



# Nevada-Placer Weed Management Area

## 2017 Annual Report and Newsletter

*Dedicated to preventing and controlling invasive weed species in Nevada and Placer Counties by sharing resources and information*

### **Project Highlight**

#### **Roadside Invasive Plant Management**

Roadways serve as conduits for the movement of invasive plants into and throughout Nevada and Placer counties. Vehicles travelling on interstate and regional highways as well as local roads can unintentionally move and introduce invasive plants to new locales. The most significant and threatening travel thoroughfare in our area is the I-80 corridor which directly links northern California to other western states that are infested with invasive plants that are not established in California or are here in limited numbers. Likewise, weeds like yellow starthistle and stinkwort which are prevalent on the western slope of the Sierras are poised to move eastward along roadways into the mountains absent intervention and management.

To counter these threats, the Nevada and Placer County Agriculture departments cooperate with Caltrans to conduct annual surveys and treatments along I-80 between Colfax and the California-Nevada state line. During the summer months when weeds are actively growing and readily visible, agriculture department inspectors scour the interstate shoulders and medians looking for new occurrences of troublesome weeds like spotted knapweed, musk thistle, and perennial pepperweed. These annual efforts allow inspectors to identify, treat and confine infestations before they become established and spread outside of the travel way into forest, riparian and other environments including agricultural lands in western Nevada and Placer Counties. In 2017, over 300 infestations were discovered and managed along the I-80 corridor.



*Spotted knapweed occurrences along Hwy 89 (left) and I-80 (below).*



### ***Invasive Plants to Watch for*** **Stinkwort (*Dittrichia graveolens*)**

The earliest Stinkwort detections in Placer and Nevada counties were recorded in 2003. Stinkwort was first identified in California in Santa Clara County in 1984, but did not begin rapidly expanding to other areas until the mid-1990s. Infestations in western Placer and Nevada counties occur on roadsides, empty lots, and other disturbed areas. Since 2015, the Placer County Agriculture Department has been working to map and treat infestations along the I-80 corridor east of Colfax with the goal of preventing further encroachment of this pest into the Sierra Nevada Mountains.

Stinkwort is an erect annual weed that can grow up to 3 feet tall. It earns its name from the rank odor emitted by a sticky resin that covers plants. Stinkwort germinates in winter, but unlike other annual weeds like starthistle, doesn't flower until late summer in our area. Stinkwort produces small yellow flowering heads that eventually turn reddish-brown and reproduces from seeds which are distributed by wind, water, vehicles and shoes and clothing. Direct contact with stinkwort can cause dermatitis, so when performing mechanical removal it is important to wear appropriate protective clothing.

### **Barb Goatgrass (*Aegilops triuncialis*)**

Once the Sierra Nevada foothills turn brown in late May each year, there are a few invasive annual grasses that are just greening up. One such grass, Barb goatgrass, is a late-maturing annual with grey-green foliage and unusual looking large flower/seed heads. Although Barb Goatgrass has been detected in Nevada and Placer Counties since at least the 1950's, populations have exploded and expanded in the past 20 years with movement into higher elevations (up to 4000 feet and counting), and into susceptible grasslands. Roadside populations are growing by soil moving activities and road construction and maintenance equipment. Goatgrass is now seen throughout western Nevada and Placer Counties, but luckily unknown in the mountain areas for now. Highway 20 and Highway 49 have smaller populations moving east and north in Nevada County.

Barb goatgrass seed heads when mature in June will turn a reddish-brown color before drying to the typical California summer gold. Shortly afterwards, seed heads break apart at several joints, and the joints are then dispersed by attaching to animals, humans, equipment such as vehicles, and also in roadside soils/gravels which may be scraped and moved by annual maintenance activities. Plant material has a high silica content that results in a persistent thatch that will suppress other plant species, ending in a monoculture after a few years. Seedheads have a mechanism by which a specific portion of the seeds will not germinate the following year, but will wait until year two or three. This creates a longer seedbank in time, but usually not longer than four or five years at the maximum.

Management techniques are timed mowing in late May or early June, spring burning, chemical treatments, or hand-pulling for smaller infestations.



*Barb Goatgrass*

### ***2017 Control and Outreach***

- 1,600 invasive weed infestations were treated covering over 780 net acres. Surveys were conducted across 25,000 acres.
- Species Controlled: artichoke thistle, arundo, barb goat grass, Bermudagrass, black mustard, bladder senna, bouncingbet, bulbous bluegrass, bull thistle, Canada thistle, cheatgrass, chickpea milkvetch, common tansy, creeping buttercup, Dalmatian toadflax, diffuse knapweed, Dyer's woad, English ivy, everlasting pea, French broom, gorse, Himalayan blackberry, hoary cress, Italian thistle, lens-podded hoary cress, Maltese starthistle, milk thistle, medusahead, musk thistle, nipplewort, oblong spurge, oxeye daisy, pale flax, perennial pepperweed, prickly lettuce, purple foxglove, red sesbania, rush skeletonweed, sulfur cinquefoil, Russian knapweed, Russian-thistle, Scotch broom, Scotch thistle, Spanish broom, spotted knapweed, stinkwort, St. John's wort teasel, tree of heaven, tumble mustard, white sweet clover, woolly distaff thistle, woolly mullein, yellow starthistle and yellow sweet clover.



*Mature stinkwort plant flowering in October.*



### **Nevada-Placer Weed Management Area Partners:**

Bear Yuba Land Trust, California Department of Fish & Wildlife, California Department of Food & Agriculture, California Invasive Plant Council, California State Parks, Caltrans, Pacific Gas & Electric Company, Placer County Agriculture Department, Placer County Resource Conservation District, Placer County Starthistle Awareness & Removal, Placer Land Trust, Nevada County Agriculture Department, Nevada County Fire Safe Council, Nevada County Resource Conservation District, Truckee River Watershed Council, U.S. Forest Service-Tahoe & El Dorado National Forests

