

## DOCKETED

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## 5.14 Waste Management

This subsection discusses the potential effects on human health and the environment from nonhazardous and hazardous waste generated at the MREC project. Section 5.14.1 describes project site investigations and the waste and waste streams that would be generated by the project. Section 5.14.2 describes the project's environmental analysis in terms of waste and waste disposal sites. Section 5.14.3 discusses potential cumulative effects. Section 5.14.4 describes mitigation measures. Section 5.14.5 presents laws, ordinances, regulations, and standards (LORS) that apply to the generated waste. Section 5.14.6 describes agencies that have jurisdiction over the generated waste and specifies whom to contact in those agencies. Section 5.14.7 describes permits required for generated waste and a schedule for obtaining those permits, and Section 5.14.8 provides the references used to prepare this subsection.

### 5.14.1 Affected Environment

This subsection discusses the condition of the 9.79-acre MREC site and the potential need to remove or otherwise treat contaminated soil or groundwater at the site. Additionally, this section identifies the various nonhazardous and hazardous waste streams for MREC construction and operation.

#### 5.14.1.1 Site Investigations

A Phase I ESA was conducted in September 2015 by Padre Associates, Inc., for the MREC site (Padre Associates, Inc., 2015) (see Appendix 5.14A). The ESA was conducted in accordance with methods prescribed by the American Society for Testing and Materials document entitled "Standard Practice for Environmental Site Assessments: Phase 1 Environmental Site Assessment Process (Designation: E 1527-13)."

The Phase I ESA report concluded:

*...the Project Site was historically utilized as an automobile salvage yard, which is a potential recognized environmental condition (REC). However, based on the fact that petroleum hydrocarbon-stained surface soils were reportedly excavated and remediated at the Project Site in 1991, and that the parcel has almost entirely been resurfaced with asphalt-concrete and concrete, no additional action or assessment is recommended regarding the historical use of the Project Site.*

According to the Phase I ESA, potential human health risks are likely to be minimal when considering the future intended use of the project site for industrial purposes. The proposed MREC property parcel requires no further investigation before redevelopment.

#### 5.14.1.2 Project Waste Generation

Wastewater, nonhazardous waste, and hazardous waste will be generated at the MREC site during facility construction and operation.

##### **Construction Phase**

During construction, the primary waste generated will be nonhazardous waste. However, some hazardous waste will also be generated. All of the hazardous wastes will be generated at the plant site. The types of waste and their estimated quantities are described below. Typical wastes generated during construction and demolition are identified in Table 5.14-1.

**Table 5.14-1 Potential Wastes Generated during Construction**

<b>Waste</b>	<b>Origin</b>	<b>Composition</b>	<b>Estimated Quantity</b>	<b>Classification</b>	<b>Disposal</b>
Scrap wood, steel, glass, plastic, paper, calcium silicate insulation, and mineral wool insulation	Construction waste	Normal refuse	130 tons	Nonhazardous	Recycle and/or dispose of at a Class II or III landfill
Concrete waste	Construction	Solids	120 tons	Nonhazardous	Recycle and/or dispose of at Class III Landfill
Scrap metals	Construction	Parts, wire, containers	10 tons	Nonhazardous	Recycle and/or dispose of at a Class III landfill
Concrete from demolition	Removal of existing surfacing	Solids	<1 ton	Nonhazardous	Recycle and/or dispose of at Class III Landfill
Metal from demolition	Disposal of onsite scrap	Solids	<1 ton	Nonhazardous	Recycle and/or dispose of at a Class III landfill
Sanitary waste	Portable toilet holding tanks	Water	1,500 gpd	Nonhazardous liquid	Remove by contracted sanitary service
Empty hazardous material containers	Construction	Drums, containers, and totes	100 each	Hazardous and nonhazardous solids	Dispose of containers <5 gallons as normal refuse Return containers >5 gallons to vendors for recycling or reconditioning
Spent welding materials	Construction	Solid	4,000 lb	Hazardous	Dispose of at a Class I landfill
Waste oil	Construction equipment and vehicles	Hydrocarbons	400 gallons	Non-RCRA hazardous liquid	Dispose of at a permitted TSD facility
Waste oil filters	Construction equipment and vehicles	Solids	2,000 lb	Hazardous	Recycle at a permitted TSD facility
Used and waste lube oil	CTG lube oil flushes	Hydrocarbons	4,000 gallons	Hazardous	Recycle at a permitted TSD facility
Oily rags, oil sorbent excluding lube oil flushes	Clean up of small spills	Hydrocarbons	1,000 l.	Hazardous	Recycle or dispose of at a permitted TSD facility
Solvents, paint, and adhesives	Maintenance	Solvents	1,000 gallons	Hazardous	Recycle at a permitted TSD facility
Spent lead acid batteries	Equipment	Heavy metals	100 lb	Hazardous	Store no more than 10 batteries (up to 1 year) – recycle offsite
Spent alkaline batteries	Equipment	Metals	100 lb	Universal Waste solids	Recycle or dispose of offsite at an Universal Waste Destination Facility

Table 5.14-1 Potential Wastes Generated during Construction

Waste	Origin	Composition	Estimated Quantity	Classification	Disposal
Passivating and chemical cleaning fluid waste	Pipe cleaning and flushing	Water	10,000 gallons once before initial start up	Hazardous or nonhazardous liquid	Sample and characterize – manage accordingly and dispose of appropriately offsite
Hydrotest water	Testing equipment and piping integrity	Water	150,000 gallons	Hazardous or nonhazardous liquid	Sample and characterize – manage accordingly and dispose of appropriately offsite

RCRA = Resource Conservation and Recovery Act  
TSD = treatment, storage, and disposal

**Nonhazardous Solid Waste.** The nonhazardous waste streams listed below could potentially be generated from construction of the generating facility and the electric transmission line.

**Paper, Wood, Glass, and Plastics—**Approximately 130 tons of paper, wood, glass, and plastics will be generated from packing materials, waste lumber, insulation, and empty nonhazardous chemical containers during project construction. These wastes will be recycled where practical. Waste that cannot be recycled will be disposed of weekly at a Class III landfill. Onsite, the waste will be placed in dumpsters.

**Concrete—**Approximately 120 tons of excess concrete will be generated during construction of the facility. Waste concrete will be disposed of weekly at a Class III landfill or at clean fill sites, if available, or will be recycled and disposed of at a construction and demolition site.

**Metal—**Approximately 10 tons of metal, including steel from welding/cutting operations, packing materials, and empty nonhazardous chemical containers, and aluminum waste from packing materials and electrical wiring will be generated during construction. Waste will be recycled where practical, and non-recyclable waste will be deposited in a Class III landfill.

**Wastewater.** Wastewater generated during construction will include sanitary waste, stormwater runoff, equipment washdown water, and water from excavation dewatering during construction (if dewatering is required). These wastewaters could be classified as hazardous or nonhazardous depending on their chemical quality. As discussed, wastewater would be sampled and disposed of if found hazardous. Methods for disposing of nonhazardous wastewaters are identified in Section 5.14.1.2.2.

**Hazardous Waste.** Most hazardous waste generated during construction will consist of water from excavation dewatering (if it contains contaminants), flushing and cleaning fluids, passivating fluid (to prepare pipes for use), and solvents. Other hazardous waste, such as welding materials and dried paint, also may be generated during construction.

When pipes are cleaned and flushed, waste will be generated. The volume of flushing and cleaning waste generated is estimated to be one to two times the internal volume of the pipes cleaned. The quantity of welding, solvent, and paint waste is expected to be minimal. Wastewaters generated during construction could also be considered hazardous, if demonstrated so by sampling. Methods for recycling and disposing of hazardous wastes during construction are described in Section 5.14.4.1.2.

## Operation Phase

During MREC facility operation, the primary waste generated will be nonhazardous waste. However, varying quantities of hazardous waste also will be generated periodically. The types of wastes and their estimated quantities are discussed below.

**Nonhazardous Waste.** The MREC will produce facility wastes typical of power generation facility O&M activities. These wastes will include rags, turbine air filters, broken and rusted metal and machine parts, defective or broken electrical materials, empty containers, typical refuse generated by workers and small office operations, and other miscellaneous solid wastes. The quantity of all solid nonhazardous waste generated is estimated to be approximately 39 TPY. Large metal parts will be recycled.

**Nonhazardous Wastewater.** The water balance schematic diagrams, provided in Figures 2.3-5a and 2.3-5b of Section 2.0, illustrate the expected waste streams and describe the waste stream flow rates. The wastewater collection system will collect sanitary wastewater from sinks, toilets, and other sanitary facilities.

General facility drainage will consist of area washdown, sample drains, equipment leakage, and drainage from facility equipment areas. Water from these areas will be collected in a system of floor drains, hub drains, sumps, and piping, and will be routed to the facility's concrete-lined wastewater sump. Water from this sump will be sampled and analyzed at an approved lab. If contamination is present, the water will be trucked offsite for disposal at an approved wastewater disposal facility. If sampling results show no contamination, the water will be discharged to the stormwater drainage system.

**Hazardous Waste.** Hazardous waste generated will include waste lubricating oil, used oil filters from turbine equipment, spent catalysts, and chemical cleaning wastes. The catalyst units will contain heavy metals considered hazardous. Chemical cleaning wastes, which consist of alkaline and acidic cleaning solutions, will be generated from periodic pipe cleaning. These wastes may contain high concentrations of heavy metals and will be collected for offsite disposal.

The chemical feed area drains will collect spillage, tank overflows, effluent from maintenance operations, and liquid from area washdowns. Water collected will be sampled and, if it is not contaminated, released. The quantity of this effluent is expected to be minimal.

The facility will use lithium-ion and/or redux flow batteries. Battery providers will be required.

Wastes potentially generated during operations at the facility are summarized in Table 5.14-2.

Table 5.14-2 Potential Wastes Generated during Operations

Waste	Origin	Composition	Estimated Quantity	Classification	Disposal
Lubricating oil	Small leaks and spills from the gas-turbine lubricating-oil system	Hydrocarbons	~400 gallons/year	Hazardous	Cleaned up using sorbent and rags—disposed of by certified oil recycler
Lubricating oil filters	Gas-turbine lubricating-oil system	Paper, metal, and hydrocarbons	~600 lb/year	Hazardous	Recycled or disposed of by certified oil recycler
SCR catalyst units	SCR system (use tends to be 15 years)	Metal and heavy metals, including vanadium	295,000 lb every 15 years	Hazardous	Recycled by SCR manufacturer or disposed of at Class I landfill
CO catalyst units	CO catalyst (use tends to be 5 years)	Metal and heavy metals	None - reclaimed	Hazardous	Recycled by manufacturer

Table 5.14-2 Potential Wastes Generated during Operations

Waste	Origin	Composition	Estimated Quantity	Classification	Disposal
Oily rags	Maintenance, wipe-down of equipment, etc.	Hydrocarbons, cloth	~520 lb/year (~1,200 rags/year)	Hazardous	Recycled or disposed of by certified oil recycler
Oil sorbents	Clean up of small spills	Hydrocarbons	~100 lb/year	Hazardous	Recycled or disposed of by certified oil recycler
Deionization trailer unit	Water treatment process	Metal and resins	Up to 173 trailers per year of operation	Nonhazardous	Recycled by water treatment manufacturer
Industrial sewer/offsite disposal	Oil-water separator effluent treatment	Industrial Wastewater	50 gallons/year	Hazardous/Non hazardous	Oil recycled by certified oil recycler Water discharged to privately owned industrial wastewater processor
Batteries	Energy Storage System	Lithium ion/flow	25 MW	Hazardous	Returned to manufacturer for recycling

## 5.14.2 Environmental Analysis

### 5.14.2.1 Significance Criteria

A project would have a significant effect on the environment in terms of waste management if it meets the following criteria (CEQA Guidelines Section 15002[g], Appendix G):

- Be located on a site that is included on a list of hazardous materials sites (Cortese List) compiled pursuant to Government Code Section 65962.5 and, as a result, would create a significant hazard to the public or the environment
- Have solid waste disposal needs beyond the capacity of appropriate landfills to accommodate them

The risks or hazards posed by the transportation of hazardous materials, including hazardous wastes, are described and analyzed in Section 5.5, Hazardous Materials Handling.

### 5.14.2.2 Cortese List

An examination of the Department of Toxic Substance Control (DTSC) Hazardous Waste and Substances Site List (Cortese List) compiled pursuant to Government Code Section 65962.5 shows there are no sites currently on the list within 1,000 feet of the MREC site (DTSC, 2015a). The closest listed site is the Pacific Coast Pipelines Superfund site in Fillmore, California, which is 14.5 miles from the proposed MREC site. As discussed previously, the MREC site is not located on impacted soil or groundwater. Thus, it is highly unlikely that any impacts will result from Cortese-listed properties, nor will the MREC site present a significant hazard to the public or the environment.

### 5.14.2.3 Solid Waste Disposal

Nonhazardous waste (often referred to as municipal waste, or garbage) will be recycled or deposited at a Class III landfill. Hazardous wastes will be delivered to a permitted offsite TSD facility for treatment or

recycling, or will be deposited at a permitted Class I landfill. The following subsections describe the waste disposal sites feasible for disposal of MREC wastes.

### **Nonhazardous Waste**

Approximately 205 tons of nonhazardous waste will be generated during MREC construction, and nonhazardous waste will continue to be generated during its operation. Other nonhazardous wastes will be recycled to the extent possible, and what cannot be recycled will be disposed of at a permitted landfill as discussed below.

It is anticipated that all excavated soil will be used onsite for grading and leveling purposes. In the event that some excavated soil is not reused onsite, it would be classified for disposal on the basis of sampling completed once the soil is excavated and stockpiled. Soil determined to be nonhazardous could be suitable for reuse at a construction site or disposal at a regional disposal facility, depending on the chemical quality.

The nearest landfill sites serving the MREC vicinity, including portions of unincorporated Ventura County and the city of Santa Paula, include Toland Road Landfill and Simi Valley Landfill and Recycling Center. Before disposal at one of the landfills, waste would be processed at one of the Ventura County transfer stations.

The Toland Road Landfill is located at 3500 North Toland Road, Santa Paula, California. It is an active solid waste landfill with a 91-acre disposal area. Toland Road Landfill accepts mixed municipal waste, construction and demolition debris, industrial waste, biosolids, and agricultural waste. No enforcement actions or areas of concern (AOCs) have been identified at the facility since 2012 (California Department of Resources Recycling and Recovery [CalRecycle], 2015a). In December 2011 and October 2012, two nuisance odor complaints were received for odor from a biosolids unit. The odor complaint has not recurred, according to CalRecycle records of inspections by the Local Enforcement Agency (CalRecycle, 2015a).

The Simi Valley Landfill and Recycling Center is located at 2801 Madera Road, Simi Valley, California. As an active solid waste landfill operated by Waste Management of California, Simi Valley accepts mixed municipal, construction and demolition debris, industrial, and biosolids. A third party operates a chipping and grinding facility for greenwaste. The disposal area currently covers 368 acres, and the entire facility comprises 887 acres. For the most part, state records show the facility has been in compliance with applicable regulations, with the exception of a minor litter problem identified during a July 2015 inspection, landfill gas detections above the required compliance levels (2009 through 2013), and elevated temperatures in greenwaste piles at its chipping and grinding facility in October 2013 and March 2015 (CalRecycle, 2015a). However, this facility is situated near oil fields and elevated gas levels were determined to be largely naturally occurring. No landfill gas exceedances were reported in 2014 or 2015. No enforcement actions have been taken at the facility in the past 5 years, according to the SWIS database (CalRecycle, 2015a).

Gold Coast Recycling and Transfer Station, operated by Harrison Industries, is located at 5275 Colt Street in Ventura, California. It is permitted as a large-volume transfer and processing facility, comprising 2 acres and accepting mixed municipal waste (Harrison Industries, 2015). The waste is processed for material recovery, then the remaining waste that cannot be recycled is transported to one of the area landfills for disposal (Harrison, 2015). The facility has had several AOCs noted during recent inspections, including vector control (birds), dust control, and road sweeping, but no notices of violation (NOVs) or enforcement actions in the past 5 years. Del Norte Transfer Station in Oxnard has had AOCs as well, plus a notice of violation in 2013 for inadequate lighting, but no enforcement actions in the past 5 years (CalRecycle, 2015a).

E.J. Harrison, Inc. (Harrison Industries) is one of the local service providers for residential, commercial, and industrial solid waste hauling that services the unincorporated area of Ventura County

(Harrison, 2015). The county has franchise agreements with 13 local haulers for commercial waste pick up and disposal (McCullough, 2015). The primary disposal facility is the publicly owned and operated Toland Road Landfill located in Santa Paula, California, approximately 10 miles northeast of the MREC site. The Toland Road Landfill has adequate capacity to handle and dispose of solid waste generated by the MREC facility, as shown in Table 5.14-3. The Toland Road Landfill, operated by the Ventura Regional Sanitation District, accepts commercial loads of nonhazardous waste processed through a Ventura County transfer station or materials recycling facility. The other landfill included in this table, Simi Valley Landfill, is a likely alternative to the Toland Road Landfill.

Table 5.14-3 Solid Waste Disposal Facilities in the Vicinity of the MREC

Landfill/ Transfer Station	Location	Class	Permitted Capacity <sup>a</sup> (cubic yards)	Remaining Capacity a (cubic yards)	Permitted Throughput <sup>a</sup> (tons per day)	Estimated Closure Date <sup>a</sup>	Violation of Minimum State Standards Noted <sup>a</sup>
Toland Road Landfill	Santa Paula, CA	III	30,000,000	21,983,000	1,500	05/31/2027	No
Simi Valley Landfill and Recycling Center	Simi Valley, CA	III	119,600,000	119,600,000	9,250	01/31/2052	Yes (3/15 and 7/15)
Gold Coast Recycling and Transfer Station	Ventura, CA	NA	NA	NA	440	NA	Yes (AOCs only - 3/15. 7/15, 8/15)
Del Norte Recycling and Transfer Station	Oxnard, CA	NA	NA	NA	2,779	NA	Yes (NOV – 7/13 & 8/13)

Notes:

<sup>a</sup> Based on CalRecycle SWIS Database (CalRecycle, 2015a)

According to CalRecycle, the Toland Road Landfill has a total capacity of more than 30 million cubic yards of refuse and the estimated remaining capacity as of June 1, 2006, was more than 21.9 million cubic yards.

Adequate landfill capacity exists; therefore, disposal of nonhazardous waste will not be a constraint on MREC development. Impacts related to landfill capacity will be less than significant.

### Hazardous Waste

Hazardous waste generated at the MREC facility will be stored at the facility for less than 90 days. The waste will then be transported to a TSD facility by a permitted hazardous waste transporter. These facilities vary considerably in what they can do with the hazardous waste they receive. Some can only store waste, some can treat the waste to recover usable products, and others can dispose of the waste by incineration, deep-well injection, or landfilling. (Incineration and deep-well injection of these materials are not permitted in California.)

According to DTSC, 156 facilities in California can accept batteries, used oil, solvents, and other hazardous waste for treatment, recycling, or disposal (DTSC, 2015b). For ultimate disposal, California has two active hazardous waste (Class I) landfills: Waste Management's Kettleman Hills Landfill and Clean Harbors' Buttonwillow Landfill.



**Waste Management Kettleman Hills Landfill.** This landfill accepts Class I and II waste. The B-18 landfill is permitted for and will accept all hazardous wastes except radioactive, medical, and unexploded ordnance. Currently, B-18 landfill phase 1 and 2 are in operation with a permitted capacity of 10.7 million cubic yards. B-18 phase 1 and 2 are near capacity, but B-18 phase 3 will be opening with a permitted capacity of approximately 5 million cubic yards and a life expectancy of 8 years (Henry, 2012). After B-18 closes, a new B-20 landfill will be opened on currently undeveloped land on the site. B-20 has a permitted capacity of 15 million cubic yards and a life expectancy of 24 years (Henry, 2012). As a whole, Kettleman Hills Landfill will be accepting waste for the next 32 years, until 2044. However, they are continuously searching for more expansion opportunities (Henry, 2012).

**Clean Harbors Buttonwillow Landfill.** This landfill is permitted at 13.1 million cubic yards and can accept 4,050 tons per day (Linton, 2012). As of January 2012, it is approximately 2 percent full (Linton, 2012). The landfill is permitted to accept waste until 2040 (CalRecycle, 2015a). Buttonwillow has been permitted to manage a wide range of hazardous wastes, including RCRA hazardous wastes, California hazardous waste, and nonhazardous waste for stabilization treatment, solidification, and landfill. The landfill can handle waste in bulk (solids and liquids) and in containers. Typical waste streams include nonhazardous soil, California hazardous soil, hazardous soil for direct landfill, hazardous waste for treatment of metals, plating waste, hazardous and nonhazardous liquid, and debris for microencapsulation (Clean Harbors, 2015).

**Additional Facilities.** In addition to hazardous waste landfills, there are numerous offsite commercial hazardous waste treatment and recycling facilities in California. Some facilities located in southern California that may be used by MREC include Demenno/Kerdoon in Compton, Evergreen Environmental Services in Carson (Safety Kleen), Rho-Chem, LLC in Inglewood, Crosby & Overton in Long Beach, and Clean Harbors in Wilmington (DTSC, 2015b).

#### 5.14.2.4 Waste Disposal Summary

The MREC will generate nonhazardous waste that will add to the total waste generated in Ventura County and in California. However, there is adequate recycling and landfill capacity in California to recycle and dispose of the waste generated by MREC. It is estimated that MREC will generate approximately 205 tons of solid waste during construction (including approximately 1 ton of hazardous waste) and approximately 9,070 tons a year from operations. Considering that 1,030,539 tons of solid waste were landfilled in Ventura County in 2013, MREC's contribution will likely represent less than 1 percent of the county's total waste generation (CalRecycle, 2015b). Therefore, the impact of the project on solid waste recycling and disposal capacity will not be significant.

Hazardous waste generated will consist of waste oil, filters, SCR and oxidation catalysts, and fluids used to clean piping. The waste oil, catalysts, and the deionization trailer unit will be recycled. Hazardous waste treatment and disposal capacity in California is more than adequate. Therefore, the effect of MREC on hazardous waste recycling, treatment, and disposal capability will not be significant.

#### 5.14.3 Cumulative Effects

A cumulative impact refers to a proposed project's incremental effect together with other closely related past, present, and reasonably foreseeable future projects whose impacts may compound or increase the incremental effect of the proposed project (PRC § 21083; CCR, Title 14, §§15064[h], 15065[c], 15130, and 15355).

The quantities of nonhazardous and hazardous wastes that would be generated during MREC construction and operation would be relatively low: an estimated 205 tons of solid waste during construction and approximately 9,070 TPY during operation. Recycling efforts would be prioritized wherever practical, and capacity is available in a variety of treatment and disposal facilities. Sufficient

landfill capacity is available in the project area. Therefore, the added waste quantities generated by the MREC would not result in significant cumulative waste management impacts.

#### 5.14.4 Mitigation and Waste Management Methods

The handling and management of waste generated by MREC will follow the hierarchical approach of source reduction, recycling, treatment, and disposal. The first priority will be to reduce the quantity of waste generated through pollution prevention methods (for example, high-efficiency cleaning methods). The next level of waste management will involve reusing or recycling wastes (for example, used oil recycling). For wastes that cannot be recycled, treatment will be used, if possible, to make the waste nonhazardous (for example, neutralization). Finally, offsite disposal will be used for residual wastes that cannot be reused, recycled, or treated.

The following subsections present methods for managing nonhazardous and hazardous waste generated by MREC.

##### 5.14.4.1 Construction Phase

Handling requirements and mitigation measures for handling wastes during construction are described in the following subsections.

###### **Nonhazardous Wastes**

Nonhazardous waste generated during construction will be collected in onsite dumpsters and picked up periodically by E.J. Harrison & Sons (doing business as Santa Clara Valley Disposal). The waste then will be taken to the Toland Road Landfill in Santa Paula, or the Simi Valley Landfill in Simi Valley. Recyclable materials will be segregated and transported by E.J. Harrison or other private haulers to an area recycling facility. E.J. Harrison can provide drop boxes or debris boxes for large quantities of recyclables.

Wastewater generated during construction will include sanitary waste and could include excavation dewatering water, equipment washwater, and stormwater runoff. Sanitary waste will be collected in portable, self-contained toilets. Excavation dewatering water will be contained in portable tanks and sampled before offsite disposal. Equipment washwater will be contained at designated wash areas and will be disposed of offsite. Stormwater runoff will be managed in accordance with a stormwater management permit, which will be obtained before construction starts. Nonhazardous wastewater generation will be minimized by water conservation and reuse measures.

###### **Hazardous Wastes**

Most hazardous waste generated during construction will consist of excavation dewatering water, flushing and cleaning fluids, passivating fluids, and solvents. Some waste in the form of welding materials and dried paint also may be generated. Nonhazardous materials will be used whenever possible to minimize the quantity of hazardous waste generated. The construction contractor will be the generator of hazardous construction waste and will be responsible for proper handling in compliance with all applicable federal, state, and local laws and regulations, including licensing, training of personnel, accumulation limits and times, and reporting and recordkeeping. The hazardous waste will be collected in satellite accumulation containers near the points of generation. This waste will be moved daily to the contractor's 90-day hazardous waste storage area, located at the plant construction laydown area. The waste will be delivered to an authorized hazardous waste management facility before expiration of the 90-day storage limit.

##### 5.14.4.2 Operation Phase

Handling requirements and mitigation measures for the handling of wastes during operation are described in the following sections.

### **Nonhazardous Wastes**

Wastewater from facility sinks, toilets, and showers will be disposed of to the sanitary sewer.

Nonhazardous waste will be collected and deposited in a local landfill. Whenever practical, recycling will be implemented throughout the facility to minimize the quantity of nonhazardous waste that must be disposed of in a landfill.

### **Hazardous Wastes**

To avoid the potential effects on human health and the environment from handling and disposing of hazardous wastes, procedures will be developed to ensure proper labeling, storage, packaging, recordkeeping, and disposal of all hazardous wastes. The following general procedures will be employed:

- The MREC will be classified as a hazardous waste generator and will obtain a site-specific EPA identification number that will be used to manifest hazardous waste from the MREC facility. Hazardous waste from the MREC facility will be stored onsite for less than 90 days before offsite disposal, treatment, or recycling.
- Hazardous wastes will be accumulated at the generating facility according to the CCR Title 22 requirements for satellite accumulation.
- Hazardous wastes will be stored in appropriately segregated storage areas surrounded by berms to contain leaks and spills. The bermed areas will be sized to hold the full contents of the largest single container and, if not roofed, will be sized for an additional 20 percent to allow for rainfall. These areas will be inspected daily.
- Hazardous wastes will be collected by a licensed hazardous waste hauler using a hazardous waste manifest. Wastes will be shipped only to authorized hazardous waste management facilities. Biannual hazardous waste generator reports will be prepared and submitted to the DTSC. Copies of manifests, reports, waste analyses, and other documents will be kept onsite and will remain accessible for inspection for at least 3 years.
- Employees will be trained in hazardous waste procedures, spill contingencies, and waste minimization.
- Procedures will be developed to reduce the quantity of hazardous waste generated. Nonhazardous materials will be used instead of hazardous materials whenever practical, and wastes will be recycled whenever practical.

Specifically, hazardous waste handling will include the following practices. Handling of hazardous wastes in this way will minimize the quantity of waste deposited to landfills:

- Waste lubricating oil will be recovered and recycled by a waste oil recycling contractor.
- Spent oil filters and oily rags will be recycled.
- Spent SCR and oxidation catalysts will be recycled by the supplier, if possible, or disposed of in a Class I landfill.

#### 5.14.4.3 Facility Closure

When MREC is closed, both nonhazardous and hazardous wastes must be handled properly. Closure can be temporary or permanent. Temporary closure would be for a period greater than the time required for normal maintenance, including overhaul or replacement of the combustion turbines. Causes for temporary closure could be a disruption in the supply of natural gas; flooding of the site; or damage to the plant from earthquake, fire, storm, or other natural causes. Permanent closure would consist of a cessation in operations with no intent to restart operations and could result from the age of the plant,

damage to the plant beyond repair, economic conditions, or other unforeseen reasons. Handling of wastes for these two types of closure are discussed below.

### **Temporary Closure**

For a temporary closure, where there is no release of hazardous materials, facility security will be deployed on a 24-hour basis, and the CEC will be notified. Depending on the length of shutdown necessary, a contingency plan for the temporary cessation of operations will be implemented. This plan will be prepared as described in section 2.3. The plan will be developed to ensure conformance with all applicable LORS and the protection of public health and safety and the environment. The plan, depending on the expected duration of the shutdown, could include draining all chemicals from storage tanks and other equipment, and the safe shutdown of all equipment. All wastes will be disposed of according to applicable LORS, as discussed in Section 5.14.5.

If the temporary closure is in response to facility damage, or where there is a release or threatened release of hazardous waste or materials into the environment, procedures will be followed as set forth in the applicable risk management, spill control, or emergency action plans. Procedures include methods to control releases, notification of applicable authorities and the public, emergency response, and training for generating facility personnel in responding to and controlling releases of hazardous materials and hazardous waste. Once the immediate problem of hazardous waste and materials release is contained and cleaned up, temporary closure will proceed as described for a closure where there is no release of hazardous materials or waste.

### **Permanent Closure**

The planned life of the generation facility is 30 years, although operation could be longer. When the facility is permanently closed, the handling of nonhazardous and hazardous waste and hazardous materials will be part of a general closure plan that will attempt to maximize the recycling of facility components. Unused chemicals will be sold back to the suppliers or other purchasers or users. All equipment containing chemicals will be drained and shut down to protect public health and safety and the environment. All nonhazardous wastes will be collected and disposed of in appropriate landfills or waste collection facilities. All hazardous wastes will be disposed of according to applicable LORS. The site will be secured 24 hours per day during the MREC decommissioning activities.

### **Monitoring**

Because the environmental impacts caused by construction and operation of the facility are expected to be minimal, extensive monitoring programs will not be required. Generated waste, both nonhazardous and hazardous, will be monitored during MREC construction and operation in accordance with the monitoring and reporting requirements mandated by the regulatory permits to be obtained for construction and operation.

## **5.14.5 Laws, Ordinances, Regulations, and Standards**

Nonhazardous and hazardous waste handling at the MREC will be governed by federal, state, and local laws. Applicable laws and regulations address proper waste handling, storage, and disposal practices to protect the environment from contamination and to protect facility workers and the surrounding community from exposure to nonhazardous and hazardous waste. Table 5.14-4 presents a summary of the LORS applicable to waste handling at the MREC.

Table 5.14-4 LORS for Waste Management

<b>Laws, Ordinances, Regulations, and Standards</b>	<b>Requirements/Applicability</b>	<b>Administering Agency</b>	<b>AFC Section Explaining Conformance</b>
<b>Federal</b>			
RCRA Subtitle D	Regulates design and operation of nonhazardous solid waste landfills. MREC solid waste will be collected and disposed of by a collection company in conformance with Subtitle D.	CalRecycle	Sections 5.14.5.1, 5.14.4.1, 5.14.4.2.1, 5.14.1.2.2
RCRA Subtitle C	Controls storage, treatment, and disposal of hazardous waste. Hazardous waste will be handled by contractors in conformance with Subtitle C.	DTSC	Sections 5.14.5.1, 5.14.4.1.2, 5.14.4.2.2, 5.14.1.2.2
CWA	Controls discharge of wastewater to the surface waters of the United States.	RWQCB	Sections 5.14.5.1, 5.14.4.1.1, 5.14.4.2.1
<b>State</b>			
CIWMA	Controls solid waste collectors, recyclers, and depositors. MREC solid waste will be collected and disposed of by a collection company in conformance with CIWMA.	CalRecycle	Sections 5.14.5.2, 5.14.4.1, 5.14.4.2.1, 5.14.1.2.2
HWCL	Controls storage, treatment, and disposal of hazardous waste. Hazardous waste will be handled by contractors in conformance with the HWCL.	DTSC	Sections 5.14.5.2, 5.14.4.1.2, 5.14.4.2.2, 5.14.1.2.2
Porter-Cologne Water Quality Control Act	Controls discharge of wastewater to surface waters and groundwaters of California.	RWQCB	Sections 5.14.5.2, 5.14.4.1.1, 5.14.4.2.1
California Fire Code	Controls storage of hazardous materials and wastes and the use and storage of flammable/combustible liquids. Wastes will be accumulated and stored in accordance with Fire Code requirements. Permits for storage containers will be obtained, as needed, from the VCFD.	VCFD	Section 5.14.7, 5.14.5.4, 5.14.4.2.2
<b>Local</b>			
Ventura County Ordinance Code	Provides guidance for local management of solid waste and household hazardous waste (incorporates the county's Source Reduction and Recycling Elements, which detail means of reducing commercial and industrial sources of solid waste). Waste will be recycled in a manner consistent with applicable LORS.	Ventura County Solid Waste Management Department	Section 5.14.6, 5.14.7, 5.14.5.3, 5.14.4.2.2
Ventura County Resource Management Agency, Environmental Health Division, Hazardous Materials Program - CUPA various programs	Ventura County Environmental Health Division's Hazardous Materials Program is CUPA for Ventura County that regulates and conducts inspections of businesses that handle hazardous materials, hazardous wastes, and/or have underground storage tanks. MREC will comply with Ventura County's Hazardous Materials Program requirements concerning storage and handling of hazardous materials and wastes and will also cooperate with the agency on resolution of any environmental issues at the site.	Ventura County Resource Management Agency Environmental Health Division	Section 5.14.6, 5.14.7, 5.14.5.3, 5.14.4.2.2

## Notes:

CIWMA= California Integrated Waste Management Act

HWCL = Hazardous Waste Control Law

## 5.14.5.1 Federal LORS

EPA regulates wastewater under the CWA. The federal statute that controls nonhazardous and hazardous waste is RCRA 42 USC 6901, et seq. RCRA's implementing regulations are found in 40 CFR

260, et seq. Subtitle D assigns responsibility for the regulation of nonhazardous waste to the states; federal involvement is limited to establishing minimum criteria that prescribe the best practicable controls and monitoring requirements for solid waste disposal facilities. Subtitle C controls the generation, transportation, treatment, storage, and disposal of hazardous waste through a comprehensive “cradle-to-grave” system of hazardous waste management techniques and requirements. It applies to all states and to all hazardous waste generators (above certain levels of waste produced). MREC will conform to this law in its generation, storage, transport, and disposal of any hazardous waste generated at the facility. EPA has delegated its authority for implementing the law to the State of California.

#### 5.14.5.2 State LORS

Wastewater is regulated by the State Water Quality Control Boards and RWQCBs under the Porter-Cologne Water Quality Control Act. Nonhazardous waste is regulated by CIWMA of 1989, found in PRC Section 40000, et seq. This law provides an integrated statewide system of solid waste management by coordinating state and local efforts in source reduction, recycling, and land disposal safety. Counties are required to submit Integrated Waste Management Plans to the state. This law directly affects Contra Costa County and the solid waste hauler and disposer that will collect MREC solid waste. It also affects MREC to the extent that hazardous wastes are not to be disposed of along with solid waste.

RCRA allows states to develop their own programs to regulate hazardous waste. The programs must be at least as stringent as RCRA. California has developed its own program in HWCL (Health and Safety Code Section 25100, et seq.). Because California has elected to develop its own program, HWCL performs essentially the same regulatory functions as RCRA and is the law that will regulate hazardous waste at MREC. However, HWCL includes hazardous wastes not classified as hazardous waste under RCRA. Because hazardous wastes will be generated at the MREC facility during construction and operation, HWCL will require the Applicant to adhere to storage, recordkeeping, reporting, and training requirements for these wastes.

#### 5.14.5.3 Local LORS

For solid nonhazardous waste, the laws are administered and enforced primarily by the Ventura County Department of Public Works Integrated Waste Management Division and the RWQCB. The Ventura County Resource Management Agency’s Environmental Health Division, Hazardous Materials Program, will advise on the health effects of leaks and spills of hazardous materials and hazardous waste. Ventura County Environmental Health Division will serve as CUPA for the MREC.

Local agency requirements and LORS associated with the project will be addressed before the construction and operation of the facility, and the facility would conform to all local requirements. These include the need to file a HMBP with the Ventura County Environmental Health Division that will permit the storage of hazardous materials and wastes in accordance with state and local regulations. The HMBP will be filed with the Ventura County Environmental Health Division and will be updated annually in accordance with applicable regulations.

For emergency spills, Ventura County has a countywide Hazardous Materials Team consisting of response personnel who have completed formal training in hazardous materials incident response. The team is located at the VCFD headquarters in Camarillo, (approximately 35- to 45-minute response time to the MREC site), but other stations can respond to small-scale hazardous materials incidents, so the nature and extent of the emergency will determine which station or engine responds first. The closest fire station to the MREC is the Saticoy Station 26, at 12391 West Telegraph Road, Santa Paula, California. The station is approximately 2.2 miles away by road and would most likely provide the first response to a fire at the MREC site, with an approximate 5 to 6 minute average response time. Station 26 is capable of handling small-scale situations with hazardous materials.

All wastes generated by the MREC will be managed in a manner consistent with applicable LORS.

#### 5.14.5.4 Codes

The design, engineering, and construction of hazardous waste storage and handling systems will be in accordance with all applicable codes and standards:

- The Uniform Fire Code
- The Uniform Building Code
- The Uniform Plumbing Code
- CBC
- California Fire Code
- Contra Costa County Code

#### 5.14.6 Agencies and Agency Contacts

Several agencies, including EPA at the federal level and DTSC and Cal-EPA at the state level, regulate nonhazardous and hazardous waste and will be involved in the regulation of the waste generated by the MREC project. The regulations, however, are administered and enforced primarily through the Ventura County Environmental Health Division, which is the designated CUPA. The persons to contact for nonhazardous and hazardous waste management are listed in Table 5.14-5.

Table 5.14-5 Agency Contacts for Waste Management

Issue	Agency	Contact
<b>Nonhazardous Waste</b>		
Solid Waste and Recycling	Ventura County Department of Public Works, Water and Sanitation Department, Integrated Waste Management Division	Bruce Belluschi, Division Manager 800 South Victoria Avenue Ventura, California 93009 (805) 658-4311 <a href="mailto:Bruce.Belluschi@ventura.org">Bruce.Belluschi@ventura.org</a>
		Lisa McCullough (805) 658-4321
<b>Hazardous Waste</b>		
Hazardous Waste Compliance and Inspections	Ventura County Environmental Health Division, CUPA	Rick Bandelin, Manager Ventura County Government Center Administration Building - 3rd Floor 800 S. Victoria Avenue Ventura, CA 93009 (805) 654-2815 <a href="mailto:Rick.Bandelin@ventura.org">Rick.Bandelin@ventura.org</a>
		Brandi Starjack (805) 654-2823

#### 5.14.7 Permits and Permit Schedule

The temporary storage of hazardous wastes at the MREC will be included in the HMBP submitted to the Ventura County Environmental Health Division Hazardous Materials Program as described in Section 5.5, Hazardous Materials. No additional permits are required.

#### 5.14.8 References Cited or Consulted

California Department of Resources Recycling and Recovery (CalRecycle). 2015a. Solid Waste Information System (SWIS) Database, Ventura County. September 2015.

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Clean Harbors. 2015. Buttonwillow Landfill Facility Fact Sheet. Available online at: <http://www.cleanharbors.com/locations/index.asp?id=53>. October.

Department of Toxic Substance Control (DTSC). 2015a. DTSC's Hazardous Waste and Substances Site List (Cortese List), Contra Costa County. September. [http://www.dtsc.ca.gov/SiteCleanup/Cortese\\_List.cfm](http://www.dtsc.ca.gov/SiteCleanup/Cortese_List.cfm).

Department of Toxic Substance Control (DTSC). 2015b. *California Commercial Offsite Hazardous Waste Permitted Facilities*. September. [http://www.envirostor.dtsc.ca.gov/public/commercial\\_offsite.asp](http://www.envirostor.dtsc.ca.gov/public/commercial_offsite.asp).

Harrison Industries. Santa Clara Valley Disposal. 2015. September. <http://www.ejharrison.com/services/ventura.html>.

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Henry, Bob / Waste Management – Kettleman Hills Landfill. 2012. Personal communication with Beth Storelli/CH2M HILL. January 12.

Linton, Ken/ Clean Harbors Buttonwillow Landfill. 2012. Personal communication with Beth Storelli/CH2M HILL. January 11.

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Padre Associates, Inc. 2015. Phase I Environmental Site Assessment, Commercial Property Located at 1025/1028 Mission Rock Road, Assessor's Parcel Number 090-0-1909-165, Unincorporated Area, Santa Paula, Ventura County, California. September.

Ventura Regional Sanitation District. 2015. <http://www.vrsd.com/Toland.html>.

Waste Management, Inc. (WM). 2015. September. <http://kettlemanhillslandfill.wm.com/facility-expansion/index.jsp>.