If you’ve seen a doctor, used a road, taped something, or have a roof over your head, you may have benefited from a product made by Kraton. The polymers manufactured in Kraton’s Belpre, Ohio, facility are used in a variety of applications, including medical products, paving, adhesives and roofing.

Though Kraton manufactures cutting-edge polymers, it does so from a 1960s-era facility. In 2011, when Kraton considered major upgrades to its power infrastructure to meet federal requirements, it opted to take advantage of incentives offered by AEP Ohio, its local utility, to replace its outdated coal-fired boilers with two new natural gas boilers with combined heat and power (CHP), a super-efficient approach to onsite electricity generation.

The CHP system captures heat that would otherwise be unused through the facility’s processes. Thanks to this innovation, Kraton is now producing about one-third of its energy for free—all while reducing hazardous air pollutants by more than 96 percent, and cutting greenhouse gas emissions by 15 percent.

The increased efficiency from the natural gas-fired CHP boilers have helped Kraton lower its energy costs dramatically—while also reaping savings on lower safety and maintenance costs.

“With Combined Heat and Power from our new efficient boilers, a significant amount of our power is being produced at no cost, so our savings just keep adding up,” said Scott Oran, plant manager for Kraton. “And we’ve improved our site safety by moving to natural gas.”

“When we looked at our options to replace our 50-year-old boilers, we needed to meet a number of challenges, and going with CHP has exceeded our expectations,” Oran said. “We’re saving money, operating cleaner and more efficiently, and positioned to be more competitive going forward. Not only did we meet U.S. Environmental Protection Agency requirements, but we’re using less expensive energy than the pricey grade of coal that our old boilers required.”

**Kraton Polymers Quick Facts**

<table>
<thead>
<tr>
<th>Type of Project:</th>
<th>Combined Heat and Power (CHP)</th>
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<tbody>
<tr>
<td>Investment:</td>
<td>$52 million</td>
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<tr>
<td>Payback Period:</td>
<td>Approximately 4.5 years</td>
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<tr>
<td>Utility Incentives:</td>
<td>$150,000-$200,000 in annual rebates</td>
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<tr>
<td>Savings:</td>
<td>Energy costs cut by one-third based on no-cost power now generated onsite</td>
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Let the Energy Savings Continue:
The Kraton plant is the largest type of facility in the world of its kind, originally built during the 1960s (and subsequently upgraded), so the investment in energy-saving technology was a big decision that has paid off in a big way. By lowering energy costs, the company is more competitive. Adding CHP capability is the solution that has met all of Kraton’s immediate and long-term challenges. And with 250,000 hours to complete the job, the community enjoyed economic growth during the process—along with long-term job security for the company’s 450 employees in Belpre.

“Our contractors played an integral role in coming up with cost savings ideas during the process,” said Scott Haverty, Kraton’s process and technical lead on the project.

Kraton worked hand and glove with its utility, AEP Ohio, to design and finance the project. AEP Ohio was a partner from the beginning, helping with the application process, and providing incentives that helped push the investment through. Today, ongoing utility incentives from AEP average about $150,000-$200,000 annually.

Kraton’s outstanding experience reflects an overwhelming level of satisfaction from industrial manufacturers that opt for efficiency upgrades. “More than 90 percent of our industrial customers are satisfied with their investments to be more efficient,” said Jon Williams, manager of Energy Efficiency, AEP Ohio. “And more than one third of our retail electric sales are industrial, so this is a critical part of our business.”

As an added bonus, the startup of the new CHP boilers was accomplished with zero downtime by coordinating it with existing plant operations. So Kraton never missed a step in delivering its products.

About Kraton
Kraton Corporation (NYSE “KRA”) is a leading global producer of styrenic block copolymers, specialty polymers and high-value performance products derived from pine wood pulping co-products.

Combined Heat and Power and Waste Heat to Power could supply 20 percent of U.S electric capacity by 2030