April 10, 2017

Good morning, Co-Chair Monroe and Co-Chair Smith-Warner and committee members. Thank you for the opportunity to testify today on the benefits of the Precision Irrigated Agriculture Program at Blue Mountain Community College to eastern Oregon and the entire northwest.

My name is Casey White-Zollman, and I am the Vice President of Public Relations for BMCC.

In 1975 there were no center pivot irrigation systems in the Hermiston area. Local farmers who raised watermelons used flood irrigation and had yields ranging from 3-5 tons per acre. Today the yields of this crop have increased to 30-50 tons per acre or more while using one-third as much water applied through the drip irrigation system.

This is just one example of improved technology being adopted by the agricultural industry to increase efficiencies while decreasing costs and more effectively using our water resources.

The 2 most valuable resources that we all have are air and water. Precision irrigated agriculture focuses on using these 2 resources in the best way, never wasting, always cognizant of how to share with others so all needs are met.

In less than 3 months, a new facility will be completed on the grounds of the OSU Hermiston Agricultural Research and Experiment Center, allowing BMCC and OSU to partner in the delivery of education to our agricultural partners while improving productive practices using our precious water resource. The program was designed with a primary focus on traditional high school graduates. The industry has now begun to ask for more short-term training through intensive 1-week seminars and 4-hour seminars offered during November through February, which is a slower time for producers. Farmers have shown a need for increased knowledge and skill development for their workers. We will meet this need as they have requested.

Precision Irrigated Agriculture is designed to show students how to be good stewards of our precious water resource. By precisely delivering water to where the plant needs it at just the right time we decrease water use while increasing productivity.

<u>Unmanned aerial vehicles</u> can be used to scout fields to determine crop water needs. <u>Infrared photography</u> can tell of plant stresses which need to be addressed. <u>Soil mapping</u> can help us know how much water can be stored in the soil and how much will infiltrate and at what rate.

When we couple this technology with soil probes and controls on the center pivot we will use water in the best possible way. Controlling the pivots is done remotely from any computer or cell phone.

The use of auto steer and GPS on tractors and sprayers allows agriculturalists to precisely apply chemicals, avoiding skips and overlaps, decreasing overall chemical use, costs, and eliminating waste and possible crop damage.

BMCC strives to meet the needs of our community – after all, that is why community is in our name. When our community and industry partners speak, we listen and respond with vital programs and trainings that meet their needs.

We provide current, relevant, responsive educational programs for our students. Our partnerships with industry help make this a reality. The

strong relationships BMCC has with industry leaders, including growers and suppliers in farming and irrigation have helped to make the Precision Irrigated Agriculture program.

I urge you to support an increase in funding to the community colleges in Oregon so that we can continue programs like this to meet the needs of our communities. Thank you for your time.