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August 15, 2001

Jimi Gadzia
2508 Cortez Court
Roswell, New Mexico 88201

RE: TRIASSIC PARK – INFORMATION REQUEST

Dear Ms. Gadzia:

You had requested information regarding hazardous waste landfill disposal facilities in the western U.S. Enclosed is a map and a list of such facilities compiled by Gandy-Marley, Inc. As I explained in our telephone conversation, the symbols on the map indicate facility ownership, i.e., similar symbols are owned by the same company, at least at the time of publication (1998). All facilities on the map have their Part B hazardous waste permit approved except for Triassic Park.

I'm also providing an explanation of the RCRA Land Disposal Restrictions (LDRs). As you undoubtedly know, New Mexico's Environmental Improvement Board has adopted all of the federal LDRs by reference (see page III-110). The LDRs mandate that for disposal, hazardous wastes must first be treated to attain the very conservative *Universal Treatment Standards (UTSs)*. In fact, the UTSs are very similar to our cleanup standards for surface soils. These standards, together with RCRA's stringent unit engineering and operating requirements, make NM's hazardous waste program what I consider to be very protective.

If you have any questions or comments regarding this information, please don't hesitate to e-mail me at steve_pullen@nmenv.state.nm.us, or telephone me at 505 428-2544.

Sincerely,

Steve Pullen
Project Manager

Enclosures

cc: file

CHAPTER 6

LAND DISPOSAL RESTRICTIONS

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The LDR program approaches ground water protection differently from unit-specific technical standards. This program does not mandate physical barriers to protect ground water, but instead requires that hazardous wastes undergo fundamental physical or chemical changes so that they pose less of a threat to ground water, surface water, and air when disposed. The obvious advantage of such hazardous waste treatment is that it provides a longer lasting form of protection than does simple hazardous waste containment. While synthetic barriers designed to prevent the migration of leachate can break down and fail over time, physical and chemical changes to the waste itself provide a more permanent type of protection.

OVERVIEW

A common hazardous waste management practice is to place hazardous waste in land-based units (i.e., land treatment units, landfills, surface impoundments, or waste piles). In 1995, approximately 8.1 percent (22 million tons) of hazardous waste generated under RCRA was permanently disposed of on the land. The permanent disposal of hazardous waste in land-based units has the potential to threaten human health and the environment through ground water contamination. As a result, the RCRA program contains extensive technical requirements to ensure that land-based units prevent hazardous leachate from escaping into the environment. To complement the unit-specific standards, which alone do not fully protect human health and the environment from the potential risks of land-based hazardous waste management, RCRA contains the LDR program.



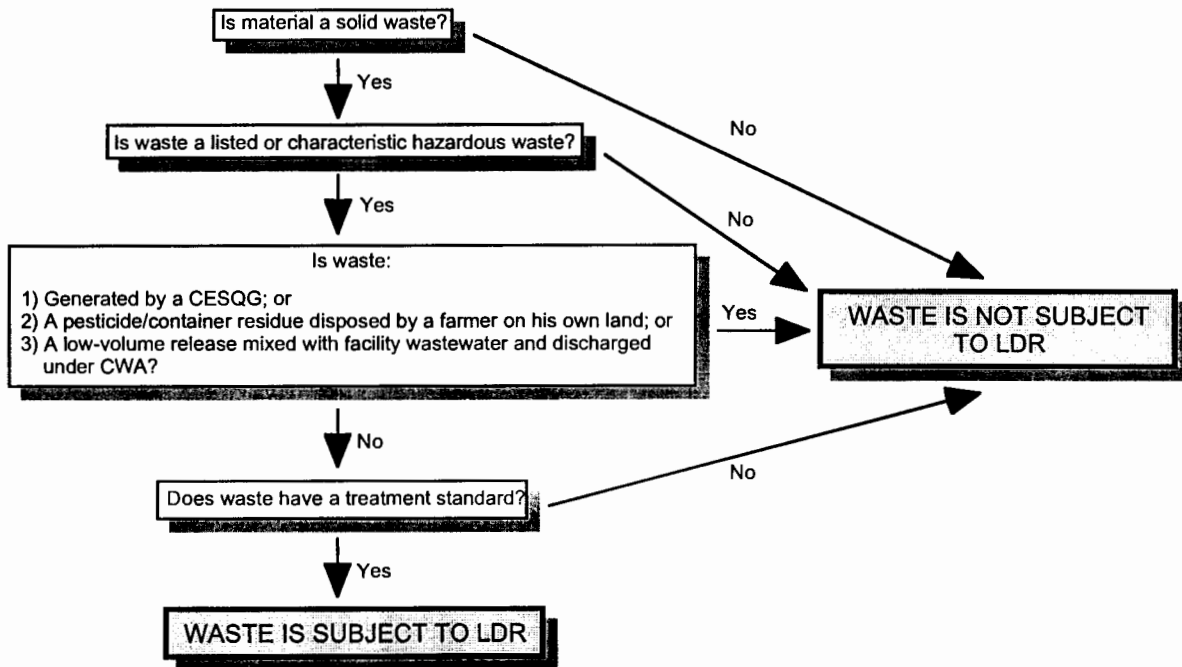
When directing EPA to establish the LDR program, Congress called for regulations that specified concentrations of hazardous constituents or methods of treatment that would substantially decrease the toxicity of hazardous waste or decrease the likelihood that contaminants in such wastes would leach. EPA responded to these requirements by establishing waste-specific treatment standards that dictate to what extent waste must be treated. All hazardous wastes, except under certain circumstances, must meet a specific treatment standard before they can be disposed.

solid and hazardous waste, its disposal is not regulated under the LDR program. Once a generator identifies its waste as hazardous (either listed, characteristic, or both), the waste is assigned a waste code. When EPA establishes a treatment standard for the waste code, the waste will then become restricted (i.e., subject to the LDR requirements). RCRA requires that EPA establish treatment standards for hazardous wastes within six months of promulgating a new listing or characteristic. Until EPA establishes a treatment standard for a waste, this newly identified or newly listed waste (i.e., waste for which EPA has yet to establish a treatment standard) can continue to be land disposed without treatment. When EPA promulgates a final treatment standard for a waste, handlers of the waste must manage it in accordance with all the LDR requirements and cannot dispose of it on the land until it meets all applicable treatment standards (see Figure III-19).

APPLICABILITY

Wastes must be a RCRA hazardous waste in order to be subject to the LDR program. In other words, unless a waste meets the definition of a

Figure III-19: LAND DISPOSAL RESTRICTIONS APPLICABILITY



While the LDR program generally applies to all persons who generate, transport, treat, store, or dispose of restricted hazardous wastes, there are exclusions from the LDR requirements. The following wastes are not subject to the LDR program:

- Waste generated by CESQGs
- Waste pesticides and container residues disposed of by farmers on their own land
- Newly identified or newly listed hazardous wastes for which EPA has yet to promulgate treatment standards
- Certain waste releases that are mixed with a facility's wastewater and discharged pursuant to CWA.

Wastes meeting any of these descriptions may continue to be land disposed without being subject to the LDR program.

The LDR requirements attach to a hazardous waste at its point of generation. In other words, once a waste has been generated, identified, and assigned a waste code, it must be treated in accordance with LDR requirements before being disposed. As a general principle, a hazardous waste must meet all applicable treatment standards to be eligible for land disposal. For purposes of the LDR program, a generator of a listed hazardous waste must determine if the waste also exhibits any hazardous waste characteristics. If it does, then the treatment standard for all waste codes must be met before land disposal.

LDR PROHIBITIONS

The LDR program consists of three main components: the disposal prohibition, the dilution prohibition, and the storage prohibition. This series of prohibitions restricts how wastes subject

to LDR requirements are handled. The most visible aspect of the LDR program is the disposal prohibition, which includes treatment standards, variances, alternative treatment standards, and notification requirements. **Land disposal** means placement in or on the land, except in a corrective action unit, and includes, but is not limited to, placement in a landfill, surface impoundment, waste pile, injection well, land treatment facility, salt dome formation, salt bed formation, underground mine or cave, or placement in a concrete vault, or bunker intended for disposal purposes. The other two components work in tandem with the disposal prohibition to guide the regulated community in proper hazardous waste management. The dilution prohibition ensures that wastes are properly treated, and the storage prohibition ensures that waste will not be stored indefinitely to avoid treatment.

■ Disposal Prohibition

The first component of the LDR program, the **disposal prohibition**, prohibits the land disposal of hazardous waste that has not been adequately treated to reduce the threat posed by such waste. The criteria that hazardous wastes must meet before being disposed of are known as **treatment standards**. These treatment standards can be either concentration levels for hazardous constituents that the waste must meet or treatment technologies that must be performed on the waste before it can be disposed.

EPA bases the LDR treatment standards on the performance of available technologies. EPA conducts extensive research into available treatment

technologies to determine which proven, available technology is the best at treating the waste in question. The technology that

DISPOSAL PROHIBITION

The disposal prohibition prohibits the land disposal of hazardous waste that has not been adequately treated to reduce the threat posed by such waste.

best minimizes the mobility or toxicity (or both) of the hazardous constituents is designated as the **Best Demonstrated Available Technology (BDAT)** for that waste. The treatment standards are based on the performance of this BDAT.

When treatment standards are set as concentration levels, the regulated community may use any method or technology (except dilution, as discussed later in this chapter) to meet that concentration level. The concentration level is based on the performance of the BDAT, but the regulated community does not need to use this technology to meet the treatment standard. EPA prefers to use concentration-based standards because they stimulate innovation and the development of alternative treatment technologies. However, when EPA feels that the waste will only be effectively treated by the BDAT or when there is no way to measure hazardous


constituent levels, the Agency will designate the BDAT as the treatment standard. This means that the regulated community must treat the waste with that specific technology in order to meet the treatment standard.


The treatment standards are found in the regulations in a table arranged by hazardous waste code (40 CFR §268.40). Concentration-based treatment standards appear in the table as numeric values. The few treatment standards that require the use of a specific technology are expressed as a five-letter code representing the technology (see Figure III-20). There are 30 such codes representing specific technology-based standards. Descriptions of these codes and the technologies that they require are found in the regulations in a separate table in 40 CFR §268.42 (see Figure III-21).

Figure III-20: EXCERPTS FROM THE 40 CFR §268.40 TREATMENT STANDARDS TABLE

TREATMENT STANDARDS FOR HAZARDOUS WASTES					
WASTE CODE	WASTE DESCRIPTION AND TREATMENT/REGULATORY SUBCATEGORY	REGULATED HAZARDOUS CONSTITUENT		WASTEWATERS	NONWASTEWATERS
		Common Name	CAS Number	Concentration in mg/l; or Technology Code	Concentration in mg/kg unless notes as "mg/l/TCLP"; or Technology Code
K009	Distillation bottoms from the production of acetaldehyde from ethylene	Chloroform	67-66-3	0.046	6.0
K026	Stripping still tails from the production of methyl ethyl pyridines	NA	NA	CMBST	CMBST

Concentration-Based Standard





Technology-Based Standard

Figure III-21: EXCERPTS FROM THE 40 CFR §268.42 TECHNOLOGY-BASED STANDARDS TABLE

Code	Technology	Description
BIODG	Biodegradation	Biodegradation uses microorganisms to break down organic compounds to make a waste less toxic.
CHRED	Chemical reduction	Chemical reduction converts metal and inorganic constituents in wastewater into insoluble precipitates that are later settled out of the wastewater, leaving a lower concentration of metals and inorganics in the wastewater.
CMBST	Combustion	Combustion destroys organic wastes or makes them less hazardous through burning in boilers, industrial furnaces, or incinerators.
DEACT	Deactivation	Deactivation is treatment of a waste to remove the characteristic of ignitability, corrosivity, or reactivity. Deactivation can be achieved using many of the treatment technologies in 40 CFR §268.42, Table 1. Part 268, Appendix VI recommends technologies that can be used to deactivate specific wastestreams.
MACRO	Macroencapsulation	Macroencapsulation is the application of a surface coating material to seal hazardous constituents in place and prevent them from leaching or escaping.
NEUTR	Neutralization	Neutralization makes certain wastes less acidic or certain substances less alkaline.
PRECP	Precipitation	Precipitation removes metal and inorganic solids from liquid wastes to allow the safe disposal of the hazardous solid portion.
REMTL	Recovery of Metals	Recovery of organics uses direct physical removal methods to extract metal or inorganic constituents from a waste.
RORGS	Recovery of Organics	Recovery of organics uses direct physical removal methods (e.g., distillation, steam stripping) to extract organic constituents from a waste.
STABL	Stabilization	Stabilization (also referred to as solidification) involves the addition of stabilizing agents (e.g., Portland cement) to a waste to reduce the leachability of metal constituents.

Characteristic Hazardous Wastes

Both listed and characteristic hazardous wastes must meet the LDR treatment standards before they are eligible for land disposal. There are, however, some unique situations that arise when dealing with characteristic wastes under the LDR program.

The treatment standards for most characteristic hazardous wastes entail rendering the waste nonhazardous (i.e., decharacterizing the waste or removing the characteristic). However, some characteristic waste treatment standards have additional requirements. The regulated community must examine these wastes for

underlying hazardous constituents. These constituents are not what causes the waste to exhibit a characteristic, but they can pose hazards nonetheless. The underlying hazardous constituents must be treated in order to meet contaminant-specific levels. These levels are referred to as the **universal treatment standards (UTS)**, and are listed in a table in the RCRA regulations (40 CFR §268.48). This is why some characteristic wastes that no longer exhibit a characteristic must still be treated to meet additional LDR requirements. Once such characteristic hazardous wastes have been decharacterized and treated for underlying constituents, they can be disposed of in a nonhazardous waste landfill.

CASE STUDY: DECHARACTERIZED WASTES AND THE REQUIREMENT TO TREAT FOR UNDERLYING HAZARDOUS CONSTITUENTS

A facility generates an industrial nonwastewater that contains benzene, acetone, and methanol. The generator determines that their waste is not listed based on its origin, but upon testing the waste, determines that it fails the TCLP for benzene. As a result, the waste is identified as D018. According to the LDR treatment standard for D018, the benzene in the waste must be treated to a standard of 10 mg/kg, and the waste must also be treated for acetone and methanol underlying hazardous constituents. The generator decides to treat the waste in containers at the facility. After treatment, the benzene meets the 10 mg/kg standard and no longer exhibits a characteristic. Although the waste is technically no longer a hazardous waste, it must be treated for the acetone and methanol underlying hazardous constituents before it can be land disposed.

Variations, Extensions, and Exemptions

If a restricted waste does not meet its applicable treatment standard, it is prohibited from land disposal. Although most wastes become eligible for disposal by meeting the treatment standards, in some instances this may not be possible. For example, there may not be enough treatment capacity to treat a waste, or the concentration level may not be achievable. To address these situations, EPA established procedures that allow wastes to be disposed of under special circumstances. The following exemptions, variations, and extensions allow wastes to be disposed of without meeting their respective treatment standards, or to be treated to a different standard:

- National capacity variations
- Case-by-case extensions
- No-migration variations
- Variations from a treatment standard
- Equivalent treatment method variations
- Surface impoundment treatment exemptions.

While national capacity variations, when needed, are automatically granted to all affected hazardous waste management facilities, the other five exemptions, variations, and extensions require a facility to specifically petition the Agency.

National Capacity Variations

When developing a treatment standard, EPA examines the available treatment capacity to determine whether it is sufficient to handle current and future waste management needs. If the Agency determines that nationally there is not enough capacity to treat a waste, EPA can automatically extend the effective date of the waste's treatment standard. Such an extension to the effective date is intended to give the waste treatment industry more time to develop the capacity to handle the waste. Wastes under a national capacity variance can be disposed of, without meeting the treatment standards, in landfills and surface impoundments that meet minimum technical requirements (e.g., liners, leachate collection and removal systems, and leak detection systems). (These technical requirements are fully discussed in Section III, Chapter 5.)

Case-by-Case Extensions

A facility may petition EPA for a case-by-case extension to delay the effective date of a waste's treatment standard, upon showing that capacity does not exist for that particular waste. Similar to national capacity variations, wastes granted case-by-case extensions can be disposed of without meeting the treatment standards in landfills and surface impoundments that meet minimum technical requirements.

No-Migration Variances

No-migration variances differ from capacity variances in that they apply to the disposal unit instead of to the waste, and allow wastes to be disposed of in the unit without meeting the treatment standards. To obtain a no-migration variance for a disposal unit, a facility must petition EPA and demonstrate that there will be no migration of hazardous constituents from the unit (i.e., the waste will not leak or escape from the unit) for as long as the wastes remain hazardous.

Variances from a Treatment Standard

Variances from a treatment standard allow the regulated community to petition EPA and show that the required LDR treatment standard is not appropriate for their waste, or that the treatment standard is not achievable. If a variance is granted, EPA will specify an alternative standard to meet.

Equivalent Treatment Method Variances

Equivalent treatment method variances allow the regulated community to petition EPA and demonstrate that a technology different from the required LDR treatment technology can achieve the same results. If approved, the applicant can use the alternative technology in place of the required technology.

Surface Impoundment Treatment Exemptions

Surface impoundment treatment exemptions allow the regulated community to petition EPA for permission to treat hazardous waste in surface impoundments (surface impoundments are fully discussed in Section III, Chapter 5). Under normal circumstances, owners and operators cannot place untreated hazardous waste on the land, even if it is in a land-based unit for treatment. Since many

facilities use surface impoundments as a means of treating waste, the surface impoundment treatment exemption allows owners and operators to conduct such treatment under certain conditions. Surface impoundments treating waste under this exemption must comply with double liner and minimum technical requirements, and provisions for the removal of sludges and treatment residues.

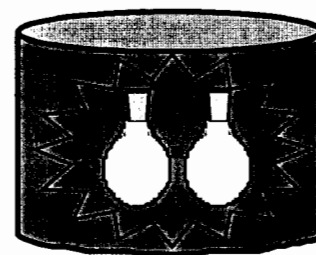
Alternative Treatment Standards

In establishing treatment standards, the Agency applied the BDAT methodology to the typical forms of waste generated by industry. Some forms of hazardous waste are unique and were not taken into account by the BDAT process when treatment standards were established. As a result, EPA created a number of broad, alternative treatment standards for special types of waste.

Lab Packs

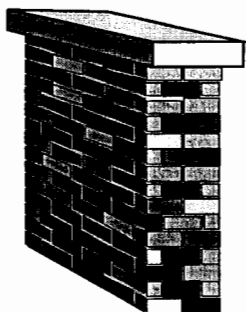
Laboratories commonly generate small volumes of many different listed hazardous wastes. Rather than manage all these wastes separately, labs often consolidate these small containers into lab packs. Trying to meet the individual treatment standards for every waste contained in a lab pack would be impractical.

To ease the compliance burden, EPA established an alternative treatment standard for lab packs that allows the whole lab pack to be incinerated, followed by treatment for any metal in the residues. Treatment using this alternative standard satisfies the LDR requirements for all individual wastes in the lab pack.



Debris

Debris can become contaminated with hazardous waste accidental releases or spills. While such contaminated debris is typically regulated under the contained-in policy (as discussed in Section III, Chapter 1), it may also be subject to LDR treatment standards. The physical characteristics of such debris may make it difficult to meet the LDR treatment standard for the waste that is contaminating it. For example, incinerating a solvent-saturated brick wall is not necessarily going to destroy the solvent constituents that are safely nestled in between the pieces of brick. Instead of requiring debris to meet these sometimes inappropriate and difficult standards, EPA established a set of alternative standards that can be used to treat hazardous debris (40 CFR §268.45, Table 1). The alternative standards range from removing all contaminants with high pressure washing, to encapsulating the debris in order to prevent hazardous constituents from leaching. Debris treated with these alternative treatment standards meets the LDR requirements, and in many cases, can be disposed of as nonhazardous waste.

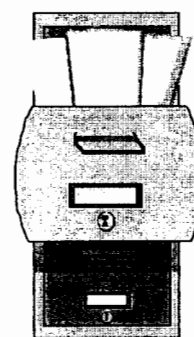


Soil

Accidental spills of hazardous waste or spills of product chemicals can also contaminate soil. While such contaminated media is also typically regulated under the contained-in policy (as discussed in Section III, Chapter 1), it may also be subject to LDR treatment standards. Because EPA established LDR treatment standards by applying the BDAT process for wastes, and soil is not considered a “waste,” the established LDR treatment standards might not automatically be appropriate for contaminated soil. As a result, EPA promulgated alternative treatment standards for contaminated soil in 1998.

Notification, Certification, and Recordkeeping

In order to properly track the hazardous waste that is generated, transported, treated, stored, and disposed of, EPA imposes certain LDR notification, certification, and recordkeeping requirements on generators and TSDFs. LDR notifications inform the next waste handler how the waste must be treated to meet the treatment standard or if it can be disposed of without treatment. When wastes do not need to meet a treatment standard, or already meet the standard, EPA requires the handler to sign a statement certifying such a claim.



Generators must send a notification with the initial shipment of every waste. If the waste, process, or receiving facility changes, another notification is required. The information that the notification must include varies according to the status of the waste. For example, the notification requirements will differ slightly if the waste meets its treatment standard or is subject to a national capacity variance.

Treatment facilities have to send similar notifications along with the shipment of treated wastes to disposal facilities. A certification normally accompanies this notification stating that the waste meets its treatment standards and may be land disposed. Disposal facilities are the final link in the waste management chain. As a result, they have to test the waste residue that they receive to ensure that it meets the treatment standards.

Each hazardous waste handler must comply with certain recordkeeping requirements for LDR notifications and paperwork. Generators, treatment facilities, and disposal facilities must keep copies of all LDR paperwork associated with the waste they ship or receive in their facility files for three years.

Characteristic wastes that are decharacterized subsequent to the point of generation (i.e., they become nonhazardous) are handled differently. Once a waste is decharacterized and has met its full LDR treatment standards, it can go to a RCRA Subtitle D nonhazardous waste facility. These LDR notifications and certifications are sent to the EPA Region or authorized state rather than to the receiving Subtitle D facility. This is intended to protect Subtitle D facilities from the burden of hazardous waste paperwork.

■ Dilution Prohibition

The second component of the LDR program is the **dilution prohibition**. When a waste's treatment standard is expressed as a numeric concentration level, it is often easier and less expensive to dilute the waste in water or soil in order to reduce the concentration of the hazardous constituents. This type of activity does not reduce the overall or mass load of toxic chemicals that could be released to the environment, and is inconsistent with the goals of the LDR program. To prevent this activity from being practiced, EPA established the dilution prohibition. The dilution prohibition states that it is impermissible to dilute hazardous waste to circumvent proper treatment. Adding water or

DILUTION PROHIBITION

The dilution prohibition forbids dilution, such as the addition of soil or water to waste, in order to reduce the concentrations of hazardous constituents, and can prohibit treatment of a waste by ineffective or inappropriate treatment methods. Examples of ineffective or inappropriate treatment include biodegradation, combustion, or incineration of metals, and stabilization of organics. The clearest objective indication that proper treatment is being conducted is if the treatment is the same type as that on which the treatment standard is based (i.e., if the treatment method is the same as the BDAT that established the waste's treatment standard) or if the treatment process actually destroys or removes hazardous constituents.

soil to a waste to dilute it, combining wastes not amenable to the same type of treatment, and incinerating metal wastes are all examples of impermissible dilution.

■ Storage Prohibition

The final component of the LDR program is the **storage prohibition**. Before a waste can be treated, it is usually

STORAGE PROHIBITION

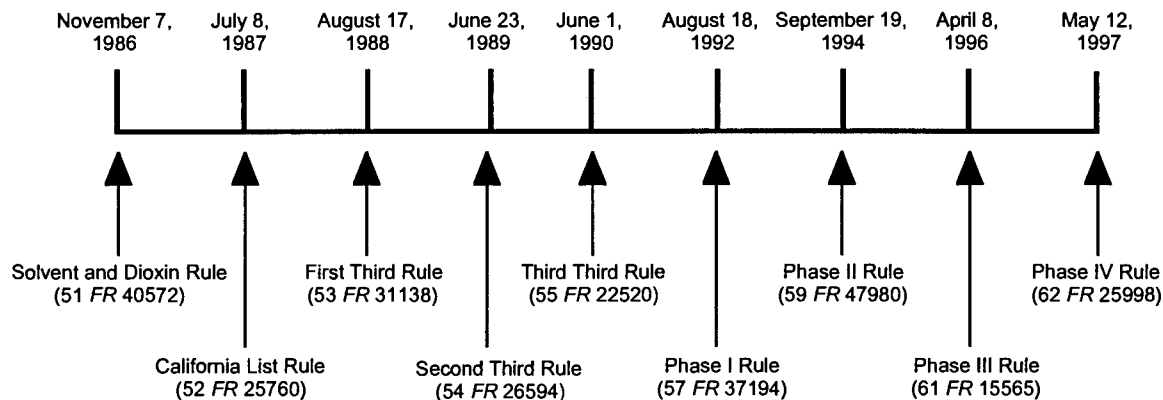
The storage prohibition prevents the indefinite storage of untreated hazardous waste for reasons other than the accumulation of quantities necessary for effective treatment or disposal.

stored in units, such as containers and tanks. These storage units are not intended for the long-term management of waste, and therefore, are not required to provide the same level of protective measures as disposal units. To prevent indefinite storage, EPA regulations state that if waste storage exceeds one year, the facility has the burden of proving that such storage is being maintained in order to accumulate quantities necessary for effective treatment or disposal. For storage less than one year, EPA has the burden of proving that such storage is not for the purpose of accumulating quantities necessary for effective treatment or disposal. Generators accumulating waste on site within their respective accumulation time limits (as discussed in Section III, Chapter 3), and transfer facilities temporarily storing manifested shipments of hazardous waste for less than 10 days (as discussed in Section III, Chapter 4), are not subject to this burden of proof requirement.

HISTORY OF LDR

The LDR program has a complicated history. The progression of the LDR program is important in understanding how and why the LDR program operates the way it does today (see Figure III-22).

Figure III-22: SIGNIFICANT LAND DISPOSAL RESTRICTIONS RULEMAKINGS



HSWA established the authority for the LDR program. When HSWA was enacted, EPA had already listed and identified a large number of hazardous wastes. As a result, the Agency had to gradually address these wastes by establishing LDR treatment standards in stages. Congress directed EPA to address certain high-risk and high-volume wastes first, and established a three-part schedule for EPA to follow in addressing the remaining wastes. The three parts of this schedule are known as the Thirds.

Before EPA could address the wastes in the Thirds, the Agency was required to address those wastes that were high-risk (dioxins) and those wastes that were generated in large amounts (solvents). The treatment standards for these wastes were promulgated on November 7, 1986. This rulemaking also established the basic framework for the LDR program.

Because EPA's promulgation of LDR treatment standards for the large number of wastes in the Thirds would take considerable time, the Agency established interim treatment standards to ensure adequate protection of human health and the environment. These interim standards are known as the **California list**. The list, based on a program established by California's Department of

Health Services, became effective on July 8, 1987. These standards did not target specific waste codes, but rather wastes containing certain toxic constituents or exhibiting certain properties. As EPA established waste-specific treatment standards in the Thirds, the California list provisions were superseded. All of the provisions on the list have now been superseded.

To address the wastes that were to be covered under the Thirds, EPA ranked the wastes according to hazard and volume generated. Those wastes that posed the greatest potential threat were addressed first through a rulemaking on August 17, 1988. These wastes are known as the First Third wastes. The treatment standards for the Second Third wastes were promulgated on June 23, 1989, and the treatment standards for the Third Third wastes were promulgated on June 1, 1990.

While EPA was addressing the solvents, dioxins, and the Thirds, other hazardous wastes were being listed and identified as part of the Agency's continuing process of hazardous waste identification. These newly listed and identified wastes, which became subject to RCRA after HSWA, were grouped in their own respective schedules. These schedules are known as the Phases. These schedules not only promulgated

treatment standards for newly listed and identified wastes, but also made minor modifications and improvements to the LDR regulatory program.

On August 18, 1992, EPA promulgated Phase I, which finalized treatment standards for the first set of newly listed wastes and established alternative treatment standards for hazardous debris. On September 19, 1994, EPA promulgated Phase II, which also finalized treatment standards for additional newly listed wastes and added the UTS table (40 CFR §268.48). On April 8, 1996, EPA promulgated Phase III, which not only finalized treatment standards for a third set of newly listed wastes, but also prohibited the combustion of metals (such treatment is ineffective and thus constitutes impermissible dilution). On May 12, 1997, EPA promulgated the first half of Phase IV, which finalized the last set of treatment standards for newly listed wastes and modified the LDR notification requirements. The second half of Phase IV, which will complete the schedule established by the Phases, will finalize treatment standards for newly identified toxicity characteristic metal wastes and formerly exempt mineral processing wastes.

With the completion of the four Phases, EPA has promulgated standards for all currently identified and listed hazardous wastes. EPA now promulgates the LDR treatment standards for a waste when the waste is initially identified or listed.

SUMMARY

The LDR program is designed to protect ground water from contamination by requiring hazardous wastes to be physically or chemically altered to reduce the toxicity or mobility of hazardous constituents prior to disposal. The LDR requirements apply to all hazardous wastes (with a

few exceptions) once a treatment standard has been established for the waste. These requirements attach at the point of generation, at which time generators must determine both hazardous waste listings and characteristics. Based on this determination, the waste must meet all applicable treatment standards before disposal. The LDR program consists of prohibitions on:

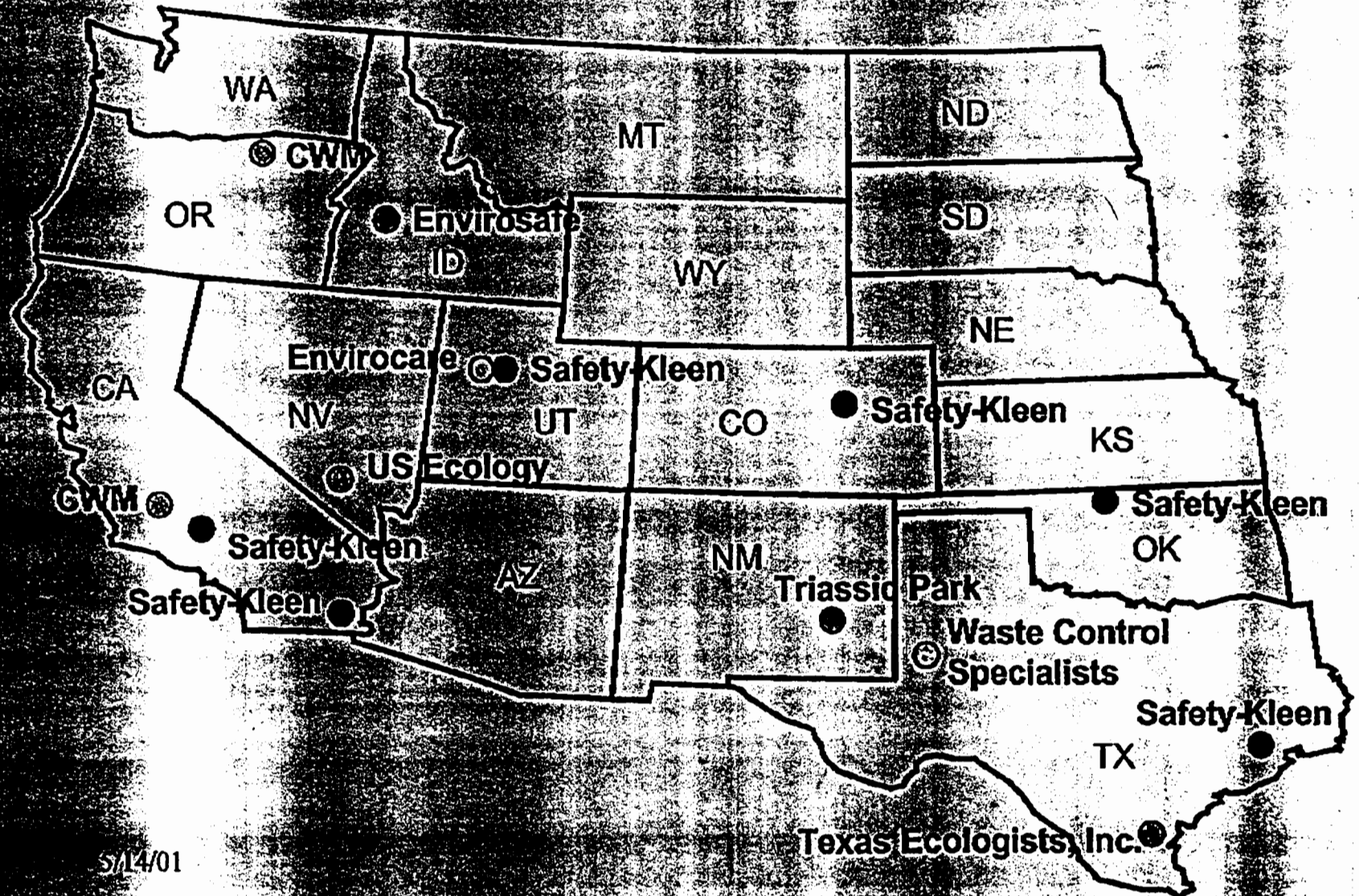
- Disposal
- Dilution
- Storage.

The disposal prohibition requires that hazardous wastes be treated to meet waste specific treatment standards before disposal. These standards are based on the BDAT process and requires treatment to a specific concentration level or treatment by a specific technology. EPA established a series of variances, exemptions, and extensions to address those situations where the required treatment standard cannot be achieved. The LDR program also includes alternative treatment standards for unique wastestreams, such as lab packs, debris, and soil. To ensure that wastes receive proper treatment and are managed appropriately, EPA also established notification and recordkeeping requirements.

The dilution prohibition prevents treatment by ineffective or inappropriate methods. The storage prohibition is intended to require expeditious treatment.

Since 1986, when the first treatment standards were promulgated, the LDR program has continually evolved. EPA has finished establishing treatment standards for all existing, newly identified, and newly listed wastes based on two rulemaking schedules (the Thirds and Phases), and the Agency now establishes treatment standards for hazardous wastes when they are either listed or identified.

TSD Facilities in Western US



5/14/01

Restrictions: No dioxins or explosives.
RCRA Permit Status: Part B approved.
TSCA Approval Status: Storage and off-site brokering.
Other Services Offered: Analytical services, chlorine recycling, consulting, fuels program, lab pack/field services, transportation, site remediation.

Map Key No. 10

Reynolds Metal Co.
 500 E. Reynolds Road
 Arkadelphia, AR 71923

Contact: Greg Felling

Phone: 870-245-2720

EPA ID No.: ARD006354161

Type of Facility: TSD

Categories of Wastes Handled: K088 waste only, Reactives (cyanide/sulfide)

Onsite Treatment and Disposal Methods: Rotary-Kin incineration.

Restrictions: Only K088 wastes accepted.

RCRA Permit Status: Interim, Part B submitted.

Permitted Annual Incineration Capacity: 300,000 cubic yards.

Other Services Offered: Consulting on K088 only.

CALIFORNIA

Map Key No. 11

Broco Environmental
 2824 N. Locust Ave
 Rialto, CA 92376

Contact: Jerry Gilbert

Phone: 909-350-0580

EPA ID No.: CAT080022148

Type of Facility: TS

Categories of Wastes Handled:

Aqueous Waste with Solvents	Reactives
Aqueous Waste (other)	Reactives (cyanide/sulfide)
Contaminated Soil	Solvents/Halogenated
Explosives	Solvents/Nonhalogenated
Inorganic Sludges/Solids	TCLP Toxic Metals
Organic Sludges/Solids	Waste Acids
Paint Sludges	Waste Caustics
Pesticides	Waste Oil

Additional Wastes: Gas cylinders, water and air reactives.

Onsite Treatment and Disposal Methods: Demilitarization and recycle.

RCRA Permit Status: Interim.

Other Services Offered: Analytical services, consulting, emergency response, site remediation, tank/container cleaning, transportation.

Additional Comments: Wholly owned subsidiary of Environmental Enterprises, Inc. (Cincinnati, Ohio).

Map Key No. 12

Chemical Waste Management, Inc.

P.O. Box 471
 Kettleman City, CA 93239

Contact: Bob Henry

Phone: 209-386-9711

EPA ID No.: CAT000648117

Type of Facility: TD

Categories of Wastes Handled:

Organic Sludges/Solids	Solvents/Nonhalogenated
PCBs <50 ppm	TCLP Toxic Metals
Pesticides	Waste Acids
Reactives (cyanide/sulfide)	Waste Caustics
Solvents/Halogenated	Waste Oil

Onsite Treatment and Disposal Methods: Landfilling, neutralization, pesticide hydrolysis, stabilization.

Restrictions: No explosives or radioactive wastes.

RCRA Permit Status: Part B approved.

Other Services Offered: Cleanup services, transportation.

Map Key No. 13

Chem-Tech Systems, Inc.
 3650 E. 26th St
 Los Angeles, CA 90023

Contact: Fred W. Chuff

Phone: 213-268-5058

EPA ID No.: CAT080033681

Type of Facility: TSDR

Categories of Wastes Handled:

Aqueous Waste with Solvents	Paint Sludges
Aqueous Waste (other)	TCLP Toxic Metals
Contaminated Soil	Waste Acids
Inorganic Sludges/Solids	Waste Caustics
Organic Sludges/Solids	Waste Oil

Onsite Treatment and Disposal Methods: Air stripping, carbon adsorption, coagulation and flocculation, filtration, neutralization, oxidation/reduction, precipitation, solidification/stabilization, wet oxidation.

RCRA Permit Status: Part B approved.

Other Services Offered: Analytical services.

Map Key No. 14

Crosby & Overton, Inc.
 1610 W. 17th St
 Long Beach, CA 90813

Contact: Milton Sanders

Phone: 562-432-6445

EPA ID No.: CAD028409019

Type of Facility: TS

Categories of Wastes Handled:

Aqueous Waste with Solvents	Solvents/Halogenated
Aqueous Waste (other)	Solvents/Nonhalogenated
Contaminated Soil	TCLP Toxic Metals
Inorganic Sludges/Solids	Waste Acids
Organic Sludges/Solids	Waste Caustics
Paint Sludges	Waste Oil

Onsite Treatment and Disposal Methods: Neutralization, oily wastewater treatment, solidification/stabilization.

Restrictions: No PCBs, explosives, radioactives, or biological wastes.

RCRA Permit Status: Part B approved.

Other Services Offered: Analytical services, cleanup services, consulting, emergency response, mobile treatment, tank/container cleaning, transportation.

Map Key No. 15

DeMunno/Kerdoon

2000 N. Alameda St
Compton, CA 90222

Contact: Catherine DeMunno

Phone: 310-537-7100

EPA ID No.: CAT080013352

Type of Facility: TSD

Categories of Wastes Handled:

Aqueous Waste	TCLP Toxic Metals
Aqueous Waste with Organics	Waste Caustics
Organic Sludges/Solids	Waste Oil
Solvents/Nonhalogenated	

Additional Wastes Handled: Flammable liquids, gasoline, ink, mineral spirits, petroleum products.

Onsite Treatment and Disposal Methods: Activated-carbon adsorption, chemical dehydration, chemical flocculation and demulsification, dissolved-air flotation, distillation (atmospheric and vacuum), neutralization, precipitation, volatile organic removal.

RCRA Permit Status: Interim, Part B submitted.

Other Services Offered: Analytical services, antifreeze and waste oil recycling, certified laboratory, consulting, emergency response, tank/container cleaning, transportation.

Onsite Treatment and Disposal Methods: Evaporation, landfilling, solidification/stabilization.

Restrictions: Bulk or containerized hydrazine, compressed gas cylinders, Class II explosives, medical and biohazardous waste, municipal wastes, PCBs >50 ppm, and radioactive wastes.

RCRA Permit Status: Part B approved.

Permitted Land Disposal Capacity: 12 million cubic yards.

Other Services Offered: Analytical services, transportation.

Map Key No. 18

OPC (a subsidiary of Rollins Environmental Services (CA) Inc.)

5756 Albe Street
Los Angeles, CA 90058

Contact: Bill Mizel

Phone: 213-685-5063
800-X-WASTES

EPA ID No.: CAD050806850

Type of Facility: TSR

Categories of Wastes Handled:

Aqueous Waste with Solvents	Pesticides
Aqueous Waste (other)	Reactives (cyanide/sulfide)
Contaminated Soil	Solvents/Halogenated
Inorganic Sludges/Solids	Solvents/Nonhalogenated
Organic Sludges/Solids	TCLP Toxic Metals
Paint Sludges	Waste Acids
PCBs <50 ppm	Waste Caustics
PCBs 50-500 ppm	Waste Oil
PCBs >500 ppm	

Onsite Treatment and Disposal Methods: Chromate reduction, clarification, fuel blending, neutralization, oxidation/reduction, precipitation.

RCRA Permit Status: Part B approved.

Other Services Offered: Analytical services, lab pack processing, PCB services, tank/container cleaning, transportation.

Map Key No. 16

Laidlaw Environmental Services (Imperial Valley), Inc.

8296 S. Garvey Rd, P.O. Box 158
Westmorland, CA 92281

Contact: Roger Higson

Phone: 619-344-9400

EPA ID No.: CAD000833164

Type of Facility: TD

Categories of Wastes Handled:

Aqueous Wastes (other)	Pesticides
Contaminated Soil	TCLP Toxic Metals
Inorganic Sludges/Solids	Waste Acids (sludges)
Organic Sludges/Solids	Waste Caustics (sludges)
Paint Sludges (Latex)	Waste Oil (sludges)
PCBs <50 ppm	

Onsite Treatment and Disposal Methods: Landfilling, microencapsulation, neutralization, solidification/stabilization.

RCRA Permit Status: Part B approved.

Permitted Land Disposal Capacity: 4.4 million tons.

Other Services Offered: Analytical services, transportation.

Map Key No. 19

Phibro-Tech

8851 Dice Rd
Santa Fe Springs, CA 90670

Contact: Steve Anstey

Phone: 562-698-8036

EPA ID No.: CAD008488025

Type of Facility: TSR

Categories of Wastes Handled:

Aqueous Waste (other)	TCLP Toxic Metals
Inorganic Sludges/Solids	Waste Acids

Onsite Treatment and Disposal Methods: Evaporation, filtration, metal purification, neutralization, precipitation.

Restrictions: By analysis only.

RCRA Permit Status: Part B approved.

Other Services Offered: Analytical services, transportation.

Additional Comments: All metals are recycled as metallic salts and sold for industrial use.

Map Key No. 17

Laidlaw Environmental Services (Lokem), Inc.

2500 W. Lokem Rd
Bullwinkle, CA 93206

Contact: Customer Service
Department

Phone: 800-544-7199

EPA ID No.: CAD980875278

Type of Facility: TSD

Categories of Wastes Handled:

Aqueous Wastes (other)	PCBs <50 ppm
Contaminated Soil	Reactives (cyanide/sulfide)
Inorganic Sludges/Solids	TCLP Toxic Metals
Organic Sludges/Solids	

Map Key No. 20**Romic Environmental Technologies Corporation**2081 Bay Road
East Palo Alto, CA 94303

Contact: Kress Hauri

Phone: 800-756-8248

EPA ID No.: CAD009452657

Type of Facility: TSR

Categories of Wastes Handled:

Aqueous Waste with Solvents	Solvents/Halogenated
Aqueous Wastes (other)	Solvents/Nonhalogenated
Contaminated Soil	TCLP Toxic Metals
Inorganic Sludges/Solids	Waste Acids
Organic Sludges/Solids	Waste Caustics
Paint Sludges	Waste Oil
PCBs <50 ppm	

Onsite Treatment and Disposal Methods: Biological treatment, distillation, fuel blending, solid fuel liquification, thin-film evaporation.**RCRA Permit Status:** Part B approved.**Other Services Offered:** Consulting, lab pack services, recycling programs, solvent recovery, tank/container cleaning, transportation.**Map Key No. 21****U.S. Filter Recovery Services (California) Inc.
(formerly Norris Environmental Services)**5215 S. Boye Ave
Los Angeles, CA 90058

Contact: Hank Donnelly (ext 412)

Phone: 213-538-7111

EPA ID No.: CAD094030993

Type of Facility: T

Categories of Wastes Handled:

Aqueous Waste (other)	TCLP Toxic Metals
Contaminated Soil	Waste Acids
Inorganic Sludges/Solids	Waste Caustics
Reactives (cyanide/sulfide)	

Onsite Treatment and Disposal Methods: Neutralization, oxidation/reduction, precipitation, solidification/stabilization.**RCRA Permit Status:** Part B approved.**Other Services Offered:** Analytical services.**COLORADO****Map Key No. 22****Chemical Waste Management**9131 E. 96th Avenue
Henderson, CO 80640

Contact: Tom Andlmer

Phone: 303-289-4827

EPA ID No.: COD380591184

Type of Facility: TSR

Categories of Wastes Handled:

Aqueous Waste with Solvents	Pesticides
Aqueous Waste (other)	Reactives (cyanide/sulfide)
Contaminated Soil	Solvents/Halogenated
Inorganic Sludges/Solids	Solvents/Nonhalogenated
Organic Sludges/Solids	TCLP Toxic Metals
Paint Sludges	Waste Acids
PCBs <50 ppm	Waste Caustics
PCBs 50-500 ppm	Waste Oil
PCBs >500 ppm	

Onsite Treatment and Disposal Methods: Distillation, neutralization, solidification/stabilization.**RCRA Permit Status:** Part B approved.**TSCA Approval Status:** TSCA approval for PCB storage.**Other Services Offered:** Solvent recovery, transportation.**Map Key No. 23****Laidlaw Environmental Services (Dear Trail) Inc.**10855 E. Highway 36
Dear Trail, CO 80105

Contact: Bill Shortreed

Phone: 970-386-2293
800-392-1036

EPA ID No.: COD991300484

Type of Facility: TSD

Categories of Wastes Handled:

Aqueous Waste (other)	Pesticides
Contaminated Soil	Reactives (cyanide/sulfide)
Dioxins	TCLP Toxic Metals
Inorganic Sludges/Solids	Waste Acids
PCBs <50 ppm	Waste Caustics

Onsite Treatment and Disposal Methods: Landfilling, neutralization, oxidation/reduction, solidification/stabilization.**RCRA Permit Status:** Part B approved.**Permitted Land Disposal Capacity:** 2.5 million cubic yards.**Other Services Offered:** Analytical services, site remediation, tank/container cleaning, transportation.**CONNECTICUT****Map Key No. 24****Clean Harbors of Connecticut**761 Middle St
Bristol, CT 06010

Contact: Roland Bobin

Phone: 203-583-8917

EPA ID No.: CTD000604488

Type of Facility: TS

Categories of Wastes Handled:

Aqueous Waste with Solvents	Solvents/Halogenated
Aqueous Waste (other)	Solvents/Nonhalogenated
Inorganic Sludges/Solids	TCLP Toxic Metals
Organic Sludges/Solids	Waste Acids
Paint Sludges	Waste Caustics
PCBs	Waste Oil
Reactives (cyanide/sulfide)	

Onsite Treatment and Disposal Methods: Neutralization, oxidation/reduction, precipitation.**Restrictions:** None.**RCRA Permit Status:** Part B approved.**Other Services Offered:** Analytical services, cleanup services, consulting, tank/container cleaning, transportation.

GEORGIA

Map Key No. 25

CWM Resource Management, Inc.

5371 Cook Rd
Morrow, GA 30260

Contact: Carol Carollo

Phone: 404-361-5181

EPA ID No.: GAD096629282

Type of Facility: TSR

Categories of Wastes Handled:

Aqueous Waste with Solvents	Reactives (cyanide, sulfide)
Aqueous Waste (other)	Solvents/Halogenated
Contaminated Soil	Solvents/Nonhalogenated
Inorganic Sludges/Solids	TCLP Toxic Metals
Organic Sludges/Solids	Waste Acids
Paint Sludges	Waste Caustics
PCBs <50 ppm	Waste Oil
Pesticides	

Onsite Treatment and Disposal Methods: Neutralization, solidification/stabilization.

RCRA Permit Status: Part B approved.

Other Services Offered: Transportation.

Map Key No. 26

MKC Enterprises, Inc.

5850 New Peachtree Road
Doraville, GA 30094

Contact: Pete Sartore

Phone: 500-457-8521

EPA ID No.: GAD000616367

Type of Facility: TSDR

Categories of Wastes Handled:

Aqueous Waste with Solvents	PCBs >500 ppm
Aqueous Waste (other)	Pesticides
Contaminated Soil	Reactives (cyanide/sulfide)
Dioxin	Solvents/Halogenated
Explosives	Solvents/Nonhalogenated
Inorganic Sludges/Solids	TCLP Toxic Metals
Organic Sludges/Solids	Waste Acids
Paint Sludges	Waste Caustics
PCBs <50 ppm	Waste Oil
PCBs 50-500 ppm	

Onsite Treatment and Disposal Methods: Neutralization, solidification/stabilization.

RCRA Permit Status: Part B approved.

Other Services Offered: Analytical services, consulting, and transportation.

IDAHO

Map Key No. 27

Envirosafe Services of Idaho, Inc.—Grand View

P.O. Box 400
Grand View, ID 83624

Contact: Mark Sneed

Phone: 800-727-9969

EPA ID No.: IDD073114854

Type of Facility: TSD

Categories of Wastes Handled:

Aqueous Waste (other)	PCBs 50-500 ppm
Contaminated Soil	PCBs >500 ppm
Dioxin	Pesticides
Inorganic Sludges/Solids	Reactives (cyanide/sulfide)
Organic Sludges/Solids	TCLP Toxic Metals
Paint Sludges	Waste Acids
PCBs <50 ppm	Waste Caustics

Onsite Treatment and Disposal Methods: Debris management (size reduction, treatment), evaporation, landfilling, solidification/stabilization.

RCRA Permit Status: Part B approved.

TSCA Approval Status: Permit approved for all PCBs.

Permitted Land Disposal Capacity: 2.5 million cubic yards

Other Services Offered: Analytical services, industrial waste management and disposal, labpacks, transportation.

ILLINOIS

Map Key No. 28

American Waste Processing, Ltd.

2010 W. Madison, P.O. Box 306
Maywood, IL 60153

Contact: Joseph A. Stroenik

Phone: 708-681-3999

EPA ID No.: ILD000716894

Type of Facility: TDR

Categories of Wastes Handled:

Aqueous Waste with Solvents	Solvents/Halogenated
Aqueous Waste (other)	Solvents/Nonhalogenated
Contaminated Soil	TCLP Toxic Metals
Inorganic Sludges/Solids	Waste Acids
Organic Sludges/Solids	Waste Caustics
Paint Sludges	Waste Oil
PCBs <50 ppm	

Onsite Treatment and Disposal Methods: Absorbent recycling, aerosol can treatment, oil filter recycling, and proprietary product destruction.

RCRA Permit Status: Part B approved.

Other Services Offered: Analytical services, consulting, emergency response, site remediation, tank/container cleaning, transportation.

Map Key No. 29

Chemical Waste Management, Inc.

7 Noble Ave
Sauget, IL 62201

Contact: Charlie Eiler

Phone: 618-271-2804

EPA ID No.: ILD098642424

Type of Facility: TD

Categories of Wastes Handled:

Organic Sludges/Solids	Solvents/Nonhalogenated
PCBs <50 ppm	TCLP Toxic Metals
Pesticides	Waste Oil
Solvents/Halogenated	

Onsite Treatment and Disposal Methods: Fixed-hearth and rotary-kiln incineration.

RCRA Permit Status: Part B approved.

Other Services Offered: Transportation.

NEBRASKA

Map Key No. 77

Clean Harbors Environmental Services, Inc.
P.O. Box 606, five miles south on Highway 71
Kimball, NE 69145

Contact: Jeff Zelik Phone: 800-452-4578

EPA ID No.: NED981723513

Type of Facility: TSD

Categories of Wastes Handled:

Aqueous Waste with Solvents	PCBs <50 ppm
Aqueous Waste (other)	Pesticides
Contaminated Soil	Solvents/Halogenated
Inorganic Sludges/Solids	Solvents/Nonhalogenated
Organic Sludges/Solids	Waste Oil
Paint Sludges	

Onsite Treatment and Disposal Methods: Fluidized-bed incineration.

RCRA Permit Status: Part B approved.

Permitted Annual Incineration Capacity: 45,000 tons.

Additional Comments: Facility also includes a nonhazardous solid waste monofill which only accepts dioxin ash and air pollution control residue produced at facility.

EPA ID No.: NVT330010000

Type of Facility: TSD

Categories of Wastes Handled:

Aqueous Waste with Solvents	PCBs >500 ppm
Aqueous Waste (other)	Pesticides
Contaminated Soil	Solvents/Halogenated
Inorganic Sludges/Solids	Solvents/Nonhalogenated
Organic Sludges/Solids	TCLP Toxic Metals
Paint Sludges	Waste Acids
PCBs <50 ppm	Waste Caustics
PCBs 50-500 ppm	Waste Oil

Additional Wastes Handled: Asbestos, transformers: draining, flushing, and landfilling.

Onsite Treatment and Disposal Methods: Landfilling, solidification/stabilization.

Restrictions: No biodegradable wastes, explosives, gases, radioactive wastes, or water reactive wastes.

RCRA Permit Status: Part B approved.

TSCA Approval Status: TSCA permit approved.

Permitted Land Disposal Capacity: 3.0 million cubic yards.

Other Services Offered: Analytical services, consulting, transportation.

NEVADA

Map Key No. 78

21st Century Environmental Management Inc. of Nevada
(21st Century EMI—Philip Services)

2095 Newlands Dr East
Fernley, NV 89408

Contact: John Wolf Phone: 702-575-2760

EPA ID No.: NVD980985338

Type of Facility: TSR

Categories of Wastes Handled:

Aqueous Waste (other)	TCLP Toxic Metals
Contaminated Soil	Waste Acids
Inorganic Sludges/Solids	Waste Caustics
Reactives (cyanide/sulfide)	

Onsite Treatment and Disposal Methods: Hazardous waste recycling using chemical treatment and blending to meet smelter specifications.

Restrictions: Only accepts D001-D011, F006-F012, F019, F039, K002-K009, K061, K062, K064-K066, K089, K090-K091, P021, P029-P030, P074, P098, P099, P104, P106, P121, U032, U134, and U123 wastes.

RCRA Permit Status: Part B approved.

Other Services Offered: Analytical services, consulting, emergency response, site remediation, tank/container cleaning, transportation.

Additional Comments: Also offers treatment of photographic solutions and solids. Wholly owned subsidiary of Philip Services, Inc.

NEW JERSEY

Map Key No. 80

Cycle Chem, Inc.
217 South First Street
Elizabeth, NJ 07208

Contact: Gary Hoadley Phone: 908-355-5800

EPA ID No.: NJD002200046

Type of Facility: TSDR

Categories of Wastes Handled:

Aqueous Waste with Solvents	Pesticides
Aqueous Waste (other)	Reactives (cyanide/sulfide)
Contaminated Soil	Solvents/Halogenated
Inorganic Sludges/Solids	Solvents/Nonhalogenated
Organic Sludges/Solids	TCLP Toxic Metals
Paint Sludges	Waste Acids
PCBs <50 ppm	Waste Caustics
PCBs 60-500 ppm	Waste Oil
PCBs >500 ppm	

Onsite Treatment and Disposal Methods: Neutralization, solidification/stabilization, fuel blending.

RCRA Permit Status: Part B approved.

Other Services Offered: Analytical services, emergency response, mobile treatment, site remediation, tank/container cleaning, transportation.

Map Key No. 79

US Ecology, Inc.
P.O. Box 678
Beatty, NV 89003

Contact: Zaki K. Nasser Phone: 800-239-3943

Map Key No. 81

Du Pont Environmental Treatment
R-1, Waste Acceptance; Route 130
Deepwater, NJ 08023

Contact: Customer Service Center Phone: 800-626-1717

EPA ID No.: NJD002385730

Type of Facility: TSDR

Categories of Wastes Handled:

Aqueous Waste with Solvents
Organic Sludges/Solids
Paint Sludges
PCBs <50 ppm

Solvents/Halogenated
Solvents/Nonhalogenated
TCLP Toxic Metals
Waste Oil

Onsite Treatment and Disposal Methods: Biological treatment, distillation, evaporation.

RCRA Permit Status: Interim, Part B submitted.

Other Service Offered: Solvent recovery, transportation.

Map Key No. 103**System Environmental Corporation/Lafarge Corporation**

11387 Road 176, P.O. Box 266
Paulding, OH 45879

Contact: Mike Betts

Phone: 614-287-1046

EPA ID No.: OHD005048947

Type of Facility: SDR

Categories of Wastes Handled:

Solvents/Halogenated
Solvents/Nonhalogenated

Waste Oil

Onsite Treatment and Disposal Methods: Cement kiln energy recovery.

Restrictions: Wastes must be pumpable and/or blendable, <10% chlorine, and >8,000 BTU/lb.

RCRA Permit Status: Part B approved.

Map Key No. 104**Waste Technologies Industries**

1250 St. George Street
East Liverpool, OH 43920

Contact: Heidi J. Dugan

Phone: 330-386-4260

EPA ID No.: OHD980613541

Type of Facility: TS

Categories of Wastes Handled:

Aqueous Waste with Solvents
Aqueous Waste (other)
Contaminated Soil
Explosives
Organic Sludges/Solids
Paint Sludges
PCBs <50 ppm
Pesticides

Reactives (cyanide/sulfide)
Solvents/Halogenated
Solvents/Nonhalogenated
TCLP Toxic Metals
Waste Acid
Waste Caustics
Waste Oil

Additional Wastes Handled: Direct-burn tanker trucks.

Onsite Treatment and Disposal Methods: Rotary-kiln incineration.

RCRA Permit Status: Part B approved.

Permitted Annual Incineration Capacity: 60,000 tons.

OKLAHOMA**Map Key No. 105****Laidlaw Environmental Services, Inc.—
Lone Mountain Facility**

Route 2, Box 170
Waynoka, OK 73060-9022

Contact: Jay Adair

Phone: 580-697-3500

EPA ID No.: OKD005438376

Type of Facility: TSD

Categories of Wastes Handled:

Aqueous Waste with Solvents
Aqueous Waste (other)
Contaminated Soil
Inorganic Sludges/Solids
Organic Sludges/Solids
Paint Sludges
PCBs <50 ppm
Pesticides

Reactives (cyanide/sulfide)
Solvents/Halogenated
Solvents/Nonhalogenated
TCLP Toxic Metals
Waste Acids
Waste Caustics
Waste Oil

Additional Wastes Handled: Asbestos, nonhazardous industrial wastes.

Onsite Treatment and Disposal Methods: Alkaline chlorination, evaporation, landfilling, microencapsulation, neutralization, oxidation/reduction, solidification/stabilization.

Restrictions: No pressurized containers, F020-F023, F026-F027, explosives, PCBs >60 ppm.

RCRA Permit Status: Part B approved.

Permitted Land Disposal Capacity: 1.0 million tons.

Other Services Offered: Analytical services, mobile treatment, site remediation, solvent recovery, tank/container cleaning, transportation.

Map Key No. 106**Parma-Fix Treatment Services, Inc.**

2700 South 25th W. Ave
Tulsa, OK 74107

Contact: Stacy Kieler

Phone: 918-582-9595

EPA ID No.: OKD000402396

Type of Facility: TSD

Categories of Wastes Handled:

Aqueous Waste (other)
Inorganic Sludges/Solids
PCBs <50 ppm
Pesticides

TCLP Toxic Metals
Waste Acids
Waste Caustics
Waste Oil

Onsite Treatment and Disposal Methods: Deepwell injection, neutralization, precipitation, solidification/stabilization.

RCRA Permit Status: Part B approved.

Other Services Offered: Transportation.

OREGON

Map Key No. 107

Chemical Waste Management of the Northwest
17829 Cedar Springs Lane
Arlington, OR 97812

Contact: Steve Seed Phone: 503-454-2643

EPA ID No.: ORD089452353

Type of Facility: TSD

Categories of Wastes Handled:

- | | |
|-----------------------------|-----------------------------|
| Aqueous Waste with Solvents | PCBs >500 ppm |
| Aqueous Waste (other) | Pesticides |
| Contaminated Soil | Reactives (cyanide/sulfide) |
| Inorganic Sludges/Solids | Solvents/Halogenated |
| Organic Sludges/Solids | Solvents/Nonhalogenated |
| Paint Sludges | TCLP Toxic Metals |
| PCBs <50 ppm | Waste Acids |
| PCBs 50-500 ppm | Waste Caustics |

Onsite Treatment and Disposal Methods: Evaporation, landfilling, solidification/stabilization.

RCRA Permit Status: Part B approved.

TSCA Approval Status: <50 ppm—onsite disposal; >50 ppm—sent to CWM facility for incineration.

Permitted Land Disposal Capacity: 800,000 cubic yards.

Other Services Offered: Cleanup services; emergency response; lab pack services; storage/transfer of wastes to other CWM facilities for distillation, recycling, and incineration; transportation.

Categories of Wastes Handled:

- | | |
|----------------------------|-------------------|
| Aqueous Waste (other) | TCLP Toxic Metals |
| Contaminated Soil | Waste Acids |
| Inorganic Sludges/Solids | Waste Caustics |
| Reactive (cyanide/sulfide) | |

Onsite Treatment and Disposal Methods: Delisted treatment employing neutralization, precipitation, and solidification/stabilization of liquid and solid inorganic wastes.

Restrictions: No flammable or radioactive wastes.

RCRA Permit Status: Part B approved.

Other Services Offered: Analytical services, disposal, transportation.

Map Key No. 110

Envirotrol, Inc.
32 Green Street
Lewisley, PA 15143

Contact: William Zinsser Phone: 412-741-2030

EPA ID No.: PAD080707087

Type of Facility: TSD

Categories of Wastes Handled:

- | | |
|------------------------|-------------------------|
| Contaminated Soil | Pesticides |
| Explosives | Solvents/Halogenated |
| Organic Sludges/Solids | Solvents/Nonhalogenated |
| Paint Sludges | Waste Oil |
| PCBs <50 ppm | |

Onsite Treatment and Disposal Methods: Spent activated carbon regeneration through thermal treatment.

Restrictions: Spent carbon treatment only.

RCRA Permit Status: Part B approved.

Other Services Offered: Transportation.

PENNSYLVANIA

Map Key No. 108

Bethlehem Apparatus Company, Inc.
850 Front St, P.O. Box Y
Hellertown, PA 18056

Contact: John M. Boye Phone: 610-838-7034

EPA ID No.: PAD002390961

Type of Facility: R

Categories of Wastes Handled:

- | | |
|-------------------|---------------------------|
| Contaminated Soil | TCLP Toxic Metals/Mercury |
| Inorganic Solids | |

Onsite Treatment and Disposal Methods: Distillation, mercury vacuum retorting (RMERC).

Restrictions: Mercury recycling facility only; mercury batteries, mercury switches, thermometers, fluorescent lamps, regulators, ignition tubes, personal protective equipment, and debris.

RCRA Permit Status: State Recycling Permit submitted.

Map Key No. 111

Horsehead Resource Development Co., Inc.
401 Delaware Avenue
Palmerston, PA 18071

Contact: J. Totera Phone: 800-253-5579
M.L. Wingert

EPA ID No.: PAD002395887

Type of Facility: R

Categories of Wastes Handled: K061 Waste

Onsite Treatment and Disposal Methods: High-temperature metals recovery (HTMR).

RCRA Permit Status: Part B approved.

Map Key No. 112

Keystone Cement Co.
Route 329
Bath, PA 18014

Contact: Michael Luybii Phone: 610-837-1881

EPA ID No.: PAD002389559

Type of Facility: SR

Categories of Wastes Handled: Solvents/Nonhalogenated

Additional Wastes Handled: Residual fuels.

Map Key No. 109

Enviro Corporation
1600 Pennsylvania Ave
York, PA 17404

Contact: Carl Leffler Phone: 717-846-1900

EPA ID No.: PAD010154045

Type of Facility: TSD

Categories of Wastes Handled:

Aqueous Wastes (other)	TCLP Toxic Metals
Inorganic Sludges/Solids	Waste Acids

Onsite Treatment and Disposal Methods: Evaporation, filtration, ion exchange, metal purification, neutralization, precipitation.

RCRA Permit Status: Part B approved.

Other Services Offered: Analytical services, transportation.

Additional Comments: All wastes recycled as metallic salts and sold for various industrial applications.

Map Key No. 135

Rhone-Poulenc Basic Chemical Company (Houston Plant)

8615 Manchester Blvd
Houston, TX 77012

Contact: Fran Jurgerson **Phone:** 713-928-3411

EPA ID No.: TXD008090079; HW60005001

Type of Facility: DR

Categories of Wastes Handled:

Aqueous Waste with Solvents	Reactives (sulfide)
Aqueous Wastes (other)	Solvents/Halogenated
Inorganic Sludges/Solids	Solvents/Nonhalogenated
Organic Sludges/Solids	TCLP Toxic Metals (in solution)
Paint Sludges	Waste Acids (H ₂ SO ₄)
Pesticides	Waste Oil

Onsite Treatment and Disposal Methods: Liquid injection incineration, spent sulfuric acid regeneration.

RCRA Permit Status: Part B approved.

Other Services Offered: Analytical services.

Map Key No. 136

Rollins Environmental Services (TX) Inc.

P.O. Box 609
Deer Park, TX 77536

Contact: Jack Kelleher **Phone:** 281-830-2326
800-X-WASTES

EPA ID No.: TXD055141378

Type of Facility: TED

Categories of Wastes Handled:

Aqueous Waste with Solvents	Pesticides
Aqueous Wastes (other)	Reactives (cyanide/sulfide)
Contaminated Soil	Solvents/Halogenated
Organic Sludges/Solids	Solvents/Nonhalogenated
Paint Sludges	Waste Acids
PCBs <50 ppm	Waste Caustics
PCBs 50-500 ppm	Waste Oil
PCBs >500 ppm	

Onsite Treatment and Disposal Methods: Landfilling, rotary-kiln incineration, solidification/stabilization.

Restrictions: No explosives. No cellulose products in landfill.

RCRA Permit Status: Part B approved.

TSCA Approval Status: TSCA permit.

Other Services Offered: Analytical services, lab pack processing, PCB services, tank/container cleaning, transportation.

Map Key No. 137

Texas Ecologists, Inc.

P.O. Box 307, Petronilla Rd
Robstown, TX 78390

Contact: Customer Service **Phone:** 800-733-1504

EPA ID No.: TXD069452340

Type of Facility: D

Categories of Wastes Handled:

Organic Sludges/Solids	Solvents/Nonhalogenated
Pesticides	TCLP Toxic Metals
Solvents/Halogenated	

Onsite Treatment and Disposal Methods: Landfilling, stabilization.

Restrictions: No liquids, gases, explosives, or pyrophoric material.

RCRA Permit Status: Part B approved.

Other Services Offered: Cleanup services, consulting, transportation.

Map Key No. 138

Texas Industries L.P.

245 Ward Rd
Midlothian, TX 76065

Contact: Randy Jones **Phone:** 972-647-3946

EPA ID No.: TXD007349327

Type of Facility: RD

Categories of Wastes Handled:

Aqueous Waste with Solvents	Solvents/Nonhalogenated
Aqueous Waste (other)	Waste Oil
Solvents/Halogenated	

Onsite Treatment and Disposal Methods: Cement kiln energy recovery.

RCRA Permit Status: Interim, Part B submitted.

Other Services Offered: Analytical services, transportation.

Map Key No. 139

Treatment One

5743 Cheswood
Houston, TX 77087

Contact: Pam P. Nowlin **Phone:** 713-845-8710

EPA ID No.: TXD055135388

Type of Facility: TSDR

Categories of Wastes Handled:

Aqueous Waste with Solvents	Reactives (cyanide/sulfide)
Aqueous Wastes (other)	Solvents/Halogenated
Contaminated Soil	Solvents/Nonhalogenated
Inorganic Sludges/Solids	TCLP Toxic Metals
Organic Sludges/Solids	Waste Acids
Paint Sludges	Waste Caustics
PCBs <50 ppm	Waste Oil
Pesticides	

Onsite Treatment and Disposal Methods: Hydrolysis, neutralization, oxidation/reduction, solidification/stabilization.

Additional Wastes Handled: Gas cylinders, lab packs, and water reactive material.

Restrictions: No PCBs, explosives, infectious material, or radioactives.

RCRA Permit Status: Part B approved.

Other Services Offered: Field services for gas cylinders and lab packs, fuel blending, and consolidation for incineration.

Map Key No. 140**Waste Control Specialists LLC**

P.O. Box 1937
Pasadena, TX 77501

Contact: A. Paul Nowlin Phone: 888-492-7552

EPA ID No.: TXD988088464

Type of Facility: TSDR

Categories of Wastes Handled:

Aqueous Waste with Solvents	PCBs >500 ppm
Aqueous Waste (other)	Pesticides
Contaminated Soil	Reactives (cyanide/sulfide)
Dioxin	Solvents/Halogenated
Inorganic Sludges/Solids	Solvents/Nonhalogenated
Organic Sludges/Solids	TCLP Toxic Metals
Paint Sludges	Waste Acids
PCBs <50 ppm	Waste Caustics
PCBs 50-500 ppm	Waste Oil

Additional Wastes Handled: All RCRA codes, low-level radioactive wastes, mixed wastes, NORM wastes.

Onsite Treatment and Disposal Methods: Landfilling, microencapsulation, microencapsulation, neutralization, oxidation/reduction, solidification/stabilization, wet oxidation.

Restrictions: Etiological, explosive, putrescible, pyrophoric wastes.

RCRA Permit Status: Part B approved.

TSCA Approval Status: All TSCA-regulated wastes plus co-mingled RCRA TSCA wastes. No limits.

Permitted Capacity: 11,000,000 cubic yards.

Other Services Offered: Analytical services, consulting, emergency response, fuel blending, mobile treatment, site remediation, solvent recovery, tank/container cleaning, transportation. Also, radioactive treatment, storage, and disposal.

Additional Comments: All RCRA waste codes accepted. In-plant rail access.

Map Key No. 142**Laidlaw Environmental Services (Aragonite), Inc.**

11800 N. Aptus Rd
Aragonite, UT 84029

Contact: Jim Jerzual Phone: 801-323-8100

EPA ID No.: UTD981552177

Type of Facility: TS

Categories of Wastes Handled:

Aqueous Waste with Solvents	Pesticides
Aqueous Waste (other)	Solvents/Halogenated
Contaminated Soil	Solvents/Nonhalogenated
Organic Sludges/Solids	TCLP Toxic Metals
Paint Sludges	Waste Acids
PCBs <50 ppm	Waste Caustics
PCBs 60-500 ppm	Waste Oil
PCBs >600 ppm	

Onsite Treatment and Disposal Methods: Rotary-kiln incineration.

Restrictions: No water reactives except in lab packs. No explosives, pyrophorics, radiological wastes, or compressed gas cylinders.

RCRA Permit Status: Part B approved.

TSCA Approval Status: Approved to incinerate PCBs.

Map Key No. 143**Laidlaw Environmental Services (Lone and Grassy Mountain), Inc.—Grassy Mountain Facility**

3 Miles East, 7 Miles North, Exh 41 I-80, P.O. Box 22750
Salt Lake City, UT 84122

Contact: Randall Miller Phone: 801-323-8900

EPA ID No.: UTD991301748

Type of Facility: TSD

Categories of Wastes Handled:

Aqueous Waste with Solvents	Pesticides
Aqueous Waste (other)	Reactives (cyanide/sulfide)
Contaminated Soil	Solvents/Halogenated
Inorganic Sludges/Solids	Solvents/Nonhalogenated
Organic Sludges/Solids	TCLP Toxic Metals
Paint Sludges	Waste Acids
PCBs <50 ppm	Waste Caustics
PCBs 50-500 ppm	Waste Oil
PCBs >600 ppm	

Onsite Treatment and Disposal Methods: Landfilling, neutralization, solidification/stabilization.

RCRA Permit Status: Part B approved.

TSCA Approval Status: Approved for PCBs.

Other Services Offered: Analytical services, consulting, mobile treatment, site remediation, transportation.

UTAH**Map Key No. 141****Envirocare of Utah, Inc.**

46 W. Broadway, Suite 240
Salt Lake City, UT 84101

Contact: Greg Copeland Phone: 801-532-1330

EPA ID No.: UTD982598898

Type of Facility: TSD

Categories of Wastes Handled:

Contaminated Soil	Pesticides
Inorganic Sludges/Solids	Reactives (cyanide/sulfide)
Mixed Wastes	Solvents/Halogenated
Organic Sludges/Solids	Solvents/Nonhalogenated
Paint Sludges	TCLP Toxic Metals
PCBs <50 ppm	

Additional Wastes Handled: Non-RCRA radioactive wastes.

Onsite Treatment and Disposal Methods: Landfilling, microencapsulation, neutralization, solidification/stabilization.

RCRA Permit Status: Part B approved.

Permitted Land Disposal Capacity: 900,000 tons.

VIRGINIA**Map Key No. 144****Clean Harbors Environmental Services, Inc.**

7515 Harvest Road
Prince George, VA 23834

Contact: Gary Young Phone: 804-452-1751

EPA ID No.: VAD989175055

Type of Facility: TSR