GABRIELLE O’BRIEN: So welcome everyone. My name is Gabrielle O'Brien and my pronouns are she and her. I'm the Senior Project Officer responsible for this event and representing the ADCET team.

On behalf of ADCET, I want to welcome all of you to this inaugural UDL Symposium titled UDL in Action, the What, the Why and the How of UDL.

ADCET is committed to the self‑determination of First Nations people. We acknowledge the Palawa and pakana people of lutruwita upon whose lands ADCET is hosted. I also want to pay my respects to the Turrbal, Yugara and Gubbi Gubbi people where I am today in Meanjin, Brisbane, and I want to acknowledge the traditional custodians of all the lands across Australia wherever our participants may be. I pay my deep respect to Elders past and present and welcome all Aboriginal and Torres Strait Islander Peoples joining today.

With the announcement of the date of the 2023 referendum on the Voice to Parliament, it is a good time to reflect on what we can do to support First Nations people at this politically charged time. ADCET hopes its commitment to the Voice can contribute to the future in a positive way.

Now for some housekeeping. Please note requirements for captioning and etiquette for all sessions to run smoothly are in the chat and on the UDL Symposium website at www.adcet.edu.au/UDLsymposium. This session is being recorded. Please turn off your camera and mic for the session. Please use the Q&A function to pose questions to the speaker, ensure your surrounding environment is quiet if you are attending workshop sessions. Don't forget to tag us on socials with #UDLSymposium2023. And don't forget we have more poster presentations on the ADCET website, and you will be provided all session recordings and notes on the ADCET website after the symposium.

So for many years, ADCET has been a proponent of UDL as a way to transform learning and teaching for the betterment of people with disability. To support the tertiary education sector, we have developed a range of resources and activities to assist educators, learning designers and others to implement a UDL approach. This has included an e‑learning module, web resources, webinars and a community of practice. Now we are excited to host this inaugural symposium to showcase the good practice in Australia and internationally.

We are very pleased to kick off this symposium with today's special guest speaker, Dr Sheryl Burgstahler. Sheryl's achievements are too many to mention in such a short timeframe, so I encourage you to view her biography on the program website. I am pleased to hand over to Sheryl who will be talking about how applying a UDL framework can lead to tertiary education that is accessible and inclusive. Over to you, Sheryl.

SHERYL BURGSTAHLER: Thank you so much. I've been to Australia several times and I wish I was there right now. I'm actually in Seattle, Washington, and here it's Monday evening, so our time is a little bit different, time of the day. I'm happy to be with you and it's wonderful we have technology where that is possible. I go by she/her pronouns. Again, my name is Sheryl Burgstahler. My email is on the screen and it is in chat as well. But I will read it. Sherylb@uw.edu. I wouldn't give out my email address if I didn't expect you to contact me. Maybe not all of you, but if you have a question, or to comment on something I have talked about, or extend the conversation, or look for resources, this is a topic I really care about, so I would be happy to talk to you.

I'm going to take kind of a bird's‑eye view of universal design, going beyond universal design for learning and seeing how it fits into a broader landscape of universal design applications. There will be a lot of sessions and the keynote on the next day of this program, more zeroed in on the UDL part of what I am talking about today.

So I direct two units under Accessible Technology Services. My two units are, first of all, the IT Accessibility Team. That team is funded by the University of Washington. It's been funded since 1984. My job there is to make sure the University of Washington procures, develops and uses technology that's accessible to everyone, including people with disabilities, which could be faculty, students, staff and even our visitors, like visitors to our websites. I would like to say we do a perfect job, but of course we don't. It's a journey, but we strive to reach those goals and make sure that we are fully inclusive and accessible to all of our people and our community that have disabilities. So, again, that's focused on the University of Washington, so of course it's funded by the UW which is a state‑funded institution of higher education. I will be using "higher education" and "post‑secondary" as you use "tertiary", and so you will hear I will be using a little bit different terminology but I think we all know they mean the same thing.

Then I have the DO‑IT centre, Disabilities, Opportunities, Internetworking, Technology. I started this program in 1992 because I wanted to do something beyond just focusing on technology. It's not just enough for people with disabilities to have access to technology like assistive technology and even access to accessible technology as well. But there are other things to support students with disabilities to get prepared for college and employment, and so forth. So I wanted to take a more holistic view. That was beyond my job description. So like a lot of institutions, maybe yours, the people who live their passion usually go out and get their own money. I started doing that in 1992, started with a large grant, multi‑million dollar grant from the National Science Foundation. Many of our programs are focused on science, technology, engineering and mathematics fields, which isn't a bad idea because those fields create many accessibility challenges, but also lucrative careers for people, where people with disabilities are underrepresented. Much of our funding stills comes from the National Science Foundation.

We also get state funds from Washington State, corporate funds, private funds and so forth to fund all the work we do. We even have a program in Japan at the University of Tokyo that does many of the same things we do in the DO‑IT program that started in 2007 after two visiting scholars from the University of Tokyo came to visit our program for a year. And later we funded this Centre on Universal Design and Education which is all about what we are talking about today. That was in 1999. Funded by our US Department of Education, but also in each grant proposal that I write to the National Science Foundation, Department of Education and otherwise, I will always say that the resources we create will build that resource. So we didn't ‑ you know, we had 10 years of funding from the Department of Education but we still continue to update and add new resources. So you might want to take a look at that. That resource will have a URL at the end of the slides.

Two projects are particularly relevant to what I'm talking about today. One of them is NNL. You will see that at the bottom of the screen. It's neuroscience for neurodiverse learners. So we are really focusing on students on the autism spectrum who have some learning disabilities, attention deficits and other issues that affect the way that they approach learning and they learn things. So that's a very interesting project to focus on that particular area.

We are always conscious of intersectionality, though. We might have a student who is on the autism spectrum who also might be blind or use a wheelchair or have other types of disabilities. I'm also talking about things that are related to access computing. That's a project that's been going on well over 10 years now funded by different grants from the National Science Foundation to increase the participation of people with disabilities in computer careers, computer and IT careers, also to work with faculty to make sure they can accommodate students with disabilities in their computing classes and help faculty learn how they can include universal design topics within their curriculum. So our computer science graduates will leave with degrees and also knowledge about how to design accessible products. Because in the US there is a big push from Microsoft, Google, Amazon for hiring people that know something about accessibility, which is a wonderful development, but unfortunately not all our faculty have caught up and are teaching accessible design in those classes so we work on a number of different areas.

When we are working with students ‑ many of our programs we have students with disabilities ‑ we take the approach of self‑determination. The idea ‑ the broad idea in helping students with disabilities get the skills they need, the knowledge they need, the resources, the networking ‑ all the things they need to make decisions in their life so they can be in charge of their life, get the resources they need and be successful in the areas that they choose to pursue.

But today we are talking more about working with faculty and staff and institutions and technology companies, and there we are always promoting the practice of universal design. So if we are working with technology companies, we are helping them make their products more accessible to people with disabilities.

So what I'm thinking about today is I think we need a paradigm shift. We just need to think differently. By paradigm, meaning the way we think about things in institutions of higher education. What do we think about? So changing from what to what? Well, from excluding groups of students who should be able to participate in something to be more inclusive. If we create barriers for them getting into career fields like computing and IT, that's really unfair. How can we open those doors and be more inclusive? From design for the average student to design for everyone, to be thinking not just, "Well, who is likely to be in my class? What's their background, how old are they going to be?", and so forth, but thinking about all students who might show up in our classes, including those students at the margins, rather than just think of average but think what are some of the outliers of some of the students that might be in my class? For instance in the area of technology knowledge some may think all students know about technology now. Not all of them do so we need to address those students that aren't technology savvy to make sure they can come up to speed and be successful in our classes.

From a reactive reliance on accommodations alone to a proactive universal design of accessible, inclusive, sustainable products and environments and services. By sustainable I mean we create a class that can be used for all students and perhaps have some students with accommodations, but make them as accessible as possible on the front end. They are born accessible is what we can call that. So, therefore, they are sustainable. And our country ‑ many times we provide accommodations in terms of document redesign so the documents will be accessible maybe to students who are blind or have learning disabilities, but we don't use those new developed materials in the next version of the class. It only goes to the student. So if another student comes in and needs accessible materials, then we do it all over again. We want to avoid that, and create sustainable products, environments and services.

But there was a time we, including you and us in a lot of different countries, we already did this. It was in the physical environment. So right now, I have on the screen a picture that appeared in the front page of a student newspaper here at the University of Washington in Seattle in 1970. Here we have a young man in a wheelchair in a crowded area walking with ‑ next to other students, and he has a large sign on his back of his wheelchair. It is in all capital letters. To me that says he is shouting to everyone who will listen. "Ramp the curbs. Get me off the street." Back in 1970, that was very controversial. University of Washington, as in other schools in the US, pushed back on that. We're a very hilly campus, a lot of sidewalks and we are really old. We have very high kerbs. So people would say how expensive is that going to be? How many students really do we have in wheelchairs? How can we afford to do such things? Well, some people recognise they should have put kerb cuts in them at the beginning so people in wheelchairs could use those sidewalks rather than be out on the street and trying to find ways into getting into buildings and on to sidewalks and so forth. Now it's common practice. So something that was controversial and just thought of as something that a person with a wheelchair would use, now we all use sidewalks with kerb cuts. So it's just an expectation in our neighbourhoods there will be kerb cuts. Who uses them? People pushing baby strollers and delivery carts and everybody else. I think people in wheelchairs are kind of the minority of the people who use those cuts. It benefits everyone. Wouldn't it be nice in our courses if the same thing happened. Maybe it will. That's our version. Maybe it won't be reality ever but it might be where it is just assumed when you develop a course it is made to be accessible to people with disabilities as well as other students.

I like to think of ability rather than disability and ability on a continuum. Everyone in this presentation today, 100s of us, could rate ourselves individually on this double‑edged arrow here from not able on the left to able on the right. We would all be able to rate ourselves and come up with a little list of our characteristics. My guess we wouldn't find any two of us that match. So we can take a look at the ability to understand English. One person might have a difficulty understanding English because English is not their first language. Another person might have difficulty understanding English because of a learning disability that affects their ability to do so. So, again, it could be a disability or it could be some other reason, and you could rate yourself maybe a little lower than other people might rate themselves. Social norms. We know students on the autism spectrum have difficulty picking up social cues, so they have to often be taught what other people seem to pick up naturally.

But there are other people who might rate themselves a little lower than others on social norms and they might have grown up in different cultures so they are learning new norms in the country they are now in. All these other characteristics as well, the ability to see on a continuum. A person might have, in this presentation, an inability to see this presentation. It could be because they are blind, it could be they have their video turned off because they don't have reliable internet connection, it could be they are in a location, maybe driving a car and listening to the talk ‑ to the audio.

So that's why I mentioned here that there is a double‑edged arrow all the way from not able to able, because I am assuming when I am giving this talk that some of you don't see the screen and I'm giving you just enough information so you can see what I'm talking about. That's universal design, the ability to hear or walk or reprint, write with a pen or pencil, communicate verbally, to not distraction, learn, manage physical and mental health ‑ these are all abilities. There are many more I could list. We could all rate ourselves. Again, the point is we don't have just one common model of what a human being looks like, even the average human being, so we need to accept diversity as just inability, as we do other characteristics of human beings.

Now, when we look at accommodations, when we're looking at an accommodation model, it is helpful to notice what one of the more expensive ones ‑ at least what we're experiencing here in the United States and may be common in Australia and other countries as well. Some of them are expensive accommodations in online courses, particularly in the pandemic, are first of all making inaccessible documents accessible. Mainly reformatting PDF files. PDF files tend to be difficult to make accessible. They can be. Some of you would probably know how to do that. But if you don't, it's more difficult to create an accessible PDF file than it is to create, say, a Word file or even an HTML document, that's HTML, hypertext marked up language is the language of the internet for web pages, but it also is for your content management program where you have a content page. That is in HTML that you are using there. That's easier to make accessible than a PDF.

What happens is a lot of faculty members put their syllabus in a PDF, and then they format and they have to be reformatted. If they did them in an accessible format, we would never have to provide that accommodation. Captioning videos is another one. Many of our faculty put their videos up on YouTube but they don't realise they can edit those captions and make them accurate. That, of course, is important for a lot of people, including students who are deaf. If we made those accurate captions on all the videos we used in our classes, that would be universal design. It no longer would be an accommodation that would have to be provided.

So universal design ‑ you may have a different definition. I like the original one from the Centre of Universal Design at North Carolina State University which applies to any product or environment. "The design of products and environments to be useable by all people to the greatest extent possible without the need for adaptation or specialised design." We should think about the diversity of people in our classes and how we can make whatever we are doing, designing a class or presenting materials, or whatever, accessible to everybody.

The three characteristics of universal design of any type are it's technically accessible, that would be technically accessible to someone who has a disability; useable, that also means it's easy to use, you can figure out what to do, you can perform all the functions, you can navigate on a website and so forth; and then inclusive as well, whenever possible, we create products that everyone can use so students, for example, can work side by side.

A quick example in the physical environment what it means to be inclusive is represented by the two pictures I have on the screen right now. On the left‑hand side we have one we would call America's Disabilities Act compliant. It meets all the standards to be ADA compliant. Two steps into the front door of this pretty modern building, and then to the left we have a ramp, it has handrails. That's ADA compliant for our standards here in the United States. But on the right‑hand side we have something that goes beyond ADA compliance to be more inclusive. On the left, if I'm walking next to someone using a wheelchair, they will go one way, they will go the other. We will meet at the top but it will interrupt our conversation. On the right, we have another building at the University of Washington that has a gradually sloping ramp into the building. That's the main entrance to the building. Notice that ramp is really wide as well. So my colleague using a wheelchair and I can walk side by side to go into that front door. We don't have to have our communication interrupted and it's wide enough that people can pass us on the other side. There are many steps in this building. You can find them, you can use them. But the main entrance is the one that's most accessible and inclusive.

So looking at framework ‑ I will give you some resources to look this up but we only have a few more minutes here so I won't go into detail ‑ I created a framework, the universal design in higher education framework, where we have a scope, we have definition ‑ I already gave the definition ‑ and there are principles, guidelines, practices and processes. We will go through a few of those things. One thing to think about is the diversity of our students, with respect to race, ethnicity, cultural background, sexual identity, socioeconomic, age, mental status, religious beliefs, values, academic interests, work experiences and specific abilities, we already talked about. So a lot of range of people in our classes. And then the scope. You could be looking at all applications in education or tertiary education. You could be looking just at instruction. There would be a lot of focus on instruction in these two days in this program. Services, like career services and so forth, the technology design of things you create on your campus, like we do in our one unit I mentioned already. The physical spaces, the products, conference exhibits, presentations. We are making our presentations in these sessions accessible to people with disabilities. The files, and so forth, you can access. And even professional organisations and lots of other things.

An example, when you look at universal design of technology, just think of your smartphone. It builds in accessibility features. We can change the foreground and background and text size, and our phones can even talk to us. Mine a little bit too much, by the way. But also, we want to make sure that these devices are compatible with any other assistive technology that people with disabilities might be using, like a Braille embosser for a person who is blind and they want to have hardcopy so they can produce things in Braille.

There are multiple beneficiaries of universal design. We already talked about videos but when you think about videos that have good solid accurate captions, who do they benefit? Certainly people who are deaf and cannot hear, but also English language learners. When you think of it, it's kind of a mean trick if you don't have accurate captions on your videos and you have ones that have misspelled words, no punctuation, and so forth, for an English language learner. Also people who are in a noisy environment, like an airport or a noiseless one like a library and they want to watch a video and turn off the sound. Slow internet connections. They want to know the spelling of words. That's pretty much everybody. And they need to find the content quickly because there are ways to search through a collection of videos through those captions and find specific content, just like a Google search for text.

There are three sets of principles that underpin my framework for universal design in higher education or other applications as well that I really think are relevant to education. There are other principles out there, by the way, for the universal design of homes so people can live in homes as they age and reduce function, but these three are particularly relevant. They are the 7 original principles of universal design that go along with that definition I brought on the screen a while back, and they can help you with a physical space, like is there a space for moving in an environment, for people who are left and right‑handed and other things, useable, and so forth. And these are basic principles that apply to anything, but particularly the physical space. Then the three principles of universal design for learning that you are going to talk a lot about on these two days. Then there are actually four principles for the universal design of information technology, for the IT that we use, those learning management systems and, as they said, the modules within them, and so forth. And those four principles, too, can be used to underpin what we are doing, and they also underpin the web content accessibility guidelines that are used worldwide for the design of websites and other IT.

I'm just going to fast forward and say what I think, if you apply all three sets of principles, what happens in an educational setting. Well, first of all you provide multiple ways for your participants, which would be your students, to learn, to demonstrate what they have learned, and to engage. So, for instance, you are teaching a topic, you have a video that presents that material, you have something that they can read to learn about that material. To demonstrate what they have learned, a lot of different ways to test and evaluate the students' learning. Then different ways to engage in the class as well.

But then there is another thing which means to ensure that the technologies, the facilities, the services, the resources, the strategies are accessible to individuals with a wide variety of disabilities. That's why we need UDL plus these other sets of principles as well. For instance, the one example I gave. If you have the video and you have the handout. Sometimes people think that's enough. Sometimes even people that are practising UDL. But I don't think it's enough if you look at UD more broadly. You need to go back at that video and make sure it has accurate captions and is otherwise accessible to people with disabilities. Then you need to look at that material. Is it designed in a way that it's accessible to someone who is blind and using a screen reader perhaps to read the text on the screen, or someone with a learning disability who uses simpler technology to convert text to speech. So that's important as well.

So what do we have to do? Well, considering, of course, consider the characteristics of students who might attend and the assistive technologies they might be using. And I have actually four people I would like to introduce to you. If you make your course accessible to these four people, then it's going to be accessible to most people who might be in your class who have disabilities. They also have different characteristics as far as their English language skills and their cultures and interests and comforts in using technology and the environments and abilities, and so forth, but I'm going to focus on the disability.

Here we have Zayn. These are all people associated with the DO‑IT program. Zayn is deaf. We need to make sure we provide audio or text descriptions for any audio we are using. That's important for her. Anthony has multiple physical disabilities. He does not have a useable voice. There are thousands of assistive technologies available to him to operate a computer and a telephone and other things. He has a large print ‑ a large keyboard with large buttons on it that he can actually suppress because he does have some motor skills that allow him to press those keys as long as they are very large. He has software that can help him convert his written material into vocal material so that he can use his interface with a telephone so he can talk to people on the phone. He can compose the message and he has a synthesised voice that he can use. Very important because this young man has a really important job in technology where he is giving consulting to parents of children newly diagnosed with conditions similar to his and will be using the technology that he is. It is an inspiration to them to see what he is using.

What do you have to know about that if you are creating a website or a course or something? Well, Anthony can do everything everyone else can do on a keyboard, but he can't always do everything we can do on a mouse. There is just that one thing. It's a little more complicated than what I'm saying, but simply make sure whatever you are doing, a pull‑down menu or whatever technology you are using, can be fully operated with the keyboard alone. You don't need to learn about the technologies, you just need to know about the limitation.

Then there's Jesse. Jesse has multiple learning disabilities. She composes her thoughts using dictation software, but then she also has to have it read back to her with text to speech. She is somebody that's ‑ who is going to have a difficult time using a PDF that's not designed to be accessible, especially if it's just a scanned in image where it looks like text to most of us who have sight, where it really isn't text, it's just a picture of text, so her text‑to‑speech software can't use it. She will have to have the material modified. What we have to do for her, make sure the PDFs, those web pages we have in our learning management system pages, and Word documents and other documents, have text within them, not just images of text.

Then there is Hadi. Hadi actually works for me. He actually teaches online. So he needs to have access to things as well. So he is totally blind, and he also, like Jesse, needs to have access to the text but he needs more than that for a screen reader, because he needs to know what the heading structure is, heading 1, heading 2, heading 3, and lists, when he is presented with a list, and so forth, and tables, so he needs that extra formatting so the computer can tell him what ‑ counting a list, heading 2 or heading 1 or whatever. Think about those four people.

I will just highlight some of the things I am doing to my presentation today. I used Microsoft PowerPoint. I used a template, a standard template. They tend to be more accessible and guide you in the right direction. Google Docs, for instance, if you could do Google slides, much more difficult to make accessible. So choose a good tool.

I spoke the critical content presented on the slides. I designed an accessible PDF PowerPoint document which I have in text format, structured headings, lists, tables, alternative text for the images. Uncluttered slides, plain backgrounds, high contrast with the text. Spelling out acronyms, avoiding jargon. Additional tips for online courses, point students to specific resources to gain needed knowledge and skills. If there are certain technical skills they need for using Blackboard or Canvas, whatever you are using, tell them where they can get started if this is the first course they've taken with that technology.

Recognise and avoid cultural, ability and other assumptions. Examples of assignments that are relevant to a diverse audience. Offer multiple ways to learn, demonstrate learning and engage. Caption the videos, of course, accurately. Avoid long lectures and massive slide decks. Chunk up the content and organise it with headings. Overview at the beginning, summary at the end. Use outlines and other scaffolding tools to help the students follow what you are doing. Simplify and break down images and tables. Avoid strict cameras‑on policy. We like students to have their cameras on but it can create a great deal of fatigue if you require them to have their cameras on all of the time, particularly students with anxiety issues.

Use clear instructions, make your expectations clear. Provide adequate time for practice. Give students ideas they can do for more practice than you are providing to the other students. Make sure there is adequate time for your activities in your text. Provide feedback on parts of large assignments and corrective opportunities. Use a small number of technology tools. Don't bring in every gadget on earth, especially new tools. Make sure they operate with a keyboard alone, but adding that extra overhead for students to learn the technologies can be a challenge for students too. Avoid PDFs. You can take workshops and learn how to make them accessible, that's fine, but you can just simply avoid them. I teach online classes. I don't use PDFs. Use accessible HTML in the content pages. Use descriptive wording for hyperlinks. Hadi, when he does to a website, his screen reader is so smart it can go from link to link and tell him what is at the link. If you like to use click here, click here, click here on all your links, that's exactly what he hears. He has to go back and read all the surrounding text to figure out what he is linking to, so just have descriptive wording there. Say DO‑IT website, web content accessibility guidelines. That is the underlying linked text. Also the alternative text for images.

In summary, what is universal design? Well, it's an attitude. An attitude that you want to include everybody in your class, and you are willing to prepare ahead of the time. A framework which I presented. A goal ‑ and you will probably never reach it totally, but you have the goal of making your course fully accessible. And a process kind of systematically going through and figuring out what you can do to be accessible. It values diversity, equity and inclusion, it promotes best practices. It absolutely does not lower standards. If you are lowering your standards because of it, that's not universal design, it is something else. It is proactive. It can be implemented incrementally. Don't do everything all at once. Maybe do one for one term. Do one thing. Fix all your videos or something. But whatever you do, it's going to benefit everyone and it will minimise the need for accommodations.

Our last slide here, I just have some resources. You will see the URLs are in your chat, so you can look up ‑ look those up. I will briefly say what they are here. One is to the DO‑IT page. We have lots of resources there. I'm a great believer in when you get money from the Federal Government particularly to put resources out there to benefit other people, so we have lots of resources. The two projects I mentioned, Access Computing and NNL, you can link to those if you want to know more about that from the DO‑IT website. There are a lot of resources, videos, publications, we even have free stickers and line drawings. I had some line drawings in my presentation today. We have a large collection of them and give you permission for you to use them in your presentations or your publications.

Then there's ‑ part of the DO‑IT website is this Centre for Universal Design in Education I mentioned which has the UD framework all spelled out, as well as things like equal access, universal design of instruction with a lot of examples. 20 tips for teaching an accessible online course, and links to lots of articles that have been published in the literature about universal design in higher education or tertiary education, right? And then the accessible technology website. We also have the URL here too. Don't forget, you can contact me, sherylb@uw.edu. You also might want to look up my book. Creating Inclusive Learning Opportunities in Higher Education, a Universal Design Toolkit. So we are ready to move on to Q&A.

GABRIELLE: Thanks, Sheryl. That was fabulous, and perfectly timed as well. I will just ask all participants to not be shy and put their questions in the Q&A panel. But the first question is from Elizabeth Hitches. What would be your favourite tip for engaging with UDL for the first time?

SHERYL: Wow. Favourite tip? Where I would start, kind of the same thing. When people say, "Wow, how should I get started?" One thing you can do is think about the first week of your course, or even two weeks because if you are not making things fully accessible, that student is going to have it to go to the disability services office to get accommodations like reformatting their videos or their documents. And so make sure whatever you are doing the first week or two is fully accessible, if you want to start somewhere. And I think that ‑ wow, that's kind of hard to even say. I think documents are a good place to start. Your materials. You know, you have got your content and your content management pages, those. Make sure you use the heading structure, heading 1, heading 2. All LMSs have them, so do that. Think of the document for your syllabus. I would avoid putting in PDF. I like to use a Word document myself. I put it in the content management page, then I also have it as a Word document. I don't have many other attachments in my class but I like the attached syllabus because they can download it to their desktop and I ask them to edit it, add notes, add things to the timeline, and so forth, even take out things that don't apply to them.

So looking at your documents throughout is another good way to start and start at the beginning of the class. Forgive yourself for not doing everything. There still is a disability services office that can provide accommodations. Just make sure every term a student will need fewer accommodations.

GABRIELLE: Great. Thanks, Sheryl. The next question is from Amber. In your University, how are staff with their own accessibility requirements, like Hadi, supported to implement UDL in their teaching? Example, selection creation of images or figures in a presentation?

SHERYL: I wouldn't say they have a great deal of support for helping them teach their classes. Hadi does teach online. He is not teaching online right now, but he used to do quite a bit of it. I don't know how much support at his last school he received for that. Support in general for faculty, though, who have disabilities like Hadi, he can get support for that through a disability services office that's designed for faculty and that comes out of our human resources department. We have a different disability services for the students. So he could go there. And in theory, if he was needing some support to use Canvas, which is our learning management system, he should be able to get support from that office. We do have a blind Professor at one of our branch campuses, and he is actually supported by Hadi because he has some difficulty using his screen reader, and Hadi is a real expert at that and they're using the same screen reader. And one thing in his support in using Canvas, this other Professor, as Hadi describes to me, sometimes he thinks he is having trouble with Canvas, but really he is not using a feature within Jaws, his screen reader, that would make Canvas accessible to him. So there is that interaction there which can be very complicated. And so for a blind Professor, this learning how to teach online, they really can benefit from working with another blind person who knows how to do that.

GABRIELLE: That's great to know. It can be quite challenging here as well to support staff with different types of disabilities as well. So another set of attendees have said what has been the biggest resistance for implementing or explaining UDL to educators?

SHERYL: The biggest is lack of time; feeling like this is beyond what they should do as a faculty member. I give a lot of talks on our campus to faculty. When they bring that up, I say to them, "Well, let's think about this for a minute. What do you faculty members do in other cases when you need more support, or you feel like from your department? You get resources." And most of the departments and colleges have IT support now. They didn't probably 10 years ago. So I say, "What you need to think about is where the support needs to come from. Who needs to do what?"

For instance, our business school has worked with my unit, and they decided that they are going to caption all the videos for faculty members who teach online. It is a huge business school. Lots of faculty. They integrated that into the process of them teaching ‑ creating their online courses and it's part of their IT support. So you could ask your department, "Well, what could you do to help us?" And that was a big burden taken off individual faculty members. Imagine all the faculty members that do not have to learn how to do that. It's just automatically done. Business school has a lot of money, by the way, compared to some of the other departments. Keep that in mind.

Another department, the social work department, has decided to have a central person that helps their faculty with document design. They will reformat ‑ they will create accessible documents for a faculty like PDFs, HTML documents, and so forth, so they removed that burden. The college of education through their IT department has a very comprehensive training program for faculty and faculty in education tend to adopt UDL very easily because of their interest, and so forth, but they also provide this additional support.

So what I see is there are three levels of support. There is what you are doing as a faculty member. There is a lot here on that list you could do tomorrow. It is not all hard. Then there is something where maybe we could get something from the department or the college. Then there is the central support. That's my group. So we do a lot of the proactive training, working with departments, and so forth, to make sure that the technology we procure, develop and use at the University is accessible.

By the way, we are using Zoom today. We standardised on Zoom many years ago ‑ my accessibility team was on the selection committee and voted against it. Small company, they had done nothing as far as accessibility. Where Microsoft Teams was another product, large company, a lot of accessibility support. Well, we got outvoted, often happens. Our next step is to get something in the contract. They wanted for Zoom in the contract to say that part of the contract is for them to work with my group to make their product increasingly accessible for people with disabilities.

So in our country, Zoom was perfectly in their right to make an inaccessible product. Universities are not supposed to purchase them because we are required to deliver accessible technologies to our faculty, students and staff. And so we got on it. We spent a lot of time. My staff, we brought other institutions in, a large University joined us to put pressure on Zoom. They gladly took our advice. Zoom is recognised as the most accessible conferencing software in the world, and it is because of the work of our institution and many others, they were ‑ they valued our contributions and continue to make things more accessible, getting captions better, getting, you know, sign language interpreters to be in the breakout rooms. We have a list of things, and with this other institution as we prioritised them, helped them decide what to work on next, and we continue to do that day by day.

GABRIELLE: Thank you. Thanks, Sheryl. We have a couple of questions around mental health. What developments do you see in UDL for those with mental health challenges, including students who have got, say, social anxiety and operating either in a classroom or in an online capacity? How can UDL help those students?

SHERYL: Yeah. The problem with a lot of students is, in our country anyway, most students who have disabilities, including mental health, do not disclose them. So that's where UDL comes in because they don't have to disclose to benefit from what you are doing.

I did mention briefly not requiring students to have their video on. Our faculty really like students to have their video on. I do too when I am talking to my students. But I recognise that that is extra anxiety. I think we all feel it when I'm in a meeting and I'm just listening but, you know, it's a meeting at work. There is extra anxiety. You have got to be present on the screen, you have to look like you are paying attention, and it's just a little extra anxiety. It doesn't bother me too much, but it does some people. So things like that can be helpful.

I think really clear instructions and expectations can be helpful. I think being very welcoming to that student and others in the class by inviting them to meet with you if they have any concerns in the class, to just be really open to ‑ make it really clear you would like to meet with students, you enjoy getting to know them. Anything you can do to reduce that anxiety. But being very specific about the requirements and the expectations can go a long way in that department.

Also being flexible on things like maybe attendance, and that really depends on the instructor and what you are teaching, and so forth, but sometimes you can, you know, make attendance ‑ it might be required because you are doing things in class but maybe one forgiveness or something as far as that. Or a way to make things up if you miss something to help reduce that anxiety as well.

GABRIELLE: Great, Sheryl. Here is a tricky one. If you had unlimited funds and time, what's the next project you would work on?

SHERYL: Ooh.

GABRIELLE: What's the next big emerging ‑ ‑ ‑

SHERYL: For me?

GABRIELLE: ‑ ‑ ‑ challenge? For you or UDL in general, for all of us.

SHERYL: Yeah. Well, I'd spread the word about increase the practice of UDL but assuming that is created I should be thinking about. One that is top of mind for me, and I am seeking more money for doing this very thing, I really have a passion for helping faculty members in tertiary education ‑ see I remembered ‑ actually teach relevant content about universal design or UDL in their classes. So I mentioned one example there is computer science faculty teaching about how they can design accessible products. Engineering classes. Engineering faculty, most of them don't talk about designing accessibly. Even if they use user‑centred design, which is common practice, they don't define the user broadly enough to include people with disabilities. People who are teaching history classes or even diversity classes, many of them they don't even talk about people with disabilities and implications and so forth.

So that's my latest ‑ one of my passions and there is a lot of work to be done. The book that I wrote that I mentioned, I devoted a whole chapter to it in examples of how you can include universal design topics within any subject area. So that's something I would like to get more money for. Any ideas?

GABRIELLE: Well, everyone is always looking for money, aren't they?

SHERYL: I know.

GABRIELLE: Speaking of your book, we've had some people say looking forward to reading your book, but also would you have any other recommendations for other UDL leaders, apart from yourself, that people who are new to UDL should sort of invest time in reading?

SHERYL: I will tell you where you can find them. There are quite a number of them now. A couple ‑ about 10 years ago I could have named the few, they were running around talking about these things. So I have on the Centre for Universal Design and Education on the DO‑IT website, there is a link to articles written about, actually, universal design applications in higher education, tertiary education. And go to that link. And we keep this up regularly, like weekly, when we find an article, a really good article, and we have them organised by different application areas, like learning and physical spaces, and so forth. That is the latest, greatest research, but also research to practice that you can find. I am learning about people in this field, I don't even know their names and they write these brilliant articles.

Along those lines, if you go to our website we have a community of practice. If you search for communities of practice, we have a number of them. One of them is the UDHE community of practice. That's a worldwide, email‑based very accessible community of practice. It's not one where you get a lot of chatting going on but it is one where people share resources that would answer the question also.

GABRIELLE: Great. Well, that will give people a lot of reading to do.

SHERYL: Yes.

GABRIELLE: Another question we have is what do you think about the responsibility of Universities and colleges in providing the tools, software for faculties and academics to make the process of implementing UDL and accessibility sustainable within their workloads? That's a big question.

SHERYL: That's a big issue. We have a problem, even at our own institution with all my advocacy of getting people to really buy into even purchasing IT that is accessible to people with disabilities. So we are even below that particular question and what we are working on. I think there is a continual challenge in getting high‑level buy‑in. It's easy to get high‑level statements on buy‑in to say, "Oh, yes, we want to include people with disabilities. Yes, we want to do this." And there are different ways to do it.

A sneaky way I did it is that in this book that we've been talking about, notice who wrote the forward? Honorary Cassi, the President of our institution. So I helped her write it. Now I can go around campus and quote her. Don't say that ‑ don't tell them. Kind of sneaky but I have a good relationship with her and she is very supportive of universal design. When she has a chance to talk about things, she is supportive. You can find ways to draw higher level administrators in or IT organisation. I have worked there for over 30 years. I have been around for a long time. And the different leaders have had different levels of interest in promoting universal design. Sometimes they have been sort of reluctant. I think they think it's going to increase the chance we will get a lawsuit or civil rights complaint or something, which is just the opposite. They just don't want to think about it.

Our newest one right now, my current leader is really talking about universal design quite often, and even in a mission statement for my ‑ the larger unit I'm part of, universal design is promoted as a best practice in technology design, which is amazing. So everywhere, everything, all the time. We all need to just talk about it and be practical about it. I know when I teach faculty, much like I did today, it was a pretty short presentation, but I give them a lot of easy things to do. You know, in a longer presentation I go into a little more detail about some of them. But I like them to see, you know, use the heading structure. Really, is that hard to do? It's not hard to do. Now I have told you why it's good to do, so just do it. And do it when you are first grading a course but go back and fix it. You can do it incrementally. Do it a little bit at a time, you know, and fix it. It's important.

GABRIELLE: Yes. Thank you, Sheryl. I think we've just got time for one more quick question. How can we join the CoPs, the communities of practice. Is it just they go to the website and sign up?

SHERYL: Yep. You go to the website, the DO‑IT website, and it probably ‑ I can't remember exactly where it is, but you can engage, how you can engage, and you will get it that way. Also if you search communities of practice or community of practice, you will find a list of them and for each one it will say how to join.

GABRIELLE: Right. Fantastic.

SHERYL: We kind of keep track of who is in there and what your profession is, and so forth, because we are kind of a community. We will even share that list at times so you know who else is on there and where they're from, and so forth. So our leader, Alana Crawford, she will be communicating with her and she will get that information for you and then she will put you on the list.

GABRIELLE: Great. Well, we've had about 400 people join this morning, so that will probably add quite a few more people to your communities of practice.

SHERYL: No worries.

GABRIELLE: But thank you so much, Sheryl, for your insights today. I hope everybody who has participated has gained something new from that. Thank you again, Sheryl, for having ‑ put the time aside on a public holiday in the US. And we really appreciate the information that you have provided to us. You are getting lots of claps and hearts from everyone, and I think I share in that.

SHERYL: Well, thank you for joining me. You can probably tell I'm pretty passionate about this topic. It's not hard to get me to talk about it.

GABRIELLE: No, well, that's fantastic. It's great to have leaders like yourself do that sort of thing.