



MATTHEW RODRIQUEZ

Los Angeles Regional Water Quality Control Board

October 15, 2015

Mr. Robert McAllister Penrose, LLC 10940 Portal Drive Los Alamitos, CA 90720

## WASTE DISCHARGE REQUIREMENTS FOR POSTCLOSURE MAINTENANCE, PENROSE LANDFILL, 8301 TUJUNGA AVENUE, LOS ANGELES, CALIFORNIA (FILE NO. 58-192, CI-2181, WDID NO. 4B190320004, GEOTRACKER GLOBAL ID. L1 0009967534)

Dear Mr. Mr. McAllister:

Reference is made to our letter to you, dated September 25, 2015, transmitting tentative Waste Discharge Requirements (WDRs) for the Penrose Landfill. Pursuant to Division 7 of the California Water Code, this Regional Water Quality Control Board (Regional Board) at a public hearing held on October 8, 2015, reviewed the tentative requirements, considered all factors in the case, and adopted Order No. R4-2015-0203 (copy attached) that includes revised WDRs for the subject site. The revised WDRs package will be posted on the Regional Board's website at http://www.waterboards.ca.gov/losangeles/board\_decisions/adopted\_orders/. Hard copies of the Order may be obtained by contacting the Regional Board staff listed below.

If you have any questions regarding this matter, please contact Dr. Enrique Casas, Project Manager, at (213) 620-2299.

Sincerely, Wen Yang

Senior Engineering Geologist Land Disposal Unit

Ms. Leslie Graves, State Water Resources Control Board CC: Ms. Shannon Hill, CalRecycle Mr. David Thompson, Los Angeles Department of Building and Safety, LEA Program

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## STATE OF CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD LOS ANGELES REGION

#### ORDER NO. R4-2015-0203

## POSTCLOSURE MAINTENANCE WASTE DISCHARGE REQUIREMENTS FOR PENROSE, LLC (PENROSE LANDFILL)

#### (File Nos. 58-192 and 60-058)

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

#### BACKGROUND

- Penrose, LLC (Discharger) owns the 72-acre Penrose Landfill (Landfill), a closed Class III municipal disposal facility located at 8301 Tujunga Avenue, Los Angeles, California (Figure 1).
- 2. The Discharger is the successor owner who purchased the Landfill from Consolidated Rock Products Company on March 5, 1974.
- 3. The Landfill is located across Tujunga Boulevard from the closed Newberry and Strathern landfills (Figure 1). The three landfills are closely associated because they were all owned, and/or operated, by the Discharger at one time and groundwater monitoring has historically been conducted through a well network that serves the three landfills.
- 4. Municipal waste disposal was conducted from 1960 to 1985 under two Regional Board resolutions. Resolution No. 58-92, adopted on December 18, 1958, was for an approximately 24-acre area commonly known as Site No. 7. Resolution No. 58-93, also adopted on December 18, 1958, was for an approximately 50-acre area commonly known as Site No. 8. Both Site No. 7 and Site No. 8 are former sand and gravel quarries.
- 5. The Landfill was operated under a City of Los Angeles conditional use permit (CUP) issued on June 8, 1960 for Site No. 8, and zone variance ZV82-186 to expand operations onto adjacent Site No. 7, issued in 1979.
- 6. Areas within the Site No. 7 and Site No. 8 quarries that were a minimum of ten feet above the highest anticipated groundwater elevation (elevation 655 feet mean sea level) were permitted to receive municipal wastes. Below this elevation, only inert wastes were allowed to be accepted.
- 7. The Landfill reached its permitted maximum elevation in early 1985, and ceased accepting municipal solid wastes on March 25, 1985.
- 8. During its active life, approximately 16 million tons of municipal wastes were disposed of at the Landfill.

- 9. On August 8, 1986, the Discharger submitted the report titled *Closure Plan, Penrose Sanitary Landfill* (Closure Plan). The Closure Plan indicated that it would take five years to receive sufficient inert material Landfill to grade the site to the final contours approved in the Landfill CUP. As a result, the City of Los Angeles Department of Building and Safety (local enforcement agency [LEA] to the California Integrated Waste Management Board (CIWMB)<sup>1</sup> required the Discharger to remain under an active solid waste facility permit (SWFP) until such time that the Landfill was properly closed in compliance with the Closure Plan. The SWFP remained in effect until December 31, 1987.
- 10. On June 6, 1991, in response to comments from Regional Board staff and the LEA on the proposed development of a golf course end use, the Discharger submitted a Revised Closure Plan.
- 11. Pursuant to section 17760 of title 14 of the California Code of Regulation (14 CCR), now contained in section 21100 of title 27 of the California Code of Regulation (27 CCR), solid waste disposal sites that did not complete closure by November 18, 1990, are subject to applicable performance standards and the minimum substantive requirements in 27 CCR for proper closure, postclosure maintenance and ultimate reuse of disposal sites. The Landfill did not complete closure by November 18, 1990, therefore is subject to these regulations.
- 12. On January 25, 1993, the Regional Board adopted Order No. 93-009, which terminated Resolution No. 58-93 and amended Resolution No. 58-92 to permit the two separated areas of the Landfill to be closed and undergo postclosure maintenance as a single site. However, neither Resolution No. 58-92 or Order No. 93-009 include requirements for the closure and postclosure maintenance of the Landfill.
- 13. In March 1994, the Discharger submitted a Final Closure Plan that included a golf driving range end use for the Landfill. On August 15, 1994, the LEA approved the Final Closure Plan, with concurrence from Regional Board staff.
- 14. Final cover construction activities at the Landfill were completed in 1995. The final cover system constructed at the Landfill consisted of a multi-layer design that included a Foundation Layer, a Barrier Layer, and the soil component of a Vegetation Layer. The Barrier Layer consisted of geosynthetic clay liner (GCL) that substituted as an engineered alternative to a one-foot thick compacted clay liner.
- 15. On October 1, 1997, the CIWMB approved a public recreation facility land use plan for the Landfill.
- 16. The closed Landfill is zoned industrial (M1, M2 and parking uses). A golf course driving range (the John Wells Golf Center) currently resides on the Landfill. The Discharger also leases portions of the Landfill for commercial operations. Currently, these include a commercial dirt-hauling/landscaping operation and a trucking storage yard.
- 17. Ancillary structures at the Landfill include a maintenance yard, landfill gas recovery system, a flare station, and abandoned gas-to-energy facility.
- 18. On November 26, 2013, the Regional Board Executive Officer issued a directive, pursuant to

<sup>&</sup>lt;sup>1</sup> Now the California Department of Resources Recycling and Recovery or CalRecycle.

California Water Code (CWC) section 13260 requiring the Discharger to submit a Report of Waste Discharge (ROWD) for the revision of existing waste discharge requirements (WDRs) to include postclosure maintenance requirements for the Landfill. In a March 26, 2014 response to the ROWD directive, the Discharger asserted that regulatory closure of the Landfill is warranted and the Discharge is therefore not subject to the ROWD directive.

- 19. On May 29, 2014, the Regional Board issued a Notice of Violation (NOV) to the Discharge for failure to submit an ROWD. In a letter dated June 20, 2014, the Discharger asserted that the NOV was without merit. To date, the Discharger has not complied with the ROWD directive.
- 20. In June 2010, Regional Board staff undertook a review of the Threat to Water Quality (TTWQ) and Complexity (CPLX) designations for all waste management facilities permitted within the Land Disposal Program. The purpose of the review was to establish better uniformity in the TTWQ and CPLX designations for landfills in the Los Angeles Region. As a result, the TTWQ designation for the Landfill was elevated from 3 to 2<sup>2</sup>, The Discharger asserted that the revised TTWQ designation was unwarranted and has not fully paid annual permit fees since 2011. To date, five NOVs<sup>3</sup> have been issued to the Discharger for failure to pay annual fees in full.

#### REGULATORY REQUIREMENTS

- 21. CWC section 13263 (e) provides that all WDRs shall be reviewed periodically and, upon such review, may be revised by the Regional Board to comply with changing state or federal laws, regulations, policies, or guidelines. This Order revises the WDRs for the Landfill to include requirements for the postclosure maintenance for the Landfill.
- 22. Definitions of terms used in this Order shall be as set forth in 27 CCR section 20164, 14 CCR section 17381, CWC section 13050, and other applicable state regulations.
- 23. CWC section 13267(b) authorizes the Regional Board to require the submittal of technical and monitoring reports. Monitoring and Reporting Program CI-**2181** (MRP), is hereby incorporated by reference into this Order. The MRP is necessary to assure compliance with this Order.
- 24. The State Water Resources Control Board (State Board) and Regional Boards are the state agencies designated to protect water quality that may be impacted by solid waste disposal activities, while the California Department of Resources Recycling and Recovery (CalRecycle) regulates all other aspects of solid waste disposal in the state. 27 CCR, Division 2, promulgated on July 18, 1997, clarifies the roles and responsibilities of the State Board/Regional Boards and CalRecycle in regulating municipal disposal sites.
- 25. On June 13, 1994, this Regional Board adopted a revised *Water Quality Control Plan for the Coastal Watersheds of Los Angeles and Ventura Counties* (Basin Plan). The Basin Plan (including its subsequent amendments) designates the following beneficial uses for

<sup>&</sup>lt;sup>2</sup> Category "2" – Those discharges of waste that could impair the designated beneficial uses of the receiving water, cause short-term violations of water quality objectives, cause secondary drinking water standards to be violated, or cause a nuisance.

Category "3" – Those discharges of waste that could degrade water quality without violating water quality objectives, or could cause a minor impairment of designated beneficial uses as compared with Category 1 and Category 2.

<sup>&</sup>lt;sup>3</sup> January 5, 2011, February 21, 2012, December 7, 2012, December 11, 2013, and March 18, 2015.

groundwater within the San Fernando Valley Basin, where the Landfill is located: municipal and domestic supply, agricultural supply, industrial service supply, and industrial process supply. The requirements in this Order, as they are met, are in conformance with the goals of the Basin Plan.

#### ENVIRONMENTAL SETTING

- 26. The Landfill is located within the San Fernando Groundwater Basin, which is comprised of highly permeable alluvial materials, primarily sands and gravels.
- 27. The Landfill is located on the debris fan of the Big Tujunga Wash. The Tujunga Wash is an intermittent stream which flows southerly across the debris cone and is one of the principal recharge sources to the San Fernando Groundwater Basin. The Hansen Spreading Grounds are located approximately 2.5 miles to the north-northwest of the Landfill. The Tujunga Spreading Grounds are located approximately 1.75 miles to the west of the Landfill. Both the Hansen and Tujunga Spreading Grounds are used for flood control and groundwater recharge.
- 28. The geologic units found beneath the site area, from youngest to oldest, are: 1) Holocene alluvium, 2) upper Pleistocene (older) alluvium, 3) Plio-Pleistocene Saugus Formation, 4) Miocene sedimentary formations, and 5) pre-Cretaceous crystalline rocks. Most of the groundwater in the vicinity of the Landfill is within the Pleistocene alluvium. The Holocene alluvium, more than 100 feet above the perennial groundwater table, transmits water to the Pleistocene alluvium during recharge events. The Miocene and pre-Cretaceous rocks beneath the alluvium do not contain economically exploitable volumes of groundwater.
- 29. There are no active<sup>4</sup> faults underlying the Landfill. The Tujunga segment of the San Fernando Fault is three miles north of the Landfill. The Verdugo Fault is located 1,500 feet north of the Landfill. Both the San Fernando and Verdugo faults are active fault as indicated on the California Geological Survey, Geologic Data Map No. 6.
- 30. The Landfill is within a 100-year floodplain as indicated in the Federal Emergency Management Agency Flood Insurance Rate Map for the Sun Valley area (Figure 2).
  - 31. Residential neighborhoods are located on part of the western, and all of the southern boundary of the Landfill. Heavy industrial uses, which include two concrete manufactures and one asphalt plant, are located along the northern and eastern boundaries of Penrose Landfill.
- 32. The Newberry Landfill occupies a former sand and gravel quarry and was operated from approximately 1948 until its closure in May 1955. The property is currently owned by the Discharger.
- 33. The Strathern Landfill to the east of the Landfill was operated by the Discharger as an inert waste landfill between September 21, 1992 and February 9, 2009. The Strathern Landfill occupies a former sand and gravel quarry and was operated under WDRs Order No. 91-086 until the property was condemned through eminent domain by the County of Los Angeles Department of Public Works as the site for the proposed Rory M. Shaw Wetlands project. The proposed project involves the construction of a multiuse wetlands park that includes a

<sup>&</sup>lt;sup>4</sup> Defined as Holocene epoch faults that have ruptured in the last approximately 11,000 years.

stormwater conveyance system, detention ponds, and wildlife habitat enhancement.

## ENVIRONMENTAL MONITORING SYSTEMS

- 34. In a letter dated August 10, 1984, Regional Board staff directed the Discharger to submit a work plan for the construction of groundwater monitoring wells at the Penrose, Newberry and Tuxford landfills. Groundwater monitoring wells at the vicinity of the Landfill, as shown in Figure 3, has been in place since June 1985. Wells 4918, 4918B, and 4917 are designated for the Landfill.
- 35. Section 13273 of CWC requires the operator of each solid waste disposal site on a ranked list to conduct and submit to the appropriate Regional Board the results of a solid waste assessment test (SWAT) report to determine if the site is leaking hazardous waste. A SWAT was completed on July 1, 1989 for the Penrose and Newberry landfills and was approved by Regional Board staff on September 22, 1989. The SWAT monitoring program found evidence of several regional water quality problems. Solvents including trichloroethylene (TCE) were detected in wells up-gradient (north) of the Landfill. High nitrate levels were found northwest of the Landfill.
- 36. A Supplemental SWAT encompassing the Penrose and Newberry landfills was prepared in 1989. The Supplemental SWAT concluded that there was no apparent threat to groundwater from the migration of landfill gas from the Penrose and Newberry landfills and that landfill gas was being effectively controlled at the Penrose Landfill by the landfill gas collection system at the site. No evidence of leachate production at the Penrose and Newberry landfills was detected and the wastes in these landfill appeared to be unsaturated. The Supplemental SWAT was approved by Regional Board staff on September 22, 1989, on the condition that detection groundwater monitoring be continued per Subchapter 15 (14 CCR) regulations.
- 37. On March 7, 1991, the Discharger requested the cessation of groundwater monitoring at the Landfill because previous monitoring indicated no adverse impact to groundwater quality from the Landfill. Subsequently, groundwater monitoring at the Landfill ceased, though Regional Board records do not indicate whether Regional Board staff acted upon the Discharger request. With the opening of the Strathern Inert Landfill in 1992, groundwater monitoring was renewed at wells MW-4928A, MW-4928B and MW-4928C.
- 38. The Landfill is located immediately south of the northern San Fernando Valley, an area of contaminated groundwater beneath the North Hollywood section of the City of Los Angeles and the City of Burbank. In 1980, concentrations of chlorinated volatile organic compounds (VOC), including TCE and PCE, were found above federal maximum contaminant levels (MCLs) and State action levels in many groundwater production wells. In June 1986, the U.S. Environmental Protection Agency (USEPA) placed the San Fernando Valley sites on the National Priorities List (NPL). Groundwater pollution in the area is believed to be caused by industrial activities including aerospace and defense manufacturing, machinery degreasing, dry cleaning, and metal plating. Some contaminants currently affecting the basin's water supply can be traced as far back as the 1940s, when chemical wastes disposal was unregulated throughout the Valley.
- 39. On July 1, 1996 the Discharger entered into a Consent Decree with USEPA to avoid prolonged litigation and to provide for payment of a specified amount for past and future response costs for the North Hollywood Operable Unit (NHOU) Site Interim Remedial Action

selected in the 1987 NHOU Record of Decision and for the past costs of Basin-wide investigations.

- 40. Starting on January 2007, the Discharger completed four quarters of groundwater sampling at the Penrose, Newberry and Strathern landfills. In addition to groundwater monitoring of wells MW-4928A, MW-4928B and MW-4928C at the Strathern Landfill conducted pursuant to WDRs Order No. 91-086, the Discharger sampled monitoring wells MW-4918, MW-4918B and MW-4927 located at the closed Penrose and Newberry Landfills. The monitoring results indicated that there was no apparent threat to groundwater from the Landfill. However, since no routine groundwater monitoring has been conducted at the Landfill, additional groundwater monitoring data is needed to determine if the groundwater quality at the site has been changed.
- 41. The Discharger has installed a landfill gas (LFG) collection and monitoring system at the Landfill, which has been in operation since 1972. Due to the decrease of LFG generated from the Landfill, the operation of a cogeneration plant has ceased and landfill gas is now destructed in a flare system. The LFG collection system helps to control lateral off-site migration of landfill gases, which could cause various environmental problems, including groundwater contamination.
- 42. Because a postclosure maintenance plan for the Landfill has not been submitted to the Regional Board, this Order requires the Discharger to comply with applicable postclosure maintenance plan requirements (specifically section 2597 of title 23 of the California Code of Regulation that are now contained in 27 CCR, section 21769).

#### ADMINISTRATIVE

- 43. It is the policy of the State of California that every human being has the right to safe, clean, affordable, and accessible water adequate for human consumption, cooking, and sanitary purposes. This Order promotes the policy by including requirements for the prevention and remediation of pollution that the Landfill may cause to ground and surface water resources. In addition, this Order permits the beneficial use of treated wastewaters, such as leachate, gas condensate, and contaminated sub-drain water so that valuable drinking water resources may be preserved.
- 44. The actions required by this Order will result in minor alterations to the Landfill, an existing facility as defined in section 15301, chapter 3, title 14 of the CCR and adoption of this Order is categorically exempt from the provisions of the California Environmental Quality Act (Public Resources Code section 21000 et seq.).
- 45. The Regional Board has notified interested agencies and all known interested persons of its intent to issue requirements for operation of the Landfill. The Regional Board in a public meeting on October 8, 2015 heard and considered all comments pertaining to the postclosure maintenance of the Landfill.
- 46. Any person aggrieved by this action of the Regional Board may petition the State Water Board to review the action in accordance with California Water Code (CWC) section 13320 and 23CCR section 2050 and following. The State Water Board must receive the petition by 5:00 p.m., thirty days after the date of this Order, except that if the thirtieth day following the date of this Order falls on a Saturday, Sunday, or state holiday, the petition must be received by the State Water Board by 5:00 p.m. on the next business day. Copies of the law

and regulations applicable to filing petitions may be found on the Internet at: http://www.waterboards.ca.gov/public\_notices/petitions/water\_quality or will be provided upon request.

IT IS HEREBY ORDERED that the Discharger shall comply with the following at the Landfill:

#### A. SPECIFICATIONS

- 1. The Landfill is closed. No municipal wastes or any other wastes may be received at the Landfill for the purpose of disposal.
- Inert soil, concrete, and asphalt materials that are used for the construction or repair of the final cover, access roads, or other facilities at the site may be imported to the Landfill, provided that the source, volume, and usage of such imported materials are reported in the corresponding semi-annual monitoring report.
- 3. The Discharger shall remove any unacceptable wastes that arrive at the site in violation of the requirements in this Order and discharge any removed waste to a legal point of disposal.

## B. PROHIBITIONS

- 1. Discharge of waste as a result of inadequate closure or postclosure maintenance practices, and that have not been specifically described to the Regional Board and for which valid WDRs are not in force, are prohibited.
- 2. The waste that the Landfill received throughout its operating life shall not:
  - a. cause the occurrence of coliform or pathogenic organisms in the groundwater basin;
  - b. cause the occurrence of objectionable tastes or odors in the groundwater basin;
  - c. cause waters pumped from a groundwater basin to foam;
  - d. cause the presence of toxic materials in the groundwater basin;
  - e. cause the pH of waters in the groundwater basin to fall below 6.0, or rise above 9.0;
  - f. cause the Regional Board's water quality objectives for the groundwaters or surface waters as established in the Basin Plan to be exceeded; or
  - g. cause pollution, contamination, or nuisance, as defined in CWC section 13050, or adversely affect beneficial uses of groundwaters or surface waters as established in the Basin Plan.
- 3. Odors, vectors, and other nuisances of waste origin that migrate beyond the limits of the Landfill are prohibited.
- 4. The discharge of waste to surface water drainage courses or to groundwater is prohibited.

- 5. No operations at the Landfill shall cause any Basin Plan objective to be exceeded at any location under, or in the vicinity of, the Landfill.
- 6. The Discharger shall comply with all federal, state, and county sanitary health codes, rules, regulations, and ordinances pertinent to the disposal of wastes on land and with the operation and maintenance of the Landfill.

#### C. REQUIREMENTS FOR POSTCLOSURE MAINTENANCE

- 1. The Discharger shall submit to the Regional Board, within 90 days of the adoption of this Order, for the approval of the Executive Officer, a Postclosure Maintenance Plan that implements all requirements in this Order, including the MRP, at the Landfill. Specifically, the Postclosure Maintenance Plan shall include the following:
  - a. A description of the design and the location of all features and systems which will provide waste containment during the post closure maintenance period.
  - b. A description of all precipitation and drainage control features.
  - c. A description of any leachate control features and procedures.
  - d. A discussion of groundwater and unsaturated zone monitoring programs for the post closure maintenance period, including location, construction details, and rationale of all monitoring facilities.
  - e. An evaluation of anticipated settlement due to decomposition and compaction of wastes and subsidence of underlying natural geologic materials.
  - f. A description of the nature of the final cover, including its engineering characteristics, permeability, thickness, slopes steepness, existing and proposed landscaping, drainage and irrigation facilities.
  - g. The post closure land use of the disposal site and the surrounding area.
  - h. Estimates of costs for postclosure maintenance for the anticipated post closure maintenance period.
  - i. Maps showing all existing or proposed structures, landscaping, and related features to be installed and maintained over the final landfill cover, accompanied by a description and quantification of water entering, leaving, and remaining on site from all sources to determine potential adverse impacts due to the proposed use, and corresponding mitigative design features that will ensure the physical and hydraulic integrity of the final cover.
- 2. The postclosure maintenance period for the Landfill shall continue until the Regional Board determines that remaining wastes at the Landfill will not threaten water quality.
- 3. All containment structures and erosion and drainage control systems at the Landfill shall be designed and constructed by, or under the direct supervision of, a California-registered civil engineer or certified engineering geologist.

- 4. The Landfill shall have containment structures that are capable of preventing degradation of the waters of the state. Construction standards for containment structures shall comply with 27 CCR requirements. The Discharger shall provide design specifications for Regional Board staff's review and approval prior to construction of any containment structure.
- 5. Drainage controls, structures, and facilities shall be designed to divert any precipitation or tributary runoff to prevent ponding and percolation of water at the Landfill. When necessary, temporary structures shall be installed as needed to comply with this requirement.
- 6. The Landfill shall be graded and maintained to promote runoff of precipitation and to prevent ponding of liquids and surface water. Erosion or washout of refuse or cover materials by surface flow shall be controlled to prevent off-site migration.
- The migration of gases from the Landfill shall be controlled as necessary to prevent water pollution, nuisance, or health hazards. The discharge of wastes or waste byproducts (i.e., leachate or gas condensate) to off-site surface drainage courses or to groundwater is prohibited.
- 8. Gas condensate gathered from the gas monitoring and collection system at the Landfill shall not be returned to the Landfill. Any proposed modifications or expansions to this system shall be designed to allow the collection, testing and treatment, or disposal by approved methods, of all gas condensate produced at the Landfill.
- 9. The Discharger shall intercept and remove liquid detected in **any** leachate collection and removal systems in accordance with 27 CCR section 20340(c) at the Landfill. Leachate shall be discharged to a legal point of disposal and shall not be returned to the Landfill.
- 10. The Discharger shall maintain permanent survey monuments at the Landfill throughout the postclosure maintenance period. Benchmarks shall be established and maintained in sufficient numbers to enable reference to key elevations and to permit control of critical grading and compaction operations.
- 11. The Discharger shall, at all times, properly operate and maintain all facilities and systems of treatment and control (and related appurtenances) which are installed or used to achieve compliance with conditions of this Order. Proper operation and maintenance includes effective performance, and adequate laboratory and process controls including appropriate quality assurance procedures.
- 12. All inspections shall be documented and reported to the Regional Board in accordance with the MRP, No. CI-2181 (Attachment T).

#### D. REQUIREMENTS FOR GROUNDWATER MONITORING

1. The Discharger shall implement the attached MRP which is incorporated herein by reference and revisions thereto in order to detect, at the earliest opportunity, any unauthorized discharge of waste constituents from the Landfill or any unreasonable impairment of beneficial uses associated with (caused by) discharges of waste at the Landfill.

- 2. At any time, the Discharger may file a written request, including appropriate supporting documents, with the Executive Officer, proposing modifications to the MRP. The Discharger shall implement any changes to the revised MRP approved by the Executive Officer upon receipt of a signed copy of the revised MRP.
- 3. The Discharger shall furnish, under penalty of perjury, technical or monitoring program reports in accordance with CWC section 13267. Failure or refusal to furnish these reports or falsifying any information provided therein renders the Discharger guilty of a misdemeanor and subject to the penalties stated in CWC section 13268.
- 4. The effectiveness of all groundwater monitoring wells, groundwater monitoring devices, and leachate and gas collection systems shall be maintained throughout the Landfill's postclosure maintenance period in accordance with acceptable industry standards. If a well or piezometer is found to be inoperative, the Regional Board and other interested agencies shall be informed in writing within fourteen days after such discovery, and this notification shall contain a time schedule for restoring the well or piezometer to operating order.
- 5. If a groundwater monitoring well or piezometer is proposed to replace an inoperative well or piezometer, the Discharger shall not delay replacement while waiting for Executive Officer approval. However, a technical report describing the location and construction details shall be submitted to the Executive Officer within 30 days.
- 6. The Discharger shall provide for proper handling and disposal of water purged from groundwater monitoring wells at the Landfill during sampling. Water purged from a groundwater monitoring well shall not be returned to that well (or any other Landfill well).
- 7. Any abandoned groundwater monitoring wells or bore holes under the control of the Discharger, and situated within the Landfill boundaries, must be located and properly modified or sealed to prevent mixing of any waters between adjacent water-bearing zones. A notice of intent to decommission a well must be filed with the appropriate regulatory agencies prior to decommissioning. Procedures used to decommission these wells, or to modify wells still in use, must conform to the specifications of the local health department or other appropriate agencies.
- 8. For any monitoring wells installed at the Landfill in the future, the Discharger shall submit technical reports prior to installation. These technical reports shall be submitted at least 60 days prior to the anticipated date of installation of the wells. These reports shall be accompanied by:
  - a. Maps and cross sections showing the locations of the monitoring points; and
  - b. Drawings and data showing construction details of the monitoring points. These data shall include:
    - *i.* casing and test hole diameter;
    - ii. casing materials;
    - iii. depth of each hole;
    - *iv.* the means by which the size and position of perforations shall be determined, or verified, if in the field;
    - v. method of joining sections of casing;

vi. nature of filter materials;

vii. depth and composition of soils; and

*viii.* method and length of time of well development.

Within 30 days of the installation of a groundwater monitoring well at the Landfill, the Discharger shall submit an as-built report to the Regional Board and the California Department of Water Resources (DWR), including delineation of the stratigraphy encountered, all water bearing zone(s) encountered and water quality data.

- 9. As of the effective date of this Order, the compliance monitoring wells at the Landfill shall consist of those wells listed in Table T-1 of the MRP. All monitoring wells shall be monitored pursuant to this Order or as directed by the Executive Officer through future revisions of the MRP.
- 10. The Discharger shall install any additional groundwater, soil pore liquid, soil pore gas, or leachate monitoring devices necessary to comply with the MRP, as adopted or as revised by the Executive Officer.
- 11. The point of compliance (POC) for groundwater monitoring for the Landfill is a vertical surface located at the hydraulically downgradient limit of the Landfill that extends through the uppermost aquifer underlying the Landfill pursuant to 27 CCR section 20405(a).

## E. REQUIREMENTS FOR ON-SITE USE OF WATER

- No water shall be routinely applied at the Landfill except for irrigation, dust control, or other non-emergency uses approved by the Executive Officer. Any water used at the Landfill, except for potable water, recycled water permitted under Water Reclamation Requirements (WRRs) adopted by the Regional Board, and any other water allowed by the Executive Officer, shall be subject to these WDRs.
- 2. Washing of paved Landfill roads during rainy periods shall only occur when muddy roads create a safety concern. Washing of equipment or vehicles on the Landfill shall be confined to controlled areas where the wastewater is collected for proper disposal.
- 3. Overflow, runoff, or ponding caused by the over-application or improper management of on-site use of water are prohibited.
- 4. All uses of potable water shall be within the boundaries of the Landfill property. During an emergency, this water may be used for firefighting on the Landfill or on undeveloped areas off and adjacent to the Landfill.

## F. REQUIREMENTS FOR REPORTING SCHEDULED ACTIVITIES

1. The Discharger shall notify Regional Board staff at least 30 days prior to any maintenance activities which could alter existing surface drainage patterns or change existing slope configurations. These activities may include, but not be limited to, significant grading activities, the importation of fill material, the design and installation of soil borings, groundwater monitoring wells, and other devices for Landfill investigation purposes.

- 2. The Discharger shall furnish, within a reasonable time, any information the Regional Board may request to determine whether cause exists for modifying, revoking and reissuing, or terminating this Order. The Discharger shall also furnish to the Regional Board, upon request, copies of records required to be kept by this Order.
- 3. If the Discharger becomes aware that it failed to submit any relevant facts in any report to the Regional Board, it shall submit such facts or information within fourteen days of its discovery of the omission.
- 4. The Regional Board shall be notified of any incident at the Landfill that are in violation of this Order and that may endanger the environment, by telephone within 24 hours from the time the Discharger becomes aware of the circumstances, and in writing within 14 days of the time that the Discharger becomes aware of the circumstances. The written notification shall fully describe the incident including what occurred, when it occurred, the duration of the incident, when correction occurred (or when correction will occur if it is a continuing incident), and the steps taken or planned to reduce, eliminate, and/or prevent recurrence of the incident. All instances of noncompliance with this Order shall also be reported to the Regional Board in the same manner as stated above, and shall also be included in the next scheduled monitoring report.
- 5. The Discharger shall notify the Executive Officer, in writing, at least 30 days in advance of any proposed transfer of this Order's responsibility and coverage between the Discharger and a new owner or operator of the Landfill. Any transfer agreement between the Discharger and a new owner or operator shall include an acknowledgement that the Discharger is liable for violations up to the transfer date and that the new owner or operator is liable from the transfer date on. The agreement shall include an acknowledgement that the new owner or operator accepts responsibility for compliance with this Order.
- 6. The Discharger shall notify the Regional Board of changes in information submitted in the Postclosure Maintenance Plan required in Section C.1 of this Order within 30 days of the change.
- 7. All applications, reports, or information submitted to the Regional Board shall be signed and certified as follows:
  - a. Applications, Reports of Waste Discharge, or similar documents shall be signed as follows:
    - i. For a corporation by a principal executive officer of at least the level of vicepresident.
    - ii. For a partnership or sole proprietorship by a general partner or the proprietor, respectively.
    - iii. For a municipality, state, federal or other public agency by either a principal executive officer or ranking elected official.
    - iv. For a military installation by the base commander or the person with overall responsibility for environmental matters in that branch of the military.
  - b. All other reports required by this Order and other information required by the Executive Officer shall be signed by a person designated in paragraph [a] of this

provision, or by a duly authorized representative of that person. An individual is a duly authorized representative only if:

- i. The authorization is made in writing by a person described in paragraph [a] of this provision;
- ii. The authorization specifies either an individual or a position having responsibility for the overall operation of the regulated facility or activity; and
- iii. The written authorization is submitted to the Executive Officer.
- c. Any person signing a document under this section shall make the following certification:

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

#### G. GENERAL PROVISIONS

- 1. This Order does not authorize violation of any federal, state, or local laws or regulations.
- 2. The Discharger has a continuing responsibility for correcting any problems which may arise in the future as a result of waste discharged at the Landfill, and from gases and leachate that may be caused by infiltration or precipitation of drainage waters into the waste disposal units, or by infiltration of water applied to this property during subsequent use of the land or other purposes.
- 3. The Discharger shall allow the Regional Board, or an authorized representative, upon presentation of credentials and other documents as may be required by law, to:
  - a. Enter upon the Discharger's premises where a regulated facility or activity is located or conducted, or where records must be kept under the conditions of this Order;
  - b. Have access to and copy, at reasonable times, any records that shall be kept under the conditions of this Order;
  - Inspect at reasonable times any facilities, equipment (including monitoring and control equipment), practices, or operations regulated or required under this Order; and
  - d. Sample or monitor at reasonable times, for the purpose of assuring compliance with this Order or as otherwise authorized by the CWC, any substances or parameters at this location.
- 4. The Discharger shall maintain a copy of this Order at the Landfill so as to be available at all times to Landfill operating personnel.

- 5. These requirements do not exempt the Discharger from compliance with any other current or future law that may be applicable. They do not legalize this waste management facility, and they leave unaffected any further restraints on the disposal of wastes at this waste management facility that may be contained in other statutes.
- 6. This Order includes the attached "Standard Provisions Applicable to Waste Discharge Requirements", adopted November 7, 1990 (Attachment W) which is incorporated herein by reference.
- 7. The requirements adopted herein neither authorize the commission of any act causing injury to the property of another, nor protect the Discharger from liabilities under federal, state, or local laws.
- 8. The filing of a request by the Discharger for a modification, revocation and reissuance, or termination, or a notification of planned changes or anticipated noncompliance, does not stay any condition, provision, or requirements of this Order.
- 9. This Order does not convey any property rights of any sort, or any exclusive privilege.
- 10. The Discharger is the responsible party for these WDRs, including any MRP or other body of requirements incorporated by reference therein. The Discharger shall comply with all conditions of these WDRs. Violations may result in enforcement actions, including regional board orders, or court orders, requiring corrective action or imposing civil monetary liability, or in modification or revocation of these WDRs by the Regional Board.
- 11. The Discharger shall within 48 hours of a significant earthquake event, provide an initial verbal assessment to the Regional Board of any earthquake damage at the Landfill. A detailed post-earthquake report describing any physical damages to the containment features, groundwater monitoring and/or leachate control facilities and a corrective action plan to be implemented at the Landfill shall be submitted to the Regional Board within thirty days of the earthquake event. A significant earthquake is herein defined as an earthquake event above Richter Magnitude 5.0 within a 100-kilometer radius of the property boundaries of the Landfill.
- 12. The Discharger shall immediately notify the Regional Board of any flooding, slope failure or other change in Landfill conditions that could impair the integrity of waste containment facilities or of precipitation and drainage control structures.
- 13. The Discharger shall take all reasonable steps to minimize or correct any adverse impact on the environment resulting from noncompliance with this Order, including such accelerated or additional monitoring as may be necessary to determine the nature and impact of the noncompliance.
- 14. This Order is not transferable to any person except after notice to the Executive Officer. The Regional Board may require modification or revocation and reissuance of this Order to change the name of the Discharger and incorporate such other requirements as may be necessary under the CWC. The Discharger shall submit notice of any proposed transfer of this Order's responsibility and coverage as described under Provision No. F.5 of this Order.

- 15. In accordance with CWC section 13263(g), these requirements shall not create a vested right to continue to discharge and are subject to being superseded or modified. All discharges of waste into the waters of the state are privileges, not rights.
- 16. The provisions of this Order are severable, and if any provision of this Order, or the application of any provision of this Order to any circumstance, is held invalid, the application of such provision to other circumstances, and the remainder of this Order, shall not be affected thereby.
- 17. This Order becomes effective on the date of adoption by the Regional Board.
- 18. This Order may be terminated or modified by the Regional Board, including, but not limited to the following:
  - a. Violation of any term or condition contained in this Order;
  - b. Obtaining this Order by misrepresentation, or failure to disclose all relevant facts; or
  - c. A change in any condition that required either a temporary or permanent reduction or elimination of the authorized waste discharge.
- 19. This Order in no way limits the authority of the Regional Board, as delineated in the CWC, to require additional investigations and cleanups pertinent to this project. This Order may be revised by the Regional Board as additional information from the project becomes available.
- 20. Failure to comply with the terms and conditions of this Order may result in imposition of civil liability against the Discharger by the Regional Board, either by the Regional Board or judicially by the Superior Court, in accordance with the CWC, including CWC sections 13268 and 13350 and/or referral to the Attorney General of the State of California for such legal action as may be deemed appropriate.

## H. TERMINATION

1. Except for violation enforcement purposes, Regional Board Resolution No. 58-92, adopted December 18, 1958, and Regional Board Order No. 93-009, adopted January 25, 1993, are hereby terminated.

I, Samuel Unger, Executive Officer, do certify that the foregoing is a full, true, and correct copy of an order adopted by the California Regional Water Quality Control Board, Los Angeles Region, on October 8, 2015.

Samuel Unger, P.E.

Executive Officer

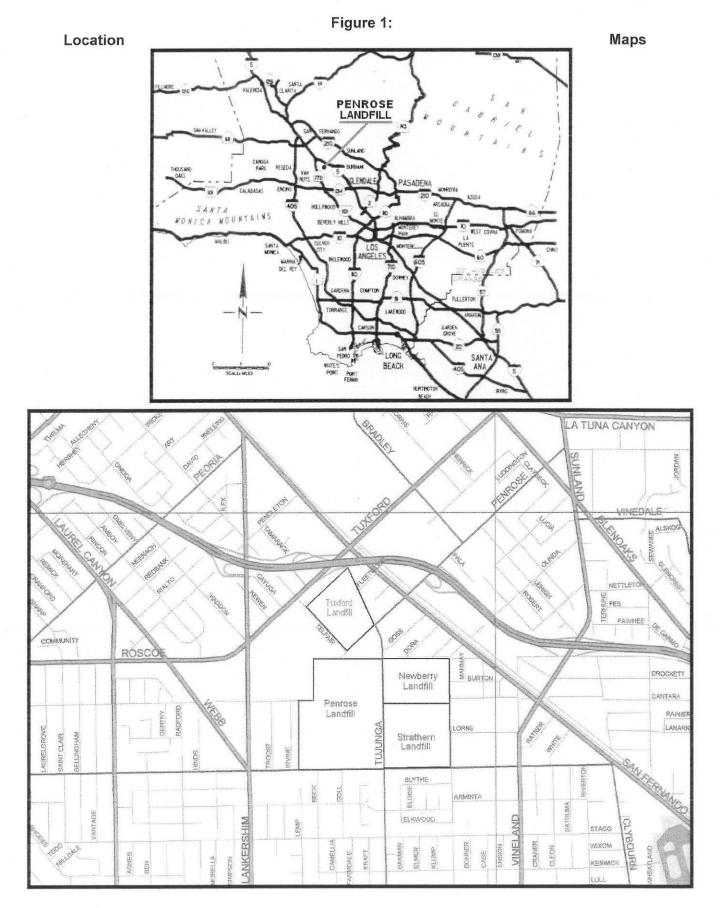


Figure 2: Federal Emergency Management Agency Flood Insurance Rate Map

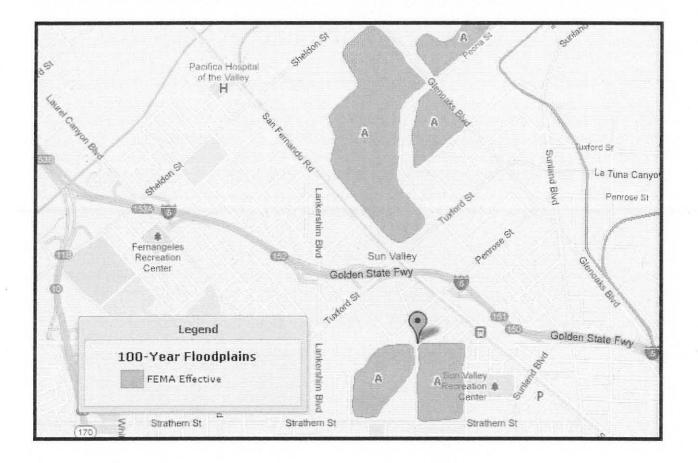
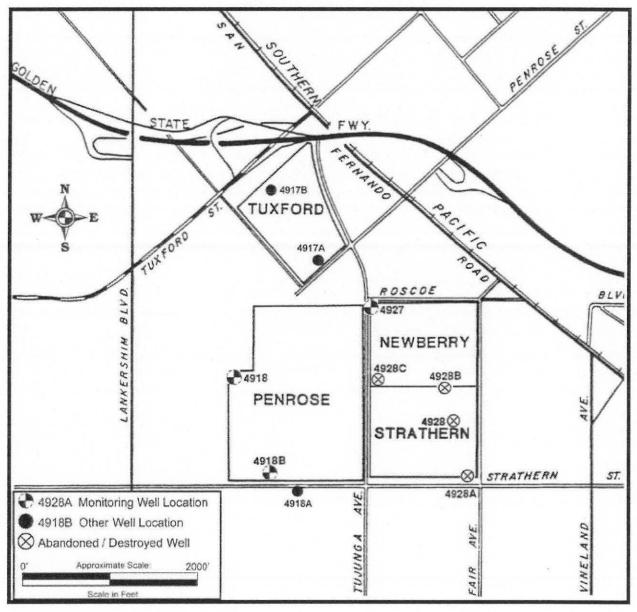


Figure 3: Groundwater Well Locations



## STANDARD PROVISIONS APPLICABLE TO WASTE DISCHARGE REQUIREMENTS

#### 1. DUTY TO COMPLY

The discharger must comply with all conditions of these waste discharge requirements. A responsible party has been designated in the Order for this project, and is legally bound to maintain the monitoring program and permit. Violations may result in enforcement actions, including Regional Board orders or court orders requiring corrective action or imposing civil monetary liability, or in modification or revocation of these waste discharge requirements by the Regional Board. (Water Code, Sections 13261, 13263, 13265, 13268, 13300, 13301, 13304, 13340, and 13350). Failure to comply with any waste discharge requirement, monitoring and reporting requirement, or other order or prohibition issued, reissued or amended by the Los Angeles Water Board or State Water Resources Control Board is a violation of these waste discharge requirements and the Water Code, which can result in the imposition of civil liability. (Water Code, Section 13350, subdivision (a).)

#### 2. GENERAL PROHIBITION

Neither the treatment nor the discharge of waste shall create a pollution, contamination or nuisance, as defined by California Water Code section 13050. In addition, the discharge of waste classified as hazardous, as defined in California Code of Regulations, Title 23, Section 2521, subdivision (a) is also prohibited.

#### 3. AVAILABILITY

A copy of these waste discharge requirements shall be maintained at the discharge facility and be available at all times to operating personnel. (Water Code, Section 13263)

#### 4. CHANGE IN OWNERSHIP

The discharger must notify the Executive Officer, in writing at least 30 days in advance of any proposed transfer of this Order's responsibility and coverage to a new discharger containing a specific date for the transfer of this Order's responsibility and coverage between the current discharger and the new discharger. This agreement shall include an acknowledgement that the existing discharger is liable for violations up to the transfer date and that the new discharger is liable from the transfer date forward. (Water Code, Sections 13267 and 13263)

#### 5. CHANGE IN DISCHARGE

In the event of a material change in the character, location, or volume of a discharge, the discharger shall file with this Regional Board a new Report of Waste Discharge. (Water Code, Section 13260, subdivision (c)). A material change includes, but is not limited to, the following:

(a) Addition of a major industrial waste discharge to a discharge of essentially domestic sewage, or the addition of a new process or product by an industrial facility resulting in a change in the character of the waste.

- (b) Significant change in disposal method, e.g., change from a land disposal to a direct discharge to water, or change in the method of treatment which would significantly alter the characteristics of the waste.
- (c) Significant change in the disposal area, e.g., moving the discharge to another drainage area, to a different water body, or to a disposal area significantly removed from the original area potentially causing different water quality or nuisance problems.
- (d) Increase in flow beyond that specified in the waste discharge requirements.
- (e) Increase in the area or depth to be used for solid waste disposal beyond that specified in the waste discharge requirements. (California Code of Regulations, Title 23, Section 2210)

#### 6. REVISION

These waste discharge requirements are subject to review and revision by the Regional Board. (Water Code, Sections 13263)

#### 7. NOTIFICATION

Where the discharger becomes aware that it failed to submit any relevant facts in a Report of Waste Discharge or submitted incorrect information in a Report of Waste Discharge or in any report to the Regional Board, it shall promptly submit such facts or information. (Water Code, Sections 13260 and 13267)

## 8. <u>VESTED RIGHTS</u>

This Order does not convey any property rights of any sort or any exclusive privileges. The requirements prescribed herein do not authorize the commission of any act causing injury to persons or property, do not protect the discharger from his liability under Federal, State or local laws, nor do they create a vested right for the discharger to continue the waste discharge. (Water Code, Section 13263, subdivision (g).)

#### 9. <u>SEVERABILITY</u>

Provisions of these waste discharge requirements are severable. If any provisions of these requirements are found invalid, the remainder of the requirements shall not be affected.

#### 10. OPERATION AND MAINTENANCE

The discharger shall, at all times, properly operate and maintain all facilities and systems of treatment and control (and related appurtenances) which are installed or used by the discharger to achieve compliance with conditions of this Order. Proper operation and maintenance includes effective performance, adequate funding, adequate operator

staffing and training, and adequate laboratory and process controls including appropriate quality assurance procedures. This provision requires the operation of backup or auxiliary facilities or similar systems only when necessary to achieve compliance with the conditions of this Order. (Water Code, Section 13263, subdivision (f).)

#### 11. NOTIFICATION REQUIREMENT

Except for a discharge which is in compliance with these waste discharge requirements, any person who, without regard to intent or negligence, causes or permits any hazardous substance or sewage to be discharged in or on any waters of the State, or discharged or deposited where it is, or probably will be, discharged in or on any waters of the State, shall, as soon as (a) that person has knowledge of the discharge, (b) notification is possible, and (c) notification can be provided without substantially impeding cleanup or other emergency measures, immediately notify the Office of Emergency Services of the discharge in accordance with the spill reporting provision of the State toxic disaster contingency plan adopted pursuant to Article 3.7 (commencing with Section 8574.7) of Chapter 7 of Division 1 of Title 2 of the Government Code, and immediately notify the State Board or the appropriate Regional Board of the discharge. This provision does not require reporting of any discharge of less than a reportable quantity as provided for under subdivisions (f) and (g) of Section 13271 of the Water Code unless the discharger is in violation of a prohibition in the applicable Water Quality Control plan. (Water Code, Section 13271, subdivision (a).)

## 12. OIL OR PETROLEUM RELEASES

Except for a discharge which is in compliance with these waste discharge requirements, any person who without regard to intent or negligence, causes or permits any oil or petroleum product to be discharged in or on any waters of the State, or discharged or deposited where it is, or probably will be, discharged in or on any waters of the State, shall, as soon as (a) such person has knowledge of the discharge, (b) notification is possible, and (c) notification can be provided without substantially impeding cleanup or other emergency measures, immediately notify the Office of Emergency Services of the discharge in accordance with the spill reporting provision of the State oil spill contingency plan adopted pursuant to Article 3.5 (commencing with Section 8574.1) of Chapter 7 of Division 1 of Title 2 of the Government Code. This provision does not require reporting of any discharge of less than 42 gallons unless the discharge is also required to be reported pursuant to Section 311 of the Clean Water Act or the discharge is in violation of a prohibition in the applicable Water Quality Control Plan. (Water Code, Section 13272)

#### 13. INVESTIGATIONS AND INSPECTIONS

The discharger shall allow the Regional Board, or an authorized representative upon the presentation of credentials and other documents as may be required by law, to:

(a) Enter upon the discharger's premises where a regulated facility or activity is located or conducted, or where records must be kept under the conditions of this Order;

- (b) Have access to and copy, at reasonable times, any records that must be kept under the conditions of this Order;
- (c) Inspect at reasonable times any facilities, equipment (including monitoring and control equipment), practices, or operations regulated or required under this Order; and
- (d) Sample or monitor at reasonable times, for the purposes of assuring compliance with this Order, or as otherwise authorized by the California Water Code, any substances or parameters at any location. (Water Code, Section 13267)
- (e) Except for material determined to be confidential in accordance with applicable law, all reports prepared in accordance with the terms of this Order shall be available for public inspection at the office of the Los Angeles Water Board. Data on waste discharges, water quality, geology, and hydrogeology shall not be considered confidential.

#### 14. MONITORING PROGRAM AND DEVICES

The discharger shall furnish, under penalty of perjury, technical monitoring program reports; such reports shall be submitted in accordance with specifications prepared by the Executive Officer, which specifications are subject to periodic revisions as may be warranted. (Water Code, Section 13267)

All monitoring instruments and devices used by the discharger to fulfill the prescribed monitoring program shall be properly maintained and calibrated as necessary to ensure their continued accuracy. All flow measurement devices shall be calibrated at least once per year, or more frequently, to ensure continued accuracy of the devices. Annually, the discharger shall submit to the Executive Office a written statement, signed by a registered professional engineer, certifying that all flow measurement devices have been calibrated and will reliably achieve the accuracy required.

The analysis of any material required pursuant to Division 7 of the Water Code shall be performed by a laboratory that has accreditation or certification pursuant to Article 3 (commencing with Section 100825) of Chapter 4 of Part 1 of Division 101 of the Health and Safety Code. However, this requirement does not apply to field tests, such as test for color, odor, turbidity, pH, temperature, dissolved oxygen, conductivity, and disinfectant residual chlorine. (Water Code, Section 13176). Unless otherwise permitted by the Regional Board Executive officer, all analyses shall be conducted at a laboratory certified for such analyses by the State Water Resources Control Board's Division of Drinking Water. All analyses shall be required to be conducted in accordance with the latest edition of "Guidelines Establishing Test Procedures for Analysis of Pollutants" (40CFR Part 136) promulgated by the United States, Environmental Protection Agency (USEPA). (California Code of Regulation, Title 23, Section 2230)

The Quality Assurance-Quality Control Program must conform to the USEPA Guidelines "Laboratory Documentation Requirements for Data Validation", January 1990, USEPA Region 9) or procedures approved by the Los Angeles Regional Water Quality Control Board.

All quality assurance and quality control (QA/QC) analyses must be run on the same dates when samples were actually analyzed. All QA/QC data shall be reported, along with the sample results to which they apply, including the method, equipment, analytical detection and quantitation limits, the percent recovery, and explanation for any recovery that falls outside the QC limits, the results of equipment and method blanks, the results of spiked and surrogate samples, the frequency of quality control analysis, and the name and qualifications of the person(s) performing the analyses. Sample results shall be reported unadjusted for lank results or spike recoveries. In cases where contaminants are detected in QA/QC samples (e.g., field, trip, or lab blanks); the accompanying sample results shall be appropriately flagged.

The Discharger shall make all QA/QC data available for inspection by Regional Board staff and submit the QA/QC documentation with its respective quarterly report. Proper chain of custody procedures must be followed and a copy of that documentation shall be submitted with the quarterly report.

## 15. TREATMENT FAILURE

In an enforcement action, it shall not be a defense for the discharger that it would have been necessary to halt or to reduce the permitted activity in order to maintain compliance with this Order. Upon reduction, loss, or failure of the treatment facility, the discharger shall, to the extent necessary to maintain compliance with this Order, control production or all discharges, or both, until the facility is restored or an alternative method of treatment is provided. This provision applies, for example, when the primary source of power of the treatment facility fails, is reduced, or is lost. (Water Code, Section 13263, subdivision (f).)

## 16. DISCHARGE TO NAVIGABLE WATERS

A person who discharges pollutants or proposes to discharge pollutants or proposes to discharge pollutants to the navigable waters of the United States within the jurisdiction of this state or a person who discharges dredged or fill material or proposes to discharge dredged or fill material into the navigable waters of the United States within the jurisdiction of this state shall file a report of waste discharge in compliance with the procedures set forth in Water Code section 13260. (Water Code, Section 13376)

#### 17. ENDANGERMENT TO HEALTH AND ENVIRONMENT

The discharger shall report any noncompliance which may endanger health or the environment. Any such information shall be provided verbally to the Executive Officer within 24 hours from the time the discharger becomes aware of the circumstances. A written submission shall also be provided within five days of the time the discharger becomes aware of the circumstances. The written submission shall contain a description

of the noncompliance and its cause; the period of noncompliance, including exact dates and times, and if the noncompliance has not been corrected; the anticipated time it is expected to continue and steps taken or planned to reduce, eliminate, and prevent recurrence of the noncompliance. The Executive officer, or an authorized representative, may waive the written report on a case-by-case basis if the oral report has been received within 24 hours. The following occurrence(s) must be reported to the Executive Office within 24 hours:

- (a) Any bypass from any portion of the treatment facility.
- (b) Any discharge of treated or untreated wastewater resulting from sewer line breaks, obstruction, surcharge or any other circumstances.
- (c) Any treatment plan upset which causes the effluent limitation of this Order to be exceeded. (Water Code, Sections 13263 and 13267)

#### 18. MAINTENANCE OF RECORDS

The discharger shall retain records of all monitoring information including all calibration and maintenance records, all original strip chart recordings for continuous monitoring instrumentation, copies off all reports required by this Order, and record of all data used to complete the application for this Order. Records shall be maintained for a minimum of three years from the date of the sample, measurement, report, or application. This period may be extended during the course of any unresolved litigation regarding this discharge or when requested by the Regional Board Executive Officer.

Records of monitoring information shall include:

- (a) The date, exact place, and time of sampling or measurement;
- (b) The individual(s) who performed the sampling or measurement;
- (c) The date(s) analyses were performed;
- (d) The individual(s) who performed the analyses;
- (e) The analytical techniques or method used; and
- (f) The results of such analyses.
- 19. (a) All application reports or information to be submitted to the Executive Office shall be signed and certified as follows:
  - (1) For a corporation by a principal executive officer or at least the level of vice president.
  - (2) For a partnership or sole proprietorship by a general partner or the proprietor, respectively.

- (3) For a municipality, state, federal, or other public agency by either a principal executive officer or ranking elected official.
- (b) A duly authorized representative of a person designated in paragraph (a) of this provision may sign documents if:
  - (1) The authorization is made in writing by a person described in paragraph(a) of this provision.
  - (2) The authorization specifies either an individual or position having responsibility for the overall operation of the regulated facility or activity; and
  - (3) The written authorization is submitted to the Executive Officer.

Any person signing a document under this Section shall make the following certification:

"I certify under penalty of law that I have personally examined and am familiar with the information submitted in this document and all attachments and that, based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment. (Water Code Sections 13263, 13267, and 13268)"

#### 20. OPERATOR CERTIFICATION

Supervisors and operators of municipal wastewater treatment plants and privately owned facilities regulated by the Public Utilities Commission, used in the treatment or reclamation of sewage and industrial waste shall possess a certificate of appropriate grade in accordance with California Code of Regulations, title 23, section 3680. State Boards may accept experience in lieu of qualification training. (California Code of Regulations, Title, 23, Sections 3680 and 3680.2.) In lieu of a properly certified wastewater treatment plant operator, the State Board may approve use of a water treatment plant operator of appropriate grade certified by the State Department of Public Health where reclamation is involved. (California Code of Regulations, Title, 23, Section 3670.1, subdivision (b).)

## ADDITIONAL PROVISIONS APPLICABLE TO PUBLICLY OWNED TREATMENT WORKS' ADEQUATE CAPACITY

21. Whenever a regional board finds that a publicly owned wastewater treatment plant will reach capacity within four years, the board shall notify the discharger. Such notification shall inform the discharger that the regional board will consider adopting a time schedule order pursuant to Section 13300 of the Water Code or other enforcement order unless

the discharger can demonstrate that adequate steps are being taken to address the capacity problem. The notification shall require the discharger to submit a technical report to the regional board within 120 days showing how flow volumes will be prevented from exceeding existing capacity or how capacity will be increased. A copy of such notification shall be sent to appropriate local elected officials, local permitting agencies and the press. The time for filing the required technical report may be extended by the regional board. An extension of 30 days may be granted by the executive officer. Longer extensions may be granted by the regional board itself. (California Code of Regulations, Title, 23, Section 2232.)

#### STATE OF CALIFORNIA CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD LOS ANGELES REGION

## MONITORING AND REPORTING PROGRAM (CI-2181) FOR Penrose, LLC PENROSE LANDFILL

This Monitoring and Reporting Program (MRP) for Penrose, LLC (Discharger) for the Penrose Landfill (Landfill) is issued pursuant to California Water Code (CWC) section 13267(b), and is incorporated by reference into Los Angeles Region (Regional Board) Order No. R4-2015-0203 (Order). The Discharger shall begin implementing this MRP following the adoption of the Order.

## I. REQUIRED REPORTS AND CONTINGENCY RESPONSE

#### A. GENERAL REQUIREMENTS FOR REPORT SUBMITTAL

1. **Schedule:** The Discharger shall submit all regular reports required in this MRP to this Regional Board in accordance with the following schedule:

#### Report

Second Semi-Annual Report

## Date due to the Regional Board

First Semi-Annual Report (for the period from January 1 to June 30)

(for the period from July 1 to December 31)

February 15

August 15

The Compliance Index number (**CI-2181**), as well as the period that the report covers, shall be clearly displayed on the cover page of each report.

- 2. Transmittal Letter A letter transmitting the essential points shall accompany each report. Such a letter shall include a discussion of any violations found since the last such report was submitted, and shall describe actions taken or planned for correcting those violations. If the Discharger has previously submitted a time schedule for correcting said violations, a reference to the correspondence transmitting such schedule will be satisfactory. If no violations have occurred since the last submittal, this shall be stated in the transmittal letter.
- 3. **Signature, certification, and perjury statement requirements:** All letters transmitting monitoring reports shall follow the signature, certification, and perjury statement requirements provided in Section G.7 of the Order.
- 4. Electronic Data Submittal The Discharger shall submit all scheduled reports required in the Order and this MRP electronically, in accordance with 23 CCR section 3890 et. seq., or as directed by the Regional Board Executive Officer. Until directed otherwise by the Regional Board Executive Officer, all reports shall be submitted to the State Board GeoTracker data system in searchable Portable Document Format (PDF) files (Geotracker Global ID. L10009967534). In addition, all groundwater analytical data and monitoring well locations shall be submitted to GeoTracker in Electronic Deliverable Format (EDF). Documents that cannot be conveniently reviewed in electronic format,

such as large maps or drawings, shall be submitted as hard copies to the Regional Board office as instructed by Regional Board staff. All hard copy reports required in this MRP shall be addressed to:

California Regional Water Quality Control Board Los Angeles Region 320 W. 4th Street, Suite 200 Los Angeles, California 90013 ATTN: Land Disposal Unit

### **B. MONITORING REPORTS**

Semi-annual Reports shall include, but should not be limited to, the following:

- Summary of Non-Compliance The report shall contain a summary of non-compliance that discusses the compliance record and the corrective actions taken or planned that may be needed to bring the discharge into full compliance with waste discharge requirements. Significant aspects of any on-going corrective action measures conducted during the monitoring period shall also be summarized. This section shall be located at the front of the report and shall clearly list all non-compliance with discharge requirements, as well as all exceedances of water quality protection standards.
- 2. **Site Conditions**: General discussion of site conditions (geology, climate, 100-year 24-hour storm, and watershed specifics, etc.) relative to water quality monitoring.
- 3. Narrative Description A narrative discussion of the site's various monitoring activities and results. Each requirement of Section II of this MRP shall be specifically discussed. Include a comprehensive discussion of the compliance record, any significant monitoring system and operational changes, a summary of corrective action results and milestones, and a review of construction projects, with water quality significance, completed or commenced in the past reporting period or planned for the up-coming reporting period.
- 4. Laboratory Results Laboratory results and statements demonstrating compliance with Section II of this MRP. Results of additional water sampling and analyses performed at the Landfill, outside of the requirements of this MRP, shall be summarized and reported. If the results of such additional sampling and analyses have or will be reported under separate cover, a statement as such shall be included in the monitoring report.
- 5. Graphical Presentation of Analytical Data For the second semiannual reports, for each monitoring point, submit in graphical format the laboratory analytical data for all samples taken within at least the previous eight calendar years. Each such graph shall plot the concentration of one or more constituents over time for a given monitoring point, at a scale appropriate to show trends or variations in water quality. Maximum contaminant levels (MCL) shall be graphed along with constituent concentrations where applicable. Graphs shall plot each datum, rather than plotting mean values. For any given constituent or parameter, the scale for background plots shall be the same as that used to plot downgradient data. In addition, all monitoring analytical data obtained during the previous year, shall be presented in tabular form; concentration Limits required in Section II.A.5. of this MRP shall be updated, and map(s) shall be included showing the areas where any significant events have taken place during the previous calendar year.

 Leachate and Landfill Gas Condensate - A summary of the total estimated volume, on a semi-annual basis, of any landfill leachate or landfill gas condensate that has been discharged and the legal point of disposal.

## C. CONTINGENCY RESPONSE

- 1. **Response to an Initial Indication of a Release** Should the initial statistical or nonstatistical comparison indicate that a release is tentatively identified, the Discharger shall:
  - a. Within 24 hours, verbally notify the designated Regional Board staff contact as to the monitoring point(s) and constituent(s) or parameter(s) involved;
  - Provide written notification by certified mail within seven days of such determination; and
  - c. Do either of the following:
    - i. Carry out a discrete re-test in accordance with Section II.A.7.b. of this MRP. If the re-test confirms the existence of a release or the Discharger fails to perform the re-test, the Discharger shall carry out the release discovery response requirements in Section I.C.4. In any case, the Discharger shall inform the Regional Board of the re-test outcome within 24 hours of results becoming available, following up with written results submitted by certified mail within seven days, or
    - ii. Make a determination, in accordance with 27 CCR section 20420(k)(7), that a source other than the waste management unit caused the release or that the evidence is an artifact caused by an error in sampling, analysis, or statistical evaluation or by natural variation in the groundwater, surface water, or the unsaturated zone.
- 2. **Physical Evidence of a Release** If either the Discharger or the Executive Officer determines that there is significant physical evidence of a release (27 CCR section 20385(a)(3)), the Discharger shall conclude that a release has been discovered and shall:
  - a. Within seven days notify the Regional Board of this fact by certified mail (or acknowledge the Board's determination).
  - b. Carry out the requirements of Section I.C.4. for all potentially-affected monitored media.
  - c. Carry out any additional investigations stipulated in writing by the Executive Officer for the purpose of identifying the cause of the indication.
- 3. **Release Discovery Response** If either the Discharger or the Executive Officer concludes that a release has been discovered, the following steps shall be carried out:
  - a. If this conclusion is not based upon monitoring for all constituents of concern (COCs), the Discharger shall sample for all COCs at all monitoring points in the affected medium. Within seven days of receiving the laboratory analytical results, the

Discharger shall notify the Executive Officer, by certified mail, of the concentration of all COCs at each monitoring point. This notification shall include a synopsis showing, for each monitoring point, those constituents that exhibit an unusually high concentration.

- b. The Discharger shall, within 90 days of discovering the release, submit an Amended Report of Waste Discharge proposing an Evaluation Monitoring and Reporting Program that meets the requirements of 27 CCR sections 20420 and 20425.
- c. The Discharger shall, within 180 days of discovering the release, submit a preliminary Engineering Feasibility Study meeting the requirements of 27 CCR section 20430.
- d. The Discharger shall immediately begin delineating the nature and extent of the release by installing and monitoring assessment wells as necessary to assure that it can meet the requirements of 27 CCR section 20425 to submit a delineation report within 90 days of when the Executive Officer directs the Discharger to begin the Evaluation Monitoring and Reporting Program.
- 4. **Release Beyond Facility Boundary** Any time the Discharger concludes (or the Executive Officer directs the Discharger to conclude) that a release from the Landfill has proceeded beyond the facility boundary, the Discharger shall so notify all persons who either own or reside upon the land that directly overlies any part of the plume (Affected Persons) as follows:
  - a. Initial notification to Affected Persons shall be accomplished within 14 days of making this conclusion and shall include a description of the Discharger's current knowledge of the nature and extent of the release.
  - b. Subsequent to initial notification, the Discharger shall provide updates to all Affected Persons, including any persons newly affected by a change in the boundary of the release, within 14 days of concluding there has been any material change in the nature or extent of the release.
  - c. Each time the Discharger sends a notification to Affected Persons (under a. or b., above), it shall, within seven days of sending such notification, provide the Board with both a copy of the notification and a current mailing list of Affected Persons.

# D. RESPONSE TO VOLATILE ORGANIC COMPOUNDS (VOC) DETECTION IN BACKGROUND WELL

- 1. Except as indicated in Section I.D.2. below, any time the laboratory analysis of a sample from a Background monitoring point shows either (1) two or more VOCs above their respective Method Detection Limit<sup>1</sup>, or (2) one VOC above its Practical Quantitation Limit, the Discharger shall:
  - a. Within 24 hours, notify the Regional Board by phone that possible Background monitoring point contamination has occurred.

<sup>&</sup>lt;sup>1</sup> In case the discrete re-test is triggered by detections of common laboratory contaminants (i.e., acetone, toluene, methylene chloride, and carbon disulfide) the Discharger may postpone the discrete re-test until after the next monitoring event. Re-test will not be required unless the same pollutants are also detected in the next monitoring event.

- b. Follow up with written notification by certified mail within seven days.
- c. Immediately obtain two new independent VOC samples from that Background monitoring point and send them for laboratory analysis of all detected VOCs.
- 2. If either or both the new samples validate the presence of VOC(s) at the Background monitoring point, the Discharger shall:
  - a. Within 24 hours, notify the Regional Board about the VOC(s) verified to be present at that Background monitoring point.
  - b. Provide written notification to the Board by certified mail within seven days of validation.
  - c. Within 180 days of validation, submit a report, acceptable to the Executive Officer, which examines the possibility that the detected VOC(s) originated from other than the Landfill, and proposes appropriate changes to this MRP.
- 3. If the Executive Officer determines, after reviewing the report submitted under Section I.D.2. above, that the VOC(s) detected originated from a source other than the Landfill, the Executive Officer will make appropriate changes to this MRP.
- 4. If the Executive Officer determines, after reviewing the report submitted under Section I.D.2. above, that the detected VOC(s) most likely originated from the Landfill, the Discharger shall assume that a release has been detected and shall immediately begin carrying out the requirements of Sections I.C.4 and I.C.5. of this MRP.

## II. REQUIRED MONITORING AND INSPECTIONS

#### A. GROUNDWATER MONITORING

- 1. **Groundwater Monitoring Networks** The groundwater monitoring network for the Landfill shall include detection monitoring wells 4927, 4918, and 4918B. Their locations are displayed on Figure T-1.
- Water Quality Protection Standard (WQPS) In accordance with 27 CCR section 20390, WQPS for the Landfill is established as the natural background groundwater quality at the site, which is set to either the statistically predicted value (if the constituent naturally exists) or the laboratory detection limit (if the constituent does not naturally exist in the water).
- 3. Routine Groundwater Monitoring Routine groundwater monitoring at the site includes semi-annual monitoring, annually monitoring, and five-year COC scan. Current groundwater Monitoring Parameters (MPars) and their minimum monitoring frequencies are listed in Table T-1. Unless otherwise approved by Regional Board staff, semi-annual sampling shall be conducted in March and September, annual and five-year COC sampling shall be conducted in September.
- 4. **Constituents of Concern (COC) List** As of the date of the adoption of this MRP, the COC list for the Landfill consists of all the semi-annually and annually monitored parameters. In addition, at any subsequent time, the COC list shall include all Appendix

II (40 CFR, part 258) constituents detected and affirmed in the five-year scan required by this MRP. The Discharger shall notify Regional Board staff of any such new addition to the COC list immediately, via phone or e-mail, shall record it in the Operating Record of the Landfill within fourteen days of the verification, and shall add the constituent(s) to the COC list in the next scheduled monitoring report.

Location	Monitoring Wells	
Compliance Well	4918B	
Sidegradient Well	4918	
Background Well	4927	

Table T-1: Groundwate	r Monitoring Wells
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5. Development and Updating of Concentration Limits - The Discharger shall develop, and submit to the Regional Board all Concentration Limits following the procedures provided in Section II.A.6.a. of this MRP. The revised concentration limits shall be submitted with the first semi-annual report following the adoption of Regional Board Order No. R4-2015-0203. Subsequently, the Discharger shall review Concentration Limits biannually in its reports submitted to the Board. When appropriate, new Concentration Limits shall be proposed. For any well/MPar pair for which the Intra-Well Comparison analysis is not applicable, the Discharger shall use the Inter-Well comparison analysis to determine whether water quality protection standards are violated.

Table 1-2: Groundwater N	Monitoring Parameters	and Minimum	Monitoring	Frequencies

Constituent	Reporting Unit*
Semi Annually Monitoring	
рН	pH Unit
Specific conductivity	µmuos/cm
Alkalinity	mg/L
Nitrate (as nitrogen)	mg/L
Chloride	mg/L
Sulfate	mg/L
Boron	mg/L
Total dissolved solids (TDS)	mg/L
Chemical oxygen demand (COD)	mg/L
Total organic carbon (TOC)	mg/L
Volatile organic compounds	μg/L

Annually Monitored Parameters Bicarbonate Total Hardness Calcium Potassium Sodium Trace metals (including As, Ba, Cr, Cu, Pb, and Hg) Semi-volatile organic compounds All other COCs added per Section II.A.4	
Five-year COC scan (Starting Second Semi-Annual 2015) All other Appendix II pollutants that are not included in semi-annual and annual groundwater monitoring	various

\*Indicates milligram per liter (mg/L) and micrograms per liter (µg/L).

#### 6. Statistical Data Analysis Methodology

- a. Intra-well comparison methods shall be used for all compliance wells for all constituents that are detectable at concentrations above their respective Method Detection Limit (MDL) in 10% or more of the background data to date. Initially, for each given MPar at a given downgradient monitoring well (well/MPar pair), the proposed background data set shall consist of all validated data from that compliance well and parameter obtained in the past five (5) years. Every two years. following the adoption of this MRP, as part of the annual monitoring summary report. the Discharger shall add the newer data to the background data set for each well/MPar pair after validating (via a method approved by the Executive Officer) that the new data does not indicate an increase over the existing background data. At that time, the Discharger shall also retire the well/MPar's oldest two years of background data, thereby producing a data set covering the then-previous eight years. The Discharger shall validate the proposed intra-well background data set as follows for each MPar at each well initially or, subsequently, at a new well or for a new MPar at an existing well. The Discharger shall report the validated or updated background data set, for each affected well/MPar pair, in the next scheduled monitoring report.
- b. Per 27 CCR section 20415(e)(9)(C), if a control chart approach is used to evaluate water quality monitoring data, the specific type of control chart and its associated statistical parameter values (e.g., the upper control limit) shall be included in the supporting documentation as required by section 20415(e)(7). The discharger shall use the procedure only if this supporting documentation shows the procedure to be protective of human health and the environment. Any control charting procedure must have a false positive rate of no less than one percent for each monitoring point charted. For example, upper control limits on X bar or R Charts used only once every six months (where no composite retest is used) must be set at no more than 2.327 standard deviations of the statistic plotted for a one-sided statistical comparison, or at no more than 2.576 standard deviations of the statistic plotted for a two-sided statistical comparison.

- c. In the event that an approved data analysis method provides a preliminary indication that a given monitoring parameter has a measurably significant increase at a given well, the Discharger shall conduct a verification procedure (retest) in accordance with 27CCR section 20415(e)(8)(E).
- d. The verification procedure shall be performed only for the constituent(s) or parameter(s) that has shown "measurably significant" (see 27CCR section 20164) evidence of a release, and shall be performed only for those monitoring points at which a release is indicated.
- e. For any COC or monitoring parameter that is detectable at concentrations above its respective MDL in 10% or less of the background data to date, the constituent's concentration limit shall be its MDL. A measurable exceedance of this concentration limit shall be determined by application of the non-statistical analysis method described in Section II.A.7 of this MRP.
- f. Water Quality Monitoring Approach The monitoring approach used for each well/MPar pair shall be controlled by whether that MPar has exhibited a measurably significant increase at that well. Therefore, the Discharger shall monitor each well/MPar pair in one of two modes, as follows:
  - i. **Detection Mode -** For an MPar that has not produced a measurably significant increase at that well, the purpose of monitoring, for that well/MPar pair, is to watch for the MPar's arrival at that well at a concentration in excess of its respective Threshold Value; or;
  - ii. **Tracking Mode** For an MPar that has produced a measurably significant increase at a given well, the purpose of the monitoring, for that well/MPar pair, is to verify the suitability and effectiveness of the existing or proposed corrective measures by tracking changes in the MPar concentration at that location via an evolving concentration-versus-time plot. For any well/MPar pair in Tracking Mode, its Threshold Value automatically becomes the mean of its Concentration Limit (background data set), which should be plotted as a horizontal line on its concentration-versus-time plot. The goal is to indicate when the applied corrective action measures have brought the MPar's concentration down to, or below, this concentration. These plots shall be the primary input for the Discharger's twice-yearly analysis of the effectiveness of the corrective action measures.
- g. **Detection Mode Data Analyses -** The following applies to all detection mode data analyses:
  - i. **Monitoring Parameters Readily Detectable in Background -** At any given monitoring point, the Discharger shall apply an appropriate statistical analysis for each detection mode monitoring parameter that exceeds its respective MDL in at least 10% of the applicable background data set;
  - ii. **Monitoring Parameters Not Readily Detectable in Background** For any monitoring point at which one or more monitoring parameters, in detection mode, exceed their respective MDL in less than 10% of the applicable background data set, the Discharger shall analyze the data for these monitoring parameters via

the California Nonstatistical Data Analysis Method (CNSDAM) test described in Section II.A.7 of this MRP.

#### 7. California Nonstatistical Data Analysis Method (CNSDAM)

- a. Non-Statistical Method for Detection Mode for MPars Seldom Found in Background For any given compliance (downgradient) well, regardless of the monitoring program (detection monitoring, evaluation monitoring, or corrective action monitoring), the Discharger shall use this data analysis method, jointly, for all constituents on the "scope list" as described below:
  - Scope List The scope list subject to CNSDAM for a monitoring well shall constituent all Mpars for which less than 10% of the background data points exceed its MDL; and
  - ii. **Two Triggers** From the scope list, for an initial test (or, for a retest, the modified scope list under Section No. II.A.7.b below), the Discharger shall identify each MPar in the current sample from that well that exceeds either its respective MDL or PQL. The Discharger shall conclude that these exceeding MPars provide a preliminary indication (or, for a retest, provide a measurably significant indication) of a release of waste from the Landfill at that well, if either:
    - (a) Two or more of the MPars on a monitoring well's scope list exceed their respective MDL; or
    - (b) At least one of the MPars on a monitoring well's scope list equals or exceeds its respective PQL.
- b. Discrete Retest [27CCR section 20415(e)(8)(E)]:
  - i. In the event that the Discharger concludes (pursuant to Section II.A.7.a.ii above) that there is a preliminary indication, then the Discharger shall immediately notify Board staff by phone or e-mail and, within 30 days of such indication, shall collect two new (retest) samples from the indicating compliance well.
  - ii. For any given compliance well, the Discharger shall analyze the retest samples only for those constituents indicated in that well's original test, under Section II.A.7.a.ii of this MRP, and these indicated constituents shall comprise the well's "modified scope list." As soon as the retest data are available, the Discharger shall apply the same test (under Section II.B.7.a.ii above, but using this modified scope list) to separately analyze each of the two suites of retest data at that compliance well.
  - iii. If either (or both) of the retest samples trips either (or both) of the triggers under Section II.A.7.a.ii, then the Discharger shall conclude that there is a measurably significant increase at that well for the constituent(s) indicated in the validating retest sample(s). Furthermore, thereafter, the Discharger shall monitor the indicated constituent(s) in tracking mode at that well, shall remove the constituent(s) from the scope list created for that well, notify the Board in writing, and highlight this conclusion and these changes in the next scheduled monitoring report and in the Landfill's operating record.

8. **Groundwater Flow Direction** - The Discharger shall measure the water level in each well, at least semi-annually, including the times of expected highest and lowest elevations of the water level, and determine the presence of horizontal and vertical gradients, and groundwater flow rate and direction for the respective groundwater body.

#### **B. SITE INSPECTIONS**

The Discharger shall inspect the Landfill in accordance with the following schedule, and record, at a minimum, Standard Observations.

- 1. During the wet season (October through April), following each storm that produces storm water runoff, or on a monthly basis if no storm produces runoff during the month.
- 2. During the dry season, a minimum of one inspection shall be performed every three months.
- 3. Standard Observations during a site inspection shall include at least the following:
  - a. Evidence of any surface water leaving or entering the Landfill, estimated size of affected area, and estimated flow rate (show affected area on map).
  - b. Evidence of odors; presence or absence, characterization, source, and distance of travel from source.
  - c. Evidence of erosion and/or of exposed refuse.
  - d. Inspection of all storm water discharge locations for evidence of non-storm water discharges during dry seasons, and integrity during wet seasons.
  - e. Evidence of ponded water at any point on the waste management facility (show affected area on map).
  - f. Landscape and irrigation systems.
  - g. Integrity of all drainage systems.
  - h. Landfill gas collection system.
  - i. Site security.

#### PART III: SAMPLING AND ANALYTICAL PROCEDURES

## A. SAMPLING AND ANALYTICAL METHODS

Sample collection, storage, and analysis shall be performed according to the most recent version of Standard USEPA Methods (USEPA publication "SW-846"), and in accordance with a sampling and analysis plan acceptable to the Executive Officer. A State of California approved laboratory shall perform water analysis. Specific methods of analysis must be identified. The director of the laboratory whose name appears on the certification shall supervise all analytical work in his/her laboratory and shall sign reports of such work submitted to the Regional Board. In addition, the Discharger is responsible for seeing that the laboratory analysis of samples from all monitoring points meets the following restrictions:

- The methods of analysis and the detection limits used must be appropriate for the expected concentrations. For detection monitoring of any constituent or parameter that is found in concentrations which produce more than 90% non-numerical determinations (i.e., Trace) in historical data for that medium, the SW-846 analytical method having the lowest Method Detection Limit (MDL) shall be selected.
- 2. Trace results (results falling between the MDL and the Practical Quantitation Limit (PQL)) for organic compounds shall be reported as such.
- 3. MDL and PQL shall be derived by the laboratory for each analytical procedure, according to State of California laboratory accreditation procedures. Both limits shall reflect the detection and quantitation capabilities of the specific analytical procedure and equipment used by the laboratory. If the laboratory suspects that, due to a change in matrix or other effects, the true detection limit or quantitation limit for a particular analytical run differs significantly from the laboratory-derived values, the results shall be flagged accordingly, and an estimate of the limit actually achieved shall be included.
- 4. All quality assurance / quality control (QA/QC) data shall be reported, along with the sample results to which it applies, including the method, equipment, and analytical detection limits, the recovery rates, an explanation (corrective action) of any QA/QC measure that is outside the laboratory control limits, the results of equipment and method blanks, the results of spiked and surrogate samples, the frequency of quality control analysis, and the name and qualifications of the person(s) performing the analyses. Sample results shall be reported unadjusted for blank results or spike recovery.
- 5. Non-targeted chromatographic peaks shall be identified, quantified, and reported to a reasonable extent. When significant unknown peaks are encountered, second column or second method confirmation procedures shall be performed in an attempt to identify and more accurately quantify the unknown analyte(s).
- 6. QA/QC analytical results involving detection of common laboratory contaminants in any sample shall be reported and flagged for easy reference.
- 7. In cases where contaminants are detected in QA/QC samples (i.e. field, trip, or lab blanks), the accompanying sample results shall be appropriately flagged.
- 8. Proper chain of custody procedures shall be used in all sampling activities at the Landfill.
- No filtering of samples taken for organics analyses shall be permitted. Samples for organic analyses shall be taken with a sampling method that minimizes volatilization and degradation of potential constituents.
- 10. Thirty-Day Sample Procurement Limitation For any given monitored medium, the samples taken from all monitoring points to satisfy the data analysis requirements for a given reporting period shall all be taken within a span of thirty days, and shall be taken in a manner that insures sample independence to the greatest extent feasible [27 CCR section 20415(e)(12)(B)]. For any sampling event during which samples are not collected within thirty days, the Discharger shall report the sampling period in the corresponding semiannual report.

11. Groundwater sampling shall also include an accurate determination of the groundwater surface elevation and field parameters<sup>2</sup> (temperature, pH, electrical conductivity, turbidity) for that monitoring point [27 CCR section 20415(e)(13)]; groundwater elevations taken prior to purging the well and sampling for monitoring parameters shall be used to fulfill groundwater flow rate/direction analyses required under Section II.A.8 of this MRP. All field parameter measurements shall be included in the semiannual reports submitted to the Regional Board.

## B. RECORDS TO BE MAINTAINED

Analytical records shall be maintained by the Discharger or laboratory, and shall be retained for a minimum of five years. The period of retention shall be extended during the course of any unresolved litigation or when directed by the Executive Officer. Such records shall show the following for each sample:

- 1. Identity of sample and the actual monitoring point designation from which it was taken, along with the identity of the individual who obtained the sample.
- 2. Date and time of sampling.
- 3. Date and time that analyses were started and completed, and the name of personnel performing each analysis.
- 4. Complete procedure used, including method of preserving the sample, and the identity and volumes of reagents used.
- 5. Calculations of results; and
- 6. Results of analyses, and MDL and PQL for each analysis.

Ordered by Samuel Unper

Samuel Unger, P.E. Executive Officer Date: October 8, 2015

<sup>&</sup>lt;sup>2</sup> "Field parameters" may also be tested in a laboratory instead of being tested in the field.

Figure 1. Groundwater Well Locations

