



Martins Creek coal units shut down



In September, PPL permanently shut down the two coal-fired generating units at the Martins Creek power plant.

Built in the 1950s to meet the rapid growth in electricity use following World War II, Martins Creek was at one time PPL's largest coal-fired power plant.

Although it was one of PPL's smallest power plants at the time of its retirement, it still generated enough electricity in a year to power about 240,000 typical homes.

"For many years, the coal-fired generating units at Martins Creek played a critical role in providing the electricity needed to fuel the region's growth," said Brad Piatt, manager of Peaking Power for PPL Generation.

The units were shut down as part of a voluntary agreement with environmental agencies in Pennsylvania and New Jersey to reduce sulfur dioxide emissions.

Since the 2003 agreement, the Martins Creek plant already had reduced sulfur dioxide emissions by 25 percent. Retiring the units will reduce sulfur dioxide emissions by about 20,000 tons per year.

Shutting down these units also reduces carbon dioxide emissions by about 1.3 million tons per year.

"PPL is committed to producing electricity in an environmentally responsible manner," Piatt said. "We continue to operate two oil or natural gas units at Martins Creek, and the Lower Mount Bethel Energy plant, which is one of the cleanest and most modern natural gas-powered plants in the country.

"We also are pursuing plans to expand generation from our hydroelectric and nuclear power plants, which do not emit greenhouse gases, and will invest at least \$100 million in renewable energy projects over the next five years."

PPL already has developed several renewable energy projects in both Pennsylvania and New Jersey.

In the beginning:

When it was dedicated in 1954, the Martins Creek plant was one of PPL's largest. Here are some facts about the plant's operations in the early years:

- Unit 1 generated enough electricity to run electric refrigerators in 2.5 million homes.
- About 30,000 yards of concrete were used in the construction of Unit 1 – enough to build an 18-foot-wide highway 17 miles from Martins Creek to Stroudsburg.
- More than 300,000 cubic feet of air a minute, heated to 600 degrees Fahrenheit, was required to keep the fires in the boiler going.

In 1954:

- You could buy a car for \$1,950.
- Sports Illustrated makes its debut.
- Gasoline costs 29 cents per gallon.
- The Supreme Court bans segregation of schools.
- The average home costs \$17,500.
- Schoolchildren are given the first polio vaccines.
- The average annual salary is \$4,700.
- Minimum wage is 75 cents per hour.

Sweating the small stuff secures big delivery

Two 76-foot-long tanks are traveling separately from Chicago and Reidsville, N.C. They must arrive at Marcus Hook, Pa., within the same two-hour period. The tanks are transported by 185-foot trucks and will be installed using a 500-ton crane. When will each truck have to begin its journey to arrive at the same time?

It sounds like a complicated math problem, but it was a real-life challenge for employees at PPL Interstate Energy Company.

The company recently installed two storage tanks at its pump station at Marcus Hook, a town along the Delaware River southwest of Philadelphia that is the starting point of the 84-mile pipeline that delivers oil and natural gas to the company's Martins Creek terminal and the Lower Mount Bethel and Martins Creek power plants.

"This type of installation is unique in the pipeline industry," said Dennis Levine, general manager. "It was truly a joint effort with Air Products, the crane company and the trucking company to make sure everything went safely and smoothly."

With the two trucks traveling from different states, timing was critical. Employees at Interstate Energy coordinated the effort to make sure the tanks arrived at the same time to minimize the amount of time the crane was required.

It took about 45 minutes for the crane to lift the tanks from the trucks and put them on the ground. The tanks were placed on their foundations the next day.

The tanks will store liquid nitrogen, which is used to clear the pipeline after a typical four-week pump cycle or in the event of an emergency.

"If we didn't use nitrogen after a cycle of pumping oil through the pipeline, the oil would set up like shoe polish and we wouldn't be able to use the pipeline," Levine said. "Having storage tanks on site ensures we'll have the nitrogen we need, especially in the event of an emergency."

Interstate Energy negotiated with



A 500-ton crane was needed to lift the nitrogen storage tanks.

Air Products of Allentown to build, own and operate the storage tanks. Each tank holds 40,000 to 50,000 gallons of liquid nitrogen, which is not flammable or toxic.

"Every aspect of the project was completed safely and on time thanks to detailed planning," Levine said.

Teacher workshop shines

Educators can learn how to bring the world of songbirds to life in their classrooms during the Pennsylvania Songbirds Teacher Workshop from 8:30 a.m. to 3:30 p.m. Wednesday, Oct. 3 at PPL's Martins Creek Cedars Pavilion on Foul Rift Road.

Kindergarten through 12th-grade teachers will learn a variety of classroom activities on bird biology, habitats, observing and identifying birds, bird migration, research techniques, and ideas for projects to help songbirds in their area.

The workshop will include a visit to a songbird banding station to allow teachers to see these marvels of nature up close and personal. Participants should dress for outdoor weather.

There is no fee to attend, and lunch is provided. Act 48 credits will be available.

To register, please visit www.pplprojectearth.com and click on "TEA Workshops." For more information, contact PPL at 570-251-6196.

Tracking Martins Creek's peregrine chicks

What could possess someone to take an elevator ride up the side of a 600-foot power plant stack? The chance to get a rare glimpse of the peregrine falcon chicks nesting at PPL's Martins Creek.

This past June, about 17 birding enthusiasts — representing PPL, the Pennsylvania Game Commission and local wildlife groups — gathered to watch as the Game Commission banded the chicks.

Sensing the extra activity, the parents flew around the stack, keeping wary eyes on the latest visitors.

Because the chicks were too young to fly, their exit was blocked with a broom so they wouldn't attempt to jump down from their 350-foot-high nest while being removed from the nest.

"This is a rare opportunity to be able to see such magnificent birds," said John DePalma, instrument man. "In a couple of weeks, they'll be flying so it will be hard to keep track of them."

Game Commission officials quickly grabbed the three chicks and put them in mesh bags to weigh them. An unhatched egg

also was taken out of the nest so it could be analyzed.

Art McMorris, peregrine program coordinator for the Game Commission, carefully took each bird out of its bag and gave it a thorough checkup. He determined that there is one male and two females and that they are all in excellent health.

The chicks got a small band placed on their leg to help the Game Commission track them. The male put up a bit of a fight while being tagged, but the struggle didn't faze McMorris.

"I've been pecked and clawed by birds of all sizes," McMorris said. "It's just part of the job."

McMorris worked quickly to tag all the chicks to minimize any stress from the activity.

When he finished, the nesting box was opened again and the chicks were placed back inside. McMorris tossed in a small quail for their troubles.

Supporting communities

PPL is dedicated to strengthening the communities near our plants.

The company recently donated \$1,500 to the Victorian Days Committee of Belvidere, N.J., to help sponsor the town's 20th annual Victorian Days festival, which celebrates the bygone era with antique shows, house tours, garden parties and more.

In addition, the Belvidere Public Library received \$4,000 for computer upgrades and the Belvidere Youth Athletic Association received \$4,000.

PPL also donated \$4,000 to the Harmony Township Athletic Association and \$2,500 to the Harmony Township Historical Society.



Two of the chicks huddle together after being returned to their nest.

Nature enthusiasts flocking to preserve's programs

Whether they want to learn about high-flying birds or slow and steady turtles, more and more people are turning to PPL's Martins Creek Environmental Preserve.

More than 430 people have attended environmental education programs at the preserve during the past year. In addition, hundreds of

students have gotten an inside look at how PPL generates electricity during tours of the power plant.

"PPL takes its commitment to the environment very seriously and that includes educating the public about the area's wildlife and habitats," said John Drabic, who helps lead many of the preserve's environmental programs. "Whether it's spotting a peregrine falcon, doing a wildflower walk or learning to identify all the animal tracks on the preserve, our educational

programs offer something for everyone."

Working with local environmentalists, the Pennsylvania Game Commission and a number of organizations, PPL's naturalists and educational staff plan a full roster of programs every quarter.

For a list of upcoming programs, check out the final page of this newsletter.

PPL Martins Creek
6605 Foul Rift Road
Bangor, PA 18013-4857

Explore fall programs at learning center

PPL's Martins Creek Environmental Preserve offers educational and fun programs throughout the year. Below is a sampling of the programs planned for the fall:

Winged Wildlife - Backyard Bird Feeding

1:30-3 p.m.

Sunday, Oct. 7

Bird feeding can benefit birds and also provide great bird-watching in your own backyard. Find out how easy it is to make your own bird feeder at home while learning some tips for safely attracting and feeding birds. Dress for the outdoors.

Geocaching the Tekening Trails

1:30-3 p.m.

Sunday, Oct. 28

See what treasures await you when you join "Hiking Jane" Frye on a geocaching adventure and hike on the Tekening Trails. Bring a small trinket to trade and a Global Positioning System unit if you have one. There will be some GPS units available to borrow.

Christmas Bird Count

7 a.m.

Sunday, Dec. 30

Join us for some pre-dawn owling if you don't mind the dark or meet us after daybreak to observe songbirds, shorebirds, raptors and waterfowl. Bring binoculars and a field guide to help catalog the

number of birds and different species seen throughout the variety of different habitats. Dress for the weather and wear comfortable hiking shoes.

All programs are free and will be held at the Cedars Pavilion on Foul Rift Road. Registration is required.

For more information about the programs PPL is offering this fall and to register, contact us at 570-251-6196 or pplpreserves@pplweb.com.

PPL provides these programs as part of PPL Project Earth, an initiative through which the company educates the public about energy resources and the environment. For more information, visit www.pplprojectearth.com.