### INVESTING IN THE FUTURE: RESEARCH DRIVES OHIO SOYBEANS

THE OHIO SOYBEAN COUNCIL (OSC) AND SOYBEAN CHECKOFF ESTABLISHED THE SOYBEAN REWARDS PROGRAM TO HELP OHIO'S SOYBEAN FARMERS INCREASE PRODUCTIVITY, YIELDS AND PROFITABILITY. BY USING CHECKOFF FUNDS FOR RESEARCH INTO NEW VARIETIES, DISEASE AND PEST MANAGEMENT STRATEGIES AND CONSERVATION PRACTICES, OSC PROVIDES FARMERS WITH THE MOST CRITICAL INFORMATION ABOUT THE LATEST TECHNOLOGIES AND TRENDS TO ENSURE THEIR OPERATIONS FLOURISH.

## OSC-FUNDED INNOVATIONS LEAD TO FARMERS' SUCCESS

OSC WORKS WITH MANY DEDICATED RESEARCHERS AND SCIENTISTS from The Ohio State University (OSU) to bring farmers the most up-to-date information on a wide variety of topics including new soybean varieties, improving yields and handling disease and pest pressures. Among others, OSC is currently funding research by Dr. Leah McHale.

Dr. Leah McHale received her Bachelor of Science in horticulture from Pennsylvania State University and her Ph.D. in plant biology from the University of California, Davis. She is currently leading an OSC-funded project to develop improved soybean varieties and germplasm specifically for the Ohio region. The ultimate goal is to combine superior traits for use in both industrial products as well as food, feed and oil with higher yields and greater disease resistance.

What this means for Ohio farmers is better seeds for their specific environment. Better seeds mean better soybeans, which leads to bigger profits, increased market share and even opening up some new markets.

# THE UGLY TRUTH ABOUT SUDDEN DEATH SYNDROME



### FIRST APPEARING IN 1971,

sudden death syndrome (SDS) has become a problem in almost every U.S. soybeanproducing state. It is a fungal disease that favors wet, poorly drained and compacted fields. High rainfall seasons also can contribute to the flourishing of SDS.

#### **TYPICAL SYMPTOMS INCLUDE:**

- LEAF DROP
- DISCOLORED AND/OR DECAYING ROOTS AND CROWNS
- YELLOW SPOTS ON THE TOP LEAVES
- BROWN LESIONS THAT SPREAD UNTIL THE LEAF IS DEAD

### TOP 3 METHODS TO MANAGE SDS

- 1. CHOOSE VARIETIES WITH HIGH LEVELS OF RESISTANCE TO THIS PATHOGEN. RESISTANT VARIETIES ARE AVAILABLE AND ARE VERY EFFECTIVE.
- 2. DON'T PUSH THE PLANTING. THIS FUNGUS FAVORS WET, COOL CONDITIONS, SO PLANT FIELDS WITH A HISTORY OF SDS LAST AND UNDER DRIER CONDITIONS.
- 3. DON'T COMPACT FIELDS. COMPACTION KEEPS SOIL MOIST FOR A LONGER PERIOD OF TIME, PROVIDING A LONGER TIME FOR INFECTION.

For the rest of this list, please go to www.soybeanrewards.org or for more information, please contact Dr. Anne Dorrance at dorrance.1@osu.edu.

