What makes effective online learning?

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Four MOOCs:

1. Let's Teach Computing

Course content: https://openeducation.blackboard.com/mooc-catalog/myCourses?tab_tab_group_id=_12_1

Online Community: https://plus.google.com/communities/112335386477156503633

2. Teaching with Tablets

Course content: https://openeducation.blackboard.com/mooc-catalog/myCourses?tab_tab_group_id=_12_1

Online Community: https://plus.google.com/communities/108510780639510097712

3. Technology Outdoors

Course content: http://dlaberasmus.eu/courses/stem-steam-online-course

Online Community: https://plus.google.com/u/0/communities/117458443566280105364

4. STEM to STEAM

June 2018: http://dlaberasmus.eu/courses/stem-steam-online-course/

Papers:

Smith, N., Caldwell, H., Richards, M., and Bandara, A., 2017. A comparison of MOOC development and delivery approaches. *The International Journal of Information and Learning Technology*, 34(2), pp.152-164

Caldwell, H. and Heaton, R. (2016). The interdisciplinary use of blogs and online communities in higher education. *The International Journal of Information and Learning Technology (IJILT)* 33(3) p2056-4880.

Caldwell, H. and Smith, N. (2017). The online learning hive: transfer to practice within a MOOC community of educators. *The International Conference on Information Communication Technologies in Education (ICICTE 2017) Proceedings, Southampton Solent University.*

Comparison

Learndash
Wordpress
Embedded Google Docs
Padlets
Google +
iMovie
Green screening
Zeemaps
Twitterchats
Webinars
Digital badges
Blackboard Open Education

MOOC	Registrations	Active online community members	Number of countries involved	Technologies used	Teaching strategies
Let's Teach Computing	406	169	N/A	Blackboard Open Education Google+ Digital badges	Content based on a book
Teaching with Tablets	570	273	28	Blackboard Open Education Google+ Digital badges and certificates	Content based on a book e-tivities
Technology Outdoors	497	224	27	Word Press Google+	Content based on the activities of the project community

Hybrid small scale MOOCs

- Targeted at a niche audience
- Based on project dissemination
- Pedagogic flexibility
- Structured connectivist approach
- Has a life cycle: a cohort talking, reflecting and doing (participation and reification) (Wenger)
- Shared pace and mutual engagement

Measures of success:

- Evidence of change
- Transfer to practice (Or of intent) Or beliefs?
- Quality of community relationships
- Personalised experience
- Sustained debate

Structure

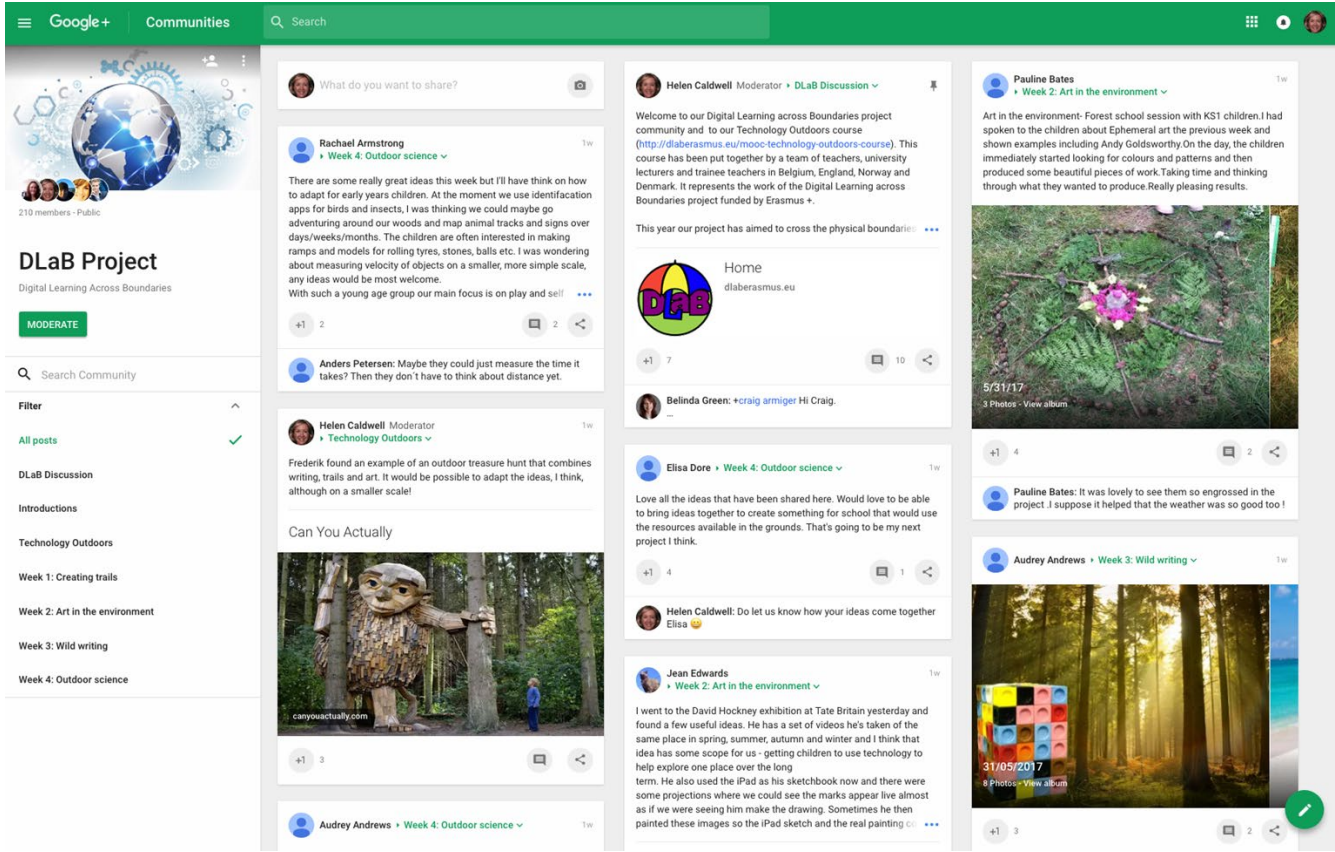
The Technology Outdoors MOOC was multi-modal in both the way content was shared as well as within the material produced and shared by participants. This sets it apart from the other online MOOCs currently available. The visual nature of digital artefacts both drew in and inspired other participants resulting in a community of practice developing quickly for a core group of users.

Course Navigation

- Section 1: Creating Trails
  - A: See and Think – Unit 1: Newscasts
  - A: See and Think – Unit 2: Spare time activities
  - A: See and Think – Unit 3: Hacking Nature
  - A: See and Think – Unit 4: Outdoor games
  - A: See and Think – Unit 5: Mapping Nature - Bird Marking
  - B: Reflect
  - C: Share
- Section 2: Art in the Environment
- Section 3: Wild Writing
- Section 4: Science Outdoors

COMMUNITY

A Google + community gave us a visual platform for reflecting and sharing ideas prompted by the course materials and a forum for discussions on the weekly themes.



Link to the online community: https://plus.google.com/u/0/communities/117458443566280105364

Examples from practice: DLaB

Talking and doing

Steve Tipton ▸ **DLaB Project** 3w

Delayed my create/reflect for week 2 because I knew we had a trip to the local park with reception class. I discussed with class teacher using Unit 2 'Exploring Art Vocabulary'. She was delighted to help out and we agreed to use our iPods because the children are familiar with them, for smaller children we find them ideal. We decided on colour, texture and shape for our vocabulary.
We set off to the park in our school minibus in the pouring rain but our spirits were not dampened, when we arrived we had to change our plans and rather than exploring outside decided to visit the butterfly house. Once inside we explained to the children we wanted them to take pictures of different textures, colours and shapes. The children needed very little help and fully engaged with the task as we walked round I was amazed how using the cameras made the children so much more focused and their concentration level was a delight to observe.
After lunch the weather improved and we repeated the lesson in the garden area where the children found many more items to photograph.
22 children sharing 8 iPods managed to take 800 pictures without this focus this would have been just another walk in the park and the best thing is we get to do it again on Thursday with Class 2.
I have attached a few examples but also plan to let the children make some collages during their next IT lesson.
Thanks for great ideas, Steve

Sue Pownall, artist & illustrator +1
It's great to read and see how inspired the children were with this exercise. Enjoy Thursday too.

Katie Mason +1
That sounds fantastic and the photos are brilliant too. I chuckled slightly at the amount of photos taken...young children are quite snap happy!

Steve Tipton
"Tell me and I forget. Teach me and I remember. Involve me and I learn" Benjamin Franklin

Ian Pilkington +1
Wonderful! The outcomes speak for themselves, not just in the engagement but the stunning imagery. These would look brilliant enlarged as canvas prints and placed around school What an inspiration to the older kids!!

Jean Edwards
These are great, thanks for sharing them! When I did this with my adult students they were very snap happy too: its good in that it makes them evaluate later and make choices maybe! Great idea to print them out and display them too.

Jean Edwards +1
Looking at the album I was thinking it would be good to remake them in drawing, painting, printing or collage as big abstracts perhaps?

Helen Caldwell Moderator
Such lovely textures! I agree they would be fantastic enlarged as canvases or collages, or used as an inspiration for physical artwork. 800 photos!

Jean Edwards
I was stuck for drawing ideas this evening, so I used your pic collage as inspiration!

Steve Tipton
That's amazing, I can't draw for toffee!

Jean Edwards +1
Don't feel you can't draw - it might be that you haven't found a way into it that suits you yet! Producing a realistic representation of something is only one aspect of drawing, and we tend to give too much importance.

Chantelle James
I love this idea! The pictures are brilliant and from this could be used further (as you said) within the classroom as a basis for IT, Art or a stimulus for English.

PHYSICAL AND DIGITAL

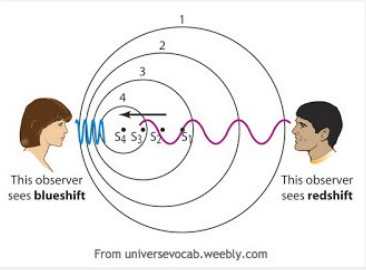
Monday, May 29, 2017

Technology Outdoors: Week 4 Science Outdoors.

Redshift Swan ©Sue Pownall 2017

As an art teacher to adult students, I was dubious about what this last week could bring in terms of personal inspiration and for my classes.
Unit 2 reintroduced me to the Doppler Effect, which I had forgotten, and continued with RedShift, which I don't recall having ever learnt. However, as I studied physics back in the dark ages, including Einstein's theory of relativity, I assume I must have.

Finishing the unit, I bounced around the internet reading more on this. I liked the simplicity of the illustration below, and found space.com a good site for info, but nasa.gov was a bit complex.



From universevocab.weebly.com

Apart from spending a long time surfing, I continued my exploration of the weekly ideas through my dog walks and took a Doppler effect photo.

Dogwalk Double Doppler Effect

This would not be an image to share with young learners, but from an artistic viewpoint the resulting patterns of colour and light as the cygnets swim towards the swan and she swims towards them could be the beginning of some printmaking patterns. In fact, I have been playing with monoprints based on Redshift and Doppler Effect, here are some of them.

Variations on a theme. ©Sue Pownall 2017

I am sad that this is the last week of the DLabErasmus course, but have an idea to develop the dogwalk images I have created for it.

Sam Rutsaert +1
Great how an artist can take some inspiration from 'non-art-things'. This could even be something you could do in a STEAM lesson.

Sue Pownall, artist & illustrator
+Sam Rutsaert what's a STEAM lesson?

Sam Rutsaert +1
STEAM is an extension of STEM. STEM stands for science, technology, engineering and mathematics. This is all about integrating all of these fields in a problem-solving situation.
STEAM is when you add the Arts component in it, the theme of the DLaB project next year actually is 'STEM to STEAM', so if you're interested you can definitely learn more then ☺

Sam Rutsaert
This short video explains it pretty well:
https://youtu.be/vSAXJCPC5C4

Barbara van Duijne
This is great imaging, I am intrigued by exactly how you created these images. I think I have my own personal summer project to work on. Thank you

Sue Pownall, artist & illustrator +1
+Sam Rutsaert Thanks Sam. I like this idea of integrating the various fields.

Sam Rutsaert +1
It's a great way to motivate the pupils more and simulate situations they might face later in the work field

Sue Pownall, artist & illustrator
+Barbara van Duijne Thanks Barbara. I used a Gelliplate with acrylic paints. I created a pattern on the plate with some textured wallpaper, which I then printed on textured paper. Once dried, I stencilled the swan (I made the stencil by cutting into a plastic sheet), then finally painted on top.

Examples from practice: DLaB

Sharing practice

Sharing previous practice

‘I have already posted some work done
earlier this year on Google+ and feel that my current practice sits very well alongside the Virtual Sculptures case study.’

Sharing actual practice

‘My year 1 children loved this activity.’

‘I set a small group a challenge of...creating 3D models in our local environment.
This is what they came up with.’

Sharing intention to practice

‘I will be checking out Sculptris and Meshmixer and will report back.’

‘Plan is to take the models outside and photograph them in 'real' places. Green screen could be another good plan too.’

Responding to the MOOC content

‘Nightingale Class have been exploring Surrealism...they have begun to use green screen imaging to place their trees in a range of settings both real and imaginary.’

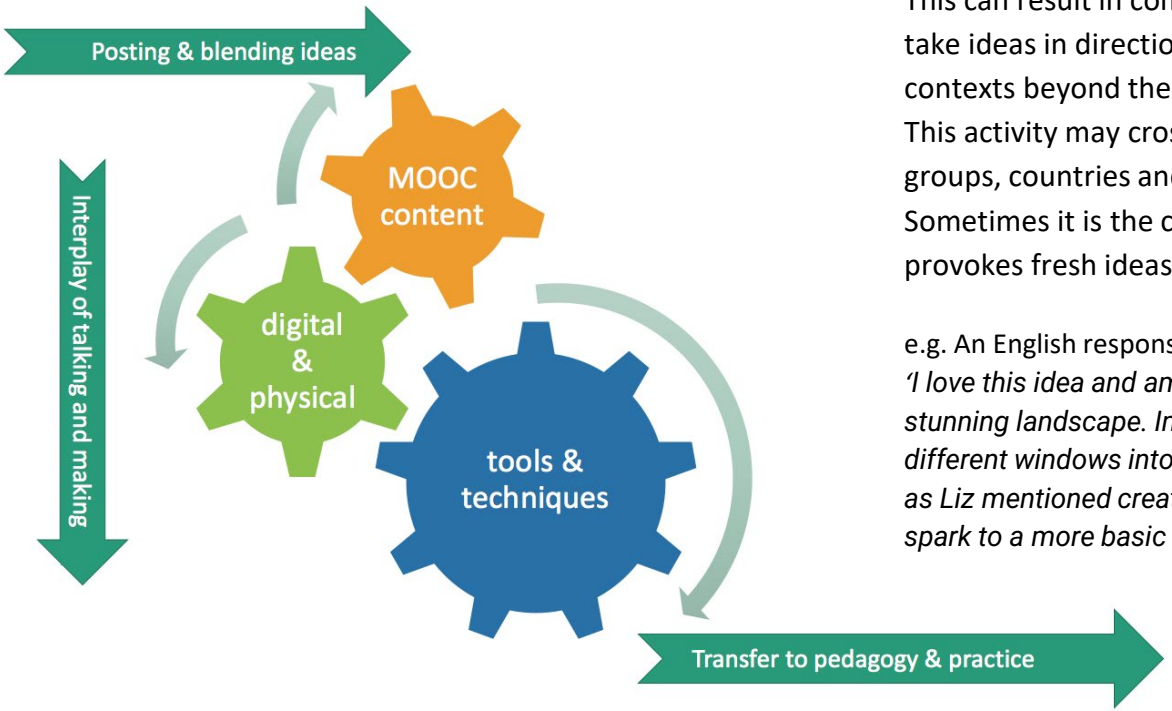
Responding to the Post content

‘Wow! 👏👍 Great pictures+idea! 😊 I will certainly try GIMP!’

‘Excellent idea, I am going to look into this one and give it a go’.

‘Love the creativity of your Y6s, Ian. Will share their work with our Y4s as it may encourage them to continue exploring surrealism.’

LEARNING PROCESS



Visual posts can act as anchors for talking and making within online communities.
They prompt participants to collectively explore practical tools and techniques in the physical and digital spheres, and then relate them to pedagogical approaches and beliefs.
This can result in complex and rich seams of learning that take ideas in directions across different educational contexts beyond the original course content.
This activity may cross boundaries of subject areas, age groups, countries and cultures.
Sometimes it is the crossing of such boundaries that provokes fresh ideas and insights:

e.g. An English response to a post of skiers in Norway:
'I love this idea and am wondering how it would work with a less stunning landscape. In my mind I am thinking of a range of different windows into the play that goes on in the playground or as Liz mentioned creating the peculiar - that would maybe add a spark to a more basic background.'

Lessons learned

- Transfer to practice is often a complex process that is dependent on cycles of action, reflection and peer appreciation.
- Importance of the human factor: nurture the community and respond quickly.
- Allow members to get to know each other and build an atmosphere of non-competitiveness and interpersonal trust based on mutual appreciation.
- Low level comments are often a precursor to more purposeful participation.
- There is an interplay of three dualities in the online communities: ‘digital and physical’, ‘personal and collective’, and ‘talking and making’.

Knowledge creation in an online community is an iterative process that involves multiple and reciprocal interactions with content and others. Reciprocity in online communities leads to satisfaction, which in turn enhances knowledge self-efficacy and furthers intentions to continue sharing knowledge (Cheung et al., 2013).

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