

UNITED STATES DISTRICT COURT
MIDDLE DISTRICT OF LOUISIANA

Dr. Janet Rami, Ph.D. and Mrs. Sheila Floyd,)	CV No. 99-437
)	
Plaintiffs)	DECLARATION OF
)	CDR BARRY LOVELESS
v.)	
)	Judge: "B"
Rhodia, Inc.,)	
)	Magistrate: M1
Defendant)	

I, CDR Barry K. Loveless, declare:

1. I have been the San Diego Area Operations Officer for the Southwest Division, Naval Facilities Engineering Command ("Southwest Division"), in San Diego, California, since April 1998. One of my responsibilities, as Operations Officer, is to oversee the execution of environmental cleanup projects at certain Navy installations in the San Diego area, including Naval Weapons Station Seal Beach, Fallbrook Annex ("Fallbrook Annex").
2. I make this declaration based on personal knowledge, as well as knowledge and belief based on review of official records maintained at Southwest Division and through reasonable inquiry of employees and personnel of Southwest Division, acting in the course of their official duties.
3. Southwest Division manages the Navy's Installation Restoration Program ("IRP") for site cleanup of Navy and Marine Corps installations in the Western United States. The Navy executes its IRP cleanup function under the authority of the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA), 42 U.S.C. §9601, *et seq.* and the Defense Environmental Restoration Program (DERP), 10 U.S.C. §2701, *et seq.* The President of the United States delegated his authority, under CERCLA, to various federal agencies (including the U.S. Department of Defense ("DOD") and the Environmental Protection Agency) through Executive Order 12580 (January 23, 1987). Under Section 2 (d) of this Executive Order, the DOD is the lead federal cleanup agency for releases (or threats of release) on-installation or where the sole source of the release is from a DOD installation.
4. Since the 1970s, approximately 35,000 canisters (approximately 2.8 million gallons) of Vietnam-era napalm have been stored outdoors at Fallbrook Annex. Over time, exposure to

the elements has caused many of the canisters to degrade, leading to occasional releases of napalm to the environment. Napalm is a mixture of approximately 33% gasoline, 46% polystyrene, and 21% benzene. The Navy, through various contractors, made attempts over the years to process the napalm canisters for disposal or recycling of component parts. Each attempt failed due, in large part, to the high polystyrene content of the napalm, which tended to clog machinery unless kept constantly heated.

5. The Navy's 1990 Addendum to its CERCLA Preliminary Assessment, for Fallbrook Annex, concluded that further napalm stockpile site inspection was warranted due to contamination from leaking canisters and possible soil contamination from preservatives in the wood packing crates. The assessment further recommended that the napalm canisters be demilitarized (i.e., withdrawn from the active munitions inventory and properly disposed). The 1991 CERCLA Site Inspection confirmed that significant soil contamination had not yet occurred. However, based on increasing incidents of canister leakage and the potential for air emission of hazardous substances (primarily benzene and gasoline), the Navy decided to take a CERCLA non-time critical removal action.

6. In 1994, the Navy, through an intra-agency agreement with the Department of Energy's Pacific Northwest Laboratory, managed by Battelle Corporation, obtained services to evaluate and execute the Navy's removal action.¹ In accordance with the U.S. EPA's CERCLA regulations and guidance, the Navy and Battelle completed an engineering evaluation and cost analysis (EE/CA) in December 1994. The EE/CA evaluated technological alternatives and, among other things, compared their implementability, protection against health and ecological risk, cost-effectiveness, and ability to meet state and federal environmental regulations. This EE/CA and a subsequent February 1995 Addendum were placed in the CERCLA administrative record file for public comment by the Fallbrook community. Upon review of public and regulatory agency comments, the Navy issued its decision in its March 1996 Action Memorandum.² The Action Memorandum selected on-site separation of the napalm, its canisters, and wood crates into separate waste streams. This was to be followed by shipment of the napalm waste stream to an off-site facility which was permitted to treat and blend hazardous waste for use by other facilities, authorized to burn supplemental fuels under the federal Resource Conservation and Recovery Act³ (RCRA) regulations for boilers and industrial furnaces (40 CFR Part 266). In addition, 42

¹ The Navy is now obtaining Battelle's services through a direct contractual relationship between Battelle and the Navy.

² A true and correct copy of this Action Memorandum was supplied to Rhodia's counsel for this litigation.

³ 42 U.S.C. §6901, *et seq.*

U.S.C. §9621 (c) and 40 CFR §300.440 ("CERCLA Off-Site Rule" or "OSR") also require that any facilities which receive CERCLA waste streams be specifically authorized to do so by the U.S. EPA. Finally, as indicated in the Action Memorandum, at p. 6, after completion of the removal action, the Navy plans to further study the site for residual contamination. This study will likely be in the form of a focused Remedial Investigation/Feasibility Study, followed by a Record of Decision.

7. In accordance with the Navy's Action Memorandum, Battelle subcontracted with Pollution Control Industries (PCI) of East Chicago, Indiana for treatment/fuel blending of napalm. Due in large part to public and political pressure resulting from the unfortunate historical stigma that napalm carries, PCI eventually defaulted on its contract. After extensive efforts to locate a replacement blender, which was CERCLA OSR-authorized by U.S. EPA, GNI Group of Deer Park, Texas was awarded a subcontract in July 1998. The contract provided that GNI would blend 1.7 million gallons of napalm over a 24-month period. A second subcontract was awarded in November 1998 to another blending facility for 800,000 gallons of napalm blending and disposal.⁴ This facility has been unsuccessful in finding any interested or qualified disposal facilities, and since GNI has the capacity to process additional quantities, their subcontract will likely be increased to include the entire estimated project volume of 2.8 million gallons. GNI was required to locate disposal facilities that met certain acceptance criteria, including possession of a RCRA-hazardous waste permit for burning of the blended fuel and CERCLA OSR authorization. Once again, due to napalm's historical stigma, industry interest was quite limited. Out of a total of 25 entities contacted, only 3 expressed significant interest. Out of these, Rhodia, Inc. and Chemical Waste Management were selected, based on application of the acceptance criteria.
8. In order to meet the approximate two-year production schedule,⁵ discussed in the Action Memorandum, GNI contracted for disposal capacity from Rhodia and Chemical Waste Management to dispose of the combined equivalent of 57 to 82 drained napalm canisters per day.⁶ Rhodia's contracted disposal capacity equates to approximately 40 to 54 canisters per day, while Chemical Waste Management's contracted disposal capacity equates to

⁴ Blending and disposal of the remaining 300,000 gallons has not yet been awarded to either subcontractor in order to allow for volume shortfalls during canister draining, and to ensure we can meet our contract commitments based upon initial volume estimates.

⁵ The original schedule end date in the Action Memorandum was 12 November 1999. Based on delays to date, the schedule has already been extended to February 2001.

⁶ This range is based upon the production output ranges in each contractor's contract. This also represents the maximum capacity range of each contractor.

approximately 17 to 28 canisters per day. If the Navy were unable to replace Rhodia, the loss of Rhodia's production output would add approximately 2.85 to 5.6 years to the two-year schedule. In addition, not even accounting for inflation, it is preliminarily estimated that project costs would increase by approximately \$12,312,000 to \$24,192,000.⁷

9. In light of the historical stigma and contracting experience to-date, the prospects of finding an alternative source for napalm-derived fuel disposal are very limited. Considering all the regulatory approvals necessary, the earliest that a replacement contractor might possibly be brought on-line would be 6 months. This is a very optimistic estimate.
10. As observed in the Action Memorandum, at p. 31, the passage of time is expected to pose the following problems:
 - a. The rate of canister degradation and failure is expected to increase over time, resulting in increased threat to human health and the environment.
 - b. Increased volatilization of benzene and gasoline, due to canister failure, may also diminish the value of napalm as a material that can be beneficially reused as a supplemental fuel. This may further limit the availability of treatment/disposal facilities.
 - c. The time delay is expected to significantly increase project costs, which itself might impact the Navy's ability to complete the project.

I declare under penalty of perjury that the foregoing is true and correct. Executed this 3rd day of June, 1999, at San Diego, California.

Barry K. Loveless, CDR, U.S. Navy

⁷ Time-dependent overhead costs are estimated at \$18,000 per workday. When this is multiplied by the total number of extended workdays (5.6 years (or 2.85 years) x 240 workdays per year x \$18,000 per workday), one arrives at the total increased overhead costs. This is only a preliminary estimate and assumes blending and subcontracting out by GNI of the entire quantity.