What's Being Done

Finding solutions

Many agencies and groups, from local to international, are working to solve the problems invasive plants pose for the state's lands. Their work includes:

- Implementing on-the-ground control projects aimed at removing invasive plants.
- Developing policies and practices to limit the spread of invasive plants.
- Advancing awareness of wildland weed problems and solutions.
- Mapping infestations to set priorities and guide planning.
- Working in collaboration with public and private partners to develop programs.
- Researching ecological impacts and effective long-term solutions.

What You Can Do

You can help

Invasive plants are a serious and growing problem, and California's threatened landscapes need all the help they can get. You can prevent the spread of plant invaders and help solve the problems they've already caused. Here are a few suggestions:

- Don't use known invasive plants in gardens or landscaping.
- Learn to identify invasive plants, and who in your area to notify when you see them. (For a list of county weed management groups, see www.cdfa.ca.gov/wma.)
- Volunteer with habitat restoration efforts at local parks and creeks.
- Don't move plants in the wild, especially over long distances.
- Consider becoming a member of Cal-IPC, the California Invasive Plant Council.

Join Cal-IPC

Help protect California's landscapes

The California Invasive Plant Council (Cal-IPC) works to protect California wildlands from invasive plants through research, restoration, and education.

Cal-IPC is a member-driven organization. We need your help to protect California's unique landscapes from the threat of invasive plants. To join, please visit our website or contact us at the address below.

Cal-IPC
California Invasive Plant Council

www.cal-ipc.org

1442-A Walnut Street #462, Berkeley, CA 94709
Phone: 510-843-3902 Email: info@cal-ipc.org

Cover photo: Bull thistle (*Cirsium vulgare*) and other grassland weeds are spreading throughout California, even into Yosemite Valley.

(1) California Natural Diversity Database, California Department of Fish and Game, Natural Heritage Division.
(2) Pimentel, D. L. Lach, R. Zuniga, and D. Morrison. 2000. Environmental and economic costs of nonindigenous species in the United States. *BioScience* 50: 53-65.
(3) Zavaleta, Erika. 2000. Valuing ecosystem services lost to *Tamarix* invasion. In *Invasive Species in a Changing World*. Mooney, Harold A. and Richard J. Hobbs, editors. Island Press, Washington, D.C.

biological pollution:

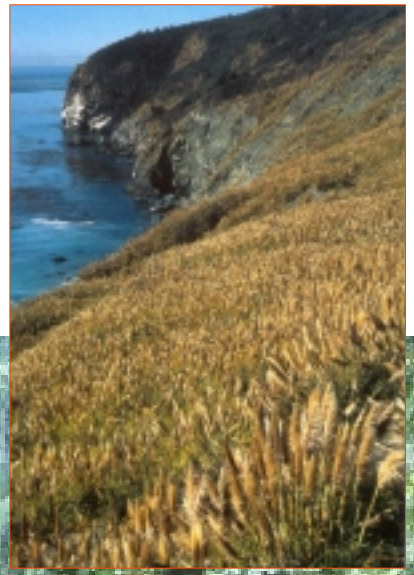
what you should know about invasive plants in California

California's Landscapes

A unique natural heritage

California is home to some of the world's most beautiful and biologically rich landscapes. From redwood forests to oak woodlands, coastal dunes to desert grasslands, these landscapes are home to an astonishing variety of plants and animals. Many of these exist nowhere else on Earth.

Unfortunately, these landscapes are being destroyed by invasive plants. Human development has disturbed nature's processes, and every day, invasive plants degrade more of our treasured natural heritage.



Invasive Plants

What are invasive plants?

When plants that evolved in one region of the globe are moved to another region, a few of them flourish in the wild, crowding out native vegetation. These invasive plants have a competitive advantage because they are no longer controlled by their natural predators, and they can quickly spread out of control.

How do they get here?

Shipping, international travel, and the aquarium and horticultural trades are major routes of introduction.

How do they spread?

- Fragments break off and regrow
- Birds or mammals carry seeds
- Seeds are blown by the wind
- Clothing and vehicles spread seeds

In addition, some invasives are still used in landscaping.

Top: Pampas grass (*Cortaderia* sp.) crowds out native coastal vegetation. Bottom: English ivy (*Hedera helix*) smothers the understory in a redwood forest.

The Danger

Threatened wildlife

Invasive plants rob sunlight, nutrients, and water from native plants, which wild animals depend on. Invasives impact at least half the species federally listed as threatened or endangered. In California, 181 rare and endangered species are threatened by invasive plants (1).

Degraded rangeland and cropland

Invasive plants crowd out crops and the plants that range animals normally feed on. These invaders can be low in nutrition or even toxic to sheep and cattle. Invasion can cause land values to plummet, and eradication is costly. Nationwide, invasive weeds in pastures and farmland cost an estimated $33 billion per year (2).

Diminished outdoor recreation

Invasive plants can blanket waterways, trails, and scenic landscapes, making boating, hiking and biking difficult, and lowering the land's value for photography and wildlife viewing. By stressing wildlife, they make hunting and fishing less rewarding or even impossible.

Increased wildfire potential

Some invasive plants are far more susceptible to wildfires than native plants. When areas that are not adapted to wildfires are invaded by these plants, fires can be catastrophic. It can take decades for towns and wildlands to recover from these dangerous, costly fires.

Reduced water resources

Some invasive plants consume enormous quantities of water. This water is lost to wildlife, farms, boaters, and urban dwellers, at a high price. Tamarisk trees alone will cost $7 to $16 billion over the next half-century (3).

Accelerated erosion and flooding

When invasive plants displace native plants from streamsides and wetlands, the entire balance of the waterway can be disrupted, increasing the likelihood of flooding and erosion. In a vicious cycle, erosion can worsen conditions for natives and increase invasion.