

Spring 2016

Thorium Shipped Out, and Dust of Deceit Left Behind in West Chicago

Lindsey Stern
College of DuPage

Follow this and additional works at: <http://dc.cod.edu/essai>

Recommended Citation

Stern, Lindsey (2016) "Thorium Shipped Out, and Dust of Deceit Left Behind in West Chicago," *ESSAI*: Vol. 14 , Article 36.
Available at: <http://dc.cod.edu/essai/vol14/iss1/36>

This Selection is brought to you for free and open access by the College Publications at DigitalCommons@COD. It has been accepted for inclusion in ESSAI by an authorized editor of DigitalCommons@COD. For more information, please contact koteles@cod.edu.

Thorium Shipped Out, and Dust of Deceit Left Behind in West Chicago

by Lindsey Stern

(English 1102)

When people reminisce about their hometown, most people daydream about childhood memories of playing in the creek with the neighborhood kids, running around at the town parks, and spending practically their whole summer enjoying the fresh air. The children who grew up in the town of West Chicago, Illinois, did not realize that throughout the environment they played in, the soil, water, and air was contaminated with radioactive waste derived from the element thorium. Thorium is a naturally occurring element that is stored deep within the ground, but turns radioactive once the metal is tampered with (“Thorium”). Thorium was brought to the town of West Chicago in 1931, by a company named The Lindsay Light Company to a building known as The Rare Earths Facility (Capettini). The Rare Earths Facility processed and extracted thorium from monazite ores, and used the purest form of thorium to make gaslight mantles that glowed when heated as a source of light before electricity was more prominent (Capettini).

The uses of thorium were praised in such an era, but the waste left behind after the company extracted what they needed from the ores was the dangerous part. Black sand-like particles known as radioactive mill tailings were dumped throughout various locations in West Chicago including The Rare Earths Facility grounds, Reed-Keppler Park, Kress Creek, and the sewage treatment plant (Robeznieks). From the 1931 to 1950, The Lindsay Light offered the mill tailings to employees and residents to use as fill dirt in their yards or for various landscaping projects (Robeznieks). Within that nineteen year span, there were no records of who used the fillers or where the fillers were used. In 1967, The Rare Earths Facility was purchased by a well-known energy company based out of Oklahoma named Kerr-McGee (Capettini). Kerr-McGee continued the extraction of thorium and dumping radioactive waste, until the close of the facility in 1973 (Capettini). The last rail car load of material contaminated by radioactive thorium did not leave the town of West Chicago until November of 2015 (Capettini). The total radioactive waste weighed 1.6 million tons and filled 16,000 rail cars (Capettini). This essay will argue that the forty-two years that it took Kerr McGee to remove radioactive thorium from land in West Chicago after the company closed has taken an unnecessary toll on the environment and nearby community. The health and safety of the people of West Chicago has been ignored for numerous years. The residents have suffered the consequences of the negligence on the company’s behalf, denying them the right to live in an environment free of radioactive chemicals.

Many residents of West Chicago were uninformed as to the locations of the radioactive waste and the environmental damages it caused during and after the removal of the material. All of the mill tailings that were used as filler dirt around residential areas of West Chicago were said to have been removed as contaminated soil. People do not realize the larger concern that it was not only the mill tailings that contaminated the soil, but also the air and water was contaminated every time the material was tampered with. The Environmental Protection Agency provided a report that stated, “Thorium-contaminated soil emits gamma radiation and once the contamination is disturbed, the risks increase” (“Lindsay Light”). Not only was the radiation harmful while it was piled high in various locations in West Chicago, but it also emitted further danger every time it was moved. An additional Superfund site report from the EPA stated that as of August 30, 1990, Kerr-McGee had excavated many residential properties and removed the contaminated soil and dumped it at The Rare Earths Facility in West Chicago (“Superfund Site”). The EPA also included that many residential areas were

contaminated and multiple properties surrounding the facility were at risk due to windblown contamination from the waste piles (“Superfund Site”). After learning about how the wind can affect contamination, it is highly possible that the company caused even more contamination in the process by moving the material. Quite possibly the movement of the material may have contaminated properties near the facility that had already been checked and cleaned up. Moving the problem across town did not get rid of the dangerous situation. The material moved seemed to be a cover up on the company's behalf to avoid future conflict or blame for contamination. Apparently the company wanted the people of West Chicago to believe that they were displaying concern for their safety by moving the material to The Rare Earths Facility. In reality, this now put the residents surrounding The Rare Earths Facility at risk.

As if the air and soil in West Chicago were not enough to be tampered with by the companies contaminated waste, the water was not to be forgotten about. The National Priorities List reported in 1984 that the facilities waste also entered Kress Creek and the West Branch of the DuPage River through a storm sewer and drainage ditch contaminating several feet of sediment and water (“NPL Site”). The NPL also included that an estimated 20,000 people obtain drinking water from the municipal and private wells within three miles of the Kress Creek contaminated site (“NPL Site”). The drinking water in West Chicago had been contaminated as well as the soil and air making it impossible for the residents not to come into contact with the radiation. In 1984, the EPA added multiple West Chicago sites of contamination to their superfund cleanup list (“Superfund Site”). The residents started to notice men dressed in anti-contamination suits cleaning up and testing various residential areas (“Superfund Site”). Men dressed in the anti-contamination suits really sparked the public’s curiosity of the dangers of what was in their soil. Although areas where the material was dumped throughout West Chicago were well known, attempting to discover where exactly the contamination spread to was nearly impossible due to the water, soil, and air all being contaminated.

The attention called to of one resident in particular, Jennifer Fawell, raised suspicion about the radioactive waste that was dumped throughout West Chicago and the eleven million cubic feet of radioactive waste stored at the facility near her home (Schmeltzer). In 1975, Fawell contracted a form of Hodgkin's disease at the age of sixteen (Schmeltzer). After a ten year health battle her family became suspicious when Kerr-McGee knocked on their door wanting to test their land for contamination (Schmeltzer). The positive contamination results particularly near where Fawell played in the sandbox as a child, led her to create a lawsuit alleging that Kerr-McGee knew about the dangerous radioactive contamination that was spreading throughout the town of West Chicago (Schmeltzer). Fawell fought claiming that her cancer was a result of the company's negligence and failure to notify the residents of the dangerous health effects that the radioactive waste can cause (Schmeltzer). Fawell and her family’s story of being in the dark about the damages thorium can cause remains no different for the rest of the town residents. Kerr-McGee taking ten years after the facility had closed to start testing yards for contamination was too late in Fawell’s case. As a West Chicago resident myself, living only six blocks away from the facility and not knowing much about the harmful radioactive waste that lingered throughout the town, allows me to empathize with Fawell. I do not recall Kerr-McGee ever knocking on my family's front door offering to test our soil for contamination. When thinking about it, maybe it would not have made a difference having our soil checked after now knowing that the air and water was also contaminated. Kerr-McGee taking their time to “fix” the issue and failing to reveal the harmful effects that thorium causes to human health was completely unacceptable.

Kerr-McGee was trying hard to conceal the dangers of thorium and not taking responsibility for their dumping of the radioactive waste, and connections of more health issues related to the radiation arose with other residents. In the article, “Assault on Mount Thorium” by Andis Robeznieks, resident Judy Wall recalls playing in Kress Creek as a child and, “there was a place where there was almost like sewage coming in and when we’d play in it we would literally turn purple” (Robeznieks).

In addition, Walls would catch fish to eat and recalled finding deformed fish and duck eggs without shells (Robeznieks). Walls later contracted Hodgkin's disease (Robeznieks). Two residents that had been directly exposed to the contamination in West Chicago contracted a type of cancer that attacked their lymph nodes called Hodgkin's disease. It is highly possible that more residents have become exposed to similar radiation. According to the Agency for Toxic Substance and Disease Registry (ATSDR), after exposure to thorium, it accumulates in the bone and lymph nodes of the body ("Toxicological"). Also, after inhalation, studies have found an "increased incidence of respiratory diseases, as well as blood forming tissue, lung, lymphatic, and pancreatic cancers in humans ("Toxicological"). Concerning children's health the report also states that children have a higher health risk after contact with contaminated soil, and any contact should be avoided ("Toxicological"). Coincidentally, two residents contracted the exact same type of cancer and at a young age, they both had direct exposure to the radiation, in two different areas of the same town. Children innocently playing outside in their neighborhood, at the town parks, and near creeks, should never be exposed to a life threatening risk. Looking at the bigger picture, a company should never be allowed to conceal information about toxic waste, and Kerr-McGee should have properly disposed of the waste many years prior. The longer the waste lingered, the risk of further damage heightened.

The public started to notice the negligence on the company's behalf and the waste being stored in town started to concern the residents. In 1986, many West Chicago homeowners appealed to the U.S. Supreme Court asking for a forced removal of the radioactive waste stored at the shutdown Kerr-McGee facility, stating that they were in violation of state law due to the waste being hazardous material (Schmelter). The U.S. Supreme court refused to hear the case stating that "a federal court cannot use state law to order the removal of the waste" (Schmelter). The federal government ignored the matter by claiming it was the state's jurisdiction. Residents were becoming fed up with the company's negligence and they were ignored by the federal government when they took their case to court. Both Kerr-McGee and the federal government knew they could brush the responsibility onto another entity. The residents of West Chicago just wanted the company to take responsibility for their actions. They wanted to live in a town free of radiation.

The company knew that attention was being drawn to the negative effects that the waste had caused the residents, and the fear set in. As residents began to put the pieces together concerning Kerr-McGee's negligence the company knew that they had to come up with a quick solution to conceal the extensive contamination (Robeznieks). Kerr-McGee officials proposed a solution of storing the material in a tomb made of clay to stand four stories high, taking up 27 acres of the 46 acre site in the middle of town (Robeznieks). In 1990, Kerr-McGee's proposal for the permanent on-site disposal facility was accepted by the Nuclear Regulatory Commission and would have cost the company \$25 million to complete (Robeznieks). The Nuclear Regulatory Commission (NRC) was responsible for granting Kerr-McGee other licenses that allowed them to keep the material in town for many years (Robeznieks). Ruling in favor of their license holders ideas was the only safe way for them to continue profiting by collecting their licensing fees from large corporations (Robeznieks). In regards to the newly proposed dump site, the NRC did not investigate what exactly they were providing a license for, and did not display concern for where Kerr-McGee wanted to build the clay tomb because all they were concerned about was collecting their licensing money and maintaining a positive rapport with big business (Robeznieks). The NRC did not take the time to investigate the potential hazards of the long-term radioactive waste storage facility being built in the middle of a residential neighborhood. According to a *Chicago Tribune* article, "scientists state that the thorium particles would have continued to release radiation through the clay tomb for millions of years" (Meyer). The article also states that the residents wanted the thorium removed completely by shipping it out to a remote waste facility, which would have costed Kerr-McGee more than \$120 million to complete (Meyer). Kerr-McGee only considered the fastest method they could find to make the public believe that they were taking responsible action for their negligence and to save the company millions

of dollars by avoiding the proper disposal that the residents requested. Not to mention, Kerr-McGee could have used the permanent radioactive waste disposal facility as a way to make more money. The new facility could have potentially allowed other companies to haul radioactive waste directly through the residential neighborhood to dump it into the clay tomb. Building a tomb around the radiation was the large corporation's attempt to mask the issue for a much lower cost, and could have potentially made them money.

The term “masking” was an appropriate term to describe Kerr-McGee's continued negligence. Kerr-McGee was not only causing environmental damage in West Chicago but in several states across the U.S. as well (“Tronox”). According to an EPA enforcement case summary of Tronox, in 2005, Kerr-McGee came up with a plan to transfer their environmental damages, torts, and liabilities from several states onto a spin-off company named Tronox (“Tronox”). Tronox was created to rid the parent company, Kerr-McGee, from responsibility and liabilities accumulated by the chemical portion of the company (“Tronox”). However, Kerr-McGee’s most valuable gas and oil assets were transferred to a new company named Kerr McGee Chemical Corporation, which was later sold to Anadarko Petroleum Corporation for \$19 billion (“Tronox”). Pam Hunter states in her article “Anadarko to Pay \$4.4B for Cleanup,” that “Kerr-McGee knew exactly what they were doing by transferring their liabilities onto a spin-off company, and by separating their assets to protect only their most profitable portions” (Hunter). The Department of Justice reported in the case summary for the Tronox bankruptcy that in 2009, Tronox filed for bankruptcy and the Federal government discovered Kerr-McGee’s spin-off scheme and sued Anadarko for \$5.15 billion (“Historic”). According to the DOJ, “the settlement constituted the largest payment for the cleanup of environmental contamination ever obtained in a lawsuit by the Department of Justice” (“Historic”). On January 21, 2015, the settlement agreement went into effect and the \$5.15 billion was put into a trust, separating \$4.14 billion for cleanup across the United States, and \$600 million in a separate trust to pay tort victims (“Historic”). Clearly, Kerr-McGee was not only disobeying disposal of waste laws in West Chicago but in various parts across the country as well. The company knew how to avoid taking responsibility for their actions and Illinois was not the only state to fall victim to their schemes. Kerr-McGee thought they could escape their liabilities, but the federal government finally caught them red handed and forced them to pay for the cleanup of the hazardous waste.

Looking at the bigger picture, Kerr-McGee’s continued negligence has suffered deadly consequences for the residents of West Chicago and it is impossible to trace just how many others lives have been affected by the contamination. Kerr-McGee tried multiple times to rid themselves of the responsibility for their wrongful actions. Kerr-McGee’s motives were clearly recognized by their first attempt to mask the material all the way to the illegal corporate reorganization of their assets to avoid liability. The ruthless company filed for bankruptcy and attempted to force the taxpayers to pay the debt of their destruction. If the federal government did not catch on to Kerr-McGee’s antics, then the radioactive waste may still be lingering throughout West Chicago and other areas of the country. The delay concerning the removal of the hazardous material stemmed from a large corporation not wanting to spend money on something that they thought could be easily brushed under the rug. Not only was Kerr-McGee neglecting the liability but the federal government and the NRC initially looked past the issue as well. People need to be persistent and stand up to large corporations to fight for justice in situations of severe neglect of responsibility. Corporate greed took importance over accountability in Kerr-McGee’s case and taking forty two years to finally pick up their radioactive mess is completely unacceptable. If the public does not recognize how often large corporations ignore their responsibilities and we keep allowing them to do so, then the consequences will become even more severe every time. Human health, safety, and life is a large enough consequence to never give up fighting for.

This topic hits close to home for me, literally, because of a coincidence that has been brought to my attention after my research. My father was a West Chicago mailman that walked the same

twelve mile delivery route every day for twenty years. The neighborhood of his mail route was less than one block from the thorium-contaminated Reed-Keppler Park site. In 2005, he passed away from lung cancer. My father was a smoker but there is not a doubt in my mind that the contaminated air he was breathing for twenty consecutive years, may have contributed to his illness. Educating myself about this topic has raised my awareness about the harmful health effects of the radioactive waste that was lingering in the town I grew up in. I can only hope that people will recognize the dangers of the power that large corporations have over the entire country and more than likely, their decisions are not looking out for the good of the people. Justice relies on people sticking up for what they believe in, even if it involves standing up against a large corporation.

Works Cited

- Capettini, Maggie. "Lindsay Light, Kerr McGee, and Thorium." *Friends of the West Chicago City Museum*. Wegohistory.com. No Date. n. pag. Web. 25 Apr. 2016.
- "Historic \$5.15 Billion Environmental and Tort Settlement with Anadarko Petroleum Corp. Goes into Effect." *United States Department of Justice: Office of Public Affairs*. Justice.gov, 23 January 2015. n. pag. Web. 2 May 2016.
- Hunter, Pam. "Anadarko To Pay \$4.4B For Cleanup." *ENR: Engineering News-Record* 273.15 (2014): 14. *Academic Search Complete*. n. pag. Web. 23 Apr. 2016.
- "Lindsay Light Site History and Background." *United States Environmental Protection Agency*. EPA.gov, 2015. n. pag. Web. 26 Apr. 2016.
- Meyer, Erin. "40 Years Later, Toxic Waste still Haunts Pockets of DuPage County." *Chicago Tribune*, 21 January 2012. *Chicago Tribune*. n. pag. Web. 2 May 2016.
- "NPL Site Narrative for Kerr-McGee (Kress Creek/ West Branch of DuPage River)." *United States Environmental Protection Agency*. EPA.gov, 1984. n. pag. Web. 26 Apr. 2016.
- Robeznieks, Andis. "Assault on Mount Thorium." *Chicago Reader*. Chicago Reader.com, 6 June 1991. n. pag. Web. 25 Apr. 2016.
- Schmelter, John. "Fawell's Ailing Niece Sues Kerr-McGee." *Chicago Tribune*, 12 March 1986. *Chicago Tribune*. n. pag. Web. 26 Apr. 2016.
- "Superfund Site Information for Kerr-McGee (Residential Areas)." *United States Environmental Protection Agency*. EPA.gov, 2016. n. pag. Web. 25 Apr. 2016.
- "Toxicological Profile for thorium." *Agency for Toxic Substances and Disease Registry (ATSDR)*. 1990. Atlanta, GA: U.S. Department of Health and Human Services, Public Health Service. n. pag. Web. 25 Apr. 2016.
- "Tronox Incorporated Bankruptcy Settlement." *United States Environmental Protection Agency*. EPA.gov, 2016. n. pag. Web. 26 Apr. 2016.
- "thorium (Th)." *Encyclopaedia Britannica. Britannica Academic*. Encyclopædia Britannica Inc., 2016. n. pag. Web. 24 Apr. 2016.