Disentangling ideas: How is the global studies classroom a place of entanglement

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What is disentanglement?

Remove knots or tangles from (wool, rope, or hair)
extricate implies the use of care or ingenuity in freeing from a difficult position or situation
Before something can be disentangled there has to be entanglement…

…Hmm.
What is entanglement?

The action or fact of entangling or being entangled.
How do we consider entanglement and disentanglement?

- Chaotic
- Complex
- Interdependent
- Rhizomatic
- Ideological
- Political
- Social
- Economic
- Discursive
- Knowledge-based
- Organic and Artificial
Entanglement: Huh? What?

Oxman coined the term ‘material ecology’ to an emerging field in design denoting informed relations between products, buildings, systems, and their environment (Oxman, 2010).

“‘Quantum entanglement’ denotes the moment a few or more particles interrelate such that the quantum state of any particle cannot be described alone, only all the particles en masse. If Enlightenment was the salad, Entanglement is the soup. In the Age of Entanglement it becomes impossible to discern one ingredient from another. Taxonomies are defunct; disciplinary walls dissolve...all silos coalesce (back) into the Pangea of information.”

(Oxman, 2016; p. 9)
Entanglement: Huh? What?

Schrödinger coined the term ‘entanglement’ to describe this peculiar connection between quantum systems

“When two systems, of which we know the states by their respective representatives, enter into temporary physical interaction due to known forces between them, and when after a time of mutual influence the systems separate again, then they can no longer be described in the same way as before, viz. by endowing each of them with a representative of its own. I would not call that one but rather the characteristic trait of quantum mechanics, the one that enforces its entire departure from classical lines of thought. By the interaction the two representatives [the quantum states] have become entangled.”

(Schrödinger, 1935; p. 555)
Entanglement: Huh? What?

Hillis (2010, 2016) described the ‘Age of Entanglement’ and characterized our contemporary epoch.

“We humans are changing. We have become so intertwined with what we have created that we are no longer separate from it. We have outgrown the distinction between the natural and the artificial. We are what we make. We are our thoughts, whether they are created by our neurons, by our electronically augmented minds, by our technologically mediated social interactions, or by our machines themselves. We are our bodies, whether they are born in womb or test tube, our genes inherited or designed, organs augmented, repaired, transplanted, or manufactured. Our prosthetic enhancements are as simple as contact lenses and tattoos and as complex as robotic limbs and search engines.
Entanglement: Huh?

Hillis (2010, 2016) described the ‘Age of Entanglement’ and characterized our contemporary epoch. They are both functional and aesthetic. We are our perceptions, whether they are through our eyes and ears or our sensory-fused hyper-spectral sensors, processed as much by computers as by our own cortex. We are our institutions, cooperating super-organisms, entangled amalgams of people and machines with super-human intelligence, processing, sensing, deciding, acting. Our home planet is inhabited by both engineered organisms and evolved machines. Our very atmosphere is the emergent creation of forests, farms and factories. Empowered by the tools of the Enlightenment, connected by networked flows of freight and fuel and finance, by information and ideas, we are becoming something new. We are at the dawn of the Age of Entanglement.”

(Hillis, 2016)
What if we think of the global studies classroom in relation to entanglement?

What about the soup and what about the salad?
What affordances are provided by thinking about entanglement and disentanglement in relation to global studies?

• Ideas
• Knowledge
• Ideologies
• Discourses
Loops of entanglement and disentanglement
Entanglement and Global Studies

At present, one must acknowledge the changes taking place throughout the world.

Our transformation has extensive reaches that will impact most communities on our planet and the inhabitants.

Global studies for global competence is essential for success in the contemporary age.
Entanglement and Global Studies

“My aim in developing such a diffractive methodology is to provide a transdisciplinary approach that remains rigorously attentive to important details of specialized arguments within a given field, in an effort to foster constructive engagements across (and a reworking of) disciplinary boundaries. In particular, this approach provides important theoretical tools needed to move conversations in science studies, feminist studies, and other (inter)disciplinary studies beyond the mere acknowledgment that both material and discursive, and natural and cultural, factors play a role in knowledge production by examining how these factors work together, and how conceptions of materiality, social practice, nature, and discourse must change to accommodate their mutual involvement. I also show that this method is sufficiently robust to build meaningful conversations between the sciences and other areas of study and to contribute to scientific research.”

(Barad, 2007, p. 25)
The Global Issues: Citizenship and Sustainability course was developed to position students within contexts of knowledge, skills, attitudes, and values where students, “develop community-based action-research projects that match learners’ interests to current social, political, environmental, and economic affairs”

(Kornelson, 2017, p. 18)
Global Competence

The OECD (2016) document, “Global Competence for an Inclusive World” defines global competence (GC) as:

“the capacity to analyse global and intercultural issues critically and from multiple perspectives, to understand how differences affect perceptions, judgements, and ideas of self and others, and to engage in open, appropriate and effective interactions with others from different backgrounds on the same basis of shared respect for human dignity” (p. 4).

(OECD, 2016, p. 4)
Global Competence

The concept includes the following capacities:

• acquisition of in-depth knowledge
• understanding of global and intercultural issues
• abilities to learn from and live with people from diverse backgrounds
• attitudes and values necessary to interact respectfully with others

(OECD, 2016, p. 1)
Global Competence

The driving ideas include:

• global trends are complex and require careful investigation
• cross-cultural engagement should balance clear communication with sensitivity to multiple perspectives
• global competence should equip young people not just to understand but to act.

(OECD, 2016, p. 1)
Global Competence

- OECD (2016) described a broad range of elements and more specifically focused upon the development and support of globally competent in learners
- Provided framework to guide and shape learning for 2030
Disentanglement in the Classroom

The theoretical underpinning for this presentation are grounded in the following contexts and qualitative action-research methods:

- Professional Knowledge Landscapes (Clandinin & Connelly, 1996)
- Action-research (Kemmis, 2009)
- Self-Study (Robbin & Sarkany, 2017)
- Narrative Inquiry (Schnee, 2009)
- Practitioner-Inquiry (Cochran-Smith & Lytle, 2004)
Disentanglement as a Pedagogical Approach

Artifactual Literacy of teaching and learning (Pahl & Rowsell, 2011) such as:
memoirs, written and spoken reflections, journals, images, blogs, podcasts, paintings, sculpture, concrete casts, collage, discussions, fusion texts (Evans, 2013), and interviews
Disentanglement as an opportunity for transformation where individuals share experiences, thoughts, and knowledge in a manner of which Bhabha (1994) describes as “third spaces” (p. 2) where individuals re-envision, re-imagine, and hybridize elements of culture and identities of self and other, and co-create knowledge (Berger & Luckmann, 1996; Vygotsky, 1933)
Guiding Questions for GC that may be satisfied by Disentanglement

• How well are students prepared for life and employment in culturally diverse societies and in a globalized world?
• How much are students exposed to global news and how do they understand and critically analyse intercultural and global issues?

(OECD, 2016, p. 3)
Guiding Questions for GC that may be satisfied by Disentanglement

• What are the salient divides in the population in terms of global competence?
• What approaches to multicultural, intercultural, and global education are used at school?
• What approaches are used to stimulate peer-to-peer learning between students from difference cultures?

(OECD, 2016, p. 3)
Guiding Questions for GC that may be satisfied by Disentanglement

- What approaches are used to educate culturally diverse students and how are schools leveraging this diversity to develop students’ global competence?

- How well are schools contesting cultural and gender biases and stereotypes, including their own?

(OECD, 2016, p. 3)
Let’s Practice Disentangling, just a bit…

“M.” a GICS student wrote,

“Presently, I think our society is neglecting our conscious and unconscious mind. We ask less questions and prefer being told what to do and how to live life. In my opinion more and more youth are abandoning their creativity, emotion and thought process and using electronics as a substitution. Kids no longer imagine because technology does it for them.”

What is said in the student’s writing in relation to Barad (2007) “discourse and materiality” (p. 5)?

How does thought entangled with the lived experiences of the student, the telling of their ideas and narrative, and what does this mean in relation to the actions they pursue for the greater good?
Let’s Practice Disentangling, just a bit…

A student named “B.” stated:

“People are more flexible with their rights and many people speak for what they believe in and social media has had an impact for people looking to put thoughts out there… The 21st century generation is learning to adapt to new things such as laws, human rights and sexuality which I think is important to move successful throughout life.”

This student shares about their world view. This sample is one of many that capture ideas, knowledge, ideologies, and discourses that instantiate identity.

Each piece of reflexive writing is a powerful statement of self, other, and world.

What affordances do artifacts such as these help learners and teacher to know about themselves and one another?
Understanding Entanglement and Disentanglement…

Enables learner and teacher considerations to be based upon understandings of an approach that offers affordances and opportunities to know powerful understandings of self, other, and world.

These understandings set teachers and learners forward upon trajectories of complex and entangled journeys of teaching and learning for GC and transformative change.

Supports the conceptualization that teaching and learning within the global studies classroom may be discursive in nature, but the powerful nature of entanglement places experiences within contexts that are discursive and material.

The learners and teachers within the global studies classroom are entangled within epistemological and ontological systems that characterize real and lived experiences as well as identity and thought.
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Bibliography


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