

MINUTES
SENATE AGRICULTURAL AFFAIRS COMMITTEE

DATE: Tuesday, January 30, 2018

TIME: 8:00 A.M.

PLACE: Room WW53

MEMBERS PRESENT: Chairman Rice, Vice Chairman Den Hartog, Senators Patrick, Bayer, Guthrie, Thayn, Harris, and Foreman

ABSENT/ EXCUSED: Senator Jordan

NOTE: The sign-in sheet, testimonies and other related materials will be retained with the minutes in the committee's office until the end of the session and will then be located on file with the minutes in the Legislative Services Library.

CONVENED: **Chairman Rice** called the meeting of the Agricultural Affairs Committee (Committee) to order at 8:00 a.m.

MINUTES APPROVAL: **Vice Chairman Den Hartog** moved to approve the minutes of January 16, 2018. Seconded by **Senator Thayn**. The motion carried by **voice vote**.

PRESENTATION: **Idaho Bean Commission (IBC), Andi Woolf-Weibye**, Executive Director, said in 2017 the IBC had growth in the growers attendance of their annual Bean School. They are continuing their efforts in the multi-state bean consortium. They have four grants in process and two that closed this year.

The hurricane that hit Costa Rica this year delayed trials on bean test plots. Two hurricanes hit Puerto Rico, which made it impossible to plant their bean seed plots. IBC believes that their bean seed trials in Puerto Rico will allow them to expand their seed market in Latin America.

IBC has developed a yellow bean variety named Patron. This new variety has been approved and Treasure Valley Seed has a use permit to distribute that seed. In the Mexican culture yellow beans are consumed for their breakfast meal and this is the market where this bean will be exported.

Future plans for IBC include focusing on garden beans and new markets for the product. The multi-state bean consortium has been delayed at the University of Idaho (UI). IBC submitted the Memorandum of Agreement (MOA) in August 2016 and UI has not responded to IBC. IBC is looking to contract with UI to move this project ahead. Wyoming and Colorado see this consortium as a need for their operations. The serology testing and certification program will be processed in Idaho and the trials will be conducted in the other states. IBC is pursuing trade barriers in the Mexican market with the assistance of ISDA's new marketing manager Fabiola McCullum in Mexico.

Vice Chairman Den Hartog asked if there was any indication from UI why there is a hold up on the MOA. **Ms. Woolf-Weibye** responded that they had spoken to Dean Parrella last year in May, but have had no resolution.

PRESENTATION: **Impact of the Soy Bean Cyst Nematode on Sugarbeets and Dry Beans, Roger Batt**, representing Idaho Eastern Oregon Seed Association, stated today's presentation is centered around soy bean cyst nematode in which the industry is highly concerned about this pest, along with some of the diseases and vectors that can be transmitted from soybeans to the dry bean industry.

Dr. Saad Hafez, PhD, UI Parma Extension, stated that he came before the Committee in 2006 when they discovered the potato cyst nematode, which was a disaster for the potato industry. He does not want a repeat of this problem for Idaho's bean industry. The nematode is a pest that affects many crops and can easily devastate a crop. There are four varieties that affect bean crops (see Attachment 1) and the cyst nematode can remain in the soil for ten to fifteen years. Once the host is planted these cyst nematodes hatch and attack the plants. Every area of the world where the soybean is grown have cyst nematode and the nematode has spread by moving the seed around.

A bean crop can lose 80 percent of its yield if the cyst nematode is present in the soil. A common bean is a host plant along with alfalfa. The sugarbeet cyst and the soybean cyst can mate and they produce another nematode that will survive on beans and sugarbeets. The Measuring Management Practices for Soybean Cyst Nematode throughout the world is to develop a resistant variety. **Dr. Hafez** believes this procedure is the worst technique of management for any cyst forming nematode. Once a resistant variety is developed the nematode can develop another race and then you cannot fix the resistant variety. Now the soybean breeder has twenty-eight different races of cyst nematodes instead of the one variety; if management practice has multiple races the management of control becomes difficult.

Senator Patrick stated when he raises sugarbeets his practice is to raise a radish crop before the sugarbeet crop to help control nematodes. **Dr. Hafez** explained this method is called a trap crop. The trap crop triggers the cyst nematode to hatch and once they hatch they cannot survive on the radish or reproduce. Unfortunately, this method is not available for the soybean cyst nematode. The radish trap crop will only work on the sugarbeet cyst nematode.

Vice Chairman Den Hartog questioned the slide that showed the impacts to yields on the soybean crop. She asked if there were other impacts, such as crop quality, that affect the crop. **Dr. Hafez** advised that anytime you deal with cyst nematode damage it can affect the quality, produce disease, and affect yield.

Dr. Oliver Neher, PhD, Amalgamated Sugar Company, advised that his presentation should be viewed as a technical session concerning the impact of the cyst nematode on sugarbeets. He began his presentation with the following statistics for the 2017 sugarbeet season: 177,000 acres of sugarbeets were harvested; supports 1,600 full-time employees; with annual cash receipts of \$850 million; pays employee compensation of \$61 million; with a \$90 million added value to the Idaho economy.

There are current threats to the industry besides the cyst nematode which are: 1) beet curly top virus; 2) soil-born and foliar pathogens; and 3) sugarbeet cyst nematode. Between 65 to 75 percent of their acres are already infected by the sugarbeet cyst nematode. There are control measures in insecticide, biological seed treatments, and genetic tolerance.

Mr. Neher explained that the introduction of soybeans into Idaho would bring the soybean cyst nematode to the State. The sugarbeet industry also fears that through this introduction it would bring uncertified soybean seed along with contamination. There would be infestation and penetration of sugarbeet roots, hybridization of soybean cyst nematodes, and the negative effects of a third crop of the Round-Up Ready technology. Sugarbeet cyst nematodes can effect seedlings and will open up the root for damage. There will be other bacteria and fungi penetrating the root and causing root decay and rot. The sugarbeet industry is experiencing problems with ryzotonia, which is a soil-born pathogen and the introduction of nematodes would multiply the damage.

The sugarbeet industry is concerned that the new strains will be able to feed on both hosts and overcome the genetic tolerance that is currently in place for sugarbeet nematodes. There is no known resistance to soybean cyst nematodes in sugarbeets. Sugarbeets cyst nematode is a major chain resistance with some minor chain being affected.

The ability of spraying the sugarbeet crop with a glyphosate containing herbicide is a common practice for the crop. Amalgamated Sugar is growing Round-Up Ready Sugarbeets along with Round-Up Ready Corn in Idaho. If there is a third crop, such as soybean which is also Round-Up Ready, there will be more volunteers in the field and more glyphosate spraying will be required which will increase selection pressure (see Attachment 2).

Senator Bayer asked if there was a situation where there was a sugarbeet-soybean hybrid species, would that new hybrid potentially be susceptible to a radish trap crop. **Dr. Neher** explained that the sugarbeet industry has only seen the hybridization in the lab. No studies have been done on the affects of these radish crops.

Aaron Phillips, representing Del Monte Food Operations, spoke to the issue of soybean production on the health of the bean seed crop and would be focusing on the disease aspect for the bean crops. There are two main seed production areas in Idaho the Treasure and Magic Valley. Soybeans and beans are both legume crops. Soybeans take a month longer to reach maturity than most beans. This extra month of growing gives a broader window of opportunity for disease transmittal and nematodes (see Attachment 3). Some of the diseases that soybeans could bring into the State could be potential border closers for Idaho crops. These diseases would not just be economic losses within the State, but lost opportunities for companies that do business exporting their goods.

The seed industry establishes new varieties within the State which could be susceptible to disease. These are very valuable crops and the loss of one of these crops can set back an organization several years. The Legislature understood decades ago that Idaho was a premier location for producing bean seed. They put safeguards in place that have created a thriving industry. Numerous seed companies have located their businesses in Idaho decades ago due to the environment created by stringent regulations. Relaxing rules for soybeans places these companies and their seed production operations at risk.

The UI Bean Breeding Program has been developing varieties for the State's Bean Industry since 1925 and that research continues. Idaho's bean seed crop totals 50,000 acres annually and total \$70 million in 2016. Growers make about \$2,200 per acre gross on a 3,500 pound yield and their net return is approximately \$968 per acre. A soybean grower in Illinois grosses \$680 per acre on a 72 bushel yield and the return is approximately \$300 per acre.

Senator Patrick asked if the seed companies consider diseases coming from backyard gardens. **Mr. Phillips** replied that those backyard gardens do pose threats to crops from diseases and insects.

Roger Batt, representing the Idaho Eastern Oregon Seed Association (IEOSA), said the Bean Industry is concerned about soybean production in the State. There are approximately 200 acres of soybeans already in Idaho. The bean growers are concerned about what could happen to their industry. IEOSA met with ISDA early last year to discuss proposed negotiated rulemaking. ISDA denied the request because they believe there are enough measures in place with ISDA's testing and the growers should not be concerned about the soybean cyst nematode being transported. IEOSA respectfully disagrees with ISDA's assessment.

The bean industry is requesting that the Legislature consider the following to protect the companies interests. Placing a moratorium on soybean production in the major bean production areas of the State, which are the Treasure and Magic Valleys. This is not the first time the Legislature has placed a moratorium on production of a certain crop. Through rulemaking the brassica species, canola and rapeseed species, in the late 1980s. During that time they found that oil seed brassica species canola and rapeseed, if they cross-pollinate with turnips, rutabagas and other types of seed it makes them toxic and inedible. IEOSA had a very good reason to ask for the moratorium and were able to conduct negotiated rulemaking which were adopted by the Legislature the next year. Those rules still apply today and they have worked well for those production areas. IEOSA is pursuing similar measures through legislation, since they have been denied rulemaking.

In addition, the bean industry would ask that soybeans be allowed to be regulated by the IBC. IBC would be able to work closely with the growers to make sure there would not be no potential impact in the future. This might solve problems with existing and future production in those area.

Senator Patrick declared that Idaho is one of the best seed growing states for many reasons. He asked when soybeans are grown along with sugarbeets in other states how it affects those crops. **Mr. Neher** answered that the sugarbeets grown in North Dakota's Red River Valley do not have any issues currently with soybean nematodes. They are testing heavily for these pathogens, but have not found them. North Dakota does have the soybean cyst nematode, but it has not affected the sugarbeet crops because there is no hybridization.

ADJOURNED: There being no further business, **Chairman Rice** adjourned the meeting at 9:02 a.m.

Senator Rice
Chair

Carol Deis
Secretary