



What is a Cone Survey?

A cone survey is a data collection effort to determine whether conifer trees in a particular area are producing an abundant, high quality cone crop. This varies greatly from year-to year as well as based on the tree species and location. Cone surveys are conducted on behalf of CAL FIRE's L.A. Moran Reforestation Center (LAMRC), which houses the only State-run Seed Bank in California.

Why are Cone Surveys Needed?

Recent large and damaging wildfires and bark beetle outbreaks have resulted in an urgent need to increase the pace and scale of reforestation activities across the state. To achieve these goals, conifer seeds must be collected from cones and stored by the seed bank so they can be used to grow new seedlings when the need arises. The identification of viable seed crops through annual cone surveys is an essential step in prioritizing collection areas and replenishing seed supplies.

How are cone survey sites selected?

Forestry professionals from CAL FIRE and other collaborators work with the seed bank to prioritize cone survey locations. Survey locations are based on the species of conifer needed and where the potential for viable seed crops is high.

How are cone surveys conducted?

Trained resource professionals conduct cone surveys by viewing trees from public roads and from private properties where landowners have granted access. Surveyors use binoculars to assess the condition of cone crops. The abundance of cones is recorded and communicated to CAL FIRE to determine the viability of a physical collection.

How often are cone surveys conducted?

Initial surveys are typically completed form May to July, with monitoring surveys conducted at promising sites. CAL FIRE staff and collaborators may collect cone/seed samples to test for viability if a crop is promising.

What happens if there are viable cones on my property?

If a sufficient number of viable cones are found in a suitable location, CAL FIRE will coordinate with the property owner(s) regarding the timing and methods of collection. Typically cone collections can begin as early as mid-July and continue through December. Professional tree climbers scale trees to hand harvest cones. This process does not damage the tree or affect its form or appearance.

How do landowners' benefit?

Landowners benefit by knowing that they are helping to preserve California's unique ecosystems and the services they provide, such as critical wildlife habitat, clean water, clean air, timber production, and carbon sequestration. Landowners may also request that CAL FIRE reserve a portion of the seeds collected from their property for future reforestation efforts on their land.



For More Information Please Contact:

L.A Moran Reforestation Center:

Reforestation Services Program | CAL FIRE

For questions on your reforestation needs, please contact:

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