

KAREN FOLEY: Good morning. And welcome to Student Hub Live. Well, today, we have a fantastic STEM showcase. My name is Karen Foley.

And I'm presenting the programme that we've got lined up for you over the next few hours today. We've got heaps to cover-- lots to discuss. And I'm hoping that you're going to have a really fabulous time.

So for those of you who haven't been to one of our events before, I know there are lots of people in the chat room who already have, this is a live online interactive space for our OU students to come and connect with each other and members of staff.

Now we do have a programme lined up today. You can drop in and out as much as you would like. And we will put the videos up of today's event shortly afterwards, so you can always catch up if you would like to.

Now we've got lots of things for you to do today, but there is no pressure. You may like to chat to other students about where you are, what you're studying, what you're having for lunch, what animals you've got in the house, for example, and what you're hoping to do over the summer break if you are lucky enough to be having one this year.

You can also talk about curriculum that you'd like to find out about and get experiences from other students. So everything goes in the chat. And overseeing that we have Nicola who's from the faculty today, who I'm going to introduce you to in just a second.

Nicola, hi. How is everybody doing in the chat?

NICOLA: Hi, Karen. Nice to see you. Hi, everyone. Yes. Chat's just starting to build some momentum now. A couple of students just posted that they're finished a couple of modules-- S112 and S111.

But hopefully I'm looking forward to supporting students and having chats with students in lots of these discussions about coffee and tea and biscuits and whatever else for the rest of the morning and afternoon.

KAREN FOLEY: Brilliant. Thank you, Nicola. We've also got some widgets or polls that we'd love you to fill in. I can see that there are lots of people who've already had a go at doing those.

We've got people from all over the world today, but nobody at the moment, I think, from Cheshire. So if you're from that area, do put a dot on the map.

To click on our map and tell us where you are, you just open the map. And then you can put a dot where you are. And then you can also see what other people have said also.

Now we have other things for you to fill in. We've got multi-choice questions. Those are very self-explanatory. You just click on the ball that appears to be most like your situation.

And then we're also going to have a series of word clouds. Now these have three different options. We need three things in each box. Otherwise, the results don't submit.

But if you can only think of one or two, that's fine. Just put a full stop or cross in the box, and then at least you can submit your contribution. And you can also see what other people have said as well.

We'd like to know what topics you'd like us to ask the experts. And Nick's going to come on and explain that in just a moment. So I think that's everything for now.

But we will fill you in along the way. Vanessa has put little survey in the chat that would be great if you could complete at some point in the day. But chill out, and enjoy the show, and let me introduce you to Nick Braithwaite, who is our executive dean of the Faculty of Science, Technology, Engineering and Mathematics. Nick, welcome.

NICK Good morning. Nice to be here. Hello, everybody.

BRAITHWAITE:

KAREN FOLEY: Now, Nick, can you give us a bit of an outline about what students might look forward to today?

NICK Yes. I think we've got lined up some showcase of new curriculum, developing curriculum, some new
BRAITHWAITE: qualifications. We've got some single honours qualifications coming in-- geology, for example.

Been doing some great things in cyber security. Very important area right now. And there's another new qualification area, data science. Another important area to have. We are a digital information rich age.

Also, I think we're showcasing the Open STEM live. So we should be getting those too. STEM live's my favourite part of what we do.

KAREN FOLEY: Yes. You've been really involved in that. And that's been such an important area. And I'm looking forward to see how particularly engineering students can engage with the Open STEM labs. And I'm sure that's going to be interesting for everyone else at home.

Nick, we've been asking people what subjects they're studying. Lots of people are doing math, stats, and computing. That's the sort of key lead one at the moment. So keep filling those in at home if you could.

But can you tell us a little bit about what the faculty have been doing? I mean, the pandemic has represented some phenomenal shifts in the lives of our students and also in the way that we're teaching. So how has STEM been trying to stay in touch with students during this time?

NICK Well, we do use, of course, online connections to our students quite a lot. What we haven't been able to do is
BRAITHWAITE: some of the face-to-face things.

Some of the residential schools in engineering, for example, which we haven't been able to do-- so we've got alternatives to that including a home experiment kit.

And I just brought a small part of my home experiment kit here, which I'm working on right at this very moment. That would be engineering. We'll be bandaging things up with that.

We have been trying to supplement the normal methods of contacting students-- being with students. We have had to do remote exams where, in some cases, we changed some of the exam structures.

That was necessary because we just couldn't have people travelling to exam centres. So I think the main answer to what we've been doing is we've been adapting.

We've been adapting like the rest of society. And maybe compared with other higher education places, other universities and colleges, we found it easier because we're already quite a long way down some of that route of remote connecting.

KAREN FOLEY: And I think one of the things that I've certainly noticed, Nick, is that people have really valued virtual events partly because they've become just a part of everyday life.

We now have virtual drinks with other people, et cetera. And you've been doing some quite interesting things with your comms team. You've been having Ask the Experts sessions.

Can you tell us a little bit about this? And we've got a widget, where we'd like to ask students what sorts of things they'd like to ask the experts as well.

How have those been working? And why is that such a lovely idea in terms of actually allowing students that insight and connection to some amazing pieces of work that are happening right now?

NICK BRAITHWAITE: Well, they've seen the pieces of work. Let's take the example of the meteorite that landed over in Winchcombe not very long ago.

One of our colleagues was able to go collect it-- be the first person to handle this thing and gather it and take it into a safe place where it could be analysed.

And what we're able to do with it is to introduce it to the teams, the people who've been to collect it, the people who will be analysing it. And it's that closeness of connection.

It's realising that we are a university. We have people who do this kind of research. And it feeds through. It trickles through into our curriculum eventually.

But why not get it right at the source? And it's a very intimate environment that you could question directly the people.

Also, the stuff that we do with the BBC, the *Blue Planet* programmes, that sort of thing, talking to the people who produce those programmes-- the people who are making the decisions about what's in shop and what's not-- it's really nice to be so specific and to do it live and also make the recording available.

KAREN FOLEY: And there are also other really hot topics like vaccinations right now and also renewable energies. How have the faculty being contributing to those debates?

NICK BRAITHWAITE: OK. Two things there. The vaccinations-- one part of our campus has been turned into a vaccination centre, because we got a lot of empty carparks and a lot of empty buildings.

And those have been adapted in our faculty business and law. Many people enjoy coming to the campus at least to have a vaccination if not to come back to work as ordinarily.

We've also done one of our Ask the Expert sessions on epidemiology and the spread of disease. When it comes to renewable energy and sustainability, it's an area that's very close to my heart at the moment.

I'm leading the university's initiatives in this area. And I'm promoting a greening of our campus. We have new renewable energy courses.

In fact, we're celebrating 25 years of renewable energy education from the old university. And I'd really like to title that, We Told You So, because an awful lot of what my previous colleagues have been preaching for a long time is really coming back now, and it's coming in force.

This is a fabulous time to be involved in that. And we've got an awful lot of work to do. Look at the effect on the environment right now with a lot of climate change worries.

We have modules that are addressing this. It's distributed it across modules. We got some micro credentials that are addressing this area too. Very STEM. We've got a contribution to make, and we need people with this.

KAREN FOLEY: And it's such a fast-moving dynamic environment literally right now. And that's why it's so exciting to find out all of this new curriculum that, 10 years ago even, wouldn't have been considered as big topical issues, which are now being included in fantastic new modules we're going to hear a bit more about today.

So Nick, you mentioned converting one of the buildings into a vaccination centre. But there are other things that the faculty did right at the start of the pandemic.

And I think, very often, students are quite alarmed to hear that we've got laboratories with lots of chemicals in them. And we used those in quite an interesting way right at the beginning.

NICK Well, right at the beginning when there was a very short supply of the hand sanitizer, we were able to turn some
BRAITHWAITE: of our labs over to creating some of that for the local hospital.

I mean, you can look up how to make it on the internet. But if you've got the facilities and the laboratory, you can make it by the bucket load rather than just by a small cupful.

And so we did a certain amount of that. We also use the same equipment-- personal protective equipment. Visors and aprons and things. And we've been able to share those, because we weren't using them. We shared those with local facilities too.

KAREN FOLEY: Mm. And we've got some comments in the chat as well, Nick, which is students reflecting on some of those changes in terms of impacts for them.

And you spoke about remote exams earlier. Elaine says that she was really pleased about the home exams, because she had social anxiety. I've actually had this from quite a few students.

They actually prefer those as an alternative. And Berrell says that the remote exams work because the fear of being somewhere unknown and in a different room was quite intimidating.

NICK Yeah. I mean, whenever you change something like this, you change where the anxieties are. Exams are anxious
BRAITHWAITE: things anyway.

So we changed. We've moved away from the anxiety of travelling to an unknown place and not being quite sure whether or not you get there, the transport system's going to be OK, how will I feel about it.

We've now changed that. It's a bit more relaxed and do it in your own home. But the anxiety now goes into, can I upload the answers afterwards? Will my internet be sustained during the critical period?

So I'm afraid we can't remove all of the things. We can move them around changing a bit. And I think there's more to learn. The traditional three-hour exam is very popular, because we know who the people are, we know where they are, and so on.

But it's not the only way to do it. And we're great experimenters and innovators, so we try some new things. Maybe not all of them will go so well, but we keep trying.

And it's part of a dynamic system that, I will say, what we do is a bit like we've got a bicycle. If you stop, you'll fall over. So we keep going. We keep changing. And we're trying to improve-- continual improvement if we can.

KAREN FOLEY: Absolutely. And it makes us question, I think, across the whole university. And I think some of those answers aren't necessarily formed right now.

But what things we can take from the pandemic? What aspects may be useful to develop? And I guess we're all in a state of considering that, because they don't work for everyone.

I mean, Laura says she didn't like the remote exams. She felt it wasn't a level playing field. She'd much rather sit at a formal exam where everyone has the same resources available.

And I used to like that. I used to believe in the collective unconscious, and the people would sort of perform better in that room together. But as you say, there are all of these different anxieties here.

And it's great to be able to reflect on those and be dynamic but also offer students something there in terms of support also. So that's been really good.

NICK Yeah. Yeah. Absolutely. There's just so much to learn.

BRAITHWAITE:

And that question, and to go back to that question about exam anxiety, why do we have exams at all? It's the standards that we make our way of showing that we've got the standards.

And it's those standards that we have to maintain to give us the credibility. And actually when you come through it, life is a lot richer. Life isn't exams.

It's a continual process of exchanging knowledge. And so this is just a small step along the way. I'm afraid it's a necessary one. But one shouldn't get too anxious about it.

I mean, I've done lots of exams. And I've done them terribly badly in the past. Some of the not so bad. But you get through. And it's what happens after the exams. That's what really counts.

KAREN FOLEY: It is. And it's developing those competencies. And I think that's why places like the Open STEM labs allow students those hands-on practical ways to actually develop some of those skills.

And assessment, I guess, is one of those important things that you need to do. You need to demonstrate what you can do. Life can be stressful sometimes.

And it's important we wriggle through those and recognise those anxieties and how we can support students. Let's take a look, Nick, at how everyone's feeling right now in terms of the overall mood.

So we asked people what they were feeling. And this is what they said. Most common was happy and excited and curious, positive, interested. I think we've got some Welsh students in today full of joy, which is a lovely thing.

Needing biscuits. Awaiting for results. Worried about results. OK. So lots there. Nick, what might you say to students who are feeling a bit anxious about their forthcoming results?

NICK Oh, about results. Yeah. Well, I always say, don't worry about them before they come. Or when they come, reflect
BRAITHWAITE: on where you go from here.

Have a next plan. But you've got to feel a better result. Let me also say I never discuss how I did in an exam immediately after the exam-- always absolutely silent about that.

But you've got to think of it, where do I go next? Have I got enough to go on with? And if you got a low result, for example, it might be meaning you're not ready to go on yet.

And if you've got a good result, a momentum building result, then build on the strengths of that. And always reflect on why you might not get 100%. I mean, very few people do.

Why not? What did you miss out? You can always put that right before you go to the next stage. It's a good indicator of how well you're doing. That's the sensible reason for doing it. Isn't it?

And we are trying to make sure that people are ready for the next stage. We're open. We don't have an entry exam. And we do have an exit process.

And when you go out, you're as good as the rest. That's why we're an Open University. The university part is really important to us. You go out as good as the rest.

But we do these exams along the way to give out the stepping stones and philtres to maybe send you back again, come round again, go off somewhere different, change your plans.

Got very good feedback. But it's not the only form of feedback. There's all the excellent feedback you get from tutors.

KAREN FOLEY: Absolutely. Absolutely. It's important to bear in mind these things in perspective but also, I guess, recognising these are, as you said, Nick, earlier, heightened causes of anxiety for people.

And that's OK. But our student support teams are amazing if you don't get the results you perhaps wanted. It's also a good opportunity, as Nick says, to be able to reflect on some of those areas that you may need to upscale on, because there's nothing worse than getting a year ahead and thinking, oh gosh, I wish I'd figured that out in the first place.

So they can be good indicators for areas that you may need to improve on in future. Nick, we've been asking people about what they'd like to ask the experts about.

And so far people have said things like sustainability, biology, NIT-- how to get a dream job will be our next session. Stay tuned for that. Lab safety, veganism, smart cities, blockchain, making maths easy, and some of the level three modules.

So lots of interesting content there. Any feedback?

NICK That's all very STEM specific. Isn't it? I love it. I mean, it should be STEM specific, because it's a STEM meeting.

BRAITHWAITE: But I mean all of these things indicate where the people are of our community.

These are the sorts of things that we think about-- connecting all of those things. I particularly like. I'm going to smile again about the sustainability one.

That's got to be a thread that runs through everything. And then there's a great technicality in there-- blockchain. That's an interesting thing.

Blockchain's a technology that allows you to put sources of information in safe places that you can draw them into. Say, demonstrate your credentials a bit like the qualifications that you get from the OU.

It's been on the fringes of things. But we've got people working on it. We've got people who are looking for ways to deploy-- even ways to link it back to that vaccine.

And maybe it's part of a vaccine passports in the future. All STEM stuff is great.

KAREN FOLEY: Absolutely. Lovely. Well, thank you for filling those in at home. Nick, thank you for coming along. I appreciate it. You're very busy. What's next on your agenda today?

NICK Thank you for that. I have to go back to the executive meeting of the STEM faculty, which I was in earlier. And I

BRAITHWAITE: just said I'm just popping off to Student Hub Live. And we're going to now go and talk about budgets and things like that.

KAREN FOLEY: Excellent. Well, Nick, I hope that this was a lot more enjoyable than the budget discussions. But thank you so much for coming along. Good luck with the rest of the day. And we will see you very soon. All right, everybody.

NICK Thank you.

BRAITHWAITE:

KAREN FOLEY: We're going to now show you a video of the student support team. We also have Matthew from our student support team in the chat today alongside Nicola.

So make sure you make the most of this opportunity to ask any questions that you'd like to know about. And oh, biscuit chat going on, Emily says that waggon wheels are the bomb.

So now's the time to get a cup of tea and a biscuit if you would like to. We'll be back in our next session after a few minutes.

And it's going to be a really good one. For those of you who will after knowing how to get a dream job, we're going to talk to careers and employability services. So stay tuned for that. See you in a minute.