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Chestnut trees take root in 2 Morris townships

Pilot program trying to raise blight-resistant cross

By Michael Daigle

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Saving the American chestnut tree is not for those in a hurry.

It takes at least six generations -- 50 years or so -- in order to produce a crossbred tree that can be resistant to the fungus that took hold in the late 19th century and decimated the vast chestnut stands that reached from Maine to Florida and west to the Ohio Valley, said Rob Summersgill, New Jersey spokesman for the American Chestnut Foundation.

Summersgill updated the Morris County Park Commission this week on the progress of two pilot programs to grow chestnut trees in Mount Paul Memorial Park in Chester Township and Schooley's Mountain Park in Washington Township.

He said the crossbred trees are combinations of American and Chinese chestnuts. The Chinese chestnut has developed a natural resistance to the chestnut blight, which researchers are trying to breed into the American chestnut, Summersgill said. They will never be able to get rid of the blight, he said. The fungus that causes the blight rests underneath the tree's bark and circles the tree, eventually killing it, he said. The Pennsylvania chapter maintains 150 chestnut orchards and has planted more than 32,000 trees.

New Jersey has 64 orchards with 2,954 trees, he said.

The American chestnut was a tree that provided food for animals and humans, and was used in a variety of products, including furniture, floors, instruments and telephone poles. It is lighter than other woods such as oak and is rot resistant.

At its peak range, about one-fourth of the hardwood forest that covered 200 million acres, including parts of New Jersey, was chestnut trees.

Chestnut blight first appeared in 1904 in New York City. By 1950, almost 4 billion trees were dead.

The trees in Schooley's Mountain are doing better than those in Mount Paul, Summersgill said.

In 2005, 20 chestnut trees were planted on Schooley's Mountain, and most have survived.

Chestnut seeds were planted at Mount Paul.

He said it appears that the soil in the Washington Township park is more acidic, which is preferred by chestnut trees. Also, the park is hillier and rockier, a landscape the chestnut always found more

suitable, he said.

The biggest challenge at both locations is white tail deer, he said. The park commission has used tubes to protect the young trees, but deer have damaged several just the same.

Charles Zafonte, horticulture manager for the park commission, said they were turned down last year for a grant for fencing.

At Schooley's Mountain they would need to fence in a 100-by-200-foot area at a cost of about \$8,000, Zafonte said. The commission can reapply for that grant, he said.

The other challenge, Summersgill said, is that the seeds have to be hand-pollinated in June and July, which is a time-consuming task. The nuts are collected in September.

It takes four crosses between the Chinese and American chestnuts to create a variety that exhibits blight resistance, he said.

Each cross takes eight years to mature to the point that the next one can occur.
