

Expert Allocation District Court Decision Highlights (Slip Opinion attached)

- Testified Effectively as Expert Witness on Liability Allocation for Plaintiff in Non-jury Trial on Issue of Damages at Caldwell Trucking Superfund Site
 - “The Court finds that two of Plaintiff’s witnesses, Mr. John P. McBurney and Mr. E. Michael Thomas to have been **particularly knowledgeable and candid** with the Court and both stood up well to direct and cross examination. . . . Mr. Thomas is Plaintiff’s allocation expert who is an attorney with significant experience in allocating cleanup responsibilities at environmental sites. The court deems these witnesses to be **particularly credible and affords substantial weight to their testimony.**”
Slip Opinion (attached) at 5.
- Judge Accepted Plaintiff’s Expert Allocation Testimony, Rejected Defendant’s Expert Testimony
 - Court examined each aspect of Plaintiff’s expert allocation. **Slip Opinion at 38-45.**
 - Court concluded “[t]he [Plaintiff’s] allocation represents an equitable and fair allocation to these parties.”
Slip Opinion at 45.
 - Court applied Plaintiff’s expert allocation to determine liability amount owed by Defendant. **Slip Opinion at 75, 85.**
 - Court rejected Defendant’s allocation expert opinion as comprised entirely of “net opinions” and “unsupported by any accepted scientific methodology”. **Slip Opinion at 80.**
- Link to **3rd Circuit Slip Opinion** affirming District Court adoption of Plaintiff expert’s allocation.

ORIGINAL FILED

NOV 21 2002

WILLIAM T. WALSH, CLERK

UNITED STATES DISTRICT COURT
DISTRICT OF NEW JERSEY

CALDWELL TRUCKING PRP GROUP,	:	Hon. Dennis M. Cavanaugh
	:	Civil Action No. 95-1690 (DMC)
Plaintiff(s),	:	
	:	
-vs-	:	
	:	
THE PULLMAN COMPANY and REXON	:	<u>OPINION</u>
TECHNOLOGY CORPORATION,	:	
	:	
Defendant(s),	:	
	:	

PROCEDURAL HISTORY

On November 21, 1995, Plaintiff filed a Complaint in this action against ninety-five Defendants, including Pullman and REXON seeking recovery of costs expended and to be expended by Plaintiff to investigate and remediate environmental contamination at the Caldwell Trucking Superfund Site in Fairfield, New Jersey. Plaintiff seeks recovery of these costs pursuant to various statutory and common law causes of action.

In or about 1995 the United States Government instituted a cost recovery action related to the Caldwell Trucking site captioned United States vs. Baureis Realty Company et als., 95-2732 (WGB) in the United States District Court for the District of New Jersey against several Defendants.

Plaintiff filed a Second Amended Complaint on October 5, 1996,

and a Third Amended Complaint on April 22, 2000. The Second and Third Amended Complaints each named additional Defendants but asserted the same causes of action as in the original Complaint. Eventually there was a total of 125 (one hundred twenty-five) alleged responsible Defendants.

This Court entered a Case Management Order staying all discovery and establishing an alternative dispute resolution process appointing Matthew Low of TLI Systems, Inc., as a third party neutral charged with developing a report allocating percentage contribution shares among Plaintiff(s) and Defendants. The matter was stayed for approximately two years during the pendency of the non-binding ADR process. Pullman was one of the Defendants to participate in the ADR process while Rexon chose not to.

At the conclusion of the ADR process, numerous settlement conferences among the parties were conducted and eventually settlements resulted for approximately 116 Defendants.

At the conclusion of a further discovery period this Court denied Defendant Pullman's motion for summary judgment and granted Plaintiff's motion for summary judgment against Pullman holding that Pullman was obligated to indemnify Rexon in this matter.

This Court conducted a non-jury trial on the issue of damages

only on July 29, 30, 31, August 1 and August 2, 2002. It is now incumbent upon me to make findings of fact and conclusions of law as provided by Fed.R.Civ.P. 52(a).

PARTIES

Plaintiff, The Caldwell Trucking PRP Group, is an association of eight corporations that entered into a consent decree with the United States and the State of New Jersey on or about March 30, 1994, to investigate and remedy environmental contamination at the Caldwell Trucking Super Fund Site. (These entities include Singer Kearfott, Curtis-Wright Corporation, Cooper Industries [McGraw Edison], Carborundum Corporation, DuPont, Englehard Corporation, Schering Corporation and Saltire, Inc.) Plaintiffs were identified by the governmental agencies as parties that each arranged for the disposal of hazardous substances to the Caldwell site at various times.

Caldwell Trucking Company was at all relevant times a New Jersey corporation that owned and operated a liquid waste disposal business at the facility that is now known as the Caldwell Trucking Super Fund Site in Fairfield, New Jersey. Caldwell Trucking engaged in the business of liquid waste removal for commercial and residential customers during the period 1952 to 1981.

Defendant Raxon Technology Corporation was a corporation of

the State of Delaware until it was dissolved on June 30, 1995. REXON was in the business of manufacturing electronic components and fuses for military applications at manufacturing facilities in Wayne and Fairfield, New Jersey. Some of REXON's wastes were transported to and disposed of by Caldwell Trucking at the site.

REDM Industries, Inc. was a Delaware corporation and at all times relevant herein the parent and sole owner of all of the stock of REXON.

Defendant, The Pullman Company, is a corporation of the State of Delaware and the owner of all of the outstanding shares of stock of REDM and REXON for the period October 1984 to April 1989 when it sold its shares in these companies to Little Falls Acquisition Corporation. There is no allegation that Pullman directly or indirectly arranged for or took any part in the actual disposal of any wastes to the Caldwell Trucking site.

Little Falls Acquisition Corporation was a corporation organized in 1989 by certain officers of REXON to engage in a management buy-out of the stock of REDM and REXON. Little Falls Acquisition Corporation changed its name to REXON Technology Corporation after the 1989 transaction.

THE TRIAL

As stated above, a five-day bench trial occurred from July 31 through August 2, 2002. I believe the attorneys put forth a very professional well prepared case on behalf of their respective clients. While I do not believe it is necessary that I comment on each witness offered, I do believe that several deserve mention. The Court finds two of Plaintiff's witnesses, Mr. John P. McBurney and Mr. E. Michael Thomas to have been particularly knowledgeable and candid with the Court and both stood up well to direct and cross examination. Mr. McBurney is a chemical engineer and an environmental project manager or coordinator hired by the PRP Group to coordinate the technical activities necessary in the cleanup at the Caldwell Superfund Site. Mr. Thomas is Plaintiff's allocation expert who is an attorney with significant experience in allocating cleanup responsibilities at environmental sites. The Court deems these witnesses to be particularly credible and affords substantial weight to their testimony.

In contrast, the Court finds Defendants' expert, Dr. Short, to be significantly less credible than the other witnesses presented. While there is little doubt but that Dr. Short possesses expert credentials in his field, I was not persuaded by his explanations or opinions. After watching and listening to him closely both on direct and cross examination, it is my opinion that he was somewhat

confused and not as prepared as I believe he should have been. Accordingly, the Court attaches diminished weight to his testimony and opinions.

None of the remaining witnesses stood out one way or the other and the Court has no reason to give anyone more or less credibility than the others.

FINDINGS OF FACT¹

A. As Concerning The Caldwell Trucking Company Superfund Site:

1. The Caldwell Trucking Company Superfund Site ("the Site") is located in Fairfield Township, Essex County, New Jersey.

Pretrial Stipulation No. 47

2. The Site includes the property located at 222 Passaic Avenue, Fairfield, New Jersey including, but not limited to, Lot 17 Block 2201 and Lot 20 Block 2302 on the local tax maps of Fairfield Township, Essex County, and areas outside the properties located at 222 Passaic Avenue where hazardous substances have come to be located, including, but not limited to areas north and east of 222 Passaic Avenue in which contaminated groundwater has been found.

Pretrial Stipulation No. 48

¹Subsequent to trial, both parties submitted extensive Proposed Findings of Fact and Conclusions of Law to the Court. The selected Findings of Fact and Conclusions of Law have been chosen from among those proposals submitted by the parties.

3. The Site area consists of a 4.5 acre tract of land (Block 2201 Lot 17) and a 6.9 acre tract of land (Block 2302 Lot 20). The 4.5 acre tract (actually 4.315 acres) was acquired in three separate pieces: 1) a 0.06 acre portion purchased in April, 1948; 2) a 2.5 acre portion purchased in April 1948; and 3) a 1.755 acre portion purchased in March 1954. The 6.9 acre portion of the Site was purchased in 1954. It branched off from the original 4.5 acres in an "L" shape. This portion abutted property owned by General Hose & Coupling. **Pretrial Stipulation No. 54**

4. The Site consists of properties and groundwater contaminated by the disposal of residential, commercial, and industrial septic waste and other non-septic wastes. **Pretrial Stipulation No. 1**

5. The Site was used as the disposal area for the Caldwell Trucking Company, ("Caldwell Trucking"), a family-owned septic tank waste disposal business founded by George F. O'Connor. **Pretrial Stipulation No. 50**

6. Shortly after the 1948 purchases, the land was cleared and O'Connor began using the 2.5 acre and 0.06 acre portions for disposal. This portion of the land was located directly behind 222 Passaic Avenue, the office of Caldwell Trucking and home of the O'Connors. **Pretrial Stipulation No. 8**

7. The 6.9 acre portion of the Site was purchased in 1954, however, the parcel was wooded until approximately 1968 when

Caldwell Trucking contracted with Franklin Contracting Company for the excavation in connection with Route 80. **Pretrial Stipulation No. 15**

8. The initial three step lagoons were in operation until sometime between 1966 and 1968, when they were removed in connection with excavation for Interstate Highway Route 80. **Pretrial Stipulation No. 12**

9. In 1969-1970, Caldwell Trucking added three additional lagoons in that area, one above the lagoon created by the contractor, one below it, and a fourth lagoon near the T-Fal property line. **Pretrial Stipulation No. 13**

10. Wastes that were brought to the site after 1969-1970 would be disposed of in all four lagoons ("the Second-Phase Lagoons"). **Pretrial Stipulation No. 14**

11. Before the Northern Lagoon Area was constructed through excavations by Franklin Contracting in the late 1960's (for fill to construct Route 80), Caldwell Trucking Company disposed of its water-wastes in the Central Lagoons. **T526:18-528:25²**

12. The Northern Lagoon Area had a sandier soil which allowed rapid percolation. **T526:21-527:7**

13. Beginning in the early to mid 1970's the New Jersey Department of Environmental Protection ("DEP") conducted various

² "T526:18-528:25" is a citation to the trial record, Transcript Page 526, Line 18 to Page 528, Line 25.

inspections and investigations of the Caldwell Trucking Site.

Pretrial Stipulation No. 28

14. As of a November 25, 1974, NJDEP Inspection Report, the 50,000-gallon tank was still in the process of being installed and Caldwell Trucking was disposing of waste in its lagoons. T441:12-442:25, Exhibit No. 50³

15. Operation of Caldwell Trucking Company's tanks would have replaced Central Lagoon operations on or about January 1, 1975. T524:8-525:10

16. The first tank used by Caldwell Trucking Company was a 50,000-gallon tank that it bought from the Township of Fairfield. It was a topless steel rectangular container with baffles and partitions inside that they utilized to dump the material directly. The tank was buried into the slope so that a tank truck could pull up and dump its load. This was known as Tank D and it was the northernmost tank and the largest. Tank D was located on the edge of the upper lagoon. Pretrial Stipulation No. 61 T529:19-532:9; Exhibit No. 20C

17. After the Caldwell Trucking tanks were installed in 1974, disposal into the tanks resulted in "normal splashing." T532:24-533:17

18. The Site was listed on the National Priorities List on

³ All Exhibit references are for the Plaintiff's exhibits, unless specifically identified otherwise.

September 8, 1983, pursuant to Section 105(a) of CERCLA, 42 U.S.C. § 9605(a), and on September 7, 1993, was listed on New Jersey's Known Contaminated Site List. Pretrial Stipulations No. 29 and 49; T83:15-84:1

19. In 1984, EPA conducted a Remedial Investigation and Feasibility Study ("RI/FS") for the site. Pretrial Stipulation No. 30

20. The initial RI/FS was to identify types, quantities and locations of contaminants in the soil and sludges at or near the Caldwell Trucking Site. Pretrial Stipulation No. 31

21. The RI/FS was completed by the EPA's contractors in 1986, before the formation of the PRP Group. T84:16-85:6

22. On September 25, 1986, EPA issued a Record of Decision ("ROD") in which it selected an Operable Unit remedy for the soil and sludges at the subject site and for municipal well No.7. Pretrial Stipulation No. 32, Exhibit No. 4

23. The OU-1 ROD provided the means and methods to remediate soils contamination. T85:16-86:16, Exhibit No. 4

24. The ROD also addressed immediate concerns regarding use of contaminated or threatened residential and commercial groundwater wells that were down gradient of the subject facility. Pretrial Stipulation No. 33, Exhibit No. 4

25. Remedy I, as selected in the 1986 ROD, called for several components, including: (a) excavation and treatment of contaminated

soils and sludges and disposal of treated soils and sludges in a secure landfill to be constructed in accordance with RCRA compliance; (b) restoration of a potable water resource by providing air stripping treatment for municipal well No. 7, and; (c) provision for an alternative water supply for residents and commercial entities using groundwater wells affected by the site. Pretrial Stipulation No. 34 , Exhibit No. 6, at p.4, ¶J.

26. Between 1987 and 1989, the EPA conducted a second RI/FS to investigate groundwater contamination at the site which was completed in July 1989. Pretrial Stipulation No. 35, Exhibit No. 6, at p.4, ¶K.

27. Caldwell Trucking continued dumping into the tanks on the property until dissolution of the company in 1988, although it primarily transported wastes from its customers' facilities directly to the ultimate disposal location between 1984 and 1988. Pretrial Stipulation No. 16

28. On September 28, 1989, EPA issued a Record of Decision in which EPA selected a preferred operable unit remedy and a contingent operable unit remedy for the contaminants in groundwater at the site. Pretrial Stipulation No. 36, Exhibit No. 5

29. The 1989 OU-2 ROD selected a "pump and treat remedy" out of the six remedies proposed by the ROD. T90:11-25, Exhibit No. 5, ROD at 1

30. The EPA connected properties with contaminated private

wells to the municipal water supply, which money was eventually recovered from the PRP Group as a result of the Consent Decree settlement. T88:15-88:3, Exhibit No. 6, at p.6, ¶N.

31. On April 19, 1993, pursuant to CERCLA, EPA issued Administrative Order Index No. II - CERCLA 93-0102 to Caldwell Trucking Company, the Carborundum Company, Cooper Industries, Curtiss-Wright Corporation, E.I. duPont deNemours & Company, Fluid Conditioning Products, Kearfott Guidance and Navigation Corp., Okon Corporation, Rexion Technology Corporation, Schering Corporation and Scovill, Inc. requiring those companies to perform the excavation, treatment and landfill component of Remedy I. Pretrial Stipulation No. 37 , Exhibit No. 6, at p.7, ¶Q.

32. On June 29, 1993, EPA issued an additional Administrative Order Index No. II CERCLA-93-0104 to many of the same companies requiring them to perform certain groundwater remediation, design and investigation studies required by the ROD. Pretrial Stipulation No. 38, Exhibit No. 16

33. Pullman was among the parties named in the June 29, 1993, EPA Order, and was also ordered to undertake cleanup of the Site. T227:22-228:10, Exhibit No. 16

34. Whereas the PRP Group stepped forward to comply with these obligations, Pullman refused to participate, making it a recalcitrant party. T228:14-229:18, Exhibit No. 6

35. The settling defendants in the Consent Decree joined

together and formed a voluntary association titled the Caldwell Trucking PRP Group and commenced action seeking recovery of its past costs and declaratory judgments regarding future costs.

Pretrial Stipulation No. 44

36. The PRP Group was formed in 1993 after its constituent members had received an EPA Order to undertake remediation of the Site. T91:5-92:1

37. If the PRP Group did not voluntarily agree to perform the required remedies, the EPA would have, and then sought cost recovery from the PRP Group members. T87:8-25

38. On March 30, 1994, the USEPA filed a Complaint against plaintiffs in an action styled United States v. Carborundum Company, et als., Civil Action No. 94-1773 (WGB) (D.N.J.). The New Jersey Department of Environmental Protection ("NJDEP") filed a similar action on March 31, 1994, and the two cases were consolidated with consent of the parties by an Order dated April 21, 1994. The Complaints alleged that plaintiffs were liable under CERCLA and New Jersey law for past response costs incurred by the USEPA and NJDEP in connection with the Caldwell Trucking Site. The USEPA and NJDEP also sought declaratory judgments on the liability of plaintiffs for future costs associated with releases of hazardous substances from the Site. **Pretrial Stipulation No. 39**

39. The EPA provides an incentive to PRPs to perform the cleanup themselves, since PRPs can do the work at less cost than

the government. T88:1-14

40. The PRP Group entered into a Consent Decree with the EPA. T93:13-22, Exhibit No. 6

41. On April 19, 1994, a Consent Decree between the EPA, DEP and nine (9) of the parties earlier alleged to be responsible parties with respect to the Caldwell Trucking site was published in the Federal Register seeking public comment. Pretrial Stipulation No. 40, Exhibit No. 6, November 29, 1994 Opinion, at p. 3

42. On March 30, 1994, EPA and DEP lodged a Consent Decree in the United States District Court for the District of New Jersey. Pretrial Stipulation No. 41, Exhibit No. 6, November 29, 1994 Opinion, at p. 3

43. On November 29, 1994, the United States District Court for the District of New Jersey entered the Consent Decree in United States et al. v. The Carborundum Company, et al., Civ. No. 94-1473. Pretrial Stipulation No. 42, Exhibit No. 6, November 29, 1994 Opinion

44. The Consent Decree governs the work to be performed at the Site. T94:5-10, Exhibit No. 6

45. After the Consent Decree was entered, the US government was willing to listen to the PRP Group concerning more cost and environmentally effective alternatives to the ROD remedies. T86:17-87:1

46. The Consent Decree signaled a shift from an adversarial

relationship to a cooperative relationship between the EPA and the PRP Group. T94:11-95:7

47. In April 1995, the PRP Group filed a complaint in Caldwell Trucking PRP Group v. Rexon Technology Corp., et al. (later captioned Caldwell Trucking PRP Group v. ADT Automotive, Inc., et als., Civ. No. 95-1690 seeking contribution from numerous other alleged potentially responsible parties at the Site ("the PRP Group action"). Pretrial Stipulation No. 45

48. In June 1995, the United States on behalf of the Environmental Protection Agency (EPA) filed a complaint in United States v. Baureis Realty Co., Inc., et al., Civ. No. 95-2732 pursuant to Section 107 (a) of the Comprehensive Environmental Response, Compensation, and Liability Act of 1980, 42 U.S.C. § 9607 (a), as amended ("CERCLA"), seeking reimbursement of response costs incurred and to be incurred at or in connection with the release or threatened release of hazardous substances at the Site ("the U.S. action"). Pretrial Stipulation No. 46

B. As Concerning Caldwell Trucking Company's Business Operations:

49. Caldwell Trucking Company was incorporated on May 10, 1946. Pretrial Stipulation No. 53

50. From the start of operations until approximately 1950 or 1951, Caldwell Trucking had only one truck, a 1.5 ton dump truck mounted with a 500-gallon tank. Pretrial Stipulation No. 9

51. In 1951, Caldwell Trucking purchased an additional truck

and mounted a 750-gallon tank onto it. **Pretrial Stipulation No. 55**

52. In 1956, Caldwell Trucking bought a new dump truck and fitted it with a 1,100-gallon tank. **Pretrial Stipulation No. 56**

53. Also in 1956, Caldwell Trucking replaced the 500-gallon tank dump truck with a platform truck mounted with a 750-gallon tank. **Pretrial Stipulation No. 57**

54. Caldwell Trucking used these three trucks (one 1,100-gallon and two 750-gallon) until approximately 1969 when they acquired a large tank trailer. **Pretrial Stipulations No.10 and 58**

55. It was normal to send the 750-gallon truck to a commercial job. **T445:24-446:2**

56. Caldwell Trucking's volume was not significant during the 1950's, handling residential waste almost exclusively during this period. **T438:11-439:3**

57. In the early 1960's, the Town of Fairfield began to expand with many new residential, commercial and industrial developments. **Pretrial Stipulation No. 59**

58. Caldwell Trucking Company's customers in the 1950's were primarily residential, but that changed in the 1960's and 1970's. **T523:6-13**

59. By the mid to late 1960's, approximately 50% of Caldwell Trucking's volume was commercial and industrial. **T439:9-13**

60. By the end of the 1960's, Caldwell Trucking's commercial volume outweighed its residential volume. **T439:14-440:2**

61. Caldwell Trucking Company's business grew throughout its operations, such that the business in the 1970's was larger than that in the 1950's. **T521:21-522:17**

62. At its peak, Caldwell Trucking Company had five to seven vehicles that were handling septic waste. **T522:22-523:2**

63. Ruth Ann O'Connor, began working for the company in 1969. She assumed her mother's bookkeeping and receptionist duties and managed Caldwell's municipal contracts and licensing for ocean disposal. By the early 1970's, she became Vice President of Caldwell Trucking. **Pretrial Stipulation No. 3**

64. Caldwell Trucking's primary customer records are Ledgers and Daybooks maintained by the late Rose O'Connor, and later by her daughter, Ruth Ann O'Connor. **Pretrial Stipulation No. 5**

65. Ledgers and Daybooks are generally available from the following years: 1962 - 1966; 1973 - 1975; and 1978 - 1980. **Pretrial Stipulation No. 52, Exhibit 24**

66. The daybook was a daily log that Rose O'Connor kept next to the telephone. If someone called to have a job done she would write it in the book and a bill or invoice would be made out to be given to the driver who would be sent out to service the customer. **Pretrial Stipulation No. 6**

67. Ruth Ann O'Connor indicated that her mother's bookkeeping method was to have a client sign a work order at the job site. She would then send out a bill to the company. **T436:7-10**

68. She would mark the ledger not paid ("NP") until the check arrived, at which point she would indicate in the ledger that the customer had paid for the service. **T436:14-18**

69. Not every transaction would be recorded in the ledgers. For instance, if the customer paid cash at the time of the job, or if it was a consistent customer on a set schedule, the transaction might not be marked in the ledgers. **T436:19-437:19**

70. Entries in the daybook marked "done" indicate that Caldwell Trucking actually serviced the customer. **T438:8-10**

71. Some industrial/commercial customers may have been on a regular schedule and not listed in the day books. **T498:20-499:7**

72. Ruth Ann O'Connor implemented a triplicate invoice form. One copy would be give to the customer at the time of the service, one copy would be mailed with the bill, and one would be kept by Caldwell Trucking. **Pretrial Stipulation No. 7**

73. Caldwell Trucking charged the same price whether they used the 1,100-gallon truck or the 750-gallon truck. **Pretrial Stipulation No. 17**

74. Caldwell Trucking charged the same price for residential and commercial/industrial work. **T445:17-23**

75. Two 750-gallon truck removals would be counted as two loads, even if the actual volume removed were only 1,000 gallons. **Pretrial Stipulation No. 18**

76. Caldwell Trucking's prices increased periodically during

its years of operation due to the increasing costs of doing business. Pretrial Stipulation No. 62

77. Caldwell Trucking also transported waste for ocean disposal and later incineration, land filling, and disposal at sewage treatment plants. Pretrial Stipulation No. 51

78. Despite the availability of ocean disposal, Caldwell Trucking continued to dispose of waste in the lagoons at the site. T440:22-441:11

79. Although some customers' wastes were meant to be taken directly for ocean disposal, there were occasions when the ocean disposal company could not take the waste and Caldwell Trucking would bring it back to the Site. T443:19-24

80. Waste shipments earmarked for ocean disposal were usually taken to the site, dewatered, and the dewatered sludge was later taken out for ocean disposal. T443:25-445:16

81. When Caldwell Trucking Company removed wastes from its customers' septic tanks, it attempted to remove the entire contents of the tank. T546:24-548:15

82. Caldwell Trucking Company was never given an explanation by its customers about the presence of any chemicals, toxins or pollutants in the waste that was removed from septic tanks. T551:21-552:8

83. Caldwell Trucking Company had no way of knowing the content of the wastes hauled from septic tanks aside from

occasional odors that were inconsistent with typical septic waste.

T551:9-18; T5552:9-11

84. Caldwell Trucking Company serviced duPont's sewer package plant, which served residences in duPont Village. T590:19-592:15

85. There is no evidence in the record that PRP Group member duPont's package plant wastes contained anything other than routine sanitary wastes. T785:19-787:20

86. Caldwell Trucking Company collected lime sludge from plaintiff McGraw Edison's (now Cooper Industries) settling pond that had a municipal sewer connection for the pond effluents. T593:6-594:12

87. McGraw Edison's lime sludge would not have contained VOCs. T785:6-17

88. There is no evidence in the record that PRP Group member Engelhard's septic wastes contained volatile organic compounds. T787:21-789:13

89. Caldwell Trucking Company collected cutting oils from Kearfott, which were originally pumped out of drums, but later removed from a holding tank. T594:15-595:13

90. Caldwell Trucking Company did not dispose of Kearfott's cutting oils in the lagoons but rather applied the oil to the Site's dirt roads for purposes of dust suppression. T596:2-9

91. There is no evidence in the record that PRP Group member Kearfott's cutting oils contained VOCs since only a minority of

cutting oils contained such substances. T790:793:17

92. Kearfott's cutting oils would not have contributed to the Caldwell Trucking Site's possible DNAPL contamination. T793:18-21

93. There is no evidence in the record that PRP Group member Schering Corporation's pond sludge contained volatile organic compounds. T793:24-795:13

94. There is no evidence in the record that PRP Group member Scoville's septic wastes contained anything other than routine sanitary wastes. T785:19-787:20

95. There is no evidence in the record that PRP Group member Scoville's industrial wastes contained concentrations of VOCs that would be greater than that within an industrial septic system. T796:4-797:19

96. By 1984, Caldwell Trucking discontinued active use of the tanks and operated primarily as a waste transporter until 1988, when it completely ceased operations. Pretrial Stipulation No. 2

97. Bud and Ruth O'Connor continued to operate Caldwell Trucking Company until 1988. Pretrial Stipulation No. 4

C. As Concerning Industrial Practices During the 1950's through 1970's:

98. There were no state regulations prohibiting waste solvent disposal into septic systems in the 1950's, 1960's and 1970's. T40:17-25

99. There were no federal regulations prohibiting solvent disposal into septic systems in the 1950's, 1960's and 1970's.

T41:7-15

100. There were no regulations prohibiting solvent disposal into septic systems in the 1950's, 1960's and 1970's. **T41:16-19**

101. Solvent degreasers were used in manufacturing processes during the 1950's through 1970's to clean and remove oil from parts. **T41:20-42:10**

102. Degreasing solvents typically contained VOCs (including TCE, PCE and TCA) in the 1960's and 1970's. **T42:11-20**

103. Typical industrial practice involved solvent recycling if reasonable volumes were present; otherwise, waste solvents were discarded. **T43:8-18**

104. Solvent spills on factory floors were sometimes mopped up and dumped into the sink, which resulted in disposal down the drain and into the septic system. **T43:19-44:1**

105. Solvent contamination of groundwater and potable water wells became evident in the late 1960's. **T51:3-7**

106. There was no VOC testing at all during groundwater sampling events in the 1950's and 1960's. **T51:8-14**

107. General handling and solvent disposal practices changed in the 1970's due to environmental awareness and the passing of new laws. **T44:2-5**

108. There was no verifiable intention by industry to pollute,

since industry did not know the solvent's impact on groundwater.

T51:25-52:6

109. Solvents that had been disposed into septic systems were largely removed during septic tank pump outs, since the solvents would be present in the septic sludge. T45:16-24

110. Solvents such as TCE and TCA are heavier than water, and would tend to sink. T48:10-12

111. Typical industrial solvents would sink into the sludge at the bottom of the septic tanks rather than flow out into the leach field. T48:19-49:7; 63:17-64:19

112. Whether pure material was dumped on the ground, or septic material containing the same amount of material was dumped on the ground, the effect would be the same. T67:16-68:4

D. As Concerning the PRP Group's Investigation and Remediation of the Site:

113. The Site has two principal environmental problems, contaminated soil and groundwater. T73:8-16

114. The Site had two principal disposal areas: the Central Lagoon Area and the Northern Lagoon Area. T75:1-13

115. The soils in the NLA were sandier than the CLA soils, which had more rocks and clay. T75:19-76:2

116. Caldwell Trucking's operations consisted of lagoon disposal until the lagoons filled with solids, and large quantities of liquid wastes were directly disposed into the NLA. T76:3-77:15

117. Caldwell Trucking was listed as a Superfund Site because of the chlorinated VOC contamination of groundwater and soils, and the soils were also contaminated with lead. T77:16-78:6

118. The Site's soils were also contaminated with PCBs and VOCs, which required remediation. T78:7-21

119. Groundwater contamination resulted from the surface disposal of chlorinated VOCs, which are heavier than water and would sink into the groundwater and flow towards the Passaic River. T80:18-81:9

120. PCE is ordinarily known as dry cleaning solvent, and will degrade to TCE given proper subsurface biological conditions. T81:21-82:7

121. The "Seep" is located 4,000 feet down gradient of the Site, in the direction of the Passaic River. T79:14-80:2

122. The Seep's VOC concentrations were 5,000 to 7,000 ppb, and needed to be reduced to below 50 ppb, a one hundred fold decrease. T81:10-20

123. The Caldwell Trucking PRP Group has employed Jack McBurney of Demaximis who has continuously served since 1993 as the Project Coordinator, as mandated by the Consent Decree. T82:8-23, Exhibit No. 1

124. The PRP Group's Project Coordinator oversaw all contractors' activities. T105:23-25

125. Plaintiff's Site Chronology accurately reflects the

Caldwell Trucking Superfund Site's chronology. T82:24-83:10,
Exhibit No. 3

126. The Site is one of the worst from a contaminated groundwater perspective. T84:3-14

127. The PRP Group formed Steering and Technical Committees, which had legal and technical representatives, respectively, from each of the member companies. T92:2-22

128. The PRP Group members collectively contributed to these committees at least 7,000 hours of their time. T101:13-102:9

129. After entry of the Consent Decree, the PRP Group immediately sought to eliminate the OU-1 ROD's selected RCRA Landfill remedy, which would eventually be replaced with an in-situ stabilization of contaminated soils. T95:8-97:14

130. Pilot studies preceded the actual remedy, and the PRP Group needed to convince the EPA to permit a ROD revision, which revision was ultimately approved by the EPA before the remedy was performed. T98:19-99:11; 102:19-103:5

131. The PRP Group's alternative soils remedy saved five million dollars (\$5,000,000) compared to the ROD remedy. T97:15-98:14.

132. The California List wastes were located close to the Site's tanks and down the hill towards the Central Lagoon Area. T99:20-100:7, Exhibit No. 13

133. The final soils remediation is currently underway.

T103:23-104:22

134. The OU-2, Groundwater, objectives involved containing the 10,000 ppb TCE plume and risk reduction at the Seep to a risk less than 1×10^{-6} risk. **T114:14-24**

135. When the ROD was prepared in the 1980's, the EPA lacked technologies to remediate groundwater, it only knew how to contain contamination. **T118:18-119:6**

136. The ROD selected pump and treat to control and contain the plume. **T115:9-20**

137. The complicated subsurface hydrogeology would prevent the pump and treat remedy from ever remediating the Seep. A separate remedy would have been required. **T120:2-121:3**

138. The EPA recognized that it could possibly take over 100 years to clean the Site's groundwater using the selected pump and treat remedy. **T118:8-17; 121:19-122:16; 799:6-15**

139. The EPA was looking for performance standards to remediate the groundwater, and recognized that their selected ROD remedy would never be able to meet the Consent Decree's standards. **T126:24-127:5**

140. The EPA recognized that pump and treat would not clean up the plume within 30 years, so it included a technical impracticability waiver in the ROD. **T115:21-116:4**

141. The pump and treat remedy would not stop groundwater from flowing to the Seep. **T121:8-18**

142. The PRP Group retained Eckenfelder, a design hydrogeology firm, to perform the predesign investigation for the groundwater remedy. T116:18-117:3

143. The Consent Decree required the design of the pump and treat remedy, which was undertaken by McLaren Hart, an engineering firm. T117:4-118:2

144. Alternative treatments were considered in 1994-1995, and Golder Associates' iron reactive barrier wall (IRBW) system was selected. T122:22-123:20

145. The EPA stayed the ROD's pump and treat remedy construction schedule to allow the PRP Group's application of the IRBW to the Site. T126:13-23; 127:20-128:10, 133:5-20, Exhibit No. 9 (EPA's February 5, 1997 letter)

146. The IRBW system operates by intercepting contaminated groundwater flow, wherein the reactive iron acts as a catalyst to dechlorinate hydrocarbons, rendering the chlorinated contaminants harmless. T124:21-125:4

147. The IRBW technology has been applied at other sites, but its application to the Site's fractured bedrock was considered innovative at the time. T125:5-14

148. The IRBW was installed upgradient of the Seep in an effort to meet the Consent Decree's risk reduction performance standards. T126:2-12

149. Due to the complex subsurface, some of the contaminated

groundwater was found to be bypassing the IRBW system. In response, the PRP Group installed a supplemental seep treatment system to capture, treat and discharge the remaining contaminated groundwater. T128:12-129:22

150. The EPA approved the supplemental seep treatment system. T133:1-4, Exhibit No. 10 (December 5, 2000 EPA Letter)

151. The supplemental seep treatment system was completed in February 2002. T130:23-132:17

152. At present, the treated water meets all standards. T132:18-25

153. While the IRBW and the supplemental seep treatment system are remediating the groundwater, the EPA has also required the provision of additional source control on the Site itself. T133:1-134:3, Exhibit No. 10 (December 5, 2000 EPA letter approving pilot studies for enhanced biological source control at Site.)

154. Additional source control will involve natural degradation of contaminants using biological means, and pilot studies are being submitted to the EPA for review and approval. T134:4-136:13, Exhibit No. 11 (September 29, 2000 PRP Group letter to EPA)

155. The PRP Group has sought ROD amendment, and the EPA will likely amend the ROD to select the IRBW and supplemental seep treatment systems, but will also likely keep pump and treat in an amended ROD as a contingent back-up remedy in the event the current

'remedies do not meet objectives. T137:20-138:24, Exhibit 11

156. The OU-2 remediation is consistent with the National Contingency Plan and it meets the Consent Decree's required risk reduction at the Seep. T139:1-12, Exhibit Nos. 9-11 (EPA-related correspondence confirming suitability of alternative OU-2 Remedy.)

157. The system in place is likely to remediate the groundwater in ten years versus over 100 years with the selected ROD remedy of pump and treat. T139:21-140:3

158. Had the PRP Group followed EPA's original directive, the Site would currently be in worse shape with the same amount of resources expended. T233:1-18

159. The EPA has been involved with all chosen remedies at the Site. T140:24-141:8, Exhibit No.

160. The EPA has consented to all work performed at the Site and has never objected to any of the work performed by the PRP Group. T229:21-230:5, Exhibit Nos. 9, 10 and 11

E. As Concerning the PRP Group's Remedial Costs:

161. Pursuant to the Consent Decree, the members of the Caldwell Trucking PRP Group agreed to reimburse the United States and the State of New Jersey for certain past costs and to perform response actions and incur response costs in connection with the Site. The PRP Group's payments to the State of New Jersey included \$984,434.10 on December 28, 1994, for natural resource damages; \$157,565.00 on December 28, 1994, for oversight costs; and \$95,000

to the New Jersey Spill Compensation Fund on August 3, 1994 for compensation to neighboring properties. The PRP Group's payments to the United States included \$960,000.00 on December 28, 1994 to the Department of Justice for oversight costs; \$40,000.00 to the Department of the Interior for natural resource damages; \$1,053,600.00 on December 27, 1995, for past costs. **Pretrial Stipulation No. 43**

162. The remedial costs expended by the PRP Group to date total approximately \$22,100,000. **T142:5-145:8, Exhibit No. 13**

163. The remedial costs for drum removal and fence installation for the Central Lagoon Area and Northern Lagoon Area were \$128,425.00 . **Exhibit No. 13**

164. The remedial costs for excavation of California List Waste soils were \$2,148,683.39 **Pretrial Stipulation No. 21 , Exhibit No. 13**

165. The remedial costs for stabilization of Central Lagoon Area soils were \$2,060,629.00 , **Exhibit No. 13**

166. The remedial costs for stabilization of Northern Lagoon Area soils were \$492,352.00, **Exhibit No. 13**

167. The remedial costs for soil vapor extraction of the California List Waste soils were \$720,503.00 **Pretrial Stipulation No. 23, Exhibit No. 1**

168. The remedial construction and 30 year anticipated operation and maintenance costs for the Central Lagoon Area soils

cap is \$889,000. Pretrial Stipulation No. 24 , Exhibit No. 13

169. The remedial construction and 30 year anticipated operation and maintenance costs for the Northern Lagoon Area soils cap is \$381,000. Exhibit No. 13

170. The costs to design the pump and treat remedy were \$1,439,865.90. Exhibit No. 13

171. Thus far, the PRP Group has spent approximately \$4,910,158.00 for the design and construction of the iron reactive barrier wall system and the supplemental seep treatment systems. T165:1-20; Exhibit No. 13 (as modified by Jack McBurney)

172. The PRP Group has spent approximately \$2,654,000 for additional source control measures. T166:21-167:1; Exhibit No. 13 (as modified by Jack McBurney)

173. The PRP Group has spent approximately \$1,503,031.25 for de maximis's project management services. Exhibit No. 13

174. The PRP Group has spent approximately \$1,754,006.41 for Blasland, Bouck & Lee's OU-1 engineering and related services. Exhibit No. 13

175. The PRP Group's common counsel, Pitney, Hardin, Kipp & Szuch has provided recoverable legal services involving EPA negotiations, trust administration, remedial oversight and litigation. T570:5-14, Defendants' Exhibit No. 94

176. Pitney, Hardin, Kipp & Szuch's recoverable attorneys fees, under the United States Supreme Court's Keytronics opinion,

'is \$1,105,287.55 through May 31, 2002. T571:6-574:7, Defendants'
Exhibit No. 94

177. Pitney, Hardin, Kipp & Szuch has charged its normal and customary fees. T570:15-23

178. Pitney, Hardin, Kipp & Szuch's attorneys fees have been fair and reasonable. T574:12-24

179. The soils remedy costs were necessary to comply with the Consent Decree. T106:1-6

180. The soils remedy costs were fair, reasonable and consistent with work performed in the area of New Jersey. T106:17-23

181. The IRBW and supplemental seep treatment systems will cost \$12-\$13 million versus \$53.7 million for the selected ROD remedy over the next 50 years. T142:5-145:8

182. The groundwater remedy costs were fair, reasonable and consistent with work performed in the area of New Jersey. T141:23-142:3

183. Superfund Interest Rates are as follows: 2001 - 6.18%; 2000 - 5.30%; 1999 - 4.53%; 1998 - 5.61%; 1997 - 5.69%; 1996 - 5.86%; 1995 - 5.63%; 1994 - 3.36%; 1993 - 3.49%; 1992 - 5.70%; 1991 - 7.99%; 1990 - 8.47% and 1989 - 8.39%. Pretrial Stipulation No. 27

F. As Concerning Pullman/REDM/Rexon's Facilities:

Rexon's 70 Old Turnpike Road Facility in Wayne, New Jersey

184. Rexon Technology Corp., formerly known as R.E.D.M. Corp., operated facilities in Wayne, Fairfield and elsewhere in New Jersey. T810:9-11

185. Rexon's 70 Old Turnpike Road facility in Wayne started operations in 1960. T810:12-16

186. Since 1960, Rexon's Wayne operations have provided assembly of mechanical and electro-mechanical devices for ordnance fuses. Exhibit No. 15, at ¶4

187. Rexon's Wayne operations included the use of hazardous solvents such as TCE and TCA. T826:10-12; Exhibit No. 20 (p.3-3 to 3-5); Exhibit No. 22 (p.2)

188. Rexon's Wayne operations generated waste streams from degreasing and cleaning operations, which waste streams consisted of TCE and/or PCE in the 1960's. Exhibit No. 15, at ¶5a.

189. In the 1970's, Rexon's Wayne operations generated waste streams from degreasing and cleaning operations, which waste streams consisted of TCA and cutting oils. Exhibit No. 15, at ¶5a.

190. The earliest manifest record for off-site hazardous waste disposal under RCRA at Rexon's Wayne facility was May 1, 1986. Exhibit No. 19 (p.2)

191. Since 1988, Rexon's Wayne facility has been the subject of open and ongoing ECRA Case No. 88789. Exhibits Nos. 14 and 56 (Administrative Consent Orders)

192. The ECRA investigation has resulted in a groundwater cleanup due to the presence of VOCs. T773:2-7, Exhibit Nos. 14 and 56 (Administrative Consent Orders)

193. Free product concentrations of VOC contamination have been identified in the groundwater beneath REXON's Wayne facility. T777:19-780:8, Exhibit No. 57 (under Section II, Free Phase Contamination, 1,380,940 ppb total VOCs was detected)

194. REXON Wayne's septic system was identified by the NJDEP as an ECRA Area of Environmental Concern, since the NJDEP had determined that VOCs had been discharged into the septic system. T806:21-808:1; Exhibit 57, p.8-9

195. Chlorobenzene, TCA and toluene were detected in the septic sludge at REXON's Wayne facility. Exhibit No. 17 (April 26, 1989 NJDEP Memo - "1,1,1-TCA is used by REXON and toluene is used in the manufacturing of explosives and paints, both used at REXON.")

196. REDM's Wayne facility used a series of septic tanks that totaled approximately 3,500 gallons of capacity. T558:11-14

197. REDM's Wayne facility was an early customer of Caldwell Trucking, as reflected in the ledgers dating back to 1963. T446:3-447:14

198. REDM's Wayne facility was serviced at a frequency of one or two times per year. T559:19-560:2

199. Five thousand (5,000) gallons could have been removed from REDM's Wayne facility due to the amount of sewage entering the system during the time it took to empty the tanks. T559:9-17

200. Bud O'Connor personally serviced REDM's Wayne facility, and observed that this waste had a different odor than that typically associated with domestic septage. T560:3-22

201. REDM Wayne's septic tanks were packed with solids, evidencing the absence of biological degradation. T563:9-564:13

202. Rexon's Wayne wastes were dumped into the Central Lagoon Area. T620:12-24; T451:3-12

203. A small spill of REDM's Wayne waste on the TBSA parking lot asphalt caused the pavement to dissolve. T460:5-21; 560:24-563:8

204. Caldwell Trucking eventually discontinued servicing REDM's Wayne facility as a result of the TBSA spillage incident where septic removed from the Wayne facility's septic tank septic tank spilled and burned a hole in an asphalt surface. T460:5-9

205. Between 1962 and 1982, Rexon's Wayne facility generated 150,000 gallons of waste (7,500 gal/yr) that was collected by Caldwell Trucking Company, and after application of the multiplier and discount factors, results in an adjusted volume contribution of 262,500 gallons. T328:12-14; Exhibit No. 45

Rexon's Audrey Place Facilities in Fairfield, New Jersey

206. Rexon commenced operations at 8 Audrey Place in 1971 when REDM purchased the operating assets of Tyco. T811:6-9

207. Rexon subsequently expanded its Fairfield operations to include a separate building at 5 Audrey Place. T811:10-14

208. Rexon's 8 Audrey Place operations included metal machining. T829:21-830:7; Exhibit No. 15, at ¶4

209. Rexon's 5 Audrey Place operations included assembly work and warehousing. T830:15-25

210. Rexon's operation at 8 Audrey Place included the use of solvents such as TCE. Exhibit No. 22 (p.2)

211. Rexon's 8 Audrey Place operations generated waste streams consisting of cooling oils and degreasers. Exhibit No. 15, at ¶5a

212. The earliest manifest record for off-site hazardous waste disposal under RCRA at Rexon's Audrey Place facility is March 24, 1982. Exhibit No. 19 (p.2)

213. Since 1988, Rexon's 8 Audrey Place facility has been the subject of open and ongoing ECRA Case No. 88790. Exhibits Nos. 14 and 56 (Administrative Consent Orders)

214. REDM's 8 Audrey Place facility had two 1,000 gallons septic tanks. T628:23-25

215. A 1990 analytical sampling of Rexon's 8 Audrey Place septic sludge confirmed the material was VOC contaminated at a near

free product level. T768:4-768:22; Exhibit 18 (June 24, 1991 H2M Work Plan for Septic Tank Removal, "Analytical data of a sludge sample obtained on June 14, 1990, indicates that the septic tank has received non-sanitary discharges. Total petroleum hydrocarbons were quantified at a concentration of 50,000 parts per million; targeted volatile organic compounds were quantified at a total concentration of 165,100 parts per billion.")

216. A sample of the 8 Audrey Place septic sludge failed the TCLP leaching test for VOCs such as vinyl chloride, TCE, TCA and chlorobenzene, resulting in the sludge's classification as hazardous waste. Exhibit 18 at Section 1.2

217. Caldwell Trucking Company serviced REDM's Audrey Place septic systems. T447:15-449:8; T555:16-25; Exhibit No. 40 (p.5-7)

218. Rixon maintained accounts payable ledgers evidencing Caldwell Trucking Company's service of its 5 Audrey and 8 Audrey facilities. Pretrial Stipulation No. 20; T262:24-263:5; 269:4-8; Exhibit No. 40 (p.5-7)

219. Rixon's own business records reflect Caldwell Trucking Company's first pickup from Rixon's Audrey Place facilities on April 15, 1972. Exhibit No. 40 (p.5-7)

220. Small trucks that dumped Rixon's waste in the lagoons initially served Rixon's Audrey Place facilities. T556:7-11

221. Rixon began to experience problems with their septic

'system fairly quickly after moving into Fairfield, within a matter of months. T449:23-450:12

222. After Rexon developed problems with its Fairfield septic systems, Caldwell Trucking Company occasionally left a 5,000 gallon tank trailer, which would be filled and then hauled back to the site for disposal in the lagoons or, later, tanks. T450:22-451:2; 556:12-557:19

223. Rexon's Fairfield wastes were mostly disposed into the Northern Lagoon Area. T620:12-24; T451:3-12

G. As Concerning the Allocation of Responsibility:

224. Between 1996 and 2000, litigation was stayed to permit for alternative dispute resolution ("ADR") in an effort to settle this and related cost recovery and contribution cases.

225. The initial Fed. R. Civ. Pr. 26 conference was conducted on April 9, 1996, at which time the plaintiff PRP Group and the defendants requested the litigation be stayed to allow for ADR. The Court agreed and entered Case Management Order I on April 25, 1996, which served to consolidate this action with USEPA's §107 action for the limited purposes of case management, stayed further pleadings and discovery, provided for the filing of amended and third party complaints, and provided the basis for developing an ADR plan.

226. Case status conferences were held on July 30, 1996, and August 15, 1996, at which time the parties moved before the Court

to approve the ADR Process as agreed between the parties. The Court thereafter entered Case Management Order III on August 16, 1996, which, inter alia, provided a detailed ADR procedure and schedule. More than 95% of the defendants and third-party defendants agreed to participate in the ADR Process.

227. Pursuant to CMO III, the Court-appointed Neutral, Mathew Low of TLI Systems, Inc., issued his confidential Non-Binding Draft Preliminary ADR Report on May 18, 1998, and his confidential Non-Binding Preliminary ADR Report on September 29, 1998.

228. The ADR report provided the basis for significant settlement discussions with the participants in October 1998 resulting in settlements between plaintiff and approximately thirty-three (33) defendants. As a result of the ADR Process and the Neutral's reports, plaintiff made settlement offers to approximately sixty-seven (67) defendants, resulting in thirty-three (33) acceptances of said offer of settlement. Plaintiff promptly moved before the Court in October 1998 seeking approval of the settlements between plaintiff and thirty-three defendants, resulting in the Superceding Order Dismissing Defendant Parties With Prejudice And Entry Of Bar Order, entered on or about December 18, 1998.

229. The Court continued the stay of discovery so as to permit the remaining parties to engage in settlement discussions. These discussions resulted in settlements with approximately fifty-six

(56) additional parties. Plaintiff again moved before the Court seeking approval of these settlements, resulting in the Order Dismissing Defendant Parties With Prejudice And Entry Of Bar Order, entered on March 1, 2000.

230. The Court thereafter entered similar Bar Orders on July 25, 2000, February 13, 2001, October 22, 2001, and June 6, 2002, dismissing approximately twenty-seven (27) additional parties.

231. Collectively, the allocated share for the 116 settled Defendants represented approximately 20% of the Site's costs. The parties and the Court accepted these allocations as fair, reasonable and equitable. Not a single defendant, including Pullman, offered any opposition to the Court's approval of these settlements.

232. Spaulding Composites, Co., Inc., named as a defendant in both US v. Spaulding Composites, Docket No. 94-5451, and Caldwell Trucking PRP Group v. Spaulding Composites, Docket No. 94-3531, also participated in the ADR Process, and was allocated responsibility for 19.72% of the total Site. Spaulding stipulated its acceptance of this allocation share.

233. The 116 previously settled parties (representing collective responsibility for approximately 20% of the Site) together with the nearly 20% share accepted by Spaulding Composites, resulted in a 40% allocation of the Site's costs. As a result, only sixty percent (60%) of the Site's costs remained

unallocated (the "Unallocated Site Costs").

234. The PRP Group retained E. Michael Thomas to prepare an Allocation Report for the Unallocated Site Costs for the remaining eighteen (18) parties, which included the members of the plaintiff PRP Group.

235. Mr. Thomas limited his allocation to the Unallocated Site Costs (60% of the Site) since 40% of the Site's costs had already been allocated and accepted by the 116 previously settled defendants and Spaulding Composites. T242:9-243:24; 351:1-11; 354:2-355:8.

236 It was reasonable for Mr. Thomas to accept the shares of liability allocated to the prior settled defendants and Spaulding Composites, which allocation shares were obtained following a lengthy ADR Process, and which were either accepted as a basis for settlement or expressly stipulated by such parties. T354:2-355:8

237. The allocation discipline involves a number of disciplines, which has developed over the past 20 years by applying a set of generally accepted principles to the facts of a particular case, in a transparent and comprehensible way to allow parties the ability to understand the basis of their allocation. T245:10-246:6

238. A significant component of the allocation is legal, but also requires the ability to understand contamination. T246:7-247:20

239. The PRP Group's allocator was qualified to perform an allocation in this case. T248:14-249:6; 255:1-256:14

240. Most Superfund allocators are attorneys by profession. T249:7-20

241. An allocator's methodology and criteria derive from the Gore Factors, which have by and large been adopted by case law and allocators nationwide. These factors must be applied in a comparable fashion to all parties in the allocation. T250:8-251:10

242. During ADR processes, allocations are subjected to peer review in the sense that parties as well as courts review and accept such allocations for settlement purposes. T251:20-252:14; 253:2-254:9

243. Written documents generally establish the nexus between the parties and the Site. T259:9-260:4

244. Allocators deal with documentary gaps using interview and depositions of site owners and operators. T260:20-261:17

245. It is customary and usual for allocators to rely on owner and operator statements if these are deemed reliable. T269:16-270:15

246 Allocators prepare what is known as the waste-in list, which was prepared for each of the remaining parties in this case. T261:18-263:10

247. Volumetric waste contributions from each party were prepared based on information provided by the nexus documents.

T263:11-264:4

248. Factual information summaries were prepared for each party using the parties' own §104(e) Responses to the EPA's Request for Information and other available sources of information.

T264:17-267:20

249. Insufficient information was available to allow what is known as the "Driving the Remedy" allocation approach. **T311:4-25**

250. Not a single party to the allocation had information on the quantities of VOCs they had contributed to the Site. **T312:20-24**

251. The defendants' desired "Driving the Remedy" allocation approach was not possible due to the absence of the type of information necessary to allow such an approach. **T270:16-272:14**

252. There was no possibility for any divisibility analysis due the information and circumstances present at this Site.

T402:21-403:6

253. The PRP Group's modified volumetric allocation approach, which assigns liability in proportion to the volume of waste contributed by each party, was the only reasonable basis for allocation for this Site. **T272:15-18**

254. The volumetric approach was modified to take into consideration: (1) waste that may never have been disposed at the Site; (2) waste deposited into the tanks in the post-1974 years; and (3) a potential toxicity multiplier due to knowledge of the wastes' hazardous content. **T273:18-283:25**

255. An industrial waste multiplier served as a surrogate for toxicity, and was applied to all non-septic wastes. T304:3-21

256. The principles of allocation were uniformly applied to all parties to the allocation. T309:4-15; 313:6-17

257. With respect to defendant Pullman, the allocation covered three of its facilities (two in Fairfield, the other in Wayne) where the nexus documents demonstrated waste had been sent to the Site. T315:1-5

258. Pullman had accounts payable ledgers for its Fairfield facilities between 1973 and 1982. T315:9-13

259. The original allocation had assumed a 1966 start date for Pullman's Fairfield operations based on the operators' statements that all three facilities were serviced in the 1960's. T319:2-13

260. Pullman's Fairfield wastes were not subjected to the allocator's industrial waste modifier. T320:1-321:5

261. Pullman's adjusted waste volume from its Fairfield facilities was 752,000 gallons. T323:5-10

262. Given Pullman's waste from its Wayne facility, which was estimated based on operator testimony and was subjected to the industrial waste modifier, Pullman's total adjusted waste volume was estimated to be 1,014,503.2 gallons. T323:13-324:12; 327:16-328:22

263. Assuming a 1971 start date for the Pullman Fairfield facilities, rather than 1966, Pullman's total adjusted waste volume

would be reduced to 655,855.5 gallons. T329:6-334:2

264. Compared to the other allocations for the remaining parties, Pullman's allocated percentage liability was 13.42% (based on a 1971 start date) of the 60% Unallocated Site Costs, which is equivalent to an allocation of 8.05% ($13.42\% \times 60\%$) of the total Site Costs. T342:19-22; 356:5-12

265. The PRP Group's allocator spent greater than 500 hours preparing this allocation. T343:4-17

266. The PRP Group's allocation represents an equitable and fair allocation to these parties. T343:18-344:6

267. Defendant, The Pullman Company was the owner of all of the outstanding shares of REDM and REXON for the period October, 1984 to April, 1989 when it sold its shares to a management group known as Little Falls Acquisition Corporation.

268. Caldwell Trucking also provided waste disposal services for a chemical slurry waste from Mycalex Corporation (Spaulding Composites) which contained a high concentration of lead. Mycalex was the largest customer by volume of Caldwell Trucking, and the chemical slurry waste from Mycalex was disposed of into lagoons and surface impoundments at the Caldwell Trucking site. T606:15-609:10

269. Caldwell Trucking also permitted several other liquid waste haulers including Harris Sanitation, Febbi, Morris Septic Service and Constantino Disposal Service to use the Site as a disposal facility. Disposal charges to these haulers were recorded

separately, and do not appear in the ledgers or daybooks for the Company. T532:15-532:23

270. Harris Sanitation was in the business of liquid waste disposal, and Harris used the Caldwell site for disposal of its customers' waste several times a week for many years. **Pre-Trial Order Stipulated Facts 22:8**

271. The North lagoon or Filter Bed was used thereafter as the disposal location for liquids after they were precipitated in the other lagoons, and the North Lagoon or Filter Bed was also used for direct disposal of water wastes from customers whose septic systems experienced water infiltration in flood zones and during period of heavy rainfall. T473:9-473:15

272. As of June 30, 1975, Caldwell Trucking Company was deemed a transfer station for septic and other fecal liquids at its Fairfield facility as evidenced by a Registration Statement for a Solid Waste Facility filed on that date. **Def. Ex. 2.**

273. Prior to the Cease and Desist Order from the Public Utilities Commission served in May, 1973, Caldwell Trucking Company used the filter bed for waterwaste including the waste from Rexon's Fairfield facility as well as other tanks with rainwater filtering into them. **Def. Ex. 3, page 300814.**

274. The filter bed also known as the North Lagoon was located on Area 53, Lot D. The filter bed was a separate and distinct operation from the seepage lagoons for septic tank waste contained

on Area 53, Lot C. Def. Ex. 3, page 300814.

275. Water removed from customer septic tanks during heavy rains would be directly deposited in the Filter Bed at the Caldwell Trucking site. Def. Ex. 4, page 300730.

276. All trucks from companies using the Caldwell Trucking site other than Caldwell Trucking Company would deposit liquid wastes in the transfer pits located on Area 53, Lot C as of March 7, 1973. Def. Ex. 5.

277. Septic waste from customers would be placed in the seepage lagoons on Area 53, and this material would not be dumped at anytime directly into the filter bed on Area 53, Lot 2D. Def. Ex. 5.

278. As of April, 1973, thirty-five (35%) percent of the waste hauled by Caldwell Trucking Company came from two (2) customers, Mycalex Corporation (Spaulding Composites) and S.B. Thomas Bakeries of Totowa, New Jersey. Caldwell Trucking Company hauled at that time approximately 180,000 gallons of S.B. Thomas waste approximately every ninety (90) days. The Mycalex Corporation waste totaled approximately 120,000 gallons to 180,000 gallons per year at that time. Def. Ex. 6.

279. Caldwell Trucking Company represented in April, 1973 that approximately sixty-five (65%) percent of its waste totaling 570,000 gallons was disposed of at General Marine Transporting in Bayonne, New Jersey comprised of septic tank waste and sewage

sludge. Def. Ex. 6.

280. As of April, 1973, industrial wastes from Mycalex Corporation (Spaulding), S.B. Thomas Bakeries, McGraw-Edison Company (Cooper Industries) and Schering Corporation totaled approximately 300,000 gallons per year. Def. Ex. 6.

281. As of July, 1973, the filter bed for water waste from customers was no longer being used. Def. Ex. 10, page 2.

282. The Caldwell Trucking Company first commenced the use of 5,000-gallon tank wagons in 1970. T465:13-465:18.

283. One of the first uses of the 5,000-gallon tank wagons was to pump out the General Hose facility that was adjacent to the Caldwell Trucking Company. T465:19-465:24

284. The north lagoon, which was the filter bed lagoon where the light liquids were placed, closed earlier than the lagoons in the central lagoon area. T490:19-491:1

285. The north lagoon closed about a year before any of the tanks were installed at the Caldwell Trucking Site. T491:2-491:14

286. Some customers had discrete wastes that were disposed of in separate, smaller lagoons in the central lagoon area. T492:4-492:15

287. In calendar year 1980, Caldwell Trucking Company handled 2,617,300 gallons of liquid waste. Def. Ex. 28.

288. For the calendar year 1979, Caldwell Trucking Company disposed of 3,018,000 gallons of liquid waste. Def. Ex. 29.

289. For the year 1975, Caldwell Trucking Company handled approximately 3,670,000 gallons for its customers. Def. Ex. 32.

290. At a minimum, 3.6 million gallons of liquids were run through the Caldwell Trucking Site during 1975. T509:10-509:19

291. Caldwell Trucking used Modern Transportation in South Kearny and General Marine in Bayonne as its ocean-disposal facilities. T619:2-619:9

292. Both Modern Transportation and General Marine maintained late evening operating hours for ocean disposal. T619:9-619:11

293. Rxon commenced operations at the 5 Audrey Place facility in or around 1971. This facility was an office, warehouse and assembly facility for safety fuses that employed approximately 40 employees. T830:13 - 830:25.

294. The septic system at the 8 Audrey Place facility was comprised of two 1,000-gallon tanks with a capacity of 2,000 gallons. Because this septic system for this leased facility was located in a known flood zone, Caldwell Trucking serviced the 8 Audrey Place facility on a weekly basis or even daily during the Fall and Spring and during periods of precipitation. T831:1-832:21

295. George J. O'Connor personally serviced Rxon's Fairfield facility with the 5,000-gallon tank wagon. T621:13-622:1

296. During the rainy seasons, George J. O'Connor personally observed the sound of rainwater infiltrating the 5,000-gallon tank wagon when he serviced Rxon's Fairfield facility's septic system.

T622:2-622:15

297. Once the Two Bridges Sewer Authority became available, Caldwell Trucking no longer used ocean disposal. **T624:13-624:16**

298. Once the Two Bridges Sewer Authority commenced operations, Rexon's Fairfield facility's liquid waste was directly discharged into the sewer and Rexon no longer required the services of Caldwell Trucking. **T625:1-625:17**

299. For the period 1971 to 1974, wastewater from Rexon's 5 Audrey Place facility was picked up on a quarterly basis which equates to four times per year for a three year period or 16 times. Accordingly, Rexon generated for disposal 16,000 gallons of wastewater from its 5 Audrey Place facility, and this liquid waste was land disposed into the Filter Bed or Northern Lagoon at the Caldwell site. **T613:9-613:25**

300. For the period 1975 to 1981, Caldwell continued to service the 5 Audrey Place facility on approximately a quarterly basis, and the wastewater from these visits was either stored in the tanks at the Caldwell site or taken directly for ocean disposal. Wastewaters from these transactions were not disposed of to the land at the Caldwell site during this period. **T619:1-621:1**

301. There was a problem with the functioning of the septic system at Rexon's Fairfield facility at 5 Audrey Place because it needed to be pumped out frequently. **T832:1-832:18**

302. Only the bathrooms were connected to the septic system at

Rexon's Fairfield facility at 5 Audrey Place and 8 Audrey Place; there were no floor drains or any other conduits other than the bathrooms connected to the septic system. T:846:6-846:15

303. There was no way to access the septic systems at Rexon's Fairfield facility at 5 Audrey Place and 8 Audrey Place from outside the site. T846:16-846:19

304. Rexon employed approximately 200 employees at its Wayne facility in 1967, 400 employees during the 1970's, and 250 employees during the 1980's. T831:3-831:16

305. Although the tank had four (4) inches of sludge containing VOCs, the aqueous or liquid phase comprised of approximately 1,500 to 2,000 gallons of liquid did not contain detectable chemical constituent VOCs. Def. Ex. 54, page 2.

306. The septic waste generated from Rexon's Wayne facility disrupted the asphalt on a sidewalk on only one (1) occasion, and this occurred when it was being transported to the Two Bridges Sewer Authority, but such an experience never occurred at the Caldwell Trucking Site. T623:5-623:17

307. Hazardous wastes generated by Rexon at its Wayne, New Jersey facility were recycled during the 1980's and 1990's. T826:10-826:20

308. The septic tank at Rexon's Wayne facility was located in the front of the building. T831:21-831:25

309. Only the bathrooms were connected to the septic system at

Rexon's Wayne facility; there were no floor drains or slop sinks in the assembly or manufacturing areas connected to the septic system.

T844:18-845:8

310. There was no way to access the septic system at Rexon's Wayne facility from outside of the site. **T845:12-845:22**

311. Caldwell Trucking restricted use of their disposal facility in Fairfield to liquid wastes transported by their vehicles in most cases, but the Company did permit four other liquid waste disposal companies to dump at their facility. These entities were Febbi, Constantino Disposal, Harris Sanitation and Morris Septic Company. **T497:3-500:18**

312. Febbi, Morris, Harris and Constantino were charged for disposal of liquid wastes by Caldwell Trucking, but separate records were kept for loads dumped by the entities. Accordingly, entries for disposal by these entities are not included in the Caldwell Trucking ledger books or daybooks. **T497:3-497:16**

313. The volume of waste disposed of by the non-Caldwell Trucking commercial haulers, including Harris Sanitation, Morris County Septic Company, Febbi and Constantino, were in addition to the volume of waste that is referenced in the day-books and ledgers. **T500:1-500:5**

314. Harris Sanitation and Morris County Septic Company were frequent customers of Caldwell Trucking. **T501:1-501:22**

315. These entities were single truck operations, and the

capacity of the trucks were each between 750 to 1000 gallons.

T500:19-501:22.

316. Harris Sanitation disposed of 643,000 gallons of liquid wastes and 540,000 gallons of liquids wastes in 1974 and 1975 respectively at the Caldwell Trucking site. T500:19-501:6

317. Harris Sanitation contributed a total of 1,183,750 gallons of liquid wastes of which 823,000 gallons were contributed during period Caldwell Trucking was dumping wastes into lagoons at the site. T500:19-501:6

318. Curtiss-Wright Corporation operated manufacturing facilities in Fairfield, New Jersey for all periods relevant to this action. Def. Ex. 34.

319. Curtiss-Wright Corporation was a continuous Caldwell Trucking customer for disposal of septic and chemical waste from the early 1950's through 1981. Def. Ex. 34.

320. Plaintiff Curtiss-Wright Corporation contracted with Caldwell Trucking Company to dispose of several chemical and septic waste streams from its Fairfield facilities. Def. Ex. 34.

321. Curtiss-Wright Corporation generated neutralized chromic acid, a chemical waste, that was removed by Caldwell Trucking and disposed of in the seepage or north lagoon at the Caldwell Trucking Site. T598:1-598:18

322. Caldwell Trucking used the 5,000-gallon tank wagon to remove the chromic acid waste generated by Curtiss-Wright

Corporation. T598:22-598:25

323. Curtiss-Wright Corporation maintained two (2) facilities off of Passaic Avenue near the Essex County Airport in Fairfield.

T599:1-599:15

324. Curtiss-Wright Corporation operated three (3) airport hangars and a wind tunnel that was also serviced by Caldwell Trucking. T599:16-599:20

325. The waste generated by Curtiss-Wright at the three (3) airport hangars was primarily septic waste in 500-gallon and 3,000-gallon tanks. T600:1-600:9

326. Caldwell Trucking picked up the chromic acid waste generated by Curtiss-Wright once a week in 5,000-gallon tank wagons from the 1950's through the 1970's. T600:18-600:25

327. Both the septic waste and the chromic acid waste generated by Curtiss-Wright were disposed of on the ground at the Caldwell Trucking Site prior to installation of the storage tanks.

T601:2-601:5

328. Caldwell Trucking picked up 4,000 gallons of septic waste twenty (20) times over a twenty year period at Curtiss-Wright's Hangar One facility, 750 gallons six (6) times over a twenty year period at Hangar Two, and 5,000 gallons two (2) times over a ten year period at Hangar Three. Caldwell Trucking also picked 500 gallons of septic waste two (2) times at Curtiss-Wright's Jet Test Cell facility, and 2,000 gallons twenty-five (25) times over a

twenty-five period at the Wind Tunnel. Def. Ex. 34

329. Curtiss-Wright contracted with Caldwell Trucking for disposal of many gallons of liquid wastes after the installation of the tanks at the Caldwell site. Def. Ex. 34

330. Schering Corporation operated a facility in Kenilworth, New Jersey, and this facility contracted with Caldwell Trucking for the removal of chemical waste containing chloroform for a pit at this facility. Caldwell Trucking removed, transported and disposed of this liquid waste in lagoons at the Caldwell Trucking site. T601:6-603:16

331. Schering-Plough Corporation in Union, New Jersey was an early customer of the Caldwell Trucking Company, and remained a customer of the Company. T601:6-601:15

332. Schering-Plough Corporation generated a non-sanitary industrial waste related to their manufacturing operations that was deposited into a large concrete pit on the outside of their facility and picked up by Caldwell Trucking. T601:16-602:9

333. The concrete pit used by Schering-Plough held approximately 20,000- gallons, and they would pump out the water to the sewer and leave the sludge for Caldwell Trucking to haul away. T602:10-602:19

334. The sludge generated by Schering-Plough and picked up by Caldwell Trucking had a chemical odor as opposed to a septic odor, had chloroform in it, and was a grayish color. T602:20-603:6

335. Schering was a customer of Caldwell Trucking from the 1950's through the 1970's. T603:7-603:15

336. Engelhard Corporation contracted for liquid waste disposal with Caldwell Trucking through its subsidiary Magna Manufacturing Facility in Haskell, New Jersey. T603:17-603:24

337. Caldwell Trucking hauled only one (1) or two (2) loads for the Magna division of Englehard in two (2) 750-gallon tanks. T604:1-604:4

338. The two (2) loads hauled by Caldwell Trucking from Magna had chemical waste characteristics and was believed to have contained VOCs which was disposed of into the lagoons at the Caldwell Trucking Site. T604:5-604:25

339. Caldwell Trucking was contracted by Fluid Conditioning Products, also known as Carborundum, located on Fairfield Road in Fairfield for liquid waste disposal for many years commencing in the 1950's. T609:11-609:25

340. Fluid Conditioning Products generated both septic waste and chromic acid waste that was picked up by Caldwell Trucking and disposed of into the lagoons at the Site. T609:16-610:18

341. Plaintiff Fluid Conditioning Products generated chemical waste streams to the Caldwell Trucking Company site including solvent waste from its Fairfield facility. Def. Ex. 43.

342. Caldwell Trucking did business with plaintiff Scovill, also known as General Hose, located adjacent to the Caldwell

Trucking Site. T611:1-611:7

343. General Hose generated septic waste that was serviced on a weekly basis with the 5,000-gallon tank wagon. T612:1-612:8

344. General Hose also generated waste oil and solvents on one occasion that was picked up with a 750-gallon truck and discharged into the ground at the Caldwell Trucking Site. T612:9-612:25

345. Caldwell Trucking's largest volume customer was Mycalex in Clifton, New Jersey. T605:15-605:24

346. Caldwell Trucking transported and disposed of a liquid chemical slurry waste from the Mycalex facility in Clifton commencing in the early 1950's through 1981. T606:1-606:9

347. The liquid chemical waste generated by Mycalex was dumped into lagoons and on the ground until 1975 at the Caldwell Trucking Site. T606:10-606:16

348. Caldwell Trucking came to learn that the composition of the waste generated by Mycalex contained lead. T606:22-607:9

349. Caldwell Trucking removed and transported liquid wastes from Mycalex approximately once per month with three (3) small trucks in the beginning, and later once per week with the 5,000-gallon tank wagon that would sometime require more than one trip. T607:10-607:25

350. Mycalex had a concrete holding pit at their facility in which liquid sludge pumped out by Caldwell Trucking. T608:1-608:13

351. Caldwell Trucking disposed of the waste generated by

Mycalex at the Caldwell Trucking site in the area of the lagoons until 1975. T608:14-609:10

352. Caldwell Trucking also disposed of the waste generated by Mycalex in the north lagoon on some occasions. T609:1-609:10.

353. Caldwell Trucking Company was owned by George O'Connor and after his death by his children, Ruth O'Connor and George O'Connor, Jr. Pretrial Stipulation 4.

354. Caldwell Trucking Company derived a significant financial benefit in providing a convenient source for disposal of liquid wastes, and the company further benefited by savings achieved in trucking and fuel costs as well as avoidance of tipping and disposal fees at other disposal facilities during the period it was using the lagoons at the site. Def. Ex. 1 and 3

355. Beginning in the early to mid 1970's the New Jersey Department of Environmental Protection ("DEP") conducted various inspections and investigations of the Caldwell Trucking Site. Pre-Trial Stipulated Facts 4:28

356. The United States Environmental Protection Agency ("EPA") has not approved the alternative remedy proposed by the PRP Group in place of the pump and treat system chosen by the Record of Decision. T149:3-149:17

357. EPA has not to date amended or withdrawn the pump and treat remedy that was proposed and adopted by the Record of Decision. T149:18-149:24

358. Both a remedial investigation and a feasibility study were completed by government contractors before the 1989 Record of Decision was adopted for the Caldwell Trucking Site. T174:12-175:23

359. The design of the groundwater pump and treat system that the PRP Group undertook was substantially completed before they embarked upon the alternative iron reactive wall approach. T176:21-177:1

360. McLaren Hart performed the design for the pump and treat system pursuant to the 1989 Record of Decision. T173:17-173:18

361. The costs associated with McLaren Hart designing the pump and treat system under the 1989 Record of Decision were paid by the PRP Group before they evaluated the feasibility of implementing the iron reactive wall at the Site. T177:2-177:7

362. Despite the PRP Group's best efforts, the EPA has to date not agreed to amend the 1989 Record of Decision to accept the iron reactive wall and the subsequent remediation at the seep at the Caldwell Trucking Site. T178:2-178:12

363. Under CERCLA, public participation is vitally important to the adoption of remedial alternatives and implementation of remedies at Superfund sites. T178:13-178:23

364. Public participation is an essential and required element of the remedy selection process under the National Contingency Plan. Def. Ex. 94.

365. The soil vapor extraction remedy was designed to address all VOCs except for lead. T182:16-182:22

366. Spaulding Composites (Mycalex) generated a lead slurry that was disposed of at the Caldwell Trucking Site. T182:23-183:2

367. The primary soil cleanup constituent at the Caldwell Trucking Site was lead. T183:3-183:18

368. Chemical chloroform was also a constituent of concern during the remediation process at the Site. T184:2-184:17

369. A significant quantity of volatile organic compounds still exist underneath the Caldwell Trucking Site despite the use of the soil vapor extraction remedy. T217:2-217:22

370. Both the remedy contained in the 1989 Record of Decision and the remedy designed by McLaren Hart called for the use of an air stripper at the Caldwell Trucking Site. T199:13-199:16

371. The supplemental remedy that is being performed at present in the area of the seep at the Site also contains an air stripper. T199:20-199:25

372. There were no costs built into either the operation, maintenance or monitoring costs associated with additional capital costs for either additional iron reactive walls or replacement of the iron reactive wall that is presently in place at the Site should that wall reach a stage where it can no longer remove the VOCs from the groundwater. T203:24-204:16

373. PRP search costs were being incurred up to the year 2000,

some seven (7) years after the present cost recovery action was instituted. T577:16-577:23

374. There have been no additional PRPs identified in this case in the last twelve (12) months. T578:8-578:12

375. The role of Kroll Associates was to investigate potential additional PRPs who may have contributed wastes to the Caldwell Trucking Site and they did not have any role with the environmental investigation or remediation of the Site. T579:10-579:19

376. Golder Sierra, the firm responsible for design and implementation of the Iron Reactive Wall at the Caldwell Trucking Company site projected that the Iron Reactive Wall would remove ninety-five (95%) percent of the TCE at the facility. Def. Ex. 78, page 1.

377. Plaintiffs authorized and paid for a Remedial Design Report for implementation of the groundwater pump and treat remedy at the Caldwell Trucking Company site, but this report with the steps outlined in the report were not implemented. Def. Ex. 74.

CONCLUSIONS OF LAW

1. Congress enacted CERCLA, 42 U.S.C. §9601 et seq. and, later, the Superfund Amendments and Reauthorization Act ("SARA"), 42 U.S.C. §9613, in order "to provide for liability, comprehensive cleanup, and emergency response for hazardous substances released into the environment and the cleanup of inactive hazardous waste

disposal sites." United States v. Rohm & Haas Co., 939 F. Supp. 1142 (D.N.J.1996) citing Pub.L. No. 96-510, Stat. 2767 (1980) (purpose clause).

2. CERCLA's statutory framework provides liability for any: (1) current owner or operator of a facility; (2) person who owned or operated the facility at the time of the disposal of a hazardous substance; (3) person who arranged for disposal or treatment, or arranged for transport for disposal or treatment, of hazardous substances at the facility; and (4) person who accepts or accepted hazardous substances for transport to sites selected by such person. U.S. v. CDMG Realty Co., 96 F.3d 706, 713 (3d Cir. 1996) citing 42 U.S.C. § 9607(a)(1)-(4).

3. Section 107(a) of CERCLA renders all four of these classes of potentially responsible parties ("PRPs") liable for "all costs of removal or remedial action incurred by the United States Government or a State or an Indian Tribe," as well as "any other necessary costs of response incurred by any other person." 42 U.S.C.A. §9607(a)(4)(A) and (B).

4. Section 113 of SARA provides that "any person may seek contribution from any other person who is liable or potentially liable under section 107..." 42 U.S.C.A. §9613(f)(1).

5. An action under §107 differs from an action under §113 in one significant respect: a §107 action can be brought only by innocent parties that have undertaken clean-ups, whereas an action

brought by a PRP, on the other hand, is by necessity a §113 action for contribution. See New Castle County v. Halliburton NUS Corp., 111 F.3d 1116, 1120, reh'g denied, 116 F.3d 82 (3d Cir. 1997).

6. In essence, a §107 "cost recovery" action imposes strict liability on PRPs for costs associated with waste cleanup and remediation and also imposes joint and several liability of PRPs, whereas a §113 "contribution" action allows one PRP to recoup that portion of its expenditures which exceeds its fair share of overall liability. New Castle County v. Halliburton NUS Corp., 111 F.3d at 1121-22.

7. The PRP Group's contribution litigation seeks to hold generator defendants liable as persons who "arranged for disposal" of a hazardous substance for disposal at the Caldwell Trucking Superfund Site.

8. In order to establish CERCLA liability under §113, a plaintiff seeking contribution under CERCLA must prove that: (1) the defendant must fall within one of four categories of covered persons; (2) there must have been a release or threatened release of a hazardous substance from defendant's facility; (3) the release or threatened release must cause the incurrence of response costs by the plaintiff; (4) plaintiff's costs must be necessary costs of response consistent with the National Contingency Plan. CERCLA §§101(14, 22, 23-25), 107(a), (a)(4), (a)(4)(B), as amended, 42 U.S.C.A. §§ 9601(14, 22, 23-25), 9607(a), (a)(4), (a)(4)(B).; CDMG

Realty Co., 96 F.3d at 712.

9. Defendant Pullman (REDM/Rexon) is liable to the PRP Group under CERCLA and comparable state statutory and common law theories since it generated wastes containing hazardous substances that were disposed at the Caldwell Trucking Superfund Site. All elements required to establish Rexon's liability are available.

10. The PRP Group has developed proofs demonstrating that Pullman is liable to it under CERCLA §113, Spill Act and the common law since Rexon contributed hazardous substances to the Caldwell Trucking Superfund Site.

11. Pullman, when it was known as R.E.D.M. Corp. and later as Rexon Technology Corp., utilized Caldwell Trucking repeatedly over the course of twenty years at all three of its facilities.

12. The former Caldwell Trucking owners and operators have testified concerning Pullman's waste deliveries to the Caldwell Trucking Site.

13. Documentary nexus, maintained by both Caldwell Trucking and Pullman, confirms that Rexon contributed wastes to the Caldwell Trucking Site.

14. Testimony and documentary evidence confirmed that Rexon disposed of hazardous substances into its septic systems, and these wastes were periodically collected by Caldwell Trucking and dumped at the Caldwell Trucking Superfund Site, incurring response costs.

15. Pullman and Rexon are deemed "persons" under the CERCLA

statute.

16. Rexon generated wastes, including wastes containing CERCLA hazardous substances, that it arranged for Caldwell Trucking Company to remove and dispose.

17. Hazardous substances have been released at the Site within the meaning of §101(22) of CERCLA, 42 U.S.C. §9601(22), including the types known to be present in Rexon's waste.

18. The release of hazardous substances from the Caldwell Trucking Superfund Site has required both the USEPA and PRP Group to incur response costs.

19. The former owners and operators of Caldwell Trucking Company have testified that wastes from all three of Rexon's facilities were deposited into unlined pits and lagoons at the Site.

20. Rexon's §104(e) Response to the USEPA's Request for Information acknowledged that its operations included degreasing, which generated hazardous substances.

21. Rexon's §104(e) response provides that it had been manufacturing mechanical and electro-mechanical devices for ordnance fuses since at least 1960, and that these operations included degreasing and cleaning operations that would have produced TCA and/or perchloroethylene during the 1960's and 1970's.

22. The ECRA files for both the Wayne and Fairfield Sites

confirm that Rexon used and disposed of solvents such as TCE, PCE and TCA into its septic tanks.

23. CERCLA §113(f)(1), 42 U.S.C. §9613(f)(1)(1994) provides: "Any person may seek contribution from any other person who is liable or potentially liable under section 9607(a) of this title ... In resolving contribution claims, the court may allocate response costs among liable parties using such equitable factors as the court deems appropriate."

24. Plaintiff PRP Group includes member companies that have undertaken a cleanup action compelled by the government, and may by this contribution action recover contribution towards their response costs, Transtech Industries, Inc. v. A & Z Septic Clean, 798 F.Supp. 1079, 1086 (D.N.J.1992), app. dismissed, 5 F.3d 51 (3d Cir.1993), cert. denied, 114 S.Ct. 2962 (1994).

25. The 116 previously settled parties (representing collective responsibility for approximately 20% of the Site) together with the nearly 20% share accepted by Spaulding Composites, resulted in a 40% allocation of the Site's costs. As a result, only sixty percent (60%) of the Site's costs remained unallocated (the "Unallocated Site Costs").

26. The PRP Group retained E. Michael Thomas to prepare an Allocation Report for the Unallocated Site Costs for the remaining eighteen (18) parties, which included the members of the Plaintiff PRP Group.

27. Mr. Thomas limited his allocation to the Unallocated Site Costs (60% of the Site) since 40% of the Site's costs had already been allocated and accepted by the 116 previously settled defendants and Spaulding Composites. T242:9-243:24; 351:1-11; 354:2-355:8.

28. There is no evidence in the record suggesting that the prior ADR Process allocations were unfair, unreasonable or inequitable.

29. It was reasonable for Mr. Thomas to accept the shares of liability allocated to the prior settled Defendants and Spaulding Composites, which allocation shares were obtained following a lengthy ADR Process, and which were either accepted as a basis for settlement or expressly stipulated by such parties or approved by the Court in bar Orders or other Opinions.

30. In cases seeking contribution among responsible parties, "a court may consider several factors, a few factors, or only one determining factor, ... depending on the totality of circumstances presented to the court." Environmental Trans. Sys., Inc. v. Enesco, Inc., 969 F.2d 503, 509 (7th Cir.1992).

31. "There is no precise or exclusive list of equitable factors to which the Court can or must turn to guide the instant determination." Hatco Corp. v. W.R. Grace & Co., 836 F.Supp. 1049, 1090 (D.N.J.1993), opinion modified on recon. on other grounds, 849 F.Supp. 987 (D.N.J.1994).

32. "Courts are to resolve contribution claims on a case-by-case basis, taking into account relevant equitable considerations." Village of Fox River Grove v. Grayhill, Inc., 806 F.Supp. 785, 790 (N.D.Ill.1992) (citation omitted).

33. Unofficial guidance concerning factors to be considered in this equitable apportionment is contained in the "Gore factors" originally proposed by then-Congressman Albert Gore as an amendment to the 1980 CERCLA bill which did not pass.

34. The "Gore factors" are summarized as follows:

(i) the ability of the parties to demonstrate that their contributions to a discharge, release, or disposal of a hazardous waste can be distinguished;

(ii) the amount of the hazardous waste involved;

(iii) the degree of toxicity of the hazardous waste involved;

(iv) the degree of involvement by the parties in the generation, transportation, treatment, storage, or disposal of the hazardous waste;

(v) the degree of care exercised by the parties with respect to the hazardous waste concerned, taking into account the characteristics of such hazardous waste; and

(vi) the degree of cooperation by the parties with federal, state, or local officials to prevent any harm to the public health or the environment.

126 Cong.Rec. 26,779, 26,781 (1980).

35. The Seventh Circuit in Environmental Trans. Sys., 969 F.2d 503 supra, wrote:

The language of section 9613(f) clearly

indicates Congress's intent to allow courts to determine what factors should be considered in their own discretion without requiring a court to consider any particular list of factors the allocation of cleanup costs is a type of decision particularly suited to case-by-case determination ...

36. The Gore Factors are neither an exhaustive nor exclusive list, since courts may consider any factor appropriate to balance the equities in the totality of the circumstances. See Environmental Trans. Sys., Inc., 969 F.2d at 509 (citations omitted); see also In re Hemingway Transport, Inc., 993 F.2d 915 (1st Cir.) cert. denied, 510 U.S. 914, 114 S.Ct. 303, 126 L.Ed.2d 251 (1993); Kerr-McGee Chemical Corp. v. Lefton Iron & Metal Co., 14 F.3d 321, 326 n. 4 (7th Cir.1994).

37. The primary equitable factors in this case are the final three Gore factors: (1) the degree of involvement by the parties in the generation, transportation, treatment, storage; the disposal of the hazardous waste; (2) the degree of care exercised by the parties with respect to the hazardous waste concerned; and (3) the degree of cooperation by the parties with federal, state, or local officials to prevent any harm to the public health or the environment.

38. These "Gore factors" tilt decidedly against Pullman since all other things being equal, the PRP Group cooperated with the government, whereas Pullman was a recalcitrant party that has

refused to cooperate with the government when ordered to clean up the Site in June 1993.

39. The allocation approach posited by the PRP Group's allocation consultant is fair and reasonable.

40. The "driving the remedy" allocation approach suggested by the Defendants is unfair and unreasonable since there is insufficient information to permit the application of such an approach.

41. Waste delivered to the Site after January 1, 1975 was deposited in the tanks, and contributed much less to the degradation of Site than did waste deposited into the on-site lagoons, requiring a 75% discount factor to be applied to all post-1975 deliveries.

42. The 75% discount factor was fair and reasonable since it remained necessary to count a portion of such waste shipments toward the overall allocation because of the potential for incidental spillage and because continued use of Caldwell Trucking Services helped to keep the company in business and thereby to continue contributing to the environmental degradation of the site.

43. Waste destined for off-site ocean disposal, which appears to have begun on July 1, 1970, would not have contributed to the Site's contamination. Given the absence of records, there remains uncertainty about whether the shipment might have in fact been delivered to the site initially because of tie-ups at the ocean

disposal facility or equipment problems or timing issues. As a result, it is fair and reasonable to conclude that waste reported as having been shipped by Caldwell Trucking directly to the ocean disposal facilities should receive a discount factor of 0.10 (a 90% reduction.)

44. As with the tank gallonage, it is necessary to count a small portion of such waste shipments toward the overall allocation because of the potential for incidental spillage and because continued use of Caldwell Trucking Services helped to keep the company in business and thereby to continue contributing to the environmental degradation of the site. Moreover, the shipments may, in fact, have been delivered on an interim basis to the site according to the O'Connors' testimony.

45. The environmental problems at the Site are primarily related to the presence of industrial waste chemicals, as opposed to strictly sanitary or domestic (human) waste.

46. During the time Caldwell Trucking was in operation, industrial and commercial establishments routinely introduced industrial waste chemicals into their septic systems thereby commingling the industrial and sanitary wastes.

47. Disposal of this commingled septic waste would account for contamination of the areas of the Site in which disposal of septic waste is the primary known activity.

48. Shipments of septic waste from industrial sources routinely included some proportion of industrial waste chemicals.

49 The available information does not permit a determination of the relative amounts of industrial and sanitary waste in any of the parties commingled septic shipments.

50. Direct industrial process waste shipments should receive a volume multiplier to reflect the fact that, other things being equal, such shipments are likely to have had a disproportionately adverse impact on the environmental conditions at the site.

51. An industrial waste multiplier of 2.5 (a 250% increase) for non-commingled industrial wastes is fair and reasonable.

52. The PRP Group's volumetric allocation, as modified through the application of discount factors and multipliers, which have been applied consistently for each and all of the remaining parties in the case, is fair and reasonable.

53. The PRP Group's volumetric conversion factors for the years 1962 to 1988 is based on the facts in evidence, and this Court finds them to be fair and reasonable.

Year	Price per load	Gallons
1962 - 1966	\$ 26.00	750 gallons
1967 - 1974	\$ 47.00	750 gallons
1975 - 1979	\$ 63.00	750 gallons
1980 - 1988	\$ 75.00	750 gallons

54. The PRP Group's volumetric allocation for all three Pullman facilities, as provided at length below, and assuming the

Fairfield facilities came into operation in 1966, is fair and reasonable. Assuming a 1971 start date for the Pullman Fairfield facilities, rather than 1966, Pullman's total adjusted waste volume would be reduced to 655,855.5 gallons, which estimate is also fair and reasonable.

AVERAGE MONTHLY VOLUME - AUDREY PLACE			
Year	Total Amount Paid to Caldwell Trucking As Indicated by Accounts Payable Ledger	Conversion to Gallons	Total Yearly Gallons / Number of Months
1972	\$6779.75	$6,779.75 \div 47 = 144.24$ loads $144.24 \times 750 = 108,180$ gal	108,180 gal / 8 months
1973	Dates of payment cannot be determined.		
1974	\$913.5	$913.5 \div 47 = 19.4$ loads $19.4 \times 750 = 14,550$ gal	14,550 gal / 4 months
1975	\$2646	$2,646 \div 63 = 42$ loads $42 \times 750 = 31,500$ gal	31,500 gal / 12 months
1976	\$451.15	$451.15 \div 63 = 7.16$ loads $7.16 \times 750 = 5,370$ gal	5,370 gal / 2 months
1977	\$136.50	$136.50 \div 63 = 2.16$ loads $2.16 \times 750 = 1,620$ gal	1,620 gal / 1 month
1978	\$105	$105 \div 63 = 1.66$ loads $1.66 \times 750 = 1,245$ gal	1,245 gal / 1 month
1979	\$598.50	$598.50 \div 63 = 9.5$ loads $9.5 \times 750 = 7,125$ gal	7,125 gal / 1 month
1980	No Accounts Payable entries for 1980		

1981	\$393.75	393.75 ÷ 75 = 5.25 loads 5.25 x 750 = 3937.5 gal	3,937.5 gal/ 1 month
1982	\$582.75	582.75 ÷ 75 = 7.77 loads 7.77 x 750 = 5,827.5 gal	5,827.5 gal/ 1 month
Total gallonage / Total # of months for which information is available:			179,355 gal/ 31 months
Average volume per month:			5784.64 gal/month

GROSS VOLUME		
Facility	Calculation	Conclusion
Wayne	7,5000 gal/year x 20 years (1962-1982)	150,000
Audrey Place	5784.64 gal/mo. x 196 months (January 1966 - April 1982).	1,133,789.4
Total Gross Volume:		1,283,789.4

TOTAL ADJUSTED VOLUME					
Industrial - Wayne:		Discount			Adjusted Volume
	Volume (gallons)	Ocean Disposal	Tanks	Toxicity Multiplier	
Pre-Tank (12 yrs)	90,000.0 0			2.5	225,000.00
Post-Tank (8 yrs)	60,000.0 0		0.25	2.5	37,500.00
Total	150,000. 00				262,500.00
Total Adj. Volume					262,500.00

Septic - Audrey Pl.:		Discount			Adjusted
	Volume (gallons	Ocean Disposal	Tanks	Toxicity Multiplier	

)				Volume
Pre-Tank (12 yrs)	624,741. 12				624,741.12
Post-Tank (8 yrs)	509,048. 32		0.25		127,262.08
Total	1,133,78 9.44				752,003.20
Total Adj. Volume					752,003.20
Total Septic & Industrial Waste Adj. Volume					1,014,503.20

55. After applying the allocation methodology to the remaining parties in this Case, including the plaintiffs, Pullman's percentage allocation of the 60% Unallocated Site Costs is either 19.34% (1966 start date for Fairfield facilities) or 13.42% (1971 start date), which is equivalent to 11.60% [19.34% x 60%] or 8.05% [13.42% x 60%] of the total Site costs, respectively.

56. Efforts similar to the PRP Group's allocation approach have been favored by other courts as well, where the volume of waste attributable to the parties can be reasonably calculated but the toxicity of the waste is unknown, a "quantitative apportionment will best serve as a foundation for the allocation." United States of America v. Alcan Aluminum Corp., ("Alcan-Cornell"), 1991 U.S. Dist. LEXIS 18721, *10 (N.D.N.Y. 1991); see United States v. Monsanto Co., 858 F.2d 160, 172 (4th Cir. 1988); Hatco Corp. v. W.R. Grace & Co.-Conn., 836 F. Supp. 1049, 1063 (D.N.J. 1993). See also U.S. v. Atlas Minerals and Chemicals, Inc., 1995 WL 510304,

E.D.Pa., 1995 (applying a hybrid volume-toxicity allocation approach.)

57. The Court rejects the Defendants' argument that it is Plaintiff's burden to prove whether and what waste contributed to the contamination in such a manner and quantity to have required remediation and/or has driven the remedy. With respect to liability, this "causation" requirement is contrary to well-settled case law interpreting CERCLA and this allocation process. Farmland Industries Inc. v. CERC, 922 F.Supp. 437, 441 (D.Colo. 1996) (a plaintiff need not prove causation to establish liability under §9613(f) of CERCLA).

58. As to a factor to be considered by the Court, the burden of proof as to causation is with the party arguing that its waste did not contribute to the harm at issue. Westfarm Associates v. Washington Sub. San. Com'n., 66 F.3d 669 (4th Cir. 1995); In re Bell Petroleum Servs. Inc., 3 F.3d 889, 893 n. 4 (5th Cir. 1993).

59. Equity demands that all of the parties bear proportionate responsibility for any "orphan share."

60. An orphan share is created by an inability to account for all waste into the Site or to assign and collect the appropriate share of responsibility from all parties that are liable under CERCLA. It includes the share of responsibility for unidentifiable PRPs or PRPs that are bankrupt, financially insolvent or otherwise

impecunious. See Charter Township v. American Cyanamid Co., 898 F. Supp. 506, 508 (W.D. Mich. 1995).

61. The orphan share at the Site potentially comprises of the following: residents that had septic tanks serviced by Caldwell Trucking, non-identifiable entities⁴ and parties who are financially unable to pay their allocated share.

62. The Court holds that any calculated orphan share should be apportioned *pro rata* according to the parties' allocation shares of liability.

63. The PRP Group is entitled to contribution towards the "orphan share," which is defined as the financial void created by the inability of a party to pay its share of cleanup costs at a site where multiple responsible parties are involved. U.S. v. Kramer, 953 F.Supp. 592, 595 (D.N.J. 1997).

64. CERCLA permits the District Court to equitably allocate orphan shares amongst the remaining responsible parties. U.S. v. Kramer, 953 F.Supp. 592, 601 (D.N.J. 1997); Pinal Creek Group v. Newmont Mining Corp., 118 F.3d 1298, 1303 (9th Cir. 1997).

65. Allocation of any orphan share shall be among all viable PRPs according to equitable principals. SC Holdings, Inc. v. A.A.A. Realty Co., 935 F. Supp. 1354, 1373 (D.N.J. 1996); New Jersey

⁴ While numerous PRPs have been identified, given the limited period for which ledgers or diaries exist and/or recollections of the O'Connors, a significant possibility exists that many customers are unidentifiable.

Department of Environmental Protection v. GEMS, Inc., 821 F.Supp. 999, 1008 (D.N.J. 1993) (noting broad equitable power of court to allocate appropriate shares); United States v. Rohm & Haas, Co., 721 F.Supp. 666, 675 (D.N.J. 1989); United States v. Cannons Eng'g Corp., 720 F.Supp. 1027, 1048 (D.Mass. 1989), aff'd, 899 F.2d 79 (1st Cir. 1990); Town of New Windsor v. Tesa Truck, Inc., 919 F.Supp. 662, 681 (S.D.N.Y. 1996); Caldwell Trucking PRP Group v. Spaulding Composites, Inc., No. 94 Cir. 3531, 1996 WL 608490 at *5 (D.N.J. April 22, 1996); United States v. Atlas Minerals and Chems., Inc., Civ. A. No. 91-5118, 1995 WL 516304, at *81 (E.D.Pa. Aug. 22, 1995) (quoting, United States v. R.W. Meyer, Inc., 932 F.2d 568, 576 (6th Cir. 1991)); see also Stearns & Foster Bedding Co. v. Franklin Holding Corp., 947 F.Supp. 790, 801 (D.N.J. 1996); Fresno v. NL Industries, 1995 U.S. Dist. LEXIS (E.D.Cal. 1995) (orphan share may be equitably allocated).

66. The District Court in U.S. v. Kramer held that any orphan share should be equitably apportioned among all responsible parties.

67. Similarly, the court in Pinal Creek Group v. Newmont Mining Corp., 118 F.3d 1298, 1303 (9th Cir. 1997) held that "under §113(f)(1), the cost of orphan shares is distributed equitably among all PRPs, just as cleanup costs are". See also Oshtemo 898 F.Supp. at 509 (W.D.Mich. 1995) (orphan shares should be apportioned among all of the solvent PRPs that are parties in the

litigation in amounts corresponding to their relative equitable responsibility).

68. In light of the contribution protection afforded to the Site's former owners and operators, the Court rejects defendants' argument that the Site's owners and operators should be assigned an allocation share in this litigation. For purposes of this case alone, the Court assigns a "zero" share of liability to Caldwell Trucking Company, Ruth Ann O'Connor, George J. O'Connor and OKON Corporation.

69. The PRP Group shall be awarded prejudgment interest and contribution towards its recoverable attorneys fees, which have been accumulating since the PRP Group took over responsibilities for the Caldwell Trucking Site in 1994.

70. Prejudgment interest shall be based on EPA's published Superfund Interest rates, and shall be applied from the later of the date of the written demand or expenditure of the costs under 42 U.S.C. §9607(a) (providing that parties found liable under this provision "shall" be liable for certain costs that "shall" include interest that "shall accrue from the later of (i) the date payment of a specified amount is demanded in writing, (ii) the date of the expenditure concerned." (Hatco Corp. v. W.R. Grace & Co., 836 F.Supp. 1049, 1089-90 (D.N.J. 1993) modified 849 F.Supp. 931 (D.N.J. 1994); United States v. Township of Brighton, 153 F.3d 307, 321 (6th Cir. 1998).

71. The PRP Group's recoverable attorneys fees shall be treated as general site costs pursuant to KeyTronic Corp. v. United States, 511 U.S. 809, 819-820 (1994).

72. The Court rejects the opinions concerning liability allocation provided by defendants' witness, Dr. Leigh Short, since these were comprised entirely of "net opinions."

73. During cross-examination, it was revealed that Dr. Short did not undertake an independent investigation of the facts, nor did he know or ever claim to understand the wastes that were alleged to have been contributed to the Site by any of the parties, including those he was retained to support.

74. Dr. Short acknowledged during cross-examination that the very assumptions that provided the underlying bases for his testimony and report had been represented to him by defendants' counsel, and Dr. Short admits that he made no effort to verify such representations, which cross-examination demonstrated to have been false.

75. Dr. Short's testimony and conclusions were unsupported by any accepted scientific methodology.

76. The Court rejects both the testimony provided and conclusions reached by Dr. Short relating to the allocation of damages, which testimony and conclusions were inherently unreliable and not based on facts in evidence.

77. Pullman did not offer any basis for a liability allocation other than to claim that Dr. Short's testimony must be accepted given his expertise.

78. The Federal Rules of Evidence prohibit the introduction of the net opinion of an expert into evidence. See May v. Atlantic City Hilton, 128 F. Supp. 2d 195, 198 (D.J.N. 2000). In New Jersey, courts have long rejected "net" opinion testimony. As set forth in Jiminez v. Genoc Corp., 286 N.J. Super. 533 (App.Div.1996), qualified expert testimony is only helpful if there is a factual or scientific basis for an expert's opinion. The net opinion rule requires an expert witness to give the why and wherefore of his expert opinion, not just a mere conclusion. As the Court noted, this rule "frequently focuses . . . on the failure of the expert to explain a causal connection between the act or instance complained of and the injury or damage allegedly resulting therefrom." Id. at 540. A net opinion must be rejected even though it is "surrounded by expertise." Id. at 542. The Federal rule is the same.

79. The opinions in the report of Kenneth Siet from Dan Raviv Associates submitted by Pullman is not admissible into evidence and cannot be relied upon by the Court since it is a net opinion

80. The Court finds the PRP Group's costs, including the costs to install the IRBW and supplemental seep treatment systems,

to be consistent with the National Contingency Plan and therefore are recoverable under CERCLA.

81. In 1990, the EPA revised the 1985 NCP and its provision for determining the consistency of private party response actions. County Line Investment Co. v. Tinney, 933 F.2d 1508, 1513-1514 (10th Cir. 1991) citing 55 Fed.Reg. 8666 (1990). In so doing, EPA declared that "[a] private party response action will be considered 'consistent with the NCP' if the action, when evaluated as a whole, is in substantial compliance with the applicable requirements in [a revised, more detailed list of NCP provisions potentially applicable to private party actions] and results in a CERCLA-quality cleanup." Id. citing 55 Fed.Reg. at 8858 (to be codified at 40 C.F.R. § 300.700(c)(3)(i)) (emphasis added).

82. In the preamble to the 1990 NCP, EPA defined a "CERCLA-quality cleanup" as a response action that satisfies the three remedy selection requirements of CERCLA section 121(b)(1). Id. at 1514. To satisfy these requirements, remedial actions must: (1) be 'protective of human health and the environment,' utilize 'permanent solutions and alternative treatment technologies or resource recovery technologies to the maximum extent practicable,' and be 'cost-effective' [;] (2) attain applicable and relevant and appropriate requirements (ARARs) [; and] (3) provide for meaningful public participation. Id. citing 55 Fed.Reg. at 8793.

83. While Courts in this Circuit have yet to decide this issue, other courts have found that costs that were undertaken with the knowledge and acquiescence of the EPA, but otherwise without formal public comment, are consistent with the NCP. See Norfolk Southern Railway Company v. Gee Co., 158 F.Supp.2d 158 (N.D. Ill. 2001); Bedford Affiliates v. Sills, 156 F.3d 416, 427-28 (2d Cir.1998); Sherwin-Williams Co. v. Artra Group, Inc., 125 F.Supp.2d 739, 752 (D.Md.2001) ("At least one circuit has concluded that evidence of a state environmental agency's involvement with approving cleanup plans and monitoring remediation progress was sufficient to satisfy the requirement of consistency with the NCP as a whole, and not merely with respect to the public participation requirements.") (citing NutraSweet Co. v. X-L Eng'g Co., 227 F.3d 776, 791 (7th Cir.2000)); American Color & Chem. Corp. v. Tenneco Polymers, Inc., 918 F.Supp. 945, 957 (D.S.C.1995) ("This court ... recognizes that governmental agencies charged with protection of the public interest may serve as substitutes for participation by individual members of the public, at least where the agency is actively involved in all aspects of the investigation, planning, and remediation of a release of a hazardous substance....").

84. In Bedford Affiliates, the Second Circuit found that "[w]here a state agency responsible for overseeing remediation of hazardous wastes gives comprehensive input, and the private parties involved act pursuant to those instructions, the state

participation may fulfill the public participation requirements." Bedford Affiliates, 156 F.3d at 428. The court noted that "since ... none of the parties to the action disputes the quality or cost of Bedford's cleanup efforts, to preclude its recovery solely because of the lack of public comment would ignore the equitable component that Congress and the EPA built into cleanup costs decisions." Id., at 429.

85. In Union Pacific R.R. Co. v. Reilly Indus., Inc., 215 F.3d 830, 835 (8th Cir. 2000), the Eighth Circuit agreed that public participation may fulfill the public participation requirement, but found the case before it to be distinguishable from Bedford Affiliates because the defendant had consistently asserted in the litigation that the plaintiff incurred unnecessary response costs. Id., at 838. Here, defendants have not disputed the quality or cost of the PRP Group's actual clean-up efforts.

86. There is evidence that the public has participated at all stages of the PRP Group's response efforts at the Site.

87. The PRP Group has sought the EPA's consent to attempt an innovative technology.

88. The EPA has fully consented to the PRP Group's application of the IRBW and supplemental seep treatment systems by staying implementation of the ROD's pump and treat remedy, which

EPA itself acknowledges may not be able to meet the Site's remedial goals within the next 100 years.

89. The IBRW and supplemental seep treatment systems have successfully treated groundwater, which the ROD's pump and treat remedy would have been incapable of providing.

90. The Court finds that the PRP Group's costs associated with investigation, construction, implementation, maintenance and monitoring of the IBRW and supplemental seep treatment systems are recoverable since these efforts are consistent with the NCP and have provided the Site with a CERCLA-quality cleanup.

91. The PRP Group's total recoverable remedial costs are \$22,122,371.24 (through June 10, 2002.)

92. The PRP Group's total recoverable attorneys' fees are \$1,105,287.55 (through May 31, 2002.)

93. As of June 10, 2002, the PRP Group's total recoverable site costs are \$23,227,658.79 [$\$22,122,371.24 + \$1,105,287.55$].

94. Through application of the 8.05% allocation share, Pullman shall contribute \$1,869,826.53 to the PRP Group for past costs, and which sum does not include the prejudgment interest that shall be awarded to the PRP Group and submitted separately.

95. The Court does not find the existence of any orphan share at this time, but in the event that a responsible party [defined as having been assessed a percentage allocation share] fails to

contribute its full assessment, and should the Court determine that the responsible party's share qualifies as an orphan share, Pullman shall contribute its pro rata share of any such orphan share.

96. The Court grants declaratory judgment against Pullman, requiring it to contribute its allocated share of all recoverable remedial costs incurred after June 10, 2002 and attorneys fees and expenses incurred after May 10, 2002, and which contribution shall continue in effect until such time as PRP Group is released from any further Site-related obligations under the Consent Decree.

97. The PRP Group shall assess future contributions from Pullman at a frequency consistent with the assessments requested of its own member companies, and Pullman shall pay each future assessment in full within 30 days of each assessment.

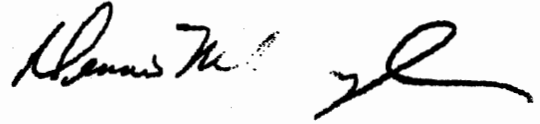
98. Within 30 days of the date of this Order, the plaintiff PRP Group shall file with the Court a Certification setting forth the precise contribution that Pullman shall be obligated to pay, including the application of prejudgment interest to past remedial costs and attorneys fees since 1993.

99. The Court maintains jurisdiction for the limited purposes of finalizing Pullman's past contribution share amount, including prejudgment interest, and future orphan share issues.

CONCLUSION

I will order a Judgment in favor of Plaintiff consistent with the findings made in this Opinion. I also will order that Plaintiff receive its costs. I have signed an Order of Judgment.

Dated:



DENNIS M. CAVANAUGH
UNITED STATES DISTRICT JUDGE