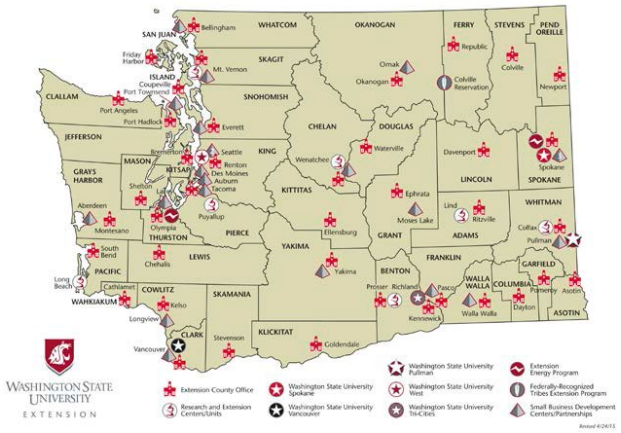
Extending Knowledge. Changing Lives.

WSU Extension is a unique educational partnership between the U.S. Department of Agriculture, the nation's land-grant universities, and county governments. WSU Extension engages people, organizations and communities through programs that advance knowledge, economic well-being and quality of life. In Washington, the Smith-Lever Act has stimulated innovative research and vital educational programs for youth and adults on a wide range of topics, including agriculture, gardening, economic development, parenting, nutrition, sustainable development, sustainable energy and more. WSU Extension focuses on applied research and outreach to solve high priority problems in the region. As the front door to the University, WSU Extension provides non-credit education and degree opportunities to individuals throughout the state, empowering residents to pursue their interests, develop their talents, support their families, and improve their communities.



Locations and People

WSU Extension has 52 locations across the state, including every county and the Colville Reservation; Research and Extension Centers in Puyallup, Mount Vernon, Wenatchee and Prosser; Research and Extension Units in Lind and Long Beach; and campuses in Pullman, Spokane, Vancouver, Tri Cities and Everett. Extension faculty contribute outreach and content through the WSU Global Campus, including certification, continuing education, and training programs. Over 6,000 volunteers support the Master Gardener and 4-H Youth Development program. 4-H reaches youth and their families to build life skills through more than 100 different hands-on projects. The Master Gardeners help residents improve water quality and quantity, properly diagnose insects and diseases, reduce pesticide use, and plant adapted plants. Overall, WSU volunteers donated more than 500,000 hours to their communities.

Soil Health Initiative

Maintaining and improving soil health is key to preventing soil depletion, ensuring long-term agricultural productivity, and protecting the environment in our region, as well as the ongoing health of the rural economy and regional food security. A host of indicators are currently available to assess soil health; however, our understanding of the relationship between these indicators and plant production and environmental outcomes is incomplete. To address these knowledge gaps, better understand linkages, and provide better guidance to stakeholders, the **Washington Soil Health Initiative (WaSHI)**. This initiative is an ambitious plan that funds research, extension, and demonstration of soil health best management practices through a network of long-term agro-ecological research and extension (LTARE) sites across Washington's diverse agricultural systems.

WaSHI is a partnership among the Washington State Conservation Commission, the Washington State Department of Agriculture, and Washington State University, working together to establish a coordinated approach to healthy soil in Washington. A renewed focus on soil health creates a win-win-win opportunity for farmers, the environment and the general public, and puts the state of Washington in a leadership

role nationally. An increased understanding of the linkages between soil health, production, and the environment achieved through the Washington SHI will contribute to several important outcomes:

- A baseline assessment of soil health and the tools to monitor and manage it across the diverse agricultural systems in Washington;
- Better understanding of the opportunities to improve soil health through changes in management practices; and
- Increased adoption of these practices to increase food production and farm profitability and providing important economic and environmental benefits to the state of Washington.

Key industries involved include growers of potatoes, wine and juice grapes, dryland agriculture and tree fruits, such as apples, pears, and cherries, among others. Visit https://soilhealth.wsu.edu/ and https://washingtonsoilhealthinitiative.com/ for frequent Soil Health Initiative updates.

Stormwater Management and Green Infrastructure

The Washington Stormwater Center at WSU Puyallup continues to be one of the nation's largest research installations in the nation that focuses on green infrastructure and stormwater management. The program is conducted through a living laboratory with full-scale, replicated, Low Impact Development (LID) practices that serve as a center for research and outreach. The Center includes pervious concrete and asphalt surfaces, rain gardens, microcosms, pervious pavers, roofing, and fish tank studies. The center has an extensive outreach program that provides LID certification for engineers, planners and agency personnel. The Center also provides online modules for LID training. Many cities and urban counties have installed pervious concrete streets and sidewalks while local businesses have installed pervious pavement parking lots and rain gardens.

Forest Stewardship

Washington has over 215,000 landowners that control nearly 5.8 million acres of forestland, making this the largest rural land use group in the state. Many landowners manage for multiple objectives, such as timber production, wildlife habitat improvement, and a variety of recreation opportunities. WSU led 91 events attended by 6,347 forest owners and managers, representing over 118,994 acres. Forest Stewardship Coached Planning is a comprehensive landowner education program that covers key aspects of caring for wooded property in a way that maximizes private landowner benefits while also protecting and enhancing public resources. The course is designed around the development of a personal Forest Stewardship Plan, which participants write with "coaching" from forestry professionals. Courses resulted in over 90% of participants implementing better management practices. In partnership with the WA State Department of Natural Resources, new foresters started in Northeast and Southwest Washington during the year.

The WSU Vetter Demonstration Farm and Forest near Deer Park in Stevens County is a collaborative effort of the Stevens County Conservation District (SCCD), Washington State University, and WSU Stevens County Extension. It was developed as a partnership to collaborate with the local community to establish a working-lands experimentation facility. The goal is to explore the area's relevant agricultural and forest management practices and techniques in a manner that benefits the small farmer and landowners. Research and demonstrations include, but are not limited to, soil health, regenerative agriculture, forest health and resilience, agroforestry, cover cropping, integration of livestock in crops and forests, and reducing the need for pesticides and commercial fertilizers. These projects will help promote small-scale sustainable agriculture to improve current crop yields and create trials for potential new crops for the local climate and soils.