



STREET TREE SEMINAR, INC.

Your Los Angeles/Orange Regional Urban Forest Council
P.O. Box 6415
Anaheim, CA 92816-6415



SAVE THE DATE:
August 22, 2013
What to Expect from the Impending "Pest Tsunami" and how to Recover From It

2013 MEETING SCHEDULE

August 22	How to prepare for the coming holocaust! Dr. Jim Downer & Dave Roger	City of Santa Clarita Sports Complex Santa Clarita, CA
October 24	A Discussion on Trees with Dr. Matt Ritter	TBD
December	Annual Scholarship Awards and Officer Induction	Kellogg West Pomona, CA
January 23rd	2014 Winter WTMS all day program	Pomona Fairplex Pomona, CA

MISSION STATEMENT

"To promote the advancement of urban forestry and provide a forum for tree care professionals to share their experiences, knowledge, and expertise for the benefit of the membership and the enhancement of Southern California's community forests."

VISION STATEMENT

"To enhance the health and beauty of Southern California cities by improving the quality of our community forests."



STREET TREE SEMINAR, INC. - Your Los Angeles/Orange Regional Urban Forest Council

STS Newsletter

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WTMS: Can Our Western Trees "Weather" the New Climate & Pests Coming Our Way?

The 2013 Street Tree Seminar Summer Program started with a warm welcome from Fred Roth, the Street Tree Seminar Vice President, who described the overall program as the challenges that trees face in today's weather conditions. Fred then introduced the first speaker Lynette Short, from Cal Fire who represents the San Diego and Los Angeles county areas.

Lynette gave a comprehensive overview of the Cal Fire Grant Programs over the last several years. She explained the various types of grants that are still available to urban forestry programs, municipalities, agencies and non-profits. The grant programs range from tree planting, small outreach and educational opportunities to complete tree inventories and urban forestry master plans. Additionally there is a "specialty" grant category that has a less specific focus and provides a wider opportunity for a creative grant submittal program. Additionally, there is a wood mill program that offers the use of a Cal Fire wood mill to cut urban wood from municipal trees. Some of the many existing Cal Fire grant programs that have been funded include The Britton Fund, California Re-leaf, Sacramento Tree Foundation, Tree People, Urban Tree Foundation, Northeast Trees, the Select Tree Program from Cal Poly California and the Urban Forestry Council's "Invest from the Ground Up" program. Many of these Cal Fire funded programs provide research and educational outreach to communities all over the state and benefit the overall community and municipal urban forestry programs. This year grants were about 3 million compared to the 5 million in the last few years.

The next speaker was Jim Downer from the UC Extension, Ventura County office who spoke on the Carbon Cycle of Trees. Jim began by explaining that carbon is stored in the soil, plants, air and water and that trees store carbon in the form of wood. The current increase of Carbon Dioxide - CO₂, has increased since industrialization and the burning of fossil fuels. Historically trees and forests take in carbon through photosynthesis and store it, in one form as wood, and in other forms as soil and decayed organic material. This process kept the carbon from developing the high atmospheric levels that we see today. Additionally, worldwide deforestation has affected the carbon balance by reducing the amount of trees and forests to store the carbon. Trees and forests are generally lost through, logging, development of pasture land, crop land and forest fires. Collectively deforestation and the burning of fossil fuels have led to the "Greenhouse Effect" increases climate change. There is a general trend that the planet is getting warmer and the recent years of record low rainfall are causing drought that adversely affects the trees and forests. The message was that trees are important to our world and to our existence.

Another important factor was the storage of carbon in the forest floor or the living soil in the form of leaf and wood mulch that create the organic layer that hosts important biologic living organisms. An example of the importance of this organic layer to plant health was an Australian study of orchards that had been stripped of their organic layer. The orchard trees became infected with Phytophthora after the original forest had been stripped away and the new orchard was planted on the new sterile site. The disease attacked the orchard trees possibly due to the lack of organic matter. Later a comparison study and experiment where done on a neighboring plot, where organic material was re-introduced to an adjacent orchard site. In the mulched orchard site, the trees were

somewhat resistant to the Phytophthora organism. The simple take from this was that the natural organic material provided a "food" source for the plant killer organism to live on and did not attack the orchard trees, whereas the orchard without any organic material was dying from the disease attacking the roots of the living trees. The lesson was that mulch was very good for trees.

John Leffingwell from Hortscience, Inc, provided a presentation on the wind effects on trees. John explained how wind affects trees differently based on the location of the tree and topography of the site. Additionally the species of tree, time of the year, prevailing winds including the height and spread of the tree all play an important role in the tree's ability to withstand wind or not. The wind energy is captured by the tree and creates tension and compression on the tree's root system. Prevailing winds create rope-like root structures that hold the tree from falling over. The windward side is the side that the wind is coming from and the leeward side is the downwind side. Some high wind failures of trees can come from soil failures, like rotational root ball failures where the entire root ball rotates in the soil and the whole tree fails. These can happen in wet soils during high wind events. Sandy soils usually have hinge failures meaning that the tree will hinge over with the whole root ball, pulling roots out of the ground beneath the tree. Hinge failures are the most common on wet soils, where the whole root ball pulls out of ground and fails.

Wind strength tends to be stronger at a higher height in the tree. So the tree trunk will experience a higher amount of force on the upper section of the trunk and canopy, than it will at a lower point closer to the ground. So the height of the tree will determine the amount of wind force applied upon a tree. A taller tree will experience more wind force than a shorter tree in the same location during the same wind event.

Michael Raupp from the University of Maryland spoke on climate change and pest outbreaks. The basic principle was that due to the changes in global temperatures, plant pests are adapting in a negative way and threatening plant survival. The increase in temperatures allows certain species of pests to have additional life cycles during a pest's normal infestation season. Warmer temperatures and droughts add stress to trees and plant material which in turn increase their pest susceptibility. Also the range of the pest territory is growing so that areas that never had a particular pest are now seeing them. The concern is that the pest populations are increasing as well as their distribution.

One example was the Mountain Pine Beetle which has historically lived on the western side of the Rocky Mountains and is now crossing over this natural barrier and spreading to the eastern Canadian boreal forests. Also the Mountain Pine Beetle is increasing its host tree selections to include new species of pines that normally were not affected from this pest before. Typically this pest was constrained by cold temperatures, but with the climate changes the host range is increasing and the once natural barrier of the Rocky Mountains is less of a defense.

A second session with Michael Raupp discussed the importance of plant diversity in the landscape to the overall pest population and the health of the landscape. The basic premise was that a diverse plant palette in the landscape provided less of an opportunity for pests as compared to mono crops that could be affected by a pest population. With plant diversity there was less opportunity for a pest to dominate the landscape as the diverse selection of plants could reduce the probable pest damage. Over-story and understory trees could



Mike Raupp shared his expertise on pests and climate change with attendees.

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CaUFC Update - Invest from the Ground Up



Many of our STS members participated in the Invest from the Ground Up Business Forum in East Hollywood last May. Thanks to all of you who made it a big success! The campaign has now moved into other communities throughout the state and is also planning a tree planting event for February 15th in the Central Valley and Bay Area. Learn more at www.investfromthegroundup.org.

Other Invest from the Ground Up Events throughout the state include:

Free Tree for all Albany Residents, Now through Sept 30, 2013, Albany, CA

Until September 30th, the City is offering homeowners and business owners in Albany a free street tree and will even take care of the concrete removal, planting and future pruning.

The city has an approved list of street trees with characteristics that are ideal for Albany. These species offer a variety of appealing characteristics that make them a great addition in the short and long-term for your home or business. From drought tolerant and side walk friendly varieties to those that offer fall colors and spring flowers, these trees all have something to offer.

Tree Planting Celebration, Sept 28, 2013, Albany

Join your community in creating a thriving tree-filled neighborhood with song birds, higher property values, lower energy costs, and a flourishing business district.

Bring your whole family for a tree-mendous morning of fun and community spirit!

WTMS Summer- Continued from page 1

provide shade and shelter for beneficial insects and a complex environment for a natural balance of pests. Biodiversity can be attributed to species richness and also by structural complexity. The natural food web depends on some amount of pests. This form of natural sustainability and integrated pest management can help reduce negative pest populations in a landscape setting.

The author Greg Rubin spoke on California Native Plants in the Landscape. His talk was on using native plants and many of the benefits associated with them. One of the benefits was their drought tolerance, adaptability to our soils and another was their fire resistance in some cases, depending on the species. Greg discussed some landscape designs using California natives and several native trees that can be used in public and private settings. Some examples of landscape planting installations were the use of one and five gallon plants for landscape installation.

This type of small planting installation reduced planting loss and the chances of root bound trees. Greg believed in a deep soaking at the time of installation and overhead watering for the continued irrigation. One case study for trees was on Engelmann oaks in Pasadena, where the soil and exotic weeds were removed back to a pre-existing condition and the result was a dramatic recovery to the oaks. Greg felt that exotic weeds and plants can have a devastating effect on trees and the California landscape. He also believed in mulch as a natural soil covering for plant material and trees.

The last speaker was Don Hodel who presented several types of drought tolerant trees that can be used as street trees in southern California. Some of the trees included types of Acacia's, Eucalyptus, Angophora, Banksia's, Cassia, Palo Verdes and many others.

Overall the STS Summer Session was a big success and a great educational opportunity to learn about the many stresses that trees have to endure in this changing weather and climate change. Many thanks go out to Rose Epperson as she was the main organizer of this event.

STS Scholarship Essay- The Importance of Street Trees by Amy Dolim

Looking out the window it is hard to imagine a world without trees. I am able to see thirty trees through the window I am sitting by. Mostly Mexican Fan Palms, Southern Magnolias, and Carrotwoods. These massive organisms, beneficial to all and with such diversity, are overlooked and taken for granted by some. Street trees benefit the community by creating protection from harsh environmental conditions, enhancing the quality of life for humans.

Picture a world without trees. The community as a whole would be unprotected from harsh environmental conditions. Rain and wind would be a threat by washing and blowing away the soil. The harsh rays from the sun would bake and bleach the soil. Streets would be flooded and ground water would be contaminated. In addition, without trees we would have nothing to filter our air. Particulate matter that settles on leaves would circle on the breeze. Trees absorb carbon dioxide, nitrogen dioxide, and sulfur dioxide, improving our oxygen. So I ask myself, would there be a world if we were without trees?

Our quality of life as humans would decline



STS Golf 2013

On July 19th , the 2013 Golf Tournament was held at the beautiful Robinson's Ranch Golf Course in Santa Clarita.

Congratulations to all of our winners:

Closest to the pin: Dan Rackley

Longest Drive: Drew Fockler

3rd Place: Dave Davis, Max Convis Yoshi Nakagawa, Mike Aragon

2nd Place: Dan Rackley, Justin Blank, Dan Sinner, and Travis Harper

1st Place: Norm Sieger, Kevin Viser, Aaron Volkenant, Drew Fockler

Raffle Prizes Donated by: ISS, ValleyCrest, Roy Boak, Stay Green, Inc., Davey Tree, Crown Trophy, Jim Habeger and Vinco

Raffle Winners: Tadd Russikoff, Brad Bishoff, Dan Sinner, Connor McPhearson, Dan Rackley, Kevin Viser, Drew Fockler, Brandon Smith, Travis Harper, Jeff Morrison and Justin Blank



STS 1st Place Team: Norm Sieger, Kevin Viser, Aaron Volkenant, Drew Fockler

Upcoming Meeting Announcement

Mark your calendars! You won't want to miss our next meeting "**What to Expect from the Impending Pest Tsunami" and how to Recover From It**" - featuring Dr. James Downer and David Roger

Date: August 22, 2013

Time: 10:30AM—1PM

Location: Santa Clarita Sports Complex, 20880 Centre Pointe Parkway, Santa Clarita CA 91351

Cost: \$15— Pre-Registration \$20— At the Door

RSVP to Christy@cycarlberg.com

indeed without the help of street trees. In the city, trees increase property values for the homeowner and their neighbors. Urban areas with great amounts of trees have less crime and a community with a greater sense of pride. The trees placed in the parkway provide a living sound barrier. The pollution created by the constant stream of cars is absorbed by the trees which catch the particulate matter. Drivers also tend to be calmer and drive at slower speeds if the parkways and streets have trees on them.

In the future, I would like to see many things- street tree selection going towards native species, working with the native beneficial insects and native birds. Habitats that will benefit the whole area's vegetation. Each city becoming unique because the trees would create a reflection of the local area's history as well as its forward thinking mentality. An arborist that works with the community and is passionate and willing to share their knowledge. In addition, and arborist who knows the habits of the species. These specialists would be able to choose the proper placement and space for the adult tree. Someone who knows you are able to plant a tree today that will be a legacy for the future.