

WSU COVID-19 Town Hall – October 21

PHIL WEILER: Good morning, everyone. Welcome to our 12th in this series of system wide COVID 19 Town Halls for Washington State University. My name is Phil Weiler. I'm Vice President for Marketing and Communications. And I'm going to be the moderator for our session today.

Today's town hall is going to cover a variety of different topics. I wanted to give you just a quick preview about what we'll be talking about. As most people will know, we've made some changes to our spring semester academic calendar. So we'll walk through those and talk about what those mean and what the implications are for different members of the WSU community.

Then, I'd like to spend some time talking about some of the research that WSU faculty are doing in the area of COVID 19. As a Land Grant University, WSU is charged with doing research into the problems that are facing society today. And WSU is definitely living up to its land grant mission with regard to COVID 19, whether it's our WSU Extension Service working on issues of food insecurity, or pharmaceutical interventions that are being developed to deal with COVID 19 related symptoms.

WSU has a deep and broad portfolio of COVID related research, much more than we can talk about in one hour. So in fact, our November and December sessions will also touch on some of the research we're doing with regard to COVID 19 and how that lives into our land grant mission here.

But then, we're going to close with a little bit of information about the status of some of the COVID 19 illnesses that we've experienced here on the Pullman Campus. So I'd encourage you to stick around for that as well.

Let me introduce our panelists and we'll go ahead and get started. We're joined today by Kirk Schulz, President Of Washington State University. Elizabeth Chilton, our Provost and Senior Vice President. Lisa Gloss, Dean of the WSU Graduate School. Dave Cillay, Vice President for Academic Outreach and Innovation. And the Chancellor of the WSU Global Campus.

Next we have Celestina Barbosa-Leiker. She's joining us in her capacity as the Vice Chancellor for Research for the WSU Health Sciences Campus. Then, we're going to hear from Stephanie Seifert. She's an Assistant Professor at the Paul G. Allen School for Global Animal Health. And then, also Dr. Michael Letko who is also an Assistant Professor at the Paul G. Allen School for Global Animal Health.

And finally, we'll conclude with some comments from Jason Sampson, who is the Assistant Director of Environmental Services, Public Health, and Sustainability for WSU.

So let me turn over to President Schulz so we can go ahead and get started. And looking forward to the next hour. Thanks for joining us.

KIRK SCHULZ: Well, hello Cougs and welcome to a great Wednesday. It's always a great day to be a Cougar, and today is no different than any other time. So I've got several things I just want to start off with today.

First, let me acknowledge our families, our students, our faculty, and staff. And this is still a very challenging time for so many members of the Cougar family, whether you're a student dealing with remote educational experiences and bandwidth and missing being around people. Whether you're a family that is trying to struggle with K through 12. Having some folks also in higher education and balancing work related with that.

We have students, faculty, and staff dealing with daycare issues, elder care issues. All that while balancing that out a pandemic, uncertainty around our financial future, as well as trying to work full time, it's just a really challenging time.

And I just want to express my appreciation to all of our faculty and staff for the great work they continue to do to engage with our students, to work on service to help the state of Washington as our economy improves, and we're going to hear from some of our exceptional faculty doing research today COVID 19 related things. And I look forward to hearing what they're doing and hearing what some other colleagues are doing in subsequent town halls.

A couple of things I just want to remind everybody, we have no playbook that we go to and read chapter 3 and know exactly what to do in something like this. And we continue to learn as we go along. And I think that's an important thing. As we start talking about spring semester, one of the things is we've got to learn about what worked really well for us in the fall semester and some things that maybe didn't work as well.

So that means we're going to have to be adaptable. We have to change. And not everybody's always happy about those things. But we're learning as we're going along. We're communicating with higher education folks around the country, around the state, and I think that's an important thing to remember. I worked with a lot of our Pac-12 presidents to put us in a position to safely be able to resume a lot of our intercollegiate athletics activities and sports.

And I'm a football fan, a basketball fan. I'm really cranked and excited by that. One of the things that we're going to be asking Cougs though is-- I know we play University of Oregon and in November here in Pullman. We're asking you to please not come to Pullman. Please do not come and say, hey, I know I can't get in the stadium, but I just want to be there anyway.

We're going to continue to communicate and ask people, tailgate from your home with a couple and only a couple of your closest friends and family members. But be careful about gathering. And again, we want to emphasize, watch it on TV, cheer loudly, cheer for the Cougs,

but do that from the safety of your own home. And don't come to Pullman to say, hey, I'm going to participate anyway.

Now, this is not one of those things where I'm saying, you all need to do that, but it's going to be different for me. President of the University and first lady will be watching our football games from our house. Watching them on TV just like everybody else will be doing. So we really need your help in doing this and making sure that we continue to manage COVID 19 as effectively as possible in the Pullman community and all of our other campus communities.

And finally, we made some announcements that we'll talk more about in the spring semester. And not everybody agrees with the no tailgating thing or no spring break or starting things later. And we hear from you. Please know that we're going to continue to make the best decisions based on data and information that we have, even if those aren't popular or the type of thing that people think that we're clueless.

We'll continue to communicate clearly. And we want to hear back from you when you don't appreciate what we do. We also want to hear from you if you think, hey, that was a really good decision. But keep that information flow going. But please know we're going to continue to make the decisions that we think are the absolute best for the health and safety of our faculty, staff, and students and the communities where WSU campus is.

So I look forward to hearing from my colleagues. Thank you all for joining us today. It's amazing to think that we've done 12 of these and that we're going to keep doing them as long as they're effective in providing information for the Coug nation. So thanks for being with us today. And as always, go Cougs.

PHIL WEILER: Thanks, President Schulz. I'm looking here on the YouTube Live. We've got more than 900 people who are joining us already. So clearly, I think this is addressing a need the people are seeing. They're willing to spend their time with us to hear what's happening with regard to COVID.

I'd like to turn it over to Provost Chilton if I could. I know that we did make an announcement recently about a change in the academic calendar. Can you remind us what those changes entailed? And then, also, what was the thinking behind making that change to the calendar?

ELIZABETH CHILTON: Yes, thank you for the question, Phil. As President Schulz just said, all of the decisions that we make are done collaboratively. We talk among the president's cabinet. And all of our decisions are guided by the principle of wanting to keep our students, faculty, staff and our communities healthy and safe.

And also, as Kirk said, we don't have a playbook. And so, oftentimes, we look to our peer institutions. Things that worked this semester, things that didn't work so well this semester, either for us or from our peers. And we also look at the science and the epidemiology and some

of the research that's coming out of scholars including those who are going to be presenting today.

So a number of institutions have made changes to their spring calendar, including elimination of spring break or late starts, et cetera, to ensure that as we're launching a new testing protocol that once we've got people safely either moved into where they're going to be that we're not sending people away and bringing them back again and starting that whole process all over.

So institutions like Carnegie Mellon, Ohio State, Wisconsin, Madison, Iowa State, Purdue, Kentucky, I could go on. But a number of institutions-- we're looking carefully at what are they doing. Not that we just follow what the pack does, no pun intended. But that we are guided by the same kinds of guiding principles that many of our peers are.

So we're going to start the semester eight days later than normal. We're going to start on January 19 rather than the 11th. That will give the winter time, a little time to [AUDIO OUT] out a flu or whatever is going on. And also will give us an extra-- some extra time for, potentially, a staggered move in concert with our arrival testing for on campus housing on the Pullman campus.

The other campuses came along with us. And we did this as a system because we share a lot of curriculum among the physical campuses and the WSU system. And so we'll start a week later. We will eliminate the spring break. But instead, implement academic breaks. These are all on our website. But Thursday, February 25th, Wednesday, March 17th, Tuesday, April 13th, and also President's Day on Monday, February 15th. And we'll start regular time-- I'm sorry, we'll end the semester at a regular time.

Overall, this actually means there's about a week less-- a week fewer of classes total for the spring. And this still meets our accreditation criteria. But we'll just give everyone a little bit less of an intense spring semester, we hope. And we understand that one solid week of break would be preferable for many.

But in concert with our testing protocol, it just wouldn't allow us to safely move people out and move people back in and maintain our standards for that.

So Phil, I also did want to just mention, in case people are curious, some of our colleges, for example, pharmacy, nursing, veterinary medicine, and a couple of our MBA programs, they have partnerships with other institutions and could not adjust their calendars. So if you're curious to know, you can go to registrar.wsu.edu/academiccalendar and one of our content experts can put that link up in the chat there. And you can search any campus and any term and see the academic calendar that pertains to that degree program.

PHIL WEILER: Terrific, thank you. You answered, actually, all the questions I had, so I appreciate that. Lisa, if I could turn it to you, I do know that there was some concern among graduate students. Questions that we had received I'm wondering how this might impact graduate

students who were teaching in the classrooms or how this might impact research that they might be doing on the various campuses. Could you talk about how this delayed start might impact graduate students?

And again, are there going to be any consequences for those students who either work in labs or might work in one of our extension research centers?

LISA GLOSS: Good morning, Phil. Good morning to everyone, and thank you for those questions. I appreciate the opportunity to address graduate education. So [? I'll ?] take us on a different number of topics. So for students taking-- graduate students taking classes, they'll have the same impact as an undergraduate education of a condensed semester with breaks-- one day breaks instead of a whole week of break. And the consequences that brings as Provost Chilton already addressed.

Assistantship-- that's probably one of the biggest issues for graduate students. Assistantships will still start on January 1, as they have for years, and go through May 15. So there will be no change in the support of graduate students. They will still receive the same number of assistantships. For students and research assistantships doing research, that doesn't really have much effect. I mean, they've been doing the research all along.

For students on teaching assistantships, it may seem a little odd because they'll be on an assistantship for a week when they're not actually teaching. But they will still be expected to do assistantship duties. And in fact, that week when we normally would have class in a regular year but are not having that, that gives those students an extra week to prepare to get ahead for when we start the more condensed semester when we don't have spring break as a whole week set aside to catch up.

So as far as the citizenship and student support [AUDIO OUT] there should be no effect on graduate students. Research. So to the extent that we're able to continue a safe environment and continue the ramp up to research that we've been ongoing since June, as long as that state is on board, there should be no effect on most research and scholarly activity functions of graduate school students, many of who, particularly in the STEM areas, are still on the WSU campuses, Pullman, Spokane, Vancouver, Tri-Cities.

For the R&D centers, again, the same thing. To the extent [AUDIO OUT] ramp up in the research, we can still do research in a protected manner with social distancing, wearing masks, et cetera. The change in the schedule should not affect research. Where there might be some concern-- and I don't have a really good answer to this-- but I think being aware of it and planning ahead will help. Is that many students have taken the option of using spring break to do field research, to leave the campus.

Well, there is not going to be that break. For students who are not taking didactic coursework, that really won't be much of effect. For those students that are trying to balance both their research schedule and taking courses, there is going to need to be some flexibility and some

understanding of that. And that will be up to individual students and faculty advisors to work with that sort of thing.

But again, communication is going to be one of the keys of getting through this. Communication and collaboration and compromise to make sure that everybody can continue their research and be successful in their coursework and in their teaching assistantship duties.

I think I answered both questions you asked. Is there anything you'd like me to expand upon?

PHIL WEILER: No, I think that covered it. Thank you. I appreciate that. As I said, we had heard from graduate students who wanted to make sure they really understood what the implications were for them. So thanks for doing that.

Dave, if I could turn to you now, I know when we made the decision to move to virtual learning for the fall semester, some faculty members have elected to use a service called ProctorU to help supervise testing. There's been some questions from students about, what is ProctorU? How does it work?

And my understanding is it is a service that Global Campus uses. So I wonder if you just fill us in on what is ProctorU and how does it actually work for students who are taking advantage of that service?

DAVID CILLAY: Certainly. Yeah, so assessment has been a focus of our faculty ever since the pivot to remote learning in the spring. And faculty have been extremely creative in how they have employed assessment strategies in their courses. Some of our faculty have chosen to use an online proctoring service called ProctorU. It allows students to take assessments in their home on their computer. And a Proctor monitors a student to ensure academic integrity.

I think right now about 4% of WSU courses are using ProctorU. And those courses, oftentimes, don't allow for alternative types of assessment. Really, that are replaced by using a Proctor. Global's been using a proctoring service for years. Because Global is a virtual environment, we allow students, again, to take assessments from their home.

We used to use physical proctoring where students would find a proctor in their local community and they would travel to that site and take the assessment there. The tools like ProctorU really have provided that flexibility for our students to not have to leave their home. They can manage it on their own time. They don't have to coordinate with a physical proctor.

That said, if students are currently uncomfortable using ProctorU, we still have that physical proctor structure in place. And so if a student would rather use a physical proctor, going to a physical location and being proctored, they have the option of working with their faculty to set that up. So that is an option for students who may be uncomfortable using an online proctoring service.

Furthermore, as we move through this semester, we've also worked with ProctorU to setup a couple of thousand practice exams which allow students to log into the system prior to taking their actual exam to identify any technical or operational glitches that they might encounter.

And the one thing I would offer as students move to online proctoring or an online assessment, really follow the instructions. What we found are, oftentimes, the challenges that are coming with connecting with ProctorU are because the instructions aren't being followed. And so one of the things we're also doing is creating a WSU video on exactly how to set up that proctoring session for our students. And that should be available shortly.

So I think that answers the questions you asked, Phil. Is there anything else?

PHIL WEILER: No, I think that covers it. Thank you. So it sounds like there'll be resources available for students who want to make sure that you're using ProctorU correctly. If students want to have another alternative to ProctorU, that's an option. They can work with their faculty members to explore those different options, so thanks for sharing that.

And again, I guess, the other piece that's worth noting is, as you mentioned, only about 4% of classes are using ProctorU. So it's a relatively small number. Great. Thank you.

I'd like, now, to spend some time talking about some of the research that WSU faculty members are doing around COVID 19. And what I'd like to do is to start with Celestina Barbosa-Leiker. She is the person who's in charge of research for the Health Sciences Campus. And obviously, we all know the Health Sciences Campus includes Colleges of Pharmacy and Pharmaceutical Sciences, Nursing, and Medicine.

Clearly, COVID 19 is very much in the concerns of those three colleges. We don't have the time to really cover absolutely everything that's happening on the Spokane Campus. But Celestina, if you could just give us a flavor of the kinds of work that's being done by faculty and researchers there, it will be something we'll be-- hopefully, be able to pursue in greater detail in some future COVID 19 town halls. So let me turn it over to you, Celestina, if I could.

CELESTINA BARBOSA-LEIKER: Great. Thank you so much, Phil. I'm honored to share some of the COVID 19 research coming out of the College of Nursing, the College of Pharmacy and Pharmaceutical Sciences, and the Elson S. Floyd College of Medicine.

But first, I want to recognize that almost none of our research is done in isolation on the Health Sciences Spokane Campus. We work in collaboration across campuses, colleges, extension sites, and many, many clinical partners across the state of Washington and beyond. So the research that I'm going to share is not just from that WSU Health Sciences Spokane Campus. But research where at least one primary investigator resides in one of our three colleges, recognizing the extensive network of researchers across the WSU system that's contributed to this work.

So let me first start with some examples of published work or work that's been highlighted in the press recently. So coming out of the College of Pharmacy and Pharmaceutical Sciences, pharmaceutical scientist Dr. Senthil Natesan is part of a research team working to unravel the molecular mechanisms that drive COVID 19's potentially fatal exaggerated lung inflammation response.

He's also working in collaboration with the College of Veterinary Medicine and on the Pullman Campus to help with identifying a peptide that could potentially be used to inhibit the SARS CoV 2 spike protein.

Another pharmacy faculty member, Dr. Josh Neumiller, was appointed to the American Diabetes Association's COVID 19 expert advisory panel, which studies the impact that the virus has on people living with diabetes. In the College of Nursing, two faculty members, Dr. Mary Ann Wilson and Dr. Shelly Fritz from the Vancouver campus tested a fabric mask with a filter that's available at big box stores as a last resort when N95 masks are unavailable. They tested two models on hospital staff members, and their work will be published next month.

Researchers in the College of Nursing and in the College of Medicine, so Dr. Smith, [INAUDIBLE], Cardie [INAUDIBLE], Ms. Brooks and myself, and so many students in the colleges of nursing and medicine, have established a WSU COVID Infant, Maternal, and Family Health Collaborative. So this is a multi-college, multi-campus collaborative. Study includes Dr. Skarstein, [INAUDIBLE], [? Waters, ?] Meehan, across the Pullman and Vancouver campuses. Again, across many colleges.

And we aim to address different aspects of the infant and maternal health issues as it relates to the COVID 19 pandemic. This includes three ongoing studies. So the first one is to look at the impact of COVID 19 pandemic on pregnant and parenting women who need access to substance use treatment.

Another one identifies areas of stress, coping, and resources needed for pregnant and parenting women during the pandemic. And then, finally, one that's looking at the COVID 19 related stress on pregnant women as it relates to mental health and substance use due to feelings of isolation during the stay at home order.

I also want to give a shout out to Dr. Courtney Meehan and the Pullman Campus and the Arts and Sciences on our COVID 19 infant feeding study. And this is where we're recruiting COVID 19 positive mothers from Spokane and around the country to study infection risk and immunity in infants.

In the Elson S. Floyd College of Medicine, researchers in the Department of Nutrition and Exercise Physiology have surveyed more than 900 pairs of twins to study the impact of Washington state's COVID 19 stay at home order on physical activity, alcohol use, and mental health.

And this work is led by Dr. Glen Duncan and Miss Ellie Avery. In one study, they found that people who reported increasing their physical activity levels after the start of the COVID 19 stay at home order reported higher levels of stress and anxiety than those whose activity levels stayed the same.

In another study, they reported that alcohol use changed almost immediately after the stay at home order was issued. And they looked at this relationship with stress and anxiety. Researchers in the College of Medicine have also been doing modeling and geographic information systems mapping to support hospitals, health authorities, and policymakers in their decision making related to the COVID maintain pandemic.

So one example is led by Dr. Ofer Amram. And this includes the COVID 19 Urban Rural Explorer or Cure. And this is a tracking tool that provides a daily snapshot into COVID 19 cases in rural communities across the country. So this tool enables users to identify rural counties with both limited hospital capacity and rapidly growing COVID 19 case numbers.

Dr. Amram also developed a capacity modeling tool in partnership with the Spokane Regional Health District and MultiCare. And this tool allows administrators to plug-in COVID 19 data and predict the future need for resources such as personal protective equipment and ventilators.

College of Medicine Research researchers led by Pablo Monsivais is also-- has also developed a COVID 19 vulnerability risk index for Washington State. This tool is an interactive map that combines key risk factors and population density to better understand how communities differ in their vulnerability to COVID 19.

Dr. Monsivais and his research team also teamed up with the city of Spokane to test wastewater for the Novel Coronavirus. They've sampled wastewater from city pipes in three separate Spokane neighborhoods and analyzed it for the virus. And finally, in the College of Medicine, researcher Dr. Jay Kennedy is leading an effort to evaluate the impact of COVID 19 pandemic on people with disabilities in the United States. His team has surveyed centers for independent living and their staff and consumers to determine COVID 19 related needs.

So that's just some of our recent research going on across our three colleges. But we've also been awarded some grant funding to begin COVID 19 research. And this includes a 4.4 million NIH grant awarded to Dr. Dedra Buchwald and the Institute for Research and Education to Advance Community Health, or IReach. And this project, which is called COVID 19 Epidemiology Research, Testing, and Services, or CONCERTS, involves researchers from WSU, the University of Colorado, and the University of Minnesota.

They're going to partner with urban Indian health programs in six major cities to understand who's been tested for COVID 19 already and what challenges exist for getting people tested and ultimately vaccinated. This grant also provides funds for overseeing resources to promote testing at each site. And the cities involved in this grant our Albuquerque, Anchorage, Denver, Minneapolis, Wichita, and Seattle.

There is also funding from the Andy Hill CARE Fund for two projects related to COVID 19 and cancer. So one study on the impact of COVID 19 pandemic on the health and well-being of cancer patients living in rural and tribal communities in our state is led by Dr. Patrick Johansen from IReach.

And then, there is a study that will evaluate the impact of missed or deferred cancer preventative care during the COVID 19 stay at home order in Washington state. And this is led by Dr. Ofer Amram. And this will look at administrative data from multi-care clinics related to canceled screenings, visits, care delays, and the number of positive cervical, breast, and colon cancer cases.

This is just a snapshot of some of the research that we're working on as it relates to COVID 19. And this is above and beyond our areas of research and excellence in understanding autism, cancer, chronic illness and disability, drug delivery and safety, neurological diseases in the brain, and the research that we do to promote health and improving the quality of life research in addiction and chronic pain, community health, health in the built environment, and sleep productivity and health functioning.

So lastly, I want to send a huge thank you to all of our grants and contracts managers and coordinators, and all of the research administrative staff that's been working tirelessly to make sure that our grants get out the door. We cannot be doing this work without all of the research staff that support the entire research enterprise at WSU.

So thank you for letting me share some of our COVID 19 research with all of you as we all work to improve the health and well-being of all of the residents of the state of Washington and beyond. Thank you.

PHIL WEILER: Thanks, Celestina. I'm smiling because as you were talking and I was thinking, wow, that is just a tremendous amount of work to manage all those grants. And so nice of you to call out those support staff for helping researchers secure the grants and then make sure that the research is being done. So a huge amount of information to share with us. Thank you so much.

What I'd like to do now is really dive a little bit deeper into the work of two researchers. Again, I mentioned it was Dr. Stephanie Seifert Dr. Michael Letko from the Paul G. Allen School of Global and Animal Health. They are doing some really interesting work, at least from my perspective, not only looking at COVID but also looking at the possibility of future pandemics.

And Stephanie, can you spend a little bit of time talking about the work you're doing about exploring bat biology and looking at how viruses may jump from animal host to humans?

STEPHANIE SEIFERT: Yeah, I can, thank you for having me here to talk to you all this morning about some of the work that we're doing at the Paul Allen School, and that I've been doing with

NIH where I just moved from NIH to start a faculty position here. I'm going to try to share on my screen.

So early on in the pandemic, I was still at the National Institutes of Health where I was part of the pandemic response and just trying to understand the basic biology of this SARS CoV2 virus that is the agent of COVID 19, including some efforts to figure out how to best decontaminate PPE like N95s for reuse during the shortage of available PPE to deal with this pandemic.

And now that we're moving on into that phase of learning better treatments on the medical side and the transmission of this virus is really dominated at this point by human to human transmission. We're starting to dive back into the ecology to prevent the next pandemic. So SARS CoV2 is not the first coronavirus to spill into the human population. Coronaviruses are also responsible for a lot of livestock disease, livestock illness, and pathology in dogs and cats as well.

There are a lot of different Coronaviruses that are either zoonotic, meaning they transmit from animals to humans, or that get into animal populations that affect our economy or the welfare of our companion animals. So the way that I think about zoonotic pathogens and zoonotic spillover from animals into humans is that there's this cumulative risk of many different components.

So a lot of different things have to align in order for a pathogen to spill into the human population. And for some viruses, this transmission chain is very well characterized, including rabies virus. And where we have a very good characterization of how transmission occurs or how the pathogen is maintained and wildlife or domestic animal populations, we're able to design intervention strategies around this transmission chain because we can identify vulnerable points.

So for rabies virus, most rabies cases around the world in humans are linked to dog bites. And with dog bites, we understand that rabies virus is maintained in this reservoir that has a very close interface with humans. And that allows us to develop strategies, for instance, with the Rabies Free Africa Program that happens-- that's a longstanding collaboration with our East Africa Campus and faculty members.

We're able to do this large vaccination campaigns as part of the WHO initiative, which is 0 by 30. So this is a very terrible disease with a very high case fatality rate. And because we understand the transmission chain, we're able to really successfully mitigate that transmission to humans and control the virus population in domestic animals that are the most likely to actually lead to transmission into humans.

So for viruses like Ebola virus, which is my background before the SARS CoV2 COVID pandemic, I was studying Ebola viruses in bats in Africa. We don't have a reservoir identified, and we really don't understand, right now, how these viruses are getting into the human population. So we

can't really develop effective mitigation strategies, which is obviously important if we want to start preventing the next pandemic.

So a big part of my research is in identifying reservoirs for some of these viruses. But then, also determining the diversity of Coronaviruses that exist in bat populations around the world. And so this is the direction that we're going now in our research is to take what we've done for the Ebola viruses.

So in a previous study, I've been the lead on a longitudinal sampling campaign for African bats to sample for Ebola viruses that cause hemorrhagic fever in humans. And so I've been sampling for many years from this hammer headed fruit bat that you can see right in an endemic zone for Ebola virus.

And what we found with this longitudinal study is that you have a peak of juvenile bats. So the bat reproduction is timed around the rainy season when you have an abundance of fruits available so that when the juvenile bats are leaving their mothers, that's when we think they're actually exposed for the first time to these Ebola viruses, which tells us that there is likely a seasonality to risk for Ebola virus spillover.

And so this is the kind of work that we are hoping to do with Coronaviruses, both in the US and in Africa, is to start identifying other Coronaviruses that are circulating in these bat populations. Coronaviruses that are closely related to SARS CoV, SARS CoV2 and MERS Coronavirus. And then, we can start to identify the viruses that are at the greatest risk of being transmitted into humans. And then, also, understanding how these viruses circulate in these bat populations.

And with that, I'm going to stop sharing and pass you on to Michael.

MICHAEL LETKO: Yep, all right. Thanks for that wonderful introduction, actually, to what I'm about to show here. So I'm going to quickly talk about some of the work that I'm doing to, basically, build a Coronavirus database to help us better understand how these viruses are actually transmitting between species. And then, more importantly, learn something about them so that we can try to prevent this from happening in the future.

So as Steph alluded to, there are a lot of new viruses being discovered in wildlife all the time. But unfortunately, most of these viruses are, actually, never really isolated. So that leaves a big question open, really, are these viruses a risk to humans? When we find a new sequence, we don't have a really easy way of addressing this question yet.

And so that's what my work is really aiming to try to build on is coming up with a series of new tools that we can use to better understand the risk that these viruses pose to global health. And this is a multipronged effort. The first step, really, involves making new laboratory tools to study all of these new viruses. And this is a combination of protein engineering and synthetic biology. Had some success already with this. Looking at the Sarbeco family of viruses, which includes SARS Coronavirus 2, which we're now all familiar with.

So once we have these tools in the lab, we need to then test them as they're discovered. And this is, really, we've exemplified this back in January just 12 days after the genome. We were able to use the tools that we had developed to rapidly characterize and identified the receptor for SARS 2.

And then, to extend this, we're now using these for active surveillance. So we have collaborators-- we found collaborators with Columbia University, EcoHealth Alliance and PREDICT. And what we basically did was tested several viruses that they were discovering. And we put it on our platform. We've now applied this or turned in applications to expand this work into other countries into Tanzania and Kenya here at WSU.

And then, finally, once we have all of this data, really, what do we do with it? And this is where the database building comes into play. So in collaboration with folks in the bioinformatics and computational biology department here at WSU, really planning out how we can take this data and use it more for predictive capabilities and for preventative capabilities.

So what we'll do is our database will be able to take in any novel viral genome sequence. We can then compare it to known viral sequences that we've tested, then, in our laboratory. And then, identify similar sequences. And then, have this all integrate into an overall score value for this novel viral genome to-- or to predict its ability to transmit or infect humans.

So why do we care about that? What's the whole reason behind studying zoonotic risk? What do we do with this information? I think, really, one of the initial efforts would be to improve the preventative medicine that we have. So this includes-- including our findings into new diagnostic assays.

So as we find viruses that present more risk to transmission, we can then include these viruses in our diagnostics so that we can detect them earlier. We can build up broader acting universal vaccines that can target whole groups of viruses. Broader antiviral drugs that work against a number of viruses.

But this is only-- these are only problems that we can really study once we know the viruses that pose the biggest risk. And then, a second effort would be to do contact mitigation with these higher risk species that are carrying these viruses. So reducing contact not only between humans, but also domestic animals and these other at risk species.

And with that, I'll thank you for your attention. And just plug that my lab is now hiring grad students and a technician.

PHIL WEILER: I love the shameless plug. Good for you. Need to do that more often, particularly if there are research opportunities or job opportunities open for students. So thank you for the both of you. Really interesting information. As both of you were speaking, I was thinking about the fact that I'm glad there are people out there who are looking over the horizon and trying to identify where the next illnesses may come from, and what we can do to ameliorate them and

prevent them from making that jump from animals to humans. So thank you for that information.

What I'd like to do now, if I could, is I'd like to turn to Jason Sampson. As many people know, we did experience an outbreak among college-aged students-- well, college-aged people in the Pullman community, particularly at the beginning of the academic year and that August and early September time frame.

And Jason and his team have been monitoring those illnesses. They have been doing contact tracing for students, faculty, and staff members who tested positive. And so we haven't really had an opportunity to talk about this yet at a town hall. I'd love, Jason, can you give us a sense of how many tests have we performed to date? And maybe talk a little bit about the One Health Diagnostic Lab that, I think, we have mentioned in previous sessions.

JASON SAMPSON: Thank you, Phil. I'd gladly talk about that. As you know, we don't live on an island as WSU. We do have some impacts from Latah county and Whitman county. But I'm really going to try to focus on just what WSU has done.

Obviously, there was some disappointment early on that we didn't get testing up and running. But I'm really proud to say that with Cougar Health Services and the Air National Guard, over the last several weeks, we've managed to do about 5,100 tests with students and employees here on campus.

And the great thing about those tests, we've actually been able to run the results in our own lab. Phil had mentioned the One Health Lab. They've been working with InSight early on to get an established lab here on campus. That is WADDL, the diagnostic site for COVID 19 is OneHealth. And they don't just do WSU's testing there. They run our tests.

They have also taken regional tests at-- from the hospital, from Palouse Medical, from Whitman Hospital in Colfax and other universities up in Spokane. And as of this week, the numbers I've seen, they've done about 2,600-- 27,000, excuse me. 1,000 tests. That's about seven or 900 tests a day at that time. And there still is room for them to actually even run more. So they have not reached capacity. And that is a really good sign as we move forward to spring and we try to figure out what that testing plan for WSU will be.

As you know, we did have that spike in August. And with that comes the need to contact trace. Because as we know, contact trace, as soon as we can get those people isolated and quarantined, we slow down that transmission. We didn't expect to see a spike that large at the beginning, unfortunately. So we did some catching up. But we were able to train about 25 contact tracers on the WSU Pullman Campus. Those contact tracers were directly with Whitman County.

We have also been able to use those contact tracers to assist at our other campuses across the state. Some of our research extension centers. And so we have them up and running and they

will continue to be ready to go moving into the spring and through the Christmas holidays and Thanksgiving break.

Another thing we like to look at is we did have this big spike, but what is actually happening now here on the campus? I think people look at that big number of positive tests, and currently, we've had about 1,300 to 1,400 positive tests associate with WSU students and employees.

But we should know that we only have about 50 active cases. And what that means is, we only have about 3% of those positives that are actually active or in isolation. And so it's much smaller than when you look at that big number of 1,400 about. And we're hoping to keep it down at that. Because when you have a lower number, obviously, there is a lower risk of transmitting it to other people.

Some other stats that we actually looked at nationally, and I think we got a lot of negative attention early on, was the percent positivity. We try to track that when we look at percent positivity, we actually do look at the entire county versus WSU. So what we do is we take all the tests run from Palouse Medical, Whitman Hospital, Cougar Health Services, and the Air National Guard.

And then, we take a look at the positive cases associated with those tests. And for the week-- last week, we actually had about 10% positivity. That may seem like a lot, but you got to look at where we started. We actually started in the high 20%. So we've actually brought that down a lot. And when you look at testing, early on when you target testing, that means when you're doing diagnostic testing, you're naturally going to have a higher percentage of positivity.

As you start looking at the general population, your positivity drops, right? We want to make sure we're reaching out to everybody and we're continually seeing that number gradually drop. As we move forward, we're hoping to get that down below 5%. That's always been the goal. That actually really shows you're, actually, reducing that transmission across your community.

And the other one that we always look at, and this is from a county and the Department of Health likes to look at it, is a two week running average. And that means, every day you look at the last two weeks and how many cases you have. We have peaked at about 290 cases over a two week span. And that was actually right at the beginning of the semester. Right in that first last week of August.

We're actually down-- WSU is down to 57 to about 50 cases last week. And I guess that's why we're actually down also to the number of active cases, right? As we reduce that two week average, we're naturally going to reduce the active cases. And we want to-- we've actually been really steady over the last three or four weeks on that. So that is a really good sign that the students, employees are really following those guidance, that's the mask wearing and things like that, to show that it actually is working.

And we're really seeing all this interaction from the transmission really occurring in the social setting versus settings in classrooms and research. And that's really important to know that when we actually follow those distancing plans, those disinfection plans, that we really have that potential to reduce that transmission.

PHIL WEILER: So Jason, you told us that the numbers are going in the right direction, which I think is great. But I appreciate the last thing you said, which is now is not the time for us to ease up on social distancing, on wearing masks, on avoiding large gatherings. Certainly, we've heard from health care professionals across the country that as we enter this fall and winter time frame, the expectation is we're going to see significant spikes across the country in cases.

And so now is the time for us, really, to double down on making sure we follow those basic-- their basic guidelines and not difficult things for us to do. But we all need to make sure that we are wearing the masks, being physically distant, not getting together in groups. And that, particularly, I think as the holidays approach, whether it's winter holidays or Thanksgiving holidays, there's a desire to get together with larger groups and family members.

And so we all need to be really careful that we don't use those-- or don't have those events turn into spreader events. Jason, one thing I'd like to have you talk a little bit about is about the testing itself. I'm looking at the live chat here on YouTube. And there was a person who had asked about, what is the experience like? What does it feel like to be tested?

And can you talk a little bit about what is that experience like? Is this one of the long swabs that tickle your brain, as some people have said? Or is it something different?

JASON SAMPSON: Sure, I can touch on that. Obviously, there was the original test that came out. Really scared people after they heard the first people got on there was a [? pharyngeal ?] and it went significantly up your nasal passage. And a lot of people had this discomfort. And the fact that they shared that with family and friends, people were actually scared to actually go get a test.

I can gladly say that the testing at OneHealth that's set up for everybody is a self-administered nasal swab. Obviously, you're doing this to yourself. So I guess if you push it up yourself far enough to have pain, then I guess was up to you. But it actually has taken that away greatly. You're still able to get a very effective result. But it's more of a very simple process. People walk you through it.

And I know multiple people that have gone in repeatedly to get tests as referred by their doctor, obviously, every two weeks or when they become close contact. But their willingness to go back and do it again really speaks to that we don't have that pain that was associated with those original tests.

PHIL WEILER: And it's probably worth repeating to everybody that testing is available at no cost to students on the Pullman Campus as well as employees on the Pullman Campus. We

encourage everybody in Whitman County to-- regardless of what location your working in the county to take advantage of this testing.

The University is covering the cost of these tests. They cost between \$100 and about \$125 apiece. We've spent well over \$600,000 to date covering the cost of those tests so that we can make sure that cost is not a barrier. As Jason mentioned, there is testing available for students at Cougar Health Services on the Pullman Campus.

In addition, we're working with the National Guard. They are moving their locations all around the city of Pullman. Again, to reduce those barriers. To have them go to where the people are to make that testing as convenient as possible. You can find the location of the National Guard test sites online if you go to WSU.edu and just Google COVID testing, you'll be able to find that information.

So please, definitely take advantage of that. Another thing I'll mention is this something we've talked about previously as well is we are entering flu season. There are flu shot clinics available on all of our campuses, or through all of our campuses across the system. Please take advantage of your flu shot. Get it as early as you can. We don't want to have people who are getting sick from the flu. And then, having to compete with people who might be ill from COVID 19. So definitely take advantage of your flu opportunities.

Jason, I just want to ask you one last question. I know the Centers for Disease Control and Prevention in Atlanta recently talked about the fact that if you had contracted COVID 19 and recovered that after approximately 90 days, some potential for you to be reinfected. We are getting close to that 90 day figure for some of our WSU Pullman students and faculty and staff who might have been infected early on.

So can you talk a little bit about what that means and what those individuals should be doing?

JASON SAMPSON: Sure. Obviously, with how new COVID 19 is, we continue to do research. And WSU is helping work the numbers through to find out what the true-- how long those antibodies last in your body. Right now, the CDC and State Department of Health know that the antibodies are good for 90 days. That means for those 90 days, technically, right now, they do not believe you can be reinfected with COVID 19.

This is really important when you talk about contact tracing, isolation, and quarantine. After 90 days, from the Department of Health standpoint, when we talk to people after-- they can potentially be infected again with COVID 19. So we're going to, again, ask people to quarantine and isolate if they test positive or if they're considered a close contact.

And so a lot of people, when they got that original test positive, some people think that that's a free pass and that they're good for a long time. It's really important to note that that is actually not the case right now. We're hoping that it actually is longer. I think a lot of people are crossing their fingers and hoping that they can be reinfected.

But for now, we do not know that so we took those precautions that we took prior to that infection. We still need to actually take moving forward. And it's also good to just stay in that habit right now. We don't need people walking around because they had a positive test. And just because they can't get re-infected, it's kind of a bad optic. And so please, if you've been tested, please follow the same procedures that everybody else has to do. It's just a really good practice.

PHIL WEILER: Great. Thank you, Jason. Good advice. As I said, now is not the time for us to let our guard down. We need to make sure we're following all those guidelines. We're getting close to the end. And I did see in the live chat here on YouTube, there was some question about whether faculty were made aware of the decisions around changing the spring semester schedule and questions about whether students and student government were aware.

My understanding is that both the Faculty Senate and student leadership had an opportunity to weigh in before the decision was made. But I guess, President Schulz, can you share-- is that information correct?

KIRK SCHULZ: Phil, thank you. And Provost Chilton can talk specifically about our faculty engagement in this. But I know our students and many of our students expressed a lot of dismay and felt that they had been left out of the decision making process surrounding cancellation of spring break and the change in the spring term.

What occurred was the faculty senates purview is the academic calendar. And Provost Chilton, appropriately, engaged with our faculty senate. They had several weeks into which to look at things. And they actually held an advisory vote, which was supportive of cancellation of spring break, spreading out three days through this semester, and starting a week later.

During that time, what occurred was we did not engage our student government in the way that we normally would. That's a mistake on our part. However, we made sure that there was some time for them to provide some feedback prior to the final decision being made.

This is one of those decisions that no matter what you decide, there's going to be a significant percentage of the WSU community that just simply disagrees with it. And I think this is a case where we had very strong faculty support for the change in calendar from the faculty senate. And we had pretty universal disagreement with our student leadership.

So the voice was heard, it's just we felt, based on data from other schools, what we saw in the spring semester of 2020, we really felt given where we expect to be with COVID 19 that this really is the best decision to make. I say that knowing that there is going to be disagreement and people will feel it's the wrong decision or the wrong decision for things like mental health.

But when we really consulted with folks, we looked at what other universities have done, we really felt this was the right decision to make for WSU. So lots of engagement. There was

certainly lots of feedback prior to that decision being made. But this is a case where there's just going to be some disagreement. And we still made the best decision we felt possible for WSU.

PHIL WEILER: Great, thank you. Provost Chilton, I don't know if there's anything that you wanted to add. I think we covered that. But I wanted to give you a chance to--

ELIZABETH CHILTON: Yeah, just briefly, as President Schulz said, we first floated the idea with the faculty senate. And I use that word very purposefully because we were aware from the start that eliminating spring break that our faculty want that break, our students want that break, our advisors in terms of Zoom meetings. It's not time off and vacation. They're still reporting and they're still doing things. But just to take a break from Zoom.

So we floated it with the faculty senate. And we had a week of about-- of a number of pieces of feedback and friendly amendments and the back and forth about which days and how long and when we'd start. Once the faculty senate, it really was not looking at first like the faculty senate were going to support it because of the desire for a mental health break.

Once they faculty senate did support it and then advisory council, the next day we reached out and shared the proposal with the student government council, which represents all of the ASWSUs across the system. We met with them on that following Monday before making a final decision.

From now on, when we send things to the faculty senate, we're copying SGC. In this case, we had to make a decision pretty quickly. And as President Schulz said, there were lots of things to consider. And we tried to be as transparent as we could as this proposal was evolving.

PHIL WEILER: Thank you, Elizabeth. I appreciate that. We're at the top of the hour. President Schulz, do you have any parting words before we are finished for the day?

KIRK SCHULZ: Well, once again, I want to express my appreciation for everybody who's joined us, whether you're watching it live or watching it later on YouTube. I want to express my appreciation to our faculty colleagues who are doing some exceptional research and scholarship around COVID 19 related things. And look forward in other of these town halls to also hearing what our colleagues are doing during this particular time.

So I just want to express my appreciation, again, to our faculty and staff and our students for their flexibility in these times. And please know, regardless of whether everybody agrees with our decisions or not, we want to make sure that we're communicating what we're doing, we're communicating why we're doing it, and we're just going to continue to use that and be as open and transparent as possible.

Acknowledging that there will be disagreement. But at the same time, making sure that we're always out there letting you know why we're choosing to do what we're doing. So as always, thank you and go Cougs.

PHIL WEILER: Thank you, President Schulz. I just have three quick items before we close off. Want to remind people that Washington State University is in the midst of its week long virtual safety health and security fair. We have a series of flash talks each day. Today's flash talks are going to focus on wellness. Today's Wellness Wednesday.

The flash talks include self-care during COVID, yoga for anxiety, and mental health self-care in crisis prevention. Those flash talks will run from 12:30 to 1:30 today. So they'll start in just about a half an hour. Best way to find that information to log in would be to go to WSU.edu. And in the search box, search for safety fair.

Also want to remind folks that the election is on November 3. If you've not registered to vote, the deadline is coming up. Please do take advantage of your right to vote. And then, finally, to let you know that our 13th COVID 19 town hall is scheduled for Wednesday, November 18 at 11:00 AM.

Again, we'll be focusing on new issues that are evolving as we make decisions about how to address COVID as an institution. But we'll also dig a little bit deeper into some of the research that's being done by WSU faculty and staff members.

So with that, I want to thank our panelists. I also want to thank the subject matter experts who are monitoring the chat function on YouTube. Again, it was an active chat group on YouTube. So thank you to the staff who helped with that.

And then, finally, once again, I want to thank all of you for joining us. Enjoy the rest of your day. Enjoy the rest of your week. And as the president said, go Cougs.