Train the Trainer Program for Oregon Agricultural Professionals

A Climate Resilience Toolbox for Working With Oregon's Farmers and Ranchers



A climate resilience training for Oregon agricultural technical service providers. This training is relevant for farm advisors and researchers throughout Oregon, including staff and faculty from Oregon State University Extension, soil and water conservation districts, Oregon Natural Resources Conservation Service, watershed councils, land trusts, researchers, nonprofits and agricultural education providers. See detailed training agenda and event resources below.

Resources provided before the training

- Training Agenda
- Laura Lenginck's planning tool <u>Cultivating Resilience on Farms and Ranches</u>
- Applying Soil Health Management Systems to Reduce Climate and Weather Risks in the Northwest PNW resource from our NW Climate Hub
- Oregon Case Studies: Highlighting producers farming for climate resilience.

NOVEMBER 2, 2021

Session 1: Climate change and agriculture in the PNW: What does the science tell us? Get the latest in climate science from Erica Fleishman, Director of Oregon Climate Change Research Institute, and join her in conversation with Mimi Casteel, Winegrower-Hope Well, and Andrea Malmberg, Bunchgrass Land & Livestock.

- Erica Fleishman's PowerPoint presentation
- Mimi Casteel recently presented at the 2021 Eco Ag ACRES conference. Her presentation is here.
- The fifth Oregon Climate Assessment
- Encourage contributions to these citizen science weather websites to improve weather reporting: <u>Mountain Rain or Snow</u> and <u>GLOBE Observer</u>.

Session 2: How do we talk about climate change with producers?

Best practices for communicating with producers about climate change and conservation. As farmers and ranchers come from a diversity of perspectives, we'll talk about how to deliver information to different audiences and better understand potential barriers. Training by Faith Kearns, UC Ag and Natural Resources, followed by discussions with Gabrielle Roesch-McNally, American Farmland Trust, Hannah Gosnell, Professor at Oregon State University, Jessica Luhning, Sustainability Manager Organic Valley, Joe Klein, OR NRCS in Wallowa County and Liza Jane McAlister of 6 Ranch.

- Faith Kearns presentation
 - o <u>PowerPoint</u> and book: <u>Getting to the Heart of Science Communication: A Guide to Effective Engagement</u> (order directly from Island Press with code HEART for 20% off)
 - o Resources mentioned in presentation and chat:
 - Building climate change resilience in California through UC Cooperative Extension
 - <u>Katharine Hayhoe</u>, climate scientist with TNC -- website has resources for both science and communications
- Panel discussion
 - o Hannah Gosnell PowerPoint

- This article shares findings that the opportunity to make money from carbon sequestration / mitigation was not that important to ranchers in US and Australia it was seen as a co-benefit.
- o Articles about Soil Health Economics
 - Soil Health Economic Case Studies by American Farmland Trust
 - How conservation delivers value on the farm and beyond Analyses of farm finances show how conservation practices benefit farmers, lenders and insurers
 - New York State's Soil Health Roadmap has a discussion of the economics of soil health including a great chart on page 13.
 - On Microscope Groups:
 - Watershed Landcare, Inc (2013) "Beyond the Rhetoric" Mudgee Microscope Group, a case study: a cooperative approach by land managers to better understand and manage for soil biological health.

NOVEMBER 3, 2021

Session 3: Climate risk and resilience. How can we design and manage agricultural operations to thrive in changing conditions? Trainer Laura Lengnick will introduce a strategic way to think about climate risks to agricultural operations and options for enhancing resilience. Learn about climate exposure, sensitivity and adaptive capacity.

- Laura Lengnick PowerPoint
- Oregon Case Studies

Session 4: **New times, new tools: Managing for resilience.** What are some key tools in the 'climate resilience toolbox' for agriculture? Trainer Laura Lengnick will introduce best climate risk management practices for effective mitigation and adaptation planning at the farm level. Learn about the best local resources on climate resilience.

- Laura Lengnick PowerPoint
- Oregon Case Studies

NOVEMBER 4, 2021

Session 5: Managing climate risk with soil conservation practices

Soil health is widely recognized as an effective climate risk management tool that generates valuable co-benefits both on farm and to society. Learn how soil conservation practices can be managed to reduce key climate risks to agricultural operations in the PNW and which practices offer the best return on investment to PNW producers. Facilitated by Cory Owens, Oregon NRCS, we'll present technical and financial incentives for planning and implementation of soil conservation practices that enhance farm resilience. Introductory and more advanced levels of soil health information will be provided for a variety of attendees by Nick Sirovatka, NRCS Soil Health Division, Regional Soil Health Specialist, and Joe Williams, NRCS Soil Health Division, Regional Soil Health Specialist.

- Soil Health 101: PowerPoint and Recording
- Soil Health 201: PowerPoint and Recording
- <u>Soil Conservation Practices to Reduce Climate Risk</u> Cory Owen NRCS PowerPoint -- highlights existing tools to support farmers and ranchers in reducing climate risk.
- Resources discussed:
 - o PNW Western Cover Crop Council
 - PNW Cover crop tool
 - o What NRCS programs are available in my area?
 - o NY Soil Health Roadmap
 - o PNW Biochar Case Studies

- Soil Health Benchmark Study from PASA
 - o Oregon Policy: Oregon Global Warming Commission Natural and Working Lands Report

Session 6: Moving forward: What do we need to be successful when serving producers? This session will provide an opportunity for participants to integrate what we've learned, identify the barriers and opportunities to next steps, and create a community of practice in Oregon. This will be a more interactive session including regional breakout groups. Facilitated by Amy Garrett, OSU Dry Farming Collaborative and Ashley Rood, OrCAN.

- <u>Dry Farming Collaborative</u>--PowerPoint on the collaborative as a case study is <u>here</u>
 o Note their winter meeting is coming up 02/08/2022!
- Northwest U.S. Agriculture in a Changing Climate: Collaboratively Defined Research and Extension Priorities

To see who registered for this event, click here.

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Western Sustainable Agriculture Research and Education Oregon Professional Development Program (WSARE PDP

Coordinated by:

Oregon Climate and Agriculture Network (OrCAN

Planning Committee:

Amy Garrett - OSU/Dry Farm Collaborative, Hannah Gosnell - OSU CEOAS, Joe Kline - OR NRCS, Laura Lengnick - Cultivating Resilience LLC., Cory Owens - OR NRCS, Maud Powell - OSU Small Farms, Holly Prendeville - USDA NW Climate Hub, Ashley Rood - Oregon Climate and Agriculture Network, Marie Vicksta - Yamhill Soil & Water Conservation District.

Questions? Please contact Ashley Rood, ashley@oregonclimateag.org

