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From the Director

In this issue of the Louisiana *Nature Magazine* insert, we feature trees. I hope you enjoy reading about a new program we are bringing to our state that restores and infuses more trees into cities affected by recent storms.

We also share how applying "good fire" to longleaf pine woodlands is welcoming back an impressive array of native plants. Regardless of whether they are downtown or at one of our nature preserves, trees benefit our environment and our personal health. Thanks for supporting our efforts to conserve and expand tree cover in Louisiana.

See you out there!

Karen Gautreaux,
Louisiana State Director

DONATIONS:
Go to **nature.org/louisiana** to donate. Or you can email **lafo@tnc.org** for more information.

Abita Creek Flatwoods Preserve in St. Tammany Parish after this season's burn © TNC/Will deGravelles

TREES TO THE RESCUE!

A growing national program branches out into Louisiana.

Thanks to a three-year grant from the USDA Forest Service, The Nature Conservancy is launching Treesilience in Louisiana. An offshoot of TNC's national initiative, the Louisiana Treesilience Program (LTP) is funded with generous support from the USDA Forest Service, in collaboration with the Louisiana Department of Agriculture and Forestry, for restoring and expanding community forests located in cities and towns in southeastern and southwestern Louisiana hit hardest by the 2020 and 2021 storm seasons. Scientists predict that such storms will be more frequent and intense with our planet's rapidly changing climate.

Through the LTP, TNC is working with local governments, non-profit organizations and community groups to identify areas of greatest need for creating or rebuilding resilient tree canopies by removing dead/dying/dangerous trees and planting native tree species to provide benefits such as shade, beauty and wildlife habitat. In addition to local expertise, TNC is tapping into tried-and-true scientific approaches to inventorying tree canopies on the ground and through aerial imagery and remote sensing to inform decision-making.

Together with our partners, TNC is also working with local communities to create or revise forest management plans, and choosing tree species known to be most effective in standing up to increasingly harsh weather and thriving in densely populated environments. Most of the work will occur on public lands, although private lands are eligible for assistance if the outcome will provide a public benefit. At the conclusion of the three-year cycle, TNC hopes to expand this effort statewide (and beyond hurricane affected areas) if a more permanent funding stream can be secured.

Georgia Tickseed (top), Night-Blooming Wild Petunia (bottom) and Whitetop Sedge (right) © TNC/Will deGravelles

GOOD FIRE

Rare plants respond to recent targeted burning

Like the tale of the mythical phoenix emerging from the ashes renewed, an impressive array of plants responded in a similar fashion after our Nature Conservancy staff and partners delivered fire to 2,022 acres last spring. These seasonal burns—conducted during late winter through late spring to mimic historic fire patterns—maintain the region's native longleaf pine woodlands and stimulate flowering and seeding for many of the hundreds of plant species making up this open savanna system.

Within weeks of prescribed burning at TNC's Abita Creek Flatwoods as well as at Talisheek and CC Road preserves in Allen and St. Tammany parishes, a collection of night-blooming wild petunia (*Ruellia noctiflora*) was observed for the first time in years. Pollinated by Sphinx moths, this state-rare and globally vulnerable plant shows off its ghostly white flowers only on a single night before they shrivel and drop the next day.

In addition to the rare petunia, Louisiana's only known protected population of Georgia tickseed (*Coreopsis nudata*) demonstrated the outcomes of beneficial fire with an impressive showing of bright purple-pink flowers. Other rare plant species that responded within a month of the burns included parrot pitcher plant (*Sarracenia psittacina*) and pale grass pink orchid (*Calapogon pallidus*). And while less showy and not considered rare, a number of sedges and warm-season grasses greatly benefited from a dose of "good fire." These plants, like Little bluestem (*Schizachyrium scoparium*), Whitetop Sedge (*Rhyncospora latifolia*) and Gulf Muhlygrass (*Muhlenbergia expansa*), form the foundation of these savannas and serve as a strong indicator of the ecosystem's health.

Prescribed fire is an indefinitely recurring management need and practice that reaps incredible rewards for biodiversity. Next winter and spring, TNC intends to oversee more prescribed fires on another 3,000 acres. Some of these will occur in different portions of the same preserves, and also at Persimmon Gully Preserve (Calcasieu Parish) and Ft. Polk Buffer Preserve (Vernon Parish).

5.9%

Amount of the original 90 million-acre remaining native longleaf pine forest in the southeastern United States.

America's Longleaf Restoration Alliance

Like Kites to Smoke

Swallow-tailed kite © Mac Stone

When a local bird researcher brought attention to a swallow-tailed kite nest located not far from a prescribed burn unit at The Nature Conservancy's Abita Creek Flatwoods Preserve, TNC Fire Manager Bill Rivers couldn't help but feel like they must be doing something right.

For millennia, these striking birds have learned that in addition to sustaining the openness of longleaf pine savanna, these seasonal fires force grasshoppers and other insects—a favorite menu item in their diet—out of the grasses that dominate the savanna understory.

According to Rivers, during TNC's prescribed burns the birds are attracted to the smoke and then proceed to float as close as they can to safely monitor what's happening on the ground, always looking for insects fleeing the fire. He says, "They wouldn't be nesting in these areas if the habitat wasn't 'right.' It's a great sign."

The Nature Conservancy

The Nature Conservancy
P.O. Box 4125
Baton Rouge, LA 70821

Louisiana
lafo@tnc.org
nature.org/louisiana

@natureconservancylouisiana
@nature_louisiana
@naturelouisiana