



North Carolina's
Wildest Landscape

written and photographed by Todd Pusser

Take a look at the Albemarle Peninsula, where wildlife from bears to bobcats to tundra swans and rattlesnakes all find a home.



Heat from the summer sun shimmered off the dusty gravel of Milltail Road in the heart of Alligator River National Wildlife Refuge. Pulsating songs of cicadas echoed through the thick pocosin as I slowly drove my truck down a long, straight dirt road bordered on each side by large soybean fields and a shallow irrigation canal. My good friend in the passenger seat, biologist Jeff Beane, raised his hand and quietly motioned for me to stop the vehicle as a small covey of quail walked out onto the road. Realizing our good fortune at sighting this declining species, we settled back into our seats with binoculars in hand watching the milling birds.

Suddenly, motion in the tall grass just off the road beyond the quail caught our attention. Adjusting the focus of my binoculars, the distinctive pointed ears and cheek ruffs of a bobcat appeared in my field of view. The feline, oblivious to our truck 50 yards away, intently stalked the birds walking down the dirt road. The quail, perhaps sensing danger, abruptly flushed from the ground in an explosion of wings and motion leaving the bobcat literally in the dust. The cat, looking somewhat perturbed, nonchalantly walked across the road in front of our truck and jumped onto a fallen tree that was lying across the irrigation canal. It slowly walked the length of the log, across the tannin-stained water, sat down on the edge of the canal, and quietly began grooming itself under the shade of a low-hanging tree. Astonished, we sat transfixed, watching it lick its luxurious coat from just yards away. The bobcat occasionally glanced our way as it continued to groom, barely acknowledging our presence and providing the longest looks either Jeff or I have ever had of this secretive predator in the wild.

Such are the joys when one explores the vast area known as the Albemarle Peninsula in the Coastal Plain. On any given day in this rural region, there is no telling what you may encounter—perhaps an American alligator, basking on the edge of a sunny creek bank at the northern limit of its natural range, or

maybe a beautifully patterned corn snake, scales awash in brilliant shades of orange, slowly crawling across a dirt road at sunset, or the incredible sight of thousands of snow geese flying over a bright winter's moon.

Sandwiched between the Albemarle Sound to the north and the Pamlico Sound to the south, the Albemarle Peninsula is made up of five counties (Beaufort, Dare, Hyde, Tyrrell and Washington) and encompasses a vast area of nearly 3,200 square miles. The rural towns that dot the peninsula are rich with history. One, the small town of Bath, nestled in the southwest corner of the peninsula in Beaufort County, is North Carolina's oldest town. Incorporated in 1705, Bath also served as our state's first capital until 1722. However, it is the region's wealth of natural history that makes it unique.

When viewed from a car window racing 60 mph down U.S. 64 toward the beaches of the Outer Banks, as most North Carolinians experience the peninsula, the flat, low-lying landscape might appear as nothing more than a monotonous patchwork of marshland and expansive agriculture fields. Indeed, while most of the peninsula forests have been logged extensively over the last century and converted to farm fields, tens of thousands of acres remain protected by four national wildlife refuges, two state parks, numerous Wildlife Commission game lands

and Nature Conservancy properties. The peninsula harbors many natural freshwater lakes—rarities in the state. The largest, Lake Mattamuskeet, is approximately 18 miles long, 6 miles wide and covers nearly 40,000 acres.

Three of North Carolina's largest rivers—the Alligator, Roanoke and Tar rivers—reach their termini here, emptying into the vast Pamlico and Albemarle Sounds and creating one of the most important and productive estuaries in the eastern United States. Smaller, blackwater creeks and rivers, such as the Scuppernong, meander throughout the peninsula. Given all these unique and diverse natural communities, it is no surprise that this immense region provides wildlife viewing opportunities unlike any other place in the state.

Wildlife in All Seasons

No matter the time of year, the Albemarle Peninsula offers much for the outdoor enthusiast, whether you are a kayaker, fisherman, hunter, photographer, hiker or birder. For wildlife watchers there are no shortage of subjects to enjoy.

The thick, impenetrable pocosin forests scattered throughout the peninsula harbor the highest density of black bears anywhere in the eastern United States. It is not uncommon to see more than a dozen bears in a single day in the vast soybean and corn fields of Alligator River National Wildlife Refuge or Pocosin Lakes National Wildlife Refuge. The bears are active year-round and can be observed on blustery, snowy winter days or the hot, humid days of summer, when the air seems so thick you can cut it with a knife.

The Albemarle Peninsula is the only region in the world that supports a population of wild, free-roaming red wolves. This endangered canid was once extinct in the wild. Only through dedicated captive breeding programs was the species able to survive. In 1987, the Fish and Wildlife Service successfully re-introduced red wolves into Alligator River National Wildlife Refuge, eight years before the better-known introduction of gray wolves into Yellowstone National Park. Today, an estimated 90–110 individuals range throughout the peninsula's 3,200 square miles. Though sightings are rare,

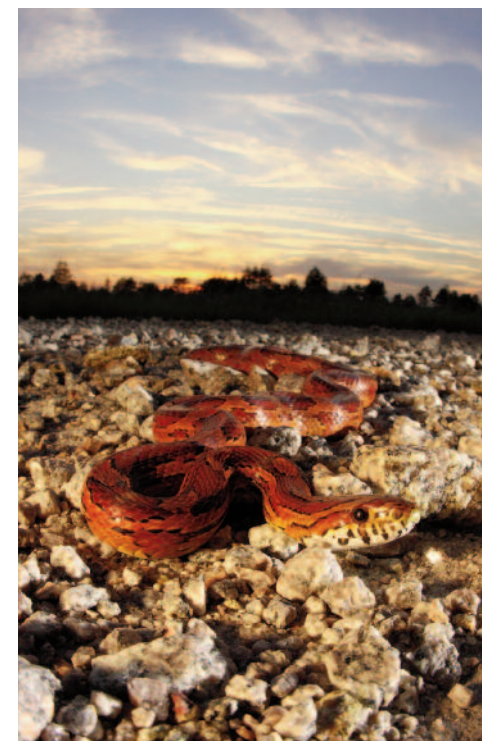
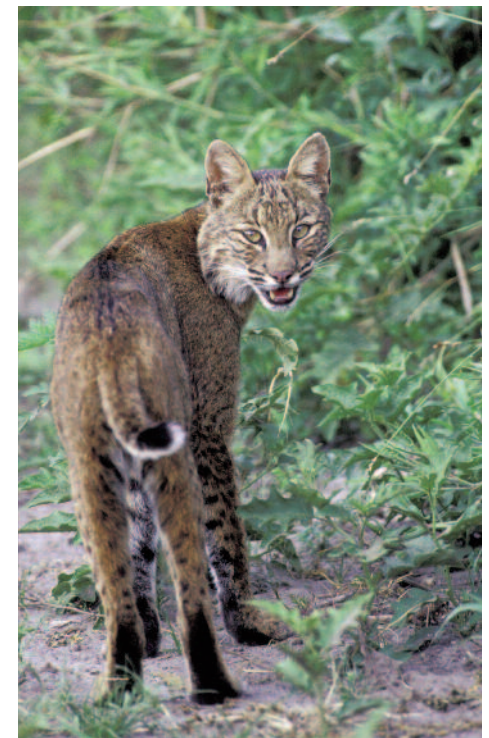
I have seen red wolves more than a dozen times over the years, often from the major highways that transect the region. Recently, my girlfriend and I watched a pair, including one animal with a radio-collar, walking slowly across a vast soybean field along N.C. 94 south of Columbia.

During the winter months, huge flocks of tundra swans and snow geese, sometimes numbering into the tens of thousands, gather in corn and soybean fields around Pungo Lake and Lake Mattamuskeet, providing what many call the greatest wildlife spectacle in the state. Red-winged blackbirds and grackles also winter in those same fields, sometimes in flocks so large they block out the sky.

Birds of prey are abundant throughout this region. Merlins, sharp-shinned hawks and Northern harriers stalk the agriculture fields, hunting the vast blackbird flocks. Bald eagles are seen nearly everywhere there is water, especially around Lake Mattamuskeet. During winter, when leaves are off the trees, the silhouettes of great horned owls are frequently observed in the fading twilight of dusk, perched along road rights-of-ways and the edges of fields.

Spring is my favorite season to visit the Albemarle Peninsula. The region explodes with activity as the dreary, cold days of winter come to an end. The songs of brilliantly colored migratory songbirds, such as prothonotary and prairie warblers, reverberate through the forests. Families of river otters play in irrigation canals that border large fields. Numerous painted turtles and yellow-bellied sliders crowd submerged logs in shallow waterways, soaking up the warmth of the sun. Snakes, including rare species such as the timber rattlesnake and glossy crayfish snake, emerge from their winter hibernacula and are commonly seen crossing roads throughout the peninsula. Once in April, I watched a barred owl repeatedly swoop down from its perch in a dead tree to the waters of a shallow canal to catch crayfish, which it readily consumed just yards away from my vantage point.

Thistles, prickly and drab looking most of the year, are common along the edges of dirt roads in the region's wildlife refuges. They burst with color as they bloom in May, providing a tempting nectar resource for swallowtail butterflies. It is not uncommon



The Albemarle Peninsula offers the best wildlife viewing of any area of the state, no matter the time of year. Depending on the season, bobcats, corn snakes and tundra swans can all be seen in this vast rural area.



Why Do Bobcats Have Tufts On Their Ears?
See Nature's Ways, page 43.



A full moon rises over a patch of forest killed by prolonged exposure to salt water along Hwy 264 near Stumpy Point. A playful gray fox rolls around on a dirt road while a black swallowtail gathers nectar from flowers of a thistle (opposite page). Barred owls hunt crayfish and families of river otters gather in productive waters throughout the peninsula.

to see a dozen or more of these colorful insects clustered on a single plant, black and yellow wings spread wide. Numerous other spectacular flowers, such as water lilies, blue-flag iris, and pickerel weed, also reach their peak bloom during this time of year.

Even during the long, humid days of summer, there is much to see, providing you can withstand the onslaught of biting flies and mosquitoes that swarm you the instant you step out of your vehicle. It is during these months that black bears, especially females with cubs, are most easily seen. Milltail Road in Alligator River National Wildlife Refuge and North Lake Drive in Pocosin Lakes National Wildlife Refuge provide excellent opportunities to observe bears foraging in soybean fields from the safety and comfort of your automobile.

The long, straight dirt roads that stretch for miles and miles through areas of dense forest and vast agriculture fields in the wildlife refuges act as super-highways for all manner of creatures. Gray foxes, deer, turkeys, and red wolves use the roads to hunt for prey, mark territories, and search for mates. The bobcat, the state's most elusive large predator, can be observed walking refuge dirt roads during all hours of the day.

The cooler days of the fall bring a welcome relief from the biting insects. As the days grow shorter, foliage on the cypress trees that line swamps and waterways, begins to change color to a brilliant red. White-tailed deer become more active and are regularly seen in freshly plowed fields and crossing dirt roads as the rutting season approaches. Many of the regions breeding birds migrate south while other species from more northern climates move into the area to replace them.

An Uncertain Future

Despite its abundance of natural wealth, the Albemarle Peninsula faces an uncertain future. The region's mosaic of forests, vast agriculture fields, cypress swamps, fresh and saltwater marshes are all very low-lying, just a foot or so above sea level, and are considered by many to be among the most vulnerable areas in the United States to an increase in sea levels associated with climate change. Increasing temperatures across the globe indicate that the Earth's climate is



shifting into an extended warming period. These events are nothing new and have occurred periodically throughout our planet's history as indicated by the fossil record. In fact, the entire peninsula was once covered by a shallow sea. However, some scientific models place much of the region back under water in as little as 100 years. While these climate change models may represent worse-case scenarios and are impossible to predict accurately, they cause concern. Any change in global sea levels could potentially cause devastating environmental and economic consequences to the region with farmers and native wildlife feeling the greatest impacts.

While many coastal U.S. communities are engaged in heated debate about the validity of climate change, a progressive and pioneering effort is under way on the Albemarle Peninsula. Collaborators from The Nature Conservancy, the U.S. Fish and Wildlife Service, local universities, and Duke Energy are working diligently to protect this region against any future change in sea level. The Albemarle Climate Change Adaptation Project, as the initiative is called, is a long-term management plan that seeks to maintain the continued health of the peninsula's ecosystem by stabilizing the surrounding land using innovative methods.

With the aid of aerial photography, scientists pinpoint areas along the Albemarle Peninsula most vulnerable to erosion from rising seas and target those specific regions to ensure long-term ecosystem stability. Large oyster beds are being created just offshore from those areas in an effort to suppress erosion from large waves. The

oyster beds also act as a natural filtration system, cleaning the water from sedimentation buildup and creating habitat for other aquatic species.

Over 100 years ago, miles upon miles of irrigation canals were dug throughout the Albemarle Peninsula for agricultural purposes. During major storms such as hurricanes, salt water from the surrounding sounds gets pushed far inland up these canals, killing trees that are unable to cope with the increase in salinity in the water table and causing degradation to peat deposits so prevalent on the peninsula. Water control structures are now being placed in canals at strategic locations around the peninsula in an effort to restore a more natural hydrology and increase wetland habitat. Thousands of salt-tolerant trees, such as bald cypress and black gum, have been planted along shoreline most vulnerable to erosion in an effort to make the land more stable. Invasive plants are being removed and in their place more resilient native marsh grasses are being planted.

What the Albemarle Peninsula will look like 200 years from now is anybody's guess. It is certain that the present shoreline will not be the same. Portions of it could be under water. Change has been an eternal constant for these low-lying areas. Hopefully, with continued dedicated efforts to prepare for potential sea level rise, this unique region of North Carolina, with all its incredible diversity of wildlife, will continue to enthrall Tar Heels for many generations to come. ♡

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