

Case Study Two North Hollywood Dump Superfund Site, Memphis, Tennessee

The Superfund program

The federal Superfund program is a program is designed to clean up¹ the most serious hazardous waste sites in the United States. These sites include many dumps or landfills, old industrial plants and refineries, abandoned mines and smelters, and federal military or nuclear sites. Superfund does not deal with currently operating solid waste landfills or active industries, but only with closed or abandoned sites. The federal program under the supervision of the United States Environmental Protection Agency (USEPA) deals only with the most serious of such sites, though state programs handle many others.

Under the “polluter pays” principle, the government takes legal action to get the former owners and users of the site to do the cleanup themselves or to pay for it. If the responsible parties cannot be identified or are now bankrupt, the costs are paid from a “Superfund” created by a tax on manufacturers of petroleum and chemicals.

The Superfund program was created by the Comprehensive Environmental Response, Compensation and Liability Act of 1980 (CERCLA) PL 96-510. In addition to setting up this program within the USEPA, the Act established the Agency for Toxic Substances and Disease Registry (ATSDR) as part of the Public Health Service to deal with the associated health issues.

The Superfund program requires re-authorization every five years. The most extensive changes were made in the first such re-authorization, the Superfund Amendments and Reauthorization Acts of 1986 (SARA) PL 99-499. SARA required higher and clearer standards for cleanup and sought faster cleanup. Most significantly for this project, SARA required the USEPA to seek increased public information, comment, and participation in decisions at these sites.

When the Superfund program started, no one really knew how many sites might eventually require this kind of treatment or how much it might cost. Indeed much of the technology needed for treatment did not exist then and has not even now been developed. Often the best that can be done is containment and monitoring. The first National Priorities List (NPL) was created in 1983 and contained 406 sites. This list is continuously updated as sites are completed and new ones are added. There were 1222 sites on the NPL as of November 22, 2000. These represent only a small fraction of what some estimate may be as many as several hundred thousand sites that present potential hazards to human health (United States. Congress. Office of Technology Assessment. 1989:129). The USEPA maintains a database called CERCLIS that lists these hazardous waste sites by state.² There have not been complete and systematic searches for such sites. Much of the dumping involved was surreptitious and illegal, and ordinary citizens have played an important role in locating and exposing the existence of the toxic wastes in their neighborhoods.

Sites are selected for the NPL on the basis of a Preliminary Assessment using a formal scoring system that ranks the amount of hazard presented by the site. The field investigation of sites, like much of the work of Superfund, is done by private contractors. Sites that receive a score high

enough to be on the NPL will be remediated by the Superfund program and those that get lower scores will not.³ There is room for a good deal of negotiation between the community, the state, the responsible parties, and the federal government before this happens. Listing is a regulatory process that requires a public comment period before the sites are final-listed in the Federal Register.

After listing on the NPL, the next steps for a Superfund site are the studies that lead up to a Baseline Human Health Risk Assessment and a Baseline Ecological Risk Assessment. These studies indicate the risk of future harm to people and other species because of exposure to the toxic materials present. If a site is complicated, it may be broken down into two or more Operable Units that are dealt with separately. Both of the Risk Assessments need to be completed before the Feasibility Study is prepared. The Feasibility Study proposes a range of possible remedies, each with their pros and cons and estimated costs. (One of the proposed remedies is always to do nothing.) One of the alternatives is indicated as the preferred choice, but this may get changed as a result of public discussion, with some new alternative even emerging from the discussions. This may be something that the Responsible Party considers can be done with less expense or some combination of the alternatives that had been suggested.

The selection of a remedy is always a matter requiring public comment, followed by the issuance of a Record of Decision (ROD) that tells, briefly, what will be done. After this the engineers go to work on the detailed design and construction contracts are signed. The whole process from site investigation to the completion of construction is likely to take many years--in the three cases studied for this project as much as twenty years or more. This does not mean that public health is under threat all that time, for the USEPA can undertake an emergency removal of hazardous materials at any time along the way to a more permanent solution.

The involvement of communities of faith at Superfund sites

Why have local congregations become involved with Superfund sites? At the neighborhood level, a church building (or a mosque, synagogue, or temple) may be located at the Superfund site. Its members may become concerned that they may be exposed to hazardous waste while in the building. Or a congregation may have members living in the neighborhood with illnesses or deaths in their family that they attribute to exposure to hazardous wastes. As part of their pastoral care, ministers or deacons, become involved in helping individuals attribute meaning to their suffering. A congregation may become embroiled in conflict over the significance of the pollution and what should be done about it. Thus religious congregations, like schools, businesses, and other local institutions, are sometimes part of the community most directly affected by the presence of hazardous waste.

At the level of the wider community of faith,⁴ city-wide or regional religious bodies may become involved with issues of hazardous waste as part of their work toward social justice. Examples of these organizations are judicatories such as the diocese in the Catholic or Episcopal denomination, the Methodist Conference, or a Presbytery or Synod. Indeed it is at the regional level of a county or group of neighboring counties that the engagement of communities of faith in an organized way is most likely to take place. This fact made it necessary to take something larger than the neighborhood as the unit of study in this project.

Most cities, counties, or states also have ecumenical or inter-faith organizations that become involved in issues of social justice. Such councils became engaged in some way at all three of the

Superfund sites studied in this project. In addition, clergy may be involved in ministerial associations that cross denominational lines. National religious bodies also make statements about environmental issues and other public policy issues. They may make financial grants to grassroots groups engaged at Superfund sites—and they did so in two of the three cases, Love Canal and Clark Fork (Milltown).

Not all religious groups are equally open to participation at Superfund sites. In the case studies and annotated bibliography developed for this project it will be obvious that the Catholic church, the mainline Protestant denominations, and the historically black denominations have been most involved. Predominantly white churches of evangelical or pentecostal types have been less engaged. Partly this stems from reasons of polity (church government) and partly from political and ideological reasons. For example, a highly influential evangelical financial guru, Larry Burkett, is a “virulent critic” of the Superfund program (Eskridge 2000). However, as a biblically-grounded evangelical rationale for environmental stewardship has been developed during the 1990s,⁵ there are signs that evangelical churches are becoming more open to these issues.

Each of the three sites chosen for this project has made a significant contribution to the history of the religious environmentalism and environmental policy in the United States. Just as Love Canal was the key site in the passage of Superfund legislation, it was the key site in the religious communities' recognition that they needed to respond to technological disasters as well as natural disasters. The Love Canal case study considers the shaping of the institutional structures for this response that took place during the two decades from 1979 to the present. Similarly, the North Hollywood case study indicates how the city of Memphis came to be prominently mentioned in a major document in the history of environmental justice. This was the influential 1987 study by the United Church of Christ Commission of Racial Justice that exposed the racial and economic inequalities in exposure to toxic wastes throughout the United States. The third case study, the Clark Fork River in Montana, the largest tributary of the Columbia River, is connected to a major document of Catholic social teaching on the environment, The Columbia River Watershed: Caring for Creation and the Common Good. This Pastoral Letter was circulating in draft form during the project research and has subsequently been revised and released. In their letter the bishops of the Pacific Northwest, from dioceses in both Canada and the United States, struggled with the claim of God's creation to be protected for its own sake and not only for human use. This makes an interesting parallel to the Clark Fork Superfund site, where the initial steps toward remediation dealt with urgent needs to protect human health but the current decisions, for remediation of the sediments along the river and behind the dam, require considering what is best for the health of the whole ecosystem, including fish as well as humans.

Communities of faith may become involved at any or all of the stages of response at a Superfund site. As the case studies for this project indicate, a religious group that becomes involved at an early stage may drop out and leave the field of community response to other players, perhaps re-engaging in a different way at a later stage. This project was mandated to look at the involvement of religious groups and inter-faith coalitions in site identification, the assessment and communication of risk, and remediation. In the case of Love Canal, a fairly stable organized coalition of religious groups stayed with the Superfund site over a long period of time. In the case of the Hollywood Dump in Memphis, religious groups were involved in site identification and the early stages of risk assessment but did not attempt to organize a lasting coalition to stay

with the Superfund process. And at the Clark Fork sites in Montana, secular environmental groups fostered intense public participation. That participation took forms that were quite different from the other two case studies, including heavy use of the EPA's TAG grants to hire technical experts and much more citizen input into the whole planning process. Coalitions at the Clark Fork sites are only beginning to engage religious groups quite late in the remediation process.

Why this project?

As indicated earlier, the USEPA is mandated to involve the public in decisions made at Superfund sites. This is done in a formal way by making public announcements that documents are available for public inspection at libraries near the site. Public meetings are called at key points in the process, minimally when the proposed plan for remediation is selected, before the Record of Decision (ROD) is issued and design and construction begin. A Community Advisory Committee may be formed to enable informed public input over a longer span of project history.⁶

Desirable as these formal opportunities for public participation may be, probably no one regards them as adequate. The issues involved at Superfund sites are complex enough that few people are likely to be able to understand the reports well enough to participate effectively without a great deal of time, study, and assistance. This biases public participation toward persons with more education and income. By the time the required public meeting is held, rather late in the Superfund process, the community may already be highly polarized. Deep divisions may have opened up between environmentalists and businesspeople or between persons who believe that the toxic materials at the site have damaged their family's health and those who believe such claims are exaggerated. It can only be helpful to broaden the avenues for public participation by engaging organizations that already exist in the community, especially ones that may help to bridge some of the divisions in order to reach consensus on how to solve the problem for the common good.

Churches and other religious organizations have been involved at Superfund sites from the very beginning of the program. When President Carter signed CERCLA in December 1980, a nun had been directing a broadly based ecumenical organization at Love Canal for a year and a half, a Baptist minister was chairing the Memphis Environmental Task Force as it addressed the hazards at the North Hollywood Dump, and an Episcopalian rector was deeply involved in community struggles with toxics in the well water of Woburn, Massachusetts. Yet these efforts have generally had a low profile in media coverage and social science research. This project was devised to help to fill that gap. Its intent is primarily descriptive, to indicate when and how religious groups have been involved and to what effect.

The project is one part of a larger five-year collaborative agreement between the USEPA and the Society for Applied Anthropology. The project design, with its centerpiece of three case studies, was specified in the contract. The researcher was allowed to choose the three Superfund sites. The three case study sites selected for this project were Love Canal in Niagara Falls, New York, the North Hollywood Dump in Memphis, Tennessee, and the Clark Fork complex of sites in western Montana.

A case study approach has often been used by the USEPA and by the Congressional Office of Technology Assessment in examining the Superfund program (United States. Congress. Office of Technology Assessment. 1988) (United States. Congress. Office of Technology Assessment.

1989) (United States. Environmental Protection Agency. Office of Emergency and Remedial Response. Community Involvement and Outreach Center. 1996). Sociologists have used a similar approach in studying environmental justice issues at Superfund sites (Bullard 2000) (Environmental Justice Resource Center 1997). The case study method used in such policy studies involves using a predetermined formal template to examine a fairly narrow set of questions. They typically use a larger set of five or ten case studies, enabling somewhat conclusive comparisons.

In contrast, anthropologists usually favor doing a single in-depth case study. Anthropologists put a program into context by studying the larger community. As they approach their ethnographic fieldwork they are open to following out threads of investigation that arise during the course of research rather than adhering to a template determined beforehand. They generate new hypotheses and insights as they go.

This project represents a compromise between the two conceptions of case study, ordering the material on three sites in such a way as to facilitate comparison, yet approaching each field site with the flexibility and openness to context that characterize anthropology.

Methods of the study

The traditional ethnographic field methods of anthropology dictate immersion in the life of a community as a participant observer for months or years. This was not practical under the time constraints of this project, which funded a total of three months of full-time work divided between three communities and an additional six months of part-time work. This schedule included literature review and writing, and no research assistance or clerical help was provided. Despite these limitations, it was possible to do some of the field work in this classic manner, by observing naturally occurring events—

- worshipping with two very different Memphis congregations at 8 A.M. and 11 A.M. services one Sunday morning,
- taking the scheduled group tour of the Milltown Superfund site,
- marching with environmental justice protestors in Memphis,
- eating at a church potluck supper with former Love Canal activists who are now deeply engaged in criminal justice issues.

The main method used was the open-ended interview with key informants. The persons interviewed were selected initially from among persons mentioned in news coverage of the site or mentioned by others as knowledgeable of the site. These persons were asked for additional suggestions, from which those who were mentioned more than once were contacted. Where full interviews were not practical, phone interviews were conducted. Additional contacts were made directly with some ministers of churches adjacent to sites, whether they were involved or not. The questions asked were different for each person and were designed to explore further the issues and events raised in the site literature. An informed consent form was used that allowed the respondent to choose between remaining anonymous or being acknowledged in the report. Because most persons were interviewed in some public role in which true anonymity would not be possible, almost all of those who gave full interviews are identified. The persons interviewed were true collaborators in this research, and the report relies heavily on their insights.

Archival research was as important as fieldwork in all three cases. This included reading newspaper accounts on microfilm (and for recent years, on-line). Another major archival source was the EPA site documents and administrative record available at EPA offices and public libraries near each site. These were in all cases too voluminous to read in detail, but large parts of them were skimmed. Special attention was directed to the materials indicating public responsiveness, particularly the transcripts of public meetings associated with the Record of Decision for sites. These transcripts are a valuable source of data on community involvement in the past.

Another helpful resource for understanding these communities was the few social science masters' theses and doctoral dissertations available for these communities. Precisely because they are unpublished student works rather than tightly written and polished for publication they often include a great deal of detail that is helpful for understanding the community, sometimes including direct quotes from anonymous individuals easily recognized as people interviewed years later for this project.

It is important to note that this project did not involve research concerned with the USEPA or the state environmental and health agencies. Officials of these agencies were not systematically interviewed and their programs were not evaluated.⁷ This was a research project concerning religious organizations in the communities surrounding Superfund sites. To research Superfund itself would be another whole project (and a very useful one).

Introduction to the Memphis site

At the outset of the Superfund program, when the first 110 sites were named in October, 1981, the top priority site for Tennessee was the North Hollywood Dump, a former municipal sanitary landfill located in north central Memphis. The Dump was selected for this research project to represent a Superfund site in a largely African-American community in an industrial city in the south. The city of Memphis was relevant to this project because of its position in an influential study of environmental justice by the United Church of Christ Commission on Racial Justice.⁸ Many of the main milestones at the North Hollywood site unfolded soon after the comparable events at Love Canal and mirrored them in some ways. At both sites, large chemical companies had dumped wastes from the manufacture of pesticides. Both sites were adjacent to elementary schools and residential neighborhoods. Neighborhood activists demonstrated as workers arrived on site to begin cleanup in December 1979 at Love Canal and February 1981 at North Hollywood. Religious leaders were involved at both Superfund sites, although the involvement of churches was neither as intense nor as persistent in Memphis as at Love Canal and it did not result in the building of a broader community coalition around the issue of toxic wastes.

The place

Memphis has long been a major hub for river, highway, railroad, and air transportation. Today Federal Express makes Memphis International the largest cargo airport in the world, as the signs welcoming travelers to the airport proclaim. In terms of regional geography and culture history, Memphis is less connected in some ways to the long, narrow state of Tennessee than to the Mid-South region of which it is the hub, including parts of Mississippi, Arkansas, and Missouri. Television news and weather broadcasts addressing “the Mid-South” are a daily reminder of this. A century ago, the black community of Memphis was shaped by rural to urban migration from the cotton fields of Mississippi, just as it in turn was a jumping off point for migration to Chicago and Detroit before and during World War I (Vaughn 1989 :102).

In 1980, at the beginning of both the Superfund program and organized community involvement working toward remediation of the North Hollywood Dump, the population of Memphis was 646,356. Blacks comprised 47.6 percent of the total. A decade of white flight in the 1970s had followed the integration of the school system. By 1984, Blacks outnumbered Whites.⁹ By 1991, when remedial design was starting at the North Hollywood Dump, the city had its first Black mayor, Dr. W. W. Herenton, former Superintendent of Schools. In other words, the period of history of the Hollywood Dump Superfund site is also the period in which Blacks moved from minority to majority status in the city of Memphis—a change with ramifications for every institution in the city.

In 1980 the white unemployment rate in Memphis stood at 3.3 percent while the black unemployment rate was 11.2. As the percentages rose with recession and fell again over the next several years, the ratio between them remained the same, with blacks about three times as likely to be unemployed as whites (Vaughn 1989:113-114). Black homeownership in Memphis is less than that of whites, but higher than in regions outside the South--47.3 percent of Memphis black households owning their homes in 1980.

The black population of Memphis continues, as in the past, to live predominantly in a crescent-shaped area extending from industrial North Memphis west along the Wolf River and south to the Mississippi River through the central city to the south side (Vaughn 1989). Predominantly

white areas include the midtown area and East Memphis. This residential pattern may help to account for the failure of the Hollywood Dump controversy in its day to engage more than the North Memphis black community. (Similarly the Memphis Depot Superfund site is currently of interest in black South Memphis, but it can hardly be said to have engaged the whole of the community.)

The Wolf River forms the northern boundary of the North Hollywood Dump. Just north of the river is I-40, the east-west interstate highway that bypasses downtown Memphis. South of the dump, residents of a poor black community occupy modest ranch-type houses. Many small Missionary Baptist churches dot the neighborhood. An elementary school, Shannon School, is located along the southwest edge of the dump. Chemical plants are located nearby, both to the west (Buckham Laboratories) and the east (Velsicol Chemical Corporation). A new community center and health center adjacent to the North Hollywood branch of the library attest to recent county expenditures in a long-neglected part of the city.

Median household income in the northern Memphis area near the Superfund Site (zip code 38108) was low, \$16,362 compared with a national median of \$30,056 and a Shelby county median of \$27,132 (1989 figures). The North Hollywood community is the poorest of the three case study communities in this project, though all three communities are below the national median. The comparable household income in Butte, Montana, was \$21,216, and in the Love Canal area (zip code 14304) was \$28,085.

A closer view of the black neighborhood of North Hollywood in the mid-1990s is possible because a graduate student in sociology at the University of Tennessee in Knoxville, Glenn Johnson, completed a dissertation dealing with the North Hollywood Superfund site. During nine months of fieldwork, he interviewed fifty residents of Memphis (Johnson 1996:34-36). About one third were African American residents of the Hollywood community, one third were politicians and bureaucrats, and one third were professionals resident in other parts of Memphis, some black and some white. Johnson did open-ended interviews, using snowball sampling to locate other knowledgeable or active individuals.

Researching and writing during the peak of national attention to problems of environmental justice, Johnson framed his account around environmental racism and a pessimistic evaluation of the ability of the Hollywood community to mobilize for collective resistance against it.¹⁰ Johnson's work was particularly useful in preparing this case study because he gives voice to anonymous residents of the North Hollywood neighborhood. However, one limitation of Johnson's focus on "voices" is that in order to maintain confidentiality he presents the interviewees as anonymous and isolated individuals. While Johnson mentions that some interviewees were active church members, he was not looking at church or neighborhood organizations **as organizations**. Therefore to complement his work, this project required a focus on organizations and on interviewing the acknowledged leaders of those organizations. For his dissertation, Johnson also reviewed newspaper accounts for the period March 5, 1980, through July 19, 1990 and constructed a chronology (his Appendix B). In this project the review was extended backward to 1979 and forward to November 2000.

The environmental issues

The Hollywood Dump served as municipal dump for household refuse as well as some industrial refuse beginning in the mid-1930s. The average depth of the layer of refuse is 26.5 feet. In 1963

a bridge was built across the Wolf River and Hollywood Street was extended through the dump, dividing the dump into a west sector and an east sector, together covering an area of about 70 acres (USEPA 1990).

The Hayden Chemical Company and its successor Velsicol had dumped chemical wastes at the North Hollywood dump from the late 1940s on. The Memphis and Shelby County Health Department closed the site to chemical dumping in 1964 and the city closed the dump completely in 1967. Even after the dump was closed, unauthorized dumping is thought to have continued at the unfenced site (USEPA 1990:3). Indeed in 1972, five years after closure, the county health department again ordered the Velsicol Company to stop dumping at the site.

After the North Hollywood dump closed, Velsicol developed a dumpsite for its chemical wastes some 50 miles upstream in a rural area of Hardeman county, Tennessee. Poor disposal practices at that site led to the contamination of local wells. This also became a Superfund site.

Among chemical companies, Velsicol was hardly known as a leader in environmental best practice. Velsicol was the company that tried to silence Rachel Carson by threatening legal action against her publisher Houghton Mifflin when a prepublication excerpt of *The Silent Spring* was first published in the *New Yorker*. In 1964 the U. S. Senate held hearings into a massive fish kill in the lower Mississippi that occurred in November 1963. The damage was traced to endrin discharged by Velsicol into Cypress Creek and the Memphis city sewer system (*Memphis Press Scimitar*, July 8, 1980, p. 13). Long after the use of the pesticide chlordane had been banned in the United States in 1989 as a probable carcinogen, Velsicol continued producing it for shipment abroad, earning it the Multinational Monitor's designation as one of the ten worst corporations in the U.S. Not until 1997 did Velsicol cease production of chlordane and heptachlor (*Multinational Monitor*, June, 1997).

When the North Hollywood chemical dumping first came to the attention of the city, concerns centered on the extent to which it might threaten not just the immediate neighborhood, but the deep aquifer from which the city draws its water, the Memphis Sands. Memphis takes special pride in its water, which is used in brewing Coors Beer. However, these concerns were dissipated when hydro-geological studies indicated that a thick layer of clay overlying the sands provided a natural barrier underneath the site. Of continuing concern was the threat of contamination of the Wolf River, which bounds the dump on the north. The Wolf River flows into the Mississippi at Mud Island, four miles to the west. The dump is located within the floodplain of the Wolf River. Groundwater from the dump flows northward into the river rather than into the residential neighborhood to the south.

With all parties anxious to avoid the mistakes of Love Canal, the Memphis and Shelby County Health Department pressed Congress for a well-designed and comprehensive health study. No health concerns or disease clusters had been reported in the immediate neighborhood of the dump, but a highly publicized case of possible exposure to toxic chemicals in Frayser, a neighborhood on the opposite side of the Wolf River, had dominated the news. In 1980 a research group from Johns Hopkins University under the directorship of Morton Corn was given a 12-month \$150,000 grant from the CDC to design a properly controlled study (not to carry it out). The design that Corn's group proposed at the end of 1981 would have cost some \$3 million to implement (Corn 1981). It called for testing 1600 people living near the dump and 3200 controls. No one was prepared to fund such a study at that time.¹¹

The scaled-down health study that was actually carried out by the health department three years later was much less comprehensive and about one-tenth as expensive as the Johns Hopkins proposal (Andrews 1988). It concentrated on the persons closest to the dump, a sample of 197 adults who lived within three blocks of the dump. It used a control group of 174 persons who lived in a neighborhood near, and just south of, downtown Memphis. The two groups were similar in age distribution, income, education, and other respects.

Soil samples in the two neighborhoods showed that the neighborhood near the dump had elevated levels of several pesticides, whether from the Dump or some other source. (The downtown control neighborhood had elevated levels of lead.) The collection of health data was targeted to probe for pesticides actually found at the dump: hexachlorobenzene, lindane, chlordane, heptachlor, dieldrin, and endrin. The Memphis and Shelby County Health Department and the CDC agreed on the plan for the smaller health study in 1984. Data was collected in 1985. The data analysis and draft report were completed in 1986, peer review and revision were carried out in 1987 and the final report was released in 1988. This was a long wait indeed for residents wanting results. Balanced against this wait, there was an important trade-off. The carefully reviewed study produced more reliable and useful results than has been the case with many small studies around other toxic sites.

The health study showed that Hollywood area residents **did** have significantly higher levels of certain pesticides in their bodies: hexachlorobenzene in serum and heptachlor epoxide in adipose tissue. Further, it was apparent that eating fish from the Wolf River was significantly associated with higher pesticide levels for the Hollywood residents, though the sample was small enough that the researchers could not exclude additional pathways of exposure such as spending time on the dump or breathing contaminated air.

The Superfund site chronology

The USEPA began investigating the North Hollywood site in 1979. It was named to the National Priorities List in October 1981 as Tennessee's highest priority hazardous waste site. Neighborhood and media interest in the site reached a peak in 1980-1981. In February 1981 the EPA removed contaminated soil. The site was covered with a 12-inch layer of soil and partially fenced as temporary measures while studies of the site continued throughout the 1980s. Both the City of Memphis and Velsicol, as 'responsible parties,' were involved throughout the 1980s in site studies and remedial actions, although through lengthy litigation they hoped to share the costs with other potentially responsible companies that might have used the dump. Community and media interest peaked again in 1984, centered partly around health studies of neighborhood residents that the county health department conducted at that time.

When the Feasibility Study was finally presented for public comment in the summer of 1990, there was little organized resistance to the proposed remedies. The public meeting at which EPA presented the plan was not held in the neighborhood but downtown, in search of air-conditioned space. Neighborhood residents did not travel downtown to attend the meeting. Later in the summer, 104 neighborhood residents did sign a petition expressing their concerns about the plan, particularly concerns about their health and safety during construction. They wanted the EPA to consider buying out their properties and relocating them (United States Environmental Protection Agency 1990), as had been done at Love Canal. The EPA responded that safety provisions were adequate, and construction went ahead without delay.

Conestoga-Rivers & Associates, an Ontario firm, did the remedial design for the dump. Remediation was carried out from 1994 through 1996--removing drums, grading, covering with a 2-foot clay cap, and fencing, all of which are typical processes of remediation for municipal landfills containing some hazardous waste. Continued monitoring of groundwater will be required to assure that contaminants migrating toward the Wolf River remain at acceptable levels. The site was considered unusable for commercial development and today remains a grassy, fenced field.

The only aspect of remediation that provoked much citywide controversy was the killing of contaminated fish in a 40-acre pond on adjacent private land. On the basis of high chlordane levels in fish, the EPA insisted on removing all the fish, draining the pond, and sealing off the contaminated bottom sediments before re-stocking the fish (Schellback and van Veen 1997). The City and Velsicol, who were responsible for paying the bill for cleanup, argued that the remedy was excessive (*Commercial Appeal*, Feb. 25, 1993), but they did not prevail.

The work was completed and the site was deleted from the National Priority List (NPL) in 1997. While the process may have seemed a slow one to residents, the remediation was complete earlier than many of the 400 sites listed on the NPL at the same time in 1983, including the other case studies in this research project—the Clark Fork and Love Canal sites (Sigman 2000).

The dynamics of community involvement

The newspaper accounts of the North Hollywood Dump are dominated by the name N. T. “Brother” Greene. North Memphis-born, Greene migrated and worked in New York City during his young adult to middle years. He returned to Memphis to “retire” in his forties, but now, at 75, is still physically active maintaining the rental properties he owns and manages. Formally educated only to the fourth grade, he is widely read and deeply self-educated. He attributes his concern about the environment to reading *Silent Spring* when he lived in New York. Shortly after he returned to Memphis he plunged into social activism on a succession of significant issues ranging from a leak in the city’s main sewer line to the proposed promotion of a white federal judge (N. T. “Brother” Greene interview, May, 2000, and *Commercial Appeal*, March 23, 1984). Greene claims no religious affiliation and even expresses annoyance that people in Memphis commonly say, “God bless you,” after a sneeze.

Brother Greene lived (in 2000 as in 1980) in a North Memphis neighborhood about two miles southwest of the dump. His organizational base there was the Cypress Health and Safety Committee, an organization distinct from the North Hollywood Neighborhood Association. Greene’s committee was named for Cypress Creek, which flows through the neighborhood. Cypress Creek was also contaminated by Velsicol pesticides but is not part of the North Hollywood Superfund site. Two of the environmental causes that Greene took on in 1980 were the North Hollywood Dump and suspected contamination in the community of Frayser. Frayser is located about the same distance from Greene’s home as the Hollywood Dump, but on the opposite (north) bank of the Wolf River. Frayser is working-class, unincorporated suburb that was largely white when it was annexed to the city in 1958.

A profound irony in the history of the North Hollywood Dump is that it owes much of its attention and action not to its own merits but to the health problems of a white family living on Steele Street in Frayser. The three children of the Pounds family developed rashes and other health problems in the summertime while playing in their back yard. When tested, the children

showed abnormal levels of organic phosphorus—an indication of pesticide exposure. The case dragged on from 1977, when Mrs. Pounds first sought help, to 1981. In March 1980 the Pounds family was featured on the nightly news on all the major national television networks (ABC March 19, CBS and NBC March 22, also NBC Sept 13 <http://tvnews.vanderbilt.edu>). Neighbors and the newspaper organized informal house-to-house health surveys in Frayser (*Commercial Appeal*, April 9, 1980). The EPA did extensive soil testing, but no evidence of a source was ever found for the supposed Frayser toxic wastes. Stung by accusations that they were not doing enough, EPA officials countered that they were spending more money in Memphis than anywhere else other than Love Canal.

Brother Greene took up the cause of the folks from Frayser, leading them in a sit-in at the governor's Memphis office to protest inaction on the Frayser case. It is hard to imagine another public figure in the Memphis of his day able to organize blacks and whites together, though eventually the Frayser people broke with him, considering him too radical. Through Greene's activism, the North Hollywood and Frayser sites became linked in EPA activity and in the media. While the Frayser case evaporated, for lack of scientific confirmation, the other persisted.

Without the interest stirred by Frayser, the newspaper readers might never have heard another word about the North Hollywood Dump. It does not require deep cynicism to imagine that the problems of poor black folks living near a city dump were not newsworthy. One resident of each community testified before the House Commerce Committee (*Commercial Appeal*, April 2, 1980). Both sites were on the agenda of a Metropolitan Task Force on the Environment that was set up by the EPA in 1980 for community input. Both sites drew the attention of the Environmental Defense Fund, whose spokesperson Ruffin Harris appeared on the March 13 CBS broadcast and attended meetings of the Metropolitan Task Force.

Brother Greene played an active and vocal role on that Task Force. His initial outrage was directed at the appointment of few residents of the affected Hollywood neighborhood to the Task Force and the choice of its first chair, a white engineer dismissively referred to by Greene as representing the Rotary Club. Changes in representation and leadership did take place, with the appointment of an African-American Baptist minister as chair. Greene continued to press for neighborhood perspectives, resisting compromise on cleanup decisions, although the Task Force had not been given such authority.

In February 1981, when Velsicol workers conducted the emergency cleanup agreed upon by the Technical Action Committee, Greene and three other protesters were arrested for chaining themselves to the fence of the dump near the gate. They argued, unsuccessfully, that residents should be evacuated while the toxic wastes from the "hot spots" were removed from the site. Officials responded that adequate safety precautions were being taken for the removal action.

The chairman of the Task Force throughout the North Hollywood assessment phase was the Rev. Hubon P. Sandridge, Jr., a minister appointed to succeed the first chairman, the engineer who had been so unacceptable to Greene. Sandridge grew up in the North Hollywood neighborhood, where his mother still lives in the family home. The church where he ministers, Thomas Chapel Missionary Baptist, is located not in the immediate North Hollywood neighborhood but is not far away, on New Raleigh Rd., north of the Wolf River. The church was founded by his step-grandfather in 1940, then pastored by his father beginning in 1956. His father built the congregation from 13 members to 250 or 300 at his death in 1976. The congregation then selected his son to follow him.¹² Under his leadership the congregation has grown to about 1000

(Sandridge, interview May 15, 2000, and participant observation, Sunday service, May 14, 2000). Its most recent building renovation and expansion took place in 1995.

Rev. Sandridge describes himself as a reluctant successor to his father, first in the ministry and then in his role as leader of the Belmont neighborhood association. In each case he resisted a “call” until it became inescapable, though personally he might have preferred to go on with a career in law or business. He has worked full-time in the Sheriff’s Department for 25 years since he finished college at Tennessee State in business administration. He takes special pride in having established a GED program for prisoners in his early years as a counselor at the county jail. His work on the Environmental Task Force provided him with the visibility and experience to run for public office, first unsuccessfully for City Council in 1983, then successfully for the School Board, where he has remained since 1987. Busy with these multiple commitments, he says that he has never been active in any of the ministerial organizations (interview, May 15, 2000).

The leadership of black ministers like Rev. Sandridge is usually pivotal in organizing the involvement of the immediate neighborhood to participate in decisions surrounding Superfund sites in minority communities.¹³ Not all ministers are equally available to do this, even should they regard it as a priority, for many do not reside in the same neighborhood as their church and most are busy supporting their families with one or more other jobs or businesses. Sandridge made himself more available for neighborhood leadership at the Superfund site in the early 1980s than it would be possible for him to do in later years of the project with his heavy responsibilities at the school board, church, and sheriff’s department. His lack of involvement in any of the ministerial and inter-faith organizations meant that he did not develop linkages in any of those directions from the Superfund site community into the religious community.

Sandridge’s role as chairman of the Task Force put him in the unenviable position of mediating the demands of Greene and his faction of the Task Force against the technical people. Technical people were in those days perhaps not as accustomed to having their judgments questioned as they would later become. One observer (interview, anonymous) describes the meetings as physically arranged with tables in a U shape with the chairman at one end, technical people on one side, and Greene’s faction opposite them. The rest of the community representatives were seated in the middle, watching an interchange between two sides “who not only did not understand each other but had no intention of understanding each other.”

By October 1982, participation in the Task Force had declined and the group seemed moribund (*Commercial Appeal*, November 26, 1982, p. B1). The Task Force foundered, in part, over lack of clarity about its status and objectives. Queried about it years later, Sandridge feels that the main problem is that purely volunteer commitments are difficult to sustain over the long haul (interview, May 15, 2000).

Greene and Sandridge, the two major African American leaders of activism surrounding the North Hollywood Dump in the early 1980s, took very different approaches, and the combination of the two was effective. Through their very disagreements, each lent the other more credibility. Both used the experience to further a run at local political office, in which both were initially unsuccessful. Perhaps most importantly, both mobilized outside resources that raised the profile of the North Hollywood site.

Greene's activism brought in one of the national environmental organizations, the Environmental Defense Fund.¹⁴ The EDF had not worked in the South prior to 1980, when it stepped into the

Memphis situation. According to Ruch (1982:42), the EDF wanted to build a national image and considered Memphis to be a good place for getting southern exposure, with the presence of its chemical industries, its role as a transportation hub, and the heavy use of agricultural chemicals in the Delta agricultural area. In Memphis, the Environmental Defense Fund pursued litigation in which Brother Greene was plaintiff.¹⁵

In mobilizing organizations outside Memphis for the progress of the Superfund cleanup, the decisive role that Rev. Sandridge played was to gain access to significant technical information on behalf of his community. He achieved this through sampling and analysis done by David Wilson, a Vanderbilt chemistry professor, independent of the sampling conducted by the Technical Action Committee. (The Technical Action Committee was headed by Terry Cothron of the state health department and consisted of state and local officials and Velsicol, later joined by EPA representatives.) Wilson's independent sampling revealed chemical hotspots that the official sampling program had missed, including a sludge pile with high levels of hexachlorobenzene (HCB). Sandridge accompanied the release of this information with a vigorous critique of official "foot-dragging" on identifying chemicals at the site (*Commercial Appeal*, January 18, 1981).

The critical independent sampling at North Hollywood Dump by David Wilson resulted from an invitation to him in 1980 from a statewide coalition of environmental organizations. The Tennessee Environmental Council asked Wilson to do an independent review of an EPA report on toxics in Shelby County. Wilson was given a list of local contacts that included the Rev. Sandridge's name. After a long hot day of looking at sites around the city and finding little of apparent significance, Wilson was tired, headachy, thirsty and ready to quit. Rev. Sandridge pressed him to see one more spot, the most important of all, he said, on the east side of the Hollywood Dump, where neighbors knew that there was material dumped by the chemical company. A change of the breeze brought a whiff of benzene to Wilson's nose, and he went on to take samples (Wilson, telephone interview, June, 2000).

Back at Vanderbilt in Nashville, Wilson's laboratory was equipped to do gas chromatography and he had graduate assistants to analyze the samples. It was his intention to send split samples to TVA for testing, in order to have proper peer review of his findings, when he learned that EPA attorney Joan Boilen in Atlanta needed the preliminary data for a case she was involved in. Following his policy of keeping the local community informed at each step, Wilson copied his letter to the EPA to the Memphis group. The confidential letter containing preliminary results was leaked to the press. Fortunately, Wilson adds, peer review later confirmed the findings.

Because the City of Memphis was a potentially responsible party (PRP) at the site, it was naturally not eager that the full extent of contamination be known. When asked what kind of opposition he had met to the release of his findings, Wilson told of a letter from the Memphis department of public works to his Dean at Vanderbilt demanding that he be fired. His dean was supportive of his work in Memphis, and the following year Wilson received a community service award from his university. Wilson's critics were persistent in trying to find out the source of his funding so that they could get it cut off, but he was not vulnerable to this threat because he had funded the Memphis work out of his own pocket, spending less than \$500. Wilson insists that public interest work of this sort can hardly be done except by tenured professors at private universities who have a history of good grant funding. (He points to Barry Commoner's work from Washington University as another instance from that era). Faculty members at state universities are simply too vulnerable to pressures from legislators, he believes. The private

universities have long been secularized (Marsden 1994). Nevertheless, in the context of this research project on the role of faith-based organizations it is worth mentioning that private universities such as Vanderbilt historically originated out of religious colleges and seminaries—Methodist, in the case of Vanderbilt.

Due to other commitments, neither Greene nor Sandridge was available for leadership at the North Hollywood Dump when public input was next called for, after a rather long period of site studies was finally concluded in 1990 and a proposal for remediation was put on the table. Nor had either of them given priority to building coalitions that might have produced continuing involvement on the part of other organizations. As a result, the community did not have as much involvement in decision-making in 1990 as they had a decade earlier. It is also noticeable that state and federal environmental officials did not appear extend themselves beyond the minimum requirements for community relations. After 1981, they appear to have taken a much less active role in fostering community participation than officials did at the other two sites in this project, Love Canal and the Clark Fork sites.

The role of religious groups

“If the South is the Bible belt, Memphis is the buckle,” is the way that some residents sum up their town to an outsider expressing an interest in understanding the city's religious landscape. To someone coming from regions of more nominal religious involvement, the sheer number of church buildings, their level of activity (Sunday evening and midweek services are common), and the visibility of faith communities in the media are striking. Almost sixty percent of Shelby County residents belong to some congregation, according to 1990 estimates (Bradley and Association of Statisticians of American Religious Bodies. 1992:364). This may be significantly under-estimated because of the large number of independent congregations that do not report statistics to any larger body. There are also several active city or county wide inter-faith organizations.

Religious denominations in Memphis

The largest denomination in Memphis is the predominantly white Southern Baptist Convention. A large (15.9 million nationwide) and growing conservative denomination, they have drawn media attention in recent years by claiming biblical authority for drawing sharp boundaries on issues such as homosexuality and male authority in church and home. Statistics on religious affiliation for Shelby County estimate that 20.5 percent of residents belong to congregations of the Southern Baptist Convention (Bradley and Association of Statisticians of American Religious Bodies. 1992:364).

A noted analyst of the Southern Baptist Church, John Lee Eighmy, spoke of the “cultural captivity” of the church, attributing it to Baptist polity. In the Baptist form of church government, the ultimate authority resides with the individual autonomous congregation. Support of denominational programs is voluntary. For this reason, church officials are unlikely to take stands on social issues that are critical of positions and values held by their largely lower and lower middle class constituents. Even individual pastors are constrained from taking unpopular positions, because, unlike pastors in denominations with other forms of government, they lack the protection of bishops or presbyteries if they offend their congregations. This tends to limit the church's mission to personal evangelism and individual reformation rather than a social or prophetic role, Eighmy concludes (Eighmy 1972).¹⁶

Other predominantly white protestant denominations in Memphis are undoubtedly influenced by the Southern Baptist ethos in various ways. For example, the largest Presbyterian church in the city is Second Presbyterian, on the east side, adjacent to the University of Memphis campus. After the Southern Presbyterian churches reunited with the northern churches to form the UPUSA, wealthy Second Presbyterian withdrew from the denomination, along with several other Evangelical Presbyterian congregations. Most of what Eighmy says of the Southern Baptists could readily be applied to the programs of Second Presbyterian in their choice to focus on individuals and family relationships and avoid taking collective stands on social issues.

The largest of the mainline Protestant denominations in Memphis is the United Methodist Church, with 5.6 per cent of the population of Shelby County as adherents.¹⁷ Adherents of the Catholic Church number 6.1 percent of the county population. Catholic priests and laity have often been at the forefront of ecumenical initiatives on social and environmental issues in Memphis. Joining in these, and turning them into truly inter-faith initiatives, have been the successive rabbis of the large Reform Jewish congregation, Temple Israel. The Jewish community is estimated at one percent of Shelby County's population (Bradley and Association of Statisticians of American Religious Bodies. 1992:364).

The largest black denominations in the United States are all represented in Memphis: the National Baptist Convention, the Church of God in Christ (COGIC), and the African Methodist Episcopal Church. Of these, the Baptists are by far the most numerous.

An intimate view of Black Baptist churches in Memphis is afforded in the anthropology dissertation research of Charles Williams. Williams, who is now a faculty member at the University of Memphis, studied the black churches in two Memphis communities: Orange Mound and Binghampton-Tillman, in each case studying three or four neighborhood churches. He emphasized the contributions they made in meeting neighborhood needs such as day care, Christian education, and relief for the poorest in these poor neighborhoods. In 1982 he was able to write after his historical review, "Whereas the political, economical, and social systems have changed drastically, the religious tradition of Memphis has remained virtually unchanged." (Williams 1982, p. 34) Williams concluded that the black and white churches of Memphis are in the fundamentalist tradition that emphasizes the virgin birth, the physical resurrection of Jesus Christ, scriptural inerrancy, substitutionary atonement, and the Second Coming. The main difference between them is that since 1968 the black church "is making significant progress in the area of 'social theology'" (p. 39).

Subsequent research by Williams (personal communication) has focused on two newer trends. One of these trends is the increasing number of the unchurched, that is, young people who have grown up without any family church affiliation. The other is the emergence of megachurches, churches of several thousand members that are oriented to the city as a whole rather than to their neighborhoods.

Two of the major Black denominations have their national headquarters in Memphis. The smaller of the two is the Christian Methodist Episcopal Church, which has 718,000 members nationally. The larger is the Church of God in Christ (COGIC), which is the second largest of the Black church bodies nationally after the National Baptist Convention. With more than 5 million members, it is the fastest growing Protestant denomination in the U.S. (*Commercial Appeal*, June 16, 2000).

COGIC was founded in Memphis in 1897 by C. H. Mason and then transformed into a Pentecostal denomination in 1907 by contact with the Azusa Street revival in Los Angeles (Lincoln 1990:80-89). Sociologist Lincoln finds COGIC clergy generally less supportive of civil rights militancy than other denominations with more highly educated clergy (p.224). Nevertheless, it was the mother church of COGIC, the C. H. Mason Temple, that provided the headquarters of the sanitation strike in Memphis in 1968. This strike brought the Reverend Dr. Martin Luther King to Memphis where he met his death on the balcony of the Lorraine Motel. This motel is now the National Civil Rights Museum. King's death is the pivotal event in the history of ecumenical and inter-faith relationships in Memphis. Early in the strike, some churchmen were beginning to reach across the racial divide. After the killing, it was too late for this to occur again for many years.

Ecumenical and inter-faith organizations in Memphis

Ministerial associations are a much more significant force in the Memphis area than in the other case study communities. The all-black Memphis Baptist Ministerial Association is a strong force in the community, especially in relation to civil rights. Of the predominantly white ministerial associations, the Memphis Minister's Association is a large inter-faith group that has representation including a Reform Jewish congregation as well as crossing broad denominational lines. It is a measure of the depth of racial division in Memphis that the first meeting between the two organizations, three days before Dr. Martin Luther King was killed in 1968, was not followed up by another joint meeting until 1999 (*Commercial Appeal*, December 15, 1999, p. B1).

The suburban communities have their own small ministerial associations, sometimes discussing issues relevant to their community as well as simply offering a friendly social gathering for clergy. The ministerial association of Frayser, for example, invited a representative of the health department and the city councilman to speak at their meeting in March 1980. They hoped to bridge the divisions in the community over the Pounds family and their possible exposure to toxic wastes (Ruch 1982:17-18).

In addition to the ministerial associations, a succession of inter-faith organizations has been formed in Memphis since the 1960s, each representing a bold social justice initiative for its time, then becoming a routine and institutionalized part of the social landscape, spurring the formation of a new ecumenical thrust. The first of these was MIFA, the Metropolitan Interfaith Association, founded in the wake of the killing of Dr. Martin Luther King as the white church community's effort to address urban problems. The second was Shelby County Interfaith (SCI), a coalition of congregations formed in 1986-87. The most recent is the Memphis Jubilee 2000 Call to Renewal, which began with discussions in 1998 and came to involve more than 800 congregations. All three inter-faith organizations have paid some attention to toxic wastes, though in all three organizations this has been a relatively minor concern in comparison with other aspects of race relations and poverty.

The first of these inter-faith organizations, MIFA, is still highly visible, particularly so at Christmas with its Christmas Store for needy children. Of its year-round programs, meals for the elderly are most visible. Through the years, many of the programs that MIFA founded or adopted were spun off as independent entities. Some of these are the Memphis Food Bank, the Memphis Literacy Council, the Housing Opportunities Council, and the Memphis Coalition for the Homeless.

Although MIFA was founded in 1968, it almost did not survive (Takayama and Darnell 1979; Lewis 1988). The organization was in severe financial trouble in the 1970s, dependent as it was on the contributions of its member congregations, who were wary of both its approach to issues and its organizational form. The leadership team of Gid Smith and Bob Dempsey turned it around, making use of federal and foundation grants to build programs. Although individual congregations did not contribute heavily, the regional judicatories of the United Methodist, Presbyterian (U. S.), Catholic, and Episcopal denominations contributed the seed money that made it possible for MIFA to go after larger grants (Takayama and Darnell 1979 p. 333).

One strategy for MIFA's growth in the 1970s and early 1980s was creative use of the federal VISTA program, taking advantage of that moment in the women's movement to recruit women who were entering the job market after raising their children. They had substantial education and volunteer experience but little employment experience. They came to MIFA as VISTA volunteers, wrote grants and completed projects for low pay before moving on to graduate/professional degrees and higher-paid positions in the nonprofit sector (Bob Dempsey, telephone interview, May, 2000). This is relevant to the North Hollywood case study because this is the way that MIFA's involvement there was orchestrated, using VISTA volunteers with history and anthropology degrees to observe, record, and educate neighborhood groups through a traveling slide show and publications (Emily Ruch, telephone conversation). By hiring a historian to chronicle events, MIFA assured that it was regularly represented at the meetings of the Metropolitan Task Force. A grant from the Tennessee Committee for the Humanities funded historian Emily Ruch and anthropologist Bridget Ciarmitaro to study how citizens acted on issues (Ruch 1982).

Although MIFA continued work, settling in as a social service organization, Shelby County Interfaith was formed in 1986-87, with a focus on racial reconciliation and social justice. More politically combative than MIFA, it took strong positions on the city schools and job creation. Using its non-profit status, it built a subdivision of low-income housing through the Nehemiah project. SCI has never had more than about 50 congregations as members, shrinking to about 40 at present. In fall 2000 its program focus is on increasing participation in child health insurance.

The Jubilee 2000 campaign in Memphis engaged a much broader participation of faith-based organizations, including Jewish, Islamic, Catholic, and mainline Protestant bodies, whether predominantly black or white. Unlike MIFA and SCI, which rely on individual congregations as members, the call organized from the top down, beginning at the level of bishops, for those denominations that had them, or the equivalent regional leaders such as the executive of the Presbytery. The list of participating faith groups and organizations in the 1999 Jubilee circular included the American¹⁸ Methodist Episcopal Church of Memphis, the American Muslim Association, the Catholic Diocese of Memphis, the Church of God in Christ (COGIC), the Episcopal Diocese of Memphis, the Metropolitan Interfaith Association (MIFA), Memphis Theological Seminary¹⁹, the National Conference on Community and Justice (NCCJ), the Presbytery of Memphis, Temple Israel, and the West Tennessee Conference of the United Methodist Church.

Notably absent from Jubilee 2000 were the Baptist churches, either black or white, with the exception of three black congregations who responded to an invitation issued to the churches of the National Baptist Convention. The three were Metropolitan Baptist, Monumental Baptist, and First Baptist of Lauderdale. In Baptist polity, the decision to join an ecumenical effort such as this would take place at the congregational level.

Because Jubilee 2000 is built around the Leviticus concept of Jubilee, in which land was allowed to lie fallow and was restored to its original owners, the religious leaders who organized Jubilee 2000 wanted to include a component related specifically to the land, in addition to other measures to relieve poverty, particularly advocacy for reform in state tax policies by removing the sales tax on food. Addressing toxics was to be the “land” component, and it would be carried out through contributions to the Mid-South Peace and Justice Center. The Center would have used the funds to renew its earlier concern with pollution, probably by re-issuing its selection of the Memphis “dirty dozen” top polluters (executive director Bill Akin, telephone interview, August, 2000).²⁰ The environmental aspect of the Jubilee 2000 program was an afterthought that was not as clearly articulated as the parts of the program that addressed economic justice. In the end, no churches elected to participate in the offering (Holly Hickson, e-mail, October, 2000).

Another recent effort to begin collaboration on issues of environmental justice is the decision in October 1999 of the Memphis affiliate of the Congress of National Black Churches to form a task force. Their regional project director, Rev. L. LaSimba Gray, announced this decision (*Commercial Appeal*, October 1, 1999). His church, New Sardis Missionary Baptist, hosted the Sunday morning service on April 2, 2000 that was one of the events in a weekend devoted to drawing attention to the Memphis Depot Superfund Site. However, there was little evidence of participation from the black churches of Memphis in any of the events of these “Days of Outrage and Action against Environmental Racism,” even those scheduled for church venues. Most events were poorly attended. Only a small group of Depot activists and their out-of-town guests from the Interim National Black Environmental & Economic Justice Coordinating Committee were in attendance.

Subsequently the Congress of National Black Churches in Memphis has been far more visible in its concerns about public education and drug abuse than it has been on environmental justice. It cannot be assumed that even with black political majority and black ecumenical leadership that environmental racism will necessarily move to a position of higher priority than it has had in the past in Memphis. Economic development, including the rapid redevelopment of sites such as the Memphis Defense Depot, takes precedence (telephone interview, County Commissioner Shep Wilbun, and other sources).

The history of ecumenical organizations in Memphis and Shelby County does not inspire a great deal of optimism about their ability to organize an interfaith and interracial response to hazardous waste issues. A hint that it might be possible can be found by looking at successful efforts to address social justice issues in Memphis under visionary black leadership with financial and volunteer support from white churches. One model for this is the Church Health Center, Inc. The Center serves the uninsured working poor, with about 30,000 patient visits annually. G. Scott Morris, its founding director, is both a physician and United Methodist minister. He is a Yale Divinity school graduate who came to Memphis in 1987 to pursue his dream of founding such a center in a city where he knew no one.²¹ In addition to a paid staff of 60, the CHC has a large volunteer staff of doctors and dentists who donate time once a month and hundreds of non-medical volunteers. Patients pay on a sliding scale, with the balance covered by donations from the sponsoring congregations—more than 175 congregations ranging from evangelical to liberal Protestant, Roman Catholic to Jewish (Evans 1999: 221-225).

The role of the church in articulating environmental justice

The North Hollywood Dump was identified as a hazardous waste site and moved through the early stages of the Superfund process in the early 1980s before the concept of environmental justice had emerged. Environmental issues concerning people of color had not yet come to be seen as an extension of the struggle for their civil rights. The first well-documented step in the emergence of an environmental justice struggle was the 1982 non-violent civil disobedience of residents of rural Warren County, North Carolina, protesting the establishment of a PCB landfill. Among the 500 demonstrators who were arrested were Dr. Benjamin F. Chavis and the Rev. Leon White, Director of the Southern Regional Office of the Commission for Racial Justice of the United Church of Christ. Other demonstrators came from the Southern Christian Leadership Conference.

In 1987 the Commission for Racial Justice of the United Church of Christ (UCC) released the report, *Toxic Wastes and Race in the United States: A National Report on the Racial and Socio-Economic Characteristics of Communities with Hazardous Waste Sites* (United Church of Christ, Commission for Racial Justice, 1987).²² This landmark study was the first to document the disproportionate presence of hazardous waste in racial and ethnic communities throughout the United States. The analysis used publicly accessible data: U. S. Census figures on the distribution of Blacks and Hispanics and USEPA lists of licensed commercial hazardous waste facilities and uncontrolled toxic waste sites. At the time there were some 20,000 uncontrolled hazardous waste sites in the CERCLIS (Comprehensive Environmental Response, Compensation, and Liability Act Information System) database. These included Superfund sites as well as other sites that had the potential to qualify as Superfund sites or to require cleanup in the future.²³

The UCC study demonstrated a statistically significant association between race and the location of the commercial hazardous waste facilities that were currently operating. However, for the much larger number of CERCLIS sites the relationship with race was not statistically analyzed. It was simply described by tabulating the racial and ethnic populations of urban areas with the greatest number of such sites. Though the UCC study was not as methodologically powerful a study as later studies, in which researchers would attempt to tease apart the effects of income and race, its overall conclusion was inescapable: there was a racial issue in toxic waste that needed to be considered nationally. Several years later the UCC revisited the question and found that inequities had increased (Goldman and Fitton 1994, 1997).

The 1987 UCC study reported that Memphis was the metropolitan area with the largest number of uncontrolled hazardous waste sites in the country. Its 173 CERCLIS sites put it well ahead of the next four—St. Louis (160), Houston (152), Cleveland (106), and Chicago (103)—all much larger industrial cities. In its conclusions and recommendations, the UCC Commission for Racial Justice particularly addressed the municipal governments, churches, and community organizations of Memphis and half a dozen other cities to actively address problems related to hazardous waste sites.

Memphis headed the CERCLIS list at the time of the UCC study, yet it was neither a very large city nor one with a reputation for heavy or polluting industry.²⁴ Its ranking as number one appeared inexplicable. One local environmental leader speculated that perhaps local officials had simply kept better records of underground storage tanks (Larry Smith, interview, May, 2000), an explanation that turns out to be close to the truth. There had been a more systematic search for hazardous waste sites in Memphis than in other places. In 1980 a project for the

discovery of potential hazardous waste sites was initiated in order to improve emergency response planning in Memphis by using historical aerial photography. In this technique, a technician using a series of aerial photos taken several years apart examined them carefully for tell-tale changes, such as ground scars, waste ponds, landfills, and junkyards that appeared in one photo and later were no longer visible on the surface. All of the 350 potential sites discovered through the aerial photographs were added to CERCLIS, although field investigation had been minimal (United States. Congress. Office of Technology Assessment. 1988). Later the EPA did preliminary assessments of all the sites to determine which ones should be added to the NPL. In other words, Memphis came out number one on the UCC list because it had been caught in the middle of a systematic search for hazardous waste sites, rather than because it was an unusually contaminated city.²⁵

The data on race and hazardous waste such as that the UCC used were available to anyone to analyze. Indeed, many social scientists have subsequently conducted many such studies nationwide or on regions, states, or cities, seeking to improve methodology and say more decisively that it is race, or socio-economic status, neither, or both, that is associated with living near toxic wastes. It is not the intent of this case study to review this literature.²⁶ The point that is relevant to this project is that it was a **church body**—not an academic institution, an environmental organization, or a government agency—that conceived and funded the research that put the question of environmental racism and environmental justice on the table for policy discussion.

The United Church of Christ was, at the time of the report, a denomination of 1.7 million members. (Like other mainline denominations, it has continued to shrink since then.) It had been formed in 1957 by the merger of the Congregational with the Evangelical and Reformed denominations. Both denominations were known as theologically liberal, ecumenically minded, and socially progressive denominations. UCC churches are largely centered in the Northeast, with denominational headquarters in Cleveland, Ohio. Because the UCC has only two small congregations in Memphis, they were not in a strong position to work on local questions of environmental justice. As noted in the Love Canal case study, the UCC, in addition to its pioneering leadership in environmental justice, has recently taken on responsibility as the lead denomination within Church World Service for response to technological disasters.²⁷

The 1987 UCC report had a significant impact nationally. Its influence quickly percolated through the other mainline denominations and became a basis for their own policy work in environmental justice. It was the UCC report that led to my choice of Memphis as a case study for this project. However, as the case study progressed, no evidence emerged that the 1987 report had any immediate, noticeable impact in Memphis. This was not because anyone systematically refuted the top position of Memphis in the report, but because it was simply not heard. The report did not apparently bring Memphis any special resources or leverage for dealing with toxic problems. Only after environmental justice was well established as a concept at the national level in the 1990s did it make its way to Memphis.

One community organization in Memphis that was speaking up for environmental justice by the mid-1990s was the Mid-South Center for Peace and Justice. The Center is an inter-faith and inter-racial organization that has been involved in several issues including disarmament, racism, housing, and community reinvestment. Today it is engaged in grant-funded work on teaching nonviolence in the schools, under its current executive director, Bill Akin. A previous director, Hubert Van Tol, sought a grant for environmental justice work. The grant allowed him to hire

Larry Smith to do community organizing around urban environmental issues that came to include the Memphis Defense Depot, a Superfund site. Students were taken along to monitor actively polluting industries, and the Center regularly issued a list of the Memphis “Dirty Dozen.” Larry Smith moved from the Center to become executive director of the Wolf River Conservancy.

One of the earliest community-wide indicators of awareness of the concept of environmental justice in Memphis is a 1994 article in the daily paper, the *Commercial Appeal*. It reported a new UCC study alleging continuing racial disparities in the siting of hazardous waste (*Commercial Appeal*, August 26, 1994, p. B1). A local reporter later looked at Shelby County data and wrote a follow-up article with an accompanying map. In it the reporter concluded (from a different set of data than that used by the UCC study) that blacks and whites were equally exposed to hazardous waste. A closer look at the map reveals flaws in this analysis, too, for the Superfund sites that it maps in sprawling, predominantly white suburbs just happen to be located in their black neighborhoods, as finer demographic detail would reveal (Larry Smith, interview, May, 2000).

Chronology of the North Hollywood Dump

- 1930s Municipal landfill opened
- 1967 North Hollywood Dump officially closed
- 1972 Health Department ordered Velsicol to stop dumping at site
- 1979 Investigation of site by USEPA began.
- 1980 Soil sampling by USEPA at Shannon School.
- 1981 Technical Action Group (consisting of representatives of the State, City, County, industry, and EPA) took emergency action to remove chemical wastes from part of the dump
- 1983 Site listed on the National Priorities List (NPL) in Federal Register
- 1988 Results of health study released
- 1990 EPA issued the Record of Decision
- 1993 Conestoga-Rovers, a Waterloo, Ontario, firm, issued its Final Remedial Design Report.
- 1994-96 Site remediated and covered with a layer of soil at least 24 inches thick.
- 1995 Fish poisoned and removed from ponds and oxbow lake prior to remediation of sediments
- 1997 Site deleted from the NPL.

Lessons learned

The North Hollywood site had articulate spokesmen, particularly Greene and Sandridge, who were able to use the media and to mobilize outside environmental organizations and gain responses from the appropriate government agencies at the outset during the phase of site identification. Yet something was missing from the community response, and that was the ability to put together a coalition that would enable continued community participation in decisions surrounding site remediation. Neither of the early leaders tried to build such a coalition within the black church community. The white church community was represented at North Hollywood by MIFA in 1980-81, apparently more in the role of observer than actor. This involvement was transitory and did not build enduring linkages or commitments to work on these issues. The failure to include the community in decisions concerning remediation, led the community to lack confidence that their interests were well served. This is clear from Johnson's research and the widespread alienation it appeared to reveal.

The North Hollywood Superfund site events of the early 1980s preceded the emergence of environmental justice as part of the national civil rights agenda. The local activists did not have available to them the discourse of environmental justice that emerged later. Nor did the North Memphis community have the formidable set of organizational supports from outside the city that can now be mobilized. This was seen, for example, on the weekend of April 1-3, 2000, when several high-profile EJ activists from throughout the South converged on Memphis for events surrounding the Memphis Defense Depot Superfund site. These activists, unlike earlier activists at the North Hollywood site, did attempt to work through existing organizations of Black church leaders.

Using the discourse of environmental justice, it is possible to frame the North Hollywood Dump as a failed struggle against environmental racism. A community that had been dumped on lacked the power to participate effectively in decisions concerning cleaning it up. Framed this way, the residents are seen as “voiceless subalterns” engaged in “silent screaming” (Johnson 1996:171-172). They were unable to organize effectively, sociologist Johnson concluded, though he does acknowledge the small victories of several activist residents (p. 169).

At the very outset of this study, Cynthia Warrick, another African-American scholar equally committed to work for environmental justice, framed it differently than Johnson had. In her view, the measure of the community's success is that the dump was cleaned up and it has been deleted from the NPL (Warrick 1999, and personal communication). While some in the community might have preferred relocation, the remedies chosen at North Hollywood are consistent with similar sites in other parts of the country. From this point of view, the glass is half full, not half empty.

However slow the progress toward cleanup may have seemed—

However much one might prefer that all materials might have been removed and not just the toxic hotspots—

However limited the opportunity for residents to voice their concerns—

However little the cleanup touches other “toxic” aspects of urban life ranging from unemployment to inadequate public transportation—

A measure of environmental justice was achieved through the expenditure of more than \$15 million on remediation of the North Hollywood site.

Summing up

Community involvement at the North Hollywood Dump Superfund site was strongest in the early stages of site identification. Given the high level of religious participation in Memphis, it is not surprising to find a Black minister in a leading role, chairing the city-wide environmental task force, or the presence of white representatives an inter-faith organization on that task force. What might be harder to understand is the rapid loss of interest and participation on the part of the community and its religious organizations in the later stages of risk assessment and communication and remediation at this site. While this apparent lack of community involvement did not hinder the progress of remediation, the cost of this lack of involvement is that the community lacks confidence in the adequacy of remediation and was not empowered to participate in other changes or improvements.

Resources

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Dr. Paul Swets, Second Presbyterian Church
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Hon. Shep Wilbun, County Commissioner
Dr. David Wilson
Prof. Charles Williams, University of Memphis
Prof. John Wingard

Web sites

The Environmental Justice Resource Center (EJRC) at Clark Atlanta University
(formed in 1994) a research, policy, and information clearinghouse

<http://www.ejrc.cau.edu/>

Tennessee Environmental Council, Nashville-based statewide coalition of environmental organizations

<http://www.tectn.org/tecmovie.html>

The Wolf River Conservancy

<http://www.wolfriver.org/>

Environmental Defense Fund

<http://www.edf.org/>

Memphis Commercial Appeal newspaper

<http://www.gomemphis.com/>

References

- Andrews, J. S. et al. (1988). Health effects study of residents near the Hollywood dumpsite, Memphis, Tennessee. Memphis, Memphis and Shelby County Health Department.
- Ball, J. G. (1997). Evangelical Protestants, the ecological crisis and public theology. Ph. D. dissertation, Drew University.
- Bradley, M. B. and Association of Statisticians of American Religious Bodies. (1992). Churches and church membership in the United States, 1990 : an enumeration by region, state, and county, based on data reported for 133 church groupings. Atlanta, Ga., Glenmary Research Center.
- Bullard, R. D. (2000). Dumping in Dixie : race, class, and environmental quality. Boulder, Westview Press.
- Catton, W. R. (1989). Cargoism and technology and the relationship of these concepts to important issues such as toxic waste disposal siting. Psychosocial effects of hazardous toxic waste disposal on communities. D. L. Peck, ed. Springfield, Illinois, Charles C. Thomas, Publisher: pp. 99-117.
- Corn, M., et al. (1981). Final report. Contract for design of environmental health effects studies stemming from the potential for human exposure to toxic waste in Memphis, Tennessee. Baltimore, Johns Hopkins University, School of Hygiene and Public Health.
- Dewitt, C. B. (1998). Caring for creation: responsible stewardship of God's handiwork. Washington, DC, Center for Public Justice (and Baker Books).
- Drake, S. F. (2000). Must we blindfold Jesus? Down-to-earth Christianity. W. D. Roberts, ed. Wynnwood, Pennsylvania, Association of Evangelical Relief and Development Organizations.
- Eighmy, J. L. (1972). Churches in cultural captivity; a history of the social attitudes of Southern Baptists. Knoxville, University of Tennessee Press.
- Environmental Justice Resource Center, C. A. U. (1997). Region IV Environmental Justice Partnership Project Lessons Learned. Atlanta, <http://www.ejrc.cau.edu/finalreport.html>.
- Eskridge, L. (2000). "When Burkett Speaks, Evangelicals Listen." Christianity Today June 12, 2000 44(7): 44.
- Evans, A. R. (1999). The healing church : practical programs for health ministries. Cleveland, Ohio, United Church Press.
- Goldman, B. and L. Fitton (1994, 1997). Toxic waste and race revisited. Washington, D. C., Center for Policy Alternatives, NAACP, and UCC Commission for Racial Justice.
- Goldman, B. A. (1993). Not just prosperity: Achieving sustainability with environmental justice, National Wildlife Federation.

Granberg-Michaelson, W. (1984). A worldly spirituality : the call to redeem life on earth. San Francisco, Harper & Row.

Hamilton, J. T. and W. K. Viscusi (1999). Calculating risks? : the spatial and political dimensions of hazardous waste policy. Cambridge, Mass., MIT Press.

Ingham, W. T. (1990). A history of Memphis Theological Seminary of the Cumberland Presbyterian Church, 1852-1990.

Jackson, B. P. and R. D. Bullard (1998). From plantations to plants: report of the emergency national commission on environmental and economic justice in St. James Parish, Louisiana. Cleveland, United Church of Christ, Commission for Racial Justice.

Johnson, G. S. (1996). Toxins! Tocsin: The North Hollywood Dump in Memphis, Tennessee: a community's struggle against environmental racism. Ph. D. dissertation in Sociology. Knoxville, University of Tennessee.

Krieg, E. J. (1998). "Methodological considerations in the study of toxic waste hazards." The social science journal **35**(2): 191-201.

Lewis, S. (1988). Diversification and unity: MIFA 1968-1988. Memphis, Memphis Inter-Faith Association.

Marsden, G. (1994). The soul of the American university: from Protestant establishment to established non-belief. Oxford, Oxford University Press.

Neal, R. and A. Allen (1998). Environmental justice: an annotated bibliography, Environmental Justice Resource Center, Clark Atlanta University.

Ruch, E. B. (1982). A chronicle of events in Frayser and at the Hollywood Dump in Memphis, Tennessee. Memphis, Metropolitan Inter-faith Association.

Schellback, C. P. and W. van Veen (1997). "Dredging up toxic sediments." Civil Engineering **67**(3): 55-57.

Sigman, H. (2000). The pace of progress at Superfund sites: policy goals and interest group influence. Cambridge, MA, National Bureau of Economic Research, Working Paper Series.

Szasz, A., M. Meuser, et al. (1997). Environmental inequality bibliography.

Takayama, K. P. and S. B. Darnell (1979). "The aggressive organization and the reluctant environment: the vulnerability of an inter-faith coordinating agency." Review of Religious Research **20**(3): 315-334.

United Church of Christ. Commission for Racial Justice. (1987). Toxic wastes and race in the United States. New York, Commission for Racial Justice, United Church of Christ.

United States. Congress. Office of Technology Assessment. (1988). Are we cleaning up? : 10 Superfund case studies : a special report of OTA's assessment on Superfund implementation. Washington, DC, Congress of the U.S. Office of Technology Assessment : For sale by the Supt. of Docs. U.S. G.P.O.

United States. Congress. Office of Technology Assessment. (1989). Coming clean : superfund problems can be solved. Washington, DC, Congress of the U.S. Office of Technology Assesment : For sale by the Supt. of Docs. U.S. G.P.O.

United States. Environmental Protection Agency. (1990). Superfund Record of Decision: North Hollywood Dump, TN, EPA/ROD/R04-90/068.

United States. Environmental Protection Agency. Office of Emergency and Remedial Response. Community Involvement and Outreach Center. (1996). Community Advisory Groups: Partners in decisions at hazardous waste sites. Washington, DC.

Vaughn, S. (1989). Memphis: Heart of the mid-south. In search of the new South : the black urban experience in the 1970s and 1980s. R. D. Bullard, ed. Tuscaloosa, University of Alabama Press: pp. 98-120.

Warrick, C. A. (1999). A theory of environmental justice success: when impacted communities are likely to prevail. Ph. D. dissertation. Fairfax, Virginia, George Mason University.

Williams, C. (1982). Two black communities in Memphis. Ph. Dissertation in Anthropology, University of Southern Illinois.

¹ The Superfund process is concerned with remediation, correcting the conditions that pose a threat to public health and the ecosystem. This does not mean restoring the environment to what it was before the damage occurred, although natural resources damage suits allow the injured party to make a claim for restoration. 'Cleanup' is a casually used term, and it will be used occasionally in this report, but it should be kept in mind that it is not entirely appropriate for Superfund remediation. Superfund remedies often leave the contaminants in place while ensuring that they do not continue to migrate into groundwater. Most so-called cleanup simply moves toxic substances from one place to another rather than de-toxifying them.

² The CERCLIS sites are listed on the internet on the USEPA web site, as are NPL sites, along with a description of each site at the time it was listed and the Record of Decision for each site and additional information about the program. <<http://www.epa.gov/superfund/sites/index.htm>>

³ The cut-off point of 28.5 was chosen arbitrarily near the beginning of the Superfund program because it was the number that would produce an initial list of 400 sites to be remediated, from among those that had been examined and scored.

⁴ The term "community of faith" appears frequently in these pages as the most inclusive term for local congregations meeting in churches, synagogues, temples, and mosques, along with larger groupings of such congregations into denominations and inter-faith councils, and para-church organizations formed for special purposes such as religiously-based environmental groups. Many people would not think of a local church congregation or parish as a "religious organization" but would reserve that term for these other organizations. This report is concerned primarily with organizations, not with individually held religious beliefs and values.

⁵ The annotated bibliography gives many examples of this rationale. See for example (Granberg-Michaelson 1984; Ball 1997; Dewitt 1998; Drake 2000)

⁶ The formation of Community Advisory Groups and provision of Technical Assistance Grants to enable them to get expert help did not effectively begin until about 1989. In two of the case studies covered by this project, no such groups were formed. Three of them were formed in the area covered by the Montana case study (one at each of 3 of the 4 Superfund sites that comprise the Clark Fork complex). The USEPA Community Involvement and Outreach Center used five case studies to evaluate Community Advisory Groups in a 1996 study (United States. Environmental Protection Agency. Office of Emergency and Remedial Response. Community Involvement and Outreach Center. 1996).

⁷ Indeed it was not possible to visit the headquarters of any of the EPA regions involved in the project -- Region 2 in New York City, Region 4 in Atlanta, and Region 8 in Denver. However, it was possible to visit USEPA offices and speak with staff in Helena and Niagara Falls, and to use library resources at the Washington DC and Chicago offices when travelling for other purposes.

⁸ There was current activity at another Superfund site in Memphis, the Defense Depot, but a few days of observation of activities related to that site suggested that it was not practical to include it in the project. It would have been difficult to obtain data that could readily be compared with the other two case studies in the time available. Researchers from Howard University under the leadership of Cynthia Warrick have been involved with the Depot site.

⁹ At the 2000 Census the population of Memphis had fallen to 610,337, of whom 54.% were black.

¹⁰ Subsequently, Johnson moved on to teach at Clark Atlanta University, where he continues to do research with Robert Bullard at the Environmental Justice Resource Center. Johnson has not returned to do further research in Memphis, but his mentor Bullard visited Memphis to help publicize the Defense Depot Superfund site April 1-3, 2000 (at well-orchestrated but poorly-attended events observed during the fieldwork for this project).

¹¹ The Medical School at the State University of New York at Buffalo had CDC funding for its health study of Love Canal residents abruptly terminated in March 1981 as well.

¹² This kind of father-son succession is not uncommon in African-American "family" churches. It does not always go smoothly, as one can note in recent newspaper coverage of controversy in Mt. Olivet Baptist Church of Memphis, where respective backers of father and son ministers have gone to court over the church's assets.

¹³ Black churches and their ministers are noted for their leadership in the environmental justice movement at many sites. A pivotal event for the formation of this movement was a summit of six major black denominations held in Washington, D. C. in December, 1993, a project of the then newly-formed National Interreligious Partnership for the Environment. Another pivotal event was President Clinton's Executive Order 12898 issued in February 1994 directing all federal agencies with a public health or environmental mission to make environmental justice part of their policies.

¹⁴ The EDF staff person who worked with Brother Greene in Memphis was Ruffin K.Harris, an experienced community organizer who was also working with the Love Canal community and community group in Toone, Tennessee, according to the 1979 Annual Report of the EDF.

http://www.environmentaldefense.org/pubs/AnnualReport/1979/b_toxic.html

¹⁵ Newspaper searches do not indicate this litigation was resolved or what impact it may have had on the site. Later Harris would found his own organization, the Hazardous Waste Organizing Alliance, and work with the residents of a Superfund site in Michigan where the Verona Wells contaminated the water supply of the city of Battle Creek, ironically the home of Kellogg cereals. Harris met an untimely death in an air crash in 1989.

¹⁶ The only Baptist church in Memphis that is attended by whites that is widely known for progressive positions on social issues is Prescott Memorial, located adjacent to the campus of the University of Memphis. Prescott Memorial, a formerly Southern Baptist affiliated-congregation, is now affiliated with the (northern) American Baptists. It broke off its Southern Baptist affiliation under pressure. It was under threat of expulsion because of its liberal stance on integrating its own membership and on ordaining a woman pastor. In taking progressive positions it risked the loss of membership and contributions. Its building houses the Mid-South Center for Peace and Justice and the Wolf River Conservancy, two of the main organizations voicing public concern about toxic wastes in Memphis during the 1990s.

¹⁷ The measure of religious adherence used throughout these case studies is the data reported in Churches and church membership in the United States, 1990. This standard reference source presents membership figures as reported by the denominations themselves and compares them with U. S. Census data.

¹⁸ Probably what is meant is the African Methodist Episcopal (AME) church.

¹⁹ Memphis Theological Seminary is the seminary of the Cumberland Presbyterian Church, a small regional denomination (Ingham 1990). It serves a denominationally and racially diverse student body in Memphis. Among its graduates for example are the Rev. Dr. L. LaSimba M. Gray, minister of New Sardis Missionary Baptist Church and a leader in the Memphis affiliate of the Congress of National Black Churches. The other seminaries in metropolitan Memphis are Southern Baptist and C.O.G.I.C.

²⁰ The most recent version of the annual list to appear in the newspapers was in 1995. Derived from toxic release inventory data compiled by the USEPA. That year's list for Shelby County was topped by Arcadian Corporation, a fertilizer plant, followed by Quebecor Printing (Memphis Commercial Appeal, August 2, 1995).

²¹ The Board is chaired by the Rev. Dr. Kenneth Robinson, who is senior pastor of St. Andrews AME Church. Robinson, like Morris, has a bi-professional background with a medical degree from Harvard and a divinity degree from Vanderbilt.

²² At the release of the report in 1987, Executive Director Dr. Benjamin F. Chavis, Jr. headed the UCC Commission for Racial Justice. The director of the Special Project on Toxic Injustice was Charles Lee, who is now with the USEPA. When Chavis later moved to the NAACP, Dr. Bernice Powell Jackson was appointed to replace him at the UCC Commission for Racial Justice. Under her leadership, the Commission continued to play a major role in the search for environmental justice. She served, for example, as co-chair of the Emergency National Commission on Environmental and Economic Justice which reported in 1998 on St. James Parish in Louisiana in relation to Shintech's proposed polyvinyl chloride (PVC) plant there (Jackson and Bullard 1998). Charles Lee was coordinator of that project, along with Damu Smith, who was encountered during the Memphis fieldwork for this project in April 2000. Smith was there organizing demonstrations and other events surrounding the Memphis Defense Depot Superfund site. Bullard also attended those April events.

²³ CERCLIS files are continuously updated and currently contain 11,419 sites, with a further 32,047 that were previously in the CERCLIS active file but have been archived after further investigation and/or remediation. (Inventory of CERCLIS and Archive Sites by Sates as of April 17, 2000, <http://www.epa.gov/superfund/sites/topics/archinv.htm>, accessed on July 6, 2000)

²⁴ This perception may say more about Tennessee's public image than about its economy. In a report issued in the same year as the UCC study, the state of Tennessee ranked third in the per capita amount of industrial hazardous waste produced. Only Louisiana and West Virginia produced more. Data from The Conservation Foundation cited in (Catton 1989).

²⁵ The technology to do a systematic search for hazardous waste sites using aerial photography in conjunction with field investigation existed in 1980. EPA then started a comprehensive national program of site discovery (the 200 Cities Hazardous Waste Site Discovery Plan), but the plan was terminated the following year because the comptroller said they already had more sites than money for remediation (United States. Congress. Office of Technology Assessment. 1988 p.89). Consequently, the CERCLIS database of potential hazardous sites has not been created through systematic searching for sites so much as by the "squeaky wheel" principle. Taken by itself, CERCLIS listing does not provide an adequate basis for comparison from one time or place to another.

²⁶ Many sources provide useful starting points for considering methodological questions related to environmental equity (Goldman 1993; Szasz, Meuser et al. 1997; Krieg 1998; Neal and Allen 1998; Hamilton and Viscusi 1999, Ch. 7).

²⁷ The web site of the resource unit is located at <http://www.nccusa.org/cws/emre/ucctechunit/>. Church World Service has long been an agency of the National Council of Churches of Christ. Recently Church World Service and the National Council of Churches were administratively separated. The full implications of this for staffing and programs are still being worked out as of this writing.