House Bill 3103

Sponsored by COMMITTEE ON AGRICULTURE, LAND USE, NATURAL RESOURCES, AND WATER (at the request of Representative Ken Helm)

SUMMARY

The following summary is not prepared by the sponsors of the measure and is not a part of the body thereof subject to consideration by the Legislative Assembly. It is an editor's brief statement of the essential features of the measure **as introduced.**

Directs Oregon State University Extension Service and Oregon State University Agricultural Experiment Station to establish agricultural water management technical assistance program. Describes elements of program.

Directs State Department of Agriculture and Water Resource Department to jointly perform various tasks related to agricultural water management technical assistance.

A BILL FOR AN ACT

- 2 Relating to technical assistance for agricultural water management.
- Be It Enacted by the People of the State of Oregon:
 - <u>SECTION 1.</u> The Oregon State University Extension Service and the Oregon State University Agricultural Experiment Station shall jointly establish an agricultural water management technical assistance program. The technical assistance program shall be a voluntary, nonregulatory and incentive-based program that includes all of the following elements:
 - (1) Staffing at least one agricultural water management specialist at each agricultural experiment station or field research center who will be responsible for:
 - (a) Building collaborative relationships with water and land managers; and
 - (b) Developing research-based water management programs that utilize data collected under subsection (6) of this section to provide publicly available statewide and regional tools for water and land managers that foster regionally specific knowledge and expertise.
 - (2) Connecting agricultural producers to information, resources, tools, programs, partners, funding opportunities and other incentives to improve on-farm water management practices and outcomes for the producers' operations and water resources.
 - (3) Creating a voluntary network of willing agricultural producers to develop on-farm demonstration projects featuring water-related management practices that yield quantifiable water quality and quantity benefits for the producers' operations and water resources and to promote the uptake of effective practices, including, but not limited to:
 - (a) Modification of irrigation equipment;
- 23 (b) Measurement and monitoring of water diversions and water use;
- 24 (c) Use of data in decision making;
 - (d) Irrigation management practices;
- 26 (e) Soil management practices;
 - (f) Fallow management practices;
- 28 (g) Temporary or permanent voluntary in-stream flow restoration, such as in-stream 29 leasing and split-season leasing;

NOTE: Matter in **boldfaced** type in an amended section is new; matter [italic and bracketed] is existing law to be omitted. New sections are in **boldfaced** type.

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- (h) Novel water sharing agreements or arrangements that benefit other in-stream and out-of-stream water uses;
 - (i) Water reuse:

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- (j) Effective use of the state and federal programs;
- (k) Practices that restore and protect fish and wildlife habitat;
 - (L) Practices that reduce energy use and costs;
 - (m) Fish screening and fish passage; and
- (n) Experimentation with alternative crops.
- (4) Identifying, studying and mitigating the effects of projects and practices implemented under subsection (3) of this section on in-stream and out-of-stream water users and uses, and conducting related outreach.
- (5) Organizing workshops and tours to promote innovative agricultural water management practices.
- (6)(a) Establishing and maintaining a publicly available weather and irrigation information system designed to collect, process and make available climate and weather-related data and provide to agricultural producers tools that support increased production, increased resilience to drought and flood events and the efficient management of water resources; or
- (b) Supporting an existing system that meets the criteria described in paragraph (a) of this subsection.
- (7) Contracting with an organization that provides publicly accessible, reproducible, satellite-based evapotranspiration data using open science methods, open data services and an ensemble of well-established evapotranspiration models to:
- (a) Support ongoing and reliable evapotranspiration data production and platform maintenance for public use across this state.
- (b) Check evapotranspiration estimates produced by the organization against data collected from sites within this state.
- (c) Update estimates or models produced by the organization to provide more reliably accurate, Oregon-specific estimates.
- (d) Conduct outreach and partner with agricultural producers and other subject matter experts to:
- (A) Collect data, including water use data and data collected by the system described in subsection (6) of this section, and perform analyses to verify and increase the accuracy of evapotranspiration estimates in this state; and
- (B) Evaluate effective uses of available evapotranspiration data to inform and improve on-farm water management practices for agricultural producers that voluntarily agree to participate.
- (8) Partnering with agricultural producers and other subject matter experts to check the accuracy of remotely sensed data, develop new tools, adapt available tools, experiment with new technologies and approaches and identify best management practices.
 - (9) Performing and publishing research related to agricultural water management.
- (10) Developing and updating Oregon-specific guides, manuals and other resources, with a focus on resources that will increase the likelihood of securing federal funding and assistance for agricultural water management and ensure the effective delivery of desired outcomes.
 - SECTION 2. (1) To carry out the technical assistance program described in section 1 of

- this 2023 Act, the Oregon State University Extension Service and the Oregon State University Agricultural Experiment Station may:
- (a) Support the acquisition and maintenance of equipment necessary for the collection of weather data, climate data and data related to agricultural water use and management, including equipment that measures or monitors water diversions, water use and evapotranspiration. Equipment may include, but need not be limited to:
 - (A) AgriMet weather stations;
- (B) Other weather stations;
- (C) Eddy covariance stations;
- **(D)** Lysimeters;

- 11 (E) Stream gauges;
- 12 (F) Soil moisture meters; and
 - (G) Water use measuring devices.
 - (b) Form partnerships with agricultural producers to site data collection equipment and use the data collected in on-farm management practices, with preference given to producers that agree to serve as demonstration farms described in section 1 (3) of this 2023 Act.
 - (c) Form partnerships and enter into cost-sharing agreements with institutions capable of maintaining data collection equipment and processing data, including the United States Geological Survey, the United States Bureau of Reclamation, the Natural Resources Conservation Service of the United State Department of Agriculture, the National Weather Service of the National Oceanic and Atmospheric Administration, the State Department of Agriculture, the Water Resources Department, the State Department of Fish and Wildlife, the Department of Environmental Quality, the Oregon Watershed Enhancement Board, the Oregon Climate Service and soil and water conservation districts.
 - (d) Procure technology and services that support innovative agricultural water management practices, including, but not limited to, data services that enable the development of water management tools using publicly available evapotranspiration data.
 - (e) Convene statewide or region-specific advisory groups or working groups to advise on any aspect of the program.
 - (2) In establishing and maintaining the voluntary demonstration network described in section 1 (3) of this 2023 Act, the Oregon State University Extension Service and the Oregon State University Agricultural Experiment Station:
 - (a) May receive and expend funds from any source to:
- 34 (A) Design and implement demonstration projects under section 1 (3) of this 2023 Act; 35 or
 - (B) Provide stipends to agricultural producers participating in the voluntary network described in section 1 (3) of this 2023 Act for time, equipment and related expenses.
 - (b) Shall prioritize projects that have the potential to increase drought resiliency and provide quantifiable water quantity and quality benefits to other in-stream and out-of-stream water users or uses.
 - <u>SECTION 3.</u> (1) The Oregon State University Extension Service and the Oregon State University Agricultural Experiment Station shall jointly:
 - (a) Track climate-related impacts on agricultural producers;
 - (b) Prepare an annual report describing those impacts, including flood and drought impacts, and recommendations to increase agricultural resilience; and

- (c) Submit the report in the manner provided by ORS 192.245 to the interim committees of the Legislative Assembly related to agriculture no later than September 15 of each year.
- (2) The Oregon State University Extension Service and the Oregon State University Agricultural Experiment Station shall jointly report on the progress of the technical assistance program established under section 1 of this 2023 Act in the manner provided by ORS 192.245 to the interim committees of the Legislative Assembly related to agriculture no later than September 15 of each even-numbered year.

<u>SECTION 4.</u> The State Department of Agriculture and the Water Resources Department shall jointly:

- (1) Develop and update maps of agricultural field boundaries and crop types to inform the development of statewide tools to be used in agricultural water management technical assistance programs. The State Department of Agriculture and the Water Resources Department may contract with a qualified entity to perform the work described in this subsection.
- (2) Support efforts by other agencies, organizations or individuals to develop and maintain key datasets related to agricultural water management for purposes of supporting voluntary, incentive-based programs for agricultural producers.
- (3) Identify and pursue federal funding opportunities related to agricultural water management, including but not limited to assistance for irrigation conservation and efficiency.
- (4) As far as is practicable, coordinate the activities described in this section with Oregon State University.

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