Introduction

The Central Oregon Agricultural Research Center (COARC) faculty and staff are pleased to present a summary of research activities conducted during 2011. The fifteen reports in this publication focus on grass seed (5), vegetable seed (2), potatoes and peppermint (3), forages and cereals (2), and rangeland and non-crop areas (3). We welcome you to peruse through the report, read a few abstracts and perhaps read the entire report on topics of particular interest.

After two years of discussion with growers and industry representatives we have implemented a collective response to the College of Agricultural Sciences (CAS) Dean. He challenged local beneficiaries of the branch experimental stations around the state to provide 25% of the current base budget. The assumption for maintaining the 13 locations around the state has been that they provide local value in the diverse nature of Oregon's agriculture and natural resource industries. Continued strategic investment across the state by the CAS will be guided by industry response to this challenge.

Local growers and industry representatives, recognizing the economic value provided by COARC, developed a plan for voluntary contributions to support the station. Growers across the three counties of central Oregon are being asked to voluntarily contribute \$1/irrigated acre for non-contracted crops. Seed contractors and agricultural dealers are committed to providing meaningful, annual contributions. Vegetable seed or grass seed growers have received information from these local contractors about the suggested grower contribution of \$10/acre for carrots, parsley and onions, and \$3/acre for grass seed.

COARC's economic impact upon the local agricultural community is seen through applied research, product registrations, educational programs and services, and new crop evaluation. COARC is proactive about addressing agricultural issues in the region, and providing an incentive for growers to support our research and educational activities.

A recent example is the initiation of an alfalfa variety evaluation in August that includes both conventional and Roundup Ready cultivars. For the first time, this 4-year project will provide independent feed value testing (ADF, NDF) for each of the four cuttings, in addition to the protein and yield data provided in the past. We are committed to making the results available in near real time to assist in your management decisions. This research is being funded by entry fees from the seed companies, at no cost to local alfalfa growers.

A second example is ongoing research being conducted on the amount of ammonia volatilization that occurs with urea-based fertilizers under central Oregon conditions. Losses in the 25% range, or 40 lbs N/acre, are common when urea is applied to bluegrass seed fields following the last irrigation in mid-October. What is being learned from this project is changing the way

agricultural dealers and growers are doing business related to fertilizer handling and crop fertility.

I would be happy to hear your thoughts, answer any questions, discuss your concerns, or share ideas of how we can collectively increase COARC's positive economic impact on the central Oregon agricultural community. Feel free to give me a call at 541-475-7107.

Marvin Butler, Director Central Oregon Agricultural Research Center

Note: Any reference to a product or company is for specific information only and does not endorse or recommend that product or company to the exclusion of others that may be suitable. Nor should information and interpretation thereof be considered as recommendations for application of any pesticide. Pesticide labels should always be consulted before any pesticide use.