

Developing digital literacies for working in a digital world - part two

Kim: script

Learners have a common goal – to succeed through further and higher Education and into the global market. Once this meant attaining a level of academic competence, but today, employers want a diverse range of attributes and skills of which a core element is digital literacy.

Music

2. Helen Beetham

There's a whole range of trends converging on this idea of digital literacy, and I think one of them is absolutely the employability agenda.

3. Simon

Our particular project we think this particular project, the digital literacies programme, is allowing us to develop students who are able to go out and influence the future of their discipline or their employment, because of the things that they can do. The understandings that they bring through digital literacy digital literacy.

5. Kim: script

Hello and welcome to Jisc on Air. I'm Kim Catcheside and in this second part of our focus on Digital Literacies I'll be looking at how a student's digital capability enhances their academic skills and understanding and helps them into employment.

End of music

In colleges and universities around the UK, the curriculum is changing to address the increasing importance of digital literacy for students. Helen Beetham is Synthesis Consultant on the JISC developing Digital Literacies programme.

6. Helen

There are institutions like Leeds Met and Oxford Brooks, and also on the back of their projects I think Plymouth and Greenwich universities that really are seeing digital literacy as a core part of the graduate attributes that they want to promote and that they want to see their graduates emerging with. The qualities that graduates will have coming from those institutions need to include digital capability. Around that strategic push there is beginning to be what I think is required, which is somebody somewhere having an overview of the students' digital experience, from you know pre-entry right the way through to graduation and alumnus status, and I think it's that view of the student experience going through that is lacking in many other universities.

it's not that those people don't care, but it's the question of whether anyone at the university is really taking on that holistic vision of what it means to be a digital learner, and what therefore needs to happen across the institution to support that, and the experience of many learners is quite fragmentary.

7. Kim

Today, there are more students each paying higher fees, each with a different level of digital capability – a real challenge for any college or university. Of course it's important to put students at the centre of their learning, but what does that really mean? Simon Walker is Head of Educational Development at the University of Greenwich.

8. Simon

I think that now we're into a very different type of education. The government is saying put students at the centre of higher education. We think actually it's about putting knowledge at the centre of higher education. And knowledge of course is changing the way in which you access knowledge, the way in which you manipulate knowledge, the way in which you make sense of knowledge with others, and those are no longer just in the single institution or in the single programme.

There's a kind of a shifting pattern towards making sure that university adds value to a student's education by the things that they can do. So these are things about often related to employment, so they're being able to understand what the sorts of things that they will need in order to hit the ground running very very quickly.

So we think their digital literacies are very very important in that respect. Not so much the employers – employers may not understand what that means in their current context. In fact there is evidence of employer-led curriculum which is maybe 20 years out of date so we think this particular project, the digital literacies programme, is allowing us to develop students who are able to go out and influence the future of their discipline or their employment, because of the things that they can do. The understandings that they bring through digital literacy, and I'm not just talking about digital skills here, it's much more than keystrokes, it's about understanding the whole nature of that background.

10. Kim

At the University of Greenwich an ambitious digital literacies project is underway, which is designed to support students through their course and into employment. What the team recognise here is that despite the significant amount of work to support students' transition into Higher Education as well as progression through the course, there is a gap in our understanding of how transition and attainment of graduate attributes is linked to digital literacies. The aim of this project is to develop a model to support digital maturity linked to graduate attribute development.

Dr Mark Kerrigan is the project leader

11. Mark

what we're really focusing on is something called digital literacies in transition. We're very interested in the student's journey. From when they arrive to when they leave, and how we both develop, support, enhance and also learn from students around their digital literacies. So really explore the student's journey in three parts. So the first year we refer to as 'learning to learn', and then we have moving through to eventually being 'understanding professionalism', and then the final year 'a young professional'.

So what we're really exploring is how we can embed digital literacies in the curriculum. How it can support these during the curriculum. And then also during the student's journey they have very key transition points or key moments, either things that go really well or are really scary, or other bits and pieces, and how potentially they can be enhanced or supported by developing digital literacies around those. when they leave university they want to be successful in whatever they're going to do, be it get a job or create their own job, open their own business, whatever it is they want to do. So our role as a university is to help them get to where they want to be.

So from our point our biggest outcome is making sure our university can deliver that, and a big way of doing that is making sure we support and enhance students' digital literacy. So we want to be able to say 'university of Greenwich will support you in reaching whatever you wish to be, and one way of doing this is making sure you are equipped to function digitally in the outside world.

12. Kim

Mark and his team has set up an interdisciplinary student and staff group, which spans the whole university and which aims to engage students at all stages of their journey.

13. Mark

we're working with them developing ideas, understanding what digital literacy versus digital skills means, and how we can embed that in the curriculum support students and staff through their journey and those transition points.

03:18 [K] So in a sense you are using students as a resource in this project. But also really from the outset putting in practice this idea of student as partner in their learning.

[M] definitely. I mean, I'm only 34 years old, but from my point of view it's very easy to get into one very set working pattern, and it's actually fantastic working with students. They don't understand boundaries. They fire brilliant ideas at you from everywhere and the added value of working with students is brilliant.

04:02 [K] can you give me an idea of an unplanned move forward that you've had over the last year.

04:09 [M] Well one of the students who we're working with is very keen on mobile technology, and part of the project wasn't necessarily focusing on digital literacy around mobile devices. He really want so explore that and he actually comes from another country, and he applied to work with us through digital literacies project, and he's moving that strand. We hadn't actually planned to move into mobile, but now that strand of work is developing alongside the other part of the work we are doing. Which is actually quite exciting. And you know, conversations that we have, we ask students to find out what digital literacies meant, and again we have idea as staff what it means, and then the students created their own framework, and we didn't tell them what to create, and getting their understanding and their interpretation of data was very exciting, so they created a framework of understanding DL which we hadn't thought of.

14. Kim

This dynamic, working group at Greenwich University draws on the CAMEL model- collaborative approaches to the management of E Learning and those familiar with this will know that it relies on bringing together differing abilities, a range of skills, and above all the trust that everyone has something to contribute.

15. Rebecca + Kim

My name is Rebecca. I am a second year student of mathematics at Greenwich university. And this year I'm currently involved in inter-disciplinary project focused on the concept of digital literacy in higher education.

00:51 [K] Could you tell me what you understand to be the purpose of the project you're engaged in?

01:01 [R] Basically we are being engaged in this project to help the university with their concept of digital literacy, so helping like student in their understanding of digital literacy, and in their transition point when they come to university so on, they start university, and to help staff as well with the concept of digital literacy and in the role of mentor for digital literacy.

01:32 [K] And what does the work actually involve?

01:35 [R] The work is divided in various parts, so at the beginning we start having some discussion with teachers about digital literacy, to understand ourselves the concept of digital literacy. Then we actually engage students proposing them to complete the survey, and we analyse the data of the survey, so we went through all the definitions students gave of digital literacy and the definitions they gave of a digital person. And now we will start a part of active research and we will produce a material for students in their [?] transition points in digital literacy.

16. Kim

Not only is Rebecca a valuable member of the research group, but her role has helped to build her digital literacy. Engaging and motivating students to develop their own digital literacies is proving valuable and goes some way to addressing equal access. Rebecca.

17. Rebecca

I didn't use use to use the computer a lot the computer before, in my high school, especially because in Italy we are not that advanced with technologies. I didn't use to use a lot the computer and a lot of programmes. When I came to university I start using the computer every day and now I spend all day on the computer and I use a lot of

I think my perspective...

on this field has changed a lot since working on this project. And I completely saw different things that I will never thought about before, and it's been brilliant.

18. Kim

The collaborative role students are playing with feeding in ideas and research into the project, is proving valuable. Daniel Speek, the innovative student from Holland that Mark mentioned, is absorbed in researching touch screen technology – in this case an iPad, to find out the potential for useful data sharing in the lab. His interest is in how digital technology can support student AND professional lab work.

19. Daniel

the reason it's interesting to use technology in the lab is because there's some potential benefits, and especially concerning two things. So there's one just purely a time benefit, so if you enter your data on a computer you don't have to transcribe this into a computer later from

paper, and also there's this issue of collaboration. A lot of labs are done with several people, to do a lab report together, and if you have all your data on paper, all your documents on paper, then there's very little chances for collaboration, and nowadays you have online documents. A lot of people refer to this as 'the cloud' and so you can have your documents on the internet, and everybody can be editing these at the same time. Now this gets even more interesting when let's say you have a class with ten lab groups and a teacher. The teacher can actually have access to all of those lab documents, so the teacher can very easily see just by clicking a screen on a computer what all their students are up to. Of course because it's digital you can have functionality, such as looking back on the edits that are made on the document, so a teacher can actually if he has the time and wants to look at how the students made their final product can actually see the process that students went to in making their product, and this is only possible when you have this in a digital form. When you have a piece of paper, I mean of course it's abit more one-dimensional.

20. Kim

Here at Greenwich, the team is building on student familiarity with social media or crowd sourcing tools to enhance the learning experience all around.

21. Simon

At Greenwich that students are bringing a number of different mobile devices on so they may have a laptop, they may have a tablet, they may have a smart phone of some kind, and they're using those in different ways. Of course, if you've got a mobile infrastructure those students are using those in the lecture theatre as well. So you make it maybe getting a lecturer who is using data which may be out of date, and students are then able to check that in real time. And have some sort of contest with the lecturer around that. Alternatively, you could have a lecturer who is brought into the whole idea about using technology in their teaching, in that not only their

07:05 [S] where they may be studying a problem on the board and they're asking those students to go and crowdsource, i.e. to use their devices to go and find the answers to those things. So there may be some activity inside the lecture theatre. In fact we're now talking about distance learning as being someone who's stuck at the back of a lecture theatre trying to listen to someone they can hardly see, or hardly hear, in the front of a lecture theatre. Because the whole idea of learning now with technology means that learning is under your control, it's brought right to your place, you can enlarge your screen, you can turn the volume up, so actually there's – our approach and our position with knowledge and learning has become a changed model I think over the last 20years.

22. Kim

Helping students to learn how to learn is a key feature of the programme and means making important changes to the curriculum at the outset – these days, there is more to introducing a student to a course than showing them the library or handing them a

reading list. In fact the teams here see course content as secondary to helping a student develop critical thinking for learning and working in a digital society.

23. Mark

we want to make the curriculum far more agile, far more responsive to the changing world. The world doesn't wait five years for a change and nor should the curriculum. And also what we want to do, employers are saying students need to deliver this to us, and this, they need to have these sorts of attributes and literacies. So one of the things that we're looking at doing is actually getting employer feedback directly into the curriculum and then make it far more agile.

employers or people who interact with our graduates can then feed back to the university anonymously, and not saying so and so can do X, Y or Z. And just so we get an idea of how our graduates are functioning when they leave university, and if there are some positives or negatives we can feed that back into the curriculum much earlier, much quicker, to make sure that is actually adapted and changed. From our point of view it's important to be able to demonstrate to the students that we do know what's going on in the outside world. We're not locked in the university, we're university part of a community, part of a much bigger picture, and that is represented in how the students learn and what they do.

24. Kim

How we foster digital capabilities in students and graduates is vital to what they can offer to society and to an economy that is increasingly digital – in further and higher Education today, and for the wider world tomorrow. Helen Beetham

25. Helen

I've got a really nice example from the university of Exeter where we've been interviewing postgraduate students about how use technology, and we've found that data capture is one way that they're really pushing their own research teams forward, that they're really pioneering approaches, and several postgraduates we've spoken to are collecting data in the field, in context where that data can actually put people's lives at risk, so talking about interviews with people in warzones and in other sensitive areas. And what those postgraduates have developed is a set of skills around managing data in devices in the cloud, so for example they'll upload data to the cloud, wipe devices clean to cross borders so that nothing around about their person can jeopardise them or the people they've interviewed, and making that data available to themselves again when they get back to university. Now university is giving those postgraduates an academic context in which the evidence they're collecting from the field can speak, can be heard, can have an impact. But the skills that they have to make that data collectible they've acquired themselves, often by sharing with other people doing similar tasks. So to me that's an example of where digital capability and academic knowhow and academic practice come together in an incredibly **productive way**.

26. Kim

If you would like more information or support in developing digital literacies of students and staff in your institution, please visit www.jisc.ac.uk/developingdigitalliteracies