

by Mike Phillips

A Private Effort to Conserve Biological Diversity



The large Vermejo Park Ranch in New Mexico and Colorado protects a wide range of ecosystems from short-grass prairie to alpine habitats.
Turner Endangered Species Fund photo

I first met Ted Turner in the spring of 1995 when he visited Yellowstone National Park, where I was working with the National Park Service on the gray wolf (*Canis lupus*) reintroduction program. During the day, we discussed the world's woes. It quickly became apparent he believed that, among the world's many problems, the accelerating loss of biological diversity ranked near the top of the list. His concern, based on the realization that thousands of native species and their attendant ecological interactions disappear at the hand of humankind every year, was that this problem would eventually have profound and negative consequences for all of us. He expressed frustration over this trend which, as the wolf project illustrates, is often reversible.

Later, after conferring with his son Beau and other family members who are equally concerned about biodiversity loss, Ted realized that his active involvement in the conservation of imperiled species could improve the recovery prospects for many imperiled plants and animals. As the owner of more than 1.7 million acres (0.7 million hectares), he could help show that coexistence between landowners and endangered species is possible under the Endangered Species Act. In 1997, this interest prompted the family to form the Turner Endangered Species Fund (TESF) and Turner Biodiversity Divisions (TBD). I agreed to come on board as Executive Director of the TESF.

The TESF and TBD are dedicated to conserving biological diversity by ensuring the survival of imperiled

species and their habitats, with an emphasis on private actions. We concentrate on carnivores, grasslands, plant-pollinator complexes, species with historic ranges that include Turner properties, and dissemination of credible scientific and policy information about biodiversity conservation. Our projects, which are based on the principles of conservation biology, involve state and federal agencies, universities, non-governmental organizations, and private citizens. We operate on the belief that wrapping many minds around a problem is a certain route to success. Whether we seek to manage extant populations or restore extirpated populations, the ultimate goal is population survival with minimal management. We believe that self-sustaining populations of native species



Grizzly bears are among the rare animals welcome at the Flying D Ranch in Montana.

Corel Corp. photo

indicate a healthy or at least a recovering landscape.

The TESH is recognized by the Internal Revenue Service as a non-profit, private operational charity. Such recognition provides a tax-exemption as long as TESH funds are used solely for projects involving species that are considered threatened or endangered by a state or by the federal government. In contrast to the Turner Foundation, which provides grants, the TESH helps to conceive, design, and implement field projects. The TBD operates under the auspices of Turner Enterprises, Inc., and was formed to focus on vulnerable species (and their habitats) that are not listed as threatened or endangered.

Since our inception in 1997, the TESH and TBD have:

- developed contracts or formal relationships with two federal agencies, five state agencies, six universities, and 18 non-governmental organizations;
- built a staff of 13 biologists, a veterinarian, and a veterinarian technologist;
- been involved in more than 23 projects, including reintroduction efforts for plants, birds, fishes, and mammals;
- begun connecting several Turner properties to large-scale reserve design efforts;
- accepted several appointments to recovery teams, advisory teams, and World Conservation Union (IUCN) Species Survival Commission specialist groups; and
- begun publishing popular and technical articles about biodiversity conservation.

Although our fieldwork emphasizes Turner properties, we are eager to participate on projects with benefits that transcend Turner property boundaries. Several of our efforts dovetail nicely with well-known large-scale reserve design initiatives:

Yellowstone to Yukon Reserve Design and the Flying D Ranch

The Flying D Ranch encompasses 113,000 acres (45,730 ha) in southwestern Montana. As the largest tract of private land in the Greater Yellowstone Ecosystem, the “D” is one of best known ranches in the west. Integrating the D in the mix of lands available to large carnivores and using the field skills of the TESH will greatly advance carnivore conservation, which is a central feature of the Yellowstone-to-Yukon (Y2Y) Conservation Initiative. The Y2Y project, sponsored by a network of over 80 organizations, institutions, and foundations in the U.S. and Canada, seeks to stitch together some 1,800 miles (2,900 kilometers) of North America’s most celebrated mountains in a series of protected reserves, wildlife corridors, and transition zones.

Upon its purchase, Mr. Turner donated a conservation easement on the D to The Nature Conservancy. The



Gray wolf
Corel Corp. photo

ranch is dominated by montane rangeland and spruce forests, and it shares a border with the Lee Metcalf Wilderness of the Gallatin National Forest. Maintaining the health of the resident elk (*Cervus elaphus*) herd is an important management objective for the ranch. In collaboration with the Montana Department of Fish, Wildlife, and Parks, the ranch fosters elk that provide recreation to hunters who use adjacent public land throughout the elk season and to hunters who participate in the D's own late-season elk cow hunt.

Grizzly bears (*Ursus arctos*) and wolverine (*Gulo gulo*) have been sighted on the D. During the winter of 1998-1999, TESH biologists also observed one wolf and detected wolf tracks on three other occasions. Large carnivores are welcome on the D. Recently, the TESH began assisting the U.S. Fish and Wildlife Service with monitoring gray wolves that settle the public/private land interface in the northwest corner of the Greater Yellowstone Ecosystem and developing aversive conditioning techniques to reduce livestock depredations.

Southern Rockies Ecosystem Project and the Vermejo Park Ranch

The Vermejo Park Ranch in New Mexico and Colorado encompasses more than 580,000 acres (235,000 ha) along the southeastern border of the Southern Rockies Ecosystem Project.¹ Elevations at the Vermejo reach from 6,000 to 12,000 feet (1,830 to 3,660 meters). Because of this elevational range, myriad ecotypes can be found on the Vermejo, including short-grass prairie, pinyon-juniper woodlands, ponderosa pine forests, mixed conifer stands, spruce-fir forests, and alpine habitats.

Like all Turner properties, the Vermejo is managed to ensure the persistence of native species. If it were ever determined that wolves should be reintroduced into the southern Rocky Mountains, then the Vermejo would provide the TESH a great opportunity to advance wolf recovery, a central feature of the Southern Rockies Ecosystem Project. Without doubt, the Vermejo could support a self-sustaining population of wolves. (*Editor's note: The Fish and Wildlife Service plans to continue to focus its gray wolf recovery efforts in the northwestern United States to Wyoming, Idaho, and Montana. For the Mexican wolf, our recovery efforts remain focused on Arizona and New Mexico. In the midwest states, the Service's gray wolf recovery program is nearly complete, and we are evaluating the northeastern U.S. for its wolf recovery potential as well.*)

To fully appreciate the Vermejo's potential for wolf recovery, it is useful to note that:

- the ranch is five times larger than Isle Royale, Michigan, which has supported a wolf population since the late 1940s;
- the density of the Vermejo's elk herd compares favorably with the density

¹The Southern Rockies Ecosystem Project is a network of organizations established to restore and protect the ecological integrity of the southern Rocky Mountains in south-central Wyoming, western Colorado, and north-central New Mexico.

of Yellowstone's northern range elk herd, which supports the densest and arguably the healthiest wolf population ever studied (health being measured by body weights and reproductive performance);

- poaching and accidental human-induced mortalities (e.g. collisions with vehicles) would be virtually non-existent because access to the ranch is strictly controlled; and
- the ranch is well within dispersal range of public land that contains suitable wolf habitat (e.g. the San Juan National Forest).

Sky Islands Wildlands Network and the Armendaris and Ladder Ranches

Ted Turner owns two other large properties in New Mexico: 1) the Armendaris Ranch, consisting of more than 335,000 acres (135,600 ha) of Chihuahuan Desert grasslands and desert scrub, riparian habitats along the Rio Grande and the Fra Cristobal Mountains, and 2) the Ladder Ranch, containing more than 250,000 acres (101,200 ha) of mixed desert grassland, riparian areas, pinyon-juniper stands, and mixed-pine forests. Both ranches are situated along the north-eastern edge of the Sky Islands Wildlands Network.² The emphasis of these ranches is on native species

²The Sky Islands Wildlands Network is an ecological preserve system proposed by environmental organizations in the U.S. and Mexico. It would restore and protect "islands" of mountain habitats in the region stretching from the Mogollon Rim in east-central Arizona and west-central New Mexico to the northern Sierra Madre Occidental in Chihuahua and Sonora, Mexico.

conservation, and their diverse habitats, elevational range, large size, and proximity to public land ensure that they will always figure prominently in large-scale reserve design efforts within the region.

The Sky Islands Wildlands Network emphasizes the restoration of carnivores, and efforts at the Ladder Ranch contribute mightily to this end. For example, at the Ladder we maintain a captive breeding facility for Mexican wolves (*Canis lupus baileyi*) for release to the wild by the Fish and Wildlife Service. Additionally, the TESH fully supports the reintroduction of Mexican wolves into the Gila National Forest, hopefully on the Ladder's allotments, and has offered the services of a biological technician to assist with radio-tracking. Finally, the Ladder's management team greatly improved the suitability of the region for large carnivores by developing an agreement with the U.S. Forest Service for removing livestock from the Ladder Ranch's two grazing allotments, which cover 65,000 acres (26,300 ha) in the Gila's Aldo Leopold Wilderness.

The TESH enjoys a close working relationship with the Fish and Wildlife Service on many efforts to conserve imperiled species. Our collaborative project to restore red-cockaded woodpeckers (*Picoides borealis*) to Ted Turner's Avalon Plantation in Florida is highlighted in the following article. A meeting between the TESH and the Service's senior staff in Washington, D.C., resulted in the decision to develop a Memorandum of Understanding to

ensure that collaborative wildlife conservation efforts will continue.

The TESH and TBD have made good progress conserving native species since 1997. However, we realize that much work remains if we are to establish our efforts as a continuing force and to properly integrate Turner properties into large-scale conservation reserve design efforts. We recognize that these tasks will be difficult because emphasizing private stewardship of biodiversity is still a fairly recent approach, the problems are complex, and effective solutions require broad-based socio-political, geographic, and fiscal considerations. The difficulty of the tasks, however, does not diminish our resolve, which is based on the belief that any real solution to the extinction crisis will rely on the genius and determination of all humankind.

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The Armendaris Ranch in New Mexico

Turner Endangered Species Fund photo