

ILLINOIS POLLUTION CONTROL BOARD
May 20, 1993

IN THE MATTER OF:)
)
UIC UPDATE, USEPA REGULATIONS) R93-6
(6-1-92 THROUGH 12-31-92)) (Identical in Substance Rules)

Proposal for Public Comment.

PROPOSED OPINION AND ORDER OF THE BOARD (by J. Anderson):

Pursuant to Sections 13(c) and 22.4(a) of the Environmental Protection Act (Act), the Board adopts amendments to the Underground Injection Control (UIC) regulations.

Both Sections 13(c) and 22.4(a) provide for quick adoption of regulations which are "identical in substance" to federal regulations and that Title VII of the Act and Section 5 of the Administrative Procedure Act (APA) shall not apply. Because this rulemaking is not subject to Section 5 of the APA, it is not subject to first notice or to second notice review by the Joint Committee on Administrative Rules (JCAR). The federal UIC regulations are found at 40 CFR 144, 146 and 148. This rulemaking updates UIC rules to correspond with federal amendments made in the period from July 1 through December 31, 1992. The USEPA actions during this period are as follows:

Federal Action	Summary
57 Fed. Reg. 31962 (July 20, 1992)	Stay of technical amendment to Third-Third rules as they relate to newly-listed wastes.
57 Fed. Reg. 37194 (Aug. 18, 1992)	Land disposal restrictions for newly-listed wastes.
57 Fed. Reg. 46292 (Oct. 7, 1992)	Revision of testing and monitoring requirements.

PUBLIC COMMENTS

The Board will receive public comment on this proposal for a period of 45 days following its publication in the Illinois Register. The Board will delay filing any adopted rules with the Secretary of State for 30 days after adoption, particularly to allow USEPA review. The complete text of the proposed amendments follows the discussions of this opinion.

0142-0681

HISTORY OF RCRA, UST and UIC ADOPTION
AGENCY OR BOARD ACTION?
EDITORIAL CONVENTIONS

The Board appended three routine discussions at the end of this opinion. The first is a summary history of the Illinois RCRA and UIC programs. It lists all actions taken to adopt and maintain these programs since their inceptions. It includes a listing of all site-specific rulemaking and adjusted standards proceedings filed that relate to these programs. It also lists all USEPA program authorizations issued to date. The second is a discussion of how the Board codifies requirements that call for state determinations, such as for exemptions, exceptions, etc. The third discussion relates to our use of language in the codification of identical-in-substance rules. We intend these as reference aids for interested persons in the regulated community.

DISCUSSION

The three federal actions that underlie this proceeding each have a distinct impact on the Illinois UIC regulations. This discussion focuses on each by subject matter and the Illinois Section impacted.

Casing Inspection Logs--Section 730.168(d)(4)

At 57 Fed. Reg. 46294 (Oct. 7, 1992), USEPA amended 40 CFR 146.68(d)(4), which corresponds with 35 Ill. Adm. Code 730.168(d)(4) in the Illinois regulations. This section sets forth the requirements for owners or operators of Class I hazardous waste injection wells to test the mechanical integrity of their wells by running casing inspection logs. Formerly, USEPA required these tests every five years. The Director could waive the requirement if factors indicated that the results of running the logs would prove unreliable. As a result of a partial settlement of litigation, in NRDC v. EPA, No. 88-1657 (D.C. Cir.), USEPA amended these requirements to generally allow the owner or operator to perform the tests as part of a routine well workover in which the injection string is pulled. The federal rule allows the Director of USEPA to waive the requirement based on the unreliability based on factors relating to the well. USEPA further added the condition that the Director could waive the requirement based on consideration of satisfactory results from a log run within the last five years. It also allows the Director to require owner or operator to run these logs every five years if there is reason to believe that the integrity of the long string casing of the well may be adversely affected by naturally-occurring or man-made events.

The Board proposes amendments that follow the federal amendments very closely. We allow the Agency to require the testing, either during routine workovers or every five years, by

permit condition. The Agency's determinations are based on consideration of the same factors as are enunciated in the federal rule. However, for greater clarity, the Board has subdivided this subsection into smaller subsections. Subsection (d)(1) provides for running the logs during routine workovers, and subsection (d)(2) provides for running them every five years. Subsection (d)(1) is further subdivided into two subsections so that the two bases for waiving the requirements stand out distinctly.

A deviation from the federal language appears in subsection (d)(2). USEPA provided that the Director could require the five-year testing "if he has reason to believe" there were adverse effects on the well casing. The Board requires the Agency to "determine that it has reason to believe" there were effects. We made this change because Illinois administrative law requires the Agency to act on established standards. See Granite City Division of National Steel Co. v. PCB (Apr. 15, 1993), No. 72850 (slip op.). We believe that requiring the Agency to make a formal determination that there is reason to believe will satisfy this requirement. We do not feel free to delete the federal "reason to believe" language due to our experience in another federal identical-in-substance program. See R91-3, SDWA Update, PC 12-PC 15. If the Board were to delete this language, the Agency would only be able to require the five-year testing if it determines that the effect had indeed occurred. This would render the Illinois rules less stringent than the federal regulations.

The Board invites public comment on its approach to Section 730.168(d)(4).

Relaxation of Prohibition of Land Disposal of Diluted Wastes--
Section 738.101(d)

USEPA amended 40 CFR 148.1(d) at 57 Fed. Reg. 31963 (July 20, 1992). This corresponds with 35 Ill. Adm. Code 738.101(d) in the Illinois UIC regulations. The effect of the federal amendment is to allow the injection of diluted wastes that no longer exhibit any characteristic of hazardous wastes into Class I hazardous waste injection wells. Formerly, USEPA amended this provision to allow the injection into Class I nonhazardous waste injection wells. The Board adopted the previous amendments in docket R92-13. In that docket we noted that the federal action was the subject of federal litigation in Chemical Waste Management, Inc. v. EPA (1992), 976 F.2d 2 (D.C. Cir.). We noted that we are constrained to follow the language of the federal regulations notwithstanding the federal litigation until USEPA follows the court's mandate and amends or repeals its rule. We added our usual Board Note indicating the federal litigation and noting that the rule may be unenforceable as a result.

In amending Section 738.101(d), the Board follows the federal amendments. We again highlight the earlier discussion of the federal litigation and the Board Note that mentions its possible effect on the rule. We feel constrained to follow the USEPA regulatory lead in this matter.

In adapting the federal requirements to the Illinois regulations, the Board deviates from the federal structure. The federal rule is divided into two paragraphs, so that paragraph (d)(1) relates to Class I nonhazardous waste injection wells and paragraph (d)(2) relates to Class I hazardous waste injection wells. In R92-13, the Board had already divided this provision to highlight the two elements: (1) Class I nonhazardous injection well and (2) exhibiting no hazardous characteristic. Since federal paragraph (d)(2) recites essentially the same thing, except that it relates only to Class I hazardous waste injection wells (and reverses the order of the two elements), we decided not to make this provision more convoluted by further subdivision. Subsection (d) combines both the hazardous and nonhazardous waste wells so that subsection (d)(1) recites Class I hazardous waste injection wells and Class I nonhazardous waste injection wells and subsection (d)(2) recites the no hazardous characteristic requirement. We added the "Class I" reference for clarity because this is the type of well defined at 35 Ill. Adm. Code 704.106(a) (corresponding to 40 CFR 144.6(a)).

The Board invites public comment on our approach to Section 738.101(d).

Prohibitions on Injection of Newly-Listed Wastes--Section 738.117

USEPA added 40 CFR 148.17 at 57 Fed. Reg. 37263 (Aug. 18, 1992). This new provision is part of the broader rulemaking that imposed land disposal restrictions for newly listed wastes as part of the RCRA program. The RCRA aspects of these "land-bans" is the subject of RCRA update docket R93-4. The federal UIC-only regulation is divided into three subsections. Subsection (a), listing 19 wastes, includes a prohibition and was effective November 9, 1992. Subsection (b), which lists four additional wastes, includes a prohibition and will become effective on June 30, 1995. Subsection (c) lists the typical three conditions under which the prohibitions do not apply: (1) the wastes meet the 40 CFR 268, Subpart D treatment standards (corresponding to 35 Ill. Adm. Code 728.Subpart D), (2) the wastes are the subject of an exemption from a prohibition (corresponding with an adjusted standard from a prohibition), or (3) if an extension of the effective date is granted pursuant to 40 CFR 148.4 (corresponding to 35 Ill. Adm. Code 738.104).

In adopting the federal requirements to the Illinois UIC regulations, the Board has followed the federal rules nearly exactly. We reformatted subsections (a) and (b) to list the

wastes individually. We further kept with our routine practice and deleted the past effective date of subsection (a).

The Board invites public comments on our approach to Section 738.117.

HISTORY OF RCRA, UST and UIC ADOPTION

The Illinois UIC (Underground Injection Control), RCRA (Resource Conservation and Recovery Act), and UST (Underground Storage Tank) regulations, together with more stringent state regulations particularly applicable to hazardous waste, include the following Parts of Title 35 of the Illinois Administrative Code:

- 702 RCRA and UIC Permit Programs
- 703 RCRA Permit Program
- 704 UIC Permit Program
- 705 Procedures for Permit Issuance
- 709 Wastestream Authorizations
- 720 General
- 721 Identification and Listing
- 722 Generator Standards
- 723 Transporter Standards
- 724 Final TSD Standards
- 725 Interim Status TSD Standards
- 726 Specific Wastes and Management Facilities
- 728 USEPA Land Disposal Restrictions
- 729 Landfills: Prohibited Wastes
- 730 UIC Operating Requirements
- 731 Underground Storage Tanks
- 738 Hazardous Waste Injection Restrictions

Special provisions for RCRA cases are included in Parts 102, 103, 104 and 106 of the Board's procedural rules.

History of RCRA and State Hazardous Waste Rules Adoption

The Board has adopted and amended the Resource Conservation and Recovery Act (RCRA) hazardous waste rules in several dockets. Dockets R81-22 and R82-18 dockets dealt with the Phase I RCRA regulations. USEPA granted Illinois Phase I authorization on May 17, 1982, at 47 Fed. Reg. 21043. The Board adopted RCRA Phase II regulations in Parts 703 and 724 in dockets R82-19 and R83-24. USEPA granted final authorization of the Illinois RCRA "base program" on January 31, 1986, at 51 Fed. Reg. 3778 (January 30, 1986). USEPA granted authorization to "Cluster I revisions" to the Illinois program and granted partial Hazardous and Solid Waste Amendments (HSWA) (Pub. L. 98-616, Nov. 8, 1984) authorization effective March 5, 1988, at 53 Fed. Reg. 126 (January 5, 1988). USEPA authorized certain subsequent amendments and granted further partial HSWA authorizations

effective April 30, 1990, at 55 Fed. Reg. 7320 (March 1, 1990), and June 3, 1991, at 56 Fed. Reg. 13595 (April 3, 1991). USEPA codified its approvals of the Illinois program at 40 CFR 272.700 and 272.701 on November 13, 1989, at 54 Fed. Reg. 37649 (Sep. 12, 1989), and on March 31, 1992, at 57 Fed. Reg. 3731 (Jan. 31, 1992). The entire listing of all RCRA identical in substance rulemakings follows (with the period of corresponding federal revisions indicated in parentheses):

- R81-22 45 PCB 317, September 16, 1981 & February 4, 1982; 6 Ill. Reg. 4828, April 23, 1982, effective May 17, 1982. (5/19/80 through 10/1/81)
- R82-18 51 PCB 31, January 13, 1983; 7 Ill. Reg. 2518, March 4, 1983, effective May 17, 1982. (11/11/81 through 6/24/82)
- R82-19 53 PCB 131, July 26, 1983, 7 Ill. Reg. 13999, October 28, 1983, effective October 2, 1983. (11/23/81 through 10/29/82)
- R83-24 55 PCB 31, December 15, 1983, 8 Ill. Reg. 200, January 6, 1984, effective December 27, 1983. (Corrections to R82-19)
- R84-9 64 PCB 427 & 521, June 13 & 27, 1985; 9 Ill. Reg. 11964, August 2, 1985, effective July 8 & 24, 1985. (1/19/83 through 4/24/84)
- R85-22 67 PCB 175, 479, December 20, 1985 and January 9, 1986; 10 Ill. Reg. 968, January 17, 1986, effective January 2, 1986. (4/25/84 through 6/30/85)
- R86-1 71 PCB 110, July 11, 1986; 10 Ill. Reg. 13998, August 22, 1986, effective August 12, 1986. (7/1/85 through 1/31/86)
- R86-19 73 PCB 467, October 23, 1986; 10 Ill. Reg. 20630, December 12, 1986, effective December 2, 1986. (2/1/86 through 3/31/86)
- R86-28 75 PCB 306, February 5, 1987; and 76 PCB 195, March 5, 1987; 11 Ill. Reg. 6017, April 3, 1987, effective March 23, 1987. Correction at 77 PCB 235, April 16, 1987; 11 Ill. Reg. 8684, May 1, 1987, effective April 21, 1987. (4/1/86 through 6/30/86)
- R86-46 79 PCB 676, July 16, 1987; 11 Ill. Reg. 13435, August 14, 1987, effective August 4, 1987. (7/1/86 through 9/30/86)

- R87-5 82 PCB 391, October 15, 1987; 11 Ill. Reg. 19280, November 30, 1987, effective November 10 & 12, 1987. (10/1/86 through 12/31/86)
- R87-26 84 PCB 491, December 3, 1987; 12 Ill. Reg. 2450, January 29, 1988, effective January 15, 1988. (1/1/87 through 6/30/87)
- R87-32 Correction to R86-1; 81 PCB 163, September 4, 1987; 11 Ill. Reg. 16698, October 16, 1987, effective September 30, 1987.
- R87-39 90 PCB 267, June 16, 1988; 12 Ill. Reg. 12999, August 12, 1988, effective July 29, 1988. (7/1/87 through 12/31/87)
- R88-16 93 PCB 513, November 17, 1988; 13 Ill. Reg. 447, January 13, 1989, effective December 28, 1988. (1/1/88 through 7/31/88)
- R89-1 103 PCB 179, September 13, 1989; 13 Ill. Reg. 18278, November 27, 1989, effective November 13, 1989. (8/1/88 through 12/31/88)
- R89-9 109 PCB 343, March 8, 1990; 14 Ill. Reg. 6225, April 27, 1990, effective April 16, 1990. (1/1/89 through 6/30/89)
- R90-2 113 PCB 131, July 3, 1990; 14 Ill. Reg. 14401, September 7, 1990, effective August 22, 1990. (7/1/89 through 12/31/89)
- R90-11 121 PCB 97, April 11, 1991; corrected at 122 PCB 305, May 23, 1991; corrected at 125 PCB 117, August 8, 1991; uncorrected at 125 PCB 435, August 22, 1991; 15 Ill. Reg. 9323, effective June 17, 1991. (Third Third Land Disposal Restrictions) (4/1/90 through 6/30/90)
- R90-17 Delisting Procedures (See below)
- R91-1 125 PCB 119, August 8, 1991; 15 Ill. Reg. 14446, effective September 30, 1991. (Wood Preserving Rules) (7/1/90 through 12/30/90)
- R91-13 132 PCB 263, April 9, 1992; 16 Ill. Reg. 9489, effective June 9, 1992. (Boilers and Industrial Furnaces (BIFs) Rules) (1/1/91 through 6/30/91)
- R91-26 129 PCB 235, January 9, 1992; 16 Ill. Reg. 2600, effective February 3, 1992. (Wood Preserving Rules Compliance Dates)

- R92-1 September 17, 1992; 16 Ill. Reg. 17636, effective
November 6, 1992. (7/1/91 through 12/31/91)
- R92-10 January 21, 1993; 17 Ill. Reg. 5625, effective
March 26, 1993. (Leak Detection Systems (LDS)
Rules) (1/1/92 through 6/30/92)
- R93-4 Next RCRA Docket. (7/1/92 through 12/31/92)

On September 6, 1984, the Third District Appellate Court upheld the Board's actions in adopting R82-19 and R83-24. (Commonwealth Edison Co. v. PCB, 127 Ill. App. 3d 446; 468 N.E.2d 1339 (3d Dist. 1984).)

The Board added to the federal listings of hazardous waste by listing dioxins pursuant to Section 22.4(d) of the Act:

- R84-34 61 PCB 247, November 21, 1984; 8 Ill. Reg. 24562,
December 21, 1984, effective December 11, 1984.

This was repealed by R85-22, which included adoption of USEPA's dioxin listings. Section 22.4(d) was repealed by P.A. 85-1048, effective January 1, 1989.

The Board has adopted USEPA delistings at the request of Amoco and Envirite (the date of the corresponding federal action is included in parentheses):

- R85-2 69 PCB 314, April 24, 1986; 10 Ill. Reg. 8112, May
16, 1986, effective May 2, 1986. (9/13/85)
- R87-30 90 PCB 665, June 30, 1988; 12 Ill. Reg. 12070,
July 22, 1988, effective July 12, 1988.
(11/14/86)
- R91-12 128 PCB 369, December 19, 1991; 16 Ill. Reg. 2155,
effective January 27, 1992. (USX)

Subsequently, upon the April 30, 1990 federal authorization of Illinois granting waste delistings, USEPA transferred pending delisting petitions to the Board. The Board docketed these as site-specific rulemaking proceedings (the name of the petitioner waste generator appears in parentheses):

- R90-18 Dimissed at 123 PCB 65, June 6, 1991. (USX Corp,
South Works)
- R90-19 Dimissed at 116 PCB 199, November 8, 1990.
(Woodward Governor Co.)
- R90-23 Dimissed at 124 PCB 149, July 11, 1991.
(Keystone Steel & Wire Co.)

The Board has modified the delisting procedures to allow the use of adjusted standards in lieu of site-specific rulemakings:

R90-17 119 PCB 181, February 28, 1991; 15 Ill. Reg. 7934, effective May 9, 1991.

Waste generators have filed Part 106 adjusted standards petitions for solid waste determinations with the Board pursuant to Section 720.130 (generator name in parentheses):

AS89-4 Dismissed at 105 PCB 269, November 15, 1989.
(Safety-Kleen Corp.)

AS89-5 Dismissed at 113 PCB 111, July 3, 1990. (Safety-Kleen Corp.)

AS90-7 Dismissed at 124 PCB 125, July 11, 1991. (Quantum Chemical Co.)

The Board has granted hazardous waste delistings by way of adjusted standards (generator name in parentheses):

AS91-1 130 PCB 113, February 6, 1992. (Keystone Steel and Wire Co.)

AS91-3 February 4, 1993; opinion issued March 11, 1993.
(Peoria Disposal Co.)

The Board has procedures to be followed in cases before it involving the RCRA regulations:

R84-10 62 PCB 87, 349, December 20, 1984 and January 10, 1985; 9 Ill. Reg. 1383, effective January 16, 1985.

The Board also adopted special procedures to be followed in certain determinations under Part 106. The Board adopted these Part 106 special procedures in R85-22 and amended them in R86-46, listed above.

One Part 106 adjusted standard proceeding filed pursuant to 728.106 sought relief from a prohibition against land disposal (petitioner's name in parentheses):

AS90-6 Dismissed September 17, 1992. (Marathon Petroleum Co.)

Other adjusted standard proceedings sought delayed closure of land disposal units (petitioners' names in parentheses):

AS90-8 130 PCB 349, February 27, 1992. (Olin Corp.)

AS91-4 131 PCB 43, March 11, 1992. (Amoco Oil Co.)

Still another adjusted standard proceeding relates to substantive physical requirements of the RCRA regulations:

AS91-10 Presently pending. (Cabot Corp.)

In another regulatory proceeding, the Board has considered granting temporary relief from the termination of an exclusion of a hazardous waste listing in the form of an emergency rule (Petitioner's name in parentheses):

R91-11 Presently pending. (Big River Zinc Corp.)

The Board has also adopted requirements limiting and restricting the landfilling of liquid hazardous wastes, hazardous wastes containing halogenated compounds, and hazardous wastes generally:

R81-25 60 PCB 381, October 25, 1984; 8 Ill. Reg. 24124, December 14, 1984, effective December 4, 1984.

R83-28 68 PCB 295, February 26, 1986; 10 Ill. Reg. 4875, March 21, 1986, effective March 7, 1986.

R86-9 Emergency regulations adopted at 73 PCB 427, October 23, 1986; 10 Ill. Reg. 19787, November 21, 1986, effective November 5, 1986.

The Board's action in adopting emergency regulations in R86-9 was reversed by the First District Court of Appeals. (Citizens for a Better Environment v. PCB, 152 Ill. App. 3d 105, 504 N.E.2d 166 (1st Dist. 1987).)

History of UIC Rules Adoption

The Board has adopted and amended Underground Injection Control (UIC) regulations in several dockets to correspond with the federal regulations. One such docket, R82-18, was a RCRA docket. USEPA authorized the Illinois UIC program on February 1, 1984, at 49 Fed. Reg. 3991. The entire listing of all UIC rulemakings follows (with the period of corresponding federal revisions indicated in parentheses):

R81-32 47 PCB 93, May 13, 1982; 6 Ill. Reg. 12479, October 15, 1982, effective February 1, 1984. (7/7/81 through 11/23/81)

R82-18 51 PCB 31, January 13, 1983; 7 Ill. Reg. 2518, March 4, 1983, effective May 17, 1982. (11/11/81 through 6/24/82)

- R83-39 55 PCB 319, December 15, 1983; 7 Ill. Reg. 17338, December 20, 1983, effective December 19, 1983. (4/1/83)
- R85-23 70 PCB 311 & 71 PCB 108, June 20 & July 11, 1986; 10 Ill. Reg. 13274, August 8, 1986, effective July 28 & 29, 1986. (5/11/84 through 11/15/84)
- R86-27 Dismissed at 77 PCB 234, April 16, 1987. (No USEPA amendments through 12/31/86).
- R87-29 85 PCB 307, January 21, 1988; 12 Ill. Reg. 6673, April 8, 1988, effective March 28, 1988. (1/1/87 through 6/30/87)
- R88-2 90 PCB 679, June 30, 1988; 12 Ill. Reg. 13700, August 26, 1988, effective August 16, 1988. (7/1/87 through 12/31/87)
- R88-17 94 PCB 227, December 15, 1988; 13 Ill. Reg. 478, January 13, 1989, effective December 30, 1988. (1/1/88 through 6/30/88)
- R89-2 107 PCB 369, January 25, 1990; 14 Ill. Reg. 3059, March 2, 1990, effective February 20, 1990. (7/1/88 through 12/31/88)
- R89-11 111 PCB 489, May 24, 1990; 14 Ill. Reg. 11948, July 20, 1990, effective July 9, 1990. (1/1/89 through 11/30/89)
- R90-5 Dismissed at 109 PCB 627, March 22, 1990. (No USEPA amendments 12/1/89 through 12/31/89)
- R90-14 122 PCB 335, May 23, 1991; 15 Ill. Reg. 11425, effective July 24, 1991. (1/1/90 through 6/30/90)
- R91-4 Dismissed at 119 PCB 219, February 28, 1991. (No USEPA amendments 9/1/90 through 12/31/90)
- R91-16 Dismissed at 128 PCB 229, December 6, 1991. (No USEPA amendments 1/1/90 through 6/30/91)
- R92-4 Dismissed at 133 PCB 107, April 9, 1992. (No USEPA amendments 7/1/91 through 12/31/91)
- R92-13 February 4, 1993; 17 Ill. Reg. 6190, effective April 5, 1993. (1/1/92 through 6/30/92)
- R93-6 This Docket. (7/1/92 through 12/31/92)

In one proceeding filed, a petitioner seeks an adjusted standard from a UIC land disposal restriction, pursuant to the procedures outlined above with respect to the RCRA program (petitioner name in parentheses):

R92-8 Presently pending. (Cabot Corp.)

AGENCY OR BOARD ACTION?

Section 7.2(a)(5) of the Act requires the Board to specify which decisions USEPA will retain. In addition, the Board is to specify which State agency is to make decisions, based on the general division of functions within the Act and other Illinois statutes.

In situations in which the Board has determined that USEPA will retain decision-making authority, the Board has replaced "Regional Administrator" with USEPA, so as to avoid specifying which office within USEPA is to make a decision.

In a few instances in identical in substance rules, decisions are not appropriate for Agency action pursuant to a permit application. Among the considerations in determining the general division of authority between the Agency and the Board are:

1. Is the person making the decision applying a Board regulation, or taking action contrary to ("waiving") a Board regulation? It generally takes some form of Board action to "waive" a Board regulation.
2. Is there a clear standard for action such that the Board can give meaningful review to an Agency decision?
3. Does the action result in exemption from the permit requirement itself? If so, Board action is generally required.
4. Does the decision amount to "determining, defining or implementing environmental control standards" within the meaning of Section 5(b) of the Act. If so, it must be made by the Board.

There are four common classes of Board decision: variance, adjusted standard, site specific rulemaking, and enforcement. The first three are methods by which a regulation can be temporarily postponed (variance) or adjusted to meet specific situations (adjusted standard or site specific rulemaking). Note that there often are differences in the nomenclature for these decisions between the USEPA and Board regulations.

EDITORIAL CONVENTIONS

As a final note, the federal rules have been edited to establish a uniform usage throughout the Board's regulations. For example, with respect to "shall", "will", and "may" - "shall" is used when the subject of a sentence has to do something. "Must" is used when someone has to do something, but that someone is not the subject of the sentence. "Will" is used when the Board obliges itself to do something. "May" is used when choice of a provision is optional. "Or" is used rather than "and/or", and denotes "one or both". "Either"... "or" denotes "one but not both". "And" denotes "both".

ORDER

The Board hereby proposes the following amendments to the Illinois UIC regulations at Sections 730.168, 738.101, and 738.117.

TITLE 35: ENVIRONMENTAL PROTECTION
 SUBTITLE G: WASTE DISPOSAL
 CHAPTER I: POLLUTION CONTROL BOARD
 SUBCHAPTER d: UNDERGROUND INJECTION CONTROL AND UNDERGROUND
 STORAGE TANK PROGRAMS

PART 730
 UNDERGROUND INJECTION CONTROL OPERATING REQUIREMENTS

SUBPART A: GENERAL

Section	
730.101	Applicability, Scope and Effective Date
730.102	Laws Authorizing Regulations
730.103	Definitions
730.104	Criteria for Exempted Aquifers
730.105	Classification of Injection Wells
730.106	Area of Review
730.107	Corrective Action
730.108	Mechanical Integrity
730.109	Criteria for Establishing Permitting Priorities
730.110	Plugging and Abandoning Class I and III Wells

SUBPART B: CRITERIA AND STANDARDS APPLICABLE
 TO CLASS I NON-HAZARDOUS WELLS

Section	
730.111	Applicability
730.112	Construction Requirements
730.113	Operating, Monitoring and Reporting Requirements
730.114	Information to be Considered by Agency

SUBPART C: CRITERIA AND STANDARDS APPLICABLE
 TO CLASS II WELLS

Section

730.121 Adoption of Criteria and Standards Applicable to Class II Wells by the Illinois Department of Mines and Minerals

SUBPART D: CRITERIA AND STANDARDS APPLICABLE
TO CLASS III WELLS

Section

730.131 Applicability
730.132 Construction Requirements
730.133 Operating, Monitoring and Reporting Requirements
730.134 Information to be Considered by the Agency

SUBPART F: CRITERIA AND STANDARDS APPLICABLE
TO CLASS V INJECTION WELLS

Section

730.151 Applicability
730.152 Inventory and Assessment

SUBPART G: CRITERIA AND STANDARDS APPLICABLE TO CLASS I
HAZARDOUS WELLS

Section

730.161 Applicability and Definitions
730.162 Minimum Criteria for Siting
730.163 Area of Review
730.164 Correction Action for Wells in the Area of Review
730.165 Construction Requirements
730.166 Logging, Sampling and Testing Prior to New Well Operation
730.167 Operating Requirements
730.168 Testing and Monitoring Requirements
730.169 Reporting Requirements
730.170 Information to be Evaluated by the Director
730.171 Closure
730.172 Post-Closure Care
730.173 Financial Responsibility for Post-Closure Care

AUTHORITY: Implementing Sections 13 and 22.4 and authorized by Section 27 of the Environmental Protection Act (Ill. Rev. Stat. 1987 and 1988 Supp. ch. 111 1/2, pars. 1013, 1022.4 and 1027).

SOURCE: Adopted in R81-32, 47 PCB 93, at 6 Ill. Reg. 12,479, effective as, noted in 35 Ill. Adm. Code 700.106; amended in R82-19, 53 PCB 131 at 7 Ill. Reg. 14426 effective as noted in 35 Ill. Adm. Code 700.106; recodified at 10 Ill. Reg. 14174; amended in R89-2 at 14 Ill. Reg. 3130, effective February 20, 1990; amended in R89-11 at 14 Ill. Reg. , effective

SUBPART G: CRITERIA AND STANDARDS APPLICABLE TO CLASS I
HAZARDOUS WELLS

Section 730.168 Testing and Monitoring Requirements

Testing and monitoring requirements shall at a minimum include:

- a) Monitoring of the injected wastes.
 - 1) The owner or operator shall develop and follow an approved written waste analysis plan that describes the procedures to be carried out to obtain a detailed chemical and physical analysis of a representative sample of the waste, including the quality assurance procedures used. At a minimum, the plan shall specify:
 - A) The parameters for which the waste will be analyzed and the rationale for the selection of these parameters;
 - B) The test methods that will be used to test for these parameters; and
 - C) The sampling method that will be used to obtain a representative sample of the waste to be analyzed.
 - 2) The owner or operator shall repeat the analysis of the injected wastes as described in the waste analysis plan at frequencies specified in the waste analysis plan and when process or operating changes occur that may significantly alter the characteristics of the waste stream.
 - 3) The owner or operator shall conduct continuous or periodic monitoring of selected parameters as required by permit condition.
 - 4) The owner or operator shall assure that the plan remains accurate and the analyses remain representative.
- b) Hydrogeologic compatibility determination. The owner or operator shall submit information demonstrating that the wastestream and its anticipated reaction products will not alter the permeability, thickness or other relevant characteristics of the confining or injection zones such that they would no longer meet the requirements specified in Section 730.162.
- c) Compatibility of well materials.

- 1) The owner or operator shall demonstrate that the waste stream will be compatible with the well materials with which the waste is expected to come into contact, and submit to the Agency a description of the methodology used to make that determination. Compatibility for the purposes of this requirement is established if contact with injected fluids will not cause the well materials to fail to satisfy any design requirement imposed under Section 730.165(b).
- 2) The Agency shall require continuous corrosion monitoring of the construction materials used in the well for wells injecting corrosive waste, and may require such monitoring for other wastes, by:
 - A) Placing coupons of the well construction materials in contact with the waste stream; or
 - B) Routing the waste stream through a loop constructed with the material used in the well; or
 - C) Using an alternative method approved by permit condition.
- 3) If a corrosion monitoring program is required:
 - A) The test must use materials identical to those used in the construction of the well, and such materials must be continuously exposed to the operating pressures and temperatures (measured at the well head) and flow rates of the injection operation; and
 - B) The owner or operator shall monitor the materials for loss of mass, thickness, cracking, pitting and other signs of corrosion on a quarterly basis to ensure that the well components meet the minimum standards for material strength and performance set forth in Section 730.165(b).
- d) Periodic mechanical integrity testing. In fulfilling the requirements of Section 730.108, the owner or operator of a Class I hazardous waste injection well shall conduct the mechanical integrity testing as follows:
 - 1) The long string casing, injection tube, and annular seal must be tested by means of an

approved pressure test with a liquid or gas annually and whenever there has been a well workover;

- 2) The bottom-hole cement must be tested by means of an approved radioactive tracer survey annually;
- 3) An approved temperature, noise, or other approved log must be run at least once every five years to test for movement of fluid along the borehole. The Agency may require such tests whenever the well is worked over;
- 4) Running casing inspection logs.
 - A) Casing inspection logs must be run at least once every five years whenever the owner or operator conducts a workover in which the injection string is pulled, unless the Agency by permit specifies otherwise:
 - i) due to well construction or other factors which that limit the test's reliability, or
 - ii) based on the satisfactory results of a casing inspection log run within the previous five years.
 - B) The Agency may require by permit that the owner or operator run a casing inspection log if it determines that it has reason to believe that the integrity of the long string casing of the well may be adversely affected by naturally-occurring or man-made events;
and
- 5) Any other test specified by permit condition in accordance with the procedures in Section 730.108(d) may also be used.
- e) Ambient Monitoring.
 - 1) Based on a site-specific assessment of the potential for fluid movement from the well or injection zone, and on the potential value of monitoring wells to detect such movement, the Agency shall require the owner or operator to develop a monitoring program. At a minimum, the Agency shall require monitoring of the pressure buildup in the injection zone annually, including at a minimum, a shut down of the well for a time

sufficient to conduct a valid observation of the pressure fall-off curve.

- 2) When prescribing a monitoring system the Agency may also require:
- A) Continuous monitoring for pressure changes in the first aquifer overlying the confining zone. When such a well is installed, the owner or operator shall, on a quarterly basis, sample the aquifer and analyze for constituents specified by permit condition;
 - B) The use of indirect, geophysical techniques to determine the position of the waste front, the water quality in a formation designated by permit condition, or to provide other site-specific data;
 - C) Periodic monitoring of the groundwater quality in the first aquifer overlying the injection zone;
 - D) Periodic monitoring of the ground water quality in the lowermost USDW;
 - E) Any additional monitoring necessary to determine whether fluids are moving into or between USDWs; and
 - F) The Agency may require seismicity monitoring when it has reason to believe that the injection activity may have the capacity to cause seismic disturbances.

BOARD NOTE: Derived from 40 CFR 146.68 (1992), as amended at 537 Fed. Reg. 2815146294, July 26 ~~October~~ 7, 198892.

(Source: Amended at 17 Ill. Reg. _____, effective _____, 1993)

TITLE 35: ENVIRONMENTAL PROTECTION
SUBTITLE G: WASTE DISPOSAL
CHAPTER I: POLLUTION CONTROL BOARD
SUBCHAPTER d: UNDERGROUND INJECTION CONTROL AND UNDERGROUND
STORAGE TANK PROGRAMS

PART 738
HAZARDOUS WASTE INJECTION RESTRICTIONS

SUBPART A: GENERAL

Section
738.101 Purpose Scope and Applicability
738.102 Definitions
738.103 Dilution Prohibited as a Substitute for Treatment
738.104 Case-by-Case Extensions of an Effective Date
738.105 Waste Analysis

SUBPART B: PROHIBITIONS ON INJECTION

Section
738.110 Waste Specific Prohibitions - Solvent Wastes
738.111 Waste Specific Prohibitions - Dioxin-Containing Wastes
738.112 Waste Specific Prohibitions - California List Wastes
738.114 Waste Specific Prohibitions - First Third Wastes
738.115 Waste Specific Prohibitions - Second Third Wastes
738.116 Waste Specific Prohibitions - Third Third Wastes
148.117 Waste-Specific Prohibitions - Newly-Listed Wastes

SUBPART C: PETITION STANDARDS AND PROCEDURES

Section
738.120 Petitions to Allow Injection of a Prohibited Waste
738.121 Required Information to Support Petitions
738.122 Submission, Review and Approval or Denial of Petitions
738.123 Review of Adjusted Standards
738.124 Termination of Adjusted Standards

AUTHORITY: Implementing Section 13 and 22.4 and authorized by Section 27 of the Environmental Protection Act (Ill. Rev. Stat. 1991, ch. 111 1/2, pars. 1013, 1022.4 and 1027) [415 ILCS 5/13, 22.4 and 27].

SOURCE: Adopted in R89-2 at 14 Ill. Reg. 3059, effective February 20, 1990; amended in R89-11 at 14 Ill. Reg. 11948, effective July 9, 1990; amended in R90-14 at 15 Ill. Reg. 11425, effective July 24, 1991; amended in R92-13 at 17 Ill. Reg. 6190, effective April 5, 1993; amended in R93-6 at 17 Ill. Reg. _____, effective _____, 1993.

SUBPART A: GENERAL

Section 738.101 Purpose Scope and Applicability

- a) This Part identifies hazardous wastes that are restricted from disposal into Class I hazardous waste injection wells and defines those circumstances under which a waste, otherwise prohibited from injection, may be injected.
- b) The requirements of this Part apply to owners or operators of Class I hazardous waste injection wells used to inject hazardous waste.
- c) Wastes otherwise prohibited from injection may continue to be injected:
 - 1) If an extension from the effective date of a prohibition has been granted pursuant to Section 738.104; or
 - 2) If an adjusted standard has been granted in response to a petition filed under Section 738.120; or
 - 3) If the waste is generated by a conditionally exempt small quantity generator, as defined in 35 Ill. Adm. Code 721.105.
- d) Wastes that are hazardous only because they exhibit a hazardous characteristic, and which are otherwise prohibited from injection under this Part, are not prohibited from injection if the wastes:
 - 1) Are disposed into a Class I nonhazardous waste injection well or Class I hazardous waste injection well, as such are defined under 35 Ill. Adm. Code 730.106(a); and
 - 2) Do not exhibit any prohibited characteristic of hazardous waste identified in 35 Ill. Adm. Code 721.Subpart C at the point of injection.

BOARD NOTE: The exemption for injection of diluted hazardous waste in this subsection ~~is~~ was the subject of ~~pending~~ pending litigation in Chemical Waste Management et al. v. USEPA, 976 F.2d 2 (D.C. Cir. 1992) (USEPA reversed significant in part), decided September 25, 1992, in the U.S. Court of Appeals for the District of Columbia. This litigation may result in the repeal or modification of 40 CFR 148.1(d), from which this

subsection is derived. The Board views any federal court decision on the effectiveness or enforceability of the USEPA rule as binding on this subsection.

BOARD NOTE: Derived from 40 CFR 148.1 (1991~~2~~), as amended at 57 Fed. Reg. ~~80883~~1963 (July 20, March 6, 1992).

(Source: Amended at 17 Ill. Reg. _____, effective _____, 1993)

SUBPART B: PROHIBITIONS ON INJECTION

Section 148.117 Waste-Specific Prohibitions - Newly-Listed Wastes

a) The wastes specified in 35 Ill. Adm. Code 721.Subpart D by the following EPA Hazardous Waste numbers are prohibited from underground injection:

- F037
- F038
- K107
- K108
- K109
- K110
- K111
- K112
- K117
- K118
- K123
- K124
- K125
- K126
- K131
- K136
- U328
- U353
- U359

b) Effective June 30, 1995, the wastes specified in 35 Ill. Adm. Code 721.Subpart D by the following EPA Hazardous Waste numbers are prohibited from underground injection:

- K117
- K118
- K131
- K132

c) The requirements of subsections (a) and (b) above do not apply:

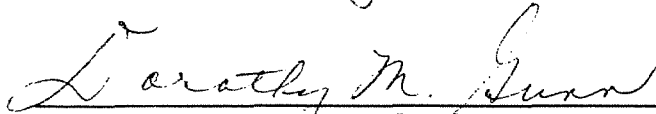
- 1) If the wastes meet or are treated to meet the applicable standards specified in 35 Ill. Adm. Code 728.Subpart D; or
- 2) If an adjusted standard has been granted in response to a petition under Subpart C of this Part; or
- 3) During the period of extension of the applicable effective date, if an extension is granted under Section 738.104.

BOARD NOTE: Derived from 40 CFR 148.17, as added at 57 Fed. Reg. 37263 (Aug. 18, 1993).

(Source: Added at 17 Ill. Reg. _____, effective _____, 1993)

IT IS SO ORDERED.

I, Dorothy M. Gunn, Clerk of the Illinois Pollution Control Board, hereby certify that the above opinion and order was adopted on the 20th day of May, 1993, by a vote of 6-0.



Dorothy M. Gunn, Clerk
Illinois Pollution Control Board