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6263.

DEPARTMENT OF THE NAVY

NAVAL FACILITIES ENGINEERING COMMAND

200 STOVALL STREET

ALEXANDRIA, VA 22332-2300

5090
181A
13 SEP 1988

From: Commander, Naval Facilities Engineering Command

Subj: ENVIRONMENTAL PROTECTION AGENCY (EPA) FINAL RULES ON POLYCHLORINATED BIPHENYLS (PCB)

Encl: (1) Major Provisions of Final Rule Amending 40 CFR 761, Polychlorinated Biphenyls in Electrical Transformers (Federal Register of 19 July 1988)
(2) Major Provisions of Final Rule Amending 40 CFR 761, Polychlorinated Biphenyls; Exclusions, Exemptions and Use Authorizations (Federal Register of 27 June 1988)
(3) Federal Register, 19 July 1988, pages 27322 through 27329
(4) Federal Register, 27 June 1988, pages 24206 through 24221

1. The Environmental Protection Agency (EPA), through two separate Federal Register actions, recently amended existing regulations concerning polychlorinated biphenyls (PCBs). Enclosures (1) and (2) summarize these amended rules. Enclosures (3) and (4) provide the complete Federal Registers amending the regulations.

2. Our point of contact for PCB matters is Barbara Sparks, Code 181A, Autovon 221-8531/8176 or Commercial (202) 325-8531/8176.

T. J. Zagrobelny

T. J. ZAGROBELNY,
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Subj: ENVIRONMENTAL PROTECTION AGENCY (EPA) FINAL RULES ON POLYCHLORINATED BIPHENYLS (PCB)

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MAJOR PROVISIONS OF FINAL RULE AMENDING 40 CFR 761, POLYCHLORINATED BIPHENYLS IN ELECTRICAL TRANSFORMERS, FEDERAL REGISTER OF 19 JULY 1988

Reference: (a) CNO ltr 5090, Ser 451/5U395842 of 18 Oct 85

1. Installation of PCB Transformers: After 1 Oct 1985, you cannot install PCB transformers in or near commercial buildings, except for the following two cases:

a. In emergency situations, PCB transformers may be installed until 1 Oct 1990. These transformers may only be used for 1 year or until 1 Oct 1990, whichever is earlier. For example, this means that if you install a PCB transformer in a commercial building (emergency situation) on 25 September 1990, it must be removed within 5 days. The owner must maintain documentation on the emergency installation. 40 CFR 761.30(a)(1)(iii)(B)(1) gives specifics on this documentation. If emergency installation occurred between 1 Oct 1985 and 1 Sep 1988, the transformer owner must notify the EPA Regional Administrator in writing by 3 Oct 1988. This notification must include the documentation information required by 40 CFR 761.30(a)(1)(iii)(B)(1). EPA defines "emergency situation" as when immediate transformer replacement is needed to continue service to power users and neither a non-PCB transformer nor a PCB-contaminated transformer is readily available for installation (i.e., available within 24 hours).

b. Retrofilled PCB transformers may be installed for purposes of reclassification until 1 Oct 1990. The EPA defines "retrofill" as removing PCB or PCB-contaminated dielectric fluid and replacing it with either PCB, PCB-contaminated, or non-PCB dielectric fluid. Retrofilled transformers may be used for 18 months after installation or until 1 Oct 1990, whichever is earlier. For example, a retrofilled transformer installed on 25 Sept 1990 must be removed on 1 Oct 1990. If the transformer is reclassified, that is, tested after 3 months of operation and found to be PCB-contaminated or non-PCB, the transformer may be left in place after the 18 month/1 Oct 1990 deadline. Transformer owners must maintain the documentation specified in 40 CFR 761.30(a)(1)(iii)(C)(1). If PCB transformers were installed for reclassification between 1 Oct 1985 and 1 Sep 1988, the transformer owner must notify the EPA Regional Administrator in writing by 3 Oct 1988. This notification must include the documentation information required by 40 CFR 761.30(a)(1)(iii)(C)(1).

Note that EPA makes an exception for retrofilled "mineral oil PCB transformers." EPA defines a mineral oil PCB transformer as any transformer that was originally designed to contain mineral oil dielectric fluid and which has been tested and found to contain 500 ppm or greater PCB. Retrofilled mineral oil PCB transformers may be installed for reclassification purposes indefinitely after 1 Oct 1990.

2. Radial PCB transformers in or near commercial buildings must, by 1 Oct 1990, be equipped with electrical protection against transformer ruptures caused by both high current faults and sustained low current faults.

Encl 3

3. Higher secondary voltage network PCB transformers in or near commercial buildings must, by 1 Oct 1990, be removed or reclassified to PCB-contaminated or non-PCB status. (This is a requirement of the July 1985 PCB fire rule amendments and was not changed by the July 1988 amendments.)

4. Lower secondary voltage network PCB transformers in or near commercial buildings, but not in sidewalk vaults must meet one of the following two requirements:

a. By 1 Oct 1990 must be equipped with electrical protection against transformer ruptures caused by high current faults, or

b. By 1 Oct 1993 must be removed from service.

As of 1 Oct 1990, if the owner has not provided electrical protection for the transformers in this category, he must register them in writing with the EPA Regional Administrator. 40 CFR 761.30 (a)(1)(iv)(C) specifies information to be provided.

5. Lower secondary voltage network PCB transformers in sidewalk vaults near commercial buildings must be removed from service by 1 Oct 1993.

6. Mineral oil transfomers: If the owner assumed that a mineral oil transformer contained less than 500 ppm PCB (as allowed by the regulations), then tested the transformer and found that it contained 500 ppm or more PCB, the transformer then becomes subject to all requirements for PCB transformers given in 40 CFR 761. 40 CFR 761.30 (a)(1)(xv)(A) through (J) provides a schedule of compliance efforts needed for such transformers.

7. Alternate marks for PCB transformer locations (vault doors, machinery room doors, fences, hallways, etc) are allowed if a program using these marks was initiated prior to 15 Aug 1985 and if other specific requirements are met. 40 CFR 761.40 (j) provides these requirements.

Note: Per reference (a), for Navy purposes "in or near commercial buildings" means within the interior of, on the roof of, attached to the exterior wall of, in an adjacent parking area serving, or within 30 meters of a non-industrial non-substation building. Commercial buildings include: (1) civilian or Navy personnel assembly buildings, (2) educational properties, (3) institutional properties (including museums, hospitals, clinics), (4) residential properties (living quarters), (5) stores, (6) office buildings (including administrative buildings), and (7) transportation centers (including airport terminal buildings, subway stations, bus stations, or train stations).

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MAJOR PROVISIONS OF FINAL RULE AMENDING 40 CFR 761, POLYCHLORINATED BIPHENYLS; EXCLUSIONS, EXEMPTIONS AND USE AUTHORIZATIONS, FEDERAL REGISTER OF 27 JUNE 1988

Reference: (a) Fonecon btwn Barbara Sparks (NAVFAC 181A) and Art Johnston (NEHC OOD) of 8 Sept 1988

1. Materials contaminated from spills from an item containing 50 or more ppm PCB: These materials (including equipment and structures) may be used and distributed in commerce provided they are decontaminated in accordance with applicable EPA spill cleanup policies.

2. Used oil to be marketed and burned for energy recovery: The rule establishes restrictions and recordkeeping requirements for marketers and burners if the used oil contains any quantifiable level (that is, 2 ppm or greater) of PCBs. Used oil is presumed to contain quantifiable levels of PCB unless the marketer obtains analyses or other evidence that the used fuel oil does not contain quantifiable levels of PCBs.

3. Workers servicing heat transfer and hydraulic systems containing PCBs: EPA removed the regulatory requirement that owners of the systems provide, and workers wear, Viton elastomer gloves when performing maintenance work on heat transfer systems and hydraulic systems containing PCBs. Note that, per reference (a), protective gloves should still be worn for this work. The Navy Environmental Health Center (NEHC) recommends Nitrile gloves. If conditions require greater manual dexterity than can be achieved with Nitrile gloves, Viton elastomer gloves may still be worn. However, they are more expensive than Nitrile gloves.

Federal Register

Tuesday
July 19, 1988

Doc NO: CLES - 00549 - 12.02 - 09/13/88

Part VI

Environmental Protection Agency

40 CFR Part 761
Polychlorinated Biphenyls in Electrical Transformers; Final Rule

Enclosure (3)

Doc NO: CLEJ-00549-12.02-09/13/88

ENVIRONMENTAL PROTECTION AGENCY

40 CFR Part 761

[OPTS-62035G; FRL 3366-6]

Polychlorinated Biphenyls in Electrical Transformers

AGENCY: Environmental Protection Agency (EPA).

ACTION: Final rule.

SUMMARY: EPA issued a proposed rule, published in the Federal Register of August 21, 1987 (52 FR 31738) which proposed amendments to the rules governing the use of polychlorinated biphenyls (PCBs) in transformers. Among other things, this document finalizes those amendments which are related to the installation of PCB Transformers for emergency or reclassification situations and, with modification, the use of an alternative label on PCB Transformer locations. It also modifies some existing enhanced electrical protection requirements on lower secondary voltage network transformers, and sets guidelines for bringing PCB Transformers previously assumed to be PCB-contaminated transformers into compliance with all applicable regulations. This document reflects changes made in response to comments on the proposed rule.

DATE: In accordance with 40 CFR 23.5 (50 FR 7271), this rule shall be promulgated for purposes of judicial review at 1 p.m. Eastern Daylight Time on August 2, 1988. These amendments shall be effective September 1, 1988.

FOR FURTHER INFORMATION CONTACT: Michael M. Stahl, Acting Director, TSCA Assistance Office (TS-799), Office of Toxic Substances, Environmental Protection Agency, Rm. EB-44, 401 M Street SW., Washington, DC 20460, (202-554-1404), TDD-(202-554-0551).

SUPPLEMENTARY INFORMATION: Section 6(e) of the Toxic Substances Control Act (TSCA) generally prohibits the use of PCBs after January 1, 1978. The statute does, however, set forth two exceptions under which EPA may, by rule, allow a particular use of PCBs to continue. Under section 6(e)(2) of TSCA, EPA may allow PCBs to be used in a totally enclosed manner. TSCA also allows EPA to authorize the use of PCBs in a manner other than a totally enclosed manner if the Agency finds that the use "will not present an unreasonable risk of injury to health or the environment."

Public reporting burden for this collection of information is estimated to average 188 minutes per response, including time for reviewing instructions, searching for existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding the burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Chief, Information Policy Branch, PM-223, U.S. Environmental Protection Agency, 401 M Street SW., Washington, DC 20460; and to the Office of Information and Regulatory Affairs, Office of Management and Budget, Washington, DC 20503.

I. Background

EPA promulgated a rule, which was published in the Federal Register of May 31, 1979 (44 FR 31514), to implement section 6(e) (2) and (3) of TSCA under 40 CFR Part 761. The rule, among other things, designated all intact, nonleaking capacitors, electromagnets, and transformers, other than railroad transformers, as "totally enclosed," thus permitting their use without specific authorizations or conditions. The Environmental Defense Fund (EDF) petitioned the U.S. Court of Appeals for the District of Columbia Circuit to review a number of provisions of the rule, including the portion of the rule that designated all intact and nonleaking capacitors, electromagnets, and transformers as "totally enclosed" (*Environmental Defense Fund, Inc.* v. *Environmental Protection Agency*, 636 F.2d 1267).

On October 30, 1980, the court, among other things, decided that there was insufficient evidence in the record to support the Agency's classification of transformers, capacitors, and electromagnets as totally enclosed. The court invalidated this portion of the rule and remanded the rule to EPA for further action.

As a consequence of the October 1980 decision, EPA undertook a number of rulemaking actions. One such rule was published in the Federal Register of August 25, 1982 (47 FR 37342) (hereafter, "PCB Electrical Use Rule"). This rule authorized, among other things, the continued use, until October 1, 1985, of PCB Transformers (electrical transformers containing greater than 500 ppm PCBs) in facilities involved in the handling of food or feed items, and authorized for the remainder of their useful life, the use of all other categories of non-railroad electrical transformers containing or contaminated with PCBs. In the PCB Electrical Use Rule, EPA made a determination that authorizing the use of these transformers for the remainder of their useful life (subject to certain conditions) did not present an unreasonable risk to public health or the environment. EPA's August 1982 decision to allow the continued use of electrical transformers containing PCBs was based on the reported low frequency of leaks and spills of PCBs from this equipment compared to the high costs associated with replacing this equipment with substitute transformers or requiring secondary containment to limit the spread of spilled materials. EPA determined that the most cost-effective means for reducing the risks posed by leaks and spills of PCBs from these transformers was to require routine inspections, repairs, and cleanup.

After promulgation of the PCB Electrical Use Rule, additional information came to EPA's attention which indicated that fires involving transformers that contain PCBs may occur more frequently than previously expected. Thus, EPA subsequently undertook an evaluation of the fire-related risks posed by the continued use of transformers that contain PCBs, and the costs and benefits of measures designed to reduce those risks. EPA issued a proposed rule, published in the Federal Register of October 11, 1984 (49 FR 39966), which contained EPA's determination that PCB Transformer fires (fires involving transformers containing greater than 500 parts per million (ppm) PCBs), particularly those fires which occur in or near commerical buildings, do present risks to human health and the environment. EPA reached this determination after considering the toxicity of materials which can be formed and released during fires involving this equipment, as well as the potential for human and environmental exposures to these materials from a single incident, and the expected frequency of incidents over the remaining useful life of this equipment.

The Agency issued a final rule, published in the Federal Register of July 17, 1985 (50 FR 29170) (hereafter, the "PCB Transformer Fires Rule") that amended the PCB Electrical Use Rule. The PCB Transformer Fires Rule placed additional restrictions and conditions on the use of PCB Transformers, particularly PCB Transformers located in or near commerical buildings. Among other provisions, EPA banned the further installation of PCB Transformers in or near commercial buildings, required the removal of PCB Transformers that posed particularly high fire-related risks, and required the installation of enhanced electrical protection on all other PCB Transformers located in or near commerical buildings.

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After the promulgation of the PCB Transformer Fires Rule, Mississippi Power Company (hereafter, "Mississippi Power") filed a petition for review of the rule. In the context of settlement negotiations, EPA agreed to issue, for publication in the Federal Register, a notice of interpretation and to propose to amend portions of the PCB Transformer Fires Rule.

EPA issued a Notice of Interpretation of the PCB Transformer Fires Rule, published in the Federal Register of December 31, 1986 (51 FR 47241), that clarified several provisions of the regulations governing the use of electrical transformers containing PCBs. The questions concerned: (1) The PCB Transformer registration requirements; (2) the requirement for the removal of stored combustibles near PCB Transformers; (3) the requirement for the reporting of fire-related incidents to the National Response Center; (4) the definition of commercial building; (5) the status of mineral oil transformers which are found to contain over 500 ppm PCBs; (6) the ban on the installation of PCB Transformers in or near commercial buildings; and (7) the requirement for the labeling of the exterior of PCB Transformer locations.

Mississippi Power also raised additional, more substantive issues regarding EPA's ban on the installation of PCB Transformers, the requirements for enhanced electrical protection of lower secondary voltage network PCB Transformers, and the requirement for the labeling of the exterior of PCB Transformer locations. First, Mississippi Power questioned whether EPA had intended to ban the installation of PCB Transformers in emergency situations (where no other non-PCB substitute is available) and the installation of retrofilled PCB Transformers when installed for purposes of reclassification. Further, Mississippi Power asked EPA to reconsider the requirement for enhanced electrical protection of lower secondary voltage network PCB Transformers because of space constraints in sidewalk vaults, lack of suitable (i.e., waterproof) fuse enclosures, and Mississippi Power's belief that the cost of fuse installation is two to four times higher than EPA originally estimated. Finally, Mississippi Power asked that EPA allow the use of alternative labels on PCB Transformer locations, when such labeling occurred voluntarily prior to the effective date of the PCB Transformer Fires Rule.

EPA evaluated the additional information submitted by Mississippi Power in the context of settlement negotiations and decided that the new information warranted a reconsideration of certain of the Agency's previous determinations. This rule presents the results of the Agency's further evaluations and finalizes, with some modification, the proposed amendments to the requirements of the PCB Transformer Fires Rule.

EPA received 15 comments on the proposed rule, four of which were received after the close of the comment period, October 5, 1987. There were no requests for an informal hearing.

EPA has considered all the comments received in response to the proposed rule (as well as comments received after the close of the comment period) and has modified the final rule where appropriate. Some comments either did not address issues in the proposed amendments, misinterpreted a proposed requirement, or, in one case, raised an interpretive issue, outside the scope of this rule, that cannot be immediately resolved. This issue concerns enhanced electrical protection on radial and low secondary voltage network PCB Transformers. EPA considers the issue outside the scope of the rule because the rule addresses only issues agreed upon in the Settlement Agreement.

In order to reduce the fire-related risks posed by the use of PCB Transformers, the July 1985 Transformer Fires Rule required, among other things, enhanced electrical protection on all radial PCB Transformers and low secondary voltage network PCB Transformers in use in or near commercial buildings by October 1, 1990. The rule called for current-limiting fuses or other equivalent technology which detect high current faults and provide for complete deenergization of the transformer within certain time limitations before transformer rupture occurred. The August 1987 proposed amendment retained that requirement, but offered, as an option to this protection, transformer removal by October 1, 1993.

The interpretive issue raised by two comments suggests that complete deenergization of a faulted transformer is not necessary to achieve the Agency's goal, i.e., to prevent PCB Transformer rupture from a fire-related incident. The argument is that since most PCB Transformers are three-phased with a current-limiting fuse on each phase, and that since most faults are internal faults and limited to one phase, deenergization of the specific faulted phase would achieve the required level of protection against rupture. Thus, these comments maintain that it is not necessary to deenergize the entire transformer.

EPA does not currently have enough information to be certain whether partial deenergization (i.e., of the faulted phase) would suffice in all situations. That is, EPA is not able at this time to state that deenergization of the faulted phase is equivalent (in terms of protection against rupture) to total deenergization of the transformer. EPA suggests that the commentors provide supplementary information so that EPA may resolve this interpretive issue. If EPA finds that deenergization of the faulted phase is equivalent to complete deenergization, EPA will issue an interpretive notice stating so. In the meantime, EPA requires enhanced electrical protection to achieve complete deenergization of a faulted transformer as stated in the July 1985 final rule. EPA has prepared a support document for this rulemaking that responds to those comments that did not result in modification of the rule. This document, entitled "Response to Comments on the Proposed Amendment to the PCB Transformer Fires Proposed Rule, June 1988," is in the public record and is available for review and copying from 8 a.m. to 4 p.m. Monday through Friday, except legal holidays, in Rm. NE-G004, 401 M Street SW., Washington, DC 20460.

For a more detailed discussion of all the issues involved in this rulemaking, see the proposed rule, published at 52 FR 31738, August 21, 1987.

II. Summary Of The Final Rule

Under section 6(e)(2)(B) of TSCA, EPA can authorize a use of PCBs provided that the use "will not present an unreasonable risk of injury to health or the environment." EPA had determined that the use of PCB Transformers until October 1, 1985 in facilities involved in the handling of food and feed items and the use of all other categories of non-railroad electrical transformers containing or contaminated with PCBs for the remainder of their useful lives would not present an unreasonable risk of injury to health or the environment. However, EPA later determined that PCB Transformer fires (fires involving transformers containing greater than 500 ppm PCB), particularly fires which occur in or near commercial buildings, do pose risks to humans and the environment. EPA determined that the continued use of PCB Transformers without additional regulatory control measures would present an unreasonable risk of injury to health and the environment and thus, in the PCB Transformer Fires Rule, imposed further restrictions and conditions on the use of PCB Transformers.

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The PCB Transformer Fires Rule required the marking of the exterior of PCB Transformer locations with the PCB identification label, and prohibited, among other things, the further installation of PCB Transformers (electrical transformers containing 500 ppm or greater PCBs) in or near commercial buildings. The PCB Transformer Fires Rule also placed conditions on the continued use of lower secondary voltage network PCB Transformers in or near commercial buildings by requiring that these transformers be equipped with enhanced electrical protection as of October 1, 1990. Enhanced electrical protection was required by EPA to avoid electrical failures leading to fire-related incidents.

Following promulgation of the PCB Transformer Fires Rule, Mississippi Power filed suit against EPA. In comments submitted in the context of settlement discussion, Mississippi Power asked EPA to consider: (1) Clarifying the current language of the requirements for enhanced electrical protection by substituting the word "rupture" for "failure"; (2) modifying the requirement for enhanced electrical protection of lower secondary voltage network transformers because of space constraints in existing sidewalk vault locations; (3) allowing the installation of PCB Transformers in certain circumstances, such as in emergency situations and for purposes of reclassification; (4) allowing the use of alternative labels in situations where such labeling was voluntarily initiated prior to the effective date of the PCB Transformer Fires Rule; and (5) establishing a specific schedule for bringing mineral oil transformers, which are tested and found to contain 500 ppm or greater PCBs, into compliance with applicable requirements.

After reviewing the new information submitted by Mississippi Power and others, and considering their requests for amendments to the PCB Transformer Fires Rule, EPA determined that the issues raised by Mississippi Power and others warranted further Agency consideration and, therefore, proposed certain amendments to the PCB Transformer Fires Rule. In this document, EPA is amending the regulations that ban the further installation of PCB Transformers in or near commercial buildings and impose certain requirements for enhanced electrical protection, as of October 1, 1990, on lower secondary voltage network PCB Transformers.

EPA is also amending the regulations to allow: (a) The installation of PCB Transformers in emergency situations (when no other non-PCB substitute is available); (b) the installation of retrofilled PCB Transformers for purposes of reclassification; and (c) the use of an alternative label to mark the exterior of certain PCB Transformer locations provided the labeling program meets certain specific requirements. The amendment will also offer owners of lower secondary voltage network PCB Transformers located in or near commercial buildings the option of enhanced electrical protection by October 1, 1990 (as is currently required), or removal by October 1, 1993. Further, EPA is prohibiting the use of lower secondary voltage network PCB Transformers located in sidewalk vaults near commercial buildings as of October 1, 1993.

In the proposed rule, EPA used the term "to register" in connection with notifying fire personnel where PCB Transformers were located. This term was used because legally it means "to record formally and exactly." EPA's enforcement experience with 40 CFR 761.30(a)(1)(vi), however, has demonstrated that some persons have misinterpreted "to register" to allow informal, nonwritten actions in place of a formal written record. To avoid misinterpretation, EPA has made it clear that it interprets this term to mean to inform or notify in writing.

Finally, EPA is amending 40 CFR 761.30(a)(1) (iv) and (v), by deleting the words "failure" and "failures" and substituting the words "rupture" and "ruptures" to avoid ambiguity in the language, and is requiring a specific schedule for bringing mineral oil transformers, found to contain 500 ppm or greater PCBs, into compliance with the applicable regulations.

III. Discussion Of The Final Rule

A. Installation Of PCB Transformers

The PCB Transformer Fires Rule banned the installation of PCB Transformers in or near commercial buildings after October 1, 1985. In the August 21, 1987 proposed rule, EPA proposed to allow the installation of PCB Transformers in or near commercial buildings in two situations that EPA believes warrant special consideration. The first is in emergency situations, where neither a non-PCB Transformer nor PCB-Contaminated transformer is currently available to replace a failed PCB Transformer, and immediate replacement is necessary to continue electrical service to the entity or entities served by the transformer. The second is for purposes of reclassification, so that a retrofilled transformer may accrue the necessary in-service use time to allow reclassification of the unit. As discussed in the proposed rule (52 FR 31742), EPA believes installation of PCB Transformers for these two uses, under the conditions specified, will not present an unreasonable risk to human health or the environment. These provisions, as modified, are in § 761.30(a)(1)(iii) of the final rule.

In order to ensure consistent treatment to those owners who installed PCB Transformers in emergency situations or for reclassification purposes between October 1, 1985 and September 1, 1988, EPA has added § 761.30(a)(1)(iii)(D) to the final rule. Those owners must notify the appropriate Regional Administrator of such installations within 30 days after the effective date of the rule.

1. *Emergency installation.* In the proposed rule, EPA solicited comments on the availability of non-PCB Transformers for use in emergency situations and the ability of power companies to purchase and receive non-PCB Transformers quickly for use in emergency situations. This information was requested since various electric power companies had indicated replacement non-PCB Transformers were not readily available. EPA received a comment confirming their non-availability; therefore, EPA assumes that non-PCB Transformers or PCB-Contaminated transformers are typically neither readily available for installation nor can they be quickly acquired. The final rule retains the proposed provisions on installation of PCB Transformers in emergency and reclassification situations in § 761.30(a)(1)(iii)(A).

The proposed rule required documentation to support an "Emergency Situation" in accordance with the definition in § 761.3. There was no comment on maintaining documentation. For compliance monitoring purposes, EPA is adding to the final rule the requirement that documentation be completed 30 days after installation and be maintained at the owner's facility. The documentation required to show an "Emergency Situation" is set forth in the final rule in § 761.30(a)(1)(iii)(B)(*1*) (*i*) through (*vi*).

EPA received a comment on the proposed amendment as to whether a PCB Transformer installed in an emergency situation could then be subsequently reclassified to non-PCB or PCB-Contaminated transformer status. EPA's response is that a transformer, originally installed in an emergency situation, can be subsequently reclassified if the reclassification to non-

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PCB or PCB-Contaminated status is completed within the 1 year allowed for a transformer originally installed in an emergency situation or by October 1, 1990, whichever is earlier. If the transformer cannot be reclassified in 1 year or by October 1, 1990, whichever is earlier, the transformer must be removed from service since it was originally installed in an "Emergency Situation" as defined in § 761.3. In the final rule, this requirement is in § 761.30(a)(1)(iii)(B)(3).

2. *Installation for reclassification purposes.* Although the current regulation prohibits the replacement of a failed PCB Transformer with another PCB Transformer in or near a commercial building, EPA believes that retrofilling and reclassification should be available as a viable option for this equipment. EPA has typically encouraged retrofilling and reclassification and believes that the benefits of reclassification in certain situations approach the benefits of PCB Transformer replacement.

Thus, EPA reconsidered its determination to ban further installation of PCB Transformers as of October 1, 1985 and proposed extending the effective date to allow the installation until October 1, 1990 of retrofilled PCB Transformers so that these units may accrue the necessary in-service use time to allow for reclassification. The final rule requires documentation of the installation of PCB Transformers for reclassification purposes to be maintained on the owner's premises in § 761.30(a)(1)(iii)(C)(1) (*i*) through (*iv*).

EPA solicited comments on the time needed to achieve reclassification. EPA received comments that reclassification to a non-PCB or PCB-Contaminated transformer can take as long as 3 years. However, EPA believes that 18 months provide sufficient time to reclassify a retrofilled PCB Transformer to a non-PCB or, at least, a PCB-Contaminated status and added that time period to the final rule in § 761.30(a)(1)(iii)(C)(2). EPA believes that the benefits of allowing the use of a PCB Transformer for this very limited time outweigh the potential risks involved. Allowing a retrofilled PCB Transformer to be placed in service for reclassification purposes encourages owners of PCB Transformers to reclassify these units and is consistent with the intent of the rule, which is to phase out gradually the use of PCB Transformers.

Thus, EPA is allowing the installation of retrofilled PCB Transformers until October 1, 1990; however, their in-service time is limited to 18 months after installation or until October 1, 1990, whichever is earlier, to achieve reclassification to a non-PCB or PCB-Contaminated status. Therefore, for practical purposes, a PCB Transformer would have to be installed for reclassification purposes with enough time allowed for it to reach at least the PCB-Contaminated status by October 1, 1990.

EPA has also decided to allow this requirement to apply retroactively to October 1, 1985, for installation of PCB Transformers for emergency and reclassification purposes which has already taken place. Therefore, EPA has provided for these situations in § 761.30(a)(1)(iii)(D) of the final rule. However, those owners who installed PCB Transformers between October 1, 1985, and September 1, 1988, must provide the Regional Administrator, within 30 days after the effective date of this rule, a notice in writing that the PCB Transformer was installed for reclassification purposes. Information to be provided for compliance monitoring purposes includes (1) The date of installation; (2) the type of transformer installed; (3) the PCB concentration, if known, at the time of installation; and (4) the reclassification schedule. These requirements were added in the final rule under § 761.30(a)(1)(iii)(D).

EPA recognizes that there are differences between the installation for reclassification purposes of a retrofilled mineral oil PCB transformer and an "askarel" PCB Transformer. Since installation of a retrofilled mineral oil PCB transformer would not present an unreasonable risk, EPA proposed that a retrofilled mineral oil PCB transformer could be installed indefinitely after October 1, 1990 for reclassification purposes. Its reclassification to a PCB-Contaminated transformer or a non-PCB transformer status would then be determined by testing its PCB concentration 3 months after its installation for reclassification. There were no comments on this proposal and the provisions are retained in § 761.30(a)(1) (iii)(C)(2)(*ii*) and (iii)(C)(2)(*iii*) of the final rule.

B. Failure vs. Rupture

EPA proposed amending the language in § 761.30(a)(1) (iv), (iv)(A), and (v), by deleting the words "failure" and "failures", and substituting the words "rupture" and "ruptures". The preamble explained the need for this change was to avoid ambiguity; the final rule includes the amendment.

C. Alternative Labeling

EPA proposed to allow the use of an alternative label (other than that required under the current regulation) for marking PCB Transformer locations—vault doors, machinery room doors, fences, hallways, or means of access, other than grates, and manhole covers. While EPA is interested in a consistent nationwide labeling system, EPA believes that those who voluntarily initiated labeling programs after consultation with local emergency response organizations should not be required to incur the additional expense associated with relabeling. There were no comments on this issue; however, internal EPA review and reevaluation resulted in some minor modifications to the proposal. When EPA proposed to allow the use of alternative marks, the Agency intended to limit this use to situations where a company can demonstrate that a local fire department knows and recognizes the alternative. For purposes of clarity for this rule, EPA intends that recognizing an alternative mark means to be able to identify it and know its meaning. Implicit in recognizing the use of the mark is the necessity that the local fire department has accepted the use of the mark, i.e., taken steps to make personnel aware of the mark by incorporating it into a formal or informal program used to make essential information available to fire department personnel. Thus, EPA is modifying the final rule to require that the company show specifically that the local fire department accepted the use of the mark by incorporating it into its training program. The use of the term "accept" in the final rule does not require any showing that the fire department has approved the mark, only that it has incorporated the use of the mark into its response procedures and training.

Alternative labeling, including the notification provisions, is retained in the final rule in § 761.40. Implicit in the proposed notification to the Regional Administrator was the authority to reject the alternative labeling if it is not substantiated as required. The final rule makes this authority explicit in § 761.40(j)(2)(iv). Also, to facilitate compliance monitoring and enforcement, the final rule requires documentation from the fire department with primary jurisdiction indicating the unit is aware of the alternative mark, accepts its use, and has incorporated it into its training materials. The final rule does require the Regional Administrator either to approve or disapprove in writing the use of an alternative label within 30 days of receipt of the documentation of a program.

D. Electrical Protection

EPA proposed to amend the electrical protection requirements on lower

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secondary voltage network PCB Transformers. For lower secondary voltage network PCB Transformers located in sidewalk vaults near commercial buildings, EPA proposed requiring the removal of these tranformers by October 1, 1993. (See discussion in Unit III.E. below.) For all other lower secondary voltage network PCB Transformers in or near commercial buildings, the proposed rule offered owners an option to the current requirement for enhanced electrical protection by October 1, 1990. This option is the removal of this equipment by October 1, 1993, provided that EPA is notified of the pending removal by no later than October 1, 1990. In short, EPA proposed to give owners of lower secondary voltage network PCB Transformers located in or near commercial buildings (in other than sidewalk vault locations) the option of implementing risk reduction measures on a shorter schedule, by complying with the current requirement to install enhanced electrical protection by October 1, 1990, or by removing the PCB Transformers by October 1, 1993. As discussed in the proposed rule (52 FR 31743), EPA believes that neither of these options will present an unreasonable risk to human health or the environment. EPA also proposed to require those owners who choose to remove this equipment by October 1, 1993, to register in writing those transformers with the EPA Regional Administrator in the appropriate region by October 1, 1990. This would provide the Regional Administrator with the information needed to facilitate compliance monitoring efforts. There were no comments on this provision and the final rule incorporates it in § 761.30(a)(1)(iv)(C).

E. Phaseout of Lower Secondary Voltage Network PCB Transformers in Sidewalk Vaults

Under the current PCB regulations, as of October 1, 1990, EPA prohibits the use of all network PCB Transformers with higher secondary voltages, while requiring enhanced electrical protection on the remaining commercial PCB Transformers, including all radial and lower secondary voltage network PCB Transformer.

EPA proposed requiring that owners of lower secondary voltage network PCB Transformers located in sidewalk vaults near commercial buildings remove those transformers from service by October 1, 1993. In the proposed rule, EPA did not give those owners the option available to owners of lower secondary voltage network PCB Transformers located [illegible] sidewalk vault, either to remove these tranformers from service or to install enhanced electrical protection.

While EPA recognizes that allowing the use of this equipment until October 1, 1993 (an additional 3 years), without installing enhanced electrical protection poses some risk, EPA believes that phaseout of an additional class of tranformers above those currently required to be phased out, further minimizes the risk of fire-related events involving PCB Transformers. EPA continues to prefer the regulatory option of transformer removal because it completely eliminates PCB Transformer fire-related risk, as well as the risks posed by leaks and spills of PCBs from these transformers. Thus, although there is some risk in allowing additional time to phase out this equipment, EPA believes the benefits of removing these PCB-containing transformers from service, thus eliminating any potential risk of PCB exposure, outweighs the risks incurred by allowing the use of these tranformers for an additional 3 years. Further, EPA has determined that requiring phaseout of those tranformers in sidewalk vaults would be practical since owners of this equipment express an interest in removing rather than installing enhanced electrical protection and EPA has already determined that for this type of equipment some risk reduction measure must be implemented.

There was no comment on the proposed amendment of the date for removal of these tranformers and the provision remains in the final rule in § 761.30(a)(1)(iv)(B).

F. Discovery of a PCB Transformer

EPA proposed that in the event a mineral oil transformer, assumed to contain less than 500 ppm of PCBs under § 761.3, is determined through testing to be contaminated at 500 ppm or greater, efforts must be initiated immediately to bring the transformer into compliance in accordance with Part 761. The proposed rule contained a schedule for achieving such compliance and solicited comments on the time frames.

Two comments asked for a clarification regarding compliance with the recordkeeping and reporting requirements, specifically, whether records and reports had to be developed for the transformer while it was assumed to be below 500 ppm. It is not EPA's intention to require owners to develop records retroactively relating to the newly discovered PCB Transformer. EPA is requiring that, after discovering that a mineral oil transformer is a PCB Transformer (and transformer that contains 500 ppm PCB or greater), the owner of the transformer comply with the schedule for bringing the transformer into compliance.

Comments indicated that anywhere from 2 to 15 days would allow ample time to purchase and affix labels to transformers, vault doors, machinery room doors, fences, hallways or other means of access to the PCB Transformer. Therefore, EPA is implementing in the final rule a 7-day period to mark the newly discovered PCB Transformer and transformer locations with the appropriate label, in § 761.30(a)(1)(xv) (B) and (C).

Comments received on the proposed rule agreed with EPA that 30 days was a reasonable amount of time to complete the written registration of the newly discovered PCB Transformer with appropriate fire response personnel and building owners. Therefore, in § 761.3)(a)(1)(xv)(D) the final rule allows 30 days after the transformer is tested and found to contain greater than 500 ppm PCBs to register the transformer.

No other comments were received on the proposed schedule, and the final rule incorporates the other provisions as proposed.

G. Other Changes

Three other minor changes were made to the proposed rule for the purpose of clarification. The first is the addition of the definition of "Retrofill" to § 761.3 to make clear that it means the draining and refilling of a transformer. The second is in paragraph (2) of the definition "Emergency Situation" under § 761.3 which has been changed to indicate that immediate replacement must be necessary for continued service to "power users" rather than "utility customers." The third is in § 761.40(j)(3) where paragraph (j)(1) is referenced to indicate clearly the locations where the marking labels must be placed.

Finally, one comment indicated there could be confusion where phase-out of a PCB Transformer is required and reclassification has been achieved. EPA agrees that a PCB Transformer that has been retrofilled and reclassified to PCB-Contaminated or non-PCB status in accordance with the TSCA regulations meets the requirement for phase-out of a PCB Transformer.

IV. The Record For This Rule

A. Previous Rulemaking Record

(1) Official rulemaking record from "Polychlorinated Biphenyls in Electrical Transformers" Final Rule, published in the Federal Register of July 17, 1985 (50 FR 29170).

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(2) Official Record from "Notice of Interpretation of Transformer Fires Regulations," published in the Federal Register of December 31, 1986 (51 FR 47241).

(3) Official Record from "Polychlorinated Biphenyls in Electrical Transformers" Proposed Rule, published in the Federal Register of August 21, 1987 (52 FR 31738). FR 31736).

B. Support Documents

(4) USEPA, OPTS, EED, Putnam, Hayes and Bartlett, Inc. "Evaluation of the Sufficiency of Current and Projected PCB Disposal Capacity To Meet Demand Requirements," July 1986.

(5) USEPA, EED, "Response to Comments on the Proposed Amendment to the PCB Transformer Fires, Rule," June 1988.

(6) Letters received from:

a. Kansas City Power and Light dated September 11, 1985.

b. Electric Power Board of Chattanooga dated October 3, 1985.

c. UNISON Transformer Services, Inc. dated March 24, 1988.

(7) Correspondence between EPA and the National Bureau of Standards:

a. Letter to Richard W. Bukowski, Center for Fire Research, Fire Science and Engineering Division, National Bureau of Standards, Gaithersburg, Maryland, dated March 29, 1988.

b. Response from Richard W. Bukowski, dated April 18, 1988.

(8) Reports from Resource Planning Corporation submitted to Utility Solid Waste Activities Group, dated January 6, and 8, and April 23, 1986.

(9) Telephone communications between:

a. Joseph Arcoleo of Jersey Central Power and Light Company and Thomas Simons, Office of Toxic Substances, EPA, on November 18, 1987, on the time between installation for reclassification of a PCB Transformer and actual retrofilling.

b. Joseph Willoughby of the General Services Administration and Thomas Simons, Office of Toxic Substances, EPA, on December 15, 1987, on deenergization of PCB Transformers through the use of current-limiting fuses.

10. Communication between Chicago Fire Department and Commonwealth Edison Co.:

a. Letter to H.A. Onishi, Commonwealth Edison Co., from John M. Eversole, Chicago Fire Department, dated February 14, 1984.

b. Letter to Louis T. Galante, Chicago Fire Department, from H.A. Onishi, Commonwealth Edison Co., dated September 23, 1985.

c. Letter to H.A. Onishi, Commonwealth Edison Co., from Thomas D. Roche, Chicago Fire Department.

V. Regulatory Requirements

A. Executive Order 12291

Under Executive Order 12291, issued February 17, 1981, EPA must judge whether a rule is a "major rule" and, therefore, subject to the requirement that a regulatory impact analysis be prepared. EPA has determined that this amendment to the PCB Rule is not a "major rule" as that term is defined in section 1(b) of the Executive Order and therefore is not subject to the requirement that a regulatory impact analysis be prepared.

While the rule places some additional restrictions and conditions on the use of PCB Transformers, it is worth noting that this rule allows the continued use of PCBs in electrical transformers that would otherwise be prohibited by section 6(e) of TSCA. This rule avoids the severe disruption of electric service to the public and industry that would occur if the use of this equipment were immediately prohibited. It also avoids the economic impact that would result from a requirement to replace the equipment as soon as possible.

This rule was submitted to OMB as required by Executive Order 12291. There were no comments from OMB on the rule.

B. Regulatory Flexibility Act

Under section 605(b) of the Regulatory Flexibility Act, 5 U.S.C. 605(b), the Administrator may certify that a rule will not, if promulgated, have a significant impact on a substantial number of small entities and, therefore, does not require a regulatory flexibility analysis.

In general this rule reduces the burden on small businesses that would otherwise be encountered if an immediate ban on PCB-containing transformers were to take effect. If an immediate ban on the use of PCBs in transformers were imposed, large costs would be incurred by all producers and users of electricity, including small businesses.

EPA certifies that this rule will not have a significant economic impact on a substantial number of small entities.

C. Paperwork Reduction Act

The Paperwork Reduction Act of 1980 (PRA), 44 U.S.C. 3501 et seq., authorizes the Director of OMB to review certain information collection requests by Federal agencies. EPA has determined that the recordkeeping and reporting requirements of this final rule constitute a "collection of information" as defined in 44 U.S.C. 3502(4). The provisions of 40 CFR 761.30 authorize the continued use of electrical equipment under certain circumstances which require recordkeeping and reporting. EPA has clearance to collect information for this authorization under OMB control numbers 2070-0003 and 2070-0073. Under the normal OMB information collection review cycle, 2070-0003 and 2070-0073 are being consolidated, and the notification required in the options allowed under this amendment are included under the consolidated OMB control number 2070-0003 for the use authorization for PCB electrical equipment.

Public reporting burden for this collection of information is estimated to average 188 minutes per response, including time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information.

Send comments regarding the burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Chief, Information Policy Branch, PM-223, U.S. Environmental Protection Agency, 401 M St., SW., Washington, DC 20460; and to the Office of Information and Regulatory Affairs, Office of Management and Budget, Washington, DC 20503, marked "Attention: Desk Officer for EPA."

List of Subjects in 40 CFR Part 761

Environmental protection, Hazardous substances, Labeling, Polychlorinated biphenyls, Reporting and recordkeeping requirements.

Dated: July 6, 1988.

Lee M. Thomas,

Administrator.

Therefore 40 CFR Part 761 is amended as follows:

1. The authority citation for Part 761 continues to read as follows:

PART 761—[AMENDED]

Authority: 15 U.S.C. 2605, 2607, 2611; Subpart G also issued under 15 U.S.C. 2614 and 2616.

2. In § 761.3 by adding the definitions of "emergency situation", "mineral oil PCB Transformer", "non-PCB Transformer", and "retrofill" alphabetically to read as follows:

§ 761.3 Definitions.

* * * * *

"Emergency Situation" for continuing use of a PCB Transformer exists when:

(1) Neither a non-PCB Transformer nor a PCB-Contaminated transformer is

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currently in storage for reuse or readily available (i.e., available within 24 hours) for installation.

(2) Immediate replacement is necessary to continue service to power users.

* * * * *

"Mineral Oil PCB Transformer" means any transformer originally designed to contain mineral oil as the dielectric fluid and which has been tested and found to contain 500 ppm or greater PCBs.

* * * * *

"Non-PCB Transformer" means any transformer that contains less than 50 ppm PCB; except that any transformer that has been converted from a PCB Transformer or a PCB-Contaminated transformer cannot be classified as a non-PCB Transformer until reclassification has occurred, in accordance with the requirements of § 761.30(a)(2)(v).

* * * * *

"Retrofill" means to remove PCB or PCB-contaminated dielectric fluid and to replace it with either PCB, PCB-contaminated, or non-PCB dielectric fluid.

* * * * *

3. In § 761.30 by revising paragraphs (a)(1)(iii), (iv), and (v), by adding paragraph (a)(1)(xv), and by revising the OMB control number to read as follows:

§ 761.30 Authorizations.

* * * * *

(a) * * *

(1) * * *

(iii) Except as otherwise provided, as of October 1, 1985, the installation of PCB Transformers, which have been placed into storage for reuse or which have been removed from another location, in or near commercial buildings is prohibited.

(A) The installation of PCB Transformers on or after October 1, 1985, however, and their use thereafter, is permitted either in an emergency situation, as defined in § 761.3, or in situations where the transformer has been retrofilled and is being placed into service in order to qualify for reclassification under paragraph (a)(2)(v) of this section.

(B) Installation of a PCB Transformer in an emergency situation is permitted when done in accordance with the following:

(1) Documentation to support the reason for the emergency installation of a PCB Transformer must be maintained at the owner's facility and completed within 30 days after installation of the PCB Transformer. The documentation must include, but is not limited to:

(i) The type of transformer, i.e., radial or lower or higher network, that requires replacement.

(ii) The type(s) of transformers, i.e., radial or lower or higher network, that must be used for replacement.

(iii) The date of transformer failure.

(iv) The date of subsequent replacement.

(v) The type of transformer, i.e., radial or lower or higher network, installed as a replacement.

(vi) A statement describing actions taken to locate a non-PCB or PCB-Contaminated transformer replacement.

(2) Such emergency installation is permitted until October 1, 1990, and the use of any PCB Transformer installed on such an emergency basis is permitted for 1 year from the date of installation or until October 1, 1990, whichever is earlier.

(3) PCB Transformers installed for emergency purposes may be subsequently reclassified; however, the transformer must be effectively reclassified to a non-PCB or PCB-Contaminated status within 1 year after installation or by October 1, 1990, whichever is earlier because the transformer was initially installed in an emergency situation.

(C) Installation of a retrofilled PCB Transformer for reclassification purposes is permitted when it is done in accordance with the following:

(1) Those who installed transformers for reclassification purposes must maintain on the owner's premises, completed within 30 days of installation, the following information:

(i) The date of installation.

(ii) The type of transformer, i.e., radial or lower or higher network, installed.

(iii) The PCB concentration, if known, at the time of installation.

(iv) The retrofill and reclassification schedule.

(2) For purposes of this paragraph, the installation of retrofilled PCB Transformers for purposes of reclassification under paragraph (a)(2)(v) of this section is permitted until October 1, 1990.

(i) However, the use of a retrofilled PCB Transformer installed for reclassification purposes is limited to 18 months after installation or until October 1, 1990, whichever is earlier.

(ii) Retrofilled mineral oil PCB Transformers may be installed for reclassification purposes indefinitely after October 1, 1990.

(iii) Once a retrofilled transformer has been installed for reclassification purposes, it must be tested 3 months after installation to ascertain the concentration of PCBs. If the PCB concentration is below 50 ppm, the transformer can be reclassified as a non-PCB Transformer. If the PCB concentration is between 50 and 500 ppm, the transformer can be reclassified as a PCB-Contaminated transformer. If the PCB concentration remains at 500 ppm or greater, the entire process must either be repeated until the transformer has been reclassified to a non-PCB or PCB-Contaminated transformer in accordance with paragraph (a)(2)(v) of this section or the transformer must be removed from service.

(D) Owners who installed PCB Transformers in emergency situations or for reclassification purposes between October 1, 1985 and September 1, 1988 must notify the Regional Administrator in writing by October 3, 1988 of such installation. The notification for emergency installation must include the information in paragraph (a)(1)(iii)(B)(1)(i) through (vi) of this section. The notification for reclassification must include the information in paragraph (a)(1)(iii)(C)(1)(i) through (iv) of this section. All PCB Transformers installed in an emergency situation or installed for reclassification purposes are subject to the requirements of this Part 761.

(iv) As of October 1, 1990, all radial PCB Transformers, in use in or near commercial buildings, and lower secondary voltage network PCB Transformers not located in sidewalk vaults in or near commercial buildings (network transformers with secondary voltages below 480 volts) that have not been removed from service as provided in paragraph (a)(1)(v) of this section, must be equipped with electrical protection to avoid transformer ruptures caused by high current faults.

(A) Current-limiting fuses or other equivalent technology must be used to detect sustained high current faults and provide for complete deenergization of the transformer (within several hundredths of a second in the case of radial PCB Transformers and within tenths of a second in the case of lower secondary voltage network PCB Transformers), before transformer rupture occurs. The installation, setting, and maintenance of current-limiting fuses or other equivalent technology to avoid PCB Transformer ruptures from sustained high current faults must be completed in accordance with good engineering practices.

(B) All lower secondary voltage network PCB Transformers not located in sidewalk vaults (network transformers with secondary voltages below 480 volts), in use in or near commercial buildings, which have not been protected as specified in paragraph

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(a)(1)(iv)(A) of this section by October 1, 1990, must be removed from service by October 1, 1993.

(C) As of October 1, 1990, owners of lower secondary voltage network PCB Transformers, in use in or near commercial buildings which have not been protected as specified in paragraph (a)(1)(iv)(A) of this section and which are not located in sidewalk vaults, must register in writing those transformers with the EPA Regional Administrator in the appropriate region. The information required to be provided in writing to the Regional Administrator includes:

(1) The specific location of the PCB Transformer(s).

(2) The address(es) of the building(s) and the physical location of the PCB Transformer(s) on the building site(s).

(3) The identification number(s) of the PCB Transformer(s).

(D) As of October 1, 1993, all lower secondary voltage network PCB Transformers located in sidewalk vaults (network transformers with secondary voltages below 480 volts) in use near commercial buildings must be removed from service.

(v) As of October 1, 1990, all radial PCB Transformers with higher secondary voltages (480 volts and above, including 480/277 volt systems) in use in or near commercial buildings must, in addition to the requirements of paragraph (a)(1)(iv)(A) of this section, be equipped with protection to avoid transformer ruptures caused by sustained low current faults.

* * * * *

(xv) In the event a mineral oil transformer, assumed to contain less than 500 ppm of PCBs as provided in § 761.3, is tested and found to be contaminated at 500 ppm or greater PCBs, it will be subject to all the requirements of this Part 761. In addition, efforts must be initiated immediately to bring the transformer into compliance in accordance with the following schedule:

(A) Report fire-related incidents, effective immediately after discovery.

(B) Mark the PCB transformer within 7 days after discovery.

(C) Mark the vault door, machinery room door, fence, hallway or other means of access to the PCB Transformer within 7 days after discovery.

(D) Register the PCB Transformer in writing with fire response personnel with primary jurisdiction and with the building owner, within 30 days of discovery.

(E) Install electrical protective equipment on a radial PCB Transformer and a non-sidewalk vault, lower secondary voltage network PCB Transformer in or near a commercial building within 18 months of discovery or by October 1, 1990, whichever is later.

(F) Remove a non-sidewalk vault, lower secondary voltage network PCB Transformer in or near a commercial building, if electrical protective equipment is not installed, within 18 months of discovery or by October 1, 1993, whichever is later.

(G) Remove a lower secondary voltage network PCB Transformer located in a sidewalk vault in or near a commercial building, within 18 months of discovery or by October 1, 1993, whichever is later.

(H) Retrofill and reclassify a radial PCB Transformer or a lower or higher secondary voltage network PCB Transformer, located in other than a sidewalk vault in or near a commercial building, within 18 months or by October 1, 1990, whichever is later. This is an option in lieu of installing electrical protective equipment on a radial or lower secondary voltage network PCB Transformer located in other than a sidewalk vault or of removing a higher secondary voltage network PCB Transformer or a lower secondary voltage network PCB Transformer, located in a sidewalk vault, from service.

(I) Retrofill and reclassify a lower secondary voltage network PCB Transformer, located in a sidewalk vault, in or near a commercial building within 18 months or by October 1, 1993, whichever is later. This is an option in lieu of installing electrical protective equipment or removing the transformer from service.

(J) Retrofill and reclassify a higher secondary voltage network PCB Transformer, located in a sidewalk vault, in or near a commercial building within 18 months or by October 1, 1990, whichever is later. This is an option in lieu of other requirements.

* * * * *

(Approved by the Office of Management and Budget under control number 2070-0003; the recordkeeping requirements of paragraph (a)(1)(xii) were approved by the Office of Management and Budget under control number 2070-0007.)

4. In § 761.40 by revising paragraph (j) to read as follows:

§ 761.40 Marking requirements.

* * * * *

(j) PCB Transformer locations shall be marked as follows:

(1) Except as provided in paragraph (j)(2) of this section, as of December 1, 1985, the vault door, machinery room door, fence, hallway, or means of access, other than grates and manhole covers, to a PCB Transformer must be marked with the mark M_L as required by paragraph (a) of this section.

(2) A mark other than the M_L mark may be used provided all of the following conditions are met:

(i) The program using such an alternative mark was initiated prior to August 15, 1985, and can be substantiated with documentation.

(ii) Prior to August 15, 1985, coordination between the transformer owner and the primary fire department occurred, and the primary fire department knows, accepts, and recognizes what the alternative mark means, and that this can be substantiated with documentation.

(iii) The EPA Regional Administrator in the appropriate region is informed in writing of the use of the alternative mark by October 3, 1988 and is provided with documentation that the program began before August 15, 1985, and documentation that demonstrates that prior to that date the primary fire department knew, accepted and recognized the meaning of the mark, and included this information in firefighting training.

(iv) The Regional Administrator will either approve or disapprove in writing the use of an alternative mark within 30 days of receipt of the documentation of a program.

(3) Any mark placed in accordance with the requirements of this section must be placed in the locations described in paragraph (j)(1) of this section and in a manner that can be easily read by emergency response personnel fighting a fire involving this equipment.

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federal register

Monday
June 27, 1988

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Part V

Environmental Protection Agency

40 CFR Part 761

Polychlorinated Biphenyls; Exclusions, Exemptions and Use Authorizations; Final Rule

Enclosure (4)

DOC NO: CLEJ-00549-12.02-09/13/88

ENVIRONMENTAL PROTECTION AGENCY

40 CFR Part 761

[OPTS-62053A; FLR 3369-2]

Polychlorinated Biphenyls; Exclusions, Exemptions and Use Authorizations

AGENCY: Environmental Protection Agency (EPA).

ACTION: Final rule.

SUMMARY: This final rule amends existing rules controlling the processing, distribution in commerce, and use of PCBs by excluding additional materials containing less than 50 parts per million (ppm) polychlorinated biphenyls (PCBs) from regulation under section 6(e) of the Toxic Substances Control Act (TSCA) which generally prohibits the manufacturing, processing, distribution in commerce, and use of PCBs. EPA has found that activities allowed under this rule will not present unreasonable risks of injury to public health or the environment.

EFFECTIVE DATE: This rule shall be effective July 27, 1988.

FOR FURTHER INFORMATION CONTACT: Michael M. Stahl, Acting Director, TSCA Assistance Office (TS-799), Office of Toxic Substances, Environmental Protection Agency, Rm. EB-44, 401 M St., SW., Washington, DC 20460, (202-554-1404), TDD (202) 554-0551.

SUPPLEMENTARY INFORMATION: EPA is issuing this regulation to:

(1) Eliminate the Viton elastomer glove requirement for workers servicing heat transfer and hydraulic systems.

(2) Allow certain equipment and materials that have been adequately decontaminated to be used and distributed in commerce.

(3) Maintain the 3 parts per billion (ppb) effluent limit for releases from pulp and paper mills.

(4) Allow the use of waste oil containing <50 ppm PCBs as a fuel in certain combustion units.

(5) Exclude from the ban on processing, distribution in commerce, and use, certain products containing <50 ppm PCBs that were "legally" manufactured, processed, distributed in commerce or used prior to October 1, 1984.

I. Background

Section 6(e) of TSCA generally prohibits the manufacture, processing, distribution in commerce, and use of PCBs. Under section 6(e)(2), the Agency may authorize non-totally enclosed uses of PCBs upon a determination that such uses will not present an unreasonable risk of injury to health or the environment. Also, under section 6(e)(3), EPA may by rule grant 1-year exemptions from the general manufacture, processing, and distribution in commerce prohibitions. Such exemptions may be granted where the petitioner can demonstrate:

(1) That the activity to be exempted will not present an unreasonable risk of injury to health or the environment.

(2) That good faith efforts have been made to develop a substitute for PCBs which does not present an unreasonable risk.

In the Federal Register of May 31, 1979 (44 FR 31514), EPA issued its first regulation implementing the TSCA section 6(e)(2) and section 6(e)(3) prohibitions. That first rule (the PCB Ban Rule) included among its provisions a general exclusion from regulation for those activities involving PCBs at levels less than 50 parts per million (ppm). The only exception to the general exclusion for activities involving less than 50 ppm materials was a prohibition on the use of waste oil as a dust suppressant, sealant, or coating. This prohibition applied to waste oils with any detectable levels of PCBs.

The Environmental Defense Fund (EDF) successfully challenged this general 50 ppm regulatory cutoff, and on October 30, 1980, the U.S. Court of Appeals for the District of Columbia Circuit remanded the Ban Rule to EPA for further action consistent with its opinion. The Court determined that there was not substantial evidence in the record which would support the decision to exclude generally from regulation all materials containing PCBs at concentrations less than 50 ppm. The Court stated that a proper exclusion would need to be more finely tailored to the purposes of excluding ambient sources of PCBs, or, be premised upon a finding that the designated cutoff does not present an unreasonable risk of injury to health or the environment. The rulemaking history of the PCB Ban Rule is described in detail in the proposed "Exclusions, Exemptions and Use Authorizations" Rule published July 8, 1987 (52 FR 25838).

On February 20, 1981, the Chemical Manufacturers Association (CMA), EDF, and other industry intervenors in the *EDF* v. *EPA* litigation, filed a joint motion with EPA seeking a stay of the court's mandate. The Court granted the joint motion on April 13, 1981, thereby staying the issuance of its mandate pending the development by EPA of additional regulations concerning PCBs with concentrations less than 50 ppm.

EPA undertook the regulation of PCBs in concentrations less than 50 ppm in two phases. On October 21, 1982, the Agency issued the Closed and Controlled Waste Manufacturing Process Rule (47 FR 46980) which excluded from the general prohibitions a limited number of chemical manufacturing processes defined as "closed" or "controlled waste" processes. These processes either resulted in no PCB releases or releases only in controlled waste streams. In essence, the Closed and Controlled Rule allowed limited new manufacture of PCBs, but only when the PCBs were controlled and not released to the environment.

On July 10, 1984, EPA completed the second phase of rulemaking concerning low concentration PCBs. The "Uncontrolled Rule" (49 FR 28154) was issued regulating manufacturing processes generating low concentration PCBs in other than "closed" and "controlled waste" processes as well as other activities involving previously generated low concentration PCBs. This second Rule excluded from regulation additional manufacturing processes that generated PCBs as byproducts and impurities and allowed the limited recycling of PCBs in the manufacture of asphalt roofing materials and paper products. EPA found that these additional activities could be excluded from the general prohibition on the manufacture, processing, distribution in commerce, and use of PCBs because these other activities do not present an unreasonable risk of injury to public health or the environment.

On October 1, 1984, the date that the Uncontrolled Rule became effective, the court lifted its stay and any activity involving any quantifiable level of PCBs was banned unless EPA had specifically excluded, exempted, or authorized the activity by regulation (49 FR 28173, July 10, 1984).

The practical effect of this action was to make illegal many activities involving previously generated PCBs which were neither anticipated nor specifically evaluated during the development of the Uncontrolled Rule. Many activities involving low concentrations of previously generated PCBs were now prohibited, regardless of the fact that they may have presented no greater risk than certain activities specifically allowed in the July 10, 1984 rule.

Petitions seeking judicial review of the July 10, 1984 rule were filed on September 24, 1984, in the U.S. Court of Appeals for the District of Columbia Circuit by the American Paper Institute (API), the Fort Howard Paper Company (Ft. Howard), the Outboard Marine Corporation (OMC), and the American

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Die Casting Institute (ADCI). The challenges were consolidated for resolution, and the Chemical Manufacturers Association (CMA) entered the litigation as an intervenor and respondent. EPA recognized the concerns of the petitioners, and on August 7, 1986, EPA entered into a settlement agreement. EPA agreed to propose specific amendments to the July 10, 1984 regulation to address the concerns of the petitioners.

EPA proposed, in the Federal Register of July 8, 1987 (52 FR 25838), to amend the July 10, 1984 PCB Rule (the "Uncontrolled Rule") by excluding additional materials from regulation based on EPA's determination that activities involving these materials do not present an unreasonable risk of injury to health or to the environment. In the July 8, 1987 proposed rule, EPA proposed the following amendments to the regulations governing the processing, distribution in commerce, and use of PCBs.

1. To generally authorize the processing, distribution in commerce, and use of products containing less than 50 ppm PCBs provided that the PCBs present in the products were legally manufactured, processed, distributed in commerce, and/or used prior to October 1, 1984. The only exception that EPA proposed to this generic exclusion of activities involving less than 50 ppm PCBs, was to place limitations on the use of oil containing less than 50 ppm PCBs as a fuel. EPA proposed to restrict the burning of oil containing less than 50 ppm PCBs to industrial boilers and furnaces, which EPA believes, as a class, will provide for more efficient combustion than nonindustrial boilers and furnaces.

2. To authorize the distribution in commerce of equipment and other materials contaminated with PCBs from a spill, provided that such materials are decontaminated in accordance with EPA's applicable PCB spill cleanup policies.

3. To eliminate the water discharge limit of less than 3 micrograms per liter (3 ug/L), roughly 3 parts per billion (ppb), for total Aroclors leaving a paper processing site.

4. To eliminate the requirement that owners of hydraulic and heat transfer systems provide Viton elastomer gloves for workers servicing this equipment, and that workers wear these gloves when servicing heat transfer and hydraulic systems.

Of the proposed amendments, the proposal to generally authorize the processing, distribution in commerce, and use of products containing less than 50 ppm PCBs (with a restriction on the use of oil containing less than 50 ppm as a fuel in nonindustrial boilers) was the most significant of the July 8, 1987 proposals and drew the most comment. The Agency invited comments on various aspects of its proposal regarding products containing less than 50 ppm PCBs, including the exposure assessment that supports the Agency's decision to prohibit the burning of low-concentration PCB waste oil in nonindustrial boilers and furnaces. In the proposed rule, EPA indicated that it would use any new information submitted to the Agency to reconsider the appropriateness of its approach concerning the burning of oil containing less than 50 ppm PCBs as a fuel, with the option of excluding all used oil products (with less than 50 ppm PCBs) from regulation, without any restrictions on burning or other recycling activities.

EPA received over 40 comments during the public comment period which closed on September 8, 1987. EPA received comments from a number of different sources, including electrical utilities, chemical manufacturers, heavy equipment manufacturers, pulp and paper mills, members of trade associations, the electrical equipment service industry, and an environmental group.

The comments are summarized in "Response to Comments on the NPR for Amendments to the Uncontrolled PCBs Rule," June 1988. Several comments were also received following the close of the comment period, which EPA accepted and considered as they contained information not available earlier. On September 21, 1987, EPA held an informal hearing in Washington, DC at the request of the Electrical Apparatus Service Association (EASA). EASA addressed the issues of the buying and selling of used transformers, salvaging and rebuilding operations, and the effect of the Proposed Rule on this service industry. Six EASA members provided testimony on various provisions of the Proposed Rule, and a transcript of the hearing appears in the Docket.

EPA has considered all comments received in response to the Proposed Rule (as well as comments received after the close of the comment period) and has modified the rule where appropriate. A more detailed explanation of regulatory development history is presented in the Preamble to the Exclusions, Exemptions and Use Authorizations Proposed Rule of July 8, 1987. A brief overview of the final rule follows.

II. Overview of the Amendments

A. General Exclusion for Products Containing Less than 50 PPM PCBS

On October 1, 1984 (the effective date of the Uncontrolled Rule), the Court of Appeals for the District of Columbia Circuit lifted the stay of mandate that had been in place since the Court's decision to remand to EPA the general 50 ppm regulatory cutoff for PCBs. The effect of this action was to ban all PCB-related activities that were not specifically excluded, authorized, or exempted by EPA under TSCA regulations (40 CFR Part 761). The rule made illegal many activities involving previously generated PCBs at concentrations of less than 50 ppm. EPA had not anticipated the many activities that would be banned when the general 50 ppm cutoff was removed, and many of these activities were not evaluated during the development of the 1984 Uncontrolled Rule.

CMA and others raised specific concerns about the effect of this ban on the distribution in commerce, further processing, and use of products containing less than 50 ppm PCBs that were produced legally before October 1, 1984, but which were in storage for use or distribution in commerce when the Uncontrolled Rule became effective. These products, they argued, should be allowed to be further processed, distributed in commerce, and used, but EPA did not specifically authorize or exempt these products by the terms of the Uncontrolled Rule. EPA agreed with the principle that materials containing less than 50 ppm PCBs that were legally in existence before October 1, 1984 should be allowed to be further processed, distributed in commerce, and used. Accordingly, EPA agreed to address these concerns in a proposed rule.

In the July 8, 1987 proposed rule, the Agency proposed to amend the existing regulations by generally excluding from the TSCA section 6(e) prohibitions the processing, distribution in commerce, and use of products containing less than 50 ppm PCBs, provided these products were legally manufactured, processed, distributed in commerce, or used prior to October 1, 1984. The term "legally," as used in this exclusion, includes products created from PCB activities allowed by EPA by regulation, by exemption petition, by settlement agreement, or pursuant to other Agency-approved programs. The only exception that EPA proposed to this generic 50 ppm cutoff for processing, distribution in commerce, and use of PCBs was a restriction on the use of oil containing less than 50 ppm as

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a fuel in nonindustrial boilers and furnaces. Materials containing less than 50 ppm PCBs as a result of a spill of 50 ppm or greater material after the effective date of the disposal regulations (July 2, 1979) are not excluded from regulation by the terms of this provision.

In this final rule, EPA has adopted this generic exclusion based upon its determination that activities involving products containing less than 50 ppm PCB generally do not present an unreasonable risk of injury to human health or the environment. EPA's analyses demonstrate that the incremental risks associated with the processing, distribution in commerce, and use of products with PCB levels up to 50 ppm are outweighed by the tremendous costs that would be incurred by banning the further processing, distribution in commerce, and use of PCBs at these levels.

While EPA has included used oil products containing less than 50 ppm PCBs within the class of "excluded PCB products," the Agency is restricting the use of PCB containing oil as a fuel. EPA has also determined that the burning of PCB containing oil in concentrations below 50 ppm in industrial boilers and furnaces does not present an unreasonable risk to public health or the environment under normal operating conditions. However, the finding of no unreasonable risk for the use of PCB-containing oil as a fuel does not include the burning of PCB containing oil under combustion conditions which are likely to promote the formation of polychlorinated dibenzofurans (PCDFs). EPA believes that among known classes of boilers and furnaces, nonindustrial boilers and furnaces are most likely to create combustion conditions conducive to the formation of PCDFs and that the burning of PCB containing oil as fuel during startup and shutdown operations in industrial boilers and furnaces are also likely to create combustion conditions conducive to incomplete combustion. Further, PCDFs are considered to be more toxic than PCBs and their formation and release during the burning of oil under certain combustion conditions in nonindustrial boilers and furnaces could present a significant risk to public health and the environment. Thus, EPA is restricting the burning of oil containing less than 50 ppm PCBs as a fuel to industrial boilers and furnaces except during startup and shutdown operations.

B. Land Application of Sewage Sludges

Land application practices involving PCBs at levels less than 50 ppm are [illegible]ssed by provisions of non-TSCA [illegible]ulatory programs. Therefore, EPA is not addressing the land application of sewage sludges under this rule because any risks from these activities can be eliminated or reduced by action taken under other laws administered by EPA. EPA has the authority to manage sewage sludge and other wastes containing less than 50 ppm PCBs (43 FR 24803, June 7, 1978), under the Clean Water Act (CWA) and the Resource Conservation and Recovery Act (RCRA) programs. Further discussion of this issue can be found in the Proposed Rule at 52 FR 25855.

C. Use Authorization for Hydraulic and Heat Transfer Systems—Requirement for Use of Viton Gloves

In the 1979 Ban Rule (44 FR 31514), EPA authorized the non-totally-enclosed use of PCBs at concentrations of 50 ppm or greater in hydraulic systems and in heat transfer systems (40 CFR 761.30 (d) and (e)). The 1979 use authorizations contained conditions relating to testing and retrofitting which were designed to reduce the concentrations of PCBs in these systems to levels less than 50 ppm by July 1, 1984.

In the July 10, 1984 Uncontrolled Rule, EPA authorized the use of PCBs in hydraulic and heat transfer systems at concentrations less than 50 ppm for the remainder of their useful lives. EPA found that the continued use of these systems did not present an unreasonable risk of injury to public health or the environment. The 1984 use authorization, however, imposed a condition on the continued use of this equipment which required owners of systems to provide workers with Viton elastomer gloves for protection against dermal exposure to PCBs. Outboard Marine Corp. (OMC) and the American Die Casting Institute (ADCI) raised concerns about the Viton glove requirements in a settlement discussion with EPA. They believed this requirement unnecessary to prevent unreasonable risk.

After reviewing the record for its original decision to require the use of Viton gloves, EPA found that the cost associated with requiring the use of gloves was significantly higher than originally estimated. Further, EPA also found that the risks posed by servicing heat transfer and hydraulic equipment containing less than 50 ppm PCBs did not outweigh the large costs associated with requiring the use of Viton gloves, or any other effective glove that is commercially available.

Accordingly, EPA is amending the authorization for hydraulic and heat transfer systems containing less than 50 ppm PCBs by eliminating the conditions requiring owners to provide, and maintenance workers to wear, gloves formulated from Viton elastomer. After evaluating economic information not examined during the 1984 rulemaking, and updating EPA's estimate of the concentration of PCBs in these systems as of 1987, EPA has determined that the servicing of heat transfer and hydraulic systems without gloves does not present an unreasonable risk of injury to public health or the environment.

The Agency wishes to emphasize that the use of impermeable gloves to prevent dermal contact with PCB-containing fluids may be warranted but the choice of such protection will be dependent on factors such as the duration of occupational exposure, concentration of PCB-containing fluid, and the costs and permeability of the glove material.

D. Water Discharge Limit of 3 PPB Total Aroclors for Pulp and Paper Processes

The July 10, 1984 rule permitted PCB recycling activities among two manufacturing industries—asphalt roofing materials manufacturers and manufacturers of pulp and paper products. Five conditions were set forth in the definition of "recycled PCBs," including a limitation on the level of PCBs allowed in water effluents. The effluent limit in the Uncontrolled Rule limited the amount of Aroclor PCBs in water discharged from these PCB processing sites to less than 3 micrograms per liter (μg/L) for total Aroclors (roughly 3 parts per billion (3 ppb)).

Petitioners, Fort Howard and the American Paper Institute, filed a joint petition challenging the 3 ppb total Aroclors discharge limit for pulp and paper mills. The major concerns were that the regulation did not allow for excursions above 3 ppb due to higher PCB levels in recycled paper entering the process and that the TSCA concentration-based standard unfairly penalized those mills who conserved water and had a decreased volume flow in their effluent discharges.

EPA proposed to eliminate the 3 ppb water effluent standard for PCBs leaving pulp and paper mills for several reasons, including: (1) EPA's belief that PCB discharges from pulp and paper mills are being adequately regulated by state permitting authorities, and (2) EPA's recognition that under the recently enacted CWA, Congress now requires that all states adopt water quality criteria within 2 years for chemicals which have been evaluated by EPA. Since water quality criteria exist for PCBs, EPA believed that it had additional assurance that all PCB

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effluents from recycling processes would be controlled, eliminating the need for section 6 action under TSCA.

EPA has considered the comments and data submitted on the adequacy of state permitting programs and concluded that it is necessary, at this time, to retain the water discharge limit in the definition of "Recycled PCBs" given the present status of some state NPDES permits and the foreseeable delays in implementing state revisions of water quality standards.

In addition, in light of comments received, that indicated a concentration-based standard unfairly penalized those mills who conserved water, the final rule requires manufacturers who process raw materials contaminated with Aroclor PCBs to comply with either a concentration or a mass-based limit. Allowing for a mass-based limitation (i.e., discharge requirements may be met by limiting the volume flow) is consistent with the Clean Water Act's approach to restricting discharges as well as the approach followed by states under their discharge-permitting authorities. EPA believes it prudent to be consistent with approaches already used by the Agency and state authorities and permit writers for controlling the PCB discharge limit into water. Allowing for a mass-based limitation will continue to regulate the absolute amount of PCBs added to the environment from a point source. EPA has not changed the 3 ppb standard for discharges from asphalt roofing material manufacturing because these manufacturers have not indicated a problem in meeting that standard.

E. Materials Decontaminated Pursuant To Spill Cleanup Policies

The PCB Spill Cleanup Policy (40 CFR Part 761, Subpart G) became effective on May 4, 1987. The policy establishes uniform cleanup levels for specified spill types and locations. The policy prescribes cleanup levels for different types of "spills" according to the PCB concentrations involved in the spill, the type of material contaminated, and the spill location. The Spill Cleanup Policy reaffirms a longstanding Agency policy of allowing the continued processing, distribution in commerce, and use of materials that have been cleaned to Agency standards.

In the July 8, 1987 proposal, EPA proposed to authorize the distribution in commerce and use of materials, equipment, and structures that had been decontaminated in accordance with applicable spill cleanup policies in effect at the time of decontamination, or if not previously decontaminated, then decontaminated at the time of distribution in commerce. Although these materials will be contaminated with low levels of PCBs, EPA proposed to authorize these activities because EPA has already determined that this residual level of contamination will not present unreasonable risks of injury to public health or the environment.

This final rule addresses materials contaminated with low level PCBs that resulted from a spill of controlled material (PCBs in concentrations of 50 ppm or greater). EPA is excluding from the TSCA section 6(e) prohibitions on the distribution in commerce and use of any equipment, structures, and other materials contaminated with PCBs, that are not otherwise authorized by 40 CFR Part 761, provided that these "materials" were decontaminated in accordance with applicable PCB cleanup policies in effect at the time of decontamination, or, if not previously decontaminated, then decontaminated at the time of distribution in commerce in accordance with the current cleanup policy.

III. Discussion of Amendments

Forty-two comments were received during the comment period. The majority of the comments received in this rulemaking generally agree with the amendments proposed in the July 8, 1987 Federal Register notice. However, several modifications to the rule were suggested by the commentors. This Unit of the Preamble discusses the major comments made in response to the proposed rule, EPA's responses to these comments, EPA's findings, and the rationale for any additional regulatory requirements. Refer to the support document "Response to Comments received on the NPR for Amendments to the Uncontrolled PCBs Rule," which appears in the Rulemaking Record for EPA's responses to comments not addressed here.

A. 50 PPM Regulatory Cutoff

1. *Excluded PCB Products* EPA's July 8, 1987 proposed rule generally excluded from the TSCA section 6(e) prohibitions, the processing, distribution in commerce, and use of products containing less than 50 ppm PCB concentration provided those PCB-containing products were legally manufactured, processed, distributed in commerce, or used prior to October 1, 1984. The term "legally" as used in this exclusion includes activities and products created by these activities EPA allowed by regulation, by exemption petition, by settlement agreement, or pursuant to other Agency approved programs. EPA requested comments on its case studies of the costs and benefits of regulating PCBs in concentrations below 50 ppm in: Investment casting waxes and products contaminated with inadvertently generated PCBs prior to the effective date of the Uncontrolled Rule. The following addresses those comments and identifies other examples of products that are included in this generic exclusion.

There was strong general support from all commentors on the proposal to generally exclude from further regulation products that were legally contaminated with previously generated PCBs at levels under 50 ppm prior to October 1, 1984. The proposal was supported by chemical manufacturers, other industries, and by utilities concerned with TSCA prohibitions on the repair and rebuilding of electrical equipment. EPA received no comments on this proposal from environmental groups.

The major criticism expressed about the general exclusion for products contaminated at less than 50 ppm was EPA's lack of clarity in defining what activities and "products" were excluded from regulation by the 50 ppm cutoff. Particularly, these commentors support EPA in its decision to exclude a broader class of products than was described by the precise terms of the definition set forth in the Settlement Agreement, but ask that EPA clarify the regulatory language to better express this intent.

The precise terms of the Settlement Agreement call for the Agency to propose to authorize the processing, distribution in commerce, and use of existing stocks of products contaminated with PCBs at concentrations less than 50 ppm, in cases where these products were legally manufactured, processed, or distributed in commerce before October 1, 1984. As noted in comments by Southern California Gas Company (SoCalGas), strictly limiting the definition of what is excluded would have the effect of placing any products contaminated by "ambient" PCBs after the 1984 date within a class of products still subject to the ban on processing, distribution in commerce, and use. The result is seen by SoCalGas to be at odds with the Agency's expressed intent not to regulate "old" or ambient" PCBs at levels of less than 50 ppm (52 FR 25843, July 8, 1987). SoCalGas is concerned that by a strict reading of the rule, many of the products contaminated with low levels of PCBs from historic PCB uses or during recycling activities would still be regulated.

The Agency acknowledges the validity of these comments. It is the Agency's intent to allow the processing, distribution in commerce, and use of

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PCBs in concentrations below 50 ppm provided that:

a. The PCBs were legally manufactured before October 1, 1984.

b. If the PCBs were processed, distributed in commerce, or used before October 1, 1984, they were legally processed, distributed in commerce or used.

c. The resulting PCB concentration (i.e., below 50 ppm) is not a result of dilution, or leaks and spills of PCBs in concentrations over 50 ppm after the effective date of the disposal regulations.

The only exceptions to the general 50 ppm cutoff for the use of previously generated PCBs are EPA prohibitions on the use of PCBs at any detectable concentration as a sealant, coating, or dust control agent, and the use of PCBs at >2 ppm as a fuel in nonindustrial boilers and furnaces. Since EPA received many comments on its proposal to restrict the use of less than ppm material as a fuel in nonindustrial boilers and furnaces, EPA has summarized these comments separately in Unit III.B of this document.

In response to an information request to the July 8, 1987 proposal, the Outboard Marine Corporation (OMC) submitted data on the concentration of PCBs in investment casting waxes. At the time of the Proposed Rule, the Agency supported the inclusion of investment casting waxes among the class of excluded products based upon mathematical modeling which estimated average PCB contamination in these waxes to be 10 ppm. The Outboard Marine Corporation survey data, collected over the last 2 years, indicated that only 18 percent of the approximately 70 samples tested contained detectable levels of PCBs. The average PCB concentration for those samples was 14 ppm. This information confirms the Agency's earlier estimates and supports the inclusion of investment casting waxes among the general PCB products exclusion.

The comments also expressed strong and uniform support for the proposed products exclusion and its effect on the further use, processing, and distribution in commerce of components derived from non-PCB electrical equipment (PCB electrical equipment containing less than 50 ppm PCBs in dielectric fluids).

Several commentors requested that the rule make express reference to heat transfer and hydraulic equipment, and other miscellaneous equipment in use, or in storage for reuse, which has been in contact with material less than 50 ppm PCBs, rather than leaving this class of equipment inferentially covered by the excluded products language. The Agency has included these items and their fluids as examples of products covered by the exclusion. Hydraulic and heat transfer equipment which has been retrofilled and "reclassified" according to TSCA procedures and regulations falls within this class of excluded products. General Motors Corporation submitted cost data on the effects of removing the prohibition of distribution in commerce and processing of this equipment. Two General Motors facilities would experience an approximate $3 million savings when the TSCA prohibitions against distribution in commerce of non-PCB heat transfer and hydraulic equipment in use or in storage are lifted.

EPA also notes that component parts derived from the rebuilding or salvaging of electrical equipment containing PCBs at levels less than 50 ppm qualify as "excluded PCB products". In addition to component parts, the exclusion also includes such activities as buying, selling, and servicing of used non-totally enclosed transformers that contain fluids with concentrations of less than 50 ppm PCBs. As noted in the Proposed Rule, 52 FR 25854, the Agency believes that recycling activities involving these components do not present any significantly greater risks than other activities connected with the unrestricted use of non-PCB electrical equipment.

Two commentors requested that the exclusion for non PCB equipment recycling activities be extended to PCB-contaminated electrical equipment (containing concentrations of 50 to 500 ppm PCB). The Electrical Apparatus Service Association (EASA) and Utility Solid Waste Activities Group (USWAG) joined in seeking the extension of the exemption to components from PCB-contaminated electrical equipment, or in the development of a new decontamination method which would allow electrical utility operating companies to continue their activities. Concern was raised about current inventories of used components which would be used in the repair of PCB-contaminated transformers. In most cases, these components are no longer manufactured, and the entire transformer may be rendered useless without the necessary used replacement parts.

EPA notes that the regulations presently authorize a utility that owns used components removed from electrical equipment owned by the same utility company to use these component parts in the repair of other equipment under its ownership. However, if a component part from PCB-contaminated electrical equipment is used to repair non-PCB equipment, the equipment must be considered to be PCB-contaminated after repair.

In responses to EASA's comments EPA also notes that the existing PCB regulations already provide a mechanism for "decontaminating" PCB-contaminated electrical equipment so that it may be treated in the same manner as non PCB electrical equipment. The PCB regulations allow the reclassification of PCB-contaminated electrical equipment. Once reclassified, a piece of equipment may be salvaged for parts without restriction.

Finally, TSCA section 6(e) provides EPA with the authority to grant exemptions from the prohibition on distribution in commerce. This mechanism is available for those who demonstrate to EPA that their activity will not present an unreasonable risk of injury to public health and the environment and that good faith efforts have been made to develop a substitute for PCBs in the activity. For example, in 1984 the Agency granted the members of EASA a 1-year exemption to process and distribute in commerce PCB-contaminated transformers and component parts. The 1-year exemption would allow EASA time to inform its members how to comply with the PCB regulations, thereby allowing EASA members time to phase out their PCB related activities that required exemptions.

EPA is adopting the generic 50 ppm exclusion for processing, distribution in commerce, and use, based on the Agency's determination that the use, processing, and distribution in commerce of products with less than 50 ppm PCB concentration will not generally present an unreasonable risk of injury to health or the environment. EPA could not possibly identify and assess the potential exposures from all the products which may be contaminated with PCBs at less than 50 ppm. However, EPA concluded that the majority of the hypothetical exposures developed in support of the July 10, 1984 rule were not significant, and in incidents where higher exposures were calculated, further evaluation of the assumptions showed that the estimated exposures overestimated actual expected exposures from the products. EPA believes that the qualitative conclusions reached in 1984 with regard to products (with concentrations up to 50 ppm) from excluded manufacturing practices apply with equal force to the products excluded by this final rule. In addition, EPA has concluded that the costs associated with the strict prohibition on PCB activities are large

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and outweigh the risks posed by these activities (see 49 FR 28179, July 10, 1984).

B. Use of PCBs Below 50 PPM as a Fuel

The July 6, 1987 proposed rule proposed to amend the PCB regulations to, in general, authorize used oil recycling activities (use, processing, and distribution in commerce) involving used oil containing less than 50 ppm PCBs. Specifically, EPA proposed to include used oil among products excluded from regulation under the definition of "excluded PCB products." However, EPA proposed to restrict used oil recycling activities by prohibiting the burning of used oil containing any quantifiable level of PCBs as a fuel in nonindustrial boilers.

The proposed rule also proposed to amend the definition of "qualified incinerator" codified at 40 CFR 761.3. EPA proposed to delete the reference to approved high efficiency boilers under 761.60(a)(3) and to replace that deleted language with a reference to the high efficiency boiler criteria and notification requirements set forth in § 761.60(a)(2). The proposal required the same combustion conditions as previously required but sought to replace the approval requirements with the simpler requirement of notification to the EPA Regional Administrator as stated in § 761.60(a)(2)(iii)(B).

The proposal also sought to make another class of combustion facilities eligible for burning used oils with less than 50 ppm PCBs. EPA proposed to include combustion facilities recognized as acceptable for burning off specification "used oil fuels" under 40 CFR Part 266, Subpart E. This second class consists of the industrial "furnaces" and "boilers" which are identified in 40 CFR 266.41(b) and whose owners have notified EPA of their used oil burning activities. The criteria for these boilers and furnaces are identified in 40 CFR 260.10.

Today's rule allows the burning of oil containing between 2 and 49 ppm PCBs as a fuel in RCRA-approved industrial boilers and furnaces. The rule requires that RCRA approved units used to burn PCB oil between 2 and 49 ppm must be operating at normal operating temperatures (this requirement prohibits burning such fuels during either startup or shutdown operations). By prohibiting the use of oil as a fuel between 2 and 49 ppm PCBs during startup and shutdown operations for these units, EPA is effectively eliminating another source where conditions are conducive to the incomplete combustion of PCBs and the formation of PCDFs. The prohibition on the use of this oil during startup and shutdown operations is consistent with the Agency's current regulations for disposing mineral oil dielectric fluid (50–499 ppm PCBs) in high efficiency boilers set forth in 40 CFR 761.60(a)(2)(iii)(A)(5). Similar to the requirements in todays rule, the existing rules regarding high efficiency boilers limit the fuel feed rate for PCBs. Section 761.60(a)(2)(iii)(A)(4) states that mineral oil dielectric fluid cannot compose more than 10 percent, 5–49.9 ppm PCBs, (on a volume basis) of the total fuel feed rate. EPA believes that the requirements for burning PCB fluid between 2 and 49 ppm PCBs during startup and shutdown operations in industrial boilers and furnaces should be consistent with the existing disposal rules set forth in 40 CFR 761.60.

Today's rule also prohibits the burning of oil containing detectable concentrations of PCBs in nonindustrial boilers and furnaces because these units, as a class, are more likely than RCRA-approved industrial boilers and furnaces to operate under combustion conditions that are conducive to the volatilization of PCBs and the formation of toxic products from the incomplete combustion of PCBs.

In the Proposed Rule, EPA concluded that nonindustrial boilers are typically small to medium size unmanned units that may not achieve optimum combustion conditions when burning fuel that the unit was not designed to burn. EPA believed that very few, if any, of these units are equipped with emissions control equipment, while many industrial boilers/furnaces are so equipped. Further, nonindustrial units are more likely to be located in an urban setting where sources are frequently clustered together, they generally have lower stack heights, and have a sporadic mode of operation. Emissions plumes from numerous sources can overlap and increase ambient air concentrations of PCBs and PCDFs while simultaneously exposing a larger population. In contrast, large boilers and industrial furnaces are more likely to be operated by trained operators and equipped with combustion controls to maintain combustion efficiency when burning fuels mixed with low concentration PCBs.

The Agency requested comments on its proposal to prohibit the burning of used oil containing less than 50 ppm PCBs in nonindustrial boilers. (See 52 FR 25854, July 8, 1987). Several commentors asserted that all used oil products under 50 ppm should be excluded from all TSCA regulations, including burner restrictions. Several commentors who opposed the burner restrictions focused their objections on the risk assessment that EPA developed in support of its proposal. Two commentors stated that the assessment overstated the potential of PCDF formation, and criticized the conservative assumptions in the risk assessment, including the frequency and duration of used oil burning in residential boilers. However, EPA did not receive substantive information to allow the Agency to reevaluate the risk of PCDF formation and make the required finding that such burning does not present unreasonable risks. Commentors did not provide information to support an adjustment to the assumptions underlying the assessment for the potential for PCDF formation such as combustion efficiency, residential combustion unit sizes and types, operating temperatures, formation of PCDF's under differing combustion conditions, etc.

In the risk assessment developed for the proposed rule, the Agency concluded that inhalation exposures associated with the volatilizing of PCBs during the burning of used oil (with PCBs at the 50 ppm level or lower) in small boilers were not significant. However, the Agency's quantitative oncogenic risk for the potential inhalation exposures associated with the formation and release of polychlorinated dibenzofurans (PCDFs) from small- and medium-sized nonindustrial boilers (which may operate under inefficient conditions) was considered significant because the risks fall into the 1×10^{-3} to 1×10^{-4} range. Moreover, only 23 percent of this oil is burned this way; a prohibition does not create great economic impact. Since EPA received no data which refutes the risk assessment, the final rule retains the prohibition on the use of waste oil containing less than 50 ppm PCB as a fuel in nonindustrial boilers. Nonindustrial boilers include but are not limited to those located in single or multifamily residences; commercial establishments (such as hotels, office buildings, laundries, service stations, greenhouses); and institutional establishments (colleges, hospitals, schools, prisons).

In this rule, EPA is designating within the class of "incinerators" qualified to burn oil containing between 2 ppm and 50 ppm PCBs those:

(1) Incinerators approved for PCB destruction under § 761.70.

(2) High efficiency boilers which operate under the conditions of § 761.60(a)(2)(iii)(A) and whose owners have notified EPA of their used oil burning activities under § 761.60 (a)(2)(iii)(B).

(3) Incinerators approved under the authority of RCRA section 3005(c).

(4) Industrial furnaces and boilers which are identified in 40 CFR 260.10

concentrations are likely to be well above the level of detection (i.e., 2 ppm) presents a greater likelihood for the formation of highly toxic byproducts associated with the poor combustion of higher concentration PCBs in these devices. Therefore, EPA, to remain consistent in avoiding such risks, is prohibiting the burning of PCB used oil as fuel in space heaters outside the automotive industry.

Several commentors have requested that the Agency clarify the term "detectable level of PCBs" which is used to describe the used oils to which this burning restriction applies (40 CFR 761.20(c)). The preamble of the Proposed Rule (52 FR 25854) stated that "detectable" means "practical limit of quantitation (i.e., 2 ppm). The Chemical Manufacturers Association recommended that EPA include this clarification in the regulatory language by referring specifically to the definition, "less than 2 micrograms per gram from any resolvable gas chromatographic peak," previously included in the TSCA regulations for nondetectable PCBs in products of closed waste manufacturing processes (47 FR 46995, October 21, 1982). This definition has been accepted by the Agency and will be incorporated in the Rule to clarify which used oils are considered to have detectable PCBs.

Several comments were received which addressed the availability of analytical methods for meeting the level of detection and the impact of this level on recycling and burning of waste oil for fuel. James River Corporation and Texaco Inc. requested that the Agency consider a level higher than the one proposed—specifically—5 ppm—which was felt would meet the goals of the regulation and the concerns for feasibility expressed by recyclers. Other thresholds suggested were 20 ppm (on the grounds that it was feasible in the field); 25 ppm, or even 35 ppm.

The Agency has determined that analytical procedures have been demonstrated to be capable of accurately and reproducibly determining the concentration of PCBs in Bunker C Fuel Oil at 2 ppm using a quantitation procedure based on one congener per homolog standard. Both Gas Chromatography/Electron Capture and Gas Chromatograph/Hall Detector Electron Capture are effective and easily implemented. Therefore, the level of quantitation (articulated in earlier TSCA regulations—47 FR 46995) is specified as 2 ppm.

A large number of comments addressing an alternative PCB threshold implicitly endorsed blending to meet any specified PCB threshold. These comments pointed out that the TSCA prohibitions on dilution do not apply where a regulation specifically allows it, and that allowing blending would make the rule consistent with the RCRA Burn Ban Rule. It was also suggested that blending would facilitate the injection of the fuel into the boiler, and result in better combustion and destruction of the PCBs.

Unlike RCRA regulations for hazardous waste disposal, the TSCA PCB disposal regulations dictate different disposal requirements depending upon the concentration of PCBs in the waste. This approach was adopted because EPA recognized that PCBs are ubiquitous in the environment and are present in measurable quantities as contaminants in many materials. EPA struggled to establish a manageable disposal system that recognized the widespread contamination that 30 or so years of indiscriminant disposal created yet one that would strictly control the disposal of any PCBs removed from use after the Congressional ban in 1977. The result was a disposal system based upon PCB concentrations in waste and a strict prohibition against dilution as a mechanism for avoiding proper disposal.

Allowing blending-down to either below the level of detection or below 50 ppm PCBs under this rule would be a departure from EPA's longstanding position that requires material once tested for PCB concentration to be treated under the regulations based upon its measured concentration. EPA is acutely aware of the difficulties in effectively monitoring compliance with the prohibition on dilution and is concerned about the potential avenue that it would be opening up for the improper disposal of 50 ppm or greater materials in allowing blending-down to either below the level of detection or below 50 ppm in this rule. Therefore, EPA is maintaining its longstanding policy to prohibit dilution.

EPA's proposal to allow batch testing by marketers as a way of saving analytical testing costs met with approval in the comments. The National Oil Recyclers note that, by the time a shipment of used oil reaches a processing plant, it is a mixture of oil from several generators. They maintain that the cost of testing each individual sample before it was added to a shipment would be prohibitive. In addition, they indicate that turn-around time for laboratory tests may range from a few days to 2 weeks, unless a high surcharge is paid for priority service. Costs for PCB testing have been cited as ranging from $25 to $85 per sample. With the low current markets in waste oil, as highlighted in comments from Harbor Oil, Inc., the expense of requiring individual samples, rather than batch testing, would be prohibitive. The Agency regulations, therefore, allow for batch testing, along with certification. It is important to note that, if any PCBs at a concentration of 50 ppm or greater, have been added to the container, then the total container contents must be considered as having a PCB concentration of 50 ppm or greater for purposes of complying with the disposal requirements of 40 CFR 761.60. Batch testing, along with proper records documentation, provides for an environmentally sound program for collecting and burning oils with detectable levels of PCBs while at the same time preserving and protecting our limited waste oil markets.

This final rule makes the TSCA regulations more consistent with the Agency's overall strategy for regulating the recycling of used oil. After evaluating the risks posed by these activities, EPA has determined that the use, processing, and distribution in commerce of used oil containing less than 50 ppm PCBs does not generally present an unreasonable risk of injury to human health or the environment. EPA is not able to determine that burning used oil as fuel in nonindustrial boilers will not present an unreasonable risk. EPA believes that the burning of PCB-containing used oil fuels in combustion facilities which operate under inefficient combustion conditions will promote the formation of highly toxic PCDFs; (see 52 FR 25849–50 for further discussion on exposure risks associated with the incomplete combustion of PCBs).

Due to the potential for the formation of PCDFs in inefficient combustion facilities burning PCB-containing used oil, EPA believes that it is prudent to adopt an approach in this final rule which is consistent with that of the RCRA Burn Ban Rule for burning hazardous waste and off-specification used oil fuels. EPA believes that the rationale set forth in the RCRA Burn Ban Rule preamble for designating nonindustrial boilers as the prohibited class of combustion facilities (50 FR 49191) provides a compelling argument for similarly restricting the burning of used oil products containing PCBs at the less than 50 ppm level. This prohibition on burning PCB-contaminated oils in non-industrial boilers will afford an interim measure of prudent control until EPA completes its ongoing comprehensive evaluation of combustion conditions in various boilers and furnaces. Upon completing this evaluation, EPA will promulgate rules prescribing combustion performance

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standards under RCRA. The net result will be to allow or disallow burning of hazardous waste fuels based on actual combustion capabilities rather than their classification as an "industrial" or "nonindustrial" boiler or furnace.

In addition to a consideration of the toxicity of PCBs and the magnitude of exposure to humans and the environment, the TSCA unreasonable risk standard requires EPA to consider the economic impacts and other societal costs associated with the regulation of a chemical. EPA evaluated the economic impacts of maintaining the current prohibition of all used oil recycling activities. (see Ref. 28, Support Document entitled "PCB Rule Revision: Cost-Effectiveness Analysis and Estimates of Exposed Population.") EPA concludes that the risks associated with the recycling (use, processing, and distribution in commerce) of used oil products containing less than 50 ppm PCBs are generally outweighed by the enormous costs associated with prohibiting such activities, the cost associated with depriving society of the benefits of recycled oil products, and the net reduction in environmental protection associated with a curtailment in recycling activities. Secondly, EPA believes that the net regulatory impact on restricting the burning of used oil containing less than 50 ppm PCBs to industrial boilers and furnaces will be insignificant. This final rule makes PCB-containing used oil (<50 ppm PCBs) available to a much larger universe of eligible combustion facilities than allowed under the previous regulation. The availability of these combustion facilities (qualified incinerators, industrial furnaces, industrial boilers, utility boilers, etc.) and the availability of other recycling markets (e.g., other industrial uses and rerefining) should provide more than adequate capacity to handle any market shifts caused by the prohibition on burning in nonindustrial boilers. EPA believes that the oil management system has already responded to the Burn Ban Rule by diverting the bulk of used oil fuels away from the nonindustrial boiler market, and any further diversion resulting from this final rule should be minimal. For these reasons, EPA concludes that allowing the burning of PCB-containing used oil fuels (<50 ppm PCBs) under the conditions set forth in this document will not present an unreasonable risk of injury to health or the environment.

In this final rule, to be consistent with the approach adopted by the RCRA Burn Ban Rule for marketers and burners of used oil fuel, EPA is implementing a combination of limited testing requirements, prohibitions, and recordkeeping requirements for burners and marketers of used oil fuel between 2 and 49 ppm PCBs. These provisions are to help ensure compliance with the prohibition on burning this PCB used oil fuel in nonindustrial boilers and furnaces.

For regulatory purposes used oil fuel is presumed to contain PCBs above the practical limit of quantitation (i.e., 2 ppm) and therefore would be subject to these restrictions, unless the marketer obtains PCB analyses (test data) or other information documenting that the used oil fuel does not contain detectable levels of PCBs. The Agency believes that presuming used oil to be contaminated with PCBs above 2 ppm is a prudent regulatory tool to ensure the proper burning of waste oils. This is not meant to imply that all waste oil is, without question, contaminated with PCBs above the level of detection, as test data and other information documenting the oil's concentration will demonstrate. The first person who makes the claim that the used oil fuel does not contain PCBs at quantifiable levels must obtain the analyses or "other information" to support his claim. The "other information" could include personal, special knowledge of the source and composition of the used oil, or a certification from the generator claiming that the oil does not contain PCBs above the practical limit of quantitation (2 ppm).

The prohibitions apply to both burners and "marketers" (as defined in 40 CFR 761.3). A person may market (process or distribute in commerce) used oil at levels between the practical limit of quantitation (2 ppm) and 50 ppm for energy recovery only to those burners who qualify either as a "qualified incinerator" under 40 CFR 761.3 or as a combustion device identified in 40 CFR 266.41(b). Before an eligible burner accepts its first shipment of used oil fuel containing PCBs at concentrations <50 ppm, but >2 ppm from a marketer, he will be required to provide the marketer a one-time written notice certifying that he will burn the used oil only in a qualified incinerator (§ 761.3) or in a combustion device identified in § 266.41(b). Marketers will be required to retain copies of their used oil analyses (or other information relating to PCB levels in oil) for 3 years; they would also be required to retain a copy of each certification that they have received from burners from the date of the last transaction with the burner.

By imposing the requirements on marketers and burners EPA believes it will effectively ensure compliance with the prohibition on the burning of used oil fuel in nonindustrial boilers. This is consistent with the RCRA Burn Ban Rule which imposes recordkeeping and reporting requirements controls to prohibit burning of off-specification used oil fuels in nonindustrial boilers.

C. Viton Glove Requirement

The Circuit Court's decision overturning EPA's rule which would allow a general 50 ppm cutoff, effectively prohibited the use of heat transfer and hydraulic systems containing less than 50 ppm PCBs. So, EPA, in the July 10, 1984 rule authorized the use of PCBs at concentrations less than 50 ppm in these systems for the remainder of their useful lives provided owners of these systems provided workers performing repair and maintenance operations on these systems with Viton elastomer gloves to protect against dermal exposure to PCBs (40 CFR 761.30(d)(6) and 761.30(e)(6)).

The Viton glove requirement was the subject of many comments received after promulgation of the July 10, 1984 rule. Due to the interest aroused by this requirement, EPA reexamined the potential exposures and economic impacts presented by the inclusion of a protective clothing requirement referring exclusively to gloves formulated from Viton elastomer. After considering additional economic information which was not considered during the previous rulemaking and after further evaluation of the potential exposures, the Agency has concluded that the Viton elastomer glove requirement is not necessary to protect against any unreasonable risks presented by the continued use of authorized heat transfer and hydraulic systems. Therefore, EPA proposed to delete the requirement from the use authorizations for heat transfer and hydraulic systems.

Several comments were received which supported the proposal to eliminate the exclusive Viton glove requirement for workers performing maintenance on heat transfer and hydraulic systems. General Motors Corporation suggested that the 1984 risk assessment greatly overstated the concentration of PCBs actually in the equipment. The data show that the average concentration of PCBs in hydraulic and heat transfer equipment to be 12 ppm. The commentor indicated that the assumption used in the 1984 risk assessment, that the PCB concentrations are constant at 50 ppm over the entire period of exposure, is not consistent with the fact that the equipment does leak and is topped off with fluids containing no PCBs. The General Motors

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data are consistent with the Agency conclusions expressed in the July 8, 1987 (52 FR 25841) proposed rule that the majority of the presently authorized hydraulic and heat transfer systems have PCB concentrations well below 50 ppm and support EPA's belief that the actual lifetime average PCB exposures resulting from servicing of heat transfer and hydraulic systems should be at least one order of magnitude less than those predicted by the 1984 assessment.

All commentors agree that the risk to maintenance workers did not warrant the costs associated with the exclusive Viton polymer requirement. The National Institute for Occupational Safety and Health (NIOSH) agreed that recommending only the use of Viton gloves is overly restrictive and not warranted based on recent research findings conducted for NIOSH by the Los Alamos National Laboratory (LANL). A number of alternative glove materials were suggested (Viton SFe, butyl, neoprene, Saranex Tyvek, nitrile, Teflone) which were shown to provide good protection against a PCB mixture (52 percent Aroclor 1254 in 48 percent trichlorobenzene) for at least 8 hours. The LANL studies, while developing information relative to the effectiveness of glove materials when handling high concentration PCBs, do not address effectiveness of lower cost glove materials for use with low concentration PCB mineral oils.

The Agency recognizes the concern expressed by NIOSH for worker protection during such time as they are engaged in contact with PCBs and strongly recommends the use of impermeable gloves and clothing designed to prevent skin contact with PCBs, particularly when PCBs are present in concentrations of 500 ppm or greater. The choice of glove material will depend on the concentration of PCBs, the duration of occupational contact with PCBs, and the cost and permeability of the glove material.

The Viton glove requirement arose from concerns caused by a May, 1984 exposure assessment conducted in support of the July 10, 1984 rule. (For details of the exposure assessment see Vol. 4 of support document for the July 10, 1984 rule entitled "Exposure Assessment for Incidentally Produced Polychlorinated Biphenyls"). The hypothetical worst case dermal exposure presented in this report was believed, at the time significant enough to justify the imposition of the Viton glove requirement. However, upon further examination, EPA has concluded that the 1984 assessment overstates the likely dermal exposures and associated risks and that the estimated exposures do not justify the imposition of the enormous costs associated with the previous protective glove requirement.

EPA also considered information not previously examined by the Agency concerning the costs to industry associated with the exclusive Viton glove requirement. At the time of the July 10, 1984 rule, Viton elastomer was the only material known to EPA which possessed the necessary resistance to PCB breakthrough. Although the costs of the Viton gloves were significant, EPA reasoned that the incremented costs associated with the inclusion of the Viton glove requirement were minimal relative to the costs which industry would incur without a use authorization for less than 50 ppm systems.

However, in response to numerous comments received after the July 10, 1984 rule, EPA reexamined the costs associated with the Viton glove requirement and found them to be exorbitant in light of the "worst-case" exposures estimated in the exposure assessment. The incremental costs associated with the Viton glove requirement are in the order of $600 million over 10 years. The Agency has concluded that the potential risks presented by these activities do not warrant the imposition of incremental costs of this magnitude.

As a result of the 1984 risk assessment which over estimated the risk of dermal occupational exposure to repair and maintenance workers and the incremented costs associated with the Viton glove requirement the Agency is amending the use authorizations for hydraulic and heat transfer systems by eliminating the conditions requiring owners to provide repair and maintenance workers with gloves formulated with Viton elastomer.

D. 3 PPB Water Effluent Limitation

The Uncontrolled PCB Rule set forth, among other things, the category of "recycled PCBs" processes that are excluded from the TSCA section 6(e) bans on manufacturing, use, and distribution in commerce. These excluded processes involved manufacturers who use raw materials contaminated with Aroclor PCBs to manufacture new products instead of using virgin materials. Recycling old products yields both environmental and economic benefits since that practice conserves natural resources, reduces energy use, and reduces solid waste generation.

In response to the proposal to exclude these activities in the Uncontrolled PCB Rule, EPA received information from only two manufacturing industries: The asphalt roofing materials manufacturers and manufacturers of pulp and paper products. After evaluating whether these specific activities would present unreasonable risks of injury to health and the environment, EPA announced in the July 10, 1984 rule that it would exclude these PCB recycling products and processes (pulp and paper and asphalt roofing), if certain conditions are met.

The provision which excludes "recycled PCBs" from the section 6(e) prohibitions is codified at 40 CFR 761.1(f). The term "recycled PCBs" is defined at 40 CFR 761.3 by five conditions that limit Aroclor PCB concentrations in the products, wastes water discharges, and air emissions. EPA determined in the final Uncontrolled PCBs Rule that PCB recycling activities conducted under these conditions would not present an unreasonable risk of injury to health or the environment.

The specific provision in the definition of "recycled PCBs" (40 CFR 761.3) that is the subject of this rulemaking pertains to provision number (4) which establishes the limits on releases of Aroclor PCBs in water discharges from sites processing paper products. The final rule retains the existing concentration-based discharge limit, but otherwise amends the provision by allowing a mass-based limitation. Provision number (4) stated: "The amount of Aroclor PCBs added to water discharged from a processing site must at all times be less than 3 micrograms per liter (μg/1) for total Aroclors (roughly 3 parts per billion)."

Petitioners, Ft. Howard and API, raised objections to this condition as it relates to discharges from mills in the pulp and paper industry. The major concerns were that the language which limited discharges to 3 ppb "at all times" (a concentration-based limitation) penalized paper mills which, in the interest of water conservation, decreased their volume flow or releases and, as a result, exceeded the 3 ppb limitation. EPA received no objections to this provision from the asphalt roofing industry.

EPA reexamined the 3 ppb Aroclors discharge limit for pulp and paper mills in light of the petitioners' claims and other comments received by the Agency. As a result, the Agency proposed to eliminate from the definition of "recycled PCBs" the provision limiting Aroclor PCB releases in water discharges from pulp and paper mills to 3 ppb.

EPA received comments both pro and con on this proposal. Some commenters

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supported the proposal to eliminate the 3 ppb limitation because they believed that PCBs in the effluents from pulp and paper mills were being adequately controlled under the CWA permit programs. They contended that the states and EPA regional offices are in fact doing an adequate job regulating PCB discharges in their NPDES permits.

EPA also received comments that opposed the proposal to eliminate the 3 ppb limitation, arguing that the current state of regulation by the states is inadequate to control discharges from pulp and paper mills and therefore a TSCA effluent limit should be maintained to exclude these activities from the processing prohibition. These commenters argued that removing this limit would create a gap in controlling PCB discharges into water.

At this time EPA has not established an effluent guideline for PCBs under the CWA. Although states have begun to revise their water quality standards under the Water Quality Act of 1987 for CWA toxic pollutants, this process will take longer than the expected 2 years to implement. EPA has considered the concerns about the adequacy of controls on PCB effluents through individual permits and concluded that it is appropriate to retain a water discharge limit in the definition of "recycled PCBs" given the present status of some state NPDES permits and the delays in implementing state revisions of water quality standards. EPA reached this conclusion in view of the fact that there is currently no effluent limitation guideline or standard for discharges of PCBs from pulp and paper mills and in view of the ongoing but as yet incomplete process in implementing state revision of water quality standards. Any subsequent PCB discharge standard promulgated under the CWA would obviate the need for a limitation in this rule, and EPA would revoke the limitation at that time.

The final rule describes the limit in a manner which requires manufacturers in the pulp and paper industry who use raw materials contaminated with Aroclor PCBs to comply with either a concentration or mass-based limit. Comments on the Uncontrolled Rule and the July 8, 1987 proposal to amend that rule pointed out the shortcomings in EPA's approach to establishing a water discharge limit solely as an absolute concentration limit. EPA agrees that the PCB water discharge limit in this rule should be consistent with mass-based approaches already used by EPA and state authorities and permit writers under the CWA.

When EPA established the 3 ppb water discharge limit forled PCBs, the intent was to control these additional uncontrolled PCBs released into the environment. The 3 ppb limit represented a level determined by EPA to be a universally achievable and reliable level of quantitation (LOQ) which would best ensure, together with the other restrictions in the definition, that no unreasonable risk of injury to health or environment would be posed by these manufacturing processes. Under the CWA, discharges are limited by a variety of technology-based effluent limitations and standards with more stringent water quality-based standards applied as needed. When EPA promulgated the Uncontrolled PCBs Rule, the Agency did not intend to create inconsistencies in the approaches to regulation of discharges.

Comments on the proposed rule show that establishing an equivalent mass limitation on water discharges from recycled PCBs activities would provide an equivalent level of protection as the 3 ppb limit. Allowing a mass limitation would regulate the absolute amount of PCBs added to the environment from a point source. EPA has considered these comments and decided that as an alternative to the 3 ppb concentration-based limit, persons may comply with this concentration limit converted to a mass-based limitation. Conversion from concentration to mass-based limitations can be accomplished by multiplying the appropriate subcategory flow factor (average wastewater flow expressed as kl per kkg product) for a facility by the concentration limit (expressed in ppb) and an appropriate conversion factor (1.0E-06) to obtain the amount of PCBs allowed per weight of product (expressed as kg PCBs per kkg product). The total daily discharge allowance for PCBs would then be calculated by multiplying the amount of PCBs allowed per weight of product by the annual average daily production for the facility (expressed as kkg product per day). Further guidance to convert the concentration-based standard to the mass-based limitation is available in the public record.

E. Distribution in Commerce and Use of Decontaminated Equipment, Structures, and Materials

In the July 8, 1987 proposed rule, EPA proposed to exclude from regulation an additional class of materials contaminated with PCBs at levels below 50 ppm (or the applicable cleanup standard for solid surfaces). Unlike the class of products discussed earlier in this rule, the PCBs discussed in this section did not originate from contamination resulting from historic manufacturing, use, or recycling activities. Rather, the <50 ppm concentration levels (or the applicable cleanup standards for solid surfaces) present in these materials are associated with leaks and spills (i.e. improper disposal) of >50 ppm material. That is, the residual PCBs remain after proper cleanup of a spill of controlled material.

EPA proposed to formally exclude from the TSCA section 6(e) prohibitions on use and distribution in commerce, certain equipment, structures, and other materials that have inadvertently become contaminated with PCBs because of spills from, or proximity to, a PCB Item with PCB concentrations greater than 50 ppm provided that these materials were decontaminated to the specified level below 50 ppm PCBs in accordance with applicable EPA PCB cleanup policies at the time of decontamination. Spills in this case must not have been the result of any intentional discharge of PCBs, and the contamination must be attributable to PCB Items and activities which are themselves authorized.

The proposal also excluded from regulation the PCB use prohibition on materials or equipment which became contaminated with PCBs prior to the effective date of the section 6(e) bans and which have not undergone decontamination under any EPA PCB cleanup policy. However, these materials would have to be decontaminated according to current PCB cleanup policies set forth in EPA's nationwide spill cleanup policy.

The proposal was not intended to act as an alternative to the reclassification provision in 40 CFR Part 761 for PCB Equipment, PCB Articles, or other PCB Items containing PCBs. The availability of decontamination as a means of allowing the further use and distribution in commerce of PCB Items is limited to the decontamination procedures specified in 40 CFR 761.79 for PCB Containers and movable equipment in storage areas. The July, 1987 proposal was intended to merely codify an existing (though not specifically authorized) practice.

Two commentors agreed with the proposal to allow the distribution in commerce and processing of equipment and other materials that are adequately decontaminated in accordance with spill cleanup policies. One commentor objected to the terms of the proposal in codified § 761.20(c)(5) arguing that it could be construed to apply even to the metalworking, machining, or similar equipment in which used oil with under 50 ppm PCBs is used.

As stated above, this exclusion addresses equipment, structures, and other materials that have inadvertently become contaminated with PCBs > 50 ppm as a result of a spill and have subsequently been decontaminated according to the appropriate spill cleanup procedures at the time of decontamination. The proposed language in § 761.20(c)(5) does not clearly set forth the Agency's intention that equipment, structures, and other materials covered by this exception are those which have inadvertently become contaminated with PCBs above 50 ppm because of spills from, or proximity to, a PCB Item whose use was authorized. Section 761.20(c)(5) has been modified to be consistent with this intent.

Since the promulgation of EPA's nationwide PCB Spill Cleanup Policy (52 FR 10588), specific cleanup levels have been established for different types of spills according to the PCB concentration involved in the spill, the type of material contaminated, and the spill location. Spills of less than 50 ppm PCBs are not covered under this policy.

In establishing this cleanup policy for typical PCB spills, EPA recognized that the risks posed by spills of PCBs vary, depending upon spill location and the amount of PCBs spilled. The PCB cleanup policy requires cleanup of PCBs to different levels depending upon spill location, the potential for exposure to residual PCBs remaining after cleanup, the concentration of the PCBs initially spilled and the nature and size of the population potentially at risk of exposure. Thus, this cleanup policy applies the most stringent requirements for spill cleanup to areas where there is the greatest potential for human exposures to spilled PCBs. Implicitly, the further use, processing, and distribution in commerce of materials decontaminated in accordance with the provisions of the nationwide cleanup policy will not present an unreasonable risk.

Since the effective date of the nationwide cleanup policy (May 4, 1987), the provisions of the policy have superseded the regional policies previously in effect. This amendment, of course, excludes from regulation eligible materials already decontaminated in conformity with regional policies prior to that date.

IV. Rulemaking Record

In accordance with the requirements of section 19(a)(3) of TSCA, EPA is issuing the following list of documents, which constitutes the record of this final rulemaking. This record includes basic information considered by the Agency in developing this final rule, including appropriate Federal Register notices, published and unpublished reports, economic and exposure analyses, and various communications before the final rule was issued. A full list of these materials will be available on request from EPA's TSCA Assistance office listed under "FOR FURTHER INFORMATION CONTACT." However, any Confidential Business Information (CBI) that is part of the record for this rulemaking is not available for public review. A public version of the record from which CBI has been deleted, is available for inspection.

A. Previous Rulemaking Records

(1) Official Rulemaking Record from "Polychlorinated Biphenyls (PCBs): Disposal and Marking Rule." Docket No. OPTS-68005, 43 FR 7150, February 17, 1978.

(2) Official Rulemaking Record from "Polychlorinated Biphenyls (PCBs): Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions Rule." 44 FR 31514, May 31, 1979.

(3) Official Rulemaking Record from "Polychlorinated Biphenyls (PCBs): Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions: Use in Electrical Equipment." Docket No. OPTS-62015, 47 FR 37342, August 25, 1982.

(4) Official Rulemaking Record from "Polychlorinated Biphenyls (PCBs): Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions: Use in Closed and Controlled Waste Manufacturing Processes." Docket No. OPTS-62017, 47 FR 46980, October 21, 1982.

(5) Official Rulemaking Record from "Polychlorinated Biphenyls (PCBs): Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions: Amendment to Use Authorization for PCB Railroad Transformers." Docket No. OPTS-62020, 48 FR 124, January 3, 1983.

(6) Official Rulemaking Record for "Polychlorinated Biphenyls (PCBs): Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions: Response to Individual and Class Petitions for Exemption." Docket No. OPTS-66006A, 49 FR 28154, July 10, 1984.

(7) Official Rulemaking Record from "Polychlorinated Biphenyls (PCBs): Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions: Exclusions, Exemptions, and Use Authorizations." Docket No. OPTS-62032A, 49 FR 28172, July 10, 1984.

(8) Official Rulemaking Record from "Polychlorinated Biphenyls (PCBs): Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions: Use in Electrical Transformers." Docket No. OPTS-62035D, 50 FR 29170, July 17, 1985.

(9) Official Rulemaking Record from "Polychlorinated Biphenyls (PCBs): Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions: Response to Exemption Petitions." Docket No. OPTS-66008E, 51 FR 28556, August 6, 1986.

B. Federal Register Notices

(10) 46 FR 27617, May 20, 1981. USEPA. "Polychlorinated Biphenyls (PCBs): Manufacture of PCBs in Concentrations Below Fifty Parts Per Million: Possible Exclusion from Manufacturing Prohibition: Advance Notice of Proposed Rulemaking.

(11) 44 FR 31514, May 31, 1979. USEPA. "Polychlorinated Biphenyls (PCBs): Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions."

(12) 44 FR 53438, September 13, 1979. USEPA. "Criteria for Classification of Solid Waste Disposal Facilities and Practices."

(13) 47 FR 47930, October 21, 1982. USEPA. "Polychlorianted Biphenyls (PCBs): Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions: Use in Closed and Controlled Waste Manufacturing Processes."

(14) 47 FR 52066, November 18, 1982. USEPA. "Pulp, Paper, and Paperboard Point Source Category Effluent Limitations Guidelines and New Source Performance Standards; Proposed Rule."

(15) 48 FR 55076, December 8, 1983. USEPA. "Polychlorinated Biphenyls (PCBs): Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions: Exclusions, Exemptions, and Use Authorizations: Proposed Rule."

(16) 49 FR 28172, July 10, 1984. USEPA. "Polychlorinated Biphenyls (PCBS): Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions: Exclusions, Exemptions, and Use Authorizations: Final Rule."

(17) 49 FR 28154, July 10, 1984. USEPA. "Polychlorinated Biphenyls (PCBs): Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions: Response to Individual and Class Petitions for Exemptions."

(18) 50 FR 19170, July 17, 1985. USEPA. "Polychlorinated Biphenyls in Electrical Transformers: Final Rule."

(19) 50 FR 49212, November 29, 1985. USEPA. "Hazardous Waste Management System: Recycled Used Oil Standards: Proposed Rule."

(20) 50 FR 49258, November 29, 1985. USEPA. "Hazardous Waste Management System: General,

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Identification and Listing of Hazardous Waste: Used Oil; Proposed Rule."

(21) 50 FR 49164, November 29, 1985, USEPA, "Hazardous Waste Management System: Burning of Waste Fuel and Used Oil Fuel in Boilers and Industrial Furnaces."

(22) 51 FR 28556, August 8, 1986, USEPA, "Polychlorinated Biphenyls (PCBs): Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions: Response to Exemption Petitions."

(23) 51 FR 41900, November 19, 1986, USEPA, "Identification and Listing of Hazardous Waste: Used Oil: Notice Announcing Decision Not To Adopt Proposed Rule Listing Used Oil as a Hazardous Waste.

(24) 52 FR 10688, April 2, 1987, USEPA, "Polychlorinated Biphenyls Spill Cleanup Policy."

(25) 52 FR 25838, July 8, 1987, USEPA, "Polychlorinated Biphenyls: Exclusions, Exemptions and Use Authorizations; Proposed Rule."

C. Support Documents

(26) August 7, 1986 Settlement Agreement filed with United States Court of Appeals for the District of Columbia Circuit, in Docket Nos. 84-1481 and 85-1118.

(27) USEPA, OPTS, EED, Versar, Inc., "Assessment of Exposures Resulting from Recycle/Reuse of Used Oil Containing PCBs at Levels Less Than 50 PPM" (January, 1987).

(28) USEPA, OPTS, ETD, Putnam, Hayes and Barlett, Inc., "PCB Rule Revision, Cost Effectiveness Analyses and Estimates of Exposed Population" (March, 1987).

(29) USEPA, OTS Versar, Inc., "Development of a Study Plan for Definition of PCBs Usage, Wastes, and Potential Substitution in the Investment Casting Industry." (January, 1976).

(30) USEPA, OPTS, ETD, ICF, Inc. "Costs of Prohibiting Reclaimed Investment Casting Wax Containing PCBs Below 50 PPM" (DRAFT) (September, 1985).

(31) USEPA, OPTS, EED, US Congress House of Reps., January 17, 1985 letter from Honorable Ralph Regula to William Prendergast, EPA, forwarding January 10, 1985 letter from constituent, Charles LeBeau, Cambridge Mill Products, Inc.

(32) USEPA, OPTS, EED, Letter from John A. Moore, EPA to Honorable Ralph S. Regula (January 3, 1985).

(33) USEPA, OPTS, EED, "Potential PCDF Formation during Combustion of Used Oil Containing Low Levels of PCBs."

(34) USEPA, OPTS, EED, "Exposure Estimates for the Amendment to the PCB Regulation." (November 20, 1986).

(35) USEPA, OPTS, EED, "Exposure Estimates for the Amendment to the PCB Regulation" (December 23, 1986).

(36) USEPA, OPTS, EED, "A Manual for the Preparation of Engineering Assessments" (September 1, 1984).

(37) USEPA, OPTS, EED, Letter from C. Nelson Schlatter, Edmont Corporation to Dr. John Moore, EPA (October 15, 1984).

(38) USEPA, OPTS, EED, Letter from Dr. John A. Moore, EPA to C. Nelson Schlatter, Edmont Corporation (November 15, 1984).

(39) USEPA, OPTS, EED, Letter from Oswald Schindler, Intermarket Latex Inc. to Martin Halper, EPA (November 13, 1984).

(40) USEPA, OPTS, ETD, "Addendum to the Heat Transfer and Hydraulic Systems RIA" (undated).

(41) USEPA, OPTS, ETD, "PCB Glove Requirement Costs: Present Value" (February, 1987).

(42) USEPA, OW, PCB Information Survey, deink Direct Dischargers by Region and NPDES Permit Numbers (November, 1984).

(43) USEPA, OPTS, EED, Letter from Richard S. Wasserstrom, American Paper Institute, Inc. to Alan Carpien, EPA (October 11, 1984).

(44) USEPA, OPTS, EED, Letter from Richard J. Kissel, Attorney for ADCI and OMC to John A. Moore, EPA (October 24, 1984).

(45) USEPA, OPTS, EED, Letter from Alan Carpien, EPA to Richard J. Kissel, Attorney for ADCI and OMC (November 20, 1984).

(46) USEPA, OPTS, EED, Letter from Timothy S. Hardy, Attorney for CMA to Alan Carpien, EPA (November 27, 1984).

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(76) State of Wisconsin, Dept. of Natural Resources, Ft. Howard Paper Company, Green Bay, WI, NPDES Discharge Monitoring from January 1982 to October 1987, WPDES Permit # WI-0001848.

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(80) USEPA, OW, ECD, Development Document for Effluent Limitations Guidelines and Standards for the Pulp, Paper, and Paper Board and the Builders' Paper and Board Mills, Point Source Categories, EPA 440/1-82/025, October 1982.

(81) EPA, OTS, Guidance for Conversion of Water Discharge Concentration-based Standards to Mass Based Limitations for PCBs under TSCA (May 1988).

V. Other Regulatory Requirements

A. Executive Order 12291

Under Executive Order 12291 issued February 17, 1982, EPA must judge whether a rule is a "major rule," and therefore, subject to the requirement that a Regulatory Impact Analysis be prepared. EPA has determined that this final rule is not a "major rule" because it does not meet the criteria set forth in section 1(b) of the Executive Order.

The effect on the economy will be the avoidance of significant costs which would otherwise be incurred if EPA maintained the existing use authorizations for hydraulic and heat transfer systems, which include the Viton glove requirement. Likewise, the rule avoids the substantial costs associated with maintaining existing prohibitions of activities involving products containing low levels (under 50 ppm) of PCB contamination.

No significant increases in prices are expected to occur as a result of this rule. No significant adverse effects are expected on competition, employment, investment, productivity, innovation, or the ability of the United States-based enterprises to compete with foreign-based enterprises.

This rule was submitted to the Office of Management and Budget (OMB) for review as required by Executive Order 12291.

B. Regulatory Flexibility Act

Section 603 of the Regulatory Flexibility Act (the Act) (15 U.S.C. 601 *et. seq.*, Pub. L. 96-534, September 19, 1980), requires EPA to prepare and make available for comment a regulatory flexibility analysis in connection with rulemaking. The initial regulatory flexibility analysis described the impact of the proposed rule on small business entities. Section 605(b) of the Act "shall not apply to any proposed or final rule if the Agency certifies that the rule will not, if promulgated, have a significant economic impact on a substantial number of small entities."

In accordance with section 605(b) of the Act, EPA certifies that this rule will not have a significant impact on a substantial number of small businesses. The rule is, in fact, nondiscriminatory in its impact on business entities, and the impact on all business entities is generally to exclude from regulation activities currently prohibited under TSCA section 6(e), and not previously authorized, exempted, or excluded by regulation. Small businesses will share equally in the benefits of this rule, including the elimination of the Viton glove requirement in the use authorization for hydraulic and heat transfer systems, and the general exclusion for products contaminated with PCBs at levels below 50 ppm. Any impact on small business entities is not appreciably greater than the impact already being borne by these entities under the existing prohibition on burning offspecification used oil in nonindustrial boilers. This rule will implement the limited restrictions on burning PCB-containing used oil (under 50 ppm) in a manner such that any additional economic burdens will be borne primarily by the marketers of the used oil.

C. Paperwork Reduction Act

The Paperwork Reduction Act of 1980 44 U.S.C. 3501 *et seq.*, authorizes the Director of OMB to review certain information collection requests by Federal agencies. Under OMB Control Number 2070-0008, OMB has approved an information collection request submitted by EPA in connection with the recordkeeping and reporting requirements which facilitate the implementation and enforcement of the Uncontrolled PCBs Rule. Further, under OMB Control Number 2050-0047, OMB has approved the information collection requirements (including invoice shipping papers, certifications, and used oil analysis) which facilitate the implementation of the prohibition on burning certain used oil fuels in nonindustrial boilers. OMB has also approved the provisions of this final rule, which requires that information related to PCBs in used oil fuels be added to the existing information collections previously approved by OMB.

List of Subjects in 40 CFR Part 761

Environmental protection, Hazardous materials, Labeling, Polychlorinated biphenyls, Reporting and Recordkeeping requirements.

Dated: June 8, 1988.

Lee M. Thomas,

Administrator.

Therefore, 40 CFR Part 761 is amended as follows:

PART 761—[AMENDED]

1. The authority citation for Part 761 continues to read as follows:

Authority: 15 U.S.C. 2605, 2607, and 2611; Subpart G also issued under 15 U.S.C. 2614, and 2616.

2. In § 761.1 by adding paragraph (f)(4) to read as follows:

§ 761.1 Applicability.

(f) * * *

Doc No: CLEJ-00549-12.02-09/13/88

(4) Except as provided in § 761.20 (d) and (e), persons who process, distribute in commerce, or use products containing excluded PCB products as defined in § 761.3, are exempt from the requirements of Subpart B of this Part.

3. In § 761.3 by adding and alphabetically inserting a definition for "Excluded PCB products," "Market/Marketers," and "Quantifiable Level/Level of Detection," and by revising the definitions for "Qualified Incinerator" and "Recycled PCBs" to read as follows:

§ 761.3 Definitions.

* * * * *

"Excluded PCB products" means PCB materials which appear at concentrations less than 50 ppm, including but not limited to:

(1) Non-Aroclor inadvertently generated PCBs as a byproduct or impurity resulting from a chemical manufacturing process.

(2) Products contaminated with Aroclor or other PCB materials from historic PCB uses (investment casting waxes are one example).

(3) Recycled fluids and/or equipment contaminated during use involving the products described in paragraphs (1) and (2) of this definition (heat transfer and hydraulic fluids and equipment and other electrical equipment components and fluids are examples).

(4) Used oils, provided that in the cases of paragraphs (1) through (4) of this definition:

(i) The products or source of the products containing < 50 ppm concentration PCBs were legally manufactured, processed, distributed in commerce, or used before October 1, 1984.

(ii) The products or source of the products containing < 50 ppm concentrations PCBs were legally manufactured, processed, distributed in commerce, or used, i.e., pursuant to authority granted by EPA regulation, by exemption petition, by settlement agreement, or pursuant to other Agency-approved programs;

(iii) The resulting PCB concentration (i.e. below 50 ppm) is not a result of dilution, or leaks and spills of PCBs in concentrations over 50 ppm.

* * * * *

"Market/Marketers" means the processing or distributing in commerce, or the person who processes or distributes in commerce, used oil fuels to burners or other marketers, and may include the generator of the fuel if it markets the fuel directly to the burner.

* * * * *

"Qualified incinerator" means one of the following:

(1) An incinerator approved under the provisions of § 761.70. Any level of PCB concentration can be destroyed in an incinerator approved under § 761.70.

(2) A high efficiency boiler which complies with the criteria of § 761.60(a)(2)(iii)(A), and for which the operator has given written notice to the appropriate EPA Regional Administrator in accordance with the notification requirements for the burning of mineral oil dielectric fluid under § 761.60(a)(2)(iii)(B).

(3) An incinerator approved under section 3005(c) of the Resource Conservation and Recovery Act (42 U.S.C. 6925(c)) (RCRA).

(4) Industrial furnaces and boilers which are identified in 40 CFR 260.10 and 40 CFR 266.41(b) when operating at their normal operating temperatures (this prohibits feeding fluids, above the level of detection, during either startup or shutdown operations).

"Quantifiable Level/Level of Detection" means 2 micrograms per gram from any resolvable gas chromatographic peak, i.e. 2 ppm.

* * * * *

"Recycled PCBs" means those PCBs which appear in the processing of paper products or asphalt roofing materials from PCB-contaminated raw materials. Processes which recycle PCBs must meet the following requirements:

(1) There are no detectable concentrations of PCBs in asphalt roofing material products leaving the processing site.

(2) The concentration of PCBs in paper products leaving any manufacturing site processing paper products, or in paper products imported into the United States, must have an annual average of less than 25 ppm with a 50 ppm maximum.

(3) The release of PCBs at the point at which emissions are vented to ambient air must be less than 10 ppm.

(4) The amount of Aroclor PCBs added to water discharged from an asphalt roofing processing site must at all times be less than 3 micrograms per liter (μg/L) for total Aroclors (roughly 3 parts per billion (3 ppb)). Water discharges from the processing of paper products must at all times be less than 3 micrograms per liter (μg/1) for total Aroclors (roughly 3 ppb), or comply with the equivalent mass-based limitation.

(5) Disposal of any other process wastes at concentrations of 50 ppm or greater must be in accordance with Subpart D of this part.

4. In § 761.20 by revising paragraph (a) and the introductory text of paragraph (c), and by adding paragraphs (c) (5) and (e), and the OMB control number to read as follows:

§ 761.20 Prohibitions.

* * * * *

(a) No persons may use any PCB, or any PCB Item regardless of concentration, in any manner other than in a totally enclosed manner within the United States unless authorized under § 761.30, except that:

(1) An authorization is not required to use those PCBs or PCB Items which consist of excluded PCB products as defined in § 761.3.

(2) An authorization is not required to use those PCBs or PCB Items resulting from an excluded manufacturing process or recycled PCBs as defined in § 761.3, provided all applicable conditions of § 761.1(f) are met.

(3) An authorization is not required to use those PCB Items which contain or whose surfaces have been in contact with excluded PCB products as defined in § 761.3.

(4) An authorization is not required to apply sewage sludges, contaminated with PCBs below 50 ppm, to land when regulated by authorities under the Clean Water Act and the Resource Conservation and Recovery Act.

* * * * *

(c) No persons may process or distribute in commerce any PCB, or any PCB Item regardless of concentration, for use within the United States or for export from the United States without an exemption, except that an exemption is not required to process or distribute in commerce PCBs or PCB Items resulting from an excluded manufacturing process as defined in § 761.3, or to process or distribute in commerce recycled PCBs as defined in § 761.3, or to process or distribute in commerce excluded PCB products as defined in § 761.3, provided that all applicable conditions of § 761.1(f) are met. In addition, the activities described in paragraphs (c) (1) through (5) of this section may also be conducted without an exemption, under the conditions specified therein.

* * * * *

(5) Equipment, structures, or other materials that were contaminated with PCBs because of spills from, or proximity to, a PCB Item > 50 ppm, and which are not otherwise authorized for use or distribution in commerce under this part, may be distributed in commerce, provided that these materials were decontaminated in accordance with applicable EPA PCB spill cleanup policies in effect at the time of the decontamination or, if not previously decontaminated, at the time of the distribution in commerce.

* * * * *

(e) In addition to any applicable requirements under 40 CFR Part 266, Subpart E, marketers and burners of used oil who market (process or distribute in commerce) for energy recovery, used oil containing any quantifiable level of PCBs are subject to the following requirements:

(1) *Restrictions on marketing.* Used oil containing any quantifiable level of PCBs (2 ppm) may be marketed only to:

(i) Qualified incinerators as defined in 40 CFR 761.3.

(ii) Other marketers identified in 40 CFR 266.41(a)(1).

(iii) Burners identified in 40 CFR 266.41(b). Only burners in the automotive industry may burn used oil generated from automotive sources in used oil-fired space heaters provided the provisions of 40 CFR 266.41(b)(2)(iii) (A), (B) and (C) are met. The Regional Administrator may grant a variance for a boiler that does not meet the 40 CFR 266.41(b) criteria after considering the criteria listed in 40 CFR 260.32 (a) through (f). The applicant must address the relevant criteria contained in 40 CFR 260.32 (a) through (f) in an application to the Regional Administrator.

(2) *Testing of used oil fuel.* Used oil to be burned for energy recovery is presumed to contain quantifiable levels (2 ppm) of PCB unless the marketer obtains analyses (testing) or other information that the used oil fuel does not contain quantifiable levels of PCBs.

(i) The person who first claims that a used oil fuel does not contain quantifiable level (2 ppm) PCB must obtain analyses or other information to support that claim.

(ii) Testing to determine the PCB concentration in used oil may be conducted on individual samples, or in accordance with the testing procedures described in § 761.60(g)(2). However, for purposes of this part, if any PCBs at a concentration of 50 ppm or greater have been added to the container or equipment, then the total container contents must be considered as having a PCB concentration of 50 ppm or greater for purposes of complying with the disposal requirements of this part.

(iii) Other information documenting that the used oil fuel does not contain quantifiable levels (2 ppm) of PCBs may consist of either personal, special knowledge of the source and composition of the used oil, or a certification from the person generating the used oil claiming that the oil contains no detectable PCBs.

(3) *Restrictions on burning.* (i) Used oil containing any quantifiable levels of PCB may be burned for energy recovery only in the combustion facilities identified in paragraph (e)(1) of this section when such facilities are operating at normal operating temperatures (this prohibits feeding these fuels during either startup or shutdown operations). Owners and operators of such facilities are "burners" of used oil fuels.

(ii) Before a burner accepts from a marketer the first shipment of used oil fuel containing detectable PCBs (2 ppm), the burner must provide the marketer a one-time written and signed notice certifying that:

(A) The burner has complied with any notification requirements applicable to "qualified incinerators" (§ 761.3) or to "burners" regulated under 40 CFR Part 266, Subpart E.

(B) The burner will burn the used oil only in a combustion facility identified in paragraph (e)(1) of this section and identify the class of burner he qualifies.

(4) *Recordkeeping requirements.* The following recordkeeping requirements are in addition to the recordkeeping requirements for marketers found in 40 CFR 266.43(b)(6) (i) and (ii), and for burners found in 40 CFR 266.44(e).

(i) *Marketers.* Marketers who first claim that the used oil fuel contains no detectable PCBs must include among the records required by 40 CFR 266.43(b)(6)(i), copies of the analysis or other information documenting his claim, and he must include among the records required by 40 CFR 266.43(b)(6)(ii), a copy of each certification notice received or prepared relating to transactions involving PCB-containing used oil.

(ii) *Burners.* Burners must include among the records required by 40 CFR 266.44(e), a copy of each certification notice required by paragraph (e)(3)(iii) of this section that he sends to a marketer.

(Approved by the office of Management of Budget under OMB control number 2050-0047)

§ 761.30 [Amended]

5. In § 761.30 by removing paragraphs (d) (6) and (7) and paragraphs (e) (6) and (7).

6. In § 761.30, in the introductory text of paragraphs (d) and (e), by revising the reference "paragraphs (d) (1) through (7)" to read "paragraphs (d) (1) through (5)" and the reference "paragraphs (e) (1) through (7)" to read "paragraphs (e) (1) through (5)" respectively.

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