

O'ahu Invasive Species Committee

Priority Target Species



Fountain grass
(*Pennisetum setaceum*)

- Grows quickly and outcompetes other plants for resources like water and space.
- Poor pasture grass, degrades the quality of pasturelands, particularly in drier areas.
- Fire-adapted, it can survive brush fires, where native plants cannot.
- Fire-promoting. Dry fountain grass is an excellent fuel for brush fires.
- Changes structure of dry forest (from bushes, trees to grass savannah).



Miconia
(*Miconia calvenscens*)

- Forms thick stands, shades out native plants and takes over moist and wet forests.
- Forms an "umbrella" over the watershed, potentially reducing the amount of rainwater that seeps into the soil.
- Shallow root systems promote erosion.
- Sand-grained sized seeds easily spread by birds and other animals when they eat the fruit. Seeds also spread by people when contaminated dirt or mud sticks to shoes, clothing, equipment, or vehicles.



Bushy Beardgrass
(*Andropogon glomeratus* var. *pumilus*)

- Thick growth displaces native plants.
- Grows along roadsides, in disturbed areas and in open sites in shrub land and grassland.
- Each plant produces millions of seeds that are spread by the wind, animals, vehicles and people.
- Dry grass promotes fires and quickly regrows after wildfires.
- Drought tolerant, yet is able to flourish in wetter areas.



Himalayan blackberry
(*Rubus discolor*; syn: *Rubus ameniacus*)

- Found in disturbed areas, open fields and around fresh water habitats.
- Forms dense, impenetrable thickets that exclude other native plant species.
- Seeds are spread by fruit-eating birds and mammals, also spreads vegetatively.
- Thickets also make access difficult for hunters, hikers and other visitors to forest.
- Infestations can produce 7,000-13,000 seeds per square meter, which can remain dormant in the soil for several years.



False Kava
(*Piper auritum*)

- Thick growth and spreading root suckers displace other plants.
- Extremely difficult to control, as root pieces and stems re-grow when cut.
- Grows more than twice as fast and out-competes true kava plants.
- Harvesting and mixing false and true kava for exports and local sale vastly degrades the quality and value of the crop.



Fire Tree
(*Morella faya*)

- Out-competes native plant species and capable of forming dense, single-species stands, devoid of other plant life.
- Modifies forest habitat by significantly increasing nitrogen levels in the soil, which makes the area inhospitable to native plants, but more suitable for other invasive species.
- Seeds spread by animals.
- Able to colonize a wide range of habitats due to its ability to alter soil chemistry.



Fireweed
(*Senecio madagascariensis*)

- Each flower can produce 150 seeds, each plant can produce 30,000 seeds per year that spread by wind, hiking boots, vehicles or by animals.
- Invades pastures, disturbed areas and roadsides.
- Toxic to livestock when eaten, it causes slow growth, illness, liver-malfunction and even death in severe cases.



Brown Treesnake
(*Boiga irregularis*) **Call 911 to report ALL snake sightings.**

- Not known to be present in Hawai'i at this time, but eight brown treesnakes have been found live or dead in Hawai'i between 1981 and 1998.
- If established here, remaining at-risk native birds might be wiped out.
- At risk is Hawai'i's \$15 million poultry industry.
- An economic study by the University of Hawai'i estimates the cost of brown treesnake introduction to Hawai'i at \$28,500,000 to \$405,000,000 annually. A new study by the USDA National Wildlife Research Center puts the actual cost at \$1.7 billion per year.



Pampas Grass
(*Cortaderia selloana*); plume inset: (*Cortaderia jubata*)

- The wind spreads pampas grass long distances. In native forests pampas grass outcompetes native plants and creates a fire hazard.
- *C. selloana* requires cross-pollination between male and female plants to produce viable seeds, spread primarily by wind.
- Both species of pampas grass, *C. selloana* and *Cortaderia jubata*, were planted as ornamentals on Maui.



Coqui Frog
(*Eleutherodactylus coqui*)

- No natural predators or competitors to keep populations in check.
- Eats insects, removing them from forest floor to treetops.
- Loss of insect services, such as pollination.
- Disrupts the balance of vulnerable native ecosystems.
- Loud, incessant and annoying call from dusk until dawn.
- Adverse economic impacts on tourism.
- Decreased export plant sales.
- Disclosure requirement for real estate sales has decreased some property values.



Red Palm Mite
(*Raoiella indica*)

- Attacks palms, bananas, hala and ginger.
- Establishes colonies on the under sides of leaves, usually along the midrib, where they feed on leaves.
- Feeding mites, especially at high mite densities, cause localized yellowing of the leaves followed by tissue death.



Red Palm Weevil
(*Rhynchophorus ferrugineus*)

- Attacks a wide variety of palms, including coconut, date, Chinese fan and betel nut.
- Creates extensive damage to palm tissues and weakens the structure of the palm trunk and wilting of crown and leaves.
- Feeding damage leading to the death of infested palms is widely reported in areas invaded by this pest.



Little Fire Ants
(*Wasmannia auropunctata*)

- Delivers a painful sting when disturbed. Welts can last for weeks.
- Infests agricultural fields and farms, where they damage crops and sting workers.
- Promotes plant pests, such as aphids, white flies and scale insects, which secrete plant sap that the ants eat. In turn, the ants protect these insects from natural predators and parasites.
- Can also infest houses, beds, furniture and food.



Coconut Rhinoceros Beetle
(*Oryctes rhinoceros*)

- Attacks palms and hala.
- Adult beetles bore into palm crown, cutting through developing leaves.
- Causes a V-shaped cut in fronds.

