

# "The best way out of difficulty is through it." Will Rogers

We are pleased to provide you the Spring 2020 issue of the BAE Update newsletter. One of the things you will notice immediately is that the content of this newsletter varies radically from our traditional newsletter in terms of format and content. It reflects our need to adapt in many ways as we are navigating through an unprecedented time in higher education.

Within this issue of the BAE Update, you will have the opportunity to read and learn more about:

- Each of the BAE graduating seniors
- List of scholarship recipients

Over the last month or so, we have undergone significant changes in the way we work, live, and interact with each other. We have no playbook for this disruptive situation but are utilizing our ingenuity and resilience to deal with the evolving new normal. In response to the COVID-19 pandemic, Oklahoma State University decided to move all classes online for the second half of the spring semester. The teaching faculty had to figure out how to make the switch over in one week during Spring Break. At the same time, the research and extension faculty had to implement social distancing and keep their projects and programs moving forward. I am amazed at what our people have done and are doing. Following the advice of one of Oklahoma's favorite sons, Will Rogers, they took the challenge

head-on.

At present, a lot of things are not within our control. However, we always control how we act and respond. The BAE students, staff and faculty have all responded most professionally.

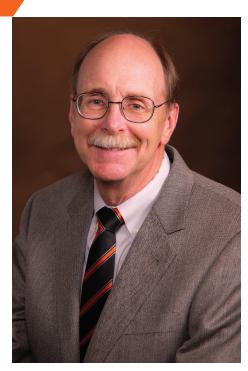
The COVID-19 pandemic led to the cancellation of the Spring Student Banquet, and with it, our opportunity to celebrate the successes of our senior class. We considered various options to honor the senior class and decided, due to the uniqueness of this situation, we would apply a one-time alteration to the BAE newsletter and use it as a vehicle to celebrate our seniors. We will return to our familiar format and content with a newsletter in the summer or fall.

The OSU BAE family continues to show its true colors as we rally to support each other and step up to the challenges presented by this pandemic. At this moment in time, we are focused on every measure we can devise to manage the challenges at hand while continuing the essential core mission of OSU.

When we come out on the other side of this pandemic, we will all have new skills and newfound confidence that we will be better equipped to handle anything else that comes our way in the future. Go Pokes!

Men

John N. Veenstra Professor and Department Head



*John Veenstra, BAE Department Head.* Photo by Todd Johnson.

The BAE Update is a publication of OSU's Department of Biosystems and Agricultural Engineering, and is published to inform alumni and friends of activities in the department. We invite and encourage you to submit comments, story ideas and alumni updates to:

BAE Update

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# Michelle Allen

Hometown: Albuquerque, New Mexico
Age: 22
Hobbies: Reading, knitting, hiking, and Netflix marathons
Why did you choose BAE: I chose BAE because I knew somebody in the department and he convinced me I would like this department more than the Chemical Engineering department.
Concentration: Bioprocessing & Food Processing
Favorite BAE Memory: Literally anytime I was working in 208

something funny and meaningful would happen to me.

**Plans after graduation:** I will work for a Pepsi bottling, canning, and distribution center in Tulsa. Also, getting married sometime in the next year.



# Micah Arthaud

Hometown: Keyes, Oklahoma
Age: 21
Hobbies: Basketball and Cowboy Motorsports
Why did you choose BAE: I grew up on a farm and have always had in interest in agriculture. I became interested in engineering through techincal electives in high school, so agricultural engineering seemed like the perfect fit, and it has been!

**Concentration:** Machine Systems & Agricultural Engineering **Favorite BAE Memory:** Attending the ASABE Quarter-Scale Tractor Competition.

**Plans after graduation:** I will work on my family's farm for now, but I hope to work for an agricultural equipment manufacturer.



## Barry Bachman

Hometown: Deer Creek, Oklahoma

**Age:** 21

Hobbies: Sports, board games and learning about new cultures. Why did you choose BAE: I chose BAE because it unites my interests in agriculture with engineering's capability to provide numerous ways to serve society.

**Concentration:** Machine Systems & Agricultural Engineering **Favorite BAE Memory:** My favorite memory is the family culture present in biosystems.

**Plans after graduation:** I will attend graduate school of theology and working in ministry.



## Mckenna Charles

Hometown:Broken Arrow, Oklahoma Age: 23

Hobbies: Reading, gaming, and embroidering at the time being Why did you choose BAE: I knew I wanted to follow my father's footsteps and be an engineer, but I wanted to go my own way as well. I want to have an impact on the environment and BAE fit perfectly for me. Concentration: Environment & Natural Resources Favorite BAE Memory: All the times spent in the BAE lounge talking together, helping with homework and being together. Plans after graduation: I have accepted a job with Tetra Tech in Tulsa, Oklahoma.



## Nathaniel Flippin

Hometown: Liberty, Oklahoma
Age: 23
Hobbies: Skeet shooting, beekeeping, and BCM
Why did you choose BAE: I chose BAE because I thought it offered a unique opportunity to be an engineer in a field where my work would have a direct, positive impact on our land and enviroment. Also, I found BAE faculty and students to be kind, down-to-earth people who always help and build each other up.
Concentration: Environment & Natural Resources

**Favorite BAE Memory:** Making friends with fellow BAE students. **Plans after graduation:** I do not have it quite nailed down, but I will enter the workforce as soon as I can.



## Braden Fountain

Hometown: Maize, Kansas Age: 22 Hobbies: Machining and cooking

Why did you choose BAE: I chose BAE because I wanted to make a difference in the world any way I can, and agricultural engineering played to my skills.

**Concentration:** Bioprocessing & Food Processing

**Favorite BAE Memory:** Working with my teammates in both senior design and instruments and control.

**Plans after graduation:** I am moving to Schuyler, Nebraska to work as an engineer for Cargill.



# Jenna Fowler

Hometown: Stillwater, Oklahoma Age: 22 Hobbies: Cooking and traveling

Why did you choose BAE: I knew I wanted to study food because it is essential to every person on the planet. BAE has a friendly department that offered a program aligning with my aspirations.

**Concentration:** Bioprocessing & Food Processing **Favorite BAE Memory:** Meeting Alex and Reagan in energy and power, then becoming life-long friends, or when our project actually worked in instruments and control.

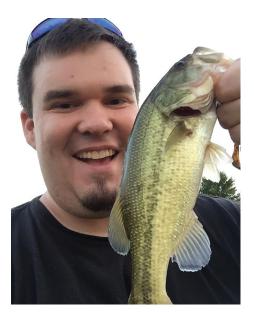
**Plans after graduation:** I will work for Frito-Lay in Dallas, then eventually get my master's degree.



# Brent Gwinn

Hometown: Houston, Texas Age: 22

Hobbies: I like to hunt, fish and be outdoors in my free time.
Why did you choose BAE: I liked how small the department was and how the faculty knew the students on a more personal level. Also, BAE curriculum seemed tailored to what I wanted to learn about.
Concentration: Machine Systems & Agricultural Engineering
Favorite BAE Memory: Being able to attend and participate in the ASABE Quarter-Scale Tractor Design Competition.
Plans after graduation: I will work full-time as a product engineer for Kubota Tractor Corporation.



## Andrew Hahn

Hometown: Broken Arrow, Oklahoma Age: 31

Hobbies: Hunting, fishing, reading and playing video games Why did you choose BAE: I enjoyed the smaller, family-style atmosphere of the department.

**Concentration:** Machine Systems & Agricultural Engineering **Favorite BAE Memory:** Anytime in Ag. Hall 208 when we were cracking jokes.

Plans after graduation: Get a job and support a family.



# Aubrey Herlocker

Hometown: Winfield, Kansas Age: 24

**Hobbies:** Hunting, fishing and spending time with family and friends. **Why did you choose BAE:** My sister graduated from BAE and she loved it. I really wanted to earn a degree in an area where I could help solve problems with natural resources.

**Concentration:** Environment & Natural Resources **Favorite BAE Memory:** Tough to say, but probably the events that occurred at the fall semester senior design final at Hideaway Pizza. **Plans after graduation:** I'm going to work full-time as an H&H engineer for Meshek and Associates.



# Lane Holt

Hometown: Kingfisher, Oklahoma Age: 22 Hobbies:Powerlifting and photography Why did you choose BAE: It felt like

Why did you choose BAE: It felt like the right type of engineering for me because of my agricultural background, but I stayed because of the family feel.

**Concentration:** Environment & Natural Resources **Favorite BAE Memory:** Playing racquetball with Dr. Thomas and Aubrey (Dr. Thomas always won).

**Plans after graduation:** I am moving to Beloit, Wyoming to work as a maintenance engineer for Hormel Foods.



# Caleb Jobe

Hometown: Woodlake, California Age: 23

**Hobbies:** Group storytelling, reading and playing video games **Why did you choose BAE:** I chose BAE because I thought biomechanical engineering had something to do with prosthetics. **Concentration:** Biomechanical

**Favorite BAE Memory:** Pulling two all-nighters in a row to complete my instruments and controls code.

**Plans after graduation:** I plan to find a job in Oklahoma City for a few years to begin paying off student loans.



Layne Kisling

Hometown: Enid, Oklahoma
Age: 22
Hobbies: Tinkering with computers and gaming
Why did you choose BAE: I enjoy engineering tasks, and I have strong ties to agriculture.
Concentration: Environment & Natural Resources
Favorite BAE Memory: Finding the BAE break room fridge restocked.
Plans after graduation: After securing a job with the Natural Resources Conservation Service, I hope to find a nice community in



# Emily Leupp

Hometown: Bartlesville, Oklahoma Age: 22

which I will start the next chapter of my life.

**Hobbies:** Singing, sharing sustainability tips, gardening and reading **Why did you choose BAE:** I am fascinated with helping others leave the planet better than we found it, and I love science and math. **Concentration:** Environment & Natural Resources

**Favorite BAE Memory:** The first week my senior design team collected data, one of our sensors was stolen. We had the serial number, pictures, and location of the sensor, so when we filed a police report, the officer said we were the most helpful victims he'd ever had!

**Plans after graduation:** I am going to graduate school at NC State pursuing a master's in biological and agricultural engineering.



# Ashton Nicole Lofquist

Hometown: Fort Worth, Texas Age: 22

**Hobbies:** Showing school spirit through the Paddle People, creative writing, and performing and listening to good music.

Why did you choose BAE: I chose BAE because it was the perfect combination of engineering and environmental science with a broader perspective than other fields, yet a close-knit family feel to it. **Concentration:** Environment & Natural Resources

**Favorite BAE Memory:** A tie between Rally at the University of Kentucky and all the fun hang out sessions I had with my classmates in the computer lab in 208.

**Plans after graduation:** I plan on working in the government on civil works projects for the Army Corps of Engineers.

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# Alexandra Lopez-Betancourt

Hometown: Tulsa, Oklahoma
Age: 23
Hobbies: Spending time with friends and family
Why did you choose BAE: BAE aligned perfectly with my career interests.
Concentration: Bioprocessing & Food Processing
Favorite BAE Memory: Senior design final at Hideaway Pizza.

Plans after graduation: I will be studying abroad.



Jordan Lord Hometown: Plano, Texas Age: 24 Hobbies: Classic car restoration Why did you choose BAE: I chose BAE after switching from mechanical engineering thanks to the encouragement from BAE alum Alec Cannon. Concentration: Biomechanical Favorite BAE Memory: Graduating Plans after graduation: I am getting married on May 30 and moving to Houston to work for HR Green with the Water Resources Group.



## Reagan McGuire

Hometown: Edmond, Oklahoma Age: 22 Hobbies: Running and knife forging

Why did you choose BAE: I chose BAE because it was a smaller community, the professors were close to students, and my family's agricultural background.

**Concentration:** Machine Systems & Agricultural Engineering **Favorite BAE Memory:** Getting to hang out with everyone in senior design.

**Plans after graduation:** I plan to attend law school, but I am undecided on where that will be. I have been accepted to OU, OCU, and Idaho colleges of law.



## Harleigh Moore

Hometown: Burbank, Oklahoma Age: 22 Hobbies: Beading and intramural sports Why did you choose BAE: I chose BAE because I was interested in sending water filtration systems to 3rd world countries. Concentration: Environment & Natural Resources Favorite BAE Memory: Spending time in Jana's office Plans after graduation: I will be working for Tanner Consulting, LLC.



## Heath Moorman

Hometown: Coyle, Oklahoma Age: 22

Hobbies: Hammocking, playing board games and cooking Why did you choose BAE: I chose BAE because I was not sure which discipline of engineering I was interested in, but I soon found a home in the department and fell in love with the people and the studies. Concentration: Machine Systems & Agricultural Engineering Favorite BAE Memory: When we discovered that tootsie rolls indeed do melt in microwaves.

**Plans after graduation:** I am seeking a job in mechanical or agricultural engineering in Oklahoma City. I will get married on June 20, then spend a week in Jamaica. Past that, I hope to travel so I may see more of the world and continue my education.



# Austin Pickering

Hometown: Tyrone, Oklahoma Age: 22

Hobbies: We are engineering students, we do not get hobbies? Why did you choose BAE: I am interested in tractors and such. Concentration: Machine Systems & Agricultural Engineering Favorite BAE Memory: That is hard to choose, we spent a lot of time in 208!

**Plans after graduation:** I had so much fun, so I thought I would drag it out and go to graduate school.



# Ross Roark

Hometown: Colorado Springs, Colorado Age: 22

**Hobbies:** Riding four wheelers and dirt bikes, woodworking and metal working.

Why did you choose BAE: I chose BAE for the advantage of getting an engineering degree with a focus in agriculture. I liked the small class size to allow students and faculty to make a deeper connection. Concentration: Biomechanical and Machine Systems

**Favorite BAE Memory:** Working with teammates in instrumentation and controls to create a unique project. It came together the night before we presented, and some how it worked without a hitch

**Plans after graduation:** I will work in a sales engineering role with Innovative IDM. Come October, I am marrying the love of my life.



# Lane Roth

Hometown: Pilot Point, Texas Age: 22 Hobbies: Learning Why did you choose BAE: I wanted to design tractors Concentration: Machine Systems and Agricultural Engineering Favorite BAE Memory: Class presentations on Calf Fry days Plans after graduation: I would like to be designing tractors



## Elisabeth Tidwell

Hometown: Edmond, Oklahoma Age: 21

Hobbies: Painting and baking are the main ones right now. Why did you choose BAE: I chose BAE, because of its environmental concentration. I was leaning towards environmental engineering, but was never completely set which led me to Biosystems. BAE is a very broad degree, where I had the opportunity to learn more about other sectors than I would have in any other engineering degree. Concentration: Environment and Natural Resources Favorite BAE Memory: My first back-to-school picnic Plans after graduation: I will attend University of North Carolina School of Law



*Chase Visina* Hometown: Edmond, Oklahoma Age: 22 Hobbies: Hunting, fishing, basketball and fitness Why did you choose BAE: I chose BAE because of the smaller, more personal feel. As a student, there are lots of hands-on activities a

more personal feel. As a student, there are lots of hands-on activities and projects that bridge what you read in a book with practical experience. The agricultural and environmental side of things aligned with my interests outside of school as well.

**Concentration:** Environment and Natural Resources

**Favorite BAE Memory:** Working on my Instruments and Controls project with Wade Young. We learned a lot, and once we finally figured out the programming, the results were so rewarding.

**Plans after graduation:** I will work for Pape-Dawson Engineering in Plano, TX as a water resources engineer.



## Hunter White

Hometown: Mooreland, Oklahoma Age: 22 Why did you choose BAE: I have always wanted an engineering

degree and have an agricultural background

**Concentration:** Machine System and Agricultural Engineering **Favorite BAE Memory:** Busting a hydrologic hose in Dr. Longs lab **Plans after graduation:** I will be going back home to the farm.



# Wade Young

Hometown: Princeton, Texas Age: 22 Hobbies: Woodworking and golf Why did you choose BAE: The small department with close relationships, friendly atmosphere and interesting areas of study Concentration: Machine Systems Favorite BAE Memory: Smoking meat for Homecoming Walk Around with Cowboy Motorsports Plans after graduation: I will attend graduate school



# 2020-2021 Scholarship Recipients

## Adam & Alee Gossen Scholarship (Endowed)

Rio Bonham

## AGCO Engineering Scholarships

Garrett Aranda Jacob Auer Jacob Kettner

Annette and Bill Barfield Scholarship

Natalie Hodde

## BAE Undergraduate Research Scholarship (Endowed)

Rio Bonham

## David McKay Scholarship

Sydney Cannon

## Don & Kim Yarbrough Scholarships

Sage Counts Emily Ea Roy Haden Kaitlyn Lane McKenna Lovejoy Rosalinda Rosales Matthew Studyvin

#### Dr. John B. Solie Scholarships (Endowed)

Brit Luna Seth Stone

Dudley & Betty Barefoot Memorial Scholarship (Endowed)

William Ellison





# 2020-2021 Scholarship Recipients

E. W. Schroeder Scholarship (Endowed)	
Garrison Hall	
Fred & Leatrice Bouse Scholarship in Agricultural Engineering (Endowed)	
Seth Durham	
Gerald & Linda Stangl (Endowed)	
Jay Clardy	
Glen Morgan Memorial Scholarship	
Jordan Dickey	
Greg & Kristen Hart Scholarships (Endowed)	
Collin Bellmer Kennerly Holloway Ashton Lofquist	
Halliburton Power of Six Scholarships (Endowed)	
Nickolas Savage	

Matilyn Wood

## James & Ruby Garton Scholarships (Endowed)

Addison Duling Taos McIntyre



# 2020-2021 Scholarship Recipients

## Jodie Whitney Scholarship

**Cooper Price** 

#### Lawrence O. Roth Scholarships (Endowed)

John Godfrey Trinity Smith

## Marvin Stone Scholarships (Endowed)

Lilly Schneberger Sawyer Searcey Tyler Walterscheid

#### **Oklahoma Association of Electric Cooperatives Scholarship**

Cameryn Taylor

**Oklahoma Municipal Power Authority Scholarship** 

Allison Storment

## **Oklahoma Grain & Feed Association Scholarship**

Colton Horn

#### Ron & Zona Noyes Scholarship (Endowed)

Gavin McCullough

#### Sam & Sheila Harp Scholarship (Endowed)

Josh Taber



# 2020-2021 Scholarship Reciepients

## Si & Kay Grider Scholarships (Endowed)

Courtney Andrews Jacob Auer Cameryn Taylor

## Terry D. Allen Agricultural Engineering Scholarship (Endowed)

**Courtney Andrews** 

## Tom and Jan Haan Scholarship (Endowed)

Kelly Lewis

## Wendell Bowers Scholarship

Kyle Humphrey

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Dr. James and Ruby Gaston Endowed Scholarship	(21-48200) Dr. John B. Solie Scholarship in Biosystems and	Sanature
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Tom & Jan Haan Bicsustance & Agricultural Engineering Scholarship (21-4220)	Agricultural Engineering (21-0020)	Have you included OSU Foundation in your estate plan?
Halliburton Power of Six Scholarship in BAE	Other:	Have you looked to see if you or your spouse's employer will match your contribution and double your impact? See a list of matching employers at OSUgiving.com/matching
21-432000 Sam & Shella Harp <u>Biosysteros</u> & Agricultural	"To learn more about how gifts are allocated, wisit OSUgiving.com	

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