, with results included in each quarterly report.

1. Visually inspect the percolation ponds. Record:
 - a. The presence or absence of evidence of pond overtopping, erosion or other indication that the ponds' capacity is insufficient;
 - b. The water level in each percolation pond to the nearest 0.1 foot,
 - c. The amount of freeboard (freeboard shall be measured vertically from the surface of the pond water to the lowest elevation of the surrounding berm and shall be measured to the nearest 0.1 foot), and
 - d. The presence or absence of foam, scum, or floating materials.
2. Visually inspect all chemical and pre-production plastics storage and handling areas for unauthorized discharges (e.g., leaks or spills).
3. The Discharger shall maintain records of all visual observations, and provide such records upon request. Records shall include the date, approximate time, locations observed, presence and probable source of any observed problems such as spills, leaks, unauthorized discharges, control system failures, etc.,

name of person(s) that conducted the observations, and any response or corrective actions necessary in response to the visual observations.

B. Flow Monitoring

The Discharger shall measure and record the total daily and average monthly flow of wastewater discharged to each authorized disposal site (in gallons). Flow must be measured using continuous flowmeters installed as required by waste discharge requirements section II.V.

C. Effluent Monitoring

1. The Discharger shall monitor the quality of effluent that is discharged to the percolation ponds. The Discharger, in its SAP, shall propose effluent monitoring locations which are representative of discharges from all wastewater processes to percolation ponds.
2. Samples shall be collected according the frequencies specified in the table, below. All monthly sampling events shall be scheduled during each quarter such that a minimum of one monthly sampling event captures an arsenic filter regeneration event. The primary waste stream sampled (routine cleaning/production, or arsenic filter regeneration) shall be reported with each sampling result, and presented in quarterly reports.

| Parameter | Units | Frequency | Sample Type |
|------------------------------------|-------------------------------|----------------------------------|----------------------|
| Arsenic, dissolved and total | parts per billion (ppb) | monthly | composite |
| CAM-17 metals, dissolved and total | ppb | monthly or annually ¹ | composite |
| Total Dissolved Solids | parts per million (ppm) | monthly | composite |
| Flow | gallons per day and per month | daily | continuous flowmeter |
| pH | standard units, average daily | daily | continuous pH meter |
| MBAS (foaming agents) | ppm | monthly | grab |
| Coliform | MPN/100 | semi- | grab |

¹ CAM-17 metals and disinfection byproducts (DBPs) shall be sampled monthly for a period of no less than six (6) months. If CAM-17 metals and DBPs are not detected above an applicable MCL, then the sampling period shall be changed to annually. Any annual detection exceeding an MCL in a sample shall result in the analysis frequency reverting back to monthly until six (6) consecutive events are again below an applicable MCL.

| Parameter | Units | Frequency | Sample Type |
|---|-------------|----------------------------------|-------------|
| organisms, total and fecal | milliliters | annually (once every 6 months) | |
| VOCs/SVOCs | ppb | monthly or annually ² | composite |
| Disinfection Byproducts (DBPs) ¹ | | | |
| Total trihalomethanes | ppm | monthly or annually | composite |
| Formaldehyde | ppm | monthly or annually | composite |
| 5 haloacetic acids ³ | ppm | monthly or annually | composite |
| Bromate | ppm | monthly or annually | composite |
| Chlorite | ppm | monthly or annually | composite |
| Total residual chlorine | ppm | monthly | composite |

D. Arsenic Filter Regeneration Onsite Monitoring

Prior to releasing discharges from the arsenic filter regeneration process to the East Pond, measure, using an onsite analyzer, pH and arsenic concentrations. Measurements shall be made no less than once per 7,000 gallons of regeneration water discharged. Record measurements and gallons of water discharged.

E. Clean-in-Place (CIP) System Flushing Onsite Monitoring

Prior to releasing discharges from the CIP system, measure, using an onsite analyzer, pH levels. Measurements shall be made no less than once per 500 gallons of CIP system water discharged. Record pH measurements and gallons of water discharged.

F. Groundwater Monitoring

Groundwater monitoring shall consist of the following:

² VOCs/SVOCs shall be sampled monthly for a period of no less than six (6) months. If VOCs/SVOCs are not detected in six (6) consecutive sampling events, VOC/SVOC analysis frequency shall be changed to annually (once every twelve months). Any annual detection of VOCs/SVOCs in a sample shall result in the analysis frequency reverting back to monthly until six (6) consecutive events are again non-detect. The Discharger may present evidence if it believes that a low level detection of VOCs/SVOCs is the result of laboratory contamination or sampling error and is not a result of waste discharge.

³ Monochloroacetic acid, Dichloroacetic acid, Trichloroacetic acid, Bromoacetic acid, Dibromoacetic acid.

1. Groundwater Monitoring Locations

- a. The following monitoring well locations shall monitor groundwater quality upgradient and downgradient of each percolation pond.

| Discharge Site, Location | Monitoring Wells |
|--|-------------------------|
| East Pond, downgradient | MW-7 |
| East Pond, upgradient | MW-14/MW-6 |
| East Pond, downgradient (groundwater levels only) | MW-12 |
| East Pond, downgradient (groundwater levels only) | MW-13 |
| Fire Pond South Overflow, downgradient | MW-10 |
| Fire Pond South Overflow, upgradient | MW-1 |

- b. These well locations shall be monitored quarterly according to the schedule in section IV.
- c. If new monitoring wells are installed to evaluate effects of discharges authorized by this Order, they will be added to this monitoring program and sampled on a quarterly basis unless otherwise specified by the Water Board's Executive Officer.

2. Groundwater Elevation and Depth to Water

Determine the groundwater elevation with respect to mean sea level and the depth to water in feet below ground surface for each monitoring well prior to purging for sampling.

3. Groundwater Direction and Gradient

Using groundwater elevation data, determine the groundwater flow direction and gradient and present it on a scaled map in each quarterly monitoring report.

4. Purging

- a. Groundwater samples must be collected after either of the following: 1) an amount of water equal to three times the amount of water within the well casing has been removed, or 2) the temperature, electrical conductivity, and pH measurements of the water in the well have stabilized to approximately ± 10 percent for successive measurements after a minimum

of one well volume has been removed. For each purging method, the groundwater elevation must recover before the sample is collected. Other purging methods may be used if it is described in the site SAP and accepted by the Water Board's Executive Officer.

- b. If a monitoring well is purged, and does not appear to be recovering to pre-purging elevations, the Discharger must document the amount of time allowed for the well to recover, the volume of water removed, and the groundwater elevation at the time of the sample collection. If the monitoring well does not recover within one hour after purging, the Discharger must document the volume of water removed and may return the next day and attempt to collect the sample from the well without further purging. Measurements of temperature, electrical conductivity, and pH during purging must be reported with the results of groundwater analyses.
- c. Well casing diameter, well depth, presence of and depth to groundwater, and total volume purged prior to sampling must also be reported with the groundwater monitoring results.

5. Groundwater Sampling

Groundwater monitoring wells MW-1, MW-6, MW-7, MW-10 and MW-14 must be sampled quarterly (except as footnoted for VOCs/SVOCs and CAM-17 metals) for the parameters listed below.

| Parameter | Units | Method |
|---|--|-------------------|
| Temperature | degrees C or F | Field measurement |
| Electrical conductivity or Specific conductance | $\mu\text{S/cm}$ or $\mu\text{mho/cm}^2$ | Field measurement |
| Dissolved oxygen | ppm | Field measurement |
| pH | standard units | Field measurement |
| TDS | ppm | Laboratory |
| Alkalinity | ppm | Laboratory |
| Arsenic, dissolved and total | ppb | Laboratory |
| CAM-17 metals, dissolved and total ⁴ | ppb | Laboratory |

⁴ CAM-17 metals in groundwater shall be sampled for four (4) consecutive quarters. If CAM-17 metals are not detected in effluent sampling for six (6) months, then the groundwater sampling frequency for CAM-17 metals shall be reduced to annually following four (4) consecutive quarterly monitoring events. This reduction shall not be applied to arsenic monitoring.

| Parameter | Units | Method |
|-------------------------|-------|------------|
| VOCs/SVOCs ⁵ | ppb | Laboratory |

III. STORM WATER POLLUTION CONTROL MONITORING AND RESPONSE PROGRAM

A. Storm Water Monitoring

1. Monitoring Points

The storm water discharge monitoring locations shall be selected such that samples collected are representative of storm water discharge leaving each drainage area identified for the Facility. The storm water discharge monitoring locations must be identified on the site plan in the SWPPP.

2. Storm Water Sampling

The Discharger shall collect storm water samples from each storm water discharge monitoring location and analyze for the following monitoring parameters:

| Parameter | Units | Sampling Frequency | Reporting Frequency |
|-----------------------|--------------------------------------|--|---------------------|
| pH | pH Units | Four qualifying storm events per year ⁶ | Annually |
| Turbidity | nephelometric turbidity units (NTUs) | | |
| Oil and Grease, Total | ppm | | |
| Iron, Total | ppm | | |

⁵ VOCs/SVOCs analysis shall be conducted only if effluent sampling indicates a detection of such constituents. VOCs/SVOCs analysis should be conducted only on samples collected from the closest downgradient monitoring well associated with the effluent discharge location from which the detection originated (e.g., if East Pond effluent discharge sample contained detectable VOCs/SVOCs, then MW-7 would be sampled and analyzed for VOCs/SVOCs).

⁶ A qualifying storm event is a precipitation event that produces a storm water discharge for at least one drainage area and is preceded by 48 hours with no discharge from any drainage area. The Discharger shall collect and analyze storm water samples from two qualifying storm events within the first half of each monitoring period (Jan 1 to June 30) and from two qualifying storm events within the second half of each reporting year (July 1 through December 31). If a sufficient number of qualifying storm events does not occur within a given monitoring period, the Discharger must document and report that information in semi-annual reports.

3. Visual Observations

- a. Monthly, the Discharger shall visually observe and document, during dry weather conditions and normal operating hours, each drainage area for the following: the presence or indications of prior, current, or potential non-storm water discharges and its sources; authorized non-storm water discharges, its sources, and associated BMPs; and all potential pollutant sources.
- b. Visual observations shall also be conducted at the same time that storm water sampling occurs. At the time a storm water sample is collected, the Discharger shall observe and document the discharge for the following:
 - i. Visually observe and record the presence or absence of floating and suspended materials, oil and grease, discolorations, turbidity, odors, trash/debris including pre-production plastics, and source(s) of any discharged pollutants.
 - ii. In the event that a discharge location is not visually observed during the sampling event, the Discharger shall record which discharge locations were not observed during sampling or that there was no discharge from the discharge location.

4. Water Quality Thresholds

The specific water quality thresholds that apply to the storm water monitoring parameters are listed in the table, below. These numeric benchmarks are "not to exceed" values.

Storm Water Monitoring Benchmarks

| Parameter | Benchmark Value |
|-----------------------|------------------------------|
| pH | Between 6.5 and 8.5 pH units |
| Turbidity | 500 NTUs |
| Oil and Grease, Total | 15 mg/L |
| Iron, Total | 1.0 mg/L |

B. Data Evaluation and Response Actions

1. The storm water monitoring data (storm water sampling and analytical data and visual observations) must be evaluated to determine the following: the effectiveness of best management practices (BMPs) in reducing or preventing pollutants in the storm water discharges; compliance with the monitoring parameter water quality thresholds; and the need to implement additional BMPs and/or SWPPP revisions.

2. The results of all storm water sampling and analytical results from each distinct sample must be directly compared to the water quality threshold for the corresponding monitoring parameter. An exceedance of one or more water quality threshold requires the Discharger to implement the following response actions:
 - i. The Discharger shall notify the Water Board, verbally or via email, within 30 days of obtaining laboratory results whenever a determination is made that a water quality threshold is exceeded for one or more storm water monitoring parameters;
 - ii. Identify the pollutant sources that may be related to the exceedance and whether the BMPs in the SWPPP have been properly implemented and perform BMP maintenance, if necessary;
 - iii. Assess the SWPPP and its implementation to determine whether additional BMPs or SWPPP measures are necessary to reduce or prevent pollutants in storm water discharges and implement such changes as soon as practicable; and
 - iv. Revise or amend the SWPPP, as appropriate, to incorporate the additional BMPs or SWPPP measures necessary to reduce or prevent pollutants in storm water discharges no later than 60 days of obtaining laboratory results of the reported exceedance; or
 - v. Demonstrate, to the satisfaction of the Executive Officer, that the exceedance(s) is attributed solely to non-industrial pollutant sources and/or to natural background sources.

IV. REPORTING REQUIREMENTS

1. The Discharger shall submit the following reports according to the schedule in the table below.
2. All reports shall include a signature that complies with the General Provisions for Monitoring and Reporting verifying statements in the report, laboratory and other sampling results, and work conducted at the site.

| Reporting Period, Report Type | Monitoring Period | Due Date |
|-------------------------------------|-------------------------|-----------------------|
| 1 st quarter, monitoring | Jan 1 – March 31 | May 15, annually |
| 2 nd quarter, monitoring | April 1 – June 30 | August 15, annually |
| 3 rd quarter, monitoring | July 1 – September 30 | November 15, annually |
| 4 th quarter, monitoring | October 1 – December 31 | February 15, annually |

| | | |
|---|---|------------------------------|
| Annual, SWPPP | Jan 1 – December 31 | February 15, annually |
| 2-year, groundwater trend analysis (see MRP section IV.C) | January 2017 – January 2019, and every 2 years thereafter | February 15, every two years |

A. Quarterly Reporting Requirements

Quarterly reports must include information specified below.

1. A letter transmitting the essential points of each report, including a discussion of any violations found since the last report was submitted and describing actions taken or planned for correcting those violations. Discuss any deviations from the Facility's approved SAP.
 - a. If the Discharger has previously submitted a detailed time schedule for correcting violations, a reference to the correspondence transmitting this schedule will suffice.
 - b. If no violations have occurred since the last submittal, this must be stated in the letter of transmittal.
2. Map(s) showing the Facility location and boundaries, location of the Spring Line Fault, all monitoring locations, storm water drainage areas and capture locations, percolation pond locations, sewage holding tanks, cooling tower locations, and wastewater discharge points.
3. A map showing the static groundwater surface elevation (feet above mean sea level) in each groundwater monitoring well, the groundwater gradient (feet/feet) and the direction of the groundwater gradient beneath and around the Facility, the velocity of groundwater flow (feet/year), and the current groundwater isocontours for that monitoring period. Groundwater isocontours should be drawn using all available data representing the monitoring period.
4. Maps shall have a font size of no less than 9 points and include a scale and legend. All maps shall be in color, with legible color-coded symbols to easily discern the information provided. Map contents shall be consistent between each map, including color, symbols, and where possible, base map information.
5. Tabular presentation of all effluent and groundwater monitoring data obtained for the monitoring period, including all previous (past two years) and current reporting period data. Tabulated results of laboratory analyses for each sampling point and constituent for the monitoring period shall be compared with the effluent, receiving water limit, MCL or SMCL for each monitoring parameter and each sample that exceeds its respective limit at any given

- monitoring point shall be indicated in the table (e.g., bold font or shaded cells).
6. Effluent monitoring results shall be notated to indicate the primary waste stream sampled (i.e., routine cleaning/sanitation and production; or arsenic filter flushing and regeneration).
 7. Tabular presentation of on-site measurements of pH and arsenic taken during arsenic regeneration events. Report the gallons of water discharged to the East Pond during regeneration events.
 8. Tabular presentation of on-site measurements of pH taken during CIP system flushing events. Report the gallons of water discharged during flushing events.
 9. Tabular presentation of flow monitoring of wastewater discharged to the percolation ponds, in gallons per day and average gallons per month.
 10. Tabular presentation of water levels and freeboard in percolation ponds. Discuss the performance of the percolation ponds in infiltrating all wastewater discharged.
 11. Discuss any modification, replacement, additions, or any major maintenance conducted on the wastewater flow measuring equipment, sewage holding tanks, percolation ponds, or wastewater control or treatment facilities during the reporting period. Provide a brief chronological summary of dates of any operational problems and maintenance activities that may impact water quality at the Facility.
 12. Provide descriptions of any operational problem(s) and corrective action(s) taken to address the problem(s).
 13. Include appendices for boring logs and well designs for any wells installed during the quarter.
 14. Include appendices of laboratory analysis reports and field notes.
 15. Report the date and quantity of sewage removed from holding tanks. The name of the company removing the material must also be reported, in addition to the name and location of the facility receiving the material.
 16. Report the date and quantity of wastewater removed during arsenic filter flushing and regeneration events. The name of the company removing the material must also be reported, in addition to the name and location of the facility receiving the material. Waste acceptance manifests shall be included in an appendix.

17. The Discharger is required to review the effluent data collected and self-report any violation of an effluent limit in WDRs section I.A.

18. The Discharger is required to review the groundwater data collected and self-report any violation of a receiving water limitation in WDRs section I.B.

B. Annual Storm Water Pollution Prevention Plan Reporting

Annual SWPPP monitoring shall be included as a separate section in each fourth quarter report (**due February 15 of each year**). SWPPP reporting must include, but not be limited to, the following information:

1. All data collected during the reporting period in accordance with the storm water monitoring plan.
2. Tabulated results of sampling and laboratory analyses for each storm water discharge monitoring location, including historic and current reporting period data, as well as the water quality threshold for each monitoring parameter and an identification of each sample that exceeds its respective water quality threshold at any given discharge monitoring location. Provide dates and rainfall amount (in inches per hour) for each qualifying storm event which triggers storm water sampling.
3. A copy of the current site map from the SWPPP.
4. Copies of all field monitoring, storm water sampling, and visual observation data sheets. An explanation shall be provided for uncompleted sampling event visual observations.
5. Calibration methods and any discrepancies of any meters used for field parameter evaluations after calibration is performed.
6. A summary of the actions taken in response to a water quality threshold exceedance, including monitoring parameter and pollutant source(s) involved, additional BMP and/or SWPPP measures taken, and associated dates and timelines for implementing the response action; or a demonstration that the exceedance(s) is attributed to a non-industrial pollutant source and/or to a natural background source.
7. A copy of any SWPPP amendments and/or revisions for the reporting period.
8. A summary of significant spills and/or leaks, including of pre-production plastic materials, that occurred at the Facility during the reporting period and the response taken by the Discharger, including dates.
9. Volume of oil and sludge removed from oil/water separators, and manner and method of disposal. Include waste removal manifests in an appendix.

10. A summary of employee trainings performed during the reporting period, including dates and content.

C. Two-Year Data Analysis Review

1. By **October 1, 2017**, the Discharger must produce for acceptance by the Water Board's Executive Officer a procedure to analyze and review the groundwater data on a two-year basis. The review and analysis may be accomplished by comparing up gradient and down gradient monitoring well data, intrawell statistical analysis, interwell statistical analysis, or other method. The analysis procedure must provide a method to determine if the groundwater data indicates a degrading trend in the groundwater quality.
2. The Discharger must review all the groundwater data collected during the previous two years and conduct an analysis on the data as proposed and accepted above, and identify any trends regarding constituent concentrations that may be associated with the Facility's discharge. The analysis shall be included as a separate section in first quarter monitoring reports submitted at 2-year intervals (i.e., first quarter 2019, 2021, 2023, etc.), except as required below for monitoring wells MW-6 and MW-7.
3. Two years of data will be available for MW-6 and MW-7 in mid-2017 (sampling of these wells began in July 2015). The Discharger shall analyze groundwater data for TDS, arsenic, and sulfate collected for MW-6 and MW-7 and conduct an analysis on the data as proposed and accepted, above, and identify any trends regarding constituent concentrations that may be associated with the Facility's discharge. The analysis shall be included as a separate section in the last quarter 2017 monitoring report, due on **February 15, 2018**.
4. The Discharger must determine and certify that the groundwater monitoring data has not shown an increase for the monitored constituents. If the certification cannot be provided because an increase is detected, the Discharger is required to notify the Water Board within 5 days of identifying such conditions.

Patty Z. Kouyoumdjian

Ordered By: _____
PATTY Z. KOUYOUMDJIAN
EXECUTIVE OFFICER

Date January 11, 2017

Attachment 1 Monitoring Report Cover Sheet
Attachment 2 General Provisions for Monitoring and Reporting Program

b) Section(s) of WDRs/NPDES

Permit Violated:

c) Reported Value(s) or Volume:

d) WDRs/NPDES

Limit/Condition:

e) Date(s) and Duration of Violation(s):

f) Explanation of Cause(s):

g) Corrective Action(s)

(Specify actions taken and a schedule for actions to be taken)

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision following a system designed to ensure that qualified personnel properly gather and evaluate the information submitted. Based on my knowledge of the person(s) who manage the system, or those directly responsible for data gathering, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.

If you have any questions or require additional information, please contact _____ at the number provided above.

Signature: _____

Name: _____

Title: _____

ATTACHMENT 2

CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD LAHONTAN REGION

GENERAL PROVISIONS FOR MONITORING AND REPORTING

1. **SAMPLING AND ANALYSIS**

- a. All analyses shall be performed in accordance with the current edition(s) of the following documents:
 - i. Standard Methods for the Examination of Water and Wastewater
 - ii. Methods for Chemical Analysis of Water and Wastes, EPA
- b. All analyses shall be performed in a laboratory certified to perform such analyses by the California State Department of Health Services or a laboratory approved by the Regional Board Executive Officer. Specific methods of analysis must be identified on each laboratory report.
- c. Any modifications to the above methods to eliminate known interferences shall be reported with the sample results. The methods used shall also be reported. If methods other than EPA-approved methods or Standard Methods are used, the exact methodology must be submitted for review and must be approved by the Regional Board prior to use.
- d. The Discharger shall establish chain-of-custody procedures to insure that specific individuals are responsible for sample integrity from commencement of sample collection through delivery to an approved laboratory. Sample collection, storage, and analysis shall be conducted in accordance with an approved Sampling and Analysis Plan (SAP). The most recent version of the approved SAP shall be kept at the facility.
- e. The Discharger shall calibrate and perform maintenance procedures on all monitoring instruments and equipment to ensure accuracy of measurements, or shall insure that both activities will be conducted. The calibration of any wastewater flow measuring device shall be recorded and maintained in the permanent log book described in 2.b, below.
- f. A grab sample is defined as an individual sample collected in fewer than 15 minutes.
- g. A composite sample is defined as a combination of no fewer than eight individual samples obtained over the specified sampling period at equal intervals. The volume of each individual sample shall be proportional to the discharge flow rate at the time of sampling. The sampling period shall equal

the discharge period, or 24 hours, whichever period is shorter.

2. OPERATIONAL REQUIREMENTS

a. Sample Results

Pursuant to California Water Code Section 13267(b), the Discharger shall maintain all sampling and analytical results including: strip charts; date, exact place, and time of sampling; date analyses were performed; sample collector's name; analyst's name; analytical techniques used; and results of all analyses. Such records shall be retained for a minimum of three years. This period of retention shall be extended during the course of any unresolved litigation regarding this discharge, or when requested by the Regional Board.

b. Operational Log

Pursuant to California Water Code Section 13267(b), an operation and maintenance log shall be maintained at the facility. All monitoring and reporting data shall be recorded in a permanent log book.

3. REPORTING

- a. For every item where the requirements are not met, the Discharger shall submit a statement of the actions undertaken or proposed which will bring the discharge into full compliance with requirements at the earliest time, and shall submit a timetable for correction.
- b. Pursuant to California Water Code Section 13267(b), all sampling and analytical results shall be made available to the Regional Board upon request. Results shall be retained for a minimum of three years. This period of retention shall be extended during the course of any unresolved litigation regarding this discharge, or when requested by the Regional Board.
- c. The Discharger shall provide a brief summary of any operational problems and maintenance activities to the Board with each monitoring report. Any modifications or additions to, or any major maintenance conducted on, or any major problems occurring to the wastewater conveyance system, treatment facilities, or disposal facilities shall be included in this summary.
- d. Monitoring reports shall be signed by:
 - i. In the case of a corporation, by a principal executive officer at least of the level of vice-president or his duly authorized representative, if such representative is responsible for the overall operation of the facility from which the discharge originates;
 - ii. In the case of a partnership, by a general partner;

- iii. In the case of a sole proprietorship, by the proprietor; or
 - iv. In the case of a municipal, state or other public facility, by either a principal executive officer, ranking elected official, or other duly authorized employee.
- e. Monitoring reports are to include the following:
- i. Name and telephone number of individual who can answer questions about the report.
 - ii. The Monitoring and Reporting Program Number.
 - iii. WDID Number.
- f. Modifications

This Monitoring and Reporting Program may be modified at the discretion of the Regional Board Executive Officer.

4. NONCOMPLIANCE

Under Section 13268 of the Water Code, any person failing or refusing to furnish technical or monitoring reports, or falsifying any information provided therein, is guilty of a misdemeanor and may be liable civilly in an amount of up to one thousand dollars (\$1,000) for each day of violation under Section 13268 of the Water Code.