MPH NEWSLETTER

Utah State University

College of Agriculture and Applied Sciences





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COLLEGE of AGRICULTURE and APPLIED SCIENCES

UtahStateUniversity

LETTER FROM THE DIRECTOR

Hello,

Hopefully the 2021-2022 academic year is off to a great start for all of you. We are looking forward to the many upcoming opportunities available this year for our students, faculty, and the program as a whole. We are incredibly pleased to have 22 new students who started the CAAS MPH program this fall with several more planning to start in spring 2022. Even with all the challenges and uncertainty due to COVID-19, our program continues to grow with this being our largest cohort yet! Although many of our students live and work around the state of Utah, we also have an increasing number of students located in other states across the country. The quick growth we have experienced over the past few years has resulted in many benefits to our students and program, some of which will be highlighted below. In addition, we are thrilled to have welcomed Casey Coombs MS, RD as our newest MPH faculty member. Casey is teaching several courses for students in both the Nutrition and Veterinary Public Health tracks.

We are excited to share some of our program highlights with you through our College of Agriculture and Applied Sciences MPH quarterly newsletter! You will find important information about the program, student and faculty spotlights, Dr. Jane Kelly's Zoonotic Disease Corner article, and much more. Thank you all for taking the time to read our newsletter. If you have any questions about the CAAS MPH program, please feel free to reach out to me anytime.



Take care.

Mateja R. Savoie Roskos PhD, MPH, RD Associate Professor; MPH Program Director

Faculty Spotlight

Jill Henderson, MPH, RD, CD

Jill Henderson is a native of Cache Valley. Jill completed her dietetics degree at Utah State University, followed by her Master of Public Health Nutrition degree a few years later. She is currently an instructor in the dietetics program teaching both the community and clinical labs as well as the first section of Medical Nutrition Therapy. Jill also teaches Communication in Nutrition Topics in the MPH nutrition program.

Jill fell in love with public health while in the dietetics program. After taking some community nutrition classes, she realized there was a lot of work that still needed to be done to combat food insecurity, promote better policies and planning in communities, and in disease prevention. Jill is also very passionate about studying social determinants of health, as she feels there is not a way to solve a problem without first understanding the root cause.



Jill's advice to current MPH students is to branch out and find that niche of public health that you love. Don't be afraid to reach out to network with other professionals as they can offer other insights and direct you to opportunities you may otherwise not have known about.

NDFS Spotlight



Sandra Quiroz Elizondo

Sandra has been awarded the 2021 Academy of Nutrition and Dietetics Foundation Diversity Scholarship, here is what she had to say about it:

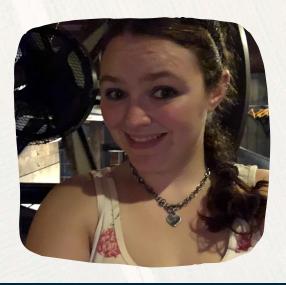
"I am sincerely honored to have been selected as the recipient for the 2021 Academy of Nutrition and Dietetics Foundation Diversity Scholarship. Thanks to the generosity of the Academy donors, I got the opportunity to start my master's degree at Utah State University without having to defer my acceptance.

As I complete my dietetic internship at Be Well Solutions and my Master of Public Health at Utah State University, I am committed to being an advocate for diversity in the field of dietetics and public health. I am very thankful because this scholarship has allowed me to enroll in both programs concurrently and keep working hard towards my goal of becoming a registered dietitian nutritionist."

ADVS Spotlight

Irene Hepler

Irene is in her second year of her MVPH and is a CAAS graduate student council ambassador. She is very passionate about One Health and dangers of zoonotic diseases. She wants to be able to use her love of animals and knowledge of zoonotic diseases to help keep communities safe. She has previously worked in the swine industry to help prevent disease spread. Since joining the MPH program she has been working with Dr. Kerry Rood on two different projects - one focusing on preventing disease outbreaks in agritourism and the other focusing on the impact of COVID-19 on Utah's agritourism. Irene plans on continuing her education through a veterinary program with a heavy emphasis on public health and eventually working in biosecurity. As the CAAS ambassador she hopes to bring the three public health programs at USU together to share student work with one another.



Zoonotic Disease Corner

E. Jane Kelly, DVM, MS, MPH, DACVPM, DACVM

I have been on the Utah One Health Symposium planning committee for several years. This year, the theme of the symposium is "Unexpected Consequences". This has had me thinking about some of the unusual consequences of diseases, zoonotic and other, including historical diseases and very recent ones. We are all living in the midst of the COVID-19 pandemic and we all heard about some of the unexpected positive consequences of widespread quarantine including the decreased air pollution in some of the most polluted cities in the world and a less severe influenza season than usual due to mandatory mask wearing. However, there were also unexpected negative results of quarantine including social isolation and the dreaded "quarantine 15" weight gain that many people experienced.



A much older example of this idea of unexpected consequences is a disease of cattle called rinderpest that has actually been eradicated and is not even a zoonotic disease. However, it had profound public health implications in Africa. Rinderpest, a viral disease of cattle and wild ungulates such as wildebeest. It was introduced to Africa with cattle from India in 1889. The cattle were completely naïve immunologically having never been exposed to the virus and this disease

(also called cattle plague) killed approximately 90% of the cattle in central Africa as well as countless buffalo and wildebeest. The Masai people of Tanzania relied on their cattle for meat and milk, cattle were their livelihood. With most of the cattle dead, there was mass starvation and two-thirds of the Masai in Tanzania died. There are historical reports of hyenas dragging off weakened villagers. Because of greatly reduced cattle and wild ungulate populations, the growth of vegetation increased leading to increased numbers of tsetse flies. Tsetse flies are vectors for a disease of humans called sleeping sickness (trypanosomiasis). Another unexpected consequence of a viral disease of cattle (rinderpest) was an increase in vectors for a human disease called sleeping sickness (as well as the mass starvation of human populations in Ethiopa and Tanzania described above).

Zoonotic Disease Corner c.

The foot and mouth disease (FMD) outbreak in the UK in 2001 is another example of an animal disease having far-reaching consequences in human health even though it is not a zoonotic disease. Foot and mouth disease is a highly contagious viral disease of cattle, sheep, goats, pigs and other cloven-hooved animals. Countries that diagnose it are required to notify the World Organization for Animal Health (OIE) of an outbreak within 24 hours of the first diagnosed case. In 2001, there was a large outbreak in Britain. The cause was likely the feeding of improperly-treated waste food fed to pigs. The disease spread rapidly to sheep and cattle. The OIE was notified as is required and within 24 hours the EU banned imports from the UK and shorty thereafter the USU and Canada banned imports of meat from the EU. In this outbreak, vaccinations were not used. Instead, animal movement was restricted and there were mass depopulations of exposed farm animals and those within a 3km radius of affected farms. Huge numbers of carcasses were incinerated. So, as well as the expected economic and trade consequences of the disease, there were unexpected and tragic mental health consequences. The mass euthanasia and burning of carcasses had a huge toll on the emotional health of people. As Mort et al. stated in their paper on the psychological effects of the 2001 UK foot and mouth disease epidemic "the disease epidemic was a human tragedy, not just an animal one". Increased suicides in famers was blamed on the FMD outbreak.

These are just a few examples of animal diseases that are not zoonotic causing unexpected and tragic consequences on human populations. Many more exist. Public health is often closely related to animal health. As a last thought, we at the Utah Vet Diagnostic Laboratory do private cremations for pets. Frequently we see first-hand how important pets are to people and how terribly upset many people are when their pet dies.

"These are just a few examples of animal diseases that are not zoonotic causing unexpected and tragic consequences on human populations."

Upcoming Events

Utah One Health Symposium - Virtual

Unexpected Consequences

The special focus of the 2021 Symposium will be on the unexpected consequences of the connections between human, animal, and environmental health, while exploring the impact of emerging disease on communities and individuals. This symposium is being hosted by our own Dr. Kerry Rood and several different speakers will be highlighting emerging public health topics. CE credit is also available for Veterinarians.

Click Here to Register

Dates and Time: Mondays Oct 25th

& Nov. 1st, 8th, and 15th.

3-5pm MST





2021 American Public Health Association Meeting and Expo

The annual APHA meeting and expo is at the end of October and will be available in person in Denver, CO and online to those interested in being involved remotely.

"Creating the Healthiest Nation: Strengthening Social Connectedness" will be this year's theme and will be touched upon in a variety of different types of sessions. This would be great way to expand your public health knowledge and potentially make new connection with your peers. There is a student discount for registration as well.

Click Here to Register

Dates: October 24th-27th

Don't Forget to Follow Us!

Be the first to hear about MPH program updates by following our social media handles! This is a great way to stay up to date on program changes, class highlights, public health events, and potential job opportunities. It also provides you with the opportunity to network with other public health professionals and programs.

Instagram: <u>@usu.mph</u>
Linkedin: <u>USU Master's of Public Health</u>
Facebook: Utah State University Master of Public Health Program