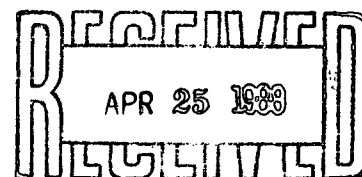


Quadrex HPS Inc.

1940 N.W. 67th Place, Gainesville, Florida 32606-1649
904-373-6066 TELEX 53-5429 TELECOPY 904-373-0040

NORTHEAST DISTRICT



DER-JACKSONVILLE

April 21, 1988

Mr. Ernest E. Frey
District Manager
State of Florida
Department of Environmental Regulation
3426 Bills Road
Jacksonville, FL 32207

Dear Mr. Frey:

As required by our EPA permit for alternate PCB disposal, Quadrex is submitting this letter of notification to your agency to temporarily operate our process equipment for reclamation of PCB contaminated solvent at our Gainesville, Florida business address. A copy of our permit is included for your information. Specifics of this operation are as follows.

Location: Quadrex HPS Inc.
1940 N.W. 67th Place
Gainesville, Florida 32606

Dates: This activity will begin on or about May 23, 1988 and will continue intermittently until complete on or about July 23, 1988.

Hours of Operation:

7:00 am to 7:00 pm.

If you have any questions regarding this activity, please do not hesitate to call me or Gene McIlvaine at (904) 373-6066.

Sincerely,

Susan E. McDonough

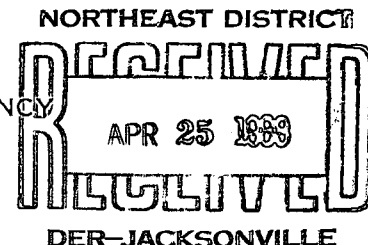
Susan E. McDonough
Regulatory Compliance Officer

xc: P. James
T. McGuire
J. Owens
B. Watkins

DOCKET # 21



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
WASHINGTON, D.C. 20460



FEB 12 1983

OFFICE OF
PESTICIDES AND TOXIC SUBSTANCES

Mr. David Fowler
President
Quadrex HPS, Incorporated
1940 N. W. 67th Place
Gainesville, Florida 32601

Dear Mr. Fowler:

Enclosed is a document entitled "Approval to Dispose of Polychlorinated Biphenyls (PCBs)." This document permits Quadrex HPS, Incorporated (Quadrex) to use its solvent extraction method to remove PCBs from mineral oil dielectric fluid (MODEF) transformers; heat transfer and hydraulic fluid systems; PCB askarel transformers; surface contaminated office equipment; and paper contaminated with askarel transformer fluid; subject to the listed conditions of approval. This approval is issued pursuant to Section 6(e)(1) of the Toxic Substances Control Act (TSCA) of 1976 (Public Law 94-469), and the Federal PCB Regulations, 40 CFR Part 761.60(e) (48 FR 13181, March 30, 1983).

The approval is based upon the ability of the Quadrex solvent extraction method to remove PCBs to a level below 2 parts per million (ppm) with no detectable PCB emissions to air or releases to water. (The 2 ppm was chosen because it is the Environmental Protection Agency (EPA)-designated limit of detection of PCBs in oil). In addition, the approval is based upon the Agency's conclusion that the Quadrex solvent extraction method does not present an unreasonable risk of injury to public health or the environment.

This approval shall be effective immediately and shall extend to July 5, 1988. The approval may be withdrawn, or further conditions may be added to it at any time EPA has reason to believe that operation of the Quadrex solvent extraction method presents an unreasonable risk of injury to public health or the environment. Withdrawal of the approval or the imposition of further conditions may also result from future EPA rulemaking with respect to PCBs. Moreover, violation of any condition included as part of this approval may subject Quadrex to enforcement action and/or termination of the approval.

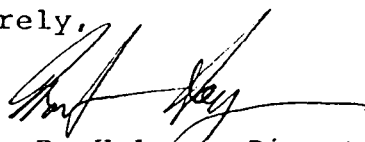
Please be advised that approval for treating higher concentrations of PCBs in the specified matrices (MODEF, heat transfer fluid, hydraulic fluid, and PCB-askarel, office equipment, or askarel contaminated paper products), or for treating PCBs in other matrices, may be considered when Quadrex demonstrates such capability to the satisfaction of EPA. Such a demonstration may be accomplished either during commercial processing or through other controlled experimentation. Authorized EPA representatives may be present to witness the demonstration and obtain split samples for verification of analytical results.

It is the responsibility of you and your company, Quadrex HPS, Incorporated to comply with all applicable provisions of TSCA and the Federal PCB Regulations in treating the matrices specified in this approval. Violation of any of the applicable provisions and/or the conditions of approval may be cause for rescission of this approval. Furthermore, this approval does not relieve you of the responsibility to comply with all other applicable Federal, State and local regulations and ordinances for transportation, siting, operation, and maintenance of the Quadrex solvent extraction method.

EPA reserves the right to inspect Quadrex processes to be used for the disposal of PCBs and the records which Quadrex is required to maintain under the Federal PCB Regulations during operation and at other reasonable times.

Please contact Jared Flood of my staff at (202) 382-3962 if you have any questions pertaining to this approval.

Sincerely,



Martin P. Halper, Director
Exposure Evaluation Division

Enclosure

cc: Regional Administrators
Regions I - X

PCB Coordinators
Regions I - X

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

IN THE MATTER OF)	APPROVAL TO DISPOSE
)	
QUADREX HPS, INCORPORATED)	OF POLYCHLORINATED
)	
GAINESVILLE, FLORIDA)	BIPHENYLS (PCBs)

AUTHORITY

This approval is issued pursuant to Section 6(e)(1) of the Toxic Substances Control Act of 1976, Public Law No. 94-469, and the Federal PCB Regulations, 40 CFR §761.60(e) (48 FR 13181, March 30, 1983).

EFFECTIVE DATE

This approval shall be effective upon the signature of the Director of the Exposure Evaluation Division.

BACKGROUND

Section 6(e)(1)(A) of the Toxic Substances Control Act (TSCA) requires that EPA promulgate rules for the disposal of polychlorinated biphenyls (PCBs). The rules implementing section 6(e)(1)(A) were published in the Federal Register of May 31, 1979 (44 FR 31514) and recodified in the Federal Register of May 6, 1982 (47 FR 19527). Those rules require, among other things, that various types of PCBs and PCB Articles be disposed of in EPA-approved landfills (40 CFR §761.75), incinerators (40 CFR §761.70), high efficiency boilers (40 CFR §761.60), or by alternative methods (40 CFR §761.60(e)) that demonstrate a level of performance equivalent to EPA-approved incinerators or high efficiency boilers. The May 31, 1979 Federal Register also designated Regional Administrators as the approval authority for PCB disposal facilities.

On March 30, 1983, EPA issued a procedural rule amendment to the PCB rule (48 FR 13181). This procedural rule change transferred the review and approval authority of mobile and other PCB disposal facilities that are used in more than one region to the Office of Pesticides and Toxic Substances (OPTS). The purpose of the amendment is to eliminate duplication of effort in the regional offices and to unify the Agency's approach to PCB disposal. The amendment gives the Assistant Administrator authority to issue nationwide approvals (i.e., approvals which will be effective in all ten EPA regions) to mobile and other PCB disposal facilities that are used in more than one region.

On November 17, 1984, Quadrex HPS, Incorporated (Quadrex) submitted to EPA a permit application and demonstration test plan for nationwide approval to treat the interior of drained mineral oil dielectric fluid (MODEF) transformers, heat transfer fluid and hydraulic fluid systems containing PCBs. The demonstration test plan was approved by the Director of the Office of Toxic Substances on April 19, 1985, and Quadrex commenced the trial demonstration at the Quadrex facility in Gainesville, Florida on April 22, 1985. MODEF, heat transfer fluid, and hydraulic fluid were selected for processing for purposes of the trial demonstration. EPA personnel witnessed the demonstration to verify Quadrex's on-site chemical analysis of the treated MODEF, heat transfer fluid, hydraulic fluid, processed solvent, and to obtain split samples for subsequent analysis and verification. Quadrex completed the demonstration on April 26, 1985.

The results of this April 1985 demonstration indicated that the Quadrex process successfully removed PCBs from a Freon 113® test matrix which included hydraulic fluid, heat transfer fluid, or MODEF containing PCBs. EPA found that the Quadrex process is equivalent to a 40 CFR §761.70 incinerator or 40 CFR §761.60 high efficiency boiler and that the operation of the Quadrex PCB disposal unit does not present an unreasonable risk of injury to human health or the environment. Quadrex was issued a final nationwide PCB disposal approval on July 5, 1985. In this approval, the concentration of PCBs in the Freon/MODEF mixture prior to the distillation process may not exceed 920 ppm. The concentration of PCBs in the Freon/heat transfer fluid or Freon/hydraulic fluid mixtures may not exceed 3,100 ppm.

On September 4, 1985, EPA received a demonstration test plan from Quadrex outlining procedures for demonstrating the process to remove PCBs from solid surfaces and a liquid matrix. Specifically, Quadrex proposed to use its decontamination/disposal method to clean PCB-contaminated office items and to process the PCB/Freon solvent matrix that will be generated during the cleaning operations. The demonstration was conducted September 12-13, 1985 at the New Mexico State Highway Department General Office Building in Santa Fe, New Mexico.

On August 4, 1986, EPA received a demonstration test plan from Quadrex for the separation of PCBs from an additional proprietary solvent. The demonstration was performed on August 25-29, 1986 at the Quadrex facility located in Gainesville, Florida. EPA personnel witnessed the September 1985 and August 1986 demonstrations to monitor the Quadrex operations and verify the on-site chemical analysis of the treated materials. In addition, split samples were obtained for subsequent analysis and verification.

The findings presented below are for the Quadrex PCB disposal demonstrations conducted during September 1985 and August 1986. Complete, acceptable demonstration test reports for both of these demonstrations are in EPA's files.

FINDINGS

1. Quadrex HPS, Incorporated of Gainesville, Florida, has demonstrated a solvent extraction process whereby items contaminated with PCB askarel are washed with a solvent, trichlorotrifluoroethane (Freon 113®), and PCBs are subsequently removed from solvent using filters and a distillation method. In addition, Quadrex has demonstrated removal of PCBs from a proprietary solvent using filters and a distillation method. This distillation method is effective in removing PCBs from the Freon 113® or proprietary solvent to a concentration of PCBs less than 2 parts per million (ppm) (total concentration). The concentrated PCB still bottoms are then prepared for removal and sent to an EPA-approved PCB disposal facility. [The distillation process has already been approved by EPA for treatment of MODEP transformers, heat transfer and hydraulic fluid systems using Freon 113®]. This permit only applies to PCB decontamination/disposal units operated by Quadrex personnel. Quadrex-manufactured PCB decontamination/disposal units under lease to other companies or persons are not approved for operation under this permit.

2. The Quadrex PCB decontamination/disposal unit is a completely enclosed mobile process that is designed to prevent release of PCBs to air, water, or to surfaces. The Quadrex PCB decontamination/disposal unit was developed by Quadrex and is analogous to similar units developed for clean-up of radioactive materials. From the results of a demonstrations conducted during September 1985 and August 1986, the distillation process is effective in removing PCBs from either Freon 113® or the proprietary solvent to below the level of 2 ppm total concentration, as compared to an external standard.

3. In the September 1985 demonstration, PCB-contaminated items (e.g., typewriters, computers, tools, and other equipment) were placed on a movable table in a closed cleaning chamber. The table was rotated back and forth as Freon 113® was sprayed on the items. In the August 1986 demonstration, proprietary solvent was spiked with PCB askarel fluid. The PCB-contaminated Freon 113® generated from the equipment cleaning operations or PCB-contaminated proprietary solvent were filtered first for PCB removal via canistered filtration media and/or placed in a distillation unit where the temperature was elevated to permit the Freon 113® or proprietary solvent to vaporize. The Freon 113® or proprietary solvent were then cooled and allowed to return to the liquid state for reuse. After complete distillation of the Freon 113® or proprietary solvent, the distillation unit was thermostatically turned off and the remaining PCB material was drained and packaged for disposal at an EPA-approved incinerator. Filtration canisters were also prepared for transfer to a disposal site (incineration). Further details of the methods and equipment used in distillation for the separation of PCBs from Freon 113® and proprietary solvent are

included in the permit application and process demonstration test plans on file at EPA Headquarters.

4. The Quadrex PCB decontamination/disposal unit operates as a batch process which uses a variable amount of Freon 113® or proprietary solvent to remove PCBs from surfaces and from PCB liquids such as askarel, MODEF, heat transfer fluid or hydraulic fluid which adhere to surfaces. After cleaning the PCB items, the Freon 113® or proprietary solvent were then run through the distillation process until Quadrex personnel determined through on-site analysis (off-site for the September 1985 demonstration) that the total concentration of PCBs in the Freon 113® or proprietary solvent were less than 2 ppm. The Freon 113® or proprietary solvent recovered were then ready for reuse. PCB still bottoms were removed, along with any contaminated filters, for disposal by incineration. All records of chemical analysis conducted during the demonstrations were submitted to EPA in accordance with the procedures and schedules outlined in the process demonstration test plans.

5. The Quadrex decontamination unit is designed with shut-off valves at key locations and other safety features that will act to prevent spills into the environment. The decontamination/disposal unit is under low pressure, and is designed with automatic shut-off devices should pressure or temperature exceed specified safety limits.

6. The Quadrex decontamination/disposal unit is a closed system, and does not emit harmful materials into the air, water, soils, or other surfaces. The process demonstration test plans state that operators of the unit, and persons conducting sampling of the unit use specified safety procedures and have proper protective clothing to minimize worker exposure. Liquid still bottom residues will be drained, then packaged in Department of Transportation (DOT) and EPA acceptable packaging to include appropriate liquid transport drums of 55 gallon or 30 gallon size and/or 1 to 5 gallon placed in an overpack 55 gallon or 30 gallon drum with absorbent materials sufficient to absorb twice the volume of the liquid present. These liquid wastes will be disposed of by incineration at an EPA-approved disposal site.

7. The Quadrex disposal process was shown to have a level of performance equivalent to that of thermal destruction methods (incinerators and high efficiency boilers). Under EPA regulations (40 CFR §761.60(e)) many factors are used to determine the appropriate destruction equivalency goals for alternate PCB destruction methods. Submissions from Quadrex during the permit application process have indicated that the decontamination method used to remove PCBs from Freon 113® and a proprietary solvent meet the standards set by EPA for an approved incinerator or high efficiency boiler, in terms of the efficiency of removal. Furthermore, the Quadrex PCB decontamination/disposal unit is designed to protect workers from PCB exposure and precludes any apparent release of PCBs to the environment.

8. The Quadrex PCB disposal unit is applicable to cleaning surfaces contaminated with PCBs to acceptable levels without destruction of that surface. Therefore, EPA finds that the Quadrex PCB disposal method is equivalent to a 40 CFR §761.70 incinerator or 40 CFR §761.60 high efficiency boiler and that operation of the Quadrex PCB disposal unit does not pose an unreasonable risk of injury to human health or the environment.

CONDITIONS OF APPROVAL

1. A non-confidential written advance notification must be provided to the appropriate EPA Regional Administrator, EPA Regional PCB Disposal Coordinator, State official(s), and local official(s) where the Quadrex process is to be used for disposal of PCBs. The notification must be provided to the appropriate official(s) at least 30 days, but not more than six months, in advance of operation of the permitted disposal process at the site. The content of the notification shall include at a minimum:
 - a. The nature of the PCB disposal activity.
 - b. The exact location where the disposal unit will be operating, such as the facility street address, city and state. Should there be no street address, Quadrex must provide EPA with a telephone contact such that exact location(s) may be determined by telephone inquiry.
 - c. The exact time(s) and date(s) the unit will be treating PCBs on-site. Should a change in time(s), date(s), or location(s) be expected, appropriate officials (as indicated above) must be notified by telephone immediately and be advised in writing of all changes in operating schedules. Please note that changes in time(s), date(s), or location(s) may not circumvent the original 30 day written advance notification provided to appropriate official(s).
2. Quadrex must obtain all necessary environmental approvals and/or permits from the appropriate Federal, State and local agencies prior to the treatment of PCBs at any site.
3. The Quadrex mobile PCB disposal unit will be limited to the treatment of transformers containing PCB askarel or MODEP and systems containing heat transfer and hydraulic fluid. Prior to treatment, the systems or transformers must be drained of all free-flowing fluids. The drained fluids must be disposed of in accordance with 40 CFR §761.60. In addition, Quadrex must advise its customers that transformers treated with the Quadrex process and returned to service cannot be reclassified unless the dielectric fluid is tested following a minimum three months of in-service use. In-service use is defined as use under electrically loaded conditions in which the dielectric fluid is raised to a minimum of 50°C.

The Quadrex mobile disposal unit is also authorized to use Freon 113® to spray clean office equipment such as.

- (1) telephones, desk calculators, typewriters, etc. and
- (2) paper, filefolders, and other cellulose-based documents and small document containers (excluding cardboard boxes) when these items have become surface contaminated with askarel transformer fluids. The contaminated Freon 113® must be distilled and the

still bottoms disposed of in accordance with 40 CFR §761.60.

4. The PCB concentration of the Freon 113® mixture in the still may not exceed the following levels:

- ° MODEP, 920 ppm total PCBs;
- ° Heat transfer fluid, 3,100 ppm total PCBs;
- ° Hydraulic fluid, 3,100 ppm total PCBs; and
- ° Askarel dielectric fluid, 5,000 ppm total PCBs.

The PCB concentration in a the Quadrex Proprietary Solvent (QPS) mixture in the still may not exceed the following levels:

- ° 920 ppm Aroclor 1242
- ° 4,200 ppm Aroclor 1260
- ° A total of no more than 5,120 ppm Aroclors 1242, 1254, and 1260 where the Aroclor 1242 concentration is no more than 920 ppm, the Aroclor 1254 concentration is no more than 920 ppm, and the Aroclor 1260 concentration is no more than 4,200 ppm.

Prior to treatment, samples of the Freon 113® or QPS mixture must be obtained from the still and analyzed using gas chromatography procedures specified in EPA approved procedures outlined in the following documents:

"Guidelines for PCB Destruction Permit Applications and Demonstration Test Plans for PCB Disposal by Non-Thermal Alternative Methods," August 21, 1986;

"Recommended Analytical Requirements for PCB Data Generated On Site During Non-Thermal PCB Destruction Tests," USEPA, March 19, 1986 (Draft);

"Quality Assurance and Quality Control Procedures for Demonstrating PCB Destruction in Filing for PCB Disposal Permit," USEPA, June 28, 1983 (Draft); and

"Interim Guidelines and Specifications for Preparing Quality Assurance Project Plans," OAMS-005/80, Office of Research and Development, USEPA, December 29, 1980.

Should Quadrex HPS, Incorporated successfully demonstrate to EPA through controlled experimentation or actual demonstration that the Quadrex process is capable of treating higher concentrations of PCBs in a particular fluid, this condition may be modified accordingly. Authorized EPA representatives may witness the demonstration and obtain split samples for verification of analytical results.

5. A sample of treated Freon 113® or QPS must be drawn, and analyzed in duplicate (i.e., duplicate analysis) by gas chromatography for the concentration of PCBs after the treatment of each transformer or system at the site where the Quadrex PCB Disposal Process is being used. If the concentration of PCBs in the treated sample is 2 ppm or greater, the Freon 113® or QPS must be reprocessed and reanalyzed to show less than 2 ppm per peak before the next transformer or system is treated.

6. If the quality control testing, as described in Condition (5), reveals that the PCBs have not been adequately removed after repeated processing (not to exceed three times the estimated theoretical time necessary for complete reaction), the affected unit shall cease operation. The facility operator must notify the PCB Disposal Site Coordinator in the appropriate EPA region immediately and file a written report with that region within seven (7) days. The affected unit shall not resume operation until the problem has been corrected to the satisfaction of the appropriate EPA region.

7. Provisions must be made to assure that the following process elements are suitably monitored and recorded for each transformer or system processed, such that materials harmful to health or the environment are not inadvertently released:

- a. name, address, and telephone number of the Quadrex disposal unit operator and supervisor;
- b. the name and business address of the person or firm whose PCB containing transformer/system is being processed;
- c. the location, manufacturer, rated capacity and identification (serial) number of the transformer, heat transfer system or hydraulic system;
- d. the date the transformer/system is received by Quadrex, the date(s) processed, and the date returned to the custody of the owner (if applicable);
- e. estimated quantity and quality of solvent charged into the transformer, heat transfer or hydraulic fluid system;
- f. estimated quantity and quality of treated solvent and other treated materials produced;
- g. date, time and duration of treatment per transformer or system;
- h. a copy of the gas chromatograph and/or other records from tests conducted to determine the final concentration of the treated solvent;
- i. estimated quantity and quality of wastes produced, the

method of disposal and location of the disposal facility for each waste must be documented; and

- j. temperature of reaction in at least one-half hour intervals.

Disposal recordkeeping documents must be compiled within 60 days of the testing date. must be kept at one centralized location, and must be made available for inspection by authorized representatives of the EPA. Such documents shall be maintained for a least five years. Quadrex must also maintain the records required by 40 CFR §761.180(f). If Quadrex or its authorized agents terminate business, these records or their copies must be submitted to the Director of the Exposure Evaluation Division.

In addition, Quadrex must maintain, aboard the mobile unit, a record of the PCB disposal services performed by the unit during the previous month. These records must be available for inspection by authorized representatives of EPA.

- 8. In the event Quadrex or an authorized facility operator of the Quadrex mobile unit believes, or has reason to believe, that a release of PCBs has or might have occurred, the facility operator must inform the appropriate EPA region by telephone immediately.

A written report describing the incident must be submitted to the appropriate EPA Region within five (5) business days. No PCBs may be processed in that facility until the release problem has been corrected to the satisfaction of the appropriate EPA region.

- 9. Any spills of PCBs or other fluids shall be promptly controlled and cleaned up as provided in Quadrex's spill prevention plan, and in accordance with the PCB spill cleanup procedures of the appropriate EPA region. In addition, a written report describing the spill, operations involved, cleanup actions and changes in operation to prevent such spills in the future must be submitted to the appropriate EPA region within seven (7) business days.

PCB spills must be reported in accordance with the PCB spill reporting requirements prescribed under §311 of the Clean Water Act for discharges to navigable waters and under the Comprehensive Environmental Response, Compensation, and Liability Act (Superfund) for discharges to other media.

- 10. Quadrex must take all necessary precautionary measures to ensure that operation of the Quadrex mobile unit(s) is in compliance with the applicable safety and health standards, as required by Federal, State and local regulations and ordinances.

- 11. The Quadrex mobile unit shall be secured (e.g., fence, alarm system, etc.) at each commercial site to restrict public access

to the area. Any bodily injury occurring as a result of the Quadrex PCB Disposal Process must be reported to the PCB Disposal Site Coordinator in the appropriate EPA region by the next regular business day.

12. Any reports required by Conditions (6), (8), (9), and (11) are to be submitted by telephone to the appropriate regional PCB Disposal Site Coordinator within the time frame specified. In addition, Quadrex shall file written reports with the Regional Administrator of the appropriate EPA region, and the Director of the Exposure Evaluation Division within the time frame specified in the aforementioned conditions.

13. Quadrex shall be responsible for ensuring that personnel directly involved with the handling or disposal of PCB-contaminated fluid using the Quadrex PCB Disposal Process are demonstrably familiar with the general requirements of this approval. At a minimum, this must include:

- a. the type of materials which may be treated using the Quadrex PCB Disposal Process, and the upper limit of PCB contamination which may be treated;
- b. basic recordkeeping requirements under this approval and the location of records;
- c. notification requirements;
- d. waste disposal requirements for process and by-product wastes generated during the operation of the Quadrex PCB Disposal Process; and
- e. reporting requirements.

In this regard, Quadrex must maintain on-site during the operation of its mobile unit a copy of this approval; the spill prevention and cleanup plan; and sampling and analytical procedures used to determine PCB concentrations in untreated and treated materials.

14. Untreated PCB fluids may not be transported off-site on the Quadrex mobile unit. Process equipment (i.e., reactors, pumps, hoses, etc.) on the mobile unit must be decontaminated in accordance with procedures described in Quadrex's permit application and test plan, prior to transporting off-site. PCB-contaminated equipment must be transported in accordance with 40 CFR §761.40 and the U.S. Department of Transportation (USDOT) requirements of Title 49 CFR Part 172, including placarding the mobile facility and labelling all PCBs.

15. The carbon entrapment cannister must be replaced every six (6) months or immediately after 600 hours of unit operation.

16. All wastes generated by the Quadrex PCB Disposal Process

other than the successfully cleaned Freon 113® or OPS solvent, (i.e., filter media, sludges, water or other effluents, etc.) must be disposed of as if it contains the original PCB feedstock concentration. EPA will consider amending this condition only after such waste has been fully characterized to determine all components, and gas chromatography analysis of the waste demonstrates that the PCB concentration is below 2 ppm.

17. Quadrex shall incorporate financial assurance of closure and liability coverage provisions into its closure plan. These provisions must be equivalent to those specified in 40 CFR Part 264, Subpart H of the Resource Conservation and Recovery Act (RCRA), and provide funds for:

- a. proper closure of the mobile PCB disposal units, and
- b. compensating others for bodily injury and property damage caused by accidents arising from operations of the mobile disposal units.

18. Quadrex must file a written pre-operation report with the Director of the Exposure Evaluation Division within thirty (30) days from the date of manufacture of each additional Quadrex mobile unit which is to be operated in the United States. This report shall contain the following information:

- a. date of manufacture of the unit;
- b. identification and/or serial number of the new Quadrex mobile unit;
- c. certification by an independent, registered professional engineer to the effect that the Quadrex mobile unit is substantially identical to the original unit in terms of engineering design, hardware, process capacity, quality and workmanship;
- d. certification by the chief executive officer of Quadrex HPS, Incorporated signifying that the Quadrex mobile unit construction has been completed in such manner; and
- e. a list of all substantive and nonsubstantive changes made to the design and construction of any new Quadrex mobile unit which is not identical to the original Quadrex mobile unit.

19. No major modifications may be made to the Quadrex unit design, as described in the application and demonstration plan for this approval, without written approval of the Director of the Exposure Evaluation Division. For the purpose of this approval, "major modification" shall be defined as any change to capacity, design, efficiency, waste type, or any other changes affecting overall performance or environmental impact.

20. Quadrex must notify EPA at least 30 days before transferring ownership in the Quadrex PCB Disposal Process. Quadrex must also submit to EPA, at least 30 days before such transfer, a notarized affidavit signed by the transferee which states that the transferee will abide by Quadrex's EPA approval. Within thirty days of receiving such notification and affidavit, EPA will issue an amended approval substituting the transferee's name for the Quadrex name or EPA may require the transferee to apply for a new PCB disposal approval. In the latter case, the transferee must abide by Quadrex's EPA approval until EPA issues the new approval to the transferee.

21. Quadrex shall comply with all applicable requirements of the Federal PCB Regulation, 40 CFR Part 761, in the operation of the mobile Quadrex PCB Disposal unit(s). Particular note shall be given to:

- a. 40 CFR, section 761.65 - storage for disposal;
- b. 40 CFR, section 761.79 - decontamination; and
- c. 40 CFR, section 761.180 - records and monitoring.

22. The conditions of this approval are severable, and if any provision of this approval or any application of any provision is held invalid, the remainder of this approval shall not be affected thereby.

23. This approval shall supersede all previous U.S. EPA Headquarters and/or U.S. EPA Regional PCB disposal approvals or amendments for the Quadrex PCB Disposal Process.

24. This approval shall expire on July 5, 1988. For a renewal approval, EPA may require additional information and/or testing of the Quadrex PCB Disposal Process. In order to continue the effectiveness of this approval pending EPA action on reissuance, Quadrex must submit a renewal request letter to EPA at least 90 days, but not more than 180 days, prior to the expiration date of this approval.

APPROVAL

1. Approval to dispose of PCBs is hereby granted to Quadrex HPS, Incorporated of Gainesville, Florida subject to the conditions expressed herein, and consistent with the material and data included in the application filed by the company. EPA reserves the right to impose additional conditions when it has reason to believe that the continued operation of the Quadrex mobile unit presents an unreasonable risk to public health or the environment, new information requires changes, or EPA issues new regulations or standards for issuing permits.

Any departure from the conditions of this approval or the terms expressed in the application must receive prior written authorization from the Director of the Exposure Evaluation Division. In this context, "application" shall be defined as all data and materials which have been received by this Agency from Quadrex HPS, Incorporated regarding the Quadrex PCB Disposal Process.

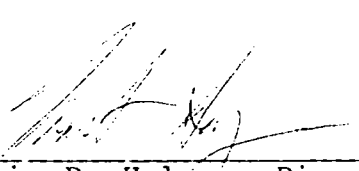
2. This approval to dispose of PCBs does not relieve Quadrex HPS, Incorporated of the responsibility to comply with all applicable Federal, State and local regulations. Violation of any applicable regulations will be subject to enforcement action, which may include termination of this approval. This approval may be rescinded at any time for failure to comply with the terms and conditions herein, or for other reasons which the Director of the Exposure Evaluation Division deems necessary to protect the public health and the environment.

3. Quadrex HPS, Incorporated shall be responsible for the actions of any authorized Quadrex PCB Disposal Process employees when those actions are within the scope of operating or moving the Process, and shall assume full responsibility for compliance with all applicable Federal, State and local regulations including, but not limited to, any advance or emergency notification and accident reporting requirements.

4. EPA reserves the right for its employees or agents to inspect Quadrex PCB disposal activities at any location or reasonable time.

FEB 12 1987

Date



Martin P. Halper, Director
Exposure Evaluation Division