



GROWING

SOUTH DAKOTA

A MAGAZINE BY SOUTH DAKOTA STATE UNIVERSITY | WINTER 2020
COLLEGE OF AGRICULTURE, FOOD AND ENVIRONMENTAL SCIENCES



**INNOVATION, INTERVENTION AND INITIATIVES
FOR THE FUTURE**

SDSU

Extension

2019 ANNUAL REPORT





FROM THE DEAN JOHN KILLEFER

"The farmer has to be an optimist or he wouldn't still be a farmer." – Will Rogers

I am continuously amazed by the ingenuity, perseverance and resilience of the great American Farmer and Rancher! There are not many professions where we have so little control over so many variables that can impact our success, or failure, than that found in the professions encompassing farming, ranching and natural resource conservation. From the impacts of Mother Nature to those of policies that influence our markets, our South Dakota farmers and ranchers have seen some of the most challenging growing seasons in recent history. In spite of the many challenges and setbacks experienced this past year, there has been a tremendous demonstration of resilience and hope throughout our industry and communities. As I have heard many times, "I can't wait to see 2019 in the rearview mirror," followed by optimistic anticipation of what 2020 will hold for us. I am proud of the resilient nature of the South Dakota farmer and rancher, and know that South Dakota State University and the College of Agriculture, Food and Environmental Sciences is here in its many capacities to partner with you as we enter into the coming growing season.

Our land-grant universities were uniquely created to serve the three important missions of teaching, research and Extension. These three missions are intertwined like a three-stranded rope, all working together to provide a stronger product than the individual strands alone. There are times when one of the strands needs to take center stage to provide the support that is necessary at a particular time. There is the constant need to provide graduates who are exceptionally well educated to meet the workforce needs of the day, research conducted to address long-range needs of our industries and to also meet the immediate needs of a current crisis or challenge, and then there are the times when we need to marshal our resources to provide the outreach and support that

our stakeholders and communities need to weather a storm. This past year shines a particular light on the latter, where we have so many individuals and communities hurting from the challenges that came with 2019. This edition of *Growing South Dakota* highlights just some of the many ways that SDSU, the College of Agriculture, Food and Environmental Sciences, and especially our SDSU Extension programs not only transfer knowledge gained from agricultural researchers but also provide support and relief to assist our many farmers and ranchers through the challenges that 2019 has thrown at us.

The very wet fall of 2018 set the stage for what was to become an extremely challenging 2019 growing season. The beginning of 2019 greeted us with hard freezing weather and excessive precipitation in the form of snow that lasted through a protracted winter. Once spring arrived, we experienced three extensive flooding events throughout the state. The first flooding event occurred with the now famous "Bomb Cyclone" that hit in the middle of March dumping heavy snow on the north and giving southeastern South Dakota a lot of rain. All of this occurred on top of frozen soil that resulted in major flooding throughout the area. Rain seemed to fall continuously throughout the spring and summer, resulting in a second flooding event for central South Dakota in late May followed by a third flood in early fall for the Madison area. Many new precipitation records were set in 2019.

Our Extension teams pulled together materials and created resources and programs to assist those being impacted by these events. Some of the resources were created to respond to the many immediate needs of our citizens, while others were created to provide support to the many long-term, chronic challenges that were being created by difficult growing and harvest seasons and the additional impacts of difficult market situations. As a result of the extreme weather that we faced in South Dakota, there were approximately 3.95 million total prevented planted acres (17 times as many acres as 2018), the most in the entire nation.

As would be anticipated, market and weather-related challenges were identified as two of the top stressors for our state's producers. Our Agricultural Economic Extension teams responded to the needs of our farmers and ranchers by providing risk management, marketing and budgeting

information and resources. In addition to these financial resources that our economists have provided, our Extension Rural Behavioral Health Team created many programs to address the acute and chronic impacts that these many challenges have had on the mental health and well-being of our farmers and ranchers. We have created the "Weathering the Storm" program that trains individuals on how to work with family members who may be dealing with excessive stress. Another program is "Communicating with Farmers Under Stress" that provides tools for counselors, agri-business and community members on how to recognize and aid those dealing with stress. Dealing with stress in our agricultural communities requires the efforts of many individuals and organizations throughout the state and nation. In September 2019, SDSU Extension partnered with the South Dakota Counselors Association to host a three-day South Dakota Farm and Ranch Stress Summit to provide information on how to provide support to individuals dealing with stress. SDSU Extension has also been providing "Mental Health First Aid Training" programs throughout the state to share this evidence-based public education and prevention tool to improve the public's knowledge of mental health and substance use problems, and how to connect people in need to appropriate care.

The SDSU College of Agriculture, Food and Environmental Sciences, and especially our Extension teams are here to help individuals and communities thrive during challenging times. The people and entities that make up the agricultural communities of South Dakota create a very special family that has bonded together to support each other as we respond to these challenging times. As I stated earlier, I am so proud of the resilience and determination of the South Dakota Farmer and Rancher as we have faced a challenging 2019. As we put 2019 into the memory books, I wish you all the very best for 2020 and everyone in the SDSU College of Agriculture, Food and Environmental Sciences looks forward to working with you to create a prosperous and less stressful new year.

All the Best! Go Jacks!

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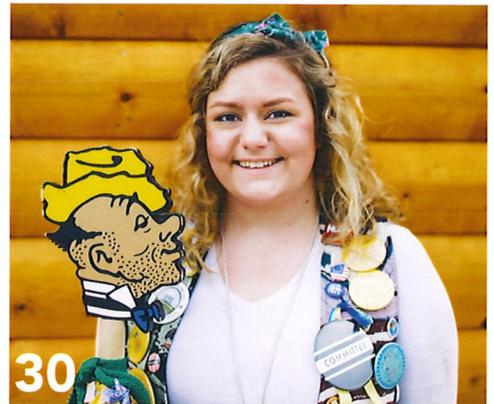
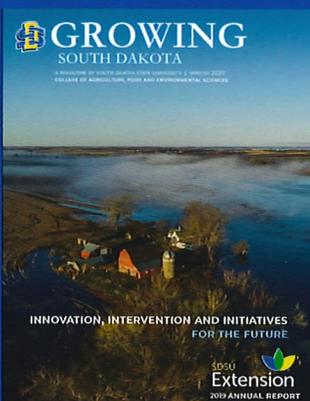
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ON THE COVER: Farmland affected by 2019 flooding and increased rainfall. Photo courtesy of Greg Latza.



Legislators, South Dakota State University faculty and staff members, commodity group representatives and various project supporters gathered to cut the ribbon in front of the newly expanded and renovated South Dakota Animal Disease Research and Diagnostic Laboratory. Lt. Governor Larry Rhoden (center) cut the ribbon.

SOUTH DAKOTA ANIMAL DISEASE RESEARCH AND DIAGNOSTIC LABORATORY RIBBON CUTTING CEREMONY

The South Dakota Animal Disease Research and Diagnostic Laboratory (ADRDL) held a ribbon cutting ceremony September 6, on the South Dakota State University campus to celebrate the upcoming official opening of the new facility in November.

“Today’s ribbon cutting represents a renewed commitment to the ongoing mission of this lab, said Larry Rhoden, Lieutenant Governor of South Dakota. “That commitment ensures that the scientists here who serve the people of South Dakota and the region have the tools they need to more safely identify diseases and conduct important research.”

The \$58.6 million expansion and renovation will ensure the facility meets federal standards and provides more space to accommodate new technologies. The new facility features a Biosafety Level 3 space to contain dangerous pathogens, offers greater security against bioterrorism as well as upgraded air, water and electrical systems. A drive-up window for dropping off samples was also added to provide clients with easy access to the lab and to enhance biosecurity.

“These are exciting times as we recognize the completion of a goal that we’ve had for a long time to modernize our veterinary and diagnostic research facility,” said South Dakota State Veterinarian Dustin Oedekoven.

Performing approximately 500,000 tests per year, the new 80,000 sq. ft. lab is made up of sections for bacteriology, clinical pathology and parasitology, DNA sequencing and bioinformatics, serology, food safety microbiology, virology, histopathology, molecular diagnostics, extension and outreach, specialized research testing, and research.

Following the move into the new ADRDL, the existing Veterinary and Biomedical Sciences building will be renovated for teaching and research purposes.

“This incredible new facility will provide hands-on training for students,” said Barry H. Dunn, President of South Dakota State University. “The experience they gain will serve them well in attaining careers in veterinary medicine, medical technology, human medicine and other science, technology, engineering and mathematical careers.”

Originally built in 1967, upgraded in 1993 and newly renovated and expanded in 2019, the Animal Disease Research and Diagnostic Lab has provided the state of South Dakota with critical research and diagnostic support to protect the citizens and the livestock industry in the state and region from disease outbreaks for more than five decades.

“The work that’s conducted here at the lab can be briefly summarized as

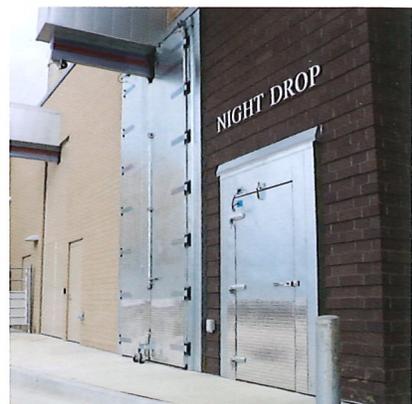
protecting animal and public health and food safety. Because of the economic impact of our animal agriculture industry as well as the critical importance of public health and food safety, the work that happens here at the lab impacts all of us either indirectly or directly,” said Oedekoven.

“This achievement of increased efficiency and service has been made possible through the continued support and cooperation of many groups,” said John Killefer, South Dakota Corn Endowed Dean of the College of Agriculture, Food and Environmental Sciences at South Dakota State University. “This was really a team effort.”

Supporters of the project include but are not limited to South Dakota’s Ag Unity, the South Dakota Association of Cooperatives, the State Veterinarian, the South Dakota Animal Industry Board, the South Dakota Veterinary Medical Association, members of South Dakota’s commodity groups, legislative leaders and the governor’s office.

“As we work to implement policies that are friendly toward producers and help support our state’s top industry, we’re proud to partner with labs like this as we look to lead the nation in innovative care and groundbreaking research,” said Rhoden.

Andrea Schubloom





FROM THE DIRECTOR OF EXTENSION KARLA TRAUTMAN

I grew up on a small farm that was an integrated livestock and crop operation. We grew it all. There was a feedlot full of cattle, a pasture full of stock cows and a herd of 30 dairy cows. There were also the barns that held the pigs, sheep, chickens, ducks and geese. We grew acres of corn, soybeans and oats. There were even a few horses that were used to check on the cows in the pasture! Every day was governed by the routine of morning and evening chores. As a young child, my job was to gather the eggs from the chicken coup. While the chores became more complex as I grew older, the value of the farm and the importance of those chores to the successful functioning of the farm were not lost on me.

I can look back today and be amazed at the diversity of that farm. Think of all the moving parts that it took to keep it going. After all, the technology to make it “all

tick” wasn’t nearly at the level it is today. It makes you wonder how a farmer even managed to accomplish what they did!

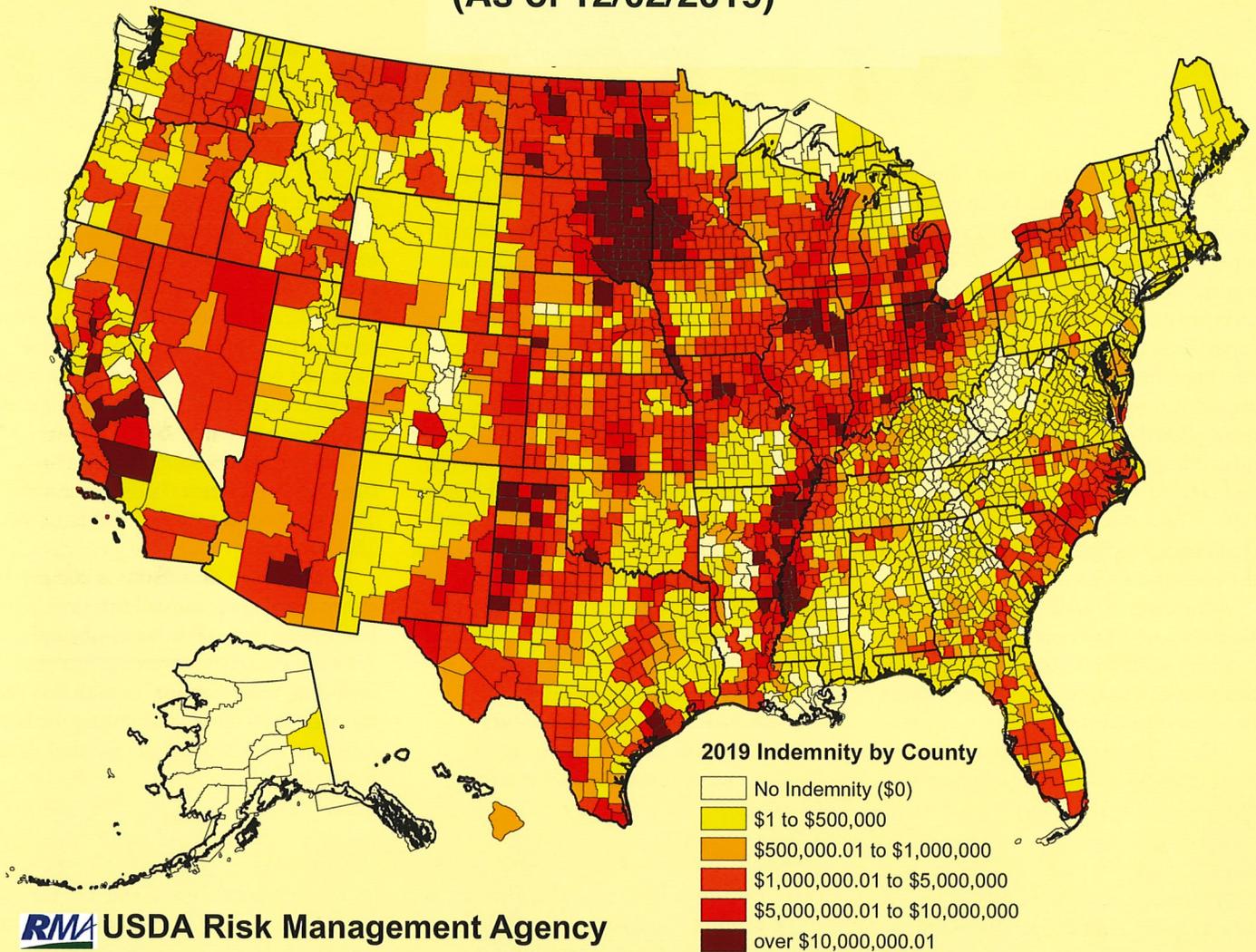
At the time, the diversity of the farm was just as much about “the way you did it” as it was about the availability of technology to manage it. Today, technological innovations are the foundation for how agriculture continues to feed the world population while providing solutions to societal challenges. It has also been a resource during challenging times – like those we have faced in 2019 at the hands of Mother Nature. Ultimately, technology is a tool and a significant one at that. The differential is the human interface. How can we focus the use of technology and innovation to answer the age old questions of “what, when, why and how” as it applies to agriculture, family and community? How can innovations help or hinder our ability to solve problems? Why is it important? What will we do with it? When will it be useful? How will it be useful? Why does it matter? How will it matter? What difference will it make?

This edition of *Growing South Dakota* highlights the work of SDSU Extension in bringing research-based knowledge to the citizens of South Dakota in the

best of times...and the worst of times. Our professionals value the importance of building relationships with people, hearing about their needs and then drawing from research to provide knowledge and innovative solutions. Their efforts tell a story of listening and caring – with the intent to learn about collective concerns and needs and then using the innovations of research and knowledge to provide applicable solutions that mitigate the challenges that producers, families and communities face. Ultimately, SDSU Extension strives to connect the dots between the challenge, research, and innovations in technology. That connection is critical to providing producers, families and communities with solutions that answer the critical questions of who, what, where and when in the quest of improving their quality of life for themselves and the communities they call home.

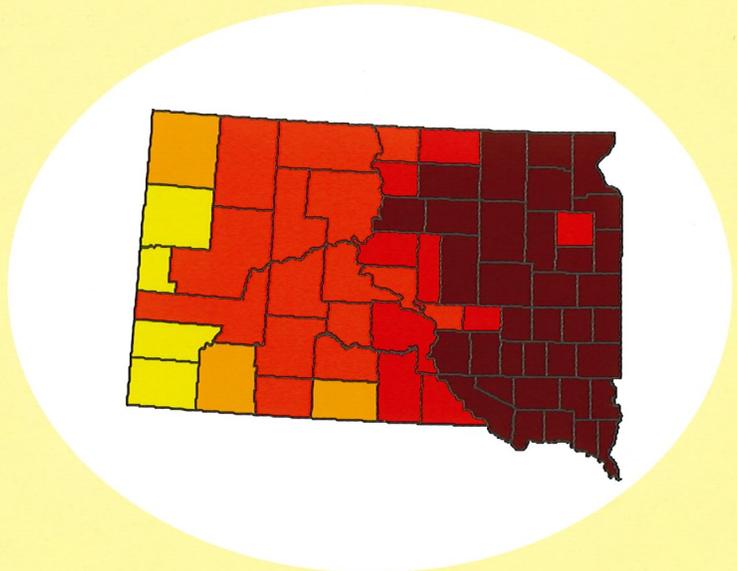
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2019 USDA Risk Management Agency Crop Indemnities (As of 12/02/2019)



"As a result of the extreme weather that we faced in South Dakota, there were approximately 17 times as many prevented planted acres in 2019 than in 2018 – the most in the entire nation."

- John Killefer, South Dakota Corn Endowed Dean of the College of Agriculture, Food and Environmental Sciences



SDSU EXTENSION RESPONDS TO MOTHER NATURE

During years when many South Dakotans are faced with great challenges, the role of SDSU Extension is especially important to provide unbiased, research-based information and assist in meeting people's needs. SDSU Extension experts were quick to respond to the effects of the extreme weather and the impact it made on the state this year. The team offered educational programming, hosted trainings and open house meetings, and created a variety of opportunities for face-to-face and online dialogue about the challenges people were facing as a result of the excessive moisture.

According to South Dakota Governor Kristi Noem, 63 of South Dakota's 66 counties submitted disaster declarations this year due to record-breaking storms, floods and tornadoes.

"The weather extremes that have been faced by agricultural producers

and South Dakota communities during 2019 have been unprecedented. SDSU Extension professionals have prioritized direct interaction with the agricultural community by providing unbiased, research-based information and assistance based on the issues that producers have articulated as important. From livestock and agronomic needs both short and long term, to the needs of individuals, families and communities who have been affected, the SDSU Extension team is here to provide the educational resources and technical information that will be the most impactful for them as they make critical decisions both now and in the future," said Karla Trautman, SDSU Extension Director.

According to SDSU Extension State Climatologist Laura Edwards, a combination of last fall's moisture saturating soils and then freezing, as well as a cold winter with above average

snowfall, all contributed to the excessive moisture that occurred this year.

There were three notable flooding events that occurred during 2019. The first was in mid-March when a bomb cyclone hit southeastern South Dakota and heavy snow in the northern part of the state. "The rain on top of snow on top of frozen soil all contributed to excessive moisture in the spring," Edwards said.

The second notable event was in late May in the central part of the state. The third was in mid-September in the Madison area.

"Overall, the whole state is 200 percent above the average rainfall this year. It has really been unusual to be consistently wet. A lot of new records were set this year, including record annual rainfall this April through September considering the last 125 years of South Dakota weather data," Edwards said.

IN 2019

According to the U.S. Department of Agriculture, due to excessive moisture South Dakota producers were unable to plant just shy of 4 million acres this year, the greatest amount of unplanted acres of any state in the nation and a record for South Dakota. In comparison, in 2018 there was a total of 227,646 prevented planted acres in South Dakota.

Around February, Edwards and several other members of the SDSU Extension team started having conversations about how to address the issues that many South Dakotans were likely going to face come spring.

“We pulled together a flood response team, which included people from all the extension program areas. We created and shared a lot of information and resources that could be helpful to all who might be effected by the excessive moisture, whether it be communities, businesses, farms, etc.,” Edwards said.

Addressing Farmer Stress

The SDSU Extension Rural Behavioral Health Team implemented a variety of programs to address and bring awareness around farmer stress and mental health.

The “Weathering the Storm in Agriculture: How to Cultivate a Productive Mindset” workshop is designed to provide healthy stress management strategies for farmers and ranchers when dealing with the impacts of chronic stress and trains individuals how to work with family members who may be dealing with stress.

The “Communicating with Farmers Under Stress” workshop provides tools for individuals who regularly work with the agriculture community, such as helping professionals, agri-business professionals, service members and clergy, on how to recognize and aid those experiencing chronic stress.

As of October, the team had trained

over 100 participants in the farm stress curricula and plans to continue offering the workshops into next year.

SDSU Extension partnered with the South Dakota Counselors Association to host a three-day South Dakota Farm and Ranch Stress Summit in September. Over 100 attendees took part in a variety of breakout sessions and topics about dealing with stress.

“The goals of the summit included educating counselors, social workers, psychologists, and other helping professionals on farm stress; bringing farmers, ranchers and helping professionals together to share perceptions and ideas on mental health; and increase mental health literacy among agricultural producers and those that work with them,” said Andrea Bjornestad, SDSU Extension Mental Health Specialist.

The summit also offered a Mental



Ag Economic Dialogues

The SDSU Extension Economics Team hosts Ag Economic Dialogues monthly that focus on specific and relevant topics for farmers and ranchers. A survey conducted by SDSU Extension experts of farmers and ranchers revealed that markets and weather were the two main factors causing producers the most stress going into the fall. Therefore, the team tailored the August, September and October Ag Economic Dialogues to address their concerns.

“Given the planting and calving season issues this year, producers dealt with fewer bushels and calves to market this fall. With that expected decrease in income, we provided risk management, marketing and budgeting information to aid the producers’ decision making for fall and into spring 2020,” Gessner said.

Attendees joined the dialogues in person at the Sioux Falls Regional Extension Center or via online webinar.

Field Days

The SDSU Extension Agronomy Team hosts annual field days at five of the South Dakota Agricultural Experiment Stations across the state to showcase and share results of research trials being conducted on the farms. However, this year the team took a different approach.

“We started the field days with answering farmer’s questions first and then looking at the research plots if there was time left. Each farmer was facing a different situation this year and they came with many questions, so we wanted to make it a priority to help get their questions answered,” said Paul Johnson, SDSU Extension Weed Science Coordinator.

Health First Aid Training for individuals across agriculture and community landscapes. Mental Health First Aid is an evidence-based public education and prevention tool to improve the public’s knowledge of mental health and substance use problems and provide assistance to those in crisis. As of October, the training has been provided by SDSU Extension personnel eight times in six locations across South Dakota and continues to be offered by request.

“Mental Health First Aid Training gives the skills needed to reach out and provide initial support to someone who may be developing a mental health or substance use problem and help connect them to appropriate care,” said Hope Kleine, a Mental Health First Aid Instructor and SDSU Extension Health Education and Food Safety Field Specialist.

Additionally, in 2018-2019, Bjornestad gave 23 presentations to a variety of agricultural organizations and groups across South Dakota on farm stress. Her presentation included education on signs and symptoms of stress and depression, as well as risk factors for suicide.

“My goal is to bring awareness around farm stress and mental health,” Bjornestad said.

Open House Meetings

The SDSU Extension Agronomy Team responded to flooding and excessive moisture early on by holding winter agronomy meetings and open house meetings throughout eastern South Dakota in January and April. The team held three winter agronomy meetings in January in Tyndall, Mitchell and Burke. These were held in conjunction with private pesticide

applicator trainings.

“The idea behind the winter meetings to provide an agronomy update for areas really hit hard by the weather last fall and winter,” said Sara Bauder, SDSU Extension Agronomy Field Specialist. “These focused on grain storage, farm economics, climate updates, field ruts and other timely topics.”

As spring approached and with wet conditions continuing, Bauder decided to hold more open house meetings in April across 10 locations in eastern South Dakota. The meetings had a variety of experts on site, including several SDSU Extension specialists, USDA’s Natural Resources Conservation Service staff, USDA’s Risk Management Agency staff, local crop insurance agents and agri-business people.

“The open houses offered an opportunity for producers to ask any and all questions they had in an informal, comfortable setting,” Bauder said.

Many producers planted crops this year that they don’t typically plant, mainly cover crops and forages, so Bauder said they had a lot of questions about planting, harvesting and storing them, as well as feeding them to livestock. Additionally, she said there many questions about crop insurance, conservation programs, weed and pest management, and pre-planning to best manage crops next year.

“We want people to know that we are available to answer questions and offer resources. Everyone is at a different place this year because of the weather and we strive to answer questions for each individual seeking assistance for what they are facing,” Bauder said.

SUCCESSFUL ENERGIZE! CONFERENCE BUOYS COMMUNITY EFFORTS IN LEMMON & BEYOND

Cool, rainy weather in Lemmon, S.D., didn't dampen community spirit on April 30 and May 1, when the community hosted the state's Energize! Conference facilitated by SDSU Extension's Community Vitality Team. Over 120 community leaders from South Dakota, North Dakota, Michigan and Kansas gathered for the conference to gain new perspectives and share ideas in revitalizing rural communities.

Dave Bonde, executive director of Fort Pierre Development Corporation, has attended the conference for two consecutive years and continues to be energized by the ideas shared by presenters and participants.

"When you get a group of small communities together, it's amazing how many are working on the same issues," Bonde said.

This was the second year that SDSU Extension held the Energize! Conference in the state and Lemmon community members were eager to welcome conference attendees. The unique conference aims to re-energize rural communities with populations smaller than 5,000. The format is unique in that breakout sessions are held at various businesses within walking distance of one another along Main Street. This provides

attendees an opportunity to visit the businesses and also gets business owners and community members involved with the conference.

The conference kicked off with keynote speaker Brett Comstock, a rural entrepreneur from Nebraska, and was followed with breakout sessions featuring more than a dozen different speakers from small communities across the state. Topics discussed ranged from providing housing and healthcare to establishing a business in a rural community and involving youth on community boards.

Cathy Evans, executive director of the Lemmon Housing Authority, attended the inaugural Energize! Conference in De Smet last year.

"I was thoroughly impressed; it was among the top three conferences I have ever attended. A lot of people I know [from community development] from across the state were there. After it was over, I just felt we needed to bring this conference to Lemmon," Evans said.

Of the two-day event, Judy Larson, who farms with her family near Lemmon, expressed, "It was a good chance to showcase the many things happening in Lemmon. We have several young entrepreneurs as well as a strong group of artists and creators in our community."

Larson is the current president of the Placemakers Co-op, which helped host the conference. The group of creative community members has spearheaded hosting various art classes and community events within Lemmon.

Most importantly, Larson believes the conference brought new confidence to the community. She explains, "Bringing people from outside Lemmon to our community helped many of us see ourselves differently... I think it helped Lemmon business owners and community members realize the intrinsic value they bring and how exceptional they are."

Additionally, as a result of successfully hosting the conference, Larson says Lemmon community members recognize there may be more opportunities to host small conferences and events.

"We proved that we can host something like this. We have the resources of a nice hotel, a theatre and the Beeler Community Center... We can work together and have a vibrant community," said Larson.

The 2020 Energize! Conference will be held in Milbank, S.D., on May 5 and 6. If you have more questions about the event, contact Paul Thares at paul.thares@sdstate.edu or at (605) 374-4177.

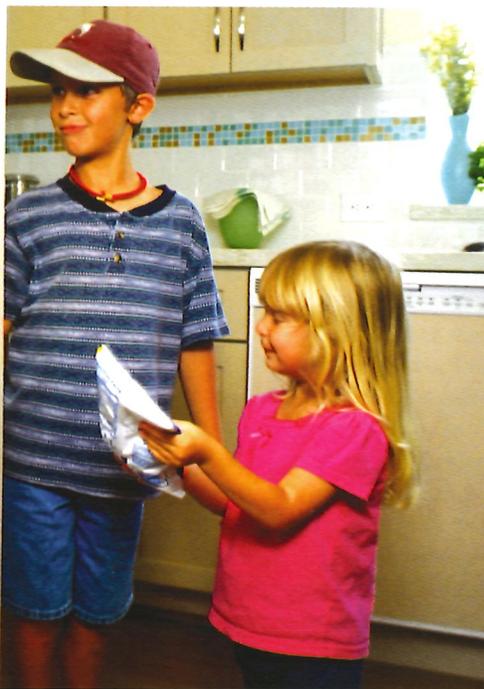
Sydney Meyer

Top Right: Kevin Wientjes and Bruce Brandner of the Herreid Community Foundation talked about getting the foundation started.

Below Right: The group of participants in the 2019 Energize! Conference.

Below: Kate Westphal, owner of Romancin' the Range, shared her experience of starting her own business in Lemmon at a young age.





HELPING LOVED ONES TRANSITION SMOOTHLY

The SDSU Extension Gerontology Team is hosting Lunch and Learn Webinars to provide opportunities for South Dakotans to learn about aging and information to consider in order to age well. The webinars also cover topics that can be useful for people with concerns about older loved ones.

“Increasing age and end-of-life are important times of life. The decisions we make as younger people influence the opportunities available to us as older people,” said Leacey Brown, SDSU Extension gerontology field specialist.

Five webinars were held in 2019. The summer 2019 pilot of the Lunch and Learn Webinar series covered family caregiving, difficult conversations between aging parents and adult children, aging well, long-term care planning and myths about the aging brain. The webinars are meant to be convenient so people can view the content over their lunch hour or watch the recordings at a later date.

“Participants indicated they plan to use the content in various ways, including discussing caregiving with family, reviewing personal long-term care plans, writing wills, utilizing strategies to have difficult conversations, being more conscious of how language reinforces

stereotypes, etc.,” Brown said.

More Lunch and Learn Webinars are scheduled for January, February and March, and topics that will be covered include 10 signs of Alzheimer’s disease, financial exploitation and strategies to stay in the home.

Dakotas Housing Study

SDSU Extension and NDSU Extension recently teamed up to conduct the Dakotas Housing Study, which showed that housing appropriate for successful aging in place is largely absent in both states. Over 600 people across South Dakota and North Dakota participated in the study.

“The purpose of this study was to explore how residents think about housing and aging in place,” said Leacey Brown, SDSU Extension Gerontology Field Specialist.

In South Dakota, 89 percent of older adults report a preference to remain in their homes and communities as they enter later stages of life. However, many older adults who plan to remain in their homes may have a difficult time accomplishing this due to a lack of appropriate housing.

Strategies to build homes that are suitable for aging in place are known,

but implementation has been sparse. Brown said a discrepancy exists between consumer preferences and housing options available in the current stock of homes. Most homes are missing one or more of the basic accessibility features, including no-step entrance and single floor living; extra-wide hallways and doors; lever style door handles and faucets; and accessible electrical controls. Even when these features are present, a home may not be aging in place ready. For example, the kitchen or laundry room may contain design elements that make performing routine tasks difficult.

“Lack of consumer demand is a common reason for aging in place ready homes not being built. The results of this study suggest consumers may have greater interest than housing industry professionals realize,” Brown said.

Design strategies, such as universal design, that can create aging in place ready homes without the stigma or limitations of accessibility, are largely unknown to most residents.

“What sets universal design apart from accessibility is that it is meant to meet the needs of people taller than average, shorter than average and with and without disabilities,” Brown said. Most study participants were unfamiliar with universal design.

Unlike other design approaches, such as accessible, barrier-free, etc., universal design does not offer prescriptions to meet the needs of unique individuals. The goal is to ensure the solution for one user does not interfere with how another person interacts with the space or product.

Despite consumer preferences and the high likelihood that a person with a disability will interact with most homes in the housing stock, universal design has not been implemented in the housing stock.

Beyond the preference of older adults to remain in their homes and communities, the study showed increasing the availability of aging in place ready homes will likely benefit individuals, families and communities in a variety of ways. Eliminating the need for home modifications, specifically environmental adaptations to support activity performance of people with disabilities, may reduce financial strain on nonprofits and government agencies.

“By the time older adults need home modifications, many are living on a fixed income, meaning they are unable to afford the needed adaptations to their home,” Brown said.

Additional benefits may include improved health and wellness among older adults by enhancing their abilities to perform routine activities such as meal preparation and personal cares like bathing, among other tasks.

“We hope results of this report will help to expand the discussion on housing in South Dakota. Updating the housing stock in South Dakota will take a significant amount of time. This report provides recommendations and strategies that communities might use to increase the availability of aging in place ready homes,” Brown said.

The report includes the results of the research project and recommendations for individuals, families and community leaders on how to increase the availability of homes in South Dakota that allow older South Dakotans to accomplish their goals. To view the full report, visit extension.sdstate.edu.

Sydney Meyer



Workforce Development



Certifications

- Certified Crop Advisors
- Commercial and private applicators
- Concentrated animal feeding operations
- Food safety 3rd party processing authority
- HOSTA



Continuing Education

- Native American Beginning Farmer Rancher Development Program
- Community and school gardens
- Farm to school
- Food product development, processing and marketing
- Community and workplace wellness
- Employee financial literacy
- Science of Agriculture
- Ag CEO
- Small Business Basics
- Small Business is Everybody's Business
- Veterinarians: South Dakota One Health, Applied Reproductive Strategies in Beef Cattle
- Field days, including integrated pest management
- Master Gardeners
- Artificial insemination school



Train the Trainer

- Native American Traditional Games
- Yoga for Kids
- Better Choices, Better Health® SD
- 4-H Shooting Sports
- 4-H Robotics
- Strengthening Families Program 10-14
- Food preservation



13 S.D. VISTA MEMBERS SERVED



12,400 HRS.
IN THE 2018-2019 YEAR



AMERICORPS VISTA MEMBERS EXPAND EXTENSION PROGRAMMING

For the third year, SDSU Extension has been the recipient of an AmeriCorps VISTA (Volunteers in Service to America) grant that allows SDSU Extension to hire AmeriCorps VISTA members to build the capacity of SDSU Extension programming. AmeriCorps VISTA improves lives and strengthens communities while fostering civic engagement and building a stronger workforce through service and volunteering.

“AmeriCorps VISTA service members work with SDSU Extension staff to increase knowledge of and access to physical and financial health and wellness techniques in effort to bring economically disadvantaged South Dakotans out of poverty,” said Aimee House Ladonski, SDSU Extension AmeriCorps Program Director and Volunteer Development Field Specialist.

These members dedicate a year to advance programming in tribal local foods, family resource management, gerontology, health outreach and nutrition education. In exchange for a year of service, members receive a monthly living stipend, an education award that can be applied toward tuition or student loans, professional development, healthcare benefits and noncompetitive eligibility for federal jobs.

“During the 2018-2019 program year, AmeriCorps VISTA members served 12,400 hours. Since the program’s inception at SDSU Extension, members have served 19,200 hours, to benefit

South Dakota’s communities,” Ladonski said.

SDSU Extension AmeriCorps VISTA members that served during the 2018 – 2019 program year were:

- Monica Herrera - Gerontology
- Paige Madsen - Gerontology
- Benjamin Grubb – Wokini Tribal Outreach
- Hunter Olson – Healthy Schools
- Amanda Crawford – Health Outreach, Better Choices Better Health SD
- Jackie Salono – Tribal Local Foods
- Nick Ciaramitaro – Tribal Local Foods
- Patrick Hall – Tribal Local Foods AgrAbility
- Matthew Smith – Communications
- Mackenzie Smith – Family Resource Management
- Elizabeth Word - Family Resource Management
- Missy Korczak – AmeriCorps VISTA Leader
- Srilata Tipaji – SDSU Grant Program

For more information about the program, contact Aimee Ladonski at aimee.ladonski@sdstate.edu or 605-782-3290.

Sydney Meyer



Above: From left to right: Faye Harris, Prairey Walking; SDSU Extension Family and Community Health Field Specialist (back), Janet Speidel, Kiley Hump; Chronic Disease Prevention and Health Promotion Administrator for the South Dakota Department of Health, Angie Brown, Community Health Manager for Wellmark Blue Cross and Blue Shield (front) pose with the \$5,000 check given to the city of Martin.

SOUTH DAKOTA WELLNESS COALITIONS MAKE BIG IMPACTS IN SMALL COMMUNITIES

SDSU Extension has been working extensively to build wellness coalitions across the state. These coalitions aim to improve the lives of rural community members by encouraging healthy lifestyle habits. The wellness coalitions are guided by SDSU Extension staff to implement nutrition, physical activity and gardening interventions.

SDSU Extension has been working with community members all across South Dakota communities including Elk Point, Herreid, McLaughlin, Lower Brule, Crow Creek, Lakota Homes, Dupree, Martin, Kyle, Wagner, Lake Andes and De Smet.

These coalitions are comprised of community members ranging from individuals working in local healthcare,

schools, city representatives, food pantry staff, and youth.

Each coalition has assessments to engage the local community to help implement health initiatives. These health initiatives promote access to healthy foods, increase healthy eating behaviors and encourage participation in physical activity opportunities. Each coalition selects programs to implement based on the needs of the community. Initiatives included increasing healthy retail options, community gardening, classes on safe food preservation practices, and working with school lunch programs to offer healthier options for students.

Across the state, 13 community gardens have been established, resulting in over 7,000 produce items being harvested. A significant portion of the produce harvested was donated to local food pantries. Three community fitness zones have been established, increasing access to free physical activity opportunities.

The city of Martin was recently presented the 2019 Healthy Hometown Community Award during the Chronic Disease Partners/ Better Choices, Bette Health® Meeting in October. The award

recognized the Martin community for its accomplishments in health improvement initiatives within the community. The Martin wellness coalition has implemented several school wellness initiatives, purchased wellness equipment to be used at the Bennett County Fitness Center and in Bennett County schools, implemented the Bountiful Backpack Program, built a community garden and more.

“I’ve just seen so much growth, and there’s so much that has been accomplished. From the nutrition education that our children are receiving to young adults learning to cook healthier meals for their children. Also the Stock Healthy Shop Healthy program, the free fruit for our children, the walking and running path, our 5K run and the community garden,” said Nathania Knight, SDSU Extension Family and Community Health Associate.

Funding for the coalitions is provided by the 1416 and 1890 CDC High Obesity Prevention Grants, a Well Connected Communities Grant, and the USDA’s Food and Nutrition Services Supplemental Nutrition Assistance Program Education (SNAP-Ed).

Nicole Hudson



EXTENSION PROGRAMS IN OUR OWN WORDS

SDSU Extension programs are impacting the lives of people throughout South Dakota. Here is a brief snapshot of some of the efforts taking place to benefit our stakeholders.



John Ball, Forestry Specialist – Addressing Emerald Ash Borer

“Emerald ash borer, an Asian borer that kills ash trees, arrived in the U.S. in the early 1990s and has killed more than 100 million trees in 34 states. It was confirmed in Sioux Falls last year by SDSU Extension. During the next few decades, South Dakota could lose 99% of its ash trees in communities, riparian forests and windbreaks.

SDSU Extension is working with the USDA Animal and Plant Health Inspection Service, the South Dakota Department of Agriculture and communities to help slow the spread across the state, allowing time to plan for the loss of this resource. We are also assisting communities in inventorying their trees and training commercial applicators in treatment methods.”

Amber Letcher, 4-H Youth Development Specialist – Strengthening the Heartland

“The potential for experiencing injury or chronic pain is high in the agriculture and manufacturing industries and one possible treatment for on-the-job injuries may involve prescription opioids. Without access to proper education, the risk of unintentional misuse or dependence on prescription pain killers may increase.

Strengthening the Heartland is a multi-state, collaborative program between SDSU Extension and NDSU Extension dedicated to preventing opioid misuse in rural communities across the Dakotas. Strengthening the Heartland facilitates evidence-emerging prescription opioid misuse prevention programs, while also providing educational resources such as webinars and print materials for front line professionals who support rural communities. The program started in September 2018 and presentations began in January 2019. In the first year of programming, 1,518 youth and adults in South Dakota participated in the opioid misuse prevention programs. Evaluation results indicated a significant increase in knowledge of safe prescription opioid use practices from pre-test to post-test.”



**STRENGTHENING *the*
HEARTLAND**



Kari O'Neill, Community Vitality Field Specialist – Change Network and Emergency Preparedness Training

Change Network

“Sponsored by the Bush Foundation, the Change Network helps South Dakotans lead change within their organizations and communities in a more equitable and inclusive manner. Now in its third round of the year-long cohort, there have been over 45 participants from across South Dakota.

The cohort meets throughout the year and participants attend educational trainings where they have opportunities to network with their fellow participants and other leaders across the state. The Change Network has an emphasis on leadership and works to build participants’ skills in diversity, inclusion and equity. By doing so, the goal is to then equip the leaders to strengthen their own organizations and

communities in which they live through grant-funded projects.

Each participant chooses a “champion” who serves as their mentor and supporter throughout their project. Additionally, each participant is assigned a confidant that serves on the leadership group for the Change Network and provides guidance throughout the participants’ projects.

Each member of the cohort is trained to fill out a logic model, a \$5,000 grant application and a budget to carry out a project to benefit their community or organization. Plans for a fourth cohort are underway and SDSU Extension hopes to serve as a conduit in keeping alumni of this important program moving forward.”

Emergency Preparedness Training

“SDSU Extension Community Vitality has been working with Partnership with Native Americans (PWNA) since 2015 in eight reservation communities across four reservations to assist residents in planning for emergencies.

Community Vitality staff assist each community with asset mapping, forming action plans, updating action plans, and producing a ripple map at the end of the project to show their progress. SDSU Extension conducted surveys and interviews for an assessment of how the project has impacted their community. As the project unfolds, small reservation communities will add beneficial services and equipment to better prepare for emergencies.”



Jason Schoch, Tribal Local Foods Associate – AgrAbility Program

“The vision of AgrAbility is to enhance quality of life for farmers, ranchers and other agricultural workers with disabilities, so that they, their families, and their communities continue to succeed in rural America. SDSU Extension’s Tribal Local Foods Program’s Tatanka Ki Owetu program is a pilot AgrAbility project funded by USDA-NIFA that focuses on the Pine Ridge Reservation. Our program focuses on developing service capacity through innovative educational programs designed to advance individual capabilities, adapt new technologies and deliver program content through appropriate educational venues.

The South Dakota Tatanka Ki Owetu AgrAbility project is unique across the United States as far as AgrAbility projects go because we are focusing on new tribal farmers who are coming into agriculture with existing disabilities, not established producers. Most AgrAbility programs in other states only work with established producers who have either suffered an accident or have been diagnosed with a chronic and disabling condition, primarily connecting them with assistive-technology resource providers such as state vocational-rehabilitation programs or business providers. With Tatanka Ki Owetu, we develop most of our assistive technology locally, only transferring a client to another resource provider when their level of disability is beyond our ability to assist them directly. The reason for this is because our clients lack developed or existing infrastructure, struggle for access to land or capital and/or because the state of persistent-poverty and intergenerational trauma often means that our clients live with both mental and physical disabilities, as well as behavioral or cognitive disabilities in many cases. As a result, our team spends significantly more time with clients on the ground than do other programs.

USDA and the National AgrAbility project are watching our pilot program to see if our approach could be replicable not only nationwide in areas of high poverty, but also in working with Tribal Nations across the U.S. In the first year of the program so far, SDSU’s Tribal Local Foods AgrAbility team has assisted the startup of five new disabled tribal farm operations on the Pine Ridge Reservation and developed a Tribal New Farmers Guide, which will serve as one of the core elements of the next generation of South Dakota AgrAbility in the future.”

Anthony Bly, Soils Field Specialist – Every Acre Counts

“Every Acre Counts is a project that focuses on improving the profitability, diversity and ecosystem benefits of agriculture by using precision technologies to empower producers to help make informed management decisions for every acre of their operations. Every Acre Counts has a significant opportunity to improve on-farm profitability through input/expense reduction on marginal lands in South Dakota.

Marginal lands, which are field areas that continually have a history of losing money, will be identified with precision software using historical yield history and variable economic crop inputs. When farmers use alternative practices on marginal lands, they can improve on-farm profitability, soil health, water quality, wildlife habitat and other ecosystem services.

Every Acre Counts is currently seeking producers with eroded, salty or wetland soils interested in considering the program within the 15 targeted counties, including Brown, Clay, Clark, Spink, Faulk, Potter, Walworth, Edmunds, Lake, Moody, Minnehaha, Buffalo, Jerauld, Brule and Aurora. We have secured the precision software to do the yield and economic analysis to identify marginal lands and are currently analyzing 2,500 acres. Our acreage goal is 40,000 acres influenced over a five-year treatment period.

The goal is for the program to spread statewide and eventually nationwide. The supporting partners are South Dakota Soil Health Coalition, South Dakota Corn, Pheasants Forever, Ducks Unlimited and South Dakota Game, Fish and Parks.”



Russ Daly, Veterinarian – One Health Program

“South Dakota One Health is a collaborative effort that promotes a deeper understanding of the connections between the health of people, animals and the environment. There might not be any place in the U.S. where the One Health concept is more important than in South Dakota. For example, rates of certain zoonotic, animal-to-people spread diseases, such as E. coli O157 and cryptosporidiosis in South Dakota citizens are among the highest in the country. We are also one of the largest farm and rural populations in the country, with a correspondingly high rate of contact with animals. Potentially deadly zoonotic diseases such as rabies, tularemia, and plague are endemic in our state. Understanding these conditions and how to best approach prevention are of great importance to our citizens.

SDSU Extension partners with the Sanford USD Medical School, the South Dakota Department of Health, the South Dakota Animal Industry Board, and Area Health Education Centers to provide educational opportunities surrounding different topics important to those who live and work in the state and region. These educational opportunities include semiannual seminars open to the public and an informational website, www.onehealthsd.org. The seminars choose a One Health topic of interest to South Dakotans and enlist speakers and experts to explore the human health and animal health aspects of the topics. Attendees include doctors, nurses, veterinarians, livestock producers, regulatory agency staff and members of the general public. Past programs have examined antibiotic resistance in people and animals, use of therapy animals in healthcare settings, influenza in people and animals, and many others. The South Dakota One Health seminars have inspired many other states to spur their own One Health efforts, including Arkansas, Idaho, Iowa and Montana, to name a few.”

EXTENSION PROGRAMS IN OUR OWN WORDS

CONTINUED...



Jennifer Foliard, Family and Community Health Field Specialist – Farm to School Manual

“Farm to School enriches the connection between agriculture, schools, parents, students and the community through food education, gardening or local food procurement in the school setting. These activities as part of farm to school, have been shown to improve students’ health and nutrition, social skills, leadership skills and behavior. Also, South Dakota children directly benefit by having fresh, local food to eat during the day. Additionally, new markets can emerge for producers by selling directly to schools. This summer, SDSU Extension, the South Dakota Department of Agriculture and Dakota Rural Action, released the South Dakota Farm to School Guidebook. The guidebook provides a roadmap for schools and producers on how to implement farm to school in their communities. Farm to School programs are emerging throughout the state

and the development of the South Dakota Farm to School Guidebook will help more communities launch or grow their program.

Farm to School and the guidebook are tools to build on the rich connection that already exists between food production and communities in South Dakota. This program cuts across all sectors, engages communities in a new way to improve the health of their children and highlights the importance of South Dakota producers and South Dakota grown and raised products.”

Curtis Braun, Food Safety Field Specialist – Food Safety and Small Businesses

“Food processors need to ensure that they are making safe and wholesome foods. Some small food processors are not aware of FDA Food Safety Modernization Act (FSMA) requirements, which shifts the focus of the nation’s food safety system from responding to foodborne illness to preventing it.

As a Preventive Controls Qualified Individual (PCQI), I am qualified to write FSMA food safety plans. I work with small businesses throughout South Dakota to write food safety plans, as well as create prerequisite programs to support the plans. I also provide ongoing support to the small businesses to maintain their food safety plans. This work helps ensure that food is safe and meets regulatory requirements. It also allows processors to expand their distribution footprint outside South Dakota borders by selling to wholesalers.”



George Perry, Beef Reproductive Management Specialist – Precision Livestock Production

“Precision Livestock Production is the use of advanced technologies to optimize the contribution of each animal. When we put this into perspective of beef production, it is estimated that we need to double beef production by 2050 to meet the demands of the world’s growing population. Our laboratory is working on how to increase the percentage of beef cows that conceive early in the breeding season and how to decrease embryonic losses.

Previous research shows that animals that conceive early wean the equivalent of an extra calf in weaning weight during their life. Thus, by getting more cows to conceive early in the breeding season, we can have a huge economic impact on the state of South Dakota. Animals that conceive early in the breeding season will produce more pounds of calves over their lifetime. When they conceive to proven genetically superior sires through the use of artificial insemination, cows can produce calves that are faster growing and produce a higher quality product.

Embryonic losses are the other major limitation to efficiency in beef production. If an animal conveys but loses that embryo, it is a minimum of 21 days until she has a chance to conceive again. This loss of 21 days is the equivalent of 40 to 50 pounds of weaning weight. If we could prevent embryonic loss in just five out of every 100 cows, it would be possible to wean up to an additional 2,100 pounds of calf for every 100 cows.”

SDSU Extension Hosts Summer Range Workshops

Youth and adults of the Sicangu Oyate (Rosebud Sioux Tribe) and the Oglala Lakota Nation participated in range workshops this summer put on by SDSU Extension, the Natural Resources Conservation Service and partners.

4th Annual Rosebud Range Workshop

Youth from the Mission Boys and Girls Club and local 4-H clubs, as well as local adults, took part in the 4th Annual Rosebud Range Workshop held in late July at the Rosebud Sioux Tribal Ranch.

“The youth learned differences in grasses, forbs and shrubs. They also learned if the plants were native to the prairie or introduced, cool season or warm-season, and perennial or annual growth periods. Medicinal uses for each plant were also discussed,” said Sean Kelly, SDSU Extension Range Management Field Specialist.

T-shirts and backpacks filled with conservation information, activities and items were given to youth in attendance compliments of the RST Tribal Ranch and South Central Resource Conservation and Development Council.

The adult workshop started with plant

identification in the pasture. Cultural and medicinal uses were also discussed for each plant. Following plant identification, there were demonstrations on calculating stocking rates and carrying capacities from utilizing grass clippings and a grazing stick. Participants also learned how to utilize a rainfall infiltration kit. Grazing kit bags with all the tools necessary to calculate stocking rates were provided to the adult participants compliments of the RST Tribal Ranch.

“Participants came from near and far to attend this excellent educational opportunity to learn more about the land. The land has so much to teach us and physically being on the land is the best classroom,” said Kelly.

The workshop was coordinated by the Natural Resources Conservation Service (NRCS), SDSU Extension and the RST Tribal Ranch.

Kyle Range Workshop

SDSU Extension and the Natural Resources Conservation Service (NRCS) partnered with Lakota Funds to host a range workshop for the Oyate (people) of Oglala Lakota County. Located in the heart of some of the most diverse and scenic

tracts of native rangeland in South Dakota, participants gathered at the Lakota Trade Center in Kyle, S.D. on June 7.

The day began with classroom instruction and demonstration of a tabletop rainfall simulator. The afternoon consisted of traveling to a nearby range unit for field activities. SDSU and NRCS staff provided information on rangeland inventory, grazing systems, calculating stocking rates, carrying capacities, soil health and plant identification, which also included cultural and medicinal aspects.

“Participants expressed their appreciation for the opportunity to learn more about the land and their interest in future informational activities. Next year, the team hopes to expand the learning opportunities of the range workshops to the Pine Ridge and Oglala area in addition to the Kyle area,” said Kelly.

NRCS staff included Trudy Ecoffey, Pine Ridge Tribal Liaison, and Mary Scott, Rosebud Tribal Liaison. SDSU Extension staff included Sean Kelly, Range Management Field Specialist, and Jimmie Doyle, Natural Resources Extension Field Specialist.

Sydney Meyer



Left: Deanna Eagle Feather discusses medicinal uses of native range plants at Rosebud.

Below: SDSU Extension Range Field Specialist Sean Kelly discusses range plants at Rosebud.





Foreign Animal Disease Preparedness Meeting

enter the United States.

ASF is currently the most harmful swine disease in the world and is continuing to spread. FMD is also very prevalent in Asia, Africa and eastern Europe where it not only affects pigs, but beef, dairy, sheep and goats. If the United States were to break out in FMD, all of those livestock species would be affected as well.

If the United States were to break out in AFS, experts say the exportation of pork would cease completely. This would require 27 percent more pork to be consumed domestically, which would result in a decrease in the price for pork. This would not only be devastating to the pork industry but would also impact beef and poultry consumption and the price of corn and soybeans.

The Secure Pork Supply Plan was also covered at the meeting. The goal of the Secure Pork Supply Plan are to be able to determine where ASF or FMD has broken out, to prevent the diseases from spreading across the country, and identify non-affected areas as quickly as possible so exports from those areas could resume.

“The National Pork Board, the South Dakota Animal Industry Board and the South Dakota Pork Producers Council need to get a lot of credit for being proactive,” said Bob Thaler, Professor and SDSU Extension Swine Specialist. “While it’s not popular to do and we hope we’ll never need it, at least now there is a plan in place that can be rapidly implemented if we do break with ASF.”

Nicole Hudson

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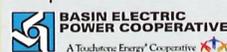


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SDSU EXTENSION BEEF-RELATED EFFORTS

SDSU Beef Extension specialists have been working to educate and inform South Dakota Beef producers by hosting various training and educational programs throughout the year in an effort to continue to improve the South Dakota beef industry.

AI School

SDSU Extension hosted a three-day Artificial Insemination School at the SDSU Cottonwood Research Station near Philip, S.D., July 23, 24 and 25, 2019. This school consisted of classroom training pertaining to AI techniques, reproductive-tract anatomy, heat detection, AI equipment and semen handling.

Cattle Handling Workshop

SDSU Extension also worked in conjunction with Rosebud Sioux Tribe and the USDA Natural Resource Conservation Service to host a free cattle handling workshop on Sept. 19, 2019. This workshop featured Ryan Sexson, a Nebraska cattle producer with a passion for holistic ranch management that focuses on low-stress stockmanship, stewardship of the land, and the importance of building relationships with people. The workshop featured classroom and hands-on cattle handling activities. Topics included cattle behavior, low-stress handling techniques, handling impacts on carcass quality and how to successfully implement these techniques with your own cattle.

Calf Value Discovery Program

SDSU Extension offered a Calf Value Discovery Program this year. This program allows cow/calf operators to gain valuable feedback to help improve the management decisions that impact their financial

bottom line. The program is designed to allow producers to consign a minimum of five steer calves which will be fed in an accelerated finishing program at Vander Wal Yards located in Bruce, S.D. SDSU personnel will weigh cattle periodically and send performance updates to their owners. Cattle will be sold in truckload lots on a grid price system beginning on or around May 15, 2020.

Feeding Strategies

A particular emphasis this year was strategies to deal with feed challenges associated with late planting conditions, such as silage utilization and high-moisture grain management and strategies on how to use the backgrounding phase to manage cattle's genetic potential more precisely. These segments were led by Alfredo DiCostanzo, Professor of Beef Cattle Nutrition & Management at the University of Minnesota.

Feedlot Short Course

Another opportunity offered at this year's Feedlot Shortcourse was the chance to observe the consequences of improper implanting techniques. Brian Dorcey, DVM, with the Veterinary Medical Center in Worthington, Minn., lead an ear necropsy session showing exactly what happens when proper procedures are not followed and how that can affect implant response. Speakers also covered topics focused on reducing cost of gain and improving outcomes, including bunk management and feed mixing, environmental stress mitigation and growth promoting technologies. These speakers included Zach Smith, SDSU Ruminant Nutrition Center Faculty Supervisor and Assistant Professor, Todd

Franz, J & R Feeds, and Warren Rusche, SDSU Extension Beef Feedlot Associate.

"The course offered an opportunity for cattle feeders to learn strategies and management tips to improve their operation from industry experts," said SDSU Extension Beef Feedlot Management Associate Warren Rusche.

Beef Quality Assurance Certification

SDSU Extension also hosted a BQA certification course on November 21, in Mitchell, S.D. Beef producers are required to be BQA certified before they can sell their cattle to many packers. This course gave producers the opportunity to become certified.

Beef Quality Assurance Transportation Certification

Another program hosted this year was a Beef Quality Assurance Transportation certification training. This multi-state workshop was offered by South Dakota State University Extension, Iowa State University Extension and Outreach, and University of Minnesota Extension on Tuesday, Dec. 10, at Sioux Falls Regional Livestock. BQA Transportation is the latest certification needed for beef cattle haulers and producers who deliver cattle to major packing plants. The BQA Transportation program focuses on transporter safety, delivering cattle in a timely manner, cattle fitness of transport, cattle handling, emergency preparedness and more.

SDSU Extension's efforts have made a significant impact on beef producers across the state and region and will continue to do so to improve our state's beef cattle industry.

Nicole Hudson

2019 SDSU EXTENSION YEARS OF SERVICE AWARDS

CONGRATULATIONS

TO THE FOLLOWING EXPERTS FOR THEIR YEARS OF SERVICE TO SDSU EXTENSION





M.



N.



O.



P.



Q.



R.



S.

25 YEARS OF SERVICE:

- A. JACK DAVIS**
- B. PAULETTE MORSE**

20 YEARS OF SERVICE:

- C. KIMBERLY MCGRAW**

15 YEARS OF SERVICE:

- D. KIMBERLY CRIPPS**
- E. RUTH BECK**
- F. KATHIE WEIGHT**
- G. LORNA SABOE-WOUNDED HEAD**
- H. VICKIE PRUSSMAN**

10 YEARS OF SERVICE:

- I. LINDSEY GERARD**

5 YEARS OF SERVICE:

- J. MARY CLAIRE BAUER**
- K. ANDREA BJORNSTAD**
- L. AMBER ERICKSON**
- M. MEGAN JACOBSON**
- N. KAYCEE JONES**
- O. DAVID KARKI**
- P. JONATHAN KLEINJAN**
- Q. NATHANIA KNIGHT**
- R. SARA KOEPKE**
- S. HILARY RISNER**



SDSU EXTENSION WELCOMES DR. TIMOTHY TANNER AS 4-H YOUTH DEVELOPMENT PROGRAM DIRECTOR

Dakota communities now and in the future.

“Today’s busy youth have access to numerous activities and distractions,” Tanner says. “They crave meaningful connection and want to belong to something important. They are laser-focused on building themselves toward a better future. I am lucky that as the leader of South Dakota 4-H, I get to offer these youth an opportunity for the connection, service and personal development that they desire.”

Prior to being hired by SDSU Extension, Tanner worked for the Ohio State University Extension for 11 years. He served as the Harrison County Director and 4-H Educator for ten years and transitioned into the roles of Area Leader and Associate State 4-H Leader.

Prior to his position with the Ohio State University Extension, Tanner held various roles in youth summer camps, was the Director of Education Ministries for a local church and was the part-time District Director of Youth and Young Adults for a regional non-profit organization.

Tanner received an associate degree in general studies from Hesston College in Kansas and a bachelors’ degree in youth ministry and recreation management from Bluffton University in Ohio. Tanner also has a master’s in adult education from Penn State University and a Ph.D. in educational sciences from the University of Kentucky.

Nicole Hudson

Timothy Tanner recently began his position with SDSU Extension serving as the State 4-H Youth Development Program Director.

Tanner says he hopes to strengthen the program quality to continue to attract youth, while continuing to produce meaningful outcomes for local South



Far left: 2018-2019 State 4-H Ambassadors on the Teen Leadership Conference committee kick-off the Soles4Souls 4-H community service project. Back row from left to right: Julia Ebbinga, Taylor McMartin, Sydney Hoffman, Nathan Linke, Emily Foiles, Laura Bogue. Front row: Alisha McMartin and Hailie Stuck.

Left: Delegates attending the Teen Leadership Conference formed assembly lines to process and package donated shoes.

South Dakota 4-H members collected 8,413 pairs of shoes as part of a 2018-2019 statewide community service project. Shoes collected by 4-H members were then donated to the international non-profit, Soles4Souls, that creates sustainable jobs through the distribution of shoes and clothes around the world.

Lincoln county 4-H collected the most shoes in the state with a total of 571 pairs.

“Any chance we have to teach youth – and even adults – about the importance of community service is a success,” said Hilary Risner, SDSU Extension Regional 4-H Youth Program Advisor.

“Projects like these give the hands-on

learning experience that 4-H is known for both nationally and globally.”

The shoes are sold for an average of \$1 per pair to non-profit partners in developing countries that provide business training to local entrepreneurs. The entrepreneurs purchase the shoes and are then able to start businesses of their own selling the product in their local marketplaces. This allows entrepreneurs the opportunity to earn a sustainable income and ultimately supports the purchase of necessities like food, shelter and education.

Soles4Souls’ micro-enterprise programs offer a long-term solution to poverty

through job creation in places like Haiti, Honduras and Sierra Leone.

At the end of the project, over 100 South Dakota 4-H members sorted and packaged the shoes during the community service session of the 4-H Teen Leadership Conference. This gave the 4-H members the opportunity to see the impact their project will have on the world. Several other counties organized their own packaging efforts with their youth as well.

Nicole Hudson

SOUTH DAKOTA 4-H SELECTS 2019-2020 STATE 4-H AMBASSADORS



Back (from left to right): Matthew Marrs, ReAnna Kotalik, Isaac Sousa, Kate DeVelder, Brianna Duerre, William Karels, Logan Tlam, Grant Gubrud
Middle: Julia Ebbinga, Matea Gordon, Kayla Fischer, Hayden Niles, Danika Gordon, Hannah Frost, Elisabeth Kluin, Colton Wicks
Front: Alisha McMartin, Jessemey Sharp, Taylor Storbakken, Teagan Miller, Tessa Erdmann, Jessica Kott, Hailie Stuck

Twenty-three teens from across the state were selected to serve as the 2019-2020 State 4-H Ambassadors at the South Dakota State Fair in Huron, S.D.

Youth were selected to serve as State 4-H Ambassadors based on an application and interview process. Industry professionals assisted co-advisors Hilary Risner, SDSU Extension Regional 4-H Youth Program Advisor and State 4-H Ambassador Program Co-Advisor and Amber Erickson, SDSU Extension 4-H Youth Development Field Operations Coordinator, in selecting the ambassadors. This gave teens the opportunity to network with potential employers and leaders in the industry.

The State 4-H Ambassador program was developed to expand leadership opportunities for teens by engaging in hands-on leadership development 4-H program areas, which include Agriculture, Health & Wellness, Leadership and Science.

“I was inspired to apply to be a State 4-H Ambassador, as I saw it as an

opportunity to grow as a leader,” said Hannah Frost, Minnehaha County 4-H member and 2019-2020 State 4-H Leadership Ambassador. “I was inspired to use the opportunity to encourage younger members and to pass on the joy of 4-H to generations to come.”

Through the program, teens have the opportunity to serve on either the marketing committee or the Teen Leadership Conference committee. The marketing committee continues to build promotion and awareness of the 4-H program while providing the ambassadors with valuable skills in marketing and communications. The Teen Leadership Conference committee works closely with Risner and Erickson to plan the annual conference while gaining event planning experience.

“We are so excited to welcome this impressive group of teens to the team this year. There is a lot of passion for 4-H and a desire to see it succeed and grow,” said Risner.

Teens selected to serve for the 2019-

2020 term include: Kate DeVelder, Clay County; Brianna Duerre, Day County; Julia Ebbinga, Turner County; Tessa Erdmann, Brown County; Kayla Fischer, Day County; Hannah Frost, Minnehaha County; Danika Gordon, Butte/Lawrence Counties; Matea Gordon, Butte/Lawrence Counties; Grant Gubrud, Deuel County; William Karels, Grant County; Elisabeth Kluin, Minnehaha County; ReAnna Kotalik, Bon Homme County; Jessica Kott, Brule County; Matthew Marrs, Butte/Lawrence Counties; Alisha McMartin, Turner County; Teagan Miller, Day County; Hayden Niles, Day County; Jessemey Sharp, Brown County; Isaac Sousa, Grant County; Taylor Storbakken, Marshall County; Hailie Stuck, Spink County; Logan Tlam, Davison County; and Colton Wicks, Lake County.

Andrea Schubloom & Nicole Hudson

4-H Ambassadors and Alumni Serve on Next Generation of Agriculture Panel at Governor's Ag Summit



▲ From left to right: Logan Wolter, Taylor McMartin, Governor Kristi Noem, Calli Williams, and John Eilertson.

State 4-H Ambassador Taylor McMartin, and 4-H alumni, Calli Williams, John Eilertson and Logan Wolter, discussed the future of agriculture as part of the Next Generation of Agriculture panel hosted by Governor Kristi Noem during the Governor's Ag Summit in July.

The panelists shared their insight into what it is like to be the next generation of agriculturalists. The panel discussed what older generations can do to help young farmers and producers be successful, why younger generations are and are not pursuing careers in agriculture, as well as what is holding the younger generations back from being successful in the agriculture industry and opportunities available.

McMartin is a freshman agricultural communications student at South Dakota State University from Hartford, South Dakota. Despite not living on a farm, she showed sheep in 4-H and now raises sheep on a family friend's farm.

"My goal for this panel was to share my non-traditional agriculture experience. Being the youngest of the four panelists, I

offered a much different success story. Being a young producer is difficult and sharing my victory to aspiring producers and industry leaders was a tremendous milestone," said McMartin.

McMartin spoke about how 4-H inspired her to pursue a career in agriculture. 4-H and FFA instilled in her a passion for public speaking and agriculture. She combined her two passions by pursuing a degree in agricultural communications.

Eilertson is a senior animal science major at South Dakota State University. Eilertson grew up on a farm where he helps his family raise row crops, small grains, hogs, cattle and sheep. Growing up, Eilertson was involved in 4-H, and showed sheep, goats, cattle and participated in other educational projects.

"This panel was a great opportunity to share the challenges and rewards of being a young person involved in agriculture," Eilertson said.

The panel gave both young and older agriculturalists the opportunity to learn from each other. The young agriculturalists were able to share their knowledge and new ideas for the future. Older agriculturalists were able to share their experiences and wisdom with them.

Williams works as a Farm and Livestock

Insurance Agent. She and her husband, Tate, also operate a purebred Angus cow-calf operation near Letcher, S.D. Williams and her husband are considered millennial ranchers, as they are ranching on an acreage they purchased and a cattle herd they started from the ground up.

"Looking at the list of speakers that were presenting during the Ag Summit, I honestly wasn't sure what to expect for a crowd that would be taking time out of their day to listen to a group of 'kids'. I was blown away by the guests who were in attendance, the questions the audience had for our panel and the encouragement guests offered us," Williams said.

"I think it is extremely important to talk about the next generation of agriculture to not only instill a positive image of our generation wanting to be involved in agriculture and being willing to put in the work, but also to encourage anyone considering a lifestyle of farming or ranching that it is possible," she said.

This panel gave agriculturalists an opportunity to have a candid conversation about what the future of agriculture may look like. Attendees were given ideas about how to do their part to ensure the success of the next generation of farmers and ranchers.

Nicole Hudson & Sydney Meyer

SOUTH DAKOTA 4-H HALL OF FAME INDUCTEES

Eleven individuals were recognized for their volunteer service to the South Dakota 4-H at the South Dakota State Fair. Each of these individuals have devoted many years helping the 4-H youth of South Dakota.

"In 4-H we focus on 'inspiring youth to do' through hands-on learning, community service, and leadership experiences. These volunteers have demonstrated the community impact that a lifestyle of 'doing' can achieve," reflected Dr. Timothy Tanner, SDSU Extension State 4-H Program Director. "The 4-H program relies on the investment of caring volunteers just like these eleven honorees and we sincerely appreciate their service."

The South Dakota 4-H Volunteer Hall of Fame was established to recognize and celebrate adult volunteers in South Dakota who have dedicated themselves to making contributions to the development of the

SDSU Extension 4-H Youth Development Program.

The 2019 Volunteer Hall of Fame inductees included Mary Williams of Pennington County, Diana Jons of Gregory County, Evelyn Werkmeister of Douglas County, Joy Braun of Spink County and James Wenzlaff of Minnehaha County.

The South Dakota Shooting Sports Hall of Fame recognizes adults who have made significant contributions to the development of shooting sports programs across the state.

The 2019 Shooting Sports Hall of Fame inductees include Doug Kittelson of Hamlin County, Dale Foiles of Brookings County, Dean Balsinger of Brookings County, Bruce Eldridge of Tripp County, Mark Rowen of Hughes, Stanley and Sully Counties and Mike Kraft of Marshall County.

Nicole Hudson



From left to right: Tim Tanner, State 4-H Program Director, Tanya Jacobson (accepting on behalf of the late James Wenzlaff), Joy Braun, Diana Jons and Evelyn Werkmeister. Not pictured: Mary Williams.



From left to right: Back row - Bruce Eldridge, Doug Kittelson, Mark Rowen, Mike Kraft, and John Keimig, SDSU Extension Youth Safety Field Specialist. Front row - Dean Balsinger and Dale Foiles.

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South Dakota 4-H Year in Review



42,634

Youth Reached Through 4-H and Educational Programming



9,225 4-H Memembrs in South Dakota



1,819 Registered 4-H Volunteers in South Dakota



85 State Dog Show Exhibitors
208 State Dog Show Entries



44 Livestock Skill-A-Thon Participants & **142** State Livestock Judging Participants

20 Youth Participated in Performing Arts



State Horse Show

262 Exhibitors

772 Entries

609 Horse Events

163 Youth-In-Action



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Jennifer Hayford
Jessica Mollman
Julian Witte
Kasee Heib
Lauren Pierce
Lindsey Syltie
Mary Payer
Olivia Amundson
Penny Phillips
Phillip Rozeboom
Regina Bakley
Shelby Anderson
Stephanie Powers
Stephanie Vento

Dr. Tim Tanner
Vanessa Hight
Vanessa Lambert

AGRONOMY, HORTICULTURE & PLANT SCIENCE

Dalitso Yabwalo
David Schneider
Debankur Sanyal
Johnathon Wolthuizen
Joyce Kindvall
Kathy Mathiason
Dr. Kristopher Osterloh
Meredith McCuen
Dr. Navreet Mahal

AG & BIOSYSTEMS ENGINEERING

Steph Bebensee
Dr. Xufei Yang

ANIMAL SCIENCE

Natalie Howard

DAIRY & FOOD SCIENCE

Dr. Clifford Hall
Dr. Isaac Salfer

NATURAL RESOURCE MANAGEMENT

Dr. Bruce Eichhorst
Dr. Onja Razafindratsima
Duane Olson
Charles Fenster
Stella Liu

VETERINARY & BIOMEDICAL SCIENCES

Alexandra Dart
Dr. Greta Krafzur
Mathew Miller
Shaelyn Westergard
Dr. Gary Gackstetter

SD AG EXPERIMENT STATION

Sarah Dozier
Katie Grott

CAFES MARKETING & COMMUNICATIONS

Andrea Schubloom

SHOWCASING OUR POINTS OF PRIDE

We were proud to share a few of our points of pride with Chairman of the Federal Communications Commission Ajit Pai and members of the Egyptian Trade Delegation.



FCC Chairman Ajit Pai with Agricultural and Biosystems Engineering students. From left to right: Ty Grone, Parker Aase, Ajit Pai, Logan Goslee, Ben Lucas.



Members of the Egyptian Trade Delegation: Ambassador Hamdi Saleh, Mr. Ahmed Rabei'e, Mr. Mohamed Mamdouh, Mr. Ahmed Essam, Mr. Ibrahim El Meligy, Ms. Hamdy El Husseiny. SDSU faculty: College of Agriculture, Food and Environmental Sciences Dean John Killefer, SDSU President Barry H. Dunn.

NATIONAL FFA ORGANIZATION RECOGNIZES ANDREW STREFF AS 2019 AMERICAN STAR

Senior agricultural business student Andrew Streff has been chasing his goal of being named an American Star finalist in the National FFA Organization for more than seven years. Growing up on his family farm outside Salem, S.D., Streff was surrounded by agriculture and began working toward his goal at a young age.

As an involved member of the McCook Central FFA Chapter, Streff started keeping records of his work on the farm as part of his Supervised Agricultural Experience (SAE) project when he was a freshman in high school. According to the National Council for Agricultural Education, SAE projects are student-led, instructor-supervised and work-based learning experiences that help students to explore careers, learn real-world skills, get hands-on experience, put their talents to work and help them to earn an income while finding their passion.

Upon receiving his American FFA degree, the highest degree attainable in the FFA, Streff was finally eligible to apply for an American Star award. His combined years of working on the family farm and completing two internships qualified him for the American Star in Agricultural Placement category which is meant for members who spend their SAE hours working for an employer(s). Other categories of the award include the American Star in Agribusiness, American Star in Agriscience and American Star Farmer.

For Streff, there were three parts to his SAE. The first being his work on the family farm managing their acres of corn and soybeans from planting in the spring to harvest in the fall. The second was his work as a crop scout intern during summer 2017 at his local cooperative, Central Farmers Coop, where he scouted 11,000 acres of crops for local farmers and helped manage 16 test plots throughout southeastern South Dakota. The third part was his internship working for WinField United in Ohio over summer 2018 where he managed technology research trials, test plots and serviced customer technology

needs throughout the western half of Ohio and eastern Indiana.

“All three parts of my SAE helped me to gain a well-rounded education in the agriculture industry,” Streff said. “Working for my dad and other companies gave me a more diverse knowledge of the industry and the ability to look at it from both a farmer’s perspective and a sales perspective.”

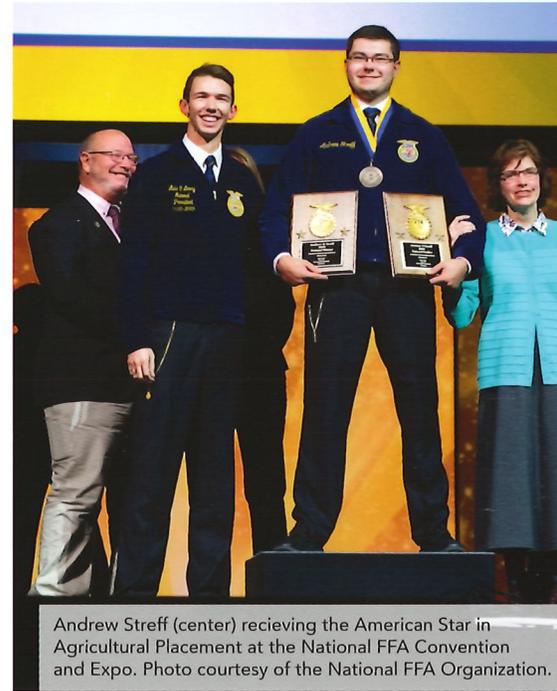
Streff submitted his American Star application in May 2019 and reached his goal of being named a finalist for the award in July 2019. Each state is allowed to nominate one member for the award and four are selected as finalists who then advance to the National FFA Convention and Expo where they undergo a more in-depth interview process.

“The star awards are very prestigious awards so the judges really look for how well you know the nitty gritty details of your project,” Streff said. “I was asked very specific questions about my application and the results of the work I completed and decisions I made along the way.”

After arriving in Indianapolis and completing his final interviews, Streff exceeded his goal and was named the 2019 American Star in Agricultural Placement as his name was announced on stage at the 92nd National FFA Convention and Expo at Lucas Oil Stadium. As the recipient, he received a total of \$4,000, \$2,000 of which he received upon being a finalist and an additional \$2,000 for winning the award.

“Whether it was working on the farm or taking an internship 15 hours away from home to learn more about the industry, it was very humbling to see how the countless hours of work that I put into my project and the amount of mentoring I received from so many different people paid off in the end,” Streff said. “It was a big moment for everyone in my circle – I wouldn’t have gotten there without the support of my FFA advisor, my parents and the different mentors I had throughout my community.”

Streff’s big accomplishment is not his first. Since he became a member,



Andrew Streff (center) receiving the American Star in Agricultural Placement at the National FFA Convention and Expo. Photo courtesy of the National FFA Organization.

Streff has competed in parliamentary procedure and land judging at the national level, and also participated in the extemporaneous speaking, agricultural mechanics and agronomy leadership and career development events. Additionally, Streff served as a state FFA officer for South Dakota as the 2016-2017 State FFA Treasurer.

“From the time he came in as a freshman, you could see and feel the determination he had to succeed and the passion he had for the agricultural industry,” said McCook Central FFA Advisor Terry Rieckman. “Andrew was always such a positive role model and leader, but I think the thing that always stood out was how goal oriented he was.”

At South Dakota State University, Streff continues to serve the FFA with his time and assistance during the South Dakota FFA State Convention that is held on campus. He is also an active member of FarmHouse Fraternity, Agronomy Club, Little International and the College of Agriculture, Food and Environmental Sciences Prexy Council.

Upon graduation in May 2020, Streff plans to return home to his local community and pursue a career working in crop insurance or commodity brokering so that he can remain active on his family farm.

Andrea Schubloom

CODY WRIGHT RECEIVES USDA TEACHING AWARD



For his engaging teaching methods and commitment to students, South Dakota State University animal science professor Cody Wright is a recipient of the U.S. Department of Agriculture (USDA) Excellence in College and University Teaching Award for Food and Agricultural Sciences. The Association of Public and Land-grant Universities (APLU) presented the award to Wright on Nov. 10 in San Diego, Calif.

“Dr. Wright has a unique ability to contextualize course content into learning experiences to which students readily relate and value,” said Don Marshall, associate dean for academic programs of the SDSU College of Agriculture, Food and Environmental Sciences. “He stays well informed of industry practices, trends and issues, and brings that information into the classroom to illustrate real-life applications of important concepts.”

Wright teaches Ruminant Livestock Production, Livestock Feeds and Feeding, Current Issues in Animal Science, Cow-Calf Management, and Vitamins and Minerals. He also coordinates internships for students in the Animal Science Department, works with students on independent study projects and assists students with undergraduate teaching experiences.

“The most rewarding part of being a professor is hands down the students,” Wright said. “Getting to know them and

helping them understand the key concepts and practices that will be beneficial in their careers energizes me. There is nothing better than having a student experience an a-ha moment.”

Wright’s teaching philosophy revolves around creating and fostering a positive learning environment, establishing high expectations and demonstrating the relevance and application of course material.

“I believe that to be effective, the learning process needs to be a team effort between the instructor and the students. Indeed, effective teaching is much more about facilitating learning than imparting knowledge. In my courses, I strive to help students build bridges between basic and applied sciences and help them recognize relationships between theory and application,” Wright said.

He also likes to have fun in the classroom and hopes students enjoy it, too. He strives to create an environment where students are comfortable asking questions and conversing with him.

“Dr. Wright is an excellent professor that will go out of his way to engage with students,” said Clay Baldwin, senior animal science and agricultural science student. “He is very approachable and always willing to help.”

Wright started working at SDSU in 2001 as an SDSU Extension Beef Specialist. In 2007, he started teaching

one undergraduate course in the fall and a graduate course every other spring. Then in 2011, his appointment changed to what it is today with a large teaching appointment and smaller research appointment. Wright received his bachelor’s degree from SDSU, master’s degree from Kansas State University, and doctorate from North Carolina State University, all in animal science.

He is one of five regional awardees recognized as outstanding professors of agriculture, natural resources, veterinary and human sciences. Individuals are nominated by their college/university for the award and are evaluated by a panel of nationally recognized teachers and scholars. The panel chooses two national recipients, two early career awardees and up to six regional awardees. Recipients are chosen based on their ability as instructors, educational innovation, service to students, professionalism and scholarship.

Wright will receive \$2,000 to be disbursed to SDSU and used for the purposes he designates in support of strengthening instructional programs in food and agricultural sciences. The award program is a partnership between APLU and USDA’s National Institute of Food and Agriculture.

Sydney Meyer



Photo courtesy of Hope Gauger



JEANETTE KLEIN LEADS BIGGEST ONE-DAY EVENT IN THE DAKOTAS

For senior agricultural leadership student Jeanette Klein of White, S.D., Hobo Day is more than a long-standing South Dakota State University tradition – Hobo Day is a family tradition.

Since 1912, Hobo Day has been the biggest one-day event in the Dakotas and SDSU's beloved homecoming celebration, bringing thousands of alumni, students, supporters, community members and families from across the nation to campus each year. Throughout the week leading up to Hobo Day, students on the Hobo Day Committee host several events for SDSU students and the community to take part in such as One Month Club, Bum-A-Meal, Rally at the Rails, Hobolympics, BumFire and more.

Hobo Day Committee

Shortly after her start at SDSU, Klein

joined the Hobo Day Committee. The committee is comprised of the Grand Pooba who leads the group and three Assistant Poobas who manage events, parade and marketing teams made up of another small group of students.

"Two of my older cousins were on the Hobo Day Committee," Klein said. "I saw how much fun they had and I was looking for a way to get involved with the traditions of the university, too."

During her first year on the committee in 2016, Klein served as the coordinator for the Hobolympics event where students compete in a series of athletic and mind-stretching games. She then served as the Assistant Pooba of Events during 2017 and 2018 where she oversaw all events during Hobo Week.

After being on the committee for three years, Klein became the third member

in her family selected to serve as Grand Pooba to lead the Hobo Day Committee and the 107th Hobo Day on October 5, 2019. Her cousins, Corey and Anna Chicoine, previously served as Grand Pooba in 2016 and 2017.

"It was fun to share the Grand Pooba experience with my cousins Corey and Anna," Klein said. "We are all third-generation Jackrabbits, so it meant a lot to my aunts, uncles and family to see all three of us serve in this role."

To be selected as Grand Pooba, committee members go through two rounds of interviews, one with stakeholders and one with the Hobo Day Committee where they present their vision plan for the upcoming Hobo Day. The two groups then give their input and the decision is ultimately up to the current Grand Pooba to select his/her successor.



Left: Klein driving the Bummobile through a parade in Colton, S.D., during the Hobo Day Summer Parade tour. Photo courtesy of Kendra Mack.

really adopted the lifestyle of riding the rails because they enjoyed the spirit of wandering and exploring the country. Students can relate to hobos in that way because a lot of us are in a new place and we are really just exploring our passions, interests and figuring out where to go next in life.”

The Next Step

Throughout her years at SDSU, Klein has been a member of Little International, Alpha Xi Delta Sorority, Choralia, State A Thon, served as an Admissions Ambassador and South Dakota FFA volunteer and worked at the SDSU Alumni Center.

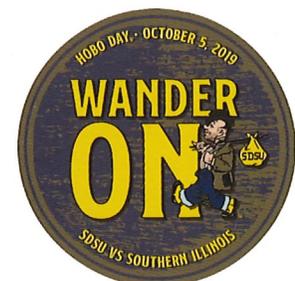
Upon graduation in May 2020, Klein plans to combine her love for the agriculture and hospitality industries and pursue a career in youth development and agritourism.

“I have had some really awesome classes and professors that have encouraged me to pursue my passions, even if they are unconventional,” Klein said. “That encouragement and support combined with my extracurricular involvement has given me confidence for my life post-graduation.”

Klein plans to return to campus and help with the Hobo Day Parade in the future. She hopes to connect with future Hobo Day Committee members and share her stories like many alumni have done with her.

“Even though my time on the committee is done, my experience with Hobo Day is not done,” Klein said. “Hobo Day is one of the most unique homecoming celebrations in the country and I look forward to coming back to Brookings and meeting those friends for years to come.”

Andrea Schubloom



◀ **Top center:** The 2019 Hobo Day Committee members surround Klein at the conclusion of the 2019 Hobo Day Parade. Photo courtesy of Paula Linke.

Bottom center: Klein (right) and cousins Anna Chicoine (left), 2017 Grand Pooba, and Corey Chicoine (center), 2016 Grand Pooba, at the 2016 Hobo Day. Photo courtesy of Josh Jaspers.

Klein said her Grand Pooba responsibilities included budgeting, conducting planning meetings, setting deadlines, scheduling the summer parade tour, overseeing all committee teams, and maintaining connections with partners across campus and in the community. Additionally, she was in charge of selecting the Hobo Day Parade Grand Marshall who is usually a friend or alum of SDSU. She also selected two alumni of the Hobo Day Committee to return to campus and act as the Hobo Day mascots, Weary Wil and Dirty Lil, whose real identities are revealed during halftime of the Hobo Day football game.

Looking back on the day, Klein said her favorite part was the morning of the Hobo Day Parade.

“The whole experience of parade morning is super fun,” Klein said. “At the end we get to drive through and celebrate a successful Hobo Week and see our friends and family along the way.”

Klein recently chose her fellow committee member, Kylee Donnelly, to serve as the 2020 Grand Pooba. The 108th Hobo Day will be held October 31, 2020.

“Wander On”

Each year, the Hobo Day Committee chooses a tagline for the celebration. The tagline is a phrase that ties back to Hobo Day traditions and is created together by the entire committee. The 2019 tagline “Wander On” was a way for students to relate to historic hobos.

“When people were coming back from the Civil War, they would hop on trains to get back to their hometowns,” Klein said. “Many lived across the country and would have to get off the trains and get odd jobs for a while to make some cash in order to continue their journey home. They would meet new people along the way and some

AKIMOTO AND TOMOKO ICHINOMIYA RECEIVE 20TH ANNUAL BUTLER HUMAN RIGHTS AWARD

The City of Brookings honored Akimoto and Tomoko Ichinomiya as the recipients of the 20th annual Dorothy and Eugene T. Butler Human Rights Award on Thursday, September 26. The Ichinomiyas are being recognized for effectively advancing the cause of human rights by helping people from all around the world adapt to life in Brookings and by educating people in this region about Japanese culture. Their astounding ability to bring together people from diverse cultures is a role model for American citizens in Brookings and across the nation.

The Butler Human Rights Award presentation was held in conjunction with the ABLE awards for Accessibility, the Mayor's Sustainability Awards, the Mayor's Awards for Historic Preservation and the Mayor's Generational Leadership Awards at McCrory Gardens Visitor Center on Thursday, September 26 from 5:00 to 7:00 p.m.

The Ichinomiya's community service to friends and organizations has been voluntary and unpaid. For years, Tomoko's status as a student wife prohibited her from paid employment but she handled her volunteer activities with the zeal of a professional. The Ichinomiya's stated goal is to contribute to the community that embraced them to achieve their aspirations for higher education and enabled them to build bridges between cultures. Here is a listing of some of their wide range of volunteer activities:

- Volunteer and leaders in services provided to international students by U.S. Friends, including a week-long orientation program each semester
- Weekly English language classes and socialization for international wives and their children
- Acquiring, organizing and dispersing the large collection of household goods and warm clothing for free distribution to international students
- Organizers and presenters in the annual Festival of Cultures held on

- SDSU for many years
- Encourage interfaith interaction and understanding
- Unselfish, intensive, daily care giving for American friends with debilitating, challenging, long-term health issues
- Educate Americans to admire the unique culture of their native land Japan

Aki and Tomoko met in Sioux Falls in 1990 when they individually enrolled in an English as a Second Language program offered by Augustana College. Upon completion of that program, each matriculated at SDSU when they both earned bachelor's degrees. They married upon graduation in 1996 and returned to Japan in 2001. They returned to Brookings in 2005 so Aki could pursue a master's degree in dairy science. He was hired by the department upon the degree completion and now serves as Assistant Manager of the Davis Dairy Plant. Aki has been recognized regionally for his cheese and ice cream making abilities. Tomoko is currently working for Aramark at SDSU. Both have a green card which can lead to American citizenship.

"There is no way to estimate the number of people whose lives they have affected, but the list is long," stated Harriet Swedlund, former executive director of the South Dakota World Affairs Council. "They light up the room with energy, enthusiasm and optimism," she stated. Aki and Tomoko's examples for building relationships influence everyone they meet and are their way to make Brookings the friendly, comfortable and supportive environment they liked as students that lured them back to be full-time residents.

Dr. Philip Baker, a previous Butler award winner added "The Ichinomiyas serve as ambassadors for Japan and to the United States with honor, compassion and love. The Butlers would be smiling with approval of this interactive and deserving



Aki (left) and Tomoko (right) Ichinomiya accept the Butler Human Rights Award. Photo courtesy of City of Brookings.

couple being selected to receive the Butler Human Rights Award."

Tomoko is a master gardener who volunteers at any garden and Aki plays percussion in the Brookings Area Community Band.

The Dorothy and Eugene T. Butler Human Rights Award is named after the Butlers in recognition of their lifelong advocacy in human rights issues on the local, regional, national and international levels. The annual award recognizes significant volunteer efforts on behalf of human rights. Previous honorees, in addition to Dorothy and Eugene T. Butler, Jr. are: Dr. Philip and Winnie Baker, First United Methodist Church, the Rev. Carl Kline, the Rev. Scott Miller and Lisa Wolff, Margaret Denton, Dr. Steve Marquardt, Lawrence Novotny, Dr. Charles Woodard, Dr. Geoffrey Grant, Dr. Timothy Nichols, Scott Nagy, Dr. Ann Marie Bahr, Phyllis Cole-Dai, Harriet Swedlund, Drs. MaryJo and Richard Lee, Dr. Ruth Harper, Professor Doris Giago, and Dr. Allen Branum.

City of Brookings

SOUTH DAKOTA STATE UNIVERSITY 2019 FRIEND OF THE BEEF INDUSTRY

The First Dakota National Bank Agricultural Banking Team has been named the 2019 South Dakota State University Friend of the Beef Industry. Agriculture has been in First Dakota's blood since they opened their doors in 1872. Their commitment to farmers and ranchers through every calving and growing season has allowed them to grow into one of the largest agricultural lenders in the nation.

"First Dakota National Bank has been a longtime supporter of SDSU and the College of Agriculture, Food and Environmental Sciences and has been instrumental in providing support in developing a number of our program areas, specifically the beef program," said John Killefer, South Dakota Corn Endowed Dean of the College of Agriculture, Food and Environmental Sciences. "Nate Franzén, president of the Agricultural Banking Division at First Dakota, has been a real champion of our beef activities on campus."

Franzén is responsible for all aspects of agricultural relationship banking at First Dakota. He grew up on a diversified dairy, grain and cattle farming operation near Langford, S.D. He joined First Dakota in 1998. In 2011, Franzén was appointed to the American Bankers Association's Agriculture and Rural Bankers committee and served as chairman in 2015. He is a graduate of South Dakota Agricultural and Rural Leadership (SDARL) Class I and currently serves as chairman of the SDARL Foundation Board of Directors. He is also chair of the South Dakota Ag Foundation Board of Directors.

Larry Ness is CEO and chairman of the board at First Dakota. In 2010, he was named a Distinguished Alumnus by the South Dakota State University Department of Economics. In 2015, SDSU created the Ness Division of Management and Economics, now called the Ness School of Management and Economics, to honor



From left to right: Joe Cassady, Larry Ness, Nate Franzén, John Killefer, SDSU President Barry H. Dunn.

his commitment to SDSU and its students. This year, Ness will be honored as one of six Distinguished Alumni of SDSU.

First Dakota has also invested in SDSU's Cow-Calf Education and Research Facility, eTrading Education Laboratory, Swine Education and Research Facility, and Raven Precision Agriculture Center.

First Dakota National Bank was honored on the field during the September 21, SDSU Beef Bowl football game. The organization was represented by Larry Ness and Nate Franzén.

Sydney Meyer

SOUTH DAKOTA STATE UNIVERSITY CO-HOSTS 51ST BEEF IMPROVEMENT FEDERATION RESEARCH SYMPOSIUM AND CONVENTION

The 51st Beef Improvement Federation Research Symposium and Convention was held June 18-21 in Brookings, S.D. South Dakota State University served as a co-host for the event in partnership with the South Dakota Beef Breeds Council. The purpose of the annual meeting and research symposium was to bring together industry professionals, producers and researchers to discuss current issues facing the beef industry.

The Beef Improvement Federation (BIF) was founded in 1968 and is an organization dedicated to advancing and coordinating all segments of the beef industry in addition to connecting science and industry to improve beef cattle genetics.

Joe Cassady, head of the Animal Science Department at South Dakota State University, served as the BIF 2019 Organizing Committee Chair for the 2019 convention.

"It was an honor to work with our

co-hosts, the South Dakota Beef Breeds Council, to host nearly 500 of the nation's leading producers and researchers in beef cattle production for the 51st Annual Beef Improvement Federation Research Symposium and Convention," Cassady said.

The annual meeting began Tuesday, June 18, with a young producer symposium and National Association of Animal Breeders symposium. Following the symposiums, a variety of general sessions, panel discussions, presentations and breakout sessions were hosted throughout the remainder of the convention by researchers, industry professionals and producers from across the United States.

While in Brookings, attendees had the opportunity to see and experience local businesses and cattle operations on a guest tour Wednesday, June 19, or on the post-conference tour Friday, June 21.

At the conclusion of the convention

on Thursday, June 20, an evening social and BBQ was held at the SDSU Cow/Calf Education and Research Facility. Completed in 2016, the Cow/Calf Education and Research Facility was designed to enable students to gain hands-on beef cattle production experience and provide faculty with the ability to teach and conduct research in a modern facility. Additionally, SDSU's Ruminant Nutrition Center is home to the university research feedlot and is capable of performing production-scale feedlot management comparisons.

"South Dakota is home to some of the most premier beef cattle seedstock producers in the U.S. and it was a pleasure to highlight those operations along with the state-of-the-art facilities and learning opportunities we offer here at SDSU," Cassady said.

Andrea Schubloom

SOUTH DAKOTA NATIVE NAMED GLOBAL FARMFLUENCER

Bath, S.D., native Matthew Sperry grew up working on his family farm where he helps manage their acres of corn and soybeans. As a former 4-H member and current junior at South Dakota State University studying precision agriculture and agronomy, Sperry found the perfect opportunity to combine his passions for agriculture, film, advocacy and technology.

Sponsored by Corteva Agriscience in partnership with 4-H, the global Farmfluencer contest was created to inspire the next generation of farmers and help young adults understand the role of innovation and technology in agriculture today.

In spring of 2019, Sperry heard about the Farmfluencer video contest asking young men and women across the world, ages 16-24, to answer the questions “what does farming mean to you?” and “does an industry that’s been around for 10,000 years have a future for you?” These questions sparked Sperry’s interest and prompted him to share his own personal message about how precision agriculture and emerging technologies have greatly

changed the look of farming over the years.

“It’s about improving and implementing new technology because that is where the future of agriculture is going,” Sperry said. “While on the surface agriculture can appear similar from place to place, in today’s world, farming practices can differ drastically, influencing inputs, yields and profits.”

When crafting the message for his video, Sperry drew inspiration from his older brother, Mark, who served as a Peace Corps volunteer in Zambia, Africa, from 2017-2019 teaching fish farming and improved agricultural practices to local village farmers. Because of a lack of electricity, running water and resources, farming in Africa is much more labor intensive than it is on Sperry’s family farm near Bath. However, Sperry wanted to show how farmers around the globe are working to feed the growing population.

“Whether we are from Africa or South Dakota, we are all working to put food on the world’s tables,” Sperry said.

To provide additional insight on the

topic, Sperry also interviewed two of his professors at SDSU and included their comments in the video.

“The similarities between farmers across the world are bigger than their differences,” said Elijah Kosse, instructor in the SDSU Ness School of Management and Economics. “Whether it’s a two-acre plot in Zambia or a 2,500-acre farm in South Dakota, farmers are seeking the same goal – to grow more food with lower costs, both lower economic costs and lower environmental costs.”

With over 140 entries from young men and women worldwide, the top 30 video submissions were chosen based on a set of criteria evaluating how compelling the message was and the uniqueness, creativity and level of craft that went into producing the video. Being one of the top 30 participants, Sperry then had to promote his own video to gain votes during a two-week voting period where two videos were eliminated each day.

Sperry said he and his family reached out to their friends and connections through 4-H, their local cooperative,



Matthew and his brother, Mark Sperry, at their home farm near Bath, S.D.



Top Left: Sperry's brother, Mark, and students measuring a fish pond in Zambia after learning about fish farming in their Agricultural Sciences class at Mpande Secondary School.

Below left: Sperry and his fellow winner, Hannah Riensche, receiving their awards at the Farmfluencer Award Ceremony at the Iowa State Fair.

Below: Sperry presenting about his Farmfluencer video on the Pioneer stage at the Farm Progress Show in Illinois.



implement dealers, the township board and soil conservation service asking people to vote for his video.

At the conclusion of the two-week voting period, Sperry's video had 5,093 votes, making him one of two grand prize winners of the contest. As a result, Sperry and his fellow grand prize winner, Hannah Riensche of Rochester, Minnesota, each won \$5,000 and attended the Iowa and Indiana state fairs where they were presented with their awards and spoke about their videos. Additionally, Sperry presented about his video at the Indiana, Iowa and South Dakota state fairs, the Farm Progress Show in Decatur, Illinois, and visited with Corteva Agriscience and Pioneer executives at their international offices and research facilities in both Indianapolis and Johnston, Iowa.

"I was thrilled that he won," Kosse said. "He put a lot of time and effort into the project and the message he shared is so vital."

"It was really humbling to see the support that everyone gave," Sperry said. "I'm glad that so many people were interested and I hope that they watched mine and the other videos to see what's out there. That is what this contest was all about – to introduce people to what the agriculture industry means to the young generation."

While at SDSU, Sperry is heavily involved on campus and is an active member of the Agronomy Club, Precision Agriculture Club, Shooting Sports Club, Golden Key International Honors Society, National Society of Collegiate Scholars, Jacks for Life, and Fellowship of Catholic

University Students (FOCUS). He also involves himself in many community service projects and serves as an adult 4-H leader.

For Sperry, his future plans are to work in the agricultural industry near his home while becoming the fifth generation involved on his family farm. Home is where his passion for agriculture began, and is where he plans to return and continue to fuel that passion.

"Agriculture has really taken off," Sperry said. "I can't see myself being in any other industry other than agriculture, because it is where all of it comes together."

Sperry's winning video can be viewed at farmfluencer.com.

Andrea Schubloom

UNDERWATER DRONE OFFERS EXCITING WAYS TO STUDY WATER QUALITY

Drones flying through the sky assist the agricultural world in collecting data. At the 2019 Dakotafest, a drone operating underwater drew a great deal of attention. The new tool offers a huge change in the way researchers can study water quality in lakes and streams.

South Dakota State University junior Alex Masloski of Blaine, Minn. showed how the drone worked in a pool within the tent.

“Currently, grab samples are collected at a few points in lakes and streams to determine water quality. In a lake that means you need a boat to drive to a location, take a sample, then move to another location, take another sample and repeat. With the drone, I can program it to use a GPS system designed to work underwater to follow a predetermined path. The drone will automatically drive along the programmed path, collecting water quality data every few seconds with a cluster of sensors. We take the data back to SDSU to visualize it, but we hope to map out the water quality data in real time.

The goal is to fill in the gaps left by grab samples taken at a few points and provide in-depth, real-time data.”

The drone costs about \$30,000 and weighs 35 lbs. Tethered by a Teflon line with a 350-lb. load limit, it is battery-operated and it sends the information it sees to a laptop so the researchers can monitor the data as the drone moves about. The team is working on mounting a cluster of electronic sensors used to test the water in real-time.

Because the drone is submersible, it allows testing at different depths because the water quality can vary by depth. For example, disturbance of sediments at the bottom of a lake can decrease clarity near the bottom, while changes to discharge rates can impact the clarity of streams and rivers. The cluster of water quality sensors can measure several indicators such as salinity, turbidity (or clarity), nitrates, and chlorophyll levels. The sensors can provide these measurements much more rapidly than traditional grab samples, and when integrated with the drone, will allow

repeatable measurements at many spatial points in the water body.

Funded through the SDSU Department of Agricultural and Biosystems Engineering, Masloski's internship has him working with Aaron Franzen, SDSU Assistant Professor of Agricultural and Biosystems Engineering, and Rachel McDaniel, SDSU Assistant Professor and Water Resource Engineer, who will put the drone to work.

Masloski began working on the drone project in January 2019. Along the way, with the help of Franzen, he used his engineering skills to build and program the drone which will be used McDaniel's research team to study water quality. The drone arrived at SDSU in kit form, including an electronics bundle that contains much of the same electronic hardware that is used to control aerial drones. Masloski assembled the drone as an upgraded heavy-lift variant, configured the software, and wrote manuals for future researchers that need to pilot it after his graduation from SDSU. Drone operators

pilot the drone using an Xbox 360 controller which is intuitive for students who often have experience with video games.

The water quality sensor array on the system is most commonly used on its own, with data downloaded after sampling from the boat. Masloski is working on integrating the drone and sensor array to provide real-time water quality data collection and visualization on a map showing where the measurements are located.

“Doing this is really cool stuff. It combines learning engineering to develop the drone and programming the drone for use underwater. I also learned what environmental details to look for underwater.”

The drone can be used in any body of water that is deep enough to cover it. The camera at the front of the drone provides a real-time view of the scene in the system's front. The drone pilot can use the live video feed to watch for unexpected events or findings and mark the 3D location as a spot for future testing. It also has a grabber that can take samples from plants or sediment found in the water body.

In working on the project, Masloski

learned more about how agricultural and biosystems engineers work together to provide solutions. “I walked in with four semesters of college under my belt when I started working on this project. SDSU provided me with the resources and guidance to use what I’ve learned to get real-world experience to develop innovative technology. Extension provides a lot of research and practical applications that people can use in agriculture. While working on the drone this summer, I also shared what I’ve learned through public outreach at events like Dakotafest.”

Masloski said the drone offers a whole different look at the underwater world. “When you look at a patch of weeds from the surface, it's hard to know what is in the water around them. It's untouched territory that is so much different from what we see from the surface. You can learn so much more when the drone can dive below the water and show you what's there.”

“The drone is very intuitive for college students who have played video games,” McDaniel said. “Combining the drone with the sensors allows us to get a very

Below: Masloski conducting a demonstration of the underwater drone at Dakotafest.



good picture of water quality. We'll use it as a teaching tool and a research tool to understand water quality in three dimensions. This project emphasizes the diverse topics agricultural engineering addresses by combining several topics covered in the major including mechanical engineering, signal processing, and environmental engineering.”

Connie Sieh Groop

POET COMMITS \$2 MILLION TO SUPPORT SOUTH DAKOTA STATE UNIVERSITY PRECISION AGRICULTURE PROGRAM

POET founder and CEO Jeff Broin announced a \$2 million gift for precision agriculture at South Dakota State University.

POET and SDSU have a strong history of collaboration on innovative research projects and training the next generation to use agriculture to solve the world's most pressing issues, like climate change. POET is proud to partner with SDSU on this exciting venture. In addition:

- POET's gift will support construction of the Raven Precision Agriculture Center;
- POET and SDSU will enhance research partnerships through dedicated POET office space at the Research Park at South Dakota State University to help facilitate new, groundbreaking collaborations; and
- POET and SDSU will partner to develop academic programs in bioprocessing so SDSU graduates will

have a robust understanding of how biofuels and agriculture can drive change across the globe.

The stakes have never been higher to combat climate change. What was once considered a problem for the distant future is a real threat to all of us today.

"A little over 100 years ago, we derived nearly everything in our society from the surface of the earth. If we want to return to a healthy planet, we will once again need to lean on agriculture, in combination with biofuels and bioproducts, to replace fossil fuels and their derivatives. This gift supports South Dakota's future farmers, who will need to cultivate even more sustainable ag practices for future generations," said POET Founder and CEO Jeff Broin.

SDSU's increasing commitment to precision agriculture, including being the first university to offer both a four-year precision agriculture major and minor and the construction of the new

Raven Precision Agriculture Center on campus, will position the Jackrabbits to lead the way in making positive change that impacts future generations across the globe.

"We are grateful for the tremendous support POET has shown toward SDSU and our precision agriculture program," said SDSU President Barry Dunn. "Partnering with the leading biofuels company in the world creates unique opportunities to not only grow precision agriculture at SDSU, but also expand the industry into areas where change and growth can have a positive impact on the environment and society as a whole. Educating and training the next generation of ag producers, scientists, engineers and others to meet the challenges and opportunities will define the future of agriculture and the biofuels industry in the state, region and the world."

POET



Bottom: POET founder and CEO Jeff Broin announcing POET's \$2 million contribution to the Raven Precision Agriculture Center and SDSU's precision agriculture program.

Below: SDSU President Barry H. Dunn gives remarks at the news conference after POET's gift was announced.



CORTEVA AGRISCIENCE COMMITS \$600,000 TO SUPPORT SOUTH DAKOTA STATE UNIVERSITY RAVEN PRECISION AGRICULTURE CENTER

Corteve Agriscience recently announced a \$600,000 gift to support the South Dakota State University precision agriculture program and construction of the new Raven Precision Agriculture Center on campus. The gift will sponsor the Corteve Student Atrium inside the new facility.

“We are very fortunate to have Corteve Agriscience partner with us on this groundbreaking precision agriculture facility and program,” said John Killefer, South Dakota Corn Endowed Dean of the South Dakota State University College of Agriculture, Food and Environmental Sciences. “The culture of innovation that is shared between Corteve Agriscience and South Dakota State University makes for a perfect partnership that will help ensure an exciting and impactful future for precision agriculture as we work together to feed a hungry world and conserve our precious natural resources.”

The Raven Precision Agriculture Center will allow South Dakota to lead the nation in precision agriculture research, teaching and innovation. The building has 129,000 square feet of floor space that

will be able to house modern precision farm equipment and provide collaborative learning spaces for student design projects. Flexible space will be available so scientists from a variety of departments and industry can collaborate in research and education. A groundbreaking ceremony for the facility was held on the SDSU campus in Brookings on October 6, 2018.

“The launch of a precision ag-focused major is a big opportunity for the future of agriculture and can help make a difference in the lives of farmers everywhere,” said Jamie Williamson, Corteve Agriscience Area Leader – Northern Plains. “Precision agriculture is just one in a long list of innovations that help us find the solutions needed to solve the problems of today and anticipate tomorrow’s challenges. Corteve Agriscience is focused on providing farmers with complete solutions, and digital agriculture is a key component to meet the needs of farmers.”

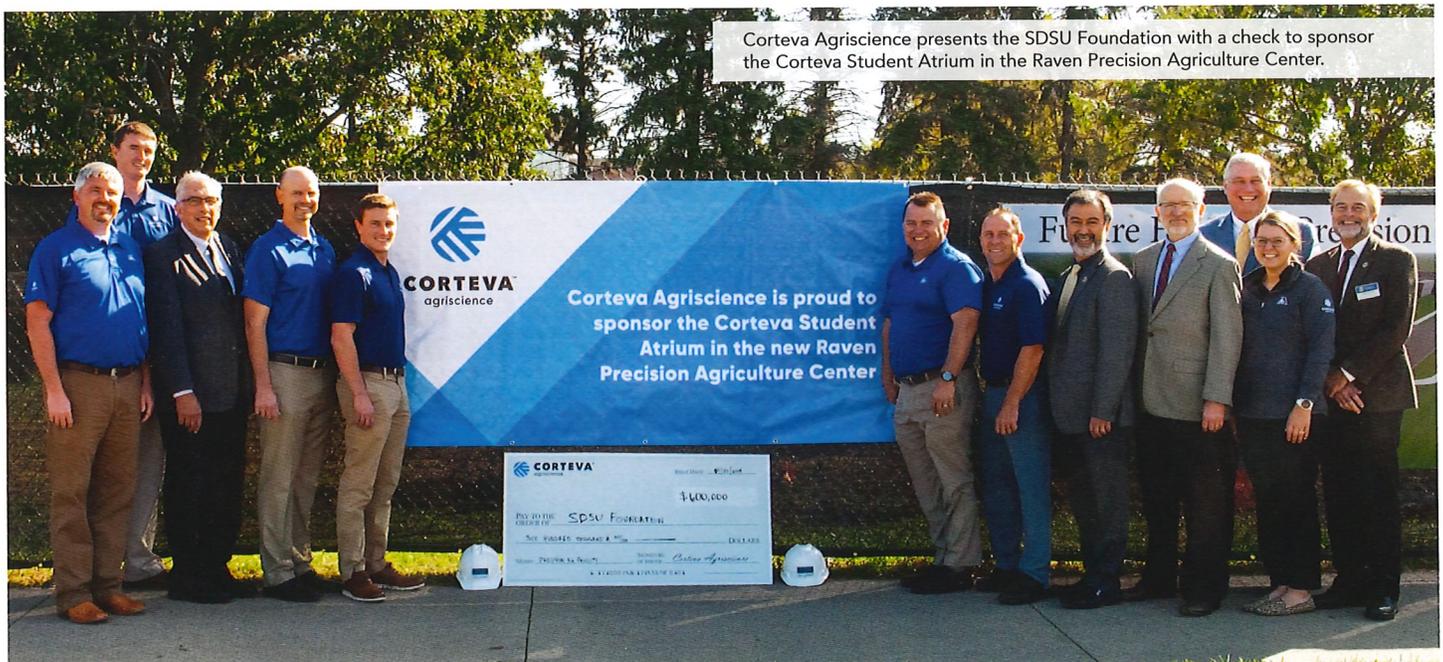
SDSU is the nation’s first land-grant university to offer a bachelor’s degree and minor in precision agriculture. The degree is a collaborative effort encompassing the Agricultural and Biosystems

Engineering Department and the Agronomy, Horticulture and Plant Science Department in the College of Agriculture, Food and Environmental Sciences, as well as the Jerome J. Lohr College of Engineering.

SDSU’s precision agriculture degree provides students with access to cutting-edge developments in the rapidly evolving intersection of agronomics, high-speed sensor technology, data management and advanced machinery development. Students will be prepared for lifelong careers that support economically and environmentally sustainable agriculture.

“We understand there are increasing needs of precision agriculture education,” said Williamson. “As a champion of responsible agriculture and an industry leader in digital technology, we look forward to what these capable students and this historic university can accomplish going forward.”

Sydney Meyer & Andrea Schubloom



Corteve Agriscience presents the SDSU Foundation with a check to sponsor the Corteve Student Atrium in the Raven Precision Agriculture Center.

THANK YOU!



FIRST DAKOTA NATIONAL BANK

The College of Agriculture, Food and Environmental Sciences would like to extend a sincere thank you to our friends at **First Dakota National Bank** for being our challenge donor during **One Day for State**. First Dakota National Bank matched **\$25,000** of the college's total for the day.

We'd also like to thank **all** alumni, current students and their families, SDSU faculty and staff, friends and past/present/future Jackrabbits from near and far for their generous support during One Day for State. Together **WE** raised over **\$109,000** for CAFES!

All funds raised during One Day for State will help to provide our students with scholarships, travel opportunities, hands-on learning experiences and much more!

One day for **STATE** 

2019 Results

24 *hours.* **3,744** *donors.*
\$1,348,477 *raised.*

College of Agriculture, Food and Environmental Sciences Results:

\$109,455 *raised*

209 *donors* 

 **24**
first-time donors

74
alumni donors

68
friend donors

48
faculty/staff donors

11
parent donors

8
student donors

www.sdstatefoundation.org/odfs

INVESTING IN TOMORROW'S LEADERS TODAY

At South Dakota State University we expect to be a premier land-grant institution recognized for high value, innovation and bold impact. We are dedicated to the education, growth and success of all our students. Within the College of Agriculture, Food and Environmental Sciences we embrace our land-grant mission as we prepare our graduates to feed the world, ensure the future of our natural resources, and shape the communities in which they live.

For generations, our graduates have been impactful leaders in their professions and home communities. We have an opportunity to build on this legacy of leadership. Moving forward, we expect to enhance the impact the students of our college make on our state, region and the world. We are preparing our current and future students to be global citizens that fuel our region's work force. We are engaging at a deeper level with producers, business/industry leaders, and communities asking them to partner with us as we invest in the next great generation of Jackrabbit students.

Our students have bold aspirations to lead and change our world. Our university has and will continue to be the launching pad for personal growth and professional development for our graduates. We are continually finding ways to enhance the resources we provide our students as they earn their degrees and prepare to enter the workforce.

Scholarship support, quality facilities, internship opportunities, competition experiences, access to state-of-the-art technology and first-rate instruction are essential elements in preparing our students to have impactful, personal and professional lives once they leave South Dakota State. Thanks to a strong "culture of giving" at our institution, we have made great strides in recent years in providing these resources, but we are just getting started.

If you are a current donor, thank you. Your commitment to our mission is making an impact. If you are interested in exploring ways to invest in "Tomorrow's Leaders Today", we would enjoy discussing how you can make a difference at SDSU.



We appreciate your thoughtful consideration and look forward to our next conversation.

*Keith Mahlum,
MS '93*



SCHOLARSHIPS AT SOUTH DAKOTA STATE UNIVERSITY

**OUR STUDENTS HAVE BOLD DREAMS
AND AMBITIONS FOR THEIR FUTURE.**

**Scholarships change their lives and
contribute to their success at SDSU.**

For more information on scholarships or to make a contribution,
please contact the SDSU Foundation:

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