

Harding Lawson Associates



June 29, 1992

11935 038

State of New Mexico
Environment Department
1190 St. Francis Drive
Santa Fe, New Mexico 87502

Attention: Edward L. Horst
RCRA Program Manager
Hazardous and Radioactive Materials Bureau

Ladies and Gentlemen:

NMD000804292
Request for Determination
Revised Permit Application
Safety-Kleen Corporation
Albuquerque Service Center

Pursuant to direction from Mr. Robert Wachsmuth of Safety-Kleen Corporation (Safety-Kleen), Harding Lawson Associates is submitting a draft revised hazardous waste facility permit application which reflects requested operational and procedural changes at the Albuquerque service center. After reviewing the permit modification classes listed in Title 40 Code of Federal Regulations (40CFR) Section 270.42 Appendix I, Safety-Kleen is requesting that all but three of these revisions be designated as Class 1 permit modifications because they reflect administrative changes. The remaining three revisions, discussed below, are requested as two Class 2 modifications and one Class 3 modification. We respectfully request that you make a determination regarding the class of permit modification we have assigned to each revision.

This submittal includes:

- o Tables which list the Class 1, 2, and 3 revisions made to the permit application and a brief explanation of each.
- o Revised pages of the permit application (with the changes underlined and the date on which the changes are made). Please note that the entire text of the permit application (except for the appendices) has been reprinted due to a modification of the software on which the permit application is stored. Therefore, the attached version of the permit application's text supersedes the previous text.

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- o Revised pages of the appendices.
- o Pages of the permit with requested revisions.

Please be aware that the attached revised pages of the permit application address the removal of drum color as discussed in Safety-Kleen's letter dated November 21, 1992 (and approved in your letter dated February 24, 1992).

Currently, the service center's permit allows for a maximum of 2,000 gallons in the Building H Flammable Storage building (shelter). Recently, TERA, Inc. assessed the secondary containment provided for the shelter and certified it as 965 gallons. Because of an increasing market and to allow for various contingencies, we respectfully request that a Class 3 permit modification be granted to allow for a maximum storage of 9,650 gallons in the shelter (40 CFR 264.175(b)(3)). The revised permit application reflects this proposed change and includes a copy of the TERA, Inc. assessment report.

Section 2.2 (Quantitative Testing) of the permit application has been deleted. The testing described in this section is performed at Safety-Kleen Recycle Centers and is not a standard operating procedure at service centers; this information was inadvertently included in the permit application for the Albuquerque service center. Safety-Kleen proposes that the qualitative testing described in Section 2.2.1 of the permit application and Attachment I-1 of the permit are adequate to comply with the requirements of 40CFR 264.13. Therefore, we respectfully request that a Class 2 permit modification be granted.

There are two issues Safety-Kleen would like to address regarding sections of the permit (as opposed to the permit application). Attachment I-1 of the permit (i.e., Waste Analysis Plan) includes two pages, both numbered as page 6, which describe the sampling and analytical procedures for the Safety-Kleen Recycling Center. Safety-Kleen is requesting that:

- o volatile organic analyses for spent mineral spirits and immersion cleaner be restricted to the organics listed in the table attached to the pages from the permit with requested revisions because these are the only volatile organics in onsite waste streams;
- o analyses for all waste streams are performed on a representative sample taken annually;
- o the parameter of pH be deleted for the immersion cleaner because the new formula is petroleum-based (i.e., pH is not a critical parameter);
- o the only volatile organic analyzed for in the dry cleaning wastes is perchloroethylene because it is the only volatile organic likely to be present;

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- o pH be deleted for dry cleaning solvent wastes because it is not a critical parameter.

Safety-Kleen respectfully requests that a Class 2 permit modification be granted for the above.

In addition, Module IV (Tanks) of the service center's permit lists organic solvents and various waste codes between D004 and D043 for the spent mineral spirits stored in the waste tank. Because D001 is the primary waste code for this waste stream (as reflected in the Part A and B permit applications), Safety-Kleen respectfully requests the Module IV be revised to reflect this. We request that this revision be designated a Class 1 permit modification.

After your determination regarding class of permit modification has been made we will formally submit the revised permit application. This will include properly signed certification and attestation statements as provided on page ii of the permit application.

According to the requirements of 40CFR 270.42 Safety-Kleen will notify all persons on the facility mailing list which is maintained by the Director of the New Mexico Environment Department. A notice will be made and a public meeting will be scheduled for the proposed Class 2 and 3 permit modifications.

Yours very truly,

HARDING LAWSON ASSOCIATES



Marilyn A. Blume
Associate Environmental Scientist



John C. Blasco
Principal Environmental Scientist

MB/JCB/seb/T24243-H

Attachments: Tables-Requested Class 1, 2 and 3 Permit Modifications
Permit Application (Without Appendices)
Revised Appendix Pages
Revised Permit Pages

cc: R. Wachsmuth, Safety-Kleen
J. Bard, Safety-Kleen (letter only)

TABLES I, II AND III

**TABLE 1
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 1
PERMIT MODIFICATIONS**

Section, Page or Paragraph Reference	Revision Type	Description/Explanation
✓ Cover page	Addition	Cover page shows new revision date for the permit application.
✓ Certification and Attestation Statements	Substitution	The certification and attestation statement reflect the new revision date and Mr. Robert Wachsmuth as the Regional Environmental Engineer (as opposed to Ms. Ellen Jurczak).
✓ Table of Contents Appendices	Additions, Changes to Titles	TCLP analytical data has been added to Appendix D. Appendix E of the Table of Contents includes "Examples of Container Specifications," which replaces the titles for specific container types (information in appendix remains the same); and "Certification of H-3 Flammable Storage Building," a report which includes information of the capacity for secondary containment in the storage building. Appendix F of the Table of Contents includes a minor change to the title of the second document under that appendix. The Telephone Spill Log has been replaced by the "Field Spill Report Form."

[Handwritten notes and signatures, including a signature that appears to be "John P. ..."]

**TABLE 1
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 1
PERMIT MODIFICATIONS
(continued)**

Section, Page or Paragraph Reference	Revision Type	Description/Explanation
1.0 FACILITY DESCRIPTION		
✓ Abstract	Addition, Deletion	✓ The structure in which paint waste is stored is a masonry shelter as opposed to metal.
1.1 Description of Business Activity		
✓ Paragraph 2	Addition, Deletion	✓ The term "three" has been replaced with the term "several."
1.1.1 Parts Cleaner Service	Additions, Deletions	✓ References to container capacities have been deleted; references to containers meeting DOT requirements have been added.
1.1.2 Waste Management Management Practices		
Paragraph 6	Addition	✓ The title of branch manager has been changed to resource recovery branch manager.
1.1.3 Paint Waste Collection Service	Addition, Deletion	✓ Reference to container capacities have been deleted; reference to containers meeting DOT requirements have been added.
1.2 Description of the Facility		
Paragraph 1	Addition	✓ The date of installation/construction has been added for the tanks, return and fill station and the flammable storage shelter.

(Handwritten notes and stamps, including a circular stamp with illegible text)

**TABLE 1
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 1
PERMIT MODIFICATIONS
(continued)**

Section, Page or Paragraph Reference	Revision Type	Description/Explanation
1.2.2 Waste Management Practices		
2 Paragraph 2	Addition, Deletion	✓ Reference to container capacity has been deleted and replaced with general reference to spent material. A more accurate description of the secondary containment in the return and fill station is provided.
Paragraph 4	Additions, Deletions	✓ References to container capacities and color coding have been deleted; this sentence has been revised to indicate that containers are segregated according to their contents and not mixed onsite.
Paragraph 5	Addition	✓ This paragraph has been added to indicate that all containers used for storage of hazardous waste will meet DOT requirements and that the specifications provided in Appendix E are examples of containers in which hazardous waste is stored.
Paragraph 8	Additions, Deletions	✓ References to container capacities and color coding have been deleted; references to containers which meet DOT requirements have been added.
Paragraph 9	Additions, Deletions	✓ This paragraph has been revised to indicate that the storage configuration for containers shown in Appendix C is an example of how containers will be stored and that containers will not be

**TABLE 1
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 1
PERMIT MODIFICATIONS
(continued)**

Section, Page or Paragraph Reference	Revision Type	Description/Explanation	
2.2 <i>med</i>	Quality Control Procedures	Additions, Deletions	References to container capacities and specific amounts of material in containers have been deleted; references to containers which meet DOT requirements have been added. <i>★ 11/1/01</i>
	Paragraph 4	Deletion	Item 9., which stated that waste shipments to the Denton Recycle facility from the Albuquerque service center are not mixed with waste shipments from other branches, has been deleted. Compatible waste shipments from various service centers may be mixed. <i>← 11/1/01</i>
2.2.1 <i>med</i>	Qualitative Waste Analysis, II	Addition	A sentence has been added to the introductory paragraph which indicates that the new formula immersion cleaner is a TCLP waste. A similar sentence has been added to Subsection B. New Immersion Cleaner. <i>11/1/01</i>
2.6 <i>med</i>	Operating Record		The title for this section has been changed from Operating Log to Operating Record.

**TABLE 1
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 1
PERMIT MODIFICATIONS
(continued)**

Section, Page or Paragraph Reference	Revision Type	Description/Explanation
3.0		PREPAREDNESS AND PREVENTION PLAN
/ 3.1	Addition, Deletion	Section e. of Security Measures has been revised to indicate that outdoor lighting is on during low light hours of the day as opposed to 24 hours a day added.
3.2	Addition, Deletion	A general sentence referring to the regional manager has been deleted; review of the Facility Inspection Record by the regional environmental engineer (or regional manager) and the branch manager has been added.
3.3		Facility Design
3.3.1		Tank Storage
Paragraph 1	Addition	This paragraph has been added to describe TERA, Inc.'s supervision of the installation assessment of the tank system. <i>Added to permit</i>
Paragraph 5	Addition	This paragraph has been added to note that the waste solvent tank has cathodic protection.
3.3.2		Drum Storage
Paragraph 1	Addition	It has been noted that the drum storage area is coated with epoxy and urethane "or equivalent". <i>Added to permit</i>

**TABLE 1
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 1
PERMIT MODIFICATIONS
(continued)**

Section, Page or Paragraph Reference	Revision Type	Description/Explanation
Paragraph 2	Addition, Deletion	The structure in which paint is a masonry shelter (as opposed to metal). In addition, a sentence has been added which indicates that the secondary containment is designed of coated concrete. <i>Completed</i>
3.3.3 Compatibility of Containers with their Contents	Addition, Deletion	Reference to color coding of containers has been deleted; reference to containers meeting DOT requirements has been added. <i>Completed</i>
3.4 Plant Operations		
3.4.1 Potential Minor Spill Sources	Deletion	Reference to container capacity has been deleted.
3.4.4 Tank Evaluation and Repair Plan		
Paragraph 2	Addition	The statement that the tank assessment will be performed "in accordance with 40 CFR 264.191" has added. <i>Completed</i>

**TABLE 1
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 1
PERMIT MODIFICATIONS
(continued)**

Section, Page or Paragraph Reference	Revision Type	Description/Explanation
4.0	CONTINGENCY PLAN	
/	Abstract	Addition, Deletion
		<p style="text-align: right;"><i>Change to the Emergency Coordinator section of the Abstract</i></p> <p>✓ The Emergency Coordinator section of the Abstract has been revised to indicate that the alternate emergency coordinator is an appropriately trained employee designated by the branch manager; previously it had been indicated that the branch secretary was the alternate emergency coordinator (please note that specific names, addresses, etc. for alternate emergency coordinators are included in Appendix F). The structure in which paint is a masonry shelter (as opposed to metal). The Emergency Notifications section of the Abstract has been modified to reflect more current information (e.g., telephone numbers).</p>
4.2	Emergency Coordinator	Additions, Deletions
/		<p>○ This section has been revised to indicate that the alternate emergency coordinator Responsibilities is an appropriately trained employee designated by the branch manager; previously it had been indicated that the branch secretary was the alternate emergency coordinator (please note that specific names, addresses, etc. for alternate emergency coordinators are included in Appendix F).</p>

**TABLE 1
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 1
PERMIT MODIFICATIONS
(continued)**

Section, Page or Paragraph Reference	Revision Type	Description/Explanation
4.3		Emergency Response Procedures
4.3.2	Addition	The <u>Spill Report Telephone Log</u> has been replaced by the <u>Field Spill Report Form</u> .
4.3.3		Fire Control Procedures
Paragraph 3	Addition	This paragraph has been revised to distinguish between the old and new immersion cleaner formulas.

**TABLE 1
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 1
PERMIT MODIFICATIONS
(continued)**

Section, Page or Paragraph Reference	Revision Type	Description/Explanation
5.0 PERSONNEL TRAINING		
Abstract	Addition	The title of the second column of "Time of Training" has been changed from "Prior to Starting Work" to "Prior to Working in Unsupervised Position" to be consistent with 40CFR 264.16(b). The title of branch manager has been changed to resource recovery branch manager. The position of branch sales manager has been added. Please note that position descriptions have been included in Appendix G. An "X" under the "Prior to Working in Unsupervised Position" has been added for the Warehouseman.
5.1 Outline of Training Program	Additions, Deletions	All facility employees, as opposed to new branch managers complete introductory training. The title of branch manager as been changed to resource recovery branch manager.
5.2 Organization Structure and Job Descriptions	Addition	This section has been expanded upon to further describe the corporate and service center organization and structure.
5.2.2 Environment, Health and Safety Department	Addition	A sentence has been added to indicate that the EHS Department includes Safety-Kleen's environmental engineers. Item A has been revised to clarify the role of the EHS Department as overseeing the

**TABLE 1
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 1
PERMIT MODIFICATIONS
(continued)**

Section, Page or Paragraph Reference	Revision Type	Description/Explanation
5.2.2 (continued)		training of personnel (this section is now consistent with Section 5.2).
1002? 5.3 ✓ Description of the Training Program	Addition	This paragraph has been revised to more clearly describe the training of service center employees. <i>Need App G1 as there are changes to App G1</i>
5.3.1 ✓ Training of New Resource Recovery Branch Managers		
1002? ✓ Paragraph 1	Addition	Waste analytical profiles have been added to the list of records to be reviewed by new branch managers.
2? ✓ Paragraph 2	Addition, Deletion	The length of training time for new branch managers is "about" four weeks as opposed to four weeks. In addition, the reference to "at least eight hours" of training in the Part B has been deleted. This approximation of time will not result in deletion of any topics or a change in content which new branch managers must address. The branch manager will be trained in the Part A as well as the Part B.
5.3.3 Training of New Sales Managers 2	Addition	The position of sales manager has been added the list of positions at the service center. A job description is included in Appendix G.

TABLE 1
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 1
PERMIT MODIFICATIONS
(continued)

Section, Page or Paragraph Reference	Revision Type	Description/Explanation
5.3.4 ✓ 1 or 2? Training of New Sales Representatives	Deletion	The number of this section has been changed from 5.3.3 to 5.3.4. The specific length of training time for new sales representatives (i.e., two weeks) has been deleted. This approximation of time will not result in deletion of any topics or a change in content which new sales representatives must address. Slides and tapes as well as videotape will be used in the training program.
✓ 5.3.5 1 Training of New Warehousemen	Change	The number of this section has been changed from 5.3.4 to 5.3.5.
✓ 5.3.6 1 or 2? Annual Training	Addition, Deletion	The number of this section has been changed from 5.3.5 to 5.3.6. "It" has changed to "The annual training". Slides and tapes as well as videotape will be used in the training program.

**TABLE 1
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 1
PERMIT MODIFICATIONS
(continued)**

Section, Page or Paragraph Reference	Revision Type	Description/Explanation
APPENDIX A		
Part A <i>1003</i>	✓ Addition	The appropriate TCLP codes have been added to the Part A; this is considered an informational change because the state was notified in writing previously (see also Table III, Class 3 Permit Modifications).
APPENDIX D		
Analytical Data <i>203</i>	✓ Addition	TCLP analytical data has been included in Appendix D.
APPENDIX E		
Equipment Information	Additions <i>new find Site plan on desktop media</i>	A site plan showing location of emergency equipment has been added. The emergency equipment list has been revised for purposes of clarification. A cover sheet for the specific container specifications provided Appendix E has been added to indicate that these specifications are examples and that all containers will meet DOT requirements. In addition, the TERA, Inc. regarding certification of the secondary containment of the flammable storage building has been included.
APPENDIX F		
Emergency Information 1	✓ Additions, Deletions	The Emergency Information sheet has been updated with current names, addresses, telephone numbers, etc. The Employees Functions During an Emergency sheet has been retitled, specific employee names have been

TABLE 1
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 1
PERMIT MODIFICATIONS
(continued)

Section, Page or Paragraph Reference	Revision Type	Description/Explanation
APPENDIX F (continued)		deleted (however, assignment of functions during an emergency are still assigned by job title) and responsibilities have been slightly reorganized (however, this reorganization does not affect the emergency coordinator, or alternate from meeting regulatory requirements.
APPENDICES F Emergency Information and G Training Information	Additions, Deletions	Revised job descriptions have been added for branch manager, sales representatives and warehouseman.
APPENDIX H Financial Information	Addition, Deletion	The previous financial assurance documentation has been replaced by the most current (i.e., March 23, 1992).

**TABLE 1
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 1
PERMIT MODIFICATIONS
(continued)**

Section, Page or Paragraph Reference	Revision Type	Description/Explanation
<p>2 TANKS - MODULE IV (Permit)</p>	<p>Addition</p>	<p>[Please note that this requested revision regards language in the permit as opposed to the permit application.] Module IV (Tanks) lists organic solvents and various waste codes for spent mineral spirits stored in the tank. Because D001 is the primary waste code, Safety-Kleen requests that it be added.</p>

1 Reference to Permit Application dated November 1990.

**TABLE II
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 2
PERMIT MODIFICATIONS**

Harding Lawson Associates

Section, Page or Paragraph Reference ¹	Revision Type	Description/Explanation
Issue 1:		
✓ 2.2 Quantitative Testing <i>2</i>	Deletion	This section has been deleted. The testing described in this section is performed at Safety-Kleen Recycle Centers. It is not a standard operating procedure at Safety-Kleen service centers. This section was inadvertently included in the permit application for the Albuquerque service center. The qualitative testing described in Section 2.2.1 and Attachment I-1 of the permit are adequate to comply with the requirements of 40CFR 264.13.
Issue 2:		
Pages 6 and 6 of the facility permit <i>2023</i>	Deletions	[Please note that the following requested permit revisions to pages in the permit are found immediately behind the revised appendix pages.] Pages 6 and 6 of the facility permit application describe analyses to be performed at the service center. Safety-Kleen is requesting that volatile organic analyses be restricted to the organics listed in Table 1 for spent mineral spirits and immersion cleaner because these are the only volatile organics in onsite waste streams; that analyses for all waste streams are performed on a representative sample taken annually; that the parameter of pH be deleted for the immersion cleaner because the new formula is petroleum-based (i.e., pH is not a critical parameter); that the only volatile organic analyzed for in the dry

TABLE II
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 2
PERMIT MODIFICATIONS
(continued)

Harding Lawson Associates

Section, Page or Paragraph Reference ¹	Revision Type	Description/Explanation
Issue 2 (continued)		cleaning wastes is perchloroethylene because that is the only volatile organic likely to be present; that pH be deleted for dry cleaning solvent wastes because it is not a critical parameter;.

1 Reference to Permit Application dated November 1990.

**TABLE III
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 3
PERMIT MODIFICATION**

Section, Page or Paragraph Reference ¹	Revision Type	Description/Explanation
<p>This Class 3 permit modification request addresses an increase in the maximum storage capacity of the H-3 Flammable Class 1B Storage Building (shelter). The maximum would increase from 1,092 gallons to 9,650 gallons (an increase of 8,558 gallons). The shelter has recently been certified as providing 965 gallons of secondary containment. the following revisions have been made to the permit application:</p>		
1.0 FACILITY DESCRIPTION		
3 ✓ Abstract	Additions, Deletions	The table reflects the increase in the secondary containment capacity and the storage capacity in the shelter. The same change has been made to the facility description information in the Contingency Plan Abstract.
3 ✓ Section 1.2.2, Paragraph 8	Additions, Deletions	The revisions to this paragraph reflects the increase in the maximum storage capacity in the shelter.
2.0 WASTE ANALYSIS PLAN		
3 ✓ Abstract	Addition	The facility capacity for paint waste and dumpster sediment (i.e., waste stored in shelter) is listed as 9,650 gallons (reflects increase in maximum storage capacity.)
6.0 CLOSURE PLAN		
3 ✓ Abstract	Additions, Deletions	Item d. has been revised to reflect the increase in the maximum storage capacity of the shelter.

**TABLE III
SAFETY-KLEEN
ALBUQUERQUE SERVICE CENTER
REQUESTED CLASS 3
PERMIT MODIFICATION
(continued)**

Section, Page or Paragraph Reference ¹	Revision Type	Description/Explanation
✓ APPENDIX A Part A Permit Application Section XII, Item 2:	Revision to process design capacity	The process design capacity for container storage has been increased from 1,092 to 9,650. This is the result of changing the maximum storage capacity in the shelter from 1,092 gallons to 9,650 gallons.
APPENDIX E		
3) Equipment Information	(Addition	The report from TERA, Inc. certifying secondary containment for the shelter has been added.
3) APPENDIX H Revised Closure Cost Estimate	Additions, Deletions	The revised closure cost estimate reflects the increase in the maximum storage capacity in the shelter.

1 Reference to Permit Application dated November 1990.

**REVISED PAGES
FOR
ALBUQUERQUE SERVICE CENTER
PERMIT APPLICATION**

**STORAGE FACILITY
PERMIT APPLICATION
SAFETY-KLEEN CORP. SERVICE CENTER
ALBUQUERQUE, NEW MEXICO
NMD 000804294**

Prepared by: SAFETY-KLEEN CORP.

September 16, 1987

Revised: May 4, 1990

Revised: September 25, 1990

Revised: November 9, 1990

Modified: June 26, 1992

CERTIFICATION STATEMENT

Albuquerque, New Mexico Service Center

NMD 000804294

The undersigned, being a vice president of Safety-Kleen Corp., the permit applicant, certifies under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

David A. Dattilo
Vice President, Sales and Service

Date

Scott E. Fore
Vice President, Environment, Health and Safety

Date

ATTESTATION

The undersigned, attesting witness to the Certification Statement and this document dated June 26, 1992, of which this affidavit is a part, states that I am personally responsible for the preparation of the document, that I personally gathered the information contained herein, and further that the information, to the best of my knowledge and belief, is true, accurate and complete.

Robert P. Wachsmuth [June 26, 1992]
✓ Regional Environmental Engineer [June 26, 1992]

Date

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Appendices

A PART A APPLICATION

B PROCESS FLOW DIAGRAMS

Safety-Kleen Solvent Use and Regeneration Loop
Unit Process for the Handling of Spent Mineral Spirits
Unit Process for the Handling of Spent Immersion Cleaner, Dry Cleaning Waste
and Paint Waste

C MAPS AND FACILITY DRAWINGS

General Location Map
Topographic Map 1" = 200'
Zoning Map
Plat Map
100-Year Flood Plain Map
Water Main Map
Storm Sewer Map
Sanitary Sewer Map
Wind Rose
Site Plan
Floor Plan
Ignitable Waste Storage Shelter
Drum Washer Plans (2)

D ANALYTICAL DATA

Analyses of Tank test (2 pages)
Analyses of Spent Mineral Spirits
Analyses of Mineral Spirits Dumpster Sediment
Analyses of Spent Immersion Cleaner (4 pages)
Analyses of Dry Cleaner Still Bottoms (3 pages)
Analyses of Dry Cleaner Filter Residue (3 pages)
Analyses of Paint Wastes (6 pages)
Mineral Spirits Specifications
Immersion Cleaner Specifications

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FACILITY DESCRIPTION ABSTRACT

CORPORATE HEADQUARTERS: Safety-Kleen Corp.
777 Big Timber Road
Elgin, IL 60123
708/697-8460

RESPONSIBLE OFFICIALS: David A. Dattilo
Vice President, Sales and Service

Scott E. Fore
Vice President, Environment, Health and Safety

FACILITY ADDRESS: Safety-Kleen Corp. (7-008-01)
2720 Girard NE
Albuquerque, NM 87107

TELEPHONE NUMBER: 505/884-2277

U.S. EPA I.D. NUMBER: NMD 000804294

GEOGRAPHIC LOCATION: 35° 06' 44" N
106° 36' 46" W

OWNER: Safety-Kleen Corp.

DATE OPERATIONS BEGAN: March 1, 1977

DESCRIPTION OF ACTIVITIES: This facility is an accumulation point for spent solvents generated by Safety-Kleen customers, the majority of whom are small quantity generators. All wastes are ultimately shipped to a Safety-Kleen recycling facility or a contract reclaimer and then returned to the Company's customers as product.

PROPERTY DESCRIPTION: About 1.05 acres with the following structures:

- a. one building with offices and a warehouse with two areas for container storage;
- b. two underground double-walled storage tanks (one for product and one for spent solvent);
- c. one loading dock with a solvent return and fill station; and
- d. one enclosed shelter to be used for container storage.

FACILITY TYPE: Storage in an aboveground tank (S02) and in containers (S01)

STORAGE UNIT	CAPACITY (GAL.)	SECONDARY CONTAINMENT(GAL.)	MATERIAL TO BE STORED
Tank	12,000	*	Spent Mineral Spirits Solvent (D001) ¹
Container Storage--East Warehouse	2,592	448.4	Spent Immersion Cleaner old formula (F002, F004) ¹ new formula (see ¹) Dry Cleaning Waste (F002) ¹
Container Storage--Warehouse West Warehouse	3,456	549.8	Spent Immersion Cleaner old formula (F002, F004) ¹ new formula (see ¹) Dry Cleaning Waste (F002) ¹
Container Storage-- ✓Masonry Shelter	<u>9,650</u> [June 26, 1992]	<u>965</u> [June 26, 1992]	Paint Waste (D001, F003, F005) ¹ Dumpster Sediment (D001) ¹

* indicates double-walled tank

¹ D004, D005, D006, D007, D008, D009, D010, D011, D018, D019, D021, D022, D023, D024, D025, D026, D027, D028, D029, D030, D032, D033, D034, D035, D036, D037, D038, D039, D040, D041, D042 and D043

1.0 FACILITY DESCRIPTION

1.1 Description of Business Activity

Safety-Kleen Corp. is an international service-oriented company whose customers are primarily engaged in automotive repair, industrial maintenance and dry cleaning. The company has been operating since 1968 offering solvent collection and reclamation services for its 400,000 customers, more than 99% of whom generate less than 1000 kilograms (2200 pounds) per month. In 1989, Safety-Kleen reclaimed more than 40 million gallons of spent solvent.

Currently, Safety-Kleen offers several [June 26, 1992] services, [deleted "three of": June 26, 1992] which involve the accumulation and storage of spent solvent at 164 service centers in 46 states. These wastes are shipped from the service centers to one of seven Safety-Kleen recycle centers or to an independent reclaimer and are then returned to customers as usable product. A unique feature of this system is that Safety-Kleen retains ownership of the parts cleaning machines and the solvent. This "closed loop" system allows the Company to maintain control of the solvent except while it is in use at the customer's place of business. A description of each of these [deleted "three": June 26, 1992] services follows.

1.1.1 Parts Cleaner Service

The original service offered by the Company in 1968 was the parts cleaner service and it remains the primary business activity. This service involves the leasing of a small parts degreasing unit which consists of a sink affixed to a drum which meets Department of Transportation (DOT) requirements (typically a 5-, 16- or 30-gallon container) [June 26, 1992] and contains Safety-Kleen 105 Solvent (mineral spirits). On a regularly scheduled basis, a Safety-Kleen sales representative cleans and inspects the parts washer

machine and replaces the drum of used solvent with one of clean product. Each sales representative performs about fifteen of these services per day, collecting the drums of used solvent on a route van.

At the end of each day, the solvent is transferred from the drums to a storage tank at the service center and drums of product are prepared for the next day's services. Periodically, a tanker truck is dispatched from one of the recycle centers to deliver a load of clean solvent and collect the spent solvent at the service center. Two-thirds of the solvent used by Safety-Kleen customers has been reclaimed with the remainder being purchased from a vendor.

Safety-Kleen has also established a parts cleaner service for users who own their machines. This service, known as the Customer Owned Machine Service, provides a solvent reclamation service to these customers regardless of machine model. The used solvent is pumped (using a hand pump) from the customer owned machine to a container which meets DOT requirements [June 26, 1992] by a Safety-Kleen sales representative. The waste solvent is stored in the same manner as the waste cleaner solvent collected from our leased parts cleaner machines. The sales representative then refills the customer-owned machine with drummed Safety-Kleen mineral spirits solvent via the hand pump. The same analyses are performed on waste solvent from customer-owned machines as are down-leased parts cleaner machines.

A second type of parts washer, the immersion cleaner, is available for the removal of varnish and gum from such things as carburetors and transmissions. This machine consists of an immersible basket with an agitator affixed to a container which meets DOT requirements (typically a 16-gallon drum) and [June 26, 1992] containing a chlorinated solvents/cresylic acid blend. The spent solvent remains in the drum after

delivery to the service center where it is stored in a contained area of the warehouse. Periodically, a box trailer truck is dispatched from a recycle center to deliver drums of fresh solvent and collect the drums of spent solvent for reclamation.

1.1.2 Dry Cleaner Service

In 1984, Safety-Kleen began offering a service for the collection of filter cartridges and still bottoms contaminated with dry cleaning solvents (usually perchloroethylene). These wastes are drummed on the customer's premises and are periodically collected by a sales representative. The drummed waste is accumulated in a contained area of the warehouse for shipment to a Safety-Kleen recycle center. About 35% of this waste is returned to dry cleaners as usable product.

In accordance with 40 CFR 264.73, Safety-Kleen maintains a manifest system, an operating log, biennial reports and all other records required under these sections.

The operating record must include:

- 1) a record of hazardous waste shipments rejected by the facility including the following:
 - a. the name of the generator and transporter,
 - b. the manifest number,
 - c. the date the shipment was rejected, and
 - d. the reason for rejection;
- 2) personal training records for all current personnel; and
- 3) The contents of the waste storage tank, the quantity of each waste received, and the date each period of accumulation begins (i.e., the date each waste solvent pickup occurs) must also be included in the operating record.

A biennial report must be submitted by March 1 of each even numbered year.

The biennial report shall be submitted on form 8700-13B. The report shall cover

facility activities during the previous calendar year and shall include all of the following information:

- (a) The EPA identification number, name, and address of the facility.
- (b) The calendar year covered by the report.
- (c) For off-site facilities, the EPA identification number of each hazardous waste generator from which the facility received a hazardous waste during the year, and, for imported shipments, the name and address of the foreign generator.
- (d) A description and the quantity of each hazardous waste the facility received during the year. For off-site facilities, this information shall be listed by EPA identification number of each generator.
- (e) The method of treatment, storage, or disposal for each hazardous waste.
- (f) The most recent closure cost estimate under 40 CFR 264.142.
- (g) The certification signed by the owner or operator of the facility or the owner or operator's authorized representative.

Safety-Kleen must implement the manifesting system required under 40 CFR 264.71.

If the facility receives hazardous waste accompanied by a manifest, the resource recovery branch manager [June 26, 1992] (branch manager) or his designate shall do all of the following:

- (a) Sign and date each copy of the manifest to certify that the hazardous waste covered by the manifest was received.
- (b) Note any significant discrepancies in the manifest on each copy of the manifest.
- (c) Within 30 days after the delivery, send a copy of the manifest to the generator.
- (d) Retain, at the facility, a copy of each manifest for not less than 3 years from the date of delivery. (Safety-Kleen is the TSD as well as the transporter so only one copy is kept on file).

- (e) Return a copy of the manifest to the director or his or her designee within a period of 10 days after the end of the month in which the waste was received.

The requirements described above do not apply to hazardous waste produced by generators of more than 100 kilograms but less than 1,000 kilograms in a calendar month if both of the following requirements are met:

- (a) The waste is reclaimed under a contractual agreement pursuant to which the type and frequency of shipments are specified in the agreement and the vehicle used to transport the waste to the recycling facility and to deliver the regenerated material back to the generator is owned and operated by the reclaimer of the waste.
- (b) The generator maintains a copy of the reclamation agreement in his or her files for a period of not less than 3 years after termination or expiration of the agreement.

The facility will not receive bulk shipments of hazardous waste from a rail or water transporter.

When a shipment of hazardous waste is initiated from this facility, the branch manager or his designate must:

- (a) Prepare a manifest before transporting the waste off-site.
- (b) Designate on the manifest one facility which is licensed to handle the waste described on the manifest. The branch manager may also designate on the manifest an alternate facility which is licensed to handle his or her waste if an emergency prevents delivery of the waste to the primary designated facility.
- (c) Use a transporter who is properly licensed under the act or a generator-owned vehicle licensed under the act to transport the waste.
- (d) If the transporter is unable to deliver the hazardous waste to the designated facility or the alternate facility, the generator shall either designate another facility or instruct the transporter to return the waste.

Except as described in the next paragraph, the branch manager shall use a manifest form approved by the director which contains all of the following information:

- (a) A manifest document number.

- (b) The generator's name, mailing address, telephone number, and EPA identification number.
- (c) The name and EPA identification number of each transporter.
- (d) The name, address, and EPA identification number of the designated facility and an alternate facility, if any.
- (e) The description of the waste required by regulations of the DOT in the provisions of 49 CFR 172.101, 172.202, and 172.203.
- (f) The total quantity of each hazardous waste by units of weight or volume, and the type and number of containers as loaded into or onto the transport vehicle.
- (g) The hazardous waste number describing the waste.
- (h) The following certification: "I hereby declare that the contents of this consignment are fully and accurately described above by proper shipping name and are classified, packed, marked, and labeled, and are in all respects in proper condition for transport by highway according to applicable international and national government regulations and applicable state regulations."
- (i) Other certification statements required by the director based on requirements under title II of the solid waste disposal act.

If the branch manager manifests a shipment of hazardous waste out of state, and if the state to which the shipment is manifested requires the use of another manifest, then the generator shall use that manifest.

The branch manager shall do all of the following when initiating a shipment:

- (a) Sign the manifest certification by hand.
- (b) Obtain the handwritten signature of the initial transporter and the date of acceptance on the manifest.
- (c) Retain one copy for his files.
- (d) Submit one copy to the director or his or her designee, which shall be postmarked not later than 10 days after the month in which shipment was made.
- (e) Give the remaining copies to the transporter.

When Safety-Kleen receives or ships hazardous waste, the branch manager or his designate must review the manifest and check the information on the manifest for correctness. It should be noted that Safety-Kleen computer-prints most of the required information on the majority of its manifests. The employee checking the manifest must review the names, addresses, EPA and New Mexico I.D. and transporter numbers, the manifest document number and the telephone numbers listed. In addition, the hazardous material (HM) box should be checked, the waste description, DOT classification, DOT I.D. number and EPA Waste Code must be verified. The number of drums and pounds, as well as the symbols for these units must be correct and an "H" must be entered in the last column. The generator, transporter(s) and TSD operator must all print and sign their names and enter the date the waste was shipped or received, as appropriate.

Upon discovering a significant manifest discrepancy, the branch manager shall attempt to reconcile the discrepancy with the waste generator or transporter through telephone conversations or otherwise. If the discrepancy is not resolved within 15 days after receiving the waste, the branch manager shall immediately submit, to the director and regional administrator, a letter describing the discrepancy and attempts to reconcile it and a copy of the manifest or shipping paper at issue. Significant manifest discrepancies are differences between the quantity or type of hazardous waste a facility actually receives, as follows:

- (a) For bulk waste, significant discrepancies are variations of more than 10% in weight.
- (b) For batch waste, a significant discrepancy is any variation in piece count, such as a discrepancy of one drum in a truckload.
- (c) Significant discrepancies in type are obvious differences which can be discovered by inspection or waste analysis, such as waste solvent substituted for waste acid or toxic constituents not reported on the manifest or shipping paper.

1.1.3 Paint Waste Collection Service

In 1986, a paint waste reclamation program was initiated to service automobile body repair businesses. Wastes containing various thinners and paints are collected in containers which meet DOT requirements [June 26, 1992] on the customer's premises.

The sales representative collects these containers and stores them in an enclosed concrete flammable shelter which is separate from the office/warehouse. These wastes are periodically shipped to a reclaimer and the regenerated solvent is distributed to Safety-Kleen customers for use as product.

In accordance with 40 CFR 264.73, Safety-Kleen maintains a manifest system, an operating log, biennial reports and all other records required under these sections.

The operating record must include:

- 1) a record of hazardous waste shipments rejected by the facility including the following:
 - a. the name of the generator and transporter,
 - b. the manifest number,
 - c. the date the shipment was rejected, and
 - d. the reason for rejection;
- 2) personal training records for all current personnel; and
- 3) The contents of the waste storage tank, the quantity of each waste received, and the date each period of accumulation begins (i.e., the date each waste solvent pickup occurs) must also be included in the operating record.

A biennial report must be submitted by March 1 of each even numbered year.

The biennial report shall be submitted on form 8700-13B. The report shall cover facility activities during the previous calendar year and shall include all of the following information:

- (a) The EPA identification number, name, and address of the facility.
- (b) The calendar year covered by the report.

- (c) For off-site facilities, the EPA identification number of each hazardous waste generator from which the facility received a hazardous waste during the year, and, for imported shipments, the name and address of the foreign generator.
- (d) A description and the quantity of each hazardous waste the facility received during the year. For off-site facilities, this information shall be listed by EPA identification number of each generator.
- (e) The method of treatment, storage, or disposal for each hazardous waste.
- (f) The most recent closure cost estimate under 40 CFR 264.142.
- (g) The certification signed by the owner or operator of the facility or the owner or operator's authorized representative.

Safety-Kleen must implement the manifesting system required under 40 CFR 264.71.

If the facility receives hazardous waste accompanied by a manifest, the branch manager or his designate shall do all of the following:

- (a) Sign and date each copy of the manifest to certify that the hazardous waste covered by the manifest was received.
- (b) Note any significant discrepancies in the manifest on each copy of the manifest.
- (c) Within 30 days after the delivery, send a copy of the manifest to the generator.
- (d) Retain, at the facility, a copy of each manifest for not less than 3 years from the date of delivery. (Safety-Kleen is the TSDF as well as the transporter so only one copy is kept on file).
- (e) Return a copy of the manifest to the director or his or her designee within a period of 10 days after the end of the month in which the waste was received.

The requirements described above do not apply to hazardous waste produced by generators of more than 100 kilograms but less than 1,000 kilograms in a calendar month if both of the following requirements are met:

- (a) The waste is reclaimed under a contractual agreement pursuant to which the type and frequency of shipments are specified in the agreement and

the vehicle used to transport the waste to the recycling facility and to deliver the regenerated material back to the generator is owned and operated by the reclaimer of the waste.

- (b) The generator maintains a copy of the reclamation agreement in his or her files for a period of not less than 3 years after termination or expiration of the agreement.

The facility will not receive bulk shipments of hazardous waste from a rail or water transporter.

When a shipment of hazardous waste is initiated from this facility, the branch manager or his designate must:

- (a) Prepare a manifest before transporting the waste off-site.
- (b) Designate on the manifest one facility which is licensed to handle the waste described on the manifest. The branch manager may also designate on the manifest one alternate facility which is licensed to handle his or her waste if an emergency prevents delivery of the waste to the primary designated facility.
- (c) Use a transporter who is properly licensed under the act or a generator-owned vehicle licensed under the act to transport the waste.
- (d) If the transporter is unable to deliver the hazardous waste to the designated facility or the alternate facility, the generator shall either designate another facility or instruct the transporter to return the waste.

Except as described in the next paragraph, the branch manager shall use a manifest form approved by the director which contains all of the following information:

- (a) A manifest document number.
- (b) The generator's name, mailing address, telephone number, and EPA identification number.
- (c) The name and EPA identification number of each transporter.
- (d) The name, address, and EPA identification number of the designated facility and an alternate facility, if any.
- (e) The description of the waste required by regulations of the DOT in the provisions of 49 CFR 172.101, 172.202, and 172.203.

- (f) The total quantity of each hazardous waste by units of weight or volume, and the type and number of containers as loaded into or onto the transport vehicle.
- (g) The hazardous waste number describing the waste.
- (h) The following certification: "I hereby declare that the contents of this consignment are fully and accurately described above by proper shipping name and are classified, packed, marked, and labeled, and are in all respects in proper condition for transport by highway according to applicable international and national government regulations and applicable state regulations."
- (i) Other certification statements required by the director based on requirements under title II of the solid waste disposal act.

If the branch manager manifests a shipment of hazardous waste out of state, and if the state to which the shipment is manifested requires the use of another manifest, then the generator shall use that manifest.

The branch manager shall do all of the following when initiating a shipment:

- (a) Sign the manifest certification by hand.
- (b) Obtain the handwritten signature of the initial transporter and the date of acceptance on the manifest.
- (c) Retain one copy for his files.
- (d) Submit one copy to the director or his or her designee, which shall be postmarked not later than 10 days after the month in which shipment was made.
- (e) Give the remaining copies to the transporter.

When Safety-Kleen receives or ships hazardous waste, the branch manager or his designate must review the manifest and check the information on the manifest for correctness. It should be noted that Safety-Kleen computer-prints most of the required information on the majority of its manifests. The employee checking the manifest must review the names, addresses, EPA and New Mexico I.D. and transporter numbers, the manifest document number and the telephone numbers listed. In addition, the hazardous

material (HM) box should be checked, the waste description, DOT classification, DOT I.D. number and EPA Waste Code must be verified. The number of drums and pounds, as well as the symbols for these units must be correct and an "H" must be entered in the last column. The generator, transporter(s) and TSD operator must all print and sign their names and enter the date the waste was shipped or received, as appropriate.

Upon discovering a significant manifest discrepancy, the branch manager shall attempt to reconcile the discrepancy with the waste generator or transporter through telephone conversations or otherwise. If the discrepancy is not resolved within 15 days after receiving the waste, the branch manager shall immediately submit, to the director and regional administrator, a letter describing the discrepancy and attempts to reconcile it and a copy of the manifest or shipping paper at issue. Significant manifest discrepancies are differences between the quantity or type of hazardous waste designated on the manifest or shipping paper and the quantity or type of hazardous waste a facility actually receives, as follows:

- (a) For bulk waste, significant discrepancies are variations of more than 10% in weight.
- (b) For batch waste, a significant discrepancy is any variation in piece count, such as a discrepancy of one drum in a truckload.
- (c) Significant discrepancies in type are obvious differences which can be discovered by inspection or waste analysis, such as waste solvent substituted for waste acid or toxic constituents not reported on the manifest or shipping paper.

1.2 Description of the Facility

The Albuquerque service center has been operating as a storage facility since March 1, 1977. The facility consists of the following structures:

- a. a 2,500 square foot warehouse with offices and contained areas for drum storage;

- b. two 12,000 gallon underground double-walled storage tanks (one for product and one for spent solvent), installed in March 1992 [June 26, 1992];
- c. a solvent return and fill station with a loading dock, constructed in March 1992 [June 26, 1992]; and
- d. an enclosed concrete, flammable, 1242 square foot shelter for the storage of containerized ignitable waste, constructed in March 1992 [June 26, 1992].

Descriptions of the surrounding area and of waste management practices at the service center follow. Applicable maps and facility drawings are in Appendix C.

1.2.1 Regional Description

The Albuquerque, New Mexico Service Center is located in Bernalillo County about one mile northwest of Carlisle Blvd. and S.R. 40. This area is zoned for manufacturing and to the best of Safety-Kleen's knowledge, no easements or title, deed or usage restrictions exist which may be in conflict with operations at this site.

Albuquerque is bordered by the 11,000 acre Cibola National Forest to the east and the Canocito Navajo Indian Reservation to the west. The total population of Albuquerque and surrounding areas in Bernalillo, Sandoval and Valencia counties is about 350,000. The climate in this area is an arid, continental climate. Rainfall varies, but in the vicinity of the service center, average annual precipitation is 7 to 10 inches. Average snowfall is about 10 inches. The average temperature in winter is approximately 38°F and 74°F in summer. Winds blow from the north in winter and from the south in summer. The average annual windspeed is 9 miles per hour.

Albuquerque is located in the Rio Grande Valley, and is bordered on both sides by mesas rising about 5,000 feet. The elevation at the service center is approximately 5,100 feet. The service center is not in the 100-year flood plain.

The soil in the vicinity of the service center is the Wink Series. These deep, well drained soils are formed in unconsolidated alluvium but have been modified by colian erosion. The slopes are generally 0 to 1 percent in the area of the service center. The surface layer is a brown, fine sandy loam.

The Albuquerque Service Center receives its water from the City of Albuquerque which also maintains a sanitary sewer line on Girard Avenue. Drainage in this area is by way of a series of diversion channels. The North Diversion Channel is directly east of the service center.

No known oil or gas wells exist within one quarter mile of the site and it is not located in or near a wetland or critical habitat. No schools, parks or hospitals exist within one quarter mile of the facility.

The non-building areas of the facility are paved with asphalt, gravel or concrete as noted on the site plan in Appendix C. The majority of the vehicular traffic and loading/unloading operations occur at and near the return and fill station and this area is paved with asphalt and concrete. The entrance to the facility is on Girard Avenue, which is the major access road to the facility. The access road was designed in accordance with engineering criteria appropriate for sustaining the traffic volume and loading for the manufacturing activities in this area. The route vans that daily travel the routes between the service center and its customers use the two-lane approach driveway.

1.2.2 Waste Management Practices

The Albuquerque service center was designed to facilitate the handling and storage of the wastes resulting from the services offered by Safety-Kleen. The underground storage tanks, drum storage areas, return and fill station, and the ignitable waste shelter all have secondary containment and the service center has the equipment

necessary for employees to safely manage wastes on-site. Appendix C contains drawings of the waste management facilities.

Spent mineral spirits from parts washers is accumulated in a 12,000 gallon underground double-walled storage tank via the return and fill station. Spent material is [June 26, 1992] poured into the dumpsters in the return and fill station, and material in the dumpster is pumped into the storage tank for spent solvent. The return and fill station has secondary containment in the form of a 20' x 14' 8" x 1' coated concrete equipped with a blind sump [June 26, 1992].

The underground double-walled tanks have been designed in accordance with NFPA standards and are constructed of carbon steel. Two tanks holding 12,000 gallons each are installed underground; one is for clean and one is for spent mineral spirits. Each tank is equipped with an audiovisual high level alarm.

The container storage areas in the warehouse are used only for the storage of (1) spent immersion cleaner and (2) dry cleaning wastes. The wastes are not mixed while on site and different wastes are segregated according to their contents [June 26, 1992]. While the wastes are not incompatible with one another, it is necessary to segregate them for inventory and quality control purposes.

All containers used for storage of hazardous waste will meet DOT requirements and will have a maximum capacity of 55 gallons (except for 85-gallon overpack drums). Example specifications for containers used at the service center are provided in Appendix E. [June 26, 1992]

The drum storage area in the east side of the warehouse has secondary containment in the form of a six inch wide by four inch high steel reinforced concrete

curb with a 12' x 2' x 2.5' (448.8 gallons) collection trench. No more than 2,592 gallons of spent solvents will be stored in this drum storage area at any time.

The drum storage in the west side of the warehouse has secondary containment in the form of a six inch wide by four inch high steel reinforced concrete slab with a 12'L x 1'9"W x 3'6"D (549.8 gallons) collection trench. No more than 3,456 gallons of spent solvent will be stored in this drum storage area at any given time.

Paint wastes will be placed in containers which meet DOT requirements [June 26, 1992] at the customer's place of business and sediment from cleaning the dumpsters is also [June 26, 1992] placed in containers which meet DOT requirements [June 26, 1992]. These containers of ignitable wastes are palletized and stored in the enclosed masonry [June 26, 1992] shelter (i.e., H-3 Flammable Storage Building [June 26, 1992]) shown in Appendix C. This structure has secondary containment in the form of a coated concrete trench; no more than 9,650 [June 26, 1992] gallons will be stored at any given time. Appendix E includes a copy of a report prepared by TERA, Inc. which certifies the secondary containment capacity of the shelter as 965 gallons [June 26, 1992].

An example of the configuration for storage of containers is [June 26, 1992] shown on the Floor Plans in Appendix C. Two feet of aisle space will be maintained and the drums will be stored no more than six feet [June 26, 1992] high. Containers in the drum storage areas will be placed on pallets and moved with a forklift or pallet jack.

WASTE ANALYSIS PLAN ABSTRACT

Waste Description	EPA Waste Code Nos.	Facility Capacity ¹	Annual Amount ²
Spent Mineral Spirits	D001 ⁵	12,000	103
Bottom Sediment From the Tank	D001 ⁵	N/A	2
Spent Immersion Cleaner			
<u>Old Formula [June 26, 1992]</u>	<u>F002, F004⁵</u>	<u>6,048³</u>	<u>2.5</u>
<u>New Formula [June 26, 1992]</u>	<u>see ⁵</u>	<u>included with above</u>	<u>included with above</u>
Dry Cleaning Waste	F002 ⁵	<u>included with above [June 26, 1992]</u>	12
Paint Waste	D001, F003, F005 ⁵	<u>9,650⁴ [June 26, 1992]</u>	14.3
Dumpster Sediment	D001 ⁵	<u>included with above [June 26, 1992]</u>	2

- 1 The facility capacity is in gallons.
- 2 The annual amount is in thousands of gallons.
- 3 The total amount of drummed waste stored in the east side of the warehouse will not exceed 2,592 gallons and the total amount of drummed waste stored in the west side of the warehouse will not exceed 3,456 gallons (a total of 6,048 gallons).
- 4 The total amount of ignitable wastes stored in the flammable shelter will not exceed 9,650 [June 26, 1992] gallons.
- 5 and D004, D005, D006, D007, D008, D009, D010, D011, D018, D019, D021, D022, D023, D024, D025, D026, D027, D028, D029, D030, D032, D033, D034, D035, D036, D037, D038, D039, D040, D041, D042 and D043

2.0 WASTE ANALYSIS PLAN

2.1 Description of Wastes

Six types of waste result from the servicing of Safety-Kleen customers and the maintenance of the service center. It should be noted that the solvents managed at this facility are only incompatible with strong oxidizers and reactive metals, none of which are present in the tanks, container storage areas, or the concrete sealant. The solvents are also compatible with one another. Analytical data for the wastes and specifications for the products are in Appendix D and qualitative descriptions follow.

2.1.1 Wastes Resulting From the Parts Washer Service

Spent mineral spirits from parts washers is accumulated in a 12,000 gallon underground double-walled storage tank via the return and fill station. Containers of spent material [June 26, 1992] are poured into a dumpster at the return and fill station which in turn empties into the tank. This waste handling method results in three types of mineral spirits waste:

- a. Spent mineral spirits solvent--The spent mineral spirits solvent is removed from the tank by a tanker truck on a scheduled basis. About 6,000-7,000 gallons are removed every two weeks. This waste is ignitable (D001) and TCLP toxic using the characteristic leaching procedures. (D004, D005, D006, D007, D008, D009, D010, D011, D018, D019, D021, D022, D023, D024, D025, D026, D027, D028, D029, D030, D032, D033, D034, D035, D036, D037, D038, D039, D040, D041, D042, and D043.) In 1986, the Albuquerque service center shipped 85,000 gallons of spent solvent to the Safety-Kleen recycle center in Denton, Texas.
- b. Bottom sediment in the tank--Approximately once every two years, it is necessary to remove sediment and other heavy material from the bottom of the tank. A Safety-Kleen vacuum truck is used for this purpose and can collect up to 4,000 gallons of this waste for reclamation. The sediment is ignitable (D001) and TCLP toxic using the characteristic leaching procedures. (D004, D005, D006, D007, D008, D009, D010, D011, D018, D019, D021, D022, D023, D024, D025, D026, D027, D028, D029, D030, D032, D033, D034, D035, D036, D037, D038, D039, D040, D041, D042, and D043.)

- c. Dumpster sediment--Sediment also accumulates in the bottom of the dumpsters in the return and fill station. This sediment is removed manually with a shovel, drummed and the drums are stacked no more than six feet high in the enclosed H-3 Flammable Storage Building, used to store containerized ignitable waste. The chemical composition of this waste is analogous to that of the bottom sediment from the tank. In 1986, about 1,500 gallons of this waste were shipped to Safety-Kleen's Denton, Texas recycle center for reclamation.

Immersion cleaner remains in the drum in which it was originally used until it is received at the recycle center. [Note: sentence referring to capacities has been deleted [June 26, 1992].] The old formula immersion cleaner contains chlorinated solvents (F002) and cresylic acid (F004). The new immersion cleaner formula is toxic using the characteristic leaching procedure D004, D005, D006, D007, D008, D009, D010, D011, D018, D019, D021, D022, D023, D024, D025, D026, D027, D028, D029, D030, D032, D033, D034, D035, D036, D037, D038, D039, D040, D041, D042, and D043. [Note: sentence referring to color coding of containers has been deleted [June 26, 1992].] In 1986, about 2,000 gallons of these solvents were shipped to the Denton, Texas recycle center for reclamation.

2.1.2 Wastes Resulting From the Dry Cleaner Service

Dry cleaning wastes consist of spent filter cartridges, powder residue from diatomaceous or other powder filter systems and still bottoms. These wastes are packaged on the customer's premises in drums which meet DOT requirements [June 26, 1992]. The drums are then palletized [Note: reference to stacking height has been deleted: June 26, 1992] and placed in the drum storage area of the warehouse. While approximately 80% of the dry cleaning solvent used is perchloroethylene (F002), and characteristic leaching procedure D004, D005, D006, D007, D008, D009, D010, D011, D018, D019, D021, D022, D023, D024, D025, D026, D027, D028, D029, D030, D032, D033, D034, D035, D036, D037, D038, D039, D040, D041, D042, and D043,

about 17% is mineral spirits, (D001) and the remaining 3% is trichloro-trifluoroethane (F002). Any ignitable (D001) dry cleaning waste collected will be stored in the H-3 Flammable Storage Building. In 1986, about 5,000 gallons of dry cleaning wastes were shipped to the Safety-Kleen recycle center in Denton, Texas.

2.1.3 Paint Wastes

Paint wastes consist of various lacquer thinners (D001, F003, and F005) and is toxic using the characteristic leaching procedure D004, D005, D006, D007, D008, D009, D010, D011, D018, D019, D021, D022, D023, D024, D025, D026, D027, D028, D029, D030, D032, D033, D034, D035, D036, D037, D038, D039, D040, D041, D042 and D043. The waste is collected in drums which meet DOT requirements [June 26, 1992] at the customer's place of business and the containers are then palletized and stored in an enclosed masonry shelter (the H-3 Flammable Storage Building) [June 26, 1992]. [Note: deleted sentence referencing annual shipments of paint waste; June 26, 1992.]

2.2 Quality Control Procedures

The used solvents are the primary feedstocks for the generation of Safety-Kleen solvent products. As a result, quality control of the spent solvents is necessary to ensure that reclamation occurs in the safest and most efficient manner possible. The service center collects spent solvents from about 1,100 customers, most of whom are small quantity generators, and fourteen thousand drums containing recoverable solvents are returned to the service center each year for shipment to a reclaimer. With such large numbers of waste generators and waste shipments, performing detailed analyses at the service center is economically and logistically infeasible.

Furthermore, as discussed earlier in the Facility Description, all the materials collected at the service center are managed at all times in the closed loop system and are usually collected from a company with a single process. The composition and quality of these materials are known and Safety-Kleen's operating experiences have shown that the collected materials rarely deviate from company specifications. As an additional safeguard, Safety-Kleen personnel are instructed to inspect all materials before returning them to the service centers. This mode of operation has been proven to safeguard the recycling process and maintain a quality product.

In accordance with New Mexico Hazardous Waste Management Regulations 206.B.3, however, Safety-Kleen will perform physical and chemical analysis of a waste stream when it is notified or has reason to believe that the process or operation generating the waste has changed, or when the result of inspection indicates that the waste collected does not match that designated. The customer's Standard Industrial Classification (SIC) code is listed on the placement contract when he starts Safety-Kleen's service and his use for the machine is determined by the sales representative to be appropriate at that time. Should the sales representative notice the machine is being used for a new purpose or the customer's business changes, he must review this change with the customer and determine whether the new use is appropriate. It is Safety-Kleen's practice that suspected non-conforming material must not be accepted until a full analysis has been done or the material must be rejected. Procedures to verify waste characteristics occur at several check points in the management of the solvent, as described below.

Safety-Kleen controls the use and management of its solvents by:

1. limiting the solvents stored to those compatible with one another and their containers.

2. limiting the uses of each type of solvent (for example, dry cleaning waste is only collected from dry cleaner shops);
3. determining the customer's type of business (i.e., his SIC code is recorded) and the purpose for which he will use the machine.
4. training customers to use the machines properly;
5. training employees to inspect spent solvent and determine whether it is acceptable;
6. indicating on the service document, every time waste is collected, whether the spent solvent meets Safety-Kleen's acceptance criteria (Item 14 in Appendix D);
7. marking each container with the customer's name, address and EPA I.D. number (if required). This information remains on containerized waste until it is accepted at the reclamation facility; and
8. keeping a record of each incoming and outgoing shipment in the operating log at each facility.

✓ [Note: Item 9. has been deleted: June 26, 1992]

Safety-Kleen's customers sign a service document containing the following information:

- a. the name, address and EPA I.D. number of the facility to which the waste is being shipped;
- b. the customer's name, address and EPA I.D. number (if required); and
- c. the description and amount of Safety-Kleen solvent waste generated.

In addition, each incoming and outgoing shipment is recorded in the facility's operating log.

If a waste is rejected at the time of service, the customer will be given a choice as to whether he will dispose of the waste himself or require Safety-Kleen's assistance. If he requests Safety-Kleen's assistance, a sample will be drawn using a Coliwasa tube and it will be analyzed for flash point and volatile organic compounds. If this analysis

does not adequately define the constituents, additional analyses will be performed as necessary (e.g., for semi-volatile organic compounds, base-neutral compounds, PCBs, etc.). If the waste is acceptable at the branch, it will be relabeled and manifested appropriately and then managed with the other wastes. If it is not acceptable, it will either be: (a) managed on a 10 day transfer basis and manifested to a properly permitted reclamation or disposal facility, or (b) manifested and shipped directly to a properly permitted reclamation or disposal facility.

The recycle center located in Denton, Texas sends waste analyses to the service centers. If any sample of the waste solvent does not meet standard acceptance criteria, the recycle center will phone the branch manager and alert him to the situation before any processing is done. The branch manager has the right to refuse any further service to a business which has returned waste unable to meet acceptable criteria. If the particular acceptance criteria is not met, a determination will be made as to what processing technology is required. The material is processed accordingly which may include transportation to another facility. Each truckload of spent mineral spirits comes from one identifiable Safety-Kleen facility. The recycle center and the branch facility have accurate up-to-date information on the waste constituents which are available in the event of a release.

2.2.1 Qualitative Waste Analysis

a. General Inspection Procedures

Safety-Kleen visually inspects each drum of waste when it is collected at the customer's location. Safety-Kleen examines the waste for volume, appearance, consistency and odor and is intimately familiar with the characteristics of the waste it receives. Based on the known waste characteristics, Safety-Kleen has established the

specific acceptance criteria set forth below, to be used by Safety-Kleen personnel in their visual inspections. These acceptance criteria allow Safety-Kleen to ensure that the waste being picked up is not contaminated.

If a particular drum of waste does not meet the acceptance criteria, the Safety-Kleen service representative will either (1) sample the waste for testing at a Safety-Kleen laboratory, as described below, to determine whether the waste has been contaminated; or (2) reject the drum of waste. In the event the waste is not sampled, Safety-Kleen will notify the generator's State Agency that is authorized to implement the RCRA hazardous waste management program (or EPA if the RCRA program has not been delegated to the State).

If the waste is sampled for further analysis, the service representative will take a sample of the waste and then seal the drum and label it as hazardous waste. The drum is left with the customer pending the results of the laboratory tests. The laboratory testing involves analyzing the suspect waste for flash-point and the presence of volatile organic compounds using a modified EPA 8010 method (GC analysis). The costs of any sampling and testing performed as a result of the waste failing to meet the acceptance criteria, will be borne by the customer.

If the laboratory analysis reveals that the sampled waste is not contaminated, Safety-Kleen will accept the waste from the customer.

If the laboratory confirms that the waste is contaminated, the generator will be responsible for securing an alternate means of disposal. In the event the generator does not contract with Safety-Kleen to arrange for the treatment or disposal of waste which is sampled and found to be contaminated, Safety-Kleen will provide the generator's State Agency that is authorized to implement the RCRA hazardous waste management

program (or EPA if the RCRA program has not been delegated to the State) with the results of this additional quantitative testing.

b. Waste Specific Criteria

The following is a description of the specific acceptance criteria for each waste stream.

I. Spent Mineral Spirits Solvent

The acceptance criteria for determining by visual inspection whether spent mineral spirits solvent has been contaminated are volume, odor and color, the most significant of which is volume. Spent mineral spirits solvent is collected in drums which meet DOT requirements [June 26, 1992]. If the volume of waste in a given drum exceeds the specified level, the Safety-Kleen service representative will sample the waste for laboratory testing as described above, or will reject the waste.

In addition to the volume criterion, the odor of the spent solvent will clearly indicate whether the waste has been contaminated. Spent mineral spirits solvent has a very distinctive odor. The service representatives are expressly instructed not to deliberately sniff the waste. However, if the mineral spirits solvent has been contaminated the service representative would immediately notice a difference in the odor when he services the machine.

The spent mineral spirits solvent is also visually inspected for its color. Unused mineral spirits solvent has a greenish tint. As the solvent is used, it turns brown in color. The more it is used, the darker brown it becomes, until it is almost black. Therefore, if the spent solvent does not appear to be green, brown, or black, the service representative will sample the waste for possible contamination as described above, or will reject the waste.

II. Immersion Cleaner

Safety-Kleen is currently in the process of reformulating its immersion cleaner.

The new formula immersion cleaner is a toxic hazardous waste according to the Toxicity Characteristic Leaching Procedure (TCLP) [June 26, 1992].

A. Existing Immersion Cleaner

The criteria for the inspection of spent immersion cleaner are volume, color and physical state. A [June 26, 1992] sample will be tested for contamination following the procedures described above or the waste will be rejected.

Unused immersion cleaner is amber in color. As the solvent is used, it turns brown in color. The more it is used, the darker brown it becomes, until it is almost black. Therefore, if the spent immersion cleaner does not appear to be amber, brown or black, the service representative will either sample the waste for possible contamination as described above, or reject the drum of waste.

The drum of spent immersion cleaner should contain two phases, an aqueous phase and a solvent phase. The aqueous phase should compose approximately 20% of the total volume of waste. If the waste is not separated into phases, or if the aqueous phase is greater than 20%, the service representative will either sample the waste for possible contamination as described above, or will reject the waste.

B. New Immersion Cleaner

T [June 26, 1992] the new immersion cleaner is determined to be a hazardous waste under TCLP [June 26, 1992]. T [June 26, 1992] the acceptance criteria and respective descriptions for the new formula immersion cleaner [June 26, 1992] will be the same as those for the existing immersion cleaner, with the exception of the physical

state criterion. The new immersion cleaner waste is a single phase [June 26, 1992], therefore, this criterion is not applicable.

c. Dry Cleaner Wastes

Dry cleaner wastes consist of spent filter cartridges, powder residue and still bottoms.

1. Spent Filter Cartridges

Spent Filter cartridges are placed in containers which meet DOT requirements [June 26, 1992]. It is obvious to the service representative whether the items in the drums are filter cartridges.

The drums may also contain approximately one inch of liquid which should either be clear or have a light brownish tinge. If the amount of the liquid is greater than approximately one inch or if the liquid is a color other than light brown, the service representative will sample the waste for contamination in accordance with the procedures described above, or will reject the waste.

II. Powder Residue

The criteria for the acceptance of powder residue are consistency and color, the former being the more significant criterion of the two. A drum of powder residue should not contain any liquid. As the name implies, it will be dry or "powdery" to the touch. If there is any liquid in the drum, the waste will be sampled for contamination in accordance with the procedures described above, or the waste will be rejected.

The powder residue is also inspected for color and should appear to be grayish-black. If the residue is not grayish-black in color, the service representative will sample the waste for contamination in accordance with the procedures described above, or will reject the waste.

III. Still Bottoms

The criteria for the acceptance of dry cleaning still bottoms are consistency and color. The waste should have a highly viscous, tar-like consistency. If the consistency of the waste is too thin or if there is more than one inch of free liquid in the drum, the waste will be sampled for contamination in accordance with the procedures described above, or will be rejected.

In addition to consistency, the still bottom waste is inspected for color. The waste should appear dark brown or black in color. If the waste is a different color, a service representative will sample the waste for contamination in accordance with the procedures described above, or will reject the waste.

d. Paint Wastes

Safety-Kleen handles both lacquer thinner waste generated from the paint gun cleaning process and paint waste.

I. Lacquer Thinner Waste

The significant criterion for determining whether lacquer thinner waste will be accepted is volume. The solvent is provided to customers in containers which meet DOT requirements [June 26, 1992]. The paint gun cleaning machine operates as a closed system. The solvent is pumped from a tube in a left hand container [June 26, 1992] (facing the machine) through the machine into a right hand container [June 26, 1992]. The tube in the left hand container [June 26, 1992] extends exactly half way into the container [June 26, 1992]. The left hand container [June 26, 1992] starts with 5 gallons of clean solvent which will be pumped out as the machine is used to clean the spray guns. This process will continue until the left hand pail contains 2-1/2 gallons of solvent. Any solvent above 2-1/2 gallons remaining in the left hand container [June 26, 1992] at the time of servicing will be pumped through the machine into the

right hand pail by the Safety-Kleen service representative. Therefore, when the machine is serviced, the right hand container [June 26, 1992] will always contain 5 gallons of solvent. If a service representative discovers more than a total of 7-1/2 gallons of solvent in the two pails or there is an overfill from the right hand pail, the waste will be sampled for contamination in accordance with the procedures described above, or the waste will be rejected.

II. Paint Waste

The significant criterion for the inspection of paint waste is consistency. The waste should contain no more than 30 percent solids. The service representative will insert a long glass tube into the drum. The tube should glide easily down to the bottom of the drum. If there is resistance to the insertion of the glass tube, it is assumed that the level of solids is in excess of 30 percent and the service representative will reject the waste.

The contents of the glass tube are also visually examined for consistency and water content. The material should be a "free flowing" liquid, but should not contain a significant amount of water. If there is more than approximately 10 inches of water in the 3 foot tube (the water and paint will separate in the tube and thus can be measured) the waste will be rejected.

[Note: Section 2.2.2, Quantitative Testing, has been deleted; June 26, 1992.]

2.3 Waste Analyses at the Recycle Center

Analyses performed at the Safety-Kleen recycle centers are undertaken to safeguard the recycling process and to assure the product quality. The following tables in Appendix D summarize a typical waste analysis plan practiced at the recycle center for the hazardous materials returned from the service center:

Table D-1 Parameters and Rationale for Hazardous Waste Selection

Table D-2 Parameters and Test Methods

Table D-3 Methods Used to Sample Hazardous Wastes

Table D-4 Frequency of Analysis

A profile of the paint waste is in Appendix D. It will be reanalyzed when the reclaimer to whom it is shipped requests reanalysis or when a change in the use of the product occurs.

2.4 Waste Analysis Plan Update

This waste analysis plan will be modified when a new waste product is collected or when sampling and material management methods change. Revision of the plan is the responsibility of the Environment, Health and Safety Department at Safety-Kleen's Corporate Office in Elgin, Illinois.

2.5 Land Ban Notification/Certification Forms

In accordance with 40 CFR 268.7, Safety-Kleen will provide notification/certification for wastes banned from landfills as follows:

1. Printing the Notice language on manifests-such as for core-business customers to branch shipments; or
2. Special forms for each regularly handled waste types (e.g., MS, IC, perc, freon); or
3. A general form that must be completed for unique or non-standard waste streams. These wastes will only be handled on a transfer basis in accordance with 40 CFR 263.12.

The notice is required paperwork for all Safety-Kleen waste types. Shipments lacking the proper Notice will not be accepted by any Safety-Kleen facility. When a shipment with the proper Notice is received, the Notice is kept in the files of the receiving facility with the manifest or with the pre-print if a manifest is not used.

2.6 Operating Record [June 26, 1992]

Safety-Kleen maintains an operating record [June 26, 1992] on-site which includes the following information as it becomes available:

- (1) A description and the quantity of each hazardous waste received, and the method and date of its storage as required by Pt. V, sec. 264, Appendix I;
- (2) The location of each hazardous waste within the facility and the quantity;
- (3) Records and results of waste analyses performed;
- (4) Summary reports and details of all incidents that require implementing the contingency plan;
- (5) Records and results of inspections;
- (6) Monitoring, testing or analytical data, and corrective action where required;
- (7) For off-site facilities, notices to generators as specified in 264.12(b);
- (8) All closure and post-closure cost estimates;
- (9) A certification by the permittee no less often than annually, that the permittee has a program in place to reduce the volume and toxicity of hazardous waste;
- (10) The land ban notices and requirements.

These records are kept on file in the branch manager's office.

PREPAREDNESS AND PREVENTION PLAN ABSTRACT

SECURITY MEASURES: The site is secured as follows:

- a. There is a chain link fence with three strands of barbed wire around the facility.
- b. Warning signs are posted at all entrances.
- c. Locks are on all entrances to the warehouse and on the metal shelter.
- d. Remote controls for all tank operations are inside the warehouse.
- e. There is outdoor lighting which is triggered during low-light hours of the day [June 26, 1992].

INSPECTION PROCEDURES: See Appendix E for a copy of the Facility Inspection Record.

REQUIRED EQUIPMENT: The emergency equipment requirement is met with the following:

- a. Internal communications will be by voice.
- b. Telephones are available in the office and the warehouse.
- c. Fire extinguishers are available next to three exits in the warehouse and at the masonry shelter [June 26, 1992] for ignitable waste storage.
- d. Water is available from the city of Albuquerque.

3.0 PREPAREDNESS AND PREVENTION PLAN

3.1 Security Measures

The facility is secured with a six-foot high chain link fence topped by three strands of razor wire which surrounds the entire facility. All access gates are locked when the facility is unoccupied and warning signs stating "Danger - Unauthorized Personnel Keep Out" which are visible from twenty-five feet are posted at the entrances. These warning signs are posted in both English and Spanish. An electronic entrance gate is located at the front of the facility which can automatically be opened and closed to allow trucks to enter and exit. In addition, outdoor lights are triggered during low-light hours of the day [June 26, 1992].

The office/warehouse building is secured with locks on all doors and warning signs are posted at all entrances to work and waste storage areas. These warning signs are posted in both English and Spanish.

The tanks are inaccessible in that material can not be added to or removed from them without activating the pumps, the controls for which are inside the warehouse. The pumps are not activated unless mineral spirits product or waste is being added to or removed from the tanks by Safety-Kleen personnel. The container storage areas and flammable shelter area are also locked unless occupied by Safety-Kleen personnel. As a result the tanks and container storage areas are inaccessible except by Safety-Kleen personnel. In addition, warning signs are posted on the return and fill station. These warning signs are posted in both English and Spanish.

The overhead door to the ignitable waste shelter will be closed and locked unless containers are being added to or removed from the shelter. Warning signs are also posted on the shelter. These warning signs are posted in both English and Spanish.

3.2 Inspection Procedures

The branch (i.e., service center) manager or his designate is responsible for carrying out and documenting the facility inspection (Appendix E) on a daily basis. He must note any repairs that are needed and assure that they are completed. If he can not carry out the repairs himself, he must notify the Technical Services Department at Safety-Kleen's corporate headquarters and request assistance. Completion of repairs must also be noted on the Facility Inspection Record.

The regional environmental engineer or regional manager [June 26, 1992] must review the Facility Inspection Record on a quarterly basis with the branch manager [June 26, 1992] to insure that they are properly completed and that any necessary repairs have been effected.

The facility inspection includes the following:

- a. Tank inspections--At a minimum, the tank holding the solvent product and that holding the spent solvent are inspected daily. The daily inspections include checks of the high level alarm and of the volume held in the tank and checks of the leak detection system for any releases. Sudden deviations in the solvent volumes will be investigated and their causes determined. If necessary, repairs must be initiated immediately. When the tank used to store spent solvent is 85% full, a pickup must be scheduled with the Solvent Control Department in Safety-Kleen's corporate headquarters. The solvent must not exceed 95% of the tank volume at any time.
- b. Solvent dispensing equipment--The solvent dispensing hose, connections and valves must be inspected for damage (such as cracks or leaks) and proper functioning on a daily basis. Any solvent in the hoses must be drained after use. The pumps, pipes and fittings must also be checked daily for damage and proper functioning. Any damage to the solvent dispensing equipment must be noted and repaired.
- c. Drum storage areas--The three drum storage areas (including the paint waste shelter) are inspected daily and the number and condition of the drums noted. The total volume of the spent solvent held in the drum storage area must not exceed ten times the amount that can be collected in the secondary containment system. The contents of any leaking or suspect drums must be placed in a drum of adequate integrity. Finally, the drums must be properly labeled and marked in accordance with U.S.

DOT and New Mexico hazardous waste regulations. The secondary containment system must be inspected for deterioration or failure. If cracks or leaks are detected, they must be repaired immediately.

- d. Route vehicles--Each route vehicle must be inspected daily to insure the proper operation of its brakes, lights, turn signals, emergency flashers and wipers. In addition, the necessary safety equipment must be on board: sorbents, fire extinguisher, eye wash, first aid kit, reflector kits, rubber gloves, plastic aprons, and safety glasses. Any missing equipment must be replaced.
- e. Dumpsters--The two wet dumpsters (in the return and fill station), the two associated valves and each joint in the piping must be inspected daily for leaks and sediment buildup. A barrel washer, located inside the dumpster, uses piped-in spent solvent to rinse mineral spirits waste from the barrel and returns the rinse and spent solvent to the waste mineral spirits tank. Any leaks must be noted and repaired immediately and excess sediment must be removed from the dumpster. The dry (trash) dumpster must be inspected to insure that no liquids are being placed in it.
- f. Safety equipment--The four fire extinguishers must be checked weekly to insure that the units are charged and accessible. In addition, the operation of the eyewash must be confirmed weekly and the first aid kit and sorbents must be inspected weekly for adequate content and accessibility. A list of required emergency equipment is in Appendix E.
- g. Security--The operation of each gate and lock must be checked daily. In addition, the fence must be inspected for deterioration on a weekly basis.

3.3 Facility Design

The Albuquerque service center was designed to minimize the possibility of spills or fires and to minimize the effects of any accidents which may occur. Specifications for the storage facilities, secondary containment and other equipment are in Appendix E and descriptions follow.

3.3.1 Tank Storage

As noted in the previously revised permit application, the facility's spent solvent underground storage tank in place at the time the facility permit was issued was not secondarily contained and was scheduled to be replaced by the time it was 15 years old

(i.e., March of 1992). TERA, Inc. supervised the installation assessment of the tank system; installation was completed in March of 1992. Copies of the installation assessment report have been provided to the state; a copy of the report is also on file at the branch. [June 26, 1992]

The 12,000 gallon storage tank is 8' in diameter and 32'6" long. It is constructed of 1/4" thick carbon steel and is double-walled. It is constructed in accordance with Underwriters Laboratories Standard 142 and is located more than 5 feet from the building foundation, in accordance with NFPA requirements. A liquid-sensing leak detector is between the two walls, and must be checked daily (see Sheet 1 of 3 of drawing D13617).

The exterior of the outside tank is coated with a plastic-fiberglass mixture so that no metal is exposed and the tank is isolated from electrical currents.

A manually-controlled waste feed cut-off valve located adjacent to the wet dumpsters at the return/fill station, can prevent the tank from being overfilled. The tank is equipped with an aural (siren) and visual (strobe light) high level alarm system which will alert employees when the tank is approximately 600 gallons from being full. The 300 gpm pump on the tanker truck can be turned off immediately when the alarm sounds. A manual button can be used to test the alarm to insure the system is operable. The fill pipes are secondarily contained to prevent spills during loading and unloading operations.

Cathodic protection has been installed for the carbon steel/FRP-coated composite tank. A copy of the report by the independent corrosion expert who designed the cathodic protection system for the tank and supervised its installation has been provided to the state and a copy is on file at the facility. [June 26, 1992]

The return and fill station is a sheet steel structure as are the dumpster and the secondary containment, although the walls of the return and fill station will be constructed of masonry block units. The dumpsters are tight-piped to the tank. All piping is aboveground and all joints are welded. The following procedures are followed when loading and unloading solvent into the tanks:

1. Secure the tractor-trailer for unloading or loading in a location which has easy access to the pump or curb side of the unit. Set brakes, engage governor and hook up grounding equipment.
2. Check available tank volumes via gauges or measure with a stick to verify that there is enough volume to transfer each load safely and prevent overfills. Leave all hatches open on storage tanks and on the tanker truck.
3. Make hose connections between storage tank and tanker truck in proper sequence (i.e., to empty vessel first). Double check to insure all connections are tight and locked.
4. Engage pump and move clean product to storage tank. Check for leaks along hose, piping and at connections. If a leak is noted, stop the operation immediately and make repairs or make arrangements for repairs.
5. Check the available tanker truck volume. Reverse hose connections and move dirty solvent from storage to tanker truck. (Again, check for leaks and repair as needed).
6. Drain all hoses before disconnecting to prevent spillage.
7. In the event of a spill, follow the emergency procedures outlined in the Contingency Plan.
8. Check all paperwork; document proper quantities of material delivered and picked up. Insure all manifests, bills of lading and other related paperwork are in order.

In the event of a spill or leak, the procedures described in the Contingency Plan will be followed. A minor spill will be handled as described in Section 4.3.1 and a major spill as in Section 4.3.2. All accumulated material will be pumped to the used solvent storage tank. Any solvents or oil dry used in the cleanup will be containerized,

labeled and handled as hazardous waste. All equipment used will be decontaminated and the rinse water will be handled as a hazardous waste.

3.3.2 Drum Storage

The slab, curbing and collection trenches for the drum storage areas in the warehouse are made of steel-reinforced concrete and the concrete has been poured so that no cracks or gaps exist between them. The curbing is four inches high and six inches wide and encompasses the storage area except where there is a trench. Steel grates cover the trench to facilitate the movement of drums across it. The concrete is coated with chemical-resistant epoxy and urethane or equivalent [June 26, 1992] so as to be impermeable. The solvents in storage are only incompatible with strong oxidizers and reactive metals, none of which are present in the base or sealants.

Ignitable wastes in containers are stored at least fifty (50) feet from the property line in the masonry shelter [June 26, 1992]. The secondary containment trench is designed of coated concrete [June 26, 1992]. An overhead door secures the shelter when drums are not being added to or removed from it.

3.3.3 Compatibility of Containers with their Contents and Each Other

The mineral spirits, immersion cleaner, dry cleaning waste and paint wastes are compatible with the drums in which they are stored; in fact, mineral spirits is sometimes used as a rust-preventive coating for steel. Immersion cleaner, mineral spirits, and paint waste are stored in steel drums.

Dry cleaning wastes are stored in containers which meet DOT requirements [June 26, 1992]. The typically used [June 26, 1992] polyethylene drums have been treated with fluorine gas to be resistant to dry cleaning solvents. Immersion cleaner and

dry cleaner waste are never opened at the branch facility. Containers in the warehouse will be palletized to facilitate storage shipping. Since none of the wastes handled by Safety-Kleen react with steel or polyethylene, compatibility is assured.

3.4 Plant Operations - Potential Spill and Fire Sources and Control Procedures

Employees must perform their duties in the safest, most efficient manner possible and the service center has been equipped to facilitate these activities. Drums will be moved using a handcart and pallets using a forklift or pallet jack. Upon arrival at the service center, containers of spent solvent must immediately be added to the storage tank or placed in the drum storage areas. Open drums of solvent must not be left unattended. A container holding hazardous waste must always be closed during storage except when it is necessary to add or remove waste. Below are descriptions of situations which can result in accidents and the precautions taken to prevent their occurrences.

3.4.1 Potential Minor Spill Sources

The following is a list of activities that have the potential for a minor (one that can be remediated without assistance from a clean up contractor) pollution incident:

- a. Pouring of drummed solvent into the dumpster--As contents of the [June 26, 1992] drums are poured into the dumpster, solvent can splash out. Employee training emphasizes the importance of taking care in emptying the drums. The return and fill station is underlain by a metal pan with a floor drain that empties into the storage tank. This design will contain this type of spill.
- b. Filling of drums with solvent product--A low pressure hose with an automatic shut-off valve, similar to those used at automotive service stations, is used to fill the drums with solvent. Leaking fittings, a damaged hose or carelessness could lead to the discharge of solvent outside of the drum. Manual emergency shut-off valves are on each hose, should the equipment not function properly. In addition, employee training emphasizes the importance of inspection, maintenance and reporting of conditions with pollution incident potential.

- c. Moving of containers--When a container is moved, a potential exists for it to tip over. To minimize the potential for spillage of solvent, all containers must be maintained in an upright position and remain tightly covered while in storage or in transit.
- d. Delivery truck transfers--The cargo should be secured in the route vehicle with straps before transport. Individual containers of solvent can tip over or be dropped when being moved on or off a delivery truck so transfers will be made using a handcart and a hoist, if necessary.

If a spill does occur, the amount of solvent in the containers is a quantity which can be collected with sorbent clay or pads. Any contaminated soil that results will be removed manually, drummed and shipped to a Safety-Kleen recycle center for proper disposal.

3.4.2 Potential Major Spill Sources

The following activities have the potential for a major (one for which remedial action will require assistance) pollution incident:

- a. Overfilling of storage tanks--Both product and spent solvent tanks can be overfilled with a resulting discharge of solvent. A high level alarm and daily checks of tank volumes will prevent this type of incident.
- b. Leaking pipelines--The pipelines and other equipment present a potential for leaks and resultant pollution. Regular inspection of this equipment and the solvent inventory will detect any leaks.

3.4.3 Potential Fire, Incompatibility and Vapor Build Up Sources

The following is a list of fire prevention and minimization measures:

- a. All wastes and products are kept away from ignitable sources-- Personnel must confine smoking and open flames to remote areas, separate from any solvent (e.g., the office or locker room). The mineral spirits handling area, ignitable waste shelter and the storage tanks are separated from the warehouse building area to minimize the potential for a fire to spread or injury to personnel to occur.
- b. Ignitable wastes are handled so that they do not:
 1. become subject to extreme heat or pressure, fire or explosion, or a violent reaction--The mineral spirits waste is stored in a tank or in

drums, none of which are near sources of extreme heat, fire, potential explosion sources or subject to violent reactions. The tanks are vented and the drums kept at room temperature to minimize the potential for pressure build up.

2. produce uncontrolled toxic mists, fumes, dusts or gases in quantities sufficient to threaten human health--The vapor pressure of mineral spirits is low (2 mm) and it is reactive with strong oxidizers only. Toxic mists, fumes, dusts or gases will not form in quantities sufficient to threaten human health since strong oxidizers are not handled at this facility and the solvent vaporization will be minimal under normal working conditions. The tanks operate under atmospheric temperature and pressure and are vented to prevent the accumulation of vapors. Monitoring of vapors is not necessary as, under normal circumstances, the 6% concentration of the lower explosive level is not possible. The paint waste storage shelter was built in accordance with local and national fire codes to minimize the potential for fires and explosions.

3. produce uncontrolled fires or gases in quantities sufficient to pose a risk of fire or explosion--See 'a' above and 'c' below.

4. damage the structural integrity of the Safety-Kleen facility--The mineral spirits and paint wastes will not cause deterioration of the tank, drums or other structural components of the facility.

- c. Adequate aisle space is maintained to allow the unobstructed movement of personnel, fire protection equipment, and decontamination equipment to any area of the facility operation in an emergency.
- d. "No Smoking" signs are posted in areas where solvents are handled or stored.
- e. Fire extinguishers must be checked once per week and tested by the fire extinguisher company once per year.

The solvents stored onsite are only incompatible with strong oxidizers and reactive metals, none of which are present onsite. They are therefore compatible with one another and their mixing will not cause a strong reaction. The fan in the warehouse must be turned on five minutes before entering the container storage area and all day, until operations cease for the day, to prevent the accumulation of toxic vapors.

Industrial hygiene studies have been performed at Safety-Kleen facilities and employees have not been found to be over-exposed to air contaminants.

3.4.4 Tank Evaluation and Repair Plan

Any release to the environment must be reported to the Regional Administrator within 24 hours of its detection and certification of major repairs is required.

The product and waste [June 26, 1992] stored in the tanks at this facility are pure and spent [June 26, 1992] mineral spirits; both of which are [June 26, 1992] compatible with the carbon steel structure; in fact, mineral spirits is often used as a light hydrocarbon coating to prevent rusting of metal parts.

In addition to the daily inspection, an assessment of the tanks will be performed every five (5) years in accordance with 40 CFR 264.191 [June 26, 1992]. If, during any inspection, corrosion is noted, it will be removed and the tank repaired. If corrosion is significant and localized, the tank will be immediately taken out of service and repaired, (i.e., a patch welded over the corroded area). Should the corrosion of the vessel be extensive or if the tank is found to be leaking, the vessel will be immediately taken out of service and replaced.

3.4.5 External Factors

The design of the installation is such that a harmful spill is highly unlikely to occur from most external factors. The storage tanks are inaccessible to non-Safety-Kleen personnel and the pump switches are located inside. Also, the drum storage areas are in buildings which are inaccessible to unauthorized personnel.

- a. Vandalism - Only extreme vandalism would result in a solvent spill or fire. Responses to spills and fires are described in the contingency plan.
- b. Strikes - A strike would not result in a solvent spill or fire.
- c. Power failure - A power failure would not result in a spill or fire. Should a power failure occur, all activities requiring electricity will cease.
- d. Flooding - The site elevation is above the projected 100-year flood plain; therefore, a 100-year flood will not affect the facility.

- e. Storms or Cold Weather - The solvent return and fill station is roofed to eliminate the possibility of rain or snow entering the dumpsters. No opportunity is foreseen to affect the facility with snow, cold weather or storm water.

3.5 Internal and External Communications and Alarm Systems

Because the facility is small, internal communication within the building and the solvent return/fill area is accomplished by voice. An alarm is located at the return/fill station which, when pressed, will sound throughout the warehouse if the employee at the return/fill station needs assistance. Telephones will be used to report a spill or a fire and to summon assistance from local and state emergency response agencies. Branch managers have emergency phone numbers of local and state emergency response teams posted by each phone located in the sales office. Included in these phone numbers is the 24-hour telephone number which can be used to contact the Environment, Health and Safety Department.

CONTINGENCY PLAN ABSTRACT

CORPORATE HEADQUARTERS: Safety-Kleen Corp.
777 Big Timber Road
Elgin, IL 60123
708/697-8460

RESPONSIBLE OFFICIALS: David A. Dattilo
Vice President, Sales and Service

Scott E. Fore
Vice President, Environment, Health and Safety

FACILITY ADDRESS: Safety-Kleen Corp. (7-008-01)
2720 Girard NE
Albuquerque, NM 87107

TELEPHONE NUMBER: 505/884-2277

U.S. EPA I.D. NUMBER: NMD 000804294

GEOGRAPHIC LOCATION: 35° 06' 44" N
106° 36' 46" W

OWNER: Safety-Kleen Corp.

DATE OPERATIONS BEGAN: March 1, 1977

DESCRIPTION OF ACTIVITIES: This facility is an accumulation point for spent solvents generated by Safety-Kleen customers, the majority of whom are small quantity generators. All wastes are ultimately shipped to a Safety-Kleen recycling facility or a contract reclaimer and then returned to the Company's customers as product.

PROPERTY DESCRIPTION: About 1.05 acres with the following structures:

- a. one building with offices and a warehouse with two areas for container storage;
- b. two underground double-walled storage tanks (one for product and one for spent solvent);
- c. one loading dock with a solvent return and fill station; and
- d. one enclosed shelter to be used for container storage.

FACILITY TYPE: Storage in an aboveground tank (S02) and in containers (S01)

STORAGE UNIT	CAPACITY (GAL.)	SECONDARY CONTAINMENT(GAL.)	MATERIAL TO BE STORED
Tank	12,000	*	Spent Mineral Spirits Solvent (D001) ¹
Container Storage--East Warehouse	2,592	448.4	Spent Immersion Cleaner old formula (F002, F004) ¹ new formula (see ¹) Dry Cleaning Waste (F002) ¹
Container Storage-- Warehouse West Warehouse	3,456	549.8	Spent Immersion Cleaner old formula (F002, F004) ¹ new formula (see ¹) Dry Cleaning Waste (F002) ¹
Container Storage-- Masonry Shelter	<u>2,650</u> [June 26, 1992]	<u>265</u> [June 26, 1992]	Paint Waste (D001, F003, F005) ¹ Dumpster Sediment (D001) ¹

* indicates double-walled tank

1 D004, D005, D006, D007, D008, D009, D010, D011, D018, D019, D021, D022, D023, D024, D025, D026, D027, D028, D029, D030, D032, D033, D034, D035, D036, D037, D038, D039, D040, D041, D042 and D043

PURPOSE: This plan describes the proper action to be taken by employees during an emergency.

RESPONSIBILITIES: The emergency coordinator or his alternate is responsible for implementing the plan during an emergency.

EMERGENCY COORDINATOR: The branch manager is the emergency coordinator. The alternate emergency coordinator is a trained employee designated to this position by the emergency coordinator [June 26, 1992].

EMERGENCY NOTIFICATIONS:

Albuquerque Police Department	911 or 505/768-1986
Albuquerque Fire Department	911 or 505/243-6601
<u>Responding Station #8 [June 26, 1992]</u>	<u>505/888-8100 [June 26, 1992]</u>
<u>Presbyterian [June 26, 1992] Hospital</u>	<u>505/841-1111 [June 26, 1992]</u>
Environment, Health and Safety Dept.	708/888-4660
New Mexico Health and Environment Dept.	505/827-9329 (24 hrs.)
Rinchem	505/345-3655 <u>or 505/883-4232 (24 Hr. central security) [June 26, 1992]</u>

4.0 CONTINGENCY PLAN

Safety-Kleen Corp. (7-008-01)
2720 Girard NE
Albuquerque, New Mexico 87107

4.1 Purpose

The contingency plan describes the actions to be taken by each employee in the event of a spill, fire or other emergency. It includes the information necessary to address emergency situations efficiently and in such a manner as to prevent or minimize hazards to human health or the environment due to fire, explosion, or any other release of hazardous materials to the air, soil, surface water, or ground water.

The contingency plan is to be carried out immediately whenever there is a release of hazardous material which could threaten human health or the environment, implementing the procedures contained in this plan.

4.2 Emergency Coordinator Responsibilities

The emergency coordinator is responsible for implementing the contingency plan during an emergency; however, all employees must be familiar with the procedures in this plan and are responsible for proper implementation of the plan should the emergency coordinator or his alternate be unavailable. The branch manager is the emergency coordinator and the alternate emergency coordinator is a trained employee designated to this position by the emergency coordinator [June 26, 1992].

The emergency coordinator and his alternate must be familiar with all aspects of this contingency plan, the operations and activities at the facility, the location and characteristics of materials handled, the location of all records within the facility and the facility layout. In addition, these coordinators have the authority to commit the resources necessary to carry out the contingency plan. Their home addresses and

telephone numbers, as well as the office telephone number, are listed in Appendix F. Also listed in Appendix F are the assigned duties of each employee during an emergency. At least one employee will be at the facility or on call to respond to an emergency situation.

4.2.1 Responsibilities During an Emergency

Whenever there is an imminent or actual emergency situation, the emergency coordinator (or his alternate when the emergency coordinator is not available) must immediately:

- a. activate the internal facility communication system to notify all facility personnel;
- b. notify Safety-Kleen's Environment, Health and Safety Department using the 24-hour telephone number after working hours - 708/888-4660; and
- c. notify appropriate state or local agencies with designated response roles, if necessary.

Whenever there is a release, fire, or explosion, the emergency coordinator must immediately try to identify the character, exact source, amount, and extent of any contamination. Because of the limited number of materials being handled at the facility, he or she may do this by observation or by review of facility records. If necessary, outside laboratories may be contacted to perform chemical analysis.

Concurrently, the emergency coordinator must assess possible hazards to human health or the environment that may result from the release, fire, or explosion. This assessment must consider both direct and indirect effects of the release, fire, or explosion (e.g., the effects of any toxic, irritating, or asphyxiating gases that may be generated, or the effects of any hazardous run-off).

During an emergency, the emergency coordinator must take all measures necessary to ensure that fires, explosions, and releases do not occur, recur, or spread to other hazardous waste at the facility. These measures must include, where applicable, stopping processes and operations, collecting and containing released waste, and removing or isolating containers.

4.2.2 Remedial Action Responsibilities

If the environment has been contaminated or there is a potential for contamination as a result of a fire, explosion, or spill, the emergency coordinator must contact the Environment, Health and Safety Department to report the incident. All releases, fires, and explosions; necessitate the implementation of this contingency plan. Any situation that has the potential for releasing solvent or solvent vapors or causing a fire or explosion must be addressed according to this plan. Should there be any questions as to whether this plan should be implemented (i.e., a problem is suspected but cannot be confirmed) the EHS or Technical Services Dept. must be contacted and assistance requested. The treatment, storage and/or disposal of the recovered waste, contaminated soil or surface water that results must be arranged by Safety-Kleen and carried out as expeditiously as possible.

The emergency coordinator must ensure that, in the affected area(s) of the facility:

- a. no substance that may be incompatible with the released material is brought onsite until cleanup procedures are completed; and
- b. all emergency equipment listed in the contingency plan is cleaned and fit for its intended use before operations are resumed.

4.2.3 Reporting Responsibilities

If the emergency coordinator determines that the facility has had a release that could threaten human health or the environment, the coordinator must report those findings as follows:

- a. If the assessment indicates that evacuation of local areas may be advisable, the coordinator must immediately notify appropriate authorities.
- b. The coordinator must immediately notify the Environment, Health and Safety Department. The department will notify the New Mexico Health and Environment Department (HED), of any spill or release of hazardous waste within 24 hours (except for spills of one pound or less that are immediately cleaned up). The department will report to the New Mexico Health and Environment (HED) the following:
 - (1) name and telephone number of notifier;
 - (2) name and address of facility;
 - (3) time and type of incident (e.g., release, fire);
 - (4) name and quantity of material(s) involved, to the extent known;
 - (5) the extent of injuries, if any; and
 - (6) the possible hazards to human health, or the environment outside the facility.

Safety-Kleen will notify the appropriate state and local authorities that the facility is in compliance with Section 4.2.2 before operations are resumed in the affected area(s) of the facility.

The emergency coordinator must document the time, date, and details of any incident that requires the implementation of the contingency plan. Within 30 days of the incident, Safety-Kleen will submit a written report on the incident to the New Mexico HED. The report must include:

- a. name, address, and telephone number of the owner or operator;
- b. name, address, and telephone number of the facility;

- c. date, time, and type of incident (e.g., fire, explosion);
- d. name and quantity of material(s) involved;
- e. the extent of injuries, if any;
- f. an assessment of actual or potential hazards to human health or the environment, where this is applicable; and
- g. estimated quantity and disposition of recovered material that results from the incident.

4.2.4 Chain of Command

Based on the emergency response procedures described above, the chain of command during an emergency is as follows:

- a. The person who discovers/causes the spill reports to the emergency coordinator.
- b. The emergency coordinator contacts the Environment, Health and Safety Dept.
- c. The Environment, Health and Safety Department reports to the New Mexico HED.

4.2.5 Government Agencies and Local Authorities to Be Notified

During an emergency, the following government agencies and local authorities may be contacted:

<u>Agency or Authority</u>	<u>Rationale</u>
Police Department	Notify if there is imminent danger to human health.
Fire Department	Notify if there is a fire, uncontrolled spill, or other imminent danger.
Hospital	Notify if there are any injuries.
New Mexico HED	Report releases and fires.
Rinchem	Call to assist with remedial action after a release.

Arrangements have been made to familiarize the police department, fire department and local emergency response teams with the layout of the facility, the properties of hazardous materials handled and associated hazards, locations where facility personnel normally work, entrances to and roads inside the facility, and possible evacuation routes. Arrangements have also been made to familiarize the local hospital with the types of injuries or illnesses which could result from fires, explosions, or releases at the facility. Copies of the letters to the local police department, fire department and hospital are in Appendix F.

4.3 Emergency Response Procedures

Response actions to be taken in specific emergency situations are described in the sections which follow. Employees must assess the possible hazards to human health or the environment resulting from a release or fire by visually inspecting the area, reviewing Material Safety Data Sheets for the materials released and estimating the extent of the release and identifying the media to which it was released (e.g., soil, water).

4.3.1 Minor Spills

If a spill should occur while pouring spent solvent into a dumpster or filling drums with solvent product at the return and fill station, and it is contained in the secondary containment at the base of the return and fill station, remedial action will not be necessary. Should the spill occur outside the containment, different actions must be taken depending on whether the spill occurs on a paved or unpaved area:

- a. If the solvent spills on a paved area, it must be collected with sorbent sheets and/or sorbent clay (such as "Oil Dry"). The sorbents will be collected, drummed and shipped to the Safety-Kleen recycle center for proper disposal.

- b. If the solvent spills on an unpaved area, the free solvent must be collected with sorbent material. The sorbent material and any contaminated soil must be collected, drummed and shipped to a Safety-Kleen recycle center for proper disposal.

If a spill occurs while moving or delivering drums outside of the warehouse, the response actions described in 'a' and 'b' above must be followed. Spills inside the warehouse and the paint waste shelter will be prevented from contaminating the environment by the concrete floor and the secondary containment. In the event of a spill indoors, the doors and windows should be opened to improve the ventilation in the confined area. If solvent is spilled in a non-explosion rated area or is flowing in such, insure that all sources of ignition (e.g., thermostats or light switches) are left in the same position (either on or off) as at the time of the spill. Then, following the instructions of the appropriate Material Safety Data Sheet (Appendix F), the worker will enter the area wearing rubber gloves, aprons, safety glasses, and/or a respirator, collect the liquid, drum it and return it to storage. An explosion-proof area is one which special wiring has been used which prevents the likelihood of an explosion. Only the return and fill station contains this type of wiring.

Cleanups are completed only when the workers have cleaned themselves and the emergency equipment with soap and water. All minor spills must be reported to the Environment, Health and Safety Department and the department will contact the New Mexico HED, if required.

In the event a container needs emptying, a pump located on the facility will be used to remove the liquid and pump it to a new container. In the event the liquid from a tank needs to be removed, tanker trucks will be used to remove the liquid and haul it to a recycle center. A wet/dry vacuum is present at the site to be used in the event of a minor spill. sorbent pads can also be used to wipe up any minor spills.

4.3.2 Major Spills

Any spill which can not be completely remediated using the methods described in 'a' and 'b' of Section 4.3.1 is a major spill. A major spill is usually the result of a vehicular accident, tank overfilling, equipment failure or a fire. Spilled material which escapes collection can contaminate soil, surface water, ground water, sanitary sewer systems and storm sewer systems. Emergency response to this type of spill should be as follows:

- a. Assist any injured people.
- b. Stop the flow of solvent, if possible.
- c. Retain, contain or slow the flow of the solvent if it can not be stopped.
- d. If solvent escapes your containment efforts, immediately call the local Fire Department, and report to the emergency coordinator and the Environment, Health and Safety Department.
- e. Immediately recover the spilled solvent to reduce property and environmental damage. Start recovery operations immediately.
- f. Contact the spill clean up contractor and request clean up assistance.

The emergency coordinator shall report any incident as soon as possible to the Environment, Health and Safety Department using the 24-hour telephone number: 708/888-4660. If the Environment, Health and Safety Department does not respond within thirty minutes, the emergency coordinator shall call an emergency cleanup response contractor, if it is deemed necessary, and report the incident to the National Response Center (telephone: 800/424-8802) and New Mexico HED (telephone: 505/827-9329 - 24-hour number). Otherwise, the Environment, Health and Safety Department will contact the proper authorities.

The person reporting a spill should be prepared to give his name, position, company name, address and telephone number. The person reporting should also describe the

material spilled and, if possible, some estimate of the amount, and the containment status and specify any equipment needed.

Contaminated material resulting from remedial actions for major spills, will usually be disposed of at a properly permitted treatment or disposal facility since the quantity of waste material will probably exceed the storage capacity of the Safety-Kleen recycle center.

Contaminated equipment resulting from remedial actions for spills must be cleaned and decontaminated. If it is a paved or metal surface, this can be done using a detergent solution.

Every spill must be recorded on the Field Spill Report Form [June 26, 1992] (Appendix F) and reviewed with branch personnel to prevent similar spills from occurring in the future. A copy of this report is sent to the Environmental Affairs Department.

4.3.3 Fire Control Procedures

If a fire occurs, personnel must act quickly with the fire extinguisher to put out the fire before it spreads. If it can not be extinguished immediately, evacuate the facility and call the fire department.

Vapors of mineral spirits exposed to a spark or open flame can flash at temperatures over 105° F. A mineral spirits fire can best be extinguished with foam. If foam is not available, sweeping the fire with water fog can cool it, directing the water spray to push the flames into a confined area, if possible. The flame should not be extinguished until the flow of the solvent has been stopped. Then attention should be directed immediately to extinguishing the flame.

The old formula [June 26, 1992] immersion cleaner (which is a mixture of chlorinated solvents, cresylic acid and an alkaline solution) and dry cleaning wastes are not flammable (see Section IV of the appropriate Material Safety Data Sheet in Appendix F) but can produce phosgene gas and hydrochloric acid at very high temperatures (about 1200° F). The new formula immersion cleaner also is not flammable; however, incomplete combustion can generate carbon monoxide and other toxic vapors [June 26, 1992]. The potential for the materials reaching a decomposition state is minimal; however, branch personnel and local authorities must be aware of the proper response, should a fire affect the drum storage areas:

- a. Isolate the hazard area and deny entry to unauthorized personnel.
- b. Stay upwind; keep out of low areas.
- c. Ventilate closed spaces before entering them.
- d. Wear positive pressure breathing apparatus and protective clothing.
- e. Evacuate a 600 foot radius area endangered by the gas.

A fire in the drum storage area can best be extinguished by foam, water fog, or water spray.

Paint wastes can generate carbon monoxide and other poisonous gases. Therefore, it is important to wear positive pressure breathing apparatus and full protective clothing in the affected area. If a fire in or near the ignitable waste shelter occurs:

- a. Isolate the area and deny entry to unauthorized personnel.
- b. Stay upwind; keep away from low areas.
- c. Wear protective clothing and self-contained breathing apparatus.

A dry chemical, carbon dioxide or foam will best extinguish the fire. Cool the shelter and containers with water until well after the fire has been extinguished.

Explosions may result in the spread of fire, unstable structures, and other hazardous conditions at the facility. Therefore, the site must not be re-entered until the fire department and Safety-Kleen's insurance company have determined it is safe to do so. Action must be taken to ensure fires, explosions or releases do not occur or reoccur. These include removing the source of the problem, repairing or remediating the source of the problem, cooling areas subject to fires and explosions and replacing faulty equipment.

4.4 Evacuation Plan

Clearly marked exits exist in the warehouse and office area and employees are trained to be aware of all potential escape routes.

The signal for evacuation is either a verbal or loudspeaker announcement describing the hazard and indicating the need for evacuation.

When an uncontrolled fire or release has occurred, all personnel are to be evacuated from the area and assemble across Girard Avenue to assure that all personnel are accounted for and out of the hazardous area. The fire department must be notified at the time of evacuation either from a safe onsite building or from a neighboring facility.

4.5 Arrangement with Emergency Response Contractors

The emergency coordinator and his alternates have been trained using this contingency plan as well as in a classroom setting. They have preferences such as

various state members at the corporate office and the Material Safety Data Sheets to help them make a decision during an emergency.

An emergency response contractor is identified on the Emergency Information sheet (Appendix F). This contractor will provide emergency assistance during a release and/or cleanup.

4.6 Implementation Schedule

Any discrepancies or deficiencies found during the routine inspection must be corrected expeditiously to insure that the problem does not lead to an environmental or human health hazard. Where a hazard is imminent or an accident has already occurred, remedial action must be taken immediately. The branch manager has the overall responsibility for remediating any discrepancies found during the routine inspection, and will consult with the corporate environmental and engineering staffs to design an implementation schedule for remedial action.

4.7 Availability and Revision of the Contingency Plan

This plan and all revisions to the plan are kept at the facility and regularly updated throughout the operating life of the facility. Copies of this document are provided to local authorities and organizations listed on the Emergency Information sheet (Appendix F) and they may be called upon to provide emergency services. In addition, this plan and all revisions to the plan are made readily available to employees working at the facility.

The plan is reviewed and updated, if necessary, whenever:

- a. the facility license is modified to allow new process wastes to be stored or treated, or applicable regulations are revised;
- b. the list or location of emergency equipment changes;

- c. the facility changes in its design, construction, operation maintenance, or other circumstances in a way that:
 - (1) increases the potential for fires, explosions, or releases of hazardous constituents, or
 - (2) changes the response necessary in an emergency;
- d. the names, addresses, or phone numbers of emergency coordinators change;
- e. the employee assigned to each emergency task changes; or
- f. the plan fails when implemented in an emergency.

PERSONNEL TRAINING ABSTRACT

OBJECTIVE: The purpose of training is to familiarize employees with environmental regulations, records and emergency procedures so they can perform their jobs in the safest and most efficient manner possible. The program is designed to ensure that facility personnel are able to respond effectively to emergencies by familiarizing them with emergency procedures, emergency equipment and emergency systems.

TIME OF TRAINING

JOB TITLE	<u>Prior to Working in Unsupervised Position</u> [June 26, 1992]	On the Job	Annually	When Regulations and/or Procedures Change
<u>Resource Recovery</u> [June 26, 1992] Branch Manager	X		X	X
Branch Secretary		X	X	X
<u>Branch Sales Manager</u>	X	X	X	X [June 26, 1992]
Sales Representative	X	X	X	X
Warehouseman	X [June 26, 1992]	X	X	X

5.0 PERSONNEL TRAINING

5.1 Outline of Training Program

Each employee is trained to operate and maintain the facility safely, and to understand hazards unique to his job assignment. All facility employees [June 26, 1992] complete an introductory training program before starting their jobs, with annual review and update thereafter. Appendix G contains information on service center personnel and trainers, job descriptions, training outlines and training record forms. All employees at the facility have [June 26, 1992] training that satisfies the requirement of Pt. V 264.16. The persons listed in the resumes in Appendix G are personnel working for Safety-Kleen Environment, Health and Safety Department. All [June 26, 1992] of these people have [June 26, 1992] input to Safety-Kleen training program and any of them may participate in actual training. Robert Wachsmuth, regional environmental engineer, directly trains new resource recovery branch managers [June 26, 1992] (branch managers). The branch manager, in turn, trains his employees. An employee may not work in an unsupervised position until he or she has received proper training as outlined in Appendix G.

5.2 Organization Structure and Job Descriptions

The Corporate Training and Environmental, Health and Safety Departments are responsible for developing, implementing and presenting the training program to the branch manager. Environmental compliance and training of facility employees is the responsibility of the branch manager. The Corporate Training and Environmental, Health and Safety Departments ensure that the branch manager is trained and that he in turn trains facility personnel including annual and introductory training of sales managers, sales representatives, branch secretaries and warehouse personnel. Resumes

describing education, training, and hazardous waste experience for Environmental Health and Safety personnel responsible for developing and presenting training programs to the branch manager are presented in Appendix G. Job descriptions for branch personnel are also provided in Appendix G. [June 26, 1992]

5.2.1 Branch Manager

The branch manager is ultimately responsible for the operations at the service center. The sales representatives, secretary and warehouseman report to the branch manager and he, in turn, must provide the training and materials necessary for the branch employees to execute their duties. With respect to environmental compliance, the branch manager must:

- a. keep the service center clean and orderly;
- b. execute or designate an employee to execute the daily inspection, keep a written log and remediate any problems;
- c. know the potential hazards of the material and wastes handled on site;
- d. identify potential spill and fire sources and be able to execute the contingency plan;
- e. inform all employees of their environmental responsibilities;
- f. act as emergency coordinator and notify the proper authorities during an emergency, remediate the situation to the best of his abilities, and submit necessary reports to the corporate office; and
- g. maintain all environmental records (such as manifests, training records and spill reports) on file.

The branch manager is trained (see Section 5.3.1) sufficiently that he is able to perform as a trainer himself for his employees.

5.2.2 Environment, Health and Safety Department

Safety-Kleen's Environment, Health and Safety (EHS) Department operates out of the corporate office in Elgin, Illinois. This department includes Safety-Kleen's environmental engineers [June 26, 1992]. Each field [June 26, 1992] regional environmental engineer who works in this department is responsible for compliance of the service centers in a given geographic area of the country. The EHS Department must:

- a. provide oversight in training of personnel in accordance with [June 26, 1992] environmental regulations and corporate policy;
- b. notify the proper authorities, oversee remedial actions and submit a written report to the state after an emergency situation has occurred;
- c. assure that environmental permits are submitted and updated as required; and
- d. manage any environmental compliance issues which exceed the resources available at the service center level.
- e. Participate in training new branch managers. Resumes for those employees responsible for training new branch managers are in Appendix G.

5.3 Description of the Training Program

Employee training is accomplished using both classroom and on-the-job methods. Environmental training for branch managers comes from both the EHS Department and regional environmental engineers. This training is sufficient enough to allow the branch manager to in turn train his facility employees. [June 26, 1992]

All facility employees are trained prior to starting or as soon as he or she begins working (depending on his or her position) and annually thereafter. Introductory and annual training program outlines for all facility personnel are provided in Appendix G. In addition, new branch managers receive more intense training as designated by the

Corporate Training and EHS Departments. These training program outlines are also located in Appendix G. [June 26, 1992]

5.3.1 Training of New Resource Recovery Branch Managers

New managers are trained for several weeks before they begin their new positions. This training is both in situ and classroom modes. While being trained at a designated "training facility", a new manager reviews all environmental records and learns the recordkeeping requirements. These records include: waste analytical profiles, [June 26, 1992] manifests, personnel records, training records, facility inspection records, and spill reports.

The training culminates in about [June 26, 1992] four weeks of training at his new facility, at least one day of which is devoted to environmental training with his regional environmental engineer. This training [June 26, 1992] consists of an introduction to environmental law and a review of the Part A and Part B [June 26, 1992] including the Waste Analysis Plan, Preparedness and Prevention Plan, Contingency Plan, Training Plan and Closure Plan. This training is outlined in Appendix G.

Additional time is spent reviewing past environmental compliance at the branch manager's facility and regulations unique to his state are discussed as well.

5.3.2 Training of Branch Secretaries

Branch secretaries are trained in the proper recordkeeping procedures as soon as they begin working for Safety-Kleen. While they are not usually responsible for preparing the documentation, they must check it for accuracy and completeness and then process or file it as required. Additional training is overseen by the branch manager and is done within six months of starting. It includes the items listed in the Introductory

and Annual Training Topics for Branch Employees (Appendix G) which are explained in company-produced videotape presentations on emergency response, shipping documents (including manifests), drum labels and other safety and environmental compliance issues. In addition, the contingency plan must be reviewed with the branch manager within the first two weeks of the secretary starting work.

5.3.3 Training of Sales Manager [June 26, 1992]

A branch sales manager is a middle management position created to supervise the sales force within a specific line of services. The sales manager position will be particular to a specific line of Safety-Kleen business and will be filled according to the needs of the facility. The primary goals of this position is to direct and assist the branch manager in attaining sales goals in a specific line of business which Safety-Kleen offers. The sales manager supervises the sales aspect of the sales representative position. Though most training for this position is within the area of sales, the sales manager also receives the training in the Introductory and Annual Training Topics for Facility Employees located in Appendix G. A sales manager may also be trained as the designate for performing the facility inspection. Additional training in the form of slide and/or video presentations and a review of the Contingency Plan with the branch manager is required. A job description for this position can be found in Appendix G. [June 26, 1992]

5.3.4 Training of New Sales Representatives

New sales representatives are trained in [Note: deleted reference to two weeks; [June 26, 1992]] manifests, facility inspection records and training records. A sales representative may also be trained as the designate for performing the facility inspection.

Additional training is in the form of slide/tape and/or [June 26, 1992] videotape presentations and a review of the contingency plan. The contingency plan must be reviewed with the branch manager before the sales representative formally begins his new position and annually thereafter. All items listed in the Introductory and Annual Topics Training for Branch Employees (Appendix G) must be explained within six months of starting.

5.3.5 Training of New Warehousemen

A warehouseman is trained to maintain the service center and assist the other branch employees in their tasks. He may be a designate for the facility inspection and must be trained by the branch manager as such. Within two weeks of the warehouseman's starting, the branch manager must review the contingency plan with him, and within six months he must review the items listed in the Introductory and Annual Training Topics for Branch Employees (Appendix G).

5.3.6 Annual Training

On an annual basis, employees are trained using a program prepared and updated annually by the EHS Department. The regional engineer must insure that the program has been executed. The annual training [June 26, 1992] includes updates on environmental regulations, an in-depth review of the contingency plan and a review of RCRA inspection criteria.

All service center employees must annually review the items listed in the Introductory and Annual Topics for Branch Employees. This review is in the form of slide/tape and/or [June 26, 1992] videotapes and a review and discussion of the storage facility permit application. In addition, periodic memoranda on changes in

environmental regulations are issued by the EHS Department and must be read and discussed by all branch personnel.

5.4 Training Records

All training must be documented using the record forms in Appendix G. The records must be kept on file at the facility until closure. Employees may not work in unsupervised positions until the Contingency Plan has been reviewed and they understand emergency response procedures.

CLOSURE PLAN ABSTRACT

LOCATION ADDRESS: Safety-Kleen Corp. (7-008-01)
2720 Girard NE
Albuquerque, NM 87107

U.S. EPA I.D. NO: NMD 000804294

WASTE UNITS TO UNDERGO CLOSURE:

- a. Tank Storage - one 12,000 gallon underground double-walled storage tank
- b. Drum Storage - an area of about 353 square feet with a storage capacity of 2,592 gallons and an area of about 900 square feet with a storage capacity of 3,456 gallons.
- c. Return and Fill Station - The location of this waste management unit is shown in the Site Plan. This structure can hold 550 gallons of dumpster sediment.
- d. Ignitable Waste Shelter - The location of this structure is shown in the Site Plan. It has a storage capacity of 9,650 [June 26, 1992] gallons.

The volumes shown above are the maximum amounts which will be stored at this facility.

6.0 CLOSURE PLAN

6.1 Purpose

The Albuquerque service center operates as a storage facility for hazardous wastes, and Safety-Kleen believes it is required that it be closed in accordance with the closure requirements of New Mexico Hazardous Waste Management Regulations 206.C. Closure of the facility will be carried out in accordance with the steps outlined in this plan and Appendix H contains an estimated schedule and cost for the completion of closure. Safety-Kleen will remove all hazardous wastes and residuals from the facility and will therefore eliminate the need for further maintenance and care. An outside contractor will be performing the closure clean-up and sampling activities. The contractor will have worked with Safety-Kleen prior to clean-up so we can be aware of their capabilities. A state licensed Professional Engineer will be onsite periodically to certify the adequacy of the clean-up activity.

6.2 Underground Tank and Associated Piping

To safely clean and decommission the underground storage tank:

- a. Remove the remaining material from the tank and return the materials to a reclaimer.
- b. Provide access to the tank.
- c. Rinse, scrape and squeegee the tank interior, removing all residual waste material and rinsate.
- d. Disconnect and decontaminate all appurtenant piping and pumping equipment.
- e. Remove tank and appurtenant equipment and reuse or sell as scrap.
- f. Backfill all excavations with clean fill materials.
- g. Transport and dispose of all waste material during the project.

6.2.1 Removal of Waste Material and Opening of the Tank

The contents of the tank must be removed using a pump, vacuum or similar equipment and then be shipped by tanker truck to a reclaimer.

To gain access to tanks, use the manway at the top of the tank. Depending on the type of opening and the condition of the equipment, a variety of tools may be used to open the manway. Care must be exercised to minimize spark generation when working on the tank.

Prior to entering the tank, personnel should have full face respiratory protection and protective clothing. Once the tanks have been opened, they must be provided with positive ventilation. The tanks will then be inspected to determine the approximate quantity and physical conditions of any remaining waste material.

6.2.2 Removal of Residual Waste and Cleaning of Tank

Before removing any residual waste from the tank, all piping and appurtenant equipment will be flushed with clean mineral spirits followed by a detergent solution.

The method used to remove the residual waste material from the tanks will depend on the physical properties and quantities of that material. Prior to any person entering the tank, an effort will be made to remove as much liquid and sediment as possible (see Section 6.2.1).

Subsequent to vacuuming the majority of the material from the tanks, it may be necessary to use a high pressure wash system using clean solvent and a detergent solution to rinse residual material from the walls, roof, and floor of the tank. The evacuated material and the rinse solution will be shipped to a reclaimer. The quantity of wash fluid used will be kept to a minimum in order to limit the amount of waste material.

Storage tanks are considered confined spaces (i.e., spaces open or closed having a limited means of egress in which poisonous gases or flammable vapors might accumulate or an oxygen deficiency might occur), and confined space entry requires special procedures:

- a. Tanks are to be washed, neutralized and/or purged (where flammable atmosphere is present) prior to being entered.
- b. Supply valves must be closed and tagged and bleeder valves left open; or supply piping should be disconnected.
- c. Pumps or motors normally activated by automatic controls shall be operated manually to be sure they have been disconnected. Instrument power switches should be tagged "Off".
- d. In tanks where flammable vapors may be present, all sources of ignition must be removed.
- e. Under circumstances where "hot work" (welding, burning, grinding, etc.) is to be performed in or on the vessel, a test for combustible gases shall be taken. This is referred to as a "flash test". In all tank entering situations, an oxygen deficiency test shall also be performed prior to tank entry. Both flash test and oxygen deficiency test will be performed by the supervisor of the area in which the work is being done.
- f. Under conditions where there exists a possibility (no matter how remote) of toxic vapors being present in the tank to be entered, the supervisor will arrange to have the air tested. The results of all tests will be displayed on site.
- g. There must be a set of wristlets or a rescue harness and sufficient rope at the job site to effect a rescue. Any other rescue equipment considered necessary must also be on the job site.
- h. Workers should wear rescue harnesses if entering a tank with a large enough opening to easily affect a rescue. In tanks with small openings, only wristlets may be used. In cases where there are agitator shafts, drums or other hazards in which the man's life-line would be entangled and the supervisor in charge feels that wearing the lifeline may entrap a man and increase the hazard, the wearing of a harness or wristlets may be eliminated.
- i. A constant source of fresh air must be provided to insure a complete change of air every few minutes. In cases of short term entry for

inspection or removal of objects, an air mask is recommended. In cases of long term entry the use of an air mover should be considered.

- j. When a ladder is required to enter a tank, the ladder must be secured and not removed while anyone is in the vessel. In cases where a rigid ladder could become an obstacle, a chain ladder may be used.
- k. Adequate illumination must be provided and a flashlight or other battery operated light must also be on hand to provide illumination for a safe exit in the event of an electrical power failure.
- l. All electrical equipment to be used inside the tank must be in good repair and grounded.
- m. Other people working in the immediate area will be informed of the work being done, and they must inform the watcher or supervisor immediately of any unusual occurrence which makes it necessary to evacuate the tank.
- n. The Watcher or Standby Observer System must be implemented. It consists of the following:
 - (1). Workers inside a confined space must be under the constant observation of a fully instructed watcher.
 - (2). Before anyone enters the tank, the watcher will be instructed by the person in charge of the entry that an entry authorization must be obtained from the person in charge and a rescue harness or wristlets must be used on the job.
 - (3). The watcher must also know the location of the nearest telephone (with emergency numbers posted), eyewash and/or shower, fire extinguisher and oxygen inhalator. For all "hot work" inside a tank, the watcher must be instructed how to shut down the welding/burning equipment.
 - (4). As long as anyone is inside the vessel, the watcher must remain in continuous contact with the worker. HE IS NOT TO LEAVE THE JOB SITE EXCEPT TO REPORT AN EMERGENCY. He does not enter the tank until help is available.
 - (5). After being instructed in his responsibilities, the watcher will sign a form indicating his understanding.
- o. All welding and burning equipment must be provided with a shutoff under the control of the watcher; and the watcher must be shown how to shut off the equipment if it becomes necessary. Welding and burning equipment will only be taken into a tank immediately prior to its use and must be removed from the tank immediately after the job is finished.

- p. For all "hot work" inside a tank, a properly executed flame permit, if needed, must be displayed at the job site and standard welding and burning safety precautions will always be followed.

6.2.3 Removal of the Tank

To safely remove the tank:

- a. Disconnect all appurtenant piping.
- b. Disconnect all appurtenant pumping equipment.
- c. The tanks and piping shall be removed and disposed of at a properly permitted landfill. The final rinsate must be sampled and analyzed for volatile organic compounds to determine the cleanliness of the tank and its piping. If any volatile organic compounds are present above detection limits, the washing and rinsing must be repeated until they are no longer detectable.
- d. Sample and analyze for mineral spirits and TCLP contaminants (except pesticides) beneath the tankfarm. If contamination is indicated, it will be confirmed with an extent of contamination soil study. The soil will be overexcavated or otherwise treated to eliminate the contamination. Soil samples must be collected and analyzed after clean-up to insure decontamination has been achieved.
- e. Backfill the excavation with clean fill materials and grade to ground level.
- f. Repave with asphalt or concrete as needed.
- g. Wastes (such as contaminated soil, rinsate and tank pieces) generated during the cleanup are hazardous unless it can be demonstrated they are not.

Closure documentation must include proof that these wastes were disposed of at a properly permitted facility, analyses of the waste, quantities and the disposal location.

6.3 Drum Storage Areas in Warehouse

The drum storage areas are used for the storage of drums of used immersion cleaner, dry cleaning waste and dumpster sediment. At closure, all the drums will be removed and transported to a reclaimer after proper packaging, labeling and manifesting. The contents of the drums will be reclaimed and the drums will be cleaned for reuse.

The concrete floor and spill containment sumps will be cleaned with a detergent solution and the final rinsate will be analyzed for volatile organic compounds to determine the effectiveness of the cleaning. If any cracks are present soil samples must be collected from beneath the cracks and analyzed for volatile organic compounds. If contamination is present, a workplan must be developed to determine the extent of contamination and proper remedial action. Any other wastes generated in the closure process will be reclaimed or properly disposed of.

6.4 Solvent Return and Fill Station

The return and fill station is used to collect and return the used mineral spirits to the waste storage tank. Closure of the return and fill station will be made prior to the cleaning and removal of the storage tank. At closure, the sediment in the dumpsters will be removed and drummed, labeled, and manifested for proper treatment and disposal at a Safety-Kleen recycle center.

The dumpster and the dock area will be thoroughly rinsed with a detergent solution. The rinsate is discharged through the appurtenant piping system into the storage tank (after it has been emptied but before disconnection), which will be subjected to a separate closure procedure as described earlier. The final rinsate must be analyzed for volatile organic compounds. The washing and rinsing will be repeated until contaminants are not present above detection levels. The clean dumpster and dock structure will be reused by Safety-Kleen or scrapped.

6.5 Ignitable Waste Shelter

The ignitable waste shelter is used to store containers of paint waste and dumpster sediment prior to shipment to a reclaimer. At closure, any residual waste will

be removed from the shelter and shipped to a reclaimer. The shelter will be thoroughly cleaned with a detergent solution and the rinsate will be collected and properly disposed of. The concrete structure will be reused by Safety-Kleen or scrapped.

6.6 Facility Closure Schedule and Certification

Within 90 days of receiving the final volume of hazardous wastes, Safety-Kleen will remove all hazardous wastes from the site in accordance with the approved closure plan. The New Mexico Health and Environment Department may approve a longer period if Safety-Kleen demonstrates that the activities required to comply with this paragraph will, of necessity, take longer than 90 days to complete or the following requirements are met:

- a. the facility has the capacity to receive additional wastes;
- b. there is a likelihood that a person other than Safety-Kleen will recommence operation of the site; and/or
- c. closure of the facility is incompatible with continued operation of the site. In this case, Safety-Kleen will take all steps necessary to prevent threats to human health and the environment.

Safety-Kleen will complete closure activities in accordance with the approved closure plan and within 180 days after receiving the final volume of wastes.

When closure is completed, Safety-Kleen shall submit to the New Mexico Health and Environment Department certification, both by the operator and by an independent registered professional engineer, that the facility has been closed in accordance with the approved closure plan.

REVISED APPENDIX PAGES

**NOTE: THE FOLLOWING REVISED PART A PERMIT APPLICATION
SUPERSEDES THE APPLICATION PROVIDED IN APPENDIX A OF
THE PART B PERMIT APPLICATION DATED NOVEMBER 1990.
PLEASE NOTE THAT TCLP CODES HAVE BEEN ADDED TO THE
PART A; THE STATE WAS NOTIFIED OF THE APPLICABLE TCLP
CODES IN A LETTER DATED SEPTEMBER 24, 1990.**

For EPA Regional Use Only	 United States Environmental Protection Agency Washington, DC 20460 <h1 style="margin:0;">Hazardous Waste Permit Application Part A</h1> <p style="font-size:small; margin:0;">(Read the Instructions before starting)</p>	For State Use Only									
<table border="1" style="width:100%; border-collapse: collapse;"> <tr> <td colspan="3" style="text-align:center; font-size:small;">Date Received</td> </tr> <tr> <td style="width:33%; text-align:center; font-size:small;">Month</td> <td style="width:33%; text-align:center; font-size:small;">Day</td> <td style="width:33%; text-align:center; font-size:small;">Year</td> </tr> <tr> <td style="text-align:center;"> </td> <td style="text-align:center;"> </td> <td style="text-align:center;"> </td> </tr> </table>			Date Received			Month	Day	Year			
Date Received											
Month	Day	Year									
I. ID Number(s)											
A. EPA ID Number		B. Secondary ID Number (if applicable)									
N M D O O 0 8 0 4 2 9 4											
II. Name of Facility											
S A F E T Y - K I L E E N C L O P P											
III. Facility Location (Physical address not P.O. Box or Route Number)											
A. Street											
2 7 2 0 G I R A R D N E											
Street (continued)											
City or Town		State ZIP Code									
A L B U Q U E R Q U E		N M 8 9 1 0 7 -									
County Code <small>(if known)</small>	County Name										
	B E R N A L I I L D										
B. Land Type	C. Geographic Location	D. Facility Existence Date									
(enter code)	LATITUDE (degrees, minutes, & seconds)	LONGITUDE (degrees, minutes, & seconds)									
	3 5 0 6 4 4 N	1 0 6 3 6 4 6 W									
IV. Facility Mailing Address											
Street or P.O. Box											
7 7 7 B I G T I M B E R R O A D											
City or Town		State ZIP Code									
E I C I N		I L 6 0 1 2 3 -									
V. Facility Contact (Person to be contacted regarding waste activities at facility)											
Name (last)		(first)									
W A C H S M I T H		R O B E R T									
Job Title		Phone Number (area code and number)									
R E G E N V E N G R		7 1 4 - 5 9 3 - 3 9 8 5									
VI. Facility Contact Address (See Instructions)											
A. Contact Address Location Mailing	B. Street or P.O. Box										
X											
City or Town		State ZIP Code									

EPA I.D. Number (enter from page 1)										Secondary ID Number (enter from page 1)											
N	M	D	0	0	0	8	0	4	2	9	4										

XI. Nature of Business (provide a brief description) -

This location is primarily a local sales/service office and warehouse for Safety-Kleen products consisting of small parts cleaning equipment, solvent and allied products such as hand cleaner, floor cleaner, parts washing brushes, etc. Safety-Kleen collects used solvents from the customer (primarily SQG & VSQG's) for temporary storage at this facility. Once a sufficient quantity of materials is collected, the materials are moved off-site in a semi trailer or tanker to a Safety-Kleen Recycling Center.

XII. Process - Codes and Design Capacities

- A. PROCESS CODE** - Enter the code from the list of process codes below that best describes each process to be used at the facility. Twelve lines are provided for entering codes. If more lines are needed, attach a separate sheet of paper with the additional information. If a process will be used that is not included in the list of codes below, then describe the process (including its design capacity) in the space provided in item XIII.
- B. PROCESS-DESIGN CAPACITY** - For each code entered in column A, enter the capacity of the process.
- 1. AMOUNT** - Enter the amount. In a case where design capacity is not applicable (such as inc. closure/pack closure or enforcement action) enter the total amount of waste for that process unit.
 - 2. UNIT OF MEASURE** - For each amount entered in column B(1), enter the code from the list of unit measure codes below that describes the unit of measure used. Only the units of measure that are listed below should be used.
- C. PROCESS TOTAL NUMBER OF UNITS** - Enter the total number of units used with the corresponding process code.

PROCESS CODE	PROCESS	APPROPRIATE UNITS OF MEASURE FOR PROCESS DESIGN CAPACITY	UNIT OF MEASURE	UNIT OF MEASURE CODE
	DISPOSAL:		GALLONS	G
D79	INJECTION WELL	GALLONS; LITERS; GALLONS PER DAY; OR LITERS PER DAY	GALLONS PER HOUR	E
D80	LANDFILL	ACRE- FEET OR HECTARE-METER	GALLONS PER DAY	U
D81	LAND APPLICATION	ACRES OR HECTARES	LITERS	L
D82	OCEAN DISPOSAL	GALLONS PER DAY OR LITERS PER DAY	LITERS PER HOUR	H
D83	SURFACE IMPOUNDMENT	GALLONS OR LITERS	LITERS PER DAY	V
S01	STORAGE: CONTAINER (barrel, drum, etc.)	GALLONS OR LITERS	SHORT TONS PER HOUR	D
S02	TANK	GALLONS OR LITERS	METRIC TONS PER HOUR	W
S03	WASTE PILE	CUBIC YARDS OR CUBIC METERS	SHORT TONS PER DAY	N
S04	SURFACE IMPOUNDMENT	GALLONS OR LITERS	METRIC TONS PER DAY	S
T01	TREATMENT: TANK	GALLONS PER DAY OR LITERS PER DAY	POUNDS PER HOUR	J
T02	SURFACE IMPOUNDMENT	GALLONS PER DAY OR LITERS PER DAY	KILOGRAMS PER HOUR	R
T03	INCINERATOR	SHORT TONS PER HOUR; METRIC TONS PER HOUR; GALLONS PER HOUR; LITERS PER HOUR; OR BTU'S PER HOUR	CUBIC YARDS	Y
T04	OTHER TREATMENT <small>(Use for physical, chemical, thermal or biological treatment processes not occurring in tanks, surface impoundment or incinerators. Describe the processes in the space provided in item XIII.)</small>	GALLONS PER DAY; LITERS PER DAY; POUNDS PER HOUR; SHORT TONS PER HOUR; KILOGRAMS PER HOUR; METRIC TONS PER DAY; METRIC TONS PER HOUR; OR SHORT TONS PER DAY	CUBIC METERS	C
			ACRES	B
			ACRE- FEET	A
			HECTARES	Q
			HECTARE-METER	F
			BTU's PER HOUR	K

EPA I.D. Number (enter from page 1)

Secondary ID Number (enter from page 1)

N M D O 0 0 8 0 4 2 9 4

XIV. Description of Hazardous Wastes (continued)

Line Number	A. EPA HAZARDOUS WASTE NO. (enter code)	B. ESTIMATED ANNUAL QUANTITY OF WASTE	C. UNIT OF MEASURE (enter code)	D. PROCESSES	
				(1) PROCESS CODES (enter)	(2) PROCESS DESCRIPTION (If a code is not entered in D(1))
1	F 0 0 2	65.7	T S	0 1	Spent Immersion Cleaner;
2	F 0 0 4	*			Old and New Formulas
3	D 0 0 4	"			"
4	D 0 0 5	"			"
5	D 0 0 6	"			"
6	D 0 0 7	"			"
7	D 0 0 8	"			"
8	D 0 0 9	"			"
9	D 0 1 0	"			"
10	D 0 1 1	"			"
11	D 0 1 8	"			"
12	D 0 1 9	"			"
13	D 0 2 1	"			"
4	D 0 2 2	"			"
15	D 0 2 3	"			"
16	D 0 2 4	"			"
17	D 0 2 5	"			"
18	D 0 2 6	"			"
19	D 0 2 7	"			"
20	D 0 2 8	"			"
21	D 0 2 9	"			"
22	D 0 3 0	"			"
23	D 0 3 2	"			"
24	D 0 3 3	"			"
25	D 0 3 4	"			"
26	D 0 3 5	"			"
27	D 0 3 6	"			"
28	D 0 3 7	"			"
29	D 0 3 8	"			"
30	D 0 3 9	"			"
31	D 0 4 0	"			"
32	D 0 4 1	"			"
33	D 0 4 2	"			"

B.

* Included with above

EPA I.D. Number (enter from page 1)	Secondary ID Number (enter from page 1)
N M D 0 0 0 8 0 4 2 9 4	

XIV. Description of Hazardous Wastes (continued)

Line Number	A. EPA HAZARDOUS WASTE NO. (enter code)	B. ESTIMATED ANNUAL QUANTITY OF WASTE	C. UNIT OF MEASURE (enter code)	D. PROCESSES	
				(1) PROCESS CODES (enter)	(2) PROCESS DESCRIPTION (if a code is not entered in D(1))
1	D 0 0 1	76.9	T		Paint Waste & Dumpster Sediment
2	F 0 0 3	*			Paint Waste Only
3	F 0 0 5	"			"
4	D 0 0 4	"			Paint Waste and Dumpster Sediment
5	D 0 0 5	"			"
6	D 0 0 6	"			"
7	D 0 0 7	"			"
8	D 0 0 8	"			"
9	D 0 0 9	"			"
10	D 0 1 0	"			"
11	D 0 1 1	"			"
12	D 0 1 8	"			"
13	D 0 1 9	"			"
14	D 0 2 1	"			"
15	D 0 2 2	"			"
16	0 2 3	"			"
17	D 0 2 4	"			"
18	D 0 2 5	"			"
19	F 0 2 6	"			"
20	D 0 2 7	"			"
21	D 0 2 8	"			"
22	D 0 2 9	"			"
23	F 0 3 0	"			"
24	D 0 3 2	"			"
25	D 0 3 3	"			"
26	D 0 3 4	"			"
27	D 0 3 5	"			"
28	D 0 3 6	"			"
29	D 0 3 7	"			"
30	D 0 3 8	"			"
31	D 0 3 9	"			"
32	D 0 4 0	"			"
33	D 0 4 1	"			"

* included with above

**NOTE: PLEASE INSERT THE FOLLOWING AT THE BACK OF APPENDIX D
(ANALYTICAL DATA). THIS INFORMATION INCLUDES THE MOST
RECENT TCLP DATA FOR THE SERVICE CENTER'S WASTE
STREAMS.**

**TCLP
ANALYSIS OF SPENT MINERAL SPIRITS**

Parts Washer Solvent Wastes

Volatile Organics (EPA 8240) Analysis, ppm

Parameter	CH3Cl	CH3Br	C2H3Cl	C2H5Cl	CH2Cl2	acetone	CS2	1,1-DCE	1,1-DCA	1,2-DCE	CHCl3	
LAB SITE												
M CL	< 100	< 100	< 100	< 100	< 50	< 1000	< 50	< 50	< 50	< 50	< 50	
W DE	< 120	< 120	< 120	< 120	< 60	< 1200	< 60	< 60	< 60	< 60	< 60	
W EL	< 120	< 120	< 120	< 120	< 62	< 1200	< 62	< 62	< 62	< 62	< 62	
W HE	< 120	< 120	< 120	< 120	69	< 1200	< 62	< 62	< 62	< 62	< 62	
M LE	< 100	< 100	< 100	< 100	< 50	< 1000	< 50	< 50	< 50	< 50	< 50	
M MA	< 250	< 250	< 250	< 250	120	< 2500	< 120	< 120	< 120	< 120	< 120	
C RE	< 600	< 600	< 600	< 600	< 300	< 6000	< 300	< 300	< 300	< 300	< 300	

Parameter	1,2-DCA	MEK	1,1,1-TCA	CCl4	v-acetate	CHBrCl2	1,2-DCPA	1,3-DCPE	TCE	CHBr2Cl	1,1,2-TCA
LAB SITE											
M CL	< 50	< 1000	< 50	< 50	< 500	< 50	< 50	< 50	410	< 50	< 50
W DE	< 60	< 1200	380	< 60	< 600	< 60	< 60	< 60	< 60	< 60	< 60
W EL	< 62	< 1200	750	< 62	< 620	< 62	< 62	< 62	< 62	< 62	< 62
W HE	< 62	< 1200	480	< 62	< 620	< 62	< 62	< 62	< 62	< 62	< 62
M LE	< 50	< 1000	300	< 50	< 500	< 50	< 50	< 50	61	< 50	< 50
M MA	< 120	< 2500	< 120	< 120	< 1200	< 120	< 120	< 120	< 120	< 120	< 120
C RE	< 300	< 6000	2300	< 300	< 3000	< 300	< 300	< 300	< 300	< 300	< 300

Parameter	benzene	2-CVE	1,3-DCPE	CHBr3	Mo-2-pon	2-hex'one	PCE	1,1,2,2-PCA	toluene	Cl-benz	eth-benz
LAB SITE											
M CL	< 50	< 100	< 50	< 50	< 500	< 500	96	< 50	180	< 50	67
W DE	< 60	< 120	< 60	< 60	< 600	< 600	720	< 60	480	< 60	320
W EL	< 62	< 120	< 62	< 62	< 620	< 620	930	< 62	540	< 62	310
W HE	< 62	< 120	< 62	< 62	< 620	< 620	1900	< 62	340	< 62	390
M LE	< 50	< 100	< 50	< 50	< 500	< 500	140	< 50	290	< 50	150
M MA	< 120	< 250	< 120	< 120	< 1200	< 1200	< 120	< 120	420	< 120	140
C RE	< 300	< 600	< 300	< 300	< 3000	< 3000	1500	< 300	1500	< 300	580

Parts Washer Solvent Wastes

Volatile Organics (EPA 8240) Analysis, ppm

Parameter	styrene	xylenes	1,2-DCIB	1,3-DCIB	1,4-DCIB
LAB SITE					
M CL	< 50	660	< 100	< 100	< 100
W DE	< 60	4100	790	290	< 60
W EL	< 62	2500	< 62	< 62	< 62
W HE	90	3400	340	< 62	90
M LE	< 50	1300	140	< 100	< 100
M MA	< 120	920	< 250	< 250	< 250
C RE	17000	3900	1900	380	1500

Parts Washer Solvent Wastes
TCLP Organics And EPA 8240/8270 Analyses, ppm

Parameter	cresol	2,4-DNT	Cl6-benz	Cl6-13-but	Cl6-eth	nitrobenz	Cl5-phenol	pyridine	2,4,5-TCP	2,4,6-TCP
Reg. Limit	200	0.13	0.13	0.5	3	2	100	5	400	2
LAB SITE ANALYSIS										
M CL TCLP	9	< 0.033	< 0.033	< 0.033	< 0.033	< 0.033	< 0.17	< 0.17	< 0.033	< 0.033
M CL 8240/8270	< 1	< 1	< 1	< 1	< 1	< 1	< 5	na	< 1	< 1
W DE TCLP	3	< 0.033	< 0.033	< 0.033	< 0.033	< 0.033	< 0.17	< 0.17	< 0.033	< 0.033
W DE 8240/8270	280	< 100	< 100	< 100	< 100	< 100	< 500	na	< 100	< 100
W EL TCLP	6.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 5.0	< 5.0	< 1.0	< 1.0
W EL 8240/8270	< 1200	< 1200	< 1200	< 1200	< 1200	< 1200	< 6200	na	< 1200	< 1200
W HE TCLP	< 0.33	< 0.33	< 0.33	< 0.33	< 0.33	< 0.33	< 1.6	< 1.6	< 0.33	< 0.33
W HE 8240/8270	< 1200	< 1200	< 1200	< 1200	< 1200	< 1200	< 6200	na	< 1200	< 1200
M LE TCLP	< 0.033	< 0.033	< 0.033	< 0.033	< 0.033	< 0.033	< 0.17	< 0.17	< 0.033	< 0.033
M LE 8240/8270	< 50	< 50	< 50	< 50	< 50	< 50	< 250	na	< 50	< 50
M MA TCLP	< 0.67	4.4	< 0.67	< 0.67	< 0.67	< 0.67	< 3.3	< 3.3	< 0.67	< 0.67
M MA 8240/8270	< 100	< 100	< 100	< 100	< 100	< 100	< 500	na	< 100	< 100
C RE TCLP	0.21	< 0.033	< 0.033	< 0.033	< 0.033	< 0.033	< 0.17	< 0.17	< 0.033	< 0.033
C RE 8240/8270	< 100	< 100	< 100	< 100	< 100	< 100	< 500	na	< 100	< 100

Parameter	benzene	CCl4	Clbenz	CHCl3	1,4-DCIB	1,2-DCA	1,1-DCE	MEK	PCE	TCE	VChloride
Reg. Limit	0.5	0.5	100	6	7.5	0.5	0.7	200	0.7	0.5	0.2
LAB SITE ANALYSIS											
M CL TCLP	0	< 0.10	< 0.10	< 0.10	< 0.20	< 0.10	< 0.10	< 2.0	0.61	< 0.10	< 0.20
M CL 8240/8270	< 50	< 50	< 50	< 50	< 100	< 50	< 50	< 1000	96	410	< 100
W DE TCLP	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 2.0	0.16	< 0.10	< 0.20
W DE 8240/8270	< 60	< 60	< 60	< 60	< 60	< 60	< 60	< 1200	720	< 60	< 120
W EL TCLP	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	3.9	2.8	< 0.10	< 0.20
W EL 8240/8270	< 62	< 62	< 62	< 62	< 62	< 62	< 62	< 1200	930	< 62	< 120
W HE TCLP	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 2.0	< 0.10	0.49	< 0.20
W HE 8240/8270	< 62	< 62	< 62	< 62	90	< 62	< 62	< 1200	1900	< 62	< 120
M LE TCLP	< 0.10	< 0.10	< 0.10	< 0.10	< 0.20	< 0.10	< 0.10	< 2.0	0.58	< 0.10	< 0.20
M LE 8240/8270	< 50	< 50	< 50	< 50	< 100	< 50	< 50	< 1000	140	61	< 100
M MA TCLP	0.15	< 0.10	< 0.10	0.41	< 0.20	< 0.10	< 0.10	< 2.0	0.15	< 0.10	< 0.20
M MA 8240/8270	< 120	< 120	< 120	< 120	< 250	< 120	< 120	< 2500	< 120	< 120	< 250
C RE TCLP	0.12	< 0.05	< 0.05	< 0.05	0.38	< 0.05	< 0.05	1.3	0.27	< 0.05	< 0.1
C RE 8240/8270	< 300	< 300	< 300	< 300	1500	< 300	< 300	< 6000	1500	< 300	< 600

REVISED: JUNE 26, 1992

Parts Washer Solvent Wastes

Physical Properties and TCLP Analysis, ppm

<i>Parameter</i>	<i>Reg. Limit</i>	<i># Samp</i>	<i>Avg</i>	<i>Min</i>	<i>Max</i>
pH	<2 or >10	7	6.6	5.5	8.0
SG	na	7	0.79	0.78	0.80
FP	< 100	7	112	78	151
As	5	7	0.00	0.00	0.00
Ba	100	7	0.47	0.00	1.20
Cd	1	7	0.05	0.00	0.07
Cr	5	7	0.00	0.00	0.02
Pb	5	7	0.90	0.47	1.60
Hg	0.2	7	0.00	0.00	0.00
Se	1	7	0.00	0.00	0.00
Ag	5	7	0.00	0.00	0.00
cresol	200	7	2.70	0.00	9.00
2,4-DNT	0.13	7	0.63	0.00	4.40
Cl6-benz	0.13	7	0.00	0.00	0.00
Cl6-13-but	0.5	7	0.00	0.00	0.00
Cl6-eth	3	7	0.00	0.00	0.00
nitrobenz	2	7	0.00	0.00	0.00
Cl5-phenol	100	7	0.00	0.00	0.00
pyridine	5	7	0.00	0.00	0.00
2,4,5-TCP	400	7	0.00	0.00	0.00
2,4,6-TCP	2	7	0.00	0.00	0.00
benzene	0.5	7	0.04	0.00	0.15
CCl4	0.5	7	0.00	0.00	0.00
Clbenz	100	7	0.00	0.00	0.00
CHCl3	6	7	0.06	0.00	0.41
1,4-DCIB	7.5	7	0.05	0.00	0.38
1,2-DCA	0.5	7	0.00	0.00	0.00
1,1-DCE	0.7	7	0.00	0.00	0.00
MEK	200	7	0.74	0.00	3.90
PCE	0.7	7	0.65	0.00	2.80
TCE	0.5	7	0.07	0.00	0.49
VChloride	0.2	7	0.00	0.00	0.00

Less than values are treated as zeros in the statistical analysis
 Greater than values are treated as the value in the statistical analysis

Parts Washer Solvent Wastes

Physical Properties and TCLP Metals Analysis, ppm

Parameter		pH	SG	FP	As	Ba	Cd	Cr	Pb	Hg	Se	Ag
Reg. Limit		<2 or >10	na	< 100	5	100	1	5	5	0.2	1	5
LAB SITE												
M	CL	6.5	0.79	125	< 0.5	0.51	0.041	< 0.01	0.47	< 0.001	< 0.2	< 0.01
W	DE	6.5	0.799	110	< 0.05	0.6	< 0.05	< 0.05	1.3	< 0.01	< 0.05	< 0.05
W	EL	7	0.777	151	< 0.05	0.6	0.06	< 0.05	0.5	< 0.01	< 0.05	< 0.05
W	HE	6.5	0.775	95	< 0.05	1.2	0.07	< 0.05	1.2	< 0.01	< 0.05	< 0.05
M	LE	6	0.78	115	< 0.5	0.27	0.055	< 0.01	0.74	0.002	< 0.2	< 0.01
M	MA	6.5	0.8	110	< 0.5	< 1.0	0.059	0.017	1.6	0.0018	< 0.2	< 0.01
C	RE	8	0.79	78	< 1	0.09	0.05	< 0.02	0.5	< 0.002	< 1	< 0.05

TCLP Semi Volatiles Analysis, ppm

Parameter		cresol	2,4-DNT	Cl6-benz	Cl6-13-but	Cl6-eth	nitrobenz	Cl5-phenol	pyridine	2,4,5-TCP	2,4,6-TCP
Reg. Limit		200	0.13	0.13	0.5	3	2	100	5	400	2
LAB SITE											
M	CL	9	< 0.033	< 0.033	< 0.033	< 0.033	< 0.033	< 0.17	< 0.17	< 0.033	< 0.033
W	DE	3	< 0.033	< 0.033	< 0.033	< 0.033	< 0.033	< 0.17	< 0.17	< 0.033	< 0.033
W	EL	6.7	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 5.0	< 5.0	< 1.0	< 1.0
W	HE	< 0.33	< 0.33	< 0.33	< 0.33	< 0.33	< 0.33	< 1.6	< 1.6	< 0.33	< 0.33
M	LE	< 0.033	< 0.033	< 0.033	< 0.033	< 0.033	< 0.033	< 0.17	< 0.17	< 0.033	< 0.033
M	MA	< 0.67	4.4	< 0.67	< 0.67	< 0.67	< 0.67	< 3.3	< 3.3	< 0.67	< 0.67
C	RE	0.21	< 0.033	< 0.033	< 0.033	< 0.033	< 0.033	< 0.17	< 0.17	< 0.033	< 0.033

TCLP Volatiles Analysis, ppm

Parameter		benzene	CCM	Clbenz	CHCl3	1,4-DCIB	1,2-DCA	1,1-DCE	MEK	PCE	TCE	VChloride
Reg. Limit		0.5	0.5	100	6	7.5	0.5	0.7	200	0.7	0.5	0.2
LAB SITE												
M	CL	< 0.10	< 0.10	< 0.10	< 0.10	< 0.20	< 0.10	< 0.10	< 2.0	0.61	< 0.10	< 0.20
W	DE	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 2.0	0.16	< 0.10	< 0.20
W	EL	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	3.9	2.8	< 0.10	< 0.20
W	HE	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 2.0	< 0.10	0.49	< 0.20
M	LE	< 0.10	< 0.10	< 0.10	< 0.10	< 0.20	< 0.10	< 0.10	< 2.0	0.58	< 0.10	< 0.20
M	MA	0.15	< 0.10	< 0.10	0.41	< 0.20	< 0.10	< 0.10	< 2.0	0.15	< 0.10	< 0.20
C	RE	0.12	< 0.05	< 0.05	< 0.05	0.38	< 0.05	< 0.05	1.3	0.27	< 0.05	< 0.1

**TCLP
ANALYSES OF SPENT IMMERSION CLEANER
- NEW FORMULA**

REVISED: JUNE 26, 1992

NEW IMMERSION CLEANER FORMULA
TCLP ANALYSES



TEI ANALYTICAL, INC.

7177 NORTH AUSTIN • NILES, ILLINOIS • 60648 • 708/647-1345

August 7, 1990

LABORATORY REPORT

5075

CORRECTED REPORT

Page 1 of 2 pages

Safety-Kleen Corporation
O'Hare Technical Center
P.O. Box 29050
Elk Grove Village, IL 60007

P.O. # 76856

Attn: John Dingess/Dennis Brinkman

SAMPLE

RECEIVED: 05-30-90 1200

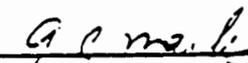
TEI NO. 74777

SAMPLE IDENTIFICATION: 188-31-1

<u>TEST</u>	<u>RESULT</u>	<u>DATE PERFORMED</u>
TCLP		06-05-90
Arsenic	LT 1 mg/1	06-07-90
Barium	3 mg/1	06-21-90
Cadmium	10 mg/1	06-21-90
Chromium	3 mg/1	06-21-90
Lead	42 mg/1	06-21-90
Mercury	LT 0.05 mg/1	06-12-90
Selenium	LT 1 mg/1	06-12-90
Silver	3 mg/1	06-21-90
Volatiles	See attached	06-12-90
Acid Extractables	See attached	06-13-90
Base Neutrals	See attached	06-13-90

LT = Less Than

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Gayle E. Marks, Ph.D.



TEI ANALYTICAL, INC.

7177 NORTH AUSTIN • NILES, ILLINOIS • 60648 • 708/647-1345

REVISED: JUNE 26, 1992

NEW IMMERSION CLEANER FORMULA
TCLP ANALYSES

August 7, 1990

LABORATORY REPORT CORRECTED REPORT

5075

Page 2 of 2 pages

Safety-Kleen Corporation

TCLP Volatiles, Base/Neutrals, Acid Extractables

All results expressed as ppm unless otherwise indicated.

LT = Less Than

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TEI-74777
188-31-1

Benzene	LT 1
Carbon Tetrachloride	LT 1
Chlorobenzene	220
Chloroform	LT 1
o Cresol	LT 50
m Cresol	LT 50
p Cresol	LT 50
Cresol	LT 50
1,4 Dichlorobenzene	1500.
1,2 Dichloroethane	LT 1
1,1 Dichloroethylene	LT 1
2,4 Dinitrotolene	LT 10
Hexachlorobenzene	LT 0.1
Hexachlorobutadiene	LT 10
Hexachloroethane	LT 10
Methyl Ethyl Ketone	LT 10
Nitrobenzene	LT 10
Pentachlorophenol	LT 10
Pyridine	LT 10
Tetrachloroethylene	320
Trichloroethylene	1.5
2,4,5 Trichlorophenol	LT 10
2,4,6 Trichlorophenol	LT 10
Vinyl Chloride	LT 1

Gayle E. Marks
Gayle E. Marks, Ph.D.

**TCLP
ANALYSES OF SPENT IMMERSION CLEANER
- OLD FORMULA**

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Immersion Cleaner Wastes

Physical Properties and TCLP Analysis, ppm

<i>Parameter</i>	<i>Reg. Limit</i>	<i># Samp</i>	<i>Avg</i>	<i>Min</i>	<i>Max</i>
pH	<2 or >10	4	9.3	8.0	10.2
SG	na	4	1.05	0.93	1.20
FP	< 100	4	125	85	185
As	5	4	0.00	0.00	0.00
Ba	100	4	0.29	0.00	0.70
Cd	1	4	0.91	0.32	2.30
Cr	5	4	0.28	0.06	0.51
Pb	5	4	3.60	0.20	11.00
Hg	0.2	4	0.00	0.00	0.00
Se	1	4	0.00	0.00	0.00
Ag	5	4	0.00	0.00	0.00
cresol	200	3	400.00	0.00	1200.00
2,4-DNT	0.13	3	0.00	0.00	0.00
C16-benz	0.13	3	0.00	0.00	0.00
C16-13-but	0.5	3	0.00	0.00	0.00
C16-eth	3	3	0.00	0.00	0.00
nitrobenz	2	3	0.00	0.00	0.00
C15-phenol	100	3	0.00	0.00	0.00
pyridine	5	3	0.00	0.00	0.00
2,4,5-TCP	400	3	0.00	0.00	0.00
2,4,6-TCP	2	3	0.00	0.00	0.00
benzene	0.5	4	0.04	0.00	0.16
CCl4	0.5	4	0.63	0.00	2.50
C1benz	100	4	4.39	0.00	13.00
CHCl3	6	4	0.14	0.00	0.56
1,4-DCIB	7.5	4	13.75	1.60	32.00
1,2-DCA	0.5	4	1.43	0.00	3.60
1,1-DCE	0.7	4	0.03	0.00	0.11
MEK	200	4	4.85	0.00	15.00
PCE	0.7	4	1.97	0.00	4.40
TCE	0.5	4	1.38	0.00	4.40
VChloride	0.2	4	0.00	0.00	0.00

Less than values are treated as zeros in the statistical analysis

Greater than values are treated as the value in the statistical analysis

Immersion Cleaner Wastes

Volatile Organics (EPA 8240) Analysis, ppm

Parameter	CH ₃ Cl	CH ₃ Br	C ₂ H ₃ Cl	C ₂ H ₅ Cl	CH ₂ Cl ₂	acetone	CS ₂	1,1-DCE	1,1-DCA	1,2-DCE	CHCl ₃	
LAB SITE												
M CL	< 5000	< 5000	< 5000	< 5000	350000	< 50000	< 2500	< 2500	< 2500	< 2500	2700	
W DE	< 8400	< 8400	< 8400	< 8400	162000	< 84000	< 4200	< 4200	< 4200	< 4200	< 4200	
W EL	< 1100	< 1100	< 1100	< 1100	< 530	< 11000	< 530	< 530	< 530	< 530	< 530	
C RE	< 120	< 120	< 120	< 120	2200	< 1200	< 60	< 60	< 60	< 60	< 60	

Parameter	1,2-DCA	MEK	1,1,1-TCA	CCl ₄	v-acetate	CHBrCl ₂	1,2-DCPA	1,3-DCPE	TCE	CHBr ₂ Cl	1,1,2-TCA	
LAB SITE												
M CL	< 2500	< 50000	< 2500	< 2500	< 25000	< 2500	< 2500	< 2500	< 2500	< 2500	< 2500	
W DE	< 4200	< 84000	< 4200	< 4200	< 42000	< 4200	< 4200	< 4200	< 4200	< 4200	< 4200	
W EL	< 530	< 11000	< 530	< 530	< 5300	< 530	< 530	< 530	< 530	< 530	< 530	
C RE	< 60	< 1200	< 60	< 60	< 600	< 60	< 60	< 60	< 60	< 60	< 60	

Parameter	benzene	2-CVE	1,3-DCPE	CHBr ₃	Me-2-pen	2-hex'one	PCE	1,1,2,2-TCA	toluene	Cl-benz	eth-benz	
LAB SITE												
M CL	< 2500	< 5000	< 2500	< 2500	< 25000	< 25000	3600	< 2500	< 2500	5800	< 2500	
W DE	< 4200	< 8400	< 4200	< 4200	< 42000	< 42000	< 4200	< 4200	< 4200	63000	< 4200	
W EL	< 530	< 1100	< 530	< 530	< 5300	< 5300	< 530	< 530	< 530	< 530	< 530	
C RE	< 60	< 120	< 60	< 60	< 600	< 600	480	< 60	190	< 60	89	

Parameter	styrene	xylenes	1,2-DCIB	1,3-DCIB	1,4-DCIB
LAB SITE					
M CL	< 2500	< 2500	< 5000	12000	24000
W DE	< 4200	< 4200	161000	21000	43000
W EL	< 530	< 530	2000	< 530	600
C RE	210	590	590	170	270

Immersion Cleaner Wastes

Semivolatile Organics (EPA 8270) Analysis, ppm

Parameter	phenol	b-2Cl-ethr	2Cl-phenol	1,3-DCIB	1,4-DCIB	benzyl'ol	1,2-DCIB	2Me-pheno	b-2Cl-IPE	4Me-pheno	N-nitroso	
LAB SITE												
M	CL	55	< 10	< 10	26	58	< 20	180	49	< 10	32	< 10
W	DE	3800	< 1000	< 1000	< 1000	< 1000	< 1000	1600	1400	< 1000	1900	< 1000
W	EL	< 1100	< 1100	< 1100	< 1100	< 1100	< 2100	1200	< 1100	< 1100	< 1100	< 1100
C	RE	< 100	< 100	< 100	100	330	180	< 100	< 100	< 100	< 100	< 100

Parameter	C2Cl6	nitrobenz	isophorone	2nitroph'ol	2,4Meph'ol	benz acid	b-2Cléthox	2,4-dClph	1,2,4-TCIB	Naph'ene	4-Claniline
LAB SITE											
M	CL	< 10	< 10	< 10	< 10	< 10	< 50	< 10	< 10	< 10	< 20
W	DE	< 1000	< 1000	< 1000	< 1000	< 1000	< 5000	< 1000	< 1000	< 1000	< 1000
W	EL	< 1100	< 1100	< 1100	< 1100	< 1100	< 5300	< 1100	< 1100	< 1100	< 2100
C	RE	< 100	< 100	< 100	< 100	< 100	< 500	< 100	< 100	< 100	< 100

Parameter	Cl6butadien	4Cl3Mephnl	2-Menaph	Cl6cycpent	2,4,6Clph	2,4,5Clph	2-Clinaph	2-nitroanil	Me2phthal	acenaphthy	2,6-DNT
LAB SITE											
M	CL	< 10	< 20	< 10	< 10	< 10	< 10	< 50	< 10	< 10	< 10
W	DE	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 5000	< 1000	< 1000	< 1000
W	EL	< 1100	< 2100	< 1100	< 1100	< 1100	< 1100	< 5300	< 1100	< 1100	< 1100
C	RE	< 100	< 100	1300	< 100	< 100	< 500	< 100	< 500	< 100	< 100

Parameter	3-nitroanil	acenaphthe	2,4dnitrophe	4nitrophenol	dibenluran	2,4-DNT	delhphthal	4Clphenphe	fluorene	4-nitroanil	4,6dn2Mep
LAB SITE											
M	CL	< 50	< 10	< 50	< 50	< 10	< 10	< 10	< 10	< 50	< 50
W	DE	< 5000	< 1000	< 5000	< 5000	< 1000	< 1000	< 1000	< 1000	< 5000	< 5000
W	EL	< 5300	< 1100	< 5300	< 5300	< 1100	< 1100	< 1100	< 1100	< 5300	< 5300
C	RE	< 500	< 100	< 500	< 500	< 100	< 100	< 100	< 100	< 500	< 500

Immersion Cleaner Wastes

Semivolatile Organics (EPA 8270) Analysis, ppm

Parameter	N-nitroso	4Brphenph	Cl6benzene	Cl5phenol	phenanthre	anthracene	d-n-butylph	fluoranthen	pyrene	bulbenphth	3,3'Cl2benz	
LAB SITE												
M	CL	< 10	< 10	< 10	< 50	< 10	< 10	< 10	< 10	< 10	< 20	
W	DE	< 1000	< 1000	< 1000	< 5000	< 1000	< 1000	< 1000	< 1000	< 1000	< 2000	
W	EL	< 1100	< 1100	< 1100	< 5300	< 1100	< 1100	< 1100	< 1100	< 1100	< 2100	
C	RE	< 100	< 100	< 100	< 500	< 100	< 100	< 100	< 100	< 100	< 200	

Parameter	ben[a]anthr	chrysene	b2ethhexph	d-n-octylph	ben[b]fluor	ben[k]fluor	ben[a]pyren	Ind[123-cd]	dben[a,h]an	ben[ghi]per
LAB SITE										
M	CL	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10	< 10
W	DE	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000
W	EL	< 1100	< 1100	< 1100	< 1100	< 1100	< 1100	< 1100	< 1100	< 1100
C	RE	< 100	< 100	< 100	< 100	< 100	< 100	< 100	< 100	< 100

Immersion Cleaner Wastes

Physical Properties and TCLP Metals Analysis, ppm

Parameter		pH	SG	FP	As	Ba	Cd	Cr	Pb	Hg	Se	Ag
Reg. Limit		<2 or >10	na	< 100	5	100	1	5	5	0.2	1	5
LAB SITE												
M	CL	8	1.2	95	< 0.5	0.44	2.3	0.51	11	0.001	< 0.2	< 0.01
W	DE	9	1.11	85	< 0.05	0.7	0.4	0.48	2	< 0.01	< 0.05	< 0.05
W	EL	10	0.945	185	< 0.05	< 0.3	0.32	0.06	1.2	< 0.01	< 0.05	< 0.05
C	RE	10.2	0.93	135	< 1	< 0.02	0.64	0.07	0.2	< 0.002	< 1	< 0.5

TCLP Semi Volatiles Analysis, ppm

Parameter		cresol	2,4-DNT	Cl6-benz	Cl6-13-but	Cl6-eth	nitrobenz	Cl5-phenol	pyridine	2,4,5-TCP	2,4,6-TCP
Reg. Limit		200	0.13	0.13	0.5	3	2	100	5	400	2
LAB SITE											
M	CL	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 1.0	< 5.0	< 5.0	< 1.0	< 1.0
W	DE	1200	< 0.33	< 0.33	< 0.33	< 0.33	< 0.33	< 1.7	< 1.7	< 0.33	< 0.33
W	EL	matrix	matrix	matrix	matrix	matrix	matrix	matrix	matrix	matrix	matrix
C	RE	< 0.33	< 0.33	< 0.33	< 0.33	< 0.33	< 0.33	< 1.7	< 1.7	< 0.33	< 0.33

TCLP Volatiles Analysis, ppm

Parameter		benzene	CCl4	Clbenz	ClCl3	1,4-DCIB	1,2-DCA	1,1-DCE	MEK	PCE	TCE	VChloride
Reg. Limit		0.5	0.5	100	6	7.5	0.5	0.7	200	0.7	0.5	0.2
LAB SITE												
M	CL	0.16	2.5	> 4.4	0.56	> 4.4	3.6	< 0.10	> 4.4	> 4.4	> 4.4	< 0.20
W	DE	< 0.10	< 0.10	13	< 0.10	17	2.1	0.11	15	0.68	1.1	< 0.20
W	EL	< 5	< 5	< 5	< 5	32	< 5	< 5	< 100	< 5	< 5	< 10
C	RE	< 0.05	< 0.05	0.14	< 0.05	1.6	< 0.05	< 0.05	< 1	2.8	< 0.05	< 0.1

**TCLP
ANALYSES OF DRY CLEANER
STILL BOTTOMS**

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Dumpster Mud Wastes

Physical Properties and TCLP Analysis, ppm

<i>Parameter</i>	<i>Reg. Limit</i>	<i># Samp</i>	<i>Avg</i>	<i>Min</i>	<i>Max</i>
pH	<2 or >10	6	7.8	6.5	10.0
SG	na	1	1.2	1.2	1.2
FP	< 100	6	107	80	160
As	5	6	0	0	0
Ba	100	6	0.65	0.28	1.00
Cd	1	6	1.46	0.80	2.80
Cr	5	6	0.04	0.00	0.16
Pb	5	6	98.03	1.30	570.00
Hg	0.2	6	0.00	0.00	0.00
Se	1	6	0.00	0.00	0.00
Ag	5	6	0.00	0.00	0.00
cresol	200	6	22.31	0.00	96.00
2,4-DNT	0.13	6	0.00	0.00	0.00
C16-benz	0.13	6	0.00	0.00	0.00
C16-13-but	0.5	6	0.00	0.00	0.00
C16-eth	3	6	0.00	0.00	0.00
nitrobenz	2	6	0.00	0.00	0.00
C15-phenol	100	6	0.00	0.00	0.00
pyridine	5	6	0.00	0.00	0.00
2,4,5-TCP	400	6	0.00	0.00	0.00
2,4,6-TCP	2	6	0.00	0.00	0.00
benzene	0.5	6	0.12	0.00	0.52
CCl4	0.5	6	0.03	0.00	0.17
C1benz	100	6	0.72	0.00	4.30
CHCl3	6	6	0.00	0.00	0.00
1,4-DCIB	7.5	6	0.82	0.00	4.40
1,2-DCA	0.5	6	0.00	0.00	0.00
1,1-DCE	0.7	6	0.00	0.00	0.00
MEK	200	6	2.50	0.00	15.00
PCE	0.7	6	0.92	0.00	3.60
TCE	0.5	6	0.10	0.00	0.45
VChloride	0.2	6	0.00	0.00	0.00

Less than values are treated as zeros in the statistical analysis

Greater than values are treated as the value in the statistical analysis

Dumpster Mud Wastes

Volatile Organics (EPA 8240) Analysis, ppm

Parameter	CHCl3	CH2Br	C2H3Cl	C2H5Cl	CH2Cl2	acetone	CS2	1,1-DCE	1,1-DCA	1,2-DCE	CHCl3	
LAB SITE												
M CL	< 100	< 100	< 100	< 100	< 50	< 1000	< 50	< 50	< 50	< 50	< 50	29
W DE	< 10	< 10	< 10	< 10	< 5.0	< 100	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
W EL	< 110	< 110	< 110	< 110	< 55	< 1100	< 55	< 55	< 55	< 55	< 55	< 55
M LE	< 330	< 330	< 330	< 330	610	< 3300	< 170	< 170	< 170	< 170	< 170	< 170
C RE	< 1000	< 1000	< 1000	< 1000	< 500	< 10000	< 500	< 500	< 500	< 500	< 500	< 500

Parameter	1,2-DCA	MEK	1,1,1-TCA	CCl4	v-acetate	CHBrCl2	1,2-DCPA	1,3-DCPE	TCE	CHBr2Cl	1,1,2-TCA
LAB SITE											
M CL	< 50	< 1000	48	< 50	< 500	< 50	< 50	< 50	< 50	< 50	< 50
W DE	< 5.0	< 100	11	< 5.0	< 50	< 5.0	< 5.0	< 5.0	6.4	< 5.0	< 5.0
W EL	< 55	< 1100	750	< 55	< 550	< 55	< 55	< 55	< 55	< 55	< 55
M LE	< 170	< 3300	1500	< 170	< 1700	< 170	< 170	< 170	< 170	< 170	< 170
C RE	< 500	< 10000	2300	< 500	< 2500	< 500	< 500	< 500	< 500	< 500	< 500

Parameter	benzene	2-CVE	1,3-DCPE	CHBr3	Me-2-pen	2-hex'one	PCE	1,1,2,2-PCA	toluene	Cl-benz	eth-benz
LAB SITE											
M CL	< 50	< 100	< 50	< 50	< 500	< 500	230	< 50	440	< 50	150
W DE	52	< 100	< 5.0	< 5.0	< 50	< 50	84	< 5.0	550	< 5.0	270
W EL	< 55	< 1100	< 55	< 55	< 550	< 550	740	< 55	500	430	1700
M LE	< 170	< 330	< 170	< 170	< 1700	< 1700	260	< 170	530	< 170	200
C RE	< 500	< 1000	< 500	< 500	< 5000	< 5000	1000	< 500	4600	< 500	1800

Parameter	styrene	xylenes	1,2-DCIB	1,3-DCIB	1,4-DCIB
LAB SITE					
M CL	< 50	1200	< 100	< 100	< 100
W DE	< 5.0	13000	< 5.0	47	< 5.0
W EL	< 55	1200	250	< 55	100
M LE	< 170	1400	< 170	< 170	< 170
C RE	< 500	8700	< 500	< 500	< 500

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Dumpster Mud Wastes

Volatile Organics (EPA 8240) Analysis, ppm

Parameter	CH3Cl	CH3Br	C2H3Cl	C2H5Cl	CH2Cl2	acetone	CS2	1,1-DCE	1,1-DCA	1,2-DCE	CHCl3	
LAB SITE												
M CL	< 100	< 100	< 100	< 100	< 50	< 1000	< 50	< 50	< 50	< 50	< 50	29
W DE	< 10	< 10	< 10	< 10	< 5.0	< 100	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
W EL	< 110	< 110	< 110	< 110	< 55	< 1100	< 55	< 55	< 55	< 55	< 55	< 55
M LE	< 330	< 330	< 330	< 330	610	< 3300	< 170	< 170	< 170	< 170	< 170	< 170
C RE	< 1000	< 1000	< 1000	< 1000	< 500	< 10000	< 500	< 500	< 500	< 500	< 500	< 500

Parameter	1,2-DCA	MEK	1,1,1-TCA	CCl4	v-acetate	CHBrCl2	1,2-DClPA	1,3-DClPE	TCE	CHBr2Cl	1,1,2-TCA
LAB SITE											
M CL	< 50	< 1000	48	< 50	< 500	< 50	< 50	< 50	< 50	< 50	< 50
W DE	< 5.0	< 100	11	< 5.0	< 50	< 5.0	< 5.0	< 5.0	6.4	< 5.0	< 5.0
W EL	< 55	< 1100	750	< 55	< 550	< 55	< 55	< 55	< 55	< 55	< 55
M LE	< 170	< 3300	1500	< 170	< 1700	< 170	< 170	< 170	< 170	< 170	< 170
C RE	< 500	< 10000	2300	< 500	< 2500	< 500	< 500	< 500	< 500	< 500	< 500

Parameter	benzene	2-CVE	1,3-DCPE	CHBr3	Me-2-pen	2-hex'one	PCE	1,1,2,2'CA	toluene	Cl-benz	eth-benz
LAB SITE											
M CL	< 50	< 100	< 50	< 50	< 500	< 500	230	< 50	440	< 50	150
W DE	52	< 10	< 5.0	< 5.0	< 50	< 50	84	< 5.0	550	< 5.0	270
W EL	< 55	< 110	< 55	< 55	< 550	< 550	740	< 55	500	430	1700
M LE	< 170	< 330	< 170	< 170	< 1700	< 1700	260	< 170	530	< 170	200
C RE	< 500	< 1000	< 500	< 500	< 5000	< 5000	1000	< 500	4600	< 500	1800

Parameter	styrene	xylenes	1,2-DCIB	1,3-DCIB	1,4-DCIB
LAB SITE					
M CL	< 50	1200	< 100	< 100	< 100
W DE	< 5.0	13000	< 5.0	47	< 5.0
W EL	< 55	1200	250	< 55	100
M LE	< 170	1400	< 170	< 170	< 170
C RE	< 500	8700	< 500	< 500	< 500

Dumpster Mud Wastes

Semivolatile Organics (EPA 8270) Analysis, ppm

Parameter	phenol	b-2Cl-ethr	2Cl-phenol	1,3-DCIB	1,4-DCIB	benzyl'ol	1,2-DCIB	2Me-pheno	b-2Cl-IP'E	4Me-pheno	N-nitroso
LAB SITE											
M CL	< 2200	< 2200	< 2200	< 2200	< 2200	< 4400	< 2200	< 2200	< 2200	< 2200	< 2200
W DE	< 3.0	< 3.0	< 3.0	< 3.0	< 3.0	< 3.0	< 3.0	25	< 3.0	< 3.0	< 3.0
W EL	< 1100	< 1100	< 1100	< 1100	< 1100	< 2100	< 1100	< 1100	< 1100	< 1100	< 1100
M LE	230	< 63	< 63	< 63	200	< 130	450	420	< 63	350	< 63
C PE	< 100	< 100	< 100	< 100	< 100	< 100	< 100	< 100	< 100	< 100	< 100
M CL	< 2500	< 2500	< 2500	99000	220000	< 5100	610000	< 2500	< 2500	< 2500	< 2500

Parameter	C2Cl6	nitrobenz	isophorone	2nitrophenol	2,4-Meph'ol	benz acid	b-2Clcethox	2,4-dClph	1,2,4-TCIB	Naph'ene	4-Claniline
LAB SITE											
M CL	< 2200	< 2200	< 2200	< 2200	< 2200	< 11000	< 2200	< 2200	< 2200	< 2200	< 4400
W DE	< 3.0	< 3.0	< 3.0	< 3.0	< 3.0	< 15	< 3.0	< 3.0	< 3.0	180	< 3.0
W EL	< 1100	< 1100	< 1100	< 1100	< 1100	< 5300	< 1100	< 1100	< 1100	1200	< 2100
M LE	< 63	< 63	< 63	< 63	< 63	< 310	< 63	< 63	< 63	430	< 130
C PE	< 100	< 100	< 100	< 100	< 100	< 500	< 100	< 100	< 100	1400	< 100
M CL	< 2500	< 2500	< 2500	< 2500	6800	< 12000	< 2500	< 2500	< 2500	< 2500	< 5100

Parameter	Cl6butadien	4Cl3Mephnl	2-Menaph	Cl6cycpent	2,4,6Clph	2,4,5Clph	2-Cl'naph	2-nitroanil	Me2phthal	acenaphthy	2,6-DNT
LAB SITE											
M CL	< 2200	< 4400	< 2200	< 2200	< 2200	< 2200	< 2200	< 11000	< 2200	< 2200	< 2200
W DE	< 3.0	< 3.0	120	< 3.0	< 3.0	< 15	< 3.0	< 15	< 3.0	< 3.0	< 3.0
W EL	< 1100	< 2100	< 1100	< 1100	< 1100	< 1100	< 1100	< 5300	< 1100	< 1100	< 1100
M LE	< 63	< 130	140	< 63	< 63	< 63	< 63	< 310	< 63	< 63	< 63
C PE	< 100	< 100	1900	< 100	< 100	< 500	< 100	< 500	< 100	< 100	< 100
M CL	< 2500	< 5100	< 2500	< 2500	< 2500	< 2500	< 2500	< 12000	< 2500	< 2500	< 2500

Dumpster Mud Wastes

Semivolatile Organics (EPA 8270) Analysis, ppm

Parameter	3-nitroanil	acenaphthe	2,4-dinitrophenol	4-nitrophenol	dibenzofuran	2,4-DNT	diorthophthal	4-chlorophenol	fluorene	4-nitroanil	4,6-dn2Mep
LAB SITE											
M CL	< 11000	< 2200	< 11000	< 11000	< 2200	< 2200	< 2200	< 2200	< 2200	< 11000	< 11000
W DE	< 15	< 3.0	< 15	< 15	< 3.0	< 3.0	< 3.0	< 3.0	< 3.0	< 15	< 15
W EL	< 5300	< 1100	< 5300	< 5300	< 1100	< 1100	< 1100	< 1100	< 1100	< 5300	< 5300
M LE	< 310	< 63	< 310	< 310	< 63	< 63	< 63	< 63	< 63	< 310	< 310
C PE	< 500	< 100	< 500	< 500	< 100	< 100	< 100	< 100	< 100	< 500	< 500
M CL	< 12000	< 2500	< 12000	< 12000	< 2500	< 2500	< 2500	< 2500	< 2500	< 12000	< 12000

Parameter	N-nitroso	4-chlorophenol	1,2,3-trichlorobenzene	1,2,4-trichlorobenzene	phenanthrene	anthracene	d-n-butylphthalate	fluoranthene	pyrene	butylbenzophenone	3,3'-dichlorobenzidine
LAB SITE											
M CL	< 2200	< 2200	< 2200	< 11000	< 2200	< 2200	< 2200	< 2200	< 2200	< 2200	< 4400
W DE	< 3.0	< 3.0	< 3.0	< 15	5.2	< 3.0	20	< 3.0	< 3.0	< 3.0	< 6.0
W EL	< 1100	< 1100	< 1100	< 5300	< 1100	< 1100	< 1100	< 1100	< 1100	< 1100	< 2100
M LE	< 63	< 63	< 63	< 310	< 63	< 63	< 63	< 63	< 63	< 63	< 130
C PE	< 100	< 100	< 100	< 500	< 100	< 100	210	< 100	< 100	920	< 200
M CL	< 2500	< 2500	< 2500	< 12000	< 2500	< 2500	< 2500	< 2500	< 2500	< 2500	< 5100

Parameter	benzo[a]anthracene	chrysene	benz[e]anthracene	d-n-octylphthalate	benzo[b]fluoranthene	benzo[k]fluoranthene	benzo[a]pyrene	indeno[1,2,3-cd]perylene	dibenz[a,h]anthracene	benzo[ghi]perylene
LAB SITE										
M CL	< 2200	< 2200	< 2200	< 2200	< 2200	< 2200	< 2200	< 2200	< 2200	< 2200
W DE	< 3.0	< 3.0	50	< 3.0	< 3.0	< 3.0	< 3.0	< 3.0	< 3.0	< 3.0
W EL	< 1100	< 1100	< 1100	< 1100	< 1100	< 1100	< 1100	< 1100	< 1100	< 1100
M LE	< 63	< 63	110	< 63	< 63	< 63	< 63	< 63	< 63	< 63
C PE	< 100	< 100	1700	100	< 100	< 100	< 100	< 100	< 100	< 100
M CL	< 2500	< 2500	< 2500	< 2500	< 2500	< 2500	< 2500	< 2500	< 2500	< 2500

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Dumpster Mud Wastes

Physical Properties and TCLP Metals Analysis, ppm

Parameter		pH	BQ	FP	As	IIa	Cd	Cr	Pb	Hg	Se	Ag
Reg. Limit		<2 or >10	na	< 100	5	100	1	5	5	0.2	1	5
LAB SITE												
M	CL	10	na	115	< 0.5	0.85	0.8	0.06	2.2	0.002	< 0.2	< 0.01
W	DE	7	na	80	< 0.05	1	0.84	< 0.05	570	< 0.01	< 0.05	< 0.05
W	EL	8	na	115	< 0.05	0.9	1	< 0.05	1.3	< 0.01	< 0.05	< 0.05
M	LE	6.5	na	85	< 0.5	0.47	2	0.01	1.3	< 0.001	< 0.2	< 0.01
C	NE	7.9	1.2	85	< 1	0.41	2.8	0.02	4.6	< 0.002	< 1	< 0.5
M	CL	7.5	na	> 160	< 0.5	0.28	1.3	0.16	8.8	< 0.001	< 0.2	< 0.01

TCLP Semi Volatiles Analysis, ppm

Parameter		cresol	2,4-DNT	Cl6-benz	Cl6-1,3-but	Cl6-eth	nitrobenz	Cl5-phenol	pyridine	2,4,5-TCP	2,4,6-TCP
Reg. Limit		200	0.13	0.13	0.5	3	2	100	5	400	2
LAB SITE											
M	CL	10	< 0.33	< 0.33	< 0.33	< 0.33	< 0.33	< 1.7	< 1.7	< 0.33	< 0.33
W	DE	5	< 0.033	< 0.033	< 0.033	< 0.033	< 0.033	< 0.17	< 0.17	< 0.033	< 0.033
W	EL	96	< 0.091	< 0.091	< 0.091	< 0.091	< 0.091	< 0.46	< 0.46	< 0.091	< 0.091
M	LE	< 0.033	< 0.033	< 0.033	< 0.033	< 0.033	< 0.033	< 0.17	< 0.17	< 0.033	< 0.033
C	NE	0.88	< 0.066	< 0.066	< 0.066	< 0.066	< 0.066	< 0.34	< 0.34	< 0.066	< 0.066
M	CL	22	< 0.67	< 0.67	< 0.67	< 0.67	< 0.67	< 3.3	< 3.3	< 0.67	< 0.67

TCLP Volatiles Analysis, ppm

Parameter		benzene	CCl4	Clbenz	ClClCl3	1,4-DCIU	1,2-DCA	1,1-DCE	MEK	PCE	TCE	VChloride
Reg. Limit		0.5	0.5	100	6	7.5	0.5	0.7	200	0.7	0.5	0.2
LAB SITE												
M	CL	0.11	< 0.10	< 0.10	< 0.10	< 0.20	< 0.10	< 0.10	< 2.0	0.96	< 0.10	< 0.20
W	DE	0.52	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 2.0	< 0.10	< 0.10	< 0.20
W	EL	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 2.0	0.16	< 0.10	< 0.20
M	LE	< 0.10	< 0.10	< 0.10	< 0.10	0.52	< 0.10	< 0.10	< 2.0	0.64	< 0.10	< 0.20
C	NE	0.1	< 0.05	< 0.05	< 0.05	< 0.1	< 0.05	< 0.05	15	0.17	0.14	< 0.1
M	CL	< 0.10	0.17	4.3	< 0.10	> 4.4	< 0.10	< 0.10	< 2.0	3.6	0.45	< 0.20

**TCLP
ANALYSES OF DRY CLEANER
FILTER RESIDUE**

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Dry Cleaner Solvent Wastes

Physical Properties and TCLP Analysis, ppm

<i>Parameter</i>	<i>Reg. Limit</i>	<i># Samp</i>	<i>Avg</i>	<i>Min</i>	<i>Max</i>
pH	<2 or >10	3	7.0	6.0	8.0
SG	na	2	1.14	1.03	1.25
FP	< 100	3	90	80	105
As	5	3	0.00	0.00	0.00
Ba	100	3	0.52	0.37	0.80
Cd	1	3	0.25	0.05	0.45
Cr	5	3	0.18	0.13	0.26
Pb	5	3	1.00	0.20	1.70
Hg	0.2	3	0.00	0.00	0.00
Se	1	3	0.00	0.00	0.00
Ag	5	3	0.00	0.00	0.00
cresol	200	3	0.02	0.00	0.06
2,4-DNT	0.13	3	0.00	0.00	0.00
Cl6-benz	0.13	3	0.00	0.00	0.00
Cl6-13-but	0.5	3	0.00	0.00	0.00
Cl6-eth	3	3	0.00	0.00	0.00
nitrobenz	2	3	0.00	0.00	0.00
Cl5-phenol	100	3	0.00	0.00	0.00
pyridine	5	3	0.00	0.00	0.00
2,4,5-TCP	400	3	0.00	0.00	0.00
2,4,6-TCP	2	3	0.00	0.00	0.00
benzene	0.5	3	0.00	0.00	0.00
CCl4	0.5	3	0.00	0.00	0.00
Clbenz	100	3	0.00	0.00	0.00
CHCl3	6	3	0.00	0.00	0.00
1,4-DCIB	7.5	3	0.00	0.00	0.00
1,2-DCA	0.5	3	0.00	0.00	0.00
1,1-DCE	0.7	3	0.05	0.00	0.14
MEK	200	3	0.00	0.00	0.00
PCE	0.7	3	4.40	4.40	4.40
TCE	0.5	3	0.06	0.00	0.17
VChloride	0.2	3	0.00	0.00	0.00

Less than values are treated as zeros in the statistical analysis

Greater than values are treated as the value in the statistical analysis

Dry Cleaner Solvent Wastes

Volatile Organics (EPA 8240) Analysis, ppm

Parameter	CH3Cl	CH3Br	C2H3Cl	C2H5Cl	CH2Cl2	acetone	CS2	1,1-DCE	1,1-DCA	1,2-DCE	CHCl3
LAB SITE											
W DE	< 10	< 10	< 10	< 10	< 5.0	200	< 5.0	< 5.0	< 5.0	< 5.0	< 5.0
W HE	< 7700	< 7700	< 7700	< 7700	< 3900	< 77000	< 3900	< 3900	< 3900	< 3900	< 3900
M LE	< 300	< 300	< 300	< 300	< 150	< 3000	< 150	< 150	< 150	< 150	< 150

Parameter	1,2-DCA	MEK	1,1,1-TCA	CCl4	v-acetate	CHBrCl2	1,2-DCEPA	1,3-DCPE	TCE	CHBr2Cl	1,1,2-TCA
LAB SITE											
W DE	< 5.0	< 100	18	< 5.0	< 50	< 5.0	< 5.0	< 5.0	6.4	< 5.0	< 5.0
W HE	< 3900	< 3900	< 3900	< 3900	< 39000	< 3900	< 3900	< 3900	< 3900	< 3900	< 3900
M LE	< 150	< 3000	< 150	< 150	< 1500	< 150	< 150	< 150	< 150	< 150	< 150

Parameter	benzene	2-CVE	1,3-DCPE	CHBr3	Me-2-pen	2-hex'one	PCE	1,1,2,2PCA	toluene	Cl-benz	eth-benz
LAB SITE											
W DE	< 5.0	10	< 5.0	< 5.0	< 50	< 50	25000	< 5.0	32	< 5.0	< 5.0
W HE	< 3900	< 3900	< 3900	< 3900	< 39000	< 39000	510000	< 3900	4800	< 3900	< 3900
M LE	< 150	< 300	< 150	< 150	< 1500	< 1500	72000	< 150	< 150	< 150	< 150

Parameter	styrene	xylenes	1,2-DCIB	1,3-DCIB	1,4-DCIB
LAB SITE					
W DE	< 5.0	62	130	36	76
W HE	< 3900	14000	< 3900	< 3900	< 3900
M LE	< 150	< 150	< 150	< 150	< 150

Dry Cleaner Solvent Wastes

Semivolatile Organics (EPA 8270) Analysis, ppm

Parameter	phenol	b-2Cl-ethr	2Cl-phenol	1,3-DCIB	1,4-DCIB	benzyl'ol	1,2-DCIB	2Me-pheno	b-2Cl-IPE	4Me-pheno	N-nitroso	
LAB SITE												
W DE	< 3.0	< 3.0	< 3.0	3.8	3.8	< 3.0	< 3.0	13	< 3.0	15	< 3.0	
W HE	< 770	< 770	< 770	< 770	< 770	< 1500	< 770	< 770	< 770	< 770	< 770	
M LE	74	< 42	< 42	< 42	< 42	< 84	< 42	< 42	< 42	< 42	< 42	

Parameter	C2Cl6	nitrobenz	Isophorone	2ntroph'ol	2,4Meph'ol	benz acid	b-2Clethox	2,4-dClph	1,2,4-TCIB	Naph'ene	4-Clanllne
LAB SITE											
W DE	< 3.0	< 3.0	< 3.0	< 3.0	< 3.0	< 15	< 3.0	< 3.0	< 3.0	27	< 3.0
W HE	< 770	< 770	< 770	< 770	< 770	< 3900	< 770	< 770	< 770	< 770	< 1500
M LE	< 42	< 42	< 42	< 42	< 42	< 200	< 42	< 42	< 42	< 42	< 84

Parameter	C16butadien	4Cl3Mephnl	2-Menaph	C16cycpent	2,4,6Clph	2,4,5lClph	2-Claph	2-nitroanll	Me2phthal	acenaphthy	2,6-DNT
LAB SITE											
W DE	< 3.0	< 3.0	3.9	< 3.0	< 3.0	< 15	< 3.0	< 15	< 3.0	< 3.0	< 3.0
W HE	< 770	< 1500	< 770	< 770	< 770	< 770	< 770	< 3900	< 770	< 770	< 770
M LE	< 42	< 84	< 42	< 42	< 42	< 42	< 42	< 200	< 42	< 42	< 42

Parameter	3-nitroanll	acenaphthe	2,4dnitrophe	4ntrophenol	dibonluran	2,4-DNT	dothphthal	4Clphenphe	fluorene	4-nitroanll	4,6dn2Map
LAB SITE											
W DE	< 15	< 3.0	< 15	< 15	< 3.0	< 3.0	9	< 3.0	< 3.0	< 15	< 15
W HE	< 3900	< 770	< 3900	< 3900	< 770	< 770	< 770	< 770	< 770	< 3900	< 3900
M LE	< 200	< 42	< 200	< 200	< 42	< 42	< 42	< 42	< 42	< 200	< 200

Dry Cleaner Solvent Wastes

Semivolatile Organics (EPA 8270) Analysis, $\mu\text{g/g}$

Parameter	N-nitroso	4Biphenyl	Cl6benzene	Cl5phenol	phenanthrene	anthracene	d-n-butylphl	fluoranthene	pyrene	butbenpht	3,3'Cl2benz
LAB SITE											
W DE	< 3.0	< 3.0	< 3.0	< 15	< 3.0	< 3.0	28	< 3.0	< 3.0	180	< 6.0
W HE	< 770	< 770	< 770	< 3900	< 770	< 770	< 770	< 770	< 770	< 770	< 1500
M LE	< 42	< 42	< 42	< 200	< 42	< 42	< 42	< 42	< 42	110	< 84

Parameter	ben[a]anthr	chrysene	b2ethhexph	d-n-octylphl	ben[b]fluor	ben[k]fluor	ben[a]pyren	ind[123-cd]	dben[a,h]an	ben[ghi]per
LAB SITE										
W DE	< 3.0	< 3.0	320	34	< 3.0	< 3.0	< 3.0	< 3.0	< 3.0	< 3.0
W HE	< 770	< 770	< 770	< 770	< 770	< 770	< 770	< 770	< 770	< 770
M LE	< 42	< 42	64	< 42	< 42	< 42	< 42	< 42	< 42	< 42

Dry Cleaner Solvent Wastes

Physical Properties and TCLP Metals Analysis, ppm

Parameter		pH	SG	FP	As	Ba	Cd	Cr	Pb	Hg	Se	Ag
Reg. Limit		<2 or >10	na	< 100	5	100	1	5	5	0.2	1	6
LAB SITE												
W	DE	7	1.03	80	< 0.05	0.8	0.24	0.15	1.7	< 0.01	< 0.05	< 0.05
W	HE	6	1.25	85	< 0.05	0.4	0.05	0.13	0.2	< 0.01	< 0.05	< 0.05
M	LE	8	matrix	105	< 0.5	0.37	0.45	0.26	1.1	< 0.001	< 0.2	< 0.01

TCLP Semi Volatiles Analysis, ppm

Parameter		cresol	2,4-DNT	Cl6-benz	Cl6-13-but	Cl6-eth	nitrobenz	Cl5-phenol	pyridine	2,4,5-TCP	2,4,6-TCP
Reg. Limit		200	0.13	0.13	0.5	3	2	100	5	400	2
LAB SITE											
W	DE	< 0.33	< 0.33	< 0.33	< 0.33	< 0.33	< 0.33	< 1.7	< 1.7	< 0.33	< 0.33
W	HE	< 0.060	< 0.060	< 0.060	< 0.060	< 0.060	< 0.060	< 0.30	< 0.30	< 0.060	< 0.060
M	LE	0.059	< 0.033	< 0.033	< 0.033	< 0.033	< 0.033	< 0.17	< 0.17	< 0.033	< 0.033

TCLP Volatiles Analysis, ppm

Parameter		benzene	CCl4	Clbenz	Cl1Cl3	1,4 DCl11	1,2-DCA	1,1-DCE	MEK	PCE	TCE	VChloride
Reg. Limit		0.5	0.5	100	6	7.5	0.5	0.7	200	0.7	0.5	0.2
LAB SITE												
W	DE	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 2.0	> 4.4	< 0.10	< 0.20
W	HE	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	0.14	< 2.0	> 4.4	0.17	< 0.20
M	LE	< 0.10	< 0.10	< 0.10	< 0.10	< 0.20	< 0.10	< 0.10	< 2.0	> 4.4	< 0.10	< 0.20

T

**TCLP
ANALYSES OF PAINT WASTES**

E

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D

Paint Gun Cleaner Wastes

Physical Properties and TCLP Analysis, ppm

<i>Parameter</i>	<i>Reg. Limit</i>	<i># Samp</i>	<i>Avg</i>	<i>Min</i>	<i>Max</i>
pH	<2 or >10	2	6.3	6.0	6.5
SG	na	2	0.894	0.851	0.937
FP	< 100	2	75	75	75
As	5	2	0.00	0.00	0.00
Ba	100	2	0.80	0.60	1.00
Cd	1	2	0.36	0.00	0.72
Cr	5	2	0.46	0.21	0.72
Pb	5	2	1.35	0.30	2.40
Hg	0.2	2	0.00	0.00	0.00
Se	1	2	0.00	0.00	0.00
Ag	5	2	0.00	0.00	0.00
cresol	200	2	4.85	0.00	9.70
2.4-DNT	0.13	2	0.00	0.00	0.00
Cl6-benz	0.13	2	0.00	0.00	0.00
Cl6-13-but	0.5	2	0.00	0.00	0.00
Cl6-eth	3	2	0.00	0.00	0.00
nitrobenz	2	2	0.00	0.00	0.00
Cl5-phenol	100	2	0.00	0.00	0.00
pyridine	5	2	0.00	0.00	0.00
2.4.5-TCP	400	2	0.00	0.00	0.00
2.4.6-TCP	2	2	0.00	0.00	0.00
benzene	0.5	2	0.16	0.14	0.18
CCl4	0.5	2	0.00	0.00	0.00
Clbenz	100	2	0.00	0.00	0.00
CHCl3	6	2	0.00	0.00	0.00
1.4-DCIB	7.5	2	0.00	0.00	0.00
1.2-DCA	0.5	2	0.06	0.00	0.12
1.1-DCE	0.7	2	0.00	0.00	0.00
MEK	200	2	2100.00	200.00	4000.00
PCE	0.7	2	0.31	0.00	0.61
TCE	0.5	2	0.80	0.00	1.60
VChloride	0.2	2	0.00	0.00	0.00

Less than values are treated as zeros in the statistical analysis

Greater than values are treated as the value in the statistical analysis

Paint Gun Cleaner Wastes

Volatile Organics (EPA 8240) Analysis, ppm

Parameter	CH3Cl	CH3Br	C2H3Cl	C2H5Cl	CH2Cl2	acetone	CS2	1,1-DCE	1,1-DCA	1,2-DCE	CHCl3
LAB SITE											
W DE	< 11000	< 11000	< 11000	< 11000	< 5600	< 120000	< 5600	< 5600	< 5600	< 5600	< 5600
W DO	< 11000	< 11000	< 11000	< 11000	270000	< 110000	< 5300	< 5300	< 5300	< 5300	< 5300

Parameter	1,2-DCA	MEK	1,1,1-TCA	CCl4	v-acetate	CHBrCl2	1,2-DCEPA	1,3-DCPE	TCE	CHBr2Cl	1,1,2-TCA
LAB SITE											
W DE	< 5600	< 120000	< 5600	< 5600	< 56000	< 5600	< 5600	< 5600	< 5600	< 5600	< 5600
W DO	< 5300	< 110000	< 5300	< 5300	< 53000	< 5300	< 5300	< 5300	< 5300	< 5300	< 5300

Parameter	benzene	2-CVE	1,3-DCPE	CHBr3	Me-2-pen	2-hex'one	PCE	1,1,2,2'CA	toluene	Cl-benz	eth-benz
LAB SITE											
W DE	< 5600	< 11000	< 5600	< 5600	< 56000	< 56000	< 5600	< 5600	290000	< 5600	33000
W DO	< 5300	< 11000	< 5300	< 5300	< 53000	< 53000	< 5300	< 5300	300000	< 5300	13000

Parameter	styrene	xylene	1,2-DCIB	1,3-DCIB	1,4-DCIB
LAB SITE					
W DE	< 5600	54000	< 5600	< 5600	< 5600
W DO	< 5300	55000	< 5300	< 5300	< 5300

Paint Gun Cleaner Wastes

Semivolatile Organics (EPA 8270) Analysis, ppm

Parameter	phenol	b-2Cl-ethr	2Cl-phenol	1,3-DCIB	1,4-DCIB	benzyl'ol	1,2-DCIB	2Me-pheno	b-2Cl-IPE	4Me-pheno	N-nitroso
LAB SITE											
W DE	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000
W DO	< 1100	< 1100	< 1100	< 1100	< 1100	< 2100	< 1100	< 1100	< 1100	< 1100	< 1100

Parameter	C2Cl6	nitrobenz	Isophorone	2nitroph'ol	2,4Meph'ol	benz acid	b-2Clethox	2,4-dClph	1,2,4-TCIB	Naph'ene	4-Claniline
LAB SITE											
W DE	< 1000	< 1000	< 1000	< 1000	< 1000	< 5000	< 1000	< 1000	< 1000	< 1000	< 1000
W DO	< 1100	< 1100	< 1100	< 1100	< 1100	< 5300	< 1100	< 1100	< 1100	< 1100	< 2100

Parameter	Cl6butadien	4Cl3Mephnl	2-Menaph	Cl6cycpenl	2,4,6Clph	2,4,5lClph	2-Clinaph	2-nitroanil	Me2phthal	acenaphthy	2,6-DNT
LAB SITE											
W DE	< 1000	< 1000	< 1000	< 1000	< 1000	< 5000	< 1000	< 5000	< 1000	< 1000	< 1000
W DO	< 1100	< 2100	< 1100	< 1100	< 1100	< 1100	< 1100	< 5300	< 1100	< 1100	< 1100

Parameter	3-nitroanil	acenaphthe	2,4dnitrophe	4nitrophenol	dibenluran	2,4-DNT	dothphthal	4Clphenphe	fluorene	4-nitroanil	4,6dn2Mep
LAB SITE											
W DE	< 5000	< 1000	< 5000	< 5000	< 1000	< 1000	< 1000	< 1000	< 1000	< 5000	< 5000
W DO	< 5300	< 1100	< 5300	< 5300	< 1100	< 1100	< 1100	< 1100	< 1100	< 5300	< 5300

Parameter	N-nitroso	4Brphenph	Cl6benzene	Cl5phenol	phenanthre	anthracene	d-n-butphl	fluoranthen	pyrene	butbenphth	3,3'Cl2benz
LAB SITE											
W DE	< 1000	< 1000	< 1000	< 5000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 2000
W DO	< 1100	< 1100	< 1100	< 5300	< 1100	< 1100	< 1100	< 1100	< 1100	1600	< 2100

Parameter	ben[a]anthr	chrysene	b2ethhexph	d-n-octphl	ben[b]fluor	ben[k]fluor	ben[a]pyren	Ind[123-cd]	dben[a,h]an	ben[ghi]per
LAB SITE										
W DE	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000
W DO	< 1100	< 1100	< 1100	< 1100	< 1100	< 1100	< 1100	< 1100	< 1100	< 1100

Paint Gun Cleaner Wastes

Physical Properties and TCLP Metals Analysis, ppm

Parameter	pH	SG	FP	As	Ba	Cd	Cr	Pb	Hg	Se	Ag
Reg. Limit	<2 or >10	na	< 100	5	100	1	5	5	0.2	1	5
LAB SITE											
W DE	6	0.851	75	< 0.05	1	< 0.05	0.21	0.3	< 0.01	< 0.05	< 0.05
W DO	6.5	0.937	75	< 0.05	0.6	0.72	0.72	2.4	< 0.01	< 0.05	< 0.05

TCLP Semi Volatiles Analysis, ppm

Parameter	cresol	2,4-DNT	C16-benz	C16-13-but	C16-eth	nitrobenz	C15-phenol	pyridine	2,4,5-TCP	2,4,6-TCP
Reg. Limit	200	0.13	0.13	0.5	3	2	100	5	400	2
LAB SITE										
W DE	< 0.033	< 0.033	< 0.033	< 0.033	< 0.033	< 0.033	< 0.17	< 0.17	< 0.033	< 0.033
W DO	9.7	< 2.6	< 2.6	< 2.6	< 2.6	< 2.6	< 13	< 13	< 2.6	< 2.6

TCLP Volatiles Analysis, ppm

Parameter	benzene	CCl4	C1benz	C11C13	1,4-DCIB	1,2-DCA	1,1-DCE	MEK	PCE	TCE	VChloride
Reg. Limit	0.5	0.5	100	6	7.5	0.5	0.7	200	0.7	0.5	0.2
LAB SITE											
W DE	0.18	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	< 0.10	4000	< 0.10	< 0.10	< 0.20
W DO	0.14	< 0.10	< 0.10	< 0.10	< 0.10	0.12	< 0.10	> 200	0.61	1.6	< 0.20

**NOTE: PLEASE INSERT THE FOLLOWING EMERGENCY EQUIPMENT LIST
AND SITE PLAN SHOWING LOCATION OF EMERGENCY
EQUIPMENT INTO APPENDIX E. PLEASE REMOVE THE
PREVIOUS EMERGENCY EQUIPMENT LIST.**

EMERGENCY EQUIPMENT LIST

A site plan showing the location of the following emergency equipment is found immediately behind this list [June 29, 1992].

Eye Wash Stand---The eye wash is located immediately south of the Return-and-Fill Dock [June 29, 1992]. The workers should try the stand and become familiar with its operation. The eye wash stand should be checked once a week for operation.

Showers---Should be checked periodically to ascertain that they are operational. Located in the locker room area.

Ventilation---Any area that is closed and collects vapors should be avoided or equipped with proper fans to ensure adequate ventilation.

Fire Extinguisher---The service center has nine [June 29, 1992] 10-pound ABC extinguishers. An ABC extinguisher is a universal system used on paper, wood and electrical, as well as solvent fires. The extinguisher must be full and carry an inspection tag. The accepted extinguisher is available as S-K Part No. 4009.

Absorbent Material---An adequate supply (200 sheets, 2 bales) should be on hand to handle small spills. Located in the warehouses. One bale is located with the spill cleanup equipment [June 29, 1992], on the loading dock and on the route trucks. Several bales of absorbent material are kept in storage. S-K Part No. 8890.

Communication System---Telephones are installed at all facilities, normally in the branch office. An alarm which sounds a buzzer throughout the warehouse is located at the return and fill dock area in case assistance is needed.

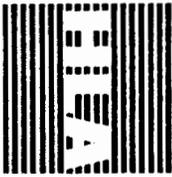
High Level Over-flow alarm and Guages [June 29, 1992]---Over-flow alarms are installed at all storage tanks. They are set to activate at 95% tank capacity and have both a horn and a flashing light alarm which can be manually tested.

The following equipment shall be located in the locker room area and the supply checked weekly:

Gloves - The rubber or plastisol gloves sold by Safety-Kleen are to be used when handling the solvents. Several pairs of gloves are also kept with the spill cleanup equipment [June 29, 1992]. Two dozen gloves are kept in storage.
Safety Glasses or Face Mask - Whichever the worker prefers, is to be worn when loading or unloading the solvent. Several pairs of glasses are also kept with the spill cleanup equipment [June 29, 1992]. One pair of glasses hangs in the loading dock area.

Plastic Aprons - Are available for the situation where a solvent may get on the worker's clothing. Two plastic aprons are also kept with the spill cleanup equipment [June 29, 1992]. Several are kept in storage. One apron is located at the loading dock.

Decontamination of all equipment is accomplished by washing with soap and water.



Harding Lawson Associates
Engineering and
Environmental Services

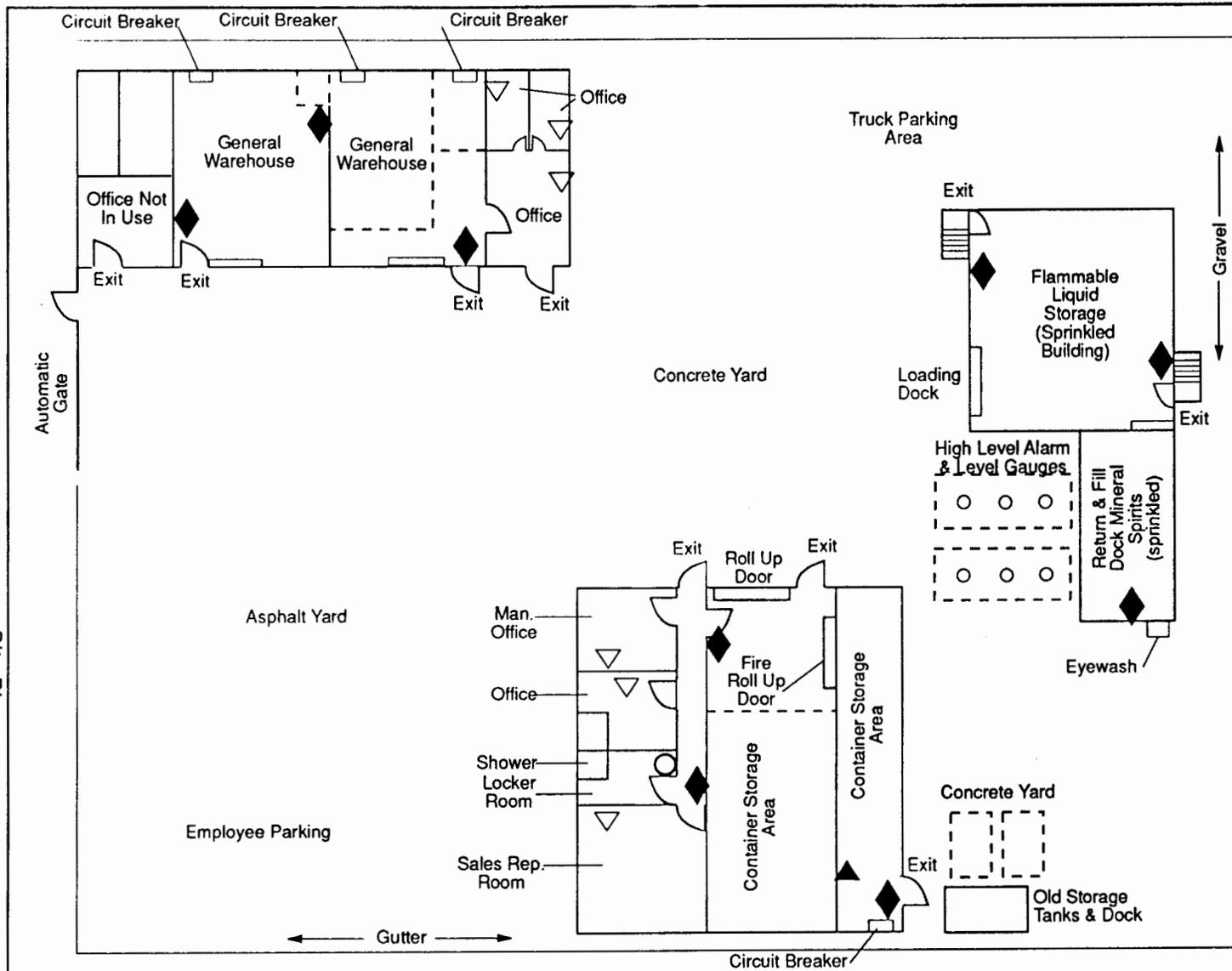
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11935 038

Site Plan
Emergency Equipment Location
Safety-Kleen Corporation
Albuquerque, New Mexico

APPROVED
DATE
6/92

REVISED DATE

20033 038 02
06/29/02
PLATE



EXPLANATION

- ◆ Fire Extinguisher
- First Aid Kit (in locker room)
- ▲ Spill Cleanup Equipment (including gloves, safety glasses or face masks, plastic aprons, absorbent material and respirators)
- ▽ Telephone



NOT TO SCALE

**NOTE: PLEASE INSERT THE FOLLOWING PAGE IMMEDIATELY IN FRONT
OF THE FOUR PAGE DOCUMENT STEEL DRUM CONSTRUCTION
DETAILS IN APPENDIX E.**

EXAMPLES OF CONTAINER SPECIFICATIONS

Note: The following information includes examples of specifications handled at the Albuquerque Service Center. All storage containers will meet DOT requirements and will not exceed 55 gallons in capacity (except for 55-gallon overpack drums). [June 26, 1992]

**NOTE: PLEASE INSERT THE FOLLOWING REPORT FROM TERA, INC. AS
THE FINAL DOCUMENT IN APPENDIX E.**

CERTIFICATION OF H-3 FLAMMABLE STORAGE BUILDING
ALBUQUERQUE, NEW MEXICO

For

SAFETY-KLEEN CORP.
Elgin, Illinois

 **TERA, inc.**



TERA, Inc.

6440 H. Arch. Suite 200
P.O. Box 74038 Houston, Texas 77274 Tel: 713 792-0877 Fax: 713 792-0718

92-400-36

CERTIFICATION

I have supervised the installation assessment dated April 22, 1992, of the H-3 Flammable Class IB Storage Building at the Safety-Kleen Corporation facility in Albuquerque, New Mexico. The EPA ID Number for this facility is: NMD 000804294.

With regard to this duty, I certify under penalty of law that I have personally examined and am familiar with the information submitted in this document and all related attachments and that, based on my observations and my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.

John W. Cox

Registered Professional Engineer

New Mexico No. 10317

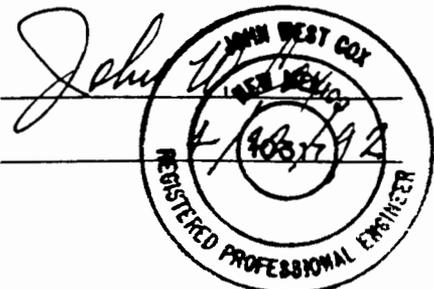
TERA, Inc.

P. O. Box 740038

Houston, Texas 77274

Signed: _____

Date: _____





TERA, inc.

5440 H. Loren, Suite 200
P.O. Box 1000, Dallas, Texas 77278 Tel: 714 212-0276 Fax: 714 212-0716

April 22, 1992
92-400-36

Mr. Bob Wachsmuth
SAFETY-KLEEN CORP.
2750 Thompson Creek Road
Pomona, California 91767

Subject: Certification of H-3 Flammable Storage Building at
the Safety-Kleen Albuquerque, New Mexico, Branch

Dear Mr. Wachsmuth:

On April 9, 1992, Bob Speake of TERA, Inc., inspected the Safety-Kleen branch facilities at Albuquerque, New Mexico (EPA No. NMD 00804294).

This letter is to certify that on April 9, 1992 we found the H-3 Flammable Class 1B Storage Building to be as described in the attached certification report.

The H-3 Building secondary containment capacity is 965-gallons. Hazardous waste storage for this building is therefore limited to 9,650-gallons to comply with 40 CFR 264.175(b)(3)). We observe that the building is currently permitted to store 1092 gallons of Class 1B hazardous waste.

Please let me know if you have any questions regarding this certification. Thank you.

Very truly yours,

TERA, Inc.

Robert C. Speake
Senior Engineer

John W. Cox, Ph.D., P.E.,
Vice President



RCS/JWC/lf

- Attachments: Two (2) copies certification report
- Copies to: Three (3) to New Mexico Environment Department (Dr. Herbert Grover)
- One (1) to Safety-Kleen Albuquerque Branch Manager (Ralph)
- One (1) to Safety-Kleen EHS (Jennifer Jendras)
- One (1) to Safety-Kleen Tech Services (Wayne Olson)

CERTIFICATION OF H-3 FLAMMABLE STORAGE BUILDING
ALBUQUERQUE, NEW MEXICO

* * *

For

SAFETY-KLEEN CORP.
Elgin, Illinois

* * *

By

TERA, Inc.
Houston, Texas

April 1992

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INSTALLATION CERTIFICATION
H-3 FLAMMABLE STORAGE BUILDING

This report documents and certifies the installation of the H-3 Flammable Storage Building (hereinafter called "H-3 Building") at the Safety-Kleen Corp. facility in Albuquerque, New Mexico. The EPA ID number for this facility is NMD 000804294. This certification was performed and this report was written to address the requirements of 40 CFR 264.17, 264.35, 264.175(b), and 264.176 and the corresponding provisions of Part V of the New Mexico Hazardous Waste Management Regulations, as well as the requirements of the compliance schedule for the H-3 Building in the permit issued November 29, 1991 by the New Mexico Environment Department. Each item in this compliance schedule will be separately addressed below. Text in small print is quoted from the compliance schedule.

* * * * *

I.I.1 Prior to operation of the Double-Walled Underground Waste Solvent Storage Tank and its ancillary equipment, and the H-3 Flammable Storage Building, the Permittee shall submit as-built plans of both units and any ancillary equipment.

In conformance to item I.I.1.a, as-built plans of the waste solvent storage tank system were submitted to the New Mexico Environment Department with the RCRA tank system installation assessment, TERA Report No. 92-403-19, dated March 5, 1992.

A. SECONDARY CONTAINMENT

I.I.1.b. At a minimum, these plans for the H-3 Flammable Storage Building shall indicate:

A. SECONDARY CONTAINMENT (Continued)

- i. The dimensions of the building, including the secondary containment capacity as required by HMR-6, Pt. V, sec. 264.175(b)

Each subparagraph of the regulation quoted above is addressed separately below. Drawings, manufacturer's literature, and inspection photographs are attached to this report (as plates) for further reference.

1. Building and Secondary Containment Dimensions

The dimensions of the building and its secondary containment are shown on Safety-Kleen drawing number 700801-6000-01, which is Plate 4 of this report. Inspection revealed that the major as-built dimensions of the building and its secondary containment closely follow those shown on the design drawings, except as shown on Plates 4 and 8.

2. Secondary Containment System Description

The H-3 Building secondary containment system consists of a four inch high reinforced concrete curbing below the reinforced masonry walls, a reinforced concrete slab which slopes down in all directions towards the center floor trench, and two exterior rollup door trenches, with underground piping between the door and center trenches. The two exterior swinging doors have automatic closers and watertight seals. (See Plate 4).

A. SECONDARY CONTAINMENT (Continued)3. Secondary Containment Coating (HWMR-6, Pt. V,
Sec. 64.175(b)(1))

Inspection showed that the reinforced concrete floor slab in the H-3 Building has been coated. According to the contractor, it was coated with the Dupont industrial coating described in Plate 13. This coating is free of cracks or gaps and appears to be sufficiently impervious to contain leaks or spills until any material collected can be detected and removed. Stainless steel liners have been installed in the floor trenches. According to the contractor, the trenches were coated with the aforementioned industrial coating before the liners were installed and the joints between the liners and the reinforced concrete were sealed with the Sika joint sealant described in Plate 14. Thus, the secondary containment appears to satisfy the spill containment provisions of HWMR-6, Pt. V, sec. 264.175(b)(1).

4. Secondary Containment Design (HWMR-6, Pt. V,
Sec. 264.175(b)(2))

This secondary containment system is designed to collect a spill via a flow over the slab into the center floor trench. The entrance to the pipe exiting the center trench (and discharging into the firewater storage tank) was designed to be above the outlet pipes from the door trenches (see Section A, Plate 4 and Section B-B, Plate 5). This arrangement allows a spill to back up from the center trench, through the piping interconnecting the three trenches, and into the door trenches. The total volume (in all three trenches) was designed to be 10% of the permitted capacity of the building without overflowing into the firewater storage

A. SECONDARY CONTAINMENT (Continued)4. Secondary Containment Design (HWMR-6, Pt. V,
Sec 264.175(b)(2)) (Continued)

tank (which is underground and thus not as readily accessible as the floor trenches are for visual monitoring for the presence of hazardous waste. Such monitoring is required by Section 80.301(1)4 of The Uniform Fire Code, the city's fire code).

Inspection by TERA on April 9, 1992 revealed that the outlet pipe from the center trench was not installed above the door trench pipes as designed (See Plate 4 and Photo B on Plate 18). The contractor corrected this deficiency during April 10-13, 1992 as shown on Plates 8 and 19. A 90-degree elbow was installed to elevate the mouth of the center trench outlet pipe above the entrances to the door trench outlet pipes. A square of sheet metal was fastened to the underside of the grate to cover the open mouth of the pipe, which now faces upward. Thus, the firewater collection tank remains isolated from a potential 10% hazardous waste spill within the warehouse. With these modifications, the H-3 Building's secondary containment now appears to satisfy the design requirements of HWMR-6, Pt. V, sec. 264.175 (b)(2).

5. Secondary Containment Volume (HWMR-6, Pt. V,
Sec. 264.175(b)(3))

A table showing the as-built volume of the building's secondary containment (i.e two door trenches and the center trench) in on Plate 8. The total volume of the secondary containment is 965 gallons, which is about 88 percent of the 1092-gallon hazardous waste storage capacity for which the

A. SECONDARY CONTAINMENT (Continued)

5. Secondary Containment Volume (HWMR-6, Pt. V,
Sec. 264.175(b)(3)) (Continued)

building is currently permitted. Thus, the secondary containment system has substantial reserve capacity: in fact, the center trench alone has sufficient capacity to store more than a 10% spill under the current permit. TERA concludes that the H-3 Building's secondary containment satisfies the capacity requirements of HWMR-6, Pt. V, sec. 264.175 (b)(3).

6. Prevention of Run-On into the Secondary Containment System
(HWMR-6, Pt. V, Sec 264.175(b)(4))

Since the building is roofed to prevent run-on from outside the building, its secondary containment system satisfies the requirements of HWMR-6, Pt. V, sec. 264.175(b)(4).

B. AISLE SPACE

I.I.1.b. At a minimum, these plans for the H-3 Flammable Storage Building shall indicate:

- ii. The aisle space as required by HWMR-6, Pt. V, sec. 264.35.

Plate 15 is a floor plan of the H-3 Building showing the aisle space required by the City of Albuquerque fire code (i.e. the Uniform Fire Code). Storage in the warehouse is limited to piles or palletized containers by the 0.25 gpm/sq. ft. capacity of the ceiling sprinkler system (UFC Tables 79.203-C through F). For containers up to 5-gallon capacity, storage height is limited to 6.5 feet (UFC Table 79.203-A). For larger containers, storage height is limited to one container high by the capacity of the

B. AISLE SPACE (Continued)

sprinkler system (UFC Table 79.203-C). The maximum size of container that can be stored in the warehouse is 60 gallons (UFC sect. 79.201(a)).

Based on Safety-Kleen's intent, declared in the permit application, to store hazardous waste in the H-3 Building in 5-gallon pails and 16-gallon drums, the theoretical building storage capacity for the layout shown on Plate 15, is between 4,752 and 10,560 gallons; a table of calculations for these limits is on Plate 15. The lower limit is based on 100 percent storage in 16-gallon drums; the upper limit is based on 100 percent storage in 5-gallon pails. However, the upper limit must be reduced to 9,650-gallons, based on secondary containment capacity (see subparagraph 1A5 above).

Warehouse aisle space, as shown on Plate 15, satisfies UFC sections 79.203(b), 79.204(b), and 80.304. These code provisions apply to flammable or combustible hazardous liquids storage warehouses. The main aisle is to be eight feet wide; side aisles are four feet wide. Aisles also provide access to exit doors, wall or floor-mounted components of the sprinkler system, the ventilating fan, wall-mounted fire extinguishers, and wall switches, as required by the fire code.

The aisle space provided on Plate 15 allows sufficiently-unobstructed movement of personnel and equipment to any area of the warehouse in the event of a fire, spill, or another emergency. Thus, the layout shown on Plate 15 appears to satisfy HWMR-6 sec. 264.35.

C. 50-FOOT BUFFER ZONE

I.I.1.b. At a minimum, these plans for the H-3 Flammable Storage Building shall indicate:

iii. The location of the storage unit in relation to the property boundary in order to determine if there is a 50-foot buffer zone, as required by HMR-6, Pt. V, sec. 264.176.

Plate 3 is a site plan marked with the actual distances from the walls of the H-3 Building to the perimeter property fence. In every case, these distances exceed 50 feet.

D. DESIGN SPECIFICATIONS

I.I.1.b. At a minimum, these plans for the H-3 Flammable Storage Building shall indicate:

iv. The design specifications that address the general requirements for handling ignitable wastes, as required by local and federal fire codes and by HMR-6, Pt. V, sec. 264.17.

The H-3 Flammable Storage Building was designed to conform to the requirements of the City of Albuquerque fire and building codes, which are the Uniform Fire and Building Codes, respectively. Section 79.204 of the fire code regulates the design of hazardous liquids storage warehouses like the H-3 Building. Chapter 9 of the building code details the requirements for Group H occupancies. Other chapters of these codes were adhered to in the detailed design of the various building components required by these codes.

Construction notes were provided in the design (Plate 2) to require contractor conformance to the city's building and fire codes. The city's Certificate of Occupancy (Plate 23) provides evidence that these codes were followed for both design and construction of the H-3 Building. Discussed below are the design features of the building addressed in the regulation quoted above.

D. DESIGN SPECIFICATIONS (Continued)

1) Prevention of Accidental Ignition or Reaction of Ignitable Wastes (HWMR-6, Pt. V, Sec. 264.17(a))

The building has the required 50 foot buffer from all property boundaries (Plate 3). It is also separated from the attached H-7 Return and Fill Shelter by a four-hour area separation wall which has the required 3-hour rollup door assembly (Plates 4 and 16); the two-hour roof/ceiling assembly (Plate 7) is a part of the required area separation between the H-3 and H-7 occupancies.

An explosion-proof electrical system has been provided for the H-3 Building (Plates 9 and 10) to prevent accidental ignition of hazardous wastes due to sparks.

An explosion-proof ventilator fan designed for continuous operation (Plates 4 and 17) has been provided to prevent the buildup of vapors which could cause a spontaneous ignition; outside air supply for this fan comes through the louver in the bottom half of the west entrance door (Plates 17 and 18). According to the contractor, the 90-minute battery pack installed on the north wall of the building (Plate 17) provides the emergency power to the ventilator fan in the event of power failure, as required by the city fire code.

To minimize the danger of a fire caused by radiant heat, the H-3 Building is windowless, has normally closed swinging and rollup doors, and its exterior is painted a light beige color to reflect sunlight (Plates 16 and 17).

D. DESIGN SPECIFICATIONS (Continued)2) Precautions to prevent extreme, violent, toxic, or uncontrolled reactions (HWMR-6, Pt. V, Sec. 264.17(b))

In addition to the safety features described above, a ceiling automatic sprinkler system has been provided to suppress fires within the warehouse (Plates 11, 12, and 20). The contractor states that the 90-minute battery pack mentioned above also furnishes emergency power to the sprinkler system in the event of power failure. Ten pound dry chemical fire extinguishers have been provided just inside both entrance doors to provide a backup to the automatic sprinkler system.

An emergency ventilator fan cutoff switch has been installed outside the west entrance door (Plates 4 and 17) to reduce the flow of oxygen into the building in the event of fire.

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Miscellaneous Masonry Details *	6
Roof Detail	7
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* As-Built



SAFETY-KLEEN CORP.

777 BIG TIMBER ROAD ELGIN, ILLINOIS 60123

PHONE 708/ 697-8460

**SERVICE CENTER BRANCH
2720 GIRARD AVE.
ALBUQUERQUE, NM**

DESIGNED BY:



TERA, inc.

HOUSTON, TEXAS PHONE 713/ 772-0878

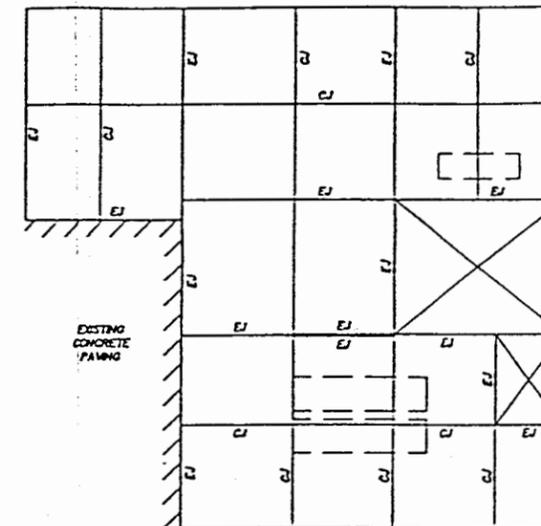
JOB NO. 91-141

GENERAL NOTES

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NOTES:

- 1) NEW PERIMETER FENCE IS TO BE 6 FT. - 8 GAUGE GALVANIZED CHAIN LINK W/ 3 STRANDS OF BARBED WIRE. LINE POST- 2" O.D. SS20. TOP RAIL- 1 3/8" O.D. SS20. TERMINAL AND END POST- 3" O.D. SS40. GATE POST- 4" O.D. SS40. PROVIDE BOTTOM TENSION WIRE. POST TO BE SET 24" IN CONCRETE. MAXIMUM SPACING OF LINE POSTS TO BE 10 FT. C.C. VERIFY LAYOUT WITH PROJECT MANAGER.
- 2) CONCRETE PAVEMENT: (APPROX 1300 SY)
3000 PSI CONCRETE @ 28 DAYS.
6" CONCRETE SLAB WITH 8 X 8 X #4 WWF OVER 4" COMPACTED AGGREGATE BASE OVER COMPACTED SUBBASE. PROVIDE CONTROL/EXPANSION JOINTS AS SHOWN BELOW. SUB-GRADE AND FINAL GRADE IS THE RESPONSIBILITY OF THIS CONTRACTOR. VERIFY GRADES TO NATURAL DRAINAGE WITH PROJECT MANAGER. REF. SK DWG. 011322. DETAIL C2 FOR FURTHER DETAILS.

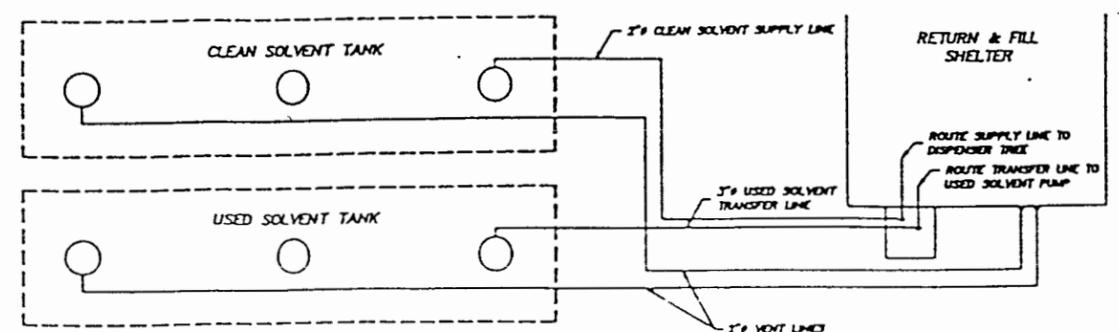
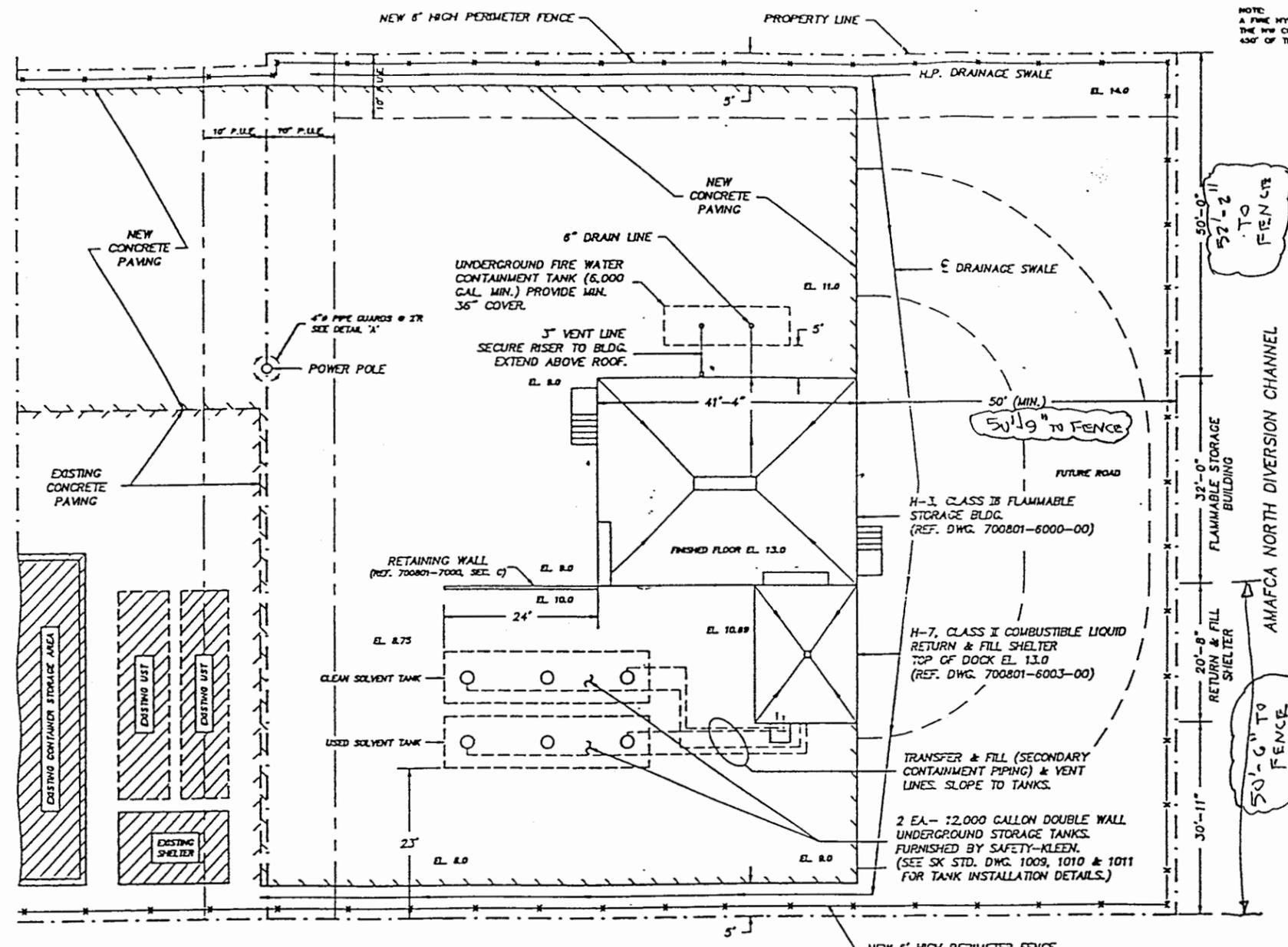


CONCRETE PAVING JOINT LAYOUT

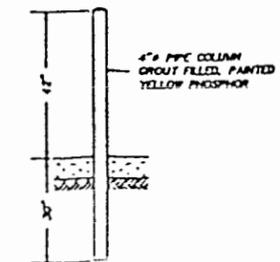
1" = 20'

- EJ- EXPANSION JOINT FOR EXPANSION JOINTS AT BUILDINGS, PROVIDE 1/2" PREFORMED EXPANSION JOINT MATERIAL AND JOINT SEALER.
- FOR EXPANSION JOINTS IN PAVING, PROVIDE 1/2" PREFORMED EXPANSION JOINT MATERIAL, JOINT SEALER AND #4 SMOOTH DOVELS AT 24" CENTERS. COAT ONE END OF DOVELS WITH A NONBONDING AGENT.
- CJ- CONTROL JOINT PROVIDE 1/4" WIDE X 1" DEEP SAW CUT, FILL WITH JOINT SEALER.

NOTE:
A FIRE HYDRANT IS LOCATED APPROX 30' FROM THE NW CORNER OF THE PROPERTY AND IS WITHIN 450' OF THE FURTHEST POINT OF THE STORAGE BLDG.



PIPING SCHEMATIC



PIPE GUARD DETAIL 'A'
4 REQ.

NOTE:

- H-3 AND H-7 BUILDINGS TO BE TYPE M-H CONSTRUCTION (UBC-91 TABLES 5-A THRU 5-D, 8-C AND 17-A), EXCEPT FOR THE FOLLOWING:
1. COMMON WALL BETWEEN H-3 AND H-7 BUILDINGS TO BE 4 HOUR AREA SEPARATION WALL WITH 3 HOUR OPENING (UBC-91 505(f) AND 901(+))
 2. ROOF/CEILING ASSEMBLY OF H-3 BUILDING TO BE 2 HOUR RATED. (UBC-91 505(f), EXCEPTION 1.)

PLATE 3

REVISIONS										SCALE		DATE		DATE		DATE	
NO.	DESCRIPTION	BY	CHK	APPR	DATE	BY	CHK	APPR	DATE	DATE	DATE	DATE	DATE	DATE	DATE	DATE	

777 2ND STREET, SUITE 100, ALBUQUERQUE, NM 87102-1000

SAFETY-KLEEN CORP.

ALBUQUERQUE, NM

700801-0005-00

GENERAL NOTES

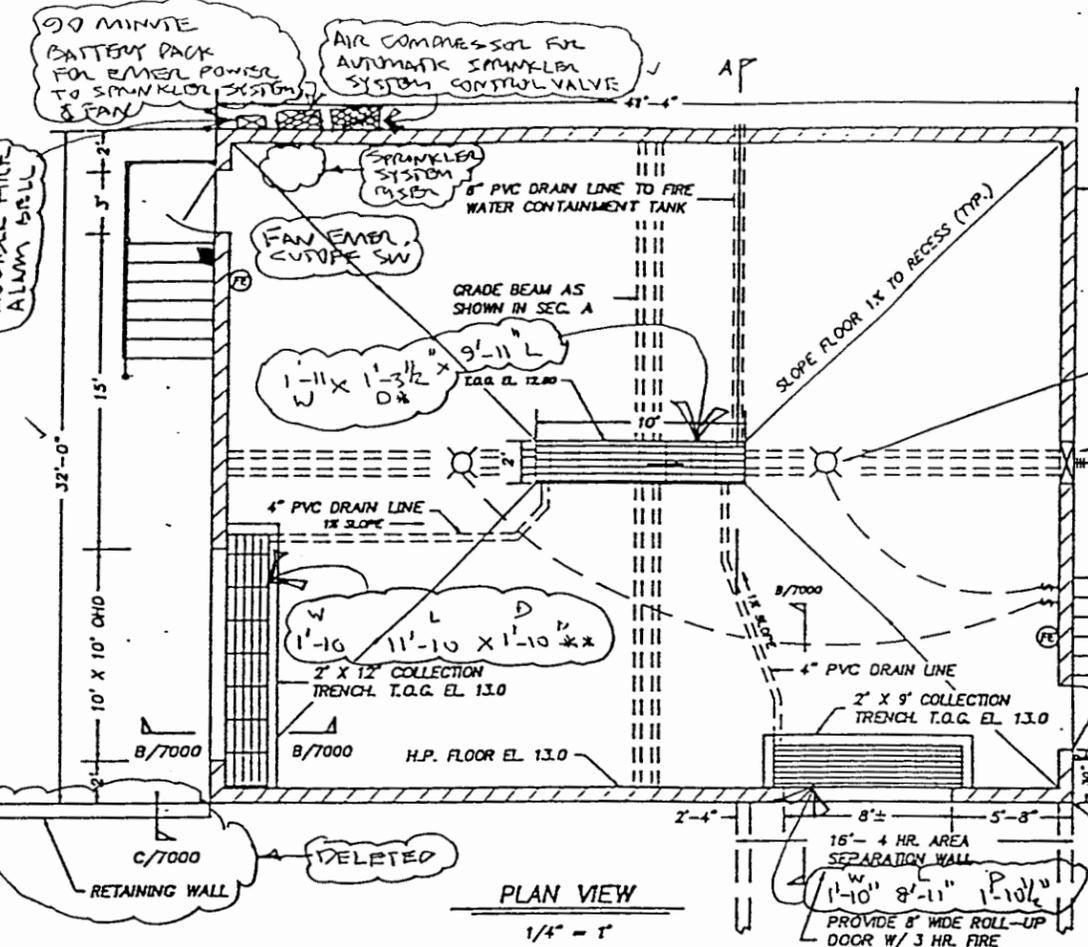
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NOTES:

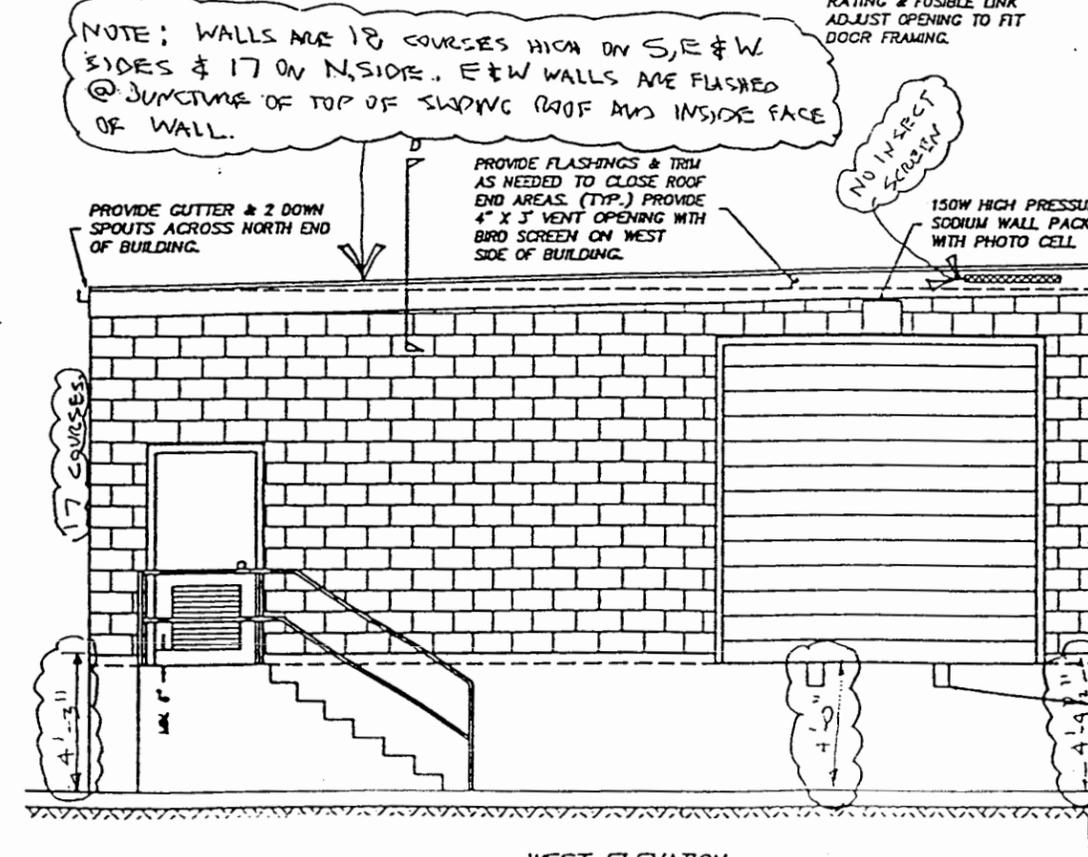
- 1) REFERENCE NOTES AND SPECIFICATIONS DWG. NO. 0001 FOR ADDITIONAL CONSTRUCTION INSTRUCTIONS AND DETAILS.
- 2) PROVIDE 100 DRY CHEMICAL FIRE EXTINGUISHER AT EACH ENTRANCE DOOR.
- 3) FOR 4 HR. AREA SEPARATION WALL, FILL UNROUTED CELLS OF CMU WALL WITH NONCOMBUSTIBLE INSULATION PER UBC-91 TABLE 4-5-B, NOTE 1.3. SUBMIT MATERIAL SPECIFICATIONS & INSTALLATION PROCEDURES FOR APPROVAL.
- 4) PROVIDE 2 HOUR FIRE RATED PROTECTION FOR ROOF ASSEMBLY PER UBC-91, CHAPTER 47. ROOF ASSEMBLY SHALL PROVIDE EXPLOSION VENTING REQUIRED BY UBC-91 SECTION 910. SUBMIT INSTALLATION DRAWINGS & PROCEDURES FOR CITY APPROVAL.
- 5) PROVIDE AUTOMATIC FIRE-EXTINGUISHING SYSTEM PER NFPA 12. SYSTEM SHALL INCLUDE AN AUDIBLE AND VISUAL ALARM LOCATED SO AS TO BE VISIBLE AND ABLE TO BE HEARD FROM THE OFFICE AREA. SUBMIT INSTALLATION DRAWINGS AND PROCEDURES FOR SAFETY-KLEEN APPROVAL. UPON COMPLETION OF INSTALLATION, THE SYSTEM SHALL PASS THE TESTS REQUIRED BY NFPA 12. CONTRACTOR SHALL SUBMIT DESIGN FOR CITY APPROVAL.
- 6) REFERENCE DWGS. 700301-7000 & 7001 FOR MISC. DETAILS NOT SHOWN HEREON.
- 7) REFERENCE DWG. 700301-7000 FOR S/C COATING DETAILS.
- 8) ESTIMATED MATERIAL STORAGE CAPACITY OF THE BUILDING IS 200 GALLONS OF CLASS 1B LIQUIDS IN CLOSED CONTAINERS. FLOOR AREA IS 1,227 SQ. FEET.

SEE PLATE 7

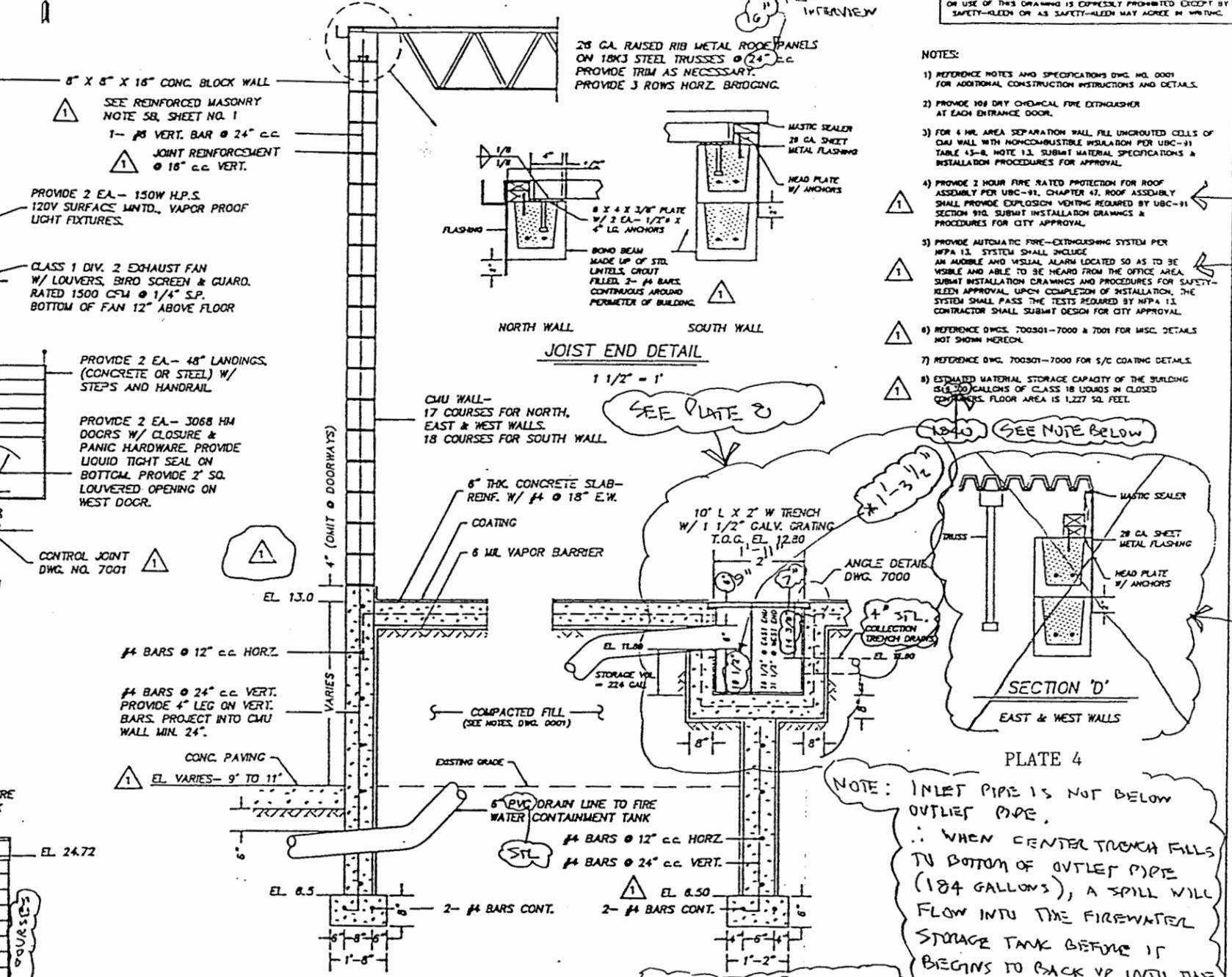
SEE PLATE 9



PLAN VIEW
1/4" = 1'



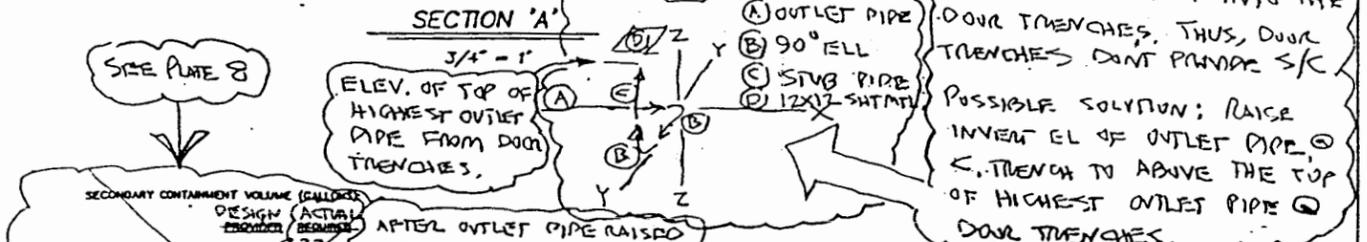
WEST ELEVATION
3/8" = 1'



JOIST END DETAIL
1 1/2" = 1'

SECTION 'D'
EAST & WEST WALLS

SECTION 'A'
3/4" = 1'



SECONDARY CONTAINMENT VOLUME (GALLONS)

DESIGN PRODUCTION	ACTUAL REQUIREMENT	RESERVE
SO. DOOR TRENCH	174	233
WEST DOOR TRENCH	232	298
CENTER FLOOR TRENCH	224	284
HAZARDOUS WASTE	830	815
SLOPING FLOOR	80	
FIREWATER TANK	8,000	
FIREWATER	8,890	8,133

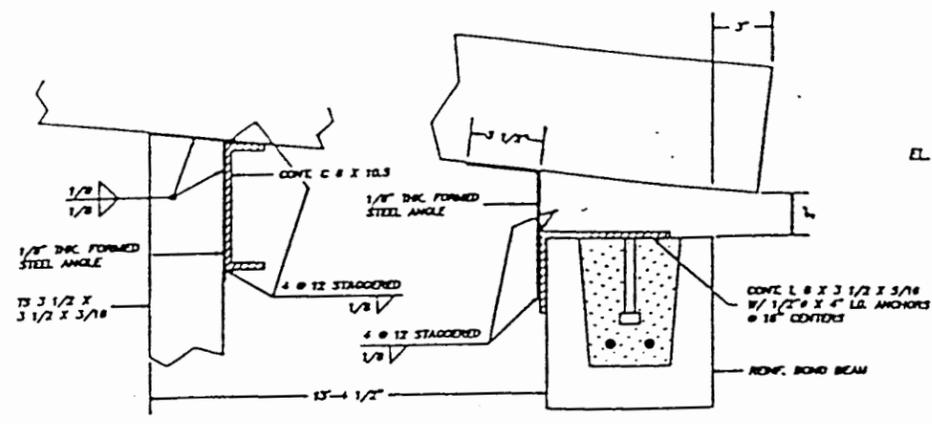
10% OF VOLUME OF WASTE STORED (40 CFM @ 284,133)
10' DIA. SPRINKLER FLOW @ 0.25 CFM/IN (UFC SECT. 90.301 (1))

NO.	DESCRIPTION	BY	CHK	APPR	DATE
1	ADDED CONTROL JOINT AT 2E CORNER PER NORTH JOINT REV. - UBC AS NOTED	JG	RCS	ANC	10/23/91
2	RELEASED FOR REGULATORY REVIEW & DESIGN	JG	RCS	ANC	10/23/91

ALBUQUERQUE, NM 700801-6000-01

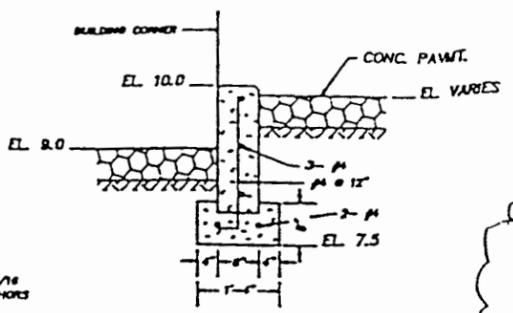
MARKED BY RCS DURING 4/9/92 SITE VISIT

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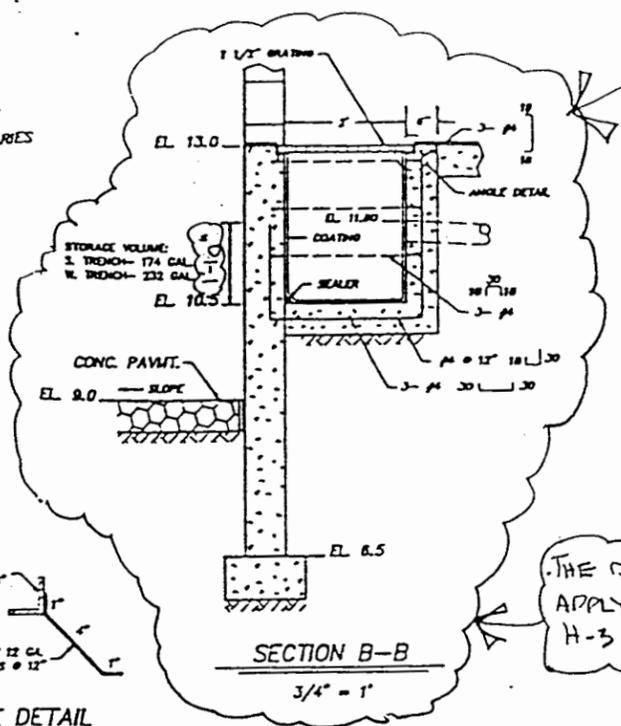


DETAIL 1
5" = 1'

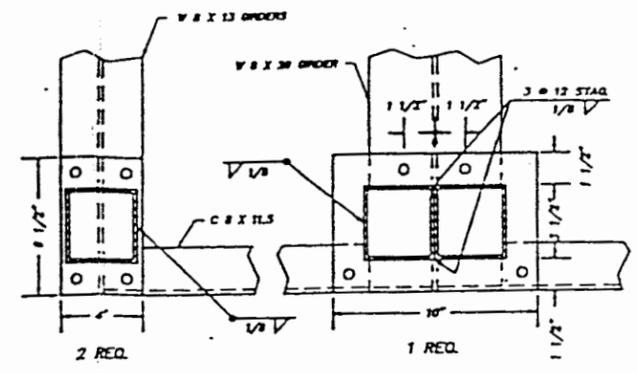
DETAIL 2
5" = 1'



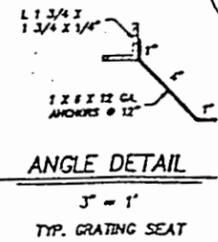
SECTION 'C'
3/4" = 1'
RETAINING WALL SECTION



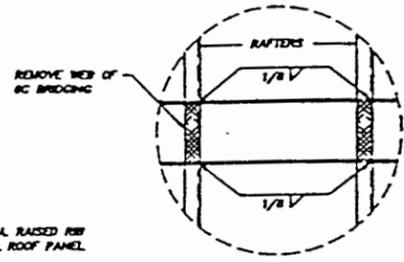
SECTION B-B
3/4" = 1'



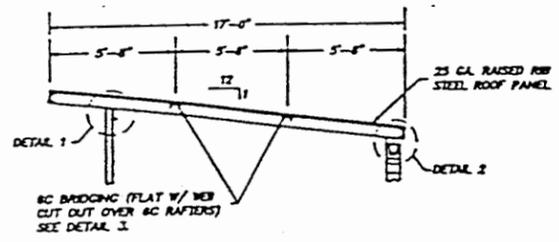
TS COLUMN BASE PLATES
5" = 1'
TS 3 1/2 X 3 1/2 X 3/16\"/>



ANGLE DETAIL
5" = 1'
TYP. GRATING SEAT

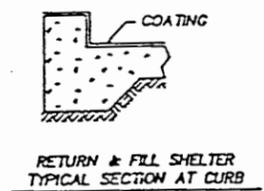


DETAIL 3
1 1/2" = 1'

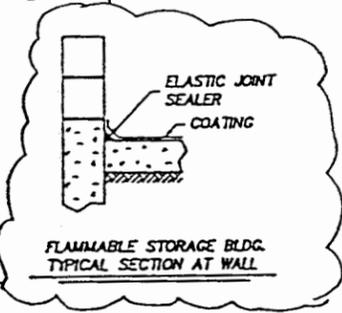


SECTION D-D
1/4" = 1'

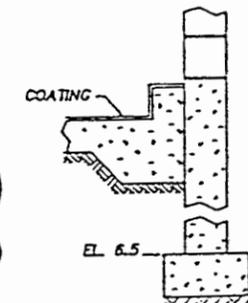
INSTALL MACHINE SCREWS & OTHER ATTACHMENTS AS NEEDED TO PROVIDE A COMPLETE, SECURE ROOF SYSTEM.



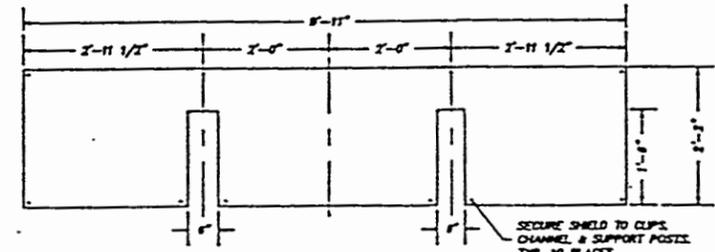
RETURN & FILL SHELTER TYPICAL SECTION AT CURB



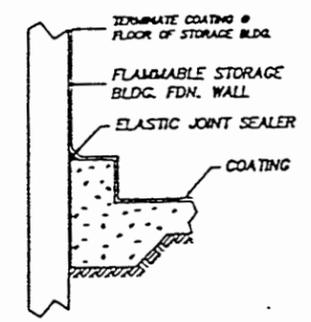
FLAMMABLE STORAGE BLDG. TYPICAL SECTION AT WALL



RETURN & FILL SHELTER TYPICAL SECTION AT WALL

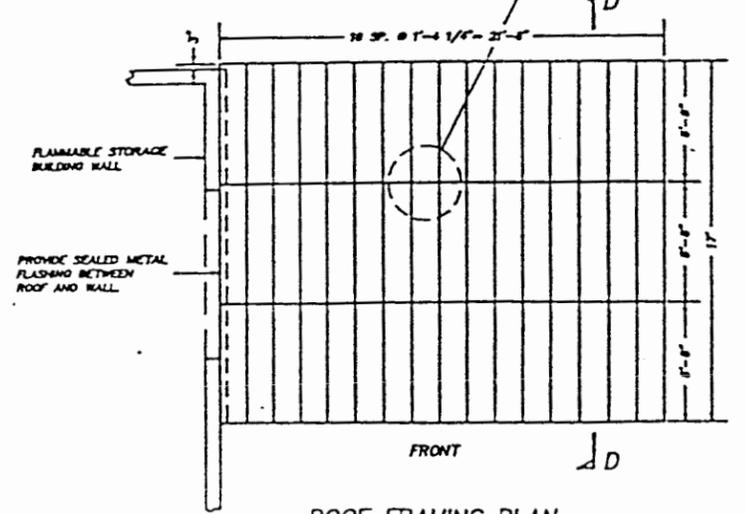


SECURITY WEATHER SHIELD
2 REQ.
26 GA. GALV. (& PAINTED) SHEET METAL

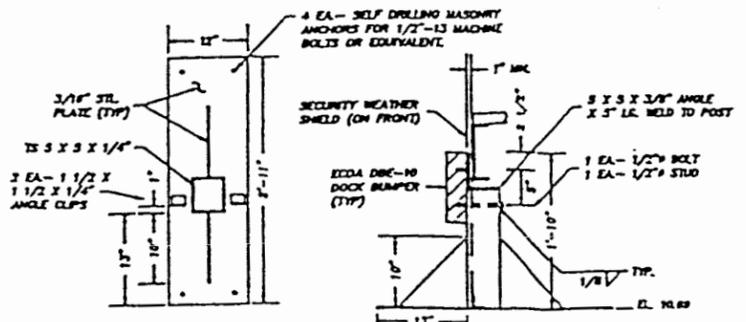


RETURN & FILL SHELTER (REF. SECTION 'B', DWG. 6003)

TYPICAL COATING DETAILS
N.T.S.
SEE DWG. NO. 0001 FOR SPECS. AND DETAILS



ROOF FRAMING PLAN RETURN & FILL SHELTER
1/4" = 1'
ALL MEMBERS ARE 6" X 1 1/2" X 18 GA. COLD ROLLED CHANNEL



TYP. TRUCK BUMPER POST
1" = 1'
4 REQ.

THE DETAILS APPLY TO THE H-3 BUILDING

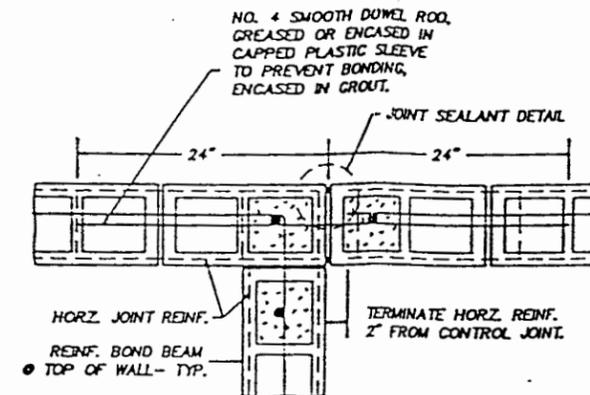
SEE PLATE 2

MARKED BY RCS DURING 4/9/92 SITE VISIT

TITLE									
MISC. STRUCTURAL DETAILS									
SAFETY-KLEEN CORP.									
NO.	DESCRIPTION	BY	CHK	APPR	DATE	SCALE	BY	CHK	DATE
1	ADDED DETAIL 3	JFC	NCJ	JFC	10/15/91				
2	RELEASED FOR REGULATORY REVIEW & BIDDING	JFC	NCJ	JFC	10/15/91				
REVISIONS						ALBUQUERQUE, NM 770-000-REV. NO. 700801-7000-01			

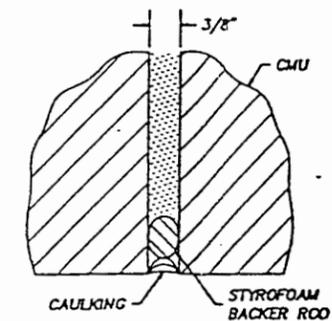
GENERAL NOTES

THIS DRAWING CONTAINS INFORMATION PROPRIETARY TO SAFETY-KLEEN CORPORATION. ANY REPRODUCTION, DISCLOSURE OR USE OF THIS DRAWING IS EXPRESSLY PROHIBITED EXCEPT BY SAFETY-KLEEN OR AS SAFETY-KLEEN MAY AGREE IN WRITING.



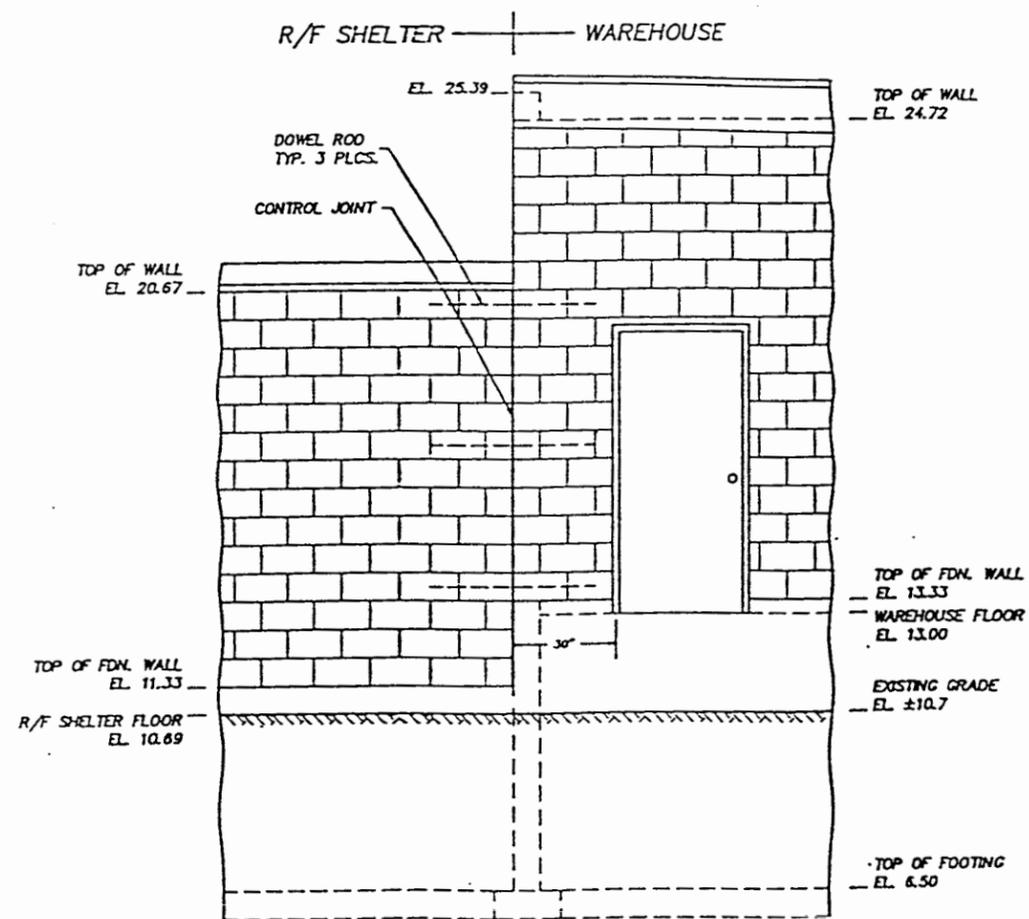
TYPICAL SECTION OF CONTROL JOINT

1 1/2" = 1'



JOINT SEALANT DETAIL

FULL SCALE



PARTIAL EAST ELEVATION

1/2" = 1'
(LANDING AND STAIRS NOT SHOWN)

PLATE 6

TITLE									
MISC. MASONRY DETAILS									
SAFETY-KLEEN CORP. 777 2nd Street, Suite 200, Albuquerque, NM 87102-1100									
SCALE	NOTED	BY	CHKD	P.E. APPR	OP. APPR	DATE	11/13/91		
NO.	DESCRIPTION	BY	CHKD	APPR	DATE	STD-000-REV NO.			PL. # OF #
REVISIONS						ALBUQUERQUE, NM		700801-7001-00	

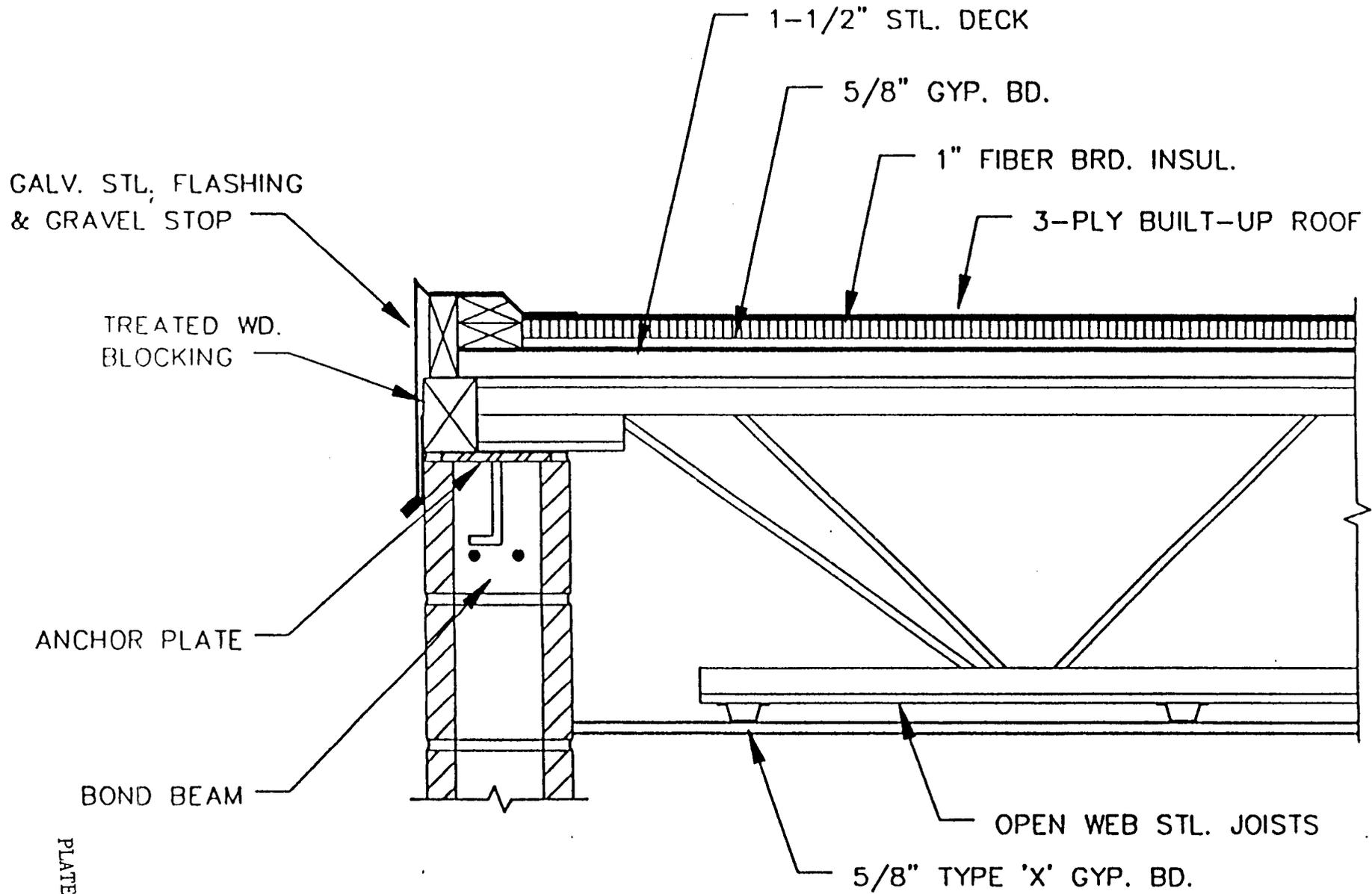


PLATE 7

ROOF DETAIL
1 1/2" - 1'-0"

PROVIDED BY V.W. GILBERT, ARCHITECT,
ALBUQUERQUE, N.M.

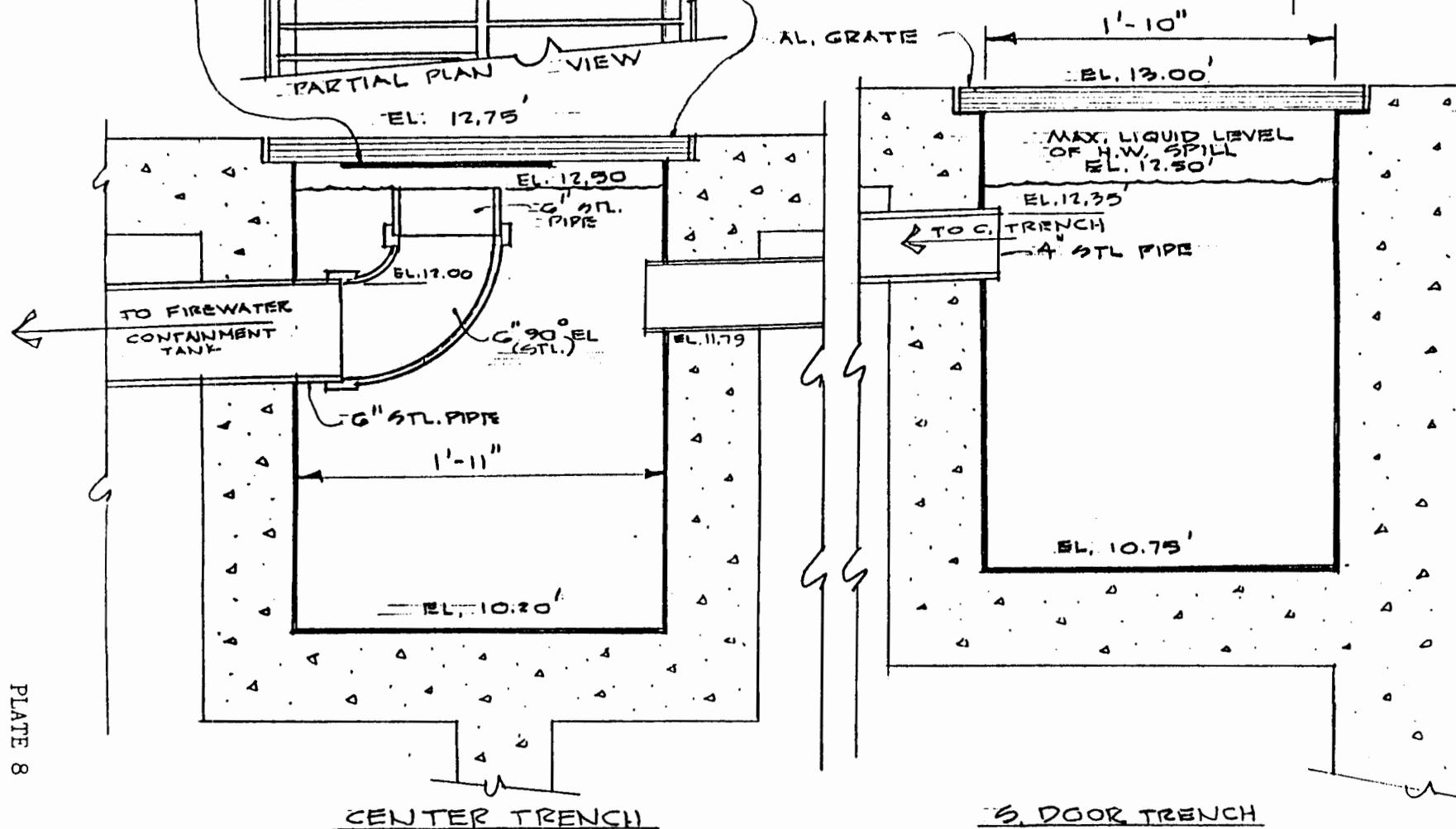
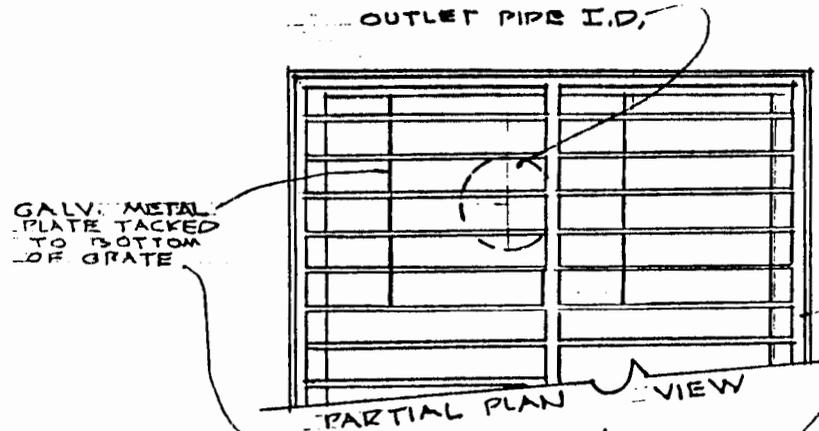
SUBJECT: AS BUILT DRAWING OF
 H-3 PLOG S/C
 BY: RCS
 DATE: 4/9/92


TERA, inc.

JOB NO.: 92-400-36
 FILE: SYK/ALBQR/WHSE I/A
 SHEET: 1 OF 1

TRENCH H.W. STORAGE CAPACITY

TRENCH	W	D	L	VOL, CF	VOL, GAL
CENTER	1.92	2.30	9.92	43.81	327
S. DOOR	1.83	2.25	8.92	36.73	274
W. DOOR	1.83	2.25	11.83	48.71	364
				129.25	965 GAL



TRANSVERSE SECTION
 SCALE 1/10" = 1"

PLATE 8

HYDRAULIC DESIGN INFORMATION SHEET

sub 1-23-92

SAFETY-KLEEN CORP.

DATE 1/21/92

LOCATION 2720 GIRARD AVE., N.E., ALBUQ., N.M.

LOADING FLAMMABLE STORAGE BUILDING

SYSTEM NO. _____

CONTRACTOR SOUTHWEST FIRE PROTECTION INC.

CONTRACT NO. _____

CALCULATED BY STEPHEN DYER

DRAWING NO. _____

CONSTRUCTION: COMBUSTIBLE NON-COMBUSTIBLE

CEILING HEIGHT 12'-6" FT.

OCCUPANCY _____

SYSTEM DESIGN	<input type="checkbox"/> NFPA 13: <input type="checkbox"/> LT. HAZ. <input type="checkbox"/> ORD. HAZ. GP. <input type="checkbox"/> 1 <input type="checkbox"/> 2 <input type="checkbox"/> 3 <input type="checkbox"/> EX. HAZ.
	<input type="checkbox"/> NFPA 231 <input type="checkbox"/> NFPA 231C: FIGURE _____: CURVE _____
	<input type="checkbox"/> OTHER (Specify) <u>.25 OVER THE ENTIRE AREA OR 3000</u>
	<input type="checkbox"/> SPECIFIC RULING _____ MADE BY _____ DATE _____
SYSTEM DESIGN	AREA OF SPRINKLER OPERATION <u>1224</u> <input checked="" type="checkbox"/>
	DENSITY <u>.25 G.P.M.</u>
	AREA PER SPRINKLER <u>102</u> <input checked="" type="checkbox"/>
	HOSE ALLOWANCE GPM: INSIDE _____
	HOSE ALLOWANCE GPM: OUTSIDE <u>500</u> <input checked="" type="checkbox"/>
RACK SPRINKLER ALLOWANCE _____	
SYSTEM TYPE	
<input type="checkbox"/> WET <input checked="" type="checkbox"/> DRY <input type="checkbox"/> DELUGE <input type="checkbox"/> PRE-ACTION	
SPRINKLER OR NOZZLE	
MAKE <u>GRINNELL</u> MODEL <u>F-950</u>	
SIZE <u>1/2"</u> K-FACTOR <u>5.6</u>	
TEMPERATURE RATING <u>165</u>	

CALCULATION SUMMARY	GPM REQUIRED <u>350</u> ^{3/4"}	PSI REQUIRED <u>86.9</u>	AT BASE OF RISER
	"C" FACTOR USED: <u>4.6</u>	OVERHEAD <u>100</u>	UNDERGROUND <u>140</u>

WATER SUPPLY	WATER FLOW TEST		PUMP DATA		TANK OR RESERVOIR	
	DATE & TIME <u>JAN 16, 1992</u>	RATED CAPACITY _____	CAPACITY _____		ELEVATION _____	
	STATIC PSI <u>95 P.S.I.</u>	AT PSI _____	ELEVATION _____		WELL	
	RESIDUAL PSI <u>89 P.S.I.</u>	ELEVATION _____	PROOF FLOW _____ GPM			
	GPM FLOWING <u>850 G.P.M.</u>	LOCATION <u>IN 8" WATER MAIN</u>		SOURCE OF INFORMATION <u>CITY OF ALBUQ. - SEE LETTER.</u>		
	ELEVATION <u>5297 FT.</u>					

COMMODITY STORAGE	COMMODITY _____ CLASS _____ LOCATION _____	
	STORAGE HEIGHT _____ AREA _____ AISLE WIDTH _____	
	STORAGE METHOD: SOLID PILED _____ % PALLETIZED _____ % RACK _____ %	
	<input type="checkbox"/> SINGLE ROW <input type="checkbox"/> CONVENTIONAL PALLET <input type="checkbox"/> AUTOMATIC STORAGE <input type="checkbox"/> ENCAPSULATED	
	<input type="checkbox"/> DOUBLE ROW <input type="checkbox"/> SLAVE PALLET <input type="checkbox"/> SOLID SHELVING <input type="checkbox"/> NON-ENCAPSULATED	
<input type="checkbox"/> MULTIPLE ROW <input type="checkbox"/> OPEN <input type="checkbox"/> ENCAPSULATED		
RACK	FLUE SPACING IN INCHES	CLEARANCE FROM TOP OF STORAGE TO CEILING
	LONGITUDINAL _____ TRANSVERSE _____	_____ FT. _____ IN.
HORIZONTAL BARRIERS PROVIDED _____		

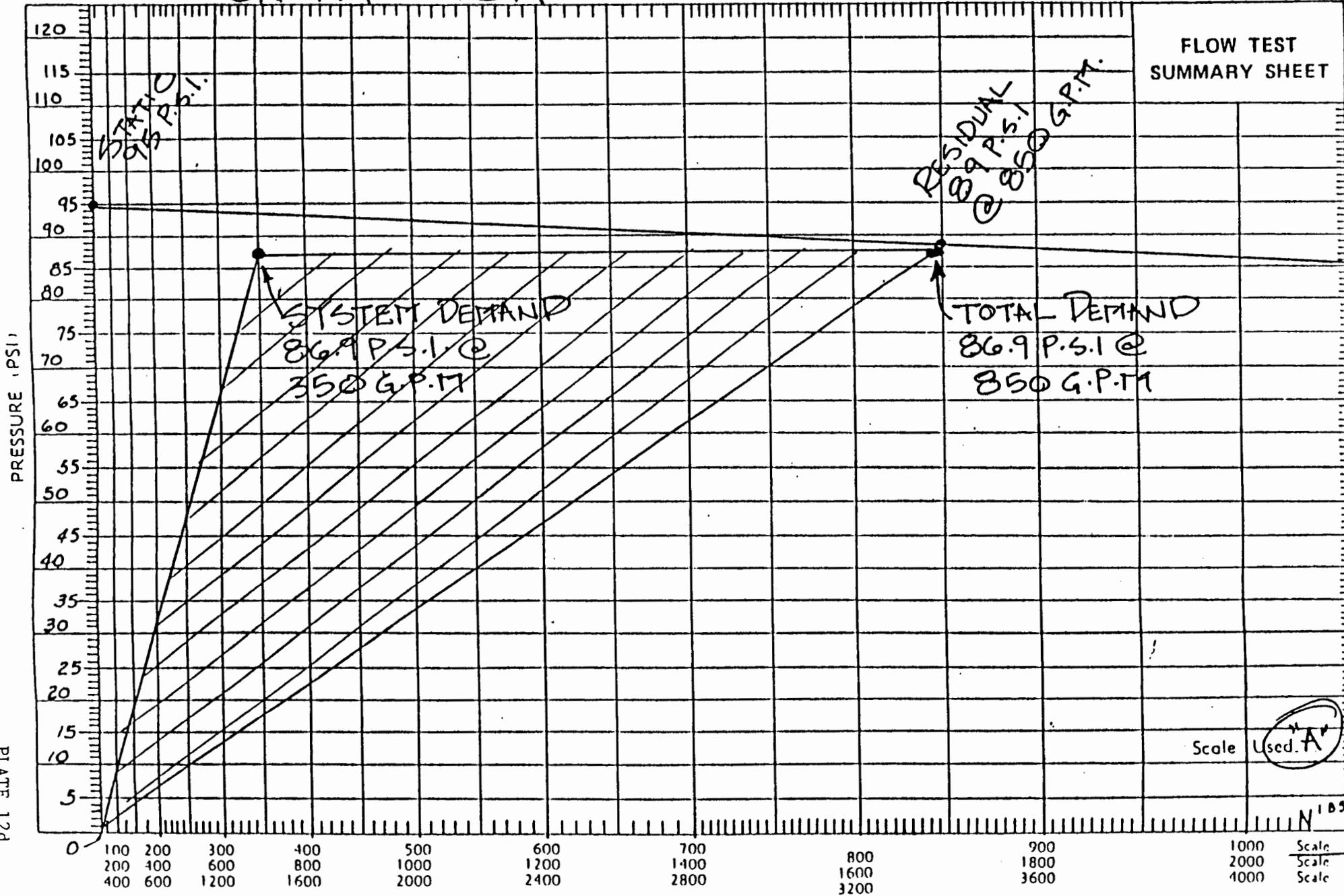
NOZZLE IDENT. AND LOCATION	FLOW IN G.P.M.	PIPE SIZE	PIPE FITTINGS AND DEVICES	EQUIV. PIPE LENGTH	FRICITION LOSS P.S.I./FOOT	PRESSURE SUMMARY	NORMAL PRESSURE	NOTES	REF. STEP
44	Q 25.5	1"	SCH 40	L 10	.285	Pt 21.0	Pt	C=100	
				F —		Pe —	Pv		
				T 10		Pf 2.85	Pn		
43	Q 52.8	1/4"		L 10	.291	Pt 23.85	Pt		
				F —		Pe —	Pv		
				T 10		Pf 2.91	Pn		
42	Q 51.8	1/4"		L 10	.653	Pt 26.76	Pt		
				F —		Pe	Pv		
				T 10		Pf 6.53	Pn		
41	Q 114.1	1/2"	T=8	L 2.33	.567	Pt 33.29	Pt	0-9" X .433 (P=)	
			E=4	F 12.0		Pe .32	Pv		
				T 14.33		Pf 8.13	Pn		
40	Q 114.1	2 1/2"	T.W	L 10	.052	Pt 41.74	Pt	@ X-MAIN	
				F —		Pe —	Pv		
				T 10		Pf .52	Pn		
39	Q			L		Pt 42.26	Pt	@ POINT 30	
				F		Pe	Pv		
				T		Pf	Pn		
38	Q 25.5	1"	E=2	L 10.5	.285	Pt 21.0	Pt		
				F 2		Pe —	Pv		
				T 12.5		Pf 3.6	Pn		
37	Q 25.5	1"	E=2	L .5	.285	Pt 21.0	Pt		
			T=5	F 7		Pe —	Pv		
				T 7.5		Pf 2.14	Pn		
36	Q 51.8	1/4"		L 10	.281	Pt 23.14	Pt 24.6	Q UP= 124.6 X 25.5 23.14	
				F —		Pe —	Pv		
				T 10		Pf 2.81	Pn		
35	Q 79.6	1/4"		L 10	.615	Pt 27.41	Pt	ADD TYP. LINE SEE 37 TO 33 QUP. 1/27.41 X 25.5 23.14	
				F —		Pe	Pv		
				T 10		Pf 6.15	Pn		
						Pt 33.56			

NO.	NOZZLE IDENT. AND CATION	FLOW IN G.P.M.	PIPE SIZE	PIPE FITTINGS AND DEVICES	EQUIV. PIPE LENGTH	FRICITION LOSS P.S.I./FOOT	PRESSURE SUMMARY	NORMAL PRESSURE	NOTES	REF. STEP
31		Q 30.7	1 1/2	E=4	L 2.2	.531	Pt 33.56	Pt	ADD TYP. LINE SEE 37-33 Q-UP $\sqrt{\frac{33.56}{25.5}} = 3.14$	
		Q 110.3		T=8	F 12		Pe .25	Pv		
32		Q 114.1	T.W		L 11	.180	Pt 41.35	Pt 42.26	Q 32 ADD G.P.M. + HIGHEST PSI = 42.26	
		Q 224.4	2 1/2	F —			Pe	Pv		
33		Q			L		Pt 44.24	Pt	Q 20	
		Q		F	Pe		Pv			
		Q		T	Pf		Pn			
34	K=5.6	Q	1"		L 10	.285	Pt 21.0	Pt		
		Q 25.5		F —	Pe —		Pv			
		Q		T 10	Pf 2.85		Pn			
23	K=5.6	Q 27.3	1 1/4		L 10	.291	Pt 23.85	Pt		
		Q 52.8		F —	Pe		Pv			
		Q		T 10	Pf 2.91		Pn			
22	K=5.6	Q 29.0	1 1/4		L 10	.653	Pt 26.76	Pt		
		Q 31.8		F —	Pe		Pv			
		Q		T 10	Pf 6.53		Pn			
21	K=5.6	Q 32.3	1 1/2	T=8	L 2.0	.567	Pt 33.29	Pt		
		Q 114.1		F 4	Pe .07		Pv			
		Q		T 6.0	Pf 3.46		Pn			
20		Q			L		Pt 36.76	Pt	Q UP $\sqrt{\frac{41.21}{36.76}} \times 114.1$ 125.2	
		Q		F	Pe		Pv			
		Q 125.2		T	Pf		Pn			
15		Q 224.4	T.W	DPI=28	L 15.17	.410	Pt 44.24	Pt	10.17 X .433	
		Q 349.6	2 1/2	L _T =8	F 57.0		Pe 4.40	Pv		
		Q	CHECK IT SV=7	T 72.17	Pf 29.59		Pn			
2		Q	C=140	E=24	L 265.0	.0295	Pt 78.23	Pt	Q BASE OF RISER	
		Q 350	4	GV=4	F 23.0		Pe	Pv		
		Q		T 293.0	Pf 8.64		Pn			
		Q 500			L		Pt 86.87	Pt	ADD OUTSIDE HOSE=500 G.P.M.	
		Q		F	Pe		Pv			
		Q 850		T	Pf		Pn			

CONTRACT NAME: SAFETY KLEEN CORP.

NO:

FLOW TEST SUMMARY SHEET



Scale Used: A

Scale A
Scale B
Scale C

FLOW - GPM

PLATE 122

City of Albuquerque

P.O. BOX 1293 ALBUQUERQUE, NEW MEXICO 87103



16 JAN, 1992

MR. RANDAL CARLTON
SOUTHWEST FIRE PROTECTION
1204 FOURTH ST., NW
ALBUQUERQUE, NM 87102

RE: REQUEST FOR WATER FLOW TEST AT SAFETY-KLEEN CORP.
2720 GIRARD AVE., NE

Dear MR. CARLTON,

The City's Computer Model of the master waterline system indicates that the residual hydraulic grade line (HGL) in the 8 inch water line in GIRARD at 850 GPM is 5297 feet above mean sea level (MSL). This is equal to a residual pressure of approximately 89 psig with respect to the waterline elevation of 5091 feet above MSL.

The static pressure in this line is approximately 95 psig.

Cordially,

Stuart Reeder

G. Stuart Reeder, P.E.
Computer Modeling Manager
Utility Development Division
Public Works Department

xc: Sam Cummins, Manager, UDD
wp+3279

PLATE 12e

H-16
ZONE 2E

high solids epoxy mastic

Type:

Epoxy/Amine Modified Polyamide

Description:

Du Pont 25P is a two package (1:1 mix), high solids, high build, VOC Conforming (2.2 lbs./gal), multi-use epoxy mastic coating. It provides outstanding application properties — no induction time, long pot life, can be applied in hot or cold weather, faster dry times, excellent film build on both flat surfaces and edges, goes over hand-cleaned rusty surfaces, can be applied over damp surfaces, most other coatings, and can be top-coated with a wide range of coatings. Its performance and durability are excellent under all conditions and environments.

Suggested Uses:

25P is a multi-use product suitable for application in a variety of situations.

- As a single coat in non-corrosive environments (5-8 mils DFT).
- As a single coat in corrosive environments (10-12 mils DFT).
- As a primer in 2 or 3 coat systems (3-8 mils DFT).
- As an intermediate or mid-coat in a 3 coat system (4-6 mils DFT).
- Provides excellent durability and adhesion over steel, galvanized steel, masonry — concrete, and wood.

Recommended For Immersion Service:

25P is recommended for immersion service in near neutral, fresh, or salt water exposures. It is not recommended for use with potable water. It may be used for fire water towers, ballast tanks, barge and ship hulls, clarifiers, waste water treatment plants, offshore structures, pier pilings and supports, and other areas where a high level of water resistance is required.

Compatibility With Other Coatings:

- 25P is highly compatible with all generic types of coatings.
- It can be applied over most coatings in sound condition such as Ganicin® inorganic/organic zincs, Cortar®

epoxies, Imron® polyurethanes, Du Pont 50P, Dulux® alkyds, vinyls, chlorinated rubbers, acrylics, and latexes. If in doubt, apply a test patch before painting.

- It can be topcoated by itself and other coating types listed above.

Resistance:

Acids:	Very good	Solvents:	Excellent
Alkalis:	Excellent	Abrasion:	Excellent
Humidity:	Excellent	Weather:	Very good

(Will chalk on exterior exposure)

Salts: Excellent
Ammonia: Excellent

Maximum Service Temperature:

200°F (93°C) in continuous service
300°F (148°C) in intermittent heat

Volume Solids (Mixed):

70% Avg.

Weight Solids (Mixed):

82% Avg.

Weight Per Gallon (Mixed):

11.8 Lb. Avg. 5.4 Kg. Avg.

Suggested Film Build (DFT):

— Single Coat — 5-8 mils in non-corrosive environment
10-12 mils in corrosive environment and immersion service

— Primer — 3-8 mils
— Mid Coat — 4-6 mils

Coverage Per Gallon:

1122 Ft² @ 1 mil DFT
224 Ft² @ 5 mils DFT
112 Ft² @ 10 mils DFT

Gloss:

Satin Finish

Colors:

Standard — White, Cirrus Gray, Shale Gray, Clay Tan, Red Oxide, Aluminum
Custom Color — See Color Spectrum Color Wheel

high solids epoxy mastic

Flash Point (Tag Closed Cup):

25P Bases > 100°F
VF-525 < 73°F

Surface Preparation:

For atmospheric service an SSPC-SP-6 (Commercial) is preferred for optimal performance. If not possible or practical, then hand tool clean to an SSPC-SP-2 or power tool clean to an SSPC-SP-3. For immersion service a SSPC-SP-5 is required.

Activator:

Add 1 part VF-525 Activator to 1 part 25P Base. Mix until thoroughly blended. You may begin painting immediately — there is no induction time.

Pot Life:

8 hours at 70°F-90°F when reduced 15% by volume with Y-32035 or RTO1P thinner.

Shelf Life:

12 Months Minimum

Reduction:

2-5% of Y-32035 is required under normal conditions. For maximum pot life, reduce 15% by volume with Y-32035 or RTO1P. Use T-8054 thinner in hot or windy conditions for spray application. Reduce 10-15% with RTO1P thinner when applying by roller or brush in hot or windy conditions. If more than 25% reduction is required, consult your local Du Pont representative.

Application Thinners:

Normal Conditions — Y-32035
Hot or Windy Conditions — T-8054 (spray)
Hot or Windy Conditions — RTO1P (roll or brush).

Clean Up Thinners:

T-8054 or MEK

Packaging:

1 & 5 Gallon Containers

Shipping Weight (lbs.):

	BASE	ACTIVATOR
1 Gallon Container	14	11
5 Gallon Container	68	55

Application Conditions:

Do not apply if material, substrate, or ambient temperature is below 35°F (2°C) or above 100°F (43°C).

Dry Times (Hours):

@ 5 mils DFT 50% R.H.

	50°F (10°C)	70°F (21°C)	90°F (32°C)
To Touch	3-4	2-3	1-2
To Handle	8	4	2
To Recoat	5	3	2
Full Cure	14 Days	7 Days	4 Days

Application Equipment:

Apply by brush, roll, or spray.
ROLL: ¼"-½" lambs wool or synthetic roll cover such as One Coater. Keep roll wet. Roll in one direction, rewet, then cross roll.

Air Spray:

	Binks	DeVilbiss	Graco
Spray Gun:	#18 or #62	JGA502 or MBC510	800 or 900
Fluid Nozzle:	66 or 67	E or D	04 or 086
Air Cap:	66 or 67PB	704, 765 or 78	02, 03 or 952

Airless Spray:

Pump: 30:1 Bulldog (Graco)
High Pressure Filter: 60 mesh
Fluid Hose: ¾" x 150' max.
Note: If more than 100', use 45:1 King and to ½" x 100' plus ¾" x 50'
Airless Gun: Graco 207945, 208663
Tips: .015"-.027"
Minimum pressure to avoid fingering: 2000 psi

Additional Comments:

- VOC = 2.2 lbs./gal. (avg.)
- Custom Color Bases are short filled to allow for colorant addition.
1LB25P — Light Base (124 oz./gal.)
2MB25P — Medium Base (120 oz./gal.)
3DB25P — Deep Base (116 oz./gal.)
4NB25P — Neutral Base (112 oz./gal.)
- Consult the Material Safety Data Sheet prior to use.

polyurethane enamels

APPLICATION INSTRUCTIONS

Surface Preparation:

Newly primed surfaces should be clean and dry. If contaminated, detergent/water wash, then blow dry. Previously painted surfaces should have all loose paint removed and the edges feathered. Prime bare spots with appropriate primer.

Activation:

Thoroughly mix 4 parts of enamel, then add 1 part of VG-Y-511 activator while stirring. No induction period is necessary.

Pot Life:

16 hours @ 77°F

Reduction:

No reduction should be necessary. However, if conditions require the addition of thinner, Y-32035 (or Y-32401 in hot or windy weather) may be used up to 20% by volume. If more than 20% is required, contact your Du Pont representative for specific recommendations.

Storage Conditions:

Store in a dry, well ventilated area. Storage temperatures should be between -30°F (-34°C) and 120°F (48°C).

Application Conditions:

Do not apply if material, substrate, or ambient temperature is less than 45°F (7°C) or above 110°F (43°C). For best results, temperature should be between 60°F (16°C) and 85°F (35°C). The substrate must be at least 5°F (3°C) above the dew point. Relative humidity should be below 90%.

*See additional comment #2

Cure Times At Recommended Thickness
(Hours @ 50% R.H.):

	50°F	70°F	90°F
Dry to Touch	24	6	2
Dry to Handle	120	48	24
Dry to Recoat*	48	16	2
Full Cure	300	168	72

*See additional comment #3

Application Equipment:

Apply by brush, roll or spray.

Roll:

¼"-¾" lambs wool or synthetic roll cover such as One Coater®. Keep roll wet. Roll in one direction, rewet, then cross roll.

Conventional Air Spray:

	Binks	DeVilbiss	Graco
Spray Gun:	18	JGA502 or MBC510	800
Fluid Nozzle:	66	E or F	03 or 04
Air Cap:	63PB	704 or 765	02, 021 or 03

Airless Spray:

Pump: 30.1 Bulldog (Graco)
High Pressure Filter: 60 Mesh
Fluid Hose: ¾" x 150' max.
Airless Gun: Graco 208663
Tips: .015"-.025"
Minimum pressure to avoid fingering:
2000 psi

Air Assisted Airless:

Pump: 12:1 Senator (Graco)
Gun: 217292
Tips: .023"-.029"

Additional Comments:

1. Formulated with Rule 66 non-photochemically reactive solvents.
2. For application between 35°F-45°F, add 189 S or VH-Y-691 at the rate of 4 oz./activated gallon.
3. May be recoated by spray when tack free.
4. Some colors are certified by the U.S.D.A. for use in meat and poultry processing. Check with your Du Pont representative for the current list of approved colors.
5. Moisture or condensation on uncured material will decrease gloss.

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polyurethane enamels

Type:

A 2-Package Aliphatic Polyurethane

Description:

A polyurethane enamel based on patented Du Pont resin technology to be mixed with VG-Y-511 activator for use over Imron®, Du Pont 25P, Corlar®, or Dulux® primers and enamels. May also be applied directly over itself without special surface preparation or over old coatings (including alkyds) that are in sound condition. Imron® 326 is designed for areas requiring a topcoat with long lasting gloss and color retention along with a high degree of chemical, solvent, and abrasion resistance.

Suggested Uses:

The unique properties of Imron® 326 enamel topcoat make it an excellent choice for industrial, commercial, institutional, and architectural applications where long lasting beauty, durability, and ease of use are desired. Imron® 326 is recommended for interior or exterior use on structural steel, walls, ceilings, doors, trim, piping, tanks, pumps, motors, equipment, stairs, towers, handrails, siding, etc. in a large number of industries and exposures, some of which are:

- Chemical Plants
- Oil Refineries
- Pulp & Paper Mills
- Food Processing Plants
- Power Plants
- Steel Mills
- Mining
- Waste Treatment Facilities
- Bridges
- Offshore structures
- Port Authorities
- Office Buildings
- Schools
- Shopping Centers

Not Recommended For:

Immersion service

Compatibility With Other Coatings:

Imron® 326 can be applied over most coatings in sound condition such as Du Pont 25P Epoxy Mastic, Imron® Polyurethanes, Corlar® Epoxies, Dulux® Alkyds, acrylics, and latexes. If in doubt, apply a test patch before painting.

Dry Film Characteristics:

Acids — Excellent	Solvents — Very Good
Alkalis — Excellent	Color and Gloss
Humidity — Excellent	Retention — Excellent
Salts — Excellent	Abrasion and Mechanical
Weather — Excellent	Abuse — Excellent

Maximum Service Temperature:

200°F (93°C) in continuous service.
300°F (148°C) in intermittent heat.
Some yellowing of light colors may occur at elevated temperatures.

Volume Solids (Mixed):

38% Avg.

Weight Solids (Mixed):

50% Avg.

Weight Per Gallon (Mixed):

10.5 Lb. Avg. 4.8 Kg. Avg.

Suggested Film Thickness:

5 mils (125 μm) wet 2 mils (50 μm) dry

Theoretical Coverage Per Gallon*:

610 Ft² (14.9m²/L) @ 1 mil
305 Ft² (7.5m²/L) @ 2 mils
suggested dry film thickness

*Material losses during mixing and application will vary and must be taken into consideration when estimating job requirements.

Gloss:

High

Colors:

See color card for availability of standard colors. For special colors, contact your Du Pont representative.

Flash Point (Tag Closed Cup):

20°-73°F (-7° to 23°C)

Shelf Life:

12 months minimum

Application Thinners:

Y-32035 or Y-32401

Clean Up Thinners:

Y-32035 or MEK

Packaging:

Pigmented portion — 1's & 5's 80% full
Activator — Quarts: 80% Full
Gallons: Full

Shipping Weight (Lbs.):

Enamel	Activator
1 gallon containers — 9	1 quart containers — 2
5 gallon containers — 46	1 gallon containers — 8



Sikaflex®-1a

Elastomeric sealant/adhesive

Technical Data



Description:	Sikaflex-1a is a premium-grade, high-performance, moisture-cured, 1-component, polyurethane-base, non-sag elastomeric sealant.
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Where to Use:	<ul style="list-style-type: none">● Designed for all types of joints where maximum depth of sealant will not exceed ½ in.● Excellent for small joints and fillets...windows, door frames, reglets, flashing, and many construction adhesive applications.● Suitable for vertical and horizontal joints; readily placeable at 40F.● Has many applications as an elastic adhesive between materials with dissimilar coefficients of expansion.
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Advantages:	<ul style="list-style-type: none">● Easy, low-cost, ready to use.● Eliminates time, effort, and equipment for mixing, filling cartridges, pre-heating or thawing, and cleaning of equipment.● High elasticity - cures to a tough, durable, flexible consistency with exceptional cut- and tear-resistance.● Excellent adhesion - bonds to most construction materials...without primer in most cases.● Long life.● Excellent resistance to aging, weathering.● Proven in tough climates around the world.● USDA-approved: chemically acceptable to the U.S. Department of Agriculture for use in meat and poultry processing area.● Odorless, non-staining..● Paintable with water-, oil-, and rubber-base paints.● Jet fuel resistant.● Meets Federal Specification TT-S-00230C, Type II, Class A.● Meets ASTM C-920, Type S, Grade NS, Class 25.● Meets Canadian Standard 19-GP-16A, Type II.● EPA-approved for potable-water contact.● Urethane-based, suggested by EPA for radon reduction.
--------------------	--

Coverage:	10.3-fl-oz cartridge seals 12.4 lineal ft of ½- x ¼-in. joint. 20-fl-oz uni-pac sausage seals 24 lineal ft of ½- x ¼-in. joint.
------------------	--

Packaging:	Disposable 10.3-fl-oz, moisture-proof composite cartridges, 24/case, and uni-pac sausages, 20-fl-oz, 20/carton; Available on special order 1.8- and 4.5-gal pails, 50-gal drums, and 10.3-fl-oz uni-pac sausages.
-------------------	---

Typical Technical Data Sikaflex-1a:
(Material and curing conditions 73F and 50% R.H.)

Colors: White, colonial white, aluminum gray, limestone, black, dark bronze, capitol tan. Special architectural colors on request.

Shelf Life:	10.3-fl-oz cartridges	12 months
	10.3- and 20-fl-oz uni-pac sausages	12 months
	1.8-gal pails	4 months
	4.5-gal pails	4 months
	50-gal drums	4 months

Storage Conditions: Store at 40-95F. Condition material to 65-85F before using.

Application

Temperature: 40 to 100F. Sealant should be installed when joint is at mid-range of its anticipated movement.

Service Range: -40 to 167F

Curing Rate:	Tack-free Time	6 to 8 hours (TT-S-00230C)
	Tack-free to touch	3 hours
	Final cure	5 to 8 days

Recovery >90%

Shore A Hardness (ASTM D-2240):

21 day 40± 5

Tensile Properties (ASTM D-412):

21 day	Tensile Stress	140 psi	
	Elongation at Break	700%	
	Modulus of Elasticity	25%	40 psi
		50%	60 psi
100%		80 psi	

Lap-Shear Strength (ASTM D-1002), modified, glass substrate

21 day	50F	120 psi
	73F	125 psi
	122F	125 psi

Adhesion in Peel (TT-S-00230C):

Substrate	Peel Strength	Adhesion Loss
Aluminum	25 lb	10%
Glass	20 lb	5%
Concrete	20 lb	0%

Weathering

Resistance: Excellent

Ozone Resistance: Exceptional

Chemical Resistance: Good resistance to water, diluted acids, and diluted alkalines. Consult Technical Service for specific data.

Radon Reduction: Approximately 97% reduction in radon. Independent laboratory evaluation. Actual results available upon request, consult Technical Service.

How To Use

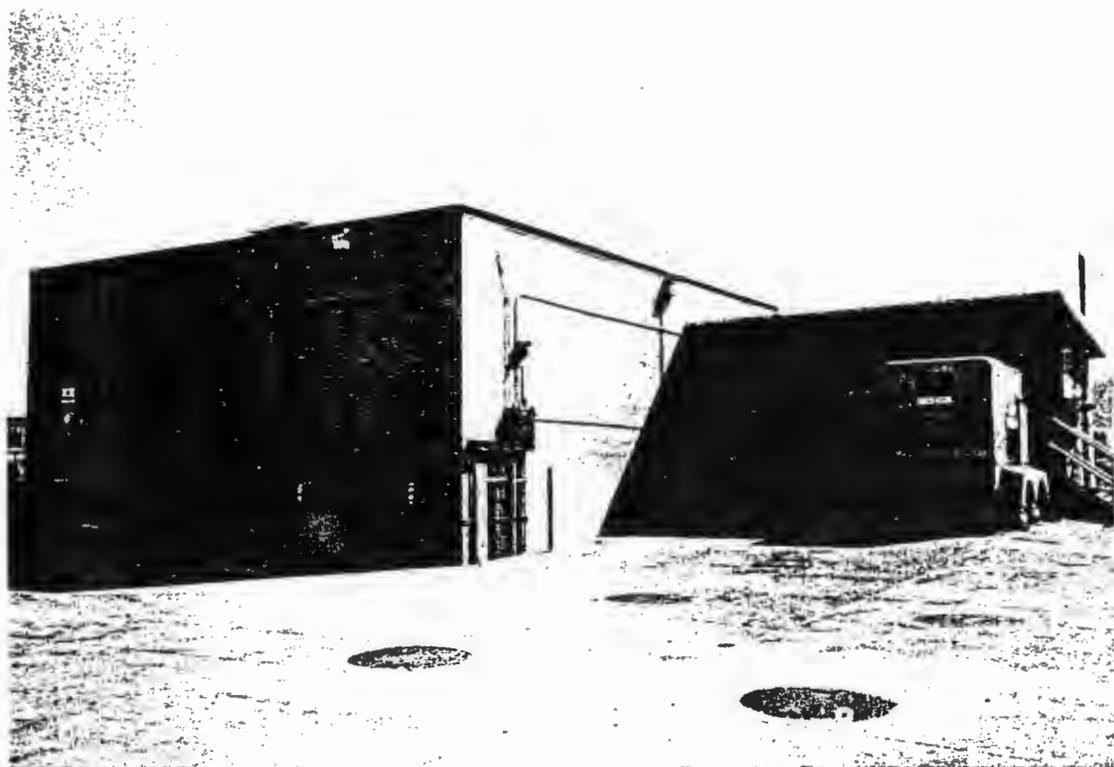
Surface Preparation: Clean all surfaces. Joint walls must be sound, clean, dry, frost-free, and free of oil and grease. Curing compound residues and any other foreign matter must be thoroughly removed. Install bond breaker tape or backer rod to prevent bond at base of joint.

Priming: Priming is not usually necessary. Most substrates only require priming if testing indicates a need or where sealant will be subjected to water submersion after cure. Consult Sikaflex Primer Technical Data Sheet or Technical Service for additional information on priming.

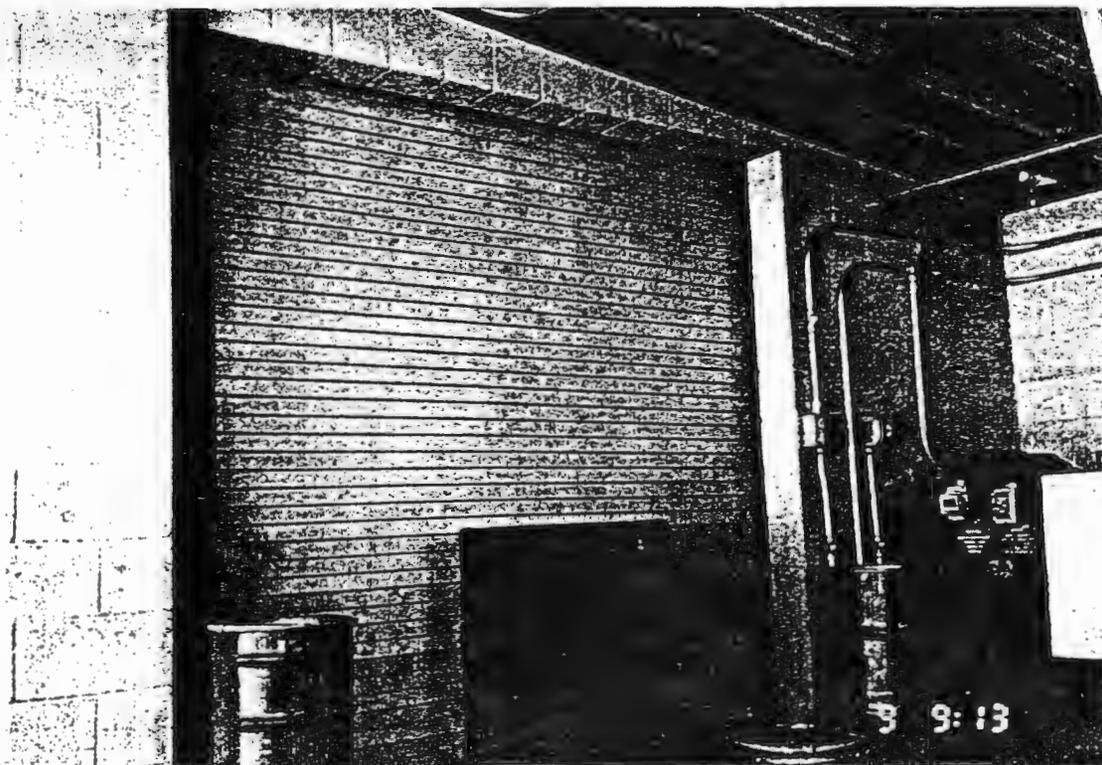
Application: Recommended application temperatures: 40-100F. For cold weather application, store units at approximately 70F; remove just prior to using. For best performance, Sikaflex-1a should be gunned into joint when joint slot is at mid-point of its designed expansion and contraction. Place nozzle of gun into bottom of the joint and fill entire joint. Keep the nozzle in the sealant, continue on with a steady flow of sealant preceding the nozzle to avoid air entrapment. Avoid overlapping of sealant to eliminate entrapment of air. Tool as required. For use in horizontal joints in traffic areas, the absolute minimum depth of the sealant is ½ in. and closed cell backer rod is recommended over open cell to offer greater support.

Limitations:

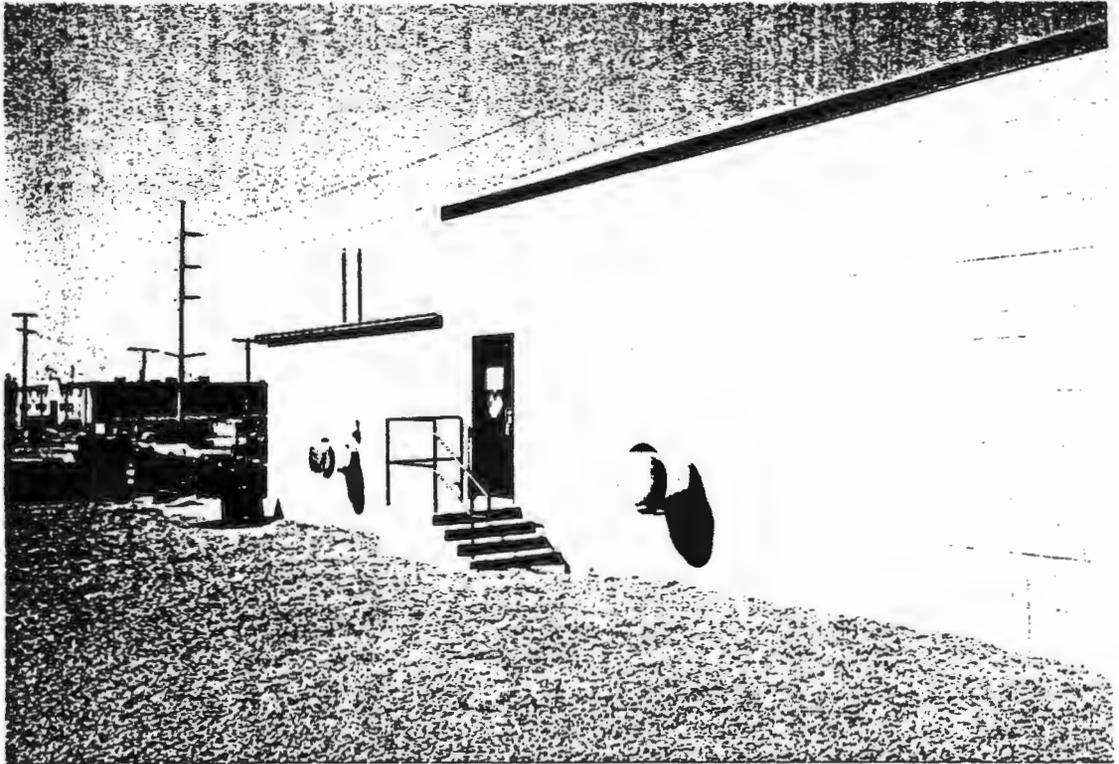
- Allow 1-week cure at standard conditions when using Sikaflex-1a in total water-immersion situations.
- Avoid exposure to high levels of chlorine.
- Maximum depth of sealant must not exceed ½ in.; minimum depth is ¼ in.
- Maximum expansion and contraction should not exceed 25% of average joint width.
- Do not cure in the presence of curing silicone sealants.
- Avoid contact with alcohol, and other solvent cleaners, during cure.
- Do not apply when moisture-vapor-transmission condition exists, from the substrate, as this can cause bubbling within the sealant.
- Use opened cartridges and uni-pac sausages the same day.
- When applying sealant, avoid air-entrapment.
- Since system is moisture-cured, permit sufficient exposure to air.
- White color tends to yellow slightly when exposed to ultra-violet rays.
- The ultimate performance of Sikaflex-1a depends on good joint design and proper application with joint surfaces properly prepared.
- Minimum depth of sealant in horizontal joints subject to traffic is ½ in.



FRONT OF H-3 BUILDING (RETURN AND FILL SHELTER AT RIGHT)



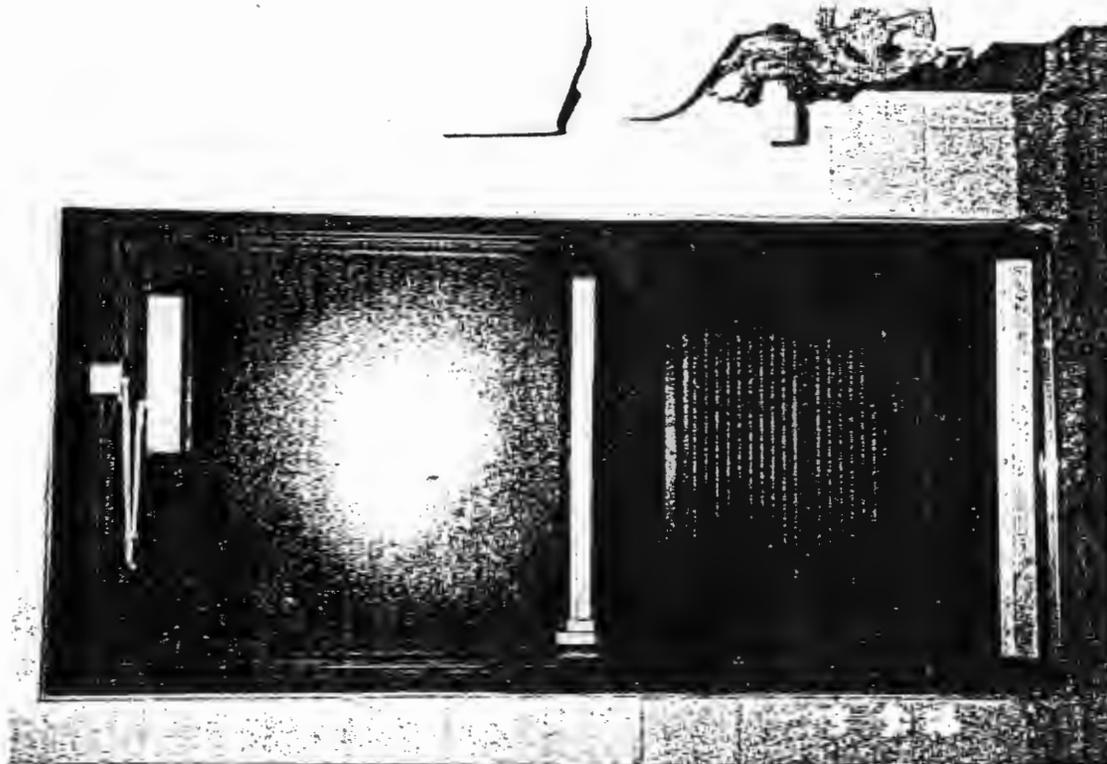
THREE HOUR FIRE DOOR



REAR OF H-3 BUILDING (VENTILATOR FAN AT RIGHT)



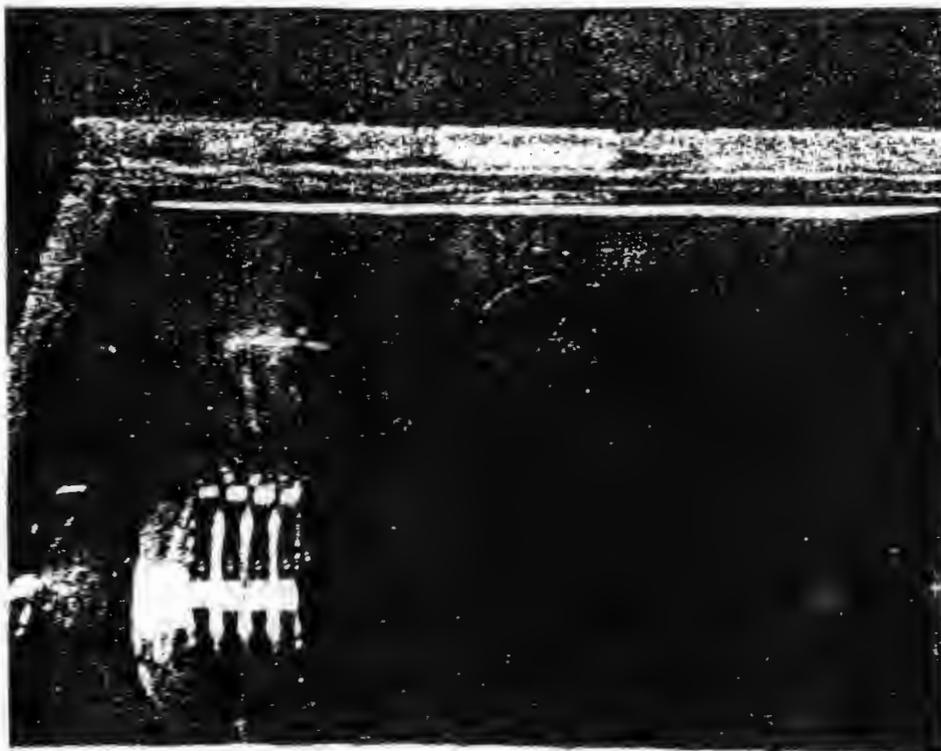
FRONT OF H-3 BUILDING (EMERGENCY POWER PANEL, ALARM,
AIR COMPRESSOR FOR SPRINKLER SYSTEM, AND
FIRE DEPARTMENT HOSE CONNECTION AT LEFT)



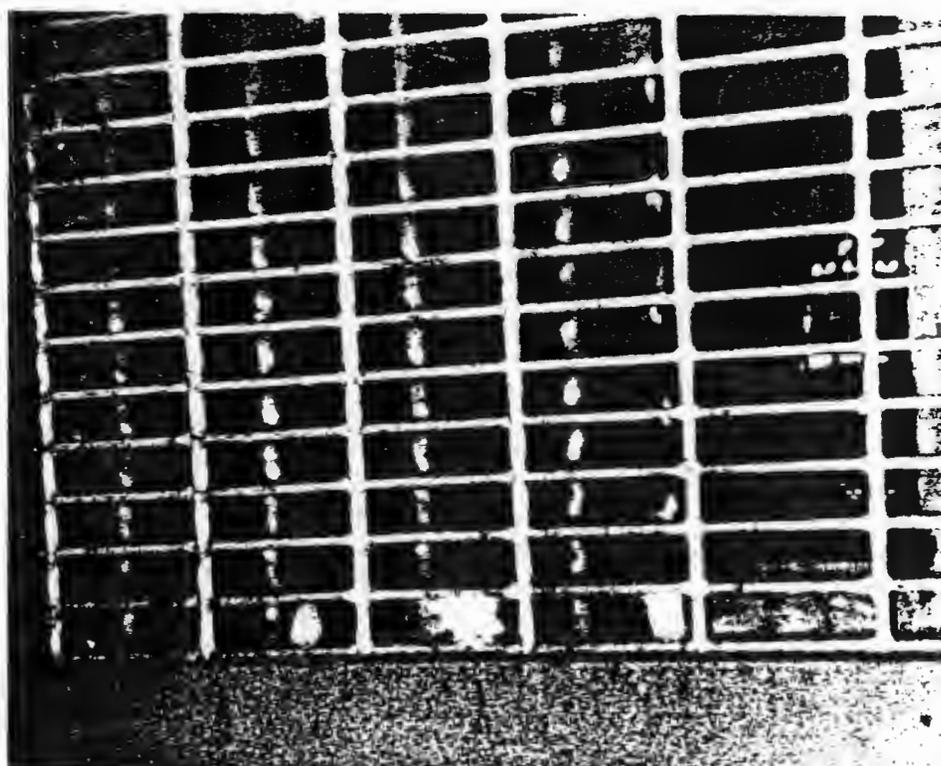
EXTERIOR SWINGING DOOR W/AUTOMATIC CLOSER, PANIC BAR, AND TIGHT SEAL AT BOTTOM (SPRINKLER SYSTEM RISER AT RIGHT)



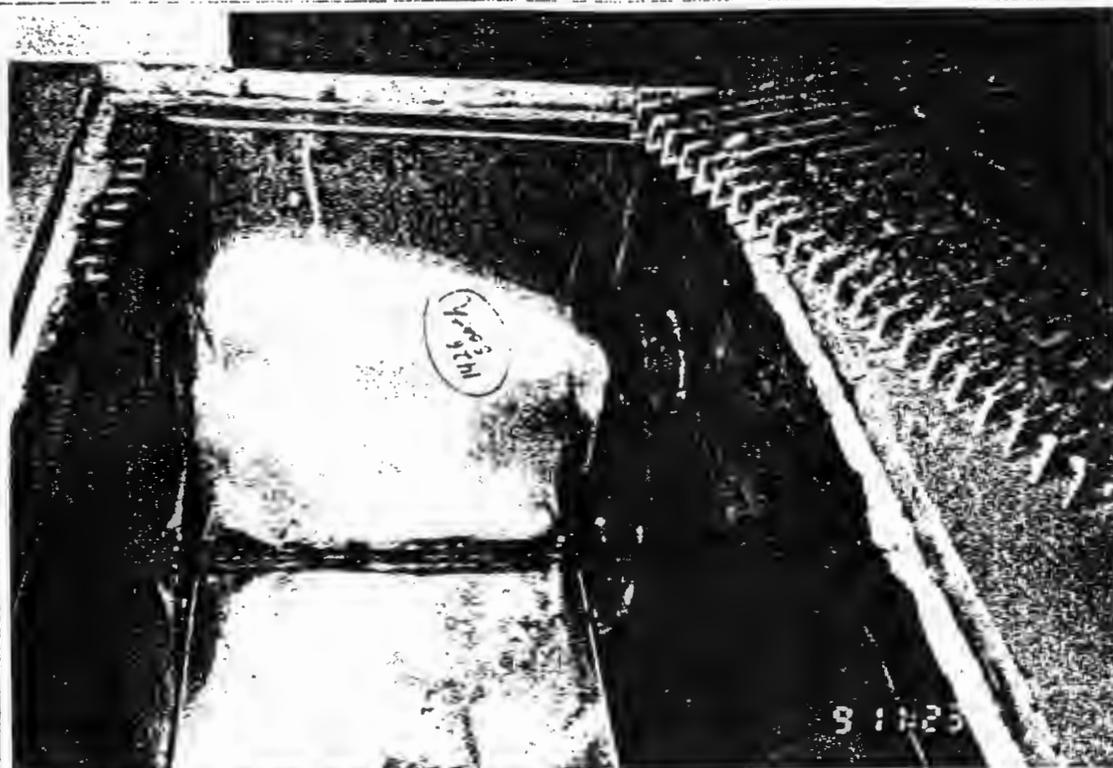
INTERIOR OF CENTER TRENCH (OUTLET PIPE TO FIREWATER CONTAINMENT TANK AT LEFT. INLET PIPE FROM SOUTH DOOR TRENCH AT RIGHT) (PICTURE TAKEN PRIOR TO MODIFICATION OF OUTLET PIPE)



OUTLET PIPE (AFTER MODIFICATION) FROM CENTER TRENCH
TO FIREWATER CONTAINMENT TANK



SHEET METAL FASTENED TO BOTTOM OF CENTER TRENCH GRATE
(COVERS MOUTH OF OUTLET PIPE)



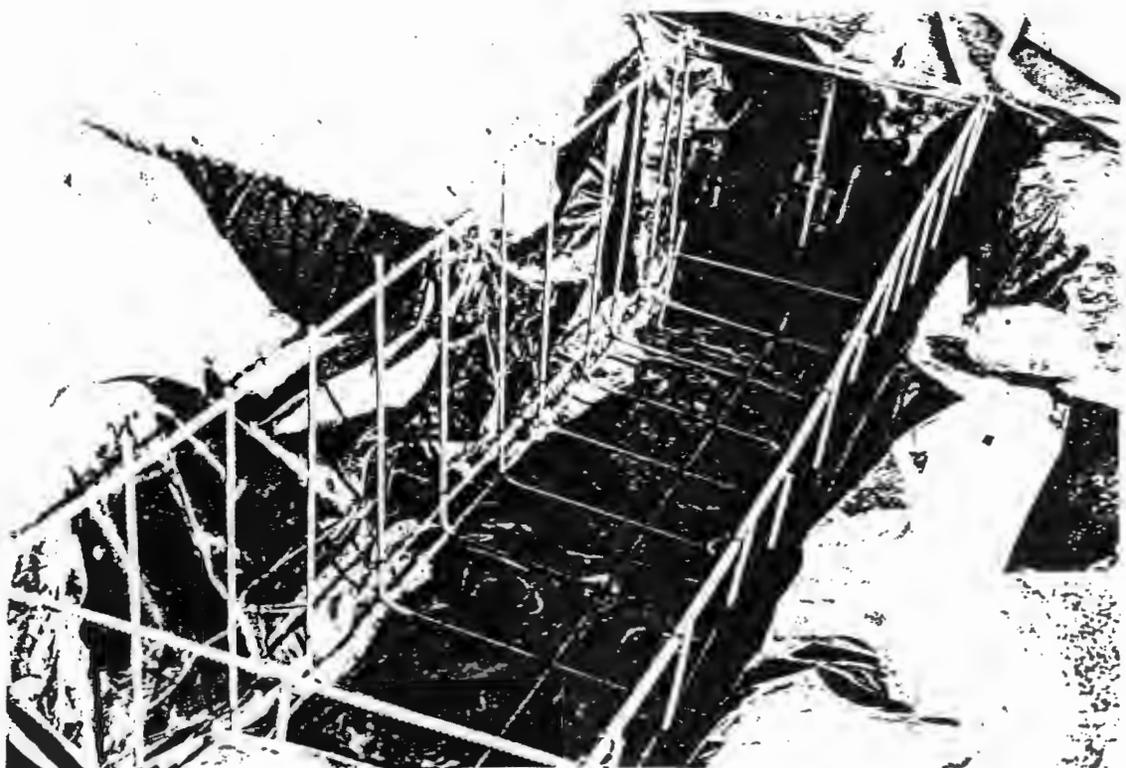
INTERIOR OF SOUTH DOOR TRENCH
(OUTLET PIPE TO CENTER TRENCH)
AT RIGHT)



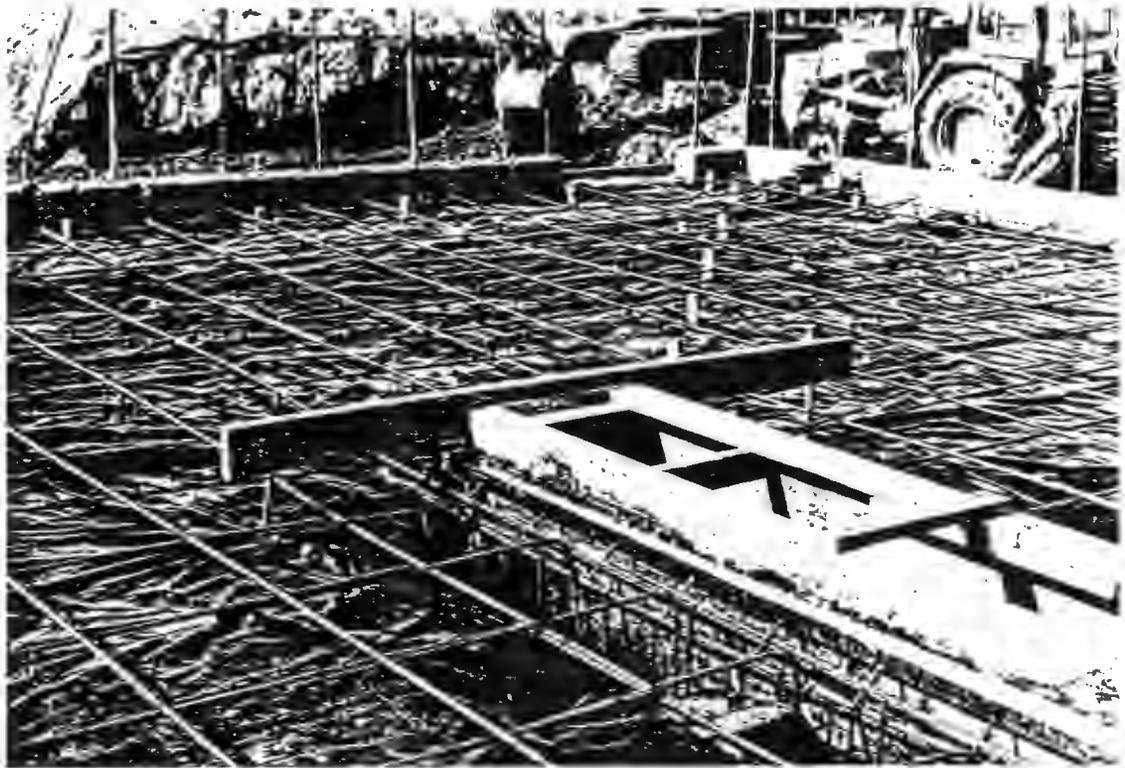
AUTOMATIC SPRINKLER SYSTEM
RISER



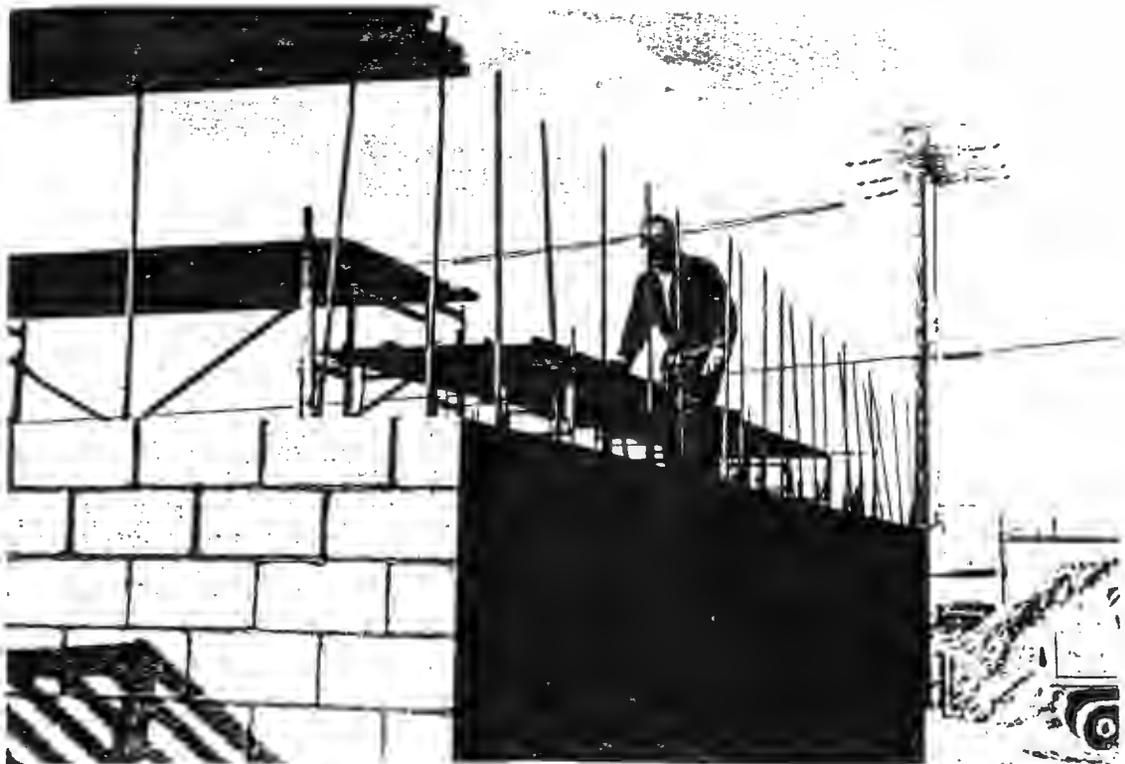
FIRE DEPARTMENT CONNECTION (AT NW CORNER OF H-3 BUILDING)



FLOOR TRENCH REINFORCEMENT



H-3 BUILDING FLOOR SLAB REINFORCEMENT



REINFORCEMENT IN CONCRETE MASONRY WALLS

Certificate of Occupancy

City of Albuquerque
Land Resources and Regulation Department
Code Administration Division

This Certificate, issued pursuant to the requirements of Section 308 of the Albuquerque Uniform Administrative Code, certifies that at the time of issuance this structure was in compliance with the above code and other technical codes and city ordinances regulating building construction or use.

Building Address 2720 Girard Blvd. NE Zip _____

Portion of Building Storage Building (Return & Fill Shelter Only)

Use Classification Commercial (Liquid Storage) Bldg. Permit No. 9109460

Occupancy Group H, 3/H, 2 Type of Construction V-N Land Use Zone M-1

Owner of Building Safety-Kleen Corporation Address 2720 Girard Blvd. NE Albuquerque, NM 87111

David L. Steele

CHIEF BUILDING OFFICIAL

By: Vickie Chavez

Date: April 8, 1992

PLATE 23

POST IN A CONSPICUOUS PLACE

**NOTE: PLEASE INSERT THE FOLLOWING TWO PAGES INTO APPENDIX F
AS LISTED IN THE TABLE OF CONTENTS (I.E., FIRST TWO PAGES
OF APPENDIX F). PLEASE REMOVE CORRESPONDING PAGES
FROM PERMIT APPLICATION DATED NOVEMBER 9, 1990.**

EMPLOYEE POSITION FUNCTIONS DURING AN EMERGENCY

<u>Title</u>	<u>Emergency Function</u>
Branch Manager	Emergency Coordinator Notify Environmental Affairs Department Notify Emergency Agencies, if necessary
Alternate Emergency Coordinator: Any trained employee designated to this position by the emergency coordinator	Supervise Evacuation <u>Apply First Aid</u>
Sales Representatives	Retain, contain or slow the flow of solvent Shut off electricity, <u>secure building</u> <u>Gather Fire Extinguishers</u> <u>Gather Absorbents</u>
Branch Secretaries	<u>Apply First Aid</u> <u>Assist in Notifying Emergency Agencies</u>
Warehouseperson	<u>Gather Drums and Shovels</u>

EMERGENCY INFORMATION

A. Facility Emergency Coordinator

Name: Ralph Ondatie

Home Address: 9900 Spain NE, Apt. G2034
Albuquerque, New Mexico 87111

Telephone: Office: 505/884-2277
Home: 505/275-3138
Pager: 505/766-4288

Alternate Coordinators

1) Scott Hesseltine

1720 Ira NE
Rio Rancho, New Mexico 87124

Office: 505/884-2279
Home: 505/892-7389
Pager: 505/843-5495

2) Adrienne Osborne

11713 Rosemont NE
Albuquerque, New Mexico 87124

Office: 505/884-2277
Home: 505/296-6267

B. Emergency Notification Phone Number

a. Internal:

Safety-Kleen Environmental Health and Safety Department
24 Hour Emergency Number: 708/888-4660

b. External:

1. National Response Center
24 Hour Emergency Number: 800/424-8802

2. New Mexico Health and Environment Department
505/827-9329

C. Emergency Team to be Notified

<u>UNIT</u>	<u>TELEPHONE NUMBER</u>
a. <u>Albuquerque Fire Dept.</u>	<u>911 or 505/243/6601</u>
b. <u>Responding Station #8</u> <u>4201 Menaul N.E.</u>	<u>505/888-8100</u>
c. <u>Albuquerque Police Dept.</u>	<u>911 or 505/768-1986</u>
d. <u>Presbyterian Hospital</u>	<u>505/841-1111</u>
e. <u>Rinchem</u>	<u>505/345-3655 or</u> <u>505/883-4232 (24 hr.</u> <u>Central Security or</u> <u>505/766-0939 (24 hr. Pager)</u>

BRANCH INTERNAL PAGING SYSTEM - PUSH "INTERCOM" THEN "6"

NOTE: THE FOLLOWING PAGES ARE TO BE INSERTED IN APPENDICES F AND G. PLEASE REMOVE THE POSITION DESCRIPTIONS FOR BRANCH MANAGER, SALES REPRESENTATIVE AND WAREHOUSEMAN FROM THE NOVEMBER 9, 1990 PERMIT APPLICATION. PLEASE INSERT THE JOB DESCRIPTIONS FOR BRANCH SALES MANAGER.

Safety-Kleen Corp.®

Field Management Position Description

Position Title:

RESOURCE RECOVERY BRANCH MANAGER

Policy Date _____

Prepared By J. Pelletier

C. Sprague

Approved by _____

Reporting Relationships:

Reports to Regional Manager of Sales

Oversees all branch personnel

Qualifications:

High school graduate (minimum) with Safety-Kleen sales experience. Applicant must exhibit excellent speaking and writing skills, leadership abilities, and must successfully complete the required testing procedure (including participation in the Leadership Development Program).

Position Overview:

The Resource Recovery Branch Manager has overall responsibility for facility operations and profitability, and directs sales and service activities within the geographic area defined by Corporate Marketing.

Responsibilities :

- ⇒ Presents a proper example to all assigned personnel in regard to the Corporate Ethics Policy.
- ⇒ Plans, directs, and controls the activities of all assigned personnel.
- ⇒ Trains all branch administrative, management, and sales personnel.
- ⇒ Complies with all Company policies related to branch activities.
- ⇒ Assists or accompanies Sales Representatives during their sales activities, when necessary.
- ⇒ Accurately tabulates daily sales and inventory figures and reports them to the Regional Manager and/or Corporate office.
- ⇒ Maintains and assumes financial responsibility for inventories of solvents, allied products, assigned vehicles, and other capital equipment.

- ⇒ Provides for regular inspections of the facility, equipment, and records in compliance with Company and governmental regulations.
- ⇒ Represents Safety-Kleen Corp. in local community affairs and public relation activities.
- ⇒ Communicates with Corporate Technical Services and Environmental, Health and Safety Departments, and implements necessary actions or plans for regulatory compliance.
- ⇒ Functions as the primary Emergency Response Coordinator and delegates a secondary Emergency Response Coordinator in case of absence.
- ⇒ Safeguards capital equipment, supplies, customer records and lists and other confidential Company information.

Specific Duties and Authority:

(The Resource Recovery Branch Manager has overall responsibility for branch operations. Duties are to be performed or delegated as the situation warrants to subordinates. The following categories are not prioritized.)

Environmental, Health and Safety

- Assures the proper completion and administration of hazardous waste manifests and associated paperwork (land disposal restriction notices, operating log, waste analysis, and spill reporting)
- Assures the proper management, preparation and shipment of hazardous waste (including packaging, labeling, placarding of vehicles, and transfer and storage procedures)
- Maintains a current Emergency Response and Evacuation Plan
- Conducts safety training and maintains records of such training
- Implements and maintains branch environmental, health, and safety awareness
- Keeps Environmental, Health, and Safety training records current

Sales Management

- Recruits, trains, directs and motivates sales staff
- Develops supervisors
- Schedules and holds weekly sales meetings
- Monitors daily sales activities
- Plans and implements strategies to achieve sales quotas
- Accurately reports and maintains weekly sales production records

REVISED: JUNE 26, 1992

Typical Daily Duties:

1. Perform safety check each day on assigned route truck and replenish products on the truck before beginning daily activity.
2. Contact potential customers for the purpose of selling Safety-Kleen services and allied products.
3. Exchange used solvents with fresh solvent and replenish the inventory of Safety-Kleen's products for existing customers.
4. Make minor repairs of Safety-Kleen's spray cleaners and spot blasters or lease new equipment to the customer.
5. Accurately prepare the necessary paper-work for each service (including all government related documents, labels, or vehicle placards), and bill or credit the customer, as necessary.
6. At the end of each day, return the truck to the branch for cleaning and maintenance, and summarize the day's activities so the supervisor or clerical staff can tabulate the daily figures and forward them to the Corporate office. The offloading of solvents, machines, wastes, and pads, although in some cases this is performed by a warehouseman, is the responsibility of the sales rep. This offloading includes the proper placement in specified areas of the warehouse or flammable drum storage areas.

BRANCH SALES MANAGER

This title includes the following positions:

Branch Industrial Manager

Branch Automotive Manager

Branch Special Markets Manager

Note: Position descriptions for each of the above follows: this position will be filled on an as needed basis at the Albuquerque service center. [June 26, 1992]

Safety-Kleen Corp.®

Branch Middle Management Position

Position Title:

BRANCH INDUSTRIAL MANAGER

Division:

Industrial Services

Policy Date _____
Prepared By J. Pelletier C. Sprague
Approved by _____

Organizational Relationship:

Reports directly to the Resource Recovery Branch Manager and indirectly to Regional Industrial Sales Manager. All Industrial Sales Representatives within assigned territories report directly to the BIM. In branches without a BFM, one or more Branch Secretaries report to the BIM, as assigned by the Resource Recovery Branch Manager.

Qualifications:

High School graduate (minimum) with above average Safety-Kleen route sales experience. Applicant should exhibit leadership abilities, be self-motivated, and pass Company testing. Good reading and letter writing skills are also required.

Primary Focus:

- Develops and maintains industrial account business by presenting and providing the complete Industrial Fluid Recovery Service to customers in assigned territories.

Secondary Focus:

- Trains, motivates and controls the industrial sales staff within the assigned territories.

Safety-Kleen Corp.®

Branch Middle Management Position

Position Title:

BRANCH AUTOMOTIVE MANAGER

Division:

Automotive Services

Policy Date _____

Prepared By J. Pellerier

C. Sprague

Approved by _____

Organizational Relationship:

Reports directly to the Resource Recovery Branch Manager and indirectly to Regional Automotive Sales Manager. All Automotive and Oil Sales Representatives within assigned territories report directly to the BAM. In branches without a BFM, one or more Branch Secretaries report to the BAM, as assigned by the Resource Recovery Branch Manager.

Qualifications:

High School graduate (minimum) with above average Safety-Kleen route sales experience. Applicant should exhibit leadership abilities and be self-motivated, and pass Company testing.

Primary Focus:

- Develops and maintains automotive account business by presenting and providing the complete Automotive Fluid Recovery Service to customers in assigned territories.

Secondary Focus:

- Trains, motivates and controls the automotive sales staff within the assigned territories.

Safety-Kleen Corp.®

Branch Middle Management Position

Position Title:

BRANCH SPECIAL MARKETS MANAGER

Division:

Special Markets

Policy Date _____

Prepared By J. Pelletier

Approved by _____

Organizational Relationship:

Reports directly to the Resource Recovery Branch Manager. All Special Markets Sales Specialists within assigned territories report directly to the BSMM.

Qualifications:

High School graduate (minimum) with above average Safety-Kleen special markets route sales experience. Applicant should exhibit leadership abilities and be self-motivated, and pass Company testing. Attendance of PSM course is desirable.

Primary Focus:

- Develops and maintains Corporate and Branch goals related to special markets by planning, organizing, directing, and controlling all assigned employees.

Secondary Focus:

- In most instances, the BSMM is responsible for personal production within an assigned zone and operates under the guidelines established by the Special Markets Sales Specialist job description. This would include a minimum number of sales calls that would generate a set revenue quota. Branch specific standards would be established by the Regional Special Markets Sales Manager in conjunction with the Resource Recovery Branch Manager.

WAREHOUSEPERSON

JOB DESCRIPTION

Performs duties to assist the sales representatives in loading and unloading the trucks. Performs janitorial duties at the warehouse. Performs specific hazardous waste activities as outlined below.

REPORTS TO:

Branch Manager

QUALIFICATION:

Attended high school

PRINCIPAL RESPONSIBILITIES:

Maintain warehouse in clean and orderly manner.

Assist sales representatives in loading trucks and replacing solvent.

Refurbish drums as needed.

Park or move trucks as needed.

Stock inventory.

Replenish trucks with inventory.

Perform hazardous waste activities:

- a. General hazardous waste management activities, including transfer of hazardous waste from containers to tanks and placement of containerized hazardous waste into storage.
- b. Preparedness and prevention activities, including maintenance of aisle space and verification of adequate packaging, placarding and labelling.
- c. Completing hazardous waste manifests and associated paperwork (land disposal restriction notices).

Perform other related duties as assigned. [June 26, 1992]

**NOTE: PLEASE REMOVE THE SPILL REPORT TELEPHONE LOG IN
APPENDIX F (LAST PAGE) AND INSERT THE FOLLOWING FORM.
THE FIELD SPILL REPORT FORM SUPERSEDES THE SPILL
REPORT TELEPHONE LOG.**

SAFETY-KLEEN CORP.
Field Spill Report Form

Report all spills to the Safety-Kleen Environment, Health and Safety Dept. immediately. REVISED: JUNE 26, 1992

1. Facility Number and Location _____
 2. Date of spill _____ Time _____ a.m./p.m.
Report from: _____ Title _____
 4. Location of spill: _____
 5. Material spilled: _____ Quantity _____
 6. Any injuries or property damage? Yes or No If yes, explain. _____

 7. Cause of spill. _____

 8. Was the spilled material contained? Yes or No If yes, how? If no, describe the scene in detail (including nearby surface water or sewers and distance to them). _____

 9. Describe clean-up action taken. _____

 10. Person involved in incident. _____
 11. Vehicle # _____ Company _____
 12. List any emergency agencies at scene. _____
 13. Are there homes or businesses nearby? Yes or No Distance? _____
 14. Notification: S-K Environment Dept. Nat'l. Response Center State
1-800-323-5740 1-800-424-8802 1- . .
1-708- -888-4660 (24 hr.)
- | | | | |
|-----------------|-------|-------|-------|
| Date/time: | _____ | _____ | _____ |
| Contact name: | _____ | _____ | _____ |
| Comments rec'd: | _____ | _____ | _____ |
| | _____ | _____ | _____ |
| | _____ | _____ | _____ |
- Signature _____

After completing this form, file copy 1 in the Contingency Plan Section of the Environmental Manual and mail copy 2 to the SK Environment, Health and Safety Department.

**NOTE: PLEASE REMOVE THE CLOSURE COST ESTIMATE PROVIDED IN
APPENDIX H OF THE APPLICATION DATED NOVEMBER 9, 1990**

ALBUQUERQUE, NEW MEXICO FACILITY
CLOSURE COST ESTIMATE

1. Tank Closure - Open, remove contents of, clean, remove, and dispose of a 12,000-gallon underground storage tank.

Phase I - Remove Contents and Clean

1. Ship contents to a reclaimer.

Crew:		
2 Truck Dr.	\$17.56 hrs x 8 hrs.=	\$ 281.28
2 Trucks	\$500 lump sum	500.00
Tank size = 12,000 gal. - 7,500 gal/truck = 2 trucks		
	2 Trucks x 300 miles x 1.75/mile =	1,050.00
	Reclamation costs (\$0.30/gal)	3,600.00

2. Squeegee Clean Tank

Crew:		
1 Foreman	\$18.30/hr. x 24 hrs. =	439.20
1 Laborer	(\$17.00/hr. & \$3.00/hr. hazard pay) x 24 hours =	480.00

3. Use of high pressure water for two days 800.00
4. Disposal and transportation of wash water
(1,200 gallons @ \$0.70/gallon) = 840.00
5. Transportation of wastewater
300 miles x \$1.75/mile = 525.00
6. Test final rinsate (2 samples) 2,000.00

Total - Phase I \$10,515.00

Phase II - Remove and Dispose of Tank

1. Disconnect and Remove Appurtenant Equipment

Crew:		
1 Foreman	\$18.30/hr. x 8 hrs. =	\$ 146.40
2 Laborers	\$17.00/hr. x 8 hrs. =	272.00

2.	Torch Tank		
	Crew		
	1 Foreman	\$18.30/hr. x 8 hrs. =	146.40
	1 Laborer	\$17.00/hr. x 8 hrs. =	136.00
3.	Remove Tank		
	Crew:		
	1 Foreman	\$18.30/hr. x 2 hrs. =	36.00
	4 Laborers	\$16.80/hr. x 2 hrs. =	134.40
	1 Backhoe	\$28.97/hr. x 2 hrs. =	57.94
	Equipment	\$200 Lump Sum =	200.00
	Total Phase II		\$1,130.00

Phase III - Concrete Demolition

1.	Demolition of concrete pad		\$ 750.00
2.	Removal and disposal of concrete 200 cyd at \$4.50/cyd		<u>900.00</u>
			\$1,650.00

Phase IV - Backfilling, Regrading, Soil Testing

1.	Test for soil contamination 4 samples		\$4,000.00
2.	Regrading		
	Crew:		
	1 F.E. Loader	\$27.38/hr. x 1 hr. =	27.38
	Equipment	\$200.00 lump sum =	200.00
	Backfill	10 c.y. x \$2.00 c.y =	20.00
	Total - Phase IV =		\$1,247.00

Summary of Closure Cost for 12,000-gallon tank:

Phase I =	\$10,515.00
Phase II =	1,130.00
Phase III =	1,650.00
Phase IV =	<u>4,247.00</u>
	\$17,542.00

2. CLOSURE OF DRUM STORAGE AREA - Remove and return drums to a reclaimer, clean the drum storage areas, and dispose of wash water generated.

a.	2 Truck Dr.	\$17.56/hrs x 8 hrs.=	\$ 280.96
	2 Trucks	\$500 lump sum	500.00
	Hauling cost = 2 loads x 300 miles x \$1.75/mile =		1,050.00
b.	Clean drum storage area		
	Crew:		
	1 Foreman	\$18.30/hr. x 10 hrs. =	183.00
	1 Laborer	(\$17.00/hr. & \$3.00/hr. hazard pay) x 20 hours =	200.00
c.	Dispose of wash water		
		(700 gallons @ \$0.12/gallon) =	84.00
d.	Dispose of used solvents		
		378 16-gallon drums x \$30/drum =	11,340.00
e.	Testing rinsate for contamination		
		2 samples x \$1,000.00 each	<u>2,000.00</u>
			\$15,638.00

3. CLOSURE OF RETURN AND FILL STATION - Remove, package and dispose of sediment, clean the dumpster and dock area, remove dumpster and dock structure for reuse or scrap.

a.	1 Truck @	\$250.00 lump sum each	\$ 250.00
	Hauling Cost = 300 miles x \$1.75/mile		525.00
	1 Truck Dr.	\$17.56/hr. x 8 hrs.	140.48
	Crew:		
	1 Foreman	\$18.30/hr x 8 hrs.=	146.40
	1 Laborer	(\$17.00/hr. & \$3.00/hr. hazard pay) x 8 hrs. =	160.00
b.	Clean Dumpster and Dock Areas		
	Crew:		
	1 Foreman	\$18.30/hr. x 8 hrs. =	146.40
	1 Laborer	(\$17.00/hr. & \$3.00/hr. hazard pay) x 8 hours =	160.00
	Use of high pressure water for one day =		400.00

c.	Disposal of wash water (200 gallons @ \$0.70/gallon) =	140.00
d.	Dispose of dumpster mud 15 55-gallon drums x \$300/drum =	4,500.00
e.	Test rinsate for contamination 2 samples x \$1,000.00 each	2,000.00
f.	Disassemble, and remove dumpsters and docks	
	Crew:	
	1 Foreman \$18.30/hr. x 8 hrs. =	146.40
	2 Laborer \$17.00/hr. x 8 hours =	272.00
	Equipment \$5.20hr. x 8 hrs. =	41.60
	Total Dock Closure Cost =	\$9,028.00

4. CLOSURE OF MASONRY SHELTER - Remove paint waste, clean shelter
[June 29, 1992]

a.	Clean masonry shelter	
	Crew:	
	1 Foreman \$18.30/hr. x 20 hrs. =	366.00
	1 Laborer \$17.00/hr. x 3.00/hr hazard pay x 20/hr =	400.00
	Use of high pressure water for one day	400.000
b.	Dispose of wash water 500 gallons x 0.12/gallon	60.00
c.	Dispose of paint waste 9,650 gallons x \$2.00	19,300
d.	Testing for contamination 4 samples x \$75.00 each	<u>450.00</u>
	Total Masonry Shelter Closure Cost =	<u>\$20,976.00</u>

5. PE CERTIFICATION \$1,000.00

6. TOTAL CLOSURE COST:

12,000-gallon tank =	\$17,542.00
Drum storage area =	15,638.00
Return and fill station <u>[NOTE: deleted reference to paint waste shelter: June 29, 1992]</u> =	9,028.00
<u>Masonry Shelter =</u>	<u>[June 29, 1992] \$20,976.00</u>
P.E. certification =	<u>1,000.00</u>
Total	<u>[June 29, 1992] \$64,184.00</u>

**NOTE: PLEASE REPLACE THE FINANCIAL ASSURANCE
DOCUMENTATION IN APPENDIX H WITH THE FOLLOWING
DOCUMENTATION DATED MARCH 23, 1992.**



Mr. David Morgan
 New Mexico Environmental Improvement Division
 Hazardous Waste Bureau
 1190 St. Francis Drive
 Santa Fe, NM 87503

Dear Sir or Madam:

I am the chief financial officer of Safety-Kleen Corp., 777 Big Timber Road, Elgin, Illinois, 60123. This letter is in support of this firm's use of the financial test to demonstrate financial assurance as specified in the New Mexico Hazardous Waste Management Regulations, Part II 206.C.3 and 206.D.3.

1. This firm is the owner or operator of the following facilities for which financial assurance for closure or post-closure care is demonstrated through the financial test specified in New Mexico Hazardous Waste Management Regulations, Part 206.C.3 and 206.D.3. The current closure and/or post-closure cost estimates covered by the test are shown for each facility: total per attached listing - closure \$190,000; post-closure \$0.
2. This firm guarantees, through the corporate guarantee specified in New Mexico Hazardous Waste Management Regulations Part II 206.C.3 and 206.D.3, the closure or post-closure care of the following facilities owned or operated by subsidiaries of this firm. The current cost estimates for the closure or post-closure care so guaranteed are shown for each facility: closure \$0; post-closure \$0.
3. This firm is the owner or operator of the following hazardous waste management facilities for which financial assurance for closure or, if a disposal facility, post-closure care is not demonstrated either to the New Mexico Environmental Improvement Division through the financial test or any other financial assurance mechanism specified in New Mexico Hazardous Waste Management Regulations, Part II 206.C.3 and 206.D.3. The current closure and/or post-closure cost estimates not covered by such financial assurance are shown for each facility: total per attached listing - closure \$29,406,130; post-closure \$11,117,100.

This firm is required to file a Form 10K with the Securities and Exchange Commission (SEC) for the latest fiscal year.

The fiscal year of this firm ends on the Saturday closest to December 31. The figures for the following items marked with an asterisk are derived from this firm's independently audited, year-end financial statements for the latest completed fiscal year, ended December 28, 1991.

(con't)

Alternative II

1. Sum of current closure and post-closure cost estimates	\$40,713,230		
2. Current bond rating of most recent issuance of this firm and name of rating service	<u>A, Standard and Poors</u>		
3. Date of issuance of bond	<u>September 15, 1989</u>		
4. Date of maturity of bond	<u>September 15, 1999</u>		
*5. Tangible net worth	\$356,526,000		
*6. Total assets in U.S. (required only if less than 90% of firm's assets are located in the U.S.)	\$711,082,000		
		<u>YES</u>	<u>NO</u>
7. Is line 5 at least \$10 million?		X	
8. Is line 5 at least 6 times line 1?		X	
*9. Are at least 90% of firm's assets located in the U.S.? If not complete line 10.			X
10. Is line 6 at least 6 times line 1?		X	

I hereby certify that the wording of this letter is identical to the wording specified in New Mexico Hazardous Waste Management Regulations, Part II 206.D.3.j.(6) as such regulations were constituted on the date shown immediately below.



Robert W. Willmschen
Vice President - Finance

March 23, 1992
RWW/dmb

PARAGRAPH #1STATE OF NEW MEXICO

Albuquerque (\$95,000)	(7-008-01) (0)	2720 Girard NE Albuquerque, NM 87107	NMD 000804294
Farmington (\$95,000)	(7-008-21) (0)	4200A Hawkins Road Farmington, NM 87401	NMD 980698849
<u>\$190,000</u>	<u>\$0</u>		

Closure	Post-Closure
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PARAGRAPH #2

None

PARAGRAPH #3STATE OF ALABAMA

Dolomite (\$75,000)	(3-019-01) (0)	1002 Hoke Avenue Dolomite, AL 35061	ALD 077640001
Gurley (\$55,000)	(3-019-02) (40,600)	201 Section Line Street Gurley, AL 35748	ALD 000776807
Huntsville AC (\$150,000)	(0-007-49) (0)	Colemont Ind. Site U.S. 72 East Huntsville, AL	ALD 981028798
Montgomery (\$75,000)	(3-019-21) (0)	4815 N. Birmingham Montgomery, AL 36308	ALT 020010997
Whistler (\$75,000)	(6-133-01) (0)	3023 Dials Street Whistler, AL 36612	ALD 071951628

STATE OF ARIZONA

Phoenix (\$52,050)	(7-142-01) (40,600)	4401 E. University Phoenix, AZ 85034	AZD 089308803
Tucson (\$52,050)	(7-142-02) (0)	4161 E. Tennessee Tucson, AZ 85714	AZD 980892897
Chandler (\$52,050)	(7-142-01) (0)	Lot 42, Beck Avenue Williams Field Rd. Ind. Park Chandler, AZ 05224	AZD 981969504

STATE OF ARKANSAS

Little Rock (\$84,000)	(6-086-01) (40,600)	11727 Arch St. Pike Little Rock, AR 72206	ARD 054575238
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Fort Smith (\$65,000)	(40,600)	(6-063-01)	2511 Johnson Street Fort Smith, AR 72904	ARD 000709733
West Memphis (\$52,050)	(0)	(6-094-01)	309 Mound City Road Between I 55 and 40 West Memphis, AR 72301	ARD 056855232

STATE OF CALIFORNIA

El Monte (\$266,000)	(\$126,000)	(7-088-06)	10625 Hickson Street Unit A El Monte, CA 91731	CAT 000613893
Fresno (\$52,050)	(0)	(7-015-01)	3561 S. Maple Street Fresno, CA 93725	CAD 066113465
Gardena (\$150,000)	(0)	(7-088-04)	139 E. 157th Street Gardena, CA 90248	CAT 000613919
Highland (\$222,000)	(\$126,000)	(7-172-01)	7979 Palm Ave., Unit E Highland, CA 92346	CAT 000613927
Los Alamitos (\$52,050)	(\$335,000)	(7-088-05)	3876 Florista Street Los Alamitos, CA 90270	CAD 066177783
Los Angeles (\$266,000)	(\$126,000)	(7-088-02)	2918 Worthen Avenue Los Angeles, CA 90039	CAT 000613935
Oakland (\$205,000)	(\$126,000)	(7-178-01)	404 Market Street Oakland, CA 94607	CAD 053044053
Reedley Recycle Center (\$110,500)	(\$65,000)		1000 South I Street Reedley, CA 93654	CAD 093459485
Rohnert Park (\$330,000)	(\$138,000)	(7-178-03)	5750 Commerce Blvd. Rohnert Park, CA 94928	CAT 000613943
Rancho Cordova (\$65,000)	(\$126,000)	(7-157-01)	2576 Mercantile Drive Rancho Cordova, CA 95670	CAT 000613950
Salida (\$52,050)	(0)	(7-185-01)	5050 Salida Blvd. Salida, CA 95368	CAT 000613968
San Diego (\$52,050)	(\$335,000)	(7-175-01)	6306 Federal Blvd. San Diego, CA 92114	CAD 080916968
El Cajon (\$140,000)	(0)	(7-175-01)	W. Bradley & Johnson Avenues El Cajon, CA 92020	CAD 982486094
Santa Ana (\$367,500)	(\$126,000)	(7-088-07)	2120 South Yale Street Santa Ana, CA 92704	CAT 000613976
Santa Barbara (\$375,000)	(0)	(7-177-01)	214 E. Montecito Street Santa Barbara, CA 93103	CAT 000613984
Goleta (\$52,050)	(0)	(7-177-01)	5310 Overpass Road Goleta, CA 93103	CAD 981374077

Santa Clara (\$52,050) (\$350,000)	(7-178-02)	3461 Woodward Ave. Santa Clara, CA 95054	CAD 077187888
San Jose (\$215,000) (0)	(7-178-02)	1147 N. 10th Street San Jose, CA 95112	CAD 980817159
Sylmar (\$132,000) (\$126,000)	(7-088-01)	13024 Bradley Avenue Sylmar, CA 91342	CAT 000613992

STATE OF COLORADO

Commerce City (\$52,050) (0)	(6-052-01)	4980 Locust Street Commerce City, CO 80022	COD 000716613
Englewood AC (\$175,000) (0)	(6-052-02)	2801 S. Tejon Englewood, CO 80110	COD 000716621
Grand Junction (\$52,050) (0)	(6-052-21)	368 Bonny Grand Junction, CO 81501	COT 090010851
Pueblo (\$52,050) (0)	(6-052-04)	2841 East Fourth Street Pueblo, CO 81001	COD 000716639
Denver (\$114,000) (0)		1345 Bayoud Avenue Denver, CO 80223	COD 980954101

STATE OF CONNECTICUT

Branford (\$52,050) (0)	(2-112-01)	11 Tipping Drive Branford, CT 06405	CTD 980667927
West Hartford (\$52,050) (40,600)	(2-070-01)	24 Brixton Street West Hartford, CT 06110	CTD 000845982
Plainsfield (\$104,100) (0)		Community Avenue Plainsfield, CT 06374	CTD 001156009

STATE OF FLORIDA

Casselberry (\$52,050) (0)	(3-130-01)	464 A Pulmosa Drive Casselberry, FL 32707	FLD 097837983
Sanford (\$77,000) (0)	(3-130-01)	North Star Business Park, Lot 10 Sanford, FL 32771	FLD 984171165
Delray Beach (\$227,000) (801,500)	(3-097-01)	16086 SW 4th Ave., Bldg. B Delray Beach, FL 33444	FLD 000776757
Boynton Beach (\$77,000) (0)	(3-097-01)	Lot 46B Boynton Beach Park of Commerce Boynton Beach, FL	Applied For
Orange Park (\$77,000) (0)	(3-079-01)	161 Industrial Loop South Orange Park, FL 32073	FLD 980847214
Miami (\$80,400) (395,000)	(3-097-02)	7875 NW 54th Street Miami, FL 33166	FLD 980840086

Medley (\$77,000)	(0)	(3-097-02)	Palmetto Dr. & NW South River Dr. Medley, FL	Applied For
Port Charlotte (\$77,000)	(0)	(3-163-02)	19200 Peachland Blvd. Bachman Blvd. Port Charlotte, FL 33949	FLD 000776716
Tallahassee (\$80,400)	(395,000)	(3-079-02)	3082 West Tharpe Street (Rear) Tallahassee, FL 32303	FLD 000776773
Tallahassee (\$77,000)	(0)		Entrepot Blvd.-Airport Ind. Park Tallahassee, FL 32303	Applied For
Tampa (\$256,000)	(807,200)	(3-163-01)	4701 North Manhattan Tampa, FL 33614	FLD 049557408
Tampa AC (\$150,000)	(0)	(0-007-50)	5309 24th Avenue South Tampa, FL 33619	FLD 980847271

STATE OF GEORGIA

Columbus (\$52,050)	(0)	(3-106-01)	5920 Coca Cola Blvd. Columbus, GA 31909	GAD 000823096
Garden City (\$52,050)	(0)	(3-179-01)	5217 Augusta Road P.O. Box 7036 Garden City, GA 31408	GAD 000776781
Hapeville (\$52,050)	(0)	(3-013-01)	3440 Lang Avenue Hapeville, GA 30354	GAD 000823070
Morrow (\$52,050)	(0)	(3-013-01)	South Lake Com. PK- Commercial Dr. Morrow, GA 30260	GAD 981265424
Macon (\$52,050)	(0)	(3-106-)	6850 Hawkinsville Road Macon, GA 31207	GAD 980709257
Norcross (\$170,000)	(0)	(3-013-02)	480 S. Old Peachtree Road Norcross, GA 30071	GAD 980842777
Ringgold (\$52,050)	(0)	(3-019-22)	RR #5, Dietz Road Ringgold, GA 30736	GAD 980842835

STATE OF IDAHO

Boise (\$52,050)	(40,600)	(1-183-08)	514 E. 45th Street Boise, ID 83704	IDD 000712026
Pocatello (\$52,050)	(40,600)	(1-183-28)	2610 Garrettway Pocatello, ID 83201	IDD 991281270
Boise (\$52,050)	(0)	(1-183-01)	Supply Way and Gowan Road Boise, ID 83705	IDD 981770498

STATE OF ILLINOIS

Arlington Heights (\$185,000)	(0)	(5-034-03)	306 Campus Drive Arlington Heights, IL 60004	ILD 000805929
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Elgin Recycle Center (\$225,000) (2,450,000)		1500 E. Villa Street Elgin, IL 60120	ILD 000805911
Caseyville (\$363,000) (0)	(5-160-02)	20 Tucker Drive Caseyville, IL 62232	ILD 981097819
Chicago Plant (\$360,000) (0)		1445 W. 42nd Street Chicago, IL 60609	ILD 005450697
Franklin Park (\$52,050) (23,000)	(5-034-04)	412 Domenic Court Franklin Park, IL 60131	ILD 000665869
Mokena (\$52,050) (23,000)	(5-034-05)	9631 West 194th Place Mokena, IL 60448	ILD 000665851
Pekin (\$430,000) (0)	(5-136-01)	RR #3 Pekin, IL 61554	ILD 093862811
Schaumburg (\$185,000) (0)	(5-034-01)	728 Morse Avenue Schaumburg, IL 60193	ILD 079749073
Urbana (\$93,000) (23,000)	(5-033-01)	500 Anthony Drive Urbana, IL 61801	ILD 981088388
Dolton (\$5,500,000) (0)	(0-006-54)	633 E. 138th St. P.O. Box 100 Dolton, IL 60419	ILD 980613913

STATE OF INDIANA

Evansville (\$52,050) (0)	(5-060-01)	4417 St. Joe Street Evansville, IN 47712	IND 000815894
Fort Wayne (\$221,000) (0)	(5-068-01)	2112 Production Road Ft. Wayne, IN 46808	IND 000715466
Indianapolis (\$221,000) (0)	(4-076-02)	8418-26 Brookville Road Indianapolis, IN 46239	IND 000715886
Greenwood (\$50,000) (0)	(4-046-02)	800 Park Drive Greenwood, IN 46142	IND 984874776
Portage (\$221,000) (0)	(5-034-06)	6050 Eagle Drive Portage, IN 46368	IND 000714428
South Bend (\$221,000) (0)	(5-082-01)	2217 Western Avenue South Bend, IN 46628	IND 000715474
Breslube USA (\$861,000) (0)		601 Riley Road E. Chicago, IN 46312	IND 077042034

STATE OF IOWA

Davenport (\$52,050) (0)	(5-047-01)	3035 West 73rd Street Davenport, IA 52806	IAD 098027592
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Grimes (\$120,000)	(5-053-21) (0)	5318 NW 111 Drive, RR #2 Grimes, IA 50111	IAD 083489773
Des Moines (\$52,050)	(5-053-01) (0)	4705 NE 22nd Street Des Moines, IA 50317	IAD 981718000
Mason City (\$126,000)	(5-093-01) (0)	16 SW 11th Street Mason City, IA 50401	IAD 000678326

STATE OF KANSAS

Dodge City (\$52,050)	(6-195-21) (0)	600 East Trail Dodge City, KS 67801	KSD 980686844
Wichita (\$91,000) (40,600)	(6-195-01)	1311 South Anna Wichita, KS 67209	KSD 000809723
Edwardsville (\$52,050) (40,600)	(5-085-01)	9317 Woodend Road Edwardsville, KS 66022	KSD 980973515
Bonner Springs (\$ 0) (63,000)	(5-085-01)	11565 K 32 Highway Bonner Springs, KS	KSD 000687681

STATE OF KENTUCKY

Ashland (\$150,000)	(4-075-01) (0)	1592 Wolohan Drive Ashland, KY 41101	KYD 000776724
Ashland (\$55,000)	(4-075-01) (0)	West Virginia & Kevin Aves. Ashland, KY 41105	KYD 981027451
Lexington (\$150,000)	(4-090-01) (0)	264 Big Run Road Lexington, KY 40503	KYD 020440459
Lexington (\$55,000)	(4-090-01) (0)	550 Blue Sky Parkway Lexington, KY 40509	KYD 981027469
Louisville (\$150,000) (260,000)	(4-091-01)	751 Grade Lane Louisville, KY 40213	KYD 091514653
Louisville (\$55,000)	(4-091-01) (0)	Eiler Avenue Louisville, KY 40214	KYD 985072610
New Castle (\$340,250)	(0-006-54) (0)	State Highway 146 New Castle, KY 40050	KYD 053348108

STATE OF LOUISIANA

Pineville (\$150,000)	(6-073-04) (0)	4200 Shreveport Highway Pineville, LA 71360	LAD 000757708
Tioga AC (\$250,000)	(6-073-04) (0)	518 Ryder Drive Pineville, LA 71360	LAD 981057441
Kenner (\$52,050) (40,600)	(6-115-01)	14 26th Street Kenner, LA 70062	LAD 089841902

Kenner (\$156,100)	(6-115-01) (0)	Tyler Avenue Kenner, LA 70062	(applied for)
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STATE OF MAINE

Leer's (\$52,050)	(2-011-01) (0)	Route 202, RFD 3, Box 1990 Leeds, ME 04263	MED 980667810
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STATE OF MARYLAND

Baltimore (\$52,050)	(2-016-01) (0)	1448 Desoto Road Baltimore, MD 21230	MDD 981034291
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Glen Burnie (\$52,050)	(40,600) (2-016-02)	150 Penrod Court Section G & H Glen Burnie, MD 21061	MDD 000737106
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Silver Springs (\$52,050)	(40,600) (2-058-01)	12164 Tech Road Silver Springs, MD 20904-1980	MDD 000737395
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Odenton (\$52,050)	(0) (2-016-01)	Betson Court Odenton, MD 21230	MDD 982678385
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STATE OF MINNESOTA

Cloquet (\$52,050)	(0) (5-050-01)	1302 18th Street Cloquet, MN 55720	MND 000686170
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St. Paul (\$10,000)	(0) (5-103-01)	180 Ryan Drive St. Paul, MN 55117	MND 000823823
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Blaine (\$52,050)	(0) (5-103-01)	Lot 1 and Hokanson Ind. Park Isanti St. NE Blaine, MN 55434	MND 981953045
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Eagan AC (\$171,765)	(0) (5-103-02)	3227 Terminal Drive Eagan, MN 55121	MND 981097884
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Burnsville (\$60,000)	(0) (5-103-02)	1401 Cliff Rd. Burnsville, MN 55337	MND 000686188
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STATE OF MISSISSIPPI

Jackson (\$52,050)	(0) (6-078-01)	120 Richardson Drive Jackson, MS 39209	MSD 000776765
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Southhaven AC (\$171,765)	(0) (0-007-44)	7217 Airways Avenue Southhaven, MS 38671	MSD 981030894
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STATE OF MISSOURI

Blue Springs (\$190,000)	(0) (5-085-02)	24016 East 40 Highway Blue Springs, MO 64015	MOD 000669077
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Cape Girardeau (\$120,000)	(0) (5-030-01)	Route 2, Box 549-D Cape Girardeau, MO 63701	MOD 000669051
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Columbia (\$90,000)	(0)	(5-042-01)	610 Big Bear Blvd. Columbia, MO 65201	MOD 980971626
St. Charles (\$90,000)	(0)	(5-160-03)	4526 Towne Court, Lot #22 Harvestowne Industrial Park St. Charles, MO 63301	MOD 095486312
Springfield (\$137,000)	(0)	(6-193-02)	734 Northwest Bypass 66 Springfield, MO 65802	MOD 000669069
Independence AC (\$175,000)	(0)	(5-085-02)	901 Yuma Independence, MO 64056	MOD 980973564
Holnam/Safety-Kleen - Clarksville, MO (\$341,500)	(0)		Hwy. 79 North P.O. Box 456 Clarksville, MO 63336	MOD 029729688

STATE OF NEBRASKA

Gering (\$52,050)	(0)	(6-052-03)	RR 1, Box 15E Gering, NE 69341	NED 000687178
Grand Island (\$65,000)	(40,600)	(5-065-01)	Highway 281 South Behind Grand Island Dodge Grand Island, NE 68801	NED 000687186
Grand Island (\$90,000)	(0)	(5-065-01)	2700 W. 2nd Avenue Grand Island, NE 68801	NED
Omaha (\$65,000)	(0)	(5-127-01)	14564 Grover Street Omaha, NE 68144	NED 020185138
Omaha AC (\$195,621)	(0)	(5-127-01)	Lamont & 139th St. Omaha, NE 68144	NED 981495724

STATE OF NEVADA

North Las Vegas (\$52,050)	(0)	(7-087-01)	1655 Stocker Street North Las Vegas, NV 89030	NVD 007096761
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STATE OF NEW YORK

Avon AC (\$230,000)	(0)	(2-028-02)	1525 West Henrietta Road Avon, NY 14414	NYD 980753784
Colonie (\$85,000)	(0)	(2-004-01)	Green Mountain Drive Colonie, NY 12110	APPLIED FOR
Congers (\$85,000)	(0)	(2-118-01)	68 North Harrison Avenue Congers, NY 10920	NYD 000708164
Amityville (\$85,000)	(0)	(2-118-08)	80 Seabro No. Amityville, NY 11701	NYD 000708198
Latham (\$85,000)	(0)	(2-004-01)	72 Sicker Road Latham, NY 12110	NYD 000708206

Mattydale (\$85,000)	(2-187-01) (0)	Factory & Mitchell P.O. Box 56 Mattydale, NY 13211	NYD 000824581
Lackawanna (\$85,000)	(2-028-01) (0)	75 N. Gates Avenue P.O. Box A Lackawanna, NY 14218	NYD 981556541
Thornwood (\$85,000)	(2-118-05) (0)	9 Walnut Place Thornwood, NY 10594	NYD 000708172
Waverly (\$85,000)	(2-074-01) (0)	Route 34 North Road #1 Waverly, NY 14892	NYD 000708156
Woodside (\$85,000)	(2-118-06) (0)	58-05 52nd Avenue Woodside, NY 11377	NYD 980785760

STATE OF NORTH CAROLINA

Charlotte (\$90,000)	(3-031-01) (0)	2320 Yadkin Avenue Charlotte, NC 28205	NCD 079060059
Raleigh (\$90,000)	(3-171-01) (0)	Sommerville Industrial Building Route 3, 6225 Old State Road Raleigh, NC 27603	NCD 000776740
High Point AC (\$230,000)	(3-064-01) (0)	High Point Building, Inc. Mendenhall Road High Point, NC 27263	NCD 077840148
St. Pauls (\$90,000)	(3-031-02) (0)	Hwy. 301 North St. Pauls, NC 28384	NCD 980846935

STATE OF NORTH DAKOTA

Fargo (\$52,050)	(1-183-03) (0)	1537-1/2 First Avenue South Fargo, ND 58103	NDD 000716738
Bismarck (\$52,050)	(1-183-23) (0)	3704 Saratoga Bismarck, ND 58501	NDD 980957070

STATE OF OHIO

Kent (\$175,000)	(4-040-03) (0)	4341 Mogadore Road Kent, OH 44240	OHD 981099401
Brunswick (\$260,000)	(4-040-02) (0)	1169 Industrial Parkway Brunswick, OH 44212	OHD 000720987
Hamilton (\$200,000)	(4-037-01) (0)	4579 Port Union Road Hamilton, OH 45011	OHD 084750579
Hebron Recycle Center (\$835,000)	(0)	581 Milliken Drive SE Hebron, OH 43025	OHD 980587364
Groveport (\$60,000)	(4-046-01) (0)	4465 Marketing Place Groveport, OH 43125	OHD 981000664

Oregon (\$200,000)	(4-190-01) (0)	161 North Lallendorf Oregon, OH 43616	OHD 000721001
Tallmadge (\$200,000)	(4-040-03) (0)	2929 Mogadore Road Tallmadge, OH 44278	OHD 000720136
Warrensville Heights (\$60,000)	(4-040-01) (0)	26309 Miles Road, Unit M1 Warrensville Heights, OH 44128	OHD 000810275
Tipp City (\$60,000)	(4-037-02) (0)	4205 Lisa Drive Tipp City, OH 45371	OHD 980683155
Toledo (\$60,000)	(4-190-01) (0)	5148 Tractor Road Toledo, OH 43616	OHD 981097876
Youngstown (\$60,000)	(4-196-01) (0)	1171-1/2 N. Meridian Road Youngstown, OH 44509	OHD 980990162
Sharonville (\$60,000)	(4-037-01) (0)	11919 Tramway Drive Sharonville, OH 45241	OHD 981187313

STATE OF OKLAHOMA

Wheatland (\$52,050)	(6-124-01) (0)	7825 State Hwy. 152 Wheatland, OK 73097-0128	OKD 980878474
Tulsa (\$122,000)	(6-193-01) (0)	16215 East Marshall Street Tulsa, OK 74138	OKD 000763821

STATE OF OREGON

Springfield (\$100,000)	(7-054-01) (0)	550 Shelley Street Space C & D Springfield, OR 97477	ORD 000712067
Clackamas (\$100,000)	(7-148-01) (0)	11843 SE Highway 212 Clackamas, OR 97015	ORD 092895481
Clackamas AC (\$150,000)	(7-148-01) (0)	16540 SE 130th Street Clackamas, OR 97015	ORD 981766124

PUERTO RICO

Safety-Kleen Envirosystems Company of Puerto Rico, Inc. - Manati (\$350,000)	(0)	KM 51, Hwy. 2 (P.O. Box 1098) Manati, PR 00701	PRD 090399718
Safety-Kleen Envirosystems of Puerto Rico, Inc. - Dorado (\$90,000)	(0)	KM 267, Hwy. 2 Dorado, PR 00646	PRD 031132421

STATE OF SOUTH CAROLINA

Greer (\$57,000)	(3-066-01) (0)	Old Gilreath Road Greer, SC 29651	SCD 981031040
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Lexington Recycle Center & Branch (\$480,000) (0)	(0)	Route 5, Box 319 A Lexington, SC 29072	SCD 077995488
Florence (\$57,000) (0)	(3-043-21) (0)	Highway 301 South Florence, SC 29501	SCD 980842785
Summerville (\$57,000) (0)	(3-179-21) (0)	P.O. Box 2053 Rt. 17 A South SUMMerville, SC 29483	SCD 980709299
Holly Hill (\$390,000) (0)	(0-006-61) (0)	Rt. 2 Box 418 Hwy 453 South Holly Hill, SC 29059	SCD 003368891

STATE OF SOUTH DAKOTA

Sioux Falls (\$52,050) (0)	(1-183-05) (0)	2000 North Westport Avenue Sioux Falls, SD 57107	SDD 000716696
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STATE OF TENNESSEE

Dyersburg (\$75,000) (0)	(6-051-01) (0)	2010 Brewer Road Dyersburg, TN 38024	TND 981027410
Knoxville (\$75,000) (0)	(3-080-01) (0)	826 Stewart Knoxville, TN 37917	TND 079025698
Knoxville (\$75,000) (0)	(3-080-01) (0)	NW Industrial Park Pleasant Ridge Rd. Knoxville, TN 37921	Applied For
Nashville (\$125,000) (0)	(3-109-01) (0)	215 Whitsett Road Nashville, TN 37210	TND 981474125

STATE OF TEXAS

Abilene (\$52,050) (40,600)	(6-002-01) (0)	4234 Oil Belt Lane Abilene, TX 79605	TXD 062287883
Amarillo (\$52,050) (40,600)	(6-009-02) (0)	3811 Interstate 40 East Amarillo, TX 79104	TXD 000747410
Amarillo (\$80,000) (0)	(6-009-02) (0)	1202-1204 North Forest Amarillo, TX 79107	(applied for)
Corpus Christi (\$55,000) (0)	(6-048-01) (0)	3820 Bratton Road Corpus Christi, TX 78415	TXD 000747402
Corpus Christi (\$60,000) (0)	(6-048-01) (0)	Santa Elena St. & Centaurus Corpus Christi, TX 78405	(applied for)
Denton Recycle Center (\$400,000) (0)	(0)	1722 Cooper Creek Road Denton, TX 76201	TXD 077603371
El Paso (\$52,050) (0)	(6-056-01) (0)	900A Hawkins Blvd. El Paso, TX 79905	TXD 000747394

El Paso (\$55,000)	(0)	(6-056-01)	6000 Pompano Street El Paso, TX 79924	(applied for)
Ft. Worth (\$60,000)	(0)	(6-049-02)	6529 Midway Road Haltom City, TX 76117	TXD 981053416
Irving (\$60,000)	(0)	(6-049-01)	2130A East Grauwylar Irving, TX 75061	TXD 981052061
Longview (\$52,050)	(0)	(6-194-01)	202 Michael Place Longview, TX 75602	TXD 000747378
Lubbock (\$52,050)	(0)	(6-009-01)	1 Mile East of Loop 289 On Highway 62 & 82 Lubbock, TX 79408	TXD 000747436
McAllen (\$52,050)	(40,600)	(6-048-02)	1/4 Mile North Jackson Road 1/8 Mile West International McAllen, TX 78501	TXD 083145656
Midland (\$52,050)	(0)	(6-002-02)	10043-B County Rd. 125-W Midland, TX 79711	TXD 981054617
Missouri City (\$210,000)	(0)	(6-073-02)	1580 Industrial Road Missouri City, TX 77459	TXD 010803203
Orange (\$52,050)	(0)	(6-073-03)	3304 Womack Road Orange, TX 77630	TXD 061290276
Pasadena (\$52,050)	(0)	(6-073-01)	3333 Federal Road Pasadena, TX 77504	TXD 000747386
La Porte (\$60,000)	(0)	(6-073-01)	16th St. at M St. La Porte, TX 77571	(applied for)
San Antonio (\$60,000)	(0)	(6-169-01)	5243 Sinclair Road San Antonio, TX 78222	TXD 000729400
Waco (\$52,050)	(0)	(6-049-03)	Rt. 12, Box 911 Highway 84 West Waco, TX 76710	TXD 980876015
Wichita Falls (\$52,050)	(0)	(6-049-04)	1606 Missile Road Wichita Falls, TX 76306	TXD 000747428

STATE OF UTAH

Salt Lake City (\$52,050)	(0)	(7-166-01)	394 Ironwood Drive Salt Lake City, UT 84115	UTD 052430741
Salt Lake City (\$52,050)	(0)	(7-166-01)	1066 Pioneer Road Salt Lake City, UT 84104	UTD 980957088

STATE OF VERMONT

Barre (\$200,000)	(0)	(2-105-01)	23 West Second Street Barre, VT 05641	VTD 000791699
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STATE OF VIRGINIA

Bristol (\$52,050)	(0)	(3-026-01)	2146 King Mill Road Bristol, VA 24201	VAD 981042955
Chesapeake (\$52,050)	(0)	(3-121-01)	4545 Bainbridge Blvd. Chesapeake, VA 23320	VAD 000737346
Chester (\$52,050)	(0)	(3-154-01)	1200 West 100 Road Chester, VA 23831	VAD 981043011
Vinton (\$52,050)	(0)	(3-155-01)	Route 24 East of Vinton at O'Neal Drive Vinton, VA 24179	VAD 000737361

STATE OF WASHINGTON

Auburn (\$70,000)	(40,600)	(1-181-01)	3210 C Street NE, Unit G Auburn, WA 98002	WAD 000712059
Lynwood (\$70,000)	(40,600)	(7-092-01)	6303 212th Street SW, Suite C Lynwood, WA 98036	WAD 000712042
Pasco (\$70,000)	(0)	(1-183-02)	814 E. Ainsworth Pasco, WA 99301	WAD 980978746
Spokane (\$70,000)	(40,600)	(1-183-01)	9516 East Montgomery, Unit 16 Spokane, WA 99206	WAD 000712034

STATE OF WEST VIRGINIA

Nitro (\$52,050)	(40,600)	(4-075-02)	Rock Branch Industrial Park Nitro, WV 25143	WVD 000737387
Fairmont (\$92,000)	(3,000,000)	(4-145-23)	345 Locust Fairmont, WV 26554	WVD 980510895
Wheeling (\$52,050)	(0)	(4-145-03)	10 Industrial Park Dr. Wheeling, WV 26003 Waukesha, WI 53186	WVD 981034101
Eleanor (\$52,050)	(0)	(4-075-02)	Route 62 Eleanor, WV 25070	WVD 988767893

TOTALS FOR PARAGRAPH #3
\$29,406,130 \$11,117,100

Closure Post-Closure

REVISED PERMIT PAGES

Safety-Kleen Recycling Centers. The analysis will include Primary Tests, Secondary Tests, and the Toxic Characteristic Leaching Procedures Test described below for each waste stream.

- (1) The tests for the Spent Mineral Spirits and associated tank bottom and dumpster sludges are:

Primary Tests: Flash Point - verify greater than 90 F
PCB Analysis

Secondary Tests: Volatile Organic Analysis; see Table 1 [June 29, 1992]
Physical Appearance
Specific Gravity
pH
Bottoms Sediment And Water (BS&W)
Distillation Performance

In addition, the TCLP analysis results for Cadmium, Chromium and Lead will be provided from a representative sample taken on an annual basis [June 29, 1992].

- (2) The tests for the spent Immersion Cleaner Solvent are:

Primary Tests: Flash Point
PCB Analysis

Secondary Tests: Physical Appearance
Specific Gravity
[Request that pH be deleted; pH is not a critical parameter]; June 29, 1992] new
% Water
Distillation Performance
Volatile Organic Analysis; see Table 1 [June 29, 1992]

In addition, the TCLP analysis results for Cadmium, Chromium and lead will be provided from a representative sample taken on an annual basis [June 29, 1992].

- (3) The tests for the Dry Cleaning Solvent wastes are:

Primary Tests: Physical Appearance
[Request that Volatile Organic Analysis be deleted; only VOC in material is perchloroethylene [June 29, 1992]
Perchloroethylene [June 29, 1992]

Secondary Tests: Specific Gravity
 [Request that pH be deleted; it is not critical parameter]:
 June 29, 1992]
 PCB Analysis - GC (Residue Extract)

In addition, the TCLP analysis results for Cadmium, Chromium and Lead will be provided from a representative sample taken on an annual basis [June 29, 1992].

- (4) The analyses performed on each incoming load of paint wastes are pH, specific gravity, percentage solids, distillation and a GC screen used to determine that chlorinated solvents are not present.

Safety-Kleen's customers sign a service document containing the following information:

- a. the name, address and EPA I.D. number of the facility to which the waste is being shipped;
- b. the customer's name, address and EPA I.D. number (if required);
 and

TABLE 1
COMPOUNDS FOR
VOLATILE ORGANIC ANALYSIS

- o FMF (freon)
- o 1,1,1-Trichloroethane
- o 1,1,2-Trichloroethane
- o Paradichlorobenzene
- o 1,2,4-Trichlorobenzene Sulfonic Acid (TCBS)
- o FTF (freon)
- o Carbon Tetrachloride
- o Perchloroethylene
- o Orthodichlorobenzene
- o 1,2,3-TCBS
- o Toluene
- o Methylene Chloride
- o Trichloroethylene
- o Metadichlorobenzene
- o 1,3,5-TCBS
- o Mineral Spirits
- o Benzene