

# MONTANA'S TROPHY TREES

BY JAMES HAGENGRUBER  
PHOTOGRAPHY BY TOM BAUER

**I**MAGINE BACKPACKING in the Beartooths without being able to pitch a tent in a grove of tall firs, paddling the Yellowstone with no audience of majestic cottonwoods, or taking a Bitterroot Valley hike on a fall afternoon without passing through a mature stand of golden-leaved aspen.

Like waterfalls, royal elk, and rare wildflowers, giant trees add magic to the state's outdoors.

Finding and honoring the grandest of these forest monarchs is the goal of several tree proponents who have located and recorded the largest of each of Montana's 40-some tree species in a champion tree registry. The species range from a western red cedar stout enough that it would require six adults to wrap their arms around its base, to a western serviceberry with a trunk no wider than your wrist.

**HIGH CHAIR:** Dwarfed by his stump seat, retired state forester Mark Lewing sits on the Montana champion plains cottonwood, in Ravalli County.



Records of the nation's largest trees have been kept since 1940 by American Forests, a nonprofit conservation group. Helen Smith, a fire ecologist at the U.S. Forest Service Fire Science Laboratory in Missoula, maintains the organization's champion tree list for Montana. Smith is also co-discoverer of the 153-foot-tall western larch, one of the state's two national champions.

"They're awe-inspiring," Smith says of champion trees. "When you're standing at the base of one, to think that it survived 1,000 years or longer, it's very humbling."

Champion trees are sized on a point system that combines circumference, diameter, height, and crown spread. Montana's highest-scoring tree, a western red cedar, racked up 555 points. The national champ, a coast redwood in California that has an 85-foot circumference and rises 369 feet from the ground, tops out at 1,312 points. Montana's smallest biggest tree, a western serviceberry with a 10-inch circumference, has just 28 points.

Montana's other national champion tree, though yet to be officially recognized as such, sprouted decades ago in the Kootenai National Forest. It is a quaking aspen that stands 142 feet tall and has a trunk diameter of 30 inches.

Hunting and angling is steeped in a tradition of recording the biggest of various fish and wildlife species. States keep records, as do organizations such as the Boone and Crocket Club and the International Game Fish Association. But few people ogle photos of giant mountain hemlock or take a week of vacation to pursue a new record blue elderberry. Tree trophies, it turns out, don't have a big fan base.

In fact, of Montana's 38 state tree records, nearly half were nominated by just three people. And seven species have never been nominated at all (know of, or even heard of, a cascade mountain ash or a Columbia hawthorn?).

Most of Montana's giants live in the soggy northwestern region, the workplace of U.S. Forest Service forest technician Alan Lane, who has registered six records, including the subalpine fir, western white pine, and quaking aspen.

"I found most of them when I was doing stand exams for the Forest Service," he says. "I was running into big trees all the time."

With seven nominations to his name, Martin Flanagan is another titan of Montana's champion tree registry. A rancher, nurseryman, aquaculturist, and former outfitter, Flanagan lives in—where else?—Big Timber, a town named for the giant cottonwoods that line the nearby Yellowstone River. Flanagan believes some of those trees are over 200 years old, which means they would have lined the banks as Capt. William Clark and his crew floated past two centuries ago.

Flanagan is a man obsessed with trees and shrubs. On a wall in his home is a map of the upper Rocky Mountain states, marked with more than two dozen red dots showing the location of champion trees. His yard is thick with trees, and one section is set aside as a sanctuary for rescued lilacs. When an old home in the area is razed, Flanagan tries to dig up any surrounding shrubs. Each bloom is different, he says. Many were carried across the Great Plains in covered wagons and



**LARGE LARCH:** USFS forest ranger Tim Love stands next to America's largest western larch, which grows near Seeley Lake. The tree rises 153 feet from the ground and is 264 inches around at the base.

*James Hagenruber is a journalist who lives in Billings. Photojournalist Tom Bauer lives in Missoula.*

have continued blooming long after dust bowls and depressions have pushed away the people.

“Lilacs, rhubarb, and yellow roses are all that’s left of some of the old places,” Flanagan said. “They’re living pieces of our history.”

Most of the seven state champion records claimed by Flanagan are located in Sweet Grass County and are not what anyone would consider majestic. But they are extraordinary examples of tiny species. The peachleaf willow he nominated three years ago, for example, stands just 20 feet tall. Nonetheless, that specimen would tower over its peers anywhere in Montana.

The champion tree registry is a good way of inspiring people to take an interest in the state’s forests, Flanagan says. It also has the power to highlight some of the state’s lesser-known native species.

Flanagan makes part of his living selling trees native to Montana. He was recently hired to plant Rocky Mountain maple, Rocky Mountain juniper, and Rocky Mountain ash at the National Museum of Forest Service History, a nonprofit, privately owned museum under construction on a 36-acre site near Missoula. These species are “virtually unheard of at nurseries,” says Flanagan, who collects the specimens on public lands near his home.

Flanagan also recently founded the for-profit Montana Champion Tree Project, which aims to not only protect big trees, but to trademark and sell their genetic copies. In August 2001, Flanagan worked with Lane, from the U.S. Forest Service, to cut buds from the state and national champion quaking aspen in northwestern Montana. The buds have been grafted onto aspen stock—much in the same way fruit trees are grafted—and are being grown at an Oregon nursery. Flanagan hopes to begin selling the young champions soon.

Flanagan knows that the environment plays a strong role in the health of any organism, but he also believes in the power of good genes. Just as ranchers use the best bulls to improve their herd, Flanagan believes his champion tree clones will grow taller and stronger than the average tree.

“In no way can we prove our trees are superior,” Flanagan says. “But common sense tells us they should be.”

Flanagan would like to see more communities establish “living libraries” of champion tree clones, where the specimens could be nurtured by experts and appreciated by the public. “The trees, they’re our only living link to our ancient past,” Flanagan says. “We need to preserve that link. We’ve got to have these around for our children. That’s what really matters.”

A variety of other cloned species are already on the market. The Michigan-based Champion Tree Project sells cuttings from the nation’s largest trees as trademarked “ChampTrees.” With the permission of federal officials, the group recently tried to clone 4,700-year-old *Methuselah*, a bristlecone pine growing in California’s White Mountains, but the grafted buds didn’t take.

American Forests, publisher of the national champion tree registry, operates a nursery that sells dozens of different historic tree clones. There’s a “Lewis and Clark Cottonwood” tree that harkens from a cottonwood parent at a purported Lewis and Clark campsite near Cutbank, Montana. Genetic copies of the “Harriet Beecher Stowe White Ash” from Ohio and the “Harry S. Truman Silver Maple” from Missouri are also for sale.

Despite the popularity of this trees-as-living-history strategy, not everyone is



**TREE-MENDOUS:** Helen Smith, a USFS fire ecologist who maintains Montana’s champion tree registry, is dwarfed by the state’s record ponderosa pine. The tree stands 194 feet tall and has a trunk circumference of 241 inches.

**LOTS OF SHADE:** Montana's 56-foot-tall champion box elder (right) grows in a front yard south of Corvallis.

**BOTANY LESSON:** Teacher Steve Lewis and his third-graders (far right) line up in front of the state's largest American elm, in Stevensville.



sold on the idea of champion trees begetting champion saplings. Or even that it can work.

"Certainly, there is a genetic component, but I believe that most of it has to do with the environment," says Smith, the keeper of Montana's champion tree registry.

Smith also says that a cloned tree taken out of its unique environment could be susceptible to disease in its new location.

"Through time, trees evolved with insects and diseases," she says. "Trees are hit hardest by diseases they didn't evolve with, like how whitebark pine is now being decimated by the introduced disease blister rust."

Cloning, the ecologist continues, cancels out the benefits of evolution by essentially freezing a tree's genetic structure in time. If the process of natural selection holds true, each new generation of trees should be slightly better adapted to its specific surroundings than the previous generation. A clone, then, has "learned" nothing from its parent tree, because it *is* its parent tree.

Besides, an aspen that grew fat and tall in cool, rainy northwestern Montana might wither and die in the hot, windy environment of the Pryor Mountains. Champion trees are arguably the benefactors of good luck, Smith says. They sprouted in rich soil, had access to consistent moisture, and haven't been felled by fire, lightning, axe, or disease.

There might be rational reasons for recording and preserving the kings of each

tree species. But in Smith's view, the big idea behind the champion tree registry is that trees are part of what she calls the "therapeutic value of wilderness." People want to know that the same trees that provided shade and inspiration to people hundreds or even thousands of years ago are still alive today.

According to Smith, people in some parts of the country actually do spend their vacations tracking down and then viewing champion trees. This can be a relatively easy task back East, where the biggest trees usually live in protected, urban settings.

There, the record-book specimens often receive tender care and plenty of food and water to keep them thriving.

Here in the West, on the other hand, cham-

pion trees are often miles from the nearest road or path. Finding them can take days. And, unlike many of their coddled urban relatives, most of Montana's big trees survived nature's worst to become champions. Many bear the scars of lightning, beetle infestation, and even ice jams. Pretty they are not. Montana's champion western red cedar, for example, sports a 6-foot fire scar on its trunk and is afflicted with patches of rot.

Champion trees can also be the targets of vandalism. A few years ago someone took a chainsaw to a 1,000-year-old redwood in northern California, and in 1989 the famous 150-year-old Treaty Oak in Austin, Texas, was poisoned.

Smith does not advertise the location of Montana's champion trees, for the same reason the federal Bureau of Land

## MONTANA'S ROYAL COURT

Shown here are representations of 25 Montana tree champions, and the nation's tallest tree for comparison. The first number is the tree's height, and the second is total points.

SOURCE: AMERICAN FORESTS





Management doesn't reveal the locations of archaeological sites. "To protect against vandals and looting," she says.

Most of Montana's champions are found in national forests. A few, though, are on private land. According to Mark Lewing, a retired forester for the Montana Department of Natural Resources and Conservation, landowners who learn they have a champion on their property usually take pains to protect it.

Lewing has seven champion trees to his name, including the state's largest plains cottonwood, a grizzled giant growing in Ravalli County, and the champion American elm, which grows on

public school property in Stevensville.

Like other record tree owners, Stevensville school officials are proud of their 82-foot-tall champion, Lewing says. A place in the registry offers no formal protection, but it usually guarantees the tree won't be chopped down.

"Just having it known by the landowner is probably the best protection there is," Lewing says.

The converse is also true. Not long ago, a state champion white willow in Ravalli County was nearly trimmed off the list because the landowner didn't know the tree

was a champion and decided to do some pruning. Luckily, not enough vegetation was removed to drop the 82-footer from the list.

"He could have whacked the thing down," Lewing says. "Now that he knows, he's proud to have it on his land." 🐻

