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Cleanup and Industrial Revitalization in the Tri-State Region THE SOUTH POINT PLANT SUPERFUND SITE AND LAWRENCE COUNTY, OHIO

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Introduction

The tri-state region, where Kentucky, Ohio, and West Virginia come together on the Ohio River, has long been known as one of the nation's commercial and industrial manufacturing hubs. Fueled by rich iron, coal, and clay resources and sustained by direct transportation links and proximity to major markets, the region's five counties have hosted some of the country's largest steel, cement, and chemical manufacturing companies.

In the early 1980s, however, the region faced challenging times. Rising energy costs, an extended economic recession, and the export of manufacturing operations overseas led to the closure of many local facilities. In Lawrence County, Ohio, unemployment approached 20 percent.

Communities' efforts to reverse these trends met several challenges. Industrial manufacturing had left behind aging infrastructure and environmental contamination. Combined with the region's mountainous terrain and extensive floodplains, there were few sites available that might attract business interest.

The situation in Lawrence County was particularly acute: a 600^+ acre area along the Ohio River next to the Village of South Point that had hosted munitions, fertilizer, and chemical manufacturing facilities for four decades was largely idle. Industrial operations had contaminated soils and ground water. The U.S. Environmental Protection Agency (EPA) placed the area – the South Point Plant Superfund site – on its National Priorities List (NPL) of contaminated sites in September 1984.

Over the next two decades, local governments worked diligently with each other and with their state and federal partners as part of a regional economic revitalization effort. One of the signature accomplishments of this project has been the cleanup and reuse of the South Point Plant site as The Point, an industrial park with eight tenants that employs almost 200 people. Future plans for the facility include additional tenants, expanded facilities, and the construction of an intermodal facility that will serve as a vital storage and road, rail, and river transportation resource for the region.

This case study explores the partnerships and key factors that have led to the successful cleanup and reuse of the South Point



Lawrence County and the Village of South Point are located in the tri-state region, where Ohio, Kentucky, and West Virginia come together along the Ohio River.

Plant Superfund site. In particular, the case study reviews the lessons learned by local governments, business owners, and state and federal regulators at The Point. These parties developed creative solutions to address obstacles and used innovative tools to create new opportunities that have resulted in local regional economic revitalization while preserving the protection of human health and the environment. EPA Region 5, for example, issued the first Ready for Reuse (RfR) Determination for industrial uses in the Midwest for the South Point Plant site.

In the following pages, the case study discusses the evolution of remediation and redevelopment efforts at the South Point Plant site between its NPL listing in 1984 and ongoing reuse activities at the site in 2009. This case study is intended to provide relevant information and lessons learned from the South Point Plant site to parties with a general interest in Superfund site reuse, as well as Midwest communities with a particular interest in commercial and industrial reuse opportunities for local environmentally impaired properties.



View of the entrance to The Point industrial park in South Point, Ohio, 2008.

1





South Point Plant Superfund Site, South Point, Ohio

SITE HISTORY, CONTAMINATION, AND REMEDIATION

From 1943 until the late 1990s, manufacturing facilities at the site produced ammonium nitrate explosives, fertilizers, industrial chemicals, coal pitch pellets, ethanol, and liquid carbon dioxide. As this photo illustrates, the site was covered by operations buildings, warehouses, storage tanks, and other structures to support the site's varied manufacturing activities.

Site operations, waste materials, and four major releases resulted in the contamination of soil and ground water with volatile and semi-volatile organic compounds, ammonia, nitrates, and metals like arsenic and cadmium. EPA listed the site on the National Priorities List, the Agency's list of top-priority Superfund sites, in September 1984.



Following a risk assessment and remedial investigations, EPA selected a remedy in the site's 1997 Record of Decision. EPA determined that contaminants were either manufactured or disposed of at five site locations; the majority of the site property was never contaminated.

Components of the site's remedy include:

- the excavation and on-site consolidation and off-site disposal of contaminated site soils;
- the placement of a dual barrier cap over the site's Eastern Disposal Area, a 13-acre area located on the site's eastern edge;
- surface controls for the site's Northern Fly Ash Ponds;
- ground water pumping, containment, monitoring, and discharge into the Ohio River; and
- institutional controls that restrict the use of site ground water and stipulate that the site can be used only for commercial/ industrial purposes.

Throughout all site activities, EPA staff met regularly with community stakeholders to share site information and updates and to incorporate community feedback into the Superfund process. The selected remedy enabled the site to be reused for commercial/ industrial land uses, which EPA had determined to be the site's reasonably anticipated future land use. Cleanup activities at the site began in May 2001 and the construction of the site's remedy was completed in December 2001.

In May 2006, EPA completed the first Five-Year Review (FYR) for the site. The FYR concluded that the site remedy continues to be protective of human health and the environment.

Project History

1983 – 1998

Recognizing Opportunities, Building Relationships

In 1983, there were a lot of cooks in the kitchen, and no coordinated strategy at hand to address the economic hardships facing the tri-state region. Multiple local organizations, including two chambers of commerce, were each working to bring businesses and jobs to Lawrence County. "Our industries were shutting down left and right and we knew that it was going to take a lot to bring our economy back," recalled Ralph Kline, Assistant Executive Director of the Ironton-Lawrence County Community Action Organization. "We realized that we could accomplish a lot more if we worked together."

The result was the formation of the Lawrence Economic Development Corporation (LEDC), a non-profit community improvement corporation. The LEDC was designated as the economic development agent for Lawrence County. The LEDC's original goals – job creation and retention – remain unchanged today.

While the LEDC developed a toolkit of economic development tools during the 1980s, it was clear that two key ingredients would be needed to foster long-term economic development and revitalization. First, the LEDC needed an inventory of sites and buildings located in close proximity to transportation networks and infrastructure. Second, regional coordination would be needed to attract state and federal resources and link together vital resources in the tri-state area. For example, the Port of Huntington, the largest inland port in the United States by tonnage, is located in Lawrence County.

In this context, one site stood alone. "As the LEDC continued its work, the idea of developing a premier, world-class industrial park made more and more sense," said South Point Mayor Bill Gaskin. "And the property that would become The Point really stood out. Everyone saw this area as a tremendous potential opportunity."

Owned at the time by Ashland Oil (later Ashland, Inc.), the property was centrally located on the Ohio River and offered more than 500 acres for industrial development. Ashland had sold an 80-acre portion of the property to an ethanol production company in 1981 and also operated energy production facilities, but was unsure of its long-term plans in the tri-state region. During the late 1980s and 1990s, the LEDC cultivated a close working relationship with the company, providing market research and technical assistance to support its efforts to explore its options at the property.

The LEDC also worked closely with site staff from EPA Region 5 and Ohio EPA during these years, clarifying the property's status as a Superfund site. "Our priority was making sure that the agencies understood the value of the site, and that the community would be able to use this remarkable property for industrial land uses in the future," stated Dr. Bill Dingus, the LEDC's Executive Director.

The Lawrence Economic Development Corporation

The Lawrence Economic Development Corporation (LEDC) is a non-profit community organization. The LEDC was formed in 1983 through the merger of several local economic development organizations and designated as the economic development agent for Lawrence County. The goals of the agency are job creation and retention. The ownership and development of The Point is one of LEDC's primary responsibilities.

The LEDC offers several services to area businesses, including:

- financing assistance
- technical assistance
- resource information
- community profiles
- industrial development
- industrial development bonds
- a site and building inventory

The LEDC also administers a city and county-wide revolving loan fund, as well as a Regional 166 revolving loan fund. The LEDC is directed by a Board of Trustees, composed of local elected officials and business leaders.



The LEDC's offices at The Point.

He also noted that, thanks to discussions with EPA and Ohio EPA, the LEDC and the community's concerns regarding the site's Superfund status had been addressed. "We knew that there were portions of the site that would need to be cleaned up, as well as the site's ground water, and that the vast majority of the area was not contaminated. The site was also already very familiar to us – members of our families had worked there for years. And we knew that the site's PRPs [potentially responsible parties] would be responsible for the site's cleanup."

Remedial investigations were conducted at the site from 1989 to 1992, with the feasibility study and Record of Decision (ROD) for the site's remedy completed in 1997. The site's ROD concluded that "it is reasonably anticipated that future use at the site will remain industrial."

All told, the LEDC worked patiently with businesses and state and federal agencies for more than a decade, building relationships and putting economic development tools and resources in place. In 1998, all of the organization's patient preparations began to pay off.



Timeline of Events

1943:	Buckeye Munitions builds South Point Plant for production of ammonium nitrate explosives
1946:	Allied Chemical (later Allied Signal and Honeywell International, Inc.) purchases site property
1946-1978:	Allied Chemical produces fertilizers and various chemicals at the site
1979:	Ashland Oil purchases the site property and operates coal-water fuel pilot plant and pitch prilling test plant
1981-1995:	South Point Ethanol (SPE) operates ethanol production facilities on 80-acre portion of the site
1983:	Local organizations create the Lawrence Economic Development Corporation (LEDC)
Sept. 1984:	EPA lists the site on the NPL
1985-1997:	Cardox leases a portion of the site property for liquid carbon dioxide production
Sept. 1997:	EPA issues the Record of Decision for the site
1999:	Biomass, Inc. acquires the SPE site property and plans to operate a wood/sawdust burning power plant
1999:	The area is designated as an Ohio Enterprise Zone and a non-contiguous developable site within the federal Huntington-Ironton Empowerment Zone
May 2001:	Site cleanup begins
2001:	The LEDC acquires 504 acres of site property for redevelopment as The Point industrial park
2001-2004:	Infrastructure installation and building rehabilitation and construction for The Point
Dec. 2001:	Construction of the site's remedy completed
Dec. 2001:	First business locates at The Point
July 2002:	EPA provides Superfund Redevelopment Initiative and Region 5 reuse planning services for the site
Oct. 2004:	EPA issues RfR Determination for The Point
2005:	Four businesses are located at The Point
May 2006:	EPA completes first Five-Year Review for the site
Sept. 2007:	Ohio University Southern opens education and training center at The Point
2009:	Eight businesses are located at the point; LEDC plans for intermodal facility at The Point are moving forward

1998 – 2004 Laying the Foundation for the Future

When Ashland, Inc. decided to move out of the tri-state region in 1998, the LEDC opened negotiations with the company to acquire the property. The LEDC would eventually acquire the property in 2001, following completion of the site's cleanup, for \$3.86 million. In 1998, however, the LEDC did not have many resources at its disposal. The three-year transition period enabled the organization to formalize relationships into partnerships and leverage the resources needed to make The Point a reality.

Between 1999 and 2003, the LEDC:

- developed a two-phase, community-based master plan for the industrial reuse of the site property;
- coordinated with the Village of South Point, Lawrence County, and neighboring localities;
- identified state agency resources to enable the adaptive reuse of existing buildings and the construction of shell buildings at the site;
- initiated marketing and outreach efforts to attract businesses to The Point;
- built relationships with regional, state, and federal organizations and elected officials and pursued state and federal resources; and
- coordinated with U.S. EPA Region 5, Ohio EPA, and site PRP Honeywell International during the site's cleanup.

The LEDC's activities led to three major outcomes. First, in 1999, The Point was designated as an Ohio Enterprise Zone and a non-contiguous developable site within the Huntington-Ironton Empowerment Zone (EZ), state and federal designations that provided the LEDC with \$2.2 million in acquisition funds and a range of incentives to attract businesses to locate at The Point. "The EZ designation provided The Point with critical dollars in the early its development stages for acquisition and development costs," stated Cathy Burns, Executive Director of the Empowerment Zone. "EZ funds were the primary funding source during The Point's first three years of development to secure title by the LEDC and pay for all environmental expenses and the master plan. These three steps were critical and had to be accomplished before other funds could be applied for."

Second, the Village of South Point annexed the site property to enable the extension of updated water and sewer infrastructure to The Point. "The site has always been a good place to build for industry, dating back to the Second World War," noted South Point Mayor Bill Gaskin. "The Village has always supported industry at the site, and we plan on continuing to provide that support into the future. Annexing the site and extending

Community Profile (Part II) – Partners and Grants

The Point was designated as part of the federal Huntington-Ironton Empowerment Zone in 1999, and is also located in an Ohio-designated Enterprise Zone. The Empowerment Zone/Enterprise Community (EZ/EC) program was created in 1993 to empower economically distressed communities to create economic development opportunities and jobs in rural and urban areas. The Huntington-Ironton EZ was one of 20 communities selected in the program's second round. The EZ has provided The Point with \$4.8 million in funding and enabled The Point to leverage an additional \$8.5 million in public and private dollars.

Building on these designations, The Point has received assistance from diverse organizations and grant resources.

State

- Ohio Department of Development (ODOD), Governor's Office of Appalachia – multiple grants
- Ohio General Assembly CAP-786 Rural Areas Community Improvements grant
- Ohio Valley Regional Development Commission

Federal

- Appalachian Regional Commission (ARC) Area Development program
- U.S. Department of Agriculture (USDA) Rural Community Development Initiative program
- U.S. Department of Housing and Urban Development (HUD) – Community Development Block Grant program and Congressional Grants, EDI-Special Projects
- U.S. Economic Development Administration (EDA)
 Public Works and Economic Development program

Nonprofit

- Foundation for the Tri-State Community – 21st Century Endowment Fund
- Ironton-Lawrence County Community Action Organization (ILCAO) – multiple grants
- Southern Ohio
 Agricultural
 and Community
 Development
 Foundation (SOACDF)
 multiple grants



infrastructure several years ago was a key part of that ongoing effort."

Third, following completion of the site's cleanup in 2001, the LEDC received reuse planning assistance from EPA Region 5 and EPA's Superfund Redevelopment Initiative in 2002. Efforts to address future land use considerations at the South Point Plant site fit well with emerging nationwide interest in the revitalization of contaminated areas, including Superfund

sites. "The LEDC and the Village of South Point requested our assistance to address potential stigma or public safety concerns that prospective businesses might have regarding the site," recalled EPA Region 5 Reuse Coordinator Tom Bloom. "They were highly organized and highly motivated, and we have worked with them to develop several tools that have supported the site's reuse while also ensuring that the community's health is protected."

The Point: Master Plan Overview

In 1999, the LEDC developed a community-based, two-phase Master Plan for the reuse of the South Point Plant Superfund site as The Point, a premier, world-class industrial park. The Master Plan was a key component of the tri-state region's successful Huntington-Ironton Empowerment Zone application.

The first phase of the Master Plan has focused on the development of a 185-acre land area located along Commerce Drive, which extends northwest across the site from The Point's eastern, main entrance, located adjacent to U.S. Route 52. Phase 1 activities have included road paving, the extension of infrastructure along Commerce Drive, and the adaptive reuse and construction of three buildings for commercial and industrial users. Development of this land area is ongoing.

The second phase of The Point's Master Plan focuses on the development of intermodal facilities – docks, cranes, forklifts, storage and loading areas, and other infrastructure – which will connect interstate highways and the Norfolk-Southern rail line with river barges and container ships on the Ohio River. Other potential components of The Point's second phase of development include an ethanol production facility or other large-scale manufacturing facility.



Ready for Reuse (RfR) Determinations: An Overview

An RfR determination is an environmental status report that documents a technical determination by EPA, in consultation with states, tribes, and local governments, that all or a portion of a site can support specified types of uses and remain protective of human health and the environment. An RfR Determination provides potential users of a site with clear information about the environmental status of a property and the actions needed to maintain the integrity of the remedy.

At the South Point Plant Superfund site, the RfR Determination issued by EPA Region 5 in October 2004 was the second industrial RfR Determination issued in the country, following the Tex Tin Superfund site in Texas City, Texas, and the first issued in the Midwest.

Since 2003, six EPA Regional offices have issued a total of seventeen RfR Determinations for sites in their Regions, with as many as seven additional documents currently underway. Local officials, developers, and EPA staff in Regional offices say that RfR Determinations have played an important role in the reuse of sites and serve many beneficial purposes. Local officials and developers report that they have used RfR Determinations to improve local economic conditions by encouraging reuse.

Other sites for which RfR Determinations have been written include:

- Arlington Blending and Packaging (Arlington, TN)
- Augustus Hook (Frankfort, IN)
- Conroe Creosoting Company (Conroe, TX)
- H.O.D. Landfill (Antioch, IL)
- Ingram Richardson (Frankfort, IN)
- MGM Brakes (Cloverdale, CA)
- Midvale Slag (Midvale, UT)
- RSR Corporation (Dallas, TX)
- Sharon Steel (Midvale, UT)
- Southern Maryland Wood Treating (Hollywood, MD)

In 2003, EPA's assistance enabled the development of a toolkit of communications materials to address stigma and public safety concerns for the South Point Plant site, as well as an analysis of reuse opportunities and remedy considerations. The site's remedy, for example, included institutional controls – a property deed restriction – instituted by the site's PRPs that restricted the use of ground water at the site and stipulated that the site property could only be used for industrial purposes.

In 2004, EPA also developed a Ready for Reuse (RfR) Determination for the site; the report stated that EPA had determined that the LEDC's site property was ready for industrial reuse (see sidebar). "The RfR Determination has been one of our most powerful tools," said Jeremy Clay, The Point's Director. "We share it with businesses up front and it moves them past any site contamination or stigma concerns they might have. We have financing tools and property incentives and other resources to help businesses locate here, but the RfR [Determination] is what makes those discussions possible."

As a result, by the end of 2004, two businesses had located at the industrial park, citing The Point's location, business incentives, and building availability, as well as the completed cleanup and RfR Determination for the South Point Plant Superfund site, as key factors in their decisions. As Marty Meyer, President of M&M Service, the first business to locate at The Point, stated in a 2002 interview, "I can see a large future for this park. The Point offers opportunities that are difficult to match in this region. We certainly anticipate being here for the long term."

The Point was open for business. Its expansion and development could now move forward.



The RfR Determination certificate for the South Point Plant site, on display at the LEDC's offices.

2005 – 2009⁺ Realizing the Possibilities ...

Since the LEDC attracted the first two companies to The Point in 2004, the roster of companies has expanded to include eight diverse small businesses, as well as a satellite campus for Ohio University, which opened a training center at The Point in 2007. All of the businesses have located within the 185-acre area laid out in the first phase of The Point's Master Plan.

Many other companies have visited The Point over the past five years; The Point's Director Jeremy Clay estimates that there are typically 2-4 companies in leasing or acquisition discussions with the LEDC at any given time. The business marketing and outreach process at The Point is now no different from similar efforts at commercial and industrial parks across the country.

During his interactions with the LEDC, Ohio EPA Project Manager Kevin O'Hara has noticed several reasons why the organization may have been so successful in attracting interest

Businesses Located at The Point, 2009

- 1) American Electrical Power electric utility
 - one building, 24 employees
- 2) Applied Industrial Technologies industrial products distributor
 - 1 building, 9 employees
- 3) Calgon Carbon Corporation activated carbon and air/water treatment system manufacturer
 - 1 building, 3 employees
- 4) Engines, Inc. parts fabrication and machine shop services
 - 3 buildings, 90 employees
- 5) M&M Mailing direct mail marketing company
 - 1 building, 6 employees
- M&M Service service station equipment specialist
 - 1 building, 13 employees
- Mercier's railroad right-of-way maintenance company
 - one building, 50 employees
- Superior Marine Ways

 shipbuilding and tugboat services
 - riverfront facility, 9 employees





Businesses at The Point: Applied Industrial Technologies, Engines Inc., M&M Mailing, and Mercier's.

in The Point. "Having a dedicated agency like the LEDC managing The Point is a major plus in the first place," he stated. "The location of their offices right there at the property is also a major strength. Their location conveys that the site is safe and open for business, and that the community welcomes businesses' interest in the property."

LEDC Executive Director Bill Dingus notes that The Point explicitly emphasizes the property's Superfund history as part of its marketing activities and discussions with prospective businesses. "Since the site was cleaned up [in 2001], we have marketed The Point's status as part of a Superfund site as a major plus," he said. "Up front, we let companies know that the site has been evaluated by U.S. EPA and Ohio EPA, that a responsible party [Honeywell International] has addressed the site's contamination and is responsible for the site's remedy, and that all [the companies] need to be concerned with is ensuring the appropriate operation of their own facilities. There is more certainty here regarding site conditions than at most any greenfield or brownfield in the area, in my opinion."

The Point has also benefited from a unique combination of geographic and economic factors. "We have been very fortunate," reflected Ralph Kline from the Ironton-Lawrence County Community Action Organization. "When this all got started, I'm not sure that any of us knew just how special and unique that piece of land was."

In addition to The Point's large, contiguous acreage, proximity to major markets, out-of-floodplain location, deep water port frontage on the Ohio River, and access to transportation networks, the industrial park is also benefiting from ongoing infrastructure and economic development initiatives in the tristate region. These initiatives – including the expansion of the Heartland Corridor rail network, the expansion of the Port of Huntington, and the development of intermodal facilities like the Pritchard Intermodal Park – provide vital support for the LEDC's future plans for The Point.

Reuse in Action: M&M Mailing



In 2006, Ken McGuire decided to relocate his business, M&M Mailing, from West Virginia to South Point, Ohio. "The availability and pricing of land here at The Point was compelling, and having utilities available was great," Mr. McGuire said. "Moving to The Point has significantly reduced the company's operating costs. Perhaps as important, everyone took an interest and wanted to work with me. For example, the LEDC helped me get connected with state and federal programs. There is such a willingness to work together at The Point."

M&M Mailing opened for business in March 2007; the company operates out of a 16,000-square-foot facility located along the eastern edge of The Point. The company is a direct mailing organization, processing circulars, publications, and billings for clients nationwide. Other company operations include ink jetting and bar coding for mail processing.

Since the company relocated to The Point, Mr. McGuire estimates that its revenues have increased approximately seven percent. "There has been an increase in sales, and a decrease in operational expenses," he stated. "I'm optimistic for the future."

M&M Mailing's future plans include investments in new mailing technologies and expanded services for one of its major clients, the U.S. Postal Service. The company is also considering leasing or acquiring an adjacent piece of land at The Point, which would expand its facilities by 5,500 square feet. "We always have plans to grow," said Mr. McGuire. "And we can grow well at The Point."

According to the LEDC's Executive Director Bill Dingus, The Point is the finest intermodal transportation site on the Ohio River between Cincinnati and Pittsburgh. "This property has always had a remarkable location, dating from when explosives were manufactured here during the Second World War," he stated. "And now, if you look at the future of transportation in this country, that means just-in-time container shipping deliveries and a return to using our nation's waterways as a primary transportation network. We are positioned to play a central part in supporting intermodal transportation on the Ohio River in the years to come."

... Adapting to Challenges

The successful development of The Point over the past several years has not sidestepped challenges. While the site property's status as part of a Superfund site was addressed directly by EPA's RfR Determination, the LEDC has had to address three other long-standing issues.

The first challenge has been the development of The Point around the 80-acre portion of the Superfund site that is owned by another entity, Biomass, Inc. The company acquired the site acreage in 1999 to refurbish former power plant facilities for use as a coal or biomass burning power plant. Due to financing and permitting issues, the company's plans have not yet been implemented. The LEDC has addressed the Biomass property

The Heartland Corridor

The Heartland Corridor is a railroad line that runs between the Port of Hampton Roads in Norfolk, Virginia, through western Virginia and southern West Virginia, to Columbus, Ohio. This railroad line, owned by Norfolk Southern, is a primary route for moving freight from the East Coast to the Midwest.



The Norfolk Southern Corporation is modifying

28 railroad tunnels along the corridor to enable double-stacked container trains to travel along its entire length. The company estimates that these modifications will improve transit time between Norfolk and Chicago and Norfolk and Detroit by one full day, respectively. The company anticipates that the project will be completed by 2011.

by ensuring that infrastructure can be extended to the property and by continuing to contact the company. "We're not sure what else we can do in this situation," said Bill Dingus. "We remain hopeful that we'll be able to work with the company in the future."

Two other unexpected findings – archaeological resources and an endangered species – have also required the LEDC's attention in recent years. An initial property assessment identified 16 archaeological areas requiring further evaluation; The Point has completed these evaluations and is now coordinating with the Ohio Historic Preservation Office to excavate and preserve cultural artifacts. Road construction in 2003 uncovered habitat for the eastern spadefoot toad at The Point; the LEDC has developed a management plan for the species that will dedicate several acres for its habitat. "We have tried our best to both follow our Master Plan, and also to respond flexibly when we need to," said The Point's Director Jeremy Clay. "And with the [archaeological resources and endangered species], they've had a beneficial effect as well as being challenging. They've helped prioritize phase 1 areas for development, while we work to get the other areas ready as well."

Careful planning. Creative outreach and marketing. Coordination with local, state, and federal partners. Flexibility. The end result: the successful redevelopment of The Point industrial park at the South Point Plant Superfund site.

South Point Training Center

Ohio University Southern, one of five regional campuses of Ohio University, is located in nearby Ironton, Ohio. In 2003, the University was seeking to locate a satellite campus in the tri-state region. According to Jim Crawford, Director of the University's Center for Development at the time, "The Point was located where we needed to be, and building our facility there meant that we could provide training services for the employees of companies located at The Point as well."

The Point's industrial history and contamination were a primary concern for the University. Following meetings with the LEDC and correspondence with EPA and Ohio EPA, during which the parties reviewed EPA's Preliminary Closeout Report and RfR Determination for the South Point Plant site, the University determined that the agencies' documentation of the site's contamination, remediation, and current availability for industrial reuse were sufficient to move forward with the project. According to Ohio EPA Project Manager Kevin O'Hara, "we were able to field [the University's] questions and walk them through how the site's remedy had addressed potential health risks at the site. We were able to communicate that, following the site's cleanup, Ohio EPA has not had any concerns about the protectiveness of the site's remedy."

Following allocation of funding resources for the project, the Ohio University Southern South Point Training Center was built in 2006-2007, in a partnership between the University, the LEDC, the Lawrence County Chamber of Commerce, and the Huntington-Ironton Empowerment Zone. The Center's 2,000 square feet include training and conference space, five offices, and a courtyard. The Center is also connected to the LEDC's offices. The Center opened in September 2007.

In its first year of operation, according to Executive Director Cathy Burns, the Center had training contracts with approximately 20 business clients; the Center also hosted approximately 20 not-for-profit events. "Our plans for the future focus on continuing to provide off-site training and increasing on-site training," Ms. Burns said. "We also have some space for business incubation. Overall, we would like to maximize the use of this facility in coming years."



Lessons Learned

Site Specifics

Participants involved at the South Point Plant site agree that a combination of significant factors have contributed to the site's cleanup and successful redevelopment.

- The site is one of the land areas best suited for industrial development in the tri-state region.
- Local and regional governments worked together consistently over a long period of time to put in place the requisite resources, partnerships, and expertise.
- EPA and Ohio EPA provided timely reuse planning assistance for the site as efforts to redevelop the site property were moving forward.
- Localized soil contamination meant that the site's cleanup could proceed rapidly, with the majority of the site's acreage never having been affected.
- The site's PRPs remain responsible for maintaining the site's remedy.
- EPA had selected a remedy for the site that would be consistent with the property's reasonably anticipated future land use.

The Bigger Picture

While these conditions created an ideal climate for the successful reuse of the South Point Plant site, there are also a range of broader lessons learned that can help guide similar projects at contaminated sites throughout the Midwest and across the country.

Think long-term.

It can take many years to remediate contamination that has accumulated over decades of site activities. However, this lengthy process also provides a time window for site stakeholders to build partnerships and identify resources, coordinate with EPA and state agencies, and develop a strategy for returning a site to use while protecting future users. The LEDC was formed in the early 1980s and worked for more than a decade to put in place the pieces needed to develop The Point.

Identify the key characteristics of the site and its surroundings to inform future land use opportunities.

The South Point Plant site was uniquely suited for industrial redevelopment, in a region with significant industrial resources and infrastructure. Other Superfund sites may be suited to other types of land uses. Many sites can also support multiple land uses, providing an opportunity for communities to address multiple priorities. For example, many sites are well-suited to community land uses like community centers and civic areas, as well as recreational and ecological land uses, that can provide community-wide amenities.

EPA and Reuse: Lessons Learned

Since the inception of the Superfund program, EPA has been building on its expertise in conducting site characterization and remediation to ensure that contamination is not a barrier to the reuse of property. Today, consideration of future use is an integral part of EPA's cleanup programs.

"At older sites, EPA did not focus on taking reuse considerations into account early in the cleanup process," reflected Region 5 Homeland Security Advisor Matthew Mankowski, a former EPA project manager at the site. "Today, that has changed. Superfund cleanups can be very creative and flexible in allowing for future site uses, but that information needs to be plugged in early to be as effective as possible."

At the South Point Plant site, future land use considerations were able to inform EPA Region 5's selection of the site's remedy, which enabled the site's reuse for industrial purposes. Site PRP Honeywell International worked with the LEDC during the site's remedial design, enabling the use of on-site soils for the site's landfill cap. In return, the PRP regraded those areas for the LEDC in accordance with The Point's Master Plan. EPA Region 5's RfR Determination for the site provided the community with a tool to address site stigma concerns.

Thanks to lessons learned at sites like the South Point Plant site across the country, EPA has developed additional tools to ensure an integrated approach to the cleanup and redevelopment of contaminated sites. For example, for sites like the South Point Plant site, EPA developed its partial deletions guidance. Partial deletions allow EPA to remove the cleaned and uncontaminated portions of a Superfund site from the NPL, expediting the reuse of those properties.

Second, EPA works with site stakeholders to consider how future land use considerations can inform the implementation and long-term stewardship of site remedies as well as cleanup planning. At some sites, for example, reuse considerations can inform the future location of ground water monitoring wells and other operation and maintenance equipment that might inadvertently hinder redevelopment efforts. At other sites, detailed site reuse plans have provided additional benefits that save time and reduce redevelopment costs. For example, future infrastructure corridors or building footers can be installed in coordination with site cleanup activities.

Engage local governments.

As the organizations responsible for their communities' general welfare, local governments are particularly well-positioned to host redevelopment projects, bring together diverse stakeholders to discuss site reuse opportunities, and use planning tools and incentives to foster positive site outcomes.

Collaborate and consider local and regional partnerships.

Community-based reuse planning processes can be most effective when they engage diverse stakeholders, including site owners and prospective purchasers, are based on detailed site and community information, and lead to implementable strategies and next steps. In the tri-state region, local governments in three states realized that, by working together rather than by competing against each other, they could develop a regional economic revitalization plan that harnessed the region's natural resources and extensive industrial infrastructure.



M&M Service was the first business to locate at The Point. It renovated two buildings for office and warehouse uses in 2002.

Work with a site's natural features and adaptively reuse buildings, roads, and other infrastructure.

The South Point Plant site's location out of the floodplain and proximity to the Ohio River were key factors in the development of The Point. The LEDC was also able to reduce infrastructure costs and attract initial business interest by upgrading existing site infrastructure, including roads and water and sewer lines, and restoring on-site buildings for immediate reuse. At other Superfund sites, natural features can be an important part of recreational and ecological reuse plans, while site buildings and equipment also often serve as important reminders of a community's history and heritage.

Access site-related information and recognize opportunities provided by the Superfund program.

Superfund sites are among the most comprehensively documented and evaluated areas of land in the United States. The LEDC markets The Point's status as part of a Superfund site as an opportunity for companies looking for industrial space in the tri-state region. At most sites, a completed remedial investigation/feasibility study, draft proposed plan, or RfR Determination will provide prospective purchasers with extensive site information.

Contact and work with site owners, PRPs, and trustees.

The LEDC worked with previous site owner Ashland, Inc. to acquire the land needed for The Point and continues to coordinate with Honeywell International, one of the site's PRPs. According to Manager Chuck Geadelmann, "Honeywell International maintains a good working relationship with the LEDC and supports the safe and appropriate reuse of the site for industrial purposes." At other sites, these parties may be able to take the lead on a site's cleanup and redevelopment.

Build on past experience.

Parties at the South Point Plant site were charting new territory in addressing stigma and other site issues. Today, thanks to the bona fide prospective purchase (BFPP) provisions of the 2001 Brownfields Revitalization Act, environmental insurance, and EPA tools like RfR Determinations, established resources are available. Prospective purchasers can contact EPA site teams to learn more, or see the Resources section on page 13 for additional information.



EPA Region 5 and Ohio EPA continue to work with site stakeholders to ensure the protectiveness of the site's remedy and support revitalization outcomes. In February 2008, Ohio EPA provided this reuse support letter to a prospective business concerned about The Point's status as part of a Superfund site.

Conclusions

The timeline of events at the South Point Plant Superfund site illustrates how the integration of cleanup and reuse considerations at contaminated areas can result in two successful outcomes: the protection of human health and the environment and community revitalization. Over the next few years at the site, new businesses will continue to locate at The Point, new jobs and tax revenues will continue to benefit the Village of South Point and surrounding Lawrence County, and the industrial park will continue to play a vital role in the reestablishment of one of the country's preeminent industrial regions.

In the tri-state region, local governments came together to share resources, collaborate regionally, and coordinate closely with the site's owners, potentially responsible parties, community representatives, and state and federal agencies. In turn, their initiative has led to new economic opportunities at the South Point Plant site, and a bright future for surrounding communities.





View of the Ohio River, looking north from The Point.

Sources and Resources

Sources

Images and maps for this case study were obtained from EPA Region 5, the Huntington-Ironton Empowerment Zone, Lawrence County, the LEDC, Ohio University Southern, The Point industrial park, the Village of South Point, and a December 2008 site visit.

Resources

EPA site progress profile: cfpub.epa.gov/supercpad/cursites/csitinfo.cfm?id=0504434

EPA Superfund Redevelopment Initiative: www.epa.gov/superfund/programs/recycle/index.htm

2001 Brownfields Revitalization Act and BFPP information: www.epa.gov/brownfields/html-doc/2869sum.htm

Environmental insurance information: www.epa.gov/brownfields/insurebf.htm

Huntington-Ironton Empowerment Zone: www.empowerwv-oh.org_

Ironton-Lawrence County Community Action Organization: www.ilcao.org

Lawrence County (includes The Point and the LEDC): www.lawrencecountyohio.org

Ohio University Southern: www.southern.ohiou.edu

Village of South Point: www.villageofsouthpoint.com

Cleanup and Industrial Revitalization in the Tri-State Region THE SOUTH POINT PLANT SUPERFUND SITE AND LAWRENCE COUNTY, OHIO



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