



Understanding curriculum as geo/biospheric text

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Abstract The world is experiencing crises related to the cascading effects of anthropization. These crises result from imperialist and capitalist practices that categorize and exploit the other (e.g., the land, the water, and their resources and beings) for maximizing profit. Such malpractices have led to climate crises of drought, famine, and extinctions. In the present, things are categorized through detachment, whereby the self-absorbed hyperbolic sees greatness in being and acting in meager ways, in nationalism and populism. In the midst of experiencing such a world of isms, this article suggests an important change for education—a curricular adjustment that not only allows for addressing subject matter (i.e., health and economics) and the subjects of such matters (i.e., the students and the teachers in the classrooms) but also acknowledges the importance of the other (i.e., the non-human world), which has been at the mercy of a singular reliance on the “incomplete” human consciousness. An inclusive curriculum underscores the different forms of concrete conscious beings and is mindful of a togetherness that ensures the continuation of life. “Event-ually”, through highlighting each individual with the natural environment, the latent bonds each individual has with the other and another, and with the world itself, will expose themselves in new ways.

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Contextual: Method, methodology, and framework

Through discourse, we free ourselves from the thrusts of an economically driven technocratic world that Aoki described, according to Heidegger (1977), as “rooted in man’s interest in means, reflects his will to master, to control, and to manipulate” (Aoki 1999, p. 153). Realizing the power of such a worldview, and also understanding that “humans are tuned for relationship” (Abram 1996, p. ix), we begin a study that focuses on the worlds of within, through which we reveal the meanings of our own experiences to the world. By doing so, we hope to express a fresh connection in and with the world. After visiting our past and collecting our data, we reflect on the experiences that formed who we are today, while staying open to what those experiences may reveal for the future. We do all this through a different version of “the method of *currere*” (Pinar 1975), which follows the four phases of “regressive—progressive—analytical—synthetical” (p. 19). Nonetheless, the way we forge is different from *currere* in its focus; *currere*’s focal point has always been on the ongoing study of the social and subjective (Pinar 2015, p. 189), whereas the central themes here are natural, subjective, and relational. There is no doubt that, as individuals who have experienced different private and public lives, we represent distinct worldviews. Acknowledging these differences may not only draw attention to the diversity of our understandings but also keep us conscious that our subjectivity is conditioned through the familial and social environments we have experienced. To make our experiences distinct, we present this article in an episodic format, through which each of us opens space for the others to describe, express, and analyze our own experiences and interests. The disclosure of our shared perspectives, however, may reveal the commonality that holds our worlds together.

My (Sandra’s) wonder is lived through Rachel Carson’s *The Sense of Wonder* (1998): “If a child is to keep his inborn sense of wonder, he needs the companionship of at least one adult who can share it, rediscovering with him the joy, excitement and mystery of the world we live in” (p. 30). For me, wonder is realized within my own journey of companionship and connection with the natural world, where the adult companion takes the form of nature, in an interweaving of learning in nature, learning from nature, and nature as master teacher. Wonder became my constant companion as I journeyed the sandbars and tide pools and wandered forest trails surrounded by the flying, feathered, and finned. I understand these connections to the more than human (Abram 1997) as Kimmerer (2017) invited us to do. They are our *ki* and *kin*, our relatives, our relations, and as David Jardine (1998) acknowledged, “we are as much their relations as they are ours” (p. 96). I came to know and live wonder through relationships above, below, between, and among the tides, seas, and skies. These contexts offered and shaped significant life experiences, which inspired and informed my connection, caring, and love for backyard places. Significant life experiences take many forms. Guided by Rachel Carson’s *The Sense of Wonder* (Carson 1998), inspired by Aldo Leopold’s (1949) dying wolf in *Green Fire*, and lived alongside Greg Cajete (1994) in *Look to the Mountain*, they are uniquely mine.

Today I draw upon these experiences through story and the telling of those stories. My ecological autobiography has become a way to share my love for the natural world, and in today’s world of crises, a way to assuage ecological grief and to warn of the extinction of experience as those same places diminish, disappear, and die. My stories tell of special and much-loved places where each time I return, I feel as David Jardine (1998) did in *Birding Lessons*: “This place itself has remembered what I have forgotten,

my own memory, my raising, and some of my own life is stored up in these trees for safe keeping” (p. 92). Trees hold our collective stories.

As someone (Fay) who has lived life in many different parts of the world—in particular, and for most of the time, in two places—and as a student of and a prospective educator in curriculum studies, what has always interested me is the world itself, its beings, and the interrelations among them all. Here, I highlight some of my experiences of these two places, each of which represents a distinct cultural, temporal, and geographical situatedness, and which I term the *old* and the *new* worlds. These experiences, of course, represent both the historical and the natural worlds. Some of the experiences mentioned here are embedded in my childhood and some years of my youth, while others belong to the other parts of my youth, and yet others stretch to the present. Hence, the terms of *old* and *new* also refer to conventional time.

The many parts of one’s life—the events, the existential times involved in the journey, the other time, the conventional, and the places experienced—reveal the complexity of one’s dialogue as well as the world. The intricacy of this study indicates that it does not echo “a logical” continuity (Pinar 1975, p. 20), which is represented through a narrow and linear abstract world, but its “point of coherence is the biography as it is lived: the *lebenswelt*” (p. 20). The latter admission places this exploration in the context of a concrete world and existential framework. The focus on “human perception, and experience” in and with the world and consequent “descriptions of such perceptions” discloses the phenomenological/hermeneutical methodology of this study (Willis 1991, as cited in Pinar et al. 1995, p. 405). In other words, this study presents a “rigorous effort to understand experience profoundly and authentically” (p. 405). In addition, according to Jaspers, language “is the means by which transcendence communicates with Existenz, appeals to Existenz” (Young-Bruhl 1981, p. 106). What are the motivational purposes for this search, one may ask?

The challenges of the climate crises caused by imperialist and capitalist practices; the atrocities and wars leading to mass migrations; the rise of nationalism and populism in the world; the ongoing malpractices of humanity; and to top them all, the presence of the Covid-19 virus (which regardless of its origin and causes, is related to human theories and practices) are only a few of the occurrences that have heightened confusion and thus ignited this study. Witnessing all these challenges and linking them with the persons we are, we ask, “What curricular understandings may appear from our complex experiences with the natural world and the bond we have already detected between humans’ and non-humans’ existence?”

These present uncertainties require us, as MacDonald et al. (1996) noted, to have “a different reading of history” that helps to “make sense of our contemporary world” (p. 73). In this re-conceptualizing, although each of our experiences may have commonalities with the others, we have to mention that each experience is only *empirical* for the specific, as Jaspers (2010, p. 241) explained. Moreover, no matter how capable we are at narrating our experiences and reflecting on them, we should have full awareness that we are unable to express them adequately and fully (Rilke 2004, p. 15). There is this understanding that life is complex and it cannot be tamed and placed on a piece of paper, nor can it be presented in some room somewhere at the university.

Moreover, since the experiences and the reflections are all of or by humans, the perspectives here are not “de-anthropocentricize[d]” (Weston 2009, p. 110) in any form or shape. Thus, in the “breaking the spell of actual” (p. 110), not for the purpose of following “some already-theorized or theorizable post-anthropocentric alternative, but precisely in the service of *finding our*” (p. 110) own possibilities, while realizing that the understanding (i.e., metaphorically and literally) here is on the ground of *regeneration*, the Earth. This latter

realization, once again, makes “natality” (Arendt 1958, p. 9)—which signals the existence of different forms in the world and reconceptualization in education—the central theme for this text. Finally, within the capacity of togetherness, while pondering on “the key curriculum” question (Pinar 2012, p. 57), the suggestion is to extend the concepts of reparation, reciprocity, and responsiveness to the world of non-humans as well.

Historical

Ocean, a body of bodies

Marine explorer and ecologist Jacques Yves Cousteau captures my (Sandra) relationship with the ocean in his words “The Sea, once it casts its spell, holds us in its net of wonder forever” (Yaccarino 2009, p. 6). This wondrous remembering and reflexing of ocean experience is embodied in my connection with the crab, specifically the Dungeness crab of the Salish Sea. I spent every spring and summer of my youth traveling on sandbars and exploring thriving communities of tide pools, which were home to an array of intertidal beings, including many species of crab. Late spring was a precarious and quite wonderful time. The extremes of the vernal equinox brought low tides, and the quickly receding waters exposed all kinds of intertidal life to visitors and predators alike.

We were always on the lookout for crabs, sometimes for dinner but mostly because we were interested in their lives. I vividly remember wading into tide pools and experiencing the thrill and wonder of catching a glimpse of the orange brown carapace of a Dungeness crab, claws and legs at the ready, riding the outgoing tide. I watched and wondered as they sped swiftly through the shallowing waters in search of the solace and safety of sheltering beds of eel grass. Here they would hunker down, dig in, and disappear within a bivouac of sand, with only eye stocks and filter feeding mouthparts barely visible to the world.

In spring, we often discovered two crabs locked in a battle embrace. Thinking of ourselves as saviours, we separated the two, “liberating” the smaller crab from the oppressor’s hold. After many such rescue missions, we began to notice the larger crab was always a male and the smaller individual a female. Upon further observations, conversations, and the eventual study of crab taxonomy via field guides, we discovered the two crabs were not fighting. They were mating, and the male was cradling the female to protect her vulnerably soft, recently moulted body. Hence our well-intentioned but *misguided* actions led to separation and loss for the crab—an extinction of life that would have begun in the swirling plankton mass, home to the multitude of species who feed, sustain, and nurture the ocean realm. Lives ended before they began.

When I remember those crabs I prevented from coming into existence, and those I placed in harm’s way, I now act with responsibility and reciprocity. Today when I traverse those same ocean places, I scan the rippled sandbars and shallow tide pools for any stranded and at-risk companions. With great care and alacrity, I transport my charges to deeper, colder waters, where I secret them among the undulating forests of eel grass. There, they remain hidden from predators and safe from the desiccating heat of the sun.

An important part of my connecting through reciprocity and responsibility is no longer characterizing crabs, and all other sea beings, as “seafood”. The term *seafood* is anthropocentric, human-centred language that condones *othering* and allows us to devalue the more-than-human world and self-validate our destroying ways (Abram 1997; Weston 1996). The crab’s sole reason for being is to provide food for us, a relationship based on an extrinsic shallow

ecology (Naess 2008) that prioritizes what the crab can do for us rather than what we can do for the crab. Hence, for me, crab and all aquatic ki and kin are off the menu!

The old world, a thirsty land: Fay

I (Fay) grew up in a small house in the central part of Tehran, with four other siblings and my parents; it was a crowded house, even by the standards of that place and that time. Ironically, within the experienced lack of space, grew the capacity of making room for the others. Although our house was small, we were not allowed to play in public areas, such as streets or alleys. Most of the time, we were sardined with our friends and relatives in a yard smaller than the house itself. It was so chaotic and so loud at times that even as kids we toned down our voices and whispered through our breaths.

As we got older, we thought of playing in the vacant lands, which were called *kharabe* (meaning “small ruin” in Farsi), in the neighborhood. Most of these *kharabe*(s) belonged to the city, so we asked our parents for permission to play in them. Of course, our requests were rejected as soon as they were presented, because these vacant lands were filthy and filled with hazardous debris. After much discussion and debate with my parents, our attention shifted to a piece of vacant land attached to the back of our own house. The *proximity* of the land to our home bore some hope. I remember that the land was bare and dusty; although we monitored it regularly, it was a place in which people occasionally dumped their unwanted items. The double urgency that the land presented and the *familiarity* with it finally crumbled our parents’ resistance, and they allowed us to play there. However, the permission was granted on the ground of some “ifs”: *if* we had the permission of the neighbors to play on the vacant land, *if* we cleaned it, and *if* we maintained the safety of the land. The first if was removed easily since our friends in the neighborhood had similar situations and desires. The second and the third ifs, though, required a great deal of work, discipline, and cooperation. We worked for several days to clean the land and to remove all the things that did not belong there, and soon established that land as a place for the neighborhood kids to play. Next, we set some rules for monitoring the land, so the land would stay free from debris. We needed to fence the land on one side only, because the other three sides already had the walls of the three adjacent houses. As for maintaining our own safety, we sprayed the dusty land with fresh water every time before playing. With that action, the game could begin, and of course that brought us to life. As for the vacant land, the penetration of water into the invisible life running in the veins of its soil revealed its animation through its petrichor.

Over time, the whole family became so attached to that piece of land that my parents purchased it as soon as they could afford to do so. Some time after that investment, a part of the vacant land became a vegetable garden, which the family enjoyed. The land project was for all of us a great achievement, of which, for me, a lasting memory has a *biospheric* (Pinar 2015, p. xiv) characteristic. The connections that existed between the water, the earth, and the air—all of which exposed the invisible life in the vacant land and the bare soil through its petrichor—is an ever-lasting recognition that has acclimatized me to and with the world.

In Skana’s memory: Sandra

Those summer years on the sandbars alongside my (Sandra’s) intertidal ki and kin guided me to research, study, and practice connections with the more-than-human world. My first job was as a marine educator and naturalist at a local aquarium. It was a dream job because

I could share the stories of lifelong companions who illuminated, informed, inspired, and connected me to my life's purpose.

The aquarium's star attraction was Skana, a Southern Resident Orca who, at six years of age, was forever separated from her family to perform for us. She was believed to be from K pod, one of three resident orca pods (i.e., J, K, L) which dwell in the Salish Sea. At first, having the opportunity to share stories alongside the iconic Skana was exciting and uplifting. I was in awe and humbled by her sovereignty. My initial and naive feelings of euphoria soon devolved from wonder to sorrow. I came to understand and directly experience that Skana "was an experiment of *y/our* culture" (Institute for the Humanities 2017, timestamp .33). To narrate Skana's "show", I would cross a small bridge to her pool. She always greeted me with a spy hop. I met her eye as the wondrous black and white form rose effortlessly from the water. She held my gaze, and within, I did not encounter a greeting but rather an anguished plea: "I do not belong here. I do not belong to you". I felt her anger, depression, and the profound grief of hopelessness of a life lost forever. I was a witness to Skana's extinction of experience. We forcibly separated her from her family, displaced her from her home, and took away her language and traditional food. She was denied a life well lived as sister, companion, mother, auntie, and grandmother.

Skana died at the age of 25. She could have lived 100 years, swimming alongside her family. She would have become a matriarch, mother, mentor, and elder to many sons, daughters, nieces, nephews, sisters, and brothers. As a matriarch, she would have led them, counseled them, nurtured them, cared for them, loved them, and been revered and respected all her days as knowledge keeper of the clan.

To honor Skana, I share her story and the stories of her Southern Resident Orca family. My memories of her lived experiences shape, inspire, and challenge my work. In my role as pedagogical witness (Iseke-Barnes 2008; Korteweg and Root 2016), I tell her story so others may learn and wonder. I connect Skana's life to Granny, the iconic matriarch of J pod, whose life spanned more than 100 years. Granny's legacy is what Skana's could and should have been. As matriarch, she was the leader, the elder who held and shared memories of family, home, and histories. She made the decisions about where and with whom to feed, rest, mate, and play. Granny was mother to many and grandmother to all.

With Granny's death in 2016, and no apparent successor to assume the matriarch role, the following questions arose: Who will assume the role of knowledge keeper of the three pods' lived experiences? What is the future of the Southern Resident Orcas and the Salish Sea as matrilineal lines diminish and disappear into great silence? (Saulitis 2014). Decimated Chinook salmon populations, the Southern Residents' preferred food, combined with increasing threats of ocean traffic and military testing and of existing and proposed oil pipelines, as well as the cumulative effects of air, water, and noise pollutants have pushed these unique whales to the edge of extinction. Whale researchers concluded this generation of whales could be the last (Lacy et al. 2017). In the words of researcher Ken Balcomb, who over the past four decades has studied, lived with, and devoted his life to the Southern Resident Orcas "This is what extinction looks like" (Marino 2018, para. 7). Our task is to change the story.

I end with Granny's story, with observations from the last reported sighting as she traveled with J pod on October 12, 2016. Granny's time was near. Her once-robust form was showing signs of emaciation due to starvation. Still, she continued to lead the pod and share precious meals of salmon with younger whales. Granny was last seen heading north in Haro Strait. She traveled far ahead of her pod, which was unusual as she always remained in close proximity to her immediate family, her beloved matriline. When J pod was next spotted, Granny was missing. It was the only time since Dr. Michael Bigg first

documented the Southern Residents in the 1970s that Granny was not with her family. She was never seen again. When I share Granny's final journey, I always conclude with my daughter's consoling words on the loss of this grand matriarch: "Mum, she went straight to heaven, or wherever it is that all whales go". Heaven is truly where all whales go.

Another story of extinction took place in July and August, 2018, when the world watched and grieved with J pod whale Tahlequah as she carried her deceased calf Ti-Tahlequah for 17 days and 1600 km. The babe lived a mere 20 minutes. I remember the joy I felt upon hearing news of the birth, the resultant despair I experienced with the calf's death, and my sadness throughout Tahlequah's journey of grief. Elder Tom Samson (Mapes 2018) of the Tsartlip First Nation spoke of the collective sorrow of the human and more-than-human worlds:

This is our child. This is our relative. She is a mother, she cried for her child to show the world. Something is wrong with what we are doing as a people. It is not about politics. It is about who we are and our relationship with the ocean and the land we live in. (para. 13)

As Tahlequah's mourning unfolded, another J pod calf, 4-year-old Scarlet, was dying. I remember standing on a bluff high above the ocean, scanning the Salish Sea for the whales. My heart rose, then shattered, as far out to sea, the shifting waves revealed Scarlet's small form. She swam slowly and trailed far behind her J pod family. For the past few weeks, her mother and siblings had shared salmon with her, as she could not hunt for herself, and had taken turns supporting her emaciated body as she was too weak to keep pace with the pod. On this day, Scarlet was surrounded by a flotilla of boats, crewed by government officials and whale researchers taking photos, administering antibiotics, and monitoring breath samples. Concerned members of the Lummi Nation were also there with gifts of salmon in the hope she would eat. No one, whale or human, could help, and the following day, Scarlet disappeared. Her mother, Slick, was also absent from the pod, presumably to be with her daughter as she slipped away. A few days later, Slick was again traveling with J pod. Scarlet was not by her side.

As I remember these stories of connection, loss, grief, and extinction of experience, I find solace and hope in a conversation between environmental author and activist Derrick Jensen (2000) and Indigenous scholar Vine Deloria. Jensen posed the question "You've suggested the beautiful possibility that extinction might not be forever, but that, instead, the endangered creatures go away and come back when their habitat *is* once again being treated properly". In his response, Vine Deloria stressed the importance of "preparing the area right" because "traditional Indian knowledge says that beings never become extinct. They go away, but they have the power to come back" (para. 50). I take this conversation as evidence that it is in our power to provide the space, heal the Earth, and maintain the connections for our ki and kin to return and share our story as life-long companions. Extinction is not necessarily forever. As poet Emily Dickinson reminded us, "Hope is the thing with feathers" (Johnson 1960, p. 116). There is always hope, which we must keep alive through our collective and shared ecological memory.

In the new world: Embracing this and that

Many years later, I live in another little home in Kitsilano. It seems things have not changed that much; only the order of some events in life is in reverse mode. My connection with the world continues through the relations between the air, the water, the land, and more. This time, though, the concept of water has expanded to include the continual and relentless rain, and the close-by vast ocean. These days, the connection with the world is not just limited to the breath of the thirsty soil of the old world that arises through the rain, or the

sprays of water on a “vacant” land before games. Because the “intimacy of the heart, ... has no objective tangible place in the world” (Arendt 1958, p. 39), the kinship also has been mulched with the smell of mosses that grow in the presence of constant rain on this land. The connections of oneself with the other have also been enhanced through these diverse biospheric experiences.

In expressing all the different kinds in the world that I have experienced and in searching for the meanings of my life, I can see the link between the ontological, epistemological, and the italicized “is” and “it” of Aoki’s questions “what *is* it?” and “what *is* *it*?” (Aoki 2004, p. 156) in a different light. Hence, keeping both “is” and “it” italicized in that sentence, I ask “what *is* *it*?” This rearrangement momentarily places the focus on the “isness” of the other (p. 156) and deepens understanding by revealing both ontological and epistemological interconnections between the “is” (i.e., the life) and the “it” (i.e., the Earth).

Analyzing the historic relation between positivism, capitalism, and imperialism

That which appears repeatedly through these lived experiences is the *connections* that exist in and with the world. This interdependency of all beings, even in the midst of struggles with the Covid-19 global pandemic, has remained in the shadows of competitions that see success in a focus on “good, better, and best” for humanity’s health and economy. In such pursuits, while science ontologically rejects the existence of any supernatural entity, at the same time, “the neutralization of the historical context resulting from the international circulation of texts and the correlative forgetting of their originating historical conditions produces an apparent universalization” (Bourdieu and Wacquant 1999, p. 41) that denies the existence of the subject. This intense interest in science in *generalization* and how to do something has given a perfect platform to the imperialists and the capitalists, who have always looked for an increase of profit. In such circumstances, science surpasses the power of any other unearthly belief, as it continues to control nature further through its latest prodigy, which is the new technology.

“Ecological imperialism” (Clark and Bellamy Foster 2009, p. 311) continues in the world, and many examples reveal how “the established technology has become an instrument of destructive politics” (Marcuse 1964, p. 227). For instance, invading and occupying Iraq, which apparently was for the “reason” of weapons of mass destruction, was in fact for further exploitation of and profit from that land’s resources, oil (Clark and Bellamy Foster 2009, p. 311), Iraq’s strategic situation, and its role in the geopolitics of the area; this example is still fresh in the world’s memory. However, the practices of imperialism neither are limited to wars for oil nor are contained in Iraq; through “the renewed scramble for Africa, ... or biopiracy aimed at Third World germplasm, ecological imperialism is operating within a global economy predicated on accumulation” (p. 311). The economically advanced countries, with their high standards of living and large footprints, require a continuous appropriation of the land, resources, and laborers of the less “progressed” countries, in addition to those of their own. These constant exploitations aim at the historical beings and, as Hornborg (1998, 2001) and Jorgenson (2006) reminded us, the natural resources, both of which result in historical and ecological degradation of the less “advanced” for the benefits of the opposite side. Moreover, since the larger the scale of the exploitation, the larger the profit, capitalism does not contain itself to one particular area and operates globally “as a particular social metabolic” system “that generates rifts in

underlying metabolic relations between humanity and the Earth and within nature itself” (Clark and Bellamy Foster 2009, p. 313). The capitalist and the imperialist ecologies have worsened the world’s ecological conditions, as they see the air, land, water, and more as just other sources for more profits.

At present, the globe is grappling with a pandemic; both the economy and the health of the world are at risk. At the height of this global struggle with an invisible life, Covid-19, the economy is in a conjugal relationship with psychology but remains indifferent toward the natural world. In such a situation, we turn toward education, the true existence of which is determined by reconceptualizing and understanding the importance of individual subjects, and which forms the foundations of any society. The students and teachers represent an irreducible diversity when linked with their lived experiences and their academic interests, which are also manifold and varied; they can begin a grassroots movement that gradually changes the status of the world. With the inclusion and help of that which is latent in each individual’s lived life in relation with the natural world, the humanity of today may remember its subtle connections with that world.

In doing so, it is necessary to realize that such education requires freedom from the immediate, even though temporary; from the labor of living; and from the economic burdens that can alter the course of any public work. Only through such freedom will the world transcend its current situation. In other words, if the humanity of today keeps the standards of before Covid-19 and resumes its “normal” behaviors from prior to the appearance of the virus, at best—and, of course, in short—it may be able to control this virus or another virus through the employment of the next new biological or technological formulation. But, in the long run, neither can it eliminate the existing or future struggles with the natural world nor is it prepared in any form or way to suffer further disturbances.

The re-arrangeable

Despite the “great” achievements of history, the civilization of today is still incapable of securing the world or understanding it. Modern humanity has an “infatuation” with technology (Grumet 1988, p. 21) and seems to forget that attentiveness and thoughtfulness do not happen in the limitations of a virtual world, but what Aoki termed, “a fuller understanding of understanding” (Pinar and Irwin 2004, p. 157) is plausible in the engagement with and the relations of the existing matter-real world. The term *matter-real* indicates the importance of a “geocentric, terrestrial” (Arendt 1958, p. 286) focus in education. Of course, with a focus on matter, materialism can also be a source of distraction and derailling, as it reifies itself through constant marveling at the next new thing on the market. Knowing such risks, this replighting suggests something different.

The whales’ heartrending stories are a call to action, and in sharing their stories, we can respond to that call. Science education scholar Derek Hodson (2009) advised us to not only engage and connect with the Earth in cognitive, experiential, and affective ways but also to take sociopolitical action on behalf of the natural world. Payne and Wattchow (2009) contextualized Hodson in their advocacy for a slow pedagogy of place, an eco-pedagogy that encompasses the cognitive and affective through experiential, corporeal, spiritual, and cosmological connections. I (Sandra) place my response within the context of the sixth extinction (Kolbert 2014), evidenced today by the escalating environmental crises of ecosystem collapse; biodiversity loss; mass extinctions; toxic air, water, and soil; climate disruption; and Covid-19—all caused and exacerbated by human actions on the Earth. Lawrence Paul Yuxweluptun, captured the definitive cause of this age of the anthropocene in

his rephrasing of Descartes: “I think, therefore I am ... *greedy*” (Institute for the Humanities 2017, timestamp 17.57). We must reject the economic narrative.

Conversations embracing elder knowledge and elder wisdom about the human and more-than-human, storied through the lens of place, as lived by elders facing the threat of displacement from their homes, community, and traditional spaces, provide us with stories of truly *being in this world together*. To connect, we share lived experiences as ki and kin; honor one another with respect, reciprocity, reverence, responsibility, rootedness (Archibald 2008; Kimmerer 2013, 2017; Kirkness and Barnhardt 2001); and nurture our interspecies bonds through spiritual, corporeal, cosmological, and eco-pedagogical connections (Jardine 1998; Payne and Wattchow 2009). Inspiration and guidance can be found in Wendell Berry’s (2003) words “it is not from ourselves that we will learn to be better than we are” (p. 96) and from Robin Wall Kimmerer’s (2013) way forward: “To love a place is not enough. We must find ways to heal it” (p. 317). Change is contingent and incumbent upon us.

This repositioning can be realized through an eco-phenomenological (Brown and Toadvine 2003; Toadvine 2009) narrative. Eco-phenomenology compels us to expand upon human-centred interpretations of experience and further the essence of experience to infuse ecocentric and biocentric ways of knowing, being, and healing. This discernment of experience provides the space for the telling of stories and values and welcomes the responsibility of listening. In this time of environmental devaluing, destruction, and crises of climate and disease, let us draw upon the advice of poet Mary Oliver (2008): “Instructions for living a life: / Pay attention. / Be astonished. / Tell about it” (p. 59). This is the role and purpose of sharing ecological memory through stories.

For me, a “displaced” change comes about through the opening of historical discourse with the natural world. It is only through individual discourses that allow for the discussion of experiences with the other-than-human world that it is possible to address the entirety of the world; its current condition; and perhaps, the course of the future. Countless potentialities can lead to a multitude of possibilities if the centrality of the world—the Earth itself, not places—in relation to the so-called being comes to full realization. The two-fold understanding of being-to-get-her and being-connected-with-one-another reveals Earth as the only entity, without which there is no being for the self or for the other. Hence, to be dependent on being restitutive about, reciprocal toward, and responsive for the other, the Earth. The latter considerations can be practiced through being attentive to individual students and their respective experiences of and their connections with the Earth and its beings. After all, an established cohort whole, a life force, not only is mindful and considerate of the visible, the humans, but also cares for the invisible in the moving shadows of humanism, which fixed on the notions of rational and “progress” through controlling the other, has committed anthropic erosions and resource exploitations and has caused depletions and exhaustions of the other, the Earth.

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