The Sustainability Tales

How University Teachers Could Make the World Better

By

Kerry Shephard

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Preface

This book is about how university teaching might contribute to the international attainment of the Sustainable Development Goals[1]. It accepts that other university functions, such as research and community engagement, may be doing great things in this context, but expresses concern that what for many is the university's principal role, teaching, may not be as effective as it might be, and may even be pulling in the wrong direction. The book's library subject classification is Literature and Literary Criticism, Education, Sustainability, but for many higher education practitioners it is intellectually situated within the field of enquiry known as Education for Sustainable Development, or ESD. Notably ESD is *for*, not *about* sustainable development, and therein lies its biggest problem. Many academic books, research articles and blogs have been written about ESD and these tend to either focus on how to teach young people to be *for* sustainable development, at school and at university, or on why the task is so challenging, and so far, perhaps even unsuccessful. I am responsible for some of these academic texts myself and on balance I have to accept that my own efforts have been, essentially, unsuccessful. Our world is a wonderful place, but undoubtably suffering from global warming, climate change, deforestation, habitat fragmentation, pollution, over-fishing and a wide range of associated human calamities that fall short of any reasonable categorisation as sustainable development. ESD may be work in progress, but has a long way to go before we can think of it as a promising contribution to the attainment of the Sustainable Development Goals. Rather than write another book about how to do ESD, or about why it is not working, I thought that I might try something different.

I am a scientist and an educator, not a scholar of English literature, so I struggle to comment convincingly about Chaucer and what he was attempting to do many centuries ago when he wrote the Canterbury Tales. But I have been fascinated by the Tales since I learned about them (actually only the Prologue) as a schoolboy many decades ago, and also as a schoolboy, by history. (Perhaps I would have studied history at university, rather than science, had it not been for a falling out with my history teacher at a critical time in my schooling). Nevertheless, when Chaucer wanted to comment on social turmoil in the fourteenth century he chose to do it as a collection of

narratives, rather than as a more straightforward historical account. Chaucer's time was characterised by rampant disease (particularly the Black Death), challenges to established class structures (including the 1381 Peasants' Revolt) and public disquiet about the power of the Church. Perhaps it is human nature to imagine that our current times are particularly turbulent, but this imagining is, of course, central to the ethos of the twenty first century's pursuit of the Sustainable Development Goals. In exploring our current social and environmental turmoil, I have enjoyed drawing inspiration from Chaucer, and using some of his literary devices in my own narratives. For example, Chaucer inserted himself as a character in the Tales, and was, of course the Tales' Narrator. It is not clear if the character of Chaucer, in the Tales, is in any way representative of the real Chaucer, or indeed if any of the pilgrims represent in some way, real people. My pilgrims are all fictional, and any resemblance to real people is entirely accidental. Even the Narrator in the Sustainability Tales, who shares a name with me, may or may not be me. To me fair, I suspect that there is a little of me, and of my experiences, in all of the tales. The context of each tale, however, does have a strong relationship to truth, as I hope to have demonstrated though the notes and references. Even so, paramount in addressing complex issues in this way is that, although there may be just one truth, there are multiple interpretations of it.

I have written this book for university people (academics, students, administrators and others), who may be interested in sustainability and either concerned that our universities might not be teaching the right things to our students or perhaps that our universities might not have the wherewithal to teach these things even if minded to. If you are a university teacher yourself, perhaps you are wondering how you could do more than you currently do, worried that whatever you do might make no difference, but interested in a broad range of perspectives on these matters. I hope that the book will be useful to all of those who read it.

I have enjoyed writing this book. I mostly write by imagining myself as someone else explaining something that I know something about, but from a different perspective from my own. I do this by dictating to my computer. That part of writing can be fun. Readers may note a conversational style in my writing, rather than a more formal academic style, which I do not apologise for. I then have to use the keyboard to edit the text and

to add notes and references; not so enjoyable, but important nonetheless as a mark of scholarliness. Writing this book has also had its difficulties. I had to consider the challenges of ESD from multiple perspectives, do my best to ensure that all of the perspectives on ESD that I know about were included, and cross reference between the tales to tell a story. I learned a lot about my views on the issues, and about myself on the way, but also how difficult it can be to reasonably express someone else's point of view, or to be someone you are not. Even within the almost infinite bounds of fiction, I struggled to imagine the changes in the way that people will need to think and act as we reach for the Sustainable Development Goals, as something that university people can reasonably teach in higher education. For me, even fiction has its limits.

I acknowledge the contributions that many wonderful academic colleagues have made over many years to the ways in which I see the world of higher education and understand it. Conversing and researching with you all has been a great privilege. I thank the University of Otago wholeheartedly. The University of Otago has provided me with the opportunity to under-take the research that has led to this book, the academic freedom to ensure that my work will contribute to the international public debate on higher education, and the expectation that I will make my findings known widely. I emphasise that any points of view expressed by me in this book are my own, and not necessarily those of my employer, the University of Otago.

Kerry Shephard

September 18th, 2024

Notes

[1]   The 17 Sustainable Development Goals and their history are described on this United Nations website: https://sdgs.un.org/goals

The Prologue

It is autumn, and autumnal. The ivy covering the old walls still has some green in it but mostly it is yellow and red. Early in the morning you can see your breath and the evenings are grey rather than bright. Generously, we might say the last phase of a declining Indian summer. Colleagues gathering here for sherry might also be described as autumnal, in dress and demeanour, and, let's be honest, in age too. None are young and I might be the oldest, touching as I am my late 60s. Right now, I do get the impression that winter is coming, and everyone knows it, but that we will all do our best to put it off for as long as possible.

I'm guessing we've come mostly by invitation, a few perhaps by application and I suspect definitely one or two are trusted friends of our host, here to offer him moral support and to fill awkward silences. The invitation suggested that this was the sixth in a series of annual conferences on higher education's impact on people and planet, with a focus on teaching rather than on research. And that it would be small, very small, multidisciplinary, and conversational rather than presentational. PowerPoint is banned, as indeed are all forms of technology. Mobile phones definitely switched off or better still, left in hotel rooms. No paper handouts either. Just good honest conversation. I guess that is what has attracted us all in particular, although I doubt that any of us realised, initially, how small it would be (11 of us, including our host). Perhaps embarrassingly small, although Jeremy, our host and organiser, did send us an acceptance email confirming sponsorship had been obtained, so our conference registration fees have not had to cover costs. Just as well, considering the sherry, the comfortable armchairs, the art on the walls and the academic atmosphere guaranteed by ancient walls, high ceilings and dusty bookshelves. Clearly money has not been a limiting factor, although I suspect that most of us have had to find our own funding for our flight. As I understand it, each of has about 30 minutes to tell our story and then it's to be a discussion, until the next tea-break. Our days, starting at 9.30 tomorrow, are divided into 2-hour sections, and we have three days. I wonder what happens if we run out of things to say?

I have not actually met anyone here previously, but I know some by reputation, one by email exchange, and we all know who we are because Jeremy listed us in our acceptance email. We will have Googled each other

to discover that we all have standing in our diverse fields, we all have good publication records and H Indices[1] greater than 20, much greater in some cases. We have all written books. And I think that we have all been quite outspoken in our institutions and more widely about the policies and practices of higher education as they relate to wider social and environmental purpose. None of us have been vice chancellors, rectors or university presidents, or are likely to be. Other than Jeremy, we could all be described as multi-disciplinary or even interdisciplinary. Although each of us fits within a department, our broad research interests enable us to teach about and to talk about diverse topics. I suspect that we have all offered research-led opinions about teaching and learning to our own institutional leaders.

We know who we are today because our webpages, Linked-in profiles and Research Gate summaries showed us photos. Mine is 10 years out of date, but looking at everyone here, so are all the others, except our host's, Jeremy. I took the time before this conference to read about everyone else. It wasn't obligatory, but it certainly is in my nature to be prepared. I made notes about us all, and I shall be taking notes as we get into our conversations to keep a record. As I am to be the narrator of this record, readers will learn about the others through me, and undoubtably my interpretations will struggle to do justice to everyone. I shall do my best. I start to paint pictures, in words, of everyone below, but in much more detail later as I attempt to record our conversations. And at the end of each tale, I shall attempt to summarise the key arguments, in my own way.

As with all academic conferences, it's a certainty that diverse reasons have brought us to accept this invitation, or to apply. Some will have simply wanted to get away from the office, or spouse. Some will have needed to recharge spent batteries of academic enthusiasm. Some will have wanted to be in this part of the world to visit relatives or friends, or the excellent art galleries, or to fish in the nearby salmon rivers. Perhaps some are looking for new ideas, or new partnerships, or new partners. For most, simply being invited to a select conference is a big plus for CV, application for promotion, or sense of worth. But I wonder if there is something more going on here. Reading between the lines in our web pages I felt, or imagined, a sense of desperation, that academia is losing its way, that we have all been part of this slow unravelling, and that something needs to be done before it is too late. I wondered if others also thought of their journey here as a sort

of pilgrimage, back to an ancient seat of learning, and a chance for renewal, or forgiveness. That certainly applies to me. I hope to find out more about why the others are here in the days to come.

Let's start with our host, Jeremy. There he is serving the sherry, or ginger ale for some. Tall, slightly scruffy, with well-worn clothes, but confident and clearly at ease with academics, and this place, and with serving sherry in fine glasses in dusty common rooms. Jeremy is, for me, the personification of upper-middle-class poshness. (… and clearly, I am not, otherwise I would have a better word for it than poshness). Google tells us that he is a graduate of this esteemed college, and more of an entrepreneur than an academic. A wheeler dealer in academic circles. He knows everyone with money to spend and everyone who is anyone who hopes to get this money. No doubt they, or their universities, pay him to make the introductions. Jeremy makes money, spends money, organises people and chairs meetings. I am sure that he is no stranger to the all-expenses-paid dinner. I don't think that his own research is particularly well known, but he is in his element here. I reluctantly accept that the higher education that we have now needs Jeremy, and others like him. I wonder if the higher education that needs to replace what we have now will need the Jeremys of this world?

Next to Jeremy is Lincoln, our biologist. Has a reputation for being a stanch advocate for research and for research-led teaching. He seems to me to be a sort of no-nonsense academic. Originally British I think, but he has been in Australia for many years now. He is recognised as someone who knows the liberal traditions of academic institutions and how they should be managed to produce outcomes that are trusted and appreciated by other academics. You would not see the word 'productivity' in anything written by Lincoln, but I suspect that his colleagues think of him as highly productive. He is a steadfast critic of neoliberalism and managerialism and suggests that there have been fundamental mistakes in the evolution of university development. I am guessing that Lincoln is highly collegial. I should imagine that he would make a fine mentor for young academics, keen to get on.

Nessa is sitting in a large elderly armchair but is not looking particularly comfortable. So far, I have not seen Nessa talk with many others here, which seems strange to me as Nessa teaches in the preforming arts. Nessa is looking quite nervously at everyone around her, as I suspect I am also. Perhaps we have things in common.

Donna is our top-ranking international researcher. Her name is everywhere nowadays. In some respects, she is not a good fit with many of the others, as she is so successful. I guess that she is here because of her outspoken commentaries on how universities work nowadays. In contrast to Nessa, Donna looks very much at home here in this common room. In the time that it has taken me to summarise what I know about Donna, she has conversed with Andrew, Henry and Jeremy.

Caroline arrived a bit late but settled in quickly. She is tall, smart and interacts with others easily. Caroline is an engineer, and one of those highly successful women in a profession dominated traditionally by men. Academically-speaking, Caroline has much in common with me. Both of us are interested in monitoring change in higher education, or academic evaluation. Caroline brings her engineer's, numbers-focussed, observations to a field traditionally dominated by qualitative research.

Henry is our learning technologist. I read that he has a huge number of articles about eLearning, but a reputation for emphasising the need for university teachers to form genuine conversational relationships with their students. I look forward to understanding more about how that works. Personally, I struggle with technology, worry about how anonymous our students are becoming within our universities because of how we all use technology, and fail to see how technology can help.

Andrew is a lawyer, law lecturer and certainly rather outspoken in the academic social-media world. Many here will have heard his opinions about financial aspects of academia, making universities pay for themselves, including full-cost recovery from student fees. I have seen him described as the money-guy. Andrew wears a suit, a bow tie and has a coloured handkerchief in his top jacket pocket. So far, for me, Andrew is the odd man out in this group. Other than Jeremy, it would be easy to link everyone's work to the conference's theme of people and planet in some sustainability-related way, but I might struggle to do this with Andrew.

Molly is chatting to Henry and Donna. They seem to be getting on well. Molly is American, tall and slightly built. Molly is a social scientist with a reputation for being on the under-dog's side, always. She researches disadvantage and integrity and certainly looks the part. There is nothing grandiose about Molly, but certainly something wholesome in the way that she dresses and holds herself in public, and in what she writes about.

What should I say about me? I have become more outgoing and confident with age, but in my younger days I was embarrassingly shy. Lack of confidence and self-worth is definitely a feature. Some would suggest that I am rather boring, lack conversation, and am generally awkward in polite society. I agree. I found my niche in academia but on the way discovered that I am good at some things, perhaps teaching and research, and not so good at others, like networking and leadership. But I am interested in everything and need many more lifetimes than I have to understand how it all works. I am also an educational researcher and an educational developer. I am interested in and research everyone else's business, in my own and in everyone else's university. I tell people that I am a professional meddler. I meddle in your academic business, and I have a keen nose for deception. I used to be a biologist but struggled to fund my laboratory. Nowadays my university, along with its teachers, researchers, professional colleagues, administrators and students, provides the best laboratory that any researcher could possibly want. I found the shift from science to social science difficult, but all-consuming. I could be accused of sitting on the fence over many of the big challenges that universities are experiencing now, but I prefer to imagine myself as professionally disinterested. I don't see how we can research a topic if we have a strong opinion about its rights and wrongs before we start. My conscience would not let me meddle in your business at the same time as having an opinion about it.

Who else? Ganesh has just arrived. Perhaps he has just flown in from India, where he is well known as one of that nation's leading sociologists. I doubt that his nation's government appreciates him as much as his academic peers do. His research is quite critical of much in that country but is certainly seen by international researchers as representative of social change on the ground, far more so than that seen in political manifestos.

Still to arrive is Rik. Much of Rik's research explores higher education and the development of higher education teachers. He has more teaching-related letters after his name than any other academic I know. I guess that he is one of those permanent students, or collectors of qualifications. I am looking forward to meeting him in person. We have communicated by email before, but if he arrives, it will be our first face to face meeting.

So, that is us. And now I see that Jeremy is about to bring us to order.

Jeremy speaks: Welcome all! It is so good to meet you in person after all of our emailing over past weeks and I cannot tell you how much I'm looking forward to our conversations over the next few days. As you know this is the sixth in a series of conferences on the theme of people and planet. We are all unashamedly interested in sustainability, sustainable development and the roles of universities in helping our societies to achieve the Sustainable Development Goals. And within this broad sphere of interest our deliberations will focus on learning and teaching rather than on the more widely understood research that our universities do. I know that I think of every conference that I host as special in some way, but I think this one in particular deserves that title. Most particularly, this is the first conference that I have led that has been so generously sponsored. Each of you will have paid something to get here, but your costs have been considerably lessened by our sponsor. I had to look in detail at our sponsors' conditions, and there were some, but all of them have been easily accommodated.

They relate to our timetable procedures, which we are all happy with; limits to the use of presentational technologies that no one has questioned; a maximum enrolment, somewhat smaller than usual; and an invitation list, although not all who were invited have been able to come, and some of you applied to attend in the usual way. I think that everyone here already knew what I have just described, but our sponsor tells me that they have a surprise for us at the end of the conference. I did not share that with you in my emails to you. Other than an assurance that the surprise is a good one, I do not know what it is yet. And yes, I do know who our sponsor is, although they will be anonymous until the end of the conference. Their credentials had to be checked because our host college has a list of people and concerns that we are unable to accept funding from. Most universities and colleges in my experience will not accept funding from the tobacco industry, for example, but this college has a longer list; no doubt added to over the centuries. Our sponsor passed that hurdle.

My task as host is multifaceted. I am here as a first point of contact if any of you encounter problems. I am here as a timekeeper and facilitator of conversations. I am here to ensure that fair play rules. I shall add to the conversations where I see a need and ask for clarification if I think that you expect too much of us as we struggle to understand your individual disciplines and points of view. I know much about each of you from your published academic work, but I hope to get to know each of you at a different level over the next few days.

Although you all know something about each of you from the information that I have provided, and no doubt you will have read some of each other's writing, I think it reasonable for me to summarise our collective identity now, at least to provide an indication of why we are here, and why other eminent academics in our fields of enquiry are not.

To be blunt, you are all rather outspoken academics, perhaps even contrary. Within each of your peer groups you are known as academics who do not toe the party line on key aspects of your disciplines that relate to sustainability. Although each of you will probably know the major and generally accepted themes that occupy multiple disciplines around your own, you are unlikely to have followed the arguments and disagreements within areas that are not your own. As we come from diverse academic areas, our conference is a multidisciplinary opportunity, perhaps even with aspirations for interdisciplinarity. I, and our sponsor, are hoping that each of you will use your own narrative and contributions to conversations to unpick the challenging concepts that exist in your own academic backyard, for the benefit of your neighbours. This is not an opportunity for each of us to simply express contrary opinions, and I am sure that we will not. Our narratives do not need to list all of the supporting references, but each of us needs to be confident that they exist. Who we are also relates to what outcomes we expect from this conference. The product is the future us. We all hope to leave this place with a richer perspective on the ills of the world and their links to university teaching and learning.

Are there any questions?

Caroline: Thanks Jeremy, that's useful. I have to admit that until just now I wasn't at all sure why I came. This is not my usual type of academic confer-

ence and the fact that it doesn't have a book or conference proceedings as outcome has raised eyebrows in my circle of academic friends. But I do like the notion that I am the product. I think that I do need to reset my own perspectives on people and planet, and on my university teaching. I needed this, so thank you.

(General murmurs of agreement).

Jeremy: Wonderful. OK. Dinner tonight at 8. In the dining room across the way. And then we all meet here tomorrow for our first narrative and conversation. Everyone has been sent a timetable, and I have printed it out for our noticeboard by the door. Staring us off tomorrow will be Henry, who has chosen to be identified as a learning technologist. Thank you everyone.

(General applause).

Notes

[1] Some academics measure their academic worth by counting the number of times that other academics write about what they have written about, in books and in academic papers. An academic who rarely gets mentioned by other academics is not a particularly worthy academic in this way of measuring worth. An academic who only writes one book or paper in their career, is also not considered particularly worthy, no matter how many times that particular book or paper is mentioned by others. Really worthy academics write lots of books or papers, each of which gets mentioned by many other academics. Academics with an H index of 20 have written at least 20 books or papers, each of which has been mentioned by at least 20 other academics. Building a personal H Index is a matter of pride for some academics. Other academics find other ways to imagine their self-worth. Personally, I like H Indices, but I need to acknowledge that academics can be quite snobbish about who is doing the mentioning, and where they do it.

The Learning Technologist's Tale

Everyone gathered again in the Common Room the next morning. Rik had arrived overnight and is talking energetically with Jeremy. At 9.30 AM Henry's slight figure moves quickly with determination to a chair that appears now to be in a commanding position. Others automatically move to other chairs and sit down. Henry is standing up in front of his chair and we assume that he will make his delivery in this way. He has no notes and appears to be taut with nervous energy. Henry doesn't wait for an introduction from Jeremy, although clearly Jeremy intended him to.

Henry: Thank you for this opportunity and for the trust that you put it in me to give the opening presentation. I feel like a keynote speaker! And I see I've been labelled as the learning technologist. I am a learning technologist, so the label is accurate, but I always feel like a slightly unusual learning technologist. I seem to spend as much time advising people not to focus on learning technologies as advising them to do so. Not all of my fellow learning technologists respect my position on this matter. I guess a major thrust in my work is that learning technologies nowadays need to be integrated into everyday learning and teaching practices and when we research how they work we need to research them in the context of their efficacy to support learning and teaching in the real world, not as a separate entity or in an imaginary world where university teachers, and students, are actually prepared to use them. I feel strongly that almost all learning nowadays is mediated by technologies, but that this is particularly so for learning that is likely to make a difference for our shared interest in people and planet. So, it is in that integrated way that I want to introduce the idea of a perfect storm of problems in the development of universities. Learning technologies are in my tale, but I hope won't dominate it.

I start not that long ago with massification. That's not to say that universities were perfect before they became huge but certainly in my view massi-

fication was a major step in their development. When some of you started your journey in higher education, in many cases even first year classes had fewer than 100 students and some third-year classes had fewer than 10. One of my third-year classes in my undergraduate degree had only three students in it. Such numbers were common in those days. Nowadays some first-year classes in some universities number in the thousands. Unfortunately, or perhaps fortunately, the word got out that university education helps societies to prosper and to become more democratic and governments in many countries have facilitated a massive expansion[1]. Once again looking at my own journey, when I went to university perhaps only 8 to 10% of young people went. In many countries nowadays 50% of young people go to university and in some countries a much greater percentage do. Perhaps if the staff student ratios and number of university academics had increased in proportion we might not be where we are now, but they didn't.

Other things did change at about the same time though, and it is impossible to explore higher education expansion without exploring these other factors. Technologies became widespread. I started using computers in my teaching in the early 80s. The Internet and email developed in the 90s. And student access to online resources blossomed in the early 2000s, alongside Web CT and Blackboard, laptops and mobile phones. Students no longer needed to go to the library to learn. Social media platforms like Facebook came along soon after. In many nations, our students also changed. In the early days they were all tried and tested and proved successful at school and generally fitted into the university system very well, particularly as new universities were opened to accept them. But as the number of young people increased their diversity also increased and many struggled to find their place in this essentially middle-class enterprise. Initially, at least where I went to university, the expansion was coupled to student grants, making university affordable for a wide range of students. But progressively student grants were replaced by student loans and increasingly students had to find work to supplement their income whilst at university. University teachers can no longer simply assume that students will find time to study. Importantly, these changes did not occur in isolation. They interacted with one another. For the institution of higher education as a whole, campus-based students were joined by distance students who never came to campus but relied on technologies to overcome the disadvantage

of distance. Teaching and learning progressively became asynchronous, as students worked away on discussion boards, summitted assignments rather than sat face to face exams, and watched recordings of lectures rather than attended them in person. Video conferencing began to flourish in the business world, for university researchers, and to a much smaller extent, for distance students and teachers. Nations complained about the cost of a university degree for so many young people, and progressively identified higher education as a personal benefit rather than a social benefit, but even so, the higher education system even until quite recently could hardly be described as broken.

And then came Covid. Almost overnight, videoconferencing went from a niche enterprise to something that all university teachers had to learn how to do, albeit learning on the job as 'emergency remote teaching'[2]. Video-conferencing technologies and teaching approaches that had developed in previous decades, but only ever achieved niche status before the pandemic, became mainstream. Everyone here will remember some difficult times. Although most of our students could attend our lectures remotely if they wished to, their mode of attendance for many was far from satisfactory. Teachers found themselves teaching to their computer screen, filled with the black boxes of students who may or may not be listening, but chose to have their cameras turned off, so who would know? Some might say that this is similar to lecturing to a room full of students who refuse to inter-act, but few lecturers will agree. Without the visual cues that at least some listening students can give, it is very difficult to lecture. The experience for most involved was dismal. I say 'most' because for the few teachers who had taught in these ways before, their prior experience helped them greatly. Many simply shifted from synchronous teaching to asynchro-nous teaching[3], adopting a traditional distance mode. And for students who had always found it difficult to attend in person (including those with care responsibilities for dependents, those who lived too far from campus to attend every day, and those with day-time jobs) these calamities became opportunities.

In some ways, all students were suddenly provided with choices. By then, many lectures were recorded, so some asynchronous learning with-out attendance had been possible for some time. And then, suddenly, all lectures were recorded, allowing asynchronous attendance for all, and

as well as that, students could now attend synchronously, without even travelling to campus. And even if students did choose to attend synchronously, they could do so on their terms; at home, in a coffee shop, in the library, with camera on or off, in day clothes or even in pyjamas. Some systems even allowed students to ask questions anonymously, using the chat facility, allowing a degree of interaction denied to many of those who attended in person prior to Covid, as interacting in a large lecture setting is too intimidating for many.

But the situation also emphasised limitations. Most university teachers were not prepared for videoconferencing. To be blunt, many simply failed to adapt. They transferred their conventional learning resources to appear online in Blackboard or Moodle, they gave the same lecture that they always provided but without the benefits of face-to-face interactions and social settings of students meeting up. For many teachers it was an unpleasant experience and the same could be said for many of our students, internationally.

As Covid declined, universities around the world anticipated a return to in-person teaching[4]. A great deal of research, and optimism, suggested that students were keen to return to face-to-face learning with their teachers and to forms of interaction most university teaching failed to provide remotely. But as we well know now, the genie was out of the bottle. Around the world reports were shared that students were not returning to lectures. Students no doubt understood the limitations of new ways of teaching, but they also appreciated the choices made available to them. As it turns out, and although students during lockdowns clearly did not welcome all of the interactions possible in videoconferencing, preferring for example to listen and watch without talking themselves or showing others their camera view, many nowadays prefer even this low interactive medium to actually attending in-person. Lectures, where still given, are often poorly attended. Increasingly university teachers and institutions anticipate a future with fewer traditional teaching situations made available for undergraduates, with diverse online synchronous and asynchronous learning opportunities provided as alternatives to lecture-based courses, and much in common with traditional distance learning.

I think that we should also include here some wider issues that impact on the way that universities work. Around the world we are seeing massive graduate unemployment on a scale that we haven't seen before. In many nations, including some of our largest, students can no longer imagine a degree as a pathway to a reasonable job with a good salary. This changes the cost benefit analysis that students have to undertake before they take out a student loan or commit themselves to 3 or more years of limited earning potential. The change also impacts on the universities themselves, in particular on the diversity of universities. We have always had elite institutions that have always managed to attract the best students, the best research funding, the best university teachers, and these institutions have always managed to graduate their students into good jobs. The links and advantages are probably best known in the USA[5] where there is considerable understanding of the class-based advantages passed down from generation to generation. Graduates from the best institutions get the best jobs and their increased earnings provide the best advantages for their own children's education, so these children manage to get into the best institutions and pass on the advantage. None of this is new but we are starting to see dramatic differences in outcomes between our best institutions and our worst. Research in the UK[6] has demonstrated that attendance at some universities may result in lower subsequent earnings than if the students have never been to university at all. University people, of course, are not immune to the stresses that these developments cause. Almost universally these stresses feed back into the university to encourage it to do better. Perhaps competition between institutions has always existed but it is certainly reaching new heights at present, fuelled by externally-driven ranking systems. Universities go to extraordinary measures to increase their performance in the rankings and these measures do not necessarily advantage many of the attributes that colleagues gathered here today will be interested in. Teaching and learning are far more difficult to measure with our new neoliberal instruments than research, and the rankings focus on things that are measurable rather than things that are admirable.

My analogy of the perfect storm continues. As if everything that I've said already isn't enough we need to go on. One thing that worries me greatly but doesn't surprise me because I've been working with it for so many years, is how slowly academics are changing and accommodating to the changes that I've been describing so far. So, at this point I want to tell a

tale that I think is a key element of my overall tale. My own institution is well practised in videoconferencing. Not only do we have videoconferencing specialists but, post-covid, just about all of our teachers are familiar with this mode of teaching. Many of our programmes and departments combine face to face students with those attending by videoconferencing. My own department is amongst these and given that we have a teaching and learning focus, I would like to say that we have become good at this sort of thing. Not so. Every month we meet as a team, with some of us in our own seminar room, while others attend at a distance, some on distant campuses, appearing as projected images on our seminar room's screen. We can generally hear and see them well. But not so for them. They generally see us only as small dots scattered around the room, and would struggle to see who is speaking at any particular time. And certainly, they would be lucky if they could hear anything spoken by those other than in the front row. Conversations are troublesome for all concerned. Some blame the technology, but this is the same room and the same technology that I regularly use to teach with similar group sizes. I know that with effort and good organisation it is possible to ensure that everyone present, face to face and at a distance, is able to see and hear everyone else. But even in my own department, my colleagues have not been prepared to make the effort to learn how to do this, or to make the effort to actually do it, even within our own team. I am deeply disappointed. It seemed to me that my institution has learned nothing from its Covid experiences and from the challenges of remote engagement since then. The reason why my own department has not accommodated to new technologies is likely a combination of many factors. I suggest that ignorance and lack of caring are involved, but fundamentally I think that my colleagues simply do not know about the research into videoconferencing and its application to teaching environments. The real danger in all of this is that people are charged with a responsibility to improve university teaching assuming they know how to do it based on traditional experience alone, without engaging in the research or doing research themselves. Many universities do not give teaching a high enough status to research how to do it properly, or to warrant thinking about it deeply enough. As I see it, this is just another example of the danger of universities researching everyone else's practices, but not their own.

And there are more convolutions in this complex tale of woe, with a focus on the diversity of our universities. My vignette of teaching and learning

specialists failing to accommodate to the affordances and requirements of new technologies referred to my own institution rather than to something more generalisable, as different universities and different nations may be doing different things in this space. I do have experience in Europe, the USA, and in Oceania, and universities there are highly involved in the international higher education literature, so I think that my analysis is broadly applicable to these areas. But I know far less about major higher education centres like China and India, where a significant proportion of the planet's universities reside. I am pleased that Ganesh is here, and I look forward to learning more about what is happening in India. Speaking internationally now, within these limits, I suggest that wealthy institutions are protecting their academics from having to learn how to teach in our new post-Covid world, where students have choices. Instead of anticipating that their teachers will take time off from their research to learn how to teach in new ways, and to adapt, these institutions employ so called third-space professionals[7] who essentially do the adaptation for them. If my institution had been one of these institutions, my colleagues would not have put themselves in this position at all. They would have been advised and supported to do the job properly by professional people employed for this very purpose. But only wealthy institutions, that do well in the rankings, and that can anticipate continued presence within our lists of elite institutions, can afford enough third-space professionals. Similar third-space professionals follow the research into learning and teaching, support university teachers to develop new teaching programs, and have significant interactions with the students who use these new teaching programs. And to be sure, these third-space professionals will all be skilled users of technology. Technologies will be integrated within everything that they do, as will an assumption of continued technological change, including the great unknown of artificial intelligence (AI). In these institutions university teachers are likely to be able to continue much as they have in the past, undertaking some teaching but focusing on their research. Institutions who can afford third-space professionals are likely able to continue to provide both synchronous and asynchronous support for learning. There will certainly be fewer lectures, but these will be professionally engineered and made available to a wide range of learners in a range of AI enhanced formats.

Less well-off institutions that are capable of following current changes in the higher education environment are adopting another strategy, with a

focus on academic development; accepting that they cannot support their teachers to continue as they have in the past, and so demanding that they themselves change. Such institutions have well developed postgraduate certificates of higher education and anticipate that these programs will train their new university teachers to be able to cope with the demands of technologies and students. Some go further and require their existing lecturers and professors to upskill and to demonstrate their upskilling by becoming professional teachers accredited by external bodies like Advance HE. Rather than support, such institutions offer professional development opportunities, much of which focusses on how technologies are integrated into both teaching and learning. Some institutions and many teachers are being dragged kicking and screaming into this particular vision of the 21st century, but some nations are prioritising academic development and linking it to government-mandated funding and governance changes. I doubt that it will work as well as elite institutions' support mode, but needs must.

And then we have my own institution and others like it, and I suspect in some cases whole nations. Managed by fine disciplinary academics who have only their own experience of teaching and learning to guide them, they appoint one or more of their own to guide their transformation. Governed by politically-appointed governors, with next to no knowledge of the academy, and anticipation that it is a business like any other business, they set ambitious agendas and apply change processes based on human resource models to work against their academics rather than with them, as necessary to balance their books. Such institutions have no stomach to force their new and existing teachers into programmes of professional development, but instead focus on the research-elements of rankings to ensure their future viability. Such institutions do not have the funds to support their academics into new ways of working, and lack the gumption or understanding to realise that to change what they do, academics either need to retrain, or be supported so that they do not need to retrain. 'Let's get rid of contrary academics' does not appear to me to be a plan at all. Perhaps I am missing something, and perhaps deep down I am hoping that our conversation this week will help me to understand something that I have failed to understand so far. A big part of my perfect storm involves our universities struggling to identify where in the pecking order they are currently situated.

And so to people and planet, and the roles of university teaching in achieving social, environmental and economic justice inherent to the Sustainable Development Goals. I think that most university teachers, and most of our institutions, are simply too busy surviving to think deeply about such matters. Perhaps we ten are the exceptions, and certainly we all know other exceptions, but most of our colleagues are in survival mode and have been for some time. The odds of our university teaching making a positive contribution to the achievement of the Sustainable Development Goals (SDG)s are stacked against us. Perhaps a key issue for us to consider here is the extent to which we graduate people who prioritise people and planet, or their own well-being. To imagine that our teaching does not already have an influence on this prioritisation is naive to the extreme, and to imagine that our current influence is positive or even benign is also a challenge for me. And to be clear, the institution of higher education does not assess, evaluate, measure or research such things, so all we have to go on is our experience and imagination. I am sure that Kerry and Caroline will be telling us more about these matters of measurement. And I suggest that institutional and national choices of Support, Academic Development and Human Resources modes of change are also likely to be important. And because our use of and involvement with technologies is irretrievably integrated with these matters, it is just as well that we have a learning technologist here to help us see the wood from the trees! I repeatedly hear calls from colleagues interested in education for sustainability, in education for sustainable development and from sustainability scientists telling us how we need to change higher education, and how we need to graduate students who think and act in particular ways, and I can't help but think how unreasonable these calls and demands are, and how far removed from reality these people must be.

At this stage I would like to stop talking, and start a conversation. I do want to extend my analysis further and talk about a particular development that I am interested in, but let's see if we can all be involved in this. Ideally my own particular interest here will be able to be developed in response to something that comes up in our conversation.

Jeremy: Thank you Henry, that was a great start to our conversation, and I can see that several colleagues wish to challenge you or agree with you. Let's start with Nessa.

Nessa: It was a real pleasure to hear you talking about these things Henry as in my institution most of them are swept under the carpet. People are too busy, and I think too embarrassed to address them seriously. I know for a fact that student attendance in many areas of my university is truly dismal even some years after Covid. I know of lecturers who lecture to an empty room just looking into the camera. I know of lecturers who routinely teach to ten percent of the registered class. And I like the fact that you're making links between things like attendance and the features of our education nowadays that might have contributed. I know that many people say this is the fault of us recording lectures, as why would students need to attend in person if they can just watch the recording at their leisure, but I'm also certain it's more than that. Given the proportion of my own students who work in the evenings in hospitality and sometimes even early in the morning as cleaners, I know that at least some of our students simply cannot manage to attend lectures when we want them to. Things are different from when I was a student. I found it quite hard just working in the holidays, nowadays many of our students do full time jobs on top of their university degree.

Lincoln: None of us are immune from these sorts of things. For a while I had very poor attendance in my lectures and is it simply impossible to interact with students who aren't there or to interact with students through recordings. You can ask rhetorical questions but without any indication of how students react it's not the same at all. My department stipulated some minimum attendance expectations and that did make a difference but I'm still struggling with low attendance coupled with an expectation from my institution that the students would do as well in their exams whether they had attended lectures or not. Things like pass rates and retention from year to year have to go up year on year. We have a number of equity groups with targets for performance and some of these students are the least likely to attend, no doubt for legitimate reasons, but no matter what the reason, students who persistently don't attend tend to be those who need most support. I am finding myself essentially delivering instructions for how to prepare for the exams and I struggle to imagine it as any reasonable way of running a university. And to be blunt, my university is almost certainly one of Henry's elite group. I cannot imagine what it must be like to teach in some of the others.

Jeremy: Murmurs of concurrence confirm that most in the room are experiencing similar situations. Clearly this is an international problem.

Nessa: To be clear, lack of attendance is not only affecting our lectures. For a range of reasons, much of my teaching involves putting students into groups and supporting groupwork. My institution has promoted groupwork to encourage engagement, to promote active learning and to overcome the dangers of competitive individualism. Many of my students are equity students and we think that these high engagement models of teaching and learning really support their development. But none of this works if students don't engage within their groups. Some freeloading[8] has always been an issue with groupwork, but it was far more manageable before Covid. Most groups nowadays report that some students simply do not attend, even to online activities in Facebook and the like. Students seem to have got the message that all they need to do is watch lecture recordings. I worry deeply that standards are falling, and I feel powerless to turn things around. At present I have to agree with you Henry, that addressing the more challenging aspects of education, like integrating sustainability, fall by the wayside when we struggle even with the basics. And unfortunately I suspect that my institution is one of those politely referred to by Henry as being in Human Resources mode. We certainly cannot afford to support our university teachers in the way that elite institutions can. Basically I have to do it all myself. And we are clearly not in academic development mode. I am interested in learning more about pedagogy but most of my colleagues think that they are already experts. Upskilling is a real problem in my university. And right now, those who are retiring are not being replaced. I think that we are losing some of our best teachers.

Rik: My institution is also losing traditional teachers, but tends to replace them with new people on fixed-term teaching-only contracts. I wish I could say they were all dedicated teachers but generally they're not given time to learn how to teach by attending academic development courses. And most of them want to be lecturers, not teachers. They see the teaching role as a stepping stone to a proper job, with research. They nearly all have PhDs. But I want to add that it is difficult to identify which of our teachers are good teachers and which are not. I have my own ideas, and I guess prejudices, and perhaps for some this is obvious, but the metrics that we use to value teaching often identify our best researchers as our best teachers and

sometimes I suspect we, and our students, confuse charisma with good teaching. Mostly we depend on what the students tell us about their teachers and teaching, to make judgements about the quality of teaching[9]. But I wonder what it would look like if we included measures of attendance in our quality rubric. Are our best teachers those who motivate their students to attend? In my tale I shall be talking about possibilities to professionalise university teaching, but I think that until we go down that route we will be talking at cross purposes about what is good teaching and what is not.

Andrew: Goodness Rik ... are we now considering sacking those teachers whose students don't attend? That would certainly put the cat amongst the pigeons. But seriously, I think we have far too much focus on inputs into our teaching and nowhere near enough focus on outcomes. Surely good teachers are those that achieve good student learning! Personally, I like the system that they've developed in the USA to make judgements about the quality of learning in undergraduate programs. Students who hope to go to postgraduate positions need to take an external examination known as the GRE[10], I suspect because institutions tend not to trust the assessments, or evaluations[11], offered by other institutions. I think this gets to Nessa's point about us not being in control, and perhaps having to turn a blind eye to poor student performance as we are under so much pressure to pass students who perhaps should not pass. I like the idea of keeping feedback on learning in our own institutions but sending final assessment to an independent external body. I have no doubt that AI will be involved.

Lincoln: So much depends on trust and reputation. I wonder if perhaps before Covid, on balance our societies tended to trust us, but after Covid that trust has been eroded. I cannot imagine my institution being happy to send all its final assessments to an external body no matter how independent, but I guess my institution is one of those relatively elite universities that can afford to support teachers. We are trusted, we do have a reputation. We are safeguarding these things in the best way that we know how. We think that we are teaching well, albeit with poor attendance at some of our formal teaching events.

Henry: Thank you. Clearly, we are all in the right place here today. Higher education teaching has problems that touch us all, even as we come from different disciplines and different parts of the planet. That does lead me

nicely into my own small part of the jigsaw puzzle. Although I can be quite negative about our chances of using higher education for positive social change through our teaching, I do have a particular interest that is relevant.

It has always seemed to me important that technologies don't get in the way of good communication. For many, the gold standard of good communication would be face-to-face conversation, as we are doing today. Communication scientists would not necessarily agree, but at least this provides a standard against which other forms of communication can be compared. We also need to consider the purposes of communication. Simple one-way instruction has easier to achieve needs than far more demanding interactive communication. Communication that aims to change the people being communicated with is probably the most demanding of all. So, I agree with everyone who contributed to our conversation just now. Our universities are not necessarily very good at teaching. Many of our lectures are very poor. They do not resemble either Socratic lectures given by professional communicators or professionally produced podcasts. They are not interactive. They do not engage people. Often, they simply attempt to transmit information. And it is not just our large lectures that are deficient. I have experienced lecturing in small groups, so-called seminars, that are similarly deficient. Recording these inadequate events, making them available online and calling them learning resources is simply an insult to anyone who thinks of their profession as pedagogy. Our students might appreciate them, but often they know no better, and the power differentials in our system make their appreciation expected.

But having said all of that, these teaching events are not for me. They are for our students. And let's face it, our students are diverse, not only in experience, but also in motivation, in availability, in location and in anticipation. Some years ago, students either attended lectures or did not. If they did not attend, they were generally obliged to borrow another student's notes to find out what the lecture was about. Over the years academics have increasingly provided students with good reading lists and sometimes even with pre-prepared notes. So, missing a lecture was not hugely problematic. And then lectures started to be recorded and attendance started to slip away, particularly if all the lecturer did was to transmit information. Students soon realise the difference between a lecture that can be watched and listened to as a recording, and those that really need to be attended

in person. Recordings are fine for transmitting information, and asynchronous learning has many advantages. Not only can students watch it at a time to suit them, but they can watch it over and over. But Covid introduced us all to something more. If students wanted to, they could stay at home and still experience the lecture synchronously with those who chose to attend in person, through the medium of videoconferencing. Communication may not be as good, but deficits for many were made up by convenience. Learning technologists, instructional designers and others call such things 'hybrid' teaching and learning, although the term hybrid is used quite indiscriminately. Here I am referring to situations where we have a university teacher in the same room as students who have chosen to attend face-to-face. Other students are attending via video conferencing. In an ideal situation all participants can see and hear all other participants, and everyone present can interact with everyone else. It would be as we are now all together in one room, but in addition, using cameras and microphones, and perhaps everyone having their own mobile device, what we do here is available to people like us who chose not to come here or were unable to come here. Most of us here will have experienced the live streamed lecture or a webinar or the use of zoom to bring a few students from overseas into a live lecture. I suggest that in most circumstances everyone's experience of these is not particularly good. The face-to-face participants don't interact with the distance students. They may not even be able to see them and certainly are likely to struggle to hear them. But in most cases the teacher is presenting and not trying to interact at all. That is not a situation that I'm interested in. I am interested in teaching situations where interaction is possible for all, no matter whether they attend in person or at a distance. I am interested in understanding how well we can do this. How interactive can the teaching and learning be? So far, I have researched mostly small groups, mostly with say ten people in the room and another ten elsewhere. My research suggests that it is vital that teachers do not turn their backs on anyone. Eye contact is important. It is also important that if someone in the room talks, the camera can focus in on them so that their image is displayed on the screen alongside the images of the distance participants. To make this work we need reasonable technology, like cameras that can be zoomed in on any speaker, and microphones that detect speech well[12]. But most of all we need teachers who care enough about communication to bother to learn how to use the technology and to bother to learn how to interact as

they lecture or teach. I've no hesitation in saying that the limiting factor in all of this is generally the teacher rather than the technology. It takes time and effort to learn how to teach well in this sort of hybrid situation. It takes experience on which our learning as teachers can develop. And it takes, dare I say it, a professional attitude to learning rather than an assumption that we already know how to teach and that it is the technology's fault if we do not teach well. At present our pedagogy is being driven by changes in the technology, rather than the other way around. I need to emphasise that my research really has been with relatively small groups. I do think it should be possible to make hybrid large group teaching similarly interactive and accessible, but I have not done the research yet. And to be clear, the vast majority of hybrid teaching that I see does not impress me, yet. We have a long way to go.

And why is this important? While some universities seem resigned to accept that their teaching in future will be basically asynchronous and at a distance, and some are preparing properly for this, some university teachers and some institutions still profess the advantages of in-person learning, the significance of being lectured to by an eminent professor, and the importance of a campus experience. So, maintaining flexibility of opportunity for students, perhaps incorporating hybrid situations with learners attending both in-person and at a distance synchronously, has become an important quest for some universities[13]. I think that such opportunities should be particularly relevant to this group. Most of us are interested in using the power of university teaching to at least have some sort of positive influence on the next generation beyond transmitting information. We may not here all be advocates for education for sustainable development in the same way, but we are all advocates, I suspect, for good teaching and good influences. It seems to me that if we are going to influence our students in good ways we need to communicate well with them. I doubt that we can communicate well by giving them lecture notes or recordings of lectures they didn't attend. I accept that most of our teaching isn't good enough for these forms of influence, but I really do think it's vital that students attend those parts of our teaching that are potentially good enough to influence them. If they can't attend face-to-face, perhaps we can get the technology and the academic skill level to be sufficiently good to enable some good learning whether the students attend face-to-face or at a distance. But I cannot do this on my own. At present universities are not invested into