Chapter NR 675

LAND DISPOSAL RESTRICTIONS

NR 675.01 Purpose. The purpose of this chapter is to identify hazardous wastes that are restricted from land disposal and define those limited circumstances under which an otherwise prohibited waste may continue to be disposed on land.

History: Cr. Register, February, 1991, No. 422, eff. 3–1–91.

NR 675.02 Applicability. Except as specifically provided, the requirements of this chapter apply to generators and transporters of hazardous waste and owners and operators of hazardous waste treatment, storage or disposal facilities. This chapter does not apply to solid waste generators, transporters or solid waste treatment, storage or disposal facilities that generate, transport or receive only:

(1) Non–hazardous solid waste,

(2) Metallic mining wastes resulting from a mining operation as defined in s. 293.01 (9), Stats., or

(3) A combination of wastes described in subs. (1) and (2).

The publications containing CFR references, title 42 of the United States code, and the clean water act, referred to in this chapter, may be obtained from:

Superintendent of Documents
P.O. Box 371954
Pittsburgh, PA 15250–7954
(202) 512–1800

These documents are available for inspection at the offices of the department, the secretary of state, and the revisor of statutes.

History: Cr. Register, February, 1991, No. 422, eff. 3–1–91; correction made under s. 13.93 (2m) (b) 1., Stats., Register, August, 1992, No. 440; am. (2), r. (3), renum, (4) to be (3) and am., Register, May, 1995, No. 473, 6–1–95**; correction in (2) made under s. 13.93 (2m) (b) 7., Stats., Register, May, 1998, No. 509.**

NR 675.03 Definitions. The definitions in s. NR 600.03 apply to this chapter. In addition, the following definitions also apply to this chapter:

(1) "Debris" means solid material exceeding a 60 mm particle size that is intended for disposal and that is one of the following:

(a) A manufactured object.

(b) Plant or animal matter.

(c) Natural geologic material.

The following materials are not debris: any material for which a specific treatment standard is provided in ss. NR 675.20 to 675.28, namely lead acid batteries, cadmium batteries and radioactive lead solids; process residuals such as smelter slag and residues from the treatment of waste, wastewater, sludges or air emission residues; and intact containers of hazardous waste that are not ruptured and that retain at least 75% of their original volume. A mixture of debris that has not been treated to the standards provided by s. NR 675.25 and other material is subject to regulation as debris if the mixture is comprised primarily of debris, by volume, based on visual inspection.

A mixture of debris that has not been treated to the standards provided by s. NR 675.25 and other material is subject to regulation as debris if the mixture is comprised primarily of debris, by volume, based on visual inspection.

(1m) "De minimis" means losses from normal material handling operations, such as spills from the unloading or transfer of materials from bins or other containers, leaks from pipes, valves or other devices used to transfer materials; minor leaks of process equipment, storage tanks or containers; leaks from well–maintained pump packings and seals; sample purgings; and relief device discharges; discharges from safety showers and rinsing and cleaning of personal safety equipment; and rinsate from empty containers or from containers that are rendered empty by that rinsing.

(1p) "End–of–pipe" means the point where effluent is discharged to the environment.

(2) "Halogenated organic compounds" means those compounds having a carbon–halogen bond which are listed under Appendix II to this chapter.

(3) "Hazardous constituent or constituents" means those constituents listed in ch. NR 605, Appendix IV.

(4) "Hazardous debris" means debris that contains a hazardous waste listed in s. NR 605.09, or that exhibits a characteristic of hazardous waste identified in s. NR 605.08.

(4m) "Inorganic metal–bearing waste" means waste for which EPA has established treatment standards for metal hazardous constituents, and which does not otherwise contain significant organic or cyanide content as described in s. NR 675.06 (3) (a) and is specifically listed in ch. NR 675 Appendix VIII.

(5) "Inorganic solid debris" means nonfriable inorganic solids contaminated with D004–D011 hazardous wastes that are incapable of passing through a 9.5 mm standard sieve; and that require cutting, or crushing and grinding in mechanical sizing equipment prior to stabilization; and are limited to the following inorganic or metal materials:

(a) Metal slags, whether dross or scoria;

(b) Glassified slag;

(c) Glass;

(d) Concrete, excluding cementitious or pozzolanic stabilized hazardous wastes;

(e) Masonry and refractory bricks;

(f) Metal cans, containers, drums or tanks;

(g) Metal nuts, bolts, pipes, pumps, valves, appliances or industrial equipment;

(h) Scrap metal as defined in s. NR 600.03.

(6) "Land disposal" means placement in or on the land, except in a corrective action management 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.

(7) "Nonwastewaters" means wastes that do not meet the criteria for wastewaters in sub. (8).

(7m) "Stormwater impoundments" means surface impoundments which receive wet weather flow, and only receive process waste during wet weather events.

(7p) "Underlying hazardous constituent" means any constituent listed in s. NR 675.28, Table UTS–Universal Treatment Standards, except fluoride, vanadium and zinc, which can reasonably be expected to be present at the point of generation of the hazardous waste, at a concentration above the constituent–specific universal treatment standards.

(8) "Wastewasters" means wastes that contain less than 1% by weight total organic carbon and less than 1% by weight total suspended solids.

History: Cr. Register, February, 1991, No. 422, eff. 3–1–91; r. and recr., Register, May, 1995, No. 473, eff. 6–1–95**; cr. (1m), (1p), (4m) and (7m), am. (8), r. (8) (a) to (c), Register, May, 1998, No. 509, eff. 6–1–98.**

NR 675.04 Exemptions. (1) Wastes which are otherwise prohibited from land disposal under this chapter may be treated in a surface impoundment or series of impoundments provided that:

(a) Treatment of wastes occurs in the impoundments;

(b) The following conditions are met:

1. Sampling and testing. For wastes with treatment standards in ss. NR 675.20 to 675.24 or prohibition levels in ss. NR 675.11 to 675.16 or both, the residues from treatment shall be analyzed as specified in s. NR 675.07 or 675.13 to determine if they meet the applicable treatment standards or, where no treatment standards have been established for the waste, the applicable prohibition levels. The sampling method, specified in the waste analysis plan under s. NR 630.13, shall be designed such that representative samples of the sludge and the supernatant are tested separately rather than mixed to form homogeneous samples.

2. Removal. The following treatment residues, including any liquid waste, shall be removed at least annually: residues which do not meet the treatment standards promulgated under ss. NR 675.20 to 675.24; residues which do not meet the prohibition levels established under ss. NR 675.11 to 675.16 or imposed by statute where no treatment standards have been established; residues which are from the treatment of wastes prohibited from disposal on land under ss. NR 675.11 to 675.16 where no treatment standards have been established and no prohibition levels apply; or residues from managing listed wastes which are not delisted under s. NR 605.10. If the volume of liquid flowing through the impoundment or series of impoundments annually is greater than the volume of the impoundment or impoundments, this flow-through constitutes removal of the supernatant for the purpose of this requirement.

3. Subsequent management. Treatment residues may not be placed in any other surface impoundment for subsequent management.

4. Recordkeeping. The procedures and schedule for the sampling of impoundment contents, the analysis of test data and the annual removal of residues which do not meet the treatment standards, or prohibition levels where no treatment standards have been established, or which are from the treatment of wastes prohibited from disposal on land under ss. NR 675.11 to 675.16 where no treatment standards have been established and no prohibition levels apply, shall be specified in the facility's waste analysis plan as required under s. NR 630.13.

(c) The impoundment meets the design requirements of ch. NR 660, regardless that the unit may not be new, expanded, or a replacement, and shall be in compliance with applicable groundwater monitoring requirements of ch. NR 635, and

(d) The owner or operator submits to the department a written certification that the requirements of par. (b) have been met and submits a copy of the waste analysis plan required under par. (a). The following certification is required:

I certify under penalty of law that the requirements of s. NR 675.04 (1) (c), have been met for all surface impoundments being used to treat restricted wastes. I believe that the submitted information is true, accurate and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.

(2) (a) De minimis losses to wastewater treatment systems of commercial chemical product or chemical intermediates that are ignitable (D001), corrosive (D002), or are organic constituents that exhibit the characteristic of toxicity (D012–D043), and that contain underlying hazardous constituents are not considered to be prohibited wastes.

(b) Land disposal prohibitions for hazardous characteristic wastes do not apply to laboratory wastes displaying the characteristic of ignitability (D001), corrosivity (D002) or organic toxicity (D012–D043) that are mixed with other plant wastewaters at facilities whose ultimate discharge is subject to regulation under ch. 283, Stats., including wastewaters at facilities which have eliminated the discharge of wastewater, provided that either of the following conditions is met:

1. The annualized flow of laboratory wastewater into the facility's headworks does not exceed 1%.

2. The laboratory wastes' combined annualized average concentration does not exceed one part per million in the facility's headworks.

(3) Universal waste handlers and universal waste transporters are exempt from ss. NR 675.07 and 675.30 for the universal wastes which are subject to regulation under ch. NR 690.

(4) De minimis losses of characteristic wastes to wastewaters are not considered to be prohibited wastes. Discharges of laboratory wastes shall not exceed either of the following:

(a) One percent of the total flow of wastewater into the facility's headworks on an annual basis.

(b) A combined annualized average concentration of one part per million in the headworks of the facility's wastewater treatment or pretreatment facility.

(5) Evaporation of hazardous constituents as the principal means of treatment is not considered to be treatment for the purposes of an exemption under this section.

History: Cr. Register, February, 1991, No. 422, eff. 3–1–91; renum. (1) (a) to (c) to be (1) (b) to (d) and am. (1) (b) 1., 2. and 4., cr. (1) (a), Register, August, 1992, No. 440, eff. 9–1–92**; renum. (2) to be (5), cr. (2), (3) and (4), Register, May, 1998, No. 509, eff. 6–1–98.**

NR 675.05 General. (1) (a) Any person who generates, treats, stores or disposes of a hazardous waste may seek an extension to the effective date of any applicable requirement under ss. NR 675.11 to 675.16 by submitting an application to EPA pursuant to 40 CFR 268.5, July 1, 1993.

(b) If EPA denies an application for an extension under 40 CFR 268.5, July 1, 1993, the department shall recognize that denial.

(c) Persons who have had their applications for an extension approved by EPA under 40 CFR 268.5, July 1, 1993, shall continue to manage their wastes in compliance with any applicable restrictions established under ss. NR 675.11 to 675.16 unless and until the department recognizes EPA's approval, except when the waste is being managed in another state and the person complies with that other state's requirements. A person may petition the department to recognize an EPA approval by submitting the following to the department:

1. Copies of all material and information received from EPA, including the extension under 40 CFR 268.5, July 1, 1993.

2. Copies of all material and information received from EPA, including the EPA notice of approval, concerning the extension under 40 CFR 268.5, July 1, 1993.

3. All other information that the department determines is necessary to evaluate the request for an extension.

(d) When determining whether to recognize an EPA−granted extension under 40 CFR 268.5, July 1, 1993, the department shall:

1. Consider all available information including, but not limited to, the information submitted by the applicant to EPA; and

2. Apply the same criteria as applied by EPA under 40 CFR 268.5, July 1, 1993.

(e) The department shall recognize an EPA−granted extension unless the department clearly establishes that an extension would threaten human health or the environment.

An example of when an extension may be sought under this subsection is when there is a lack of treatment, recovery or disposal capacity.

(2) (a) Any person who seeks an exemption from a prohibition under ss. NR 675.11 to 675.16 for the disposal of a restricted hazardous waste in a particular unit or units shall submit a petition to the EPA pursuant to 40 CFR 268.6, July 1, 1993.

(b) If EPA denies a petition for an exemption under 40 CFR 268.6, July 1, 1993, the department shall recognize that denial.

(c) Persons who have had their petitions for an exemption approved by EPA under 40 CFR 268.6, July 1, 1993, shall continue to manage their wastes in compliance with any applicable restriction under ss. NR 675.11 to 675.16 until the department recognizes EPA's approval, except when the waste is being managed in another state and the person complies with that other state's requirements. A person may petition the department to recognize an EPA approval by submitting the following to the department:

1. Copies of all materials and information submitted to EPA concerning the exemption under 40 CFR 268.6, July 1, 1993;

2. Copies of all material and information received from EPA including the EPA notice of approval concerning the exemption under 40 CFR 268.6, July 1, 1993; and

3. All other information that the department determines is necessary to evaluate the request for an exemption.

(d) When determining whether to recognize an EPA−granted exemption under 40 CFR 268.6, July 1, 1993, the department shall:

1. Consider all available information including, but not limited to, the information submitted by the applicant to EPA; and

2. Apply the same criteria as applied by EPA under 40 CFR 268.6, July 1, 1993.

(e) The department shall recognize the EPA granted exemption unless the department clearly establishes that an exemption would threaten human health or the environment.

(3) The following hazardous wastes are not subject to any provision of this chapter:

(a) Waste generated by very small quantity generators of less than 100 kilograms of non−acute hazardous waste or less than 1 kilogram of acute hazardous waste per month as specified in s. NR 610.07.

(b) Waste pesticides that a farmer disposes of pursuant to the requirements under subs. (2) and (3) or s. NR 615.04 (2).

(c) Wastes identified or listed as hazardous after November 8, 1984 for which EPA has not promulgated land disposal restrictions or treatment standards.

History: Cr. Register, February, 1991, No. 422, eff. 3−1−91; am. (1) (a) to (c) 2., (d) (intro.), 2. and (2) (a) to (d), Register, August, 1992, No. 440, eff. 9−1−92; am. (1) (a), (b), (c) (intro.), 1., 2., (d) (intro.), 2., (2) (a), (b), (c) (intro.), 1., 2., (d) (intro.), 2., Register, May, 1995, No. 473, eff. 6−1−95.

NR 675.06 Dilution prohibition. (1) Except as provided in sub. (2), no generator, transporter, handler or owner or operator of a treatment, storage or disposal facility may in any way dilute a restricted waste or the residual from treatment of a restricted waste as a substitute for adequate treatment to achieve compliance with ss. NR 675.20 to 675.28, to circumvent the effective date of or to otherwise avoid a prohibition in ss. NR 675.11 to 675.16, or to circumvent a land disposal prohibition imposed by 42 USC 6924.

(2) Dilution of wastes that are hazardous only because they exhibit a characteristic in a treatment system which treats wastes subsequently discharged to a water of the United States pursuant to a permit issued under s. 283.31, Stats., or which treats wastes for purposes of pretreatment requirements under ss. 283.11 and 283.21, Stats., is not impermissible dilution for purposes of this section unless a method has been specified in s. NR 675.20 as the treatment standard, or unless the waste is a D003 reactive cyanide wastewater or nonwastewater.

(3) Combustion of the hazardous wastes associated with the waste codes listed in ch. NR 675 Appendix IX is prohibited, unless the waste, at the point of generation, or after any bona fide treatment such as cyanide destruction prior to combustion, can be demonstrated to comply with one or more of the criteria listed in pars. (a) to (f) and is not otherwise specifically prohibited from combustion:

(a) The waste contains hazardous organic constituents or cyanide at levels exceeding the constituent−specific treatment standard in s. NR 675.28.

(b) The waste consists of organic, debris−like materials, including but not limited to wood, paper, plastic or cloth, contaminated with an inorganic metal−bearing hazardous waste.

(c) The waste, at point of generation, has a heating value of greater than or equal to 5,000 BTU per pound.

(d) The waste is co−generated with wastes for which combustion is a required method of treatment.

(e) The waste is subject to federal or Wisconsin requirements necessitating reduction of organics, including biological agents.

(f) The waste contains greater than 1% total organic carbon (TOC).

History: Cr. Register, February, 1991, No. 422, eff. 3−1−91; r. and recr., Register, August, 1992, No. 440, eff. 9−1−92; am. (1), (2), Register, May, 1995, No. 473, eff. 6−1−95**; am. (1) and (2), cr. (3), Register, May, 1998, No. 509, eff. 6−1−98.**

NR 675.07 Waste analysis and recordkeeping. (1) (a) Except as specified in s. NR 675.13, if a generator's waste is listed in s. NR 605.09, the generator shall test its waste or test an extract using the toxicity characteristic leaching procedure, test method 1311 in EPA Publication SW−846, "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods", as incorporated by reference in s. NR 600.10 (2) (b) 1. and (c), or use knowledge of the waste, to determine if the waste is restricted from land disposal under this chapter.

(b) Except as specified in s. NR 675.13, if a generator's waste exhibits one or more of the characteristics in s. NR 605.08, the generator shall test an extract using the toxicity characteristic leaching procedure, test method 1311 in EPA Publication SW−846, "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods", as incorporated by reference in s. NR 600.10 (2) (b) 1. and (c), or use knowledge of the waste, to determine if the waste is restricted from land disposal under this chapter.

(c) The generator shall determine the underlying hazardous constituents that are reasonably expected to be present in the D001, D002 or D012−D043 wastes if the generator determines that any of the following is true:

1. For D001 wastes, the generator's waste exhibits the characteristic of ignitability and is neither in the High TOC Ignitable Liquids Subcategory nor is treated by CMBST or RORGS of s. NR 675.22, Table 1.

2. For D002 wastes, the generator's waste exhibits the characteristic of corrosivity and is prohibited under s. NR 675.17.

3. For D012 to D043 wastes, the generator's waste exhibits the characteristic of organic toxicity and is prohibited under s. NR 675.18.

(d) If a generator determines that it is managing a restricted waste under this chapter and the waste exceeds the applicable treatment standards or it exceeds the applicable prohibition levels in s. NR 675.13 or RCRA section 3004 (d), with each shipment of

waste the generator shall notify the treatment or storage facility in writing of the appropriate treatment standards in ss. NR 675.20 to 675.28 and any applicable prohibitions in s. NR 675.13 or 42 USC 6924 (d).

1. The notice shall include all of the following information:

a. EPA hazardous waste number.

b. The waste constituents that the treater will monitor, if monitoring will not include all regulated constituents, for wastes F001–F005, F039, D001, D002 and D012–D043. Generators shall also include whether the waste is a nonwastewater or wastewater and indicate the subcategory of the waste, if applicable.

An example of a subcategory of waste is "D003 reactive cyanide".

c. The manifest number associated with the shipment of waste.

d. For hazardous debris, the contaminants subject to treatment as provided by s. NR 675.25 and the following statement: "This hazardous debris is subject to the alternative treatment standards of s. NR 675.25"; and

e. Waste analysis data, where available.

f. The date the waste is subject to the prohibitions.

2. The generator shall keep a copy of this notice with the generator's copy of the manifest.

(e) If a generator determines that it is managing a restricted waste under this chapter, and determines that the waste may be disposed on land without further treatment, with each shipment of waste the generator shall submit to the treatment, storage or land disposal facility, a notice and a certification stating that the waste meets applicable treatment standards in ss. NR 675.20 to 675.28 and the applicable prohibition levels in s. NR 675.13 or 42 USC 6924 (d). Generators of debris that the department has determined does not contain hazardous waste are not subject to these notification and certification requirements.

1. The notice shall include all of the following information:

a. EPA hazardous waste number.

b. The waste constituents that the treater will monitor, if monitoring will not include all regulated constituents, for wastes F001 to F005, F039, D001, D002 and D012–D043 and s. NR 675.13 and 42 USC 6924 (d). Generators shall also include whether the waste is a nonwastewater or wastewater and indicate the subcategory of the waste, if applicable.

An example of a subcategory of waste is "D003 reactive cyanide".

c. The manifest number associated with the shipment of waste.

d. Waste analysis data, where available.

2. The certification shall be signed by an authorized representative and shall state the following:

"I certify under penalty of law that I personally have examined and am familiar with the waste through analysis and testing or through knowledge of the waste to support this certification that the waste complies with the treatment standards specified in ss. NR 675.20 to 675.28 and all applicable prohibitions in s. NR 675.13 or 42 USC 6924 (d). I believe that the information I submitted is true, accurate and complete. I am aware that there are significant penalties for submitting a false certification, including the possibility of a fine and imprisonment."

3. The generator shall keep a copy of this notice and certification with the generator's copy of the manifest.

(f) If a generator's waste is subject to an exemption from a prohibition against the type of land disposal method utilized for the waste, such as, but not limited to, a case–by–case extension under s. NR 675.05 (1) or an exemption under s. NR 675.05 (2) or a nationwide capacity variance under 40 CFR 268, subpart C, July 1, 1996, with each shipment of waste the generator shall submit a notice to the facility receiving the waste stating that the waste is not prohibited from land disposal.

1. The notice shall include all of the following information:

a. EPA hazardous waste number.

b. The waste constituents that the treater will monitor, if monitoring will not include all regulated constituents, for wastes F001–F005, F039, D001, D002 and D012–D043. Generators shall also include whether the waste is a nonwastewater or wastewater and indicate the subcategory of the waste, such as "D003 reactive cyanide", if applicable.

c. The manifest number associated with the shipment of waste.

d. Waste analysis data, where available.

e. For hazardous debris, the contaminants subject to treatment, as provided by s. NR 675.25 and the following statement: "This hazardous debris is subject to the alternative treatment technologies provided by s. NR 675.25."

f. For hazardous debris when using the treatment standards for contaminating wastes in s. NR 675.20, the requirements in subd. 1.a., b., c., d. and g.

g. The date the waste is subject to the prohibition.

2. The generator shall keep a copy of this notice with the generator's copy of the manifest.

(g) If a generator is managing prohibited waste in tanks, containers or containment buildings regulated under s. NR 610.07 (2), 610.08 (4) or 615.05 (6) and is treating the waste in tanks, containers or containment buildings to meet applicable treatment standards specified in ss. NR 675.20 to 675.28, the generator shall develop and follow a written waste analysis plan which describes the procedures that the generator will carry out to comply with the treatment standards. Generators treating hazardous debris under the alternative treatment standards of s. NR 675.25, Table 1 are not subject to these waste analysis requirements. The plan shall be kept on site in the generator's operating record and all of the following requirements shall be met:

1. The waste analysis plan shall be based on a detailed chemical and physical analysis of a representative sample of the prohibited waste being treated, and contain all information necessary to treat the waste in accordance with the requirements of this chapter, including the selected testing frequency.

2. This plan shall be submitted to the department a minimum of 30 days prior to the treatment activity, with delivery verified.

3. Wastes shipped off site pursuant to this paragraph shall comply with the notification requirements of par. (e).

(h) If a generator determines whether the waste is restricted based solely on the generator's knowledge of the waste, all supporting data used to make this determination shall be retained on site in the generator's files. If a generator determines whether the waste is restricted based on testing this waste or an extract developed using the toxicity characteristic leaching procedure, test method 1311 in EPA Publication SW–846, "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods", as incorporated by reference in s. NR 600.10 (2) (b) 1. and (c), all waste analysis data shall be retained on site in the generator's files.

(i) If a generator determines that it is managing a restricted waste that is excluded from the definition of hazardous or solid waste or exempt from regulation under chs. NR 600 to 685 subsequent to the point of generation, the generator shall place a one–time notice in the facility's file stating the generation, subsequent exclusion from the definition of hazardous or solid waste or exemption from chs. NR 600 to 685 and the disposition of the waste.

(j) Generators shall retain on site a copy of all notices, certifications, demonstrations, waste analysis data and other documentation produced pursuant to this section for at least 5 years from the date that the waste that is the subject of the documentation was last sent to on–site or off–site treatment, storage or disposal. The 5–year record retention period is automatically extended during the course of any unresolved enforcement action regarding the regulated activity. Upon written notice from the department to the

generator, the period of retention may be extended beyond 5 years. The requirements of this paragraph apply to solid wastes even when the hazardous characteristic is removed prior to disposal or when the waste is excluded from the definition of hazardous or solid waste or exempted from regulation under chs. NR 600 to 685 subsequent to the point of generation.

(k) If a generator is managing a lab pack waste and wishes to use the alternative treatment standard under s. NR 675.22, with each shipment of waste the generator shall submit a notice to the treatment facility in accordance with par. (c), except that underlying hazardous constituents need not be determined. The generator shall also comply with the requirements in pars. (g) and (h), and shall submit the following certification signed by an authorized representative:

"I certify under penalty of law that I personally have examined and am familiar with the waste and that the lab pack does not contains any wastes identified at ch. NR 675, Appendix III, Wis. Adm. Code. I am aware that there are significant penalties for submitting a false certification, including the possibility of fine or imprisonment."

(2) Treatment facilities shall test their wastes according to the frequency specified in their waste analysis plans as required by s. NR 630.13 (1) (h). Testing shall be performed as provided in pars. (a), (b) and (c).

(a) For wastes with treatment standards expressed as concentrations in the waste extract in s. NR 675.21, the owner or operator of the treatment facility shall test the treatment residues, or an extract of the residues developed using the toxicity characteristic leaching procedure, method 1311 in EPA Publication SW−846, "Test Methods for Evaluating Solid Waste, Physical/ Chemical Methods", as incorporated by reference in s. NR 600.10 (2) (b) 1. and (c), to ensure that the treatment residues or extract meet the applicable treatment standards.

(b) For wastes that are prohibited under s. NR 675.13 but not subject to any treatment standards under ss. NR 675.20 to 675.24, the owner or operator of the treatment facility shall test the treatment residues according to the generator testing requirements specified in s. NR 675.13 to assure that the treatment residues comply with the applicable prohibitions.

(c) For wastes with treatment standards expressed as concentrations in the waste under s. NR 675.23, the owner or operator of the treatment facility shall test the treatment residues, not an extract of the residues, to assure that the treatment residues meet the applicable treatment standards.

(d) 1. A notice shall be sent with each waste shipment to the land disposal facility which includes the following information:

a. EPA hazardous waste number;

b. The corresponding treatment standards for wastes F001−F005, F039 and wastes prohibited under s. NR 675.13 or 42 USC 6924 (d). Treatment standards for all other restricted wastes shall either be included or be referenced by including on the notification the applicable wastewater or nonwastewater category, the applicable subdivisions made within a waste code based on waste specific criteria and the administrative code sections and paragraphs where the applicable treatment standard appears. Where the applicable treatment standards are expressed as specified technologies in s. NR 675.22, the applicable 5 letter code found in table I of s. NR 675.22 also shall be listed on the notification;

c. The manifest number associated with the shipment of waste; and

d. Waste analysis data, where available.

2. The treatment facility shall keep a copy of this notice with the treatment facility's copy of the manifest.

(e) The treatment facility shall submit a certification with each shipment of waste or treatment residue of a restricted waste to the land disposal facility stating that the waste or treatment residue has been treated in compliance with the treatment standards in ss. NR 675.20 to 675.24 and the applicable prohibitions in s. NR 675.13 or 42 USC 6924 (d).

1. For wastes with treatment standards expressed as concentrations in the waste extract or in the waste, the certification shall be signed by an authorized representative and shall state the following:

"I certify under penalty of law that I have personally examined and am familiar with the treatment technology and operation of the treatment process used to support this certification and that, based on my inquiry of those individuals immediately responsible for obtaining this information, I believe that the treatment process has been operated and maintained properly so as to achieve the performance levels specified in ss. NR 675.20 to 675.28 and all applicable prohibitions in s. NR 675.13 without impermissible dilution of the prohibited waste. I am aware that there are significant penalties for submitting a false certification, including the possibility of fine and imprisonment."

2. For wastes with treatment standards expressed as technologies specified in s. NR 675.22 the certification shall be signed by an authorized representative and shall state the following:

"I certify under penalty of law that the waste has been treated in accordance with the requirements of s. NR 675.22. I am aware that there are significant penalties for submitting a false certification, including the possibility of fine or imprisonment."

3. For wastes with treatment standards expressed as concentrations in the waste pursuant to s. NR 675.23, if compliance with the treatment standards in ss. NR 675.20 to 675.28 is based in part or in whole on the analytical detection limit alternative specified in s. NR 675.23 (3), the certification also shall state the following:

"I certify under penalty of law that I have personally examined and am familiar with the treatment technology and operation of the treatment process used to support this certification and that, based on my inquiry of those individuals immediately responsible for obtaining this information, I believe that the nonwastewater organic constituents have been treated by incineration in units operated in accordance with ch. NR 665 or by combustion in fuel substitution units operating in accordance with applicable technical requirements, and I have been unable to detect the nonwastewater organic constituents despite having used best good faith efforts to analyze for such constituents. I am aware that there are significant penalties for submitting a false certification, including the possibility of fine and imprisonment."

4. For characteristic wastes D001, D002, D003 and D012 to D043 that are subject to the treatment standards in s. NR 675.20 other than those expressed as a required method of treatment, or are reasonably expected to contain underlying hazardous constituents, or are treated on−site to remove the hazardous constituents or are treated on−site to remove the hazardous characteristic; and are then sent off−site for treatment of underlying hazardous constituents, the certification shall state the following:

"I certify under penalty of law that the waste has been treated in accordance with the requirements of s. NR 675.20 to remove the hazardous characteristic. This decharacterized waste contains underlying hazardous constituents that require further treatment to meet universal treatment standards. I am aware that there are significant penalties for submitting a false certification, including the possibility of fine and imprisonment."

5. Generators or treaters who first claim that, under s. NR 605.05 (2) (g), hazardous debris is not subject to the requirements

of chs. NR 610 to 685, are subject to the following notification and certification requirements:

a. A one−time notification, including the following information, must be submitted to the department.

b. The notification must be updated if the debris is shipped to a different facility, and, for debris excluded under s. NR 605.05 (2) (g), if a different type of debris is treated or if a different technology is used to treat the debris.

c. For debris excluded s. NR 605.04 (4), the owner or operator of the treatment facility must document and certify compliance with the treatment standards of s. NR 675.25 Table 1. Records shall be kept of all inspections, evaluations and analyses of treated debris that are made to determine compliance with the treatment standards. Records shall be kept of any data or information the treater obtains during treatment of the debris that identifies key operating parameters of the treatment unit. For each shipment of treated debris, a certification of compliance with the treatment standards shall be signed by an authorized representative and placed in the facility's files. The certification shall state the following:

"I certify under penalty of law that the debris has been treated in accordance with the requirements of s. NR 675.25. I am aware that there are significant penalties for making a false certification, including the possibility of fine and imprisonment."

6. The treatment facility shall keep a copy of this certification with its copy of the manifest.

(f) If the waste or treatment residue will be further managed at a different treatment or storage facility, the treatment, storage or disposal facility sending the waste or treatment residue off−site shall comply with the notice and certification requirements applicable to generators under this section.

(3) The owner or operator of any land disposal facility disposing any waste subject to restrictions under this chapter shall:

(a) Have copies of the notice and certifications specified in sub. (1) or (2).

(b) Test the waste, or an extract of the waste or treatment residue developed using the toxicity characteristic leaching procedure, method 1311 in EPA Publication SW−846, "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods", as incorporated by reference in s. NR 600.10 (2) (b) 1. and (c), or using any methods required by generators under s. NR 675.13 to assure that the wastes or treatment residues are in compliance with the applicable treatment standards in ss. NR 675.20 to 675.24 and all applicable prohibitions in s. NR 675.13 or 42 USC 6924 (d). Testing shall be performed according to the frequency specified in the facility's waste analysis plan as required by s. NR 630.13.

(c) The treatment standards applicable to the waste at the initial point of generation.

(5) Notifications sent under sub. (4) shall be signed by an authorized representative and shall state the language found in s. NR 675.07 (2) (e) 1.

History: Cr. Register, February, 1991, No. 422, eff. 3−1−91; am. (2) (a), (b), (d) 1. b., (e) (intro.), 1. and (g) 2., cr. (1) (b), (g), (i) to (k) and (2) (e) 3., renum. (1) (intro.), (a) to (e) and (2) (e) 3. to be (1) (a), (c) to (f), (h) and (2) (e) 4. and am. (1) (a), (c) (intro.), 1. b., (d) (intro.), 1. b., 2., (e) (intro.), 1. b., (f) and (h), Register, August, 1992, No. 440, eff. 9−1−92; correction made under s. 13.93 (2m) (b) 7., Stats., Register, March, 1993, No. 447; am. (1) (a), (b), (e), (2) (a), (e) 2., (3) (a), (b), renum. (1) (c) 1. d., (f) to (k) to be (1) (c) 1. c., (g) to (l) and am. (1) (g), (k) and (l), cr. (1) (c) 1. d., (e) 2., (f), Register, May, 1995, No. 473, eff. 6−1−95**; r. and recr. (1), am. (2) (a), (2) (e) 1., 3. and (3) (b), renum. (2) (e) 4. to be (2) (e) 6., cr. (2) (e) 4. and 5. Register, May, 1998, No. 509, eff. 6−1−98.**

NR 675.09 Special rules regarding wastes that exhibit a characteristic. (1) The generator of a solid waste shall determine each hazardous waste number, or hazardous waste code, applicable to the waste in order to determine the applicable treatment standards under ss. NR 675.20 to 675.28. For purposes of this chapter, the waste will carry the waste code for any applicable listing under s. NR 605.09. In addition, the waste will carry one or more of the waste codes under s. NR 605.08 where the waste exhibits a characteristic, except in the case when the treatment standard for the waste code listed in s. NR 605.09 operates in lieu of the standard for the waste code under s. NR 605.08 as specified in sub. (4). If the generator determines that the waste displays a hazardous characteristic, and the waste is not a D004−D011 waste, a High TOC D001, or is not treated by CMBST or RORGS of s. NR 675.22 Table 1, the generator shall determine what underlying hazardous constituents are reasonably expected to be present above the universal treatment standards in s. NR 675.28.

(2) Where a prohibited waste is both listed under s. NR 605.09 and exhibits a characteristic under s. NR 605.08, the treatment standard for the waste code listed in s. NR 605.09 will operate in lieu of the standard for the waste code under s. NR 605.08, provided that the treatment standard for the listed waste includes a treatment standard for the constituent that causes the waste to exhibit the characteristic. Otherwise, the waste shall meet the treatment standards for all applicable listed and characteristic waste codes.

(3) In addition to any applicable standards determined from the initial point of generation, no prohibited waste which exhibits a characteristic under s. NR 605.08 may be land disposed unless the waste complies with the treatment standards under s. NR 605.09.

(4) Wastes that exhibit a characteristic are also subject to s. NR 675.07 requirements, except that once the waste is no longer hazardous, the generator or treatment facility shall place a one−time notification and certification in its files and send the notification and certification to the department, except for those facilities described in sub. (7). The notification and certification that the generator or treatment facility places in its files shall be updated if the process or operation generating the waste changes or if the Subtitle D facility receiving the waste changes. However, the generator or treatment facility need only notify the department on an annual basis if these changes occur. The notification and certification shall be sent to the department no later than December 31 of the year in which the changes occur. The notification shall include:

(a) 1. For characteristic wastes other than those managed on site in a wastewater treatment system subject to ch. 283, Stats., the name and address of the subtitle D facility receiving the waste shipment;

2. For all characteristic wastes, a description of the waste as initially generated, including the applicable hazardous waste number, treatability group and underlying hazardous constituents.

(b) A description of the waste as initially generated, including the applicable hazardous waste number, treatability group or groups, and underlying hazardous constituents in D001 and D002 wastes prohibited under s. NR 675.17, or D012−D043 wastes prohibited under s. NR 675.18.

(5) Notifications sent under sub. (4) shall be signed by an authorized representative and shall state the language found in s. NR 675.07 (2) (e) 1. If treatment removes the characteristic but does not treat underlying hazardous constituents, then the certification found in s. NR 675.07 (2) (e) 5. applies.

(6) For decharacterized wastes managed on site in a wastewater treatment system subject to ch. 283, Stats., compliance with the treatment standards in s. NR 675.28 shall be monitored quarterly, unless the treatment is aggressive biological treatment, in which case compliance must be monitored annually. Monitoring results shall be kept in on site files for 5 years.

(7) For decharacterized wastes managed on site in a wastewater treatment system subject to ch. 283, Stats., for which all underlying hazardous constituents are addressed by a permit issued under chs. NR 200 to 299, this compliance shall be documented and the documentation shall be kept in on site files.

History: Cr. Register, August, 1992, No. 440, eff. 9−1−92**; am. (1), (4), (a), (b), (4) (b), and (5), renum. (4) (a) to be (4) (a) 1., cr. (4) (a) 2., (6) and (7), r. (4) (c), Register, May, 1998, No. 509, eff. 6−1−98.**

NR 675.10 Schedule for land disposal prohibition and establishment of treatment standards. (1) IDENTIFICATION OF WASTES TO BE EVALUATED BY AUGUST 8, 1988. EPA will take action under 42 USC 6924 (g) (5) and 42. USC 6924 (m) by August 8, 1988, for the following wastes:

The publication containing title 42 of the United States code may be obtained from:

The Superintendent of Documents
U.S. Government Printing Office
Washington, D.C. 20402

For ease of understanding the wastes have been listed by the section of ch. NR 605 under which they were listed.

(a) s. NR 605.09 (2) (a) Wastes

F006 – Wastewater treatment sludges from electroplating operations except from the following processes: (1) Sulfuric acid anodizing of aluminum; (2) tin-plating on carbon steel; (3) zinc plating (segregated basis) on carbon steel; (4) aluminum or zinc–aluminum plating on carbon steel; (5) cleaning/stripping associated with tin, zinc and aluminum plating on carbon steel; and (6) chemical etching and milling of aluminum.

F007 – Spent cyanide plating bath solutions from electroplating operations.

F008 – Plating bath sludges from the bottom of plating baths from electroplating operations where cyanides are used in the process.

F009 – Spent stripping and cleaning bath solutions from electroplating operations where cyanides are used in the process.

F019 – Wastewater treatment sludges from the chemical conversion coating of aluminum.

(b) s. NR 605.09 (2) (b) Wastes

K001 – Bottom sediment sludge from the treatment of wastewaters from wood preserving processes that use creosote and/or pentachlorophenol.

K004 – Wastewater treatment sludge from the production of zinc yellow pigments.

K008 – Over residue from the production of chrome oxide green pigments.

K011 – Bottom stream from the wastewater stripper in the production of acrylonitrile.

K013 – Bottom stream from the acetonitrile column in the production of acrylonitrile.

K014 – Bottoms from the acetonitrile purification column in the production of acrylonitrile.

K015 – Still bottoms from the distillation of benzyl chloride.

K016 – Heavy ends or distillation residues from the production of carbon tetrachloride.

K017 – Heavy ends (still bottoms) from the purification column in the production of epichlorohydrin.

K018 – Heavy ends from the fractionation column in ethyl chloride production.

K020 – Heavy ends from the distillation of vinyl chloride in vinyl chloride monomer production.

K021 – Aqueous spent antimony catalyst waste from fluoromethanes production.

K022 – Distillation bottom tars from the production of phenol/acetone from cumane.

K024 – Distillation bottoms from the production of phthalic anhydride from naphthalene.

K030 – Column bottom or heavy ends from the combined production of trichloroethylene and perchloroethylene.

K031 – By–products salts generated in the production of MSMA and cacodylic acid.

K035 – Wastewater treatment sludges generated in the production of creosote.

K036 – Still bottoms from toluene reclamation distillation in the production of disulfoton.

K037 – Wastewater treatment sludge from the production of disulfoton.

K044 – Wastewater treatment sludges from the manufacturing and processing of explosives.

K045 – Spent carbon from the treatment of wastewater containing explosives.

K046 – Wastewater treatment sludges from the manufacturing, formulation and loading of lead based initiating compounds.

K047 – Pink/red water from TNT operations.

K060 – Ammonia still lime sludge from coking operations.

K061 – Emission control dust/sludge from the primary production of steel in electric furnaces.

K062 – Spent pickle liquor from steel finishing operations in chlorine production.

K069 – Emission control dust/sludge from secondary lead smelting.

K071 – Brine purification muds from the mercury cells process in chlorine production, where separately prepurified brine is not used.

K073 – Chlorinated hydrocarbon waste from the purification step of the diaphragm cell process using graphite anodes.

K083 – Distillation bottoms from aniline production.

K084 – Wastewater treatment sludges generated during the production of veterinary pharmaceuticals from arsenic or organo–arsenic compounds.

K085 – Distillation of fractionation column bottoms from the production of chlorobenzenes.

K086 – Solvent washes and sludges; caustic washes and sludges, or water washes and sludges from cleaning tubs and equipment used in the formulation of ink from pigments, driers, soaps, and stabilizers containing chromium and lead.

K087 – Decanter tank tar sludge from coking operations.

K099 – Untreated wastewater from the production of 2,4–D.

K101 – Distillation tar residues from the distillation of aniline–based compounds in the production of veterinary pharmaceuticals from arsenic or organo–arsenic compounds.

K102 – Residue from the use of activated carbon for decolorization in the production of veterinary pharmaceuticals from arsenic or organo–arsenic compounds.

K103 – Process residues from aniline extraction from the production of aniline.

K104 – Combined wastewater streams generated from nitrobenzene/aniline production.

K106 – Waste water treatment sludge from the mercury cell process in chlorine production.

(c) s. NR 605.09 (3) (b) Wastes

P001 – Warfarin, when present at concentration greater than 0.3%

P004 – Aldrin

P005 – Allyl alcohol

P010 – Arsenic acid

P011 – Arsenic (V) oxide

P012 – Arsenic (III) oxide

P015 – Beryllium dust

P016 – Bis–(chloromethyl) ether

P018 – Brucine

P020 – Dinoseb

P030 – Soluble cyanide salts not elsewhere specified

P036 – Dichlorophenylarsine

P037 – Dieldrin

P039 – Disulfoton

P041 – Diethyl–p–nitrophenyl phosphate

P048 – 2,4–Dinitrophenol

P050 – Endosulfan

P058 – Fluoracetic acid, sodium salt

P059 – Heptachlor

P063 – Hydrogen cyanide

P068 – Methyl Hydrazine

P069 – Methyllactonitrile

P070 – Aldicarb

P071 – Methyl parathion

P081 – Nitroglycerine

P082 – N–Nitrosodimethylamine

P084 – N–Nitrosomethylvinylamine

P087 – Osmium tetraoxide

P089 – Parathion

P092 – Phenylmercuric acetate

P094 – Phorate

P097 – Famphur

P102 – Propargyl alcohol

P105 – Sodium azide

P108 – Strychnine and salts

P110 – Tetraethyl lead

P115 – Thallium (I) sulfate

P120 – Vanadium pentoxide

P122 – Zinc phosphide, when present at concentrations greater than 10%

P123 – Toxaphene

(d) s. NR 605.09 (3) (c) Wastes

U007 – Acrylamide

U009 – Acrylonitrile

U010 – Mitomycin C

U012 – Aniline

U016 – Benz(c)acridine

U018 – Benz(a)anthracene

U019 – Benzene

U022 – Benzo(a)pyrene

U029 – Methyl bromide

U031 – n–Butanol

U036 – Chlordane, technical

U037 – Chlorobenzene

U041 – n–Chloro–2,3–epoxypropane

U043 – Vinyl chloride

U044 – Chloroform

U046 – Chloromethyl methyl ether

U050 – Chrysene

U051 – Creosote

U053 – Crotonaldehyde

U061 – DDT

U063 – Dibenz o (a, h) anthracene

U064 – 1,2:7,8 Dibenzopyrene

U066 – Dibromo–3–chloropropane 1,2

U067 – Ethylene dibromide

U074 – 1,4–Dichloro–2–butene

U077 – Ethane, 1,2–dichloro

U078 – Dichloroethylene, 1,1

U086 – N,N Diethylhydrazine

U089 – Diethylstilbestrol

U103 – Dimethyl sulfate

U105 – 2,4–Dinitrotoluene

U108 – Dioxane, 1,4

U115 – Ethylene oxide

U122 – Formaldehyde

U124 – Furan

U129 – Lindane

U130 – Hexachlorocyclopentadiene

U133 – Hydrazine

U134 – Hydrofluoric acid

U137 – Indeno(1,2,3–cd)pyrene
U151 – Mercury
U154 – Methanol
U155 – Methapyrilene
U157 – 3–Methylcholanthrene
U158 – 4,4–Methylene–bis–(2–chloroaniline)
U159 – Methyl ethyl ketone
U171 – Nitropropane, 2
U177 – N–Nitroso–N–methylurea
U180 – N–Nitrosopyrrolidine
U185 – Pentachloronitrobenzene
U188 – Phenol
U192 – Pronamide
U200 – Reserpine
U209 – Tetrachloroethane, 1,1,2,2
U210 – Tetrachloroethylene
U211 – Carbon tetrachloride
U219 – Thiourea
U220 – Toluene
U221 – Toluenediamine
U223 – Toluene diisocyanate
U226 – Methylchloroform
U227 – Trichloroethane, 1,1,2
U228 – Trichloroethylene
U237 – Uracil mustard
U238 – Ethyl carbamate
U248 – Warfarin, when present at concentrations of 0.3% or less
U249 – Zinc phosphide, when present at concentrations of 10% or less

(2) IDENTIFICATION OF WASTES TO BE EVALUATED BY JUNE 8, 1989. By June 8, 1989, EPA will take action under the resource conservation and recovery act to evaluate the hazardous wastes associated with the following waste codes for either appropriate treatment technologies or standard or both. A description of each waste can be found in ch. NR 605.

Table I – Second Third Wastes

F010	F011	F012	F024			
K009	K010	K019	K025	K027	K028	K029
K038	K039	K040	K041	K042	K043	K095
K096	K097	K098	K105			
P002	P003	P007	P008	P014	P026	P027
P029	P040	P043	P044	P049	P054	P057
P060	P062	P066	P067	P072	P074	P085
P098	P104	P106	P107	P111	P112	P113
P114						
U002	U003	U005	U008	U011	U014	U015
U020	U021	U023	U025	U026	U028	U032
U035	U047	U049	U057	U058	U059	U060
U062	U070	U073	U080	U083	U092	U093
U094	U095	U097	U098	U099	U101	U106
U107	U109	U110	U111	U114	U116	U119
U127	U128	U131	U135	U138	U140	U142
U143	U144	U146	U147	U149	U150	U161
U162	U163	U164	U165	U168	U169	U170
U172	U173	U174	U176	U178	U179	U189
U193	U196	U203	U205	U206	U208	U213
U214	U215	U216	U217	U218	U235	U239
U244						

(3) IDENTIFICATION OF WASTES TO BE EVALUATED BY MAY 8, 1990. By May 8, 1990, EPA will take action under the resource conservation and recovery act to evaluate the hazardous wastes associated with the following waste codes for either appropriate treatment technologies or standard or both. A description of each waste can be found in ch. NR 605.

Table II – Final Third Wastes

K002	K003	K005	K006	K007	K023	K026
K032	K033	K034	K048	K049	K050	K051
K052	K093	K094	K100			
P006	P009	P013	P017	P021	P022	P023
P024	P028	P031	P033	P034	P038	P042
P045	P046	P047	P051	P056	P064	P065
P073	P075	P076	P077	P078	P088	P093
P095	P096	P099	P101	P103	P109	P116
P118	P119	P121				
U001	U004	U006	U017	U024	U027	U030
U033	U034	U038	U039	U042	U045	U048
U052	U055	U056	U068	U069	U071	U072
U075	U076	U079	U081	U082	U084	U085
U087	U088	U090	U091	U096	U102	U112
U113	U117	U118	U120	U121	U123	U125
U126	U132	U136	U139	U141	U145	U148
U152	U153	U156	U160	U166	U167	U181
U182	U183	U184	U186	U187	U190	U191
U194	U197	U201	U202	U204	U207	U222
U225	U234	U236	U240	U243	U246	U247

(4) EPA EVALUATION BASED UPON CHARACTERISTIC. By May 8, 1990, EPA shall take action under the resource conservation and recovery act to evaluate all wastes identified as hazardous based on a characteristic alone for either appropriate treatment technologies or standard or both.

Examples of wastes identified hazardous based on a characteristic alone include corrosivity, reactivity, ignitability and toxicity.

(5) Wastewater residues, with less than 1% total organic carbon and less than 1% total suspended solids, resulting from the following well designed and well operated treatment methods for wastes listed in subs. (1) and (2) for which EPA has not promulgated wastewater treatment standards:

(a) Metals recovery;
(b) Metals precipitation;
(c) Cyanide destruction;
(d) Carbon adsorption;

(e) Chemical oxidation steam stripping;

(f) Biodegradation; and

(g) Incineration or other direct thermal destruction.

(6) Hazardous wastes listed in subs. (1) and (2) that are mixed radioactive and hazardous wastes.

(7) Multi−source leachate that is derived from disposal of any listed waste, except from hazardous waste D020, F021, F022, F023, F026, F027 or F028.

(8) Nonwastewater forms of wastes listed in sub. (1) that were originally disposed before August 17, 1988 and for which EPA has promulgated "no land disposal" as the treatment standard at s. NR 675.23, table CCW, no land disposal subtable. This provision does not apply to waste codes K044, K045, K047 and K061, high zinc subcategory.

(9) Nonwastewater forms of wastes listed in sub. (1) that were originally disposed of before August 17, 1988 and for which EPA has promulgated "no land disposal" as the treatment standard at s. NR 675.23, table CCW, no land disposal subtable. This provision does not apply to waste codes K044, K045, K047 and K061, high zinc subcategory.

(10) Nonwastewater forms of wastes listed in sub. (1) for which EPA has promulgated "no land disposal" as the treatment standard at s. NR 675.23, table CCW, no land disposal subtable, that are generated in the course of treating wastewater forms of the wastes. This provision does not apply to waste codes K044, K045, K047 and K061, high zinc subcategory.

(11) Nonwastewater forms of waste codes K015 and K083.

History: Cr. Register, February, 1991, No. 422, eff. 3−1−91; renum. from NR 675.09 and am. (1) (b), (8) and (9), Register, August, 1992, No. 440, eff. 9−1−92; am. (1) (d), (9), renum. (10) to be (11), cr. (10), Register, May, 1995, No. 473, eff. 6−1−95.

NR 675.11 Waste specific prohibitions – solvent wastes. (1) Effective March 1, 1991, the spent solvent wastes specified as hazardous by EPA hazardous waste nos. F001, F002, F003, F004 and F005, are prohibited from land disposal.

(2) Effective March 1, 1991, the F001 to F005 solvent wastes which are contaminated soil and debris resulting from a response action taken under 42 USC 9604 or 42 USC 9606 or a corrective action required under 42 USC 6921 to 6939a and the residues from treating these wastes are prohibited from land disposal.

(3) The requirements of subs. (1) and (2) do not apply if:

(a) The wastes meet the treatment standards of ss. NR 675.20 to 675.24; or

(b) Persons have been granted an exemption from a prohibition pursuant to a no migration petition for a waste under s. NR 675.05 (2) with respect to those wastes and units covered by the petition; or

(c) Persons have been granted an extension to the effective date of a prohibition for a waste due to a nationwide capacity shortage pursuant to s. NR 675.05 (3), with respect to those wastes covered by the extension.

History: Cr. Register, February, 1991, No. 422, eff. 3−1−91; renum. from NR 675.10, Register, August, 1992, No. 440, eff. 9−1−92.

NR 675.12 Waste specific prohibitions – wastes containing dioxin. (1) Effective March 1, 1991, dioxin containing wastes specified as hazardous by EPA hazardous waste nos. F020, F021, F022, F023, F026, F027 and F028 are prohibited from land disposal.

(2) The requirements of sub. (1) do not apply if:

(a) The wastes meet the standards of ss. NR 675.20 to 675.24; or,

(b) Persons have been granted an exemption from a prohibition pursuant to a no migration petition for a waste under s. NR 675.05 (3), with respect to those wastes and units covered by the petition; or

(c) Persons have been granted an extension to the effective date of a prohibition pursuant to s. NR 675.05 (1), with respect to those wastes covered by the extension.

History: Cr. Register, February, 1991, No. 422, eff. 3−1−91; renum. from NR 675.11, Register, August, 1992, No. 440, eff. 9−1−92.

NR 675.13 Waste specific prohibitions – California list. (1) The following hazardous wastes are prohibited from land disposal effective March 1, 1991:

(a) Liquid hazardous wastes having a pH less than or equal to 2.0;

(b) Liquid hazardous wastes containing polychlorinated biphenyls (PCBs) at concentrations greater than or equal to 50 ppm;

(c) Liquid hazardous wastes that are primarily water and contain halogenated organic compounds (HOCs) in total concentration greater than or equal to 1,000 mg/l and less than 10,000 mg/l HOCs.

(d) Liquid hazardous wastes that contain HOCs in total concentration greater than or equal to 1,000 mg/l and are not prohibited under par. (c); and

(e) Nonliquid hazardous wastes containing HOCs in total concentration greater than or equal to 1,000 mg/kg.

The term halogenated organic compound is defined in s. NR 600.03 (104) and includes compounds listed in Appendix II to this chapter.

(2) The requirements of sub. (1) do not apply if:

(a) Persons have been granted an exemption from a prohibition pursuant to a no migration petition for a waste under s. NR 675.05 (2), with respect to those wastes and units covered by the petition, except for liquid hazardous wastes containing polychlorinated biphenyls at concentrations greater than or equal to 500 ppm which are not eligible for the exemptions; or

(b) Persons have been granted an extension to the effective date of a prohibition for a waste pursuant to s. NR 675.05 (1), with respect to those wastes covered by the extension; or

(c) The wastes meet the applicable standards specified in ss. NR 675.20 to 675.24 or, where treatment standards are not specified, the wastes are in compliance with the applicable prohibitions in this chapter, or 42 USC 6924 (d).

(d) An exemption has been granted under s. NR 675.05 (3) due to a shortage of treatment capacity.

(3) The prohibitions and effective dates specified in sub. (1) do not apply where the waste is subject to a prohibition and effective date for a specified HOC.

An example of a specified HOC would be a hazardous waste chlorinated solvent.

(4) To determine whether or not a waste is a liquid under this section, the following test shall be used: method 9095, paint filter liquids test, as described in EPA Publication SW−846, "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods", as incorporated by reference in s. NR 600.10 (2) (b) 1. and (c).

(5) Except as otherwise provided in this subsection, the waste analysis and recordkeeping requirements of s. NR 675.07 are applicable to wastes prohibited under this chapter or 42 USC 6924 (d).

(a) The initial generator of a liquid hazardous waste shall test its waste, not an extract or filtrate, in accordance with the procedures specified in s. NR 605.08, or use knowledge of the waste, to determine if the waste has a pH less than or equal to 2.0.

If the liquid waste has a pH less than or equal to 2.0, it is restricted from land disposal and all requirements of this chapter are applicable, except as otherwise specified in this section.

(b) The initial generator of either a liquid hazardous waste containing polychlorinated biphenyls (PCBs) or a liquid or nonliquid hazardous waste containing halogenated organic compounds (HOCs) shall test its waste, not an extract or filtrate, or use knowledge of the waste, to determine whether the concentration levels

in the waste equal or exceed the prohibition levels specified in this section.

If the concentration of PCBs or HOCs in the waste is greater than or equal to the prohibition levels specified in this section, the waste is restricted from land disposal and all requirements of this chapter are applicable, except as otherwise specified in this section.

History: Cr. Register, February, 1991, No. 422, eff. 3–1–91; renum. from NR 675.12, Register, August, 1992, No. 440, eff. 9–1–92; am. (4), Register, May, 1995, No. 473, eff. 6–1–95**; am. (4), Register, May, 1998, No. 509, eff. 6–1–98.**

NR 675.14 Waste specific prohibitions – first third wastes. (1) The wastes specified as hazardous by EPA hazardous waste nos. F006 (nonwastewater), K001, K004 wastes specified in s. NR 675.23 (1), K008 wastes specified in s. NR 675.23 (1), K016, K018, K019, K020, K021 wastes specified in s. NR 675.23 (1), K022 (nonwastewater), K024, K025 nonwastewaters specified in s. NR 675.23 (1), K030, K036 (nonwastewater), K037, K044, K045, nonexplosive K046 (nonwastewater), K047, K060 (nonwastewater), K061 (nonwastewaters containing less than 15% zinc), K062, non CaSO4 K069 (nonwastewaters), K086 (solvent washes), K087, K099, K100 nonwastewaters specified in s. NR 675.23 (1), K101 (wastewater), K101 (nonwastewater, low arsenic subcategory – less than 1% total arsenic), K102 (wastewater), K102 (nonwastewater, low arsenic subcategory – less than 1% total arsenic), K103 and K104 are prohibited from land disposal.

(2) Effective March 1, 1991, wastes specified as hazardous by EPA hazardous waste nos. K061, containing 15% zinc or greater, and K071 are prohibited from land disposal.

(3) Effective March 1, 1991, the wastes specified in s. NR 675.10 (1) having a treatment standard in ss. NR 675.20 to 675.24 based on incineration and which are contaminated soil and debris are prohibited from land disposal.

(4) The requirements of subs. (1) to (3) do not apply if:

(a) The wastes meet the applicable standards specified in ss. NR 675.20 to 675.24; or

(b) Persons have been granted an exemption from a prohibition pursuant to a no migration petition for a waste under s. NR 675.05 (2), with respect to those wastes and units covered by the petition; or

(c) Persons have been granted an extension to the effective date of a prohibition for a waste pursuant to s. NR 675.05 (1), with respect to those wastes covered by the extension.

(d) An exemption has been granted due to a shortage of treatment capacity by s. NR 675.05 (3).

(5) To determine whether a hazardous waste listed in s. NR 675.10 (1) exceeds the applicable treatment standards specified in ss. NR 675.21 to 675.23, the initial generator shall test a representative sample of the waste extract or the entire waste depending on whether the treatment standards are expressed as concentrations in the waste extract or the waste, or the generator may use knowledge of the waste. If the waste contains constituents in excess of the applicable ss. NR 675.20 to 675.24 levels, the waste is prohibited from land disposal and all requirements of this chapter are applicable, except as otherwise specified.

History: Cr. Register, February, 1991, No. 422, eff. 3–1–91; renum. from NR 675.13 and am. (3) and (5), Register, August, 1992, No. 440, eff. 9–1–92; am. (2), (5), Register, May, 1995, No. 473, eff. 6–1–95.

NR 675.15 Waste specific prohibitions – second third wastes. (1) Effective March 1, 1991, the following wastes specified in s. NR 605.09 (2) as EPA hazardous waste nos. F010; F024; the wastes specified in s. NR 605.09 (2) (b) as EPA hazardous waste nos. K005, K007, K009 (nonwastewaters), K010, K023, K027, K028, K029 (nonwastewaters), K036 (wastewaters), K038, K039, K040, K043, K093, K094, K095 (nonwastewaters), K096 (nonwastewaters), K113, K114, K115, K116 and the wastes specified in s. NR 605.09 (3) (b) as EPA hazardous wastes nos. P013, P021, P029, P030, P039, P040, P041, P043, P044, P062, P063, P071, P074, P085, P089, P094, P097, P098, P099, P104, P106, P109, P111, P121, U028, U058, U069, U087, U088, U102, U107, U221, U223 and U235 are prohibited from land disposal.

(2) Effective March 1, 1991, the wastes specified in s. NR 605.09 (2) (b) as EPA hazardous waste nos. K009 (wastewaters), K011 (nonwastewaters), K013 (nonwastewaters) and K014 (nonwastewaters) are prohibited from land disposal.

(3) Effective March 1, 1991, the wastes specified in s. NR 605.09 (2) as EPA hazardous wastes nos. F006 — cyanide (nonwastewater), F008, F009, F011 (wastewaters) and F012 (wastewaters) are prohibited from land disposal.

(4) Effective March 1, 1991, the waste specified in s. NR 605.09 (2) as EPA hazardous waste no. F007 is prohibited from land disposal.

(5) Effective March 1, 1991, F011 (nonwastewaters) and F012 (nonwastewaters) are prohibited from land disposal pursuant to the treatment standards specified in ss. NR 675.21 and 675.23 applicable to F011 (nonwastewaters) and F012 (nonwastewaters).

(6) Effective June 8, 1991, the wastes specified in this section have a treatment standard in ss. NR 675.20 to 675.24 based on incineration, and which are contaminated soil and debris are prohibited from land disposal.

(7) The requirements of subs. (1) to (6) do not apply if:

(a) The wastes meet the applicable standards specified in ss. NR 675.20 to 675.24, or

(b) Persons have been granted an exemption from a prohibition pursuant to a petition under s. NR 675.05 (2) regarding those wastes and units covered by the petition.

(8) The requirements of subs. (1) to (5) do not apply if persons have been granted an extension to the effective date of a prohibition pursuant to the requirements under 40 CFR 268.5, July 1, 1993, with respect to those wastes covered by the extension.

(9) To determine whether a hazardous waste listed in s. NR 675.10 exceeds the applicable treatment standards specified in ss. NR 675.21 and 675.23, the initial generator shall test a representative sample of the waste extract or the entire waste, depending on whether the treatment standards are expressed as concentrations in the waste extract or the waste, or the generator may use knowledge of the waste. If the waste contains constituents in excess of the applicable ss. NR 675.20 to 675.24 levels, the waste is prohibited from land disposal and all requirements of this chapter are applicable, except as otherwise specified.

History: Cr. Register, February, 1991, No. 422, eff. 3–1–91; renum. from NR 675.14 and am. (7), (9) and (10), Register, August, 1992, No. 440, eff. 9–1–92; r. (7), renum. (8) to (10) to be (7) to (9) and am. (8), Register, May, 1995, No. 473, eff. 6–1–95.

NR 675.16 Waste specific prohibitions—third third wastes. (1) Effective September 1, 1992, the following wastes are prohibited from land disposal:

(a) The wastes specified in s. NR 605.09 (2) (a) as EPA hazardous waste numbers F002 (1, 1, 2–trichloroethane), F005 (benzene), F005 (2–ethoxy ethanol), F005 (2–nitropropane), F006 (wastewaters), F019, F025 and F039 (wastewaters);

(b) The wastes specified in s. NR 605.09 (2) (b) as EPA hazardous waste numbers K002; K003; K004 (wastewaters); K005 (wastewaters); K006; K008 (wastewaters); K011 (wastewaters); K013 (wastewaters), K014 (wastewaters); K015 (nonwastewaters); K017; K021 (wastewaters); K022 (wastewaters); K025 (wastewaters); K026; K029 (wastewaters); K031 (wastewaters); K032; K033; K034; K035; K041; K042; K046 (wastewaters, reactive nonwastewaters); K048 (wastewaters); K049 (wastewaters); K050 (wastewaters); K051 (wastewaters); K052 (wastewaters); K060 (wastewaters); K061 (wastewaters); and high zinc subcategory (15% zinc); K069 (wastewaters, calcium sulfate nonwastewaters); K073; K083; K084 (wastewaters); K085; K095 (wastewaters); K096 (wastewaters); K097; K098; K100 (wastewaters); K101 (wastewaters); K102 (wastewaters); K105; and K106 (wastewaters);

(c) The wastes specified in s. NR 605.09 (3) (b) as EPA hazardous waste numbers P001; P002; P003; P004; P005; P006; P007; P008; P009; P010 (wastewaters); P011 (wastewaters); P012 (wastewaters); P014; P015; P016; P017; P018; P020; P022; P023; P024; P026; P027; P028; P031; P033; P034; P036 (wastewaters); P037; P038 (wastewaters); P042; P045; P046; P047; P048; P049; P050; P051; P054; P056; P057; P058; P059; P060; P064; P065 (wastewaters); P066; P067; P068; P069; P070; P072; P073; P075; P076; P077; P078; P081; P082; P084; P088; P092 (wastewaters); P093; P095; P096; P101; P102; P103; P105; P108; P110; P112; P113; P114; P115; P116; P118; P119; P120; P122; and P123;

(d) The wastes specified in s. NR 605.09 (3) (c) as EPA hazardous waste numbers U001; U002; U003; U004; U005; U006; U007; U008; U009; U010; U011; U012; U014; U015; U016; U017; U018; U019; U020; U021; U022; U023; U024; U025; U026; U027; U029; U030; U031; U032; U033; U034; U035; U036; U037; U038; U039; U041; U042; U043; U044; U045; U046; U047; U048; U049; U050; U051; U052; U053; U055; U056; U057; U059; U060; U061; U062; U063; U064; U066; U067; U068; U070; U071; U072; U073; U074; U075; U076; U077; U078; U079; U080; U081; U082; U083; U084; U085; U086; U089; U090; U091; U092; U093; U094; U095; U096; U097; U098; U099; U101; U103; U105; U106; U108; U109; U110; U111; U112; U113; U114; U115; U116; U117; U118; U119; U120; U121; U122; U123; U124; U125; U126; U127; U128; U129; U130; U131; U132; U133; U134; U135; U136 (wastewaters); U137; U138; U140; U141; U142; U143; U144; U145; U146; U147; U148; U149; U150; U151 (wastewaters); U152; U153; U154; U155; U156; U157; U158; U159; U160; U161; U162; U163; U164; U165; U166; U167; U168; U169; U170; U171; U172; U173; U174; U176; U177; U178; U179; U180; U181; U182; U183; U184; U185; U186; U187; U188; U189; U191; U192; U193; U194; U196; U197; U200; U201; U202; U203; U204; U205; U206; U207; U208; U209; U210; U211; U213; U214; U215; U216; U217; U218; U219; U220; U222; U225; U226; U227; U228; U234; U236; U237; U238; U239; U240; U243; U244; U246; U247; U248; U249; and

(e) The following wastes identified as hazardous based on a characteristic alone: D001; D002, D003, D004 (wastewaters), D005, D006; D007; D008 (except for lead materials stored before secondary smelting), D009 (wastewaters), D010, D011, D012, D013, D014, D015, D016 and D017.

(2) Effective September 1, 1992, the following wastes specified in s. NR 605.09 (2) (b) as EPA hazardous waste numbers K048 (nonwastewaters), K049 (nonwastewaters), K050 (nonwastewaters), K051 (nonwastewaters), and K052 (nonwastewaters) are prohibited from land disposal.

(3) Effective May 8, 1992, the following waste specified in s. NR 605.09 (2) (a) as EPA hazardous waste numbers F039 (nonwastewaters); the wastes specified in s. NR 605.09 (2) (b) as EPA hazardous waste numbers K031 (nonwastewaters); K084 (nonwastewaters); K101 (nonwastewaters); K102 (nonwastewaters); K106 (nonwastewaters); the wastes specified in s. NR 605.09 (3) (b) as EPA hazardous waste numbers P010 (nonwastewaters); P011 (nonwastewaters); P012 (nonwastewaters); P036 (nonwastewaters); P038 (nonwastewaters); P065 (nonwastewaters); P087; and P092 (nonwastewaters); the wastes specified in s. NR 605.09 (3) (c) as EPA hazardous waste numbers U136 (nonwastewaters); and U151 (nonwastewaters); and the following wastes identified as hazardous based on a characteristic alone: D004 (nonwastewaters); and D009 (nonwastewaters); and RCRA hazardous wastes that contain naturally occurring radioactive materials are prohibited from land disposal.

(4) Effective May 8, 1992, hazardous wastes listed in ss. NR 675.10 to 675.13 that are mixed radioactive and hazardous wastes are prohibited from land disposal, except as provided in sub. (5).

(5) Subject to applicable prohibitions in ss. NR 675.11 to 675.13, contaminated soil and debris are prohibited from land disposal as follows:

(a) Effective May 8, 1993, debris that is contaminated with wastes listed in ss. NR 675.11 to 675.13, including such wastes that are mixed radioactive hazardous wastes, and debris that is contaminated with any characteristic waste for which treatment standards are established in ss. NR 675.21 to 675.23, including such wastes that are mixed radioactive hazardous wastes, are prohibited from land disposal.

(b) Effective May 8, 1993, hazardous soil having treatment standards in ss. NR 675.21 to 675.23 based on incineration, mercury retorting or vitrification, and soils contaminated with hazardous wastes listed in ss. NR 675.11 to 675.13 that are mixed radioactive hazardous wastes, are prohibited from land disposal.

(6) The requirements of subs. (1) to (5) do not apply if:

(a) The wastes meet the applicable standards specified in ss. NR 675.20 to 675.24;

(b) Persons have been granted an exemption from a prohibition pursuant to a petition under s. NR 675.05 (2), with respect to those wastes and units covered by the petition;

(c) The wastes meet the applicable alternate standards established pursuant to a petition granted under s. NR 675.24;

(d) Persons have been granted an extension to the effective date of a prohibition pursuant to s. NR 675.05 (1), with respect to these wastes covered by the extension.

(7) To determine whether a hazardous waste listed in s. NR 675.09 exceeds the applicable treatment standards specified in ss. NR 675.21 and 675.23, the initial generator shall test a representative sample of the waste extract or the entire waste, depending on whether the treatment standards are expressed as concentrations in the waste extract or the waste, or the generator may use knowledge of the waste. If the waste contains constituents in excess of the applicable ss. NR 675.20 to 675.24 levels, the waste is prohibited from land disposal, and all requirements of this chapter are applicable, except as otherwise specified.

(8) Effective June 1, 1995, D008 lead materials stored before secondary smelting are prohibited from land disposal.

(a) On or before June 1, 1995, the owner or operator of each secondary lead smelting facility shall submit to the department the following:

1. A binding contractual commitment to construct or otherwise provide capacity for storing such D008 wastes prior to smelting which complies with all applicable storage standards;

2. Documentation that the capacity to be provided will be sufficient to manage the entire quantity of such D008 wastes; and

3. A detailed schedule for providing such capacity.

(b) Failure by a facility to submit such documentation shall render such D008 managed by that facility prohibited from land disposal effective June 1, 1995. In addition, no later than June 1, 1995, the owner or operator of each facility shall place in the facility record documentation of the manner and location in which such wastes will be managed pending completion of such capacity, demonstrating that such management capacity will be adequate and complies with all applicable requirements of chs. NR 600 to 685.

History: Cr. Register, August, 1992, No. 440, eff. 9–1–92; am. (3), r. and recr. (4), (5), r. (6), renum. (7) and (8) to be (6) and (7), cr. (8), Register, May, 1995, No. 473, eff. 6–1–95.

NR 675.17 Waste specific prohibitions: newly listed wastes. (1) Effective November 9, 1992, the wastes specified in s. NR 605.09 (2) (b) as hazardous waste nos. K107, K108, K109, K110, K111, K112, K117, K118, K123, K124, K125, K126, K131, K132 and K136; and the wastes specified in s. NR

605.09 (3) (c) as hazardous waste numbers U328, U353 and U359 are prohibited from land disposal.

(2) Effective June 30, 1993, the wastes specified in s. NR 605.09 (2) (a) as hazardous waste nos. F037 and F038 that are not generated from surface impoundment cleanouts or closures are prohibited from land disposal.

(3) Effective June 30, 1994, the wastes specified in s. NR 605.09 (2) (a) as hazardous waste nos. F037 and F038 that are generated from surface impoundment cleanouts or closures are prohibited from land disposal.

(4) Effective June 30, 1994, radioactive wastes that are mixed with hazardous wastes specified in s. NR 605.09 (2) (a) as hazardous waste nos. F037 and F038; the wastes specified in s. NR 605.09 (2) (b) as hazardous waste nos. K107, K108, K109, K110, K111, K112, K117, K118, K123, K124, K125, K126, K131, K132 and K136; or the wastes specified in s. NR 605.09 (3) (c) as hazardous waste nos. U328, U353 and U359 are prohibited from land disposal.

(5) Effective June 30, 1994, debris contaminated with hazardous wastes specified in s. NR 605.09 (2) (a) as hazardous waste nos. F037 and F038; the wastes specified in s. NR 605.09 (2) (b) as hazardous waste nos. K107, K108, K109, K110, K111, K112, K117, K118, K123, K124, K125, K126, K131, K132 and K136; or the wastes specified in s. NR 605.09 (3) (c) as hazardous waste nos. U328, U353 and U359; and which is not contaminated with any other waste already subject to a prohibition are prohibited from land disposal.

(6) Between June 30, 1992 and June 30, 1993, the wastes included in sub. (2) may be disposed of in a landfill only if the unit is in compliance with s. NR 675.05 (1), and may be generated in and disposed of in a surface impoundment only if the unit is in compliance with s. NR 675.05 (1).

(7) Between June 30, 1992 and June 30, 1994, the wastes included in subs. (4) and (5) may be disposed of in a landfill only if the unit is in compliance with s. NR 675.05 (1), and may be generated in and disposed of in a surface impoundment only if the unit is in compliance with s. NR 675.05 (1).

(8) The requirements of subs. (1), (2), (3), (4) and (5) do not apply if:

(a) The wastes meet the applicable standards in ss. NR 675.20 to 675.28.

(b) Persons have been granted an exemption from a prohibition pursuant to a petition under s. NR 675.05 (2) with respect to those wastes and units covered by the petition.

(c) The wastes meet the applicable alternate standards established pursuant to a petition granted under s. NR 675.24.

(d) Persons have been granted an extension to the effective date of a prohibition pursuant to s. NR 675.05 (1), with respect to the wastes covered by the extension.

(9) To determine whether a hazardous waste identified in this section exceeds the applicable treatment standards specified in ss. NR 675.21 and 675.23, the generator shall test a representative sample of the waste extract or the entire waste, depending on whether the treatment standards are expressed as concentrations in the waste extract or the waste, or the generator may use knowledge of the waste. If the waste contains constituents in excess of the applicable levels in ss. NR 675.20 to 675.28, the waste is prohibited from land disposal, and all requirements of ch. NR 675 are applicable, except as otherwise specified.

History: Cr. Register, May, 1998, No. 509, eff. 6–1–98.

NR 675.18 Waste specific prohibitions: ignitable and corrosive characteristic wastes whose treatment standards were vacated. Effective August 9, 1993, the wastes specified in subs. (1) and (2) are prohibited from land disposal.

(1) Wastes specified in s. NR 675.21 as D001 but not listed in the High TOC Ignitable Liquids Subcategory that are managed in systems other than those whose discharge is regulated under ch. 283, Stats.

(2) Wastes specified in s. NR 675.22 as D002 that are managed in systems other than those whose discharge is regulated under ch. 283, Stats.

History: Cr. Register, May, 1998, No. 509, eff. 6–1–98.

NR 675.19 Waste specific prohibitions: newly identified organic toxicity characteristic wastes and newly listed coke by–product and chlorotoluene production wastes; ch. 283, Stats., equivalent; spent aluminum potliners; and carbamate wastes. (1) NEWLY IDENTIFIED ORGANIC TOXICITY CHARACTERISTIC WASTES AND NEWLY LISTED COKE BY–PRODUCT AND CHLOROTOLUENE PRODUCTION WASTES. (a) Effective December 19, 1994, the wastes specified in s. NR 605.09 (2) (b) as hazardous waste numbers K141, K142, K143, K144, K145, K147, K148, K149, K150 and K151 are prohibited from land disposal. In addition, debris contaminated with hazardous waste numbers F037, F038, K107–K112, K117, K118, K123–K126, K131, K132, K136, U328, U353, U359, and soil and debris contaminated with D012–D043, K141–K145 and K147–K151 are prohibited from land disposal. The following wastes that are specified in s. NR 605.08 (5) Table 1 as hazardous waste numbers: D012, D013, D014, D015, D016, D017, D018, D019, D020, D021, D022, D023, D024, D025, D026, D027, D028, D029, D030, D031, D032, D033, D034, D035, D036, D037, D038, D039, D040, D041, D042 and D043 that are not radioactive, or that are managed in systems other than those whose discharge is regulated under ch. 283, Stats., are prohibited from land disposal.

(b) On September 19, 1996, radioactive wastes that are mixed with D018–D043 that are managed in systems other than those whose discharge is regulated under ch. 283, Stats., are prohibited from land disposal. Radioactive wastes mixed with K141–K145 and K147–K151 are also prohibited from land disposal. In addition, soil and debris contaminated with these radioactive mixed wastes are prohibited from land disposal.

(c) Between December 19, 1994 and September 19, 1996, the wastes included in sub. (2) may be disposed in a landfill or surface impoundment only if the unit is in compliance with the requirements specified in s. NR 675.05 (1).

(d) The requirements of pars. (a) to (c) do not apply if any of the following conditions apply:

1. The wastes meet the applicable treatment standards in ss. NR 675.20 to 675.28.

2. Persons have been granted an exemption from a prohibition pursuant to a petition under s. NR 675.05 (2), with respect to those wastes and units covered by the petition.

3. The wastes meet the applicable alternate treatment standards established pursuant to a petition granted under s. NR 675.24.

4. Persons have been granted an extension to the effective date of a prohibition pursuant to s. NR 675.05 (1), with respect to these wastes covered by the extension.

(e) To determine whether a hazardous waste identified in this section exceeds the applicable treatment standards specified in s. NR 675.20, the generator shall test a sample of the waste extract or the entire waste, depending on whether the treatment standards are expressed as concentrations in the waste extract or the waste, or the generator may use knowledge of the waste. If the waste contains constituents in excess of the applicable levels specified in ss. NR 675.20 to 675.28, the waste is prohibited from land disposal, and all requirements of ch. NR 675 are applicable, except as otherwise specified.

(2) SPENT ALUMINUM POTLINERS AND CARBAMATE WASTES. (a) On July 8, 1996, the wastes specified in s. NR 605.09 as hazardous waste numbers K156–K161; and in s. NR 605.09 as hazardous waste numbers P127, P128, P185, P188–P192, P194, P196–P199,

P201–P205, U271, U277–U280, U364–U367, U372, U373, U375–U379, U381–U387, U389–U396, U400–U404, U407 and U409–U411 are prohibited from land disposal. In addition, soil and debris contaminated with these wastes are prohibited from land disposal.

(b) On July 8, 1996 the wastes identified in s. NR 605.08 as D003 that are managed in systems other than those whose discharge is regulated under ch. 283, Stats., are prohibited from land disposal. This prohibition does not apply to unexploded ordnance and other explosive devices which have been the subject of an emergency response, including D003 wastes are prohibited unless they meet the treatment standard of DEACT before land disposal, as provided in s. NR 675.20.

(c) On July 8, 1996, the wastes specified in s. NR 605.08 as hazardous waste number K088 are prohibited from land disposal. In addition, soil and debris contaminated with these wastes are prohibited from land disposal.

(d) On April 8, 1998, decharacterized wastes managed in surface impoundments whose discharge is regulated under ch. 283, Stats., are prohibited from land disposal. The following are exceptions to this requirement:

1. Surface impoundments which are licensed under s. NR 680.32.

2. Storm water impoundments.

3. Surface impoundments which are part of facilities in the pulp, paper and paperboard industrial category.

(e) On April 8, 1998, radioactive wastes mixed with K088, K156–K161, P127, P128, P185, P188–P192, P194, P196–P199, P201–P205, U271, U277–U280, U364–U367, U372, U373, U375–U379, U381–U387, U389–U396, U400–U404, U407, and U409–U411 are prohibited from land disposal. In addition, soil and debris contaminated with these radioactive mixed wastes are prohibited from land disposal.

(f) Between July 8, 1996 and April 8, 1998, the wastes included in pars. (a), (b), (c) and (e) may be disposed in a landfill or surface impoundment if the landfill or surface impoundment is in compliance with s. NR 675.05 (1).

(g) Paragraphs (a) to (e) do not apply if any of the following conditions are met:

1. The wastes meet the applicable treatment standards specified in ss. NR 675.20 to 675.28.

2. A person has been granted an exemption from a prohibition pursuant to a petition under 40 CFR 268.6, with respect to those wastes and units covered by the petition.

3. The wastes meet the applicable alternate treatment standards established pursuant to a petition granted under 40 CFR 268.44.

4. Persons have been granted an extension to the effective date of a prohibition pursuant to 40 CFR 268.5, with respect to the wastes covered by the extension.

(h) To determine whether a hazardous waste identified in this section exceeds the applicable treatment standards specified in s. NR 675.20, the generator shall test a sample of the waste extract or the entire waste, depending on whether the treatment standards are expressed as concentrations in the waste extract or the waste, or the generator may use knowledge of the waste. If the waste contains constituents in excess of the applicable levels in ss. NR 675.20 to 675.28, the waste is prohibited from land disposal, and all requirements of this chapter are applicable, except as otherwise specified.

History: Cr. Register, May, 1998, No. 509, eff. 6–1–98.

NR 675.20 Applicability of treatment standards. **(1)** The table "Treatment Standards for Hazardous Wastes" in this section provides criteria for the land disposal of hazardous wastes. A waste identified in the table "Treatment Standards for Hazardous Wastes" may be land disposed only if it meets the requirements found in the table. For each waste, the table identifies one of 3 types of treatment standard requirements:

(a) All hazardous constituents in the waste or in the treatment residue shall be at or below the values found in the table for that waste under the heading "wastewaters" or "non–wastewaters", as applicable; or

(b) The hazardous constituents in the extract of the waste or in the extract of the treatment residue shall be at or below the values found in the table under the heading "wastewaters" or "non–wastewaters", as applicable; or

(c) The waste shall be treated using the technologies specified in the table, which are described in detail in s. NR 675.22, Table 1–Technology Codes and Description of Technology–Based Standards.

(2) Compliance with concentration level standards shall be determined as specified in pars. (a) to (d).

(a) For wastewaters, based on maximums for any one day, except for D004 through D011 wastes for which the previously promulgated treatment standards based on grab samples remain in effect.

(b) For all nonwastewaters, based on grab sampling.

(c) For wastes subject to the waste extract standards, other than D004 and D008, by using test Method 1311, the Toxicity Characteristic Leaching Procedure found in "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods", EPA Publication SW–846, as incorporated by reference in s. NR 600.10 (2) (b) 1. and (c).

(d) For wastes D004 and D008, by using either of the following 2 test methods:

1. Method 1311.

2. Method 1310, the Extraction Procedure Toxicity Test.

(3) Wastes covered by a technology standard may be land disposed after being treated using that specified technology or an equivalent treatment technology approved by the department following the procedures in s. NR 675.22 (2).

(4) When wastes with differing treatment standards for a constituent of concern are combined for purposes of treatment, the treatment residue shall meet the lowest treatment standard for the constituent of concern.

(5) Notwithstanding the prohibitions in sub. (1), treatment and disposal facilities may demonstrate, and certify pursuant to s. NR 675.07 (2) (e), compliance with the treatment standards for organic constituents specified by a footnote in the table "Treatment Standards for Hazardous Wastes" in this section, provided that all of the following conditions in pars. (a) to (c) are satisfied:

(a) The treatment standards for the organic constituents were established based on incineration in units operated in accordance with the technical requirements of ch. NR 665, or based on combustion in fuel substitution units operating in accordance with applicable technical requirements.

(b) The treatment or disposal facility has used the methods referenced in par. (a) to treat the organic constituents.

(c) The treatment or disposal facility may demonstrate compliance with organic constituents if good–faith analytical efforts achieve detection limits for the regulated organic constituents that do not exceed the treatment standards specified in this section by an order of magnitude.

(6) For characteristic wastes D001, D002 and D012–D043 that are subject to treatment standards in the table "Treatment Standards for Hazardous Wastes," all underlying hazardous constituents shall meet Universal Treatment Standards, found in s. NR 675.28, Table UTS, prior to land disposal.

(7) The treatment standards for F001–F005 nonwastewater constituents carbon disulfide, cyclohexanone and methanol apply to wastes which contain only one, 2 or 3 of these constituents. Compliance shall be measured for these constituents in the waste extract from Test Method 1311, the Toxicity Characteristic Leach-

ing Procedure found in "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods", EPA Publication SW−846, as incorporated by reference in s. NR 600.10 (2) (b) 1. and (c). If the waste contains any of these 3 constituents along with any of the other 25 constituents found in F001−F005, then compliance with treatment standards for carbon disulfide, cyclohexanone and methanol are not required.

The treatment standards that heretofore appeared in tables in ss. NR 675.21, 675.22 and 675.23 have been consolidated into the table "Treatment Standards for Hazardous Wastes" in this section.

SECTION NR 675.20 TREATMENT STANDARDS FOR HAZARDOUS WASTES

Waste Code	Waste Description and Treatment/Regulatory Subcategory[1]	REGULATED HAZARDOUS CONSTITUENT		WASTEWATERS	NON–WASTEWATERS
		Common Name	CAS[2] No.	Concentration mg/l[3]; or Technology Code[4]	Concentration in mg/kg[5] unless noted as "mg/l TCLP"; or Technology Code
D001	Ignitable Characteristic Wastes, except for the s. NR 605.08 (2) (a) 1. High TOC Subcategory.	NA	NA	DEACT and meet s. NR 675.28 standards[8]; or RORGS; or CMBST	DEACT and meet s. NR 675.28 standards[8]; or RORGS; or CMBST
	High TOC Ignitable Characteristic Liquids Subcategory based on s. NR 605.08 (2) (a) 1. – Greater than or equal to 10% total organic carbon. (Note: This subcategory consists of nonwastewaters only).	NA	NA	NA	RORGS; or CMBST
D002	Corrosive Characteristic Wastes.	NA	NA	DEACT and meet s. NR 675.28 standards[8]	DEACT and meet s. NR 675.28 standards[8]
D002, D004, D005, D006, D007, D008, D009, D010, D011	Radioactive high level wastes generated during the reprocessing of fuel rods. (Note: This subcategory consists of nonwastewaters only.)	Corrosivity (pH)	NA	NA	HLVIT
		Arsenic	7440–38–2	NA	HLVIT
		Barium	7440–39–3	NA	HLVIT
		Cadmium	7440–43–9	NA	HLVIT
		Chromium (Total)	7440–47–3	NA	HLVIT
		Lead	7439–92–1	NA	HLVIT
		Mercury	7439–97–6	NA	HLVIT
		Selenium	7782–49–2	NA	HLVIT
		Silver	7440–22–4	NA	HLVIT
D003	Reactive Sulfides Subcategory based on s. NR 605.08 (4) (a) 5.	NA	NA	DEACT	DEACT
	Explosives Subcategory based on s. NR 605.08 (4) (a) 6., 7., and 8.	NA	NA	DEACT and meet s. NR 675.28 standards[8]	DEACT and meet s. NR 675.28 standards[8]
	Unexploded ordnance and other explosive devices which have been the subject of an emergency response.	NA	NA	DEACT	DEACT
	Other Reactives Subcategory based on s. NR 605.08 (4) (a) 1.	NA	NA	DEACT and meet s. NR 675.28 standards[8]	DEACT and meet s. NR 675.28 standards[8]
	Water Reactive Subcategory based on s. NR 605.08 (4) (a) 2., 3., and 4. (Note: This subcategory consists of nonwastewaters only).	NA	NA	NA	DEACT and meet s. NR 675.28 standards[8]
	Reactive Cyanides Subcategory based on s. NR 605.08 (4) (a) 5.	Cyanides (Total) [7]	57–12–5	Reserved	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30

D004	Wastes that exhibit, or are expected to exhibit, the characteristic of toxicity for arsenic based on the extraction procedure (EP) in SW–846 Method 1310.	Arsenic	7440–38–2	5.0	5.0 mg/l EP
		Arsenic; alternate[6] standard for nonwastewaters only.	7440–38–2	NA	5.0 mg/l TCLP
D005	Wastes that exhibit, or are expected to exhibit, the characteristic of toxicity for barium based on the extraction procedure (EP) in SW–846 Method 1310.	Barium	7440–39–3	100	100 mg/l TCLP
D006	Wastes that exhibit, or are expected to exhibit, the characteristic of toxicity for cadmium based on the extraction procedure (EP) in SW–846 Method 1310.	Cadmium	7440–43–9	1.0	1.0 mg/l TCLP
	Cadmium Containing Batteries Subcategory (Note: This subcategory consists of nonwastewaters only.)	Cadmium	7440–43–9	NA	RTHRM
D007	Wastes that exhibit, or are expected to exhibit, the characteristic of toxicity for chromium based on the extraction procedure (EP) in SW–846 Method 1310.	Chromium (Total)	7440–47–3	5.0	5.0 mg/l TCLP
D008	Wastes that exhibit, or are expected to exhibit, the characteristic of toxicity for lead based on the extraction procedure (EP) in SW–846 Method 1310.	Lead	7439–92–1	5.0	5.0 mg/l EP
		Lead; alternate[6] standard for nonwastewaters only	7439–92–1	NA	5.0 mg/l TCLP
	Lead Acid Batteries Subcategory (Note: This standard only applies to lead acid batteries that are identified as RCRA hazardous wastes and that are not excluded elsewhere from regulation under the land disposal restrictions of ch. NR 675 or exempted under other regulations (see s. NR 625.12). This subcategory consists of nonwastewaters only.)	Lead	7439–92–1	NA	RLEAD
	Radioactive Lead Solids Subcategory (Note: These lead solids include, but are not limited to, all forms of lead shielding and other elemental forms of lead. These lead solids do not include treatment residuals such as hydroxide sludges, other wastewater treatment residuals, or incinerator ashes that can undergo conventional pozzolanic stabilization, nor do they include organo–lead materials that can be incinerated and stabilized as ash. This subcategory consists of nonwastewaters only).	Lead	7439–92–1	NA	MACRO

D009	Nonwastewaters that exhibit, or are expected to exhibit, the characteristic of toxicity for mercury based on the extraction procedure (EP) in SW–846 Method 1310; and contain greater than or equal to 260 mg/kg total mercury that also contain organics and are not incinerator residues. (High Mercury–Organic Subcategory)	Mercury	7439–97–6	NA	IMERC; or RMERC
	Nonwastewaters that exhibit, or are expected to exhibit, the characteristic of toxicity for mercury based on the extraction procedure (EP) in SW–846 Method 1310; and contain greater than or equal to 260 mg/kg total mercury that are inorganic, including incinerator residues and residues from RMERC. (High Mercury–Inorganic Subcategory)	Mercury	7439–97–6	NA	RMERC
	Nonwastewaters that exhibit, or are expected to exhibit, the characteristic of toxicity for mercury based on the extraction procedure (EP) in SW–846 Method 1310; and contain less than 260 mg/kg total mercury. (Low Mercury Subcategory)	Mercury	7439–97–6	NA	0.20 mg/l TCLP
	All D009 wastewaters.	Mercury	7439–97–6	0.20	NA
	Elemental mercury contaminated with radioactive materials. (Note: This subcategory consists of nonwastewaters only.)	Mercury	7439–97–6	NA	AMLGM
	Hydraulic oil contaminated with Mercury Radioactive Materials Subcategory. (Note: This subcategory consists of nonwastewaters only.)	Mercury	7439–97–6	NA	IMERC
D010	Wastes that exhibit, or are expected to exhibit, the characteristic of toxicity for selenium based on the extraction procedure (EP) in SW–846 Method 1310.	Selenium	7782–49–2	1.0	5.7 mg/l TCLP
D011	Wastes that exhibit, or are expected to exhibit, the characteristic of toxicity for silver based on the extraction procedure (EP) in SW–846 Method 1310.	Silver	7440–22–4	5.0	5.0 mg/l TCLP
D012	Wastes that are TC for Endrin based on the TCLP in SW–846 Method 1311.	Endrin	72–20–8	BIODG; or CMBST	0.13 and meet s. NR 675.28 standards[8]
		Endrin aldehyde	7421–93–4	BIODG; or CMBST	0.13 and meet s. NR 675.28 standards[8]

D013	Wastes that are TC for Lindane based on the TCLP in SW–846 Method 1311.	alpha–BHC	319–84–6	CARBN; or CMBST	0.066 and meet s. NR 675.28 standards[8]
		beta–BHC	319–85–7	CARBN; or CMBST	0.066 and meet s. NR 675.28 standards[8]
		delta–BHC	319–86–8	CARBN; or CMBST	0.066 and meet s. NR 675.28 standards[8]
		gamma–BHC (Lindane)	58–89–9	CARBN; or CMBST	0.066 and meet s. NR 675.28 standards[8]
D014	Wastes that are TC for Methoxychlor based on the TCLP in SW–846 Method 1311.	Methoxychlor	72–43–5	WETOX or CMBST	0.18 and meet s. NR 675.28 standards[8]
D015	Wastes that are TC for Toxaphene based on the TCLP in SW–846 Method 1311.	Toxaphene	8001–35–2	BIODG or CMBST	2.6 and meet s. NR 675.28 standards[8]
D016	Wastes that are TC for 2,4–D (2,4–Dichlorophenoxyacetic acid) based on the TCLP in SW–846 Method 1311.	2,4–D (2,4–Dichlorophenoxyacetic acid)	94–75–7	CHOXD; BIODG; or CMBST	10 and meet s. NR 675.28 standards[8]
D017	Wastes that are TC for 2,4,5–TP (Silvex) based on the TCLP in SW–846 Method 1311.	2,4,5–TP (Silvex)	93–72–1	CHOXD or CMBST	7.9 and meet s. NR 675.28 standards[8]
D018	Wastes that are TC for Benzene based on the TCLP in SW–846 Method 1311.	Benzene	71–43–2	0.14 and meet s. NR 675.28 standards[8]	10 and meet s. NR 675.28 standards[8]
D019	Wastes that are TC for Carbon tetrachloride based on the TCLP in SW–846 Method 1311.	Carbon tetrachloride	56–23–5	0.057 and meet s. NR 675.28 standards[8]	6.0 and meet s. NR 675.28 standards[8]
D020	Wastes that are TC for Chlordane based on the TCLP in SW–846 Method 1311.	Chlordane (alpha and gamma isomers)	57–74–9	0.0033 and meet s. NR 675.28 standards[8]	0.26 and meet s. NR 675.28 standards[8]
D021	Wastes that are TC for Chlorobenzene based on the TCLP in SW–846 Method 1311.	Chlorobenzene	108–90–7	0.057 and meet s. NR 675.28 standards[8]	6.0 and meet s. NR 675.28 standards[8]
D022	Wastes that are TC for Chloroform based on the TCLP in SW–846 Method 1311.	Chloroform	67–66–3	0.046 and meet s. NR 675.28 standards[8]	6.0 and meet s. NR 675.28 standards[8]
D023	Wastes that are TC for o–Cresol based on the TCLP in SW–846 Method 1311.	o–Cresol	95–48–7	0.11 and meet s. NR 675.28 standards[8]	5.6 and meet s. NR 675.28 standards[8]
D024	Wastes that are TC for m–Cresol based on the TCLP in SW–846 Method 1311.	m–Cresol (difficult to distinguish from p–cresol)	108–39–4	0.77 and meet s. NR 675.28 standards[8]	5.6 and meet s. NR 675.28 standards[8]
D025	Wastes that are TC for p–Cresol based on the TCLP in SW–846 Method 1311.	p–Cresol (difficult to distinguish from m–cresol)	106–44–5	0.77 and meet s. NR 675.28 standards[8]	5.6 and meet s. NR 675.28 standards[8]
D026	Wastes that are TC for Cresols (Total) based on the TCLP in SW–846 Method 1311.	Cresol–mixed isomers (Cresylic acid) (sum of o–, m–, and p–cresol concentrations)	1319–77–3	0.88 and meet s. NR 675.28 standards[8]	11.2 and meet s. NR 675.28 standards[8]

D027	Wastes that are TC for p–Dichlorobenzene based on the TCLP in SW–846 Method 1311.	p–Dichlorobenzene (1,4–Dichlorobenzene)	106–46–7	0.090 and meet s. NR 675.28 standards[8]	6.0 and meet s. NR 675.28 standards[8]
D028	Wastes that are TC for 1,2–Dichloroethane based on the TCLP in SW–846 Method 1311.	1,2–Dichloroethane	107–06–2	0.21 and meet s. NR 675.28 standards[8]	6.0 and meet s. NR 675.28 standards[8]
D029	Wastes that are TC for 1,1–Dichloroethylene based on the TCLP in SW–846 Method 1311.	1,1–Dichlorethylene	75–35–4	0.025 and meet s. NR 675.28 standards[8]	6.0 and meet s. NR 675.28 standards[8]
D030	Wastes that are TC for 2,4–Dinitrotoluene based on the TCLP in SW–846 Method 1311.	2,4–Dinitrotoluene	121–14–2	0.32 and meet s. NR 675.28 standards[8]	140 and meet s. NR 675.28 standards[8]
D031	Wastes that are TC for Heptachlor based on the TCLP in SW–846 Method 1311.	Heptachlor	76–44–8	0.0012 and meet s. NR 675.28 standards[8]	0.066 and meet s. NR 675.28 standards[8]
		Heptachlor epoxide	1024–57–3	0.016 and meet s. NR 675.28 standards[8]	0.066 and meet s. NR 675.28 standards[8]
D032	Wastes that are TC for Hexachlorobenzene based on the TCLP in SW–846 Method 1311.	Hexachlorobenzene	118–74–1	0.055 and meet s. NR 675.28 standards[8]	10 and meet s. NR 675.28 standards[8]
D033	Wastes that are TC for Hexachlorobutadiene based on the TCLP in SW–846 Method 1311.	Hexachlorobutadiene	87–68–3	0.055 and meet s. NR 675.28 standards[8]	5.6 and meet s. NR 675.28 standards[8]
D034	Wastes that are TC for Hexachloroethane based on the TCLP in SW–846 Method 1311.	Hexachloroethane	67–72–1	0.055 and meet s. NR 675.28 standards[8]	30 and meet s. NR 675.28 standards[8]
D035	Wastes that are TC for Methyl ethyl ketone based on the TCLP in SW–846 Method 1311.	Methyl ethyl ketone	78–93–3	0.28 and meet s. NR 675.28 standards[8]	36 and meet s. NR 675.28 standards[8]
D036	Wastes that are TC for Nitrobenzene based on the TCLP in SW–846 Method 1311.	Nitrobenzene	98–95–3	0.068 and meet s. NR 675.28 standards[8]	14 and meet s. NR 675.28 standards[8]
D037	Wastes that are TC for Pentachlorophenol based on the TCLP in SW–846 Method 1311.	Pentachlorophenol	87–86–5	0.089 and meet s. NR 675.28 standards[8]	7.4 and meet s. NR 675.28 standards[8]
D038	Wastes that are TC for Pyridine based on the TCLP in SW–846 Method 1311.	Pyridine	110–86–1	0.014 and meet s. NR 675.28 standards[8]	16 and meet s. NR 675.28 standards[8]
D039	Wastes that are TC for Tetrachloroethylene based on the TCLP in SW–846 Method 1311.	Tetrachloroethylene	127–18–4	0.056 and meet s. NR 675.28 standards[8]	6.0 and meet s. NR 675.28 standards[8]
D040	Wastes that are TC for Trichloroethylene based on the TCLP in SW–846 Method 1311.	Trichloroethylene	79–01–6	0.054 and meet s. NR 675.28 standards[8]	6.0 and meet s. NR 675.28 standards[8]
D041	Wastes that are TC for 2,4,5–Trichlorophenol based on the TCLP in SW–846 Method 1311.	2,4,5–Trichlorophenol	95–95–4	0.18 and meet s. NR 675.28 standards[8]	7.4 and meet s. NR 675.28 standards[8]
D042	Wastes that are TC for 2,4,6–Trichlorophenol based on the TCLP in SW–846 Method 1311.	2,4,6–Trichlorophenol	88–06–2	0.035 and meet s. NR 675.28 standards[8]	7.4 and meet s. NR 675.28 standards[8]
D043	Wastes that are TC for Vinyl chloride based on the TCLP in SW–846 Method 1311.	Vinyl chloride	75–01–4	0.27 and meet s. NR 675.28 standards[8]	6.0 and meet s. NR 675.28 standards[8]

F001, F002, F003, F004, & F005	F001, F002, F003, F004 and/or F005 solvent wastes that contain any combination of one or more of the following spent solvents: acetone, benzene, n–butyl alcohol, carbon disulfide, carbon tetrachloride, chlorinated fluorocarbons, chlorobenzene, o–cresol, m–cresol, p–cresol, cyclohexanone, o–dichlorobenzene, 2–ethoxyethanol, ethyl acetate, ethyl benzene, ethyl ether, isobutyl alcohol, methanol, methylene chloride, methyl ethyl ketone, methyl isobutyl ketone, nitrobenzene, 2–nitropropane, pyridine, tetrachloroethylene, toluene, 1,1,1–trichloroethane, 1,1,2–trichloroethane, 1,1,2–trichloro–1,2,2–trifluorethane, trichloroethylene, trichloromonofluoromethane, and/or xylenes (except as specifically noted in other subcategories). See further details of these listings in s. NR 605.09 (2) (a).	Acetone	67–64–1	0.28	160
		Benzene	71–43–2	0.14	10
		n–Butyl alcohol	71–36–3	5.6	2.6
		Carbon disulfide	75–15–0	3.8	NA
		Carbon tetrachloride	56–23–5	0.057	6.0
		Chlorobenzene	108–90–7	0.057	6.0
		o–Cresol	95–48–7	0.11	5.6
		m–Cresol (difficult to distinguish from p–cresol)	108–39–4	0.77	5.6
		p–Cresol (difficult to distinguish from m–cresol)	106–44–5	0.77	5.6
		Cresol–mixed isomers (Cresylic acid) (sum of o–, m–, and p–cresol concentrations)	1319–77–3	0.88	11.2
		Cyclohexanone	108–94–1	0.36	NA
		o–Dichlorobenzene	95–50–1	0.088	6.0
		Ethyl acetate	141–78–6	0.34	33
		Ethyl benzene	100–41–4	0.057	10
		Ethyl ether	60–29–7	0.12	160
		Isobutyl alcohol	78–83–1	5.6	170
		Methanol	67–56–1	5.6	NA
		Methylene chloride	75–09–2	0.089	30
		Methyl ethyl ketone	78–93–3	0.28	36
		Methyl isobutyl ketone	108–10–1	0.14	33
		Nitrobenzene	98–95–3	0.068	14
		Pyridine	110–86–1	0.014	16
		Tetrachloroethylene	127–18–4	0.056	6.0
		Toluene	108–88–3	0.080	10
		1,1,1–Trichlorethane	71–55–6	0.054	6.0
		1,1,2–Trichloroethane	79–00–5	0.054	6.0
		1,1,2–Trichloro–1,2,2–trifluoro ethane	76–13–1	0.057	30
		Trichloroethylene	79–01–6	0.054	6.0
		Trichloromonofluoromethane	75–69–4	0.020	30
		Xylenes–mixed isomers (sum of o–, m–, and p–xylene concentrations)	1330–20–7	0.32	30
	F003 and/or F005 solvent wastes that contain any combination of one or more of the following 3 solvents as the only listed F001–5 solvents: carbon disulfide,	Carbon disulfide	75–15–0	3.8	4.8 mg/l TCLP
		Cyclohexanone	108–94–1	0.36	0.75 mg/l TCLP

	solvents: carbon disulfide, cyclohexanone, and/or methanol (formerly s. NR 675.21 (3)).	Methanol	67–56–1	5.6	0.75 mg/l TCLP
	F005 solvent waste containing 2–Nitropropane as the only listed F001–5 solvent.	2–Nitropropane	79–46–9	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
	F005 solvent waste containing 2–Ethoxyethanol as the only listed F001–5 solvent.	2–Ethoxyethanol	110–80–5	BIODG; or CMBST	CMBST
F006	Wastewater treatment sludges from electroplating operations except from the following processes: (1) Sulfuric acid anodizing of aluminum; (2) tin plating on carbon steel; (3) zinc plating (segregated basis) on carbon steel; (4) aluminum or zinc–aluminum plating on carbon steel; (5) cleaning/stripping associated with tin, zinc and aluminum plating on carbon steel; and (6) chemical etching and milling of aluminum.	Cadmium	7440–43–9	0.69	0.19 mg/l TCLP
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
		Nickel	7440–02–0	3.98	5.0 mg/l TCLP
		Silver	7440–22–4	NA	0.30 mg/l TCLP
F007	Spent cyanide plating bath solutions from electroplating operations.	Cadmium	7440–43–9	NA	0.19 mg/l TCLP
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
		Nickel	7440–02–0	3.98	5.0 mg/l TCLP
		Silver	7440–22–4	NA	0.30 mg/l TCLP
F008	Plating bath residues from the bottom of plating baths from electroplating operations where cyanides are used in the process.	Cadmium	7440–43–9	NA	0.19 mg/l TCLP
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
		Nickel	7440–02–0	3.98	5.0 mg/l TCLP
		Silver	7440–22–4	NA	0.30 mg/l TCLP
F009	Spent stripping and cleaning bath solutions from electroplating operations where cyanides are used in the process.	Cadmium	7440–43–9	NA	0.19 mg/l TCLP
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
		Nickel	7440–02–0	3.98	5.0 mg/l TCLP
		Silver	7440–22–4	NA	0.30 mg/l TCLP
F010	Quenching bath residues from oil baths from metal heat treating operations where cyanides are used in the process.	Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	NA

F011	Spent cyanide solutions from salt bath pot cleaning from metal heat treating operations.	Cadmium	7440–43–9	NA	0.19 mg/l TCLP
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
		Nickel	7440–02–0	3.98	5.0 mg/l TCLP
		Silver	7440–22–4	NA	0.30 mg/l TCLP
F012	Quenching wastewater treatment sludges from metal heat treating operations where cyanides are used in the process.	Cadmium	7440–43–9	NA	0.19 mg/l TCLP
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
		Nickel	7440–02–0	3.98	5.0 mg/l TCLP
		Silver	7440–22–4	NA	0.30 mg/l TCLP
F019	Wastewater treatment sludges from the chemical conversion coating of aluminum except from zirconium phosphating in aluminum can washing when such phosphating is an exclusive conversion coating process.	Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30
F020, F021, F022, F023, F026	Wastes (except wastewater and spent carbon from hydrogen chloride purification) from the production or manufacturing use (as a reactant, chemical intermediate, or component in a formulating process) of: (1) tri– or tetrachlorophenol, or of intermediates used to produce their pesticide derivatives, excluding wastes from the production of Hexachlorophene from highly purified 2,4,5–trichlorophenol (F020); (2) pentachlorophenol, or of intermediates used to produce its derivatives (i.e., F021); (3) tetra–, penta–, or hexachlorobenzenes under alkaline conditions (i.e., F022); and from the production of materials on equipment previously used for the production or manufacturing use (as a reactant, chemical intermediate, or component in a formulating process) of: (1) tri– or tetrachlorophenols, excluding wastes from equipment used only for the production of Hexachlorophene from highly purified 2,4,5–trichlorophenol (F023); (2) tetra–, penta–, or hexachlorobenzenes under alkaline conditions (i.e., F026).	HxCDDs (All Hexachlorodibenzo–p–dioxins)	NA	0.000063	0.001
		HxCDFs (All Hexachlorodibenzofurans)	NA	0.000063	0.001
		PeCDDs (All Pentachlorodibenzo–p–dioxins)	NA	0.000063	0.001
		PeCDFs (All Pentachlorodibenzofurans)	NA	0.000035	0.001

		Pentachlorophenol	87–86–5	0.089	7.4
		TCDDs (All Tetrachlorodibenzo–p–dioxins)	NA	0.000063	0.001
		TCDFs (All Tetrachlorodibenzofurans)	NA	0.000063	0.001
		2,4,5–Trichlorophenol	95–95–4	0.18	7.4
		2,4,6–Trichlorophenol	88–06–2	0.035	7.4
		2,3,4,6–Tetrachlorophenol	58–90–2	0.030	7.4
F024	Process wastes, including but not limited to, distillation residues, heavy ends, tars, and reactor clean–out wastes, from the production of certain chlorinated aliphatic hydrocarbons by free radical catalyzed processes. These chlorinated aliphatic hydrocarbons are those having carbon chain lengths ranging from one to and including 5, with varying amounts and positions of chlorine substitution. This listing does not include wastewaters, wastewater treatment sludges, spent catalysts, and wastes listed in s. NR 605.09 (2).	All F024 wastes	NA	CMBST	CMBST
		2–Chloro–1,3–butadiene	126–99–8	0.057	0.28
		3–Chloropropylene	107–05–1	0.036	30
		1,1–Dichloroethane	75–34–3	0.059	6.0
		1,2–Dichloroethane	107–06–2	0.21	6.0
		1,2–Dichloropropane	78–87–5	0.85	18
		cis–1,3–Dichloropropylene	10061–01–5	0.036	18
		trans–1,3–Dichloropropylene	10061–02–6	0.036	18
		bis(2–Ethylhexyl) phthalate	117–81–7	0.28	28
		Hexachloroethane	67–72–1	0.055	30
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Nickel	7440–02–0	3.98	5.0 mg/l TCLP
F025	Condensed light ends from the production of certain chlorinated aliphatic hydrocarbons, by free radical catalyzed processes. These chlorinated aliphatic hydrocarbons are those having carbon chain lengths ranging from one to and including 5, with varying amounts and positions of chlorine substitution. F025 – Light Ends Subcategory	Carbon tetrachloride	56–23–5	0.057	6.0
		Chloroform	67–66–3	0.046	6.0
		1,2–Dichloroethane	107–06–2	0.21	6.0
		1,1–Dichloroethylene	75–35–4	0.025	6.0
		Methylene chloride	75–09–2	0.089	30
		1,1,2–Trichloroethane	79–00–5	0.054	6.0
		Trichloroethylene	79–01–6	0.054	6.0
		Vinyl chloride	75–01–4	0.27	6.0
	Spent filters and filter aids, and spent desiccant wastes from the production of certain chlorinated aliphatic hydrocarbons, by free radical catalyzed processes. These chlorinated aliphatic hydrocarbons are those having carbon chain lengths ranging from one to and including 5, with varying amounts and positions of chlorine substitution. F025 – Spent Filters/Aids and Desiccants Subcategory	Carbon tetrachloride	56–23–5	0.057	6.0
		Chloroform	67–66–3	0.046	6.0
		Hexachlorobenzene	118–74–1	0.055	10
		Hexachlorobutadiene	87–68–3	0.055	5.6
		Hexachloroethane	67–72–1	0.055	30
		Methylene chloride	75–09–2	0.089	30
		1,1,2–Trichloroethane	79–00–5	0.054	6.0
		Trichloroethylene	79–01–6	0.054	6.0
		Vinyl chloride	75–01–4	0.27	6.0

F027	Discarded unused formulations containing tri−, tetra−, or pentachlorophenol or discarded unused formulations containing compounds derived from these chlorophenols. This listing does not include formulations containing hexachlorophene synthesized from prepurified 2,4,5−trichlorophenol as the sole component.	HxCDDs (All Hexachlorodibenzo−p−dioxins)	NA	0.000063	0.001
		HxCDFs (All Hexachlorodibenzofurans)	NA	0.000063	0.001
		PeCDDs (All Pentachlorodibenzo−p−dioxins)	NA	0.000063	0.001
		PeCDFs (All Pentachlorodibenzofurans)	NA	0.000035	0.001
		Pentachlorophenol	87−86−5	0.089	7.4
		TCDDs (All Tetrachlorodibenzo−p−dioxins)	NA	0.000063	0.001
		TCDFs (All Tetrachlorodibenzofurans)	NA	0.000063	0.001
		2,4,5−Trichlorophenol	95−95−4	0.18	7.4
		2,4,6−Trichlorophenol	88−06−2	0.035	7.4
		2,3,4,6−Tetrachlorophenol	58−90−2	0.030	7.4
F028	Residues resulting from the incineration or thermal treatment of soil contaminated with EPA Hazardous Wastes Nos. F020, F021, F023, F026 and F027.	HxCDDs (All Hexachlorodibenzo−p−dioxins)	NA	0.000063	0.001
		HxCDFs (All Hexachlorodibenzofurans)	NA	0.000063	0.001
		PeCDDs (All Pentachlorodibenzo−p−dioxins)	NA	0.000063	0.001
		PeCDFs (All Pentachlorodibenzofurans)	NA	0.000035	0.001
		Pentachlorophenol	87−86−5	0.089	7.4
		TCDDs (All Tetrachlorodibenzo−p−dioxins)	NA	0.000063	0.001
		TCDFs (All Tetrachlorodibenzofurans)	NA	0.000063	0.001
		2,4,5−Trichlorophenol	95−95−4	0.18	7.4
		2,4,6−Trichlorophenol	88−06−2	0.035	7.4
		2,3,4,6−Tetrachlorophenol	58−90−2	0.030	7.4

F037	Petroleum refinery primary oil/water/solids separation sludge – Any sludge generated from the gravitational separation of oil/water/solids during the storage or treatment of process wastewaters and oily cooling wastewaters from petroleum refineries. Such sludges include, but are not limited to, those generated in: oil/water/solids separators; tanks and impoundments; ditches and other conveyances; sumps; and stormwater units receiving dry weather flow. Sludge generated in stormwater units that do not receive dry weather flow, sludges generated from non–contact once–through cooling waters segregated for treatment from other process or oily cooling waters, sludges generated in aggressive biological treatment units as defined in s. NR 605.14 (1) (including sludges generated in one or more additional units after wastewaters have been treated in aggressive biological treatment units) and K051 wastes are not included in this listing.	Acenaphthene	83–32–9	0.059	NA
		Anthracene	120–12–7	0.059	3.4
		Benzene	71–43–2	0.14	10
		Benz(a)anthracene	56–55–3	0.059	3.4
		Benzo(a)pyrene	50–32–8	0.061	3.4
		bis(2–Ethylhexyl) phthalate	117–81–7	0.28	28
		Chrysene	218–01–9	0.059	3.4
		Di–n–butyl phthalate	84–74–2	0.057	28
		Ethylbenzene	100–41–4	0.057	10
		Fluorene	86–73–7	0.059	NA
		Naphthalene	91–20–3	0.059	5.6
		Phenanthrene	85–01–8	0.059	5.6
		Phenol	108–95–2	0.039	6.2
		Pyrene	129–00–0	0.067	8.2
		Toluene	108–88–3	0.080	10
		Xylenes–mixed isomers (sum of o–, m–, and p–xylene concentrations)	1330–20–7	0.32	30
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Cyanides (Total)[7]	57–12–5	1.2	590
		Lead	7439–92–1	0.69	NA
		Nickel	7440–02–0	NA	5.0 mg/l TCLP

F038	Petroleum refinery secondary (emulsified) oil/water/solids separation sludge and/or float generated from the physical and/or chemical separation of oil/water/solids in process wastewaters and oily cooling wastewaters from petroleum refineries. Such wastes include, but are not limited to, all sludges and floats generated in: induced air floatation (IAF) units, tanks and impoundments, and all sludges generated in DAF units. Sludges generated in stormwater units that do not receive dry weather flow, sludges generated from non–contact once–through cooling waters segregated for treatment from other process or oily cooling waters, sludges and floats generated in aggressive biological treatment units as defined in s. NR 605.14 (1) (including sludges and floats generated in one or more additional units after wastewaters have been treated in aggressive biological units) and F037, K048, and K051 are not included in this listing.	Benzene	71–43–2	0.14	10
		Benzo(a)pyrene	50–32–8	0.061	3.4
		bis(2–Ethylhexyl) phthalate	117–81–7	0.28	28
		Chrysene	218–01–9	0.059	3.4
		Di–n–butyl phthalate	84–74–2	0.057	28
		Ethylbenzene	100–41–4	0.057	10
		Fluorene	86–73–7	0.059	NA
		Naphthalene	91–20–3	0.059	5.6
		Phenanthrene	85–01–8	0.059	5.6
		Phenol	108–95–2	0.039	6.2
		Pyrene	129–00–0	0.067	8.2
		Toluene	108–88–3	0.080	10
		Xylenes–mixed isomers (sum of o–, m–, and p–xylene concentrations)	1330–20–7	0.32	30
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Cyanides (Total)[7]	57–12–5	1.2	590
		Lead	7439–92–1	0.69	NA
		Nickel	7440–02–0	NA	5.0 mg/l TCLP
F039	Leachate (liquids that have percolated through land disposed wastes) resulting from the disposal of more than one restricted waste classified as hazardous under s. NR 605.09. Leachate resulting from the disposal of one or more of the following listed Hazardous Wastes and no other Hazardous Wastes retains its listed Hazardous Waste Number(s): F020, F021, F022, F026, F027, and/or F028.	Acenaphthylene	208–96–8	0.059	3.4
		Acenaphthene	83–32–9	0.059	3.4
		Acetone	67–64–1	0.28	160
		Acetonitrile	75–05–8	5.6	NA
		Acetophenone	96–86–2	0.010	9.7
		2–Acetylaminofluorene	53–96–3	0.059	140
		Acrolein	107–02–8	0.29	NA
		Acrylonitrile	107–13–1	0.24	84
		Aldrin	309–00–2	0.021	0.066
		4–Aminobiphenyl	92–67–1	0.13	NA
		Aniline	62–53–3	0.81	14
		Anthracene	120–12–7	0.059	3.4
		Aramite	140–57–8	0.36	NA
		alpha–BHC	319–84–6	0.00014	0.066
		beta–BHC	319–85–7	0.00014	0.066
		delta–BHC	319–86–8	0.023	0.066
		gamma–BHC	58–89–9	0.0017	0.066
		Benzene	71–43–2	0.14	10
		Benz(a)anthracene	56–55–3	0.059	3.4

		Benzo(b)fluoranthene (difficult to distinguish from benzo(k)fluoranthene)	205–99–2	0.11	6.8
		Benzo(k)fluoranthene (difficult to distinguish from benzo(b)fluoranthene)	207–08–9	0.11	6.8
		Benzo(g,h,i)perylene	191–24–2	0.0055	1.8
		Benzo(a)pyrene	50–32–8	0.061	3.4
		Bromodichloromethane	75–27–4	0.35	15
		Methyl bromide (Bromomethane)	74–83–9	0.11	15
		4–Bromophenyl phenyl ether	101–55–3	0.055	15
		n–Butyl alcohol	71–36–3	5.6	2.6
		Butyl benzyl phthalate	85–68–7	0.017	28
		2–sec–Butyl–4,6–dinitrophenol (Dinoseb)	88–85–7	0.066	2.5
		Carbon disulfide	75–15–0	3.8	NA
		Carbon tetrachloride	56–23–5	0.057	6.0
		Chlordane (alpha and gamma isomers)	57–74–9	0.0033	0.26
		p–Chloroaniline	106–47–8	0.46	16
		Chlorobenzene	108–90–7	0.057	6.0
		Chlorobenzilate	510–15–6	0.10	NA
		2–Chloro–1,3–butadiene	126–99–8	0.057	NA
		Chlorodibromomethane	124–48–1	0.057	15
		Chloroethane	75–00–3	0.27	6.0
		bis(2–Chloroethoxy)methane	111–91–1	0.036	7.2
		bis(2–Chloroethyl)ether	111–44–4	0.033	6.0
		Chloroform	67–66–3	0.046	6.0
		bis(2–Chloroisopropyl)ether	39638–32–9	0.055	7.2
		p–Chloro–m–cresol	59–50–7	0.018	14
		Chloromethane (Methyl chloride)	74–87–3	0.19	30
		2–Chloronaphthalene	91–58–7	0.055	5.6
		2–Chlorophenol	95–57–8	0.044	5.7
		3–Chloropropylene	107–05–1	0.036	30
		Chrysene	218–01–9	0.059	3.4
		o–Cresol	95–48–7	0.11	5.6
		m–Cresol (difficult to distinguish from p–cresol)	108–39–4	0.77	5.6
		p–Cresol (difficult to distinguish from m–cresol)	106–44–5	0.77	5.6

		Cyclohexanone	108–94–1	0.36	NA
		1,2–Dibromo–3–chloropropane	96–12–8	0.11	15
		Ethylene dibromide (1,2–Dibromoethane)	106–93–4	0.028	15
		Dibromomethane	74–95–3	0.11	15
		2,4–D (2,4–Dichlorophenoxyacetic acid)	94–75–7	0.72	10
		o,p'–DDD	53–19–0	0.023	0.087
		p,p'–DDD	72–54–8	0.023	0.087
		o,p'–DDE	3424–82–6	0.031	0.087
		p,p'–DDE	72–55–9	0.031	0.087
		o,p'–DDT	789–02–6	0.0039	0.087
		p,p'–DDT	50–29–3	0.0039	0.087
		Dibenz(a,h)anthracene	53–70–3	0.055	8.2
		Dibenz(a,e)pyrene	192–65–4	0.061	NA
		m–Dichlorobenzene	541–73–1	0.036	6.0
		o–Dichlorobenzene	95–50–1	0.088	6.0
		p–Dichlorobenzene	106–46–7	0.090	6.0
		Dichlorodifluoromethane	75–71–8	0.23	7.2
		1,1–Dichloroethane	75–34–3	0.059	6.0
		1,2–Dichloroethane	107–06–2	0.21	6.0
		1,1–Dichloroethylene	75–35–4	0.025	6.0
		trans–1,2–Dichloroethylene	156–60–5	0.054	30
		2,4–Dichlorophenol	120–83–2	0.044	14
		2,6–Dichlorophenol	87–65–0	0.044	14
		1,2–Dichloropropane	78–87–5	0.85	18
		cis–1,3–Dichloropropylene	10061–01–5	0.036	18
		trans–1,3–Dichloropropylene	10061–02–6	0.036	18
		Dieldrin	60–57–1	0.017	0.13
		Diethyl phthalate	84–66–2	0.20	28
		2,4–Dimethyl phenol	105–67–9	0.036	14
		Dimethyl phthalate	131–11–3	0.047	28
		Di–n–butyl phthalate	84–74–2	0.057	28
		1,4–Dinitrobenzene	100–25–4	0.32	2.3
		4,6–Dinitro–o–cresol	534–52–1	0.28	160
		2,4–Dinitrophenol	51–28–5	0.12	160
		2,4–Dinitrotoluene	121–14–2	0.32	140
		2,6–Dinitrotoluene	606–20–2	0.55	28

		Di–n–octyl phthalate	117–84–0	0.017	28
		Di–n–propylnitrosamine	621–64–7	0.40	14
		1,4–Dioxane	123–91–1	12.0	170
		Diphenylamine (difficult to distinguish from diphenylnitrosamine)	122–39–4	0.92	NA
		Diphenylnitrosamine (difficult to distinguish from diphenylamine)	86–30–6	0.92	NA
		1,2–Diphenylhydrazine	122–66–7	0.087	NA
		Disulfoton	298–04–4	0.017	6.2
		Endosulfan I	939–98–8	0.023	0.066
		Endosulfan II	33213–65–9	0.029	0.13
		Endosulfan sulfate	1031–07–8	0.029	0.13
		Endrin	72–20–8	0.0028	0.13
		Endrin aldehyde	7421–93–4	0.025	0.13
		Ethyl acetate	141–78–6	0.34	33
		Ethyl cyanide (Propanenitrile)	107–12–0	0.24	360
		Ethyl benzene	100–41–4	0.057	10
		Ethyl ether	60–29–7	0.12	160
		bis(2–Ethylhexyl) phthalate	117–81–7	0.28	28
		Ethyl methacrylate	97–63–2	0.14	160
		Ethylene oxide	75–21–8	0.12	NA
		Famphur	52–85–7	0.017	15
		Fluoranthene	206–44–0	0.068	3.4
		Fluorene	86–73–7	0.059	3.4
		Heptachlor	76–44–8	0.0012	0.066
		Heptachlor epoxide	1024–57–3	0.016	0.066
		Hexachlorobenzene	118–74–1	0.055	10
		Hexachlorobutadiene	87–68–3	0.055	5.6
		Hexachlorocyclopentadiene	77–47–4	0.057	2.4
		HxCDDs (All Hexachlorodibenzo–p–dioxins)	NA	0.000063	0.001
		HxCDFs (All Hexachlorodibenzofurans)	NA	0.000063	0.001
		Hexachloroethane	67–72–1	0.055	30
		Hexachloropropylene	1888–71–7	0.035	30
		Indeno (1,2,3–c,d) pyrene	193–39–5	0.0055	3.4
		Iodomethane	74–88–4	0.19	65
		Isobutyl alcohol	78–83–1	5.6	170

	Isodrin	65–73–6	0.021	0.066
	Isosafrole	120–58–1	0.081	2.6
	Kepone	143–50–8	0.0011	0.13
	Methacrylonitrile	126–98–7	0.24	84
	Methanol	67–56–1	5.6	NA
	Methapyrilene	91–80–5	0.081	1.5
	Methoxychlor	72–43–5	0.25	0.18
	3–Methylcholanthrene	56–49–5	0.0055	15
	4,4[1]–Methylenebis(2–chloroaniline)	101–14–4	0.50	30
	Methylene chloride	75–09–2	0.089	30
	Methyl ethyl ketone	78–93–3	0.28	36
	Methyl isobutyl ketone	108–10–1	0.14	33
	Methyl methacrylate	80–62–6	0.14	160
	Methyl methansulfonate	66–27–3	0.018	NA
	Methyl parathion	298–00–0	0.014	4.6
	Naphthalene	91–20–3	0.059	5.6
	2–Naphthylamine	91–59–8	0.52	NA
	p–Nitroaniline	100–01–6	0.028	28
	Nitrobenzene	98–95–3	0.068	14
	5–Nitro–o–toluidine	99–55–8	0.32	28
	p–Nitrophenol	100–02–7	0.12	29
	N–Nitrosodiethylamine	55–18–5	0.40	28
	N–Nitrosodimethylamine	62–75–9	0.40	NA
	N–Nitroso–di–n–butylamine	924–16–3	0.40	17
	N–Nitrosomethylethylamine	10595–95–6	0.40	2.3
	N–Nitrosomorpholine	59–89–2	0.40	2.3
	N–Nitrosopiperidine	100–75–4	0.013	35
	N–Nitrosopyrrolidine	930–55–2	0.013	35
	Parathion	56–38–2	0.014	4.6
	Total PCBs (sum of all PCB isomers, or all Aroclors)	1336–36–3	0.10	10
	Pentachlorobenzene	608–93–5	0.055	10
	PeCDDs (All Pentachlorodibenzo–p–dioxins)	NA	0.000063	0.001
	PeCDFs (All Pentachlorodibenzofurans)	NA	0.000035	0.001
	Pentachloronitrobenzene	82–68–8	0.055	4.8
	Pentachlorophenol	87–86–5	0.089	7.4

		Phenacetin	62–44–2	0.081	16
		Phenanthrene	85–01–8	0.059	5.6
		Phenol	108–95–2	0.039	6.2
		Phorate	298–02–2	0.021	4.6
		Phthalic anhydride	85–44–9	0.055	NA
		Pronamide	23950–58–5	0.093	1.5
		Pyrene	129–00–0	0.067	8.2
		Pyridine	110–86–1	0.014	16
		Safrole	94–59–7	0.081	22
		Silvex (2,4,5–TP)	93–72–1	0.72	7.9
		2,4,5–T	93–76–5	0.72	7.9
		1,2,4,5–Tetrachlorobenzene	95–94–3	0.055	14
		TCDDs (All Tetrachlorodibenzo–p–dioxins)	NA	0.000063	0.001
		TCDFs (All Tetrachlorodibenzofurans)	NA	0.000063	0.001
		1,1,1,2–Tetrachloroethane	630–20–6	0.057	6.0
		1,1,2,2–Tetrachloroethane	79–34–6	0.057	6.0
		Tetrachloroethylene	127–18–4	0.056	6.0
		2,3,4,6–Tetrachlorophenol	58–90–2	0.030	7.4
		Toluene	108–88–3	0.080	10
		Toxaphene	8001–35–2	0.0095	2.6
		Bromoform (Tribromomethane)	75–25–2	0.63	15
		1,2,4–Trichlorobenzene	120–82–1	0.055	19
		1,1,1–Trichloroethane	71–55–6	0.054	6.0
		1,1,2–Trichloroethane	79–00–5	0.054	6.0
		Trichloroethylene	79–01–6	0.054	6.0
		Trichloromonofluoromethane	75–69–4	0.020	30
		2,4,5–Trichlorophenol	95–95–4	0.18	7.4
		2,4,6–Trichlorophenol	88–06–2	0.035	7.4
		1,2,3–Trichloropropane	96–18–4	0.85	30
		1,1,2–Trichloro–1,2,2–trifluoro ethane	76–13–1	0.057	30
		tris(2,3–Dibromopropyl) phosphate	126–72–7	0.11	NA
		Vinyl chloride	75–01–4	0.27	6.0
		Xylenes–mixed isomers (sum of o–, m–, and p–xylene concentrations)	1330–20–7	0.32	30
		Antimony	7440–36–0	1.9	2.1 mg/l TCLP

		Arsenic	7440–38–2	1.4	5.0 mg/l TCLP
		Barium	7440–39–3	1.2	7.6 mg/l TCLP
		Beryllium	7440–41–7	0.82	NA
		Cadmium	7440–43–9	0.69	0.19 mg/l TCLP
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)	57–12–5	0.86	NA
		Fluoride	16964–48–8	35	NA
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
		Mercury	7439–97–6	0.15	0.025 mg/l TCLP
		Nickel	7440–02–0	3.98	5.0 mg/l TCLP
		Selenium	7782–49–2	0.82	0.16 mg/l TCLP
		Silver	7440–22–4	0.43	0.30 mg/l TCLP
		Sulfide	8496–25–8	14	NA
		Thallium	7440–28–0	1.4	NA
		Vanadium	7440–62–2	4.3	NA
K001	Bottom sediment sludge from the treatment of wastewaters from wood preserving processes that use creosote and/or pentachlorophenol.	Naphthalene	91–20–3	0.059	5.6
		Pentachlorophenol	87–86–5	0.089	7.4
		Phenanthrene	85–01–8	0.059	5.6
		Pyrene	129–00–0	0.067	8.2
		Toluene	108–88–3	0.080	10
		Xylenes–mixed isomers (sum of o–, m–, and p–xylene concentrations)	1330–20–7	0.32	30
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
K002	Wastewater treatment sludge from the production of chrome yellow and orange pigments.	Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
K003	Wastewater treatment sludge from the production of molybdate orange pigments.	Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
K004	Wastewater treatment sludge from the production of zinc yellow pigments.	Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
K005	Wastewater treatment sludge from the production of chrome green pigments.	Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
		Cyanides (Total)[7]	57–12–5	1.2	590
K006	Wastewater treatment sludge from the production of chrome oxide green pigments (anhydrous).	Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
	Wastewater treatment sludge from the production of chrome oxide green pigments (hydrated).	Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Lead	7439–92–1	0.69	0.37 mg/l TCLP

K007	Wastewater treatment sludge from the production of iron blue pigments.	Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
		Cyanides (Total)[7]	57–12–5	1.2	590
K008	Oven residue from the production of chrome oxide green pigments.	Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
K009	Distillation bottoms from the production of acetaldehyde from ethylene.	Chloroform	67–66–3	0.046	6.0
K010	Distillation side cuts from the production of acetaldehyde from ethylene.	Chloroform	67–66–3	0.046	6.0
K011	Bottom stream from the wastewater stripper in the production of acrylonitrile.	Acetonitrile	75–05–8	5.6	38
		Acrylonitrile	107–13–1	0.24	84
		Acrylamide	79–06–1	19	23
		Benzene	71–43–2	0.14	10
		Cyanide (Total)	57–12–5	1.2	590
K013	Bottom stream from the acetonitrile column in the production of acrylonitrile.	Acetonitrile	75–05–8	5.6	38
		Acrylonitrile	107–13–1	0.24	84
		Acrylamide	79–06–1	19	23
		Benzene	71–43–2	0.14	10
		Cyanide (Total)	57–12–5	1.2	590
K014	Bottoms from the acetonitrile purification column in the production of acrylonitrile.	Acetonitrile	75–05–8	5.6	38
		Acrylonitrile	107–13–1	0.24	84
		Acrylamide	79–06–1	19	23
		Benzene	71–43–2	0.14	10
		Cyanide (Total)	57–12–5	1.2	590
K015	Still bottoms from the distillation of benzyl chloride.	Anthracene	120–12–7	0.059	3.4
		Benzal chloride	98–87–3	0.055	6.0
		Benzo(b)fluoranthene (difficult to distinguish from benzo(k)fluoranthene	205–99–2	0.11	6.8
		Benzo(k)fluroanthene (difficult to distinguish from benzo(b)fluoranthene)	207–08–9	0.11	6.8
		Phenanthrene	85–01–8	0.059	5.6
		Toluene	108–88–3	0.080	10
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Nickel	7440–02–0	3.98	5.0 mg/l TCLP

K016	Heavy ends or distillation residues from the production of carbon tetrachloride.	Hexachlorobenzene	118–74–1	0.055	10
		Hexachlorobutadiene	87–68–3	0.055	5.6
		Hexachlorocyclopentadiene	77–47–4	0.057	2.4
		Hexachloroethane	67–72–1	0.055	30
		Tetrachloroethylene	127–18–4	0.056	6.0
K017	Heavy ends (still bottoms) from the purification column in the production of epichlorohydrin.	bis(2–Chloroethyl)ether	111–44–4	0.033	6.0
		1,2–Dichloropropane	78–87–5	0.85	18
		1,2,3–Trichloropropane	96–18–4	0.85	30
K018	Heavy ends from the fractionation column in ethyl chloride production.	Chloroethane	75–00–3	0.27	6.0
		Chloromethane	74–87–3	0.19	NA
		1,1–Dichloroethane	75–34–3	0.059	6.0
		1,2–Dichloroethane	107–06–2	0.21	6.0
		Hexachlorobenzene	118–74–1	0.055	10
		Hexachlorobutadiene	87–68–3	0.055	5.6
		Hexachloroethane	67–72–1	0.055	30
		Pentachloroethane	76–01–7	NA	6.0
		1,1,1–Trichloroethane	71–55–6	0.054	6.0
K019	Heavy ends from the distillation of ethylene dichloride in ethylene dichloride production.	bis(2–Chloroethyl)ether	111–44–4	0.033	6.0
		Chlorobenzene	108–90–7	0.057	6.0
		Chloroform	67–66–3	0.046	6.0
		p–Dichlorobenzene	106–46–7	0.090	NA
		1,2–Dichloroethane	107–06–2	0.21	6.0
		Fluorene	86–73–7	0.059	NA
		Hexachloroethane	67–72–1	0.055	30
		Naphthalene	91–20–3	0.059	5.6
		Phenanthrene	85–01–8	0.059	5.6
		1,2,4,5–Tetrachlorobenzene	95–94–3	0.055	NA
		Tetrachloroethylene	127–18–4	0.056	6.0
		1,2,4–Trichlorobenzene	120–82–1	0.055	19
		1,1,1–Trichloroethane	71–55–6	0.054	6.0
K020	Heavy ends from the distillation of vinyl chloride in vinyl chloride monomer production.	1,2–Dichloroethane	107–06–2	0.21	6.0
		1,1,2,2–Tetrachloroethane	79–34–6	0.057	6.0
		Tetrachloroethylene	127–18–4	0.056	6.0
K021	Aqueous spent antimony catalyst waste from fluoromethanes production.	Carbon tetrachloride	56–23–5	0.057	6.0
		Chloroform	67–66–3	0.046	6.0
		Antimony	7440–36–0	1.9	2.1 mg/l TCLP

K022	Distillation bottom tars from the production of phenol/acetone from cumene.	Acetophenone	96–86–2	0.010	9.7
		Diphenylamine (difficult to distinguish from diphenylnitrosamine)	122–39–4	0.92	13
		Diphenylnitrosamine (difficult to distinguish from diphenylamine)	86–30–6	0.92	13
		Phenol	108–95–2	0.039	6.2
		Toluene	108–88–3	0.080	10
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Nickel	7440–02–0	3.98	5.0 mg/l TCLP
K023	Distillation light ends from the production of phthalic anhydride from naphthalene.	Phthalic anhydride (measured as Phthalic acid or Terephthalic acid)	100–21–0	0.055	28
		Phthalic anhydride (measured as Phthalic acid or Terephthalic acid)	85–44–9	0.055	28
K024	Distillation bottoms from the production of phthalic anhydride from naphthalene.	Phthalic anhydride (measured as Phthalic acid or Terephthalic acid)	100–21–0	0.055	28
		Phthalic anhydride (measured as Phthalic acid or Terephthalic acid)	85–44–9	0.055	28
K025	Distillation bottoms from the production of nitrobenzene by the nitration of benzene.	NA	NA	LLEXT fb SSTRP fb CARBN; or CMBST	CMBST
K026	Stripping still tails from the production of methyl ethyl pyridines.	NA	NA	CMBST	CMBST
K027	Centrifuge and distillation residues from toluene diisocyanate production.	NA	NA	CARBN; or CMBST	CMBST

K028	Spent catalyst from the hydrochlorinator reactor in the production of 1,1,1–trichloroethane.	1,1–Dichloroethane	75–34–3	0.059	6.0
		trans–1,2–Dichloroethylene	156–60–5	0.054	30
		Hexachlorobutadiene	87–68–3	0.055	5.6
		Hexachloroethane	67–72–1	0.055	30
		Pentachloroethane	76–01–7	NA	6.0
		1,1,1,2–Tetrachloroethane	630–20–6	0.057	6.0
		1,1,2,2–Tetrachloroethane	79–34–6	0.057	6.0
		Tetrachloroethylene	127–18–4	0.056	6.0
		1,1,1–Trichloroethane	71–55–6	0.054	6.0
		1,1,2–Trichloroethane	79–00–5	0.054	6.0
		Cadmium	7440–43–9	0.69	NA
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
		Nickel	7440–02–0	3.98	5.0 mg/l TCLP
K029	Waste from the product steam stripper in the production of 1,1,1–trichloroethane.	Chloroform	67–66–3	0.046	6.0
		1,2–Dichloroethane	107–06–2	0.21	6.0
		1,1–Dichloroethylene	75–35–4	0.025	6.0
		1,1,1–Trichloroethane	71–55–6	0.054	6.0
		Vinyl chloride	75–01–4	0.27	6.0
K030	Column bodies or heavy ends from the combined production of trichloroethylene and perchloroethylene.	o–Dichlorobenzene	95–50–1	0.088	NA
		p–Dichlorobenzene	106–46–7	0.090	NA
		Hexachlorobutadiene	87–68–3	0.055	5.6
		Hexachloroethane	67–72–1	0.055	30
		Hexachloropropylene	1888–71–7	NA	30
		Pentachlorobenzene	608–93–5	NA	10
		Pentachloroethane	76–01–7	NA	6.0
		1,2,4,5–Tetrachlorobenzene	95–94–3	0.055	14
		Tetrachloroethylene	127–18–4	0.056	6.0
		1,2,4–Trichlorobenzene	120–82–1	0.055	19
K031	By–product salts generated in the production of MSMA and cacodylic acid.	Arsenic	7440–38–2	1.4	5.0 mg/l TCLP
K032	Wastewater treatment sludge from the production of chlordane.	Hexachlorocyclopentadiene	77–47–4	0.057	2.4
		Chlordane (alpha and gamma isomers)	57–74–9	0.0033	0.26
		Heptachlor	76–44–8	0.0012	0.066
		Heptachlor epoxide	1024–57–3	0.016	0.066
K033	Wastewater and scrub water from the chlorination of cyclopentadiene in the production of chlordane.	Hexachlorocyclopentadiene	77–47–4	0.057	2.4

K034	Filter solids from the filtration of hexachlorocyclopentadiene in the production of chlordane.	Hexachlorocylopentadiene	77–47–4	0.057	2.4
K035	Wastewater treatment sludges generated in the production of creosote.	Acenaphthene	83–32–9	NA	3.4
		Anthracene	120–12–7	NA	3.4
		Benz(a)anthracene	56–55–3	0.059	3.4
		Benzo(a)pyrene	50–32–8	0.061	3.4
		Chrysene	218–01–9	0.059	3.4
		o–Cresol	95–48–7	0.11	5.6
		m–Cresol (difficult to distinguish from p–cresol)	108–39–4	0.77	5.6
		p–Cresol (difficult to distinguish from m–cresol)	106–44–5	0.77	5.6
		Dibenz(a,h)anthracene	53–70–3	NA	8.2
		Fluoranthene	206–44–0	0.068	3.4
		Fluorene	86–73–7	NA	3.4
		Indeno(1,2,3–cd)pyrene	193–39–5	NA	3.4
		Naphthalene	91–20–3	0.059	5.6
		Phenanthrene	85–01–8	0.059	5.6
		Phenol	108–95–2	0.039	6.2
		Pyrene	129–00–0	0.067	8.2
K036	Still bottoms from toluene reclamation distillation in the production of disulfoton.	Disulfoton	298–04–4	0.017	6.2
K037	Wastewater treatment sludges from the production of disulfoton.	Disulfoton	298–04–4	0.017	6.2
		Toluene	108–88–3	0.080	10
K038	Wastewater from the washing and stripping of phorate production.	Phorate	298–02–2	0.021	4.6
K039	Filter cake from the filtration of diethylphosphorodithioc acid in the production of phorate.	NA	NA	CARBN; or CMBST	CMBST
K040	Wastewater treatment sludge from the production of phorate.	Phorate	298–02–2	0.021	4.6
K041	Wastewater treatment sludge from the production of toxaphene.	Toxaphene	8001–35–2	0.0095	2.6
K042	Heavy ends or distillation residues from the distillation of tetrachlorobenzene in the production of 2,4,5–T.	o–Dichlorobenzene	95–50–1	0.088	6.0
		p–Dichlorobenzene	106–46–7	0.090	6.0
		Pentachlorobenzene	608–93–5	0.055	10
		1,2,4,5–Tetrachlorobenzene	95–94–3	0.055	14
		1,2,4–Trichlorobenzene	120–82–1	0.055	19

K043	2,6–Dichlorophenol waste from the production of 2,4–D.	2,4–Dichlorophenol	120–83–2	0.044	14
		2,6–Dichlorophenol	187–65–0	0.044	14
		2,4,5–Trichlorophenol	95–95–4	0.18	7.4
		2,4,6–Trichlorophenol	88–06–2	0.035	7.4
		2,3,4,6–Tetrachlorophenol	58–90–2	0.030	7.4
		Pentachlorophenol	87–86–5	0.089	7.4
		Tetrachloroethylene	127–18–4	0.056	6.0
		HxCDDs (All Hexachlorodibenzo–p–dioxins)	NA	0.000063	0.001
		HxCDFs (All Hexachlorodibenzofurans)	NA	0.000063	0.001
		PeCDDs (All Pentachlorodibenzo–p–dioxins)	NA	0.000063	0.001
		PeCDFs (All Pentachlorodibenzofurans)	NA	0.000035	0.001
		TCDDs (All Tetrachlorodibenzo–p–dioxins)	NA	0.000063	0.001
		TCDFs (All Tetrachlorodibenzofurans)	NA	0.000063	0.001
K044	Wastewater treatment sludges from the manufacturing and processing of explosives.	NA	NA	DEACT	DEACT
K045	Spent carbon from the treatment of wastewater containing explosives.	NA	NA	DEACT	DEACT
K046	Wastewater treatment sludges from the manufacturing, formulation and loading of lead–based initiating compounds.	Lead	7439–92–1	0.69	0.37 mg/l TCLP
K047	Pink/red water from TNT operations.	NA	NA	DEACT	DEACT

K048	Dissolved air flotation (DAF) float from the petroleum refining industry.	Benzene	71–43–2	0.14	10
		Benzo(a)pyrene	50–32–8	0.061	3.4
		bis(2–Ethylhexyl) phthalate	117–81–7	0.28	28
		Chrysene	218–01–9	0.059	3.4
		Di–n–butyl phthalate	84–74–2	0.057	28
		Ethylbenzene	100–41–4	0.057	10
		Fluorene	86–73–7	0.059	NA
		Naphthalene	91–20–3	0.059	5.6
		Phenanthrene	85–01–8	0.059	5.6
		Phenol	108–95–2	0.039	6.2
		Pyrene	129–00–0	0.067	8.2
		Toluene	108–88–33	0.080	10
		Xylenes–mixed isomers (sum of o–, m–, and p–xylene concentrations)	1330–20–7	0.32	30
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Cyanides (Total)[7]	57–12–5	1.2	590
		Lead	7439–92–1	0.69	NA
		Nickel	7440–02–0	NA	5.0 mg/l TCLP
K049	Slop oil emulsion solids from the petroleum refining industry.	Anthracene	120–12–7	0.059	3.4
		Benzene	71–43–2	0.14	10
		Benzo(a)pyrene	50–32–8	0.061	3.4
		bis(2–Ethylhexyl) phthalate	117–81–7	0.28	28
		Carbon disulfide	75–15–0	3.8	NA
		Chrysene	2218–01–9	0.059	3.4
		2,4–Dimethylphenol	105–67–9	0.036	NA
		Ethylbenzene	100–41–4	0.057	10
		Naphthalene	91–20–3	0.059	5.6
		Phenanthrene	85–01–8	0.059	5.6
		Phenol	108–95–2	0.039	6.2
		Pyrene	129–00–0	0.067	8.2
		Toluene	108–88–3	0.080	10
		Xylenes–mixed isomers (sum of o–, m–, and p–xylene concentrations)	1330–20–7	0.32	30
		Cyanides (Total)[7]	57–12–5	1.2	590
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Lead	7439–92–1	0.69	NA
		Nickel	7440–02–0	NA	5.0 mg/l TCLP

K050	Heat exchanger bundle cleaning sludge from the petroleum refining industry.	Benzo(a)pyrene	50–32–8	0.061	3.4
		Phenol	108–95–2	0.039	6.2
		Cyanides (Total)[7]	57–12–5	1.2	590
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Lead	7439–92–1	0.69	NA
		Nickel	7440–02–0	NA	5.0 mg/l TCLP
K051	API separator sludge from the petroleum refining industry.	Acenaphthene	83–32–9	0.059	NA
		Anthracene	120–12–7	0.059	3.4
		Benz(a)anthracene	56–55–3	0.059	3.4
		Benzene	71–43–2	0.14	10
		Benzo(a)pyrene	50–32–8	0.061	3.4
		bis(2–Ethylhexyl) phthalate	117–81–7	0.28	28
		Chrysene	2218–01–9	0.059	3.4
		Di–n–butyl phthalate	105–67–9	0.057	28
		Ethylbenzene	100–41–4	0.057	10
		Fluorene	86–73–7	0.059	NA
		Naphthalene	91–20–3	0.059	5.6
		Phenanthrene	85–01–8	0.059	5.6
		Phenol	108–95–2	0.039	6.2
		Pyrene	129–00–0	0.067	8.2
		Toluene	108–88–3	0.08	10
		Xylenes–mixed isomers (sum of o–, m–, and p–xylene concentrations)	1330–20–7	0.32	30
		Cyanides (Total)[7]	57–12–5	1.2	590
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Lead	7439–92–1	0.69	NA
		Nickel	7440–02–0	NA	5.0 mg/l TCLP

K052	Tank bottoms (leaded) from the petroleum refining industry.	Benzene	71–43–2	0.14	10
		Benzo(a)pyrene	50–32–8	0.061	3.4
		o–Cresol	95–48–7	0.11	5.6
		m–Cresol (difficult to distinguish from p–cresol)	108–39–4	0.77	5.6
		p–Cresol (difficult to distinguish from m–cresol)	106–44–5	0.77	5.6
		2,4–Dimethylphenol	105–67–9	0.036	NA
		Ethylbenzene	100–41–4	0.057	10
		Naphthalene	91–20–3	0.059	5.6
		Phenanthrene	85–01–8	0.059	5.6
		Phenol	108–95–2	0.039	6.2
		Toluene	108–88–3	0.08	10
		Xylenes–mixed isomers (sum of o–, m–, and p–xylene concentrations)	1330–20–7	0.32	30
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Cyanides (Total)[7]	57–12–5	1.2	590
		Lead	7439–92–1	0.69	NA
		Nickel	7440–02–0	NA	5.0 mg/l TCLP
K060	Ammonia still lime sludge from coking operations.	Benzene	71–43–2	0.14	10
		Benzo(a)pyrene	50–32–8	0.061	3.4
		Naphthalene	91–20–3	0.059	5.6
		Phenol	108–95–2	0.039	6.2
		Cyanides (Total)[7]	57–12–5	1.2	590
K061	Emission control dust/sludge from the primary production of steel in electric furnaces.	Antimony	7440–36–0	NA	2.1 mg/l TCLP
		Arsenic	7440–38–2	NA	5.0 mg/l TCLP
		Barium	7440–39–3	NA	7.6 mg/l TCLP
		Beryllium	7440–41–7	NA	0.014 mg/l TCLP
		Cadmium	7440–43–9	0.69	0.19 mg/l TCLP
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
		Mercury	7439–97–6	NA	0.025 mg/l TCLP
		Nickel	7440–02–0	3.98	5.0 mg/l TCLP
		Selenium	7782–49–2	NA	0.16 mg/l TCLP
		Silver	7440–22–4	NA	0.30 mg/l TCLP
		Thallium	7440–28–0	NA	0.078 mg/l TCLP
		Zinc	7440–66–6	NA	5.3 mg/l TCLP

K062	Spent pickle liquor generated by steel finishing operations of facilities within the iron and steel industry (SIC Codes 331 and 332).	Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
		Nickel	7440–02–0	3.98	5.0 mg/l TCLP
K069	Emission control dust/sludge from secondary lead smelting. – Calcium Sulfate (Low Lead) Subcategory	Cadmium	7440–43–9	0.69	0.19 mg/l TCLP
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
	Emission control dust/sludge from secondary lead smelting. – Non–Calcium Sulfate (High Lead) Subcategory	NA	NA	NA	RLEAD
K071	K071 (Brine purification muds from the mercury cell process in chlorine production, where separately prepurified brine is not used) nonwastewaters that are residues from RMERC.	Mercury	7439–97–6	NA	0.02 mg/l TCLP
	K071 (Brine purification muds from the mercury cell process in chlorine production, where separately prepurified brine is not used) nonwastewaters that are not residues from RMERC.	Mercury	7439–97–6	NA	0.025 mg/l TCLP
	All K071 wastewaters.	Mercury	7439–97–6	0.15	NA
K073	Chlorinated hydrocarbon waste from the purification step of the diaphragm cell process using graphite anodes in chlorine production.	Carbon tetrachloride	56–23–5	0.057	6.0
		Chloroform	67–66–3	0.046	6.0
		Hexachloroethane	67–72–1	0.055	30
		Tetrachloroethylene	127–18–4	0.056	6.0
		1,1,1–Trichloroethane	71–55–6	0.054	6.0
K083	Distillation bottoms from aniline production.	Aniline	62–53–3	0.81	14
		Benzene	71–43–2	0.14	10
		Cyclohexanone	108–94–1	0.36	NA
		Diphenylamine (difficult to distinguish from diphenylnitrosamine)	122–39–4	0.92	13
		Diphenylnitrosamine (difficult to distinguish from diphenylamine)	86–30–6	0.92	13
		Nitrobenzene	98–95–3	0.068	14
		Phenol	108–95–2	0.039	6.2
		Nickel	7440–02–0	3.98	5.0 mg/l TCLP
K084	Wastewater treatment sludges generated during the production of veterinary pharmaceuticals from arsenic or organo–arsenic compounds.	Arsenic	7440–38–2	1.4	5.0 mg/l TCLP

K085	Distillation or fractionation column bottoms from the production of chlorobenzenes.	Benzene	71–43–2	0.14	10
		Chlorobenzene	108–90–7	0.057	6.0
		m–Dichlorobenzene	541–73–1	0.036	6.0
		o–Dichlorobenzene	95–50–1	0.088	6.0
		p–Dichlorobenzene	106–46–7	0.090	6.0
		Hexachlorobenzene	118–74–1	0.055	10
		Total PCBs (sum of all PCB isomers, or all Aroclors)	1336–36–3	0.10	10
		Pentachlorobenzene	608–93–5	0.055	10
		1,2,4,5–Tetrachlorobenzene	95–94–3	0.055	14
		1,2,4–Trichlorobenzene	120–82–1	0.055	19

K086	Solvent wastes and sludges, caustic washes and sludges, or water washes and sludges from cleaning tubs and equipment used in the formulation of ink from pigments, driers, soaps, and stabilizers containing chromium and lead.	Acetone	67–64–1	0.28	160
		Acetophenone	96–86–2	0.010	9.7
		bis(2–Ethylhexyl) phthalate	117–81–7	0.28	28
		n–Butyl alcohol	71–36–3	5.6	2.6
		Butylbenzyl phthalate	85–68–7	0.017	28
		Cyclohexanone	108–94–1	0.36	NA
		o–Dichlorobenzene	95–50–1	0.088	6.0
		Diethyl phthalate	84–66–2	0.20	28
		Dimethyl phthalate	131–11–3	0.047	28
		Di–n–butyl phthalate	84–74–2	0.057	28
		Di–n–octyl phthalate	117–84–0	0.017	28
		Ethyl acetate	141–78–6	0.34	33
		Ethylbenzene	100–41–4	0.057	10
		Methanol	67–56–1	5.6	NA
		Methyl ethyl ketone	78–93–3	0.28	36
		Methyl isobutyl ketone	108–10–1	0.14	33
		Methylene chloride	75–09–2	0.089	30
		Naphthalene	91–20–3	0.059	5.6
		Nitrobenzene	98–95–3	0.068	14
		Toluene	108–88–3	0.080	10
		1,1,1–Trichloroethane	71–55–6	0.054	6.0
		Trichloroethylene	79–01–6	0.054	6.0
		Xylenes–mixed isomers (sum of o–, m–, and p–xylene concentrations)	1330–20–7	0.32	30
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Cyanides (Total)[7]	57–12–5	1.2	590
		Lead	7439–92–1	0.69	0.37 mg/l TCLP

K087	Decanter tank tar sludge from coking operations.	Acenaphthylene	208–96–8	0.059	3.4
		Benzene	71–43–2	0.14	10
		Chrysene	218–01–9	0.059	3.4
		Fluoranthene	206–44–0	0.068	3.4
		Indeno(1,2,3–cd)pyrene	193–39–5	0.0055	3.4
		Naphthalene	91–20–3	0.059	5.6
		Phenanthrene	85–01–8	0.059	5.6
		Toluene	108–88–3	0.080	10
		Xylenes–mixed isomers (sum of o–, m–, and p–xylene concentrations)	1330–20–7	0.32	30
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
K088	Spent potliners from primary aluminum reduction.	Acenaphthene	83–32–9	0.059	3.4
		Anthracene	120–12–7	0.059	3.4
		Benz(a)anthracene	56–55–3	0.059	3.4
		Benzo(a)pyrene	50–32–8	0.061	3.4
		Benzo(b)fluoranthene	205–99–2	0.11	6.8
		Benzo(k)fluoranthene	207–08–9	0.11	6.8
		Benzo(g,h,i)perylene	191–24–2	0.0055	1.8
		Chrysene	218–01–9	0.059	3.4
		Dibenz(a,h)anthracene	53–70–3	0.055	8.2
		Fluoranthene	206–44–0	0.068	3.4
		Indeno(1,2,3–cd)pyrene	193–39–5	0.0055	3.4
		Phenanthrene	85–01–8	0.059	5.6
		Pyrene	129–00–0	0.067	8.2
		Antimony	7440–36–0	1.9	2.1 mg/l TCLP
		Arsenic	7440–38–2	1.4	5.0 mg/l TCLP
		Barium	7440–39–3	1.2	7.6 mg/l TCLP
		Beryllium	7440–41–7	0.82	0.014 mg/l TCLP
		Cadmium	7440–43–9	0.69	0.19 mg/l TCLP
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
		Mercury	7439–97–6	0.15	0.025 mg/l TCLP
		Nickel	7440–02–0	3.98	5.0 mg/l TCLP
		Selenium	7782–49–2	0.82	0.16 mg/l TCLP
		Silver	7440–22–4	0.43	0.30 mg/l TCLP
		Cyanide (Total)	57–12–5	1.2	590
		Cyanide (Amenable)	57–12–5	0.86	30
		Fluoride	16984–48–8	35	48 mg/l TCLP

K093	Distillation light ends from the production of phthalic anhydride from ortho–xylene.	Phthalic anhydride (measured as Phthalic acid or Terephthalic acid)	100–21–0	0.055	28
		Phthalic anhydride (measured as Phthalic acid or Terephthalic acid)	85–44–9	0.055	28
K094	Distillation bottoms from the production of phthalic anhydride from ortho–xylene.	Phthalic anhydride (measured as Phthalic acid or Terephthalic acid)	100–21–0	0.055	28
		Phthalic anhydride (measured as Phthalic acid or Terephthalic acid)	85–44–9	0.055	28
K095	Distillation bottoms from the production of 1,1,1–trichloroethane.	Hexachloroethane	67–72–1	0.055	30
		Pentachloroethane	76–01–7	0.055	6.0
		1,1,1,2–Tetrachloroethane	630–20–6	0.057	6.0
		1,1,2,2–Tetrachloroethane	79–34–6	0.057	6.0
		Tetrachloroethylene	127–18–4	0.056	6.0
		1,1,2–Trichloroethane	79–00–5	0.054	6.0
		Trichloroethylene	79–01–6	0.054	6.0
K096	Heavy ends from the heavy ends column from the production of 1,1,1–trichloroethane.	m–Dichlorobenzene	541–73–1	0.036	6.0
		Pentachloroethane	76–01–7	0.055	6.0
		1,1,1,2–Tetrachloroethane	630–20–6	0.057	6.0
		1,1,2,2–Tetrachloroethane	79–34–6	0.057	6.0
		Tetrachloroethylene	127–18–4	0.056	6.0
		1,2,4–Trichlorobenzene	120–82–1	0.055	19
		1,1,2–Trichloroethane	79–00–5	0.054	6.0
		Trichloroethylene	79–01–6	0.054	6.0
K097	Vacuum stripper discharge from the chlordane chlorinator in the production of chlordane.	Chlordane (alpha and gamma isomers)	57–74–9	0.0033	0.26
		Heptachlor	76–44–8	0.0012	0.066
		Heptachlor epoxide	1024–57–3	0.016	0.066
		Hexachlorocyclopentadiene	77–47–4	0.057	2.4
K098	Untreated process wastewater from the production of toxaphene.	Toxaphene	8001–35–2	0.0095	2.6

K099	Untreated wastewater from the production of 2,4–D.	2,4–Dichlorophenoxyacetic acid	94–75–7	0.72	10
		HxCDDs (All Hexachlorodibenzo–p–dioxins)	NA	0.000063	0.001
		HxCDFs (All Hexachlorodibenzofurans)	NA	0.000063	0.001
		PeCDDs (All Pentachlorodibenzo–p–dioxins)	NA	0.000063	0.001
		PeCDFs (All Pentachlorodibenzofurans)	NA	0.000035	0.001
		TCDDs (All Tetrachlorodibenzo–p–dioxins)	NA	0.000063	0.001
		TCDFs (All Tetrachlorodibenzofurans)	NA	0.000063	0.001
K100	Waste leaching solution from acid leaching of emission control dust/sludge from secondary lead smelting.	Cadmium	7440–43–9	0.69	0.19 mg/l TCLP
		Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
		Lead	7439–92–1	0.69	0.37 mg/l TCLP
K101	Distillation tar residues from the distillation of aniline–based compounds in the production of veterinary pharmaceuticals from arsenic or organo–arsenic compounds.	o–Nitroaniline	88–74–4	0.27	14
		Arsenic	7440–38–2	1.4	5.0 mg/l TCLP
		Cadmium	7440–43–9	0.69	NA
		Lead	7439–92–1	0.69	NA
		Mercury	7439–97–6	0.15	NA
K102	Residue from the use of activated carbon for decolorization in the production of veterinary pharmaceuticals from arsenic or organo–arsenic compounds.	o–Nitrophenol	88–75–5	0.028	13
		Arsenic	7440–38–2	1.4	5.0 mg/l TCLP
		Cadmium	7440–43–9	0.69	NA
		Lead	7439–92–1	0.69	NA
		Mercury	7439–97–6	0.15	NA
K103	Process residues from aniline extraction from the production of aniline.	Aniline	62–53–3	0.81	14
		Benzene	71–43–2	0.14	10
		2,4–Dinitrophenol	51–28–5	0.12	160
		Nitrobenzene	98–95–3	0.068	14
		Phenol	108–95–2	0.039	6.2
K104	Combined wastewater streams generated from nitrobenzene/aniline production.	Aniline	62–53–3	0.81	14
		Benzene	71–43–2	0.14	10
		2,4–Dinitrophenol	51–28–5	0.12	160
		Nitrobenzene	98–95–3	0.068	14
		Phenol	108–95–2	0.039	6.2
		Cyanides (Total)[7]	57–12–5	1.2	590

K105	Separated aqueous stream from the reactor product washing step in the production of chlorobenzenes.	Benzene	71–43–2	0.14	10
		Chlorobenzene	108–90–7	0.057	6.0
		2–Chlorophenol	95–57–8	0.044	5.7
		o–Dichlorobenzene	95–50–1	0.088	6.0
		p–Dichlorobenzene	106–46–7	0.090	6.0
		Phenol	108–95–2	0.039	6.2
		2,4,5–Trichlorophenol	95–95–4	0.18	7.4
		2,4,6–Trichlorophenol	88–06–2	0.035	7.4
K106	K106 (wastewater treatment sludge from the mercury cell process in chlorine production) nonwastewaters that contain greater than or equal to 260 mg/kg total mercury.	Mercury	7439–97–6	NA	RMERC
	K106 (wastewater treatment sludge from the mercury cell process in chlorine production) nonwastewaters that contain less than 260 mg/kg total mercury that are residues from RMERC.	Mercury	7439–97–6	NA	0.20 mg/l TCLP
	Other K106 nonwastewaters that contain less than 260 mg/kg total mercury and are not residues from RMERC.	Mercury	7439–97–6	NA	0.025 mg/l TCLP
	All K106 wastewaters.	Mercury	7439–97–6	0.15	NA
K107	Column bottoms from product separation from the production of 1,1–dimethylhydrazine (UDMH) from carboxylic acid hydrazides.	NA	NA	CMBST; or CHOXD fb CARBN; or BIODG fb CARBN	CMBST
K108	Condensed column overheads from product separation and condensed reactor vent gases from the production of 1,1–dimethylhydrazine (UDMH) from carboxylic acid hydrazides.	NA	NA	CMBST; or CHOXD fb CARBN; or BIODG fb CARBN	CMBST
K109	Spent filter cartridges from product purification from the production of 1,1–dimethyhydrazine (UDMH) from carboxylic acid hydrazides.	NA	NA	CMBST; or CHOXD fb CARBN; or BIODG fb CARBN	CMBST
K110	Condensed column overheads from intermediate separation from the production of 1,1–dimethylhydrazine (UDMH) from carboxylic acid hydrazides.	NA	NA	CMBST; or CHOXD fb CARBN; or BIODG fb CARBN	CMBST
K111	Product washwaters from the production of dinitrotoluene via nitration of toluene.	2,4–Dinitrotoluene	121–1–1	0.32	140
		2,6–Dinitrotoluene	606–20–2	0.55	28

K112	Reaction by−product water from the drying column in the production of toluenediamine via hydrogenation of dinitrotoluene.	NA	NA	CMBST; or CHOXD fb CARBN; or BIODG fb CARBN	CMBST
K113	Condensed liquid light ends from the purification of toluenediamine in the production of toluenediamine via hydrogenation of dinitrotoluene.	NA	NA	CARBN; or CMBST	CMBST
K114	Vicinals from the purification of toluenediamine in the production of toluenediamine via hydrogenation of dinitrotoluene.	NA	NA	CARBN; or CMBST	CMBST
K115	Heavy ends from the purification of toluenediamine in the production of toluenediamine via hydrogenation of dinitrotoluene.	Nickel	7440−02−0	3.98	5.0 mg/l TCLP
		NA	NA	CARBN; or CMBST	CMBST
K116	Organic condensate from the solvent recovery column in the production of toluene diisocyanate via phosgenation of toluenediamine.	NA	NA	CARBN; or CMBST	CMBST
K117	Wastewater from the reactor vent gas scrubber in the production of ethylene dibromide via bromination of ethene.	Methyl bromide (Bromomethane)	74−83−9	0.11	15
		Chloroform	67−66−3	0.046	6.0
		Ethylene dibromide (1,2−Dibromoethane)	106−93−4	0.028	15
K118	Spent absorbent solids from purification of ethylene dibromide in the production of ethylene dibromide via bromination of ethene.	Methyl bromide (Bromomethane)	74−83−9	0.11	15
		Chloroform	67−66−3	0.046	6.0
		Ethylene dibromide (1,2−Dibromoethane)	106−93−4	0.028	15
K123	Process wastewater (including supernates, filtrates, and washwaters) from the production of ethylenebisdithiocarbamic acid and its salts.	NA	NA	CMBST; or CHOXD fb (BIODG or CARBN)	CMBST
K124	Reactor vent scrubber water from the production of ethylenebisdithiocarbamic acid and its salts.	NA	NA	CMBST; or CHOXD fb (BIODG or CARBN)	CMBST
K125	Filtration, evaporation, and centrifugation solids from the production of ethylenebisdithiocarbamic acid and its salts.	NA	NA	CMBST; or CHOXD fb (BIODG or CARBN)	CMBST
K126	Baghouse dust and floor sweepings in milling and packaging operations from the production or formulation of ethylenebisdithiocarbamic acid and its salts.	NA	NA	CMBST; or CHOXD fb (BIODG or CARBN)	CMBST

K131	Wastewater from the reactor and spent sulfuric acid from the acid dryer from the production of methyl bromide.	Methyl bromide (Bromomethane)	74–83–9	0.11	15
K132	Spent absorbent and wastewater separator solids from the production of methyl bromide.	Methyl bromide (Bromomethane)	74–83–9	0.11	15
K136	Still bottoms from the purification of ethylene dibromide in the production of ethylene dibromide via bromination of ethene.	Methyl bromide (Bromomethane)	74–83–9	0.11	15
		Chloroform	67–66–3	0.046	6.0
		Ethylene dibromide (1,2–Dibromoethane)	106–93–4	0.028	15
K140	Waste solids and filter cartridges from the production of 2,4,6–tribromophenol.	2,4,6–Tribromophenol	118–79–6	0.035	7.4
K141	Process residues from the recovery of coal tar, including, but not limited to, collecting sump residues from the production of coke or the recovery of coke by–products produced from coal. This listing does not include K087 (decanter tank tar sludge from coking operations).	Benzene	71–43–2	0.14	10
		Benz(a)anthracene	56–55–3	0.059	3.4
		Benzo(a)pyrene	50–32–8	0.061	3.4
		Benzo(b)fluoranthene (difficult to distinguish from benzo(k)fluoranthene)	205–99–2	0.11	6.8
		Benzo(k)fluoranthene (difficult to distinguish from benzo(b)fluoranthene)	207–08–9	0.11	6.8
		Chrysene	218–01–9	0.059	3.4
		Dibenz(a,h)anthracene	53–70–3	0.055	8.2
		Indeno(1,2,3–cd)pyrene	193–39–5	0.0055	3.4
K142	Tar storage tank residues from the production of coke from coal or from the recovery of coke by–products produced from coal.	Benzene	71–43–2	0.14	10
		Benz(a)anthracene	56–55–3	0.059	3.4
		Benzo(a)pyrene	50–32–8	0.061	3.4
		Benzo(b)fluoranthene (difficult to distinguish from benzo(k)fluoranthene)	205–99–2	0.11	6.8
		Benzo(k)fluoranthene (difficult to distinguish from benzo(b)fluoranthene)	207–08–9	0.11	6.8
		Chrysene	218–01–9	0.059	3.4
		Dibenz(a,h)anthracene	53–70–3	0.055	8.2
		Indeno(1,2,3–cd)pyrene	193–39–5	0.0055	3.4

K143	Process residues from the recovery of light oil, including, but not limited to, those generated in stills, decanters, and wash oil recovery units from the recovery of coke by−products produced from coal.	Benzene	71−43−2	0.14	10
		Benz(a)anthracene	56−55−3	0.059	3.4
		Benzo(a)pyrene	50−32−8	0.061	3.4
		Benzo(b)fluoranthene (difficult to distinguish from benzo(k)fluoranthene)	205−99−2	0.11	6.8
		Benzo(k)fluoranthene (difficult to distinguish from benzo(b)fluoranthene)	207−08−9	0.11	6.8
		Benzene	71−43−2	0.14	10
		Chrysene	218−01−9	0.059	3.4
K144	Wastewater sump residues from light oil refining, including, but not limited to, intercepting or contamination sump sludges from the recovery of coke by−products produced from coal.	Benzene	71−43−2	0.14	10
		Benz(a)anthracene	56−55−3	0.059	3.4
		Benzo(a)pyrene	50−32−8	0.061	3.4
		Benzo(b)fluoranthene (difficult to distinguish from benzo(k)fluoranthene)	205−99−2	0.11	6.8
		Benzo(k)fluoranthene (difficult to distinguish from benzo(b)fluoranthene)	207−08−9	0.11	6.8
		Chrysene	218−01−9	0.059	3.4
		Dibenz(a,h)anthracene	53−70−3	0.055	8.2
K145	Residues from naphthalene collection and recovery operations from the recovery of coke by−products produced from coal.	Benzene	71−43−2	0.14	10
		Benz(a)anthracene	56−55−3	0.059	3.4
		Benzo(a)pyrene	50−32−8	0.061	3.4
		Chrysene	218−01−9	0.059	3.4
		Dibenz(a,h)anthracene	53−70−3	0.055	8.2
		Naphthalene	91−20−3	0.059	5.6
K147	Tar storage tank residues from coal tar refining.	Benzene	71−43−2	0.14	10
		Benz(a)anthracene	56−55−3	0.059	3.4
		Benzo(a)pyrene	50−32−8	0.061	3.4
		Benzo(b)fluoranthene (difficult to distinguish from benzo(k)fluoranthene)	205−99−2	0.11	6.8
		Benzo(k)fluoranthene (difficult to distinguish from benzo(b)fluoranthene)	207−08−9	0.11	6.8
		Chrysene	218−01−9	0.059	3.4
		Dibenz(a,h)anthracene	53−70−3	0.055	8.2
		Indeno(1,2,3−cd)pyrene	193−39−5	0.0055	3.4

K148	Residues from coal tar distillation, including, but not limited to, still bottoms.	Benz(a)anthracene	56–55–3	0.059	3.4
		Benzo(a)pyrene	50–32–8	0.061	3.4
		Benzo(b)fluoranthene (difficult to distinguish from benzo(k)fluoranthene)	205–99–2	0.11	6.8
		Benzo(k)fluoranthene (difficult to distinguish from benzo(b)fluoranthene)	207–08–9	0.11	6.8
		Chrysene	218–01–9	0.059	3.4
		Dibenz(a,h)anthracene	53–70–3	0.055	8.2
		Indeno(1,2,3–cd)pyrene	193–39–5	0.0055	3.4
K149	Distillation bottoms from the production of alpha– (or methyl–) chlorinated toluenes, ring–chlorinated toluenes, benzoyl chlorides, and compounds with mixtures of these functional groups. This waste does not include still bottoms from the distillations of benzyl chloride.	Chlorobenzene	108–90–7	0.057	6.0
		Chloroform	67–66–3	0.046	6.0
		Chloromethane	74–87–3	0.19	30
		p–Dichlorobenzene	106–46–7	0.090	6.0
		Hexachlorobenzene	118–74–1	0.055	10
		Pentachlorobenzene	608–93–5	0.055	10
		1,2,4,5–Tetrachlorobenzene	95–94–3	0.055	14
		Toluene	108–88–3	0.080	10
K150	Organic residuals, excluding spent carbon adsorbent, from the spent chlorine gas and hydrochloric acid recovery processes associated with the production of alpha– (or methyl–) chlorinated toluenes, ring–chlorinated toluenes, benzoyl chlorides, and compounds with mixtures of these functional groups.	Carbon tetrachloride	56–23–5	0.057	6.0
		Chloroform	67–66–3	0.046	6.0
		Chloromethane	74–87–3	0.19	30
		p–Dichlorobenzene	106–46–7	0.090	6.0
		Hexachlorobenzene	118–74–1	0.055	10
		Pentachlorobenzene	608–93–5	0.055	10
		1,2,4,5–Tetrachlorobenzene	95–94–3	0.055	14
		1,1,2,2– Tetrachloroethane	79–34–5	0.057	6.0
		Tetrachloroethylene	127–18–4	0.056	6.0
		1,2,4–Trichlorobenzene	120–82–1	0.055	19
K151	Wastewater treatment sludges, excluding neutralization and biological sludges, generated during the treatment of wastewaters from the production of alpha– (or methyl–) chlorinated toluenes, ring–chlorinated toluenes, benzoyl chlorides, and compounds with mixtures of these functional groups.	Benzene	71–43–2	0.14	10
		Carbon tetrachloride	56–23–5	0.057	6.0
		Chloroform	67–66–3	0.046	6.0
		Hexachlorobenzene	118–74–1	0.055	10
		Pentachlorobenzene	608–93–5	0.055	10
		1,2,4,5–Tetrachlorobenzene	95–94–3	0.055	14
		Tetrachloroethylene	127–18–4	0.056	6.0
		Toluene	108–88–3	0.080	10

K156	Organic waste (including heavy ends, still bottoms, light ends, spent solvents, filtrates, and decantates) from the production of carbamates and carbamoyl oximes.[9]	Acetonitrile	75–05–8	5.6	38
		Acetophenone	96–86–2	0.010	9.7
		Aniline	62–53–3	0.81	14
		Benomyl	17804–35–2	0.056	1.4
		Benzene	71–43–2	0.14	10
		Carbaryl	63–25–2	0.006	0.14
		Carbenzadim	10605–21–7	0.056	1.4
		Carbofuran	1563–66–2	0.006	0.14
		Carbosulfan	55285–14–8	0.028	1.4
		Chlorobenzene	108–90–7	0.057	6.0
		Chloroform	67–66–3	0.046	6.0
		o–Dichlorobenzene	95–50–1	0.088	6.0
		Methomyl	16752–77–5	0.028	0.14
		Methylene chloride	75–09–2	0.089	30
		Methyl ethyl ketone	78–93–3	0.28	36
		Naphthalene	91–20–3	0.059	5.6
		Phenol	108–95–2	0.039	6.2
		Pyridine	110–86–1	0.014	16
		Toluene	108–88–3	0.080	10
		Triethylamine	121–44–8	0.081	1.5
K157	Wastewaters (including scrubber waters, condenser waters, washwaters, and separation waters) from the production of carbamates and carbamoyl oximes.[9]	Carbon tetrachloride	56–23–5	0.057	6.0
		Chloroform	67–66–3	0.046	6.0
		Chloromethane	74–87–3	0.19	30
		Methomyl	16752–77–5	0.028	0.14
		Methylene chloride	75–09–2	0.089	30
		Methyl ethyl ketone	78–93–3	0.28	36
		o–Phenylenediamine	95–54–5	0.056	5.6
		Pyridine	110–86–1	0.014	16
		Triethylamine	121–44–8	0.081	1.5
K158	Bag house dusts and filter/separation solids from the production of carbamates and carbamoyl oximes.[9]	Benomyl	17804–35–2	0.056	1.4
		Benzene	71–43–2	0.14	10
		Carbenzadim	10605–21–7	0.056	1.4
		Carbofuran	1563–66–2	0.006	0.14
		Carbosulfan	55285–14–8	0.028	1.4
		Chloroform	67–66–3	0.046	6.0
		Methylene chloride	75–09–2	0.089	30
		Phenol	108–95–2	0.039	6.2

K159	Organics from the treatment of thiocarbamate wastes.[9]	Benzene	71–43–2	0.14	10
		Butylate	2008–41–5	0.042	1.5
		EPTC (Eptam)	759–94–4	0.042	1.4
		Molinate	2212–67–1	0.042	1.4
		Pebulate	1114–71–2	0.042	1.4
		Vernolate	1929–77–7	0.042	1.4
K161	Purification solids (including filtration, evaporation, and centrifugation solids), baghouse dust and floor sweepings from the production of dithiocarbamate acids and their salts.[9]	Carbon disulfide	75–15–0	3.8	4.8 mg/l TCLP
		Dithiocarbamates (total)	NA	0.028	28
		Antimony	7440–36–0	1.9	2.1 mg/l TCLP
		Arsenic	7440–38–2	1.9	5.0 mg/l TCLP
		Lead	7439–92–1	0.069	0.37 mg/l TCLP
		Nickel	7440–02–0	3.98	5.0 mg/l TCLP
		Selenium	7782–49–2	0.82	0.16 mg/l TCLP
P001	Warfarin, & salts, when present at concentrations greater than 0.3%.	Warfarin	81–81–2	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P002	1–Acetyl–2–thiourea	1–Acetyl–2–thiourea	591–08–2	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P003	Acrolein	Acrolein	107–02–8	0.29	CMBST
P004	Aldrin	Aldrin	309–00–2	0.021	0.066
P005	Allyl alcohol	Allyl alcohol	107–18–6	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P006	Aluminum phosphide	Aluminum phosphide	20859–73–8	CHOXD; CHRED; or CMBST	CHOXD; CHRED; or CMBST
P007	5–(Aminomethyl)–3–isoxazolol	5–(Aminomethyl)–3–isoxazol	2763–96–4	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P008	4–Aminopyridine	4–Aminopyridine	504–24–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P009	Ammonium picrate	Ammonium picrate	131–74–8	CHOXD; CHRED; CARBN; BIODG; or CMBST	CHOXD; CHRED; or CMBST
P010	Arsenic acid	Arsenic	7440–38–2	1.4	5.0 mg/l TCLP
P011	Arsenic pentoxide	Arsenic	7440–38–2	1.4	5.0 mg/l TCLP

P012	Arsenic trioxide	Arsenic	7440–38–2	1.4	5.0 mg/l TCLP
P013	Barium cyanide	Barium	7440–39–3	NA	7.6 mg/l TCLP
		Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30
P014	Thiophenol (Benzene thiol)	Thiophenol (Benzene thiol)	108–98–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P015	Beryllium dust	Beryllium	7440–41–7	RMETL; or RTHRM	RMETL; or RTHRM
P016	Dichloromethyl ether (Bis(chloromethyl)ether)	Dichloromethyl ether	542–88–1	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P017	Bromoacetone	Bromoacetone	598–31–2	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P018	Brucine	Brucine	357–57–3	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P020	2–sec–Butyl–4,6–dinitrophenol (Dinoseb)	2–sec–Butyl–4,6–dinitrophenol (Dinoseb)	88–85–7	0.066	2.5
P021	Calcium cyanide	Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30
P022	Carbon disulfide	Carbon disulfide	75–15–0	3.8	CMBST
		Carbon disulfide; alternate[6] standard for nonwastewaters only.	75–15–0	NA	4.8 mg/l TCLP
P023	Chloroacetaldehyde	Chloroacetaldehyde	107–20–0	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P024	p–Chloroaniline	p–Chloroaniline	106–47–8	0.46	16
P026	1–(o–Chlorophenyl)thiourea	1–(o–Chlorophenyl)thiourea	5344–82–1	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P027	3–Chloropropionitrile	3–Chloropropionitrile	542–76–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P028	Benzyl chloride	Benzyl chloride	100–44–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P029	Copper cyanide	Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30

P030	Cyanides (soluble salts and complexes)	Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30
P031	Cyanogen	Cyanogen	460–19–5	CHOXD; WETOX; or CMBST	CHOXD; WETOX; or CMBST
P033	Cyanogen chloride	Cyanogen chloride	506–77–4	CHOXD; WETOX; or CMBST	CHOXD; WETOX; or CMBST
P034	2–Cyclohexyl–4,6–dinitrophenol	2–Cyclohexyl–4,6–dinitrophenol	131–89–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P036	Dichlorophenylarsine	Arsenic	7440–38–2	1.4	5.0 mg/l TCLP
P037	Dieldrin	Dieldrin	60–57–1	0.017	0.13
P038	Diethylarsine	Arsenic	7440–38–2	1.4	5.0 mg/l TCLP
P039	Disulfoton	Disulfoton	298–04–4	0.017	6.2
P040	O,O–Diethyl O–pyrazinyl phosphorothioate	O,O–Diethyl O–pyrazinyl phosphorothioate	297–97–2	CARBN; or CMBST	CMBST
P041	Diethyl–p–nitrophenyl phosphate	Diethyl–p–nitrophenyl phosphate	311–45–5	CARBN; or CMBST	CMBST
P042	Epinephrine	Epinephrine	51–43–4	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P043	Diisopropylfluorophosphate (DFP)	Diisopropylfluorophosphate (DFP)	55–91–4	CARBN; or CMBST	CMBST
P044	Dimethoate	Dimethoate	60–51–5	CARBN; or CMBST	CMBST
P045	Thiofanox	Thiofanox	39196–18–4	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P046	alpha, alpha–Dimethylphenethylamine	alpha, alpha–Dimethylphenethylamine	122–09–8	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P047	4,6–Dinitro–o–cresol	4,6–Dinitro–o–cresol	543–52–1	0.28	160
	4,6–Dinitro–o–cresol salts	NA	NA	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P048	2,4–Dinitrophenol	2,4–Dinitrophenol	51–28–5	0.12	160
P049	Dithiobiuret	Dithiobiuret	541–53–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P050	Endosulfan	Endosulfan I	939–98–8	0.023	0.066
		Endosulfan II	33213–65–9	0.029	0.13
		Endosulfan sulfate	1031–07–8	0.029	0.13

P051	Endrin	Endrin	72–20–8	0.0028	0.13
		Endrin aldehyde	7421–93–4	0.025	0.13
P054	Aziridine	Aziridine	151–56–4	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P056	Fluorine	Fluoride (measured in wastewaters only)	16964–48–8	35	ADGAS fb NEUTR
P057	Fluoroacetamide	Fluoroacetamide	640–19–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P058	Fluoroacetic acid, sodium salt	Fluoroacetic acid, sodium salt	62–74–8	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P059	Heptachlor	Heptachlor	76–44–8	0.0012	0.066
		Heptachlor epoxide	1024–57–3	0.016	0.066
P060	Isodrin	Isodrin	465–73–6	0.021	0.066
P062	Hexaethyl tetraphosphate	Hexaethyl tetraphosphate	757–58–4	CARBN; or CMBST	CMBST
P063	Hydrogen cyanide	Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30
P064	Isocyanic acid, ethyl ester	Isocyanic acid, ethyl ester	624–83–9	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P065	Mercury fulminate nonwastewaters, regardless of their total mercury content, that are not incinerator residues or are not residues from RMERC.	Mercury	7439–97–6	NA	IMERC
	Mercury fulminate nonwastewaters that are either incinerator residues or are residues from RMERC; and contain greater than or equal to 260 mg/kg total mercury.	Mercury	7439–97–6	NA	RMERC
	Mercury fulminate nonwastewaters that are residues from RMERC and contain less than 260 mg/kg total mercury.	Mercury	7439–97–6	NA	0.20 mg/l TCLP
	Mercury fulminate nonwastewaters that are incinerator residues and contain less than 260 mg/kg total mercury.	Mercury	7439–97–6	NA	0.025 mg/l TCLP
	All mercury fulminate wastewaters.	Mercury	7439–97–6	0.15	NA
P066	Methomyl	Methomyl	16752–77–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST

P067	2–Methyl–aziridine	2–Methyl–aziridine	75–55–8	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P068	Methyl hydrazine	Methyl hydrazine	60–34–4	CHOXD; CHRED; CARBN; BIODG; or CMBST	CHOXD; CHRED; or CMBST
P069	2–Methyllactonitrile	2–Methyllactonitrile	75–86–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P070	Aldicarb	Aldicarb	116–06–3	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P071	Methyl parathion	Methyl parathion	298–00–0	0.014	4.6
P072	1–Naphthyl–2–thiourea	1–Naphthyl–2–thiourea	86–88–4	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P073	Nickel carbonyl	Nickel	7440–02–0	3.98	5.0 mg/l TCLP
P074	Nickel cyanide	Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30
		Nickel	7440–02–0	3.98	5.0 mg/l TCLP
P075	Nicotine and salts	Nicotine and salts	54–11–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P076	Nitric oxide	Nitric oxide	10102–43–9	ADGAS	ADGAS
P077	p–Nitroaniline	p–Nitroaniline	100–01–6	0.028	28
P078	Nitrogen dioxide	Nitrogen dioxide	10102–44–0	ADGAS	ADGAS
P081	Nitroglycerin	Nitroglycerin	55–63–0	CHOXD; CHRED; CARBN; BIODG or CMBST	CHOXD; CHRED; or CMBST
P082	N–Nitrosodimethylamine	N–Nitrosodimethylamine	62–75–9	0.40	2.3
P084	N–Nitrosomethylvinylamine	N–Nitrosomethylvinylamine	4549–40–0	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P085	Octamethylpyrophosphoramide	Octamethylpyrophosphoramide	152–16–9	CARBN; or CMBST	CMBST
P087	Osmium tetroxide	Osmium tetroxide	20816–12–0	RMETL; or RTHRM	RMETL; or RTHRM
P088	Endothall	Endothall	145–73–3	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P089	Parathion	Parathion	56–38–2	0.014	4.6

P092	Phenyl mercuric acetate nonwastewaters, regardless of their total mercury content, that are not incinerator residues or are not residues from RMERC.	Mercury	7439–97–6	NA	IMERC; or RMERC
	Phenyl mercuric acetate nonwastewaters that are either incinerator residues or are residues from RMERC; and still contain greater than or equal to 260 mg/kg total mercury.	Mercury	7439–97–6	NA	RMERC
	Phenyl mercuric acetate nonwastewaters that are residues from RMERC and contain less than 260 mg/kg total mercury.	Mercury	7439–97–6	NA	0.20 mg/l TCLP
	Phenyl mercuric acetate nonwastewaters that are incinerator residues and contain less than 260 mg/kg total mercury.	Mercury	7439–97–6	NA	0.025 mg/l TCLP
	All phenyl mercuric acetate wastewaters.	Mercury	7439–97–6	0.15	NA
P093	Phenylthiourea	Phenylthiourea	103–85–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P094	Phorate	Phorate	298–02–2	0.021	4.6
P095	Phosgene	Phosgene	75–44–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P096	Phosphine	Phosphine	7803–51–2	CHOXD; CHRED; or CMBST	CHOXD; CHRED; or CMBST
P097	Famphur	Famphur	52–85–7	0.017	15
P098	Potassium cyanide	Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30
P099	Potassium silver cyanide	Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30
		Silver	7440–22–4	0.43	0.30 mg/l TCLP
P101	Ethyl cyanide (Propanenitrile)	Ethyl cyanide (Propanenitrile)	107–12–0	0.24	360
P102	Propargyl alcohol	Propargyl alcohol	107–19–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P103	Selenourea	Selenium	7782–49–2	0.82	0.16 mg/l TCLP
P104	Silver cyanide	Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30
		Silver	7440–22–4	0.43	0.30 mg/l TCLP

P105	Sodium azide	Sodium azide	26628–22–8	CHOXD; CHRED; CARBN; BIODG; or CMBST	CHOXD; CHRED; or CMBST
P106	Sodium cyanide	Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30
P108	Strychnine and salts	Strychnine and salts	57–24–9	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P109	Tetraethyldithiopyrophosphate	Tetraethyldithiopyrophosphate	3689–24–5	CARBN; or CMBST	CMBST
P110	Tetraethyl lead	Lead	7439–92–1	0.69	0.37 mg/l TCLP
P111	Tetraethylpyrophosphate	Tetraethylpyrophosphate	107–49–3	CARBN; or CMBST	CMBST
P112	Tetranitromethane	Tetranitromethane	509–14–8	CHOXD; CHRED; CARBN; BIODG; or CMBST	CHOXD; CHRED; or CMBST
P113	Thallic oxide	Thallium (measured in wastewaters only)	7440–28–0	1.4	RTHRM; or STABL
P114	Thallium selenite	Selenium	7782–49–2	0.82	0.16 mg/l TCLP
P115	Thallium (I) sulfate	Thallium (measured in wastewaters only)	7440–28–0	1.4	RTHRM; or STABL
P116	Thiosemicarbazide	Thiosemicarbazide	79–19–6	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P118	Trichloromethanethiol	Trichloromethanethiol	75–70–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
P119	Ammonium vanadate	Vanadium (measured in wastewaters only)	7440–62–2	4.3	STABL
P120	Vanadium pentoxide	Vanadium (measured in wastewaters only)	7440–62–2	4.3	STABL
P121	Zinc cyanide	Cyanides (Total)[7]	57–12–5	1.2	590
		Cyanides (Amenable)[7]	57–12–5	0.86	30
P122	Zinc phosphide Zn_3P_2, when present at concentrations greater than 10%	Zinc phosphide	1314–84–7	CHOXD; CHRED; or CMBST	CHOXD; CHRED; or CMBST
P123	Toxaphene	Toxaphene	8001–35–2	0.0095	2.6
P127	Carbofuran [9]	Carbofuran	1563–66–2	0.006	0.14
P128	Mexacarbate [9]	Mexacarbate	315–18–4	0.056	1.4
P185	Tirpate [9]	Tirpate	26419–73–8	0.056	0.28
P188	Physostigimine salicylate [9]	Physostigmine salicylate	57–64–7	0.056	1.4
P189	Carbosulfan [9]	Carbosulfan	55285–14–8	0.028	1.4

P190	Metolcarb [9]	Metolcarb	1129–41–5	0.056	1.4
P191	Dimetilan [9]	Dimetilan	644–64–4	0.056	1.4
P192	Isolan [9]	Isolan	119–38–0	0.056	1.4
P194	Oxamyl [9]	Oxamyl	23135–22–0	0.056	0.28
P196	Manganese dimethyldithiocarbamate [9]	Dithiocarbamates (total)	NA	0.028	28
P197	Formparanate	Formparanate	17702–57–7	0.056	1.4
P198	Formetanate hydrochloride [9]	Formetanate hydrochloride	23422–53–9	0.056	1.4
P199	Methiocarb [9]	Methiocarb	2032–65–7	0.056	1.4
P201	Promecarb [9]	Promecarb	2631–37–0	0.056	1.4
P202	m–Cumenyl methylcarbamate [9]	m–Cumenyl methylcarbamate	64–00–6	0.056	1.4
P203	Aldicarb sulfone [9]	Aldicarb sulfone	1646–88–4	0.056	0.28
P204	Physostigmine [9]	Physostigmine	57–47–6	0.056	1.4
P205	Ziram [9]	Dithiocarbamates (total)	NA	0.028	28
U001	Acetaldehyde	Acetaldehyde	75–07–0	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U002	Acetone	Acetone	67–64–1	0.28	160
U003	Acetonitrile	Acetonitrile	75–05–8	5.6	CMBST
		Acetonitrile; alternate[6] standard for nonwastewaters only	75–05–8	NA	38
U004	Acetophenone	Acetophenone	98–86–2	0.010	9.7
U005	2–Acetylaminofluorene	2–Acetylaminofluorene	53–96–3	0.059	140
U006	Acetyl chloride	Acetyl chloride	75–36–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U007	Acrylamide	Acrylamide	79–06–1	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U008	Acrylic acid	Acrylic acid	79–10–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U009	Acrylonitrile	Acrylonitrile	107–13–1	0.24	84
U010	Mitomycin C	Mitomycin C	50–07–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U011	Amitrole	Amitrole	61–82–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U012	Aniline	Aniline	62–53–3	0.81	14

U014	Auramine	Auramine	492–80–8	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U015	Azaserine	Azaserine	115–02–6	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U016	Benz(c)acridine	Benz(c)acridine	225–51–4	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U017	Benzal chloride	Benzal chloride	98–87–3	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U018	Benz(a)anthracene	Benz(a)anthracene	56–55–3	0.059	3.4
U019	Benzene	Benzene	71–43–2	0.14	10
U020	Benzenesulfonyl chloride	Benzenesulfonyl chloride	98–09–9	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U021	Benzidine	Benzidine	92–87–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U022	Benzo(a)pyrene	Benzo(a)pyrene	50–32–8	0.061	3.4
U023	Benzotrichloride	Benzotrichloride	98–07–7	CHOXD; CHRED; CARBN; BIODG; or CMBST	CHOXD; CHRED; or CMBST
U024	bis(2–Chloroethoxy)methane	bis(2–Chloroethoxy)methane	111–91–1	0.036	7.2
U025	bis(2–Chloroethyl)ether	bis(2–Chloroethyl)ether	111–44–4	0.033	6.0
U026	Chlornaphazine	Chlornaphazine	494–03–1	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U027	bis(2–Chloroisopropyl)ether	bis(2–Chloroisopropyl)ether	39638–32–9	0.055	7.2
U028	bis(2–Ethylhexyl)phthalate	bis(2–Ethylhexyl)phthalate	117–81–7	0.28	28
U029	Methyl bromide (Bromomethane)	Methyl bromide (Bromomethane)	74–83–9	0.11	15
U030	4–Bromophenyl phenyl ether	4–Bromophenyl phenyl ether	101–55–3	0.055	15
U031	n–Butyl alcohol	n–Butyl alcohol	71–36–3	5.6	2.6
U032	Calcium chromate	Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
U033	Carbon oxyfluoride	Carbon oxyfluoride	353–50–4	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST

U034	Trichloroacetaldehyde (Chloral)	Trichloroacetaldehyde (Chloral)	75–87–6	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U035	Chlorambucil	Chlorambucil	305–03–3	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U036	Chlordane	Chlordane (alpha and gamma isomers)	57–74–9	0.0033	0.26
U037	Chlorobenzene	Chlorobenzene	108–90–7	0.057	6.0
U038	Chlorobenzilate	Chlorobenzilate	510–15–6	0.10	CMBST
U039	p–Chloro–m–cresol	p–Chloro–m–cresol	59–50–7	0.018	14
U041	Epichlorohydrin (1–Chloro–2,3–epoxypropane)	Epichlorohydrin (1–Chloro–2,3–epoxypropane)	106–89–8	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U042	2–Chloroethyl vinyl ether	2–Chloroethyl vinyl ether	110–75–8	0.062	CMBST
U043	Vinyl chloride	Vinyl chloride	75–01–4	0.27	6.0
U044	Chloroform	Chloroform	67–66–3	0.046	6.0
U045	Chloromethane (Methyl chloride)	Chloromethane (Methyl chloride)	74–87–3	0.19	30
U046	Chloromethyl methyl ether	Chloromethyl methyl ether	107–30–2	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U047	2–Chloronaphthalene	2–Chloronaphthalene	91–58–7	0.055	5.6
U048	2–Chlorophenol	2–Chlorophenol	95–57–8	0.044	5.7
U049	4–Chloro–o–toluidine hydrochloride	4–Chloro–o–toluidine hydrochloride	3165–93–3	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U050	Chrysene	Chrysene	218–01–9	0.059	3.4
U051	Creosote	Naphthalene	91–20–3	0.059	5.6
		Pentachlorophenol	87–86–5	0.089	7.4
		Phenanthrene	85–01–8	0.059	5.6
		Pyrene	129–00–0	0.067	8.2
		Toluene	108–88–3	0.080	10
		Xylenes–mixed isomers (sum of o–, m–, and p–xylene concentrations)	1330–20–7	0.32	30
		Lead	7439–92–1	0.69	0.37 mg/l TCLP

U052	Cresols (Cresylic acid)	o–Cresol	95–48–7	0.11	5.6
		m–Cresol (difficult to distinguish from p–cresol)	108–39–4	0.77	5.6
		p–Cresol (difficult to distinguish from m–cresol)	106–44–5	0.77	5.6
		Cresol–mixed isomers (Cresylic acid) (sum of o–, m–, and p–cresol concentrations)	1319–77–3	0.88	11.2
U053	Crotonaldehyde	Crotonaldehyde	4170–30–3	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U055	Cumene	Cumene	98–82–8	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U056	Cyclohexane	Cyclohexane	110–82–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U057	Cyclohexanone	Cyclohexanone	108–94–1	0.36	CMBST
		Cyclohexanone; alternate[6] standard for nonwastewaters only	108–94–1	NA	0.75 mg/l TCLP
U058	Cyclophosphamide	Cyclophosphamide	50–18–0	CARBN; or CMBST	CMBST
U059	Daunomycin	Daunomycin	20830–81–3	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U060	DDD	o,p'–DDD	53–19–0	0.023	0.087
		p,p'–DDD	72–54–8	0.023	0.087
U061	DDT	o,p'–DDT	789–02–6	0.0039	0.087
		p,p'–DDT	50–29–3	0.0039	0.087
		o,p'–DDD	53–19–0	0.023	0.087
		p,p'–DDD	72–54–8	0.023	0.087
		o,p'–DDE	3424–82–6	0.031	0.087
		p,p'–DDE	72–55–9	0.031	0.087
U062	Diallate	Diallate	2303–16–4	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U063	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	53–70–3	0.055	8.2
U064	Dibenz(a,i)pyrene	Dibenz(a,i)pyrene	189–55–9	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U066	1,2–Dibromo–3–chloropropane	1,2–Dibromo–3–chloropropane	96–12–8	0.11	15

U067	Ethylene dibromide (1,2–Dibromoethane)	Ethylene dibromide (1,2–Dibromoethane)	106–93–4	0.028	15
U068	Dibromomethane	Dibromomethane	74–95–3	0.11	15
U069	Di–n–butyl phthalate	Di–n–butyl phthalate	84–74–2	0.057	28
U070	o–Dichlorobenzene	o–Dichlorobenzene	95–50–1	0.088	6.0
U071	m–Dichlorobenzene	m–Dichlorobenzene	541–73–1	0.036	6.0
U072	p–Dichlorobenzene	p–Dichlorobenzene	106–46–7	0.090	6.0
U073	3,3'–Dichlorobenzidine	3,3'–Dichlorobenzidine	91–94–1	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U074	1,4–Dichloro–2–butene	cis–1,4–Dichloro–2–butene	1476–11–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
		trans–1,4–Dichloro–2–butene	764–41–0	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U075	Dichlorodifluoromethane	Dichlorodifluoromethane	75–71–8	0.23	7.2
U076	1,1–Dichloroethane	1,1–Dichloroethane	75–34–3	0.059	6.0
U077	1,2–Dichloroethane	1,2–Dichloroethane	107–06–2	0.21	6.0
U078	1,1–Dichloroethylene	1,1–Dichloroethylene	75–35–4	0.025	6.0
U079	1,2–Dichloroethylene	trans–1,2–Dichloroethylene	156–60–5	0.054	30
U080	Methylene chloride	Methylene chloride	75–09–2	0.089	30
U081	2,4–Dichlorophenol	2,4–Dichlorophenol	120–83–2	0.044	14
U082	2,6–Dichlorophenol	2,6–Dichlorophenol	87–65–0	0.044	14
U083	1,2–Dichloropropane	1,2–Dichloropropane	78–87–5	0.85	18
U084	1,3–Dichloroproplyene	cis–1,3–Dichloroproplyene	10061–01–5	0.036	18
		trans–1,3–Dichloroproplyene	10061–02–6	0.036	18
U085	1,2:3,4–Diepoxybutane	1,2:3,4–Diepoxybutane	1464–53–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U086	N,N'–Diethylhydrazine	N,N'–Diethylhydrazine	1615–80–1	CHOXD; CHRED; CARBN; BIODG; or CMBST	CHOXD; CHRED; or CMBST
U087	O,O–Diethyl S–methyldithiophosphate	O,O–Diethyl S–methyldithiophosphate	3288–58–2	CARBN; CMBST	CMBST
U088	Diethyl phthalate	Diethyl phthalate	84–66–2	0.20	28
U089	Diethyl stilbestrol	Diethyl stilbestrol	56–53–1	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST

U090	Dihydrosafrole	Dihydrosafrole	94–58–6	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U091	3,3'–Dimethoxybenzidine	3,3'–Dimethoxybenzidine	119–90–4	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U092	Dimethylamine	Dimethylamine	124–40–3	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U093	p–Dimethylaminoazobenzene	p–Dimethylaminoazobenzene	60–11–7	0.13	CMBST
U094	7,12–Dimethyibenz(a)anthracene	7,12–Dimethylbenz(a)anthrace ne	57–97–6	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U095	3,3'–Dimethylbenzidine	3,3'–Dimethylbenzidine	119–93–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U096	alpha, alpha–Dimethyl benzyl hydroperoxide	alpha, alpha–Dimethyl benzyl hydroperoxide	80–15–9	CHOXD; CHRED; CARBN; BIODG; or CMBST	CHOXD; CHRED; or CMBST
U097	Dimethylcarbamoyl chloride	Dimethylcarbamoyl chloride	79–44–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U098	1,1–Dimethylhydrazine	1,1–Dimethylhydrazine	57–14–7	CHOXD; CHRED; CARBN; BIODG; or CMBST	CHOXD; CHRED; or CMBST
U099	1,2–Dimethylhydrazine	1,2–Dimethylhydrazine	540–73–8	CHOXD; CHRED; CARBN; BIODG; or CMBST	CHOXD; CHRED; or CMBST
U101	2,4–Dimethylphenol	2,4–Dimethylphenol	105–67–9	0.036	14
U102	Dimethyl phthalate	Dimethyl phthalate	131–11–3	0.047	28
U103	Dimethyl sulfate	Dimethyl sulfate	77–78–1	CHOXD; CHRED; CARBN; BIODG; or CMBST	CHOXD; CHRED; or CMBST
U105	2,4–Dinitrotoluene	2,4–Dinitrotoluene	121–14–2	0.32	140
U106	2,6–Dinitrotoluene	2,6–Dinitrotoluene	606–20–2	0.55	28
U107	Di–n–octyl phthalate	Di–n–octyl phthalate	117–84–0	0.017	28

U108	1,4–Dioxane	1,4–Dioxane	123–91–1	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
		1,4–Dioxane; alternate[6] standard for nonwastewaters only	123–91–1	NA	170
U109	1,2–Diphenylhydrazine	1,2–Diphenylhydrazine	122–66–7	CHOXD; CHRED; CARBN; BIODG; or CMBST	CHOXD; CHRED; or CMBST
		1,2–Diphenylhydrazine; alternate[6] standard for wastewaters only	122–66–7	0.087	NA
U110	Dipropylamine	Dipropylamine	142–84–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U111	Di–n–propylnitrosamine	Di–n–propylnitrosamine	621–64–7	0.40	14
U112	Ethyl acetate	Ethyl acetate	141–78–6	0.34	33
U113	Ethyl acrylate	Ethyl acrylate	140–88–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U114	Ethylenebisdithiocarbamic acid salts and esters	Ethylenebisdithiocarbamic acid	111–54–6	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U115	Ethylene oxide	Ethylene oxide	75–21–8	(WETOX or CHOXD) fb CARBN; or CMBST	CHOXD; or CMBST
		Ethylene oxide; alternate[6] standard for wastewaters only	75–21–8	0.12	NA
U116	Ethylene thiourea	Ethylene thiourea	96–45–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U117	Ethyl ether	Ethyl ether	60–29–7	0.12	160
U118	Ethyl methacrylate	Ethyl methacrylate	97–63–2	0.14	160
U119	Ethyl methane sulfonate	Ethyl methane sulfonate	62–50–0	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U120	Fluoranthene	Fluoranthene	206–44–0	0.068	3.4
U121	Trichloromonofluoromethane	Trichloromonofluoromethane	75–69–4	0.020	30
U122	Formaldehyde	Formaldehyde	50–00–0	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST

U123	Formic acid	Formic acid	64–18–6	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U124	Furan	Furan	110–00–9	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U125	Furfural	Furfural	98–01–1	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U126	Glycidylaldehyde	Glycidylaldehyde	765–34–4	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U127	Hexachlorobenzene	Hexachlorobenzene	118–74–1	0.055	10
U128	Hexachlorobutadiene	Hexachlorobutadiene	87–68–3	0.055	5.6
U129	Lindane	alpha–BHC	319–84–6	0.00014	0.066
		beta–BHC	319–85–7	0.00014	0.066
		delta–BHC	319–86–8	0.023	0.066
		gamma–BHC (Lindane)	58–89–9	0.0017	0.066
U130	Hexachlorocyclopentadiene	Hexachlorocyclopentadiene	77–47–4	0.057	2.4
U131	Hexachloroethane	Hexachloroethane	67–72–1	0.055	30
U132	Hexachlorophene	Hexachlorophene	70–30–4	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U133	Hydrazine	Hydrazine	302–01–2	CHOXD; CHRED; CARBN; BIODG; or CMBST	CHOXD; CHRED; or CMBST
U134	Hydrogen fluoride	Fluoride (measured in wastewaters only)	16964–48–8	35	ADGAS fb NEUTR; or NEUTR
U135	Hydrogen sulfide	Hydrogen sulfide	7783–06–4	CHOXD; CHRED; or CMBST	CHOXD; CHRED; or CMBST
U136	Cacodylic acid	Arsenic	7440–38–2	1.4	5.0 mg/l TCLP
U137	Indeno(1,2,3–cd)pyrene	Indeno(1,2,3–cd)pyrene	193–39–5	0.0055	3.4
U138	Iodomethane	Iodomethane	74–88–4	0.19	65
U140	Isobutyl alcohol	Isobutyl alcohol	78–83–1	5.6	170
U141	Isosafrole	Isosafrole	120–58–1	0.081	2.6
U142	Kepone	Kepone	143–50–8	0.0011	0.13
U143	Lasiocarpine	Lasiocarpine	303–34–4	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST

U144	Lead acetate	Lead	7439–92–1	0.69	0.37 mg/l TCLP
U145	Lead phosphate	Lead	7439–92–1	0.69	0.37 mg/l TCLP
U146	Lead subacetate	Lead	7439–92–1	0.69	0.37 mg/l TCLP
U147	Maleic anhydride	Maleic anhydride	108–31–6	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U148	Maleic hydrazide	Maleic hydrazide	123–33–1	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U149	Malononitrile	Malononitrile	109–77–3	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U150	Melphalan	Melphalan	148–82–3	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U151	U151 (mercury) nonwastewaters that contain greater than or equal to 260 mg/kg total mercury.	Mercury	7439–97–6	NA	RMERC
	U151 (mercury) nonwastewaters that contain less than 260 mg/kg total mercury and that are residues from RMERC only.	Mercury	7439–97–6	NA	0.20 mg/l TCLP
	U151 (mercury) nonwastewaters that contain less than 260 mg/kg total mercury and that are not residues from RMERC.	Mercury	7439–97–6	NA	0.025 mg/l TCLP
	All U151 (mercury) wastewaters.	Mercury	7439–97–6	0.15	NA
	Elemental Mercury Contaminated with Radioactive Materials	Mercury	7439–97–6	NA	AMLGM
U152	Methacrylonitrile	Methacrylonitrile	126–98–7	0.24	84
U153	Methanethiol	Methanethiol	74–93–1	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U154	Methanol	Methanol	67–56–1	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
		Methanol, alternate[6] set of standards for both wastewaters and nonwastewaters	67–56–1	5.6	0.75 mg/l TCLP
U155	Methapyrilene	Methapyrilene	91–80–5	0.081	1.5
U156	Methyl chlorocarbonate	Methyl chlorocarbonate	79–22–1	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U157	3–Methylcholanthrene	3–Methylcholanthrene	56–49–5	0.0055	15

U158	4,4'–Methylene bis(2–chloroaniline)	4,4'–Methylene bis(2–chloroaniline)	101–14–4	0.50	30
U159	Methyl ethyl ketone	Methyl ethyl ketone	78–93–3	0.28	36
U160	Methyl ethyl ketone peroxide	Methyl ethyl ketone peroxide	1338–23–4	CHOXD; CHRED; CARBN; BIODG; or CMBST	CHOXD; CHRED; or CMBST
U161	Methyl isobutyl ketone	Methyl isobutyl ketone	108–10–1	0.14	33
U162	Methyl methacrylate	Methyl methacrylate	80–62–6	0.14	160
U163	N–Methyl N'–nitro N–nitrosoguanidine	N–Methyl N'–nitro N–nitrosoguanidine	70–25–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U164	Methylthiouracil	Methylthiouracil	56–04–2	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U165	Naphthalene	Naphthalene	91–20–3	0.059	5.6
U166	1,4–Naphthoquinone	1,4–Naphthoquinone	130–15–4	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U167	1–Naphthlyamine	1–Naphthlyamine	134–32–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U168	2–Naphthlyamine	2–Naphthlyamine	91–59–8	0.52	CMBST
U169	Nitrobenzene	Nitrobenzene	98–95–3	0.068	14
U170	p–Nitrophenol	p–Nitrophenol	100–02–7	0.12	29
U171	2–Nitropropane	2–Nitropropane	79–46–9	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U172	N–Nitrosodi–n–butylamine	N–Nitrosodi–n–butylamine	924–16–3	0.40	17
U173	N–Nitrosodiethanolamine	N–Nitrosodiethanolamine	1116–54–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U174	N–Nitrosodiethylamine	N–Nitrosodiethylamine	55–18–5	0.40	28
U176	N–Nitroso–N–ethylurea	N–Nitroso–N–ethylurea	759–73–9	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U177	N–Nitroso–N–methylurea	N–Nitroso–N–methylurea	684–93–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST

U178	N–Nitroso–N–methylurethane	N–Nitroso–N–methylurethane	615–53–2	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U179	N–Nitrosopiperidine	N–Nitrosopiperidine	100–75–4	0.013	35
U180	N–Nitrosopyrrolidine	N–Nitrosopyrrolidine	930–55–2	0.013	35
U181	5–Nitro–o–toluidine	5–Nitro–o–toluidine	99–55–8	0.32	28
U182	Paraldehyde	Paraldehyde	123–63–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U183	Pentachlorobenzene	Pentachlorobenzene	608–93–5	0.055	10
U184	Pentachloroethane	Pentachloroethane	76–01–7	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
		Pentachloroethane; alternate[6] standards for both wastewaters and nonwastewaters	76–01–7	0.055	6.0
U185	Pentachloronitrobenzene	Pentachloronitrobenzene	82–68–8	0.055	4.8
U186	1,3–Pentadiene	1,3–Pentadiene	504–60–9	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U187	Phenacetin	Phenacetin	62–44–2	0.081	16
U188	Phenol	Phenol	108–95–2	0.039	6.2
U189	Phosphorus sulfide	Phosphorus sulfide	1314–80–3	CHOXD; CHRED; or CMBST	CHOXD; CHRED; or CMBST
U190	Phthalic anhydride (measured as Phthalic acid or Terephthalic acid)	Phthalic anhydride (measured as Phthalic acid or Terephthalic acid)	100–21–0	0.055	28
		Phthalic anhydride	85–44–9	0.055	28
U191	2–Picoline	2–Picoline	109–06–8	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U192	Pronamide	Pronamide	23950–58–5	0.093	1.5
U193	1,3–Propane sultone	1,3–Propane sultone	1120–71–4	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U194	n–Propylamine	n–Propylamine	107–10–8	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U196	Pyridine	Pyridine	110–86–1	0.014	16
U197	p–Benzoquinone	p–Benzoquinone	106–51–4	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST

U200	Reserpine	Reserpine	50–55–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U201	Resorcinol	Resorcinol	108–46–3	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U202	Saccharin and salts	Saccharin	81–07–2	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U203	Safrole	Safrole	94–59–7	0.081	22
U204	Selenium dioxide	Selenium	7782–49–2	0.82	0.16 mg/l TCLP
U205	Selenium sulfide	Selenium	7782–49–2	0.82	0.16 mg/l TCLP
U206	Streptozotocin	Streptozotocin	18883–66–4	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U207	1,2,4,5–Tetrachlorobenzene	1,2,4,5–Tetrachlorobenzene	95–94–3	0.055	14
U208	1,1,1,2–Tetrachloroethane	1,1,1,2–Tetrachloroethane	630–20–6	0.057	6.0
U209	1,1,2,2–Tetrachloroethane	1,1,2,2–Tetrachloroethane	79–34–5	0.057	6.0
U210	Tetrachloroethylene	Tetrachloroethylene	127–18–4	0.056	6.0
U211	Carbon tetrachloride	Carbon tetrachloride	56–23–5	0.057	6.0
U213	Tetrahydrofuran	Tetrahydrofuran	109–99–9	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U214	Thallium (I) acetate	Thallium (measured in wastewaters only)	7440–28–0	1.4	RTHRM; or STABL
U215	Thallium (I) carbonate	Thallium (measured in wastewaters only)	7440–28–0	1.4	RTHRM; or STABL
U216	Thallium (I) chloride	Thallium (measured in wastewaters only)	7440–28–0	1.4	RTHRM; or STABL
U217	Thallium (I) nitrate	Thallium (measured in wastewaters only)	7440–28–0	1.4	RTHRM; or STABL
U218	Thioacetamide	Thioacetamide	62–55–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U219	Thiourea	Thiourea	62–56–6	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U220	Toluene	Toluene	108–88–3	0.080	10
U221	Toluenediamine	Toluenediamine	25376–45–8	CARBN; or CMBST	CMBST

U222	o–Toluidine hydrochloride	o–Toluidine hydrochloride	636–21–5	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U223	Toluene diisocyanate	Toluene diisocyanate	26471–62–5	CARBN; or CMBST	CMBST
U225	Bromoform (Tribromomethane)	Bromoform (Tribromomethane)	75–25–2	0.63	15
U226	1,1,1–Trichloroethane	1,1,1–Trichloroethane	71–55–6	0.054	6.0
U227	1,1,2–Trichloroethane	1,1,2–Trichloroethane	79–00–5	0.054	6.0
U228	Trichloroethylene	Trichloroethylene	79–01–6	0.054	6.0
U234	1,3,5–Trinitrobenzene	1,3,5–Trinitrobenzene	99–35–4	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U235	tris–(2,3–Dibromopropyl)–phospha te	tris–(2,3–Dibromopropyl)–pho sphate	126–72–7	0.11	0.10
U236	Trypan Blue	Trypan Blue	72–57–1	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U237	Uracil mustard	Uracil mustard	66–75–1	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U238	Urethane (Ethyl carbamate)	Urethane (Ethyl carbamate)	51–79–6	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U239	Xylenes	Xylenes–mixed isomers (sum of o–, m–, and p–xylene concentrations)	1330–20–7	0.32	30
U240	2,4–D (2,4–Dichlorophenoxyacetic acid)	2,4–D (2,4–Dichlorophenoxyacetic acid)	94–75–7	0.72	10
	2,4–D (2,4–Dichlorophenoxyacetic acid) salts and esters	NA	NA	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U243	Hexachloropropylene	Hexachloropropylene	1888–71–7	0.035	30
U244	Thiram	Thiram	137–26–8	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST
U246	Cyanogen bromide	Cyanogen bromide	506–68–3	CHOXD; WETOX; or CMBST	CHOXD; WETOX; or CMBST
U247	Methoxychlor	Methoxychlor	72–43–5	0.25	0.18
U248	Warfarin, & salts, when present at concentrations of 0.3% or less.	Warfarin	81–81–2	(WETOX or CHOXD) fb CARBN; or CMBST	CMBST

U249	Zinc phosphide, Zn_3P_2, when present at concentrations of 10% or less.	Zinc phosphide	1314–84–7	CHOXD; CHRED; or CMBST	CHOXD; CHRED; or CMBST
U271	Benomyl [9]	Benomyl	17804–35–2	0.056	1.4
U278	Bendiocarb [9]	Bendiocarb	22781–23–3	0.056	1.4
U279	Carbaryl [9]	Carbaryl	63–25–2	0.006	0.14
U280	Barban [9]	Barban	101–27–9	0.056	1.4
U328	o–Toluidine	o–Toluidine	95–53–4	CMBST; or CHOXD fb (BIODG or CARBN); or BIODG fb CARBN	CMBST
U353	p–Toluidine	p–Toluidine	106–49–0	CMBST; or CHOXD fb (BIODG or CARBN); or BIODG fb CARBN	CMBST
U359	2–Ethoxyethanol	2–Ethoxyethanol	110–80–5	CMBST; or CHOXD fb (BIODG or CARBN); or BIODG fb CARBN	CMBST
U364	Bendiocarb phenol [9]	Bendiocarb phenol	22961-82-6	0.056	1.4
U367	Carbofuran phenol [9]	Carbofuran phenol	1563–38–8	0.056	1.4
U372	Carbendazim [9]	Carbendazim	10605-21-7	0.056	1.4
U373	Propham [9]	Propham	122–42–9	0.056	1.4
U387	Prosulfocarb [9]	Prosulfocarb	52888–80–9	0.042	1.4
U389	Triallate [9]	Triallate	2303–17–5	0.042	1.4
U394	A2213 [9]	A2213	30558–43–1	0.042	1.4
U395	Diethylene glycol, dicarbamate [9]	Diethylene glycol, dicarbamate	5952–26–1	0.056	1.4
U404	Triethylamine [9]	Triethylamine	101–44–8	0.081	1.5
U409	Thiophanate–methyl [9]	Thiophanate–methyl	23564–05–8	0.056	1.4
U410	Thiodicarb [9]	Thiodicarb	59669–26–0	0.019	1.4
U411	Propoxur [9]	Propoxur	114–26–1	0.056	1.4

NA means not applicable

Notes to Table:

1 The waste descriptions provided in this table do not replace waste descriptions in ch. NR 605. Descriptions of Treatment/Regulatory Subcategories are provided, as needed, to distinguish between applicability of different standards.

2 CAS means Chemical Abstract Services. When the waste code and/or regulated constituents are described as a combination of a chemical with its salts and/or esters, the CAS number is given for the parent compound only.

3 Concentration standards for wastewaters are expressed in mg/l and are based on analysis of composite samples.

4 All treatment standards expressed as a Technology Code or combination of Technology Codes are explained in detail in s. NR 675.22 Table 1––Technology Codes and Descriptions of Technology–Based Standards.

5 Except for Metals (EP or TCLP) and Cyanides (Total and Amenable) the nonwastewater treatment standards expressed as a concentration were established, in part, based upon incineration in units operated in accordance with the technical requirements of ch. NR 665, or based upon combustion in fuel substitution units operating in accordance with applicable technical requirements. A facility may comply with these treatment standards according to provisions in s. NR 675.20 (4). All concentration standards for nonwastewaters are based on analysis of grab samples.

6 Where an alternate treatment standard or set of alternate standards has been indicated, a facility may comply with this alternate standard, but only for the Treatment/Regulatory Subcategory or physical form (i.e., wastewater and/or nonwastewater) specified for that alternate standard.

7 Both Cyanides (Total) and Cyanides (Amenable) for nonwastewaters are to be analyzed using Method 9010 or 9012, found in "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods", EPA Publication SW–846, as incorporated by reference in s. NR 600.10 (2) (b) 1. and (c), with a sample size of 10 grams and a distillation time of one hour and 15 minutes.

8 These wastes, when rendered nonhazardous and then subsequently managed in systems subject to ch. 283, Stats., are not subject to treatment standards.

9 Between August 26, 1996 and August 27, 1997, the treatment standard for this waste may be satisfied by either meeting the constituent concentrations in this table or by treating the waste by the specified technologies: combustion, as defined by the technology code CMBST at s. NR 675.22 Table 1, for nonwastewaters; and biodegradation as defined by the technology code BIODG, carbon adsorption as defined by the technology code CARBN, chemical oxidation as defined by the

technology code CHOXD, or combustion as defined as technology code CMBST at s. NR 675.22 Table 1, for wastewaters.

History: Cr. Register, February, 1991, No. 422, eff. 3–1–91; am. (1) and (3), Register, August, 1992, No. 440, eff. 9–1–92; am. (1), Register, May, 1995, No. 473, eff. 6–1–95**; r. and recr. Register, May, 1998, No. 509, eff. 6–1–98.**.

NR 675.21 Treatment standards expressed as concentrations in waste extract.

Note: For the requirements and for treatment standards in Table CCWE–Constituent Concentrations in Waste Extracts, both of which were found in this section until June 1, 1998 refer to s. NR 675.20.

History: Cr. Register, February, 1991, No. 422, eff. 3–1–91; am. (1), r. and recr. Table CCWE, Register, August, 1992, No. 440, eff. 9–1–92; am. (1), table 1, (2), cr. (3), Register, May, 1995, No. 473, eff. 6–1–95**; r. and recr. Register, May, 1998, No. 509, eff. 6–1–98.**

NR 675.22 Treatment standards expressed as specified technologies.

(1) The following wastes in pars. (a) and (b) and in the table in s. NR 675.20 "Treatment Standards for Hazardous Wastes," for which standards are expressed as a treatment method rather than a concentration level, shall be treated using the identified technology or technologies in pars. (a) and (b) and table 1.

Note: For the requirements found in this section until June 1, 1998 in Table 2–Technology–Based Standards By RCRA Waste Code, and Table 3–Technology–Based Standards for Specific Radioactive Hazardous Mixed Waste, refer to s. NR 675.20.

(a) Liquid hazardous wastes containing polychlorinated biphenyls (PCBs) at concentrations greater than or equal to 50 ppm shall be incinerated in accordance with the technical requirements of s. NR 157.07. Thermal treatment under this section shall also be in compliance with applicable regulations in chs. NR 625 and 665.

(b) Nonliquid hazardous wastes containing halogenated organic compounds (HOCs) in total concentration greater than or equal to 1,000 mg/kg and liquid HOC–containing wastes that are prohibited under s. NR 675.13 (1) (d) shall be incinerated in accordance with the requirements of ch. NR 665. These treatment standards do not apply where the waste is subject to a ch. NR 675 treatment standard for a specific HOC, such as a hazardous waste chlorinated solvent for which a treatment standard is established under s. NR 675.21 (1).

(c) A mixture consisting of wastewater, the discharge of which is subject to regulation under either section 402 or section 307 (b) of the clean water act, and de minimis losses of materials from manufacturing operations in which these materials are used as raw materials or are produced as products in the manufacturing process, and that meet the criteria of the D001 ignitable liquids containing greater than 10% total organic constituents (TOC) subcategory, is subject to the DEACT treatment standard described in table 1. For purposes of this paragraph, de minimis losses include those from normal material handling operations such as spills from the unloading or transfer of materials from bins or other containers, leaks from pipes, valves or other devices used to transfer materials; minor leaks from process equipment, storage tanks or containers; leaks from well maintained pump packings and seals; sample purgings; and relief device discharges.

Table 1.–Technology Codes and Description of Technology–Based Standards

Technology code	Description of technology–based standards
ADGAS:	Venting of compressed gases into an absorbing or reacting media (i.e., solid or liquid)–venting can be accomplished through physical release utilizing valves/piping; physical penetration of the container; and/or penetration through detonation.
AMLGM:	Amalgamation of liquid, elemental mercury contaminated with radioactive materials utilizing inorganic reagents such as copper, zinc, nickel, gold, and sulfur that result in a nonliquid, semi–solid amalgam and thereby reducing potential emissions of elemental mercury vapors to the air.
BIODG:	Biodegradation of organics or non–metallic inorganics (i.e., degradable inorganics that contain the elements of phosphorus, nitrogen, and sulfur) in units operated under either aerobic or anaerobic conditions such that a surrogate compound or indicator parameter has been substantially reduced in concentration in the residuals (e.g., Total Organic Carbon can often be used as an indicator parameter for the biodegradation of many organic constituents that cannot be directly analyzed in wastewater residues).
CARBN:	Carbon adsorption (granulated or powdered) of non–metallic inorganics, organo–metallics, and/or organic constituents, operated such that a surrogate compound or indicator parameter has not undergone breakthrough (e.g., Total Organic Carbon can often be used as an indicator parameter for the adsorption of many organic constituents that cannot be directly analyzed in wastewater residues). Breakthrough occurs when the carbon has become saturated with the constituent (or indicator parameter) and substantial change in adsorption rate associated with that constituent occurs.
CHOXD:	Chemical or electrolytic oxidation utilizing the following oxidation reagents (or waste reagents) or combinations of reagents: (1) Hypochlorite (e.g. bleach); (2) chlorine; (3) chlorine dioxide; (4) ozone or UV (ultraviolet light) assisted ozone; (5) peroxides; (6) persulfates; (7) perchlorates; (8) permanganates; and/or (9) other oxidizing reagents of equivalent efficiency, performed in units operated such that a surrogate compound or indicator parameter has been substantially reduced in concentration in the residuals (e.g., Total Organic Carbon can often be used as an indicator parameter for the oxidation of many organic constituents that cannot be directly analyzed in wastewater residues). Chemical oxidation specifically includes what is commonly referred to as alkaline chlorination.
CHRED:	Chemical reduction utilizing the following reducing reagents (or waste reagents) or combinations of reagents: (1) Sulfur dioxide; (2) sodium, potassium, or alkali salts or sulfites, bisulfites, metabisulfites, and polyethyleneglycols (e.g., NaPEG and KPEG); (3) sodium hydrosulfide; (4) ferrous salts; and/or (5) other reducing reagents of equivalent efficiency, performed in units operated such that a surrogate compound or indicator parameter has been substantially reduced in concentration in the residuals (e.g., Total Organic Halogens can often be used as an indicator parameter for the reduction of many halogenated organic constituents that cannot be directly analyzed in wastewater residues). Chemical reduction is commonly used for the reduction of hexavalent chromium to the trivalent state.
CMBST:	High temperature organic destruction technologies, such as combustion in incinerators, boilers, or industrial furnaces operated in accordance with the applicable requirements of ch. NR 665 or 40 CFR part 266, subpart H, and in other units operated in accordance with applicable technical operating requirements; and certain non–combustive technologies, such as the Catalytic Extraction Process.
DEACT:	Deactivation to remove the hazardous characteristics of a waste due to is ignitability, corrosivity, and/or reactivity.
FSUBS:	Fuel substitution in units operated in accordance with applicable technical operating requirements.
HLVIT:	Vitrification of high level mixed radio active wastes in units in compliance with all applicable radioactive protection requirements under control of the Nuclear Regulatory Commission.
IMERC:	Incineration of wastes containing organics and mercury in units operated in accordance with the technical operating requirements of ch. NR 665. All wastewater and nonwastewater residues derived from this process must then comply with the corresponding treatment standards per waste-code with consideration of any applicable subcategories (e.g., High or Low Mercury Subcategories).
INCIN:	Incineration in units operated in accordance with the technical operating requirements of ch. NR 665.
LLEXT:	Liquid–liquid extraction (often referred to as solvent extraction) of organics from liquid wastes into an immiscible solvent for which the hazardous constituents have a greater solvent affinity, resulting in an extract high in organics that must undergo either incineration, reuse as a fuel, or other recovery/reuse and a raffinate (extracted liquid waste) proportionately low in organics that must undergo further treatment as specified in the standard.

MACRO:	Macroencapsulation with surface coating materials such as polymeric organics (e.g. resins and plastics) or with a jacket of inert inorganic materials to substantially reduce surface exposure to potential leaching media. Macroencapsulation specifically does not include any material that would be classified as a tank or container according to s. NR 600.03.
NEUTR:	Neutralization with the following reagents (or waste reagents) or combinations of reagents: (1) Acids; (2) bases; (3) water (including wastewaters) resulting in a pH greater than 2 but less than 12. 5 as measured in the aqueous residuals.
NLDBR:	No land disposal based on recycling.
PRECP:	Chemical precipitation of metals and other in organics as insoluble precipitates of oxides, hydroxides, carbonates, sulfides, sulfates, chlorides, fluorides, or phosphates. The following reagents (or waste reagents) are typically used alone or in combination: (1) Lime (i.e., containing oxide-sand/or hydroxides of calcium and/or magnesium; (2) caustic (i.e., sodium and/or potassium hydroxides; (3) soda ash (i.e., sodium carbonate);(4) sodium sulfide; (5) ferric sulfate or ferric chloride; (6) alum; or (7) sodium sulfate. Additional flocculating, coagulation or similar reagents/processes that enhance sludge dewatering characteristics are not precluded from use.
RBERY:	Thermal recovery of Beryllium.
RCGAS:	Recovery/reuse of compressed gases including techniques such as reprocessing of the gases for reuse/resale; filtering/adsorption of impurities; remixing for direct reuse or resale; and use of the gas as a fuel source.
RCORR:	Recovery of acids or bases utilizing one or more of the following recovery technologies: (1) Distillation (i.e., thermal concentration); (2) ion exchange; (3) resin or solid adsorption; (4) reverse osmosis; and/or (5) incineration for the recovery of acid. Note: this does not preclude the use of other physical phase separation or concentration techniques such as decantation, filtration (including ultrafiltration), and centrifugation, when use in conjunction with the above listed recovery technologies.
RLEAD:	Thermal recovery of lead in secondary lead smelters.
RMERC:	Retorting or roasting in a thermal processing unit capable of volatilizing mercury and subsequently condensing the volatilized mercury for recovery. The retorting or roasting unit (or facility) must be subject to one or more of the following: (a) a National Emissions Standard for Hazardous Air Pollutants (NESHAP) for mercury; (b) a Best Available Control Technology (BACT) or a Lowest Achievable Emission Rate (LAER) standard for mercury imposed pursuant to a Prevention of Significant Deterioration (PSD) permit; or (c) a state permit that establishes emission limitations (within meaning of section 302 of the Clean Air Act) for mercury. All wastewater and nonwastewater residues derived from this process must then comply with the corresponding treatment standards per waste code with consideration of any applicable subcategories (e.g., High or Low Mercury Subcategories).
REMTL:	Recovery of metals or inorganics utilizing one or more of the following direct physical/removal technologies: (1) Ion exchange; (2) resin or solid (i.e., zeolites) adsorption; (3) reverse osmosis; (4) chelation/solvent extraction; (5) freeze crystallization; (6) ultrafiltration and/or (7) simple precipitation (i.e., crystallization) – Note: This does not preclude the use of other physical phase separation or concentration techniques such as decantation, filtration (including ultrafiltration), and centrifugation, when used in conjunction with the above listed recovery technologies.
RORGS:	Recovery of organics utilizing one or more of the following technologies: (1) Distillation; (2) thin film evaporation; (3) steam stripping;(4) carbon adsorption; (5) critical fluid extraction; (6) Liquid– liquid extraction; (7) precipitation/crystallization (including freeze crystallization); or (8) chemical phase separation techniques (i.e., addition of acids, bases, demulsifiers, or similar chemicals); – Note: this does not preclude the use of other physical phase separation techniques such as a decantation, filtration (including ultrafiltration), and centrifugation, when used in conjunction with the above listed recovery technologies.
RTHRM:	Thermal recovery of metals or inorganics from nonwastewaters in units identified as industrial furnaces according to s. NR 600.03.
RZINC:	Resmelting in high temperature metal recovery units for the purpose of recovery of zinc.
STABL:	Stabilization with the following reagents (or waste reagents) or combinations of reagents: (1) Portland cement; or (2) lime/pozzolans (e.g.,fly ash and cement kiln dust) – this does not preclude the addition of reagents (e.g., iron salts, silicates, and clays) designed to enhance the set/cure-time and/or compressive strength, or to overall reduce the leachability of the metal or inorganic.
SSTRP:	Steam stripping of organics from liquid wastes utilizing direct application of steam to the wastes operated such that liquid and vapor flow rates, as well as, temperature and pressure ranges have been optimized, monitored, and maintained. These operating parameters are dependent upon the design parameters of the unit such as, the number of separation stages andthe internal column design. Thus, resulting in a condensed extract high inorganics that must undergo either incineration, reuse as a fuel, or other recovery/reuse and an extracted wastewater that must undergo further treatment as specified in the standard.
WETOX:	Wet air oxidation performed in units operated such that a surrogate compound or indicator parameter has been substantially reduced in concentration in the residuals (e.g., Total Organic Carbon can often be used as an indicator parameter for the oxidation of many organic constituents that cannot be directly analyzed in wastewater residues).
WTRRX:	Controlled reaction with water for highly reactive inorganicor organic chemicals with precautionary controls for protection of workers from potential violent reactions as well as precautionary controls for potential emissions of toxic/ignitable levels of gases released during the reaction.

Note 1: When a combination of these technologies (i.e., a treatment train) is specified as a single treatment standard, the order of application is specified in NR 675.22 table 2 by indicating the five letter technology code that must be applied first, then the designation "fb." (an abbreviation for "followed by"), then the five letter technology code for the technology that must be applied next, and so on.

Note 2: When more than one technology (or treatment train) are specified as alternative treatment standards, the five letter technology codes (or the treatment trains) are separated by a semicolon (;) with the last technology preceded by the word "OR". This indicates that any one of these BDAT technologies or treatment trains can be used for compliance with the standard.

(2) (a) Any person may submit an application to EPA demonstrating that an alternative treatment method can achieve a level of performance equivalent to that achieved by methods specified in subs. (1), (4) and (5) for wastes or specified in Table 1 of s. NR 675.25 for hazardous debris. The applicant shall submit information demonstrating that the treatment method will not present an unreasonable risk to human health or the environment and is in compliance with federal, state and local requirements. On the basis of the information and any other available information, EPA may approve the use of the alternative treatment method if it finds that the alternative treatment method provides a level of performance equivalent to that achieved by methods specified in subs. (1), (4) and (5) for wastes or specified in Table 1 of s. NR 675.25 for hazardous debris. Any approval shall be stated in writing and may contain the provisions and conditions as EPA deems appropriate. The person to whom the certification is issued shall comply with all limitations contained in the determination.

(b) If EPA denies an application for an alternative treatment method under par. (a), the department shall recognize that denial.

(c) Persons who have had their applications for an alternative treatment method approved by EPA under par. (a) shall continue to use the treatment method specified in sub. (1) until the department recognizes EPA's approval of an alternative treatment method except when waste is being treated in another state and the person complies with that state's requirements. A person may petition the department to recognize an EPA alternative treatment method by submitting the following to the department:

1. Copies of all materials and information submitted to EPA concerning the alternative treatment method;

2. Copies of all materials and information received from EPA, including the EPA notice of approval, concerning the alternative treatment method;

3. All other information that the department determines is necessary to evaluate the request for an alternative treatment method.

(d) When determining whether to recognize an EPA−approved alternative treatment method, the department shall:

1. Consider all available information including but not limited to the information submitted by the applicant to EPA; and

2. Apply the same criteria as applied by EPA under par. (a).

(e) The department shall recognize the EPA−approved alternative treatment method unless the department clearly establishes that the alternative treatment method would threaten human health or the environment.

(3) Approval by EPA and the department of an alternative treatment method under sub. (2) shall allow a facility to dispose on land prohibited waste under this chapter.

(4) As an alternative to the otherwise applicable treatment standards in ss. NR 675.20 to 675.24, lab packs are eligible for land disposal provided the following requirements are met:

(a) The lab packs comply with the applicable provisions of s. NR 660.18 (9) (c);

(b) The lab pack does not contain any of the wastes listed in Appendix III;

(c) The lab packs are incinerated in accordance with the requirements of ch. NR 665; and

(d) Any incinerator residues from lab packs containing D004, D005, D006, D007, D008, D010 and D011 are treated in compliance with the applicable treatment standards for such wastes in ss. NR 675.20 to 675.24.

(5) Radioactive hazardous mixed wastes are subject to the treatment standards in s. NR 675.20. Where treatment standards are specified for radioactive mixed wastes in the table "Treatment Standards for Hazardous Wastes," those treatment standards will govern. Where there is no specific treatment standard for radioactive mixed waste, the treatment standard for the hazardous waste, as designated by waste code, applies. Hazardous debris containing radioactive waste is subject to the treatment standards specified in s. NR 675.25.

History: Cr. Register, February, 1991, No. 422, eff. 3−1−91; am. (1) (intro)., (b) and (2) (a), cr. (4), (5) and Tables 1 to 3, r. (1) (d), r. and recr. (1) (c), Register, August, 1992, No. 440, eff. 9−1−92; am. (1) (c), (1) (b) Table 1, Table 2, (2) (a), (c), (5), Register, May, 1995, No. 473, eff. 6−1−95**; am. (1), (4) (b) and (5), cr. Table 1 entry, repeal Table 2 and 3, Register, May, 1998, No. 509, eff. 6−1−98.**

NR 675.23 Treatment standards expressed as waste concentrations.

For the requirements and for treatment standards in Table CCW−Constituent Concentrations in Wastes, both of which were found in this section until June 1, 1998 refer to s. NR 675.20.

History: Cr. Register, February, 1991, No. 422, eff. 3−1−91; am. (1), cr. (3), r. and recr. (1) Table CCW, Register, August, 1992, No. 440, eff. 9−1−92; r. and recr. Table, Register, May, 1995, No. 473, eff. 6−1−95**; r. and recr. Register, May, 1998, No. 509, eff. 6−1−98.**

NR 675.24 Variance from a treatment standard. (1)

(a) Where the treatment standard is expressed as a concentration in a waste or waste extract and a waste cannot be treated to the specified level, or where the treatment technology is not appropriate to the waste, the generator or treatment facility may petition EPA for a variance from the treatment standard under 40 CFR 268.44, July 1, 1996. The petitioner shall demonstrate that because the physical or chemical properties of the waste differ significantly from wastes analyzed in developing the treatment standard, the waste cannot be treated to specified levels or by the specified methods. The petitioner may also demonstrate that it is treating underlying hazardous constituents in characteristically hazardous wastewaters by sending the waste to a properly designed and operated BAT/PSES system, which may not be achieving the treatment standards found in s. NR 675.28.

(b) If EPA denies the petition for a variance under 40 CFR 268.44, July 1, 1993, the department shall recognize that denial.

(c) Generators or owners or operators of treatment facilities who have had their petitions for a variance approved by EPA under 40 CFR 268.44, July 1, 1993, shall continue to treat their wastes in compliance with ss. NR 675.20 to 675.23 until the department recognizes EPA's approval of an alternative treatment method except when waste is being treated in another state and the person complies with that state's requirements. Generators or owners or operators of treatment facilities may petition the department to recognize an EPA variance by submitting the following to the department:

1. Copies of all materials and information submitted to EPA concerning the variance under 40 CFR 268.44, July 1, 1993.

2. Copies of all material and information received from EPA, including the EPA notice of approval, concerning the variance under 40 CFR 268.44, July 1, 1993.

3. All other information that the department determines is necessary to evaluate the request for a variance.

(d) When determining whether to recognize an EPA granted variance under 40 CFR 268.44, July 1, 1993, the department shall:

1. Consider all available information including, but not limited to, the information submitted by the applicant to EPA; and

2. Apply the same criteria as applied by EPA under 40 CFR 268.44, July 1, 1993.

(e) The department shall recognize an EPA granted variance unless the department clearly establishes that the variance would threaten human health and the environment.

(2) During the petition review process, the applicant shall comply with all restrictions on land disposal under this chapter.

(3) Approval by EPA and the department of a variance from a treatment standard under sub. (1) shall allow a facility to land dispose of prohibited waste under this chapter.

History: Cr. Register, February, 1991, No. 422, eff. 3−1−91; am. (1), Register, August, 1992, No. 440, eff. 9−1−92; am. (1) (a), (b), (c) (intro.), 1., 2., (d) (intro.), 2., Register, May, 1995, No. 473, eff. 6−1−95**; am. (1) (a), Register, May, 1998, No. 509, eff. 6−1−98.**

NR 675.25 Treatment standards for hazardous debris. (1) TREATMENT STANDARDS.

Hazardous debris shall be treated prior to land disposal as follows unless the department determines under s. NR 605.04 (4) (b) that the debris is no longer contaminated with hazardous waste or the debris is treated to the waste−specific treatment standard provided in this chapter for the waste contaminating the debris:

(a) *General.* Hazardous debris shall be treated for each"contaminant subject to treatment" defined by sub. (2) using the technology or technologies identified in Table 1 of this section.

(b) *Characteristic debris.* Hazardous debris that exhibits the characteristic of ignitability, corrosivity or reactivity identified under s. NR 605.08 (2) to (4) shall be deactivated by treatment using one of the technologies identified in Table 1 of this section.

(c) *Mixtures of debris types.* The treatment standards of Table 1 in this section shall be achieved for each type of debris contained in a mixture of debris types. If an immobilization technology is used in a treatment train, it shall be the last treatment technology used.

(d) *Mixtures of contaminant types.* Debris that is contaminated with 2 or more contaminants subject to treatment identified under sub. (2) shall be treated for each contaminant using one or more treatment technologies identified in Table 1 of this section. If an immobilization technology is used in a treatment train, it shall be the last treatment technology used.

(e) *Waste PCBs.* Hazardous debris that is also a waste PCB under ch. NR 157 is subject to the requirements of either ch. NR 157 or this section, whichever are more stringent.

(2) CONTAMINANTS SUBJECT TO TREATMENT. Hazardous debris shall be treated for each "contaminant subject to treatment." The contaminants subject to treatment shall be determined as follows:

(a) *Toxicity characteristic debris.* The contaminants subject to treatment for debris that exhibits the Toxicity Characteristic exhibits the TC toxicity characteristic.

(b) *Debris contaminated with listed waste.* The contaminants subject to treatment for debris that is contaminated with a prohibited listed hazardous waste are those constituents or wastes for which treatment standards are established for the waste under s. NR 675.20.

(c) *Cyanide reactive debris.* Hazardous debris that is reactive because of cyanide shall be treated for cyanide.

(3) CONDITIONED EXCLUSION OF TREATED DEBRIS. Hazardous debris that has been treated using one of the specified extraction or destruction technologies in Table 1 of this section and that does not exhibit a characteristic of hazardous waste identified in s. NR 605.08 after treatment is not a hazardous waste and need not be managed in a hazardous waste facility. Hazardous debris contaminated with a listed waste that is treated by an immobilization technology specified in Table 1 is a hazardous waste and shall be managed in a hazardous waste facility.

(4) TREATMENT RESIDUALS. (a) *General requirements.* Except as provided by pars. (b) and (d):

1. Residue from the treatment of hazardous debris shall be separated from the treated debris using simple physical or mechanical means; and

2. Residue from the treatment of hazardous debris is subject to the waste–specific treatment standards provided by ss. NR 675.20 to 675.24 for the waste contaminating the debris.

(b) *Nontoxic debris.* Residue from the deactivation of ignitable, corrosive or reactive characteristic hazardous debris that is not cyanide–reactive and that is not contaminated with a contaminant subject to treatment defined by sub. (2) shall be deactivated prior to land disposal and is not subject to the waste–specific treatment standards of ss. NR 675.20 to 675.24.

(c) *Cyanide–reactive debris.* Residue from the treatment of debris that is reactive because of cyanide shall meet the standards for D003 under s. NR 675.23.

(d) *Ignitable nonwastewater residue.* Ignitable nonwastewater residue containing equal to or greater than 10% total organic carbon is subject to the technology–based standards for D001: "Ignitable Liquids Based on s. NR 605.08 (2) (a) 1." under s. NR 675.22.

(e) *Residue from spalling.* Layers of debris removed by spalling are hazardous debris that remain subject to the treatment standards of this section.

Table 1.–Alternative Treatment Standards For Hazardous Debris[1]

Technology description	Performance and/or design and operating standard	Contaminant restrictions[2]
A. Extraction Technologies:		
1. Physical Extraction		
a. Abrasive Blasting: Removal of contaminated debris surface layers using water or air pressure to propel a solid media, such as steel shot, aluminum oxide grit, plastic beads.	Glass, Metal, Plastic, Rubber: Treatment to a clean debris surface. [3]Brick, Cloth, Concrete, Paper, Pavement, Rock, Wood: Removal of at least 0.6 cm of the surface layer; treatment to a clean debris surface.[3]	All Debris: None.
b. Scarification, Grinding, and Planing: Process utilizing striking piston heads, saws, or rotating grinding wheels such that contaminated debris surface layers are removed.	Same as above	Same as above
c. Spalling: Drilling or chipping holes at appropriate locations and depth in the contaminated debris surface and applying a tool which exerts a force on the sides of those holes such that the surface layer is removed. The surface layer removed remains hazardous debris subject to the debris treatment standards.	Same as above	Same as above
d. Vibratory Finishing: Process utilizing scrubbing media, flushing fluid, and oscillating energy such that hazardous contaminants or contaminated debris surface layers are removed.[4]	Same as above	Same as above
e. High Pressure Steam and Water Sprays: Application of water or steam sprays of sufficient temperature, pressure, residence time, agitation, surfactants, and detergents to remove hazardous contaminants from debris surfaces or to remove contaminated debris surface layers	Same as above	Same as above.
2. Chemical Extraction		
a. Water Washing and Spraying: Application of water sprays or water baths of sufficient temperature, pressure, residence time, agitation, surfactants, acids, bases, and detergents to remove hazardous contaminants from debris surfaces and surface pores or to remove contaminated debris surface layers.	All Debris: Treatment to a clean debris surface[3]; Brick, Cloth, Concrete, Paper, Pavement, Rock, Wood: The thickness of the debris shall be limited to no more than 1.2 cm (1/2 inch) in one dimension[5], except that this thickness limit may be waived under an "Equivalent Technology" approval under s. NR 675.22 (2); debris surfaces shall be in contact with water solution for at least 15 minutes	Brick, Cloth, Concrete, Paper, Pavement, Rock, Wood: Contaminant shall be soluble to at least 5% by weight in water solution or 5% by weight in emulsion; if debris is contaminated with a dioxin–listed waste,[6] an "Equivalent Technology" approval under s. NR 675.22 (2) shall be obtained.[8]

b. Liquid Phase Solvent Extraction: Removal of hazardous contaminants from debris surfaces and surface pores by applying a nonaqueous liquid or liquid solution which causes the hazardous contaminants to enter the liquid phase and be flushed away from the debris along with the liquid or liquid solution while using appropriate agitation, temperature, and residence time.[4]	Same as above	Brick, Cloth, Concrete, Paper, Pavement, Rock, Wood: Same as above, except that contaminant shall be soluble to at least 5% by weight in the solvent.
c. Vapor Phase Solvent Extraction: Application of an organic vapor using sufficient agitation, residence time, and temperature to cause hazardous contaminants on contaminated debris surfaces and surface pores to enter the vapor phase and be flushed away with the organic vapor.[4]	Same as above, except that brick, cloth, concrete, paper, pavement, rock and wood surfaces shall be in contact with the organic vapor for at least 60 minutes.	Same as above.
3. Thermal Extractiona. High Temperature Metals Recovery: Application of sufficient heat, residence time, mixing, fluxing agents or carbon in a smelting, melting, or refining furnace to separate metals from debris.	For refining furnaces, treated debris shall be separated from treatment residuals using simple physical or mechanical means[9], and, prior to further treatment, such residuals shall meet the waste–specific treatment standards for organic compounds in the waste contaminating the debris.	Debris contaminated with a dioxin–listed waste:[5] Obtain an "Equivalent Technology" approval under s. NR 675.22 (2).[8]
b. Thermal Desorption: Heating in an enclosed chamber under either oxidizing or nonoxidizing atmospheres at sufficient temperature and residence time to vaporize hazardous contaminants from contaminated surfaces and surface pores and to remove thecontaminants from the heating chamber in a gaseous exhaust gas.[7]	All Debris: Obtain an Equivalent Technology approval under s.NR 675.22 (2)[8]; treated debris shall be separated from treatment residuals using simple physical or mechanical means, and, prior to further treatment, such residue shall meet the waste–specific treatment standards for organic compounds in the waste contaminating the debris. Brick, Cloth, Concrete, Paper, Pavement, Rock, Wood: The thickness of the debris shall be limited to no more than 10 cm (4 inches) in one dimension[5], except that this thickness limit may be waived under the Equivalent Technology approval.	All Debris: Metals other than mercury.
B. Destruction Technologies:		
1. Biological Destruction (Biodegradation): Removal of hazardous contaminants from debris surfaces and surface pores in an aqueous solution and biodegration of organic or nonmetallic inorganic compounds, such as inorganics that contain phosphorus, nitrogen, or sulfur, in units operated under either aerobic or anaerobic conditions.	All Debris: Obtain an "Equivalent Technology" approval under s. NR 675.22 (2)8; treated debris shall be separated from treatment residuals using simple physical or mechanical means[9], and, prior to further treatment, such residue shall meet the waste–specific treatment standards for organic compounds in the waste contaminating the debris. Brick, Cloth, Concrete, Paper, Pavement, Rock, Wood: The thickness of the debris shall be limited to no more than 1.2 cm (1/2 inch) in one dimension[5], except that this thickness limit may be waived under the Equivalent Technology approval	All Debris: Metal contaminants.
2. Chemical Destruction		
a. Chemical Oxidation: Chemical or electrolytic oxidation utilizing the following oxidation reagents, waste reagents or combination of reagents (1) hypochlorite (e.g., bleach); (2) chlorine; (3) chlorine dioxide; (4) ozone or UV (ultraviolet light) assisted ozone; (5) peroxides; (6) persulfates; (7) perchlorates; (8) permanganates;or (9) other oxidizing reagents of equivalent destruction efficiency. Chemical oxidation specifically includes what is referred to as alkaline chlorination.	All Debris: Obtain an "Equivalent Technology" approval under s. NR 675.22 (2); [8] treated debris shall be separated from treatment residuals using simple physical or mechanical means,[9] and, prior to further treatment, such residue shall meet the waste–specific treatment standards for organic compounds in the waste contaminating the debris. Brick, Cloth, Concrete, Paper, Pavement, Rock, Wood: The thickness of this debris shall be limited to no more than 1.2 cm (1/2 inch) in one dimension,[5] except that this thickness limit may be waived under the "Equivalent Technology" approval	All Debris: Metal contaminants.
b. Chemical Reduction: Chemical reaction utilizing the following reducing reagents, waste reagents or combination of reagents: (1) sulfur dioxide; (2) sodium, potassium, or alkali salts of sulfites, bisulfites, and metabisulfites, and polyethylene glycols (e.g., NaPEG and KPEG); (3) sodium hydrosulfide; (4) ferrous salts; or (5) other reducing reagents of equivalent efficiency.[4]	Same as above	Same as above.
3. Thermal Destruction: Treatment in an incinerator operating in accordance with ch. NR 665; a boiler or industrial furnace operating in accordance with 40 CFR Part 266, Subpart H or other thermal treatment unit operated in accordance with ch. NR 670, ors. NR 670.11, but excluding for purposes of these debris treatment standards Thermal Desorption units.	Treated debris shall be separated from treatment residuals using simple physical or mechanical means,[9] and, prior to further treatment, such residue shall meet the waste–specific treatment standards for organic compounds in the waste contaminating the debris.	Brick, Concrete, Glass, Metal, Pavement, Rock, Metal: Metals other than mercury, except that there are no metal restrictions for vitrification. Debris contaminated with a dioxin–listed waste.[6] Obtain an "Equivalent Technology" approval under s. NR 675.22 (2),[8] except that this requirement does not apply to vitrification.
C. Immobilization Technologies:		

1. Macroencapsulation:Application of surface coating materials such as polymeric organics (e.g., resins and plastics) or use of a jacket of inert inorganic materials to substantially reduce surface exposure to potential leaching media.	Encapsulating material shall completely encapsulate debris and be resistant to degradation by the debris and its contaminants and materials into which it may-come into contact after placement (leachate, other waste, microbes).	None.
2. Microencapsulation: Stabilization of the debris with the following reagents or waste reagents such that the leachability of the hazardous contaminants is reduced: (1) Portland cement; or (2) lime/pozzolans (e.g., fly ash and cement kiln dust). Reagents (e.g., iron salts, silicates, and clays) may be added to enhance the set and cure time or compressive strength, or to reduce the leachability of the hazardous constituents.[5]	Leachability of the hazardous contaminants shall be reduced.	None.
3. Sealing: Application of an appropriate material which adheres tightly to the debris surface to avoid exposure of the surface to potential leaching media. When necessary to effectively seal the surface, sealing entails pretreatment of the debris surface to remove foreign matter and to clean and roughen the surface. Sealing materials include epoxy, silicone, and urethane compounds, but paint may not be used as a sealant.	Sealing shall avoid exposure of the debris surface to potential leaching media and sealant shall be resistent to degradation by the debris and its contaminants and materials into which it may come into contact after placement (leachate, other waste, microbes).	None.

[1]Hazardous debris shall be treated by either these standards or the waste–specific treatment standards for the waste contaminating the debris. The treatment standards shall be met for each type of debris contained in a mixture of debris types, unless the debris is converted into treatment residue as a result of the treatment process. Debris treatment residuals are subject to the waste– specific treatment standards for the waste contaminating the debris.

[2]Contaminant restriction means that the technology is not BDAT for that contaminant. If debris containing a restricted contaminant is treated by the technology, the contaminant shall be subsequently treated by a technology for which it is not restricted in order to be land disposed and excluded from regulation as hazardous waste.

[3]"Clean debris surface" means the surface, when viewed without magnification, shall be free of all visible contaminated soil and hazardous waste except that residual staining from soil and waste consisting of light shadows, slight streaks, or minor discolorations, and soil and waste in cracks, crevices, and pits may be present provided that such staining and waste and soil in cracks, crevices, and pits shall be limited to no more than 5% of each square inch of surface area.

[4] Acids, solvents, and chemical reagents may react with some debris and contaminants to form hazardous compounds. For example, acid washing of cyanide–contaminated debris could result in the formation of hydrogen cyanide. Some acids may also react violently with some debris and contaminants, depending on the concentration of the acid and the type of debris and contaminants. Debris treaters should refer to the safety precautions specified in Material Safety Data Sheets for various acids to avoid applying an incompatible acid to a particular combination of debris and contaminant. For example, concentrated sulfuric acid may react violently with certain organic compounds, such as acrylonitrile.

[5]If reducing the particle size of debris to meet the treatment standards results in material that no longer meets the 60 mm minimum particle size limit for debris, such material is subject to the waste–specific treatment standards for the waste contaminating the material, unless the debris has been cleaned and separated from contaminated soil and waste prior to size reduction. At a minimum, simple physical or mechanical means shall be used to provide such cleaning and separation of nondebris materials to ensure that the debris surface is free of caked soil, waste, or other nondebris material.

[6]Dioxin–listed wastes are EPA Hazardous Waste numbers FO20, FO21, FO22, FO23, FO26, and FO27.

[7]Thermal desorption is distinguished from Thermal Destruction in that the primary purpose of Thermal Desorption is to volatilize contaminants and to remove them from the treatment chamber for subsequent destruction or other treatment.

[8]The demonstration "Equivalent Technology" under s. NR 675.22 (2) shall document that the technology treats contaminants subject to treatment to a level equivalent to that required by the performance and design and operating standards for other technologies in this table such that residual levels of hazardous contaminants will not pose a hazard to human health and the environment absent management controls.

[9]Any soil, waste, and other nondebris material that remains on the debris surface or remains mixed with the debris after treatment is considered a treatment residual that shall be separated from the debris using, at a minimum, simple physical or mechanical means. Examples of simple physical or mechanical means are vibratory or trommel screening or water washing. The debris surface need not be cleaned to a "clean debris surface" as defined in note 3 when separating treated debris from residue; rather, the surface shall be free of caked soil, waste, or other nondebris material. Treatment residuals are subject to the waste–specific treatment standards for the waste contaminating the debris.

History: Cr. Register, May, 1995, No. 473, eff. 6–1–95**; am. (2) (b), Register, May, 1998, No. 509.**

NR 675.26 Alternative treatment standards based on HTMR.

For the treatment standards found in this section until June 1, 1998, refer to s. NR 675.20.

History: Cr. Register, May, 1995, No. 473, eff. 6–1–95**; r. and recr., Register, May, 1998, No. 509, eff. 6–1–98.**

NR 675.28 Universal treatment standards. Table Universal Treatment Standards identifies the hazardous constituents, along with the nonwastewater and wastewater treatment standard levels, that are used to regulate most prohibited hazardous wastes with numerical limits. For determining compliance with treatment standards for underlying hazardous constituents, these treatment standards may not be exceeded. Compliance with these treatment standards is measured by an analysis of grab samples, unless otherwise noted in the following Table Universal Treatment Standards.

Section NR 675.28 –– Universal Treatment Standards

Regulated constituent/common name	CAS[1] number	Wastewater standard	Nonwastewater standard
		Concentration in mg/l[2]	Concentration in mg/kg[3] unless noted as "mg/l TCLP"
I. Organic constituents:			
A2213 [6]	30558–43–1	0.042	1.4
Acenaphthene	83–32–9	0.059	3.4
Acenaphthylene	208–96–8	0.059	3.4

Acetone	67–64–1	0.28	160
Acetonitrile	75–05–8	5.6	38
Acetophenone	96–86–2	0.010	9.7
2–Acetylaminofluorene	53–96–3	0.059	140
Acrolein	107–02–8	0.29	NA
Acrylamide	79–06–1	19	23
Acrylonitrile	107–13–1	0.24	84
Aldicarb sulfone [6]	1646–88–4	0.056	0.28
Aldrin	309–00–2	0.021	0.066
4–Aminobiphenyl	92–67–1	0.13	NA
Aniline	62–53–3	0.81	14
Anthracene	120–12–7	0.059	3.4
Aramite	140–57–8	0.36	NA
alpha–BHC	319–84–6	0.00014	0.066
beta–BHC	319–85–7	0.00014	0.066
delta–BHC	319–86–8	0.023	0.066
gamma–BHC	58–89–9	0.0017	0.066
Barban [6]	101–27–9	0.056	1.4
Bendiocarb [6]	22781–23–3	0.056	1.4
Bendiocarb phenol [6]	22961–82–6	0.056	1.4
Benomyl [6]	17804–35–2	0.056	1.4
Benzene	71–43–2	0.14	10
Benz(a)anthracene	56–55–3	0.059	3.4
Benzal chloride	98–87–3	0.055	6.0
Benzo(b)fluoranthene (difficult to distinguish from benzo(k)fluoranthene)	205–99–2	0.11	6.8
Benzo(k)fluoranthene (difficult to distinguish from benzo(b)fluoranthene)	207–08–9	0.11	6.8
Benzo(g,h,i)perylene	191–24–2	0.0055	1.8
Benzo(a)pyrene	50–32–8	0.061	3.4
Bromodichloromethane	75–27–4	0.35	15
Bromomethane/Methyl bromide	74–83–9	0.11	15
4–Bromophenyl phenyl ether	101–55–3	0.055	15
n–Butyl alcohol	71–36–3	5.6	2.6
Butylate [6]	2008–41–5	0.042	1.4
Butyl benzyl phthalate	85–68–7	0.017	28
2–sec–Butyl–4,6–dinitrophenol/Dinoseb	88–85–7	0.066	2.5
Carbaryl [6]	63–25–2	0.006	0.14
Carbenzadim [6]	10605–21–7	0.056	1.4
Carbofuran [6]	1563–66–2	0.006	0.14
Carbofuran phenol [6]	1563–38–8	0.056	1.4
Carbon disulfide	75–15–0	3.8	4.8 mg/l TCLP
Carbon tetrachloride	56–23–5	0.057	6.0

Carbosulfan [6]	55285–14–8	0.028	1.4
Chlordane (alpha and gamma isomers)	57–74–9	0.0033	0.26
p–Chloroaniline	106–47–8	0.46	16
Chlorobenzene	108–90–7	0.057	6.0
Chlorobenzilate	510–15–6	0.10	NA
2–Chloro–1,3–butadiene	126–99–8	0.057	0.28
Chlorodibromomethane	124–48–1	0.057	15
Chloroethane	75–00–3	0.27	6.0
bis(2–Chloroethoxy)methane	111–91–1	0.036	7.2
bis(2–Chloroethyl)ether	111–44–4	0.033	6.0
Chloroform	67–66–3	0.046	6.0
bis(2–Chloroisopropyl) ether	39638–32–9	0.055	7.2
p–Chloro–m–cresol	59–50–7	0.018	14
2–Chloroethyl vinyl ether	110–75–8	0.062	NA
Chloromethane/Methyl chloride	74–87–3	0.19	30
2–Chloronaphthalene	91–58–7	0.055	5.6
2–Chlorophenol	95–57–8	0.044	5.7
3–Chloropropylene	107–05–1	0.036	30
Chrysene	218–01–9	0.059	3.4
o–Cresol	95–48–7	0.11	5.6
m–Cresol (difficult to distinguish from p–cresol)	108–39–4	0.77	5.6
p–Cresol (difficult to distinguish from m–cresol)	106–44–5	0.77	5.6
m–Cumenyl methylcarbamate [6]	64–00–6	0.056	1.4
Cyclohexanone	108–94–1	0.36	0.75 mg/l TCLP
o,p'–DDD	53–19–0	0.023	0.087
p,p'–DDD	72–54–8	0.023	0.087
o,p'–DDE	3424–82–6	0.031	0.087
p,p'–DDE	72–55–9	0.031	0.087
o,p'–DDT	789–02–6	0.0039	0.087
p,p'–DDT	50–29–3	0.0039	0.087
Dibenz(a,h)anthracene	53–70–3	0.055	8.2
Dibenz(a,e)pyrene	192–65–4	0.061	NA
1,2–Dibromo–3–chloropropane	96–12–8	0.11	15
1,2–Dibromoethane/Ethylene dibromide	106–93–4	0.028	15
Dibromomethane	74–95–3	0.11	15
m–Dichlorobenzene	541–73–1	0.036	6.0
o–Dichlorobenzene	95–50–1	0.088	6.0
p–Dichlorobenzene	106–46–7	0.090	6.0
Dichlorodifluoromethane	75–71–8	0.23	7.2
1,1–Dichloroethane	75–34–3	0.059	6.0
1,2–Dichloroethane	107–06–2	0.21	6.0
1,1–Dichloroethylene	75–35–4	0.025	6.0
trans–1,2–Dichloroethylene	156–60–5	0.054	30

2,4–Dichlorophenol	120–83–2	0.044	14
2,6–Dichlorophenol	87–65–0	0.044	14
2,4–Dichlorophenoxyacetic acid/2,4–D	94–75–7	0.72	10
1,2–Dichloropropane	78–87–5	0.85	18
cis–1,3–Dichloropropylene	10061–01–5	0.036	18
trans–1,3–Dichloropropylene	10061–02–6	0.036	18
Dieldrin	60–57–1	0.017	0.13
Diethylene glycol, dicarbamate [6]	5952–26–1	0.056	1.4
Diethyl phthalate	84–66–2	0.20	28
p–Dimethylaminoazobenzene	60–11–7	0.13	NA
2–4–Dimethyl phenol	105–67–9	0.036	14
Dimethyl phthalate	131–11–3	0.047	28
Dimetilan [6]	644–64–4	0.056	1.4
Di–n–butyl phthalate	84–74–2	0.057	28
1,4–Dinitrobenzene	100–25–4	0.32	2.3
4,6–Dinitro–o–cresol	534–52–1	0.28	160
2,4–Dinitrophenol	51–28–5	0.12	160
2,4–Dinitrotoluene	121–14–2	0.32	140
2,6–Dinitrotoluene	606–20–2	0.55	28
Di–n–octyl phthalate	117–84–0	0.017	28
Di–n–propylnitrosamine	621–64–7	0.40	14
1,4–Dioxane	123–91–1	12.0	170
Diphenylamine (difficult to distinguish from diphenylnitrosamine)	122–39–4	0.92	13
Diphenylnitrosamine (difficult to distinguish from diphenylamine)	86–30–6	0.92	13
1,2–Diphenylhydrazine	122–66–7	0.087	NA
Disulfoton	298–04–4	0.017	6.2
Dithiocarbamates (total) [6]	137–30–4	0.028	28
Endosulfan I	959–98–8	0.023	0.066
Endosulfan II	33213–65–9	0.029	0.13
Endosulfan sulfate	1031–07–8	0.029	0.13
Endrin	72–20–8	0.0028	0.13
Endrin aldehyde	7421–93–4	0.025	0.13
EPTC [6]	759–94–4	0.042	1.4
Ethyl acetate	141–78–6	0.34	33
Ethyl benzene	100–41–4	0.057	10
Ethyl cyanide/Propanenitrile	107–12–0	0.24	360
Ethyl ether	60–29–7	0.12	160
bis(2–Ethylhexyl) phthalate	117–81–7	0.28	28
Ethyl methacrylate	97–63–2	0.14	160
Ethylene oxide	75–21–8	0.12	NA
Famphur	52–85–7	0.017	15

Fluoranthene	206–44–0	0.068	3.4
Fluorene	86–73–7	0.059	3.4
Formetanate hydrochloride [6]	23422–53–9	0.056	1.4
Formparanate [6]	17702–57–7	0.056	1.4
Heptachlor	76–44–8	0.0012	0.066
Heptachlor epoxide	1024–57–3	0.016	0.066
Hexachlorobenzene	118–74–1	0.055	10
Hexachlorobutadiene	87–68–3	0.055	5.6
Hexachlorocyclopentadiene	77–47–4	0.057	2.4
HxCDDs (All Hexachlorodibenzo–p–dioxins)	NA	0.000063	0.001
HxCDFs (All Hexachlorodibenzofurans)	NA	0.000063	0.001
Hexachloroethane	67–72–1	0.055	30
Hexachloropropylene	1888–71–7	0.035	30
Indeno (1,2,3–c,d) pyrene	193–39–5	0.0055	3.4
Iodomethane	74–88–4	0.19	65
Isobutyl alcohol	78–83–1	5.6	170
Isodrin	465–73–6	0.021	0.066
Isolan [6]	119–38–0	0.056	1.4
Isosafrole	120–58–1	0.081	2.6
Kepone	143–50–0	0.0011	0.13
Methacrylonitrile	126–98–7	0.24	84
Methanol	67–56–1	5.6	0.75 mg/l TCLP
Methapyrilene	91–80–5	0.081	1.5
Methiocarb [6]	2032–65–7	0.056	1.4
Methomyl [6]	16752–77–5	0.028	0.14
Methoxychlor	72–43–5	0.25	0.18
3–Methylchlolanthrene	56–49–5	0.0055	15
4,4–Methylene bis(2–chloroaniline	101–14–4	0.50	30
Methylene chloride	75–09–2	0.089	30
Methyl ethyl ketone	78–93–3	0.28	36
Methyl isobutyl ketone	108–10–1	0.14	33
Methyl methacrylate	80–62–6	0.14	160
Methyl methansulfonate	66–27–3	0.018	NA
Methyl parathion	298–00–0	0.014	4.6
Metolcarb [6]	1129–41–5	0.056	1.4
Mexacarbate [6]	315–18–4	0.056	1.4
Molinate [6]	2212–67–1	0.042	1.4
Naphthalene	91–20–3	0.059	5.6
2–Naphthylamine	91–59–8	0.52	NA
o–Nitroaniline	88–74–4	0.27	14
p–Nitroaniline	100–01–6	0.028	28
Nitrobenzene	98–95–3	0.068	14
5–Nitro–o–toluidine	99–55–8	0.32	28

o–Nitrophenol	88–75–5	0.028	13
p–Nitrophenol	100–02–7	0.12	29
N–Nitrosodiethylamine	55–18–5	0.40	28
N–Nitrosodimethylamine	62–75–9	0.40	2.3
N–Nitroso–di–n–butylamine	924–16–3	0.40	17
N–Nitrosomethylethylamine	10595–95–6	0.40	2.3
N–Nitrosomorpholine	59–89–2	0.40	2.3
N–Nitrosopiperidine	100–75–4	0.013	35
N–Nitrosopyrrolidine	930–55–2	0.013	35
Oxamyl [6]	23135–22–0	0.056	0.28
Parathion	56–38–2	0.014	4.6
Total PCBs (sum of all PCB isomers, or all Aroclors)	1336–36–3	0.10	10
Pebulate [6]	1114–71–2	0.042	1.4
Pentachlorobenzene	608–93–5	0.055	10
PeCDDs (All Pentachlorodibenzo–p–dioxins)	NA	0.000063	0.001
PeCDFs (All Pentachlorodibenzo–furans)	NA	0.000035	0.001
Pentachloroethane	76–01–7	0.055	6.0
Pentachloronitrobenzene	82–68–8	0.055	4.8
Pentachlorophenol	87–86–5	0.089	7.4
Phenacetin	62–44–2	0.081	16
Phenanthrene	85–01–8	0.059	5.6
Phenol	108–95–2	0.039	6.2
o–Phenylenediamine [6]	95–54–5	0.056	5.6
Phorate	298–02–2	0.021	4.6
Phthalic acid	100–21–0	0.055	28
Phthalic anhydride	85–44–9	0.055	28
Physostigmine [6]	57–47–6	0.056	1.4
Physostigmine salicylate [6]	57–64–7	0.056	1.4
Promecarb [6]	2631–37–0	0.056	1.4
Pronamide	23950–58–5	0.093	1.5
Propham [6]	122–42–9	0.056	1.4
Propoxur [6]	114–26–1	0.056	1.4
Prosulfocarb [6]	52888–80–9	0.042	1.4
Pyrene	129–00–0	0.067	8.2
Pyridine	110–86–1	0.014	16
Safrole	94–59–7	0.081	22
Silvex/2,4,5–TP	93–72–1	0.72	7.9
1,2,4,5–Tetrachlorobenzene	95–94–3	0.055	14
TCDDs (All Tetrachlorodibenzo–p–dioxins)	NA	0.000063	0.001
TCDFs (All Tetrachlorodibenzofurans)	NA	0.000063	0.001
1,1,1,2–Tetrachloroethane	630–20–6	0.057	6.0
1,1,2,2–Tetrachloroethane	79–34–5	0.057	6.0

Tetrachloroethylene	127–18–4	0.056	6.0
2,3,4,6–Tetrachlorophenol	58–90–2	0.030	7.4
Thiodicarb [6]	59669–26–0	0.019	1.4
Thiophanate–methyl [6]	23564–05–8	0.056	1.4
Tirpate [6]	26419–73–8	0.056	0.28
Toluene	108–88–3	0.080	10
Toxaphene	8001–35–2	0.0095	2.6
Triallate [6]	2303–17–5	0.042	1.4
Tribromomethane/Bromoform	75–25–2	0.63	15
1,2,4–Trichlorobenzene	120–82–1	0.055	19
1,1,1–Trichlorethane	71–55–6	0.054	6.0
1,1,2–Trichlorethane	79–00–5	0.054	6.0
Trichloroethylene	79–01–6	0.054	6.0
Trichloromonofluoromethane	75–69–4	0.020	30
2,4,5–Trichlorophenol	95–95–4	0.18	7.4
2,4,6–Trichlorophenol	88–06–2	0.035	7.4
2,4,5–Trichlorophenoxyacetic acid/2,4,5–T	93–76–5	0.72	7.9
1,2,3–Trichloropropane	96–18–4	0.85	30
1,1,2–Trichloro–1,2,2–trifluoroethane	76–13–1	0.057	30
Triethylamine [6]	101–44–8	0.081	1.5
tris–(2,3–Dibromopropyl) phosphate	126–72–7	0.11	0.10
Vernolate [6]	1929–77–7	0.042	1.4
Vinyl chloride	75–01–4	0.27	6.0
Xylenes–mixed isomers (sum of o–, m–, and p–xylene concentrations)	1330–20–7	0.32	30
II. Inorganic Constituents:			
Antimony	7440–36–0	1.9	2.1 mg/l TCLP
Arsenic	7440–38–2	1.4	5.0 mg/l TCLP
Barium	7440–39–3	1.2	7.6 mg/l TCLP
Beryllium	7440–41–7	0.82	0.014 mg/l TCLP
Cadmium	7440–43–9	0.69	0.19 mg/l TCLP
Chromium (Total)	7440–47–3	2.77	0.86 mg/l TCLP
Cyanides (Total) [4]	57–12–5	1.2	590
Cyanides (Amenable) [4]	57–12–5	0.86	30
Fluoride [5]	16984–48–8	35	NA
Lead	7439–92–1	0.69	0.37 mg/l TCLP
Mercury––Nonwastewater from Retort	7439–97–6	NA	0.20 mg/l TCLP
Mercury––All Others	7439–97–6	0.15	0.25 mg/l TCLP
Nickel	7440–02–0	3.98	5.0 mg/l TCLP
Selenium	7782–49–2	0.82	0.16 mg/l TCLP
Silver	7440–22–4	0.43	0.30 mg/l TCLP
Sulfide	18496–25–8	14	NA
Thallium	7440–28–0	1.4	0.078 mg/l TCLP

Vanadium [4]	7440–62–2	4.3	0.23 mg/l TCLP
Zinc [5]	7440–66–6	2.61	5.3 mg/l TCLP

1 CAS means Chemical Abstract Services. When the waste code and/or regulated constituents are described as a combination of a chemical with its salts and/or esters, the CAS number is given for the parent compound only.

2 Concentration standards for wastewaters are expressed in mg/l and are based on analysis of composite samples.

3 Except for Metals (EP or TCLP) and Cyanides (Total and Amenable) the nonwastewater treatment standards expressed as a concentration were established, in part, based upon incineration in units operated in accordance with the technical requirements of ch. NR 665, or based upon combustion in fuel substitution units operating in accordance with applicable technical requirements. A facility may comply with these treatment standards according to s. NR 675.20 (4). All concentration standards for nonwastewaters are based on analysis of grab samples.

4 Both Cyanides (Total) and Cyanides (Amenable) for nonwastewaters are to be analyzed using Method 9010 or 9012, found in "Test Methods for Evaluating Solid Waste, Physical/Chemical Methods", EPA Publication SW–846, as incorporated by reference in s. NR 600.10 (2) (b) 1. and (c), with a sample size of 10 grams and a distillation time of one hour and 15 minutes.

5 These constituents are not "underlying hazardous constituents" in characteristic wastes, according to the definition at s. NR 675.03 (7p).

6 Between August 26, 1997 and August 26, 1998, these constituents are not underlying hazardous constituents as defined at s. NR 675.03 (7p).

NA means not applicable.

History: Cr. Register, May, 1998, No. 509, eff. 6–1–98.

NR 675.30 Prohibition on storage. (1) Except as provided for in this section, the storage of hazardous wastes restricted from land disposal under this chapter or 42 USC 6924 is prohibited, unless following conditions are met:

(a) A generator stores the wastes in tanks, containers, or containment buildings on–site solely for the purpose of the accumulation of the quantities of hazardous waste as necessary to facilitate proper recovery, treatment or disposal and the generator complies with the requirements in chs. NR 610 and 615. A generator existing on the effective date of a regulation under this chapter and storing hazardous wastes for longer than 90 days due to the regulations under this chapter becomes an owner or operator of a storage facility and shall obtain a hazardous waste operating license. A facility may qualify for an interim license upon compliance with the regulations governing interim license issuance under ch. NR 680.

(b) An owner or operator of a hazardous waste treatment, storage or disposal facility stores the wastes in tanks, containers or containment buildings solely for the purpose of the accumulation of the quantities of hazardous waste as necessary to facilitate proper recovery, treatment or disposal and:

1. Each container is clearly marked to identify its contents and the date each period of accumulation begins;

2. Each tank is clearly marked with a description of its contents, the quantity of each hazardous waste received, and the date each period of accumulation begins, or the information for each tank is recorded and maintained in the operating record at that facility. Regardless of whether the tank itself is marked, an owner or operator shall comply with the operating record requirements specified in ch. NR 630.

(c) A transporter stores manifested shipments of the wastes at a transfer facility for 10 days or less.

(2) An owner or operator of a treatment, storage or disposal facility may store the wastes for up to one year unless the department demonstrates that the storage was not solely for the purpose of accumulation of the quantities of hazardous waste as are necessary to facilitate proper recovery, treatment or disposal.

(3) An owner or operator of a treatment, storage or disposal facility may store the wastes beyond one year; however, the owner or operator bears the burden of proving that the storage was solely for the purpose of accumulation of the quantities of hazardous waste as are necessary to facilitate proper recovery, treatment or disposal.

(4) If a generator's waste is exempt from a prohibition against the type of land disposal utilized for the waste, the prohibition in sub. (1) does not apply during the period of the exemption.

Examples of exemptions from the prohibition against the type of land disposal include a case–by–case extension granted under s. NR 675.05 (1), an approved petition granted under 40 CFR 268.6, July 1, 1993, or a national capacity variance granted under 40 CFR 268 Subpart C, July 1, 1993.

(5) The prohibition in sub. (1) does not apply to hazardous wastes that meet the treatment standards specified under ss. NR 675.21 to 675.23, or the treatment standards specified under the variance in s. NR 675.24, or where treatment standards have not been specified is in compliance with the applicable prohibitions in ss. NR 675.11 to 675.16, or 42 USC 6924 (d).

(6) Liquid hazardous wastes containing polychlorinated biphenyls (PCBs) at concentrations greater than or equal to 50 ppm shall be stored at a facility that meets the requirements of ch. NR 157 and shall be removed from storage and treated or disposed as required by this chapter within one year of the date when the wastes are first placed into storage. The provisions of sub. (3) do not apply to the PCB wastes prohibited under s. NR 675.13.

History: Cr. Register, February, 1991, No. 422, eff. 3–1–91; am. (5) and (6), Register, August, 1992, No. 440, eff. 9–1–92; am. (1) (a), (b) (intro.), Register, May, 1995, No. 473, eff. 6–1–95.