

**Teaching and Learning Summit 2020**  
**Professor Diana Laurillard's response to Questions and Comments**

**Overall comments**

Just to say how much I appreciate having this extended two-turn conversation. There were really good, thought-provoking comments. Out of curiosity I did a word count, and our total words were 3,100, about half each, i.e. ~22 minutes @ 140 wpm. So that was a good amount of discussion time. In the old days I'd have been asked to do 40 mins + 10 mins Q&A. This is a much better balance! Thank you very much for your engagement with the talk.

<b>Question</b>	<b>Diana's response</b>
<p>I'm interested in the ratio between synchronous and asynchronous learning and how this should be adapted for different learner groups. Is there any information about learning stage (e.g. undergraduate vs. postgraduate) and the optimal a/synchronous blend?</p>	<p>It's an interesting question, but I don't think it's answerable. In education we span the range from 100% synch in primary to 90% for some university music/drama/science courses to 0% in many online open universities. Humans need synchronous and f2f, for the best kind of formal and informal learning at any stage, so we need to keep that as a crucial element wherever we can. The UKOU ran week-long summer schools every year on campuses, but interestingly, over the years they have diminished due to the ever-rising demands of the workplace. Mix it up, is the only clear advice I can think of, apart from design-test-redesign, as a general principle!</p>
<p>I'd like to know more about 'converting' a 1 hour lecture to a 5 minute video!</p>	<p>If this refers to my slides on converting a 1-hour lecture slot to an online version, the assumption was that the 50 minute lecture presentation would convert to 4 x 5min videos, plus 4 x 2-minute quizzes plus a 20-minute reading. And the 10-minute Q&amp;A would convert to a 30-minute live online Q&amp;A. I'm not sure what the question is. I'm sorry I wasn't more clear on that.</p>
<p>Me too. Even if it were a series of 3 or 4 5 minute videos</p>	<p>Does the above answer the question you have in mind?</p>

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I am interested to know how teachers are supported to apply learning design in their practice. It is amazing that the application you introduced could provide a bar chart of time for different activities, and how the active/passive learning could be visualised. Thanks a lot for sharing the knowledge!

It's funny there are no other such apps for supporting teachers. It's just very simple arithmetic, but remarkably powerful when you're trying to work out how to balance students' learning activities and your own teaching activities against the time available.

What do people think about MOOCs as a platform for professional development?

We have found it works extremely well when we run them on a social learning platform like FutureLearn, because discussions between professionals can be a rich exchange of ideas and experiences. And professionals do not need personal nurturing in the way that students do, so the mass approach is viable. And as most professional development courses only provide a certificate of attendance, not achievement, MOOCs can cope with that - as well as the achievements measurable through automated testing. And they can reach into places where PD is all but non-existent. For me, PD is their real strength.

This workshop has some suggestions to identify which parts of your lecture material are suited to video, and which parts can be done by other online methods: <https://staff.unimelb.edu.au/finearts-music/teaching-and-learning/teach-anywhere/media-and-documents/Rethinking-your-lecture-slides-handout.pdf>

Very good to have this kind of advice available. It's important not to produce 50-minute videos!

This session may give some ideas about converting lectures to short videos... <https://le.unimelb.edu.au/professional-development/designing-for-learning-with-technology/designing-and-facilitating-online-learning>

Ditto

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Thank you Diana for your interesting presentation. My questions are related to your analysis of cost. It may be true that absolute teaching costs are higher for online learning, but some could argue that the marginal costs of delivery can be significantly lower. Have you considered this, and if so, have the results borne this out? Related to this, how do the fixed costs compare between the two delivery formats? And how does this impact the costs of teaching in your modelling.

Good question, and one I wish people asked more often. Yes the marginal costs are lower, as they are also with conventional methods, but this only comes into effect if you use wholly online courses to increase your student numbers to a cohort size that exceeds the break-even number. With f2f courses there is a limit to how far you can do that, due to estate size. With online there is no limit on numbers, although there are step changes in the number of teaching support and admin staff you need to do all the variable cost work on per student support. So you can keep increasing your online student numbers until you exceed the slightly higher break-even costs. You may also amortise the cost of the upfront online development over more runs than I illustrated. Good question about fixed vs variable costs too. This is what I was trying to illustrate in those two slides: that the fixed costs of f2f are low, but keep repeating at the same level, the 1-hour slot, whereas although the fixed cost of making 4 videos and quizzes is high to begin with, the repeat costs are very low. (You see what you've sparked! As I said, I wish this question was asked more often!)

It's simple arithmetic, but complex enough that you need a tool to help with this kind of planning. We have one, the 'Course Resource Appraisal Modeller' CRAM (<http://web.lkldev.ioe.ac.uk/cram/index.html>) - free and downloadable. The website has a guide. It allows you to do this kind of fixed vs variable cost for the two types of course, with different ways of teaching, over 3 runs. And also provides feedback on the nature of the student experience. I hope that will give you some idea of what we can do on this kind of issue - sorry there was no time to discuss properly.

Here is a ref: Kennedy, E., Laurillard, D., Horan, B., & Charlton, P. (2015). Making meaningful decisions about time, workload and pedagogy in the digital age: the Course Resource Appraisal Model. *Distance education*, 36(2), 177-195.

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For Diana - Many thanks for a terrific presentation. It is fascinating to see the translation of the Conversational Framework to the Learning Designer website and tool. It is wonderful that teachers are able to share the models that are being developed. I wonder if analysis and research is being undertaken by investigating the models that are developed using the tool...? Are there things that can be learned about models that may relate to different subject types or discipline areas?

Yes, it's been interesting to look at that. We got part way into analysing the patterns, but the development of the system itself took a lot of the time - it was surprisingly ground breaking in its technicalities. We ran some online events to collect and share designs, and used that material to start looking at patterns, and how to identify them. The AI folk on the team were keen to be able to spot a pattern and offer a similar one. But I felt the more interesting idea would be to use the defined learning outcome to say - here's an alternative way of achieving that. But there's no role for AI there, so not interesting to investigate. A multidisciplinary research team has to make compromises, unfortunately! But part of the event was to do peer reviews of designs, and this began to yield some interesting pedagogic principles in the way reviewers argued their case for why a design did not meet the criteria or how it could be improved. Then the funding ran out.

Now there's another opportunity, with the new Blended and Online Learning Design course starting soon on FutureLearn, which is designed to collect more peer reviewed designs. Demonstrating the feasibility of that is part of the research - do teachers build on the work of others, as we do in science and scholarship? Certainly we can show they can borrow pedagogies from other disciplines, but so many prefer to start from scratch - that's what we do in teaching!

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@gregor and panel... yes, let's talk culture! What are some tangible ideas/strategies to get academics to share designs, talk about their teaching, be collegial with materials and resources? Do we need a platform? Do we need a champion in each faculty? Do we need some more stringent design inspirations that are quintessentially "unimelb" (or custom to discipline/schools)?

This is what we're hoping to do in the new Blended and Online Learning Design course starting soon on FutureLearn, which is designed to support teachers sharing designs across discipline areas and even age groups. After all we share a lot of pedagogies across all areas and sectors - books, lectures, small group teaching, discussion groups or seminars, practical sessions, individual and joint projects...the details of those approaches expressed in the Learning Designer are also remarkably similar, so that a specific design has quite few topic words - most are about the pedagogy, advising students on what to do. It would be wonderful if you could join us on that course - which I refer to as really a Massive Open Online Collaboration!

The ABC workshop is a rapid curriculum development version of the Learner Designer

One important difference is that the ABC is done with paper and stickies, so what you create is a large piece of cardboard rolled up in your office - the thinking done is its main legacy - and that's important. It's a good prior stage to go through. But the Learning Designer creates a digital object that is permanent, and can be edited, updated, adapted and shared. And it gives you feedback. Also the ABC focuses at curriculum level, not session level. So the two are quite different and complementary.

I agree with Gregor about opening the 'closed door' teaching to our colleagues. It would be a great idea if the next Teaching and Learning Summit (or other event of similar nature) brings experiences of the teachers/lecturers, their best practice and the challenges they met (what works, what maybe working, and what does not work).

Good argument - enabling the discovery of new knowledge about teaching and learning to be a collaborative process, where the teaching equivalent of the journal article is something like a learning design – enabling us to build on each other's best ideas. Making 'teaching a design science'.

Re: cost and time. I believe this is moot. Many academics will only see the reward/payoff next semester ongoing. Many of the assets and designs they have prepared this year can be re-used with minor tweaks and adjustments ongoing. It gets easier! Design as a science is iterative (and efficient over time)

Yes!, exactly, I agree with that. But that upfront increase in the workload means that universities and departments have to be prepared for this very different distribution of teacher time. See discussions above.

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My experience has been that students feel that transitioning from a straight up didactic lecture into an online and blended learning experience, they (students) complain about workload. They (students) feel that the expectation to work at home is more work than sitting in a lecture theatre.

We do have to recognise that students need guidance for the work they do at home, and it's right that we convert a 50 min lecture into a series of short lectures with exercises. Too many would not watch a 50 min lecture on their laptop at home. In that sense it is more work - but that translates into more learning. They cannot learn enough through simple absorption.

I would be interested to see how Diana's time allocations would work out for her learner design model. I think the conversational model is great for helping us think about different T&L activities, but I am not sure about the learner design software.

Please see the discussion above on workload issues. The CRAM modeller is good for working out how much teaching time you have for the different types of teaching in your course, but does not get into the detail of the pedagogy, only in broad outline. The Learning Designer tool is complementary, and would follow on from that, as you begin to work on the detail of how you and your students spend your time during, say, a week of study on your course. In both cases, the decisions are entirely yours, but both tools support the thinking and design processes you have to go through. There are no rules about how you plan the teaching time you're allotted, but it's useful to have the opportunity to think through how to spend it.

I agree so much with how sharing and learning from each other is vital! How can we create a feeling of "safety" around this – and a willingness to be "vulnerable" ? that breaks away from any perception of this being similar to an SES?

This is what all academics do in their research. We are respectful of each other's work and contributions even in the process of rejecting a journal article. We are nowhere near that kind of knowledgeable level of what makes a good learning design as yet - we need much more work as a teaching community before we get to that point. So actually I suspect we would generally be less vulnerable in sharing teaching ideas. We are peers, building on each other's work. Our problem with it is cultural - we're not used to exposing our teaching to our peers! But if we are to build knowledge and make progress, we just have to get over that.

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Diana presented the Learning Designer tool as a teaching quality optimisation tool. It certainly helps to visualise and understand the different types of touch points and teaching and learning methods but I don't see how it optimises quality. I fear that this tool might be used to try to get nicer looking pie charts without much regard for optimising teaching quality.

You're absolutely right - that effect definitely happens. In workshops, staff come with their current learning design, put it into the tool and see that it's predominantly turquoise - learning through acquisition. And everyone believes in active learning, so where is it? So they have to start working on making it look prettier - but that does translate into a design that encourages students to be active in their learning. We have to stress that there is no right answer here, but it's a definite improvement in the way they think about their teaching more from the student's point of view. But I agree that 'optimising' is a stretch - we can't know that. 'Improving' would be a better word.

Yes I particularly liked the Learning Designer tool's method of showing the proportions of different types of learning activities in a subject.

I'm glad you like that. It's such a simple idea, but does seem to mean a lot to people. That calculation is no doubt going on in teacher's heads to some extent as they plan their students' work, but it's very complicated - we need help with that!

Is the Learner Designer 'software/site' a shortcut to avoid T&L professional development and the time investment required?

That would be an odd thing to do with it. We use it in TPD workshops and courses, and then it can persist into teachers' practice beyond the TPD. Unfortunately we don't require any TPD - a small minority actually do it. It's not as though HE teachers have to fill a quota of TPD hours anyway, at least where we are. So I rather doubt this would happen, but perhaps some people may use it that way.

it would be a good conversation starter and a thought-provoking way to rethink one's teaching practice and learning design.

Yes it can certainly work well in that way as part of a workshop.

Myth: Online teaching and learning is simply an acute adjustment, something for this pandemic moment. Fact: Those that consider this as long term opportunity, and invest in time to work on designs and materials and new delivery approaches will fare much better in the long term (as will our institution). PD has a stigma and stink, but let's promote

Well said. It has never been on a par with research, especially not in top universities, despite various warm words being said. But this is a great opportunity to see the new developments and innovation in teaching as mission to build up our knowledge and expertise, by using as a model

this as a personal investment and learning moment ourselves (as educators). Could promotion and incentive structures support this too as clear signals and visible nudges?

the way we work in science and scholarship on knowledge building. We do know it will be nothing if not collaborative.