

Sierra Streams Institute Continues the Fight Against Scotch Broom

Spring will be upon us before we know it and so will the invasion of Scotch Broom! This year, Sierra Streams Institute will once again join the fight against this aggressive invasive weed that is threatening the biological integrity of our watershed. As a local organization focused on using scientific methods to understand the issues facing our watershed, we know that invasive weeds like Scotch Broom pose a serious threat to our local habitats. We are excited to be joining the Fire Safe Council of Nevada County's annual Scotch Broom Challenge, and are calling on anyone who wants to help restore our native habitats to join us in the fight!

This year, Sierra Streams Institute will once again be working at Hirschman's Pond and the Deer Creek Environs to remove Scotch Broom. Our work at Hirschman's Pond is part of a three year Sierra Nevada Conservancy grant aimed at assessing forest health and reducing fuels to minimize the risk of catastrophic wildfires and enhance ecosystem health. Scotch Broom is native to the British Isles and central and southern Europe and was originally introduced to North America in the mid-1800s as an ornamental plant and for erosion control due to its rapid growth and deep roots. It was also used for medicinal purposes and the handles were used for making brooms. It spreads quickly, colonizing grasslands, scrub and woodland habitat. It often invades disturbed areas, trailsides and streambanks. It crowds out native plants and forms dense stands that are difficult for wildlife to move through. Although it produces attractive yellow flowers in the spring, this invasive weed reduces biodiversity and degrades habitat quality for native plants, animals and insects. Furthermore, it can quickly grow up to 10 feet tall and is highly flammable, creating a significant fire hazard in our forests and along roadsides. It is estimated that Scotch Broom now covers 600,000 acres in California alone.

Individual plants have been known to live up to 25 years, and it is crucial to remove them before they have a chance to spread their seeds. Scotch Broom begins to flower in March and can continue to flower through June. Later in the summer, seed pods appear and turn brown before releasing their seeds. Mature plants can produce up to 15,000 seeds each year. Our goal is to remove the Scotch Broom before it has a chance to propel thousands of seeds up to 12 feet from the plant to begin the next generation. The seeds can remain viable for at least 5 years after being dropped and have the potential to remain dormant for decades before germination. Seeds stored in glass jars at Kew Gardens in England remained viable after 81 years!

There are several methods for removal, but the most effective is thought to be repeated pulling of successive generations before seeds are released. In order to prevent resprouting, the entire root must be removed from the soil. This is most effective during the late winter and early spring when the soil is moist and it is easier to extract the entire root. Alternatively, the trunk can be cut below the lowest node during dry summer months when there is less water to aid regrowth from the stump.

Scotch Broom has become widespread and we rely on the dedicated efforts of volunteers every year to remove this highly invasive weed. The Sierra Streams Institute team will be at Hirschman's Pond on March 29th 2014 and the Deer Creek Environs on April 5th 2014 starting at 9:00 am. Please contact Aviva Fiske at aviva@sierrastreamsinstitute.org if you are interested in participating. A full list of removal sites and dates can be found at the Fire Safe Council of Nevada County at www.areyoufiresafe.com.

Together we can take on the Scotch Broom Challenge!

Aviva Fiske

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Sierra Streams Institute